

# Power BI Interview Questions

**Instructions to solve the Questions:**

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favoured.**
  - 4. For mcq also, provide the reason for your answer with example to support it.**
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Q-1 What does DAX stands for?

- 1) Demand Analysis Expressions
- 2) Data and Expressions
- 3) Data Analysis Expressions
- 4) Datastructures & Algorithms Expressions

Q-2 Which of the following is not a DAX function?

- 1) Aggregation functions
- 2) Counting functions
- 3) Information functions
- 4) Window functions

Q-3 What does a Data-Source filter do?

- 1) Stops loading the data after a certain memory threshold
- 2) A parameter to filter data before loading into machines
- 3) Connects to the data source and refreshes the data within Power-Bi service, not affecting the local file
- 4) Connects to more databases/files

Q-4 Which of the following lets you receive value from user on live time?

- 1) Variables
- 2) Values
- 3) Parameters (inside power query>>manage parameters)
- 4) Return

Q-5 Which of the following does not use DAX?

- 1) Tableau
- 2) Power Pivot
- 3) Power BI

- 4) SSAS (SQL Server analysis Services)

Q-6 Which of the following will act as a ‘Filter’ in Visualizations?

- 1) Edit Interaction
- 2) Slicer
- 3) Bookmarks
- 4) Drill-Through

Q-7 What is X-velocity in Power Platforms?

- 1) Main Engine used in Power platforms
- 2) Main Database used in Power platforms
- 3) Main RAM of Power platforms

Q-8 Can we have Multiple Active Relationships in Power BI?

- 1) YES
- 2) NO

Q-9 What are Tiles?

- 1) A kind of a Visualization/Graphs
- 2) Grids in a Visualization/Graphs
- 3) Snap-shot of data pinned at Power BI Service
- 4) Actual Tiles (LOL)

Q-10 Which of the Following Language is used in Power Query Editor?

- 1) M-language
- 2) DAX
- 3) SQL
- 4) F# (read F sharp)

Q-11 Which of the following DAX functions can establish both one and bidirectional relationship between tables (like Many to Many)?

- 1) RELATEDTABLE
- 2) INTERSECT
- 3) RELATED
- 4) CROSSFILTER

Q-12 I want to choose a ‘filter’ to change all the graphs on a page. What should I choose ?

- 1) Report Level Filter
- 2) Page level Filter
- 3) Visual Level Filter
- 4) Slicer (Although it does the job, This is not a ‘filter’)

Q-13 For which task is PowerBi not recommended?

- 1) ETL (Extract,Transform,Load)
- 2) Data modelling and Relationships
- 3) Pulling Data/Web Scraping
- 4) Building Reports

Q-14 I want to see some top 10 kind of information/metric. What Visual do you use?

- 1) Pie Chart
- 2) Tree Map
- 3) Scatter Plot
- 4) Bar Chart

Q-15 What is a Z-Order in Power Bi?

- 1) To Calculate z-statistic/z-score of a data point to calculate it's probability of occurrence
- 2) To sort Text data(like names in Descending Order)
- 3) Design Strategy to arrange visual over shapes

Q-16 Which of the following is not an IF-ELSE function?

- 1) If function
- 2) What-If
- 3) Switch function

Q-17 The answer of FORMAT(26-06-2020, "mmmm y") is-

- 1) Jul 2020
- 2) July 20
- 3) July 190
- 4) None of the above

Q-18 The answer of FORMAT( 234248.67, "Scientific") is-

- 1) 234248670%
- 2) 2,342,486.70
- 3) 234248(10-02)
- 4) 2.34E+05

Q-19 You want to show overall performance of your Organization(Take for example you have total sales and total cost columns). Which Visual do you use?

- 1) KPI
- 2) Cards (Single/Multilevel)
- 3) Line chart

Q-20 What does Unpivoting option in Power Query do?

- 1) It takes the names from a column and makes a new column for each of name and the values of that column are an aggregation of another column (which we can choose).
- 2) It takes column names of several selected columns and transforms it into attribute -value pairs (2 columns), with attribute of that column being the column names and values being the aggregation.
- 3) Transposes the Data Table (Row <-> Columns)

Q-21 I have 2 columns Customer and Sales and want to calculate sum of sales for a customer named Amit. Which function do you use?

- 1) SUM
- 2) SUMMARIZE
- 3) SUMX

4) CALCULATE

Q-22 Which of these will not ignore logical values (like True(1), False(0)) in a column while calculating minimum?

- 1) MIN
- 2) MINA
- 3) MINX
- 4) MINL

Q-23 Which of these functions can calculate the maximum of 2 scalar expressions?

- 1) MAX
- 2) MAXA
- 3) MAXX
- 4) MAXIMUM

Q-24 I want to count the rows of a column after evaluating a expression which may contain Boolean (Booleans should be counted), Blanks . What do I use?

- 1) COUNT
- 2) COUNTX
- 3) COUNTAX
- 4) COUNTROWS

Q-25 Which of the following functions will work only on Azure SQL and DirectQuery Tables?

- 1) DISTINCTCOUNTNONBLANK
- 2) PRODUCTX
- 3) APPROXIMATEDDISTINCTCOUNT
- 4) NONE

Q-26 I want a table with one column of dates between StartDate and EndDate. What Function do I use?

- 1) CALENDARAUTO
- 2) CALENDAR
- 3) DATE
- 4) TIME

Q-27 Which of the following doesn't return in Datetime Format?

- 1) TODAY
- 2) NOW
- 3) DATE
- 4) YEAR

Q-28 Which of the following functions will ignore all filters BUT does not return a table? (including both inside query and outside query filters)?

- 1) ALL
- 2) ALLEXCEPT
- 3) ALLCROSSFILTERED
- 4) ALLSELECTED

Q-29 Which will retrieve a value for present table from another table irrespective of whether that table is related or not.

- 1) LOOKUPVALUE
- 2) SELECTEDVALUE
- 3) KEYWORDMATCH
- 4) HASONEVALUE

Q-30 Which database can PowerBi not connect to?

- 1) AZURE
- 2) SALESFORCE
- 3) HADOOP
- 4) GOOGLE ANALYTICS

Q-31 What Cloud Architecture is Power BI Service?

- 1) HAAS
- 2) PAAS
- 3) SAAS
- 4) IAAS

Q-32 Where are Time Series Chart Located?

- 1) Filter Pane (where all filters,slicers are located)
- 2) Field Pane (where all visuals are located)
- 3) Get more Visuals (Appsource)

Q-33 Which Visual would you use to show Outliers?

- 1) Clustered Column Bar Chart
- 2) Scatter Plot
- 3) Tree Map
- 4) Line Chart

Q-34 What is Data Granularity?

- 1) Diamond Schema design is granular data
- 2) Data Granularity is the Filter direction between two visuals
- 3) It is level of detail presented in the data
- 4) It is Many-To-Many relationships

Q-35 Define Cardinality?

- 1) Types of Relationships between tables (ex- 1 to 1, 1 to many,etc)
- 2) Number of Rows in data
- 3) Number of Columns in data
- 4) Direction of flow of data in a join between tables

Q-36 Which of the Following is best in terms of Space Complexity of Power BI?

- 1) Calculated column
- 2) Measure

3) Visual Table/Matrix

Q-37 Can DAX be used to modify the data in a table?

- 1) Yes
- 2) No (Dax Query can't replace a table value but creates a new table to store these values)

For the Next 3 Questions Consider a Left Table (1/first) and a Right Table(2/second)

Q-38 \_\_\_\_\_ gives all from second ,matching from first.

- 1) Right OuterJoin
- 2) Right Anti Join
- 3) Left OuterJoin
- 4) Left Anti Join

Q-39 \_\_\_\_\_ gives only matching in both.

- 1) Full Outerjoin
- 2) Inner
- 3) Right Outerjoin
- 4) Left Outerjoin

Q-40 \_\_\_\_\_ gives only from second (excluding the first).

- 1) Left anti join
- 2) Right Anti join
- 3) Left outerjoin
- 4) Right Outerjoin

Q-41 \_\_\_\_\_ is a join not available in Power Query, but available in SQL.

- 1) Full OuterJoin
- 2) Left Anti Join
- 3) Self-Join
- 4) Left OuterJoin

Q-42 You are creating a measure which utilizes the column from another table. But the problem is the relationship is Inactive. What do you do?

- 1) RELATEDTABLE FUNCTION
- 2) LOOKUPVALUE FUNCTION
- 3) USERELATIONSHIP FUNCTION
- 4) Change the Active relationship in the Modelling tab manually /OR delete one relationship.

Q-43 Calculate a Measure for the sales for previous month, which one can you NOT use -

- 1) CALCULATE AND PREVIOUSMONTH
- 2) CALCULATE AND DATEADD
- 3) CALCULATE AND PARALLELPERIOD

Q-44 What can be achieved by removing unnecessary rows and columns?

- 1) IT is not necessary to remove unnecessary rows. Infact it's good to keep all metadata intact
- 2) Deleting unnecessary rows can lead to damaging the structure of the data model

- 3) Deleting unnecessary rows and column not only reduces the data size and increases speed/performance of report but also it is a good practice to load only necessary data into your data model.

Q-45 Is it possible to create a relationship between two tables on two columns of different data types?

- 1) No, relationship is established on same data type columns only
- 2) Yes, if the direction of flow of data is set to Many-to-Many
- 3) Yes , but it is only available in paid versions of Power BI

Q-46 Which one leads to more Optimized performance?

- 1) Low Cardinality (means less distinct values in a column)
- 2) High Cardinality (means high unique values count)

Q-47 Which chart is useful to compare 2 values which are usually difficult to compare because of difference in scale?

- 1) BAR CHART
- 2) KPI VISUAL
- 3) COMBO CHART
- 4) GAUGE CHART

Q-48 \_\_\_\_\_ dax function is used in dynamic security.

- 1) USERRELATIONSHIP
- 2) USERPRINCIPALNAME
- 3) USERCULTURE

Q-49 You have 2 tables- A ‘USER’ table containing unique ID’s of Customers and ‘SALES’ table Consisting of their purchases, ID’s and unique id for each of their Purchases. What connection do you establish between the tables? (Direction is USER → SALES)

- 1) ONE TO ONE
- 2) ONE TO MANY
- 3) MANY TO ONE
- 4) MANY TO MANY

Q-50 Now you have the same USER table and a REGION table which has a column of 4 entries of region id from where the customers made orders. They(Tables) both have a common column RegionID. What connection do you establish now? (Direction is USER → REGION)

- 1) ONE TO ONE
- 2) ONE TO MANY
- 3) MANY TO ONE
- 4) MANY TO MANY

Q-51 DAX nested functions is equivalent to SQL what?

- 1) SQL CTE’s
- 2) SQL SUBQUERIES
- 3) SQL JOINS
- 4) SQL BUCKETIZATION

Q-52 What does CONTAINS(TABLE,[FIRST\_NAME],'AMIT',[LAST\_NAME],'BOSE') does?  
(FIRST\_NAME,LAST\_NAME are columns)

- 1) Returns Row index of Amit Bose in TABLE
- 2) Changes first\_name column to AMIT and last\_name column to 'BOSE'
- 3) Return True/False whether the columns contains the respective values
- 4) None of the above

Q-53 What is the difference between CONTAINSSTRING (1) AND CONTAINSSTRINGEXACT (2)?

- 1) 1 is not CASE-sensitive whereas 2 is.
- 2) 1 is not ACCENT-sensitive whereas 2 is
- 3) Both 1 & 2

Q-54 A filter in Visual is an \_\_\_\_\_ filter and filters present in slicers/filter pane is an \_\_\_\_\_ filter.

- 1) Inner and Outer
- 2) Outer and Inner
- 3) None of the above

Q-55 Consider a SALES table with Q1&Q2 columns (Quarterly sales), Country column, gender column, consider the 2 queries-

TS = SUMX(ALL(SALES),SALES[Q1]+SALES[Q2]) → 1

TS\_ = SUMX(ALLSELECTED(SALES),SALES[Q1]+SALES[Q2]) → 2

Now we build a visual (for ex-table/matrix) and put TS, TS\_ and Country column inside the visual. Then we take a Slicer and put Gender in it's field. Then,

- 1) TS&TS\_ will contain total sales of respective countries and will also show total sales on the basis of gender if slicer is used.
- 2) TS will contain total sales as a whole and will show same value for every country. But will categorise on the basis of slicer. TS\_ will also show same totalled sales for all country but will also be unaffected by slicer.
- 3) TS will contain total sales as a whole and will show same value for every country. It will also be unaffected by gender slicer. TS\_ will also show same totalled sales for all country but will be affected by slicer.
- 4) None

Q-56 Consider a table Series with columns –Viewers(m) and Series\_number –

```
Column =
var temp = Series[Viewers (m)]
RETURN
COUNTRWS(FILTER(ALL(Series),Series[Viewers (m)]>temp))+1
What is this Query doing?
```

- 1) Creating a column of number of viewers for each Series\_number
- 2) Creating a ranking of every Series\_number by Series[Viewers (m)]
- 3) Sorting the Series\_number column itself by Viewers(m)
- 4) None of the above

Q-57 How many VARIABLES OR 'var' can you declare in a dax query?

- 1) Less than 3
- 2) Less than 4
- 3) Unlimited

Q-58 VARIABLE OR 'VAR' in dax is a –

- 1) DAX FUNCTION
- 2) DAX KEYWORD
- 3) DAX DATA-TYPE

Q-59 Is it possible to convert Data-Type using DAX? If yes, then what function can we use to convert for example Text to Integer?

- 1) YES, INT FUNCTION
- 2) YES, CONVERT FUNCTION
- 3) NO not possible

Q-60 What keyword is mandatory in a DAX Query ? (Query here refers to kind of queries we have in SQL. In previous questions we assumed queries to be simple dax expressions)

- 1) DEFINE
- 2) EVALUATE
- 3) ORDER BY
- 4) START AT

Q-61 If an author hides pages at the Power BI desktop level, are they visible in the power Bi service also(to the author) ? Are they also not visible in the Power BI desktop level , right after we hide them?

- 1) YES AND NO
- 2) NO AND YES
- 3) NO AND NO
- 4) YES AND YES

Q-62 Which one is True-

- 1) We need to import Custom visuals every time in a new report.
- 2) We don't need to import them , they are already available under visualization pane
- 3) We need to import them just once, then they are available forever.

Q-63 Which one is the best defined workflow of Power BI?

- 1) Create report in Power BI Mobile → share in PBI Desktop → View/Interact in PBI Service
- 2) Create a report in PBI Service → share it in PBI Mobile → View/Interact in PBI Desktop
- 3) Create a report in PBI Mobile → share in PBI Desktop → View/Interact in PBI Service
- 4) Create a report in PBI Desktop → share in PBI Service → View/Interact in both PBI Service and PBI Mobile

Q-64 What is a collection of ready made visuals and pre-arranged in dashboards and reports is called?

- 1) An App
- 2) A canvas
- 3) A Tile
- 4) Scheduled Refresh

Q-65 Building blocks of Power Bi are-

- 1) Visuals, Dashboards, Reports, Tiles and datasets
- 2) Dashboard, Databases, Mobile Devices and Tiles
- 3) PowerQuery, Power Pivot and DAX
- 4) M language and DAX

Q-66 Which of the following filters are not available?

- 1) Tile level filter
- 2) Drillthrough
- 3) Report Level filter
- 4) Page Level Filter

Q-67 Is analyzing performance of each of your report elements possible in Power BI? Explain also?

- 1) YES, analyzing the metadata
- 2) YES, deleting unnecessary rows and columns in data, removing blanks and null/errors thus reducing the dataset size
- 3) YES, using the performance analyzer
- 4) NO, only way is to manually record Time taken to load and view reports

Q-68 How can we create a slide show like Power Point in Power Bi Report? (HINT: Use Bookmark)

- 1) No Bookmarks cannot be used as they are static
- 2) No Instead of a bookmark we can use a visual/custom visual
- 3) Yes We can use Buttons and set action to Bookmark
- 4) No We should use Power Point instead

Q-69 Output of ABS(-3.556) is-

- 1) -3.0
- 2) -4.0
- 3) -3.556
- 4) 3.556

Q-70 Output of CEILING(-10.3, -3) is-

- 1) -10
- 2) -9
- 3) -7
- 4) -13

Q-71 Which function does not give Variance?

- 1) VAR.P
- 2) VARX.P
- 3) VAR
- 4) VAR.S

Q-72 What does data alert do?

- 1) Alerts the user if the data limit exceeds a certain threshold.

- 2) Alerts the user that the data might be malicious.
- 3) Alerts the user if a certain data points aggregation/metric is above, below or at a certain threshold set by the user.
- 4) Alerts the user for a data refresh if there is a change in the data source.

Q-73 Data Alerts do not work in –

- 1) KPI
- 2) Gauge chart
- 3) Bar chart
- 4) Cards

Q-74 Data Alerts (as features) are only available in -

- 1) Power Bi Mobile
- 2) Power Bi Service
- 3) Power Bi Desktop
- 4) Power Bi Report Server

Q-75 Who can modify the data alert feature?

- 1) Dashboard owner
- 2) Everyone who has access to dashboard
- 3) Everyone who has access to dashboard and has Power Bi Premium.

Q-76 What does Q&A chart/visual in Power Bi do?

- 1) To take inputs from report(/dashboard) viewers and managers about the report.
- 2) To ask Questions about the loaded data and convert them into visuals
- 3) To ask Power Bi's Artificial Intelligence about various features/options

Q-77 Define Dashboard?

- 1) A Canvas of report elements built in PBI desktop
- 2) A Canvas of report elements built in PBI Service
- 3) Dashboard is built by bringing together a couple of visuals/charts based on the loaded data
- 4) The Data Model tab

Q-78 Differentiate Reports and Dashboards?

- 1) Reports can have multiple pages, whereas in dashboards we have only one page.
- 2) They are same
- 3) Slicers and filters are not available in Reports whereas they are available in Dashboards
- 4) Reports are built in PBI Service whereas Dashboards are built in PBI Desktop

Q-79 Power Bi Paginated reports are created by-

- 1) Power BI Report Server
- 2) Power BI Service
- 3) Power BI Desktop
- 4) Power BI Report Builder

Q-80 What is a Workspace in Power BI?

- 1) Creates a bundle of Dashboards, Reports and data
- 2) The only area in PBI Service where we can edit a Report
- 3) Workspaces are places to collaborate with people/colleagues to create collections of dashboards, reports and paginated reports.

Q-81 You plan to join a fact table named ActivityLog to a Date dimension named ActivityDate. The date value in ActivityLog is a datetime column named ActivityStart.

The date value in ActivityDate is a number column named DateID. DateID is in the 'YYYYMMDD' format.

What should you do in the model before you create the relationship?

- 1) Change the Data Type of ActivityStart to Date.
- 2) Create a measure in ActivityLog that uses the FORMATDAX function.
- 3) Change the Data Type of DateID to Date.
- 4) Create a calculated column in ActivityLog that uses the FORMAT DAX function.

Q-82 Can we perform a join between tables ,taking a column from one table and measure from another?

- 1) Yes
- 2) No

Q-82

	Id	A <sup>B</sup> C	Key	A <sup>B</sup> C 123	Value
1	1	Student	Tom		
2	1	Class	101		
3	1	Score	80		
4	2	Student	Jane		
5	2	Class	101		
6	2	Score	89		
7	3	Student	Larry		
8	3	Class	102		
9	3	Score	95		
10	3	Score	70		

After Pivoting,

1	2	3	<b>Id</b>	ABC 123	<b>Student</b>	ABC 123	<b>Class</b>	ABC 123	<b>Score</b>	ABC 123
1			1	Tom		101		80		
2			2	Jane		101		89		
3			3	Larry		102		Error		

Resolve the error while also preserving all the data.

- 1) Change Data Type of the Value column
- 2) Select the Key column, and then click Remove Duplicates
- 3) Change the Aggregate Value Function of the pivot
- 4) Select the Score column, and then click Remove Errors

Q-83 You have following data

<b>GeoCode</b>	<b>CustomerCount</b>	<b>2014</b>	<b>2015</b>	<b>2016</b>	<b>2017</b>
MA	2300	38885900	40830195	46954724.25	49302460.46
SD	1200	3993773.76	4193461.65	3983788.56	4182977.99
PA	340	89433932.54	93905628.6	98600910.03	103530955.5
NC	890	2000243.76	2100255.15	2289278.15	2403742.01
US	7777	6994777.75	7344515.85	9180644.81	9639677.05

And want to change this to

<b>GeoCode</b>	<b>CustomerCount</b>	<b>Attribute</b>	<b>Value</b>
MA	2300	2014	38885900
MA	2300	2016	46954724.25
MA	2300	2017	49302460.46
SD	1200	2014	3993773.76
SD	1200	2015	4193461.65
SD	1200	2016	3983788.56
SD	1200	2017	4182977.99
PA	340	2014	89433932.54
PA	340	2015	93905628.6
PA	340	2016	98600910.03
PA	340	2017	103530955.5
NC	890	2014	2000243.76
NC	890	2015	2100255.15
NC	890	2016	2289278.15
NC	890	2017	2403742.01
US	7777	2014	6994777.75
US	7777	2015	7344515.85
US	7777	2016	9180644.81
US	7777	2017	9639677.05

What do you do?

- 1) Transpose the data table
- 2) Reverse Rows of the data
- 3) Choose columns 2014 – 2017 and pivot them
- 4) Choose columns Geocode and CustomerCount and unpivot all the others

**Q-84** You have two Microsoft SQL Server database servers named SQLProd and SQLDev. SQLDev contains the same tables as SQLProd, but only a subset of the data in SQLProd.

You create a new Power BI Desktop model that uses 120 tables from SQLDev.

You plan to publish the Power BI file to the Power BI service.

You need to connect the model to the tables in SQLProd. The solution must minimize administrative effort.

What should you do from Query Editor before you publish the model?

- 1) Create a new connection to SQLProd, and then import the tables from SQLProd.
- 2) Delete the existing queries, and then add new data sources.
- 3) Configure the Data source settings.
- 4) Edit the source of each table query

**Q-85** You have the following table —

Date	Day	Week	Month	Year
2014-12-01	1	27	12	2014
2014-12-02	2	27	12	2014
2014-12-03	3	27	12	2014
2014-12-04	4	27	12	2014

You need to add a column to display the date in the format of December 01, 2014.  
Which DAX formula should you use in Power BI Desktop?

- 1) `FORMAT([Date], "MMM") & " " & FORMAT([Date], "DD") & ", " & FORMAT([Date], "YYYY")`
- 2) `FORMAT([Date], "M") & " " & FORMAT([Date], "D") & ", " & [Date].[Year])`
- 3) `[Date].[Month] & " " & FORMAT([Date], "D") & ", " & [Date].[Year])`
- 4) `FORMAT([Date], "MMMM DD, YYYY")`

Q-86 You have a data table. You discover that a column named ErrorCode has several values starting with a space character, and a column named SubStatus contains several non-printable characters. You need to remove all the leading whitespaces from ErrorCode and all the non-printable characters from SubStatus. All other data must be retained.

What should you do on each column?

- 1) ErrorCode – Extract → first characters then in SubStatus Extract → first characters
- 2) ErrorCode – Extract → length then in SubStatus Format → Clean
- 3) ErrorCode – Format → Clean then in SubStatus Format → Trim
- 4) ErrorCode – Format → Trim then in SubStatus Format → Clean

Q-87 You import a data like this

City
UK - London
France - Paris
Spain - Madrid
Canada - Montreal

And now you want this

City
London
Paris
Madrid
Montreal

What do you do?

- 1) Format → Trim
- 2) Extract → Last Characters
- 3) Split Column → Delimiter
- 4) Extract → Text after Delimiter

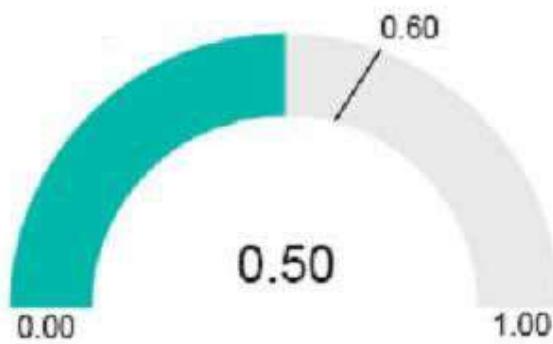
Q-88 What can not be achieved by using the Power Bi service API?

- 1) Retrieve rows from a dataset
- 2) Add rows to a dataset
- 3) Create a dataset
- 4) Refresh an imported dataset



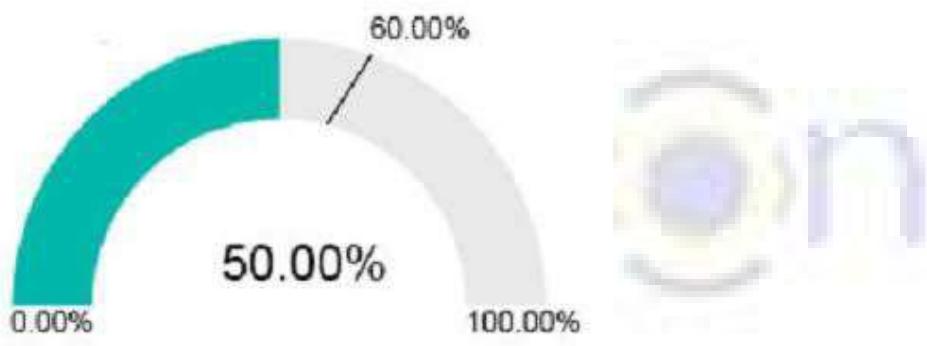
Q-89 Change this

### Progress and Target



To this,

### Progress and Target



- 1) Create a calculated column that adds '%' to the values
- 2) Create a calculated measure that adds '%' to the values
- 3) Edit the query of data source and change the data type to percentage
- 4) From modelling tab change the data type to percentage.

Q-90 You are importing sales data from a Microsoft Excel file named Sales.xlsx into Power BI Desktop.

You need to create a bar chart showing the total sales amount by region.

When you create the bar chart, the regions appear as expected, but the sales amount value displays the count of sales amount instead of the sum of sales amount each region.

What do you do that data appears correctly?

- 1) Delete the query, import the data into Sql server, then import from it
- 2) Add a calculated column that totals the sales amount column
- 3) Change data-type of sales amount column to numeric

- 4) Try refreshing the data model /OR data source.

Q-91 Consider 3 tables Territory, Sales and Products.

Relationship is Territory → Sales (1 to Many) & Products → Sales(1 to Many). Will a slicer work from a column from Territory on a column from Products?

- 1) Yes
- 2) No

Q-92 State Why for the above question

- 1) Slicers don't work in a 1 to Many relationship
- 2) Slicers only work when there is a direct relationship between two tables
- 3) If Connections made are one way (ex a → b) then a slicer won't work the other way (ex b → a, like in the above case). We must make the connection bidirectional between Product and sales by Edit relationship → Cross filter direction → Set it to both and press OK.

Q-93 Choose the correct option? (Terminology alert: Many → 1 means many side to one side)

- 1) Related when you need to access from 1 → Many, Related-table when you need to access column from Many → 1
- 2) Related when you need to access from Many → 1, Related-table when you need to access column from 1 → Many
- 3) Related when you need to access from Many → Many, Related-table when you need to access column from 1 → Many
- 4) Related when you need to access from 1 → 1, Related-table when you need to access column from 1 → Many

Q-94 Consider the query – ([Total\_marks\_of\_Students] is a measure ,Gender is a column in Student table containing only 'F' & 'M')

CALCULATE(

    CALCULATE([Total\_marks\_of\_Students],Student[Gender]='F'),Student[Gender]='M')

What does it return?

- 1) Total marks of students for M/male students
- 2) Total marks of students for F/Female students (As inner Query is given higher preference)

Q-95 You plan to use Power BI Embedded to deliver reports in a web application. You need to ensure that the reports display live data. Which data source you should use?

- 1) Microsoft Azure Data Lake Store
- 2) Microsoft Azure Table Storage
- 3) Microsoft Azure HDInsight
- 4) Microsoft Azure SQL Database

Q-96 You have a Power BI model that contains the following two tables: Sales(Sales\_ID, sales\_date, sales\_amount, CustomerID) Customer(CustomerID, First\_name, Last\_name) There is a relationship between Sales and Customer. You need to create a measure to rank the customers based on their total sales amount. Which DAX formula should you use?

- 1) RANKX(ALL(Sales), SUMX(RELATEDTABLE(Customer), [Sales\_amount]))
- 2) TOPN(ALL(customer), SUMX(RELATEDTABLE(Sales), [Sales\_amount]))
- 3) RANKX(ALL(customer), SUMX(RELATEDTABLE(Sales), [Sales\_amount]))
- 4) RANK.EQ(Sales[sales\_amount], Customer[CustomerID])

Q-97 You embed a Power BI report in a Microsoft SharePoint Online page. A user name User1 can access the SharePoint Online page, but the Power BI web part displays the following error message: "This content isn't available". User1 is unable to view the report. You verify that you can access the SharePoint Online page and that the Power BI report displays as expected. You need to ensure that User1 can view the report from SharePoint Online. What should you do?

(NOTE: **Microsoft SharePoint Online** is a content management system that is part of the Office 365 suite of services. **SharePoint** provides a rich collaboration environment in which internal and external users can work together, manage content, and communicate information using a variety of **SharePoint** intranets and sites.)

- 1) Publish the app workspace.
- 2) Edit the settings of the Power BI web part.
- 3) Modify the members of the app workplace.
- 4) Share the dashboards in the app workspace.

Q-98 In the Power BI service, you create an app workplace that contains several dashboards. You need to provide a user named sudhanshu1@ineuron.com with the ability to edit and publish dashboards. What should you do?

- 1) Modify the members of the app workspace.
- 2) Configure security for the dataset used by the app.
- 3) Share the dashboard, and then modify the Access settings of the dashboard.
- 4) From the app workspace, click Update app, and then configure the Access settings.

Q-99 You have an app workspace named Retail Store Analysis in the Power BI service. You need to manage the members that have access to the app workspace using the least amount of administrative effort. What should you do?

- 1) From the Power BI Admin portal, click Usage metrics .
- 2) From the Office 365 Admin center, click Groups.
- 3) From the Office 365 Admin center, click Users.
- 4) From the Power BI Admin portal, click Tenant settings.

Q-100 You plan to create a dashboard in the Power BI service that retrieves data from a Microsoft SQL Server database. The dashboard will be shared between the users in your organization. You need to ensure that the users will see the current data when they view the dashboard. How should you configure the connection to the data source?

- 1) Import the data by using the Import Data Connectivity mode.
- 2) Deploy an on-premises data gateway
- 3) Import the data by using the DirectQuery Data Connectivity mode.
- 4) Live Connection

Q-101 You created a KPI with a indicator and target variable

For the Trend axis you selected a months column. But you notice that the months are sorted by alphabetical order and not by datetime. What do you do?

- 1) Choose another visual
- 2) Remove the Trend Axis (remove the trend axis, sort by date and then reinsert it)
- 3) Modify visual levelfilters
- 4) Modify Drillthrough filters

Q-102 You created a stacked column chart visualization that displays ProductName by Date. You discover that the axis for the visualization displays all the individual dates. You need to ensure that the visualization displays ProductName by year and that you can drill down to see ProductName by week and day. What should you do first?

- 1) Configure a visual filter for the Date column that uses an advanced filter.
- 2) Create new columns for the date, year, week, and day.
- 3) Create a new hierarchy in the Sales table.
- 4) Format the virtualization and set the type of the X-Axis to Categorical.

Q-103 You plan to use Power BI Desktop to import 100 CSV files. The files contain data from different stores. The files have the same structure and are stored in a network share. You need to import the CSV files into one table. The solution must minimize administrative effort. What should you do?

- 1) Add a folder data source and use the Combine Files command.
- 2) Add a folder data source and use the Merge Queries command
- 3) Add a Microsoft Excel data source and use the Merge Queries command
- 4) Add text/CSV data sources and use the Append Queries command.

Q-104 Customer table-

<b>CustomerID</b>	<b>CustomerName</b>
1	Customer1
2	Customer2
3	Customer3
4	Customer4

Ordertable-

<b>OrderID</b>	<b>CustomerID</b>	<b>OrderDate</b>	<b>OrderAmount</b>
1	1	12-22-2016	1000
2	1	12-23-2016	1200
3	2	12-24-2016	1100
4	3	12-24-2016	800

Desired result

<b>CustomerID</b>	<b>CustomerName</b>	<b>OrderID</b>	<b>OrderDate</b>	<b>OrderAmount</b>
1	Customer1	1	12-22-2016	1000
1	Customer1	2	12-23-2016	1200
2	Customer2	3	12-24-2016	1100
3	Customer3	4	12-24-2016	800
4	Customer4			

If you consider Customer table as first table, which join will you perform?

- 1) Union
- 2) Left Anti
- 3) Left Outer
- 4) Right Anti
- 5) Right Outer

Q-105 You plan to use Power BI Desktop optimized for Power BI Report Server to create a report. The report will be published to Power BI Report Server. You need to ensure that all the visualization in the report can be consumed by users. Which type of visualizations should you exclude from the report?

- 1) Funnel charts
- 2) Custom Visuals
- 3) R visuals
- 4) Bubble maps

Q-106 Consider this table

<b>Table name</b>	<b>Column name</b>
Sales	OrderID
	Product
	ProductCategory
	ProductSubCategory
	OrderDate
	SalesAmount
Date	DateID
	Date
	Year
	Month
	Week
	Day

You plan to create a report to display TotalSales by ProductCategory and ProductSubCategory.  
Create a measure to calculate the % of TotalSales for each ProductCategory.

- 1) `SUM([SalesAmount])/  
CALCULATE(SUM([SalesAmount],FILTER(Sales,Sales[ProductCategory]))) * 100`
- 2) `DIVIDE(SUM([SalesAmount]),CALCULATE(SUM([SalesAmount]),  
ALL(Sales[ProductCategory],Sales[ProductSubCategory])))`
- 3) `DIVIDE(SUM([SalesAmount]),CALCULATE(SUM([SalesAmount]),  
ALLSELECTED(Sales[ProductCategory],Sales[ProductSubCategory])))`
- 4) `DIVIDE(SUM([SalesAmount]),CALCULATE(SUM([SalesAmount]),  
ALLEXCEPT(Sales[ProductCategory],Sales[ProductSubCategory])))`

Q-107 Consider the table—

Table name	Column name
Transactions	TransactionID
	TransactionDate
	TransactionQuantity
Date	Date
	Day
	Month
	Year

You need to create a measure to calculate a running total of TransactionQuantity.

- 1) SUMX(Transactions[TransactionQuantity],FILTER(Date[Date],Date[Date]<=MAX(Date[Date])))  
)
- 2) CALCULATETABLE(SUM(Transactions[TransactionQuantity]),FILTER(ALL(Date[Date]),Date[Date]<=MAX(Date[Date])))
- 3) CALCULATE(SUM(Transactions[TransactionQuantity]),FILTER(ALL(Date[Date]),  
Date[Date]<=MAX(Date[Date])))
- 4) None

Q-108 Now Calculate a running total of TransactionQuantity for every 30 days for the same table as above.

- 1) CALCULATE(SUM(Transactions[TransactionsQuantity]),DATESMTD(Date[Date]))
- 2) CALCULATE(SUM(Transactions[TransactionQuantity]),FILTER(ALL(Date[Date]),  
Date[Date]>MAX(Date[Date])-30 && Date[Date]<=MAX(Date[Date])))
- 3) CALCULATE(SUM(Transactions[TransactionsQuantity]),PARALLELPERIOD(Date[Date],-  
1,Month))
- 4) CALCULATE(SUM(Transactions[TransactionQuantity]),FILTER(ALL(Date[Date]),  
Date[Date]<MAX(Date[Date])&& Date[Date]>MAX(Date[Date])+30))

Q-109 You have the following two queries in Power BI Desktop:

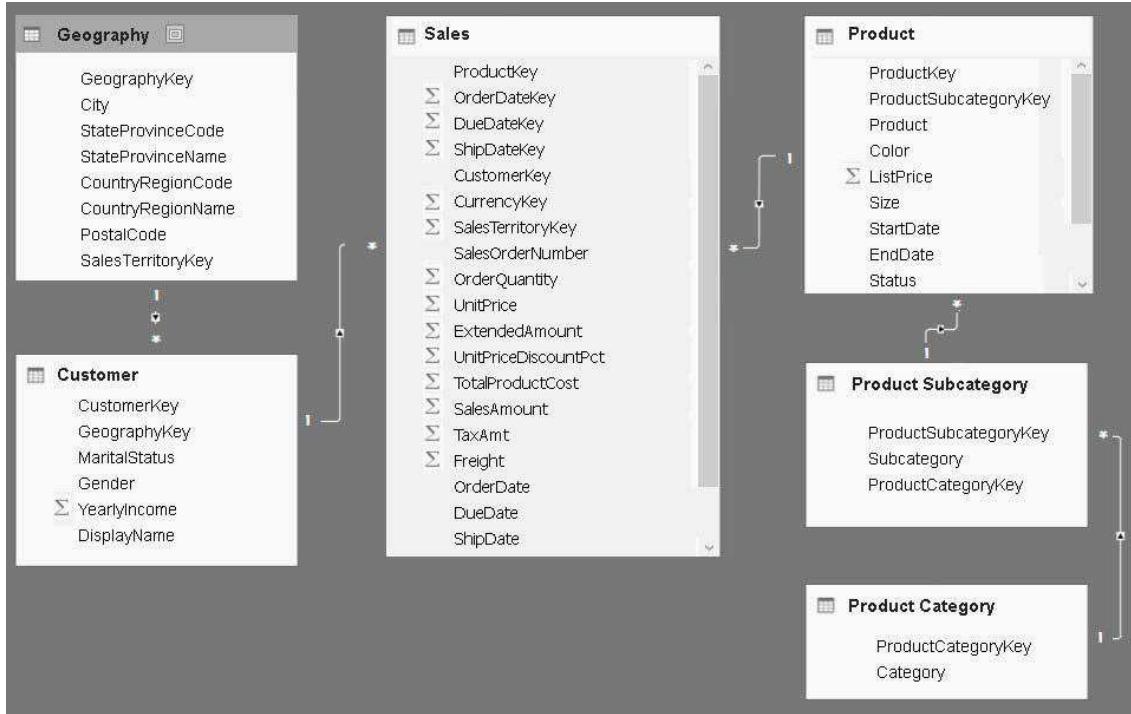
A query named Query1 that retrieves a table named SMB\_Customers from a Microsoft SQL Server database

A query named Query2 that retrieves a table named Enterprise\_Customers from an Oracle database Both tables have the same columns. You need to combine the data from SMB\_Customers and Enterprise\_Customers. Which command should you use?

- 1) Combine files

- 2) Merge Columns
- 3) Merge Queries
- 4) Append Queries

Q-110 Consider this DATA MODEL—



You need to add a measure to rank total sales (SalesAmount column) by product. The results must appear as shown in the following table—

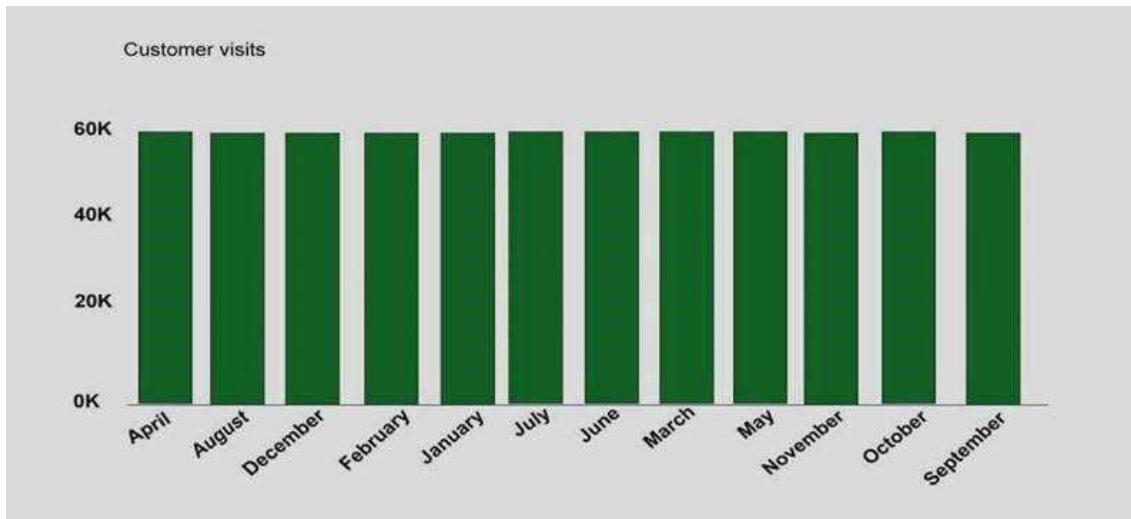
Rank	Product	SalesAmount
1	Product3	13,0000
1	Product2	13,0000
2	Product1	12,0000
3	Product5	10,000
3	Product4	10,000

Which DAX will you use?

- 1) Product Ranking = RANKX(ALL('Product'),  
CALCULATE(SUM(Sales[SalesAmount])),,Asc, Dense)
- 2) Product Ranking = RANKX(ALL('Product'), SUM([SalesAmount]),,DESC, Skip)
- 3) Product Ranking = RANKX(ALL('Product'),  
CALCULATE(SUM(Sales[SalesAmount])),,DESC, Dense)

- 4) Product Ranking = RANKX(Product, [SalesAmount],,DESC, Skip)

Q-111 You have two tables named CustomerVisits and Date in a Power BI model. You create a measure to calculate the number of customer visits. You use the measure in the report shown below



You discover that the total number of customer visits was 60,000, and that there were only 3,000 customer visits in April. You need to fix the report to display the correct data for each month. What should you do?

- 1) Create a relationship between the CustomerVisits table and the Date table.
- 2) Create a hierarchy in the Date table.
- 3) Modify the n=measure to use the CALCULATE DAX function.
- 4) Modify the measure to use the SUM DAX function.

Q-112 You have a query for a table named Sales. Sales has a column named CustomerID. The Data type of CustomerID is Whole Number. You refresh the data and find several errors. You discover that new entries in the Sales table contain nonnumeric values. You need to ensure that nonnumeric values in the CustomerID column are set to 0. Solution: From Query Editor, select the CustomerID column and click Remove Errors. Does this meet the goal?

- 1) Yes
- 2) No

Q-113 You have a Power BI report that displays a bar chart and a donut chart on the same page. The bar chart shows the total sales by year and the donut chart shows the total sale by category. You need to ensure that when you select a year on the bar chart, the donut remains unchanged. What should you do?

- 1) Set a visual level filter on the bar chart.

- 2) Edit the interactions from the Format menu.
- 3) Set a visual level filter on the donut chart.
- 4) Add a slicer to the page that uses the year column.

Q-114 You have a Power BI model for sales data. You create a measure to calculate the year-to-date sales. You need to compare the year-to-date sales with the previous year for the same time period. Which DAX function should you use?

- 1) LASTDATE
- 2) PREVIOUSYEAR
- 3) PARALLELPERIOD
- 4) SAMEPERIODLASTYEAR

Q-115 You have a query that retrieves sales data. A sample of the data is shown in the following table.

Date	CustomerId	ProductId	Quantity
10/10/2016	8877	8878	5
null	8877	8879	5
null	8877	8880	5
10/11/2016	5723	1234	2
null	5723	1235	3
null	5723	1236	5
null	5723	1237	10
10/12/2016	4356	4401	11
null	5723	4908	2

You need to ensure that the values in the Date column contain a date. Null values must be replaced with the date from the previous row. What should you click on the Transform tab in Query Editor?

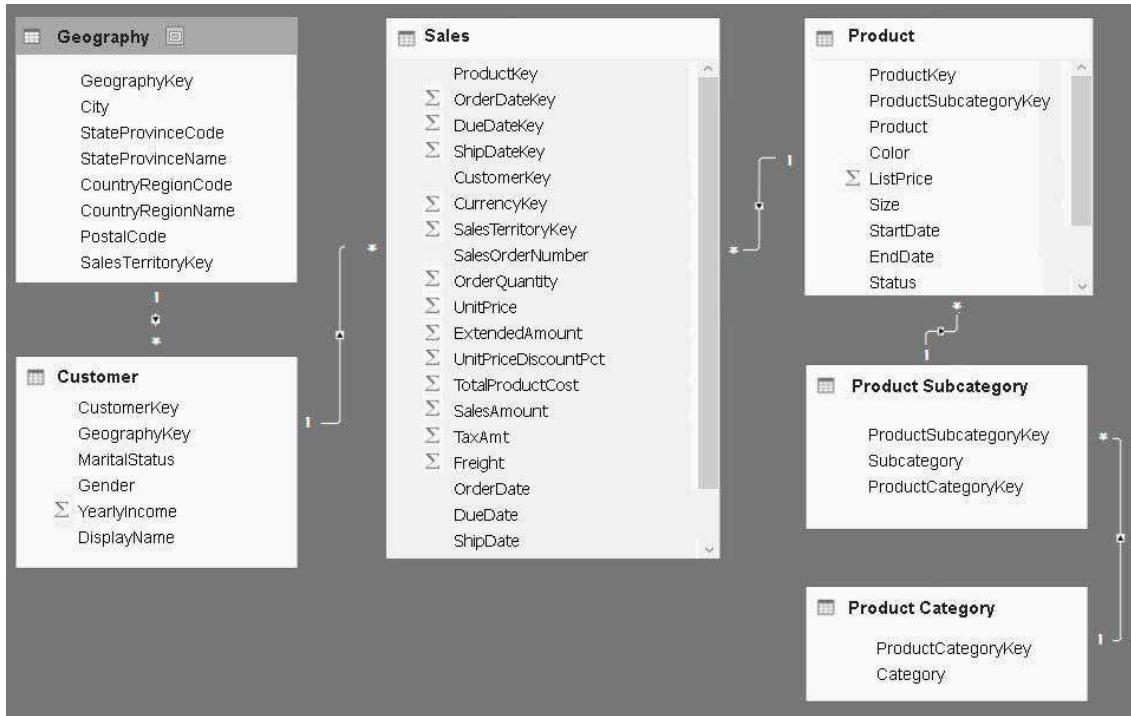
- 1) Date, and then Earliest
- 2) Format, and then Clean
- 3) Fill, and then Down
- 4) Replace Values, and then Replace Errors

Q-116 You need to create a measure of Sales[SalesAmount] where Product[Color] is Red or Product[Size] is 50. Which DAX should you use?

- 1) CALCULATE(SUM([SalesAmount]), ALL('Product'[Color], 'Product'[Size]))
- 2) CALCULATE(SUM([SalesAmount]), 'Product'[Color] = "Red" || 'Product'[Size] = 50)
- 3) CALCULATE(SUM([SalesAmount]), FILTER('Product', 'Product'[Color] = "Red" || 'Product'[Size] = 50))

4) CALCULATE(SUM([SalesAmount]), FILTER('Product'[Color] = "Red" || 'Product'[Size] = 50))

Q-117 Consider the data-model



You add another table named Territory to the model. A sample of the data is shown in the following table.

TerritoryKey	TerritoryName
1	United States
1	USA
2	Canada
2	Can
3	United Kingdom
3	UK

Which function should you use in the query for Territory before you create the relationship?

- 1) Distinct
- 2) IsDistinct
- 3) ReplaceMatchingRows
- 4) RemoveMatchingRows

Q-118 You enable Q&A on the dashboard. You need to provide users with sample questions that they can ask when using Q&A. Which settings should you modify from the Power BI Settings?

- 1) Dashboards
- 2) Subscriptions
- 3) Datasets
- 4) Workbooks

Q-119 You need to calculate the number of orders (Consider a OrderId column with distinct values only). What should you do?

- 1) Create a calculated measure that uses the COUNTA(Order\_ID) DAX formula
- 2) Create a calculated measure that uses the SUM (Order\_ID) DAX formula
- 3) Create a calculated column that uses the SUM (Order\_ID) DAX formula
- 4) Create a calculated column that uses the COUNTA (Order\_ID) DAX formula

Q-120 You plan to add a table named Date to the model. The table will have columns for the date, year, month, and end of the last month and will include data from January 1, 2013 to December 31, 2015.

Which DAX functions should you use to create the columns?

- 1) CALENDARAUTO, YEAR, MONTH, and EOMONTH
- 2) CALENDAR, YEAR, MONTH, and ENDOFMONT
- 3) CALENDARAUTO, YEAR, MONTH, and ENDOFMONT
- 4) CALENDAR, YEAR, MONTH, and EOMONTH

Q-121 A data analyst publishes several Power BI visualizations to a blog.

You discover that some of the visualizations contain data that is considered private by your company.

You need to prevent the visualizations from being published to the blog.

What should you do?

- 1) From the Power BI Admin portal, disable the Publish to web setting.
- 2) From the Power BI settings, delete the embedded codes.
- 3) From the Power BI Admin portal, disable the Share content with external users setting.
- 4) From the dashboard settings, modify the Share dashboard settings

Q-122 You create a report in the Power BI service.

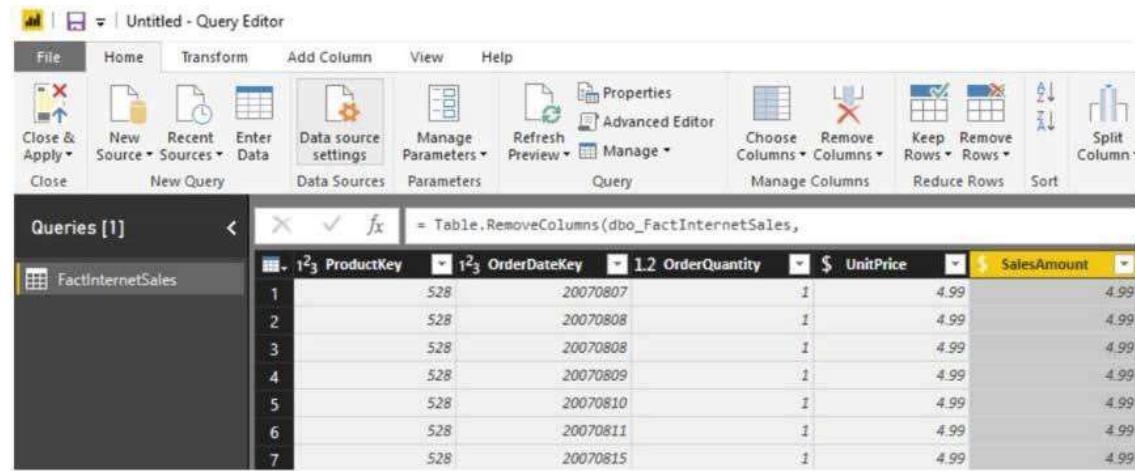
You plan to provide external users with access to the report by publishing the report to a public blog.

You need to ensure that the report in the blog post will be updated as the data is refreshed.

What should you do in the Power BI service?

- 1) Publish the app workspace to the entire organization. In the blog post, use the URL of the workspace.
- 2) Share the Report , in the blog post, use the URL of the Dashboard
- 3) Publish the Report to the web . In the Blog-Post, use the Embed-code URL.
- 4) In the blog post, use the URL of the report.

Q-123 You have this FactInternetSales Data.



The screenshot shows the Power BI Query Editor interface. The ribbon at the top has tabs for File, Home, Transform, Add Column, View, and Help. The Home tab is selected. Below the ribbon are various icons for managing data sources, queries, and columns. The main area is titled "Queries [1]" and contains a table named "FactInternetSales". The table has columns: ProductKey, OrderDateKey, OrderQuantity, UnitPrice, and SalesAmount. The data shows 7 rows of sales records for ProductKey 528, all occurring on OrderDateKey 20070807, with SalesAmount values of 4.99.

	ProductKey	OrderDateKey	OrderQuantity	UnitPrice	SalesAmount
1	528	20070807	1	4.99	4.99
2	528	20070808	1	4.99	4.99
3	528	20070808	1	4.99	4.99
4	528	20070809	1	4.99	4.99
5	528	20070810	1	4.99	4.99
6	528	20070811	1	4.99	4.99
7	528	20070815	1	4.99	4.99

You plan to create a bar chart showing the count of sales by year that have a SalesAmount greater than \$1,000.

You need to create a measure that will be used in the bar chart.

Complete the DAX.

Measure = \_\_\_\_\_ ( \_\_\_\_\_ ('FactInternetSales', 'FactInternetSales'[SalesAmount] > 1000))

- 1) CALCULATE, COUNTX
- 2) COUNTROWS, FILTER
- 3) COUNTX, FILTER
- 4) CALCULATE, COUNT

Q-124 From the Home tab in Power BI Desktop, you click Enter Data and create a table named Sales that contains the following data.

Region	Sales
Canada	100
Canada	900
Italy	500
Spain	800
US	200
US	1000

You add Region and Sales to visualization and the visualization displays the following data.

Sales	Region
1000	Canada
500	Italy
800	Spain
1200	US

What causes the visualization to display four rows of data instead of six?

- 1) Data Category of Region
- 2) Data type of Sales
- 3) Default Summarization on Sales
- 4) Default Summarization on Region

Q-125 You need to create a custom visualization for Power BI.

What should you install first?

- 1) jQuery
- 2) Node.js
- 3) Microsoft Azure Powershell
- 4) Microsoft.NET

Q-126 You have the following two tables:

Subscriber(SubscriberID, EnrollmentDate, ServicePlan)

Date (Date, Month, Week, Year)

There is a relationship between Subscriber[EnrollmentDate] and Date [Date].

You plan to create a KPI for the number of subscribers enrolled in the current year.

You need to create a goal that is five percent more than the number of subscribers enrolled during the previous calendar year.

Complete the DAX

                  (‘Subscriber’[SubscriberID]),  
                  (‘Date’[Date]))\*1.05

- 1) CALCULATE, SUMX, PARALLELPERIOD
- 2) CALCULATE, SUMX, TOTALYTD
- 3) CALCULATE, COUNT, PREVIOUSYEAR
- 4) CALCULATE, SUMX, DATESYTD

Q-127 You are creating a report in Power BI Desktop that has two visualizations on a page as shown—



You need to ensure that when you click the bar of a country, only the values for that country are shown on the Revenue by Year and Manufacturer chart.

- 1) Click the Revenue by Year and Manufacturer chart. On the Format tab, click Edit Interactions. On the Units by Country chart, click Filter.
- 2) Click the Revenue by Year and Manufacturer chart. On the Format tab, click Edit Interactions. On the Units by Country chart, click Highlight.
- 3) Click the Units by Country chart. On the Format tab, click Edit Interactions. On the Revenue by Year and Manufacturer chart, click Filter.
- 4) Click the Units by Country chart. On the Format tab, click Edit Interactions. On the Revenue by Year and Manufacturer chart, click Highlight.

Q-128 Consider this SQL data

Table name	Column name	Data type
Order	Order_ID	Integer
	Order_date	Integer
	Order_amount	Currency
	Customer_ID	Integer
	Order_ship_date	Integer
	Store_ID	Integer
Customer	Customer_ID	Integer
	First_name	Varchar(100)
	Last_name	Varchar(100)
	Customer_photo	Binary
Date	Date_ID	Integer
	Date_name	Datetime
	Month	Integer
	Week	Integer
Monthly_returns	Year	Integer
	Month_ID	Integer
	Total_returns	Float
Store	Store_ID	Varchar(100)
	Name	Varchar(100)
	City	Varchar(100)
	Sales_target	Float

The Order table contains more than one million rows.

The Store table has a relationship to the Monthly\_returns table on the Store\_ID column. This is the only relationship between the tables.

You plan to use Power BI Desktop to create an analytics solution for the data but you need to import only a sample of the data from the Order table.

What do you do?

- 1) From Query Editor, create a custom column that uses a custom column formula.
- 2) From Query Editor, add a SELECT statement that uses a WHERE clause to the source definition.
- 3) In the Power BI model, create a calculated table.
- 4) From Query Editor, filter the table by Order\_date.

Q-129 Consider the previous table only

The Store table has a relationship to the Monthly\_returns table on the Store\_ID column. This is the only relationship between the tables. You plan to create a chart that displays total Order[Order\_amount] by Store[Name].

- 1) Create a relationship between the Order table and the Store table.
- 2) To the Order table, add a measure that uses the COUNTA('Order'[Order\_ID]) DAX formula.
- 3) To the Order table, add a measure that uses the COUNT('Order'[Order\_amount]) DAX formula.
- 4) None

Q-130 Ouput of SEARCH("n","printer") is-

- 1) True
- 2) False
- 3) 4
- 4) 3

Q-131 You plan to embed Visualizations to a website.

Which one can you Embed?

- Visual 1 : Uses RLS
- Visual 2 : Uses a dataset stored in MS one-drive for business
- Visual 3 : Uses a custom visual
- Visual 4 : Uses a dataset from SSAS (on premise)

Q-132 You have a workspace that contains 10 dashboards. A dashboard named Sales Data displays data from two datasets. You discover that users are unable to find data on the dashboard by using natural language queries.

You need to ensure that the users can find data by using natural language queries.

What should you do?

- 1) From the settings of the workspace, modify the Language Settings.
- 2) From the Sales Data dashboard, set the dashboard as a Favorite.
- 3) From the properties of the datasets, modify the Q&A and Cortana settings.
- 4) From the properties of the dashboard, modify the Q&A settings.

Q-133 Does Q&A work for Multi-Dimensional data?

- 1) Yes
- 2) No

Q-134 You manage a Power BI model that has two tables named Sales and Product.

You need to ensure that a sales team can view only data that has a CountryRegionName (in sales table) value of United States and a ProductCategory (in product table) value of Clothing.  
What should you do from Power BI Desktop?

- 1) Add the following filters to a report. CountryRegionName is United States  
ProductCategory is Clothing
- 2) From Power BI Desktop, create a new role that has the following filters.  
[CountryRegionName] = "United States" [ProductCategory] = "Clothing"
- 3) Add the following filters in Query Editor. CountryRegionName is United States  
ProductCategory is Clothing

- 4) From Power BI Desktop, create a new role that has the following filter.  
[CountryRegionName] = "United States" && [ProductCategory] = "Clothing"

Q-135 You have a table named Sales. Sales contains the data shown in the following table.

Year	Total Sales
2015	26,250,801.43
2016	32,890,351.72
2017	11,685,099.08

You have the following measure.

Total Sales This Year = SUM([Total Sales])

You plan to create a KPI to compare the current yearly sales to the previous year as shown in the exhibit. (Click the Exhibit button.)

Current Year Sales



You need to create the measure for the goal.

How should you complete the DAX formula?

\_\_\_\_\_( [Total Sales This Year], \_\_\_\_\_( 'Date'[Date], -1, YEAR ) )

- 1) CALCULATE, SAMEPERIODLASTYEAR
- 2) CALCULATE, DATEADD
- 3) CALCULATE, PREVIOUSYEAR
- 4) SUMX, PREVIOUSYEAR

Q-136 You are creating a report in Power BI Desktop.

You have the following tables.

Total name	Column name	Data type
Sales	SalesID	Integer
	SalesDate	Datetime
	TotalPrice	Float
	CustomerID	Integer
	SalesShipDate	Datetime
	StoreID	Integer
Date	Date	Datetime
	DateKey	Integer
	DateName	Datetime
	MonthNumber	Integer
	Week	Integer
	MonthName	Varchar(3)
	Year	Integer

Date[Date] is in the mm/dd/yyyy format. Date[DateKey] is in the ddmmmyyyy format.

Date[MonthNumber] is in the mm format. Date[MonthName] is in the mmm format.

You create the report shown in the exhibit. (Click the Exhibit button.)



You need to ensure that the months appear in the order of the calendar.

How should you sort the MonthName column?

- 1) By MonthNumber
- 2) Ascending
- 3) Descending
- 4) By DateKey

Q-137 You are creating a report in Power BI Desktop.  
You are consuming the following tables.

Total name	Column name	Data type
Sales	SalesID	Integer
	SalesDate	Datetime
	TotalPrice	Float
	CustomerID	Integer
	SalesShipDate	Datetime
	StoreID	Varchar(100)
Date	Date	Datetime
	DateKey	Integer
	DateName	Datetime
	MonthNumber	Integer
	MonthName	Varchar(3)
	Year	Integer

You have a new table named Fiscal that has the same schema as the Date table, but contains the fiscal dates of your company.

You need to create a report that displays the total sales by fiscal month and calendar month. What should you do?

- 1) Union Fiscal and Date as one table.
- 2) Add Fiscal to the model and create a one-to-many relationship by using Date[Year] and Fiscal[Year].
- 3) Add Fiscal to the model and create a one-to-one relationship by using Date[Year] and Fiscal[Year].
- 4) Merge Fiscal into the Date table.

Q-138 What type of connection doesn't support any kind of transformations on data?

- 1) Import data connection
- 2) Direct Query connection
- 3) Live connection
- 4) None

Q-139 You need to filter out totals from target figures. Which function does that?

- 1) Table.Filter
- 2) CALCULATETABLE
- 3) Table.SelectRows
- 4) Table.FilterRows

Q-140 Difference between & and && in DAX?

- 1) & checks whether one expression is false and returns false and && checks if both expressions are true then returns true
- 2) & checks if one expression is true and returns true and && checks if both expressions are true then returns true
- 3) & is used to concatenate the strings and && checks if both expressions are true then returns true
- 4) None

Q-141 Data has been scraped from a table on a popular retirement website. However, the Health care quality column's scores were not automatically transformed from text to numbers when Query Editor loaded the table. You thus right-clicked the column header, and selected Change Type > Whole Number to change them.

Unfortunately, the, Health care quality column contains a few ties in states' rankings, which was noted on the website by the word (tie) after their numbers. Query Editor thus reports a few errors.

What is the consequence of using the Remove Errors option (ribbon or the right-click menu option) to resolve this?

- 1) Removes the applied steps that has errors
- 2) Removes the error warnings but keeps all data intact
- 3) Blanks the cell values that have errors
- 4) Removes any rows with errors

Q-142 When you enable Snap objects to grid, all visuals on the Power BI Desktop canvas that you move (or resize) are automatically aligned to the nearest grid axis, making it much easier to ensure two or more visuals align to the same horizontal or vertical location or size.

You can also manage the overlap of each element on the design surface, often referred to as?

- 1) Vertical Stacking
- 2) Stack-Order
- 3) A-order
- 4) Z-order

Q-143 A retail analysis dashboard contains a small collection of datasets including Sales, Items and Stores. You have dragged the Category field from the Item dataset onto the report canvas. You now want to give users the option to select one, many or all Categories to filter the visuals on the report.

Which element should you pick from the visualizations pane?

- 1) Slicer
- 2) Multi-row card
- 3) Funnel
- 4) Card

Q-144 As part of a large HR project you are working with a dataset of company employees, both past and present. The data includes columns for EthnicGroup, PayTypeID, HireDate (the date they started work), TermDate (the date they left) and several other columns. You want to create a new Calculated Column that determines if the person was a bad hire based on a set of rules. If they were a bad hire then the result is 1, otherwise the Calculated Column displays a zero.

The bad hire rule is:

BadHire = If the person stayed at the company less than 61 days

Example: If a person joined the company on 27th June 2013 and left on 21st August 2013, then they would be a bad hire.

Which DAX expression would you use for this Calculated Column?

- 1) IF(OR(((HireDate)-[TermDate])) >= 61,ISBLANK([TermDate])),0,1)
- 2) IF(((HireDate)-[TermDate])\*-1) < 61,1,0)
- 3) IF(((TermDate)-[HireDate])\*-1) >= 61,0,1)
- 4) None

(Reason: For this expression we must use a combination of IF, OR and ISBLANK. If we forget to use ISBLANK then the difference between a date and a blank date is always 0, causing problems with the numeric comparison and potentially always showing BadHire as 1. Remember some employees won't have left the company and hence have no TermDate value.)

Q-145 You're creating a fancy little dashboard using Power BI Service. The dashboard shows the accumulative increase in the global population over the last several decades. The

dashboard will contain an introductory YouTube video that you have uploaded to the YouTube website. After uploading the video you copy the embed HTML code and paste it into your dashboard.

Unfortunately the video is fixed to 768 pixels wide and you would like it to expand to fit the tile size. What should you do?

- 1) Remove the allowfullscreen parameter from the code
- 2) Change the iFrame width & Height attributes to 100%
- 3) Add an extra outer DIV with a style width:auto and height:auto value
- 4) Videos are fixed size and can't expand to fit tiles

Q-146 Many data modeling and data transformations are available when using DirectQuery, though with some limitations. Which of the following is NOT a limitation of using DirectQuery?

- 1) All tables must come from a single Database
- 2) There is a 1 million row limit for returning data
- 3) Relationship filtering is limited to a single direction, rather than both directions
- 4) 1 GB dataset limitation

Q-147 When you share with people outside your organization, they get an email with a link to the shared dashboard. They need a Power BI Pro license, and they have to sign in to Power BI to see the dashboard.

After they sign in, they see the shared dashboard in its own browser window without the left navigation pane, not in their usual Power BI portal. They have to bookmark the link to access this dashboard in the future.

Which of the following statements is 'FALSE' when sharing visualizations outside of your organisation?

- 1) They can't edit any content in this dashboard or report
- 2) They can change any filters/slicers available on the reports connected to the dashboard and save their changes
- 3) People outside your organization can't see any data if role- or row-level security is implemented on on-premises Analysis Services tabular models
- 4) Only your direct recipients can see the shared dashboard. For example, if you sent the email to [Amit@inueron.ai](mailto:Amit@inueron.ai), only Amit can see the dashboard

(Remember : They can use slicers but not save their changes)

Q-148 Some of the most powerful data analysis solutions in Power BI Desktop can be created by using measures. Measures help us by performing calculations on our data as we

interact with our reports. Understanding aggregations is fundamental to understanding measures, because every measure will perform some type of aggregation.

Which of the below is TRUE regarding measures in Power BI?

- 1) You can reference another measure in a DAX expression by just typing an opening bracket ([])
- 2) Every time you interact with your report, you are changing the context in which a measure calculates and displays its results
- 3) You can create a new measure by clicking on the New Measure button in the ribbon on Power BI Desktop's Home tab
- 4) All of the above

Q-149 You can easily add a new custom column of data to your Power BI Desktop model. You can create and rename your custom column using easy buttons to create M formulas that define your custom column.

How would you add a custom column?

- 1) Home → Query Editor → Home → DataSource settings
- 2) Home → External Data → Enter Data
- 3) Home → Relationships → Manage Relationships
- 4) Home → Query Editor → File → Add Column

Q-150 Having created a new blank model you want to load in data from a SQL Server database which is hosted on the same PC as the Power BI Desktop application. You click the Get Date ribbon option and select SQL Server from the drop down list.

What should you enter in the Server textbox?

- 1) Local
- 2) [blank]
- 3) Host
- 4) Localhost

Q-151 The following table contains a Parent-Child hierarchy on the columns: Employee Key and Parent Employee Key. From the table you can see that employee 112 has no parent defined, employee 14 has employee 112 as manager (ParentEmployeeKey), employee 3 has employee 14 as manager and employees 11, 13, and 162 have employee 3 as manager. The

above helps to understand that employee 112 has no manager above her/him and she/he is the top manager for all employees.

Employee Key	Parent Employee Key
112	
14	112
3	14
11	3
13	3
162	3
117	162
221	162
81	162

The PATHLENGTH Function (DAX) returns the number of levels in a given PATH(), starting at current level until the oldest or top most parent level.

What would be the PATHLENGTH value for the third row (values 3 and 14)?

- 1) 2
- 2) 4
- 3) 3
- 4) 1

(REASON: 3 as path will be → 112|14|3)

Q-152 A complicated dashboard for the finance department requires you to combine three separate text fields together to form a concatenation of Country, Region and City. Which DAX expression below would successfully concatenate the three fields together into a single string result?

- 1) CONCATENATE( [Country], ", ", [Region], ", ", [City] )
- 2) CONCATENATEX([Country], ", ", [Region], ", ", [City] )
- 3) [Country] + ", " + [Region] + ", " + [City]
- 4) [Country] & ", " & [Region] & ", " & [City]

Q-153 When you import multiple tables, chances are you're going to do some analysis using data from all those tables. Relationships between those tables are necessary in order to accurately calculate results and display the correct information in your reports.

Imagine an example of a model that has a Sales actuals table with a lookup table for department and also a budget sales table that records target budget for each department. The department table is connected to both the sales and the budget table.

Which kind of Cross Filter Direction would you use in this example?

- 1) Single
- 2) Both

Q-154 If you want to combine data from multiple sources into a single model, for example, to join some data from a corporate SQL Server database with some local data maintained in an Excel file. Is DirectQuery a good choice for this scenario rather than Import?

- 1) Yes
- 2) No

Q-155 You have loaded data from a database table which contains a list of filenames that have been processed by an internal team. One particular column called filename contains the name of each file processed e.g. enrollment.batch11.xml

Which Transform function would you use to dissect the filename values into two separate columns, one for the filename and the other for the file extension e.g. xml

- 1) Extract - Text before delimiter
- 2) Split Column - Split at Each occurrence of the delimiter
- 3) Extract - Text after delimiter
- 4) Split Column - Split at Right-most delimiter

Q-156 Reports are often confused with dashboards since they too are canvases filled with visualizations. But there are some major differences. Which one allows you to filter, highlight, and slice, and also see dataset tables and fields and values?

- 1) Report
- 2) Dashboards
- 3) Neither
- 4) Both

Q-157 The Union DAX command creates a union (join) table from a pair of tables but which statement below is FALSE regarding Union?

- 1) The two tables must have the same number of columns
- 2) The column names in the return table will match the column names in table\_expression1
- 3) Columns are combined by position in their respective tables
- 4) Duplicate rows are removed

Q-158 Which type of visualisation would you choose if you wanted to show relationships between 3 numerical values and turn the horizontal axis into a logarithmic scale? The worksheet data would include grouped sets of values and you wanted to show patterns in large sets of data, for example by showing linear or non-linear trends, clusters, and outliers?

- 1) Scatter plot
- 2) Tree Map
- 3) Bubble Chart
- 4) Pie Chart

Q-159 Output of DAX → IF(ISLOGICAL("true"), "Is Boolean type or Logical", "Is different type") is—

- 1) Is Boolean type or Logical
- 2) Is different type

Q-160 When you share a dashboard with tiles that link to reports, those reports are also shared at the same time. But what if you want to share just a report? Just send the report page URL to your colleagues. As long as they have Power BI Pro licenses, are members of the same distribution group, in the same email domain as you, or have at least one dashboard that links to that same report (the dashboard has tiles that were pinned from that report), they'll be able to open the report.

You want to share a report that is prefiltered on the Store Territory with a value of UP. What should you add to the end of the report URL before you share it?

- 1) ?filter=Store/Territory = UP
- 2) ?filter=Store/Territory eq UP
- 3) ?filter=Store/Territory == UP
- 4) ?filter=Store[Territory] eq UP

Q-161 You want to write a DAX expression that checks if the product code column contains the value "ex". Which DAX function below is the right one to use?

- 1) FIND("ex", [ProductCode])
- 2) SEARCH("ex", [ProductCode])
- 3) CONTAINS(tablename, [ProductCode], "ex")
- 4) NONE

Q-162 With Power BI Publish to web, you can easily embed interactive Power BI visualizations online, such as in blog posts, websites, through emails or social media, on any device.

You have published a visualization but unfortunately changes to the underlying data are not immediately visible to users. What might be wrong?

- 1) We must refresh the data manually to the web
- 2) It takes upto an hour for the data to refresh
- 3) It's not possible to update/refresh the data after publishing on the web, visuals are static
- 4) User is restricted by RLS

Q-163 The DAX FORMAT function is used to convert a value to text according to the specified format that you provide as the second argument to the function. Which DAX expression below would format the number so that it's displayed as 40.00%?

- 1) FORMAT(0.4,"Percent")
- 2) FORMAT(0.4,"p")
- 3) FORMAT(0.4,"%")
- 4) FORMAT(40,"Percent")

Q-164 You have noticed a large spike in your gross-margin between July and august 2020. You want to find out the reason for this though you are not sure what to analyse.

What Feature can you use here?

- 1) Use Q&A visual and ask 'Why have sales increased from July to august 2020?'
- 2) Right click on the month's value, select analyse and choose 'Explain the Increase'
- 3) Use Azure ML visual and drag in the gross margin field to the 'Explain' bucket.
- 4) Call DV (your data analyst)

Q-165 You drag the field into the 'Explain by' bucket of the decomposition tree visual and they don't appear as nodes/leaves in the visual. Why?

- 1) The decomposition tree is a preview visual – once the feature is enabled (under file → options) the field will appear in the visual
- 2) You cannot enter attributes/dimensions in the 'Explain by' bucket – it has to be other measures
- 3) The fields that are entered into 'Explain by' are possible splits that you (or an end user) can then choose from in terms of how to analyse the metric using the visual.
- 4) The field that have been entered are from dimension table which have no relationship with the metric being analysed

Q-166 What is the difference between groups and bins in Power BI?

- 1) You would use groups with text values(Categories/attributes) and bins with numerical values.
- 2) Groups work with dax whereas bins use M
- 3) Groups and bins are identical.
- 4) Groups are grouping of text values and bin is actually a dust-bin for power bi which contains deleted values of data.

Q-167 You create a Bar Chart visual showing Quarter wise sales for year 2020.

(Assume sales on y-axis and bars of Q1,Q2,Q3,Q4 ON xaxis)

You want a separate color for Q1 bar, how do you achieve it?

- 1) Conditional Formatting
- 2) Groups
- 3) Calculated Column
- 4) Calculated Measure

Q-168 Tree map belong to which Visual Segment?

- 1) Comparison
- 2) Composition
- 3) Distribution
- 4) Relation

Q-169 KPI belongs to which visual segment?

- 1) Comparison
- 2) Composition
- 3) Distribution
- 4) Relation

Q-170 You have a line chart , with

Sales on Y-axis and dates on X-axis. The visual shows Jan 2020,Jul 2020,... on X axis instead of Months (like Jan,Feb,Mar....)

What do you do?

- 1) Increase the minimum category width of the X-axis in the formatting pane
- 2) Increase the 'Maximum Size' of the X-axis in the formatting pane
- 3) Change the X-axis from type 'Continuous' to type 'Categorical'
- 4) Reduce the text size on X-axis



## SUBJECTIVE QUESTIONS

Q-1 Describe all types of Visual segments with examples.

Q-2 Difference between a report and a Dashboard

Q-3 What are Many-to-Many relationships?

Q-4 DirectQuery vs Import?

Q-5 What are advantages of using Variables?

Q-6 Can SQL be used in Power Query Editor?

Q-7 Define Power BI's Q&A?

Q-8 Define Data Security in Power Bi?

Q-9 Consider functions like SUM,SUMX and AVERAGE,AVERAGEEX. What is this X implying?

Q-10 Why use Calculated measure over Calculated column whenever possible?



Q-11 Explain different types of filters in Power Bi? Is RLS a filter?

Q-12 What is Power BI Embedded?

Q-13 State the difference between COUNT and COUNTD Function?

Q-14 In DAX functions like VAR.S & VAR.P, what are the P&S implying?

Q-15 What is equivalent of Append Queries in DAX? State Syntax also

Q-16 Explain the types of Joins in Power Bi Query editor?

Q-17 What are the types of tables in Power Bi?

Q-18 How to represent different levels of hierarchy of data in one single visualization?

Q-19 Name some important charts and state why they are important for you?

Q-20 What is Bookmark? How do you create it?

Q-21 Give an example of a visual from Power BI which serves as a Cross-Table? Is table visual right?

Q-22 How to create Heirarchies in Power BI?

Q-23 What are main three fundamental tabs of Power BI Desktop?

Q-24 Tell all the data-types available in Power Bi?

Q-25 Tell two ways to navigate in Reports.

Q-26 How to import/Scrape data from web using Power Bi?

Q-27 Can you calculate Correlation using dax as there is no predefined function for it? Consider Table with columns Sales, Area. Find the correlation coefficient between them. Formula below --

$$r = \frac{1}{n-1} \sum \left( \frac{x - \bar{x}}{s_x} \right) \left( \frac{y - \bar{y}}{s_y} \right)$$

Q-28 You want to create a line chart showing Quantity by the invoice date.

There exist an active relationship between Date Column from the Date table and delivery date column from the Sale table.

Now You notice that there is a relationship between the Date column from the Date table and the Invoice Date Key column from the Sale table, but the relationship is inactive. All other visuals in your report will be analyzing values by delivery date. How should you approach this problem? Give reason for your approach?

Q-29 How can you make sure that each category manager can see sales of their category only and allow the CEO to see all sales in a single report? Your solution must involve minimal effort.

Q-30 Any Difference between Histograms and Bar charts?

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## TABLEAU Interview Questions

**Instructions to solve the Questions:**

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favored.**
  - 4. For MCQ's also, provide the reason for your answer with example to support it.**
- 

1. Which is not a component of Tableau
  1. VizQLServer
  2. Gateway
  3. Repository
  4. Tiles
2. Which Is a Tableau file extension
  1. .tdl
  2. .tdl
  3. .tde
  4. .tdi
3. Which is not a datatype available in tableau
  1. Text
  2. Date
  3. Region
  4. Character
4. Recognize a filter from tableau
  1. Context Filter
  2. Cross-Drill Filter
  3. Hide Filter
  4. URL Filter
5. Green Pill symbolizes Dimension
  1. True

2. False
6. Which is not a Filter Pane in Tableau
1. Condition Tab
  2. Slicer
  3. Wildcard Tab
  4. Exclude/Include Tab
7. Which of the following is not a Trend Line model
1. Linear Trend Line
  2. Exponential Trend Line
  3. Binomial Trend Line
  4. Logarithmic Trend Line
8. Can the same measure be used twice in a single view
1. No
  2. Yes
9. Which explains the order of data representation in data section
1. Parameters > Sets > Measure > Dimension
  2. Measure > Dimension > Parameters > Sets
  3. Sets > Parameters > Dimension > Measure
  4. Dimension > Measure > Sets > Parameters
10. Sets can be created on Dimensions as well as measures?
1. True
  2. False
11. Tableau cannot hide the unused fields.
1. True
  2. False
12. Story Boards is the key feature of Tableau
1. True
  2. False
13. Which of the following charts is best suited for Comparison
1. Scatter Chart
  2. Pie Chart
  3. Line Chart
  4. Histogram
14. Best Visual for static values
1. Pie Chart
  2. Stocked Column Chart
  3. Scatter Chart
  4. Bubble Chart
15. Which of the following chart will best depict sales of Audi, Mercedes, Bentley for the period of 3 years.
1. Waterfall Chart
  2. Bubble Chart
  3. Line Chart

4. Bar Chart
16. Identify continuous field
1. Region
  2. Address
  3. Profit
  4. Ship Date
17. Which color is the dimension pill
1. Blue
  2. Red
  3. Yellow
  4. Green
18. Tableau uses \_\_\_\_\_ chart by default to show time values
1. Table
  2. Histogram
  3. Bar
  4. Line
19. Measures can be converted into dimensions
1. True
  2. False
20. To view a discrete set of values in a continuous range of values which is an apt visual?
1. Scatter Plot
  2. Line
  3. Histogram
  4. Waterfall
21. Pick a file extension for tableau projects
1. Tableau Packaged Workbook [.twbx]
  2. Tableau Workbook [.twb]
  3. Tableau Data Source [.tds]
  4. All of the above
22. Which should be picked to place on the colors card
1. PostalCode
  2. Discount
  3. Region
  4. Quantity
23. Do I need to write a separate calculation for viewing top 10 Cities with maximum sales?
1. Yes
  2. No
24. A sheet cannot be used within a story directly.
1. True
  2. False
25. Sets can be created on dimensions?
1. True
  2. False
26. # in tableau shows?
1. Data Literal

- 2. Measure
  - 3. Dimension
  - 4. Parameter
27. Macro is a concept of Tableau
- 1. True
  - 2. False
28. Which does not belong to the Product suite that tableau offers?
- 1. Reader
  - 2. Desktop
  - 3. Private
  - 4. Public
29. Is there a QnA feature in Tableau?
- 1. Yes
  - 2. No
30. Is there a drill up/ drill down feature in tableau?
- 1. Yes
  - 2. No
31. Which is not a join available in tableau?
- 1. Inner
  - 2. Outer
  - 3. Left
  - 4. None of the above
32. DAX functions belong to tableau
- 1. True
  - 2. False
33. Tableau gives you access to additional marketplace?
- 1. Yes
  - 2. No
- 34. What is the meaning of forecast option in analysis menu**
- 1. Used to export an img of the story
  - 2. To show forecast based on available data
  - 3. Is used to set the layout in terms of colors
  - 4. To update the story with latest data from source
35. What is the meaning of maps layers option in the map menu
- 1. To show forecast based on available data
  - 2. To hide and show map layers, such as street names and country borders and add data layers
  - 3. To create new geographic roles and assign them to the geographic fields in your data
  - 4. Is used to create additional fields based on certain calculation on existing fields
36. If you publish your data to tableau public, who can view it?
- 1. Open to everyone
  - 2. Only people with a license

**37. Does dashboards contain multiple worksheets which are linked. so the action in any of the worksheet can change the results in the dashboard accordingly?**

1. Yes
2. No

**38. View could be highlighted using?**

1. Filters
2. Aggregations
3. Labelling
4. All of the above.

**39. Which is not a shelf from Tableau**

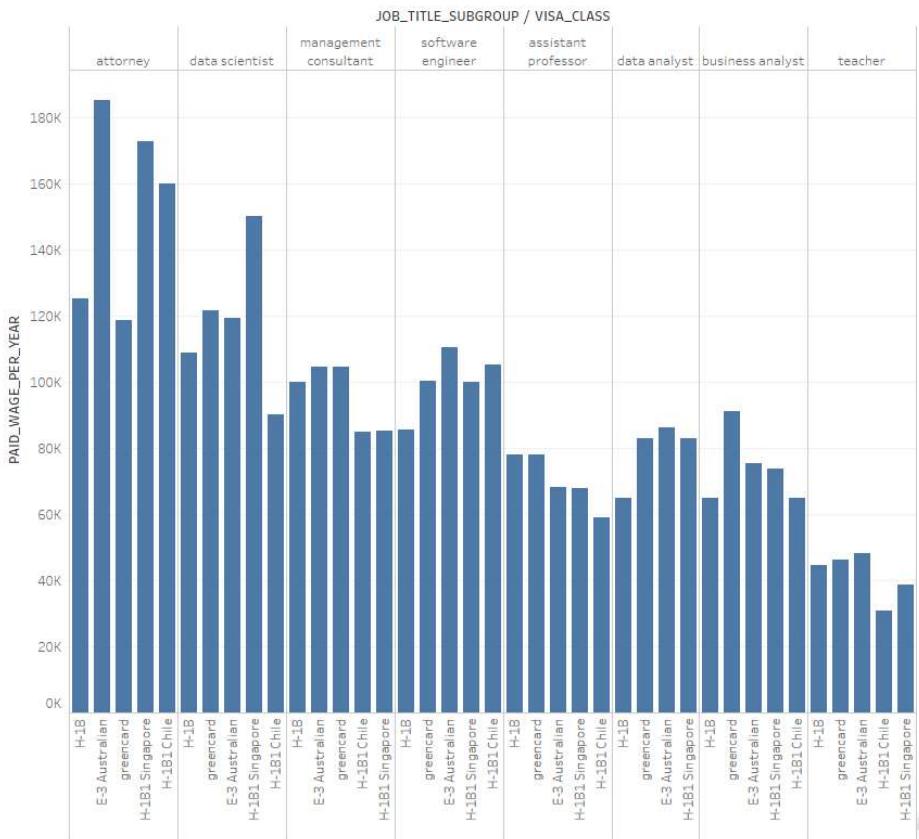
1. Row and Column
2. Filter
3. Parameter
4. Marks

**40. What is the meaning of geocoding option in map menu?**

1. Is used to export an image of the story
2. To create new geographic roles and assign them to the geographic fields in your data
3. Is used to set the layout in terms of colors and sections of the story
4. To hide and show map layers, such as street names and country borders and add data layers

**41. Identify shelf from Tableau**

1. Data
2. Pages
3. Report
4. Model



Answer the following questions related to the chart above.

42. What should be placed in the row shelf?

1. PAID\_WAGE\_PER\_YEAR
2. VISA\_CLASS
3. JOB\_TITLE\_SUBGROUP
4. Cannot comment

43. What should be placed on the column field

1. PAID\_WAGE\_PER\_YEAR
2. VISA\_CLASS
3. JOB\_TITLE\_SUBGROUP
4. Cannot comment

44. Which visual chart is used?

1. Basic Bar Chart
2. Combo Bar Chart
3. Dual Axis Bar Chart
4. Clustered Bar Chart

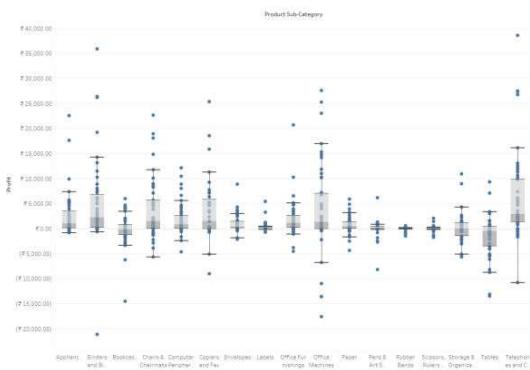
45. Which is a valid statement

1. Citizen with green card have the highest paid wages

2. Data Scientist with green card are paid more wages than combined avg of H1B1-Singapore and H1B1-Chile
3. Data Analyst with E3-Australian Visa is paid the least
4. None of the above
46. Data Analyst with E3-Australian Visa is paid the highest
1. True
  2. False
47. After which Layer does tableau fit in the below option
1. Database Layer
  2. Data Interaction Layer
  3. Data Modelling Layer
  4. Service Layer
48. Personal Version is preferred for Big Data.
1. True
  2. False
49. Tableau Server is Located in
1. Europe
  2. Australia
  3. Dubai
  4. Canada
50. Discrete Variables are also called as Measures
1. True
  2. False
51. Continuous Variables are also called as Measures
1. True
  2. False
52. Dependent Variables are usually all Measures
1. True
  2. False
53. Tableau provides a default model view
1. True
  2. False
54. Creation of Custom Filters is possible with Tableau?
1. True
  2. False
55. Best way to find Outliers is?
1. Manually search in the table
  2. Filter directly on the data source and delete
  3. Using trend analysis by forming groups & filters
  4. Does not affect the analysis
56. Sum[x,y] falls under which type of calculation
1. Number
  2. Aggregate

- 3. Logical
  - 4. User
57. Variables in calculation field are represented with
- 1. Orange
  - 2. Green
  - 3. Blue
  - 4. Red
58. Blue fields in the calculations are aggregates
- 1. True
  - 2. False
59. # represents \_\_\_\_\_ in Tableau.
- 1. Parameter
  - 2. Group
  - 3. Calculation Field
  - 4. Dimension
60. Newly created Calculated Fields are listed under Dimension
- 1. True
  - 2. False
61. Newly created Calculated Fields are listed under Measures
- 1. True
  - 2. False
62. The data source uploaded initially is always
- 1. External data source
  - 2. Primary Data Source
  - 3. Secondary Data Source
  - 4. Internal Data Source
63. Tableau allows dynamic selection of primary and secondary data sources?
- 1. True
  - 2. False
64. Dashboard is a feature unique to tableau?
- 1. True
  - 2. False
65. A good reason to use bullet graph is?
- 1. Displaying sales growth
  - 2. Adding data to bins and calc. Count measure
  - 3. Analyzing the trend for a time period
  - 4. Comparing the actual against the target sale
66. The icon associated with the field that has been grouped is a \_\_\_\_\_
- 1. Paper Clip
  - 2. Set
  - 3. Hash
  - 4. Equal To
67. What is the meaning of the cell size option in format menu
- 1. To customize the size of the cells displaying data
  - 2. To assign a title and caption

- 3. To create additional fields based on calc.
  - 4. Apply theme to the entire workbook
68. What does publishing data source mean?
- 1. To export an image of story
  - 2. To publish the workbook in the server used by others
  - 3. To publish the source data used in the workbook
  - 4. Used to give a chance to user for dynamically changing data members at runtime.
69. Can you create your own Hierarchy in tableau?
- 1. True
  - 2. False
70. Can we create different worksheets to create different view on the same data or different data.
- 1. Yes
  - 2. No
71. .Twb format allows the stakeholders to directly view the report with data imports?
- 1. True
  - 2. False
72. Which of the following is not an advantage of tableau?
- 1. Widely used by Data Analyst
  - 2. Story Feature
  - 3. Multiple visual creation on the same sheet
  - 4. Wide option available to import large dataset
73. Which is not a practice around dimensions and measures
- 1. Double Click
  - 2. Drag and Drop
  - 3. Point and Click
  - 4. None of the above
74. Is a manual sort possible in Tableau
- 1. True
  - 2. False
75. Visual Chart suggestion is not a default feature of Tableau
- 1. True
  - 2. False
76. Customization of Axis Header is possible with Tableau
- 1. True
  - 2. False
77. At a time only a single field can be created using highlighter.
- 1. True
  - 2. False
78. Screen Dimension are customizable in Tableau
- 1. True
  - 2. False
79. Tableau is best fit for?
- 1. Visual Drag n Drop operation
  - 2. Data Discovery

3. Statistical Modelling  
 4. ETL Operations
80. Is it possible to deploy a URL action on a dashboard object to open a Web Page within a dashboard rather than opening the system's web browser?
1. True, with the use of Tableau Server
  2. True, with the use of a Web Page object
  3. False, not possible
  4. True, requires a plug-in
81. A sheet cannot be used within a story directly. Either sheets should be used within a dashboard, or a dashboard should be used within a story.
1. True
  2. False
82. Sets can be created on Measures.
1. True
  2. False
83. Tableau is not capable to?
1. Wizard driven visual analysis
  2. Centralized server
  3. Ad-hoc discovery
  4. None of the above
84. For creating variable size bins we use \_\_\_\_\_
1. Calculation Fields
  2. Sets
  3. Groups
  4. Table Calculation
85. What is the below graph called?
- 
1. Candle Plot
  2. Scatter Line Plot
  3. Box Plot
  4. Cylinder Plot
86. Longitude and Latitude are to be created externally by the analyst?
1. True
  2. False
87. Sales/Profit can be considered as a continuous field?
1. True

- 2. False
88. Swapping rows with columns on a dual axis graph will throw an error.
- 1. True
  - 2. False
89. Customizing donut chart is a default feature in tableau.
- 1. True
  - 2. False
90. Can Measures can be converted to dimensions ?
- 1. True
  - 2. False
91. By default all numeric values are listed under measures
- 1. True
  - 2. False
92. Which is not a strength of Tableau
- 1. Mobility
  - 2. Self Service BI
  - 3. Big Data Connectivity
  - 4. Enterprise Deployment
93. Treemaps are static, No grouping of categories is possible.
- 1. True
  - 2. False
94. Customizing tooltip to visuals on hover is a feature available in Tableau
- 1. True
  - 2. False
95. R functions and R models are used in Tableau?
- 1. True
  - 2. False
96. Data blending is used for?
- 1. To merge data from the same source
  - 2. To merge data two different folders in the same location.
  - 3. To merge data placed in different locations.
  - 4. None of the above
97. Can you automate the tableau reports?
- 1. Using Tableau Public
  - 2. Using Tableau Online
  - 3. Using Tableau Desktop
  - 4. Using Tableau Server
98. Which function is used to check the current date and time?
- 1. ISDATE()
  - 2. CURRENTDATE()
  - 3. NOW()
  - 4. DATE()
99. Which is not a valid file extension for tableau
- 1. .tds
  - 2. .tbd

- 3. .tdl
  - 4. .tps
100. Which is not a data type in tableau?
- 1. String
  - 2. Text
  - 3. Number
  - 4. Date
101. Which of these methods saves all worksheets in your visualization
- 1. Worksheets
  - 2. Workbooks
  - 3. Bookmarks
  - 4. Dashboards
102. Can one visual chart have two x-axis or y-axis?
- 1. Yes
  - 2. No
103. Tableau supports live data connection
- 1. Yes
  - 2. No
104. Drill down can be only performed if there is an existing hierarchy in the workspace?
- 1. Yes
  - 2. No
  - 3. May be
105. Extraction of data after filtering from a data source is possible?
- 1. Yes
  - 2. No
106. Groups can be formed random like clusters?
- 1. True
  - 2. False
107. Sets is used for individual clustering while creating a visual
- 1. Yes
  - 2. No
108. Grouping is limited to columns with hierarchy?
- 1. True
  - 2. False
109. What does creating alias in tableau mean?
- 1. Creating same columns with different column names
  - 2. Having same column name but different name for column elements
  - 3. Means to rename measure
  - 4. None of the above
110. Which is a license that tableau offers
- 1. Tableau Desktop License
  - 2. Tableau Public License
  - 3. Tableau Viewer License

- 4. Tableau CAL License
- 111. Alias should be created with measure.
  - 1. True
  - 2. False
- 112. Alias are used under dimensions usually?
  - 1. True
  - 2. False
- 113. Grouping is best defined as?
  - 1. Collection of similar elements
  - 2. Customized collection of elements
  - 3. Unique collection of elements.
  - 4. Random collection of elements
- 114. Group icon is
  - 1. HashTag
  - 2. Paperclip
  - 3. Tree
  - 4. Abc
- 115. Tableau supports data extracts from?
  - 1. MySql
  - 2. Postgres
  - 3. MS Sql Server
  - 4. All of the above
- 116. Grouping will overwrite the existing values of that particular dimension.
  - 1. True
  - 2. False
- 117. Grouping can be used as a normal dimension
  - 1. True
  - 2. False
- 118. Grouping in measure is possible?
  - 1. True
  - 2. False
- 119. Sets can be combined?
  - 1. True
  - 2. False
- 120. Joining of sets is same as data blending
  - 1. Yes
  - 2. No
- 121. Data type of both set must be same is a requirement of Tableau
  - 1. Yes
  - 2. No
- 122. Shared axis in Tableau is for ?
  - 1. Two Measures
  - 2. Two Dimensions
  - 3. Two Sets
  - 4. Two Group

123. Which of the following is not a filtering option in tableau
1. Top
  2. Condition
  3. Wildcard
  4. None of the Above
124. Default aggregation used for tree map
1. Sum
  2. Avg
  3. Count
  4. Count Distinct
125. Tableau is supported on a mobile device
1. True
  2. False
126. Tableau allows you to join multiple as per your flexibility
1. Yes there is no limit
  2. Yes but the limit is 27
  3. There is a possibility but the limit is above 50 Tables
  4. No is not feasible, the limit is 32
127. Testing is a latest add on feature offered by tableau before the visualization stage
1. True
  2. False
128. Tableau supports SQL queries?
1. Yes
  2. No, not yet added.
129. Select the one that census info in geocoding option
1. Tableau Server
  2. Longitude, Latitude
  3. Metadata
  4. Data Layer in geospatial analysis
130. Cascading filters are same as joining of sets
1. Yes
  2. No
131. Tableaus performance is dependent on?
1. Data source
  2. Data Geographical location
  3. Time the data source takes to execute query
  4. None of the above
132. Select one which is compatible with Tableau
1. Python 2
  2. Python 3
  3. Java
  4. R
133. Tableau SDK is downloaded within the tableau set up file
1. True
  2. False

134. Tableau SDK is an add on kit for?
1. Building RESTful API
  2. Connect to a data source
  3. Eclipse, Visual Studio
  4. All of the above
135. Which is included in Tableau SDK
1. Extract API
  2. Server API
  3. Both
  4. None of the above
136. Tableau SDK supports?
1. C, C++
  2. Python 2.x and Python 3.x
  3. Java
  4. All of the above
137. Tableau SDK does not work on
1. Fedora
  2. CentOS
  3. Ubuntu
  4. None of the above
138. Tableau SDK is compatible with which OS
1. Windows
  2. Linux
  3. Mac OS X
  4. All of the above
139. Updates from the data source
1. Is it auto updated
  2. Manual updation is required
  3. We can customize the option
  4. None of the above
140. Custom geocoding can be used to plot data on the map?
1. Yes
  2. No
141. In Mobile views dynamic scrolling can be attained
1. True
  2. False
142. Tableau follows which schema
1. Hybrid
  2. Snowflake
  3. Star
  4. None of the above
143. Which filter is applied at the data source level?
1. Context Filter
  2. Quick Filter
  3. Local Filter

4. Global Filter
144. Which table calculation shows the rate of change?
1. Percentage difference from
  2. Difference from
  3. Percent from
  4. Percentage of total
145. What is an invisible filter?
1. Can be applied to view but not exposed to user
  2. Filter is only displayed with correct data blending
  3. Type of filter in Tableau used for dashboard design
  4. None of the above
146. Which of the following allow users to select or input a value in a view and that value can then in turn be used in calculations, and subsequently, filters.
1. Calculated fields
  2. Captions
  3. Parameters
  4. Tooltips
147. Dashboard layout containers allow you to \_\_\_\_\_
1. Create an area in the dashboard where objects automatically adjust their size and position based on the other objects in the container
  2. Create an area in the dashboard where objects maintain its predetermined size and position.
  3. Add sheets and other objects in the dashboard without affecting any formatting
  4. Add a dashboard within a dashboard
148. Where can the list of parameters not be used
1. Filters
  2. Binned Measures
  3. Reference Line
  4. Pages
149. Sorted field is denoted in?
1. Green
  2. Blue
  3. Italic
  4. Bold
150. Containers for shelves, legends and other controls are represented as?
1. Cards
  2. Shelves
  3. Marks
  4. Page
151. Which shelf allows you to encode data by assigning different shapes to the marks in a data view
1. Icon shelf
  2. Shape shelf
  3. Label shelf
  4. Page shelf

152. Displays the fields of the data sources to which Tableau is connected. The fields are divided into dimensions and measures. It also displays custom fields such as calculations, binned fields, and groups
1. Data Window
  2. Dashboard
  3. Data Source
  4. Bookmarks
153. Text tables is well known as
1. Axis
  2. Cell
  3. Caption
  4. Cross Tab
154. Is a representation of your data in a Tableau worksheet or dashboard.
1. Dimensions
  2. Data Window
  3. Data view
  4. Data source
155. What is a secondary Table calculations
1. Calculations performed from the results of the previous calculations
  2. Calculations that applies to all of the data in the table
  3. Another name for calculated field
  4. Calculations performed at the data source level
156. In dual axis which is a good practice
1. Edit Axis
  2. Dual Axis
  3. Sync Axis
  4. Format Reference Line
157. What is presentation mode?
1. A view from a user's perspective.
  2. Removes legends, quick filters, parameter controls to allows easy integration with Power Point
  3. Read only version of your view
  4. Hides the data window, toolbars, workspace controls, and view cards
158. Tableau supports all browsers
1. True
  2. False
159. Which is an option for wildcard filter
1. Contains
  2. Starts with
  3. Ends with
  4. All of the above
160. Calculated fields are represented as an equals
1. True
  2. False
161. All items in the data pane must have unique value

1. True
  2. False
162. Parameters can have the same names?
1. Yes
  2. No
163. Count and CountD null values are included
1. True
  2. False
164. When using DATEPART, which of the following is not a valid value?
1. Months
  2. Days
  3. Dayofyear
  4. Is-Weekday
165. DATE(2018-12-11 22:12:09) is a valid expression?
1. True
  2. False
166. ZN function returns?
1. Zero when TRUE
  2. Returns value if exist else returns NULL
  3. Returns value if exist else returns zero when Null
  4. Returns 1 if is a value else returns null
167. Which is not a valid function
1. RUNNING\_COUNT
  2. RUNNING\_COUNTD
  3. RUNNING\_SUM
  4. RUNNING\_AVG
168. SCRIPT\_function returns result from an external service
1. True
  2. False
169. IF part of an expression can return a different data type from the ELSE part.

1. True
  2. False
170. The LOOKUP function
1. Returns the number of rows from the current row to the first row in the partition.
  2. Returns the value of the expression in a target row, specified as a relative offset from the current row.
  3. Returns the number of rows from the current row to the last row in the partition.
  4. Returns the value of this calculation in the previous row.



## **Subjective Questions :**

1. What Are the Filters? Name the Different Filters in Tableau.
2. There Are Three Customer Segments in the Superstore Dataset. What Percent of the Total Profits Are Associated with the Corporate Segment?
3. Different joins available in Tableau?
4. What is the Difference Between Joining and Blending?
5. Is There a Difference Between Sets and Groups in Tableau?
6. What is a Parameter in Tableau? Give an Example.
7. What is the Rank Function in Tableau?
8. Define aggregation and disaggregation in tableau?
9. What is a context filter and what are its limitations?
10. What are Schedules and Extracts in a Tableau server?
11. Name the components of the dashboard?
12. What is the page shelf?
13. What is the maximum number of tables that can be joined?
14. What are shelves and sets?
15. Display top 5 and last 5 records in a single view?
16. Why we Need Actions in Tableau?
17. Difference between parameters and filters
18. What is the difference between the quick filter and the normal filter in Tableau?
19. How can we combine a database and the flat file data in Tableau Desktop?
20. How do we use parameters in Tableau?
21. What is a blended axis?
22. List the various datatypes in Tableau?
23. Difference between data joining and data blending
24. What are context filters?
25. Explain the term filter actions
26. Bar graph vs Histogram
27. What are the types of Tableau combined sets?
28. Explain the classification of tableau
29. TreeMap Vs Heat Map
30. What is the use of a blended axis?
31. What is the use of dual-axis?
32. Explain bin

# SQL Interview Questions

**Instructions to solve the Questions:**

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favored.**
  - 4. For MCQ's also, provide the reason for your answer with example to support it.**
- 

- 1) What is the role of SQL?
  - a) Store data
  - b) Manipulate data
  - c) store, manipulate and retrieve data
  - d) Create table



- 2) Identify the primary key

- a) Customer name
- b) Phone number
- c) CustomerID
- d) Postal code

- 3) What does CREATE INDEX do?

- a) Creates a Search key
- b) Creates a primary key
- c) Creates a foreign key
- d) Select the file

- 4) What does this operator <> signify?
- a) Between a certain range
  - b) Not equal
  - c) Specifies multiple values in column
  - d) Search in a table
- 5) Which of the following syntax is correct?
- a) SELECT \* FROM customerorderbycountry
  - b) SELECT Customer\_name from Customer ORDER BY Country DESC;
  - c) SELECT \* FROM Customer ORDER BY Country DESC
  - d) SELECT Customer\_name FROMCustomer ORDER BY Country DESC;
- 6) Which of the following syntax is correct?
- a) INSERT INTO Country( Country\_name, City, State);
  - b) INSERT INTO Country ( Country\_name, City, Region)VALUES (India, Mumbai, Maharashtra);
  - c) INSERT INTO Country ( Country\_name, City, Region)VALUES ('India',' Mumbai', 'Maharashtra')
  - d) INSERT INTO Country ( Country\_name, City, Region)VALUES ('India',' Mumbai', 'Maharashtra');
- 7) If we omit the where clause in UPDATE. What will happen?
- a) No change
  - b) All records will be updated
  - c) Error
  - d) Updates the database

8) Which database system supports ROWNUM?

- a) Oracle
- b) MySQL
- c) NoSQL
- d) DBMS

9) What does LIKE 'a\_\_% means?

- a) Finds a values that's starts with a
- b) Finds a values which have a in any position
- c) Finds a values that starts with a and are at least 2 character in length
- d) Finds a values that starts with a and are at least 3 character in length

10) Which of the following is a wildcard character?

- a) =
- b) <
- c) >
- d) %

11) What does % represents

- a) Returns the modulus
- b) Divide the function
- c) Represents zero or more characters
- d) Returns percentage

12) What does \_ represents

- a) Represents a single character
- b) Represents a break
- c) Represents a null value
- d) Represents a break between 2 characters

13) What does [] represents

- a) Represents a range of characters
- b) Represents any single character within the bracket
- c) Represents any single character
- d) Represents a null value

14) What does ^ represents

- a) Represents any character not in the bracket
- b) Represents any character
- c) Represents a single character
- d) Represents the whole word

15) What does - represents

- a) Represents a single character
- b) Represents any character
- c) Represents a range of characters
- d) Represents a null character

16) Alias exists

- a) For the duration of the query

- b) Permanently
- c) Till the system is shutdown
- d) Temporary
- 17) How is alias used in SQL. Identify the correct statement.
- a) SELECT Customer\_name ALIAS name FROM Customer;
- b) SELECT Customer\_name ALIAS\_NAME name FROM Customer;
- c) SELECT Customer\_name ALIAS\_NAME AS name FROM Customer;
- d) SELECT Customer\_name AS name FROM Customer;
- 18) CASE statement is similar to which statement?
- a) SWITCH
- b) IF THEN ELSE
- c) WHILE
- d) FOR
- 19) If there is no ELSE clause in CASE statement and no conditions are true, it returns:
- a) Error
- b) NULL
- c) Default value
- d) 0
- 20) What does COALESCE() function does
- a) Close the database
- b) Return the all null value in a list
- c) Return the first non-null value in a list

d) Return the all non-null value in a list

21) What is a stored procedure?

- a) A procedure that helps to store SQL queries
- b) A function that return the amount of storage
- c) A SQL code that you can save so that code can be reused over gain
- d) Return stored functions

22) What does “\*” signifies

- a) Multiplication
- b) Select
- c) Power off
- d) AND operator

23) What does LIKE operator does

- a) Search for the presence of a similar row in a specified table that meets certain criteria.
- b) Search for the presence of a row in a specified table that meets certain criteria.
- c) It is used to compare a value to a list of literal values that have been specified.
- d) It is used to compare a value to similar values using wildcard operators.

24) How to back up a SQL database

- a) BACKUP DATABASE Customer
- b) BACKUP DATABASE Customer;
- c) BACKUP DATABASE Customer TO DISK = ‘filepath’;
- d) BACKUP DATABASE Customer TO PATH = ‘filepath’;

25) What does a differential back up do?

- a) Reduces the backup time
- b) Increases the backup time
- c) Reduces the backup time by eta time
- d) None of the above

26) Which datatype can hold letters and numbers

- a) String
- b) Varchar
- c) Character
- d) Var

27) Which datatype can hold numbers

- a) Number
- b) Integer
- c) Int
- d) Num

28) What is the range of tinyint in SQL

- a) 0 to 150
- b) 0 to 250
- c) 0 to 255
- d) 0 to 215

29) What is the storage capacity of tinyint

- a) 1 byte

b) 2 byte

c) 3 byte

d) 4 byte

30) What is the storage capacity of int

a) 2 byte

b) 4 byte

c) 8 byte

d) 16 byte

31) What is the storage capacity of bigint

a) 4 byte

b) 16 byte

c) 8 byte

d) 256 byte

32) What is the storage capacity of smallint

a) 4 byte

b) 1 byte

c) 3 byte

d) 2 byte

33) Select the odd one out

a) NOT NULL

b) UNIQUE

c) DISTINCT

d) CHECK

34) What is foreign key

- a) It is a field in one table that refers to the primary key in another table.
- b) It is external key
- c) It is a candidate key
- d) It is a primary key

35) Identify the correct statement

- a) CREATE INDEX Id\_name;
- b) CREATE INDEX Id\_name ON Customer (Name)
- c) CREATE INDEX Id\_name ON Customer (Name);
- d) CREATE INDEX Id\_name IN Customer (Name)

36) VIEW can be deleted with which command

- a) Delete
- b) Drop
- c) Alter
- d) Viewdelete

37) Out of these which is the least powerful database system

- a) Oracle
- b) MySQL
- c) Access
- d) MS SQL Server

38) Select the odd one out

- a) Primary key
- b) Unique
- c) Null
- d) Default

39) Select the odd one out

- a) Primary key
- b) Foreign key
- c) Drop
- d) Index

40) Select the odd one out

- a) NOT NULL
- b) UNIQUE
- c) CHECK
- d) ISNULL

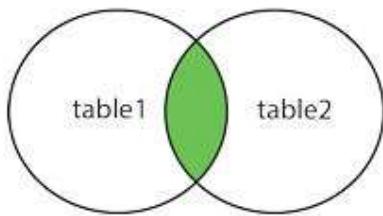
41) Select the option which is used to select discrete values

- a) COUNT
- b) SELECT
- c) SELECT DISTINCT
- d) WHERE

42) Which of these is used to return the number of records

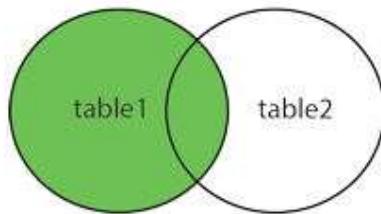
- a) WHERE

- b) SELECT TOP
  - c) SELECT
  - d) Index
- 43) Which of the following is used to specify different values in a WHERE clause
- a) IN
  - b) Foreign key
  - c) LIKE
  - d) Index
- 44) Which of the following is used to select values in the given range
- a) IN
  - b) SELECT
  - c) GROUP BY
  - d) BETWEEN
- 45) Which of the following is used with WHERE clause to add aggregate functions in SQL queries?
- a) HAVING
  - b) IN
  - c) SELECT
  - d) Index
- 46) Which JOIN does this figure represent:



- a) JOIN
- b) CENTER JOIN
- c) INNERJOIN
- d) UNION

47) Which JOIN does this figure represent:

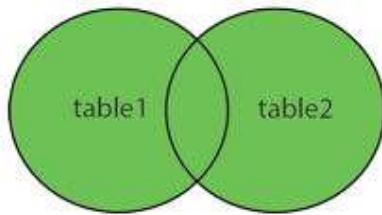


- a) LEFT JOIN
- b) JOIN
- c) SELF JOIN
- d) FULL JOIN

48) Which operator is used to combine two or more queries

- a) IN
- b) UNION
- c) JOIN
- d) FULL JOIN

49) Which JOIN does this figure represent:



- a) JOIN
- b) FULL JOIN
- c) UNION
- d) SELF JOIN

50) Which of the operator is used to test for the existence of a record in a sub query

- a) EXIST
- b) EXISTS
- c) IN
- d) WHERE



51) Which of the operator is used to limit the value range that can be placed in a column

- a) CHECK
- b) WHERE
- c) BETWEEN
- d) Index

52) Which of the following database system is powerful and robust?

- a) MS SQL Server
- b) Oracle
- c) MySQL

d) All of the above

53) Which of the following is used to insert values

- a) INSERT
- b) INSERT IN
- c) INSERT INTO
- d) INSERT TO

54) What does “\*” indicate in a SQL query

- a) Select
- b) Select all the columns from the table
- c) Select a particular column from the table
- d) None of the above

55) Write a SQL query to select all records from the Customer table select customer\_name column with age greater than 50

- a) SELECT \* FROM Customer WHERE age>16;
- b) SELECT Customer\_name FROM Customer WHERE age>50;
- c) SELECT Customer\_name FROM Customer;
- d) SELECT Customer\_name FROM Customer WHERE age>19;

56) Write a SQL query to select all records from the Customer table where the customer\_name ends with “a”

- a) SELECT \* FROM Customer WHERE Customer\_name LIKE '%a';
- b) SELECT \* FROM Customer WHERE Customer\_name LIKE '%a%';
- c) SELECT \* FROM Customer WHERE Customer\_name LIKE 'a%'
- d) SELECT \* FROM Customer WHERE Customer\_name LIKE '%%a';

57) Write a SQL query to select all records from the Customer table where the customer\_name is "Raj" and age = 20

- a) SELECT \* FROM Customer WHERE customer\_name = "Raj" AND age=20;
- b) SELECT \* FROM Customer WHERE customer\_name = "Raj" OR age=20;
- c) SELECT \* FROM Customer WHERE customer\_name > "Raj" AND age=20;
- d) SELECT \* FROM Customer WHERE customer\_name <>"Raj" AND age<>20;

58) Write a SQL query to select all records from the Customer table where the age is between 20 to 30

- a) SELECT \* FROM Customer WHERE age BETWEEN 20 OR 30;
- b) SELECT \* FROM Customer WHERE age BETWEEN 20 AND 30;
- c) SELECT \* FROM Customer WHERE age = (20 AND 30);
- d) SELECT age>20 AND age<30 FROM Customer;

59) Select the operator used for sorting the columns

- a) GROUP BY
- b) SORT
- c) ORDER BY
- d) SORT BY

60) Write a SQL query to select Customer\_name from the Customer table sorted in ascending order according to age

- a) SELECT \* FROM Customer;
- b) SELECT Customer\_name FROM Customer ORDER BY age;
- c) SELECT Customer\_name FROM Customer GROUP BY age;
- d) SELECT Customer\_name FROM Customer;

61) Write a SQL query to select all records from the Customer table where customer\_name has "am" in any position

- a) SELECT \* FROM Customer WHERE Customer\_name LIKE "%am";
- b) SELECT \* FROM Customer WHERE Customer\_name LIKE "%am%";
- c) SELECT \* FROM Customer WHERE Customer\_name LIKE "am%";
- d) SELECT \* FROM Customer WHERE Customer\_name LIKE "%a%";

62) Write a SQL query to select all records from the Customer table where customer\_name start with "a" and are at least 3 characters in length

- a) SELECT \* FROM Customer WHERE Customer\_name LIKE "%a";
- b) SELECT \* FROM Customer WHERE Customer\_name LIKE "a\_\_%";
- c) SELECT \* FROM Customer WHERE Customer\_name LIKE "%a\_\_";
- d) SELECT \* FROM Customer WHERE Customer\_name LIKE "%\_\_a";

63) Write a SQL query to select all records from the Customer table where customer\_name start with "a" and ends with "a"

- a) SELECT \* FROM Customer WHERE Customer\_name LIKE "a%a";
- b) SELECT \* FROM Customer WHERE Customer\_name LIKE "%a";
- c) SELECT \* FROM Customer WHERE Customer\_name LIKE "%a%";
- d) SELECT \* FROM Customer WHERE Customer\_name LIKE "a%";

64) Write a SQL query to select all records from the Customer table where customer\_name has "a" in the second position '\_r%'

- a) SELECT \* FROM Customer WHERE Customer\_name LIKE "%a";
- b) SELECT \* FROM Customer WHERE Customer\_name LIKE "%\_a";
- c) SELECT \* FROM Customer WHERE Customer\_name LIKE "a\_%";
- d) SELECT \* FROM Customer WHERE Customer\_name LIKE "\_a%";

65) Write a SQL query to create aliases of Customer\_name as name and region as area from Customer table

- a) SELECT Customer\_name ALIASES name, region ALIASES area FROM Customer;
- b) SELECT Customer\_name ALIASES NAME name, region ALIASES NAME area FROM Customer;
- c) SELECT Customer\_name AS name, region AS area FROM Customer;
- d) SELECT Customer\_name ALIASES name AND region ALIASES area FROM Customer;

66) Write a SQL query to create aliases of Cust\_name as Customer name from Customer table

- a) SELECT Cust\_name ALIASES Customer name FROM Customer;
- b) SELECT Cust\_name AS Customer name FROM Customer;
- c) SELECT Cust\_name ALIASES NAME Customer name FROM Customer;
- d) SELECT Cust\_name AS [Customer name] FROM Customer;

67) Write a SQL query to create aliases of Contact that includes email\_address and phone\_number from Customer table

- a) SELECT CONCAT(email\_address, phone\_number) AS Contact FROM Customers;
- b) SELECT CONCAT(email\_address, ', ', phone\_number) AS Contact FROM Customers;
- c) SELECT CONCAT(email\_address AND phone\_number) AS Contact FROM Customers;
- d) SELECT (email\_address + phone\_number) AS Contact FROM Customers;

68) Write a SQL query to selects all customers that are from the same City as the Salesperson

- a) SELECT \* FROM Customers WHERE City IN (Salesperson);
- b) SELECT \* FROM Customers WHERE City IS EQUAL TO City IN Salesperson;
- c) SELECT \* FROM Customers WHERE City IN (SELECT \* FROM Salesperson);
- d) SELECT \* FROM Customers WHERE City IN (SELECT City FROM Salesperson);

69) Write a SQL query to selects all customers that are in IT and Bank

- a) SELECT \* FROM Customers WHERE Job IN ('IT', 'Bank');
- b) SELECT \* FROM Customers WHERE Job = ('IT', 'Bank');
- c) SELECT \* FROM Customers WHERE Job == ('IT', 'Bank');
- d) SELECT \* FROM Customers WHERE Job EQUAL TO ('IT', 'Bank');

70) Write a SQL query to selects all customers with a Customer\_name starting with "a", "s", or "r"

- a) SELECT \* FROM Customers WHERE Customer\_name START '[asr]%' ;
- b) SELECT \* FROM Customers WHERE Customer\_name = '[asr]%' ;
- c) SELECT \* FROM Customers WHERE Customer\_name == '[asr]%' ;
- d) SELECT \* FROM Customers WHERE Customer\_name LIKE '[asr]%' ;

71) Which of the following is used to create and modify the tables in SQL

- a) Data definition language
- b) Data manipulation language
- c) Data query language
- d) Data control language

72) Which of the following is used to get some schema relation in SQL

- a) Data definition language
- b) Data manipulation language
- c) Data query language
- d) Data control language

73) Which of the following is used for manipulation in SQL

- a) Data definition language
- b) Data manipulation language
- c) Data query language

d) Data control language

74) Which of the following is used to deal with rights and permission in SQL

- a) Data definition language
- b) Data manipulation language
- c) Data query language
- d) Data control language

75) Which of the following is used to deal with transaction in SQL

- a) Data definition language
- b) Transaction control language
- c) Data query language
- d) Data control language

76) Which of the following is not a Data definition language command

- a) CREATE
- b) RENAME
- c) DROP
- d) SELECT

77) Which of the following is not a Data query language command

- a) CREATE
- b) RENAME
- c) DROP
- d) SELECT

78) Which of the following is not a Data manipulation language command

- a) INSERT
- b) UPDATE
- c) ALTER
- d) DELETE

79) Which of the following is a Data control language command

- a) GRANT
- b) REVOKE
- c) ALL OF THE ABOVE
- d) NONE

80) Which of the following is not a Transaction control language command

- a) COMMIT
- b) ROLLBACK

- c) SAVEPOINT
- d) CONTROL

81) Which of the following operator is used for searching the matching keyword in the database

- a) EXISTS
- b) LIKE
- c) SELECT
- d) WHERE

82) Which of the following operator is used for searching the void value in the database

- a) WHERE
- b) SELECT
- c) EXISTS
- d) IS NULL

83) Which of the following operator is used for selecting maximum value in the database

- a) SELECT
- b) MAX
- c) TOP
- d) IN

84) What is a view

- a) Virtual table based SQL query
- b) A command to view tables
- c) A command to see database
- d) None

85) Which of the following is not an aggregate function

- a) AVG
- b) STDEV
- c) VAR
- d) LEN

86) Which of the following operator is used to save the transactions in the database

- a) SAVEPOINT
- b) COMMIT
- c) COMMITS
- d) UPDATE

87) Which of the following operator is used to sets a checkpoint within the transactions in the database

- a) SAVE
- b) CHECKPOINT
- c) SET CHECKPOINT
- d) SAVEPOINT

88) Which of the following operator is used to specify the details of the transactions in the database

- a) DETAILS
- b) SET TRANSACTION
- c) TRANSACTION
- d) CHECK

89) Which of the following operator is used to withdraw user privileges in the database

- a) WITHDRAW
- b) REVOKE
- c) UPDATE
- d) NONE

90) Which of the following operator is used to give user privileges in the database

- a) GIVE
- b) GRANT
- c) USER
- d) PRIVILEGES

91) Write a SQL query to select countries with wind speed equal to 5

- a) SELECT Countries WHERE Wind\_speed=5;
- b) SELECT World WHERE Wind\_speed =5;
- c) SELECT Countries, Wind\_speed FROM World WHERE Wind\_speed=5;
- d) SELECT Countries, Wind\_speed FROM World WHERE Wind\_speed <>5;

92) Write a SQL query to select countries and sort them according to population

- a) SELECT Countries FROM World SORT BY Population;
- b) SELECT Countries FROM World ORDER BY Population;
- c) SELECT Countries ORDER BY Population;
- d) SELECT SORT BY (Countries) FROM World;

93) Write a SQL query to select countries where weather is neither rainy nor warm

- a) SELECT Countries, Weather FROM WORLD WHERE Weather NOTIN("rainy", "warm");
- b) SELECT Countries, Weather WHERE Weather NOT IN("rainy", "warm");
- c) SELECT Countries, Weather FROM WORLD WHERE Weather iIN("rainy", "warm");
- d) SELECT Countries, Weather FROM WORLD WHERE Weather;

94) Write a SQL query to select countries where weather is neither rainy nor warm or wind speed is equal to 5

- a) SELECT Countries, Weather, Wind\_speed FROM WORLD WHERE Weather IN ("rainy", "warm") OR Wind\_speed = 5;
- b) SELECT Countries, Weather, Wind\_speed FROM WORLD WHERE Weather BETWEEN ("rainy", "warm") OR Wind\_speed = 5;
- c) SELECT Countries, Weather, Wind\_speed FROM WORLD WHERE Weather NOT IN ("rainy", "warm") AND Wind\_speed = 5;
- d) SELECT Countries, Weather, Wind\_speed FROM WORLD WHERE Weather NOT IN ("rainy", "warm") OR Wind\_speed = 5;

95) Write a SQL query to select countries where wind speed is equal to India

- a) SELECT Countries FROM World WHERE Wind\_speed = ("India");
- b) SELECT Countries FROM World WHERE Wind\_speed = (SELECT Wind\_speed FROM World WHERE Countries = India);
- c) SELECT Countries FROM World WHERE Wind\_speed = ( WHERE Countries = India);
- d) SELECT Countries FROM World WHERE Wind\_speed = India;

96) Innerjoin is also called as

- a) Equijoin
- b) Leftjoin
- c) Centerjoin
- d) None

97) Write a SQL query to delete a Customer\_id column from Customer table

- a) ALTER TABLE Customer DELETE COLUMN Customer\_id;
- b) Customer DROP COLUMN Customer\_id;
- c) ALTER TABLE Customer DROP COLUMN Customer\_id;
- d) FROM TABLE Customer DROP COLUMN Customer\_id;

98) Write a SQL query to insert a Customer\_id column from Customertable

- a) ALTER TABLE Customer ADD COLUMN Customer\_id;
- b) ALTER TABLE Customer ADD Customer\_id;
- c) From Customer ADD COLUMN Customer\_id;
- d) TABLE Customer ADD COLUMN Customer\_id;

99) Which command is used to specify the limits in the table

- a) CHECK
- b) SPECIFY
- c) WHERE
- d) SELECT

100) Write a SQL query to delete Customer table

- a) DROP TABLE Customer;
- b) DELETE TABLE Customer;
- c) TRUNCATE TABLE Customer;
- d) ALTER TABLE Customer;

101) Which of the command is used with Wildcard

- a) IN
- b) WHERE
- c) LIKE
- d) SELECT

102) SQL role is to

- a) Create tables
- b) Create database
- c) Modify tables
- d) All of them

103) Select the correct SQL query

- a) SELECT \* FROM Customer WHERE age>10 AND <20;
- b) SELECT \* FROM Customer WHERE age>10 AND age<20;
- c) SELECT \* FROM Customer WHERE age>10, <20;
- d) SELECT \* FROM Customer;

104) Which of the following operator is used to count the number of rows

- a) COUNT()
- b) SUM()
- c) COUNT(\*)
- d) TOTALROWS(\*)

105) Which of the following operator deletes all the rows in a table

- a) TRUNCATE
- b) DELETE
- c) ALTER
- d) DROP

106) Write a SQL query to count all the not null rows in Customer table

- a) SELECT TOTAL() FROM Customer;
- b) SELECT TOTALROWS() FROM Customer;
- c) SELECT COUNT() FROM Customer;
- d) SELECT COUNT(\*) FROM Customer;

107) What is the role of ALTER

- a) Add
- b) Delete
- c) Modify
- d) All of the above

108) What is the role of UPDATE

- a) Update more than one row at a time
- b) Update the table
- c) Update the deleted row
- d) Update one row at a time

109) Write a SQL query to update the name from Ram to Rita in Customer table

- a) UPDATE SET Name = "Rita" WHERE Name = "Ram";
- b) MODIFY Customer SET Name = "Rita" WHERE Name = "Ram"
- c) ALTER SET Name = "Rita" WHERE Name = "Ram"
- d) UPDATE Customer SET Name = "Rita" WHERE Name = "Ram"

110) Write a SQL query to sort the Customer table according to age

- a) SELECT \* FROM Customer GROUP BY age;
- b) SELECT \* FROM Customer SORT BY age;
- c) SELECT \* FROM Customer ORDER BY age;
- d) SELECT \* FROM Customer SORT age;

111) How many tables can be joined by using JOIN clause

- a) 1
- b) 2
- c) 3
- d) All

112) How many total JOIN can be made on r tables

- a)  $(r-1)/2$
- b)  $r-1$
- c)  $r-2$
- d)  $(r-2)/2$

113) How many types of views does SQL has

- a) 1
- b) 3
- c) 4
- d) 2

114) Syntax for view is

- a) ALTER VIEW AS SELECT
- b) CREATE VIEW AS SELECT
- c) UPDATE VIEW AS SELECT
- d) MODIFY VIEW AS SELECT

115) Which of the following is the correct syntax to delete view

- a) DELETE VIEW
- b) DROP VIEW
- c) UPDATE VIEW
- d) ALTER VIEW

116) Write a SQL query to select all records with of Customer table where product equal to jam

- a) SELECT \* FROM Customer WHERE Product=jam;
- b) SELECT Customer WHERE Product=jam;
- c) SELECT \* FROM Customer WHERE Product="jam";
- d) SELECT \* FROM Customer, Product="jam";

117) Write the output of this SUBSTR('DOCTOR', 1,4)

- a) OCTO
- b) DOCT
- c) DCOD
- d) DT

118) Write an SQL query to extract substring from Customer\_name, starting from 1 with length 4 in Customer table

- a) SELECT SUBSTR(Customer\_name, 1, 4) FROM Customer;
- b) SELECT SUBSTR(Customer\_name, 1, 4) AS ExtractString;
- c) SELECT SUBSTR(Customer\_name, 1, 4);
- d) SELECT SUBSTR(Customer\_name, 1, 4) AS ExtractString FROM Customer;

119) Which of the following function returns the length of the string

- a) LEN()
- b) STRLEN()
- c) CHAR\_LENGTH()
- d) CHAR\_LEN()

120) Which of the following function returns the index position of a value

- a) INDEX()
- b) FIELD()
- c) POSITION()

d) INDEXPOSITION()

121) The FIELD() function perform which type of search

- a) Case sensitive
- b) Case insensitive
- c) None
- d) Both

122) Which of the following operators returns the position of a string within a list of strings

- a) FIND()
- b) INDEX()
- c) CHECK()
- d) FIND\_IN\_SET()

123) Which of the following functions adds two or more expressions together

- a) ADD()
- b) +
- c) CONCAT()
- d) ADDEXP()

124) Which of the following functions returns the index position of a value in a list of values

- a) INDEX()
- b) FIELD()
- c) POSITION()
- d) INDEXPOSITION()

125) What is the output of the following query SELECT FIELD("c", "a", "b");

- a) a
- b) b
- c) c
- d) 0

126) What is the output of the following query SELECT FIND\_IN\_SET("a", null);

- a) a
- b) 0
- c) NULL
- d) None

127) What is the output of the following query SELECT FIND\_IN\_SET("a", "");

- a) NULL
- b) a

- c) 0
- d) None

128) Which of the following function returns the position of the first occurrence of a string in another string

- a) INDEX()
- b) POSITION()
- c) INSTR()
- d) RETURN()

129) Which of the following is true for INSTR()

- a) It is case insensitive
- b) It is case sensitive
- c) It inserts the value in a string
- d) None

130) What is the output of the query SELECT LPAD("SQLQUIZ", 15, "PQR");

- a) PQR PQR PSQLQUIZ
- b) PQR PQR PSQLQUIZ
- c) PQRSQL QUIZ
- d) PQRSQLQUIZ

131) What is the output of the query SELECT LTRIM(" INTERVIEW");

- a) INTERVIEW
- b) INTERVIEW
- c) interview
- d) WEIVRETNI

132) Which of the following function extracts a substring from a string

- a) MID()
- b) STR()
- c) STRING()
- d) None

133) Which of the following function returns the position of the first occurrence of a substring in a string

- a) POSITION()
- b) INDEX()
- c) STR()
- d) INSTR()

134) What is the output of the query SELECT REPLACE("RAMSHARMA", "RAM", "RAJ");

- a) RAJ
- b) RAM
- c) RAJ SHARMA
- d) RAM SHARMA

135) What is the output of the query `SELECT STRCMP("RAMSHARMA", "RAJ SHARMA");`

- a) 0
- b) NULL
- c) FALSE
- d) -1

136) Which of the following function returns the arccosine of a number

- a) COSINE()
- b) COS()
- c) ACOS()
- d) NONE

137) What is the output of the query `SELECT CEIL(25.1);`

- a) 25
- b) 24
- c) 26
- d) 25.1

138) What is the output of the query `SELECT FLOOR(25.7);`

- a) 25
- b) 26
- c) 25.7
- d) 24

139) Which of the following functions returns the natural logarithm of a number

- a) LN()
- b) LOGARITHM()
- c) EXP()
- d) NONE

140) Which of the following function returns the current date

- a) DATE()
- b) CURDATE()
- c) CURRENT\_DATE()
- d) Both b and c

141) What is the output of the query `SELECT TRUNCATE(25.265, 2);`

- a) 25
- b) 26
- c) 25.26
- d) 25.37

142) Which of the following functions returns the number of days between two date values

- a) DATE
- b) DAYS
- c) DAYS\_IN\_BETWEEN
- d) DATEDIFF

143) What is the output of the query SELECT DATEDIFF("2020-01-25", "2020-01-5");

- a) 20
- b) 25
- c) 5
- d) 22

144) What is the output of the query SELECT DATE\_ADD("2020-01-25 03:45:25", INTERVAL -2 HOUR);

- a) 2020-01-25 05:45:25
- b) 2020-01-25 04:45:25
- c) 2020-01-25 01:45:25
- d) 2020-01-25 06:45:25

145) What is the output of the query SELECT DATE\_FORMAT("2020-01-25", "%M");

- a) 2020
- b) 01
- c) 1
- d) January

146) What is the output of the query SELECT DATE\_FORMAT("2020-01-25", "%M %Y");

- a) January 2020
- b) Jan 2020
- c) 01 2020
- d) 1 2020

147) What is the output of the query SELECT DATE\_SUB("2020-01-25", INTERVAL 10 DAY);

- a) 2020/01/15
- b) 2020-01-15
- c) 2020/01/14
- d) 2020/01/10

148) What is the output of the query `SELECT EXTRACT(MONTH FROM "2020-06-15");`

- a) June
- b) Jun
- c) 6
- d) 06

149) Which of the following functions returns a date from a numeric date value

- a) DATE()
- b) DATE\_NUM()
- c) FROM\_DAYS()
- d) FROM\_DAY()

150) What is the output of the query `SELECT LAST_DAY("2020-06-25");`

- A) 2020-06-25
- B) 2020-06-30
- C) 31
- D) 176

151) Which of the following functions returns the current date and time.

- a) CURRENT\_DATE()
- b) CURR\_DATE()
- c) LOCALTIME()
- d) DATE\_TIME()

152) Which of the following creates and returns a date based on a year and a number of days value

- a) CREATE\_DATE()
- b) MAKEDATE()
- c) CREATEDATE()
- d) None

153) What is the output of the query `SELECT MAKEDATE(2020, 3);`

- a) 2020-01-03
- b) 2020-03-01
- c) 2020-03-03
- d) None

154) What is the output of the query `SELECT MAKETIME(05, 30, 6);`

- a) 05:30:06
- b) 05-30-06
- c) 5:30:6
- d) None

155) Which of the following functions adds a specified number of months to a period

- a) ADDMONTHS()
- b) MONTHS()
- c) PERIOD\_ADD()
- d) ADD()

156) Which of the following functions returns the difference between two periods

- a) PERIOD\_DIFF()
- b) DIFF()
- c) DIFFERENCE()
- d) PERIOD()

157) What is the output of the query SELECT QUARTER("2020-08-25");

- a) 2
- b) 3
- c) 4
- d) August

158) What is the output of the query SELECT SEC\_TO\_TIME(256);

- a) 00:04:00
- b) 00:04:16
- c) 00:02:00
- d) 00:02:16

159) Which of the following functions returns a date based on a string and a format

- a) DATEFORMAT()
- b) DATE\_FORMAT()
- c) STR\_TO\_DATE()
- d) None

160) Which of the following functions compares two expressions and returns NULL if they are equal

- a) NULL()
- b) CHECK()
- c) NULLIF()
- d) IFNULL()

161) Which of the following functionS returns 1 or 0 depending on whether an expression is NULL

- a) NULLIF()
- b) IFNULL()
- c) NULL()
- d) ISNULL()

162) Which of the following statement goes through conditions and return a value

- a) CONDITION()
- b) WHERE
- c) CASE
- d) RETURN

163) Which of the following functions converts a value to a binary string

- a) BIN
- b) BINARY\_STRING
- c) BINARYSTRING
- d) BINARY

164) Which of the following functions converts a value into the specified datatype

- a) CONVERT\_TYPE()
- b) CAST()
- c) CONV()
- d) DATATYPE()

165) Write a SQL query to reverse the value in Customer\_name column

- a) SELECT REVERSE(Customer\_name);
- b) SELECT REVERSE(Customer\_name) FROM Customer;
- c) REVERSE(Customer\_name) FROM Customer;
- d) SELECT Customer\_name FROM Customer WHERE REVERSE(Customer\_name);

166) Write a SQL query to replace a "s" with "r" in a string "sql questions"

- a) SELECT REPLACE("sql questions", "s", "r");
- b) REPLACE("sql questions", "s", "r");
- c) SELECT REPLACE("s", "r");
- d) SELECT REP("sql questions", "s", "r");

167) Write a SQL query to add these several string together "East", "West"

- a) SELECT CONCAT("East ", "West ");
- b) CONCAT("East ", "West ");
- c) SELECT ADD("East ", "West ");
- d) "East " + "West "

168) Write a SQL query to convert the text to lowercase

- a) SELECT LOWERCASE("SQL");
- b) SELECT LOWER\_CASE("SQL");
- c) SELECT LCONVERT("SQL");
- d) SELECT LCASE("SQL");

169) Write a SQL query to find the length of the string

- a) SELECT LEN("SQL");
- b) SELECT LENGTH("SQL");
- c) LENGTH("SQL");
- d) SELECT STRLEN("SQL");

170) Write a SQL query to compare SQL and NOSQL

- a) SELECT CMP("SQL", "NOSQL");
- b) SELECT STR\_CMP("SQL", "NOSQL");
- c) SELECT STRCMP("SQL", "NOSQL");
- d) SELECT COMPARE("SQL", "NOSQL");

## Subjective Questions

1. Is semicolon used after sql? If yes/No, please justify the reason.
2. Difference between JOIN and UNION
3. Difference between order by and group by.
4. SELECT Person.Name, COUNT(Sales.SalesID) AS NumberOfSales FROM Sales INNER JOIN Person ON Sales.Person.ID=Person.PersonID WHERE Name = 'Ram' GROUP BY Name HAVING COUNT(Sales.SalesID) > 15;
5. Is SQL case sensitive
6. What does drop function does
7. What does truncate function does
8. What is a candidate key?
9. When can you compare the dates in SQL
10. What is the view? Explain with syntax
11. A view can be updated with which command
12. What is SQL injection
13. When does SQL injection occurs

14. What is batch of SQL statement
  15. What is ENUM
  16. What are the types of SQL commands
  17. What is the difference between Data definition language and Data manipulation language.
  18. What is a Data query language.
  19. What is a Data control language?
  20. What is Transaction control language
  21. What is a subquery. Explain with syntax.
  22. What are the types of views
  23. What is the difference between CONCAT and CONCAT\_WS function
  24. What is the difference between ATAN and ATAN2 function
  25. What is the difference between CEIL, FLOOR and ROUND function?
  26. What is a RAND() function
  27. What is the difference between LOCALTIMESTAMP and CURRENT\_TIMESTAMP
  28. Which function is used to create date and time
  29. Name three functions that specify current date and time.
  30. Which function returns the difference between two periods. And the result will be in which format.
-

# Python Interview Questions

## Instructions to solve the Questions:

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favoured.**
1. What is a frozen set in Python?
  2. When you exit Python, is all memory deallocated?
  3. Explain garbage collection with Python.
  4. What is the process to calculate percentiles with NumPy?
  5. Explain different ways to create an empty NumPy array in Python.
  6. How will you find, in a string, the first word that rhymes with ‘cake’?
  7. Explain How to create a series from a list, numpy array and dict?
  8. How to get the items of series A not present in series B?
  9. How to get the minimum, 25th percentile, median, 75th, and max of a numeric series?
  10. How to keep only top 2 most frequent values as it is and replace everything else as ‘Other’?
  11. How to bin a numeric series to 10 groups of equal size?
  12. How to find the positions of numbers that are multiples of 3 from a series?
  13. How to stack two series vertically and horizontally?
  14. How to get the positions of items of series A in another series B?
  15. How to compute the mean squared error on a truth and predicted series?
  16. How to calculate the number of characters in each word in a series?

17. How to convert a series of date-strings to a timeseries?
18. How to filter valid emails from a series?
19. How to compute the Euclidean distance between two series?
20. How to replace missing spaces in a string with the least frequent character?
21. How to create a TimeSeries starting '2000-01-01' and 10 weekends (saturdays) after that having random numbers as values?
22. How to fill an intermittent time series so all missing dates show up with values of previous non-missing date?
23. How to import only every nth row from a csv file to create a dataframe?
24. How to change column values when importing csv to a dataframe?
25. How to count the number of missing values in each column?
26. How to replace missing values of multiple numeric columns with the mean?
27. How to use apply function on existing columns with global variables as additional arguments?
28. How to find and cap outliers from a series or dataframe column?
29. How to create a new column that contains the row number of nearest column by Euclidean distance?
30. How to create a column containing the minimum by maximum of each row?
31. How to normalize all columns in a dataframe?
32. How to compute the correlation of each row with the succeeding row?
33. How to replace both the diagonals of dataframe with 0?
34. How to get the particular group of a groupby dataframe by key?
35. How to get the particular group of a groupby dataframe by key?
36. How to compute grouped mean on pandas dataframe and keep the grouped column as another column (not index)?
37. How to join two dataframes by 2 columns so they have only the common rows?

38. How to get the positions where values of two columns match?
39. How to get the frequency of unique values in the entire dataframe?
40. How to split a text column into two separate columns?
41. How to compute the mean squared error on a truth and predicted series?
42. How to convert the first character of each element in a series to uppercase?
43. How to calculate the number of characters in each word in a series?
44. How to compute difference of differences between consecutive numbers of a series?
45. How to get the day of month, week number, day of year and day of week from a series of date strings?
46. How to filter words that contain at least 2 vowels from a series?
47. How to get frequency counts of unique items of a series?
44. How to compute difference of differences between consecutive numbers of a series?
45. How to get the day of month, week number, day of year and day of week from a series of date strings?
46. How to filter words that contain at least 2 vowels from a series?
47. How to get frequency counts of unique items of a series?
48. How to convert a numpy array to a dataframe of given shape?
49. How can we convert a Series to DataFrame?
50. How can we convert DataFrame into an excel file?
51. Write a Python program to check if a specific Key and a value exist in a dictionary.
52. Write a Python program to get the total length of all values of a given dictionary with string values
53. Write a Python program to create a key-value list pairing in a given dictionary.
54. Write a Python program to convert a given list of lists to a dictionary.

55. Write a Python program to extract values from a given dictionaries and create a list of lists from those values.
56. Write a Python program to count the frequency in a given dictionary.
57. Write a Python program to find the specified number of maximum values in a given dictionary.
58. Write a Python program to get all combinations of key-value pairs in a given dictionary.
59. Write a Python program to filter even numbers from a given dictionary values.
60. A Python Dictionary contains List as value. Write a Python program to update the list values in the said dictionary.
61. A Python Dictionary contains List as value. Write a Python program to clear the list values in the said dictionary
62. Write a Python program to convert string values of a given dictionary, into integer/float datatypes
63. Write a Python program to remove a specified dictionary from a given list.
64. Write a Python program to split a given dictionary of lists into list of dictionaries.
65. Write a Python program to create a dictionary grouping a sequence of key-value pairs into a dictionary of lists
66. Write a Python program to filter the height and width of students, which are stored in a dictionary.

**Original Dictionary:**

**{'Cierra Vega': (6.2, 70), 'Alden Cantrell': (5.9, 65), 'Kierra Gentry': (6.0, 68),  
'Pierre Cox': (5.8, 66)}**

**Height > 6ft and Weight > 70kg:**

**{'Cierra Vega': (6.2, 70)}**

- 67. Write a Python program to convert more than one list to nested dictionary.**
- 68. Write a Python program to filter a dictionary based on values**
- 69. Write a Python program to drop empty items from a given Dictionary**
- 70. Write a Python program to create a dictionary of keys x, y, and z where each key has as value a list from 11-20, 21-30, and 31-40 respectively. Access the fifth value of each key from the dictionary.**
- 71. Write a Python program to store a given dictionary in a json file**
- 72. Write a Python program to match key values in two dictionaries.**
- 73. Write a Python program to replace dictionary values with their average.**
- 74. Write a Python program to get the top three items in a shop.**
- 75. Write a Python program to create a dictionary from a string.**
- Note: Track the count of the letters from the string.
- 76. Write a Python program to find the highest 3 values of corresponding keys in a dictionary**
- 77. Write a Python program to create and display all combinations of letters, selecting each letter from a different key in a dictionary.**
- 78. Write a Python program to print all unique values in a dictionary**
- 79. Write a Python program to combine two dictionary adding values for common keys**
- 80. Write a Python program to check a dictionary is empty or not**
- 81. Write a Python program to remove duplicates from Dictionary.**

82. Write a Python program to get a dictionary from an object's fields.
83. Write a Python program to get the maximum and minimum value in a dictionary.
84. Write a Python script to sort (ascending and descending) a dictionary by value
85. Write a Python script to add a key to a dictionary.
86. Write a Python script to concatenate following dictionaries to create a new one.
87. Write a Python script to check whether a given key already exists in a dictionary.
88. Write a Python script to generate and print a dictionary that contains a number (between 1 and n) in the form  $(x, x*x)$
89. Write a Python script to print a dictionary where the keys are numbers between 1 and 15 (both included) and the values are square of keys
90. Write a Python script to merge two Python dictionaries.
91. Write a Python program to sum all the items in a dictionary.
92. Write a Python program to map two lists into a dictionary.
93. Write a Python program to multiply all the items in a dictionary

**94.** Write a Python program to remove a key from a dictionary.

**95. Define ReIndexing.**

**96. Define Multiple Indexing?**

**97. How to Reset the index?**

**98. Describe Data Operations in Pandas?**

**99. Define GroupBy in Pandas?**

**100. What is Time Series in Pandas?**

101. Write a Python program to split a list based on first character of word

102. Write a Python program to split a list into different variables.

103. Write a Python program to generate groups of five consecutive numbers in a list.

104. Write a Python program to convert a pair of values into a sorted unique array.

105. Write a Python program to select the odd items of a list.

106. Write a Python program to insert an element before each element of a list.

109. Write a Python program to print a nested lists (each list on a new line) using the print() function.

110. Write a Python program to convert list to list of dictionaries.

Sample lists: ["Black", "Red", "Maroon", "Yellow"], ["#000000", "#FF0000", "#800000", "#FFFF00"]

Expected Output: [{"color\_name": "Black", "color\_code": "#000000"}, {"color\_name": "Red", "color\_code": "#FF0000"}, {"color\_name": "Maroon", "color\_code": "#800000"}, {"color\_name": "Yellow", "color\_code": "#FFFF00"}]

111. Write a Python program to sort a list of nested dictionaries.

112. Write a Python program to split a list every Nth element.

Sample list: ['a', 'b', 'c', 'd', 'e', 'f', 'g', 'h', 'i', 'j', 'k', 'l', 'm', 'n']

Expected Output: [['a', 'd', 'g', 'j', 'm'], ['b', 'e', 'h', 'k', 'n'], ['c', 'f', 'i', 'l']]

113. Write a Python program to compute the difference between two lists.

Sample data: ["red", "orange", "green", "blue", "white"], ["black", "yellow", "green", "blue"]

Expected Output:

Color1-Color2: ['white', 'orange', 'red']

Color2-Color1: ['black', 'yellow']

114. Write a Python program to create a list with infinite elements.

115. Write a Python program to concatenate elements of a list

116. Write a Python program to remove key values pairs from a list of dictionaries.

117. Write a Python program to convert a string to a list.

118. Write a Python program to check whether all items of a list is equal to a given string.

119. Write a Python program to replace the last element in a list with another list

Sample data : [1, 3, 5, 7, 9, 10], [2, 4, 6, 8]

Expected Output: [1, 3, 5, 7, 9, 2, 4, 6, 8]

120. Write a Python program to check whether the nth element exists in a given list.

121. Write a Python program to find a tuple, the smallest second index value from a list of tuples.

122. Write a Python program to create a list of empty dictionaries.

123. Write a Python program to print a list of space-separated elements.

124. Write a Python program to insert a given string at the beginning of all items in a list. Sample list : [1,2,3,4], string : emp  
Expected output : ['emp1', 'emp2', 'emp3', 'emp4']

125. Write a Python program to iterate over two lists simultaneously.

126. Write a Python program to move all zero digits to end of a given list of numbers. Expected output:

Original list:

[3, 4, 0, 0, 0, 6, 2, 0, 6, 7, 6, 0, 0, 0, 9, 10, 7, 4, 4, 5, 3, 0, 0, 2, 9, 7, 1]

Move all zero digits to end of the said list of numbers:

[3, 4, 6, 2, 6, 7, 6, 9, 10, 7, 4, 4, 5, 3, 2, 9, 7, 1, 0, 0, 0, 0, 0, 0, 0]

127. Write a Python program to find the list in a list of lists whose sum of elements is the highest. [Go](#)

Sample lists: [1,2,3], [4,5,6], [10,11,12], [7,8,9]

Expected Output: [10, 11, 12]

128. Write a Python program to find all the values in a list are greater than a specified number.

129. Write a Python program to extend a list without append.

Sample data: [10, 20, 30]

[40, 50, 60]

Expected output : [40, 50, 60, 10, 20, 30]

130. Write a Python program to remove duplicates from a list of lists. Sample list : [[10, 20], [40], [30, 56, 25], [10, 20], [33], [40]]

New List : [[10, 20], [30, 56, 25], [33], [40]]

131. Write a Python program to get the depth of a dictionary.

Expected Output:

Original list:

['abcd', 'abc', 'bcd', 'bkie', 'cder', 'cdsw', 'sdfsd', 'dagfa', 'acjd']

Items start with a from the said list:

['abcd', 'abc', 'acjd']

Items start with d from the said list:

['dagfa']

Items start with w from the said list:

[]

132. Write a Python program to check whether all dictionaries in a list are empty or not. Sample list : [{}, {}, {}]

Return value : True

Sample list : [{1,2}, {}, {}]

Return value : False

133. Write a Python program to flatten a given nested list structure.

Original list: [0, 10, [20, 30], 40, 50, [60, 70, 80], [90, 100, 110, 120]]

Flatten list:

[0, 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, 110, 120]

134. Write a Python program to remove consecutive duplicates of a given list.

Original list:

[0, 0, 1, 2, 3, 4, 4, 5, 6, 6, 6, 7, 8, 9, 4, 4]

After removing consecutive duplicates:

[0, 1, 2, 3, 4, 5, 6, 7, 8, 9, 4]

135. Write a Python program to pack consecutive duplicates of a given list elements into sublists. Original list:

[0, 0, 1, 2, 3, 4, 4, 5, 6, 6, 6, 7, 8, 9, 4, 4]

After packing consecutive duplicates of the said list elements into sublists:

[[0, 0], [1], [2], [3], [4, 4], [5], [6, 6, 6], [7], [8], [9], [4, 4]]

136. Write a Python program to create a list reflecting the run-length encoding from a given list of integers or a given list of characters. Original list:

[1, 1, 2, 3, 4, 4.3, 5, 1]

List reflecting the run-length encoding from the said list:

[[2, 1], [1, 2], [1, 3], [1, 4], [1, 4.3], [1, 5], [1, 1]]

Original String:

automatically

List reflecting the run-length encoding from the said string:

```
[[1, 'a'], [1, 'u'], [1, 't'], [1, 'o'], [1, 'm'], [1, 'a'], [1, 't'], [1, 'i'], [1, 'c'], [1, 'a'], [2, 'l'], [1, 'y']]
```

137. Write a Python program to create a list reflecting the modified run-length encoding from a given list of integers or a given list of characters.

Original list:

```
[1, 1, 2, 3, 4, 4, 5, 1]
```

List reflecting the modified run-length encoding from the said list:

```
[[2, 1], 2, 3, [2, 4], 5, 1]
```

Original String:

```
aabcdadadns
```

List reflecting the modified run-length encoding from the said string:

```
[[2, 'a'], 'b', 'c', [4, 'd'], 'a', 'd', 'n', [2, 's']]
```

138. Write a Python program to decode a run-length encoded given list

Original encoded list:

```
[[2, 1], 2, 3, [2, 4], 5, 1]
```

Decode a run-length encoded said list:

```
[1, 1, 2, 3, 4, 4, 5, 1]
```

139. Write a Python program to split a given list into two parts where the length of the first part of the list is given.

Original list:

```
[1, 1, 2, 3, 4, 4, 5, 1]
```

Length of the first part of the list: 3

Split the said list into two parts:

```
([1, 1, 2], [3, 4, 4, 5, 1])
```

140. Write a Python program to pair up the consecutive elements of a given list.

Original lists:

```
[1, 2, 3, 4, 5, 6]
```

Pair up the consecutive elements of the said list:

```
[[1, 2], [2, 3], [3, 4], [4, 5], [5, 6]]
```

Original lists:

[1, 2, 3, 4, 5]

Pair up the consecutive elements of the said list:

[[1, 2], [2, 3], [3, 4], [4, 5]]

141. Write a Python program to check if a given string contains an element, which is present in a list
142. Write a Python program to find the indexes of all None items in a given list
143. Write a Python program to join adjacent members of a given list
144. Write a Python program to check if first digit/character of each element in a given list is same or not
145. Write a Python program to find the indices of elements of a given list, greater than a specified value.
146. Write a Python program to remove additional spaces in a given list
147. Write a Python program to find the common tuples between two given lists
148. Sum a list of numbers. Write a Python program to sum the first number with the second and divide it by 2, then sum the second with the third and divide by 2, and so on.
149. Write a Python program to compute the average of  $n^{\text{th}}$  elements in a given list of lists with different lengths
150. Write a Python program to remove all strings from a given list of tuples.
151. Write a NumPy program to get the powers of an array values element-wise
152. Write a NumPy program to get the element-wise remainder of an array of division.
153. Write a NumPy program to calculate the absolute value element-wise

154. Write a NumPy program to concatenate element-wise two arrays of string.
155. Write a NumPy program to repeat all the elements three times of a given array of string
156. Write a NumPy program to capitalize the first letter, lowercase, uppercase, swap case, title-case of all the elements of a given array.
157. Write a NumPy program to insert a space between characters of all the elements of a given array.
158. Write a NumPy program to encode all the elements of a given array in cp500 and decode it again.
159. Write a NumPy program to remove the leading and trailing whitespaces of all the elements of a given array.
160. Write a NumPy program to remove the leading whitespaces of all the elements of a given array.
161. Write a NumPy program to remove the trailing whitespaces of all the elements of a given array.
162. Write a NumPy program to split the element of a given array with spaces.
163. Write a NumPy program to make all the elements of a given string to a numeric string of 5 digits with zeros on its left
164. Write a Python program to find the maximum and minimum value of a given flattened array.
165. Write a NumPy program to get the minimum and maximum value of a given array along the second axis.
166. Write a NumPy program to calculate the difference between the maximum and the minimum values of a given array along the second axis
167. Write a NumPy program to compute the 80th percentile for all elements in a given array along the second axis.
168. Write a NumPy program to compute the median of flattened given array.

169. Write a NumPy program to compute the weighted of a given array.
170. Write a NumPy program to compute the mean, standard deviation, and variance of a given array along the second axis
171. Write a NumPy program to compute the covariance matrix of two given arrays
172. Write a NumPy program to compute cross-correlation of two given arrays
173. Write a NumPy program to compute Pearson product-moment correlation coefficients of two given arrays
174. Write a NumPy program to test element-wise of a given array for finiteness (not infinity or not Not a Number), positive or negative infinity, for NaN, for NaT (not a time), for negative infinity, for positive infinity.
175. Write a Python NumPy program to compute the weighted average along the specified axis of a given flattened array
176. Write a Python program to count number of occurrences of each value in a given array of non-negative integers
177. Write a NumPy program to compute the histogram of nums against the bins.
178. Write a NumPy program to sort a given array of shape 2 along the first axis, last axis and on flattened array.
179. Write a NumPy program to create a structured array from given student name, height, class and their data types. Now sort the array on height.
180. Write a NumPy program to create a structured array from given student name, height, class and their data types. Now sort by class, then height if class are equal.
181. Write a NumPy program to sort the student id with increasing height of the students from given students id and height. Print the integer indices that describes the sort order by multiple columns and the sorted data
182. Write a NumPy program to get the indices of the sorted elements of a given array.

183. Write a NumPy program to sort a given complex array using the real part first, then the imaginary part.
184. Write a NumPy program to partition a given array in a specified position and move all the smaller elements values to the left of the partition, and the remaining values to the right, in arbitrary order (based on random choice)
185. Write a NumPy program to sort the specified number of elements from beginning of a given array.
186. Write a NumPy program to display all the dates for the month of March, 2017
187. Write a NumPy program to get the dates of yesterday, today and tomorrow
188. Write a NumPy program to count the number of days of specific month
189. Write a NumPy program to create a 3x3x3 array with random values
190. Write a NumPy program to create a 5x5 array with random values and find the minimum and maximum values.
191. Write a NumPy program to create a random 10x4 array and extract the first five rows of the array and store them into a variable
192. Write a NumPy program to shuffle numbers between 0 and 10 (inclusive)
193. Write a NumPy program to normalize a 3x3 random matrix
194. Write a NumPy program to create a random vector of size 10 and sort it
195. Write a NumPy program to find the nearest value from a given value in an array
196. Write a NumPy program to check two random arrays are equal or not.
197. Write a NumPy program to create random vector of size 15 and replace the maximum value by -1,
198. Write a NumPy program to find point by point distances of a random vector with shape (10,2) representing coordinates.
199. Write a NumPy program to find the most frequent value in an array.

200. Write a NumPy program to convert cartesian coordinates to polar coordinates of a random 10x2 matrix representing cartesian coordinates

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# Excel Interview Questions

**Instructions to solve the Questions:**

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favored.**
  - 4. For MCQ's also, provide the reason for your answer with example to support it.**
- 

**MCQ:**

1. Which function in Excel helps in finding out how many numerical entries are there?
  - a) NUM
  - b) COUNT
  - c) SUM
  - d) CHCKNUM
2. A feature that displays data on a column according to specific criteria?
  - a) FORMULA
  - b) FILTER
  - c) SORTING
  - d) PIVOT
3. What is the use of AUTOSUM command?
  - a) Sum of number's in series.
  - b) Sum of number's by leaving one alternate row/column.
  - c) Sum of no's and gives the average value.
  - d) None of the above.
4. Which data type will be placed on the left corner side of the cell?
  - a) Text

- b) Number
- c) Boolean
- d) Error

5. Which data type will be placed on the right corner side of the cell?

- a) Text
- b) Number
- c) Boolean
- d) Error

6. Which data type will be placed in the center of the cell?

- a) Text
- b) Number
- c) Boolean
- d) Error

7. What is the name of the intersection of a column and a row on worksheet?

- a) Column
- b) Value
- c) Address
- d) Cell

8. What type of chart is useful in comparing values versus categories?

- a) Pie Chart
- b) Column Chart
- c) Bar Chart
- d) Stacked Column Chart

9. What function displays row data in a column or column data in a row?

- a) Reverse
- b) Transpose
- c) Inverse

- d) Transfer
10. How are data organized in Excel spreadsheet?
- a) Rows and Columns
  - b) Lines and Spaces
  - c) Height and width
  - d) Only Rows
11. What does the VLOOKUP function do?
- a) Look up values that starts with “v”
  - b) Checks whether the text is same in the other cells/box.
  - c) Find related records.
  - d) All the above.
12. A function inside another function is called ?
- a) Nested Function
  - b) Round Function
  - c) Stacked Function
  - d) Class function
13. Which of the following functions cannot be used to edit the content of a cell?
- a) Pressing Shift key
  - b) Pressing Esc key
  - c) Double-Clicking the cell
  - d) Clicking the Formula Bar
14. To copy cell contents using drag and drop, press the
- a) End key
  - b) Shift Key
  - c) Esc key
  - d) None of the above
15. What is the use of AUTOFILL feature?

- a) Extends a sequential series of data.
  - b) Automatically adds a range of cell values
  - c) Applies a border around selected cell
  - d) None of the above
16. Which is used to filter Dates by Years, Months, Quarters and Days?
- a) Slicer
  - b) Date Filter
  - c) Filter
  - d) Timeline
17. Which of these not a Text functions?
- a) CONCATENATE()
  - b) TEXT()
  - c) LEFT()
  - d) TRIM()
18. Can we find the number of duplicates in a range using COUNTIF() function?
- a) True
  - b) False
19. An Excel workbook is a collection of?
- a) Worksheets
  - b) Workbooks
  - c) Charts
  - d) Worksheets and Charts
20. Excel files have a default extension of?
- a) Xls
  - b) Xlsx
  - c) Excel
  - a) d) Xlx

21. How can we use format painter multiple times before it turns it off?

- a) Pressing the Ctrl key & clicking the format painter
- b) Pressing the shift key & clicking the format painter
- c) Double-click the format painter
- d) Format painter can't be used multiple times at once

22. Why Excel file is called as worksheet?

- a) It contains Text and Data.
- b) Modifying options
- c) It contains many sheets including worksheets and charts
- d) It contains a limited number of worksheets and charts

23. Which of the following is not the valid data type in Excel?

- a) Number
- b) Label
- c) Character
- d) Date, Time

24. Which of the following methods cannot be used to edit the content in a cell?

- a) Pressing Alt Key
- b) Clicking the formula bar
- c) Pressing Enter key
- d) Double-clicking the cell

25. You can select a single range of cells by

- a) Shift key + Arrow key
- b) Ctrl Key + Arrow Key
- c) Ctrl Key while Dragging over the cell
- d) Dragging over the corresponding cells

26. What does a right-clicking on a cell in Excel do?

- a) Opens a short menu with some options

- b) Deletes the object
- c) Right click won't work
- d) Selects the objects

27. Comments can be added to the cells using

- a) Edit > Comments
- b) Insert > Comments
- c) File > Comments
- d) View > Comments

28. When you copy a formula

- a) Excel erases the original copy of the formula
- b) Excel adjusts absolute cell references
- c) Excel don't adjust relative cell references
- d) Excel edits cell references in newly copied formula

29. Which formula is referred to as Absolute cell reference?

- a) !A!1
- b) \$A%1
- c) \$A\$1
- d) &A&1

30. How to convert Number Data Type into Label Data Type?

- a) Insert ^ at the beginning of the Number
- b) Insert ' at the beginning of the Number
- c) Insert alphabets at the beginning of the Number
- d) Insert \* at the beginning of the Number

31. The Greater than sign(>) is an example of which operator?

- a) Arithmetic
- b) Logical
- c) Conditional

- d) Greater
32. Which of the following formula is incorrect?
- a) =1+3
  - b) -A1+10
  - c) =B1+B2
  - d) =B1+10
33. Which of the following formula will excel not be able to calculate?
- a) =SUM(A1:A5)-B1
  - b) =SUM(A1:A5)\*2
  - c) =SUM(A1:A13)/(10-4)
  - d) =SUM(Sales)-B1
34. Which of the following is not an example value?
- a) 350
  - b) Jan 10, 2021
  - c) 0.5
  - d) Serial Number 102
35. Getting data from a cell located in a different sheet is called?
- a) Referencing
  - b) Accessing
  - c) Updating
  - d) Functioning
36. What is the purpose of Tab Scrolling button?
- a) Allows to view a different worksheet
  - b) Allows to view an additional worksheet in rows wise
  - c) Allows to view an additional worksheet in column wise
  - d) Allows viewing additional sheets tabs
37. Concatenation of a string can be done using

- a) ‘
- b) !
- c) #
- d) &

38. Data can be arranged in Excel worksheet using?

- a) Auto Formatting
- b) Applying Styles
- c) Changing fonts
- d) All the above

39. The Auto Calculate feature

- a) Can only add number's in a range of cells
- b) Provides a quick way to view the Arithmetic operation result on a range of cells
- c) Creates formula automatically and add it into cells
- d) None of the Above

40. Which feature in Excel quickly completes a series of data?

- a) Auto Complete
- b) Auto Fill
- c) Fill Handle
- d) Sorting

41. The process of arranging the items of the column in some sequence is known as?

- a) Filtering
- b) Sorting
- c) Order
- d) Range

42. In Excel rows are labelled as

- a) A1, B1, C1, etc.
- b) A, B, C, etc.

- c) A1, A2, A3, etc.
- d) 1,2,3, etc.
43. In Excel Columns are labelled as
- a) A1, B1, C1, etc.
- b) A, B, C, etc.
- c) A1, A2, A3, etc.
- d) 1,2,3, etc.
44. What type of chart is good for a single series of data?
- a) Column Chart
- b) Pie Chart
- c) Bar Chart
- d) Tree map
45. How many sheets are there, by default when we create a new Excel file?
- a) 1
- b) 2
- c) 3
- d) 4
46. Which data type will be placed on the right corner side of the cell?
- a) Text
- b) Number
- c) Boolean
- d) Error
47. In Excel which one denoted a range from A2 to A7?
- a) A2-A7
- b) A2,A7
- c) A2:A7
- d) A2;A7

48. Which chart type is best for comparing sales between two products?

- a) Column Chart
- b) Pie Chart
- c) Line Chart
- d) None of the Above

49. What dialog box allows you to change the field name in Pivot Table?

- a) Field Settings
- b) Field Option
- c) Field Cell
- d) Field Structure

50. Merge cells option can be applied from?

- a) Format Cells dialog box Alignment Tab
- b) Formatting toolbar
- c) Both of A and B
- d) None of the Above

51. When you insert an Excel file into a Word document, the data are

- a) Hyperlinked
- b) Placed in a word table
- c) Linked
- d) Embedded

52. You can set page border in Excel from

- a) From border tab in format cells dialog box
- b) From border tool in format toolbar
- c) From line style in format section
- d) Not possible to set page border

53. Which of the following format you can decide to apply or not in Auto Format dialog box?

- a) Number format
- b) Border format
- c) Font format
- d) All the Above

54. Which of the following option can check the conditions against \_\_\_ when applying conditional formatting?

- a) Cell value
- b) Formula
- c) Both A and B
- d) We can't check the conditions

55. You can use the formula palette to

- a) Format cells containing number
- b) Create and edit formula containing functions
- c) Enter assumptions data
- d) Copy a range of cells

56. How to join some cells and place the content at the middle of the joined cell?

- a) From Format Cells dialog box click on Merge Cells check box
- b) From Format Cells dialog box select the Centered alignment
- c) From Format Cells dialog box choose To merge and Center check box
- d) Click on Merge and Center tool on formatting toolbar

57. Tab scroll buttons are placed on Excel screen

- a) Towards the bottom right corner
- b) Towards the bottom left corner
- c) Towards the top right corner
- d) Towards the top left corner

58. The Name boxes on to the left of the formula bar

- a) Shows the name of workbook currently working on

- b) Shows the name of worksheet currently working on
- c) Shows the name of cell or range currently working on
- d) None of the above

59. Which of the following cannot be a sheet in workbook?

- a) Work Sheet
- b) Data Sheet
- c) Macro Sheet
- d) Chart Sheet

60. How can you update the values of formula cells if Auto Calculate mode of Excel is disabled?

- a) F8
- b) F9
- c) F10
- d) F11

61. Which of the following Excel screen components can NOT be turned on or off?

- a) Formula Bar
- b) Status Bar
- c) Tool Bar
- d) None of Above

62. What happens when you press Ctrl + X after selecting some cells in Excel?

- a) It will disappear
- b) Marked for Cutting
- c) Cells are Deleted and shifted left
- d) Cells are deleted and shifted up

63. Which of the following option is not available in Paste Special dialog box?

- a) ADD
- b) SQRT

- c) SUBTRACT
  - d) DIVIDE
64. Which command will you choose to convert a column of data into row?
- a) Cut and Paste
  - b) Paste Special > Transpose
  - c) Paste Special > Reverse
  - d) None of Above
65. Which of the cell pointer indicate that you can move the content to another cell?
- a) Big Plus icon
  - b) Small Plus icon
  - c) Mouse Pointer with Anchor at the tip
  - d) None of Above
66. Long text can be broken down into many lines within a cell. You can do this through
- a) Wrap Text Format > Cells
  - b) Justify in Edit > Cells
  - c) Text Wrapping in Format > Cells
  - d) All the above
67. Excel provides the default value in step in Fill Series dialog box
- a) 0
  - b) 1
  - c) 2
  - d) 5
68. Which chart type is best for comparing sales between two products?
- a) Column Chart
  - b) Pie Chart
  - c) Line Chart
  - d) None of the Above

69. The Shortcut key Ctrl + D is used in Excel to

- a) Open the font dialog box
- b) Apply double underline for the active cell
- c) Fill down in the election
- d) None of Above

70. The shortcut key Ctrl + R is used in Excel to

- a) Right align the content of cell
- b) Remove the cell contents of selected cells
- c) Fill the selection with active cells to the right
- d) None of the Above

71. The command Edit > Fill Across worksheet is active only when?

- a) One sheet is selected
- b) When many sheets are selected
- c) When no sheet is selected
- d) None of above

72. Which of the following you can paste selectively using paste Special command?

- a) Validation
- b) Formats
- c) Formulas
- d) All of above

73. Edit > Delete command

- a) Deletes the content of a cell
- b) Deletes formats of cell
- c) Deletes the comment of cell
- d) Deletes selected cells

74. Which command is used to remove the content of selected cells?

- a) Delete

- b) Clear Contents
- c) Clear All
- d) Clear Delete

75. How to remove only the formatting done in a range?

- a) Edit > Clear > Formats
- b) Edit > Delete
- c) Remove Formatting on Std Toolbar
- d) Delete key

76. How to remove a sheet from a workbook?

- a) Select the sheet, choose Edit > Delete Sheet
- b) Select the sheet, choose Format > Sheet > Hide
- c) Both A and B
- d) None of Above

77. Which of the following is not true about Find and Replace in Excel?

- a) Search for bold and replace with italics
- b) Decide whether to look for the word or not
- c) Can Search in formula too
- d) None of Above

78. Shortcut key to replace a data with another in sheet?

- a) Ctrl + R
- b) Ctrl + Shift + R
- c) Ctrl + H
- d) Ctrl + F

79. Comments can be added to cells using?

- a) Home > Comments
- b) Insert > Comments
- c) Data > Comments

- d) View > Comments
80. Getting data from a cell located in a different sheet is called?
- a) Accessing
  - b) Referencing
  - c) Updating
  - d) Functioning
81. Which elements of a worksheet can be protected from accidental modification?
- a) Contents
  - b) Objects
  - c) Scenarios
  - d) All the Above
82. Which area in an Excel window allows entering values and formulas?
- a) Title Bar
  - b) Menu Bar
  - c) Formula Bar
  - d) Standard Tool Bar
83. Multiple calculations can be made in a single formula using?
- a) Std Formulas
  - b) Array formulas
  - c) Complex Formulas
  - d) Smart Formulas
84. Shortcut used to select an entire column in MS-Excel?
- a) Ctrl + C
  - b) Ctrl + Arrow key
  - c) Ctrl + S
  - d) None of Above
85. Function used to get the remainder after a number is divided by a divisor?

- a) ROUND()
- b) FACT()
- c) MOD()
- d) DIV()

86. Which Function is not a built-in in Excel?

- a) BMI
- b) AVG
- c) MAX
- d) SUM

87. Which chart not available in Excel?

- a) Area
- b) Line
- c) Pie
- d) None of Above

88. What will be the output if you format the cell containing 5,436.8 as '#,##0.00'?

- a) 5436
- b) 5436.80
- c) 5436.8
- d) 5437

89. How do you wrap the text in a cell?

- a) Format, cells, font
- b) Format, cells, protection
- c) Format, cells, number
- d) Format, cells, alignment

90. What does COUNTA() function do?

- a) Count cells having alphabets
- b) Counts empty cells

- c) Counts cells having number
- d) Counts non-empty cells
91. What is the shortcut key to highlight the entire column?
- a) Ctrl + C
- b) Ctrl + Enter
- c) Ctrl + Page Up
- d) Ctrl + Space Bar
92. Which of the following Excel screen components can NOT be turned on or off?
- e) Formula Bar
- f) Status Bar
- g) Tool Bar
- h) None of Above
93. In the formula, which symbol specifies the fixed columns or rows?
- a) \$
- b) \*
- c) %
- d) &
94. Excel displays the current cell address in?
- a) Formula Bar
- b) Status Bar
- c) Name Box
- d) Title Bar
95. Which is the correct way to refer the cell A10 on sheet3 from sheet1?
- a) Sheet3!A10
- b) Sheet1!A10
- c) Sheet3.A10
- d) A10

96. Which language is used to create macros in Excel?

- a) Visual Basic
- b) C
- c) Visual C++
- d) Java

97. How many worksheets can a workbook have?

- a) 3
- b) 8
- c) 255
- d) None of the above

98. Which key is used for check spelling?

- a) F3
- b) F1
- c) F7
- d) F9

99. What are the tabs that appear at the bottom of each workbook called?

- a) Reference Tabs
- b) Position Tabs
- c) Location Tabs
- d) Sheet Tabs

100. In Excel, a Data Series is defining as what?

- a) A type of chart
- b) A cell references
- c) A collection of related data
- d) A division of results

101. A7:A9 indicates?

- a) Cells A7 and A9 only

- b) Cells A7 through A9
- c) Cell A8 only
- d) None of Above

102. How to center the worksheet titles across a range of cells?

- a) Select the cells containing the title text + range of cells
- b) Ctrl + E
- c) Format the cells
- d) PIVOT

103. What is the use of AUTOSUM command?

- a) Sum of number's in series.
- b) Sum of number's by leaving one alternate row/column.
- c) Sum of no's and gives the average value.
- d) None of the above.

104. The name box in Excel?

- a) Shows the location of the previously active cell
- b) Appears to the left of the formula bar
- c) Appears below the status bar
- d) Appears below the menu bar

105. Comments put in cells are called?

- a) Smart Tip
- b) Cell Tip
- c) Web Tip
- d) Soft Tip

106. What is the use of horizontal and vertical scroll bars?

- a) Split a worksheet into two panes
- b) View different rows and columns to edit cell
- c) Edit cell

d) View different worksheets

107. When the formula bar is active, you can see?

- a) Edit formula button
- b) Cancel button
- c) Enter button
- d) All of above

108. Hyperlinks can be?

- a) Text
- b) Drawing Objects
- c) Pictures
- d) All of above

109. When you link data maintained in Excel workbook to a Word document?

- a) The Word document cannot be edited
- b) The Word document contains a reference to the original source
- c) The Word document must contain hyperlink
- d) The Word document contains a copy of the actual data

110. Formula can be created using?

- a) Values but not cell references
- b) Cell references but not values
- c) Values and cell references
- d) None of above

111. Which function key generates a bar graph from the values entered a graph?

- a) F11
- b) F5
- c) F6
- d) F9

112. Which command need to execute from “run window” to open a new excel file?

a) Ms excel

b) MsExcel

c) ms-excel

d) excel

113. In Excel which chart is also known as X Y chart?

a) Pie Chart

b) Bar Chart

c) Area Chart

d) Scatter Chart

114. Macros are executed from which menu?

a) Insert

b) Format

c) Tools

d) Data

115. You can print only an embedded chart by?

a) Moving the chart to a chart sheet before printing.

b) Formatting the chart before printing

c) Selecting the chart before printing

d) A and C Only

116. Which function calculates your monthly Mort age payment?

a) PMT

b) NPER

c) PV

d) None of Above

117. Which key is used to edit existing Excel data?

a) F1

- b) F2
- c) F3
- d) F4

118. A feature enables to adjust or back solve the value in a cell to reach the desired outcome in a formula?

- a) Goal Seek
- b) Summary report
- c) Trend line
- d) Forecasting

119. Which web component is used to create an interactive Pivot Table?

- a) HTML
- b) Pivot Table Service
- c) Pivot Table Report
- d) Excel Report

120. When Integrating Word and Excel, Word is?

- a) Server
- b) Client
- c) Source
- d) User

121. On an Excel sheet the active cell is indicated by?

- a) A dotted border
- b) A dark wide border
- c) A blinking order
- d) Black Background

122. The process of keeping the row visible while scrolling through the rest of the worksheet?

- a) Freeze Panes
- b) Page Breaks

- c) Margins
  - d) Sorting
123. Can we be able to prevent people from copying the cell from your worksheet?
- a) Yes
  - b) No
124. Which is not belongs to macro languages in Excel?
- a) XLM
  - b) XML
  - c) VBA
  - d) All of Above
125. Number of columns in a worksheet is?
- a) 128
  - b) 256
  - c) 512
  - d) 1024
126. How many characters can be typed in a single cell in Excel?
- a) 2562
  - b) 1024
  - c) 32000
  - d) 65535
127. Can we resize the column in Excel?
- a) Yes
  - b) No
128. Is it possible to make Pivot Table using multiple sources of data?
- a) If the multiple sources are different, from same workbook.
  - b) If the multiple sources are different, from different workbook.
  - c) Both A and B

d) None of Above

129. How can be unprotected a VBA project using code?

a) Inserting Password

b) Inserting code in formula bar

c) It's not possible.

d) None of Above

130. Does each cell in Excel have a unique address?

a) True

b) False

131. How to hide or show Ribbon in Excel?

a) Ctrl + F1

b) Ctrl + F2

c) Ctrl + F3

d) Shift + F5

132. How to increase the number of rows and columns in a worksheet?

a) By pressing Ctrl and + Symbol

b) Go to Insert > Add Column/ rows

c) Right click and add rows and column in worksheet

d) It's not possible to increase the rows/ columns.

133. How many languages does Macro have?

a) 1

b) 2

c) 3

d) 4

134. How to resize the column?

a) Double-click on the boundary line

b) Drag the boundary line on the right side of the column

- c) Both A and B
- d) None of Above

135. The Visual Basic Code Editor will automatically detect certain types of errors as you are entering the code.

- a) True
- b) False

136. Is keyword are also referred to as reversed order?

- a) True
- b) False

137. Visual Basic responds to events using which of the following?

- a) Code Procedure
- b) Event Procedure
- c) Form Procedure
- d) Property

138. What is triggered if the user clicks a button?

- a) Event
- b) Method
- c) Setting
- d) Property

139. Which of the property controller tells the order they receive the focus find when the tab key is pressed during run time?

- a) Focus Order
- b) Focus Number
- c) Tab Index
- d) Control Order

140. What is the use of Properties window in the development of Visual Basic applications?

- a) To change how objects look and feel

- b) Find when opening programs stored on a hard drive
- c) To allow the developer to graphically design program components.
- d) To set program related options like name, location.
141. Which of the properties in a control's list of properties is used to give the control a meaningful name?
- a) Text
- b) Context Menu
- c) Name
- d) Control Name
142. The value returned by Input Box is a string.
- a) True
- b) False
143. Which of the following arithmetic operations has the highest level of precedence?
- a) + - Addition, Subtraction
- b) \* / Multiplication, Division
- c) ^ Exponential
- d) ( ) Parentheses
144. Which of the following is a valid name for a variable?
- a) Two\_One
- b) 2One
- c) Two One
- d) Two.One
145. Keywords in Visual Basic are words are?
- a) Used to find when naming variables.
- b) Used to name controls, such as TextBox1, Command2, etc.
- c) Have special meaning and should not be used when naming variables.
- d) Used as prefixes for control names (such as text, btn, LBL, and lst).

146. To continue a long statement on another line, use?

- a) an underscore characters.
- b) an ampersand character.
- c) Ctrl + Enter.
- d) a space followed by an underscore character.

147. VBA is?

- a) Used to extend Excel functions
- b) A statistical tool developed by Microsoft for financial analysts
- c) An open-source programming environment
- d) A programming that replaces Excel

148. Find what is the proper syntax Find when using a message dialog box?

- a) MessageBox.Show("Hi there", "Hi")
- b) MessageBox.Show(Hi there, Hi)
- c) MessageBox.Show "Hi There", "Hi"
- d) MessageBox.Show Hi There, Hi

149. What will be the output of the following statement?

```
txtBox.Text = FormatCurrency(1234.567)
```

- a) \$1234.567
- b) 12,34.57
- c) \$1,234.57
- d) \$1234.57

150. Asc("A") is 65. Find what is Asc("C")?

- a) 66
- b) 67
- c) 68
- d) "C"

151. Asc("A") is 65. Find what is displayed by txtBox.Text = Chr(65) & "BC"?

- a) ABC
- b) A BC
- c) 656667
- d) Not enough information is available
152. Which of the following expressions has as its value the words “Hello World? Surrounded by quotation marks?
- a) “Hello World”
- b) Chr(34) & “Hello World”
- c) Chr(34) & Hello World & Chr(34)
- d) Chr(34) & “Hello World” & Chr(34)
153. Which of the following is True?
- a) “Cat” = “cat”
- b) “Cat” < “cat”
- c) “Cat” > “cat”
- d) Relational operators are only valid for numeric values.
154. Which of the following is a valid Visual Basic conditional statement?
- a)  $2 < n < 5$
- b)  $2 < n$  or  $< 5$
- c)  $2 < n$  or  $5$
- d)  $(2 < n)$  Or  $(n < 5)$
155. Which of the following VBA windows shows the code of the active object?
- a) Explorer Window
- b) Properties window
- c) Immediate Window
- d) Code Window
156. A VBA unit is called?
- a) Subroutine

- b) Macro
- c) Routine
- d) Program

157. What is Default in VBA among the following?

- a) Pass by Address
- b) Pass by Reference
- c) Pass by Value
- d) None of Above

158. You can set Page Border in Excel from

- a) From Border tab in Format Cells dialog box
- b) From Border tool in Formatting toolbar
- c) From Line Style tool in Drawing toolbar
- d) You cannot set page border in Excel

159. How can you check the conditions against when applying conditional formatting?

- a) Cell Value
- b) Formula
- c) Both A and B
- d) None of Above

160. Which of the following is not true regarding Conditional Formatting?

- a) You can add more than one condition to check
- b) You can set a condition to look for Bold and apply Italics on them
- c) You can apply Font, border and pattern formats that meets the specified conditions
- d) You can delete any condition from Conditional Formatting dialog box if it is not required

161. You can use the formula palette to

- a) Format cells containing numbers
- b) Create and edit formula containing functions
- c) Enter assumptions data
- d) Copy a range of cells

162. Tab scroll buttons are placed on Excel screen

- a) Towards the bottom right corner
- b) Towards the bottom left corner
- c) Towards the top right corner
- d) Towards the top left corner

163. Each Excel file is a workbook that contains different sheets. Which of the following cannot be a sheet in workbook?

- a) Work sheet
- b) Chart sheet
- c) Module sheet
- d) Data sheet

164. A Function may return up to two values?

- a) True
- b) False

165. The command Edit > Fill Across Worksheet is active only when

- a) One sheet is selected
- b) When many sheets are selected
- c) When no sheet is selected
- d) None of above

166. Which of the following series type is not valid for Fill Series dialog box?

- a) Linear
- b) Growth
- c) Autofill
- d) Time

167. Which of the following you can paste selectively using Paste Special command?

- a) Validation
- b) Formats
- c) Formulas
- d) All of above

168. What does Edit > Delete command do?

- a) Deletes the content of a cell
- b) Deletes Formats of cell
- c) Deletes the comment of cell
- d) Deletes selected cells

169. The Delete key of the keyboard is assigned to which command in Excel?

- a) Edit > Clear > Contents
- b) Edit > Clear > All
- c) Edit > Delete
- d) All of above

170. Comments put in cells are called?

- a) Smart Tip
- b) Cell Tip
- c) Web Tip
- d) Soft Tip

**SUBJECTIVE:**

1. Explain why the numbers positioned on the left corners in a cell/box not considering as a number?
2. How function is different from formula?
3. On which occasion the TRIM() function is used?
4. What is the use of charts in Excel?
5. Difference between relative and absolute references in Excel.
6. What is a Pivot Table, and what are the different sections of a Pivot Table?
7. Can you sort multiple columns at one time?
8. What is Ribbon and where does it appear?
9. What are macros in Excel?
10. What are the different COUNT functions available in Excel?
11. How to calculate Compound Interest in Excel?
12. How does VLOOKUP() function work?
13. What is HLOOKUP in Excel?
14. What is the use of sparkline and its types?
15. How many dates Time function available in Excel and explain some of them?
16. How many text function available in Excel and explain some of them?
17. What are the limitations of VLOOKUP function in Excel?
18. Explain the Data Formats available in Excel?
19. List the order of operation used for evaluating Excel formulas?
20. List some useful functions in Excel?
21. How to resize the column?
22. What is conditional formatting in Excel?
23. Explain Format painter with example?
24. What is dashboard in Excel and give some important things while preparing the dashboards?

25. Explain how cell reference is useful in the calculation?
  26. How to resize the column?
  27. How to use the Same Formatting to Every Sheet in A Workbook in Excel?
  28. How to display the Text in Data Area of Pivot Table?
  29. How to debug a VBA Code?
  30. How to display two data fields side-by-side instead of separate rows?
- 



# **Qlik View Interview Questions**

**Instructions to solve the Questions:**

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favored.**
  - 4. For MCQ's also, provide the reason for your answer with example to support it.**
- 

**Q-1) Which of the following is not the part of Qlik View components?**

- a) Qlik view user management.
- b) Qlik view server.
- c) Qlik view publisher
- d) Qlik view user access

**Q-2) Using which connection qlik view can connect to a data base**

- a) OLDC connection
- b) OLAP connection
- c) ODBC connection
- d) None of the above

**Q-3) Trellis chart can be explained as**

- a) We can create an array of charts based on first dimension.
- b) We can create an array of charts based on any dimension.
- c) We can create an array of charts with any two dimension.
- d) All of the above options.

Q-4) Which of the following is correct about Trellis chart?

- a) It is basically a grid of large charts and each are different.
- b) It is basically a grid of small charts or a repetition of charts.
- c) It is basically a grid of all different charts.
- d) It is basically a grid of same charts with different dimension.

Q-5) How many dimensions can you use in Bar chart in Qlik View?

- a) 2
- b) 3
- c) 1
- d) 4

Q-6) Which of the following charts in Qlik View has only expression and no dimension?

- a) Gauge chart
- b) Statistic box
- c) List box
- d) Both a and c
- e) Both a and b

Q-7) Optimal data structure is considered for which of the following

- a) Star Schema
- b) Snowflake schema
- c) Synthetic key
- d) All of the above

Q-8) Which is the file extension for Qlik view?

- a) .qvw
- b) .qvp

- c) .qmp
- d) .qvw

Q-9) Why there is no data type in Qlik View?

- a) There is no enough memory available.
- b) It is enable to understand different data structures.
- c) Needs flexibility for loading data from different data sources.
- d) Both a and c

Q-10) Which of the following is not present in statistical calculations of Qlik View?

- a) T-test
- b) Hypothesis testing
- c) Distributions
- d) M-test

Q-11) Whiskers chart resembles \_\_\_\_\_.

- a) Box plot
- b) Mekko chart
- c) Time chart
- d) All of the above

Q-12) Which of the following join is not present in Qlik View?

- a) Left join
- b) Right Join
- c) Outer join
- d) Left anti join

Q-13) Web files are loaded in Qlik View with help of?

- a) Script writer
- b) Web Editor
- c) Script merger
- d) None

Q-14) Which QlikView service is employed to distribute the load of data files evenly amongst a cluster of servers.

- a) QlikView Distribution Service
- b) Qlikview Publisher Repository
- c) QlikView management console
- d) Qlikview Server load sharing

Q-15) According to you which of the following document is created by the Qlik View?

- a) User document
- b) Source document
- c) Server document
- d) Intermediate document

Q-16) Where is the information associated with tasks like Reload and Distribution for QlikView documents is stored in QlikView?

- a) QlikView Web Server
- b) QlikView Management Console
- c) QlikView Access Point
- d) QlikView Publisher Repository

Q-17) Which sign can be useful for fuzzy search?

- a) =
- b) \*

c) /

d) ~

Q-18) Given a situation where you unsure about the spelling or word that you simply wish to look in QlikView. Which of the given searches would you do?

- a) Wildcard search
- b) Fuzzy search
- c) Advanced search
- d) All of the above

Q-19) A \_\_\_\_\_ in QlikView captures the selections in all states defined in a QlikView document.

- a) Bookmark
- b) Dashboard
- c) Both
- d) None

Q-20) QlikView can connect to data base using \_\_\_\_\_ connection created for the database.

- a) OMCD
- b) OCDC
- c) ODBC
- d) OMCN

Q-21) The concept of \_\_\_\_\_ only the new or changed records from the source into the QlikView document is called Incremental Load.

- a) Loading
- b) Increasing
- c) Decreasing
- d) Changing

Q-22) In \_\_\_\_\_ we can create array of chart based on first dimension.

- a) Bar chart
- b) Trellis chart
- c) Line chart
- d) Pie chart

Q-23) \_\_\_\_\_ chart are also made of trellis display.

- a) Bitmap
- b) Pie
- c) Histogram
- d) None

Q-24) With the help of Mini Chart we can set type of \_\_\_\_\_ - instead of values.

- a) Digits
- b) Characters
- c) Modes
- d) All of the above

Q-25) We can also show \_\_\_\_\_ like a cross table which is a beneficial feature.

- a) Pivot table
- b) Snowflake table
- c) Statistic table
- d) None

Q-26) If we have to sort a pivot table than we have to sort it first according to the first dimension then to the next.

- a) First dimension
- b) Second dimension

- c) Third dimension
- d) All are possible

Q-27) The model in which the data is prearranged into facts and dimensions is known as \_\_\_\_\_

- a) Star schema
- b) Snowflake schema
- c) Database schema
- d) None of the above

Q-28) What does \$ means in modifier?

- a) Represents the record of current selection
- b) Represents the previous selection
- c) Represents the next selection
- d) Represents the Bookmark name

Q-29) \_\_\_\_\_ specifies that the join between the two tables should be left join, it uses before the word join.

- a) Left join
- b) Right join
- c) Inner join
- d) Outer join

Q-30) In \_\_\_\_\_ tier raw data is loaded and we create QVD.

- a) 1-tier
- b) 2-tier
- c) 3-tier
- d) 4-tier

Q-31) What does \$1 represents in modifier?

- a) Represents the record of current selection
- b) Represents the previous selection
- c) Represents the next selection
- d) Represents the Bookmark name

Q-32) Which graph we will use for two years difference sale ?

- a) Histogram
- b) Bar chart
- c) Pie chart
- d) All of the above

Q-33) In \_\_\_\_\_ tier QVD is converted in business login and the requirement of business and data model is created.

- a) 1-tier
- b) 2-tier
- c) 3-tier
- d) 4-tier

Q-34) Qlikview stores the data in QVD as QVD has \_\_\_\_\_ capability.

- a) Data enhancing
- b) Data compression
- c) Data compatibility
- d) Data reduction

Q-35) What does \${\_1} represents in modifier?

- a) Represents the record of current selection
- b) Represents the previous selection
- c) Represents the next selection
- d) Represents the Bookmark name

Q-36) We can use a \_\_\_\_\_ object to keep many charts in the same box.

- a) Chart
- b) Table
- c) Container
- d) Schema

Q-37) \_\_\_\_\_ can be used for only one application means we can only read the data from one QVW application.

- a) Binary Load
- b) Normal Load
- c) Dynamic load
- d) Secondary load

Q-39) Qlikview has better performance than other BI because of its \_\_\_\_\_ approach.

- a) Memory analytics
- b) Schema design
- c) Types of charts
- d) All of the above

Q-40) A \_\_\_\_\_ is much better as we can sort it according to any column as per our choice.

- a) Pivot table
- b) Straight table

- c) Statistic table
- d) none

Q-41) \_\_\_\_\_ is used for easily spot problem in key field association

- a) ratio
- b) subset ratio
- c) fix ratio
- d) none

Q-42) Which one of the following is a date and time function?

- a) Setdateyear
- b) Now
- c) UTC
- d) All of the above

Q-43) In \_\_\_\_\_ tier Reading all QVD from 2-tier and we make a single QVW.

- a) 1-tier
- b) 2-tier
- c) 3-tier
- d) 4-tier

Q-44) In \_\_\_\_\_ join resulting table only contain the combination among two tables with the full data set from the first table.

- a) Left join
- b) Right join
- c) Inner join

d) Outer join

Q-45) Which function is used to rename a field temporarily?

- a) Rem
- b) Binary
- c) Comment
- d) Alias

Q-46) Which function is used to calculate the sharpness of the peak of a frequency distribution curve?

- a) Skewness
- b) Kurtosis
- c) Alias
- d) peak

Q-47) Which one of the following is NOT an aggregate function?

- a) Max
- b) Sum count
- c) Sum
- d) Date

Q-48) How many dimensions we can use in Bar chart?

- a) 1
- b) 2
- c) 3
- d) 4

Q-49) Which port is used to transfer data between server and clients?

- a) 443
- b) 80
- c) 688
- d) 400

Q-50) In \_\_\_\_\_ join resulting table only contain the combination among two tables with the full data set from the second table.

- a) Left join
- b) Right join
- c) Inner join
- d) Outer join

Q-51) \_\_\_\_\_ is used to improve the presentation of particular queries.

- a) Normal schema
- b) Snowflake schema
- c) Star schema
- d) All of the above

Q-52) \_\_\_\_\_ assigns the variable with assesses the expression.

- a) Set
- b) Let
- c) Match
- d) keep

Q-53) \_\_\_\_\_ is used for loading data in tables which is already loaded in Qlikview application.

- a) Resident load

- b) Incremental load
- c) Synthetic load
- d) none

Q-54) Straight table is good for \_\_\_\_\_ purpose.

- a) Binding
- b) Segregating
- c) Grouping
- d) all of the above

Q-55) Which script statement keyword is used to load data from databases?

- a) Resident
- b) Load
- c) Select
- d) none

Q-56) \_\_\_\_\_ is only relevant for key fields since they are present in multiple tables and do not share the same value.

- a) ratio
- b) subset ratio
- c) fix ratio
- d) none

Q-57) \_\_\_\_\_ specifies that the join between the two tables should be inner.

- a) Left join

- b) Right join
- c) Inner join
- d) Outer join

Q-58) Modifiers deals with the \_\_\_\_\_

- a) Attribute name
- b) Field name
- c) Entity name
- d) Table name

Q-59) We can use \_\_\_\_\_ for various purposes like for reloading the application and to create object.

- a) Macros
- b) Micros
- c) Statistics
- d) All of the above

Q-60) \_\_\_\_\_ is the key where two or more tables consists more than one common column between them.

- a) Dynamic key
- b) Synthetic key
- c) Schema key
- d) none

Q-61) \_\_\_\_\_ assigns the variable without assesses the expression.

- a) Set

- b) Let
- c) Match
- d) keep

Q-62) The expression sum({\$<Months=>}TotalSales) is example of \_\_\_\_\_.

- a) Schema
- b) Table
- c) Measure
- d) Modifier

Q-63) \_\_\_\_\_ specifies that the join between the two tables should be right join, it uses before the word join.

- a) Left join
- b) Right join
- c) Inner join
- d) Outer join

Q-64) \_\_\_\_\_ is the field which contain the percentage of row which contain the non-null value.

- a) Subset ratio
- b) Information Density
- c) Both
- d) None

Q-65) Join creates \_\_\_\_\_ table.

- a) 1

- b) 2
- c) 3
- d) 4

Q-66) In \_\_\_\_\_ resulting table should contain the full data set from both the sides.

- a) Left join
- b) Right join
- c) Inner join
- d) Outer join

Q-67) Optimized load is much faster and preferable especially for \_\_\_\_\_ set of data.

- a) Large
- b) Small
- c) Medium
- d) all

Q-68) Keep creates \_\_\_\_\_ table.

- a) 1
- b) 2
- c) 3
- d) 4

Q-69) What does Bookmark1 represents in modifier?

- a) Represents the record of current selection
- b) Represents the previous selection

- c) Represents the next selection
- d) Represents the Bookmark name

Q-70) The layer are basically set on the sheet object properties layout where bottom, top, normal respective to the \_\_\_\_\_.

- a) Number
- b) Characters
- c) Alphabets
- d) None

Q-71) Which of the following is not a type of concatenation in Qlik View.

- a) Automatic concatenation
- b) Dynamic concatenation
- c) No concatenation
- d) Forced concatenation

Q-72) The \_\_\_\_\_ is a way of sorting and arranging data into different sets in sheet objects like charts or tables.

- a) Set analysis
- b) Squat analysis
- c) Cross analysis
- d) None

Q-73) Creating a \_\_\_\_\_ and linking it with that particular database or fact table will give you all the details of time and date.

- a) Calendar

b) Date functions

c) Master Calendar

d) None

Q-74) LEF stands for \_\_\_\_\_

a) Licenced Enable File.

b) Licenced Encoder File.

c) Large Enable File.

d) Large Encoder File

Q-75) What does SNMP stands for?

a) Simple network modifier protocol

b) Snowflake network management protocol

c) Simple network management protocol

d) None

Q-76) What are the main tasks performed in the Qlik View document?

a) Reduce

b) Reload

c) Distribute

d) All of the above

Q-77) \_\_\_\_\_ has application files containing your reports/dashboard data/script/data model and connection strings.

a) QVW

b) QVD

c) QVX

d) none

Q-78) \_\_\_\_\_ files stores data in a simple format (without GUI) fetched from the database.

- a) QVW
- b) QVD
- c) QVX
- d) none

Q-79) \_\_\_\_\_ files are used you wish to make your own connector that could connect to QlikView files.

- a) QVW
- b) QVD
- c) QVX
- d) none

Q-80) \_\_\_\_\_ measures the symmetry in a statistical distribution curve.

- a) Kurtosis
- b) Skewness
- c) Statistics
- d) none



Q-81) \_\_\_\_\_ function matches a value from one table with an interval or time value in another table.

- a) Match
- b) Interval Match
- c) Internal match
- d) None

Q.82) Backus-Naur Form is a \_\_\_\_\_

- a) Measure language
- b) Programming language
- c) Meta language

d) None of the above

Q-83) A \_\_\_\_\_ is used to display information like in a meter gauge.

a) Gauge chart

b) Gauge graph

c) Gauge Diagram

d) none

Q-84) Which QlikView service can search for user information?

a) Qlikview publisher

b) Qlikview server

c) Qlikview publisher repository

d) Qlikview directory service connector

Q-85) What does the Garbage tab do in a transformation wizard?

a) Delete unwanted columns

b) Delete unwanted tables

c) Delete unwanted charts

d) Delete unwanted rows

Q-86) Which option is used to create macros?

a) Macros module

b) Micros module

c) Edit module

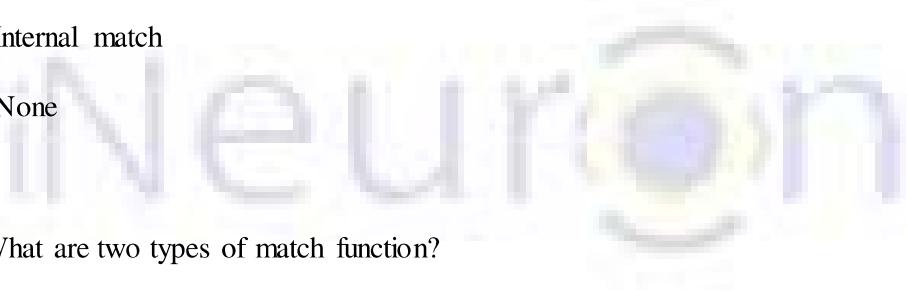
d) All of the above

Q-87) \_\_\_\_\_ feature enables a user to fetch data files from both in-memory and external databases

- a) Direct memory
- b) Direct discovery
- c) Indirect memory
- d) Indirect discovery

Q-89) \_\_\_\_\_ function matches a string expression value with other relevant values.

- a) Match
- b) Interval Match
- c) Internal match
- d) None



Q-90) What are two types of match function?

- a) Match
- b) Wild Match
- c) Internal Match
- d) Both a and b

Q-91) KML stands for\_\_\_\_\_

- a) Keyhole markup language
- b) Key markup language
- c) Key matching language
- d) Keyhole matching language

Q-92) \_\_\_\_\_ use for defining and containing geographical data which use by earth browsers.

- a) UML
- b) XML
- c) KML
- d) DML

Q-93) In which chart does the x-axis wrapped in a 360° round?

- a) Mekko chart
- b) Gauge chart
- c) Radar chart
- d) Combo chart

Q-94) What action do you expect to take place upon pressing Ctrl+E in QlikView?

- a) Reloading the script
- b) Opening script editor
- c) Open document properties
- d) Open report editors

Q-95) Which of the following is not the type of keep?

- a) Left
- b) Right
- c) Inner
- d) Outer

Q-96) \_\_\_\_\_ is used to create the mapping table that can be used for replacing field value and field names.

- a) Mapping table
- b) Mapping query
- c) Mapping function
- d) Mapping load

Q-96) What is considered to be the optimal data structure?

- a) Star schema
- b) Snowflake schema
- c) Database schema
- d) Synthetic schema

Q-97) Can Qlik View extract data from website?

- a) Yes
- b) No

Q-98) Which of the following is not a rotate option?

- a) Rotate right
- b) Rotate left
- c) Rotate out
- d) Transpose

Q-99) Ctrl + T is used to view \_\_\_\_\_

- a) Table view
- b) Dashboard
- c) Menu
- d) None

Q-100) Ctrl + R is used for \_\_\_\_\_

- a) Reload
- b) Rename
- c) Partial reload
- d) None

Q-101) Which of the following is not a type of load in Qlik View?

- a) Buffer load
- b) Residential Load
- c) Incremental Load
- d) Add load

Q-102) A binary load is one of the types of data loaded from QlikView file into the computer's \_\_\_\_\_.

- a) Drivers
- b) RAM
- c) ROM
- d) Register Memories

Q-103) Which of the following has only expressions but not dimensions.

- a) Gauge chart
- b) List Box
- c) Trellis chart
- d) Both (a) and (b)

Q-104) A \_\_\_\_\_ is a compressed table that shows multiple table fields

- a) List box
- b) Multi-box
- c) Statistic box
- d) None of the above

Q-105) \_\_\_\_\_ option is used while connecting to a database using ODBC and when only provides the 32-bit driver.

- a) Force 32 bit
- b) Force 43 bit
- c) Force 0 bit
- d) None

Q-106) \_\_\_\_ is where at least two tables comprises more than one normal section between them.

- a) Synthetic key
- b) Engineered Key
- c) Manufactured key
- d) None

Q-107) Ctrl + Shift + P is used for \_\_\_\_\_

- a) Print
- b) Print as image
- c) Print as PDF
- d) None

Q-108) A \_\_\_\_\_ is a concept that is created when the relationship between two tables can be established directly or through the third table.

- a) For loop
- b) While loop
- c) Circular loop
- d) None

Q-109) Which of the following is not the part of Qlik View Server environment?

- a) Qlik View web server
- b) Directory Service connector
- c) Qlik View Distribution Services
- d) Qlik View console management

Q-110) \_\_\_\_\_ is a platform that centrally manages all the other QlikView components.

- a) Qlik View Publisher.
- b) Qlik View server
- c) Qlik View Desktop
- d) Qlik Management Console

Q-111) Which of the following are document event triggers?

- a) On Open
- b) OnPostReload
- c) OnEnyselect
- d) OnPostRewduseData
- e) All of the above

Q-112) Which of the following are field event triggers?

- a) OnSelect
- b) OnChange
- c) OnLock
- d) OnUnlock
- e) All of the above

Q-113) A \_\_\_\_\_ maintains communication between client/end users.

- a) Qlik View Publisher.
- b) Qlik View server
- c) Qlik View Desktop
- d) Qlik View Directory

Q-114) P() is used for \_\_\_\_\_

- a) Possible values
- b) Excluded values
- c) Targeted values
- d) None of the above

Q-115) If we have data like '98as32r9' and we wish to remove all the alphabets. Which function we will use?

- a) Removealphabets()
- b) Purgechar()
- c) Removechar()
- d) None

Q-116) What is date#() function used for?

- a) Formatting the date
- b) Changing the date
- c) Identifying the date format
- d) None

Q-117) \_\_\_\_\_ treats the null values as missing values and does not allow linking of data.

- a) NullAsNull
- b) NullAsValue
- c) NullAsEmpty
- d) None

Q-118) How many types of triggers are available in Qlik View?

- a) 1
- b) 2
- c) 3
- d) 4

Q-119) Ctrl + B is used for \_\_\_\_\_

- a) Adding schema
- b) Adding Table
- c) Adding record
- d) Adding Bookmark

Q-120) Which of the following are book marks in Qlik View?

- a) Document Bookmarks.
- b) User Bookmarks.
- c) Private Server Bookmarks.
- d) Shared Server Bookmarks.

Q-121) Using what we can show multiple expression in table box?

- a) ||
- b) & &
- c) !!
- d) ==

Q-122) \_\_\_\_\_ allows customers to access and manipulate data files.

- a) Qlik View Publisher.
- b) Qlik View User Access
- c) Qlik View Desktop
- d) Qlik View Directory

Q-123) What is book mark?

- a) A bookmark can select the data in all the states mentioned in the QlikView document.

- b) A bookmark can capture the selections in all the states mentioned in the QlikView document.
- c) A bookmark can load the data in all the states mentioned in the QlikView document.
- d) None

Q-124) \_\_\_\_\_ system variable used to get the number of statements that have caused errors during script execution.

- a) ScriptErrorCount
- b) ScriptError
- c) ScriptCount
- d) SEC

Q-125) E() is used for \_\_\_\_\_

- a) Possible values
- b) Excluded values
- c) Targeted values
- d) None of the above

Q-126) In layout tab for sheet objects top, normal and bottom are denoted by what?

- a) 0,1,-1
- b) 1,-1,0
- c) 0,-1,1
- d) -1,0,1

Q-127) \_\_\_\_\_ helps users to engage in threaded discussions with content.

- a) Qlik View chat

- b) Qlik View FAQs
- c) Qlik View Server
- d) Qlik View Annotation

Q-128) \_\_\_\_\_ is used by developers to use to create the QlikView data model and GUI layout for application to use at the frontend.

- a) Qlik View Publisher.
- b) Qlik View server
- c) Qlik View Desktop
- d) Qlik View Directory

Q-129) What are various types of tables in Qlik View?

- a) Cross tables
- b) Pivot tables
- c) Straight tables
- d) Mapping table
- e) All of the above

Q-130) Which chart has the following look types: Speedometer, Reflected Tube, Traffic light, Test Tube

- a) Gauge chart
- b) Test tube chart
- c) Radar chart
- d) Funnel chart

Q-131) Which of the following are triggers?

- a) Document Trigger
- b) Sheet trigger
- c) Server Trigger
- d) All of the above

Q-132) Which of the following are document triggers?

- a) Document event trigger
- b) Field Event trigger
- c) Variable Event trigger
- d) All of the above

Q-133) Ctrl + E is used to \_\_\_\_\_

- a) Edit the page
- b) Edit the script
- c) Edit the charts
- d) None

Q-134) We can find total number of records by using which of the following?

- a) QvdNumberOfRecords ('path with filename')
- b) QvsNumberOfRecords ('path with filename')
- c) QvPNumberOfRecords ('path with filename')
- d) None

Q-135) How many types of bookmark is available in Qlik View?

- a) 1
- b) 2
- c) 3
- d) 4

Q-136) \_\_\_\_\_ enables linking of data that are null.

- a) NullAsValue
- b) NullAsNull
- c) NullAsEmpty
- d) None

Q-137) By which function does the second half of the table continues besides the first half rather than below it?

- a) Wrap
- b) Rotate
- c) Column
- d) Fill

Q-138) What is considered as identifier in set analysis?

- a) \$
- b) &
- c) \*
- d) !

Q-139) Ctrl +Shift + R is used for \_\_\_\_\_

- a) Partial reload
- b) Reload script
- c) Reload charts
- d) none

Q-140) The \_\_\_\_\_ is a way of sorting and arranging data into different sets in sheet objects like charts or tables.

- a) Set analysis
- b) Squat analysis
- c) Cross analysis
- d) None

Q-141) Full form of XML is \_\_\_\_\_.

- a) Extensive Markup language
- b) Extra Markup language
- c) Extensible Markup language
- d) None

Q-142) \_\_\_\_\_ function these function we are used for Update and delete records updating in QVD. these also we are using where clause.

- a) Exist
- b) Not Exist
- c) Exit
- d) None

Q-143) From which one of these menus will you get an option for Alerts?

- a) Layout
- b) Views
- c) Tool
- d) Object

Q-144) \_\_\_\_\_ is handled by IT professionals in Qlik View.

- a) Qlik View Publisher.
- b) Qlik View server
- c) Qlik View Desktop
- d) Qlik Management Console

Q-145) \_\_\_\_\_ function is used commonly in where clause is the values need to load whatever we have already in QVD those records need to load that time

- a) Exist
- b) Not Exist
- c) Exit
- d) None

Q-146) How can we drop some fields from the memory during script execution?

- a) Drop
- b) Delete
- c) Exit
- d) None

Q-147) Which of the following is not used to separate data fields from a delimited files?

- a) Comma
- b) Tab
- c) Semicolon
- d) Full stop

Q-149) Can we store a sound file in a QlikView document?

- a) Yes
- b) No\

Q-150) We can store a sound file in Qlik View Document using which prefix?

- a) Bundle
- b) Sound
- c) Voice
- d) None

Q-151) \_\_\_\_\_ statement is used to load data from databases.

- a) Load
- b) Select
- c) Match
- d) All

Q-152) \_\_\_\_\_ expansion is used to expand the contents of one cell into several cells in the table.

- a) Content Cell

- b) Context Cell
- c) Call Cell
- d) None

Q-153) Applications created in the desktop version are hosted on \_\_\_\_\_ so that users can access and use them anywhere.

- a) Qlik View Desktop
- b) Qlik View publisher
- c) Qlik View Server
- d) Qlik View Console

Q-154) The \_\_\_\_\_ mode uses the internal web browser in QlikView to display the document layout as an AJAX page.

- a) Web browser
- b) Web view
- c) Web scrapper
- d) None

Q-155) What does \*si\* in text search means?

- a) It searches word with Si as start
- b) It searches word with Si as end
- c) It searches any string that contains si
- d) None

Q-156) While loading two tables cannot intersect with each other. How to find out in QV?

- a) Join

- b) Outer Join
- c) Concatenate
- d) NoConcatenate

Q-157) Which option is used to create macros?

- a) Macros module
- b) Micros module
- c) Edit module
- d) All of the above

Q-158) \_\_\_\_\_ statement is used to load data from all files.

- a) Load
- b) Select
- c) Match
- d) All

Q-159) ETL and OLAP is supported in which of the following?

- a) Qlik View.
- b) Qlik Sense

Q-160) Which of the following has hidden script?

- a) Qlik View.
- b) Qlik Sense

Q-161) Which of the following supports multi cloud platform?

a) Qlik View.

b) Qlik Sense

Q-162) Which button helps you to enter in search mode?

a) F3

b) F4

c) F5

d) F6

Q-163) The \_\_\_\_\_ function to a Load or Select (SQL) statement is used for linking discrete numeric values to one or more numeric intervals.

a) Match

b) Internalmatch

c) NoMatch

d) None

Q-164) ctrl + G is used for \_\_\_\_\_

a) Show/hide ruler

b) Show/hide grid

c) Show/hide script

d) none

Q-165) The \_\_\_\_\_ option is used to mark and delete the data that is not required or that is jumbled and not useful.

a) Dustbin

b) Garbage

- c) Throw
- d) All of the above

Q-166) Which of the following is not the part of Qlik View architecture?

- a) Qlik View Publisher.
- b) Qlik View server
- c) Qlik View Desktop
- d) Qlik View Directory

Q-167) What are the two ways to insert Load statements into script editor?

- a) Inline
- b) File
- c) Both a and b
- d) None

Q-168) \_\_\_\_ is where at least two tables comprises more than one normal section between them.

- a) Synthetic key
- b) Engineered Key
- c) Manufactured key
- d) None

Q-169) How many types of rotate option are available in Qlik View?

- a) 1
- b) 2

c) 3

d) 4

Q-170) A \_\_\_\_\_ shows all the values of single table fields in the form of a list.

- a) List box
- b) Multi-box
- c) Statistic box
- d) None of the above



## **SUBJECTIVE QUESTION.**

- Q1) What are the difference in the features of Power BI, Tableau, and Qlik View?**
- Q2) Explain the components of Qlik View. Explain its features?**
- Q3) What is difference between Qlik view and Qlik Sense?**
- Q4) What are different types of charts which you can use in Qlik View?**
- Q5) Name some tiers of Qlik View and explain them?**
- Q6) Explain snapshots in qv**
- Q7) Explain .QVD files in Qlik View?**
- Q8) Explain CAL in qlik view?**
- Q9) Explain difference between Join and keep.**
- Q10) Explain types of join in Qlik view.**
- Q11) Explain trellis chart of qlik view**
- Q12) Explain difference between straight table and pivot table**
- Q13) Explain snowflake scheme**
- Q14) Explain various statistical functions used in qlik view?**
- Q15) What are various date and time functions in qlik view.**
- Q16) Explain Sheets options in QlikView?**
- Q17) What is set analysis in qlik view?**
- Q18) What is the QlikView server and Publisher?**
- Q19) Name different data bases that can be used with Qlik view?**
- Q20) Explain crosstable feature of qlik view?**
- Q21) Explain scripting in qlik view?**
- Q22) Explain match() function of QV?**
- Q23) What do you know about the report interface of QV?**
- Q24) Significance of rank() function of QV?**
- Q25) What is QIX Engine?**

**Q26) Explain data transformation feature of QV?**

**Q27) Describe the data model view of QV?**

**Q28) What is star schema in QV?**

**Q29) Discuss master calendar option of qv?**

**Q30) What is fuzzy search in qv?**

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# R Interview Questions



## Instructions to solve the Questions:

- 1. Explanation for each and every solution must be given in brief.**
  - 2. Screenshot for each and every step must be provided for questions involving practical implementation.**
  - 3. For theory/conceptual questions. Solutions having at least 1 practical implementation will be favoured.**
- 

- 
- 1) List out some of the function that R provides?
- 2) Explain how you can start the R commander GUI?
- 3) In R how you can import Data?
- 4) Explain how R commands are written?
- 5) How can you save your data in R?
- 6) Mention how you can produce co-relations and covariances?
- 7) Explain what is t-tests in R?
- 8) Explain what is With () and By () function in R is used for?
- 9) What are the data structures in R that is used to perform statistical analyses and create graphs?
- 10) Explain general format of Matrices in R?
- 11) In R how missing values are represented?
- 12) Explain what is transpose?
- 13) Explain how data is aggregated in R?
- 14) What is the function used for adding datasets in R?
- 15) What is the use of subset() function and sample() function in R ?

- 16)** Explain how you can create a table in R without external file?
- 17)** What are the different components of grammar of graphics?
- 18)** What is Rmarkdown? What is the use of it?
- 19)** How do you install a package in R?
- 20)** What are the steps to build and evaluate a linear regression model in R?
- 21)** Name some packages in R, which can be used for data imputation?
- 22)** Explain about confusion matrix in R?
- 23)** Explain initialize() function in R?
- 24)** How can we find the mean of one column with respect to another?
- 25)** What is a Random Walk model?
- 26)** What is a White Noise model?
- 27)** Give any five features of R.
- 28)** Differentiate between R and Python in terms of functionality?
- 29)** Explain RStudio.
- 30)** What are the advantages and disadvantages of R?
- 31)** What is the purpose behind R and Hadoop integration?
- 32)** What will be the output of the expression all(NA==NA)?
- 33)** What is the difference b/w sample() and subset() in R?
- 34)** Why do we use the command - install.packages(file.choose(), repos=NULL)?
- 35)** Give the command to create a histogram and to remove a vector from the R workspace?
- 36)** Differentiate b/w "%%" and "%/%".
- 37)** Why do we use apply() function in R?
- 38)** Differentiate between library() and require() functions.
- 39)** What is the t-test() in R?
- 40)** What is the use of with() and by() functions in R?
- 41)** Differentiate b/w lapply and sapply.
- 42)** Explain aggregate() function.
- 43)** Explain the doBy package?
- 44)** Explain fitdistr() function?
- 45)** What are GGobi and iPlots?
- 46)** Explain the lattice package.
- 47)** Explain anova() function.
- 48)** Explain cv.lm() and stepAIC() function
- 49)** Explain leaps() function

- 50)** Explain relaimpo and robust package
- 51)** Give full form of MANOVA and what is the use of it.
- 52)** Explain mashapiro.test() and barlett.test().
- 53)** Explain the use of the forecast package.
- 54)** Differentiate between qda() and lda() function.
- 55)** Explain the auto.arima() and principal() function.
- 56)** Explain FactoMineR
- 57)** What is the full form of SEM and CFA?
- 58)** Define cluster.stats() and pvclust() function().
- 59)** Define MATLAB and party packages.
- 60)** Explain S3 and S4 systems.
- 61)** Explain Chi-Square Test
- 62)** Explain Random Forest.
- 63)** Explain Time Series Analysis.
- 64)** Explain Pie chart in R.
- 65)** Explain Histogram.
- 66)** What is the main difference between an Array and a matrix?
- 67)** Which data object in R is used to store and process categorical data?
- 68)** What is the main difference between an Array and a matrix?
- 69)** Which data object in R is used to store and process categorical data?
- 70)** How can you load and use csv file in R?
- 71)** How do you get the name of the current working directory in R?
- 72)** What is R Base package?
- 73)** How R is used in logistic regression?
- 74)** How do you access the element in the 2nd column and 4th row of a matrix named M?
- 75)** What is recycling of elements in a vector?
- 76)** Give an example.What are different ways to call a function in R?
- 77)** What is lazy function evaluation in R?
- 78)** How do you install a package in R?
- 79)** Name a R packages which is used to read XML files.
- 80)** Can we update and delete any of the elements in a list?
- 81)** Give the general expression to create a matrix in R.
- 82)** which function is used to create a boxplot graph in R?
- 83)** In doing time series analysis, what does frequency = 6 means in the ts() function?

- 84)** What is reshaping of data in R?
- 85)** What is the output of runif(4)?
- 86)** How to get a list of all the packages installed in R ?
- 87)** What is expected from running the command - strsplit(x,"e")?
- 88)** Give a R script to extract all the unique words in uppercase from the string - "The quick brown fox jumps over the lazy dog".
- 89)** Vector v is c(1,2,3,4) and list x is list(5:8), what is the output of v\*x[1]?Vector v is c(1,2,3,4) and list x is list(5:8), what is the output of v\*x[[1]]?
- 90)** What does unlist() do?
- 91)** Give the R expression to get 26 or less heads from a 51 tosses of a coin using pbinom.
- 92)** X is the vector c(5,9.2,3,8.51,NA), What is the output of mean(x)?
- 93)** How do you convert the data in a JSON file to a data frame?
- 94)** Give a function in R that replaces all missing values of a vector x with the sum of elements of that vector?
- 95)** What is the use of apply() in R?
- 96)** Is an array a matrix or a matrix an array?
- 97)** How to find the help page on missing values?
- 98)** How do you get the standard deviation for a vector x?
- 99)** How do you set the path for current working directory in R?
- 100)** What is the difference between "%%" and "%/%"?
- 101)** What does col.max(x) do?
- 102)** Give the command to create a histogram.
- 103)** How do you remove a vector from the R workspace?
- 104)** List the data sets available in package "MASS"
- 105)** List the data sets available in all available packages.
- 106)** What is the use of the command - install.packages(file.choose(), repos=NULL)?
- 107)** Give the command to check if the element 15 is present in vector x.
- 108)** Give the syntax for creating scatterplot matrices.
- 109)** What is the difference between subset() function and sample() function in R?
- 110)** How do you check if "m" is a matrix data object in R?
- 111)** What is the output for the below expression all(NA==NA)?
- 112)** How to obtain the transpose of a matrix in R?
- 113)** What is the use of "next" statement in R?
- 114)** Which function in R language is used to find out whether the means of 2 groups are equal to each other or not?
- 115)** What is the best way to communicate the results of data analysis using R language?

- 116)** What are with () and BY () functions used for?
- 117)** dplyr package is used to speed up data frame management code. Which package can be integrated with dplyr for large fast tables?
- 118)** In base graphics system, which function is used to add elements to a plot?
- 119)** What are the different type of sorting algorithms available in R language?
- 120)** What is the command used to store R objects in a file?
- 121)** What is the best way to use Hadoop and R together for analysis?
- 122)** What will be the output of log (-5.8) when executed on R console?
- 123)** How is a Data object represented internally in R language?
- 124)** Which package in R supports the exploratory analysis of genomic data?
- 125)** What is the difference between data frame and a matrix in R?
- 126)** How can you add datasets in R?
- 127)** What are factor variable in R language?
- 128)** What is the memory limit in R?
- 129)** What are the data types in R on which binary operators can be applied?
- 130)** How do you create log linear models in R language
- 131)** What will be the class of the resulting vector if you concatenate a number and NA?
- 132)** What is meant by K-nearest neighbour?
- 133)** What will be the class of the resulting vector if you concatenate a number and a character?
- 134)** If you want to know all the values in c (1, 3, 5, 7, 10) that are not in c (1, 5, 10, 12, 14).  
Which in-built function in R can be used to do this? Also, how this can be achieved without using the in-built function.
- 135)** How can you debug and test R programming code?
- 136)** What will be the class of the resulting vector if you concatenate a number and a logical?
- 137)** Write a function in R language to replace the missing value in a vector with the mean of that vector.
- 138)** What happens if the application object is not able to handle an event?
- 139)** Differentiate between seq (6) and seq\_along (6)
- 140)** How do you write R commands?
- 141)** How can you verify if a given object "X" is a matrix data object?
- 142)** What do you understand by element recycling in R?
- 143)** How can you verify if a given object "X" is a matrix data object?
- 144)** How will you measure the probability of a binary response variable in R language?
- 145)** What is the use of sample and subset functions in R programming language?
- 146)** There is a function fn(a, b, c, d, e) a + b \* c - d / e. Write the code to call fn on the vector c(1,2,3,4,5) such that the output is same as fn(1,2,3,4,5).
- 147)** How can you resample statistical tests in R language?
- 148)** What is the purpose of using Next statement in R language?
- 149)** How will you create scatterplot matrices in R language?
- 150)** How will you check if an element 25 is present in a vector?
- 151)** What is the difference between library() and require() functions in R language?
- 152)** What are the rules to define a variable name in R programming language?
- 153)** What do you understand by a workspace in R programming language?
- 154)** Which function helps you perform sorting in R language?
- 155)** How will you list all the data sets available in all R packages?
- 156)** Which function is used to create a histogram visualisation in R programming language?
- 157)** Write the syntax to set the path for current working directory in R environment.
- 158)** How will you drop variables using indices in a data frame
- 159)** What will be the output of runif (7)?
- 160)** What is the difference between rnorm and runif functions ?
- 161)** What will be the output on executing the following R programming code –

```
mat<-matrix(rep(c(TRUE,FALSE),8),nrow=4)
```

```
sum(mat)
```

- 162) How will you combine multiple different string like “Data”, “Science”, “in”, “R”, “Programming” as a single string “Data\_Science\_in\_R\_Programmming” ?
- 163) Write a function to extract the first name from the string “Mr. Tom White”.
- 164) Can you tell if the equation given below is linear or not?
- 165) What will be the output of the following R programming code?

```
var2<- c("I","Love,"ProjectPro")
```

```
var2
```

- 166) I have a string "[contact@dezyre.com](mailto:contact@dezyre.com)". Which string function can be used to split the string into two different strings “contact@dezyre” and “com”
- 167) What is R Base package?
- 168) How will you merge two dataframes in R programming language?
- 169) Explain the usage of which() function in R language
- 170) How will you convert a factor variable to numeric in R language ?
- 171) What is power analysis ?
- 172) Explain the usage of abline() function
- 173) What is the usage of lattice package in R ?
- 174) When is it appropriate to use the “next” statement in R?
- 175) How do you assign a variable in R?
- 176) What are the different data types/objects in R
- 177) How R commands are written?
- 178) What is the use of subset() and sample() function in R?
- 179) How you can produce co-relations and covariances?
- 180) Which method is used for exporting the data in R?
- 181) Which packages are used for exporting of data?
- 182) How impossible values are represented in R?
- 183) Which command is used for storing R object into a file?
- 184) Which command is used for restoring R object from a file?
- 185) What is the use of coin package in R?
- 186) What is the use of tapply?
- 187) What happens when the application object does not handle an event?
- 188) Explain app specific objects which store the app contents
- 189) Explain the purpose of using UIWindow object?
- 190) How to create axes in the graph?
- 191) Why vcd package is used?
- 192) What is iPlots?
- 193) What is the use of lattice package?

- 194)** What is fitdistr() function?
  - 195)** What is the use of sink() function?
  - 196)** On which type of data binary operators are worked?
  - 197)** What is the use of doBY package?
  - 198)** Define loglm() function
  - 199)** How to create scatterplot matrices?
  - 200)** What is the use of diagnostic plots?
- 



# Statistics Interview Questions

## Guidelines

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- No Plagiarism will be entertained in the subjective questions
  - The main aim of all the questions where the answer is numeric value is not the answer, but the approach you followed to get that answer so make sure to explain every step in a clean way.
  - Make sure visuals are easily interpretable and less cluttered so follow the rules of data visualization.
  - Give real-world examples as much as you can in the answers. Good Luck!
- 

Q-1 Explain Correlation? With real-world examples

Q-2 Briefly Explain why correlation does not imply causation. With real-world examples

Q-3 What is Covariance. And what is the main difference between correlation & Covariance?

Q-4 What are the 2 main Fundamental plots to catch Correlation?

Q-5 What is a z-score? EXPLAIN intuitively.

Q-6 Explain Normal distribution with its properties. With real-world examples

Q-7 How is a Normal distribution different from a Standard Normal Distribution? Is there a way to convert it into one another? If Yes, Explain briefly that method.

Q-8 What are Outliers? Explain with a mathematical term.

Q-9 What is a left-skewed and right-skewed distribution. Explain Briefly

Q-10 What is a Symmetric distribution? Give all examples of that distribution with some visuals.

Q-11 What is a relationship between mean, the median in Normal Distribution?

Q-12 What do these terms Bell Curve and Gaussian Distribution mean?

Q-13 How is a box-plot different from a scatterplot?

Q-14 What is the difference between Descriptive and Inferential statistics?

Q-15 What is a population and sample in inferential statistics. Explain briefly with good examples.

Q-16 Let A and B be events on the same sample space, with  $P(A) = 0.3$  and  $P(B) = 0.8$ . Can these two events be disjoint?

Q-17 Can we use a z-table for a skewed distribution? Explain

Q-18 Which statistic is most sensitive to outlier – Mean, Median or mode?

Q-19 What is a percentile?

Q-20 Explain the effect of Shifting linear Transformation on mean, median, S.D. & IQR of data?

Q-21 Explain the effect of Scaling linear Transformation on mean, median, S.D. & IQR of data?

Q-22 What's Density Curve. Give a diagram also.

Q-23 Briefly explain the 'Empirical Rule' in statistics. Explaining with a diagram is mandatory, preferably with real-world data examples.

Q-24 What is the mean and S.D. of a Standard normal distribution.

Q-25 Lifespan of African Lizards is normally distributed with mean = 3.1yrs and S.D. = 0.6yrs . Find the Prob. Of Lizard living between 2.5 yrs to 4.3 yrs. Explain visually with Normal distribution.

Q-26 Consider a Normal distribution of student's heights with mean = 15cm and S.D. = 20cm. Rohan's height = 161.4cm.

What Prob. Of students have height less than Rohan's? Explain visually with Normal distribution

Q-27 Consider a Normal distribution of student's heights with mean = 15cm and S.D. = 20cm. Rohan's height = 161.4cm.

What Prob. Of students have height more than Rohan's? Explain visually with Normal distribution

Q-28 What is the Prob of a student having the same height? Give an approximate value (Hint: No calc. is needed here)

Q-29 A set of laptop prices are normally dist. Mean = \$750 and S.D. = \$60. What is the prob? Of lap prices between \$624 and \$768. Explain visually with Normal distribution.

Q-30 Consider Normal dist. Of pulse rates. Mean = 80, S.D. = 9. Additional testing is to be done for the top 40%. Find the minimum pulse rate among those top 40%? Explain visually with Normal distribution

Q-31 Normal dist of avg. wait time for various roads in Lucknow. Mean = 185 secs and S.D. = 11 secs. Anand wants to take the road that is in the bottom 10% of Lucknow. What is the max wait time in that bottom 10%? Explain visually with Normal distribution

Q-32 State the formula for the correlation coefficient

Q-33 Explain each part of the formula you mentioned above, preferably with an example.

Q-34 Ram has 2 children and 1 of them is a girl. What is the probability that the other child is also a girl?

You can assume that there is an equal number of males and females in the world. Define sample spaces properly.

Q-35 A fair six-sided die is rolled twice. What is the probability of getting 2 on the first roll and not getting 4 on the second roll?

Q-36

$$P(A \cup B \cup C) = P(A \cap C^c) + P(C) + P(B \cap A^c \cap C^c)$$

Is it True or False? Explain your answer.

Q-37 Consider a 4-sided die and roll it twice. What is the probability that the number on the first roll is strictly higher than the number on the second roll?

Define sample space properly.

Q-38 Which of the following can't be a Probability event:

- 0.1
- -0.04
- 0.5
- 0.99999
- 1.0001
- 1/89
- 0

Explain why's with your answer.

Q-39 Urvin randomly picks 4 cards from a deck of 52-cards and places them back into the deck ( Any set of 4 cards is equally likely ). Then, Amit randomly chooses 8 cards out of the same deck ( Any set of 8 cards is equally likely). Assume that the choice of 4 cards by Urvin and the choice of 8 cards by Amit are independent. What is the probability that all 4 cards chosen by Urvin are in the set of 8 cards chosen by Amit? Explain

Context: A player is randomly dealt a sequence of 13 cards from a deck of 52-cards. All sequences of 13 cards are equally likely. In an equivalent model, the cards are chosen and dealt one at a time. When choosing a card, the dealer is equally likely to pick any of the cards that remain in the deck.

Q- 40 If you dealt 13 cards, what is the probability that the 13th card is a King?

Q-41 A fair six-sided die is rolled 6 times. What is the probability of getting all outcomes as unique?

Q-42 A group of 60 students is randomly split into 3 classes of equal size. All partitions are equally likely. A and B are two students belonging to that group. What is the probability that A and B will end up in the same class?

Q-43 We have two coins, A and B. For each toss of coin A, the probability of getting head is  $1/2$  and for each toss of coin B, the probability of getting heads is  $1/3$ . All tosses of the same coin are independent. We select a coin at random. and toss it till we get a head. The probability of selecting coin A is  $\frac{1}{4}$  and coin B is  $3/4$ . What is the expected number of tosses to get the first heads?

Q-44 How would u calculate range & interquartile range.

Q-45 Differentiate between quantitative and qualitative data.

Q-46 Explain with examples -- Categorical ordinal and nominal variables

Q-47 Explain with examples – Numerical Continuous and Discrete data.

Q-48 What is the five-number summary and how is it useful?

Q-49 Suppose a life insurance company sells a \$240,000 one-year term life insurance policy to a 25-year-old female for \$210. The probability that the female survives the year is .999592. Find the expected value of this policy for the insurance company.

Q-50 When can a probability event be independent of itself?

Q-51 Name and explain any 3 outlier detection techniques.

Q-52 Name and explain any 3 outlier handling techniques

Q-53 What would be your approach if I ask you the mean length of all road trips in India? (With a confidence of 95%)

Q-54 Can you relate Standard deviation with Standard error. Explain

Q-55 What are the various effects/trade-offs of changing the width of Confidence Intervals?

Q-56 On increasing Margin of error, what happens to C.I.?

Q-57 What is the difference between 95% confidence and 99% confidence. Can you give a scenario for both?

Q-58 Explain the Degree of freedom

Q-59 What do you think will happen if DF (deg. Of freedom) is large?

Q-60 What is Statistical power?

Q-61 What are a z-test and t-test? Explain briefly

Q-62 When to use which distribution/test? (z & t-test)

Q-63 What are null and alternate hypotheses?

Q-64 Give examples for the above question for one-sided and 2-sided tests.

Q-65 What is the p-value? Explain briefly with example and visual

Q-66 How would you conduct a hypothesis test? Briefly tell every step.

Q-67 Calculate the p-value using any of your favourite tool (python, excel etc) and describe it here.

Q-68 What do we mean by – making a decision based on comparing p-value with significance level?

Q-69 If the null hypothesis consists of a constant value only, what type of test is it you think? Explain in your best way.

Q-70 Do you think the critical values of 95% one tail and 90% two tail are same. If yes, why?

Q-71 Cross-fertilizing a red and a white flower produces red flowers 25% of the time. Now we cross-fertilize five pairs of red and white flowers and produce

five offspring. What is the probability that there are no red flower plants in the five offspring?

Q-72 A roulette wheel has 38 slots – 18 red, 18 black, and 2 green. You play five games and always bet on red slots. How many games can you expect to win?

Q-73 A roulette wheel has 38 slots, 18 are red, 18 are black, and 2 are green. You play five games and always bet on red. What is the probability that you win all the 5 games?

Q-74 Some test scores follow a normal distribution with a mean of 18 and a standard deviation of 6. What proportion of test takers have scored between 18 and 24?

Q-75 A jar contains 4 marbles. 3 Red & 1 white. Two marbles are drawn with replacement after each draw. What is the probability that the same colour marble is drawn twice?

Q-76 Which of the following events is most likely? Give why

- A) At least one 6, when 6 dice are rolled
- B) At least 2 sixes when 12 dice are rolled
- C) At least 3 sixes when 18 dice are rolled
- D) All the above have same probability

Q-77 What is the main difference between Overfitting and underfitting?

Q-78 What is selection bias in statistics?

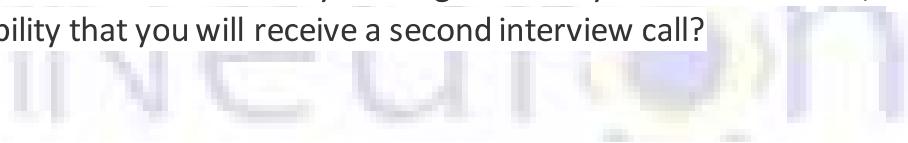
Q-79 What is a Sampling Distribution?

Q-80 What is the Law of Large Numbers?

Q-81 What is the Central Limit Theorem? And what's the use?

Q-82 Briefly explain type-I and type-II Error? Give diagrams also.

Q-83 Suppose you were interviewed for a technical role. 50% of the people who sat for the first interview received the call for second interview. 95% of the people who got a call for second interview felt good about their first interview. 75% of people who did not receive a second call, also felt good about their first interview. If you felt good after your first interview, what is the probability that you will receive a second interview call?



Q-84 A coin of diameter 1-inches is thrown on a table covered with a grid of lines each two inches apart. What is the probability that the coin lands inside a square without touching any of the lines of the grid? You can assume that the person throwing has no skill in throwing the coin and is throwing it randomly.

You can assume that the person throwing has no skill in throwing the coin and is throwing it randomly.

Q-85 Consider the following probability density function: What is the probability for  $X \leq 6$  i.e.  $P(X \leq 6)$

$$f(x) = \frac{1}{8} e^{-x/8} \text{ for } x \geq 0$$

What is the probability for  $X \leq 6$  i.e.  $P(X \leq 6)$

Q-86 In a class of 30 students, approximately what is the probability that two of the students have their birthday on the same day (defined by same day and month) (assuming it's not a leap year)?

For example – Students with birthday 3rd Jan 1993 and 3rd Jan 1994 would be a favourable event.

Q-87 Assume you sell sandwiches. 70% people choose Veg, and the rest choose non-veg. What is the probability of selling 2 veg sandwiches to the next 3 customers?

Q-88 Anand is playing a lottery game where he must pick 2 numbers from 0 to 9 followed by an English alphabet (from 26-letters). He may choose the same number both times.

If his ticket matches the 2 numbers and 1 letter drawn in order, he wins the grand prize and receives \$10405. If just his letter matches but one or both of the numbers do not match, he wins \$100. Under any other circumstance, he wins nothing. The game costs him \$5 to play. Suppose he has chosen 04R to play.

What is the expected net profit from playing this ticket?

Context: HIV is still a very scary disease to even get tested for. The US military tests its recruits for HIV when they are recruited. They are tested on three rounds of Elisa(an HIV test) before they are termed to be positive.

The prior probability of anyone having HIV is 0.00148. The true positive rate for Elisa is 93% and the true negative rate is 99%.

**Q-89** What is the probability that a recruit has HIV, given he tested positive on first Elisa test? The prior probability of anyone having HIV is 0.00148. The true positive rate for Elisa is 93% and the true negative rate is 99%.

**Q-90** What is the probability of having HIV, given he tested positive on Elisa the second time as well.

The prior probability of anyone having HIV is 0.00148. The true positive rate for Elisa is 93% and the true negative rate is 99%.

**Q-91** Suppose you're playing a game in which we toss a fair coin multiple times. You have already lost thrice where you guessed heads but a tails appeared. Which of the below statements would be correct in this case?

- A) You should guess heads again since the tails has already occurred thrice and its more likely for heads to occur now
- B) You should say tails because guessing heads is not making you win
- C) You have the same probability of winning in guessing either, hence whatever you guess there is just a 50-50 chance of winning or losing
- D) None of these

**Q-92** What is Bayesian?

**Q-93** What is Frequentist?

**Q-94** What is Likelihood?

**Q-95** The inference using the frequentist approach will always yield the same result as the Bayesian approach. **Yes/no with Reason**

Q-96 What is Quantile? Is there a difference between quantile and quartile?

Q-97 What is the difference between skewness and kurtosis? Give answer explaining visually

Q-98 What is Moment?

Q-99 State the binomial probability formula.

Q-100 Hospital records show that 75% of patients suffering from a disease die due to that disease. What is the probability that 4 out of the 6 randomly selected patients recover?

Q-101 Give and explain the types of Statistical Sampling techniques.

Q-102 What is the main difference between Data-Mining and Data Profiling?

Q-103 How would you deal with a multi-source data problems?

Q-104 What are types of Missing values.

Q-105 For each type stated above explain what it is with a real world example.

Q-106 Can a machine learning algorithm be used for imputing missing values. If yes, then explain a few methods/algos.

Q-107 What is KPI. Give a real world example

Q-108 What is Design of experiment? (w.r.t Statistics)

Q-109 What is the 80/20 rule of Businesses?

Q-110 What is Hot-Deck and Cold-Deck Imputation?

Q-111 What is the probability of throwing two fair dice when the sum is 5 and 8?

Q-112 State the case where median is better than mean for imputing missing data? Give a real world example.

Q-113 What is six-sigma in statistics?

Q-114 Given a left-skewed distribution that has a median of 60, what conclusions can we draw about the mean and the mode of the data?

Q-115 Discuss some scenarios where you will keep the outliers in data?

Q-116 If there is a 30% prob. Of seeing a car in any 20-min interval . State the prob. Of seeing atleast one car in an hour?

Q-117 Are Symmetric distributions always unimodal?

Q-118 What is Bessel's Correction?

Q-119 Differentiate between Univariate, Bivariate and Multivariate analysis?

Q-120 What types of variables are used for Pearson's correlation coefficient?

Q-121 In a scatter diagram, what is the line that is drawn above or below the regression line called?

Q-122 In an observation, there is a high correlation between the time a person studies and the amount of marks he gets. What can be inferred from this?

Q-123 What type of data does not have a log-normal distribution or a Gaussian distribution?

Q-124 What would you do if your data is not normal? Discuss your approach in brief here.

Q-125 Any 5 types of data transformations techniques to turn features to normal features.

Q-126 The students of a particular class were given two tests for evaluation. Twenty-five percent of the class cleared both the tests and forty-five percent of the students were able to clear the first test.

Calculate the percentage of students who passed the second test given that they were also able to pass the first test.

Q-127 While it is said that the probabilities of having a boy or a girl are the same, let's assume that the actual probability of having a boy is slightly higher at 0.51. Suppose a couple plans to have 3 children. What is the probability that exactly 2 of them will be boys?

Q-128 Heights of 10 year-olds, regardless of gender, closely follow a normal distribution with mean 55 inches and standard deviation 6 inches. Which of the following is true?

- A) We would expect more number of 10 year-olds to be shorter than 55 inches than the number of them who are taller than 55 inches
- B) Roughly 95% of 10 year-olds are between 37 and 73 inches tall
- C) A 10-year-old who is 65 inches tall would be considered more unusual than a 10-year-old who is 45 inches tall
- D) None of these

Q-129 About 30% of human twins are identical, and the rest are fraternal. Identical twins are necessarily the same sex, half are males and the other half are females. One-quarter of fraternal twins are both males, one-quarter both female, and one-half are mixed: one male, one female. You have just become a parent of twins and are told they are both girls. Given this information, what is the probability that they are identical?

Q-130 Rob has fever and the doctor suspects it to be typhoid. To be sure, the doctor wants to conduct the test. The test results positive when the patient actually has typhoid 80% of the time. The test gives positive when the patient does not have typhoid 10% of the time. If 1% of the population has typhoid, what is the probability that Rob has typhoid provided he tested positive?

Q-131 Arun is having two coins in his hand. Out of the two coins, one is a real coin and the second one is a faulty one with Tails on both sides. He blindfolds himself to choose a random coin and tosses it in the air. The coin falls down with Tails facing upwards. What is the probability that this tail is shown by the faulty coin?

Q-132 A fly has a life between 4-6 days. What is the probability that the fly will die at exactly 5 days ?

Q-133 What type of graph would you use for trend analysis. Give a visual also.

Q-134 Explain Survivorship bias.

Q-135 What are confounding variables?

Q-136 What is a point estimate (in inferential stats)?

Q-137 Explain the Experiment Design types in statistics. Give examples if you can.

Q-138 What is the Conditional Probability? Explain with example

Q-139 What is Bayes theorem, give formula also, explaining it. Explain with example.

Q-140 Difference between Binomial and Bernoulli distribution.

Q-141 What is a Poisson Distribution?

Q-142 Differentiate between Random Variables & Geometric Random variables.

Q-143 Give the formula for computing confidence interval for mean for a sample.

Q-144 Give the formula for computing confidence interval for proportion for a sample.

Q-145 Discuss the Assumption of Confidence interval in brief.

Q-146 State the assumption of Central Limit theorem.

Q-147 What is bootstrapping ? When is it useful in statistics?

Q-148 What is Simple Linear regression? How is it Different from Multiple Linear regression? Explain using real world examples.

Q-149 What is regression analysis? State the four most fundamental assumptions of regression? (you can tell more if you know)

Q-150 Explain the above assumptions in detail with examples.

Q-151 What is an A/B Test?

Q-152 Explain the steps involved in conducting an A/B Test?

