EXAM ASSOCIATE CLOUD ENGINEER TOPIC 1 QUESTION 54 DISCUSSION

Actual exam question from Google's Associate Cloud Engineer
Question #: 54
Topic #: 1
[All Associate Cloud Engineer Questions]

You are given a project with a single Virtual Private Cloud (VPC) and a single subnetwork in the us-central1 region. There is a Compute Engine instance hosting an application in this subnetwork. You need to deploy a new instance in the same project in the europe-west1 region. This new instance needs access to the application. You want to follow Google-recommended practices. What should you do?

A. 1. Create a subnetwork in the same VPC, in europe-west1. 2. Create the new instance in the new subnetwork and use the first instance's private address as the endpoint.

B. 1. Create a VPC and a subnetwork in europe-west1. 2. Expose the application with an internal load balancer. 3. Create the new instance in the new subnetwork and use the load balancer's address as the endpoint.

C. 1. Create a subnetwork in the same VPC, in europe-west1. 2. Use Cloud VPN to connect the two subnetworks. 3. Create the new instance in the new subnetwork and use the first instance's private address as the endpoint.

D. 1. Create a VPC and a subnetwork in europe-west1. 2. Peer the 2 VPCs. 3. Create the new instance in the new subnetwork and use the first instance's private address as the endpoint.

Show Suggested Answer

by Agents89 at *April 17, 2020, 6:47 p.m.*

Comments

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LaxmanTiwari Highly Voted 2 years, 4 months ago

Selected Answer: A

JUST PASS THE EXAM THIS MORING , THIS ONE IS THERE AND I CHOOSE A

upvoted 43 times

Agents89 Highly Voted 4 years, 6 months ago

A is correct

upvoted 40 times

Raghav2001 Most Recent 9 months ago

I read that we cannot span VPC in more than one region so how can we use same VPC subnet in different region?
So how can answer be A?

upvoted 1 times

bubidubi 8 months, 2 weeks ago

Networks (VPCs) with Google are multi-regional by default, so you can have resources anywhere in the world under one VPC and multiple subnets. (probably not the best explanation, but it's true in the end)

upvoted 2 times

Backlander 1 year, 4 months ago

A-team FTW!

upvoted 1 times

miroslav_radulovic 1 year, 6 months ago

B. 1. Create a VPC and a subnetwork in europe-west1. 2. Expose the application with an internal load balancer. 3. Create the new instance in the new subnetwork and use the load balancer's address as the endpoint.

This option follows Google-recommended practices by creating a new VPC and subnetwork in the region where the new instance will be deployed. The application is exposed using an internal load balancer, which allows the new instance to access the application using the load balancer's private IP address as the endpoint. This approach provides a secure and scalable way to connect instances across regions. Option A is incorrect because it creates a new subnetwork in the same VPC, which may cause issues with network latency and scalability. Option C is incorrect because it uses Cloud VPN, which is typically used for connecting on-premises networks to GCP, and may not be the most efficient option for connecting instances within GCP. Option D is incorrect because it peers two VPCs, which may not be the most efficient option for connecting instances within the same project.

this is what GPT said, does it make sense?

upvoted 3 times

romulo_rosa 1 year, 6 months ago

GPT also told me B is correct. If asked "in gcp, can instances in the same vpc but in different subnets communicate using internal ip in different regions?" chatGPT answers "Yes, instances in the same VPC but in different subnets can communicate using internal IP even if they are in different regions. As long as the VPC network is set up properly, the instances can communicate with each other using their internal IP addresses, regardless of the region. However, it's important to note that traffic between regions will incur additional network egress charges, so it's important to consider the cost implications when designing your network architecture."
So I think the correct answer would still be A.

upvoted 1 times

arnika98 1 year, 5 months ago

If you trust ChatGPT damn sure you are gonna fail the exam.

upvoted 8 times

bubidubi 8 months, 2 weeks ago

VPCs are multi-regional by default, so you can create another subnetwork (which is regional) in another region and that's it. B would require use of an LB which is not required for this simple thing.

upvoted 1 times

Buruguduystunstugudunstuy 1 year, 8 months ago

Selected Answer: A

ANSWER A is the correct answer because it follows Google's recommended practices of using a single VPC per project and creating a new subnetwork in the same VPC in the europe-west1 region. This allows the new instance to communicate with the existing instance using its private IP address as the endpoint.

upvoted 11 times

Buruguduystunstugudunstuy 1 year, 8 months ago

ANSWER B is incorrect because creating a new VPC and subnetwork in the europe-west1 region is not necessary and goes against Google's recommended practices of using a single VPC per project. Additionally, using an internal load balancer to expose the application is not necessary since the new instance will be in the same project and can communicate directly with the existing instance.

ANSWER C is also incorrect because Cloud VPN is used to establish a secure connection between a VPC and an external network, such as an on-premises data center or another cloud provider. It is not designed to enable communication between subnetworks in the same VPC, especially not across different regions.

ANSWER D is incorrect because VPC peering only works between VPCs in the same region, so it would not be possible to peer the existing VPC in us-central1 with a new VPC in europe-west1.

upvoted 6 times

Ary_Almeida_Junior 1 year, 9 months ago

Answer A is correct.

upvoted 1 times

cslince 1 year, 10 months ago

Selected Answer: A

A is correct

upvoted 1 times

leogor 1 year, 12 months ago

Selected Answer: A

A is correct

upvoted 1 times

gcpBeginner 2 years ago

if A is correct can someone explain what "use the first instance's private address as the endpoint" means? Does it mean to use IP from previous subnet? or does it mean use first IP from new subnet?

upvoted 2 times

Leutenant_Ololo 2 years ago

A is correct. VPC allows you to spawn multiple subnets in different zones. Routing is handled automatically (because Routers are created automatically).

"use the first instance's private address as the endpoint" means that this new instance will be accessing the app via first intance's private IP (so there should be some routing rules created). Question says: "This new instance needs access to the application." ..

upvoted 2 times

Cornholio_LMC 2 years ago

had this question today

upvoted 1 times

haroldbenites 2 years, 4 months ago

Go for A

upvoted 2 times

Bableves 2 years, 6 months ago

A cannot be good, I mean guys you are not good at networking, if you have two different subnets, you cannot use an IP from the other subnet, just randomly, you have to "give acess" which means you have to connect to the two subnets somehow, it would be better with rouing, but VPN does the job...
https://cloud.google.com/network-connectivity/docs/vpn/concepts/overview
Cloud VPN securely connects your peer network to your Virtual Private Cloud (VPC) network through an IPsec VPN connection. Traffic traveling between the two networks is encrypted by one VPN gateway and then decrypted by the other VPN gateway. This action protects your data as it travels over the internet. You can also connect two instances of Cloud VPN to each other.

upvoted 1 times

JelloMan 2 years, 6 months ago

In GCP, VPC's are global - and subnets across different regions can be accessed using private IP's (no VPN setup required).

upvoted 20 times

AzureDP900 2 years, 4 months ago

There is no need of setting VPN as you mentioned. AWS is different ..

upvoted 4 times

Leutenant_Ololo 2 years ago

I mean guys you are not good at networking <-- but we are glad you are profficient with it :-D

Routing between subnets in GCP is not the same as in "regular" networking.
https://cloud.google.com/vpc/docs/routes#subnet-routes : "When you add a subnet, Google Cloud creates a corresponding subnet route for the subnet's primary IP address range." RTFM..

upvoted 3 times

Vidyaji 2 years, 10 months ago

Selected Answer: A

A is perfect

upvoted 2 times

vishnukumartr 2 years, 11 months ago

A. 1. Create a subnetwork in the same VPC, in europe-west1. 2. Create the new instance in the new subnetwork and use the first instance's private address as the endpoint.

upvoted 2 times

Jaira1256 2 years, 11 months ago

Ans - A

upvoted 2 times

Deeska 3 years ago

Subnets are global. A is correct

upvoted 3 times

akshaychavan7 2 years, 5 months ago

subnets are regional!

upvoted 1 times

piyu1515 2 years, 5 months ago

VPC ARE GLOBA,SUBNETS ARE REGIONAL

upvoted 4 times

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