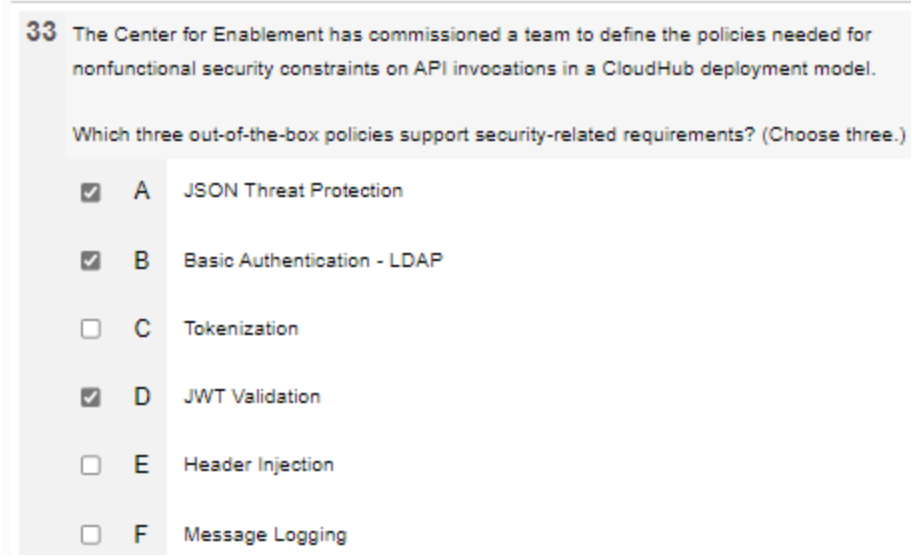
MCPA Practise Test

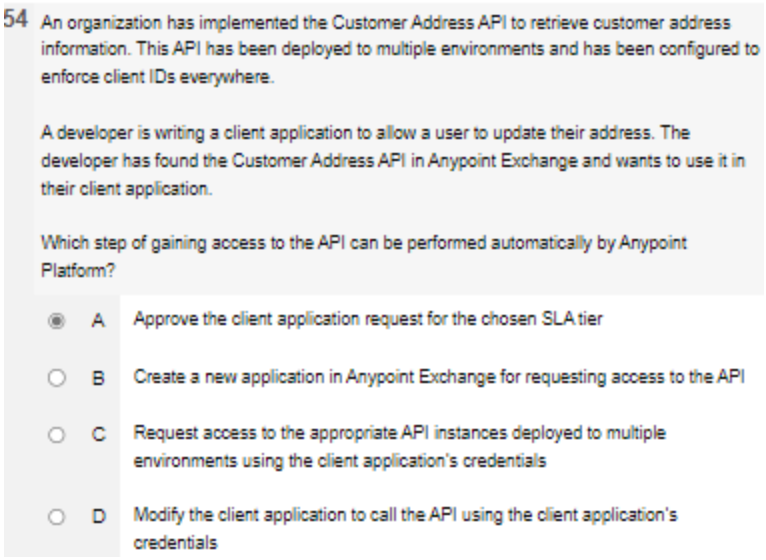
Governing web APIs on Anypoint Platform



33 The Center for Enablement has commissioned a team to define the policies needed for nonfunctional security constraints on API invocations in a CloudHub deployment model.

Which three out-of-the-box policies support security-related requirements? (Choose three.)

- [x] A JSON Threat Protection
- [x] B Basic Authentication - LDAP
- [ ] C Tokenization
- [x] D JWT Validation
- [ ] E Header Injection
- [ ] F Message Logging



54 An organization has implemented the Customer Address API to retrieve customer address information. This API has been deployed to multiple environments and has been configured to enforce client IDs everywhere.

A developer is writing a client application to allow a user to update their address. The developer has found the Customer Address API in Anypoint Exchange and wants to use it in their client application.

Which step of gaining access to the API can be performed automatically by Anypoint Platform?

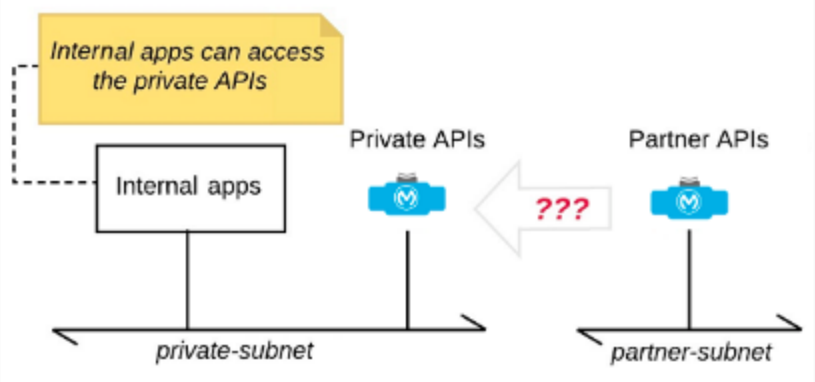
- (•) A Approve the client application request for the chosen SLA tier
- ( ) B Create a new application in Anypoint Exchange for requesting access to the API
- ( ) C Request access to the appropriate API instances deployed to multiple environments using the client application's credentials
- ( ) D Modify the client application to call the API using the client application's credentials

6 Refer to the exhibit.

Mule applications (apps) that implement a number of REST APIs are deployed to their own subnet that is inaccessible from outside the organization.

External business partners must access these APIs, which are only allowed to be invoked from a separate subnet dedicated to partners—called partner-subnet. This subnet is accessible from the public internet, which allows these external partners to reach it. Anypoint Platform and Mule runtimes are already deployed in partner-subnet, and these Mule runtimes can already access the APIs.

Which solution most effectively complies with these requirements while having the smallest impact on other applications that currently use the APIs?



- ○ A Create one API proxy that accesses each of the APIs, and then deploy that proxy to the Mule runtime in the private-subnet
- ○ B Add an additional endpoint to each API for partner-enablement consumption
- ○ C Create connectors for each of the Private APIs, and then use the Partner APIs to interface with the Private API connectors
- ◉ D Implement (or generate) an API proxy Mule application for each of the APIs, and then deploy the API proxies to the Mule runtimes in the partner-subnet

1 Which three events can be effectively enforced using an API policy in Anypoint Platform? (Choose three.)

- ☑ A Prevent overloading the back-end system
- ☐ B Identify denial-of-service attacks
- ☐ C Application auto-restart
- ☑ D Authenticate credentials between APIs
- ☐ E Stack overload prevention index
- ☑ F Log HTTP requests and responses

3 How can the application of a rate-limiting API policy be accurately reflected in the RAML definition of an API?

- A By refining the response definitions by adding the out-of-the-box Anypoint Platform rate-limit-enforcement securityScheme with description, type, and example
- B By refining the response definitions by adding 429 status code and the x-ratelimit-* response headers with description, type, and example
- C By adding a SecurityScheme with the declaration settings defined for the x-ratelimit-* response headers
- D By publishing a new RAML fragment to define 429 status code and the x-ratelimit-* response body with traits, is clause, and responses

11 The Anypoint Platform organization administrator is asked to configure an external identity provider (IdP) using an OpenID Connect-compliant provider to set up users for single sign-on (SSO).

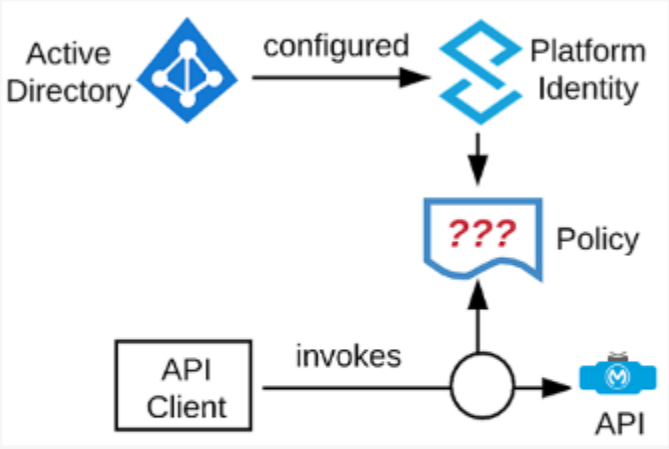
What happens if a user already exists in the Anypoint Platform organization and has the same username as the one used to log in with SSO?

- A It is not possible to create a new user for SSO with the same username as a user that already exists in the Anypoint Platform organization. The new SSO user creation, using the external identity management solution, will return an error.
- B The new user that is used to log in with SSO coexists with the original user with the same username. Users with the same username are managed independently of one another.
- C It is not possible to create a new user for SSO with the same username as a user that already exists in the Anypoint Platform organization. The new SSO user creation, using the external identity management solution, will be automatically created as unique.
- D The new user that is used to log in with SSO cannot coexist with the original user with the same username. The original user must be disabled.

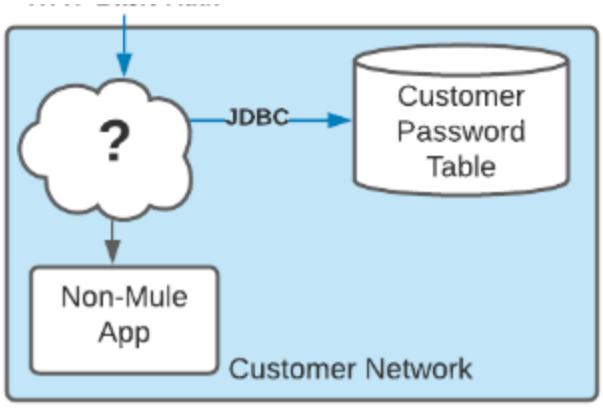
21 Refer to the exhibit.

An organization is running a Mule standalone runtime and has configured Active Directory as the Anypoint Platform external identity provider. The organization does not have budget for other system components.

Which policy should be applied to all instances of APIs in the organization to most effectively restrict access to a specific group of internal users?



- A Apply the OAuth 2.0 Access Token Enforcement policy; the internal Active Directory will be configured as the OAuth resource server
- B Apply a Client ID Enforcement policy; the specific group of users will configure its client applications to use its specific client credentials
- C Apply the Basic Authentication - LDAP policy; the internal Active Directory will be configured as the LDAP source for authenticating users
- D Apply the JWT Validation policy; configure it with the JWT token provided by Active Directory



- ○ A Use HTTP Basic Auth policy.
  Configure with a JDBC driver and connection string.
  Configure SQL query and input parameters.
- ○ B Add a database client provider in access management.
  Configure with a JDBC driver and connection string.
  Configure SQL query and input parameters.
  Configure the Client ID Enforcement policy with HTTP Basic Auth.
- ○ C Create a Mule application with APIkit.
  Configure HTTP Connector to use Basic Auth.
  Set Database Connector to retrieve username and password.
- ◉ D Create a custom policy that will validate username and password by retrieving them from the database table.
  Deploy the policy to Anypoint Exchange.
  Assign the custom policy to the API instance.
  Configure the policy definition with connection string.

57 What is the correct process to apply a nonautomated API policy, and to which API instances is this policy applied?

- ○ A Create a custom XML API policy, within the XML.
  Then set the *apiId* keyname value to *all* to apply to all instances of the API.
- ○ B A custom API policy is defined in API Designer for a particular API instance.
  Then the API policy is only applied to that specific API instance.
- ◉ C The API policy is defined in API Manager for a particular API instance.
  Then the API policy is only applied to that specific API instance.
- ○ D The API policy is defined in API Manager for the API specification.
  Then the API policy is only applied to ALL API instances of that API specification.

Establishing organizational and platform foundations

34 According to MuleSoft best practices, who should be responsible for identifying, designing, and developing integrations and APIs that are immediately available and reusable by the organization?

- (●) A Center for Enablement team
- ( ) B Internal IT department
- ( ) C Line of Business IT team
- ( ) D Business IT team

Clear Answer

☐ Mark for review

1 An organization makes a strategic decision to move toward an IT operating model that emphasizes consumption of reusable IT assets using modern APIs (as defined by MuleSoft).

Which statement describes each modern API in relation to this new IT operating model?

- ( ) A Each modern API must be REST-based and HTTP-based
- ( ) B Each modern API has its own software development lifecycle, which reduces the need for documentation and automation
- ( ) C Each modern API must be easy to consume, so each should avoid complex authentication mechanisms such as SAML or JWT
- (●) D Each modern API must be treated like a product and designed for reuse

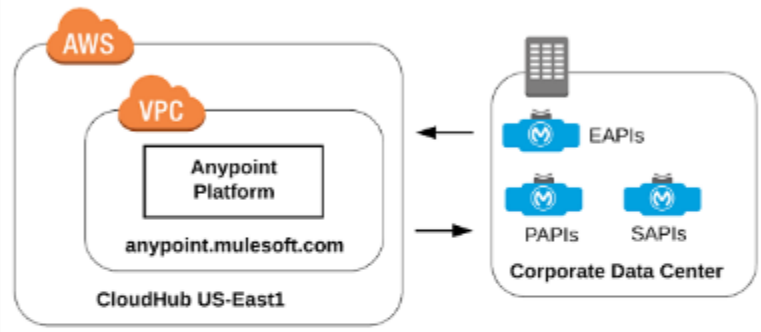
1 A company deploys Mule applications through Runtime Manager with default configurations to customer-hosted Mule runtimes. Each Mule application is an API implementation that exposes RESTful interfaces to API clients. The Mule runtimes are managed by the MuleSoft-hosted control plane.

When an API client sends an HTTP request to a customer-hosted Mule application, which data (payload) and/or metadata is pushed to the MuleSoft-hosted control plane?

- ( ) A Neither the data nor the metadata is pushed to the MuleSoft-hosted control plane
- (●) B Only the metadata is pushed to the MuleSoft-hosted control plane
- ( ) C Only the data is pushed to the MuleSoft-hosted control plane
- ( ) D Both the data and the metadata are pushed to the MuleSoft-hosted control plane

4 Refer to the exhibit.

Which statement is true when using customer-hosted Mule runtimes with the MuleSoft-hosted Anypoint Platform control plane?

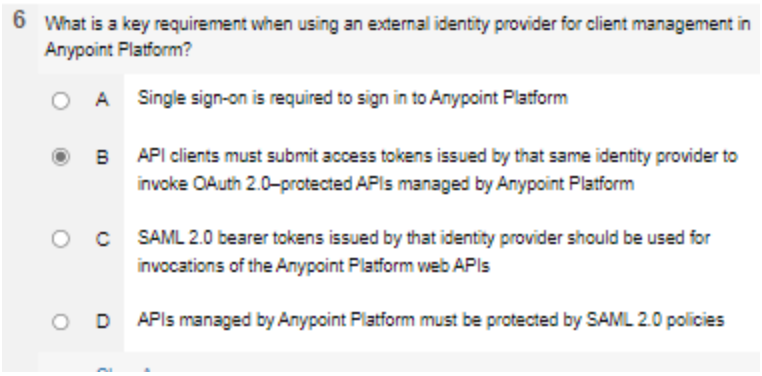


- (●) A API implementations can run successfully in customer-hosted Mule runtimes, even when APIs are unable to communicate with the control plane
- ( ) B The MuleSoft-hosted Shared Load Balancer can be used to load balance API invocations to the Mule runtimes
- ( ) C Anypoint Runtime Manager initiates a network connection to a Mule runtime in order to deploy Mule applications
- ( ) D Anypoint Runtime Manager automatically ensures high availability in the control plane by creating a new Mule runtime instance in case of a node failure

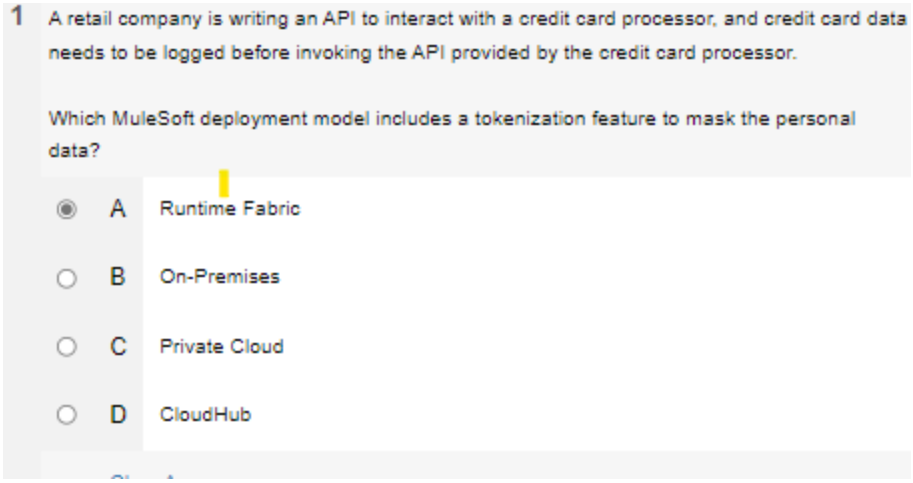
2 A company wants to secure primary account number (PAN), personally identifiable information (PII), protected health information (PHI), and any information deemed sensitive. While procuring MuleSoft licenses and software, the company makes sure that the tokenization feature is included and available.

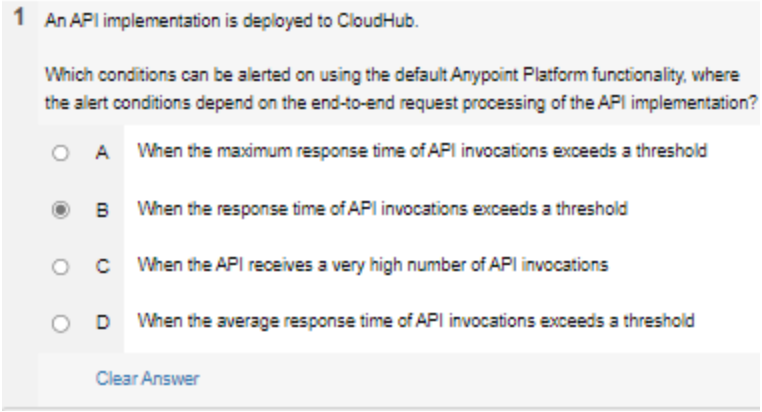
Which combination of Mule control plane and runtime plane(s) meets these requirements?

- ( ) A The MuleSoft Anypoint CloudHub control plane and MuleSoft Anypoint CloudHub runtime plane
- (●) B The MuleSoft-hosted control plane and customer-hosted Anypoint Runtime Fabric for the runtime plane
- ( ) C Anypoint Platform Private Cloud Edition for the control plane and the MuleSoft-hosted runtime plane
- ( ) D Customer-hosted MuleSoft Anypoint Platform Private Cloud Edition for the control plane and customer-hosted MuleSoft Anypoint runtimes for the runtime plane



Monitoring and analyzing application networks





1 An organization deploys Mule applications to both the MuleSoft-hosted runtime plane and a customer-hosted runtime plane. All deployments are managed by the MuleSoft-hosted control plane. Alerts have been created in the MuleSoft-hosted control plane related to invocations of deployed API implementations that are managed by API Manager. The organization's InfoSec team must locate the source(s) of the data or metadata that generate these alerts.

What generates these alerts?

- A MuleSoft-hosted runtime plane, customer-hosted runtime plane, and MuleSoft-hosted control plane
- B MuleSoft-hosted runtime plane and customer-hosted runtime plane
- C MuleSoft-hosted control plane
- D MuleSoft-hosted runtime plane and MuleSoft-hosted control plane

46 What is a typical result of using a fine-grained, rather than a coarse-grained, API deployment model to implement a given business process?

- A A higher number of discoverable, API-related assets in the application network
- B A better response time for the end user as a result of the APIs being smaller in scope and complexity
- C An overall lower usage of resources because each fine-grained API consumes fewer resources
- D A decrease in the number of connections within the application network supporting the business process

Clear Answer

2 An API with multiple API implementations (Mule applications) is deployed to both CloudHub and customer-hosted Mule runtimes. All the deployments are managed by the MuleSoft-hosted control plane. An alert must be triggered whenever an API implementation stops responding to API requests, even if no API clients have called the API implementation for some time.

How can these alerts be created to monitor the API implementations?

- A In API Functional Monitoring, create monitors for the API implementations, where each monitor repeatedly invokes an API implementation endpoint
- B In Anypoint Runtime Manager, for all the API implementations, configure one Custom Application notification alert to monitor every API implementation
- C In API Manager, configure a Request Count alert to monitor every API implementation of the API
- D In each API client, add code to send a REST API request to generate a custom alert in Anypoint Platform when an API invocation times out

3 Which two actions are needed to create a custom alert for a Mule application deployed to CloudHub? (Choose two.)

- [ ] A Enable alerts in Runtime Manager
- [ ] B Configure an alert email recipient in Access Management
- [x] C Add Anypoint Connector for CloudHub to the Mule application
- [ ] D Configure an email server for the alert notification to be sent
- [x] E Configure the custom application alert in Runtime Manager

18 What is a byproduct of the API invocation metrics available from Anypoint Platform, and how can these byproducts be utilized?

- ( ) A ROI metrics data automatically inferred from API usage that can be directly shared with business users.
  The data are used to help create real-time executive dashboards.
- ( ) B Data on the level of reuse of assets.
  The data are used to help measure the effectiveness of the application network.
- ( ) C API policy data that exceed a given threat threshold.
  The data are used to help proactively identify likely subsequent future policy violations.
- (•) D Data on past API invocations.
  The data are used to help identify anomalies and usage patterns across various APIs.

Designing and sharing APIs

SAFE Methods - GET, OPTIONS & HEAD

1 For a particular REST API specification managed by API Manager, how do an API interface, an API implementation, an API client, and API policies typically interact to invoke and process REST requests?

- ( ) A The API interface invokes the API client that calls the API implementation to apply API policies to process the REST request
- (•) B The API client invokes the API interface that applies API policies before calling the API implementation to process the REST request
- ( ) C The API implementation invokes the API client that applies API policies before calling the API interface to process the REST request
- ( ) D The API client invokes the API implementation that calls the API interface to apply API policies to process the REST request

1 An API implementation is updated.

When must the RAML definition of the API also be updated?

- A When the API implementation is optimized to improve its average response time
- B When the back-end system is migrated from SOAP to RESTful implementations
- C When the API implementation is changed to not use APIkit Router
- D (selected) When the API implementation changes the structure of the request or response messages

7 According to the API-led connectivity approach MuleSoft recommends, what is a best practice when building system APIs?

- A Expose the details of the API implementation's interaction with the back-end system to API clients
- B Expose the metadata of the back-end system
- C (selected) Document the system API using an easily consumable asset like a RAML definition
- D Build an Enterprise Data Model (Canonical Data Model) for all back-end systems and apply it to system APIs

Designing APIs using System, Process, and Experience Layers

1 A large healthcare provider has been building its application network for several years and has a large number of APIs in each layer. The company is looking for ways to streamline the use of common business objects for developers.

Which Anypoint component can streamline the use of many web APIs into a single endpoint?

- A Runtime Manager
- B (selected) DataGraph
- C API Manager
- D Anypoint Exchange

44 The central IT group of an organization is building a System API (SAPI) for a legacy system that has a number of specialized components and runs programs that implement complex algorithms.

For data analysis purposes, the business processes that consume the SAPI require the back-end system's data in its original source form, so the IT organization decides to have the SAPI mirror the back-end system's data model.

With these requirements, what is a primary benefit of designing the SAPI to mirror the back-end system's data model rather than directly connecting it to the back-end system?

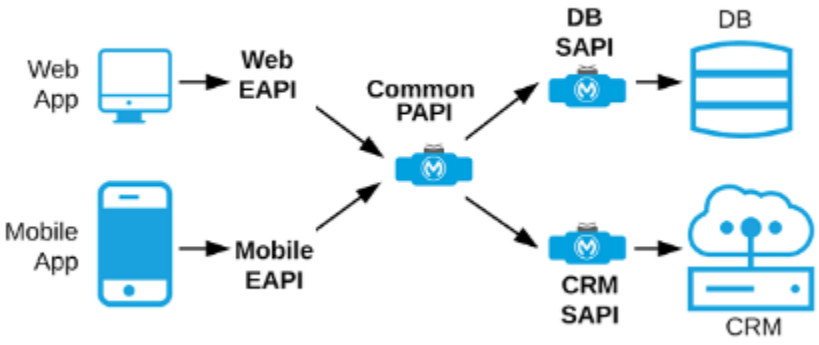
- ○ A To optimize the performance characteristics when accessing and retrieving modified data from the back-end system
- ◉ B To provide a single interface that insulates API clients from the complexity of and any future changes to the underlying integration interface exposed by the back-end system
- ○ C To expose the back-end system's data model to ensure all the back-end business objects are added to the Enterprise Data Model
- ○ D To provide an externally facing security proxy to defend against internet-based attacks from mobile and web-based clients

22 What is the most performant out-of-the-box solution in Anypoint Platform to track transaction state in an asynchronously executing, long-running process implemented as a Mule application deployed to multiple CloudHub 1.0 workers/replicas?

- ○ A File-based storage
- ○ B Transient object store
- ○ C Transient VM queue
- ◉ D Persistent object store

Clear Answer

◉ D Separate Experience APIs for the mobile app and web app, but a common Process API that invokes separate System APIs created for the database and CRM system



Clear Answer

15 A company is embarking on a MuleSoft API-led connectivity effort using Mulesoft's proposed operating model. The company has decided to build a set of APIs to solve their connectivity challenges and unlock the data from core systems of record.

Which layer of APIs must be created and who is responsible for those APIs?

- A The Mobile Application team must create the Experience APIs to create the end-user experiences
- B Central IT must create System APIs to unlock the data to help accelerate business processes
- C The Enterprise Architecture team must create the Process APIs to unlock the data
- D The Line of Business team must create the Process APIs to implement the business processes

27 When should the API data model of a system API reasonably mimic the data model exposed by the corresponding back-end system, with minimal improvements over the back-end system's data model?

- A When a pragmatic approach to data modeling with limited isolation from the back-end system is determined appropriate
- B When the system API can be assigned to an existing bounded context not including the back-end system
- C When the corresponding back-end system is expected to be replaced in the near future
- D When there is an existing Enterprise Data Model widely used across the organization

5 A team working at a multinational bank introduced a new System API into their environment.

What are two reasons the team made this decision? (Choose two.)

- [x] A The administration system did not authorize requests and was having data erroneously modified due to unauthorized requests
- [ ] B Payment requests coming through the system had to be routed to a new fraud engine that was introduced at the bank
- [x] C The administration system's interface utilized an overly complex model, the majority of which was not applicable to the bank's business
- [ ] D An external vendor that integrated with the bank's systems changed their client from one that interacted with SOAP interfaces to one that required RESTful interfaces
- [ ] E A service was introduced that needs to analyze network traffic passing through the APIs for unencrypted PII data

Architecting and deploying API implementations

1 An API instance is managed in API Manager. A corresponding Mule application will be deployed to a Mule runtime to implement the API instance. API policies defined or changed for the API instance in API Manager must be enforced for the Mule application's API endpoints.

How is the Mule application connected with the API instance so that policies defined in API Manager for the API instance will be enforced for this Mule application?

- A The Implementation URL from the API instance configuration in API Manager is used to configure API autodiscovery in the Mule application
- B The baseURL from an API autodiscovery configuration in the Mule application is used to configure the API instance in API Manager
- C The API ID from the API instance configuration in API Manager is used to configure API autodiscovery in the Mule application
- D The API ID from an API autodiscovery configuration in the Mule application is used to configure the API instance in API Manager

3 A client is starting to use MuleSoft and wants the Production environment to run on a dedicated Virtual Private Cloud (VPC) on CloudHub 1.0. Two Dedicated Load Balancers (DLBs) have been procured.

How should the CloudHub 1.0 DLBs be configured?

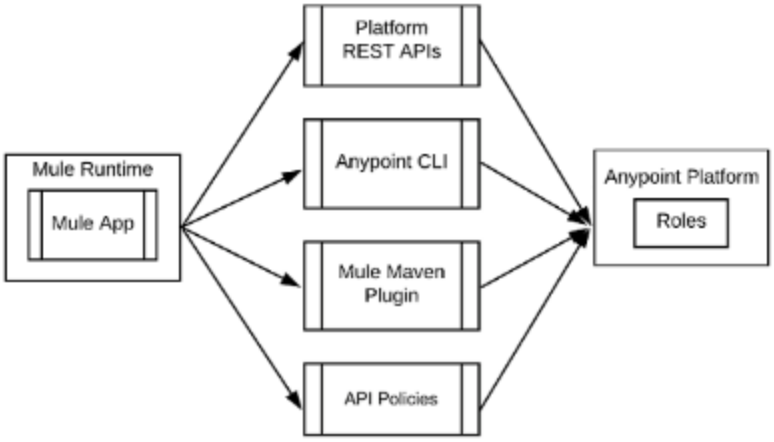
- A Configure one DLB for public-facing apps and one for private-facing applications
- B Configure both DLBs for public-facing apps and one Shared Load Balancer for private-facing applications
- C Configure both DLBs for private-facing applications
- D Configure both DLBs for public-facing applications

2 An organization uses a mixture of external SaaS systems and a legacy on-premises database that is blocked by the organization's public-facing firewall. None of the SaaS systems use AWS. New Mule applications are being designed to integrate the SaaS systems with the on-premises database. The organization wants to minimize its investment in IT infrastructure.

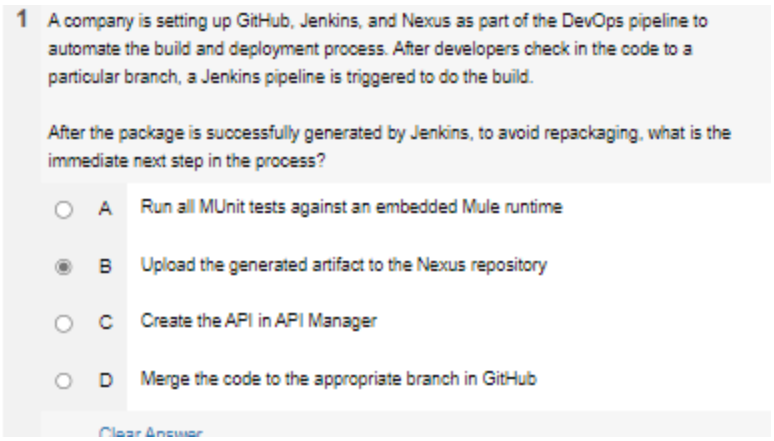
Which Anypoint Platform runtime plane should be used to deploy the Mule applications, and which Anypoint Platform network configuration will support these requirements?

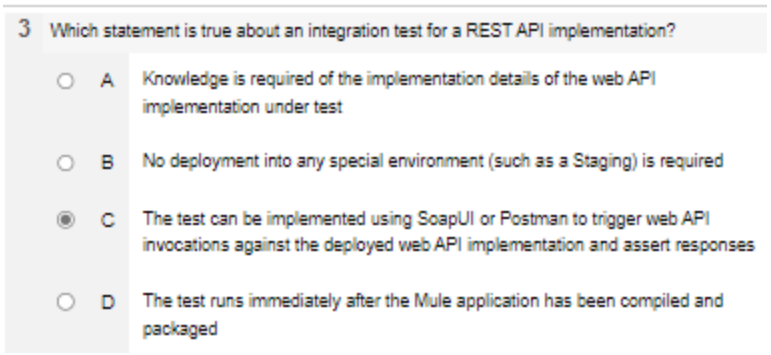
- (●) A Deploy to the MuleSoft-hosted runtime plane.
  Configure the network with an Anypoint VPC that is configured with an IPSec tunnel to the on-premises network.
- ( ) B Deploy to the MuleSoft-hosted runtime plane.
  Configure a CloudHub 1.0 Dedicated Load Balancer that is configured with an AWS (not CloudHub 1.0) Direct Connect tunnel to the on-premises network.
- ( ) C Deploy to a customer-hosted runtime plane.
  Configure the network with an Anypoint VPC that is configured with VPC peering to each external SaaS network.
- ( ) D Deploy to a customer-hosted runtime plane.
  Configure the organization's firewall to allow connections to the external SaaS systems.

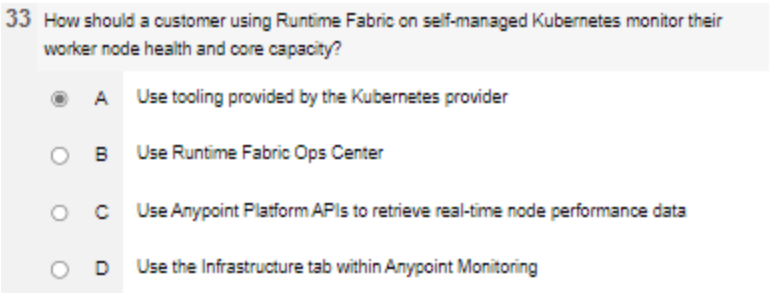
Which statement is true about automating interactions with Anypoint Platform using tools like Anypoint Platform REST APIs, Anypoint CLI, the Mule Maven plugin, and API policies?



- ( ) A Access to Anypoint Platform APIs and Anypoint CLI can be controlled separately through the roles and permissions in Anypoint Platform so that specific users can get access to Anypoint CLI while others get access to the Anypoint Platform APIs
- ( ) B Anypoint Platform APIs can only automate interactions with CloudHub, while the Mule Maven plugin is required for deployment to customer-hosted Mule runtimes
- ( ) C API policies can be applied to the Anypoint Platform APIs so that only certain lines of business have access to specific functions
- (●) D By default, the Anypoint CLI and Mule Maven plugin are not included in the Mule runtime, so they are not available to be used by deployed Mule applications





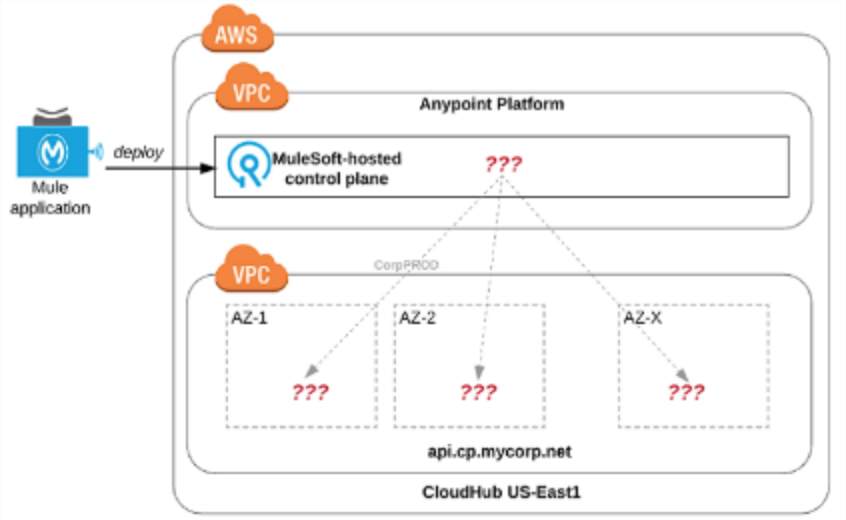


Deploying API implementations to CloudHub

1 Refer to the exhibit.

An organization uses one specific CloudHub (AWS) Region for all CloudHub deployments.

How are CloudHub workers/replicas assigned to Availability Zones (AZs) when the organization's Mule applications are deployed to CloudHub in that region?



- ○ A CloudHub workers/replicas belonging to a given environment are assigned to the same AZ within that region
- ○ B An AZ is randomly selected for a Mule application, and all the Mule application's CloudHub workers/replicas are assigned to that one AZ
- ○ C Available AZs are selected as part of the Mule application's deployment configuration and then the Mule application is deployed to CloudHub workers/replicas in those selected AZs
- ◉ D CloudHub workers/replicas are randomly distributed across available AZs within that region

1 A healthcare customer has to set up a VPC and is anticipating close to 120 APIs.

What could the customer's minimum CIDR block look like to accommodate three non-production environments (Dev, QA, UAT)?

- ○ A 169.254.0.0/28
- ○ B 169.254.0.0/16
- ◉ C 169.254.0.0/22
- ○ D 169.254.0.0/18

3 An application is running on two CloudHub workers/replicas using 0.1 vCores each. Often the application crashes, and it is determined that the cause is an "out of disk space" error. The disk space required by the application briefly exceeds 10GB for legitimate reasons.

Which action should the team take to remediate the problem?

- ○ A Deploy the application to Anypoint Runtime Fabric
- ◉ B Increase the worker/replica size to 1.0 vCores
- ○ C Increase the CloudHub local attached disk size to 10GB
- ○ D Increase the number of workers/replicas to three

3 What determines the uniqueness of the fully qualified domain name (FQDN), also known as a DNS entry, created when a Mule application is deployed to the CloudHub 1.0 Shared Worker Cloud?

- ○ A The application name and the Anypoint Platform master organization
- ○ B The application name only, but it can be modified by an Administrator after deployment
- ◉ C The application name and the region where the application is deployed
- ○ D The application name, irrespective of the region, environment, and VPC design

35 A client uses CloudHub 1.0 in the U.S. East region and wants disaster recovery in the U.S. West region using the backup and restore option (Recovery Point Objective in hours, Recovery Time Objective in 24 hours or less). There are several applications (apps)/APIs deployed in the Production environment that connect to the client's private cloud through transit gateway and similarly to on-premises through VPN.

The client's private cloud uses Direct Connect by following AWS resiliency recommendations to communicate with U.S. East and West on-premises. The client's AWS private cloud team has already completed disaster recovery script and standalone testing.

What will address disaster recovery for the client?

- A All the apps and APIs deployed in Prod are in high-availability mode, and it is MuleSoft's (the vendor's) responsibility to do disaster recovery.
  Complete the request form to set up disaster recovery testing.
  After completion of testing, notify the vendor of completion.
- B Request client to procure additional MuleSoft licenses for VPC and VPN to start the U.S. West CloudHub 1.0 instances.
  Establish respective VPN and transit gateway connections between the client's on-premises and private cloud.
  Deploy all applications along with identified minor changes.
  After testing, delete the apps but do not delete the VPN and transit gateway connectivity.
- C Change on-premises traffic routing from CloudHub 1.0 through the client's private cloud to Direct Connect for U.S. East.
  For disaster recovery, establish a respective transit gateway connection in U.S. West between CloudHub 1.0 and the client's private cloud.
  Deploy all applications along with identified minor changes in U.S. West CloudHub 1.0.
  After completion of testing, delete the setup on U.S. West CloudHub 1.0 instance.
- D Request client to procure additional MuleSoft licenses for VPC, VPN, vCores, and so on to start the U.S. West CloudHub 1.0 instances.
  Establish respective VPN and transit gateway connections between the client's on-premises and private cloud.
  Deploy all applications along with identified minor changes.
  After completion of testing, shut down the applications.

1 An Order Mule application is deployed to a CloudHub 1.0 environment that is bound to a CloudHub 1.0 virtual private cloud (VPC). No dedicated load balancers are configured.

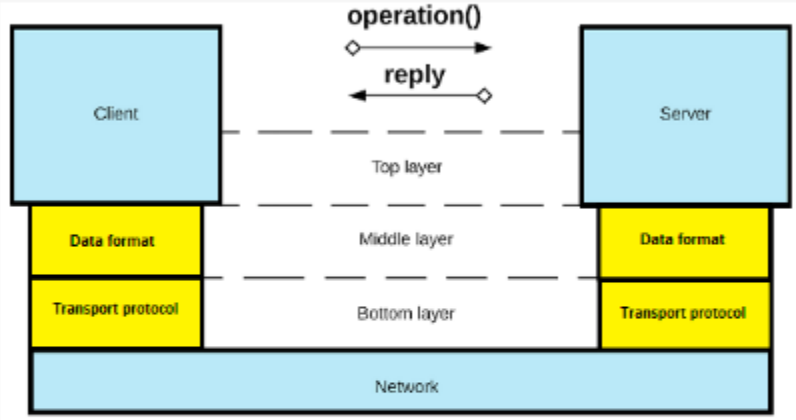
Which networking features can be configured for the deployment of the Mule application to this CloudHub 1.0 environment?

- A Two-way mutual authentication between the CloudHub 1.0 shared load balancer and the Order Mule application
- B HTTPS connections to the Order Mule application using custom vanity domains
- C Static IP addresses for the CloudHub 1.0 workers/replicas running the Order Mule application
- D Mapping rules to map external URLs to endpoints of the Order Mule application

Explaining application network basics

1 Refer to the exhibit.

What combination of data format and transport protocol can be used for an API in the context of API-led connectivity and application networks?



- A REST over JMS
- B XML over UDP
- C JSON over HTTP
- D SOAP over HTTP

Clear Answer

3 A MuleSoft architect has defined requirements for a project.

Which three tools can convert the project requirements into capabilities to design, validate, and publish APIs? (Choose three.)

- [x] A Mocking service
- [x] B Design Center
- [x] C Exchange
- [ ] D Anypoint Monitoring
- [ ] E Runtime Manager
- [ ] F API libraries

1 A customer wants to implement an API endpoint in the Mule application to receive API client requests in the Mule application so that API policies defined in API Manager are properly applied and enforced, and the API endpoint must return a response to API clients.

Which type of data format(s) and/or transport protocol should be used?

- A JSON or XML formatted data received over TCP or UDP connections.
  A response to each API client request is not required.
- B Any formatted data received over JMS, REST, and websockets connections.
  A response to each API client request is required when present.
- C (selected) Any data format received over HTTP/1.x.
  A response to each API client request is required.
- D SOAP formatted data received over SMTP connections.
  A response to each API client request is not supported.

2 A retail company wants to expose its API to external customers. The customers will consume the API data either from their mobile devices or from their desktops/laptops devices. The data needs to be customized for the different device consumers.

In which API-led Connectivity Layer should these API(s) be placed?

- A Composition
- B System
- C (selected) Experience
- D Process

Meeting API quality goals

1 Which scenario benefits from horizontal scaling?

- A An API that performs heavy data transformation
- B An API that receives infrequent but large JSON payload
- C API implementations that are stateful in nature
- D (selected) An API proxy that receives frequent but small payloads

27 A Mule application is deployed to a single CloudHub worker/replica. The Mule application acts as an API client to several API implementations, and each API requires a short-lived access token from the Mule application in each API invocation.

A storage mechanism is required to store these frequently changing, short-lived access tokens for use by the Mule application. The same access token must be read in subsequent invocations of the Mule application's flows until the token expires and is replaced.

Which out-of-the-box Anypoint Connector and Anypoint Platform Runtime Manager deployment option can store these access tokens?

- ○ A Use an Object Store Connector in the Mule application and deploy the Mule application configured with persistence gateway
- ◉ B Use an Object Store Connector in the Mule application and deploy the Mule application configured with non-persistent Object Store
- ○ C Use a VM Connector in the Mule application and deploy the Mule application configured with persistent queues
- ○ D Use a VM Connector in the Mule application and deploy the Mule application configured with non-persistent queues

1 An API implementation is being designed that must invoke an Order API. The Order API is known to repeatedly experience downtime. For this reason, a fallback API is to be called when the Order API is unavailable.

Which approach to designing the invocation of the fallback API provides the best resilience?

- ○ A Redirect client requests through an HTTP 307 Temporary Redirect status code to the fallback API whenever the Order API is unavailable
- ○ B Set an option in the HTTP Requester component that invokes the Order API to invoke a fallback API whenever an HTTP 4xx or 5xx response status code is returned from the Order API
- ◉ C Search Anypoint Exchange for a suitable existing fallback API, and then implement invocations to this fallback API whenever the Order API is unavailable
- ○ D Create a separate entry for the Order API in API Manager, and then invoke this API as a fallback API if the primary Order API is unavailable

11 An organization is deploying a new implementation of the OrderStatus System API to multiple workers/replicas in CloudHub. This API fronts the organization's on-premises Order Management System, which is securely accessed from the OrderStatus System API. The API is built with a circuit breaker retry capability.

Which type of error will result in a need to manually restart the OrderStatus System API?

- ◉ A The AWS region goes offline with a major network failure to the relevant AWS data centers
- ○ B API Manager has an extended outage during the initial deployment of the API implementation
- ○ C The Order Management System is inaccessible for eight hours due to a network outage in the organization's on-premises data center
- ○ D A CloudHub worker/replica fails with an Out of Memory exception

3 Which two scenarios are suitable for a Cache scope? (Choose two.)

- [ ] A To store custom data
- [x] B To reduce the processing load on the API instance
- [ ] C To store streaming payload
- [ ] D To store watermarks
- [x] E To store the data returned from the outbound connector that does not change frequently

3 An eCommerce company notices a substantial increase of request calls to the Order API since a new product has been added to their catalog. The clients are now often experiencing a performance decrease and timeout errors; therefore, they are not able to complete the orders. This issue results in a loss of money for the company.

Given the application is deployed to CloudHub, what is the simplest solution to resolve the issue?

- ( ) A Apply vertical scaling
- ( ) B Revisit and change the implementation of the Order API, adding a cache scope
- ( ) C Revisit and change the implementation of the Order API, adding an Anypoint MQ
- (•) D Apply horizontal scaling

MCPA Practise Test 2

23 A set of tests must be performed prior to deploying API implementations to a staging environment. Due to data security and access restrictions, untested APIs cannot be granted access to the backend systems, so instead mocked data must be used for these tests. The amount of available mocked data and its contents is sufficient to entirely test the API implementations with no active connections to the backend systems.

What type of tests should be used to incorporate this mocked data?

- ( ) A Performance tests
- ( ) B Integration tests
- ( ) C Functional tests (black box)
- (•) D Unit tests (white box)

21 A system API is deployed to a primary environment as well as to a disaster recovery (DR) environment, with different DNS names in each environment. A process API is a client to the system API and is being rate limited by the system API, with different limits in each of the environments. The system API's DR environment provides only 20% of the rate limiting offered by the primary environment.

What is the best API fault-tolerant invocation strategy to reduce overall errors in the process API, given these conditions and constraints?

- A Invoke the system API deployed to the primary environment; add timeout and retry logic to the process API to avoid intermittent failures; if it still fails, invoke a copy of the process API deployed to the DR environment
- B In parallel, invoke the system API deployed to the primary environment and the system API deployed to the DR environment; add timeout and retry logic to the process API to avoid intermittent failures; add logic to the process API to combine the results
- C Invoke the system API deployed to the primary environment; add timeout and retry logic to the process API to avoid intermittent failures; if it still fails, invoke the system API deployed to the DR environment
- D Invoke the system API deployed to the primary environment; add retry logic to the process API to handle intermittent failures by invoking the system API deployed to the DR environment

20 A company requires Mule applications deployed to CloudHub to be isolated between non-production and production environments. This is so Mule applications deployed to non-production environments can only access backend systems running in their customer-hosted non-production environment, and so Mule applications deployed to production environments can only access backend systems running in their customer-hosted production environment.

How does MuleSoft recommend modifying Mule applications, configuring environments, or changing infrastructure to support this type of per-environment isolation between Mule applications and backend systems?

- A Modify properties of Mule applications deployed to the production Anypoint Platform environments to prevent access from non-production Mule applications
- B Create separate Anypoint VPCs for non-production and production environments, then configure connections to the backend systems in the corresponding customer-hosted environments
- C Configure firewall rules in the infrastructure inside each customer-hosted environment so that only IP addresses from the corresponding Anypoint Platform environments are allowed to communicate with corresponding backend systems
- D Create non-production and production environments in different Anypoint Platform business groups

19 A company uses a hybrid Anypoint Platform deployment model that combines the EU control plane with customer-hosted Mule runtimes. After successfully testing a Mule API implementation in the Staging environment, the Mule API implementation is set with environment-specific properties and must be promoted to the Production environment.

What is a way that MuleSoft recommends to configure the Mule API implementation and automate its promotion to the Production environment?

- A Bundle properties files for each environment into the Mule API implementation's deployable archive, then promote the Mule API implementation to the Production environment using Anypoint CLI or the Anypoint Platform REST APIs
- B Modify the Mule API implementation's properties in the API Manager Properties tab, then promote the Mule API implementation to the Production environment using API Manager
- C Modify the Mule API implementation's properties in Anypoint Exchange, then promote the Mule API implementation to the Production environment using Runtime Manager
- D Use an API policy to change properties in the Mule API implementation deployed to the Staging environment and another API policy to deploy the Mule API implementation to the Production environment

17 A company has created a successful enterprise data model (EDM). The company is committed to building an application network by adopting modern APIs as a core enabler of the company's IT operating model.

At what API tiers (experience, process, system) should the company require reusing the EDM when designing modern API data models?

- A At the experience and process tiers
- B At the experience, process, and system tiers
- C At the process and system tiers
- D At the experience and system tiers

Points: 1 Time Taken: 0:24

14 An API implementation returns three X-RateLimit-* HTTP response headers to a requesting API client.

What type of information do these response headers indicate to the API client?

- A A correlation ID that should be sent in the next request
- B The remaining capacity allowed by the API implementation
- C The error codes that result from throttling
- D The HTTP response size

Points: 1 Time Taken: 0:21

13 Due to a limitation in the backend system, a system API can only handle up to 500 requests per second.

What is the best type of API policy to apply to the system API to avoid overloading the backend system?

- A Spike control
- B Rate limiting
- C Rate limiting - SLA based
- D HTTP caching

Points: 1 Time Taken: 2:53

12 An organization wants to make sure only known partners can invoke the organization's APIs. To achieve this security goal, the organization wants to enforce a Client ID Enforcement policy in API Manager so that only registered partner applications can invoke the organization's APIs.

In what type of API implementation does MuleSoft recommend adding an API proxy to enforce the Client ID Enforcement policy, rather than embedding the policy directly in the application's JVM?

- A A Mule 3 application using APIkit
- B A Mule 4 application with an API specification
- C A Mule 3 or Mule 4 application modified with custom Java code
- D A non-Mule application

Points: 1 Time Taken: 0:51

10 A company wants to move its Mule API implementations into production as quickly as possible. To protect access to all Mule application data and metadata, the company requires that all Mule applications be deployed to the company's customer-hosted infrastructure within the corporate firewall.

What combination of runtime plane and control plane options meets these project lifecycle goals?

- A iPaaS provisioned customer-hosted runtime plane and MuleSoft-hosted control plane
- B MuleSoft-hosted runtime plane and customer-hosted control plane
- C Manually provisioned customer-hosted runtime plane and customer-hosted control plane
- D Manually provisioned customer-hosted runtime plane and MuleSoft-hosted control plane

Points: 1 Time Taken: 0:50

9 A company wants to move its Mule API implementations into production as quickly as possible. The company's InfoSec group requires that all APIs be accessed using HTTPS and two-way authentication.

What combination of runtime plane and control plane options meets these project lifecycle goals?

- A Manually provisioned customer-hosted runtime plane and MuleSoft-hosted control plane
- B iPaaS provisioned customer-hosted runtime plane and MuleSoft-hosted control plane
- C Manually provisioned customer-hosted runtime plane and customer-hosted control plane
- D MuleSoft-hosted runtime plane and MuleSoft-hosted control plane

✔ Points: 1 Time Taken: 1:23

8 An organization wants MuleSoft-hosted runtime plane features (such as HTTP load balancing, zero downtime, and horizontal and vertical scaling) in its Azure environment.

What runtime plane minimizes the organization's effort to achieve these features?

- A CloudHub
- B A hybrid combination of customer-hosted and MuleSoft-hosted Mule runtimes
- C Anypoint Platform for Pivotal Cloud Foundry
- D Anypoint Runtime Fabric

✔ Points: 1 Time Taken: 2:35

7 An organization is starting an API-led connectivity journey and is deciding between deployment options. Currently, all their systems are customer-hosted on their premises. A CloudHub region is available close to their data center and their InfoSec team has approved the usage of an IPsec tunnel. The organization has agreed to use a cloud-first approach and in some Mule application deployments the Mule runtime must be fine-tuned for lower latency.

What is the best runtime plane option for the organization, given their current systems and requirements?

- A Anypoint Runtime Fabric
- B CloudHub workers in a CloudHub region nearest to their data center
- C Customer-hosted Mule runtimes
- D A hybrid combination of customer-hosted and MuleSoft-hosted Mule runtimes

✔ Points: 1 Time Taken: 0:59

6 What is the main change to the IT operating model that MuleSoft recommends to organizations to improve innovation and clock speed?

- A Create a lean and agile organization that makes many small decisions everyday; this speeds up decision making and enables each line of business to take ownership of its projects
- B Drive consumption as much as production of assets; this enables developers to discover and reuse assets from other projects and encourages standardization
- C Expose assets using a Master Data Management (MDM) system; this standardizes projects and enables developers to quickly discover and reuse assets from other projects
- D Implement SOA for reusable APIs to focus on production over consumption; this standardizes on XML and WSDL formats to speed up decision making

✔ Points: 1 Time Taken: 0:20

3 An API client calls one method from an existing API implementation. The API implementation is later updated.

What change to the API implementation would require the API client's invocation logic to also be updated?

- A When a new method is added to the resource used by the API client
- B When a new required field is added to the method called by the API client
- C When the data type of the response is changed for the method called by the API client
- D When a child method is added to the method called by the API client

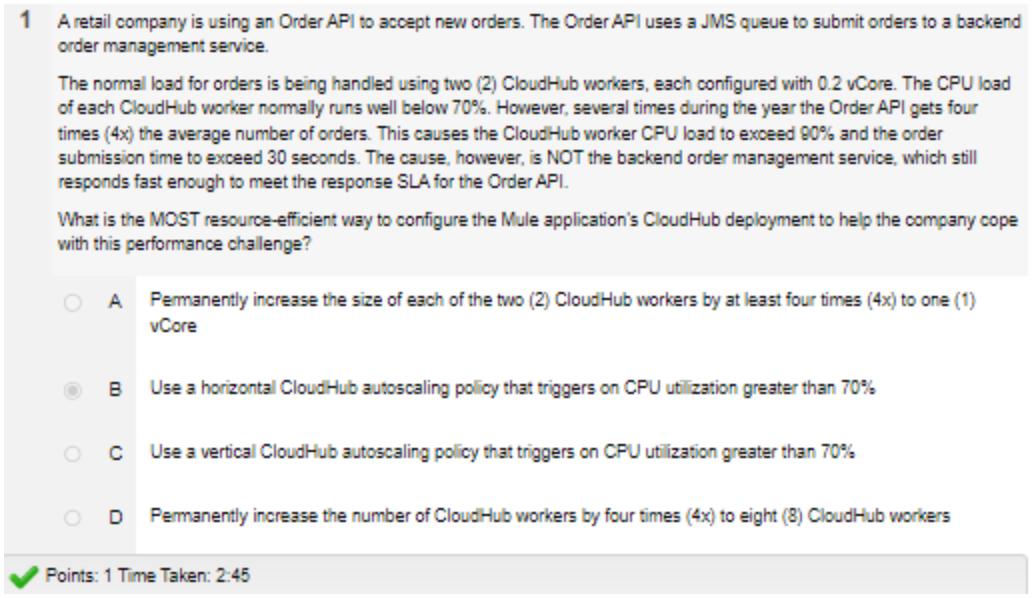
✔ Points: 1 Time Taken: 1:28

2 A company has started to create an application network and is now planning to implement a Center for Enablement (C4E) organizational model.

What key factor would lead the company to decide upon a federated rather than a centralized C4E?

- A When various teams responsible for creating APIs are new to integration and hence need extensive training
- B When the majority of the applications in the application network are cloud based
- C When development is already organized into several independent initiatives or groups
- D When there are a large number of existing common assets shared by development teams

✔ Points: 1 Time Taken: 1:42



Wrong

22) d

18) a

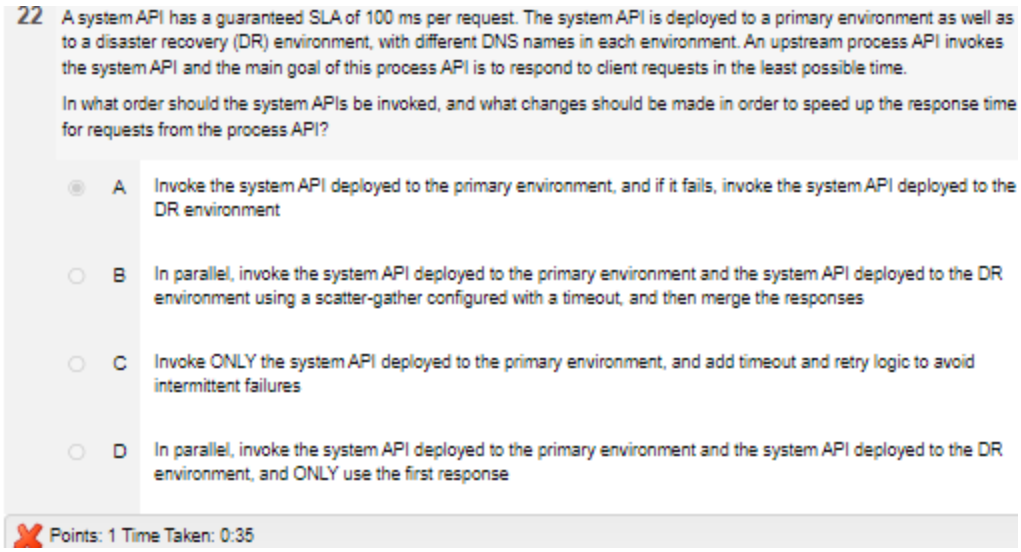
16) c

15) b

11) d

5)

4) a



18 A Mule application exposes an HTTPS endpoint and is deployed to three CloudHub workers that do not use static IP addresses. The Mule application expects a high volume of client requests in short time periods.

What is the most cost-effective infrastructure component that should be used to serve the high volume of client requests?

- A The CloudHub shared load balancer
- B Runtime Manager autoscaling
- C An API proxy
- D A customer-hosted load balancer

Points: 1 Time Taken: 1:19

16 An organization has created an API-led architecture that uses various API layers to integrate mobile clients with a backend system. The backend system consists of a number of specialized components and can be accessed via a REST API. The process and experience APIs share the same bounded-context model that is different from the backend data model.

What additional canonical models, bounded-context models, or anti-corruption layers are best added to this architecture to help process data consumed from the backend system?

- A Create a bounded-context model for every layer and overlap them when the boundary contexts overlap, letting API developers know about the differences between upstream and downstream data models
- B Create a canonical model that combines the backend and API-led models to simplify and unify data models, and minimize data transformations
- C Create a bounded-context model for the system layer to closely match the backend data model, and add an anti-corruption layer to let the different bounded contexts cooperate across the system and process layers
- D Create an anti-corruption layer for every API to perform transformation for every data model to match each other, and let data simply travel between APIs to avoid the complexity and overhead of building canonical models

Points: 1 Time Taken: 0:44

15 Traffic is routed through an API proxy to an API implementation. The API proxy is managed by API Manager and the API implementation is deployed to a CloudHub VPC using Runtime Manager. API policies have been applied to this API.

In this deployment scenario, at what point are the API policies enforced on incoming API client requests?

- A At both the API proxy and the API implementation
- B At the API proxy
- C At a MuleSoft-hosted load balancer
- D At the API implementation

Points: 1 Time Taken: 0:39

11 An Anypoint Platform organization has been configured with an external identity provider (IdP) for identity management and client management.

What credentials or token must be provided to Anypoint CLI to execute commands against the Anypoint Platform APIs?

- A The credentials provided by the IdP for client management
- B An OAuth 2.0 token generated using the credentials provided by the IdP for client management
- C An OAuth 2.0 token generated using the credentials provided by the IdP for identity management
- D The credentials provided by the IdP for identity management

Points: 1 Time Taken: 1:12

5 A retail company with thousands of stores has an API to receive data about purchases and insert it into a single database. Each individual store sends a batch of purchase data to the API about every 30 minutes.

The API implementation uses a database bulk insert command to submit all the purchase data to a database using a custom JDBC driver provided by a data analytics solution provider. The API implementation is deployed to a single CloudHub worker. The JDBC driver processes the data into a set of several temporary disk files on the CloudHub worker, and then the data is sent to an analytics engine using a proprietary protocol. This process usually takes less than a few minutes.

Sometimes a request fails. In this case, the logs show a message from the JDBC driver indicating an out-of-file-space message. When the request is resubmitted, it is successful.

What is the best way to try to resolve this throughput issue?

- A Increase the number of CloudHub workers
- B Increase the size of the CloudHub worker(s)
- C Use a CloudHub autoscaling policy to add CloudHub workers
- D Use a CloudHub autoscaling policy to increase the size of the CloudHub worker

4 Version 3.0.1 of a REST API implementation represents time values in PST time using ISO 8601 hh:mm:ss format. The API implementation needs to be changed to instead represent time values in CEST time using ISO 8601 hh:mm:ss format.

When following the semver.org semantic versioning specification, what version should be assigned to the updated API implementation?

- A 4.0.0
- B 3.1.0
- C 3.0.2
- D 3.0.1

Points: 1 Time Taken: 15:38