

WHY DO I USE MINECRAFT TO TEACH AREA AND PERIMETER:

I owe this idea to my husband. As I was preparing an area lesson for my third graders, I asked for a new idea rather than go my normal 'laying grass' or 'carpet' situation. Wondering if I could use Minecraft, he looked it up on Youtube to see if others have done it. Sure enough, there are many out there that have had success with this. So, I went to work creating task cards for my students. Here are a basic task cards I created. I have had a lot of success with this idea. Even my low students quickly catch on to the idea of area and perimeter and have had continued success with being able to do it on paper. "I picture it in my head like a Minecraft problem," they tell me. It is a digit hands-on experience for them. They have been so motivated to play the game and do the task cards correctly. We have had a blast using Minecraft to teach math.

HOW DO I USE MINE CRAFT TO TEACH AREA AND PERIMETER:

I first model this for my students! (If you don't know how to play, I suggest Youtubing this to watch someone play.) I lay the expectations out there right away!! If they break the rules, I bench them for a day or two and if it happens again, I bench them permanently (which has yet to happen).

1. Set up the game: I brought in my Playstation, but I know you can download it on the computer. I create a new world and in the new world, we play offline with the following settings: I select the option- super flat world. I put it in the setting peaceful and easy in creative mode.
2. I give them a task card. They are to dig a rectangle according to the task card. Next, they are to fill in the hole they've dug with blocks. I make them use different colored blocks for each row they do.
3. Last, I have them make a sign and post it. The sign includes their name and their equations: perimeter and area.

I go in and correct it later. ☺

Create a rectangle with a perimeter of 20 units.

$$P = 20 \text{ units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with a perimeter of 28 units.

$$P = 28 \text{ units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with a perimeter of 34 units.

$$P = 34 \text{ units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with a perimeter of 40 units.

$$P = 40 \text{ units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with an area of 16 square units.

$$A = 16 \text{ sq. units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with an area of 12 square units.

$$A = 12 \text{ sq. units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with an area of 24 square units.

$$A = 24 \text{ sq. units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)

Create a rectangle with an area of 36 square units.

$$A = 36 \text{ sq. units}$$

Don't forget to make a sign that includes:

- Your name(s)
- The Area (and the equation you used)
- The Perimeter (and the equation you used)