



**upGrad**



International  
Institute of Information  
Technology Bangalore

# PG Certification in Blockchain Technology

6 Months | Online with Offline Basecamp

**upGrad** is an online education platform to help individuals develop their professional potential in the most engaging learning environment. Based on industry trends, we have identified Blockchain as one of the fastest growing technologies with an exponential increase in demand for skilled professionals.

With our meticulously designed PG Program in Software Development Specialization in Blockchain, we promise to equip you with the perfect mix of conceptual knowledge and hands-on experience to help you kickstart a successful career in this industry.



## **Ronnie Screwvala**

Co-founder & Chairman  
upGrad



**IIIT-B** is one of the leading institutes of higher education in the country which has outstanding world class faculty, with years of experience in the latest technologies.

We are excited to partner with upGrad to offer a one-of-its-kind, academically rigorous and industrially relevant PG Program in Software Development Specialization in Blockchain. Our strong placement and alumni network, along with the credibility of a PG Certification will provide you just the right push to accelerate your career in this field.



## **Prof. S. Sadagopan**

Director  
IIIT Bangalore

# WHY BLOCKCHAIN

**290%**

increase in number of  
cryptocurrency and blockchain  
jobs posted from May to  
November 2017

~Indeed

**\$9.7 bn**

Total Blockchain  
spending by 2021 with a  
compound annual growth  
rate(CAGR) of 82%

~International Data Corporation

**40-60%**

increase in salaries  
of Blockchain skilled  
professionals compared  
to peers

~Randstad

“

*Disruptive technologies such as Blockchain and the Internet of Things  
will have a profound impact in the way we live and work. They will require  
rapid adaptation in our workplaces.*



**Narendra Modi**

Hon'ble Prime Minister of India

## WHOM IS THE PROGRAM FOR?

Whether you want to transition  
into a Blockchain Role or acquire the  
right skill-set to grow in your current  
role, this program is just right for you.

- Developers & Sr Developers
- IT/ITeS Project Leads & Managers
- Technical Leads
- Blockchain Start Up Professionals

# WHY BLOCKCHAIN WITH IIIT-B AND UPGRAD?



## PG CERTIFICATION FROM IIIT-B

Earn a reputed Post Graduate Certification without leaving your



## HANDS ON LEARNING OPPORTUNITIES

Receive industry certificates on completing industry projects and participate in action workshops



## RESUME FEEDBACK

Feedback on your resume and profile building to kickstart your career



## STRONG PEER-TO-PEER INTERACTION

State-of-the-art platform to connect with the entire network of accomplished peers



## 1:1 INDUSTRY MENTORSHIP

Receive 1:1 mentoring from Industry Experts to understand your career pathway



## DEDICATED STUDENT SUPPORT

Dedicated Student mentor along with teaching assistants for academic or other doubts.



## GET PERSONALIZED FEEDBACK

Grading and personalized feedback on your assignments



## ON-THE-GO LEARNING

Learning squeezed into smaller learning sessions; anytime - anywhere

# INSTITUTE FACULTY & INDUSTRY EXPERTS



**NITIN GAUR**  
Director  
IBM Blockchain Labs



**SUDIN BARAOKAR**  
Chief Mentor - Bankchain  
Blockchain Alliance



**PRASANNA LOHAR**  
Head Technology  
DCB Bank



**SEAN HAN**  
Author  
Blockchain Demo



**KARTIK MANDAVILLE**  
Founder & CEO  
SpringRole



**SANACHIT MEHRA**  
CEO  
Cateina Technologies



**SUNIL SHARMA**  
Co-founder  
SquadX



**PROF. TRICHA ANJALI**  
Associate Professor  
IIIT Bangalore

# PROGRAM CURRICULUM

## PRE-COURSE

*(Duration : 2 weeks)*

We have built a 2 week pre-course in JavaScript where you will be given a strong foundation in order to prepare for the intensive learning experience of the program

---

## BLOCKCHAIN FUNDAMENTALS & BUILDING A BLOCKCHAIN

*(Duration - 7 weeks)*

Demand for Blockchain developers has sky rocketed recently and there is a need for professionals who understand the core basics of blockchain. Learn the fundamental concepts behind building a blockchain, it's features & then code your own Blockchain!

### Topics Covered:

- Introduction to Blockchain
- Features of Blockchain
- Cryptography in Blockchain
- Types of Blockchain
- System Architecture
- Build your own Blockchain using JavaScript

### Tools & Languages Used:



---

## FUNDAMENTALS OF ETHEREUM AND SMART CONTRACTS

*(Duration - 2 weeks)*

### Topics Covered:

- Fundamentals of Ethereum
- Creating Smart contracts

### Tools & Languages Used:



# HYPERLEDGER

*(Duration - 6 weeks)*

Hyperledger, the most popular public blockchain, is widely used to build blockchain solutions for use cases across industries. Learn how Hyperledger functions, build and deploy fabric network and chaincode.

## INTRODUCTION TO HYPERLEDGER

*(Duration - 1 week)*

### Topics Covered:

- What is Hyperledger
- Distributed Ledger Technology and its Challenges
- What is Fabric
- Components of Fabric
- Architecture
- Transaction Flow

## FABRIC UNDER THE HOOD

*(Duration - 3 weeks)*

### Topics Covered:

- Building the Hyperledger Fabric Network
- Writing the Chaincode
- Performing Transactions

## HYPERLEDGER COMPOSER

*(Duration - 2 weeks)*

### Topics Covered:

- Introduction to Hyperledger Composer
- Understanding Hyperledger Composer(Model , Transaction Processor , Access Control , Query)
- Hyperledger Composer Playground Experience
- Developing Application using Composer Playground

### Tools & Languages Used:





# CAPSTONE PROJECT

After months of lectures and hands-on practice on latest tools, it is time for the capstone project! You will work on a project mentored by industry experts through 1-on-1 discussions and feedback sessions. The projects have been decided to ensure that you get to apply all the lessons you have covered during the 11 month program

*Note: IIIT-B and upGrad reserve the right to edit/alter the curriculum at a later date based on academic requirement and industry feedback*

## Industry Projects:



## Action Workshops:



## Industry Experts:



## Ecosystem Partners:





# PROGRAM DETAILS

## PROGRAM DURATION

6 Months

## PROGRAM FEES

₹ 1,00,000/- (inclusive of taxes)

---

## ELIGIBILITY

Minimum 50% marks or 5/10 GPA (on a scale of 10) or 2/4 GPA (on a scale of 4) in undergraduate degree examination. Having a minimum 3 year UG degree in BE, BTECH

*Final year college students enrolled in degree types mentioned above, are also eligible to apply. However, in order to successfully graduate from the program and receive a post-graduate certification, they will have to provide proof of UG graduation (e.g. provisional degree)*

---

## ADMISSIONS PROCEDURE

Post application, we have an admission process to assess your eligibility

---

## FOR FURTHER DETAILS, CONTACT US AT:

[blockchain@upgrad.com](mailto:blockchain@upgrad.com) / [admissions-pgpsd@iiitb.ac.in](mailto:admissions-pgpsd@iiitb.ac.in)

**APPLY NOW**