2018

BOTANY

(Major)

Paper: 5.2 71.

(Plant Pathology and Lichen)

Full Marks: 60

Time: 3 hours

The figures in the margin indicate full marks for the questions

- **1.** Answer the following questions: $1 \times 7 = 7$
 - (a) Which penetrating structures are formed by fungal pathogens?
 - (b) What is chlorosis?
 - (c) Who discovered Bordeaux mixture?
 - (d) What are necrotrophs?
 - (e) Which disease was responsible for Irish famine?

(f)	What is	the	most	destructive	disease	of
	sugarcane?					

- (g) Write the name of a reindeer moss.
- **2.** Write brief notes on the following: $2\times4=8$
 - (a) Systemic infection
 - (b) Primary inoculum and secondary inoculum
 - (c) Crop rotation
 - (d) Disease forecasting
- **3.** Write briefly on any *three* of the following: 5×3=15
 - (a) Koch's postulates
 - (b) Pathotoxin and vivotoxin
 - (c) Anthropochory
 - (d) Hypersensitive response
 - (e) Soil fumigation
 - (f) Classification of lichen

4. Give an account of dissemination and transmission of plant pathogens. 10

Or

Write notes on the following:

5×2=10

- (a) Yellow mosaic of bhindi
- (b) Leaf spot disease of cabbage
- 5. What is an epidemic? Discuss the factors related to the development of an epidemic.

2+8=10

Or

Give an account of the symptoms, causal organism, disease cycle and control measures of black stem rust of wheat.

2+2+3+3=10

6. Discuss the symptoms, causal organism, disease cycle and control measures of grey blight of tea.

Or

Give an illustrated account of methods of reproduction in lichens.

* * *