KONTÉNERIZÁCIÓ (KUBERNETES)

4. forduló

NOKIA

A kategória támogatója: Nokia

RENDELKEZÉSRE ÁLLÓ IDŐ:

10:00

Ismertető a feladathoz

Fontos információk

A forduló után a megoldások publikálásával együtt iránymutatásként elérhetőek lesznek a **helyezéssel kapcsolatos információk**, látni fogod, hogy a kategóriában a játékosok 20%, 40% vagy 60%-a közé tartozol-e épp.

Felhívjuk figyelmedet, hogy a következő, **5. fordulótól az egyes kategóriák csak a kijelölt napokon lesznek megoldhatóak 7-22 óra között**, érdemes letöltened a naptárat a Kategóriáim menüpontban.

4th round

In this round you can test you knowlege about pod placement in the Kubernetes domain.

Felhasznált idő: 02:06/10:00 **Elért pontszám:** 0/25

1. feladat 0/5 pont

True or false? All of the nodes in a Kubernetes cluster has to provide the same amount of resources.

Válasz

- ○ True, because divergence is not allowed in a cluster for resource efficiency consideration
- ○ False, it often makes sense to create a mix of different instance sizes in larger cluster

Magyarázat

Learn more about Pod placement in kubernetes here: https://kubernetes.io/docs/concepts/scheduling-eviction/assign-pod-node/

https://kubernetes.io/docs/concepts/scheduling-eviction/kube-scheduler/

2. feladat 0/5 pont

What is node affinity?

Válasz

- ○ Node affinity can absorb massive amounts of data every second, making it well suited for complex workloads.
- ○ Node affinity allow single sign-on with Identity and Node Access Management aimed at modern applications and services
- ◯ Node affinity is a set of rules used by the Kubernetes scheduler to determine where a pod can be scheduled
- ○ Node affinity deploys containerized applications to a Kubernetes cluster, troubleshoots containerized applications and manages the cluster resources.
- ○ A Node affinity is a worker machine in Kubernetes and may be either a virtual or a physical machine, depending on the cluster

Magyarázat

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3. feladat 0/5 pont

What is pod eviction?

Válasz

- ○ Node is unable to respond and Kubernetes kills the Pods and removes the entry from the apiserver.
- ◯ Eviction is the process of proactively terminating one or more Pods on Nodes that are low on free resources.
- ○ Evicted pods are intended to be used to specify attributes of objects that are meaningful and relevant to users.
- ○ Pod eviction allows Kubernetes to select resources based on the value of labels and resource fields assigned to a group of pods or nodes
- ○ Pod eviction are values set in kubernetes resources that are responsible for the permanent deletion of the pod instances through the API server.

Magyarázat

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4. feladat 0/5 pont

What is the preferred way in Kubernetes to refer to a group of resources when executing a command?

Válasz

- ○ Affinity rule
- ◯ Labels
- ○ Querying
- ○ Cluster IP
- ○ Namespace
- ○ Node IP
- ○ Annotations

Magyarázat

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5. feladat 0/5 pont

Is there any way to schedule pods on a tainted node?

Válasz

- ○ When a node is tainted pods don't get scheduled on it by default. It is not even possible to allow scheduling to such a node.
- ○ Pods are allowed to be scheduled on tainted nodes by default.
- ◯ Scheduling on tainted nodes can be allowed by applying tolerations to the pod in their spec.

- Modification of the node base OS is needed to avoid the taint flag.
- Tainted nodes are excluded from scheduling and removed from cluster for reinstallation.

Magyarázat

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