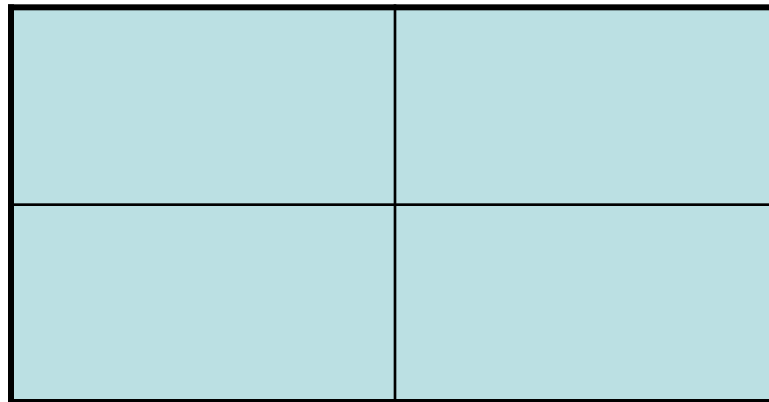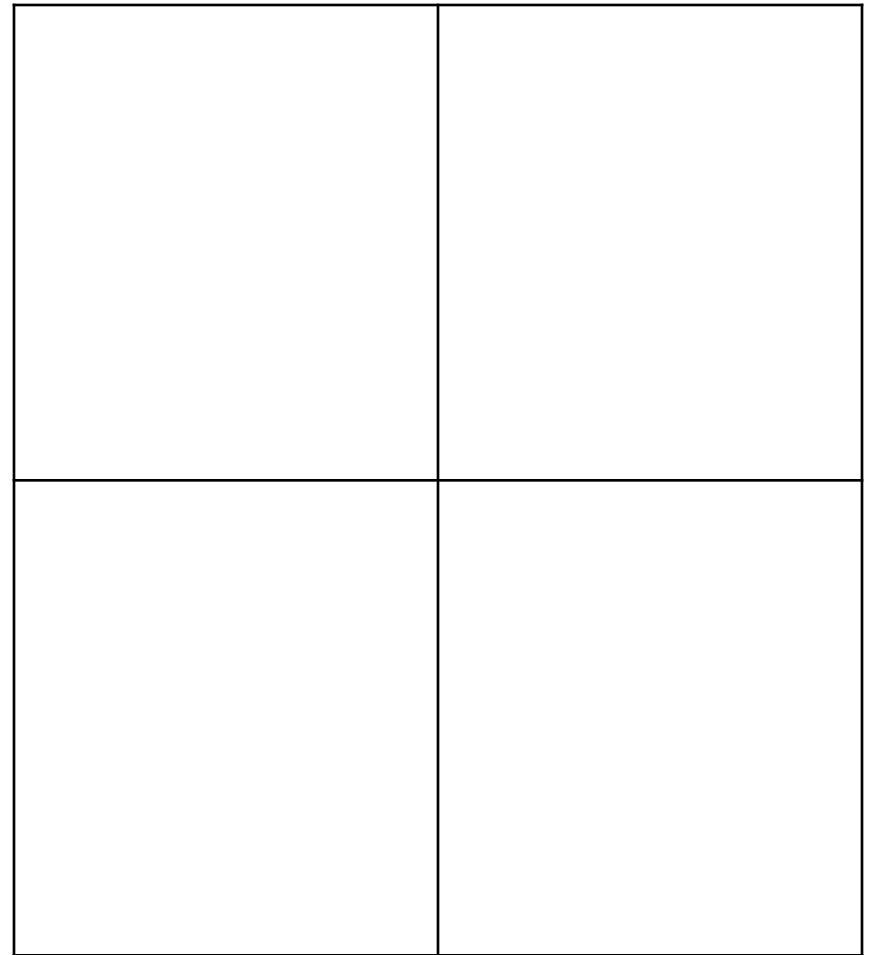# Steve's Square Converter

To advance the page hit the space bar

Steve's Square Converter

- Here's a fun tool to help you convert almost anything to anything in water & wastewater math

- Let's start off with a square box

Steve's Square Converter

- Next, place the conversion in the box
- Let's use

  1 cf = 7.5 gal
- Place 1 cf in top left box
- Place 7.5 gal in bottom left box

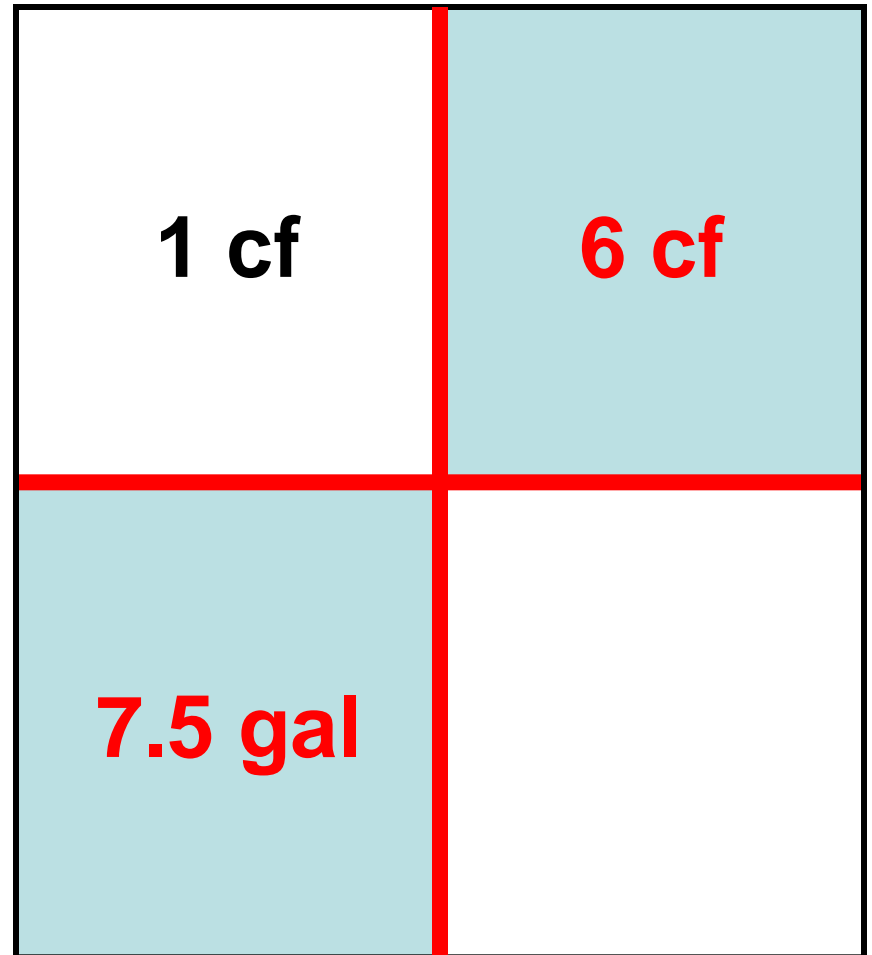|	
1 cf	
7.5 gal	

Steve's Square Converter

- OK, now we're ready to convert
- Let's say we trying to convert 6 cf to gallons
- Place 6 cf in the upper right hand box

1 cf	**6 cf**
7.5 gal	

Steve's Square Converter

- To get the answer, multiply the highlighted "cross cells"

- The borders of the cell kind of look like a large X on its side

1 cf	**6 cf**
7.5 gal	

Here's How It'd Look

7.5 gal   **6 cf**

Steve's Square Converter

- 7.5 x 6 = **45 gal**

1 cf	**6 cf**
7.5 gal	**45 gal**

How About Cubic Feet?

- To get cubic feet, we start out the same way
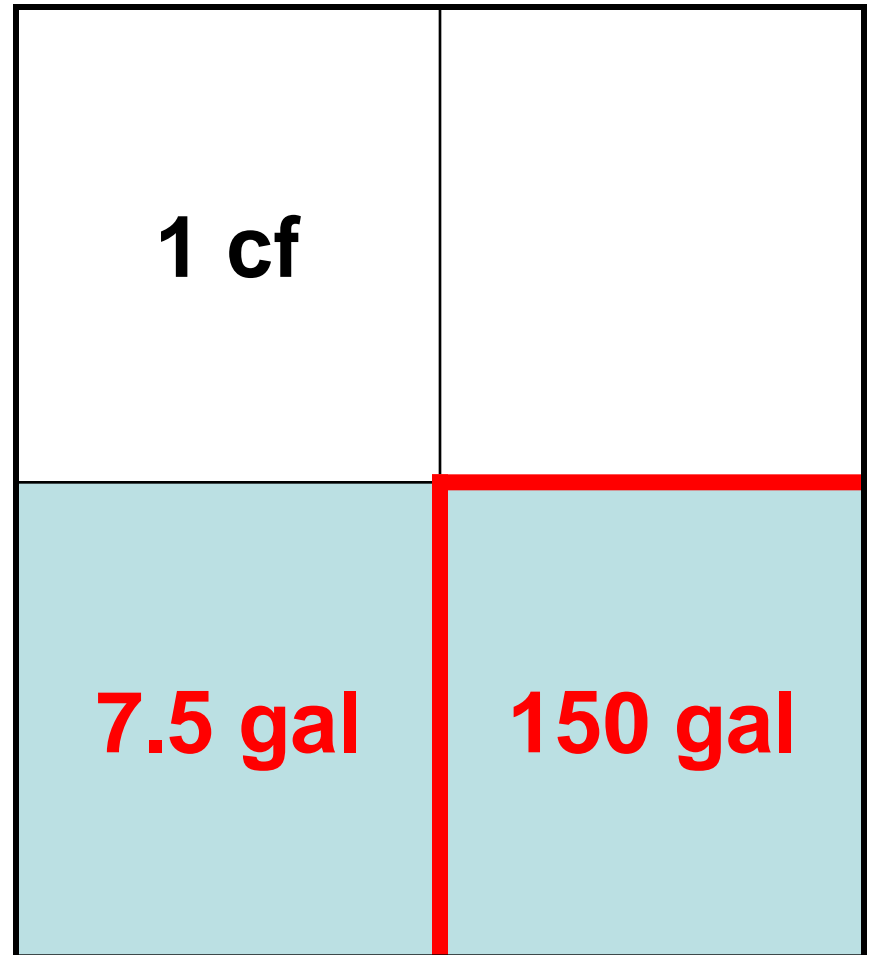 - Place 1 cf in top left box
  - Place 7.5 gal in bottom left box

1 cf	
7.5 gal	

How About Cubic Feet?

- Lets use 150 gal
  - Place 150 gal in the lower left box

1 cf	
7.5 gal	**150 gal**

How About Cubic Feet?

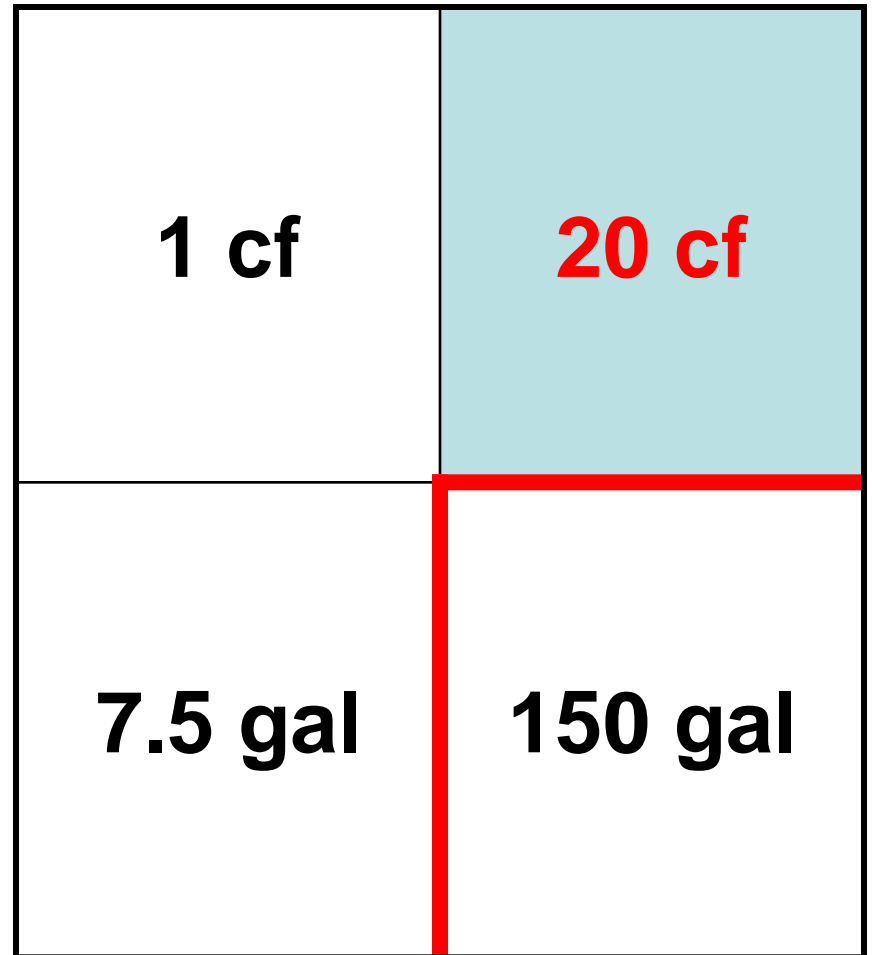- If you look just right, you can see the long hand division the we used to divide

1 cf	
7.5 gal	**150 gal**

Here's How It'd Look

7.5 gal | 150 gal

How About Cubic Feet?

- 150 ÷ 7.5 = **20 cf**

1 cf	**20 cf**
7.5 gal	**150 gal**

Steve's Square Converter

- Pretty cool!!!
- So let's recap what we've done
  1. Draw a square
  2. Fill in the conversions
  3. Place the number that you wish to be converted in the box (cell) opposite of the conversion with the same units of measurement
  4. Based on it's position, do the mathematical operation and there's you answer!!!

Want More Practice?

20 psi = ??? ft of head

Steve's Square Converter
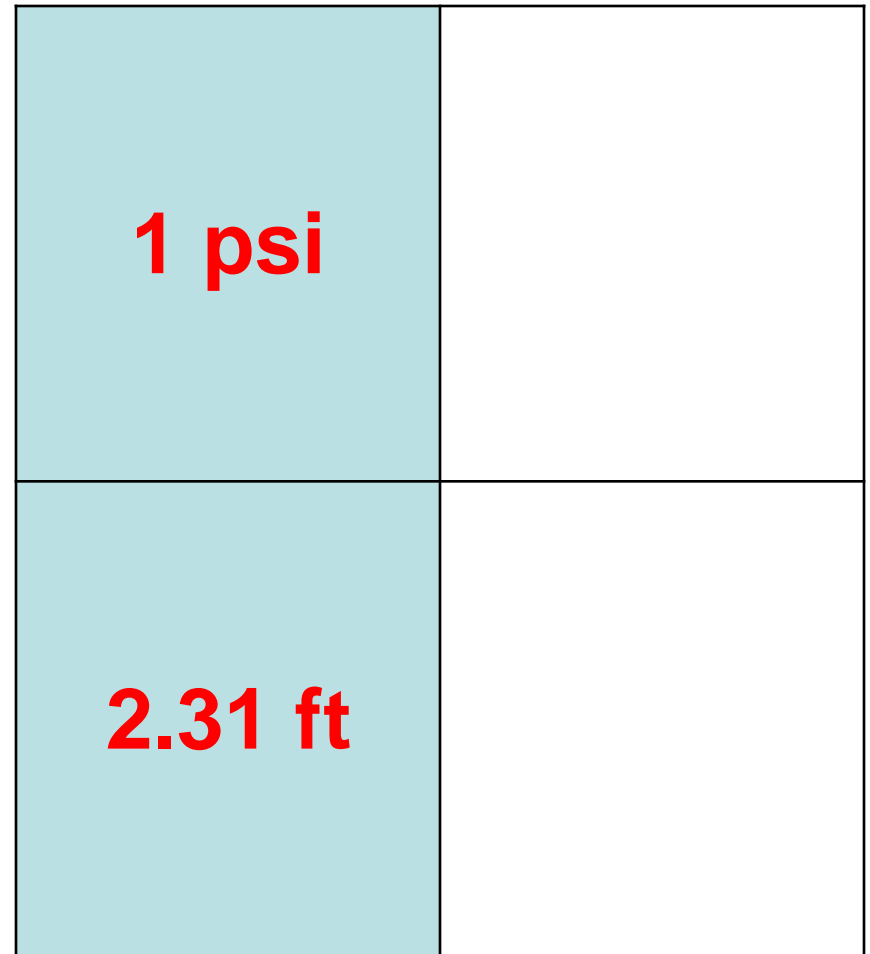
1. Draw a square
2. Fill in the conversions

   1 psi = 2.31 ft

   OR

   1 ft = 0.433 psi
3. Let's use

   1 psi = 2.31 ft

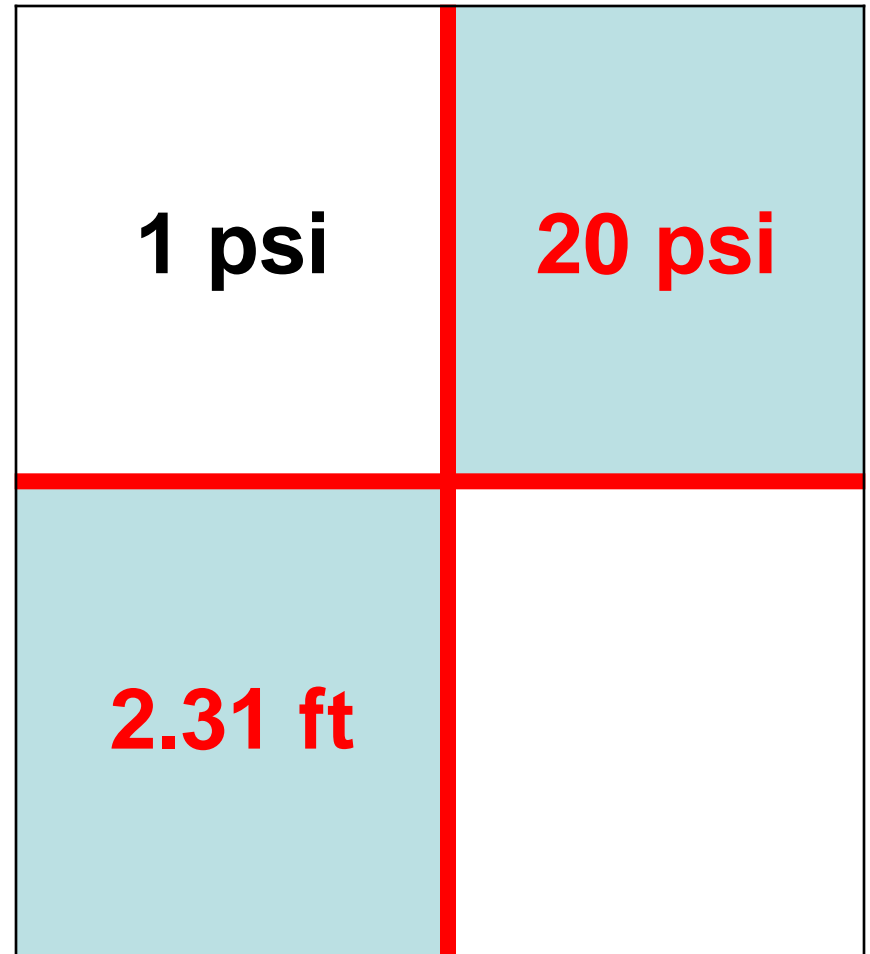|	
1 psi	
2.31 ft	

Steve's Square Converter

3. Place the number that you wish to be converted in the box (cell) opposite of the conversion with the same units of measurement

1 psi	**20 psi**
2.31 ft	

Steve's Square Converter

4. Based on it's position, do the mathematical operation
   – Cross multiply

1 psi	**20 psi**
2.31 ft	

Steve's Square Converter

2.31 x 20 psi = **46.2 ft**

1 psi	**20 psi**
2.31 ft	**46.2 ft**

Steve's Square Converter

1. Now, let's try

   1 ft = 0.433 psi

1 ft	
0.433 psi	

Steve's Square Converter
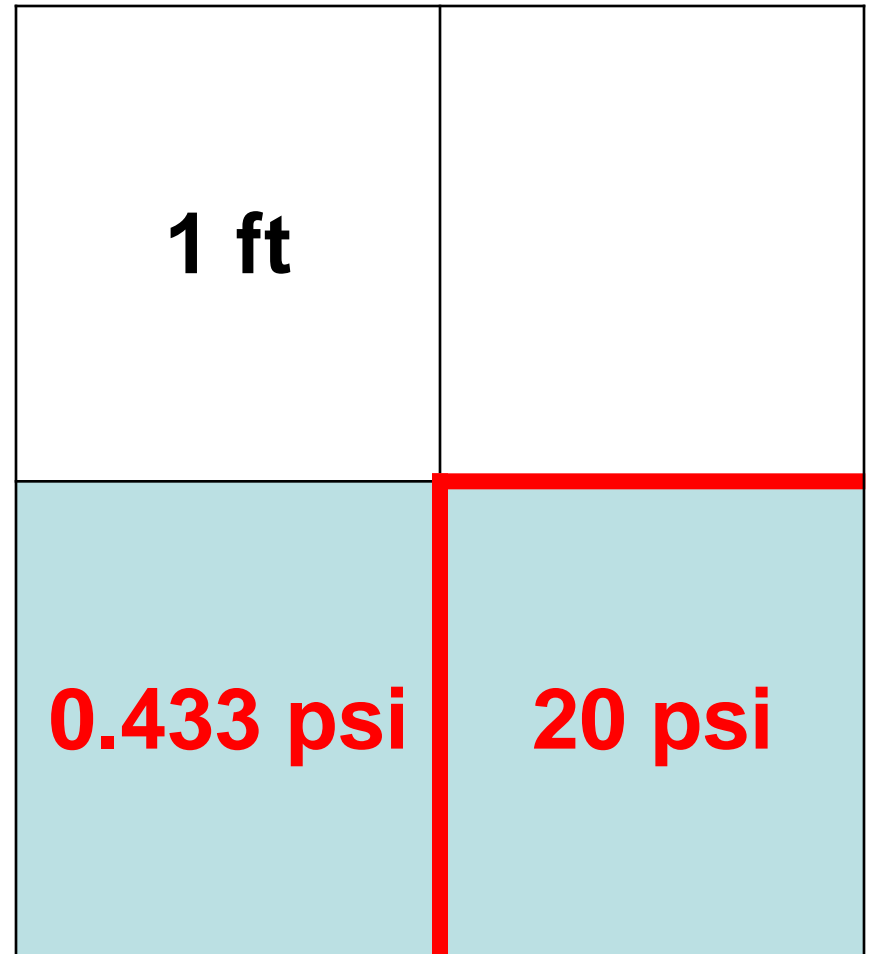
Place the number that you wish to be converted in the box (cell) opposite of the conversion with the same units of measurement

1 ft	
0.433 psi	**20 psi**

Steve's Square Converter

Based on it's position, do the mathematical operation

– Divide

1 ft	
0.433 psi	**20 psi**

Steve's Square Converter

20 ÷ 0.433 = **46.2 ft**

1 ft	**46.2 ft**
0.433 psi	**20 psi**

Steve's Square Converter

- One last point
  - **Always set up your conversion so with the unit with 1 on the left side of the equal sign**

    1 gal = 8.34 lbs

- Have fun!!!