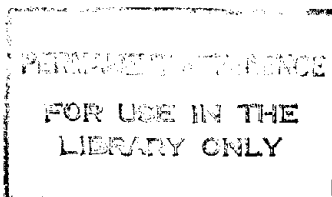


**INTRODUCTION OF SPECTROSCOPY TO THE A/L SYLLABUS**

A PROJECT REPORT PRESENTED BY

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to the Board of Study in Science Education of the  
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# INTRODUCTION OF SPECTROSCOPY TO THE A/L SYLLABUS

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## ABSTRACT

This study was carried out to investigate whether spectroscopic methods (interpretation of simple Mass, IR, and H-NMR spectra) can be introduced in to the A/L syllabus.

The subject content of teachers' guide prepared was taught in one urban leading school and three rural schools. The student's achievement levels were evaluated from the tests conducted at the end of each lessons. The comparison of marks obtained by the students indicated that there is no significant difference in the achievement level of the students in the urban leading school and the rural schools. Most of the students obtained high marks irrespective of the school.

The teaching and learning strategies which were helpful in the teaching and learning process were tests, worksheets, real world applications/real world phenomenon, analogy, diagrams and pictures, teacher question, teacher student discussion.

The difficulties in the implementation of this unit will be due to current lengthy syllabus of chemistry for A/L, lack of sinhala medium text books, the absence of internet web sites in sinhala medium, no opportunities for students to see the operation of spectrometers, teachers who were not trained, lack of teaching aids in the schools. The suggestions to overcome these are providing of the sinhala medium text books for school libraries, removing some topics from A/L syllabus and adding those topics to the O/L syllabus, teaching the unit using above strategies, and training the teachers.

Spectroscopy can be introduced successfully in to the A/L classes.