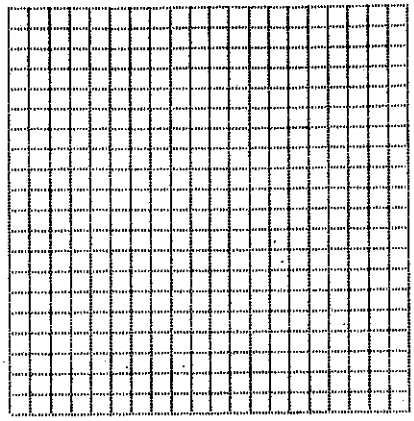
Honors Algebra 2
Conics Test Review

Name: _____
Period: _____

Find the required information & graph.

1. $x^2 + y^2 - 6x - 8y + 24 = 0$

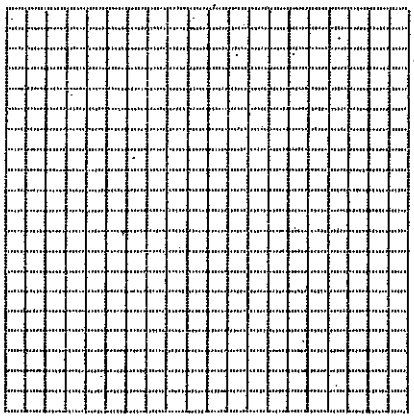


Standard form: _____

Center: _____

Radius: _____

2. $y^2 - 9x^2 - 8y + 36x - 29 = 0$



Standard form: _____

Center: _____

Eqn. of transverse axis: _____

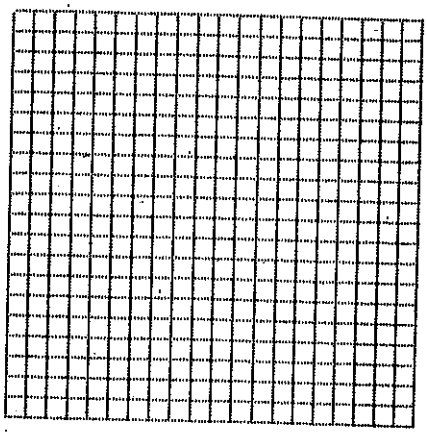
Vertices: _____ _____

Co-Vertices: _____ _____

Coord. of foci: _____ _____

Eqns. of asymptotes: _____

3. $y^2 - 4y - 4x + 16 = 0$



Standard form: _____

Opens: _____

Coord. of vertex: _____

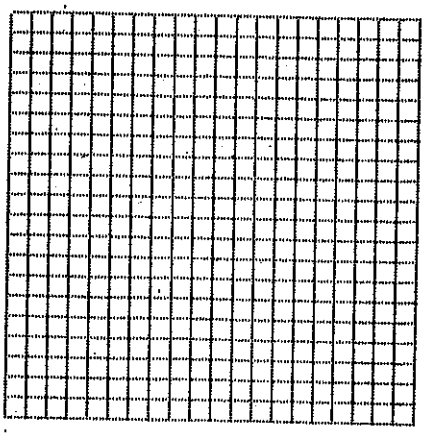
Coord. of focus: _____

Eqn. of directrix: _____

Eqn. of axis of sym: _____

EPLR: _____ _____

4. $2x^2 + 8x + y^2 + 4 = 0$



Standard form: _____

Center: _____

Maj. axis: | | to _____ axis; Eqn: _____

length : _____

Min. axis: | | to _____ axis:

length: _____

Coord. of foci: _____ _____

Identify the conic section represented by the equation.

5. $x^2 - 4y^2 + 6x + 16y - 11 = 0$ _____

6. $x^2 + y^2 - 6x + 4y + 9 = 0$ _____

7. $y = 2x^2 - 4x + 3$ _____

8. $4x^2 + 3y^2 + 8x - 24y + 51 = 0$ _____

Write the standard form of the equation of the conic with the given characteristics.

9. C (2, -1); r = 4 _____

10. C (1, -1); V (-1, -1) (3, -1); $c^2 = 5$ _____

11. F (0,-4); V (0,0) _____

12. C (1,1); a = 3 b = 2
major axis horizontal _____

Write the standard form equation of each conic.

13) _____ $4x^2 + 3y^2 + 8x - 24y + 51 = 0$

14) _____ $x^2 + y^2 - 6x + 4y + 9 = 0$

15) _____ $x^2 - 4y^2 + 6x + 16y - 11 = 0$

16) _____ $x^2 - 4x - 2y + 13 = 0$

17) _____ $y^2 - x^2 + 6x - 4y - 6 = 0$