

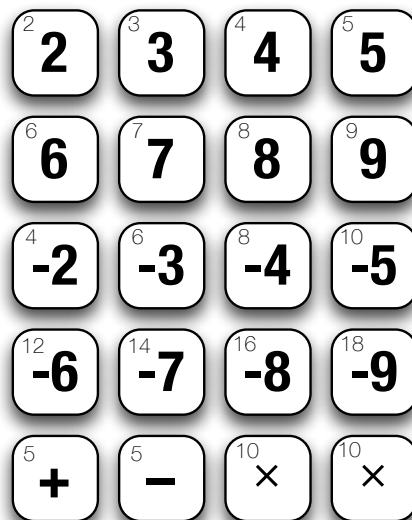
Walking the Line

Instructions

Now you will make “walking paths” – numerical expressions – out of “tiles.”

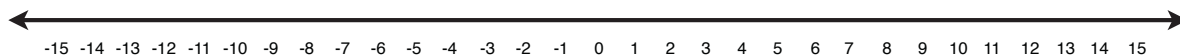
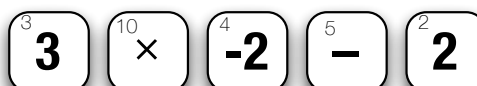
Each tile has a number of points in the corner. Add up the points to get the score. Here are the tiles and the rules:

- You cannot use any tile twice in the same walking path.
- Your path cannot step outside the range (-15 to +15).
- You may not put two number tiles next to each other! Separate them with the +, -, or × tiles. So no two-digit numbers, and you can't do something like [7][-3] to make 4.
- Parentheses are free.



Your tasks

1. Illustrate this path to -8 on the number line.



2. Figure out how many points it gets.

3. Make a new path to -8 that scores higher than the sample above.

- Write the expression.
- Draw the walk on the number line. Be sure you can tell which direction the dude is facing!
- Describe it in words.
- Calculate how many points it gets.



4. Now your **poster challenge** is to get as high a score as you can with a path to positive 11. Good luck!

- Write the expression.
- Draw the walk on the number line.
- Describe it in words.
- Calculate how many points it gets.

Make sure your poster communicates your thinking!

5. Finally, see if you can beat the score of your path to positive eleven. You can go to any number between -15 and +15. Put that path on your poster as well. describe it the same way you did the path to 11, and also explain why you picked the number you did.

6. Be ready to demonstrate your paths on the class number line.