National Conference on Dissemination of Research Findings 2016



Department of Research and Development
National Institute of Education
Maharagama
2016-07-05

National Conference on Dissemination of Research Findings -2016

Overall Guidance Dr.(Mrs.) T.A.R.J. Gunasekara

Director General

B. Sanath Pujitha

Deputy Director General

Guidance M. N. S. Edirisingha (Director)

Co-ordinator of the K. A. N. Sulochana Alexander

(Lecturer)

Conference

Project Team D. Keppetigoda (Senior Lecturer)

W. K. S. Pushpamala (Senior Lecturer)

D. Hettige (Lecturer)

N. D. Disanayake (Lecturer)

Irani de Silva (Assistant Edutionalist)

Supportive Staff and solam Nilmini Fernando tosomi laioilanad

(Management Assistant)

N. P. N. Jayarani

Cover page Design Chatura Madusanka

(Department of Electronic

Dissemination)

The ESD Good practices (fostering factors) concerning the implementation of science at junior secondary level in Northern Province of Sri Lanka

A.Nithlavarnan¹, K. Sinnathamby² & G.I.C.Gunawardana³

¹PhD Candidate- Faculty of Graduate Studies,

University of Colombo

Email: anithlavarnan@gmail.com

²Faculty of Graduate Studies, University of Jaffna,

³Faculty of Graduate Studies, University of Colombo

Education for Sustainable Development (ESD) depends on skills, appropriate values, attitudes and behaviors for peaceful co-existence and awareness of health, environmental, economic and social issues. There are several educational activities being practiced in secondary schools that promote sustainable development. There are several good ESD practices followed by schools at present but they are not properly documented and disseminated to other stakeholders. This study identifies the ESD Good practices (fostering factors) related to the implementation of the Science subject at junior secondary level.

The study utilized a mixed method approach. Both qualitative and quantitative methods have been used for data collection and data analysis. The study uses multiple methods of inquiry, such as library research, surveys, direct observation of classroom teaching-learning process and school environment. Sixty Principals and 136 Science teachers (Change agents) in secondary schools from the Northern Province of Sri Lanka formed the sample for the survey. The researcher visited the selected schools and collected primary data through 20 classroom observations of the teaching-learning process to identify the good ESD practices within the school environment.

There were several ESD good practices implemented within the science classrooms such as students making a saw dust stove, new inventions for Science exhibition and Science projects. Likewise, several ESD good practices observed outside the classrooms related to science such as biogas production in school by using garbage, conducting awareness programmes to the public regarding prevention of Dengue, control of alcohol usage, and encouraging students to find new inventions, establishing school gardens and herbal gardens, developing awareness of disaster prevention, waste management and awareness of child rights.

In the survey the change agents expressed their opinions regarding students' associations, and celebrated days and aspects related to science education for sustainable development at their schools. There are several innovative initiatives taken by the Ministry of Education and the National Institute of Education related to Science which promotes the ESD at national level. Through identifying, documenting and disseminating good ESD practices, it is possible to develop awareness, attitudes, skills and values about ESD among the students and the general public.

Key words: Education for Sustainable Development (ESD),
Good practices, Secondary science