**Exam Code:** 000-665

**Exam Name:** Test665.Architectural Design of SOA

Solutions

Vendor: IBM

Version: DEMO

## Part: A

1: Data federation is often cited as a data integration alternative to a data consolidation approach (i.e., data warehouse). Which of the following is the best reason to adopt a data federation versus data consolidation approach?

A.The set of data to be queried by the end-user is known in advance.

B.Data security, licensing restrictions, or industry regulations restrict data movement.

C.Complex transformation is required to achieve semantically consistent data.

D.Security requirements are more easily implemented using a federated approach.

**Correct Answers: B** 

2: In which of the following situations is transport level security most appropriate?

A.If the SOA solution requires assured transport delivery

B.If the SOA solution requires security for all messages across a network

C.If the SOA solution is not exposed to outside business partners

D.If the SOA solution requires decoupling security from the message content

**Correct Answers: B** 

3: A set of existing application functionality is to be exposed as services, so that this functionality becomes available across the enterprise. The existing functions can exchange text messages with clients over WebSphere MQ. What is the best approach to integrate these functions into an SOA?

A.Let clients send text messages directly to the function via WebSphere MQ.

B.Change the existing application to be able to handle XML formatted data.

C.Create an additional Web service interface for the function and perform the transformation from XML to text message there.

D.Use the transformation capabilities of XSLT style sheets at the client end.

**Correct Answers: C** 

- 4: A customer wants to build an SOA solution that allows client requests from .NET or MQ to be dynamically routed based on message contents to service providers implemented on CICS and external Web service providers. Which two of the following solution options are recommended?
- A. WebSphere Process Server for message routing and CICS Transaction Gateway
- B.WebSphere Message Broker for MQ and Web Services connectivity and CICS MQ Adapter
- C.WebSphere Partner Gateway for message routing and MQ connectivity to CICS
- D. WebSphere Interchange Server for message routing and WebSphere Adapters for CICS integration

E.WebSphere ESB for message routing and CICS Transaction Gateway

**Correct Answers: B E** 

5: Which two of the following standards/specifications best describe IBM's SOA programming model?

A.Service Component Architecture

**B.XML Schema and WSDL** 

C.J2EE JMS for calling messaging-based services

D.WS-I (Web Services Interoperability) Basic Profile

E.Service Data Objects

**Correct Answers: A E** 

6: For SOA software projects, integration flows are developed and basic unit testing is performed by the Application Integrator. Which of the following is the focus of the testing done by the quality engineer responsible for overall system Quality Verification Testing?

A.Test end-to-end service interaction and integration scenario.

B.Confirm that each of the services meet their functional requirements.

C. Validate that each of the services meet their non functional requirements.

D.Perform exhaustive testing of all the services that belong to the project.

**Correct Answers: A** 

7: The ESB Gateway pattern represents a variation of the ESB pattern and is most often used for which of the following conditions?

A.Provides all the protocol transformation functions in an SOA.

B.Provides a focal point for security services for all services in an enterprise.

C.Appears at data access boundaries for mediation to back end systems.

D.Appears at governance boundaries such as between organizations or sub-units of a large organization.

**Correct Answers: D** 

8: A customer has two legacy systems: one allows lookup and update of customer address, another allows validity checking of a zip code. Existing clients that need to update customer addresses first use the zip code validation and then send a separate request to update the address. A customer wants to expose these two legacy systems as services. Which of the following design approaches would NOT be appropriate in this case?

A. Wrap each system as a service and build a new service, which calls the existing services within a single transaction with 2-phase commit.

B.Build a new service, safeUpdateAdress, which calls each existing system in correct order.

C.Wrap each system as a service and build a new service, safeUpdateAdress, using BPEL for flow control

D.Wrap each system as a service and build a new service, safeUpdateAdress, using a session EJB to control the flow.

**Correct Answers: A** 

9: While SOA has broad business value, selecting the right project to get started is important. Which of the following business issues best aligns with an initial SOA project?

A.Focusing on short term IT cost reduction

B.Transforming a core, complex set of applications

C.Automating a significant business process

D.Breaking down strong organizational silos

10: An SOA solution designer is Web-Services enabling a legacy CRM application. The solution designer decided to base the architecture on the IBM SOA Reference Architecture. What domain should the SOA solution designer concentrate on in order to setup the service level objectives and service monitoring?

A.Infrastructure Services and IT Service Management

**B.Middleware Services and Access Services** 

C.Development Services and Access Services

D.Process Services and IT Service Management

Correct Answers: A

11: A utility module needs to be called by several business applications, three of which are critical to the business. How might an SOA solution address this problem?

A.Turn on logging to track response times.

B.Deploy the utility service into a cluster.

C.Include the utility module in each of the three applications.

D.Deploy multiple instances of the service with differing qualities of service.

**Correct Answers: D** 

12: An SOA design team is working on identifying a series of services that need to be enabled in their organizational SOA. What would be a valid design consideration?

A.Replace existing APIs (Application Programming Interfaces) with Web Services.

B.Rewrite all existing applications as Web Services that can now be delivered as part of the organizational SOA.

C.A number of existing applications can be combined together by wrapping techniques to be delivered as Web Services.

D.Leverage business analysis and business modeling outputs to align services to be delivered with business functionality.

**Correct Answers: D** 

13: An enterprise architecture group is in the process of mapping its existing enterprise architecture to the IBM SOA reference architecture. During this process, the group realizes that there are Business Process Execution Language (BPEL) based business processes that invoke business application services directly instead of using an Enterprise Service Bus (ESB). Should they consider this as an acceptable approach?

A.No, an Enterprise Service Bus should be used for all service level interactions because it handles mediation and transformation.

B.Yes, one of the powerful features of SOA is that it does not really matter where the services are located or how they are invoked.

C.Yes, as long as the enterprise architecture group's decision complies with the architecture and operational practices adopted by the company's IT governance.

D.No, business processes should use an Enterprise Service Bus to invoke services in an off-the-shelf business rules engine instead of invoking business application services.

14: An SOA solution designer is addressing non-functional requirements for an SOA project that has been suffering from performance issues. Which of the following should be included?

A.Performance and platform

B.Total-cost-of-ownership and quality

C.Security and error handling

D.Response time and scalability

**Correct Answers: D** 

15: An SOA solution designer is conducting an SOA assessment of a customer portfolio. Which of the following topic areas is most relevant to include as a topic for the application assessment?

A.Application security

B.Level of componentization

C.Required operating systems

D. Versions of off-the-shelf applications

**Correct Answers: B** 

16: SOA is certainly not the only choice for all projects and may be less than optimal for some situations. Which of the following best describes a customer environment where SOA might be applicable?

A.A business that revolves around extremely high-volume, high-performance, synchronous, and real-time transactions.

B.A homogeneous IT environment with single programming model, using common middleware

C.A heterogeneous IT environment with a variety of programming models, tools and platforms

D.A stable application environment with a small percentage of IT budget assigned to integration activities.

**Correct Answers: C** 

17: Which two of the following are objectives of an SOA assessment?

A.Assess the architecture for service re-use potential and document observed gaps between existing components, services and infrastructure.

B.Develop a holistic view of services aligned by the business portfolio of products and services.

C.Identify required tools and methods for the transformation environment.

D.Understanding the clients business and technical mandates.

E.Identify and specify services and components.

Correct Answers: A D

18: Which of the following represents the best reason that an organizational assessment is important in an SOA project?

A.Because an organization may have multiple IT departments.

B.Because the IT department must change its development processes.

C.Because SOA will impact processes that cross organizational boundaries.

D.Because embracing SOA requires the enterprise to restructure its management.

19: Which of the following statements best represents a case for an SOA?

A.An enterprise wants to standardize CRUD data services for their geographically distributed databases.

B.An online retailer is experiencing performance issues during the heavy shopping season.

C.A business wants to reduce the time to market for new products and services by leveraging existing applications and improving collaboration from partners.

D.An enterprise wants to standardize all data exchange using XML.

## **Correct Answers: C**

20: Compliance with government regulations remains at the top of many CEO list of must have functions. One aspect of Compliance with government regulations remains at the top of many CEO? list of must have functions. One aspect of compliance is providing a clear audit trail of who did what and when. What SOA technique would most help realize this requirement?

A.Decompose all business processes into a collection of services for agility and reuse.

B.Maximize legacy reuse by wrapping existing transactions with services.

C.Allow for service intermediaries through the use of an Enterprise Service Bus (ESB).

D.Leverage open standards to represent software assets as services for maximum interoperability with external systems.