Sample Questions

The following sample questions are not inclusive and do not necessarily represent all of the types of questions that comprise the exams. The questions are not designed to assess an individual's readiness to take a certification exam.

JMP Scripting Using JMP 15

Question 1

Which message will evaluate only pending formulas in a data table represented by dt?

A. `dt << Run Formulas;`
B. `dt << Eval Formula;`
C. `dt << Rerun Formulas;`
D. `dt << Eval( Formulas );`

correct answer= "A"

Question 2

Select the code that will present the user with a way to navigate to the target folder without seeing the files and return path. (Choose two.)

A. `Pick Directory()`
B. `Pick Directory( Show Files(0))`
C. `Pick Path()`
D. `Pick Path( No Files )`

correct answer= "A,B"

Question 3

The data table "Sample" has columns W, X, Y, and Z with the following modeling and data types:

Column	Data Type	Modeling Type
W	character	nominal
X	character	nominal
Y	numeric	nominal
Z	numeric	continuous

Sample

Columns (4/0)
W
X
Y
Z

Rows

All rows	8
Selected	0
Excluded	0
Hidden	0
Labelled	0

	W	X	Y	Z
1	A	5	1	10
2	B	6	2	9
3	C	4	3	8
4	D	7	4	7
5	A	3	5	6
6	B	8	6	5
7	C	2	7	4
8	D	9	8	3

When you run the following script, what is the result?

```
Data Table("Sample") << Select Where ( (:X<4) & (:Z>5) )
```

A. Row 7 will be selected.
B. Rows 5 and 7 will be selected.
C. No rows will be selected.
D. Row 5 will be selected.

correct answer= “C”

Question 4

Given the data table "Trial" with columns W, X, Y, and Z. What will be the result when the following script is run?

```
Data Table ("Trial") << sort (by (W X));
```

A. A table sorted by column W and column X will be created.
B. A table sorted by column W will be created.
C. The Trial data table will be replaced with a version that is sorted by column W.
D. A dialog box will appear asking for the columns to sort by.

correct answer= “D”

Question 5

What is written to the log after running the following JSL script?

```
Names Default To Here( 1 );
::x = 5;
x = 8;
here:x = 10;
New Namespace( "x" );
x:x = 15;

Show( x );
```

A. `x = 8`
B. `x = 10`
C. `x = 5`
D. `x = 15`

correct answer= “B”

Question 6

What is the result of evaluating the following?

```
r1 = Contains( [3 4, 2 5, 3 5, 6 4], 5 );
r2 = Contains( {"a","b","e","b","h"}, "b" );
```

A. **r1** is 4 and **r2** is 2
B. **r1** is [4,6] and **r2** is [2,4]
C. **r1** is [4] and **r2** is [2]
D. **r1** is [2,2] and **r2** is 2

correct answer= “A”

Question 7

What is the value of the key 3 within the Associative Array `aa` after running the following script?

```
aa = Associative Array( {2,3,6,10}, {5,2,8,3} );

aa[3] = aa[2] + aa[3];
```

A. 5
B. 7
C. 10
D. 13

correct answer= “B”

Question 8

Which of these loops will have the same number of iterations, given that **dt** is storing a reference to a data table?

```
1. For Each Row( dt,
     //<body expression>
   );

2. For( i = 1, i <= NRow( dt ), i++,
     //<body expression>
   );

3. i = 1;
   While( i < NRow( dt ),
     //<body expression>
     i++;
   );
```

A. 1 and 3
B. 1 and 2
C. 2 and 3
D. None have the same number of iterations

correct answer= “B”

Question 9

Which two functions only test for equality? (Choose two.)

```
aa = Associative Array( {2,3,6,10}, {5,2,8,3} );

aa[3] = aa[2] + aa[3];
```

A. `If()`
B. `Choose()`
C. `Not()`
D. `Match()`

correct answer= “B,D”

Question 10

Given the following code:

```
Names Default to Here( 1 );

n = 5;

If(
     n > 0,
         x = 1,
     n > 3,
         x = 2;
         y = 10,
     n == 5,
         x = 3;
         y = 20,
     n > 10,
         x = 4
);
```

What result is returned to the log by the **`If()`** function?

A. 1
B. 3
C. 5
D. 20

correct answer= "A"

Question 11

Assume the following statement has been run:

`X ="ABCD";`

Which of the following will NOT result in **`y`** being assigned the value of "**A**"?

A. `y = Left( x, 1 );`
B. `y = Word( 1, x, "" );`
C. `y = x[1];`
D. `y = Substr( x, 1, 1 );`

correct answer= "C"

Question 12

When the following is evaluated:

`Remove From({34, "A", 3.14159, .05, .99} ,3)`

What will appear in the log?

A. `{3.14159}`

B. `{3.14159, .05, .99}`

C. `{34, "A", .05, .99}`

D. can only Remove From Simple L-values

correct answer= “D”

Question 13

Given the table below where `Begin` and `End` are both date-time columns and `End` is always later than `Begin`:

	Begin	End
1	08/07/2017 2:00 AM	08/09/2017 1:00 AM
2	09/01/2017 1:00 PM	09/02/2017 2:00 PM
3	09/05/2017 11:00 AM	09/07/2017 3:00 PM
4	10/15/2017 10:00 AM	10/19/2017 11:00 PM
5	11/01/2017 12:00 AM	11/01/2017 12:00 PM
6	11/15/2017 12:00 AM	11/18/2017 12:00 AM
7	11/30/2017 2:00 PM	12/01/2017 1:00 PM

Which statement will calculate the difference between Begin and End such that the result will be in the number of days where a day is defined as 24 hours?

A. `New Column("Days") << Set Formula( Floor( (:End - :Begin) / In Days(1) ) );`
B. `New Column("Days") << Set Formula( Date Difference( :Begin, :End, "Day" ) );`
C. `New Column("Days") << Set Formula( In Days(:Begin - :End) );`
D. `New Column("Days") << Set Formula( Round( (:End - :Begin) / In Days(1), 0 ) );`

correct answer= “A”

Question 14

Given a table with numeric columns M and N, with M having the continuous modeling type and N having the nominal modeling type. The following script would produce which result?

```
Bivariate( Y( :M ), X( :N ) )
```

A. An error message since N is not continuous.
B. A Bivariate analysis of variables M and N.
C. A Oneway analysis since N has the nominal modeling type.
D. A dialog box asking which column should be placed in the X role.

correct answer= “B”

Question 15

Given the table below where `Begin` and `End` are both date-time columns and `End` is always later than `Begin`:

```
Names Default to Here( 1 );
dt = Open( "$SAMPLE_DATA/Big Class.jmp" );
biv = dt << Bivariate( Y( :weight ), X( :height ), Fit Line, Fit Polynomial( 2 ), Fit Polynomial
```

Which statement will calculate the difference between Begin and End such that the result will be in the number of days where a day is defined as 24 hours?

A. `biv[2] << Line Style( "Dotted" ); biv[3] << Line Style( "Dashed" );`
B. `biv[{2,3}] << { Line Style( "Dotted" ), Line Style( "Dashed" ) };`
C. `biv << (Curve[2] << Line Style( "Dotted" ) ) << (Curve[3] << Line Style( "Dashed" ) );`
D. `biv << (Fit[2] << Dotted Line ) << (Fit[3] << Dashed Line );`

correct answer= “C”

Question 16

If your script launches a platform but does not specify a column in a required role, which two statements are true? (Choose two.)

A. The built-in platform dialog opens.
B. No object reference is returned for the platform.
C. An object reference is returned for the platform.
D. An error message appears in the log.

correct answer= “A,B”

Question 17

Which message do you send to a display box to remove it from the report window without removing it from the display tree?

A. `<< set invisible`
B. `<< visibility( "conceal" )`
C. `<< set collapse`
D. `<< visibility( "collapse" )`

correct answer= “D”

Question 18

The Big Class data table is opened and a reference to it is saved in the variable **dt**. The table contains two numeric data columns that use the continuous modeling type.

Which script segment below will create two analysis platforms that would appear together side by side?

A.
```
H List Box(
   dt << Distribution( Y( :weight, :height ) ),
   dt << Bivariate( Y( :weight ), X( :height ), Fit Line )
);
```

B.
```
Panel Box( "Reports",
   dt << Distribution( Y( :weight, :height ) ),
   dt << Bivariate( Y( :weight ), X( :height ), Fit Line )
);
```

C.
```
Outline Box( "Reports",
   dt << Distribution( Y( :weight, :height ) ),
   dt << Bivariate( Y( :weight ), X( :height ), Fit Line )
);
```

D.
```
List Box(
   dt << Distribution( Y( :weight, :height ) ),
   dt << Bivariate( Y( :weight ), X( :height ), Fit Line )
);
```

correct answer= “A”

Question 19

Review the script below:

```
dt = Open( "$SAMPLE_DATA\Fitness.jmp" );

dist = dt << Distribution( Continuous Distribution( Column( :Oxy ) )
);
```

Which code statement will NOT create a custom window containing a Distribution report? ?

A.
```
New Window( "Distribution Results",
    Outline Box( "Distribution of Oxy", V List Box( dist << Clone
Box ) )
);
```
B.
```
New Window( "Distribution Results",
    Outline Box( "Distribution of Oxy", V List Box( Report( dist
) ) )
);
```
C.
```
New Window( "Distribution Results",
    Outline Box( "Distribution of Oxy", V List Box( dist ) )
);
```
D.
```
distr = dist << Report;
New Window( "Distribution Results",
    Outline Box( "Distribution of Oxy", V List Box( distr ) )
);
```

correct answer= “C”

Sample Projects

The JMP Scripting Using JMP 14 exam has a practical section on the exam where you will be asked to work with sample projects and do some scripting in order to be able to answer the test questions. Below are some examples of the types of projects you could see on the exam. It is recommended that you have a copy of JMP 14 in order to practice writing scripts. Note: Answer scripts are provided for your reference.

Question 20

1. Write a JMP script to create a new data table called "Scenario A" containing two columns named **Colors** and **Numbers**. Store the reference to the table in a variable named **dt**.
2. Using the values stored in the **c** and **x** variables created in the set up script (see below), assign the values from list **c** to the **Colors** column and assign the values from matrix **x** to the **Numbers** column.

Set Up Script

```
/*
Project 03 Template

*/

/****************************SETUP SCRIPT*************************/
/* Run the following lines to create variables required for creating the table */

/* Column Name: "Colors"          */
c = {"Black", "Gray", "White", "Red", "Green", "Blue", "Orange", "BlueGreen", "Purple", "Yellow"

/* Column Name: "Numbers"             */
x = [487, 116, 364, 125, 209, 387, 242, 187, 159, 155];

```

Answer

Note: *In the exam you are given a specific spot in a template where you will write your script as shown in the script below:*

```
/****************************SETUP SCRIPT*************************/
/* Run the following lines to create variables required for creating the table */

/* Column Name: "Colors"          */
c = {"Black", "Gray", "White", "Red", "Green", "Blue", "Orange", "BlueGreen", "Purple", "Yellow"

/* Column Name: "Numbers"             */
x = [487, 116, 364, 125, 209, 387, 242, 187, 159, 155];

/**********START YOUR SCRIPT**********/
dt = New Table( "Scenario A",
    New Column( "Colors", Character, Set Values( c ) ),
    New Column( "Numbers", Numeric, Set Values( x ) ),
);



/**********END YOUR SCRIPT**********/

```

Question 21

1. Create a non-modal window containing the display boxes and default values given below. The layout of the window does not matter. Store the reference to the window in the variable **nw**.

DisplayBox	Variable	Property
TextEditBox	tebDefault	Initial Value
NumberEditBox	nebDefault	Initial Value
CheckBoxBox	cbChoices	Items
RadioBox	rbChoices	Items
ComboBox	cmbChoices	Items
ListBoxBox	lbChoices	Items
ButtonBox	bbTitle	Title

```
tebDefault = "Default Text";
nebDefault = 12;
cbChoices = {"Check 1","Check 2","Check 3"};
rbChoices = {"Radio 1","Radio 2"};
cmbChoices = {"Combo 1","Combo 2","Combo 3"};
lbChoices = {"List 1","List 2","List 3"};
bbTitle = "Click Me!";
```

Answer

```
/**********START YOUR SCRIPT**********/

nw = New Window( "Display Box Example",
    Text Edit Box( tebDefault ),
    Number Edit Box( nebDefault ),
    Check Box( cbChoices ),
    Radio Box( rbChoices ),
    Combo Box( cmbChoices ),
    List Box( lbChoices ),
    Button Box( bbTitle )
);


/**********END YOUR SCRIPT**********/
```