



# HINDUSTAN

INSTITUTE OF TECHNOLOGY & SCIENCE  
(DEEMED TO BE UNIVERSITY)



Emerging Researchers with creative dynamism for promising innovations are invited to join Hindustan, a blossoming Deemed University with a rich heritage and commitment for excellence. It has a vision to become one of the best research universities in the country by the end of this decade. More than 400 research scholars are pursuing research at Hindustan Institute of Technology and Science. The scholars have opportunities to collaborate with international universities, research centres and industries in India or abroad.

**Admission  
JANUARY  
2020  
Session**

## INVITING APPLICATION FOR Ph.D. – FULL TIME / PART TIME – JANUARY 2020

FACULTY	FELLOWSHIP
<ul style="list-style-type: none"> <li>• Engineering &amp; Technology</li> <li>• Management, Architecture</li> <li>• Science &amp; Humanities</li> </ul> <p><b>Eligibility for Ph.D.:</b> ME / M.Tech / M.Phil / M.Sc./ M.Arch./ MBA in relevant branches with consistently good academic records</p>	<p><b>Ph.D.</b></p> <ul style="list-style-type: none"> <li>• Technology &amp; Science- Fellowship available for meritorious Full-Time Candidates</li> <li>• GATE / NET qualified Rs. 25,000- 28,000/ p.m.</li> <li>• Eligible Candidates from               <ul style="list-style-type: none"> <li>➤ Engineering: Rs. 18,000/- p.m.</li> <li>➤ Science &amp; Humanities: Rs.15,000/- p.m.</li> <li>➤ Management: Rs. 12,000/- p.m.</li> <li>➤ Others: Rs. 10,000/- p.m.</li> </ul> </li> </ul>
<p>Last date for submission of the completed application:</p> <p style="text-align: center;"><b>15<sup>th</sup> November, 2019</b></p> <p style="text-align: center;"><b>Details of application procedures, Research areas, Eligibility and selection procedures are available in our website.</b></p> <p style="text-align: center;"><b><a href="http://www.hindustanuniv.ac.in">www.hindustanuniv.ac.in</a></b></p>	<p style="text-align: center;"><b>UNIQUE OPPORTUNITIES</b></p> <ul style="list-style-type: none"> <li>• Research Scholars can have joint Supervisors from Industry, R &amp; D organisations, Collaborating Institutions from India / abroad</li> <li>• Can do part Research work in Laboratories abroad (collaborating Universities)</li> </ul>
<p><b>Address:</b></p> <p>Regd. &amp; Admn. Office: No. 40, GST Road, St. Thomas Mount, Chennai - 600016 Tamilnadu, India Ph:+91 44 2234 2155 / 0980 /1389 / 2508 Fax: +91 44 2234 2170 Email: <a href="mailto:info@hindustanuniv.ac.in">info@hindustanuniv.ac.in</a> Research Office - 9282525272</p>	

**\*Conditions for Fellowship**

- Consistently good academic record
- Minimum 75% marks obtained in UG & PG
- Achievements and awards

**Highlights**

- Full time PhD students are encouraged to present their research work at international conferences.
- Candidates can have Joint Supervisors from Industry, R&D Organisations and National Institutions of Repute and Collaborating Universities from abroad.
- Candidates also can carry out part of their research work in Laboratories of Collaborating Universities and Research Centres.

**Research Areas**

<i><b>Discipline</b></i>	<i><b>Broad Area of Research</b></i>
School of Aeronautical Engineering	<ul style="list-style-type: none"> <li>• Aero Dynamics</li> <li>• Avionics / Aero Space / Launch Vehicle</li> <li>• GPS and Local Area Augmentation Systems</li> <li>• Joint Precision Approach and Landing Systems</li> <li>• Automatic Dependent Surveillance Broadcast</li> <li>• Dual Airborne Laser Scanner</li> <li>• Composites</li> <li>• Propulsion</li> <li>• Aircraft Maintenance Engineering (with NDT)</li> </ul>
School of Building Sciences	<p><b>Structural Engineering</b></p> <ul style="list-style-type: none"> <li>• Cold formed Steel</li> <li>• Concrete, Composite &amp; Dynamics of structures</li> <li>• Sustainable concrete &amp; Steel structures</li> <li>• Earthquake engineering</li> <li>• Retro fitting of structures</li> </ul> <p><b>Environmental Engineering</b></p> <ul style="list-style-type: none"> <li>• Advanced oxidation Technologies for Water, Waste gas, Wastewater Treatment and Hydrogen Production</li> <li>• Air Quality Modelling and Waste Management</li> </ul>

	<p><b>Water Resources</b></p> <ul style="list-style-type: none"> <li>• CO2 Sequestration</li> <li>• Maintenance Optimization in Water Distribution Networks Performance Evaluation of pipe networks</li> <li>• Sustainable Water Management Integrated</li> <li>• Water Resources Management</li> <li>• Urban Planning</li> <li>• PERI – URBAN</li> <li>• Energy Efficient Architecture</li> <li>• Landscape Architecture</li> <li>• Smart Building</li> <li>• Construction Engineering</li> <li>• Highway Engineering</li> <li>• Civionics</li> <li>• Transportation Engineering</li> </ul>
<p>School of Electrical Sciences</p>	<p><b>ECE</b></p> <ul style="list-style-type: none"> <li>• Communication Network security</li> <li>• Signal Processing</li> <li>• Wireless Sensor Network</li> <li>• Wireless Communication Networks-Mobile</li> <li>• Photonics</li> </ul> <p><b>EEE</b></p> <ul style="list-style-type: none"> <li>• Process Control</li> <li>• Renewable Energy</li> <li>• Signal Processing</li> <li>• Power system</li> <li>• High Voltage Engineering</li> <li>• Power Electronics</li> </ul>
<p>School of Mechanical Engineering</p>	<ul style="list-style-type: none"> <li>• Friction, Wear and Lubrication (Tribology)</li> <li>• Industrial Office Ergonomics</li> <li>• Heat Exchangers and Heat Transfer</li> <li>• Thermal Energy Systems</li> <li>• Materials and Metallurgy</li> <li>• Composites</li> <li>• Ceramics</li> </ul>

	<ul style="list-style-type: none"> <li>• Renewable Energy</li> <li>• CAD/CAM/CAE</li> <li>• Mechatronics</li> <li>• Robotics &amp; Pneumatics</li> <li>• Machine Vision</li> <li>• Metal Cutting</li> <li>• Cylindrical / Surface Grinding</li> <li>• Welding Technology</li> <li>• Alternate Fuels&amp; Bio Diesel</li> <li>• Driver Assistance</li> <li>• Vehicle Safety - Crash and Simulation</li> <li>• Simulation of Under Water Vehicle</li> <li>• FEA / Design of Experiments</li> <li>• Nano Fluids</li> <li>• Electric Vehicles</li> <li>• Thermal - Heat Exchanger/Power Generation</li> <li>• Flow Visualization of fuel injection</li> <li>• Computational simulation Nano-Technology</li> <li>• Experimental synthesis and characterization of nanomaterials</li> <li>• Nano Materials</li> <li>• Batteries, Super capacitors and fuel cells</li> </ul>
School of Computing Sciences	<ul style="list-style-type: none"> <li>• Software Engineering</li> <li>• Networks</li> <li>• Security</li> <li>• IoT</li> <li>• Deep Learning</li> <li>• Cloud Computing</li> <li>• Image Processing and Computer Vision</li> <li>• Data Analytics</li> <li>• Natural Language Processing</li> <li>• Block chain Technology</li> <li>• Artificial Intelligence</li> </ul>
School of Management Studies	<ul style="list-style-type: none"> <li>• Media Management</li> <li>• Business Analytics</li> <li>• Logistic and Supply Chain Management</li> </ul>

	<ul style="list-style-type: none"> <li>• Social Entrepreneurship</li> <li>• Resource Management and Sustainable Development</li> <li>• Hospitality Management</li> <li>• Healthcare Management</li> <li>• Information Systems</li> <li>• Finance Management</li> <li>• Human Resource</li> <li>• Marketing Management</li> </ul>
Bio Technology	<ul style="list-style-type: none"> <li>• Tissue Engineering</li> <li>• Stem Cell Research</li> <li>• Stress Biology</li> <li>• Genetic Engineering</li> <li>• Microbial Technology</li> <li>• Toxicology</li> <li>• Cancer Biology</li> </ul>
Mathematics	<ul style="list-style-type: none"> <li>• Graph Theory</li> <li>• Differential Equation</li> <li>• Numerical Methods</li> <li>• Fuzzy Graphs</li> <li>• Quantitative Techniques &amp; Statistics</li> <li>• Fluid Dynamics</li> <li>• Operation Research</li> <li>• Topology</li> </ul>
Chemistry	<ul style="list-style-type: none"> <li>• Inorganic Materials</li> <li>• Catalysis</li> <li>• Targeted drug delivery</li> <li>• Organic synthesis Complexes</li> </ul>
Physics	<ul style="list-style-type: none"> <li>• Materials Science</li> <li>• Conducting Polymers</li> <li>• Nano composites</li> <li>• Magnetic Materials</li> <li>• Thin Films</li> </ul>
Fashion Design	<ul style="list-style-type: none"> <li>• Textile Designing</li> <li>• Apparel Design</li> <li>• Textiles and Fashion</li> </ul>
English	<ul style="list-style-type: none"> <li>• English Language Teaching</li> <li>• Aviation English</li> <li>• Business English</li> </ul>

	<ul style="list-style-type: none"> <li>• Computer Assisted Language Learning</li> <li>• American Literature</li> <li>• Past Colonial Literature</li> <li>• British Literature</li> <li>• Linguistics</li> <li>• Canadian Literature</li> <li>• Aboriginal Literature</li> </ul>
--	---

### **ADMISSION PROCEDURE**

Admission is generally offered on the basis of academic credentials, written test and interview.

Applications can be filled online with payment of Rs.1200/-

Hard copy of the Ph.D. Applications is also available on payment of Rs. 1200/- by cash / DD from **Head Office, Hindustan Group of Institutions, 40, GST Road, St. Thomas Mount, Chennai- 600016 and at HITS campus, Padur – 603103**

1. Passport size Photo (2 nos.)
2. UG & PG Degree certificate (Xerox)
3. UG & PG Mark sheet (Consolidate)
4. Latest Curriculum Vitae (CV)
5. A brief write up of the desired area of research. proposed topic of Research to be investigated containing the following information:
  - Abstract
  - Introduction
  - Review of Literature
  - Objectives
  - Research Design
  - Materials & Methods
  - Expected outcome
  - References
1. No Objection Certificate from the employer ( If applying Part – Time)
2. Demand Draft / Online payment for Rs.1200 drawn in favour of HITS, Padur.

### **Important Dates**

<b>Last date for Application submission</b>	-	<b>15<sup>th</sup> November 2019</b>
<b>Written test and Interview</b>	-	<b>2<sup>nd</sup> to 6<sup>th</sup> December 2019</b>

**For further information, kindly contact registrar@hindustanuniv.ac.in.**