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STRUCTURE AND RELATIONSHIPS OF STANDARD ENVIRONMENTAL,  
PERSONALITY AND ABILITY FACTORS IN  
SECONDARY SCHOOL ADOLESCENTS

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of the requirements for the degree of  
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at Massey University

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## ABSTRACT

Over 2,000 pupils of two state coeducational secondary schools and five single-sex private secondary schools in the same New Zealand town completed aptitude tests, and questionnaires on family background, attitudes, interests, affective states, adjustment, personality, beliefs and occupational preferences. Responses were subjected to descriptive analysis and were factor analyzed and regression analyses were carried out on dominant intellectual and non-intellectual variables. Higher socio-economic status was associated with more pre-school education, more private school education, less mother employment, less father absence, greater continuance at school, less delinquency, more parental pressure to succeed in school, more regular going out with parents, more positive family climate, more positive attitudes to teachers and higher primary school reading and arithmetic levels. Lower class was characterized by greater father absence, large families, less parental concern about school success, less family outings, deficient family climate, lower primary school reading and arithmetic levels, more negative views of how teachers regarded them, lower expectation of opportunity, and lower self-rating of happiness. Factor analyses produced six factors of the structural variables of home environment, five factors of parental child-rearing practices, eight factors of family relations, three intellectual factors, ten non-intellectual factors.

Coefficients of multiple determination showed that home environment predictors of language aptitude and average attainment were father's education, smaller family, parental attitudes against smoking, parental expectation of household duties by adolescent, low parental anger-rejection, high father-permissiveness. Personality predictors of aptitude and attainment were general ability, adjustment to reality, scientific preference, sociability, less practical preference, more perceived favourability with teachers, and greater sensitivity. Joint effects of intellectual, home environment and personality predictors were almost as great as the independent effects of intellectual predictors. Joint effects of intellectual, home environment, and personality predictors were half of the total multiple prediction of conformity problems and about equal to those of personality predictors. High ability pupils were found to be more influenced than others in aptitude by home environment factors. Males were more influenced than females by mother support and by extrinsic motives. Lower ability and lower socio-economic level pupils were more influenced by intellectual factors than by home environment. It was concluded that the home environment factors could be examined as a possible focus of experimental programmes aimed at enhancing adolescent adjustment and attainment.

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