Confidentiality

Reliability

Availability

Scalability (Horizontal / Vertical)

Iaas

Paas

Saas

Serverless computing

1. Transaction management in Microservices
2. Communication in microservices
3. Scalable microservices
4. Design and architecture in microservices
5. Java 8 Streams
6. Load Balancer
7. Fault tolerance
8. Archivement in real time project – How to overcome
9. Performance optimization in Project
10. Security feature implementation in project
11. 12 factor methodology in spring boot service
12. Traffic management , request filtering, routing,caching,authentication,authorization
13. Deploy application and update the version without downtime
14. Blue -green deployment
15. Third party tool for Authentication and Authorization

AWS Lambda

AWS Fargate

Docker 🡪 portability , productivity and efficiency

Amazon Elastic Container Service (ECS)

Amazon Elastic Kubernetes Service (EKS)

Amazon Elastic Block Store ( EBS)

IAM Roles

AWS Fargate

Compute Power

* AWS EC2 and Elastic Container Service
* EKS
* AWS Labda computing

Storage :

* S3 , Amazon Elastic cache

Networking :

* Amazon Service Discovery
* AWS App Mesh
* AWS Elastic Load Balancing
* AWS API Gateway
* AWS Route 53 for DNS

Messaging :

* Amazon SQS for message queueing
* SNS for publishing and notify

Monitoring :

* AWS cloud trail for API Monitroing
* AWS CloudWatch for inforstructure monitoring

DevOps – CI/CD

* Amazon ECR

User Instance run on cloud front CDN static content is stored in Amazon S3

* Incoming traffic 🡪 ELB 🡪 Kubernetes cluster
* Data is cached by Elastic Cache and stored in DB