



Follow Us:



The Indian EXPRESS

Friday, May 29, 2020

Sign in



Feeding 1.8 million+ children's across India, Every day!



COVID19

61,000 stranded Indians have returned since May 7: Govt

Home / Opinion / A chance to rejuvenate India's healthcare sector

A chance to rejuvenate India's healthcare sector

Covid-19 crisis offers a window to restructure, strengthen the country's health policy, and reduce dependency on imports of medical devices

Published: May 22, 2020 9:01:02 pm



Entertainment Lifestyle Tech Vid

SUBSCRIBE

Audio Epaper

EXPRESS PREMIU



Lalit Modi Va but list of fu grows

AMIT MEHRA

Medics attend to a suspected COVID-19 patient at a government hospital in New Delhi (Express Photo By Amit Mehra)

By Janak Nabar, Ketan Reddy, Dipti Singhania and Subash Sasidharan

India's response to the COVID-19 pandemic has been characterised as being amongst the most stringent, according to the Oxford COVID-19 Government Response Tracker. The country has been under lockdown since March 24, and given India's inadequate health infrastructure, a stringent response had to be undertaken to contain the virus.

Several economists have suggested ways of managing the significant economic fallout that individuals and businesses have faced as a result of the extended lockdown. On May 12, Prime Minister Narendra Modi announced a Rs 20 Lakh crore economic package: While the package has targeted liquidity issues for MSMEs, due attention should also be given to the healthcare system, and the increasing strain it will face once the lockdown is lifted.

With the spotlight currently on India's indigenous innovative capabilities in the fight against COVID-19, the time has come to boost India's healthcare infrastructure and push for greater technology deepening in the healthcare sector.



Health Profile-2019, the total number of hospital beds in the country was — which translates to 0.55 beds per 1,000 population. Furthermore, the study highlighted that twelve states that account for 70 per cent of India's 1.3 billion population were found to have hospital beds per 1,000 population below the national average of 0.55 beds. In terms of access and quality of health services, India was ranked 145 out of 195 countries in a Lancet study published in 2018, below countries like [China](#) (48), Sri Lanka (71) Bhutan (134) and Bangladesh (132).

India's general government expenditure on healthcare as a percentage of GDP was just 1.0 per cent in 2017 according to WHO data, placing it at number 165 out of 186 countries in terms of government expenditure on healthcare.

Compounding this problem of poor health infrastructure and low spending, especially in the current environment that has caused significant disruptions to the global supply chains, is India's dependence on medical devices imports.

According to the Association of Indian Medical Device Industry (AiMeD), India's medical devices imports were around Rs 39,000 crore in FY2019, having seen a growth of 24 per cent from the previous year. These imports were said to account for around 80 per cent of India's medical devices requirements, with the bulk of the devices coming from the US, China, Germany and Singapore.

Much of the data presented above highlights the fact that fighting any major health emergency let alone an outbreak of this magnitude was always going to be a tough task for India. It is important to note that India's expenditure on R&D as a per cent of GDP has continued to remain stagnant at 0.7 per cent of GDP for three decades, with the public sector accounting for 51.8 per cent of the national R&D expenditure. Furthermore, while India's public R&D expenditure on healthcare as a share of central government spending on R&D has increased to 5.5 per cent, a figure that is now comparable to that in Germany, it remains low compared to over 25 per cent in the US and around 9 per cent in Korea.

The structure of India's healthcare industry means that India now needs to build on its competitive position in the pharmaceutical and biotechnology sector, where it has established a name for itself in delivering low-cost drugs and vaccines. The industry has been at the forefront globally in the fight against COVID-19, with



health infrastructure and healthcare R&D — with a focus on healthcare and services — would surely aid in India's economic recovery, by not only protecting the well-being of its citizens but also providing access to high-quality, affordable healthcare equipment globally.

To build a robust health system for the future, focusing on India's infrastructure and technology needs would require emphasising the triple helix model of innovation, that is, bringing together the government, academia and industry, now more than ever. To this end, the government of India has established a "COVID-19 Taskforce" with the objective of mapping together various technological advancements related to COVID-19 in public R&D labs, academia, start-ups, and industries. The task force has already identified over 500 entities in the fields of medicines, ventilators, protective gear, among others.

Several public-private partnerships and collaborations are already underway. The Defence Research and Development Organisation (DRDO) which has developed ventilators is collaborating with the industry to scale up production to 10,000 units per month. Nocca Robotics, a start-up incubated at the Indian Institute of Technology Kanpur, has entered into an agreement with Bharat Dynamics Ltd. (BDL), a public sector undertaking where the latter will be involved in the large-scale development of ventilators. Start-ups like Marut Dronetech are partnering with various state governments to employ drones to monitor adherence to [social distancing](#) norms.

The Pune-based startup, MyLab Discovery Solutions, has developed a cost-effective indigenous testing kit, Pathodetect, and has not only received approval from ICMR and CDSCO but has also been selected to receive financial assistance from the Technology Development Board to ramp up the manufacturing of these kits.

The Pathodetect test kit costs almost a quarter of the cost of kits from its international competitors and also provides the results in less than three hours compared to alternative testing kits that take up to seven-eight hours to provide results.

Better coordination of the various technological developments through greater synergy between the government, academia and industry concerning research and

EXPRESS PREMIU



Lalit Modi Va
but list of fu
grows



eventual lockdown exit, several initiatives — such as those being undertaken by public R&D labs on plasma therapy and genome sequencing of SARS-CoV-2 startups from IITs — need to be closely evaluated and provided necessary regulatory and funding support.

The new economic package that has been announced by the government should include a package for the healthcare industry of around Rs 2.1 lakh crore. The government should allocate around Rs 2 lakh crore towards boosting the country's health infrastructure and around Rs 10,000 crore towards developing healthcare technologies that India would need to combat the spread of the virus once the lockdown is lifted.

The current funding landscape for collaborative research includes grants that vary from Rs 50 lakh to Rs 1 crore, depending on whether it is an early-stage proposal or a more advanced workable solution. The National Research Development Corporation (NRDC) offers financial support up to Rs 10 lakh for necessary infrastructure for researchers and innovators involved in the development of eco-friendly sanitisers, rapid test kits, PPEs, ventilators, medicines, and vaccines.

The Department of Science and Technology (DST) also set up a rapid response centre CAWACH – Centre for Augmenting WAR with COVID-19 Health Crisis – to provide support to 50 innovations and startups addressing various challenges posed by the pandemic. The scale of funding required however is significantly larger than what is currently available.

An important consideration here is, while increasing the amount of funding, there should also be the promotion of open innovation models. The open innovation model allows for the integration of an external knowledge talent pool with the in-built capabilities of a firm, thereby bringing together a network of collaborators involved in biomedical research and drug discovery.

This is a health crisis that is expected to stay with us for some time to come. The response to the pandemic offers an opportunity to bring about structural changes in India's health policy, see greater technology deepening in the healthcare sector with a focus on healthcare equipment, reduce India's dependence on imports of medical devices, and aid in India's economic recovery.

EXPRESS PREMIU



Lalit Modi Va
but list of fu
grows



Technology Madras. Views are personal. Entertainment Lifestyle Tech Vid

EXPRESS PREMIU



Lalit Modi Va but list of fu grows

SUBSCRIBE

Audio Epaper



Inform your opinion. Read what today's changemakers are saying. Subscribe to our Opinion & Editorial newsletter

Enter Your Email

Subscribe

The Indian Express is now on Telegram. Click [here to join our channel \(@indianexpress\)](#) and stay updated with the latest headlines

For all the latest [Opinion News](#), download [Indian Express App](#).

TAGS: Coronavirus COVID-19 India Lockdown

0 Comment(s) *

* The moderation of comments is automated and not cleared manually by indianexpress.com.

ADVERTISEMENT

RELIGARE | Health Insurance
Values that bind



EXPRESS OPINION

Opinion

Death of a mother at a railway station, a conversation in Heaven



Home India World Cities Opinion Sports

Entertainment Lifestyle Tech Vid

EXPRESS PREMIU



Lalit Modi Va
but list of fu
grows

SUBSCRIBE

Audio Epaper



Opinion

Outstanding scholar,
unforgettable teacher.
Rekha Jhanji was so
much more than that



Opinion

The pandemic may
create opportunities to
deepen India's
engagement with Africa



AKSHAYA PATRA
Unlimited feet for education

**Feeding
1.8 million+
children's
across India,
Every day!**

FEED NOW



Opinion

As it ramps up public
healthcare, India must
give more room to
private sector

ADVERTISEMENT

RELIGARE | Health Insurance
Values that bond

Apply Now

BEST OF EXPRESS



aircraft during landing and takeoff phase, issues guidelines

EXPRESS PREMIU



Lalit Modi Va but list of fu grows

SUBSCRIBE

Audio Epaper



Cities Strong tremors felt in Delhi-NCR as 4.6 earthquake hits near Rohtak in Haryana



Entertainment Ponmagal Vandhal review: Jyotika-starrer is let down by muddled writing

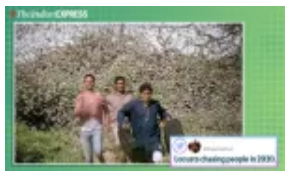
AKSHAYA PATRA
Unlimited feet for education

Feeding 1.8 million+ children's across India, Every day!

FEED NOW



Entertainment Yogesh (1943-2020): Stories in a song



Trending As India deals with locusts, people are sharing memes on dealing with it



Trending It's raining memes on social media as Indians speculate on lockdown extension



Sports LIVE | Vincy Premier T10 League, Day 8: The fight for last knockout spot



Home India World Cities Opinion Sports



Adelaide Oval

Entertainment Lifestyle Tech Vid

EXPRESS PREMIU



Opinion
Death of a mother at a railway station, a conversation in Heaven

Audio Epaper

SUBSCRIBE



Lalit Modi Va
but list of fu
grows



What the deceleration in GDP growth rate tells us about state of the Indian economy



Lifestyle
Lockdown hairstyle: People want Abhishek Bachchan's signature hairband look



Technology
New scam alert: Don't share WhatsApp verification PIN with anyone

ADVERTISEMENT

AKSHAYA PATRA
Unlimited food for education

Feeding 1.8 million+ children's across India, Every day!

FEED NOW

MUST READ



Sports
LIVE | Vincy Premier T10 League, Day 8: The fight for last knockout spot

Sports
India poised to play first overseas D/N Test at Adelaide Oval



Home India World Cities Opinion Sports

Entertainment Lifestyle Tech Vid

EXPRESS PREMIU



Lalit Modi Va
but list of fu
grows

SUBSCRIBE

Audio Epaper



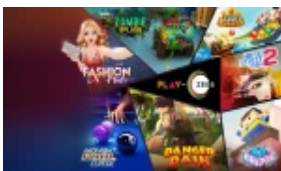
Sports
'Only cricket can restart in India if Bundesliga rules followed': Bhutia



Technology
New scam alert: Don't share WhatsApp verification PIN with anyone



Technology
Borderlands: The Handsome Collection is free for a limited time on the Epic Store



Technology
ZEE5 wants to become a super entertainment app

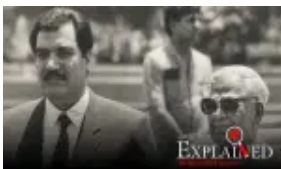


Lifestyle
Lockdown hairstyle: People want Abhishek Bachchan's signature hairband look

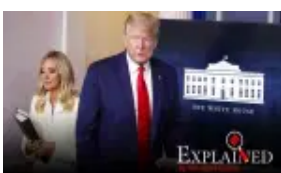
MORE EXPLAINED



What the deceleration in GDP growth rate tells us about state of the Indian economy



Najibullah has a visitor – why did a top Afghan official go to the grave of a long dead, much reviled President?



Explained: What is Trump's executive order, targeting social media platforms?

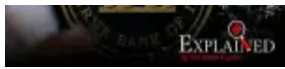
What RBI discontinuing 7.75% saving bonds means to investors



Lalit Modi Va
but list of fu
grows

SUBSCRIBE

Audio Epaper



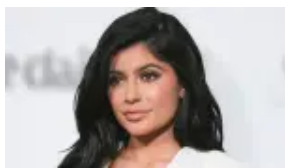
Feeding
1.8 million+
children's
across India,
Every day!

FEED NOW

MAY 29: LATEST NEWS



29 temporary prisons
earmarked across
Maharashtra



Forbes drops Kylie
Jenner from billionaire
list, accuses her of
'white lies, fabrications'



J&K: Driver's presence
of mind saves the day
as truck carrying LPG
cylinders catches fire



Ahmedabad: Fire at
Sakar 7 building, one
dead



Palkhi procession
called off, 'padukas' of
Sant Dnyaneshwar &
Sant Tukaram may be
airlifted to Pandharpur



Oil well blow out near
Assam national park yet
to be controlled;
environmentalists fear
adverse impact



Home India World Cities Opinion Sports



digestive disorders

Entertainment Lifestyle Tech Vid

EXPRESS PREMIU



Lalit Modi Va
but list of fu
grows

SUBSCRIBE

Audio Epaper



No govt approval
needed for Covid-19
tests: Gujarat HC



Telangana: Sons refuse
to allow 80-year-old
mother into house out
of COVID-19 fear



WHO cautions
researchers against
amplifying unproven
links between tobacco,
Covid-19

ADVERTISEMENT

**AKSHAYA
PĀTRA**
Unlimited food for education

**Feeding
1.8 million+
children's
across India,
Every day!**

FEED NOW



The ExpressGroup | The Indian Express | The Financial Express | Loksatta | Jansatta | inUth | Ramnath Goenka Awards
T&C | Privacy Policy | Advertise with Us | Contact Us | Subscribe | Statutory provisions on reporting (sexual offenses)

Copyright © 2020 The Indian Express [P] Ltd. All Rights Reserved

Powered by **WordPress.com** VIP