

Presentation – 90 mins

Part 1 - AWS Architecture Design - 50 mins

BRIEF

Imagine that you meet with a small startup company in the early stages of their operations. Currently their architecture uses a LAMP stack with MySQL, Apache and PHP all running on one desktop PC within their small office. Like many small start-ups they are confident that they will be the next big thing and expect significant, rapid, yet unquantified growth in the next few months. With this in mind, they are concerned about:

- Scaling to meet the demand, but with uncertainty around when and how much this demand will be they are very concerned about buying too much infrastructure too soon or not enough too late!
- 2. Their lack of provision for Disaster Recovery.
- 3. Their ability to configure their database and data access layer for high performance and throughput.
- 4. Making the user experience in the browser very low latency even though a large portion of their user base will be from far away.
- 5. Effective distribution of load.
- 6. A self-healing infrastructure that recovers from failed service instances.
- 7. Security of data at rest and in transit.
- 8. Securing access to the environment as the delivery team expands.
- 9. An archival strategy for inactive objects greater than 6 months.
- 10. Ability to easily manage and replicate multiple environments based on their blueprint architecture.

OBJECTIVE

Recommend a manageable, secure, scalable, high performance, efficient, elastic, highly available, fault tolerant and recoverable architecture that allows the startup to organically grow. The architecture should specifically address the requirements/concerns as described above.

DELIVERABLES

During this interview, you're expected to prepare a proposal including AWS solution architecture with AWS service icons and illustrate your insights: What's AWS? Why AWS? And the AWS technical dive deep.

Please Role Play acting as an AWS Solutions Architect (SA) to further present your solution architecture. In this session, 2 or more interviewers will be sitting in and represent your customers, and they will probe quite a lot of questions regarding your proposal and AWS services features and deployment in great detail (mostly in infrastructure services basics). So please deep dive into all technical points described in the proposal (especially those related to your own background and strength).

Language: English (Written); Chinese (Oral)

Format: Chime Call/On-site

Deck: Please prepare a customer facing PPT based on the following outline sample for your

presentation.

SAMPLE

Contents

- 1 Assumption of the Case
- 2 Executive Summary
- 2.1 Requirements Analysis
- 2.2 Solution Abstract and Benefits
- 3 Solution Design
- 3.1 Architecture Overview
- 3.2 Design Details
 - 3.2.1 xxx
 - 3.2.2 xxx

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- 3.3 Summary
- 4 References

Part 2 - Your own choice on one of the following topics - 40 mins

OPTIONAL TOPICS

Your own choice on topic of

- ① Demo of the 3-layer architecture from Part 1 on AWS (No slides required).
- Solution architecture in one of the below technical domains: AI/ML; Analytics; Data Platform; Modern Application; DevOps; HPC; Migration; Enterprise Architecture; Data Center Architecture; Private Cloud; Business Continuity/Disaster Recovery
- 3 Solution architecture covering specific industry issues.

REQUIREMENT

For Choice 1, there are no slides required.

For Choice 2&3, please prepare the presentation slides to present a solution architecture from your previous customer engagement or project which you are proud of. (It is better to be complicated enough to show your best technical performance).

ADDITIONAL

To make the session more interactive, we also encourage you to use the Power Point built-in free drawing feature as a supplementary tool, e.g., drawing traffic flow for better visualization.

Subject to your preference, you can also use any other tools if you feel more comfortable in delivering the presentation and free-drawing.