

# **Emerging Technologies**

## **AWS Certified Solution Architect Program**

### **Curriculum**

#### **Program Outline :**

##### **Module 1: Fundamentals of AWS**

###### **1. Introduction to AWS**

- Core principles, services, and tools.

###### **2. AWS Service Models**

- Understanding IaaS, PaaS, SaaS on AWS.

##### **Module 2: Advanced AWS Solution Architecture**

###### **3. Designing AWS Solutions**

- Best practices for designing AWS solutions.

###### **4. AWS Security and Compliance**

- Ensuring security and compliance in AWS solutions.

###### **5. Optimizing AWS Performance**

- Techniques for optimizing performance and cost-efficiency.

###### **6. AWS Deployment and Management**

- Managing AWS deployments using various tools.

##### **Module 3: Practical Applications**

###### **7. Hands-on AWS Projects**

- Real-world projects to apply AWS solution architecture skills.

## **8. AWS Integration**

- Integrating AWS solutions with existing systems.

## **Module 4: Capstone Project**

## **9. Integration of Learned Skills**

- Apply tools and techniques to real-world AWS projects.

## **10. Advanced AWS Techniques**

- Deepening knowledge and exploring advanced AWS capabilities.

## **Elective Modules**

## **11. Data Ethics and Privacy**

- Ethical considerations, privacy laws, compliance strategies.

## **12. AI for AWS**

- Implementing AI solutions in AWS architectures.

## **13. Big Data in AWS**

- Managing big data applications in AWS environments.

## **14. AWS DevOps**

- CI/CD pipelines, automation, and containerization with Docker, Kubernetes.

## **15. AWS Project Management**

- Leading AWS projects, ensuring successful delivery.

## **16. AWS for IoT**

- Integrating AWS solutions with IoT devices.

## **Websites:**

- <https://chools.in/>
- <https://ramaqchools.com/>
- <https://www.choolsgroup.com/>