

## Abstract

**THE HOLISTIC DEVELOPMENT OF THAI CHILDREN STUDY:  
RESEARCH TOOLS AND RESEARCH METHODOLOGY**

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This project aims at studying child development with regard to child rearing in the Thai families holistically. A cross sectional study of Thai families with children 18 years and under was conducted using both quantitative and qualitative methods.

For the quantitative study, a sample of 9,594 households (children and their caretakers) was selected. Stratified Three-Stage Sampling was used as sampling plan. Provinces are the first sampling unit whereas enumeration districts/villages and households are the second and the third sampling units. In the first stage, 4 regions and Bangkok acted as strata where 16 provinces from 4 regions and 16 sub-regions in Bangkok were chosen proportionally to the number of households in each province. In the second stage, 533 enumeration districts/ villages were chosen proportionally to the number of households in each enumeration districts/villages. And finally in the third stage, 18 households with one child and his/her caretaker each were chosen from a selected enumeration district/village. For the qualitative study, 108 teenagers (13-18 years) and 216 caretakers of children of all ages covered in the project were randomly chosen from the quantitative study's sampling frame.

Questionnaires, testing tools, and standard tools for measuring weight and height were used for data collection. Tools for data collection were developed differently for 6 age groups, including 1-<3 years, 3-<6 years, 6-<10 years, 10-<13 years, 13-<16 years, and 16-18 years.

For data analysis, children were grouped into 3 categories, namely the preschoolers (1-<6 years), school children (6-<13 years) and teenagers (13-18 years). Descriptive statistics were employed to describe socio-economic and environment of households, characteristics of children, all aspects of child rearing, family relationships, and family crisis. Prevalence of children with delayed physical development, emotional-social-moral development, cognitive development, and holistic development were estimated. Chi-square test, Fisher's exact test, correlation and multiple regression

analysis, logistic regression and polytomous regression were used to examine the relationships between child development, child rearing and family characteristics. Kappa Statistics were used to look at the agreement of qualitative data. Analysis of variance was used to compare effects of factors associated with child development. To construct a measure of the so-called holistic development of children, principal components analysis was used. Path model was also constructed to look at the direct and indirect effects of factors affecting the child development.

Since data came from a cross sectional study, one should bear in mind that the analysis or the interpretation may not be done across age groups. Also with the selected sample size, results are appropriate at country-wise and region-wise levels.