

## EVERYDAY CURRENT AFFAIRS – DEC 26, 2019

### TAMIL NADU

- The Central Electronics Limited, a public sector undertaking - has invited tenders to set up rooftop solar power panels on government buildings across Tamil Nadu.

**A SWITCH FOR THE BETTER**

Central Electronics Limited has floated tenders to set up more than 1.6MW capacity rooftop solar panels on government buildings



- Many government departments are among the worst defaulters of power bills
- This project will help government offices consume less power from the grid, and make Tangedco less dependent on defaulters
- Within 18 months, majority of the government buildings across the state will have roof top solar power panels
- Buildings owned by the government will be given preference for the project over ones in rented buildings

- ✓ The move follows the signing of agreement in this regard between Tamil Nadu Energy Development Authority (TEDA) and Energy Efficiency Services Limited earlier in September.
- ✓ The state plans to install more than 1.6MW capacity rooftop solar panels on top of the government buildings
- ✓ The agreement has proposed an 18-month deadline to install the targeted capacity.
- ✓ The scope of work as mentioned in the tenders includes survey, design, engineering, supply, construction, erection of the units, testing, commissioning, and operation and maintenance of the projects ranging from 10kW to 50kW each.
- ✓ In Chennai, it has been planned to set up solar power facility at Ezhilagam, DMS building and on school education department campus

- ✓ In case of buildings not owned by the government, roof top solar panels would be fixed only on the agreement with the owners of the building.
- ➔ **The Supreme Court - has fixed a deadline of January 30, 2020 for the establishment of Special Courts for exclusive trial of offences in Tamil Nadu under the Protection of Children from Sexual Offences (POCSO) Act of 2012**
- ✓ As per the apex court, at least one special court should be established in every judicial district that had 100 to 300 pending **POCSO** cases
- ✓ Similarly, two special courts should be set up in districts that had more than 300 pending cases.
- ✓ The special courts should be established with all basic infrastructure including a child-friendly environment and vulnerable-witness court rooms.
- ✓ The SC had directed the Centre to frame a scheme for 100% funding to all States and Union Territories for setting up such special courts
- ✓ As per SC, these special courts shall not deal with any case except those related to sexual offences against children.
- ✓ Tamil Nadu had 32 judicial districts, of which 16 had more than 100 Pocso cases and 8 had more than 200 cases.

## STATES

- **Delhi Cabinet - has passed the Electric Vehicle Policy to tackle air pollution**
- ✓ As per the policy, the government will provide subsidies to promote e-vehicles and will be setting up an electric vehicle board to implement it.
- ✓ The objective of this policy is to make Delhi the capital of electric vehicles in India, ensuring that 25% of the new vehicles registered by 2024 are electric vehicles.
- ✓ The first draft of the e-vehicle policy was announced in November 2018.
- ✓ This policy has been formulated after receiving feedback from several expert agencies like the United Nations Environment Program, International Transport Council, Clean Transport etc.,
- ✓ An electric vehicle doesn't emit harmful gases that results in a pollution-free environment.
- ✓ In this year's budget, the government announced that the GST rates on electric vehicles have been reduced from 12% to 5%.
- ✓ As per the Climate change meet resolutions, India has committed to reducing greenhouse gas emissions by 33% to 35% by the year 2030 as compared to 2005 levels
- **Silver Line, a proposed high-speed rail corridor in Kerala - is expected to be completed by 2024**

**SILVERLINE: TRAVEL TIME TO BE CUT FROM 12 TO 4 HRS**

**LENGTH: 532km**  
**TRACK TO CUT THROUGH 11 DISTRICTS**  
**LAND REQUIRED: 1,226.45 hectares**  
**SPEED OF TRAINS: 200km/hr**  
**COST: ₹56,443 crore**  
 (estimated in May this year)  
**CONSTRUCTION PERIOD: 2020-2024**  
**TRAVEL TIME: Four hours**  
 from Thiruvananthapuram to Kasargod (at present, it is 12-14 hours)

➤ Fast accessibility to improve economical and industrial growth  
 ➤ Fillip for tourism sector  
 ➤ About 11,000 permanent job opportunities



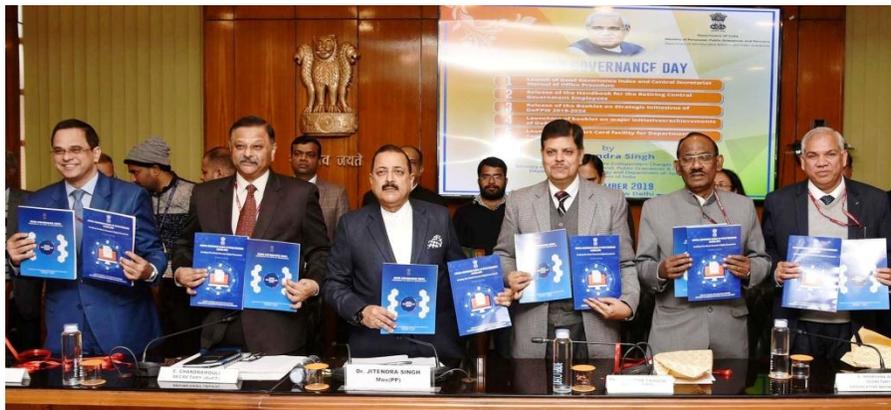
- ✓ The Thiruvananthapuram–Kasargode Semi High Speed Rail Corridor (SHSR), named as ‘Silver Line’, would connect Thiruvananthapuram with Kasargod in Kerala
- ✓ The Union Ministry of Railways has recently approved a financial assistance of Rs 56,000 crore for the completion of the project
- ✓ This 532km double-line project is a joint venture of Government of Kerala and Union Ministry of Railways

## NATIONAL

- **India’s first university for transsexuals - is set to come up in Kushinagar district of eastern Uttar Pradesh**
  - ✓ It will facilitate seamless education from Class-I to post graduation.
  - ✓ The university will also enable the transsexuals to pursue doctoral degrees
  - ✓ It is being set up by Akhil Bharatiya Kinnar Shiksha Seva Trust (All-India Transgender Education Service Trust)
  - ✓ The foundation stone of the University was laid on December 23
  - ✓ The university is first of its kind in the country, whose campus will be exclusively for transsexuals.
  - ✓ Admission into the University will formally open in January and classes will begin full-fledged from February/March.
- **Union Minister of Communication and IT, Ravi Shankar Prasad - inaugurated “Digital Village Gurawara” in Rewari, Haryana on December 25**
  - ✓ During the launch, the Minister announced that the Government is planning to offer free Wi-Fi services to about 48,000 villages under Bharatnet project till March 2020.
  - ✓ The Government of India has so far connected 1,30,000 gram panchayats and 48,000 villages to Wi-Fi services through Bharatnet.



- ✓ However, still more than 50,000 Gram Panchayats are yet to be connected.
  - ✓ In the interim budget this year, then Finance Minister Piyush Goyal had announced the government's target of 1, 00,000 villages as 'Digital Villages' over the next five years.
  - ✓ 'Digital Village' is a village where citizens can avail various e-services of the central and the State governments, along with private players.
  - ✓ These services include banking, insurance, tele-medicine, pension and other e-governance services.
  - ✓ These villages are also equipped with LED bulb assembly unit, sanitary napkin unit and rural-Wifi infrastructure.
  - ✓ The idea of Digital village was conceptualised by the Common Service Centre (CSC) under the Ministry of Electronics and IT
  - ✓ There were about 3.6 lakh CSCs in the country covering 2.25 lakh gram panchayats.
  - ✓ The Government announced in June 2018 that all gram panchayats will receive broadband connectivity by 2020.
  - ✓ The Bharatnet project was launched in 2011.
  - ✓ It is being implemented by the Ministry of Telecommunications
  - ✓ As part of the project, 100 Mbps speed internet were to be provided to around 2.5 lakh Gram Panchayats.
  - ✓ The initiative is part of the National Optical Fibre Network project.
  - ✓ It is seen as a major initiative to achieve the centre's vision of ambitious 'Digital India'.
- **The Centre - launched Good Governance Index on December 25, 2019**
- ✓ As per the Index, the States and Union Territories were divided into 3 groups namely Big states, North East and Hill states and Union territories.



- ✓ Tamil Nadu topped in Good Governance Index in the “Big States” category..
- ✓ It was followed by Maharashtra, Karnataka, Chhattisgarh and Andhra Pradesh.
- ✓ Odisha, Bihar, Goa and Uttar Pradesh were the poor states in this category
- ✓ Jharkhand was ranked the last in good governance index.

State of governance					
Rank	Big states	Score	Rank	Big states	Score
1	Tamil Nadu	5.62	10	West Bengal	4.84
2	Maharashtra	5.40	11	Telangana	4.83
3	Karnataka	5.10	12	Rajasthan	4.8
4	Chhattisgarh	5.05	13	Punjab	4.57
5	Andhra Pradesh	5.05	14	Orissa	4.44
6	Gujarat	5.04	15	Bihar	4.40
7	Haryana	5.00	16	Goa	4.29
8	Kerala	4.98	17	Uttar Pradesh	4.25
9	Madhya Pradesh	4.85	18	Jharkhand	4.23

- ✓ In the North East and hill states category, Himachal Pradesh ranked first, followed by Uttarakhand, Tripura, Mizoram and Sikkim.
  - ✓ The bad performers in this category include Jammu and Kashmir, Manipur, Meghalaya, Nagaland and Arunachal Pradesh.
  - ✓ Madhya Pradesh, Mizoram and Daman and Diu were the best performing states in Agricultural and allied ranking
  - ✓ Under the category of commerce and industries, Delhi, Uttarakhand and Jharkhand were the top performers.
- **The Centre’s Drinking water department – issues the draft guidelines for “Har Ghar Jal” scheme**
- ✓ The scheme envisages that all rural households in India to get tap water supply at three points — kitchen, washing/bathing place and toilet — by 2024
  - ✓ As part of the scheme, women will be participating in the planning, implementation and monitoring of the project
  - ✓ The programme will be driven by panchayats, village water and sanitation committee (VWSC), paani samitis or user groups in villages

- ✓ It will ensure that about 81% rural households get 55 litres of tapped water supply per person per day (LPCD) within the 2024 deadline.
  - ✓ All states will have to complete a fresh baseline survey by March, 2020 to identify the number of households that have not yet got the tapped water supply
  - ✓ The government will also set up a centralised dashboard for 'live' updates of the coverage under the scheme.
- **India - sent its first trial shipment of fresh vegetables from Varanasi to Dubai by sea route recently**
- ✓ The Agricultural and Processed Food Products Export Development Authority (APEDA) sent 14 Metric Tons (1 container) of fresh vegetables from Varanasi
  - ✓ APEDA, an organization under Ministry of Commerce and Industry, promotes export of agricultural and processed food products from India.
  - ✓ It has identified 5 potential districts of UP namely Mirzapur, Ghazipur, Chandauli, Jaunpur and Sant Ravidas Nagar to set up export hubs.
  - ✓ India is ranked second in fruits and vegetables production next to China globally.
  - ✓ India produces 90.2 million tons of fruits and 169.1 tons of vegetables (2015-16) annually
- **The National Rail Transport Institute (NRTI) - signed an Memorandum of Understanding (MoU) with University of Birmingham in Rail Bhawan, New Delhi**
- ✓ As per the MoU, the country's first Centre of Excellence for 'Next Generation Transportation Systems' will be set up



- ✓ NRTI is a deemed to be university under Union Ministry of Railways.
- ✓ The Centre would be involved in developing the Rail and Transportation sector in India.
- ✓ It will offer post-graduate, doctoral and post-doctoral programmes, alongwith customized training programmes for in-service professionals

- **Union Minister of Rural Development, Agriculture and Farmers Welfare, Narendra Singh Tomar - launched the third phase of Pradhan Mantri Gram Sadak Yojana recently**



- ✓ The third phase intends at the consolidation of 1,25,000 km of connectivity that primarily aims at rural links connecting Gramin Agricultural Markets
  - ✓ The scheme was launched in 2000, with the 100% funding by the central government.
  - ✓ The funding pattern is later revised to 60:40 between the centre and states, based on the recommendation of the 14th finance commission
  - ✓ In the north-eastern states, it is set as 90:10.
  - ✓ Under the scheme, so far 53,491 rural road works have been completed, connecting 97.27% of feasible habitations
- **The Union Ministry of Home Affairs (MHA) - has sent an alert to all States recently, warning them about the vulnerability of Android operating system to a new bug called 'StrandHogg'**
  - ✓ The bug allows real-time malware applications to pose as genuine applications and access user data of all kind from the mobile phone.
  - ✓ All versions of Android (including Android 10) are announced as 'vulnerable' to this bug
  - ✓ This malware can potentially listen to user conversations, make calls, record conversations, access photo album, read or send messages, as well as get login credentials to various accounts.
  - ✓ The main entry points for 'StrandHogg' to launch the attack includes Pop-up notifications in phone, asking for permission to send notifications, messages etc.,

## **SCIENCE, TECHNOLOGY & ENVIRONMENT**

- **The Centre - is testing a prototype of an Indian equivalent of popular messaging application platforms, such as WhatsApp and Telegram, for a secured internal usage.**
- ✓ This secure messaging app is codenamed as 'Government Instant Messaging System (GIMS)'

- ✓ It is being developed for the usage among employees of Central government as well as state government departments and organisations for intra and inter organisation communications.
- ✓ Currently the app is in pilot testing stage across some states, (like Odisha) and is learnt to have been released to Indian Navy for testing on trial basis.
- ✓ GIMS is developed by Kerala unit of National Informatics Centre (NIC).
- ✓ Unlike the other popular messaging applications, GIMS employs end-to-end encryption for one-to-one messaging

## ECONOMY

- **HDFC Bank Ltd – becomes the third company in India to cross the \$100 billion market capitalization (M-Cap) in intraday trading on December 19, closing the day at \$99.5 billion**
- ✓ It has now joined Reliance Industries Ltd (RIL), which has a market value of \$140.74 billion, and Tata Consultancy Services Ltd., (TCS) which has a market capitalization of \$114.60 billion.
- ✓ HDFC, one of India’s largest private-sector lenders, is ranked 110th in the list of world’s most valued firms
- ✓ It is ranked 26<sup>th</sup> among the global firms that have a market capitalization of more than \$100 billion.
- **Prime Minister Narendra Modi – addressed the 100<sup>th</sup> anniversary of the Associated Chambers of Commerce and Industry (ASSOCHAM) in New Delhi recently**



- ✓ The theme for the event – ‘New India Aspiring for 5 trillion USD’
- ✓ The ASSOCHAM, apex trade association in the country, promotes domestic and international trade.
- ✓ It was established in 1921 with its offices at Kolkata, Bengaluru and Ahmedabad.
- ✓ It has the powers to issue certificates of origin, recommend business visa and certify commercial invoices within the country.

- ✓ According to IMF's World Economic Outlook Database, 2019, China tops the list with 25.27 trillion USD economy, followed by US (20.49 trillion USD), Japan, Germany, UK and India (2.72 trillion USD)

## SPORTS

- **Anjum Moudgil – wins the women's 50m rifle 3 positions title for a third year in-a-row in the 63rd National Championship at Bhopal**



- ✓ Moudgil also won the team gold in the category for Punjab.
- ✓ Tamil Nadu's N Gaayathri finished with the silver medal
- ✓ Nishchal of Haryana won bronze in the women's 3P while also winning the junior women's 3P title
- ✓ Moudgil's fellow Tokyo Olympics quota holders Abhishek Verma and Yashaswini Singh Deswal were also crowned national champions in the 10m air pistol mixed team competition
- ✓ Manu Bhaker, another Tokyo Olympics quota winner, won the junior mixed team pistol event partnering with Sarabjot Singh
- ✓ This is a record seventh gold for Manu in the Nationals.

## DETENTION CENTRES – Q&A

- **The topic of 'Detention Centres' has been in spotlight ever since the concerns over the Citizenship Amendment Act (CAA) and a nationwide National Register of Citizens (NRC) were raised.**
- **What are 'Detention Centres'?**
  - ✓ Detention centres are supposed to house illegal immigrants after they are declared 'foreigners' by tribunals/ courts or foreigners who have served their sentence for an offence in India and are awaiting deportation to their home country.
  - ✓ Under Section 3(2)(c) of The Foreigners Act, 1946, the Centre has powers to deport foreign nationals staying illegally in India.
  - ✓ States can also set up their own detention centres.

- How is NRC connected with the Detention Centres?
  - ✓ In Assam, the NRC is a list of residents prepared to identify bonafide residents and detect illegal migrants.
  - ✓ It was commenced in 2015 as per the SC's directions to the Registrar General of India in 2013 to update the exercise
  - ✓ The updated final NRC was released on August 31, 2019, with over 19.07 lakh applicants failing to make it to the list
  - ✓ The 'non-included' persons should have to present their case before the foreigners' tribunals which are quasi-judicial bodies that exclusively adjudicate matters of citizenship.
  - ✓ Till it's finalized by the tribunals, non-inclusion in NRC does not automatically mean that someone is a foreigner.
- What are the States that have Detention Centres now in the country?
  - ✓ In Assam, detention centres were first set up in 2005
  - ✓ The Government had asked all the states to set up such centres in 2009, 2012, 2014 and 2018 in order to restrict the movements of illegally staying foreign nationals so that they are available when deportation is ordered.
  - ✓ Assam has six temporary detention centres — in Goalpara, Tezpur, Jorhat, Dibrugarh, Silchar and Kokrajhar — set up inside district jails where about 988 people are housed, as per the Government estimates.
  - ✓ One standalone detention centre is being built in Matia that will be India's biggest with a capacity to house 3,000 inmates.
  - ✓ Earlier this year, the Bengal government gave its approval to build a detention centre each in New Town and Bongaon.
  - ✓ There is one in Karnataka, Goa and Delhi.
- Will the Detention Centre be similar to a Prison?
  - ✓ They are not supposed to be.
  - ✓ The detention centres will have modern amenities like skill centres, creche for children, and other facilities.
  - ✓ It will also have a 'cell' to help detainee foreigners contact the concerned mission/embassy/consulate or their family through proper procedure.
  - ✓ In May this year, the Supreme Court allowed those who have completed 3 years in detention camps to be released on bail after furnishing surety bonds of ₹1 lakh each from two Indian citizens and biometric details.
  - ✓ They have to report to the local police station regularly during their legal battle to prove their citizenship in higher courts.

## **SOLAR ECLIPSE - REPORT**

# SUN, MOON AND THE RING OF FIRE

## THE PHENOMENA

### PARTIAL SOLAR ECLIPSE



- > Occurs when Moon casts only outer part of its shadow, or the penumbra, on Earth
- > It will look as if Moon has taken a bite out of Sun

### ANNUAL ECLIPSE

- > Occurs when Moon is too far away from Earth to completely cover Sun
- > This results in a ring of light around the darkened Moon
- > Sun's corona is not visible during an annular eclipse

### TOTAL SOLAR ECLIPSE



- Occurs when the new moon comes between Sun and Earth and covers the entire disk of Sun casting the darkest part of its shadow, the umbra, on Earth

### ALL ABOUT TODAY'S ECLIPSE

- > Only **partial** phase of the eclipse will be **visible in Chennai**
- > At maximum, **84.7%** of the disk of Sun will be covered by Moon
- > The eclipse will begin at **8.09am** and end at **11.19am**
- > Maximum eclipse will be at **9.35am**
- > The annular phase will be visible from **Ooty, Coimbatore, Tirupur, Erode, Karur, Dindigul, Sivaganga, Tiruchirapalli, Pudukottai** and its adjoining areas

> In the districts, eclipse will begin at **8.06am** and will last till **11.19am**

> Maximum eclipse will be between **9.29am** and **9.35am** when **93%** of the disk of Sun will be covered by Moon

**THE ANNULARITY WILL LAST FOR THREE MINUTES**



### HOW TO WATCH

- > Use a simple card projector, a box projector or project using **binoculars or telescope**
- > Use special purpose solar filters such as **eclipse glasses**
- > Use a welder's glass rated **14 or higher**



### WHERE TO WATCH

- > Birla Planetarium in Chennai, Coimbatore and Trichy will install telescopes, pinhole projectors and give solar goggles and welder's glass for people to watch from **8am to 11.20am**



### DON'T'S

- > Don't look at Sun directly without protective gear
- > Don't watch an eclipse through an x-ray film as it can damage the retina

**Solar eclipses produce harmful rays that can cause blindness** | During eclipse, Sun's corona emits only electromagnetic radiation. Scientists have studied this radiation and found that coronal light is million times fainter than the light from Sun. There is nothing in the coronal light that crosses 150 million kilometres to cause blindness. But catching



a glimpse with naked eyes can cause retinal damage

**Pregnant women should not step out** | This is due to the belief that harmful radiations are emitted during an eclipse. Also neutrino particles zip through Sun into space, due to nuclear fusion, and reach Earth. But it is harmless to the



### MYTHS

human body or pregnant women as every second our body is pelted by trillions of neutrinos

**Eclipse will poison food prepared during event** | Observations over years have shown no such evidence as the radiation has not harmed the food stored or crops in the field



**Harbinger of bad events** | People perform poojas and take shower after eclipse as they believe the eclipse has evil effects. Nasa, in an online post, says psychologists call it a classic case of confirmation bias where people tend to remember all the occasions when two things happened together but forget all of the other times when they did not

Text: U Tejonmayam, Graphic: Sasi Menon

