Sunthorn Panjasutharos 2008: Water Resource Crisis and Consequent Conflicts between Users in Eastern River Basin. Master of Science (Sustainable Land Use and Natural Resource Management), Major Field: Sustainable Land Use and Natural Resource Management, Interdisciplinary Graduate Program. Thesis Advisor: Professor (Emeritus) Piya Duangpatra, Ph.D. 122 pages.

The objective of this survey-based research was to study the water resource crisis and consequent conflicts between users in eastern river basin**.** The research's sites were focus on two sub-districts of Klong Yai watershed and two sub-districts of Pra-sae watershed. The survey was target on three stakeholders: the communal sector, agricultural sector, and industrial sector. Furthermore, other pertinent stakeholders including the government and private sectors were also participated in this study.

The results showed that the two main causes of the crisis were the occurrence of long drought period and heavily water consumption from industrial sector. The results also revealed that the communal and agricultural sectors were less affected due to the ownership of their water reserves such as dug wells, ponds, and deep groundwater wells. Moreover, the users from these two sectors used a small amount of water from Provincial Waterworks Authority. On the other hand, the industrial sector, which does not has any water reserve and solely depends upon the water source form the Provincial Waterworks Authority, was totally affected thereof.

The communal informants from Klong Yai watershed area viewed that the aforementioned water crisis did not have any effect to them due to the fact that they all have their own water reserves. In addition, the informants from Klong Yai have no conflict with the water conveying policy of Royal Thai Government. Whereas, the people from Prasae watershed area expressed that the water crisis has moderately effect to them. The causes of water shortage did not directly come from the crisis of water in reservoir, but came from the pumps of water supply system often out of order. The results also showed that most Prasae's informants have no conflict with the water conveying policy of Royal Thai Government. The agricultural informants from Klong Yai and Prasae watersheds agreed that the water crisis was less affected to agricultural water due to they have their own water reserves and their crops are rainfed–based cultivation. Most of the informants have no conflict with the water conveying policy of Royal Thai Government.

In summary, the stakeholders from all sectors conclude that the appropriate measures for sustainable water management in the future should be as follows : let all stakeholders, including the governmental and private sectors, participate and create the policy altogether; construct the water piping system in all areas and for all purposes e.g. for communal, agricultural, and industrial uses, in order to sufficiently and sustainably, supply the water to all involved stakeholders; construct additional water storage systems, particularly for the storage of rain water; properly control the balance between the water demand and supply for industrial uses; encourage the industrial sector to build up their own water storage and enforce them to standardize by treating the waste before releasing to the public water courses.

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