

**Specific Cooperation Agreement**

**between**

**The Indian Space Research Organisation of the Republic of India**

**and**

**the Mexican Space Agency of the United Mexican States**

**on**

**Forest Fire Management using EO Data and Capacity Building**

The Indian Space Research Organization (ISRO) of the Republic of India, through the Indian Institute of Remote Sensing (IIRS), and the Mexican Space Agency (AEM) of the United Mexican States, hereinafter collectively referred to as 'the Parties' and individually as 'the Party';

**BASED ON** the Memorandum of Understanding between the Indian Space Research Organisation of the Republic of India and the Mexican Space Agency of the United Mexican States concerning space cooperation for peaceful purposes, signed in the city of New Delhi, on October 22<sup>nd</sup>, 2014 (hereinafter referred to as the 'MoU');

**ENCOURAGED** by their interest in further strengthening their cooperation in some key areas such as forest fire mapping through space inputs;

**RECOGNIZING** the mutual benefits that would result from the coordination of their efforts in the exploration and use of outer space by means of a suitable legal framework;

**TAKING INTO ACCOUNT** the agreements reached at the meeting celebrated during the work of 'Monitoring and Processing Satellite Imagery of Forest Fire', which took place in the city of Dehradun, India, from the 26<sup>th</sup> to the 29<sup>th</sup> of August 2019;

Have agreed as follows:

## **ARTICLE 1**

### **PURPOSE**

In accordance with the provisions of Article 4 of the MoU, the purpose of this Agreement is to set forth the terms and conditions under which the Parties shall undertake cooperative activities on forest fire management using satellite earth observation data and capacity building.

## **ARTICLE 2**

### **FORMS OF COOPERATION**

1. The cooperation based on this Agreement could be developed through the following forms, in accordance with the provisions of Article 3 of the MoU:
  - a) facilitating admission of one Mexican postgraduate student in a 9-month Post Graduate Diploma Course conducted in India, in accordance with the specifications detailed in Article 3 of this Agreement.
  - b) joint organisation of a forest fire-monitoring workshop in Mexico in 2021.
  - c) development of customized Mobile Application for Forest fire application for use in Mexico.
2. The cooperative activities under this Agreement shall be conducted on a best-effort basis and in compliance with each Party's laws and applicable rules and regulations, including those pertaining export control and security.
3. In the event of any inconsistency between this Agreement and the MoU with regards to the specific cooperation of the Parties, the provisions of the MoU shall prevail.

## **ARTICLE 3**

### **STUDENT EDUCATION**

In order to carry out the cooperation referred to in Article 2.1, Subsection a) of this Agreement, the AEM shall provide details of two (2) Mexican candidates to the ISRO for its consideration and shortlisting to select the one candidate who will attend a nine-month (9) PG Diploma Course in RS & GIS.

The AEM shall ensure that all the documents of the Mexican candidate selected by the ISRO, such as health insurance and flight return tickets, Mexico-India and India-Mexico, are in order and duly valid.

For its part, the IIRS shall facilitate the admission of one Mexican candidate in the Post Graduate Diploma Course organised by IIRS for the UN affiliated Centre for Space Science Technology Education for Asia and the Pacific (CSSTEAP). For this purpose, the IIRS shall provide the necessary financial resources for the sustenance of the Mexican student, such as: food, accommodation and other facilities while in India, in the same manner as available to the students of other CSSTEAP courses.

**ARTICLE 4**  
**JOINT WORKSHOPS**

In order to carry out the cooperation referred to in Article 2.1, Subsection b) of this Agreement,

IIRS undertakes to:

- a) nominate three (3) resource persons to conduct the Forest fire-monitoring workshop and hands-on in Mexico at a mutually agreeable date to the Parties.
- b) Bear the cost of the ISRO's resource persons from Dehradun, India to Mexico and back.
- c) Finalise the workshop's programme and provide reading materials.

For its part, the AEM undertakes to:

- a) Provide ground domestic transportation and required logistics support to the ISRO resource persons in Mexico who will conduct the workshop.
- b) Assist the ISRO in making the arrangements for convenient accommodation to the ISRO resource persons in Mexico.
- c) Provide the facilities, catering, coffee break, translation and equipment (e.g. internet, computers, etc.) required to conduct the workshop.
- d) Ensure the attendance of the number of participants agreed by the Parties.

**ARTICLE 5**  
**PRACTICAL APPLICATION OF SPACE TECHNOLOGY**

In order to carry out the cooperation referred to in Article 2.1, Subsection c) of this Agreement, ISRO undertakes to customize its Mobile Application for forest fire monitoring, including the integration of forest type, density, and geographical boundaries of Mexico with due prior agreement and consultation among the IIRS and the AEM. Furthermore, it shall support AEM in establishing a central dashboard in Mexico for forest fire monitoring.

For its part, the AEM shall act as focal point between the ISRO and the end users of the Mobile Application,

1. shall select an organization which will host the facilities needed for the Mobile Application dashboard, and shall ensure the provision of the

equipment, services, and facilities required for establishing the central dashboard in Mexico.

## **ARTICLE 6**

### **COSTS AND EXPENSES**

Cooperative activities undertaken pursuant to this Agreement will be on a non-commercial basis; therefore, the Parties will bear the costs of undertaking their respective responsibilities without entailing any exchange of funds between the Parties.

## **ARTICLE 7**

### **POINTS OF CONTACT**

1. The ISRO points of contact:

Mr. Shantanu Bhatawdekar  
Programme Director  
Disaster Management Systems, EDPO  
ISRO Headquarters, Antariksh Bhavan - 560094  
Bangalore, Karanataka, India  
e-mail: [bpshantanu@isro.gov.in](mailto:bpshantanu@isro.gov.in)

Dr. Arijit Roy  
Head Disaster Management Studies Department,  
Indian Institute of Remote Sensing,  
4, Kalidas Road, Dehradun, India. Pin-248001  
e-mail: [arijitroy@iirs.gov.in](mailto:arijitroy@iirs.gov.in)

2. The AEM points of contact:

Mr. Julio César Castillo Urdapilleta  
Director of Space Security  
Mexican Space Agency  
Avenida Insurgentes Sur 1685 Guadalupe Inn, Ciudad de México. C.P.  
01020  
e-mail: [castillo.julio@aem.gob.mx](mailto:castillo.julio@aem.gob.mx)

Prof. Rosa Ma. Ramírez de Arellano y Haro  
Deputy General Director of International Affairs and Space Security  
Avenida Insurgentes Sur 1685, Guadalupe Inn, Ciudad de México.  
C.P. 01020  
e-mail: [ramirezdearellano.rosa@aem.gob.mx](mailto:ramirezdearellano.rosa@aem.gob.mx)

Any change in the Parties respective contact information shall be promptly communicated in writing to the other Party.

## ARTICLE 8

### INTELLECTUAL PROPERTY RIGHTS

1. For the purpose of this Agreement, 'Intellectual Property' shall, as provided in Article 1 of the Agreement on Trade-related Aspects of Intellectual Property Rights (TRIPS), refer to all categories of intellectual property that are the subject of Sections 1 through 7 of Part II of the TRIPS Agreement.
2. Each Party will ensure appropriate protection of Intellectual Property Rights generated from the cooperation pursuant to this Agreement, in strict compliance to the applicable national law, as well as the multilateral agreements on the subject to which the United Mexican States and the Republic of India are party to.
3. The use of the name, logo and/or official emblem of any of the Parties on any publication, document and/or paper is prohibited without the prior written approval of the respective Party.
4. In case of research results obtained through joint activities, the grant of intellectual property rights will be sought by both the Parties jointly and, once granted, these rights will be jointly owned by the Parties. However, the appointment of such rights may be decided in another manner by the Parties through the corresponding legal instrument.
5. The Parties shall not assign any rights and obligations arising out of the Intellectual Property Rights generated from inventions/activities carried out under this Agreement to any third Party, without prior written consent of the other Party.
6. Furthermore, for the purpose of this Agreement:
  - a) 'results' mean any and all knowledge and information of the Party gained during the cooperation under this Agreement limited to the respective performing institute(s), facility or facilities of the Party,

and including any industrial property rights obtained, as well as any copyright or other rights;

b) 'Background knowledge' means all existing or otherwise developed knowledge and information of the Parties including any industrial property rights, copyright or other rights insofar as those rights are necessary for the cooperation in terms of this Agreement for development and research or for the exploitation of the results.

7. As far as it is necessary for carrying out the cooperation under this Agreement, the Parties will inform each other in writing as to any arising results and background knowledge in terms of Article 8.1 of this Agreement.
8. For non-commercial purposes of scientific cooperation under the present Agreement, the Party who owns the patentable or non-patentable results obtained during the collaboration under this Agreement shall grant to the other Party a non-exclusive, non-transferrable, and royalty-free usage right for the duration of this Agreement. The rights of use for background knowledge will exist only insofar as they do not violate the rights of any third parties.
9. Each Party has the right to commercially exploit the patentable or non-patentable results that it owns.
10. For the time after the termination of this Agreement, the Parties will grant each other rights of use for the other Party's results and, as far as necessary, for its background knowledge under conditions usual in the market. The terms will be subject of the corresponding legal instrument. In assessing the usual market charges, the financial participation of the Parties in the creation of the results and the commercial value of the results and background knowledge will be taken into account.
11. Each Party will inform the other Party promptly of any patent application for an invention under this Agreement. If a Party intends to abandon a patent right or not to file an application for patent protection of a result that it achieved, said Party must inform the other Party of this intention to abandon in writing in a timely manner, although the Party seeking abandon will diligently keep the patent if the other Party agrees to pay all application and maintenance costs and takes over all obligations arising out of laws, rules, and regulation of the country where the patent application has been filed.
12. Should jointly arising results that were created by employees of both Parties occur, the Parties will endeavour to determine ownership using their best efforts to distinguish their respective contributions relative to

the jointly created intellectual property. If it is not feasible to distinguish the respective contributions, the Parties acknowledge and agree that rights in the results shall be co-owned by the Parties. The Parties shall negotiate in good faith the terms of the corresponding legal instrument pertaining intellectual property management and benefit sharing. If the Parties cannot agree as to the split of costs, such shall be determined in proportion to the share of the Parties in the invention. If, in the case of a joint patent right, an application for patent protection is desired in a country in which the other Party does not intend to secure patent protection, a Party may apply for patent rights in any country if that Party pays the cost of such patent. All proceeds from the patent in that country shall go to the Party who paid for the patent.

## **ARTICLE 9**

### **LIABILITY**

1. Regarding the cooperative activities under this Agreement, there shall not be any legal claim by any of the Parties against the other Party with regard to damages of any kind that may be generated by force majeure, with exception of gross negligence or wilful misconduct.
2. For the purpose of this Agreement, 'force majeure' in this sense is an externally caused, extraordinary, and unforeseeable event that cannot be prevented or avoided even through extreme care by the Parties. Force majeure in this sense includes, for example, storms, earthquakes, strikes, hostage situations, armed conflicts, unrest, and natural catastrophes.

## **ARTICLE 10**

### **DATA PROTECTION**

1. The Parties will not disclose to third parties any information identified or indicated as confidential in the framework of the cooperative activities undertaken under this Agreement without prior written permission of the other Party.
2. The Parties undertake to guarantee the confidentiality of the information in accordance with the provisions of their applicable national law and also, after the end of the collaboration, will maintain confidentiality and not allow access to the same by third parties.
3. This confidentiality obligation does not apply to information that can be proven:

- a) to have been known to the respective Party prior to the beginning of the collaboration;
  - b) to have been received by the other respective Party legally from third parties;
  - c) to be generally known already at the time the collaboration begins or become generally known afterward through no violation of the obligations contained in this Project;
  - d) to have been disclosed by court order by the respective Party due to a judgment, administrative act, or other legal act.
4. The above provisions of this Article 10 shall apply for five (5) years after the termination of this Agreement.

## **ARTICLE 11**

### **PUBLICATIONS**

1. Either Party has the right to publish information about the undertaken cooperative action with the prior written authorization of the other Party. The participation of the other Party in the Project must be cited and recognized in the process of publishing. The authorization may not be unreasonably denied. The use of the name, logo and/or official emblem of the Parties on any publication, document and/or paper will require prior permission of both the Parties, ensuring that the official emblem and logo are not misused.
2. The Party wishing to publish must promptly notify to the other Party in writing and provide the other Party with a copy of the proposed publication. If a Party protests against the publication, the said Party must submit an alternative publication proposal that safeguards its interests and makes the publication possible.
3. If a Party does not provide a written opinion on the intended publication within a time period of one (1) month from the date of notification of such publication by the other Party, authorization of the publication is deemed to have been given provided that the notice contains instructions about the consequences of such silence.
4. The permission requirement does not apply if, in fulfilling its legal or statutory obligation to publish research results, the publishing Party is only publishing basic scientific propositions or knowledge that does not represent any confidential information of the other respective Party.
5. Dissertations prepared during involvement in work under this Agreement will be published immediately upon conclusion of the PG Diploma Course

according to the respective studies program. The topic of any proposed dissertation under this Agreement must be authorized by both Parties to this Agreement prior to the beginning of the Diploma Course. The authorization may not be unreasonably denied. If a Party does not provide an opinion on a proposed dissertation within a time period of one (1) month from the date of notice of said proposed dissertation, authorization of the publication is deemed to have been given.

6. Patentable results may not be published prior to the publication of the patent application.

## **ARTICLE 12 DISPUTE SETTLEMENT**

Any difference or dispute between the Parties concerning the interpretation, implementation and/or application of any of the provisions of this Agreement shall be settled amicably through consultations and negotiations between the Parties.

## **ARTICLE 13 ENTRY INTO FORCE, DURATION, AND TERMINATION**

1. This Agreement shall enter into force on the date of its signature thereof by the Parties and shall remain in force for two (2) years. Thereafter, it may be renewed automatically for one additional year, unless either of the Parties terminate this Agreement, by giving a six-month (6) written notice in advance to the other Party of its intention to terminate this Agreement.
2. This Agreement may be modified at any given time, in writing, specifying the date in which such modifications shall come into effect.
3. The termination of this Agreement shall not affect the conclusion of the cooperative activities undertaken, prior to the termination of this Agreement, unless the Parties jointly decide otherwise.

IN WITNESS WHEREOF the undersigned, being duly authorized by their respective governments, have signed this Agreement.

Signed in two originals at Bangalore on this 28<sup>th</sup> 10-2020 day of October, 2020 in two originals each, in the English and Spanish languages, both texts are being equally authentic. In case of divergence in interpretation, the English text shall prevail.

For the Indian Space Research  
Organisation of the Republic of  
India

For the Mexican Space Agency of  
the United Mexican States



**Umamaheswaran R**  
Scientific Secretary, ISRO



**Salvador Landeros Ayala**  
General Director. AEM