

KERALA AGRICULTURAL UNIVERSITY

B.Sc Hons (Ag) 2012 Admission

IInd Semester Final Examination- August /September-2013

Cat. No: Path.1101

Marks: 80

Title: Introductory Plant pathology (2+1)

Time: 3 hours

I. Fill up the blanks

(10 x 1= 10)

1. Alternate host of Wheat rust is -----
2. Phanerogamic parasite of Sorghum is -----
3. Individual units of capsids are called as -----
4. Sexual fruiting body of powdery mildew fungi is-----
5. "Tab toxin" is produced by -----

Match the following

- | | |
|------------------------------|--------------------------|
| 6. Bengal famine | a. Rust |
| 7. Aceruvuli | b. <i>Botrydiploia</i> |
| 8. Inclusion body | c. <i>Colletotrichum</i> |
| 9. Compound interest disease | d. Virus |
| 10. Pycnidium | e. Brown spot of rice |

(10x3=30)

II. Write short notes/answers etc. on ANY TEN

1. Write short notes on important taxonomic characters of rust and smut fungi
2. Define Phytoplasma and fastidious vascular bacteria
3. Sexual reproduction in fungi
4. Role of enzymes in pathogenesis
5. Write in detail about general characters of order Melanconiales
6. Give important five bacterial diseases and briefly write the Symptomatology
7. Systematic position and taxonomic character of grape downy mildew
8. Characters of phanerogamic plant parasites and give examples
9. List out important viral diseases and briefly write the virus- vector relationship
10. Write the taxonomic characters of *Agaricus* and *Pleurotus*
11. Explain the disease triangle
12. Nomenclature of fungi

(6x5=30)

III. Write short essays on ANY SIX of the following

1. Define the following Terminology
 - a. Physiological race
 - b. Biotype

- c. Symbiosis
- d. Antagonism
- e. Predisposition

- 2. Compare and contrast with *Rhizopus* and *Mucor* life cycle
- 3. Common symptoms of virus, viroid and Phytoplasma with examples
- 4. Write an essay on general characters of basidiomycotina and Explain Dolipore septum and clamp connection
- 5. Differentiate Uredinales and Ustilaginales
- 6. Explain the reproduction and general characters of bacteria
- 7. Important taxonomic character of Subdivision Deuteromycotina
- 8. Life cycle of loose smut of wheat

IV. Write essay on ANY ONE

(1x10=10)

- 1. Life cycle of wheat rust
- 2. Classification of fungi