

Down Syndrome is a common birth defect, the most frequent and most recognizable form of mental retardation. It was named after John Langdon Down who reported its clinical description in 1866. The geneticist Charles Benedict Davenport postulated that Down Syndrome might be due to a chromosome abnormality. The suspected association of Down syndrome with a chromosomal abnormality was confirmed by Jérôme Lejeune in 1959.

In remembrance of the Golden Jubilee of the Discovery of the Biological Basis of Down Syndrome, the National Institute of Biomedical Genomics, Kalyani (an autonomous institution established under the aegis of the Department of Biotechnology, Government of India) and Manovikas Kendra, a not-for-profit Non-Government Organization, dedicated to promote various activities for prevention, identification and early intervention of persons with special needs, is organizing a Scientific and Cultural Programme on September 29, 2010 (Wednesday) at 2 P.M. in Manovikas Kendra, 482 Madudah, Plot: I-24, Sector: J, E.M. Bypass, Kolkata 700107 (Phone: 2442-3305).

**Dr. Surjya Kanta Misra will be the Chief Guest, and
Dr. Ishwar C. Verma and Dr. Mammen Chandy will be the Guests of Honour.**

We cordially invite you to this Programme and we look forward to your presence.

REMEMBERING DOWN SYNDROME
on the Golden Jubilee of the Discovery of its Biological Basis
National Institute of Biomedical Genomics, Kalyani
&
Manovikas Kendra, Kolkata

PROGRAMME

2 – 2:30 P.M.	Presentations by Students of Manovikas Kendra
2:30 - 3 P.M.	Tea Break
3 – 3:10 P.M.	Welcome Remarks by Director, NIBMG & Director, Manovikas Kendra
3:10-3:30 P.M.	Remarks by the Chief Guest, <i>Dr. Surjya Kanta Misra,</i> <i>Hon'ble Minister of Health & Family Welfare, West Bengal.</i> and Acquisition of Paintings and Honouring the Painters
3:30-4:20 P.M.	Trisomy 21 and Thereafter <i>Dr. Ishwar C. Verma</i>
4:20-4:50 P.M.	Genetic Disease: The Future <i>Dr. Mammen Chandy</i>
4:50 - 5 P.M.	Closing Remarks by Director, NIBMG

PRESS RELEASE

The term Down Syndrome is taken from the name of the English physician, Dr. John Langdon Down, who is credited with first describing the condition in 1866. It was not until 1959 that the actual chromosomal abnormality associated with the syndrome was discovered. Dr. Jerome Lejuene found that individuals with Down Syndrome possessed additional genetic material in their cells, usually an extra chromosome. Instead of having 46 chromosomes in each cell (22 pair of autosomes or non-sex chromosomes and one pair of sex chromosomes, XX in females, XY in males), individuals with Down syndrome most commonly have 47 chromosomes with the extra chromosome associated with the 21st pair. The term Trisomy 21 is therefore used to describe this configuration of three #21 chromosomes. About 95% of all individuals with Down syndrome have Trisomy 21.

Since mental retardation frequently occurs in children with Down syndrome, higher integrative abilities such as the ability to think abstractly and to form concepts are likely to be affected. However, appropriate educational programs have demonstrated impressive successes in teaching functional academic skills as well as critical self-help and daily living skills. Most individuals with Down syndrome learn to care for themselves and function within a community. With appropriate training, they can secure employment, often in the competitive job market, especially through supported work programs.

Since 1974, **Manovikas Kendra**, Kolkata, is the **Special World** for those 'differently-able' children, who are otherwise labeled as 'disabled' or 'handicapped'. Manovikas Kendra believes that each individual has some hidden potential and ability and therefore, no-one should be termed as 'disabled' simply because of some impairment in organ level. The 'differently-able' persons have some special needs, which require extra care, concern and support. The inborn abilities and potential of 'differently-able' children need to be honed and sharpened through their exposure to a wide range of therapy, training and special education. And that is the domain of Manovikas Kendra, which is now regarded as a multi-dimensional service provider for the causes, assessment and diagnosis, counseling, therapeutic interventions, special education and vocational training of the special needs children, with a single point objective *of their inclusion in the mainstream of the society...*

The **National Institute of Biomedical Genomics**, Kalyani, is an autonomous institution of the Government of India, Department of Biotechnology. The Institute was established last year. The objective of the Institute is to conduct research, teaching and translation of the role of genetic factors in health and disease. Promoting public awareness of genetic differences among individuals and integrating with institutions engaged in caring for individuals with genetic differences that impact on some their abilities is a part of the translational objective of the Institute. Towards this goal, the National Institute of Biomedical Genomics decided to pay homage to children with special needs because of their genetic endowment on the occasion of the golden jubilee of discovery of the biological basis of Down Syndrome. We are delighted that some of the children being cared for by Manovikas Kendra, many of whom have Down Syndrome, have decided to present some of their drawings and paintings to the National Institute of Biomedical Genomics. We are grateful to them. We will display their work with pride and affection.

**DRAWINGS AND PAINTINGS CREATED BY
CHILDREN WITH DOWN SYNDROME AND OTHER MENTAL HEALTH CHALLENGES
AND
ACQUIRED BY
NATIONAL INSTITUTE OF BIOMEDICAL GENOMICS**











