



**NATIONAL OPEN UNIVERSITY OF NIGERIA**  
**Faculty of Agricultural Sciences**  
**Dept. of Agricultural Economics and Extension**  
**2020\_2 Examination ...**

**Course Code: -- AEM501**

**Course Title: --- Research and Statistics in Agricultural Extension**

**Credit Unit: ----3 Units**

**Total Score: ----70 Marks**

**Time Allowed: - 3 Hrs**

**Instruction: Answer compulsory question 1 (30 mks) and any four (4) questions (10 mks each)**

**Question One**

- Explain the term “research “ (4 mark )
- Explain any four (4) factors that can determine the choice of a research problem or topic by a researcher (8marks)
- Explain two (2) main sources of data to researcher (5 marks)
- What is a hypothesis (3 marks)
- A set of NOUN staff attended a promotion interview and they scored as follows; 56, 57, 58, 67, 68, 69, 86, 85, 85, 78, 79, 85, 65 and 85. From the set of scores, find the
  - Mean (6 mks)
  - Mode (2 mks) and
  - The Range of the scores (2 mks)

**Question Two**

- Explain two (2) goals of Social Research (4 marks)
- Mention four (4) functions of hypothesis to a researcher (6 marks)

**Question Three**

- Succinctly explain any two (2) types of research (4 marks)
- As a researcher, State four (4) types of data that are likely to be collected and used in Social Research (6 marks)

**Question Four**

- Outline four (4) characteristics of research problem (6 marks)
- A questionnaire is different from an interview schedule or recording schedule. State the major difference between them and in their use (4 marks)

**Question Five**

- What is Research Design? (5 marks )
- What is a sample and when is it used? (5 marks)

**Question Six**

Assume a set of students scored the following in their examination: 45, 54, 35, 78, 89, 53, 89, 57, 45, 57, 82, 57. From the distribution, find the; (i) Mean (ii) Median and (iii) Mode (10 mks)

**Question Seven**

- a. From the same set of scores; 45, 54, 35, 78, 89, 53, 89, 57, 45, 57, 82, 57 of the students, Find;
  - (i) The first, second, third and fourth quartile (8 mks )
- b. Report writing is a must at the end of every research. Describe report writing (2 marks)