

birac

e3

Ignite • Innovate • Incubate

ATMANIRBHAR BHARAT *Scaling Innovations*



birac
ignite innovate incubate

Biotechnology Industry Research Assistance Council
(A Government of India Enterprise)



September 2020

No. 3 | Vol. 7



birac

Editorial Committee

Dr. Shirshendu Mukherjee

Mission Director
Grand Challenges India

Dr. Hafsa Ahmad

Senior Program Officer
PMU-Ind-CEPI

Ms. Ginny Bansal

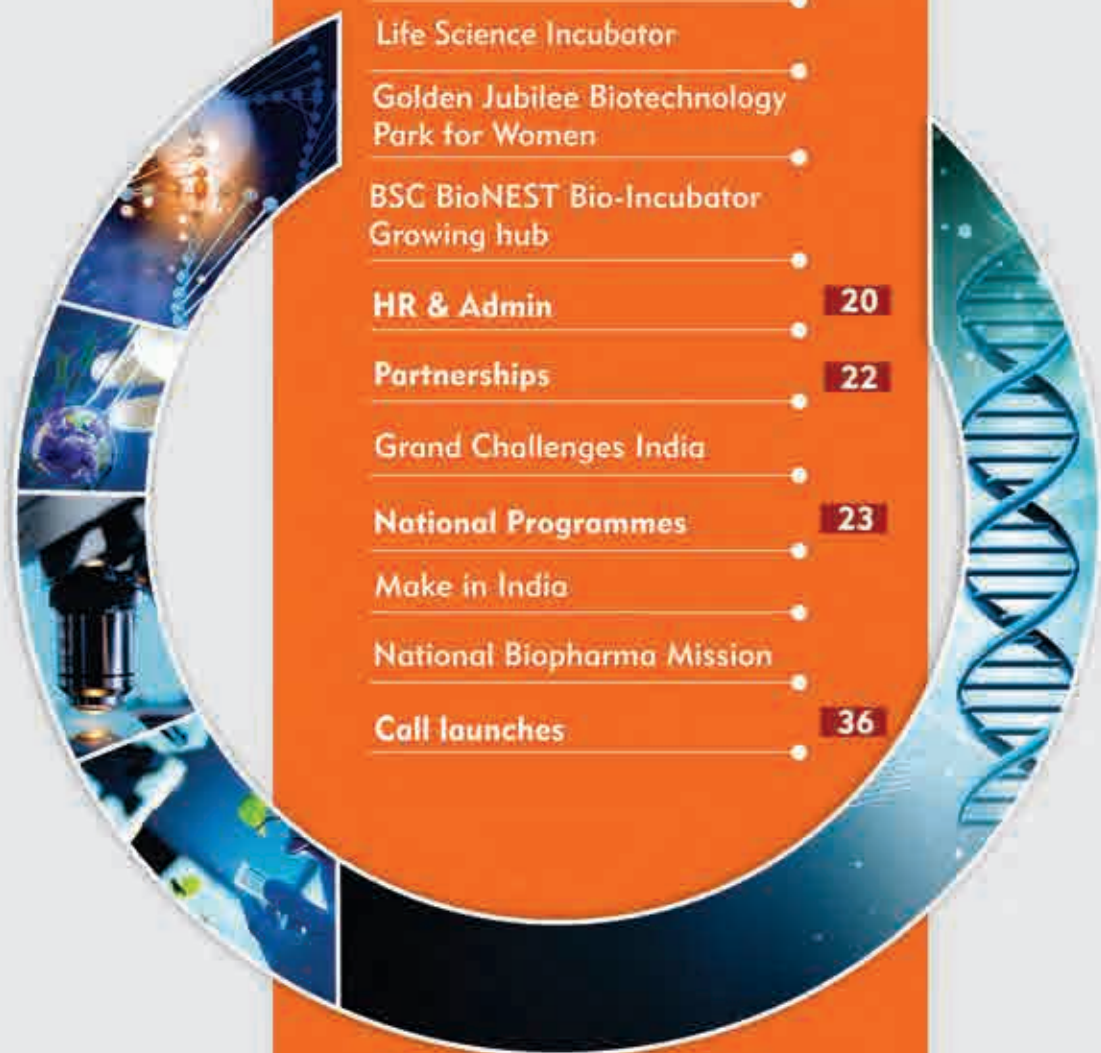
Consultant (Comm.)
Grand Challenges India

Design and Production

Airads Limited, 433, F.I.E., Patparganj, New Delhi 110 092, Email : airads2013@gmail.com

IN THIS ISSUE

Leader's Message	02
Chief Editor's Take	03
BIRAC Feature	04
AtmaNirbhar Bharat- Scaling Innovations	
BIRAC Reports	07
Ayushman Bharat PM-JAY Startup Grand Challenge	
BIRAC-Innovation Challenge Award-SoCH Webinars	
BIRAC Webinar Series	
BIRAC's IP Law Clinic	
BioNESTs-Launchpad for Biotech Startups	13
Life Science Incubator	
Golden Jubilee Biotechnology Park for Women	
BSC BioNEST Bio-Incubator Growing hub	
HR & Admin	20
Partnerships	22
Grand Challenges India	
National Programmes	23
Make in India	
National Biopharma Mission	
Call launches	36





Dr Renu Swarup
Secretary DBT
& Chairperson BIRAC

Leader's Message

The "**Atma Nirbhar Bharat Abhiyan**" was a clarion call by the honourable Prime Minister to revive every sphere of the economy from demand, supply to manufacturing, and make India self-reliant to sustain and tackle any black swan events in the future. This has become a "mantra" for everyone, as we push for raising India's share in the global economy. The Department of Biotechnology (DBT) and its PSU, BIRAC have been at the helm of the government's efforts to boost vaccine development and testing in India ever since the COVID-19 pandemic started to unfold. Therefore, all our Make in India initiatives and our myriad efforts aimed at indigenous production of testing kits and diagnostic devices or development of home-grown vaccines and drugs to fight

the pandemic, assume greater significance in this scenario.

The philosophical backdrop and intent of this 'Self-Reliant India' Mission is not one that is protectionist in nature, rather it aims at being vocal *for local* by utilizing an inclusive line of action. BIRAC has treaded a path that is based on a multi-pronged approach for inclusive innovation in healthcare and beyond. The ecosystem that was created, nurtured and strengthened by BIRAC over the years, reacted swiftly and with all its might to respond to the crisis that we faced as a nation, in the form of this COVID pandemic. From very limited production early this year to net production of about 15 lakh RT PCR kits at Andhra Pradesh MedTech Zone under the DBT-BIRAC-NBM supported Command Strategy is just one vivid example of self-reliance, that we achieved in such a short time.

BIRAC has made constant efforts to support technology driven innovations in various key sectors to ease the life of common man and to build **Atma Nirbhar Bharat**. DBT and BIRAC are headed towards various convergence platforms that will streamline our needs as a nation in product resources, and technology services towards developing reagents, diagnostics, vaccines, and therapeutics. This approach has been adopted to achieve self-reliance, mobilize immediate and long-term solutions, minimize wastage of resources, and establish coordinated approaches to fund R&D.

We are completely aligned with the Prime Minister's vision of a self-reliant India. At BIRAC, we are supporting our innovators, start-ups and industries to build competencies in producing quality products in a cost-competitive manner that can compete globally and this gives me confidence that our collective efforts will help us realize the vision of an **Atma Nirbhar Bharat**.



Anju Bhalla
Joint Secretary Department
of Science and Technology
& Managing Director, BIRAC

Chief Editor's Take

The Coronavirus pandemic has caused widespread disruptions and government has taken several measures to address the challenges posed by COVID-19. With the active support of all sectors and the citizens of the country, we have to mitigate the spread of the virus and bring the nation squarely back to the path of development.

India faced the COVID-19 situation with a spirit of self-reliance, as is evident from the fact that, from zero production of Personal Protection Equipment (PPE) before March 2020, India has today the capacity to manufacture 2 lakh PPE kits per day.

The Department of Biotechnology and BIRAC have jointly taken a number of steps to strengthen the innovation ecosystem. Entrepreneurs and innovators around the country have reacted rapidly to COVID-19 challenges. The pandemic has brought a new sense of urgency to innovate. With various opportunities being provided to young innovators and researchers, innovators are coming up with solutions that are tangible and affordable.

We at BIRAC have been instrumental in catalyzing the change in the Indian Biotech Innovation Ecosystem by strengthening the vibrant hubs of innovation, entrepreneurship development, technical and business mentoring through diverse networks, tailored to meeting the needs of the emerging biotech enterprises.

The Atmanirbhar Bharat campaign is a call to encourage entrepreneurship. BIRAC is working towards nurturing and empowering the startup community in India through its various innovative funding schemes, that will align with the national goals of Startup India, Make in India, Vocal for Local products and Atmanirbhar Bharat. From announcing the DBT-BIRAC COVID Consortia Research Call to providing funding support to companies ready for immediate deployment, to promoting potential COVID-19 solutions, BIRAC has been at the forefront of self-reliant efforts.

BIRAC supported innovations have come a long way in solving problems in varied sectors. The vibrant ecosystem offered to the innovators has been very helpful in addressing major societal issues.

We are constantly working towards development of the innovation and entrepreneurship climate to ensure the vision of Atmanirbhar Bharat and further positioning India as a Global Biotech Innovation Hub.

AtmaNirbhar Bharat- Scaling Innovations

The coronavirus pandemic has become far more than a public health crisis; its implications are far-reaching, ranging from disruption of global and local economies to education and consumer-businesses to physical and physiological consequences. Innovation has been at the forefront of our fight against the unprecedented COVID crisis and will be critical in driving the resilience and self-reliance of our nation.

Honourable Prime Minister in his clarion call to the nation announced AtmaNirbhar Bharat Abhiyan urging the nation to become self-reliant. The position of the world today teaches us to foster for self-reliant India. AtmaNirbhar India will base itself on the five pillars of the economy, infrastructure, system, vibrant demography and demand.

The COVID-19 pandemic has created a situation where it has become imperative for India to reduce dependencies on global supply chains, and focus on creating innovation and entrepreneurial ecosystems that would lead to economic and technological self-reliance and self-sufficiency through home-grown success stories. The pandemic has brought a new sense of urgency to attempts to innovate. The innovators and entrepreneurs across the country have been working hard to make this vision of AtmaNirbhar Bharat a reality.

The Department of Biotechnology and BIRAC has been working towards making this vision a reality. The mandate of BIRAC is to nurture and empower the Biotech innovation ecosystem. To strengthen the same, BIRAC over the years has initiated several schemes, networks and platforms that have helped to bridge the existing gaps in Biotech research and facilitated the development of novel, high-quality affordable products through cutting edge technologies. BIRAC provides financial and technical support to



startups from incubation, ideation, early-stage/late-stage and mentors them to take the products from laboratory to market.

So far, BIRAC has supported technology-driven 1500+ Entrepreneurs, Startups and SMEs; through various operational models of cooperation infusing INR 1144.77 Cr funds and mobilized INR 981.05 Cr funds through partnering with Public, Corporates, Philanthropic organizations at the national and international level to harness growth synergies for the of Ecosystem. A network of 50 Bio-incubators has been built creating an Incubation space of 5,48,000+ sq. ft. with high-end infrastructure providing access to instrumentation, technical, IP, legal and business mentorship for biotech startups. This has helped innovators to create a pool of intellectual wealth (225+ IP filed) and has supported in the launch of 150 product and technologies in the market.

The various schemes and programs of BIRAC have been strategically designed to cater to the entire product development cycle vis-a-vis ideation, proof of concept, validation and commercialization.

BIRAC funds a wide range of thematic areas including healthcare, agriculture, maternal and child health, nutrition, sanitation, waste to value, devices and diagnostics, bio-informatics, animal health etc. A lot of young innovators and entrepreneurs in the Biotech space are inclined towards nation building by providing innovative solutions to the unmet needs in the public health sector.



The vibrant ecosystem at BIRAC has helped innovators largely to come up with tangible and affordable solutions in varied domains. The out of the box innovations have been funded keeping in mind national importance, social relevance and promoting local innovations.

BIRAC has been at the forefront while addressing the challenges of COVID-19. From announcing the DBT-BIRAC COVID Research Consortia where funding support was recommended to about 120 proposals from industry and academia for developing indigenous solutions to combat the COVID crisis; to identifying potential COVID-19 Solutions for immediate deployment; to special sessions on COVID-19 to extend regulatory facilitation to startups; to establishing a fast track review for funding solutions with immediate deployability potential, BIRAC has been the nodal agency working towards creating a collaborative innovation ecosystem between the government, corporations, academic and research institutions to benefit for the masses at large.

BIRAC also contributes to the Government's national programs such as **"Make in India"**, **"Startup India"**, **"Swachh Bharat"** and **"Ayushman Bharat."**

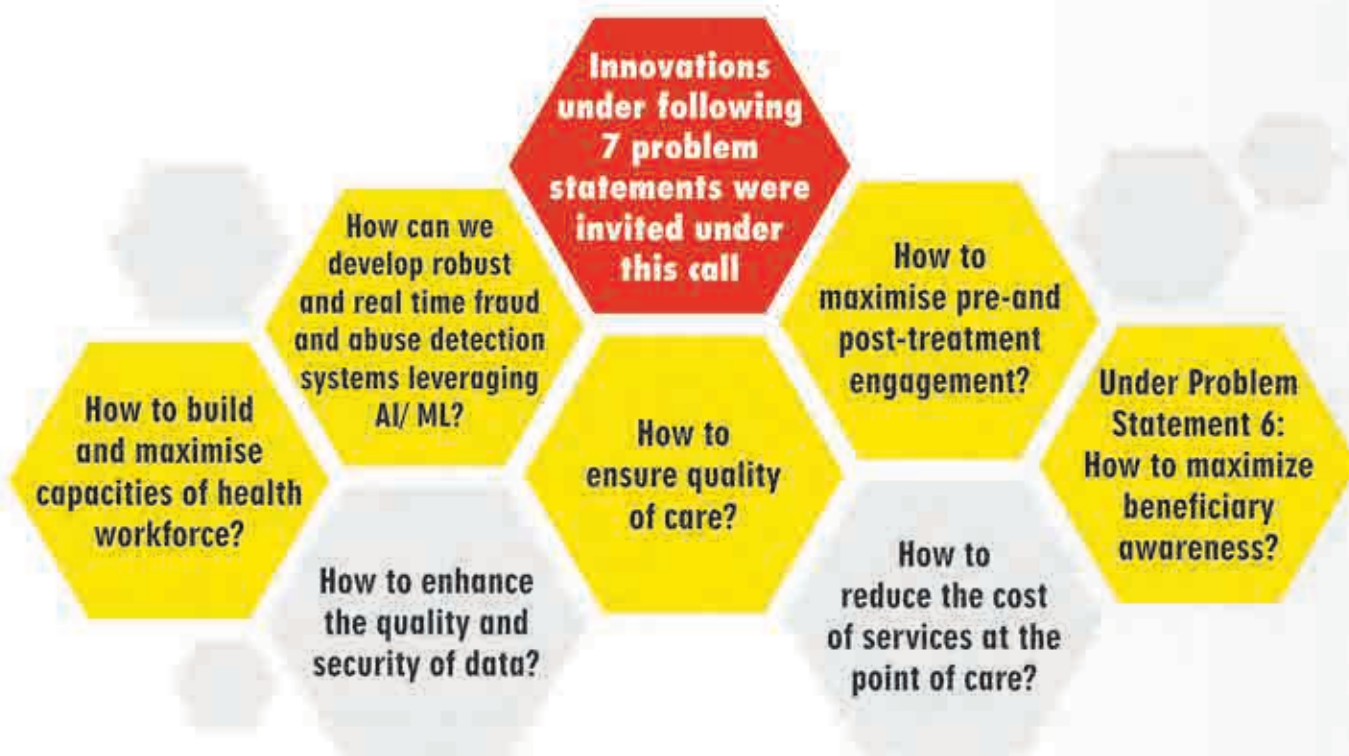
India has dealt the situation of the pandemic with the spirit of self-reliance, from the development of PPE kits, face shields to remote monitoring systems to oxygen generators, the innovators are coming up with path-breaking innovations. These "Make in India" innovations have a big responsibility in building a self-reliant nation of tomorrow.

BIRAC's efforts in last eight years have resulted in significant changes in the landscape of the Indian biotechnology sector.

Ayushman Bharat PM-JAY Start-up Grand Challenge

National Health Authority (NHA) is one of the apex institute that has been implementing India's flagship public health insurance scheme popularly known as "Ayushman Bharat Pradhan Mantri Jan Arogya Yojana (PM-JAY)". NHA in an attempt to rope in Indian start-up community be a critical participant/stakeholder for more effective implementation of largest government-funded health assurance scheme collaborated with Biotechnology Industry Research Assistance Council (BIRAC), to jointly launch Ayushman Bharat PM-JAY Start-up Grand Challenge.

The Start-up Grand Challenge was launched by the Hon'ble Prime Minister on 1st October 2019 at the first anniversary of Ayushman Bharat PM-JAY to identify, recognize and reward the best health-tech start-ups in the country and to bring in to mainstream top-notch innovations into the Indian health system. The call aims at generation of affordable and accessible cutting-edge solutions from start-ups engaged in sectors such as Medical Devices, Digital Health, Health Communications, Hospital services and Hospital Management, Medical workforce training and capacity building, among others. This initiative was designed to source the best start-ups in the country to solve some identified implementation challenges of PM-JAY and reward them with market access support for adoption at a larger scale.



AYUSHMAN BHARAT PM-JAY START-UP GRAND CHALLENGE



In the very first edition, the program received a tremendous response with 320 submissions. After rigorous internal due-diligence processes by BIRAC and NHA team, the applications were peer reviewed by a jury comprising of eminent senior experts from field of medicine, public health, technology and business, 52 were shortlisted for semi-finals Round. During the semi-finals round of Ayushman Bharat PM-JAY Start-up Grand Challenge that was held from 14 -16th July 2020, 22 start-ups were shortlisted under all 7 problem statements. The 7 final awardees under each of the 7 categories were selected in the final round of start-up Grand Challenges, conducted on 16 and 17 September 2020. The Final Awards of the Ayushman Bharat PM-JAY Start-up Grand Challenge were presented by Dr. Harsh Vardhan, Hon'ble Union Minister for Health & Family Welfare at the valedictory Session of Arogya Manthan 2.0 held on 25th September 2020. This international virtual conference was held from 22nd-25th September 2020 to mark the 2nd anniversary of PM-JAY.

BIRAC-Innovation Challenge Award-SoCH Webinars Pushing the Envelope on Innovation in Clean Cooking

To create awareness for the BIRAC-Innovation Challenge Award-SoCH, BIRAC, in association with Social Alpha and CEIIC conducted a Webinar "Pushing the Envelope on Innovation in Clean Cooking" on 6th July 2020, 4:00-5:30 pm. The webinar focused on "Innovative, Efficient and Affordable Solutions for Clean Cooking in Rural and Community Settings". 100+ participants registered and attended the webinar. The participants and the panellists were enlightened about the SoCH challenge in detail viz. the purpose for the launch, salient features of the challenge, and the support to be offered to the shortlisted applicants, finalists, and winners.

The webinar included a Panel session moderated by Mr. Adwait Joshi, CEO, Clean Energy Access Network. Among the Panellists, Mr. Manoj Kumar, CEO, Social Alpha and Dr. Priyadarshini Karve, CEO Samuchit Enviro have emphasized for the need to develop a wide variety of affordable, value for product, and user-friendly innovative solutions that can coexist at rural and urban settings, based on the different cultural and geographical needs of the users. Dr. (Prof.) Ambuj Sagar, IIT-Delhi, has shed some light upon the Policy factors affecting the deployment of a clean cooking-based innovation in the market and meeting its sustainability.

Mr. Simon Batchelor, MECS, apprised the participants about the association of MECS with BIRAC for the SoCH Challenge and emphasized that the electricity-based cooking methods are more efficient in terms of time consumption than other traditional modes of cooking. Dr. Nitin K. Labhsetwar, CSIR-NEERI advised to cite the BIS, ISO and BEE Star Labelling guidelines for preparing protocols required to evaluate prospective innovations which will be selected in the SoCH Challenge.

With reference to the SoCH Challenge, all the panellists emphasized for the development of innovative solutions focusing on the health and need of the end-users and targeting the community at a large. Participants' queries were also answered by the panellists and the organizers.



BIRAC INNOVATION CHALLENGE AWARD 2020-21

SoCH 2020-21
Innovative, Efficient and Affordable Solutions for Clean Cooking in Rural and Community Settings

Webinar
Pushing the Envelope on Innovation in Clean Cooking

Date: 6th July, 2020
Time: 4:00pm - 5:30pm

Register [here](#) to join the webinar.

For queries please contact: sped.5@birac.nic.in

Speakers

- Dr. (Prof.) Ambuj Sagar (IIT Delhi)
- Dr. Priyadarshini Karve (Samuchit Enviro)
- Adwait Joshi (MECS)
- Dr. Nitin K. Labhsetwar (CSIR-NEERI)
- Manoj Kumar (Social Alpha)
- Adwait Joshi (CEAN)

BIRAC-Innovation Challenge Award-SoCH Webinars SoCH Detailed Application: What and How to Write

To facilitate the selected applicants in understanding the detailed application form invited under the BIRAC-Innovation Challenge Award-SoCH, BIRAC, in association with Social Alpha and CEIC conducted a Webinar **"SoCH Detailed Application: What and How to Write"** on 18th Sep 2020, 11:00 am-12:30 pm.

The webinar was targeted towards addressing the final round of queries applicants may have. Participation was by invite only and so was given only to the applicants selected under the challenge after the first round of screening. All the selected applicants attended the webinar. The participants were apprised in detail about the application form viz registration process; Innovation details, Product/Technology Market Readiness and Business Model and Pricing information requested in the form. The webinar included teams from Social Alpha and BIRAC to address the queries of applicants.

In the session of 90 min, queries were taken simultaneously along with the explanation provided for each sections of the form. Participants' queries included; understanding about Technology readiness level, Roadmap for developing the product/Technology and IP related to the innovations.

All the queries raised in the webinar were resolved and to address any further queries email-ids of both the teams were also communicated to the participants.



BIRAC INNOVATION CHALLENGE AWARD 2020-21

SoCH 2020-21
Innovative, Efficient and Affordable Solutions for Clean Cooking in Rural and Community Settings

Webinar

SoCH Detailed Application- Understand What and How to Write

Date: 18th September, 2020
Time: 11:00 am to 12:30 pm

PARTICIPATION BY INVITE ONLY

For any clarification please contact:
sped-5@birac.nic.in
energy@socialalpha.org

This Webinar is targeted towards addressing the final round of queries applicants may have

BIRAC Webinar Series

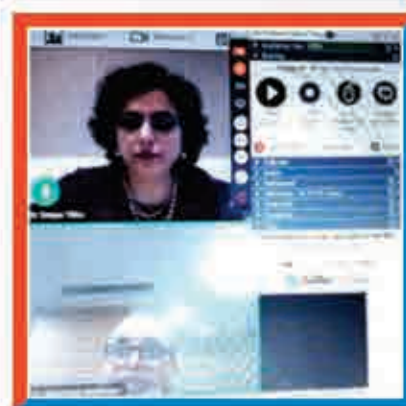
"Understanding the Biodiversity Act and Safeguarding the Start-ups with an Intellectual Property Strategy"

BIRAC organized webinar series "Understanding the Biodiversity Act and Safeguarding the Start-ups with an Intellectual Property Strategy" on 25th August & 1st September, 2020. The program was designed to sensitize the Start-ups, Academia, Entrepreneurs and SMEs on the following:

- Important provisions & exemptions of the Biological Diversity Act and access & benefit sharing provisions
- Strategy for protecting Intellectual Property by Start-ups and importance of formulating an IP strategy for business
- Common challenges faced by Start-ups with IP

Both the webinars were well attended by about 120 participants from academic institutes, medical colleges, start-ups and aspiring entrepreneurs engaged in life science sector.

The first webinar "Understanding the Biodiversity Act" was delivered by Dr. Malathi Lakshmi kumaran to apprise the participants on regulatory regime, approval process & requirements on utilization of the Biological Resources for research and commercial utilization under the Biodiversity Act. Second webinar was delivered by Dr. Deepa Tikku on "Safeguarding the Start-ups with an Intellectual Property Strategy" wherein the participants were informed on different forms of IPRs, strategy to be considered while protecting the Intellectual Property Rights and importance for formulating an IPR strategy for business.



BIRAC's IP Law Clinic organized at KIIT-Bhuvaneshwar on 28th & 29th September, 2020

BIRAC conducted IP Law Clinic in association with KIIT-Bhuvaneshwar on 28th & 29th September, 2020 through video conferencing where BIRAC grantees had one to one interaction with the BIRAC IP & Technology Management Group on IPR & Technology Transfer related issues.

The clinic was organized to provide a strategic advisory on IP filing process, Patent Searches, Patent ownership issues, requirement of approvals while utilizing the biological resources. The IP Law Clinic also guided the start-ups on importance of carrying out Freedom-To-Operate search & analysis and on the queries with respect to the Technology Transfer & Commercialization.

BIRAC team explained about the financial-aid available under BIRAC-PATH scheme for its grantees to provide the support for Patenting and Technology Transfer emerging out from the BIRAC supported projects. The IP Law Clinic was well attended by around 21 BIG grantees.

BIRAC's IP Law CLINIC



BioNESTs-Launchpads for Biotech Startups



Life Science Incubator-IKP Knowledge Park



The Life Science Incubator (LSI) is set up by IKP Knowledge Park, a 200-acre Science Park in Genome Valley, Hyderabad with the objective of nurturing start-up companies, spin-offs and scientist entrepreneurs, thereby increasing the competitiveness of the region and the country. LSI promotes the advancement of technology-based innovators and entrepreneurs working in various fields of life sciences by providing ready-to-use labspace, shared equipment facility, seed funding, mentorship, IP and other services.

LSI was set up in 2006 with support from NSTEDB, DST, Govt. In 2012 the facility was expanded with support from BIRAC, DBT and is now part of BIRAC's BioNEST network offering 13,000 sqft of incubation space. The unique feature of LSI is that startups here can leverage various programmes and expertise within IKP and in the Park's industry ecosystem, and also seamlessly move to larger labspaces as their activities grow.

LSI offers furnished laboratory units of 225 sqft and unfurnished labspace of varying sizes, Work Bench and Desk Space. The lab units are charged based on area. Desk Space and Work Bench have fixed monthly charges. Shared Equipment Facility includes equipment needed for basic Chemistry, Molecular Biology, Protein Chemistry, Spectroscopy, Microscopy, Cell culture related work. The Analytical and Instrumentation Facility has allowed LSI to extend support to innovators and industry from Hyderabad and outside, thus strengthening the Life Science ecosystem. Wide range of high-end equipment including 400 MHz NMR, LCMS/MS, GCMS/MS, ICPMS, DSC, TGA, Particle Sizer, HPLC, Digital Confocal Microscope, Phase contrast microscope etc. facilitates structural analysis and characterization of molecules, microscopic analysis and various other analyses.

A six-member team manages the LSI operations. Ms. Deepanwita Chattopadhyay, Chairman & CEO, engages with the team regularly for monitoring the progress and planning incubation strategy.

Impact

Total incubation space: 13,000 sqft

Total Incubatees: 86

Innovations funded: 47

Success stories

1. Laurus Labs Ltd.



Laurus, the first incubatee of LSI is one of the fastest growing Indian Pharma companies.

Products, patents: Commercialised 90+ Active Pharmaceutical Ingredients for anti-retroviral, Hepatitis C and Oncology drugs; 116 granted patents, 257 patents filed.

Revenue in FY2020; IPO: INR 2,800+ Cr. Went public in Dec 2016 with a valuation of INR 4,500 Cr.

Awards: Won several awards, recent being Porter Prize 2019, Pharmexcil Outstanding Export Performance Award 2018-19, NATIONAL SAFETY AWARD.

(<https://www.lauruslabs.com>)

2. Remidio Innovative Solutions Pvt. Ltd.



Medical device company creating disruptive solutions in Screening & Diagnostic Imaging in Ophthalmology.

Products, patents: Smartphone-based Fundus on Phone and Angio on Touch for high quality ophthalmic imaging to detect diabetic retinopathy. Sold 1,000 + devices and screened over 7.5 mn patients in 15 countries. Filed 6 patents, 2 granted in EU, 1 in Japan.

Revenue in FY2020; funds raised: INR 8+ Cr. Raised INR 39.4 Cr.

Awards: Wellcome Trust Affordable Healthcare Innovation Award, Lockheed Martin Innovation Award. (<https://www.remidio.us>)



Fundus-on-Phone
by Remidio

3. GPS Renewables Pvt. Ltd.



GPS is the first Internet of Things in the bio-waste to energy space.

Product: BioUrja. 83 installations across India, Bangladesh, Japan, USA, Malaysia.

Revenue in FY20: INR 16+ Crore.

Awards: Sankalp Award 2015, Climate Solver Award 2014 by WWF. Recognized as the 'Bioenergy firm of the Year 2015' by Fortune Media.

(<http://www.greenpowersystems.co.in>)



BioUrja Plant, Intel Bangalore

4. RAS Life Sciences Pvt. Ltd.



RAS Lifesciences Pvt Ltd
Striving for better health

Molecular Diagnostics startup.

Products: LAMP Kits- Lab animal monitoring kits, food pathogen detection kits, GMO testing kits

M&A: Biomerieux SA, an MNC acquired 60% stake in RAS for Rs 12.32 Cr in 2012.

BioNESTs-Launchpads for Biotech Startups

5. ATGC Biotech Pvt. Ltd.



Agri-biotech startup working on low cost synthetic pheromone based Integrated Pest Management Solution that has demonstrated control of insect pests.

Products, partnerships: Commercialized 50+ Pheromones against Brinjal Fruit and shoot borer, Fall army worm, Tuta Absoluta, Helicoverpa, Diamond Black Moth, Rice & Sugarcane Borers.

Strategic tie-up with a US based company; clients in India, US and Europe.

Funds raised: INR 25 Cr; valuation INR 300 Cr. (<http://www.atgc.in>)

6. Telluris Biotech India Pvt. Ltd.



Products: Novel nematicides and eco-friendly plant growth promoters that are environmentally safe, non-toxic and highly effective for crop protection and crop nutrition.

Funds raised: INR 30 Cr from Sathguru Catalyzers Fund.

(<https://tellurisbiotech.com>)

7. Yogee's Bioinnovations Pvt. Ltd.



BITS-Pilani faculty led startup; woman founder.

Products, patents: Technologies for cancer therapeutics, non-invasive cancer diagnosis, and nutrition and immune boosting products. 3 Indian and 5 International Patents filed for Breast cancer therapeutics, Saliva based cancer detection device and citrus fruit-based health product.

At the wake of COVID-19 pandemic, the startup manufactured alcohol-based hand sanitizer and supplied 10,000+ Litres to many COVID centres in Hyderabad, 11 GHMC hospitals and PHCs, Commissioner of Police, Hyderabad, Police Stations, BITS Hydr and IKP.





Golden Jubilee Biotechnology Park for Women

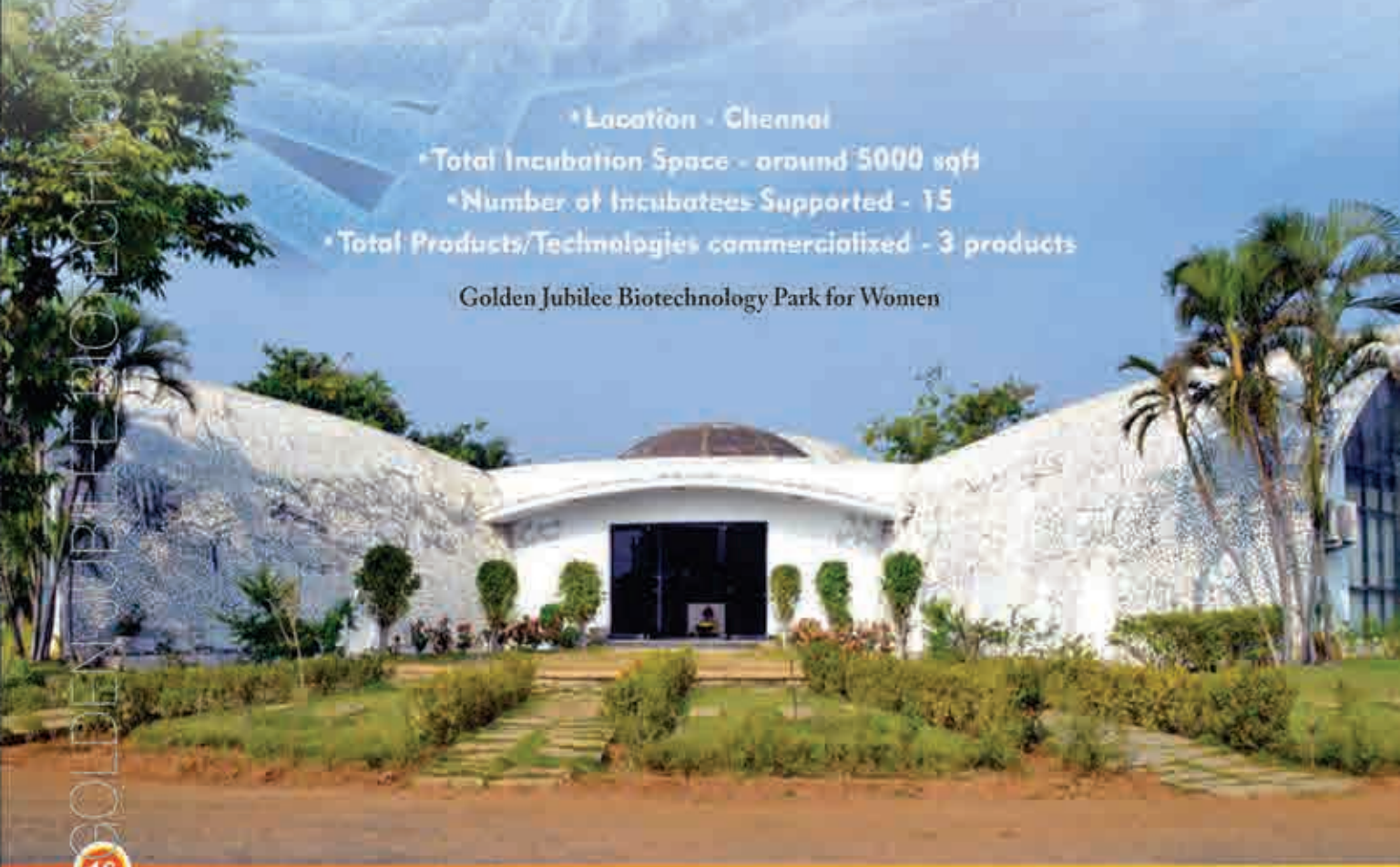
Golden Jubilee Biotech Park for Women Society, Siruseri, Chennai, Park is committed to encourage and empower Women Entrepreneurs who are in the Biotech stream from across country and especially from Tamil Nadu since it became operational in 2001.

BioNEST – M.S Swaminathan Bio Incubation Centre State of the art facility was established with the support of BIRAC in 2015, which was inaugurated by Dr. Harsh Vardhan - Minister of Health & Family welfare, the Park has become unique and the first of its kind in the country dedicated for aspiring women to realize their dream come true. Park supports truly from R&D to Commercialization.

Park has 20 Unit modules and all are occupied with women entrepreneurs from the arena of Life Science and manufactures varied products which are sold across India and abroad.

- Location - Chennai
- Total Incubation Space - around 5000 sqft
- Number of Incubatees Supported - 15
- Total Products/Technologies commercialized - 3 products

Golden Jubilee Biotechnology Park for Women



BioNESTs-Launchpads for Biotech Startups

Facilities offered and unique features

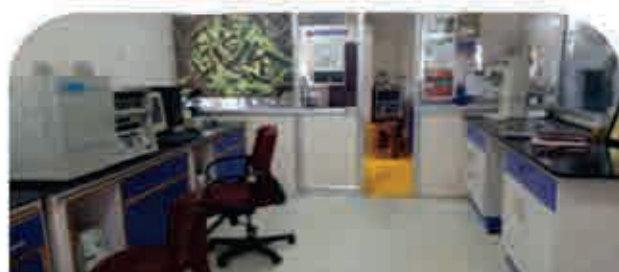
Park offers unique facility for start-ups from Incubation to large scale manufacturing, who are supported by expertise having rich experience from the diverse fields.



Bionest Central Instrumentation Facility



Bio Nest Incubation Facility



1000 sq.ft Unit Module for small scale manufacturing



Land module for Large Scale Manufacturing

With the mission of addressing the need of hundreds of Women Entrepreneurs in the Country who are looking for such a model of Park where they can carry out their Innovative work from "Ideation to Prototype and to large scale manufacturing" in the Confluence area of Medtech – Biotech'. The Park will offer such a unique facility and create direct and indirect employment for more than 500 women work forces.



BioNest Team



BSC BioNEST Bio-Incubator **Growing hub for Bio-entrepreneurs**



Location: National Capital Region on Faridabad-Gurugram Expressway

Focus area: Healthcare and Biotechnology

Incubation Space: 20,000 sqft

Total Incubatees supported: 23

BBB provides excellent incubation infrastructure, spread across 35000 sq. ft. covered area out of which 20,000 Sq. ft is dedicated to Lab Space, Office Space, Professional Business Suites, Culture Facility and Instrumentation Facility. BBB is a new age Bio-Incubator with modern infrastructure, start-of-the art laboratories with cutting edge technology. Current occupancy of the incubator is about 70 percent.

BBB has been successful in creating a vibrant entrepreneurial ecosystem in Delhi-NCR since its inception in November 2018. Incubatees of BBB get all kind of critical services, at a very nominal charge, to move on the fast-track to success. BBB has supported 23 startups in different domain of healthcare and has been able to generate 55 lac revenue from rentals and other support services. Some startups have also developed innovative product prototype and their work has been recognised by different public and private agencies.

So far 5 Patents and 8 Trademark applications has been filled by startups. Five products have been commercialised till now which has been able to generate 12 cr. (cumulative) as revenue for the startups.

Two incubatee companies (Shine Biotech Pvt. Ltd. and InnoDx Solutions Pvt. Ltd.) have also won prizes for their idea on diagnosis of coronavirus from BIRAC and DST (BIRAC-TiE Women Entrepreneurship Award and SAMADHAN Award). One incubatee company (Vanguard Diagnostic Pvt. Ltd.) has also been featured under 5000 fastest growing MSME.

Two incubatee companies (Vanguard Diagnostic Pvt. Ltd. and InnoDx Solutions Pvt. Ltd.) have received approval from ICMR for COVID-19 diagnostic kit. One incubatee company (Stellar Diagnostic Pvt. Ltd. has received ICMR approval for TB Rapid Diagnostic Kit to conduct field trials.

BioNESTs-Launchpads for Biotech Startups

BBB has signed several MoUs and have collaborations with reputed hospitals, incubators and accelerators to further guide the young Innovators. BBB has recently signed an MoU with Medanta hospital, PadUp Venture, DITECH (Haryana Government) and E-Cell (IIT, Bombay) to strengthen the network. BBB is actively promoting the entrepreneurial eco system by regularly conducting workshops, seminars and facilitating interaction between entrepreneurs. Bio-incubator has conducted more than 55 such events till date.



Facilities offered and Unique features of BBB

Incubation Facility- Wet labs, Dry Labs and Central Instrumentation Facility

Meeting Rooms, Video Conferencing Rooms, Seminar Rooms

Access to pool of Scientist from NCR Biotech Science Cluster

Access to Small Animal Facility in collaboration with RCB faculties

Access to Advanced Technology Platform centre established by DBT

1st India Biological Data Centre (IBDC) by DBT at NCR-BSC (upcoming)

IP, Technical & Business mentoring support

Other support services- Recruitment, Trainees, Affiliate Marketing, attendance service etc.

BBB is operated and managed by seasoned and skilled professionals with rich corporate experience. The team acts as a support system for all the start-up at various stages of their development.



Within a short span, BBB has created a niche in the area of Bio-Incubation in Delhi NCR with its world class facility dedicated to support biotechnology and healthcare-based start-ups. BBB invites all start-ups and innovators to come forward and experience the unique start-up ecosystem of the facility.

For more information about BBB, please visit:
<http://bbb.rcb.res.in/>

BSC BIONEST BIO-INCUBATOR GROWING HUB

Hindi Maha 2020-21

Hindi Diwas is celebrated on 14 September with great pride and vigour as Hindi was adopted as the Official Language of our nation, India on September 14, 1949.

This year Biotechnology Industry Research Assistance Council observed Hindi Maha from 01st September 2020 to 30th September 2020.

To promote and propagate the use of our national language, following competitions / activities were organized online during the Hindi month:

1. Essay Writing on Importance of Hindi Language.
2. Slogan Writing on Current Scenario.
3. Maximum Hindi email communication till **30 September 2020** by Departments.
4. Digital display of important quotations in Hindi.

All employees participated with great enthusiasm in this event.



हिन्दी मास
01 सितंबर से 30 सितंबर 2020

राष्ट्रीय व्यवहार में हिन्दी को काम में लाना देश की
एकता और उन्नति के लिए आवश्यक है।

- महात्मा गांधी

Biotechnology Industry Research Assistance Council
(A Govt. of India Enterprise)
3rd Floor, MTNL Building, I.C.T. Complex, Connaught Road, New Delhi - 110002 (INDIA)

हिंदी मास - निबंध लेखन | नारा लेखन

निबंध | नारा लेखन

निबंध अपलोड करें (विषय - हिंदी भाषा का महत्व) (शब्द सीमा - 300)

कतुपुर्

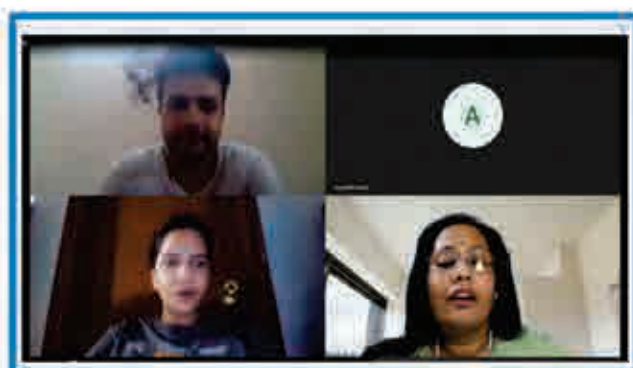
नारा अपलोड करें (विषय - वर्तमान परिदृश्य) (शब्द सीमा - 30)

कतुपुर्

Submit

Training and Development

The COVID-19 pandemic has created an unprecedented situation leading to a lot of fear and anxieties in professional life. In such circumstances fear, anxiety and high stress adversely impact the professionals' performance which also affects organisational outcomes. Keeping in view of this, BIRAC organised online training on **"Stress Management and Emotional Balance during COVID-19"** for its employees. This training helped employees understanding the source of stress during the COVID-19 situation and dealing with their stress effectively. It also facilitated in developing emotional awareness amongst the employees and guide them how to manage their negative emotions and develop a positive mind set.



Session Objectives

- To understand the sources of stress during the COVID-19 situation
- To recognise the symptoms and dealing with it effectively.

Schedule

10:00 AM - 11:30 AM
11:45 AM - 01:15 PM

Methodology

Interactive discussion and self assessment

All the participants need to keep pen and paper handy.



Grand Challenges India

Establishment of National Institute of Health Research –Global Health Research India Unit for Genomic Surveillance of Antimicrobial Resistance

There are greater levels of AMR resistance reported from India as compared to developed countries. The reasons for limited concerted response against AMR are, lack of expertise and infrastructure in microbial genomics, inadequate focus of microbial genomics to resolve the issue of AMR and lack of country wide network to address the challenge. The use of whole genome sequencing (WGS) of bacterial pathogens promises to transform our ability to understand epidemic dynamics. It allows identification of genetic changes responsible for resistance and virulence and to compare the genomes of isolates from different individuals and locations and infer likely routes of spread.

Since, inception, the Wellcome Trust Sanger Institute has had a fundamental impact on understanding the biology of infectious disease. In line with its work, the Sanger Institute through funding support of UK National Institute of Health Research (NIHR) has intended to partner with National/sentinel laboratories at four strategically important location across the globe i.e. India [Central research Laboratory (CRL), Kempegowda Institute of Medical Sciences (KIMS), The Philippines [Research Institute of Tropical Medicine (RITM)], Colombia in South America [Colombia (Agrosavia)] and Africa [Nigeria (Ibadan University)] to create country specific Global Health Research Unit (GHRU) to strengthen intelligent surveillance network hub for early warning of emerging pathogen and resistance threats.

Building on the existing expertise of GCI that is already implementing and managing programs on AMR, the present proposal on genomic surveillance of AMR is brought under the ambit of GCI. The GCI besides serving as the implementing organization on behalf of the partners is also coordinating and managing this program in India.

The UK-NIHR funded GHRU at CRL, KIMS, Bangalore, is aimed at providing intelligent global surveillance of bacterial pathogens by focusing on the WHO listed 10 key priority pathogens. The team intends to sequence 10,000 genomes of pathogens through appropriate sampling (from 50 centres PAN India) and analysis. The initiative will help enhance local capacity of each of the aforementioned sentinel laboratories and equip them to undertake WGS and generate actionable data that will enable policy makers and public health programs to make informed decisions to respond to AMR in most efficient manner.



Make in India

Latitude59

August 27-28, 2020, Kultuurikatel, Estonia | Online

About Estonia: Estonia is located to the north of Latvia and across the Baltic Sea bordered to the north by the Gulf of Finland, to the west by the Baltic Sea with Sweden on the other side, and to the east by Russia. Estonia is reportedly the world's most advanced digitalized society which offers:

- e-health Services
- e-VISA & e-residency to Startups
- Promotes innovations & offers several incentives to Startups that are at par to local & e-resident Startups

Latitude59 is the largest annual international start up event in Estonia's which brings together potential investors & start-ups for pitching, wooing and matchmaking activities. Latitude59 is an opportunity to demonstrate the product in front of the whole tech community in Estonia and many other relevant visitors including investors, media, potential customers and attending techies to get their direct feedback and support.

BIRAC along with its 05 supported Startup virtually participated in Latitude59, on **27-28th Aug 2020**. BIRAC's delegation to the event was represented by Dr. Bhuvnesh Shrivastava, Manager Make in India Cell along with representatives from following 05 Startups:

1. **Janitri Innovations** - Arun Agarwal
2. **Adiuvio Diagnostics Pvt Ltd.** - Geethanjali Radha krishnan
3. **Periwinkle Technologies** - Veena Moktali
4. **Predible Health** - Suthirth Vaidya
5. **Ubiqare Health Pvt Ltd** - Mr. Sundararajan Srinivasan

This partnership initiative is a part of BIRAC's efforts to give an international exposure to Indian startups and strengthen India-Estonia collaborations in innovation. The showcasing activity is being steered by

Make in India Cell of BIRAC and complementary event passes to attend the event were provided by the office of Indian Ambassador to Finland & Estonia.

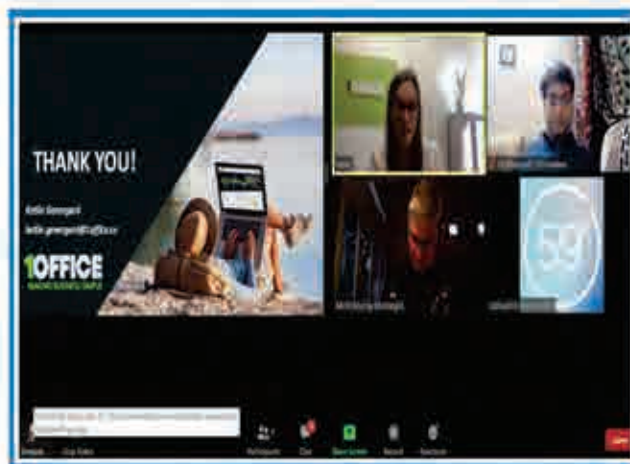
Special attraction of the event was:

1. **Focus areas:** Future of tech, education, digital government
2. **Matchmaking platform for attendees:** Startups can go through list of investors and connect directly through chat or video meeting).
3. **Mentor program with experts worldwide:** Startups can book slot with mentors of their area of interest
4. **Online demo area:** For highlighting startups to demonstrate their innovations
5. **Pitching competition:** With audience and more directly approx with 350 investors.

During the 02 daylong event, several sessions for introduction to Foreign Startup ecosystem took place, which mainly included the Belarus Startup ecosystem, Japanese Startup ecosystem & European Innovation ecosystem. Startup Estonia team presented a demo afternoon which witnessed the participation of several Startups pitches. Founder's stories by several Startups and reverse pitch by investors also attracted a large no. of Startups.

BIRAC supported Startups attending the event also availed an opportunity to attend selected 05 online mentoring sessions for important aspects of business such as conflict management, Hiring, talent acquisition, running business on e-residency, fund raising, Team integration & partnerships, Markey entry options, B2B sales, Govt relations, Financial & Business planning, how to approach VC & Seed Fund etc.

BIRAC's Startups fetched fair attention & queries through its virtual demo area from participating Startups, Investors & potential customers. The event gave Indian Startups an opportunity to meet EU Startups, international investors and industry leaders from Estonia as well the other Startup ecosystem. Likewise this engagement brought awareness to Estonian/EU participants about the Indian Biotech ecosystem. It may be worthwhile to engage formally with Estonia under a strategic partnership further.

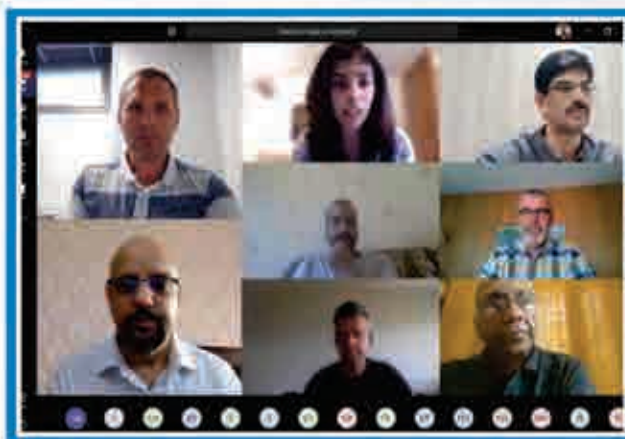
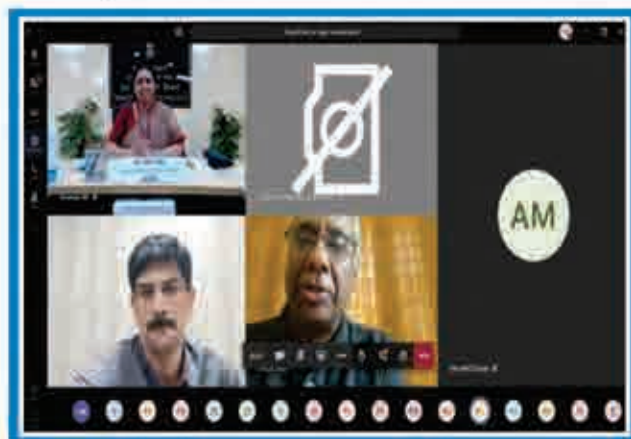


National Programmes

Advancing Collaboration Across India - Finland - Estonia

The international webinar was organized by MII Cell of BIRAC along with Embassy of India in Finland and Estonia in partnership with Invest India on 25th June, 2020. The theme of the webinar was "Advancing Collaboration Across India - Finland - Estonia (Focus: Biotech Sector)" and it was organised to showcase Indian, Finnish & Estonian Biotech Ecosystem strengths for introducing opportunities of Biotech collaboration.

Dr. Renu Swarup, Secretary DBT & Chairperson BIRAC, highlighted the Indian Biotech Ecosystem roadmap and discussed Integration of National missions along with new initiatives like investment facilitation will pave way for joint innovations for development of products. Special Address was given by H.E. Ms. Vani Rao, Ambassador of India to Finland, Estonia on India-Finland-Estonia Collaboration in Biotechnology and Medical Devices. The webinar introduced Biotech Ecosystem in India, Finland and Estonia for encouraging joint collaborations with India. The event also provided an opportunity to showcasing of biotech clusters from different part of India, Finland and Estonia.



Glimpses of the webinar
"Advancing Collaboration Across India - Finland - Estonia in the Biotech sector"

MAKE IN INDIA

National Bio-Pharma Mission



E-Inauguration of Center for Biopharma Analysis

A National Biopharma Mission supported National Service Facility at Venture Center, Pune

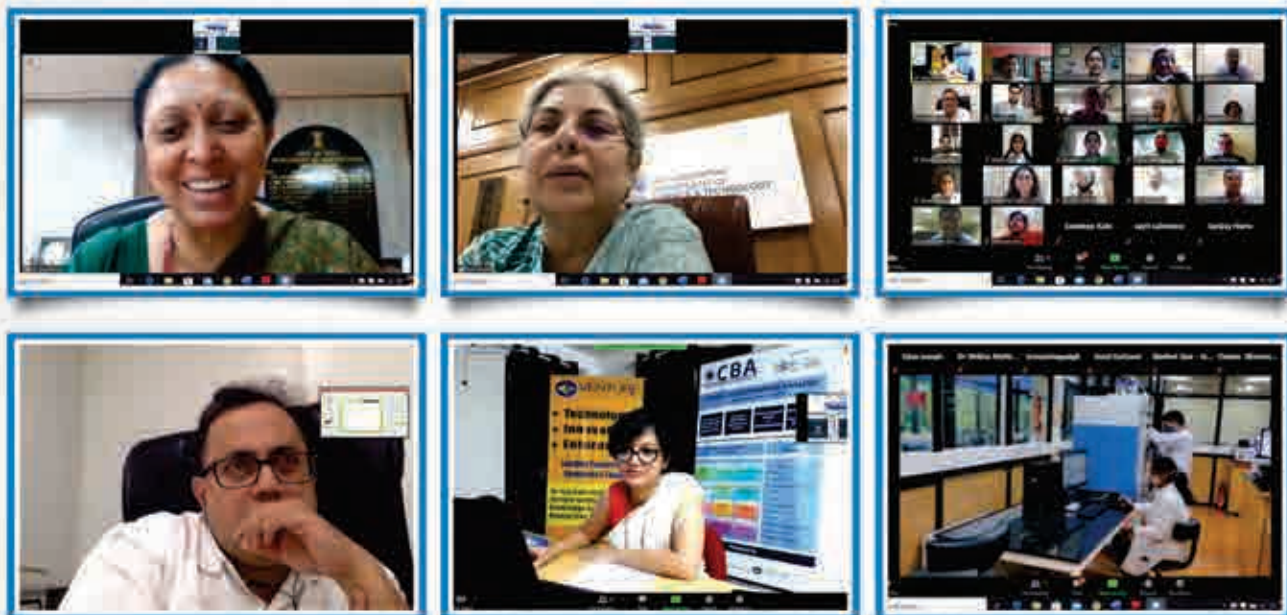
The Center for Biopharma Analysis (CBA) supported by the National Biopharma Mission of Department of Biotechnology (DBT)-Biotechnology Industry Research Assistance Council (BIRAC) at Pune-based technology business incubator, Venture Center was inaugurated virtually by Secretary, DBT, Dr. Renu Swarup on 14th Aug 2020. Ms Anju Bhalla, MD, BIRAC and Dr. Kavita Singh, Mission Director, National Biopharma Mission, also virtually addressed the gathering.

Inaugurating the facility via video conference, Dr. Renu Swarup, Secretary, DBT, said that she expects that the CBA will play a pivotal role in supporting biopharma innovations from academic and government research labs, startups and many Indian companies with not only high-quality analytical characterization but also advise on studies needed for regulatory approvals. This can help speed up the development process.

An overview and a video tour of the facility was presented by Dr. Smita Kale from CBA, Venture Center, Pune. A talk on the 'era of biopharmaceuticals-India perspective' was also delivered on this occasion by Dr. Himanshu Gadgil, Director and COO, Enzene Biosciences.

CBA will provide high-quality analytical services for biopharmaceutical developers and manufacturers. This center is envisioned to become a resource center for structural and functional characterization of biologicals and biopharmaceuticals that will create long lasting value for bioentrepreneurs and industry.

Dr. Premnath and Dr. Manisha Premnath, COO and GM, Venture Center acknowledged the support of National Biopharma Mission, DBT and BIRAC in establishing this important national facility for characterization of biopharmaceuticals.



Glimpses from the virtual inauguration of CBA

National Programmes

E-Inauguration of National Immunogenicity & Biologics Evaluation Center (NIBEC); a GCLP Facility for Viral Immunogenicity Testing: A National Biopharma Mission supported National Service Facility at IRSHA, Bharati Vidyapeeth, Pune

National Immunogenicity & Biologics Evaluation Center (NIBEC) for assessing clinical immunogenicity of viral vaccines is established jointly by Bharati Vidyapeeth University through its constituent unit Interactive Research School for Health Affairs (IRSHA) and BIRAC-DBT, Government of India through National Biopharma Mission.

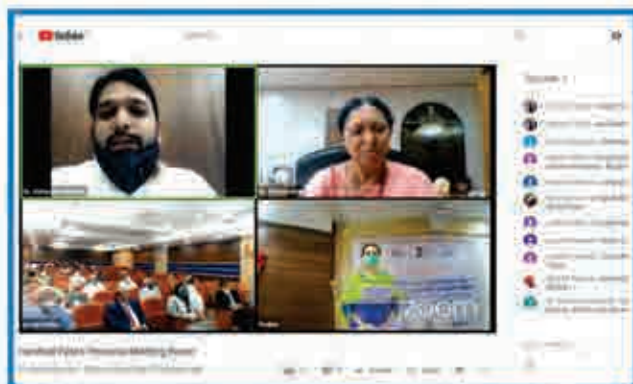
This facility was inaugurated virtually by Dr. Renu Swarup, Secretary, DBT, in an e-inauguration ceremony presided by Dr. Vishwajeet Kadam, Minister of State; Government of Maharashtra on 4th Sep 2020. Ms. Anju Bhalla, MD, BIRAC also virtually addressed the gathering.

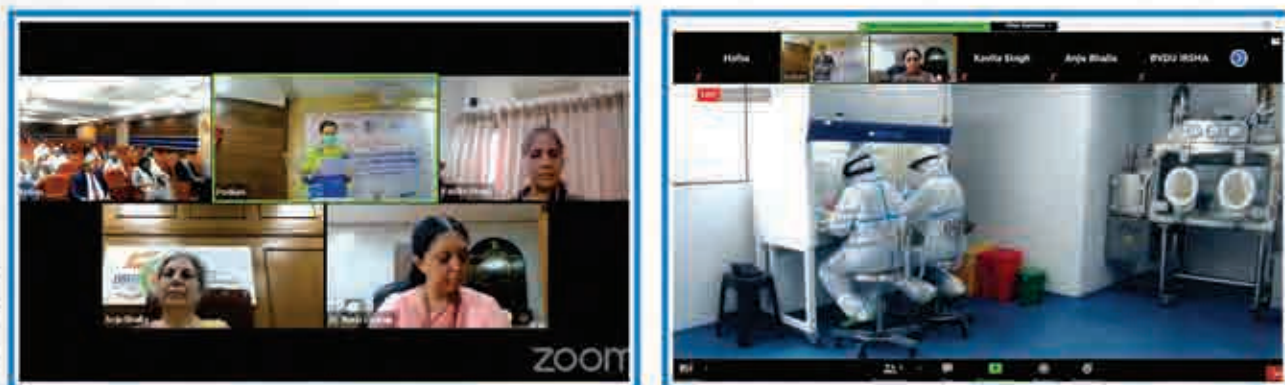
Inaugurating the facility via video conference, Dr. Renu Swarup, Secretary, DBT, said that she has very high expectations from NIBEC with regards to clinical immunogenicity testing of vaccine candidates specially with the COVID 19 vaccine pipeline in the country. She further elaborated that having domestic capabilities maintaining international standards in this space, will accelerate and fast track development of indigenous vaccines in the country.

Speaking on the subject, Dr. Vishwajeet Kadam, Minister of State; Government of Maharashtra said that Government support for creation of such a facility at IRSHA is heart-warming. He acknowledged and thanked the support of DBT and BIRAC.

An overview and a video tour of the facility was presented by Dr. A. C. Mishra, Director, NIBEC, IRSHA. He further acknowledged the support from Dr. Kavita Singh, Mission Director, National Biopharma Mission, who also joined the event virtually.

NIBEC, having a dedicated area of about 10,000 sq ft, was established in a record time of just a year. It has state of the art one BSL-3+, 4 BSL-2 and 10 BSL-1 laboratories. Key immunogenicity evaluation tests like Plaque Reduction Neutralization Test (PRNT), Microneutralization assay, IgM and IgG ELISA have been developed, standardized and validated for Dengue, Chikungunya and SARS-CoV-2 viruses. The laboratory has already started associating closely with leading Indian vaccine manufacturing companies and National and International institutes engaged in vaccine developments.





Glimpses from virtual inauguration of NIBEC

Trainings under the NBM Supported Ecosystem

The National Biopharma Mission currently supports 19 facilities to cater to different segments to aid vaccine, devices and biotherapeutics development along with manufacturing facilities. About 05 of them are already operational that includes the newly inaugurated Center for Biopharma Analysis (CBA) at Venture Center, Pune and National Immunogenicity & Biologics Evaluation Center (NIBEC) at Interactive Research School for Health Affairs (IRSHA), Bharati Vidyapeeth, Pune. The Mission has also established, five Technology Transfer Offices with an aim to strengthen the tech transfer capabilities in the country. This extended network has been making significant efforts to provide skill development in the key areas within the mandate of the Mission. Some major highlights over this quarter are:

Facilities: Center for BioPharma Analysis (CBA) at Venture Center, Pune conducted a session on 'Biophysical characterization of vaccines' on 18th July which was attended by 70 participants. The Medtech Rapid Prototyping μ Fab for Microfluidic Devices at CCAMP, Bangalore conducted a training session on Fabrication of PDMS Microfluidic devices on 24th Aug 2020 where 13 participants were given hands on training. The Marathwada MedTech Lab at NETRA Accelerator Foundation/Gрмаudyogik Shikshan Mandal conducted 4 trainings in this quarter on Advanced Programming of 3 D printer, Control Panel Functionalities of CNC Milling Machine, Application Engineering on VMC, Control Panel and application engineering of CNC Lathe. A total of 19 participants benefited from these hands-on trainings.

The MedTech Design and Rapid Prototyping Facility at Yenepoya (Deemed to be University) conducted 3 training programs. About 216 people participated in a training session on regulatory perspectives in pharmaceutical product development, while 15 participants each were trained in training on PCB Assembly Line and 3D Printing of PEEK Implants Production.

TTO's: The Innovation-Technology Transfer Office at FITT, New Delhi conducted about 20 webinars on different aspects of intellectual property, technology transfer and funding schemes which catered to a total participation of 510 attendees. IKP-PRIME conducted about 10 webinars over this quarter on various aspects of IP and entrepreneurship with a total attendance of 593 participants. TechEx.in at Venture Center, Pune conducted various online sessions on basics of IP and patent filing and database searches. These sessions observed total audience of about 323 attendees. KIIT-TBI-TTO conducted about 3 online

National Programmes

sessions on Regulatory issues in clinical studies of Drugs, Pharmaceuticals and Medical device, Invention Disclosures-Intellectual Property Rights and A breakdown of the IP application process and FTO. A total of about 197 participants attended these webinars.

Good Clinical Practice (GCP) Training Program

Series I-Aug 7th – Sep 4th 2020

Addressing gaps in setting up good clinical trial sites in the country with research capacity and capabilities in terms of GCP trained staff and infrastructure to commence community-based clinical studies without much time investment on-site preparedness activities is a major focus area within the National Biopharma Mission.

It was realized that one of the critical gaps common at trial sites was lack of GCP training of the research staff and non-familiarity with the prevailing clinical trial regulations as well as best research practices for regulated trials. To overcome this impediment CDSA in consultation with NBM has organized a well-structured comprehensive GCP training program for 05 priority sites which are also funded by NBM to conduct a seroprevalence study on COVID-19, Dengue, and Chikungunya.

Participating Sites	National Institute of Epidemiology (NIE, ICMR), Chennai (MRHRU)	SHARE India, Telangana	INCLIN Trust International
		CMC, Vellore	KEMHRC, Pune

The training was conducted through online interactive sessions wherein national and international speakers, policymakers, and subject matter experts shared their knowledge and experience. The training program was delivered in a series of five (05) sessions conducted every Friday for 3-4 hours covering Indian GCP (notified by CDSCO), ICH-GCP, ICMR ethical guidelines, and New Drug and Clinical Trial Rules 2019. The training ended with a mandatory exit assessment conducted online. The certificate is linked to complete attendance in all sessions and completing exit assessments successfully. A total of sixty-eight (68) participants from the following sites have attended this online GCP training program.

Program: This program comprised a coherent set of lectures, an exciting range of breakout discussions, and problem-solving exercises to understand, implement, and practice GCP in the area of clinical research/trials. This program offered a platform for all the participants to seek answers to various unresolved queries of theirs from different areas of clinical research/trial. It provided them with a rare opportunity to interact on a one-to-one basis with the renowned national and international faculty members. There was an exit-assessment conducted at the end of the program that helped to understand the level of knowledge percolated among the participants.

Training modules: The program was comprised of five weekly modules:

Module 1: Overview of Guidelines and Regulations for Clinical Trials (Aug 7, 2020)

Module 2: Ethical Considerations in Study Conduct (Aug 14, 2020)

Module 3: Role and responsibilities of stakeholders, Quality Control (QC) & Quality Assurance

Module 4: Clinical trial documentation and safety reporting (Aug 28, 2020)

Module 5: Investigational product, management of non-compliance (Sept 04, 2020)

Exit assessment: September 04, 2020

Faculty: National and international faculties, eminent experts, and experienced trainers imparted training to the participating sites through interactive online mode. The faculty panel comprises of the following dignitaries:



Dr. Monika Bahl
Director Clinical
Portfolio
Management, CDSA

**Dr. Sucheta
Banerjee
Kurundkar**
Director Training,
CDSA

Prof. Y K Gupta
Principal Adviser
(Project), CDSA,
President-AIIMS
Bhopal and AIIMS
Jammu
Former Dean &
Head-Dept of
Pharmacology,
AIIMS New Delhi

Dr. Nandini Kumar
Former Deputy
Director-General
Sr. Grade (ICMR),
Vice-President
FERCI

Dr. Sudha Basnet
Professor of
Pediatrics, IOM,
Tribhuvan
University, Nepal

Dr. Nitya Wadhwa
Assistant Professor,
THSTI & Faculty
in-charge, CDSA,
DBT

**Dr. Deepanjana
Sengupta**
Consultant Project
Manager, POD-TB
vaccine study,
CDSA, THSTI, DBT

**Dr. Temsunaro
Rangsen-Chandola**
Sr Scientist &
Deputy Director,
CHRD, Society for
Applied Studies,
New Delhi

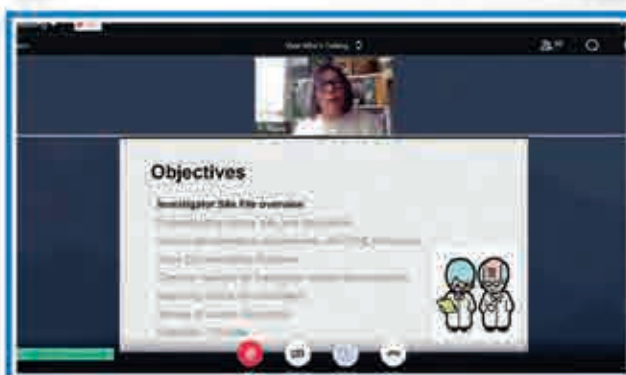
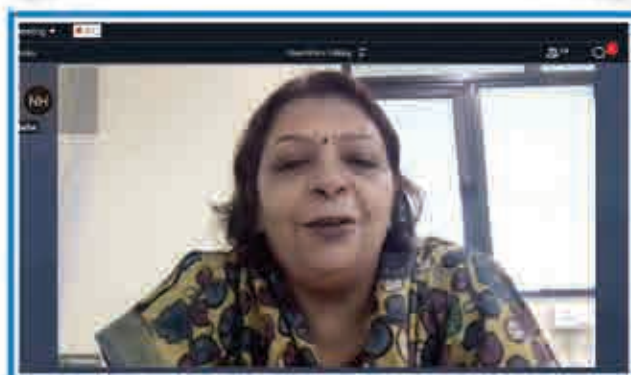
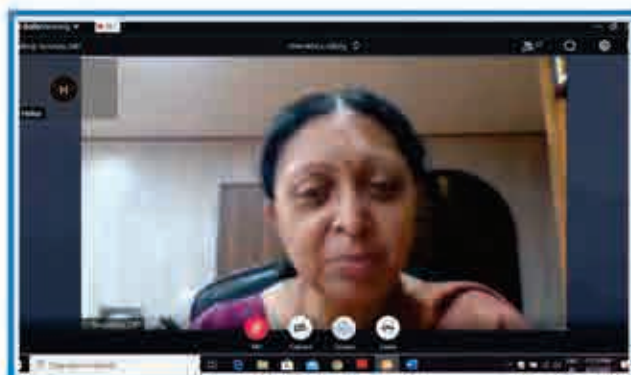
Mr. Alok Arya
Clinical Research
Manager, CHRD,
Society for Applied
Studies, New Delhi

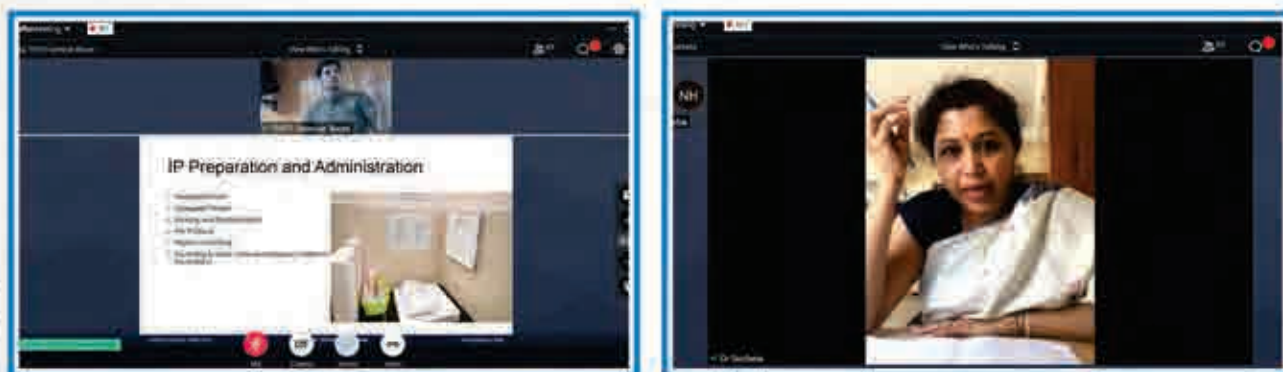
**Ms. Vandana
Chowla**
Training
Manager, CDSA

**Mr. Sumit
Kumar**
Project Manager,
CDSA

National Programmes

NATIONAL BIO-PHARMA MISSION





Glimpses from GCP Training: Series 1

Good Clinical Practice (GCP) Training Program

Series II-Aug 27th – Sep 25th 2020

The second training series was organized for the other six Demographic Surveillance System / Demographic and Health Surveillance DSS/DHS sites under NBM grants. These are new DSS/DHS/DDESS* sites are under NBM's initiative for Strengthening Clinical Trial Capacities for conduct of Community based Vaccine trials. These new DSS/DHS/DDESS* sites aim to demonstrate complete geographical representation and to study epidemiology of Dengue and Chikungunya in different age-groups at these sites and to build capacity for conduct of GCP compliant clinical trials. A total of ninety (90) participants from the following sites are attended this online GCP training program. The modules and program largely remained the same as in Series I. An exit assessment was conducted on Sep 25th 2020.



National Programmes



Dr. Monika Bahl
Director Clinical
Portfolio Management,
CDSA

Faculty

**Dr. Sucheta
Banerjee
Kurundkar**
Director Training,
CDSA

Prof. Y K Gupta
Principal Adviser
(Project), CDSA,
President-AIIMS
Bhopal and AIIMS
Jammu
Former Dean &
Head-Dept of
Pharmacology,
AIIMS New Delhi

Dr. Nandini Kumar
Former Deputy
Director-General
Sr. Grade (ICMR),
Vice-President
FERCI

Dr. Sudha Basnet
Professor of
Pediatrics, IOM,
Tribhuvan
University, Nepal

Dr. Nitya Wadhwa
Assistant Professor,
THSTI & Faculty
in-charge, CDSA,
DBT

Mr. A. B. Ramteke
Former Joint Drugs
Controller (India),
CDSCO HQ;
Consultant,
Regulatory Affairs,
CDSA, THSTI, DBT

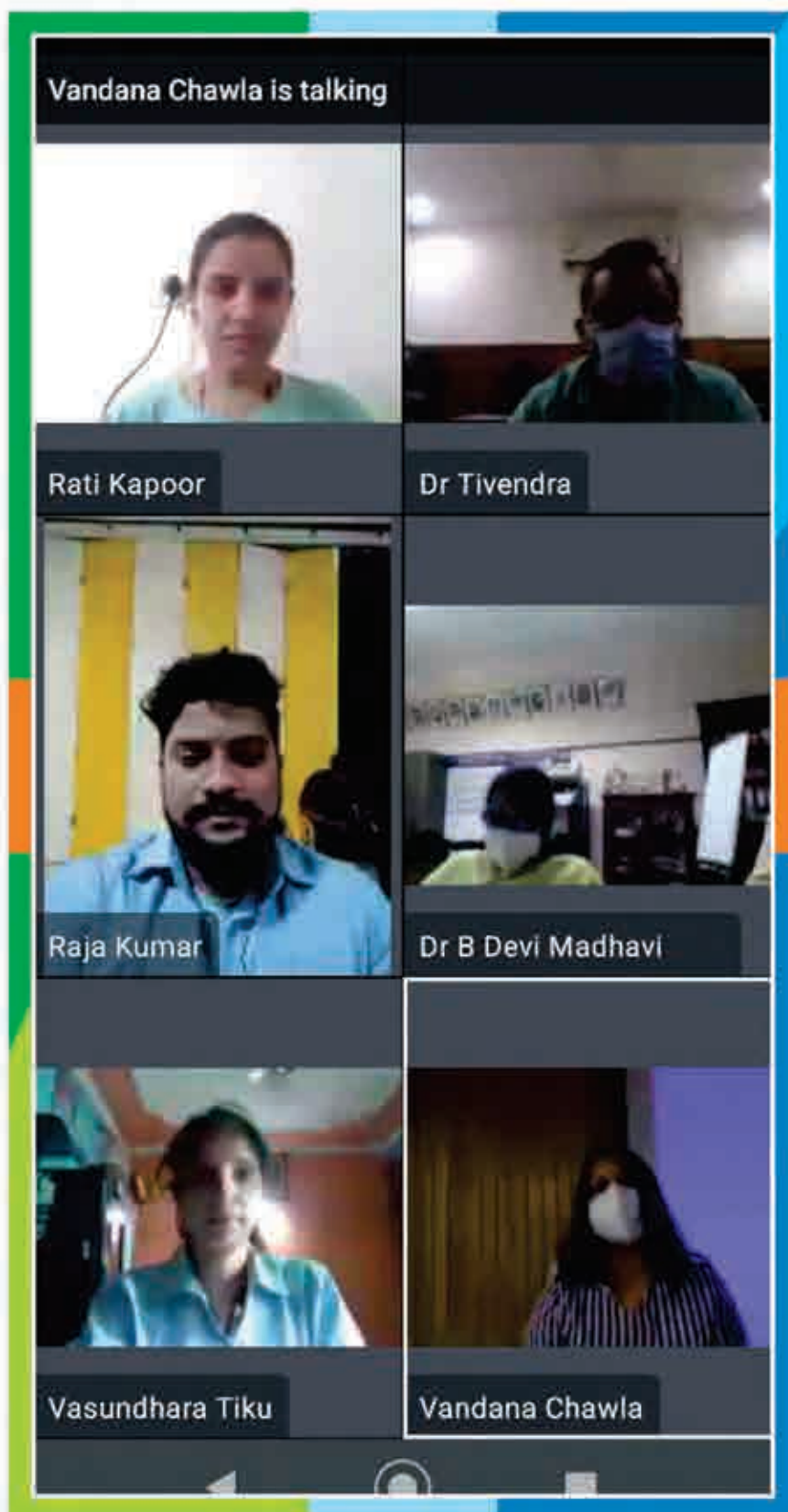
Dr. Shilpa Malik
Quality Manager,
CDSA

**Ms. Vandana
Chawla**
Training Manager,
CDSA

**Mr. Sumit
Kumar**
Project Manager,
CDSA

NATIONAL BIO-PHARMA MISSION







Congratulations!

Innovation-Technology transfer office (i-TTO) supported under the National Biopharma Mission transferred a BIRAC-BIG supported technology entitled "Unique C1-C2 spacers with occipital-cervical fixation" to Med Solutions, New Delhi





Biotechnology Industry Research Assistance Council

(A Govt. of India Enterprise)



Call for Proposals under

SITARE

Students Innovations for Translation & Advancement of Research Explorations



SITARE scheme provides orientation, training and funding for young students to embrace translational research for development of innovative products and technologies addressing unmet needs

AWARD CATEGORIES

1. BIRAC SITARE-Gandhian Young Technological Innovation Award Grant (SITARE-GYT)

Who can apply:

- Student pursuing Masters/PhD in any discipline
- Project should have commercial potential leading to formation of a biotech startup

Proposal submission

Starts: 2nd October, 2020

Closes: 30th November, 2020 (5:30 pm)

Upto INR
15 lakhs
Funding
support

2. BIRAC SITARE-Appreciation Award Grant

Who can apply:

- Students pursuing Under Graduation in any discipline
- Selection through Biotech Innovation Ignition School (BIIS)

INR
1 lakh
Award
Grant

Application submission: Open throughout the year

Please visit website for details on upcoming BIIS

Students from Tier II/III cities are encouraged to apply

Apply online only through BIRAC website (www.birac.nic.in)

BIRAC's SITARE Partner:

Society for Research and Initiatives for Sustainable Technologies and Institutions (SRISTI)
www.sristi.org, email: pramodhi@srsti.org, contact: 9925320793



Guidelines:

FAQs link: https://www.birac.nic.in/webcontent/1584008982_SITARE_Scheme_Guidelines.pdf
For further queries: spe02.birac@nic.in



For further information please contact:

Biotechnology Industry Research Assistance Council (BIRAC)

1st Floor, MTNL Building, 9, CGO Complex, Lodhi Road, New Delhi-110003, INDIA

Tel: + 91-11-24389600 | Fax: + 91-11-24389611

E-mail: birac.dbt@nic.in | Web: www.birac.nic.in

Follow us on Twitter : @BIRAC_2012