

1) If $2x - 8 = 26$, then $x = 17$

2) If it is raining, then the grass is wet

3) If a number is divisible by 10, then it is divisible by 5 (True)

Inverse:

If a number is not divisible by 10, then it is not divisible by 5 (False)

Converse:

If a number is divisible by 5, then it is divisible by 10 (False)

Contra-positive:

If a number is not divisible by 5, then it is not divisible by 10 (True)

4) If $m\angle 1 = 135^\circ$, then $m\angle 1$ is obtuse (True)

Inverse:

If $m\angle 1 \neq 135^\circ$, then $m\angle 1$ is not obtuse (False)

Converse:

If $m\angle 1$ is obtuse, then $m\angle 1 = 135^\circ$ (False)

Contra-positive:

If $m\angle 1$ is not obtuse, then $m\angle 1 \neq 135^\circ$ (True)

5) answers vary ex: $x = -10$

6)

