



## Government of India, Department of Space

## INDIAN INSTITUTE OF SPACE SCIENCE AND TECHNOLOGY

(Declared as Deemed to be University under Sec.3 of the UGC Act 1956) Valiamala PO, Thiruvananthapuram – 695547

# ADMISSION NOTIFICATION FOR M.TECH. AND MASTER OF SCIENCE PROGRAMMES FOR THE ACADEMIC YEAR 2021-2022

Indian Institute of Space Science and Technology (IIST) has been established in the year 2007 as an autonomous academic institution under Department of Space, Government of India. IIST is committed to (i) attract talented students,(ii) putting in place a system which ensures high academic standards, (iii) actively encourage innovative research in areas of relevance to space science, space technology, space applications and other related basic sciences areas.

Applications are invited for admission to the following Post Graduate programmes of the Institute for the academic year 2021-2022. The total number of seats in each branch is 10 (Ten) including sponsored seats. PG Admission for the sponsored candidates has been completed. The remaining PG seats are available for admission as shown in the seat matrix.

Programme Code	Department	Name of the Branch	Educational Qualification
MAE01		Thermal and Propulsion	(i) B.Tech. or equivalent degree in Aerospace Engineering, Aeronautical Engineering, Mechanical Engineering, Chemical Engineering or equivalent
MAE02		Aerodynamics and Flight Mechanics	(ii) A valid GATE Score in Aerospace Engineering or Mechanical Engineering or Chemical Engineering or XE papers(Thermodynamics and Fluid Mechanics)
MAE03	Aerospace Engineering	Structures and Design	<ul> <li>(i) B.Tech. or equivalent degree in Aerospace Engineering, Aeronautical Engineering, Mechanical Engineering, Civil Engineering, Production Engineering, Mechatronics or equivalent</li> <li>(ii) A valid GATE Score in Aerospace Engineering or Mechanical Engineering or Civil Engineering or XE papers (XE-D Solid Mechanics is required)</li> </ul>
MAV01	Avionics	RF and Microwave Engineering	<ul> <li>(i) B.E./B.Tech.or equivalent degree in Avionics/Electronics and Communication/ Electronics Engineering/ Electrical Engineering/ Electronics and Telecommunication</li> <li>(ii) A valid GATE Score in Electronics and Communication Engineering.</li> </ul>

Programme	Department	Name of the	Educational Qualification
Code MAV02	<u> </u>	Branch  Digital Signal  Processing	(i) B.E./B.Tech. or equivalent degree in Avionics/ Electronics and Communication/ Telecommunication/ Electrical and Electronics Engineering/Electrical Engineering/ Electronics and Telecommunication/ Engineering Science/Engineering Physics  (ii) A valid GATE Score in Electronics and Communication
			Engineering.
MAV03		VLSI and Microsystems	(i) B.E./B.Tech. or equivalent degree in Avionics/ Electronics and Communication/ Telecommunication Engineering/ Electrical Engineering/ Electronics and Telecommunication Engineering
			(ii) A valid GATE score in Electronics and Communication Engineering.
MAV04	Avionics	Control Systems	(i) B.E./B.Tech.or equivalent degree in Avionics/Electrical and Electronics / Electronics and Communication/ Electronics and Instrumentation / Instrumentation and Control Engineering/Electronics and Electrical Engineering/Electronics and Telecommunication Engineering
			(ii) A valid GATE score in Electronics and Communication Engineering/ Instrumentation Engineering/ Electrical Engineering.
MAV05		Power Electronics	(i) B.E./B.Tech. or equivalent degree in Avionics/ Electrical Engineering/Electrical and Electronics Engineering / Electronics and Communication Engineering/ Electronics and Instrumentation Engineering/ Instrumentation and Control Engineering/Electronics and Electrical Engineering /Electronics and Telecommunication and related areas.
			(ii) A valid GATE score in Electrical Engineering or Electronics and Communication Engineering/ Instrumentation Engineering
MMA01	Mathematics	Machine Learning and Computing	<ul> <li>(i) M.Sc. in Mathematics/ Statistics/ Computer Science/ Mathematics and Computing         <ul> <li>OR</li> </ul> </li> <li>(ii) B.E./B.Tech. or equivalent degree in Avionics/ Computer Science and Engineering/ Electronics and Communication Engineering/ Electrical Engineering/Electrical and Electronics Engineering/Information Technology/Electronics and Telecommunication Engineering</li> <li>(iii) A valid GATE Score in Mathematics/ Statistics/ Computer Science and Information Technology / Electronics and Communication Engineering/ Electrical Engineering.</li> </ul>

Programme Code	Department	Name of the Branch	Educational Qualification
MCH01	Chemistry	Materials Science and Technology	<ul> <li>(i) B.E./B.Tech. or equivalent degree in Polymer Science and Technology/ Chemical Engineering/ Rubber Technology/ Metallurgical Engineering/Materials Science/Materials Science and Metallurgical Engineering/ Mechanical Engineering/ Production Engineering/ Production and Industrial Engineering/ Plastic Technology</li></ul>
MPH01		Optical Engineering	(i) B.E./B.Tech. or equivalent degree in Electronics/Electrical Engineering/Electronics and Communication Engineering/ Mechanical Engineering/Computer Science and Engineering/ Engineering Physics  OR  M.Sc. in Physics/ Applied Physics/ M.S. (Integrated) Physics.  (ii) A valid GATE score in Electronics and Communication/ Electrical/ Mechanical Engineering/Physics/ Computer Science and Engineering.
MPH02	Physics	Solid State Technology	<ul> <li>(i) B.E./B.Tech. or equivalent degree in Electronics/ Electrical Engineering/ Electronics and Communication Engineering/ Engineering Physics/ Computer Science and Engineering/ Material Sciences and Engineering/ Metallurgical Engineering</li> <li>OR         M.Sc. in Physics/ Applied Physics/ Material Science/ M.S. (Integrated) Physics.</li> <li>(ii) A valid GATE score in Electronics and Communication Engineering/Electrical Engineering/ Physics/ Computer Science and Engineering/ Material science/ Metallurgical Engineering</li> </ul>
MES01	Earth and Space Sciences	Earth System Science	(i) B.E./B.Tech. or equivalent degree in Aerospace Engineering, Aeronautical Engineering, Mechanical Engineering, Chemical Engineering, Civil Engineering, Avionics, Electronics and Communication Engineering, Electrical Engineering, Electronics and Electrical Engineering, Electronics and Instrumentation Engineering, Instrumentation and Control Engineering, Physical Sciences, Agricultural Engineering, Engineering Science, Instrumentation Engineering, Engineering Physics.  OR  M.Sc. in Physics/Mathematics.

Programme Code	Department	Name of the Branch	Educational Qualification
			(ii) A valid GATE score in Aerospace Engineering/ Civil Engineering/ Chemical Engineering/ Electronics and Communication Engineering/ Electrical Engineering/ Mechanical Engineering/ Engineering Sciences/ Agriculture Engineering/ Instrumentation Engineering/ Physics/ Mathematics.  Note: Students with M. Sc. degree must have studied Physics, Mathematics at the B. Sc. level. Students having B. Tech or BE in other branches of engineering will be considered only if they have appropriate experience in related areas of Atmospheric and Oceanic Sciences/ Meteorology/ Geology/ Remote Sensing etc
MES02		Geoinformatics	<ul> <li>(i) B.E./B.Tech. or equivalent degree in Computer Science Engineering/ Information Technology/ Electrical and Electronics Engineering/Electronics and Communication Engineering/ Civil/Avionics/Physical Sciences/ Engineering Sciences/ Geoinformatics/ Agricultural Engineering</li> <li>OR         <ul> <li>M.Sc in Mathematics/Physics</li> </ul> </li> <li>(ii) A valid GATE score in Computer Science and Information Technology/Electrical Engineering/ Electronics and Communication Engineering/Civil Engineering/Engineering Sciences/Agricultural Engineering /Mathematics/Physics/ Geology and Geophysics / Atmospheric Ocean Sciences</li> </ul>
MES03	Earth and Space Sciences	Master of Science in Astronomy and Astrophysics	<ul> <li>(i) B.E./B.Tech. or equivalent degree in Aerospace Engineering, Aeronautical Engineering, Mechanical Engineering, Chemical Engineering, Civil Engineering, Avionics, Electronics and Communication Engineering, Electrical Engineering, Electronics and Electrical Engineering, Electronics Engineering, Electronics and Instrumentation Engineering, Instrumentation and Control Engineering, Physical Sciences, Engineering Science, Instrumentation Engineering, Engineering Physics Electronics Engineering.</li></ul>

- 1. **Age limit: 32 years as on 16.06.2021.** Age relaxation is applicable to SC/ST/Persons with disability (PD) category as per Government of India Orders.
- Educational Qualification & Eligibility: B.E./B.Tech./Master of Science or equivalent degree with a minimum of 60% marks or CGPA 6.50 out of 10 for General / EWS & OBC category and minimum of 55% marks or CGPA 6.00 out of 10 for SC/ST&PD category. A valid score in GATE in relevant area as the case may be is essential.
- 3. When CGPA & equivalent percentage are both provided in the mark list/certificate, CGPA alone would be considered for eligibility.

## **Fee Structure:**

Description of Fees	Amount (Rs.)
Tuition Fees(*)/ Semester	Rs.35000(*)
Other Fees/Semester	Rs.5450
Total Fee(A)	Rs.40450
Hostel Fee/ Semester	Rs.8750
Admission Fee (Non-Refundable) (One-time)	RS.1500
Caution Deposit (Refundable)(One-time)	Rs.5000
Mess Bill/(Nominal) in advance	Rs.18000 (#)
Total Fee(B)	Rs.33250 (**)
Grand Total 1 <sup>st</sup> Semester (A+B)	Rs.73700
2 <sup>nd</sup> Semester onwards (A+B-one time)	Rs.67200

#### Note:

- A General / OBC-NCL/EWS candidate who confirms the seat has to remit the fees of Rs. 40450/-.
- An SC/ST/PD candidate who confirms the seat has to pay Rs.5450/-
- (\*) SC/ST/PD students are exempted from payment of Tuition Fees.
- (\*\*) Will be collected at the time of physical reporting at the Institution.
- (#) 3000 p.m. X 6 months as advance
- Additional fees: Supplementary Examination fees Rs.100/- per paper and Thesis Submission Rs.1000/and Convocation fees - Rs.2000/- & Alumni Registration fees - Rs.500/-, which will be collected with the final semester fee.

## **General Conditions:**

- **1.** Only Indian citizens are eligible to apply.
- 2. Applications received online only will be considered for processing under any circumstances.
- **3.** The applicants can make changes in the application before the submission of branch registration. Once branch registration is submitted no changes/edition can be made.

- **4.** The applicants who wish to apply for more than one programme shall exercise their order of preference of Post Graduate Programmes, at the time of applying itself.
- **5.** Applicants can choose a maximum of **Five** preferences within or across all the departments. The preference once exercised shall be final.
- 6. SC/ST/OBC (Non-Creamy Layer)/EWS/Persons with Disabilities (PD) candidates shall upload the relevant certificates as per the format available in admission portal before the last date of online application. OBC-NCL certificates issued after 01/04/2021 only will be accepted.
  If you do not possess a valid GEN-EWS/OBC-NCL category Certificate (due to current situation), please fill the undertaking given in the admission website and upload the duly filled signed form. Institute would consider favorably request from the candidate(s) for additional time to submit the above mentioned certificate.
- 7. Applications of SC/ST/PD candidates will be processed only after the receipt of the relevant proof online. In other words, non-submission of proof online will lead to rejection of application.
- 8. Reservation of seats for SC/ST/OBC/EWS/PD is applicable as per Govt. of India Orders.
- 9. In case of ST seats falling vacant, it will be filled by SC category candidates.
- 10. Application fee is Rs.600/- for General, OBC and EWS candidates who are male (Rs.300/- for SC, ST, PD and women candidates) up to three preferences (within or across all the departments) and Rs.1200/- for General, OBC and EWS candidates who are male (Rs.600/- for SC, ST, PD and women candidates) for four to maximum five preferences (within or across all the departments)
- 11. The application fee shall be paid through online only. The last date of registration and payment of application fee is 16.06.2021.
- 12. The application fee is non-refundable.
- 13. For the M.Tech. Programmes offered by Departments of Aerospace Engineering, Mathematics and M.Tech.in RF and Microwave Engineering and VLSI and Microsystems offered by Department of Avionics, candidates will be rank listed based only on the valid GATE score. An admission list would be prepared based on the rank list & available number of vacancies & preference given by the candidate.
- 14. The shortlist will be prepared based on GATE score for the other M. Tech./Master of Science programmes offered by Departments of Chemistry, Earth and Space Sciences, Physics and Avionics. The applicants who are shortlisted for M.Tech./Master of Science programmes for above mentioned programmes are required to appear for an Interview. List of shortlisted candidates for interview for those programmes will be displayed in the IIST website on 23<sup>rd</sup> June 2021\*. Shortlisted candidates may download their interview call letter from the website.
- 15. Interview will be conducted through video conference mode.
- **16.** A provisional admission list will be prepared based on the GATE score, interview test score, number of vacancies & preferences given by the candidate.
- **17.** After the provisional admission list is published, the candidate has to remit their first semester fee through online **(SBI Collect)** within the stipulated date.

- **18.** In case the candidate in the provisional admission list fails to remit the fee within the stipulated date, the seat will be allotted to the next candidate in the rank/wait list.
- 19. All candidates who are in the rank list should confirm their willingness to be considered for further allotments in the web portal by choosing "Revalidate and proceed" option on specified dates as given in Table 2.
- 20. The candidates who do not confirm their willingness using the revalidate option on the specified dates will not be considered for any future vacancies or for any change in the branch of higher preference. (However, their existing allotment would be retained if they pay the fees.)
- **21.** The order of preference given by the candidate cannot be changed once the application is submitted. However, the candidate can withdraw from the allotted programmes in which they appear in the Allotment list/waiting list.
- 22. If the candidate with a confirmed seat, after paying fees, wishes to withdraw before the commencement of the class, he/she may send a request to <a href="mailto:academics@iist.ac.in">academics@iist.ac.in</a>. The fee will be refunded as per UGC Guidelines and for details refer to <a href="mailto:Table 3">Table 3</a> (withdrawal of confirmed seats after remitting the fees.)
- 23. Students who are completing their qualifying degree programme in 2020-21 will have to provide the consolidated mark list/mark lists of all semesters along with Provisional/Degree Certificate on or before December 31, 2021. Till the date of submission of degree Certificate, the admission will be treated as provisional and such students who have not submitted the degree certificate/verification certificate/Graduation certificate will not be eligible for scholarship. Also those students who have not submitted the Degree certificate/Transfer certificate/Provisional certificate before 1700 hrs on December 31, 2021 shall be disqualified and such students shall not be eligible to continue their studies at IIST further. On submission of the certificate on or before December 31, 2021, the scholarship will be paid with effect from the date of commencement of classes or from the date of admission to the programme whichever is earlier.
- **24.** Students who have completed their qualifying degree prior to and for 2020-21 will have to produce all the certificates and TC in original at the time of admission.
- 25. M.Tech students with valid GATE score will receive scholarship through AICTE.
- 26. For the students admitted for Master of Science programme, the scholarship will be paid by IIST
- 27. Candidates who are employed in Government/Semi Government/PSUs/Autonomous Bodies need to produce a "No Objection Certificate (NOC)" at the time of interview. For candidates who are employed and who apply to branches where there are no interviews, the NOC has to be submitted at the time of admission.
- **28.** The M.Tech./Master of Science students will be required to assist the Departments in academic activities as and when required.
- 29. Students who are selected for the admissions have to join the course on the specified dates as given in Table 1. Dates for starting of classes for these students are also given in Table 1.

	Table 1: IMPORTANT DATES					
SI No.	Event	Date				
1	Opening of IIST website for online submission of applications	May 21, 2021 - 1600 hrs (Friday)				
2	Closing of IIST website for online submission of applications	June 16, 2021 – 2359 hrs (Wednesday)				
3	Last date for payment of application fee	June 16, 2021 – 2359 hrs (Wednesday)				
4	Display of shortlisted candidates for the branches which have GATE as well as interview	June 23, 2021 – 1700 hrs (Wednesday) (Tentative)*				
5	Display of shortlisted rank list for PG programmes which is based on only GATE score	June 23, 2021 – 1700 hrs (Wednesday) (Tentative)*				
6	Interview for candidates for Departments of Chemistry, Earth and Space Sciences, Physics and Avionics	June 28 – July 02, 2021 (Tentative)*				
7	Display of short listed rank list Departments of Chemistry, Earth and Space Sciences, Physics and Avionics	July 08, 2021 (Thursday) (Tentative)*				
8	Reporting date at the Institution	July 30, 2021 (Friday) (Tentative)*				
9	Classes begins for all PG Programmes	August 02, 2021 (Monday) (Tentative)*				
10	PG Admission closes	August 09, 2021 (Tentative)*				

<sup>\*</sup> These dates are tentative and could change depending on the pandemic Covid-19 in the country.

## **Instructions to Candidates**

- **1.** Online application can be made through <a href="https://admission.iist.ac.in/">https://admission.iist.ac.in/</a>. Read instructions thoroughly before filling the application form.
- 2. Step 1: New User Registration The applicant has to first register with the Name, valid Email ID and Mobile number along with a new Password that will be used for further login to the Admission Portal. You will get a valid Registration No. on successful user creation. Please use this Registration No. and the Password you have set for completing the registration process.
- 3. Step 2: Profile Registration Login using the above Registration No. and Password. Read the instructions and click Continue to proceed to profile registration. Please enter the correct information in each tab and click Finish followed by CONFIRM button. You can use Save as Draft button to temporarily save your data. The profile can be edited till the branch registration is saved.
- **4.** Step 3: Branch Registration Login to view the branches and set the preference for various programmes. Additionally, you may apply for other programmes (branches) for which your qualifying degree is equivalent/ related to as the case may be by selecting the appropriate programmes under "other programmes". Final

- decision on your eligibility would be decided by the concerned department after the last date of application. Select branches and submit, a fee registration number will be generated.
- **5.** Step 4: Pay Registration Fee: With the registration number you can make application fee payment through bill desk.
- **6.** Short list / Rank list will be published on 23.06.2021 (For All PG programmes). The rank listed candidates from Departments of Aerospace Engineering, Mathematics and M.Tech.in RF and Microwave Engineering and VLSI and Microsystems offered by Department of Avionics would be offered admission based on their GATE score only. Using the login ID and password, the candidate can confirm their seats through online web portal. First semester fee has to be remitted through "SBI Collect" to confirm the seat.
- 7. A fresh allotment list will be prepared and updated in IIST website every Monday, Wednesday and Friday at 1700 hrs, if vacancies exist. The candidate in the allotment list has to remit the stipulated fees on or before the subsequent Wednesday, Friday and Monday 0900hrs to confirm their candidature to the program and branch allotted. Any change in the aforementioned schedule would be notified in the website.
- 8. If the candidate's highest preference is allotted and if he/she fails to remit the fees in the stipulated time, then his/her candidature will be cancelled.
- 9. If candidate is allotted one of his/her lower preferences and he/she does not remit the fees, then the candidate will be eligible for being considered for his/her higher preference provided he/she chooses "Revalidate and Proceed" option as per Table 2.
- 10. Candidates can login to their web portal and withdraw from the allotted programmes in which they appear in the allotment list/wait list. The order of preferences cannot be altered.
- 11. All candidates would be considered for allotments in the subsequent vacancy filling rounds only if the candidate chooses "REVALIDATE and PROCEED "option in the web portal on specified dates given in Table 2.

## **Table 2: REVALIDATION DATES**

PG programmes in Departments of Aerospace Engineering, Mathematics and M.Tech.in RF and Microwave Engineering and VLSI and Microsystems offered by Department of Avionics	Will be announced later
All PG Programmes	

<sup>\*</sup> These dates are tentative and could change depending on the pandemic Covid-19 in the country.

12. Note: The candidates who have paid the fees, who wish to withdraw from the program should do so as per the details given in the Table 3 below

Table 3: WITHDRAWAL FROM PROGRAMME AFTER REMITTING THE FEES

PG Programmes	Cancellation charges
PG programmes in Departments of Aerospace Engineering, Mathematics and M.Tech. in RF and Microwave Engineering and VLSI and Microsystems offered by Department of Avionics Other PG programmes	As per UGC norms.

	PG Admission 2021							
	Seat Matrix							
	Department of Aerospace Engineering							
SI.No	Branch	UR	OBC	SC	ST	EWS		
1	Aerodynamics and Flight Mechanics	3*	1	1	1	1		
2	Structures and Design	3	2	2	0	1		
3	Thermal and Propulsion	4	2	1	1	1		
	Department of Avionics		,					
SI.No	Branch	UR	ОВС	SC	ST	EWS		
1	Control Systems	3*	2	1	1	1		
2	Digital Signal Processing	3	2	1	0	1		
3	RF and Microwave Engineering	4	3	1	0	1		
4	Power Electronics	4	3	1	1*	1		
5	VLSI and Microsystems	5	2	2	1	0		
	Department of Chemistry		,					
SI.No	Branch	UR	ОВС	SC	ST	EWS		
1	Materials Science and Technology	4	2*	1	0	0		
	Department of Earth and Space S	cience	S					
SI.No	Branch	UR	ОВС	SC	ST	EWS		
1	Astronomy and Astrophysics	5	3	1	1	0		
2	Earth System Science	5	2	2	0	1		
3	Geoinformatics	3	1*	1	1	1		

Department of Mathematics								
SI.No	Branch	UR	ОВС	SC	ST	EWS		
1	Machine Learning and Computing	3	2	1*	1	1		
	Department of Physics							
SI.No	Branch	UR	OBC	SC	ST	EWS		
1	Optical Engineering	5	3	1	0	1		
2	Solid State Technology	5*	2	1	1	1		
	Total	59	32	18	9	12		
	Total Seats		•	130 Sea	ts			

<sup>\*</sup> Indicates that one PD candidate is included in the relevant category