6 DAYS RESIDENTIAL TRAINING PROGRAM ON BASIC SCIENCE AND MATHEMATICS FOR TRIBAL STUDENTS

Vigyan Prasar, Department of Science and Technology, Government of India and **Center for Rural Development**, Periyar Maniammai University, Vallam, Thanjavur, Tamil Nadu jointly organized 6 days residential training program on Basic Science and Mathematics for Tribal students in the Periyar Maniammai University premises from July 26 to July 31.

The Training programme started by 10am on 26th July, 2017 with 103 (Boys-56 and Girls -47) students of 8th,9th and 10th Std from 6 districts of Tamilnadu ie, Niligiri, Tiruvanamalai, Kaniyakumari, Salem,Thanjavur and Trichy.

DAY - 1

Inauguration:

The Inauguration of the training programme started on 26.07.2017 with the Tree Plantation by the Chief Guest in the Periyar Maniammai University campus.

Dr.D.Janaki, Director, Centre for Rural Development (CRD), Periyar Maniammai University (PMU), Vallam, Thanjavur welcomed the participants, guest and resource persons. Dr.P.K.Srividhya, Dean – Academics, PMU presided over the function. Dr.A.Anand Jerard Sebastine, Assistant Professor in Social Work and Principal Investigator of this training programme gave an introductory talk about the program and vindicated the importance of giving training to the tribal students.

Dr.Irfana Begum, Project officer, EduSat, Vigyan Prasar, New Delhi gave Special address. She Spoke on how Science and Mathematics plays an important role in everyday life. She also said the teachers in school should adopt methods that can inspire and kindle interest among the students in the early childhood itself.

The Chief Guest of the programme Ms.M.P.Nirmala, IAS (Retd) Chairperson, Tamilnadu State Commission for Protection of Child Rights (TNSCPCR), Chennai in her address spoke about the importance of educating the Children and insisted that education is the important tool to transform the society. She also shared her experience of working for the rights of tribes in the Kanniyakumari district.

Ms.C.Thilagavathi, Chairperson, Child Welfare Committee, Thanjavur District and Ms.L.Saraswathi, District Child Protection Officer, DCPU gave the felicitation address and appreciated the efforts of Vigyan Prasar and PMU. Dr.Arivanandhan, Assistant Professor in Social Work delivered Vote of thanks.

The Chief Guest released a Hand Book on "Basic Science and Mathematics" edited by Dr.Anand Jerard Sebastine which was given to all the participants. The book was developed under the project 'Reaching the Unreached of ST Sub Plan' supported by Vigyan Prasar and CRD with TISSL Publication, ISBN 978-93-0132-01-3. Ms.Irfana Begum released the kit and distributed to the participants.

Sessions:

The first session was handled by Mr.Vijayan, BT Assistant, Government Higher Secondary School, Thiruvonam, Thanjavur. In this session the participants learned the easy methods of Addition, Subtraction, Multiplication and Division.

The second session was handled by Dr.Sukumaran, Assistant Professor, Rajah Sarafoji College, Thanjavur. In this session he gave the information about biology. The children got fruitful information about living things and its structure.

The third session was handled by Mr.Manoharan, BT Assistant, Govt. Higher Secondary School, Thanjavur. The session gave information about the importance of Chemistry.

Dr.Selvakumar, Asstistsnt Professor, Dr.Kalaignar M. Karunanidhi Centre for Political Science, Periyar Maniammai University, Vallam, handled the session on 'KNOW YOUR SCIENTIST'. The children came to known about many scientists, their life history and their Inventions. Nowadays, many children were not aware about the renowned scientists from our nation. This session gave an insight about many distinguished scientist of our land.

PMU students hosted the evening cultural events by 6 pm. Mr. Lenin Assistant Professor, Dr.Kalaignar M.Karunanithi Centre for Political Science, Periyar Maniammai University, Vallam, performed thought provoking folk songs. The tribal children enjoyed the programme with keenness.

DAY - 2

The participants were given Karate, Yoga and *Silambam* (Tamilbnadu based Martial Art) training by the professionals Mr.Edwin (Karate), Mr.Sambandam (Yoga) and Mr. P.Ayyappan (Silambam) for one hour everyday from 6 am.

The Tribal students observed the 2nd year commemoration of Dr.APJ.Abdul Kalam and planted trees in the university campus.

Sessions:

The first session of the second day was handled by Dr.Kesavan, Assistant Professor, Department of Physics, PMU on Basics of Physics which prompted interest of every individual towards the subject.

Followed by Dr.Arumugam, Assistant Professor, Department of Mathematics, Periyar Maniammai University, Vallam who handled Mathematics. The students learned about different ways and the simple methods in solving problems in Mathematics.

The students went for practical lab sessions from 11.30 am. The practical sessions on the Physics labs, Chemistry labs and Bio Technology labs gave lot of insight to connect an assortment of lessons studies in the school environment.

In the afternoon session held by 2.30pm Dr.Irfana Begum, Project officer, EDUSAT handled the session on the 'Microscope and its Functions'. The tribal students got an opportunity to use the highend Microscope lab of PMU and learned about the micro particles of various objects i.e, Insects, leaf, nail, hair etc.

Dr.Kathiravan, Director, Centre of Excellence for Training and Research in Automation Technologies (CETAT), PMU, explained the activities of the automation laboratory in a simple way. The students were excited to touch the Bosch Rexroth Pneumatic, Sensor and Hydraulic machineries in the centre.

In the evening by 6 pm a short film of Dr.APJ.Abdul Kalam was shown. After that, Dr.Kumerasan, Assistant Professor, Department of Architecture, PMU gave hands-on training to draw animals, plants and various things they study in Science and Mathematics.

DAY - 3

On the third day 28.07.17 the students practiced Karate, Yoga and Silambam for one hour from 6 am.

Sessions:

The first session was handled by Dr.Selvakumar, Assistant Professor, Dr.Kalaignar M.Karunanithi Centre for Political Science, Periyar Maniammai University, Vallam. In this session he gave information about various competitive examinations, nuances in facing the challenges and gave guidelines in succeeding. After the session the students went to the Bio technology and Physics labs.

The Communication skills and Computer skills have become an important aspect for any of the career advancements in today's

trend. So the afternoon Session on 'Communication Skill' was handled by Dr.K.Selvam, Head, Department of English, PMU. The students learned about proper pronunciation of words and sentence formation and basic in English communication. Followed by this session Ms.P.Ranjini, Assistant Professor, Department of Computer Applications handled a practical session on computer and its applications. The children were taught to create email account and basics in MS Office. The children were able to learn using computers and also internet browsing for learning many of their subjects they study in school.

Dr.Uma Maheshwari, Head, Department of Commerce and Ms.B.Nalini, Assistant Professor of Commerce, PMU handled a session about Banking and the emerging trends in Online banking. This helped the students to know about the cashless transactions and current transformations in the banking sectors.

In the evening Mr.Suresh, Programme Co-ordinator and Mrs.Rekha, Team Member, CHILDLINE Collobrative organization gave a speech about child protection and child rights. They also created awareness about the problems faced by children through folk songs. The students came to know about the emergency toll free no 1098 which works 24 hours for Children who needs care and protection.

DAY - 4

On the Fourth day 29.07.17 the students practiced Karate, Yoga and Silambam for one hour from 6 am.

The Children were taken for a local visit to historic places in Thanjavur. The children visited Thanjavur Big Temple which is more than 1000 years old. They observed the architectural, civil engineering skills portrayed in the temple and sculptures of the olden days. They visited the Thanjavur Palace to know the historical

events happened in the district. Children viewed a short film about Thanjavur district, important locations, traditions, culture and values of Thanjavur. Around 1.30pm they returned to University.

Sessions:

In afternoon session at 2.30 pm, Dr.Meenakumari, Director, National Bio Diversity Authority of India, shared the importance of preserving the nature and in detail elaborated on the various components of bio-diversity. She also asked to create Biodiversity Management Committee in their village so that the participation of the people with the governmental initiatives can protect the nature. She also gave an Activity Booklet 'Biodiversity Around Us' to all the participants. Following this session, Mr.Renganathan, Co-ordinator, Tamilnadu Aadhi Dravidar Federation sensitized the children on various rights of tribes in India.

DAY - 5

On the fifth day 30.09.17, the students practiced Karate, Yoga and Silambam for one hour from 6 am.

Sessions:

The first session was handled by Mr.Vijayan, BT Assistant, Government Higher Secondary School, Thanjavur .He taught about the easy and simple way of basic mathematics. The Next session was handled by Mr.Sukumaran, Asst.Professor, Raja's Sarafoji College, Thanjavur in his session he covered the biology subject.

Afternoon session was handled by Dr. T.V.Venkateshwaran, Scientist F/ Principal Scientific Officer, Vigyan Prasar took a session on Science and Technologies. He gave a greater insight about the Sciences in every spear of life and also about the various happenings in the Space through pictorial presentation. He also clarified the doubts raised by the students with scientific evidences.

In the evening the young incubatees of Periyar Technology Business Incubator 'DRONERA' showcased the models of Drones and expound the utility of this technology in today's world. The students were exited to handle and operate the drone practically.

The Students were given a time exclusively to exhibit their talents and culture with various cultural events. The students participated with enthusiasm in this cultural eve which paved ways to show their tradition, skills and hidden talents.

DAY - 6

On the Sixth day 31.07.17, the students practiced Karate, Yoga and Silambam for one hour from 6 am.

Sessions:

The first session was handled by Dr.Kesavan, Assistant Professor, Department of Physics, PMU. He gave the fruitful information about the studies of physics covering various aspects like magnetic, electronic, light and velocity.

Afternoon a panel discussion was organized in this session, Dr.S.Chittibabu, Head, Department of Bio-Technology and Chemical Engineering, PMU, with Dr.SP.Kulandaivel Babu, Professor, Department of Electronics and Communication, came as panel discussant and clarified the questions raised by the students in the Science and Technological sphere.

Valediction:

At 2.30 pm the Valediction of the six days residential training programme was held at the Freud Hall of PMU. The welcome address was given by Dr.D.Janaki, Director, Centre for Rural Development,PMU. The Report of the six days program was read by the representatives selected among the tribal children. The participants also gave the feedback of the training programme very positively.

Prof. Sundar Manohar, Vice Chancellor, PMU had an interaction with the children and appreciated their interest to travel from various parts of Tamilnadu to learn new things that can escalate their knowledge and skills. The Chief Guest Ms.M.K.C.Subhashini, Chief Education Officer, Thanjavur District in here address emphasized that the basic education can make a person to think rationally and appreciated the efforts for conducting the training for the tribal children.

The special address was delivered by Prof.Dr.S.A.Dhanaraj, Registrar, PMU who encouraged the children to go for higher studies and even extended invitation to avail the scholarships offered by PMU to continue their Higher education here in the campus. Dr. S. Asokan, Controller of Examination felicitated the participant and the organizing team.

Dr.Anand Jerard Sebastine, Principal Investigator of this Training Programme gave vote of thanks. He thanked VIGYAN PRASAR for the financial assistance for the programme and with great sense of gratitude recorded the encouragement and support given by Dr.T.V.Venkateshwaran, Scientist F/ Principal Scientific Officer, Vigyan Prasar and Dr.Irfana Begum, Project officer, EduSat, Vigyan Prasar, New Delhi for the success of the Training programme.



Dr.A.Anand Jerard Sebastine, Director CHILDLINE, Nodal Organization, Department of Social Work, PMU was Special address.



Traibal Children Getting Hands on Training in Chemistry Lab





