

Modern Networking Questions With Answers

1) A Network that connects directly to the End User called as_____ .

- A) Distribution Network
- B) Access Network
- C) Core Network
- D) Wide Area Network

Ans: B) Access Network

2) Cloud Networking refers to the networks and _____ functionality.

- A) Network Management
- B) Cloud Management
- C) Cloud Storage Management
- D) Enterprise

Ans: A) Network Management

3) Three-Layer Model of of enterprise communications consists of_____.

- A) Application convergence
- B) Enterprise services
- C) Infrastructure
- D) All of the above

Ans: D) All of the above

4) A concept related to network convergence is_____.

- A) unified communications
- B) Network Communications
- C) Video conferencing
- D) Instant messaging

Ans: A) Unified communications

5) _____ refers to the delivery of information to and collection of information from enterprise personnel who are usually mobile, using an IP network infrastructure.

- A) IP enabling contact centers
- B) IP/wireless infrastructure

- C) IP/mobility
- D) Instant messaging

Ans: C) IP/mobility

6) Aspects of today's enterprise networks_____.

- A) Cloud-based storage
- B) Data warehouses
- C) Distributed data centers
- D) All of the above

Ans: D) All of the above

7) SDN is an approach to designing, building and operating large-scale networks based on programming the forwarding decisions in routers and switches via software from a _____.

- A) central server
- B) Distributed Server
- C) Cloud Server
- D) Virtual Server

Ans: A) Central Server

8) A protocol that distributes routing information to collaborating routers that connect autonomous systems is called as _____.

- A) Interior Router Protocol (IRP)
- B) Exterior Router Protocol (ERP)
- C) Open Shortest Path First (OSPF) Protocol
- D) First In First Out (FIFO) Protocol

Ans: B) Exterior Router Protocol (ERP)

9) if the internet does not manage the traffic efficiently_____ will occur.

- A) Congestion
- B) Perceptual
- C) Delay
- D) Error rate

Ans: A) Congestion

10) A cloud service provider maintains one or more local or regional_____.

- A) Network infrastructures
- B) Server infrastructures
- C) Virtualization
- D) cloud infrastructures

Ans: D) cloud infrastructures

11) The traditional internetworking approach is based on the _____

- A) TCP/IP protocol architecture
- B) Two-level end system addressing
- C) Routing based on destination
- D) Distributed, autonomous control

Ans: A) TCP/IP protocol architecture

12) The Open Data Center Alliance (ODCA) provides a useful, concise list of the principal requirements for a modern networking approach, which include_____

- A) Adaptability
- B) Scalability
- C) Performance
- D) Agility and flexibility

Ans: A) Adaptability

13) ETI stand for _____

- A) Environmental Technology Initiative
- B) Evolutionary Technologies International

- C) Elapsed Time Indicator
- D) European Telecommunications Standards Institute

Ans: D) European Telecommunications Standards Institute

- 14) _____ is an open source software project that aims to produce an open source cloud operating system.
- A) Open Development Initiatives
 - B) OpenDaylight
 - C) Open Platform
 - D) OpenStack

Ans: D) OpenStack

- 15) _____ Interacts with the SDN control layer to support programmability via resource control interfaces.
- A) Data Plane Functions
 - B) Control support function
 - C) Data forwarding function
 - D) Data Plane Protocols

Ans: B) Control support function

- 16) Data packet flows consist of streams of IP packets in _____.
- A) Data Plane Functions
 - B) Data forwarding function
 - C) Data Plane Protocols
 - D) Data Plane Functions

Ans: C) Data Plane Protocols

- 17) A Message Sent by the switch to the controller when a link or port change occurs is called _____

- A) Flow statistics
- B) Encapsulated packets
- C) Asynchronous
- D) Event-based messages

Ans : D) Event-based messages

18) _____ Supports programmability of resource-layer functions via the resource-control interface.

- A) Application support
- B) Orchestration
- C) Abstraction
- D) Control support

Ans: D) Control support

19) REST constraints are _____

- A) Client-Server
- B) Uniform Interface
- C) Layered System
- D) All of the above

Ans: D) All of the above

20) The _____ allows a control program to specify data plane forwarding behavior while hiding details of the underlying switching hardware.

- A) Distribution Abstraction
- B) Forwarding Abstraction
- C) Specification Abstraction
- D) Frenetic

Ans : B) Forwarding Abstraction

21) A relatively recent approach to virtualization is known as _____

- A) container virtualization
- B) Virtualization abstracts
- C) virtual processors
- D) virtual environments

Ans: A) container virtualization.

22) _____ involves deploying and managing the lifecycle of VNF instances.

- A) Service chaining
- B) Distributed architecture
- C) Management and orchestration (MANO)
- D) Virtualized network functions

Ans: C) Management and orchestration (MANO)

23) The capability to load and execute VNFs provided by different vendors on a variety of standardized hardware platforms is known as _____

- A) Performance
- B) Automation
- C) Network stability
- D) Portability/interoperability

Ans: D) Portability/interoperability

24) The main reference points include _____

- A) Vn-Nf
- B) Nf-Vn
- C) Or-fm
- D) Or-Vz

Ans: A) Vn-Nf

25) _____ is the execution environment presented to the hypervisor software by the server or storage device

- A) External storage with storage controller
- B) CPU/memory
- C) Internal storage
- D) Compute/storage execution environment

Ans: D) Compute/storage execution environment

26) The NFV orchestrator (NFVO) is responsible for resource orchestration and _____

- A) network service orchestration
- B) instance termination
- C) instance modification orchestration
- D) Cloud network service orchestration

Ans: A) network service orchestration

27) A VPN is a private network that is configured within a _____

- A) Cloud Network
- B) Local Network
- C) Wide Area Network
- D) Public Network

Ans: D) public network

28) FEC stands for _____

- A) Forward Error Correction
- B) Full Economic Costing
- C) forwarding equivalence class
- D) forwarding Error class

Ans: C) forwarding equivalence class

29) The architecture depicts NV as consisting _____

- A) Physical resources
- B) Virtual networks
- C) Virtual resources
- D) All of the above

Ans: D) All of the above

30) Virtualization of the infrastructure streamlines the operational processes and equipment used to manage the network is know as _____

- A) Operational cost savings
- B) Scalability
- C) Agility
- D) Capital cost savings

Ans: A) Operational cost savings

31) The Internet and other IP-based networks provided a _____

- A) quality of experience
- B) quality of service
- C) best effort delivery service
- D) Quality of Service

Ans: C) best effort delivery service

32) _____ controls the rate and volume of traffic entering and transiting the network on a per-flow basis

- A) Traffic policing
- B) Queuing and scheduling
- C) Queue management
- D) Traffic shaping

Ans: D) Traffic shaping

33) A service level agreement (SLA) typically represents the agreement between a customer and a provider of a service that specifies the level of _____

- A) availability, serviceability, performance, operation
- B) availability, scalability, performance
- C) maintainability, serviceability, performance, operation
- D) availability, maintainability, scalability, operation

Ans: A) availability, serviceability, performance, operation

34) ISA service for a flow of packets is defined on _____

- A) Three Level
- B) Four Level
- C) Two Level
- D) Five Level

Ans: C) Two Level

35) _____ is designed to allow various applications or organizations to share the network among applications with specific minimum throughput or latency requirements.

- A) Flow-based weighted fair queuing (WFQ)
- B) Class-based weighted fair queuing (CBWFQ)
- C) Priority queuing (PQ)
- D) Custom queuing (CQ)

Ans: D) Custom queuing (CQ)

36) RFC 3246 defines the _____ as a building block for low-loss, low-delay, and low-jitter end-to-end services through DiffServ domains.

- A) Expedited Forwarding PHB
- B) Default Forwarding PHB
- C) Assured Forwarding PHB
- D) Traffic Forwarding PH

Ans: A) Expedited Forwarding PHB

37) A value derived from a given sample metric by computing some statistic of the values defined by the singleton metric on the sample is known as _____

- A) Sample metric
- B) Singleton metric
- C) Statistical metric:
- D) Active metric

Ans: C) Statistical metric

38) Computational algorithms provide estimates of audio, video, and audiovisual quality as perceived by the user for _____

- A) Objective Assessment

- B) Subjective Assessment
- C) End-User Device Analytics
- D) Passive Assessment

Ans: A) Objective Assessment

39) Actionable QoE refers _____ enabling to concretely measure and utilize QoE metrics.

- A) all techniques and mechanisms
- B) Qualities
- C) scalability and mechanisms
- D) services

Ans: A) all techniques and mechanisms

40) _____ Provides measures about devices performance and resources state, such as memory, CPU, IO, load, and so on.

- A) Platform monitoring
- B) Network monitoring
- C) Service monitoring
- D) Infrastructure monitoring

Ans: D) Infrastructure monitoring

41) Services for managing the production and access to content for Web-based applications is _____

- A) Customer relationship management
- B) Document management
- C) IT services management
- D) Content management

Ans: D) Content management

42) The customer has access to the resources of the underlying cloud infrastructure I with _____

- A) Communications as a Service (CaaS)
- B) Infrastructure as a Service (IaaS)
- C) Platform as a Service (PaaS)
- D) Software as a Service (SaaS)

Ans: B) Infrastructure as a Service (IaaS)

43) X as a Service: Where X can represent any possible _____ option

- A) Network service option
- B) Software service option
- C) Cloud service option
- D) Infra service option

Ans: C) Cloud service option

44) A person or organization that maintains a business relationship with and uses services from cloud providers is called _____

- A) Cloud auditor
- B) Cloud broker
- C) Cloud carrier
- D) Cloud provider

Ans: D) Cloud provider

45) A _____ contains the electronics needed to transmit and receive data.

- A) Transistors
- B) Transceivers
- C) Pneumatic
- D) Hydraulic

Ans: B) Transceivers

46) Receives the REST request from the Application module, parses it, validates the request body and forwards the request to the CM module via its interface is know as _____

- A) Web Cache
- B) REST Request Handler
- C) Web Filter
- D) CM Module Interface

Ans: B) REST Request Handler

47) A range of compact, ruggedized Ethernet switches that handle security, voice, and video traffic across industrial networks is called _____

- A) Embedded networks
- B) Industrial wireless
- C) Industrial routing
- D) Industrial switching

Ans: A) Industrial switching

48) In which security portfolio includes firewall and intrusion prevention systems ?

- A) User-and group-based identity services
- B) Physical security
- C) Cloud-based threat protection
- D) Network and perimeter security

Ans: D) Network and perimeter security

49) For security management, security controllers need to provide a secure API for relevant applications is known as _____

- A) Software-Defined Security
- B) Network-Defined Security

- C) Antivirus/antiworm techniques
- D) Firewalls

Ans: A) Software-Defined Security

50) Threats faced by any virtualization implementation, such as failure to isolate guest users are_____

- A) Generic networking threats
- B) NFV-specific threats
- C) Generic virtualization threats
- D) Generic Software threats

Ans: C) Generic virtualization threats

Big Data Questions Bank with answers

1] Which one of the following option is not part of the characteristics of big data ?

- a) Variety b) veracity c) velocity d) vitality

Ans. = d) vitality

2] Which one of the following is not a component of BI ?

- a) OS b) data-warehouse c) HDFS d) dashboard

Ans. = c) HDFS

3] Select correct example of big data analytics in following option ?

- a) OLAP
b) Personalized marketing
c) ITS application
d) Hadoop

Ans. = b) personalized marketing

4] Which one of the following fact describe under ERP (Entity Relationship Programming)?

- a) Sensors b) weblogs c) payment details d) RFID

Ans. = c) payment details

5] Select right type of big data analytics.

- a) Diagnostic analytics b) time analytics c)
manual analytics d) traditional analytic

Ans. = a) Diagnostic analytics

6] Choose correct problem of Data-Warehousing.

- a) High productivity b) data homogenization
c) Time variant data d) non-volatile data

Ans. = b) Data Homogenization

Ans. = b) R coding

21] Requirements of a Distributed System are,.....

- a) Rescaling , parsing b) consistency , recoverability
- c) data mining , data clustering d) grouping , indexing

Ans. = b) consistency , recoverability

22] is the characteristic of Summarization.

- a) fault tolerance b) text mining c) seasonality d) Indexing

Ans. = d) Indexing

23] Is a data frame used to store item labels.

- A) itemInfo b) ItemData c) data d) transactionInfo

Ans. = a) itemInfo

24] An itemset containing k items is also called a

- a) K-set b) K-itemset c) K-item d) K-logic-item

Ans. = b) K-itemset

25] Fully distributed mode is also known as

- a) slave node b) master node c) multi-node cluster d) single-node clustering

Ans. = c) multi-node cluster

26] data processing is done via framework like

- a) R tool b) Unix c) spark d) linux

Ans. = c) spark

27] A serves as the master and there is only one NameNode per cluster.

- a) Data Node b) Name Node c) data Block d) Replication

Ans. = b) Name Node

28] HDFS works in a fashion.

a) master-worker b) master-slave c) worker/ slave d) all the above

Ans. = a) master-worker

29] Name Node is used when the primary Name Node goes down.

a) Rack b) Data c) secondary d) None

Ans. = c) secondary

30] technique allows streaming jobs to access reporter object.

a) ARIMA b) Map Reduce c) Aggregation d) None

Ans. = b) Map Reduce

31] The first step of the algorithm is to identify the frequent itemsets.

a) Apriori b) generic c) Aggregation d) None

Ans. = a) Apriori

32] Is a data frame with vectors of the same length as the no. of transactions.

a) ARIMA b) DATA c) transactionInfo d) Data Node

Ans. = c) transactionInfo

33] Is an analytical technique used to model the relationship between different input variables.

a) non-linear regression b) linear regression c) testing d) regression

Ans. = b) linear regression

34] regression can be applied to an outcome variable that represent multiple values.

a) technical b) linear c) non-linear d) logistic

Ans. = d) logistic

35] This technique is useful for uncovering patterns within a certain segment of customers.

a) decision tree b) predictive analytics c) descriptive analytics d) cyclic analytics

Ans. = c) descriptive analytics

36] tree can apply to output variables that are numeric or continuous.

a) regression b) classification c) decision d) none

Ans. = a) regression

37] is a probabilistic classification method.

a) classifier Bayes b) diagnostic Bayes c) naive Bayes d) none

Ans. = c) naive Bayes

38] is used for modeling stock market activity and price fluctuation.

a) ASTF b) CVTG c) DFRG d) GARCH

Ans. = d) GARCH

39] is used for analyzing real-time input about a system that can exist in certain states.

a) Kalman filtering b) VARIMA c) PARSING d) none

Ans. = a) Kalman filtering

40] Text analysis often deals with textual data that is more

a) accurate b) redundant c) complex d) simple

Ans. = c) complex

41] Can monitor the social media buzz using a simple process based on text analysis.

a) text mining b) NLP c) FFGTD d) ACME

Ans. = d) ACME

42] TFIDF stands for

- a) Text File Identification Format
- b) Text Format Inverse Data File
- c) Term Frequency Inverse Document Frequency
- d) none

Ans. = c) Term Frequency Inverse Document Frequency

43] acts as a cluster resource manager.

- a) YARN
- b) NRYA
- c) AIRMA
- d) NONE

Ans. = a) YARN

44] A Component also refers to a periodic fluctuation.

- a) Cyclic
- b) Logical
- c) non-cyclic
- d) none

Ans. = a) Cyclic

45] is a " data warehousing" framework built on top of Hadoop.

- a) spark
- b) hive
- c) Apache
- d) Apache Hive

Ans. = d) Apache Hive

46] And Adam Shook explore 23 design patterns for common MapReduce Jobs.

- a) Donald Miner
- b) Jeem Hook
- c) Jonson
- d) None

Ans. = a) Donald Miner

47] To configure short circuit local reads, you will need to enable on local hadoop.

- a) librayhadoop
- b) libhadoop
- c) libhad
- d) hadoop

Ans. = b) libhadoop

48] YARN stands for

- a) Yet Another Resource Negotiator
- b) Yet Anyone Resource Negotiator
- c) Yet Added Redundant Netfile
- d) None

Ans. a) Yet Another resource Negotiator

49] is responsible for allocating resource to respective Node-Manager.

a) Data-Node b) Name-Node c) Resource-Manager d) Resource-Node-Manager

Ans. = c) Resource-Manager

50] executes tasks on every Data-Node.

a) Node-Manager b) Name-Node c) Node-organizer d) None

Ans. = a) Node-Manager

Image Processing Questions and Answers

- 1) When x , y & the intensity values of f are all finite, discrete quantities, we call the image a _____.
- Digital Image
 - Binary Image
 - Gray-Scale Image
 - Color Image

Answer: a. Digital Image

- 2) _____ is the term used most widely to denote the elements of a digital image.
- Picture Elements
 - Image Elements
 - Pixels
 - Intensity

Answer: Pixels

- 3) _____, used for modelling and visualization, are generated by computer.
- Digital Image
 - Binary Image
 - Color Image
 - Synthetic Images

Answer: Synthetic Image

- 4) Images are produced from the emissions collected by _____ detectors.
- Gamma-Ray
 - Ultraviolet-Ray
 - Infrared-ray
 - X-rays

Answer: Gamma-Ray

- 5) Major modality of nuclear imaging called _____.
- Image Processing
 - Positron Emission Tomography
 - Digital Image Processing
 - Gamma-Ray Imaging

Answer: Positron Emission Tomography

- 6) Important use of X-rays in medical imaging is _____.
- Positron Emission Tomography
 - Digital Image Processing
 - Computerized Axial Tomography

d. Angiograms

Answer: Computerized Axial Tomography

- 7) Instead of a camera lens, radar uses an antenna & _____ to record its images.
- X-rays
 - Digital Computer Processing
 - Infrared Bands
 - Flash Camera

Answer: Digital Computer Processing

- 8) In medicine, radio waves are used in _____.
- Digital Image Processing
 - Positron Emission Tomography
 - Computerized Axial Tomography
 - Magnetic Resonance Imaging

Answer: Magnetic Resonance Imaging

- 9) Imaging using _____ finds application in geological exploration, industry & medicine.
- Sound
 - Images
 - Rays
 - Electron Microscopy

Answer: Sound

- 10) _____ is the process of manipulating an image so that the result is more suitable than the original for a specific application.
- Image Acquisition
 - Image Enhancement
 - Image Restoration
 - Wavelets

Answer: Image Enhancement

- 11) _____ is an area that also deals with improving the appearance of an image.
- Wavelets
 - Image Acquisition
 - Image Restoration
 - Color Image Processing

Answer: Image Restoration

12) The jpg file extension used in the _____ image compression standard.

- a. JPEG
- b. TIFF
- c. PNG
- d. GIF

Answer: JPEG

13) _____ partitions an image into its constituent parts or objects.

- a. Morphological Processing
- b. Compression
- c. Segmentation
- d. Feature Extraction

Answer: Segmentation

14) _____ assigns quantitative attributes to the detected features.

- a. Feature Extraction
- b. Wavelets
- c. Segmentation
- d. Feature Description

Answer: Feature Description

15) _____ is a must in image processing applications.

- a. Color compression
- b. Digital Storage
- c. Mass Storage
- d. Pixel

Answer: Mass Storage

16) A _____ of a continuous variable t , located at $t=0$, & denoted $d(t)$.

- a. Fourier Transform
- b. Unit Impulse
- c. Fourier Series
- d. Complex Plane

Answer: Unit Impulse

17) The Fourier transform contains complex terms, & it is customary for display purposes to work with the magnitude of the transform called as _____.

- a. Fourier Series
- b. Fourier Spectrum
- c. Sinc Function
- d. Frequency Domain

Answer: Fourier Spectrum

- 18) Function $H(m)$ is called a _____ because it passes frequencies in the low end of the frequency range, but it eliminates higher frequencies.
- Lowpass Filter
 - Nyquist Rate
 - Band-limited Function
 - Sampling

Answer: Lowpass Filter

- 19) In the field signal processing, _____ refers to sampling phenomena that cause different signals to become indistinguishable from one another after sampling.
- Sampling
 - Reconstruction Filters
 - Aliasing
 - Lowpass Filter

Answer: Aliasing

- 20) _____ is caused by under-sampling, & tends to be more visible in images with repetitive patterns.
- Spatial Aliasing
 - Temporal Aliasing
 - Sampling
 - Resampling

Answer: Spatial Aliasing

- 21) A vector space is a set of mathematical objects or entities, called _____.
- Scalars
 - Pixels
 - Image Transforms
 - Vectors

Answer: Vectors

- 22) The transformation matrix of the _____ is obtained by substituting the inverse transformation kernel.
- Discrete Cosine transform
 - Discrete sine transform
 - Discrete Hartley transform
 - Fourier Transform

Answer: Discrete Hartley Transform

23) Walsh Hadamard Transforms are no-sinusoidal transformations that decompose a function into a linear combination of rectangular basis functions, called _____, of value +1 & -1.

- a. Hadamard Ordering
- b. MATLAB
- c. Walsh Functions
- d. Aliasing

Answer: Walsh Functions

24) The number of sign changes along a row of a Hadamard matrix is known as the _____ of the row.

- a. Sequency
- b. Natural Ordering
- c. Hadamard Ordering
- d. Walsh Functions

Answer: Sequency

25) The _____ is based on Haar functions, $h_u(x)$, that are defined over the continuous, half-open interval.

- a. Fourier Transform
- b. Haar Transform
- c. Slant transform
- d. Hadamard Matrix

Answer: Haar Transform

26) _____ incorporates & unifies techniques from a variety of disciplines, including subband coding, quadrature mirror filtering & pyramidal image processing.

- a. Wavelet Transforms
- b. Wavelets
- c. Haar Transformation
- d. Multiresolution Theory

Answer: Multiresolution Theory

27) A _____ is used to create a series of approximations of a function or image.

- a. Wavelets
- b. Resampling
- c. Scaling function
- d. Fourier series

Answer: Scaling Function

- 28) The term _____ refers to the process of reducing the amount of data required to represent the given quantity of information.
- a. Image Compression
 - b. Data Compression
 - c. Watermarking
 - d. Image Processing

Answer: Data Compression

- 29) Each piece of information or event is assigned a sequence of code symbols, called _____.
- a. Coding Redundancy
 - b. Compression Ratio
 - c. Code Word
 - d. Redundant Data

- 30) A _____ is a device or program i.e. capable of both encoding & decoding.
- a. Codec
 - b. Encoder
 - c. Decoder
 - d. Inferior

Answer: Codec

- 31) In image processing, morphology is used 2 types of sets of pixels: _____ & _____.
- a. Objects & Pixels
 - b. Scalars & Vectors
 - c. Objects & Structuring Elements
 - d. Objects & Elements

Answer: c. Objects & Structuring Elements

- 32) Erosion & Dilation are _____ of each other with respect to set complementation & reflection.
- a. Duals
 - b. Equivalent
 - c. Opposite
 - d. Same

Answer: a. Duals

- 33) _____ Smooths the contour of an object, breaks narrow isthmuses, & eliminates thin protrusions.
- a. Closing
 - b. Erosion

- c. Rays
- d. Opening

Answer: d. Opening

- 34) The morphological _____ is a basic tool for shape detection.
- a. Fourier transform
 - b. Slant transform
 - c. Hit-or-Miss Transform
 - d. Haar Transform

Answer: c. Hit-or-Miss Transform

- 35) A _____ may be defined as a background region surrounded by a connected border of foreground pixels.
- a. Hole
 - b. Boundary Extraction
 - c. Sampling
 - d. Morphology

Answer: a. Hole

- 36) _____ is the morphological dual of thinning.
- a. Convergence
 - b. Convex Hull
 - c. Convex Deficiency
 - d. Thickening

Answer: d. Thickening

- 37) _____ Methods are an essential complement to thinning & skeletonizing algorithms.
- a. Skeleton
 - b. Pruning
 - c. Image Processing
 - d. Thickening

Answer: b. Pruning

- 38) Structuring elements in grayscale morphology belong to one of two categories: _____.
- a. Scalars & Vectors
 - b. Opening & Closing
 - c. Thinning & Thickening
 - d. Non-flat & Flat

Answer: d. Non-flat & Flat

- 39) _____ are pixels at which the intensity of an image changes abruptly.
- a. Edge Segments
 - b. Edge Pixels
 - c. Edge Objects
 - d. Point

Answer: b. Edge Pixels

- 40) _____ is an approach used frequently for segmenting images based on abrupt changes in intensity.
- a. Edge Models
 - b. Edge Pixels
 - c. Edge Detection
 - d. Line Detection

Answer: c. Edge Detection

- 41) _____ are used to represent a boundary by a connected sequence of straight-line segments of specified length & direction.
- a. Freeman Chain Codes
 - b. Chain Codes
 - c. Feature Extraction
 - d. Moore Boundary Tracing Algorithm

Answer: b. Chain Codes

- 42) The _____ of a 2-D curve is obtained by placing straight-line segments of equal length around the curve with the end points of the segments touching the curve.
- a. Slope Chain Codes.
 - b. Slant Transform
 - c. Chain Codes
 - d. Freeman Chain Codes

Answer: a. Slope Chain Codes

- 43) The _____ of a chain is obtained by starting at the origin & reversing the signs of the symbols.
- a. Digital Image
 - b. Freeman Chain Code
 - c. Mirror Image
 - d. MPP Algorithm

Answer: c. Mirror Image

- 44) The set of cells enclosing a digital boundary is called a _____.

- a. Cellular Complex
- b. Foundation
- c. Slope Chain Codes
- d. Digital Images

Answer: a. Cellular Complex

45) The _____ of a Freeman chain-coded boundary, based on the 4-D code, is defined as the first difference of smallest magnitude.

- a. Minor Axis
- b. Eccentricity
- c. Shape Numbers
- d. Digital Image

Answer: c. Shape Numbers

46) A boundary code formed as a sequence of directional numbers is referred to as a _____.

- a. Freeman Chain Code
- b. Chain Code
- c. Tracing
- d. Boundary Pre-processing

Answer: a. Freeman Chain Code

47) The _____ bounded by a simply connected cellular complex is not self-intersecting.

- a. MPP Algorithm
- b. Feature Extraction
- c. MPP
- d. Digital Boundary

Answer: MPP

48) The ration of the major to the minor axis is called the _____ of the boundary.

- a. Longest Perpendicular Chord
- b. Basic Rectangle
- c. Bounding Box
- d. Eccentricity

Answer: d. Eccentricity

49) _____ are the foundation for representing images in various degrees of resolution.

- a. Compression
- b. Wavelets
- c. Color Image Processing

d. Image Restoration

Answer: b. Wavelets

50) _____ deals with techniques for reducing the storage required to save an image or the bandwidth required to transmit it.

- a. Digital Image
- b. Segmentation
- c. Compression
- d. Feature Extraction

Answer: c. Compression

Microservice Architecture Questions With Answers

- 1) Microservices are ideal for _____
A) Small Systems

- B) Big Systems
- C) Micro Systems
- D) None Of the Above

Ans: B) Big Systems

- 2) Characteristics of Microservices are
- A) Small in size
 - B) Bounded by contexts
 - C) Decentralized
 - D) All of the above

Ans: D) All of the above

- 3) _____ n means that the bulk of the work done within your system will no longer be managed and controlled by a central body.
- A) Independently deployable
 - B) Autonomously developed
 - C) Bounded by contexts
 - D) Decentralization

Ans: D) Decentralization

- 4) _____ of services to teams reduces ramp-up time and encourages teams to build more complex products and features iteratively.
- A) Polyglotism
 - B) Independent deployability
 - C) Organizational alignment
 - D) Composability

Ans: C) Organizational alignment

- 5) _____ contributes to improved efficiency, and also reduces the need for scheduled downtime.
- A) Independent manageability
 - B) Replaceability
 - C) Stronger resilience
 - D) Better runtime scalability

Ans: A) Independent manageability

- 6) _____ reduces development time and provides a compound benefit through reusability over time.

- A) Agility
- B) Greater efficiency
- C) Comprehensibility
- D) Composability

Ans: D) Composability

- 7) "A complex system that works is invariably found to have evolved from a simple system that worked." This Law know as _____
- A) Gall's Law
 - B) Newman's Law
 - C) Cockcroft's Law
 - D) Vogels Law

Ans: A) Gall's Law

- 8) A synthesized view of business, technology, and organizational considerations is used to build _____
- A) Systematized System
 - B) Cohesive System
 - C) Modularized System
 - D) None of the above

Ans: B) Cohesive Sytem

- 9) A _____ architecture is distinct from the individual service design elements because it represents a macro view of our solution.
- A) Solution Architecture
 - B) Service Architecture
 - C) System Architecture
 - D) Layered Architecture

Ans: A) Solution Architecture

- 10) A Microservices Design Process include
- A) Standardizing process
 - B) The Holistic System
 - C) Embracing Change
 - D) None of the above

Ans: D) None of the above

11) DDD Approach stands for _____

- A) Diners, Drive-Ins, and Dives
- B) Data Display Debugger
- C) Domain Driven Design
- D) Data Driven Design

Ans: C) Domain Driven Design

12) The messages passed between components contain more than just data are _____

- A) Message-oriented
- B) Hypermedia-driven
- C) Communication-oriented
- D) Multimedia-oriented

Ans: B) Hypermedia-driven

13) CQS stands for _____

- A) command-query separation
- B) Consolidated Quotation System
- C) Command Quotation System
- D) Consolidated query separation

Ans: A) command-query separation

14) _____ is a design pattern that states that we can (and sometimes should) separate data-update versus data-querying capabilities into separate models

- A) Consolidated Quotation System
- B) Command query responsibility segregation
- C) command-query separation
- D) Customer Management

Ans: B) Command query responsibility segregation

15) _____ were designed for long-lived, distributed transactions.

- A) Sagas
- B) Distributed Transactions
- C) Microservices
- D) Embedding

Ans: A) Sagas

16) _____ is the container toolset most widely deployed in production.

- A) Docker
- B) Sagas
- C) Microservices
- D) Microprocessor

Ans: A) Docker

17) _____ is a lightweight, cross-platform runtime that provides many of the same features that the Common Language Runtime (CLR) provides on the Windows desktop or server

- A) CoreFX
- B) .NET Platform Standard
- C) ASP.NET Core
- D) CoreCLR

Ans: D) CoreCLR

18) Middleware components can be added to request processing using the methods

- A) Map
- B) Use
- C) Run
- D) All of the above

Ans: D) All of the above

19) Microservices is most closely related to what other established acronym?

- A) API
- B) AWS
- C) SOA
- D) Paas

Ans: C) SOA

20) Why would a microservices architecture be beneficial?

- A) A suite of services can be deployed and upgraded without a rebuild of other, functioning services.
- B) Less service interruption for fast-paced cloud computing.
- C) Different parts of a development team can manage individual parts of a microservice.

D) All of the above.

Ans: D) All of the above

21) Why would microservices not be beneficial?

- A) If your organization is starting with microservices, rather than a monolith.
- B) Your organization is not successfully strategizing for such compartmental design.
- C) Members of a development team aren't as knowledgeable.
- D) All of the above.

Ans: D) All of the above

22) Hence the name, microservices is meant for smaller businesses.

- A) True
- B) False

Ans: B) False

23) Microservices supports different kinds of databases and this is called _____.

- A) Service Deployment
- B) Polyglot persistence
- C) Event Driven Architecture
- D) Polyglot resistance

Ans: D) Polyglot resistance

24) Microservices based architecture prefers _____

- A) RDBMS DBs
- B) NoSQL DBs
- C) No dependency on any particular DB
- D) None of the above

Ans: C) No dependency on any particular DB

25) Microservices-based architecture enforces a Modular structure ?

- A) True
- B) False

Ans: A) True

26) features of the code enabled through TDD

- A) You cannot add members to nonexistent teams
- B) You can add a member to an existing team, verified by querying the team details
- C) You cannot remove members from a team to which they don't belong.
- D) All of the above

Ans: D) All of the above

27) A client makes a PUT or POST request to our service, the state is mutated in the_____

- A) Reality Is Event Sourced
- B) Event Sourcing Defined
- C) None of the above
- D) All of the above

Ans: B) Event Sourcing Defined

28) Performing calculations against the same set of events but in a different sequence will produce different output. For this reason use_____

- A) Ordered
- B) Idempotent
- C) Isolated
- D) Past tense

Ans: A) Ordered

29) If we want to detect team members within bulk range of each other, we need_____

- A) The Event Processor
- B) The reality service
- C) The location reporter service
- D) The proximity monitor

Ans: A) The Event Processor

30) _____ is merely a representation of the state you expect your consumers to need, a prebuilt set of data designed to support the query operations in a CQRS pattern.

- A) The Event Processor
- B) The reality Service

- C) The Location reporter service
- D) The proximity monitor

Ans: B) The reality Service

31) ASP.NET applications that are commonly referred to as _____ or areas in which conflict between developers and architects often arises.

- A) disputed areas
- B) .Net Areas
- C) Variables
- D) Constructor

Ans: A) disputed areas

32) Delegate the input to service classes that are written without regard for _____ transport or JSON parsing

- A) HTTP
- B) HTP
- C) HTML
- D) HHL

Ans: A) HTTP

33) Then start the inventory service using port _____

- A) 8001
- B) 8080
- C) 5001
- D) 46

Ans: C)5001

34) Configuration in a microservice ecosystem requires factors

- A) Securing read and write access to configuration values
- B) Ensuring that an audit trail of value changes is available
- C) Resilience and reliability of the source of configuration information
- D) All of the above

Ans: D) All of the above

35) SCCS stands for _____

- A) Spring Cloud Config Server

- B) Source Code Control System
- C) Symantec Control Compliance Suite
- D) None of the above

Ans: A) Spring Cloud Config Server

36) _____ are everywhere and are often as complex than customer-facing applications.

- A) Intranet applications
- B) Internet applications
- C) Service applications
- D) None of the above

Ans: A) Intranet applications

37) Creating an empty web application we use following command

- A) `$ dotnet new page`
- B) `$ dotnet new project`
- C) `$ dotnet new title`
- D) `$ dotnet new mvc`

Ans: D) `$ dotnet new mvc`

38) The WebSocket protocol showed up around 2008 and defines the means by which a persistent, bidirectional socket connection can be made between a browser and a server.

- A) True
- B) False

Ans: A) True

39) In the Deployment Models all of your servers are running on EC2 instances in AWS.

- A) True
- B) False

Ans: A) True

40) We can scale our operation independently, maintain unparalleled system availability, and introduce new services quickly without the need for _____

- A) Active reconfiguration
- B) massive reconfiguration.
- C) Passive reconfiguration
- D) None of the above

Ans: B) massive reconfiguration

41) _____ allows the software system to grow or shrink with the business.

- A) Stronger resilience
- B) runtime scalability
- C) Improved testability
- D) Greater efficiency

Ans: B) runtime scalability

42) Implementing well-designed microservices and APIs are essential to a microservice system is known as _____

- A) Service
- B) Solution
- C) Process
- D) Tools

Ans: A)Service

43) _____ can be disruptive to an organization but it is essential to growth and long-term success

- A) Communication
- B) Team alignment
- C) Fostering innovation
- D) All of the above

Ans: C) Fostering innovation

44) A big challenge in rapidly changing, distributed environments is getting a view of the running instances— seeing their failure/success rates, spotting bottlenecks in the system

- A) True
- B) False

Ans: A) True

