CGC UNIVERSITY MOHALI

Shaping Tomorrow, Today

Accreditations & Rankings

# Career Advancement & Training Cell (CATC)

INFORMATION
## BOOKLET

Student Training
& Career Development

| 1 cr | 12k+ | 1500+ | 300+ | 70+ | 15 cr+ | 50 cr |
|---|---|---|---|---|---|---|
| Highest Package | Placements Offered | Companies Engaged | Global Tie-ups | Countries | Research Budget | Scholarships Available |


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admissions@cgcuniversity.in

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*Welcome to the world of*

# CGC UNIVERSITY MOHALI

Shaping Tomorrow, Today

*Established in 2025 under the aegis of the Chandigarh Educational Society, CGC University, Mohali stands as a new-age university rooted in a legacy of 25+ years of academic excellence. Evolving from a strong educational foundation into a full-fledged university, CGC University, Mohali, continues to uphold its tradition of quality learning while embracing innovation at every step.*

*With its proud legacy of NAAC A+ Accreditation, NIRF Rankings, NBA Accreditation, and a Platinum Rating by QS I-GAUGE, the university exemplifies high standards in teaching, research, and institutional performance.*

*What truly sets CGC University, Mohali apart is its AI-enabled academic ecosystem and Gen Z-centred vision. The university integrates cutting-edge technologies, smart learning platforms, and industry-driven curricula to prepare students for the challenges of a rapidly evolving world.*

*Designed for holistic development, the campus fosters creativity, critical thinking, entrepreneurship, and leadership, ensuring that students don't just earn degrees but also gain real-world readiness. With experienced faculty, world-class infrastructure, affordable education, and a global outlook, CGC University, Mohali has emerged as a preferred destination for aspiring changemakers and future leaders across the nation.*

A MESSAGE FROM THE

# EXECUTIVE VICE PRESIDENT

Dear Students,

Welcome to CGC University, Mohali—an institution driven by the vision of creating future-ready leaders who contribute meaningfully to society and industry. In a world shaped by rapid technological and global transformation, education must go beyond degrees and focus on purpose, values, and impact.

Our commitment is to provide you with an environment that nurtures ambition, innovation, and a strong sense of responsibility. Through initiatives like the Career Advancement & Training Cell (CATC), we aim to empower you with the mindset and capabilities required to thrive in an ever-changing professional landscape.

I encourage you to dream big, remain focused, and align your efforts with a clear purpose.

**At CGC University, Mohali, we don't just build careers—we shape futures with purpose.**

***Dr. Sushil Prashar***

A MESSAGE FROM THE

# VICE CHANCELLOR

Dear Students,

At CGC University, Mohali, we believe that true education is a blend of knowledge, skills, values, and character. Holistic development is at the core of our academic philosophy, ensuring that students are prepared not only academically but also personally and professionally.

The Career Advancement & Training Cell (CATC) plays a key role in this journey by integrating communication skills, aptitude, leadership, teamwork, and industry exposure into your learning experience. This comprehensive approach ensures that you grow into well-rounded individuals capable of adapting to diverse professional environments.

I urge you to actively engage in all opportunities, embrace continuous learning, and strive for excellence in every endeavor.

**Your overall development today will define your success tomorrow.**

***Dr. Vinay Goyal***

A MESSAGE FROM THE

# GENERAL MANAGER

Dear Students,

Success in today's professional world requires a structured and consistent approach to skill development. At the Career Advancement & Training Cell, we have designed a comprehensive training framework that systematically prepares students for career success.

Our model is progressive and data-driven—starting from foundational skills in the early years to advanced training and company-specific preparation in the final stages. Regular assessments, personalized feedback, mentoring, and performance tracking ensure continuous improvement at every step.

This structured approach enables you to build confidence, strengthen competencies, and face recruitment processes with clarity and readiness.

**Follow the process, stay disciplined, and success will follow.**

***Dr. Ashish Agrawal***

A MESSAGE FROM THE

# SENIOR MANAGER

Dear Students,

In today's competitive landscape, technical expertise is one of the most critical factors in achieving career success. Employers seek professionals who can apply knowledge effectively, work with modern tools, and solve real-world challenges with confidence.

At CATC, our technical training programs are designed to provide hands-on experience in programming, core concepts, emerging technologies, and industry tools. Through coding sessions, workshops, projects, and technical assessments, we focus on building both depth of knowledge and practical proficiency.

We encourage you to actively participate, practice consistently, and challenge yourself to learn beyond the classroom.

**Strong technical skills today will open doors to limitless opportunities tomorrow.**

***Mr. Nitin Sharma***

# Vision

To develop industry-ready professionals with strong technical expertise, professional skills, and ethical values.

# Mission

To deliver world-class education, research, fostering a culture of innovation, social responsibility, and interdisciplinary collaboration.

- Provide structured and progressive training programs
- Enhance placement readiness across all disciplines
- Enable real-world exposure through industry interaction
- Support students in career planning and growth

# Core Values

- Excellence through
- Sustainability
- Collaboration
- Ethics and Integrity
- Diversity and Inclusion

**Innovate. Inspire. Impact.**

*From* → *To*

| | | |
|---|---|---|
| Hesitant Speaker | → | Confident Communicator |
| Average Student | → | Industry-Ready Professional |
| Theoretical Knowledge | → | Practical Expertise |
| Job Seeker | → | Career Builder |

## USP

- Structured, step-by-step training journey
- Personalized mentoring & feedback
- Real-world projects & simulations
- Continuous performance tracking
- Industry-aligned curriculum

## Importance of Training in Career Development

In the modern professional landscape, employers seek well-rounded individuals who can adapt to changing work environments, collaborate effectively, and solve complex problems.

Training programs play a crucial role in developing these competencies.

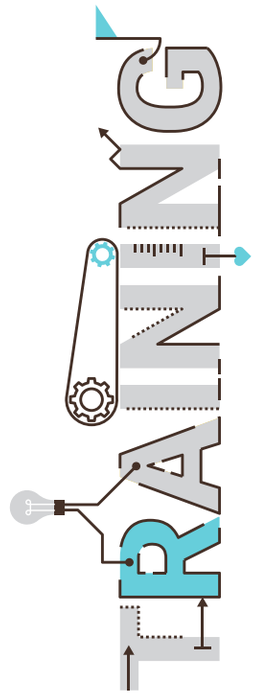
**Through structured training, students gain:**

- Improved communication and interpersonal skills
- Enhanced quantitative and analytical abilities
- Confidence in handling interviews and group discussions
- Technical and domain-specific expertise
- Professional etiquette and workplace readiness

**With CATC, you will**

- Speak confidently in interviews
- Solve real-world problems
- Think analytically and strategically
- Build industry-relevant technical skills
- Develop a professional personality

**Training** ensures that students are prepared not only to secure employment but also to excel in their chosen careers.



## CATC Training Philosophy & Learning Approach

CATC follows an outcome-based learning philosophy centered on continuous improvement and student engagement. The learning model emphasizes:

- Skill gap identification through assessments
- Practical application of concepts
- Continuous feedback and mentoring
- Progressive learning from foundation to advanced levels
- Industry alignment and real-world relevance

This approach ensures measurable improvement in student performance and placement readiness.

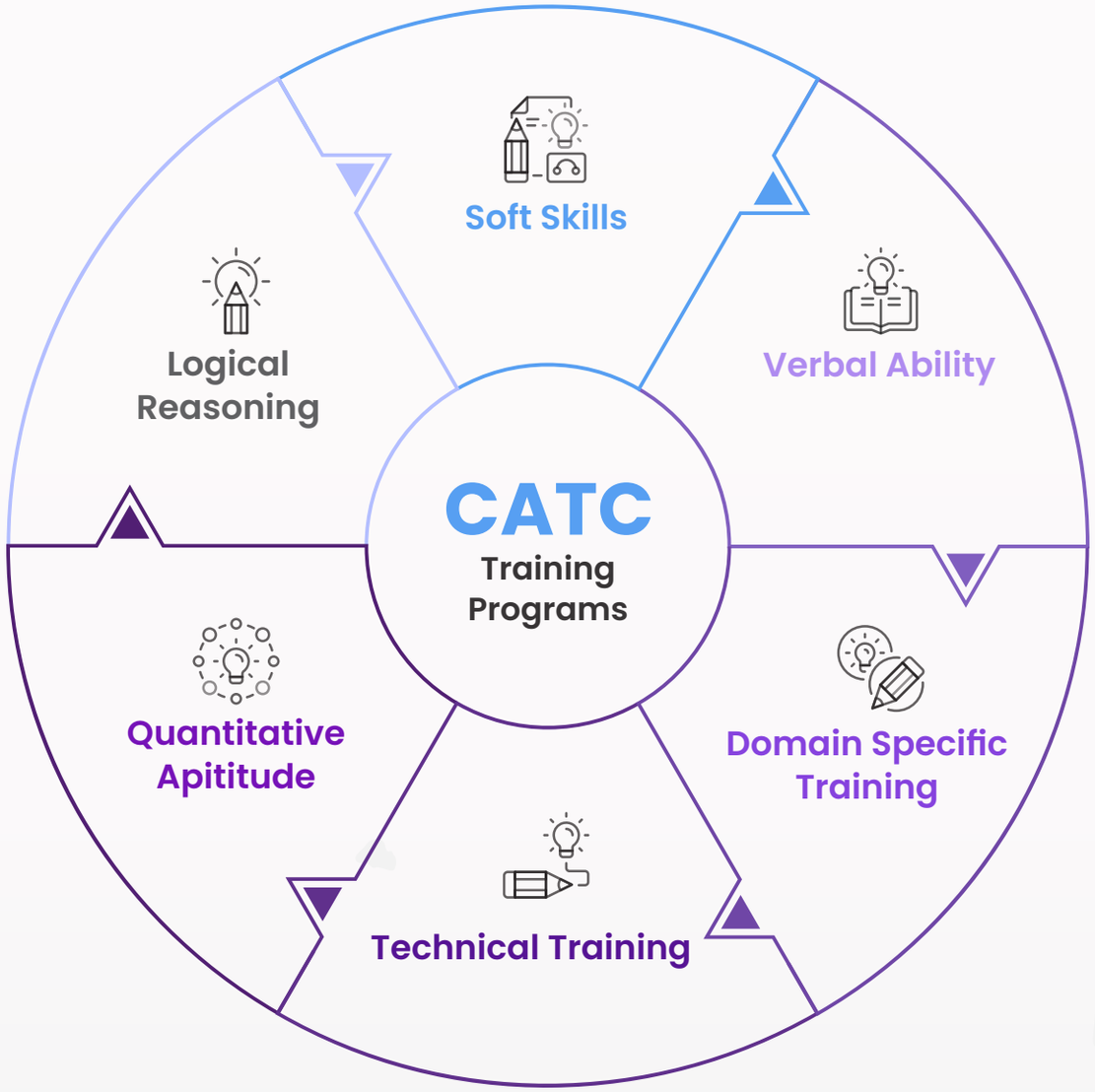
## Training Programs Offered by CATC

The Career Advancement & Training Cell offers a comprehensive portfolio of training programs designed to enhance students' employability skills and professional readiness.

These programs are carefully structured to cater to the diverse academic backgrounds of students across Engineering, Management, Law, Pharmacy, and other disciplines.

The training modules are progressive in nature, beginning with foundational skill development and advancing towards specialized domain training and placement preparation.

## Comprehensive Training Ecosystem at CATC




**Building Skills | Enhancing Competence | Ensuring Employability**

## Soft Skills Training

Soft Skills training focuses on developing behavioral competencies and professional attributes that are essential for success in academic and corporate environments.

**Key Areas Covered:**

- Effective Communication Skills (Verbal & Non-Verbal)
- Presentation & Public Speaking Skills
- Personality Development & Confidence Building
- Professional Etiquette & Workplace Behavior
- Teamwork & Leadership Skills
- Emotional Intelligence & Stress Management
- Time Management & Goal Setting

Learning Outcomes:

Students become more confident speakers, active listeners, and effective collaborators. They develop the ability to express ideas clearly, participate in group discussions, and perform well in personal interviews.

## Verbal Ability Training

Verbal Ability training enhances language proficiency and comprehension skills required for competitive exams and recruitment processes.

**Key Areas of Modules:**

- Grammar Fundamentals and Usage
- Vocabulary Building Techniques
- Reading Comprehension Strategies
- Sentence Correction & Para Jumbles
- Critical Reasoning & Verbal Logic
- Business Communication Writing Skills

Learning Outcomes:

Students improve their accuracy and speed in verbal sections of aptitude tests and develop strong written and spoken communication abilities.

## Quantitative Aptitude Training

Quantitative training develops numerical ability, logical problem-solving skills, and mathematical reasoning.

**Key Topics Covered:**

-Arithmetic (Percentages, Profit & Loss, Ratio, Time & Work)
- Algebra & Number Systems
- Data Interpretation & Data Sufficiency
- Probability & Permutation Combination
- Quantitative Reasoning Techniques
- Shortcut Methods & Exam Strategies

**Learning Outcomes:**

Students develop analytical thinking and gain confidence in solving complex quantitativeproblems within limited time.

## Logical Reasoning Training

Logical Reasoning modules strengthen analytical ability and structured thinking required for aptitude tests and technical roles.

**Key Topics Covered:**

- Analytical Reasoning
- Puzzle Solving
- Seating Arrangement & Logical Sequencing
- Coding-Decoding
- Blood Relations & Direction Sense
- Critical Thinking Exercises

**Learning Outcomes:**

Students improve decision-making ability, accuracy in reasoning questions, and overall problem-solving confidence.

## Technical Training

Technical training modules are designed in collaboration with academic departments and industry experts to ensure relevance and applicability.

**Components Include:**

-Programming Languages (C, C++, Java, Python)
- Competitive Coding
- Project Based Learning (FSD, Data Science)
- Industry Tools & Platforms
- Coding Practice Sessions
- Technical Interview Preparation

Learning Outcomes:

Students strengthen conceptual clarity, develop coding proficiency, and prepare effectively for technical recruitment processes.

## Domain Specific Training

To enhance employability across different career paths, CATC offers specialized training programs such as:

- Advanced Excel & Data Analysis
- Power BI & Business Intelligence
- Solid Works for Design Engineering
- Web Development Technologies
- PLC & SCADA for Automation Careers
- Digital Marketing Tools & Strategies
- Legal Drafting
- Medical Coding & Healthcare Data Management
- R Programming

Learning Outcomes:

These programs help students gain practical exposure to industry-relevant tools and improve their job readiness.

## Student Learning Journey at CGC University, Mohali

The student learning journey is structured to ensure progressive skill development from the first year to the final year. This roadmap helps students build strong foundations, enhance technical competence, and achieve placement readiness.

*The path to success at CGC University, Mohali:*

***From foundation to Placement readiness***

## First Year – Foundation Building

- Orientation to Career Development Programs
- Basic Communication Skills Training
- Logical Thinking & Problem Solving
- Introduction to Industry Expectations
- Basic Computer & Technical Awareness

**Objective:**

To build confidence, improve learning habits, and introduce students to professional skill development.

## Second Year – Skill Enhancement

- Aptitude Training (Quantitative & Logical)
- Intermediate Communication & Presentation Skills
- Domain Awareness Sessions
- Mini Projects & Practical Assignments
- Introduction to Certifications

**Objective:**

To develop analytical skills and begin structured career preparation.

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## Third Year – Industry Preparation

- Advanced Technical Training
- Resume Writing & LinkedIn Profile Building
- Mock Tests & Practice Assessments
- Group Discussion Training
- Industry Guest Lectures & Workshops

**Objective:**

To prepare students for internships, live projects, and initial placement processes.

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## Final Year – Placement Readiness

- Company Specific Training Programs
- Mock Interviews (Technical & HR)
- Placement Simulation Tests
- Career Counseling & Offer Negotiation Guidance
- Professional Grooming & Workplace Readiness

**Objective:**

To ensure students confidently participate in recruitment drives and secure suitable job opportunities.

## CATC Training Methodology

CATC follows a structured and scientific training methodology designed to ensure measurable improvement in student performance.

STEP 1

### Assessment

- Pre-Training Diagnostic Tests
- Skill Gap Analysis
- Student Performance Benchmarking
- Categorization into Learning Groups

STEP 2

### Structured Training

- Classroom Sessions & Concept Building
- Interactive Activities & Case Discussions
- Practice Exercises & Assignments
- Concept Reinforcement Workshops

STEP 3

### Practice & Application

- Weekly Practice Tests
- Online Assessment Platforms
- Real Recruitment Pattern Questions
- Coding Practice & Technical Assignments

STEP 4

### Evaluation

- Periodic Performance Reviews
- Sectional Score Tracking
- Faculty Feedback & Mentoring Sessions
- Improvement Reports

STEP 5

### Continuous Improvement

- Remedial Classes for Weak Areas
- Advanced Training for High Performers
- Personalized Learning Plans
- Motivation & Confidence Building Sessions

OUTCOME

### of Methodology

- Improved Placement Readiness
- Enhanced Skill Competency
- Better Interview Performance
- Higher Student Confidence Levels

## Placement Readiness Framework

The Placement Readiness Framework at CGC University, Mohali is a comprehensive and structured model designed to prepare students for recruitment processes across diverse industries. The framework integrates skill development, career awareness, performance monitoring, and practical exposure to ensure students are fully equipped to meet corporate expectations.The framework operates on the principle that placement preparation is a continuous process

## Aptitude Readiness

Aptitude training is conducted in a phased manner to build strong quantitative, logical, and verbal skills required for campus recruitment tests.

**Focus Areas:**

- Company-specific aptitude preparation
- Time-bound mock tests
- Speed and accuracy improvement strategies
- Sectional performance analysis

Students are trained to handle high-pressure test environments and develop strategic problem solving approaches.

## Communication & Interview Skills

Effective communication is a critical factor in recruitment success. CATC ensures students are trained to present themselves professionally and confidently.

**Training Includes:**

- Group Discussion Techniques
- Personal Interview Preparation
- HR Question Handling Strategies
-Body Language & Confidence Building
- Professional Grooming

Students undergo multiple mock interview simulations to gain real-time experience and feedback.

## Resume & Professional Profile Development

Students are guided in creating impactful resumes and professional digital profiles.

**Support Provided:**

- Resume Writing Workshops
- LinkedIn Profile Optimization
- Portfolio Development Guidance
- Project Presentation Techniques

This ensures students effectively showcase their skills and achievements to recruiters.

## Technical & Domain Preparation

Students receive advanced technical training aligned with industry recruitment patterns.

**Key Activities:**

-Coding Practice Platforms
- Core Subject Revision Sessions
- Technical Interview Question Banks
- Case Study Discussions

## Company Specific Preparation

Before major placement drives, CATC conducts focused training sessions based on company recruitment patterns.

**Components:**

- Previous Year Question Analysis
- Mock Online Tests
- Technical Round Preparation
- HR Round Simulation

This targeted preparation significantly enhances selection probability.

# Training Advisory Council (Student Leadership Initiative)

To promote student participation, leadership development, and peer-driven learning, the Career Advancement & Training Cell (CATC) has established a Training Advisory Council (TAC) comprising selected student representatives from various schools and academic programs.

The Council functions as a structured student leadership body with a defined hierarchy and roles. It serves as a bridge between students and the training department, ensuring effective communication, better program execution, and enhanced engagement in training initiatives.

### Structure & Hierarchy:

The Training Advisory Council operates through a well-defined organizational structure which may include:

- President
- School / Department Coordinators
- Training Event Leads
- Communication & Outreach Leads
- Activity & Operations Team Members

This hierarchical structure enables students to understand professional responsibility, teamwork, and organizational management.

### Leadership & Learning Opportunities

Students who are part of the Council receive exclusive opportunities to:

- Plan and execute training events, workshops, and competitions
- Coordinate guest lectures and student engagement activities
- Support placement preparation initiatives
- Participate in leadership and personality development programs
- Develop project management and decision-making skills

Regular interaction with trainers and department officials provides them with valuable exposure to professional work environments.

### Special Training & Mentorship

Council members undergo advanced and specialized training sessions focused on:

- Leadership & Team Management
- Event Planning & Execution
- Communication & Public Speaking
- Problem Solving & Conflict Handling
- Professional Networking Skills
- Coding / Programming to sharpen technical skills

These training interventions help students build confidence, improve organizational capabilities, and stand out during placement processes.

### Impact on Student Development

Participation in the Training Advisory Council enables students to:

- Enhance leadership and coordination skills
- Strengthen their professional profile and resume
- Gain recognition within the university ecosystem
- Develop industry-relevant soft and managerial skills
- Build strong peer networks and collaborative abilities

This initiative reflects CATC's commitment to holistic student development and experiential learning.

# Industry Exposure & Value-Added Initiatives

To bridge the gap between classroom learning and industry expectations, CATC organizes multiple initiatives that provide students with practical exposure and experiential learning opportunities.

### Guest Lectures by Industry Experts/Hackathons

Industry professionals are invited to share real-world insights, career guidance, and technological trends.

**Benefits for Students:**

- Understanding corporate work culture
- Awareness of emerging career opportunities
- Exposure to industry best practices

### Certification Programs

Students are encouraged to pursue value-added certifications in collaboration with industry partners and training platforms.

**Popular Certification Areas:**

- Data Analytics
- Cloud Computing
- Digital Marketing
- Programming & Software Tools

Certifications enhance student profiles and increase employability

### Live Projects & Case Studies

Students participate in real-time projects and business case simulations to gain practical knowledge.

**Learning Outcomes:**

-Application of theoretical concepts
-Team collaboration and leadership skills
- Problem-solving in real scenarios

### GATE Excellence Program

**GATE Preparation Program (Graduate Aptitude Test in Engineering)**

The Division of Career Planning & Development (DCPD) introduces a focused GATE Coaching Program to help students excel in competitive exams and unlock opportunities in higher education and PSUs.

**Branches Covered:**

Computer Science Engineering (CSE) | Electronics & Communication Engineering (ECE) | Mechanical Engineering (ME) | Civil Engineering (CE) | Electrical Engineering (EE)

**Program Highlights:**

- Expert-led, exam-oriented sessions
- Complete syllabus coverage with concept clarity
- Previous year questions & problem-solving practice
- Regular mock tests with performance analysis
- Dedicated doubt-solving & revision support

**Outcome:**

Build strong fundamentals, improve problem-solving skills, and achieve success in GATE, IIT/NIT admissions, and PSU careers.

### Government Exam Preparation

To support students aspiring for careers in the public sector and administrative services, DCPD offers a structured preparation program for major government competitive examinations. The program focuses on building conceptual clarity, analytical ability, current affairs awareness, and exam strategy.

**Exams Covered:** IAS / IPS / IFS | Banking (PO / Clerk / RRB) | SSC (CGL, CHSL, MTS, GD) | State Government Exams | Railways | Insurance

**Program Highlights:**

- Structured, exam-oriented preparation
- Focus on aptitude, reasoning & general awareness
- Current affairs coverage & practice sessions
-Time management & exam strategy training
- Regular assessments and performance tracking

**Outcome:**

Enhanced success rate in competitive exams, strong analytical skills, improved confidence, and

## Performance Tracking & Student Support System

CATC follows a data-driven approach to monitor student progress and provide timely support, conduction of the assessment will take place on CATC platform (Career Advancement and Training Cell Portal)

### Continuous Performance Monitoring

- Regular aptitude and technical assessments
- Individual performance dashboards
- Attendance and participation tracking
- Progress reports

### Remedial & Advanced Learning Support

Students requiring additional assistance are provided:

- Remedial Training Sessions
- Doubt Clearing Classes
- Mentoring Support

**High-performing students are offered:**

- Advanced Training Modules
- Competitive Exam Preparation Support
- Leadership Opportunities

### Counselling & Motivation Support

Career counselling sessions are organized to address student concerns, build confidence, and maintain motivation levels during placement preparation

## Career Guidance & Mentorship Support

CATC provides structured career guidance programs to help students make informed career decisions.

### Key Mentorship Activities

- One-to-One Career Counselling
- Higher Education Guidance
- Entrepreneurship Awareness Sessions
- Competitive Examination Preparation Support
- Goal Setting & Career Planning Workshops

Mentors help students identify strengths, explore career paths, and develop action plans.

## Success Path – From Admission to Placement

The student success journey at CGC University, Mohali follows a well-defined pathway:

1. Admission & Orientation
2. Skill Assessment & Career Awareness
3. Structured Training Programs
4. Practical Exposure & Certifications
5. Internship Opportunities
6. Placement Preparation
7. Campus Recruitment & Job Offers

This systematic approach ensures holistic development and career readiness.

## CATC Achievements & Impact

CATC has consistently contributed to improving student employability and placement

**Key Highlights:**

- Thousands of students trained every year
- Improvement in aptitude and communication scores
- Strong placement performance across disciplines
- Industry collaborations for training and recruitment
- Successful alumni working in reputed organizations

## Student Expectations & Code of Training Discipline

To ensure effective learning and professional development, students are expected to: outcomes.

- Maintain minimum required attendance in training sessions
- Participate actively in assessments and activities
- Complete assignments and practice exercises on time
- Follow professional behavior and discipline
- Respect faculty, trainers, and peers
- Demonstrate commitment towards career preparation

Adherence to training discipline enhances learning outcomes and placement success.

## How Students Can Make the Most of CATC Trainings

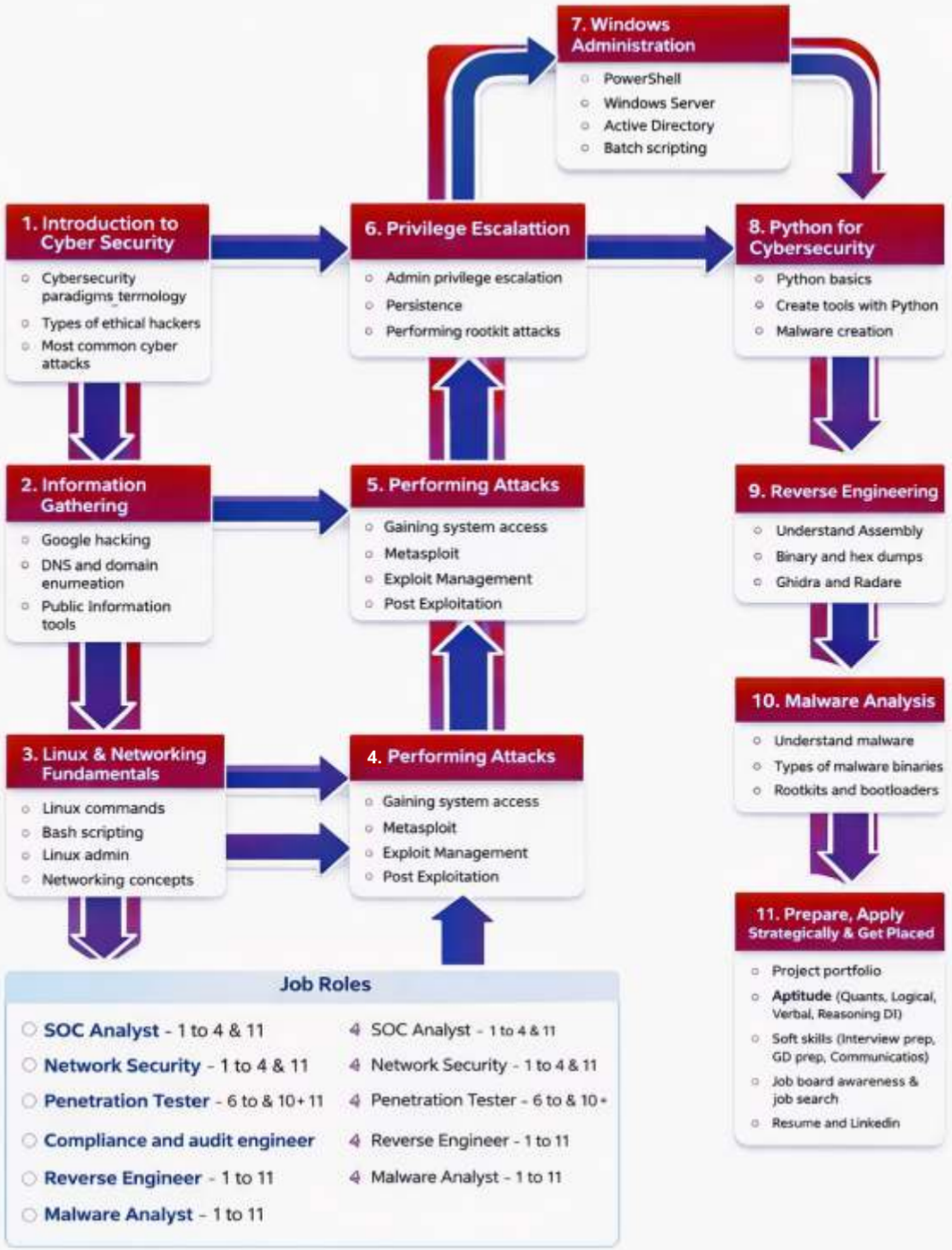
Students can maximize benefits by:

- Attending all training sessions regularly
- Practicing aptitude and communication skills daily
- Seeking feedback and working on improvement areas
- Participating in workshops, certifications, and mock interviews
- Staying updated with industry trends and career opportunities
- Maintaining a positive learning attitude

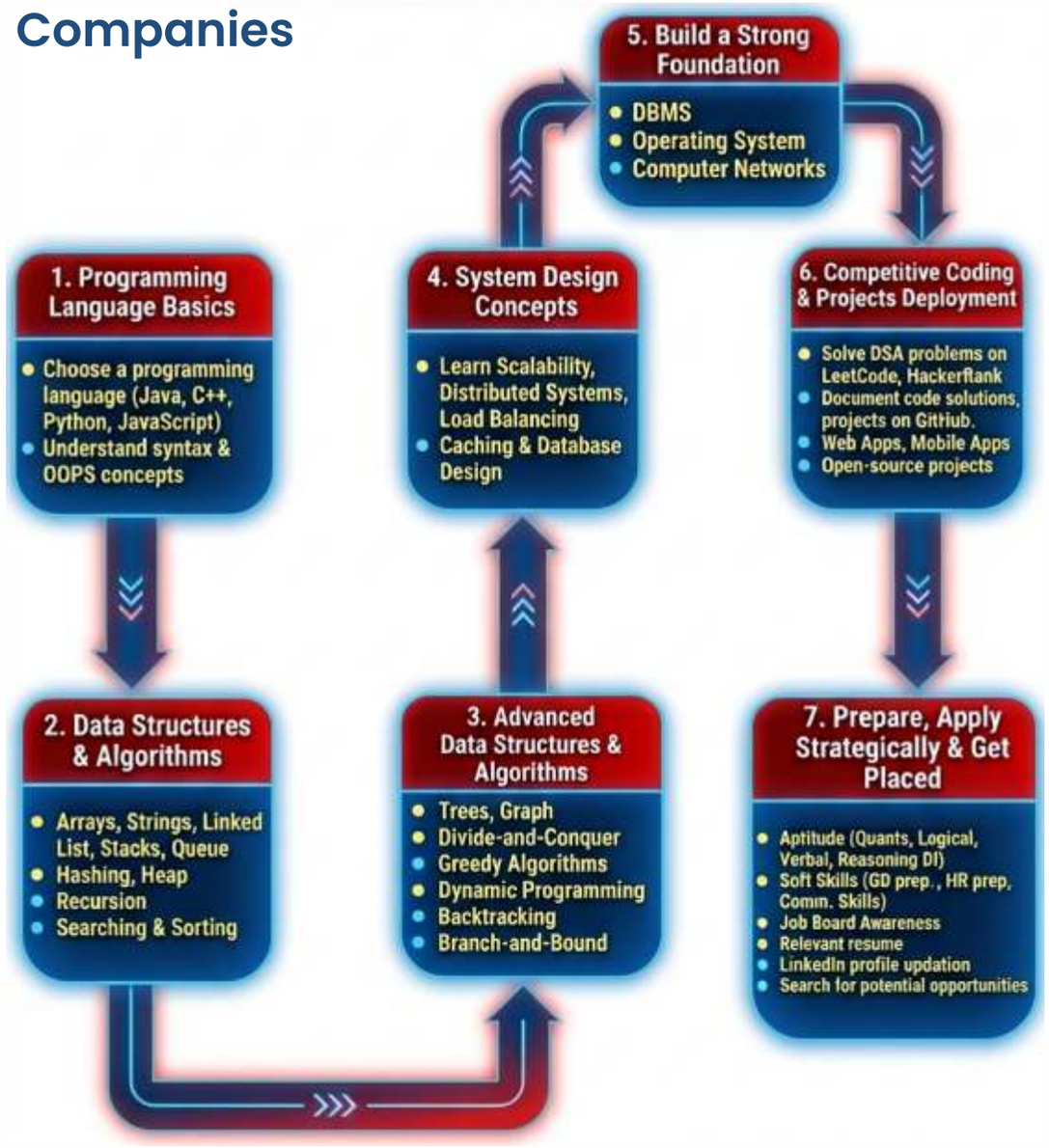
**Remember:**

Consistent effort, disciplined preparation, and self-belief are the keys to career success.

# ROADMAP-
# Cybersecurity



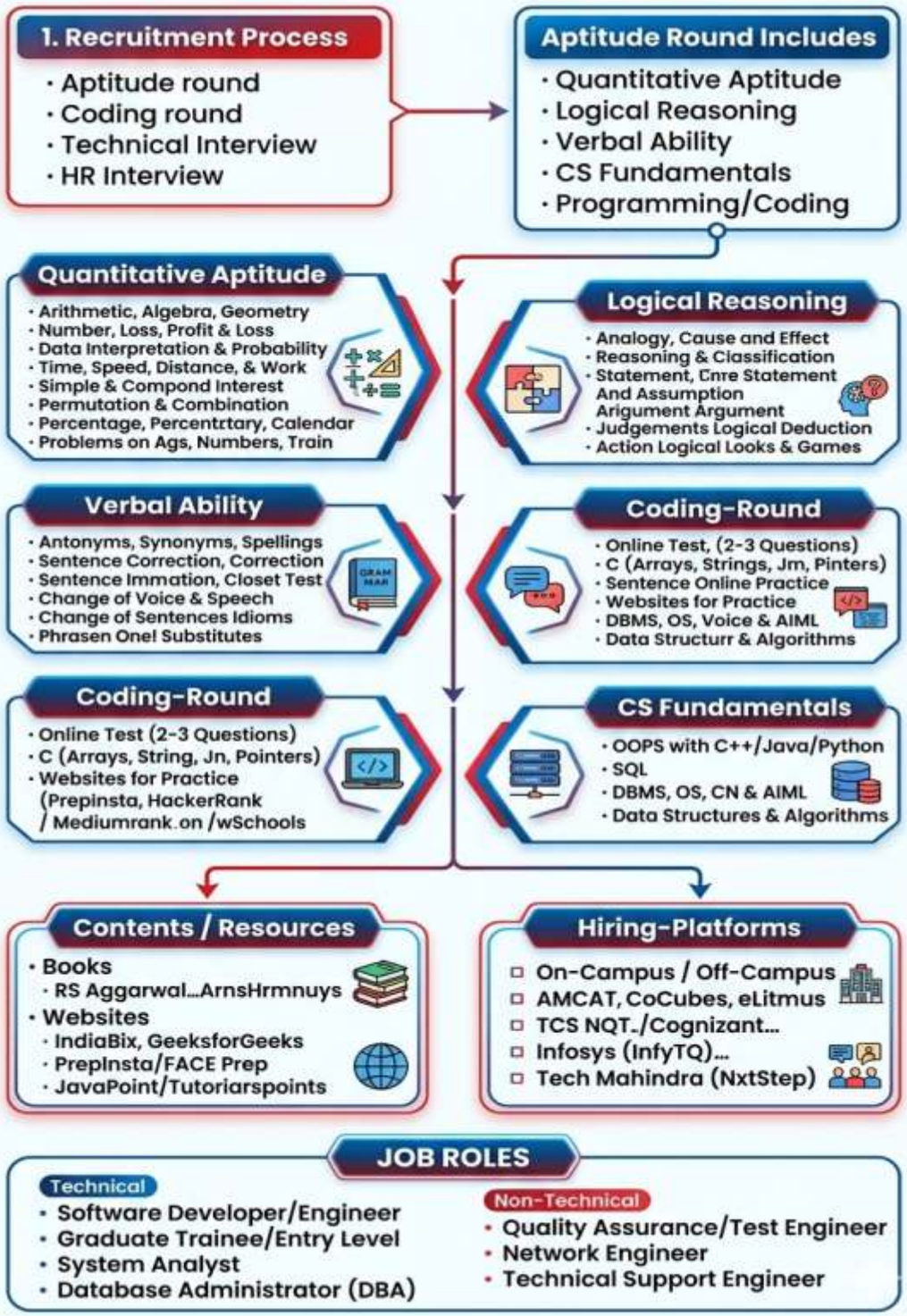

# ROADMAP-
# SDE Product Based Companies



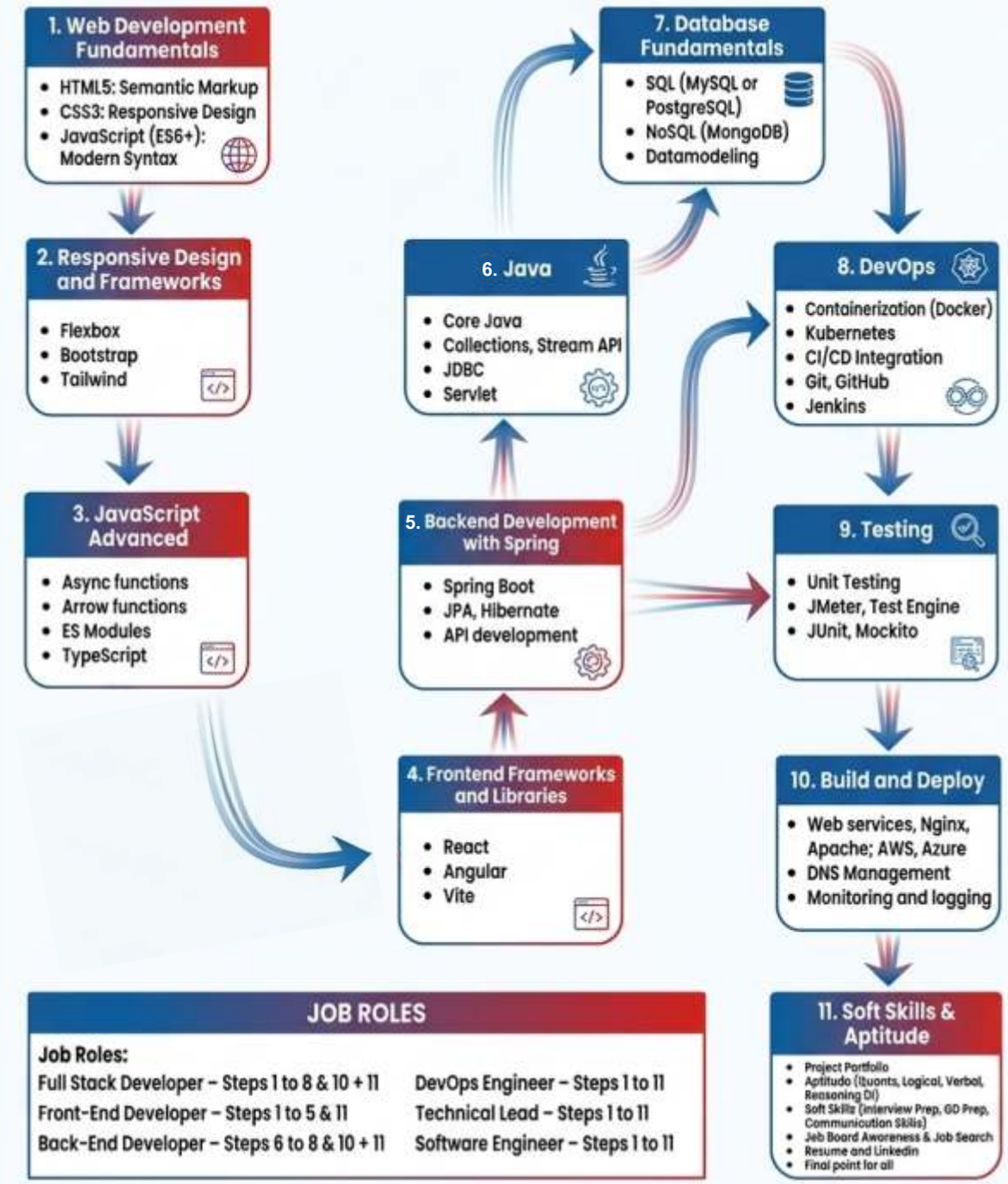

## Job Roles

Software Engineer – Steps 1 to 7
System Engineer – Steps 1,2 & 5 to 7
Game Developer – Steps 1,2 & 5 to 7
Software Developer – Steps 1 to 7
Java Developer – Steps 1 to 7
API Developer – Steps 1,2 & 4 to 7
Android Developer – Steps 1,2 & 4 to 7

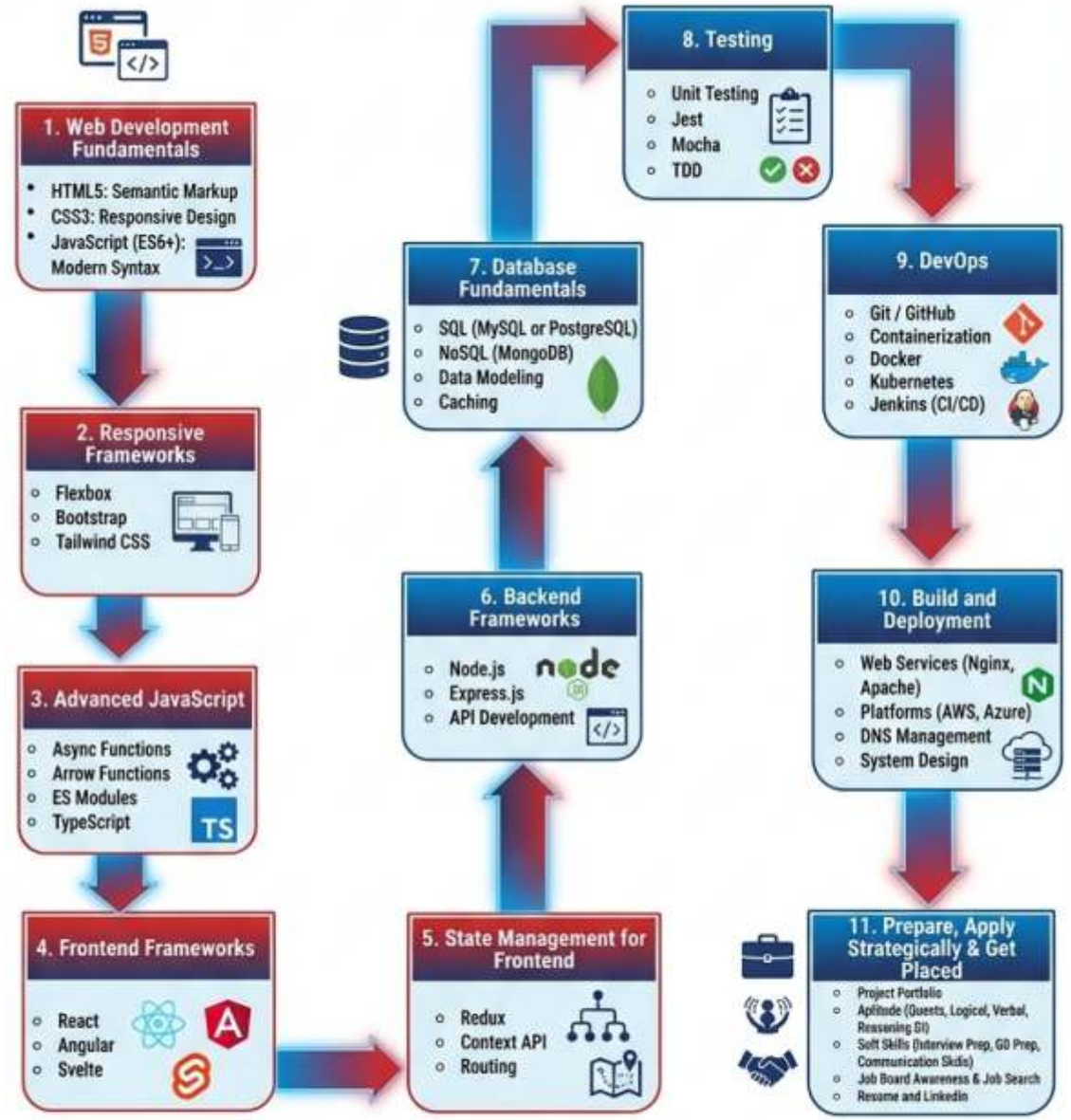
## ROADMAP-
## SDE Service Based Companies




## ROADMAP-
## FSD with SpringBoot



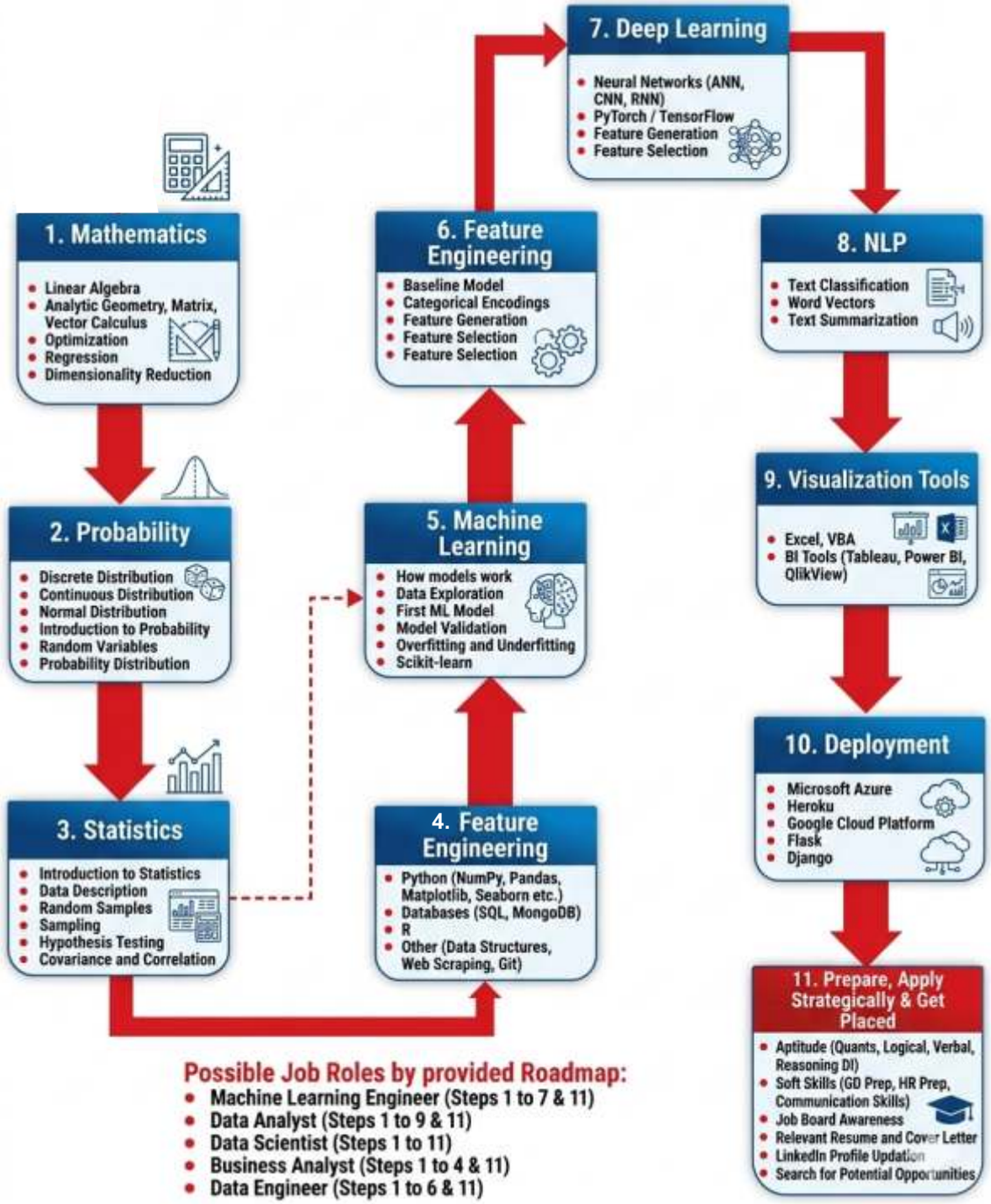
# ROADMAP-
# MERN/MEAN Developer




**Job Roles**

1. Full Stack Developer – Steps 1 to 8 & 10 to 11
2. Front-End Developer – Steps 1 to 5 & 11
3. Back-End Developer – Steps 6 to 8 & 10 to 11
4. DevOps Engineer – Steps 6 to 11
5. Web Developer – Steps 1 to 8 & 10 to 11
6. Software Engineer – Steps 1 to 11
7. UI/UX Developer – Steps 1 to 5 & 11
8. Solution Architect – Steps 6 to 11

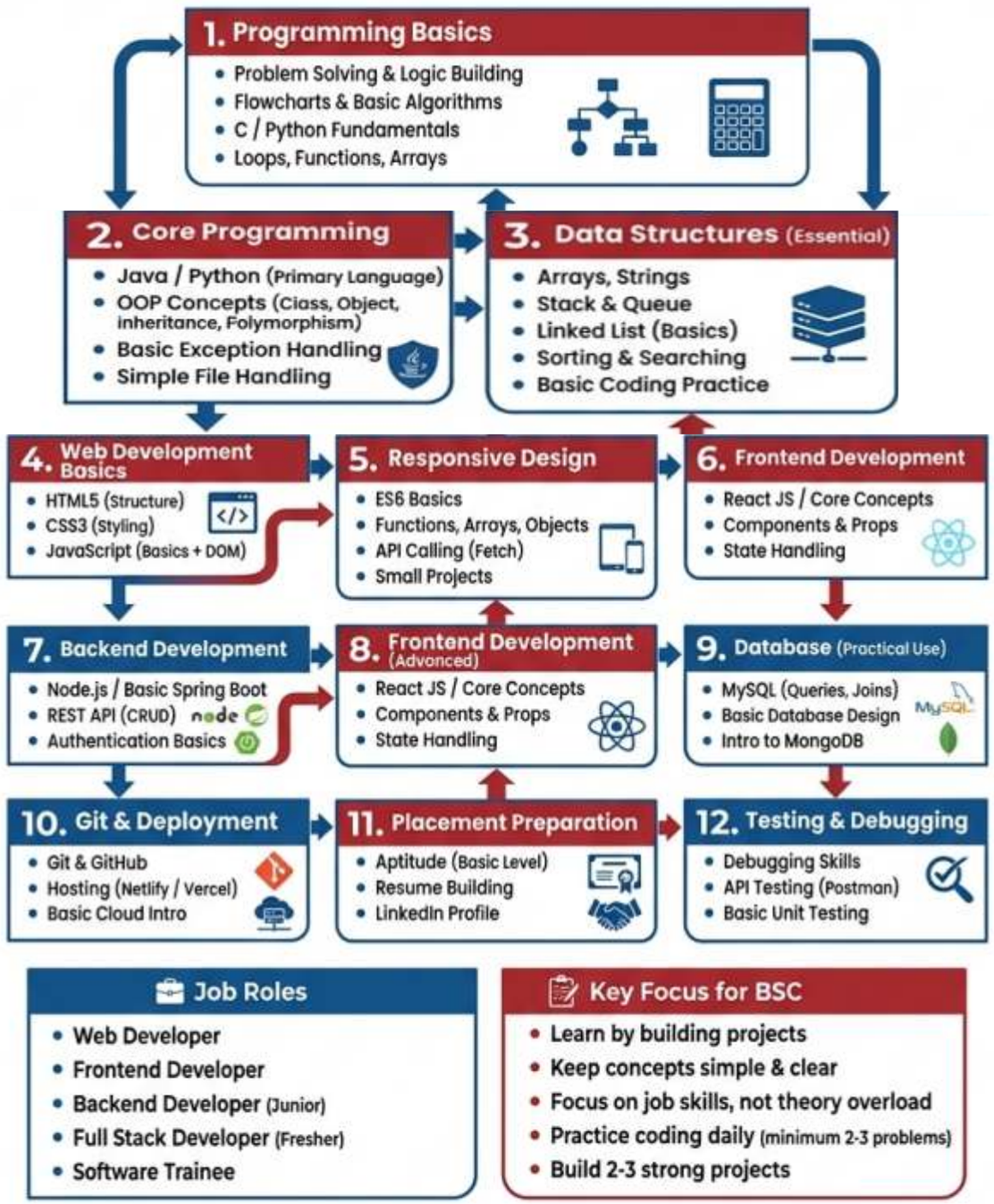
# ROADMAP-
# Data Science / ML / AI



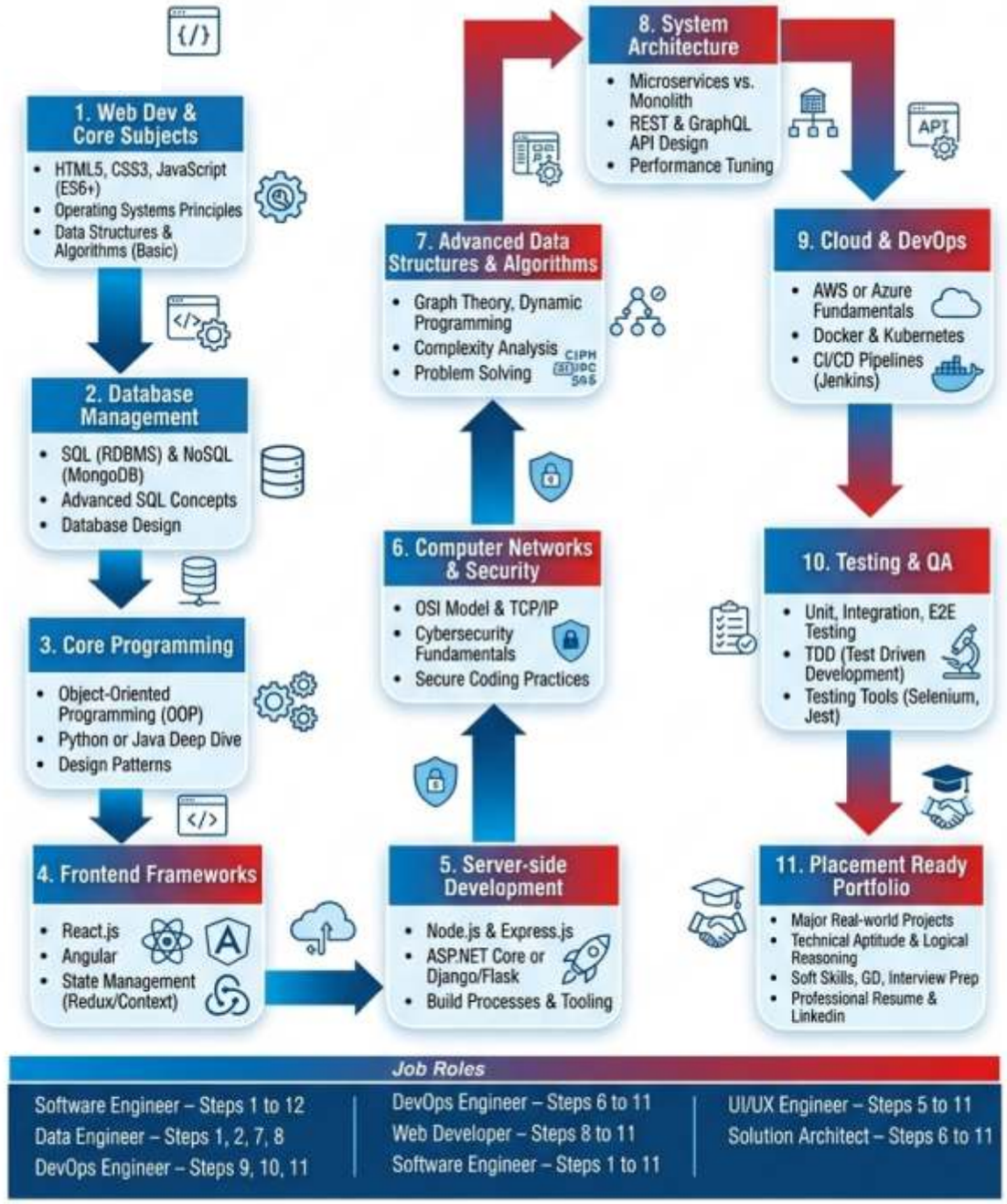

**Possible Job Roles by provided Roadmap:**

- Machine Learning Engineer (Steps 1 to 7 & 11)
- Data Analyst (Steps 1 to 9 & 11)
- Data Scientist (Steps 1 to 11)
- Business Analyst (Steps 1 to 4 & 11)
- Data Engineer (Steps 1 to 6 & 11)

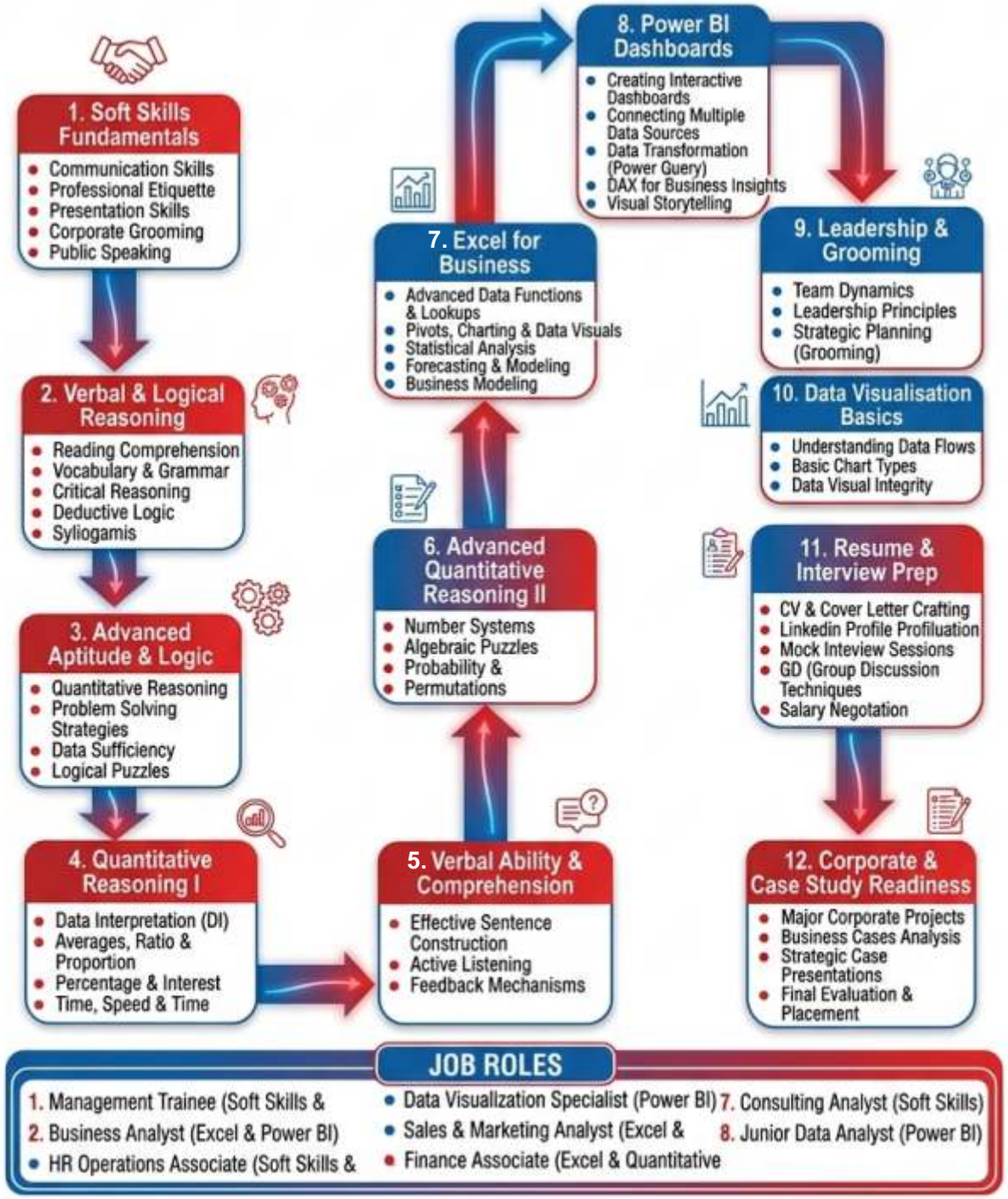
## ROADMAP-
## BSC Job-Oriented Full stack



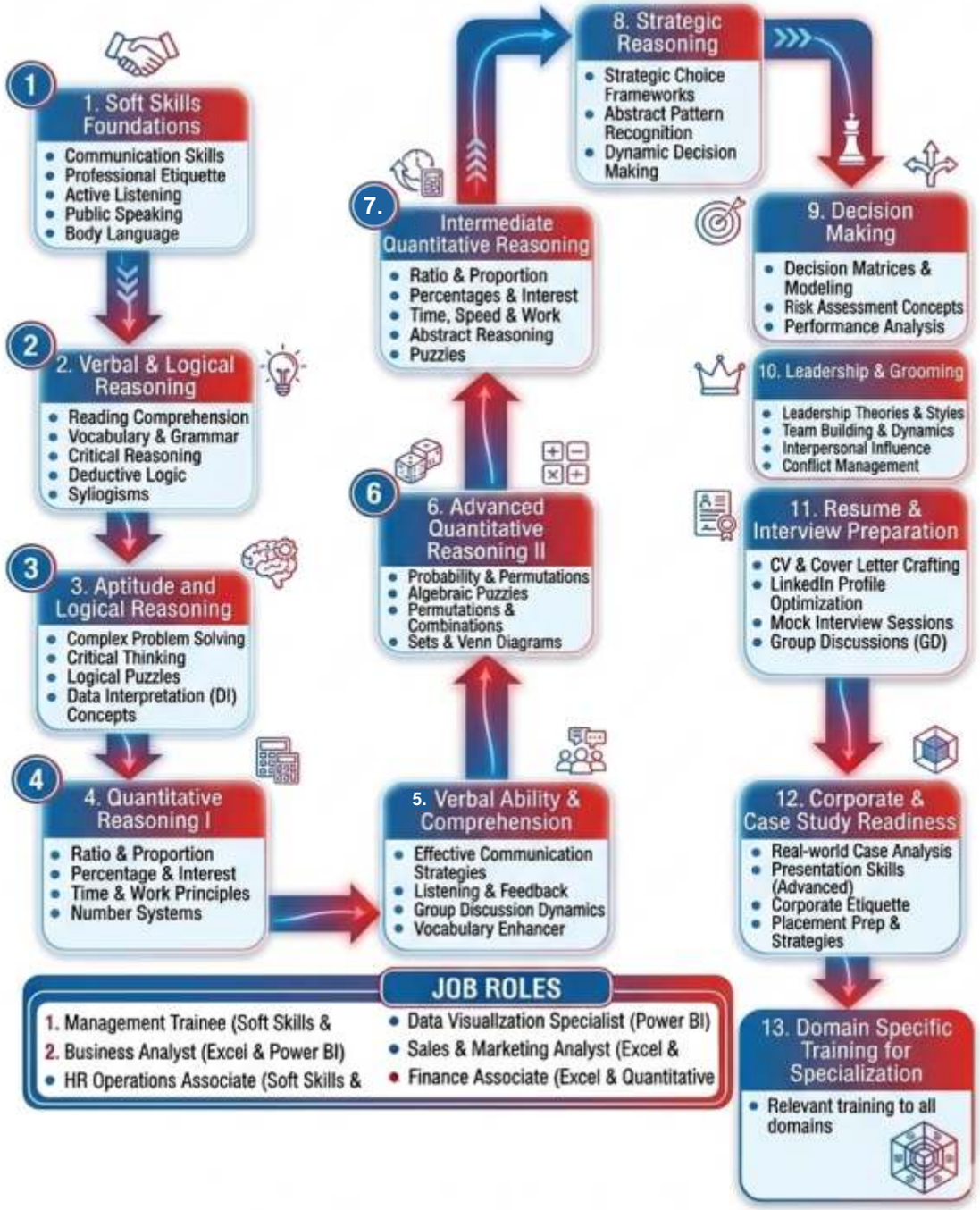

## ROADMAP-
## MCA Academic & Job



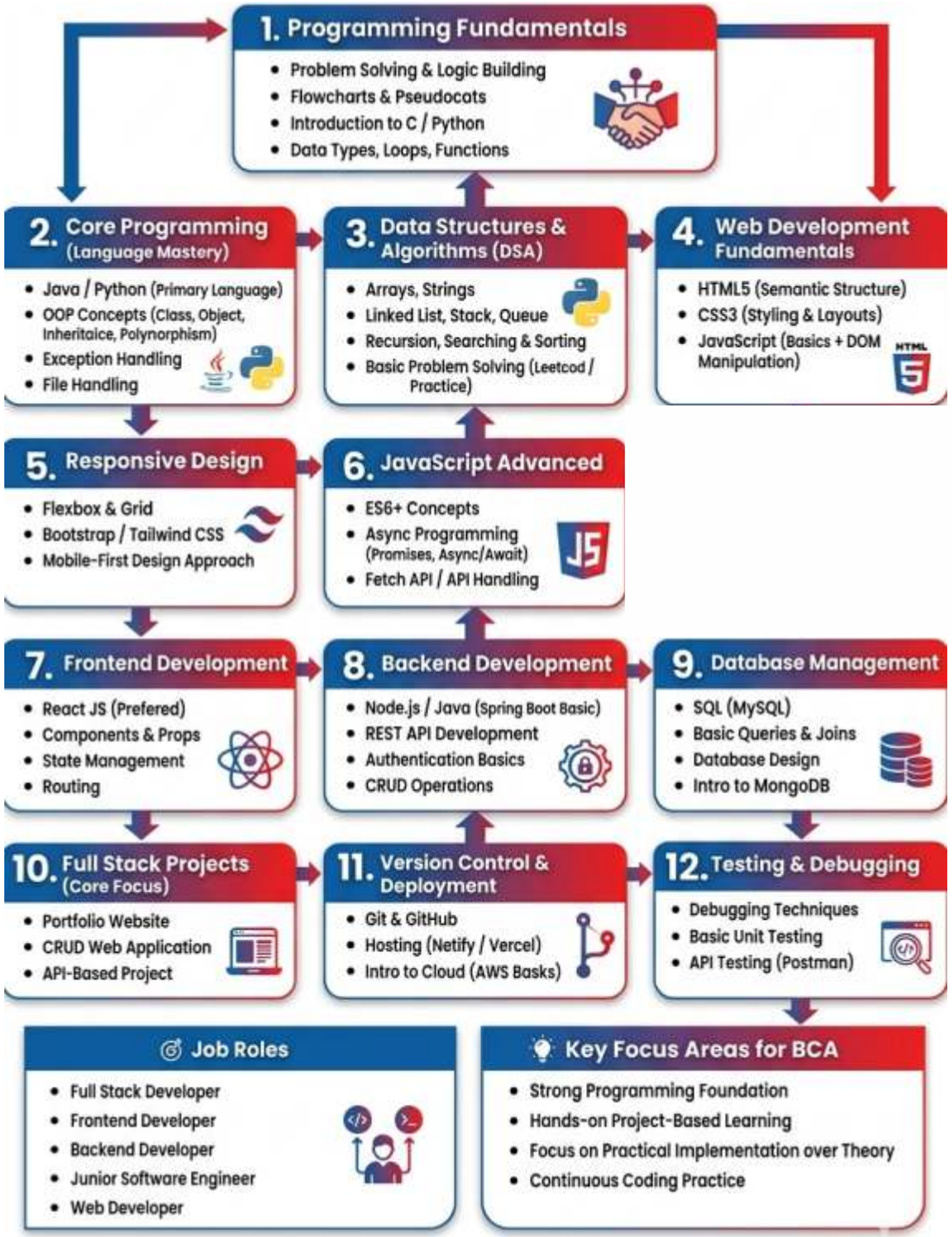
## ROADMAP-
## MBA SKILLS




## ROADMAP-
## Skills Roadmap for 3 Year, 4 Year and 5 Year Non-Tech Courses



## ROADMAP-
# BCA Full Stack Development




## Step into CGC University, Mohali

*A NEW-AGE UNIVERSITY* built for the

# Gen Z dreamer

the digital disruptor,
and the innovation-driven changemaker

Here, education goes beyond classrooms — it's AI-powered, industry-connected, and globally aligned. Every step you take here isn't just toward a degree, but toward becoming a force in the future of work. Join a university that's more than a campus — it's a catalyst for creators, coders, leaders, and learners. This is where your ambition finds its edge — and your journey becomes the future's foundation.