

Cairo University

Faculty of Computers and Information Final Term Exam



Department: Computer Science

Course Name: Selected Topic 1 (Cloud Computing)

Course Code: CS495

Instructor(s): Prof. Fatma Omara

Date: 4/1/2017

Duration: 2 hours

Total Marks: 60

Answer The Following Questions

Question 1: Define The Following

[10 marks]

- a) Scalability
- b) Jungle Computing
- c) Migration Services
- d) Emulation
- e) Virtualization

Question 2: What The Relationship Between The Following:

[20 marks]

- a) Location transparency and Availability
- b) Public Cloud and Private Cloud
- c) Migration and Green ICT
- d) Cloud, CapEx, and OpEx
- e) VM Migration and SLA

Question 3: What The Similarities and Differences Between The Following:

[25 marks]

- a) P2P Computing and Grid Computing
- b) Over provisioning and Under-Provisioning
- c) Regular Migration and Live Migration
- d) Full Virtualization, Para Virtualization, and OS-Level Virtualization
- e) Process Migration and VM Migration

Question 4: Lab.

[5 marks]

- Assume that a junior developer needs to execute a set of tasks, such as:
 - Monthly backup of data
 - Daily report generation to report any errors, transactions, etc...
 - Sending an email at the end of the day with some information to subscribers.
 - Clearing the log files at the end of every week
 - Remind yourself of a wonderful weekend coming up, every Friday at 5:00 PM

It is required to advise him with the GAE service that can help him to do these tasks?

- a) What is the PaaS platform that provides developers with 1Dyno for each deployed app/month?
- b) What is the build tool that is used to deploy applications on this platform?
- c) What is the repository that is integrated with this platform?

With My Best Wishes Prof. Fatma Omara