



# INTERNSHIPS 2024-25

# INTERNSHIP BLUEBOOK



**Career Development Cell**  
INDIAN INSTITUTE OF TECHNOLOGY MADRAS

## Message from the team

Greetings pre-final year students!

The following document is the Bluebook which is a compilation of details from the last internship season about various companies and the profiles they offer. The purpose of this document is to help the upcoming batch with valuable knowledge through the feedback of students from last year. The document contains information about job description, various selection processes and the compensation for a particular company. Please note that the information in this document is based on feedback from students and also keep in mind that the process of selection is entirely the choice of company and it can be different from last year. We would like to conclude by thanking all the students for their cooperation in providing the feedback and the coordinators for their efforts in putting this together. We hope this aids you in your preparation for the upcoming internship season and wish you best of luck for the same.

Thanks & Regards,

Team CDC.

# Index

<b>Alphagrep Securities Pvt Ltd</b>	<b>5</b>
<b>Bain &amp; Company</b>	<b>9</b>
<b>BCG</b>	<b>12</b>
<b>Databricks (Domestic)</b>	<b>14</b>
<b>Databricks (International)</b>	<b>18</b>
<b>DE Shaw</b>	<b>21</b>
<b>Goldman Sachs (Quant)</b>	<b>26</b>
<b>Glean Search Technologies India Pvt. Ltd.</b>	<b>30</b>
<b>Google India</b>	<b>34</b>
<b>Graviton Research Capital</b>	<b>38</b>
<b>IMC Trading</b>	<b>42</b>
<b>ITC</b>	<b>46</b>
<b>JP Morgan (CIB Research &amp; Analytics-Markets)</b>	<b>50</b>
<b>JP Morgan ( Quantitative Researcher)</b>	<b>57</b>
<b>Media.net</b>	<b>62</b>
<b>Millennium Consulting PVT LTD</b>	<b>66</b>
<b>Morgan Stanley</b>	<b>70</b>
<b>Optiver (Quantitative Trading)</b>	<b>74</b>
<b>Optiver (SDE)</b>	<b>78</b>
<b>Piramal Pharma Limited</b>	<b>84</b>
<b>Piramal Capital and Housing Finance Ltd</b>	<b>88</b>
<b>Procter and Gamble</b>	<b>92</b>
<b>Quantbox Research (Core Engineering Analyst (SDE))</b>	<b>97</b>
<b>Quantbox Research (Research and Trading Analyst)</b>	<b>100</b>

<b>Rubrik</b>	<b>103</b>
<b>Salesforce</b>	<b>107</b>
<b>Trexquant (India) Business Consulting LLP</b>	<b>112</b>
<b>Uber</b>	<b>115</b>
<b>Compiled data of companies from Internship bluebook 2023 - 24</b>	
<b>Accenture (Strategy &amp; Consulting)</b>	<b>119</b>
<b>Accenture (Advanced Applications Engineering)</b>	<b>123</b>
<b>Adobe (Media and Data Science Research)</b>	<b>125</b>
<b>Adobe (Research)</b>	<b>127</b>
<b>Adobe (Product)</b>	<b>130</b>
<b>American Express</b>	<b>132</b>
<b>APT Portfolio (Quant)</b>	<b>136</b>
<b>APT Portfolio (Hardware)</b>	<b>139</b>
<b>Cisco (ASIC)</b>	<b>142</b>
<b>Cisco (Software)</b>	<b>144</b>
<b>Dr Reddy's Laboratories (Digital and Analytics)</b>	<b>147</b>
<b>Dr Reddy's Laboratories (Technical Trainee)</b>	<b>150</b>
<b>Finmechanics</b>	<b>152</b>
<b>Jane Street (Quantitative Trader)</b>	<b>155</b>
<b>Jane Street (Software)</b>	<b>159</b>
<b>Microsoft (ML)</b>	<b>162</b>
<b>Microsoft (Technical Program Manager)</b>	<b>165</b>
<b>Microsoft (Software)</b>	<b>168</b>
<b>NKSecurities (Quant)</b>	<b>171</b>
<b>NKSecurities (Software)</b>	<b>174</b>
<b>NoBroker (Product)</b>	<b>177</b>
<b>NoBroker (Software)</b>	<b>180</b>
<b>Nomura (Global Markets Analyst)</b>	<b>183</b>
<b>Nomura (Wholesale Strategy)</b>	<b>187</b>
<b>Wells Fargo</b>	<b>189</b>
<b>Schneider Electric</b>	<b>191</b>

<b>PwC</b>	<b>194</b>
<b>WorldQuant</b>	<b>197</b>

# Alphagrep Securities Pvt Ltd

## Profile and Location:

Software Developer,Bangalore and Mumbai.

## About Alphagrep Securities Pvt Ltd:

AlphaGrep Securities Private Limited is a quant trading firm with a focus on algorithmic trading across global asset classes. With offices in Mumbai, Bangalore, Gurgaon, Singapore, and London, we are among the largest firms by trading volume on Indian exchanges and hold significant market share on several major global exchanges. Our approach is rooted in a disciplined and systematic quantitative methodology aimed at identifying factors that consistently generate alpha. These factors are integrated with our proprietary ultra-low latency trading systems and robust risk management practices to formulate trading strategies spanning equities, commodities, currencies, and fixed income, actively traded on global exchanges.

## Job Description:

AlphaGrep Securities is seeking a talented Software Developer to join our Core Engineering group. This team designs in-house trading applications that are robust and extremely fast.

## Responsibilities

- Design, develop, and test proprietary software, including:
  - Trading strategy simulation software optimized for distributed computation
  - Large-scale data acquisition, storage, accessibility, and visualization
  - Real-time trade management and risk analysis.
- Identify innovative solutions to complex problems and advocate for their implementation by clearly and concisely communicating your ideas to the team.

- Collaborate with other software developers, quantitative traders, and researchers in cross-functional team environments.

## **Qualifications**

AlphaGrep encourages bachelor's and master's students in computer science, mathematics, and related fields to apply. Additional requirements include:

- Excellent Software Development knowledge, demonstrated through coursework, research projects, or open source activities, preferably in C++.
- Strong understanding of object-oriented design, data structures, and algorithms.
- Brilliant problem-solving abilities
- Exposure to network programming (TCP/IP), multi-threaded applications, computational intelligence, and real-time programming.
- Passion for new technologies and ideas.
- Ability to manage multiple tasks in a fast-paced environment.
- Strong communication skills.
- Working knowledge of Linux/Unix.
- Financial experience is not required but interest in financial markets is a plus.

## **Why You Should Join Us**

- Great People: We are curious engineers, mathematicians, and statisticians who enjoy having fun while achieving our goals.
- Transparent Structure: Our employees know that we value their ideas and contributions.
- Relaxed Environment: We have a flat organizational structure with frequent activities for all employees such as yearly offsites, happy hours, corporate sports teams, etc.

- **Health & Wellness Programs:** We believe that a balanced employee is more productive. A stocked kitchen, gym membership, and generous vacation package are just some of the perks that we offer.

If you are passionate about technology and eager to contribute to a dynamic team, we encourage you to apply.

**Shortlisting process:** Technical Test, HR/Personality Test, Technical Interview/Case Interview, HR Interview

**CGPA cutoff:** NA

**Test:** Medium difficulty range questions are asked. Most of the questions were similar to codeforces questions.

**GD:** None

**No of interview rounds:** 2

**Interview:**

Each round of interview lasts for about 30-40 minutes. Most of the questions asked were related to programming.

**Preparation Material & strategies:**

- Learning coding and software development with the guidance of seniors, from the first year itself will give an initial boost.
- Doing codeforces is recommended.
- Achieve the rating of 1600 on codeforces.

**Open for:** Computer Science and Engineering, Electrical Engineering.

**Offers:** 2-software



### **Stipend Structure:**

Currency type:INR

Amount : 450000/\_ monthly

Other information:

Onward and return flight tickets.

Accommodation for complete internship duration.

# Bain & Company

## Profile and Location:

Associate Consultant  
Bengaluru, Gurgaon, Mumbai

## About Bain & Company:

Bain is a global consultancy that helps the world's most ambitious change makers define the future. Across 65 cities in 40 countries, they work alongside their clients as one team with a shared ambition to achieve extraordinary results, outperform the competition, and redefine industries.

They complement their tailored, integrated expertise with a vibrant ecosystem of digital innovators to deliver better, faster, and more enduring outcomes. Their 10-year commitment to invest more than \$1 billion in pro bono services brings their talent, expertise, and insight to organizations tackling today's urgent challenges in education, racial equity, social justice, economic development, and the environment.

## Job Description:

**The Summer Internship Consultant program offers a unique opportunity to gain valuable experience at a leading strategic consulting firm.** The program commences with a one-week intensive training session, equipping participants with the necessary skills and knowledge. Following this, interns are integrated into ongoing client case teams, where their academic background, insights, and perspectives are demonstrably valued. Interns will be entrusted with ownership of a distinct component of a real-world project, collaborating with the team to solve a complex business challenge. This program distinguishes itself by providing direct exposure to client cases, unlike many other internship opportunities. Interns will have the privilege of working alongside Bain's renowned knowledge experts, tackling intricate business issues faced by a diverse clientele, ranging from established global leaders to innovative start-up ventures. For individuals seeking a comprehensive understanding of real-world business decision-making processes, this program presents an invaluable opportunity.

### Shortlisting process:

Technical Interview/Case Interview, HR Interview, Resume Shortlist

### CGPA cutoff:

There was no explicit CGPA cutoff was above 8.

### Test:

N/A

### GD:

N/A

### No of interview rounds:

3

### Interview:

There wasn't any test for Bain, the interview was smooth and was conducted in 3 rounds, each would be random, associated with a consultant, a partner and senior partner.

For consult the questions asked were basically cases guesstimates, profitability, market entry and conventional cases. The pattern varies depending on companies, the rounds are of same level of difficulty in Bain. In the interview one should not be nervous, the more nervous you are the more crude would be your answers.

Round-1 would be quite lite but as the round proceeds the interviewers are the people at higher hierarchy and it's better to be calm in front of them.

### Preparation Material & strategies:

**Materials**—case interview crack, IIM case books, IITM Case club's case book, SRCC case book, IIM Ahmedabad case book, Shweta (an IITM alum) YouTube channel, starting off with IIM Ahmedabad Case book is not something that is suggested.

**Strategies**-- Forming a case group among other students preparing for the same is very helpful.

In the group, one person is advised to follow one resource if there is lack of time and share different cases, they come across amongst themselves and students can give mock interviews in their case groups itself.

### Open for:

B. Tech- All  
Dual Degree- All  
MA- Humanities and Social Sciences

### Offers:

5

### Stipend Structure:

B. TECH, Dual Degree, MA (same structure for all programmes)  
Stipend type- monthly  
Amount- INR 1,40,000  
Other information- accommodation is provided for the entire duration of internship.  
Food and travel allowances are as per case needs.

### Fundae session:

- <https://drive.google.com/file/d/1sxiviJsPLArULxFTsRsMdP0PhYqGE7ui/view?usp=sharing>
- <https://drive.google.com/file/d/1-6S2BA6ABZtdaXegGwmNQ2taiSpbF-Uu/view?usp=sharing>

# Boston Consulting Group (India) Pvt.Ltd

## Profile and Location:

Summer Associate

New Delhi (Gurgaon), Mumbai, Chennai, Bengaluru

## About BCG:

Boston Consulting Group (BCG) is a global consulting firm that partners with leaders in business and society to tackle their most important challenges and capture their greatest opportunities. Our success depends on a spirit of deep collaboration and a global community of diverse individuals determined to make the world and each other better every day.

Boston Consulting Group, Inc. (BCG) is an American global management consulting firm founded in 1963 and headquartered in Boston, Massachusetts. It is one of the Big Three (or MBB), the world's three largest management consulting firms by revenue) along with McKinsey and Bain & Company Since 2021, the consultancy has been led by the German executive Christoph Schweizer.

## Job Description:

As a Summer Intern, the candidate will work on a case team with talented, supportive BCGers who will help them learn and encourage them to grow. They will be challenged to develop firsthand knowledge of client's critical business issues, building client-management, problem-solving, and communications skills. As a case team member, they gain a 360-degree perspective on life as a BCG consultant—from working on client projects to socializing with colleagues etc. On joining BCG, Summer Interns undergo an orientation program, which introduces them to the core consulting skills and tools. In addition, there is a well-established mentoring process that help them through their internship.

## Shortlisting process:

Buddy Case Round, Technical Interview/Case Interview, HR Interview, Resume Shortlist.

## CGPA cutoff:

There was no explicit CGPA cutoff but above 8 is good and above 9 is great.

**Test:** N/A

**GD:** N/A

**No of interview rounds:** 2

## Interview:

The most important thing in cracking the interview is to be confident. It's important the way to communicate and present oneself in interview. Staying calm is important especially in day 1.

## **Preparation Material & strategies:**

**Materials**-- Consult case Interview crack is a great reference and also IITB, IIM case books are also good.

**Strategies**-- Forming a case group for consult is really important.  
Form a case group with help of other students preparing for the same and try to gather and solve at least one or two cases a day.

## **Open for:**

B-Tech – all

Dual Degree- All

## **Offers:**

13

## **Stipend Structure:**

B. TECH, Dual Degree (same structure for both)

Stipend type- monthly

Amount- INR 3,00,000

Other information- information for accommodation, travel and food is provided once the intern joins.

## **Fundae session:**

[https://drive.google.com/file/d/1ZIsyZ6Duq2aKAXdEW0RFSmDDNXKU7\\_uS/view?usp=s](https://drive.google.com/file/d/1ZIsyZ6Duq2aKAXdEW0RFSmDDNXKU7_uS/view?usp=s)  
haring

# Databricks

## Profile and Location:

Software Development Engineer, Bangalore, India

## About Databricks :

Databricks, Inc. is an American software company founded by the original creators of Apache Spark. Databricks develops a web-based platform for working with Spark, that provides automated cluster management and IPython-style notebooks. The company develops Delta Lake, an open-source project to bring reliability to data lakes for machine learning and other data science use cases.

## Job Description:

At Databricks, our engineers constantly push the boundaries of data and AI technology. We build highly technical products that help data teams solve the world's toughest problems - from cybersecurity threat detection to cancer drug development. We do this by building and running the world's best data and AI infrastructure platform so our customers can use deep data insights to improve their business.

As a Software Engineering Intern, you will join a team of engineers to build features that contribute directly to the Databricks platform. We're hiring across all of our teams, including full stack, backend, infrastructure, systems, tools, cloud, databases, and customer-facing products. You will have a dedicated mentor and will join our 2024 intern cohort where you'll connect with engineers, other interns, and leaders from across the company.

The impact you will have:

- Work with a team to build features for the Databricks platform.
- Manage your project end-to-end, including design, code and feedback.

- Learn about building a platform that scales quickly while maintaining quality and security.

What we look for:

- You'll graduate in June 2025 with a degree in CS or related discipline.
- You'll have implementation skills with a general purpose programming language, such as Python, Java, or C++.
- You have good knowledge of algorithms, data structures, and OOP principles.
- You are excited to solve ambiguous problems with a collaborative team.

**Shortlisting process:** Technical Test, HR/Personality Test, Technical Interview/Case Interview, HR Interview

**CGPA cutoff:** NA

**Test:** One online test was based on Data Structures and Algorithms

**GD:** NA

**No of interview rounds:** 3 ( 2 Technical rounds and 1 HR round)

**Interview:** Consisting of two technical rounds and one HR round, the sequence varied with no fixed order. All rounds were conducted offline.

### Technical Interview

The technical test was notably more manageable compared to other software tests. In the technical rounds, candidates faced live coding tests, totaling three sessions. These tests aimed to evaluate the candidate's problem-solving approach and creativity by observing their thought process and ideas.



## HR Interview

The HR round followed a typical format, with a focus on the candidate's personal background and interests. Typical questions about the candidate's background were asked, along with inquiries about their aspirations and how they align with the company's goals. This round also provided an opportunity for candidates to learn more about the company and its culture.

### Preparation Material & strategies:

Collaborating with programming club and other CFI clubs in those specifications, which align with what companies actually want or go through, proved effective. Utilizing the 450 problem sheets sent by seniors from Codeforces, candidates can enhance their preparation. It's essential to start early and avoid last-minute cramming, watching one shot lectures, as companies look for consistent effort rather than rushed preparation. For competitive programming, candidates should utilize platforms like Codeforces. For instance, dedicating 15-16 hours per week initially, then reducing to 2-3 hours weekly during vacations ensures a steady pace. Engaging in competitive programming since entering IITM, candidates can maintain this habit to excel. Specifically, seniors in CS provided a 450-problem DSA sheet, which candidates should start preparing as soon as it's shared.

### Open for:

B.Tech -All

M.Tech-CS

**Offers: 1** (Software Development Engineer)

### Stipend Structure:

**Currency Type : INR**

**Stipend Type: Monthly**

Programs	Amount	Other Info (Food, Accomodation, Travel Allowance)
B. Tech	175000	Food, Accomodation, Travel Allowance
Dual Degree	175000	Food, Accomodation, Travel Allowance
M. Tech / MS	175000	Food, Accomodation, Travel Allowance

**Fundae session : NA**

# Databricks

## Profile and Location:

Software Development Engineer, San Francisco, United States

## About Databricks :

Databricks, Inc. is an American software company founded by the original creators of Apache Spark. Databricks develops a web-based platform for working with Spark, that provides automated cluster management and IPython-style notebooks. The company develops Delta Lake, an open-source project to bring reliability to data lakes for machine learning and other data science use cases.

## Job Description:

At Databricks, our engineers constantly push the boundaries of data and AI technology. We build highly technical products that help data teams solve the world's toughest problems - from cybersecurity threat detection to cancer drug development. We do this by building and running the world's best data and AI infrastructure platform so our customers can use deep data insights to improve their business.

As a Software Engineering Intern, you will join a team of engineers to build features that contribute directly to the Databricks platform. We're hiring across all of our teams, including full stack, backend, infrastructure, systems, tools, cloud, databases, and customer-facing products. You will have a dedicated mentor and will join our 2024 intern cohort where you'll connect with engineers, other interns, and leaders from across the company.

The impact you will have:

- Work with a team to build features for the Databricks platform.
- Manage your project end-to-end, including design, code and feedback.

- Learn about building a platform that scales quickly while maintaining quality and security.

What we look for:

- You'll graduate in June 2025 with a degree in CS or related discipline.
- You'll have implementation skills with a general purpose programming language, such as Python, Java, or C++.
- You have good knowledge of algorithms, data structures, and OOP principles.
- You are excited to solve ambiguous problems with a collaborative team.

**Shortlisting process:** Technical Test, HR/Personality Test, HR Interview, Resume Shortlist

**CGPA cutoff:** NA

**Test:** One online test based on Data Structures and Algorithms (DSA)

**GD:** NA

**No of interview rounds:** 3 ( 2 Technical rounds and 1 HR round)

**Interview:**

Technical Interview:

Many companies ask standard DSA questions during technical interviews. Unique question encountered was related to machine learning, where interviewers are more interested in understanding the candidate's thought process rather than expecting a perfect answer.

HR Interview:

HR interviews often focus on the candidate's resume, with detailed questions about listed projects and experiences. It is advisable to include only those projects where the

candidate feels confident, as interviewers frequently delve deeply into these areas. Asking about your learning outcomes about the projects that you mentioned.

### Preparation Material & strategies:

There wasn't a fixed schedule for preparation. Instead, utilizing problem sheets provided by the programming club and guidance from seniors proved beneficial. Active participation in competitive programming platforms like LeetCode also played a crucial role in honing problem-solving skills and staying sharp.

**Open for:** All

**Offers:** 1 (Software Development Engineer)

### Stipend Structure:

Currency Type : USD

Stipend Type: Monthly

Programs	Amount	Other Info (Food, Accomodation, Travel Allowance)
B. Tech	8500	Accomodation and Travel Assistance
Dual Degree	8500	Accomodation and Travel Assistance
M. Tech / MS	8500	Accomodation and Travel Assistance

### Fundae session :

[https://drive.google.com/file/d/1MyMwGAEqrBNzzf2z8G8UexAAWJO\\_TQSi/view](https://drive.google.com/file/d/1MyMwGAEqrBNzzf2z8G8UexAAWJO_TQSi/view)

# DE Shaw

## Profile and Location:

Technology Developer Intern

## About DE Shaw:

The D. E. Shaw group is trusted by investors across the world to manage their assets by seeking the optimal balance of risk and reward. While we're known as a pioneer in quantitative investing, we also have considerable expertise in areas that involve fundamental analysis or portfolio manager discretion. We use a combination of quantitative and qualitative tools to uncover independent, hard-to-find sources of return across global public and private markets.

Founded in 1988 over a small bookstore in downtown New York City, the D. E. Shaw group began with six employees and \$28 million in capital and quickly became a pioneer in computational finance. In the early days of exposed pipes and extension cords, tripping on a cable could take out our whole trading system. Today, the firm has more than 1,900 people around the globe and an institutional-grade (and trip-proof) infrastructure, but we still value creativity, entrepreneurship, and the spirit of discovery.

This profile and any links posted through this profile (together, the "Content") are provided for your information only and do not convey investment advice or an offer of any type with respect to any securities or other financial products. The D. E. Shaw group does not endorse any information or beliefs discussed in any links posted through this profile and makes no representation as to the accuracy or adequacy of the Content. The Content has not been updated for any information that may have changed since publication. No assurances can be given that any aims, assumptions, or expectations expressed or implied in the Content were or will be realized, or that the activities described have continued or will continue at all or in the same manner as described

### **Job Description:**

Technology Developer Intern Technology is an integral part of virtually everything we do, and our team enjoys access to some of the most advanced computing resources in the world. The technology teams work on a variety of projects ranging from the firm's diversified strategies, trading systems, portfolio management and visualization platforms, quantitative analysis tools, real time financial data feed infrastructure, high performance low latency middleware systems, or workflow tools to making talent functions more efficient and effective. Successful candidates have traditionally been the top students in their programs and have extensive software development knowledge.

### Internship Exposure:

- Gaining insights into financial domain
- Acquiring end-to-end understanding of trading systems workflow and building core trading system components
- Working on transformative tools, enhancing data analysis libraries and building data visualization platforms
- Designing and implementing scalable, real-time software

### Who we're looking for:

- The ideal candidate should be a pre-final year student with a minimum CGPA of 7.00 in Computer Science branches and 8.00 in all other branches with no current backlogs
- Their programming skills in C/C++/Java/Python should be proficient
- They should have practical understanding of CS concepts in the following areas: - Data Structures and algorithms - Operating Systems - Computer networks - Database management systems
- Problem-solving and logical reasoning abilities are important for this role

### Shortlisting process:

Technical Test: around 1:30 hr, 3 questions

Interviews:

Technical rounds 1 and 2- both interviews were around 1hr each.

HR round- just a call only

**CGPA cutoff:** 7+ for CSE and 8+ for other branches

### Test :

- Mainly focussed on DSA and OOPs, specific focus on DP and special tree data structures like segment tree.
- 3 coding questions were asked and there were separate time limits for each question.( 2 questions from dynamic programming)

**GD:** NA

### Interviews:

No of interview rounds - 3 Interview:

Round 1 and 2:

- OOP (virtual functions,virtual pointer,virtual table)
- 1 question based on stacks
- 1 question based on heaps

Round 3:

- HR questions from Resume
- Write a class for a ludo game



### Suggestions:

● For coding questions the focus seemed to be on finding the best data structure. Further refining of the algorithm is good but they are usually satisfied with good choice of data structures; Standard OOP questions.

● Think out loud during interview

● Don't mention something you are not confident in your resume

Preparation Material:

● Geeks for Geeks Interview questions

● CS2810 helped in OOPs

● Leetcode for DSA

### Open for:

BTech- All

Dual Degree-

- Aerospace Engineering
- Biological Engineering
- Biological Sciences (M.S.)
- Chemical Engineering
- Civil Engineering
- Computer Science and Engineering
- Electrical Engineering
- Engineering Design
- Mechanical Engineering
- Metallurgical and Materials Engineering
- Naval Architecture and Ocean Engineering
- Physics (M.S.)

Post Graduate Degree

### M.Tech / M.S

- Computer Science and Engg.
- Computer Science and Engg. [M.S]
- Computer Science and Engineering
- Electrical Engineering
- Communications, Networks & Signal Processing
- Control Engineering and Optimization
- Electrical Engineering [M.S]
- Electronic System Design and Instrumentation
- Integrated Circuits & Systems
- Micro Electronics & VLSI Design
- Power Systems & Power Electronics
- RF, Optics & Photonics

### Mathematics

- Industrial Mathematics & Scientific Computing

### **Stipend Structure:**

- **Stipend Type: Monthly**
- **Amount: Rs.2,00,000**
- **Other Information: Company paid accommodation for the entire duration Insurance Coverage Breakfast/Lunch/Snacks Training To and fro domestic air fare (Up to 15,000 on actuals)**

### **Fundae session : NA**

# Goldman Sachs (quant profile)

## Profile and Location:

Quant profile, Bangalore or Hyderabad

## About Goldman Sachs:

The Goldman Sachs Group, Inc. is a leading global financial institution that delivers a broad range of financial services to a large and diversified client base that includes corporations, financial institutions, governments and individuals.

Founded in 1869, the firm is headquartered in New York and maintains offices in all major financial centers around the world.

## Job Description:

### **Domestic (bangalore/hyderabad), 10 weeks summer internship,**

Our quantitative & technical engineers are at the cutting edge of our business, solving real-world problems through a variety of analytical methods. Working in close collaboration with bankers, traders and portfolio managers across the firm, their invaluable quantitative perspectives on complex financial and technical challenges power our business decisions. As a member of our team, you will use your advanced training in mathematics, programming and logical thinking to construct quantitative models that drive our success in global financial markets. Your talents for research, analysis and aptitude for innovation will define your contributions and enable you to find solutions to a broad range of problems, in a dynamic, fast-paced environment. Whatever your background, you will bring a fresh perspective and unique skill set to our business. In return, you will be trained by our experts across the firm to navigate the complexities of the financial markets and state-of-the-art methods in quantitative finance. An ordinary day is anything but. You may work on alpha-generating strategies; discuss portfolio allocation problems; and build models for prediction, pricing, trading

automation, data analysis, and more. Whichever your area of contribution, your ideas will have a measurable effect on our business and on our clients. Candidates would be required to work on a wide range of problems, including the following: Developing and validating quantitative models used:

- 1) to calculate the fair value of financial contracts (securities and derivatives)
- 2) to measure, analyze and manage the risks in our businesses (market, counterparty credit, operational, funding, and liquidity risks as well as legal, regulatory, and reputational risks)
- 3) to execute trades and make markets electronically in equity and fixed income products and
- 4) to create trading strategies, portfolio analytics, and risk management tools for the firm's mutual funds, hedge funds, and private wealth clients.

Designing and developing sophisticated software and systems using proprietary as well as modern web, mobile, and, desktop technologies:

- 1) To manage, visualize, and analyze massive sets of the market and operational data used in our trading, risk management, and control functions.
- 2) To correctly and efficiently route orders for billions of dollars of securities every day
- 3) To allow the ability to represent, transact in, and risk management all of the firm's OTC derivative positions
- 4) To distribute computations across tens of thousands of computers.
- 5) To make use of functional programming paradigm and big data solutions to develop firm's next generation modeling, pricing, and risk management platform
- 6) To contribute to key open source initiatives– e.g. GSCollections, Project Panama
- 7) To build the firm's strategic mobile platform.

### **Shortlisting process:**

Resume Shortlist

Technical test

Technical Interview/Case Interview

**CGPA cutoff:** Nil

### Test:

The test had some math problems, basic probability problems and three coding questions interlinked with each other.

GD: No

No of interview rounds: 2 rounds

### Interview:

1st round:

- Started off with "tell me about yourself". Then 2 probability problems for the rest of the interview.
- First question was based on Russian roulette (standard question).
- Second question was based on expected /average value (similar to a brainstellar problem) but had 2 dice instead of 3. Tip: build up your approach step by step (i.e., first solve for one, two then 3 dice)
- Interviewer was interested in the student approach to solve the question, even if they didn't arrive at the actual answer.

2nd round:

- The second round was conducted by a senior member of the company and started with HR-style questions, such as "Why finance?" and "What have you done related to finance?" Extensive finance knowledge was not required, and the questions were based on the candidate's responses.
- Interviewer was interested in the quant finance IDDD offered by IIT Madras (Student had taken that)
- After the HR-style questions, the interviewer presented a puzzle involving a dog and five doors. (Each night, the dog moves from one door to an adjacent door, and we do not know the dog's initial starting point. The challenge was to devise a strategy to find the dog, similar to problems found on Brainstellar.) The interviewer was open to providing assistance if needed.
- The interviewer ended the interview open to questions.

## Preparation Material & strategies:

### Test:

- Striver (Youtube channel)
- Leetcode
- Brainstellar

### Suggestions:

- Take help from seniors as such for resume formatting, resume validation etc
- Practice general HR Questions
- Solve dsa problems( leetcode) and Brainstellar problems
- Watch a couple of YouTube lectures (Channel Striver), after 5-6 videos solve questions related to it. Towards the end attend timed contests in the night

### Open for:

Undergraduate Degree:

- B.Tech - All
- Dual Degree - All
- MA - Humanities and Social Sciences

Post Graduate Degree:

- M.Tech / M.S - All
- M.Sc - All

**Offers:** 12

### Stipend Structure:

**Currency Type :** INR

**Amount :** 150000 Monthly

**Other Facilities :** No

**Accommodation :** For the first one week

**Travel Allowance :** Will be provided

**Food Allowance :** No

### Fundae session :

[https://drive.google.com/file/d/13Fd7nFrDjm6fhrprOMWT7P8tznPu8\\_dt/view?usp=sharing](https://drive.google.com/file/d/13Fd7nFrDjm6fhrprOMWT7P8tznPu8_dt/view?usp=sharing)

# Glean Search Technologies

## India Pt. Ltd.

### Profile and Location:

Software Engineer - Intern (US)

Palo Alto, California

### About Glean Search Technologies:

Glean is an American technology company specializing in enterprise-grade artificial intelligence and search capabilities. We're on a mission to bring people the knowledge they need to make a difference in the world. Glean was founded by a seasoned team of former Google search and Facebook engineers, who wondered why we don't have an easier way of finding what we need at work.

In our personal lives, we have tools to help us find pretty much whatever we need. Why don't we have that at work? And that was the beginning of Glean.

Glean searches across all your company's apps to help you find exactly what you need and discover the things you should know. We're a diverse team of curious and creative people who want to help each other get big things done—so we can help other teams do the same.

We're backed by some of the Valley's leading venture capitalists—including Sequoia, Kleiner Perkins, Lightspeed, and General Catalyst—and have assembled a world-class team with senior leadership experience at Google, Slack, Facebook, Dropbox, Rubrik, Uber, Intercom, Pinterest, Palantir, and others.

Role Glean is looking for Backend/Infrastructure engineers to build a highly performant, scalable, secure, permissions-aware system that makes all the relevant enterprise knowledge readily available to employees in all contexts of their work.

### **Job Description:**

The role provides ample opportunities to work on various aspects of building a modern cloud-native application stack using the latest best practices - examples of some technical challenges you can work on are building a scalable, reliable distributed system and underlying storage, a unified application framework, and data model that makes it easy to index diverse sources of information, end-to-end aspects of security - application layer, platform layer as well as IT security, laser focus on making the experience feel instant, while at the same time balancing the system cost implications, and tooling for comprehensive monitoring and deployment of the system in multiple cloud environments.

### **What you will do and achieve**

- Own impactful infrastructure problems from inception and architecture to production launch.
- Write well-thought-out design documents and robust, high-quality and well-tested code.
- Work collaboratively with a strong team to identify the most impactful projects we should be prioritizing in our roadmap.
- Mentor more junior engineers or learn from battle-tested ones.

### **Who you are**

- B.Tech in computer science, or related degree
- Experience working on infrastructure for distributed systems or cloud-native applications



## Key knowledge and skills

- Thrive in a customer-focused, tight-nit and cross-functional environment - being a team player and willing to take on whatever is most impactful for the company is a must.
- A proactive and positive attitude to lead, learn, troubleshoot, and take ownership of both small tasks and large features.
- Strong coding skills (for example in Go/Python/Java/C++ etc) with an emphasis on designing for reliability and scale, and writing well-tested components.
- Familiarity with cloud-native development practices in GCP/AWS/Azure is an advantage.

**Shortlisting process:** Technical Interview/Case Interview, Resume Shortlist

**CGPA cutoff:** None but the people who were shortlisted had 9+ CG

**Test:** N/A

**GD:** N/A

**No of interview rounds:** 3

**Interview:** All three were technical rounds.

- All three interviews were online with one panelist.
- The difficulty of these rounds was in increasing order.
- The first round had standard questions- anybody comfortable with DSA would be able to answer.  
For example, a graph with start and finish vertices was given. One should reach the finish from the start without passing through some specified vertices, i.e. finding the shortest path.
- Second round: Multiple meeting schedules provided. One has to make sure all these interviews are held with the minimum possible rooms used. (Solution- using greedy type of algorithms)

### **Preparation Material & strategies:**

- 450 DSA questions given by the programming club
- Resources by CDC
- GeeksForGeeks problems
- Problems in Codeforces and CodeChef.

### **Open for:**

B Tech and Dual Degree:

Computer Science and Engineering

Electrical Engineering

**Offers:** 2- Software

### **Stipend Structure:**

Currency Type: USD

Stipend Type: Monthly

B Tech and Dual Degree-

Amount:7000

Benefits: Visa Fees, USD 1000 per month for accommodation, sponsored meals, one-time USD 500 reimbursement on flights.

### **Fundae session :**

<https://drive.google.com/file/d/1kGlcP7j14b-hB8BfyoZ5SOnj5rz0k6Qn/view?usp=sharing>

# Google India

## Profile and Location:

Software Engineering Intern

Location : Bangalore, Hyderabad, Pune

## About Google India:

Google is, at its core, an engineering company. The company seeks individuals with diverse technical skills ready to tackle some of technology's greatest challenges and impact millions, if not billions, of users. At Google, engineers not only revolutionize search but also develop massive scalability and storage solutions, create large-scale applications, and build entirely new platforms for developers worldwide. From AdWords to Chrome, Android to YouTube, Social to Local, Google engineers are continuously transforming the world through groundbreaking technological achievements.

## Job Description:

### **Software Engineering Intern, Location: Bangalore, Hyderabad, Pune**

Google is seeking passionate Software Engineering Interns who are eager to create and implement complex computer science solutions. Our interns are both researchers and developers, contributing to massively scalable, distributed software systems and collaborating on numerous smaller projects with universal appeal. This role requires strong competencies in data structures and algorithms, along with a technical fascination for how things fit together.

### Key Responsibilities:

- Develop and implement scalable, distributed software systems.

- Collaborate on smaller projects that require research, awareness, interactivity, and inquisitiveness.
- Build a deep understanding of Google's products and services to continually improve them.
- Work on core products and services as well as projects that support critical functions of our engineering operations.

#### Qualifications:

- Solid foundation in computer science.
- Strong competencies in data structures and algorithms.
- Technical fascination for system integration and functionality.
- Ability to conduct research and ask insightful questions.
- Keen eye for quality and attention to detail.

#### Preferred Attributes:

- Collaborative mindset, capable of working within a global team.
- High levels of technical depth and programming skills.
- Strong problem-solving abilities and innovative thinking.

Join Google as a Software Engineering Intern and be part of a collaborative, global organization dedicated to engineering excellence and innovation.

#### **Shortlisting process:**

1. Resume Shortlist
2. Technical Test
3. HR Interview

**CGPA cutoff:** preferably 8+

## Test:

### Coding Test:

- Duration: 1 hour
- Candidates are given two questions to solve within 1hour. The test was time consuming and required efficient problem-solving and coding skills.

**GD:** Nil

## No of interview rounds:

2 Technical Rounds

No HR Round

## Interview:

There are 2 technical interview rounds.

Duration : 45 minutes each

The interview process is straightforward and not overly time-consuming. They first ask you the question and if the approach is correct, you are asked to code. You approach

## Preparation Material & strategies:

- Follow a normal schedule with regular revisions of notes and enhancement of coding skills.
- Allocate 5-6 hours specifically for resume preparation.
- Seek help from seniors for resume formatting and validation.
- Recommended to start preparing before the summer vacation of the 2nd year.
- Codeforces, GeeksforGeeks, LeetCode and guidance from seniors
- Be patient

### Open for:

#### B.Tech

- Electrical Engineering
- Computer Science and Engg.

#### Dual Degree

- Computer Science and Engineering
- Electrical Engineering
- Computational Engineering
- Data Science

### Offers: 1

#### Stipend Structure:

Stipend Type - Monthly

Currency Type - INR

Amount (BTech,) - 114000

Amount (Dual Degree, MTech) - 122000

Food - NA

Travel - NA

Accommodation - NA

#### Fundae session :

<https://drive.google.com/file/d/1Vi2fk1OKX-UPf0RgxeCXCO6TSodqK4na/view?usp=sharing>

# Graviton Research Capital

## Profile and Location:

Quantitative researcher Intern

Location - Gurgaon

## About Graviton Research Capital:

Graviton is a privately funded quantitative trading firm dedicated to excellence in financial markets research. The firm is currently seeking a Quantitative Researcher to join its team in Gurgaon. This team trades across a wide range of asset classes and trading venues, utilizing a diverse array of concepts and techniques, including time series analysis, filtering, classification, stochastic models, pattern recognition, and statistical inference. By analyzing terabytes of data, Graviton's researchers develop innovative ideas to identify pricing anomalies in financial markets.

## Job Description:

**Quantitative researcher Intern, Location - Gurgaon**

As a Quantitative Researcher at Graviton, you will be responsible for:

- Developing new or improving existing trading models using in-house platforms.
- Utilizing advanced mathematical techniques to model and predict market movements.
- Analyzing large financial datasets to identify trading opportunities.
- Providing real-time analytical support to experienced traders.

**Shortlisting process:**

1. Resume Shortlist
2. Technical Test

**CGPA cutoff: NA****Test:**

3 puzzles in 1 hour

Click pictures and submit it on portal

**GD: Nil****No of interview rounds:**

2 rounds - Technical and HR

**Interview:**

Technical Interview -

Duration : 1 hour

Interviewer will ask you to solve 6-7 questions within 1 hour

Questions - Difficult questions on probability

HR round -

sort of icebreaker, not too intense

**Preparation Material & strategies:**

- Start preparing from the mid of the 2nd semester for the internship season.
- Allocate 8-9 hours to prepare each resume.
- Seek guidance from seniors for resume formatting and validation.



- Overlook senior profiles for inspiration and formatting ideas.
- Prepare separate resumes for different profiles (e.g., Quantitative Researcher, Core positions).
- Utilize platforms like LeetCode and GeeksforGeeks to prepare for technical tests and interviews.
- Solve at least 250 DSA problems to build a strong foundation.
- Seek advice from seniors for insights into tests, interviews, case studies, and group discussions.
- Start preparation early, ideally from the beginning of the 2nd year, to allow for comprehensive profile development.
- Engage in extracurricular activities and internships to enhance overall profile strength.
- Continuously improve resume formatting and content based on feedback from seniors and industry standards.
- Stay updated with industry trends and incorporate relevant skills and experiences into the resume.

### Open for:

B.Tech

- Computer Science and Engineering

Dual Degree

- Computer Science and Engineering

**Offers: 3**

### **Stipend Structure:**

Stipend Type - Monthly

Currency Type - INR

Amount - 450000

Food - NA

Travel - NA

Accommodation - NA

### **Fundae session :**

<https://drive.google.com/file/d/1ff8Woa-SWmm0JoaELpPBsBLJc8mrtWC8/view?usp=sharing>

# IMC Trading

**Profile and Location:** Software Engineering Intern - Mumbai

## **About IMC Trading:**

IMC is a leading trading firm, known worldwide for our advanced, low-latency technology and world-class execution capabilities. Over the past 30 years, we've been a stabilizing force in the financial markets – providing the essential liquidity our counterparties depend on. Across offices in the US, Europe, and Asia Pacific, our talented employees are united by our entrepreneurial spirit, exceptional culture, and commitment to giving back. It's a strong foundation that allows us to grow and add new capabilities, year after year. From entering dynamic new markets, to developing a state-of-the-art research environment and diversifying our trading strategies, we dare to imagine what could be and work together to make it happen.

## **Job Description:**

At IMC, Software Engineers don't just write code and design technology. They are responsible for spotting new opportunities, developing new technologies and solving problems. Every day our software makes millions of trading decisions in some of the most competitive markets across the globe, and we win by making smarter and faster decisions than our competition. Our Software Engineers deliver results and make a difference.

As a Software Engineer Intern at IMC, you will be supported by a mentor who will oversee your projects and professional development. You will also have access to pair programming and code reviews.

Your Core Responsibilities

- From day one, you are immersed in real projects, complex problem solving and opportunities to learn from our strongest engineers and traders.
- Develop your knowledge of algorithm complexity, professional design, and writing fluent code with our state-of-the-art technology.
- Work collaboratively in an environment where creativity, teamwork and innovation are recognised and rewarded.
- Enhance your knowledge of our business model and learn about high-frequency trading.
- Build key relationships across our trading and technology teams.
- Have the opportunity to secure a full-time role with IMC once you graduate.

### **Shortlisting process:**

**Resume Shortlist, Technical test, Group Discussion, Technical Interview/Case Interview, HR Interview.**

**CGPA cutoff:** NA

### **Test:**

Major focus was mainly on online coding test - algorithm based 3-4 medium level questions

**GD: Basically an interview** - to design a software

It had a booklet of 20 pages which had complete information of what software was supposed to be designed - with 20 mins prep time.

There were 4 interviewers and the interview was for 30 minutes where the approach to the problem was discussed

Next 50 minutes was for coding it in the interviewer's laptop itself

They run and see how many test cases it passes.

**No of interview rounds: 1 technical + 1 HR**

**Interview: 2 hours long technical interview + 1 hour HR round**

## Preparation Material & strategies:

**Suggestion :** What you'll need:

- An academic background in Computer Science, Engineering, or equivalent.
- Commenced your penultimate year of study.
- Strong analytical skills and desire to solve complicated problems programmatically.
- Proficient experience in a programming language (Java or C++ required).

## Preparation :

Resume Building (4-5 Days):

- Utilize a resume template provided by your Career Development Center (CDC) to efficiently draft your resume within 4-5 days.
- Begin practicing competitive programming (CP) on platforms like Codeforces by the end of your first year. This strengthens your coding skills.
- Start familiarizing yourself with common interview resources like online assessment questions from target companies a month before your summer break begins.
- Dedicate 6-7 hours daily during your summer break (2nd year) to hone your technical skills.
- Utilize resources like:
  - Online platforms like LeetCode for practicing Data Structures and Algorithms (DSA) problems.
  - A curated list of 450 DSA problems readily available online.
- Focus on mastering these resources to solidify your understanding of core concepts.

**Open for:** Electrical and Computer Science branches

**Offers:** 6

### **Stipend Structure:**

Currency Type : INR

Stipend Type : Monthly

B.Tech - 250000

Accommodation, Meal allowance for Lunch and Local  
Commute provided by Firm

### **Fundae session :**

<https://drive.google.com/file/d/1y7qiG8NlU6MogLcXW6rf0KxnCQ3ckmtX/view?usp=sharing>



**Profile:** ITC\_KITES Internship

**Location:** Pan India

**About ITC:**

ITC is one of India's foremost private sector companies and a diversified conglomerate with businesses spanning Fast Moving Consumer Goods, Hotels, Paperboards and Packaging, Agri Business and Information Technology. The Company is acknowledged as one of India's most valuable business corporations with a Gross Revenue of ₹ 69,481 crores and Net Profit of ₹ 18,753.31 crores (as on 31.03.2023). ITC was ranked as India's most admired company, according to a survey conducted by Fortune India, in association with Hay Group. ITC is the country's leading FMCG marketer, the clear market leader in the Indian Paperboard and Packaging industry, a globally acknowledged pioneer in farmer empowerment through its wide-reaching Agri Business, a pre-eminent hotel chain in India that is a trailblazer in 'Responsible Luxury'. ITC's wholly-owned subsidiary, ITC Infotech, is a specialized global digital solutions provider.

**Job Description:**

**KITES** intITC invites the leaders of tomorrow to apply for **KITES – ITC's Summer Internship Programme**. We are excited to select students who aspire to intern with ITC's technology function. **Knowledge, Initiative & Talent Excellence Series (KITES)** is ITC's Summer Internship Programme designed to provide tomorrow's leaders with a unique platform to learn, experience, and manage real business situations. Indeed, KITES is a one-of-a-kind programme!

### Programme Highlights:

- **Hands-on Experience:** Interns will face the rigours of actual work/business scenarios, applying theoretical learnings on the job, and gaining valuable insights into management, leadership, and everyday challenges.
- **Mutual Benefit:** Interns gain practical experience while ITC benefits from fresh ideas, perspectives, and observations brought by the interns.
- **Duration:** The internship spans 8 weeks, during May and June each year.
- **Talent Identification:** KITES helps identify exceptional talent from India's top institutions with the potential to become future leaders at ITC.
- **Pre Placement Offers (PPOs):** Based on performance, interns may receive PPOs, making KITES a primary source of talent acquisition for ITC.

### What to Expect:

- **Live Projects:** Interns work on critical projects derived from the Division's business plan.
- **Exposure to Best Practices:** Engage with best-in-class systems and practices in the technology domain.
- **Mentorship and Reviews:** Regular mentorship and periodic reviews.
- **Presentation to Management:** Interns who deliver superior results present their recommendations to the Division's Management Committee.
- **Pilot Opportunities:** Successful interns may pilot their recommendations before the internship ends.

### ITC's Environment:

- **Dynamic Organization:** Experience a dynamic, growing organization with one of the largest distribution networks in the country.
- **Cutting-edge Technology:** Engage with advanced technology and proven manufacturing and supply chain expertise.
- **World-class Brands:** Work with indigenously developed brands like Sunfeast, Aashirvaad, Bingo!, Fiama Di Wills, Classmate, Yippee!, Mangaldeep, Vivel, Engage, and more.

**Apply for KITES and embark on an exciting journey with ITC!**



### Shortlisting process:

- Technical test
- Group discussion
- Technical interview
- HR interview

**CGPA cutoff:** No

**Test:** The difficulty level of the questions was moderate, but managing time during the tests was crucial. It's beneficial to practice with many tests to improve time management skills.

**GD:** Eight students participated in the group discussions, which involved standard questions. For Group Discussions it is always good to initiate the discussion and better not to be hesitant while speaking at the same time not speak over others and be a good listener and try to build and contribute to the conversation and try to summarize and end the conversation.

**Interview:** The interview was not very difficult, but it is essential to be thorough with the details on your resume and your project experiences.

### Preparation Material & strategies:

#### 1. HR and Aptitude Questions:

- Questions from a set of 64 HR questions.
- Practice online math aptitude questions.

#### 2. Interview Preparation:

- Use resources from the Oratory Club.
- Have mock group discussions (GD) with friends.
- Revise core concepts for the interview.

### **3. Technical and Domain-Specific Resources:**

- DSA: "take U forward," NeetCode, LeetCode.
- Finance: Zerodha Varsity, Finshots podcast, basic YouTube videos.
- Probability: Brainstellar, "Heard on the Street," "50 Challenging Problems in Probability."

#### **Open for:**

Btech: Mechanical, Electrical, Chemical

Dual degree: Mechanical, Electrical, Chemical, Engineering Design

#### **Offers: 6**

#### **Stipend Structure:**

Currency type: INR

Stipend type: Monthly

Stipend amount: 220000

Other Information: Includes accommodation and travel expenses during the entire course of internship.

# JP Morgan

## Profile and Location:

CIB Research & Analytics – Markets

Mumbai

## About JP Morgan:

JP Morgan Chase & Co. is an American multinational financial services firm headquartered in New York City and incorporated in Delaware. It is the largest bank in the United States and the world's largest bank by market capitalization as of 2023.

J.P. Morgan is a global leader in financial services, providing strategic advice and products to the world's most prominent corporations, governments, wealthy individuals, and institutional investors. The Corporate & Investment Bank is a global leader in investment banking, wholesale payments, markets, and securities services. The world's most important corporations, governments, and institutions entrust us with their business in more than 100 countries. We provide strategic advice, raise capital, manage risk, and extend liquidity in markets around the world. Clients turn to our industry-leading Markets, Sales and Research team to offer clients unique market insights on sectors and companies, and actionable ideas using research to make well-informed investment decisions. Teams understand products across asset classes and help clients structure solutions that manage risk, enhance yield, and solve complex financial problems.

## Job Description:

### CIB Research & Analytics

The Corporate & Investment Banking Research & Analytics is an integrated specialist team covering Origination (Banking and Markets), Products (Securities Services and Treasury Services), Research and Data Analytics globally. We help global corporations, institutions and organizations of all sizes grow their businesses by providing cutting edge analytics and solutions. This group provides you an opportunity to collaborate and work in a high paced global environment and develop a wide range of technical (financial, analytical, quantitative, and coding) and interpersonal skills. Depending upon the function you are part of, you will be making an impact in providing solutions to our Corporate & Investment Banking clients.

### What to Expect

J.P. Morgan's Markets Group (part of CIB Research & Analytics) in Mumbai was set up as an extension of the Firm's global markets teams across regions. It's a growing team covering multiple asset classes within the Markets umbrella – Fixed Income /Equities - across geographies. The activities can be broadly bucketed as Sales, Trading & Structuring, Finance and Sales support. The Sales teams are extensions of local markets sales teams and work on end-to-end product support for derivative trades in the given asset classes. Work includes Pitchbooks, pricing, back-testing and analysis, and legal documentation of the products – both vanilla and exotic derivatives. The Structuring and Trading team in Mumbai will be part of the Global Equity and Credit Derivative Groups. The work involves maintenance, creation and development of new tradable assets, on which J.P. Morgan sells derivative products to clients (delta one swaps, notes, certificates, options etc.).

The key responsibilities of the team include back testing and analysis of existing and new proprietary strategies, structuring and pricing of derivative products, making marketing material and legal documents etc. Overall, the candidate will need to work closely with the Investable Indices Team (part of Cross-asset Derivatives Structuring Teams) and will need to be proactive to improve desk efficiencies, access and learn J. P. Morgan's highly sophisticated strategies.

The CCAR teams perform in-depth data analysis, using statistical and machine learning modeling techniques including decision trees, neural networks, to creatively build predictive or explanatory models.

### **Responsibilities:**

- New product development: Implementing new ideas that the team generates, devising/improvising on new strategies, coding, and back-testing strategies in Python.
- Idea analysis and generation: Working with the Structuring/Sales desks on various flow and tailor-made structuring requests, building models in Excel, back-testing strategies, and reconciling back-tests prepared in parallel. Expected to take up initiatives to come up with product ideas based on market research and analysis.
- Model development: Perform in-depth data analysis, using statistical and machine learning techniques, to creatively build alpha-generating investable index strategies catering to the diverse needs of institutional clients. • Product Pricing: Devise and provide pricing on derivative structures using internal pricing models as per the client requirements.
- Maintenance of existing Systematic Trading Strategies: J.P. Morgan is one of the leading providers of investable indices to its clients. The candidate will be required to learn these complex strategies and maintain them on a python-based platform which involves reconciliation of existing strategies, coding trading and client specific reports.
- Platform Development: The role offers good opportunities to independently suggest ideas and drive J.P. Morgan Investable Indices platform development.
- Business Intuition: Translate business needs into quantitative analyses and tools; communicate complex results to senior stakeholders in a clear and precise manner.
- Market Monitoring: Compile periodic reports on key developments in the economy, interest rate and currency markets and providing customized market outlook based on internal market research reports.

- Devising/improving models on new/existing regression analysis. This includes coding the entire statistical methodology in R, Python
- Translate business needs into quantitative analyses and tools; communicate complex results to senior stakeholders in a clear and precise manner
- Develop metrics and statistical model prototypes that can be used to influence business outcomes.
- Lead and participate in ad-hoc projects as needed by senior management or regulatory initiatives
- Work as part of a sales team that focuses primarily on fixed-income derivatives and structured investment products. Devise and provide pricing on derivative structures using internal pricing models and help with post-trade processes like instrument creation, assist with booking, note issuance process, and term sheet preparation.
- Analyzing the research reports and trade ideas from various sources and generating strategies relevant to our client base.
- Combining the product knowledge with the market research and generating pitch books / factsheets which highlight why a particular product is suited for the current environment.
- Taking responsibility for post-trade lifecycle events and assist with any client queries (settlements issues, lifecycle calculations, reconciliations, legal document checks).
- Influence the process improvement and automation agenda for the sales team. Develop process automations for daily tasks. Make use of automated pricing tools from the desks, contribute to the development to meet client's needs and help roll-out the capabilities to clients.

#### Essential Skills:

- Strong knowledge and experience in pricing of derivatives – indices, futures and options
- Strong knowledge of Equities, FX, Rates, Credit or Commodities
- Proven experience programming in any object-oriented programming language or functional (statistical/numerical) programming language (Python, R etc.)
- Analytical aptitude and ability to learn financial concepts

- Knowledge of probability theory, statistics, and machine learning would be an advantage.
- Advanced user of MS Excel (VBA knowledge would be an advantage)
- VBA and any programming language knowledge can be an advantage
- Good communication and team skills in a multi-location setup
- Strong communication skills (both written and verbal) and ability to present findings to a non-technical audience
- Must be willing to work in Asia, UK, or US hours depending on the alignment of work.
- Close attention to detail and ability to work to very high standards

Join Us at J.P. Morgan, we're creating positive change for the diverse communities we serve. We do this by championing your innovative ideas through a supportive culture that helps you every step of the way as you build your career. If you're passionate, curious and ready to make an impact, we're looking for you.

#### Shortlisting process:

Technical Test, Technical Interview/Case Interview, HR Interview, Resume Shortlist.

CGPA cutoff: N/A

Test: Technical Test

GD: N/A

No of interview rounds: 2

Interview: Technical Interview/Case Interview, HR Interview

#### Preparation Material & strategies:

-For interviews specifically, it is good to browse through the 64 HR questions book.

-Good to prepare Data Science roles by brushing up on ML/DL concepts. Look up concepts in Pattern Recognition and Machine Learning and another book called Hands-on ML.

-For finance concepts, material in the IDDD placement drive folder and concepts from

Investopedia.

-For quant problems and puzzles- Brainstellar, Heard on the Street, and Fifty challenging problems in probability will help.

-It is good to solve DSA questions regularly to prepare for software roles.

Open for:

B.Tech- All

Dual Degree-

- Aerospace Engineering
- Biological Engineering
- Biological Sciences (M.S.)
- Chemical Engineering
- Civil Engineering
- Computer Science and Engineering
- Electrical Engineering
- Engineering Design
- Mechanical Engineering
- Metallurgical and Materials Engineering
- Naval Architecture and Ocean Engineering
- Physics (M.S.)
- Quantum Science & Technology



**Offers:** 3 (Software Engineer Program, CIB Research & Analytics – Markets, Quantitative Researcher)

**Stipend Structure:**

Stipend type: Monthly

Currency Type: INR

Amount: INR 150000 -for both B Tech and Dual Degree

One-time relocation assistance- INR 50,000

**Fundae session :** N/A

# JP Morgan

## Profile and Location:

Quantitative Researcher

Mumbai/Bangalore

## About JP Morgan:

JPMorgan Chase & Co. is an American multinational financial services firm headquartered in New York City and incorporated in Delaware. It is the largest bank in the United States and the world's largest bank by market capitalization as of 2023.

J.P. Morgan is a global leader in financial services, providing strategic advice and products to the world's most prominent corporations, governments, wealthy individuals, and institutional investors. The Corporate & Investment Bank is a global leader in investment banking, wholesale payments, markets, and securities services. The world's most important corporations, governments, and institutions entrust us with their business in more than 100 countries. We provide strategic advice, raise capital, manage risk, and extend liquidity in markets around the world. Clients turn to our industry-leading Markets, Sales and Research team to offer clients unique market insights on sectors and companies, and actionable ideas using research to make well-informed investment decisions. Teams understand products across asset classes and help clients structure solutions that manage risk, enhance yield, and solve complex financial problems.

## Job Description:

Quantitative Research (QR) is an expert quantitative modeling group in J.P. Morgan, as well as a leader in financial engineering, data analytics, statistical modeling, and portfolio management. As a global team, QR partners with traders, marketers, and risk

managers across all products and regions, and contributes to sales and client interaction, product innovation, valuation and risk management, inventory and portfolio optimization, electronic trading and market making, and appropriate financial risk controls.

The QR team in Mumbai was established in 2015 and has grown since to provide quantitative finance support to various businesses including Equities, Fixed Income, Spread, Commodities, Counterparty Credit Risk, Market Risk and Wholesale Credit Risk. We provide on-the-job training, intensive internal classroom training, and online courses, all given by our experienced quants .

### Responsibilities:

As a Quantitative Researcher, you could have one or more of the following responsibilities:

- Develop and maintain sophisticated mathematical models to value and hedge financial transactions ranging from vanilla flow products to complex derivative deals
- Improve the performance of algorithmic trading strategies and promote advanced electronic solutions to our clients worldwide
- Collaborate with risk functions to develop models for market and credit risk the bank is exposed to, across various lines of business
- Build cutting-edge methodologies and infrastructure to implement our models in production

### Minimum Skills, Experience and Qualifications:

We are looking for someone excited to join our organization. If you meet the minimum requirements below, you are encouraged to apply to be considered for this role.

- You have/are pursuing a degree in engineering, financial engineering, computer science, mathematics, sciences, statistics, econometrics, or other quantitative fields
- You have strong quantitative, analytical and problem-solving skills
- You have a strong background in the following topics – calculus, linear algebra, probability, and statistics

- You demonstrate proficiency in at least one of the object-oriented programming languages, like C++ or Java, and are good at one of Python or R
- You have knowledge of data structures and algorithms.
- You can work independently as well as in a team environment
- You think strategically and creatively when faced with problems and opportunities.
- Your excellent communication skills, both verbal and written, can engage and influence partners and stakeholders.

### Additional Skills, Experience and Qualifications:

The following additional items will be considered but are not required for this role

- Markets experience and general trading concepts and terminology is useful to be familiar with.
- Knowledge of different types of financial products and asset classes like Fixed Income, Credit, Commodities, Equities
- Background in computer algorithms, python, and specialization (or significant coursework) in low-level systems (operating systems, compilers, GPUs, etc.)
- Knowledge of options pricing theory, trading algorithms, financial regulations, stochastic calculus, machine learning, or high-performance computing would be a plus.

To work on tasks that replicate the kind of work that the QR team does every day and gain an understanding of the skills required to be successful in the role, we suggest signing up for this free QR Virtual Internship Program:

<https://www.theforage.com/virtual-internships/prototype/bWqaecPDbYAwSDqJy/Quantitative-Research>

### Shortlisting process:

Technical test, Technical Interview/Case Interview, HR Interview, Resume Shortlist

**CGPA cutoff:** N/A

**Test:** Technical Tests: Maths + Coding-based questions

Slightly hard and intensive.

**GD:** None

**No of interview rounds:** 3 rounds

1st two -Technical and 3<sup>rd</sup>- HR round.

### **Interview:**

The initial round focused on delving into the resume and assessing problem-solving abilities. A question on computing the factorial of 8 through recursion provided insight into both technical proficiency and algorithmic thinking, while a Bayesian theorem question tested analytical skills.

In the subsequent round, a deeper dive into logic and coding was conducted, featuring six questions that demanded clear articulation and problem-solving prowess. With an emphasis on logical explanations, and solving on pen and paper- it is to be noted that many questions from Neetcode were asked. Both the rounds took roughly 20 minutes.

Also asked were the projects done: DOMS HOD project fin-based, a couple of self-projects based on: Stock Market Analysis, Algo Trading, a few basic ML projects, Node JS.

### **Preparation Material & strategies:**

- It is good to start Competitive Programming (CP) early, Codeforces is suggested.
- For a firm grip on CP, giving contests and solving problems daily is suggested.
- The DSA playlist from Neetcode.io is recommended.
- Focus more on building tech skills and improving your logical reasoning abilities. Brush up on math concepts. Learn some finance.
- Probability course MA2040 is better than LinAl. MA2040 reference book will suffice.
- For quant problems and puzzles, Brainstellar, and Heard on the Street will help.
- Go through Fin CFA notes.
- DSA 180 problem sheets.

- It is suggested to start deciding on the profiles in the 4th semester and begin working on them in the summer vacations just preceding the internship season.

**Open for:**

**B Tech-** ALL

**Dual Degree-** ALL

**Offers:** 3 (Software Engineer Program, CIB Research & Analytics – Markets, Quantitative Researcher)

**Stipend Structure:**

Stipend type: Monthly

INR 150000 -for both B Tech and Dual Degree

One-time relocation assistance- INR 50,000

**Fundae session :** N/A

# Media.net (Directi)

**Profile and Location:** Software Development, Mumbai/Bangalore

## About Media.net (Directi):

Media.net is a leading global advertising company with one of the most comprehensive portfolios of advertising technology in the industry across search, native, display, mobile, local, products and video. Media.net manages high-quality ad supply on over 500,000 websites and its platform and products are licensed by some of the largest publishers, ad networks and other ad tech companies worldwide.

By market cap, Media.net is one of the Top 5 largest ad tech companies worldwide. By revenue, Media.net is the second largest contextual advertising business worldwide.

Media.net has 1300+ employees in key operation centres across – North America, Europe and Asia. Media.net's US HQ is based in New York, and Global HQ in Dubai.

## Job Description:

- As an intern you will engage in product engineering efforts at Media.net and work with world class dev teams to develop game-changing, globally distributed, Web 2.0 products used by millions worldwide.
- You will be involved in the entire lifecycle of a project, including strategy, vision, design, UX, coding, architecture, deployment etc, and will be chiefly expected to deliver clean, testable and well-designed code for the same
- You are acquainted with / have mastered a few of the following skills/tools :  
Java, C#, PHP, Ruby, Python, C++, Javascript, WPF, Erlang, Haskell, LISP, Linux, Flex, XUL, Bash, Advanced Networking, Async IO, Routing, TCP/UDP, Postgres, Data structures, Advanced RDBMS, MySQL, MSSQL, neo4j, BDB, REST, SOAP,

IPC, RPC, HTML, CSS, Ajax, Agile, TDD, XP, Scrum, caching, Load Balancing, Horizontal Partitioning, Memcached, Multi-threading, Concurrency, Scalability, Unicode, Usability / Ux, MVC, Spring, Titanium, Ant, Watir, Selenium, Git, CVS, SVN, JIRA, ... \_ad infinitum\_

- Bonus points :
  - Knowledge of Agile development methodologies (XP, Scrum etc)
  - Active Blogger
  - Contribution to Open-Source projects
  - You wrote your first program on a ZX Spectrum (Add extra points if you still own the wicked cool box)
  - Ability to rattle off the names of every planet from Issac Asimov's Foundation Trilogy in reverse alphabetical order

**Shortlisting process:** Technical Test, Technical Interview/Case Interview, HR Interview

**CGPA cutoff:** NA

**Test:** Coding test on data structures and algorithms

**GD:** NA

**No of interview rounds:** 1 Technical round + 1 Technical and HR round

**Interview:**

**Round 1:**

- Starts off with questions on various topics to gauge your experience with these. Sample questions are:
  - When would you use a binary search tree instead of an array/linked list?
  - Difference between threads/processes
  - Difference between hashing/encryption
  - What is DNS
  - Difference between index/primary key



- This is followed by DSA questions. Explanation of the algorithms followed by a Python implementation is expected.

### Round 2:

- Questions on courses that you are doing currently and your interest towards these courses are asked.
- System design questions are asked, to mainly check communication and reasoning skills rather than proficiency and knowledge.
- Some DSA questions may be asked, such as: You are given a non-directed acyclic graph. You play as red, your opponent is blue. All nodes in this graph are initially unpainted. At the beginning, you pick a node and paint it red. Then, your opponent picks a node and paints it blue. Now, the game proceeds as follows:
  - Every turn, you pick an unpainted node adjacent to a red node, and paint it red.
  - Your opponent picks an unpainted node adjacent to a blue node, and paints it blue.
  - This happens until neither of you can make a move.
  - The winner is whoever has more nodes painted in their colour.

How do you play optimally? Write an algorithm to find the correct starting node. (Do it in  $O(n)$ ).

**Preparation Material & strategies:** Practice coding problems on LeetCode, review system design principles and CS courses.

### Open for:

- B.Tech - All
- Dual Degree - All

**Offers:** 5

### Stipend Structure:

- B.Tech CTC (Annual Income) - 100000 Gross Taxable (Annual Income) - Fixed Basic pay (Monthly Income)
- Other Information - Travel Allowance
- Dual degree CTC (Annual Income) - 100000 Gross Taxable (Annual Income) - Fixed Basic pay (Monthly Income)
- Other Information - Travel Allowance
- M.Tech CTC (Annual Income) - 100000 Gross Taxable (Annual Income) - Fixed Basic pay (Monthly Income)
- Other Information - Travel Allowance

**Fundae session:** NA

# MILLENNIUM CONSULTING (INDIA) PVT LTD

## Profile and Location:

QUANT DEVELOPER INTERN, Bangalore, India

## About MILLENNIUM CONSULTING (INDIA) PVT LTD:

The Corporate technology team at Millennium is responsible for creating the systems required by the Treasury and Treasury Operations Departments. These systems cover Margin, Cash and Collateral Management, Treasury Operations, and Equity Finance; they are used across the firm by a range of users including Treasury analysts, Front Office users, Portfolio Managers, and Senior Management.

## Job Description:

The Technology division in our Bangalore office is seeking interns for Quant Developer roles:

- Fixed Income & Risk Technology – Builds and maintains technology for Fixed Income and Commodities trading teams, and for the Risk Management team covering all trading teams, asset classes, and products.
- Equities Technology -- Develops and supports the platform that enables our businesses to electronically trade most asset classes globally and to manage risk and P&L. Our teams support various functions such as Algorithmic Execution Services, Latency Critical Trading Technology, PM Research Tools, Systematic Data Platform, Equity Volatility and Convertibles Technology, Production Support and Systems Operations Engineering, Trade Capture, and Risk Management.
- Corporate Technology – The Corporate technology team at Millennium is responsible for creating the systems required by the Treasury and Treasury Operations Departments. These systems cover Margin, Cash and Collateral Management, Treasury Operations, and Equity Finance; they are used across the firm

by a range of users including Treasury analysts, Front Office users, Portfolio Managers, and Senior Management.

**Shortlisting process:** Technical Test, HR/Personality Test, HR Interview

**CGPA cutoff:** NA

**Test:** They asked DSA and prob problems.

**GD:**NA

**No of interview rounds:** NA

**Interview:**

During the interview process, candidates encountered a mix of competitive programming (CP) problems and software-related questions. While the technical rounds assessed candidates' problem-solving abilities through CP problems, there was also a focus on software-related challenges.

However, the primary emphasis was on the HR interview, where candidates were likely to encounter questions about their background, skills, and aspirations. This balanced approach ensured that candidates' technical prowess and interpersonal skills were thoroughly evaluated, reflecting the holistic nature of the selection process.

**Preparation Material & strategies:**

To prepare, the candidate started by looking up common questions asked in tests and group discussions for the company they were interested in. They also made sure to read the job description and learn about the company. Daily practice of competitive programming (CP) and problem-solving was key, along with seeking advice from seniors for resume formatting. While they regularly did CP, they intensified their focus on internship-specific prep during vacations, starting three months ahead. Notably, they dedicated one week just for interview prep, showing they prioritized refining their

interview skills close to the interview date. This organized approach helped them tackle both technical assessments and interviews effectively.

### Open for:

- Engineering Physics
- Electrical Engineering
- Computer Science and Engg.

**Offers:** Quant Developer Intern, Quant Research Intern

### Stipend Structure:

**Profile:** Quant Developer Intern

**Currency:** INR

**Stipend Type :** Monthly

Program	Amount	Other Info (Food, Accomodation, Travel Allowance)
B. Tech	350000	50000

**Profile:** Quant Research Intern

**Currency:** INR

**Stipend Type :** Monthly

Programs	Amount	Other Info (Food, Accomodation, Travel Allowance)
B. Tech	350000	50000
Dual Degree	350000	50000
M. Tech / MS	350000	50000

MS	350000	50000
Phd	350000	50000

Fundae session : NA

# MORGAN STANLEY

## Profile and location:

Sales and trading,Mumbai.

## About Morgan Stanley:

Morgan Stanley's Fixed Income division encompasses interest rate and currency products, credit products, and distribution. Professionals in this division assess and actively manage risk, trade securities, and structure and execute innovative transactions in the dynamic global markets. The Commodities division is a market leader across a wide range of commodities markets, excelling in client risk management, financing solutions, and investor product sales and trading. From the largest global institutions to innovative new hedge funds, investors turn to Morgan Stanley for sales, trading, and market-making services across almost every type of financial instrument, including stocks, bonds, derivatives, foreign exchange, and commodities. Our professionals provide liquidity and content to clients worldwide, actively assessing and managing risk, trading securities, and planning and executing transactions in the fast-changing markets. As client needs become increasingly complex, we frequently develop customized solutions. Our dedicated global team, known for its leadership in risk management, monitors and manages risk through a combination of statistical analytical tools and stress tests. We employ a combined top-down and bottom-up holistic approach to create the most comprehensive margin policies, considering portfolio correlations and shifts, and incorporating sensitivities to hedges.

## **Job description:**

The Summer Program at Morgan Stanley spans two months and offers participants a comprehensive understanding of the pivotal role Fixed Income plays within the organization. Structured rotations across various desks provide invaluable insights into the division, facilitating the development and honing of analytical, quantitative, and interpersonal skills crucial for a fulfilling career.

## **Training and Development:**

This intensive program entails firm-wide orientation to Morgan Stanley's businesses and specialized division-specific training. Continuous learning is fostered through structured sessions led by senior executives. Moreover, participants engage with peers and senior colleagues through networking, social, charity, and mentoring events.

## **Roles and Responsibilities:**

In Sales, individuals gain hands-on experience in client relationship building and investment idea presentation. In Trading, they execute trading ideas and support the market-making process. Structuring exposes participants to valuation modeling techniques, optimizing transaction economics and risk quantification. Analytics equips individuals with the ability to provide insightful metrics and analytics to drive business and client strategies.

## **Candidate Requirements:**

Candidates in their penultimate year pursuing degrees in Financial, Economics, Mathematics/Engineering, or business-related studies are preferred. A keen interest in financial markets, along with strong verbal and written communication skills, is essential. The program seeks analytical, quick-learning, team-oriented individuals with a positive attitude.



### Shortlisting process:

- Technical test
- Technical interview/case interview
- HR interview

**CGPA cutoff:** Nil, but 8+ Suggested

**Test:** Contains questions from Coding, Probability, English, Math, Logic

**GD:** None

**No of interview rounds:** 3 (Two technical and one HR)

### Interview:

- First Round: Technical Round (Quant Puzzles)
- Second Round: Mainly focused on the resume submitted.
- Final Round: HR Interview

### Preparation Materials and strategies:

- Daily Problem Solving: Dedicating 3-4 hours per day to solve Data Structures and Algorithms (DSA) and Competitive Programming (CP) problems during the 4th semester.
- Utilized Senior Circulated DSA Compilation List: Used a DSA compilation list shared by seniors, containing approximately 300 DSA problems, to prepare for tests.
- Use the sources like : "Heard on the Street" which is a popular resource for quantitative finance interview preparation, while InterviewBit provides coding practice, and MA2040 coursework and the PoE textbook offer foundational knowledge in mathematics and econometrics, respectively.

**Open for:**

All students of BTech, dual degree, msc and humanities and social sciences

**Offers:** 0

**Stipend structure:**

- Currency Type : INR
- Amount : 165,000/\_

**Fundae Session:** NA

# Optiver

## Profile and Location:

Quantitative Trading Internship 2024 (Amsterdam)

## About Optiver:

Optiver is an industry leader across everything we do. We don't just meet industry standards; we aim to set them! With trading teams focusing on a broad range of options and delta1 products we are able to provide an unrivaled universe of exciting opportunities for our employees. Through our core function as a market-maker we continuously improve the market by being the source of liquidity for market participants

## Job Description:

### Trading Internship 2023(Amsterdam):

As a Trader Intern at Optiver in Amsterdam you will be given full insight into what it takes to be a trader at our company and based on your performance could receive an offer to return at the end of your studies.

If you are in your penultimate year of university, have excellent analytical skills and a passion to prove yourself then you could be the Trader Intern we are looking for.

### What you'll need:

- Penultimate year student in Mathematics, Physics, Computer Science, Engineering, Finance or equivalent, with ability to work full-time upon graduation in 2024
- Excellent numerical and analytical skills
- A proactive problem-solving nature
- Fast decision-making skills under pressure
- Competitive attitude and eagerness to constantly improve yourself
- Great attention to detail
- Computer programming skills are not required but definitely a plus
- Fluency in English (Dutch is not required)

### Want to find out more?

You can also learn more about what it would be like to be a trader at Optiver here (<https://www.youtube.com/watch?v=sK-HqhT6nA0>), or have a look inside our Amsterdam office (<https://youtu.be/kTqejjQP8pM>)!

**Shortlisting process:** Resume Shortlist, Test, GD, Interview.

**CGPA cutoff:** 7.5 and above

**Test:** Yes, mode will be online.

Topics asked: Mental math, cognitive ability, numerical reasoning, verbal reasoning, Probability, guesstimates, puzzles, quick mental arithmetic and pattern recognition.

### Sample questions:

- Find no of trees in the amazon rainforest
- Value of gold medals that can fit in a swimming pool
- Ted ed's black and white hat puzzle
- Wizard standoff puzzle
- Expected value and the standard deviation of the sum of 3 cards, and how it would change as the number of cards considered increases.
- There was also a question on making a market on the number of Microsoft Windows copies sold every year(making a market refers to a trading game in which you quote bid and ask prices depending on how sure you are about the value which in this case is the number of Windows copies sold)
- Test pattern: Objective, Subjective

**GD:** Yes, mode will be online.

- GD Topics: Market making, probability, HR
- Number of people in GD: More than 5
- Companies' expectation: Teamwork, collaborative thinking, appropriate measures for guesstimate, probability problem solving
- GD experience: They asked us to play a market making game and relevant information for this was shared by them a few days before GD.

## **Interview:**

**No of interview rounds** -1 Technical round + 1 HR round

### Round 1:

- Expected Value of sum of cards
- What would the price of 1\$ in Amazon's IPO be worth now
- Pick 4 cards, drop lowest, expected value? pick 3 cards, swap lowest, expected value? which is higher?
- Any situation that you evolved out of, do 7/13 in your head, speed questions like morning or night, etc.
- Guesstimates, expected values and probability( most questions involved playing cards).
- Few aptitude and logical questions were also asked

### Round 2 (HR Round) :

- Travel experience summary
- What is your biggest failure in life?

## **Suggestions:**

- Do not panic. Do not get stressed out. This is entirely a stress test and they want to know if you can stay calm under pressure or do you crack.
- 15 seconds is long enough to solve the question they give you if they expect an exact answer else, they expect only an estimate so you just have to make approximations.
- Do not worry about wrong answers and focus on the next question.
- Don't interrupt the interviewer when he gives hints, and do a mock interview with a friend.
- Have clear and precise communication.
- They test how quick you are at answering the questions, the ability to think laterally and out of the box, quantitative aptitude and math skills.

## Preparation Material:

- Optiver gives a guide
- As a part of prep for Optiver, the only must solved are maybe Heard on the Street and 50 problems in probability
- I would say books and websites on probability as well as mental mathematics
- Trading jobs.net - 80 questions in 8 mins (Refer to Bluebook video for more).
- "Heard on the streets' ", " 50 puzzling problems in probability", MA2040 course book, Brainstellar, heard on the Street are useful resources.
- "The 64 questions for HR " Book is helpful for soft skills development.

## Open for:

- B.Tech: All
- Dual Degree: All
- IDDD: Advanced Materials and Nanotechnology, Biomedical Engineering, Computational Engineering, Data Science Robotics, Quantum Science and Technology, Tech MBA, Complex Systems and Dynamics, Cyber Physical Systems, Electric Vehicles.

## Stipend Structure:

**Currency Type: Euros**

**Amount: 40,000**

### Brief Description:

- Competitive salary: €40,000EUR total compensation over the 8-week period (₹35,90,320.00 INR)
- (Paid) furnished housing arrangement provided by Optiver in the city center of Amsterdam
- Awesome social events and outings (boat tours through the canals of Amsterdam, BBQ's etc.)
- Free breakfast, lunch, and dinner provided at Optiver, weekly massages & a bicycle to explore Amsterdam.
- Most importantly, the possibility to receive a full-time offer upon completion of internship back in our Amsterdam, Sydney or Mumbai office

**Fundae session: NA**

# Optiver

## Profile and Location:

Software Engineering Internship 2024 (Amsterdam)

## About Optiver:

As a leading proprietary trading firm, Optiver works to make markets more efficient, transparent and stable for all. We have over 1,900 employees in offices worldwide, united in their commitment to providing liquidity, competitive pricing and reliable risk management.

As one of the oldest market-making institutions, we are active on multiple global exchanges, trading options, futures, equities, FX, fixed income and commodities products.

At Optiver, we seek individuals who thrive at the intersection of IQ and EQ. Our people are not just academic stars – they're also self-aware and open to feedback. At Optiver, we seek individuals who thrive at the intersection of IQ and EQ. Our people are not just academic stars – they're also self-aware and open to feedback.

## Job Description:

Software Engineer Internship 2024 (Amsterdam) Introduction Get ready for eight weeks immersed in the fast-paced, dynamic world of market making. As Optiver's Software Engineer Summer Intern, you'll fully own projects that directly impact Optiver's world-class trading systems. Experience the thrill of tight feedback loops and shipping your code to production. Receive feedback from our senior Traders, and receive mentorship from the industry's best and brightest technologists. This is your chance to make a direct impact on a leading trading firm, while launching your career in engineering. If you're looking to work in a challenging international environment and have a passion for solving complex problems, apply today to kick-start your future. What you'll do As a Software Engineer intern, you'll work side-by-side with your

mentor to build latency-critical applications that directly improve the market. From day one you'll tackle real issues that need to be solved through projects that further develop and optimize our systems. Each day will bring new challenges requiring your fresh perspective. You'll own end-to-end projects, from developing to testing to shipping your code to production. It's an unrivaled opportunity to accelerate your knowledge and make your mark on Optiver's core business. You will also have the chance to join industry lectures to learn about trading and our other departments to gain a complete understanding of Optiver and our business. Don't worry, you won't be expected to have previous knowledge of the financial industry! You'll be educated and upskilled by our world-class trainers in order to hit the ground running.

Examples of potential **projects that you could be working on:**

- The performance of our systems – profiling and optimizing our software and hardware
- Developing tools in close collaboration with our traders to improve our trading strategies
- Building a powerful tool to find errors in our systems by turning huge amounts of data into useful information In all cases you can expect that all projects will be a valuable contribution to our business, focusing on actual issues that we face and like to see solved. The internship will jump start your career! Who you are
- You are a penultimate year student with ability to work full-time upon graduation in 2025
- You have a desire to step outside your comfort zone and face fresh challenges every day
- You have a passion for technology and an interest in the financial industry
- You enjoy solving complex problems and can clearly articulate solutions both verbally and written
- You are proficient in either C++ or Python

What you can **expect from us** is an energetic and collaborative work culture with ambitious, down-to-earth colleagues. We constantly ask ourselves how to do better, which creates a stimulating and fun environment. **To be concrete:**



- An 8-week internship taking place in May 13, 2024 – July 5, 2024
- Mentoring and feedback from senior engineers on how to write clean, lean and pragmatic code, and solve complex problems with simple solutions
- Competitive salary: €40,000EUR total compensation over the 8 week period (~₹35,90,320.00 INR)
- (Paid) furnished housing arrangement provided by Optiver in the city center of Amsterdam
- Awesome social events and outings (boat tours through the canals of Amsterdam, BBQ's etc.)
- Free breakfast, lunch, and dinner provided at Optiver, weekly massages & a bicycle to explore Amsterdam
- Most importantly, the possibility to receive a full-time offer upon completion of internship back in our Amsterdam, Sydney or Mumbai office
- Have a look at this video to get a glimpse of the Optiver internship experience

### Want to find out more?

Have a look at this video to get a glimpse of the Optiver internship experience (<https://www.youtube.com/watch?v=ETX12a1gLcY>)

### **Shortlisting process:** Test and Interviews

#### **Technical Round -**

1. coding round was simple
2. system design round was tough

**HR round was tough**

**Total 3 rounds for the interview**

**CGPA cutoff:** CGPA 7.5 above

**Test:** Yes

- Topics asked: Basic DSA and conceptual questions, Software development, algorithms, clean code, design patterns.

- Sample questions : Find a loop in a linked list, implement a hard disk emulator, implement scrabble (the board game), Use callback functions (defined in interview) to write a basic trader given some API calls, Design a system to trade in Frankfurt using a laptop in Madras.
- Test pattern: Objective, Coding

**GD:** No

### **Interview:**

No of interview rounds - 2 (Technical Rounds) & 1 (HR Round)

#### Round 1 & Round 2 :

- Problem solving and Systems design
- Fundamentals of Data structures
- Reasoning based, They gave you a problem and you had to slowly think aloud to the solution.
- Knowing how to write trading code, basic working ideas of most software fields helps..
- Interviewer gave a situation to design a system for. You have to discuss with the interviewer and explain your decisions.
- System design round requires you to have a basic overview of how computers work and latencies and requirements to build something.
- In each of the problems they evaluated your thinking process, articulation, code quality and understanding.

#### Round 3 (HR Round) :

- Personality, strengths and weaknesses
- General HR questions.
- HR round requires you to be yourself and honest

Suggestions:

- Be friendly, enthusiastic and talk to your interviewer with confidence
- Don't give up mid interview. Keep thinking aloud, they will help you out if you are stuck.

- They prefer people with a good amount of coding experience, be it from PoRs, projects, internships or competitions.
- Doing and learning competitive programming and DSA is a really good way to ace the intern tests but in case of interviews, usually you need working knowledge and understanding of software development

### **Preparation Material:**

- Heard on the street
- Rankyourbrain
- Gen aptitude tests
- 50 Problems in probability and Leetcode questions
- 50 HR questions
- Interviewbit
- Leetcode

Open for:

- Btech: Computer Science & Engg, Electrical Engg, Mechanical Engg
- Dual Degree: Computer Science & Engg, Electrical Engg, Mechanical Engg
- IDDD : Computational Engineering, Data Science

### **Open for:**

- Btech: All
- Dual Degree: All

### **Stipend Structure:**

**Currency Type : Euros**

**Amount : 40,000**

**Brief Description:**

- **Competitive salary: €40,000EUR total compensation over the 8 week period (₹35,90,320.00 INR)**

- (Paid) furnished housing arrangement provided by Optiver in the city center of Amsterdam
- Awesome social events and outings (boat tours through the canals of Amsterdam, BBQ's etc)
- Free breakfast, lunch, and dinner provided at Optiver, weekly massages & a bicycle to explore Amsterdam.
- Most importantly, the possibility to receive a full-time offer upon completion of internship back in our Amsterdam, Sydney or Mumbai office

**Fundae session : NA**

# Piramal Pharma Limited

**Profile and Location:** Global emerging leader, pan India

## **About Piramal Pharma Limited:**

Piramal Pharma Limited (PPL) offers a portfolio of differentiated products and services through end-to-end manufacturing capabilities across 15 global facilities and a global distribution network in over 100 countries. PPL includes Piramal Pharma Solutions (PPS), an integrated Contract Development and Manufacturing Organisation (CDMO), Piramal Critical Care (PCC), a Complex Hospital Generics business, and the India Consumer Healthcare business selling over-the-counter products.

PPS offers end-to-end development and manufacturing solutions through a globally integrated network of facilities across the drug life cycle to innovators and generic companies. PCC's complex hospital product portfolio includes inhalation anaesthetics, intrathecal therapies for spasticity and pain management, injectable pain and anaesthetics, injectable anti-infectives, and other therapies. The India Consumer Healthcare business is among the leading players in India in the self-care space, with established brands in the India consumer healthcare market. In addition, PPL has a joint venture with Allergan, a leader in ophthalmology in the Indian formulations market. In October 2020, the company received a growth equity investment from the Carlyle Group.

## **Job Description:**

The Summer Interns will work on Business Impact Projects across our sites in core areas of chemical engineering to solve live business problems using chemical engineering principles. Some illustrative areas of responsibility can include ( not an exhaustive list)

- Facilitate continuous improvement 6 high impact projects across different functions and locations based on principles of chemical engineering and Lean Six Sigma, TPM & OE principles.

- Ensure delivery of business process improvement initiatives through implementation of predetermined /agreed synergies.
- Demonstrate leadership in application of technology to tackle manufacturing problems.
- Partner with site leadership teams and different team managers to identify process improvement, KRAs and KPIs for all functions, focusing on improving, automating the packaging & other operations error free.
- Explore and implement various cost saving opportunities across different products at the site.
- Analyse the current processes deployed in production/quality functions and identify possible areas of automation to improve overall plant efficiency, compliance and productivity.
- Work on projects to minimise the operating cost of the plant in terms of utility generation, utility distribution, maintenance and repair, enhanced monitoring of processes etc.
- Conceptualize and manage various cross-functional business initiatives in project mode with the use of analytical techniques.
- Identify the gaps and therefore the possibilities of process automation in the current Order to Delivery (OTD) process.
- Optimise inventory levels for different raw materials (intermediates, APIs, excipients etc.) ensuring satisfactory service levels for customers.

**Shortlisting process:** Technical Test, Group Discussion, Technical Interview/Case Interview, HR Interview

**CGPA cutoff:** NA

**Test:** A very time consuming online test, but with a relatively low cutoff. The test has 4 sections : English, Data, Logic and Core (Chemical).

Core has concepts from HMT, FPM, Kinetics and CRE, AMT.

CRE and AMT are courses from semester 5, but students will be able to handle them in the test.

**GD:** Yes, and it is the toughest round to crack.

- May take 2 GDs of 4 minutes each or 1 GD of 8 minutes. Consists usually of a group of 8 students.
- Abstract topics like Sustainable Technology, Performance of startups in India and why they are not meeting their targets, and an engineering perspective on water scarcity are given for discussion.
- Situations that test your critical and quick thinking skills are given for analysis. For example, "You are the PM of the country. A terrorist organisation has kidnapped your spouse. They are asking to free up a prisoner as a ransom. What will you do?"
- Be precise with what you say.
- Give everyone a chance to speak.
- Bring structure into the GD.

**No of interview rounds:** 1 (Technical Round) + 1 (HR Round)

**Interview:**

**Round 1:**

- Questions on prior work or project experience are asked.
- Usually the student is asked to choose a topic of interest and questions begin from that point onwards.
- Basic questions relating to Chemical Engineering are asked, such as the statement of the 2nd law of Thermodynamics.
- Take a moment to analyse the question, structure your answer and then speak.
- Smile and show confidence.

**Round 2:**

- Typical HR questions are asked such as:
  - "Tell me about yourself?"
  - "Why Piramal?"
  - "Why do you think you are a good fit for this company?"
- Try asking the interviewers a few questions about the work culture and new projects to show your enthusiasm for the role and impress the interviewers.

### **Preparation Material & strategies:**

- Test - Perry's Chemical Engineering Handbook, revision of 11th and 12th grade NCERT and Class Notes
- GD - Oratory Club fundae session, practice sessions with seniors and batchmates.
- Interview - Talk with seniors about the company and be thorough with your resume.
- HR - 64 HR Questions booklet, make your own SWOT analysis. Prepare instances from your own life to explain scenarios.

**Open for:** B.Tech - Chemical Engineering

**Offers:** 3

### **Stipend Structure:**

- B.Tech CTC (Annual Income) - Rs.125000 - Gross Taxable (Annual Income) - Fixed Basic pay (Monthly Income) -
- Other Information - - 14 days accommodation and flight travel

**Fundae session:** NA



# Piramal Capital and Housing Finance Ltd

## Profile and Location:

Intern - Analytics and IT

Mumbai/Bangalore

## About

**Piramal Capital and Housing Finance Limited**, is a non-deposit taking housing finance company, headquartered in Mumbai with branches in major cities across India. It was established to enable access to economical housing finance to the lower and middle income groups in semi-urban and rural parts of India. It is the second housing finance company to be established in the country. The company also leases commercial and residential premises. Piramal is among the 50 biggest financial companies in India.

## Job Description:

### What will you do?

- Participate in requirements review and understand new feature development
- Assist in designing, implementation and execution of test cases for new and existing features
- Collaborate with software engineering team on QA/Testing topics
- Update the testing procedure to provide better testing coverage and user experience

- Actively participate in agile meetings with product management and development team
  - Gather requirements, build testing solutions and troubleshoot issues in order to deliver a high quality product
  - Communicate technical concepts/issues clearly to internal stakeholders
- Competencies Required

#### Skills and Qualifications:

- Data driven mindset with a degree in any quantitative discipline such as Engineering, Computer Science, Economics, Statistics or Mathematics.
- Familiarity with analyzing large, multi dimensional data sets and synthesizing insights into actionable solutions.
- Proficiency in SQL, Excel, and visualization tools such as Power BI, Tableau, D3.js, and programming languages like R, Python & Scala.
- Excellent verbal and written communication skills for effective collaborations
- Creative problem solver, analytical thinker, and ability to learn new and complex concepts quickly.

**Shortlisting process:** Technical test, Technical Interview/Case Interview, HR Interview

**CGPA cutoff:** No specific CG cutoff.

#### **Test:**

The test comprised three sections: English, Mathematics (featuring probability puzzles that were somewhat tricky), and coding questions. The coding section included data structures and algorithms (DSA), machine learning (ML) questions, and data interpretation questions. A basic knowledge of DSA topics such as linked lists, trees, and dynamic programming (DP) was essential.

**GD:** NO

**No of interview rounds:** 2 rounds

## Interview:

In the interview, candidates were asked to explain a problem provided on paper and answered questions based on data structures and algorithms (DSA). They were also asked to explain the projects and work experiences listed on their resumes. Each round had a single panelist, with a different panelist for each round.

## Preparation Material & strategies:

To prepare for my interviews, I utilized a variety of resources and strategies:

- Placement Cell Resources: The placement cell shared a Google Drive with materials for different roles.
- Brain Stellar: Helpful for my preparation and highly recommend it for solving problems.
- Coursera Courses: Several relevant courses on Coursera to enhance the knowledge.
- GitHub: Referred to interview questions related to Machine Learning from GitHub.
- Books: "50 Challenging Questions in Probability" (contains around 55 to 56 problems) is excellent to hone probability skills.
- Online Platforms: GeeksforGeeks: Best resource for self-studying data structures and algorithms (DSA), LeetCode: For practicing coding problems.
- Puzzles and Guesstimates: Sources like "Heard on the Street."
- Previous Interview Experiences: They reviewed experiences shared by seniors who had undergone similar interviews to get an idea of the questions and interview format.
- CDC Resources: The Career Development Center (CDC) provided a set of books that were useful.
- Focus on Probability for ML: In Machine Learning, a solid understanding of probability is crucial. The aforementioned book on probability was particularly valuable for this.

By leveraging these diverse resources, they were able to thoroughly prepare for the interviews and gain a comprehensive understanding of the topics.

### Open for:

B.Tech-All

Dual degree-All

### Offers:

In Analytics - 10 offers

In IT - 8 offers

### Stipend Structure:

Currency type	INR
Amount	125000 monthly
Other facilities	NO
Accommodation	YES
Travel allowance	YES
Food allowance	YES

### Fundae session :

[https://drive.google.com/file/d/1JbZWxOPsw6lF7jjhW0dyN-jaYV6ud-C4/view?usp=drive\\_link](https://drive.google.com/file/d/1JbZWxOPsw6lF7jjhW0dyN-jaYV6ud-C4/view?usp=drive_link)

[https://drive.google.com/file/d/1CFi344nJdsdiUf-OXS77KfZREs3EeOdM/view?usp=drive\\_link](https://drive.google.com/file/d/1CFi344nJdsdiUf-OXS77KfZREs3EeOdM/view?usp=drive_link)

[https://drive.google.com/file/d/1MtsxuX\\_RPWC9tDPgmesslWXVRa3VxPzi/view?usp=drive\\_link](https://drive.google.com/file/d/1MtsxuX_RPWC9tDPgmesslWXVRa3VxPzi/view?usp=drive_link)

# Procter and Gamble

**Profile:** Product Supply Internship

**Location:** Pan India

## **About** Procter and Gamble

P&G was founded over 180 years ago as a simple soap and candle company. Today, we're the world's largest consumer goods company and home to iconic, trusted brands that make life a little bit easier in small but meaningful ways.

We've spanned three centuries thanks to three simple ideas: leadership, innovation, and citizenship.

The insight, innovation, and passion of talented teams have helped us grow into a global company that is governed responsibly and ethically, that is open and transparent, and that supports good causes and protects the environment. This is a place where you can be proud to work and do something that matters.

## **Job Description:**

**Internship Opportunity:** Manufacturing/Engineering Intern

### **About the Role:**

Join us as a Manufacturing/Engineering Intern in one of our cutting-edge plants where you will help produce consumer goods efficiently and with the highest quality. This role offers hands-on experience with advanced technologies in a fully automated environment.

### **Your Responsibilities:**

Production - Packing:

- Analyze and address performance losses.

- Implement solutions to enhance packing line performance.
- Install and start up new equipment.
- Develop tools for maintenance and production management.

#### Production - Making:

- Study and improve performance in production.
- Facilitate inter-departmental communication.
- Develop training programs for operators and team leaders.
- Standardize and simplify processes.

#### Quality:

- Develop quality indicators and conduct audits.
- Support production with equipment validation and process improvements.
- Investigate and resolve "non-standard" issues.
- Work on environmental management (product destruction, waste, energy, and water consumption).

#### **Your Skills:**

- Currently pursuing a Bachelor's or Master's degree in Engineering.
- Technical excellence and rigorous execution.
- Effective collaboration and problem-solving skills.
- Innovative mindset with the ability to reapply successful solutions.
- Fluency in English.

#### **What We Offer:**

- Immediate Responsibilities: Ownership of projects from the start.
- Continuous Development: Formal training and day-to-day mentoring.
- Dynamic Environment: A respectful, agile, and balanced work culture.

#### **Our Commitment:**

We are an equal opportunity employer committed to diversity and inclusion, ensuring everyone is valued, included, and performing at their peak.

Apply now to transform materials into winning consumer experiences with us!

### Shortlisting process:

- Resume shortlist
- Technical test
- Group discussion
- HR interview

**CGPA cutoff:** No explicit cutoff, but 7+ is safe.

### Test:

#### Format:

- Descriptive questions from regular coursework
- Logical ability games with increasing difficulty
- Duration: Approximately 20-30 minutes

**Difficulty:** Easy

### GD:

#### Format:

- Conducted for 3 students at a time
- Panel of 3 friendly interviewers
- Duration: Lengthy, exact time unspecified

#### Content:

- Questions to test leadership skills and teamwork
- Emphasis on quick, honest responses

#### Sample Questions:

- What was the biggest risk you have taken in your life?
- What was the greatest decision you have made?
- Describe an idea you implemented during an event or a Position of Responsibility (POR).
- How would you convince a group to complete a task they believe is pointless?

**No of interview rounds: 1**

### **Interview:**

#### **Format:**

- Conducted as a formality
- Short and simple if performance in GD and test is impressive

#### **Sample Question:**

- Example: "What does it take to be the head of Shaastra Events?"

**Duration:** Approximately 3 minutes

### **Preparation Material & strategies:**

#### **1) Technical Tests**

Resources:

- Find all test questions and games online. Search "P&G test prep" on YouTube to understand the games and their rules.
- Review P&G's Purpose, Values, and Principles (PVPs) to align your answers with their expectations.

Strategy:

- Familiarize yourself with the test format to avoid fumbling during the actual test.

#### **2) Group Discussion (GD)**

Preparation:

- Practice like a mock interview with a partner to build confidence.
- Prepare multiple answers for each potential scenario to ensure you can respond smoothly.

Tips:

- Stay confident and composed.
- Demonstrate leadership and teamwork skills.

#### **3) HR Interview**



Preparation:

- Minimal preparation needed.
- Focus on being genuine and concise.

**Open for:**

**BTech - ALL,  
DD - ALL**

**Offers: 4**

**Stipend Structure:**

- **Currency type: INR**
- **Stipend type: Total Duration**
- **Stipend amount: 300000**
- **Other Information: 20000 monthly rental allowance and travel arrangements both ways.**

# Quantbox Research

**Profile and Location:** Core Engineering Analyst (SDE) - Bangalore

## **About Quantbox Research:**

We are Quantbox. A team of programmers and mathematicians, entrenched in the best of Artificial Intelligence and Machine Learning. Our common goal is to conquer markets and achieve the best returns for our clients. We apply our expertise in mathematics and cutting-edge technology to trade, in global financial markets.

Meticulous and systematic research powers our proprietary trading algorithms and strategies. Bolstered by our 25+yr combined trading experience and our in-house state-of-the-art low latency infrastructure platform, we execute our trades with extreme efficiency in live markets. This gives us a significant edge over our competitors. With our eyes on the prize at all times, we are agile, and learn, improve and adapt easily to any market environment. And the consistent returns do the talking!

## **Job Description:**

A Software Developer for our Core Engineering group to help us in designing our in-house low latency software stack.

**Responsibilities :** Day-to-day work includes (but not limited to):

- Designing, developing, and testing proprietary software including
- Low-latency high-throughput exchange connectivity layers
- Distributed computation optimized backtesting and simulation systems capable of handling terabytes of data
- Risk systems with real-time trade management and risk analysis
- Identifying complex problems, coming up with innovative solutions, and communicating them with your team to advocate their implementation
- Collaboration with other software developers, quantitative traders, and researchers in cross-functional team environments

## **Shortlisting process:**

**Resume Shortlist, Technical test, Technical Interview/Case Interview, HR Interview.**

**CGPA cutoff:** NA

**Test:**

**DSA, OOPs and Inheritance. Code Snippets from Java, Python, C++**

Technical Test was for 1.5hrs-2 hrs. Difficulty was quite high. Questions were primarily from DSA, OOPs and inheritance.

**GD:** Nil

**No of interview rounds:** 2 technical + 1 HR round (all online)

**Interview:**

- a) **Theory round** : in which they were tested on DSA and other C++ concepts.  
There were 2 people in the interview panel. The interviewers were straightforward, expected precise answers.
- b) **Coding round** : 2 people in the panel. Students were given a problem, and were asked to come up with a solution first, then they were asked to improvise that solution. They didn't expect a correct answer straight away, but giving a good solution the first time itself would be a bonus. The interviewers were friendly, they prompted the students aptly and guided them throughout the interview. If you present an idea they will help you build upon that. Time for the interview was roughly 20 mins.
- c) **HR round** : given very little importance, basic questions related to the job profile were asked, the interview was very short.

**Preparation Material & strategies:**

**Suggestion** : Quantbox encourages bachelor's, or master's in computer science/mathematics and related fields to apply. Additional requirements include:

- **Excellent Software Development knowledge demonstrated through course work, research projects, or open source activities**
- **Proficiency in C++, object oriented design, GDB**
- **A strong understanding of data structures and algorithms**
- **Exposure to network programming (TCP/IP), concurrent programming (multi-threaded applications), Operating systems concepts**
- **Experience with Linux/Unix**
- **Brilliant problem-solving abilities**

- **Strong communication skills**

### **Preparation :**

- **Start of Preparation (End of 3rd Semester):** While the summer after your 4th semester is a good starting point, ideally, you should begin familiarizing yourself with the typical software engineering interview profile and company requirements by the end of your 3rd semester. This allows for more focused preparation during the summer break.
- **Resume Building (1-2 Days):** Crafting your resume can be completed within 1-2 days. However, thorough review and formatting by your seniors over 2-3 days is crucial to ensure a professional and polished final product. Consider using LaTeX for a clean and structured format.
- **Technical Skill :** There was no fixed schedule for your preparation, but you effectively balanced practicing DSA (Data Structures and Algorithms) problems with probability problems on a daily basis. This well-rounded approach strengthens your foundational knowledge.
- **Practice :** Practicing DSA problems, standard interview test questions, and participating in competitive programming platforms like Codeforces can significantly improve your technical skills. While the exact interview questions might not directly mirror those on platforms like LeetCode or Codeforces, the practice itself hones your problem-solving abilities and prepares you for the format of technical assessments.

### **Open for:**

**Btech: CS, EE**

**Dual Degree: CS, EE, Computational Engineering, Quantitative Finance, Data Science**

### **Offers: 3**

#### **Stipend Structure:**

Currency Type : INR

B. Tech - 450000

Dual Degree - 450000

Stipend Type : Monthly

Food, Travel, Accommodation - None

**Fundae session : Nil**

# Quantbox Research

**Profile and Location:** Research and Trading Analyst - Singapore

## **About Quantbox Research:**

We are Quantbox. A team of programmers and mathematicians, entrenched in the best of Artificial Intelligence and Machine Learning. Our common goal is to conquer markets and achieve the best returns for our clients. We apply our expertise in mathematics and cutting-edge technology to trade, in global financial markets.

Meticulous and systematic research powers our proprietary trading algorithms and strategies. Bolstered by our 25+yr combined trading experience and our in-house state-of-the-art low latency infrastructure platform, we execute our trades with extreme efficiency in live markets. This gives us a significant edge over our competitors. With our eyes on the prize at all times, we are agile, and learn, improve and adapt easily to any market environment. And the consistent returns do the talking!

## **Job Description:**

You will be learning and supporting building and improving the models that keep us competitive in the market. You will work alongside the traders, software developers and our engineering scientist, you would learn, research, improve, test, build our trading algorithms to increase trading profitability. A typical day involves applying rigorous scientific method, machine learning techniques to a vast array of datasets in order to create insights on how the market behaves.

## **Shortlisting process:**

**Resume Shortlist, Technical test, Technical Interview/Case Interview.**

**CGPA cutoff:** 8+

## **Test:**

**OOPS, Software, Quant Puzzles, Probability**

The test was a mixed bag. It had questions related to OOPS, Software, Quant Puzzles, Probability questions and 2 coding questions. Test duration was roughly 1.5-2 hrs. The

coding part was harder (was not able to solve both the questions fully, only solved partly), quant puzzles and OOPs related questions were of medium difficulty.

**GD: Nil**

**No of interview rounds: 1 Technical Round**

**Interview:**

There was only one round, which was of medium difficulty. There were 5 interviewers, they came one by one and asked questions. The interview was online (g meet was set up). Questions asked were related to quant puzzles and probability .

**Preparation Material & strategies:**

**Suggestion :** What you'll need:

- Bachelor's degree / PhD in mathematics, computer science, statistics, physics, or a related field
- Ability to think independently and use creative approach in problem solving
- Familiarity with python, C++, R programming languages

**Preparation :**

- **Strong Coders:** If you already have a good grasp of coding and practice competitive programming (CP) regularly, 1-1.5 months of dedicated preparation for the specific interview style of quant firms might be sufficient.
- **Newer Coders:** Others who need to build their coding foundation and learn data structures and algorithms (DSA) should start preparing much earlier, potentially dedicating their entire summer break.
- Early Start helps, begin practicing CP at the end of first year, giving a solid foundation for later interview prep.
- **Resume Building (6 hours):** Despite having a draft ready, I spent around 6 hours finalizing my resume, including formatting. Consulting with seniors helped refine it within 2 days. Consider using LaTeX templates and senior examples for inspiration.
- **Practice (No fixed schedule):** Consistently practice DSA and probability problems daily, alternating between the two.

**Technical Skill :**

- **Competitive Programming:** Participating in platforms like Codeforces is highly recommended for quant interviews.
- **DSA Resources:** LeetCode and GeeksForGeeks offer valuable practice materials for DSA.
- **Problem-Solving Techniques:** Focus on mastering topics like dynamic programming and graphs, which are frequently tested in quant interviews.

#### Interview Preparation:

- **Practice Platforms:** Consider using Brainstellar for quant-specific puzzles.
- **Books:** Reference books like "50 Problems in Probability" and "Heard on the Street" can provide insights into the types of questions you might encounter.

#### Open for:

**BTech : CS, EE**

**DD: CS, EE, Quantitative Finance, data science, Computational Engineering**

**Offers: 3**

#### Stipend Structure:

Currency Type : SGD

Stipend Type : Monthly

#### BONUS

B.Tech - 8000

8000 SGD sign on bonus (24000 SGD Total)

Dual Degree - 8000

8000 SGD sign on bonus (24000 SGD Total)

**Fundae session : Nil**

# Rubrik

**Profile and Location:** Software Engineer - US, Bangalore.

## About Rubrik:

**Rubrik**, the Zero Trust Data Security Company delivers data security and operational resilience for enterprises. Rubrik's big idea is to provide data security and data protection on a single platform, including: Zero Trust Data Protection, ransomware investigation, incident containment, sensitive data discovery, and orchestrated application recovery. This means data is ready at all times so you can recover the data you need and avoid paying a ransom. Because when you secure your data, you secure your applications, and you secure your business.

## Job Description:

### ❖ What Rubrik believe in

- Giving engineers responsibility, not tasks.
- Our goal is to motivate and challenge people to do their best work. To do that, we have a very fluid structure and give people the flexibility to work on projects that they enjoy the most. This develops more capable engineers and keeps everyone engaged and happy.

### ❖ What you will do

- Design, develop, test, deploy, maintain and improve the software.
- Manage individual projects priorities, deadlines, and deliverables with your technical expertise.
- Identify and solve bottlenecks within our software stack.

- ❖ About You Rubrik Software Engineers are self-starters, driven, and can manage themselves.



- ❖ Bottom line, if you have a limitless drive and like to win, we want to talk to you - come make history! Bachelor's or master's degree or equivalent in computer science or related field Proficiency in one or more general-purpose programming languages like Java, C/C++, Scala, Python.

**Shortlisting process:** Technical test, Technical Interview/Case Interview, HR Interview

**CGPA cutoff:** Above 8

**Test:**

Technical Assessment Test (Online)-There were 4 questions (1st two were Leetcode problems and the next two were Olympiad level computer science questions) all the questions had main solutions as well as efficient solutions. Main solutions were easy to come up with, but it was tough to bring efficient solutions. Dynamic Programming questions are sure, and they might also ask about graphs.

**No of interview rounds:**

Technical Interview-(2 Rounds)  
HR interview (Offline)

**Interview:**

Technical Interview (Online) - 2 Rounds. One interviewer for each round and both were not the same. The 1st interview had an array + sorting question and the 2nd technical interview had graphs-based questions and had to run test cases for it.

HR Interview - It was simple. They have asked to choose a topic from your resume and to speak about it throughout the interview. Why are you taking Rubrik? Where do you see yourself in the next 10 years? How do you deal with your shortcomings? How do you manage your Team?

### Preparation Material & strategies:

For the Tests: CP from Codeforces, some questions from 450 DSA sheets, programming club's materials and Leetcode problems.

For the Interviews: Concepts of gold and platinum level problems from usaco guide (<https://usaco.guide/>)

### Open for:

B.Tech: Computer Science and Engineering.

Dual Degree: Computer Science and Engineering

**Offers:** 3

### Stipend Structure: .

#### INTERNATIONAL OFFER:

Currency	USD
Amount	55\$/hr for BTech students 60\$/hr for Dual Degree students
Other facilities	NO
Accommodation	Housing stipend 9000\$
Travel allowance	Yes, capped at approx 1.3 lakh inr
Food allowance	NO

DOMESTIC OFFER:

Currency	INR
Amount	3,00,000 montly for BTECH and DD students
Other facilities	NO
Accommodation	YES
Travel allowance	YES
Food allowance	YES

**Fundae session :**

<https://drive.google.com/file/d/1730Eb45k0Xi5hn0FM80gh5SV4nstEQVy/view>

# Salesforce

## Profile and Location:

Intern Software Engineer, Hyderabad/Bangalore

## About Salesforce :

Salesforce is the customer company. It delivers solutions to its customers 3 times a year through its leading CRM(Customer Relationship Management) platform.

They develop cloud-based software that empowers businesses to connect with their customers in innovative ways, helping them discover more prospects, close more deals, and deliver outstanding customer service.

It provides customer relationship management software and applications focused on sales, customer service, marketing automation, analytics, and application development.

## Job Description:

This is your time to shine and be part of Salesforce, a world leader in enterprise cloud computing. We deliver innovations to our customers throughout the year, including three major releases annually. Our innovation is powered by our Customer 360 Platform, which enables us to bring value to all parts of our customers' organizations.

As a software engineering intern, you will have the opportunity to contribute immediately as a member of one of our Scrum teams, focusing on one or more aspects of software engineering for future releases. You will be involved in various stages of the engineering lifecycle, developing tools and features that enable our solutions to reach millions of end users and enterprises who rely on our mission-critical applications and services every day to run their businesses. Additionally, we look to you to help deliver high-quality software through automated testing and to take

ownership of your service in production with real-time monitoring tools and frameworks.

Responsibilities includes but not limited to:

- Operate within a dynamic work environment to generate software of exceptional quality.
- Collaborate with the development team to design, develop, test and deploy software products.
- Work on creating solutions that easily integrate into large distributed systems, using the latest technology at a remarkable scale and speed.
- Develop well-tuned code that may be included as part of our next software release.
- Contribute to our suite of automated tests and testing infrastructure.
- Contribute to tools and solutions to support and monitor our various cloud services.

Eligibility Criteria:

- Enrolled in sophomore year or higher at a college/university or any year at a graduate school.
- Working towards a B.E/ B.Tech in Computer Science, Information Technology and Circuit Branch  
graduating in 2025.

Required Skills:

- Academic or professional/internship
- Ability to quickly learn new technologies
- Strong analytical and problem-solving skills
- Ability to thrive in a fast-paced environment
- Be a self-starter and possess strong sense of self-motivation
- Excellent in effectively communicating technical challenges and proposing solutions.
- Skilled in navigating through ambiguous or undefined problems, coupled with the ability to think abstractly.

Desired Skills:

- Experience with programming languages such as Java, C++ or Python

- Knowledge of web development technologies (HTML, CSS, JavaScript) and frameworks (React, Angular, or Vue.js) is a plus.
- Coursework in SQL and relational database concepts
- Strong in Computer Science fundamentals, including object-oriented design, data structures, algorithm development, problem-solving, and complexity analysis.

**Shortlisting process:** (i) shortlist was based on results of coding assessment test  
(ii) Interview

**CGPA cutoff:** Nil

**Test:** yes

It was online. Duration is 1hr

The coding assessment included 3-4 questions and was relatively straightforward. The difficulty level ranged from 1100-1800 on Codeforces, covering topics such as sorting, arrays, and trees. They consider your Codeforces rating. The questions were similar to standard LeetCode problems.

**GD:** No

**No of interview rounds:** 1(Technical)+1(HR+Technical)

**Interview:**

1st round(Technical):

- The interview process involved two interviewers. Each interviewer asked a competitive programming (CP) question, both of which were of intermediate level.
- The interview consisted of two questions. The first question was easy, while the second one was trickier. Both questions were mostly standard problems from the DSA sheet.
- A question based on array.

2nd round(HR+technical):

- Had basic level theory questions.
- Resume specific questions.
- Puzzle would be given to solve and it was easy.
- Approach based technical question.
- A tree based question.
- Some Brain stellar questions.
- Some normal HR questions.

### **Preparation Material & strategies:**

Test & Interview:

- LeetCode questions
- Strivers DSA Sheet
- Codeforces contest
- CP from Codeforces

HR Interview:

- YouTube videos
- CDC Templates
- Know about the company

Suggestions:

- Take help from seniors as such for resume formatting, resume validation etc
- For resume starting from the 4th semester would be preferable.
- Know your resume through and through.
- Start to do Leetcode and CP questions as soon as possible
- Dedicated time for DSA sheet, Resume and Review of the coursework.

### Open for:

B.Tech:

- Engineering Physics
- Electrical Engineering
- Computer Science and Engg.

Dual Degree:

- Computer Science and Engineering
- Electrical Engineering

**Offers:** 8

### Stipend Structure:

**Currency Type :** INR

**Amount :** 150000 Monthly

**Other Facilities :** Wellness Reimbursement- INR 5000 per month  
Relocation assistance- INR 1,00,000-1,15,000 basis  
(eligibility) Medical Insurance Cover - Up to INR 7,00,000  
Duration - 8 to 10 weeks (May- Jul)

**Accommodation :** No

**Travel Allowance :** No

**Food Allowance :** No

**Fundae session :** NA



# Trexquant (India) Business Consulting LLP

**Profile and Location:** Quantitative Research Intern - Gurgaon

## About Trexquant (India) Business Consulting LLP:

Our Evolving Team

At Trexquant, we take hiring very seriously. We understand that the people we bring on board are the foundation of our success and will play a critical role in driving our business forward. That's why we go to great lengths to find the best and brightest candidates who share our values and vision for the future.

We also believe that excellence is not defined by any single characteristic. That's why we have assembled a team of dynamic, collaborative problem-solvers who possess a range of skills, experiences, and perspectives. Together, we are dedicated to tackling the most challenging issues through collaboration and creativity.

## Job Description:

As a Quantitative Research intern, your responsibilities would include:

1. Explore and learn about a wide range of data sets that are used to develop signals for systematic quantitative strategies.
2. Investigate and implement state-of-the-art academic research in the field of machine learning and quantitative finance.
3. Design features from novel data sets to improve the prediction power of the existing models.
4. Apply machine learning techniques to alpha discovery and portfolio construction.

**Shortlisting process:** Resume Shortlist, Technical Test, Technical Interview/Case Interview, GD, HR Interview

**CGPA cutoff:** 8.5+ CGPA

**Test:**

had to solve an online game and devise an algorithm. Should solve more than 50% correctly in order to qualify for the next stage. 7 days are given to solve the problems. Don't use standard approaches to solve the question. They wanted some innovative solutions. The game might look scary, but don't copy paste online approaches.

**GD:** Yes

**No of interview rounds:** 1 (Technical + HR)

**Interview:**

**Interview:** Only one round of online interview for almost 1 hour. Discussion of the approach and algorithm used by the student to solve the problem in initial round, some medium-level DSA Questions and HR round to know a few things. The interview was fairly easy and it was a one-one round. The interviewer was very jovial. Questions were asked on the projects mentioned in the resume.

**Preparation Material & strategies:**

- Most of the SDE and quant profiles test problem solving abilities through DSA, and ask questions related to DSA. Must learn Python and C++. Start as early as possible. 1 or 2 semesters.
- DSA Sheets can also be downloaded from YouTube. Quant - website: Brainstellar (<https://brainstellar.com/>). Probability: herd on the street (Book).
- Used problem sheets for datasheets from programming and math club WhatsApp groups (DSA and Quant Community), solved 2-3 problems per day. Solved problems from websites for quant. All these were done during vacations.
- Try applying for all interviews, don't have inhibition due to branch. Start preparation as early as possible, be consistent and accountable.

### Open for:

**B.Tech:** All

**Dual Degree:** All

**M.Tech / M.S:**

- \* Computer Science and Engg.
- \* Computer Science and Engg. [M.S]
- \* Electrical Engineering
- \* Communications, Networks & Signal Processing
- \* Control Engineering and Optimization
- \* Electrical Engineering [M.S]
- \* Electronic System Design and Instrumentation
- \* Integrated Circuits & Systems
- \* Micro Electronics & VLSI Design
- \* Power Systems & Power Electronics
- \* RF, Optics & Photonics
- \* Mathematics
- \* Industrial Mathematics & Scientific Computing

**Offers:** No. of Offers- 4

### Stipend Structure:

**Currency Type:** INR

**Stipend Type:** Total Duration

**Amount:** 640000 (All Programs)

**Other Information (Food, Accommodation and Travel Allowance):**

8000 (Relocation Bonus) + Total of RS 480000 bonus for entire internship duration (Awarded to 2-3 best interns every week).

### Fundae session:

[https://drive.google.com/file/d/1PI\\_IP8lMmOJnBjHpILUTtshS58QKk3lH/view?usp=sharing](https://drive.google.com/file/d/1PI_IP8lMmOJnBjHpILUTtshS58QKk3lH/view?usp=sharing)

# Uber

**Profile and Location:** Software Engineering – Bangalore and Hyderabad

## About Uber:

We're changing the way people think about transportation. Not that long ago we were just an app to request premium black cars in a few metropolitan areas. Now we're a part of the logistical fabric of more than 600 cities around the world. Whether it's a ride or a sandwich, we use technology to give people what they want, when they want it. For the people who drive with Uber, our app represents a flexible new way to earn money. For cities, we help strengthen local economies, improve access to transportation, and make streets safer. And that's just what we're doing today. We're thinking about the future, too. With teams working on self-driving cars and flying vehicles, we're in for the long haul. We're reimagining how people and things move from one place to the next. We're bringing Uber to every major city in the world. We need your skills and passion to help make it happen! Be sure to check out the Uber Engineering Blog to learn more about the team. Uber is an equal opportunity employer and enthusiastically encourages people from a wide variety of backgrounds and experiences to apply. We don't discriminate on the basis of race, color, religion, sex (including pregnancy), gender, national origin, citizenship, age, mental or physical disability, veteran status, marital status, sexual orientation or any other basis prohibited by law.

## Job Description:

Uber Software Engineering Intern:

#GreatMindsDon'tThinkAlike At Uber, we take pride in our diversity and working environment that sees you as more than just a person that can do the job, but a unique individual that can level up our organization with a perspective only you can offer. Uber provides a truly open culture that encourages all to voice their thoughts.

### About the Role:

As an Uber Intern, you'll have a direct impact on the customer experience for both riders and drivers. Do you like our service and want to bring them to the next level? Do you have a beef with our app and want to fix it? Then you should apply to join our team. We are ambitious, engaged and excited about disrupting the transportation industry across the world. Not just another social web app: we are moving real assets and real people around their cities. Outside of your work, you will build meaningful relationships with other Interns and Uber mentors through a variety of summer activities.

### As a future Uber intern, you are:

- Naturally curious. You're innovative and creative in your problem-solving and you constantly search for ways to tweak and optimize processes.
- Fast learner. We're looking for interns who thrive with learning new technologies and don't believe in one-size-fits-all solutions. You should be able to adapt easily to meet the needs of our substantial growth and constantly evolving business environment.
- A great teammate. You believe that you can achieve more on a team — that the whole is greater than the sum of its parts. You rely on others' candid feedback for continuous improvement.

### What are we looking for? Qualifications and Desired Skills-

- Actively pursuing a B.Tech or Integrated Dual Degree (anticipated graduation in 2025) in Computer Science, Electronics Eng, Electrical Engineering, Mechanical or Mathematical Sciences or related fields .
  - Demonstrated software engineering experience through previous internships, work experience, coding competitions, and/or publications.
  - Programming experience of one or more application or systems languages (Go, Python, Ruby, Java, C/C++, etc.).
  - Interest in building tools/infrastructure.
  - A desire to be part of a team that delivers impactful results every day.
  - A commitment to writing understandable, maintainable, and reusable software.
  - An innate desire to deliver and a strong sense of accountability for your work.
  - Willingness to learn new languages and methodologies
- Perks/Benefits.

- Monthly internship stipend, housing allowance, and Uber credits.
- The rare opportunity to change the world such that everyone around you is using the product you built - we're moving real people and assets and reinventing transportation and logistics globally.
- Receive mentorship from Uber engineers to guide you through your internship experience.
- Build personal networks and friendships with hardworking people who share your passion for technology in a lively international work environment.

**Shortlisting process:** Resume Shortlist, Test, GD, Interview

**CGPA cutoff:** 6.5 and above

**Test: Technical test:** The shortlisting questions are more difficult and lengthier compared to the in-person interview questions and more practice was required.

**GD:** Yes

**No of interview rounds:** 2(Technical) + 1(HR)

**Interview:**

- **2 Coding Interviews:** Not much difficult questions were asked. The interviewer also helps in the middle. It was a discussion type interview, and a good experience. The interviews are one on one (45 minutes interview).
- **HR Interview:** Asked more about the projects in resume. Asked more on how the projects were implemented. More time was focused on projects. The HR interviews have no such time limits.

**Open for:** All

**Offers:** No. of offers- 2

### **Preparation Material & strategies:**

- Prepare from before itself (6-8 months). Practice competitive programming regularly using Leetcode and Striversheet. Strivers-SDE-sheet is very helpful (more compared to Leetcode).
- For competitive programming: Used WhatsApp groups with seniors, LEETCODE and Striver SDE Sheet.

### **Stipend Structure:**

**Currency Type:** INR

**Stipend Type:** Monthly

**Amount:** 177000 (All Programs)

**Other Information (Food, Accommodation and Travel Allowance):**

177000 (including Rs. 15000 for housing allowance) + Uber credits + To and Fro air tickets

### **Fundae session:**

<https://drive.google.com/file/d/1DMTiYgastfTH0CihyYey3DTQqyHtNIPd/view?usp=sharing>

# Accenture

**Profile:** Strategy & Consulting Delivery Intern

## **About Accenture:**

Accenture is a global professional services company with leading capabilities in digital, cloud, and security. Combining unmatched experience and specialized skills across more than 40 industries, the company offers Strategy and Consulting, Technology and Operations services, and Accenture Song — all powered by the world's largest network of Advanced Technology and Intelligent Operations centers. Over 699,000 people deliver on the promise of technology and human ingenuity every day, serving clients in more than 120 countries. Accenture embraces the power of change to create value and shared success for its clients, people, shareholders, partners, and communities.

## **About Accenture Strategy & Consulting:**

Accenture Strategy shapes its clients' future, combining deep business insight with the understanding of how technology will impact industry and business models. Its focus on managing digital disruption, redefining competitiveness, operating, and business models as well as the workforce of the future helps its clients find future value and growth in a digital world. Today, digital is changing the way organisations engage with their employees, business partners, customers, and communities. This is Accenture's unique differentiator.

## **Job Description:**

Assist the team in business analysis to advise our clients for the transformation of their business/service

**Location:** Gurgaon/ New Delhi /Mumbai/Bangalore/Kolkata/Pune as applicable

Are you passionate to learn to design, build and implement strategies to enhance business performance? Does working in an inclusive and collaborative environment spark your interest?

Then, this is the right place for you!

- This internship is for undergraduates and advanced degree graduates and does not require prior work experience to learn and understand the fundamentals of management consulting.



- You will get a chance to work with a dynamic team on innovative client engagements, at the intersection of business and technology. Get ready to embark on a journey of experiential career growth and diverse experiences.
  - You will be interning with our team of experts on suitable scalable solutions and services that enable our clients to achieve their business objectives faster. This includes assisting your team in the following –
1. Identifying, assessing, and solving complex business problems for area of responsibility, where analysis of situations or data requires an in-depth evaluation of variable factors
  2. Identifying a client's high-level business needs and in the creation of detailed functional specs and other documentation, such as requirement traceability matrices, workflow diagrams, and use-cases
  3. Defining how our clients can leverage relevant technologies to enhance their operations, provide services and effectively manage operating/capitalized cost
  4. Solving key business problems and challenges by charting a journey from the current state to a “to-be” enterprise environment
  5. Developing detailed and actionable business cases and plans which reflect our practice's deep industry, digital, and business process acumen to leverage technology for a measurable impact
  6. Working in multi-disciplinary teams to shape, sell, communicate, and implement programs
  7. Assisting our clients build the required capabilities for growth and innovation to sustain high performance
  8. Reimagine, build, and transform client business and operations by developing cutting-edge assets, tools and methodologies, developing of PoVs, research, white papers, support the development of Go-to-market offerings

### **Good-to-have skills:**

- Knowledge of tools such as Power BI, Tableau, SQL, Microsoft Axis, Azure, AWS or any other data visualization platform
- Effective presentation development and delivery skills to diverse stakeholders
- Demonstrated leadership skills in projects or any other allied activities (e.g., college clubs, pro-bono volunteering)
- Knowledge of programming language C++, Java, R, S-Plus, Python or another niche technical capability

- Knowledge on key technology implementation solutions including MES, SAP, IOT, Analytics
- Knowledge on after-market service operations including spare parts management, warranty management is a plus

### **Your experience counts!**

- Academic excellence - Demonstrate consistency throughout academic career
- Knowledge of Microsoft tools - PowerPoint, Excel, Word & MS Project
- Excellent English communication skills (written and spoken) along with any other foreign language is a plus
- Strategic and analytical thinker, effective and proactive problem solver
- Aptitude to learn, problem-solving, and ability to think creatively to solve real global business problems
- Ability to seamlessly integrate and work collaboratively in a fast-paced global environment
- Competence in building credibility and effective relationships with stakeholders

### **What's in it for you?**

1. An opportunity to work on transformative projects with key G2000 clients
2. Potential to co-create with strategy leaders, industry experts, enterprise function practitioners, and, BI professionals to innovate solutions that leverage emerging technologies
3. Personalized training modules to develop your strategy & consulting acumen while growing your skills, industry knowledge, and capabilities
4. Opportunity to thrive in a culture that is committed to accelerating equality for all. Engage in boundary-less collaboration across the entire organization.

**Shortlisting Process:** Resume shortlist, Aptitude Test, Interview

**CGPA Cutoff :** Nil

**Test :** Logical Reasoning questions

**GD:** No.

**No of interview rounds -** 2

## **Interview:**

Logical thinking and case solving were the skills put to the test

## **Round 1:**

- Case Question

## **Round 2:**

- Quant Puzzle

## **Preparation Material & Suggestions:**

- Practise case solving.
- Refer to the drive provided by the team for case prep materials.
- Lectures by Victor Cheng
- Go through mock interviews and the HR questions book to develop soft skills
- Don't lose hope, and keep your options open.

## **Eligibility:**

- UG, Btech: All

## **Stipend:**

Currency Type :INR

Amount : 75000 Monthly

Other Facilities : No

Accommodation : No

Travel Allowance: According to project

Food Allowance : According to project

# Accenture

**Profile:** Advanced Application Engineering Intern

## About Accenture:

Accenture is a global professional services company with leading capabilities in digital, cloud, and security. Combining unmatched experience and specialized skills across more than 40 industries, the company offers Strategy and Consulting, Technology and Operations services, and Accenture Song — all powered by the world's largest network of Advanced Technology and Intelligent Operations centers. Over 699,000 people deliver on the promise of technology and human ingenuity every day, serving clients in more than 120 countries. Accenture embraces the power of change to create value and shared success for its clients, people, shareholders, partners, and communities.

## Job Description:

Skills required:

- Good analytical and problem-solving skills and proficiency in communication skills
- Basic Exposure to Databases, Software engineering, SQL queries
- Basic Exposure to cloud computing
- Multi-disciplinary and versatile with an aptitude to learn and apply new skills faster
- Potential to manage client interactions with proficiency
- Ability to think of new ways to solve customers' problems

**Shortlisting Process:** Resume shortlist, Test, Interview

**CGPA Cutoff:** Not specified

## Test:

Questions were asked on the following:

Aptitude, English, Pseudocode, Cloud Computing and Microsoft package-based questions, C programming, SQL, and finally quant.

**GD:** No.

**No of interview rounds - 1**

## Interview:

- HR questions (Eg: “What was your biggest challenge and how did you face it?”)
- Scenario-based questions
- Technical questions (“How do you solve the environmental crisis using ML models and what are the factors?”)
- SKILLS TESTED: Communication, Problem-Solving, Leadership

### **Preparation Material & Suggestions:**

- Geeksforgeeks for requisite hard skills
- Maintain a good balance between soft and technical skills
- PoRs go a long way in developing interpersonal skills
- Keep basic knowledge of cloud computing and DBMS
- Practise logical reasoning questions
- Build confidence in English alongside fluency, practise proper grammar.

### **Eligibility:**

- All streams/branches of B.E/B.Tech/M.E/M.Tech, MCA, and M.Sc. (CSE, IT only) – 2024 graduating batch
- Track record of outstanding academic performance and co-curricular activities
- No active backlogs during application and/or during onboarding
- Candidate should not have any gaps during their degrees. e.g. Candidate must be completing the 4 years B.Tech course in 4 consecutive years duration only
- Candidate should not have appeared for Accenture recruitment assessment/interview process in the last three months
- Candidates must be eligible to work in India either by citizenship/ have relevant documents

### **Stipend:**

Currency Type: INR

Amount: 90000 Monthly

Other Facilities: No

Accommodation: No

Travel Allowance: No

Food Allowance: No

# Adobe

**Profile :** Media and Data Science Research (AI)

## About Adobe

Changing the world through digital experiences is what Adobe's all about. We give everyone—from emerging artists to global brands— everything they need to design and deliver exceptional digital experiences. We're passionate about empowering people to create beautiful and powerful images, videos, and apps, and transform how companies interact with customers across every screen. We're on a mission to hire the very best and are committed to creating exceptional employee experiences where everyone is respected and has access to equal opportunity. We realize that new ideas can come from everywhere in the organization, and we know the next big idea could be yours. Adobe Research is looking for forward-thinking minds who are passionate about pushing the state of the art in research areas that impact Adobe's products and future endeavors.

## Job Description

- Under the direction of an Adobe Research mentor, pursue a research problem that pushes the boundaries of the field
- Explore an area of research, define a specific problem and defend it
- Generate alternative solutions, design new algorithms, implement and validate
- Publish results in journals or conferences, or identify invention disclosures (patents).

**Shortlisting Process:** Resume Shortlist, Test, Interview

**CGPA Cutoff :** NIL

**Test :** Yes, 1 hour 20 mins

**GD:** No

**No of interview rounds -** 1

## Interview:

- The first half of the interview is about your resume so be thorough with your resume and the next half is technical.
- They usually ask about your favorite project in the test and the interview. Make sure to mention the same project and if it is something related to ML, that would be beneficial.

- It is not mandatory to have prior research experience but if it's not too late and you have a chance choose to gain the research experience.
- Three or four questions similar to the ones asked in the test will be asked. So they will be based on Probability, Math Puzzles and Algorithms.

### **Suggestions:**

- Having research experience especially in Machine Learning will be helpful as this role is a research one.
- The deciding factor is the test and you have to perform well in the test.
- The test comprises of questions from Probability, Linear Algebra and Algorithms
- The questions and level difficulty wasn't extremely hard if you are decently prepared.

### **Preparation Material:**

- Probability : Bertsekas and Tsiklis , Intro to Probability
- Codechef DSA,codeforces and Leetcode competitive coding
- Heard on the Street
- Machine learning concepts

### **Open for:**

- Btech: Computer Science & Engg  
Electrical Engg  
Engineering Physics
- Dual Degree: Computer Science & Engg  
Electrical Engg  
Physics
- IDDD: Data Science,Robotics, Quantum Science and Technology

**Stipend:** 100000 Monthly

### **Link To Video Fundaes:**

<https://drive.google.com/file/d/16kmr9qWGOLpz6ypn3JU9nb5LRHOfvUb7/view?usp=sharing>

# Adobe

**Profile:** Research Intern

## About Adobe:

In today's digital and connected environments, documents are playing an increasingly central role in human communications and workplace efficiency. Document intelligence focuses on reinventing the document to deliver magnificent experiences for document creation, consumption, and collaboration. At Adobe, research scientists from multiple fields, such as natural language understanding, document imaging analysis, and human computer interaction, work together in crafting and architecting novel methods to unlock the value in documents. Researchers are exploring deep structural and semantic understanding so that users can easily extract relevant information, navigate in large document collections, and collaborate across teams more efficiently and optimally. Some of our research topics include: Machine learning & data mining: Adobe researchers follow data streams, uncover underlying data patterns and extract meaningful insights from noisy data to resolve business challenges and advance the state of the digital marketing industry. Information & data visualization We explore better ways of presenting data and information visually, develop visualization frameworks for big data sets and suggest probing business questions. Big data systems & algorithms: We develop modern Big Data systems that can handle the needs of today's enterprises and are designed from the ground-up to enable statistical and machine learning models to scale. The projects we work on connect research with practical applications. Social & cognitive sciences: We leverage social and cognitive science tools to learn about consumer's online behaviors and their interaction with offline media.

## Job Description:

**(Domestic-internship location: bangalore, 10 weeks duration )**

### What you will do

- Under the direction of an Adobe Research mentor, pursue a research problem that pushes the boundaries of the field
- Explore an area of research, define a specific problem and defend it
- Generate alternative solutions, design new algorithms, implement and validate
- Publish results in journals or conferences, or identify invention disclosures (patents)

### What you will need

- Penultimate year B.Tech or M.Tech student or PhD in computer science, or related field



- Outstanding academic record
- Strong communication skills and collaboration experience
- Passion for solving real world problems with web scale data using and inventing Machine Learning algorithms.
- Available to do a full-time internship for 12 weeks starting May 2023

#### **What you will gain**

- Mentoring and guidance from an experienced researcher
- Opportunities to be creative, be a leader and be focused
- Wellbeing resources
- Professional learning and development
- A market competitive stipend at INR 1,00,000 per month

**Shortlisting Process:** Resume Shortlist, Test, Interview

**CGPA Cutoff :** NIL

**Test :** Yes, 1 hour 20 mins

**Test pattern :** MCQ, coding

**GD:** No

**No of interview rounds - 1**

**Topics covered:** DSA, Good Idea about everything in your resume, Basic coding problems, complexity of algorithms, data structures, basic computer knowledge, better to check some basic machine learning courses just basics should suffice.

#### **Interview:**

- The first half of the interview is about your resume so be thorough with your resume and the next half is technical.
- They usually ask about your favorite project in the test and the interview. Make sure to mention the same project and if it is something related to ML, that would be beneficial.
- It is not mandatory to have prior research experience but if it's not too late and you have a chance choose to gain the research experience.
- Three or four questions similar to the ones asked in the test will be asked. So they will be based on Probability, Math Puzzles and Algorithms.

### Suggestions:

- Having research experience especially in Machine Learning will be helpful as this role is a research one.
- The deciding factor is the test and you have to perform well in the test.
- The test comprises of questions from Probability, Linear Algebra and Algorithms
- The questions and level difficulty wasn't extremely hard if you are decently prepared.
- Maybe a strong understanding of the concepts and basics and confidently answering their questions.
- Feel confident and have proper understanding of basics and try online website problems from leetcode,gfg etc

### Preparation Material:

- Probability : Bertsekas and Tsiklis , Intro to Probability
- Codechef DSA,codeforces and Leetcode competitive coding
- Heard on the Street
- Machine learning concepts
- Leetcode
- Geeks for geeks

### Open for:

- Btech: open for all
- Mtech: computer science and engg
- Dual Degree: open for all

### Stipend:

Currency Type :	INR
Amount :	100000 Monthly
Other Facilities :	No
Accommodation :	No
Travel Allowance :	No
Food Allowance :	No

### Link To Video Fundaes:

<https://drive.google.com/file/d/16kmr9qWG0Lpz6ypn3JU9nb5LRHOfvUb7/view?usp=sharing>

# Adobe

**Profile:** Product Intern

## About Adobe:

Changing the world through digital experiences is what Adobe's all about. We give everyone—from emerging artists to global brands— everything they need to design and deliver exceptional digital experiences. We're passionate about empowering people to create beautiful and powerful images, videos, and apps, and transform how companies interact with customers across every screen. We're on a mission to hire the very best and are committed to creating exceptional employee experiences where everyone is respected and has access to equal opportunity. We realize that new ideas can come from everywhere in the organization, and we know the next big idea could be yours. Adobe Research is looking for forward-thinking minds who are passionate about pushing the state of the art in research areas that impact Adobe's products and future endeavors.

## Job Description:

- Under the direction of an Adobe Research mentor, pursue a research problem that pushes the boundaries of the field
- Explore an area of research, define a specific problem and defend it

**Shortlisting Process:** Resume Shortlist, Test, Interview

**CGPA Cutoff :** NIL

**Test :** Yes, 1 hour 20 mins

**GD:** No

**No of interview rounds -** 1

## Interview:

- The first half of the interview is about your resume so be thorough with your resume and the next half is technical.
- They will ask questions about DSA and Aptitude in the interview
- Questions Around the projects mentioned, Puzzles, DSA, OOPs and CS Fundamentals(If you are not from CS, they may skip this)
- Three or four questions similar to the ones asked in the test will be asked. So they will be based on Probability, Math Puzzles and Algorithms.

- Puzzles: 1) Three jars and guess candies 2) Heaven, Hell and 2 gatekeepers. DSA: 1) Implementing queue 2) Inorder traversal. OOPs: It was related to virtual functions.. A Dynamic Programming question related to project are some questions asked.

### **Suggestions:**

- The deciding factor is the test and you have to perform well in the test.
- The test comprises of questions from Probability, Linear Algebra and Algorithms
- The questions and level difficulty wasn't extremely hard if you are decently prepared.

### **Preparation Material:**

- Probability : Bertsekas and Tsiklis , Intro to Probability
- Codechef DSA,codeforces and Leetcode competitive coding
- Heard on the Street

**Stipend:** 100000 Monthly

# American Express

**Profile:** Analyst

## About American Express:

Amex is a multinational financial corporation specializing in payment card services and travel-related services worldwide. They are a leading issuer of personal, small business, and corporate credit cards. The company's travel-related offerings include traveler's checks, credit cards, corporate and personal travel planning services, tour packages, and agencies for hotel and car-rental reservations.

## Job Description:

Our Risk, Marketing Analytics, Strategy & Decision Science teams are backbone of all financial services at American Express. Split across various business units namely Consumer, Commercial, Merchant, Network & Finance, the work touches every aspect of our customer's life cycle. Right from targeting the right customer for our products to underwriting them to managing their experience with Amex when they get onboarded, every decision is informed by cutting edge analytics & data science.

As a part of our team, you'll have the opportunity to work in one of the best companies for data scientists in the country. You will solve real world business problems while getting exposure to the industry's top leaders in analytics, data science and machine learning. If you're passionate about solving complex problems and creating solutions that impact millions, you should consider a career at Amex.

## Responsibilities:

We offer a student program to strengthen your skills and help shape your future personally and professionally. The Internship Program is considered one of the key entry points for our full-time campus hires. It is a project-based program that provides you with the opportunity to address real business challenges and offers you access to senior leaders, professional development activities, fun social events and more.

Specific job responsibilities span across different business units. An indicative list is given below:

1. Marketing: Effective targeting for customer/merchant acquisitions & engagement across channels to maximize return on investments

2. Underwriting: Assessing creditworthiness of applicants and establishing profitable acquisition frameworks
  3. Customer/Merchant Management: Dynamically assessing customer behavior based on digital traction and spending to take appropriate lending, marketing or servicing decisions
  4. Fraud Prevention: Preventing misuse of genuine customers' information by fraudsters
  5. Customer Experience: Reducing friction and elevating customers' interactions with AXP
- Description – Intern – Analytics
6. AI Labs: Designing AI/ML based products that enable advanced analytics

Generally, the role will entail the following responsibilities:

- Understand the core business of AXP and the levers behind various decisions
- Understand the specific business problem at hand and analyze relevant data to derive business insights
- Translate business insights to implementable solutions such as business strategies/data science/ machine learning models

**Shortlisting Process:** Interviews, Tests

**CGPA Cutoff:** 7, with no active backlogs.

### Tests:

Reasoning, Business Study, Probability, General Aptitude, and Machine Learning

Three sections:

1. General aptitude and Math (speed is crucial) - basic mental ability, 25 questions - 25 minutes
2. Machine Learning - from Andrew NG's course, 10 questions - 10 minutes
3. Business Case Study 25 minutes

The business case study is slightly different. A situation is given and there are several questions as are given below. There were a total of 53 questions. We can query at most 26 questions and the answers for the selected question will be visible. After we exhaust those 26 questions or after we feel that we have enough information, the question pops up. Using the answers obtained from the queries, we need to choose the appropriate course of action. So, we have to choose the 26 questions properly. I have done some consult case study prep which also has what is called 'preliminary questions', and hence that was useful for me in this section.

**GD:** No

**Interviews:**

One technical round, One HR round.

**Round 1: Technical**

- Completely Resume based - walk through the resume
- Even the machine learning questions were related to the points mentioned in the resume.
- Explain simple ML models, ML and DL algorithms. They also ask puzzles from Heard on the street.
- A guesstimate question was asked in round 1 - demanding the estimation of daily revenue of the railway station in your city.
- Case study questions

**Round 2: HR**

- HR is mostly about the company and its business model.
- your likes and dislikes, strengths and weaknesses.
- Case study question to check thinking process

**Number of Offers:** 17 (likely)

**Suggestions:**

Though Amex offers Analytics roles they ask quant questions during your interview rounds. For the Data Analytics profile, quantitative aptitude carries more weightage than competitive programming as aptitude questions are asked in tests of all the companies offering internships in the profile. Hence, Heard on the Street and Introduction to Probability by Dimitri P. Bertsekas and John N. Tsitsiklis were very helpful books for both tests and interviews.

American Express does not ask Coding Questions but checks your programming knowledge from the projects and internships mentioned in your resume.

Also, solve a few guesstimate questions, as they are being regularly asked in AmEx interviews.

Few Analytics roles ask for coding (SQL, Data structures). Hence it is necessary to prepare for these if you are to be guaranteed a role in Data science

Practicing for tests and giving mock interviews helps a lot.

Knowledge of SAS, Java, Hive, Pig, Python, and SQL is a plus.  
Have knowledge of MS Office – PowerPoint, Excel.

**Preperation Material:**

- Introduction to Probability by Dimitri P. Bertsekas and John N. Tsitsiklis (book)
- Puzzles: Books - Heard on the Street
- Website - GeeksforGeeks
- Machine Learning: ML course by Andrew NG - MCQs.
- YouTube channel - StatQuest
- For practicing competitive programming.- LeetCode/ HackerRank
- For practicing quantitative aptitude. - Brainstellar
- Speed math and aptitude: websites like prepleaf.com, indiabix

**Open for:**

Btech: All

DD: All

IDDD: Advanced Materials and Nanotechnology, Bio-Medical Engineering, Computational Engineering, Data Science, Robotics, Quantum Science and Technology, Tech MBA

**Job Location:** Bangalore, Gurgoan (HYBRID)

**Stipend:** Rs. 125000 Monthly



# APT Portfolio Private Ltd

**Profile:** Portfolio and Quant

## **About APT:**

APT stands for Algorithms, Profit and Trust, all of which are essential to our success as a leading proprietary trading firm. We leverage the team's deep technology expertise and trading experience to create winning trading strategies and provide liquidity to multiple exchanges across the world. We believe in applying our knowledge and experience while staying agile and continuously innovating in the backdrop of a rapidly evolving trading & technology landscape. It is our belief that trading capital can only be amplified through the right technology tools and investment in human capital.

## **Job Description:**

- As an intern with the delta one trading team, the candidate would be undertaking quantitative research and development.
- The intern would be exposed to new ML/Statistical/Analytical skills with the purpose of understanding the inefficiencies that lie in the financial markets.
- The intern would get exposure to the full developmental cycle of a trading strategy from its inception to rolling out in production along with post-trade analysis.
- The role and the associated projects would be at the junction of the fields of machine learning, programming, finance and mathematics.

**Intern** - 8 weeks

**Location:** Delhi

## **Shortlisting Process-**

### **CGPA Cutoff:**

Resume shortlisting was done on a CG basis

CG cutoff to "8+ for CS and EE, 9+ for all other departments

### **Test:**

Competitive Programming and Coding

### **Interview:**

Number of interview rounds - 1 (for both profiles)

The questions asked were on Coding and Puzzles.

Your CP skill and Problem-solving skills were tested

### **Suggestions:**

- A background in competitive programming helps
- Be very company-specific in the preparation
- Talk with seniors who got your dream company
- Start thinking about what sort of internship you want to do by the end of 3rd semester and have a few clear directions to focus your effort by the end of 4th semester so that you can start preparation once your 4th semester is done.
- Gain some decent level of coding practice right from 1st year as it would open up several avenues and is a good skill in general.
- Try out as much non-core as you can within the 1st three semesters as it is not feasible to do much prep in sem 4, after sem 4, you can decide on the basis of core and non-core experience whether to sit for core or non-core.
- Keeping 2-3 directions is always a good idea.

### **Preparation Material:**

- Participate in Codeforces and Competitive programming
- Practice of DSA from websites like Leetcode and Interviewbit, and also probability from 50 challenging problems and brainstellar.
- Solve many problems on Leetcode.
- MA2040(Probability), MA2031(Linear Algebra) class notes

### **Open For -**

#### **UG Degree:**

BTech - All

#### **PG Degree:**

#### **Dual Degree -**

- CS & Engg
- Electrical Engg
- Physics

#### **IDDD -**

- Advanced Materials and Nanotechnology
- Biomedical Engineering
- Electric Vehicles
- Cyber-Physical Systems
- Complex Systems and Dynamics
- Tech MBA
- Quantum Science and Technology
- Robotics
- Data Science
- Computational Engineering

**MTech- All**

**M.Sc- All**

#### **Stipend -**

Currency Type:	INR
Amount:	Monthly - INR 400,000/- (250,000+ 150,000) Min Monthly - INR 450,000/- (250,000+ 200,000) Max Monthly
Other Facilities:	Medical Insurance
Accommodation:	Two Months
Travel Allowance:	Airfare
Food Allowance:	No

# APT Portfolio Private Ltd

**Profile:** Hardware

## **Job Description:**

- Verifying VHDL/Verilog-based digital hardware design blocks. This will be accomplished using system verilog and Python-based test benches both on the simulator and on the board.
- Write test-benches, and test cases and ensure complete coverage of design features.
- Create and maintain scripts (usually Python and C++) to improve the efficiency of the team.
- Assist team members in developing proof of concept designs for upcoming features.

**Intern** - 8 weeks

**Location:** Bangalore

## **Required Skills:**

- Electrical Engineering students(B.tech/Dual Degree/MTech.). Engineering Physics is also acceptable.
- A clear understanding of basic digital design, computer architecture fundamentals and VLSI concepts.
- Knowledge and prior hardware design projects where any of the RTL design languages (System Verilog/Verilog/VHDL) were used is a must.
- Understanding FPGAs and the corresponding design flow is a plus.
- Knowledgeable about programming in either C++ or Python. Know how of Makefile generation, Assembly language coding is a plus
- A keen interest in the functioning of financial markets, quantitative research and data science will be helpful, but someone curious (and not already knowledgeable) is also good.

## **Shortlisting Process:**

Resume shortlisting, Technical Test, Interview

## **CGPA Cutoff:**

CG cutoff to "8+ for CS and EE, 9+ for all other departments

**Test:**

MCQ / Objective, Coding

**Objective** – Boolean logic, numbers in non-decimal bases,

Combinational and Sequential logic, FSMs, K-maps, state reduction, and static timing analysis

**Coding** - The questions focussed on Digital & Python OOP but nothing specific. The focus should be on the general experience of solving simple and medium coding problems.

**Interview:**

Number of interview rounds - 1

The Fundamentals of Coding (Python/Verilog/VHDL, based on your own choice) and Digital Questions (design concepts) were asked.

Example -

1. Realising XOR with NAND gates
2. Python multithreading vs multitasking as well as OOPS concepts

In Python, they might give you a link to a code-along section where they would write pieces of code and ask questions about the same.

Knowing the specific implementation of concepts in Python is important. There were also questions regarding concurrent programming, but that is an added bonus and not absolutely necessary.

Verilog: Design a 3-bit full adder, and design a ring counter

Digital Systems:

1. Given a situation and asked to model an FSM for it
2. Basic question about stuck-at-fault error
3. Basic STA question
4. Design a circuit to emulate a given FSM
5. Question about FIFO depth

**Suggestions:**

- Know Python well and how things are implemented in Python
- In Verilog, they only see if you have a basic understanding of how it works, you might be asked to write a code for a basic sequential circuit.
- They might test your understanding of various design concepts including FSMs, state reduction, STA, and designing circuits from FSM and FIFO in depth.

### Preparation Material:

- Morris Mano text for Digital systems
- Vlsiexpert.com for STA
- HDLbits website for Verilog Practice
- Past GATE problems for general practice

### Open For -

#### UG Degree

##### BTech -

- CS & Engg
- Electrical Engg
- Mechanical Engg
- Engineering Physics

#### PG Degree

##### Dual Degree -

- CS & Engg
- Electrical Engg
- Physics

##### IDDD -

- Quantum Science and Technology

##### MTech -

- Computer Science & Engg
- Electrical Engg
- Mathematics
- Mechanical Engg

### Stipend -

Currency Type:	INR
Amount:	250000 Monthly
Other Facilities:	Medical Insurance
Accommodation:	One-week
Travel Allowance:	Airfare
Food Allowance:	No



**Profile:** ASIC Engineer

**About:**

Cisco (NASDAQ: CSCO) enables people to make powerful connections--whether in business, education, philanthropy, or creativity. Cisco hardware, software, and service offerings are used to create the Internet solutions that make networks possible--providing easy access to information anywhere, at any time.

Cisco was founded in 1984 by a small group of computer scientists from Stanford University. Since the company's inception, Cisco engineers have been leaders in the development of Internet Protocol (IP)-based networking technologies. Today, with more than 71,000 employees worldwide, this tradition of innovation continues with industry-leading products and solutions in the company's core development areas of routing and switching, as well as in advanced technologies such as home networking, IP telephony, optical networking, security, storage area networking, and wireless technology. In addition to its products, Cisco provides a broad range of service offerings, including technical support and advanced services.

Cisco sells its products and services, both directly through its own sales force as well as through its channel partners, to large enterprises, commercial businesses, service providers, and consumers

**Shortlisting Process:** Test

**CGPA Cutoff :** >8

**No of interview rounds -** 2

**Interview:**

**Round 1:**

- An aptitude question: If the dates of a month with 31 days is to be represented using cards with digits written on it (1,2,3..9)(like date 21 is represented using a card '2' and a card '1' simultaneously), what is the minimum number of cards required to do it successfully. (answer is 11) (hint: 69)

- Digital questions: Explanation of setup time, hold time and the violations. Frequency divider using D-flip flop. 2 bit synchronous counter using D-flip flop.
- OOPs questions: What is the difference between normal programming and object-oriented programming? The basics of abstraction, encapsulation, inheritance, and polymorphism.
- Resume based: Questions of projects, courses etc
- Why did you choose cisco? How did you know about it?

### Round 2 (HR):

- Main question : are you going for higher studies?
- Questions on the profile posted on the internship portal, like the profile name, different sub-domains in the team, stipend etc.
- Ask you about your preferred job location.
- Mostly if you get to HR round you are 90% guaranteed to get selected.

### Suggestions:

- Talk with your seniors.
- Do well in tests as they care mostly about that.

### Preparation Material:

Digital systems, Microprocessor Theory, slides and notes, also Reference Books like Mazidi.

### Open for:

- Btech: Electrical Engineering and Engineering Physics
- Dual Degree: Electrical Engineering

### Stipend:

Currency Type :	INR
Amount :	Bachelors - INR 98,000 month, Masters - INR 1,21,300 month Monthly
Other Facilities :	No
Accommodation :	No
Travel Allowance :	No
Food Allowance :	No





**Profile:** Software Engineering, Hardware Engineering

Cisco (NASDAQ: CSCO) enables people to make powerful connections--whether in business, education, philanthropy, or creativity. Cisco hardware, software, and service offerings are used to create the Internet solutions that make networks possible--providing easy access to information anywhere, at any time.

Cisco was founded in 1984 by a small group of computer scientists from Stanford University. Since the company's inception, Cisco engineers have been leaders in the development of Internet Protocol (IP)-based networking technologies. Today, with more than 71,000 employees worldwide, this tradition of innovation continues with industry-leading products and solutions in the company's core development areas of routing and switching, as well as in advanced technologies such as home networking, IP telephony, optical networking, security, storage area networking, and wireless technology. In addition to its products, Cisco provides a broad range of service offerings, including technical support and advanced services.

Cisco sells its products and services, both directly through its own sales force as well as through its channel partners, to large enterprises, commercial businesses, service providers, and consumers

**Shortlisting Process:** Test

**CGPA Cutoff :** >7

**Test :**

1 Hr coding +MCQ (Acc to Hacker Rank)

**GD:** NA

**No of interview rounds** - 3 for software ,2 for hardware

**Interview:**

**Round 1:**

Software- DSA

- Write an algorithm to describe the top view of a tree

#### Hardware

- Asked to explain the project from microprocessor course
- How inverted graph actually look
- Gave state machine graph and asked to plot it and give equations about it

#### Round 2:

- Based on projects
- Graph, Graph Algo

#### Round 3:

- HR Round

#### Suggestions:

- Make sure you can explain the projects you put in the resume
- Don't go completely silent during the interview
- Get a strong grip over DSA.
- Doing courses over statistics and probability might help.

#### Preparation Material:

##### Hardware Role -

- Morris Mano for digital systems
- Digital System nptel

##### Software Role -

- Geeks for Geeks
- Codeforces

#### Open for:

- Btech: All
- Dual Degree: All

- IDDD: \* Advanced Materials and Nanotechnology
  - \* Bio-Medical Engineering
  - \* Computational Engineering
  - \* Data Science
  - \* Robotics
  - \* Quantum Science and Technology
  - \* Tech MBA

### Stipend:

Currency Type :	INR
Amount :	Bachelors - INR 87,000 month, Masters - INR 1,09,000 month Monthly
Other Facilities :	No
Accommodation :	No
Travel Allowance :	No
Food Allowance :	No

### Link To Video

**Fundaes:** <https://drive.google.com/file/d/1KrCSY7KQGxLejQ4-hyyBlKAA9H2jsp3w/view?ts=6290bb7d>

# Dr Reddys Laboratories

**Profile:** Digital and Analytics Internship

## About Dr. Reddy's Laboratories:

Dr. Reddy's Laboratories is an Indian multinational pharmaceutical company located in Hyderabad, Telangana, India. Dr. Reddy's manufactures and markets a wide range of pharmaceuticals in India and overseas. The company has over 190 medications, 60 active pharmaceutical ingredients (APIs) for drug manufacture, diagnostic kits, critical care, and biotechnology products.

## Job Description:

The Campus hires will be in steady touch with all the stakeholders involved. This will help them understand the nuances of the business from various perspectives. The various stakeholders may include Brand managers, Third party agencies or service providers.

## Key Personal Attributes:

- Good communication skills both written and oral, presentation skills & coordination skills.
- Excellent interpersonal skills; high level of proficiency in networking internally and externally.
- Self-starter with a go-getter attitude and an advocate of team work. Must be a quick learner and able to prioritize.
- Must be flexible to work in any environment including Manufacturing plants and Research labs

## PPO/Final Hires:

All the Campus hires will be put under a specially crafted program known as the Young Leaders Development Program which is a 15 month long stint based Program. Campus hires will undergo the best-in-class experience of stint based learning, which will enable them to get a holistic view of the organization and also enable the Organization to develop a talent pool capable of taking up roles in multiple functions. In a span of 15 months, the employee will be put through a minimum of 2 and a maximum of 4 stints across R&D and Manufacturing units which will give the hire a comprehensive sense of the entire business before he/she takes up a full-fledged role.

**Shortlisting Process:** Resume shortlist, Test, GD, Interview

**CGPA Cutoff : NIL**

**Test : Yes**

Basic JEE chemistry questions, there were questions on Arrhenius equations, Ideal gas equation questions, Significance of dimensionless numbers, thermodynamics (first law related graph question) and in aptitude mirror questions, direction based questions

**GD: Yes**

**Topics discussed:** Process/Engineering of a drug applied on skin and its propagation properties of skin cream and factors which can affect its performance

**Number of people in Group discussion :** More than 5

**Company's expectation:** They were not looking for an exact answer but approach is what matters. Presenting yourself in a group and following the group's points and putting your thoughts in the discussion. Understanding on what factors affect certain chemical processes and how to control them

**No of interview rounds - 1 (Technical Round) + 1 (HR Round)**

**Interview:**

**Round 1:**

- Questions based on basic concepts from core courses
- Topics on your projects (if any) and fluid mechanics questions, basic thermodynamic principles
- In the case of pseudoplastic fluids, what will be the value of 'n' in the power law model

**Round 2 (HR Round) :**

- Personality based questions along with example through real life application scenarios
- Strengths and weaknesses along with a suitable example of application in your professional life
- Asked about points from resume

**Suggestions:**

- Be a good communicator and ask questions without hesitation. Don't panic when they are asking questions, just skip the question if you are not comfortable with the question
- do not mention anything in your resume which are not sure or well versed in

### **Preparation Material:**

- The material provided on the internship drive

### **Open for:**

- Btech: all
- Dual Degree: all
- mtech:all

### **Stipend:**

<b>Currency Type :</b>	<b>INR</b>
<b>Amount :</b>	<b>40,000 Monthly</b>
<b>Other Facilities :</b>	<b>No</b>
<b>Accommodation :</b>	<b>Accommodation for 2 months at the company guest house.</b>
<b>Travel Allowance :</b>	<b>Reimbursement equivalent to To and fro to AC-2 Tier Rail tickets</b>
<b>Food Allowance :</b>	<b>Yes</b>

### **Link To Video Fundaes:**

<https://drive.google.com/file/d/1cN2KGzQ-v7ix98vRtDM769sKzWxatq3X/view?usp=sharing>

# Dr Reddys Laboratories

**Profile :** Core

## About Dr. Reddy's Laboratories

Dr. Reddy's Laboratories is an Indian multinational pharmaceutical company located in Hyderabad, Telangana, India. Dr. Reddy's manufactures and markets a wide range of pharmaceuticals in India and overseas. The company has over 190 medications, 60 active pharmaceutical ingredients (APIs) for drug manufacture, diagnostic kits, critical care, and biotechnology products.

## Job Description

Technical training at a manufacturing or an R&D site

**Shortlisting Process:** Resume shortlist, Test, GD, Interview

**CGPA Cutoff :** NIL

**Test :** Yes

Basic JEE chemistry questions, there were questions on Arrhenius equations, Ideal gas equation questions, Significance of dimensionless numbers, thermodynamics (first law related graph question) and in aptitude mirror questions, direction based questions

**GD:** Yes

**Topics discussed:** Process/Engineering of a drug applied on skin and its propagation properties of skin cream and factors which can affect its performance

**Number of people in Group discussion :** More than 5

**Company's expectation:** They were not looking for an exact answer but approach is what matters. Presenting yourself in a group and following the group's points and putting your thoughts in the discussion. Understanding on what factors affect certain chemical processes and how to control them

**No of interview rounds -** 1 (Technical Round) + 1 (HR Round)

**Interview:**

**Round 1:**

- Questions based on basic concepts from core courses

- Topics on your projects (if any) and fluid mechanics questions, basic thermodynamic principles
- In the case of pseudoplastic fluids, what will be the value of 'n' in the power law model

### Round 2 (HR Round) :

- Personality based questions along with example through real life application scenarios
- Strengths and weaknesses along with a suitable example of application in your professional life
- Asked about points from resume

### Suggestions:

- Be a good communicator and ask questions without hesitation. Don't panic when they are asking questions, just skip the question if you are not comfortable with the question
- do not mention anything in your resume which are not sure or well versed in
- Be thorough in your core engineering topics, these are fundamental.

### Preparation Material:

- The material provided on the internship drive

### Open for:

- Btech: Chemical Engg, Mechanical Engg
- Dual Degree: Chemical Engg, Mechanical Engg

### Stipend:

<b>Currency Type :</b>	<b>INR</b>
<b>Amount :</b>	<b>40000 Monthly</b>
<b>Other Facilities :</b>	<b>No</b>
<b>Accommodation :</b>	<b>First 15 days</b>
<b>Travel Allowance :</b>	<b>TRAIN</b>
<b>Food Allowance :</b>	<b>First 15 days</b>

### Link To Video Fundaes:

<https://drive.google.com/file/d/1cN2KGzQ-v7jx98vRtDM769sKzWxatq3X/view?usp=sharing>



# Finmechanics

**Profile:** Finance

## **About:**

FinMechanics provides consulting services to and builds applications/tools for the Treasury, Capital Markets and Risk departments of banks and financial institutions. We work on all the areas of a bank's treasury starting from pricing tools, market data management, trading and order management capabilities, risk management, trade processing, settlement and accounting systems. In the Enterprise Risk space, our Subject Matter Experts help risk departments evaluate Value at Risk, perform Asset Liability Management and set up Limit Monitoring frameworks for market, credit and trading risks. In the consulting space, we provide an exhaustive range of services on leading Treasury solutions like Numerix, Murex, Kondor+, Calypso, etc. In the last 11 years, we have worked with Global and Regional Banks in Asia-Pacific and UAE.

## **Job Description:**

The internship program at FinMechanics will involve consulting as well as creating solutions for capital markets, treasury and risk departments of financial institutions. The internship projects will involve understanding the functional and business requirements and creating solutions using mathematics, finance concepts, computing and technological skills. The exact details of the project will be communicated before the start of the internship.

**Intern** -8 weeks

**Location:** Mumbai

## **Shortlisting Process:**

Resume Shortlisting, Aptitude and Technical Test, Interview

**CGPA Cutoff:** No, shortlisting done on the basis of a course on Probability.

## **Test:**

MCQ / Objective, Coding

Mathematical Aptitude, Logical Reasoning, Probability, CS Fundamentals

## **Interview:**

Number of interview rounds - 2

### Round 1:

Technical -

Probability, DSA, Coding Logic, some programming concepts (OOP), BrainTeaser

Asked - Questions on Bayes theorem, probability in infinitely repeating the process with some basic DSA questions

- An ant is moving from the centre of an edge of a cube to the centre of a side adjacent to the sides connected to the edge (ie edge and face share a vertex). Find the shortest path the ant can take.
- Given constructors and class inheritance descriptions. Tell the order in which the constructors will execute.

### Round 2:

HR and Resume

Eg: qualities about yourself which may not be good for this interview.

### Suggestions:

- They might ask about the PORs you mention in your resume, be careful if you've dropped any POR in between and be clear about your experience in them.
- Focus on your CGPA, Coding skills and Communication skills. Maintain a Technically sound well-balanced profile, it'll be helpful if you have Competitive Programming Achievements. If you have a project in coding, they will ask questions about it.
- Questions were largely based on Probability and Statistics. Show genuine overall interest in software and Finance, this might be enough to overcome low comparative CGs.
- 1st Year - Try CP to improve algorithmic problem-solving skills  
2nd Year - Start DSA, Do a few projects  
Try to prepare for 1 thing properly and start early.

### Preparation Material:

- 50 Challenging Problems in Probability
- Financial Markets Coursera Course
- Mit-ocw course on Probability
- Brainstellar
- Leetcode/Hackerrank for DSA

### **Open For -**

**UG Degree**

BTech - All

**PG Degree**

Dual Degree - All

IDDD -

- Advanced Materials and Nanotechnology
- Biomedical Engineering
- Tech MBA
- Quantum Science and Technology
- Robotics
- Data Science
- Computational Engineering

### **Stipend**

Currency Type:	INR
Amount:	130000 Monthly
Other Facilities:	No
Accommodation:	No
Travel Allowance:	No
Food Allowance:	No

# Jane Street

**Profile:** Quantitative Trading

## About Jane Street

### Job Description

Our internships center around hands-on mentorship and a robust educational curriculum that includes challenging classes, interactive sessions, and small group discussions. Over the course of 10 weeks, you'll be matched with full-time employees in your role who will mentor you as you tackle real-world projects they design. You'll also be able to access our physical and virtual educational resources, attend guest speakers and social events, and hopefully get a real sense of what it would be like to work here full time.

If you've never thought about a career in finance, you're in good company—many of us were in the same position before working here. If you have a curious mind, a collaborative nature, and a passion for solving interesting problems, we have a feeling you'll fit right in.

#### About the Position:

As a Quantitative Trading intern, you'll be part of an immersive experience, paired with experienced Traders who will teach you how we identify market signals, analyze and execute trading strategies, construct quantitative models, conduct statistical analysis, and build trading intuition.

During the program you'll work on projects that expose you to the wide variety of problems, we solve every day. Interns have the chance to be mentored sequentially by full-time employees working in two different areas of trading.

Quantitative Trading interns work on a diverse range of projects with their mentors, conducting studies on new or existing datasets, building quantitative models, writing new tools, or even considering big-picture questions that were still trying to figure out. Project work is complemented by classes on the broader fundamentals of markets and trading, lunch seminars, and dozens of simulated interactive trading sessions.

A profitable trading strategy is only as strong as the technology it runs on, and we consider ourselves as much a technology company as a trading firm. While exposure to a particular programming language is not required, general programming experience is a plus.

If you'd like to learn more, you can read about our interview process and meet some of our newest hires.

<https://www.janestreet.com/join-jane-street/interviewing/>

<https://www.janestreet.com/join-jane-street/get-to-know-us/>

About You:

We don't expect you to have a background in finance or any other specific field—we're looking for smart people who enjoy solving interesting problems. We're actually more interested in how you think and learn than what you currently know. You should be:

- A strong quantitative thinker who enjoys working collaboratively on a team
- Eager to ask questions, admit mistakes, and learn new things
- Fluent in English

**Shortlisting Process:** Resume shortlisting, test (only for a few), two 50-60 min Zoom call interviews before the Day 1, interview

**Test:** Online – 2Hrs. After resume shortlist, selected students will be invited to the first step which will be an online test (focused on math/probability puzzles) OR a Zoom call with a trader (working on math/probability puzzles).

Those who pass the first step will be invited to the next Zoom call with another trader, also working math/probability puzzles but slightly more difficult.

**CGPA Cutoff :** - Official CG cutoff was 7. But the first round zoom calls were ordered on the basis of CGPA.

**GD:** No

**No of interview rounds - 3**

**Interview:**

- Students who pass the first two steps will be invited for final day interviews which will consist of three back-to-back 1-hour rounds of math/probability puzzles and betting games.
- All rounds are technical, no HR.

- All rounds have probability and problem-solving questions. Expected values were asked in a lot of questions.
- Each round involved some sort of a trading game, involving cards, dice & coins.
- Questions involved decision-making using probability, problems involving games wherein you need to develop a strategy for positive expectancy, and game theory.
- Skills tested - Estimation of expected value, market making (the required market making will be taught before the interview. Understanding that is crucial).
- Mostly no coding involved. Some candidates had very basic coding questions.

### Round 1:

- For some students, it was a test. For others, interview.
- 1-2 hours

### Round 2:

- 1-2 hours

### Round 3:

- 1-2 hours

### Suggestions:

- Math olympiad ranks, Jee advanced rank, cgpa, and ML-based projects are some points that can help during resume shortlisting.
- Problem-solving based on logical thinking and probability is the major focus of the selection process once resume shortlisting is done.
- Good depth in basics of probability, and good thinking to reason out and find optimal strategies help.
- Background in finance is not exactly necessary but might give an edge
- Be a little comfortable with Excel.
- Solve puzzles.
- DSA knowledge and starting CP early helps for SD & Quant interns.
- Don't hesitate to speak up during the interview, be free, calm, and show interest in problems during the interview. Even if you take time to think before answering, try not to take long and speak up once in a while, the interviewer could help.
- Speak up and understand the problem properly by asking clarifying questions.
- Look at the process of solving a problem as more of a discussion and keep giving updates on what you are doing. Show your thinking process.

- Once you make it to the interview process, can reach out to seniors placed there for a better understanding of what to expect.

### Preparation Material:

- <https://youtu.be/qgLLuggyfkA> [https://youtu.be/NT\\_l1MjckaU](https://youtu.be/NT_l1MjckaU) - an excellent and accurate example of their interview process.
- Brainstellar for problem-solving.
- Books like 'Heard on the Street 40 probability questions', '50 problems of probability'. Other books with logical reasoning questions and probability questions.
- Jane Street's website has problems.

### Open for:

- Btech: All
- Dual Degree: All
- IDDD: Computational Engineering
- MTech: Computer Science & Engg, Electrical Engg, Mathematics, Physics

### Stipend:

**Currency Type :** HKD

**Amount :** \$125,000 Monthly

**Other Facilities :** You will also receive a one-time sign-on bonus of HK\$75,000 which will be paid with your first paycheck.

**Accommodation :** ~INR 200,000 (or equivalent to HK\$20,000) per month accommodation stipend. We will also help book the accommodation at our preferred serviced apartment if needed.

**Travel Allowance :** Your travel to and from Hong Kong will be arranged and paid for by Jane Street. (FLIGHT)

**Food Allowance :** Breakfast and lunch are served in the office during workdays.

### Link To Video Fundaes:

<https://drive.google.com/drive/folders/1j4Dm1lKdTK7j7TEMKIZkAoNRXnZ7635s>

# Jane Street

**Profile:** Software Developer

## About Jane Street:

### Job Description:

Our internships center around hands-on mentorship and a robust educational curriculum that includes challenging classes, interactive sessions, and small group discussions. Over the course of 10 weeks, you'll be matched with full-time employees in your role who will mentor you as you tackle real-world projects they design. You'll also be able to access our physical and virtual educational resources, attend guest speakers and social events, and hopefully get a real sense of what it would be like to work here full time.

### About the Position:

During the program you'll work on projects that expose you to the wide variety of problems, we solve every day. Interns have the chance to be mentored sequentially by full-time employees.

We consider ourselves as much a technology company as a trading firm. While exposure to a particular programming language is not required, general programming experience is a plus.

If you'd like to learn more, you can read about our interview process and meet some of our newest hires.

<https://www.janestreet.com/join-jane-street/interviewing/>

<https://www.janestreet.com/join-jane-street/get-to-know-us/>

**Shortlisting Process:** Resume shortlisting, test (only for a few), interview

**CGPA Cutoff:** -

**GD:** No

**No of interview rounds** - 4



### Interview:

- All rounds are technical, no HR.
- Software development algorithms, clean code, design patterns were focussed

There were 4 interview rounds, each mainly focussing on programming and DSA. In each of the problems they evaluated your thinking process, articulation, code quality and understanding. Some sample problems include:

- Find a loop in a linked list
- implement a hard disk emulator
- implement scrabble (the board game)

Programming skills, along with winning in Jane Street's Electronic Challenge is a definite plus and can appeal to the panel.

### Suggestions:

- Math olympiad ranks, Jee advanced rank, cgpa, and ML-based projects are some points that can help during resume shortlisting.
- Problem-solving based on logical thinking and probability is the major focus of the selection process once resume shortlisting is done.
- Good depth in basics of probability, and good thinking to reason out and find optimal strategies help.
- Background in finance is not exactly necessary but might give an edge
- Be a little comfortable with Excel.
- Solve puzzles.
- Don't hesitate to speak up during the interview, be free, calm, and show interest in problems during the interview. Even if you take time to think before answering, try not to take long and speak up once in a while, the interviewer could help.
- Speak up and understand the problem properly by asking clarifying questions.
- Look at the process of solving a problem as more of a discussion and keep giving updates on what you are doing. Show your thinking process.
- Once you make it to the interview process, can reach out to seniors placed there for a better understanding of what to expect.

### Preparation Material:

- Brainstellar for problem-solving.
- Books like 'Heard on the Street 40 probability questions', '50 problems of probability'. Other books with logical reasoning questions and probability questions.
- Jane Street's website has problems.

### Open for:

- Btech: Computer Science & Engg, Electrical Engg, Engineering Physics
- Dual Degree\*: Computer Science & Engg, Electrical Engg, Physics
- IDDD: Computational Engineering
- MTech: Computer Science & Engg, Electrical Engg, Mathematics, Physics

### Stipend:

**Currency Type :** INR

**Amount :** 1,190,000 - 1,200,000 (or equivalent to HK\$125,000) Monthly

**Other Facilities :** No

**Accommodation :** INR 190,000 (or equivalent to HK\$20,000) per month accommodation stipend. We will also help book the accommodation at our preferred serviced apartment if needed.

**Travel Allowance :** FLIGHT

**Food Allowance :** No

### Link To Video Fundaes:

<https://drive.google.com/drive/folders/1j4Dm1lKdTK7j7TEMKIZkAoNRXnZ7635s>

# Microsoft

**Profile:** Machine learning

## About Microsoft:

Microsoft India (R&D) Private Limited, a subsidiary of Microsoft Corporation, set up Microsoft India Development Center (MSIDC) at Hyderabad in 1998. Over the course of the past 21 plus years, we have expanded to become one of Microsoft Corporation's largest R&D centers outside its headquarters in Redmond. MSIDC is a part of Microsoft Corporation's strategy of global shared development, where teams across geographies collaborate to build great software and services. Our engineers in MSIDC contribute to the engineering of critical and important technologies in the above areas, thereby impacting millions of lives.

## Job Description:

- Develop highly scalable classifiers, data regression, recommendations and predictive models
- Analyze petabytes of data and mine patterns from logs
- Bring data to life using rich visualizations
- Create language models, speech models, vision models, etc.
- Suggest, collect and synthesize requirements and innovate to create next-generation feature sets.
- Enable natural and contextual interactions in apps integrating cognitive and analytics services
- Adapt standard ML methods to best exploit modern parallel environments.
- Implement algorithms that power user and developer-facing products reaching out to millions of users. Measure and optimize the quality of your algorithms.
- Work in product teams shipping large scale end to end applications/solutions.

**Shortlisting Process:** Resume shortlist, test, interviews

**CGPA Cutoff :** 7

## Tests:

Technical test:

- Questions based on TP/FP/precision. Some were based on random forest. Some SQL and
- Statistics questions were also there.

- ML theory and usage of ML libraries like sklearn and nltk.
- K means clustering, decision trees, regression, neural networks.

**Number of Interview rounds :** 2 ( 1 Technical + 1 Live Coding round) { only technical test, on aptitude test}

**GDs :** No

### **Interviews:**

- Questions were based on Data Science, Probability and Linear Algebra, Basics of DSA and very basic DBMS questions.
- Qns based on Linear Regression, some assumptions in Logistic regression, how is the log loss related to bernoulli distribution. The HR round was very lite just introducing each other and general conversation on what was done in the company.

### **Suggestions:**

- Complete probability and statistics course. Do many practice problems. Pick a profile to target, go through bluebook for interesting companies to apply to. Approach seniors for fundaes one on one (especially people you know personally). Find 1-3 primary targets and 4-5 secondary target companies. Research the primary target companies and watch the feedback sessions. Attend as many tests as possible in your target profile for test experience.
- Use paper and pen during interviews if got stuck.
- Don't worry about the result, just do your best.
- Always speak out your mind
- Dont forget to give all possible solutions to your questions. Dont engage in arguments. Keep your answer to the point. If you dont know the concept then let them know that and then try to attempt the question. Finally show involvement in learning by asking whether the answers were right for the questions and if not ask them what works have been a better approach.
- Ability to demonstrate an understanding of computer science fundamentals, including data structures and algorithms.
- Ability to write clean, well-crafted code with an emphasis on quality, simplicity, durability, and maintainability.
- Communicate effectively to surface progress, risks and help needed within the project team.

- Good to have: Kaggle score, knowledge of C++, C#, and .NET , R / Matlab / Scipy / Pandas / Weka, and scripting languages such as Perl, Python.

### **Preparation Material:**

- Leetcode easy and few medium,
- Analytics Vidhya data science articles
- Interview bit
- MA2040 - Probability.
- Coursera - Andrew Ng Machine Learning, Deep Learning Specialization

### **Open for:**

- Btech: All
- Dual Degree: Aerospace Engg, Biotechnology, Chemical Engg, Civil Engg, Computer Science & Engg, Engineering Design, Electrical Engg, Mechanical Engg, Metallurgical & Materials Engg, Ocean Engg, Physics
- IDDD : Data Science.

### **Stipend details:**

<b>Currency Type :</b>	<b>INR</b>
<b>Amount :</b>	<b>125000 Monthly</b>
<b>Other Facilities :</b>	<b>No</b>
<b>Accommodation :</b>	<b>No</b>
<b>Travel Allowance :</b>	<b>No</b>
<b>Food Allowance :</b>	<b>No</b>

**Location of Operation:** Hyderabad, Bangalore. Noida

# Microsoft

**Profile:** Technical Program Manager

## **About:**

Microsoft India (R&D) Private Limited, a subsidiary of Microsoft Corporation, set up Microsoft India Development Center (MSIDC) in Hyderabad in 1998. Over the course of the past 21-plus years, we have expanded to become one of Microsoft Corporation's largest R&D centres outside its headquarters in Redmond. MSIDC is a part of Microsoft Corporation's strategy of global shared development, where teams across geographies collaborate to build great software and services. Our engineers in MSIDC contribute to the engineering of critical and important technologies in the above areas, thereby impacting millions of lives.

## **Job Description:**

Technical Program Managers are responsible for delivering technological solutions for the product. You work on the feature planning and design, manage the specifications of their development, and monitor their ongoing operation to better understand customer experiences. You work collaboratively with teammates to ensure our products exceed customer expectations. You communicate throughout the process to understand progress towards delivery, and technical challenges, and to provide clarity on customer needs using a data-driven approach.

You will be expected to demonstrate an ability to learn and adopt relevant new technologies, tools, methods, and processes to leverage in your solutions. As a technical program manager, some of the questions which you would be addressing through your role are:

Who is the customer? What customer problem am I addressing?

What success metrics should I define to enforce the high quality of my service (% Availability, latency (in MS) etc.)

After defining success metrics, how do I identify areas to drive improvement and prioritize solutions that yield maximum benefit? How does my solution scale to the customers' needs?

**Intern** -8 weeks

**Location:** Hyderabad, Bangalore, Noida

## **Roles and Responsibilities:**

The role entails the following aspects:

**Defining Product Architecture:** Identifying integrated solutions for technical needs across areas such as scale, build-out, capacity, performance, etc.

**Defining and Executing Product Strategy:** Develop a technical understanding of the underlying platform, gaps and opportunities, and gather requirements to drive the vision, strategy and KPIs (Key Performance Indicators).

**Building and Evolving the Product:** Build an understanding of business scenarios and technical complexities – to motivate & drive design improvements and increase applicability & platform reliability.

**Shortlisting Process:** Resume Shortlisting, GD (case study round), Interview

**CGPA Cutoff:** 9+ CGPA

### **Group Discussion:**

This was a case study discussion.

Eg: How would you map teachers to schools and scholars efficiently given you are the education minister

### **Interview:**

Number of interview rounds - 2

### **Round 1:**

Questions were based on a core background - included Case Interviews and Technical Interviews, including questions on Data Science/CSE background based on what you mention in your resume.

Eg: How do you design a toll ticketing system such that there is minimal delay and everyone pays the toll without missing?

### **Round 2:**

The topic was App design. They focussed more on thinking rather than answering.

Eg: There is some bug in the Teams app, due to which users were unable to log in quickly, few do and few don't. How will you solve and what you will improve?

### **Suggestions:**

- Focus on the solving process rather than answering correctly. Explain your thinking process coherently.
- Do PoRs: For improving soft skills, and learning to communicate efficiently – Be friendly and open, they also want to see if you connect well with people.
- If going to non-core - Do DSA or do Case studies with friends etc.
- If going to CS Core, focus on OS, DBMS, etc
- For everything, aptitude practice is necessary

### **Preparation Material:**

Look at multiple YT videos and blogs on TPM interviews and solve case studies extensively.

### **Open For -**

**UG Degree**

BTech - All

### **PG Degree**

Dual Degree-

- Aerospace Engg
- Biotechnology
- Chemical Engg
- Civil Engg
- Computer Science & Eng
- Engineering Design
- Electrical Engg
- Mechanical Engg
- Metallurgical & Materials Engg.
- Ocean Engg.
- Physics

### **Stipend**

Currency Type:	INR
Amount:	125000 Monthly
Other Facilities:	No
Accommodation:	No



# Microsoft

**Profile:** Software Engineering Intern.

**About Microsoft :** Microsoft India (R&D) Private Limited, a subsidiary of Microsoft Corporation, set up Microsoft India Development Center (MSIDC) at Hyderabad in 1998. Over the course of the past 21 plus years, we have expanded to become one of Microsoft Corporation's largest R&D centers outside its headquarters in Redmond. MSIDC is a part of Microsoft Corporation's strategy of global shared development, where teams across geographies collaborate to build great software and services. Our engineers in MSIDC contribute to the engineering of critical and important technologies in the above areas, thereby impacting millions of lives.

## **Job Description:**

**Domestic( internship location-hyderabad,noida,bangalore), 8-10 weeks duration.**

Software engineers (SWEs) work with teammates to solve problems and build innovative software solutions. You are passionate about customers and product quality, and you provide technical guidance to Program Managers as they consider user needs and product requirements. You will also be expected to demonstrate an ability to learn and adopt relevant new technologies, tools, methods and processes to leverage in your solutions. As a SWE, you are dedicated to design, development and testing of next-generation software which will empower every person and organization on the planet to achieve more.

- Applies engineering principles to solve complex problems through sound and creative engineering.
- Quickly learns new engineering methods and incorporates them into his or her work processes.
- Seeks feedback and applies internal or industry best practices to improve his or her technical solutions.
- Demonstrates skill in time management and completing software projects in a cooperative team environment.

## **Eligibility criteria :**

- One year of programming experience in an object-oriented language.
- Ability to demonstrate an understanding of computer science fundamentals, including data structures and algorithms.

- Ability to write clean, well-crafted code with an emphasis on quality, simplicity, durability, and maintainability.
- Communicate effectively to surface progress, risks and help needed within the project team.

### **Shortlisting Process:** Resume shortlist, test, interviews

**CGPA Cutoff :** 7 above

### **Test :**

Topics : ML and DL questions. coding based on ML questions using sklearn library, Projects, fundamentals of ML, probability and statistics.

### Examples:

- Questions on strings and arrays.
- Given a string containing only 'a', 'b', '?'. Find the number of possible strings such that if '?' is replaced by 'a' or 'b' it should not contain 3 same consecutive letters.
- Given N dice rolls as array A . You don't remember the next k numbers. Return an array containing k numbers. AM of N+k number is given. Return k sized array that satisfies the given condition

Test pattern: MCQ , Coding

**GD:** No

### **Interview:**

**No of interview rounds** - 3- (2 technical and 1 Hr)

- Questions based on Coding questions in both, for me on - binary Search(modified), graphs(not to code but explain approach), and trees.
- Data structures and algorithms and computer architecture Related to cache protocols
- Programming questions with basic questions for round 1, followed by intermediate questions in round 2 and 3. General linear programming questions should suffice

### **Suggestions:**

- Just try to be calm. Don't compare yourself with anyone else. & Don't lie about anything, be fair.

- Always speak loud abt ur thought process and keep confidence all the time
- Don't worry much about companies or place of work or stipend..apply for all companies in ur interest of field, do well in all and don't keep single or specific companies as targets.As all companies are good.This will release pressure.Also it is possible that even if u do good , sometimes u might get rejected verdict because of arbitrary tie breaks by some companies which is not in ur hands.So just be confident to do best.
- If stucked, try discussing your thought process with interviewer, they'll guide you towards the correct approach

### Preparation Material:

- Preparing from leetcode, code chef, code forces, interview bit etc.
- Basic DSA... searching and sorting
- Basic Math, Logic. & Dynamic Programming

### Open for:

- Btech: All
- Dual Degree: All
- Mtech: Computer Science ,Electrical engineering

### Stipend:

<b>Currency Type :</b>	<b>INR</b>
<b>Amount :</b>	<b>125000 Monthly</b>
<b>Other Facilities :</b>	<b>No</b>
<b>Accommodation :</b>	<b>No</b>
<b>Travel Allowance :</b>	<b>No</b>
<b>Food Allowance :</b>	<b>No</b>

### Link To Video Fundaes:

<https://drive.google.com/file/d/1TqjF9yAcneLXgAasXQhGy0e74YuNeGLZ/view?usp=sharing>

# NK Securities

**Profile:** Quantitative researcher

## About NK Securities:

NK Securities Research is a leading financial firm that leverages cutting-edge technology and sophisticated algorithms to trade the financial markets. Founded in 2011, we have gained invaluable experience in the field of High-Frequency Trading across different asset classes.

## Job Description:

We are seeking to recruit a quantitative research intern to work out of our Gurgaon office. As a quantitative researcher, your responsibilities would include:

- Develop and improve trading models using the in-house platform.
- Analyze large financial datasets to identify trading opportunities.
- Provide analytical support to experienced traders.
- Develop models to predict market movements.

## Qualifications:

- Strong analytical skills
- Hard-working and strong work ethic
- Programming experience in C++ or C
- Proficiency in using Python, R, or Matlab for statistical or data analysis of HFT tick data
- Excellent communication skills

## Benefits:

- NK Securities Research offers compensation above industry standards for deserving candidates.
- Exceptional performance is rewarded with a handsome variable bonus going up to 100% of the fixed compensation.

- We are a fast-growing organization where there is no ceiling on the career trajectory of an individual.
- The startup-style governance of the firm enables the newest employees to work with industry veterans.
- Our focus is on premium quality of life, and we encourage everyone in the firm to thrive in all aspects of their lives.

**Shortlisting process:** • Resume shortlist

- Test (Coding)
- Interview

[The CP rating was also taken into consideration.]

**CGPA cutoff:** 8+ CGPA was the general cutoff.

#### **Tests:**

There was a coding test conducted that mostly focused on typical array-based problems (where  $n^2$  is easy but  $O(n)$  is challenging) and other graph problems.

**GD:** No

**No. of Interview Rounds:** 2

#### **Interviews:**

- There were two interviews conducted in which they asked quant- and probability-based puzzles. They were quite helpful in giving hints and helping us think whenever we were stuck somewhere.
- For software roles, they focused on computer architecture (cache memory, pipeline processor) and asked a lot of questions about OOPS. They also asked about a couple of CP problems: medium and hard (one each).
- Problem-solving skills and the approaches used for solving a problem were heavily tested in each stage of the interview. For software, it was quite straightforward, based mainly on core CS courses.
- For CP problems, they just wanted to know your approach. OOPS, and the architecture stuff was just knowledge-based.

#### **Suggestions:**

- Start competitive programming as early as possible, preferably in the first year itself.
- In the second year, focus on improving problem-solving skills and practicing probability-based questions.
- Doing architecture courses in CS and/or MA courses on probability could help you get shortlisted for the interview.
- If you plan well enough in the 2 months of summer vacations, then that is sufficient time for a good level of preparation.

### **Preparation material:**

- For quant roles, puzzles from Brainstellar would help.
- Probability questions: a book called "50 Problems in Probability" and revising the MA2040 (probability and stochastic processes) notes
- Software: Just practice some CP problems from Codeforces, CodeChef, and Leetcode.
- Soft skills: Youtube videos

**Open for:** B.Tech: Computer Science and Engineering, Electrical Engineering

Dual Degree: Computer Science and Engineering, Electrical Engineering

IDDD: Data Science

### **Stipend:**

Currency Type: INR

Amount: 450000 Monthly

Other Facilities: 4.5L per month + Full accommodation during the entire duration of the internship

Accommodation: No

Travel Allowance: No

Food Allowance: No

# NK Securities

**Profile:** Software development ( infrastructure ) engineer

## About NK Securities:

NK Securities Research is a leading financial firm that leverages cutting-edge technology and sophisticated algorithms to trade the financial markets. Founded in 2011, we have gained invaluable experience in the field of High-Frequency Trading across different asset classes.

## Job Description:

### Responsibilities:

- Implement high-frequency automated trading systems.
- Optimize trading systems by using networks and systems programming.
- Do Research and development of algorithms to reduce the latency of trading systems.
- Build risk-management and performance-tracking tools.
- Be responsible for modules including research, design, development, deployment, optimization and support.

### Qualifications:

- A degree in Computer Science, Mathematics or Engineering from the top IITs
- A strong background in C/C++ programming, object-oriented programming, data structures and algorithms
- Working knowledge of Linux
- Working knowledge of Python and shell scripting
- Excellent problem-solving abilities
- Excellent communication skills
- Any of the following is a plus:
- An understanding of TCP/IP and Ethernet
- Familiarity with parallel programming models and parallel algorithms
- Experience in the HFT industry
- Financial experience is not required but an interest in financial markets is a plus.

**Benefits:**

- NK Securities Research offers compensation above industry standards for deserving candidates.
- Exceptional performance is rewarded with a handsome variable bonus going up to 100% of the fixed compensation.
- We are a fast-growing organization where there is no ceiling on the career trajectory of an individual.
- The startup-style governance of the firm enables the newest employees to work with industry veterans.
- Our focus is on a premium quality of life and we encourage everyone in the firm to thrive in all aspects of their lives.

**Shortlisting process:**

- Resume shortlist
- Test (Coding)
- Interview

[ CP rating was also taken into consideration ]

**CGPA cutoff:** 8+ CGPA was the general cutoff.

**Tests:**

- There was an objective coding test
- It was based almost entirely on topics like data structures and algorithms, probability, OOPS etc.

**GD:** No

**No. of Interview Rounds:** 2

**Interviews:**

- They were gauging the depth of knowledge and your application skills.
- Like in the tests, the questions were majorly on data structures and algorithms, probability, OOPS etc.



### **Suggestions:**

- Do not stress out, just give your best and do not think about anything else.
- Starting early will give you more time to prepare, but ultimately, the way you're preparing matters more. Even in a short span, one can prepare efficiently.

### **Preparation material:**

- For coding - CodeForces, Leetcode and gfg (refer to cp problems).
- For probability related questions - 'Heard on the Street', 'Fifty problems in probability', 'Zetamac' (for mental math), 'BrainStellar' etc.

**Open for:** B.Tech: Computer Science and Engineering, Electrical Engineering  
Dual Degree: Computer Science and Engineering, Electrical Engineering  
IDDD: Data Science

### **Stipend:**

Currency Type: INR

Amount: 450000 Monthly

Other Facilities: 4.5L per month + Full  
accommodation during  
the entire duration of  
internship

Accommodation: No

Travel Allowance: No

Food Allowance: No

# NoBroker

**Profile:** Product Analyst Intern

## About:

NoBroker is making the entire real-estate transaction journey seamless with the help of technology. The huge amount of data we generate on the platform helps us to use Machine Learning and Artificial Intelligence leading to faster closures and customized offerings for every customer. The support provided to us by our investors is a testimonial to our ongoing tech innovation.

NoBroker Pay, NoBroker Hood, NoBroker Home Services, and several such innovations are deepening the engagement of owners, tenants, buyers, and community residents with its platform making it a go-to-destination beyond its core offering of rental and sale transactions. NoBroker is a one-stop-shop for the entire real estate transaction journey ranging from the rental, sale, or resale to post-transaction services like loans, packers and movers, legal documentation, online rent payment, interiors, etc. NoBroker currently operates across six cities including Mumbai, Bangalore, Pune, Chennai, Hyderabad, and Delhi-NCR.

## Job Description:

### Role:

- You will be understanding our customer's requirements through primary and secondary research.
- You will be initiating lead development of the product and feature roadmap
- You will be Preparing/Identifying, conceptualizing and prototyping our several customer's engagements through apps and websites.
- You will be helping us in improving operations and setting new business goals by designing/improving processes.
- As part of the product team of NoBroker, you will be having a lot of interactions with business, operations, and customer servicing team.

### Responsibilities:

- You will be responsible for driving new feature development from start to finish - write specs, work cross-functionally with the engineering team, design our data to launch features, analyze results and make iterations.
- You will be playing a key role in owning the strategy, roadmap, and KPI for a key product area.

- Preparing roadmaps for product features and ensuring time to market is achieved by resource planning in advance.
- Take logical, data-driven decisions on product features which are highly influenceable on customer engagement and conversion
- Take the consumer experience to the next level by building a world-class product.

### **Skills:**

- Ability to understand the customer pain point and a strong desire to solve the problem in the best possible/innovative way Experience with data analysis.
  - Passion for user experience, design, and experimentation
  - Self-confidence, go-getter attitude and a great team player
  - Ability to learn and pick up new tools and technologies to help the team deliver. •
- Familiarity with programming and software development processes is a must have along with the ability to understand consumer behavior and requirements.
- Ability to suggest and consider alternative solutions to any given problem and Identify bottlenecks and help the team to resolve issues.

**CGPA:** Around 8

**Shortlisting process:** Resume Shortlisting, Interview

**No. of Interview Rounds:** 2

**Interviews:** Guesstimates, General question on current startup scene in India.

### **Preparation material:**

Product cases and guesstimates.

### **Under Graduate Degree**

BTech - All

### **Post Graduate Degree**

Dual Degree - All

IDDD

- \* Advanced Materials and Nanotechnology
- \* Bio-Medical Engineering
- \* Computational Engineering
- \* Data Science
- \* Robotics
- \* Quantum Science and Technology
- \* Tech MBA

**Stipend Details**

Amount : INR 40000 Monthly

Other Facilities : No

Accommodation : No

Travel Allowance : No

Food Allowance : Free Lunch & Snacks

# NoBroker

**Profile:** Software Development Engineer

## **About:**

NoBroker is making the entire real-estate transaction journey seamless with the help of technology. The huge amount of data we generate on the platform helps us to use Machine Learning and Artificial Intelligence leading to faster closures and customized offerings for every customer. The support provided to us by our investors is a testimonial to our ongoing tech innovation.

NoBroker Pay, NoBroker Hood, NoBroker Home Services, and several such innovations are deepening the engagement of owners, tenants, buyers, and community residents with its platform making it a go-to-destination beyond its core offering of rental and sale transactions. NoBroker is a one-stop-shop for the entire real estate transaction journey ranging from the rental, sale, or resale to post-transaction services like loans, packers and movers, legal documentation, online rent payment, interiors, etc. NoBroker currently operates across six cities including Mumbai, Bangalore, Pune, Chennai, Hyderabad, and Delhi-NCR.

## **Job Description:**

We are looking for a passionate Software Engineer to design, develop and install software solutions. You will form part of a team that will build infrastructure to revolutionize the way real estate transactions work in India.

We are looking for a solid Rockstar engineer who can hack around multiple technologies and build highly scalable, low latency, distributed systems with RESTful services, the latest frontend

MVC frameworks, native apps for Android & IOS, and part of building core front-end frameworks.

The pace of our growth is incredible – if you want to tackle hard and interesting problems at scale, and create an impact within an entrepreneurial environment, join us!

## **Primary Responsibilities :**

- Building robust, secure, high-volume performing, scalable microservices that operate 24\*7 to power NoBroker platform for end customers
- Responsible for implementing RESTful services, latest frontend MVC frameworks, native apps for android & IOS and part of building core frontend frameworks, with metric-driven KPIs.

- Produce high quality software that is unit tested, code reviewed, and checked in regularly for continuous integration
- Working closely with other team members to develop reusable UI components.
- Working closely with our product team to build new and compelling experiences for our customers

### **Skills and Requirements:**

- Applicants should have minimum knowledge on any one of these C C++ Java technologies.
- Should be able to handle the Projects.
- Candidates with excellent communication skills.
- Good knowledge on software Technologies, Analytical and Problem solving skills and have interest to learn.
- Background knowledge with frontend technology like javascript and jquery.
- High adaptability in a dynamic start-up

**CGPA:** Around 8

**Shortlisting process:** Resume Shortlisting, Interview

**No. of Interview Rounds:** 3

**Interviews:** DSA, OOPS and a few rapidfire questions on coding.

### **Preparation material:**

- DSA
- Some basic projects

### **Open for:**

**Under Graduate Degree**

BTech - All

**Post Graduate Degree**

Dual Degree - All

IDDD

- \* Advanced Materials and Nanotechnology
- \* Bio-Medical Engineering
- \* Computational Engineering
- \* Data Science
- \* Robotics
- \* Quantum Science and Technology
- \* Tech MBA

**Stipend Details:**

Amount: INR 40000 Monthly

Other Facilities: No

Accommodation: No

Travel Allowance: No

Food Allowance: Free Lunch & Snacks

# Nomura

**Profile:** Global Markets Analyst

## About Nomura:

Nomura is an Asia-headquartered financial services group with an integrated global network spanning over 30 countries. By connecting markets East & West, Nomura services the needs of individuals, institutions, corporates and governments through its four business divisions: Retail, Investment Management, and Wholesale (Global Markets and Investment Banking). Founded in 1925, the firm is built on a tradition of disciplined entrepreneurship, serving clients with creative solutions and considered thought leadership. For further information about Nomura, visit [www.nomura.com](http://www.nomura.com). Nomura's Wholesale business includes Global Markets (Fixed Income & Equities) and Investment Banking division (ECM, DCM, M&A). The wholesale division operates across all four regions – Japan, Asia, Europe and Americas – and is a globally integrated franchise.

## Job Description:

We are currently looking to recruit interns for our Global Markets Division. Based in Mumbai, the front-office team which works on a team extension model delivers pricing, modelling and risk management expertise to the Global Markets business. Founded as a centre of excellence, the group leads the way in price discovery and portfolio optimization techniques and is integral to the business' aggressive revenue targets. The team is playing an integral role in structuring, pricing, risk management and new idea generation. Global Markets Division is looking to hire interns for the following teams

1. The team works with structuring, sales and trading teams to deliver bespoke solutions to clients' hedging / investment requirements in asset classes such as Foreign Exchange, Rates, Hybrids, Credit and Equity. It involves pricing structured payoffs, preparing marketing material for the sales/structuring team, and suggesting new trade ideas to the sales team.
2. Quantitative Investment Strategies Nomura's Global Markets Quantitative Investment Strategies team has cross-market coverage encompassing equities, rates, currencies, credit, and commodities. Team takes a data-driven approach, working closely with the quantitative research team, sales team, and traders to develop investment strategies. It helps generate revenue by working with internal and external clients, providing insights and actionable ideas to manage risk exposures and deliver trading strategies.
3. ABS Strategy Nomura's European ABS team provides clients with a range of services including flow trading liquidity, bespoke solutions, in-depth market analysis, trade ideas, and



unrivalled analytics. The team in Mumbai works with two counterpart teams in London namely, ABS Flow and ABS Solutions. The team assists the London desks in identifying and valuing bond-specific opportunities in the European ABS and Real Estate market. The Mumbai team also prepares reports/presentations on the various macroeconomic and regulatory themes that impact the market thereby providing an evolution of the desk's views regarding the same.

4. Investment Products and Advisory Solutions (IPAS) – International Wealth Management  
IPAS consists of specialists working across products including Equity, Fixed Income, FX, Managed Investments and advisory roles including Wealth Planning and Discretionary Portfolio Management. The CIO office creates the broader macro theme and key pointers and then along with Product Specialists work on and manage different client portfolios. These portfolios can be of standard or tailored mandates. Product specialists in IPAS work on trading color/flows, trade execution and trade ideas on equities/ fixed income/ FX – from a cash/spot trading, structured products and derivatives perspective. Managed investments including Mutual Funds, ETFs, Hedge Funds and Private Equities are also covered by the team. The IPAS team works closely with the advisors/RMs who work directly with clients for tailor made solutions for individual portfolios.

### **Roles & Responsibilities:**

Working in close synergy with global trading desks facing dynamic markets and aggressive deadlines

Pricing FX/Rates/Credit/ Equity derivative structured products

Understanding and implementing the state-of-the-art pricing models in variable scenarios

Work in close collaboration with the global teams to help develop and validate pricing models for the new business

Pre-trade modelling, strategy selection, monitoring, performance analysis

Integration with trading systems and execution channels

Suggest and actualize innovative product designs and trading ideas

Risk modeling, optimal portfolio construction

Generating daily/weekly and monthly reports for clients pertaining to the executed trades and responding to other ad-hoc queries

Contribute towards highlighting / publishing trade ideas to Sales and Traders

Work on technical analysis, back testing of trade ideas and any other ad-hoc requests from Sales/Traders/Clients

### **Knowledge & Skills Required:**

- Core Competencies
- Strong analytical skills

- High aptitude for mathematics
- Programming skills (such as Python and VBA) to suffice structuring and trading desk requirements
- Quick Learner

#### **General Competencies:**

- Strong communication skills.
- Ability to work effectively as part of the team
- Strong work ethics
- Multitasking
- Strong inclination towards Finance

**Shortlisting Process:** Resume Shortlisting, Group Discussion, Interview

**CGPA Cutoff:** Not Considered

**No of interview rounds:** 3

#### **Interview:**

- Round 1 - Resume, Quant
- Round 2 - Finance Accounting Cases
- Round 3 - HR

#### **Suggestions:**

- Good PORs help
- Taking courses on probability, coding, and economics would help.
- Be confident during interviews

#### **Preparation Material:**

Finance, Accounting, Quant, Case study

#### **Open for:**

- Btech: All branches
- Dual Degree: All branches
- IDDD: Advanced Materials and Nanotechnology, Bio-Medical Engineering, Computational Engineering, Data Science, Robotics, Quantum Science and Technology, Tech MBA

### Stipend Details:

Currency Type :	INR
Amount :	100000 Monthly
Other Facilities :	40,000 as Relocation Allowance
Accommodation :	No
Travel Allowance :	To-&-Fro economy air fare
Food Allowance :	No

# Nomura

**Profile:** Wholesale strategy

## About Nomura:

Nomura is an Asia-headquartered financial services group with an integrated global network spanning over 30 countries. By connecting markets East & West, Nomura services the needs of individuals, institutions, corporates and governments through its four business divisions: Retail, Investment Management, and Wholesale (Global Markets and Investment Banking). Founded in 1925, the firm is built on a tradition of disciplined entrepreneurship, serving clients with creative solutions and considered thought leadership. For further information about Nomura, visit [www.nomura.com](http://www.nomura.com). Nomura's Wholesale business includes Global Markets (Fixed Income & Equities) and Investment Banking division (ECM, DCM, M&A). The wholesale division operates across all four regions – Japan, Asia, Europe and Americas – and is a globally integrated franchise.

## Job Description:

The internship will give you exposure in most of the following areas (the list is illustrative and not exhaustive):

- Work as a part of the Wholesale Strategy division on global, regional and divisional projects
- Conduct analysis of the competitive and general macro/market environment based on public data and industry reports used for senior management presentations. Consolidate/analyze quarterly financial results for Nomura and competitors
- Support strategy team seniors/business on special/ad-hoc projects (for e.g.: identifying opportunities in new areas of growth, the impact of changing regulations on capital market business, acquisition screening/evaluation, new digital business growth opportunities, etc.)
- Prepare presentations for senior management board meetings, town halls and off-sites
- Most of the projects require working closely with strategy team members, business CAOs, finance and other functional teams in different regions; working independently or with the support of another member of the team

**Shortlisting Process:** Resume shortlist, GD, Interview

**CGPA Cutoff:** 8

**GD:**

If Digital currency is centralized by government in India: Pros and Cons

A final question relating to Nomura and the GD topic would be asked, answer that well.

## **No of interview rounds - 4- (3technical and 1 Hr)**

### **Interview:**

- A case study that was given, current markets, guesstimate, why do you want to join the company if banks lower lending rates, what happens to inflation rates?
- Grilled us on a market entry case study. Guesstimates, basic financial terms like yield curve, interest rates, inflation etc. HR was a mere formality, why finance, fit with the company etc.
- Inversion of the yield curve is volatility good for an investment bank, what are futures, economic relief measures in lieu of Covid, and what will happen to the dollar if these measures are tapered.

### **Suggestions:**

- Be conversational during the interviews, and listen attentively. They are very forthcoming people and will make you feel comfortable during the interview. Be able to justify whatever you've put on the resume.
- Start exploring early on what interests you. Don't apply to companies just to get a shortlist/internship.
- Get your case study revised by a lot of seniors
- Don't forget to give all possible solutions to your questions. Don't engage in arguments. Keep your answer to the point. If you don't know the concept then let them know that and then try to attempt the question. Finally, show involvement in learning by asking whether the answers were right for the questions and if not ask them what would have been a better approach.

### **Preparation Material:**

- PoE is a highly recommended course for WS. Heard on the street, 50 problems in probability and basic financial knowledge is an added bonus. Financial Markets on Coursera is a good course for an intro to finance. ,
- You must participate in case study competitions from early on to get an advantage.
- Investopedia, geeks for geeks, Finshots, Accounting and Finance for engineers.

### **Open for:**

- Btech: All branches
- Dual Degree: All branches

**Stipend:** 75000 monthly

### **Link To Video Fundaes:**

[https://drive.google.com/file/d/1GWcOjx6l9pCuPuOja8L\\_-5G9yR0Z2YiC/view?usp=sharing](https://drive.google.com/file/d/1GWcOjx6l9pCuPuOja8L_-5G9yR0Z2YiC/view?usp=sharing)

# Wells Fargo

**Profile :** Technology Development

## **About Wells Fargo:**

Wells Fargo is a leading global financial services company headquartered in San Francisco (United States). Our business outside of the U.S. mostly focuses on providing banking services for large corporate, government and financial institution clients. We have worldwide expertise and services to help our customers improve earnings, manage risk, and develop opportunities in the global marketplace. Wells Fargo India enables global talent capabilities for Wells Fargo Bank NA., by supporting business lines and staff functions across Technology, Operations, Risk, Audit, Process Excellence, Automation and Product, Analytics and Modeling

## **Job Description**

Software development, Machine Learning

- Design, develop and test software engineering solutions to perform at scale
- Maintain reusable and reliable code and test coverage leveraging appropriate tools
- Ensure the best possible performance, quality, and responsiveness of applications
- Identify application related bottlenecks and bugs, and devise solutions to mitigate and address these issues
- Demonstrate understanding of Business Continuity Planning, quality, security and compliance requirements for supported areas
- Adhere to the coding standards and contribute to various aspects of application development such as robustness, scalability, simplification and automation
- Interact with multiple stakeholders across locations to achieve the desired goal

**Shortlisting Process:** Shortlist based on test, interview

**CGPA Cutoff :** expected to be 8.5+

**Test :** DSA, Aptitude, Quant, English

## **Interview:**

### **Round 1:**

- Both technical and HR questions
- Basics of DSA, some problems

**Suggestions:**

- Be relaxed, communication skills are very much looked for
- Be confident about points mentioned in resume
- Strong basics especially in DSA
- Start preparation as early as possible

Doing basic projects

**Preparation Material:**

- InterviewBit, Geeks for Geeks
- Data Structures and Algorithm courses
- Codechef and codeforces contests
- 10xIITian

**Open for:**

- Btech: All
- Dual Degree: All

**Stipend:** INR 130000/month

# Schneider Electric

**Profile:** Summer intern

## About Schneider Electric

Schneider's purpose is to empower all to make the most of our energy and resources, bridging progress and sustainability for all. We call this Life Is On.

Our mission is to be your digital partner for Sustainability and Efficiency.

We drive digital transformation by integrating world-leading process and energy technologies, end-point to cloud connecting products, controls, software and services, across the entire lifecycle, enabling integrated company management, for homes, buildings, data centers, infrastructure, and industries.

We are the most local of global companies. We are advocates of open standards and partnership ecosystems that are passionate about our shared Meaningful Purpose, Inclusive and Empowered values.

## Job description

We are looking forward to young Graduate Engineers from CS/IT/Mechanical/ EEE/ E&C/ E&I/ Industrial/ Mechatronics/ Power Electronics/ Robotics.

As an Intern, you'll have the opportunity to - work in a multidisciplinary team of data scientists and data engineers to build systems that drive efficiency by using state-of-the art algorithms at scale to solve complex business problems across domains. Some of the examples use cases can be: Text Analytics, Image Processing, Time Series Analysis etc.

### What will you do?

- Analyze large, complex data sets and create scalable solutions to business problems using statistical techniques and Machine Learning
- Establish scalable, efficient and automated processes for large scale data analysis, model development, deployment, experimentation, and evaluation.
- Research and implement novel machine learning and statistical approaches

### Skills and Qualifications:



- Analytic skills must include the ability to see the big picture and the demonstration of strong business intuition.
- Strong problem-solving skills with a drive to learn and master new technologies and techniques.
- Familiar with theory and practice of relevance and Machine Learning.
- Excellent verbal and written communication skills.

Additional Preferred Qualification:

- Experience using statistical computer languages (Python, R, SQL, etc.) to draw insights from large data sets.
- Experience in scripting for Automation (e.g. Python, Perl, Ruby).
- Familiarity with the Supply Chain domain

**Shortlisting process:** Test, Interview

**Test:**

- Aptitude test – 60mins; Technical test – 30mins
- MCQ/objective, psychometric test.
- Topics covered - Probability, Game theory, logical reasoning, Cores subject related questions (e.g. for mech core based questions - Strength of materials, thermal, manufacturing processes , KDOM)

**CGPA cutoff:** NA

**GD:** No

**No. of interview rounds:** 2

**Interview:**

**Round 1** (technical): Probability, Game theory, logical reasoning, Cores subject related questions (in my case mech core based questions - Strength of materials, thermal, manufacturing processes, KDOM)

1. Resume overview- questions explaining the projects and PORs (if any related to the role)

2. Guesstimate - no. of medals that can fit an Olympic sized swimming pool.
3. Probability and logical reasoning (very easy, refer Brainstellar)

**Round 2 (HR):** Gauge whether you are suitable for the role, whether you are a team player, look for leadership traits, whether you're organised or not, whether you can keep a calm mind incase things go south.

1. General questions like tell me about yourself
2. Strengths and weaknesses
3. What was a high point in your life/something you are proud of
4. Situation based questions
5. Describe yourself in one word and why; one word that your friends around would use to describe you etc.

### **Preparation materials:**

- Brainstellar
- 50 problems in probability
- Leetcode - for DSA

### **Open for:**

Btech: CS, EE, ME, EP

Dual Degree: CS, EE, ME, PH

### **Stipend:**

<b>Currency Type :</b>	INR
<b>Amount :</b>	55000 Monthly
<b>Other Facilities :</b>	No
<b>Accommodation :</b>	No
<b>Travel Allowance :</b>	No
<b>Food Allowance :</b>	No



**Profile:** Technology Consulting

**About PwC:**

PwC is one of the largest professional services firm in the world with a presence in over 150 countries and 700 cities in the world.

At PwC, while we draw upon our 160-year history, our commitment for the future is clear. We bring together the collective experience of over 284,000 people in our expansive network of firms in 155 countries to solve for tomorrow. Striving to consistently deliver innovative work that builds trust and delivers sustained outcomes. And as part of the PwC Network, we work with the world's leading organisations on their most challenging strategic problems to create real impact—building the capabilities they need to thrive in a changing world.

**Job Description:**

The Intern will be working for any one of the Technology Consulting competencies of PwC India.

As an Intern with PwC India, you will play a key role in the engagement execution. You will be provided with varied responsibilities including client acquisition support, assisting in solution design, contributing to engagement execution as a team member and on-ground client management. We encourage our Interns to participate in senior management meetings during the course of the project delivery. Interns are provided with opportunities to contribute to various thought leadership initiatives. Our Interns are excellent generalists and have a strong ability to work with managers with diverse backgrounds.

The Intern will be working for any one of the Technology Consulting competencies of PwC India.

As an Intern with PwC India, you will play a key role in the engagement execution. You will be provided with varied responsibilities including client acquisition support, assisting in solution design, contributing to engagement execution as a team member and on-ground client management. We encourage our Interns to participate in senior management meetings during the course of the project delivery. Interns are provided with opportunities to contribute to various thought leadership initiatives. Our Interns are excellent generalists and have a strong ability to work with managers with diverse backgrounds.

**Shortlisting Process:** Tests, Interviews

**CGPA Cutoff:** No specific CGPA cutoff, Recommended 8> CGPA.

**Tests:**

English and Mental Ability, Aptitude and English Grammar.

**GD:** No

**Interviews:**

One technical round, One HR round.

**Round 1: Technical and HR mix**

- Completely Resume based - walk through the resume
- The technical questions were not too deep on any topic but instead shifted according to how we were answering from our resume.
- Good Communication skills, A bit of coding skills.
- Questions from the projects you have mentioned in your resume, 2- 3 aptitude questions also asked, and more importantly the application of the projects you have worked on.
- A Few Coding Questions.

**Round 2: HR**

- HR is mostly about the company and its business model.
- Your likes and dislikes, strengths and weaknesses.
- Present yourself and answer the questions with confidence, they check your communication skills and running through your experiences and PoRs.

**Number of Offers:** 10 (Depends on the number of candidates being interviewed)

**Suggestions:**

Work on building the following set of skills:

- Basic problem solving skills
- Excellent communication skills including proficiency in English language
- Proficiency in excel and power point
- Open to regular travel; in some cases extended stay in tier 2 and tier 3 cities

- Self-disciplined and self-motivated, Ability to innovate, create lasting relationships and work independently with little supervision.

### **Preperation Material:**

- Revising core courses in insti and the resources drive from the internship team.
- Bertsekas for probability, geeksforgeeks and similar sites for coding. Other resources in the drive.
- Website - GeeksforGeeks
- A couple of mock interviews with variety of HR questions helps
- For practicing coding.- LeetCode/ HackerRank

### **Open for:**

Btech:

- Computer Science & Engg
- Electrical Engineering
- Mechanical Engineering
- Chemical Engineering

IDDD:

- Computational Engg
- Data Science
- Robotics
- Cyber Physical Systems.

MTech :

- Computer Science & Engg
- Electrical Engineering
- Mechanical Engineering

**Job Location:** Pan India

**Stipend:** Rs. 60000-70000 Monthly

# WorldQuant

**Profile :** Quantitative Researcher

## About WorldQuant

WorldQuant is a hedge fund and a quantitative investment management firm headquartered in Old Greenwich, Connecticut . Founded in 2007 by Igor Tulchinsky with the belief that talent is global, but opportunity is not, WorldQuant has more than 750 employees spread among 24 offices in 15 countries. WorldQuant seeks to get to the future faster, guided by the principle that there are an infinite number of insights to discover. The firm develops and deploys investment strategies across a variety of asset classes in global markets. It basically has two sectors: research and trading. The research sector comes up with mathematical models that help them in trading.

## Job Description:

**Domestic offer(internship location-mumbai), 8-10 weeks duration during summer**

The Role (include, but not limited to the following):

Our research subsidiary in India is seeking electrical engineering, physics, computer science, mathematics, financial engineering or any other related field majors for a quantitative researcher intern position. The goal of our internship program is to offer talented candidates a chance to learn about applications of quantitative analysis and software development to the financial markets. Specifically, interns will work closely with quantitative researchers/developers to:

- Research financial literature to identify novel ideas and build Alphas to test them.
- Create tools for the analysis of financial market data and to increase efficiency in the development of Alphas.

Its Impact: The internship program lasts 10 weeks and takes place at our Delhi / Mumbai office. Apart from gaining valuable hands-on experience on real-world projects, successful candidates have a chance to attend numerous company events, including social activities and research seminars. In addition, our friendly and collegial working environment gives interns an opportunity to interact closely with our group of highly accomplished staff and to learn more about the firm as a whole.

**What You'll Bring:**

- Have a research scientist mind-set, i.e., be a deep thinker, creative, persevering, smart, a self-starter, etc.
- Be competent in a programming language (C++ or C) and a scripting language (Perl or Python).
- Have a strong interest in learning about worldwide financial markets.
- A bachelor's, Master's, or Ph.D. degree from a leading university in a highly analytical field, such as Electrical Engineering, Physics, Computer Science, Mathematics, Financial Engineering or any other related field that is highly analytical and quantitative.
- Undergraduate or graduate students with approximately one year remaining in their academic programs will also be considered.

**CGPA cutoff:** above 8.5

**Test:** Technical + Aptitude

Topics covered: Intense math, probability, statistics,

Test pattern: MCQ/objective

**GD :** NO

**Interview:** 2 rounds

Round 1: puzzles and general questions

Round 2: more about probability

Example : Like the classic questions found in heard on the street, a question about modeling stock prices as a Markov chain.

**Preparation Material:**

- "Heard on the Street", Timothy Falcon
- "Fifty Challenging Problems in Probability with Solutions", Frederick Mosteller
- Leetcode for DSA.[Enough for WorldQuant as they only ask basic questions.]
- Brainstellar, GeeksForGeeks.
- Xinfeng

**Open for:**

- Btech: All
- Dual Degree: All
- Mtech: Open for all
- Msc: Open for all

### Suggestion:

- Math skill proficiency, Puzzles, Stats, etc, decent CGPA is required.
- I had extensive preparation of quant, had also made it to JS and Optiver final rounds, just sheer hard work i would say

### Stipend:

<b>Currency Type :</b>	INR
<b>Amount :</b>	250000 Monthly
<b>Other Facilities :</b>	Other allowance = INR 50,000 per month (includes relocation, travel and stay)
<b>Accommodation :</b>	No
<b>Travel Allowance :</b>	No
<b>Food Allowance :</b>	No