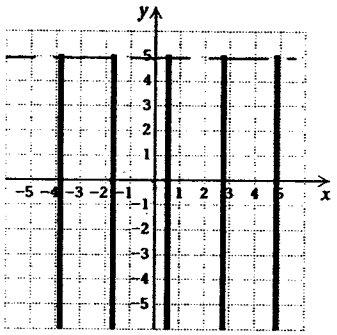
EXTRA PRACTICE 26
Inequalities in Two Variables
Use After Section 9.4

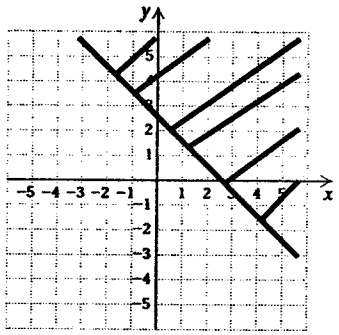
NAME_____

Examples: Graph.

a) $y < 5$



b) $x + y \geq 3$



Determine if the given ordered pair is a solution to the inequality.

1. $(3,6)$; $2x+3y>8$ _____

2. $(-1,4)$; $2x+6y<19$ _____

3. $(3,-8)$; $4x-8y>20$ _____

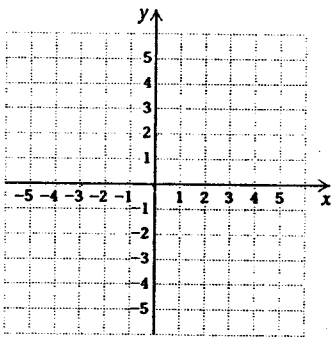
4. $(1,3)$; $6x+3y>10$ _____

5. $(1,1)$; $4x-3y<-29$ _____

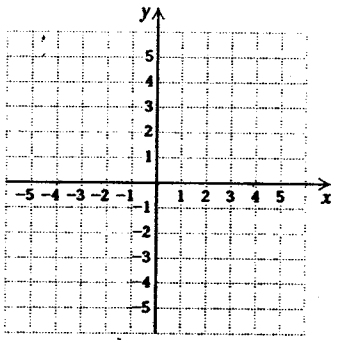
6. $(6,7)$; $-3x+9y>25$ _____

Graph.

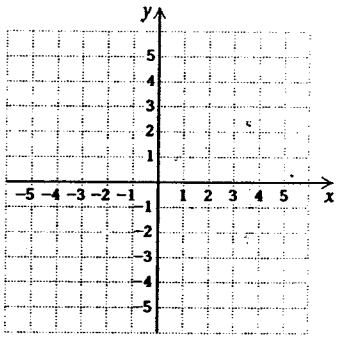
7. $y < 2$



8. $x > 3$



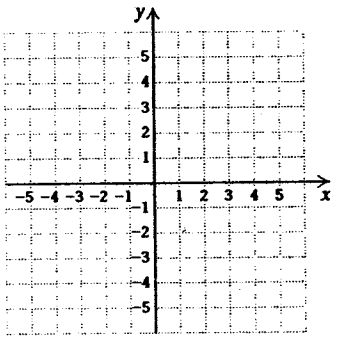
9. $y \geq 4$



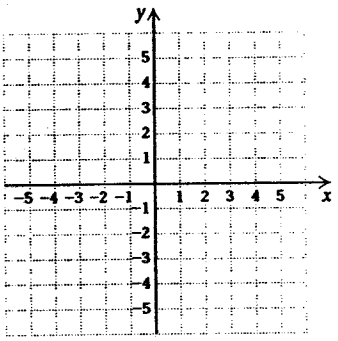
EXTRA PRACTICE 26
Inequalities in Two Variables
Use After Section 9.4

---

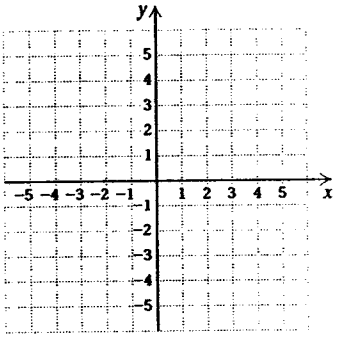
10. $x \le 4$



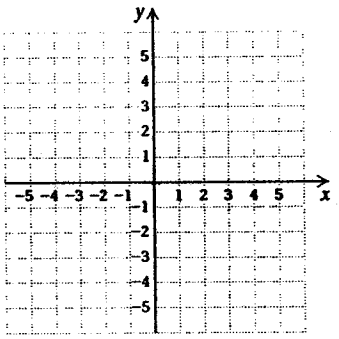
11. $y < x + 3$



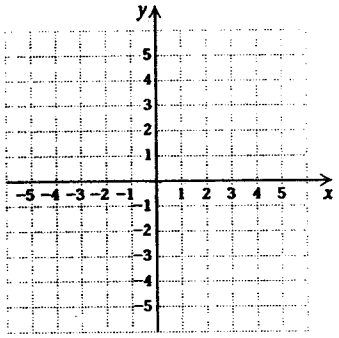
12. $y \le x - 5$



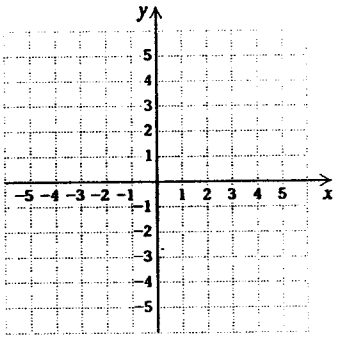
13. $y > 6 + x$



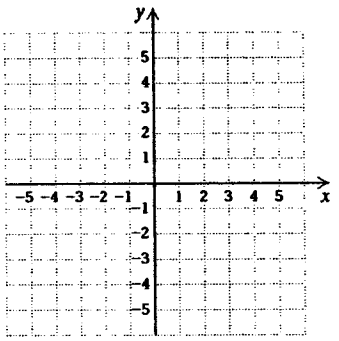
14. $x \le 3y + 2$



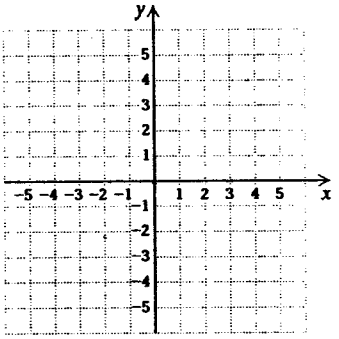
15. $2x + 3y \ge 5$



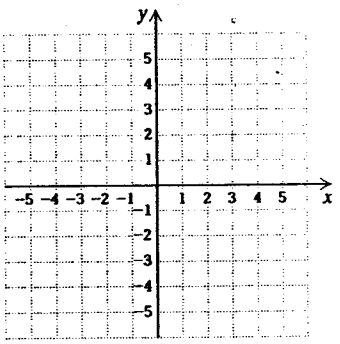
16. $2y - 5x < 13$



17. $-5 \le x < 3$



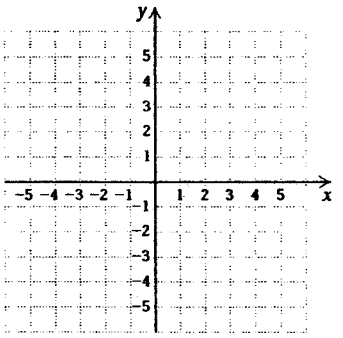
18. $x - 3y \ge 4$



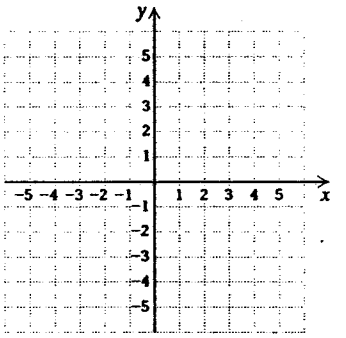
EXTRA PRACTICE 26
Inequalities in Two Variables
Use After Section 9.4

NAME_____

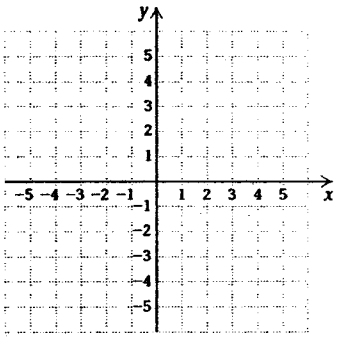
19. $4x + 3y \geq 7$



20. $2 < y \leq 4$

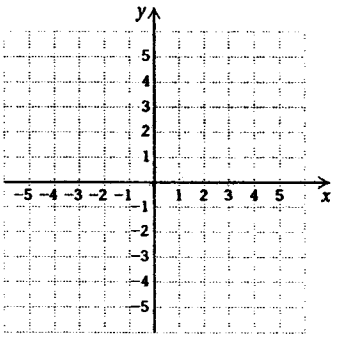


21. $4x + 2 \leq 3y + x$

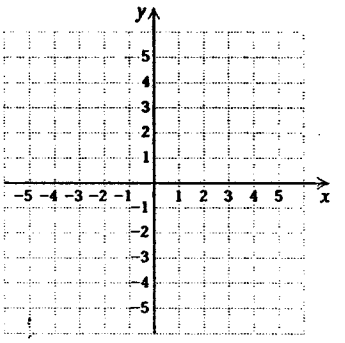


Graph each system.

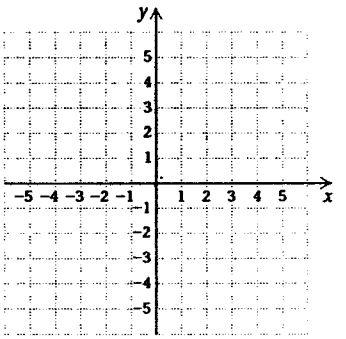
22. $y \geq 4$;
$y \leq 5 + x$



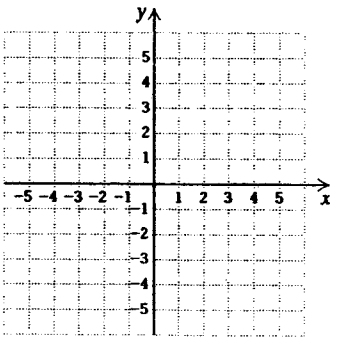
23. $y < x + 2$;
$x < 3y$



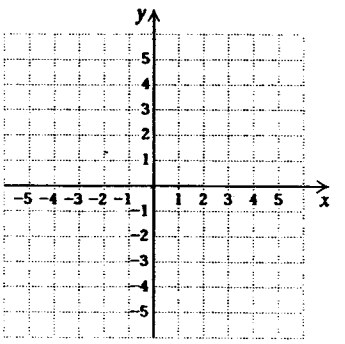
24. $y > 3x + 2$;
$y < x$



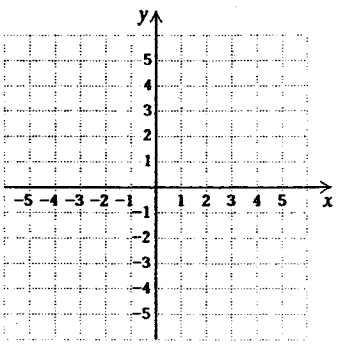
25. $5x + 2y > 3$;
$2x - 3y \leq 4$



26. $3y \geq 4x$;
$y > x - 2$



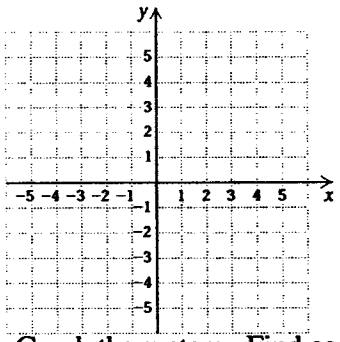
27. $4x + 3 < y$;
$3y \geq 2$



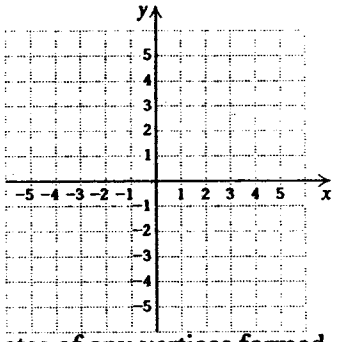
EXTRA PRACTICE 26
Inequalities in Two Variables
Use After Section 9.4

---

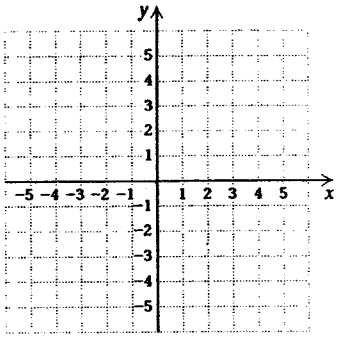
28. $6x + 3 \le y + 2$;
$x \ge 0$



29. $x + y > 0$;
$3y < x + 3$

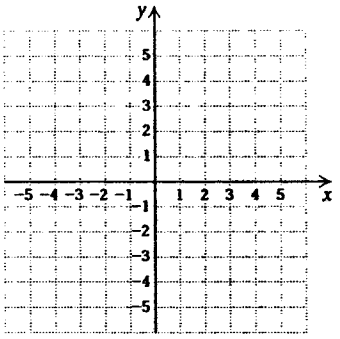


30. $4x + 3y < 5$;
$5x \ge 3y$

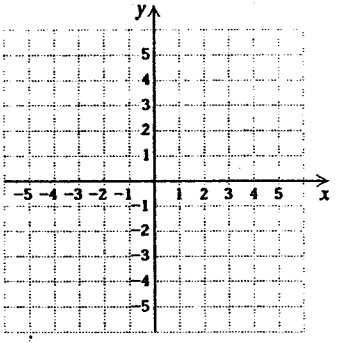


Graph the system. Find coordinates of any vertices formed.

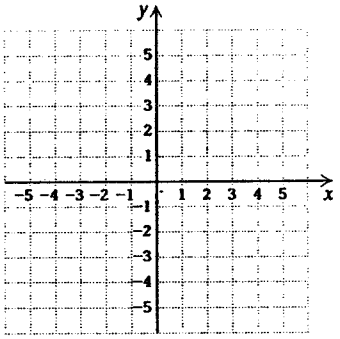
31. $y \ge 2x + 3$;
$y \le 5x - 2$;
$x \ge 3$



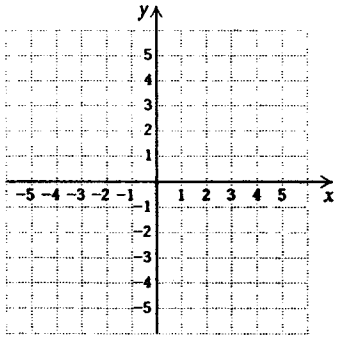
32. $y \le 9x - 3$;
$x \le 5$;
$x \ge y + 2$



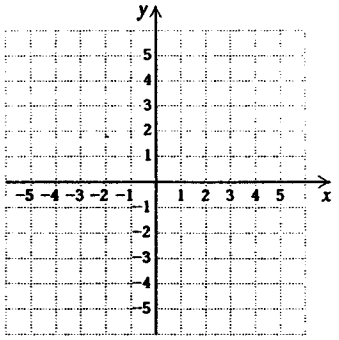
33. $x + 3y \le 14$;
$3y + 2x \ge 4$;
$x + y \ge 4$



34. $3x + 2y \ge 4$;
$3x + 2y \le 7$;
$0 \le x \le 1$



35. $5x + 2y \ge 3$;
$2y - 5x \le 4$;
$x \ge 0$;
$y \ge 0$



36. $3x + 2y \ge 6$;
$3x + 2y \le 10$;
$x \ge 2$;
$y \le 5$