

TE 130669

4370508421 : MAJOR ELECTRICAL ENGINEERING

KEY WORD : POWER POOL / BIDDING STRATEGY

WERAYUT WONGAMONCHAI : POOL PRICE BIDDING STRATEGIES
FOR GENERATION COMPANIES

ADVISOR : ASSOC. PROF BUNDHIT EUA-ARPORN, Ph.D

100 pp. ISBN 974-17-0324-14

Under the deregulation of electric supply industry, suppliers (generator) and consumers (retailers) offer and bid MWh generation and consumption respectively. An independent System Operator (ISO) uses maximization social welfare to determine the generation, load dispatch and electricity price subject to power balance constraint. This paper presents bidding strategies for a generation company to maximize its profit for bidding generation in the day-ahead market. This involves a bidding strategy and unit commitment for a generation company. The objective is to take into account the uncertain bidding information of other market participants by predicting optimum bidding point in the next trading period. The model for the electricity market is based on the drafted Thailand market rule[1]. The optimum bidding in each hour is solved by statistic bidding information and a self-scheduling. This method has been tested with the actual past records of California Power Pool. The encouraging results have been obtained.