

EVERYDAY CURRENT AFFAIRS – JUNE 15, 2021

NATIONAL

- Pune-based startup, Thincr Technologies India Private Ltd – has developed a special kind of cost-effective 3D-printed anti-viral mask



- ✓ It has been developed in collaboration with Technology Development Board (TDB) of the Department of Science and Technology
- ✓ The 3D-printed mask is coated with antiviral agents known as 'virucides', which attacks the coronavirus when it comes in contact with it.
- ✓ The coating has been tested and shown to inactivate SARSCoV-2 virus.
- ✓ The project to develop virucidal masks received financial support from TDB in May last year.
- ✓ Thereafter, an agreement was signed on July 8, 2020 for developing virucidal masks.
- ✓ According to Thincr Technologies, these virucidal masks are more effective in checking the spread of Covid-19 than ordinary N-95, 3-ply and cloth masks
- ✓ They provide an additional anti-viral protection beyond the shield provided by filtration mechanisms

- ✓ Thincr Technologies has now applied for a patent for the product, whose commercial production has started.
- ✓ Around 6,000 of such masks have been distributed by an NGO to four government hospitals in Nandurbar and Nashik in Maharashtra and Bengaluru for use by healthcare workers.

SCIENCE, TECHNOLOGY & ENVIRONMENT

- **US Pharma Novavax – to launch its vaccine in India with the Serum Institute of India as manufacturing partner**
- ✓ As per Indian government estimates, atleast 20 crore Novavax shots (five crore a month) may be available during September-December, 2021
- ✓ Novavax, named Covovax in India, is in advanced stages of Phase 2/3 “observer-blinded, randomised, active-controlled” bridging trials with ICMR
- ✓ In this regard, SII had enrolled 1,600 participants over 18 years across 15 centres.
- ✓ SII has also indicated an interest in conducting trials in children
- ✓ If things go as per plan, India may become the first country for launch of the vaccine.
- ✓ As per the trials, the vaccine was found to be effective against the Alpha variant first found in Kent, though at a less efficacy of 86%.
- ✓ It reported a much lower 49% efficacy against the variant first found in South Africa.
- ✓ The sub-protein two-shot vaccine received \$1.6 billion assistance from the US government despite the company not having any previous record of developing vaccines that were marketed.

90% EFFICACY

➤ Novavax has scored 90.4% in efficacy test conducted in US and Mexico

➤ Novavax, named Covovax in India, is in advanced stages of phase 2/3 bridging trials with SII enrolling 1,600 participants across 15 centres

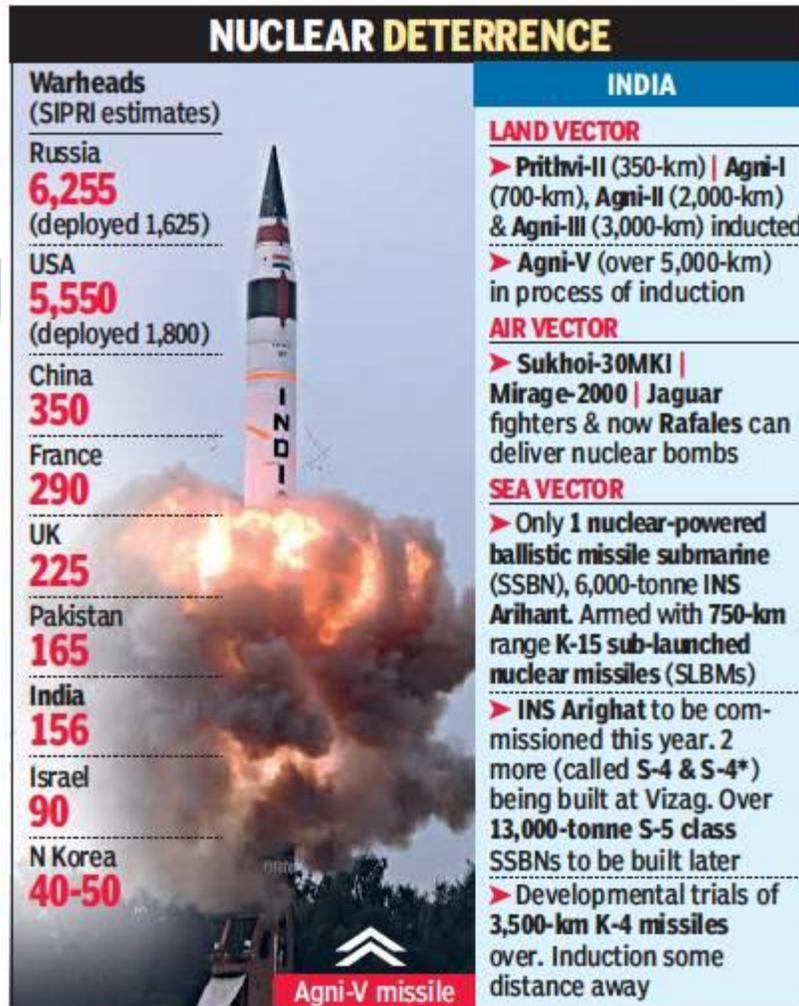
➤ As per India estimates, 20cr Novavax shots can be available during Sept-Dec. SII has also indicated an interest in conducting trials in children

- ✓ On June 14, US company Novavax announced the results of large-scale trials of its two-shot Covid-19 vaccine in the US and Mexico
- ✓ In the 29,960-person trial, the vaccine demonstrated an overall efficacy of 90.4%, on par with the vaccines made by Pfizer-BioNTech and Moderna, but better than Johnson and Johnson
- ✓ The protein-based vaccine was more than 93% effective against the more easily transmissible predominant variants.

- ✓ While the trial was being conducted, Alpha variant that was first found in the UK was the most common strain.
- ✓ The variants first identified in Brazil, South Africa and India were also detected among participants
- ✓ The vaccine was 91% effective among volunteers at high risk of severe infection and 100% effective in preventing moderate and severe cases.
- ✓ It was roughly 70% effective against variants that Novavax was unable to identify
- ✓ Novavax said it may not seek approval from USFDA until the end of September.
- ✓ It is also applying for approval in UK, EU and South Korea, apart from India

RANKINGS

- **India – has 156 nuclear warheads, as against 350 of China and 165 of Pakistan, as per the latest assessment of the Stockholm International Peace Institute (SIPRI) released on June 14**



- ✓ The nine nuclear-armed countries together possess an estimated 13,080 nuclear weapons, with Russia (6,255 warheads) and the US (5,550) at the top of the list by a huge margin.

- ✓ The others are France (290), UK (225), Israel (90) and North Korea (40-50).
- ✓ These figures, of course, are not exact because countries mostly keep their nuclear weapons programmes in secrecy.
- ✓ Apart from Russia and the US, all the other seven countries are also either developing or deploying new weapon systems.

INTERNATIONAL DAY

➤ World Blood Donor Day - June 14

GIVE 
BLOOD
 and keep the world beating 

World Blood Donor Day • June 14

PAHO  Pan American Health Organization  World Health Organization



- ✓ The observance of the day aims to raise awareness about need for safe blood transfusion
- ✓ Theme 2021 - “Give blood and keep the world beating”
- ✓ This day was first initiated and established on June 14, 2004, by the World Health Organization (WHO)
- ✓ The first ever Blood Donor Day was organised in May 2005 as a joint initiative of World Health Organization, International Federation of Red Cross and Red Crescent Societies, alongwith the support of 192 member nations of WHO
- ✓ The host for this year's World Blood Donor Day 2021 is Italy through its National Blood Centre.
- ✓ World Blood Donor Day is one among 11 official global public health campaigns marked by WHO.
- ✓ It is observed on 14th June to mark the birth anniversary of Karl Landsteiner who was born on June 14, 1868.
- ✓ Landsteiner was awarded with Nobel Prize for his discovery of ABO blood group system.

➤ World Day against Child Labour - June 12



- ✓ The day is observed to raise awareness regarding the harmful consequences of the Child Labour and efforts needed to tackle it
- ✓ Theme 2021 - 'Act Now: End Child Labour.'
- ✓ The theme of this year's World Day Against Child Labour is the action done in preparation for the 2021 International Year for the Elimination of Child Labour
- ✓ The day was first observed by International Labour Organization (ILO) in the year 2002
- ✓ According to UNICEF and International Labour Organization (ILO), the number of children forced for working has risen to around 152 million — 64 million girls and 88 million boys — across the world
- ✓ Among them, around 48% victims of child labour were aged 5-11, 28% were 12-14 years old and 24% were 15-17 years old.
- ✓ The International Labour Organisation (ILO) celebrated 100 years in 2019 in promoting social justice for children through Anti Child Labour Day.
- ✓ UN Sustainable Development Goal Target 8.7 was set by the international community to make an end to child labour by 2025.

