

Chapter **1**

Introduction

February 2018

This chapter should be cited as

ERIA (2018), 'Introduction', in Uemura T. and K. Ishigami (eds.), *Formulating Policy Options for Promoting Natural Gas Utilization in the East Asia Summit Region Volume II: Supply Side Analysis*. ERIA Research Project Report 2016-07b, Jakarta: ERIA, p.1.

Chapter 1

Introduction

This Part II of the report discusses two main topics: how much liquefied natural gas (LNG) supply infrastructures are needed in the Association of Southeast Asian Nations (ASEAN) + India by 2030 to satisfy the LNG demand projection results presented in Part I; and how much investments are required by 2030 to implement the identified LNG supply infrastructure in ASEAN and India.

To explore these topics, the following discussions and findings from Part I were considered: additional demands of LNG at provincial levels due to new natural gas thermal power plants; converted thermal power plants from diesel fuel to natural gas; additional industrial, household, and transport uses of compressed natural gas; and LNG bunkering for shipping. The projected LNG demands were presented in three scenarios in Part I. Part II is based on the middle projection scenario in Part I. These projected demands were assumed to be added to the current natural gas demand. Therefore, the estimated additional investment for additional LNG supply chain infrastructure development includes the existing LNG supply chain infrastructure.

Chapter 2 will discuss the methodology and the results. Chapter 3 will identify the LNG supply chain configuration based on Japanese experience. Chapter 4 will discuss the distribution of LNG demands at provincial levels in each country in 2030. Chapter 5 will discuss the closest ports for demand location, hierarchy of ports to import LNG, and LNG supply infrastructure between demand location and LNG importing ports. Chapter 6 will discuss the estimated LNG supply infrastructure development costs and Chapter 7 will discuss the legal framework for LNG supply chain infrastructure development. The policy implications from this study will then be presented. Finally, the concluding remarks will present the summary and issues for further study.