

DST - SCIENCE, TECHNOLOGY AND INNOVATION POLICY FELLOWSHIPS PROGRAMME

(DST-STI-PFP)

GUIDELINES AND PROFORMA FOR SUBMISSION OF APPLICATION

**Last date of submission of application for DST-STI
Fellowship: January 15, 2020**



सत्यमेव जयते

Government of India
Ministry of Science & Technology
Department of Science & Technology
(Policy Research Cell)
Technology Bhawan, New Mehrauli Road
New Delhi-110 016

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Ministry of Science and Technology Department of Science and Technology

DST Science, Technology and Innovation Policy Fellowships

Background/ Motivation

Science, Technology, and Innovation (STI) are recognized as playing a significant role in advancing human, social, and economic development and meeting the aspirations of people and nations across the world. As a result, understanding STI processes and exploring ways to strengthen them has evolved as a major vertical of intellectual activity, evinced by the recent explosion of literature on these topics. At the same time, significant efforts have been made to link this understanding to better policy making by a range of governmental agencies (both in developed and emerging economies) and inter-governmental organizations.

The Department of Science and Technology (DST) is mandated to develop and deliver public policy support for the promotion of research and development in the country. To build and strengthen an institutional mechanism for a robust evidence-driven STI policy system in India, on the recommendation of the Committee of Experts, the Policy Research Cell of DST (DST-PRC) established DST-Centers for Policy Research (DST-CPRs) in various academic institutions (IISc Bangalore, IIT Delhi, PU Chandigarh, EDII Gandhinagar and BBAU Lucknow). These centers are engaged in targeted research in number of key areas(Annex I) relevant to the country, train scholars in STI policy domain, and contribute towards better STI policy making. In addition to that, to create a critical mass of policy professional (research scholars as well as practitioners), in 2016, DST-PRC launched DST-STI-PFP, a flagship policy fellowship program.

DST-STI-PFP provides scientists, engineers and policy enthusiasts an opportunity to gain exposure from the close quarters of policymaking and contribute their knowledge and analytical skills in the STI policy realm. These initiatives started delivering results in various forms of impactful engagements. During the last few years, the initiatives have seen expansion in terms of a) number of fellows involved, b) research footprint/ topics covered, c) national and international engagement, and d) events and capacity building initiatives. This resulted in providing knowledge support not just to DST but also to various S&T policymaking bodies.

DST-STI Fellowship Call 2019:-

Recognizing the growing demand and the need to bridge the gap between 'research' and 'practice' in STI policy, this year's DST-STI-PFP is proposed in three different category with a larger scope and thematic coverage. Also, through this program, it is expected to create active linkages to relevant government agencies (scientific ministry and/or line ministries with an S&T component), facilitated by DST and/or the DST-CPRs. The Fellowship program would also provide an opportunity for policy-makers in various government departments /agencies to draw upon STI policy research expertise from this pool. Some of fellows may also be engaged in the process of formulation of a draft STI Policy (Technology Led Innovation Policy) jointly with O/o PSA, Govt. of India.

Thematic scope of the DST-STI-PFP 2019 may include following six components:-

1. Policy
2. STI related Data
3. Programmes/Schemes
4. Projects Management
5. Monitoring and Evaluation
6. Impact Assessment of Policy/Programmes

The broad details (not limited to) are as under:-

- ❖ R&D ecosystem mapping, monitoring and evaluation, sectoral research performance and funding pattern analysis, policies and incentives to promote R&D, R&D related Data analysis
- ❖ STI mapping and measurement- institutions and clusters, R&D and innovation indicators, composite indicators, STI scoreboards and indices, data for policy
- ❖ Industrial R&D, industry-academia interaction, public-private partnership models, technology transfer, intellectual property rights (IPR), research parks
- ❖ Innovation studies – mapping, evaluation and impact assessment, drivers of innovation, innovation ecosystem approach, sectoral innovation, grassroot and frugal innovation
- ❖ Technology studies - forecasting, assessment, disruptive technologies, policy interventions for technology development
- ❖ Science, technology and society studies – ethics of innovation, technological change, ethics, regulations, sustainability issues, responsible research and innovation (RRI) gender balance in STEM and open access.
- ❖ Science entrepreneurship, high-tech entrepreneurship, technology commercialization, incentives and regional policies for startup ecosystem, financial support system for startup and entrepreneurship.
- ❖ Technology trade (imports and exports), S&T diaspora studies, international IP regime, FDI in R&D, science and innovation diplomacy, internationalization strategies for Indian technical higher education institutions (THE), public research organizations (PRO) and technology firms.

The DST-STI fellowship call for 2019 is proposed with following 3 tracks:-

1. STI-Senior Policy Fellow
2. STI-Postdoctoral Policy Fellow
3. STI-Young Policy Professional

1. STI-Senior Policy Fellow would be someone who has already got at least 3 years of direct STI policy experience at the postdoctoral level. This track will be a 2-year fellowship (with a possible extension of one more year, depending upon performance). The selected candidates will be awarded a fellowship of Rs. 98,000/-(consolidated) per month and based on the Committee's decision, an amount up to Rs. 200,000/-will be granted annually to cover research-related costs, travel and contingency.

Eligibility:

Candidates with a) doctoral degree in science/medicine/engineering/social science (with a background of STI policy) with a good academic record and b) minimum of 3 years of direct STI policy experience at the postdoctoral level and are eligible to apply. Applicants must be capable of doing independent research work and have published at least 3 research papers in peer reviewed journals. At the time of application, applicant's age should be below 42 years.

2. STI-Postdoctoral Policy Fellow. This will be a postdoctoral level fellowship; for candidates who have completed a doctoral degree. This track will be a 2-year fellowship (with a possible extension of one more year, depending upon performance). The selected candidates will be awarded a fellowship of Rs. 80,000/-(consolidated) per month and based on the Committee's decision, an amount up to Rs. 1,50,000/- will be granted annually to cover research-related costs, travel and contingency.

Eligibility:

Candidates with a doctoral degree in science/medicine/engineering/social science (with a background of STI policy) with a good academic record are eligible to apply. Applicants must be capable of doing independent research work and have published at least 3 research papers in peer reviewed journals. At the time of application, applicant's age should be below 40 years.

3. STI-Young Policy Professional. This fellowship would be given to candidates who have completed a master's level education. This track will be a 2-year fellowship (with a possible extension of one more year, depending upon performance). The selected candidates will be awarded a fellowship of Rs. 44,000/-(consolidated) per month and based on the Committee's decision, an amount up to Rs. 100,000/-will be granted annually to cover research-related costs and contingency.

Eligibility:

Candidates with a master's degree in science/medicine/engineering/social science (with a background of STI policy) with a good academic record are eligible to apply.

Candidates with master's in public policy/public administration/data sciences/statistics (with S&T specialization) are encouraged to apply. At the time of application, applicant's age should be below 30 years.

In all above, age relaxation of 3 (three) years will be given to candidates belonging to SC/ST/OBC/Physically Challenged & Women candidates.

Application Procedure:-

Applicants are required to submit following documents written in English:

- **(a) For STI-Senior Policy Fellow and Postdoctoral Fellow**, a Project/Research Proposal is required on an identified STI policy issue, preferably, the issue pertaining to thematic areas of the candidates' desired DST-CPR and/or a policy research group in an academic/research institution and/or the prospective host S&T agency (proposal must be formulated in consultation with DST-CPR or an identified active policy research group or the prospective host S&T agency). The proposal must include: a) a STI related research title, b) a research objective, c) STI related Policy research background/ questions, d) research methodologies, and e) a research plan, including the evidence based outcome.

(b) For STI-Young Policy Professionals, a two-page write-up on an identified STI policy issue (in consultation with DST-CPR or an identified active policy research group or the prospective host S&T agency).

- Curriculum Vitae
- Two recommendation letters.
- A consent Letter from the prospective advisor/host organization.

Selection Procedure:

The duly constituted selection Committee will shortlist candidates based on their track record and the relevance, quality, and significance of their proposals/write-ups etc. Once the Committee finalizes the shortlisting, they will be notified via e-mail. The duly constituted Selection/Review Committee comprising others scientific departments/ ministries representatives as well eminent policy makers, academicians will select the fellows based upon a personal interview, and monitor the progress and make further review of the fellowship programme.

Maximum Number of fellowships for DST-STI Fellowship Call 2019:-

STI-Senior Policy Fellow	- 3
STI-Postdoctoral Policy Fellow/ Research Associates	- 5
STI-Young Policy Professional	- 7

The numbers are tentative and can be increased/decreased at the discretion of DST. The remuneration and terms and conditions will be guided as per applicable rules of DST/host institute.

Hosting and Placement:

The main objective of DST-STI Fellowship is to build up the cadre of academic STI policy researchers/professionals in the country, such that these Fellows may actively contribute in policy making in academia, research organizations, or even in government. The selected fellows will be hosted at one of the DST-CPRs or identified active policy research group (based on mutual consent and selection committee's approval). Additionally, fellows could also be placed at different S&T agencies and organizations based on requirement and demand. Such engagements would be facilitated through DST-CPR at IISc Bangalore with prior approval from DST. Based on the requirement and decision of the Selection Committee, some Fellows may be placed at Department of Science & Technology and the O/o. Principal Scientific Advisor to the Govt of India. UNESCO, New Delhi cluster office has also expressed interest to host/engage with a fellow at their office under this programme. Identified specific interest areas (as shown in table below)

Agency/Organization	Thematic area(s)	Contact details
O/o PSA, New Delhi	<ul style="list-style-type: none">• Policy Brief on various policies impacting STI• STI mapping and measurement – institutions and clusters, R&D and innovation indicators, composite indicators, STI scoreboards and indices, data for policy• Framework for a new STI policy• Examining Policy context (Global and Domestic)• Data Analysis	Placement in these agencies will be facilitated via a DST-CPR at IISc Bangalore.
DST, New Delhi		Please write to coordinator.cpr@iisc.ac.in for more details. (Ph.: +91-80-2293 3415)
UNESCO New Delhi	Gender balance in STEM; International S&T policy frameworks.	

It is hoped that over a time, as policy makers realize the importance of such Fellows, they will be forthcoming to support such Fellows and even host them. In addition to undertaking research and policy engagement, there will be a set of activities – such as a seminar series or topical workshops – developed by the DST-CPRs (in consultation with DST) – that will further add value to the experience gained by Fellows and also build a community for them.

Application/Proposal

Applicants are required to submit their application in prescribed format only through **ONLINE MODE** (www.onlinedst.gov.in). The details of the Call may also be available at DST's website www.dst.gov.in.

No Need to send the hard copy of the application to DST. Any other information related to the DST-STI-PFP may be enquired, if needed from: Dr. Akhilesh Mishra, Scientist D, Department of Science and Technology, Technology Bhawan, New Mehrauli Road, New Delhi-110 016 email: dststipfp@gmail.com. Phone: 011-26590254.

(Applicants may note that R&D related proposals will not be considered. Proposal must be on STI policy related issues only)

Last Date of Submission: 15th January, 2020.

DST- Centres for Science Policy Research

Sr No	Name & Address of the Policy Centre	Name & Address of the Coordinator	Specific focus/ theme Area of Policy Research Work
1.	DST- Centre for Policy Research at IISc-Bangalore	Prof. T. A. Abinandanan Materials Engineering Indian Institute of Science, Bangalore-560 012 abinandan@gmail.com abinand@iisc.ac.in	1. Scientometric Analysis of Indian Institutions 2. sectoral research performance and funding pattern analysis 3. Methods of Assessing Multi-Dimensional Impact
2.	DST- Centre for Policy Research" at IIT-Delhi	Prof. Ambuj Sagar Coordinator, DST- Centre for Policy Research at IIT-Delhi Indian Institute of Technology HauzKhas, New Delhi-110 016 asagar@hss.iitd.ac.in	1. India's Innovation Mapping 2. Technology Transfer 3. Sectorial research study 4. Benchmarking study reports
3.	DST- Centre for Policy Research in S&T Entrepreneurship "Entrepreneurship Development Institute of India (EDII)" Gandhinagar	Prof. S. B. Sareen Entrepreneurship Development Institute of India (EDII), P.O. Bhat 382 428, Gandhinagar, Gujarat sareen@ediindia.org	1. Understating ecosystem to promote and strengthen S&T Entrepreneurship 2. Scan International Strategy to promote S&T based Entrepreneurship and integrating inclusive growth element 3. Prospects and Constraints in Technology Commercialization by R&D Institutions in India: The Strategy Imperatives 4. Maintaining data base of high technology entrepreneurs and preparing and publishing case studies of such entrepreneurs
4.	DST- Centre for Policy Research" at BabasahebBhimraoA mbedkar (Central) University, Lucknow	Dr. Venkatesh Dutta BabasahebBhimraoA mbedkar University (A CentralUniversity) Rae Bareily Road, VidyaVihar, Lucknow – 226 025 (UP) Tel. (+091 522) 2440826/27, 2441515,2551615, dvenks@gmail.com duttada@yahoo.co.in	1. Study of policies and mechanisms for delivery of STI outputs to diverse stakeholders including innovation for social inclusion with special reference to: Sustainable agriculture; Health; Energy; Water resource management and Climate governance. 2. Map STI effectiveness in bringing social inclusion
5.	DST- Centre for Policy Research" at Panjab University, Chandigarh	Prof. R Tewari Coordinator, DST- Centre for Policy Research Panjab University, Sector 14, Chandigarh, UT- 160014 rupinder@pu.ac.in , dstprc2014@pu.ac.in	1. Study of policies and mechanisms that could promote to enhance and expand private sector participation in STI activities including industry - academia - R&D collaboration 2. Motivation and promotion of IP generation as a tool for enhanced Academia industry collaborations.