International Institute of Health Management Research Delhi

Supplementary Exam (Batch- 2017-19)

Data Management and Analysis

Total marks: 100 **Duration: 3 hrs**

Answer 'Section A' in question paper itself and attach with the answer sheet. Otherwise, Section A will not be evaluated at all.

SECTION A: MCQs (20 marks)

1) The normal curve of any data distribution in SPSS is generally

a) Unimodal b) Bi-modal c) Tri-modal d) None of the above

2) Merge file option can be used to add

a) Cases b) Variables c) Both (a) and (b) d) None of the above

3) Which option allows user to arithmetically combine or alter variables and place the resulting value under a new variable name

a) Transform b) Compute Variable c) Recode d) None of the above

4) Which type of file can be imported in SPSS

a) Excel files b) MS Access database file c)Both (a) and (b) d) None of the above

5) Missing values can be defined in

a) Data view window b) Variable view window c) Both (a) and (b) d) None of the above

6) Among the following variables names, which one cannot be created in SPSS?

(a) @123 (b) @123-12 (c) @123_ab (d) ab@123

7) The extension of output file of the SPSS is _____

8) If null hypothesis is rejected, does it mean that we have a conclusive proof that the alternative hypothesis is

(a) True (b) False (c) Neither True or False (d) None of these

9) The SPSS option which allows user to analyze only one of the subgroups of research interest is referred as _____

10) Split file option can be used to produce output by groups Y/N

SECTION B: SHORT QUESTIONS (42 marks)

11) What are graphs? Explain the importance of using graphs in data analysis?

12) Briefly mention about DBMS functions.

13) What are the pre-requisites to keep in mind before analyzing the data?

14) Explain the relationship between data, information and knowledge.

15) Differentiate between ordinal and scale variable with example

16) Statistical test shows that two variables are associated with r = 0.6 and p value of 0.02. What does p-value indicates?

17) What are the multiple response variables? Explain their importance.

SECTION C: LONG QUESTIONS (38 marks)

18) Using the output of an independent sample test (given on subsequent page), answer following: **(12 marks)**

a) How many tests have been computed by SPSS?

b) Which one will you choose for interpretation?

c) Reasons for choosing that specific test.

Independent Samples Test

	Levene's Test for Equality of Variances		t-test for Equality of Means						
								95% Confidence Interval of the Difference	
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	Lower	Upper
Equal variances assumed	93.772	.000	5.607	303	.000	2.57474	.45922	1.67108	3.47840
Equal variances not assumed			5.639	228.852	.000	2.57474	.45657	1.67511	3.47436

Q19) Interpret following outputs:

Output (a) **(6 marks)**

Favor or Oppose Death Penalty for Murder

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Favor	572	66.6	73.2	73.2
	Oppose	209	24.3	26.8	100.0
	Total	781	90.9	100.0	
Missing	DK	72	8.4		
	NA	6	.7		
	Total	78	9.1		
Total		859	100.0		

a. Respondent's Sex = Female

DK = Don't Know; NA = Not applicable

Output (b) **(10 marks)**

		Education level (years)	Current salary	Previous experience (in months)
Education level (years)	Pearson correlation Sig. (2-tailed) N	1.000 . 474	.661** .000 474	-.252** .000 474
Current Salary	Pearson correlation Sig. (2-tailed) N	.661** .000 474	1.000 . 474	-.097* .034 474
Previous Experience (in months)	Pearson correlation Sig. (2-tailed) N	-.252** .000 474	-.097* .034 474	1.000 . 474

Output (c) **(10 marks)**

Variables Entered/Removed[b] Mode	Variables Entered	Variable Removed	Method
1	Spendingonadvetisementa	.	Enter

a. All requested variables entered. b. Dependent variable: Sales

Model Summary Mode	R	R Square	Adjusted R Square	Std. Error of Estimated
1	.916[a]	.839	.832	.73875

a. Predictors: (Constant), spending on advertisement