UGANDA MARTYRS UNIVERSITY

FACULTY OF AGRICULTURE

Bachelor of Science in Agriculture

Year 4 Special/Supplementary Examination: Academic Year 2014-2015

June, 2015

MODULE AG9/OA11: Commodity Improvement and Biotechnology

INSTRUCTIONS:

- Read and understand the questions before answering
- Select and answer any **Four (4) Questions**
- Start each answer on a separate answer sheet
- You are allowed Three (3) **Hours** for the examination

1. a) On what justifications do scientists base their recommendation to farmers to use GMOs to address crop production problems?

   b) What are the likely consequences of GMO pollution?

2. Artificial insemination (AI) deployment benefits all animal farmers and a policy should be put in place to make use of AI compulsory. What are the repercussions, advantages and disadvantages envisaged with such a policy approach?

3. Describe the technical aspects that lead to seed produced by seed companies being of higher quality than that produced on-farm by farmers themselves.

4. Describe the variation encountered in characteristics of dairy cows and indicate which of the characteristics are also important in beef cattle. Give a detailed account of animal breeding by taking one of the domestic animals you know as an example.

5. What is the difficulties animal farms face today in relation to accessibility to elite animal breeds?

6. You are appointed Minister for MAAIF, how would you build a strong animal husbandry industry for your country?

7. What is AI? Give its advantages and disadvantages. What alternative breeding