

END OF PROJECT REPORT



A. Project number: 07-02-05-0000 PR0039/07-06

Programme Title : Education of at risk children in Malaysian society

Project title: Health Status of Prepubertal Children, Born With Low Birth

Weight

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B. Describe your project and highlight major project achievement

The " Health status of prepubertal children born with low birth weight" was started in October 2003 and completed in September 2007. This study was one of the studies under the " Education of At-Risk children in Malaysian society " headed by Prof Othman Dato Hj Mohamed at Universiti Putra Malaysia.

The main aim of our research was to study these group of children who was born as low birth weight i.e born with birth weight < 2.5 kg, are they at risk of variation or abnormality in school performance, health with regard to renal, nutritional, cardiac, eye and vision and respiratory systems compared to their peer who was born with normal birth weight, as these children reached prepubertal period.

In Malaysia, about 10 % of Malaysian children were born with low birth weight and in a study done in Hospital Universiti Sains Malaysia (Siti Arbaiyah 1999) had found a prevalence of 6.3% of children born with low birth weight in Kelantan.

No such informations regarding the consequences of being born as LBW are available in our country. We have no idea as to what these children might be facing at school level i.e their emotional, academic performances, cognitive function and their respective health status.

Our interest was to look at the achievement grades in the respective school subjects such as Malay and English language , Mathematic and Science . We also reviewed and assessed the lung function and looked on the prevalence of bronchial asthma in these children. Studies on the refractive error and ocular biometry of these children were also conducted. Questionnaires to reveal the prevalence of enuresis and assessment of nutritional status of these children were also included.

Our finding on these children performance in their respective subjects taught at school revealed that boys who were born as LBW scored significantly lower in Bahasa Malaysia writing and Mathematics compared to the control of boys with normal birth weight.

Prevalence of ever wheezed was significantly higher in school children, born with low birth weight compare to normal birth weight children and low birth weight was significantly associated with a decrease in the level of most lung function measures in children aged between 8 – 11 years old.

The children born with low birth weight had poor vision and small size of the orbit of the eyes compared to their peer born with normal birth weight and the size of their kidneys were also smaller. And yet these are relatively normal children. These finding help us in identifying the slight