

File No.Prn.SA/Mega Science/2020
Cabinet Secretariat
OFFICE OF THE PRINCIPAL SCIENTIFIC ADVISER
TO THE GOVERNMENT OF INDIA

Vigyan Bhawan Annexe
Maulana Azad Road
New Delhi-110011
Date: 24th December, 2020

OFFICE MEMORANDUM

Subject: Constitution of Drafting Groups (DGs) and Working Groups (WGs) for Mega Science Vision document of India.

The Office of the Principal Scientific Adviser (PSA) to the Government of India (GoI) has undertaken the responsibility of carrying out the next National Vision Exercise for Mega Science Programme till the year 2035. To start with, this Mega Science Vision-2035 (MSV-2035) Exercise will be carried out in six areas of research, viz. Nuclear Physics, High Energy Physics, Astronomy & Astrophysics, Accelerator-based Science & Technology, Climate Research and Ecology & Environment, after widespread bottom-up stakeholder consultations.

2. The following national institutions have agreed to assist the O/o PSA in carrying out this MSV-2035 Exercise as Nodal Institutions and have also nominated Nodal Scientists for this purpose:

Area	Nodal Institution
Nuclear Physics	Tata Institute of Fundamental Research (TIFR), Mumbai
High Energy Physics	-do-
Astronomy & Astrophysics	(i) Indian Institute of Astrophysics (IIA), Bengaluru (ii) Inter-University Centre for Astronomy and Astrophysics (IUCAA), Pune
Accelerator-based Science & Technology	Raja Ramanna Centre for Advanced Technology (RRCAT), Indore
Climate Research	Indian Institute of Science (IISc), Bengaluru
Ecology & Environmental Science	-do-

3. The Nodal Institutions, assisted by Drafting Groups (DGs) and Working Groups (WGs), will prepare Draft Mega Science Vision-2035 Reports in the six areas after bottom-up and widespread stakeholder consultations at the national level, and also through international scientific consultations, if needed. The composition and membership of DGs and WGs in the six areas are given in the **Annexure 1**. The draft report proposed will be presented to an Apex committee chaired by the PSA to the GoI for finalization.

4. The Terms of Reference of the DGs and WGs will be as follows —

Drafting Group (DG)	Working Group (WG)
(i) To first prepare a First Draft of the Mega Science Vision-2035 (MSV-2035) Report in the field containing, inter alia, the following aspects — (a) the state-of-the-art in the field globally and a SWOT analysis for India as a nation in the time window of 2020-35; (b) the need for continuing and/or undertaking	(i) To have the overall responsibility of preparing a Draft of the MSV-2035 Report in the field in a cohesive, inclusive, comprehensive and speedy manner, and submitting it for the consideration of the Apex Committee.

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specific Mega Science Projects and Programmes in the field, nationally as well as internationally, and prioritizing them within realistic expectations of resource availability; (c) relevance of such Mega Science Projects and Programmes for greater national scientific, technological and developmental goals; (d) keeping 2020 as the Baseline Year, a clear enunciation of the role such Projects and Programmes will play in raising India's global presence and competitiveness in the field including the number and quality of intellectual scientific and engineering publications and/or other contributions, number and quality of scientific and engineering manpower, technological capacity building in Indian industry including technology transfers from global projects, participation of Indian industry in such projects as global competitors, increased scientific and technological footprint in important national developmental projects and missions, etc.; and (d) appropriate evaluation, funding and management structures for such projects/programmes.

(ii) To carry out widespread national stakeholder consultation on the First Draft of the Report through all possible electronic means and invite written views of stakeholders on the First Draft of the Report. To also carry out international scientific and technological consultation on the First Draft of the Report through electronic means, if necessary.

(iii) To modify the First Draft of the Report in view of the (i) written comments received from the stakeholders; and (ii) comments received as a result of international consultations, if carried out, and prepare the Second Draft of the MSV-2035 Report in the field.

(iv) To discuss and finalize the Second Draft of the MSV-2035 Report in the field and submit it for the consideration of the Working Group (WG).

(ii) Towards this goal, the WG will closely guide the DG in preparing the First Draft of the MSV-2035 Report in the field, carrying out national stakeholder consultation, and also international consultation, if necessary, and preparing the Second Draft of the Report after incorporating various suggestions that are received.

(iii) To discuss the Second Draft of the Report as prepared by the DG and finalize the (Third) Draft MSV-2035 Report in the field and submit it to the O/o the PSA for consideration by the Apex Committee.

(iv) To conduct this exercise in close consultation with the O/o PSA to GOI.

(v) To carry out any other relevant activity identified by the Apex Committee and/or the O/o PSA to GOI.

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(v) To conduct this exercise under the guidance of the WG.	
(vi) To carry out any other relevant activity identified by the WG and/or the O/o PSA to Gol.	

5. If required, the O/o PSA to Gol will provide the necessary financial assistance to the Nodal Institutions, for completing the above exercise based on specific requests made by the nodal institutions. Arrangements for electronic platforms for uploading of documents, electronic meetings and consultations will also be made by the O/o PSA to Gol. **Annexure 1** gives details of **Drafting Groups (DGs) and Working Groups (WGs) in the six areas**. The Order constituting the Apex Committee will soon follow.

This issues with the approval of Competent Authority.

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(Dr. Arun Bhardwaj)
Scientist 'E'

Copy to:

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2. Sr. PPS to the Scientific Secretary, Office of the Principal Scientific Adviser to the Govt. of India
3. Senior Adviser, Office of the Principal Scientific Adviser to the Govt. of India
4. Dr. Praveer Asthana, National Coordinator (Mega Science and Deep Tech)
5. Director, Tata Inst. of Fundamental Research Homi Bhabha Road, Colaba, Mumbai 400005
6. Director, Inter-University Centre for Astronomy & Astrophysics (IUCAA), Pune
7. Director, Indian Institute of Astrophysics, Bengaluru
8. Director, Raja Ramanna Centre for Advanced Technology (RRCAT), Indore
9. Dr. S.K Satheesh, Scientist, IISc, Bangalore
10. Dr. R. Sukumar, Scientist, IISc, Bangalore
11. All members of Working Group and Drafting Group

Drafting Groups (DGs) and Working Groups (WGs) in the Six Areas

NUCLEAR PHYSICS

Nodal Institution: TIFR, Mumbai

Nodal Scientist: Dr. Amol Dighe, TIFR, Mumbai

Working Group (WG-NP)

<i>Director, TIFR, Mumbai – Dr. S. Ramakrishnan</i>	<i>Chairperson</i>
<i>Members from the Drafting Group</i>	
Dr. Rudrajyoti Palit, TIFR, Mumbai	Member
Dr. Aradhana Srivastava, BARC, Mumbai	-do-
Dr. Alphonsa Joseph Palakkal, IPR, Gandhinagar	-do-
Dr. Bedanga Mohanty, NISER, Bhubaneswar	-do-
<i>Other Expert Members</i>	
Dr. Vandana Nanal, TIFR, Mumbai	-do-
Dr. Vaishali Naik, VECC, Kolkata	-do-
Dr. Vishwajit Jha, BARC, Mumbai	-do-
India-ALICE Spokesperson – Dr. Subhasis Chattopadhyay, VECC, Kolkata	-do-
Dr. PK Atrey, IPR, Gandhinagar	-do-
Dr. Rajdeep Chatterjee, IIT-Roorkee	-do-
Dr. Sadhana Dash, IIT-Bombay	-do-
Dr. Akhil Jhingan, IUAC, New Delhi	-do-
Dr. Javed A. Sheikh, Kashmir University, Srinagar	-do-
Dr. Lokesh Kumar, Panjab University, Chandigarh	-do-
<i>Agency Representatives</i>	
Nominee of Chairman-AEC/Secretary-DAE	-do-
Nominee of Secretary-DST	-do-
<i>Representatives of the O/o PSA</i>	
Dr. Praveer Asthana, National Coordinator (Mega Science and Deep Tech)	-do-
Dr. Arun Bhardwaj, Scientist-E	-do-
<i>Nodal Scientist – Dr. Amol Dighe, TIFR, Mumbai</i>	<i>Member-Secretary</i>
	<i>y</i>

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Dr. Bedanga Mohanty, NISER, Bhubaneswar

HIGH ENERGY PHYSICS

Nodal Institution: TIFR, Mumbai

Nodal Scientist: Dr. Amol Dighe, TIFR, Mumbai

Working Group (WG-HEP)

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India-CMS Spokesperson – Dr. Brajesh Chaudhary, Delhi University	-do-
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Dr. Bhawna Gomber, University of Hyderabad	-do-
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ASTRONOMY & ASTROPHYSICS (A&A)

Nodal Institution: IUCAA, Pune and IIA, Bengaluru

Nodal Scientist: Dr. R. Srianand, IUCAA, Pune

Working Group (WG-A&A)

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Nodal Institution: RRCAT, Indore

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