

## One Step Equations

How many pennies are in the cup (assume the cup weighs nothing)?

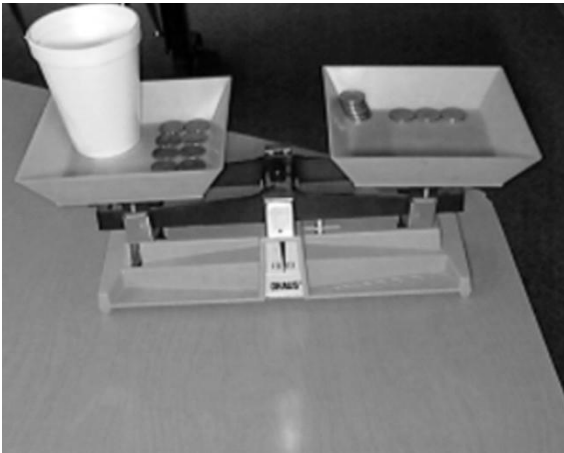
1)



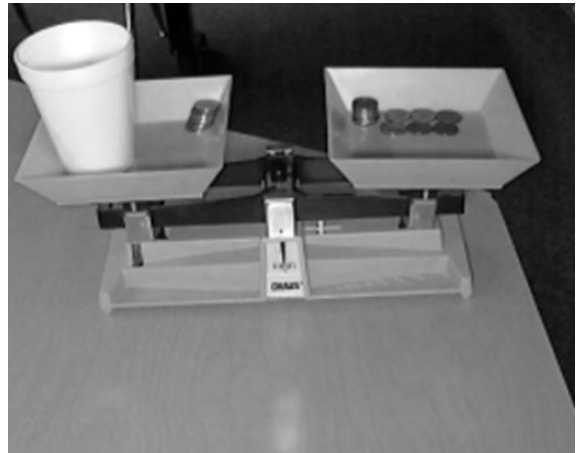
2)



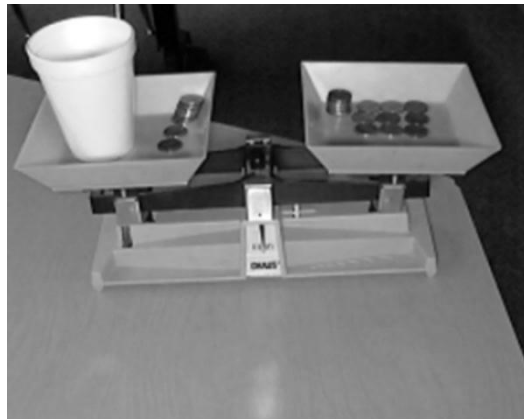
3)



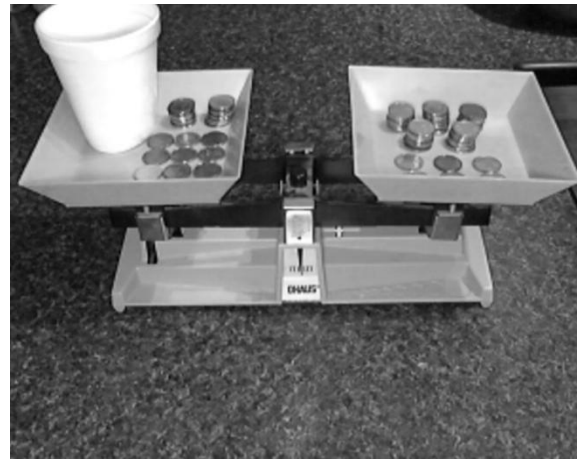
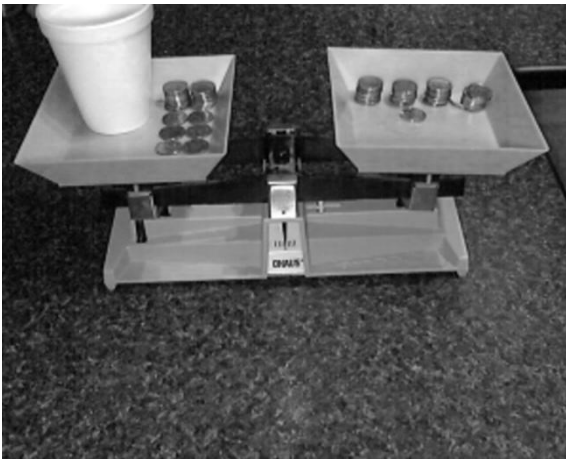
4)



5)



*Do you notice any patterns? Try your idea on these more difficult problems.*



*What did you do to solve the harder problems? Make a simple rule that you can use to solve any of these problems.*

---



---



---

Problem	Visual	Number of Pennies in the cup
<p><i>On the left side there is 1 cup and 5 pennies</i></p> <p><i>On the right side there is 10 pennies.</i></p>		

Problem	Visual	Number of Pennies in the cup
<p><i>On the left side there is 1 cup and 8 pennies.</i></p> <p><i>On the right side there is 10 pennies.</i></p>		
<p><i>On the left side there is 1 cup and 9 pennies.</i></p> <p><i>On the right side there is 12 pennies.</i></p>		
<p><i>On the left side there is 1 cup and 17 pennies.</i></p> <p><i>On the right side there is 23 pennies.</i></p>		
<p><i>On the left side there is 1 cup and 195 pennies.</i></p> <p><i>On the right side there is 235 pennies.</i></p>		



Check in with Mr. Piccini

Try it with variables instead of cups.

Problem	Verification
$x + 7 = 16$  $x =$	
$x + 7 = 18$  $x =$	
$x + 37 = 72$  $x =$	
$x + 15 = 32$  $x =$	
$x + 21 = 18$  $x =$	
$x + 35 = 88$  $x =$	

*Challenges*

$$x - 18 = 27$$

$$x =$$

$$x + 10.7 = 16$$

$$x =$$

*Does your pattern work with any number? Grab your white board, find some numbers that don't work (what different types of numbers do we know?). See if you can break the rule. Report any of your findings here...*