

Indian Institute of Information Technology, Kalyani

M.Tech in “VLSI and Embedded Systems”

About the Institute: Set up in the year 2014, IIIT Kalyani is one of the 25 IIITs established by the Ministry of Education, Government of India, under the *Not for profit Public Private Partnership (N-PPP)* model. A Memorandum of Understanding (MoU) was signed between the Government of India, Government of West Bengal, and three Industry Partners, namely, Coal India Limited, Rolta Foundation, and WBEIDC Ltd. (Webel) for setting up the institute at Kalyani, with the stakes of the partners at a ratio of 50:35:15 respectively. The institute has been declared as an *Institute of National Importance (INI)* as per *The Indian Institutes of Information Technology (Public-Private Partnership) Act, 2017*. The institute currently operates from the Webel IT Park building at Kalyani. The permanent campus of the institute is coming up at Kalyani, right on the Kalyani expressway. More than 90% of construction of the permanent campus is over.

About the Program: The M.Tech program in *VLSI and Embedded Systems* has been introduced at the institute from the year 2025. Spanning over a duration of four semesters, the program aims to equip the students with both theoretical and practical knowledge in the domain. The institute is a part of the “*Chip to Startup (C2S)*” program of the Ministry of Electronics and Information Technology (*MeitY*), Govt. of India. Under this program, FPGAs and VLSI CAD tools from all the major vendors are available to the students and researchers of the institute, with sufficiently large number of licences. Fabrication activities are also supported under the scheme.

Course Structure: The course is distributed over four semesters, as noted next.

- **Semester I:** Analog IC Design (with laboratory), Digital IC Design (with laboratory), Advanced Semiconductor Devices, Embedded Systems, Elective-I
- **Semester II:** Low Power VLSI, Mixed-Signal IC Design (with laboratory), VLSI Technology, Embedded System Laboratory, Elective-II, Elective-III
- **Semester III:** Project-I
- **Semester IV:** Project-II

Financial Support: IIIT Kalyani, being a PPP mode institute will not be able to provide any stipend to the students. However, they may apply for partial support, in the form of *Teaching Assistantship* in their 3rd and 4th semesters.

Placement Support: The institute has a fully structured Training and Placement Cell running for the undergraduate students. The facility will be extended to the M.Tech students as well.

Fee Structure: The fee to be paid by the newly admitted students consists of two components, as noted below.

- Academic Fees (Same for all students GEN/SC/ST/OBC/EWS/PwD)
- Hostel Fees (*optional, to be paid only by the students availing hostel facility*)

Academic Fees:

A. Institute Fee (Per Semester)

<i>Head</i>	<i>Amount (INR)</i>	<i>Remarks</i>
Tuition Fee	50000	Per semester
Students' Activities Fee	1430	With 10% increase every year
Infrastructural Maintenance Fee	550	With 10% increase every year
Examination Fee	1500	Per semester
Accident Medical Insurance Fee	1500	Per Year
Total	54,980	

B. One-time Payable during Admission

<i>Head</i>	<i>Amount (INR)</i>	<i>Remarks</i>
Registration Fee	1500	One time
Identity Card Fee	200	One time
Institute Development Fee	5000	One time
Alumni Registration Fee	2000	One time
Institute Caution Money	10000	One time, refundable
Total	18,700	

Hostel Fees:

<i>Head</i>	<i>Amount (INR)</i>	<i>Remarks</i>
Establishment & Maintenance Fee	7000	Per semester
Rent	25000	Per semester
Mess Charges in Advance	25000	Per semester, on actual basis
Electricity and Internet Charges	On actual	
Total	57,000	

Seat Matrix

Institute Name: Indian Institute of Information Technology , Kalyani

Department Name: Department of Electronics & Communication Engineering

Programme Name: VLSI & Embedded Systems

Dept. Name	Programme	Group Name	OPEN	OPEN -PwD	EWS	EWS-PwD	SC	SC-PwD	ST	ST-PWD	OBC	OBC-PWD	Total	Quota
Department of Electronics & Communication Engineering	VLSI & Embedded Systems	Group 1	7	1	2	0	3	0	1	0	6	0	20	AI
Department of Electronics & Communication Engineering	VLSI & Embedded Systems	Group 2	3	0	0	0	1	0	0	0	1	0	5	AI
Department of Electronics & Communication Engineering	VLSI & Embedded Systems	Group 3	2	0	1	0	0	0	1	0	1	0	5	AI

Group 1: GATE Paper: Electronics and Communication Engineering (EC)

Qualifying Degrees:

- T104 B.E./B.Tech. in Applied Electronics and Instrumentation Engineering
- T135 B.E./B.Tech. in Electronics and Communication Engineering
- T136 B.E./B.Tech. in Electronics and Instrumentation Engineering
- T137 B.E./B.Tech. in Electronics and Telecommunication Engineering
- T138 B.E./B.Tech. in Electronics Engineering
- T191 B.E./B.Tech. in Applied Electronics and Telecommunication Engineering
- T210 B.E./B.Tech. in Communication Engineering
- T231 B.E./B.Tech. in Electronic Instrumentation and Control Engineering
- T233 B.E./B.Tech. in Electronics and Computer Engineering
- T234 B.E./B.Tech. in Electronics and Control Systems
- T235 B.E./B.Tech. in Electronics and Electrical Communication Engineering
- T236 B.E./B.Tech. in Electronics and Electrical Engineering
- T237 B.E./B.Tech. in Electronics and Information Systems
- T240 B.E./B.Tech. in Electronics Communication and Instrumentation Engineering
- T241 B.E./B.Tech. in Electronics Design Technology
- T242 B.E./B.Tech. in Electronics Instrument and Control
- T243 B.E./B.Tech. in Electronics Science and Engineering
- T391 B.E./B.Tech. in Electronics and Instrumentation
- T392 B.E./B.Tech. in Instrumentation and Electronics Engineering
- T409 B.E./B.Tech. in Electronics and Communication Engineering with specialization in Design and Manufacturing
- T411 B.E./B.Tech. in Electronics System Engineering
- T412 B.E./B.Tech. in Electronics Engineering (specialization in System Engineering)
- T413 B.E./B.Tech. in Electronics Engineering with minor in System Engineering
- T414 B.E./B.Tech. in Microelectronics and VLSI Design
- T415 B.E./B.Tech. in Communication and Signal Processing
- T418 B.E./B.Tech. in Electronics and Communication Engineering (Communication Systems Design)
- T419 B.E./B.Tech. in Electronics and Communication Engineering (Electronics Systems Design)
- T431 B.E./B.Tech. in Applied Electronics and Communications Engineering
- T457 B.E./B.Tech. in Electronics and Communication Engineering (Bio-Medical Engineering)
- T458 B.E./B.Tech. in Electronics and Communication Engineering (Industry Integrated)
- T459 B.E./B.Tech. in Electronics and Communication Engineering (Microwaves)

T460 B.E./B.Tech. in Electronics and Computer Science
 T461 B.E./B.Tech. in Electronics and Telecommunication Engineering (Technolygician Electronic Radio)
 T484 B.E./B.Tech. in Electronics and Communication (Communication System Engineering)
 T511 B.E./B.Tech. in Electronic Engineering
 T512 B.E./B.Tech. in Electronic Science and Engineering
 T513 B.E./B.Tech. in Electronics and Communication Engineering (VLSI Design & Technology)
 T514 B.E./B.Tech. in Electronics and Communication Technology
 T515 B.E./B.Tech. in Electronics and Telecommunication
 T516 B.E./B.Tech. in Electronics and Tele-Communication Engineering
 T517 B.E./B.Tech. in Electronics and Telecommunications Engineering
 T518 B.E./B.Tech. in Electronics Engineering (VLSI Design and Technology)
 T519 B.E./B.Tech. in Electronics Instrumentation and Control Engineering
 S511 M.Sc. in Electronics
 S526 M.Sc. in Applied Electronics
 S565 M.Sc. in Electronics and Communication
 R103 The Institution of Electronics and Telecommunication Engineers (IETE)
 R101 The Institution of Engineers (India) (IE) - Electronics & Communication Engineering, Electronics Engineering

Group 2: GATE Paper: Computer Science and Information Technology (CS)

Qualifying Degrees:

T120 B.E./B.Tech. in Computer Engineering
 T121 B.E./B.Tech. in Computer Science
 T122 B.E./B.Tech. in Computer Science and Engineering
 T123 B.E./B.Tech. in Computer Science and Information Technology
 T124 B.E./B.Tech. in Computer Technology
 T149 B.E./B.Tech. in Information Technology
 T211 B.E./B.Tech. in Computer and Communication Engineering
 T213 B.E./B.Tech. in Computer Engineering and Application
 T214 B.E./B.Tech. in Computer Networking
 T215 B.E./B.Tech. in Computer Science and Systems Engineering
 T216 B.E./B.Tech. in Computer Science and Technology
 T265 B.E./B.Tech. in Information and Communication Technology
 T349 B.E./B.Tech. in Information Technology and Engineering
 T445 B.E./B.Tech. in Computer Science and Engineering (Cyber Security)
 T446 B.E./B.Tech. in Computer Science and Engineering (Artificial Intelligence)
 T447 B.E./B.Tech. in Computer Science and Engineering (Artificial Intelligence and Machine Learning)
 T448 B.E./B.Tech. in Computer Science and Engineering (Data Science)
 T449 B.E./B.Tech. in Computer Science and Engineering (Internet of Things and Cyber Security Including Block Chain Technology)
 T450 B.E./B.Tech. in Computer Science and Engineering (IoT)
 T451 B.E./B.Tech. in Computer Science and Engineering (Networks)
 S510 M.Sc. in Computer Science
 R101 The Institution of Engineers (India) (IE) - Computer Science and Engineering, Information Technology Engineering
 B453 MCA

Group 3: GATE Paper: Electrical Engineering (EE)

Qualifying Degrees:

T128 B.E./B.Tech. in Control and Electrical Engineering
 T129 B.E./B.Tech. in Electrical and Electronics Engineering
 T130 B.E./B.Tech. in Electrical and Instrumentation Engineering
 T131 B.E./B.Tech. in Electrical Engineering
 T150 B.E./B.Tech. in Instrumentation and Control Engineering
 T223 B.E./B.Tech. in Control and Instrumentation
 T230 B.E./B.Tech. in Electrical Instrumentation and Control Engineering

T393 B.E./B.Tech. in Electrical and Electronics
T410 B.E./B.Tech. in Electrical, Electronics and Power Engineering
T483 B.E./B.Tech. in Electrical Engineering (Electronics and Power)
R101 The Institution of Engineers (India) (IE) - Electrical Engineering, Electrical & Electronics Engineering

Important Dates:

Online reporting : To be declared
Physical reporting : To be declared
Induction Program : To be declared
Reporting to Hostel : To be declared
Commencement of classes : To be declared

Contact Details:

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