

M.Sc. 3rd Semester Examination, 2023

BOTANY

(Cell Biology and Genetics)

(Practical)

PAPER — 395.1

Full Marks : 25

Time : 3 hours

Answer all questions

The figures in the right hand margin indicate marks

*Candidates are required to give their answers in
their own words as far as practicable*

**A . Perform the *tick marked* problem of the
following : 10**

1. Work out the **Sample A, show prometaphase,
early /late anaphase, late telophase and interphase**

and describe each of them with the right drawing as shown under microscope. $2\frac{1}{2} \times 4$

2. Work out the **Sample B**, show any two divisional stages and describe each of them with the right drawing as shown under microscope. $5 + 5$
 3. Work out karyotype from the **Sample C** and comment on it.
 - B. Work out the following problem : 10
 4. Perform Chi-square test for the given problem in **Sample D** and comment on the inheritance pattern of the assumed one.
 5. Laboratory note book 2
 6. Viva-Voce 3
-

M.Sc. 3rd Semester Examination, 2023

BOTANY

(Cell Biology and Genetics)

(Practical)

PAPER – 395.1 (Old)

Marks : 25

Time : 3 hours

Answer all questions

The figures in the right hand margin indicate marks

*Candidates are required to give their answers in
their own words as far as practicable*

- A. Perform the *tick marked* problem of the following: 10
1. Make a squash preparation of the **Sample A**, show any four phases of mitotic division and

(Turn Over)

describe each of them with the suitable drawing as shown under microscope. $2\frac{1}{2} \times 4$

2. Work out the **Sample B** with a smear preparation of anther tissue, show any two divisional stages and describe each of them with the right drawing as shown under microscope. $5 + 5$
 3. Work out karyotype from the **Sample C** and comment on it.
 - B. Work out the following problem : 10
 4. Perform Chi-square test for the given problem in **Sample D** and comment on the inheritance pattern of the assumed one.
 5. Laboratory note book. 2
 6. Viva-Voce 3
-