CC Week 4

QUESTION 1:

Which of the following statement(s) is/are FALSE for Microsoft Azure Resource Group?

(a) It is a logical container
(b) It manages Azure resources
(c) It deploys web apps, databases, and storage accounts
(d) It is a physical container

Correct Option: d

Detailed Solution: A resource group is a logical container into which Azure resources like web apps, databases, and storage accounts are deployed and managed. Hence, D is the only incorrect option.

Microsoft Azure Resource Group is a fundamental concept in Microsoft Azure, which is a cloud computing platform and service provided by Microsoft.

QUESTION 2:

Statement 1: Azure supports public cloud platforms.

Statement 2: Azure App Service plan defines security.

(a) Statement 1 is TRUE, Statement 2 is FALSE
(b) Statement 2 is TRUE, Statement 1 is FALSE
(c) Both statements are TRUE
(d) Both statements are FALSE

Correct Answer: a

Detailed Solution: Microsoft Azure is Microsoft's public cloud computing platform. Azure App Service Plan is the container for hosting Web Apps, API Apps, Mobile Apps and Function Apps.

QUESTION 3:

Google Cloud Datastore provides flexible object storage with global edge caching.

(a) TRUE
(b) FALSE

false

Google Cloud Datastore is a NoSQL document database designed for storing and querying structured data. It does not provide flexible object storage with global edge caching. Instead, it focuses on scalability and ease of application development for structured data.

QUESTION 4:

Google APIs help to:

a) scale up the app according to the demand/ service requests.
b) integrate Google's services into the application.
c) migrate the web app to Google Cloud Platform.
d) None of the above

Correct Option: b
Detailed Solution: Google APIs help to integrate Google's services into the application.

QUESTION 5:

Which of the following is/are storage service(s) provided by Google Cloud Platform(GCP)?

(a) Cloud SQL

(b) BigQuery

(c) Cloud Datastore

(d) Cloud Endpoints

Correct Answer: a, c
Detailed Solution: Cloud SQL and Cloud Datastore are the storage services mentioned here provided by GCP. Hence, A and C are correct..

- **Cloud SQL**: This is a managed relational database service offered by Google Cloud Platform. It allows you to create, manage, and scale MySQL, PostgreSQL, and SQL Server databases in the cloud.
- **Cloud Datastore**: This is a NoSQL document database provided by Google Cloud Platform.
- **BigQuery**: BigQuery is not a storage service, but rather a data analytics and querying service provided by Google Cloud Platform.
- **Cloud Endpoints**: Cloud Endpoints is an API management service provided by Google Cloud Platform. It allows you to develop, deploy, protect, and monitor APIs hosted on Google Cloud or on-premises environments.

QUESTION 6:
Match the following columns:

Column I	Column II
A. GoogleAppEngine B. GoogleCloudEndpoints C. GoogleAPI	1. Integrates Google's services into end users' application 2. Helps end users' application scalability 3. Helps to migrate web application to Google Cloud Platform

a) A-3, B-2, C-1
b) A-1, B-2, C-3
c) A-3, B-1, C-2
d) A-2, B-1, C-3

QUESTION 7:
In OpenStack, when a VM is terminated, which of the following memory resources are freed?

a. Ephemeral storage
b. Block Storage
c. Persistent Storage
d. RAM

Correct Answer: a, d
Detailed Solution: In OpenStack, ephemeral storage and RAM are freed when a VM is terminated.

OpenStack is an open-source cloud computing platform that enables organizations to build and manage public and private clouds.
Ephemeral Storage: Ephemeral storage in the context of OpenStack refers to the temporary storage associated with a virtual machine (VM).
Persistent Storage: Persistent storage, on the other hand, refers to storage that retains data even after the associated VM is terminated.
Block Storage: Block storage is a type of persistent storage provided by OpenStack's Cinder service. It allows users to create and attach block storage volumes to their VMs.

In OpenStack, when a VM is terminated, both ephemeral storage and RAM are freed.

QUESTION 8:

Statement 1: When deploying the Azure app remotely, the login password of the Azure account needs to be entered when the system asks for password.

Statement 2: In Microsoft Azure, a deployment user is required for FTP and local Git deployment to a web app.

A. Statement 1 is True and Statement 2 is False
B. Statement 1 is False and Statement 2 is True
C. Both are True
D. Both are False

Correct Option: b

Detailed Answer: A deployment user is required for FTP and local Git deployment to a web app in Microsoft Azure. When deploying the Azure app remotely, the password created while configuring the deployment user should be used, not the password used to log in to the Azure portal. So the correct option is B.

QUESTION 9:

The Azure App pan has a scale count of ____ instances.

(a) 1 to 10
(b) 1 to 100
(c) 1 to 50
(d) 1 to 20

Correct Answer: d

The scale count of an Azure App Service Plan refers to the number of instances that can be allocated to host the applications within that plan. This means that an Azure App Service Plan can scale from a minimum of 1 instance up to a maximum of 20 instances.

QUESTION 10:

While developing a web-app using Google App Engine, the development server should not be kept running when changes are made to the source file.

a) TRUE
b) FALSE

Correct Option: b

Detailed Answer: The development server can be kept running while the application is being developed in Google App Engine. The development server watches for changes in the source files and reloads them if necessary. Hence, the statement is false.

QUESTION 1:

Azure app service plans define:

A. Instance size

B. Security

C. Region

D. Scale count

Correct Option: A, C, D

Detailed Answer: Azure app service plan defines instance size, region, scale count and SKU (Stock-Keeping Unit). So the correct answers are A, C and D.

QUESTION 2:

In Azure, app service supports local Git to deploy content to a web app.

A. TRUE

B. FALSE

Correct Option: A

Detailed Answer: The statement is true. In Azure, app service supports local Git to deploy content to a web app.

QUESTION 3:

Which of the following statement(s) is/are FALSE for Microsoft Azure Resource Group?

A. It is a logical container

B. It manages Azure resources

C. It is a physical container

D. It deploys web apps, databases, and storage accounts

Correct Option: C

Detailed Answer: A resource group is a logical container into which Azure resources like web apps, databases, and storage accounts are deployed and managed. Hence, C is the only incorrect answer.

QUESTION 4:

Identify the correct statement(s) on Google App Engine.

A. It is a part of Google Cloud Platform (GCP) “services” infrastructure

B. It is a Platform as a Service (PaaS) component of GCP

C. While using Google App Engine patching and maintenance would be checked continuously

D. It is a part of Google Cloud Platform (GCP) “compute” infrastructure

Correct Option: B, D

Detailed Answer: Google App Service is a part of GCP compute infrastructure. It is a Platform as a Service (PaaS) component of GCP. Using App Engine, we can just focus on our code and do not need to worry about patching or maintenance. So the correct options are B and D.

QUESTION 5:

Google Cloud Datastore provides flexible object storage with global edge caching.

A. TRUE

B. FALSE

Correct Option: B

Detailed Answer: Google Cloud Storage, not Datastore provides flexible object storage with global edge caching. So the statement is false.

QUESTION 9:

Identify the correct statement(s) on OpenStack storage concepts:

A. Ephemeral storage is managed by Nova

B. Block storage is accessible from within VM as a local file system

C. Both Block storage and Object storage persist until specifically deleted by the user.

D. Object storage is used to add additional persistent storage to VM and/or run operating system.

Correct Option: A, C

Detailed Answer: Ephemeral storage is managed by Nova. Block storage is accessible from within VM as a block device (e.g. /dev/vdc). Both Block storage and Object storage persist until specifically deleted by the user. Object storage is used to add store files, including VM images. Hence A and C are correct.

---

1) Which of the following OpenStack component is/are responsible for on demand scheduling of virtual machines?

(a) Cinder
(b) Nova
(c) Swift
(d) Glance

b) Nova

- Cinder (option a) is the block storage service, responsible for providing persistent block storage to VMs.
- Swift (option c) is the object storage service, designed for scalable and durable storage of large amounts of unstructured data.
- Glance (option d) is the image service, used for storing and managing virtual machine images.

2)

A. Cloud SQL	1. Maintains, manages, and administers relational databases on Google Cloud Platform
B. Nova, OpenStack	2. Google's fully managed, petabyte scale, low cost analytics data warehouse to find meaningful insights
C. BigQuery	3. Manages the lifecycles of instances including spawning, scheduling and decommissioning of virtual machines on demand
D. Swift, OpenStack	

Choose the correct option:

(a) A-3, B-1, C-2
(b) A-1, B-3, C-2
(c) A-2, B-3, C-1
(d) A-1, D-3, C-2

b

3) Statement 1: Azure supports hybrid cloud platform.
Statement 2: Azure App Service plan defines security.

(a) Statement 1 is True and Statement 2 is False
(b) Statement 1 is False and Statement 2 is True
(c) Both are True
(d) Both are False

d) both are false

4) Swift component of OpenStack is responsible for providing persistent block storage to running instances

(a) TRUE
(b) FALSE

no false. cinder does. swift is object storage service.

OpenStack:
NASC NGIC MP

- **N**: Nova (Compute)
- **A**: Keystone (Identity)
- **S**: Swift (Object Storage)
- **C**: Cinder (Block Storage)
- **N**: Neutron (Networking)
- **G**: Glance (Image Service)
- **I**: Ironic (Bare Metal Provisioning)
- **C**: Ceilometer (Telemetry)

- **M**: Manila (Shared File System)
- **P**: Placement (Resource Allocation)

5) Keystone provides identity and authentication for all OpenStack services.
(a) TRUE
(b) FALSE

true

6) In OpenStack, when a VM is terminated, which of the following resources are freed?

(a) Ephemeral and persistent storage, all IPs, RAM and vCPUs
(b) Ephemeral and persistent storage only
(c) Ephemeral storage, all IPs, RAM and vCPUs
(d) None

c

) Google Cloud End Points help to migrate the web app to Google Cloud Platform for better performance

(a) TRUE
(b) FALSE

false . google cloud end points is api management tool.

) What core function(s) do(es) Neutron perform?

(a) Networking
(b) Compute
(c) Storage
(d) None of the above

neutron = networking

Which three OpenStack components are required for Nova to function?

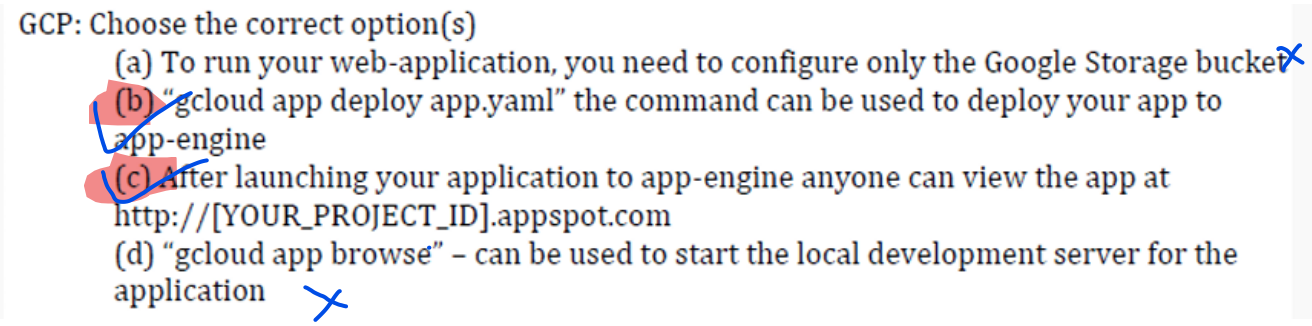
(a) Neutron, Horizon and Glance
(b) Glance, Keystone and Horizon
(c) Keystone, Glance and Neutron
(d) Cinder, Swift and Kolla

c

nova = compute so it requires keystone(identity), glance(image),neutron(networking)

Without Keystone, Nova wouldn't be able to authenticate users and authorize their

actions, such as launching and managing instances. Without Glance, Nova wouldn't be able to access the images required to provision virtual machines. Without Neutron, Nova wouldn't be able to properly configure networking for instances.



b, c