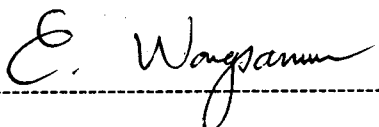
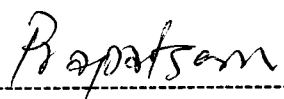


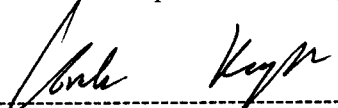
THESIS TITLE : NEEDS OF FARMERS TOWARD THE PROMOTION OF  
PARA RUBBER PRODUCTION IN CHANGWAT NONGKHAI

AUTHER : Mr. PRAKRONG SONGSERM

THESIS ADVISORY COMMITTEE :

  
----- Chairman  
(Assistant Professor Dr. Chaicharn Wongsamun)

  
----- Member  
(Assistant Professor Prapatsorn Taechaprasertvitaya)

  
----- Member  
(Associate Professor Viratch Kongkajan)

#### ABSTRACT

The objectives of this research were to: (1) determine some socio-economic characteristics of farmers participating in para rubber growing promotion, (2) determine general conditions and problems regarding the production of para rubber, (3) determine the promotion methods provided for farmers, (4) assess needs of farmers toward promotion services, and (5) compare the needs of farmers with some different socio-economic characteristics.

A sample of 119 farmers whose the rubber trees could be tapped in five Amphurs in Nongkhai Province was selected by multi-stage random sampling. The data were collected by using structured interview schedules. Frequency, percentage, arithmetic mean, standard deviation, minimum, maximum, t-test, and F-test were used to analize and compare the data.

The results of the study revealed that most of the farmers were male, with average of 47 years old, finished a primary education, and agriculture was their main occupation. An average family members were 4-6 persons, an average labour for para rubber production

was 1-2 persons. The average land holding for agriculture was 55.5 rais. The average annual agricultural income was 85,000 bahts, and the others non-agricultural income was 31,887 bahts. The land holding for para rubber growing was 10-30 rais, with an average cultivation period of 8-9 years. The planting space used of para rubber cultivation was 3x7 metres. The chemical fertilizer was applied twice a year, with an average of 22.30 kilograms per rai. Pests and diseases were protected by means of chemical control, together with pruning. The latex tapping was done every other day for 4-6 months per year. The average yield of latex production was 39 kilograms per rai. The rubber sheet was sold at 26.00-28.00 bahts per kilogram. Major problems of the farmers were : lack of fund, lack of market places, low prices, lack of knowledge on para rubber production, lack of labour for tapping, and lack of material supplies. Government officers were the main source of information and it was transferred to farmers by means of individual and group extension methods.

Important needs of the farmers on knowledge for para rubber production were: planting of stump building, pruning, propagation, latex tapping, rubber sheet making, rubber pests and diseases control, and provision of rubber market places and prices. Needs of farmers for extension methods of para rubber production were: official visit, group meeting, training, extension guides, and field study. Needs for services and supports on para rubber production were: credit, plant stocks, fertilizer, chemical controls on weeds, pests and diseases, market places, product promotion, material supplies, price guarantee, group forming, and sources of advice.

Comparisons made based on selected socio-economic characteristics and conditions of para rubber production revealed statistically significant differences in some aspects as the following: (1) Needs for production knowledge, it indicated that farmers with secondary education showed a higher level of needs than those with primary education on budding and smoked sheet making, group leaders showed a higher level of needs than group members in almost every topics, farmers whose area of para rubber growing more than 30 rais showed a higher level of needs than others on inter-cropping and smoked sheet making, farmers who had para rubber cultivation period of 8-9 years showed a higher level of needs on fertilizer

application, weeds control, latex tapping and smoked sheet making, farmers whose para rubber income less than 20,000 bahts showed a higher level of needs than others on fertilizer application, non-chemical control on weed and rubber sheet making, (2) Needs of farmers for extension methods, it indicated that group leaders showed a higher level of needs than others on field study, farmers whose area of para rubber growing of 10-30 rais showed a higher level of needs than others on group meeting, training and field study, farmers who had para rubber cultivation period of 8-9 years showed a higher level of needs than others on official visit, group meeting, training and field study, farmers whose para rubber income less than 20,000 bahts showed a higher level of needs than others on official visit, group meeting, training, field study and demonstration, and (3) Need of farmers for services and supports, it indicated that farmers with secondary education or group leaders showed a higher level of needs than others on credit, farmers whose area of para rubber growing less than 10 rais showed a higher level of needs than others on price guarantee, farmers who had para rubber cultivation period more than 9 years showed a higher level of needs than others on sources of advice and marketing, farmers whose para rubber income less than 20,000 bahts showed a higher level of needs than others on credit, plant stocks and material supplies.

The suggestions from this research were: (1) Farmers should be provided with training topics on para rubber growing, plant protection, latex tapping, and para rubber processing, (2) Knowledge of para rubber production and processing should be promoted to farmers by individual and group extension methods and (3) Farmers whose para rubber income less than 20,000 bahts should be supported and provided with credit, plant stocks, marketing places, and close supervision should be provided for farmers who have just started latex tapping.