

The Role of Local Institutions in Industrial Cluster Development in Indonesia

The Cases of Javanese Batik Clusters in Kampung Laweyan, Kampung Kauman and Lasem Area

Dissertation

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A dissertation submitted to the Faculty of Spatial Planning, Technische Universität Dortmund in partial fulfilment of the requirements for the degree of Dr.-Ing.

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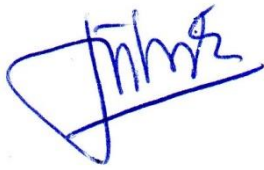
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Declaration of Originality

I hereby declare that this dissertation is the result of an independent research. Where it is indebted to the work of others, acknowledgements have duly been made.

Dortmund, January 2014

A handwritten signature in blue ink, appearing to be 'Prihadi Nugroho', written in a cursive style.

Prihadi Nugroho

*To my father in heaven,
This is for you Dad! Finally I could reach your dream. I cannot wait
any longer for another journey to spread your legacy.*

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Abstract

For decades cluster approach has been an insightful notion of development which has drawn much attention across disciplines. Its theoretical developments and empirical practices never end with satisfying results and consensus (Cumbers & MacKinnon, 2004). No matter how clusters emerge, either in developed or developing countries, urban or rural regions, high technology or labour intensive industries, large or small firms, global or local scales, it has always existed over time and is highly associated with localities, just as what is happening in Indonesia. The cluster approach has re-emerged in recent Indonesian public policy making and sparked the interest of various government agencies. Despite government recognition, it has in fact been implemented ubiquitously and cluster phenomena can be found in many local regions of Indonesia. Regarding such particularities, the common grounds to understand the cluster phenomena are supposed to be placed on localities.

The prolonged government ignorance over the role of local institutions is the central issue in this research. Repetitive action with less understanding of the local institutional setting has been the source of problems in recent cluster policy making. Instead of learning from policy failures in the past and finding alternative ways, the government seems to continue with its one-size-fits-all paradigm in promoting cluster policies. With regard to such policy inadequacy, this research was designed to explore the needs for cluster enhancement stemming from the conditions of prevailing local institutions. This research aims to figure out the influences of the prevailing local institutions on cluster performance. I used a multiple-case study approach to examine three Javanese batik clusters in two different regions, i.e. Kampung Laweyan, Kampung Kauman (Surakarta Municipality), and Lasem Area (Rembang Regency). It was chosen rather than a single case study approach primarily because the cluster phenomena demonstrate enormous variance and inconsistencies across localities. Regarding such locational divergence, the batik industry cluster is suitable to present how the local institutional framework overcomes the diversity. The unit of analysis in this research is batik cluster organisation. It consists of a core batik cluster organisation involving a community-based organisation and the likes of which is acting as a cluster management unit, individual batik firms, and the adjacent neighbourhood society.

The batik industry clusters examined in the Kampung Laweyan, Kampung Kauman, and Lasem Area definitely support the Marshallian industrial district theory rather than the Porterian cluster theory. All cases benefit from the external economies of co-location emanating from a specialised batik labour market pooling and specific batik products. This passive engagement of clustering has brought the typical technical skills, evolutionary production processes, and distinguishable final products of each batik cluster to become the prominent features of the industry resulting from the local adaptation to an inherited batik tradition and external change over time. In addition, co-location does not automatically stimulate collectivism. In spite of promoting intensified inter-firm cooperation, each batik cluster has strengthened the renewed individual business networks. When joint marketing

and batik promotion have appeared recently in the forms of exhibition events, cross-selling, and communal showrooms, these efforts were organised by the local batik cluster organisations to provide incentives for the local batik entrepreneurs and workers to support the so-called cluster programs. More importantly, the lack of inter-firm business linkages has falsified the presence of the clustering practice. The batik firm's individual business networks tend to maintain exclusive connections to suppliers, subcontractors, and consumers. Instead of fostering broader participation from various actors, the batik firms are retaining their preferences to collaborate with trusted partners. Such circumstances have therefore led to the formation of peculiar local institutional frameworks to support the respective batik industry development. This individualistic behaviour has encouraged the local batik firms to compete freely without many interventions from the local batik cluster organisations as well as government agencies. Combined with an uncontrolled imitation process, it has unleashed greater creativity and innovation from the local batik firms to produce additional batik motifs and designs. On the other hand, this has also led to the separation of the local batik industry from the active engagement of neighbourhood society. Thus, the fusion between economic activity and society as suggested in the general cluster theory has not been proved yet in this research.

Keywords: local institutional framework, cluster performance, Javanese batik clusters, multiple-case study approach

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During the same time, I kept my dream to study in Germany alive. I did not know why I had to choose this country to undertake further study. I realised that I could study the cluster topic in many other universities around the world. Still I could not omit Germany from my mind. Slowly but surely, I found my journey got closer to the dream. But I remained uncertain to explain the reasons of my choice until I met Prof. Dr. Einhard Schmidt-Kallert, my first supervisor, by email in 2008 and direct contacts in the following years. Just like a fisherman he was successful to throw a bait of knowledge and skills, which have encouraged me to reveal a variety of academic perspectives as well as empirical life phenomena. For his precious knowledge sharing and kind-and-gentle assistance during my short academic life in the Faculty of Spatial Planning of Technische Universität Dortmund, I could not find the exact words to express my feeling except: “I am so thankful from the deepest of my heart. I owe you once, Professor. If you have a chance to visit my hometown, I will take you to eat a beef rendang (and of course many other Indonesian cuisine) as many as you like.”

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Abbreviations and Acronyms

- AFC : Asian Financial Crisis
- AKATEX : *Akademi Tekstil* (Textile Academy)
- ASITA : Association of the Indonesian Tours and Travel Agencies
- ATBM : *Alat Tenun Bukan Mesin* (semi-automatic weaving handloom)
- ATM : *Alat Tenun Mesin* (machine weaving loom)
- BAKTI : *Batik Asli Kesenian Timur Indonesia* (Authentic Eastern Batik Arts of Indonesia)
- BAKOSURTANAL : *Badan Koordinasi Survei dan Pemetaan Nasional* (National Agency for Survey and Mapping Coordination)
- BAPPEDA : *Badan Perencanaan Pembangunan Daerah* (Local Development Planning Authority)
- BAPPENAS : *Badan Perencanaan Pembangunan Nasional* (National Development Planning Authority)
- BBKB : *Balai Besar Kerajinan dan Batik* (Centre for Handicraft and Batik Research and Development Facility)
- BBPPIKB : *Balai Besar Penelitian dan Pengembangan Industri Kerajinan dan Batik* (Centre for Handicraft and Batik Industry Research and Development)
- BIPIK : *Bimbingan dan Penyuluhan Industri Kecil* (Government Supervision and Counselling Program for Small Industries)
- BLH : *Badan Lingkungan Hidup* (Local Agency for Environmental Protection)
- BPBK : *Balai Penelitian Batik dan Kerajinan* (Centre for Batik and Handicraft Research and Quality Assurance Facility)
- BPKIMI : *Badan Pengkajian Kebijakan, Iklim dan Mutu Industri* (Ministerial Board for Industrial Policy Assessment, Business Climate, and Quality Assurance)
- BP3 TMII : *Badan Pelaksana Pengelola dan Pengembangan Taman Mini Indonesia Indah* (Executive Board for Beautiful Indonesia Park Management and Development)
- BRI : Bank Rakyat Indonesia
- BTA : Batik Tulungagung
- CBO : community based organisation
- CI : cottage industry
- CSR : corporate social responsibility
- DBPS-UKMK : *Deputi Bidang Pengkajian Sumberdaya Usaha Kecil, Menengah, dan Koperasi* (Deputy for the Assessment on Small, Medium, and Cooperative Business Resources Affairs)

- DEKRANASDA : *Dewan Kerajinan Nasional Daerah* (Local Council for National Handicraft)
- DEPPERIN : *Departemen Perindustrian* (Ministry of Industry)
- DINBUDPARPORA : *Dinas Kebudayaan, Pariwisata, Pemuda, dan Olahraga* (Local Agency for Culture, Tourism, Youth, and Sports)
- DINDIK : *Dinas Pendidikan* (Local Agency for Education)
- DINHUBKOMINFO : *Dinas Perhubungan, Komunikasi, dan Informatika* (Local Agency for Transportation, Communication, and Informatics)
- DINKESOSNAKERTRANS : *Dinas Kesejahteraan Sosial, Tenaga Kerja, dan Transmigrasi* (Local Agency for Social Welfare, Labour Force, and Transmigration)
- DINPERINDAGKOP-UMKM : *Dinas Perindustrian, Perdagangan, dan Koperasi* (Local Agency for Industry, Trade, Cooperatives, and Micro, Small, and Medium Business)
- DINSOSNAKERTRANS : *Dinas Sosial, Tenaga Kerja, dan Transmigrasi* (Local Agency for Social, Labour Force, and Transmigration)
- DISBUDPAR : *Dinas Kebudayaan dan Pariwisata* (Local Agency for Culture and Tourism)
- DISDIKPOR : *Dinas Pendidikan, Pemuda, dan Olahraga* (Local Agency for Education, Youth, and Sports)
- DISKOP-UMKM : *Dinas Koperasi, Usaha Mikro, Kecil, dan Menengah* (Local Agency for Cooperative, Micro, Small, and Medium Business)
- DISPARTA : *Dinas Pariwisata* (Local Agency for Tourism)
- DISPERINDAG : *Dinas Perindustrian dan Perdagangan* (Local Agency for Industry and Trade)
- DPD : *Dewan Pengupahan Daerah* (Local Labour Wage Standardisation Council)
- DPP : *Dinas Pengelolaan Pasar* (Local Agency for Marketplace Management)
- DTRK : *Dinas Tata Ruang Kota* (Local Agency for Urban Spatial Planning)
- FDI : foreign direct investment
- FEDEP : Forum for Economic Development and Employment Promotion
- FPESD : *Forum Pengembangan Ekonomi dan Sumber Daya* (Forum for Economic and Resources Development)
- FPKBL : *Forum Pengembangan Kampung Batik Laweyan* (Kampung Batik Laweyan Development Forum)
- FRK-BTL : *Forum Rembug Klaster Batik Tulis Lasem* (Cluster Consultative Forum of Lasem Handwritten Batik)
- GKBI : *Gabungan Koperasi Batik Indonesia* (Indonesian Batik Cooperatives Union)
- GPS : Global Positioning System
- GTZ : *Deutsche Gesellschaft für Technische Zusammenarbeit* (German Technical Cooperation Agency)
- G-to-G : Government to Government

- G30S/PKI : *Gerakan 30 September/Partai Komunis Indonesia* (the September 30th Movement of Indonesian Communist Party)
- HS : Harmonized System
- IDR : Indonesian Rupiah
- IMF : International Monetary Fund
- IPI : *Institut Pluralisme Indonesia* (Indonesian Institute for Pluralism)
- ISIC : International Standard of Industrial Classification
- ITT : *Institut Teknologi Tekstil* (Textile Technology Institute)
- JOGLOSEMAR : Jogja-Solo-Semarang growth triangle
- KADIN : *Kamar Dagang dan Industri* (Chamber of Commerce and Industry)
- KBTL : *Koperasi Batik Tulis Lasem* (Lasem Handwritten Batik Cooperative)
- KHL : *Kebutuhan Hidup Layak* (Decent Livelihood Demand Standard)
- kms : kilometres
- KPM : *Koninklijke Paketvaart Maatschappij* (Royal Dutch Shipping Company)
- KUB : *Kelompok Usaha Bersama* (joint business group)
- LI : large industry
- MCSME : Ministry of Cooperative, Small and Medium Enterprise
- MOA : Ministry of Agriculture
- MOI : Ministry of Industry
- MOT : Ministry of Trade
- MTCE : Ministry of Tourism and Creative Economy
- NGO : non-governmental organisation
- NHM : *Nederlandsche Handels Maatschappij* (Netherlands Trading Company)
- Pemkab Semarang : *Pemerintah Kabupaten Semarang* (Semarang Regency Government)
- PDN : *Perusahaan Dalam Negeri* (Domestic Corporation)
- PERDA : *Peraturan Daerah* (Local Government Regulation)
- PGS : *Pusat Grosir Solo* (Solo Wholesale Centre)
- PHRI : *Perhimpunan Hotel dan Restoran Indonesia* (Indonesian Hotel and Restaurant Association)
- PKWBK : *Paguyuban Kampung Wisata Batik Kauman* (Kauman Batik Tourism Neighbourhood Community)
- PPBI : *Persatuan Perusahaan Batik Indonesia* (Indonesian Batik Firms Union)
- PPBBS : *Persatuan Perusahaan Batik Bumiputera Surakarta* (Indigenous Batik Firms Union of Surakarta)
- PTIT : *Perguruan Tinggi Ilmu Tekstil* (Textile Science Advanced School)
- RPJMD : *Rencana Pembangunan Jangka Menengah Daerah* (Mid-Term Development Plan)
- RPJPD : *Rencana Pembangunan Jangka Panjang Daerah* (Long-Term Development Plan)

- SDI : *Serikat Dagang Islam* (Islamic Trade Union)
 SI : *Serikat Islam* (Islamic Union)
 SME : small and medium enterprise
 SMI : small and medium industry
 SRITEX : Sri Rejeki Isman Textile
 STTT : *Sekolah Tinggi Teknologi Tekstil* (Textile Technology
 Advanced School)
 SUBOSUKOWONOSRATEN : Surakarta, Boyolali, Sukoharjo, Karanganyar, Wonogiri,
 Sragen, Klaten
 TFP : total factor productivity
 TIB : *Textiel Inrichting Bandoeng* (Bandung Textile Research and
 Training Facility)
 TIBP : *Textiel Inrichting en Batik Proefstation* (Centre for Batik
 Textile Standardised Certification Facility)
 UMS : Universitas Muhammadiyah Surakarta
 UMK : *Upah Minimum Kabupaten* (Minimum Labour Wage
 Standard for Local Regency)
 UNESCO : United Nations Educational, Scientific and Cultural
 Organization
 UNS : Universitas Negeri Sebelas Maret
 UNSD : United Nations Statistics Division
 USD : United States Dollar
 WCO : World Customs Organization
 YBI : *Yayasan Batik Indonesia* (Indonesian Batik Foundation)

Tables

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Chapter 1

INTRODUCTION

1.1 Background

For decades cluster approach has been an insightful notion of development which has drawn much attention across disciplines. However, its theoretical developments and empirical practices never end with satisfying results and consensus (Cumbers & MacKinnon, 2004). Until now the major question regarding the necessity of clustering or not remains debatable even though various perspectives on economics (Spencer, Vinodrai, Gertler, & Wolfe, 2010), spatial planning (Asheim, Cooke, & Martin, 2006; Scott, 2006), sociology (Steiner, 2006; Staber, 2007), and public policy (Swann, 2006) have taken part in understanding cluster phenomena. No matter how clusters emerge, either in developed or developing countries, urban or rural regions, high technology or labour intensive industries, large or small firms, global or local scales, it has always existed over time and is highly associated with localities, just as what is happening in Indonesia.

The cluster approach has re-emerged in recent Indonesian public policy making and sparked the interest of various government agencies. At the higher levels, there are *Badan Perencanaan Pembangunan Nasional* (BAPPENAS) or National Development Planning Authority, Ministry of Industry (MOI), Ministry of Agriculture (MOA), and Ministry of Cooperatives and Small and Medium Enterprises (MCSME), for instance. Also, there are Central Java Provincial Government and Semarang Regency Government at the lower level (see Pemkab Semarang, 2002; Media Industri, 2005; FPESD, 2006; DBPS-UKMK, 2007; Pemerintah Republik Indonesia, 2007). However, it remains unclear who first brought it into the public policy realm. At the same time, its resurgence was closely associated with the massive collapse of large industries (LIs) following the 1997 Asian Crisis and the fall of Soeharto's New Order regime in 1998. Such events highlighted the failure of past industrial development policies which had nurtured Indo-Chinese conglomerates and crony-capitalism in forming national industry (Rock, 1999; Hill, 2001; Tambunan, 2005; Depperin, 2008; Nugroho, 2009a).

Despite government recognition, it has in fact been implemented ubiquitously and cluster phenomena can be found in many local regions of Indonesia. Its appearance is characterised by rural economy and underpinned by small and medium industries (SMIs). Such typical rural industry grows depending on agriculture activities, natural resources, traditional technology, family kinships and social networks. Previous studies have shown how the reservation of these features has contributed to the creation of inter-firm linkages in generating local economic development, for example, rattan furniture in Tegalwangi Village (Smyth, 1992), roof tile in Central Java Province (Sandee, 1995 in Berry et al., 2001), the metal-casting industry in Ceper Village (Sato, 2000), and the furniture industry in Jepara

Regency (Sandee et al., 2000 in Berry et al, 2001). However, the early form of cluster approach was initiated by MOI in the mid-1970s under the program of *Bimbingan dan Penyuluhan Industri Kecil* (BIPIK) or the Government Assistance Program for Small Industries. It clustered the selected small industries into industrial estates to achieve a capacity building program. Since the early 1980s BIPIK has evolved by linking these small industries with large firms, state-owned enterprises and multinational corporations through a foster parent scheme (Siahaan, 2000b; Tambunan, 2005). Thus, the rebirth of industrial cluster-based policies seems to represent the “putting new wine in old bottles” paradigm.

Perhaps the 1997 Asian Crisis may provide a key to understand its rationale. While a majority of LIs collapsed, most SMIs could survive even though their existence had been somewhat neglected by the government for a long time. Some observers argued that their endurance is associated with cluster networking where the vertical linkages to LIs never existed because of footloose industries. Others underlined the flexibility of SMIs to shift their production due to market demand. More importantly, their business mostly relies on informal transaction costs and a limited scale of market penetration (see Berry et al, 2001; Hill, 2001; Media Industri, 2005; Tambunan, 2005). Subsequently, the Indonesian Government admitted past policy failures by acknowledging the necessity to build stronger inter-industry linkages involving small to large industries, upstream to downstream industries, and agriculture to service industries by focusing more on deepening rather than broad-based industrialisation. Such a policy shift regards the cluster approach as not only limited in terms of the manufacturing industry but also in broader terms which includes all kinds of industries such as agriculture, tourism, and creative industry. Therefore, it could serve the co-existence of the agriculture and rural sector together with urban manufacturing and service sectors in reshaping Indonesian economic landscape.

Regardless of the virtues of the cluster approach, the intention of repackaging the old policy into a contemporary setting needs to be questioned. Building firm inter-industry linkages horizontally and vertically are indeed necessary for increasing competitive advantages as well as resource redistribution more efficiently through industrial agglomeration of similar or related activities. This may occur if the external economies of clustering are supported by joint action and flexible specialisation between industries (Schmitz & Nadvi, 1999; Meyer-Stamer & Harmes-Liedtke, 2005). However, the past four decades of the industrialisation policy in Indonesia have created ambiguity rather than integrated industrial development. It has promoted a monopolistic industrial structure which more favoured the development of LIs than SMIs. Hence, the bridging of these two types of industries would be problematic since it leads to a mixture of both formal and informal economies at stake.

Furthermore, there remains the problem of channelling rural and urban regions. In fact, the existing spatial system is not ready to support a cluster approach. Past spatial development has created an urban bias phenomenon which encouraged polarisation in some major urban regions. According to Firman (2004), urbanisation in Indonesia is highly concentrated on Java Island mainly surrounding a small number of urban centres such as Jakarta, Surabaya, Bandung, and Semarang. This trend resulted partly from past industrialisation policies which favoured the growth of footloose LIs in these urban areas. As exemplified in the case of Central Java Province, the primate city distribution has been intensified for nearly thirty years during the 1980-2007 periods. The two major urban centres of Semarang and Surakarta remain dominant while the growth of smaller towns is rather lower. In fact, the role of small towns is important in linking rural and urban regions. They can perform

transitional rural-urban mixed spaces where the two-way resources distribution may be more balanced (Nugroho, 2009b). In contrast, many industrial clusters exist in rural regions representing a complex of cottage industries (CIs) and SMIs. They are located near these areas where the access to resources and markets is limited and grow depending on traditional family kinships and social networks (Weijland, 1999). Thus, fitting together different types of industrialisation systems into a single industrial cluster policy is likely to trigger many questions with regard to its rationale, implications and practicalities.

1.2 Problem Statement

Despite the fact that a cluster approach is useful to overcome the absence of inter-sectoral and spatial linkages, it remains debatable if it can meet development goals satisfactorily. For the sake of the cumulative output of the given region, it can improve the economic performance resulting from the advancement of total production output and employment creation, investment inflows, the number of industries, production scale and market penetration, and income per capita. Much evidence from previous research has shown its significant role in improving aggregate economic indicators throughout the workings of informal economy and social networks. On the other hand, some findings show that the effects of collectivism and network externalities may vary between regions. The performance of each cluster cannot be measured by using uniform indicators as it represents a local phenomenon of places. For example, Sato (2000) found that the role of intermediate traders in the case of the metal-casting industry in Ceper Village was influential in determining cluster growth respectively. In the meantime, the key drivers of the rattan furniture cluster in Tegalwangi Village are local entrepreneurship and tacit knowledge and innovation. Its existence is unique because the skills of local producers have been inherently embedded over generations where the supply of raw materials is unavailable nearby. In addition, almost all of its production outputs are to fulfil the export market (Smyth, 1992).

Regarding such particularities, the common grounds to understand the cluster phenomena are supposed to be placed on localities. According to Schmitz and Nadvi (1999), a variety of cluster performances around the world to some extent reflect the deployment of socially constructed institutions of certain places so that its emergence carries out shared norms, values, and socio-cultural institutional setting. Thus, it is difficult to construct a satisfactory theory to explain why particular clusters may exist in one region but not in others. Consequently, conventional economic measures cannot be used when comparing cluster performances, but it is supposed to consider the role of social capital and institutions at a local level for capturing cluster growth patterns (Steiner, 2006). In this sense, the workings of social capital elements create a particular institutional milieu necessary for the establishment of cluster activities and their sustainability. It is important to look carefully at how traditions, norms, and social networks incorporated within existing local institutions affect cluster growth, the process of so-called endogenous development.

Unfortunately, existing cluster policies lack better apprehending of the important role of divergent local institutions in redirecting cluster growth. The cluster-based policies proposed by various government agencies account for its potential benefits in accelerating economy. They look carefully at the identified competitive products in each region, then decide a

commodity specific cluster in that region. Thus, each selected cluster region will promote certain commodities different to those from other regions. By addressing the cluster approach the government expects to encourage the increase of a value-adding process in these regions through the intensification of public expenditures and programs to further inter-industry linkages. However, there are less innovative efforts to the success of this approach. Ironically, they remain more focused on conventional top-down styled incentives such as road and infrastructure provisions, administrative cost cut-offs, micro financing schemes, and technical assistance programs.

Even though such public provisions are important, they would not immediately solve the problems of clustering. The pattern of inter-industry linkages and growth trajectories may vary so much between regions that uniform policies would not work in this case. Some clusters perhaps require more infrastructure and shared facilities. Others may require more access to raw materials and markets. Cluster needs cannot simply be assessed by using a top-down mechanism and merely analysing secondary data and information. The policy failures of the past, as exemplified by the BIPIK program and its derivatives, were caused by such inappropriate assessments. It has demonstrated the subordination of the government to the internal capacity of SMIs compared to LIs in terms of producing high returns, creating employments, promoting innovations, etc. In addition, the government has also ignored the self-organising ability of SMI clusters in sustaining their businesses. Instead they are often seen as helpless entities which require external support. In many cases they can actually build particular inter-industry linkages from below to survive. Thus, local institutions should be understood sufficiently in order to look after cluster growth.

1.3 Research Question

The prolonged government ignorance over the role of local institutions is the central issue in this research. Repetitive action with less understanding of local institutional setting has been the sources of problems in recent cluster policy making. Instead of learning from policy failures in the past and finding alternative ways, the government seems to continue with its one-size-fits-all paradigm in promoting cluster policies. The government looks overconfident in predicting that such policy approach continuation will automatically lead to the creation of a stronger industrial structure. The absence of inter-industry linkages is expected to diminish by such government intervention. The government indeed does not intend to dictate clustering processes on the field. Rather, the government attempts to facilitate the strengthening of potential commodity specific clusters in each region. However, this effort is not enough. The government is supposed to gather sufficient information from below about the needs for cluster enhancement. On the other hand, the campaign for the cluster policy itself is not enough to ensure the creation of inter-industry linkages. There are a plenty of related policies that also need readjustment. For example, foreign trade policies that allow similar imported products, environmental laws that limit the use of natural resources, intellectual property rights laws that inhibit product imitation and innovation are some of that the government should take into consideration to facilitate cluster growth.

With regard to such policy inadequacy, this research is designed to explore the needs for cluster enhancement stemming from the conditions of prevailing local institutions. This

would be useful in redirecting existing cluster policies. Understanding what kind of support the cluster communities require from the government may provide insightful feedback for policy improvements. Learning from the past, it is actually the nature of clusters, particularly the SMI clusters, to survive with less support from the government. They can somehow find alternative ways to keep their businesses running and competing in the markets. Thus, I argue that this nature should be preserved by preventing unnecessary intervention by the government. Because cluster entities have mostly originated from local societies, hence government intervention should be incorporated somewhere between society and the market. In response to this I have raised the following research question:

“How the prevailing local institutions influence cluster performance?”

The research question is divided into the following detailed questions:

1. What are the types of formal and informal institutions made up to underpinning local clusters? How do they contribute to create a particular institutional framework useful to encourage (or discourage) cluster performance?
2. How the inter-industrial linkages are shaped in local clusters? What are the typical industrial input-output preferences incorporated into those linkages? What are the competition and cooperation patterns responsible for those linkages?
3. Does a particular social cohesion condition correlate to cluster performance? How do the existing social networks take a role in promoting local clusters? What sorts of norms and traditions are maintained to (re-)generate industrial clustering activities?
4. What are the key factors of local institutions related to cluster performance? How these factors can be adapted into cluster theory and practice? What are the policy recommendations suitable to local cluster enhancement?

1.4 Goal and Objectives

This research is aimed at discovering the influences of prevailing local institutions on cluster performance. Arguably, local institutions provide critical foundations from which cluster performance differs from one region to another, given the assumption that all production factors and capacity are comparatively similar. To achieve this goal, some objectives that will be pursued are as follows:

1. To identify both formal and informal institutions associated with the creation of local cluster’s institutional framework;
2. To scrutinise the formation and performance of local cluster;
3. To scrutinise the existing inter-industrial linkages within local cluster;
4. To identify the underlying input-output preferences and the patterns of competition and cooperation contributed to the existing inter-industrial linkages;
5. To scrutinise the existing social cohesion within local cluster;
6. To identify the role of social networks, norms, and traditions to cluster performance;
7. To assess the key factors of local institutions related to cluster performance;
8. To identify theoretical feedback and policy recommendations suitable to local cluster enhancement.

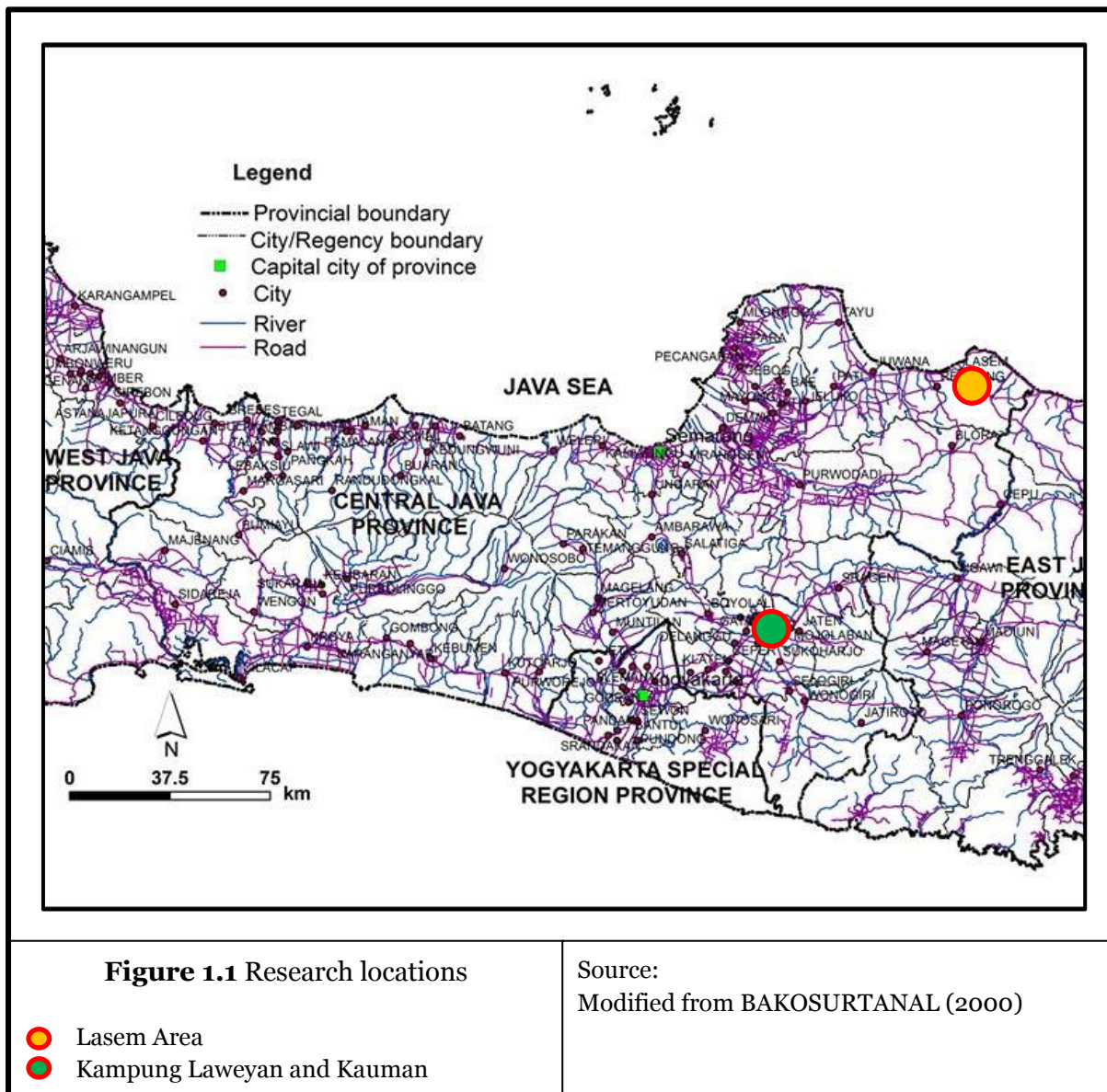
1.5 Scope of Research

Substantively, the scope of the research addresses the influences of local institutions on cluster performance by focusing on the contribution of the local institutional framework to clustering activities. The interplay between formal and informal institutions will be scrutinised in order to figure out the major determinants of cluster performance emanating from the established institutional framework. The research encompasses the government side's cluster-related policies (and relevant regulations) and public agencies responsible for ascertaining their implementation. I will not examine the entire policy making process nor the policy effectiveness related to cluster adoption to local development strategies. Also, I will not examine the complexity of government bureaucracy which is probably correlated with the condition of present institutional framework. Rather, I will merely check the delivery of government programs and the involvement of various public agencies to succeed with a cluster approach.

On the other hand, the research will examine local cluster dynamics in terms of the building of collective networks necessary to increase cluster performance. How the participating actors interact and their networks get engaged within the circle of local cluster is the central issue of the research. Such circumstances reflect the principle of the cluster approach which suggests the importance of joint action in search of collective efficiency and accumulated economic benefits of industrial co-location. However, I will not evaluate the condition of adjacent neighbourhood society to which the respective cluster is being attached. Indeed it is important to understand thoroughly how the society responds to clustering activities, mainly because it provides the closest source of social norms and traditions which is likely to shape local cluster performance as well as entire institutional framework. To accommodate this, I would like to examine the practices of social norms and traditions encapsulated and shared in the local cluster. Even though special attention to the adjacent neighbourhood society will not be paid, I expect that the investigation of local cluster performance may result in some indications as to what the society looks like.

The case of this research is batik industry cluster. I am undertaking a multiple-case study research covering three batik clusters in Surakarta Municipality (Kampung Laweyan and Kampung Kauman) and Rembang Regency (Lasem Area). There are several reasons behind this choice. First, the batik industry represents the symbol of national identity. Many ethnic groups in Indonesia have been producing batik cloth and clothing for decades. Each batik product carries out the preservation of locally sociocultural values as reflected by its design in particular. Also, it represents the different production processes which may indicate how the local traditions have been combined with the adoption of new technology. Second, batik industrialisation is a form of endogenous development. Originally, the batik industry represented a home-based industry that grew over generations. Its evolution is mostly shaped by the inheritance of local knowledge and wisdom. Thus, its existence can reveal the nature of local values. Third, the batik industry has developed intensively. This means that it consists of multiple sized industries ranging from small to large firms, and downstream to upstream industries. Therefore, the economic multipliers of the batik industry for local development are relatively high because it is characterised by labour intensive industry with concrete inter-industrial linkages.

The research takes place in two different regions in Central Java Province, Indonesia (see Figure 1.1). Actually, there are many batik regions in this province, but I have considered these two regions for several reasons. First, each batik industry cluster has developed quite differently. Batik Solo, which is primarily produced in the Surakarta Municipality, is broadly known for its distinguished design and is more famous than Batik Lasem. The batik industry in Surakarta has reached a higher level than its competitor in Rembang. Second, the aspects of socio-cultural values associated with their developmental trajectories are different. The batik industry in Surakarta is identifiable by Keraton Surakarta (Surakarta Court), which has been influenced by classical batik motifs while in Rembang by the Chinese handwritten batik tradition. Third, the local development setting is also different. The batik industry in Surakarta Municipality has benefited from better urban access and infrastructure. Located in the Province's mainland, it is accessible from primary urban centres, i.e. the capital city Semarang and Yogyakarta Special Province. In contrast, the batik industry in Rembang Regency lies on a less developed rural region. It is located on Java's north coast where agriculture and fishery sectors have dominated the local economy and as well as social culture. By undertaking such a multiple-case study, I expect to discover comparable influences of the local institutional framework towards batik cluster performance.



Chapter 2

THEORETICAL REVIEW

2.1 Understanding Cluster Theory

Emerging Cluster Definitions: Two Mainstreams Contested

Cluster is not an easy term to define, and getting a general definition of cluster terminology is perhaps a daunting task to complete. In the past two decades, many scholars have attempted to identify thorough cluster definitions but there is still no satisfying consensus to explain the cluster phenomena over the world (Maskell & Kebir, 2006). Some definitions may carry out more conceptual terms while the others are operational. They may apply in certain places but not in the rest. There is simply no common agreement among scholars, practitioners and policy makers in defining “what” cluster is.

In general, the term cluster is closely associated with words such as group, homogeneity, existence, dynamism, and proximity. Some theorists may approach these elements of cluster differently. According to Schmitz and Nadvi (1999), the simple definition of cluster refers to “sectoral and spatial concentrations of firms”. Meyer-Stamer and Harmes-Liedtke (2005) underline that firms which agglomerate in certain locations are closely related. Thus, the technical term of cluster must deal with two kinds of proximity: territoriality and functionality (Malmberg & Power, 2006; Belussi, 2006). The territorial element suggests that cluster may exist in specific locations where its members are attracted to concentrate. Hence, such locations embrace certain features of co-location attractiveness. On the other hand, the functionality element highlights the importance of interconnectedness between cluster members. This means that there must be similarities and/or relatedness of certain economic activities within cluster. Therefore, the economic benefits must be the key driver that reinforces cluster formation. Belussi (2006) has discussed a wide range of cluster definitions showing these two elements from different perspectives (see **Box 2.1**).

Box 2.1 Some definitions of industrial districts or clusters

Term #1: INDUSTRIAL DISTRICT AS A SOCIO-ECONOMIC CONCEPT

Becattini (1987, p. 47): *“The Marshallian industrial district constitutes, thus, a localized thickening (in this spatial determination we find its weakness and its strength) of inter-industry relationships, that show a consistent stability during time.”*

Continued in the next page

Box 2.1 continued

Pyke, Becattini and Senberger (1990, pp. 16-17): *“Industrial districts are geographical defined systems, characterised by a high number of firms active in different stages and in different modes of the production of a homogenous product. A significant characteristics is that a large part of these firms are small firms or very small firms ... The various districts are specialised in different products with various degrees of complexity and with different final uses ... A characteristic of the industrial district is that it has to be thought as a unique unity, a social and economic system ... Important is the fundamental role played by the various forms of cooperation among the firms which is communitarian.”*

Term #2: CLUSTERS AS VAGUE SPATIAL SYSTEMS

Rosenfeld (1997, p. 4): *“A cluster is very simply used to represent concentrations of firms that are able to produce synergy because of their geographical proximity and interdependence, even though their scale of employment may not be pronounced or prominent.”*

Feser (1998, p. 26): *“Economic clusters are not just related and supporting industries and institutions, but rather related and supporting institutions that are more competitive by virtue of their relationships.”*

Roelandt and Den Hertog (1999, p. 9): *“Clusters can be characterised as networks of producers of strongly interdependent firms (including specialised suppliers), linked to each other in a value-adding production chain.”*

Enright (1996, p. 191): *“A regional cluster is an industrial cluster in which member firms are in close proximity to each other.”*

Lundvall and Borrás (1997, p. 39): *“The region is increasingly the level at which innovation is produced through regional networks of innovators, local clusters and the cross-fertilising effects of research institutions.”*

Term #3: CLUSTERS AS CLOSE SUBSTITUTES FOR THE CONCEPT OF INDUSTRIAL DISTRICT

Maskell (2001, p. 925): *“The term cluster is used synonymously in the literature together with industrial agglomeration or localisation, while the term industrial district ... is often applied when wishing explicitly to emphasise to values and norms shared by co-localised firms.”*

Asheim and Isaksen (2002, p. 77): *“The crux of the regionalisation argument is that the regional level, and specific local and regional resources may still be important in firms’ effort to obtain global competitiveness ... firms in the cluster rely on unique regional resources and local cooperation when innovating.”*

Cooke and Huggins (2002, p. 4): *“Clusters are geographically proximate firms in vertical and horizontal relationships, involving a localised enterprise support infrastructure with shared developmental vision for business growth, based on competition and cooperation in a specific market field.”*

Source: Belussi (2006)

Of those definitions – of course there are still many other definitions – neither can bring two elements together satisfactorily. Indeed, they have tried to come up with such overarching definitions, but most of them tend to put more emphasis on one element rather than reconciling both together. They reflect the contrast between the two mainstreams of cluster theory over decades, the Marshallian industrial district vis-à-vis the Porterian cluster theory. Hence, it is not surprising if many literatures in industrial organisations carry out the influences of these mainstreams inside their arguments. The Marshallian industrial district addresses the importance of spatial agglomeration that enables firms within proximate locations to obtain increasing external economics of scale by co-location. The concentration of firms in the same location is more likely to create spillovers of benefits of economic activities – the idea which is later well known as the so-called localised economies – than those that are widely dispersed. In contrast, the Porterian cluster theory suggests the importance of functional linkages between similar and/or related firms and supporting

organisations as a profound business strategy in enhancing competitiveness. The concentration of firms is a means of supporting the key industries to generate innovation and productivity, from which certain locations may accumulate their competitiveness. Therefore, this theory is concerned with value-adding mechanisms through the clustering of economic activities (Asheim et al., 2006; Belussi, 2006).

Alfred Marshall (1890), who pioneered the investigation of the origins of industrial organisations, originated the industrial district theory. He observed some industrial districts in Italy, which were typically formed by small firms – the theory is broadly known as the so-called Third Italy. The districts cover areas of Veneto, Emilia-Romagna, Toscana and the Marche (Asheim et al., 2006). The first and foremost feature of the industrial district theory is localised external economies. It is attainable if firms locate closely together in a certain bounded area. The benefits of co-location may emerge through the shared utilisation of infrastructure such as roads, transport and communication, while individual firms are in the race to increase their own internal returns of production at the same time. More importantly, co-location may result in knowledge spillovers shared between firms and actors in the given industrial district, through which the decisions of augmenting the scale of production and market penetration are made up. In addition, this shared knowledge is useful to generate transfer of productivity and innovation for the entire community of an industrial district. This process takes place by mobilising trust and cooperation networks between its members. The local knowledge of economic activities spreads through the process of imitation, technological adaptation, the upgrading of workers' skills, money lending and many other forms of social capitalisation. Thus, an industrial district represents the fusion between society and economy where the local community gets engaged actively along the value chain processes of concentrated firms. Such situations are known as local industrial atmosphere, which represents another key feature of the theory (Belussi, 2006).

The forms of localised external economies of an industrial district may be present by: 1) skilled labour pooling, 2) supporting activities, and 3) specialisation between inter-related firms. The skilled labour pooling may occur due to the effects of industrial agglomeration which creates a labour market system, in which firms can maximise job-matching opportunities to hire potential workers in response to market conditions. On the other hand, the workers will also have similar opportunities for their skill upgrading and career development. Therefore, co-location of firms may provide an efficient way to maintain production shift more easily. The presence of supporting activities is observable through the shared utilisation of the aforementioned infrastructure. Sometimes these supporting activities can be seen in non-traded activities such as health centres, schools, childcare facilities, mass transportation and so forth. Finally, inter-firm specialisation can be created because of the divisions of labour between firms along the value chain processes. This means that firms within an industrial district are able to specialise their products and scales of production flexibly in response to meet the market demand. All these forms add more to the characteristics of the local industrial atmosphere by putting more emphasis on economic sense (Gordon & McCann, 2000; Asheim et al., 2006).

Unlike the Marshallian industrial district theory that sheds much light on the importance of local territorial bonding of concentrated firms and society, the Porterian cluster theory has paid more attention to the functional linkages between concentrated firms and their supporting institutions. Michael Porter constructed a cluster theory during the 1990s concerning the competitiveness of nations. Later, his theory was also widely being adopted

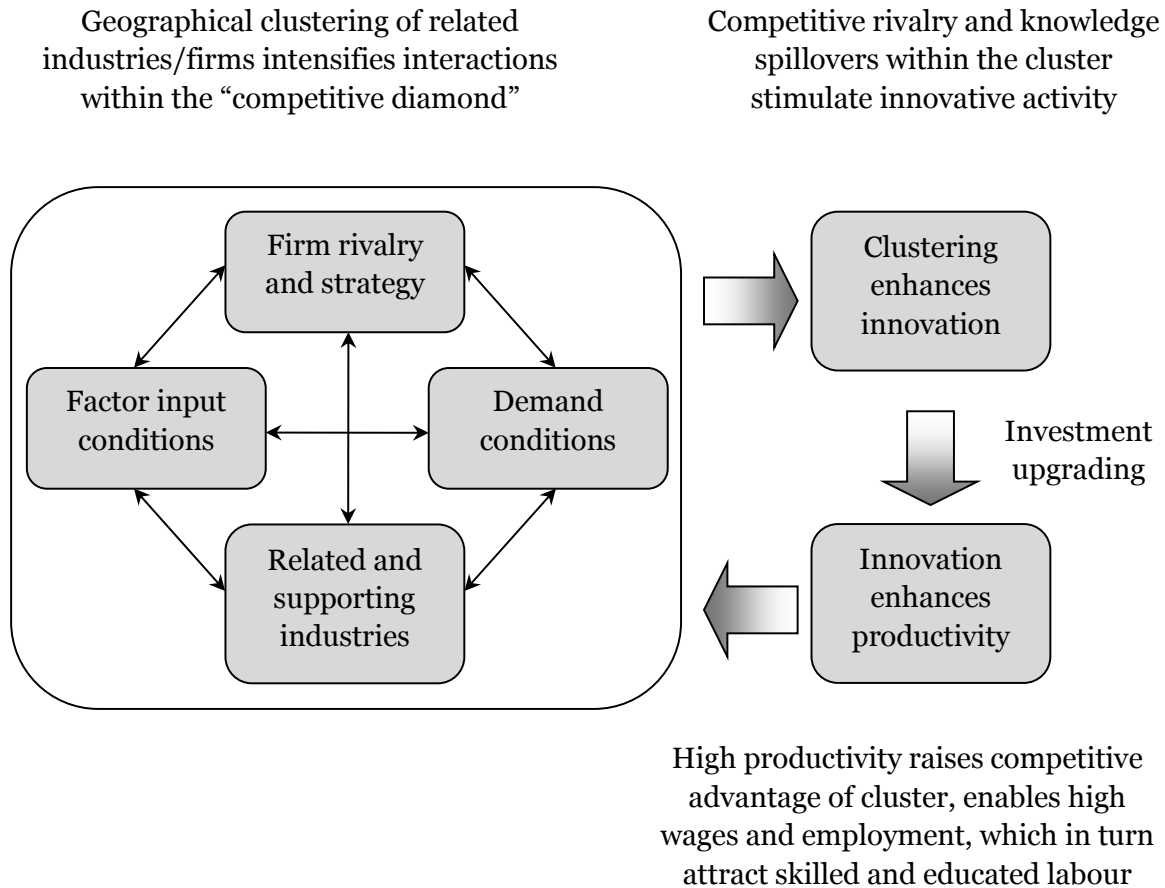
into the context of regions and localities. In doing so, he suggested industrial clustering as the way of building competitiveness based on market competition. Porter (1998) defined the term cluster as follows (Asheim et al., 2006):

“Clusters are geographic concentrations of interconnected companies, specialized suppliers, service providers, firms in related industries, associated institutions (for example universities, standards agencies and trade associations) in particular fields that compete but also cooperate.”

According to Asheim et al. (2006), his definition carries out the elements of functional linkages of interconnected firms and associated institutions and spatial proximity of cluster members. The functional linkages emerge through the interconnectedness of commonalities and complementarities, which present two types of mechanisms: 1) both vertical (value-adding chains) and horizontal linkages (complementary and supporting goods and services), and 2) social networks of trust and cooperation. The spatial proximity, on the other hand, is necessary to form and enhance the value-adding process resulting from interactions between firms both directly and indirectly. Even though Porter seems to highlight the importance of co-location between firms, he did not clearly explain “what” and “how” this may occur. Rather, he pointed out how the clustered firms and associated institutions may create such an initial business environment necessary to foster the creation of innovation and productivity. Thus, the mechanisms of producing innovation and productivity are the key features of the Porterian cluster theory, not the process of spatial industrial agglomeration.

To explain his cluster theory Porter introduced a model of competitiveness– a model which is later well known as Porter’s Diamond Model (see Figure 2.1). At the beginning, under the market systems firms are supposed to create an alliance of four sets of factors: 1) firm rivalry and strategy, 2) factor input conditions, 3) demand conditions and 4) related and supporting industries. The intensified interactions between actors within the alliance reflect two things: the (leading) firm’s business strategy and initial institutional setting. Arguably, such interactions will be greater if the alliance members are geographically clustered within proximate locations. The next stage, he argued, such clustered alliance will lead to the advancement of an innovation process stemming from competitive rivalry and knowledge spillovers within the cluster. As innovation increases, it is likely to induce new investment instalments. In turn, the increased innovation will enhance higher productivity that determines the competitive advantages of cluster. All these stages are viewed as a circular process nationwide. However, Porter also believed that industrial clustering is not only a common sense way of decomposing national economy, but also useful to analyse either local or global economy (Asheim et al., 2006; Belussi, 2006).

Figure 2.1 Porter's Cluster Model



Source: Porter (1990) in Asheim et al. (2006)

Apart from the different approaches between the Marshallian industrial district and the Porterian cluster model, both theories share some common ground:

- 1) The spatial proximity of concentrated firms and actors within the industrial district or cluster;
- 2) The localised economic benefits resulting from the interactions of interconnected firms (local multiplier effects);
- 3) The emerging dynamic socioeconomic linkages between firms over periods of time;
- 4) The transfers of knowledge and innovation between firms through particular mechanisms; and
- 5) The existence of local institutions in underpinning a business cycle.

All these elements are typical in finding out whether an industrial district or cluster may exist in certain places. Actually, they represent a more specific definition of the cluster theory than that which discussed at the beginning of this chapter. However, there remain debates among theorists, practitioners and policy makers for making such a definition measurable in the field. There are some considerations that should be taken into account in observing cluster phenomena. First, the boundaries of clusters should be clearly delineated. This is not simply drawing the lines of cluster territory on a map, but more importantly, it may include

the sphere of influences of firms and actors involved in cluster activities. This means that the observers must be aware of the context of localities of clustering ranging from small village to global regions (Belussi, 2006; Malmberg & Power, 2006). Second, the number of firms (cluster population threshold), a variety of firm sizes, industrial structure and organisational arrangements are important to measure the types of externalities generated. This implies on the degrees of collective efficiency and competitive values attained (Belussi, 2006). Third, the evolutionary trajectories of cluster growth need to be assessed thoroughly. Simply the reason is that cluster is a local phenomenon so that its dynamics cannot easily be compared from one case to another. For example, some clusters consist of large high-technology firms while others are small and medium industries, but they can achieve successful development by following different ways (Belussi, 2006). Fourth, the role of local institutions is influential in determining how clusters work. In this sense, local institutions refer to social norms, networks, and regulations (the rules of the game) necessary to support the mechanisms of economic transactions as well as knowledge and innovation transfers between firms. Such institutional setting determines how cooperation and collective action could work while firms are competing with one another (Schmitz & Nadvi, 1999; Malmberg & Power, 2006).

Critical Review on Cluster Practices

With respect to its virtues, recent cluster development has unveiled some criticisms over its practicalities and theoretical generalisations. A variety of previous research findings told us that the development of cluster theories has not yet been completed. Either the researchers rely mostly on Marshallian territorialism or Porterian functionalism, the rebuilding of existing theories are possible including the attempts for providing alternative theories. At least there are three aspects in the cluster theory that require further discovery: 1) spatial proximity, 2) the creation of inter-firm linkages, and 3) the role of local institutions. In contrast, there is no empirical evidence refuting the necessity of a cluster approach in generating local economic multipliers as well as the transfer of knowledge and innovation. Cluster has been acknowledged as a local phenomenon which cannot be found ubiquitously but it may exist in specific locations – no matter how the observers delineate the boundaries of localities. Also, cluster is useful to accelerate transfer of knowledge and innovation through a variety of value adding processes. The following will discuss those criticisms further.

Nowadays, spatial proximity is no longer necessary as a stringent feature of cluster phenomena. The concentration of interconnected firms does not always correspond to geographical closeness due to the decline of physical barriers of exchange in trade, social and information entities. Following the progress in information and communication technologies and the forces of globalised trading systems, expansion of inter-firm linkages may not only be limited into the local boundaries. For example, spatial proximity is unnecessary for global clusters such as computer, automobile and biotechnology industries. The specialised production of cluster members is divided subject to the competitiveness of firms and nations or regions. In general, this case exists in clusters which involve multinational corporations, and capital intensive and high technology industries. However, in other cases spatial proximity may be still beneficial for cluster development. It may be required to accumulate collective efficiency in certain phases of production and to mobilise the low capacity of firms.

The second criticism relates to the generation of localised economic benefits and transfers of knowledge and innovation. In fact, this is not an automatic process once the given cluster exists. The clustering of firms requires the leading roles of a particular number of firms and actors where the rest of the cluster members will follow. The hierarchical structure of power and leadership in cluster will determine what and how local multipliers are driven. Firms and actors who hold influential positions within the cluster society are likely to be the most important drivers for generating local multipliers. They may perform either as internal or external agents for cluster development. The internal agents may be the pioneering or prominent entrepreneurs, informal leaders, local government officials and business associations. The external agents are such as foreign buyers, exporting firms, intermediate traders or brokers and nongovernmental organisations (NGOs). This means that local multipliers emanating from clustering activities may be generated internally or externally.

Thirdly, cluster evolves in response to the change of local institutional setting. But this does not occur equally in reverting direction. It is broadly accepted by scholars that as a subset of larger society, cluster will respond to the conditions of social order. As social structure and relations change, it is likely to affect cluster performance. Either the sources of social change may come from anticipated events like annual inflation increase, repetitive seasons like flooding, or sudden shocks like political turmoil, cluster is vulnerable to endure during unstable environment. Nevertheless, whenever cluster performance fluctuates, it does not always affect the predetermined local institutions. It is fair to say that the change in cluster performance might have a slight change on local institutions. Most previous findings showed the contribution of clustering activities to local development in terms of export share, income generation, job creation, entrepreneurial and skill upgrading and the transfers of knowledge and innovation. However, the reservation of such achievements somehow remains isolated within cluster society. This means that the effects of collective efficiency and action are less developed to help to improve the standards of living of the larger society. Therefore, the reciprocal relationships between local institutions and cluster performance still require further investigations.

2.2 The Importance of Local Institutions in Cluster Theory

Defining the Concept of Institutions

Institutions are simply about “know-how” to make things work in certain ways. They set up the creation of an environment to support human interactions in society. The outcomes of the functioning of institutions are social order by which the appropriateness of thoughts, beliefs, behaviours and relations performed by society members are assessed. In this sense, according to North (1990), institutions reflect the rules of the game that carry out bonding and restrictive features, the so-called humanly devised constraints, imposed to the given society members. This definition does not simply refer to the stipulation of permitted and prohibited activities, rather it reinforces the necessity of reducing uncertainties of life events. By constraining the ways of interacting between people, the risks of continuing uncertainties and harmful misconducts to entire society can be minimised.

North (1990) argued that the rules of the game are useful to provide a structure of incentives that shapes human interactions. This structure is formed by two kinds of constraints, namely formal and informal constraints. The former includes all written rules and regulations such as constitution, judicial laws, treaties and contracts. The scope of formal rules is more specific and focused in an attempt to deal with certain issues, hence it encourages rigidity in nature. The latter includes conventions, codes of conduct, custom and all types of unwritten rules transmitted to people socially. Often they consist of unclear, inconsistent and ambivalent substances since their dispersal mostly relies on oral expression, body language, common attitude and behaviour as well as symbolic rules so that interpretations of their meanings may vary. However, both constraints are complementary to each other to get a better understanding of social phenomena thoroughly. Informal rules may provide a broad contextual setting that makes up entire social life, which is useful in directing the workings of formal rules to increase their enforcement more effectively. On the other hand, enforcing formal rules without considering the influences of informal rules on both an individual and group decision-making process is likely to produce incorrect understandings. Hence, North suggests that we should regard these two on balance instead of choosing the best one.

The main reason of establishing institutions is to reduce the risks of uncertainties. Because life events are so countless and unpredictable in contrast to the limited capabilities of human beings to handle them, the role of institutions is beneficial to capture possibilities that people can attain. At the heart of any kind of institutions is the prevention of human beings from detrimental conditions while they are pursuing a better livelihood. In his discussion, North (1990) explained that opportunities to wealth maximisation could be the ultimate goals for the institutions creation. He underlined two basic assumptions on building his theory: market imperfection and human behaviour. Under a market imperfection state, information related to the market spreads asymmetrically. Individuals cannot ascertain the value preferences of others completely. Because they cannot rely on invisible hand mechanisms to correct market failures regarding wealth maximisation for an entire society, individuals tend to be the profit maximisers for them in order to achieve the preferred prosperity. In this sense, North assumes that individuals are rational in the making of choices. They are likely to gather information from others by any means, including spying for and stealing from others, rather than surrendering their rational choices to market prices only. As a result, those who have a sufficient amount of information may be in a better position while deciding their preferential choices than the rest.

The second assumption is about how human behaviour may influence individual choices. By raising this assumption North (1990) intended to criticise that rationalistic model of choice is inadequate to explain social phenomena. Arguably, human interactions are so multifaceted that not all individuals are quite rational in a decision-making process. The purpose of wealth maximising efforts is not always on the basis of individualism and capital accumulation of wellbeing. Some groups of individuals may work relentlessly due to religious beliefs, collectivism and social responsibilities. The way people achieve this purpose is not always to promote competition as suggested by the rational choice model. Sometimes people conduct voluntary actions and cooperation in pursuing their interests. Therefore, he addressed human behavioural assumption to fill in such gaps of understanding social phenomena. This refers to the notion of that human beings do not behave representing individual entities but also the member of social entities.

The importance of understanding human behaviour rests on the creation of knowledge with respect to human perceptions about what the real world should be. This does not simply relate to instrumental capabilities in determining the ends and means of maximising wealth opportunities. This idea deals with the learning abilities of human beings in shaping their entire life. North (1990) introduced two variables to understand human behaviour, namely motivation and the ability of deciphering the environment. Motivation is associated with the mental construct intrinsically embedded within individuals, which carries out certain value preferences. It determines the reasoning process of behaving regardless of how sensible it is. It is not always rational and understandable because it is closely linked to complex cognitive systems of thinking. The product of this process is the perception of satisfying a welfare state and the ways to achieve it. The second variable corresponds to the abilities of human beings in adapting to changing environment. How people understand and respond to such change is critical to figure out the connection between their intentions and actions. Either people are keen to continue undertaking similar and repetitive actions or seek alternatives responding to the changing environment that will unveil human adaptive behaviour. In turn, this will lead to typical survival strategy of individuals in struggling for their interests.

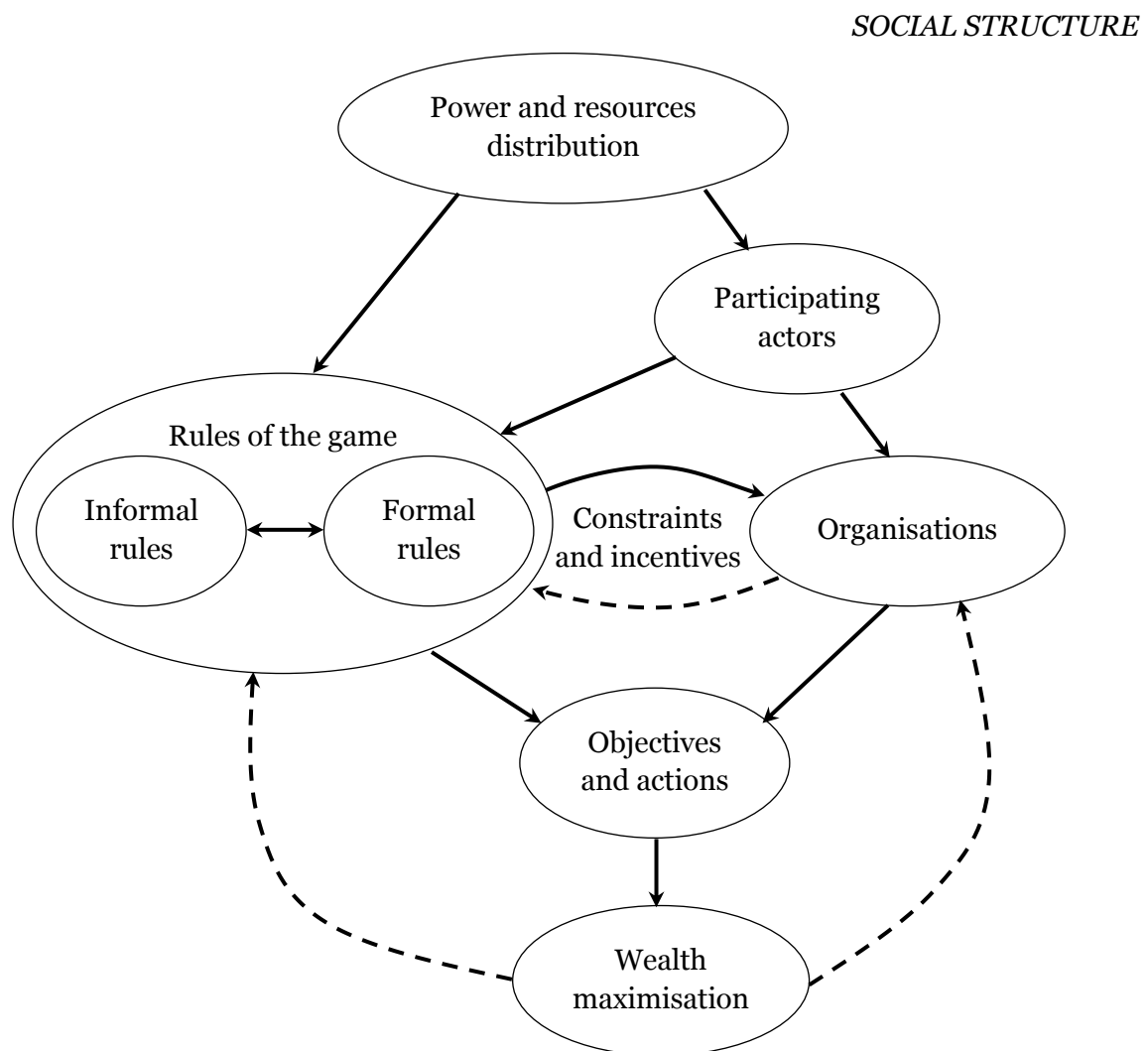
To make institutions work, individuals are not only confined by a set of rules and regulations but these must be followed by rules enforcement to assure their proper implementation. The absence of enforcement may attract some groups of people to oppress others because of self-interest maximising behaviour. The ruler must therefore set out sanctions for any misconduct. In general, stricter rules and sanctions may apply in a society when there are more knowledge gaps between individuals to decide the most preferred alternatives responding incomplete information about opportunities of wellbeing. Such circumstances are inevitable because the nature of human beings is the wealth maximiser so that free competition may result in winners and the losers. This demonstrates that human behaviour is another potential source of uncertainties instead of the opportunity of wellbeing per se. Therefore, the deployment of robust institutions is required to inhibit discerning actions from one to another that reduce equal access to such opportunities (North, 1990).

The building of reliable institutions to minimise risks and uncertainties nevertheless is insufficient to achieve such ultimate goals. Institutions need a vessel to put their policies into practice. This vessel is organisations. North (1990) defines organisations as the groups of individuals with common interests in order to achieve a set of objectives. Organisations carry out particular norms and values of institutions as embedded in their objectives and function to govern their implementation. Institutions provide incentives for organisations to take advantages of wealth opportunities. On the other hand, the outcome resulting from organisational performance will give feedback for institutional improvement. This may indicate whether the institutions are quite effective, even though it is unnecessary to be efficient, to ascertain the opportunities. Therefore, organisations play a significant role as the agents of institutional change.

However, the existence of organisations in society is pivotal in terms of what better or worse welfare conditions they may impose. As discussed earlier, every organisation is built upon particular institutional preferences to achieve a set of objectives. A group of organisations may promote a similar platform of values and norms but they have different objectives to pursue. Alternatively, they may be created on a basis of different institutional milieu but they share similar or diverse objectives. At the heart of this situation is that the attainment of social welfare is not determined by the number and performance of organisations per se.

Despite the usefulness of the establishment of organisations, there remain the contentious problems of competition and cooperation. Individuals and organisations share these problems along the process of pursuing their interests. The tensions between social agents are inevitably part of efforts to ascertain welfare opportunities. The efficacy of their roles in acquiring social welfare perhaps is critical factor to assess their significance. At least their creation is not supposed to worsen the existing condition. In this sense, opportunities to better livelihood are basically open resources to all, but the pursuit of maximising self-interest by either individuals or organisations should not impinge on the rights of others (see **Figure 2.2**).

Figure 2.2 Scope of institutions



Source: Nugroho (2013, p. 5)

With respect to the idea of how careful social agents are handling the problems of competition and cooperation, there are three basic forms of organisation: state agencies, private sectors and community-based organisations. Basically, the performance of these organisations is still based on rationalistic and self-interested behaviour. However, once they can share common objectives then it becomes possible for them to conduct collective action.

In fact, promoting collective action is not easy because of those who are not willing to contribute, a situation that is well known as the problems of free riding. Olson (1965) suggested that collective action may fail if there is no exclusion of those who can freely obtain the benefits of the production of collective goods and services. As a result, people prefer not to contribute instead of voluntarily cooperate to conduct collective action.

State intervention may create regulations coerced by government bodies to take control over the provision of collective goods and services. They can take the lead and coordinate their provision by using bureaucratic structure. But their performance relies heavily on their internal capacity to collect accurate information about common pool resources. In addition, this capacity relates to government abilities to administer the costs of their provision, including accomplishing monitoring and sanctioning actions. Many governments are in fact unable to finance these actions through public expenditure. In turn, their provision eats into the government budget. On the contrary, private sectors may encourage more efficient ways in providing collective goods and services. They can provide a reliable structure of incentives to owners of resources by endorsing property rights. However, their competitive nature may result in a monopolistic market that inhibits the other producers to provide similar goods and services at affordable price. As a result, consumers with less purchasing power are prone to the higher prices of collective goods and services. In the meantime, community-based organisations are able to encourage collective action for producing goods and services. They can assess community needs and resources and produce the desired goods and services quite effectively. Even though they have capacity to promote cooperation between social agents, the amount and continuity of producing them is very limited because their provision depends on how many of these organisations can collect and share the resources in society to finance their production and distribution. Thus, such self-governing communities may succeed only if the levels of participation in society are relatively high (Ostrom, 1990).

It is obvious that reconciling the idea of competition and cooperation through collective action is somewhat problematic. There are no institutions and organisations that can serve it satisfactorily. A mixture of the prevailing institutions and the different types of organisations may provide better solutions for minimising the side effects of any organisations' activities. Since institutions are the source of organisation formation, it is essential to figure out the existence of power structure and relations. Norms and values embedded in all rules of the game are created and sustained by those who have been holding powerful positions in society. The dynamics of the performance of organisations is not supposed to be viewed as the product of static institutional framework. Indeed, each institution has raised noticeable norms and values that bond the given society members. However, their implementation is fluid and influenced by their creators. These creators are the power holders in society. They may present as government executives, political parties, investors, business owners, pressure groups, informal leaders, shamans or spiritual leaders, and so forth. The tensions of getting the most preferred positions between these actors will lead to the establishment of a desired institutional framework. This means that understanding the interests of and the social transactions between these power holders is efficacious in capturing institutional dynamism.

The Relevance of Local Institutions in Cluster Theory

Industrial district or cluster is a local phenomenon. It differs from industrial estate or complex in terms of the ways it originates. It comes from endogenous factors of the given

locations, which attract firms (and related or supporting activities) to co-locate in the same area. The latter represents external initiatives usually from the government to induce the rise of particular economic activities in destination locations. Co-location attractiveness from below thus is the key to understand why locations induce the existence of one sector but not others. In the beginning, it is understandable if we suspect that economic potentials of locations, either in terms of comparative or competitive advantages framework of thinking, are the major drivers of such attractiveness. But, if we look deeper at the comparison of diverse economic performance of locations ranging from lagging regions to the most advanced regions, we are likely to recognise one critical factor that underpins such differences. This factor is the local institutional setting.

Many empirical findings in the past have shown that local institutions influence the levels of productivity of economic sectors and income generation, which in turn determine the welfare state of regions. In economic literature, such influence is measured by the total factor productivity (TFP) variable. This variable is to indicate how much the transfer of knowledge and innovation may distinguish the performance of similar industries even though the other supporting variables such as the levels of investment, the amount of raw materials, the composition of labour skills and the use of technology are relatively the same. The success of a small industry district in Italy to conquer the export market (the Third Italy case) or the high technology industry cluster of Silicon Valley in the US are some examples that represent how local institutions contribute much to industrial and regional performance.

Local institutions provide important foundations for the cluster theory in at least two ways: the accumulation of trust and social networks and the spread of local knowledge to cluster members as well as the entire society. The emergence and development of the industrial cluster inevitably depends on the working of trust and social networks. These two aspects may trigger the spirit of collectivism necessary to encouraging local entrepreneurs in the given society to start up their business. This makes the local entrepreneurs feel more confident in running businesses because they find themselves being united as part of a social group rather than individual entities. Hence, the thickness of social cohesion indicates how the given society takes cares of the growth of individual cluster members to further their business. Such institutional settings assist cluster members to work together in utilising resources and reducing the risks of producing and marketing goods and services. Therefore, the part of individual economic transactions is reduced by collective actions.

The second contribution of local institutions is pertaining to the process of transmitting local knowledge and innovation within the cluster. It helps to explain how societies are able to facilitate the accumulation of local knowledge. The knowledge gap and the diverse capabilities of cluster members to deal with economic opportunities and difficulties can be overcome through collective actions. Such actions manifest in many forms such as technological adoption, skill upgrading, and product imitation between cluster members. The spirit of collectivism lubricates the enriching process of local knowledge creation. It also accelerates the diffusion of innovation within a cluster. Such circumstances reveal the notion that the cluster theory is not simply a form of either spatial agglomeration or efficient business linkages. More importantly, cluster demonstrates “the way of life” of the given society where it takes place, which articulates the notion of cooperating while competing. That is why clusters represent the fusion between society and economic activities.

2.3 Social Network Theory

The Definition of Social Network

Social network is a form of social structure that promotes interaction between actors in society. The resulting social ties can be made up by family kinship, friendship, common interest or various types of relationships between people. The basic elements of social network, according to Lin (2001), consist of structure and action. The structure element demonstrates power hierarchy and distribution across society in which resources and influences from one actor to another are exchanged. This causes individuals and groups to withhold certain positions, which affect the characteristics of social relations. The action element describes social exchanges between actors to pursue expected returns. This carries out the flows of resources and motives held by actors in order to gain maximum profits from social networking. Thus, social network provides mechanisms for maintaining social order.

Such mechanisms are useful to reduce the risks of actions by individuals or groups compared to those without any network at all. Social network generates information exchange rapidly so that the potentials of resources and influences held by certain actors can be recognised by others. They subsequently can capture the benefits and drawbacks of conducting repetitive interaction. If they benefit from participating in the network, they will enjoy and further social transactions. Conversely, they may leave the existing network and join another to establish their expectations on its potential returns. In this sense, people expect to get a good performance from other parties involved in these interactions. This is the benefit of social transactions where the buyers are treated well by the sellers.

Hence, an effective social network requires trust and sanctions. Trust and sanctions are important not only to ascertain buyers' expectations but also to reduce sellers' opportunistic behaviour. Buskens (2002) explained this situation due to the prevalence of asymmetric information in society. The bundle of information is polarized to actors with critical positions in the network, not dispersed equally to all. If they also belong to rich resources and influences, they can control and dominate the network. Trust and sanctions are required by both parties to ensure information flows about resources available before making decisions to exchange. Hence, sufficient information is a prerequisite for rational persons in a decision-making process. Trust and sanctions are linked by transaction costs. Their relationship can be simply explained by the formula of that the buyers (the trustors) will place trust if the transaction costs represent the sanctions imposed to the sellers (the trustees) for misconduct. The greater the sanctions incurred, either in terms of monetary values or social punishments, the more the trust will be placed on.

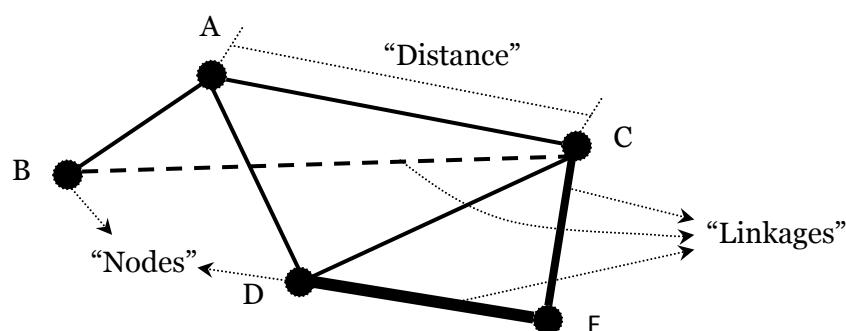
In the next level, the instrumental function of trust and sanctions is to lubricate cooperation and coordination within the social network. Network governance provides incentives of public recognition of social transactions. Actually, interaction between two people or more, the trustors and the trustees, does not take place in a void. Good and bad experiences resulting from these interactions are somehow transmitted to the public. Both parties have opportunities to be awarded a good reputation by the public. Reputation is a social gain for those who have behaved in a trustworthy manner. Having a good reputation is likely to increase one's position in the network. Thus, individuals or groups with good reputation will not only increase the certainties of profit maximization, but also enjoy their influences to

control society. In contrast, they may also obtain social punishments for misbehaving. People who are deceitful and not cooperative in compliance with the prevailing social order are also likely to be sanctioned by the public. Social sanctions and exclusion are frequently more severe than paying off the losses. Through the working of reputation and social sanction mechanisms both parties are therefore conditioned to cooperate under a coordinated social order (Lin, 2001; Buskens, 2002; Ostrom & Ahn, 2009).

The Characteristics of Social Network

The structure of social networks contains three major variables: nodes, linkages and distance (see **Figure 2.3**). These all work together in specifying how the flow of interactions between individuals and groups takes place. Nodes represent the locations and positions of actors in the network (and sometimes their recognised status in society too). The important roles and influences of actors in the network can be observed from their positions in the network. Their positions are associated with the linkages by which actors can interact and bridge communication between network members. The forms of linkages, which perform certain attributes of density, frequency and flexibility to interactions, will determine the exchange of resources and influences through social transactions. Finally, the distance variables explain the closeness between actors in terms of making direct or indirect contacts and building the sphere of influences and control in shaping desired interactions (Lin, 2001; Buskens, 2002).

Figure 2.3 Social network variables



Source: Author (2013)

Theoretically, there are two basic forms of social networking showing the different ways of accumulating social contacts. The first is dense networks. The proponents of dense networks suggest the building of more ties between actors in order to assure more consistent and reliable information of valued resources. The more linkages are created, the more accurate is information available about potential tradable resources as well as the performance of actors involved. Similarly, if a trustor is informed by other trustors of the valued resources and the performance of a trustee, s/he may be convinced to make a first contact (and possibly repeated contacts in the future) with her or him. This rule can also occur in the opposite way. The redundant information shared across network members is essential to increase trust between them. It guarantess control mechanisms within the network to prevent actors from misbehaving. It also effectively encourages cooperation and coordination since reputation and sanctions as the social returns are easily passed on to the public. Therefore, neither the

trustor nor the trustee can avoid broader control from the network society (Burt, 2001; Buskens, 2002).

In contrast, the second form is known as structural holes. Burt's theory of structural holes explains that social networking can be carried out well with limited ties between actors. He points out the real life situation where actors have unequal opportunities to build up a number of ties due to resource constraints (time, money, power, etc.). However, it does not mean that actors with limited contacts are unable to get access to valued resources exchanged within the network. The presence of a focal actor or middleman therefore is important to bridge communication between separate actors. This third party would be useful to minimise redundant information shared within networks so that more efficient transactions between actors can be undertaken. Furthermore, actors with more structural holes are likely to refrain from opportunistic behaviour of the trustees because the focal actor can mediate the disputes between the actors involved (Burt, 2001; Buskens, 2002).

Nevertheless, neither of these forms is better or worse. They are both complementary to each other. Dense networks are beneficial to thicken trust between actors through enforceable rules of the game. Formalised and stricter institutions can be applied effectively within dense networks since social gains of long-term reputation and sanctions are obvious and also attached to contracts and social relations. Thus, cooperation and coordination is likely to be easier within dense networks. However, dense networks can create redundant information and polarized accumulation of resources to certain actors. Such circumstance may occur when powerful actors dominate and manipulate the network to satisfy their own interests. In this case, cooperation and coordination between actors are more coercive and less efficient for the mobilisation of resources.

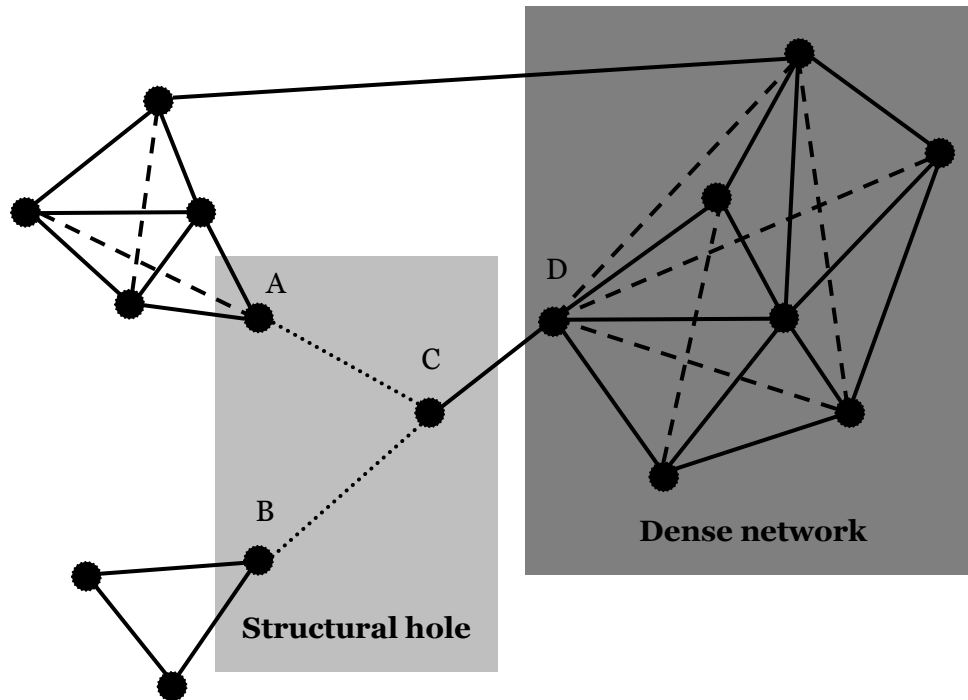
Structural holes can also create thickened trust in the social network through intermediary roles of the focal actor or middleman. This third party can narrow the distance between actors. Informal rules of the game and more flexible contacts can be made with the focal actor in order to get access to information and valued resources exchanged in the network. However, structural holes can create fragile cooperation and coordination between actors. As the actors do not share stable connections each other, they are likely to be unreachable from social rewards and punishments. Therefore, the role of the focal actor is significant to assure actors' compliance with the social order. According to Burt (2001), structural holes can provide the source of benefit through brokerage mechanisms, while dense networks may function to achieve the buried resources in structural holes. These two forms of social networking can thus be managed together to achieve more efficient resources mobilisation (see **Figure 2.4**).

Lessons Learned from Cluster Practices in Indonesia

In general, institutions that shaped various cluster cases in Indonesia are predominantly encouraged by the economic benefits of clustering. Society participates in clusters due to the potential economic advantages for a better livelihood so that social relations are utilised to achieve cluster's shared goals. In most cases, some leading firms or entrepreneurs attract profitable industry to society, and then followed by their neighbours. Leader-follower relationship built in accordance to guidance as above. Alternatively, similar economic activities appear simultaneously in certain locations because of abundant natural resources,

profitable markets, and skilful labour pools. In this case, the specific industry persists over generations as a matter of family business inheritance. However, the latter does not lead to automatic advances for all. There must be leading firms or prominent leaders in clusters or society responsible for expanding cluster growth. The influential position held by certain groups of actors in cluster or society is likely to determine its growth as a whole. In other words, structural organisation of clustering leads the domination of particular actors against the rest of the participants. Large leading firms and traders are the most important actors who connect potential buyers and cluster members.

Figure 2.4 Dense network and structural hole



Source: Modified from Burt (2001)

Sandee and van Hulsen (2000) showed their roles in various cases involving a coppersmith cluster in Tumang Village (Boyolali Regency), a metal casting cluster in Ceper Village (Klaten Regency), a wooden furniture cluster in Tahunan Subdistrict (Jepara Regency), a tile production cluster in rural Java, a leather goods cluster in Yogyakarta Province, woven cloth production clusters and brass handicraft clusters throughout Central Java Province. Their roles vary ranging from searching for and distributing buyers' orders to cluster members, promoting joint production and marketing, providing shared equipment and facilities, to providing skill upgrading training and supervision for process and product innovation. The role of large leading firms is prominent in all cluster cases except the leather goods cluster. Subcontracting is the most favourable way to establish strong vertical business linkages from the larger to smaller producers. Either excessive orders that the large firms cannot handle alone or continuous orders where large firms manage production distribution downwards are the common reasons of subcontracting. In the case of the coppersmith cluster, the large firms may call upon the household firms to temporarily participate in the entire production once the buyer's orders exceed the production capacity. On the contrary, continuous

subcontracting patterns exist in the wooden furniture cluster where the leading firms distribute the orders regularly to their production partners.

With regard to equipment sharing, the larger firms may purchase advanced technology that the smaller firms can hire. This production linkage applies to metal casting, tile production, woven cloth production, and brass handicraft clusters where the smaller firms are unable to burden themselves to purchase (expensive) advanced technology and maintenance cost due to their financial limitation. While operating the hired machines, they may receive technical assistance from the owner as well for product quality and skill upgrading. Actually, many government agencies, particularly those involved in industrial, cooperative, and trade affairs, have been providing similar shared equipment and facilities at subsidised prices. Unfortunately, the government facilities are often a long distance from the smaller firms' location and unsuitable to meet their production needs.

Special training for a more sustained transfer of knowledge and innovation may also take place in regular events instead of depending on shared equipment and facilities hire only. The leading firms in the wooden furniture cluster provide continuous technical assistance for their partners to adjust production ability in order to meet buyer's changing requirements. A similar role is applicable to the traders in the leather goods cluster. They inform and provide special training for producers regarding buyer's up-to-date preferences. In turn, they will collect qualified products from the producers door-to-door and sell them to buyers. In the case of the metal casting cluster, the role of traders is also present to stimulate occasional skill upgrading training whenever they introduce the producers to new design and technology. However, the traders do not always create a long-term contract with local producers but their role is quite effective to bridge the needs of production capacity upgrading and of market preferences. According to Sato (2000), traders may influence the direction of cluster growth through brokerage system. Compared to the large firms, the traders are determined to bring new product designs to local producers and collect the products to be sold out of town.

While the large leading firms and traders are enjoying their influential role in cluster growth, various government agencies also contribute in the background. The government's role remains important particularly for the small firms and new business entrants even though it is considerably less significant to the entire cluster organisation. Annual training on industrial production, bookkeeping, entrepreneurship, and sales and marketing are among the most popular direct government interventions. In addition, the government also provides various microcredit schemes, working capital soft loans and grants, subsidised prices for new equipment procurement and participation in marketing exhibition, and discounted taxes and retributions. Unfortunately, those interventions seem ineffective to boost cluster growth, and there are no transparent monitoring and evaluation reports to measure the effectiveness of these government programs. Berry, Rodriguez, and Sandee (2001) explained that such government ineffectiveness closely relates to the subcontracting dominance maintained inside the cluster organisations. Within subcontracting patterns, the smaller firms may feel it is more convenient to obtain predictable profits where the large leading firms and traders act like a foster parent. On the other hand, the large leading firms and traders may create a stable business linkage to their (smaller) partners while transferring the costs of lower production labour as well as advanced knowledge and innovation. These patterns have been built upon family connections and friendship relationships at most through which informal primordial ties are stronger to build inter-firm

connectedness than formal regulations. Therefore, it would be more suitable for the government agencies to focus on improving the business climate through the creation and implementation of macro policies related to industrial relations and trade networks rather than undertaking direct engagement at micro level.

2.4 Conceptual Framework

The focus of this research deals with the influences of prevailing local institutions on cluster performance. By undertaking this research, I would like to argue that the distinct local institutional framework is likely to determine the cluster performance at most, given the assumptions that the access to production factors, markets, and government supports are relatively the same. Certainly, the measure of performance is closely associated with tangible indicators such as total output (Hill, 2001), employment creation (Hill, 2001; McDonald, Huang, Tsagdis, & Tüselmann, 2007), productivity level (Meyer-Stamer, 1998), income generation (Spencer et al., 2010), and environmental impacts (Puppim de Oliveira, 2008a) resulting from clustering activities. The alternative measurement involving intangible indicators such as innovative systems (Simmie, 2006; McCormick & Oyelaran-Oyeyinka, 2007), knowledge creation and spillovers (Steiner, 2006; Cooke, De Laurentis, Tötdling, & Tripp, 2007), social equity (Hill, 2001; Meyer-Stamer, 1998), working condition (Puppim de Oliveira, 2008b), and quality of life have yet to be studied. However, those measurements merely focus on “the end product” instead of “the process” underlying transactional processes and interactions between participating actors in the cluster. Many observers have missed the importance of such an institutional arrangement in order to catalyse clustering activities. In addition, the existing cluster theories either fed by Marshallian or Porterian clustering conceptions have been addressing the locality element critical to theoretical building and practical implementation. In this sense, what and how the local institutional framework was being made to stimulate the emergence and further developments of local clusters are influential to its success (and failure). Arguably, the local institutional framework promotes particular mechanism of incentives and disincentives necessary to guide the participating actors within the cluster to interact each other. Thus, the rigidity vis-à-vis flexibility in nature of the predetermined institutional framework will contribute to the (re-)shaping of common attitude and adaptive behaviour of the cluster’s participating actors to achieve clustering objectives.

Having such conceptual understanding, I attempt to investigate the workings of a local institutional framework in support of the clustering phenomena with the case of local batik clusters. Expectedly, the framework will direct the nurturing of competition and cooperation patterns adequate to increase accumulated outputs of individual firms collectively. In this research I have approached the framework by examining the actualisation of both formal and informal institutions carried out by five interest groups, i.e. batik cluster organisations (e.g. hired private business consultant, cluster management unit, and community based organisation), batik business groups (e.g. individual batik firms, suppliers, traders, and buyers), government agencies, external agencies (e.g. universities, NGOs, and donors), and the adjacent neighbourhood societies attached to batik clusters. Through different (and sometimes overlapping) roles and networks possessed by each interest group, these groups are withstanding preferred combination of formal and informal institutions that mostly meet

Chapter 3

RESEARCH DESIGN

3.1 Operational Definition

Following the conceptual framework in **Figure 2.5**, I considered local institutions as the starting point to understand cluster performance. The underlying assumption was that cluster phenomena emerges naturally from endogenous forces of localities, so that neither externally induced attempts nor government top-down assertions to cluster adoption would lead to its success. Furthermore, many previous cluster studies focused on its performance and contribution to particular economic societies or social neighbourhood communities by evaluating the immediate impact of clustering activities. In this research I have approached it differently. I considered local institutions as the critical factor of cluster success, so that its dynamics will determine cluster organisation to achieve its objectives. Understanding local institutions is useful to discover why clustering emerges in particular regions but not in others even though they have a similar local institutional framework and are located next to one another.

To examine the research question, I focused on the relationships between three variables: local institutions, institutional framework, and cluster performance. The following will describe the operational definition of these variables.

- **Local institutions:** all forms of rules of the game are imposed on the cluster. It constitutes formal and informal, written and unwritten rules applied in society where the cluster exists. The formal rules comprise laws and regulations, government policies and social contracts. Such observation is the same as applied to informal rules, which constitute social norms and traditions maintained in society. I will analyse how these rules are adopted to determine the creation of the institutional framework of clustering. In addition, part of this observation is the mechanism of imposing merits and sanctions by which the rules are enforced.
- **Institutional framework:** a design of systems carrying out particular rules of the game that shapes activities and behaviour of individuals and groups in the cluster. It presents organisational rules of clustering for members (and to some extent the affected society), through which the spirit of collectivism is nurtured to achieve common goals. Here the practices of social networks in cluster management are the key issues. This can be analysed through the patterns of cooperation and competition applied to run clustering activities. In other words, it is important to understand how close cluster formation is to local society because it is widely perceived that cluster is the fusion between economy and society.

- **Cluster performance:** refers to the ability of clusters to achieve economic and social improvements resulting from collective actions of the cluster's participating actors and organisations. The result can be examined from total output of economic indicators (e.g. cluster size and production scale upgrading, employment creation, and market coverage) and social indicators (e.g. the provision of cluster shared facilities, working condition enhancement, and quality neighbourhood settlement). By process the cluster performance can be viewed from the strengthening of inter-industrial linkages along value-adding processes (economic side) and social networks (social side). Thus, the intensified networks within the cluster could be the key indicator for its performance.

3.2 Research Strategy

To conduct this research, I used a multiple-case study approach. Case study research basically deals with the inquiry process of understanding the workings of certain phenomena. It is used to explore the way of something which occurred within the bounded systems rather than testing the prevalence of phenomena. It focuses on contemporary events where the control of researchers over these events is limited or absent (Creswell, 2007; Yin, 2009). The justification of the use of this case study approach is as follows:

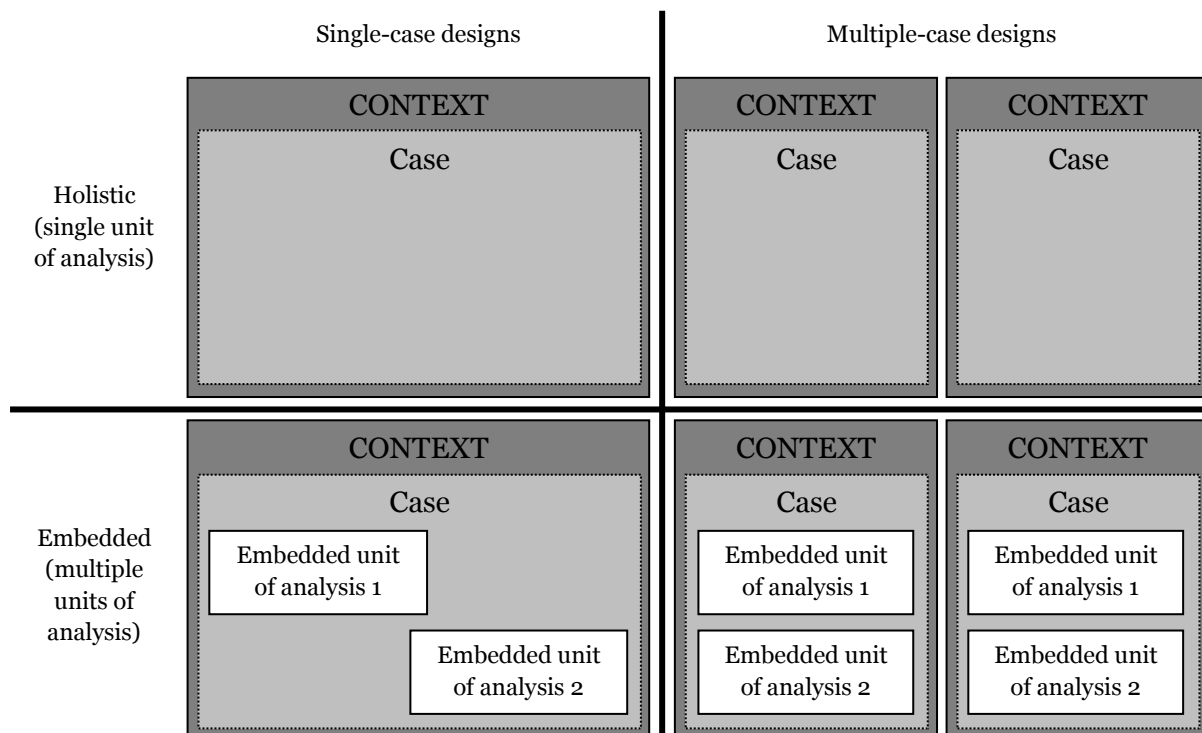
- 1) The case study is useful to discover the dynamics of local institutions in cluster as well as the rest of society. This is not only focused on the finding of the patterns of change over time, but what endogenous factors lies behind the existing institutions and cluster organisation to change.
- 2) The case study is also useful to identify external inducement and environment that may affect institutional change. In this sense, we can look at how far these external factors determine the change. This carries out a twofold meaning: 1) the cluster independence to maintain locally institutional framework to grow, and 2) its flexibility to adapt outside influences beneficial to performance change.
- 3) Even though it is difficult to make a clear cut between inside and outside influences, the case study can help to indicate where the preservation of embedded norms and values in local institutions come from. With respect to institutional capacity matters, it may lead to the potential actors responsible for cluster institutional change.

The multiple-case study approach was chosen rather than the single case primarily because the cluster phenomena demonstrate enormous variance and inconsistencies across localities. No matter what theoretical conception underlies the observation (e.g. Marshallian territoriality approach or Porterian functionality approach), categorical distinction (e.g. small-and-medium enterprises to a giant multinational company cluster, traditional to high technology cluster, local to global cluster), or practical implication (e.g. economic structural enhancement, social capital improvement, technological capacity upgrading), cluster phenomena provide a wide array of possibilities to understand its performance from various perspectives. There is simply no certain formula to replicate the cluster success story from one location to another. So if the success of the Silicon Valley cluster might have inspired the governments around the world to establish similar clusters, for example, it is impossible to duplicate its successful elements entirely in the new locations because of contextual

distinction from the origin. The diverse institutional capability may cause this condition despite sufficient natural resources endowment, technological capacity, and other resources. Another reason relates to a distinct political system and bureaucratic style which may discourage successful cluster replication.

Regarding such locational divergence, the batik industry cluster is suitable to present how the local institutional framework overcomes the diversity. People may find many batik regions in Indonesia but none has followed particular developmental pathways to reach its success. When observing successful batik clusters in Pekalongan and Surakarta, for example, the batik industry clusters have not shared a similar product, technology, and innovation. The batik industry in Pekalongan is identical to the free-style coastal batik motifs and widespread printing technologies used while its counterpart in Surakarta is particularly recognisable with its compliance to classical court batik motifs and traditional stamping technologies. If we use a neoclassical economic growth theory which underlines the importance of accumulation of capital, labour, and technology, for example, we would be surprised to find how the distinct technological capacity of these batik clusters could bring successful growth. Regarding such a diverse local context, the use of a multiple-case study approach is appropriate in order to explore the uniqueness of endogenous factors on each batik cluster that have influenced and shaped its growth performance. The approach carries out Yin's holistic multiple-case study design since this research deals with a single unit of analysis (see **Figure 3.1**). This design offers a comparison of different cases attached to each local contextual setting by using the same conceptual framework and methodological protocol (Yin, 2009).

Figure 3.1 Basic designs of case study approach



Source: Modified from Yin (2009, p. 46)

3.3 Case Selection

To get the most from such a comparative case study design, the selection of cases was carried out by presenting salient features of local batik industry cluster and its contextual setting. The rich variance of cases is useful to explain the persistence of endogenous factors which have determined a particular local institutional framework to support batik industry cluster performance. To meet this purpose, some criteria of case selection were created as follows:

- 1) Each observation site embraces a unique batik mainstream indicating that the local batik industry has been sharing a common skills knowledge and tradition in batik making. This will lead to the building of a localised batik identity (local branding). The recognition of such a unique identity by batik lovers and greater society sheds light on the performance of the local batik industry to promote the product;
- 2) The distance of the batik industry clusters observed is not so close that the dominating influences of certain batik clusters to the competitors could be minimised. It is important to maintain the independence of the local institutional framework in order to take effect into the bounded cluster system. How local batik players and the adjacent neighbourhood society are tied to encourage economic and social transactions is the central issue in this criterion. Physical distance therefore is viewed as less important than economic and social distance between actors in the local batik industry cluster. Besides, it remains difficult to demarcate the boundaries of inside and outside influences to local batik cluster performance. However, this criterion may be useful to examine the closeness degree of a local batik cluster to its neighbourhood social system and vice versa, from which the cluster conception of economy and society fusion could be verified;
- 3) The administrative boundaries of regions where the batik clusters are located serves as another selection criterion. The role of government agencies and public spending at a particular government tier may contribute to the further developments of the local batik industry and the working of the local institutional framework. In doing so, the evaluation of government performance is insightful to meet the research goal and objectives. However, I will not dwell on government performance evaluation or any other organisational evaluation. Rather, this criterion is intended to categorise batik clusters based on the condition of local development enhancement, i.e. the developed and less developed regions. Presumably, the developed regions provide a foundation to stimulate a more complex institutional setting. The accumulation of resources and wealth in these regions encourages more channels and opportunities to develop better institutional performances than the other regions. However, social phenomena do not always follow such direction straightaway. Sometimes we may find that the lagging regions can support the development of a batik cluster with very limited access to resources. Therefore, it would be interesting to look further at distinct local contexts to check whether the batik cluster performance and its institutional framework are heavily relied on local development growth. Finally, we may expect to obtain additional factors that might have determined the direction of batik cluster development.

Following those criteria, the case of the research is the local batik industry cluster within the context of municipality/regency administrative boundaries. The case includes batik industry

clusters in Kampung Laweyan and Kampung Kauman in Surakarta Municipality and Lasem Area in Rembang Regency. Batik industry clusters in Surakarta represent the sustained emergence of the classical court batik mainstream in developed regions while those in Rembang are associated with the continuation of the traditional handwritten coastal batik industry in less developed regions. Initially, the research will focus on Kampung Laweyan and Lasem Area batik clusters. During the fieldwork another case of a Kampung Kauman batik cluster was added on in response to the fact that there are many other batik clusters in the city. This new case was taken because both Kampung Laweyan and Kampung Kauman batik clusters are broadly perceived as the city's iconic batik industry centres whose industrial origins and stages of development are dissimilar as well as the neighbourhood social systems. Of course, the addition of the new case was not intended to meet sampling representativeness. Rather, it could provide broader possibilities to disclose the variance of local institutional frameworks available in the same municipal administration context.

3.4 Unit of Analysis

The unit of analysis in this research is batik cluster organisation. It consists of a core batik cluster organisation involving a community-based organisation and the likes of which is acting as a cluster management unit, individual batik firms, and the adjacent neighbourhood society. In the case of Surakarta, the cluster organisational role is performed by *Forum Pengembangan Kampung Batik Laweyan* (FPKBL) or Kampung Batik Laweyan Development Forum in Kampung Laweyan and *Paguyuban Kampung Wisata Batik Kauman* (PKWBK) or Kauman Batik Tourism Neighbourhood Community in Kampung Kauman. Their counterpart in the Lasem Area is the *Forum Rembug Klaster Batik Tulis Lasem* (FRK-BTL) or Cluster Consultative Forum of Lasem Handwritten Batik. The core organisation plays a significant role in accommodating cluster needs and bridging contacts with various supporting agencies. Having such a central position, it would serve to intermediate tensions and interests inside the cluster, and between cluster and outsiders. However, since its position is representing batik cluster players – to some extent it sometimes articulates the adjacent neighbourhood society interests – the core organisation is performing more an informal ruler to promote cluster needs, in which the local social norms and traditions are embedded.

The cluster supporting agencies mostly consist of local government agencies, market institution group (e.g. suppliers, traders, brokers, and buyers), and external agencies (e.g. universities, NGOs, and donors). The main government agencies actively engaged in batik cluster development are *Badan Perencanaan Pembangunan Daerah* (BAPPEDA) or Local Development Planning Authority, *Dinas Perindustrian dan Perdagangan* (DISPERINDAG) or Local Agency for Industry and Trade, *Dinas Koperasi, Usaha Mikro, Kecil, dan Menengah* (DISKOP-UMKM) or Local Agency for Cooperative, Micro, Small, and Medium Business, *Dinas Pariwisata* (DISPARTA) or Local Agency for Tourism, and a quasi-government agency called Forum for Economic Development and Employment Promotion (FEDEP). Specific to the Lasem Area, the role of DISPERINDAG and DISKOP-UMKM was unified into a single body called *Dinas Perindustrian, Perdagangan, dan Koperasi* (DISPERINDAGKOP) or Local Agency for Industry, Trade, and Cooperatives. These government agencies are responsible for the policy making of batik cluster development at

municipality/regency level. At neighbourhood level, there is a village (*kelurahan/desa*) or subdistrict (*kecamatan*) head who merely act as the local government arm-length administrator with less influence to policy making process. The nature of government agencies are reinforcing formal rules, so that the given bureaucracy rigidity may compete against cluster's flexible nature. In the meantime, the position of market institution and external agencies is somewhere in-between formal and informal rulers, depending on their interest tendencies and organisational formation.

3.5 Data Collection Methods

One of the important features in undertaking the case study research is the use of a triangulation method to thoroughly present the real-life phenomena. It suggests an iterative compare-and-contrast analysis moving forward and backward frequently to examine multiple sources of evidence. This process aims to value both supporting and opposing views, perceptions, data, and information taken from various evidence sources necessary to (re-)construct a complete understanding of empirical facts that have been shaping the observed phenomena (Hancock & Algozzine, 2006; Yin, 2009; Woodside, 2010). In doing so, I combined the use of primary and secondary sources. The primary sources taken from interviews, questionnaires, and field observations served as the main analytical entrance to the research. The secondary ones took a complementary role in providing initial background knowledge of the research context and supporting evidence for analysis. Their collection came from statistical reports, public documents, previous studies and media publications. In the following sections I will discuss the data collection methods in detail.

Variables and Indicators

As presented in **Table 3.1**, I demonstrated the links between detailed research questions, variables, and indicators to guide the case measurement. The first group of detailed research questions was intended to explore the types of formal and informal institutions which might have shaped the formation of the institutional framework necessary to rule in the batik industry cluster activities. How the tensions of rules and roles performed by participating actors in the cluster was the main focus of this measurement. By understanding the construction of local institutional framework, we could figure out particular mechanisms which provided both incentives and disincentives for the local batik cluster to perform.

The second group focused on inter-industrial linkages performed by local batik firms. This measured input-output pattern resulted from clustering activities, particularly related to raw materials and labour supply, production network, and marketing and trade channels. Another measure related to industrial preferences of local batik firms in acquiring raw materials and batik workers. The result indicated certain conditions required by local batik firms to run the business, from which specified suppliers and labour market were intensively linked to certain batik cluster. Last but not least, the examination of competition and cooperation patterns sustained in each batik cluster was important to figure out whether the actual business climate was conducive to further local batik cluster development. From this viewpoint, we could analyse the relationships between the existing patterns and institutional

framework. In the end, we might conclude the performance of local batik cluster to stimulate collective economic multipliers in two-way directions.

Similar to the preceding measurement, the third group also examined the performance of the local batik cluster but from a social perspective. This was not meant to specify the improvement of social cohesion resulting from clustering activities, but its contribution to direct local batik cluster performance. The social cohesion variable was important to facilitate business linkages between local batik firms to co-locate closely to each other. In this sense, it illuminated the salient features of the socio-cultural background in batik cluster locations, from which the encouragement of local batik cluster performance had come. The features might include batik making tradition, division of labour, knowledge transfer, and entrepreneurial skills which have changed and sustained over generations.

The final group of variables and indicators measured the research findings and its contribution to existing cluster theory and policy recommendation. This was intended to capture the key factors within local institutions which have contributed at most to batik cluster performance. Afterwards, I formulated the scientific contributions of the research to cluster theory, and its empirical contribution to batik cluster policy recommendation.

Table 3.1 Detailed research questions, variables, and indicators

Research Question (RQ):		
How the prevailing local institutions influence cluster performance?		
Detailed RQ #1:		
<ul style="list-style-type: none"> • What are the types of formal and informal institutions made up to underpinning local clusters? • How do they contribute to create a particular institutional framework useful to encourage (or discourage) cluster performance? 		
VARIABLES	INDICATORS	REMARKS
Formal institutions	Written rules imposed by government	The government policies and programs related to batik cluster development
Informal institutions	Norms and traditions in society	Social norms and traditions practiced by participating actors in local batik cluster
Institutional framework	The scheme of incentives and disincentives	This provides a guideline for organising business relations and entire mechanisms inside local batik cluster
Detailed RQ #2:		
<ul style="list-style-type: none"> • How the inter-industrial linkages are shaped in local clusters? • What are the typical industrial input-output preferences incorporated into those linkages? • What are the competition and cooperation patterns responsible for those linkages? 		

Continued in the next page

Table 3.1 continued

VARIABLES	INDICATORS	REMARKS
Inter-industrial linkages	Backward linkages	The patterns of supply chains of material inputs and batik workers
	Production networks	The patterns of joint production and partnerships between batik firms
	Forward linkages	The patterns of marketing and trade links by batik firms
Input-output preferences	Basic requirements for industrial operations	The preferences of batik firms to acquire material inputs and labour supply
Competition and cooperation patterns	Synthesis from inter-industrial linkages analysis	The patterns of competition and cooperation sustained in local batik cluster

Detailed RQ #3:

- Does a particular social cohesion condition correlate to cluster performance?
- How do the existing social networks take a role in promoting local clusters?
- What sorts of norms and traditions are maintained to (re-)generate industrial clustering activities?

VARIABLES	INDICATORS	REMARKS
Social cohesion	Norms and traditions in society	Social norms and traditions practiced by participating actors in local batik cluster
	Social network patterns	The patterns of social relations performed by local batik firms to support cluster performance

Detailed RQ #4:

- What are the key factors of local institutions related to cluster performance?
- How these factors can be adapted to cluster theory and practice?
- What are the policy recommendations suitable to local cluster enhancement?

VARIABLES	INDICATORS	REMARKS
Key factors of local institutions	Sound contributions of the elements of formal and informal institutions	The findings about the key factors within local institutions which determine batik cluster performance
Theoretical feedback	Pattern matching of cluster theory elements	The theoretical contributions of the research to cluster theory
Policy recommendation	Practical suitability of cluster theory elements and policy	The empirical contributions of the research to the improvement of cluster policy recommendation related to local batik industry development in particular

Source: Author (2013)

Data Sources and Procedures

A variety of data sources and procedures were used in this research. The primary data sources were considerably more important than the secondary ones since the nature of the research requires direct contacts with a number of key informants and batik players to answer the research question. Interviews, questionnaires, and field observations were conducted to collect the primary data. In contrast, the secondary data taken from statistical reports, public documents, previous studies, and media publications were supplementary for the research in a sense of providing background knowledge of the research context and supporting proof of evidence during triangulation analysis (see Yin, 2009). The following **Table 3.2** shows the use of multiple data sources and procedures in this research.

Table 3.2 Data sources and procedures

VARIABLES	INDICATORS	PROCEDURES						
		INTERVIEWS	QUESTIONNAIRES	FIELD OBSERVATIONS	STATISTICAL REPORTS	PUBLIC DOCUMENTS	PREVIOUS STUDIES	MEDIA PUBLICATIONS
Formal institutions	Written rules imposed by government	X		X	X	X	X	X
Informal institutions	Norms and traditions in society	X		X			X	X
Institutional framework	The scheme of incentives and disincentives	X		X	X		X	X
Inter-industrial linkages	Backward linkages	X	X	X			X	
	Production networks	X	X	X			X	
	Forward linkages	X	X	X			X	
Input-output preferences	Basic requirements for industrial operations	X	X					
Competition and cooperation patterns	Synthesis from inter-industrial linkages analysis	X	X	X			X	
Social cohesion	Norms and traditions in society	X		X			X	X
	Social network patterns	X		X				

Continued in the next page

Table 3.2 continued

VARIABLES	INDICATORS	PROCEDURES						
		INTERVIEWS	QUESTIONNAIRES	FIELD OBSERVATIONS	STATISTICAL REPORTS	PUBLIC DOCUMENTS	PREVIOUS STUDIES	MEDIA PUBLICATIONS
Key factors of local institutions	Sound contributions of the elements of formal and informal institutions	X		X				
Theoretical feedback	Pattern matching of cluster theory elements	X		X				
Policy recommendation	Practical suitability of cluster theory elements and policy	X		X				

Source: Author (2013)

A series of expert interviews was undertaken individually to capture insightful explanations from the key informants regarding how the local institutions may affect batik cluster performance. The semi-structured interview form was chosen due to its merits to provide the interviewees a degree of flexibility to answer a set of open-ended questions in guided manner (see **Annex E and F**). By so doing, the interviewees could demonstrate their views, perceptions, and feelings freely, through which further possibilities to explain particular events could be attained. However, individual judgment biases from the interviewees were likely to occur and might be strongly emphasised during the interview sessions. Therefore, the use of other sources of evidence was very useful to value the pros and cons of theirs objectively (Hancock & Algozzine, 2006). In addition, the choice of individual instead of group interviews was done mainly because of time availability of the key informants to welcome the interview session in the most comfortable ways related to the minimisation of potential distractions around.

Prior to execution of the interview, I prepared an interview guideline comprising a set of instructions and guided open-ended questions. I split the guideline into two distinct interview forms: the government agency-targeted group and the batik cluster organisation- and external agency-targeted group. This distinction was necessary due to their different roles in shaping the building of a local institutional framework and directing batik cluster performance. Some questions were designed to completely expose their specific roles, but of course there were other questions shared across the different groups of interviewees in order to capture a common sense of particular events such as the implementation of reward-and-punishment mechanisms to reinforce certain rules of the game, for example (see **Annex E and F**). Apart from this predetermined guideline, I also asked the interviewees to share their personal life experiences regarding their involvement in the batik industry. This applied particularly to old and prominent batik entrepreneurs and the newcomers to batik industry. This approach was useful to provide another way to explore the existence of tacit knowledge

owned by the interviewees (and sometimes shared across the local batik community) such as family apprenticeship model to transfer batik making techniques from the parents or senior family members to the prospective successors, for example. Such additional information could also be taken from unstructured conversations during the interview sessions and field observations.

The selection of key informants, however, remains important to gather rich and insightful information from them not only to reveal the appearance of the phenomena as it is, but also to capture the conflicting and contradicting ideas, thoughts, intentions, and approaches across the key informants. According to Woodside (2010), key informants are the people who have specific knowledge and immense interests in certain issues or topics. Due to their unique knowledge and engagement beyond the common public, their representativeness must be put in the first place of selection criteria. In this research I considered occupational roles and direct engagement of those recognisable in the local batik cluster development as the first and foremost criterion of key informant selection.

The second criterion related to the diversity of interest groups representation. Such representativeness was required to collect diversified and thorough information regarding the working of local institutions to influence batik cluster performance. Moreover, this diversified representativeness was useful to augment the external validity of doing case study research (see Yin, 2009). In doing so, I divided the proposed key informants into three interest groups, i.e. local batik cluster organisation, local government agencies, and the external agencies. Actually, there was another interest group involved in local batik cluster development, i.e. the market institutions. However, I disregarded this group to take part in the expert interview session mainly because they had not shared the specific contribution to local batik cluster development. In other words, whether the local batik industry was being clustered or not, they were not concerned with local batik cluster development issues as were many of the former groups.

The third criterion related to the willingness of proposed key informants to participate in the interview. As the fulfilment of ethical requirements, the researcher must have confirmed consent from the targeted respondents prior to their participation in the research. During the interview – and of course the other types of data collection methods particularly questionnaire and field observation – their willingness to share information either related to interview questions or personal background must first be attained, including the disclosure of their personal judgments, perceptions, and identities (see Hancock & Algozzine, 2006; Woodside, 2010). To meet this ethical issue, I briefly introduced the entire research project to the proposed key informants (and questionnaire respondents) and asked their permission before collecting required data and information. In practice, this willingness criterion sometimes inhibited the search for insightful information from the proposed key informants. For example, I failed to conduct an interview with the Head of Chamber of Commerce and Industry (*Kamar Dagang dan Industri* or KADIN) or his/her representative officials in Surakarta Municipality and Rembang Regency because of their ignorance to confirm the interview request. In contrast, I could obtain supplementary information from additional key informants recommended by those who had already participated in the previous interview sessions. This situation applied to the old and new batik entrepreneurs in the three batik clusters observed, for example. By undertaking such flexible expert interview method I could reduce the missing information from the proposed key informants and maintain the triangulation process properly. The composition of key informants participated in this

research is displayed in **Table 3.3** below. Noticeably, some key informants possess multiple roles, particularly those who are acting as the executive or advisory board members of local CBOs and batik entrepreneurs (see **Annex A and B**).

Table 3.3 Composition of participating key informants

No.	Positioning Role*	Number of Key Informants		
		Laweyan	Kauman	Lasem
MUNICIPALITY/REGENCY LEVEL				
1.	Local government agencies		8	6
2.	Business associations		2	N/A
3.	Local historians		1	1
LOCAL NEIGHBOURHOOD LEVEL				
1.	Senior academic staff	N/A	1	N/A
2.	NGO activists	N/A	N/A	1
3.	Old batik firm successors	1	1	2
4.	New batik entrepreneurs	N/A	N/A	2
5.	CBO board members	4	5	2
6.	Senior citizens	1	2	1

*Remark: * the positioning role shows the primary role that the key informants represented the most during the interview session*

Source: Author (2013)

In addition to the interview method, I also had some informal meetings and unstructured conversations with various stakeholders. A special meeting with Director General of Small and Medium Industries at MOI and her senior deputies was undertaken to discuss current national government policies relating to batik industrial development. The meeting disclosed the common challenges and opportunities faced by the national batik industry. The second meeting was conducted with a government-appointed consultant for micro, small, and medium business development hired by the Representative Branch Unit of the Bank of Indonesia in Surakarta. The result was the disclosure of funding problems to support the development of that kind of business sector. A guided tour in Danar Hadi Batik Museum in Surakarta was taken to provide another way of collecting background information regarding the history of the national batik industry development. From this tour I obtained a general insight of the batik industry progress over time, including the evolution of batik raw materials and technology use and the foreign influences towards national batik industry development. The fourth meeting was conducted with the Section Head of Collection and Maintenance at Textile Museum in Jakarta. She shared information about long-standing government efforts to collect and preserve traditional textiles and textile making equipment across the country for public educational purpose. The next meeting was conducted with the Secretary of and the Public Relations Officer of Indonesian Batik Cooperatives Union or *Gabungan Koperasi Batik Indonesia* (GKBI) in Jakarta, particularly to reveal the

evolutionary role of national and local batik cooperatives to support batik industry development over time. Finally, the meeting with the Division Head of Research Facilities and Standardisation at Centre for Handicraft and Batik Research and Development Facility or *Balai Besar Kerajinan dan Batik* (BBKB) in Yogyakarta. The meeting discussed some issues relating to standardisation and technical upgrading mostly for small and medium batik entrepreneurs. None of those meetings actually resulted in direct contributions to answer the research question. However, this additional information was useful to shed light on the context of the national batik industry development and to provide supporting evidence for the triangulation analysis. The following **Table 3.4** summarises the relevance of these meetings to enrich the research analysis.

Table 3.4 Additional primary data sources from informal meetings and unstructured conversations

No.	Positioning Role	Institution	Information Obtained
1.	Director General of Small and Medium Industries and Senior Deputies	Ministry of Industry in Jakarta	Common challenges and opportunities in national batik industry development recently
2.	Section Head of General Affairs at Directorate General of Culture, Arts, and Film	Ministry of Tourism and Creative Economy in Jakarta	The process of Indonesian batik nomination to UNESCO and the policy making role of the Ministry in preserving and promoting batik culture and arts
3.	Government consultant for micro, small, and medium business development	Representative Branch Unit of the Bank of Indonesia in Surakarta	Funding problems related to government support for micro, small, and medium business development
4.	Tour guide	Danar Hadi Batik Museum in Surakarta	Historical progress of national batik industry development
5.	Section Head of Collection and Maintenance	Textile Museum in Jakarta	The long-standing government efforts to collect and preserve traditional textiles and textile making equipment across the country for public education purpose
6.	Secretary and Public Relations Officer	Indonesian Batik Cooperatives Union in Jakarta	The evolutionary role of national and local batik cooperatives to support batik industry development over time
7.	Division Head of Research Facilities and Standardisation	Centre for Handicraft and Batik Research and Development Facility in Yogyakarta	Standardisation and technical upgrading mostly for small and medium batik entrepreneurs

Source: Author (2013)

The next primary data collection method was the questionnaire survey. The main purpose of undertaking the questionnaire survey in this research was to collect socio-economic data relevant to local batik cluster performance. As we might have already realised, neither batik industry-related government agencies nor bureau of statistics offices at local and national levels could provide this data. The responsible government agencies such as DISPERINDAG and DISKOP-UMKM could not provide information about local batik industry development mainly because they have never measured the performance of the industry adequately. The only data available covers basic industrial information such as the number of firms, the types

of industry, the names and addresses of firm owners, employment size, and estimated output. During the interview the public officials could not tell us about the industrial performance update because the actual industrial capacity – one of basic variables for the measurement of industrial competitiveness – has never been checked properly. On the contrary, the bureau of statistics offices can merely cover the data related to the textile industry and large-and-medium scale manufacturing industry. Generally, the lack of awareness by the industrial community to participate in regular industrial census has caused such data unavailability. Another reason is the weak control by the government to review industrial business registration, particularly those smaller home-based industries. Recently, there has been an effort from MOI to monitor the national batik industry performance. Unfortunately, it only covered the large and medium batik registered firms and showed the aggregate performance condition nationally. Furthermore, the previous studies available have not included the measurement of local batik cluster performance, rather their results focused more on the development of batik arts and designs, cultural preservation issues, or the performance of individual batik firms. To make it worse, neither could the board members of the local batik cluster organisation explain its performance. They could merely share general achievements of the local batik industry but could not quantify its expansion and decreasing growth trend. Owing to the poor data availability, I therefore conducted a questionnaire survey to bridge this information gap.

The questionnaire form was designed for batik firms in three batik clusters observed. The form covered questions ranging from typical input needs (e.g. raw materials, manpower, investment, and technology) to marketing and distribution of final products (e.g. total output, types of final products, and marketing channels and destinations). Not only did the form search for quantifiable data, it also identified industrial preferences for business operations (see **Annex G**). Prior to the execution of the questionnaire survey, similar ethical consent had been attained as for the expert interview procedure. The survey targeted all batik firms in each batik cluster consisting of 88 firms in Kampung Laweyan, 45 firms in Kampung Kauman, and 30 firms in Lasem Area based on field observation data collected in 2012. At the end of the day, it reached 21, 18, and 26 firms in those three batik clusters respectively (see **Annex C and D**). The overall results were not quite satisfying since many respondents failed to complete a number of the questions. Therefore, I could only provide limited figures and estimate numbers to indicate current batik cluster performance.

In the meantime, the use of field observation method is required to illuminate the case contextual setting and to provide proof of evidence more objectively in contrast to the key informants' explanations. This method is useful either to confirm or challenge the present data and information taken from the interviews, statistical reports, public documents, and previous studies, from which the augmentation of internal validity of the case study research could be achieved (Hancock & Algozzine, 2006; Yin, 2009). For instance, before undertaking the field observation I found that the batik cluster size in Kampung Laweyan covered 82 batik firms based on the latest data released by FPKBL. After the field observation there were 88 batik firms, confirming the shutdown of 8 batik firms and the establishment of 14 new ones. In doing so, I utilised four ways of capturing the factual events, i.e. taking of photographs, videotaping, taking field notes, and GPS-assisted mapping. As with conducting the expert interview and questionnaire survey, I prepared a list of objects to be captured during the field observation and asked for permission beforehand, particularly if the objects were located in private premises. The following **Table 3.5** presents the list of objects and methods used during the field observation.

Table 3.5 The list of objects and methods in the field observation

No.	Object Items	Purpose	Methods			
			PHOTOGRAPH	VIDEOTAPING	FIELD NOTES	GPS MAPPING
1.	Physical boundaries of local batik cluster including the entrance gates of the attached neighbourhood unit, major roads, rivers, signage, etc.	To figure out the demarcation of local batik cluster regarding its accessibility to urban/rural public facilities, infrastructure, suppliers, batik markets, and so forth	X	X	X	X
2.	Location of batik firms, showrooms, cooperatives, suppliers, markets, communal facilities, etc.	To figure out the size of local batik cluster and its distribution related to spatial agglomeration				X
3.	The attached neighbourhood condition during the normal weekdays and seasonal hectic days	To obtain visual perception about the flows of interactions occurred in the local batik cluster in distinct conditional days	X	X	X	
4.	Physical quality appearance of batik firms, showrooms, cooperatives, suppliers, markets, communal facilities, etc.	To obtain visual perception about the appearance of those existing objects	X		X	
5.	Batik making process and working condition in batik workshops	To figure out batik making process including the use of raw materials, technology, and the gendered division of labour	X		X	

Source: Author (2013)

With regard to the use of secondary data sources, I collected statistical reports, public documents, previous studies, and media publications either in the forms of hardcopies or online versions. The statistical reports were mostly used to examine the historical developments of the national batik industry and the contextual setting of local batik clusters observed, but this contributed little to their performance examination. The use of public documents was to provide information about government policies and regulations related to national/local batik industry development and clustering approach. Meanwhile, the usefulness of previous studies was associated with the supply of background information relevant to national/local batik industry development issues. Finally, media publications were useful mainly to keep updated on those issues, and together with previous studies it could provide some indication of the actors linked to particular events happening in batik industry.

3.6 The Use of Triangulation Methods

Triangulation is a method of combining multiple sources of evidence which is useful to validate the similarities of research findings. The converging results may provide a better understanding on the phenomena under study resulting from multiple points of view and methods (Given, 2008). According to Patton (2002), this claim is not entirely true because the main point of undertaking triangulation is to check data consistencies across different sources. Actually, the different data sources and inquiry methods may yield different results. Thus, the rationale behind the use of triangulation method is to find a fuller clarification of the phenomena rather than to collect data similarities. Another merit of triangulation method is to reduce potential biases resulting from a single measurement. These advantages can be achieved since the method serves as a protocol of confirmation and validation towards different facts that a researcher requires in pursuit of research question and objectives. Once the triangulation results confirm hypotheses or propositions of the research, it has reached an endpoint of examination. At the same time, it may serve as a protocol of differentiation when the results unpredictably disclose different meanings beyond the researcher's expectation. This situation is beneficial to encourage the researcher to chase for further examination, through which the alternative explanations and the breadth and depth of meanings related to the phenomena may be produced (Lewis & Ritchie, 2003; Stake, 2010). Hence, triangulation has become popular to increase the reliability and validity of the research. However, the use of multiple methods in data collection and data analysis while proceeding triangulation has marked its principal weakness due to the lengthy and costly resources that the researcher must pay for. This makes the researcher may be trapped into a never-ending search for perfect elucidation of the phenomena (Patton, 2002; Given, 2008).

According to Denzin (1978, in Patton, 2002; Lewis & Ritchie, 2003), there are four basic types of triangulation as follows:

- 1) Data triangulation: the use of multiple data sources in a study;
- 2) Methodological triangulation: the use of different methods to generate data in a study;
- 3) Theory triangulation: the use of a variety of theoretical perspectives to interpret data in a study;
- 4) Investigator triangulation: the use of several different researchers to check and evaluate the interpretation of data in a study.

Of those aforementioned types, I rather used data and methodological triangulations in this research. Their implementation was done when I collected data from the field by using different sources and techniques (refer to **Table 3.2**, **Table 3.4**, and **Table 3.5**). I also used them to interpret various facts and figures when establishing logical explanations about cluster phenomena. By undertaking triangulation I could find a variety of relationship patterns of events and actors in each local batik cluster. Finally, I could make a cross-case inference together with the deepening of local uniqueness of batik cluster phenomena.

Chapter 4

A REVIEW OF BATIK INDUSTRY DEVELOPMENT

4.1 The Early Period of Batik Tradition, ca. 600-1850 AD

The term batik comes from two Javanese words: “*amba*” and “*titik*”. *Amba* means width or breadth, and later is associated with a piece of wide-long fabric called *kain panjang*. *Titik* means dot or drop, representing certain drawing ways of connecting dots onto a piece of fabric. So batik refers to a process of drawing by using handheld *canting* or stamping tools to put wax on a desired pattern and motif, and the result called *batikan* (Jusri & Idris, 2011; Wulandari, 2011). Batik reflects a handmade process of drawing which requires creativity and skills. Hence, batik is often associated with exclusively fine arts rather than mass products. The former suggests the originality of the batik making process in conventional traditions, while the latter refers to the opposite by using machinery. In the other section of this chapter, I will explain further the tensions inside the batik community, arguing for and against machinery based batik products to be acknowledged “authentic batik”. This condition relates to the most recent definition of batik as a process of dye-resist decoration onto a fabric by using a wax.

Following its terminology, batik originates from Indonesia, particularly rooted in Javanese culture and tradition. Such a claim is true in the sense of that the Javanese batik tradition can be traced back to centuries ago when archaeological discoveries found a number of ancient temple statues in Java Island showing the use of batik material as the royal emperor’s clothing. Some scholars argued that Javanese batik (and therefore Indonesian batik) appeared during the Majapahit Monarchy (1293-1478) which existed in Mojokerto in East Java with the capital city of Trowulan. Others predicted that batik had appeared earlier during the period of Srivijaya Monarchy (600s-1100s) which existed in the South Sumatra Province – located in Sumatra Island, not Java Island – with its capital city around Musi River; and its successor migrated to Central Java mainland during the Srivijaya attack on the Tarumanagara Monarchy (358-669) in West Java, namely the Syailendra Monarchy (700s-800s) centred in Medang. Later, the Syailendra Monarchy was also known as the ancestor of the Medang Monarchy (752-1045). If the Majapahit Monarchy had been established under the influence of Hindu-Shiva religion, both Srivijaya Monarchy and Syailendra Monarchy were Buddhists. It is believed that batik had developed and spread during the rise and fall of those ancient monarchies in Indonesia even though there are no convincing artefacts showing authentic batik production in the past such as batik fabric and its equipment, for example. Arguably, these artefacts had been lost because of the absence of long-lasting preservation technology. However, it is inevitable that batik clothing was recognisable during those ancient times and the most popular centre of batik development was on Java Island (see Elliot, 2004; Jusri & Idris, 2011; Wulandari, 2011).

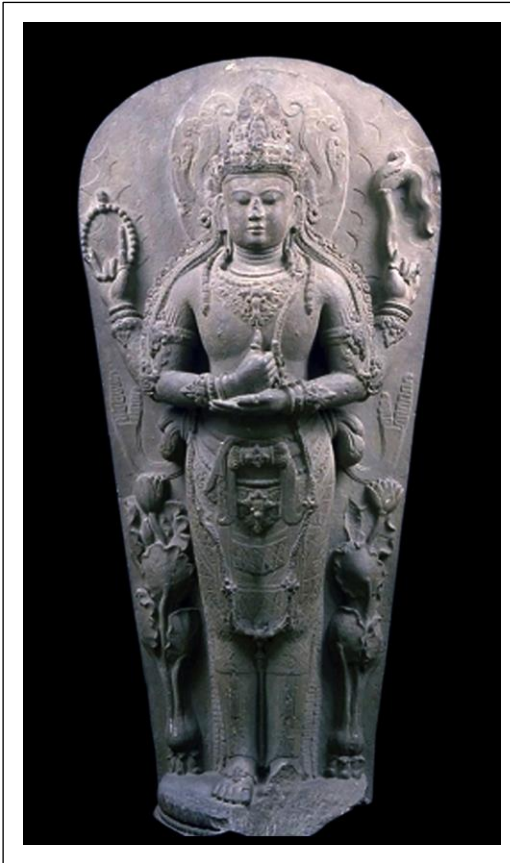


Figure 4.1 A statue of King Anushapati of Singhasari Monarchy ca. 1260 AD wearing a long batik dress. The statue found in Kidal Temple in Malang, East Java, to represent himself as the incarnation of God Shiva.

Source: Endarto (2011)



Figure 4.2 A statue of Avalokiteshvara, the Buddhist Boddhisattva, between 800-900 AD, wearing a long batik dress during Srivijaya Monarchy era. The statue found in Bingin Jungut site of Musi Rawas Regency, South Sumatra.

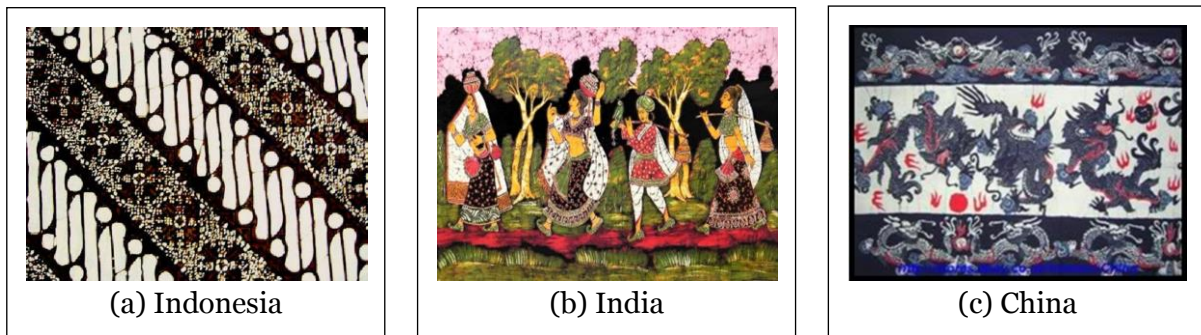
Source: Kartapranata (2012)

Similar batik-like clothing actually can be found elsewhere in other Asian regions such as India, China, Japan, Malaysia, Thailand, and Cambodia. A dye-resist technique to create painted decorative fabric similar to the batik technique was also known in those areas. According to Elliot (2004), such cloth painting methods were not only popular in Asian regions but also Africa and Europe, and probably originated from India brought to Egypt before spreading back to Asian regions. This theory is plausible because of the strong influences of Buddhism and Hinduism from India into the establishment of ancient monarchies in Indonesia. The past migration from Asian mainland to the south brought new religions and Indian culture to change indigenous beliefs on animism and dynamism practiced extensively by Indonesian ancestors. Increased political waves and economic trade following this migration encouraged cultural exchange, including the improvements of batik

making, raw materials, motifs, and utilities. During the time of these ancient monarchies batik making was a folk handicraft production, non-commercial purposes, and often used for serving royal clothing. The use of *canting* tool (waxing pen) for drawing *batik tulis* (handwritten batik) in the earliest batik making differs from those in India or other places (Ishwara, Yahya, & Moeis, 2011). Hence, the original batik technique was probably conceived in Indonesia and was improved by Indian influences and later also by Chinese, Persian, Japanese, and Dutch. Cultural exchange and adaptation through religious missionaries, political expansions, and commodities trade are the most likely ways of improvements in batik making, motifs, raw materials, and utilities along with the waves of migration from India and Southern China and colonisation from the Dutch and Japanese in particular (see Doellah, 2002; Maxwell, 2003; Veldhuisen, 2007; Ishwara et al., 2011).

As for the local tradition, batik has evolved over time because of endogenous innovations as well as foreign dispersions. Regardless of its origins, changes in the batik tradition cannot be placed in isolation from external influences. Similarities and differences of batik tradition in Indonesia with neighbouring countries reflect the adaptability of the indigenous batik makers to absorb external influences from which the richness of the batik tradition flourished. The major similarities rest on a detailed decorative design and the use of rich colour applied on a piece of fabric. Scrupulous design making combined with various colouring techniques may take days or months to represent the maker's artistic expressions. The final design may display images of nature, life experiences, symbolic meanings and abstract ideas (see **Figure 4.3**).

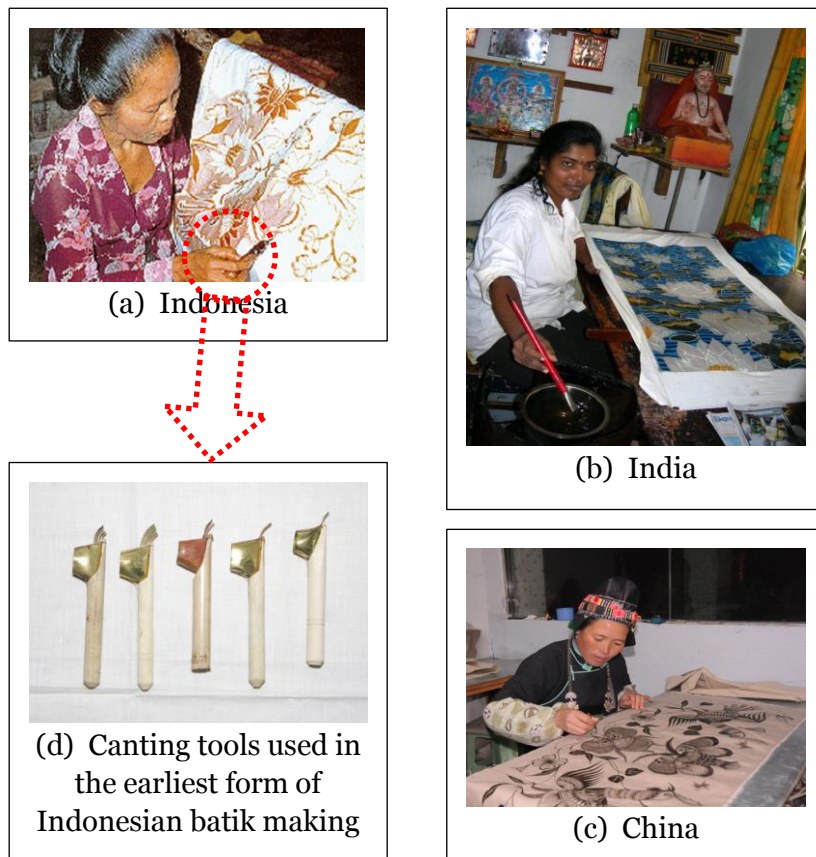
Figure 4.3 A sample of batik motifs from Indonesia, India, and China



Source: (a) Gulnik (2011), (b) Dolls of India (2013), (c) Xiao (2010)

Even though the results look similar, the decorating process is different. Batik making requires the application of hot wax to draw a pattern and design on a fabric to resist a desired colour. The multiple stages of adding and removing wax are undertaken to combine various colour of the end product (UNESCO, 2009). This process distinguishes Indonesian batik from batik-like products of other countries which have been drawn using an ink, paint or other liquid materials, from which it was awarded a world's intangible cultural heritage by the UNESCO on October 2nd, 2009 in Abu Dhabi. The alternative process does not require wax addition and removal either for drawing pattern and design or combining colour. Therefore, the batik-like products are not an authentic batik but a textile with batik motifs (see **Figure 4.4**).

Figure 4.4 The different ways of batik making in Indonesia, India, and China



Source: (a) Scole (1999), (b) Handmade Expressions (2011), (c) Guangming Daily (2012), (d) Bolk (2009)

The use of handheld tools is the first and foremost feature of traditional batik making. *Canting* tool and stamping tool – both are used to fix the liquid wax onto a fabric – are basic tools to form batik pattern and design. Either *canting* or stamping tools can be used individually or simultaneously to result in batik cloth. The individual use of the *canting* tool produces **batik tulis** (handwritten batik) and the stamping tool does **batik cap** (stamping batik), while both usage does **batik kombinasi** (combined batik). Whichever the method is undertaken, as long as the wax application is still on the batik cloth results in an authentic traditional batik.

Actually, the creation of the *canting* tool is not known precisely. According to Siswandi (1999) and Veldhuisen (2007), it was supposedly found in the 17th century even though ancient textiles with batik motifs had been found centuries earlier. Nobody knows exactly by whom, when, and where the *canting* tool was invented. Interestingly, ancient batik motifs which still exist such as *gringsing* and *kawung* have been found in many ancient statues and reliefs on the sacred temples of Srivijaya and Majapahit Monarchies. If the *canting* tool (and perhaps waxing materials too) had not been present during the era of these monarchies, then the batik production relied on other types of drawing tools. The earlier technology of cotton weaving which had existed already was likely to facilitate the creation of ancient batik motifs. The presence of *kain tenun* (woven fabrics with colourful detailed pattern) found in diverse regions of Indonesia to represent a folk handicraft industry shows how local customs and

traditions inspired new inventions on textile production including batik technique. The case of Kampung Laweyan in Surakarta shows exactly how a prior weaving industry centre transformed into *kampung batik*, a form of urban settlement characterised by a home based batik industry. Formerly, Kampung Laweyan used to be a *tanah perdikan* – a tax free land controlled by the ruling authority – of Majapahit Monarchy. After the batik technique was introduced by Ki Ageng Henis, the descendant of King Brawijaya V of Majapahit, during his stopover in Laweyan since 1546 the local residents started to modify plain woven fabrics into batik fabrics called *kain jarik*, a form of women's traditional long skirt.

“... around 1546 AD Ki Ageng Henis, a descendant of King Brawijaya V, visited to Laweyan Village and coincidentally encountered Sunan Kalijaga – one of the prominent Islamic propagators – to learn Islamic lessons and help spread the religion to local residents and others. During his stopover Ki Ageng Henis taught Laweyan villagers the batik technique. Soon Laweyan transformed from a weaving industry centre to a kampung batik.”

Source: Efendi (personal communication, December 22, 2011)

“Laweyan came from a Javanese word “lawe”, meaning a yarn. In the past the area stretched out between Laweyan and Pengging areas, which were linked with the River Jenes. Along its riverbank there was used to be a plenty of cotton plants to supply the weaving industry in Laweyan ... Previously, the plain woven fabrics were used to produce kain lurik for daily clothing. After the inception of the batik technology the local residents shifted to produce kain jarik.”

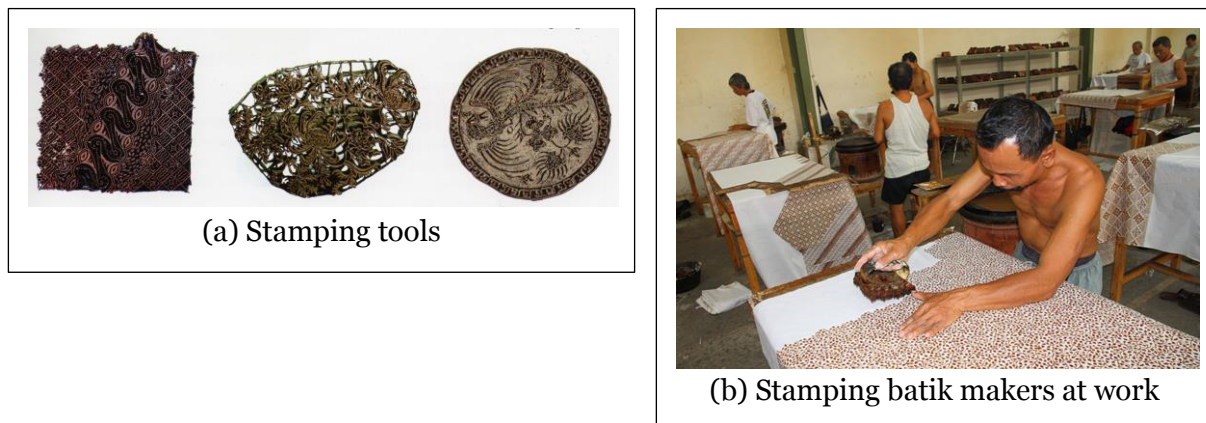
Source: Widhiarso (personal communication, December 22, 2011)

Batik production grew quickly after the invention of the stamping tool, which was known as a *canting cap* around the mid-19th century. It was made from copper which was probably inspired from a wooden stamping tool that already existed in Palembang of South Sumatra or India (Siswandi, 2009; Ishwara et al., 2011). Compared to handwritten batik, batik production using a stamping tool is easier and faster. Batik makers can create consistent and neat batik motifs by connecting dots and lines on the edges of the stamping tool continuously on a fabric. It requires batik makers' precision and endurance to hold it tightly for hours because of its heavy weight. Therefore, batik stampers are mostly men whereas batik hand-writers are women. In line with the increased use of the stamping tool a variety of batik motifs have developed. The third generation of batik motifs resulting from the combination of using both *canting* and stamping tools together, namely combined batik. Batik makers usually use a stamping tool first to put on a general pattern of batik motif and then a *canting* tool for detailed fillings called *isen-isen*. The leading batik production centre that has developed those three types of batik mainstreams is Pekalongan, which is located on the northwest coast of Central Java Province.

The second feature of traditional batik making is wax application. A hot liquid wax is used to cover certain areas on a fabric to resist it from a (un)desired colour. Sometimes it is also used for putting detailed design and fillings onto batik fabric. Such a dye-resist technique on textile production actually developed thousand years ago in many parts of the world like Egypt, China, India, Middle-East and West Africa. However, they did not use wax materials or *canting* tool to accomplish it. Even the early Indonesian batik technique used glutinous rice paste instead of wax to resist an undesired colour. A finger or bamboo stick was used to

fix the paste onto the fabric. This tradition called *simbut* technique was found in West Java and at the prehistoric site of Tana Toraja in South Sulawesi (Siswandi, 2009; Ishwara et al., 2011). If the later discoveries found wax application in other countries, the types of wax materials differ from traditional batik making. In Indonesia, batik wax resulted from a mixture of local materials such as paraffin, *kote* (beeswax), *gondorukem*, *damar mata kucing* (merawan timber or *light hopea*), *lilin gladhagan* (used wax) and imported microwax (Doellah, 2002). Therefore, the exploration of local resources to produce batik wax has characterised traditional batik making.

Figure 4.5 Stamping tools used in Indonesian batik making



Source: (a) Ishwara et al. (2011, p. 25), (b) Gugus (2012)

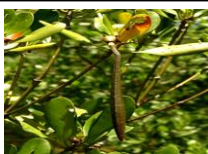





The third feature is the use of locally natural plants for colouring process. The ancient batik motifs were dominated by *soga* (brown), black and white. The dyeing materials were collected from local natural plants such as *kayu tingi*, *kayu tegeran*, *kayu secang*, *kayu jambal*, *tarum*, and *gambir*. Parts of these plants can be extracted to result in some of the basic colours of batik as shown in **Table 4.1** below.

The fourth feature of traditional batik making is the wax removal process called *nglorod* (see **Figure 4.6**). The process is by putting the waxed fabrics into a barrel of boiling water. Before the fabrics are put into the barrel, a portion of starch or caustic soda is dissolved in the water in order to remove the wax quickly. Once the fabrics are in, the batik worker(s) stirs and washes them several times using a long wooden stick which is also used to lift up the fabrics from the barrel. The *nglorod* process can be made up several times during the entire batik processing. If the batik maker wants to add more colours, the first-time waxed fabrics are put into the *nglorod* process before being coloured and waxed again. After all colouring and waxing processes have been done, the batik worker(s) put the waxed fabrics into the final *nglorod* phase. This final process is known as *mbabar* or *ngebyok* (International Batik Centre, 2012).

Taking into consideration that those characteristics of traditional batik making are not present elsewhere, it is obvious that batik skills and technology are rooted in local Indonesian traditions. Each locality brought about their own discovery in batik making coincidentally, and shared knowledge and skills spread along territorial expansions of ancient monarchies and migrations across regions. Such political waves and demographic movements improved the local batik techniques. During these times the foreign influences,

particularly from India, had been brought into the occupied lands by the conquering kings. The strong influences of Indian Buddhism and Hinduism manifested in these ancient monarchies reshaped the local social order and culture. For instance, the caste system in India transformed into the former Buddhist and mystical society of occupied lands. Lombard (2008c) exemplified a rigorous hierarchical pattern in the old Javanese society during the Majapahit era. The society was classified into four groups known as *caturjana* which consisted of: 1) *mantri* (high-order government officials) and *arya* (royal family), 2) *kryan* or *ksatriya* (military knights), 3) *wali* (religious guardians) and *perwira* (commissioned officers) who acted like a low-class royal family, and 4) *waiśya* (traders, farmers, and artisans) and *śūdra* (ordinary people). Such classification is somewhat different from Indian society which placed *brahmana* (religious priests) on the top rank. Such idealistic *caturjana* systems in fact dissolved into the existing social order which placed the kings as the centre of the universe, representing the manifestation of God in the world.

Table 4.1 Sources of natural dyeing plants in batik making

No.	Type of Plant	Parts of Plant Used	Colour Resulted	Image
1.	<i>Kayu tingi</i> (<i>Cerriops tagal</i> (Perr.) C.B. Robinson)	<ul style="list-style-type: none"> • Timber skin • Timber 	<ul style="list-style-type: none"> • Black • Red 	
2.	<i>Kayu tegeran</i> (<i>Maclura cochinchinensis</i> (Lour.) Corner)	<ul style="list-style-type: none"> • Timber skin • Timber 	<ul style="list-style-type: none"> • Yellow 	
3.	<i>Kayu secang</i> (<i>Caesalpia sappan</i> L.)	<ul style="list-style-type: none"> • Timber skin 	<ul style="list-style-type: none"> • Red 	
4.	<i>Kayu jambal</i> (<i>Peltophorum pterocarpum</i> (DC.) Backer ex K. Heyne)	<ul style="list-style-type: none"> • Timber skin 	<ul style="list-style-type: none"> • Yellow flame 	
5.	<i>Tarum</i> (<i>Indigofera arrecta</i> Hochst. Ex A. Rich)	<ul style="list-style-type: none"> • Leaf 	<ul style="list-style-type: none"> • Indigo blue 	
6.	<i>Gambir</i> (<i>Uncaria gambir</i> (Hunter) Roxb)	<ul style="list-style-type: none"> • Fruit 	<ul style="list-style-type: none"> • Dark red 	

Source: Doellah (2002), Prohati (2013) and the images are the courtesy of: (1) Fryer and Newland (2011), (2) Haslam (2013), (3) Garg (2009), (4) Ganguly (2010), (5) Stüber (2004), (6) Sudarsono (2011)



Figure 4.6 Wax removal process in traditional batik making (*nglorod*)

Source: Batik Purwanti (2012)

4.2 Local Batik Making Adaptation towards External Influences, ca. 700-1945 AD

Historically, the Indian and Chinese people brought the first external influences to indigenous batik making. Even though prehistoric migrations from these countries to the Indonesian archipelago have lasted for centuries, their identifiable influences started in 100 AD through trade links. The Indians came to Sumatra, Java, and Bali, followed by the Chinese in the third century to southern Sumatra. As of the eighth century these trade links intensified, particularly since the rulers of Srivijaya Monarchy controlled the Malacca Straits as the most important trade route in Southeast Asia (Forshee, 2006). The Indian traders introduced cotton fabrics while the Chinese introduced silk fabrics. These fabrics were among the most popular trading items like spices, mahogany, ceramics, and musk oil exchanged with Southeast Asia, Africa, and Europe (Lombard, 2008b). From an economic view, the imported fabrics and clothing were beneficial to accelerate the traditional batik production. Previously, the indigenous batik makers relied on handmade woven fabrics which were produced in several days per sheet. The scarcity of domestic fabrics supply made imported fabrics welcome by the local batik makers to increase their production capacity. From a socio-cultural view, they were also influential in improving traditional batik quality and utility. They inspired the local batik makers to learn about new design, decorating techniques, and material use. For example, *chintz* of Coromandel Coast – a glazed printed calico made of cotton fabric with floral decorative design (see **Figure 4.7**) – and *patola* of Gujarat – a silk sari woven cloth used for Indian women’s wedding clothing (see **Figure 4.8**) – were traded from India to Sumatra Island in the seventh century during the age of Srivijaya Monarchy. The specific pattern and use of these ancient cloths symbolised the higher social status of the users, particularly the royal family members (Doellah, 2002).

The basic differences between Indian and Chinese influences in traditional batik making are observable in batik motifs. The Indian motifs display an orderly geometric pattern similar to traditional motifs like *kawung*, *parang*, *ceplok*, and *truntum*. These motifs used to be favoured in the royal family clothing of Sumatran and Javanese monarchies. Some of these ancient motifs were forbidden for ordinary people outside the crown family because they symbolised certain meanings of pride, superiority, health, etc. The Chinese motifs are identical to the application of floral bouquet and animal images like phoenix, dragon, *kilin*, and turtle (see **Figure 4.9**). These images came from Chinese mythology to represent

various symbolised meanings of glory, prosperity, peace, etc., which were inspired from Chinese pottery designs prior to 1910. Afterwards, Chinese descendant batik makers, particularly in Pekalongan, adopted Dutch-styled floral bouquet motifs in response to the increasing demand of this new design first introduced by the Indo-European batik makers mostly settled in the north coast cities of Java (Doellah, 2002; Ishwara et al., 2011). Even though differently expressed, both Indian and Chinese motifs have shared a purposeful message delivery that emphasises great expectations and prayers to the users, and heightens their social status as well.



Figure 4.7 Chintz cloth of Coromandel Coast, India

Source: Doellah (2002, p. 158)

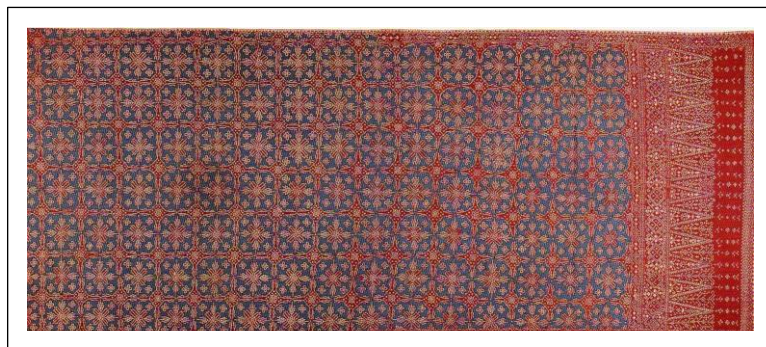


Figure 4.8 Jelamprang local batik motif adopted from patola cloth of Gujarat, India

Source: Ishwara et al. (2011, p. 63)

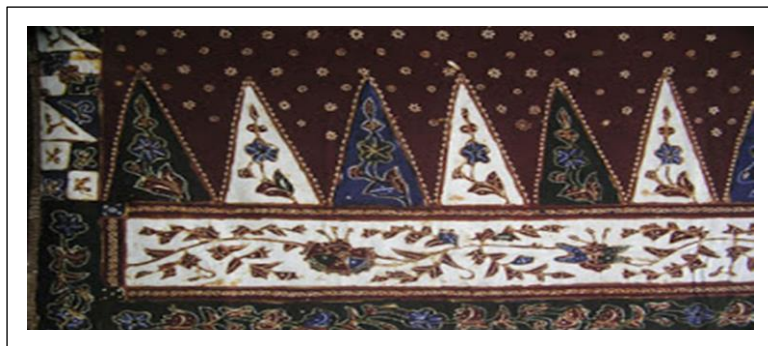


Figure 4.9 Floral bouquet batik motif adopted from Chinese art design

Source: Ishwara et al. (2011, p. 71)

The following influence came from Islamic tradition brought by Gujarat and Arab traders. Their influences to the local batik production are little known, probably because of limited areas of trading coverage and the short period of Islamic monarchy in the north coast Java regions. According to Lombard (2008b), the spread of Islamic teachings started and concentrated in these areas at least from the 15th century, marked by the rise of the first Islamic monarchy in Java, i.e. Demak Monarchy (1475-1548), the prior vassal of Majapahit Monarchy located about 400 kms to the west which had been separated from the central government a few years before its demise in 1478. Its further development to mainland regions were more difficult due to resistance from the former Hindu-governed Majapahit Monarchy opponents against the new religion, which was suspected to replace their former

beliefs on polytheism, animism, and dynamism. Following its slow dispersion to the mainland, the Islamic traders in the north coast intensified local batik trading – the most favoured employment for the Islamic community along with the clove cigarette industry – as a means of promoting economic welfare, political power, and religious influences. In line with Islamic trading economy increase on the north coast, these Islamic traders built batik home industry dwellings called *kampung kauman*. It was *kampung kauman* in Pekalongan and Cirebon which promoted batik trading intensively even though they were located 80 kms and 260 kms respectively from Demak. In relation to batik making (and any other artistic expressions) Islamic rules had prohibited the presentation of multiple Gods and mortal images. Soon the local batik makers modified the old batik motifs by applying incomplete or unrealistic mortal images, Islamic symbols and calligraphic writings, and orderly geometric patterns to result in the new batik motif called **batik rifa'iyah**. Despite the enriched batik motif, there was no technological change inherited to traditional batik making, causing little public recognition on the deeper Islamic influences in the local batik industry.



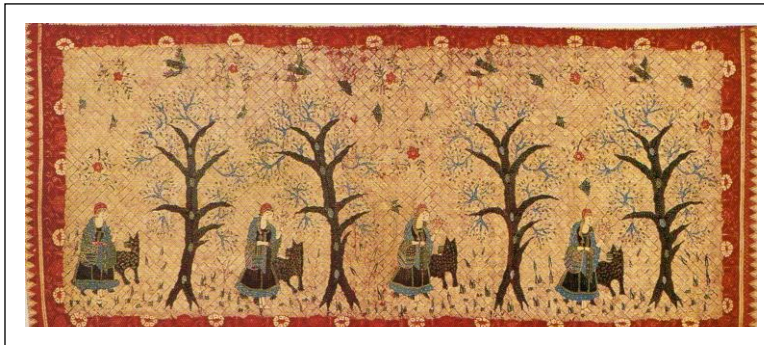
◀ **Figure 4.10** Rifa'iyah batik motif adopted from Islamic influence

Source: Purnomosidi (2012)

The Dutch influences on local batik making were initiated by the Indo-European batik maker namely Ms. Carolina Josephina von Franquemont in Surabaya – the port city in the north-eastern of East Java Province – in 1840 (Veldhuisen, 2007), long after the first visit of the Dutch fleet in 1596 and the establishment of an official Dutch traders' association called *Vereenigde Oostindische Compagnie* (VOC) or the Dutch East Indies Trading Union Company in 1602 (Lombard, 2008a). There were two key drivers that sparked Dutch involvement in traditional batik making: 1) the demise of VOC supremacy in national trading and 2) the intensifying trade growth particularly along the north coast regions of Java. The closing of VOC in 1799 – later its role was taken over by the Dutch-Indie Colonial Government regime – led to economic welfare downturn of VOC staff and families. Previously, the Dutch traders came to and lived in Indonesian territory to exploit natural resources, particularly spices and plantation commodities for the sake of their homeland needs. Later, they also became involved in intra-Asian textile trading, but were not interested in the textile industry including batik making. However, the subsequent effect of VOC bankruptcy made the Dutch traders got involved deeper in the textile and traditional clothing trade inside Asian region (Doellah, 2002; Veldhuisen, 2007; Lombard, 2008a).

Taking into consideration prospective returns of the batik industry, some Dutch female settlers started up batik production businesses by employing traditional batik makers at their home workshops. They introduced new batik designs and motifs by adopting European styles such as floral bouquet, fairy tales, natural landscapes, and life events (see **Figure 4.11**). Another influence was the use of softer and more simplified colouring techniques. This batik motif was broadly known as **batik Belanda** (Dutch batik), and frequently named by its creators such as *batik Prankemon* (by Messrs Carolina Josephina von Franquemont),

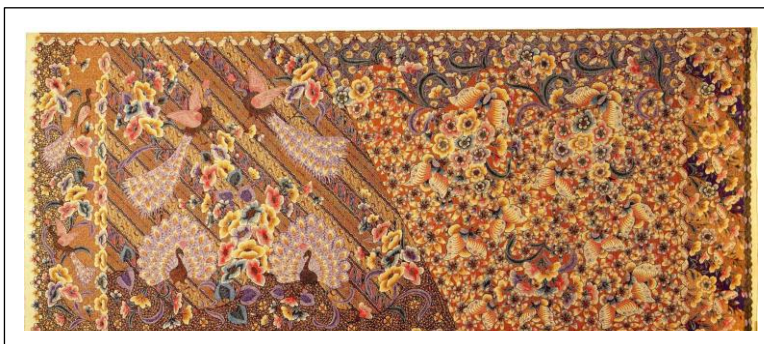
batik Panastroman (by Messrs Catharina Carolina von Oosterom), and *batik Pansellen* (by Messrs Eliza Charlotta van Zuylen, the last Dutch batik maker in the late 1940s). These batik makers lived in north coast cities, particularly Pekalongan, and produced batik fabrics for commercial use. Following the increasing demand of Dutch batik products, many Arab and Chinese batik makers produced them as well. Nevertheless, the marketing distribution of Dutch batik products was limited to national trade at most. As for Dutch indigenous society, these batik products were perceived as middle-class clothing and collectible items in the Netherlands instead of profitable commodities (Doellah, 2002; Veldhuisen, 2007; Lombard, 2008a).



◀ **Figure 4.11** Dutch batik motif adopted from Dutch influence

Source: Doellah (2002, p. 168)

The last foreign influence came from Japanese tradition during the short colonisation era of 1942-1945. During its invasion of Indonesian territory, the trade links to European and Asian countries were disrupted, creating significant shortages of imported cotton fabrics and synthetic dyeing materials. As generally known, the domestic consumption of cotton fabrics was very high and the bright colourful batik motifs from Chinese and Dutch influences relied on synthetic dyeing materials instead of natural colour products. Consequently, local batik makers utilised the remaining materials stock and intensified the traditional handwritten process to cope with reduced market supply and demand. This short period then resulted in a new batik motif called ***batik Djawa Hokokai***, the label taken from a Japanese-built organisation comprising Indonesian members led by the Japanese (see **Figure 4.12**). The main feature of this batik motif is the use of combined colours and detailed motifs and a *pagi-sore* pattern, a two-pattern in single batik fabrics. The prominent colours of yellow, turquoise, red, and green are used intensively, and the detailed very small *isen-isen* (technical fillings) is applied in the main pattern and borderlines. The floral images (e.g. sakura, chrysanthemum, orchid, rose, etc.) and animal images (e.g. butterfly, peacock, etc.) are preferred in the Djawa Hokokai batik making resulted from the combination of existing batik motifs and Japanese influence (Doellah, 2002; Ishwara et al., 2011).



◀ **Figure 4.12** Djawa Hokokai batik motif adopted from Japanese influence

Source: Ishwara et al. (2011, p. 99)

All these foreign influences were welcome by Indonesian batik makers and have enriched traditional batik making over time. Obviously, the greatest foreign influences appear in the adaptation of batik designs and motifs resulting from either imitation processes or creative innovations. It has been evolving from geometric patterns of dots and lines to natural images pattern of living organisms and life events. Such evolutionary batik motif creation is possible because of the availability of imported cotton fabrics to ease the drawing of various designs and motifs compared to prior woven fabrics. Imported synthetic dyeing materials are also supportive in facilitating accelerated foreign adaptation. The traditional batik colours relying on natural dyeing materials only produce limited colours of brown, black, red, yellow and blue. With synthetic dyeing materials the batik makers have unlimited possibilities to create various colour combinations. Of local batik makers, the Chinese descendant batik makers who live in the northern coast cities of Java are more adaptive to foreign influences than indigenous batik makers. While the indigenous batik makers are preserving classical Keraton-styled batik motifs and slowly accepting foreign influences, the Chinese descendant batik makers have stepped further into the contemporary batik motifs by combining the classical with adaptive motifs. As can be seen, they keep applying the classical background and adding to the new designs and motifs. This situation applies for colouring adaptation as well where the classical *soga* brown and black-white colours are combined with bright glamorous colours. Another foreign influence can be noticed from the transformation of batik uses. Previously, batik making was to serve domestic clothing demand and the finest handwritten batik clothing was limited for royal family members. However, since the inception of new batik designs, motifs, and colours from abroad batik fabrics and clothing have turned into commercial commodities. Batik products are no longer limited to be used on special occasions of the ruling court family, but they have become daily clothing for ordinary people as well. Such transformation has encouraged the emergence of batik entrepreneurs specialising in batik production instead of batik trading only.

Inevitably, trade channels are the key driver of local adaptation over foreign influences. With the exception of the batik makers themselves, batik traders are influential in spreading new ideas and inspirations for local batik making innovations. The traders have indirectly opened access for the exchange of materials, technology, knowledge, and utilisation in the batik industry between local batik makers and their counterparts abroad. Producer-trader relationship was the most common medium of knowledge transfers and innovations during those times. There were no direct links between local batik makers and foreign textile makers in the separated Asian regions. In contrast, the direct influences might occur between local batik makers as exemplified by Chinese descendant and Indo-European batik makers. Among those half-bred and the foreign settlers community were Arab descendant batik makers who also accelerated of the national batik industry growth. The latter batik makers were concentrated in the *kampung kauman* neighbourhood in certain north coast cities of Java. Even though their existence was frequently associated with Islamic tradition, their contribution to the batik industry was recognised by contemporary market-oriented batik motifs as well instead of promoting rifa'iyah batik motif, for example. In this sense, they were reluctant to carry out Islamic influences into batik making process unlike those Chinese descendant and Indo-European batik makers.

4.3 The Rise of the Modern Batik Industry in the Age of Dutch Colonisation, ca. 1870-1930 AD

In response to a prospective market of the traditional batik industry, the government stepped in to encourage batik makers and traders. The active engagement of the government body facilitated batik making transformation from a traditional to a modern industry. The Dutch colonisation era (1596-1942) marked this transition through the introduction of the steam boiler, paddle wheel, and other machinery since the 1870s either from import or domestic production by the government and (foreign) private investors. As a result, modernisation of domestic industry was growing in line with the existence of majority traditional folk industry (Siahaan, 2000a). Since then statistics of batik industry have been available including the traditional industry. Previously, the existence of the batik industry was identifiable through archaeological manuscripts and field observations but no official statistics reporting its performance. Therefore, the modern industrialisation era marked the collection of statistical information on the manufacturing industry in the Indonesian archipelago. Based on a series of the Dutch Indie government reports (1881-1919) the number of modern manufacturing firms increased continuously. By comparing **Table 4.2** and **Table 4.3** below we can see that the forty-year government-driven industrial modernisation was unable to replace the domination of traditional firms. In the case of the textile and leather industry for example, there were 22 modern firms out of 1,555 total firms in 1919. Of 622 domestic textile and leather firms there were 289 batik firms (46%) consisting of 145 firms employing up to five workers and 144 firms with more than ten workers (Siahaan, 2000a).

Table 4.2 The number of modern manufacturing firms, 1881-1919

No.	Type of Manufacturing Industry	1881	1885	1899	1910	1916	1917	1918	1919
1.	Food and beverages	75	92	274	338	256	261	407	251
2.	Sugar	211	204	200	196	195	195	196	197
3.	Metal goods, machinery and equipment	30	23	30	42	87	83	88	88
4.	Chemical goods, rubber and materials from fossil fuel	15	45	64	49	54	56	64	70
5.	Wood and wood products	15	7	19	33	49	45	51	54
6.	Textile and leather	1	1	5	19	21	22	21	22
7.	Non-metal goods	2	2	6	12	13	17	18	19
8.	Paper and printing service	1	2	4	5	4	3	2	3
9.	Others	0	0	12	35	253	293	149	308
TOTAL		350	376	614	729	932	975	996	1,012

Source: Segers (1987) in Siahaan (2000a, p. 26)

Interestingly, **Table 4.3** shows the supremacy of foreign ownership in the entire manufacturing industry and firms except non-metal goods and metal goods, machinery and equipment sectors. Nearly 60% firms were owned by foreign capitalists absorbing more than 90% of total manufacturing employment. This means that prior to industrial modernisation

the traditional manufacturing sector was already dominated by foreign ownership. In addition, the high labour absorption by foreign firms indicated its significance to the national industry and the high dependency to foreign capital investment. It was the Chinese venture capital which controlled foreign investment in Indonesia's manufacturing industry. In **Table 4.4** we can observe that Chinese ownership was about 57% out of a total of 5,939 foreign firms in contrast to the Dutch, and it covered almost all manufacturing sectors except food and beverages, and chemical goods, rubber and materials from fossil fuel sectors. Thus, Chinese foreign capital was influential in promoting national industry development during this period.

Table 4.3 The number of overall manufacturing firms and labour force by domestic/foreign ownership, 1919

No.	Type of Manufacturing Industry	Domestic		Foreign		Total	
		Firm	Labour	Firm	Labour	Firm	Labour
1.	Food and beverages	299	906	1,766	99,635	2,065	100,541
2.	Textile and leather	622	7,051	933	16,595	1,555	23,646
3.	Wood and wood products	423	739	721	3,310	1,144	4,049
4.	Paper and printing service	13	180	107	2,900	120	3,080
5.	Chemical goods, rubber and materials from fossil fuel	37	80	1,037	39,707	1,074	39,787
6.	Non-metal goods	1,240	4,903	309	17,550	1,549	22,453
7.	Metal goods, machinery and equipment	831	2,072	374	21,996	1,205	24,068
8.	Others	224	305	179	458	403	763
Total		3,689	16,236	5,426	202,151	9,115	218,387

Source: Segers (1987) in Siahaan (2000a, p. 32)

If we look closer at the textile and leather industry, it was batik making which dominated industrial formation. In 1921 there were 840 batik firms, equal to 56% of total firms composed of textile and leather industries (see **Table 4.5**). This demonstrates that until the early 20th century the batik industry had become the backbone of the national textile industry before the country turned to intensify the production of cotton cloth and any other synthetic textiles. In other words, the development of the batik industry relied heavily on imported cloth or self-produced natural fabrics. The table also shows the greater involvement of the ethnic Chinese group in developing the national batik industry compared to the indigenous business group. Even though we cannot measure the batik market share or the composition of domestic and foreign capital investment in the batik industry at that time, the large ownership by the ethnic Chinese group demonstrates their powerful bargaining position in controlling the batik market.

Table 4.4 The number of overall manufacturing firms by domestic/foreign ownership, 1921

No.	Type of Manufacturing Industry	Domestic	Foreign		Total
			Dutch	Chinese	
1.	Food and beverages	350	978	962	2,290
2.	Textile and leather	666	154	793	1,613
3.	Wood and wood products	438	87	655	1,180
4.	Paper and printing service	43	107	110	260
5.	Chemical goods, rubber and materials from fossil fuel	49	846	226	1,121
6.	Non-metal goods	1,683	164	258	2,105
7.	Metal goods, machinery and equipment	868	182	222	1,272
8.	Others	307	33	162	502
Total		4,404	2,551	3,388	10,343

Source: Segers (1987) in Siahaan (2000a, p. 38)

Table 4.5 The number of textile and leather firms by domestic/foreign ownership, 1921

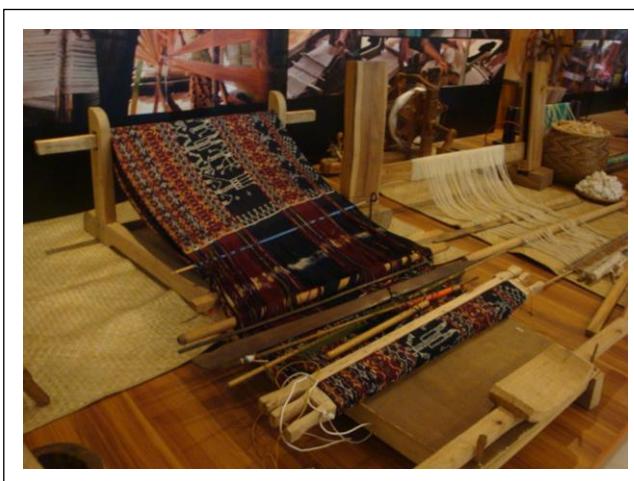
No.	Type of Manufacturing Industry	Domestic	Foreign		Total
			Dutch	Chinese	
1.	Batik	386	19	435	840
2.	Tailor	141	38	115	294
3.	Footwear	72	13	168	253
4.	Tannery	25	6	7	38
5.	Kapok	5	31	29	65
6.	Rope	1	18	0	19
7.	Others	36	29	39	104
Total		666	154	793	1,613

Source: Modified from Segers (1987) in Siahaan (2000a, p. 39)

As part of industrial modernisation the colonial government encouraged the establishment of research and training facilities. The early initiative was the establishment of *Textiel Inrichting Bandoeng* (TIB) in 1922 in Bandung city of West Java Province. It was built to support the accelerated modernisation of the domestic textile industry to achieve self-sufficiency in cotton cloth. The rationale of its development was the fear of colonial government from losing superior control over the textile trade because of increased cheaper cotton cloth imports from Japan and a disrupted supply from the textile industry in the Netherlands. By 1926 TIB could produce an improved semi-automatic handloom called *Alat Tenun Bukan Mesin* (ATBM) or semi-automatic weaving handloom (see **Figure 4.14**) that enabled them to increase the production capacity seven times more than the traditional

handloom of *gedogan* (see **Figure 4.13**), followed by the invention of machine loom called *Alat Tenun Mesin* (ATM) in 1930 (see **Figure 4.15**). Even though the adoption of new technology spread rapidly among local textile ventures from 257 ATBM looms and 44 ATM looms in 1930 soared to 52,000 ATBM looms and 10,000 ATM looms in 1942 compared to 500,000 *gedogan* equipment, it was not enough to remove import dependency as the level of self-sufficiency was estimated at 6% only. In 1928 the role of TIB was expanded not only focusing on technology research but also training activities. It hosted a weaving school in collaboration with local indigenous officials for educating Indonesians to become textile experts (Dick, 2002; Van der Eng, 2007). The colonial government also built *Textile Inrichting en Batik Proefstation* (TIBP) in Yogyakarta city of Yogyakarta Special Province in 1922 after establishment of TIB. It aimed at providing information about textile and batik industry development, undertaking certified testing on production quality control, and hosting training on batik and crafting industry standardisation and quality warranty (Jusri & Idris, 2011; BPKIMI, 2012; BBKB, 2013).

In the trading sector the colonial government regulated the cloth trading monopoly by favouring imported materials such as cloths, chemical dyes, and printed textiles from the Netherlands to be exchanged with indigenous natural resources. Limited import quotas for the same articles from British, Japan, and other countries were allowed without threatening the market of the textile industry in the Netherlands. Initially, this trade monopoly was operated by a Dutch private firm *Nederlandsche Handels Maatschappij* (NHM), which acted as a sole distribution agent and supported by Dutch shipping lines *Koninklijke Paketvaart Maatschappij* (KPM), which controlled almost all trade links in the Indonesian archipelago as well as intra-Asian regions. KPM was accompanied by Chinese middlemen's shipping lines to serve the colonies. The domination lasted until 1904 and gradually decreased following World War I (1914-1918). By the end of 1920s it was taken over by Japanese cheaper products which rose from 26% to 75% during 1928-1933, compared to Dutch share from 26% to 7% during the same period. As Dutch domination declined, the Chinese shipping lines took over the control of trade links not only to the old destinations but also to Japan (Siahaan, 2000a; Lindblad, 2002; Van der Eng, 2007).



◀ **Figure 4.13** Traditional weaving handloom (*gedogan*)

Source: Author (2013) taken from Textile Museum Collection Jakarta

Figure 4.14 Semi-automatic weaving handloom (ATBM)

Source: Author (2013) taken from Textile Museum Collection Jakarta



Figure 4.15 Machine weaving loom (ATM)

Source: Author (2013) taken from Textile Museum Collection Jakarta

4.4 The Struggle of Indigenous Batik Makers against the Hegemony of Foreign Players in Cloth Trading and Batik Market, 1933-1945 AD

The decade of 1930s marked heightened trade competition between the Dutch and Japanese in particular. The decline of textile production in the Netherlands and the increase of transport costs to its colonies in Asia because of World War I, made imported cloth (and other batik materials) from Europe less competitive. On the other hand, the Japanese textile firms could supply cheaper and better quality of cloths to domestic batik makers. As for comparison, **Table 4.6** below shows the proportional shift of imported commodities to the Dutch East Indie colony during 1929-1940.

In response to the threat of Japanese products the colonial government reinforced policies to control the cloth trade. Cambriic Covenant was imposed in 1933 to regulate import quota of *kain mori* (cambric). Another quota policy was endorsed for bleached cotton cloth (1934), unbleached cotton cloth (1935), and cotton yarn (1935), and followed by a strict import prohibition for woven products (1935) and clothing products (1936). The Japanese Government opposed the policy and started bilateral negotiations in March 1934. However,

it failed to result in a G-to-G mutual agreement, so that private cloth importers from both parties then undertook separate meetings which were successful in producing trade consensus underlining the abolition of cloth trade barriers between two two countries and cooperation in exchanged products distribution (Siahaan, 2000a; GKBI, 2009).

Table 4.6 The proportion of imported commodities to the Dutch East Indie colony from various countries, 1929-1940 (%)

Country of Origin	1929	1930	1931	1932	1933	1934	1935	1936	1937	1938	1939	1940
Europe	47,7	45,6	40,8	39,3	35,4	34,0	36,2	40,7	44,8	50,2	46,0	31,2
Netherlands	17,7	16,7	15,4	15,8	12,4	13,3	13,4	16,7	19,1	22,2	21,0	13,9
<i>British</i>	11,0	10,5	7,9	9,6	9,6	8,2	8,0	7,8	8,3	8,0	7,1	8,1
<i>Germany</i>	10,9	10,1	9,4	7,7	7,6	7,4	8,1	9,1	8,5	10,2	8,7	0
Asia	36,3	39,7	45,3	49,6	55,0	54,6	51,7	46,5	40,6	32,2	34,7	38,8
Japan	10,9	12,0	17,1	21,2	31,0	32,5	30,1	26,7	25,4	15,0	18,1	22,7
<i>Singapore</i>	10,6	11,0	11,4	12,6	10,8	11,3	10,7	10,0	7,5	7,6	7,1	3,1
United States	12,4	10,7	9,4	6,7	4,9	6,2	6,9	7,7	10,2	12,6	13,6	23,1
Australia	2,4	2,9	3,1	3,3	3,2	3,4	3,3	2,9	2,5	2,8	3,3	3,7
Others	1,2	1,1	1,4	1,1	1,5	1,8	1,9	2,2	1,9	2,2	2,4	3,2

Source: Modified from Broek (1942) in Siahaan (2000a, p. 49)

In the meantime, the colonial government approached indigenous batik entrepreneurs to support Cambic Covenant policy. On June 5th, 1934 their representatives consisting of Mr. R. Wongsodinomo R. Danubroto and Mr. Margolan (Surakarta), Mr. Djajengkarso, Mr. H.M. Bilal, and Mr. H. Muksin (Yogyakarta) and Mr. H. Madenoer Wirio, Mr. H. Zarkasi, and Mr. H. Abdulhadi (Pekalongan) attended a meeting in Jakarta hosted by the *Departement van Economische Zaken* or Department of Economic Affairs. The meeting chaired by Mr. Meyeranef ended in a deadlock and sparked immediate resistance from indigenous batik entrepreneurs against the colonial government and Chinese group dominance in cloth and batik trading. The policy irritated the interest of indigenous batik makers because:

- 1) Batik materials supply was exclusively distributed through the determined system of trade controlled by mostly Chinese and Arab traders;
- 2) Batik trader-producer relations were managed under a bonded agreement stipulating the obligation of batik producers to sell their products to raw materials suppliers;
- 3) Time discrepancy between batik production and marketing season created sustained difficulties for batik producers to run business continuously. Batik production ran throughout the year but the marketing season fell on certain times such as the harvesting period, New Year, and holidays (GKBI, 1969).

As a result, those who had limited capital stock were prone to such monopolistic market systems. Therefore, the indigenous batik makers established batik cooperatives sporadically in many regions to cope with this unfair system as shown in **Table 4.7**. On April 21st, 1939 a number of batik cooperatives held a meeting in Surakarta proposing power unification under a Batik Bond organisation and succeeded in purchasing cambic and batik materials from the importers directly without intervention from Chinese middlemen (GKBI, 1969).

Table 4.7 List of GKBI members, 1930s-1940s

No.	Name of Cooperative	Place	Establishment Date
1.	Persatuan Pengusaha Batik Bumi Putera (PPBBP)	Yogyakarta	Mid-June 1934
2.	Persatuan Perusahaan Batik Bumiputera Surakarta (PPBBS)	Surakarta	1935
3.	Koperasi Batik Trusmi	Cirebon	1935
4.	Koperasi Perusahaan Batik Setono	Pekalongan	May 15 th , 1935
5.	Persatuan Perusahaan Batik Indonesia (PPBI)	Yogyakarta	1937
6.	Persatuan Pembatikan Tulungagung (PERBATA)	Tulungagung	1937
7.	Koperasi Persatuan Perusahaan Batik Pekadangan	Pekalongan	May 27 th , 1937
8.	Koperasi Batik Timur Asli Republik Indonesia (BATARI)	Surakarta	1939
9.	Koperasi Mitra Batik	Tasikmalaya	April 28 th , 1941
10.	Cooperatie Persatuan Batik Bumiputera (CPBB)	Ciamis	July 7 th , 1941
11.	Cooperatie Batik Asli Kesenian Timur Indonesia (BAKTI)	Ponorogo	July 17 th , 1947
12.	Persatuan Batik Indonesia (PERBAIN)	Purwokerto	November 7 th , 1949

Source: Modified from GKBI (2009, p. 50)

Regardless of transitional share in trade competition between foreign importers, the domestic manufacturing industry continued to grow. Based on industrial census by the colonial government in 1940, there were 5,469 firms employing 288,941 workers across the country. The census only covered medium and large manufacturing industries in the Dutch East Indies territory so that it was not comparable to the manufacturing performance in 1921. The following **Table 4.8** displays the census results where the textile industry provided 50,168 employments (17.4%) and performed the second largest contribution to the entire manufacturing industry after the tobacco and cigarettes industry. Almost all textile firms (96.7%) were located in Java Island and had an average labour utilisation of 210 workers per firm.

Table 4.8 The number of medium and large manufacturing firms and labour force based on the 1940 Industrial Census

No.	Type of Manufacturing Industry	Firm			Labour
		Java	Outer Java	Total	
1.	Food and beverages	1,179	768	1,947	48,073
2.	Tobacco and cigarettes	115	2	117	53,547
3.	Cooking oils, butter, etc.	824	254	1,078	21,850
4.	Chemical goods	61	11	72	6,038
5.	Rubber goods	10	4	14	3,371
6.	Woods and sawmills	81	70	151	7,083
7.	Printings and bindery	251	59	310	15,842
8.	Tannery	23	2	25	1,583

Continued in the next page

Table 4.8 continued

No.	Type of Manufacturing Industry	Firm			Labour
		Java	Outer Java	Total	
9.	Textile	231	8	239	50,168
10.	Footwear	24	1	25	7,624
11.	Gas and electricity	518	212	730	11,232
12.	Earthenware goods	100	23	123	12,371
13.	Metal goods	34	12	46	3,710
14.	Workshops and dockyard	476	116	592	46,449
Total		3,927	1,542	5,469	288,941

Source: Modified from Sitsen (1943) in Siahaan (2000a, p. 88)

Reclassification and measurement of the census data by Segers (1987, in Siahaan, 2000a) found that the manufacturing industry created 177,293 jobs. He used different approaches in measuring manufacturing industry coverage by omitting gas and electricity and workshops and dockyard sectors. In the case of the textile industry there were 40,962 jobs (22%) ranked as the top second share of labour consumption in the manufacturing industry. Within the industry batik production created 4,049 jobs (9.9%) as shown in **Table 4.9**.

Table 4.9 The number of medium and large manufacturing industry labour force based on sex and nationality, 1940

No.	Type of Manufacturing Industry	Sex		Nationality			Total
		Male	Female	Domestic	Europe	Chinese	
1.	Food, beverages, and tobacco	65,037	34,042	93,109	585	5,385	99,079
2.	Textile, clothing, and leather	5,035	35,927	39,626	175	1,161	40,962
	Batik	N/A	N/A	3,987	0	62	4,049
	<i>Bags</i>	<i>N/A</i>	<i>N/A</i>	<i>2,783</i>	<i>19</i>	<i>0</i>	<i>2,802</i>
	<i>Kapok</i>	<i>N/A</i>	<i>N/A</i>	<i>27,232</i>	<i>46</i>	<i>601</i>	<i>27,879</i>
	<i>Clothing</i>	<i>N/A</i>	<i>N/A</i>	<i>1,865</i>	<i>20</i>	<i>142</i>	<i>2,027</i>
	<i>Tannery</i>	<i>N/A</i>	<i>N/A</i>	<i>1,171</i>	<i>20</i>	<i>102</i>	<i>1,293</i>
	<i>Footwear</i>	<i>N/A</i>	<i>N/A</i>	<i>2,204</i>	<i>61</i>	<i>254</i>	<i>2,519</i>
	<i>Others</i>	<i>N/A</i>	<i>N/A</i>	<i>384</i>	<i>9</i>	<i>0</i>	<i>393</i>
3.	Woods and wood products	6,987	96	5,932	136	1,015	7,083
4.	Chemical and rubber goods	4,130	2,968	6,661	57	380	7,098
5.	Non-metal mining goods	7,654	982	8,157	231	248	8,636
6.	Metal goods, machinery and equipment	13,785	650	10,594	1,772	2,071	14,435
Total		102,628	74,665	164,079	2,956	10,260	177,293

Source: Modified from Segers (1987) in Siahaan (2000a, pp. 95-96)

During the Japanese colonisation era (1942-1945), the condition of the batik industry deteriorated. The long-lasting trade links to European and Asian countries suspended drastically responding to Japanese power supremacy building in its colonies in East Asia. The sudden decrease of imported cotton fabrics made local batik makers slow down production levels and market penetration. Cotton fabrics supply was limited and heavily relied on Japanese ruling authority control which mobilised the colonies' resources for strengthening military power. In addition, the bitter Japanese colonisation era also created massive labour force shortages due to the forced labour policy to undertake various construction projects for Japanese military needs. By November 1944 no less than 2.6 million Javanese out of a total around 25 million labour forces nationwide were abruptly forced to work on these projects (Dick, 2002; Vickers, 2005). On the other hand, the batik cooperatives were dysfunctional to provide batik materials supply. Many of them were closed down, leaving the batik makers to survive individually during this time of hardship (GKBI, 2009). As a consequence of combined raw materials and labour force shortages, the batik makers turned to the finest lengthy handwritten batik production with limited products in order to keep the business running and the batik workers surviving. Therefore, the *pagi-sore* batik motif was produced to serve day-and-evening clothing purpose (Doellah, 2002; GKBI, 2009).

To conclude, the periods of Dutch and Japanese colonisation backwards witnessed the transformation of the batik industry from a spare-time leisure activity to a household income generation source, from a traditional to a modern mass production, from the use of natural to artificial raw materials, and from a local self-sufficiency to an import dependency pattern. Beyond all those things the struggle of indigenous batik makers against foreign supremacy in the batik industry was escalating all the time. Getting better access to cotton fabrics and other batik materials has been a political agenda of some prominent batik entrepreneurs to promote domestic batik industry independence. The creation of batik cooperatives and Batik Bond has been a milestone to further batik industry development. Unfortunately, there has been little evidence showing the batik industry performance. Most references available explained textile industry performance instead of a specific batik industry during the Dutch colonisation period. In contrast, there was a lack of attention from indigenous batik makers and organisations to record their business carefully. According to GKBI (2009), there were thousands of batik makers during the period of 1930s-1940s, increased from 840 firms in 1921 (see **Table 4.5**). Only a few were large manufacturing firms while the majority were a small scale industry with less than twenty batik workers. So it could be envisaged that there were more than 20,000 batik workers engaged actively in the industry. However, there was no quantitative data to depict the production capacity and value of batik industry. Archaeological manuscripts and field observations in the past could not uncover much about its performance unless social, economic, and political conditions underlying the presence of the batik industry. Therefore, the actual economic importance of the batik industry during this period remained unmeasurable, but its effects were identifiable from living oral testimonies.

“The famous successful batik merchant lived here in Kampung Laweyan, namely Mr. Tjokrosoemarto. He was a prominent batik exporter who pioneered batik trading to Europe in the 1800s. He possessed a huge fancy house which had been renovated several times since 1915.”

Source: Widhiarso (personal communication, December 23, 2011)

“Mr. Tjokrosoemarto probably was the king of the past batik industry. To show his fortune, it could be observed from his possession of many land certificates. He owned no less than 800 land certificates around Surakarta and many other places ... He exported batik cloths from Indonesia through Cirebon port on the northwest coast of Java.”

Source: Priyatmono (personal communication, December 22, 2011)

“I could only observe (the glory of the local batik entrepreneurs in the past) from the housing property artefacts. The oldest house found there (in Kampung Kauman) was built in 1828, meaning that by the early 1800s a juragan batik (a large batik master) had lived around as portrayed by the old houses which were owned by Mr. Abdul Kamid, Mr. Abu Ngamar, and Mr. Khotib Anom II ... The glory of Kampung Kauman was actually not resulted from the contribution of abdi dalem’s (the royal servant of Keraton Solo palace) routine salary but the local batik industry expansion.”

Source: Musyawaroh (personal communication, March 14, 2012)

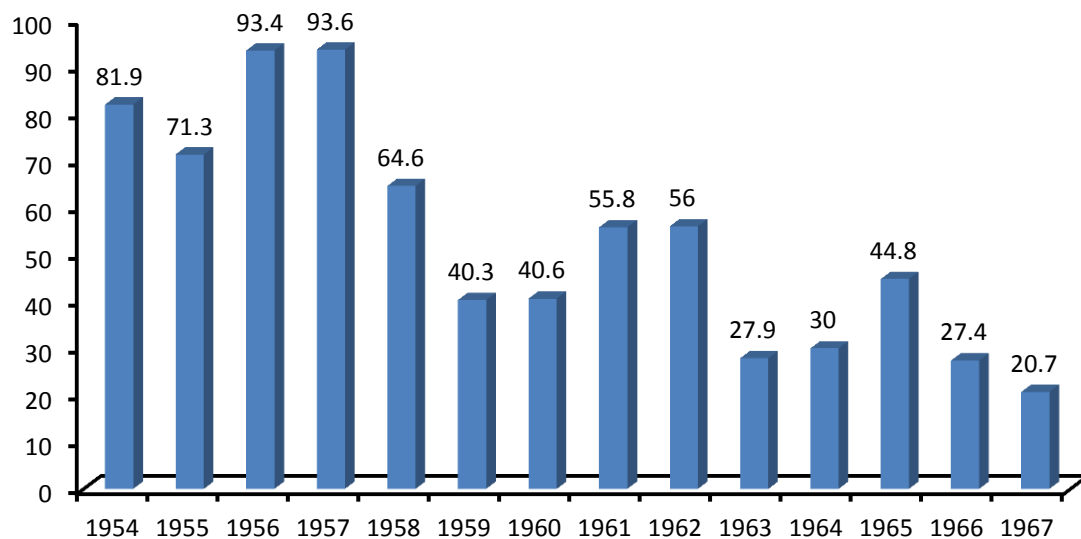
4.5 Building Nationalism on Batik Industry Development after Independence Day, 1950-1966 AD

After Indonesia’s Independence on August 17th, 1945, the nation started a new horizon of independent development. The central government under Soekarno’s Old Order regime (1945-1966) launched anti-imperialism politics by stressing self-sufficiency movements and taking over the ex-multinational corporations into state-owned enterprises. However, until the early 1950s no government policies run effectively in stabilising the national economy due to military and political upheavals squeezing the newly-born country’s unity. The first five years of independence witnessed a series of Dutch aggressions hitting the country looking for the rebuilding of the Dutch East Indies colony, and separatist movements from parts of the country. Despite economic stability, the country was struggling for peaceful security and political integration. After the hardships of foreign political diplomacy that produced Ethical Policy for both parties, the central government established a number of bureaucratic system restorations and economic development policies. For the first decade of the 1950s ministerial cabinets changed several times, creating unstable government structure to promote sound national development. Finally, President Soekarno called for the 1945 Constitution restoration through Presidential Decree on July 5th, 1959 in order to strengthen the sovereignty of a unified nation and to stabilise socio-political order from political factions within the government bureaucracy (Dick, 2002).

In line with central government politics for nation building, a socialism approach featured the foundations of development policies. The prominent *Program Benteng* (Fortress Program) launched from 1950 until 1957 aimed at enhancing the import share by Indonesians, and was one of important policies to protect domestic industry interests. The policy privileged (a small number of) national importers to import a limited range of consumer goods replacing the role of foreign traders particularly Dutch and ethnic Chinese businessmen, a policy feature of so-called economic nationalism (Dick, 2002; Lindblad, 2010; Wie, 2010). Under the policy some national firms and state-owned enterprises had monopolistic trade over certain consumer goods including cotton fabrics. In doing so, the

participating role of cooperatives chiefly focused on rural and small-and-medium enterprises development and was more encouraged than private firms. Batik Bond was reactivated and turned into *Gabungan Koperasi Batik Indonesia* (GKBI) or Indonesian Batik Cooperatives Union on September 18th, 1948. It was a unification of four primary cooperatives, i.e. *Persatuan Perusahaan Batik Indonesia* (PPBI) or Indonesian Batik Firms Union, *Persatuan Perusahaan Batik Bumiputera Surakarta* (PPBBS) or Indigenous Batik Firms Union of Surakarta, *Batik Asli Kesenian Timur Indonesia* (BAKTI) or Authentic Eastern Batik Arts of Indonesia, and *Batik Tulungagung* (BTA, set in 1952) to compete against ethnic Chinese domination over national batik trading. Since September 1953 GKBI was given licensed trading monopoly by the Ministry of Economics for cotton fabrics import and distribution to batik firms (see **Figure 4.16** and **Figure 4.17**). In 1954 the GKBI membership increased to twenty primary cooperatives consisting of 4,160 batik entrepreneurs. In addition to supplying cambric for its members, GKBI also served for 1,179 non-members. GKBI was commissioned to overcome raw materials shortages due to former Japanese colonisation and unstable national security and political conditions (GKBI, 1969, 2009).

Figure 4.16 Volume of cambric distribution by GKBI, 1954-1967 (million yards)

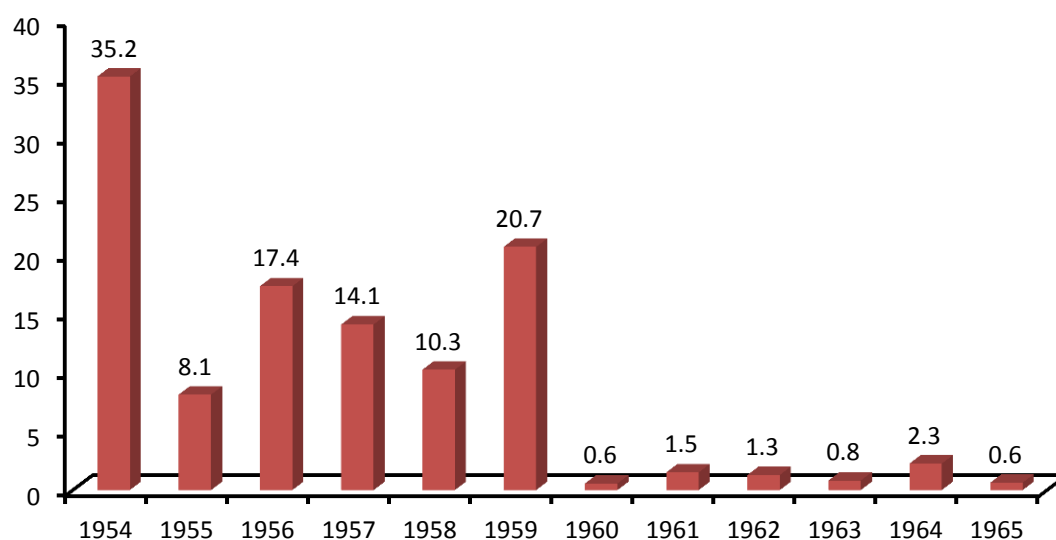


Source: Modified from GKBI (1969, p. 145)

Despite strong dependence on an exclusive trading license, the role of GKBI in the domestic batik industry became more influential, marked by the establishment of cambric factory MEDARI in 1960. It was located in Sleman of Yogyakarta Province and fully financed by the collective voluntary charity of GKBI members. This effort was not only to substitute imported cloth, but also to increase the quantity of cheaper fabrics that could not be supplied by the existing textile industry. In fact, it was still insufficient to overcome the high dependency on imported cloth. In **Table 4.10** we can observe the comparison between domestic textile industry production capacity of and imported cloth levels. By comparing total supply of cloth with volume of cambric distribution by GKBI in **Figure 4.16**, it can be roughly estimated that the level of cloth consumption by the batik industry was relatively low and decreased from 5.8% (1964) to 2.48% (1967). However, the declining role of GKBI in the cloth distribution monopoly did not indicate a batik industry downturn. It continued to grow at low-to-stagnated levels because of political and economic instability during this period of

time. Unfortunately, there were no data available to show its performance. The central government's intention to promote an import substitution policy which concentrated more on the development of upstream industries such as agro-processing, metal and machinery, and chemical industries (Siahaan, 2000a) has caused the development of the small scale industry to be somewhat neglected, including the batik industry. Therefore, its performance can only be traced from living testimonies and historical artefacts.

Figure 4.17 Value of cambric distribution by GKBI, 1954-1967 (million US\$)



Source: Modified from GKBI (1969, p. 145)

Table 4.10 Domestic textile industry supply and imported cloth levels, 1964-1968

Year	Domestic Textile Supply (million meters)	Imported Cloth (million meters)	Total Supply (million meters)	Population Number (million lives)	Consumption Per Capita (meter)
1964	233.6	237.6	474.2	103.3	4.6
1965	456.0	313.4	769.4	105.4	7.3
1966	250.0	481.7	731.7	107.6	6.8
1967	225.0	523.0	748.0	110.0	6.8
1968	316.0	447.7	764.2	112.4	6.8

Source: Direktorat Jenderal Industri (1976) in Siahaan (2000b, p. 334)

The growing independence of GKBI by the late 1950s in fact raised anxiety from a number of high ranking bureaucrats, particularly from the Minister of *Jawatan Transmigrasi dan Koperasi* (the Ministry of Transmigration and Cooperatives) Mr. Achadi, accused for its private capital accumulation tendency, which was considered unsuitable to government socialism politics (GKBI, 2009). Such circumstances actually resulted from increasing political tensions between factions in bureaucratic system seeking for power control of the country. The emerging Communist Party bloc supported President Soekarno's authoritative regime of *Demokrasi Terpimpin* (Guided Democracy) and *Ekonomi Terpimpin* (Guided Economy) after the endorsement of a Presidential Decree in 1959 infiltrated various

government bodies and social and economic organisations to attack its opponents. Not surprisingly, the government apparatus and policies were often overridden by political factions to achieve their objectives. As a result, the independence of indigenous-organised GKBI was forcefully undermined, and its trading license privilege therefore was taken away by early 1963 and handed over to state-owned enterprise *Perusahaan Dalam Negeri* (PDN) or Domestic Corporation. The Indonesian Communist Party, which maintained its political axis to China, benefited the most from such political-economy instability to regain its powerful influence, including the ethnic Chinese entrepreneurs who were already dominating the national economy (Dick, 2002; Brown, 2003; GKBI, 2009).

Beyond the inconsistent stance of central government to encourage the national batik industry independence, there were sustained tensions between indigenous and foreign batik makers, particularly concerning the ethnic Chinese community. Some of these foreigners have settled down and converted to Indonesian citizens to run batik businesses over generations while the rest continued to keep their original citizenship. Although they were able to assimilate into the local Indonesian neighbourhood, they maintained primordial ties with their motherlands as exemplified by the presence of *kampung pecinan* settlements (Chinatown) and Arab *kampung kauman* settlements in many cities. Batik entrepreneurs from both Chinese and Arabic ethnic groups were the most aggressive parties in the national batik industry among other foreign groups. Interestingly, the indigenous batik community accepted their involvement in the batik industry differently. While the Arab descendant batik community could integrate business and social relationships with the indigenous people, their Chinese comrades were facing uncomfortable resistance from the indigenous people. While the Arabic *kampung kauman* enjoyed harmonious life with surrounding local settlements, the *kampung pecinan* had to survive with distant closure. One of the plausible reasons for such differences was that the Arab ethnic group permeated collectivism of social groups, which fitted the traditional Indonesian communalism nature of society. In contrast, according to Brown (2003), the Chinese ethnic group tended to represent themselves as individuals rather than a collective group, so that internal frictions continued to persist, creating suspicion and distrust from external parties.

The Dutch colonisation period and Old Order regime showed clearly the ambiguity of the ethnic Chinese group in supporting the struggle of indigenous people to achieve independence. During the Dutch colonisation era this group along with other Asian and Middle East traders were privileged the second social class below the top ranking European community and above the indigenous people. They also enjoyed predetermined trading licenses on various consumer goods at both national and international levels. The Chinese group was also assigned by the colonial government to conduct certain tasks to repress the indigenous people such as being local police/military officers and tax collectors (Lombard, 2008a). Having the legacy of trading licenses, the ethnic Chinese business group turned to rousing the national economy, including controlling textile industry and raw materials supply required by the batik industry. The fight by the indigenous people against Chinese group domination actually took place several times. For example, Mr. K.H. Samanhoedi, a famous batik entrepreneur in Surakarta, along with a nationalist journalist Mr. Tirto Adhi Soerjo mobilised a number of indigenous entrepreneurs, particularly batik entrepreneurs, to build a Moslem-based organisation called *Serikat Dagang Islam* or Islamic Trade Union (SDI) in 1905. The organisation was aimed at promoting shared awareness and cooperation from indigenous entrepreneurs to compete with ethnic Chinese hegemony. In 1912 under the

leadership of Mr. H.O.S. Tjokroaminoto SDI changed its name to *Serikat Islam* or Islamic Union (SI) to reinforce its political movement in challenging social injustice (Vickers, 2005).

During the Old Order regime the ethnic Chinese business group supremacy could not have been taken over by the local Indonesians. Instead of promoting their independence, the Fortress Program was likely to provide alternative access to their Chinese rival to sustain its dominance. In the case of building the national batik industry's independence, the trading license given to GKBI in controlling cotton cloth and raw materials (chemical dyes and waxes) trade was ineffective. In reality, only a small number of large indigenous batik firms could utilise the given quota to increase their production capacity. The remaining smaller majority surrendered to Ali-Baba relationships because of limited capital stock and technology. This latter group maintained business connections with the ethnic Chinese group in two ways, i.e. reselling the given cloth quota or performing as a puppet to access the imported cloth quota for the sake of ethnic Chinese business interests. The second type performers were known as briefcase importers (*importir aktentans*) who signed import licenses on behalf of mostly ethnic Chinese businessmen. The term Ali-Baba explained the position of indigenous entrepreneurs ("Ali") and their Chinese partners ("Baba") to maintain both parties business continuation (Dick, 2002). Not only in economic field had the ethnic Chinese group also regained an improved political bargaining position as a result of internal frictions among political factions in the government and parliament. It was Soekarno's anti-imperialism and socialism policies that to some extent brought back the ethnic Chinese supremacy into national economy and political landscape. The Indonesian Communist Party played a significant role in redirecting government politics to support communist bloc to China vis-à-vis Western capitalist bloc. In addition, the government realised that the Dutch trading system legacy could not be dismantled entirely out of the hands of the ethnic Chinese business group. Dealing with such complex political economy situations, government pragmatism led to troublesome inconsistencies that caused deteriorating political instability and economic downturn (Dick, 2002; Vickers, 2005).

Another government intervention in the batik industry development was the revitalisation of *Institut Teknologi Tekstil* (ITT) or Textile Technology Institute. Formerly, ITT was known as TIB and maintained its role as a research and education institution. It was renamed several times to *Akademi Tekstil* (AKATEX) or Textile Academy in 1954, *Perguruan Tinggi Ilmu Tekstil* (PTIT) or Textile Science Advanced School in 1964, and lastly *Institut Teknologi Tekstil* in 1966 as an integrated institution serving for education, research and development in the textile manufacturing industry (Van der Eng, 2007; STTT, 2013). The government also revitalised *Balai Penyelidikan Batik* (Batik Investigation House) in 1951 and renamed it *Balai Penelitian Batik* (Batik Research House) in 1960. In 1968 its function was expanded to include crafting industry and renamed to *Balai Penelitian Batik dan Kerajinan* (BPBK) or Centre for Batik and Handicraft Research and Quality Assurance Facility (Jusri & Idris, 2011; BPKIMI, 2012; BBKB, 2013).

Besides government-driven institutional building, the Old Order period also marked some advances in the national batik industry. Until the 1950s the batik industry continued to grow resulting from an increased domestic market. The prolonged shortage of cotton fabric supply since the 1930s had encouraged the intensification of the batik industry in the sense that batik producers focused on more intricate batik design and traditional sarong cloths. As famous widely-used daily clothing, it also attracted textile producers in the Netherlands so that they also exported to Indonesia a relatively small share of printed batik sarongs at 5%

compared to bleached textiles for the batik industry at 31% based on the latest 1930s statistics (Van der Eng, 2007). The demand for sarong cloths was not only popular for indigenous people but also Indo-European and wealthy ethnic Chinese families in Indonesia, thanks to Dutch-styled batik makers who brought in a new Western fashion style. The introduction of manual printing batik (*batik sablon*) technology in 1950s, particularly in the north coast of Java, indicated the increased batik market. Along with imported printed sarongs the domestic printed batik products overwhelmed the market which could not be fulfilled by the traditional handwritten batik producers. Batik Indonesia motif was also introduced in the early 1950s by the prominent Indo-Chinese batik master from Surakarta city of Central Java Province Mr. Go Tik Swan Hardjonagoro. He was assigned by President Soekarno himself to create a unique batik motif to represent the spirit of unity in diversity for the new-born country Indonesia. It was the combination of traditional court and northern coast batik motifs with a rich decorative colour application (KRHT Hardjonagoro, 1999; Rustopo, 2008).

Since the late 1950s, however, the batik industry growth has stagnated due to intensified political friction within the government. Many prominent indigenous large batik entrepreneurs like Mr. K.H. Samanhoedi of Laweyan Surakarta were engaged in political movements. GKBI and many other social and economic institutions managed by the indigenous people were greatly manipulated as a political means by different conflicting interest groups to achieve their objectives. As a result, many batik resources were run out for non-economical purposes and many batik firms closed down thereafter. On the other hand, the worsening political tension and security instability near the end of the Old Order regime in the mid-1960s affected the decrease of the batik market and workers. The traditional batik market declined dramatically because of abandoned farmland cultivation. The farmers and peasant society were militarised by the Indonesian Communist Party to support the establishment of the Fifth Armed Force consisting of civilian blue-collar workers and farmers. The decrease of farmland cultivation corresponded with the batik market decrease because the harvesting period was traditionally associated with greater consumption in batik fabrics and clothing, on which farming households expended their income. Thus, political and security turmoil led the batik entrepreneurs and workers to neglect the core business.

4.6 Promoting the National Batik Industry in the Era of Trade Liberalism and Global Competition, 1967-1998 AD

Turning to Soeharto's New Order regime (1967-1998), the spirit of national sovereignty building continued in different ways. If the previous regime posed half-hearted treatment of ethnic Chinese business group, the central government supported their active engagement in the national economy, including batik industry development. The new treatment set under the Baba-Ali relationship pattern, where the indigenous government dictated and seized the economic power of Indo-Chinese businessmen in favour of a small elite group at top-level government structure. Crony capitalism and corrupted bureaucracy thus became a featured means to sustain government politics as well as economic growth. On the political side, the central government practised a military authoritarian regime to withstand top-down control of development. The number of political parties was reduced to only three major parties, public media was stringently censored, and the military elite group was placed to head state-

owned enterprises and strategic positions in all government structure from central to local levels. On the economic side, the central government returned the ownership of multinational corporations, welcomed foreign direct investment (FDI), accelerated strategic and manufacturing industries, and promoted food security through the Green Revolution program. Rural agriculture sectors and small-and-medium industries were developed through plentiful infrastructure projects, technical assistance and microfinance programs, and a parenting scheme of supervision. All those “modernised development” modes were packaged within continuous five-year development plans which carried out a balance of three development principles, i.e. stability (security and politics), growth (economics), and equity (social welfare) (Wie, 2002; Vickers, 2005).

A number of policies to further batik institutionalisation were inseparable from the building of national identity. In 1968 the Governor of Special Capital Province of Jakarta Mr. Ali Sadikin declared batik and *kebaya* clothing as national formal wear. In the next years batik clothing has become the official uniform for the country’s public agencies and many other organisations until now (Kardinata, 2009). The central government stipulated *Undang-undang* (Law) No. 1/1967 on Foreign Investment allowing foreign direct investment and multinational corporations to contribute in national economic development. Along with Law No. 1/1968 on Domestic Investment it encouraged accelerated industrialisation by opening the economy in order to pursue economic growth with certain protection and special treatment on domestic manufacturing industries and agricultural development. Due to these combined policies, the gross domestic investment share relative to the Gross Domestic Product (GDP) rose from 8% (1965) to 24% (1980) and 32% (1995). Import substitution strategy and broad spectrum industrialisation thus became the main agenda for reducing imported materials dependency before switching to export promotion strategy (Wie, 2002).

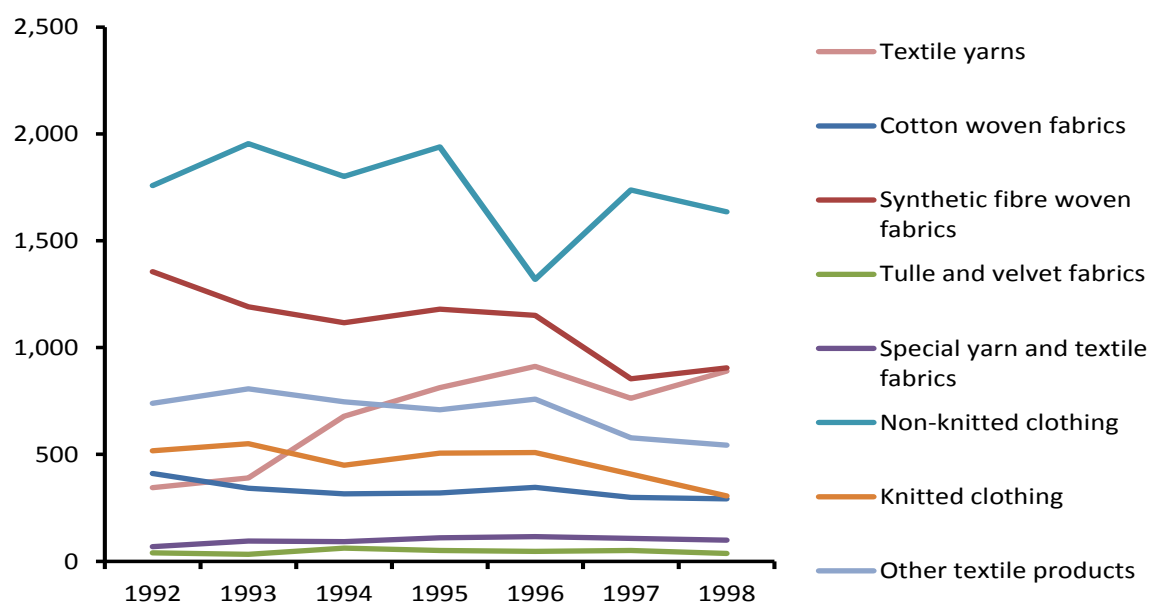
Regardless of the virtues and effects of these regulations to the overall economy, the opening of the domestic market however threatened the existence of GKBI, batik cooperatives and smaller batik firms. Indeed, during the New Order authority the independence and roles of GKBI in the cloth trade recovered, but not its exclusive monopoly right. To respond to the market change, GKBI built a joint venture textile factory with a Japanese firm in Batang Regency of the north coast of Central Java Province on July 12th, 1970 called PT. Primatexco Indonesia. In 1972 GKBI cooperated with central government to build another textile factory PT. Primissima in Medari Village of Sleman Regency (Yogyakarta Special Province), funded by a grant from the Dutch government. These efforts were accomplished in order to achieve self-sufficiency in cloth supply (GKBI, 2009). As the roles of GKBI repositioned, the government continued to support BPBK as the centre of information, training and quality examination for the batik and craft industry. It was renamed several times to *Balai Batik* (Batik House), *Balai Besar Penelitian dan Pengembangan Industri Kerajinan dan Batik* (BBPPIKB) or Centre for Handicraft and Batik Industry Research and Development in 1980, and recently *Balai Besar Kerajinan dan Batik* (BBKB) or Centre for Handicraft and Batik Research and Development Facility in 2002 (Jusri & Idris, 2011; BPKIMI, 2012; BBKB, 2013). In **Table 4.11** we can see that the production capacity of the domestic textile industry was increasing, and by the 1980s it had achieved self-sufficiency in cloth supply. Since then various textile products were exported even though the raw materials still relied on imports (see **Figure 4.18**).

Table 4.11 Production capacity of domestic textile industry, 1985-1997

No.	Type of Commodities	Unit	1985	1990	1995	1997
1.	Textile cloth	Million meters	2,499	5,802	8,177	9,183
		Million tons	336	682	1,105	1,241
	Woven fabrics	Million meters	2,128	4,320	6,946	7,799
		Million tons	285	581	939	1,054
	Knitted fabrics	Million meters	37	762	1,228	1,384
		Million tons	50	102	166	187
2.	Clothing	Million meters	27	59	2,975	3,404
		Million tons	95	205	402	460

Source: Siahaan (2000b, p. 364)

Figure 4.18 Export value of domestic textile industry, 1985-1997 (million USD)



Source: Siahaan (2000b, p. 370)

Accordingly, batik industry flourished rapidly in response to the growing domestic market resulting from government uniform demands in particular. The decades of 1970s marked the return of ethnic Chinese batik firms to the batik industry. They could run business along with indigenous firms without fear although their activities remained under surveillance, mainly because of the 1965 G30S/PKI military coup d'état. Some large Indo-Chinese batik firms in the Java mainland such as Batik Keris, Batik Semar, and Batik Kresno (Surakarta) and those in the north coast like Batik Maranatha (Lasem of Rembang), Oey Soe Tjoen, The Tie Siet, Oey Soen King, Liem Siok Hien, Oey Kok Sing (Pekalongan) grew to become prominent batik producers. Even their products fulfilled export markets too like Batik Maranatha and Oey Soe Tjoen. Possessing a large capital, this ethnic Chinese business group could have introduced machine-based printing technology to accelerate mass batik production. As a result, the cumulative batik production output increased, but ironically it reduced the share of traditional batik producers. The use of machinery in the batik industry during the 1970s

had marginalised smaller batik firms – almost all of them were indigenous batik makers – which still relied on handmade batik production. The latter group suffered from the modernisation of the batik industry due to limited capital investment and labour intensive dependency, so that this group was uncompetitive against the larger firms in producing cheaper batik products. In contrast, a small number of large traditional batik firms (Batik Maranatha) could have persisted with handwritten batik making while their fellows (Batik Keris, Batik Semar, and Batik Kresno) adopted machine-based printing technology. The surviving group was able to maintain the lengthy expensive batik production since they had created a distinguished market segment of their exclusive products through prolonged business networks. However, such market segmentation to serve middle-upper class was not always useful to support business continuation. In the case of Oey Soe Tjoen, according to Kardinata (2009), his firm, which focused on handwritten batik making, encountered market shrinkage due to the increased imitation products with much lower prices cutting his market segment.

Rapid industrialisation growth experienced by the Indonesian economy since the 1970s has created a dilemma for batik industry development. Adopting modernised technology was successful in achieving cloth supply self-sufficiency, and therefore increased total output and productivity of downstream industries including batik making. However, the government's incentive policies in fact favoured large manufacturing enterprises more than smaller and traditional firms. Those who were holding greater capital and market access had better opportunities to increase batik production. They could respond better to overcome both government demand on batik uniform and domestic cloth oversupply by producing cheaper batik fabrics and clothing. On the contrary, the options available for their smaller counterparts were reducing production capacity, downgrading product quality, turning to cloth and batik traders, or closing down the business and switching to another employment. Actually, such circumstances have existed since the domestic batik industry experienced raw materials scarcity during the Japanese colonisation era. Some traditional batik makers had foreseen the less potential future of the industry and undertook secondary businesses or invested in higher education for their children. Some large batik entrepreneurs invested in the trading industry, properties, (informal) money lending, transportation, agribusiness, and many other businesses, which were away from the core business. It was only a small number who invested in related industries as exemplified by Batik Danar Hadi owner, Mr. Santosa Doellah. He was the indigenous batik maker who built his own textile factory and supervised traditional batik workers in villages. In contrast, some ethnic Chinese traditional batik makers had done the same by focusing on the skill upgrading of their batik workers and the smaller batik entrepreneurs as exemplified by Messrs Naomi Susilowati Setiono of Batik Maranatha (Lasem) and Mr. Go Tik Swan Hardjonagoro (Surakarta).

In the case of higher education investment to the next batik generation, many large batik entrepreneurs encountered the lost generation problem. For example, Batik Tjokrosoemarto firm of Laweyan (Surakarta), formerly known as a famous batik exporter until the Independence of 1945, none of his descendants continued the batik family business but turned to the local hotel and restaurant industry in Surakarta. A similar problem is currently being faced by the old Indo-Chinese batik entrepreneur Mr. Sigit Witjaksana, the owner of the traditional handwritten medium scale batik enterprise Batik Sekar Kencana in Lasem (Rembang). His children are not interested in continuing his business at all, and have chosen to undertake other employment. He is facing the bitter future of the soon-to-be family business discontinuation with a smile by running batik production with fewer loyal workers.

“... I am old (83 years) and now surrender to God’s destiny. Dealing with my children’s reluctance to continue the business, so I decided to continue by upholding Javanese life principle, i.e. ‘wong mbelah nggawa damar, Gusti Allah ora samar’ [meaning that any human effort will bring about its fortune in return]”

Source: Witjaksana (personal communication, April 20, 2012)

During the two decades of 1980s-1990s printed batik products or textiles with batik motifs flooded the domestic market. When many traditional batik firms closed down everywhere, printed batik textile producers and batik makers were dominating. They enjoyed a steady growth and could expand business networks, indicated by the spread of batik outlets in several large cities like Jakarta, Surabaya, Bandung, and Semarang. Interestingly, traditional batik makers in Pekalongan were able to cope with the negative impact of adopting printing technology. They introduced a new dyeing technique called *coletan* by using a manual paint brush to apply desired colours on fabric. This method could cut the conventional multiple colouring processes and hence reduce the use of dyeing materials. Furthermore, they also combined various batik techniques to reduce the cost of production instead of either relying on traditional batik making or surrendering to printing technology invasion.

All those conditions demonstrated clearly how the open market competition resulting from government policies during the New Order era were not successful in coping with the problems of the batik industry development. Started from overcoming cloth supply scarcity, these policies favoured printed batik industry groups with the costs of traditional ones. Nevertheless, the rapid growth of the printed batik industry actually indicated the growing batik market. Without the support from this industry, batik fabrics and clothing would take longer to reach the lower income class and distant areas at affordable prices. Therefore, the government policies to some extent were successful in promoting batik as a national identity.

4.7 Recent Developments in Batik Industry, early 2000 AD to the present

Approaching the 21st century, the national economy was suddenly hit by disastrous twin crises, i.e. the 1997 Asian Financial Crisis (AFC) and the fall of Soeharto’s New Order regime on May 21st, 1998. The AFC contagious effects firstly forced down the currency exchange rate of Indonesian Rupiah (IDR) to the U.S. Dollar (USD) from Rp 2,500 to Rp 17,500 per dollar, the banking system collapsed as did the large manufacturing industry, the inflation rate soared to 70%, the prices of food and other basic needs increasingly fluctuated, and finally riots and looting occurred in many places. To make things worse, the International Monetary Fund (IMF) came to rescue the economic recovery by coercing more liberalised strategies to withdraw the state control over the market. As a result, shortly after the agreement with the IMF was signed, the combined political instability in parliament, massive demonstrations on the streets, and heightened public distrust forced President Soeharto to lose his legitimacy by surrendering his throne to Vice President Prof. Dr.-Ing B.J. Habibie. This new president then prepared a remarkable transition period of the political and government system from centralised military authoritarian to a democratic decentralised system. By 1999 a free and

fair election was undertaken successfully, creating a new democratic Reform regime under President Abdurrahman Wahid (Hill & Shiraishi, 2007; Basri, 2013).

However, such dramatic political change did not automatically lead to economic recovery. It took six years to stabilise the national economy, slower than neighbouring countries like Thailand and Malaysia. The economic crisis did not only reveal the fragility of national financial institutions but also the failure of crony capitalism, which had all contributed to the weakening of the industrial structure formation. When most large manufacturing industries went bankrupt, interestingly, most small-and-medium enterprises (SMEs) withstood the crisis. One simple reason was that the high reliance of SMEs to the domestic market had saved them from the negative impacts of the fluctuating exchange rate. Another reason was that the informal business linkages and family kinship underlying the SME businesses which created a catalyst to deal with the changing environment. Learning from the policy failures of the past which favoured the development of large manufacturing industries, the central government then promoted a cluster policy approach in 2002 in order to create better inter-industrial linkages. The Ministry of Industry and Trade prioritised 14 industrial branches, which were classified into four clusters, i.e. textile and textile products, footwear, electronics, and wood processing and pulp/paper industries. In 2005 the clusters were reclassified and increased to become ten clusters covering up to 32 industrial branches. They consisted of textile and textile products, footwear, electrical machineries, wood products, pulp and paper, food and beverages, fish processing, rubber processing, palm oil processing, and petrochemical. Strategies to create stronger industrial structure included the strengthening of inter-firm value chains, the improvement of production control and raw materials processing, and providing a foster parenting scheme of skills upgrading and market networking for SMEs (Media Industri dan Perdagangan, 2002; Media Industri, 2005; Ministry of Industry, 2008).

The prioritisation of the textile industry cluster is promising for a better batik industry development. Their prolonged association has carried out economic reciprocity as well as social transformations and political tensions as discussed in preceding sections. As a parent for the batik industry, the performance of the textile industry determines its growth. In the Indonesian economy it has become one of the prominent sectors, ranked in the top three on export-import statistics. **Table 4.12** shows how the export share was two-five times higher than that of imports even though it continued decreasing during 2007-2011. This resulted from an increasing amount of textile exports from USD 9.79 billion to USD 13.23 billion, compared to its imports from USD 1.19 billion to USD 6.73 billion during the same period.

Table 4.12 Twelve leading export-import shares of manufacturing products, 2007-2011 (%)

No.	Type of Manufacturing Industry	2007	2008	2009	2010	2011
1.	Coconut oils and crude palm oils	13.55	18.22	17.60	17.60	18.97
		0.07	0.07	0.09	0.10	0.09
2.	Textiles	12.80	11.44	12.59	11.43	10.83
		2.48	4.25	4.69	4.98	5.34
3.	Iron steel, machinery, and automotive	11.76	12.38	11.85	11.06	10.80
		42.63	43.49	43.76	42.74	41.61

Continued in the next page

Table 4.12 continued

No.	Type of Manufacturing Industry	2007	2008	2009	2010	2011
4.	Rubber processing	8.25	8.77	6.84	9.72	11.90
		<i>1.12</i>	<i>0.98</i>	<i>1.06</i>	<i>1.08</i>	<i>1.10</i>
5.	Electronics	9.12	8.69	10.76	9.44	7.80
		<i>8.33</i>	<i>14.65</i>	<i>14.50</i>	<i>14.02</i>	<i>12.78</i>
6.	Copper and lead processing	8.04	6.40	5.78	6.64	6.14
		<i>1.81</i>	<i>1.83</i>	<i>1.42</i>	<i>1.80</i>	<i>1.74</i>
7.	Chemical goods	5.97	4.32	4.31	4.67	5.01
		<i>14.78</i>	<i>11.50</i>	<i>11.18</i>	<i>11.31</i>	<i>12.22</i>
8.	Pulp and paper	5.81	5.90	5.82	5.82	4.72
		<i>3.52</i>	<i>2.74</i>	<i>2.60</i>	<i>2.70</i>	<i>2.59</i>
9.	Wood processing	5.85	4.75	4.69	4.37	3.66
		<i>0.59</i>	<i>0.42</i>	<i>0.37</i>	<i>0.36</i>	<i>0.38</i>
10.	Food and beverages	3.29	3.62	3.50	3.28	3.69
		<i>7.41</i>	<i>3.37</i>	<i>3.88</i>	<i>4.46</i>	<i>5.43</i>
11.	Electrical equipment	2.81	2.70	2.73	2.71	2.45
		<i>2.32</i>	<i>2.68</i>	<i>2.91</i>	<i>3.11</i>	<i>2.99</i>
12.	Leather, leather goods, and shoes/footwear	2.46	2.36	2.57	2.72	2.82
		<i>0.46</i>	<i>0.62</i>	<i>0.57</i>	<i>0.70</i>	<i>0.77</i>

Remark: the italic-written numbers show the import share

Source: Modified from Kementerian Perindustrian Republik Indonesia (2013b-c)

A detailed observation shows an increasing demand for overall imports in the textile industry since 2008. The major cause comes from a sharp decline of the supply of intermediate goods, particularly fabrics, required to generate downstream industries. **Table 4.13** demonstrates export-import ratio in textile industry where all fabrics subsectors have been decreasing which in turn caused the decline of downstream subsectors such as garments and batik.

Table 4.13 Export-import ratio of textile trade volume, 2007-2011

No.	Sub Group	2007	2008	2009	2010	2011
INPUT GOODS						
1.	Yarn	6.93	3.35	3.43	4.04	3.46
2.	Fibre	1.16	1.33	1.49	1.35	1.19
3.	Nylon tyre cord	1.58	1.32	1.22	0.94	0.71
INTERMEDIATE GOODS						
4.	Fabric	4.48	0.65	0.61	0.48	0.44
5.	Other textile goods	3.23	0.91	1.04	0.83	0.82
6.	Tulle fabric and other net	2.28	0.74	0.68	0.55	0.38

Continued in the next page

Table 4.13 continued

No.	Sub Group	2007	2008	2009	2010	2011
7.	Silk woven fabric	3.09	0.02	0.04	0.00	0.01
8.	Bundled woven fabric (<i>kain tenun ikat</i>)	3,985.81	0.26	0.12	0.04	1.83
FINAL GOODS						
9.	Garment	59.36	30.66	30.86	25.86	26.99
10.	Batik	31.89	28.48	26.26	32.34	25.43
11.	Gunny sack	90.16	1.98	0.50	0.67	12.60
12.	Bed linen, tablecloth, toilet paper, kitchen cloth	9.59	4.67	4.19	3.42	3.75
13.	Scarf, shawl, veil, and the likes	12.86	4.65	5.63	2.82	2.71
14.	Rug	4.61	1.72	2.17	1.62	1.77
15.	Handkerchief	1.34	0.07	0.11	0.06	0.56
TOTAL		8.21	2.59	2.72	2.23	1.97

Source: Modified from Kementerian Perindustrian Republik Indonesia (2013d-e)

If the cluster policy worked, it was supposed to increase batik industry performance. In fact, until the mid-2000s it was declining involving both printed and traditional batik producers. The scarcity of cloth supply recurred, but it was not caused by the deficiency of textile production. It was the cloth trade and distribution network that disrupted the cotton supply, where most domestic textile products were being exported under a cartel mechanism. Many small and medium batik firms were facing difficulties to access cheaper cloths as their availability and market prices were stirred by the domestic textile cartel. In the meantime, the role of GKBI to assure cloth supply distribution was less powerful because it served its members only, as did other batik cooperatives in many regions. As a result, parallel with the decline of domestic batik supply, imported printed batik products flooded the market, particularly from China and Malaysia.

Table 4.14 shows the performance of the national batik industry from 2006 to 2010. It refers to large and medium batik firms only because of several limitations in data availability. Firstly, the national account of industrial statistics covers registered firms in official publications of industrial affairs offices and bureaus of statistics. Unfortunately, the documents cannot reveal small and cottage industry performance as their business is generally unregistered, lacks good accounting records, locates at owner's home, and sometimes has no definite office and workshop. Such circumstances make it difficult for government officials to record and monitor their performance regularly. As a consequence of their performance negligence, their contribution to the broader economy is not recorded well. Secondly, prior to 2002 batik-specific nomenclature was unrecognised. Batik was classified in the textile industry. Likewise, current international classification of industrial activity on the list of International Standard of Industrial Classification (ISIC) does not mention batik and still places it in the textile industry group (see United Nations Statistics Division [UNSD], 2013). Another classification created by the World Customs Organization (WCO) for international trade commodity identification, namely Harmonized System (HS), introduced the batik nomenclature within the textile industry in 2002. The HS coding

actually started to take effect in 1988 and has not been implemented in all countries (see World Customs Organization [WCO], 2013). As for the Indonesian Ministry of Industry, it has been adopted recently by implementing the 2003/2007 HS coding list to monitor export-import performance of domestic industry. Thirdly, the integrated data pooling system which enables inter-governmental data exchange does not exist yet. Several public agencies may generate different data for similar subjects according to their specific interests. In the meantime, the data provided by bureaus of statistics at central and local levels sometimes lacks of consistency and reliability, creating a frustrating data discrepancy. Fourthly, most old data sources are unavailable. A good data collection began in the era of Dutch colonisation and disappeared during the nation's independence movement period onwards. Even though the data related to the batik industry is incomplete and limited to certain batik production areas, it may illustrate situations around its development, particularly regarding batik trade networks, transformative design and production, and participating stakeholders.

Table 4.14 The performance of the large and medium batik firms, 2006-2010

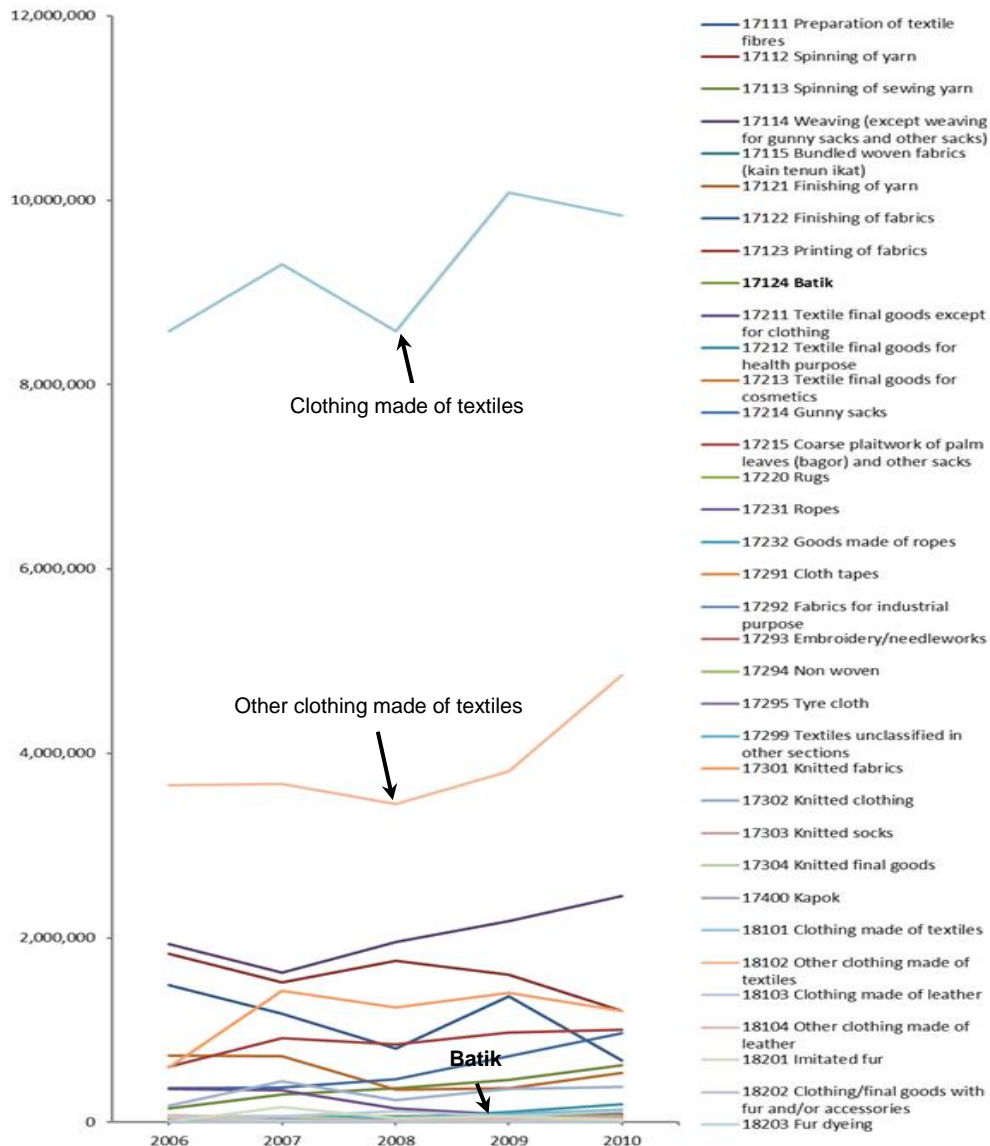
Indicator	2006	2007	2008	2009	2010	Average Growth (%)
Number of Firms (Unit)	298	308	235	339	326	2.35
Production Value (Rp. '000)	394,641,105	509,194,105	699,661,151	572,380,745	838,329,888	28.11
No. of Workforce (Person)	12,047	13,060	12,988	15,346	17,082	10.45
Utilisation Level (%)	80.6	79.8	80.4	76.6	78.5	-0.65
Input Value (Rp. '000)	331,677,469	398,975,840	623,176,664	422,808,755	565,156,118	17.60
Output Value (Rp. '000)	444,766,552	569,533,804	831,185,891	684,013,800	935,096,286	27.56
Value Added (Rp. '000)	113,089,083	170,557,964	208,009,227	261,205,045	369,940,168	56.78

Source: Kementerian Perindustrian Republik Indonesia (2013a)

During the period 2006-2010 the national batik industry has grown continuously regardless of the negative trend in the levels of utilisation. As the number of firms and employment size increased, the total added value increased as well probably because of the broader use of printing technology. Even though the performance of the batik industry seemed promising, the contribution to the domestic textile industry remained very low. In 2006 the output value of the batik industry reached USD 37,064 and increasingly doubled to USD 77,925 in 2010. However, the shared amount to the total output of textile industry was not significant where it constituted an amount of more than USD 12 million (2006) and nearly USD 15 million (2010). As can be seen in **Figure 4.19**, the comparable outputs of the batik industry placed on the lower position below the clothing textile industry. The share was also very low

even though it has increased from 0.30% to 0.52% during 2006-2010, compared to the clothing textile industry at 65-70% (see **Figure 4.20**).

Figure 4.19 Output value of large and medium textile industry, 2006-2010 (USD)

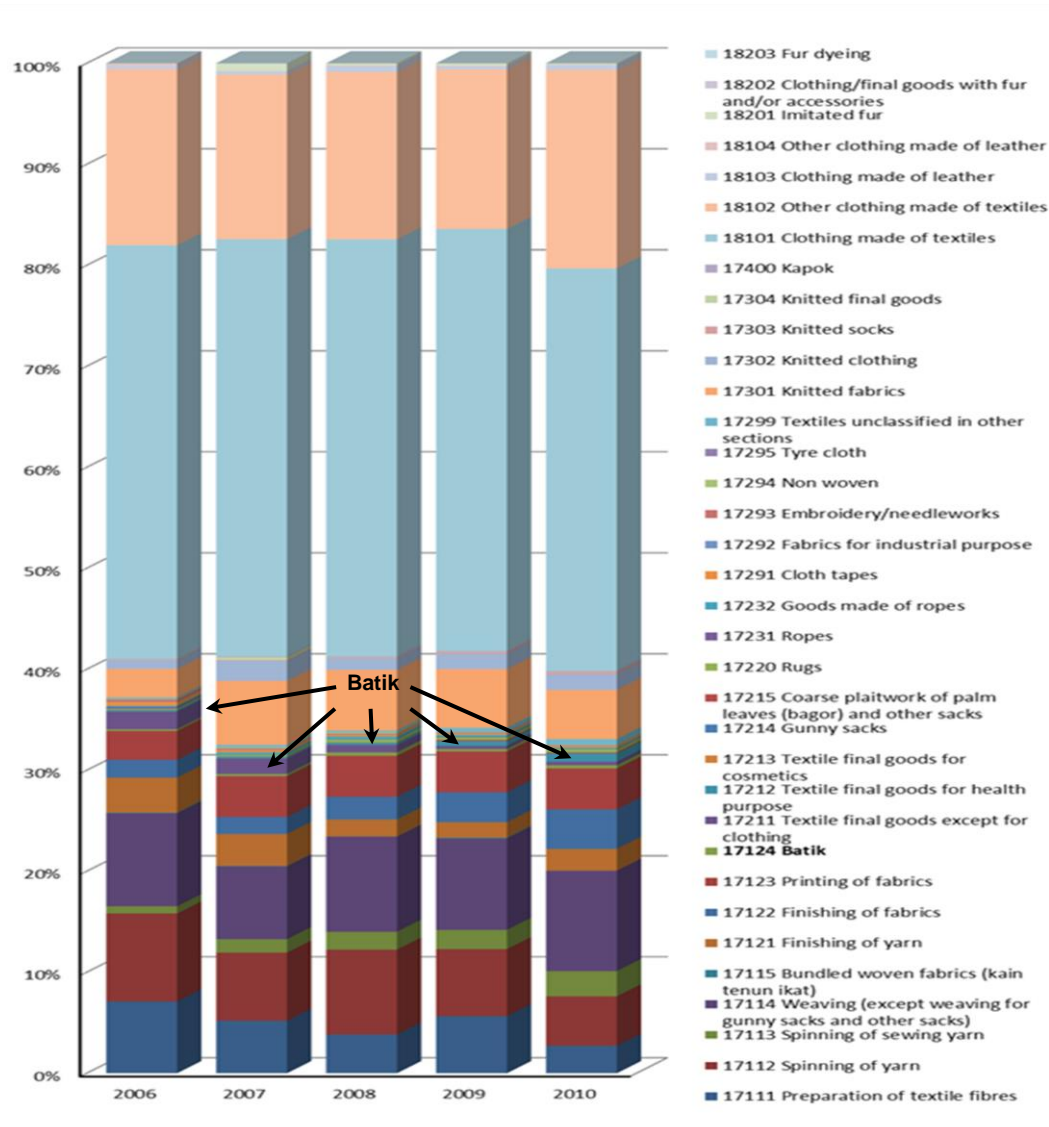


Source: Modified from Kementerian Perindustrian Republik Indonesia (2013a)

Responding to the increase of imported batik products, it triggered collective awareness from the government and batik communities to secure their domination of the domestic market by recalling the memory of the national batik identity. Many actions have been undertaken by the government, batik communities, and private firms to support the revival of the batik industry. In addition to various policies, the central government has facilitated batik preservation and education initiatives through the establishment of the Indonesian Batik Foundation on October 28th, 1994 (Yayasan Batik Indonesia, 2013) and Textile Museum in Jakarta by the Governor of Special Capital Province of Jakarta Mr. Ali Sadikin on June 28th, 1976 (Museum Tekstil Jakarta, 2012). There have also been local government initiatives through the opening of the National Batik Museum in Pekalongan by the ruling President

Susilo Bambang Yudhoyono on July 12th, 2006 (Pemerintah Kota Pekalongan, 2011) as well as privately owned batik museums such as Batik Museum in Yogyakarta built by the Mr. Hadi Nugroho family on May 12th, 1977 (Museum Batik, 2011) and Danar Hadi Batik Museum in Surakarta by Mr. Santosa Doellah on October 20th, 2000 (House of Danar Hadi, 2009). Some community-based organisations were also built to promote the local batik industry like Forum Pengembangan Kampung Batik Laweyan (Laweyan Batik Kampung Settlement Development Forum) in Surakarta on September 25th, 2004, for instance (Kampoeng Batik Laweyan, 2013). Such collectivism escalated from 2008 onwards in response to Malaysian claim on batik cultural heritage (“Malaysia klaim”, 2012). After a lengthy process of negotiation, finally Indonesian batik was internationally recognised as an intangible cultural heritage by UNESCO on October 2nd, 2009 in Abu Dhabi (United Nations Educational, Scientific and Cultural Organization [UNESCO], 2009) that rejected the claim. Since then the batik industry has been increasing until the present, marked by the establishment of new batik firms and local clusters, various exhibition events, and broadened batik education and training with formal schools and batik workshops.

Figure 4.20 Output share of large and medium textile industry, 2006-2010 (%)



Source: Modified from Kementerian Perindustrian Republik Indonesia (2013a)

4.8 The Developmental Path of National Batik Industry

For more than a millennium the batik industry growth in Indonesia has showed a somewhat erratic trajectory of development. Regardless of a general uprising growth trend, it revealed an unusual industrial modernisation which contradicted the common stages of development. If modernisation that brings up the advanced technology adoption would lead to a better industrial development, this theory seems fail to explain the batik industry phenomenon in Indonesia. Instead of promoting a rapid growth, the introduction of more advanced technology eroded the economic scale of the batik trading gradually. In **Figure 4.21** I illustrate a summarized development trajectory of the batik industry development. The correlation of two variables is contested, i.e. the level of commercialisation and the level of technology, explored from more qualitative than quantitative data. The data interpretation is categorised into three ranking groups: low (L), moderate (M), and high (H). The following **Table 4.15** provides a set of criteria I have used to evaluate the eventual points which represent a particular development level.

Table 4.15 A set of criteria for the assessment of batik industry development

No.	Ranking Group	Level of Commercialisation	Level of Technology
1.	LOW	Domestic market oriented, the output of production is mostly for individual use and royal clothing demand, imported raw materials and final goods are relatively high	The dominated use of traditional hand-held tools (<i>canting</i> and stamping tools)
2.	MODERATE	Domestic market oriented remains high with some export penetrations, the output of production is more to meet market demand, domestic supply for raw materials is attained with reduced imports including for final goods	The dominated use of manual tools (manual screen printing)
3.	HIGH	Foreign market oriented, the output of production is for fulfilling expanded market, self-sufficiency in raw materials is attained with fewer dependency on imported final goods	The dominated use of full machinery (printing technology)

Source: Author (2013)

Actually, a better illustration might be produced if the economic growth and policy variables are included. Unfortunately, the absence of consistent and accurate data to show the economic performance such as firm and employment size, output value, and labour productivity has inhibited such assessment. Furthermore, the impacts of policies exercised along the history of batik industry development are unavailable so that I cannot evaluate the policy effectiveness related to its performance.

Assuming that the graph in **Figure 4.21** is true, I present some interesting findings. First, the trade links with the foreign actors are the key driver for the batik industry development. A series of foreign trade flows, particularly cloth and clothing items, have stimulated the enlargement of the batik market and production change. Foreign trade has reshaped the views of the domestic batik producers related to the commercial value of batik products, the enrichment of batik designs and motifs, and the use of new materials and technology in the batik industry. The use of cotton cloths and synthetic dyes is a good example to demonstrate a fundamental transition to accelerate batik industrialisation. At the same time, this trade has sparked as many political tensions as production instability due to the scarcity of and discriminative distribution of cotton cloths in particular. The problem has been lasting until the present regardless of self-sufficiency in cotton cloths has been achieved, causing a troublesome jiggling condition to the sustainability of batik production.

Second, the new technology adoption has contributed much into industrial growth direction. Either coming from an endogenous discovery or borrowing technology introduced by external agents, it has improved the production process and capacity significantly. In turn, it may lead to the market value increase of the entire batik industry. However, it is acceptable for certain stages of development as exemplified by the application of printing technology, for example. Starting from a manual to a fully mechanised printing technology, its adoption created a long-lasting dilemma for the batik industry development. In short term it was useful to double the production capacity to meet the high market demand and to promote the batik products to broader markets. However, in the long term it might disrupt the traditional batik producers and decline the overall market profits. One of the worst situations occurred when the domestic (printed) batik producers were threatened by their foreign competitors a few years ago.

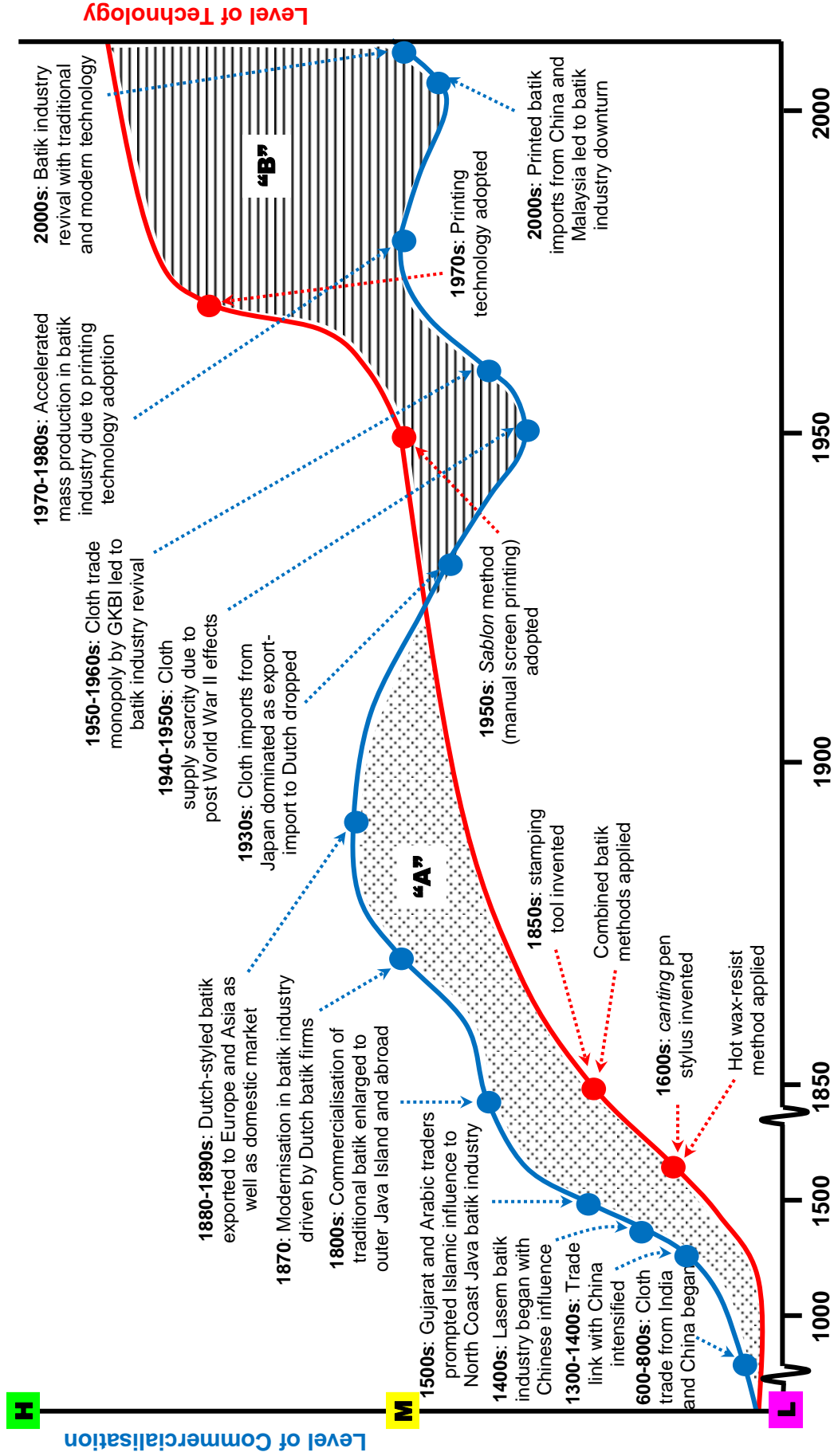
Third, the reciprocal correlation between the level of commercialisation and the level of technology in the batik industry shows a twisting pattern. Initially, the foreign trade increase was advantageous to trigger the improvement of batik production technology, and vice versa. These two variables have brought a parallel uprising growth trend until the Dutch colonial government stepped into the batik industry modernisation. The shaded “A” polygon shows their positive relationships before the trade turned into the diminishing return. As the modernisation continued to introduce an (undesired) full mechanisation, the trade growth was shocked and dropped into a volatile direction. The dashed “B” polygon represents the situation where the machinery-based improvement in batik technology was disadvantageous for the entire batik trade. In the beginning, the introduction of printing technology seemed beneficial to a small group of (large) printed batik firms and threatened the majority traditional batik firms. But the recently increased printed batik imports have in fact hit all domestic batik producers.

Fourth, the most influential actors in the batik industry development are the (large) batik firms and traders. They both are responsible for the change in the batik processes and products through the introduction of new batik designs and motifs, raw materials, and technology. Sometimes they could maintain a good relationship prior to the Dutch colonisation era. In other times their relationship has run unpredictably depending on the policy orientation of the ruling authority. When the batik industry was under the control of the Dutch colonial government, the large batik traders, especially the foreign importers, were benefited from the government policy. In contrast, when the Indonesian government took

control over the industry, the policy exercised was not always consistent to support the participating actors.

Fifth, the ethnic Chinese business group was more flexible to adjust their production and trading activities in dealing with the changing political and economic environment compared to the indigenous counterparts. This group was able to obtain different bargaining positions to run the businesses. During the Dutch colonisation era the ethnic Chinese entrepreneurs played at the foreground of the batik industrialisation landscape following their domination in cloth imports and batik trading. When the Old Order and the subsequent New Order regime ruled in the country, they could continue the businesses at the back stage and kept controlling the provision and distribution of raw materials as well as the batik production and trading. In doing so, they stirred the indigenous counterparts as their puppets in order to gain benefits from the government policies. Such circumstances therefore revealed two contrasts, i.e. the flexibility of the ethnic Chinese batik entrepreneurs in comparison to the long-standing resistance of the indigenous batik entrepreneurs in dealing with the changing environments during the periods of the national batik industry development. It seemed that the competition focus was greatly concerned with cultural preservation of traditional batik making. In fact, the pursuit of economic opportunities has greatly lured the tensions between the ethnic Chinese and indigenous batik entrepreneurs to dominate the domestic batik industry and market demand.

Figure 4.21 A brief history of batik industry development, ca. 600 AD to the present



Source: Author (2013)

Chapter 5

THE CULTURAL HERITAGE OF BATIK TRADITION

5.1 The General Features of Batik Making Mastery

Batik is not simply about artistic design and motif. Batik is a process of transferring human creativity and skills onto a piece of fabric in order to reflect the life passion of batik makers by following certain rules. According to Susanto (1973), general batik mastery consists of two phases, i.e. cloth preparation and the production process. Cloth preparation requires certain treatment in order to ease wax and colour application/removal. It consists of three consecutive phases as follows:

- 1) **Nggirah** or **ngetel** (cloth washing). Washing new cloth is necessary to remove *kanji* (starch solution) added excessively by textile producers or suppliers to make them thicker and heavier. It aims to rejuvenate cloth absorption level and increase its flexible strength. Firstly, the cut cloth is soaked in fresh water all night long and then washed several times with a mixture of water, bean oil, and caustic soda or *londo merang* (burnt rice stalks). After that the cloth is dried before the next phase;
- 2) **Nganji** (light starch addition). The addition of a light starch solution is required to prevent the clean cloth from wax permeation but not dyeing. Then the cloth is dried for the next phase;
- 3) **Ngemplong** (cloth flattening). Flattening the starch added cloth is the final preparation process. A few cloths of ten sheets are rolled together and placed onto a flat wooden surface. These fabric rolls then are pounded frequently by using a wooden stick called *ganden*. After being flattened, each cloth sheet is folded and stored for the batik making process.

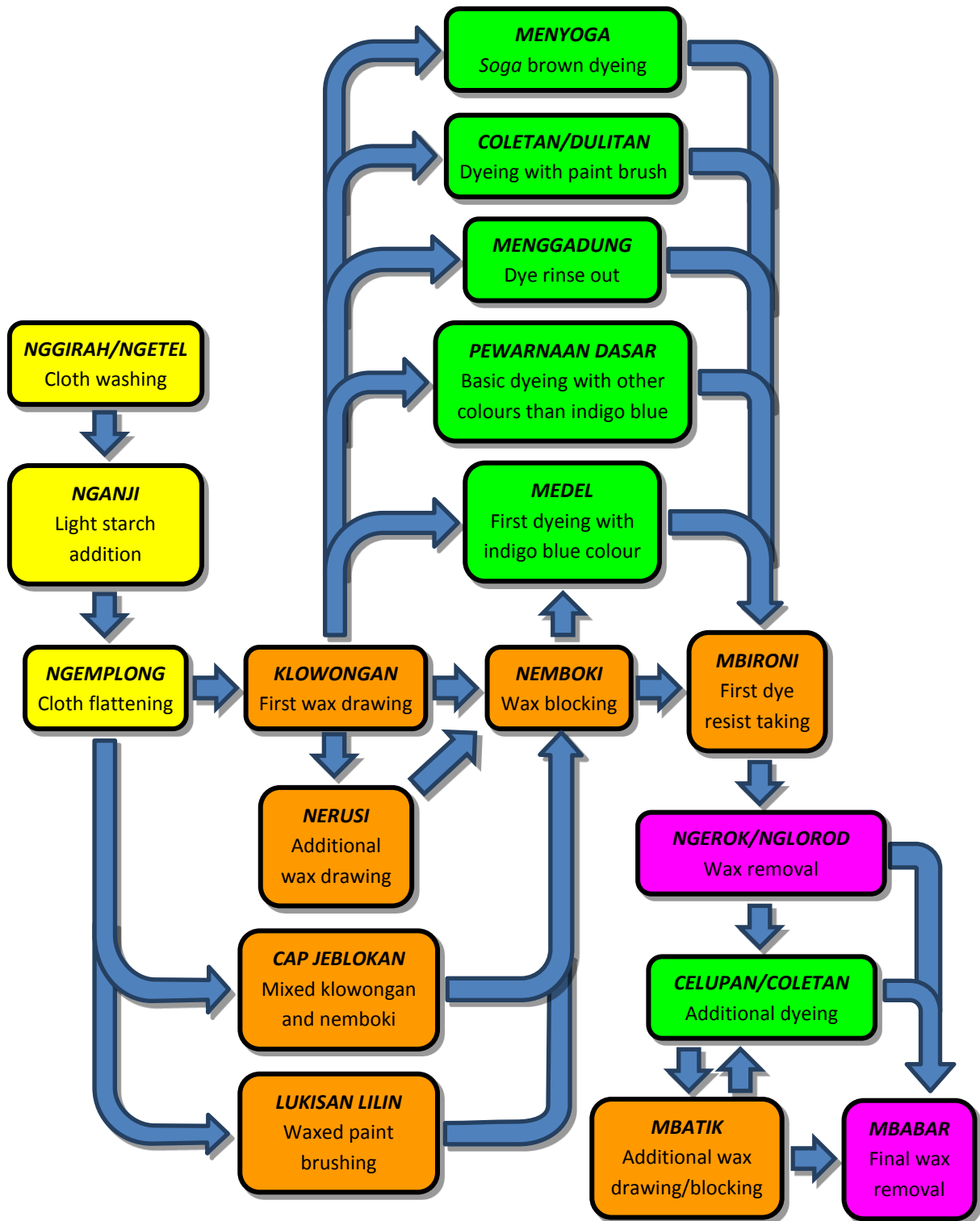
Batik production requires three sequential processes which specify the principle rules of batik making as follows (Susanto, 1973):

- 1) Applying hot wax to draw the desired design and motif onto a piece of fabric. It functions to prevent the fabric from (un)desired colour, by which batik making is identical to a dye-resist technique. In conventional ways it utilises *canting* and stamping tools. There are a variety of hot wax application techniques:
 - a) **Klowongan**. This is the first-time wax application to draw the basic pattern of the batik design and motif. The first *klowongan* is also called *ngengrengan* which result in a *soga* brown pattern outline. However, if the batik maker wants to create an enriched design and motif, she or he could add additional wax onto the fabric, a process called *nerusi*,

- b) **Nemboki**. This is a process of putting on thicker wax to block white areas which are not covered by *klowongan*. It aims to leave these areas white, and to put on detailed fillings (*isen-isen*) and dots (*cecek*),
 - c) **Mbironi**. This process is to resist the colour on preferred areas from undesired colour intrusion during dyeing process. *Mbironi* is undertaken in the middle of batik processing where the batikked cloth has been coloured with dark blue for the first time (*wedelan*) and the initial wax has been removed either by a *kerokan* (scrapping off) or *lorodan* (boiling out) process,
 - d) **Cap jeblokan**. This is a combined wax application of *klowongan* and *nemboki* techniques. It blocks desired areas to produce *soga* brown or white coloured batik fabrics,
 - e) **Lukisan lilin batik**. This is an innovative technique where wax application is undertaken by using a paintbrush instead of *canting* tools;
- 2) Applying colour to waxed fabric through *celupan* (dyeing) or *coletan* (paint brushing) techniques. The colouring materials may come from natural and synthetic sources. Similar to wax application the process of colouring waxed fabric can be done in several ways as follows:
- a) **Medel**. This is the first-time colouring process by putting a dark blue colour on the waxed fabric. The entire fabric is put into a dyeing tub several times. In the past the dark blue colour was taken from *Indigofera* plant leaves but currently *naphtol* synthetic dyes are commonly used,
 - b) **Pewarnaan dasar**. This is the replacement process of *medel* technique when the batik makers want to produce more colourful batik fabrics. Instead of initially applying a dark blue colour, they can put different colours on directly for the first time,
 - c) **Menggadung**. This process is to rinse out colour solution on the waxed fabric which is placed on a flat-wide table. It will not result in a good coloured fabric because the solution is spread across the surface by using a paintbrush. This technique is broadly known in *Pekalongan*,
 - d) **Coletan** or **dulitan**. The colour application is done by using a paintbrush to wipe out the colour on preferred areas of waxed fabrics. This technique is popular in batik centres on the north coast of *Java*,
 - e) **Menyoga**. This is a specific *soga* brown colouring process which is popular in *Surakarta* and *Yogyakarta*. *Soga* brown batik products are identical to *Keraton*-styled batik motifs (court batik);
- 3) Removing wax from dyed fabrics through *ngeroak* (scrapping off) or *nglorod* (boiling) techniques. *Nglorod* may be done several times following additional colouring and the final wax removal process called *mbabar* or *ngebyok*.

All those processes are common (and of course required) in traditional batik making which is highly dependent on hand-work instead of machinery. A combination of several of the abovementioned skills results in batik making diversity where the richness of the batik designs and motifs are skilfully executed. Such diversity is classified into five batik mainstreams as discussed in the following section.

Figure 5.1 Batik production process



Source: Author (2013)

5.2 Five Batik Mainstreams

Batik Keraton (Court Batik)

Among other batik motifs **Batik Keraton** (court batik) is the most recognisable batik motif because of its traditional authenticity in preserving classical colours, orderly geometric patterns, and specified rules of batik motifs. It refers to the legacy of prominent Mataram Javanese principalities, i.e. Surakarta and Yogyakarta, which are the centre of Javanese culture. Thus, court batik is also known as **batik pedalaman** (*vorstenlanden*) – a term used to express the geographical location of both palaces in the Central Java mainland and the rigid and orderly rules of batik making. In fact, there are many other *Keraton* principalities – not all located on the mainland – that have created court batik motifs such as Cirebon Palace with *paksi naga liman*, *kapal kandas*, and *wadasan* motifs; Banten Palace with *surosowan*, *pancaniti*, and *srimanganti* motifs; Maduranese Palace with *ganggeng* motif; and Jambi Palace with *kapal angso 1* motif (see **Figure 5.2**). It was produced intensively and achieved its finest forms in the environment of these palaces in order to provide clothing for members of royalty. The use of court batik motifs is limited for ceremonial occasions such as the coronation of a new king, royal wedding, sacred rituals, and lifetime ceremonies from cradle to the grave (BP3 TMII, 1997; Djoemena, 1999; Doellah, 2002; Elliott, 2004; Jusri & Idris, 2011). Some court batik motifs are prohibited for use by non-royal family members. However, recent batik industry developments show that these forbidden motifs have been copied extensively with some modifications – a common strategy of batik makers to deal with the restrictive rules.

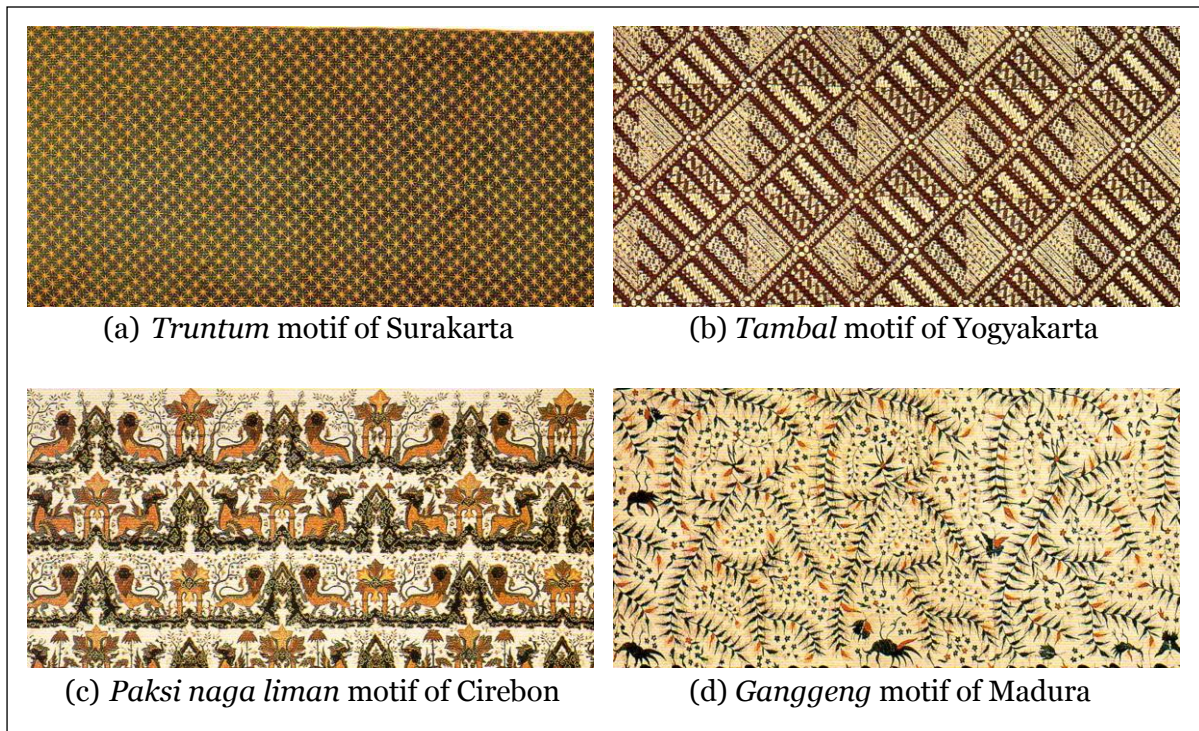
According to BP3 TMII (1997), the first rules of forbidden batik motifs (*pola larangan*) were introduced from the reign of Surakarta Monarch, Susuhunan Paku Buwono III (1749-1788), through official declaration in 1769 and 1784, and continued by his successor Susuhunan Paku Buwono IV (1788-1829) in 1790. Some forbidden batik motifs – these rules were also applied later in Yogyakarta Palace even though the actual declaration date is unknown – were *parang rusak*, *sawat*, *cemukiran*, *udan liris*, *rujak sente*, *garuda ageng*, *kawung*, and *semen*. The rules determined the use of forbidden batik motifs as follows:

- 1) The ruling king, crown prince(s), queen, and concubine(s) wore *parang rusak*, *sembagen huk*, and *garuda ageng* motifs;
- 2) The royal members with prince titles and descendants of the ruler all wore *semen* with *sayap garuda* (eagle wings), and *udan liris* motifs;
- 3) Distant royal members with *Raden Mas* or *Raden* titles all wore *semen* without *sayap garuda* (eagle wings), *kawung*, and *rujak sente* motifs.

These forbidden motifs carry out particular symbolic meanings to represent Javanese order philosophy, mainly the hierarchy of power. For example, *parang rusak* motif symbolises a sword to eliminate malicious power in society or the holy power of God so that it can only be worn by the ruling king. Another example is the *kawung* motif which symbolises the *mancapat* principle of human fertility. *Semen* motif represents the source of power in the world. All those motifs were created on purpose to deliver the images of authoritarian positions and influential roles attached to the users either in the royal family or society. Commonly, the motifs were inspired by the Javanese *kejawen* belief and *kebatinan* knowledge which have shaped Javanese syncretism – a local religious belief resulting from

the mixture of Javanese culture with Hinduism, Buddhism, and Islamic religions (BP3 TMII, 1997; Elliott, 2004).

Figure 5.2 Court batik motifs from various *Keraton* Principalities



Source: Doellah (2002, pp. 59, 83, 100, 106)

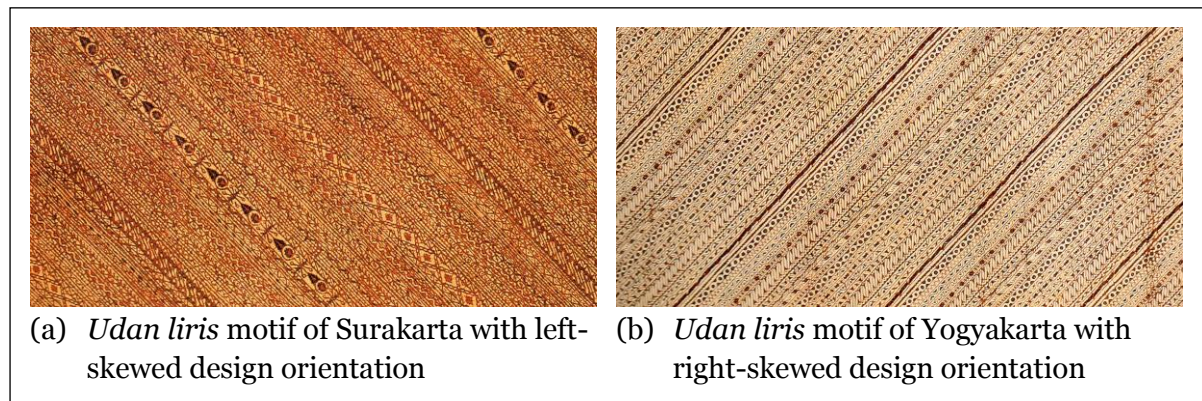
Even though court batik motifs from Surakarta and Yogyakarta shared similar forbidden rules, they have retained some differences as well. First, the traditional colours of court batik from Surakarta are indigo blue, cream, and *soga* brown while those from Yogyakarta are white and black. Second, the batik motif of Surakarta is intricate with rich tiny fillings while that of Yogyakarta is bold and eye-catching with large designs. Third, in the case of diagonal styled batik motifs like *parang rusak* and *udan liris* the court batik of Surakarta applies a north-west direction rule while Yogyakarta does the opposite, a north-east rule (see **Figure 5.3**). Fourth, specific to *sembagen huk*, *kawung*, and *semen* motifs apply for Yogyakarta's court batik only (BP3 TMII, 1997; Siswandi, 1999; Doellah, 2002; Elliott, 2004).

Batik Pesisiran (Coastal Batik)

The term **Batik Pesisiran** (coastal batik) refers to batik motifs produced in the batik centres of coastal regions, particularly the northern coast of Java. There are three leading coastal batik centres, i.e. Pekalongan, Lasem (Central Java Province), and Cirebon (West Java Province), those which were previously known as the Big Six that produced the largest amount of batik products along with Surakarta, Yogyakarta, and Banyumas. The remaining coastal batik centres from west to east are Indramayu (West Java Province), Brebes, Tegal, Pemalang, Batang, Semarang, Demak, Kudus, Jepara (Central Java Province), Tuban, Gresik, Surabaya, and Sidoarjo (East Java Province) (BP3 TMII, 1997; Doellah, 2002; Jusri & Idris, 2011). Actually, the north coast batik centres of Java are located in a ribbon area of more than 619 kilometres in length and covering 19 municipalities/regencies. Since ancient

times of monarchy authorities up to the Dutch colonisation era some cities like Cirebon, Pekalongan, Semarang, Lasem and Tuban have been the important ports for domestic and international trade as well as the centres of political and military expansions. Not surprisingly, these areas were opened towards foreign influences in the local batik tradition (Elliott, 2004; Lombard, 2008a-c).

Figure 5.3 The difference of design orientation between Surakarta and Yogyakarta court batik motifs



Source: Djoemena (1999, pp. 46-47)

Compared to court batik, it displays more vivid colourful tones resulting from the blend of Javanese, Indian, Chinese, Islamic, and Dutch interactions in cloth decorating techniques. It carries out a variety of colour tones ranging from classical natural dark to contemporary bright pastel colours, thanks to the unlimited combination of synthetic dyes available. The batik designs do not follow certain rules, rather they come purely from the artistic expression of the batik makers themselves. They may appear either in geometrical patterns, random layouts, or a combination of the two. More importantly, coastal batik motifs do not have symbolic meanings, specific functional use, or philosophical views of the makers, but are simply decorative cloths. Since the beginning court batik fabrics were made for commercial purposes to serve the clothing demand of an entire society (Doellah, 2002; Elliott, 2004). Sometimes they were also treated as valuable assets comparable to gold, jewellery, stock, and land certificate (Lombard, 2008b).

Despite coastal batik variations, there are some local identities that can be recognised from one batik centre to another. For example, the endemic *megamendung* motif is identical to Cirebon, *jelamprang* motif to Pekalongan, and *latohan* motif to Lasem. Regarding colour tones, Pekalongan is famous for dark blues and green and Lasem for blue and *abang getih pithik* (chicken blood red colour), from which Lasem's *batik bangbiron* (two-tone red and blue batik cloths) became popular. In terms of batik processes Pekalongan is famous because of stamping batiks and *coletan* (paint-brush work) dyeing technique while Lasem is consistent with *batik tulis* (handwritten batik technique). In addition, there are famous batik motifs which resulted from batik processes in two or three batik centres, i.e. *batik dua negeri* (two-country batik) and *batik tiga negeri* (three-country batik). In the past these batik types were made of the combination of local excellence in dyeing techniques involving *soga* brown of Surakarta and Yogyakarta, chicken blood red of Lasem, and dark blue of Pekalongan. At present, these motifs can be finished in a single location due to the spread of knowledge and technological transfers and access to dyeing materials (Susanto, 1973; BP3 TMII, 1997; Doellah, 2002; Elliott, 2004; Jusri & Idris, 2011). However, it remains difficult to identify

such local differences. Shared experiences on the adoption of foreign motifs, design patterns, and dyeing techniques may lead to misidentification. European floral bouquet and fairy tale batik motifs and Chinese floral bouquet and animal image batik motifs could be found along the coastal regions. This applies to colour appearances as well. Therefore, only those who have an excellent knowledge of batik making can recognise their differences accurately (see **Figure 5.4**).

Figure 5.4 A variety of coastal batik motifs



Source: (a) Doellah (2002, p. 97)
 (b) to (f) Ishwara et al (2011, p. 62, 93, 140, 156, 201)

Batik Saudagaran (Merchant Batik)

Similar to coastal batik, **Batik Saudagaran** (merchant batik) also reflects the freedom of artistic expression of batik makers. They feel free to combine forbidden and contemporary batik motifs without any consequences. According to Nugroho (personal communication, February 9, 2012) during a Guided Tour in Dinar Hadi Batik Museum of Surakarta, merchant batik makers are those living and producing batik fabrics outside the Palace walls

(of Surakarta). They produce batik for commercial purposes, not to serve the clothing needs of royal members exclusively. As batik making has become a primary source of income, they are accustomed to producing from home workshops and selling them directly from a living room – a common residential layout of batik entrepreneurs in Kampung Laweyan and Kampung Kauman that has lasted until now. Merchant batik motifs are difficult to recognise because the production follows market demand dynamics. Nevertheless, according to Doellah (2002), a simple hint to differentiate merchant batik and other batik mainstreams is that it is still preserving court batik motifs with modifications such as basic pattern outline, and applying more batik processing and dyeing techniques rather than relying on classical ways and colours.

As exemplified in **Figure 5.5**, the basic outlining pattern imitates forbidden batik motifs of *kawung* and *parang*. *Kawung* motif appears in symmetrical interlocking flowers and seeds while *parang* motif shows the diagonal lines of standing swords. At the foreground the Chinese styled floral bouquet and borderlines have been applied through a *pagi-sore* layout, and the bright colours are finished by using *tiga negeri* techniques (Doellah, 2002). In this case, the adoption of *kawung* and *parang* motifs has no intention to emphasise any particular symbolic meanings, rather it only represents decorative arts.

Figure 5.5 A sample of merchant batik motifs with *pagi-sore* layout and *tiga negeri* dyeing technique



Source: Doellah (2002, p. 134)

Batik Petani (Farmer's Batik)

Batik Petani (farmer's batik) has been developed by traditional batik makers in villages outside the Palace walls and sometimes far from urban regions or batik marketplaces. Therefore, it is also known as *batik perdesaan* (rural batik). Similar to merchant batik, it is aimed at not only satisfying the batik market but mostly to supply lower market segments. Compared to merchant batik, which applies more intricate designs and fillings, farmer's batik is more simply made. Such difference is associated with the business cycle of farmer's batik at periodical times of the year, i.e. during the waiting period of farmland harvesting times. The farmers' housewives spend their spare time undertaking batik processes at homes or village community's batik workshops before returning to the fields (Nugroho, personal communication, February 9, 2012). This means that the production does not run continuously as it depends on harvesting times which may occur two-three times a year. Commonly they work based on contracts from (mostly) urban middlemen and the products will be collected later for further processing or direct selling to (urban) batik markets. Thus, the batik makers have less power to batik design innovation as well as salary levels.

Being treated as a spare time activity for additional income, farmer's batik making seems to have limited opportunities to achieve better developments. It often appears in simpler patterns and colouring techniques. As can be observed in **Figure 5.6**, farmer's batik is inspired from the court batik mainstream. It adopts its geometrical patterns and classical *soga* brown, white, and black colours with fewer modifications than coastal batik. At a glance it looks like court batik but actually it has a lower quality and no symbolic meanings attached to it.

Figure 5.6 A sample of farmer's batik motifs with *sidomukti* pattern of Yogyakarta

Source: Doellah (2002, p. 146)



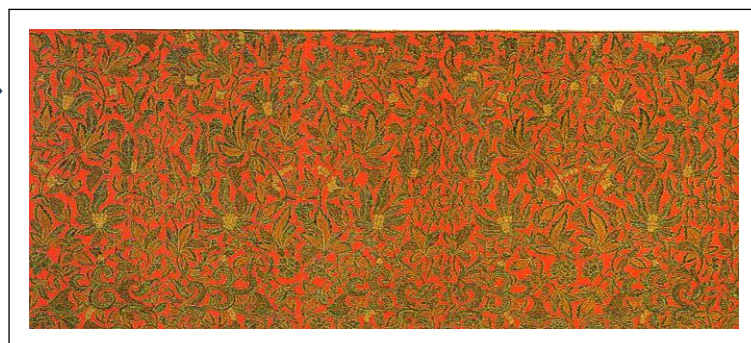
Batik Indonesia

The fifth mainstream **Batik Indonesia** was pioneered in the early 1950s by the prominent Indo-Chinese batik master from Surakarta, Mr. KRHT Go Tik Swan Hardjonagoro. He was given a special assignment by the former President Soekarno to create a batik motif that could represent the image of national unity. He spent a lengthy meditation alone for months visiting many batik centres and sacred places in the Java's north coast from the west and ended up in Bali on the east. His efforts are called *laku prihatin* – an ancient Javanese tradition that suggests people undertake a series of spiritual meditations and rituals in order to achieve their goals – of obtaining inspiration to create an assigned batik motif. This spiritual behaviour was actually common for batik makers in the past, but is no longer widely practiced (KRHT Hardjonagoro, 1999; Rustopo, 2008).

The characteristics of Batik Indonesia motifs are that the design adopts a court batik motif and the dyeing technique applies coastal batik motif mainstream. The result would be a rich intricate multi-coloured batik motif that combines both classical and contemporary batik motifs. It was inspired by Surakarta's court batik motif which articulates the excellence of Javanese philosophical values through intricate and orderly geometrical patterns in *soga* brown colour, and Pekalongan's coastal batik motif which encourages artistic freedoms expressed in contemporary patterns and multi-coloured use (see **Figure 5.7**).

Figure 5.7 A sample of Batik Indonesia motifs with *sekar kenanga* pattern by Go Tik Swan Hardjonagoro

Source: Doellah (2002, p. 218)



All these five mainstreams in fact share the legacy of farmer's batik making, not the court batik mainstream. Farmer's batik motif is the simplest batik form which is being maintained by the traditional folk industry up to now. It remains produced in villages as a spare time activity. After being brought into *Keraton* Surakarta and *Keraton* Yogyakarta walls it achieved the finest improvements in design layout, detailed fillings, and dyeing process. On coastal batik centres in the Java's north coast it was being enriched with foreign influences in similar elements, and technological innovations (stamping and printing batik techniques) and synthetic dye applications. According to Rustopo (2008), farmer's batik outlines the foundation of Indonesian batik mainstreams. In essence it carries out traditional agricultural values of village society which promotes the balance of human life with nature. Not surprisingly, almost all batik motifs present the images of flora and fauna and natural landscapes either in realistic or symbolic forms. Through such a variety of developments the Javanese batik motifs have become more diverse and colourful.

5.3 The Value Chain of Batik Industry Tradition

In general, the value chain of the batik industry is relatively short and does not require so many raw materials. The basic consumption needs are fabrics, waxes, and dyes. The most used fabrics are *kain mori* (cambrics) with *primitissima* and *prima* quality. Other types of fabrics that are frequently used are paris, shantung, viscose, dobby, and silk. The types of waxes needed are paraffin, *kote* (beeswax), *gondorukem* (resin of eucalyptus tree), *damar mata kucing* (resin of merawan timber or *light hopea*), *lilin gladhagan* (used waxes), microwax, and *kendal* (cow's fat). Lastly, the dyes required may come from natural or synthetic sources. The natural dyes are collected from various plants such as *tingi* (*Ceriops tagal* (Perr.) C.B. Robinson), *tegeran* (*Maclura cochinchinensis* (Lour.) Corner), *secang* (*Caesalpia sappan* L.), *jambal* (*Pelthoporum pterocarpum* (DC.) Backer ex K. Heyne), *tarum* (*Indigofera arrecta* Hochst. Ex A. Rich), *gambir* (*Uncaria gambir* (Hunter) Roxb), *kunyit* (*Curcuma Longa* L), and *mengkudu* (*Morinda citrifolia* L). In the meantime, the popular synthetic dyes are naphthol, remasol, indigosol, reactive, basis, procion, and indanthrene. In addition to natural dyeing substances the batik makers sometimes add a colour stimulator called mordant into the dyeing solution in order to enhance the original colour brightness, i.e. *jeruk sitrun* (lemon), *tetes tebu* (molasses), *jambu klutuk* (guava), *belimbing wuluh* (starfruit), *gula* (white sugar), *gula aren* (palm sugar), *tape* (fermented cassava), and *tawas* (alum). In the case of synthetic dyes, the use of mordant is no longer needed because these may be available in abundant colour tones from the factories. Besides these raw materials some supporting materials are also required such as fresh water, firewood, charcoal, and kerosene. The use of these kinds of energy sources is more preferred because the control of combustion heat is easier and the price is cheaper than natural gas, electrical power supply, solar energy, and other types of energy sources.

There are three ways of collecting raw materials supply, i.e. direct purchase, indirect purchase from middlemen, and contractual supply from larger batik entrepreneurs. Direct purchase is the simplest form of supply where batik makers may come to supplier's shops or order by phone. The transaction can be cash or *ngebon* – a term referring to payment in instalments, which is generally preferred by the batik makers. There is a set of agreement custom between the suppliers and batik makers regarding payment due and methods. In

practice, the suppliers will wait a month or two when the batik products are circulated in the market. If the batik makers fail to pay, then the suppliers will reduce or refuse the next transaction. On the batik makers' side, they often sell their properties or look for quick money from relatives (family and friends), a private money lender, or pawnshops. They avoid taking bank loans due to strict administrative requirements.

In the second supply method the middlemen visit the homes of the batik makers offering batik materials even though the reverse often takes place as well. The middlemen may be distribution agents, intermediate traders, and local cooperatives or communal business organisations. Often the middlemen are the neighbours and their role is essential in cutting down production cost burdens. The payment methods for their services are similar to the direct purchase model, but more flexible regarding payments. However, particular mutual agreements apply between two parties for binding loyalty over a longer period of time. Strong social trust heightened in the neighbourhood plays as collateral for such transactions. Whenever the middlemen cheat or the batik makers ignore their payment obligation, then they must deal with social sanctions ranging from gossip to social exclusion.

The third method perhaps is the most binding in the supply chain from larger batik entrepreneurs to batik makers. It offers certainty of supply and in return the batik makers will obtain an amount of wages as paid workers or sell their batik products to them at determined prices. Such contractual supply requires loyalty from batik makers where they will collect "free of charge" raw materials and they must abide by their batik master's rules for the entire batik production process. At a glance it looks like the practice of modern slavery, but if we look closer it actually offers the advantages of capacity building and social security for loyal batik makers and their families. By joining to a larger batik entrepreneur's circle, the batik makers may obtain supervision from in-house batik masters to improve design quality and batik making skills. They will also obtain medical treatment during illness, and sometimes the batik entrepreneurs will visit them at home. In many cases, the batik makers are encouraged to build their own batik business after working for a quite long time. The batik entrepreneurs will support them through the marketing network and sometimes in financial matters as well.

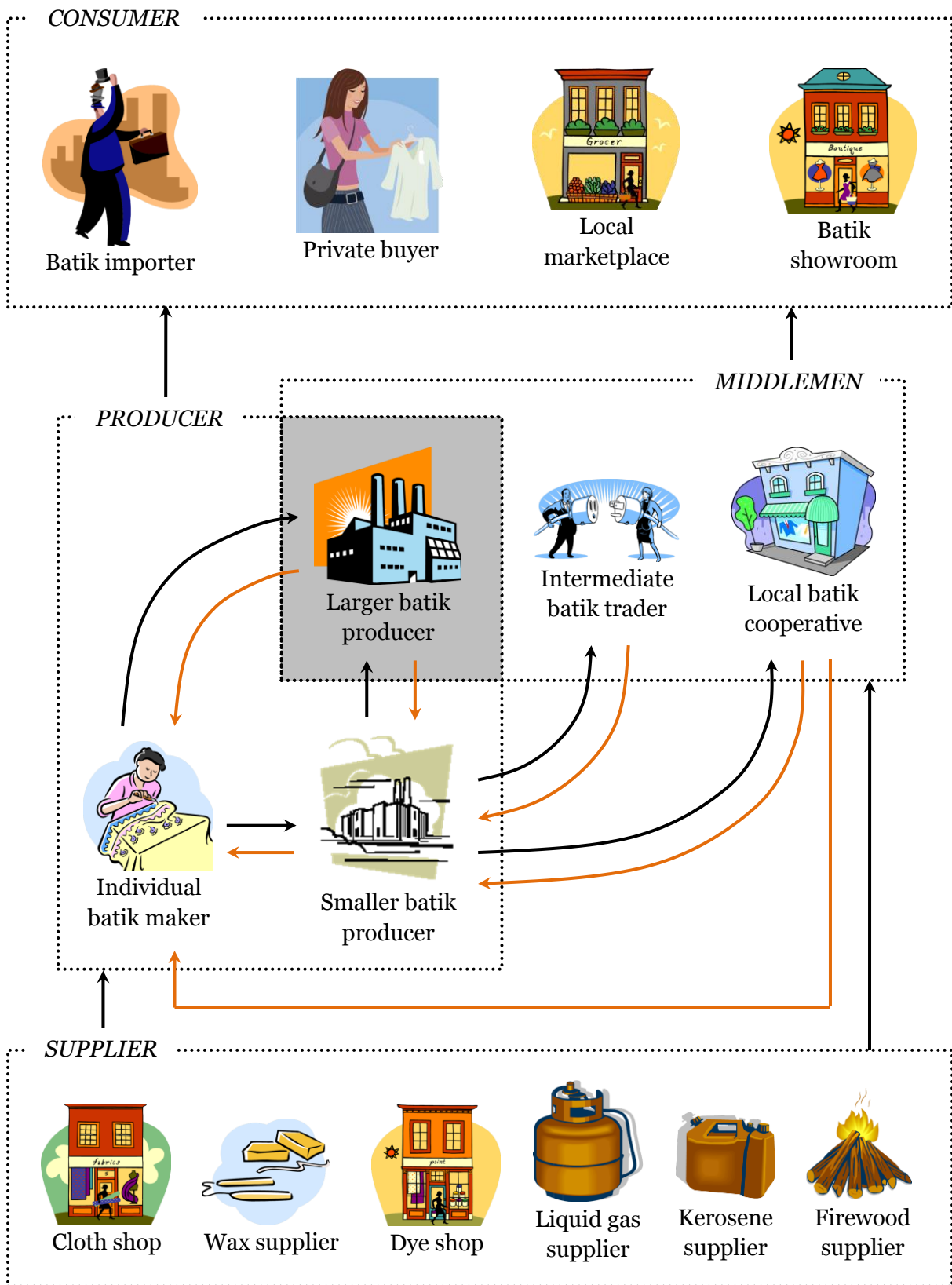
In the production line, the batik industry may be present in both traditional and modern ways. The traditional way refers to the home-based batik process while the modern way converts the process into factories. The home-based process may take place entirely at entrepreneurs' home workshops and partially subcontracted to their counterparts who specialise in certain works or batik makers in villages. In the case of a subcontracting system, the batik entrepreneurs would assign their partners to finish certain works and the results would be returned to them. The subcontractors participate in the same way as with paid workers to the batik entrepreneurs. Therefore, in many batik centres we can find partial batik specialists such as *juragan medel* who focus on the *wedelan* process and *juragan mbabar* on the final wax removal process. On the contrary, the modern way utilises machinery by adopting textile industrial technology. The human batik labours are replaced by machines and computers which may completely accelerate the production process. The results are large quantities of printed batik products with lower prices than traditional batiks.

At the end of the business cycle, both direct and indirect marketing channels exist. The direct marketing channels occur when the batik entrepreneurs contact the buyers at the first hand. They may sell the products in shops at local markets or at home galleries. In other instances

they may deliver to buyers' address, usually those who have been loyal customers. In the past some traditional batik entrepreneurs sold their products door-to-door by walking around in local markets and neighbourhoods. This method is rarely seen today except in rural societies. The recent trend has shown increasing online marketing particularly in urban batik centres, and mouth-to-mouth marketing through family, friends, and relations. In addition, they also market their products at exhibition events.

On the contrary, indirect marketing channels are preferred by smaller batik entrepreneurs with fewer marketing networks and capital investment. They depend largely on the service middlemen whose role is played by intermediate traders and larger batik entrepreneurs. Often the middlemen play multiple roles as raw material suppliers and batik marketers at the same time. The middlemen may come to the batik maker's homes to collect the products, and vice versa. The payment method is similar to the case of raw materials supply mentioned above where the smaller batik entrepreneurs are subordinate to the middlemen's rules in terms of deciding correct market prices. The batik entrepreneurs may certainly suggest the floor prices and the middlemen may change them in order to take up the commission fee. In this case the batik entrepreneurs are often unaware of the actual market prices for their products. Such circumstances may not occur in the case of a horizontal marketing channel. Those who have their own brands or are at an equal business level may negotiate with marketing partners to maintain affordable prices including the commission fee. In some cases they can make a mutual agreement to dispense with this fee through cross-marketing methods. By exchanging the products to be sold to each consumer segment, they can keep the prices stable in different marketing arrears and attract more consumers due to product diversity in their shops and galleries. However, this marketing method may be disadvantageous if their products are less favourable than their partners' products. As a result, this situation may disrupt the business future and irritate existing social relations. The following **Figure 5.8** illustrates the entire value chain of the batik industry.

Figure 5.8 Value chain in batik industry



Remark: \longrightarrow direct supply; \longrightarrow contractual/conditional supply

Source: Author (2013)

Chapter 6

CASE STUDIES OF BATIK CLUSTERS

6.1 An Overview of Local Development Setting

Understanding the contextual setting is important in the case study research in order to elucidate the bounded systems that have shaped the phenomena. Even though clear cut boundaries between the context and the case are often blurred, examination of the context is useful to figure out the contribution of certain endogenous factors to the case dynamics. In this research the local batik clusters are located in two distinct regions, i.e. Surakarta Municipality and Rembang Regency, and which are 213 kilometres apart. In this section I will analyse the local development setting of these regions.

Administrative Boundaries

Surakarta Municipality covers a territory of 44.04 km² surrounded by Karanganyar Regency, Sukoharjo Regency, Klaten Regency, and Boyolali Regency (see **Figure 6.1**). It lies on a flat urbanised area, leaving only 2.83% agricultural land out of the total land use with three rivers flowing across the city, i.e. Bengawan Solo, Kali Jenes, and Kali Pepe (see **Figure 6.2**). The city benefits from its strategic location as an important hub linking the capital city of Central Java Province in the north (Semarang Municipality), Yogyakarta Special Province on the south, and the border city of Magetan in East Java Province which is only 76.2 kilometres to the north east. Surrounded by rural peripheral regions, Surakarta emerges as a leading growth centre in the Java's south east to compete with Yogyakarta. It has five *kecamatan* (subdistricts), i.e. Laweyan, Serengan, Pasar Kliwon, Jebres, and Banjarsari, and 51 *kelurahan* (urban villages). Kampung Laweyan's batik cluster is located in Laweyan Subdistrict whereas Kampung Kauman's batik cluster lies 2.7 kilometres in Pasar Kliwon Subdistrict. Both sites are for residential land use with support of commercial and services activities on the major road lines (BPS Kota Surakarta, 2011).

In contrast, Rembang Regency consists of 1,014.08 km² area surrounded by the Java Sea on the north and the limestone Mountains of Kendeng and Blora Regency on the south. Other adjacent regions are Pati Regency and Tuban Regency of East Java Province (see **Figure 6.3**). In 2011, the Rembang area consists of 14 subdistricts and 294 urban/rural villages predominantly utilised for agriculture. It consists of 341.5 km² drylands (33.68%), 290.95 km² paddy fields (28.69%), and 238.13 km² forests (23.48%), compared to a residential land use of 95.29 km² (9.4%). Its land surface varies from coastal lowlands to hilly highlands (see **Figure 6.4**). The batik cluster of Lasem Area is located in the Lasem and Pancur Subdistricts, where Lasem is crossed by the Java's north coast national road while the Pancur is linked to uphill agriculture lands in the south (BPS Kabupaten Rembang, 2012).

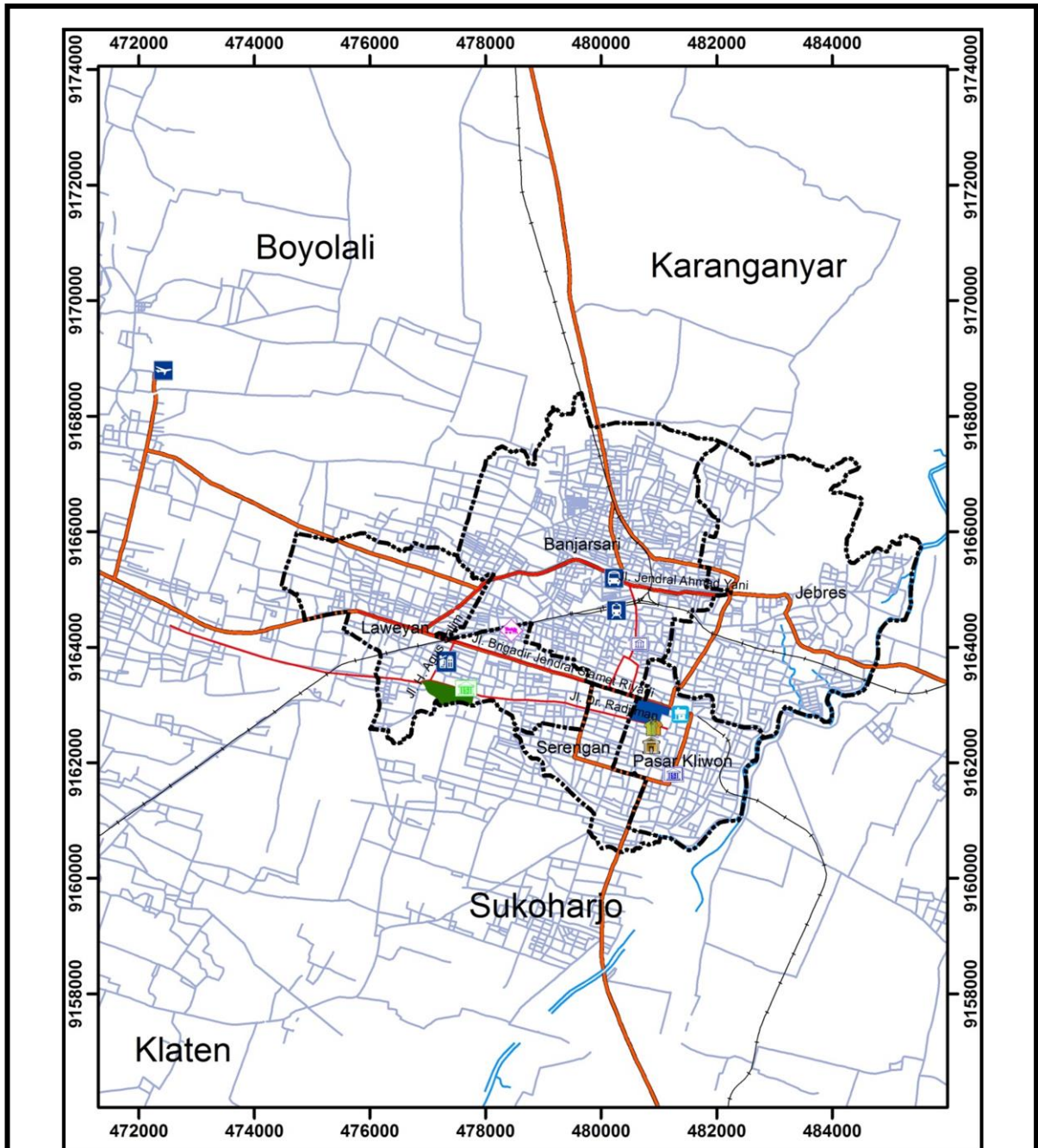
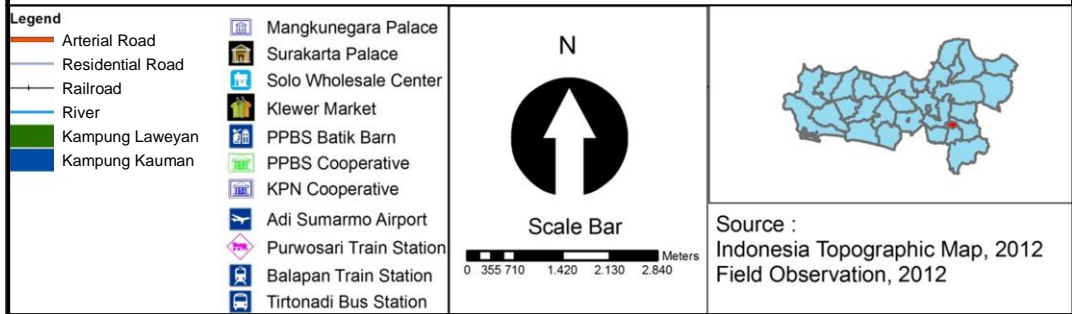


Figure 6.1
Orientation map of Kampung Laweyan and Kampung Kauman



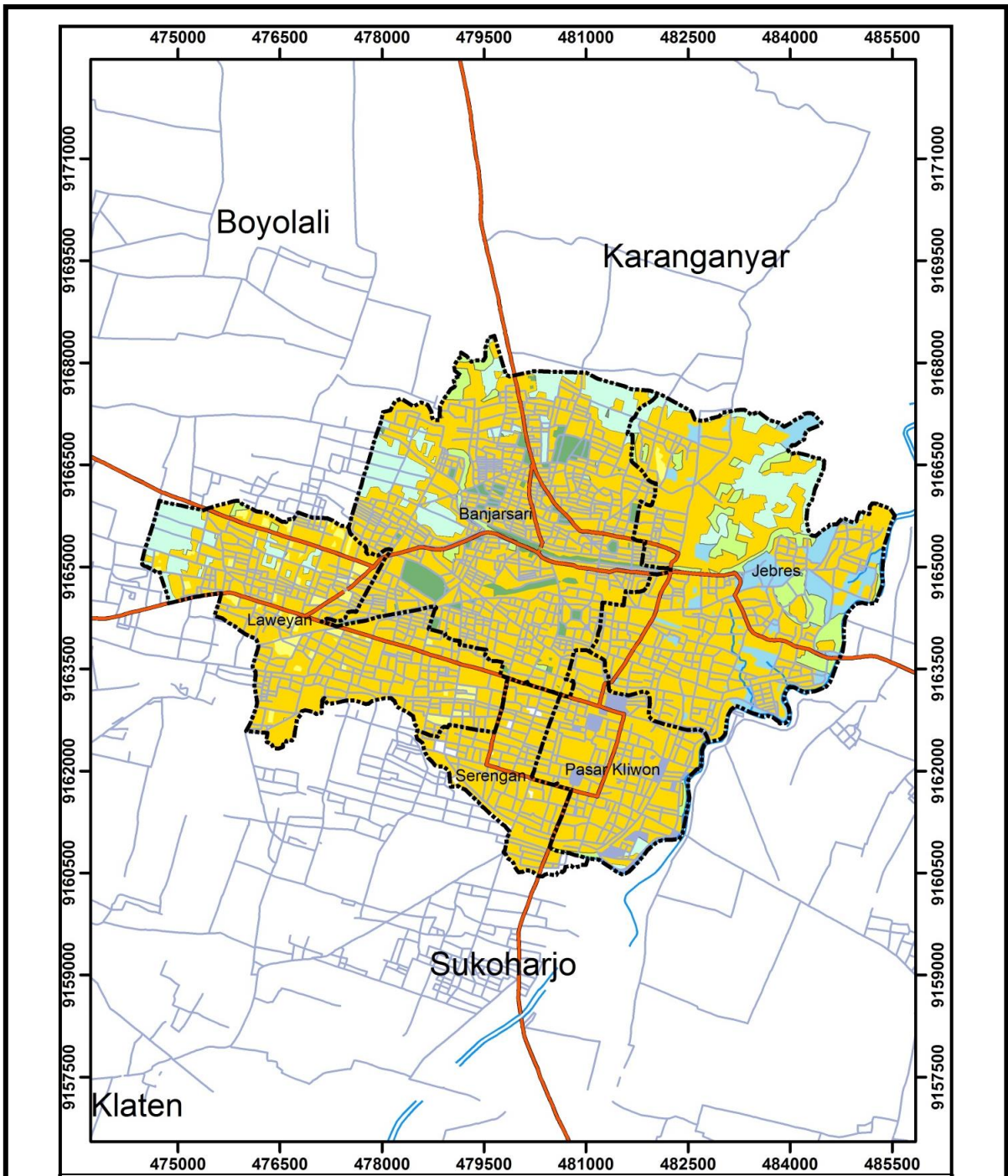


Figure 6.2
Land use distribution of Surakarta Municipality


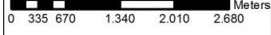





















Legend		<p>N</p>  <p>Scale Bar</p> 	
 Arterial Road  Residential Road  River  Subdistrict boundary	 Settlement  Moor  Farm  Field		



Figure 6.3
Orientation map of Lasem Area (Lasem Subdistrict and Pancur Subdistrict)

<p>Legend</p> <ul style="list-style-type: none"> — National Road — Provincial Road — Arterial Road — Residential Road Lasem Subdistrict Pancur Subdistrict 	<ul style="list-style-type: none">  Dampo Awang Anchor  Mak Co Pagoda  Tjoe Hwi Kiong Pagoda  Cemetery of RA Kartini  Rembang Mosque  RA Kartini Museum  Petilasan Sunan Bonang  Plawangan Site  Ratanavana Arama Monastery 	<p style="text-align: center;">N</p>  <p style="text-align: center;">Scale Bar</p> 	 <p>Source : Indonesia Topographic Map, 2012 Field Observation, 2012</p>
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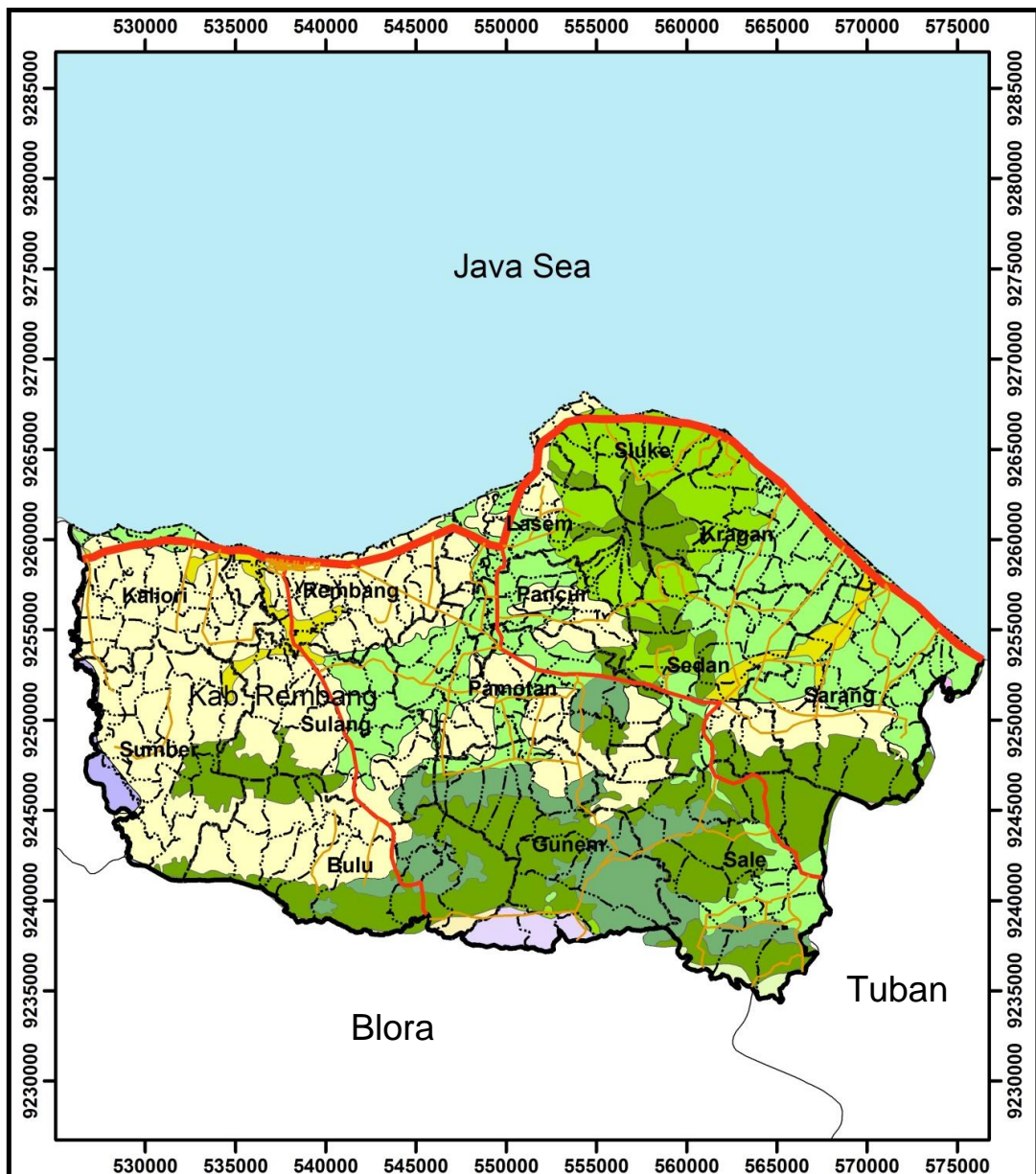
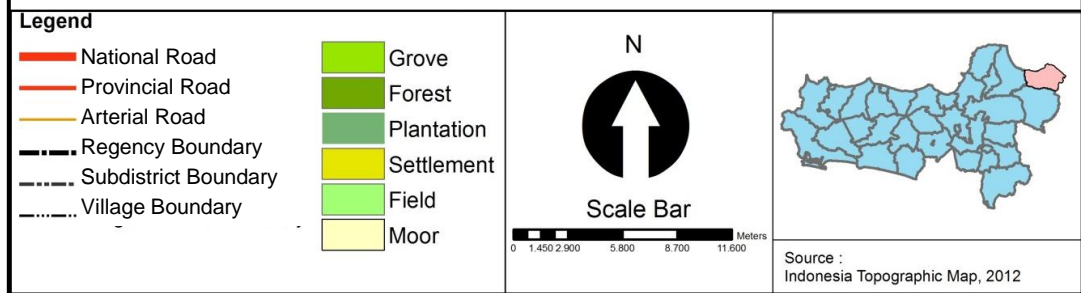


Figure 6.4
Land use distribution of Rembang Regency



Demographic Profile

In 2011 Surakarta had a population of 536,498 inhabitants, making the second largest population in the province after the capital city of Semarang. It is the most densely populated city with 12,182 inhabitants per km² on average, compared to Semarang with 4,178 inhabitants per km². However, since 2007 the citywide population growth has been decreasing at about -1.16% per year. This decline has arisen because of outward migration of people looking for cheaper settlements around (BAPPEDA Kota Surakarta, 2011). Kampung Laweyan is located on the more spacious area of the Laweyan Subdistrict with lower density level of 10,946 inhabitants per km². On the other hand, Kampung Kauman is the most crowded area in the Pasar Kliwon Subdistrict with 17,335 inhabitants per km². This is due to the concentration of mixed urban land use composed of trade, residential and government activities (see **Table 6.1**). Laweyan society is recognised as a strong, independent, and hardworking entrepreneurial group while Kauman society as a *santri* group (Islamic education community) who supports religious ways in socio-economic life.

Table 6.1 Population distribution by subdistrict in Surakarta Municipality, 2011

No.	Subdistrict	Population (lives)	Area (km ²)	Density (lives/km ²)
1.	Laweyan	94,576	8.64	10,946
2.	Serengan	50,559	3.19	15,849
3.	Pasar Kliwon	83,559	4.82	17,335
4.	Jebres	137,374	12.58	10,920
5.	Banjarsari	170,430	14.81	11,507
Total		536,498	44.04	12,182

Source: Dinas Kependudukan dan Catatan Sipil Kota Surakarta (2011) in BAPPEDA Kota Surakarta (2011, p. 26)

Following the out-migration trend, the employment size is declining at -2.39% per year higher than the out-migration level of -0.67%. With the exception to two sectors, i.e. bank, rental, and business services and construction, the remaining sectors experienced a decrease in labour absorption. Regardless of such negative trends, trade, services, and manufacturing remain the major areas of employment (see **Table 6.2**).

In comparison, Rembang's population was 597,262 in 2011 with an average density of 589 inhabitants per km² and an annual growth rate of 2.04%. It concentrates on Rembang Subdistrict and Lasem Subdistrict. The urban centre functions are divided between Rembang as the government centre and Lasem as the economic centre. Historically, Lasem existed earlier as a major port city and trade centre during the Majapahit Monarchy period. Rembang existed later to replace Lasem as the government centre under the Dutch East Indies colonial regime in 1750 due to prolonged ethnic Chinese rebellions. Until the present, Lasem's inhabitants are considered to be hardworking farmers, traders, and entrepreneurs while Rembang's inhabitants are associated with the bureaucratic class. Lasem Area's batik

cluster is located in Lasem Subdistrict and Pancur Subdistrict with a population of 1,050 per km² and 603 per km² respectively (see **Table 6.3**) (BPS Kabupaten Rembang, 2012).

Table 6.2 Employment distribution of Surakarta Municipality, 2007-2011 (workers)

No.	Sector	2007	2008	2009	2010	2011	Annual Growth (%)
1.	Agriculture, livestock, forestry, and fishery	1,560 <i>0.59</i>	1,743 <i>0.69</i>	1,743 <i>0.69</i>	2,608 <i>1.05</i>	1,366 <i>0.57</i>	-3.11
2.	Mining and quarrying	0 <i>0.00</i>	0 <i>0.00</i>	0 <i>0.00</i>	0 <i>0.00</i>	0 <i>0.00</i>	0.00
3.	Manufacturing	58,238 <i>22.13</i>	44,222 <i>17.47</i>	44,222 <i>17.47</i>	42,065 <i>16.91</i>	46,189 <i>19.41</i>	-5.17
4.	Electricity, gas, and water	486 <i>0.18</i>	604 <i>0.24</i>	604 <i>0.24</i>	700 <i>0.28</i>	315 <i>0.13</i>	-8.80
5.	Construction	10,042 <i>3.82</i>	7,134 <i>2.82</i>	7,134 <i>2.82</i>	9,217 <i>3.70</i>	10,251 <i>4.31</i>	0.52
6.	Trade, hotel, and restaurant	111,887 <i>42.52</i>	108,870 <i>43.01</i>	108,870 <i>43.01</i>	106,426 <i>42.78</i>	99,300 <i>41.72</i>	-2.81
7.	Transportation and communication	17,665 <i>6.71</i>	18,221 <i>7.20</i>	18,221 <i>7.20</i>	16,815 <i>6.76</i>	15,570 <i>6.54</i>	-2.96
8.	Bank, rental, and business services	6,274 <i>2.38</i>	8,745 <i>3.46</i>	8,745 <i>3.46</i>	9,157 <i>3.68</i>	9,091 <i>3.82</i>	11.22
9.	Services including government services	55,003 <i>20.90</i>	61,562 <i>24.32</i>	61,562 <i>24.32</i>	59,780 <i>24.03</i>	53,916 <i>22.65</i>	-0.49
Total Number		263,162	253,109	253,110	248,778	238,009	-2.39
Population Number		515,372	522,935	528,202	499,337	501,650	-0.67
Employment Ratio		0.51	0.48	0.48	0.50	0.47	-1.96

Remark: the italic-written numbers show the respective employment share each year (%)

Source: Modified from Badan Pusat Statistik Kota Surakarta (2011) in BAPPEDA Kota Surakarta (2011, p. 29)

The employment structure of Rembang is predominantly influenced by agriculture (46.74%), trade (18.38%), and services sectors (13.85%). However, together with the mining and transportation sectors, the agricultural sector is declining. This indicates that the primary sectors are no longer attractive for employment opportunities even though the population increases every year. An employment shift from primary to trade and services sectors is likely to occur within the Rembang Regency instead (see **Table 6.4**).

Table 6.3 Population distribution by subdistrict in Rembang Regency, 2011

No.	Subdistrict	Population (lives)	Area (km ²)	Density (lives/km ²)
1.	Sumber	33,734	76.73	440
2.	Bulu	25,760	102.40	252
3.	Gunem	22,924	80.20	286
4.	Sale	35,998	107.14	336
5.	Sarang	60,870	91.33	667
6.	Sedan	51,688	79.64	649
7.	Pamotan	44,176	81.56	542
8.	Sulang	37,137	84.54	439
9.	Kaliori	38,986	61.50	634
10.	Rembang	85,138	58.81	1,448
11.	Pancur	27,687	45.94	603
12.	Kragan	59,041	61.66	958
13.	Sluke	26,816	37.59	713
14.	Lasem	47,307	45.04	1,050
Total		597,262	1,014.08	589

Source: Badan Pusat Statistik Kabupaten Rembang (2012, pp. 2, 56)

Table 6.4 Employment distribution of Rembang Regency, 2007-2011 (workers)

No.	Sector	2007	2008	2009	2010	2011	Annual Growth (%)
1.	Agriculture, livestock forestry, and fishery	179,168 60.64	155,535 55.37	169,091 55.94	171,748 56.38	140,266 46.74	-5.43
2.	Mining and quarrying*	1,910 0.65	3,720 1.32	2,657 0.88	822 0.27	N/A	-18.99
3.	Manufacturing	21,095 7.14	28,846 10.27	27,792 9.19	29,639 9.73	28,833 9.61	9.17
4.	Electricity, gas, and water	N/A	N/A	N/A	N/A	N/A	N/A
5.	Construction	12,291 4.16	14,848 5.29	15,333 5.07	11,274 3.70	19,542 6.51	14.75

Continued in the next page

Table 6.4 continued

No.	Sector	2007	2008	2009	2010	2011	Annual Growth (%)
6.	Trade, hotel, and restaurant	42,339	42,191	51,709	46,341	55,160	7.57
		<i>14.33</i>	<i>15.02</i>	<i>17.11</i>	<i>15.21</i>	<i>18.38</i>	
7.	Transportation and communication	12,888	13,762	11,899	12,920	11,163	-3.35
		<i>4.36</i>	<i>4.90</i>	<i>3.94</i>	<i>4.24</i>	<i>3.72</i>	
8.	Bank, rental, and business services	2,153	2,344	2,449	761	3,569	16.44
		<i>0.73</i>	<i>0.83</i>	<i>0.81</i>	<i>0.25</i>	<i>1.19</i>	
9.	Services including government services	23,613	19,658	21,330	31,133	41,563	19.00
		<i>7.99</i>	<i>7.00</i>	<i>7.06</i>	<i>10.22</i>	<i>13.85</i>	
	Total Number	295,457	280,904	302,260	304,638	300,096	0.39
	Population Number	583,234	586,587	589,819	593,360	597,262	0.60
	Employment Ratio	0.51	0.48	0.51	0.51	0.50	-0.49

Remark: * the employment numbers also include electricity, gas, and water sector

The italic-written numbers show the respective employment share each year (%)

Source: Modified from Badan Pusat Statistik Provinsi Jawa Tengah (2018-2012)

Economic Performance

Recently, Surakarta's economy has been growing at an annual rate of 14.78% and such high performances have mainly shaped by trade (26.25%), manufacturing (20.32%), construction (14.42%), and services sectors (13.69%). On average the income per capita in 2011 achieved US\$ 1,820 per year. By combining this with employment growth figures shown on Table 6.2, we can conclude that the city has been growing as a centre for trade and services. Even though the sector's average productivity levels are low compared to other non-agriculture sectors – the trade sector was USD 2,420 per worker and services sector was USD 2,330 per worker, both referring to 2011 data. Their contributions remain significant to the economy as indicated by the impressive growth rate of 17.14% and 20.21% respectively (see **Table 6.5**).

The economic situation is different in Rembang Regency. Rembang's economy relies on agriculture (44.56%), trade (17.30%), and services sectors (14.82%). The economy was growing at 12.63% annually, and all sectors increased above 10% per year except the mining and quarrying sector with a 7.34% growth rate. The average annual income per capita in 2011 was USD 760 (see **Table 6.6**). By comparing this with Table 6.4, we can conclude that the region reflects a rural economy. Not surprisingly, the productivity levels of the entire economy are very low. The capita share of the agricultural sector was USD 1,450, the trade sector USD 1,430, and the services sector USD 1,620. Thus, the overall positive growth trend is still insufficient to boost local economic viability due to low productivity levels. Such circumstances show Rembang in a lagging region and placed on the lower group of municipalities/regencies with poor economic performance in Central Java Province.

Table 6.5 Gross Regional Domestic Product of Surakarta Municipality
at current prices, 2007-2011 (thousand USD)*

No.	Sector	2007	2008	2009	2010	2011	Annual Growth (%)
1.	Agriculture, livestock forestry, and fishery	354.95 <i>0.06</i>	393.85 <i>0.06</i>	417.30 <i>0.06</i>	461.07 <i>0.06</i>	493.97 <i>0.05</i>	9.79
2.	Mining and quarrying	210.48 <i>0.04</i>	245.44 <i>0.04</i>	245.40 <i>0.03</i>	245.20 <i>0.03</i>	250.87 <i>0.03</i>	4.80
3.	Manufacturing	140,149.19 24.34	153,208.31 23.27	160,446.32 21.68	173,457.91 20.94	186,103.98 20.32	8.20
4.	Electricity, gas, and water	15,510.04 <i>2.69</i>	16,944.83 <i>2.57</i>	18,994.74 <i>2.57</i>	21,583.71 <i>2.61</i>	23,964.72 <i>2.62</i>	13.63
5.	Construction	77,055.39 13.38	95,070.54 14.44	109,515.83 14.80	120,043.78 14.49	132,054.95 14.42	17.84
6.	Trade, hotel, and restaurant	142,648.87 24.78	165,391.52 25.12	185,296.75 25.04	213,040.27 25.72	240,441.12 26.25	17.14
7.	Transportation and communication	66,842.19 <i>11.61</i>	73,745.98 <i>11.20</i>	82,193.58 <i>11.11</i>	92,185.79 <i>11.13</i>	100,508.90 <i>10.97</i>	12.59
8.	Bank, rental, and business services	63,657.33 <i>11.06</i>	71,993.44 <i>10.93</i>	81,362.92 <i>10.99</i>	93,613.54 <i>11.30</i>	106,889.88 <i>11.67</i>	16.98
9.	Services including government srvc.	69,329.44 12.04	81,496.61 12.38	99,334.75 13.42	113,796.80 13.74	125,372.54 13.69	20.21
Total Amount		575,757.88	658,490.51	740,057.60	828,428.05	916,080.93	14.78
Population Number		515,372	522,935	528,202	499,337	501,650	-0.67
GRDP Per Capita		1.12	1.26	1.40	1.66	1.82	15.63

Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000

The italic-written numbers show the respective sectoral share each year (%)

Source: Modified from Badan Pusat Statistik Kota Surakarta (2011, pp. 35, 243-244)

Table 6.6 Gross Regional Domestic Product of Rembang Regency
at current prices, 2007-2011 (thousand USD)*

No.	Sector	2007	2008	2009	2010	2011	Annual Growth (%)
1.	Agriculture, livestock, forestry and fishery	140,278.75 46.37	155,113.25 45.53	168,432.58 45.13	188,456.33 45.28	202,894.42 44.56	11.16

Continued in the next page

Table 6.6 continued

No.	Sector	2007	2008	2009	2010	2011	Annual Growth (%)
2.	Mining and quarrying	5,866.75 1.94	6,385.50 1.87	6,908.67 1.85	7,284.58 1.75	7,589.33 1.67	7.34
3.	Manufacturing	12,169.58 4.02	13,540.17 3.97	14,510.00 3.89	15,741.42 3.78	17,237.75 3.79	10.41
4.	Electricity, gas, and water	1,157.50 0.38	1,317.25 0.39	1,457.50 0.39	1,695.00 0.41	2,035.33 0.45	18.96
5.	Construction	25,129.50 8.31	29,558.17 8.68	33,547.75 8.99	37,705.33 9.06	41,881.00 9.20	16.67
6.	Trade, hotel, and restaurant	53,539.25 17.70	58,892.33 17.29	64,523.17 17.29	70,926.00 17.04	78,775.00 17.30	11.78
7.	Transportation and communication	16,350.00 5.40	19,108.83 5.61	21,118.42 5.66	23,175.08 5.57	25,011.00 5.49	13.24
8.	Bank, rental, and business services	7,004.25 2.32	7,789.25 2.29	8,584.00 2.30	9,505.83 2.28	10,441.08 2.29	12.27
9.	Services including government srves.	39,043.42 12.90	46,981.58 13.79	52,124.67 13.96	59,658.58 14.34	67,482.67 14.82	18.21
Total Amount		302,546.00	340,694.33	373,257.34	416,158.15	455,358.58	12.63
Population Number		583,234	586,587	589,819	593,360	597,262	0.60
GRDP Per Capita		0.52	0.58	0.63	0.70	0.76	11.54

Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000

The italic-written numbers show the respective sectoral share each year (%)

Source: Modified from Badan Pusat Statistik Kabupaten Rembang (2012, pp. 53, 255)

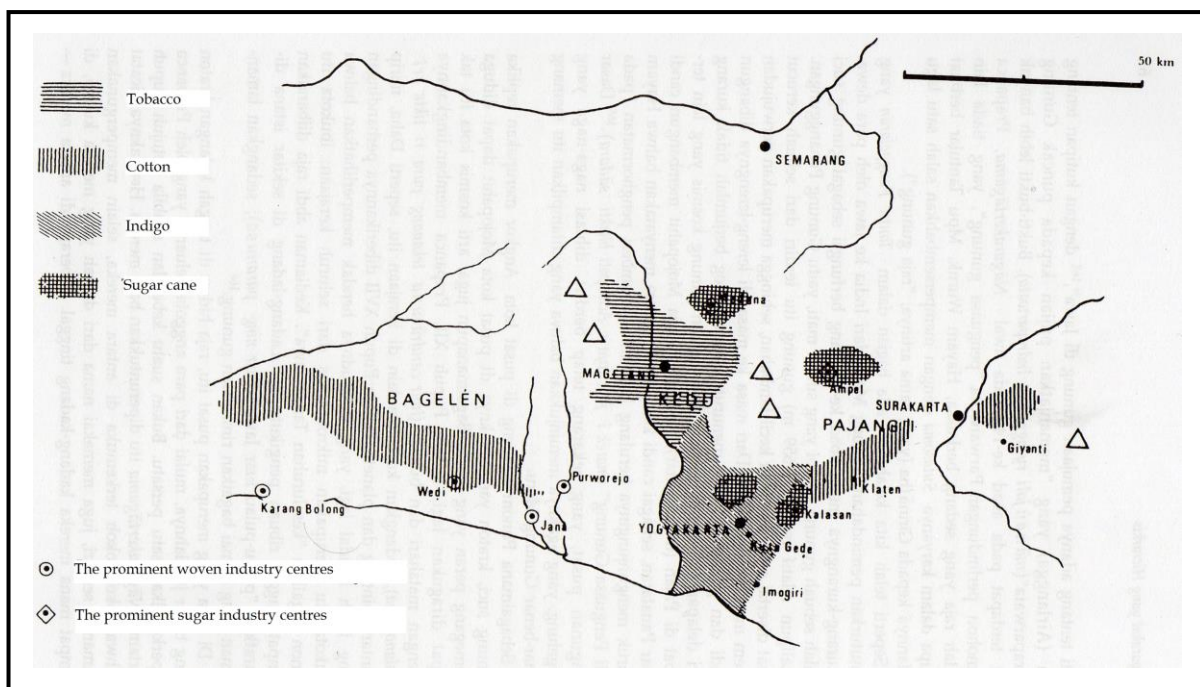
Socio-Cultural Background

Historically, both Surakarta and Rembang societies stem from the Javanese tradition. Apart from geographical homogeneity, their socio-cultural relations can be traced back to the Majapahit Monarchy period (1293-1478). Prior to the Majapahit Monarchy, Java's territory was split into several kingdoms fighting each other to gain domination. After being united by the fourth king Rajasanagara Dyah Hayam Wuruk (1350-1389), those kingdoms were managed as vassals or satellite regions of the ruling Majapahit authority. The former kings and queens were assigned to control territorial development at local levels. Through royal marriages and strategic alliances such a hierarchical decentralisation system was well maintained. Not only in a matter of extended family relationships and multi-layered cooperation had the central government been successful in accommodating different socio-cultural backgrounds but it also facilitated the former Buddhism and Hinduism monarchies to co-exist together with local Javanese customs and others since the territory covered Indonesian archipelago, Malay Peninsula, and small part of Southern Asia. Immediately such socio-cultural adaptation resulted in Javanese *kejawen* syncretism, a new religion

which blended Buddha-Hindu-Islam religions with indigenous animisms and dynamisms (Lombard, 2008c).

After the demise of Majapahit Monarchy these kingdoms separated again looking for independence. Prior to the existence of Surakarta there was a territory of Pajang Monarchy (1568-1586) followed by the Islamic Mataram Monarchy (1588-1681). As mentioned earlier in Chapter 4, Kampung Laweyan used to be a tax free land of the Majapahit Monarchy. When the Pajang Monarchy was ruled by Sultan Hadiwijaya, Laweyan land was given to Ki Ageng Henis – the ancestor of Laweyan society – as a gift for his service to put down a rebellion attempt from Arya Panangsang of Jipang Panolan Regency (*kadipaten*). At the same time, Ki Ageng Henis’ son and grandson, Ki Ageng Pamanahan and Sutawijaya, were given Mataram land. Later, Sutawijaya established the Islamic Mataram Monarchy in Alas Mentaok nearby the Kotagede site of Yogyakarta (Widhiarso, personal communication, December 23, 2011). During that time the Pajang-Laweyan area was a cotton plantation area. There were many small home industries producing traditional woven fabrics at least until the Dutch colonisation era (see **Figure 6.5**) (Lombard, 2008c).

Figure 6.5 Plant locations in Java before Javanese War 1825-1830

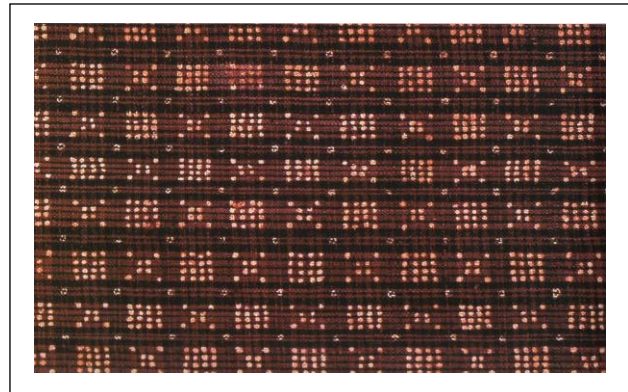


Source: Carey (1984) in Lombard (2008c, p. 62)

In the next years Kampung Laweyan transformed from residential to business settlement. The first change took place during the second half of the 17th century following the movement of Ki Ageng Henis and his family into Laweyan. A local folklore believes that batik skills were first introduced by Ki Ageng Henis to the Laweyan society which was accustomed to the weaving industry. However, according to local historian Mr. Soedarmono (personal communication, February 8 and March 6, 2012), this perception is doubtful since the principal role of the *ulama* (Islamic missionarist) attributed to Ki Ageng Henis was to spread religious lessons to the locals, not to teach them batik techniques. In my viewpoint, batik production had been a local expertise centuries ago because the Pajang-Laweyan area used to be a vassal of the Majapahit Monarchy. Batik clothing was worn both by royal family

members or ordinary people. The differences might apply on the use of intricate techniques and motifs and its specific functions. During that time there were no forbidden court batik motifs restricted by the ruling authority. Thus, the early entrepreneurial society of Laweyan had been familiar with batik skills and motifs. So, it is plausible to acknowledge this period as a transition from woven to batik industry. Previously, one of the famous types of traditional woven fabrics was *kain lurik* which was produced exclusively in Klaten, an area located on the southwest of Surakarta (see **Figure 6.1**). The transition resulted in *batik lurik* cloth (see **Figure 6.6**) which combined traditional weaving handloom technology and handmade batik skills using a *canting* tool (refer to the development date of *canting* tools in the 17th century explained in Chapter 4).

Figure 6.6 An example of *batik lurik* motif produced in Kerek Village, Tuban Regency (East Java Province). The basic horizontal lines of *lurik* fabrics are added by geometric pattern of batikked dots and batik dyeing process.



Source: Siswandi (1999, p. 34)

The second change took place from the 1800s to 1920s when Kampung Laweyan became the largest batik production centre in Surakarta. In line with the invention of the stamping tool (1850s), the modernisation of the batik industry (1870s), and the opening of the new railroad routes from *vorstenlanden* (Java's mainland occupied by former Mataram Monarchy, i.e. Surakarta and Yogyakarta Courts) to Java's north coast by the Dutch colonial government (1870-1894) (Pusponegoro, Soim, & Muttaqin, 2007), the period was acknowledged as the golden era of the batik industry in Laweyan, marked by the possession of spacious high wall-mounted fortress-like houses, numerous land certificates, famous fancy Fiat cars, batik shops, and properties (Priyatmono, personal communication, December 22, 2011; Sulaiman, personal communication, January 6, 2012; Soedarmono, personal communication, February 8, 2012). In addition, the Laweyan batik industry was also benefited from its natural landscape attached to Kali Jenes River which connected to the greater Bengawan Solo River. According to Widhiarso (personal communication, December 23, 2011) and Sulaiman (personal communication, January 6, 2012) the river used to be an important transportation route for batik trading from *Bandar Kabanaran* (Kabanaran Port) in Laweyan to the north coast regions, particularly Demak, Tuban, and Gresik, and vice versa. Even the first Indonesian batik exporter, Mr. Tjokrosumarto of Laweyan, transported batik products by this river as well. The river was also useful to support the growth of the batik industry in Laweyan since the industry was water consumptive in nature, particularly for multiple dyeing and washing processes.

The home-based batik industry complex in Kampung Laweyan was stirred by the dominance of a *juragan batik* (large batik master) called *Mbok Mase* (female batik entrepreneur). Within the *Mbok Mase* system the female entrepreneurs directed overall batik business whereas their husbands were limited to production control only. *Mbok Mase* also engaged in batik trading and marketing through direct selling in local marketplaces and other regions

(Widhiarso, personal communication, December 23, 2011; Soedarmono, personal communication, February 8, 2012). Such circumstances contradicted the common Javanese tradition because women took the lead in family home business over men. Another gendered division of labour is also applied on the production line where the female batik workers were responsible for handwritten batik making whereas the male workers for stamping, dyeing, wax removal, and finishing processes. Such labour division has been sustained up to now especially regarding adjustment towards new technology. Male workers were more responsive to using both handheld and modern technology from the stamping tool (*batik cap*) to manual screen printing (*batik sablon*) and the printing machine (*batik printing*). As a result, female co-workers remained steady in handwritten batik making and less flexible in competing for different jobs.

During this period, according to Puspongoro et al (2007) and Priyatmono (personal communication, December 22, 2011), the batik industry in Kampung Laweyan specialised in stamping batik products characterised by the mass production industry and merchant batik motifs to meet the general market segment. With the outstanding success in the batik industry Laweyan society became a closed society who behaved in an unfriendly manner towards outsiders. As batik entrepreneurs they worked individually and were accustomed to competing freely. The building of high walls surrounding their houses also functioned to protect batik designs from rival imitation. Batik entrepreneurs protected the batik workers, particularly the skilled male batik stampers, from being hijacked by rivals. If stealing of batik designs or workers occurred, it could lead to disastrous conflicts between batik entrepreneurs. Sometimes it might cause fatalities due to the physical battles involving family members and batik workers. The incident was known as “*parit merah*” (red ditches) to illustrate the worst effects of social conflicts resulting from strong business competition. On the other hand, limited business cooperation occurred based on family-tied relationships and subcontracting patterns. Such closed business networks were maintained over generations in order to secure the originality of confidential batik products (Soedarmono, personal communication, February 8, 2012).

While enjoying the golden era, another transitional period of the Laweyan batik industry started in the 1900s and intensified in the following decades due to greater involvement of indigenous batik entrepreneurs in political movements. This period marked the third change of the batik industry in Laweyan. Initiated by batik entrepreneurs from Kampung Laweyan Mr. K.H. Samanhoedi (1905) and Mr. H.O.S. Tjokroaminoto (1912), the early indigenous trade union and political parties were set to fight against the hegemony of Chinese and foreign players in cloth and batik trading. It created restrictions for indigenous batik entrepreneurs to access imported cloths due to the Dutch colonial government control policy over import networks and distribution. On the contrary, their foreign counterparts of Dutch, Chinese, Arabic, and Indian entrepreneurs were privileged to access imported batik materials and other resources. The movements manifested in direct confrontation by strengthening trade networks of indigenous entrepreneurs (Priyatmono, personal communication, December 22, 2011; Widhiarso, personal communication, December 23, 2011; Sulaiman, personal communication, January 6, 2012; Soedarmono, personal communication, February 8, 2012). However, these movements failed because of a strong cartel system orchestrated by the colonial government and less coordinated movements by the indigenous leaders who more concentrated on local interests. The success of Mr. Tjokrosumarto to export batik fabrics hence could be viewed as a breach of this hegemony.

In the 1930s the movements were intensified and changed from individual-led trade unions to collective-driven batik cooperatives that spread sporadically in many cities. At the beginning, the batik cooperatives still concentrated at local levels for the sake of their members only. In 1934 some representatives of local batik cooperatives – from Surakarta was represented by the Laweyan batik entrepreneur Mr. Wongsodinomo (the chief of PPBS cooperative) – met the ruling colonial government official to negotiate the on-going cloth and batik trading policy, but they failed again. Finally, they joined the movements and brought them up to national level by establishing GKBI in 1948 to create independent import networks. This effort was successful in promoting GKBI in taking over the cloth and batik trading monopoly (see Chapter 4 for additional information). However, this success was resulted not only from the never-ending attempts of indigenous batik entrepreneurs. There had also been a series of momentums that has eased such achievement, i.e. the economic downturn in the Netherlands due to the World Wars, the increased cheaper cotton cloths from Japan, and the Fortress Program by the Indonesian central government to encourage a protection policy for domestic industry.

From time to time the political agenda remained the same, i.e. taking over the control of cloth and batik trading from the hands of foreign competitors, but the approach changed from individual to collective actions and from local to national levels. As a result of prolonged political movements and the effects of the post-war economic downturn the national batik industry declined, including in Kampung Laweyan and many other batik production centres. Not only in economic scale had the batik industry in Laweyan declined, but the role of *Mbok Mase* was also downgraded and taken over by husbands mainly to finance political movements and expand the batik business. From the 1950s onwards the male batik entrepreneurs in Kampung Laweyan led the family business and expanded the market networks to distant cities and regions (Soedarmono, personal communication, February 8, 2012). Following an improved cloth supply by GKBI and subsequent batik demand increase, the market of Laweyan batik products (and of course the national batik supply as well) enlarged. The key driver of this enlarged market was the government demand nationally for batik uniforms and official dressing in formal ceremonies. *Mbok Mase*, who was not accustomed to dealing with bureaucratic government procurement and had limited mobility to reach distant markets, was immediately marginalised. Therefore, male batik entrepreneurs in Kampung Laweyan who had better negotiation skills and mobility took over the role of *Mbok Mase* almost completely. The former *Mbok Mase*'s role however remained influential in determining overall production processes and maintaining existing business networks based on family relationships, friendship circles, door-to-door and direct marketing at local marketplaces. Such circumstances marked the fourth wave of socio-cultural shift in the Laweyan batik industry, and it has continued until the present.

In the case of the batik industry in Kampung Kauman, the socio-cultural background is associated with the emergence of the Surakarta Monarchy. It existed more than 150 years after the Pajang and Mataram Monarchy periods. Its establishment was associated with a series of palace movements of Mataram kingship and the heightened foreign influences of VOC governors. Due to rebellions in the Emperor's family circle the Mataram Palace was moved several times, first to Karta, Plered (both located in Yogyakarta), and finally to Wanakarta Village of Kartasura (Sukoharjo Regency). After being severely attacked and ruined by ethnic Chinese military troops in 1742 – an incident called *Geger Pecinan* (Chinese War) led by the king's brother-in-law Raden Mas Garendi (aka Sunan Kuning) during 1740-1743 – the ruling Mataram king Susuhunan Paku Buwono II moved the palace to *Desa Sala*

(aka Solo Village) at its current site. On February 17th, 1745 King Susuhunan Paku Buwono II (1745-1749) established *Keraton* Surakarta (Surakarta Court), and the former territory of Solo Village was renamed *Nagari Surakarta Hadiningrat* (Surakarta Principality) (Winarti, 2004; Priyatmono, personal communication, December 22, 2011). During his escape from Kartasura, King Susuhunan Paku Buwono II with his families and loyal supporters stopped in Kampung Laweyan and begged for protection from local residents. However, his plea was rejected because of local residents' fears of rebels' running amok and public sentiment towards his disgraceful closeness to the VOC administration. Then this escaped group ran to Ponorogo (East Java Province) before returning to Surakarta with an escort from VOC military troops to build a new palace Surakarta Court. Since then the king has sworn to oppose and forbid his families to have any connections, including marriage, with Laweyan society (Soedarmono, personal communication, February 8, 2012).

According to Puspongoro et al (2007) and Musyawaroh (personal communication, March 14, 2012), Kampung Kauman existed shortly after the building of the Great Mosque of Surakarta in 1757. The ruling king, Susuhunan Paku Buwono III (1749-1788), commanded the building of the mosque and appointed a royal servant (aka *abdi dalem keraton*) responsible for its maintenance, Islamic *syiar* (religious teachings), and the spread of the king's words in religious affairs. This royal servant obtained the official position of *Penghulu (Tafsir Anom)*, a high ranking public official similar to Ministry of Religious Affairs. He was also called *abdi dalem pamethakan* – the Javanese word *pamethakan* refers to a whiteness quality which symbolises the holy missions to teach Islamic lessons to the public. He acted as the king's arm-length minister to spread the religion. The king named himself *Sayyidin Panatagama Khalifatullah*, meaning that he was the highest religious leader responsible for ensuring the creation of an Islamic society inside the monarchy. To accomplish his task, the king gave the appointed *Penghulu* a land parcel on the north of the mosque to build his residence. He had a number of deputies for different functions and responsibilities: 1) *Khotib* to provide sermons for regular worship events, 2) *Modin* to alarm prayer times and undertake clerical jobs related to religious events, 3) *Qoyyim* to assist *Modin's* duties, and 4) *Merbot* to undertake cleaning services inside the mosque premises. All these *Penghulu* assistants built houses behind the mosque, and by the following years there were many royal servants living there. Soon the settlement area around the Great Mosque was identical to *Perkauman*, a unique settlement complex occupied at most by *abdi dalem keraton* who supported the Islamic-ordered society. Since then Kauman society has been recognised as the *santri* class, i.e. a group of Javanese society who ascribes to the Islamic tradition.

As the national batik market intensified in the 1800s, it triggered the first transformation of Kauman from *kampung santri* (an Islamic-featured neighbourhood) to a business settlement, showing that the batik industry in Kampung Kauman began two-and-half centuries after that of Kampung Laweyan. According to Musyawaroh (2012, personal communication, March 14, 2012), the oldest home-based batik factory artefact discovered in Kauman was established in 1828, indicating the rise of the industry around the early 1800s. However, according to Puspongoro et al (2007), the date of 1828 probably referred to the ancient Javanese calendar which was equal to 1898 AD. This was more logical and corresponded to the times when King Susuhunan Paku Buwono X (1893-1939) granted trading licenses to his royal servants' families to get involved in the commercial sector particularly batik trading. In the Javanese aristocratic realm it was a kind of taboo for royal servants and their families to engage actively in economic sectors, because it was perceived to humiliate the ruling king's dignity (Soedarmono, personal communication, February 8,

2012). Therefore, in line with the declaration of forbidden batik motifs by King Susuhunan Paku Buwono III and his successor King Susuhunan Paku Buwono IV (refer to Chapter 5) this transformation did not result in radical change from a residential to a batik business neighbourhood.

Along the glorious period of the Laweyan batik industry (1800s-1920s), the batik industry in Kauman grew slowly because of physical and social constraints. Located right in the city centre near *alun-alun* (public square) of Surakarta, Kampung Kauman occupied limited space for a residential area and functioned as the centre for Islamic teachings. Consequently, the economic share of the batik industry in Kauman was less significant than that in Laweyan, and the outcomes were utilised more to support social and educational activities than the aggressive expansion of the batik industry. In this sense, the early business groups in Kampung Kauman maintained traditional Javanese aristocracy, Islamic *syariah* (religious rules), and economic opportunities of growing batik market in balance. There were some prominent social and educational organisations existed in Kauman such as Sarekat Ngrukti Sawa (1914), Muhammadiyah (1923), and Nahdlatul Muslimat (1931). These organisations focused on supporting the betterment of socio-religious life and educational skills for the Kauman society and *priyayi Keraton* (aristocratic family members of Surakarta Court) even though ordinary citizens of Surakarta were welcome to join in (Pusponegoro et al, 2007).

In daily life the strong attachment of the Kauman society to the Surakarta Court made them bonded with Javanese-Islamic culture. The men were always superior to the women to whom they were responsible for leading and protecting the home and social life. Due to higher status as royal servants, both the men and women were obliged to behave in compliance with *Keraton's* rules and order to maintain the king's dignity and his family. As a result, *Mbok Mase* Kauman were limited to run batik business compared to their counterparts in Laweyan. Initially, they used to be batik makers who supplied batik clothing exclusively for *Keraton* family members. They learned the finest batik techniques and motifs directly from *Keraton* batik masters and family members.

Regarding the origin of batik skills possessed by Kauman women, some scholars argued that it was inherited from *Keraton's* tradition, from which the court batik mainstream and forbidden batik motifs emerged. The king assigned a number of *nyai abdi dalem* (the royal servant's wife) to produce batik clothing for royal family members. As demands for court batik increased against an exclusive limited supply, the king allowed batik makers outside the *Keraton* walls to produce but under certain technical supervisions (Musyawaroh, personal communication, March 14, 2012; Mustangidi, April 9, 2012; Setiawan, personal communication, April 9, 2012).

“The highest titled wife at the Mataram Court was considered equal in status to the ruler; she wore the same batik design as the ruler himself. A Dutch visitor to Mataram in 1656 saw the Susuhunan served and surrounded by 10,000 women, 4,000 of whom were seen spinning, weaving, embroidering, painting and sewing.”

Source: de Graaf (1956, pp. 256-257) in Laarhoven (2012, p. 6)

In contrast, others believed that batik making was a customary skill equipped by Javanese women over generations. Similar to weaving skill and any other traditional textile production techniques, it emerged from people's handicraft traditions and was influenced by *Keraton's*

tradition through imitation processes or direct training (Elliott, 2004; Soedarmono, personal communication, February 8, 2012; Soim, personal communication, April 3, 2012).

In my viewpoint, none of those arguments are absolutely true because in fact it might have come from both sides at once. The first wave originated from *Keraton* assignment towards *nyai abdi dalem* to produce exclusive batik clothing through direct training and supervision. *Keraton* apprenticeship was limited to family members and royal servants only through which the quality of court batik was distinguished from other batik mainstreams. Due to growing court batik orders from the *Keraton* family and batik trading in Surakarta during the 1800s-1920s, either the group of *nyai abdi dalem* or common batik makers could have expanded the batik business. The second wave started from an imitation process by common batik makers. Inspired by the excellence of and greater enthusiasm from public consumers for the court batik style (aka classical batik motif), they learned to adapt the *Keraton* style in batik techniques and motifs to enrich existing merchant batik. Thus, they possessed family-inherited batik skills first and became enriched by the finest court batik skills later to respond to a market change.

Responding to potential benefits from the growing batik market, *Mbok Mase* Kauman were tempted to start up batik business for (mostly) secondary income sources. The justification related to insufficient regular salary earned from working as royal servants. *Keraton* was no longer able to entirely finance the daily needs of royal servants while their families sought better living conditions. However, they were unable to start up batik businesses straightaway due to *Keraton*'s rules related to "business permits" and the tribute to the king's family dignity. Their husband had to request "a business permit" to the king. Once the king and the husband had approved, *Mbok Mase* could run the business under a husband's control. In the Javanese-Islamic culture women's submission to men was a principal rule to order human relations and activities. As the women's leader the men were responsible for the fulfilment of their wives and families' needs ranging from material possessions to self-protection while the women were responsible for household management and child care. Such predetermined rules therefore limited women's activities outside the home as applied to the *Mbok Mase* group in Kauman (Pusponegoro et al, 2007; Soedarmono, personal communication, February 8 and March 6, 2012; Musywaroh, personal communication, March, 14, 2012).

Accordingly, the growth of the home-based batik industry in Kampung Kauman during the period of 1800s-1920s was less significant than Kampung Laweyan. In terms of industrial size only a few large batik firms existed in Kauman, and most batik entrepreneurs were connected each other through family bonding. The industry grew from inside without any business connections or intervention from the Surakarta Court. Strong horizontal and vertical business linkages took place vividly because of the remarkable social cohesion and crowded side-by-side settlement layout. The limited neighbourhood space actually encouraged the Kauman society to build close social and business relations, thanks to the legacy of the Javanese-Islamic tradition that had shaped such a sticky social system. Moreover, according to Musywaroh (2001) and Pusponegoro et al (2007), the socio-spatial division in Kauman was noticeable through the names of sub-settlement areas indicating the names and roles of prominent royal servants, building functions, specialised employments, and featured social activities. For example, there were Modinan and Sememen referring to the house of *modin* and *khotib* Sememi; Gerjen and Blodiran referring to the concentration of tailor and embroidery works; and Keplekan referring to the place for (gambling) card play. Since the batik business was something of a side job for *Mbok Mase* Kauman, hence the

industrial composition was dominated by batik traders rather than batik producers, contrary to Kampung Laweyan.

This was not surprising since the Kampung Kauman site was surrounded by a famous traditional marketplace Pasar Klewer and Coyudan-Singosaren-Nonongan trading zone. Before the batik industry appeared in Kauman this surrounding area was already the busiest trading centre in Surakarta. Here were a lot of batik shops along with textile and clothing, consumer goods, and jewellery shops. The move of former Pasar Klewer from Slompretan Square to the current site facilitated by the ruling King Susuhunan Paku Buwono III in 1785 had triggered the increase of batik trading intensively. Initially, the market accommodated textile and clothing traders, but since its movement it was growing to become a traditional batik trading centre as well. However, following its renovation in 1970 Pasar Klewer became an indoor market dominated by printed batik products.

From the 1930s onwards the batik industry in Kauman suffered the same periods of hardship as its rival Laweyan because of the effects of the post-World War and domestic political upheaval. Similar to Laweyan, many batik entrepreneurs became involved in political movements to face foreign hegemony as exemplified by Haji Misbach, the founder of *Serikat Dagang Islam Merah* (SDI Merah) which was closed to the Indonesian Communist Party; and Muchtar Bukhori, the founder of Muhammadiyah School in Surakarta who directed political movements through public education for the indigenous people (Puspongoro et al, 2007). Noticeably, those political and social organisations emerged at the expense of the batik industry. It were the men who played the leading role in the batik business even though *Mbok Mase* mostly ran the business. The role of *Mbok Mase* remained limited to producing and marketing batik products while the husbands took benefits from the business to support their activities in the public sphere. As a consequence of the Javanese-Islamic patriarchal system, the success of *Mbok Mase* Kauman in batik trading was still under the shades of their husbands. Regardless of a nationwide batik industry decline starting from 1950s to the early 2000s, such circumstances have not changed up to now. The batik industry in Kampung Kauman has maintained a rigid social system to underpin strong social cohesion.

In the meantime, the socio-cultural background of the batik industry in Lasem Area took a slight different pathway from that in Surakarta. If both batik industries in Kampung Laweyan and Kampung Kauman were founded with and mostly developed from the Javanese tradition, their counterpart in Lasem was greatly influenced by the Chinese tradition. The origin of the Lasem batik industry was probably linked to the reign of Majapahit Monarchy where Lasem Area became the satellite vassal of the monarchy. It was Rajasaduhita Indudewi, also known as Putri Indu Dewi Purnamawulan (deceased in 1415), the younger cousin of the fourth and most successful king of the monarchy Rajasanagara Dyah Hayam Wuruk, who ruled in Lasem since 1351, because of which she was entitled with Bhre Lasem. She was the older sister of Rajasaduhiteswari Dyah Nartaja (deceased in 1388) who ruled in another vassal region in Pajang Area entitled with Bhre Pajang. Later, Bhre Pajang became the ancestor of the Pajang Monarchy which controlled Laweyan tax free land. Therefore, by history Lasem Area was connected to Laweyan and subsequently to Kauman as well through which the early Javanese court batik mainstream was also probably being derived. During this period Lasem batik industry was a folk home-based industry to serve the royal family for clothing and not traded in the local markets. It was a kind of self-consumption commodity produced with the handwritten batik technique by using a wooden stick similar to a *canting* tool (Widi, 2009; Ishwara et al, 2011; Winarno, personal communication, April 27, 2012).

Still in the era of the Majapahit Monarchy, the Chinese influence to local batik mastery began following a series of political and trade expeditions along the Ming Dynasty period (1368-1644). The ruling Chinese Emperor Yong Le (1402-1424) assigned Admiral Ceng Ho (aka Zheng He) to lead the expeditions to build diplomatic contact with the Majapahit Emperor. On his last visit to Lasem in 1413, one of his naval crew Bi Nang Un requested to stay there with his wife Na Li Ni instead of returning to China. Soon this Chinese couple made friendly contacts with the locals, and transferred handicraft production knowledge to them. Bi Nang Un was known as a skilful blacksmith and craftsman while Na Li Ni was a cloth maker. They both introduced Chinese design arts and techniques to improve local expertise. Later, the Chinese cultural images were applied in batik making. In addition, the chicken blood red colour – in Javanese known as *getih pithik* – and multiple dyeing processes featured Lasem batik products with quality durable colour (*wantek*) (Winarno, personal communication, April 27, 2012; Witjaksana, personal communication, April 20, 2012). However, prior to Admiral Cheng Ho's visits there had been Chinese settlers in Lasem. Supposedly, some Chinese settlers pioneered the establishment of home-based batik industry by introducing a mixed Javanese-Chinese batik genre to the market. They entered the industry in response to intensified cloth trading in Java's north coast in particular (see Lombard, 2008b). Then some indigenous batik makers were recruited into the industry while the rest remained serving the Emperor's royal clothing demand. Thus, the adoption of Chinese culture into the industry and its expansion to Lasem market and its surroundings marked the second wave of socio-cultural transformation in the Lasem batik industry.

The third wave of full batik industrialisation started around the mid-1800s when the Dutch colonial government paid much attention to the development of a national textile industry including a batik industry. Considering profitable outcomes of traditional batik commodities, the colonial government facilitated batik industrial development (please refer to Chapter 4). By endorsing a capital investment regulation in 1860, the colonial government privileged large capitalists to develop the domestic industry, and it was the Chinese business group and foreign investors who benefited most from this regulation. The Chinese batik entrepreneurs were capable of taking control of the Lasem batik industry easily not only because of greater capital possession and entrepreneurial skills against the indigenous competitors, but also close relationships with the government. Not surprisingly, during the Dutch colonisation era the Chinese community was recruited by the government to collect various taxes from local residents and to become police/military troops, from which the Chinese ethnic group gained political and economic closeness to the government (Winarno, personal communication, April 27, 2012).

Thus, we can see a socio-political divide between the Chinese and the indigenous people to foster the batik industry in Lasem. The former could start up a batik business easily and hold the key role in the industry while the latter was to some extent being marginalised to become the Chinese-owned batik firms' employees. Furthermore, the industry featured a labour intensive mass production which maintained traditional handwritten batik making. Interestingly, such "structural discrimination" did not create detrimental social conflicts between the owners of Chinese batik firms and their Javanese employees. The owners treated them carefully just like family members, but on the other hand the employees considered batik making a secondary job after agricultural land cultivation. In general, the Chinese settlers – not only limited to the wealthy Chinese business group – could assimilate with local residents as well as the ruling authorities. One of their adaptive behaviours was to marry local women to secure their position in society (see Laarhoven, 2012). Thus, the

higher status and power held by the *juragan batik* (batik master) did not automatically provide a better bargaining position in the batik industry. Somehow they relied on the workers' availability of time to complete the batik processing.

Another important feature of the industry was the presence of gender equality among batik entrepreneurs. Both men and women could take a leading role in the batik industry ranging from production processes to marketing and trade networking. Intergenerational knowledge transfers were undertaken by a batik master to selected family members through in-house confidential apprenticeships during the childhood. Surprisingly, the dyeing formula was not taught entirely causing unsustainable dyeing quality maintenance by future generations. At this stage, it looked like a challenge for the successors to discover dyeing innovations to preserve the family batik tradition. This apprenticeship model was different compared to the batik industry in Kampung Laweyan and Kampung Kauman where the successors could learn batik skills in detail. As for batik workers, however, there remained a gender division of labour where the women were responsible for handwritten batik making and detailed processing while the men for the stamping batik making and finishing processes. Such circumstances have been continued for more than 150 years until the present regardless of fluctuating performance of the national batik industry development.

A slight socio-cultural change occurred from the mid-2000s when Lasem batik industry was taken over gradually by indigenous entrepreneurs. A number of former Javanese batik workers started up their own businesses separated from the ex-batik masters. After possessing sufficient capital and additional training facilitated by local governments, they run new batik firms independently. They adopted borrowing techniques, particularly from the Pekalongan batik centre, to enrich the Lasem batik authenticity which mainly carried out the Chinese tradition. This new batik generation no longer followed a *pakem* (a rigid rule in batik making), rather they introduced innovative batik designs, motifs, and dyeing instead. According to Kwan (personal communication, February 29, 2012) and Winarno (personal communication, April 27, 2012), the rise of Javanese-owned batik business was inseparable from the downturn of Chinese dominance in the Lasem batik industry. Until 1930 there were 157 batik firms with about 120s being owned by the Chinese. Due to political instability after the Independence Day and the introduction of a printing technology in 1970s, the industry has experienced continuous decline. The main cause of this was brought about by the availability of cheaper printed batik products. In this sense, the rigid attitude of Chinese batik masters to maintain traditional handwritten batik making made them lose influence in the industry. Therefore, the rise of Javanese-owned batik firms might act like a double-edged sword for the future development of the batik industry in Lasem Area.

6.2 Local Institutions in Batik Industry Clusters

Historically, the batik industry clusters in the three cases have been growing naturally from below. The spatial agglomeration of the industry started from a folk home-based industry which permeated traditional batik making in nature. Later, each batik cluster followed different development trajectories dealing with both internal and external forces. In this section I will explain how the current institutional setting of each batik cluster may respond to contemporary issues and challenges in the general batik industry development. The

interplay and reciprocal relations between government intervention, market change, and inter-firm linkages will be the primary focus of discussion.

Local Cluster Policy

In the Surakarta Municipality there is no specific batik cluster development policy. The term cluster can be found in the official development plans being inserted randomly without appropriate purpose. Instead of formulating a thorough cluster policy, the term is used interchangeably with *sentra* (centre) to identify a concentration of similar economic sectors in certain places which refers more to the Marshallian industrial district theory. In addition, there is no public consensus in understanding the cluster approach, rather each government agency insists on using different perceptions. For example, BAPPEDA prefers the term cluster while DISPERINDAG and *Badan Lingkungan Hidup* (BLH) or Local Environmental Protection Agency prefers *sentra produksi/industri* (production/industrial centre), and DISKOP-UMKM uses *Kelompok Usaha Bersama* (KUB) or joint business group. To make it worse, the group of entrepreneurs does not care about any technical term and jargon that the government uses as long as they can run the business well.

Based on *Peraturan Daerah* (PERDA) or Local Government Regulation No. 2/2007 about *Rencana Pembangunan Jangka Menengah Daerah (RPJMD) Kota Surakarta Tahun 2005-2010* (The Mid-Term Local Development Plan of Surakarta Municipality 2005-2010), the cluster approach is weighted more in inter-regional development cooperation affairs involving Surakarta and five surrounding regions, i.e. Boyolali Regency, Sukoharjo Regency, Wonogiri Regency, Sragen Regency, and Klaten Regency, from which the area is named by the abbreviation of participating regions: SUBOSUKOWONOSRATEN. It is merely associated with inter-regional economic linkages, and the batik industry in Surakarta is perceived as an enclave or has less inter-industrial linkages within that greater region. It is ironic since batik clusters in Surakarta actually are connected to batik production centres in those neighbouring regions such as Bekonang (Sukoharjo Regency), Masaran (Sragen Regency), Kedung Gudel (Klaten Regency), and Tirtomoyo (Wonogiri Regency). Those regions have been interconnected at least in batik processing, commuting workers, and batik outputs which are sold in Pasar Klewer. Furthermore, the cloth supply for the batik industry comes from textile factories located in those surrounding regions such as PT. Sri Rejeki Isman Textile (SRITEX), PT. Tyfountex, and PT. Danliris (Sukoharjo Regency), PT. Sari Warna Asli Tekstil and PT. Sekar Bengawan Abadi Tekstil (Karanganyar Regency).

Within the local development context the policymakers have perceived cluster as an object of policy targeting to which annual routine programming and budget allocation would be decided. Even though the importance of cluster approach to increase local competitiveness are mentioned several times in that mid-term development plan and various public sector policies, the concrete policy formulation to support cluster development among government agencies is unclear. Rather, each government agency keeps undertaking annual routine programming and budget allocation as a matter of business as usual where cluster is seen as “another way” for public spending. For example, DISPERINDAG requires the existence of cluster organisation or other forms of industrial grouping in order to deliver skill upgrading training, equipment grants, technical supervision, and promotion funding subsidies. The similar actions apply for other agencies so that overlapping programs and budget allocations occur frequently. Another feature of the “so-called cluster policy” in Surakarta is that

physical improvements and capacity building programs (e.g. trainings, supervisions) are favourable in policy targeting. All those efforts are aimed at supporting the manifestation of a development vision which has declared Surakarta to become a cultural city. Not surprisingly, such city branding has led government programs to deal with cultural aspects so that the preservation of cultural heritage sites, city signage, and physical settlement improvements are applied in Kampung Laweyan and Kampung Kauman.

Such policy direction has been sustaining as shown in the latest development plans. Based on PERDA No. 12/2010 about The Mid-Term Development Plan of Surakarta Municipality 2010-2015, the physical improvement programs are given more in Kampung Laweyan and Kampung Kauman mainly because both locations have numerous cultural heritage artefacts. A city walk development project along the primary road Jl. Slamet Riyadi and Purwosari area has been designed to provide better tourism access to Kampung Laweyan. The capacity building aspect is shown by providing microcredit incentives for cluster-like joint business groups and entrepreneurial trainings by DISKOP-UMKM, for instance. In the broader policy context the policy direction remains the same where the cluster approach is rather perceived a political jargon with unclear practicalities. In PERDA No. 2/2010 about *Rencana Pembangunan Jangka Panjang Daerah (RPJPD) Kota Surakarta Tahun 2005-2025* (The Long-Term Local Development Plan of Surakarta Municipality 2005-2025) the term cluster is used to express local economic development strategies which rely on small and medium enterprises (SMEs). The approach is expected excessively to resolve various issues ranging from local economic competitiveness upgrading, technology enhancement to business institutional development. However, again, there is unclear policy direction and coordination to actualise it.

In the Rembang case there is no specific cluster development policy either. However, the policy direction to promote a cluster is clearer than in the Surakarta case. With regard to local development vision to achieve an independent and wealthy society, PERDA No. 13/2008 about The Mid-Term Development Plan of Rembang Regency 2006-2010 points out the promotion of natural resources and local potentials development to achieve economic growth. The development of agriculture and ocean fishery sectors is prioritised more than other sectors. In doing so, the cluster approach is adopted to improve agriculture-led inter-industrial linkages. As for batik industry development, the local government emphasises the creation of batik tourism destinations and of batik trading pool in local cooperatives. Such policy direction was strengthened in the next PERDA No. 10/2010 about The Mid-Term Development Plan of Rembang Regency 2010-2015. The additional policy substances suggest the improvements in infrastructure provisions for industrial clusters and public services to encourage new SME clusters. It also suggests some capacity building programs to support cluster practice such as technical supervision to support industrial cluster network, business cluster development and partnerships, and entrepreneurship training. All these programs have been designed thoroughly to meet the objectives of broader policy, i.e. PERDA No. 1/2010 about The Long-Term Development Plan of Rembang Regency 2005-2025. The policy specifies a cluster approach in terms of channelling SME clusters in agro-industry and fishery sectors, and establishing Kampung Batik Lasem and batik trading pool to support tourism development.

So far policy consistency to support cluster development looks more convincing in Rembang Regency. It seems that the cluster approach has been regarded appropriately to encourage inter-industrial linkages even though the leading sector is agriculture and fishery sectors, not

the batik industry. In fact, the absence of a concrete batik cluster policy has led to fuzzy implementation of the cluster approach in the Lasem batik industry (refer to the following section for further discussion). Cluster serves no more than government jargon. Annual routine programming and budget allocation remains the conventional way for each government agency to follow, so that cluster adoption by the government has created little impact to improve policy coordination and inter-governmental cooperation. As a result, the egocentric behaviour of each government agency remains dominant to maintain such a “business as usual” tradition.

Another interesting and unusual government activity can be found clearly in both Surakarta Municipality and Rembang Regency. Both governments released the long-term development plan in the middle of the on-going mid-term development plan. Based on *Undang-undang* (Government Act) No. 25/2004 about *Sistem Perencanaan Pembangunan Nasional* (The National Development Planning System) the development plans are formulated regularly following a hierarchical order of administrative boundaries from national to local levels, of substantial comprehensiveness from general guidelines to detailed plans, and sequential timespan from long-term to annual term. With respect to the decentralisation system practice in Indonesia as regulated in the Government Act No. 32/2004 about *Pemerintahan Daerah* (Regional Autonomy), each local government may indeed create development plans to accommodate aspirations from within since the former centralised government system and top-down development mechanism no longer exist. However, such autonomous governance is supposed to maintain development harmony vertically and horizontally. Regarding cluster adoption into public policymaking, both governments in Surakarta and Rembang are baffled to find an appropriate legal basis to create a cluster policy. Once a cluster approach has been introduced, either from respective cluster communities (Surakarta case) or government agencies (Rembang case), the immediate government response is reluctance to adjust the existing conventional programming or budgeting routine to meet cluster needs. Rather, the government tends to maintain bureaucratic rigidity and to focus more on each government agency’s performance. In other words, the absence of a legal basis for cluster adoption inhibits government agencies to succeed it completely even though the mayors and regents are keen to implement it. In the case of Surakarta for example, according to Sukriyah (personal communication, January 10, 2012), a cluster approach is being inserted to related government agencies’ routine programming and budgeting for that reason. The absence of a legal basis for cluster adoption has prevented BAPPEDA from accumulating bonding commitments from related government agencies to actualise it. Hence, it is not surprising that a citywide batik cluster policy has never existed in Surakarta even though there are many batik production centres scattered within and around.

Cluster Organisation

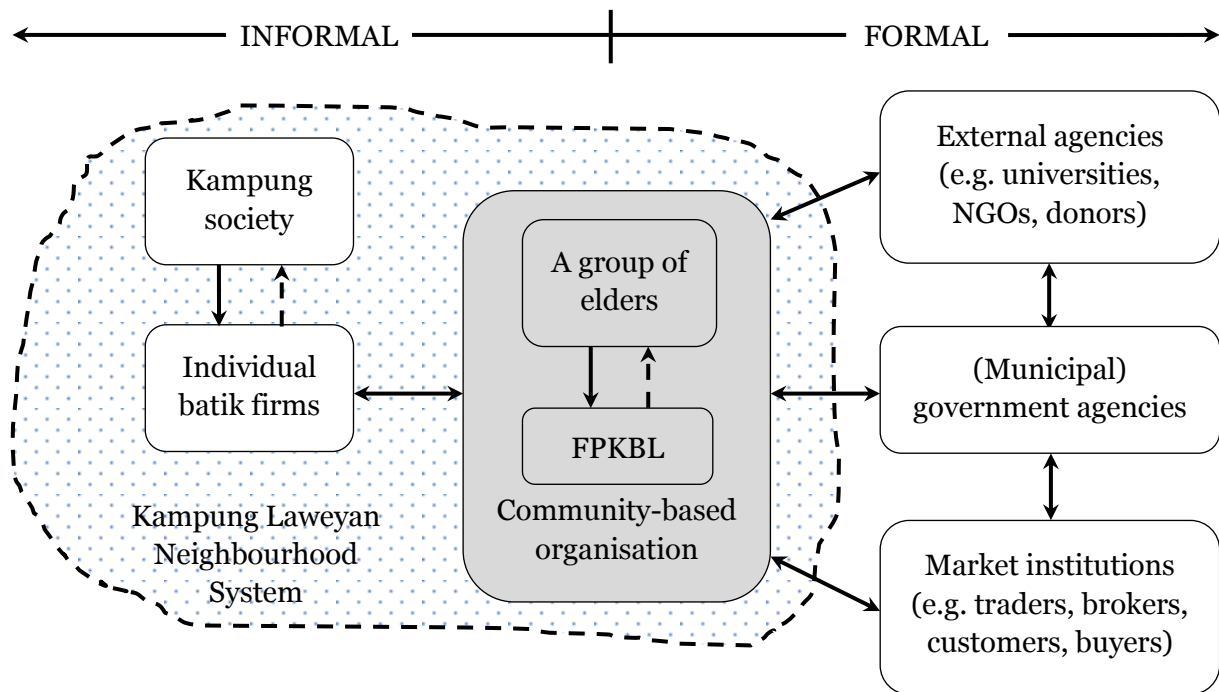
The official organisation of batik industry cluster in Kampung Laweyan was declared to the public on September 25th, 2004, namely *Forum Pengembangan Kampung Batik Laweyan* (FPKBL) or Kampung Batik Laweyan Development Forum. It was a kind of community-based organisation to respond to aspirations from the Laweyan society concerning a concrete revitalisation program for preserving the neighbourhood as a cultural heritage site and batik industry centre (Nugroho, 2013). The initiative for its establishment came from a senior batik entrepreneur Mr. Achmad Sulaiman (aged 65) who was worrying about the future of the neighbourhood. Prior to the declaration Kampung Laweyan faced physical settlement

quality decline due to abandoned large housing properties which formerly functioned as home-based batik firms, and incoming investors who destroyed and changed historical properties for commercial buildings. Actually, there had been a legal basis for the endorsement of Kampung Laweyan as a cultural heritage site, i.e. *Surat Keputusan Walikota* (Mayor Decree) No. 646/116/I/1997 dated November 31st, 1997 which described the Endorsement of Old Historical Buildings and Sites in the Surakarta Municipality. Later, this legal document was supported with higher regulation from the Ministry of Culture and Tourism through *Peraturan Menteri* (Ministerial Regulation) No. PM.03/PW.007/MKP/2010 which described the Endorsement of Kampung Laweyan as a Conserved Cultural Material, Site or Area. Clearly these regulations emphasised the protection of the Kampung Laweyan site as a cultural asset rather than a prospective batik industry centre (Nugroho, 2012). Therefore, the FPKBL declaration re-claimed the legally binding support for its revitalisation program, and the regeneration of the batik industry cluster was chosen as a means of supporting it.

The structure of FPKBL consists of two bodies, i.e. an advisory board of a prominent elderly group and an executive board of elected local batik entrepreneurs and activists. The Forum does not function as a cluster business management unit, rather it acts as an intermediary organisation in bridging communication between Laweyan batik community, local residents, government agencies, market institutions (e.g. suppliers, traders, brokers, customers, and buyers), and external agencies (e.g. universities, non-governmental organisations/NGOs, and donors). It facilitates program matching accommodated from below with prospective programs offered by (mostly) municipal government agencies and other stakeholders. In doing so, the executive board which is currently chaired by Mr. Alpha Febela Priyatmono (aged 54), often consults with the advisory board to discuss a number of issues regarding kampung improvement and batik development programs, and to assist in reconciling social disputes within the batik community (Efendi, personal communication, December 22, 2011; Priyatmono, personal communication, December 22, 2011). Thus, seniority does matter in maintaining social harmony in Kampung Laweyan where appropriate respect to the elders is likely to determine FPKBL performance (see **Figure 6.7**).

A similar community-based batik cluster organisation emerged in Kampung Kauman in 2006. Distinguished from the Kampung Laweyan case, the initiative came from a young batik business successor Mr. Gunawan Setiawan (aged 42), who was perhaps the most successful batik entrepreneur of his generation. He worried about the increased destructive trend of the old buildings and properties in the neighbourhood due to the inability of the owners to preserve them. Despite undertaking proper maintenance, the owners left them abandoned to be destroyed by nature or sold to investors. Up until that time, many batik successors had collapsed due to internal inability to compete with the enormous printed batik supply. Hence, employment shift and property selling became popular household income sources, leaving only eight leading batik firms to survive. Ironically, printed batik trading in Pasar Klewer market remained busy as if it was not prone to market change. With the support from a group of young generation in Kauman and technical facilitation by a local academia Mrs. Musyawaroh, he initiated the building of *Paguyuban Kampung Wisata Batik Kauman* (PKWBK) or Kauman Batik Tourism Neighbourhood Community in 2006. Soon it attracted local government support through an official declaration ceremony in the Great Mosque of Surakarta and various development programs (Musyawaroh, personal communication, March 14, 2012; Amien, personal communication, April 4, 2012; Setiawan, personal communication, April 9, 2012).

Figure 6.7 Cluster organisation in Kampung Laweyan



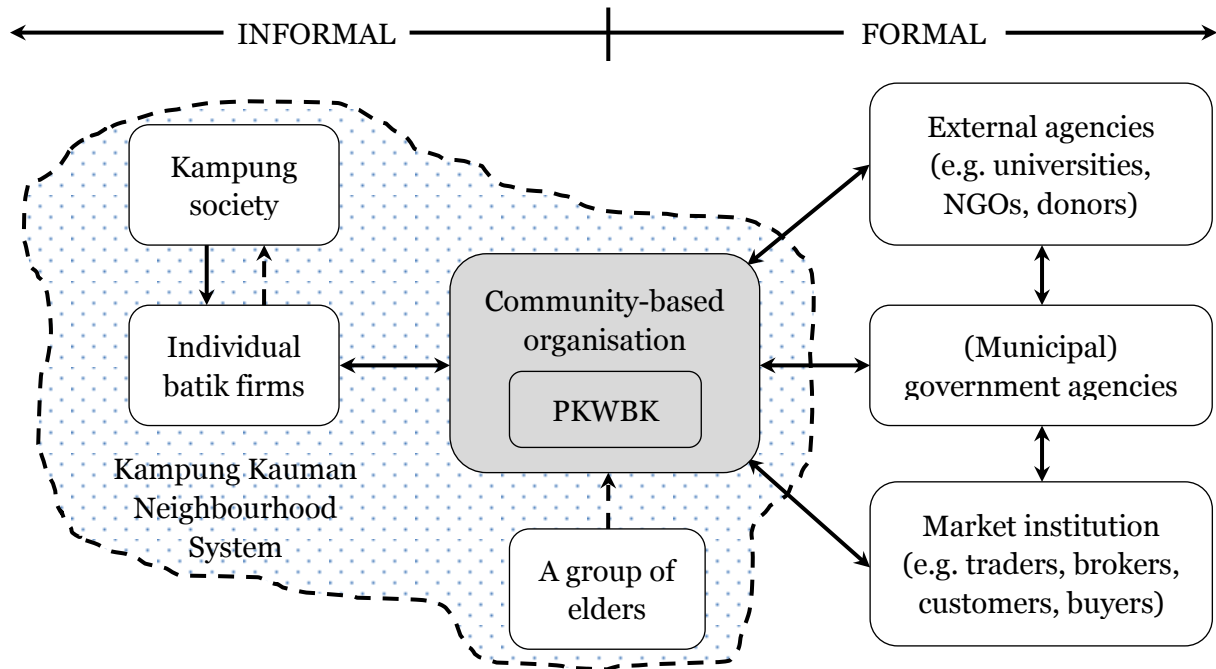
Source: Nugroho (2013, p. 14)

The main PKWBK's objective is to regenerate the economic potentials of Kampung Kauman by exploiting cultural heritage of the local batik industry and old buildings. Thus, reshaping its image to become a batik tourism destination is the main agenda of the organisation. PKWBK structure consists of a single executive body which acts as a social organisation rather than a cluster business management unit. Similar to the Laweyan case, it serves as a program matching mediator on behalf of the local batik industry but does not get involved in inter-firm disputes. It may work independently with less intervention from the group of elders (Amien, personal communication, April 4, 2012; Setiawan, personal communication, April 9, 2012). Unfortunately, the organisation depends heavily on the strong leadership of the primary initiator as well as current chief Mr. Gunawan Setiawan. His powerful influences and philanthropic actions within the Kauman society have made it easier for him to direct the organisation and build external networks. With such power concentration PKWBK performance seems under the shadow of the leader's direction, mainly if task delegation and cadre recruitment fail to comply with its objectives (see **Figure 6.8**).

If both cluster organisations in Surakarta were built from below, their counterpart in the Lasem Area has been a government-driven initiative. Initially, the BAPPEDA of Rembang Regency introduced a cluster approach to promote potential economic sectors. It was initially introduced by the higher-tier BAPPEDA of Central Java Province in 2004 sponsored by *Deutsche Gesellschaft für Technische Zusammenarbeit* (GTZ) to promote regional economic development. Accordingly, BAPPEDA was to set up a quasi-government organisation that served as a multi-stakeholder forum to advise BAPPEDA in formulating a local economic development policy, namely FEDEP. FEDEP was legalised through *Surat Keputusan Bupati* (Regent Decree) No. 027/2005 about the Establishment of FEDEP in Rembang Regency. FEDEP encouraged the creation of cluster organisations to accommodate

various potential economic sectors of the region. It was called *Forum Rembug Klaster* (FRK) or Cluster Consultative Forum representing a so-called community-based organisation. As for the batik sector, the FRK was named by FRK Batik Tulis Lasem (FRK-BTL) to promote a traditional handwritten batik industry in Lasem Area (FEDEP Rembang, 2007; Drupodo, personal communication, May 7, 2012).

Figure 6.8 Cluster organisation in Kampung Kauman



Source: Nugroho (2013, p. 19)

FRK-BTL functions as an intermediary organisation to bridge communication primarily between the batik community in the Lasem Area and FEDEP Rembang. It may directly approach government agencies and potential partners to facilitate program matching. In spite of its similarity to Surakarta case, FRK-BTL focuses on the pursuit of economic objectives of the batik industry development in Lasem. As the government's arm-length body, it obtains annual budget allocation up to IDR 5 million (equals to USD 417) to host meetings at the grassroots level. Then it may propose programs to FEDEP as a bottom-up input for economic development policy formulation. The first FRK-BTL chief Mrs. Naomi Susilowati Setiono (aged 50, deceased on March 16th, 2010) was the successor of a leading batik firm Maranatha in Lasem. She took a lead for five years (2004-2009) and this position is currently continued by the elected Mr. Ahmad Rifa'i (aged 61), a new batik entrepreneur who started business in 2008 after being retired from a kepala desa (village head) position in Pohlandak Village of Pancur Subdistrict in 2007 (Drupodo, personal communication, May 7, 2012; Rifa'i, personal communication, May 8, 2012). Coincidentally, the succession encourages structural transformation of batik cluster management in the Lasem Area. The first chief is broadly known as a Chinese descendant family batik business successor who is aware of preserving the authenticity of Lasem's traditional handwritten batik making. The successor is a Javanese indigenous entrepreneur who learned the first traditional batik making from and was encouraged by Mrs. Setiono herself to start up the business. Such circumstances embark a leadership transition from the old Chinese leading hegemony to the

new Javanese batik enterprise group in the middle of the struggle for preserving the Lasem batik tradition to deal with current market change.

For the first period FRK-BTL was successful in promoting the batik industry revival in Lasem. Under the strong charismatic leadership of Mrs. Setiono the number of batik firms increased from around 18 in 2005 to 37 batik entrepreneurs in 2011. With support from the government she encouraged both the old and new batik entrepreneurs through various batik trainings and technical supervisions (Kwan, personal communication, February 29, 2012; Rifa'i, personal communication, May 8, 2012). However, an immediate challenge to FRK-BTL performance occurred around 2009 following another government policy to create Koperasi Batik Tulis Lasem (KBTL) or Lasem Handwritten Batik Cooperative which was aimed at serving the batik trading pool. It was initiated by DISPERINDAGKOP of Rembang Regency derived from provincial and national policies. Ideally, according to Drupodo (personal communication, May 7, 2012), the role of KBTL is complementary to FRK-BTL to accomplish business operations of cluster programs. Simply the FRK-BTL plays policy formulation function while KBTL implements the business strategies. In fact, the existence of KBTL creates a chaotic organisational complexity within the Lasem batik community. The elected KBTL chief Mr. Santoso Hartono (aged 45), often opposed the FRK-BTL policy recommendations and challenged Mrs. Setiono leadership style. For example, he suspected the transparency of FRK-BTL in allocating batik training for its members. Conversely, KBTL was often suspected of being overridden by the chief's self-interest to accumulate business advantages. As a result of personal tensions between the leaders of FRK-BTL and KBTL the form of batik cluster organisation in the Lasem Area is complicated, and to some extent carries out both personal and inter-governmental competition in nature (see **Figure 6.9**).

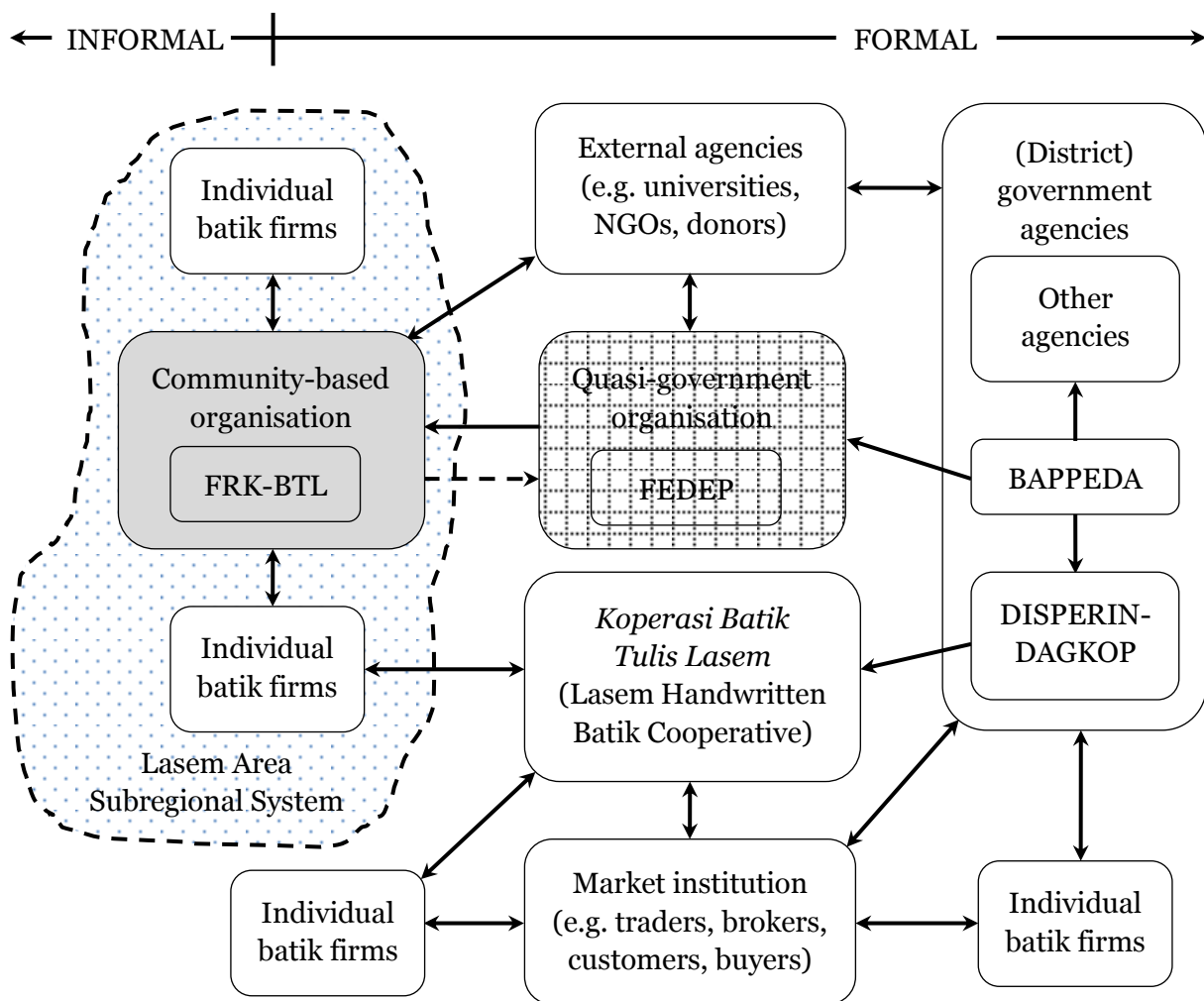
Cluster Size and Distribution

A minimum threshold of interconnected firms to be considered as a cluster has actually never been specified yet. Even Cooke (2007) suggests that as long as there are more than two interacting firms, it can be considered as a cluster. In addition, previous studies on clusters involving a different number of clustered firms have emphasised proximity and processes in inter-firm business networks, technology exchange, knowledge spillovers, and social relations as critical elements for the functioning of a cluster instead of the cluster size. The contribution of these elements has considerably determined cluster growth through certain processes of evolution. As a cluster grows, it is likely to attract more firms to join mainly because of the effects of agglomeration economies (Cooke, 2007; Menzel, Henn & Fornahl, 2010). In terms of cluster distribution the notion of proximity does not ascribe physical distance as a prerequisite for cluster operations. Even though there is a tendency that geographical proximity matters in the early stage of cluster emergence, its importance is weakening depending on the featured types and developmental pathways of a respective cluster. The ability of a cluster, primarily induced by pioneer or champion firms, to generate profits through certain organisational routines and spread their spin-off advantages towards following new firms is a key for achieving a critical mass of clustering, from which the scale of production of a respective cluster is determined (Dorenkamp & Mossig, 2010).

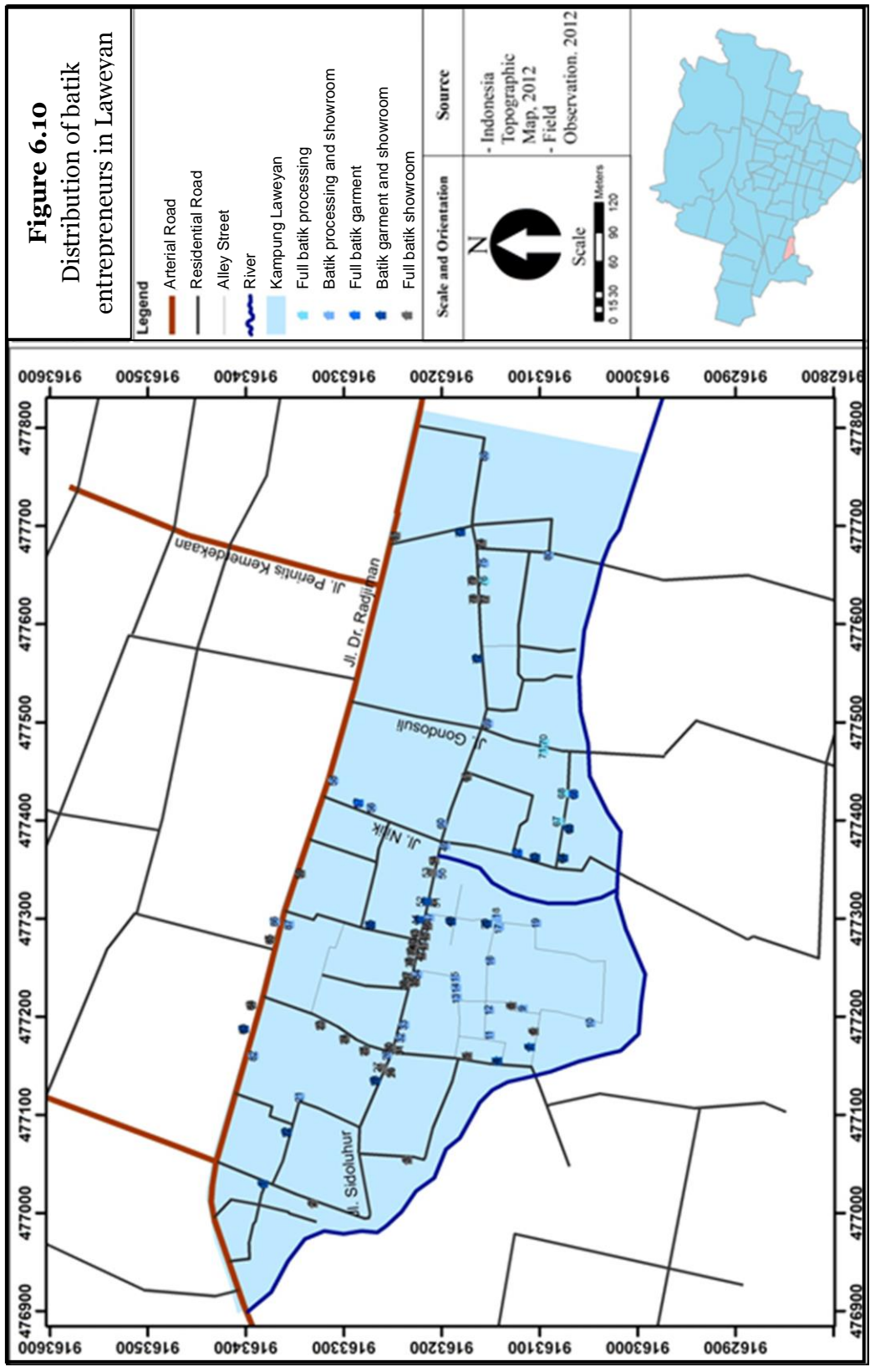
Currently, there are 88 batik firms in Kampung Laweyan which fall into five categories: 1) full processing (5 firms), 2) processing and showroom (29 firms), 3) garment (3 firms), 4) garment and showroom (16 firms), and 5) full showroom (35 firms). Around 60% of the

entrepreneurs are producing either batik cloths (34 firms) or batik garments (19 firms). Of those numbers 45 firms (51%) are carrying on direct batik trading through batik showrooms. If combined with all the batik traders (35 entrepreneurs) there are 80 batik showrooms in Kampung Laweyan. Most batik firms are concentrated along the Jl. Sidoluhur road axis which is largely occupied by full batik traders and showrooms. In the meantime, the batik producers are distributed in various locations of the neighbourhood (see **Figure 6.10**). With such industrial composition the Kampung Laweyan batik cluster has recently encouraged a downstream industry. Even though the full processing firms are found there, almost all batik entrepreneurs have moved the process of producing unfinished batik cloths to other places. They have subcontracted this first half batik processing to smaller firms or individual batik makers and merely focused on the finishing stage of production and marketing. In the past there was a socio-spatial segregation in the Kampung Laweyan neighbourhood. The upper side of the main axis Jl. Sidoluhur used to be a home-based business and residence area for batik masters, which was recognisable with their spacious fancy houses. On the contrary, the lower side was for batik workers' residence featured by a small and crowded settlement area connected with alley streets (Ristianti, 2010). Currently, such socio-spatial division tends to disappear mainly because of the batik commercialisation trend throughout the entire neighbourhood where many batik showrooms can be found in this lower side as well.

Figure 6.9 Cluster organisation in Lasem Area



Source: Nugroho (2013, p. 24)



In Kampung Kauman there are 45 batik firms with batik showrooms. The industrial composition consists of 21 production firms (14 batik processing and 7 batik garment firms) and 24 full batik showrooms. All those production firms operate batik showrooms as well, from which the batik industry cluster in Kauman features more as a batik trading centre. The concentration of batik showrooms is located on the southern part of the neighbourhood between Jl. Wijaya Kusuma, Jl. K.H. Hasyim Ashari, and Jl. Dr. Radjiman roads. It is not surprising as that area is the closest location to Pasar Klewer, the Great Mosque, and Surakarta Palace which are the most favourite tourism destinations in the city. Another important location in Kampung Kauman is the Jl. Cakra road axis, along which most batik processing firms concentrate (see **Figure 6.11**). Similar to the case of Kampung Laweyan, almost all batik producers in Kampung Kauman have relocated the first half process to other places. They have managed subcontracting relationships with smaller batik producers or individual batik makers in the villages around Surakarta to produce unfinished batik cloths, so that they can focus on the stages of finishing and marketing. The difference is that there is no socio-spatial segregation in the local batik industry unlike those in Kampung Laweyan. Both the local batik masters and workers can live and run the batik businesses together in a crowded settlement layout of the Kampung Kauman neighbourhood. Therefore, the batik production firms and showrooms are spotted equally at the centre and southern parts of the neighbourhood.

Unlike its counterparts in Surakarta, the batik industry cluster in the Lasem Area is more homogenous where all batik entrepreneurs run batik processing and showrooms at once. Distinguished from the batik clusters in Kampung Laweyan and Kampung Kauman, they maintain an upstream industry feature by focusing on the production of batik cloths only, not batik clothing or any other variants of batik products. This cluster comprises 30 batik firms and is mostly concentrated in Babagan Village, a village which was formerly known as a Little Chinatown of Rembang. In the past all batik firms were located in the Lasem part while the batik workers commuted from villages in Pancur Subdistrict. Currently, such a socio-spatial division in the local batik industry tends to disappear following the rise of new (Javanese) batik entrepreneurs to start up their own businesses. They are spread in the western part of Lasem Subdistrict like Soditan, Ngemplak, and Selopuro villages as well as to Pancur Subdistrict in Tuyuhan, Karaskepoh, and Jeruk villages. In addition, the batik masters have not merely relied on the full batik processing at their home-based workshops. Rather, they also have practiced a subcontracting agreement especially with their batik workers to produce unfinished batik cloths at their homes. Therefore, some batik masters are conducting both partial and full batik processing at their workshops (see **Figure 6.12**).

By comparing three batik clusters above we may conclude that the cluster size does not matter for their existence. The difference in a number of firms seems less important in determining their performance. Instead, the industrial characteristics and composition of the local batik cluster are more influential in directing its growth, as indicated by subcontracting practices to spread the partial production process outside the batik masters' workshops. Regarding the spatial distribution of the local batik firms, the proximity between firms to some extent remains important for these clusters. There is a tendency to sustain the concentration of these firms in particular spots of the local batik cluster neighbourhood even though some new batik firms are established in many other spots. Therefore, this can be viewed that each batik cluster has regarded these earliest spots of concentrated firms as the major locations for generating and spreading the economic benefits of clustering outwards.

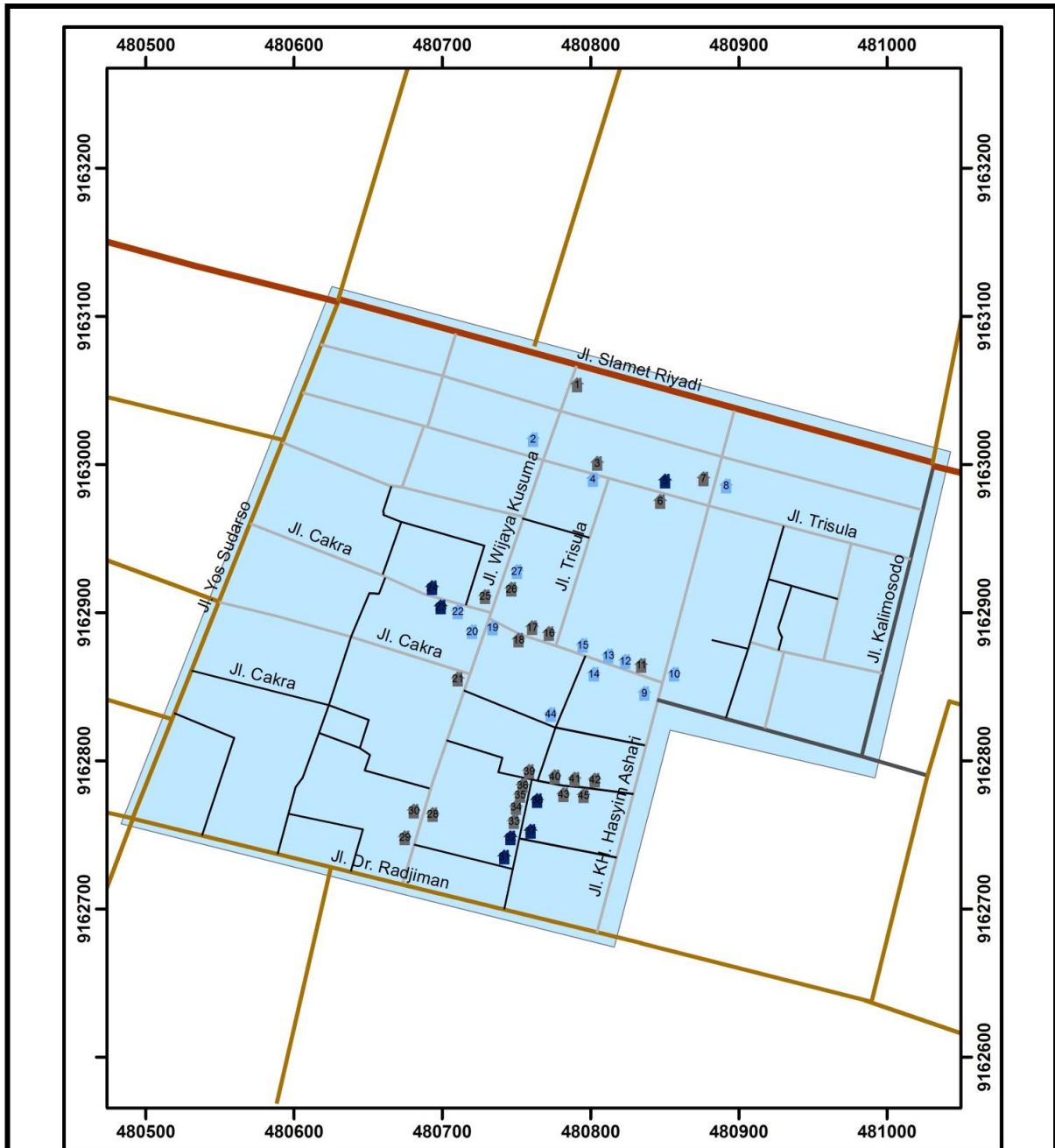

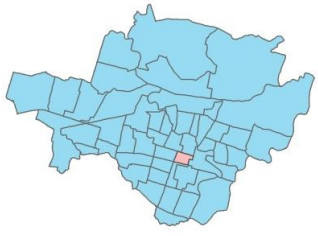


Figure 6.11
Distribution of batik entrepreneurs in Kauman

<p>Legend</p> <ul style="list-style-type: none"> — Provincial Road — Arterial Road — Collector Road — Residential Road — Alley Street Kampung Kauman ■ Batik processing and showroom ■ Batik garment and showroom ■ Full batik showroom 	<p>N</p>  <p>Scale Bar</p> <p>0 15 30 60 90 120 Meters</p>	 <p>Source : Indonesia Topographic Map, 2012 Field Observation, 2012</p>
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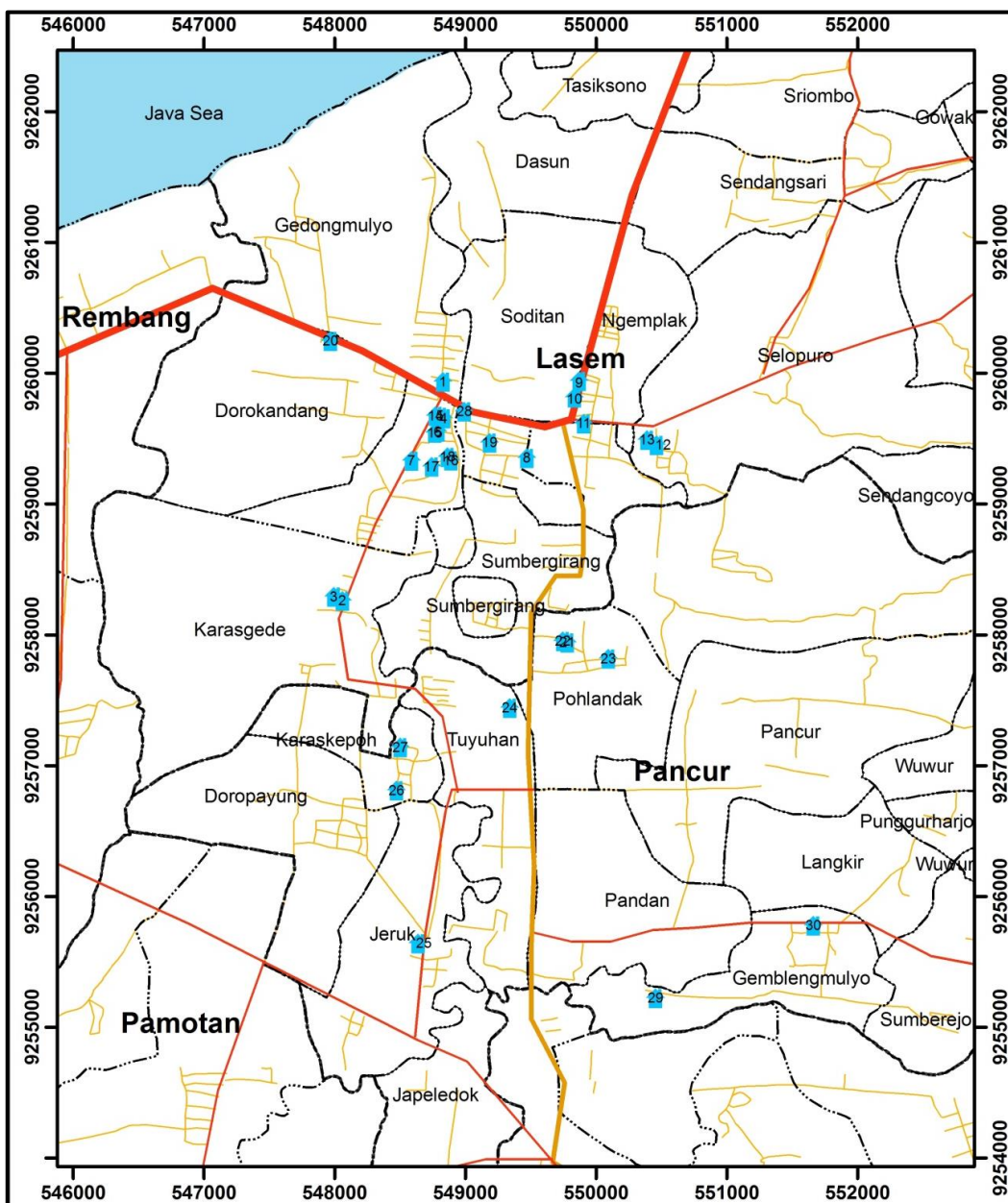





Figure 6.12
Distribution of batik entrepreneurs in Lasem

<p>Legend</p> <ul style="list-style-type: none"> — National Road Subdistrict boundary — Provincial Road Village boundary — Arterial Road — Residential Road ■ Batik processing and showroom 	<p>N</p>  <p>Scale Bar</p>  <p>Meters</p>	 <p>Source : Indonesia Topographic Map, 2012 Field Observation, 2012</p>
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Backward Linkages

Both batik clusters in the Kampung Laweyan and Kampung Kauman have more advantages than those in the Lasem Area because all materials are available in Surakarta and its surrounding regions. Many textile factories operate in Sukoharjo Regency and Karanganyar Regency to supply cotton cloth and other variants such as *prmissima*, *prima*, viscose, shantung, paris and doobby. Based on information taken from 16 batik producers and 6 batik traders in Kampung Laweyan and 8 batik producers and 10 batik traders in Kampung Kauman, I can figure out that there are no differences between these two batik clusters in cloth demand. The most preferred cloth types are cotton, *prmissima*, and *prima*. Roughly 70% of the cloth demand is supplied by textile distributors/shops in Surakarta, 20% from Yogyakarta, and 10% from Pekalongan. They require around 30-15,000 metres of each cloth type per month. The most expensive price is *prmissima* cloth at IDR 60,000-350,000 (USD 5-29.2) per metre. The least expensive price is *prima* cloth at IDR 8,000-10,000 (USD 0.7-0.8) per metre. Those prices are relative depending on the cloth grade and market fluctuation (see **Table 6.7**).

Table 6.7 Average monthly demand of raw materials in Kampung Laweyan and Kampung Kauman batik clusters

No.	Type of Materials	Quantity	Unit Price (USD)*	Supply Locations
CLOTHS				
1.	Cotton	40-15,000 metres	0.9-8.3	Surakarta, Yogyakarta, Pekalongan
2.	<i>Prmissima</i>	100-15,000 metres	5.0-29.2	Surakarta, Yogyakarta, Pekalongan
3.	<i>Prima</i>	30-10,000 metres	0.7-0.8	Surakarta, Yogyakarta
WAXES				
4.	Beeswax	8-1,500 kilograms	1.4-1.7	Surakarta
5.	<i>Gondorukem</i>	40-80 kilograms	1.7-1.9	Surakarta
6.	<i>Damar matakucing</i>	8-10 kilograms	1.9-2.1	Surakarta
7.	Paraffin	5-35 kilograms	1.7-2.9	Surakarta
DYES				
8.	Synthetic dyes	1-10 kilograms	3.3-7.1	Surakarta

Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000

Source: Author (2013)

As for the provision of other materials such as waxes, synthetic dyes, and energy sources (e.g. firewood, kerosene, liquid petroleum gas, and electricity), batik producers in Kampung Laweyan and Kampung Kauman collect them from local shops/distributors in Surakarta. The average monthly demand for waxes are 5-1,500 kilograms at IDR 17,000-35,000 (USD 1.4-2.9) per kilogram and synthetic dyes are 1-10 kilograms at IDR 40,000-85,000 (USD

3.3-7.1) per kilogram. Regarding energy demand, the data is unavailable since the respondents cannot estimate it adequately. The remaining supporting materials are also not measurable because of poor data availability provided by the respondents (see **Table 6.7**).

In the case of Lasem Area batik cluster the average cloth demand per month is less than that of in Surakarta. Based on replies from 26 batik producers in the Lasem Area (15 in Lasem Subdistrict and 11 in Pancur Subdistrict), they actually require 45-5,500 metres of cloth per month at IDR 9,200-84,200 (USD 0.8-7.0) per metre. Unfortunately, all these cloths must be ordered from textile factories and distributors in Surakarta, Yogyakarta, Pekalongan, and Malang, making local batik producers more vulnerable to cloth supply from other regions. The great dependency on Surakarta (and other regions) also applies to waxes and synthetic dyes but not energy sources. The quantity of waxes required is 5-600 kilograms per month at IDR 15,500-75,000 (USD 1.3-6.3) per kilogram while the synthetic dyes are 1-50 kilograms at IDR 150,000-500,000 (USD 12.5-41.7) per kilogram. Regarding energy sources, batik producers still depend on the use of un-renewable energy, particularly kerosene, liquid petroleum gas and firewood. The average monthly demand for kerosene is about 10-200 litres at IDR 7,500-10,000 (USD 0.6-0.8) per litre, and liquid petroleum gas is 12-45 kilograms at IDR 13,000-14,000 (USD 1.1-1.2) per kilogram, and firewood is 1-8 *rit* at IDR 200,000-300,000 (USD 16.7-25-0) per *rit*. These energy sources are all accessible from local distributors in Lasem and Rembang (see **Table 6.8**).

Table 6.8 Average monthly demand of raw materials in Lasem Area batik cluster

No.	Type of Materials	Quantity	Unit Price (USD)*	Supply Locations
CLOTHS				
1.	Cotton	180-4,570 metres	0.8-1.0	Surakarta, Yogyakarta
2.	<i>Primissima</i>	45-5,500 metres	1.1-7.0	Surakarta, Yogyakarta, Pekalongan, Malang
3.	<i>Prima</i>	180-5,500 metres	0.8-2.5	Surakarta, Yogyakarta, Pekalongan, Malang
WAXES				
4.	Beeswax	5-50 kilograms	2.1-3.8	Surakarta, Pekalongan, Surabaya
5.	<i>Gondorukem</i>	3-100 kilograms	1.7-6.3	Surakarta
6.	<i>Damar matakucing</i>	5-50 kilograms	1.3-6.3	Surakarta, Pekalongan, Surabaya
7.	Paraffin	20-600 kilograms	1.5-1.7	Surakarta, Pekalongan, Surabaya
DYES				
8.	Synthetic dyes	1-50 kilograms	12.5-41.7	Surakarta, Pekalongan, Surabaya

Continued in the next page

Table 6.8 continued

No.	Type of Materials	Quantity	Unit Price (USD)*	Supply Locations
ENERGY				
9.	Kerosene	10-200 litres	0.6-0.8	Lasem, Rembang
10.	Liquid gas	12-45 kilograms	1.1-1.2	Lasem, Rembang
11.	Firewood	1-8 rit**	16.7-25.0	Lasem, Rembang

Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000

** a measurement unit that equals to the capacity of small pickup truck

Source: Author (2013)

Overall we can observe that both batik clusters in Kampung Laweyan and Kampung Kauman require more raw materials than the Lasem Area indicating their larger production capacity. But if we look closer at the price difference, particularly for waxes and dyes, batik producers in Lasem Area are willing to spend more money for better quality products. As they continue to produce the finest handwritten batik cloth, multiple wax application and dyeing processes are undertaken at the cost of production quantity. Nevertheless, cloth supply sustainability remains critical for all batik clusters observed. Accessible cloth supply with good quality variants are the basic requirements for its procurement. These requirements also apply to waxes and dyes, but the batik producers in the Lasem Area put price stability and late payment for these inputs including cloth as additional requirements. Not surprisingly, batik producers in Lasem Area worry more about input prices and payment methods since their locations are far from suppliers. However, in the case of energy supply all batik producers in Kampung Laweyan, Kampung Kauman, and Lasem Area agree upon its sustainable accessibility and price stability issues (see **Table 6.9**). Even though the distribution network is much better than other types of material inputs, where there is no big difference in price at various locations, the great dependency of all batik producers on un-renewable energy sources is still unavoidable until now. The main reason is that there is no better substitute to replace these energy sources in order to control heat temperature particularly during the wax removal process.

In the meantime, the demand for intermediate and final goods in forms of batik cloth, clothing, and other commodities is only applicable to batik clusters in Kampung Laweyan and Kampung Kauman. There are a lot of batik traders who undertake downstream batik industry, and even many batik entrepreneurs who take up multiple roles as the producer, trader, and middleman. Actually, many batik entrepreneurs in the Lasem Area carry out the same multiple roles, but they are focusing more on trading raw materials particularly cloths and waxes instead of selling batik clothing. The main feature of batik entrepreneurs in the Lasem Area is that they only produce and trade the finest handwritten batik cloth, so that the downstream industry development is being neglected to some extent. In the following **Table 6.10** we can observe the average monthly demand of batik commodities in Kampung Laweyan and Kampung Kauman. In respect of batik cloth group, both stamped and printed batik cloths are the most popular articles required by local batik traders, mainly because of the cheaper prices compared to handwritten and combined batik cloths. It indicates a higher market demand for those commodities. As for the batik clothing group, with the exception to

selendang article, all types of commodities are available in the Kampung Laweyan and Kampung Kauman batik clusters. Similarly, this also applies to other commodities groups except for a bed linen article. All these batik commodities are mostly supplied from Surakarta, creating a strong backward linkage to local batik producers and suppliers. Pekalongan and Yogyakarta have become the alternative batik centres to which local batik traders are looking for additional commodities.

Table 6.9 Typical basic requirements for primary raw materials of batik clusters in Kampung Laweyan, Kampung Kauman, and Lasem Area

No.	Conditions of Supply	Kampung Laweyan				Kampung Kauman				Lasem Area			
		C	W	D	E	C	W	D	E	C	W	D	E
1.	Easier accessibility	High	High	High	High	High	High	High	High	High	High	High	High
2.	Sufficient quantity	High	High	High	No information	High	High	High	No information	High	High	High	High
3.	Good supply quality	High	Medium	High	No information	High	High	High	No information	High	High	High	High
4.	Supply variants availability	High	High	High	No information	High	High	High	No information	High	High	High	High
5.	Price stability of supply	High	High	High	No information	High	High	High	No information	High	High	High	High
6.	Late payment possibility	High	High	High	No information	High	High	High	No information	High	High	High	High

Remark: C = cloths; W = waxes; D = dyes; E = energy sources

The coloured cells indicate the degree of importance of each input requirements as follows: = high; = medium; = low

Source: Author (2013)

Table 6.10 Average monthly demand of batik commodities in Kampung Laweyan and Kampung Kauman batik clusters

No.	Type of Commodities	Quantity (Pieces)	Unit Price (USD)*	Supply Locations
CLOTHS				
1.	Handwritten batik	5-200	4.2-31.3	Surakarta, Pekalongan, Sumatra
2.	Stamped batik	10-1,000	2.5-8.3	Surakarta, Sragen, Sukoharjo, Kalimantan
3.	Combined batik	15-80	2.9-25	Surakarta
4.	Printed batik	20-300	1.7-6.7	Surakarta, Pekalongan
CLOTHING				
5.	Shirt	10-400	2.1-12.5	Surakarta, Pekalongan, Yogyakarta
6.	Blouse	10-500	2.1-9.2	Surakarta, Pekalongan, Yogyakarta
7.	<i>Daster</i> (dress)	10-360	1.5-4.2	Surakarta, Pekalongan, Yogyakarta
8.	Sarong	20-100	2.1-5.4	Surakarta, Pekalongan, Yogyakarta

Continued in the next page

Table 6.10 continued

No.	Type of Commodities	Quantity (Pieces)	Unit Price (USD)*	Supply Locations
9.	Jarik (skirt)	50-400	2.3-10.4	Surakarta, Pekalongan, Yogyakarta
10.	Pant	40-200	1.7-4.2	Surakarta, Pekalongan, Yogyakarta
11.	Selendang (scarf)	20-50	1.3-6.3	Surakarta, Pekalongan, Yogyakarta
OTHERS				
12.	Bed linen	10-30	6.5-23.3	Surakarta
13.	Bag and wallet	50-600	0.5-5.0	Surakarta, Yogyakarta
14.	Footwear	50-100	0.7-1.7	Surakarta, Yogyakarta
15.	Tablecloth	40-200	1.1-2.1	Surakarta

Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000

Source: Author (2013)

Regarding the requirements for batik cloths and clothing supply, local batik traders in both Kampung Laweyan and Kampung Kauman consider product quality and variation as well as the possibility of late payment as the most important determinants of the procurement decisions. On the contrary, the requirements are not applicable to the other batik commodities (see **Table 6.11**). This means that they are more selective on purchasing batik cloths and clothing from the suppliers following an abundant supply of various batik commodities in the Surakarta market. Dealing with tight market competition, they first consider product quality and variation in order to provide distinguished cheaper batik articles. Such conditions do not apply for other batik commodities since the supply is limited so that the batik traders set more importance on quantity and accessibility matters first.

Table 6.11 Typical basic requirements for intermediate and final goods of batik clusters in Kampung Laweyan and Kampung Kauman

No.	Conditions of Supply	Cloths	Clothing	Others
1.	Easier accessibility	High	High	Medium
2.	Sufficient quantity	High	High	Medium
3.	Good supply quality	Medium	Medium	High
4.	Supply variants availability	Medium	Medium	High
5.	Price stability of supply	Low	Low	Low
6.	Late payment possibility	Medium	Medium	Low

Remark: The coloured cells indicate the degree of importance of each input requirements as follows: = high; = medium; = low

Source: Author (2013)

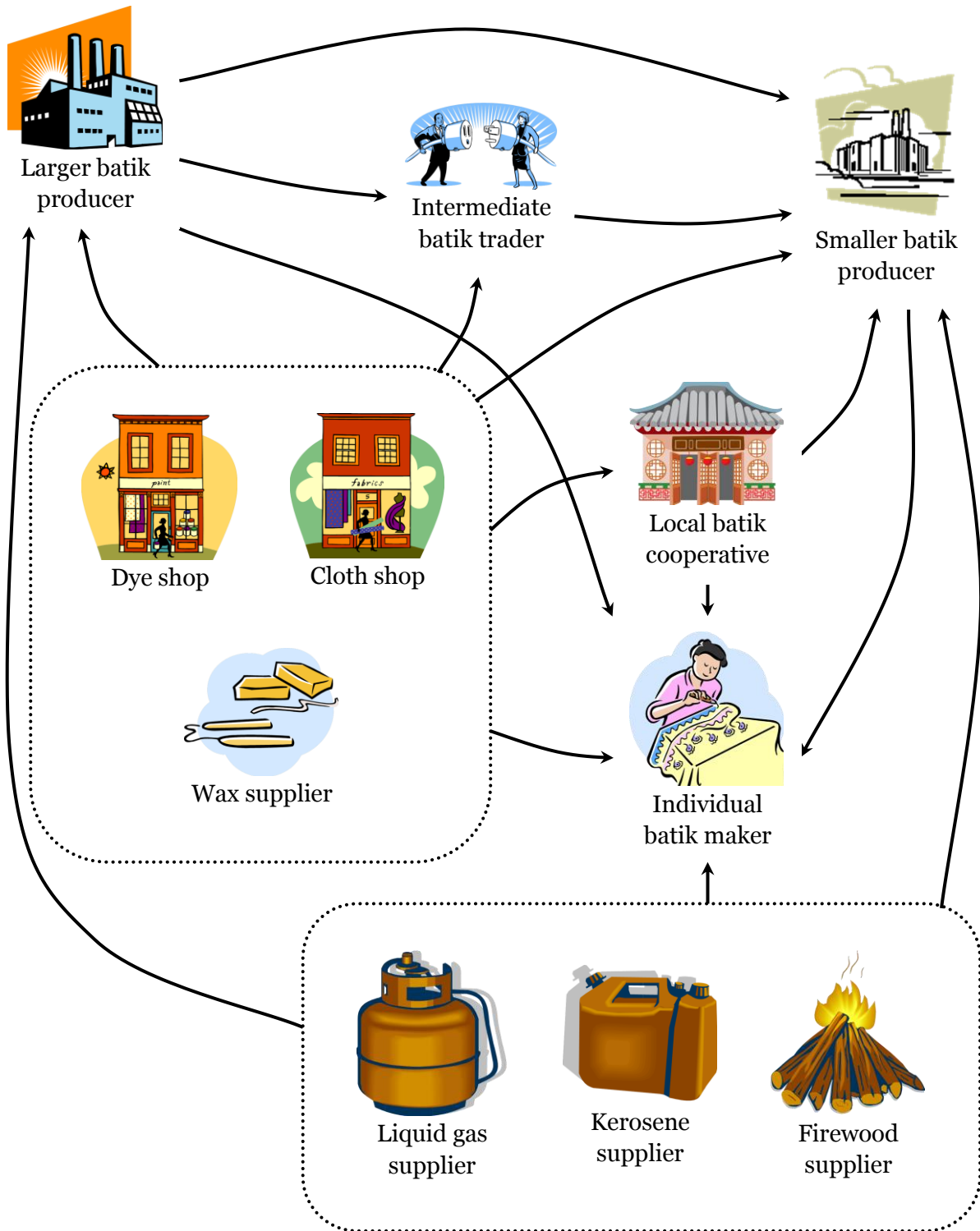
With regard to procurement customs, batik producers and traders in Kampung Laweyan, Kampung Kauman, and Lasem Area are undertaking direct purchase from suppliers. They make out an order, do the transaction, and take up the goods by themselves from batik material shops and suppliers – sometimes directly from the factories – to their home-based batik firms and showrooms or kiosks in the local market, particularly in Pasar Klewer (Surakarta). The second most popular way is by utilising the role of middlemen. In most cases the middlemen are the larger batik producers and *pedagang pengepul* (intermediate or collecting traders). The role of larger batik producers takes place when they supply the smaller ones the required cloths and waxes under a certain binding contract (subcontracting agreement). The smaller batik producers must sell batik cloths to and get paid by them in return. Similarly, the intermediate batik traders may assist (smaller) batik producers in supplying goods under the same conditions. They may sell batik items directly to the market or resell them to the larger batik producers. Regardless of procurement options, both direct and late payment methods are possible during transactions (see **Figure 6.13**).

Specific to the batik cluster in the Lasem Area there are additional supply chain patterns where the batik producers can purchase cloths and waxes to fellow batik producers or local batik cooperative. The former pattern applies in the case of Mr. Ahmad Rifa'i who allows some batik producers, mostly the smaller ones, to purchase his material stock, for instance. The latter exists when local batik cooperative (*Koperasi Batik Tulis Lasem*) undertake collective purchases to batik material shops or distributors in Surakarta, and resell the input goods to batik producers in the Lasem Area (see **Figure 6.13**). Interestingly, these patterns allow late payment method without any collateral but mutual trust. Thus, late payment method is a common feature of the batik cluster in the Lasem Area (see **Table 6.9**).

Similar to backward linkages patterns in material supply, it also implies on labour supply in the three batik clusters. Almost all batik workers come from a local region and its surrounding, showing clearly that there must be an abundant batik labour pool in the Surakarta and Lasem Area. In the case of the batik clusters in Surakarta, the most batik workers are local residents while the rest commute from Sukoharjo Regency, Sragen Regency (Kampung Laweyan), Klaten Regency, and Boyolali Regency (Kampung Kauman). All the batik workers in the Lasem Area batik cluster are from Lasem Subdistrict and Pancur Subdistrict (Rembang Regency), making the industry appears an enclave economy greatly concentrated in that area only.

Considering the nature of inter-generational transfer of batik skills, the specialised labour pool in the batik industry is endemic in certain regions and being sustained as a local tradition. As exemplified in the batik clusters in Kampung Laweyan and Kampung Kauman the resurgence of the batik industry by a younger batik generation has attracted the old batik workers who used to work with their parents to return working at their batik firms. In the 1970s there was a massive lost generation in the batik industry due to the introduction of printing technology. During that period of hardship many batik entrepreneurs discontinued batik production and changed to other forms of employment, forcing batik workers to also search for new jobs (refer to discussion in Subchapter 4.6). However, such circumstances did not lead to the disappearance of batik labour specialisation in those regions. The case of the batik cluster in the Lasem Area could be a good example where former batik workers have become new batik entrepreneurs, as exemplified by Mrs. Sugiyem, Mrs. Anisah, Mrs. Rohim, and Mrs. Ramini. Formerly, all these Javanese entrepreneurs worked at Chinese-owned batik firms in Lasem before starting up their own batik businesses recently.

Figure 6.13 Backward linkages pattern of batik clusters in Kampung Laweyan, Kampung Kauman, and Lasem Area



Remark: The multiple roles of larger batik producer, intermediate trader, and local cooperative as the middlemen of material supply exist in Lasem Area

Source: Author (2013)

Actually, the employment size of each batik cluster cannot be measured exactly due to the absence of a local batik industry database. As explained by Mr. Najamudin, who represents a local government staff (personal communication, January 10, 2012), most batik firms particularly those in Surakarta have not been registered yet, and the few registered firms are less cooperative in regularly disclosing their business activities. As a result, the government cannot check the performance of the batik industry thoroughly including the employment statistics. This situation also takes place in the Lasem Area. Thus, in the following discussion I will provide an estimate figure of each batik cluster based on replied questionnaires, interviews, and field observations.

In the case of batik clusters in Kampung Laweyan and Kampung Kauman, the average employment size for each batik firm varies between 14-42 workers. This figure accounts for permanent batik workers who are undertaking batik labour and earning regular wages. Some of them work at in-house batik workshops while the others at their homes in villages. In addition, there are a great number of casual batik workers offering the products door-to-door to existing batik firms, (intermediate) batik traders, and the local market. Thus, the current employment size of batik clusters in Kampung Laweyan is around 2,500 workers and in Kampung Kauman around 1,300 workers on average. In contrast, similar employment conditions are found in Lasem Area in a slight difference where either permanent or casual workers may take out batik works from several batik firms simultaneously to be completed after office hours at their homes. Therefore, the batik cluster in the Lasem Area is, to some extent, unable to create a bonding loyalty of batik workers to a single batik firm compared to those in Kampung Laweyan and Kampung Kauman. However, the average employment size in Lasem Area is higher with 29-149 workers per firm. In total the local batik cluster may generate at least 2,700 employments on average.

The comparable labour composition of three batik clusters can be analysed in **Table 6.12**. The table is built upon a general batik production process shown in **Figure 5.1** combined with questionnaire results. Actually, there are three labour groups in the batik industry, i.e. production, trading, and administration. Production workers are the most important staff in the industry. Those involved in the key production process, i.e. handwritten and stamped batik making, dyeing, and wax removal processing, earn the highest wage amount of IDR 40,000-50,000 (USD 3.3-4.2) followed by trading and administration staff. Some are recruited to execute a single work such as *nyorek* (copying batik motif from paper scratch to blank fabric), *mbatik* (handwritten and stamped batik making), and administration. Others may undertake multiple positions such as dyeing and wax removal processes. The batik firm owner focuses more on the pre-production phase, production control, and marketing and distribution. Sometimes he or she recruits an assistant called *carik* who is a trusty person responsible for supervising the entire daily production process.

Both batik clusters in Kampung Laweyan and Kampung Kauman share a similar labour composition. They mostly work all the time except during public holidays. They are recruited informally through words of mouth by using family network and friend relationships. The only difference perhaps is the range of the commuting area where batik workers in Kampung Laweyan come from Sukoharjo Regency and Sragen Regency while those in Kampung Kauman from Klaten Regency and Boyolali Regency. In comparison, the labour composition in Lasem Area batik cluster is also similar in terms of the number of workers employed in each labour position. However, the wage structure is slightly higher in Lasem and more

importantly, there are no batik stampers employed. The commuting area is also smaller where batik workers only travel inside the Rembang Regency.

Table 6.12 The labour composition of batik clusters in Kampung Laweyan, Kampung Kauman, and Lasem Area

No.	Type of Labour	Laweyan and Kauman		Lasem Area	
		Employment (Workers)	Daily Wage (USD)	Employment (Workers)	Daily Wage (USD)
PRODUCTION					
1.	Raw material preparation*	1-2	1.7	1-4	1.3-2.5
2.	Design making*	1-2	1.7	1-2	1.3-2.1**
3.	Design copying (<i>nyorek</i>)	1-6	1.7	1-4	0.8-2.5**
4.	Handwritten batik making	2-5	2.1-3.3	20-120	1.3-4.2
5.	Stamped batik making	2-5	2.1-3.3	0	0
6.	Dye processing*	2-5	2.5-3.3	2-8	1.3-4.2
7.	Wax removal processing*	1-5	2.5-3.3	2-5	2.1-4.2
8.	Quality controlling*	1-2	1.7-2.9	1	1.7
TRADING					
9.	Distribution & marketing*	2-8	1.7-2.9	2-5	1.7
10.	Direct selling	2-4	1.7	0	0
ADMINISTRATION					
11.	Bookkeeping and payroll	1-2	1.7-2.9	1-2	1.7

*Remark: * the types of labour that can be executed by a worker as multiple jobs*

Source: Author (2013)

So far we may assume that the embedded batik skills and typical closeness in family networks and friend relationships are the key determinants for staff recruitment. Unexpectedly, however, batik producers and traders in all batik clusters do not completely rely on primordial family and friendship ties to fulfil required staff. These criteria are perceived as having moderate impact on the formation of labour composition along with a cheaper wage level criterion. They also do not require skilled labour for each position except those in production works. Instead they emphasise more on honesty, responsibility, integrity, and a hardworking attitude for prospective staff in all positions. As can be observed in **Table 6.13**, batik entrepreneurs in Kampung Laweyan impose the most stringent conditions for labour supply then followed by Lasem Area and Kampung Kauman, indicating a tight competition level there.

Table 6.13 Typical basic requirements for labour force of batik clusters in Kampung Laweyan, Kampung Kauman, and Lasem Area

No.	Conditions of Supply	Laweyan			Kauman			Lasem		
		P	T	A	P	T	A	P	T	A
1.	Cheaper wage level	High	High	High	Low	Low	Low	High	High	Low
2.	Skill and knowledge suitability	High	High	High	Low	Low	Low	High	High	High
3.	Creative and innovative capability	High	High	Low	Low	Low	Low	High	High	Low
4.	Honesty, responsibility and integrity	High	High	High	High	High	High	High	High	High
5.	Leadership quality	High	High	Low	Low	Low	Low	High	High	Low
6.	Adaptability to firm's business strategy	High	High	High	Low	High	High	High	High	High
7.	Team working capability	High	High	High	Low	Low	Low	High	High	High
8.	Good communication skill	Low	High	High	Low	High	High	High	High	Low
9.	Hardworking attitude	High	High	High	Low	Low	Low	High	High	High
10.	Having close family relationship	High	High	High	Low	High	High	Low	High	High
11.	Having close friendship and social relations	High	High	Low	High	Low	Low	High	High	High

Remark: P = production; T = trading; A = administration

The coloured cells indicate the degree of importance of each input requirements as follows: High = dark green; Medium = light green; Low = very light green

Source: Author (2013)

In a matter of capital possession, I can only provide an estimated figure of initial investments required to start up batik business taken from limited questionnaire results. In general, it requires about IDR 15-600 million (USD 1,250-50,000) to run new batik business depending on the scale of production. The largest investment amounts are venture capital and raw material supply that may cost up to 60% of the total investment. Batik clusters in Kampung Laweyan are likely to invest larger amounts of venture capital while their counterparts in the Lasem Area invest in raw material supply. In the case of Kampung Kauman batik cluster the local industry seems less competitive than the other two because of the lowest investment levels in all categories (see **Table 6.14**). Another feature of the investment pattern in these batik clusters is that all batik entrepreneurs finance the businesses themselves. They prefer to call for further financial support from family relatives or friends, but not the banks. Their reluctance to access bank loans is primarily because of strict loan conditions, particularly related to collateral and high interest rates, which may inhibit business operations. The third alternative of financial support may come from government loans or grants. A number of government agencies from central to local levels have various routine programs to provide financial assistance to batik firms in particular. Usually, the programs appear in forms of a microfinance scheme with lower interest rates, revolving funds, or special grants.

Table 6.14 Initial investment composition of batik clusters in
Kampung Laweyan, Kampung Kauman, and Lasem Area (USD)*

No.	Type of Investment	Laweyan	Kauman	Lasem Area
1.	Venture capital	250-25,000	417-4,167	417-16,667
2.	Equipment and technology	125-417	125-417	83-833
3.	Workshop property	833-2,083	N/A	833-8,333
4.	Raw material	83-16,667	167-3,750	167-25,000
5.	Labour	N/A	N/A	N/A

*Remark: * the actual amount has been converted to the 2013 currency exchange rate of
USD 1 = IDR 12,000*

Source: Author (2013)

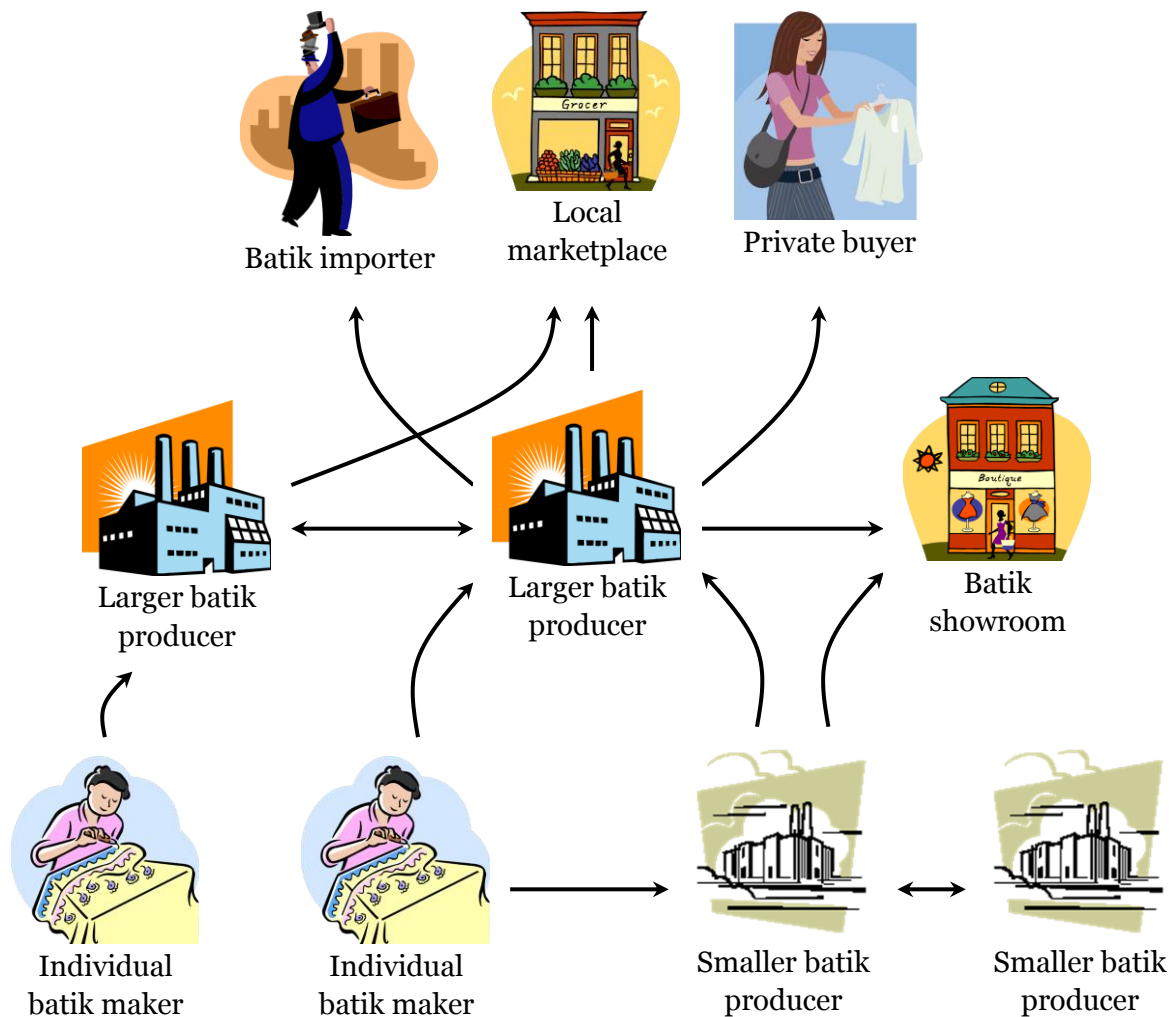
Production Network and Forward Linkages

Batik production in Kampung Laweyan takes place at home-based workshops. The old-fashioned production network is being maintained where all batik processes are completed in the neighbourhood. Currently, there are 53 batik production firms; some undertake complete processing from material preparation to finishing stages while the rest do partial processing either focusing on intermediate goods production or the finishing stage. Whichever production stage that the firm and individual batik maker gets specialised, the finishing stage must take place in the batik master's home-based workshops at which the final inspection of product quality is completed. The forms of production networks exist in Kampung Laweyan demonstrate a subcontracting pattern, and none carry out a horizontal joint production (see **Figure 6.14**). The batik masters or the larger batik firms provide bonding contracts to downlinked batik firms and individual batik makers to execute particular batik works. On the other hand, the downlinked partners must return the products to them for finishing and final quality control. In most cases the returned products are unfinished batik items to which the contract givers would apply dyeing and the remaining finishing processes. Afterwards, the partners will be paid for the accepted products and may collect another contract. In the case of rejected products, the partners must improve the products to meet the quality standard of the contract giver. If repeated disqualified products occur, the partners may lose the contract forever. Dealing with difficulties to check product quality from the partners, the contract givers never provide multiple contracts to several different downlinked partners. The main reason is the absence of a standardised batik industry, particularly in batik techniques and dyeing process, meaning that each batik firm and individual batik maker possesses different batik skills and confidential dyeing formula. Thus, any imitation process in the industry will not result in identical batik products.

Most partners are the smaller batik firms and individual batik makers residing in Kampung Laweyan neighbourhood. The rest come from adjacent regions such as Kampung Sondakan, Kampung Pajang, Kampung Bumi (Surakarta Municipality), and Kabanaran Village (Sukoharjo Regency). Both batik masters or larger batik firms and their downlinked partners run the business daily except public holidays. The production routine takes up 8-10 hours per day, starting with material preparation at 7 a.m. and continuing with the production

process from 9 a.m. to 5 p.m. The batik workers come to the workshop around 8 a.m. and finish in the afternoon. Unlike the older generations, batik workers no longer live with their master working overtime. They work during regular business hours and sometimes take some blank and unfinished batik cloths to be continued at home. While the production is running, the batik masters or firm owners may check out batik trading and marketing progress by contacting potential buyers and loyal customers and visiting their own showrooms or kiosks in the local marketplace particularly Pasar Klewer. Alternatively, they collect loans and batik orders given to smaller batik firms or individual batik makers at their homes. Around mid-day they will check the production at the workshop, but sometimes such production control is delegated to a *carik* (a supervising assistant). At the end of the day they will conduct a final inspection for the entire production process before the workshop is closed and the batik workers going home.

Figure 6.14 Forward linkages pattern of batik cluster in Kampung Laweyan



Source: Author (2013)

At the moment the average production capacity of the batik cluster of Kampung Laweyan could achieve more than 13,000 pieces of batik cloths and 6,000 pieces of various batik clothing articles valued at IDR 3.1 billion (USD 256 thousand) per month. Combined with

batik commodities purchased from other places (refer to **Table 6.10**), the estimated amount of production capacity may increase up to 15,000 pieces of batik cloths, 8,000 pieces of batik clothing articles, and an additional 800 pieces of various batik products worth at IDR 3.3 billion (USD 280 thousand) per month. Obviously, the batik cluster of Kampung Laweyan is considered the largest batik production centres in Surakarta where the capacity ratio between original and imported products is about 85:15 (batik cloth) and 40:60 (batik clothing). Such production amounts and ratios are even higher than their counterpart Kampung Kauman batik cluster. The market destinations of Laweyan batik products are not only limited to the domestic market, but also reach the export market (see **Table 6.15**).

Table 6.15 Average monthly production capacity of batik cluster in Kampung Laweyan

No.	Type of Commodities	Quantity (Pieces)	Unit Price (USD)*	Market Destinations
CLOTHS				
1.	Handwritten batik	20-2,000	25.0-83.3	Surakarta, Yogyakarta, Semarang, Jakarta, Outer Java, Malaysia
2.	Stamped batik	300-2,400	12.5-25.0	Surakarta, Yogyakarta, Semarang, Jakarta, Outer Java, Malaysia
3.	Combined batik	4,000	6.3-10.0	Surakarta, Yogyakarta, Semarang, Jakarta, Outer Java, Malaysia
4.	Printed batik	5,000	3.3-5.8	Surakarta, Yogyakarta, Semarang, Jakarta, Outer Java, Malaysia
CLOTHING				
5.	Shirt	100-2,000	2.9-8.3	Surakarta, Yogyakarta, Semarang, Bandung, Jakarta, Outer Java, Malaysia
6.	Blouse	100-2,000	2.9-8.3	Surakarta, Yogyakarta, Semarang, Bandung, Jakarta, Outer Java, Malaysia
7.	<i>Daster</i> (dress)	6,000	0.8-5.8	Surakarta, Yogyakarta, Semarang, Bandung, Jakarta, Denpasar, Outer Java, Malaysia
8.	Sarong	N/A	N/A	N/A
9.	<i>Jarik</i> (skirt)	100-200	12.5-16.7	Surakarta, Pekalongan, Yogyakarta
10.	Pant	N/A	N/A	N/A
11.	<i>Selendang</i> (scarf)	100-200	12.5-16.7	N/A

*Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000*

Source: Author (2013)

Multiple trade and marketing networks are practiced in the Kampung Laweyan batik cluster. The most common way is through direct selling at local marketplaces particularly Pasar Klewer. The batik entrepreneurs bring the products to their own kiosk in the market or vend door-to-door. The second way is by opening a batik showroom at the front side of the house. This approach has been popular since the mid-2000s shortly after the endorsement of the

revitalisation program in the neighbourhood. In line with the growing number of batik showrooms in Kampung Laweyan, it generates as many incoming buyers and visitors as the increase of production capacity. The third way is to transport the products to private buyers/loyal customers and importers. Only a small number of large batik entrepreneurs can manage such a delivery order. The fourth way is through cross-selling between fellow batik entrepreneurs. Such horizontal linkages occur through consignment methods where the seller indicates the price on the products from which the co-sellers may gain a compensation fee for sold products (see **Figure 6.16**). Interestingly, there are no intermediate traders taking a role in the trading and marketing network of finished batik products in Kampung Laweyan. The dominating role of batik masters and firm owners persists on this stage so that the price stability of similar products could be maintained in diverse selling points.

In comparison, the production pattern of batik cluster in Kampung Kauman shares some similarities with its counterpart in Kampung Laweyan. The daily production takes up to ten hours during weekdays but not on public holidays. Batik workers only work during business hours and nobody lives at the workshops owned by the batik masters or larger batik firms. They are also allowed to take blank or unfinished batik cloths to be continued at home. However, the finishing process and final inspection must be done at the workshops. The main difference is that the location of batik workshops is not only in the neighbourhood, but many new batik workshops are built in various places. Some batik masters have placed them close to their workers villages such as Bekonang (Sukoharjo Regency). Of 21 existing production firms, there are probably less than ten firms maintaining the production process in Kampung Kauman. The limited space available for the development of the batik industry has been the major cause of home-based batik workshops moving to other places. Another cause is associated with the enormous conversion of the old batik workshop buildings to different use following change of ownership. As a result, the number of batik showrooms in the neighbourhood has doubled in relation to the batik workshops, featuring Kampung Kauman as a batik trading centre.

The production network appears in the form of a vertical subcontracting pattern similar to those in Kampung Laweyan. The batik masters or the larger batik firms may provide contracts to smaller partners as well as individual batik makers. The downlinked partners must comply with contractual conditions and return the unfinished products to the contract givers for quality control. Currently, the average production capacity of batik cluster in Kampung Laweyan could achieve more than 1,000 pieces of batik cloths and 800 pieces of batik clothing items valued at IDR 400 million (USD 34 thousand) monthly. If batik commodities purchased from outside Kampung Kauman are added on (refer to **Table 6.10**), then the total amount of production capacity will increase up to 2,500 batik cloths, 2,800 batik clothing items, and 800 various batik products with a total value of IDR 700 million (USD 58 thousand). Referring to such estimated figure, it is obvious that the batik cluster in Kampung Kauman greatly relies on batik supply from other regions, where the capacity ratio between original and imported products is 40:60 for batik cloths and 30:70 for batik clothing items (see **Table 6.16**).

Table 6.16 Average monthly production capacity of batik cluster in Kampung Kauman

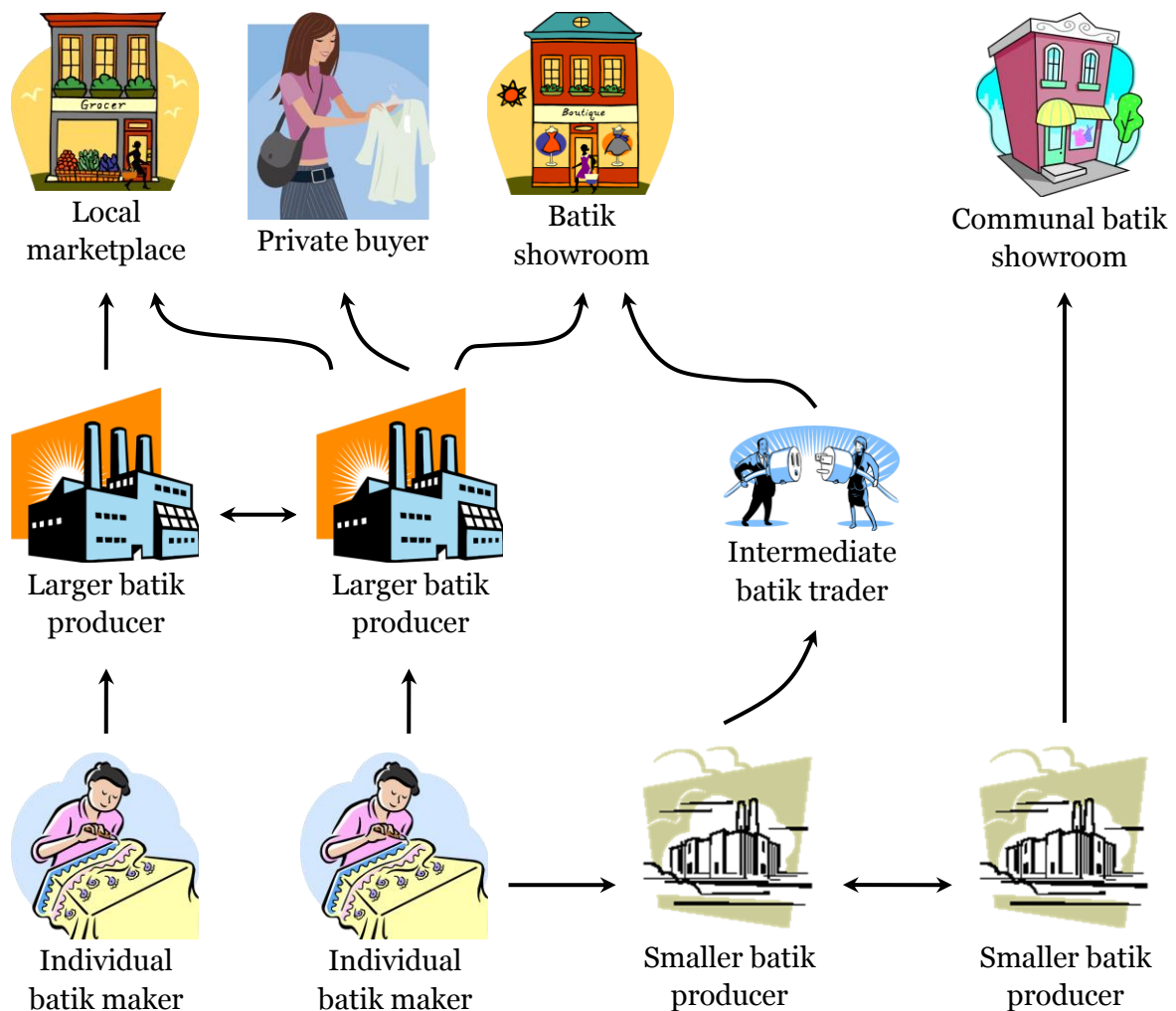
No.	Type of Commodities	Quantity (Pieces)	Unit Price (USD)*	Market Destinations
CLOTHS				
1.	Handwritten batik	10-20	20.8-66.7	Indonesia
2.	Stamped batik	40-250	8.3-41.7	Indonesia
3.	Combined batik	250	5.0-25.0	Indonesia
4.	Printed batik	500	4.2-33.3	Indonesia
CLOTHING				
5.	Shirt	40-300	6.3-8.3	Indonesia
6.	Blouse	40-300	4.2-25.0	Indonesia
7.	<i>Daster</i> (dress)	40-200	3.3-4.2	Indonesia
8.	Sarong	N/A	N/A	N/A
9.	<i>Jarik</i> (skirt)	10	20.8-66.7	Indonesia
10.	Pant	N/A	N/A	N/A
11.	<i>Selendang</i> (scarf)	40	4.2-6.3	Indonesia

Remark: * the actual amount has been converted to the 2013 currency exchange rate of
 USD 1 = IDR 12,000

Source: Author (2013)

Regarding prospective forward linkages resulted from the industry, the batik entrepreneurs in Kampung Kauman focus on the domestic market. They are likely to maintain the former trading and marketing networks inherited by their ancestors. Surakarta, Yogyakarta, Semarang, Jakarta, Surabaya, and Bali remain the favourite market destinations of the batik industry in the neighbourhood. Unfortunately, more detailed information about the rest of the market destinations could not be captured during the fieldwork, so it has not been possible to work out better comparison against the other batik clusters. Nevertheless, the current forward linkages of the batik cluster in Kampung Kauman presents an important role of intermediate traders in the industry regardless of network similarities applicable in Kampung Laweyan. Their role is complementary to the cross-selling method when they collect various batik products from different suppliers. These traders manage their own batik showrooms, kiosks, or other selling points, and may sell similar products at different price levels. In contrast, the cross-selling method practiced in Kampung Kauman enables traders to vary prices of similar products. Another important feature of the current trading and marketing network is the presence of communal showrooms. Their existence is beneficial to support smaller batik producers to market their products at affordable price levels (see **Figure 6.15**).

Figure 6.15 Forward linkages pattern of batik cluster in Kampung Kauman



Source: Author (2013)

In the case of the batik cluster in the Lasem Area the daily production routine is somewhat similar to their counterparts in Surakarta. The batik masters or firm owners are responsible for the entire production from material preparation to final inspection. The difference is that they need not recruit an assistant for production control because they monitor and supervise all production stages themselves. The business hour is the same length taking ten hours a day, starting from early morning and ending by the afternoon. The batik workers may come to work at the batik workshop during business hours. Alternatively, they can come and pick up blank cloths and waxes required for batik making at home. Therefore, the batik workers are more flexible to choose whether they prefer to work at the workshop all day long or at home. Interestingly, the relationships between batik masters/owners and their workers in the Lasem Area demonstrate “unusual customary relations”. First, the batik workers still consider batik making as a secondary job while waiting for agriculture cultivation and harvesting periods. They can come and go easily from the batik industry depending on the availability of agricultural work. As a consequence, the batik masters/owners cannot force them to work regularly. Second, the batik workers may collect advance payment prior the completion of the batik work. This applies to those who prefer to work at home during business hours and the regular workers who are keen to undertake additional batik work

after hours. Third, the batik workers may work for several batik masters/owners at the same time. Again, they can come and go easily in the industry instead of building a loyal bonding with certain batik masters/owners. This condition is primarily caused by the scarcity of skilful batik workers in the Lasem Area, from which the batik masters/owners are losing powerful bargaining positions vis-à-vis the batik workers. In addition, the recent youth generation prefers to work at manufacturing factories or take clerical jobs to earn “easy money” rather than do batik making.

With regard to the sequential stages of production and time management, there is no big difference compared to the batik clusters in Surakarta except the quality of processing in cloth preparation and dye application. The batik industry in the Lasem Area may take longer and better production processes since it is consistent with traditional handwritten batik making. The cloth preparation requires 7-12 stages of soaking and washing, compared to 4-5 stages in Surakarta. It is necessary for the strengthening of the cloth fibres to absorb and peel off waxes applied quickly, and to maintain colour durability during multiple dyeing processes. If we look back at **Table 6.7** and **Table 6.8**, it is obvious that the batik industry in the Lasem Area uses a greater supply of waxes and dyes, not only in the total amount but also the price levels of the respective materials.

Even though the production process looks more complicated, the average capacity per month is lesser than the batik cluster in Kampung Laweyan but higher than Kampung Kauman. As we can observe in **Table 6.17** below, the production capacity of the batik cluster in the Lasem Area may achieve 4,000 pieces of handwritten batik cloths and 300 pieces of batik clothing worth around IDR 24 billion (USD 2 million) per month. The market destinations cover many regions in Indonesia and foreign countries. Such achievement is definitely resulted from the continuation of the traditional handwritten batik industry supported by 30 batik firms which are focusing to market authentic local products.

Furthermore, the trading and marketing network is much simpler than those in Kampung Laweyan and Kampung Kauman. The vertical forward linkages may appear from individual batik makers to batik firms and from batik firms to local marketplaces, private buyers, and local batik cooperative. There is no horizontal cross-selling applied since each batik entrepreneur produces and markets their products individually. Another important feature is the absence of intermediate traders, so that price stability merely depends on inter-firm competition which in turn creates very high discrepancies on price levels (see **Figure 6.16**).

Competition and Cooperation Patterns

Among the batik clusters observed the level of competition occurring in Kampung Laweyan is perhaps the highest resulting from much segmented product marketing. Each batik producer maintains individual business networks, thanks to inherited family business networks. Those newcomers in the industry with fewer business networks are also benefited from that legacy through continuous business campaigning by Kampung Laweyan as the largest batik production centre in Surakarta. In fact, batik showrooms in Kampung Laweyan do not display similar products. Each producer sells distinguishable own products or resells purchased products from other places at equal price levels. The quantity of products sold is limited and the product variants change frequently. Cross-selling appears in a few locations at the same price levels, creating stable batik trading across the neighbourhood.

Table 6.17 Average monthly production capacity of batik cluster in Lasem Area

No.	Type of Commodities	Quantity (Pieces)	Unit Price (USD)*	Market Destinations
CLOTHS				
1.	Handwritten batik	30-4,000	12.5-500.0	Rembang, Kudus, Semarang, Kendal, Pekalongan, Bandung, Bogor, Jakarta, Serang, Blitar, Malang, Surabaya, Surakarta, Yogyakarta, Bali, Medan, Sumatra, Kalimantan, Singapore, Brunei, Thailand, Qatar
2.	Stamped batik	0	0	N/A
3.	Combined batik	0	0	N/A
4.	Printed batik	0	0	N/A
CLOTHING				
5.	Shirt	50	16.7	Rembang
6.	Blouse	N/A	N/A	N/A
7.	<i>Daster</i> (dress)	N/A	N/A	N/A
8.	Sarong	200	12.5	Rembang
9.	<i>Jarik</i> (skirt)	N/A	N/A	N/A
10.	Pant	N/A	N/A	N/A
11.	<i>Selendang</i> (scarf)	50	20.8	Rembang

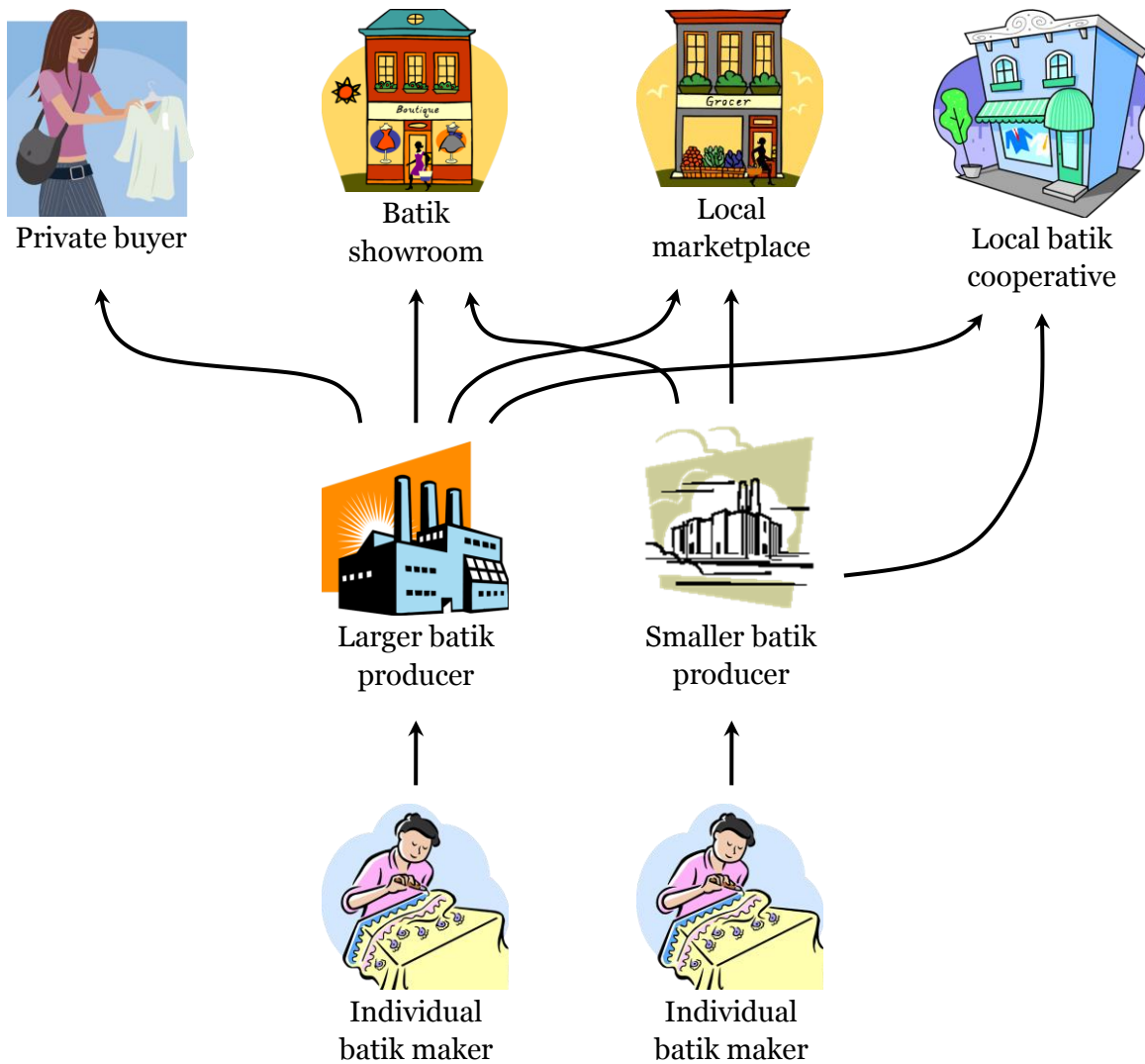
*Remark: * the actual amount has been converted to the 2013 currency exchange rate of USD 1 = IDR 12,000*

Source: Author (2013)

Unfortunately, such a highly segmented competitive market is not supported by appropriate business ethics. Opportunistic behaviour is maintained by batik producers as manifested in uncontrolled imitation products. Once particular batik motifs and designs are sold out fellow batik producers will imitate them immediately. These competitors will apply slight different drawing and dyeing techniques, and sell the products at more competitive prices. However, the original makers cannot complain about intellectual property rights. The main reason is that the imitation process in the batik industry has been sustained since earliest times, and most batik motifs and designs, particularly the classical ones, have been collective property rights of the nation or society (refer to Chapter 5 for further discussion). Secondly, there are no formal regulations and strict law enforcement imposed by local and central governments. The government invocation addressed to the entire batik community to register product patents and apply standardised batik labelling for authentic batik products has been ineffective. The lack of awareness from the batik community in Kampung Laweyan – and probably all other batik communities elsewhere in Indonesia – about the importance of patent registry has led to such ineffectiveness. Thirdly, FPKBL cannot impose similar regulations and law enforcement as well, mainly because it functions more as a social community-based organisation than a ruling authority and typical feature of Laweyan society with a stubborn and less cooperative attitude. Finally, either the government or FPKBL has

nothing to do unless providing appeal notices and advices to correct improper business ethics by prompting out social tolerance and a bashful manner (*pekewuh*).

Figure 6.16 Forward linkages pattern of batik cluster in Lasem Area



Source: Author (2013)

The case of the Kampung Kauman batik cluster also demonstrates high competition in a different way. Lower market segmentation applies in the neighbourhood because of lower production capacity and an intensified cross-selling practice. Product imitation occurs intensively similar to Kampung Laweyan case. The batik producers and traders, particularly those possessing batik showrooms, must deal with unpredictable price war due to abundant similar products being sold throughout the neighbourhood. For example, the recent trade of the *batik bola* motif – a new batik motif with the application of famous soccer club logos – has caused an unstable market price because they sell similar products at different price levels. Interestingly, such cross-selling practice is created not only through the consignment method but also by guiding the buyers into other showrooms whenever they run out of the supply stock or the buyers are searching for different products unavailable in their own

showrooms. In turn, such disruptive opportunistic behaviour may decrease the business climate in the neighbourhood.

Dealing with such circumstances, neither the government nor PKWBK can solve the problem easily. The government cannot impose formal regulations while PKWBK are unable to release particular reward-and-punishment rules. In the past PKWBK facilitated conflict resolutions between batik producers/traders to relieve discount wars but were less effective. Currently, PKWBK has withdrawn the direct engagement in inter-firm competition, and focuses more on developing communal batik showrooms and microfinance cooperative units to support smaller batik entrepreneurs in Kampung Kauman in particular. Thus, open market competition takes place at the cost of the individual batik producers and traders.

In contrast, a moderate competition applies in the case of the batik cluster in the Lasem Area. The imitation process also applies intensively, but the lesser number of batik producers and the absence of intermediate traders have prevented the local batik products from fluctuated market prices. Even though product segmentation is relatively high and product similarities are seldom found, the batik producers are to some extent safeguarded from price wars. Rather, they are quite confident in developing individual business marketing, thanks to the preservation of traditional handwritten batik making which contributes to limit uncontrolled product imitation. Thus, the dual roles performed by FRK-BTL and KBTL which are backed by BAPPEDA and DISPERINDAGKOP do not greatly affect the batik industry development in the Lasem Area. Open market competition also occurs in the Lasem Area as well, leaving out the inter-firm conflicts that would remain in the air if not resolved by involved batik entrepreneurs. In the case of skilled batik workers being hijacked for example, the government, FRK-BTL, and KBTL have surrendered the problem into the hands of the batik entrepreneurs involved. The absence of government regulations and loose social inclusiveness has contributed to such unfriendly competition. So if the counterparts in Kampung Laweyan and Kampung Kauman are worrying about uncontrolled imitation products and price stability, the batik entrepreneurs in Lasem Area are worrying about the availability of labour supply.

6.3 Institutional Network in Batik Industry Clusters

Relationship with Government Agencies

All three batik clusters are maintaining good relationships (mostly) with local government agencies in order to collect sustainable support from government policies and programs. The common support they are frequently asking for is the creation of a better business climate. There are three leading public agencies responsible for undertaking this task: 1) Local Development Planning Authority (BAPPEDA), 2) Local Office for Industry and Trade (DISPERINDAG), and 3) Local Office for Cooperatives, Micro, Small, and Medium Business Enterprises (DISKOP-UMKM). Specific to Rembang case, the latter two agencies are unified into a single organisation namely the Local Office for Industry, Trade, and Cooperatives (DISPERINDAGKOP). The following **Table 6.18** presents the contribution of these agencies to support the creation of a better business climate and batik industry development.

Table 6.18 Contribution of leading public agencies to support batik industry development

No.	Organisation	Featured Tasks	Specific Programs
1.	BAPPEDA	1) Formulating policies on local development planning 2) Coordinating inter-governmental policy-making 3) Supervising and implementing policies on spatial and environment, economic, socio-cultural, governance, research and development, and statistical affairs 4) Providing thorough monitoring and evaluation on local development programs	1) Facilitating batik cluster development initiatives 2) Hosting regular meetings through FEDEP to monitor batik cluster development progress
2.	DISPERINDAG	1) Formulating sector strategic plan related to industry and trade affairs 2) Supervising and implementing policies on industry and trade affairs 3) Providing guidance and counselling on industrial business, standardisation, marketing, equipment and technical upgrading, institutional cooperation, and capacity building 4) Providing monitoring and evaluation on export-import and international trade cooperation at local level	1) Providing training on the batik industry, corporate management, web design, and online marketing 2) Providing new equipment grants 3) Sponsoring (mostly) smaller and new batik firms to participate in exhibition and trade fairs
3.	DISKOP-UMKM	1) Formulating sector strategic plan related to cooperatives, micro, small, and medium enterprises affairs 2) Supervising and implementing policies on cooperatives, micro, small, and medium enterprises affairs	1) Providing trainings on batik design, showroom interior layout, business marketing, bookkeeping, and entrepreneurship 2) Providing microcredit loans through <i>Kredit Usaha Rakyat</i> (People's Business Credit), <i>Kredit Dana Bergulir</i> (Revolving Fund Credit) schemes, and many other similar facilities

Continued in the next page

Table 6.18 continued

No.	Organisation	Featured Tasks	Specific Programs
		3) Providing guidance and counselling on microcredit and money lending services, business entrepreneurship, and capacity building for cooperatives, micro, small, and medium enterprises	3) Providing new equipment grants 4) Sponsoring (mostly) smaller and new batik firms to participate in exhibition and trade fairs
		4) Providing monitoring and evaluation on business activities run by cooperatives, micro, small, and medium enterprises	

Source: Author (2013)

The abovementioned programs are available every year as a matter of government top-down action. To access the programs, the implementing government agency requires that the beneficiaries must be batik clusters, cooperatives, or any other forms of business groups rather than individual batik firms. These target groups are responsible for distributing and checking program implementation with supervision from the respective government agency. Having routine “ready-to-use” template programs, the government creates opportunities to access the programs in compliance with government-driven terms and conditions. In other words, batik cluster organisations and any other target groups are conditioned to pursue program matching instead of creating genuine programs from below. Therefore, such a rigid governance system leaves small room for more innovative participatory policy making to meet the actual needs of batik cluster development. Not surprisingly, there are some overlapping programs promoted by different public agencies. For instance, DISPERINDAG and DISKOP-UMKM in Surakarta provide sponsorship for batik firms to participate in exhibition events. Similar practice occurs in Rembang where DISPERINDAGKOP and *Dewan Kerajinan Nasional Daerah Kabupaten Rembang* (DEKRANASDA) or Local Council for National Handicraft of Rembang Regency – a non-profit organisation supported by the government which promotes a local handicraft industry – are rallying to provide similar sponsorship. Such overlapping programs demonstrate ineffective competition among public agencies and other local organisations due to lack of coordination.

Another feature of the government network is the persistence of program unsustainability. Each government agency has encouraged policy monitoring and evaluation instruments. However, this conduct carries out more a policy cycle routine to meet satisfied organisational performance indicators. Numerous programs completed are checked by using a set of indicators produced by implementing public agencies without collecting appropriate feedback from target groups. The perceptions and expectations from target groups regarding program implementation, outcomes, aftermath support, and future continuation are often ignored from the final evaluation measurement. As a result, government programs serve a one-off transaction without measurable impacts to target groups. In turn, the government cannot figure out precisely the progress of batik cluster development programs, and on the other hand, the target groups are being jeopardised within policy cycle uncertainties. In the case of Kampung Laweyan for example, the post-training evaluation and program

continuation of web design training have never existed so that its effectiveness to enhance the quality of batik marketing remains unchecked (Efendi, personal communication, December 22, 2011). In the meantime, the case of Kampung Kauman presents program unsustainability on natural dyed batik making training. The participants did not receive post-training support to market their products. Actually, they have spent much time to undertake self-experiments to extract natural dyeing vegetation substances and more complicated batik processes. Dealing with the lack of government marketing support, they are likely to market the products by utilising immediate support from batik cluster organisations and larger batik firms (Setiawan, personal communication, April 9, 2012; Supriyadi, personal communication, April 10, 2012). Another story comes from Lasem Area case when the government introduced batik making training for new entrepreneurs. After the program completion there was no clear batik industry roadmap so that most participants were reluctant to start up their own businesses (Rifa'i, personal communication, May 8, 2012).

Relationship with External Agencies

Noticeably, local universities, non-governmental organisations (NGOs), and donors are the most influential actors in the batik industry development. They could manage more intensive contacts with local batik cluster organisations and individual firms in order to accommodate cluster's actual needs and to design solution programs properly. In the Kampung Laweyan batik cluster the role of the research group from Universitas Muhammadiyah Surakarta (UMS) was inspiring to introduce bioethanol energy to replace the use of kerosene in the handwritten batik making process. However, this effort was unsuccessful as the evaporated air resulting from the bioethanol combustion caused dizziness and respiratory problem to batik makers (Efendi, personal communication, December 22, 2011). The best practice comes from the case of Kampung Kauman where a facilitator from Universitas Negeri Sebelas Maret (UNS), Mrs. Musyawaroh (aged 53 years), was keen to empower PKWBK since the beginning. The mutually active engagement between the local batik cluster and academics has succeeded in promoting a kampung revitalisation program in Kampung Kauman (Setiawan, personal communication, April 9, 2012). Unfortunately, the role of academics remains absent in the case of Lasem Area batik cluster.

In the meantime, the role of NGOs and donors are identifiable in Kampung Laweyan and Lasem Area cases. A Jakarta-based NGO namely *Yayasan Warna-Warni* (Colourful Foundation) contributed to the promotion of the kampung revitalisation program in Kampung Laweyan nationally in the early 2000s. It succeeded in assisting the reshaping of the Kampung Laweyan image from abandoned old settlement to an attractive cultural heritage tourism destination site (Soedarmono, personal communication, March 6, 2012). During 2007-2008 fiscal year GTZ sponsored the building of *Instalasi Pengolahan Limbah* (IPAL) or Communal Liquid Waste Treatment Facility in Kampung Laweyan through GTZ Pro-LH project in cooperation with Ministry of Environment and BLH of Surakarta Municipality to reduce water pollution level resulting from the batik industry. The pilot project actually was less successful in changing the attitude of local batik producers to encourage green production and to reduce the water pollution level in the neighbourhood, mainly because of limited space availability and land topography unsuitable to cover entire batik cluster needs (Najamudin, personal communication, January 10, 2012). In the case of Lasem Area, the role of Jakarta-based NGO namely *Institut Pluralisme Indonesia* (IPI) or

Indonesian Institute for Pluralism was impressive to encourage indigenous batik entrepreneurs in Jeruk Village of Pancur Subdistrict. It facilitated the presence of new batik business beneficial to rural income generation and traditional handwritten batik industry preservation (Kwan, personal communication, February 29, 2012).

With respect to greater impacts to local batik cluster improvements, the vibrant relationship with those external agencies actually is however unable to build a strong bonding network. In most cases their engagement to maintain the network will disappear shortly after project completion. Time and budget constraints and distant location are the common reasons for such temporary relationship. All three cases are experiencing similar unsustainable networking with external agencies. The slight difference presents in the Kampung Kauman case when the former UNS facilitator is still taking care of good relationship with PKWBK and Kauman society even though she does no longer get involved actively in cluster activities. A testimony from a newly endogenous batik entrepreneur in Lasem Area Mrs. Ramini (aged +50 years), the leader of traditional batik production group KUB Srikandi, may shed light on how such external networking takes place.

“In 2005 Mr. Willy (the founder of IPI) visited the village head residence (of Jeruk Village) looking for potential batik makers here. Following the guidance from the village head, he approached me to start up a new batik business. At that time I had been unemployed for about four years after being fired from a famous batik firm in Lasem. I rejected his proposal at first time because of lack of entrepreneurial skills and working capital. He attempted to convince me by offering financial assistance but I kept refusing. My response remained unchanged until his next visits twice here. At the fourth visit I finally surrendered and agreed to take out his proposal by forming a group of batik makers to run the business. Later he supplied us with sufficient working capital and raw materials, intensive technical assistance, and marketing network. He was responsible for marketing our products so that we could focus on production only. After project completion, he gradually left us to build our independent business networks. Recently, he has rarely ordered our products as our group members were capable of running the business without external support anymore.”

Source: Ramini (personal communication, May 9, 2012)

Relationship with Market Institutions

The groups of suppliers and consumers are the most important actors who determine market institutions in the batik industry. The suppliers organise the availability and accessibility to raw materials and energy sources while the consumers do market demand change. Thus, batik firms and individual batik makers in all three cases maintain good relationships with them. They make direct contacts individually to the suppliers except those few small batik firms in Lasem which are also benefited from the collective supply by the local batik cooperative (KBTL). Mostly the strong relationships with the suppliers and consumers have been sustained from former family business networks and close friendships, through which individual business networks dominate the shaping of market institutions in all batik clusters observed.

In the meantime, the role of independent batik traders and middlemen are less significant except in Kampung Kauman. The well-established individual business networks and subcontracting pattern in three batik cluster cases have inhibited their existence. Even the

batik traders and the middlemen (intermediate batik traders) in Kampung Kauman do not get involved in the batik production process at all either in supplying raw materials, equipment, financial assistance, or technical supervision. They merely take part in the marketing process through a one-off transaction and cross-selling which results in a weak and unpredictable marketing relationship for batik producers. In addition, most batik producers in Kampung Laweyan and Kampung Kauman are undertaking multiple roles as batik traders too, so that the role of independent batik traders and middlemen are unnecessary.

Interestingly, batik entrepreneurs and workers in the three batik clusters agree upon the unimportance of bank, cooperative, and any other financial institutions. They keep relying on family sources for primary financial support. Sometimes they may ask close friends and fellow batik producers for such support. Bank conditionality to access loans, i.e. compulsory collateral and highly interest rate, is the main reason why they avoid seeking financial support from these institutions. Nevertheless, the bank may provide supplementary support through corporate social responsibility (CSR) programs. For instance, PT. Bank Rakyat Indonesia (BRI) in Rembang sponsored the establishment of Batik Village Areas in Sumber Girang Village and Ngropoh Village in September 2010. The program was initiated in cooperation with the owner of Pusaka Beruang batik firm, Mr. Santoso Hartono, in order to improve the living standards of traditional batik makers in those areas. The program incorporated several activities, i.e. batik training, public infrastructure improvements, exhibitions, and money lending partnerships. However, the program might take place with a personal guarantee from a leading batik firm, showing another form of bank conditionality rather than a giveaway capacity building program (Hartono, personal communication, April 20, 2012).

Relationship with Neighbourhood Society

In general, the neighbourhood society in Kampung Laweyan, Kampung Kauman, and Lasem Area do not contribute directly to local batik cluster activities. The society only provides a social order and does not get involved in the batik business cycle. There are no written rules that determine the operation of the home-based batik industry in the neighbourhood unless self-awareness from each batik entrepreneur to withstand social tolerance. Thus, the existence of FPKBL (Kampung Laweyan), PKWBK (Kampung Kauman), and FRK-BTL (Lasem Area) performing an intermediary role within local neighbourhood creates a catalyst to absorb the risks of batik business impacts to the rest of society. The blurred boundary of relationship between batik firms and the neighbourhood which is transcended into these batik cluster organisational bodies' tasks and responsibilities has created flexibility for both parties to resolve business conflicts either in a good or bad manner. If the social cohesion is strong, then the present social interactions may be useful to reduce inter-firm conflicts quickly, and the role of cluster organisation to cope with the conflicts becomes easier. Sometimes inter-firm cooperation in the neighbourhood may lead to stronger social cohesion. However, in most cases there is an asymmetrical correlation between the dynamics of social cohesion and inter-firm business alliance where the former determines the latter. So if the social cohesion is weak, then the inter-firm conflicts may aggravate the present social interactions.

In the case of Kampung Laweyan, the strong social cohesion is built by underpinning common respect to the group of elders or senior batik entrepreneurs and open competition. It helps to balance egocentric behaviour and the hardworking attitude of batik entrepreneurs which is to some extent inherited over generations. As a result, a tight competition resulting from a highly segmented product marketing does not seriously affect the social harmony. Whenever the tensions become heightened and the conflicts seem unsolved, then the resolution should be best turned back to individual self-awareness to maintain social tolerance and a bashful manner. In addition, social sanctions may take effect immediately in forms of gossiping and insinuation for any misconduct. Therefore, all batik entrepreneurs and FPKBL are conditioned to present appropriate respect to the prevailing social order. It would however be ineffective without committed participation from all batik entrepreneurs. In this sense, some leading batik entrepreneurs may ignore it as long as they could maintain strong business networks and distinguished business marketing strategy, through which the loyal customers protect them from business downturn. Due to the least pre-emptive effect of social sanctions for this leading group, the misconduct correction is up to individual self-awareness entirely.

On the contrary, the strong social cohesion in Kampung Kauman exists as a combination of prevailing Javanese-Islamic hierarchical social order and intensified competition brought by an incoming flock of outside batik traders. The flying geese organisational model has shaped the social order in which a few prominent leaders determine the dynamics of social cohesion. In Kampung Kauman prominent leaders are also leading batik entrepreneurs, who can exercise powerful influences in society as well as on the (local) business climate. However, it is the sympathetic contribution and charismatic leadership of this elite group that takes part in, not just a matter of seniority arrogance. Such quality leadership roles are also beneficial to reduce inter-firm conflicts, mainly when the increasing number of incoming batik traders have recently been threatening the local batik industry growth. Similar to the case of Kampung Laweyan, social tolerance and a bashful manner would direct individual behaviour of batik entrepreneurs to reconcile conflicts with limited intervention from this elite group. The PKWBK leader could step in by giving some advice to conflicting parties to find the best solutions by themselves. If the problems remain unsolved, then social sanctions in the forms of gossip and insinuation would punish the troublemakers. The effect could be harmful for the continuation of their business since the industry serves the low segmented batik market.

In comparison, the weak social cohesion persisting in the Lasem Area is shaped by an agrarian life style and strong individualistic behaviour inherited from Chinese culture. The agrarian life style in its purest form actually may lead to very strong social cohesion and harmony. It may also build a strong attachment of the local society to the land and environmental preservation. Ironically, the case of the batik cluster in the Lasem Area merely demonstrates the preservation of traditional batik making partially. The batik producers take advantage of the traditional handwritten batik processing, but they do not care about environmental protection as shown by the intensive use of synthetic dyes and the great unawareness of appropriate liquid waste treatment. Furthermore, the opportunistic behaviour and open competition among batik entrepreneurs have eroded social cohesion enormously, creating intensified distrust inside the batik industry cluster. As a result, the role of FRK-BTL as an intermediary agent for bridging the local batik industry community and the neighbourhood society is elusive, and conflict resolution greatly depends on a courteous attitude by the batik entrepreneurs. No social sanctions may be applicable to such social order since each batik entrepreneur does care much about individual business

networks. If collective actions exist as shown by the role of KBTL in supplying raw materials and promoting joint marketing, it presents another form of individual pursuit to satisfy self-interests rather than voluntary altruism. Thus, the Lasem case perhaps provides the best example to show an antithesis against the clustering theory which suggests the fusion between society and economic activities. It also shows that open competition does not unleash the necessity of business alliance, mainly because of the well-established individual business networks and highly segmented product marketing.

6.4 Lessons Learned: Dismantling Social Cohesion While Promoting Traditional Institutions

Certainly, all three batik clusters present the maintenance of traditional institutions in the local batik industry development. The industry continues to apply labour intensive handmade batik processing even though many batik firms are welcoming the textile printing technology except those in the Lasem Area. The raw materials, batik motifs, and marketing methods used may change except production ways. Handwritten and stamping techniques remain prominent in the contemporary batik industry, which makes authentic batik products distinguishable from fraudulent ones (aka printed batik textiles). Another important feature is the application of old-fashioned stages of production ranging from cloth preparation to wax removal process (refer to Chapter 5). All stages still rely on the use of manual handheld equipment with fewer changes to adopt new technology. Moreover, both batik entrepreneurs and workers do not have a particular manual standard for batik processing, rather they work following individual intuitive art making instead of rigid procedures. For example, they have no standardised dyeing formula record replicable to other producers. Some batik producers write down the formula on a wall, the reverse of a cabinet storage door, or any other flat surface by using chalk or unused charcoal stick. Others keep the formula confidential in their memory. If dyeing formula guidance is shared by a family apprenticeship model and public batik training, this will not result in identical products however. The golden rule is that the quality dyeing formula is attainable from a lifetime intuitive learning process through never-ending experiments.

The next traditional institutions are demonstrated by considerable informal interactions in many aspects of the local batik industry. Family kinship and friendship relationships strongly direct interaction between actors in the industry and often exceed contractual agreements. The batik entrepreneurs recruit workers not only as professional staff but also as extended family members, for example. This creates a friendly working environment based on mutual trust and respect with relaxed labour regulations. Combined with friendship relations, it helps to establish loyalty from batik workers instead of implementing a strict labour contract. The family-tied labour relations exist in both batik clusters in Surakarta, but are not applicable to the Lasem Area. Such informality in fact is ineffective in building bonding attachment from batik workers to their master. As discussed earlier, batik workers in the Lasem Area have a better bargaining position than their masters due to scarcity of labour and their secondary job perspective to batik production. Consequently, hijacking of skilled batik workers remains unavoidable depending on better incentives that the batik masters may offer to attract them.

Similar relational patterns also exist in the supply chain and marketing network. The individual business networks that support the industry have more informal than formal transactions. The practices of subcontracting, late payment, consignment, and cross-selling are sustained without any collateral and contracts but by mutual trust. Generally, each batik entrepreneur has favourite suppliers and loyal customers. Their close business links have persisted over decades and are often a continuation of their parents' former networks. Such circumstances might be beneficial for the continuation of family business, but it could to some extent raise difficulties to build collective supply procurement and product marketing. It is not surprising that inter-firm cooperation is almost absent in the local batik industry due to intensified individual business networks. Whenever inter-firm cooperation exists, it is probably triggered from such individual business networks, not voluntarily stemming from collective awareness. As a result, the role of local batik cluster organisations like FPKBL, PKWBK, and FRK-BTL is limited to joint marketing exhibitions and batik promotions only as this so-called collective action might provide an additional marketing network to participating batik firms. If inter-firm cooperation, joint marketing, and any other forms of collective actions are considerably less significant to batik firms, then the social cohesion is unlikely to greatly affect their business. This means that the local batik industry in all three batik clusters may develop regardless of the dynamics of social cohesion in the neighbourhood. The following **Table 6.19** presents the important features of institutional framework in three cases.

Table 6.19 Comparative institutional framework of batik clusters in Kampung Laweyan, Kampung Kauman, and Lasem Area

No.	Element	Laweyan	Kauman	Lasem
1.	Establishment date of the place	1500s AD	1757 AD	1300s AD
2.	Origin of the place	Free tax land of Pajang Monarchy (1568-1586)	Settlement for royal servants of Surakarta Monarchy (1745-present)	Satellite vassal region of Majapahit Monarchy (1293-1478)
3.	Establishment date of batik industry	The mid-1500s AD	The end of 1800s AD	The early 1400s AD
4.	Cluster initiative	Bottom-up (2004)	Bottom-up (2006)	Top-down (2004)
5.	Cluster organisation	FPKBL	PKWBK	FRK-BTL
6.	Origin of the industry	Home-based weaving industry for public market	Home-based batik industry for royal clothing	Home-based batik industry for royal clothing
7.	Current state of the industry	Market oriented industry	Market oriented industry	Market oriented industry
8.	Industrial site coverage	Urban village settlement area	Urban village settlement area	Subdistrict rural area
9.	Influential socio-cultural background	Javanese business class	Javanese aristocracy and Islamic upper class	Chinese and Javanese business class
10.	Industrial focus	Production activity	Trading activity	Production activity
11.	Modes of production	Traditional handmade & modern mass production	Traditional handmade & modern mass production	Traditional handmade production

Continued in the next page

Table 6.19 continued

No.	Element	Laweyan	Kauman	Lasem
12.	Knowledge transfer methods	Family apprenticeship model and public batik training	Family apprenticeship model and public batik training	Confidential family apprenticeship model
13.	Technology application	Handwritten, stamping, and printing technology	Handwritten, stamping, and printing technology	Handwritten technology
14.	Output dominance	Stamped batik cloths and clothing	Printed batik cloths and clothing	Handwritten batik cloths
15.	Gendered division of labour	Male domination	Male domination	Equal position (business owners), female domination (workers)
16.	Employment status preference	Primary job	Primary job	Primary job (business owners), secondary job (workers)
17.	Business relations	Family-tied and friendship network	Family-tied and friendship network	Family-tied and friendship network

Source: Author (2013)

Despite shared historical traditions and industrial connections, **Table 6.19** highlights some similarities and dissimilarities of the local institutional framework in the three batik clusters. Rooted in Javanese culture featuring a hierarchical patronage system and traditional handwritten batik making style, each batik cluster started the industry as a spare-time home-based activity of textile making to supply a very limited market, i.e. domestic consumption, royal clothing, or local public market. Whilst the embryonic batik clusters in Lasem Area and Kampung Kauman were consistent in supporting the demand from the royal family circles, the Kampung Laweyan batik cluster had moved forward to commercialise its products to the local market. This was possible because the Kampung Laweyan society performed as a free and independent social group away from the hegemonic order of the ruling regime, i.e. Javanese monarchies. Originating from a free tax land, Kampung Laweyan was built as a kampong settlement for the-next-to-be Javanese business class who started up family businesses in the cotton plantation and weaving industry. From the beginning, this society was accustomed to running home-based businesses by utilising abundant available cotton materials. In addition, long-standing resistance of the Kampung Laweyan society towards control by the ruling regime as well as external infiltrations had been useful in building a self-governing social system, a noticeable socio-cultural character which was associated with stubborn and less cooperative attitudes.

Such an independent institutional background has in fact strengthened the adaptive behaviour of the local entrepreneurs to continue the batik business cycle and place identity in the following years. Not surprisingly, when the cluster initiative was proposed from below in 2004 by FPKBL, the Kampung Laweyan batik business group and the rest of society were ready to revitalise the local batik industry even though inevitable tensions and social conflicts remained difficult to reconcile. In the end, the batik cluster in Kampung Laweyan could finally adjust to a unique business environment where strong social cohesion in the neighbourhood does not directly contribute to local batik cluster performance, particularly in terms of building stronger inter-firm cooperation. Another important point that should be highlighted is that the preserved social resistance has somehow been beneficial to protect the

authentic physical environment of the Kampung Laweyan site as a famous batik masters' settlement. Indeed, there have recently been many changes to the existing old building façade and its functions in response to the growing batik demand and urban land use change. However, the atmosphere of the batik production (and trading) centre remains significant to reclaiming its identity inheritance.

By combining both traditional handmade and modern mass production modes the growth of the batik industry in Kampung Laweyan has increased rapidly compared to its counterparts in Kampung Kauman and Lasem Area. The eagerness of batik entrepreneurs in Kampung Laweyan to adopt new technology, particularly printing technology, has been useful not only in boosting current productivity levels, but also for the enrichment of traditional batik production and innovation which greatly depends on stamped batik products. Broadly identified as a production centre of merchant batik motifs, the local batik producers are able to design numerous new motifs without fear of strict and forbidden batik making rules. With the support of family apprenticeship models and public batik training, this technical innovation process is easily transferred between local batik entrepreneurs. Such circumstances may perhaps not be present if the male's role continues to be overshadowed by that of the female-led *Mbok Mase* system. The important social transformation in leading the industry from women to men has been the key to structural enhancement and rapid industrialisation of the local batik industry in Kampung Laweyan where informal family ties and a friendship network lubricates its evolutionary stages of development over time.

In the case of Kampung Kauman the formation of a local institutional framework cannot be separated from the dominating influence of the Surakarta Court in the past. The local batik cluster took modest industrialisation and commercialisation processes as a consequence of a binding attachment to the ruling regime. Initially, the local batik producers were exclusively assigned to supplying batik cloths and clothing for royal family members in compliance with strict and forbidden batik making rules. The emergence of a local business group in the early 20th century was embodied within the Javanese aristocracy and Islamic upper class, making this newly-born social group resistant to the fast growing batik market demand. Their production level was limited and they were engaged more in batik trading as a source of extra income. Consequently, their market penetration was not as aggressive as their counterparts in Kampung Laweyan. Strong obedience to preserving both Javanese and Islamic cultures of excellence created a rigid top-down institutional framework. Such socio-cultural inheritance was transferred to the following generations which constrained freedom and flexibility of local batik entrepreneurs, as well as the entire Kampung Kauman society, in anticipating market change and external influences.

As a result, social transformation that has recently taken place in Kampung Kauman does not provide an adequate foundation for cultivating collective actions to support either clustering activities or an individual business cycle. The leadership transition from ancestors to the younger generation, in terms of business cycle continuation and organisational structure, presents further dominance of the upper social class in the local industry. High dependence on the striving role of a few business elites promotes a somewhat ambiguous rather than democratic inclusive institutional setting. Even though it is claimed that the cluster initiative in 2006 was encouraged from below, the polarisation of the decision-making process into this elitic group remains unbreakable. Furthermore, the tendency to maintain close relationships with the ruling regime is intensified, creating the so-called social harmony within the society and local batik entrepreneurs of Kampung Kauman.

Another ambiguity becomes evident when the local batik cluster organisation PKWBK announced bringing back past socio-cultural values as principal ingredients to further the local industry and kampong improvement. If the local batik entrepreneurs are consistent with this ambition, they are supposed to preserve the traditional handmade batik making style and court batik motifs. In fact, the current situation demonstrates the opposite. Printed batik products are to a great extent available in stock and mostly come from external suppliers. Therefore, Kampung Kauman batik cluster reclaims its identity as a prominent batik trading centre in Surakarta.

Similar to its counterpart in Kampung Laweyan, the local entrepreneurs in Kampung Kauman have been able to adapt to new technology and innovation through family apprenticeship models and public batik training. They welcome it, use it, but fail to adjust it to strengthen the formation of a better institutional framework necessary to promote inter-firm cooperation. Under a prolonged men's control over the industry, each batik firm enjoys achieving a market opportunity by optimising family ties and individual friendship networks. If many forms of collectivity exist, it only represents accumulated opportunistic behaviour of the local batik firms to earn short-term profit. Actually, the structure of competition and cooperation within the industry has not changed much. The business elite and new capitalist investors take control of batik trading activities while smaller local entrepreneurs can survive because of multiplier effects resulted from their businesses. In other words, such a flying-geese model of industrial development is good to provide stimulation of short-term marginal revenue, but in the long-term it will probably endanger skills upgrading and empowerment process of individual batik firms to reach maturity.

Turning to the case of the Lasem Area batik cluster, we may find a different institutional framework contrasting in many ways to the Kampung Laweyan and Kampung Kauman cases. The first and foremost feature is that the formerly controlled region of Lasem Area has never created a high dependence of society and the local batik entrepreneurs towards the ruling regime or only a few elitic groups. Rather, they have shown great resistance to external domination and strong individual behaviour in running businesses, thanks to the deep influence of Chinese culture in shaping such a defensive attitude. Initially, the local batik industry was limited to supplying the batik demand from the royal family members. The batik making process was carried out at home by the Javanese women as a spare-time activity, a situation which was similar to the cases of Kampung Laweyan, Kampung Kauman, as well as many other cases of past Javanese batik clusters. After being equipped with better technical and business skills by the Chinese traders, the local batik entrepreneurs transformed from public servant to a mercantile society. Compared to the past Kampung Kauman society, this social transformation ran smoothly because of the absence of excessive control from the ruling regime to further the local batik industry and the typical character of Java's northcoast society as a trading society. As a result, they were able to balance borrowing external values with the necessity of protecting their local identity.

The local batik cluster in the Lasem Area has thus emerged as a traditional handmade batik production centre specialising in the finest handwritten batik styles and coastal batik motifs. The industry, which is orchestrated by the Javanese and Chinese business class, concentrates on production instead of trading activity by maintaining traditional batik processing at the homes of batik workers in villages. Currently, the production process is expanding to remote villages of the neighbouring region of Pancur Subdistrict and involving newer Javanese batik entrepreneurs who formerly worked as employees for the Chinese-owned batik firms. Such

social transformation is taking place mainly because of government intervention by introducing a top-down cluster initiative in 2006. In spite of the usefulness of cluster initiative for mostly smaller batik entrepreneurs and new entrants, it has sparked tensions between leading and large batik firms. Even though the conflicting groups have reconciled, it has left unsolved suspicious and backstabbing behaviour embodied in harsh competition in the local batik industry. It is clear that the current institutional framework in the Lasem Area batik cluster fails to promote a better environment for either clustering activities or social cohesion. Each batik firm tends to expand business by optimising family ties and individual friendship networks. Inter-firm cooperation and joint marketing are almost non-existent. Interestingly, there is a growing tendency that the government-led cluster initiative is overridden by particularly powerful groups which are able to maintain closeness with government apparatus. Thus, such a cluster initiative creates a more complicated institutional setting which is disruptive for the betterment of local batik cluster performance.

Despite its disadvantages, the local batik cluster in Lasem Area is quite reliable in securing inherited traditional handmade batik making and long-term economic viability. Strong social resistance towards the uncontrolled use of printing technology as exemplified by the former two cases is manifested through a confidential family apprenticeship model. This closed transfer of knowledge and innovation from batik masters to their selected successors is useful in maintaining product quality control and high price levels. Even though the production level of Lasem Area batik cluster is lower than its counterparts in Kampung Laweyan and Kampung Kauman, the local batik entrepreneurs can collect higher marginal revenue per item. Another important effect of the current institutional setting in the Lasem Area case is shown by the presence of equal opportunity in the employment structure. Both men and women can participate in the industry freely regardless of their socio-cultural background. Nevertheless, female domination in traditional handmade batik making remains exceptional due to its nature which requires high precision and patience. More importantly, the batik workers possess a better bargaining position towards their masters mainly because of the scarcity of skilled labour. With such uniqueness the existing institutional setting in the Lasem Area batik cluster highlights the absence of social cohesion and inter-firm cooperation necessary to support successful clustering activities.

Chapter 7

CONCLUSIONS

7.1 Conclusions

The batik industry clusters examined in the Kampung Laweyan, Kampung Kauman, and Lasem Area definitely support the Marshallian industrial district theory rather than the Porterian cluster theory. All cases benefit from the external economies of co-location emanating from a specialised batik labour market pooling and specific batik products. This passive engagement of clustering has brought the typical technical skills, evolutionary production processes, and distinguishable final products of each batik cluster to become the prominent features of the industry resulting from the local adaptation to an inherited batik tradition and external change over time. In fact, the batik entrepreneurs and workers in Kampung Laweyan and Kampung Kauman are confidently more flexible regarding technological adoption to meet the market change than their counterparts in Lasem Area. Such particularities have brought the local batik industry into the market with noticeable characteristics of place and activity that can be recognised by consumers. Thus, each batik cluster continues to promote the local batik identity instead of allowing external batik products to replace the locally produced ones even though the joint action that features the active engagement of clustering has almost never existed. The batik firms in Kampung Laweyan remain identical to the contemporary merchant batik industry while their counterparts in Kampung Kauman adhere to the classical court batik industry and in the Lasem Area to the coastal handwritten batik industry.

In addition, co-location does not automatically stimulate collectivism. In spite of promoting intensified inter-firm cooperation, each batik cluster has strengthened the renewed individual business networks. When joint marketing and batik promotion have appeared recently in the forms of exhibition events, cross-selling, and communal showrooms, these efforts were organised by the local batik cluster organisations to provide incentives for the local batik entrepreneurs and workers to support the so-called cluster programs. In fact, the late-coming initiatives from government agencies and local batik cluster organisations to promote cluster programs did not come from the local batik community's awareness of the importance of clustering. Rather, it came from the external forces brought by either internal or external actors to introduce the anticipated advantages of a cluster approach for the local batik industry revival. In Kampung Laweyan and Kampung Kauman the initiative was brought by academics while in the Lasem Area by the local government agency. In other words, the clustering phenomenon in each location has not reflected a natural endogenous development which has become the important feature of clustering along with flexible specialisation and collective efficiency.

More importantly, the lack of inter-firm business linkages has falsified the presence of the clustering practice. The batik firm's individual business networks tend to maintain exclusive connections to suppliers, subcontractors, and consumers. Instead of fostering broader participation from various actors, the batik firms are retaining their preferences to collaborate with trusted partners. Once they are comfortable with their existing partners, it does not create opportunities for their partners' rivals to join the networks. The main reason for the reluctance of batik entrepreneurs to welcome additional partners is the fear of an unstandardized quality of supplies and services. They claim that batik making conveys personal artistic expressions, particularly traditional handwritten and stamping batik processing, so that the imitation process cannot result in identical products. However, this claim is not entirely true regarding the fact that the intensive technical supervision and quality control actually may be expanded to the partners along the production process. The knowledge transfer can be made through such partnerships to complement the conventional family apprenticeship model and public batik training. Consequently, batik production confidentiality is still maintained in all three cases, creating the prolonged constraints to the local batik industry advancement due to the strong individualistic behaviour.

Such circumstances have therefore led to the formation of peculiar local institutional framework to support the respective batik industry development. This individualistic behaviour has encouraged the local batik firms to compete freely without many interventions from the local batik cluster organisations as well as government agencies. Combined with an uncontrolled imitation process, it has unleashed greater creativity and innovation from the local batik firms to produce additional batik motifs and designs. On the other hand, this has also led to the separation of the local batik industry from the active engagement of neighbourhood society. The industrial growth takes place as if the local batik firms operate in a vacuum space without substantiated local multiplier effects. Indeed it has improved the living standard of local batik entrepreneurs and workers, but its impact on social improvements remain questionable. The batik industry revival in all three cases does not seem to care much about this issue as indicated by the regeneration of the old family business networks and the pursuit of enlarging individual business linkages. Thus, the fusion between economic activity and society as suggested in the general cluster theory has not been proved yet in this research.

7.2 Feedback to Cluster Theory

The first and foremost scientific contribution of this research to the general cluster theory is that the agglomeration of similar industries, particularly those emanating from a natural endogenous process and not by external interventions, does not always require good social cohesion in a local neighbourhood. Either the given cluster grows in a small densely populated area like Kampung Laweyan and Kampung Kauman or in a widely scattered area like Lasem Area, the condition of social cohesion does not greatly affect clustering activities. Even the better social cohesion that exists in Kampung Kauman cannot in fact promote greater engagement of local batik firms to support cluster development programs organised by PKWBK. Rather, a free riding attitude tends to escalate across the neighbourhood in response to the growing trend of the local batik industry market. Moreover, the so-called

cluster development in all three cases does not suggest the importance of inter-firm cooperation and local multipliers.

As exemplified in the Lasem Area case, the local batik industry continues to depend on cloth and dye supplies from other regions, particularly Surakarta and Pekalongan. Interestingly, the local batik cluster does not encourage the existence of local suppliers even though the industry was started more than six centuries ago. The absence of local suppliers is therefore no longer critical to the current cluster growth. In contrast, it is not plausible to build a textile factory in the urbanised settlement area of Kampung Laweyan, for example. Indeed the given cluster may build backward and forward linkages far outside its location and not limited to proximate territorial boundaries. However, inter-firm cooperation within the cluster is still an important feature of any cluster phenomenon, a situation that does not exist in the three batik clusters observed.

Secondly, the prolonged local tradition has shaped the working of informal rules that exceed the formal rules supporting cluster growth. The embedded socio-cultural norms brought about by the prevailing social order have guided interaction between actors within the cluster. The manifestation of informal rules emerges in tacit knowledge and codes of conduct transferred over generations. Tacit knowledge results in batik skills retained through confidential family apprenticeship models and public batik training. No reference books, nor standard manual procedures, nor any kind of documentation has recorded the transmitting of batik skills other than the tutor's lifetime experiences shared during apprenticeship and training sessions, and never-ending experiments conducted by the successors. The codes of conduct are codified regularly in local society with respect to evolving social interactions. There are no written rules and no systematic training to maintain the codes. Rather, the codes are spread sporadically in family homes, local neighbourhoods, and the broader intermingling environment through a lifetime of observation and adaptation.

The dominating Javanese culture has shaped such informality in the three batik clusters. It praises deliberative appreciation to senior batik entrepreneurs, the elderly group, and prominent leaders in the local batik community as well as neighbourhood society. The result is a hierarchical social order which inhibits participating actors from setting up a direct accusation and reward-and-punishment mechanism particularly for conflicting parties. Such circumstances have led them to maintain so-called social tolerance and a bashful manner in terms of individual freedom to satisfy self-interests without disturbing others. Friendly invocation and warning combined with typical social sanctions take place to assure the compliance of actors within the prevailing social order. Self-correction is expected to present in order to dismiss emerging conflicts and to encourage win-win solution instead of executing harsh penalties and social exclusions.

Dealing with this situation, the role of a community-based organisation (CBO) is more suitable to foster local batik cluster development than government, external agencies, or batik firms regardless of the inconvenient position that it possess to bridge communication within clusters. It understands better the complexity of the prevailing social order and holds more flexibility when responding to its dynamics, so that it can be expected to maintain the predetermined informality when seeking advantageous opportunities for the entire cluster. Having such an intermediary role, theoretically CBO may redistribute power and resources across the batik cluster more equally. In reality, the existing CBOs in the three batik clusters hold a loose control over batik cluster development due to minimal participation of batik

firms to support cluster programs and to promote inter-firm cooperation. As a result, individual business networks and opportunistic behaviour are still dominant firmly covered by a hierarchical social order, creating difficulties for CBOs to promote collective actions. Thus, the performance of CBOs like FPKBL, PKWBK, and FRK-BTL remains under the control of a small elite group which is capable of jeopardising so-called social tolerance for the sake of their own business interests. This finding confirms Ostrom's theory which suggests that the success of self-governing communities is attainable with high participation of society members. So if the free riding practice is intensified, then the communities are likely to fail to establish collective actions as experienced by those CBOs in the three batik clusters. This finding validates the third research contribution to scientific theory.

The fourth contribution is still related to the formation of a local institutional framework to support batik cluster development. In line with the persistence of a hierarchical social order and intensified individual business networks, the research finding shows the sustained dense networks that are primarily held by large batik firms. This is confirmed when the local batik industry revival has restored the old family business networks exclusively. These old batik firms – not the newcomers – prefer to restore and sustain their parents' business linkages to run present-day businesses. Alternatively, they are likely to cultivate individual business networks rather than dispersed collective networks and inter-firm cooperation within the cluster. As a result, these large and prominent batik firms are more comfortable undertaking business within such a hierarchical social order, from which they can maintain subcontracting patterns and hinder the middlemen from disrupting the prevailing business network patterns. Therefore, this finding has falsified Burt's structural holes theory which suggests the importance of the middlemen to reduce inefficient transactions between participating actors. In the case of Kampung Laweyan and Lasem Area, the dense networks supported by the old batik firms and newcomers have hindered the middlemen to exist. When the middlemen's role is found broadly in Kampung Kauman, their existence promotes more opportunistic behaviour that creates disastrous competition between batik producers and traders within the cluster. Instead of reducing inefficient transactions, they are responsible for fluctuating batik prices resulting from an uncontrolled discount war and price dumping practices.

7.3 Policy Recommendations for Local Batik Clusters

Reflecting from two distinct case situations and findings, I would like to suggest different approaches to policy recommendations to local batik cluster development in Surakarta Municipality and Rembang Regency. The many differences between these two batik regions involving the landscape of local developments and batik industry enhancements have lured a profound insight of the necessity to avoid uniform policy advice. At the same time, I have also considered a number of similarities shared by the three batik clusters observed in terms of contemporary problems, challenges, and opportunities to further local batik cluster development and the overall batik industry. To mention a few, there are recurring classical issues in the regional planning field, i.e. the "linkage" issues as manifested in the lack of spatial integration and inter-firm linkages, and the "leakage" issues as exemplified by the on-going high cost economy practised by the local batik industry in common through individual business networks and unfriendly market competition. Even though the approaches may

vary, the likely intention of the policy recommendations that I have pursued are the preservation of a traditional batik industry to safeguard the authenticity of featured local batik products, where the case of Kampung Laweyan is identical to the merchant batik mainstream, Kampung Kauman to the court batik mainstream, and Lasem Area to the coastal batik mainstream. Another important feature of the traditional batik industry that needs to be considered is the continuation of labour intensive handwritten and stamping batik skills. The bottom line is that encouragement of the local batik identity and traditional batik making would lead to heightened cultural values and economic viability of the local batik industry. Presumably, the public consumers look for distinguishable batik products to demonstrate individual preferences and symbolic status in society.

Taking these considerations into account, the policy recommendations for the local batik cluster development in Surakarta Municipality would be better placed on the broader context of locality than the citywide or even smaller neighbourhood boundaries. For the sake of spatial development, the current locations of batik clusters of Kampung Laweyan and Kampung Kauman, as well as other batik clusters in Surakarta, must deal with limited space availability because of the increasing housing demand. Furthermore, the research findings revealed that durable individual business linkages performed by local batik firms are maintained intensively with their partners in the city outskirts, and not limited within the Surakarta context only. Therefore, promoting inter-regional linkages of batik cluster development is perceived to be a better approach to the Surakarta case. The greater adaptive behaviour performed by the local batik community to deal with changing situations over time and the better access to facilities and public infrastructure required by the industry, have enabled them to compromise with such an open competition approach. In contrast, the more suitable approach for Rembang context, particularly Lasem Area case, is by promoting an inward-looking intra-regional linkages strategy for local batik cluster development. The reasons are threefold. First, business friction remains inside the local batik industry resulting from the practices of strong individual business linkages and harmful unfair competition in the past. The suspicious distrust among the local batik community needs to be cured in order to promote fairer inter-firm competition and cooperation. Second, the long-standing resistance of the local batik community towards machinery-based technological change has encouraged the preservation of traditional handwritten batik making in particular. This makes the business continuation of the local batik industry has depended heavily on traditional batik producers and workers. Third, the limited access to facilities and public infrastructure has been a physical constraint that the local batik industry must deal with. Such circumstances are associated with the natural topographic limitations and widely dispersed locations of batik firms. In the following section I will discuss further those different policy recommendations.

In my view, it is inappropriate to encourage an exclusive batik cluster development strategy in Kampung Laweyan and Kampung Kauman. The locations of both batik clusters are no longer suitable to promote cluster development resulting from limited space available to support industrial expansion. This problem is associated with the local batik industry's demand for water supply and liquid waste treatment facility. Since the past the industry has required a good access to water sources to cope with multiple batik processes and liquid waste disposal. As the industry and the population in both locations have increased, those urban settlement areas are no longer suitable to support the production process entirely. The existing home-based batik workshops must compete with the increasing household demand for clean water. The massive use of synthetic dyes and the lack of a liquid waste treatment

facility in the neighbourhood have worsened the water pollution levels in the drainage channels, which are also used for household waste water disposal. A similar problem actually exists with the neighbouring batik industry centres throughout the Surakarta Municipality. Hence, an outward-looking strategy is perceived necessary to tackle the limitation of such spatial allocation and public infrastructure provisions.

The second reason relates to the fact that many batik production centres can be found in the villages in the surrounding regions, i.e. Bekonang (Sukoharjo Regency), Masaran (Sragen Regency), Kedung Gudel (Klaten Regency), and Tirtomoyo (Wonogiri Regency). Some batik entrepreneurs in Kampung Laweyan and Kampung Kauman have in fact relocated their workshops to these regions. The subcontracting pattern and individual business networks are managed outwards to the city outskirts. Moreover, the batik firms in both locations depend on raw materials and labour supply from these regions. Therefore, the batik cluster development policy must be viewed as a regional cluster, and no longer delineated to urban kampong settlement boundaries. With this renewed perspective, the proposed regional batik cluster policy may compromise with varying economic, socio-cultural, public infrastructure, and environmental issues.

Starting from this perspective, Surakarta should be focusing on batik trading and training activities. Currently, there are many batik showrooms spread across the city to accompany the traditional batik market Pasar Klewer, batik grocery centre *Pusat Grosir Solo* (PGS), and batik street vendors. By concentrating on batik trading the city government could organise particular trading spots to serve different market segments for traditional and printed batik products. Such differentiation is beneficial to raise public awareness in recognising various batik products accurately. Along with an increase in public awareness, the local batik producers would probably become more confident to keep producing traditional batik products. It is anticipated that this trading policy may stabilise batik prices and minimise authentic batik counterfeiting, from which the cultural preservation of the traditional batik industry could be sustained. In turn, the policy will prevent the traditional batik workers from the risk of unemployment possibilities stemming from the uncontrolled spread of printing technology to the industry, and will attract the youth to continue to learn batik skills and business as a prospective new employment while safeguarding its cultural heritage.

In addition, Surakarta can also serve as a centre of traditional batik training. Many batik training sessions have been undertaken every year hosted in private batik firms, batik training centres, and public schools by various agencies. Even *Dinas Pendidikan, Pemuda, dan Olahraga* (DISDIKPOR) or Local Agency for Education, Youth, and Sports has endorsed batik training policy as an extracurricular local content in the public school curriculum recently. These efforts could be continued more intensively by integrating with other training related to entrepreneurship, business management, and marketing, for example. Such cross-agency training integration is necessary to ensure the participants about the prospective future of the batik industry in order to stimulate the birth of new batik entrepreneurs. On the other hand, it may be useful to reduce overlapping training by local government agencies in particular. Thus, inter-governmental coordination should also be improved in order to avoid inefficient public spending because of those overlapped training (and related programs), and to foster the creation of sound batik industry development by involving the neighbouring governments.

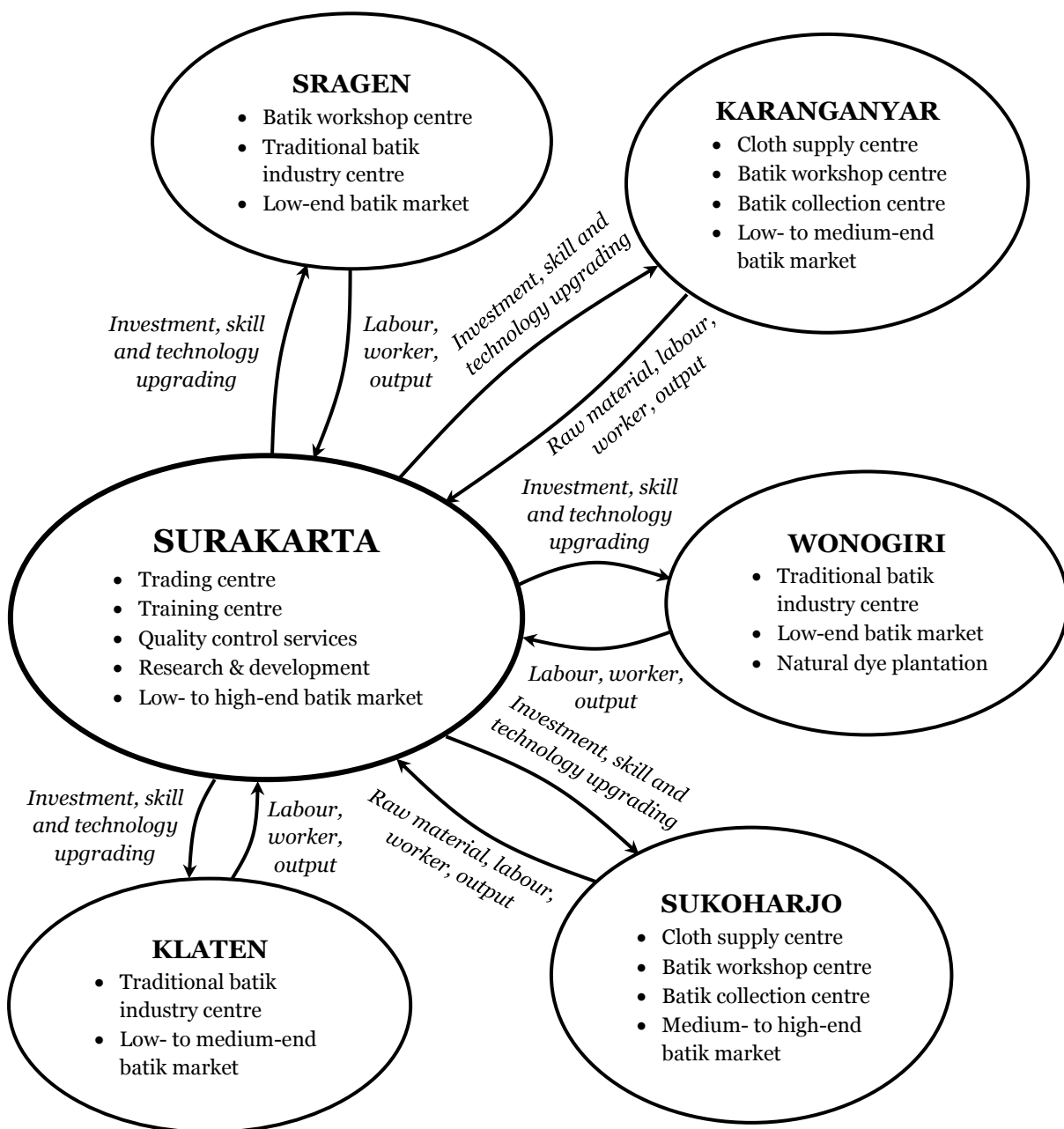
In this sense, the policy cannot be isolated in the city context only. Rather, it should be brought to the higher government level concerning the patterns of backward and forward linkages that have been in existence so far. The batik industrial development policy should at least be located in the context of the Greater Surakarta area (aka Solo Raya or in the past known by SUBOSUKOWONOSRATEN) to re-organise batik clustering activities properly. As a centre of batik trading and training, Surakarta could be viewed as the region's core functioning to redistribute batik orders to subcontractors in peripheral villages, to provide standardised quality control services, to promote research and development services for industrial and human resources capacity upgrading, and to provide market centres for diverse batik products. The citywide batik production centres located in the kampung neighbourhoods may continue to run the businesses, but it would be better to gradually relocate the workshops to the city outskirts. Thus, the local batik producers could focus on the quality control phase and the development of downstream industries only such as batik fashion and garments. On the other hand, the rest of the five supporting regions may conduct different functions with respect to each localised specialisation. For example, Sukoharjo Regency and Karanganyar Regency may serve for the centre of cloth supply because of the many textile factories' operations over there. These regions may also serve for the centre of batik workshops and batik products collection from villages before entering the Surakarta market. The remaining peripheral regions of Sragen Regency, Klaten Regency, and Wonogiri Regency may function as the centre of traditional batik production, labour market pool, and low-end batik products marketing. All these peripheral regions are expected to provide vacant land to cultivate natural dye plants in order to support a green production campaign. Actually, there has been a small initiative to provide a green belt area near Gajahmungkur Dam in Wonogiri Regency that could be used for natural dye plantation. This effort needs to be continued more intensively to reduce the deteriorating environmental impact and import dependency on synthetic dyes (see **Figure 7.1** and **Table 7.1**).

On the contrary, the local batik cluster development in Lasem Area is supposed to strengthen intra-regional linkages between Lasem Subdistrict and Pancur Subdistrict. The recent batik industry development trend has encouraged the rise of new indigenous Javanese batik firms away from the old batik production centres in Lasem urban centre, particularly around Babagan Village. Interestingly, these new batik firms exist independently without any kind of business linkages with the old ones even though many of them used to be their workers. This leads to the absence of strong inter-firm linkages and of spatial integration within local batik industry. It escalates transaction costs and severe open competition within the so-called batik cluster. In turn it would probably increase production inefficiency no matter the higher price tags the batik producers put on exclusive traditional handwritten batik products.

To solve such unfriendly competition, the local government could perhaps introduce a batik labour wage standard policy to which both batik entrepreneurs and workers can refer. Actually, the local government stipulates updated *Upah Minimum Kabupaten* (UMK) or Minimum Labour Wage Standards for Local Regency every year which provides a basic reference for industrial labour wage payment. The calculation is done by measuring the average monthly living cost called *Kebutuhan Hidup Layak* (KHL) or the Decent Livelihood Demand Standard. The Standard is reviewed annually by undertaking a field survey to check the change in the living cost components as regulated in *Undang-undang No. 13/2007 tentang Ketenagakerjaan* (Government Law No. 13/2007 about Labour Force Affairs). However, the policy does not specify a minimum labour wage standard for each industry so that firms within the same industry may apply different standards for certain labours. As

exemplified in the Lasem batik industry, there is a labour wage gap where the fresh batik workers with little working experience may earn IDR 10,000-15,000 per day (USD 0.8-1.3), for example. Compared to the 2012 UMK for Rembang Regency at IDR 816,000 (USD 68) per month, the local batik workers earned IDR 260,000-390,000 (USD 21.7-32.5) per month only. Such wage differences are enough to attract the movement of batik workers to different firms – the so-called labour hijacking phenomenon – where batik firms may provide a higher labour wage standard and better incentives for them. To ensure policy implementation the local government should exercise stringent law enforcement to reduce the worst impacts of opportunistic behaviour conducted by both batik entrepreneurs and workers.

Figure 7.1 Proposed inter-regional linkages of regional batik clustering in Surakarta



Source: Author (2013)

Table 7.1 A five-year action plan for batik cluster development in Surakarta Municipality

No.	Proposed Actions	Objectives	Expected Outcomes	Targeted Groups	Time Budget					Implementing Agencies
					1	2	3	4	5	
1.	Promoting integrated regional batik cluster development policy for the Greater Surakarta area (aka Solo Raya)	<ul style="list-style-type: none"> To create better business climate for regional/local batik industry by ascertaining fairer batik trading, environmental friendly batik processing, and improved social security for particularly traditional batik workers To create better spatial integration of inter-connected batik industry by focusing on functional specialisation of local batik clusters To improve horizontal inter-governmental coordination and cooperation in reducing high cost economy and increasing regional/local batik industry competitiveness 	<ul style="list-style-type: none"> The strengthened inter-firm and inter-regional linkages of batik clusters in Surakarta and its peripheral regions The improved policy coordination among local government leaders and agencies which is responsive to deal with batik market change and issues related to regional/local batik industry development 	<ul style="list-style-type: none"> Batik producers Batik traders Batik workers Batik suppliers 	X				X	<p><u>Leading agencies:</u></p> <ul style="list-style-type: none"> A consortium of local development planning authorities (BAPPEDA) of participating regions, i.e. Surakarta, Sukoharjo, Karanganyar, Wonogiri, Sragen, and Klaten <p><u>Supporting agencies:</u></p> <ul style="list-style-type: none"> Local FEDEPs Local batik cluster organisations (FPKBL, PKWBK, and the likes) Local government agencies, i.e. DISPERINDAG, DISKOP-UMKM, DINSOSNAKERTRANS, DTRK, DPU, and DISBUDPAR Local Chamber of Commerce and Industry (KADIN) Local representative groups of supporting industries or suppliers
2.	Regulating specific citywide market places for diversified batik products	<ul style="list-style-type: none"> To specify market places based on different market segments ranging from low- to high-end batik products To improve government control over batik market in order to protect both batik producers and consumers from illegal and fraudulent batik products 	<ul style="list-style-type: none"> The improved batik market certainty against deceitful trading practices The increased price stability of various batik products The increased preservation of batik authenticity 	<ul style="list-style-type: none"> Batik marketplace owners/managers Private/communal batik showroom owners Batik kiosk tenants Batik producers Batik traders 	X		X	X	X	<p><u>Leading agencies:</u></p> <ul style="list-style-type: none"> BAPPEDA <p><u>Supporting agencies:</u></p> <ul style="list-style-type: none"> DISPERINDAG, DISKOP-UMKM, DTRK, DPU, and DPP

Continued in the next page

Table 7.1 continued

No.	Proposed Actions	Objectives	Expected Outcomes	Targeted Groups	Time Budget					Implementing Agencies
					1	2	3	4	5	
3.	<p>Promoting the quality standard of batik processing, particularly for the traditional batik producers</p> <ul style="list-style-type: none"> To achieve the finest batik processing quality necessary to preserve its cultural values and higher market prices in return To comply with increasing concerns on green production standards by the governments and (international) markets 	<ul style="list-style-type: none"> The better warranty of (traditional) batik products authenticity The sustained cultural preservation of traditional batik processing The reduced amount of and harmful effects of environmental degradation resulted from batik industry 	<ul style="list-style-type: none"> Batik producers Batik workers Batik suppliers 	X	X	X	X	X	<p><u>Leading agencies:</u> Local batik cluster organisations (FPKBL, PKWBK, and the likes) in cooperation with experienced batik practitioners either from batik producers/workers or academic institutions</p> <p><u>Supporting agencies:</u></p> <ul style="list-style-type: none"> BBKB BLH NGOs Donors 	
4.	<p>Promoting sustained batik education course for the general public and prospective batik successors, particularly the traditional batik processing</p> <ul style="list-style-type: none"> To ensure the preservation of traditional batik processing over generations To encourage the rise of new batik entrepreneurs/workers 	<ul style="list-style-type: none"> The increased public awareness on the preservation of traditional batik processing The improved public knowledge in recognising authentic batik products in contrast to the illegal and fraudulent products 	<ul style="list-style-type: none"> School-age pupils The general public Prospective batik newcomers 	X	X	X	X	X	<p><u>Leading agencies:</u></p> <ul style="list-style-type: none"> DISDIKPORa for school-age pupils Universities for bachelor students Local batik cluster organisations (FPKBL, PKWBK, and the likes) for the general public, tourists, etc. <p><u>Supporting agencies:</u></p> <ul style="list-style-type: none"> Batik producers, particularly the owner of batik workshops Batik Museum NGOs Donors 	

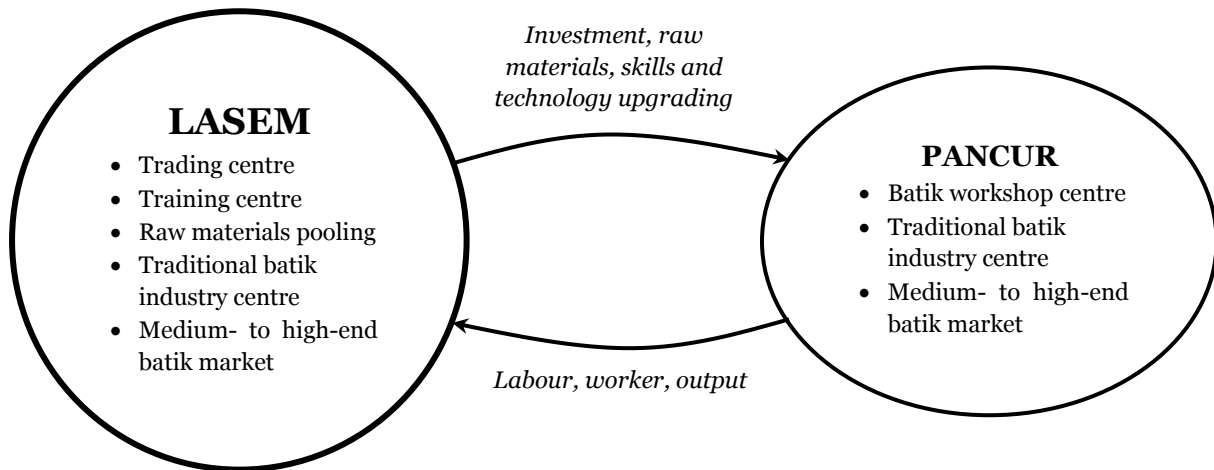
Source: Author (2013)

The second policy relates to raw material supply, particularly cloths and synthetic dyes. To reduce the transaction costs resulting from high dependency on other supply regions, the local government could facilitate the building of raw material pooling centre. Previously, this function was to some extent undertaken by the local batik cooperative (KBTL) temporarily while doing the core business to provide financial and marketing assistance for members. Currently, KBTL is merely focusing on batik marketing and promotion without regular programming. The local government may revitalise its function or take it over entirely to meet the current batik industry needs. The prior financial assistance function could be intensified to serve all batik entrepreneurs, and not be limited to the members only. Grants, loans, sponsorships, and various financial assistance programs from the government could be distributed properly by this local cooperative. In the meantime, the marketing and promotion function could be intensified by revitalising the existing batik showrooms and providing a representative information centre.

Regarding public batik training, there is a very limited training session hosted in Rembang Regency by various agencies. The local DISDIKPORAs has promoted batik training session as an extracurricular local content in the public school curriculum. However, the local government agencies have rarely hosted in-house batik training in Rembang. They mostly transport the participants to other batik regions such as Pekalongan, Surakarta, and Yogyakarta through partial sponsorship programs. To make it worse, there are no batik firms in the Lasem Area which have initiated to host such training unlike their counterparts in Surakarta. The main reason is obvious, i.e. the prolonged fear of batik masters about their business confidentiality, from which the preservation of traditional inherited handwritten batik skills are very difficult to attain. If (mostly) the old Chinese batik masters are reluctant to support these public batik training courses, then the local government may involve the new (Javanese) batik entrepreneurs to share their knowledge. The government may assign KBTL to host training with supervision from DISPERINDAGKOP. Furthermore, similar to the Surakarta case, this training should be more efficiently integrated with other related training sponsored by various government agencies. Simply this effort is aimed at improving inter-governmental coordination and minimising public spending inefficiency.

In the meantime, the spatial integration of the local batik industry development seems less important than the building of stronger inter-firm business linkages. The endured individual business networks and high dependency on outside supply of raw materials are the critical factors that cause such ignorance. However, it remains necessary to anticipate further developments responding to the recent revival of the local batik industry. For example, there are two batik villages have been established in Pancur Subdistrict but the access to and within the villages remains poor. As a result, the new batik workshops built there are isolated because of limited public transport, rustic rocky-and-narrow roads with insufficient street lighting, limited telecommunication lines, and lack of liquid waste treatment facilities. To move from one batik production village to another one, people must take rural roads across the paddy fields or steep rocky roads in the middle of hilly plantation fields and forests. Therefore, improving access and public infrastructure in the Lasem Area is the main policy agenda to increase intra-regional linkages of the local batik industry cluster. In addition, Lasem Subdistrict could function more to serve batik trading and training activities together with the rise of new batik firm concentration near the urban centre. On the other hand, the function of Pancur Subdistrict could be directed as the centre of batik production workshops (see **Figure 7.2** and **Table 7.2**).

Figure 7.2 Proposed intra-regional linkages of local batik clustering in Lasem Area



Source: Author (2013)

7.4 Research Limitations

Initially, the research aims to figure out the condition of local institutions which affect the local batik cluster performance. The research findings have primarily captured the recent conditions instead of demonstrating the institutional dynamics within the local batik clusters over a period of time. At this point I cannot explain how the local institutions have been evolving even though the change of socio-cultural background in each batik cluster had been evaluated. There remain some missing links that I cannot figure out sufficiently when attempting to connect present and past conditions. For example, I cannot say that the strong individual business networks performed by batik entrepreneurs in the three batik clusters were mostly inherited from their parents. The problem emanates from the limited time available to explore this more deeply and the inability of the respondents to share their past experiences. The respondents provided general information about the prevailing local institutions that have been working in their neighbourhood and the next broader territorial boundaries, i.e. municipality/regency level. They could not explain in detail the chronological order about the institutional change based on their lifetime experiences. Even though I have interviewed prominent local leaders, old batik entrepreneurs, and leaders of the local batik cluster organisation, they tended to share their knowledge only randomly and were unable to identify precisely what kinds of institutional aspects have remained in existence, evolved, or disappeared. As a result, I cannot explain further the key drivers and processes underlying the sustainability of those individual business networks.

The next limitation relates to the absence of a local batik industry performance assessment. Such an assessment would actually be useful to present the impact of batik cluster development towards the performance of the entire batik industry in the municipality/regency level (or even higher administrative levels). Unfortunately, the respondents could not specifically inform their business performance due to poor book-

Table 7.2 A five-year action plan for batik cluster development in Rembang Regency

No.	Proposed Actions	Objectives	Expected Outcomes	Targeted Groups	Time Budget					Implementing Agencies
					1	2	3	4	5	
1.	Promoting integrated local batik cluster development policy, particularly for Lasem Area	<ul style="list-style-type: none"> To create better business climate for local batik industry by ascertaining fairer batik trading, environmental friendly batik processing, and improved social security for particularly traditional batik workers To create better spatial integration of inter-connected batik industry by focusing on functional specialisation of local batik clusters To improve horizontal inter-governmental coordination and cooperation in reducing high cost economy and increasing local batik industry competitiveness 	<ul style="list-style-type: none"> The strengthened inter-firm and intra-regional linkages of batik cluster in Lasem Area The improved policy coordination among local government leaders and agencies which is responsive to deal with batik market change and issues related to local batik industry development 	<ul style="list-style-type: none"> Batik producers Batik traders Batik workers Batik suppliers 	X				X	<p><u>Leading agencies:</u></p> <ul style="list-style-type: none"> Local development planning authority (BAPPEDA) <p><u>Supporting agencies:</u></p> <ul style="list-style-type: none"> Local FEDEP Local batik cluster organisation (FRK-BTL) Local government agencies, i.e. DINPERINDAGKOP-UMKM, DINKESOSNAKERTRANS, DPU, DTRK, and DINBUDPARPORA Local Chamber of Commerce and Industry (KADIN) Local representative groups of supporting industries or suppliers
2.	Regulating batik labour wage standard policy	<ul style="list-style-type: none"> To specify batik labour wage standard necessary to prevent the local batik industry from unethical batik workers hijacking and excessive incentives counterproductive to the increase of batik workers' productivity To ensure batik workers' income sufficiency to meet their daily needs 	<ul style="list-style-type: none"> The fairer business competition between local batik firms through certain standards of labour wage and incentive The reduced harmful opportunistic behaviour practiced by batik producers and workers 	<ul style="list-style-type: none"> Batik producers Batik workers 	X	X	X	X	X	<p><u>Leading agencies:</u></p> <ul style="list-style-type: none"> The regent of Rembang Regency <p><u>Supporting agencies:</u></p> <ul style="list-style-type: none"> Local Labour Wage Standardisation Council (DPD) Local government agencies, i.e. DINPERINDAGKOP-UMKM and DINKESOSNAKERTRANS Local Chamber of Commerce and Industry (KADIN)

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Table 7.2 continued

No.	Proposed Actions	Objectives	Expected Outcomes	Targeted Groups	Time Budget					Implementing Agencies
					1	2	3	4	5	
3.	Building a batik raw materials pooling centre by repositioning the role of local batik cooperative (KBTL)	<ul style="list-style-type: none"> To ensure continuous supply of batik raw materials for the local batik industry, particularly cloth, dye, and wax supplies To reduce the transaction costs of batik raw materials supply spent by local batik firms 	<ul style="list-style-type: none"> The continuous supply of batik raw materials The reduced price stability of batik raw materials supplies 	<ul style="list-style-type: none"> Batik producers Batik workers Batik suppliers 	X					<u>Leading agencies:</u> DINPERINDAGKOP-UMKM <u>Supporting agencies:</u> <ul style="list-style-type: none"> Local batik cluster organisation (FRK-BTL) Local representative groups of supporting industries or suppliers
4.	Promoting sustained batik education course for the general public and prospective batik successors, particularly the traditional batik processing	<ul style="list-style-type: none"> To ensure the preservation of traditional batik processing over generations To encourage the rise of new batik entrepreneurs/workers 	<ul style="list-style-type: none"> The increased public awareness on the preservation of traditional batik processing The improved public knowledge in recognising authentic batik products in contrast to the illegal and fraudulent products 	<ul style="list-style-type: none"> School-age pupils The general public Prospective batik newcomers 	X	X	X	X	X	<u>Leading agencies:</u> <ul style="list-style-type: none"> DINDIK for school-age pupils Universities for bachelor students Local batik cluster organisations (FPKBL, PKWBK, and the likes) for the general public, tourists, etc. <u>Supporting agencies:</u> <ul style="list-style-type: none"> Batik producers, particularly the owner of batik workshops NGOs Donors
5.	Building better access and infrastructure to reach local batik clusters, including the provision of public transport	To increase the accessibility to local batik clusters useful either to the local batik community (e.g. producers, workers, suppliers, etc.) or the visitors (e.g. buyers, tourists, etc.)	The improved access and convenience for accelerating local batik industry growth	<ul style="list-style-type: none"> Batik producers Batik traders Batik workers Batik suppliers Prospective visitors 	X	X	X	X	X	<u>Leading agencies:</u> DPU <u>Supporting agencies:</u> <ul style="list-style-type: none"> DINHUBKOMINFO DINBUDPARPORA

Source: Author (2013)

keeping. Even they could not tell the net profits they earned last month, so that they merely shared the estimated figures of business performance. In addition, the responsible government agencies and local bureau of statistics could not supply consistent and reliable data covering the batik industry performance. As a result, I cannot determine whether the given local institutional framework has affected positively or negatively to its performance. Rather, the research findings present how the actors and their networks respond to a number of events associated with local batik cluster developments. For example, each batik cluster responded differently to overcome the adverse business competition like the discount war. Learning from these responses, I can analyse how certain relational patterns work for the formation of a more rigid or flexible institutional framework.

The research also could not present the policy effectiveness related to the local batik cluster developments. The lack of information related to local government policies which have caused this problem. As the annual monitoring and evaluation reports were not accessible, I could not determine the government performance relating to the local batik cluster development programs. For example, the batik training programs sponsored by the local government agencies are provided annually without proper evaluation. Furthermore, there were not many complaints from the participants asking for overlapping and post-training programs. Actually, the policy effectiveness assessment is useful to establish whether the policy provided could improve the skills and knowledge of participating batik entrepreneurs or workers, which in turn would probably increase productivity level, product innovation, marketing networks, and so forth.

Finally, the research was limited to provide descriptive explanations about the working of the local institutional framework in affecting the performance of local batik clusters. More explorations need to be executed to capture the dynamics of local institutions and social cohesion relevant to the performance. In doing so, the diversity of the key informants and respondents needs to be expanded to include the batik workers, suppliers, consumers, and non-batik local residents in order to obtain more comprehensive understanding regarding the same research question.

7.5 Further Research Agenda

The research has so far focused on the workings of local institutions in the local batik clusters bounded within the local administrative authorities, i.e. Surakarta Municipality and Rembang Regency. Even though these institutions have been determining the performance of local batik clusters at most, actually the business linkages of batik firms may reach distant regions. So if the individual business networks become enlarged enormously, then the influence of external institutions would probably exceed the local institutions. Alternatively, such influence may occur in the formation of backward linkages pattern when batik firms greatly depend on supplies from other regions. Thus, I suggest that the investigation of local institutions performance should be placed in the broader territorial and industrial contexts in order to figure out how the backward and forward business linkages take place thoroughly. From this research I have found that batik clustering does not require such proximate location to exist and that the scope of and the depth of business networks are more influential to the workings of local institutions than the prevailing social cohesion.

In addition, further research should rather examine the perceptions of batik workers, suppliers, consumers, and non-batik local residents. Their feedback may provide supporting explanations to the failure of prevailing social cohesion to promote the strengthening of business linkages and inter-firm cooperation within the batik cluster. Whether the economic benefits as well as social improvements of the local batik cluster may benefit the local actors and neighbourhood society could be measured from their responses. On the contrary, the performance of local government agencies needs to be examined as well to determine the policy effectiveness in creating better business climate for local batik cluster developments. What policies and programs are beneficial to improve batik cluster activities have not been evaluated properly, from which the overlapping training programs and any other government assistance unavoidably recur. By evaluating the impact of policies and programs on the local batik cluster and the subsequent multiplier effects to local actors and the society, we can better understand what combination of formal and informal rules will benefit local batik cluster developments.

References

- BAKOSURTANAL, *see* Badan Koordinasi Survei dan Pemetaan Nasional
- BAPPEDA Kota Surakarta, *see* Badan Perencanaan Pembangunan Daerah Kota Surakarta
- BBKB, *see* Balai Besar Kerajinan dan Batik
- BP3 TMII, *see* Badan Pelaksana Pengelola dan Pengembangan Taman Mini Indonesia Indah
- BPKIMI, *see* Badan Pengkajian Kebijakan, Iklim dan Mutu Industri
- BPS Kabupaten Rembang, *see* Badan Pusat Statistik Kabupaten Rembang
- DBPS-UKMK *see* Deputi Bidang Pengkajian Sumberdaya Usaha Kecil, Menengah dan Koperasi
- Depperin *see* Departemen Perindustrian
- FEDEP, *see* Forum for Economic Development and Employment Promotion
- FPESD *see* Forum Pengembangan Ekonomi dan Sumber Daya
- Pemkab Semarang *see* Pemerintah Kabupaten Semarang
- STTT, *see* Sekolah Tinggi Teknologi Tekstil
- TREDA, *see* Trade Research and Development Agency
- UNESCO, *see* United Nations Educational, Scientific and Cultural Organization
- UNSD, *see* United Nations Statistics Division
- WCO, *see* World Customs Organization
- Asheim, B., Cooke, P., & Martin, R. (2006). The rise of the cluster concept in regional analysis and policy: A critical assessment. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 1-29). London: Routledge.
- Atmojo, H. (2009). *Traditional batik of Kauman, Solo: An exotic, timeless cultural heritage*. Surakarta: Penerbit Tiga Serangkai.
- Badan Koordinasi Survei dan Pemetaan Nasional (2000). *Peta digital rupabumi Indonesia*. Retrieved from <http://www.bakosurtanal.go.id/>
- Badan Pelaksana Pengelola dan Pengembangan Taman Mini Indonesia Indah (1997). *Indonesia indah buku ke-8: Batik*. Jakarta: Badan Pelaksana Pengelola dan Pengembangan Taman Mini Indonesia Indah.
- Badan Pengkajian Kebijakan, Iklim dan Mutu Industri (2012). *Profil Balai Besar Kerajinan dan Batik*. Retrieved from <http://bpkimi.kemenperin.go.id/bpkimi/index.php?r=site/page&id=36>
- Badan Perencanaan Pembangunan Daerah Kota Surakarta (2011). *Profil daerah Kota Surakarta 2011*. Surakarta: Author.
- Badan Pusat Statistik Kabupaten Rembang (2012). *Rembang dalam angka tahun 2012*. Rembang: Author.
- Badan Pusat Statistik Kota Surakarta (2011). *Produk Domestik Regional Bruto Kota Surakarta tahun 2011*. Surakarta: Author.
- Badan Pusat Statistik Provinsi Jawa Tengah (2008). *Jawa Tengah dalam angka tahun 2008*. Semarang: Author.

- Badan Pusat Statistik Provinsi Jawa Tengah (2009). *Jawa Tengah dalam angka tahun 2009*. Semarang: Author.
- Badan Pusat Statistik Provinsi Jawa Tengah (2010). *Jawa Tengah dalam angka tahun 2010*. Semarang: Author.
- Badan Pusat Statistik Provinsi Jawa Tengah (2011). *Jawa Tengah dalam angka tahun 2011*. Semarang: Author.
- Badan Pusat Statistik Provinsi Jawa Tengah (2012). *Jawa Tengah dalam angka tahun 2012*. Semarang: Author.
- Balai Besar Kerajinan dan Batik (2013). *Profil Balai Besar Kerajinan dan Batik*. Yogyakarta: Author.
- Basri, M.C. (2013). A tale of two crises: Indonesia's political economy. *JICA-RI Working Paper No. 57 March 2013*. Tokyo: Japan International Cooperation Agency Research Institute. Retrieved from jica-ri.jica.go.jp/publication/assets/JICA-RI_WP_No.57_2013.pdf
- Batik Purwanti (2012). *Wax removal process in traditional batik making* [Photo image]. Retrieved from http://batikpurwantibayat.com/wp-content/uploads/2012/10/DSC_0217.jpg
- Belussi, F. (2006). In search of a useful theory of spatial clustering: Agglomeration versus active clustering. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 69-89). London: Routledge.
- Berry, A., Rodriguez, E., & Sandee, H. (2001). Small and medium enterprise dynamics in Indonesia. *Bulletin of Indonesian Economic Studies*, 37(3), 363-384. doi: 10.1080/00074910152669181
- Bolk, S. (2009). *Canting tools used in the earliest form of Indonesian batik making* [Photo image]. Retrieved from <http://dereisnaarbatik.blogspot.de/2009/09/canting.html>
- Broek, J. O. M. (1942). Economic development of the Netherlands Indies, Institute of Pacific Relations. In B. Siahaan (2000a). *Industrialisasi di Indonesia: Sejak hutang kehormatan sampai banting stir*. Bandung: Penerbit ITB.
- Brown, C. (2003). *A short history of Indonesia: The unlikely nation?*. Crows Nest, NSW: Allen & Unwin.
- Burt, R. S. (2001). Structural holes versus network closure as social capital. In N. Lin, K. Cook & R. S. Burt (Eds.), *Social capital: Theory and research* (pp. 31-56). New York: Aldine De Gruyter.
- Buskens, V. (2002). *Social networks and trust*. Dordrecht: Kluwer Academic Publishers.
- Capello, R. (2009). Space, growth and development. In R. Capello & P. Nijkamp (Eds.), *Handbook of regional growth and development theories* (pp. 33-52). Cheltenham: Edward Elgar.
- Cooke, P. (2007). Jacobian cluster emergence: Wider insights from 'green innovation' convergence on a Schumpeterian 'failure'. In D. Fornahl, S. Henn, & M. Menzel (Eds.), *Emerging clusters: Theoretical, empirical and political perspectives on the initial stage of cluster evolution* (pp. 17-42). Cheltenham: Edward Elgar.
- Cooke, P., De Laurentis, C., Tödting, F., & Trippel, M. (2007). *Regional knowledge economies: Markets, clusters and innovation*. Cheltenham: Edward Elgar.
- Creswell, J. W. (2007). *Qualitative inquiry and research design: Choosing among five approaches* (2nd ed.). Thousand Oaks: Sage Publications.
- Cumbers, A. & MacKinnon, D. (2004). Introduction: Clusters in urban and regional development. *Urban Studies*, 41(5/6), 959-969, doi: 10.1080/00420980410001675896

- Dawkins, C. J. (2003). Regional development theory: Conceptual foundations, classic works, and recent developments. *Journal of Planning Literature*, 18(2), 131-172. doi: 10.1177/0885412203254706
- De Graaf, H.Jed. (1956). De vijf gezantschapsreizen van Rijklof van Goens naar het hof van Mataram, 1648-1654, *Werken van de Linschoten Vereeniging vol.LIX*, The Hague: Martinus Nijhof. In R. Laarhoven (2012). A silent textile trade war: Batik revival as economic and political weapon in 17th century Java. In Textile Society of America (Ed.), *Textiles and Politics: Textile Society of America 13th Biennial Symposium Proceedings*, Paper 705, Washington, DC, September 18-September 22, 2012, Lincoln, the United States: University of Nebraska Lincoln. Retrieved from <http://digitalcommons.unl.edu/tsaconf/705>
- Deputi Bidang Pengkajian Sumberdaya Usaha Kecil, Menengah dan Koperasi (2007). *Kajian efektivitas model penumbuhan klaster bisnis UKM berbasis agribisnis*. Jakarta: Kementerian Negara Koperasi dan Usaha Kecil dan Menengah in conjunction with PT. La'mally.
- Dick, H. (2002). Formation of the nation-state, 1930s-1966. In H. Dick, V. J. H. Houben, J. T. Lindbland & T. K. Wie (Eds.), *The emergence of a national economy: An economic history of Indonesia, 1800-2000* (pp. 153-193). Crows Nest, NSW: Allen & Unwin and University of Hawai'i Press.
- Dorenkamp, A., & Mossig, I. (2010). Economic policy and its impact on the evolution of clusters and spatial systems exemplified by German TV programme production. In D. Fornahl, S. Henn, & M. Menzel (Eds.), *Emerging clusters: Theoretical, empirical and political perspectives on the initial stage of cluster evolution* (pp. 43-73). Cheltenham: Edward Elgar.
- Djoemena, N. (1999). Regional variations. In J. Achjadi (Ed.), *Batik: Spirit of Indonesia* (pp. 37-63). Jakarta: Yayasan Batik Indonesia.
- Doellah, S. (2002). *Batik: Pengaruh zaman dan lingkungan*. Surakarta: Danar Hadi.
- Dolls of India (2013). *Indian batik motif* [Photo image]. Retrieved from <http://www.dollsofindia.com/productbatik-paintingskrishna-and-gopinis-batik-painting-on-cotton-cloth-DU03.html>
- Elliot, I. M. (2004). *Batik: Fabled cloth of Java* (Revised ed.). Singapore: Periplus Editions.
- Endarto, D. (2011). *A statue of King Anushapati of Singhasari Monarchy ca. 1260 AD wearing a long batik dress* [Photo image]. Retrieved from <http://wilwatiktamuseum.files.wordpress.com/2011/12/arca-nusantara-01.jpg>
- Firman, T. (2004). Demographic and spatial patterns of Indonesia's recent urbanisation. *Population, Space and Place*, 10, 421-434. doi: 10.1002/psp.339
- Forshee, J. (2006). *Culture and customs of Indonesia*. Westport: Greenwood Press.
- Forum for Economic Development and Employment Promotion Rembang (2007). *Profile FEDEP Rembang*. Rembang: Forum for Economic Development and Employment Promotion Rembang Rembang.
- Forum Pengembangan Ekonomi dan Sumber Daya (2006). *Visi dan misi Forum Pengembangan Ekonomi dan Sumber Daya Jawa Tengah*. Retrieved from <http://fped-jateng.org/index.php/index.php/tugas-dan-tujuan-fped>
- Fryer, R., & Newland, J. (2011). Kayu tingi [Photo image]. Retrieved from http://www.northqueenslandplants.com/Australian%20Plant%20Families%20N-S/rhizophoraceae_Ceriops%20tagal.html
- Gabungan Koperasi Batik Indonesia (1969). *20 tahun GKBI 1948-18 September-1968*. Jakarta: Koperasi Pusat Gabungan Koperasi Batik Indonesia.

- Gabungan Koperasi Batik Indonesia (2009). *Gabungan Koperasi Batik Indonesia 18 September 1948 – 2008: 60 tahun GKBI – 1948*. Jakarta: Author.
- Ganguly, B. (2010). *Kayu jambal* [Photo image]. Retrieved from http://commons.wikimedia.org/wiki/File:Peltophorum_pterocarpum_5793.JPG
- Garg, J. M. (2009). *Kayu secang* [Photo image]. Retrieved from [http://commons.wikimedia.org/wiki/File:Caesalpinia_sappan_\(Sappan_wood\)_W2_IMG_3339.jpg](http://commons.wikimedia.org/wiki/File:Caesalpinia_sappan_(Sappan_wood)_W2_IMG_3339.jpg)
- Given, L. M. (2008). *The Sage encyclopedia of qualitative research methods: Volume 1 & 2*. Thousand Oaks: Sage Publications, Inc.
- Gordon, I. R., & McCann, P. (2000). Industrial clusters: Complexes, agglomeration and/or social networks?. *Urban Studies*, 37(3), 513-532. doi: 10.1080/0042098002096
- Guangming Daily (2012). *Chinese handmade batik making* [Photo image]. Retrieved from http://en.gmw.cn/2012-06/07/content_4298877_13.htm
- Gugus, (2012). *Stamping batik makers at work* [Photo image]. Retrieved from <http://www.medogh.com/blogartikel-batik/pembuatan-batik-cap-vs-batik-tulis-di-indonesia>
- Gulnik, Y. (2011). *Indonesian batik motif* [Photo image]. Retrieved from <http://batikdesign.org/cultural-origins-of-traditional-indonesian-batik/>
- Hancock, D. R. & Algozzine, B. (2006). *Doing case study research: A practical guide for beginning researchers*. New York: Teachers College, Columbia University.
- Handmade Expressions (2011). *Indian handmade batik making* [Photo image]. Retrieved from <http://www.handmadeexpressions.net/collections/batik-art-wax-printing>
- Haslam, S. (2013). *Kayu tegeran* [Photo image]. Retrieved from [http://www.noosanativeplants.com.au/plants/861/maclura-cochinchinensis-\(was-cudrania-cochinchinensis\)](http://www.noosanativeplants.com.au/plants/861/maclura-cochinchinensis-(was-cudrania-cochinchinensis))
- Hill, H. (2001). Small and medium enterprises in Indonesia: old policy challenges for a new administration. *Asian Survey*, 41(2), 248-270. URL: <http://www.jstor.org/stable/10.1525/as.2001.41.2.248>
- Hill, H. & Shiraishi, T. (2007). Indonesian after the Asian Crisis. *Asian Economic Policy Review*, 2, 123-141. doi: 10.1111/j.1748-3131.2007.00058.x
- House of Danar Hadi (2009). *Antique Batik Museum*. Retrieved from <http://www.houseofdanarhadi.com/en/museum.php>
- International Batik Centre (2012). *Proses pembuatan batik*. Retrieved from <http://international-batik-center.blogspot.de/2012/05/proses-pembuatan-batik.html>
- Ishwara, H., Yahya, L. R. S., & Moeis, X. (2011). *Batik pesisir pusaka Indonesia: Koleksi Hartono Sumarsono*. Jakarta: Kepustakaan Populer Gramedia.
- Jusri & Idris, M. (2011). *Batik Indonesia: Soko guru budaya bangsa*. Jakarta: Direktorat Jenderal Industri Kecil dan Menengah Kementerian Perindustrian Republik Indonesia.
- Kampoeng Batik Laweyan (2013). *About FPKBL*. Retrieved from http://kampoenglaweyan.com/en/index.php?option=com_content&task=view&id=30&Itemid=60
- Kardinata, H. (2009). *Garis waktu batik Indonesia*. Retrieved from <http://dgi-indonesia.com/garis-waktu-batik-indonesia/>
- Kartapranata, G. (2012). *A statue of Avalokiteshvara, the Buddhist Boddhisattva, between 800-900 AD, wearing a long batik dress during Srivijaya Monarchy era* [Photo image]. Retrieved from http://en.wikipedia.org/wiki/File:Avalokiteshvara_Bingin_Jungut_Srivijaya.JPG

- Kementerian Perindustrian Republik Indonesia (2013a). *Trend of Indonesia's medium and big industries performance by ISIC*. Retrieved from http://www.kemenperin.go.id/statistik/ibs_kbli.php?industri=Batik++
- Kementerian Perindustrian Republik Indonesia (2013b). *Trend of Indonesia's export by sectors*. Retrieved from <http://www.kemenperin.go.id/statistik/peran.php?ekspor=1>
- Kementerian Perindustrian Republik Indonesia (2013c). *Trend of Indonesia's import by sectors*. Retrieved from <http://www.kemenperin.go.id/statistik/peran.php>
- Kementerian Perindustrian Republik Indonesia (2013d). *Peran ekspor kelompok hasil industri tekstil terhadap total ekspor hasil industri*. Retrieved from http://www.kemenperin.go.id/statistik/peran_kelompok.php?kel=2&ekspor=1
- Kementerian Perindustrian Republik Indonesia (2013e). *Peran impor kelompok hasil industri tekstil terhadap total impor hasil industri*. Retrieved from http://www.kemenperin.go.id/statistik/peran_kelompok.php?kel=2&ekspor=
- KRHT Hardjonagoro (1999). Motifs in meanings. In J. Achjadi (Ed.), *Batik: Spirit of Indonesia* (pp. 64-81). Jakarta: Yayasan Batik Indonesia.
- Laarhoven, R. (2012). A silent textile trade war: Batik revival as economic and political weapon in 17th century Java. In Textile Society of America (Ed.), *Textiles and Politics: Textile Society of America 13th Biennial Symposium Proceedings*, Paper 705, Washington, DC, September 18-September 22, 2012, Lincoln, the United States: University of Nebraska Lincoln. Retrieved from <http://digitalcommons.unl.edu/tsaconf/705>
- Lewis, J., & Ritchie, J. (2003). Generalising from qualitative research. In J. Lewis & J. Ritchie (Eds.), *Qualitative research practice: A guide for social science students and researchers* (pp. 263-286). Thousand Oaks: Sage Publications, Inc.
- Lin, N. (2001). Building a network theory of social capital. In N. Lin, K. Cook & R. S. Burt (Eds.), *Social capital: Theory and research* (pp. 3-30). New York: Aldine De Gruyter.
- Lindblad, J. T. (2002). The late colonial state and economic expansion, 1900-1930s. In H. Dick, V. J. H. Houben, J. T. Lindblad & T. K. Wie (Eds.), *The emergence of a national economy: An economic history of Indonesia, 1800-2000* (pp. 111-152). Crows Nest, NSW: Allen & Unwin and University of Hawai'i Press.
- Lindblad, J. T. (2010). Economic growth and decolonisation in Indonesia. *Itinerario*, 34(1), 97-112. doi: <http://dx.doi.org/10.1017/S0165115310000070>
- Lombard, D. (2008a). *Nusa Jawa: Silang Budaya kajian sejarah terpadu: Buku I Batas-batas pembaratan*. Jakarta: PT. Gramedia Pustaka Utama in collaboration with Forum Jakarta – Paris and École française d'Extrême-Orient.
- Lombard, D. (2008b). *Nusa Jawa: Silang Budaya kajian sejarah terpadu: Buku II Jaringan Asia*. Jakarta: PT. Gramedia Pustaka Utama in collaboration with Forum Jakarta – Paris and École française d'Extrême-Orient.
- Lombard, D. (2008c). *Nusa Jawa: Silang Budaya kajian sejarah terpadu: Buku III Warisan kerajaan-kerajaan konsentris*. Jakarta: PT. Gramedia Pustaka Utama in collaboration with Forum Jakarta – Paris and École française d'Extrême-Orient.
- Malaysia klaim tujuh budaya Indonesia. (2012, June 19). *ANTARA News*. Retrieved from <http://www.antaranews.com/berita/317054/2007-2012-malaysia-klaim-tujuh-budaya-indonesia>
- Malmberg, A. & Power, D. (2006). True clusters: A severe case of conceptual headache. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 50-68). London: Routledge.

- Maskell, P., & Kebir, L. (2006). What qualifies as a cluster theory?. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 31-49). London: Routledge.
- Maxwell, R. (2003). *Textiles of Southeast Asia: Trade, tradition and transformation* (Revised ed.). Hongkong: Periplus Editions.
- McCormick, D., & Oyelaran-Oyeyinka, B. (2007). Introduction: Clusters and innovation systems in Africa. In B. Oyelaran-Oyeyinka & D. McCormick (Eds.), *Industrial clusters and innovation systems in Africa: Institutions, markets, and policy* (pp. 1-19). Tokyo: United Nations University Press.
- McDonald, F., Huang, Q., Tsagdis, D., & Tüselmann, H. J. (2007). Is there evidence to support Porter-type cluster policies?. *Regional Studies*, 41(1), 39-49. doi: 10.1080/00343400601136284
- Media Industri (2005). KPIN: Acuan pengembangan industri di tanah air. *Media Industri*, No. 18.X.2005, 7-10. Retrieved from <http://www.kemenperin.go.id/Ind/Publikasi/MajIndag/File/2005101.pdf>
- Media Industri dan Perdagangan (2002). Program revitalisasi dan pengembangan industri dan perdagangan. *Media Industri dan Perdagangan*, No. 10.IX.2002, pp. 3-10.
- Menzel, M., Henn, S., & Fornahl, D. (2010). Emerging clusters: A conceptual overview. In D. Fornahl, S. Henn, & M. Menzel (Eds.), *Emerging clusters: Theoretical, empirical and political perspectives on the initial stage of cluster evolution* (pp. 1-12). Cheltenham: Edward Elgar.
- Meyer-Stamer, J. (1998). Clustering, systemic competitiveness and commodity chains: Shaping competitive advantage at the local level in Santa-Catarina/Brasil. In International Institute for Labour Studies (Ed.), *International Workshop on Global Production and Local Jobs: New Perspectives on Enterprise Networks, Employment and Local Development Policy*, Geneva, 9-10 March 1998, Geneva: International Institute for Labour Studies.
- Meyer-Stamer, J., & Harmes-Liedtke, U. (2005). How to promote clusters. *Mesopartner Working Paper 08/2005*. Duisburg: Mesopartner.
- Ministry of Industry (2008). *Industry for better life: facts and figures*, Jakarta: Bureau of General Affairs and Public Relations Ministry of Industry
- Muljana, S. (2005). *Runtuhnya kerajaan Hindu-Jawa dan timbulnya negara-negara Islam di Nusantara*. Yogyakarta: LKiS.
- Museum Batik (2011). *Profil*. Retrieved from <http://www.museumbatik.com/page/Profil.html>
- Museum Tekstil Jakarta (2012). *History*. Retrieved from <http://museumtekstiljakarta.com/en/sejarah/>
- Musywaroh. (2001). *Deskripsi tata fisik rumah pengusaha batik di Kauman Surakarta* (Unpublished master thesis), Universitas Gadjah Mada, Indonesia.
- North, D. C. (1990). *Institutions, institutional change and economic performance*. Cambridge: Cambridge University Press.
- Nugroho, P. (2009a, June). *Industrial clustering, urban politics and regional development: Are we going to better regional policy or muddling through?*. Paper presented at the International Conference on Regional Development and Infrastructures: Trends, Issues and Challenges Confronting Regional Development, Infrastructure and Environment in Developing Countries, Bandung.

- Nugroho, P. (2009b, July). *Reconciling industrial clusters and urban systems through regional network governance*. Paper presented at the Second IRSA Institute Conference: The Political Economics of Regional Development, Bogor.
- Nugroho, P. (2012). The effects of social systems on batik cluster institutionalisation in Surakarta Municipality: A review of local cluster policy. In Faculty of Economics of University of Indonesia (Ed.), *Human Development and Capability Association (HDCA) 2012 International Conference Proceeding*, Jakarta, Indonesia, September 5th-September 7th, 2012, Jakarta, Indonesia: University of Indonesia.
- Nugroho, P. (2013). A socio-cultural dimension of local batik industry development in Indonesia. In Faculty of Economics and Business of Padjajaran University and Indonesian Regional Science Association (Eds.), *The 23rd Pacific Conference of the Regional Science Association International (RSAI) and the 4th Indonesian Regional Science Association (IRSA) Institute Proceeding*, Bandung, Indonesia, July 2nd-July 4th, 2013, Bandung, Indonesia: Padjajaran University and Indonesian Regional Science Association.
- Olson, M. (1965). *The logic of collective action: Public goods and the theory of groups*. Cambridge: Harvard University Press.
- Ostrom, E. (1990). *Governing the commons: The evolution of institutions for collective action*. Cambridge: Cambridge University Press.
- Ostrom, E., & Ahn, T.K. (2009). The meaning of social capital and its link to collective action. In G. T. Svendsen & G. L. H. Svendsen (Eds.), *Handbook of social capital: The troika of sociology, political science and economics* (pp. 17-36). Cheltenham: Edward Elgar.
- Patton, M. Q. (2002). *Qualitative research and evaluation methods* (3rd Ed.). Thousand Oaks: Sage Publications, Inc.
- Pemerintah Kabupaten Semarang (2002). *Peraturan Daerah No. 3 Tahun 2002 tentang Rencana Strategis Kabupaten Semarang 2002-2006*. Ungaran: Author.
- Pemerintah Kota Pekalongan (2011). *Museum Batik Nasional*. Retrieved from http://www.pekalongankota.go.id/index.php?option=com_content&view=article&id=134:museum-batik-pekalongan&catid=77:seni-budaya&Itemid=104
- Pemerintah Republik Indonesia (2007). *Buku pegangan penyelenggaraan pemerintahan dan pembangunan daerah 2007: Pengembangan ekonomi daerah dan sinergi kebijakan investasi pusat-daerah*. Jakarta: Author.
- Peraturan Daerah No. 2/2007 tentang Rencana Pembangunan Jangka Menengah Daerah Kota Surakarta Tahun 2005-2010.
- Peraturan Daerah No. 13/2008 tentang Validasi Rencana Pembangunan Jangka Menengah Daerah Kabupaten Rembang Tahun 2006-2010.
- Peraturan Daerah No. 1/2010 tentang Rencana Pembangunan Jangka Panjang Daerah Kabupaten Rembang 2005-2025.
- Peraturan Daerah No. 2/2010 tentang Rencana Pembangunan Jangka Panjang Daerah Kota Surakarta 2005-2025.
- Peraturan Daerah No. 10/2010 tentang Rencana Pembangunan Jangka Menengah Daerah Kabupaten Rembang Tahun 2010-2015.
- Peraturan Daerah No. 12/2010 tentang Rencana Pembangunan Jangka Menengah Daerah Kota Surakarta Tahun 2010-2015.
- Pike, A., Rodríguez-Pose, A., & Tomaney, J. (2006). *Local and regional development*. London: Routledge.

- Prohati (2013). *Daftar spesies*. Retrieved from <http://www.proseanet.org/prohati2/browser.php>
- Puppim de Oliveira, J. A. (2008a). Environmental upgrading of industrial clusters: Understanding their connections with global chains in the Brazilian furniture sector. In J. A. Puppim de Oliveira (Ed.), *Upgrading clusters and small enterprises in developing countries: Environmental, labor, innovation and social issues* (pp. 45-64). Surrey: Ashgate Publishing Limited.
- Puppim de Oliveira, J. A. (2008b). Introduction: Social upgrading among small firms and clusters. In J. A. Puppim de Oliveira (Ed.), *Upgrading clusters and small enterprises in developing countries: Environmental, labor, innovation and social issues* (pp. 1-22). Surrey: Ashgate Publishing Limited.
- Purnomosidi, I. (2012). Rifa'iyah batik motif adopted from Islamic influence [Photo image]. Retrieved from <http://koempoelanbarangdjadoel.blogspot.de/2012/03/kb-647-batik-koeno-rifaiyah.html>
- Pusponegoro, M., Soim, M., & Muttaqin, H. (2007). *Kauman: Religi, tradisi dan seni*. Surakarta: Paguyuban Kampung Wisata Batik Kauman.
- Risianti, N. S. (2010). *Indikasi penilaian signifikansi budaya kawasan bersejarah, bangunan bersejarah dan aktivitas bersejarah di Kampung Batik Laweyan* (Unpublished bachelor thesis), Diponegoro University, Indonesia.
- Rock, M. T. (1999). Reassessing the effectiveness of industrial policy in Indonesia: Can the neoliberals be wrong?. *World Development*, 27(4), 691-704. doi: 10.1016/S0305-750X(98)00158-2
- Rustopo (2008). *Jawa sejati: Otobiografi Go Tik Swan Hardjonagoro*. Yogyakarta: Penerbit Ombak and Yayasan Nabil.
- Sandee, H. & van Hulsen, S. C. (2000). Business development services for small and cottage industry clusters in Indonesia: A review of case studies from Central Java. In German Agency for Technical Cooperation (GTZ), United States Agency for International Development (USAID), Mekong Project Development Facility (MPDF), and Committee of Donor Agencies for Small Enterprise Development (Eds.), *Proceedings of International Conference on Business Services for Small Enterprises in Asia: Developing Markets and Measuring Performance*, Paper 10, Hanoi, April 3-6, 2000.
- Sato, Y. (2000). Linkage formation by small firms: The case of a rural cluster in Indonesia. *Bulletin of Indonesian Economic Studies*, 36(1), 137-166. doi: 10.1080/00074910012331337813
- Schmitz, H. & Nadvi, K. (1999). Clustering and industrialization: Introduction. *World Development*, 27(9), 1503-1514. doi: 10.1016/S0305-750X(99)00072-8
- Scole, A. (1999). *Indonesian handmade batik making* [Photo image]. Retrieved from <http://www.discover-indo.tierranet.com/batikpag.htm>
- Scott, A. J. (2006). Spatial and organizational patterns of labour markets in industrial clusters: the case of Hollywood. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 236-254). London: Routledge.
- Segers, W. A. I. M. (1987). Changing economy in Indonesia, Vol. 8, Amsterdam: Royal Tropical Institute. In B. Siahaan (2000a). *Industrialisasi di Indonesia: Sejak hutang kehormatan sampai banting stir*. Bandung: Penerbit ITB.
- Sekolah Tinggi Teknologi Tekstil (2013). *Profil STTT*. Retrieved from <http://www.stttekstil.ac.id/profil.php>

- Siahaan, B. (2000a). *Industrialisasi di Indonesia: Sejak hutang kehormatan sampai banting stir*. Bandung: Penerbit ITB.
- Siahaan, B. (2000b). *Industrialisasi di Indonesia: Sejak periode rehabilitasi sampai awal reformasi*. Bandung: Penerbit ITB.
- Simmie, J. (2006). Do clusters or innovation systems drive competitiveness?. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 164-187). London: Routledge.
- Siswandi, R. (1999). The roots of tradition. In J. Achjadi (Ed.), *Batik: Spirit of Indonesia* (pp. 20-35). Jakarta: Yayasan Batik Indonesia.
- Smyth, I. (1992). Collective efficiency and selective benefits: The growth of the rattan industry of Tegalwangi (Indonesia). *IDS Bulletin*, 23(2), 51-56. doi: 10.1111/j.1759-5436.1992.mp23003010.x
- Spencer, G. M., Vinodrai, T., Gertler, M. & Wolfe, D. A. (2010). Do cluster make a difference?: Defining and assessing their economic performance. *Regional Studies*, 44(6), 697-715. doi: 10.1080/00343400903107736
- Staber, U. (2007). Contextualizing research on social capital in regional clusters. *International Journal of Urban and Regional Research*, 31(3), 505-521. doi: 10.1111/j.1468-2427.2007.00742.x
- Stake, R. E. (2010). *Qualitative research: Studying how things work*. New York: The Guilford Press.
- Steiner, M. (2006). Do clusters 'think'?: An institutional perspective on knowledge creation and diffusion in clusters. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 199-217). London: Routledge.
- Stüber, K. (2004). *Tarum plant* [Photo image]. Retrieved from <http://de.wikipedia.org/wiki/Indigofera>
- Sudarsono, A. (2011). *Gambir plant* [Photo image]. Retrieved from <http://titan-medicalplant.blogspot.de/2011/11/benefit-of-medical-plant-gambiruncaria.html>
- Swann, G. M. P. (2006). Cluster and hinterland: When is a proactive cluster policy appropriate?. In B. Asheim, P. Cooke & R. Martin (Eds.), *Clusters and regional development: Critical reflections and explorations* (pp. 255-271). London: Routledge.
- Tambunan, T. (2005). Promoting small and medium enterprises with a clustering approach: A policy experience from Indonesia. *Journal of Small Business Management*, 43(2), 138-154. doi: 10.1111/j.1540-627X.2005.00130.x
- Tirta, I. (1999). Batik in fashion. In J. Achjadi (Ed.), *Batik: Spirit of Indonesia* (pp. 167-203). Jakarta: Yayasan Batik Indonesia.
- Trade Research and Development Agency (2008). *Indonesian batik: A cultural beauty*. Retrieved from www.kemendag.go.id/files/pdf/2012/12/08/batik-ido-1354950532.pdf
- Undang-undang No. 1/1967 tentang Penanaman Modal Asing
- Undang-undang No. 1/1968 tentang Penanaman Modal Dalam Negeri
- Undang-undang No. 17/2003 tentang Ketenagakerjaan
- Undang-undang No. 25/2004 tentang Sistem Perencanaan Pembangunan Nasional
- Undang-undang No. 32/2004 tentang Pemerintahan Daerah
- United Nations Educational, Scientific and Cultural Organization (2009). *Indonesian batik*. Retrieved from <http://www.unesco.org/culture/ich/en/RL/00170>
- United Nations Statistics Division (2013). *UN classifications registry*. Retrieved from <http://unstats.un.org/unsd/cr/registry/default.asp?Lg=1>

- Van der Eng, P. (2007). 'De-industrialisation' and colonial rule: The cotton textile industry in Indonesia, 1820-1941. *Working Paper No. 2007/04*. Retrieved from <http://rspas.anu.edu.au/economics/publications.php>
- Veldhuisen, H. C. (2007). *Batik Belanda 1840-1940: Dutch influence in batik from Java history and stories*. Jakarta: PT. Gaya Favorit Press.
- Vickers, A. (2005). *A history of modern Indonesia*. Cambridge: Cambridge University Press.
- Weijland, H. (1999). Microenterprise clusters in rural Indonesia: Industrial seedbed and policy target. *World Development*, 27(9), 1515-1530. doi: 10.1016/S0305-750X(99)00076-5
- Widi, A. H. (2009, September 5). Menapaki jejak Majapahit di Kajar, Lasem. *Kompas*. Retrieved from <http://cetak.kompas.com/read/2009/09/05/0323093/Menapaki.Jejak.Majapahit.di.Kajar.Lasem>
- Wie, T. K. (2002). The Soeharto era and after: Stability, development and crisis, 1966-2000. In H. Dick, V. J. H. Houben, J. T. Lindbland & T. K. Wie (Eds.), *The emergence of a national economy: An economic history of Indonesia, 1800-2000* (pp. 194-243). Crows Nest, NSW: Allen & Unwin and University of Hawai'i Press.
- Wie, T. K. (2010). Understanding Indonesia: The role of economic nationalism. *Journal of Indonesian Social Sciences and Humanities*, 3, 55-79. Retrieved from <http://www.kitlv-journals.nl/index.php/jissh/issue/view/916>
- Winarti, R. Ay. S. (2004). *Sekilas sejarah Karaton Surakarta*, Surakarta.
- Woodside, A. G. (2010). *Case study research: Theory, methods, practice*. Bingley: Emerald Group Publishing Limited.
- World Customs Organization (2013). *HS nomenclature older edition*. Retrieved from http://www.wcoomd.org/en/topics/nomenclature/instrument-and-tools/hs_nomenclature_older_edition.aspx
- Wulandari, A. (2011). *Batik Nusantara: Makna filosofis, cara pembuatan, dan industri batik*. Yogyakarta: Penerbit ANDI.
- Xiao, X. (2010). *Chinese batik motif* [Photo image]. Retrieved from <http://interactchina.wordpress.com/2010/08/12/batik-chinas-most-ancient-dyeing-2/>
- Yayasan Batik Indonesia (2013). *History of Yayasan Batik Indonesia*. Retrieved from http://www.batik-indonesia.org/en/about_us
- Yin, R. B. (2009). *Case study research: Design and methods* (4th ed.). Thousand Oaks: Sage Publications.

Annex A. List of Interviewees in Surakarta Batik Cluster

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
GOVERNMENT LEADERS IN SURAKARTA MUNICIPALITY							
1.	EXP-INT_SKA01 6 Jan 2012 1h : 18m : 34s	Sri Wahyuni (with support of Dwi Puspendari)	Female	54	Jl. Gambiran RT. 4/RW. 1 No. 127 Cemani, Grogol, Sukoharjo M: 08179460308	Public servant	Division Head of Industry at Local Office for Industry and Trade
2.	EXP-INT_SKA02 6 Jan 2012 56m : 15s	Nur Haryani	Female	49	Jl. Merpati No. 66 Perumahan Bumi Graha Indah, Jaten R: (0271) 826391 M: 08122612305	Public servant	Head of Local Office for Cooperatives and Micro, Small and Medium Enterprises
3.	EXP-INT_SKA03 7 Jan 2012 3h : 19m : 21s	Mohammad David R. Wijaya	Male	47	c/o Gallery Restaurant Jl. Dr. Wahidin No. 49 Surakarta R: (0271) 714050 M: 08122985357	Entrepreneur in furniture and restaurant industry	Head of Forum of Economic Development and Employment Promotion (FEDEP) Surakarta
4.	EXP-INT_SKA04 10 Jan 2012 1h : 25m : 12s	Sukriyah	Female	53	Jl. Gambiran Kemangi RT. 3/RW. 1 Sukoharjo R: (0271) 720336 M: 081329273060	Public servant	Division Head of Economics at Local Development Planning Authority
5.	EXP-INT_SKA05 10 Jan 2012 42m : 17s	Sultan Najamudin	Male	44	Jl. Indronoto No. 22 Ngabean, Kartasura, Sukoharjo M: 0817263748	Public servant	Subdivision Head of Pollution Control at Local Agency for Environmental Protection

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
6.	EXP-INT_SKA06 18 Jan 2012 1h : 2m : 55s	Widdi Sri Hanto (with support of Budy Sartono)	Male	50+	Jl. Mawar No. 4B Perum Griya Andini, Mojolaban, Sukoharjo M: 08122654379	Public servant	Head of Local Office for Culture and Tourism
7.	EXP-INT_SKA07 11 Jan 2012 39m : 55s	Yuyuk Yuniman	Male	51	Jl. Bulumantakan No. 7 RT. 5/RW. 6 Punggawan, Surakarta R: (0271) 716081 M: 08172845046	Public servant	Head of Kampung Laweyan
8.	EXP-INT_SKA08 11 Apr 2012 3h : 7m : 25s	Totok Mulyoko	Male	45	Jl. Trisula No. 4 Kauman, Surakarta R: (0271) 636627 M: 081548718562	Public servant	Head of Kampung Kauman
EXTERNAL AGENTS IN SURAKARTA MUNICIPALITY							
9.	EXP-INT_SKA09 25 Jan 2012 59m : 54s	Suharto	Male	50	Jl. Yosodipuro No. 54 Surakarta M: 08122652040 E: miki729292@yahoo.com	Entrepreneur in travel agent industry	Head of Association of the Indonesian Tours and Travel Agencies (ASITA) Solo Raya
10.	EXP-INT_SKA10 25 Jan 2012 2h : 10m : 34s	Abdullah Soewarno	Male	61	c/o Mandala Wisata Hotel Perintis Kemerdekaan No. 12 Surakarta R: (0271) 712270 M: 08129096964	Entrepreneur in hotel industry	Vice Head of Indonesian Hotels and Restaurants Association (PHRI) Surakarta
11.	EXP-INT_SKA11 8 Feb 2012 & 6 Mar 2012 4h : 0m : 44s	Soedarmono	Male	63	Jl. Yosodipuro No. 114B Surakarta R: (0271) 720757	Academic staff at Universitas Negeri Sebelas Maret	Local historian
12.	EXP-INT_SKA12 06 Mar 2012 1h : 27m : 48s	Hardjosuwarno	Male	50+	Jl. Yos Sudarso No. 176 Surakarta R: (0271) 643289 M: 08122970884	Batik entrepreneur	Owner and successor of old batik firm

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
KEY PLAYERS OF BATIK CLUSTER ORGANISATION IN KAMPUNG LAWEYAN (FPKBL)							
13.	EXP-INT_LWY01 22 Dec 2011 1h : 16m : 17s	Arif Budiman Efendi	Male	44	Jl.Nitik No. 3 Laweyan, Surakarta R: (0271) 712072 E: arif@kampoenglaweyan.com	Internet marketer	Information and technology manager of FPKBL
14.	EXP-INT_LWY02 22 Dec 2011 1h : 35m : 39s	Alpha Febela Priyatmono	Male	52	Jl. Sayangan Kulon IX No. 9 Laweyan, Surakarta R: (0271) 712276 E: febela2006@yahoo.co.id	Batik entrepreneur & academic staff at Universitas Muhammadiyah Surakarta	Head of FPKBL
15.	EXP-INT_LWY03 23 Dec 2011 3h : 10m : 46s	Widhiarso	Male	40	Jl. Sidoluhur No. 26 Laweyan, Surakarta R: (0271) 715364 E: lorpasar@gmail.com	Batik entrepreneur	Research and development manager of FPKBL
16.	EXP-INT_LWY04 6 Jan 2012 2h : 32m : 32s	Achmad Sulaiman	Male	63	Jl. Sidoluhur No. 75 Laweyan, Surakarta R: (0271) 712288 M: 081329423535 E: batikpuspakencana@yahoo.com	Batik entrepreneur	Senior citizen and prominent adviser of FPKBL
17.	EXP-INT_LWY05 11 Jan 2012 1h : 41m : 17s	Gunawan M. Nizar	Male	44	Jl. Sidoluhur No. 9 Laweyan, Surakarta R: (0271) 7652777 E: putra_laweyan@ymail.com	Batik entrepreneur	Treasurer of FPKBL

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
KEY PLAYERS OF BATIK CLUSTER ORGANISATION IN KAMPUNG KAUMAN (PKWBK)							
18.	EXP-INT_KAU01 13-14 Mar 2012 4h : 29m : 15s	Musyawaroh	Female	53	Jl. Kahuripan No. 33A Sumber, Surakarta R: (0271) 7073202	Academic staff at Universitas Negeri Sebelas Maret	Coordinator of facilitation team for kampung revitalisation program in Kampung Kauman
19.	EXP-INT_KAU02 3 Apr 2012 2h : 37m : 18s	Mohammad Soim	Male	35	Jl. Cakra No. 10 Kauman, Surakarta M: 081329306780	Batik entrepreneur	Treasurer of PKWBK
20.	EXP-INT_KAU03 4 Apr 2012 1h : 20m : 57s	Helmy Nur Amien	Male	33	Jl. Cakra No. 33 Kauman, Surakarta R: (0271) 652248	Batik entrepreneur	Public relations officer of PKWBK
21.	EXP-INT_KAU04 4 Apr 2012 1h : 42m : 41s	Abdul Mukhid Agus Riyanto	Male	47	Jl. Wijaya Kusuma V No. 7 Kauman, Surakarta R: (0271) 655235	Teacher of local junior high school (SMP Negeri 25 Surakarta)	Secretary of PKWBK
22.	EXP-INT_KAU05 9 Apr 2012 3h : 44m : 6s	Gunawan Setiawan (with support of Taufiq Sulaiman, Supriyadi, and Helmy Nur Amien)	Male	41	Jl. Cakra No. 21 Kauman, Surakarta R: (0271) 632214, 667659 E: batikgs@yahoo.com	Batik entrepreneur	Head of PKWBK
23.	EXP-INT_KAU06 9 Apr 2012 1h : 26m : 5s	Mustangidi	Female	82	Jl. Cakra II No. 10 Kauman, Surakarta R: (0271) 644246	Batik entrepreneur	Senior citizen

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
24.	EXP-INT_KAU07 10 Apr 2012 1h : 25m : 9s	Afrosim	Male	59	Jl. Cakra No. 11 Kauman, Surakarta R: (0271) 664021 M: 0816679493	Batik entrepreneur	Senior citizen
25.	EXP-INT_KAU08 10 Apr 2012 48m : 21s	Mohammad Nafi' Taslim	Male	73	Jl. Yos Sudarso No. 176 Kauman, Surakarta R: (0271) 643166	Batik entrepreneur	Senior citizen and Head of Great Mosque Surakarta
26.	EXP-INT_KAU09 10 Apr 2012 1h : 38m : 52s	Supriyadi	Male	43	Jl. Wijaya Kusuma III No. 8 Kauman, Surakarta R: (0271) 642258 E: dianbatikwarnaalam1969@yahoo.co.id	Batik entrepreneur	Research and development officer of PKWBK

Annex B. List of Interviewees in Lasem Batik Cluster

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
GOVERNMENT LEADERS IN REMBANG REGENCY							
1.	EXP-INT_RBG01 20 Apr 2012 1h : 12m : 39s	Ismanto	Male	55	Jl. Sunan Bonang No. 45 Lasem, Rembang R: (0295) 531005 M: 081325703963	Public servant	Head of Lasem Subdistrict
2.	EXP-INT_RBG02 26 Apr 2012 5h : 43m : 9s	Murni Nur Rif'ah	Female	49	Jl. Pesantren No. 3A Rembang R: (0295) 691570 M: 081390576276 E: nindysln@yahoo.co.id	Public servant	Division Head of Tourism at Local Office for Culture, Tourism, Youth, and Sport
3.	EXP-INT_RBG03 25 Apr 2012 2h : 1m : 6s	Deddy Nurcahyanto	Male	37	Jl. Dr. Soetomo No. 55 Rembang R: (0295) 692269 M: 081215003249 E: dnurcahyanto@gmail.com	Public servant	Subdivision Head of Industry, Trade, and Cooperative at Local Development Planning Authority
4.	EXP-INT_RBG04 7 May 2012 2h : 17m : 58s	Drupodo	Male	45	Desa Sumberejo RT. 1/RW. 7 Rembang R: (0295) 6913650 M: 081325592444	Public servant	Secretary of Local Development Planning Authority
5.	EXP-INT_RBG05 7 May 2012 1h : 32m : 40s	Sulistiyo	Male	45	Jl. Puri Raya No. 29 Rembang M: 08156515845	Public servant	Section Head of Industrial Business at Local Office for Industry, Trade, and Cooperative

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
6.	EXP-INT_RBG06 25 and 27 Apr 2012 1h : 57m : 57s	Syaiko Rosyidi	Male	36	Jl. Jenderal Sudirman No. 2 Rembang M: 085291599112	Academic staff at STIE YPPI	Head of Head of Forum of Economic Development and Employment Promotion (FEDEP) Rembang
EXTERNAL AGENTS IN REMBANG REGENCY							
7.	EXP-INT_RBG07 29 Feb 2012 3h : 10m : 57s	William Kwan Hwie Liong	Male	50+	c/o Prasadha Jinarakkhita Building Jl. Kembangan Raya Blok JJ Jakarta M: 08159276508, 082123920550 E: williamkwanhl@yahoo.com	NGO activist	Facilitator and sponsor for batik business group establishment in Jeruk Village (KUB Srikandi) of Pancur Subdistrict
8.	EXP-INT_RBG08 27 Apr 2012 2h : 22m : 18s	Edi Winarno	Male	52	Dukuh Pereng Desa Jeruk RT. 7/ RW. 3 Pancur, Rembang M: 081326503888 E: edwin_rbg@yahoo.com	Public servant	Head of Indonesian Historian Society and Head of Local Office for Public Library and Archives
KEY PLAYERS OF BATIK CLUSTER ORGANISATION IN LASEM AREA (FRK-BTL)							
9.	EXP-INT_LSM01 19 Apr 2012 2h : 15m : 48s	Gustav Nicholas Purnomo	Male	29	Jl. Gedungmulyo IV No. 1 Lasem, Rembang R: (0295) 531056 M: 0816531494 E: purnomobatikarts@yahoo.com	Batik entrepreneur	Owner and successor of old Chinese batik firm
10.	EXP-INT_LSM02 19 Apr 2012 47m : 5s	Mujiono	Male	40	Desa Karasgede RT. 1/RW. 2 Lasem, Rembang M: 081575486872, 085866369077	Batik entrepreneur	Owner of new Javanese native batik firm
11.	EXP-INT_LSM03 20 Apr 2012 1h : 20m : 7s	Sigit Witjaksana	Male	83	Jl. Babagan IV No. 4 Lasem, Rembang	Batik entrepreneur	Senior citizen and owner of old Chinese batik firm

No.	Code, Date, and Length of Interview	Name	Sex	Age	Address	Occupation	Role Position
12.	EXP-INT_LSM04 20 Apr 2012 1h : 54m	Santoso Hartono	Male	44	Jl. Jatirogo No. 34 Lasem, Rembang	Batik entrepreneur	Head of local batik cooperative (KBTL) and owner of Chinese batik firm
13.	EXP-INT_LSM05 24 Apr 2012 2h : 29m : 43s	Henry Setiawan	Male	25	Jl. Babagan IV No. 7 Lasem, Rembang R: (0295) 531186 M: 085733439222 E: zenk1_88@yahoo.com	Batik entrepreneur	Successor of old Chinese batik firm
14.	EXP-INT_LSM06 8 May 2012 5h : 33m : 2s	Ahmad Rifa'i	Male	60	Jl. Lontong Tuyuhan, Desa Sumbergirang RT. 2/RW. 8 Lasem, Rembang M: 081325469860, 081390310120 E: fika_batik@yahoo.com	Batik entrepreneur	Head of FRK-BTL and owner of new Javanese native batik firm
15.	EXP-INT_LSM07 9 May 2012 20m : 20s	Ramini	Female	40	Desa Jeruk RT. 3/RW. 1 Pancur, Rembang M: 081225334490	Batik entrepreneur	Head of new joint batik business group (KUB Srikandi)

Annex C. List of Respondents in Surakarta Batik Cluster

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
BATIK PLAYERS IN KAMPUNG LAWEYAN								
1.	M. Riza	Male	31	Batik entrepreneur	Arini Batik 17 Aug 2010 M. Riza	Batik production	Jl. Sidoluhur No. 61A Laweyan, Surakarta B/R: (0271) 726279	Owner
2.	Usan Nursawa	Female	43	Batik entrepreneur	Batik Giyant Santoso 1990 Usan Nursawa	Traditional batik production, silk, and cotton	Jl. Semeru RT. 3/RW. III Banaran, Grogol, Sukoharjo B/R: (0271) 720295 M: 081329059809	Owner
3.	Fauzi Aditya	Male	33	Batik entrepreneur	Batik Purwondharjo 6 Jul 1969 Fauzi Aditya	Batik production	Jl. Perintis Kemerdekaan No. 11 Surakarta B: (0271) 720105 R: (0271) 711151	Owner
4.	Ardhada Khusuma Wardana	Male	32	Psychologist	Batik Naluri Laweyan 18 Feb 1983 Ardhada Khusuma Wardana	Batik production and trading	Jl. Sidoluhur No. 15 Laweyan, Surakarta B: (0271) 719416 R: (0271) 3307227 M: 08990514209	Owner
5.	Rowan Tironi	Male	29	Batik entrepreneur	Sekar Arum N/A Rowan Tironi	Batik production	Jl. Sekar Jagad No. 63 Pajang, Surakarta B: (0271) 725630 R: (0271) 722794 M: 085728474000	Owner

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
6.	Toto Indra Setiawan	Male	22	Batik entrepreneur	Batik Putra Bengawan 10 Jun 2009 Toto Indra Setiawan	Batik garment and showroom	Jl. Sidoluhur No. 33 Laweyan, Surakarta B: (0271) 735895 R: (0271) 715288 M: 082134727879	Owner
7.	Bambang Slameto	Male	56	Batik entrepreneur	Batik Merak Manis 1980 Bambang Slameto	Batik production and showroom	Jl. Sidoluhur No. 20 Laweyan, Surakarta B: (0271) 719641 R: (0271) 712417	Owner
8.	Gaya Riyanto	Male	40	Tailor	Marigo Batik 1997 Gaya Riyanto	Garment	Jl. Kidul Pasar RT. 4 Laweyan, Surakarta B: (0271) 732114 M: 081973145567	Owner
9.	Farina Yunia	Female	47	Tailor	Rin Modeste 1997 Farina Yunia	Garment	Jl. Nitik No. 1 Laweyan, Surakarta B: (0271) 715114 M: 085732257471	Owner
10.	Slamet Setya Budi	Male	41	Batik entrepreneur	Batik Setya Budi 2001 Slamet Setya Budi	Batik production	Setono RT. 2 Laweyan, Surakarta B/R: (0271) 732144	Owner
11.	Andi	Male	35	Batik entrepreneur	Batik Satrio Luhur 2009 Andi	Batik garment and showroom	Jl. Sidoluhur No. 36 Laweyan, Surakarta B/R: (0271) 712213	Owner
12.	Taufik Tri L.	Male	49	Batik entrepreneur	Batik Cattleya 1999 Taufik Tri L.	Batik production and showroom	Jl. Sidoluhur No. 14 RT. 1/RW. I Laweyan, Surakarta B: (0271) 730889 M: 0852229952121	Owner
13.	Achmad Arif Yulianto	Male	35	Batik entrepreneur	Batik Puspa Kencana 1976 Achmad Sulaiman	Batik production and showroom	Jl. Sidoluhur No. 75 Laweyan, Surakarta B: (0271) 712288 M: 081329423535	Owner (successor)

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
14.	Sarjono	Male	57	Batik entrepreneur	Batik Gress Tenan 1972 Sarjono	Batik production and showroom	Jl. Setono RT. 2/RW. 2 Laweyan, Surakarta B/R: (0271) 741059 M: 081325250099	Owner
15.	Iwan	Male	23	Batik entrepreneur	Batik Sido Luhur 2006 Iwan	Batik garment and showroom	Jl. Sidoluhur No. 36 Laweyan, Surakarta B/R: (0271) 712213 M: 085647481979	Owner
16.	Saud Effendy	Male	58	Batik entrepreneur	Batik Saud Effendy N/A Saud Effendy	Batik art and painting	Jagalan No. 6 RT. 2/RW. V Laweyan, Surakarta B/R: (0271) 720090 M: 0816671965	Owner
17.	Arya	Male	33	Private company staff	Batik Serikat Dagang Indonesia Dec 2011 Gunawan	Batik trading	Jl. Dr. Radjiman No. 556 Surakarta B: (0271) 720985 M: 087835324689	Store manager
18.	Natsir	Female	56	Batik entrepreneur	Griya Batik Pendapi 2007 N/A	Batik showroom	Jl. Sidoluhur No. 44 Laweyan, Surakarta B: (0271) 718504	N/A
19.	Wahyuning Asri	Female	N/A	Batik entrepreneur	Batik Tiganegri Dec 2010 Wahyuning Asri	Batik trading	Jl. Tiganegri No. 11A Laweyan, Surakarta B/R: (0271) 728207	N/A
20.	Ade Romi	Male	31	Batik entrepreneur	Batik Joyo Hadi 8 Aug 1988 Ade Romi	Batik trading	Jl. Tiganegri No. 8 Laweyan, Surakarta B: (0271) 714402 M: 08192212234	Owner
21.	Anonymous	N/A	N/A	N/A	Toko Murni N/A Mulyono	Dye supply	Jl. Dr. Radjiman No. 519 Surakarta B: (0271) 717101	N/A

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
BATIK PLAYERS IN KAMPUNG KAUMAN								
22.	Surahman	Male	54	Private company staff	Sahan Batik 2011 Adip and Afif	Batik production and trading	Kampung Kauman, Surakarta B: (0271) 633801 R: (0271) 633801 M: 085728277411	Supervisor
23.	Helmy Noer Amien	Male	33	Batik entrepreneur	Batik Prada Noer 2009 Helmy Noer Amien	Batik production and trading	Jl. Cakra No. 33 Kauman, Surakarta B: (0271) 652248 M: 08562839118	Owner
24.	Malia Esty	Budi Female	22	Batik entrepreneur	Batik Dakon Mas N/A Umi Nasichah	Batik production and showroom	Jl. Cakra No. 11 Kauman, Surakarta B/R: (0271) 664021 M: 082138713667	Owner (successor)
25.	Isnaini	Female	27	Batik entrepreneur	Batik Domas 2008 Arganinggar	Batik production and showroom	Jl. Cakra No. 6B Kauman, Surakarta B: 081393465555 M: 081329555500	Owner (successor)
26.	Umi Afifah	Female	39	Batik entrepreneur	Batik Sekar Galuh N/A Umi Afifah	Batik showroom	Jl. Cakra No. 6 Kauman, Surakarta B: (0271) 665957 R: (0271) 630629	Owner
27.	Sidiq Pramono	Male	40	Batik entrepreneur	Batik Danni 30 Dec 2008 Sidiq Pramono	Batik production and showroom	Jl. Cakra No. 17 Kauman, Surakarta B/R: (0271) 2072363 M: 08172847912	Owner
28.	Isti Handayani	Widi Female	40	Batik entrepreneur	Sekar Adisti Aug 2008 Isti Widi Handayani	Batik and craft production	Jl. Wijaya Kusuma III No. 17 Kauman, Surakarta B/R: (0271) 638083 M: 081567870500	Owner

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
29.	Indriastuti	Female	51	Batik entrepreneur	Toko Batik 11 Jan 2008 Indriastuti	Batik trading	Jl. Masjid Agung No. 19 Kauman, Surakarta B/R: (0271) 635358	Owner
30.	Purwadi	Male	38	Batik entrepreneur	Batik Adilla 2010 Purwadi	Batik wholesale trading	Jl. Wijaya Kusuma V No. 7 Kauman, Surakarta B: (0271) 642886 M: 081329998032	Owner
31.	Nety and Dian	Female	30	Batik entrepreneur	Gatotkaca Souvenir and Craft 1 Mar 2009 Nety and Dian	Souvenir and craft	Jl. Trisula No. 32 Kauman, Surakarta B: (0271) 7559345 M: 081548545246	Owner
32.	Firmansyah	Male	37	Batik entrepreneur	Batik Nora 24 Jul 2008 Firmansyah	Batik trading	Jl. Wijaya Kusuma No. 5 Kauman, Surakarta B/R: (0271) 635883 M: 08132664223783	Owner
33.	Anonymous	Female	N/A	Private company staff	Batik Farell N/A Yohana Setyawan	Batik trading	Jl. Wijaya Kusuma III No. 10 Kauman, Surakarta R: (0271) 642253	Trader
34.	Gunawan Arifin	Male	33	Entrepreneur	Kaos Katulistiwa 8 Jul 2007 Gunawan Arifin	Artistic t-shirt production	Jl. Wijaya Kusuma No. 17C Kauman, Surakarta M: 087835338958	Owner
35.	Kosidah	Female	50	Batik entrepreneur	Toko Batik Bagas Jul 2008 Kosidah	Batik trading	Kauman RT. 4/RW. IX Surakarta M: 081804561344	Owner

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
36.	Zainal Arifin	Male	58	Batik entrepreneur	Batik Kiara 2 Sep 2009 Norbita Ati	Batik trading	Jl. Wijaya Kusuma III No. 12 Kauman, Surakarta B/R: (0271) 642011	N/A
37.	Heppy Violita Irawan	Female	21	Private company staff	Batik Bathok 2007 Didik	Batik showroom	Jl. Trisula No. 32 Kauman, Surakarta M: 081548780290	Administration staff
38.	Asmahan	Female	42	Batik entrepreneur	Ceria Batik 1990 Asmahan	Batik trading	Jl. Cakra II No. 2 Kauman, Surakarta M: 081229786988	Owner
39.	Siti Fatkhiyah	Female	42	Batik entrepreneur	Batik Wildan 19 Jan 2009 Siti Fatkhiyah	Batik trading	Jl. Wijaya Kusuma No. 28 Kauman, Surakarta M: 081804459383	Owner

Annex D. List of Respondents in Lasem Batik Cluster

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
BATIK PLAYERS IN LASEM SUBDISTRICT								
1.	Gustav Nicholas Purnomo	Male	28	Batik entrepreneur	Batik Purnomo 1979 Gustav and Alvin Nicholas Purnomo	Handwritten batik production	Jl. Gedong Mulyo IV No. 1 Lasem, Rembang R/B: (0295) 531056	Owner (successor)
2.	Agus Susanto	Male	36	Batik entrepreneur	Batik Talenta 2006 Christina Lindawaty	Handwritten batik production	Jl. Babagan No. 33 RT. 4/RW. 2 Lasem, Rembang M: 081805833687, 085327057575	Owner
3.	Joko	Male	40	Hamlet head	Sekar Mulyo 2010 Joko	Handwritten batik production	Desa Babagan RT. 6/RW. 2 Lasem, Rembang M: 081351783299	Owner
4.	Mohammad Gholib	Male	40	Batik entrepreneur	Godong Mas May 2010 Mohammad Gholib	Handwritten batik production	Jl. Sunan Bonang next to Perhutani Office Lasem, Rembang B/R: (0295) 531785 M: 081326128246	Owner
5.	Winarno	Male	39	Batik entrepreneur	Hasta Dana Art 18 Aug 2009 Winarno	Handwritten batik production	Desa Serdang Asri RT. 1/RW.1 Lasem, Rembang M: 081326350666	Owner

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
6.	Mohammad Ma'rif	Male	31	Batik entrepreneur	Handanah Batik 1975 Mohammad Ma'rif	Handwritten batik production	Jl. Sunan Bonang No. 152 Lasem, Rembang B/R: (0295) 531446 M: 081328123467	Owner
7.	Ramidi	Male	39	Batik entrepreneur	Melati Muda 2008 Ramidi	Handwritten batik production	Jl. Kajar No. 50 Lasem, Rembang M: 081390222445	Owner
8.	Anissah	Female	43	Batik entrepreneur	UD. Tiga Berlian 1995 Anissah	Handwritten batik production	Desa Selopuro RT. 3/RW. 1 Lasem, Rembang M: 085225892029	Owner
9.	Mujiono	Male	40	Batik entrepreneur	Batik Samudra Art May 2006 Mujiono	Handwritten batik production	Desa Karasgede RT. 1/RW. 2 Lasem, Rembang M: 081575486872	Owner
10.	Mujarso	Male	48	Public servant (village head)	Bima Art 2010 Mujarso	Handwritten batik production	Desa Babagan RT. 9/RW. 3 No. 2 Lasem, Rembang M: 0812250041009	Owner
11.	Usman	Male	59	Teacher	Lasem Art 1989 Usman	Handwritten batik production	Desa Dorokandang RT. 12/RW. 1 Lasem, Rembang B/R: (0295) 531612 M: 085291535135	Owner
12.	Gunawan	Male	65	Batik entrepreneur	Gunawan Emas 2005 Gunawan	Handwritten batik production	Desa Babagan Gang V No. 1 Lasem, Rembang B/R: (0295) 531086 M: 087717220567	Owner
13.	Siti Syahro	Female	33	Teacher	Dampo Awang Batik Art 2006 Ma'sum Ahadi	Handwritten batik production	Desa Sumber Girang RT. 1/RW. 2 Lasem, Rembang M: 08155007040	Owner's wife

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
14.	Priscilla Reny	Female	28	Batik entrepreneur	Batik Maranatha Ong's Art N/A Priscilla Reny	Handwritten batik production	Jl. Karangturi I No. 1 Lasem, Rembang B/R: (0295) 531224 M: 081326711127	Owner (successor-5 th generation)
15.	Santoso Hartono	Male	44	Batik entrepreneur	UD. Pusaka Beruang 13 Mar 2005 Santoso Hartono	Handwritten batik production	Jl. Jatilogo No. 34 Lasem, Rembang B/R: (0295) 531359 M: 08572685851	Owner
BATIK PLAYERS IN PANCUR SUBDISTRICT								
16.	Sumiyati	Female	39	Batik entrepreneur	Sekar Gading Oct 2009 Sumiyati	Handwritten batik production	Desa Gembleng Mulyo RT. 2/RW. 1 Pancur, Rembang M: 08132597771	Owner
17.	Sumirih	Female	42	Housewife	Kresna Aji 2007 Mujiyanto	Handwritten batik production	Desa Pohlandak Pancur, Rembang M: 085226320300	Owner's wife
18.	Sumasri	Male	58	Batik entrepreneur	Asri Batik Art 2009 Sumasri	Handwritten batik production	Desa Pohlandak RT. 4/RW. 2 Pancur, Rembang M: 085325591163	Owner
19.	Jarwan	Male	39	Batik entrepreneur	Nayla Art 23 Feb 2010 Jarwan	Handwritten batik production	Desa Pohlandak RT. 1/RW. 1 Pancur, Rembang M: 081390776311	Owner
20.	Ahmad Rifa'i	Male	43	Batik entrepreneur	Ningrat Batik Nov 2007 Ahmad Rifa'i	Handwritten batik production	Jl. Lontong Tuyuhan Desa Sumbergirang RT. 2/RW. 8 Lasem, Rembang M: 081325469860, 081390310120	Owner
21.	Suyanti Anitasari	Female	33	Batik entrepreneur	Kalimasada Art 2008 Suyanti Anitasari	Handwritten batik production	Langkir RT. 2/RW. 1 Pancur, Rembang M: 081325204349	Owner

No.	Name	Sex	Age	Occupation	Company Name, Date of Establishment, and Owner	Type of Industry	Address	Role Position
22.	Rukeni	Female	45	Batik entrepreneur	Mutiara 2009 Rukeni	Handwritten batik production	Desa Gembleng Mulyo RT. 3/RW. 1 Pancur, Rembang M: 081391591545	Owner
23.	Shofiyah	Female	42	Batik entrepreneur	Cantik Jaya 2008 Shofiyah	Handwritten batik production	Desa Gembleng Mulyo M: 081228107789	Owner
24.	Siti Wiwin Rustiani	Female	35	Batik entrepreneur	Pesona Canting 1985 Sugiyem	Handwritten batik production	Desa Karas Kepoh RT. 6/RW. 1 Pancur, Rembang M: 085225007513	Owner's daughter
25.	Siti Murniyati	Sri Female	40	Public servant (village head)	Risty Art 10 Aug 2010 Siti Sri Murniyati	Handwritten batik production	Desa Karas Kepoh RT. 3/ RW. 1 Pancur, Rembang M: 085302950337	Owner
26.	Ramini	Female	40	Batik entrepreneur	KUB Srikandi 2006 William Kwan	Handwritten batik production	Desa Jeruk RT. 3/RW. 1 Pancur, Rembang M: 081225334490	Manager

Annex E1. Interview Guideline for Government Agency

GENERAL INSTRUCTION

1. Each interview takes about 90 minutes.
2. Make sure that each interviewee has sufficient time to respond interview questions appropriately.
3. If the interview session fails to complete in one-off contact, please ask the interviewee gently to have additional interview session(s) no later than a month after the first contact done.
4. Record the interviewee identity covering name, age, sex, occupation, home and office addresses, and contact numbers. Please take a photograph of respective interview wherever possible for identification purpose.
5. Take a field note portraying the detailed situation of and the dynamics occurred during interview session. Please take a photograph to capture the place around which the interview takes place, if possible.
6. Introduce the interviewer identity covering name, position in the research, address and contact numbers prior to question-and-answer section.
7. Describe the interviewee briefly about the research background, purpose, and expected outcomes.
8. Place the voice recorder on the most comfortable flat surface near to the interviewee to reach the best voice quality. Please ask the respective interviewee permission gently before recording begins.
9. Proceed the interview calmly and flexibly, and record any interesting moments while the interview in progress in order to get as many as information from the interviewee.
10. Validate the interviewee answers in the middle of and the end of interview session.
11. Conclude the interview session with a kind thankful greeting and ask the interviewee availability for further information collection.

INTRODUCTION

Good morning/afternoon/evening Sir or Madam,

First of all, let me introduce myself before the interview begins. My name is Prihadi Nugroho, a lecturer at the Department of Urban and Regional Planning Diponegoro University (Semarang), and currently is undertaking PhD research project in Technische Universität Dortmund (Germany). The project emanates from the understanding of recent phenomena of varying batik cluster growth across the regions. With respect to better access to information technology and infrastructure, such variations are presumably correlated to endogenous factors inside the region to stimulate its performance. Thus, the project

constitutes the influences of local institutions to batik cluster performance by comparing the cases in Kampung Laweyan and Kampung Kauman (Surakarta Municipality) and Lasem Area (Rembang Regency). It aims to examine how the conditions of local institutions are influential to local batik cluster(s). The local institutions observed encompass the prevailing rules of the game and organisations participating inside the cluster. The potential target groups may include batik firms, government agencies, community-based organisations, external agencies (e.g. universities, non-governmental organisations, donors), and market institution (e.g. suppliers, traders, brokers, customers, buyers).

Last but not least, I am expecting your participation in this interview session. Many thanks in advance for your time and kind responses.

Sincerely yours,

Prihadi Nugroho

INTERVIEWEE IDENTITY

Name :
Age :
Sex :
Occupation :
Position :
Function and Task :
Scope of Authority :
Length at Work :
Office Address :
Telephone No. : Fax. No. : Email :
Home Address :
Telephone No. : Fax. No. : Email :

INTERVIEW QUESTIONS

A. General Policy Direction of Industrial Cluster Development

- 1) What do you know about national/regional/local industrial cluster development policies? When did clustering approach take place to promote national/regional/local developments? Please mention the prioritised sectors that the government agencies have been favouring at most to succeed that approach!
- 2) How is the implementation of those clustering policies? Please describe, if possible, the periodization of clustering policies implementation!
- 3) What are the rationale, purpose, and focus of clustering policies? Please describe what strategies and programs conducted to realise those policies!

- 4) What are the regulations available to found those clustering policies? What are the policies and programs related to their implementation?
- 5) How supportive is the existing government institution to promote those clustering policies? Please describe the roles, tasks and functions, and relationships between participating government agencies!
- 6) Do you think that those clustering policies implementation are successful to enhance national/regional/local developments or not? What factors do you suggest influential to those clustering policies implementation?
- 7) What are the opportunities, challenges, and obstacles encountered to develop those clustering policies?
- 8) What kinds of innovative programs created to further clustering policies? Please explain, if possible, whether those programs are successful or not to strengthen the existing clustering policies!

B. Batik Cluster Development Initiative

- 1) What do you know about batik cluster policy? How does its sustainability take into account so far?
- 2) How far does the policy contribute to national/regional/local developments? If possible, please provide relevant statistical records and information!
- 3) What are the forms of government facilitation that takes place in order to support respective batik cluster development either in physical or non-physical supports?
- 4) Who are the actors involved in batik cluster policy making? Please describe the roles, tasks and functions, and relationships between those participating actors!
- 5) What are the regulations, policies, programs, and norms relevant to batik cluster development policy? How far do those various rules of the game contribute to the effectuation of batik cluster policy?
- 6) What are the mechanisms applied for ensuring the implementation of those rules of the game? Are there some particular rewards and punishments applicable to their implementation? Please explain how successful do those mechanisms take into effect!
- 7) How is the public acceptance towards batik cluster development policy? Please explain whether there are some public supports vis-à-vis rejections dealing with its policy process!
- 8) What are the forms of participation of batik players and related actors to succeed batik cluster development policy?
- 9) What are the contributions of batik cluster policy to create the betterment of overall business climate? Please explain competition and cooperation patterns prevailing within batik industry, including their advantages and drawbacks!
- 10) What are the opportunities, challenges, and obstacles encountered to develop batik cluster policy?
- 11) What kinds of innovative programs created to further batik cluster policy? Please explain, if possible, whether those programs are successful or not to strengthen the existing policy!
- 12) What are the common perceptions shared in the public regarding batik industry preservation efforts?
- 13) Are there any obstacles and rejections from the public against those efforts? If any, how the governments cope with these situations?

- 14) Are there any formal and informal meeting forums hosted to further batik industry development? Please explain how these forums take place to effectuate batik industry development!
- 15) Do you think that the existing institutional pattern sufficient to accommodate batik industry development needs properly? Please give your comments and suggestions regarding its further improvement!

Annex E2. Panduan Wawancara Instansi Pemerintah (Bahasa)

PETUNJUK UMUM

1. Wawancara dilakukan sekitar 90 menit untuk tiap narasumber.
2. Pastikan bahwa narasumber memiliki waktu yang cukup untuk diwawancarai hingga selesai.
3. Jika wawancara tidak dapat diselesaikan tepat waktu atau jika diperlukan waktu tambahan untuk sesi wawancara berikutnya, mintalah kesediaan narasumber untuk melanjutkan wawancara di lain waktu tak lebih dari satu bulan sejak wawancara pertama dilakukan.
4. Catatlah identitas narasumber meliputi nama, umur, jenis kelamin, pekerjaan, alamat rumah dan kantor, serta nomer kontak yang bisa dihubungi (lengkapilah dengan foto profil narasumber).
5. Catatlah detail pelaksanaan wawancara meliputi hari, tanggal, lokasi, durasi, dan suasana sekitar tempat wawancara (lengkapilah dengan foto sekitar lokasi wawancara).
6. Perkenalkan identitas pewawancara meliputi nama, posisi dalam penelitian, serta alamat dan nomer kontak yang bisa dihubungi.
7. Jelaskan dengan singkat latar belakang, tujuan, dan hasil yang diharapkan dari penelitian.
8. Persiapkan alat perekam dan mintalah izin kepada narasumber untuk merekam dan mencatat wawancara.
9. Mulailah wawancara dan catat kejadian-kejadian penting selama wawancara berlangsung.
10. Periksa dan konfirmasi kembali jawaban-jawaban narasumber sebelum mengakhiri sesi wawancara pada hari itu.
11. Akhirilah wawancara dengan ucapan terima kasih dan mintalah kesediaan narasumber untuk dihubungi kembali untuk pemutakhiran data dan informasi.

PERKENALAN

Selamat pagi/siang/sore/malam.

Perkenalkan nama saya Prihadi Nugroho, dosen pada Jurusan Perencanaan Wilayah dan Kota Universitas Diponegoro, Semarang. Saat ini saya sedang studi S3 pada bidang Perencanaan Ruang di Technische Universität Dortmund, Jerman. Penelitian yang sedang saya lakukan ini berkaitan dengan penulisan disertasi bertemakan tentang kelembagaan

lokal dalam pertumbuhan kluster, dengan studi kasus kluster industri batik di Solo dan Rembang. Penelitian ini bertujuan untuk melihat bagaimana kondisi kelembagaan lokal yang ada mampu berpengaruh terhadap pertumbuhan kluster. Kelembagaan lokal yang dimaksud meliputi aturan main yang berlaku dan organisasi-organisasi yang terbentuk di dalam kluster, baik yang bersifat formal maupun informal. Dengan demikian cakupan kelompok sasaran penelitian meliputi unsur-unsur pelaku usaha (pemasok, pengrajin, pedagang, dan penyedia jasa), asosiasi, lembaga penelitian dan pengembangan, KADIN, organisasi masyarakat, pemerintah, dan lembaga-lembaga lain terkait. Latar belakang penelitian ini berawal dari fenomena pertumbuhan kluster batik yang bervariasi antara satu daerah dan daerah lainnya. Padahal seiring dengan perluasan akses terhadap teknologi informasi dan infrastruktur yang cukup memadai dewasa ini, semestinya peluang untuk tumbuh tidak terlalu berbeda. Karenanya, pengaruh kekuatan dari dalam daerah dan kluster itulah (*endogenous factor*) yang berperan penting bagi pertumbuhan kluster tersebut. Berangkat dari hipotesis ini maka penelitian berfokus pada kelembagaan lokal sebagai sumber kekuatan kolektif bagi pertumbuhan kluster batik.

Demikian penjelasan ringkas tentang penelitian ini. Saya berharap Bapak/Ibu berkenan memberikan data dan informasi yang relevan. Sebelumnya saya ucapkan terima kasih atas waktu yang disediakan dan kerjasamanya.

Salam hangat,

Prihadi Nugroho

IDENTITAS RESPONDEN

Nama	:			
Umur	:			
Jenis Kelamin	:			
Pekerjaan	:			
Jabatan	:			
Fungsi dan Tugas	:			
Kewenangan	:			
Lama Kerja	:			
Alamat Kantor	:			
No. Telepon	:	No. Fax.	:	Email :
Alamat Rumah	:			
No. Telepon	:	No. Fax	:	Email :

DAFTAR PERTANYAAN

A. Arah Kebijakan Pengembangan Kluster Industri

- 1) Apa yang Anda ketahui tentang kebijakan kluster industri nasional? Mohon dijelaskan sejak kapan strategi kluster diterapkan untuk memajukan pembangunan nasional dan daerah! Sebutkan pula sektor-sektor ekonomi apa saja yang diprioritaskan dalam pengembangan kluster tersebut!
- 2) Bagaimana implementasi kebijakan kluster tersebut? Mohon dijelaskan (periodisasi) pasang surut perkembangannya dari dulu hingga sekarang!
- 3) Apa yang menjadi latar belakang, tujuan dan fokus dalam kebijakan kluster industri tersebut? Mohon dijelaskan pendekatan, strategi maupun program-program yang disusun untuk merealisasikan kebijakan kluster tersebut!
- 4) Apa saja peraturan yang menjadi payung hukum bagi kebijakan kluster industri tersebut? Lalu sebutkan pula kebijakan dan program pemerintah yang terkait dengan kebijakan kluster industri tersebut!
- 5) Bagaimana sistem kelembagaan yang dibuat untuk mendukung kebijakan kluster industri tersebut? Apakah hanya memberdayakan lembaga-lembaga yang sudah ada atau diperlukan pembentukan lembaga-lembaga baru? Mohon dijelaskan bagaimana kedudukan, tugas, fungsi dan sifat hubungan di antara lembaga-lembaga tersebut!
- 6) Menurut Anda, bagaimana tingkat keberhasilan dan efektivitas kebijakan kluster tersebut dalam memajukan pembangunan daerah? Apa saja faktor-faktor yang mendukung maupun menghambat implementasi kebijakan tersebut?
- 7) Menurut Anda, bagaimana peluang, tantangan dan hambatan yang dihadapi dalam pengembangan kluster industri nasional dari dulu hingga sekarang?
- 8) Apa saja inovasi dan program-program yang telah dilakukan untuk memajukan kluster industri nasional? Mohon dijelaskan sejauhmana keberhasilan usaha-usaha tersebut!

B. Inisiatif Pengembangan Kluster Batik

- 1) Apa yang Anda ketahui tentang kebijakan kluster batik? Bagaimana keberlanjutan kebijakan tersebut sejak awal diperkenalkan hingga saat ini?
- 2) Sejauhmana kebijakan kluster batik tersebut mampu meningkatkan kontribusi industri batik terhadap pembangunan nasional dan daerah? Jika ada, mohon berikan data statistik yang relevan!
- 3) Apa bentuk-bentuk fasilitasi pemerintah yang diberikan untuk mendukung pengembangan kluster batik, baik yang berupa bantuan fisik maupun nonfisik?
- 4) Siapa saja aktor-aktor yang terlibat dalam proses kebijakan kluster batik? Mohon dijelaskan bagaimana kedudukan, posisi, peran dan sifat hubungan di antara aktor-aktor tersebut!
- 5) Apa saja peraturan, kebijakan, program maupun norma yang berlaku dalam pengembangan kebijakan kluster batik? Sejauhmana seperangkat aturan main tersebut berpengaruh terhadap efektivitas kebijakan kluster batik tersebut?
- 6) Bagaimana cara dan mekanisme yang diterapkan untuk menjamin terlaksananya kebijakan, program dan aturan main tersebut secara efektif? Apakah ada semacam

pemberian penghargaan dan sanksi tertentu kepada aktor-aktor yang terlibat? Mohon dijelaskan pula bagaimana keberhasilan mekanisme dan prosedur tersebut!

- 7) Bagaimana penerimaan publik terhadap kebijakan klaster batik tersebut? Mohon dijelaskan bentuk-bentuk dukungan maupun penolakan publik selama proses kebijakan berlangsung, mulai tahap inisiasi, sosialisasi, implementasi hingga monitoring dan evaluasi!
- 8) Apa saja bentuk-bentuk partisipasi di antara pelaku industri batik dan aktor-aktor terkait dalam menyukseskan kebijakan klaster batik tersebut?
- 9) Bagaimana peran kebijakan klaster batik tersebut dalam menciptakan iklim usaha yang kondusif? Mohon dijelaskan pola-pola persaingan dan kerjasama yang terjadi di antara pelaku industri batik, berikut manfaat dan kerugiannya!
- 10) Menurut Anda, bagaimana peluang, tantangan dan hambatan yang dihadapi dalam pengembangan industri batik dari dulu hingga sekarang?
- 11) Apa saja inovasi dan program-program yang telah dilakukan untuk memajukan industri batik? Mohon dijelaskan sejauhmana keberhasilan usaha-usaha tersebut!
- 12) Menurut Anda, bagaimana persepsi dan penerimaan masyarakat pada umumnya terhadap usaha-usaha melestarikan industri batik?
- 13) Apakah ada kendala maupun hambatan dari masyarakat terhadap usaha pelestarian industri batik? Jika ada, lalu bagaimanakah solusi untuk mengatasinya?
- 14) Apakah ada semacam forum pertemuan formal dan informal untuk pengembangan industri batik? Mohon dijelaskan bagaimana tata cara dan efektivitas forum ini dalam memajukan industri batik dari dulu hingga sekarang!
- 15) Menurut Anda, apakah pola kelembagaan yang ada sudah mampu menjawab kebutuhan pengembangan industri batik secara luas? Berikanlah tanggapan dan usulan Anda bagaimana kelembagaan ini bisa ditingkatkan lagi, baik dari sisi aturan main, kebijakan dan peraturan maupun organisasi dan aktor-aktor yang terlibat!

Annex F1. Interview Guideline for Batik Cluster Organisation and External Agency

GENERAL INSTRUCTION

1. Each interview takes about 90 minutes.
2. Make sure that each interviewee has sufficient time to respond interview questions appropriately.
3. If the interview session fails to complete in one-off contact, please ask the interviewee gently to have additional interview session(s) no later than a month after the first contact done.
4. Record the interviewee identity covering name, age, sex, occupation, home and office addresses, and contact numbers. Please take a photograph of respective interview wherever possible for identification purpose.
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7. Describe the interviewee briefly about the research background, purpose, and expected outcomes.
8. Place the voice recorder on the most comfortable flat surface near to the interviewee to reach the best voice quality. Please ask the respective interviewee permission gently before recording begins.
9. Proceed the interview calmly and flexibly, and record any interesting moments while the interview in progress in order to get as many as information from the interviewee.
10. Validate the interviewee answers in the middle of and the end of interview session.
11. Conclude the interview session with a kind thankful greeting and ask the interviewee availability for further information collection.

INTRODUCTION

Good morning/afternoon/evening Sir or Madam,

First of all, let me introduce myself before the interview begins. My name is Prihadi Nugroho, a lecturer at the Department of Urban and Regional Planning Diponegoro University (Semarang), and currently is undertaking PhD research project in Technische Universität Dortmund (Germany). The project emanates from the understanding of recent phenomena of varying batik cluster growth across the regions. With respect to better access

to information technology and infrastructure, such variations are presumably correlated to endogenous factors inside the region to stimulate its growth. Thus, the project constitutes the influences of local institutions to batik cluster growth by comparing the cases in Kampung Laweyan and Kampung Kauman (Surakarta Municipality) and Lasem Area (Rembang Regency). It aims to examine how the conditions of local institutions are influential to local batik cluster(s). The local institutions observed encompass the prevailing rules of the game and organisations participating inside the cluster. The potential target groups may include batik firms, government agencies, community-based organisations, external agencies (e.g. universities, non-governmental organisations, donors), and market institution (e.g. suppliers, traders, brokers, customers, buyers).

Last but not least, I am expecting your participation in this interview session. Many thanks in advance for your time and kind responses.

Sincerely yours,

Prihadi Nugroho

INTERVIEWEE IDENTITY

Name	:		
Age	:		
Sex	:		
Occupation	:		
Position	:		
Function and Task	:		
Scope of Authority	:		
Length at Work	:		
Office Address	:		
Telephone No.	:	Fax. No. :	Email :
Home Address	:		
Telephone No.	:	Fax. No. :	Email :

INTERVIEW QUESTIONS

A. The History of Batik Industry Development

- 1) What do you know about the history of batik industry development in Surakarta/Rembang? Please describe, if possible, its chronological periodization!
- 2) How does batik industry in Surakarta/Rembang contribute to local developments?
- 3) What are the opportunities, challenges, and obstacles encountered to develop batik industry in Surakarta/Rembang?

- 4) What kinds of innovative programs created to further batik industry in Surakarta/Rembang? Please explain, if possible, whether those programs are successful or not to strengthen its development!
- 5) What are the roles of batik clusters in Kampung Laweyan/Kampung Kauman/Lasem Area in promoting batik industry development in Surakarta/Rembang? Please explain, if possible, the performance of respective batik cluster recently!
- 6) What are the opportunities, challenges, and obstacles encountered to develop batik industry in Surakarta/Rembang? What solutions have been made to respond those forces, and what impacts to overall batik industry development?

B. The Origin of Kampung Laweyan/Kampung Kauman/Lasem Area Batik Clusters

- 1) What do you know about the history of batik clusters in Kampung Laweyan/Kampung Kauman/Lasem Area? Please describe, if possible, its chronological periodization!
- 2) How does batik industry in Kampung Laweyan/Kampung Kauman/Lasem Area contribute to social welfare improvements in the society?
- 3) What are the shared facilities to advance batik industry development in Kampung Laweyan/Kampung Kauman/Lasem Area?
- 4) What are the forms of participation and cooperation between batik actors in Kampung Laweyan/Kampung Kauman/Lasem Area in advancing business climate, physical neighbourhood, and social capital?
- 5) How does the competition between batik actors take place? Please explain the forms of competition applied in the field, including their advantages and drawbacks!
- 6) What are the opportunities, challenges, and obstacles encountered to develop batik industry in Kampung Laweyan/Kampung Kauman/Lasem Area?
- 7) What kinds of innovative programs created to further batik industry in Kampung Laweyan/Kampung Kauman/Lasem Area? Please explain, if possible, whether those programs are successful or not to strengthen its development!

C. Institutions in Batik Industry Development

- 1) Who are the individuals, groups, and organisations influential to batik industry development either in Kampung Laweyan/Kampung Kauman/Lasem Area or wider Surakarta/Rembang regions? Please explain their roles and positions in the industry!
- 2) What kinds of interrelationships are maintained between those actors to promote batik industry development?
- 3) What are the policies, programs, and rules of the game applied for promoting its development?
- 4) What are the mechanisms applied for ensuring the implementation of those rules of the game? Are there some particular rewards and punishments applicable to their implementation? Please explain how successful do those mechanisms take into effect!
- 5) Are there any social norms and traditions sustained in order to promote batik industry development either in Kampung Laweyan/Kampung Kauman/Lasem Area or wider Surakarta/Rembang regions?

- 6) How effective those social norms and traditions are acceptable to directing batik industry development?
- 7) How far the prevailing business competition and marketing determine batik industry development? Please explain the participation forms of various actors to support it!
- 8) What are the common perceptions shared either in Kampung Laweyan/Kampung Kauman/Lasem Area or wider Surakarta/Rembang regions regarding batik industry preservation efforts?
- 9) Are there any obstacles and rejections from the public against those efforts? If any, how those actors cope with these situations?
- 10) Are there any formal and informal meeting forums hosted to further batik industry development in Kampung Laweyan/Kampung Kauman/Lasem Area? Please explain how these forums take place to effectuate local batik industry development!
- 11) Do you think that the existing institutional pattern sufficient to accommodate batik industry development needs properly? Please give your comments and suggestions regarding its further improvement!

Annex F2. Panduan Wawancara Organisasi Klaster Batik dan Agensi Eksternal (Bahasa)

PETUNJUK UMUM

1. Wawancara dilakukan sekitar 90 menit untuk tiap narasumber.
2. Pastikan bahwa narasumber memiliki waktu yang cukup untuk diwawancarai hingga selesai.
3. Jika wawancara tidak dapat diselesaikan tepat waktu atau jika diperlukan waktu tambahan untuk sesi wawancara berikutnya, mintalah kesediaan narasumber untuk melanjutkan wawancara di lain waktu tak lebih dari satu bulan sejak wawancara pertama dilakukan.
4. Catatlah identitas narasumber meliputi nama, umur, jenis kelamin, pekerjaan, alamat rumah dan kantor, serta nomer kontak yang bisa dihubungi (lengkapilah dengan foto profil narasumber).
5. Catatlah detail pelaksanaan wawancara meliputi hari, tanggal, lokasi, durasi, dan suasana sekitar tempat wawancara (lengkapilah dengan foto sekitar lokasi wawancara).
6. Perkenalkan identitas pewawancara meliputi nama, posisi dalam penelitian, serta alamat dan nomer kontak yang bisa dihubungi.
7. Jelaskan dengan singkat latar belakang, tujuan, dan hasil yang diharapkan dari penelitian.
8. Persiapkan alat perekam dan mintalah izin kepada narasumber untuk merekam dan mencatat wawancara.
9. Mulailah wawancara dan catat kejadian-kejadian penting selama wawancara berlangsung.
10. Periksa dan konfirmasi kembali jawaban-jawaban narasumber sebelum mengakhiri sesi wawancara pada hari itu.
11. Akhiri wawancara dengan ucapan terima kasih dan mintalah kesediaan narasumber untuk dihubungi kembali untuk pemutakhiran data dan informasi.

PERKENALAN

Selamat pagi/siang/sore/malam.

Perkenalkan nama saya Prihadi Nugroho, dosen pada Jurusan Perencanaan Wilayah dan Kota Universitas Diponegoro, Semarang. Saat ini saya sedang studi S3 pada bidang Perencanaan Ruang di Technische Universität Dortmund, Jerman. Penelitian yang sedang saya lakukan ini berkaitan dengan penulisan disertasi bertemakan tentang kelembagaan

lokal dalam pertumbuhan kluster, dengan studi kasus kluster industri batik di Solo dan Rembang. Penelitian ini bertujuan untuk melihat bagaimana kondisi kelembagaan lokal yang ada mampu berpengaruh terhadap pertumbuhan kluster. Kelembagaan lokal yang dimaksud meliputi aturan main yang berlaku dan organisasi-organisasi yang terbentuk di dalam kluster, baik yang bersifat formal maupun informal. Dengan demikian cakupan kelompok sasaran penelitian meliputi unsur-unsur pelaku usaha (pemasok, pengrajin, pedagang, dan penyedia jasa), asosiasi, lembaga penelitian dan pengembangan, KADIN, organisasi masyarakat, pemerintah, dan lembaga-lembaga lain terkait. Latar belakang penelitian ini berawal dari fenomena pertumbuhan kluster batik yang bervariasi antara satu daerah dan daerah lainnya. Padahal seiring dengan perluasan akses terhadap teknologi informasi dan infrastruktur yang cukup memadai dewasa ini, semestinya peluang untuk tumbuh tidak terlalu berbeda. Karenanya, pengaruh kekuatan dari dalam daerah dan kluster itulah (*endogenous factor*) yang berperan penting bagi pertumbuhan kluster tersebut. Berangkat dari hipotesis ini maka penelitian berfokus pada kelembagaan lokal sebagai sumber kekuatan kolektif bagi pertumbuhan kluster batik.

Demikian penjelasan ringkas tentang penelitian ini. Saya berharap Bapak/Ibu berkenan memberikan data dan informasi yang relevan. Sebelumnya saya ucapkan terima kasih atas waktu yang disediakan dan kerjasamanya.

Salam hangat,

Prihadi Nugroho

IDENTITAS RESPONDEN

Nama	:			
Umur	:			
Jenis Kelamin	:			
Pekerjaan	:			
Jabatan	:			
Fungsi dan Tugas	:			
Kewenangan	:			
Lama Kerja	:			
Alamat Kantor	:			
No. Telepon	:	No. Fax. :		Email :
Alamat Rumah	:			
No. Telepon	:	No. Fax :		Email :

DAFTAR PERTANYAAN

A. Sejarah Perkembangan Industri Batik

- 1) Apa yang Anda ketahui tentang sejarah perkembangan industri batik di Solo/Rembang? Mohon dijelaskan (periodisasi) pasang surut perkembangannya sejak awal berdiri hingga saat ini!
- 2) Bagaimana peran industri batik di Solo/Rembang terhadap pembangunan daerah selama ini?
- 3) Menurut Anda, bagaimana peluang, tantangan dan hambatan yang dihadapi dalam pengembangan industri batik Solo/Rembang dari dulu hingga sekarang?
- 4) Apa saja inovasi dan program-program yang telah dilakukan untuk memajukan industri batik Solo/Rembang? Mohon dijelaskan sejauhmana keberhasilan usaha-usaha tersebut!
- 5) Bagaimana peran Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem dalam mendorong kemajuan industri batik Solo/Rembang? Mohon dijelaskan kinerja industri batik Laweyan/Kauman/Lasem selama sekurang-kurangnya 10 tahun terakhir!
- 6) Apa saja kendala yang pernah dihadapi Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem dalam memajukan industri batik Solo/Rembang secara keseluruhan? Lalu apa saja solusi yang pernah dilakukan serta bagaimana dampaknya terhadap industri batik pada umumnya?

B. Ihwal Keberadaan Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem

- 1) Apa yang Anda ketahui tentang sejarah perkembangan Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem? Mohon dijelaskan (periodisasi) pasang surut perkembangannya sejak awal berdiri hingga saat ini!
- 2) Bagaimana peran industri batik di Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem terhadap kesejahteraan para pelaku usaha dan masyarakat Laweyan pada umumnya?
- 3) Apa saja fasilitas-fasilitas bersama yang telah dibangun untuk memajukan industri batik di Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem?
- 4) Apa saja bentuk-bentuk partisipasi dan kerjasama di antara pelaku industri batik Laweyan/Kauman/Lasem baik dalam memajukan usaha, memperbaiki kondisi lingkungan maupun meningkatkan kerukunan, kebersamaan dan gotong-royong warga secara keseluruhan?
- 5) Bagaimana kondisi persaingan di antara pelaku secara umum? Mohon dijelaskan pola-pola persaingan yang berlaku, berikut manfaat dan kerugiannya!
- 6) Menurut Anda, bagaimana peluang, tantangan dan hambatan yang dihadapi dalam pengembangan industri batik Laweyan/Kauman/Lasem dari dulu hingga sekarang?
- 7) Apa saja inovasi dan program-program yang telah dilakukan untuk memajukan industri batik Laweyan/Kauman/Lasem? Mohon dijelaskan sejauhmana keberhasilan usaha-usaha tersebut!

C. Kelembagaan dalam Pengembangan Industri Batik

- 1) Siapa saja individu, kelompok maupun organisasi yang berperan dalam pengembangan industri batik Laweyan/Kauman/Lasem maupun Kota Solo/Kabupaten Rembang pada umumnya? Mohon dijelaskan bagaimana peran dan kedudukan masing-masing aktor tersebut!
- 2) Bagaimana hubungan dan sinergi di antara aktor-aktor tersebut dalam pengembangan industri batik?
- 3) Apa saja kebijakan, program dan aturan main yang telah digunakan untuk mendorong pengembangan industri batik tersebut?
- 4) Bagaimana cara dan mekanisme yang diterapkan untuk menjamin terlaksananya kebijakan, program dan aturan main tersebut secara efektif? Apakah ada semacam pemberian penghargaan dan sanksi tertentu kepada aktor-aktor yang terlibat? Mohon dijelaskan pula bagaimana keberhasilan mekanisme dan prosedur tersebut!
- 5) Apakah ada norma sosial dan tradisi tertentu yang dipertahankan untuk mendorong pengembangan industri batik baik di Laweyan/Kauman/Lasem maupun Solo/Rembang pada umumnya?
- 6) Menurut Anda, sejauhmana penerapan norma sosial dan tradisi tersebut dapat diterima dan dijadikan acuan dalam pengembangan industri batik secara bersama-sama?
- 7) Sejauh ini bagaimana mekanisme persaingan usaha dan pemasaran industri batik Laweyan/Kauman/Lasem dan Solo/Rembang secara keseluruhan? Mohon dijelaskan bagaimana inisiatif dan partisipasi dari pemerintah, pelaku usaha, masyarakat, dll dalam mendukung industri batik tersebut!
- 8) Menurut Anda, bagaimana persepsi dan penerimaan masyarakat di Kampung Batik Laweyan/Kampung Batik Kauman/Klaster Batik Lasem dan Kota Solo/Kabupaten Rembang pada umumnya terhadap usaha-usaha melestarikan industri batik?
- 9) Apakah ada kendala maupun hambatan dari masyarakat terhadap usaha pelestarian industri batik? Jika ada, lalu bagaimanakah solusi untuk mengatasinya?
- 10) Apakah ada semacam forum pertemuan formal dan informal untuk pengembangan industri batik Laweyan/Kauman/Lasem dan Solo/Rembang? Mohon dijelaskan bagaimana tata cara dan efektivitas forum ini dalam memajukan industri batik dari dulu hingga sekarang!
- 11) Menurut Anda, apakah pola kelembagaan yang ada sudah mampu menjawab kebutuhan pengembangan industri batik secara luas? Berikanlah tanggapan dan usulan Anda bagaimana kelembagaan ini bisa ditingkatkan lagi, baik dari sisi aturan main, kebijakan dan peraturan maupun organisasi dan aktor-aktor yang terlibat!

Annex G1. Questionnaire Survey Guideline for Batik Firms

QUESTIONNAIRE FORM

Respondent Code	:	
Date	:	
Location	:	
Starting Time	:	
Ending Time	:	

RESPONDENT IDENTITY

Respondent Name	:				
Age	:		Sex	:	
Occupation	:		Position	:	
Home Address	:				
Telephone No.	:		Mobile No.	:	
Company Name	:				
Field of Industry	:				
Establishment Date	:				
Owner's Name	:				
Office Address	:				
Telephone No.	:		Facsimile No.	:	
Initial Investment	:	IDR			
Production Cost	:	IDR	<i>(please mention the average value per year)</i>		
Net Profit	:	IDR	<i>(please mention the average value per year)</i>		
Turnover Value	:	IDR	<i>(please mention the average value per year)</i>		

GENERAL INSTRUCTION

1. The filling of questionnaire takes about 60 minutes.
2. Make sure that each respondent has sufficient time to fill in the questions appropriately.
3. If the questionnaire survey fails to complete in one-off contact, please ask the respondent gently to have additional time(s) no later than a month after the first contact done.
4. Record the respondent identity covering name, age, sex, occupation, home and office addresses, and contact numbers.
5. Introduce the surveyor identity covering name, position in the research, address and contact numbers prior to question-and-answer section.
6. Describe the respondent briefly about the research background, purpose, and expected outcomes.
7. Proceed the questionnaire survey calmly and flexibly, and record any interesting moments while the survey in progress in order to get as many as information from the respondent.
8. Validate the respondent answers in the middle of and the end of survey session.
9. Conclude the questionnaire survey with a kind thankful greeting and ask the respondent availability for further information collection.

INTRODUCTION

Good morning/afternoon/evening Sir or Madam,

First of all, let me introduce myself before the questionnaire survey begins. My name is Prihadi Nugroho, a lecturer at the Department of Urban and Regional Planning Diponegoro University (Semarang), and currently is undertaking PhD research project in Technische Universität Dortmund (Germany). The project emanates from the understanding of recent phenomena of varying batik cluster growth across the regions. With respect to better access to information technology and infrastructure, such variations are presumably correlated to endogenous factors inside the region to stimulate its performance. Thus, the project constitutes the influences of local institutions to batik cluster performance by comparing the cases in Kampung Laweyan and Kampung Kauman (Surakarta Municipality) and Lasem Area (Rembang Regency). It aims to examine how the conditions of local institutions are influential to local batik cluster(s). The local institutions observed encompass the prevailing rules of the game and organisations participating inside the cluster. The potential target groups may include batik firms, government agencies, community-based organisations, external agencies (e.g. universities, non-governmental organisations, donors), and market institution (e.g. suppliers, traders, brokers, customers, buyers).

Last but not least, I am expecting your participation in this questionnaire survey. Many thanks in advance for your time and kind responses.

Sincerely yours,

Prihadi Nugroho

LIST OF QUESTIONS

A. The Needs for Raw Materials, Labour Force, Equipment, and Capital

1. What are the types of raw materials required to run the business?

Types of Raw Materials	Average Volume	Unit Price (IDR)	State of Origins
CLOTHES			
1) Cotton			
2) Rayon			
3) <i>Prima</i>			
4) <i>Primissima</i>			
5) Dobby			
6) Viscose			
7) Paris			
8) Silk			
9) Berkolin			
10) Bleached Clothes			
11) Others.....			
WAXES			
1) Beeswax			
2) <i>Gondorukem</i>			
3) <i>Damar matakucing</i>			
4) Paraffin			
5) Microwax			
6) Cow fat			
7) Used waxes			
8) Others.....			
DYEING AGENTS			
1) Synthetic dyes			
2) Natural dyes			
3) Others.....			
ACCESSORIES			
1) Button			
2) Zipper			

3) Beads			
4) Embroidery			
5) Others.....			
ENERGY			
1) Electricity			
2) Kerosene			
3) Liquid petroleum gas			
4) Firewood			
5) Others.....			

Remark: Please take out additional papers to fill in the answers if necessary

2. What are your prior considerations to purchase the raw materials? (Please tick "✓" on the appropriate cells)

Considerations	Clothes	Waxes	Dyes	Accessories	Energy
1) Low and affordable prices					
2) Price stability					
3) Assured quality of supply					
4) A variety of quality supply					
5) Assured continuity of supply					
6) Close location for purchase					
7) Easier access to the suppliers					
8) Possibility for late payment or layaways					
9) Discount prices for bulk stockpile					
10) Others.....					

Remark: Please take out additional papers to fill in the answers if necessary

3. What procurement methods that you prefer to purchase the raw materials? (Please circle the appropriate answers)
- Purchasing directly to agents/distributors/shops etc.
 - Purchasing through the middlemen
 - Purchasing collectively through local cooperative(s), community groups, etc.
 - Having some grants from particular agencies, please mention:
 - Others.....
4. What are your preferred payment methods for purchasing the raw materials? (Please circle the appropriate answers)
- Cash payment in advance
 - Late payment in cash

- c. Instalment payment, please mention the requirements:
 - d. Having some grants from particular agencies, please mention:
 - e. Others.....
5. What are the possible constraints you are encountering during the purchase of raw materials?
(Please circle the appropriate answers)
- a. Unstable supply of required goods
 - b. Insufficient supply of required goods
 - c. Unsuitable specification of supply to comply with market preferences
 - d. Unstable prices of supply goods
 - e. Late delivery time of supply goods required
 - f. Others.....
6. What sorts of solutions have been made up to overcoming the constraints? *(Please circle the appropriate answers)*
- a. Collecting from the other suppliers (please specify who and where they come from)
 - b. Borrowing from the other entrepreneurs (please specify who and where they come from)
 - c. Purchasing lower quality supply goods
 - d. Loading a stockpile of supply goods
 - e. Reducing the quantity of use of particular raw materials (please specify the raw materials types)
 - f. Modifying or recycling the used raw materials
 - g. Establishing networks to many suppliers
 - h. Others.....
7. Which stakeholders below that you have considered important in the raw materials supply chain? *(Please circle the appropriate answers)*
- a. Supplier, because:
 - b. Agent/distributor/shop, because:
 - c. Intermediate trader (middlemen), because:
 - d. Cooperative, because:
 - e. Community group, because:
 - f. Government (please specify), because:
 - g. Others (please specify), because:
8. How many workers do you need to run the business?

Types of Labour	Number	Average Wage (IDR)	State of Origins
PRE PRODUCTION			
1) Production planning			
2) Logistics			
3) Market research			

4) Others.....			
PRODUCTION			
1) Design			
2) Material preparation			
3) Copying the design (<i>nyorek</i>)			
4) Handwritten batik making			
5) Stamped batik making			
6) Indigo blue dyeing (<i>wedelan</i>)			
7) Paint brush dyeing (<i>Coletan</i>)			
8) Scrapping off the wax (<i>kerokan</i>)			
9) Dye-resist waxing (<i>mbironi</i>)			
10) <i>Soga</i> brown dyeing (<i>menyoga</i>)			
11) Wax removal (<i>nglorod</i>)			
12) Washing and drying			
13) Final processing			
14) Cloth pressing/flattening			
15) Quality control			
16) Others.....			
SUPPORTING SERVICE			
1) Garment			
2) Embroidery			
3) Packaging			
4) Transportation			
5) Distribution and marketing			
6) Sales promotion staff			
7) Publishing and advertisement			
8) Others.....			
ADMINISTRATION			
1) Secretariat			
2) Accounting and bookkeeping			
3) Cashier and payroll			
4) Human resources development			
6) Others.....			

Remark: Please take out additional papers to fill in the answers if necessary.

9. What are your prior considerations to hire the workers? *(Please tick "✓" on the appropriate cells)*

Considerations	Pre-Production	Production	Supporting Service	Administration
1) Low and affordable labour wage				
2) Having considerable skills and knowledge				
3) Having considerable creativity & innovation				
4) Having honesty, responsibility & integrity				
5) Having leadership quality				
6) Being adaptive to firm's dynamics				
7) Having a teamwork skill				
8) Being communicative to the consumers				
9) Having hardworking attitude				
10) Having a close family relationship				
11) Having a close friendship				
12) Others.....				

Remark: Please take out additional papers to fill in the answers if necessary.

10. How do you recruit the workers? *(Please circle the appropriate answers)*

- a. Direct hunting through family members, friends, neighbours, and relatives
- b. Hiring job recruitment agency (please specify)
- c. Placing job advertisement on the media
- d. Calling for support from the fellow entrepreneurs (please specify)
- e. Others.....

11. What are the possible constraints you are encountering in human resources development matters? *(Please circle the appropriate answers)*

- a. Low working ethos (e.g. punctuality, tidiness and cleanliness of the workspace, etc.)
- b. Inadequate educational background and skilful knowledge
- c. Low adaptability towards new technology and business climate change
- d. Limited skills and willingness to improve self-capabilities
- e. The lack of advanced trainings (please specify)
- f. Limited specialised labour market (please specify)
- g. The lack of batik makers regeneration and new entrepreneurship programs
- h. Slow transfer of knowledge and innovation (new information and instructions)
- i. Others.....

12. What sorts of solutions have been made up to overcoming the constraints? *(Please circle the appropriate answers)*

- a. Hosting special in-house trainings for the workers (please specify)

- b. Assigning the workers to participate in the trainings hosted by the government or other agencies (please specify)
 - c. Providing bonuses and incentives (please specify)
 - d. Hosting batik making trainings and other types of trainings required (please specify)
 - e. Facilitating new equipment and technology
 - f. Providing internal counselling and supervision to the workers
 - g. Others.....
13. How did you get batik making and entrepreneurial skills? *(Please circle the appropriate answers)*
- a. Inherited from the family (senior) members
 - b. Self-training with the other batik entrepreneurs
 - c. Doing intensive apprenticeship with certain batik entrepreneurs (please specify)
 - d. Having trainings and supervisions from the government and other agencies (please specify)
 - e. Others.....
14. How do you proceed the knowledge and innovation transfer regarding production advancement and entrepreneurship to the workers or the public society? *(Please circle the appropriate answers)*
- a. Providing special trainings and apprenticeship programs (please specify)
 - b. Practising mouth-to-mouth instructions (*gethok tular*)
 - c. Hosting special dissemination meetings (please specify)
 - d. Providing direct instructions (please specify)
 - e. Creating proper documentation and manual of procedures (please specify)
 - f. Placing advertisements to media (please specify)
 - g. Others.....
15. Which stakeholders below that you have considered important in the labour supply chain? *(Please circle the appropriate answers)*
- a. Batik entrepreneurs, because:
 - b. Batik traders, because:
 - c. Intermediate traders (middlemen), because:
 - d. Local Office for Manpower, because:
 - e. Local Office for Industry and Trade, because:
 - f. Local Office for Cooperative and Small-and-Medium Business, because:
 - g. Job recruitment agency (please specify), because:
 - h. Other agencies (please specify), because:

16. What are the types of investment required to run the business? *(Please mention the establishment date of the firm)*

Types of Investment	Amount (IDR)	Investment Funds Collection Methods (e.g. own saving, shared investment, loans, etc.)
1) Capital stock		
2) Equipment and technology		
3) Workshops and properties		
4) Raw materials		
5) Others.....		

Remark: Please take out additional papers to fill in the answers if necessary.

17. How many new investments you did since the business establishment date? *(Please specify)*

Types of Investment	Amount (IDR)			
	Year 19.....	Year 19.....	Year 20.....	Year 20.....
1) Capital stock				
2) Equipment and technology				
3) Workshops and properties				
4) Raw materials				
5) Others.....				

Remark: Please take out additional papers to fill in the answers if necessary.

18. If the fund collection methods differ from the answer of question no. 16), please specify how you collect it! *(Please circle the appropriate answers)*

- a. Own saving
- b. Family funding
- c. Investment sharing (please specify)
- d. Bank loans (please specify)
- e. Loans from the other agencies (please specify)
- f. Grants from certain agencies (please specify)
- g. Others.....

19. What are the possible constraints you are encountering in capital investment matters? *(Please circle the appropriate answers)*

- a. Limited capital stock
- b. Limited access to funding agencies (please specify)
- c. Complicated loans conditionality (please specify)
- d. Unconsiderable collateral requirement (please specify)
- e. High interest rate (please specify)
- f. Others.....

20. What sorts of solutions have been made up to overcoming the constraints? *(Please circle the appropriate answers)*
- Suspending new investments
 - Optimising current investments (please specify)
 - Mortgaging or selling out some private assets (please specify)
 - Calling for family financial support (please specify)
 - Calling for financial support from friends, neighbours, relatives, or the other agencies (please specify)
 - Others.....
21. Which stakeholders below that you have considered important in the investment supply chain? *(Please circle the appropriate answers)*
- Business owners, because:
 - Traders, because:
 - Middlemen, because:
 - Family, because:
 - Friends/neighbours/relatives, because:
 - Banks (please specify), because:
 - Cooperatives/micro finance agencies (please specify), because:
 - Government agencies (please specify), because:
 - Other agencies (please specify), because:
22. What are the types of technology required to run the business?

Types of Technology	Forms of Technology
1) Design	
2) Raw materials processing	
3) Batik processing	
4) Final goods processing	
5) Packaging	
6) Storage	
7) Transportation	
8) Energy supply	
9) Administration	
10) Others.....	

Remark: Please take out additional papers to fill in the answers if necessary.

23. How did you obtain the technology required?

Types of Technology	Technology Procurement Methods (e.g. self-made, buying from suppliers, government grants, etc.)
1) Design	
2) Raw materials processing	
3) Batik processing	
4) Final goods processing	
5) Packaging	
6) Storage	
7) Transportation	
8) Energy supply	
9) Administration	
10) Others.....	

Remark: Please take out additional papers to fill in the answers if necessary.

24. In what ways do you utilise that technology? *(Please circle the appropriate answers)*

- a. Self-utilisation
- b. Possibly hired by other parties (please specify)
- c. Possibly shared by other parties for free (please specify)
- d. Used to transfer the knowledge to the workers (courses and trainings)
- e. Used to non-production public education programs
- f. Others.....

25. What are the possible constraints you are encountering in technology investment matters? *(Please circle the appropriate answers)*

- a. Inadequate investment capital to purchase
- b. Limited access to technology suppliers (please specify)
- c. Unsuitable specification of technology supply (please specify)
- d. High operation and maintenance costs (please specify)
- e. Limited after sales services (please specify)
- f. Others.....

26. What sorts of solutions have been made up to overcoming the constraints? *(Please circle the appropriate answers)*

- a. Suspending new technology investments
- b. Optimising current technology use (please specify)
- c. Modifying the installed technology (please specify)
- d. Developing new innovations on the installed technology (please specify)
- e. Borrowing or hiring required technology from friends, neighbours, relatives, or the other agencies (please specify)

- f. Calling for technology support grants from the government or the other agencies (please specify)
- g. Others.....

27. Which stakeholders below that you have considered important in the technology supply chain? *(Please circle the appropriate answers)*

- a. Business owners, because:
- b. Traders, because:
- c. Middlemen, because:
- d. Family, because:
- e. Friends/neighbours/relatives, because:
- f. Banks (please specify), because:
- g. Cooperatives/micro finance agencies (please specify), because:
- h. Government agencies (please specify), because:
- i. Universities (please specify), because:
- j. Research and development agencies (please specify), because:
- k. Other agencies (please specify), because:

B. Production Capacity, Distribution, and Marketing

28. What types of commodities you produce?

Types of Commodities	Average Volume Per Month	Unit Price (IDR)	State of Marketing Destinations
CLOTHES			
1) Handwritten batik			
2) Stamped batik			
3) Printed batik			
4) Combined batik			
5) Others.....			
FASHION			
1) Formal shirt			
2) Blouse			
3) Daster			
4) Cotton T-shirt			
5) Sarong			
6) Jarik			
7) Pant			
8) Shawl			

9) Scarf and necktie			
10) Others.....			
ACCESSORIES			
1) Linen and bed cover			
2) Pillowcase			
3) Curtain			
4) Bag			
5) Shoe and sandal			
6) Wallet			
7) Others.....			
HANDICRAFT			
1)			
2)			
3)			
4)			
5)			

Remark: Please take out additional papers to fill in the answers if necessary.

29. What sorts of production patterns preferred to run the business? *(Please circle the appropriate answers)*
- Daily routine
 - Periodical pattern (please specify)
 - By order pattern
 - Others.....
30. How much the monthly average production costs you have to compensate to run the business? *(Please specify)*

Types of Cost Spending	Total Amount (IDR)			
	Year 19.....	Year 19.....	Year 20.....	Year 20.....
1) Equipment and raw materials				
2) Production process				
3) Distribution and marketing				
4) Transportation				
5) Export-import handling				
6) Business licensing				
7) Taxes and retributions				

8) Illegal taxation				
9) Wages and incentives				
10) Others.....				

Remark: Please take out additional papers to fill in the answers if necessary.

31. What are the possible constraints you are encountering during production process? *(Please circle the appropriate answers)*
- a. Unstable raw materials supply (please specify)
 - b. Unstable energy supply (please specify)
 - c. Security infringement (please specify)
 - d. Demonstration of workers and boycott (please specify)
 - e. Machinery malfunction (please specify)
 - f. The lack of appropriate technology support (please specify)
 - g. Others.....
32. What sorts of solutions have been made up to overcoming the constraints? *(Please circle the appropriate answers)*
- a. Finding alternative raw materials and energy (please specify)
 - b. Saving the use of raw materials and energy (please specify)
 - c. Finding alternative machinery and equipment (please specify)
 - d. Proceeding internal mediation with the workers (please specify)
 - e. Calling for policy backup (please specify)
 - f. Calling for government policy support (please specify)
 - g. Others.....
33. What sorts of alternative production strategies have been made up to deal with those constraints? *(Please circle the appropriate answers)*
- a. Keep production running with alternative raw materials and energy sources
 - b. Keep production running with recycled raw materials
 - c. Keep production running by diverting partial processes to the co-production partners (production partnership)
 - d. Keep production running with reduced volume
 - e. Temporary production suspension until the problems solved
 - f. Others.....
34. Which stakeholders below that you have considered important in the technology supply chain? *(Please circle the appropriate answers)*
- a. Business owners, because:
 - b. Traders, because:
 - c. Middlemen, because:
 - d. Family, because:
 - e. Friends/neighbours/relatives, because:
 - f. Banks (please specify), because:
 - g. Cooperatives/micro finance agencies (please specify), because:

- h. Government agencies (please specify), because:
- i. Universities (please specify), because:
- j. Research and development agencies (please specify), because:
- k. Other agencies (please specify), because:

35. How much the average production value of your business since the beginning? *(Please specify)*

Types of Commodities	Total Amount (IDR)			
	Year 19.....	Year 19.....	Year 20.....	Year 20.....
1) Clothes				
2) Fashion				
3) Accessories				
4) Handicraft				
5) Others.....				

Remark: Please take out additional papers to fill in the answers if necessary.

36. What are the possible constraints you are encountering during production process? *(Please circle the appropriate answers)*

- a. Uncertain selling prices of commodities (please specify)
- b. Dumping price practices (please specify)
- c. The existence of cartel-typed or monopoly practices (please specify)
- d. Irresponsive government policies (please specify)
- e. Limited facilities and public infrastructure provisions (please specify)
- f. Security infringement (please specify)
- g. Others

37. What sorts of solutions have been made up to overcoming the constraints? *(Please circle the appropriate answers)*

- a. Refocusing marketing distribution to specified market segments (please specify)
- b. Diversifying commodities and selling prices (please specify)
- c. Doing production efficiency to cut off the selling prices (please specify)
- d. Doing marketing cooperation with the fellow batik entrepreneurs (please specify)
- e. Participating in exhibition and trade fairs more frequently (please specify)
- f. Calling for policy backup (please specify)
- g. Calling for government policy support (please specify)
- h. Others

38. Which stakeholders below that you have considered important in the technology supply chain? *(Please circle the appropriate answers)*

- a. Business owners, because:
- b. Traders, because:
- c. Middlemen, because:
- d. Family, because:

- e. Friends/neighbours/relatives, because:
- f. Banks (please specify), because:
- g. Cooperatives/micro finance agencies (please specify), because:
- h. Government agencies (please specify), because:
- i. Universities (please specify), because:
- j. Research and development agencies (please specify), because:
- k. Other agencies (please specify), because:

39. Based on your evaluation, which are the following factors that you have considered important to keep your business running? (Please tick "✓" on the appropriate cells)

Factor Categories	Stages of Value Chain			
	Pre-Production*	Production**	Storage	Distribution & Marketing
INTERNAL FACTORS				
1) Access to capital				
2) Raw materials availability				
3) Sufficient equipment & technology				
4) Labour composition & qualification				
5) Enterprise management				
6) Business strategy				
7) Market positioning				
8) Other				
9) Other				
10) Other				
EXTERNAL FACTORS				
1) Easy business license procedure				
2) Fair trade arrangement				
3) Tax deduction				
4) Illegal taxation eradication				
5) Cartel-typed and monopoly cutoff				
6) Government policies support				
7) Strict law enforcement				
8) Security stability				
9) Climate change				
10) Post-disaster recovery				
11) Entrepreneurship enhancement				

12) Public empowerment facilitation				
13) Other				
14) Other				
15) Other				

Remark: Please take out additional papers to fill in the answers if necessary.

** Pre-production phase includes the procurement of raw materials, capital investment, technology, etc.*

*** Production phase includes entire processing from raw material preparation to final process (intermediate or final goods)*

40. How do you reckon your firm performance since its establishment date? *(Please specify)*

Aspects	Amount (IDR)			
	Year 19.....	Year 19.....	Year 20.....	Year 20.....
1) Capital investment				
2) Production cost				
3) Value-added				
4) Labour force				
5) Others				

Remark: Please take out additional papers to fill in the answers if necessary.

::::: END OF QUESTIONNAIRE :::::

Annex G2. Panduan Kuesioner Perusahaan Batik (Bahasa)

QUESTIONNAIRE FORM

Kode Responden	:	
Hari & Tanggal	:	
Lokasi	:	
Waktu Mulai	:	
Waktu Selesai	:	

IDENTITAS RESPONDEN

Nama Responden	:				
Umur	:		Jenis Kelamin	:	
Pekerjaan	:		Posisi	:	
Alamat Rumah	:				
No. Telepon	:		No. HP	:	
Nama Perusahaan	:				
Bidang Usaha	:				
Tanggal Berdiri	:				
Nama Pemilik	:				
Alamat Kantor	:				
No. Telepon	:		No. Facsimile	:	
Modal Awal	:	Rp.			
Biaya Produksi	:	Rp.	<i>(sebutkan nilai rata-rata per tahun)</i>		
Laba Bersih	:	Rp.	<i>(sebutkan nilai rata-rata per tahun)</i>		
Nilai Omzet	:	Rp.	<i>(sebutkan nilai rata-rata per tahun)</i>		

PETUNJUK UMUM

1. Pengisian kuesioner membutuhkan waktu sekitar 60 menit.
2. Pastikan bahwa narasumber memiliki waktu yang cukup untuk mengisi kuesioner hingga selesai
3. Jika kuesioner tidak dapat diselesaikan tepat waktu atau jika diperlukan waktu tambahan untuk sesi wawancara berikutnya, mintalah kesediaan narasumber untuk melanjutkan wawancara di lain waktu tak lebih dari satu bulan sejak wawancara pertama dilakukan.
4. Catatlah identitas narasumber meliputi nama, umur, jenis kelamin, pekerjaan, alamat rumah dan kantor, serta nomer kontak yang bisa dihubungi.
5. Perkenalkan identitas pewawancara meliputi nama, posisi dalam penelitian, serta alamat dan nomer kontak yang bisa dihubungi.
6. Jelaskan dengan singkat latar belakang, tujuan, dan hasil yang diharapkan dari penelitian.
7. Mulailah survei kuesioner dan catat kejadian-kejadian penting selama wawancara berlangsung
8. Periksa dan konfirmasi kembali jawaban-jawaban narasumber sebelum mengakhiri sesi wawancara pada hari itu.
9. Akhiri wawancara dengan ucapan terima kasih dan mintalah kesediaan narasumber untuk dihubungi kembali untuk pemutakhiran data dan informasi.

PERKENALAN

Selamat pagi/siang/sore/malam.

Perkenalkan nama saya Prihadi Nugroho, dosen pada Jurusan Perencanaan Wilayah dan Kota Universitas Diponegoro, Semarang. Saat ini saya sedang studi S3 pada bidang Perencanaan Ruang di Technische Universität Dortmund, Jerman. Penelitian yang sedang saya lakukan ini berkaitan dengan penulisan disertasi bertemakan tentang kelembagaan lokal dalam pertumbuhan klaster, dengan studi kasus klaster industri batik di Solo dan Rembang. Penelitian ini bertujuan untuk melihat bagaimana kondisi kelembagaan lokal yang ada mampu berpengaruh terhadap pertumbuhan klaster. Kelembagaan lokal yang dimaksud meliputi aturan main yang berlaku dan organisasi-organisasi yang terbentuk di dalam klaster, baik yang bersifat formal maupun informal. Dengan demikian cakupan kelompok sasaran penelitian meliputi unsur-unsur pelaku usaha (pemasok, pengrajin, pedagang, dan penyedia jasa), asosiasi, lembaga penelitian dan pengembangan, KADIN, organisasi masyarakat, pemerintah, dan lembaga-lembaga lain terkait. Latar belakang penelitian ini berawal dari fenomena pertumbuhan klaster batik yang bervariasi antara satu daerah dan daerah lainnya. Padahal seiring dengan perluasan akses terhadap teknologi informasi dan infrastruktur yang cukup memadai dewasa ini, semestinya peluang untuk tumbuh tidak terlalu berbeda. Karenanya, pengaruh kekuatan dari dalam daerah dan klaster itulah (*endogenous factor*) yang berperan penting bagi pertumbuhan klaster tersebut. Berangkat dari hipotesis ini maka penelitian berfokus pada kelembagaan lokal sebagai sumber kekuatan kolektif bagi pertumbuhan klaster batik.

Demikian penjelasan ringkas tentang penelitian ini. Saya berharap Bapak/Ibu berkenan memberikan data dan informasi yang relevan. Sebelumnya saya ucapkan terima kasih atas waktu yang disediakan dan kerjasamanya.

Salam hangat,

Prihadi Nugroho

DAFTAR PERTANYAAN

A. Kebutuhan Bahan Baku, Tenaga Kerja, Peralatan dan Modal

1. Apa saja bahan baku yang Anda butuhkan?

Kategori Jenis Bahan Baku	Jumlah Rata-rata Per Bulan	Harga Per Satuan (Rp)	Daerah Asal Pembelian
KAIN			
1) Katun			
2) Rayon			
3) Prima			
4) Primissima			
5) Doby			
6) Viscos			
7) Paris			
8) Sutra			
9) Berkolin			
10) Blaco			
11) Lainnya.....			
LILIN/MALAM			
1) Malam tawon			
2) Gondorukem			
3) Damar matakucing			
4) Parafin			
5) Microwax			
6) Lemak/kendal			
7) Lilin bekas			
8) Lainnya.....			

ZAT PEWARNA			
1) Pewarna sintetis			
2) Pewarna alam			
3) Lainnya.....			
ASESORIS			
1) Kancing			
2) Ritsleting			
3) Manik-manik			
4) Bordir			
5) Lainnya.....			
ENERGI			
a. Listrik			
b. Minyak tanah			
c. Gas elpiji			
d. Arang/kayu bakar			
e. Lainnya.....			

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

2. Apa pertimbangan Anda dalam membeli bahan baku? (Jawaban boleh lebih dari satu. Berikanlah tanda centang "✓" pada kolom yang tersedia)

Pertimbangan	Kain	Lilin/ Malam	Zat Pewarna	Asesoris	Energi
1) Harga murah/terjangkau					
2) Harga relatif stabil					
3) Kualitas terjaga baik					
4) Tersedia beragam kualitas yang diinginkan					
5) Kontinuitas pasokan barang terjamin					
6) Lokasi pembelian dekat					
7) Akses ke supplier mudah					
8) Pembelian bisa dicicil/bayar belakangan					
9) Mendapat diskon untuk partai besar					
10) Lainnya.....					

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

3. Bagaimana cara pengadaan bahan baku di atas? (Jawaban boleh lebih dari satu. Lingkariilah jawaban yang sesuai untuk setiap kategori bahan baku)

- a. Membeli sendiri langsung ke agen/distributor/toko dll.
 - b. Membeli sendiri melalui pedagang perantara (makelar)
 - c. Membeli secara kolektif melalui koperasi, kelompok masyarakat, dll
 - d. Mendapatkan bantuan hibah dari lembaga tertentu, sebutkan:
 - e. Lainnya.....
4. Bagaimana cara pembayaran bahan baku di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori bahan baku)*
- a. Bayar tunai di depan
 - b. Bayar tunai di belakang
 - c. Angsuran, sebutkan syaratnya:
 - d. Mendapatkan hibah dari lembaga tertentu, sebutkan:
 - e. Lainnya.....
5. Apa saja kendala dan hambatan yang Anda hadapi dalam pengadaan bahan baku di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori bahan baku)*
- a. Barang tidak selalu tersedia di pasaran
 - b. Jumlah barang tersedia tetapi tidak mencukupi
 - c. Spesifikasi barang tidak sesuai selera pasar
 - d. Harga barang fluktuatif
 - e. Suplai barang tidak tepat waktu
 - f. Lainnya.....
6. Bagaimana solusi yang dilakukan untuk mengatasi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori bahan baku)*
- a. Mencari bahan baku ke supplier lain (sebutkan siapa dan daerahnya)
 - b. Meminjam atau berutang dari pengusaha lain (sebutkan siapa dan daerahnya)
 - c. Membeli bahan baku kualitas seadanya yang tersedia di pasaran
 - d. Menimbun jumlah stok bahan baku
 - e. Mengurangi pemakaian bahan baku tertentu (sebutkan jenis bahan baku dimaksud)
 - f. Memodifikasi atau mendaur ulang bahan baku bekas pakai
 - g. Membuat jaringan ke banyak supplier
 - h. Lainnya.....
7. Siapakah stakeholder di bawah ini yang Anda anggap menentukan dalam rantai pengadaan bahan baku di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori bahan baku)*
- a. Supplier, alasannya:
 - b. Agen/distributor/toko, alasannya:
 - c. Pedagang perantara (makelar), alasannya:
 - d. Koperasi, alasannya:
 - e. Kelompok masyarakat, alasannya:
 - f. Pemerintah (sebutkan siapa), alasannya:
 - g. Lembaga lain (sebutkan siapa), alasannya:

8. Berapa jumlah tenaga kerja yang Anda butuhkan?

Kategori Jenis Pekerjaan	Jumlah Tenaga	Upah Rata-rata (Rp)	Daerah Asal Tenaga Kerja
PRA PRODUKSI			
1) Perencana produksi			
2) Logistik bahan & alat			
3) Riset pasar			
4) Lainnya.....			
PRODUKSI			
1) Desainer			
2) Penyiapan kain & alat			
3) Pemindahan pola (nyoret)			
4) Pematikan tulis			
5) Pematikan cap			
6) Pewarnaan wedelan			
7) Pewarnaan coletan			
8) Kerokan			
9) Mbironi			
10) Menyoga			
11) Melorod			
12) Pembilasan & pengeringan			
13) Penyempurnaan			
14) Pengepresan batik			
15) Quality control			
16) Lainnya.....			
JASA PENDUKUNG			
1) Konveksi			
2) Bordir			
3) Pengemasan (packaging)			
4) Transportasi			
5) Distribusi & pemasaran			
6) Penjaga toko/stand			
7) Percetakan & periklanan			
8) Lainnya.....			

ADMINISTRASI			
1) Tata usaha (sekretariat)			
2) Akuntansi & pembukuan			
3) Kasir & pengupahan (payroll)			
4) Personalia (HRD)			
6) Lainnya.....			

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

9. Apa pertimbangan Anda dalam menggunakan tenaga kerja? (Jawaban boleh lebih dari satu. Berikanlah tanda centang "√" pada kolom yang tersedia)

Pertimbangan	Pra Produksi	Produksi	Jasa Pendukung	Administrasi
1) Upah murah/terjangkau				
2) Memiliki keahlian & ketrampilan memadai				
3) Memiliki daya kreasi & inovasi				
4) Jujur, tanggung jawab & integritas tinggi				
5) Memiliki inisiatif & jiwa kepemimpinan				
6) Mudah adaptasi dg kebutuhan perusahaan				
7) Dapat bekerjasama dalam teamwork				
8) Mudah berkomunikasi dengan konsumen				
9) Sanggup bekerja keras				
10) Kedekatan hubungan keluarga				
11) Kedekatan pertemanan & relasi sosial				
12) Lainnya.....				

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

10. Bagaimana cara Anda merekrut tenaga kerja? (Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori pekerjaan)
- Mencari langsung dari anggota keluarga, teman, tetangga dan kerabat
 - Menggunakan jasa penyalur tenaga kerja (sebutkan siapa dan daerahnya)
 - Memasang iklan lowongan kerja di media massa
 - Mencari informasi dari sesama pengusaha atau pihak lain (sebutkan siapa dan daerahnya)
 - Lainnya.....
11. Apa saja kendala dan hambatan yang Anda hadapi dalam pengembangan sumber daya manusia (SDM)? (Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori pekerjaan)
- Etos kerja rendah (misal: disiplin waktu, kerapian tempat kerja, dsb)

- b. Latar belakang pendidikan dan ketrampilan kurang memadai
 - c. Sulit beradaptasi dengan teknologi baru dan perubahan iklim usaha
 - d. Keahlian terbatas dan sulit berkembang
 - e. Kurangnya pelatihan (sebutkan jenis pelatihan yang dimaksud)
 - f. Terbatasnya pasar tenaga kerja trampil (sebutkan jenis pekerjaan yang dimaksud)
 - g. Kurangnya regenerasi pembatik dan wirausaha baru
 - h. Transfer pengetahuan dan inovasi berjalan lambat (penyerapan informasi dan instruksi)
 - i. Lainnya.....
12. Bagaimana solusi yang dilakukan untuk mengatasi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori pekerjaan)*
- a. Memberikan pelatihan khusus karyawan (sebutkan apa dan bagaimana jenis pelatihannya)
 - b. Mengirimkan karyawan pada pelatihan yang disediakan pemerintah atau lembaga lain (sebutkan apa dan bagaimana jenis pelatihannya)
 - c. Memberikan bonus dan insentif tertentu (sebutkan apa dan bagaimana caranya)
 - d. Mengadakan kursus pembatikan maupun jenis pelatihan lainnya (sebutkan apa dan bagaimana caranya)
 - e. Memfasilitasi pengadaan peralatan dan teknologi baru
 - f. Memberikan pembinaan internal dan supervisi secara intensif kepada karyawan
 - g. Lainnya.....
13. Bagaimana Anda memperoleh keahlian membatik dan jiwa kewirausahaan? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai)*
- a. Diwariskan turun-temurun oleh keluarga
 - b. Belajar mandiri (otodidak) dari pengusaha lain
 - c. Magang secara intensif pada pengusaha tertentu (sebutkan siapa dan bagaimana caranya)
 - d. Memperoleh bimbingan dan pelatihan dari instansi pemerintah atau lembaga lain (sebutkan siapa dan bagaimana caranya)
 - e. Lainnya.....
14. Bagaimana cara Anda mentransfer pengetahuan dan inovasi produksi maupun semangat kewirausahaan, baik kepada karyawan sendiri maupun masyarakat umum? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai)*
- a. Memberikan kursus dan pemagangan tertentu (sebutkan apa dan bagaimana caranya)
 - b. Melalui informasi dari mulut ke mulut (*gethok tular*)
 - c. Sosialisasi melalui forum pertemuan tertentu (sebutkan apa dan bagaimana caranya)
 - d. Memberikan instruksi dan pengarahan langsung (sebutkan apa dan bagaimana caranya)
 - e. Membuat dokumentasi dan penyebaran brosur (sebutkan apa dan bagaimana caranya)
 - f. Melalui pemasangan iklan dan advertorial di media massa (sebutkan apa dan bagaimana caranya)
 - g. Lainnya.....
15. Siapakah stakeholder di bawah ini yang Anda anggap menentukan dalam rantai pengadaan tenaga kerja di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori pekerjaan)*

- a. Pengusaha batik, alasannya:
- b. Pedagang batik, alasannya:
- c. Pedagang perantara (makelar), alasannya:
- d. Dinas Tenaga Kerja, alasannya:
- e. Dinas Perindustrian, alasannya:
- f. Dinas Koperasi dan UKM, alasannya:
- g. Jasa Penyalur Tenaga Kerja (sebutkan siapa), alasannya:
- h. Lembaga lain (sebutkan siapa), alasannya:

16. Apa saja investasi modal awal yang Anda butuhkan? (Sebutkan tahun awal usaha didirikan)

Kategori Jenis Modal	Jumlah (Rp)	Cara Perolehan Modal
		(Mis: modal sendiri, patungan, pinjaman bank, dsb)
1) Modal usaha		
2) Peralatan & teknologi		
3) Bangunan/pabrik		
4) Bahan baku		
5) Lainnya.....		

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

17. Berapa kali Anda melakukan penambahan investasi baru selama usaha ini berdiri? (Sebutkan tahun investasinya hingga kondisi terakhir)

Kategori Jenis Modal	Jumlah Modal (Rp)			
	Tahun 19.....	Tahun 19.....	Tahun 20.....	Tahun 20.....
1) Modal usaha				
2) Peralatan & teknologi				
3) Bangunan/pabrik				
4) Bahan baku				
5) Lainnya.....				

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

18. Jika cara perolehan modal untuk investasi baru di atas berbeda dengan jawaban no. 15), sebutkan bagaimana cara penambahan modal baru tersebut dilakukan! (Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori investasi)

- a. Modal sendiri
- b. Modal keluarga
- c. Patungan (sebutkan dengan siapa dan bagaimana syaratnya)
- d. Pinjaman bank (sebutkan nama lembaga dan bagaimana syaratnya)
- e. Pinjaman koperasi/lembaga pembiayaan lain (sebutkan nama lembaga dan bagaimana syaratnya)

- f. Bantuan hibah pemerintah/lembaga lain (sebutkan nama lembaga dan bagaimana syaratnya)
- g. Lainnya.....
19. Apa saja kendala dan hambatan yang Anda hadapi dalam mendapatkan modal di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori modal)*
- Jumlah modal yang terbatas
 - Akses ke lembaga permodalan terbatas (sebutkan kondisi akses yang dimaksud)
 - Prosedur peminjaman modal rumit (sebutkan kondisi prosedur yang dimaksud)
 - Syarat jaminan peminjaman memberatkan (sebutkan kondisi jaminan yang dimaksud)
 - Suku bunga tinggi (sebutkan berapa)
 - Lainnya.....
20. Bagaimana solusi yang dilakukan untuk mengatasi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori modal)*
- Menunda penambahan investasi baru
 - Mengoptimalkan investasi yang sudah ada (sebutkan bagaimana caranya)
 - Menjual sebagian aset yang dimiliki (sebutkan jenis aset dan bagaimana cara menjualnya)
 - Mengusahakan bantuan dari keluarga (sebutkan bagaimana caranya)
 - Mengusahakan pinjaman dari teman, tetangga, kerabat atau lembaga lain (sebutkan nama lembaga dan bagaimana syaratnya)
 - Lainnya.....
21. Siapakah stakeholder di bawah ini yang Anda anggap menentukan dalam rantai penanaman modal di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori modal)*
- Pemilik usaha, alasannya:
 - Pedagang, alasannya:
 - Makelar, alasannya:
 - Keluarga, alasannya:
 - Teman/tetangga/kerabat, alasannya:
 - Perbankan (sebutkan siapa), alasannya:
 - Koperasi/lembaga keuangan mikro (sebutkan siapa), alasannya:
 - Pemerintah (sebutkan siapa), alasannya:
 - Lembaga lain (sebutkan siapa), alasannya:
22. Apa saja teknologi yang Anda butuhkan untuk produksi?

Kategori Jenis Teknologi	Bentuk Teknologi
1) Desain	
2) Pengolahan bahan baku	
3) Pematangan	
4) Penyempurnaan produk	

5) Pengemasan (packaging)	
6) Penyimpanan (storage)	
7) Transportasi	
8) Suplai energi	
9) Administrasi	
10) Lainnya.....	

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

23. Bagaimana cara Anda mendapatkan teknologi di atas?

Kategori Jenis Teknologi	Cara Perolehan Teknologi (Mis: membuat sendiri, membeli, hibah pemerintah, dsb)
1) Desain	
2) Pengolahan bahan baku	
3) Pematangan	
4) Penyempurnaan produk	
5) Pengemasan (packaging)	
6) Penyimpanan (storage)	
7) Transportasi	
8) Suplai energi	
9) Administrasi	
10) Lainnya.....	

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

24. Bagaimana cara Anda memanfaatkan teknologi di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori teknologi)*

- a. Dipakai sendiri
- b. Disewakan ke pihak lain (sebutkan siapa dan bagaimana caranya)
- c. Dipinjamkan ke pihak lain (sebutkan siapa dan bagaimana caranya)
- d. Digunakan untuk transfer pengetahuan kepada karyawan (kursus dan pelatihan)
- e. Digunakan untuk sarana edukasi masyarakat (kegiatan nonproduksi)
- f. Lainnya.....

25. Apa saja kendala dan hambatan yang Anda hadapi dalam pengadaan teknologi di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori teknologi)*

- a. Modal pembelian tidak mencukupi
- b. Akses ke pihak penyedia jasa teknologi terbatas (sebutkan kondisi akses yang dimaksud)
- c. Spesifikasi teknologi yang ada tidak sesuai (sebutkan kondisi teknologi yang dimaksud)
- d. Biaya operasi dan perawatannya mahal (sebutkan kondisi biaya yang dimaksud)

- e. Layanan purna jualnya terbatas (sebutkan kondisi layanan yang dimaksud)
 - f. Lainnya.....
26. Bagaimana solusi yang dilakukan untuk mengatasi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori teknologi)*
- a. Menunda pembelian
 - b. Mengoptimalkan teknologi yang sudah ada (sebutkan bagaimana caranya)
 - c. Memodifikasi teknologi yang dimiliki (sebutkan bagaimana cara menjualnya)
 - d. Mengembangkan inovasi teknologi sendiri (sebutkan bagaimana caranya)
 - e. Meminjam atau menyewa teknologi dari teman, tetangga, kerabat atau lembaga lain (sebutkan nama lembaga dan bagaimana syaratnya)
 - f. Meminta bantuan hibah teknologi dari pemerintah atau lembaga lain (sebutkan nama lembaga dan bagaimana syaratnya)
 - g. Lainnya.....
27. Siapakah stakeholder di bawah ini yang Anda anggap menentukan dalam rantai pengadaan teknologi di atas? *(Jawaban boleh lebih dari satu. Lingkarilah jawaban yang sesuai untuk setiap kategori teknologi)*
- a. Pemilik usaha, alasannya:
 - b. Pedagang, alasannya:
 - c. Makelar, alasannya:
 - d. Keluarga, alasannya:
 - e. Teman/tetangga/kerabat, alasannya:
 - f. Perbankan (sebutkan siapa), alasannya:
 - g. Koperasi/lembaga keuangan mikro (sebutkan siapa), alasannya:
 - h. Pemerintah (sebutkan siapa), alasannya:
 - i. Perguruan tinggi (sebutkan siapa), alasannya:
 - j. Lembaga riset & teknologi (sebutkan siapa), alasannya:
 - k. Lembaga lain (sebutkan siapa), alasannya:

B. Kapasitas Produksi, Distribusi dan Pemasaran

28. Apa saja produk yang Anda hasilkan?

Kategori Jenis Produk	Jumlah Rata-rata Per Bulan	Nilai Jual (Rp)	Daerah Tujuan Pemasaran
KAIN			
1) Batik tulis			
2) Batik cap			
3) Batik printing			
4) Batik kombinasi			

5) Lainnya.....			
FASHION			
1) Kemeja			
2) Blouse			
3) Daster			
4) Kaos			
5) Sarung			
6) Jarik			
7) Celana			
8) Selendang			
9) Syal & dasi			
10) Lainnya.....			
ASESORIS			
1) Sprei & bed cover			
2) Sarung bantal guling			
3) Korden & tirai			
4) Tas			
5) Sepatu & sandal			
6) Dompot			
7) Lainnya.....			
HANDICRAFT			
1)			
2)			
3)			
4)			
5)			

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

29. Bagaimana pola produksi yang Anda lakukan? *(Jawaban boleh lebih dari satu)*
- Rutin tiap hari
 - Berkala pada periode waktu tertentu (sebutkan kapan dan bagaimana)
 - Sesuai pesanan dari pembeli
 - Lainnya.....
30. Berapa rata-rata biaya produksi per bulan yang harus Anda keluarkan selama usaha ini berdiri? *(Sebutkan kondisi tahun awal hingga kondisi terakhir)*

Kategori Jenis Biaya	Jumlah Biaya (Rp)			
	Tahun 19.....	Tahun 19.....	Tahun 20.....	Tahun 20.....
1) Belanja alat & bahan				
2) Proses produksi				
3) Distribusi & pemasaran				
4) Transportasi				
5) Bea ekspor – impor				
6) Perizinan usaha				
7) Pajak & retribusi				
8) Pungutan tak resmi				
9) Upah & insentif				
10) Lainnya.....				

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

31. Apa saja kendala dan hambatan yang Anda hadapi dalam proses produksi di atas? *(Jawaban boleh lebih dari satu)*
- Suplai bahan baku tidak selalu lancar (sebutkan bahan baku yang dimaksud)
 - Suplai energi tidak selalu lancar (sebutkan energi yang dimaksud)
 - Gangguan kamtibmas (sebutkan gangguan yang dimaksud)
 - Demonstrasi dan mogok kerja karyawan (sebutkan demonstrasi yang dimaksud)
 - Kerusakan mesin dan peralatan (sebutkan mesin dan peralatan yang dimaksud)
 - Kurangnya dukungan teknologi tepat guna (sebutkan teknologi yang dimaksud)
 - Lainnya.....
32. Bagaimana solusi yang dilakukan untuk mengatasi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu)*
- Mencari bahan baku dan energi alternatif (sebutkan bagaimana caranya)
 - Mengurangi penggunaan bahan baku dan energi (sebutkan bagaimana caranya)
 - Mencari mesin dan peralatan alternatif (sebutkan bagaimana caranya)
 - Melakukan mediasi internal dengan karyawan (sebutkan bagaimana caranya)
 - Meminta bantuan aparat keamanan (sebutkan siapa dan bagaimana caranya)
 - Meminta bantuan pemerintah melalui insentif kebijakan (sebutkan siapa dan bagaimana caranya)
 - Lainnya.....
33. Bagaimana strategi produksi Anda jika menghadapi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu)*
- Produksi tetap jalan dengan menggunakan bahan baku dan energi alternatif
 - Produksi tetap jalan dengan menggunakan bahan baku daur ulang
 - Produksi tetap jalan tetapi sebagian dialihkan ke pengusaha lain (kerjasama produksi)
 - Produksi tetap jalan tetapi volume produksinya dikurangi

- e. Produksi dihentikan sementara waktu hingga masalah teratasi
- f. Lainnya.....

34. Siapakah stakeholder di bawah ini yang Anda anggap menentukan dalam rantai produksi di atas? *(Jawaban boleh lebih dari satu)*
- a. Pemilik usaha, alasannya:
 - b. Pedagang, alasannya:
 - c. Makelar, alasannya:
 - d. Keluarga, alasannya:
 - e. Teman/tetangga/kerabat, alasannya:
 - f. Perbankan (sebutkan siapa), alasannya:
 - g. Koperasi/lembaga keuangan mikro (sebutkan siapa), alasannya:
 - h. Pemerintah (sebutkan siapa), alasannya:
 - i. Perguruan tinggi (sebutkan siapa), alasannya:
 - j. Lembaga riset & teknologi (sebutkan siapa), alasannya:
 - k. Lembaga lain (sebutkan siapa), alasannya:
35. Berapa rata-rata nilai produksi total (nilai tambah) yang dihasilkan selama usaha ini berdiri? *(Sebutkan kondisi tahun awal hingga kondisi terakhir)*

Kategori Jenis Produk	Jumlah Nilai Tambah (Rp)			
	Tahun 19.....	Tahun 19.....	Tahun 20.....	Tahun 20.....
1) Kain				
2) Fashion				
3) Asesoris				
4) Handicraft				
5) Lainnya.....				

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

36. Apa saja kendala dan hambatan yang Anda hadapi dalam distribusi dan pemasaran produk? *(Jawaban boleh lebih dari satu)*
- a. Harga jual produk yang tidak pasti (sebutkan bagaimana kondisinya)
 - b. Adanya praktek banting harga di antara pelaku usaha (sebutkan bagaimana kondisinya)
 - c. Adanya praktek mafia dan monopoli (sebutkan bagaimana kondisinya)
 - d. Kebijakan dan peraturan pemerintah tidak mendukung (sebutkan bagaimana kondisinya)
 - e. Keterbatasan fasilitas dan infrastruktur umum yang tidak memadai (sebutkan bagaimana kondisinya)
 - f. Gangguan kamtibmas (sebutkan bagaimana kondisinya)
 - g. Lainnya.....
37. Bagaimana solusi yang dilakukan untuk mengatasi kendala dan hambatan di atas? *(Jawaban boleh lebih dari satu)*
- a. Memfokuskan pemasaran pada segmen pasar tertentu (sebutkan bagaimana caranya)

- b. Melakukan diversifikasi produk dan harga jual (sebutkan bagaimana caranya)
- c. Melakukan efisiensi produksi untuk menekan harga jual (sebutkan bagaimana caranya)
- d. Melakukan kerjasama pemasaran dengan pengusaha lain (sebutkan bagaimana caranya)
- e. Mengikuti pameran dan promosi lebih intensif (sebutkan bagaimana caranya)
- f. Meminta bantuan aparat keamanan (sebutkan siapa dan bagaimana caranya)
- g. Meminta bantuan pemerintah melalui insentif kebijakan (sebutkan siapa dan bagaimana caranya)
- h. Lainnya.....

38. Siapakah stakeholder di bawah ini yang Anda anggap menentukan dalam rantai distribusi dan pemasaran di atas? *(Jawaban boleh lebih dari satu)*

- a. Pemilik usaha, alasannya:
- b. Pedagang, alasannya:
- c. Makelar, alasannya:
- d. Keluarga, alasannya:
- e. Teman/tetangga/kerabat, alasannya:
- f. Perbankan (sebutkan siapa), alasannya:
- g. Koperasi/lembaga keuangan mikro (sebutkan siapa), alasannya:
- h. Pemerintah (sebutkan siapa), alasannya:
- i. Perguruan tinggi (sebutkan siapa), alasannya:
- j. Lembaga riset & teknologi (sebutkan siapa), alasannya:
- k. Lembaga lain (sebutkan siapa), alasannya:

39. Menurut penilaian Anda, manakah faktor-faktor di bawah ini yang paling menentukan bagi kelangsungan usaha Anda? *(Jawaban boleh lebih dari satu. Berikanlah tanda centang "✓" pada kolom yang tersedia)*

Kategori Faktor	Tahapan Rantai Nilai (Value Chain)			
	Pra Produksi*	Produksi**	Penyimpanan	Distribusi & Pemasaran
FAKTOR INTERNAL				
1) Akses permodalan				
2) Ketersediaan bahan baku				
3) Peralatan & teknologi memadai				
4) Struktur & kualifikasi tenaga kerja				
5) Manajemen perusahaan				
6) Strategi bisnis perusahaan				
7) Segmentasi pasar (positioning)				
8) Lainnya.....				
9) Lainnya.....				
10) Lainnya.....				

FAKTOR EKSTERNAL				
1) Kemudahan perizinan				
2) Pengaturan tata niaga yang fair				
3) Keringanan pajak & retribusi				
4) Penghapusan pungutan liar				
5) Penindakan mafia & monopoli				
6) Pemberian insentif kebijakan				
7) Pemberian kepastian hukum				
8) Jaminan kamtibmas				
9) Perubahan kondisi cuaca				
10) Penanggulangan bencana alam				
11) Pemberdayaan kewirausahaan				
12) Fasilitasi forum pemberdayaan masyarakat & lintas sektor				
13) Lainnya.....				
14) Lainnya.....				
15) Lainnya.....				

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

** tahapan pra produksi meliputi pengadaan modal usaha, peralatan dan teknologi, bahan baku, dst.*

*** tahapan produksi meliputi semua pemrosesan mulai dari bahan baku hingga barang jadi atau setengah jadi*

40. Bagaimana kinerja usaha Anda selama usaha ini berdiri? (Sebutkan kondisi tahun awal hingga kondisi terakhir)

Aspek	Jumlah (Rp)			
	Tahun 19.....	Tahun 19.....	Tahun 20.....	Tahun 20.....
1) Investasi modal				
2) Biaya produksi				
3) Nilai tambah				
4) Tenaga kerja (Orang)				
5) Lainnya.....				

Keterangan: Pergunakanlah kertas tambahan jika tabel di atas tidak mencukupi.

:::: SELESAI ::::

Annex H1. An Example of Interview Transcription

TRANSCRIPT of EXPERT INTERVIEW		Code : EXP-INT_LWY01
Day of Interview : Thursday	Date : 22 December 2011	
Time of Interview : Afternoon from 14:01 to 15:17	Duration : 1 hours 16 minutes 17 seconds	
Location of Interview: Front terrace of private residence of FPKBL* Chairperson Mr. Alpha Febela		
Name of Respondent : Arif Budiman Efendi		
Sex : Male	Age : 44 years	
Position in Charge : Information technology expert of FPKBL		
Occupation : Internet marketer		
Residential Address : Jl. Nitik No. 3 Laweyan, Kota Surakarta		
No. Telp / HP : (0271) 712 072	Email : arif@kampoenglaweyan.com	
Office Address : Jl. Dr. Rajiman No. 565 Laweyan, Kota Surakarta		
No. Telp / Fax : (0271) 718 722	Email : N/A	

*FPKBL = Forum Pengembangan Kampung Batik Laweyan (Laweyan Batik Urban Village Development Forum), a community-based organization aims at promoting the revitalization of Kampung Laweyan as the cultural heritage site and the famous centre of batik industry in Solo City.

SECTION A : The History of Batik Industry Development

1) What do you know about the history of batik industry development in Surakarta? Please describe, if possible, its chronological periodization!

Ee...let's start talking about Laweyan, ee...because Laweyan (village) was built before Solo (city). We ee...there was **Pajang (Monarchy)** ruling in Javanese mainland (especially surrounding Solo region) during **15th century**. Around **1546** there was ee...a prominent leader namely **Ki Ageng Henis**, the son of **King Brawijaya V**, who moved into Laweyan. During his stay Ki Ageng Henis met ee...**Sunan Kalijaga**, the famous Islamic missionary in ancient Javanese history. Soon Ki Ageng Henis converted his religion (from Hindu) to Islam and helped him to spread Islamic teachings and **batik making techniques to Laweyan villagers**. Ee...later on Laweyan – the Javanese word "**lawe**" means "yarn" – which was previously well known as **the centre of weaving industry**, had become ee...**the pioneer of batik industry**. Ee...after that the batik industry had reached out its **golden era** with the strong influences of **KH Samanhudi**, the noticeable Islamic movement leader of *Serikat Dagang Islam* organization (Islamic Trade Union), particularly since **batik stamping technology** was broadly used to

produce batik fabrics faster and more economically. The golden era prolonged until **1960s**. But since **batik printing technology** was introduced in **1970s** – mainly by the large batik manufacturer like **Batik Keris**, the production of **traditional batik** (with handwriting and stamping technology) went slowdown. The production cost of **batik printing** products was much cheaper than traditional batik ones. As a result, the period of 1970s could be seen as **the dark age** of Laweyan's batik industry. This trend lasted until **the early 2000s** when there remained about four batik producers, the situation when batik industry nearly became extinct, right? Then...some local batik activists like **Mr. Sulaiman** initiated to revitalize batik industry in Laweyan. Mr. Sulaiman and friends moved from below without sufficient support from government in order to redevelop batik industry hand-in-hand with government bodies, private sector and the other stakeholders. They shared a dream to put Laweyan back into the golden era by promoting its rich potentials. *Alhamdulillah* (the Islamic blessing to the Lord)...since **2004** up to now we have gained increasing support from various stakeholders, and we also have been consolidating internally to promote batik products along with tourism attractions. Even though the core business (of Kampung Laweyan) is still batik products, there are some supporting industries developing like culinary and furniture businesses. Formerly we ee...sold batik products to **Klewer Market (Solo)**, **Tanah Abang Market (Jakarta)**, and so forth. But we now can attract ee...tourists (and buyers) to visit Laweyan.

2) How does batik industry in Surakarta contribute to local developments?

Ee...**the iconic competitive products** of Solo comes from batik industry. This makes Solo broadly known as (one of) **the largest batik nuanced city** (in Indonesia). Hmm...and because the major batik production centre in Solo is Laweyan – even though there is another famous one namely (Kampung) Kauman which is ranked the 2nd place after Laweyan – hence people recognize **batik Solo is identical to Laweyan batik products**. That's it...

3) What are the opportunities, challenges, and obstacles encountered to develop batik industry in Surakarta?

Yup...**the opportunities** (of batik industry development) are **quite promising** because since we got threatened with **batik Malaysia**, the **UNESCO recognition** (to Indonesian batik as the world's intangible cultural heritage of Indonesia since 2nd October 2009) has impacted on the increasing market demand of Indonesian batik products in particular for domestic market. With hundreds of millions population hence Indonesia is **the largest market for batik products**. (Therefore, such international recognition – that batik is originated from Indonesia – is very significant to reposition Indonesian batik market share against similar products particularly from **Malaysia** and **China**). Ee...following its growing opportunities from which a lot of **new entrants** of batik producers with **various design richness** arising across the country nowadays, the **challenges** of batik development may come from **the fear of oversupply** which would affect to immediate boredom of batik consumers. If batik is only viewed as economic product, then sooner or later it may cause **consumer weariness**. However, if we encourage "**batik plus**" in which batik industrialization is preserved (along with its **sociocultural values** instead of its **economic values** only), then we may support batik development much longer. For instance, in the case of Laweyan we also promote our **cultural**

heritage site (as a historical settlement) as well as batik industry. By doing this, we attempt to **educate people** ranging from elementary school to university students to study about old buildings preservation, historical research, and so forth. Thus, such mixed activities may enrich our strengths to promote **batik tourism**.

4) What kinds of innovative programs created to further batik industry in Surakarta? Please explain, if possible, whether those programs are successful or not to strengthen its development!

Ee...the **innovation** of **batik firms** firstly can be identified by...their **updated motifs** to compete in market. Another innovation is that we **work together** to join up individual batik firms in order to actualize **batik plus concept** by creating **tourism packages** attractive to potential visitors. To attract visitors in enjoying Laweyan environment, we **preserve** our **historical sites** and **improve onsite infrastructure** more conveniently and safely. At the same time we ee...**build persuasive dialogues** with either **affected groups** or **related stakeholders** in order to find appropriate solutions for subsequent problems resulted from **tourism development in Laweyan** ee...because not all tourism actors are aware of the impacts of tourism development. In doing so, we build **synergetic cooperation** with ee...our partners such as **ASITA** (Association of the Indonesian Tours and Travel Agencies), **government bodies** – which are expected to build intergovernmental cooperation horizontally and vertically, and **universities** nearby Solo region. Regarding the role of universities, we encourage **new inventions** on **natural colouring additives** to substitute prolonged usage of **synthetic additives** in batik making. This has become an urgent request since ee...environmental issues have sparked tremendous public awareness widely. In fact, the capacity of **IPAL** (*Instalasi Pengolahan Air Limbah*) *komunal* or communal liquid waste maintenance facility in Laweyan is currently inadequate. Yeah...therefore we keep accommodating such concerns while promoting Laweyan...so that more people will come here (with impressive image about Laweyan as **sustainable historical site** as well as **green batik production centre**).

5) What are the roles of batik clusters in Kampung Laweyan in promoting batik industry development in Surakarta? Please explain, if possible, the performance of respective batik cluster recently!

The past ten years...yeah we **introduced publicly** the phrase of **Kampung Batik Laweyan** in **2004**. Afterwards, such effort has **inspired** the other **batik production regions** nationwide to build up similar **kampung batik** (batik villages), through which batik can be used for **stimulating** newly **tourism destinations**. In addition, we mmm...mmm...mmm...(*mumbling*) actively participate in **exhibitions** (to publicize our *kampung batik* model). Frequently we are asked by batik communities from outside to...share our experiences in developing site properly, mainly because we build up our **settlement image** from nearly zero. This may inspire the other batik regions which have been facing similar problems in terms of rebuilding **endangered settlement**. For example, recently we have assisted (the community of) next-to-be *kampung batik* in **Jakarta** namely **Kampung Batik Palbatu** by ee...providing consultations about **urban settlement redevelopment**...even in Jakarta the existence of traditional *kampung batik* has no longer exist. Previously, the traditional *kampung batik* in Jakarta

could be found in **Kebayoran Lama**. Currently, they attempt to promote Kampung Batik Palbatu which is similar to Laweyan in some aspects. Actually it is used to be an ordinary settlement, but being revitalized to become *kampung wisata* (tourism settlement).

6) What are the opportunities, challenges, and obstacles encountered to develop batik industry in Surakarta? What solutions have been made to respond those forces, and what impacts to overall batik industry development?

Ngguh (Javanese word for "yes" or expressing self understanding)...**the initial obstacles** (to revitalize batik industry) were **the shortage of industrial firms**, where it remained four units (in the dark age of 2000s). Afterwards, the old firms inspired the new entrants, which had held no batik traditions in the past, to start up batik industry. For small firms the common problem is **initial capital** (necessary to either start up or maintain business). To overcome this we build cooperation with **BI** (the Central Bank of Indonesia) and other banking institutions, particularly in **simplifying loan condition** and **reducing interest rate**. Meanwhile, in terms of **capacity building**...we have partnerships with **Ministry of Industry** through numerous **trainings** such as **batik making, business management, web design**, and so on. Along with such technical assistance forms, we also obtained **production equipments** directly from government.

SECTION B : The Origin of Kampung Laweyan Batik Cluster

1) What do you know about the history of batik clusters in Kampung Laweyan? Please describe, if possible, its chronological periodization!

(No new information added)

2) How does batik industry in Kampung Laweyan contribute to social welfare improvements in the society?

Ngguh...yeah...ee...the **re-emergence** of batik industry in Laweyan automatically has created **new employment**. Just like Mr. Alpha ee...he recruited **neighbours** to work on his firm – the way similar to **CSR** (corporate social responsibility) model. Secondly, the growing number of batik industry has triggered the openings of **new batik showrooms** in Laweyan, which is in turn attracted the growth of new industries like culinary industry in response to increasing number of group visitors. Therefore, they can benefit from the growth of batik industry too. In this sense, they are economically empowered through culinary activities, hired **"pendopo"** (the Javanese term for residential hall room functioned for receptions), homestay...and some new business opportunities for printing and packaging industries. Such initiatives have empowered the neighbours, of course...

Yeah...the remained batik producers in Laweyan during 2000s who...I mean **before 2000s** or until 2000s the **behaviour** of ee...batik firm owners of Laweyan was **closed**, not opened like now – the

situation resulted from the introduction of Laweyan as tourism destination. Previously "**regol**" (the Javanese term of wooden-constructed front gate) is closed securely. Only if visitors were knocking on, it was opened slightly to check out whether they were recognized by "**juragan**" (the Javanese term of the master or the owner of batik firm). If (the visitors were) allowed (to enter the house), the gate would be opened widely. When (the behaviour was) closed, the entire high-mounted wall surrounding the house was extremely closed. Due to such closeness ee...before 2000s many students intended to conduct research in Laweyan were being rejected. **Currently** (Laweyan neighbourhood) is **opened**. Every day group coaches come here so that our closed neighbours sooner or later adapt their habits to changing situation, particularly in order to obtain **external benefits** triggered by incoming visitors. By changing our common mindset from **conventional batik orientation** – the idea that batik producers are somehow conditioned to keep producing batik products only – to **batik plus concept**, now we can welcome outsiders like you to conduct research here.

However, not all batik producers are welcome to researcher. That's why I often recommend some batik producers to be observed. Yeah...in general they have opened to researchers, government officials who provide supervision and training activities even though the process of admittance is uneasy. For example, one day government officials came to offer certain programs, but they hehehe...(chuckling) rejected it immediately. Subsequently, they have changed their mind to admit such opportunities and started to open gallery in their house, participate in exhibitions actively, spread out brochures everywhere, and...of course create website for product promotion following the trend of information technology advancement.

(Prior to 1970s during the golden era) *nggih*, oh yeah (Laweyan neighbourhood) was **extremely closed**. (The golden era achievement) was resulted from ee...pioneered efforts of batik making in Laweyan continuously. The **market share** of Laweyan products was **dominant**. Previously there was **prominent batik ancestor** namely **Mr. Cokrosumarto**, who had intimate relationship with **Bung Karno** – the shortened nickname of the first Indonesian president, Mr. Soekarno. Mr. Cokrosumarto was **the first batik exporter** from Indonesia. Yeah...due to their endured enthusiastic attitude, their pioneership might have contributed to market dominance achievement. Later on, when trade openness intensified, **printing technology** entered into Laweyan. As a result, most of batik producers who were not ready to anticipate it hehehe...(chuckling) closed out their businesses shortly after.

But now the situation is different. **Since 2004** many **new entrants** are **young entrepreneurs** with **good management skills and knowledge**. They are opened to outsiders. For example, Mr. Alpha and Mr. Gunawan who are equipped with proper skills and open attitude are able to accelerate batik productivity by adapting to information technology. When we watch on TV news hehehe...(chuckling) we are likely to see Mr. Alpha's achievement (to market his products) even though his batik knowledge is lesser than the old producers. When being elected as FPKBL Chairperson in 2004, Mr. Alpha was not a batik producer. Because of his newly position, he started to produce batik in 2005. The situation differs from Mrs. Yuli. She actually has inherited batik making skills from her parents ee...who died in 1980s and caused immediate collapse of their batik business. Lately, Mrs. Yuli has chosen to be a lecturer instead of batik producer. That's all...since 2005 Mr. Alpha yeah...has benefited from batik business with support from information technology advancement such as TV and website.

3) What are the shared facilities to advance batik industry development in Kampung Laweyan?

Hmm...there is **IPAL** only, others are unavailable. Ideally, we have a **dream** to have a **marketing centre**. Let's say when a group of visitors coming, they cannot have a look around due to limited time. If we have marketing centre, then all batik producers may sell out their products over there. Therefore, both consumers and producers can contact each other easier. So in the future we are hoping that **the government** can provide a **vacant place** that can be functioned as marketing centre, so that all Laweyan products can be displayed over there. Unfortunately, we have realized that the negotiation process for this is quite difficult. After IPAL establishment, we had our own office namely **Laweyan IT Centre**. This office is expected to be our **media centre** to share information with batik producers in Laweyan. At the beginning, (this office is to support) **marketing** and next to develop **batik designs** through **software uses**. Just like the early development of **batik fractal** – the design process of batik by using computer-aided software instead of handwriting – which we have introduced through mini seminar, is a way for accelerating the adoption of **technology innovation** to increase (product) **competitiveness** by faster systematical design process. This is not easy, indeed. **The conventional mindset** of most batik producers here is based on **manual process**, through which (the batik designs) are created by **designers outside Laweyan** even though it can be done quickly by adopting computer softwares to produce a plenty of designs. That's why we are about to encourage the development of Laweyan IT Centre. In 2012 ee...the marketing centre is likely to build in *kelurahan* (urban village) – the lower government administration unit below subdistrict – complex with **convenient meeting room** while the *kelurahan* building is being renovated. Thus, we need not to hire meeting room anymore to welcome our guests.

Another dream is **batik museum**. Like Mr. Alpha and other producers have held **batik collections** which...yeah stored in their own "**private museums**". By establishing batik museum we can put together their collections to strengthen **education process** particularly to share their experiences to survive in batik making, for example. At the moment, some producers have their own museums. This dream is still a public discourse ee...but we hope it can be realized ee...with adequate support from many stakeholders. In the meantime, currently we have **Batik Training Centre (BTC)** to promote batik education which is especially focused **to disseminate batik making process and its history** for students from elementary to higher education schools. However, some guests are interesting to learn more about **batik making techniques** by undertaking **short or intensive courses**. (To serve such demand), ee...we are used to split up our guests into **smaller groups** to learn directly in **several batik producers' places**. For instance, Mr. Alpha can provide 50 seats for students while others can do so more or less. Therefore, our guests learn directly to batik producers. We hope that...if possible along with meeting room and marketing centre, a batik workshop could be built too in the renovated *kelurahan* building. Yeah...we are struggling for having **government support** (to realize our dreams).

Regarding the establishment of **shared warehouse** for raw materials stocking, we have never thought about it already. This is because we are still **consolidating** our **FPKBL organization** inwards for a moment. We have found that there remain **many cliques** and **conflicts of interests** between the members which are required to overcome carefully. But our **urgent demands** are **marketing centre, workshop** and **meeting room** so that the warehouse establishment is being skipped for a while. However, if it is considerably important to help smaller producers, so why not? This is mainly because the larger producers usually are able to stock up raw materials for their needs.

Ee...back to batik training centre, we do not have a representative office to welcome our guests. If there are 100 guests, then we split them up into smaller groups to be trained in several batik firms. Thus, we do not have a special place for workshop.

4) What are the forms of participation and cooperation between batik actors in Kampung Laweyan in advancing business climate, physical neighbourhood, and social capital?

For **social cohesion**, we have an event namely **Selawenan**. This is a monthly social event conducted on 25th day in the evening time. On this event we yeah...are used to discuss about various issues and organize **cultural performance**. But in the past few years we have not celebrated this event anymore due to limited resources. Another reason is that we are...concentrating to synergize with many stakeholders such as **kelurahan officials**, **LPMK** (*Lembaga Pemberdayaan Masyarakat Kelurahan* or *Kelurahan Community Empowerment Organisation* – a legislative body at *kelurahan* level) and so on to work together in improving Laweyan condition and solving related problems like neighbourhood security in order to promote Laweyan as a **competitive tourism destination**.

In relation to **product promotion**, we continue to participate in many **exhibition events** albeit it is only few batik producers in Laweyan get involved in. Our partner **ASITA** (Association of Indonesia Tour and Travel Agencies) and **Disperindag** – the abbreviation for *Dinas Perindustrian dan Perdagangan* (Industry and Trade Agency) – have also supported our activities intensively.

Regarding **neighbourhood maintenance**, we have...an initiative to collect funds from batik producers voluntarily in order to finance the making of Laweyan site map and other activities. Yeah...this is undertaken unregularly and usually depending on the demand arises. Oo...for example, if we need to remake this map, then we will collect the money. However, not all batik producers are keen to donate for such social activities. The FPKBL itself is not solid at the moment. Thus, we keep consolidating inwards.

5) How does the competition between batik actors take place? Please explain the forms of competition applied in the field, including their advantages and drawbacks!

The **competition** runs **fairly** here, no harmful conducts. Each batik producer in Laweyan has **specific products** that differ from others. For example, Mr. Alpha focuses on contemporary design, Mr. Sulaiman mass production, and Mr. Gunawan fine art handwriting and stamping batik for middle to high end users. Thus, none of us harms others' businesses because of **differentiated market segments**. Even they ee...complement each other. For example, if Mr. Alpha is unable to fulfill certain product demand, then he may ask other producers to take over. (Such competition occurs because their businesses are based on production). But if their economic basis is trading, then harmful conducts are likely to occur. Yeah...when some traders get commodities from the same suppliers, price competition may occur. Until now there is a **fair competition** here...nothing is disturbing. But actually destructive competition presents in other place, not in Laweyan. This is because a plenty of traders dominating in the market who make the price fluctuating. As a result, producers suffer at most from such unfair competition...but *alhamdulillah* it has not occurred in Laweyan. Yeah the product competition remains relatively fair. However, we need to overlook how FPKBL could distribute the number of guests equally across Kampung Laweyan, so that they are not

concentrated on particular location only. This means that we attempt to spread out the potential benefits of batik tourism here hahaha...(laughing)

6) What are the opportunities, challenges, and obstacles encountered to develop batik industry in Kampung Laweyan?

Our internal challenge is about creating **collective understanding** to promote our neighbourhood as (historical) **tourism destination**. We continue harmonizing Laweyan society to maintain **social cohesion** and to work together in **managing our site**. Therefore, ee...we can serve our guests better. Another challenge is related to how to increase **Laweyan competitiveness**. As we may have already concerned, batik production centres spread out everywhere. Since the **main asset of Laweyan** is its **old building heritage**, we are in need to make our society aware of its potentials. Not all people here get realized the importance of preserving old buildings. If we intend to make over Laweyan similar to Jakarta old town site, then its original attractiveness may disappear. Hence, we have to educate people more intensively. For example, we can strengthen **the role of BTC** in disseminating our **batik uniqueness** to many people outside, so that they may get enlightened about oo...our **batik culture richness** ee...which we have to develop altogether.

Another challenge is about yeah...**infrastructure maintenance**. For example, the maintenance of location signage, ee...water drainage and IPAL is uneasy and costly. Dealing with this problem, we need to think of the solution together by either **empowering our society** or **synergizing with related stakeholders** because ee...the development of tourism destination is unlimited. This means that once our site is growing, it is likely to give impacts positively on its surroundings. How we can synergize with various stakeholders, strengthening each other.

The next challenge may come from **incoming investors**. If they behave as profit makers only, this may be problematic hahaha...(laughing). That's why we need to **regulate** how the relationships between related stakeholders can be harmonized in order to appreciate and strengthen their interests. *Nggih, nggih*...with the support from many stakeholders we attempt to build **intensifying bonded synergy**. Yeah...because most of them have understood (about such issues), we only need to approach some schools in order to educate people regarding the development of tourism place. This means that a growing tourism place should not be viewed because of its **visible attractiveness**, but also how the **economic spillovers** can be accumulated by local people, *nggih*? If we only obtain the traffic congestion (resulted from such tourism development), so why we should do care about it? So the point is how the development of tourism place can help **to improve local livelihood** directly and indirectly. Oo...once the tourism place growing, it should be followed by better location management, not the increasing criminal rate. Therefore, we need to discuss about how to develop tourism site safer and more comfortable for both related stakeholders and our guests.

7) What kinds of innovative programs created to further batik industry in Kampung Laweyan? Please explain, if possible, whether those programs are successful or not to strengthen its development!

(No new information added)

SECTION C : Institutions in Batik Industry Development

- 1) *Who are the individuals, groups, and organisations influential to batik industry development either in Kampung Laweyan or wider Surakarta region? Please explain their roles and positions in the industry!*

Ideally, it is not supposed to be **FPKBL** only (who is taking role to develop Laweyan), but also **LPMK**, **PNPM** (*Program Nasional Pemberdayaan Masyarakat Mandiri* or National Program for Social Empowerment), **PKK** (*Pembinaan Kesejahteraan Keluarga* or Family Welfare Improvement Program) and **Kelurahan**. *Kelurahan* with all of these community organisations ideally should **synergize** each other. At the moment, **FPKBL plays dominating role**. Next in 2012 we will synergize with them in terms of sharing tasks and ee...increasing their roles to promote ee...**batik tourism** in Laweyan. At the moment, FPKBL is still very dominant. Ee...in Solo we certainly have partners from **Disperindag**, **Dinas Koperasi** (Cooperatives and Micro, Small and Medium Enterprises Agency), **Depnaker** (*Departemen Tenaga Kerja* or Ministry of Manpower) and **Solo Techno Park**. There is also **Bappeda** (*Badan Perencanaan Pembangunan Daerah* or Regional Development Planning Board). From universities we also get support from **UMS** (Universitas Muhammadiyah Surakarta), **UNIBA** (Universitas Batik) and **UNS** (Universitas Negeri Sebelas Maret). From central government we are supported by **BPPT** (*Badan Pengkajian dan Penerapan Teknologi* or Technology Studies and Application Board), **Menkominfo** (*Kementerian Komunikasi dan Informasi* or Communication and Information Ministry), and **Dirjen Perindustrian** (Directorate General of Industry). Thus, we frequently make contacts with both local and central authorities. *Nggih*, if currently they have not...participated intensively because of dominating role of FPKBL. *Inshaallah* next year we will start **synergizing more intensively**, how to **broaden participation** (from various stakeholders). Ee...previously there was PNPM from central government particularly related to tourism program, but we did not obtain it. This is we...we are trying to link up into PNPM tourism program in order to strengthen Laweyan. Yeah...we are still attempting to get there.

Honestly, because FPKBL is a **social organization** some board members are still **reluctant to work**. There are only a small number of us who work actively. In the future, we would like to improve this organization in terms of recruiting potential active members. Because in the future there are a looottt of people either from public or private sectors who are ready to support Laweyan. But the big question is yeah...who will complete the tasks. This Laweyan hehehe...(chuckling) is lacking of (voluntary) persons so that we are encouraging more participants, not only from FPKBL but also PNPM and others who can synergize with us hehehe...(chuckling) in terms of sharing the tasks and strengthening each other.

In the meantime, most of them (**local government agencies**) provide **trainings** related to **production process, enterprise management, web design**, yeah many kinds of trainings. They are also giving us **equipment grants**. Last time *insyaallah* ee...**Local Government Office** probably will execute **tourism kampung development program** in (Kampung) Laweyan and (Kampung) Kauman in 2012. Specifically, these two areas are prioritized as **batik (production) centres** which...which are supported to be improved in terms of **batik and site tourism development**. Last time we also have

suggested how to support IPAL, marketing centre yeah...all sorts of things important to Laweyan that we have proposed to government. It seems that (the government assistance for Laweyan) are not always available every year, as far as I know. **But trainings are always available.** But we do not always obtain **production equipment support** every year. Eh...for example, in the case of batik processing in Laweyan which requires **fossil fuel** based stoves. Due to the increasing price of fossil fuel, we need to think of its substitute. UMS has investigated the use of **ethanol** as the **alternative energy source**. It is cheaper but consists of some limitation, that is, its smoke may cause unconsciousness. So it is problematic tough. Another effort came from BPPT to find out yeah...ee...more economical and easier-to-produce energy source instead of fossil fuel.

Another innovation in demand is related to **stamping technology**. The **conventional technology** tek...tek...tek (*pronouncing the sound of stamping process*) requires high accuracy of hand-stamping workers. The question is how to increase precision with other techniques. Yeah...when we talk with BPPT or other agencies we are asking whether they can invent **newer stamping techniques**. For example, we have a friend who has developed **rolled-stamping technology**. One rotation of the roller can result in one motif. However, such attempt is still under research further. Or perhaps we may ask for the research about **wax substitute**. In this case there is (Solo) Techno Park who has initiated ehem...**dyeing techniques with natural colouring additives**. How they **extract** from **herbal plants** into (colouring) **powder** or **paste**...so that such innovation is **more practical** for **batik makers** because they do not need to produce it by themselves in terms of plant cultivation and processing. If possible, it might be more practical if there are some **(natural colour) extract providers and developers**. One of **natural colour limitation** is that the colour is **not durable**. **The quality thus is lower than synthetic colour**. So the problem of natural colour use is how to lock in the colour better. That's why we keep **synergizing** with them particularly in order to research about natural dyeing additives. We have a dream ee...in Laweyan there should be **batik laboratory** which focuses on **dyeing process** by linking up with government or private sector. For example, recently Mr. Alpha and Mr. Lukman of ITB (Institut Teknologi Bandung) who found fractal batik making have been financed to travel to Sweden to present about **sustainable fashion**. Here we have batik industry which has turned into **green industry** even though not supported by all firms yet. In Sweden we can learn about how green industry being managed starting from raw materials, packaging and all production process should be **environmental friendly**. It is quite **complicated process**. And it is **uneasy** too. However, *insyaallah* (the Islamic word to express a vow) we keep trying to achieve it. We will get further support from Sweden institution to keep moving forward to green industry. Hence, natural coloured batik will attract more consumers due to such pro environment characteristics.

2) What kinds of interrelationships are maintained between those actors to promote batik industry development?

Nggih, that is our homework. Even though we have built up cooperation with universities, government and private sectors, their involvement has **not been synergized** well hehehe...(chuckling) **not been integrated** systematically. Yeah...we are heading to this direction.

3) What are the policies, programs, and rules of the game applied for promoting its development?

Nggih, starting from **FPKBL** itself which is **not solid** yet. Honestly, we are not solid. This means that currently we do not have **AD/ART** (*Anggaran Dasar/Anggaran Rumah Tangga* or Organisational Statute and Instruction). We are still making it. Hopefully, it will be approved immediately (by FPKBL members). Indeed, ee...as time goes by there are new items that have to be added on because this tourism site is growing. In terms of **external affairs**, ee...we have obtained **legal regulations** (from government). For example, since Laweyan belongs to **(old buildings) heritage**, it requires **formal regulation**. We proposed **government tax reduction** for **old buildings' owners**. (Such effort is intended to provide incentives for these owners to preserve their assets instead of put them into market). By doing this, the owners may be easier to help protecting these **cultural assets**.

In relation to **financial matters**, it is often **the collateral of old buildings undervalued by the bank**. In fact, there should be **mutual perception** that oo...these old buildings should be **valued higher**. We are communicating with them (the banks) to support both **batik industry and cultural heritage preservation**. We keep **synergizing** ee...**coordinating** with **government** to get Laweyan **more prioritized** as the **local icon**. We are expecting to get immediate support from government to build marketing centre and other facilities, from which the site development can be accelerated. Regarding local regulations, I do not have proper knowledge about it, *nggih*.

4) What are the mechanisms applied for ensuring the implementation of those rules of the game? Are there some particular rewards and punishments applicable to their implementation? Please explain how successful do those mechanisms take into effect!

Honestly, there are **no rewards and punishments**. Because we just started **consolidating** this organization we have practiced **business ethics** only. This means that we establish **mutual respect and understanding, no stringent regulations apply effectively** hehehe...(chuckling) we are going over there. Yeah about transparency...in general the larger entrepreneurs usually share (resources) with neighbours or family relatives as part of their CSR programs. The point is how we can **grow together, alhamdulillah** we have done the right way.

5) Are there any social norms and traditions sustained in order to promote batik industry development either in Kampung Laweyan or wider Surakarta region?

Hmm...all I know we only keep practising **business ethics** up to now. I do not know much about tradition but batik making tradition. **Gethok tular** (Javanese terms for oral dissemination usually taking form of mouth-by-mouth delivery across people) is still exist. Yeah...yes...we have such transparency matter in order to **share information equally** (across society). For example, when I get informed about particular trainings, I will spread it out directly. It is a **common practice** here.

6) How effective those social norms and traditions are acceptable to directing batik industry development?

Generally, most of us (Laweyan society) can **accept** this **business ethics**, only a small number who reject it. Sometimes we find some generous people who are ready to share their resources in order to support common interests. At the same time, there are some people who get afraid of the impacts of others' growth in terms of economic disadvantages. But it is only a few of us. **In general we all are fine** (with current situation).

7) How far the prevailing business competition and marketing determine batik industry development? Please explain the participation forms of various actors to support it!

The Forum (FPKBL) often gets **invitations to participate** in **exhibition events** at local and national levels. Usually we hand over **brochures** of **Laweyan assets** while participating in exhibition events. Ee...(we also have undertaken promotion) through (electronic) **mass media**, **magazines** and **tabloids**. Ee...we also have organized **mutual promotion**. Even we have built up good cooperation with **TV station** to promote our location. Also, there is regular contact with *Dinas Pariwisata Jawa Tengah* (Central Java Tourism Provincial Agency) to **publicize events** in Laweyan in **official journal**. Internally, the Forum keeps updating news on the **website** (www.kampoenglaweyan.com), **online shops** or **Facebook** (social media website). I have already publicized them all.

8) What are the common perceptions shared either in Kampung Laweyan or wider Surakarta region regarding batik industry preservation efforts?

It is good enough in terms of their support. The only problem perhaps **not all batik firms have equipped with IPAL**. It is classical problem, particularly when the liquid waste pollutes neighbours' drinking water sources. Secondly, we need to think of **traffic management** in Laweyan resulted from the increasing tourists as well as **parking area** which currently occupies side roads. How we can solve these problems? *Insyallah* in the future there will be provided public parking area in the **Kabangan Market** located in the northside of Kelurahan Laweyan site. In general, they have approved (this plan).

9) Are there any obstacles and rejections from the public against those efforts? If any, how those actors cope with these situations?

Nggih, ee...yeah there is **no frontal disapproval** (from the public), but sometimes they are complaining about **uncomfort situation** like noisy guests. But it is only a few of them (acting like this). Ee...this is because the fact that following the increasing visitors to Laweyan, there will be some problems arises such as neighbourhood's **cleanliness and safety**. Yeah we have to anticipate it earlier by managing our site ideally in terms of how to increase **economic viability** without disturbing **social neighbourhood**. Therefore, we continue discussing to find out proper solutions.

10) Are there any formal and informal meeting forums hosted to further batik industry development in Kampung Laweyan? Please explain how these forums take place to effectuate local batik industry development!

Nggih, ideally in the future it should be like that (agreeing the statement above). Starting from *kelurahan* level, ee...we can discuss together with **community based organisations**. We can find out **proper solutions** for any problems resulted from **tourism development programs**. However, this cannot be realized perhaps caused by **the Forum's dominance** in actualizing tasks and responsibilities. There is no...no regular meeting to effectuate **duty sharing** across the members. But *insyaallah* in 2012 we will start sharing duties more properly. Thus, because this is our common problem, so we have to solve it together.

11) Do you think that the existing institutional pattern sufficient to accommodate batik industry development needs properly? Please give your comments and suggestions regarding its further improvement!

Oh *nggih*. Ee...(the role of) **FPKBL is not effective** yet in developing tourism site of Laweyan. This is because we do not have organizational regulation. *Nggih*, yes...we are still creating such **internal rules of the game** (AD/ART) to consolidate our members. Secondly, **many board members are inactive** even though their duties and responsibilities have been clarified. Another problem is related to **synchronization with other social organisations**. In the future, we have to improve this better, including communication with government agencies such as ee...Bappeda and FEDEP...which required to be improved further.

Notes related internal problems of FPKBL:

We are facing the gaps between entrepreneurs, not between FPKBL board members. It is uneasy to reconcile different visions and missions of them. We have tried to bridge this situation by positioning ourselves in the middle of interest groups. Actually the problems rest on miscommunication. But in general *alhamdulillah* the organization can run based on business ethics even though the reward-and-punishment rules are absent. Furthermore, we cannot apply such mechanisms strictly like profession organization if one day we will have provided it. We cannot sanction our members like what KADIN (*Kamar Dagang dan Industri* or the Chamber of Trade and Industry) does, for instance. Our members are our neighbours or family relatives. Once a member makes a mistake, we cannot punish him/her straightaway. Everyday we meet each other. So it should be better approach similar to reward-and-punishment mechanism. Thus, yeah...hehehe (*chuckling*) we cannot apply this strictly. *Nggih*, there is one of the most influential senior citizens namely Mr. Sulaiman who often helps us to mediate conflicts of interests wisely.

Annex H2. Contoh Transkripsi Wawancara (Bahasa)

TRANSKRIP WAWANCARA PAKAR		Kode : EXP-INT_LWY01
Hari Wawancara : Kamis	Tanggal : 22 Desember 2011	
Waktu Wawancara : Sore hari pk. 14:01 – 15:17	Durasi : 1 jam 16 menit 17 detik	
Lokasi Wawancara : Beranda rumah Ketua FPKBL Bpk. Alpha Febela		
Nama Responden : Arif Budiman Efendi		
Jenis Kelamin : Laki-laki	Umur : 44 tahun	
Posisi : Pengelola media teknologi informasi FPKBL		
Pekerjaan : Internet marketer		
Alamat Rumah : Jl. Nitik No. 3 Laweyan, Kota Surakarta		
No. Telp / HP : (0271) 712 072	Email : arif@kampoenglaweyan.com	
Alamat Kantor : Jl. Dr. Rajiman No. 565 Laweyan, Kota Surakarta		
No. Telp / Fax : (0271) 718 722	Email : N/A	

BAGIAN A : Sejarah Perkembangan Industri Batik

1) Apa yang Anda ketahui tentang sejarah perkembangan industri batik di Solo? Mohon dijelaskan (periodisasi) pasang surut perkembangannya sejak awal berdiri hingga saat ini!

Ee...kita mulai aja di Laweyan aja ya Pak, ee...karena Laweyan lebih dulu dari Solo. Kami ee...abad XV era **Pemerintahan (Kerajaan) Pajang** itu ya sekitar **1546** itu kan ee...ada tokoh namanya Ki Ageng Henis, beliau adalah keturunan (Raja) **Prabu Brawijaya V** datang ke Laweyan pada saat itu beliau juga ketemu juga dengan apa...**Sunan Kalijaga**. Setelah ketemu Sunan Kalijaga masuk Islam, ikut juga membantu syiar agama Islam selain itu beliau juga mengajarkan **teknik pembuatan batik** di...pada **orang-orang di Desa Laweyan** tersebut. Ee...sejak saat itu Laweyan yang dulunya terkenal dengan **industri tenun**, katakan "**lawe**" itu kan dari kata benang ya, berkembang dari industri tenun biasa terus ke ee...ada perintisan ee...**industri batik** sejak saat itu. Ee...abad XV terus berkembang sampai **puncaknya** itu era **KH Samanhudi**, tokoh pergerakan SDI ya (Serikat Dagang Islam), itu pada saat itu ditemukan namanya teknologi ee...batik dengan menggunakan **cap** dengan lebih apa ya lebih cepat, otomatis biaya lebih ekonomis (sehingga) pada masa itu Laweyan mencapai kejayaannya. Masa keemasan terus berlanjut sampai tahun **1960an** kami masih terus berjaya. Lha era tahun **1970** kita kedatangan **teknologi printing** ya, dengan teknik sablon tersebut ee...di sekeliling Laweyan itu kan ada namanya **Batik Keris** itu apa tempat printing yang cukup besar. Sejak saat itu kan ee...karena

printing dengan biaya pembuatannya yang sangat murah sehingga dijual murah menyaingi **batik tulis dan batik cap**. Pada saat itu mulai **berguguran** satu per satu ee...usaha batik di Laweyan sampai terus tahun 1970 sampai era sekitar **tahun 2000** itu hanya kemarin menyisakan sekitar 4 usaha atau 4 industri batik aja, jadi kan hampir musnah...*inggih inggih*. Terus ya...seperti beliau **Pak Sulaiman** dan rekan-rekan lain itu kan berinisiatif bagaimana Laweyan yang dulu pernah jaya sekarang bisa dikatakan hampir-hampir habis ya itu, bagaimana supaya bangkit kembali ee...Pak Sulaiman dan beserta tokoh-tokoh batik lainnya dari bawah inisiatifnya dari bukan dari pemerintah tapi dari masyarakat sendiri bagaimana menggerakkan apa sektor industri batik apa bersinkronisasi dengan unsur pemerintah maupun swasta dan berbagai pihak lainnya bagaimana bangkit kembali dan mengembangkan apa potensi batik Laweyan sehingga ya...mimpi kami bisa kembali ke masa kejayaan. Ya alhamdulillah...rentang waktu 2004 sampai sekarang itu kan supportnya kami terus disupport, kami juga terus mengkonsolidasi dari dalam ya alhamdulillah sampai sekarang tidak hanya batik sebagai apa ee...bisnis utamanya tapi sudah berkembang menjadi kawasan wisata. Meskipun core businessnya batik, jadi ada batik yang berkembang terus, ada industri kuliner, ada industri-industri pendukung lainnya seperti mebel juga ada, ya itu alhamdulillah sampai sekarang. Kalau dulu kami ee...jualan batik kita kan tempat apa dititipkan ke **Klewer, Pasar Tanah Abang** dan tempat-tempat lain, sekarang ditambah pergerakan kan ditarik istilah ee...wisatawan yang berkunjung ke Laweyan.

2) Bagaimana peran industri batik di Solo terhadap pembangunan daerah selama ini?

Ee...kalau Solo kan selain apa **salah satu ikon** ya, industri Solo kan cukup kental nuansa batiknya Solo sebagai salah satu kota batik otomatis kan istilah **produk unggulannya** salah satunya kan batik cukup besar juga. Hmm...*inggih* kalau istilah **sentral utama batik di Solo** itu kan ya jelas kan Laweyan, yang kedua kan ada juga dari Kauman meskipun nggak sebesar Laweyan. Ya...kalau kita berbicara batik, batik Solo, itu otomatis ya **sangat dominan nuansa Laweyannya**. Ya itulah...

3) Menurut Anda, bagaimana peluang, tantangan dan hambatan yang dihadapi dalam pengembangan industri batik Solo dari dulu hingga sekarang?

Ya...**peluangnya cukup besar** karena kita sudah disupport dengan sejak apa isu dulu **batik Malaysia** kita terus sudah mendapat **pengakuan UNESCO** itu peluangnya cukup besar, terutama dari segi market dalam negeri kan Indonesia kan dengan ratusan juta kita itu kan **pasar terbesar di dunia batik**, karena di sini kita memang asal-mula batik. Ee...tantangannya kalau kita apa secara bisnis kan kalau di mana-mana di **berbagai penjuru nusantara** mulai bangkit dengan batik mengambil motif...motif apa ya, **ciri khas** masing-masing *inggih*, terus tumbuh batik di mana-mana itu mesti ada...ada semacam ketakutan *inggih*, di mana sampai **titik jenuh** segala macam. Ya kalau batik dianggap sebagai **ekonomi** belaka, itu kan nanti suatu saat bisa jenuh tapi kalau "**batik plus**" lha itu yang bisa meng...ya apa ya...me...apa ya...**mengabadikan industri batik**, artinya industri batik tersebut sampai berlangsung lama. Contoh di Laweyan, Laweyan itu kan selain batik di sini kan ada **kekayaan heritage, cagar budaya**. Kalau itu bisa dilestarikan, itu sangat memperkuat karena ya...kalau hanya batik kan tadi takutnya jenuh kan kalau ada batik wisata karena heritage, di sini ada **wisata pendidikan** kami seringkali mendapat kunjungan yah...adik-adik dari sekolah SD sampai

perguruan tinggi itu sering kami mendapat kunjungan, berarti itu kan wisata edukasi, berarti kan tidak hanya batik tetapi ada juga penelitian sejarah macam-macam, lha itu kan istilah memperkaya apa...kekuatan kami dalam apa wisata batik tersebut.

4) Apa saja inovasi dan program-program yang telah dilakukan untuk memajukan industri batik Solo? Mohon dijelaskan sejauhmana keberhasilan usaha-usaha tersebut!

Ee...**inovasi** yang pertama kalau secara perusahaan-perusahaan itu kan yah...kekuatan apa **motifnya** yang **selalu up to date** *nggih* itu kan salah satu kekuatan bersaing di market, *nggih*. Itu...terus inovasi yang lainnya tentunya kami **berintegrasi** dengan yang lainnya apa...batik plusnya tadi bagaimana menciptakan suatu **paket wisata** yang semakin hari semakin menarik, untuk menarik pengunjung, kaitannya tadi sejarah bagaimana ee...kami punya **situs-situs bersejarah** tetap dirawat semakin baik, terus ada **infrastruktur** ee...bagaimana memperlancar mereka bisa masuk Laweyan dengan lebih nyaman, lebih aman. Dan terus kami juga me...apa ya...**memperkuat ke dalam** artinya ya kami kan suatu ee...apa ya...ee...**kawasan wisata** yang sedang berkembang artinya tidak belum semua apa pelaku pariwisata, baik langsung maupun tidak langsung itu memahami ini suatu kawasan wisata yang berkembang pasti ada menimbulkan apa ya...berbagai macam masalah, bagaimana itu bisa diselesaikan. Ke dalamnya kami juga ber...apa **sinergi** dengan ee...pihak-pihak rekanan kami, misalkan dari **ASITA**, dari **pemerintah** gimana ya ee...kawasan Kampung Batik Laweyan ini tidak hanya bertahan tapi terus dikembangkan bersinergi dengan daerah sekitar, tapi juga bersinergi dengan ya banyak pihak ee...unsur **pemerintah**, juga unsur **akademisi** dari universitas-universitas yang sekitar Solo, juga kami sudah bersinergi menciptakan misalkan batiknya tadi ee...tidak hanya **batik sintetis** yang sekarang jalan, tapi bagaimana mengembangkan **batik warna alam** itu karena kita sudah apa ya...karena **isu lingkungan** itu kan sorotannya luar biasa, bagaimana meskipun kami sudah punya **IPAL**, lha bagaimana IPAL tersebut bisa ee...mengakomodasi kan **kapasitasnya masih terbatas**, bagaimana ini bisa apa **mengolah industri**, seluruh limbah industri Laweyan. Ya...banyak kami juga terus ee...**berpromosi** gimana Laweyan semakin dikenal semakin yah...banyak orang tahu, makin banyak ke sini ee...kira-kira demikianlah yang kami lakukan.

5) Bagaimana peran Kampung Batik Laweyan dalam mendorong kemajuan industri batik Solo? Mohon dijelaskan kinerja industri batik Laweyan selama sekurang-kurangnya 10 tahun terakhir!

Sepuluh tahun terakhir...yah kami bisa dikatakan bangkit lagi ini kan **tahun 2004** kami **canangkan** istilah **Kampung Batik Laweyan**, terus itu juga **menginspirasi daerah lain** baik itu di daerah Solo sendiri maupun di seluruh nusantara sehingga sekarang muncul **kampung batik** yang lain-lain, yaitu pertama menginspirasi bagaimana ee...bahwa batik bisa sebagai ya trigger lah menciptakan daerah-daerah wisata apa di tempat lain, yang terus selanjutnya kan ee...inovasi mmm...mmm...mmm...ya kami juga sering apa **ikut pameran-pameran**, itu memberikan inspirasilah. Kami juga sering dimintai apa ya...sebagai **studi banding** banyak komunitas-komunitas yang sering ke tempat kami itu yah...kita sharing tentang bagaimana **mengembangkan kawasan** terutama kalau kami kan sempat bisa dikatakan ya...hampir nol, ya bagaimana kami bisa memberikan inspirasi daerah lain, baik itu yang daerah lain yang mengalami nasib yang sama artinya pernah berjaya atau sampai hancur mau

bangkit lagi, atau mau juga kami ee...di Jakarta juga kemarin membantu daerah ee...terciptanya suatu kampung batik di sana **Kampung Batik Palbatu**, ya kami memberikan yah...semacam **konsultasilah** bagaimana mengembangkan suatu kawasan apa...bagaimana...bahkan itu apa di Jakarta sendiri kan kampung batik itu kan sudah nggak ada ya. Karena di sana kalau nggak salah Kebayoran, **Kebayoran Lama** itu dulu pernah ada tapi sekarang karena satu lain hal memang ya sudah nggak ada lagi, terus ini diciptakan lagi Kampung Batik Palbatu dengan mengambil suatu daerah wilayah yang mirip-mirip Laweyan. Artinya perkampungan penduduk biasa yang yah...apa yang enak untuk yang istilahe proyeksi ke depan mau dijadikan **kampung wisata** juga. Kira-kira demikian.

6) Apa saja kendala yang pernah dihadapi Kampung Batik Laweyan dalam memajukan industri batik Solo secara keseluruhan? Lalu apa saja solusi yang pernah dilakukan serta bagaimana dampaknya terhadap industri batik pada umumnya?

Nggih...kalau **kendala** awal kalau ee...kita dulu kan sempat **hanya tinggal empat** terus muncul-muncul pendatang baru lainnya, baik itu dulu mungkin ada unsur keturunan, artinya dulu mbah saya katakan pernah industri batik sekarang bagaimana menginspirasi maupun istilahe muka baru, artinya keluarganya nggak ada sejarah industri batik tapi juga ikut ter...apa...terinspirasi untuk me...berusaha di bidang batik itu kalau industri kecil kan terutama tentang masalah **permodalan** nggih, permodalan itu bagaimana terus kita **bersinergi** dengan pihak **BI** dan perbankan lainnya, bagaimana bisa mengucurkanlah permodalan dengan ya...sedikit lebih **lunak** lah. Itu kaitannya ada permodalan, segi **kemampuan** katakan ee...teknik pembuatan batik kami juga sinergi dengan **Departemen Perindustrian**, kami sering menerima **pelatihan-pelatihan**, yaitu pelatihan **pembuatan batik**, pelatihan **manajemen perusahaan**, pelatihan **web design** dan aneka macam pelatihan lainnya. Itu dapat bantuan dari pemerintah...selain itu kemarin pernah juga mendapat bantuan **peralatan produksi** semacam yah...kami juga mendapat **bantuan langsung dari pemerintah**.

BAGIAN B : Ihwal Keberadaan Kampung Batik Laweyan

1) Apa yang Anda ketahui tentang sejarah perkembangan Kampung Batik Laweyan? Mohon dijelaskan (periodisasi) pasang surut perkembangannya sejak awal berdiri hingga saat ini!

(Tidak ada tambahan informasi)

2) Bagaimana peran industri batik di Kampung Batik Laweyan terhadap kesejahteraan para pelaku usaha dan masyarakat Laweyan pada umumnya?

Nggih...ya...ee...dengan **munculnya** industri-industri batik di Laweyan kita bergerak lagi otomatis itu kan juga **menyerap tenaga kerja**. Semacam Pak Alpha ini ee...yang jaga showroom itu kan **tetangga-tetangga** itu memang kami ada ya bisa dikatakan ya kita **CSR** ya...minimal ya tetangga dijawab bisa

masuk sebagai apapun posisinya, itu yang pertama. Yang kedua, dengan tumbuhnya industri batik ada yang mulai buka **showroom**, itu juga memberikan apa ya...**rangsangan** bagaimana **industri yang lain** juga ikut terangkat, macam kuliner ya otomatis karena banyak tamu-tamu sering ke sini kami juga sering menerima kedatangan rombongan itu kan butuh snack segala macam, butuh makan siang segala macam, otomatis mereka juga **ikut kebagian** yah kue...**kue wisatanya**. Mereka juga ikut mendapat ya apa...secara **ekonomis** ikut diberdayakan juga ee...selain itu kan ya banyak-banyak selain kuliner, ada juga di Laweyan kan tadi saya sering menerima rombongan otomatis ada yang punya "**pendopo**" longgar ya ada juga yang disewakan, ada homestay juga ikut ya...mulai mereka oh pikir ini ada peluang baru dan banyak industri lainnya semacam percetakan, packaging segala macam itu yah...terus ordernya kita tambah, kenapa tidak tetangga sendiri ya ikut terangkat. Kira-kira semacam itu.

Yah...pada tahun 2000an terutama pengusaha batik Laweyan itu yang...yang tersisa, jadi **sebelum 2000** atau sampai 2000 itu kan **sifat** ee...**pemilik batik** apa Laweyan itu kan masih **tertutup**, nggak seterbuka ini. Ini gara-gara Laweyan dijadikan wisata mereka jadi terbuka. Dulunya "**regol**", itu lho pintu depan itu tertutup rapat. Hanya apa...kalau ada orang ketuk pintu, dibuka kecil itu siapa kira-kira kenal, ya lapor dulu sama "**juragane**" boleh ndak ini. Kalau boleh...ya semacam itu. Dulu kalau tertutup terlihat jelas dengan **tembok-tembok yang tinggi** ya tertutup rapat. Ya emang kami ee...sifat ya...agak tertutuplah itu memang sebelum proses 2000-2004 sekian-sekian itu ya kalau adik-adik mahasiswa mau ke tempat kami ya tanya, mereka kan mindsetnya Laweyan tertutup. Ya ini sudah mulai terbukalah. Kita kan setiap hari ada bus rombongan yang segala macam kan lama-lama orang yang tertutup, tetangganya terbuka kok **tambah laris** o berarti kan harus **berubah diri** segala macam ya dulunya industri batik saklek segala macam, sekarang **industri batik plus**, artinya kita kan ya seperti Pak Prihadi ke sini mau penelitian kan apa...orang yang ingin melakukan penelitian itu memang tidak mudah.

Tidak semua pengusaha batik terbuka dengan peneliti. Itu memang kami akui ya saya yang biasane saya rekomendasikan itu yang sering-sering aja sudah terbiasa dengan penelitian. Ya...secara umum mereka sudah membuka diri dengan penelitian, pihak pemerintah melakukan pendampingan, pelatihan itu kadang-kadang ya tidak mudah juga. Ini ada program pemerintah mau membantu Anda, kok Anda hehehe...ada yang juga wah nggak perlu ya **monggo**, kan ee...kebanyakan dulunya Laweyan kan ya meskipun mereka sudah membuka showroom, masih kebanyakan dulunya mereka nunggu **thok** hanya jaga gawang aja tinggal nunggu tamu.. Tapi sekarang kan dengan era teknologi informasi harus ee...giat pameran, giat me...apa mengirim brosur ke mana-mana ikut yah...bagaimana dia juga harus membuat website itu kan mereka semakin terbuka.

(Sebelum 1970an pada masa keemasan) *nggih*, oh ya tertutup sekali. (Bagaimana mencapai keemasan kalau sifatnya tertutup) Yah karena bisa dikatakan ee...**batik perintisnya** kan juga dari Laweyan. Itu kan nah ee...di **pasar Laweyan sangat dominan**. Jadi di tempat kami dulu ada **tokoh batik Cokrosumarto** mitra kerja **Bung Karno**. Jadi **eksportir batik pertama** itu dari Laweyan. Ya itu...karena mereka ya ulet dan mungkin karena ya perintis tadi menguasai pasar, tapi ya masih dalam kondisi tertutup suatu ketika ada keterbukaan **teknologi printing** masuk **blek**, mereka ada yang apa...kebanyakan ternyata belum bisa mm...apa ya belum bisa merubah dirinya untuk mengantisipasi tersebut ya...hehehe banyak yang hancur juga. Sekarang lain dengan ee...**2004** sampai sekarang kan banyak juga **pendatang baru** yang **manajemen** muda, dengan **keilmuan** yang ya cukup bagus, dengan **keterbukaan** mereka ya semacam nanti bisa ketemu baik Pak Alpha, Pak Gunawan itu kan sosok manajemen muda yang dengan ya kekuatan keilmuan, dengan **adopsi teknologi informasi** mereka bisa dengan percepatan yang luar biasa bisa yah...suksesnya cukup

bagus. Kalau kita lihat aja di...pemberitaan di TV hehehe...kita kan sering ketemu Pak Alpha lewat itu kan salah satu kecanggihan meskipun dari segi ilmu batiknya masih kalah dari yang lain. Kan jadi baru tahun 2004 itu launching FPKBL, Pak Alpha pada waktu itu belum jadi pengusaha batik tetapi didhapak tek jadi ketua. Gara-gara jadi ketua, baru 2005 usaha batik. Lain dengan Bu Yuli. Bu Yuli itu memang ada warisan dari turun-temurun ee...orang tua Bu Yuli meninggal tahun 1980an sempat off. Tapi Bu Yuli kan fokusnya di jadi dosen. Ya itu...2005 sampai sekarang Pak Alpha yah...bisa nikmatilah hasilnya dengan percepatan teknologi informasi, baik itu televisi maupun website itu sangat-sangat membantu sekali.

3) Apa saja fasilitas-fasilitas bersama yang telah dibangun untuk memajukan industri batik di Kampung Batik Laweyan?

Hmm...sementara kayaknya belum ada, baru **IPAL** itu aja. Yang lain-lain apa semacam kami kan punya **mimpi** idealnya kan punya **marketing center**. Ya katakanlah ada rombongan apa...kunjungan suatu rombongan, mereka kan nggak mungkin langsung merata berkeliling ke berbagai penjuru kan karena keterbatasan waktu segala macam. Idealnya kan dilengkapi dengan marketing center, seluruh pengusaha di Laweyan nitip ke situ itu kan jadi satu, sehingga jika mau ditindaklanjuti kan oh...lebih memudahkan. Ke depannya kami ya ingin punya marketing center. Ya ini kan nggak tau masih alot hehehe...karena mimpi kami, kami dibelikan se...apa...suatu lahan kami bisa yah **mempromosikan** seluruh **aset Laweyan** di situ. Kalau yang dirintis setelah IPAL, sebenarnya itu...ya kantor kami yang **Laweyan IT Center**. Itu kan ya ini kemarin baru yah...dirintislah. Ke depannya itu menjadi suatu **kantor bersama**, artinya bagi para pengusaha batik Laweyan yang ingin disupport lewat sumber informasi. Awalnya memang karena **marketing**, kedua kami akan mengembangkan bagaimana **desain-desain batik** lewat jalur **software** itu lho. **Batik fractal** semacam itu ya kami terus mengkomunikasikan kemarin. Kami juga mengadakan **mini seminar**, bagaimana **mempercepat** tadi apa...**inovasi teknologi** untuk **peningkatan daya saing** lewat desain-desain yang yah sistematis membuatnya cepet sekali. Ya itu kan memang tidak mudah. **Mindset** mereka kan kebanyakan **masih manually**, paling-paling ya di...istilaha **didandakke** di tempat lain, apa dibuatke di tempat lain bagaimana idealnya di sini kan juga ee...ada desainer-desainer yang handal. Tapi lha ya bisa adopt teknologi informasi kan cepet sekali, dan yah variannya cepet sekali cepet banget pakai software-software. Ya ke depannya itu Laweyan IT Center mau kami terus kembangkan. Dan kayaknya 2012 ini ee...**kelurahan** kan mau dipugar, kemungkinan marketing centernya akan ditempatkan di sana, juga ada **meeting roomnya** sehingga tiap kali ada tamu nggak usah perlu nyewa kan di sana kan sudah...sudah all in one semacam itu.

Kami juga punya mimpi kami ingin punya **museum**. Yah semacam Pak Alpha dan temen-temen ini kan masih punya **peninggalan-peninggalan** ini kan yah..."**museum pribadi**" mereka bagaimana dijadikan satu memperkuat dunia pendidikannya bagaimana, ya pelajaran bagaimana pernah jaya, pernah hancur, sekarang sedang bangkit kembali kan bisa terbuka untuk umum kan kita sama-sama sharing. Ya sementara baru masing-masing pribadi punya museum-museum kecil. Iya ini kami juga sudah baru sebatas wacana ee...mudah-mudahan supportnya segera terlaksana ee...apa terjalin nggih, dari berbagai pihak pertama tadi kami sebenarnya punya apa...namanya **BTC**, Batik Traning Center, itu memberikan **edukasi tentang batik**, bagaimana belajar membatik dan ee...pengembangannya ini yang sering kami terima kan yaitu dimulai dari sekolah-sekolah sampai perguruan tinggi itu kan ya mereka ingin tahu belajar tentang **sejarah batik** dan segalanya. Ada juga

yang ingin mencoba belajar batik, baik yang **kursus singkat maupun kursus intensif**. Ee...kebiasaan kami yang karena kami keterbatasan tempat tadi ya paling-paling **dipecah ke beberapa tempat**. Misalkan Pak Alpha mampunya 50 orang atau berapa, lha itu kan dari masing-masing pengusaha tersebut semampunya mereka itu. Jadi para tamu atau rombongan belajar langsung ke perusahaan-perusahaan. Ke depannya kami juga ingin semacam tadi di...kalau memungkinkan di kelurahan itu juga selain tadi ada meeting room, marketing center jadi ada semacam workshop batiknya itu...semacam itu. Ya ini sedang...sedang kami perjuangkanlah **support pemerintah**.

Kalau semacam tadi ada **gudang bersama**...tadi kaitannya dengan stok-stok batik itu, sampai sekarang kayaknya belum...belum ada wacana ke situ karena kan kami masih berproses. Pertama, kan **FPKBL** dulu dijadikan apa seiring waktu kan masih sedang **konsolidasi**. Ada berbagai **sekat-sekat** yang kami ya...kurangi paling tidaklah karena masih konsolidasi. Tapi yang jelas kan yang urgent sekali yaitu tadi **marketing center, workshop** terus **meeting room**. Kalau untuk gudang bersama sementara ini kami belum terpikirkan. Tapi ya kenapa tidak kalau itu memang perlu, terutama kan malah kaitannya dengan pengusaha-pengusaha kecil, malah perlu dibantu kan? Kalau yang besar-besar sih biasanya kan sudah punya stok hehehe...

Ee...batik training center sementara ini belum punya kantor yang pasti karena ya seperti tadi keterbatasan tempat ya...berpindah-pindah aja, artinya misalkan ada event 100 oo...ini mungkin gantian di tempat ini, pindah nunut di perusahaan-perusahaan batik. Semacam kalau saya kemarin 100 orang ya sini sama tetangga sebelah, pinjam tempat semacam itu aja. Jadi belum ada tempat yang spesifik untuk workshop.

4) Apa saja bentuk-bentuk partisipasi dan kerjasama di antara pelaku industri batik Laweyan baik dalam memajukan usaha, memperbaiki kondisi lingkungan maupun meningkatkan kerukunan, kebersamaan dan gotong-royong warga secara keseluruhan?

Kalau untuk **kerukunan**, kami sebenarnya ada event namanya **Selawenan**. Itu suatu event tiap tanggal 25 malem itu berpindah-pindah. Itu kita yah...diskusi bersama, kita silaturahmi ada **pergelaran budaya** lha kita mengangkat berbagai macam apa isu-isu kaitannya dengan budaya yah...berbagai macamlah. **Sayang** beberapa (tahun) terakhir karena kehabisan peluru **sempat off** berapa tahun, pertama itu. Kami juga sedang ber...apa ber...menjalin **sinergi** dengan berbagai pihak baik itu dengan **kelurahan, LPMK** tadi maupun yang lain-lain, gimana Laweyan yang sedang bergerak terus menuju suatu **wisata unggulan Solo**, ini bagaimana terus **dibenahi secara bersama-sama** lintas sektoral tadi, baik itu keamanan dan berbagai macam yang terus apa ya...oo...terus ada berbagai masalah yang terus kita pecahkan bersama. Ya itu kami terus bersinergi dengan apa ya...organisasi kemasyarakatan tersebut.

Terus untuk kaitannya dengan **promosi**, kami juga sering mengadakan promosi bersama dari berbagai ya...meskipun belum semuanya karena kami sedang berproses, baru sebagian dari apa...pengusaha batik Laweyan itu kan ikut promosi bersama apa...kaitane dengan **ASITA** dan pameran bersama, kami kan mendapat jatah dari **Disperindag** terus disupport. Kami ya pameran bersama, terus kaitane dengan perawatan lingkungan kami punya di...jalan-jalan ada peta berbagai macam itu kan biasane kami juga ya urunanlah bagaimana merawat hal tersebut. Kira-kira semacam itu. Yah...belum belum rutin, ya tergantung kebutuhan. Oo...misalkan sudah dilihat petanya perlu diganti, ayo kita urunan semacam itu meskipun ya...belum semua pihak tergerak. FPKBL sendiri kan belum solid. Kami terus konsolidasi ke dalam.

5) Bagaimana kondisi persaingan di antara pelaku secara umum? Mohon dijelaskan pola-pola persaingan yang berlaku, berikut manfaat dan kerugiannya!

Kalau **persaingan biasa aja** nggak sesuatu yang apa ya sangat fatal ndak, dalam artian ya saling merugikan tidak. Kami kebanyakan kalau industri pelaku usaha batik di Laweyan yang berlaku **basis produksi** masing-masing punya **ciri khas** masing-masing. Misalkan Pak Alpha dengan ciri khas kontemporer, Pak Sulaiman dengan ciri-ciri yang batik massal – batik produk massal, Pak Gun mengambil batik tulis dan cap dengan ya sektor apa...pangsa pasar menengah ke atas itu. Jadi masing-masing tidak saling merugikan karena **pangsanya berbeda**. Bahkan apa ee...saling mengisi. Misalkan Pak Alpha nggak punya produknya bisa mengambil di...apa bisa diisi dari tempat lain, semacam itu saling menguatkan. Yang terjadi paling-paling kalau mereka basisnya hanya pedagang. Ya...suatu ketika kan karena pedagang kan ambil dari tempat lain, ternyata di sini juga ambil tempat sama ya...terjadi persaingan harga di situ. Jadi sampai sekarang persaingan ya...masih biasa-biasa saja wajar nggak ada suatu yang apa...ya frontal terus saling melemahkan ndak. Ada sih di tempat lain bukan di Laweyan. Itu ada juga karena basic mereka kan lebih banyak pedagang dan sangat dominan pedagangnya. Jadi itu persaingan harganya dalam tanda petik ya ada ngeri. Selisih seribu aja bisa lari ke tetangga hehehe...tapi alhamdulillah di Laweyan tidak. Ya **masih dalam batas kewajaran**. Hanya yang perlu kita pikirkan bersama forum dengan berbagai pihak lainnya me...memeratakan distribusi pengunjung itu bagaimana tidak hanya daerah strategis saja, tetapi juga ikut ke dalam itu seperti apa. Ya paling-paling itu yang terus kami usahakan bagaimana mereka yang meskipun di tempat terpencil itu ikut juga menikmati ya enaknyanya **ekonomi wisata** hahaha...batik ini.

6) Menurut Anda, bagaimana peluang, tantangan dan hambatan yang dihadapi dalam pengembangan industri batik Laweyan dari dulu hingga sekarang?

Kalau **tantangan dari dalam** ya itu kan masalah kami **sedang berproses** pemahaman bahwa ini suatu kawasan yang sedang berkembang itu, **pemahaman masyarakat** itu. Terus kita mengadakan **sosialisasi** bagaimana **menjaga kerukunan**, bagaimana menjaga bahwa ee...ini kan kebersamaan tamu bersama akan apa..ya itu bagaimana **dikelola** secara baik tamunya. Terus tantangan yang lain ee...bagaimana **meningkatkan daya saing Laweyan**, mempertahankan bahkan meningkatkan dibanding daerah lain. Seperti kita tahu batik ada di mana-mana, terus misalkan dari segi **aset utama Laweyan** itu salah satunya **heritage** bagaimana **rumah-rumah kuno** terus dipertahankan itu kan tidak semua orang di sini paham, mau mengerti bahwa justru kekunoannya itu menjadi potensi utama. Kalau Laweyan dibuat semacam Jakarta malah hilang daya tariknya, semacam itu. Terus ke depannya semacam tadi **edukasi**, bagaimana lewat jalur edukasi itu dikuatkan. Jadi semacam **BTC** diperkuat bagaimana edukasi batiknya itu betul-betul seperti yang kita inginkan bisa mencerahkan berbagai pihak oo...ini batik ee...batik sebagai budaya kita itu terus kita kembangkan.

Selain itu tantangan yah perawatan...**perawatan** apa ya **infrastruktur** itu kan jadi **beban** juga ya. Yah misalkan tanda apa jalan, terus apa ee...saluran air, saluran IPAL itu bagai macam apa sarana itu kan pe...apa perawatannya juga tidak mudah dan mahal. Lha itu gimana hal tersebut bisa secara bersama-sama di...apa ya diatasi oleh intern tersebut dan bagaimana kita bisa juga **bersinergi**

dengan **berbagai pihak** karena ee...daerah wisata itu kan nggak bisa dibatasi. Otomatis kita berkembang, kita juga harus memberikan **dampak positif** terhadap lingkungan sekitar kita. Bagaimana kita bisa bersinergi dengan mereka, saling menguatkan, ya itu tantangannya.

Ya terus tantangannya kita juga *ketamon* banyak **investor** ke sini. Investor kan kalau hanya sekedar profit itu kan hanya jadi masalah juga hahaha... Bagaimana itu kita **mengatur** ke depannya hubungan antara berbagai pihak, pelaku industri tersebut supaya **harmonis**, saling **menghargai**, saling **menguatkan**, ya kira-kira semacam itu. *Nggih, nggih* dengan support dari berbagai pihak kita terus bersinergi bagaimana itu **terjalin dan terus meningkat**. Yah secara sebagian besar sudah paham, hanya kita kan terus mendekati dari katakanlah sekolah-sekolah yang belum paham ya...dan intinya tadi kan bagaimana suatu **daerah wisata yang berkembang** itu kan tidak hanya sekedar jadi **tontonan**. Artinya mereka juga ikut mendapat **limpahan ekonominya** itu kan *nggih*. Kalau hanya sekedar merasakan macetnya ya buat apa. Intinya mereka kan juga ikut terbantu baik secara langsung dan tidak langsung. Oo...jadi setelah di kawasan wisata jadi semakin ramai, semakin tertib bukan kriminalnya, ndak. Lha ini kan harusnya kita musyawarahkan bagaimana kawasan wisata tersebut **cukup aman dan nyaman**, baik itu pelaku sendiri maupun tamu itu idealnya kan harus kita usahakan bersama.

7) Apa saja inovasi dan program-program yang telah dilakukan untuk memajukan industri batik Laweyan? Mohon dijelaskan sejauhmana keberhasilan usaha-usaha tersebut!

(Tidak ada tambahan informasi)

BAGIAN C : Kelembagaan dalam Pengembangan Industri Batik

1) Siapa saja individu, kelompok maupun organisasi yang berperan dalam pengembangan industri batik Laweyan maupun Kota Solo pada umumnya? Mohon dijelaskan bagaimana peran dan kedudukan masing-masing aktor tersebut!

Kalau di Laweyan itu idealnya memang bukan hanya **FPKBL** ya, ada **LPMK**, ada juga **PNPM**, ada **PKK**, ada **Kelurahan**. Kelurahan dan berbagai macam organisasi kemasyarakatan lainnya itu bagaimana idealnya **bersinergi**. Yang sementara ini kan yang masih **sangat dominan FPKBL**-nya. Ya ke depannya insyaallah tahun 2012 kami mulai apa ya bersinergi dengan mereka, me...lebih memantapkan bagaimana sharing-sharing apa tugas-tugas ee...me...meningkatkan apa peran-peran mereka masing-masing dalam meningkatkan apa ee...**wisata batik di Laweyan** tersebut. Sementara ini ya di Laweyan sendiri masih dominan **FPKBL**. Ee...kalau ee...di Solo kami jelas mendapat mitra kerja kami kan ada dari **Disperindag**, **Dinas Koperasi**, **Depnaker**, terus ada juga dari **Solo Techno Park**. Dari Pemkot itu yang sering apa itu dari kantor **Bappeda**. Bappeda itu yang sering kami...ya Bappeda. Terus dari kalau dari Perguruan Tinggi kami juga mendapat support dari **UMS**, dari **UNIBA**, **UNS** juga. Kalau dari pusat kan ada juga kemarin dari **BPPT**, dari **Menkominfo**, dari **Dirjen Perindustrian**. Jadi selain dari lokal kami juga sering kontak dengan kementerian langsung dari pusat. *Nggih*, kalau sementara ini mereka belum ber...apa ya berpartisipasi secara banyak karena masih dominan **FPKBL**-

nya. Ini baru insyaallah tahun depan ini kita mulai bagaimana kita ya **sinerginya itu diperkuat lagi**, bagaimana itu apa **perluasan partisipasi** tidak hanya FPKBL yang kelihatan sangat dominan tapi perlu juga bantuan dari berbagai macam. Ee...kan sebelumnya ada PNPM, program PNPM dari pusat itu kan PNPM mandiri. Sebelumnya kan ada program yang belum masuk PNPM pariwisata ada itu, tapi belum masuk. Ini kita...kita link-kan ke sana sebenarnya kan banyak celah-celah yang bisa untuk memperkuat Laweyan. Ya sedang...sedang kita usahakan ke sana.

Terus terang di pengurus FPKBL sendiri kan ini namanya kan **organisasi kemasyarakatan**, di yang tertulis sama yang betul-betul bergerak itu hehehe...prosentasinya hehehe...**baru sedikit**. Lha itu kan ke depannya kita mau ee...iya sempurnakan lagi organisasinya, artinya merekrut pihak-pihak yang sekiranya mau bekerja secara aktif. Karena ke depan sebenarnya baaanyak sekali pihak-pihak dari pemerintah itu kan ee...maupun dari swasta yang siap membantu Laweyan. Tapi yang jadi pertanyaan kan ya...yang mau mengerjakan itu siapa. Laweyan itu kan tadi hehehe...masih kekurangan tenaga, sedang kita usahakan bagaimana partisipan diperbanyak, tidak hanya dari FPKBL sendiri tetapi juga dari PNPM maupun dari yang lain itu kan bisa sinergi, bisa yah sharing tugaslah hehehe...saling memperkuat, kira-kira semacam itu.

Oh kebanyakan mereka (**Dinas** memberikan) **pelatihan-pelatihan**, baik itu pelatihan kaitannya dengan **proses produksi, manajemen perusahaan, web design**, yah banyak sekali pelatihan. Ada juga dari **bantuan peralatan**. Kemarin insyaallah ini kan apa ee...dari **Pemkot** itu kan juga ada kemungkinan tahun 2012 ini kan ada pengembangan...ada program **pengembangan kampung wisata Laweyan dan Kauman**. Secara spesifik karena dua daerah tersebut mendapat **prioritas** sebagai **sentra batik** yang...yang unggulan dari Laweyan mereka itu kan mengandalkan dua daerah tersebut disupport bisa meningkat lagi, ya baik batik secara khusus maupun **kawasan wisatanya** mau disupport dari berbagai segi. Kami juga kemarin sudah melontarkan bagaimana IPAL-nya bisa disupport, ada marketing center, yah dengan apa...hal-hal yang sangat urgent untuk Laweyan ada itu apa-apa saja sudah kami sampaikan ke pemerintah. Ya kayaknya (bantuan pemerintah) tidak setiap tahun setahu saya. **Yang kalau pelatihan itu terus tiap tahun ada**. Tapi kalau bantuan yang berupa basic ya **alat-alat produksi** segala macam itu kayaknya tidak setiap tahun. Eh...kalau dari misalkan dari proses di Laweyan kan untuk membatik, untuk nyanting itu kan apa perlu. Kalau yang dulu kan paling sering pake **kompur minyak**. Kita tahu minyak mahal. Alternatif apa selain minyak. Itu dari pihak UMS ada yang meneliti misalkan sebagai **bahan bakar pengganti** pakai **ethanol**. Katanya lebih irit segala macem, tapi ada kurangnya. Itu kan asapnya bisa membuat keliyeng-keliyeng. Itu bisa mabuk wah...ya itu jadi masalah. Itu kan kemarin ketemu BPPT, oh ya ini kan mau di ada usaha dari BPPT membantu bagaimana caranya ya...itu tadi ee...alternatif selain minyak apa yang ekonomis, yang mudah ketersediaannya.

Terus perlunya inovasi misalkan **cap**. Cap yang kita tahu kan tek...tek...tek itu kan perlu apa ya ketelitian cukup tinggi. Ya presisinya bagaimana cap dengan teknik lain. Ya...kita kalau kita sedang bicara dengan BPPT maupun dari pihak-pihak lain bagaimana ada **cap dengan teknik terbaru**. Misalkan ada juga temen kami yang seneng mengembangkan pake **roll**. Lha itu kan satu putaran satu motif. Lha itu kan sedang di...diteliti lebih lanjut, semacam itu. Atau mungkin ada ndak **bahan pengganti malam**. Selain malam apa sih yang bisa digantikan. Ya itu kan terus ke depannya ada penelitian semacam itu. Kita juga sedang kemarin ada techno park itu ehem...sedang me...menyempurnakan ee...pewarnaan apa batik dengan **pewarnaan alam**. Nah itu bagaimana mereka **mengekstrak** dari berbagai macam **herbal** tadi tumbuhan tadi, sehingga nanti dikemas dalam bentuk **bubuk** atau **pasta**... lha itu ada inovasi ke situ sehingga **praktis**, jadi si industri sendiri kalau bisa nggak perlu menebang pohon dulu kan kelamaan. Kalau bisa lebih praktis ada pihak yang

sudah menyediakan ekstrak-ekstrak tersebut, tapi juga menyempurnakan juga. Artine salah satu **kelemahan batik pewarna alam itu kan warnanya cepat pudar**, kalah jauh dibanding sintetis. Ya itu ke depannya seperti apa, kunciannya warna itu ya paling tidak mendekati jangan terlalu jauh dengan **pewarna sintetis**. Ya semacam itu kita terus bersinergi dengan mereka, ada penelitian ke situ. Ke depannya kami juga punya mimpi ee...di Laweyan ada semacam **laboratorium** tentang batiklah, tentang **pewarnaan**, yah itu bagaimana ada link-link dengan pemerintah maupun dengan swasta itu kita adakan suatu itu terakhir kan pas Pak Alpha ke Swedia disupport keberangkatan Pak Alpha dan Pak Lukman dari ITB yang **batik fraktal** itu kan ke Swedia. Nah itu kan mempresentasikan tentang **sustainable fashion**. Jadi di sini ada industri batik yang sudah mulai ke **green industry** meskipun belum semuanya. Nah sharing di sana ternyata industrinya betul-betul hijau. Wah **rumit** juga ya, dimulai dari bahan baku, kemasan dan segala macam semuanya harus hijau. Dan itu nggak mudah. Dengan demikian insyaallah akan kita teruskan. Kita akan mendapat support dari Swedia bagaimana Laweyan ya meskipun belum sempurna mereka, paling tidak terus bergerak ke green industry tadi. Jadi ke depannya batik warna alam akan semakin yah diminati orang karena **ramah lingkungan** tersebut, *nggih*.

2) Bagaimana hubungan dan sinergi di antara aktor-aktor tersebut dalam pengembangan industri batik?

Nggih, ya itulah PR kita meskipun Laweyan sudah ada link ke perguruan tinggi, pemerintah dan swasta yang lain itu kadang-kadang kan satu sama lain belum terangkum ke dalam satu sinergi besar yang hehehe...belum, masih ya sepotong-sepotong belum jadi rangkaian yang sistematis yang baik. Ya kita usahakan ke arah itu.

3) Apa saja kebijakan, program dan aturan main yang telah digunakan untuk mendorong pengembangan industri batik tersebut?

Nggih, dimulai dari **FPKBL** sendiri ini kan **belum solid**. Terus terang kami kan belum solid. Ya artinya berbagai peraturan yang apa peraturan yang harusnya ada **AD/ART** itu kan sedang kami proses. Mudah-mudahan dalam ke depannya ini harus secepatnya *digedhok*, harus di...disepakati bersama. Memang ee...seiring waktu kan ada item-item yang perlu ditambahkan karena ini suatu kawasan yang berkembang ini kan kami sedang bersinergi ke dalam. Ee...**ke luarnya** sedang ke...hubungan ke luar kami juga sudah mulai mendapatkan ya berbagai **payung hukum**. Misalkan di Laweyan ada heritage, itu kan perlu payung hukum. Misalkan dari pemerintah kami mengusulkan bagaimana **pemilik rumah-rumah kuno** itu mendapatkan **keringanan pajak**. Bagaimana itu bisa tercapai sehingga mereka tidak kesulitan untuk **nguri-nguri aset budaya** tersebut. Selain itu juga misalkan kalau kaitane dengan **permodalan**, sering kalau yang **diagunkan** rumah kuno di sisi perbankan malah **dinilai rendah**. Nah itu kan harusnya **penyamaan persepsi** oo...ini kan harusnya tinggi. Nah ini kan sedang kami komunikasikan dengan mereka, sehingga ke depannya ya **industri batik** jalan, ya **heritage juga tetep terjaga** lha itu kan salah satunya. Selain itu apa kami ya terus **bersinergi** apa menjalin ee...**koordinasi** dengan **pemerintah** bahwa kalau Laweyan istilahnya **digadhang-gadhang** sebagai suatu **icon**, suatu **produk unggulan** tentunya harusnya kami juga dapat **prioritas**. Misalkan pengembangan apa-apa yang perlu urgent kami butuhkan, ya semacam itu tadi marketing center

dan segala macam bagaimana mereka juga ikut memfasilitasi, ikut mendorong percepatanlah ke arah kawasan kita apa kawasan yang kita idam-idamkan tersebut. Perda-perda kayaknya kurang tahu nggih.

4) Bagaimana cara dan mekanisme yang diterapkan untuk menjamin terlaksananya kebijakan, program dan aturan main tersebut secara efektif? Apakah ada semacam pemberian penghargaan dan sanksi tertentu kepada aktor-aktor yang terlibat? Mohon dijelaskan pula bagaimana keberhasilan mekanisme dan prosedur tersebut!

Terus terang **belum ada reward dan punishment**. Karena kami sedang **konsolidasi** ya kalau ada baru sebatas etika aja, **etika bisnis** yang umum berlaku. Artinya yah kita **saling menghargai** satu sama lain, selama ini **saling menjaga** baru kira-kira semacam itu, belum ada **peraturan baku** yang bisa ya berlaku secara **efektif** sedang kami hehehe...baru ke arah situ. Yah **keterbukaan**...ya secara umum para pelaku yang cukup besar tadi biasane juga sharing juga dengan tetangga-tetangga, maupun saudara sekitar itu sudah otomatis sharing karena ya itu tadi sebagai salah satu bentuk CSR mereka membantu sesama. Jadi kita kan intinya ingin **bangkit bersama**, alhamdulillah sudah kami laksanakan.

5) Apakah ada norma sosial dan tradisi tertentu yang dipertahankan untuk mendorong pengembangan industri batik baik di Laweyan maupun Solo pada umumnya?

Hmm...sementara ini ya yang saya tahu ya baru **etika bisnis** saja yang kami pertahankan. Yang lain-lain tradisi apa ya? Ya kalau tradisi yang dipertahankan ya tradisi batik itu aja. **Gethok tular** ya masih jalan. Yah ya ada juga keterbukaan semacam itu karena kita menjalin **kebersamaan informasi-informasi** yang kita share juga semacam saya mendapatkan informasi tawaran pelatihan ada berbagai macam, itu ya didistribusikan ke temen-temen. Itu **sudah umum** kami lakukan.

6) Menurut Anda, sejauhmana penerapan norma sosial dan tradisi tersebut dapat diterima dan dijadikan acuan dalam pengembangan industri batik secara bersama-sama?

Secara umum yah kami bisa **menerima** istilaha **etika bisnis** tersebut, hanya sebagian kecil saja yang...yang masih belum bisa menerima. Cuma kan kadang-kadang ada juga ya, di manapun tempat kan ada yang berjiwa besar oo...ini demi kepentingan bersama tapi ada yang pelaku wah ini berarti kalau semuanya berkembang takut ekonomi dia perusahaannya mengecil. Tapi itu hanya kecil aja. **Secara umum kami baik-baik saja.**

7) Sejauh ini bagaimana mekanisme persaingan usaha dan pemasaran industri batik Laweyan dan Solo secara keseluruhan? Mohon dijelaskan bagaimana inisiatif dan partisipasi dari pemerintah, pelaku usaha, masyarakat, dll dalam mendukung industri batik tersebut!

Kalau dari kami dari Forum sering menerima **tawaran pameran bersama** baik lokal maupun ke pusat, itu kan juga sering mendapat tawaran. Biasanya yang kami lakukan adalah kita pameran plus menyebar **brosur** tentang **seluruh kawasan, aset Laweyan** itu apa saja itu sering kami lakukan. Ee...ada juga lewat **media massa**, lewat jalur **majalah**, maupun majalah **tabloid** itu. Ee...kami juga sering melakukan istilah **promosi bersama**, itu juga. Kalau dari langsung dari bahkan kami sudah membina hubungan yang sangat baik dengan media massa baik pertelevisian itu bahkan sudah dipesan. Nanti kalau ada event apa tolong kami dikontak. Ada juga dari dinas terkait, dari apa Dinas Pariwisata Jawa Tengah itu juga mereka punya **majalah intern** tentang pariwisata itu ya mereka minta kalau ada event apa di Laweyan kami dikabari, sehingga kita bisa ikut **mempublikasikan** semacam itu. Kalau dari Forum kami punya website saya publish di situ berbagai macam aktivitas kami, baik lewat **website, toko online** maupun **facebook**. Saya sudah publikasikan.

8) Menurut Anda, bagaimana persepsi dan penerimaan masyarakat di Kampung Batik Laweyan dan Kota Solo pada umumnya terhadap usaha-usaha melestarikan industri batik?

Cukup bagus secara umum mereka mensupport. Hanya yang jadi masalah kan kalau **industri batik** tersebut **belum dilengkapi dengan IPAL**. Itu kan jadi masalah. Persoalan klasik di mana-mana kalau nanti kita tetangganya kena pewarnaan pada air minum mereka kan jadi masalah. Kedua itu, kalau di Laweyan itu yang harus kita pikirkan bersama misalkan tempat di Laweyan kan seiring bertambahnya **traffic wisata**, di sini kan otomatis ada kemacetan, ada **parkir** yang cukup menghabiskan jalan. Itu bagaimana nantinya apa diberikan solusinya. Insyaallah ke depannya Laweyan di utara kelurahan kan ada **Pasar Kabangan** akan dijadikan lahan **parkir bersama**. Itu secara umum mereka ikut mendukung nggak ada masalah.

9) Apakah ada kendala maupun hambatan dari masyarakat terhadap usaha pelestarian industri batik? Jika ada, lalu bagaimanakah solusi untuk mengatasinya?

Nggih, ee...yah **menentang secara frontal sih tidak**, hanya kadang-kadang ada **keberatan ketidaknyamanan** mereka misalkan ada orang yang lebih senang Laweyan yang sepi, lha itu ada juga. Tapi nggak banyak juga. Ee...karena tadi misalkan kalau apa jumlah besar orang datang ke Laweyan itu kan juga sedikit banyak nanti ada **masalah** di situ, misalkan masalah **kebersihan**, masalah **keamanan**, ya itu harus kita antisipasi bersama bagaimana mengelola kawasan wisata tersebut yang ideal. Artinya ya tetep me...apa menghasilkan **ekonomi** tetapi tidak mengganggu **lingkungan**. Lha itu kan terus-menerus kita diskusikan bersama, kita cari solusinya.

10) Apakah ada semacam forum pertemuan formal dan informal untuk pengembangan industri batik Laweyan dan Solo? Mohon dijelaskan bagaimana tata cara dan efektivitas forum ini dalam memajukan industri batik dari dulu hingga sekarang!

Nggih, ke depannya idealnya memang semacam itu. Artinya katakan dimulai dari kelurahan aja dari ee...**lembaga swadaya kemasyarakatan** bisa duduk bersama. Kita bisa mencari **solusi bersama** dari berbagai masalah kaitane dengan **efek** dari **pengembangan pariwisata** tersebut. Tapi yah kalau yang dulu apa karena **Forum begitu dominan**, belum belum...sedang berproses dishare **pembagian tugasnya** dengan yang lain itu kan apa belum secara efektif ada pertemuan rutin semacam itu. Tapi insyaallah tahun 2012 ini kita harus mulai share secara tertib ya. Nah ini kan permasalahan bersama ini kan kita juga diselesaikan secara bersama.

11) Menurut Anda, apakah pola kelembagaan yang ada sudah mampu menjawab kebutuhan pengembangan industri batik secara luas? Berikanlah tanggapan dan usulan Anda bagaimana kelembagaan ini bisa ditingkatkan lagi, baik dari sisi aturan main, kebijakan dan peraturan maupun organisasi dan aktor-aktor yang terlibat!

Oh *nggih*. Ee...masih **belum efektif FPKBL** dalam **pengembangan kampung wisata** di Laweyan ini. Karena pertama, dari segi **peraturan** aja belum belum...kami terus terang **belum mampu**. Baru kemarin menelorkan anggaran dasar. *Nggih*, ya ini kan masih terus berproses dari segi peraturan kami masih terus berproses ke arah konsolidasi. Kedua, **partisipasi dari apa pengurusnya sendiri masih jauh dari sempurna**, tertulis posisinya ada semua tapi yang kerja masih sedikit. Terus **sinkronisasi** dengan apa **organisasi kemasyarakatan lainnya** kan belum terbentuk secara baik. Nah ini kan ke depannya harus dibina lebah baik lagi. Dan juga komunikasi dengan unsur pemerintah terutama tadi dari dinas terkait ee...Bappeda dan FEDEP itu juga kan mesti di...mesti lebih disempurnakanlah, masih jauh dari harapan kita.

Catatan tentang masalah internal FPKBL:

Sekat-sekat...maksudnya bukan antar FPKBL tetapi antar pengusaha. Karena tidak mudah menyatukan visi dan misi, kan ada yang ke kanan, ada yang ke kiri. Kita menjembatani di tengah sajalah, semacam itu ada toleransi ada titik tengah dengan mengakomodasi berbagai kepentingan tadi. Sebenarnya masalah tersebut kan dari kurang bagusnya komunikasi aja. Ya tapi secara umum alhamdulillah tetep baik aja meskipun dengan apa, menjalankan organisasi dengan etika bisnis tapi belum ada reward and punishment semacam itu. Dan kalau nanti ada reward and punishment tidak serta-merta tidak seperti mengadopsi pada lembaga profesi. Seperti KADIN segala macem, salah langsung dibuang, ndak bisa. Sini kan tetangga sendiri, saudara sendiri. Kalau salah itu kan nggak mungkin frontal punishment itu kan nggak bisa liar. Tiap hari kan ketemu. Jadi harus ada pendekatan yang lebih baik lagi jadi semacam reward and punishment. Jadi semacam itu yah...hehehe nggak bisa saklek. *Nggih*, yang termasuk salah satu tokoh yang paling berpengaruh ya Pak Sulaiman tadi. Tokoh yang kita pandang bijak mengayomi berbagai macam pihak.