

KERALA AGRICULTURAL UNIVERSITY
B.Sc. (Hons.) Agriculture – 2008 Admission - 1st Semester
Final Examination – March/April 2009

Title : Path 1101
Course: Introductory Plant Pathology (1+1)

Max. marks: 80
Time : 3 hours

20 X 0.5 = 10 Marks

I. Fill up the blanks / State True or False

Fill in the Blanks

1. _____ is an externally seed borne fungal pathogen.
2. Bunchy top of banana is transmitted by the vector _____
3. _____ is a pycnidial fungus.
4. Motile sporangiospore is called _____
5. Sesamum phyllody is a _____ disease.
6. Non - septate mycelium is called _____
7. _____ is a vegetative spore.
8. Downy mildew diseases are caused by fungi belonging to the order _____
9. _____ is a toxin produced ^{by} the fungus *Pyricularia*.
10. _____ is a partial stem parasite.

II. Write True / False

11. The sexual spore of *Phytophthora* is ascospore.
12. Phytopathogenic bacteria are prokaryotes.
13. The vector for green gram yellow mosaic virus is whitefly.
14. *Striga* is a total root parasite.
15. The resting spore of *Rhizoctonia solani* is sclerotia.
16. Grain smut of sorghum is a monocyclic disease.
17. *Oxalis sp* is an alternate host for wheat black stem rust disease.
18. Red rust disease is caused by viroid.
19. Asexual spore of *Mucor* is conidia
20. Female gametangium in Ascomycotina is called Oogonium.

III. Write answers in word or sentence / Define

10 X 1 = 10 Marks

1. Non motile sporangiospore.
2. Saprophyte
3. Pathogen
4. Disease syndrome
5. Pathogenicity
6. Zygosporangia
7. Perithecium
8. Basidiospore
9. Vector
10. Pycnidia

IV Short Notes (Any Ten)

10 x 2 = 20 Marks

1. Autoecious rust
2. Spiroplasma
3. Resting spores
4. Homothallism
5. Isogametic copulation
6. Karyogamy
7. Mushroom
8. Rhizomorph
9. Phytoplasma
10. Aecial stage in rust
11. Obligate parasite
12. Heterothallism

V Short Essays (Any four)

4 x 5 = 20 Marks

1. Sexual and Asexual fruiting bodies in fungi.
2. General characters and various symptoms caused by viral pathogens.
3. Classification of bacteria and their important characters.
4. Life cycle of *Pythium aphanidermatum*
5. Classification of sub division Ascomycotina up to genera level.
6. Symptoms of bacterial diseases, mode of entry and spread

VI Write essay of Any Two

2 x 10 = 20 Marks

1. Write the important taxonomic characters and classification of sub division Basidiomycotina Write briefly life cycle of *Puccinia graminis tritici*
2. Write briefly the reproduction in fungi and Bacteria.
3. Mention important characters of Myxomycota. Write briefly the classification of Myxomycota and life cycle and *Plasmodiophora brassicae*.