

# The Infrastructure Impact of Suramadu Bridge Development

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## ABSTRACT

Suramadu bridge is the connection between Madura Island and Java Island. The main reason of developing the longest bridge in South-East Asia is to spread the development in Madura Island which during the time is still assumed very much behind and limited in the development expansion of Java Island. This research intended to analyse comprehensively the social and economic impact of development policy in Suramadu and the implementative policy which was formulated in the development of Suramadu. Result showed some conclusions as follow: 1) the development of Suramadu bridge gave the positive as well as negative impact for the society, even though enomically, Suramadu bridge has opened possibility the entering of investor in Madura Island; 2) The increasing of infestation value certainly will cause the quality increasing of supporting infra-structure which formerly enters in the agenda of Suramadu Development Masteragenda. This research has also been success to reconstruct the policy in the policy model of Suramadu development.

The theoretical implication of this result is policy model of physical infra-structure can map the function of policy subsystem dstrategy in using policy instruments for producing the agenda of sustainable infra-structure policy based on the local demand and potential resources. Model construction is built by looking human capital and social capital as the important pilar which is not allowed to forget in the development process and it is as an important input for the policy maker. In practice, the implication of this research is how to set the socialization of development policy can be carried out by the concept of scenario agendaning so that the whole involved actors knowing and understanding the steps of next development. In addition, the increasing of society capacity is important in accept the impact of socio-economical change from the development.

**Keywords:** policy, Socio-economical impact, physical infra-structure policy, development of social capital and human capital

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## INTRODUCTION

Government figure can be seen from the output of policies for reaching the country national interest. One of them is the policy of economical development. Nevertheless, the phenomenon of economical development in Indonesia is not enough only founded on the economical approach but it is necessary getting start from political economy approach. Keynes [1] ever expressed that government intervension was very relevant in economy developing such as how the government had to positioned itself as the policy maker (politic) but it remained to consider the dynamic and economic demand in the society; and how the relation which is developed between the government and non government in the process of economic development.

Based on the study result and the new report of National Development Design Department (Bappenas), Asia Development Bank (ADB), and International of Labour Organization (ILO) leading of Indonesia Critical Constraints, available and quality of infrastructure become as one of the three problems which has immediately to be solved by government. The improvement and development of access to the base infrastructure service is one of the hopes which is entitled to be obtained by society and due to be carried out by government. Therefore, the President Rule No 5 in the year of 2011 about RPJMN 2010 had been presented that one of the national development challenges which was seen necessary from some dimensions and became as the sixth priority was the infrastructure development. The acceleration of economic growing really needs the additional quantity and quality improvement of infrastructure. Revitalization of agriculture may not be success without suitable infrastructure. It remembers that the marketing cost is more dominant in the structure end cost of agricultural commodity.

The problem of life environment like the pollutant of water, air and soil, or flood in urban environment has strong relation with no available infrastructure. Though the output in infrastructure field has been increased, gap of infrastructure is still felt in national level as well as inter regional. Therefore, the base infrastructure development has to become as development priority. Nowadays, the condition of infrastructure in Indonesia is still far left compared with the main economic countries in South East Asia. Whereas in the period of 1990-2005, Indonesia was one of the countries in South East Asia which ever got the infestation of infrastructure development of US\$32.62M for 68 projects through the Public Private Partnership [2]. At this time, Indonesia was on the rank of 5 (five) after China, India, Malaysia, and Philipine. The Public Private Partnership has

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responsibility in the implementation of infrastructure development like transportation, road, sanitation and water supply, electricity, telecommunication and transmission, distribution of oil and gasoline.

Talking about the performance of infrastructure development, based on the World Economic Forum Report of 2010, the infrastructure quality all of Indonesia was in the rank of 96 from 133 observed countries. This position was far behind the two neighbour countries such as Malaysia and Thailand which each of them in the rank of 27 and 41. The critical constraint in infrastructure development is the lower public infestation, the weaker government and non government relationship (KPS), and the minimum of non government infestation which included direct asset by foreign. The negative impact factor of the infrastructure in Indonesia included the difficulty of land exemption, the capacity of human resources and the organization is still weak, the bad government system, and the minimum spending of cost.

The better infrastructure condition of an area will also cause the better influence to the economic condition. If there has good infrastructure, it can be appointed that the area has the strong economic condition. This condition due to the moving speed and economic growth of a country cannot be separated from available infrastructure like transportation, telecommunication, sanitation, and energy.

Surabaya city and Madura Island are two regions of potential economy but it is unbalanced developing. The condition of Madura Island is very different with Surabaya City which is busier and more crowded by trading activity and high industrial. The problem is only one that is life prosperity, even the economic development of Madura society falls within low level if it is compared with the other region in East Java. Disparity of this growth speed becomes sharper than the region of Gerbang Kertosusila. The brute income value of Regional Domestic (PDRB) in the year of 2012 was Rp. 8.2 trillion, but in the Gerbang Kertosusilo has reached Rp. 64.5 trillion. It means that the value of PDRB in Gerbang Kertosusilo has reached almost 10 times from Madura. Insufficient access of Madura society can be become as the standard that during this time the potency of social and human asset has not still established and well used

One of the concrete steps on the policy of government infrastructure in solving problems is the slow economic development in Madura if it is compared with the other region in East Java such as the development project of Suramadu Bridge. In the beginning, the development of this bridge experiences pro and contra from the Madura society. There was an anxiety to the values and network that will enter, can destroy the design of social system and thinking, the resource capacity of local society. Therefore, it is needed the understanding and systematic analysis related to the hope on increasing of Madura society economic sector by available human resources. The development of Suramadu Bridge will really make easy the transportation access from Surabaya to Madura. In spite of this bridge development surely will make the changes step by step to the sectors of economy, social, Madura society culture such as (1) the population mobility of Java to Madura, (2) the increasing of new residence in Madura area, (3) the anxiety of being secure domination of Madura original society, (4) the establishing industry and manufacture in Madura, (5) the social gap between Madura original society with new comer, and (6) the culture and morality of Madura society (especially in surrounded Suramadu bridge) threatened decreasing.

Some possibilities of the negative impact had to become as serious attention of government in East Java Province and Bangkalan Regency to be able to design the periodical development which will increase mainly the Madura society prosperity without decreasing the identity and original culture value of Madura. One of the society control function especially academic related to the infrastructure policy of regional government was by giving the input which developed the government policy by empirical proof that could be responsible.

Based on the description of background as above, it was necessary to be carried this study as one of the contributions to study and formulate the policy strategy of regional government in the post operating of Suramadu Bridge.

## MATERIALS AND METHODS

This study was conducted in surrounded of Suramadu Bridge< Madura Island, East Java Province of Indonesia. Literature study was used to solve any kind of problems related to the development of Suramadu Bridge which invited pro and contra of various ideas from the society. Part of data was obtained from secondary one of some department and the others were based on the rules regulation.

### Public policy as the formulation and implementation

In the law perspective, Anderson [3] presented that public policy was as the behaviour of some actors (functional, group, office). Nugroho [4] expressed that policy could be forming as written government rules in the form of laws regulation. Therefore, policy can be mentioned as law in the wide meaning, so policy could be forming as “something which binds and presses”.

The formulation of policy is as the proposing step of policy formula through initiation and constructing of policy proposal through the organization of policy design, group of interest, bureaucracy of government, president, and legislative department [5]. But Bintoro Cokroamidjojo which followed the idea of Andreson [3]

expressed that the policy forming or policy formulation is often called as policy making which includes some decision taking, so if the alternative selection of decision is continuously carried out and never stops, it is called as policy formulation.

The step of formulation is an important step for determining the next step on the process of public policy. If the policy formulation is not well formulated, there is a possibility that the implementation process will also not be good even it is more extreme that the formulation result cannot be implemented.

The implementation of public policy does not only correlate with the mechanism of policy operation to the procedures of bureaucracy, but it is very related with the conflict problem of decision taking and how the policy is able to be obtained by the target groups. In the relation with it, Bardoch [6] confirmed that implementation was a game of bargaining, persuasion, and maneuver in uncertainty condition. The actor implementation plays for holding the control as much as possible and makes effort to play the system for reaching self-destination.

The implementation process is not only related with the performance of responsible administrative committees for carrying out program and causing obedience from the target group, but it is also related with the power network of well politic, economy, and social directly as well as indirectly influences the behavior all of the involved side and in the end it influences the intended effect as well as the unintended negative effect. To carry out a policy, it is needed some steps in implementation of public policy. Soenarko [7] presented about the steps in implementation the policy such as interpretation, organization, and application.

Implementations of policy will not always success. There are some pursuers for the success of policy implementation. Hogwood [8] divided the understanding of policy failure into two categories such as non-implementation and unsuccessful implementation

### **Analysis of economic-social impact in the policy dimension of regional physical infrastructure development**

Quade [8] presented that policy analysis was as an effort of accurate evaluation research before the selection of policy choice and steps for reaching the remained course of action. Dye [9] expressed that there were something which could be studied in the effort for solving the social problems (surely included the fundamental) and generally by using some concepts come from any discipline of sciences like politic, sociology, economy, psychology, and anthropology.

In analysis of specific policy area like infrastructure policy, an analyst surely cannot release from the variety of economic social problem. This problem has ever been illustrated as in Figure 1 below.

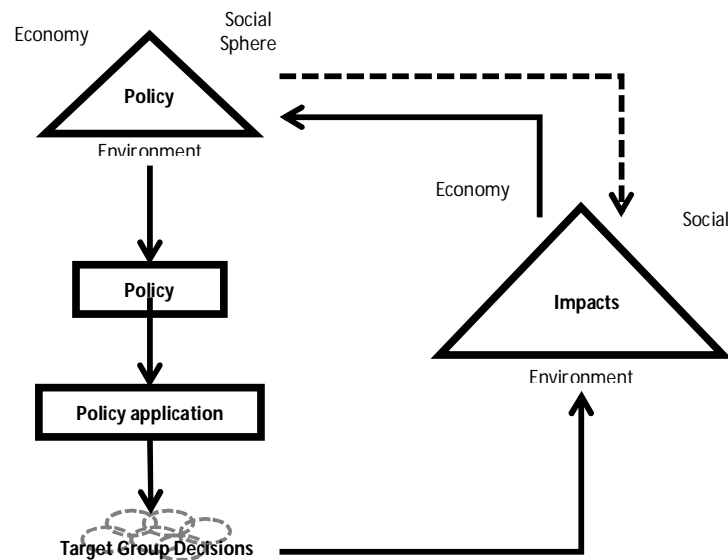


Figure 1 The policy cycle

In the illustration, researcher is as a policy analyst is demanded to be able to map and manage the variety of facts, values, and actions which influence the development process of Suramadu Bridge. Process of data presentation and impact analysis of physical and non physical problems which was carried out by researcher, at least had to be through the double loop in well balanced and comprehensively

## RESULTS AND DISCUSSION

### **Development of Suramadu Bridge: the scenario of industrial gate based on the potency in Madura**

For the central and regional government, infrastructure is as one of the most development expenses beside education and wealthy. The allocation of public cost expenses for infrastructure has to be able to stimulate the growth and distribution of society economy and to be able to stimulate the infestation and export so that the infrastructure can be maximal used for society prosperity. Nowadays, the government has gradually carried out some effort; one of them is to develop the Suramadu Bridge as the connection facility between Surabaya and Madura.

Madura Island is as one of some regions in Indonesia which is looked having the high economic value but the natural potency has not been maximal delved. Based on the regional aspects, there are some regions which have not been optimal used for sea transportation infestation and exclusive economic zone.

### **Physical infrastructure impact since the development of Suramadu Bridge**

Infrastructure development which was carried out by center as well as regional government in some development policies really could stimulate the economic development and growth. One of the efforts that can be carried out is through physical infrastructure development. The better accomplishment as well as development of infrastructure will cause the better influence to the economic condition. Therefore, infrastructure is as pulse fiber of economy which determines fluent or not influent the economic activity.

Madura is one of the regions in Indonesia which has high economic value but it has not delved optimally the potency of natural and human resources. Based on the level of population mobility, economic actor as well as goods and services moving are predicted fast and more increasing by being developed some supporting infrastructure like transportation and the other economic mobility. Post operating of Suramadu Bridge has given big impact to the regional development. Indication of the development can be seen from the increasing of area demand, area price, and residence growing and informal sector at surrounded of Suramadu Bridge. Before operating the bridge, the area price was about Rp. 30,000.00/m<sup>2</sup> and now the price has reached Rp. 500,000.00/m<sup>2</sup> by the buyer or investor from outside of Madura.

There were many changes to the formula, form, and structure of residences in Madura as the effect of many developments. In Surabaya side (Klampis, Ngasem, Rungkut, Ketintang, Sidosermo – formerly as side) mentioned that the certain part of Madura society residence is missing like “gandok” and “lumbung”, and the yard has been filled by new house so that was not easy to be back known.

The residence as part of the existing development region in the foot area of Suramadu Bridge-Madura side is very important because it is as strategic region and it can also stimulate to increase the quality life. Suramadu Bridge is also as the generator of regional development which will have big influence to the surrounded regions. The increasing of population number in the foot of Suramadu Bridge (Bangkalan Regency) is 59.30% so that is necessary to be balanced with available infrastructure especially in Bangkalan Regency like facility of education, trading, recreation location, yard, and the other public facility as the form on the facility giving of prime public service. Based on the media, Telkom (Telecommunication Department) has developed the internet network in Madura Island by fiber concept as the effort on the quality increasing of human resources

### **Policy analysis of physical infrastructure development: Suramadu Bridge Development**

Not the whole public problem will become as the policy agenda. Public problem can enter in the government agenda and make effort as public policy if the policy maker gives serious and active attention to the public problem. But the society has also to have political will to struggle the problem which is generally faced by them in order to become as public policy problem.

One of the weakness sides of development in Indonesia which is caused by the difference development speed is the gap of development inter region. One of them is caused by the distribution of natural and human resources are not in average. In the other hand, the limitation of supporting infrastructure especially transportation and residence facility caused the region is far in the back and isolated.

Mainly for East Java Province, disparity is also occurred between Surabaya and Madura Island. The connection condition between two regions with different development level really can cause the negative impact as the reason of polarization effects. In East Java, to increase the union and balance of Madura Island and Surabaya, and all at once to stimulate economic speed in Madura Island, the center and regional government evaluates that the main priority of policies for answering the regional gap is the development policy of physical infrastructure in the regions mainly in Madura.

If it is seen from the side of stakeholder involving, there are some actors involve in the project of Suramadu Bridge Development, starts from design stage until implementation. The actors included General Work Ministry, Financial Ministry, Relation Ministry, Energy and Mineral Resources Ministry, State Electrical Manufacture, Development Department of Surabaya-Madura Region, Government of East Java Province, Government of regency or city of Madura Island, and the society surrounded of Suramadu Region. All of the

actors which are included in government sector have surely provisioned with a number of policy instruments which has been regulated by the government itself for implementing the policy. The policy instruments can be as the ability in accessing the information, liberty of authority, the usage of resource and organization.

A design of policy is allow obtaining the support from the whole juridical aspects and political economy, but if in the norm aspect and traditional value getting the opposition, so the policy will have the possibility of resistance and conflict to the shareholder [5]. The problem which appears on the development of Suramadu Bridge in the society and government perspective surely has the possibility for inter opposite. The indication is the perspectives differences in capturing problems, one of them can be seen from available or non-available negative reaction which is appear after a policy has been implemented.

The study of economic development phenomenon included in Indonesia, do not enough to be carried out only by leaning on the economical approach, but it is necessary to start from political economy approach. The formulation of development policy is really as the political process which involves the variety of actor starts from country, bureaucratic, politicians, businessman, the society self-power department until the society themselves with the variety of interests which the interaction may be bumped against each other. For reaching the maximal result in solving the conflict, the actors are demanded to carry out various negotiation and compromising.

Since the initial design of infrastructure development in Suramadu Region, the process is not fluent and can be well accepted by the society especially from Madura side. It starts from area exemption stage that if it is seen from the society sight-seeing exactly it harms them, and generally it is not suitable with the price of land buying-selling. Agricultural area as wet rice field and dry field of the society which present as the daily income source has to be willing function-changed as soon as general interest.

Infrastructure has the importance function in economic system. Even the infrastructure policy can be as the master strategy by government such as the locomotive of economical moving. In the development policy of Suramadu, determination step of the master design has been formulated by the centre and regional government through the Development Committee of Suramadu Region (BPWS) based on the President Rule No 27 in the year of 2008 jo Perpres No 23 in the year of 2009.

Strategic issue for stimulating the acceleration of Suramadu Region development now is the use of base infrastructure development like road, electric, drinking water, human resources development, and sectorial characteristic development. Economically, the demand fulfilling can increase the production value, work chance, and society income. The policy output is really very suitable with the characteristic of problem in Madura Island such as economic productivity which is still low and lost with the other regions in East Java.

The development of physical infrastructure in surrounded of agricultural area and potency plantation which part of them are concentrated in the regions of Sampang, Pamekasan, and Sumenep are so kind fitted with the character of agriculture and plantation. Various supporting facilities has also to be characterized with the feasible agriculture and plantation like irrigation development for watering or irrigation, trading center of agricultural product and plantation, creating the transportation moda for distribution of agricultural product etc.

The supporting and infestation development infrastructure in surrounded of Suramadu region is absolutely for supporting society economic growth in Madura region. In order to the society is not nervous about the unreality infrastructure development of the other supporting, so the government has massively to carry out the Master Agenda of Suramadu development in developing form as well as timeline. Therefore, the society trust is not more loosing for supporting Suramadu development. In addition, if the government wants to make easy the entering of economic infestation so the ease and real mechanism of infestation has to be well managed. As the theoretical implication, the statement as above is suitable with the previous researchers like Litmen [10] about the influence of transportation and economic asset mobility, Hudson [10] about the relation between the economy and infrastructure quality, Subejo [11] and Mawardi [12] about the social asset in development

## CONCLUSION

For answering the disparity problem in this region, development policy of physical infrastructure is the connection bridge in making effort of economic development acceleration like in Madura Island. Working together between government, society, and public as the policy subsystem of central functioned in implementing the policy. Social capital belonged to the society is very important to build the government trust and it can also attract the public for actively infestation in region. The interest of investors are being hoped to produce a positive working together between the government and public.

In the process of policy implementation, policy instruments like the analysis document of social impact, economy, and environment, potency and character analysis which based on the laws regulation has to be able as the base or input for government for designing the next policy agenda. If the case can be well and comprehensive identified, it is hoped that the next policy recommendation can answer the physical and non-physical problem in the field.

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