



PG Certificate Programme in

# Cyber Security Management and Data Science

12 Months | Live Online | In-campus Immersion

IIM Nagpur Executive Alumni Status

Marketing Partner

jaro education

#### **ABOUT IIM NAGPUR**



Established in 2015, the Indian Institute of Management Nagpur (IIMN) aspires to be a leading management institution that shapes management systems, policy and governance through high-quality education, research and industry engagement. Propelled by the pursuit of engaged scholarship, the Institute aims to create value-driven leaders and global managers with strong conceptual foundations and analytical approaches, which helps them excel in diverse spheres – be it management, business, policymaking, and public administration, to name a few.

IIM Nagpur aims to address the needs of a modern India; connecting aspirations and realities to attain benchmarks that are respected internationally. Our motto, सत्यं च खाष्यायप्रवचने च, that is, an inspiring journey towards truth through individual reflection and collective discourse, propels our quest to bridge the gap between abstract knowledge and practice.

IIM Nagpur seeks to distinguish itself as an institution that promotes constant industry engagement of a 'problem-solving' nature. Executive Education, therefore, is an important thrust area for the Institute. With an array of programmes designed by a faculty body with a stellar record of research, teaching and industry engagement, the Executive Education programme at IIM Nagpur equips managers and executives with the capabilities to perform effectively in their current roles and take up greater challenges through various stages of their careers.

**High-quality education** 

Top-quality research

Multi-pronged industry engagement



#### **DIRECTOR'S MESSAGE**





**Dr. Bhimaraya Metri**Director, Indian Institute of Management Nagpur

I take pleasure in welcoming you to IIM Nagpur (IIMN). IIMN was established in 2015 as the first of the third generation IIMs, by the Ministry of Education, Govt. of India at the orange city Nagpur which is equidistant (in terms of travel time by air) from major metropolises – Delhi, Chennai, Kolkata, Mumbai. It is a thriving and fastest-growing city that stands positioned as the logistics capital of India, providing fertile ground for business ventures.

The striking feature of IIMN's state-of-the-art new campus, spread over 132 acres, is its location in the heart of the industrial hub within the country's first Multi-product Special Economic Zone at MIHAN, adjacent to Dr. Babasaheb Ambedkar International Airport, Nagpur. Thus, IIMN enjoys a natural advantage of being near to industry, enabling greater connections and partnerships with businesses across the sectors in SEZ and MIDCs. IIMN's unwavering focus on pioneering exceptional industry partnerships to lead the way in providing real-world experiences prepares our management graduates for life by bringing 'corporate into classrooms' to produce relevant talent for the corporate world.



# REIMAGINE CYBER SECURITY MANAGEMENT AND DATA SCIENCE FRAMEWORKS — A STRATEGIC PRIORITY



80%

Spike in Cybercrime in Asia Pacific Regions in 2021

\*Group IB Report 2022

# 3.5 MILLION

Cyber Security jobs to be available globally

\*Cybercrime Magazine 2023

## USD 657.02 BILLION

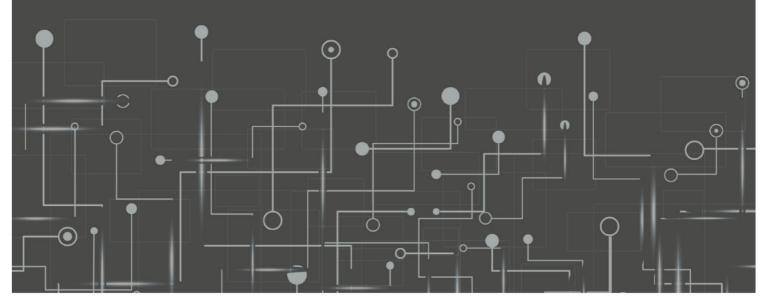
Projected to Generate in Global Cyber Security Market Size by 2030

\*Globe News Wire

# \$35.3 BILLION

Big Data Security Market Worth to Grow at a CAGR-12.4% by 2026

\*MarketsandMarkets



#### **OVERVIEW**



In the drive toward digital transformation, the industry has seen significant growth in organizations moving their data, processes, services, and infrastructure to cloud platforms. These operations are increasingly managed using networks, which has introduced substantial risks. Critical data assets are now more exposed to external vulnerabilities. As a result, security leaders across organizations face the daunting task of understanding the nuances of cloud-based models, establishing privacy, and developing security frameworks to manage and mitigate these risks.

This growing complexity has fueled the need for hybrid techno-management professionals who can evolve as strategists and leaders, rather than merely focusing on technology and tools.

Given the current context, there is a clear need for a programme that equips mid-management professionals with the necessary management credentials. Additionally, senior managers who aspire to build a strong foundation in cybersecurity management will find such a programme essential. This programme is crucial for helping working professionals in middle management roles, as well as those aspiring to senior management positions, including CTOs, and CXO-level executives strengthen their cybersecurity management skills and enhance their overall management capabilities.

This programme will equip participants with the fundamentals of cybersecurity, enabling them to assess risks and systematically manage them using various processes, techniques, and procedures. It adopts both tactical and strategic approaches, relying on fewer tools for greater efficiency.

In addition to imparting technical knowledge, the programme will emphasize overarching principles such as communication, leadership, strategy, team management, and governance. These core concepts will shape participants' understanding of cybersecurity, encouraging them to rethink and refine their approach.



#### **ELEVATING CYBER SECURITY LEADERSHIP**



Cyber threats have become more sophisticated and prevalent, making it imperative for organizations to prioritize cyber security as a strategic initiative. The CIO / CISO role is no longer just responsible for implementing security measures but is a key strategic leader who shapes the organization's cyber security vision and ensures it aligns with business objectives. They drive innovation in cyber security practices and technologies while championing the importance of cybersecurity to customers, partners, and stakeholders. In this increasingly digital world, a forward-thinking Chief Information Officer with an innovation-focused mindset is crucial to safeguarding the organization's data, reputation, and long-term success in the face of evolving cyber threats.

82%

of CIOs believe their software supply chains are vulnerable

\*betanews.com



is the anticipated cost of cybercrime in 2023, projected to rise to \$10.5 trillion by 2025



#### **PROGRAMME OBJECTIVES**





Develop capabilities to manage vulnerabilities, detect threats, and mitigate the risks caused by cyber destruction.



Provide hands-on workshops through experiential learning, using a few tools and technologies to help professionals demonstrate their prowess as business enablers and cyber warriors.



Enable participants to serve as role models, demonstrating inclusive leadership skills equipped to make tactical, strategic, and operational decisions in establishing a cyber-secure ecosystem.



Nurture participants to be beacons and catalysts for change, applying collaboration and strategic thinking to drive transformative outcomes in responding to cyber incidents.



Redefine security leadership among participants, helping them develop data-driven storytelling skills to present to management and public stakeholders in the business language.



Enable participants to develop comprehensive cybersecurity strategies around defensive and offensive approaches in managing risks and fostering security awareness.



Teach participants how to adapt to evolving needs, leverage advanced technologies, and explore opportunities in Al, automation, big data, and next-gen security.



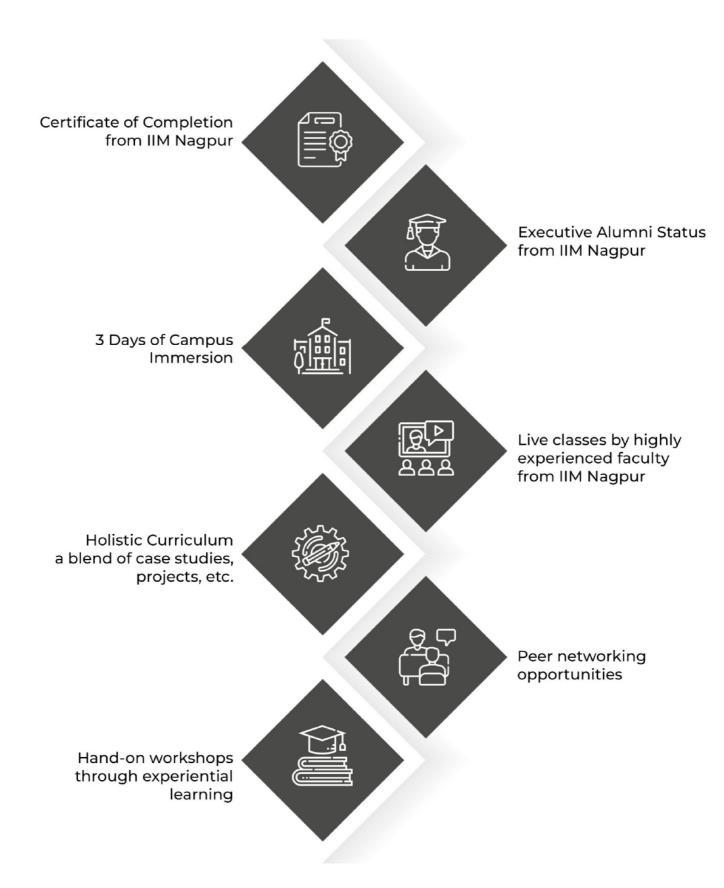
Build effective dashboards for the board and craft narratives to prepare the board reporting deck for better visibility.



Ensure compliance with data privacy and protection regulations and adhere to international and national regulatory standards.

#### **PROGRAMME HIGHLIGHTS**





#### **KEY LEARNING OBJECTIVES**



Fundamentals of cyber security management

Vulnerability and risk management

Hands-on experiential learning

Inclusive leadership and strategic thinking

Data-driven storytelling and communication

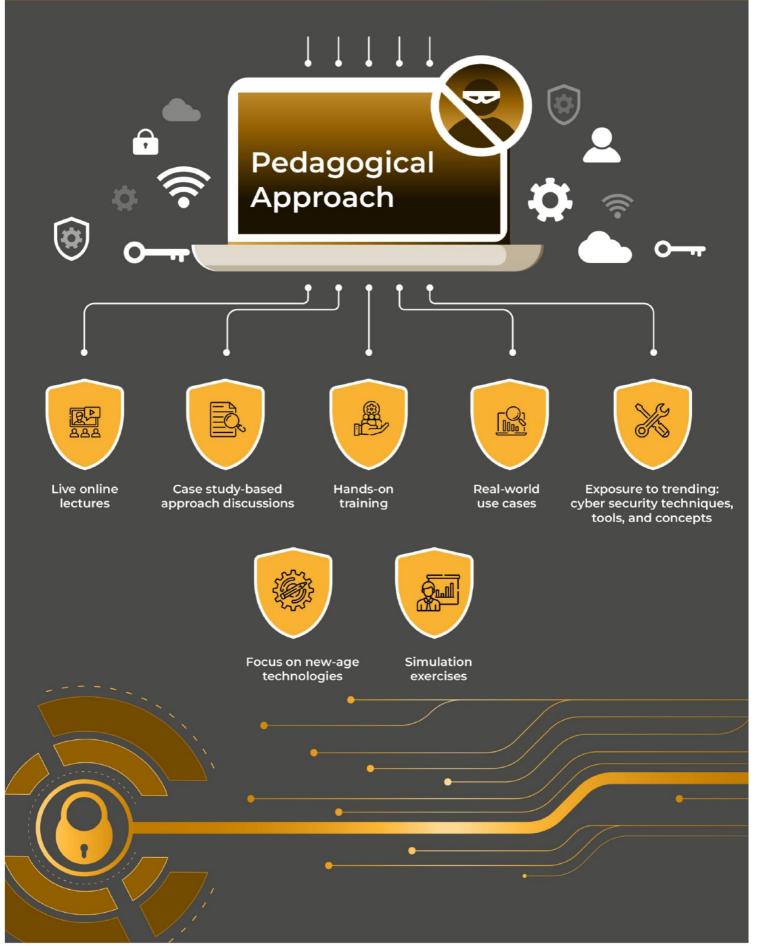
Comprehensive cyber security strategies

Adaptation to evolving technologies

Regulatory compliance and governance







#### LIBRARIES OF CONCEPT, TOOLS AND TECHNIQUES



#### **Key Focus Areas**

Risk management Network security

**SASE** (Secure Access Service Edge)

End-point security

XDR (Extended Detection and Response) Cloud security

**IoT** (Internet of Things) security

5G security

Application Security

**CASB** (Cloud Access Security Broker) Security operations

SOAR (Security Orchestration, Automation, and Response)

**Zero Trust** 

**PAM** (Privileged Access Management) **IAM** (Identity and Access Management)

#### Curriculum Breakdown



<sup>\*</sup>The above is an indicative list of pedagogical approaches, curricula, libraries and techniques/tools used in the delivery of the intake.

#### PROGRAMME CONTENT

#### Module I

#### • Cyber Security Management Foundation

- ▶ CISOs Roles and Responsibilities
- ▶ Development of Policies and Procedures
- ▶ Employee Awareness and Training Management
- Digital Forensics Readiness
- ▶ Contemporary Cyber Security Practices
- ▶ Security Governance
- Desired Outcomes from Leadership of an Organization

#### • Cyber Security Technical Foundation

- ▶ Essentials of Python (Information Security)
- ▶ Network Security
- ▶ Cloud Security
- Endpoint Security
- ▶ Threat Management
- ▶ Relevant ISO Standards
- ▶ Threat Intelligence & Analysis
- ▶ Incident Response and Recovery
- Security Architecture and Design
- ▶ Intrusion Analysis and Detection Using Log Analysis

#### Policies & Governance

- ▶ Leadership and Stakeholder Management
- ▶ Managerial and Human Aspects of Cyber Security
- ▶ Board Level Reporting
- ▶ Cyber Security Policy Goals and Objectives
- ▶ Cyber Security Policy and Auditing within an Organization
- ▶ Cyber Security Policy and Auditing for Business Partners

#### • Fundamentals of Data Science

- Descriptive Analytics
- Data Visualizations
- ▶ Statistical Inference

#### Tools and Techniques

- ▶ Hands-on Experience with Cyber Security Tools
- ▶ Firewalls
- ▶ Scanners
- Antivirus
- Network Monitoring and Scanning Tools
- ▶ IoT Security
- ▶ Application Security
- Cloud Security



#### **Module II**

#### • Cyber Security Programme Management

- ▶ Security Operation Centre
- ▶ Security Information and Event Management
- ▶ Patching
- ▶ Vendor and Partnership Relationships
- ▶ Communication for Cyber Security Compliance
- ▶ NIST Framework
- ▶ Successful Programme Management Case Studies

#### Cloud Security Management

- ▶ Cloud Security Definition and Deployment
- ▶ Risks in Cloud Security
- ▶ Content Security Policy
- ▶ Hardware Security Modules
- ▶ Key Management as a Service
- ▶ Access/Data Residency Restrictions

#### • Risk Management and Incident Response

- ▶ Cyber Security Risk Management
- ▶ Business Risk Linkage
- ▶ Business Asset Identification and Classification
- ▶ Internal Audits for Threat Identification
- ▶ Physical Asset Management

#### • Blockchain Essentials for Cybersecurity Professionals

- ▶ Blockchain: Basics
- ▶ Unique Capabilities of Blockchain and Business Value
- ▶ Blockchain Types
- ▶ Technical Aspects of Blockchain
- ▶ Blockchain Applications
- ▶ Addressing Blockchain Adoption Challenges

#### Crisis Management, Business Continuity Planning and Management

- ▶ Building Effective Crisis Management Teams
- ▶ Group Dynamics and Conflict Resolution
- ▶ Business Continuity Planning
- ▶ Incident Response and Mitigation Strategies

#### Data Privacy, Implications and How to Manage

- ▶ Data Privacy Laws and Regulations
- ▶ Data Sharing Principles
- ▶ Regulatory Aspects of Data Management



#### **Module III**

#### • Strategy Management with Human Relations While Managing Cyber Security

- ▶ Introduction to Strategy
- ▶ Strategic Thinking and Strategic Decisions
- ▶ Alignment Between Organization Strategy on Cyber Security
- ▶ Strategy and Competitive Advantage
- Strategic Leadership and Cybersecurity
- ▶ Case Study on Board Decisions and Drill Down in the Organization
- ▶ Team Processes: Group Dynamics and Conflicts in Teams
- Building and Leading High-Performance Teams

#### Applied AI and Gen AI for Cybersecurity Professionals

- Overview of AI and Gen AI
- What Managers Should Learn About Al
- ▶ Al Case
- ▶ A Tool for Decision Making with AI
- Addressing Al Adoption Challenges

#### Policies & Governance Cyber Security

- Leadership and Stakeholder Management: Managerial and Human Aspects of Cyber Security
- Planning
- Organizing
- Security Direction
- ▶ Case Study on RACI
- ▶ Board Level Reporting: Cybersecurity Policy Goals and Objectives
- ▶ Auditing: Managing Employees and Business Partners via Cybersecurity Policy

#### Effective Communication with Dashboard Approach

- ▶ Data Visualization and Storytelling for Effective Communication
- Dashboard for Cyber Security Decision-Making
- ▶ Generating Reports for Cyber Security Management
- ▶ Effectively Communicating Cyber Security Issues from Top to Bottom
- ▶ Explaining Potential Risks and Consequences for Not Implementing the Controls

Note: All modules include case studies or exercise-based sessions to provide practical and experiential learning.



# WHO SHOULD ATTEND?

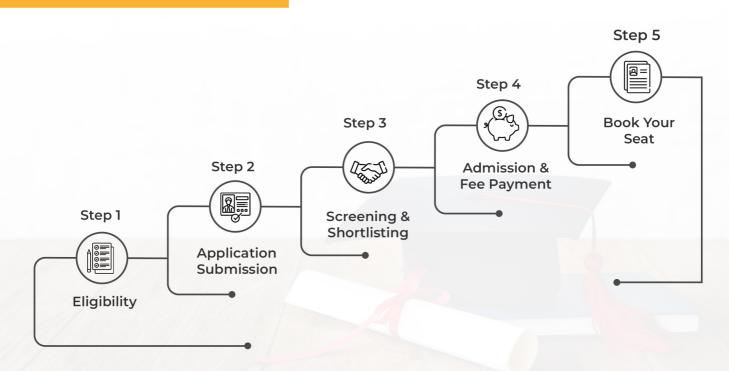
▶ This programme is designed for middle-level managers and aspiring senior executives who wish to enhance their cybersecurity management skills. It focuses on data analytics, data-driven decision-making approaches, and management principles, enabling participants to initiate and lead cybersecurity initiatives at the organizational level.





Duration	• 12 Months
Delivery	Direct to Device (D2D)
Schedule	<ul> <li>Session Timings: 2 Sessions on Sundays, 6:00 PM to 9:00 PM</li> <li>Commencement Date: 15<sup>th</sup> December, 2024</li> <li>Application Closure Date: Closing Soon</li> </ul>
Campus Immersion	3 Days of Campus Immersion
Eligibility Criteria	<ul> <li>To be eligible, candidates must have completed a Bachelor's Degree from a recognized university.</li> <li>Minimum 3 years of work experience.</li> </ul>

#### **ADMISSION PROCESS**





Fee Structure		
Application Fee	Total Programme Fee	
INR 2,000/-	INR 2,25,000/- + GST	

Instalment Pattern		
Instalment 1	INR 80,000/- + GST 3 days from date of the offer	
Instalment 2	INR 75,000 /- + GST	
Instalment 3	INR 70,000/- + GST	

## Easy EMI Options Available

#### Note

The total fee is inclusive of the campus module and exclusive of the application fee. All the amounts mentioned above are exclusive of GST.







- For participants who meet the prerequisite and successfully complete the programme will be awarded "PG Certificate Programme in Cyber Security Management and Data Science" by IIM Nagpur.
- IIM Nagpur's Executive Alumni Status.







Prof. Sujeet Kumar Sharma
Faculty, Decision Science and Information Systems,
IIM Nagpur

Dr. Sujeet K. Sharma is a Professor in the 'Decision Science & Information Systems' area at the Indian Institute of Management (IIM) Nagpur. With over 23 years of teaching experience in India, Oman, and Bahrain, Dr. Sharma has interacted with students from diverse cultural and ethnic backgrounds. Prior to joining IIM Nagpur, he worked at IIM Tiruchirappalli, Sultan Qaboos University in Oman, and the Birla Institute of Technology, International Center in Bahrain. His research interests encompass Blockchain, Artificial Intelligence, Social Media, Mobile Technologies, e-Services,

and IT for Disaster Management. Dr. Sharma has published 40 international journal articles in journals with ABDC/ABS ranking. His ResearchGate score is 32.15, and he has 7,500 Google Scholar citations, with an h-index of 33 and an i10-index of 48. His research has been featured in prestigious journals such as Government Information Quarterly, Communications of AIS, Technological Forecasting & Social Change, Computers in Human Behavior, International Journal of Information Management, Information Systems Frontiers, Behavior & Information Technology, Journal of Computer Information Systems, Scandinavian Journal of Information Systems, and Journal of Enterprise Information Management. He has also presented his work at leading conferences in India, the USA, the UK, Italy, Malaysia, Ghana, UAE, Oman, and Bahrain.

Dr. Sharma received the 'Best Researcher Award' at Sultan Qaboos University, Oman, in 2018. He served as the conference chair for the IFIP WG 8.6 Conference in 2020 and 2023, held at IIM Tiruchirappalli and IIM Nagpur, respectively. Additionally, he was a Track Chair for the International Conference on Information Systems (ICIS) in 2023.



#### Prof. Kothandaraman Sridharan

CEO, CleverInsight

Kothandaraman Sridharan (Sri) is a technocrat, leader, and innovator with 30+ years of experience in the software-service industry, product development, IT strategic consulting, and AI & Data Science domains. He has been a technology advisor for Fortune 500 companies globally. He has advised development centers in Latin America and led expansions in China for growth-focused companies. Sri has led M&A deals for software companies and currently is on the advisory board for universities in US & Asia as well as to bay area-based product companies.

Sri is currently the CEO of CleverInsight, actively working on building an AI & Data Science solution focusing on Public Education, Public Health, Life Sciences, Manufacturing and Agriculture sectors. He is helping to build AI & Data Science departments for universities in emerging markets to promote the next technology horizons and to provide better access and opportunities to students and corporate executives.

#### **HEAR FROM OUR ALUMNI**





**Virendra U. Bhagwat** Lead Software Architect



"Enrolling in the Cybersecurity programme was a game-changer for me. It equipped me with new skills and invaluable insights into cybersecurity. With senior roles on the horizon, this programme's curriculum has been instrumental in shaping my decision-making for my organization. The experienced faculty and guest lectures from cybersecurity experts enriched my learning. I wholeheartedly recommend this programme to aspiring professionals for its exceptional curriculum, effective pedagogy, executive alumni status, and unwavering support. It's a transformative journey worth embarking on."







Piali Sinha
Advisory Manager,
IT & Cyber Security Audits,

#### Deloitte.

"The Cyber Security and Data Science course at IIM Nagpur from June 2022 to June 2023 has been a game-changer for me. The programme's cutting-edge curriculum, expert faculty, and practical approach have equipped me with the knowledge and skills needed to excel in these fast-evolving fields.

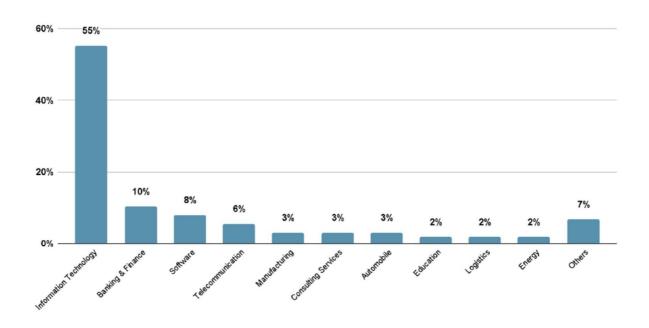
The emphasis on hands-on learning, real-world projects, and collaboration with diverse peers has been instrumental in honing my abilities. I am now more confident in tackling complex challenges in cyber security and data science.

IIM Nagpur's top-notch facilities and unwavering support made this learning journey smooth and productive. This course is nothing short of transformative, and I highly recommend it to anyone seeking a successful career in these domains. Kudos to IIM Nagpur for this exceptional opportunity!"

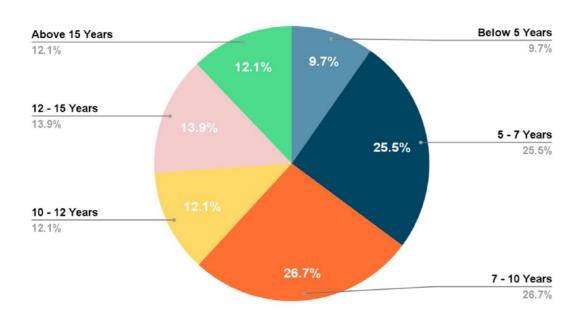




#### **INDUSTRY PROFILE OF PROFESSIONALS**



#### PAST EXPERIENCE OF PROFESSIONALS





#### **TOP COMPANIES WHERE OUR ALUMNI ARE WORKING:**













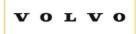












#### TOP PROFILES OF OUR ALUMNI:



Director



Assistant Vice President



Principal Cyber Security Architect



Sr. Manager IT



Project Manager



Manager-Information Security Engineer

#### Note:-

- Past performance records do not guarantee any future opportunities.
- All company names are trademarks or registered trademarks of their respective holders. Use of them does not imply any
  affiliation with or endorsement by them.
- · The list is partial.

#### CAREER ASSISTANCE





#### Resume Building

Our service comprises the meticulous creation and refinement of resumes, aligning them with corporate standards to ensure they reflect your skills and achievements. Through expert resume optimization, we enhance your professional narrative and craft an ATS-friendly resume to stand out in a competitive landscape.



#### LinkedIn Profile Optimization

We offer tailored suggestions for elevating your LinkedIn profile, strategically designed to maximize visibility and foster meaningful connections with industry leaders. Our approach ensures that your online presence resonates with the professionalism and expertise that defines your career trajectory.



#### Career Enhancement Sessions

Our exclusive Jaro Connect platform provides corporate engagements with access to immersive bootcamps and masterclasses on the latest industry trends, led by esteemed experts. This empowers the participants to stay abreast of evolving market dynamics while honing their professional competencies, ensuring they thrive in today's fast-paced business environment.

# Top Notch Companies Onboarded by Jaro Education for Interview Opportunities































- IIM Nagpur or Jaro Education do not guarantee or promise you a job or advancement in your existing position. Career Services is simply provided as a service to help you manage your career in a proactive manner. Jaro Education provides the career services described here. IIM Nagpur is not involved in any way with the career services described above and offers no commitments.
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10+

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elndia

Awards

e-India Awards

The Best ICT Enabled Higher Education Institute Award EDUCATION EXCELLENCE AWARDS 2012

Educational Excellence Awards

Most Innovation & Successful online MBA Program in India



**MODI Awards** 

Outstanding Contribution in Online Education



ABP Education Awards

Best Digital Learning



World HRD Congress

National Best



World HRD Congress

Edtech Leadership



Outlook Business Icon Awards 2023

India's Most Trusted
Online Higher Education Company

Jaro Education is an edtech pioneer and online higher education company that specialises in executive education, serving as a liaison between the world's leading universities and institutes to create online and technology-driven programmes. The company provides a quality bucket of online executive education programmes catering to domains such as Doctorate & Ph.D., Analytics & Data Science, Management, Finance, etc., from renowned national and international institutions to meet the needs of working professionals. Our goal is to foster the growth of entrepreneurs and professionals at all levels, from entry-level to C-Suite, through world-class executive education programmes.



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# CONNECTOR

**Executive Education Office, IIM Nagpur** 

### DR. SAPANKUMAR SINGH

Sr. Manager, Executive Education



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**Admission Representative** 

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