

Wearable technology in Olympic

- One of the more recent tools in the Olympic arsenal is wearable technology, which many of us are familiar.
- Devices such as Fitbit, Garmin, Polar and the Apple watch allow us to measure and track various aspects of our health and performance.
- Wearable tech was especially useful to keep track of athletes when training grounds were shut down because of the pandemic

About wearable technology

- “wearable technology” refers to anything attached to the body that measures some aspect of performance during physical activities such as running, biking, walking or swimming.
 - current devices involve micro-electromechanical systems, which incorporate sensors that quantify some aspect of physical function or movement — such as heart rate, speed, force or acceleration.
 - One of the main advantages of wearable systems is that they’re relatively inexpensive and small enough to be attached to any part of the human body.
- One of the most obvious benefits of wearable tech is its ability to provide information that wasn’t previously available.
 - For example, force-sensing resistors placed in shoes, ski boots or bike pedals can provide a continuous stream of data for entire training sessions.

Challenge

- Wearable tech produces large quantities of data that needs to be analysed and contextualized with other types of information, such as sets, repetitions, intensities and interval times.
- The sheer quantity of data can easily become unmanageable when multiple athletes and training sessions are involved.

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Snake bites in Bhitarkanika

- The villages around Odisha’s Bhitarkanika National Park, the country’s second-largest mangrove forests, are increasingly reporting cases of snake bites during this monsoon season
- Each year on July 16, the World Snake Day, awareness camps are organised on how to save people from snake bites and to protect reptiles

- Snakes in the Bhitarkanika include the poisonous king cobra, banded krait, common krait bamboo snake and blue krait
- “The snakes crawl into homes in the rainy season as the monsoon is the breeding season for the reptiles.
- The number of snakes appearing in human habitations increases during the nesting season,

About Bhitarkanika

- Bhitarkanika Mangroves is a mangrove wetland in Odisha, India, covering an area of 650 km in the Brahmani and Baitarani river deltas
- It was designated on 16 September 1998 and obtained the status of a Ramsar site on 19 August 2002.
- The national park and wildlife sanctuary is inundated by the rivers Brahmani, Baitarani, Dhamra, Pathsala.

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Planetary Boundaries

- The planetary boundary is a novel concept developed and published by the international team of 18 researchers in the year 2009. According to the

paper, there are nine planetary boundaries, and they are as follows,

1. Climate change
 2. Change in biosphere integrity (biodiversity loss and species extinction)
 3. Stratospheric ozone depletion
 4. Ocean acidification
 5. Biogeochemical flows (phosphorus and nitrogen cycles)
 6. Land-system change (for example deforestation)
 7. Freshwater use
 8. Atmospheric aerosol loading (microscopic particles in the atmosphere that affect climate and living organisms)
 9. Introduction of novel entities (eg, organic pollutants, radioactive materials, nanomaterials, and micro-plastics).
- The stability of our planet earth, as the professor states in the documentary, is mainly due to these nine processes. These elements are the reason, our planet is intact. Any change in this would greatly affect our planet.
 - “Four of nine planetary boundaries: climate change, loss of biosphere integrity, land system change, altered biogeochemical cycles (phosphorus and nitrogen), have crossed the tipping point due to unfavourable human activities,”

- Two of these, climate change and biosphere integrity, are core boundaries.
- Any change in these two would drive the Earth System into a new state.

Surveillance in Indian laws

- Reporting showed that the Pegasus spyware had been used to target 37 phones, of which 10 belonged to Indians.
- The government, relied on existing provisions of law under the Indian Telegraph Act of 1885 and the Information Technology (IT) Act of 2000.
- Even without the use of Pegasus or any other hacking software and surveillance, these provisions offer the government total opacity in respect of its interception and monitoring activities.
- The Telegraph Act relate to telephone conversations, the IT Act relates to all communications undertaken using a computer resource.
- Section 69 of the IT Act and the Interception Rules of 2009 offer even weaker protections to the surveilled.
- No provision, however, allows the government to hack the phones of any individual since hacking of computer resources,

including mobile phones and apps, is a criminal offence under the IT Act.

- Nonetheless, surveillance itself, whether under a provision of law or without it, is a gross violation of the fundamental rights of citizen
- The very existence of a surveillance system impacts the right to privacy and the exercise of freedom of speech and personal liberty under Articles 19 and 21 of the Constitution, respectively.

Growing Egypt role

- Egypt's diplomats and intelligence officers recently negotiated the end of the 11-day Israel-Palestine conflict, with the new Israeli government looking to Egypt to manage the turbulent cauldron of Gaza.
- Egypt, after long years of neglect, has now become active in re engaging with its neighbours in Africa, with substantial economic and defence partnership agreements
- Egypt, with Iraq and Jordan, announced in Baghdad at the end of June that a new tripartite grouping of these West Asian States had been set up, proclaiming the advent of al-Sham alJadid, the "New Levant

- West Asian politics was also largely influenced by the active role of Saudi Arabia and the UAE, in Syria, Yemen and Libya.
- Egypt found itself a reluctant partner in these ventures, though it was low key in Yemen and maintained ties with the Assad government in Damascus.
- In Libya, it was pushed into a more active role to confront the Tripoli-based administration, but here, too, it refused to deploy troops in the country.
- Egypt's role in the blockade of Qatar from June 2017, initiated by Saudi Arabia and the UAE, was also relatively lukewarm. Egypt allowed Qatari LNG to pass through the Suez Canal.
- The principal challenge that Egypt presently faces relates to Ethiopia's plan to construct the "Grand Ethiopian Renaissance Dam" (GERD) on the Blue Nile. Egypt fears this project could restrict its access to the waters of the Nile, the source of 95% of its fresh water.
- Egypt's other challenge is relations with Turkey.
- The two countries met at the deputy Foreign Minister level in Cairo in early May and discussed the issues that divide them: Libya and the East Mediterranean.
- In Libya, Turkey has deployed about 500 soldiers and another 2,000 fighters from its militia in Syria in support of the Tripoli-based authority.
- Egypt and the UAE have so far backed the Tobruk-based administration and supported the rival Libyan force, led by Field Marshal Khalifa Haftar, with weaponry and mercenaries.
- The just-announced tripartite coalition of Egypt, Iraq and Jordan is clearly an attempt by the partners to broaden their regional engagements:
 - Iraq would like to free itself from the Iranian grip and expand ties with its Arab neighbours.
 - Jordan is unhappy with the recent Saudi role in trying to topple King Abdullah and replace him with a disgruntled half-brother, Prince Hamza.
 - Egypt views the partnership as an opportunity to move beyond its traditional dependence on Saudi Arabia and the UAE and assert its own leadership in the region.
 - At home, due to the novel coronavirus pandemic, unemployment has increased, recovery has been slow, and the percentage of workers without adequate income has gone up from 55% to nearly 75%.
 - The poverty rate is still 2% higher than in 2015.

Learning Loss

- Schools have been closed for 16 months now, with no clarity on or a timeline for their resumption as yet.
- The country has promoted online classes and e-connectivity as the solution.
- Due to a lack of connectivity as well as a lack of access to e-devices, only a fraction of children even in this age group has had online education of any kind
- Percentage of teachers in the country capable of handling digital platforms for pedagogic purposes is very small
- All this has resulted in what commentators have termed nutrition loss and learning loss.
- One way of addressing the learning crisis might be to repeat the entire academic year. The government in Kenya has decided to do just this.
- One-to-one tutoring for the most disadvantaged learners has been taken up in many countries.
- We need a vast body of volunteers engaging in small groups with children from the most disadvantaged sections, working in tandem with schools, which will need to focus on safety measures and average performance.

Making India a sporting nation

- Many factors which are important in determining the performance of a nation in various sports.
- Beyond a threshold level, the average standard of living in a nation and the country's population size may be important determinants for its performance at the Olympics.
- The size of total GDP is hardly important in countries like India where a sizable segment is fighting hunger.
- A person of poor health can never be a good sportsman.
- In countries where there are high levels of stunted growth, malnutrition and anaemia, we cannot expect good athletes.
- The very existence of a surveillance system impacts the right to privacy and the exercise of freedom of speech and personal liberty under Articles 19 and 21 of the Constitution, respectively.
- Mobilising resources in world-class training provides an edge to sportsmen
- States need to be integrated in a bigger way in India's sports policy.
- The policy of "One State, One Sport" can be a game-changer in India.