

# POWER GENERATION AND TRANSMISSION IN THAILAND

## 1. Introduction

### 1.1 General Background

The power generation and transmission projects in Thailand are planned and implemented by three state enterprises who carry out their projects development individually under the national economic and social development policy. The largest of them is the Electricity Generating Authority of Thailand (EGAT) who owns, maintains and operates power generation plants throughout the country. The energy produced by EGAT's power plants is either sold to its direct customers or to the Metropolitan Electricity Authority (MEA) and the Provincial Electricity Authority (PEA) who are the other two state enterprises dealing with power generation and transmission in Thailand. MEA does not own any power plants, therefore the energy distributed to its customers is totally purchased from EGAT. The customers served by MEA are in the Metropolitan area and the nearby provinces. PEA, at present, owns some small diesel plants and plans to develop some small hydro plants and some non-conventional power generating projects in the future. The self-generated energy plus the energy purchased from EGAT is transmitted and distributed by PEA to electricity consumers in the provincial areas and in the areas where electricity service is not covered by MEA. The combined operation of these three state enterprises constitutes the overall network for power generation and transmission system of Thailand.

### 1.2 Electricity Generating Authority of Thailand

The future projects planned by EGAT include the following:

#### A. Thermal Power Plant Projects

- o Nam Phong Combined Cycle # 1-2
- o Bāng Pakong Combined Cycle
- o Krabi Lignite # 4
- o Mae Moh Lignite # 10-13
- o New Gas Turbine
- o Bang Pakong Thermal # 3-4
- o Region 3 Lignite
- o Ao Phai # 1-2
- o North Bangkok Plant Renovation