WE WISH OUR SUBSCRIBERS A HAPPY & PROSPEROUS NEW YEAR

Newsletter

Vol. 23 Issue 1 JANUARY 2022

Price Rs. 10/- Per Copy

Nehru Centre

Discovery of India Building
Dr. Annie Besant Road,
Worli, Mumbai - 400 018.
Phone : 2496 4676-80
Fax : 2497 3827

Annual Subscription Rs. 100

Contents

Website: www.nehru-centre.org

Email: editor@nehru-centre.org

Feedback, comments are welcome.

Published for Nehru Centre
by **Shri Chandrakant M. Rane**
Discovery of India Building,
Dr. A. B. Road, Worli,
Mumbai - 400 018.

Constituent Assembly Debates: 75 years after

Seventy five years ago, on December 9, 1946, the Constituent Assembly of India held its first meeting at 11 am in the Constitution Hall, New Delhi. Two hundred and eight members representing eleven states were present. Dr. Sachchidananda Sinha, the seniormost amongst them not only in age but also in experience as a parliamentarian, was requested to take the chair as temporary chairman of the Constituent Assembly.

In his inaugural address, Dr. Sinha reminisced about the historic Constitutional Convention held by American Constitution makers in 1787 at Philadelphia which drew up what at that time was regarded as the soundest, most practical and workable republican Constitution. It was taken as the model for all subsequent constitutions. The French National Assembly which met two years later in 1789 was greatly influenced by it and so were the constitutions of the self-governing Dominions of the British Commonwealth like Canada, Australia and South Africa. Quoting William Bennett Munro, a renowned political scientist, who had observed that 'the American Constitution is based on a series of agreements as well as a series of compromises', Dr. Sinha added that his long experience of public life spanning over half a century had taught him that reasonable agreements and judicious compromises are nowhere more called for than in framing a constitution for a country like India. He called upon the members of the Constituent Assembly to give careful thought to the fundamental principles of the American system and to the provisions of the American Constitution. Paying a tribute to the American Constitution, Dr. Sinha cited what James Montgomery Beck, one time Solicitor General of the United States, wrote in his famous book titled *The Constitution of the United States: Yesterday, Today and Tomorrow*.

Constitutions, as a governmental panacea, have come and gone; but it can be said of the American Constitution paraphrasing the noble tribute of Dr. Samuel Johnson to the immortal fame of Shakespeare, that the stream of time which has washed away the dissoluble fabric of many other paper constitutions, has left almost untouched its adamantine strength. Excepting the first ten amendments, which were originally a part of the original charter, only nine others have been

adopted in more than one hundred and thirty years. What other form of government has better stood the test of time?

"Hon'ble Members", said Dr. Sinha, "my prayer is that the constitution that you are going to plan may similarly be reared for 'Immortality', if the works of man may justly aspire to such a title, and it may be a structure of 'adamantine strength' which will outlast and overcome all present and future destructive forces."

The idea of a Constituent Assembly being the proper method for the framing of a Constitution was first articulated by the Swaraj Party in a resolution of 1934 which stated thus, "This conference claims for India the right of self-determination, and the only method of applying that principle is to convene a Constituent Assembly, representative of all sections of the Indian people, to frame an acceptable constitution." Dr. Sinha recalled that the above resolution was approved by the All-India Congress Committee which met at Patna in May 1934 and confirmed it at the Congress Session held at Faizpur in December 1936. The confirming resolution declared, "The Congress stands for a genuine democratic state in India where political power has been transferred to the people, as a whole, and the Government is under their effective control. Such a state can only come into existence through a Constituent Assembly having the power to determine finally the Constitution of the country." Hence, the idea of a Constituent Assembly had come to prevail largely as an article of faith in almost all the politically minded classes in the country except the Muslim League.

The Muslim League had not favoured the idea of a Constituent Assembly as a proper and suitable method for framing a Constitution for this country. However, after the Lahore resolution of March 1940, which asked for the establishment of a separate homeland for the Muslims of British India, was passed, the attitude of the Muslim League changed. The League favoured one Constituent Assembly for the areas claimed for a separate Muslim state and the other for the rest of India. In any case, the basic idea of a Constituent Assembly as the only means for the framing of a Constitution was accepted by all.

First meeting of the Constituent Assembly

Dr. Sachchidananada Sinha

Ending with an impassioned peroration, Dr. Sinha said, "Hon'ble Members, I wish your labours success, and invoke divine blessings that your proceedings may be marked not only by good sense, public spirit and genuine patriotism, but also by wisdom, toleration, justice and fairness to all; and above all with a vision which may restore India to her pristine glory, and give her a place of honour and equality amongst the great nations of the world. Let us not forget to justify the pride of the great Indian poet Iqbal, and his faith in the immortality of the destiny of our great, historic, and ancient country, when he summed up in these beautiful lines:

यूनान–ओ–मिस्र–ओ रोमा सब मिट गये जहाँ से,
बाकी अभी तलक है नाम–ओ–निशाँ हमारा ॥
कुछ बात है कि हस्ती मिटती नही हमारी,
सदियों रहा है दुश्मन दौरे ज़मा हमारा ॥

I particularly ask you to bring to your task a broad and Catholic vision, for as the Bible justly teaches us – "Where there is no vision, the people perish"."

What Nehru said....

Usually, when one desires to construct a building, one must have a plan for the structure that one wishes to erect and then collect the material required. For a long time we have been having various plans for a free India in our minds, but now, when we are beginning the actual work, I hope you will be at one with me when I say, that we should present a clear picture of this plan to ourselves, to the people of India and to the world at large…Governments do not come into being by State Papers. Governments are, in fact the expression of the will of the people…We should, therefore, always keep in mind the passions that lie in the hearts of the masses of the Indian people and try to fulfil them.

… Constituent Assembly, December 13, 1946

Nature of Light

By the 17th century, physicists of former times had understood various phenomena related to light and its properties and also put forth theories to explain them. However, the speed and nature of light were two properties which could not be calculated or understood. As discussed in last months's newsletter, the speed of light could be measured quite accurately by the beginning of the 20th century. But with regard to the nature of light, there were two viewpoints. One view was that light was a wave and the other view was that light was a stream of particles. In this article, we shall discuss both viewpoints.

In 1637, French philosopher-mathematician René Descartes (1596–1650) described light as a pressure wave transmitted at infinite speed. He suggested that the pressure waves propagate in an all-pervasive medium that exists everywhere in the universe. He also surmised that the medium does not affect or interact with the light. Hence it must be elastic. He called this medium a 'pervasive elastic medium' as elasticity is the property of a material which regains its original shape after being subjected to change.

In 1665, Robert Hooke (1635 – 1703) an English polymath said that light is a rapid vibration of any medium through which it propagates. He was studying a phenomenon called the 'diffraction of light' or the slight bending of light at sharp edges and 'thin-film interference', a phenomenon due to which we see colours of the rainbow in the oil layer on water (see Fig. 1 below).

Fig. 1 Colours of the rainbow seen on oil layer on water

In 1690, the first detailed theory of the 'wave nature of light' was formulated by Christiaan Huygens (1629 - 1695), a Dutch mathematician, physicist, astronomer and inventor. Using his theory he was able to derive the law of refraction (see Fig. 2) which means the changing of the path of light when it passes from one medium to another. He proposed that light was emitted in all directions as a series of waves and that light travels in a medium called the *luminiferous* (light-bearing) *aether*. He also said that these waves were not affected by gravity. Refraction in simple terms is the bending of light when it passes from one transparent substance to another. This also happens with water, sound and other waves. Due to this bending, which causes refraction of light, we are able to use magnifying glasses. Our eyes would not be able to focus without the refraction of light.

Pierre Gassendi (1592–1655) thought that light was a stream of particles. He was a French philosopher, Catholic priest, astronomer and mathematician and a contemporary of René Descartes. Gassendi's work was published posthumously in 1660.

Isaac Newton was a strong advocate of the corpuscular theory of light. In his book *Hypothesis of Light* published in 1675, he stated that light was composed of corpuscles (particles of matter) which were emitted in all directions from a source. Newton's argument against the wave nature of light was that waves were known to bend around obstacles while light travelled only in straight lines. Newton published the final version of his theory in his book *Opticks* in 1704. His reputation and immense authority in the scientific community helped the particle theory of light to hold sway until early 19th century.

On the other hand, evidence supporting the wave nature of light was being explored by the scientific community.

Michael Faraday (1791 – 1867) was a British scientist who had received little education but was an excellent experimentalist. In 1845, he found that when polarised light was made to pass through a magnetic field its direction of polarization changed. This observation was the first direct evidence that light was related to electromagnetism.

In 1865, James Clerk Maxwell (1831 – 1879), a Scottish mathematician, published *A Dynamical Theory of the Electromagnetic Field*. He demonstrated that electric and magnetic fields travel through space as waves move at the speed of light. On the other hand, Faraday proposed that light is an undulation in the *luminiferous aether*. He derived four equations that unified the theory for previously described phenomena: magnetism, electricity, light and associated radiation.

Fig. 2 Refraction of light

In 1901, Max Planck (1858 - 1947), a German theoretical physicist suggested that although light was a wave, the waves could gain or lose energy only in fixed amounts, which he called 'lumps' of light energy or 'quanta' (from a Latin word for 'how much'). This heralded the beginning of the quantum mechanics era.

Five years later, Albert Einstein used the idea of light quanta to explain photoelectric effect, or the emission of electrons from the surface of a metal when light falls on it. He suggested that light quanta had a 'real' existence.

Today, modern physicists see 'light' as having both properties, as explained earlier which is that it behaves as a wave and also as a particle or quanta. It can also be described with the help of mathematical equations. The 'wave' and 'particle' nature of light are actually metaphors for water waves and any spherical object respectively, which are used for practical purposes.

Nehru Planetarium reopens

After remaining closed for nearly 20 months, Nehru Planetarium re-opened on November 9, 2021 with a new show **Awesome Universe**. It was heartening to see people queuing up to enter the sky theatre once again and applauding the much-awaited reopening.

All Covid precautions are taken and the government norms are strictly followed. Admission to the planetarium is given after a temperature and vaccination check.

Folk Dances of India - Jharkhand

Jharkhand, which came into being on November 15, 2000 as the 28th state of the Union, is the homeland of a large tribal population. It comprises dense forests of the Chhota Nagpur Plateau and Santhal Parganas with distinct cultural traditions. Jharkhand has almost 75 per cent of India's total tribal population (estimated to be 68 million persons in 1991). The two main tribes, the Chhota Nagpur and the Santhals, and the less predominant Bhils and Gonds comprise the population of Jharkhand. They perform various folk dances during harvest season, festivals and social gatherings.

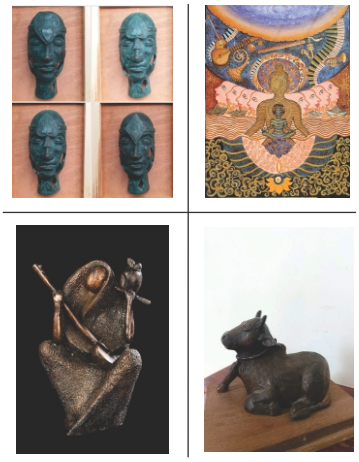
Some popular folk dances of Jharkhand are:

Chhau Dance: In eastern India, about a dozen styles of dance are prevalent under the generic name of Chhau. To differentiate one from the other, the name of the district where it is prevalent is prefixed. Three representative styles are called Mayurbhanj Chhau (Orissa), Seraikela Chhau (Jharkhand) and Purulia Chhau (West Bengal). The main difference among the various Chhau styles is in the use of masks. While some styles use mask, others do not. The Seraikela and Purulia styles of Chhau use masks. The Mayurbhanj Chhau does not use mask. The Seraikela masks are more sophisticated whereas the Purulia masks are more theatrical. All the Chhau dances are customarily performed as part of the Chaitra Parba, a festival held on the last day of the lunar month of Chaitra (March/April). Musical instruments used are *dhol*, the barrel shaped drum with two faces, *dhumsa* or *dhak*, a kind of huge kettledrum and *mahuri*, the reeded wind instrument like *shehnai*, which has sharp sound.

Santhal Dance: Santhals are inhabitants of the Santhal Parganas in Chhota Nagpur. They are born musicians and dancers. The dance is performed on the Magha Parva, the Dassai Parva, the Ba or Baha parva and the Karma. In this, the musicians stand with a *nagara* and *madal* or *mandara*, a drum, a *vansi* or flute and *jhal* or *kasa thal* which are large metallic cymbals. The dancers form a circle and dance. Men and women dance in separate rows with interlocked arms and make many cluster formations. Unlike the dances of the hills, there are no open movements of arms above shoulder level. The rhythmic structure is usually in fours with a set pattern of right leg swung and crossed in front on the first beat, stamp on the left foot, the swinging back or crossing at the back by the right leg on the third and a stamp or a pause on the fourth.

ENSEMBLE - Group Show

SOURABH MAZUMDAR
PANKAJ NIGAM . RADHA DHAKA
DEVYANI KAPOOR . SONIA SAREEN
NAROTTAM PATEL . KAMAL SHARMA
L. N. RAMASWAMY



This group of eight artists will display paintings and sculptures in various forms and mediums.

Tuesday 4th January 2022 to Monday 10th January 2022 (AC Gallery)

RABIN BAR

Rabin Bar will showcase acrylic paintings on various subjects. He has received many awards for his artistic works.

Tuesday 4th January 2022 to Monday 10th January 2022 (Circular Gallery)

NEHRU CENTRE ART GALLERY STUDY CAMP

Works done by art students in study camps organized by the Centre will be on display.

Tuesday 11th January 2022 to Monday 17th January 2022 (AC Gallery)

LAXMI AGARWAL

Laxmi's paintings are on animals and other subjects in mix media.

Tuesday 11th January 2022 to Monday 17th January 2022 (Circular Gallery)

TUSHAR SHETTY

Tushar, an architect by profession will display landscapes, cityscapes and historical places.

Tuesday 18th January 2022 to Monday 24th January 2022 (Circular Gallery)

VIJAY CHOKAKKAR

Vijay specializes in portraits and landscapes in oils and acrylics.

Tuesday 25th January 2022 to Monday 31st January 2022 (AC Gallery)

3D VIZION - Group Show

This group will exhibit abstract and landscape paintings.

Tuesday 25th January 2022 to Monday 31st January 2022 (Circular Gallery)

UNESCO World Heritage Sites in India

28. Chhatrapati Shivaji Maharaj Terminus (formerly Victoria Terminus)

The Victoria Terminus, later renamed Chhatrapati Shivaji Maharaj Terminus, is undoubtedly one of the most magnificent buildings erected in Victorian Bombay. With its grandiose conception, ornate architectural detailing and monumental scale, it can be counted among the greatest architectural achievements of the period and is one of the finest railway station buildings in the entire world. Besides being an architectural landmark, the Victoria Terminus has immense urban significance as a culmination point in an important scenic vista within the city.

Chhatrapati Shivaji Maharaj Terminus

Designed by Frederick William Stevens in the Neo-Gothic style, the building is among the masterpieces of Victorian engineering. It is also stylistically influenced by the architecture of the Indian sub-continent, which is evident in the detailing of its domed cupolas and corner spires. The station and offices were built by the Great Indian Peninsula Railway and completed in May 1888, at a cost of 2.6 million rupees. The station was opened for trains on 1st January 1882 and is among the oldest functioning railway stations in the world.

Interiors of CSMT

The building layout is C-shaped and symmetrical along the east-west axis, with large rooms and lofty ceilings, surrounded with verandas. The central apex is crowned by a high dome, which acts as a focal point in the architectural composition and dominates the skyline. Between each of the eight ribs of the dome are fantastic stained glass windows decorated with the Great Indian Peninsula Railway monogram. The flanking side wings enclose a courtyard which opens onto the street. Facing the Municipal Corporation building and Times of India offices and with the neo-classical Capitol cinema diagonally across the road, it makes for fabulous architectural ensemble on Dadabhai Naoroji Road.

Buff and grey Malad and Kurla basalt, red Dhrangadhara sandstone and white Porbandar limestone constitute the external stone surfaces while the interiors include finishes ranging from Italian marble to encaustic tiles, teak and ebony. In keeping with the architectural craftsmanship of the Gothic revival genre, sculptural motifs of animals and grotesques provide a relief to the ashlar stone.

Chhatrapati Shivaji Maharaj Terminus is one of the most iconic and widely photographed buildings in Mumbai.

Structural motifs of animals

UNESCO declared Chhatrapati Shivaji Maharaj Terminus (formerly Victoria Terminus) as a World Heritage Site in 2004.

Further reading at Nehru Centre Library:

- Bombay Gothic *by* Christopher W. London; India Book House Pvt. Ltd., Mumbai, 2002. Call No. 915.4792/Lon. Barcode – 12444
- Through the Looking Glass: The grade 1 heritage of Mumbai *by* Abha Narain Lambah; Super Book House, Mumbai, 2003. Call No. 915.4792/Lam. Barcode – 12440

R. N. I. No. MAHENG/1999/121 Date of Publication: 18th of every month MCW / 114 / 2021-23

For Private Circulation Only | Posted at Worli, MDG, Mumbai - 400 018. on 24/25th of previous month

NEHRU CENTRE PUBLICATIONS

Books for Sale

Nehru Revisited
India's Defence Preparedness
Nehru and Indian Constitutionalism
Internal Security in India
Constitutionalism and Democracy in South Asia
मुंबई: काल आणि आज
Mumbai: Past and Present
India and Central Asia
Witness to History
India-Russia Relations
India-China Relations
Remembering Einstein
Challenges to Democracy in India
Rule of Law in a Free Society
Science in India
Exploring The Universe

Colourful art catalogues for sale

(1) GOPALRAO DEUSKAR (1995)
(2) VINAYAKRAO KARMARKAR (1996)
(3) MITTER BEDI (1997)
(4) S. L. & G. S. HALDANKAR (1998)
(5) BALAJI & HARISH TALIM (1999)
(6) D. G. KULKARNI (DIZI) (2001)
(7) NARAYAN L. SONAVADEKAR (2003)
(8) NAGESH B. SABANNAVAR (2004)
(9) SAMAKALEEN (2005)
(10) VINAYAK S. MASOJI (2006)
and many others

ART FUSION catalogues

2007 / 2008 / 2009 / 2010 / 2011 / 2012 / 2013 / 2014

Set of five assorted gift cards
Designed by differently abled children

SANSKRUTI - CD ROM :
An aesthetics of Indian culture

DISCOVERY OF INDIA (VCD)

Set of ten greeting cards
Based on Discovery of India Exposition

Available at:
Book Stall, Ground floor,
Discovery of India Building,
Nehru Centre, Worli, Mumbai - 400 018.

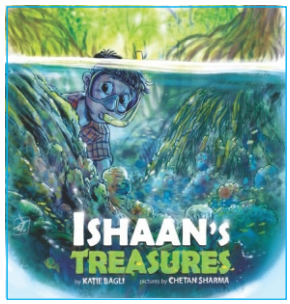
New Arrivals: Books

Sr. No.	Title	Author/s
1.	India and the Bangladesh liberation war	**Chandrashekhar Dasgupta**
2.	China's India war: Collision course on the roof of the world	**Bertil Lintner**
3.	Veerappan: Chasing the brigand	**K. Vijay Kumar**
4.	New life stories: More stories from the prize-winning Radio 4 series	**David Attenboroough**
5.	Two saints: Speculations around and about Ramakrishna Paramahansa and Ramana Maharishi	**Arun Shourie**
6.	Congress Radio: Usha Mehta and the underground radio station of 1942	**Usha Thakkar**
7.	Nehru: The debates that defined India	**Adeel Hussain and Tripurdaman Singh**

MEET-THE-AUTHOR

Children's author **Katie Bagli** will take you on a journey of the marine world

'Ishaan's Treasures' beautifully describes the journey of Ishaan who knows and can recognize several marine creatures. This story of the sea coast will fascinate one and all.



Date: Saturday, 15th January 2022
Time: 11.00 a.m. to 12.00 noon
Online: www.facebook.com/NehruCentreLibrary

OPEN TO ALL

Editor
Arati N. Desai
Design & Layout
Imtiaz Kalu

Printed at
M/s PRINTCOM
I-Wing, Shop No. 1,
Mahalaxmi SRA CHSL., P. B. Marg,
Worli, Mumbai - 400 030.

: nehru-centre.org/library.html
: nehrucentrelibrary.blogspot.in
: nehrucen-koha.informindia.co.in
: www.facebook.com/NehruCentreLibrary
: www.twitter.com/nehrucenlib

OPEN FROM
10.00 a.m. to 5.45 p.m.
On all working days