**Graphing Inequalities**

In this internal we are not only graphing lines that are equal, but we are wanting to graph areas that are more or less than a line to find a ‘feasible region’. This is an area where all of the inequalities hold true. The first one has been done for you.

|  |  |
| --- | --- |
| **Question 1**4x + 3y ≤ 1207x + 8y ≤ 280x ≥ 5y ≥ 10 |  |
| **Question 2**12x + 5y ≤ 3008x + 13y ≤ 520x ≥ 5y ≥ 16 |  |
| **Question 3**14x + 9y ≤ 6308x + 15y ≤ 600x ≥ 5y ≥ 10 |  |
| **Question 4**11x + 9y ≤ 4952x + 3y ≤ 120x ≥ 11y ≥ 17 |  |
| **Question 5**18x + 5y ≤ 4504x + 9y ≤ 360x ≥ 8y ≥ 16 |  |
| **Question 6**5x + 2y ≤ 1505x + 9y ≤ 450x ≥ 12y ≥ 11 |  |
| **Question 7**13x + 10y ≤ 6509x + 19y ≤ 855x ≥ 19y ≥ 20 |  |
| **Question 8**3x + 2y ≤ 1505x + 19y ≤ 475x ≥ 13y ≥ 7 |  |