

# Question Paper

Exam Date & Time: 11-Jan-2023 (02:00 PM - 05:00 PM)



## MANIPAL ACADEMY OF HIGHER EDUCATION

Manipal School of Information Sciences (MSIS), Manipal  
First Semester Master of Engineering - ME (Cloud Computing) Degree Examination - January 2023

### Cloud Architecture and Management [CDC 5102]

Marks: 100

Duration: 180 mins.

Wednesday, January 11, 2023

Answer all the questions.

- 1) Outline the challenges involved in VMs communication on one and two physical hosts TLO 1.2 (10)
- 2) Write Categories of Cloud Computing? Advantages and Drawbacks of Hybrid cloud? TLO 1.2 (10)
- 3) What is EC2? List EC2 -The Basics? Write Different cloud computing layers? TLO 1.2 (10)
- 4) Write & Discuss what is, when to use "Private cloud" and "Hybrid cloud"? TLO 1.2 (10)
- 5) Illustrate & Explain 'Virtualization and Protection Rings or Ring levels' and OS Architecture with neat diagrams? TLO 2.1 (10)
- 6) Sketch and explain Taxonomy of Virtualization with neat diagram? TLO 2.1 (10)
- 7) Appraise and explain TLO 2.1 (10)
  - a) Virtual Machine Migration Services
  - b) Virtual Machine life cycle
- 8) Discriminate the terms with necessary diagrams a) Application Partitioning b) Logical Partitioning c) Fixed Server Partitioning d) Server Partitioning? TLO 2.2 (10)
- 9) Illustrate the different factors to consider for TCO in detail ( TLO: 3.1) (10)
- 10) Appraise the KPMG phased approach to building the business case for given scenario:As part of the daily business operations on its advertising platform, Twitter serves billions of ad engagement events, each of which potentially affects hundreds of downstream aggregate metrics. To enable its advertisers to measure user engagement and track ad campaign efficiency, Twitter offers a variety of analytics tools, APIs, and dashboards that can aggregate millions of metrics per second in near-real time. (TLO:3.2) (10)

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