STELLA MARIS COLLEGE (AUTONOMOUS) CHENNAI 600086
(For candidates admitted during the academic year 2016-2017 \& thereafter)
SUBJECT CODE: 16PY/MC/ST34

## B. Sc. DEGREE EXAMINATION, NOVEMBER 2018 <br> PSYCHOLOGY <br> THIRD SEMESTER <br> COURSE : MAJOR - CORE PAPER : STATISTICS PSYCHOLOGY - I

 TIME : 3 HOURSMAX.MARKS:100

## SECTION - A

## I. ANSWER ALL QUESTIONS. EACH ANSWER NOT TO EXCEED 50 WORDS.

(10X2=20)

1. State the difference between statistic and parameter.
2. What is called descriptive statistics?
3. What is meant by cumulative frequency curve?
4. What is a frequency?
5. Write a note on combined mean.
6. What is called average deviation?
7. What is meant by zero correlation?
8. Write a note on linear correlation.
9. What is called mesokurtic?
10. Write a note on Normal Curve.

## SECTION - B <br> II. ANSWER ANY FIVE QUESTIONS. EACH ANSWER NOT TO EXCEED 250 WORDS. <br> (5X8=40)

11. Outline the functions and limitations of statistics.
12. Create a histogram and frequency polygon displaying the mathematics marks in a tenth class by using a suitable class interval:
$89,90,45,12,80,56,20,45,70,45,39,14,59,40,24,35,46,100,78,67$
13. Classify the following data using an appropriate class interval: $19,70,41,32,43,23,44,21,25,24,51,43,25,12,52,90,87,76,56,10,19,18,23,25$, $21,25,53,60,45,67$
14. Calculate the mean for the following data. $34,45,34,23,35,44,29,22,26,31,23,25,33,39,40$
15. Find out the quartile deviation for the following data:
$45, \quad 55, \quad 46,29, \quad 72,24, \quad 46,38,24,35$
16. Write about simple and multiple correlations with examples.
17. Chalk out the uses of a normal curve.
18. Write about the measures of divergence from normality.

## SECTION - C

III. ANSWER ANY TWO QUESTIONS. EACH ANSWER NOT TO EXCEED 1200 WORDS.
19. Differentiate descriptive and inferential statistics with special reference to social sciences.
20. Find out the mean, median and mode for the following data:

| Scores | $F$ |
| :--- | :--- |
| $0-9$ | 6 |
| $10-19$ | 7 |
| $20-29$ | 8 |
| $30-39$ | 10 |
| $40-49$ | 12 |
| $50-59$ | 20 |
| $60-69$ | 10 |
| $70-79$ | 9 |
| $80-89$ | 7 |
| $90-99$ | 6 |
| $99-109$ | 5 |

21. Calculate Pearson's product moment correlation for the following data.

| X | 23 | 38 | 43 | 33 | 41 | 20 | 29 | 42 | 26 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Y | 31 | 38 | 41 | 33 | 38 | 29 | 20 | 41 | 10 |

22. Write the characteristics of normal curve with appropriate figures wherever necessary.
