



**MOSart Labs**  
Art of VLSI



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भारतीय प्रौद्योगिकी संस्थान भुवनेश्वर  
INDIAN INSTITUTE OF TECHNOLOGY BHUBANESWAR

# Online PG Diploma in **Semiconductor Technology** & Chip Design (STCD)

India's Most Advanced Industry-Ready Chip Design Program

12 Months Industry Ready Program

4 Weeks Campus Immersion

Industry Experts as Faculty

Industry-Driven Curriculum

100% Placement Support

IIT Alumni Status

Get trained by IIT Faculty & India's leading chip design experts



amun  
**OSRAM**

Micron

AMD

SAMSUNG  
ELECTRONICS





## About **Semiconductor** Technology & Chip Design Program

The PG Diploma in Semiconductor Technology & Chip Design is a prestigious industry academia program jointly offered by IIT Bhubaneswar and MOSart Labs, built to bridge the gap between engineering graduates and the fast-growing semiconductor industry.

Designed by senior VLSI leaders and IIT professors, the program focuses on hands-on, tool-driven learning that prepares ECE/EEE graduates for real-world roles in chip design, design verification, and semiconductor technology.

This program blends the academic excellence of IIT Bhubaneswar with MOSart's industry expertise, enabling learners to build the exact skillset semiconductor companies expect.



### **First-ever Industry Partnered IIT-certified VLSI Program**

India's first and only Industry Partnered IIT-certified PG Diploma in VLSI, jointly designed and taught by IIT Bhubaneswar faculty and top VLSI industry experts.



### **Online Course with IIT-backed Training & Real-world Exposure**

Flexible online learning combined with a 4-week campus immersion at IIT Bhubaneswar for hands-on labs, tool training, project experience.



### **Job-ready Curriculum with 100% Placement Support**

Master industry-relevant VLSI skills with 100% placement assistance, resume building, interview prep, and dedicated hiring support.



### **Placement Opportunities up to 18 LPA**

Get access to top-tier semiconductor hiring partners offering salary packages up to ₹18,00,000 for skilled VLSI design engineers.



## What you will Learn

### FOUNDATION

#### VLSI Fundamentals

Build a strong foundation in semiconductor technology, chip architecture, and VLSI design principles to kickstart your career.

#### Digital/RTL Design

Master digital logic, RTL coding, and optimization techniques essential for designing modern semiconductor chips.

#### Analog Design

Explore the world of analog circuits, signal processing, and mixed-signal design, a key pillar of advanced VLSI systems.

#### VLSI Verification Techniques

Develop expertise in functional verification, simulation, and debugging, ensuring seamless chip performance.

#### IC Measurement & Testing

Learn real-world techniques for IC characterization, validation, and performance analysis, making you job-ready for core semiconductor roles.

### SPECIALIZATION

#### Advanced Digital IC Design

Master the complete VLSI design flow, from concept to implementation, using industry-leading tools.

#### Advanced Analog IC Design

Dive deep into analog and mixed-signal circuits, crucial for high-performance semiconductor applications.

#### Advanced IC Design Verification

Become an expert in verifying complex chip architectures through simulation and validation techniques.

#### Layout Design

Learn how to translate circuit schematics into optimized silicon layouts for fabrication.



**Rajesh Gupta**

27 Years Experience  
Ex- Country Head  
Micron & ams OSRAM



**Dr. Krishna Kanth**

23 Years Experience  
Ex-Director  
ams OSRAM



**Madhusudan Sampath**

24 Years Experience  
Ex-Director  
Samsung India



**Prof. Vijay Shankar P**

Head, Dept of ECE,  
IIT Bhubaneswar



**Dr. Srinivas Boppu**

Associate Professor,  
IIT Bhubaneswar



**Phanindra Kumar**

19 Years Experience  
Sr. Manager, Micron India



**Harshitha Indukuri**

27 Years Experience  
Sr. Manager, ams OSRAM



**Lakshminarasimhan**

20 Years Experience  
Founder, Logicatoms Semiconductors

### OUR FACULTY



## Program Outcomes

By the end of this program, you won't just know the theory you'll have industry-grade project experience that proves your skills.

### 8 Mini Corporate Projects & Several Industry Aligned Assignments

Gain practical exposure through short, hands-on projects that simulate real chip design tasks and help you apply concepts quickly.

### Capstone Project

Conclude your journey with a full-cycle chip design project that brings everything together. From architecture and schematics to simulation, integration, and testing, you'll solve a real industry challenge under expert mentorship, showcase your portfolio to recruiters, and stand out in interviews.

### Master Industry-Standard Tools



## Fee Structure

Launchpad  
Module &  
Entrance Fee

₹2,950/-  
(Inc GST)

Enroll  
Confirmation

₹38,800\*/-  
(Inc GST)

Paid within 3 Days of  
result (Non Refundable)

Foundation  
Semester

₹1,50,000/-  
(Inc GST)

Paid within 30 Days  
from start of program

Specialization  
Semester

₹3,12,700/-  
(Inc GST)

Paid at the start of  
second semester

Click Here to **Enroll**