Daily News Decode

07.04.21

TRIBUNALS REFORMS (RATIONALISATION AND CONDITIONS OF SERVICE) ORDINANCE, 2021



- The President of India has promulgated the Tribunals Reforms (Rationalisation and Conditions of Service) Ordinance, 2021, by which the appellate authorities under nine Acts have been done away with and the right to hear appeals under the statute has been conferred to High Courts.
- Section 184 of the Finance Act, 2017 has been amended to empower the Central Government to make rules for qualifications, appointment, term of office, salaries and allowances, resignation, removal and other terms and conditions of service of Members of Tribunals.
- The Ordinance omits following Tribunals/ Appellate Authorities from the purview of Finance Act:
- Airport Appellate Tribunal established under the Airport Authority of India Act, 1994
- Appellate Board established under the Trade Marks Act, 1999
- Authority for Advance Ruling established under the Income Tax Act, 1961
- Film Certification Appellate Tribunal established under the Cinematograph Act, 1952
- Further, it substitutes the National Consumer Disputes Redressal Commission established under the erstwhile Consumer Protection Act, 1986 with a National Consumer Disputes Redressal Commission established under the Consumer Protection Act, 2019.

SADABAHAR



- Shrikishan Suman (55 years), a farmer from Kota, Rajasthan, has developed an innovative mango variety which is a regular and round-the-year dwarf variety of mango called Sadabahar, which is resistant to most major diseases and common mango disorders.
- The fruit is sweeter in taste, comparable to langra and being a dwarf variety, is suitable for kitchen gardening, high-density plantation, and can be grown in pots for some years too.

- Besides, the flesh of the fruits, which is bourn round the year, is deep orange with sweet taste, and the pulp has very less fiber content which differentiates it from other varieties.
- The innovative attributes of the variety have been verified by the National Innovation Foundation (NIF), India, an autonomous institution of the Department of Science & Technology, Government of India.
- NIF has also facilitated the plantation of Sadabahar mango variety in the Mughal Garden at Rashtrapati Bhawan in New Delhi.

CHAFF TECHNOLOGY



- Defence Research and Development Organisation (DRDO) has developed an Advanced Chaff Technology to safeguard the naval ships against enemy missile attack.
- Defence Laboratory Jodhpur (DLJ), a DRDO laboratory, has indigenously developed three variants of this technology namely Short Range Chaff Rocket (SRCR), Medium Range Chaff Rocket (MRCR) and Long Range Chaff Rocket (LRCR) meeting Indian Navy's requirements.
- Chaff is a passive expendable electronic countermeasure technology used worldwide to protect naval ships from enemy's radar and Radio Frequency (RF) missile seekers.
- The importance of this development lies in the fact that very less quantity of chaff material deployed in the air acts as decoy to deflect enemy's missiles for safety of the ships.

Amarkantak Plateau



- Amarkantak Plateau, mountain range in Madhya Pradesh state, central India.
- It runs in a north-south direction and forms the eastern base of the triangular Satpura Range.
- The Maikala Range consists of laterite-capped, flat-topped plateaus (pats) with elevations ranging from 2,000 to 3,000 feet (600 to 900 metres). The Satpura-Maikala watershed is the second largest in India.
- The Narmada, Son, Pandu, Kanhar, Rihand, Bijul, Gopad, and Banas rivers run almost parallel from south to north and have carved extensive basins in the relatively soft rock formations of the Maikala Range.
- Vegetation varies from grass and thorny trees to deciduous trees such as teak and sal (Shorea robusta).

• The Achanakmar-Amarkantak Biosphere Reserve is a biosphere reserve in India that extends across the states of Madhya Pradesh and Chhattisgarh, covering a total area of 383,551 hectares

INS Viraat



- Recently, Supreme Court ordered a "status quo" with regard to the dismantling of India's decommissioned aircraft carrier, INS Viraat, at the Alang shipbreaking yard in Gujarat.
- INS Viraat was originally commissioned by the British Royal Navy asHMS Hermes on 18 November 1959, 15 years after she was laid down in June 1944.
- INS Viraat served as the flagship of the Royal Navy's task force during the Falkland Islands campaign in 1982 and was commissioned from active duty in 1985.
- It played a major role in Operation Jupiter in 1989 during the Sri Lankan Peacekeeping operation.
- It is the second Centaur-class aircraft carrier which was in service for 30 years before being decommissioned in March 2017.
- The ship's Motto was the Sanskrit phrase 'Jalamev Yashya, Balamev Tasya' which means 'who controls the sea is the powerful'.
- The ship was also deployed during Operation Parakram (2001-02) following the terror attack on the Indian Parliament.
- It has participated in various international joint exercises like Exercise Malabar (USA), Exercise Varuna (French), Naseem-Al-Bahar (Oman Navy).
- It holds the world record as mentioned in the Guinness Book of records for being the longest serving warship of the world.
- Operation Jupiter: As a part of Indian Peace Keeping Operations in Sri Lanka in the wake of the breakdown of the Indo- Sri Lankan Accord of 1986
- Operation Parakram: Followed after the terrorist attack on Indian Parliament.
- Operation Vijay: The Ship played a key role in creating a blockade against Pakistan during the Kargil War in 1999.

Bengal Florican



- The Bengal florican (Houbaropsis bengalensis), also called Bengal bustard, is a bustard species native to the Indian subcontinent, Cambodia, and Vietnam.
- The species has two disjunct populations, one in the Indian Subcontinent (Uttar Pradesh, Assam, and Arunachal Pradesh), the other in South-East Asia.
- It is the only member of the genus Houbaropsis.
- Adult Bengal floricans range from 66–68 cm in length and stand around 55 cm tall.
- The male has black plumage from the head and neck to underparts. Its head carries
 a long lanky crest, and the neck has elongated display plumes.
- It is listed as Critically Endangered on the IUCN Red List because fewer than 1,000 individuals were estimated to be alive as of 2017.
- The bird is listed under Schedule I of the Wildlife Protection Act of India, 1972 and Appendix I of CITES.

E9 initiative



- Minister of State for Education to attend a consultation meeting of Education Ministers of E9 countries on E9 initiative: Scaling up digital learning to accelerate progress towards SDG4 on 6th April, 2021.
- The UN is spearheading the global initiative on digital learning and skills for all, targeting marginalized children and youth and aiming to close the digital divide and drive rapid change in education systems.
- Aim: The initiative aims to accelerate recovery and advance the Sustainable Development Goal 4 agenda by driving rapid change in education systems in three of the 2020 Global Education Meeting priorities:
- Support to teachers Investment in skills and Narrowing of the digital divide.
- 9 member countries are Bangladesh, Brazil, China, Egypt, India, Indonesia, Mexico,
 Nigeria and Pakistan

Shantir Ogroshena Exercise



- Indian Army will participate in the multinational military exercise Shantir Ogroshena 2021 (Front runner of the peace) will be held in Bangladesh from April 4-12, 2021.
- Theme of the exercise is 'Robust Peacekeeping Operations'.
- The multinational military exercise will be organized to commemorate the birth centenary of Bangladesh 'Father of the Nation' Bangabandhu Sheikh Mujibur Rahman and mark the glorious 50 years of liberation.
- Indian Army contingent comprising of 30 personnel including officers, JCOs and jawans of a Battalion from the Dogra Regiment will participate in the military exercise.
- Military observers from the USA, UK, Turkey, Kingdom of Saudi Arabia, Kuwait and Singapore will also be in attendance throughout the exercise

Algorithms that may help optimise fuel efficiency made: IIT Mandi



IIT Mandi researchers have developed algorithms to predict the functioning of internal combustion (IC) engines in vehicles so that their operation can be optimised for maximum fuel efficiency and minimum emissions.

The algorithms' application can be extended to determine other variables such as the state-of-charge in battery-operated vehicles in real-time as well.

NATIONAL SUPER COMPUTING MISSION (NSM)



The National Supercomputing Mission was launched to enhance the research capacities and capabilities in the country by connecting them to form a Supercomputing grid, with National Knowledge Network (NKN) as the backbone.

- The Mission is being jointly steered by the Department of Science and Technology (DST) and the Ministry of Electronics and Information Technology (MeitY) and implemented by the Centre for Development of Advanced Computing (C-DAC), Pune, and the Indian Institute of Science (IISc), Bengaluru.
- Computing infrastructure has already been installed in four premier institutions and installation work is in rapid progress in 9 more.
- Completion in of Phase II of NSM in September 2021 will take the country's computing power to 16 Petaflops (PF).
- Phase III, initiated this year, will take the computing speed to around 45 Petaflops
- This will include three systems of 3 PF each and one system of 20PF as a national facility.
- PARAM Shivay, the first supercomputer assembled indigenously, was installed in IIT (BHU), followed by PARAM Shakti, PARAM Brahma, PARAM Yukti, PARAM Sanganak at IIT-Kharagpur IISER, Pune, JNCASR, Bengaluru and IIT Kanpur respectively.
- PARAM Siddhi AI, the high-performance computing-artificial intelligence (HPC-AI) supercomputer, has achieved global ranking of 62 in TOP 500 most powerful supercomputer systems in the world, released on 16th November 2020.

SHITALAKSHYA RIVER



- A Bangladesh ferry carrying around 50 passengers collided with a cargo vessel and sank in the Shitalakhsya River in Narayanganj in Bangladesh, leaving at least 26 people dead.
- Shitalakshya River (also known as Lakhya River) is a distributary of the Brahmaputra.
- In its initial stages it flows in a southwest direction and then east of the city of Narayanganj in central Bangladesh until it merges with the Dhaleswari near Kalagachhiya.
- A portion of its upper course is known as Banar River.

CRAFT INSTRUCTOR TRAINING SCHEME (CITS)



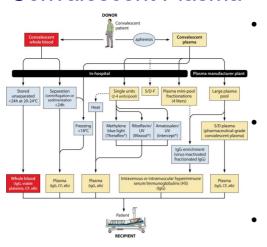
- The Directorate General of Training (DGT), under the aegis of Ministry of Skill Development & Entrepreneurship (MSDE), announced results of the All India Trade Test (AITT) for CITS Academic session 2019-2020.
- DGT offers Crafts Instructor Training programmes under Crafts Instructor Training Scheme (CITS) to ITI trainees who aspire to pursue a career in skill training.
- Comprehensive training both in skills and training methodology is imparted to the instructor trainees to make them conversant with techniques of transferring hands-on skills, to train skilled manpower.
- At the end of year-long CITS training, an All India Trade Test (AITT) for each of the 34 trades is conducted online by DGT.
- On successful completion of the training, trainees are awarded National Craft Instructor Certificate (NCIC).

Lab on Wheels



- The idea is to impart education in the fields of Mathematics and Science to those students who come from marginalised and poor economic backgrounds, in order to pique their interests in these subjects while pursuing higher education. In the end, the hope is that it becomes mutually beneficial, if some of these students decide to take admission in DTU once they finish schooling.
- The programme will initially target 12 schools. The bus will function in three shifts of three hours each from 8 am to 11 am, 11 am to 2 pm and 2 pm to 5 pm.
- One school will be visited once a week, and continuously for eight weeks, said DTU PRO Anoop Lather.
- Each shift will have two volunteers (DTU students) teaching 16 students if it's a computer lab, or 25 students if it's regular classroom teaching. After eight weeks, a new set of 12 schools will be selected.

Convalescent Plasma



A recent study published in the journal JCI Insights has found that convalescent plasma treatment is both safe and effective, significantly improving clinical outcomes.

Plasma is the liquid part of the blood. Convalescent plasma, extracted from the blood of patients recovering from an infection, is a source of antibodies against the infection.

The therapy involves using their plasma to help others recover.

• For Covid-19, this has been one of the treatment options. The donor would have to be a documented case of Covid-19 and healthy for 28 days since the last symptoms.

North Atlantic Treaty Organization



- Ukrainian President Volodymyr Zelensky has urged NATO to speed up his country's membership in the alliance, saying it was the only way to end fighting with pro-Russia separatists.
- It is an intergovernmental military alliance.
- Established by Washington treaty.
- Treaty that was signed on 4 April 1949.
- Headquarters Brussels, Belgium.
- Headquarters of Allied Command Operations Mons, Belgium.
- It constitutes a system of collective defence whereby its independent member states agree to mutual defence in response to an attack by any external party.
- NATO membership is open to "any other European state in a position to further the principles of this Treaty and to contribute to the security of the North Atlantic area."

Heat waves



- As per the India Meteorological Department (IMD), Heat wave conditions very likely in isolated pockets over Rajasthan, Vidarbha and interior Tamil Nadu.
- The warning comes after maximum temperatures of more than 40 degrees Celsius were recorded recently in most pockets.
- The IMD says heatwave is considered when the maximum temperature of a station touches at least 40 degrees Celsius or more for plains, 37 degrees Celsius or more for coastal regions and at least 30 degrees Celsius or more for hilly regions.

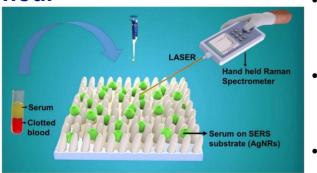
- Heatwave is declared when the departure from normal temperature is by 4.5 to 6.4 degrees Celsius and a severe heatwave is when the departure from normal is more than 6.4 degrees Celsius.
- For plains, based on actuals maximum temperature, IMD considers heatwave when actual maximum temperature is more than 45 degrees Celsius and severe heatwave when it is more than 47 degrees Celsius.

Indian Astronomers Trace Rare Supernova Explosion to Hottest Group of Stars 'Wolf-Rayet'



- A team of astronomers from the Aryabhatta Research Institute of Observational Sciences (ARIES), along with international collaborators, conducted the optical monitoring of one such stripped-envelope supernova called SN 2015 dj hosted in the galaxy NGC 7371 which was spotted in 2015.
- The rare Wolf-Rayet stars are highly luminous objects a thousand times that of the Sun and have intrigued astronomers for long
- They are massive stars and strip their outer hydrogen envelope which is associated with the fusion of helium and other elements in the massive core.
- Tracking of certain types of massive luminous supernovae explosion can help probe these stars that remain an enigma for scientists.
- The scientists also found that the original star was a combination of two stars one
 of them is a massive WR star and another is a star much less in mass than the Sun.
- Supernovae are highly energetic explosions in the universe releasing an enormous amount of energy.
- Long-term monitoring of these transients opens the door to understand the nature of the exploding star as well as the explosion properties.
- It can also help enumerate the number of massive stars.

IIT-Delhi develops device that gives dengue results within 1 hour The Indian Institute of Technology Delli



- The Indian Institute of Technology Delhi (IIT-D) has developed a device that provides dengue test results within an hour.
- The device had been clinically tested in collaboration with the National Institute of Malaria Research, the institute said.
- "The device provides a sensitive, rapid and field-deployable diagnosis of dengue at the early stage," it added.