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.

SAS Base Programming for SAS 9

Question 1

Given the following data set WORK.CLASS:

<table>
<thead>
<tr>
<th>Name</th>
<th>Gender</th>
<th>Age</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anna</td>
<td>F</td>
<td>23</td>
</tr>
<tr>
<td>Ben</td>
<td>M</td>
<td>25</td>
</tr>
<tr>
<td>Bob</td>
<td>M</td>
<td>21</td>
</tr>
<tr>
<td>Brian</td>
<td>M</td>
<td>27</td>
</tr>
<tr>
<td>Edward</td>
<td>M</td>
<td>26</td>
</tr>
<tr>
<td>Emma</td>
<td>F</td>
<td>32</td>
</tr>
<tr>
<td>Joe</td>
<td>M</td>
<td>34</td>
</tr>
<tr>
<td>Sam</td>
<td>F</td>
<td>32</td>
</tr>
<tr>
<td>Tom</td>
<td>M</td>
<td>24</td>
</tr>
</tbody>
</table>

The following program is submitted:

```sas
data WORK.MALES_OVER25;
  set WORK.CLASS;
  where Gender="M";
  where age>25;
run;
```

How many observations are in the data set WORK.MALES_OVER25?

A) 3  
B) 5  
C) 6  
D) 9  

Answer: B

Question 2

Given the SAS data set WORK.ONE:

<table>
<thead>
<tr>
<th>Revenue2008</th>
<th>Revenue2009</th>
<th>Revenue2010</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.2</td>
<td>1.6</td>
<td>2.0</td>
</tr>
</tbody>
</table>

The following SAS program is submitted:

```sas
data WORK.TWO;
  set WORK.ONE;
  Total=sum(of Rev:);
run;
```
What value will SAS assign to Total?

A) 3
B) 1.6
C) 4.8
D) The program fails to execute due to errors.

Answer: C

Question 3

Given the SAS data set WORK.ONE:

<table>
<thead>
<tr>
<th>Id</th>
<th>Char1</th>
</tr>
</thead>
<tbody>
<tr>
<td>182</td>
<td>M</td>
</tr>
<tr>
<td>190</td>
<td>N</td>
</tr>
<tr>
<td>250</td>
<td>O</td>
</tr>
<tr>
<td>720</td>
<td>P</td>
</tr>
</tbody>
</table>

and the SAS data set WORK.TWO:

<table>
<thead>
<tr>
<th>Id</th>
<th>Char2</th>
</tr>
</thead>
<tbody>
<tr>
<td>182</td>
<td>Q</td>
</tr>
<tr>
<td>623</td>
<td>R</td>
</tr>
<tr>
<td>720</td>
<td>S</td>
</tr>
</tbody>
</table>

The following program is submitted:

```sas
data WORK.BOTH;
    merge WORK.ONE WORK.TWO;
    by Id;
run;
```

What is the first observation in the SAS data set WORK.BOTH?

A. Id Char1 Char2
   --- ------ -----
   182   M  
B. Id Char1 Char2
   --- ------ -----
   182   Q  
C. Id Char1 Char2
   --- ------ -----
   182   M   Q
D. Id Char1 Char2
   --- ------ -----
   720   P   S

correct_answer = "C"

Question 4

Given the SAS data set WORK.INPUT:
The following SAS program is submitted:

```sas
data WORK.ONE WORK.TWO;
  set WORK.INPUT;
  if Var1='A' then output WORK.ONE;
  output;
run;
```

How many observations will be in data set WORK.ONE?

Enter your numeric answer in the space below.

```
correct_answer = "8"
```

**Question 5**

The following SAS program is submitted:

```sas
data WORK.LOOP;
  X = 0;
  do Index = 1 to 5 by 2;
    X = Index;
    end;
run;
```

Upon completion of execution, what are the values of the variables X and Index in the SAS data set named WORK.LOOP?

A. \( X = 3, \) Index = 5
B. \( X = 5, \) Index = 5
C. \( X = 5, \) Index = 6
D. \( X = 5, \) Index = 7

```
correct_answer = "D"
```

**Question 6**

The following SAS program is submitted:

```sas
proc format;
  value score 1 - 50 = 'Fail'
                   51 - 100 = 'Pass';
run;
```
Which one of the following PRINT procedure steps correctly applies the format?

A. `proc print data = SASUSER.CLASS;
   var test;
   format test score;
run;`

B. `proc print data = SASUSER.CLASS;
   var test;
   format test score.;
run;`

C. `proc print data = SASUSER.CLASS format = score;
   var test;
run;`

D. `proc print data = SASUSER.CLASS format = score.;
   var test;
run;`

`correct_answer = "B"`

Question 7

This item will ask you to provide a line of missing code;

The SAS data set WORK.INPUT contains 10 observations, and includes the numeric variable Cost.

The following SAS program is submitted to accumulate the total value of Cost for the 10 observations:

data WORK.TOTAL;
  set WORK.INPUT;
  <insert code here>
    Total=Total+Cost;
run;

Which statement correctly completes the program?

A. `keep Total;`

B. `retain Total 0;`

C. `Total = 0;`

D. `If _N_ = 1 then Total = 0;`

`correct_answer = "B"`

Question 8

Given the following SAS error log

```
data WORK.OUTPUT;
set SASHELP.CLASS;
BMI=(Weight*703)/Height**2;
where bmi ge 20;
ERROR: Variable bmi is not on file SASHELP.CLASS.
run;```

```
What change to the program will correct the error?

A. Replace the WHERE statement with an IF statement
B. Change the ** in the BMI formula to a single *
C. Change bmi to BMI in the WHERE statement
D. Add a (Keep=BMI) option to the SET statement

correct_answer = "A"

Question 9

The following SAS program is submitted:

```sas
data WORK.TEMP;
    Char1='0123456789';
    Char2=substr(Char1,3,4);
run;
```

What is the value of Char2?

A. 23
B. 34
C. 345
D. 2345

correct_answer = "D"