

101

3 Hours / 70 Marks

Seat No.

- Instructions –
- (1) All Questions are Compulsory.
 - (2) Answer each next main Question on a new page.
 - (3) Illustrate your answers with neat sketches wherever necessary.
 - (4) Figures to the right indicate full marks.
 - (5) Assume suitable data, if necessary.
 - (6) Mobile Phone, Pager and any other Electronic Communication device permissible in Examination Hall.

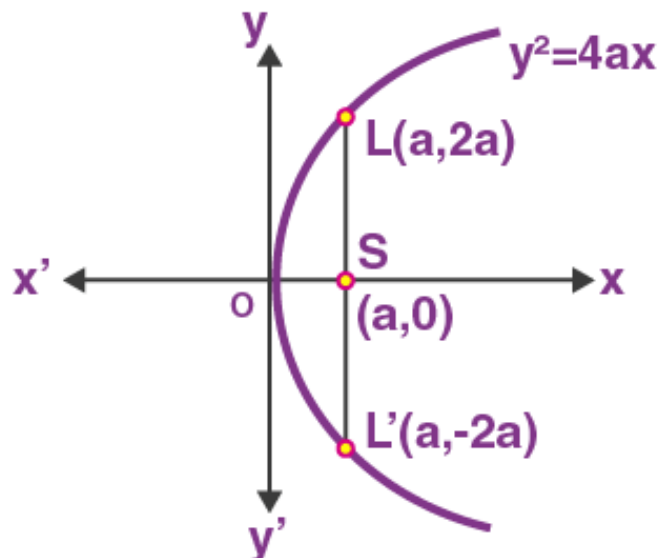
1. Answer any 5 questions:

a

Since the eccentricity of the parabola is 1, $PM / PF = 1$

$$PM = PF$$

Using the distance formula,



$$(x+a)^2 + y^2 = |x+a|$$

$$(x - a)^2 + y^2 = (x + a)^2$$

$$y^2 = 4ax$$

Standard equation of Parabola

b

c

d

e

f

g

2. Answer any 3 questions:

a

b

c

d

3. Answer any 3 questions:

a

b

c

d

4. Answer any 2 questions:

a

b

c

d

e

5. Answer any 2 questions:

a

b

c