

Letter of Intent (LoI)

for

Academic and Scientific Cooperation

between

**The National Institute for Space Research, Brazil
(INPE)**

and

**Department of Aerospace Engineering
at
Texas A&M University**

The National Institute for Space Research (INPE) of the Ministry of Science, Technology and Innovation (MCTI) of Brazil, and the Department of Aerospace Engineering at Texas A&M University, hereinafter referred to as the Parties, with a view of establishing a closer relationship for the purpose of exploring cooperative opportunities in the areas of common interest, particularly in the fields of aerospace, aerospace innovation, technology projects and education, as well as for exchange of personnel and information that would be of mutual benefit to the Parties;

Considering that INPE is an internationally recognized institute for space research, atmospheric research and space technology that promotes and conducts studies, scientific research, technological development and human resources development in the fields of space engineering and technology, astrophysics, aeronomy, earth observation, meteorology, and related areas, in accordance with the policies and guidelines set forth by MCTI;

Considering also that the **Department of Aerospace Engineering at Texas A&M University (TAMU)** has a long and productive history tracing back to 1928, when the first aeronautical courses were introduced to prepare students for careers in modern aviation, and that the Aerospace Engineering program of Texas A&M University is one of the top Aerospace Engineering programs in the United States;

Recognizing that INPE, through its Aerospace Electronics Division (DEA) of the Space Engineering and Technology Coordination (ETE), and the Department of Aerospace Engineering at Texas A&M University share common interests and priorities, in addition to promoting and furthering education and learning in their respective countries;

The Parties have expressed their intention to pursue cooperative activities in research and education in the fields that include, but are not limited to, the following:



- Attitude and orbit estimation, dynamics, and control;
- Sensor data processing;
- Turbulence and transition for subsonic and supersonic flows; and
- Hypersonics and reacting flows

The Parties share the views that the implementation of cooperation in specific areas of mutual interest may be facilitated by the following:

- Promotion of workshops and meetings for discussions of joint research objectives and expected results;
- Exchange of data and software code for scientific research under the scientific principles of open access and acknowledgment of the data and code sources;
- Exchange of qualified personnel from both Institutions, to pursue either short-term or extended research visits;
- Visits by authorized officials from each side in order to develop cooperative mechanisms and to expand areas of cooperation, as appropriate.

The Parties agree to initiate discussions to explore cooperation activities and to identify the means to implement them, including, if necessary, specific Cooperation Agreements and Work Program.

The Parties designate the following focal points as responsible for the implementation of this LoI:

For the Department of Aerospace Engineering:
Texas A&M University

Dr Daniele Mortari, Professor
Fellow: IEEE, AAS.
746C H.R. Bright Building
Department of Aerospace Engineering
Texas A&M University - 3141 TAMU
College Station, TX 77843-3141 USA
E-mail: mortari@tamu.edu

For the National Institute for Space Research:

Márcio Afonso Arimura Fialho
Space Engineering and Technology (ETE)
National Institute for Space Research (INPE)
Av. dos Astronautas, 1758
São José dos Campos, SP, Brazil
CEP: 12227-010
E-mail: marcio.fialho@inpe.br

The provisions set forth in this LoI do not create legally binding obligations by the Parties.



The Parties, having read and agreed with the terms of this LoI, have signed two identical copies on (date).

For the Department of Aerospace
Engineering
Texas A&M University

For the National Institute for Space
Research (INPE)



Dr. Rodney Bowersox
Department Head



Dr. Leonel Fernando Perondi
Director

1/14/16

Date

29.12.2015

Date