Conference Paper

Developing Competitiveness at Cimahi Telematics Creative Industry Based on Relational Economy

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Abstract

Improving creative economy is very important for a nation. Bandung City for example, has increased creative industry to construct competitive business climate [42]. Developing telematics creative industry at Cimahi City done to enhance region competitiveness and society welfare through community of practice is called Cimahi Creative Association (CCA) [37]. This research use framework: the relational economy from Bathelt & Gluckler (2011). The novelty of this research is used the relational economy theory to explain development of telematics creative industry.

In order to develop competitiveness for Cimahi telematics creative industry use intellectual instrument that is human activity systems in the form of root definition and then create conceptual models for research interest with eight dimension of relational economy that are: organization, evolution, innovation, interaction, knowledge, geographic market, cluster, and institution. These eight dimensions of relational economy are improvement from four dimensions of relational economy from Bathelt & Gluckler (2011). There are three conceptual models of problem solving interest: Cimahi telematics creative industry, developing relational economy: Cimahi creative industries, Cimahi Creative Associations as hybrid organization. Intellectual instrument such as conceptual models used for comparison stage and formulate recommendation for research result that is at the five and six stage in using soft systems methodology. Refer to norms of soft systems methodology; comparison and debating process to research interest involve soft systems methodology practitioner, academic advisor and academic reviewers. While for problem solving interest involve stakeholders at three level institutions of Cimahi telematics creative industry and soft systems methodology practitioner.

Economic processes as ‘relational’ because economic action is social action. Individual preferences, norms, values, ethics, tastes, styles, needs, and objectives emerge from and are co-constituted through the social embedding of economic action and interaction. Implication relational economy framework contains contextuality, path dependency and contingency. Dimensions of relational economy such as organization, evolution, innovation, interaction, knowledge, geographic market, cluster, institution look into economy action embedded at social relation structure and alignment with institutional structure and relevant social reality. Using relational framework is suitable and relevant with developing competitiveness for Cimahi telematics creative industry.
Keywords: relational economy, eight dimensions: organization, evolution, innovation, interaction, knowledge, geographic market, cluster, institutions, spatial and relational perspective: contextuality, path dependency, contingency, telematics creative industry, Soft Systems Methodology.

1. Introduction

Creative economic development is important where the creative economy has an effect on a country. In Indonesia, the contribution of the creative economy to the Gross Domestic Product, employment and export products have become significant. The main subsectors contribute to the creative economy, namely handicrafts, fashion, design, printing, publishing, music, film and communication information technology based industry. Bandung can be used as examples in which the growth of the creative industries lead to the formation of a competitive business climate. (Pangestu, 2012: 26-27). A relational economic perspective of the action and economic interaction aimed to analyze the action and interaction of knowledge-based economy. An economic decision determined contextually by social networks and institutional relations of the individual and the company as a collective agent. An economic action is determined by the previous actions and decisions past or path-dependent where the action and economic interaction that is a contingency (Bathelt & Gluckler, 2011: 1-2).

Telematics industry development in Indonesia, which consists of industry communication tools, industrial cameras, reproduction of recorded media, film and video, computer-related activities, consulting services software / hardware, industry, office machines, computing, and electronic accounting. The development of the telematics industry in the city of Cimahi has done to improve regional competitiveness and welfare. It was in the city of Cimahi, there are around 400 animators gathered in one place for community named Cimahi Creative Association (CCA). (Nugroho, 2011: 85-88). Three level institutions related to creative industries telematics in Cimahi, at the macro level of Cimahi Government and DPRD Cimahi, at the level of messo: Cimahi Creative Association, and the telematics industry Cimahi and at the micro level that telematics creative community: (1) Information and Communication Technology; (2) Animation; (3) Film. The third level of the institutions in carrying out activities, the role of the duties, functions and responsibilities still walk alone no interconnectivity and alignment.
This study used the theoretical framework (F) the Relational Economy from Bathelt & Gluckler (2011). Because of the novelty of this research is the use of the theory of the Relational Economy of Bathelt & Gluckler (2011) to explain the development of telematics competitiveness of creative industries where the use of these theories in the field of Administrative Sciences can be said is still relatively few. The principal problem in this research is: 1) How to build a telematics industry competitiveness Cimahi based on the concept of relational economy? The limitations of this study is to build the competitiveness of creative industries based relational economy took a research references that only the telematics industry in Cimahi. Selection of Cimahi telematics industry because this industry is the industry’s first (pilot) for the telecommunications industry in Indonesia.

2. Relational Economy

Relational economy is a framework for conceptualization analytical economic action as a relational action. Relational economy looking at the relationship of human interaction aims to overcome the restriction of an atomistic perspective, where the individual's perspective as a key driver of the imperative to maximize profits or other external behavior. On the other hand, an economic approach that introduces relational values, interpretive frameworks and practice decision-making as the subject to perform contextualization of social institutions that characterized the relationship between social institutions. Economic relational analysis of economic action and interaction in a spatial perspective. Economic relational as an alternative interpretation why industrial agglomeration achieve success, how clustering of local and global interactions can occur and why some regions more prosperous than other regions (Bathelt & Gluckler 2011: vi-vii).

Relational economy explains a discussion of issues in a systematic process of knowledge creation and innovation and how to apply. Space is often at the core of the analysis of geography. Due to space as the main object of this study then focused on the relational economy institutions and evolutionary dimension of economic interaction in a spatial perspective. In this conceptualization is not only space and territory but economic relations within or across different geographies or at different scales is a primary analysis of the economic relations (Bathelt & Gluckler 2011: vi-vii).

Figure 1 presents the development of ideas and approaches within a relational framework for analyzing the economic action in a spatial perspective. The framework consists of four main dimensions, namely the organization, evolution, innovation and
interaction. These four dimensions as key analytical categories of relational approach. In the conceptualization, social institutions is an important factor in explaining the context of behavior and specific actions in which the four dimensions, constructed and reconstructed as the basic mechanism for analyzing relational framework. Conceptualization also relates to different geographical perspectives to analyze the economic and social processes associated with each of these dimensions. It required an interdisciplinary approach in integrating economic and social theory with regard interrelation among the four dimensions. The structure of the four-dimensional relational heuristic presents a framework that can be applied systematically in a relational perspective in which today has grown into a theoretical discussion of many economic studies geography and other social sciences (Bathelt & Gluckler, 2011: 36). Of the four dimensions of relational economy is then developed four dimensions of relational economy that is the dimension of knowledge (Nonaka et al. 2000), (Amin & Cohendet 2004), (Faulconbridge, 2006), (Ibert, 2007), (Bathelt & Gluckler, 2011), dimensional of geographic markets (Hodgson 1988), (Callon, 1998), (Me’nard 1995), (Granovetter 1993), (Hodgson 1999), (Boyer, 1997), (Bathelt & Gluckler, 2011), the dimensions of the cluster (Porter 1990), (Malmberg & Maskell 2002), (Raines, 2000), (Benneworth & Charles, 2001), (Raines, 2000), (Sölvell et al. 2003), (Bathelt & Dewald, 2008), (Bathelt & Gluckler 2011), and the dimensions of the institution (Amin, 1999), (Hodgson, 1998, 2003), (Granovetter, 1985), (Scott, 2004), (Giddens 1984), (Thompson 1989), (North, 1990), (Amin & Cohendet, 2004), (Cetina, 1999), (Wenger, 1998), (Lundvall & Maskell, 2000), (Jessop 2001), (Clark, 2005), (Hassink & Termite 2005), (Setterfield 1993), (Bathelt & Gluckler, 2011).

3. Research Method

This research uses Soft Systems Methodology. SSM approach is appropriate for a study looking at the world (social) as complex, problematic, mysterious, characterized by opposition viewpoints or clashes of worldview (Checkland and Poulter, 2006: 21-22) and is soft ill structured (Checkland, 1981: 95). SSM is soft systems thinking. SSM originated from the concept of typology systems, namely human activity systems. Human activity departs systems of human intentions are rooted in human free choice, to attribute meaning, and all its implications in the form holon (s). SSM is a methodology for experience-based knowledge (Checkland and Scholes, 1990) moving between reality or perception about real world and actuality or feeling about real world (Uchiyama, 1999).
Researcher should declare the framework of the theory or theoretical framework (F) and method (M) used to formulate and guide the study intervention, and creating a feeling of the experience accumulated in the study intervention (Checkland, 1991). Then, a reflection of the F, M, A, or the theme of the research should be made to the invention of the results achieved. In the end, the design cycle and problem solving research interest - as in this study, will give birth to new knowledge, modifying the questions that have been there, or get a new question be produced at A or F.

<table>
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<th>Explanation</th>
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<tr>
<td><strong>F</strong></td>
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<tr>
<td>Institutional framework constructed by rational economy (Bathelt &amp; Gluckler, 2011) is used to reach the achievement of competitiveness</td>
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<td><strong>MR, MPS</strong></td>
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<td>Action Research Methodology – Soft Systems Methodology</td>
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<td><strong>P</strong></td>
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<td>To develop competitiveness in the Creative Industry Telematics Cimahi relational-based economy.</td>
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Source: Adapted from McKay & Marshall (2001)

In this research carried out data exploration in accordance with the principles of stages soft systems methodology. Exploration results at an early stage are realized in the form of Rich Picture [15] which describes the objective conditions of the creative industries telematics Cimahi. In an effort to build up the competitiveness of the Creative Industries Telematics Cimahi, used tools of intellectual form of human activity systems in the form of root definition, which then created a model conceptual consists of
eight dimensions of relational economy, the dimensions of the organization, evolution, innovation, interaction, knowledge, geographic markets, cluster, the institution of the relational economy and creative industry cluster telematics Cimahi. This is a four-dimensional relational enrichment economy, namely the organization, evolution, innovation and interaction as introduced by Bathelt & Gluckler.

Based on Figure 2: stages of soft systems methodology include seven stages:

1. Find unstructured problem,

2. Determine structured problem,

3. Determine root definitions from relevant system,

4. Develop a conceptual model,

5. Comparing conceptual models with structured problem situations (Comparative stage 2 and stage 4)

6. Determine feasible and desirable change by considering systematically desirable and culturally feasible.

7. Taking action to improve the situation of the problem. Stage 1-2 and stage 5-7 included in the stage of finding out which is the reality or perception about real world. Stage 3 and stage 4 including the stage of system thinking which is actuality or feeling about real world.

In this paper described the root definition associated with problem solving interest from the creative industries telematics Cimahi namely Developing Relational Economy Creative Industries Cimahi and Hybrid Organization - Cimahi Creative Association (CCA). Intellectual tool in the form of a conceptual model is used at the stage of comparison.
and formulation of recommendations resulting from the research, namely in stage five and stage six in the procedure Soft Systems Methodology. In accordance with the rules of the Soft Systems Methodology, the process of benchmarking and debating this for the purpose of problem solving research involving researchers, and academic reviewers.

In conjunction with this study, analysis of intervention identified in the real world of Creative Telematics Industry Cimahi, are as follows:

**Client (C):**
University of Indonesia

1. *Academic Advisors:* Prof. Dr. Martani Huseini and Prof. Dr. Sudarsono Harjosoekarto

2. SSM Practitioner: Heri Fathurahman

3. Academic Reviewers

**Practitioner (P):** Researcher

**Problem Owner (O):**

1. Macro Level
   
   A. Central Government: Ministry of Industry RI and the Ministry of Communication and Information RI, BPPT
   B. City Government of Cimahi:
      a. Regional Development Planning Agency
      b. Regional Secretary: Assistant of Economy and Development,
      c. Agency of Cooperatives, SMEs, Industry, Commerce and Agriculture
   C. DPRD Kota Cimahi.

2. Messo Level
   
   a. Cimahi Creative Association
   b. PT Animasi Kartun Indonesia
   c. Dreams Toon

3. Micro Level
   
   a. Telematics Community & Talent & Creative People in field of Telematics
4. Developing Competitiveness at Cimahi Telematics Creative Industry Based on Eight Dimensions of Relational Economy

Competitive advantage aims to form a barrier wall so that competitors cannot imitate competitive advantage, so the company is able to achieve the advantages and benefits of the available resources (Barney, 1991). Discussion of the concept of competitiveness can be reviewed at three levels. First is the state or the nation, second, industry or group of industries. Thirdly, the company is divided into (1) a market-based view; and resource-based view which refer to a sustainable competitive advantage (Fitriati, 2012). Telematics Cimahi creative industry seeks to develop competitiveness in the field of telematics and animation. This is evident from various works of animation, software and information technology from the creative industries telematics Cimahi was known in the local, national and in some Southeast Asian countries. This is evident from the statement of the Chairman of Cimahi Creative Association (CCA) and drawn on the rich research picture:

“Cimahi creative industry can be a pilot project for other creative industries. World telematics and industrial technology development rapidly and Cimahi Creative Association can be animated national research center that can compete at the global level. The work of CCA can compete at the global level in 2020 and West Java will spearhead the telematics industry and Cimahi become masterplan”.

“Some of the work produced by the Creative Industries Telematics Cimahi which have been used in the Netherlands and Australia, there are the results of our work in the form of software and web design employed by a foreign state enterprise. Animated films and series made by activists CCA also have views on various national televisions reach one of them titled Stars. Some of our animation was aired on national television, Global TV, Trans 7 and TVRI, we are also involved in creating visual effects movie Angel Heaven. One of the targets of CCA is to help offender’s telematics Cimahi to be independent and self-employed to become entrepreneur’s telematics. Not a few activist actors’ telematics Cimahi already recruited technology-based companies located in Jakarta, Batam and Singapore”.

In the context of research competitiveness Cimahi Telematics Creative Industry by using the rich picture, in this study determine the real world into the relevant system.
The real world break downs into a root system definition with regard CATWOE elements to analyze the process of transformation that is the creative industry cluster telematics Cimahi, Build Relational Economy Creative Industries Cimahi and Hybrid Organization.

Furthermore, researchers built a model in the form of conceptual models are built on the idea of researchers based on the theory used relational economy, so the idea of systems thinking becomes important in this stage. For Checkland, systems thinking based on two pairs of ideas, are emergent properties paired with hierarchy (also called layer structure in Checkland 2006), and communication paired with the control (Checkland 1993) as follows:

Furthermore, in this study a comparison between the conceptual models with real world. Conceptual model that has been determined in comparison with the real world, in order to generate debate about perceptions, and changes deemed to be favorable. Checkland describe four ways to compare the model with the real world, the informal discussions, with a formal question, create scenarios based on the operation of the model, trying to model the real world that is similarly structured to the conceptual model [15].

Development Local economic of Cimahi city done using the cluster approach becomes important for the industry, especially the micro small and medium enterprises are often neglected. In general, see the kind of business or product of four selected industrial clusters:
CATWOE and 3E in Root Definition Cimahi Telematics Creative Industry.

| Root Definition | A system that is owned and managed by the City of Cimahi, telematics creative industries, Cimahi Creative Association and telematics actors in organizing the governance cluster of telematics creative industries (P) through the utilization of network governance telematics creative industries (Q) to establish an institutional framework in order to ensure achieving competitiveness Cimahi Telematics Creative Industries (R) |
| Customers       | Macro level: Cimahi municipal government, the level of Meso: Cimahi Creative Industries, Micro level: Cimahi Individuals Creative |
| Actors          | Cimahi Creative Industries, Cimahi Creative Individuals |
| Transformation  | Governance of Cimahi Creative Industries to obtain optimal competitiveness |
| Weltanschauung  | Governance of Cimahi Creative Industries to gain competitiveness |
| Owner (s)       | Cimahi creative industries and Cimahi creative individuals |
| Environment     | Parties who do not want the governance of Cimahi Creative Industries to gain a competitive edge |
| E-Efficacy      | Intertwining governance Cimahi Creative Industries to gain competitiveness |
| E-Efficiency    | Using minimum resources (financial and time) |
| E-Effective     | Implementation of governance Cimahi Creative Industries gain a competitive edge |

CATWOE and 3E in Root Definition Developing Relational Economy for Cimahi Creative Industries.

| Root Definition | A system that is owned and managed by the City of Cimahi, local economic empowerment – telematics creative industries, Cimahi Creative Association and the actors of creative industries in developing economies relational for creative industries (P) through utilization of network governance creative industries (Q) to establish a framework institutions in order to ensure the achievement of competitiveness Cimahi Creative Industries (R) |
| Customers       | Macro level: Cimahi municipal government, the level of Meso: Cimahi Creative Industries, Micro level: Cimahi Individuals Creative |
| Actors          | Cimahi Creative Industries, Cimahi Creative Individuals |
| Transformasi    | Governance of Cimahi Creative Industries to obtain optimal competitiveness |
| Weltanschauung  | Governance of Cimahi Creative Industries to gain competitiveness |
| Owner (s)       | Cimahi creative industries and Cimahi creative individuals |
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1. The telematics industry cluster that includes telematics products and animations
2. Textiles cluster and fashion products
3. Craft industry cluster
4. Food and beverage industry cluster

Support the sustainability of Local Economic Development of creative industries Cimahi as increase the economic empowerment of urban communities should be based on local potential it is necessary. Local Economic Development of creative industries Cimahi become a tool for efforts to accelerate the achievement of well-being such as the development of creative industries through increased participation and cooperation of public and private and utilization of local resources. Local Economic Development of creative industries Cimahi strived to create an equitable distribution of income and employment of the population and between the regions. Through a process both the economic development rooted in the local potential is more sustainable that can be enjoyed by the local population.

In the short term in order to accelerate the goal of improving the purchasing power of the population Cimahi, economic development based on local potential is done by pushing more of the birth of new entrepreneurs. The development of start-up firms is achieved through the incubation program of the industrial cluster of telematics and providing ease of licensing businesses in the creative industries Cimahi four. With a growing number of establishments of companies or actors in this new business, the employment thus a reduction in the unemployment rate can be done quickly. Local Economic Development Cimahi done by way of organizing industrial zones that have been available through selected industry clusters. By not forgetting the problems of
SME development as human resources, capital, technology and marketing, economic movements sourced to local communities organizing and coaching required a scalable and sustainable. Handling problems through the industry cluster approach will be
Figure 6: Conceptual Model Hybrid Organization – Cimahi Creative Association (CCA).

Figure 7: Cimahi Cyber & Creative City Strategy.

more easily carried out and completed within businesses communities. Implementation of the Local Economic Development Cimahi creative industries will be lighter if they do creative industry cluster-based public-private partnership. Policies that have been made to be Cimahi Cyber and Creative City (C4) include:
Encouraging investment in idle spaces: land and buildings of the former industrial land warehousing locked out revitalized land into environmentally friendly industries (creative industries, IT, film and animation).

Facilitate and encourage the production of TV, film and animation, especially the type of production “out of the box” by exploiting the themes of the reality of the typical urban / typical Cimahi) such as markets, heritage (military construction), education, health.

Facilitate and initiate the tools products industry support TV, film and animation, namely: dolly track, jimmy jeep, tripod. By maximizing the potential of motion capture tool for placement of central government assistance.

Development of internet data center in the building BITC (Baros Information Technology and Creative).

Development of data storage for the ISP (internet service provider).

Development of infrastructure investment to central cable TV.

Facilitate the development and production of software for the film and animation.

Facilitate and encourage the establishment of IT / Creative Community through the creation of the common room, public space creatively, socializing gatherings, dialogue in Cimahi Creative Association / CCA).

5. Conclusion and Recommendation

Based on the conclusion, as follows:

a. The economic process is relational because of economic action is social action. Individual preferences, norms, values, ethics, feeling, style, needs and objectives emerge through social construction inherent in the action and economic interactions that are inherent in a social environment that is constructing meaning through interaction and institutions.

b. Implications of relational understanding of economic action produce contextually, path-dependency and contingency. Since preferences, goals, strategies individuals shaped by experience and relationships with other economic agents so that the structure of the material and economic action be contextual, (path dependency) and a contingency that does not always follow the law of universal social and spatial.
c. Dimensions organization, evolution, innovation, interaction, knowledge, geographic market, clusters, institution of the relational economy considers the economics inherent in the structure of social relations and also relates to the structure of institutions and relevant material reality.

d. Knowledge becomes an important asset to achieve and maintain competitiveness. Knowledge becomes a key object of trans-local relationships, and circulation of knowledge is the motor of the dynamics of the institution.

e. Economic policy aims to support the competitiveness of the smallest spatial scales later evolved into a broader focus on the exchange and circulation of knowledge. Through the study of this relational understanding of the action and interaction of economic and geographical perspective of the economic process can be used as an alternative perspective in the development of the knowledge economy today.

f. The use of frameworks relational economy in building competitiveness Telematics Industry Cimahi visible in the system in this research that the creative industry clusters telematics Cimahi, building a relational economy creative industries Cimahi and hybrid organization - Cimahi Creative Association.

Based on the research, this research can be formulated some of the recommendations as follows:

1. In connection with the theory of competitiveness: the need for the enrichment of the theory of competitiveness that have been effected by the dimensions of the relational economy that organization, innovation, interaction, evolution, knowledge, geographic markets, clusters and institutions.

2. In connection with Cimahi: need to build competitiveness based Telematics Industry relational economy and strengthening the role and existence of businesses actors, Cimahi Creative Association, and the telematics industry Cimahi that can continue to grow their entrepreneurial potential.

3. For the national level: need to use rational approach to economic development in the creative economy in order to achieve national competitiveness.

References


[27] Informatics, University of Bangor.


