

Chapter 5

Model for Digital Economy in Indonesia

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ABSTRACT

This study introduces the early development of digital economy in Indonesia. e-Business activity is growing at an unprecedented rate in Indonesia as indicated by the number of online real time transactions (Real Time Gross Settlement) recorded by Bank Indonesia (Indonesian Central Bank), the emergence of dotcom companies, and the use of ICT in conventional business (a combination of brick & mortar with click/online). Research was conducted by investigating the digital activities of businesses. Unfortunately out of the 109 businesses approached, response rate was very poor with only 30 responding (27%). This is not uncommon in Indonesia for a variety of reasons. Results from the four variables utilized in this study, e-Distribution Channels, Value Creation, Online Products & Services, and Online Infrastructures, indicate that the development of digital economy in Indonesia is still in its early stages due to a number of encountered obstacles.

INTRODUCTION

The rapid development of Information and Communication Technology (ICT) is evident in every aspect of community life. As with other forms of communication technology, the internet has established a strong presence in community life because it facilitates communication, a fundamental need of

society. Internet technology has developed into its own 'world' or 'space' often referred to as virtual or cyber-space. In this virtual world people can meet, interact, and conduct economic or business related activities.

The evolution of a virtual community has had a significant impact on the economic society. Early fundamental economic theory was based

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on the optimization of production factors such as physical, labor, and capital. Now, development of economic science incorporates the intellectual properties, including science and technology, creativity, and innovative forms of capital, recognized as important to the economic society.

Innovative development in ICT or digital technology over the last decade, within the field of economics and business, is referred to by a variety of terms including post-industrial society, knowledge economy, economic of innovation, online economy, new economy, e-conomy, and digital economy (Cohen, de Long, & Zysman, 2000). Digital economy, the term used within this paper, is a complex matter and a recent phenomenon related to micro economics, macro economics, and organizational theory and administration (Orlikowski & Iacono, 2000). Digital economy will explain development and economic growth in the coming decades (Margherio, 1998; Kling & Lamb, 1999), and further to this, the impact of the development of internet and information technology on company and business activities. Examples of this are as follows:

- Impact on small to medium enterprises (SMEs)
- Coordination mechanisms and the impact on markets and organizations
- E-organization and e-banking
- Internet presence
- Impact on organizational structure
- Internet based marketing
- Business models and digital economy

This research is focused on the investigation of the business model of digital economy and its role in the economy of Indonesia. Business models of digital economy have been analyzed in regards to the presence of the internet in business, the use of internet-based marketing (e-marketing), e-banking, and e-commerce.

The concept of the digital economy was first introduced by Tapscott in 1998. It was described

as a socio-political and economic system that is characterized by an access to information utilizing a variety of tools, the ability to process information, and a high communication capacity. Early identification of the components of digital economy included the following:

- The Information technology industry,
- E-commerce activities between companies and individuals,
- Digital distribution of goods and services,
- Support of sales, especially sales of goods and services that use the internet.

Zimmerman (2000) proposed that digital economy is the digitalization of information and ICT infrastructure. This concept is often used to describe the global impact of Information Technology and Communications, not only within the Internet, but also in the economic field. In their view on the interaction between the progress of innovation and technology, and the economic impact on macro and microeconomics, Kling and Lamb (2005) argue that the digital economy is the economic sector that includes goods and services in which development, production, sale or supply are dependent on digital technology. Development of the digital economy cannot be separated from the characteristics or nature of the creation of value, the product, efficiency of distribution channels, and the structure of personal services and customization (Zimmermann, 2000).

ONLINE INFRASTRUCTURE IN INDONESIA

Indonesia is an archipelago country of more than 17,000 islands, of which 4,000 are uninhabited with a total population of 245 million people. About 43,000 villages (65 percent of the total) do not have a telephone line. While the number of mobile phone subscribers has grown significantly, Internet and computer penetration is still low.

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