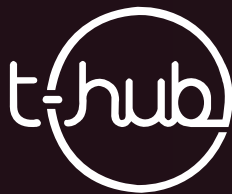


INDIA'S LEADING STARTUP "T-HUB" AND COLLABORATION OF **İSTANBUL GEDİK UNIVERSITY** **AND T-HUB**

Istanbul Gedik University

Asean Strategic Studies Application and Research Center



August 2023

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1. The Significance of Telangana in Terms of Startup Ecosystem in India



"Innovate, Incubate, Incorporate" **Honorable Mr. KT Rama Rao, Government of Telangana**

Among 29 states across India; Telangana, which is recognized as the 'Pharma Capital' of India, has been one of the first states to develop an Innovation Policy in 2016.

As such, the innovation policy of the Government of Telangana has been framed on five main pillars:

- Physical infrastructure and program management capabilities,
- Sustainable funding models,
- Human capital,
- Proactive engagement with the industry,
- Encourage startups in rural and social enterprises.

Becoming a well-equipped startup ecosystem, in 2022 Telangana switched from the 4th to 2nd rank in India Innovation Index released by NITI Aayog. It is to be noticed that Telangana has combined the benefits of having an entrepreneurship culture, a leading Information Technologies (IT) outlook, and a vibrant population.

It should also be mentioned that in line with the "Innovation and Entrepreneurship" strategy, Telangana has been the first state to have launched marquee projects such as Artificial Intelligence for Agricultural Innovation (AI4AI) and due to Telegana's various advantages with respect to startup ecosystem many multinational companies like Goldman Sachs, Fiat, Amazon Data Services India have collaborated with Telangana Government in relevant spheres.

Government of Telegana Abstract ITE& C Dept- Innovation Policy of the Government of Telangana – G.O.Ms.No. 10 Dated 25-07-2017, retrieved 01 August 2023,https://www.startupindia.gov.in/content/dam/invest-india/Templates/public/state_startup_policies/Telangana-Innovation-Policy-Issued-GO.pdf.

T-Hub website, retrieved 03 August 2023, <https://t-hub.co/about-us>.

2. T-Hub (Technology Hub)



TELANGANA STARTUP ECOSYSTEM

Youngest state (29th) in India

Pharma Capital of India

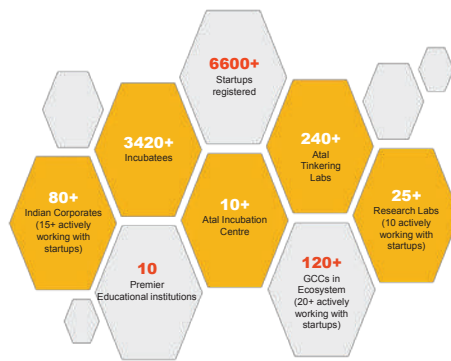
First state to form Innovation Policy

Ranked as "Top performer" in 2022 & as "Leader" on Indian start-up state ranking from 2018 to 2021

Telangana jumped from 4th to 2nd rank in India Innovation Index 2022 released by NITI Aayog

First state to have launched marquee projects such as Artificial Intelligence for Agricultural Innovation (AI4AI) and Medicine From The Sky (MFTS)

Host to various MNC's and their global centres like OPPO's 5G Innovation Lab, Fiat Chrysler Automobiles (FCA) manufacturing facility, Goldman Sachs , National Payments Corporation of India (NPCI)'s smart data centre, Amazon Data Services India Pvt. Ltd's 3 data centres, US-based BFSI's Global Capability Centre



1.1. Brief History

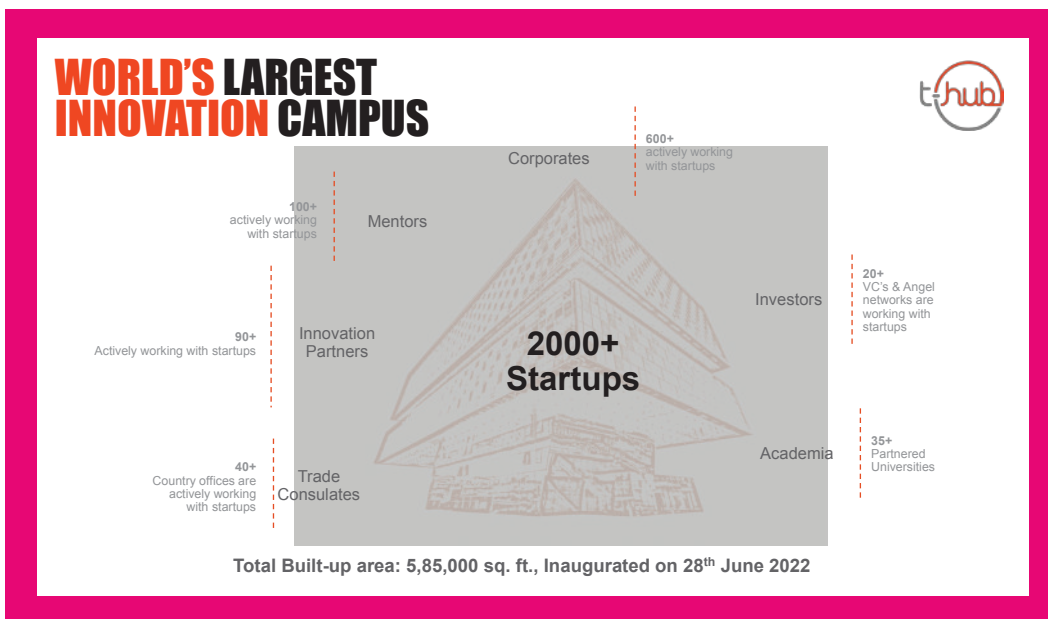
India's renowned innovation hub and ecosystem enabler T-Hub established an incubation facility center in Hyderabad in 2015 which was a joint partnership among the Telangana government and the International Institute of Information Technology, the Indian School of Business, and the National Academy of Legal Studies. Phase I of T-Hub was located at the International Institute of Information Technology at Gachibowli.



2. T-Hub (Technology Hub)



Over the six years after the establishment of T-Hub, the Telangana Government decided to enlarge the space for more startup ecosystem stakeholders. The Innovation Campus, the largest in the world, has a total area of 5,85,000 square feet that was built in Raidurg in 2022.



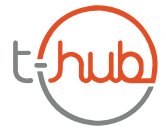
T-Hub has created a wide and strong ecosystem hub provided by distinct programs and initiatives that connect T-Hub's partners with over 600 global and national corporate partners. Given the leader status in India's innovation ecosystem, T-Hub aims at creating a sustainable and robust startup ecosystem in India and beyond by enabling and creating impact for startups, corporations, and other stakeholders in the startup ecosystem.

As far as the impact factor that T-Hub has created is concerned, T-Hub has delivered more than 100 innovation programs and supported over 2500 startups with US \$1.9 billion in funding. Moreover, the initiatives delivered by T-Hub serve as a bridge between potential investors, the corporate community, venture capital firms, academia, and governmental institutions.

T-Hub website, retrieved 03 August 2023, <https://t-hub.co/about-us>.

Geetika Sachdev, Mayuri Ramanan, "Inside T-Hub, The World's Largest Innovation Hub in Hyderabad", December 20, 2022, retrieved 01 August 2023, <https://yourstory.com/2022/12/inside-t-hub-worlds-largest-innovation-hub-hyderabad>

2. T-Hub (Technology Hub)

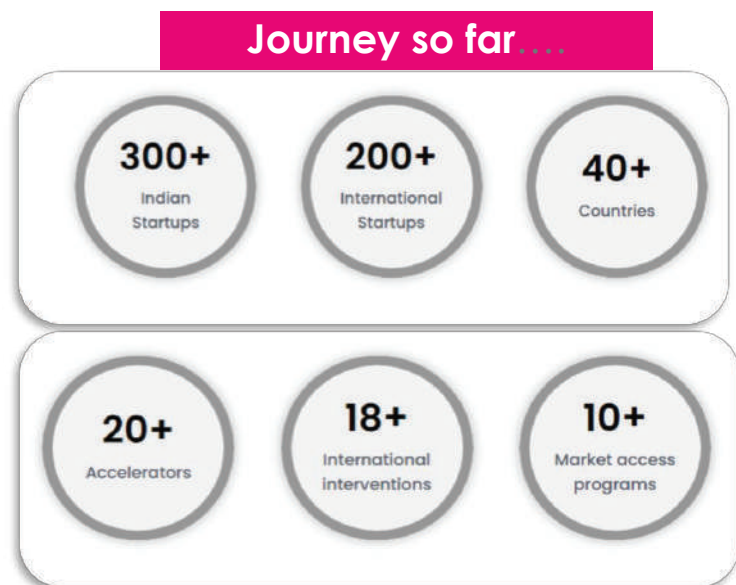


Being a part of a larger innovation network in Telegana at the center of a rapidly growing ecosystem, T-Hub not only serves as an innovation hub by enabling startups to scale nationally and globally but also has contributed to positioning Telegana at the forefront of innovation and entrepreneurship in India.

2.1. T-Hub's Innovation Principles

T-Hub's International Division provides some specific venues in accordance with the principles enshrined in T-Hub's Innovation Doctrine:

- Startup to Startup Platform: This platform enables market access assistance for international startups to enter the Indian market or Indian startups looking to expand globally.



T-Hub executes five diverse incubation and acceleration programs that help ventures through their early stages. These are 100-day programs with each running three cohorts every year. According to Anish Anthony, Chief Delivery Officer of T-Hub, every year 15 programs are conducted that are transformed into 300 high-quality startups annually.

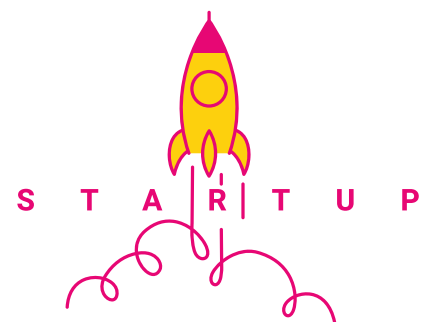
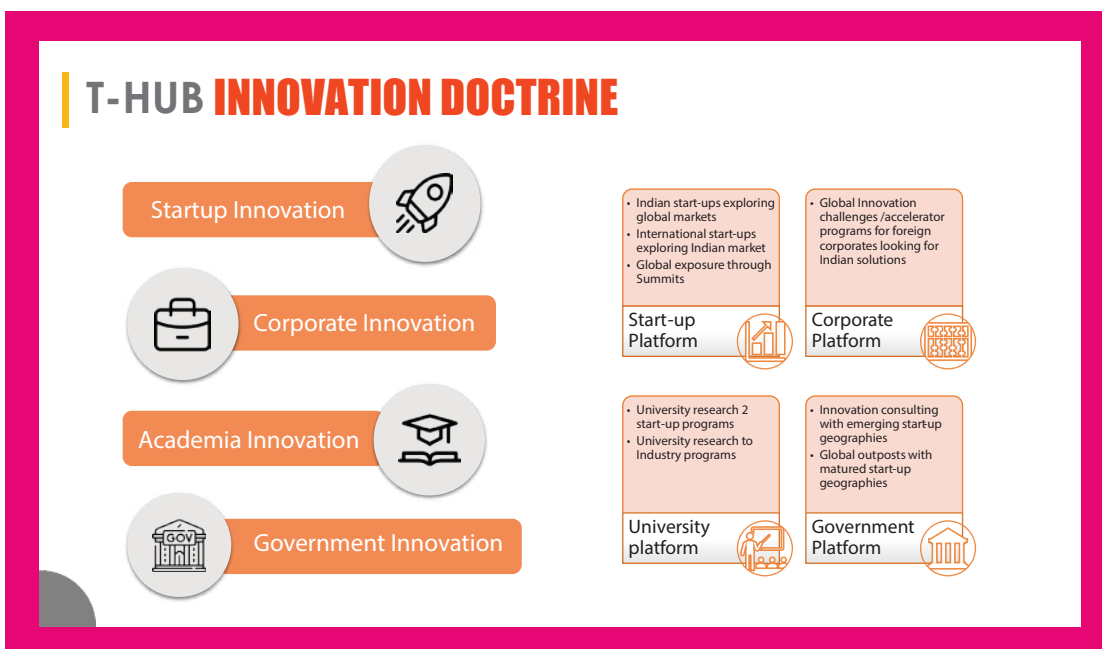
T-Hub website, retrieved 03 August 2023, <https://t-hub.co/about-us>.

Binu Paul, "Hyderabad's T-Hub: How the premier incubator is turbocharging India's start-up ecosystem", 11 June 2023, retrieved 04 August 2023,

2. T-Hub (Technology Hub)



- **Corporate to Startup Platform:** This platform offers programs for established overseas corporates to access Indian startups. In addition to market Access, this particular program also involves expert mentorship, funding, and investment connections.
- **University-to-University Platform:** These are collaboration programs for enhancing technology and research promotion. It helps build incubation centers in various academic institutions.
- **Government Platform:** On a larger scale, this platform involves innovation consulting services to establish a global innovation center.



<https://www.businesstoday.in/magazine/deep-dive/story/hyderabad-t-hub-how-the-premier-incubator-is-turbocharging-indias-start-up-ecosystem-383648-2023-05-31>.

3. India's Technological Outlook



T-Hub's INTERNATIONAL PROGRAMS

- Access to **New Markets**
Accessing new customers and expand in India and other geographies
- Access to **New Technologies**
Forging partnerships to build technology bridge between India and other geographies

Our Impact

- 300+ India startups
- 200+ International startups
- 40+ Countries
- 20+ Accelerators
- 18+ International laboratories
- 10+ Market access programs

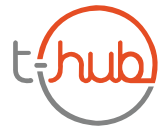
The infographic also features a world map with arrows pointing to various international programs and their partners, including: COMMUNITECH, World Startup Factory, Kotra, crosspring, Berkeley, FALCONRY, PGA, beanstalk, Cytel, LA TROUSSE, JICA, JETRO, and JCCI.

3.1. The Determinants of India's Status As a Global Technology Powerhouse

Technological advancements are accepted to change the course for all businesses which can create massive opportunities for those who can lead the shift. Innovation, on the other hand, is one of the key determinants of competitive advantage for businesses and economies worldwide. Over the past decades, India has played a significant role in serving as an innovation powerhouse in the world. In parallel with India's steady economic growth, various startups have flourished in the market nationally and globally. As a consequence, India's current strengths such as being one of the fastest growing and resilient economies worldwide, having high services exports (particularly in the realm of Information Technology), a growing strong digital and startup ecosystem, and availability of a large working age population all have contributed to this process.

Home to approximately 1/6 th of the global population, India is expected to become the largest country on the planet in 2023 in terms of population which implies that the country is advantageous to divert its young and digitally savvy population as the biggest contributors to the global workforce.

3. India's Technological Outlook



Indeed, according to a recent study %67 of India's population lies in the working age group and %25 of the incremental global workforce over the next decade will come from India. By 2030, India is projected to have the largest working-age population in the world.

On the other hand, by many predictions, currently the fifth-biggest economy globally, India would become the world's third-largest economy as early as 2030. Commensurate with the Indian economy's remarkable progress over the last decades, the Government of India has set itself the goal of becoming a developed economy by 2047. The next 25 years have been deemed as the 'Amrit Kaal' (uniquely auspicious period).

In such a context, one of the main drivers of India's economic growth has been underpinned by India's strong services exports. India's services exports have grown by 14% over the last two decades and in the fiscal year 2021-2022 stood at US \$254.5 billion. A large part of services exports are derived from Information Technologies and Business Process Outsourcing (BPO) Services which during the fiscal year 2021-2022 were about US \$ 157 billion with IT services US \$ 106 billion and BPO services US \$ 51 billion.

UN Policy Brief, No 153, India overtakes China as the World's Most Populous Country, <https://www.un.org/development/desa/dpad/wp-content/uploads/sites/45/PB153.pdf>.

India's median age is 28.4 years which enhances the country's competitive advantage. Ernst & Young LLP, Report, India@ 100 Realizing the Potential of a US\$26 Trillion Economy, 2023.

India currently has over 750 million internet users which offers massive opportunities for startups as well as providing a huge potential for a vibrant workforce.

<https://timesofindia.indiatimes.com/readersblog/learninggrowing/learning-2-56231/>

Ernst & Young LLP, Report, India@ 100 Realizing the Potential of a US\$26 Trillion Economy, 2023.

Bob Moritz and Sanjeev Krishan, India Rising: Five Springboards to Develop Nation Status by 2047, PWC Insights,

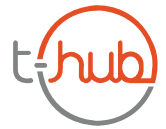
<https://www.pwc.com/gx/en/issues/c-suite-insights/publications/india-rising-5-springboards-to-developed-nation-status-by-2047.html>.

According to a study conducted by the Center for Economics and Business Research, India is expected to become the third \$10 trillion economy by 2025. There are predictions suggesting that India would become US \$26 trillion economy (in market Exchange terms) by 2047-48. See, Ernst & Young LLP, Report, India@ 100 Realizing the Potential of a US\$26 Trillion Economy, 2023.

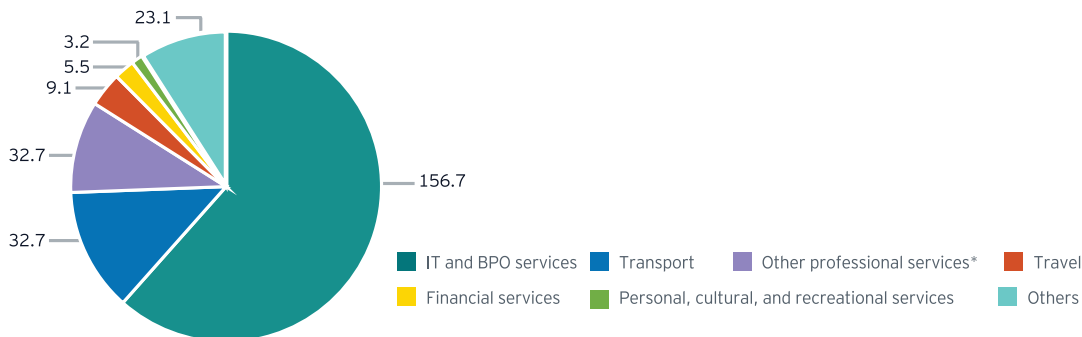
Ernst & Young LLP, 2023.

Ernst & Young LLP, 2023.

3. India's Technological Outlook



Composition of India's services exports in US\$b (FY2022)



3.2. The Parameters of India's Technological and Startup Ecosystem

In light of the overall context of the dynamics of India's global technological prominence, an overview of India's global technological status is necessary to grasp the general parameters.

To start with, in terms of data analytics which reflects the ability to derive valuable insights from large datasets, India has three institutions out of the global top 20 institutions: the Thapar Institute of Engineering and Technology, NIT India, and the Indian Institute of Technology. Additionally, the Indian Institute of Technology is ranked among the top 20 institutions in seven out of the 10 AI technologies from its publications within the 10% of highly cited papers.

In terms of digitalization, India has been at the forefront of processing digital transactions globally and rolled out biometric identification to almost 99% of its population.

As the third largest startup ecosystem in the world, India is rapidly becoming an international startup hub with a growing number of successful startups worldwide. As a result, investments

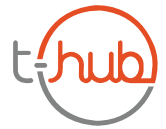
Jamie Gaida, Jennifer Wong-Leung, Stephan Robin and Danielle Cave, ASPI's Critical Technology Tracker The Global Race for Future Power, Policy Brief Report No. 69, 2023.

Gaida, Wong-Leung, Robin and Cave, ASPI'S Critical Technology, 2023.

Bob Moritz and Sanjeev Krishan, India Rising: Five Springboards to Develop Nation Status by 2047, PWC Insights,

<https://www.pwc.com/gx/en/issues/c-suite-insights/publications/india-rising-5-springboards-to-developed-nation-status-by-2047.html>.

3. India's Technological Outlook



in Indian startups grew at a %49 in terms of compound annual growth rate between 2014-2021. The number of recognized startups in India has grown from 741 in 2016 to 72,993 in 2022.



Source: INC42, *The State of Indian Startup Ecosystem Report 2022*,
<https://inc42.com/reports/the-state-of-indian-startup-ecosystem-report-2022/>.

No doubt, the massive talented technical expertise pool, governmental support of startup surroundings, and the growth expectations of the Indian economy all have contributed to and have the potential to boost the bloom of the Indian startup ecosystem. It is important to note that the government and private sector are collaborating to create a supportive environment for entrepreneurs.

On the other hand, the role of incubators and accelerators which provide access to the market and assist potential startups in funding and networking opportunities such as T-hub also play a salient role in India's entire startup ecosystem. All in all, the rise of digital technologies and an increasing number of young entrepreneurs coupled with a growing economy and technological advancements pave the way for the diversified outlook of the startup ecosystem in India.

INC42, *The State of Indian Startup Ecosystem Report 2022*,
<https://inc42.com/reports/the-state-of-indian-startup-ecosystem-report-2022/>.

Meghana Dalal, "How Indian Startups are Pionering Tech and Innovation Across Industries", retrieved May 19, 2023,

<https://yourstory.com/2023/05/indian-startups-leading-innovation-tech-agritech-healthtech-edtech>.

India has 1500 Global Capability Centers (GCCs) which represents 45% of global GCCs. Ernst & Young LLP, Report, *India@ 100 Realizing the Potential of a US\$26 Trillion Economy*, 2023.

Initiatives such as Startup India (launched in 2016), Atal Innovation Mission, and Production-Linked Initiative schemes (PLI) constitute a strong departure point for a fertile startup culture.

Learning Growing", Times of India Readers Blog, August 01, 2023,

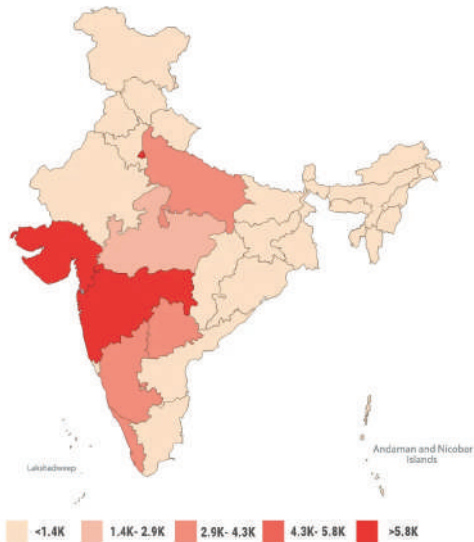
<https://timesofindia.indiatimes.com/readersblog/learninggrowing/learning-2-56231/>

"How Startup Ecosystem is Working in India", Times of India, May 19, 2023, retrieved 01 August 2023,
<https://timesofindia.indiatimes.com/blogs/myview/how-start-up-ecosystem-is-working-in-india/>.

3. India's Technological Outlook



Top Performing Indian States & UTs In Terms Of Local Startup Ecosystem Development



Source: Inc42

Source: INC42, *The State of Indian Startup Ecosystem Report 2022*,
<https://inc42.com/reports/the-state-of-indian-startup-ecosystem-report-2022/>.



4. İstanbul Gedik University and T-Hub



“Respect for human life is the basis of our inspiration for developing technologies for de-risking and achieving excellence in education.”

Honorable Ms Hülya Gedik, Gedik Holding, Chair of the Board, İstanbul Gedik University, Chair of the Board of Trustees, DEİK, Chairwoman of Turkey-India Business Council.



Gedik Holding's substantial business experience spanning over 60 years coupled with the innovative outlook of İstanbul Gedik University supported by high-quality education provide fertile grounds for generating future-oriented visions.

In that respect, İstanbul Gedik University and T-Hub signed a Memorandum of Understanding on April 2023 with the specific aim of developing business, academic and educational cooperation between the two institutions.

In such a configuration, the cooperation essentially builds on promoting collaboration between Turkey and India about nurturing the Turkish ecosystem through T-Hub's innovation principles and technological standing. Quite a solid result-driven cooperation between two institutions, the cooperation framework includes both innovative and entrepreneurship features. In that, it focuses on roadmaps for enhancing research and development projects, yet at the same time, aims at addressing the applicability and industrialization of the projects and providing access to the Indian innovation ecosystem.

CAMPUSES



İstanbul
GEDİK
University



Halil Kaya Gedik Campus



Kartal Campus



Gedik Vocational School Campus



Nişantaşı Campus

aday.gedik.edu.tr

gedik.edu.tr

REFERENCES



Bob Moritz and Sanjeev Krishan. India Rising: Five Springboards to Develop Nation Status by 2047. PWC Insights, <https://www.pwc.com/gx/en/issues/c-suite-insights/publications/india-rising-5-springboards-to-developed-nation-status-by-2047.html>.
Dalal, Megdala. "How Indian Startups are Pionering Tech and Innovation Across Industries". Retrieved May 19, 2023. <https://yourstory.com/2023/05/indian-startups-leading-innovation-tech-agritech-healthtech-edtech>.

Ernst & Young LLP, Report. India@ 100 Realizing the Potential of a US\$26 Trillion Economy. 2023.

Gaida, Jamie, Jennifer Wong-Leung, Stephan Robin and Danielle Cave. ASPI's Critical Technology Tracker The Global Race for Future Power. Policy Brief Report No. 69, 2023.

Government of Telegana Abstract ITE& C Dept- Innovation Policy of the Government of Telangana – G.O.Ms.No. 10 Dated 25-07-2017, retrieved 01 August 2023, https://www.startupindia.gov.in/content/dam/invest-in-india/Templates/public/state_startup_policies/Telangana-Innovation-Policy-Issued-GO.pdf.

"How Startup Ecosystem is Working in India". Times of India. May 19, 2023, retrieved 01 August 2023. <https://timesofindia.india-times.com/blogs/myview/how-start-up-ecosystem-is-working-in-india/>.

INC42. The State of Indian Startup Ecosystem Report 2022. <https://inc42.com/reports/the-state-of-indian-startup-ecosystem-report-2022/>.

"Learning Growing". Times of India Readers Blog. August 01, 2023, <https://timesofindia.indiatimes.com/readersblog/learninggrowing/learning-2-56231/>

REFERENCES



UN Policy Brief, No 153, India overtakes China as The World's Most Populous Country, <https://www.un.org/development/desa/dpad/wp-content/uploads/sites/45/PB153.pdf>.

Paul, Binu. "Hyderabad's T-Hub: How the premier incubator is turbocharging India's start-up ecosystem", 11 June 2023, retrieved 04 August 2023, <https://www.businesstoday.in/magazine/deep-dive/story/hyderabad-t-hub-how-the-premier-incubator-is-turbocharging-indias-start-up-ecosystem-383648-2023-05-31>.

Sachdev, Geetika and Mayuri Ramanan. "Inside T-Hub, The World's Largest Innovation Hub in Hyderabad". December 20, 2022, retrieved 01 August 2023, <https://yourstory.com/2022/12/inside-t-hub-worlds-largest-innovation-hub-hyderabad>.

"Startups Leading Innovation Tech Agritech Healthtech Edtech", Yourstory, May 2023, <https://yourstory.com/2023/05/indian-startups-leading-innovation-tech-agritech-healthtech-edtech>.

T-Hub. "About Us". August 04, 2023. <https://t-hub.co/about-us>.

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