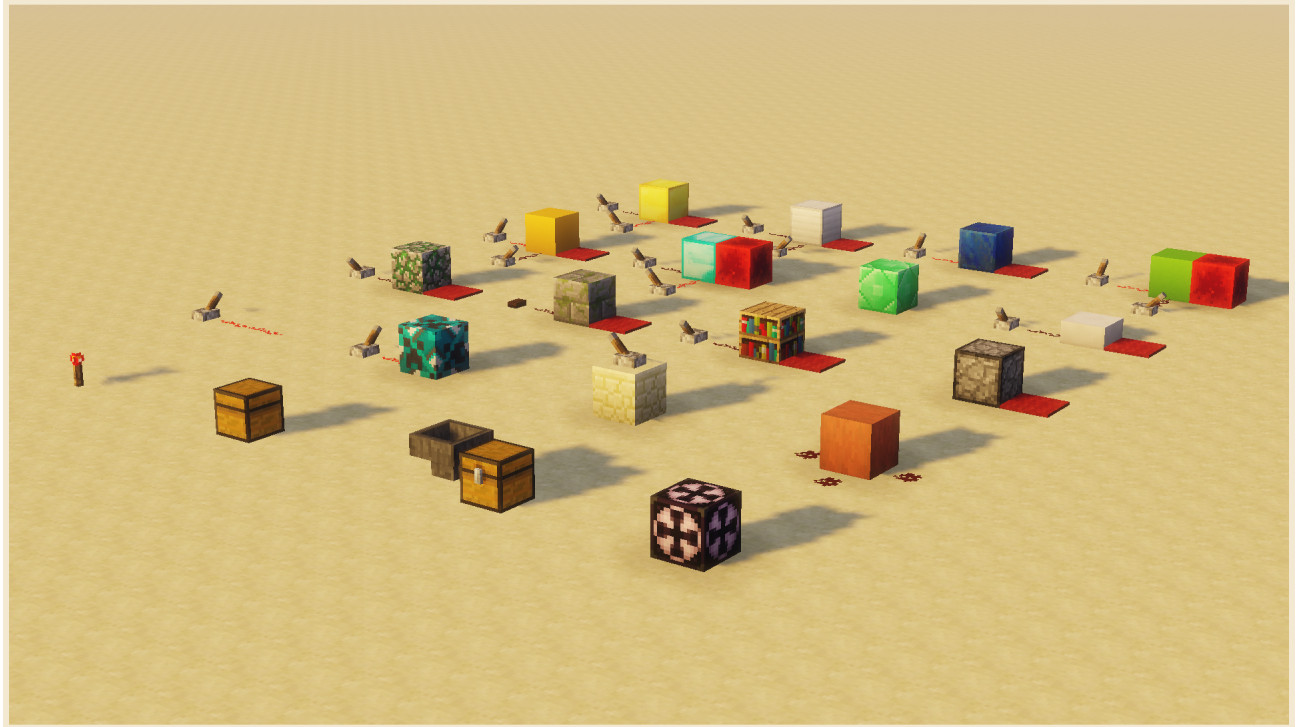


REDSTONE EXPANSION

Making redstone life easier



A CREATION BY SKYBALL

for vanilla minecraft 1.13

Introduction

This creation is a 1.13 datapack, which enables you to create more complex redstone mechanisms. In this, I will explain how to install and use it.

You can also watch this video: <https://www.youtube.com/watch?v=rvyGN2slF0>

How to install

Go to <https://www.planetminecraft.com/project/redexp2> and download the datapack.

Open the saves-folder. It is reachable by pressing , entering %appdata% and going to the folder .minecraft/saves.

Select and open your world-folder. Go to datapacks. Move the downloaded .zip-file there.

That's it! Now you only have to open the world, you have put the datapack in.

Get started

Enter /function r:give to get access to all of the new items. You will get a carrot on a stick, a carpet and a whole bunch of armor stands.

- carrot on a stick (Item configurator): When you right-click this item while standing next to a configurable block, you will be able to access the settings for this element.
- carpet (Output): As the name implies, this item is the output for the new blocks. Place it next to a new element, if the output of this block is 1 (on), then the carpet transforms into a redstone block.
- armor stands: I will explain these in the next section in detail, but each one is a placeable block that has a function. Read the name of the item and the description to get an idea on how to use it.

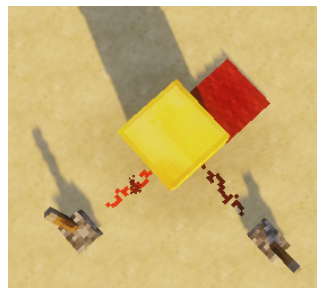
All of the new elements

As I already mentioned, the armor stands you got are the new items. I will explain all of them in this table. Also, I will assume, that you have placed the block.

In general: the sides of the new blocks are the inputs for the element you are using. A signal is a redstone wire, a lever or a redstone torch. You can't use buttons or redstone blocks as input on them.



AND that is on



AND that is off

Item name	How to use <i>(on=1, off=0)</i>
Gates	This item combines all gates, that I have added. Use the block configurator on it to specify the gate you want to use.
AND	The output-carpet is 1 if all input signals are 1
OR	The output is , if there is at least one input that is 1
NOT	The output is the inverted input signal
NAND	The output is 1 if at least one input 0

NOR	The output is 1 if all inputs are 0
XOR	Needs exactly 2 inputs. Output is 1 if one input is 1 and one 0
XNOR	Output is 1 if all inputs are 1 or if all inputs are 0
Signal manipulators	This item combines three signal manipulators. Use the block configurator on it to specify the element you want to use. 
Signal delayer	This item works just like a repeater. It waits a bit until the signal passes. Use the configurator to set the delay in ticks.
Signal shortener	If it gets an input signal, it turns on for a short amount of ticks, then turns off again. Use the configurator to set the time in ticks.
Signal extender	If it gets an input signal, it turns on and stays on for an amount of ticks if the input turns off. Use the configurator to set the time in ticks.
Impulse generator	This block turns into a redstone block, then into an emerald block and again in to a red. block. You can set the delay between the phases with the configurator.
Flip flop	If the output is 0 and it receives a signal, it sets the output to 1. If it then gets a signal, the output turns 1. Use the configurator to set the amount of signals required to toggle the output.
Randomizer	If it gets a signal, it turns either on or off.
Entity detector	Detects, whether there is a player or an entity in a certain radius. Use the configurator to set the type of entity and the radius.

Redstone sender	Sends the signal a certain amount of blocks (set with configurator) in the direction you were looking when placing. Or you can define a goal coordinate, on which a redstone block will be placed. To do that, use the configurator and click on [set] in the lower line in the chat. Go to where the block will be placed and use the second carrot on a stick you got by clicking on [set]
Block beamer	A video says more than 1000 words: https://streamable.com/tko2a Basically, it's an improved piston and can move blocks.
Wireless lever [sender]	This block is a lever, that turns the closest receiver into a redstone block.
Wireless lever [receiver]	This block turns into a redstone block, if it is the closest receiver to a sener that is on.
Vacuum hopper	This block automatically collects items that are in a certain radius. Use the configurator to set the radius.
Message sender	Step close to it to set the message it will tell in the chat by renaming the cow popping up with a name tag. Use the configurator to specify the players that will see the message.
Settings	There can only be one setting-block in the world. You should place it in the spawn chunks, as it has to be always loaded. Use the configurator to access the settings.

Survival-Version (V2.1+ only)

To craft the REDEXP-CRAFTER, you have to drop one redstone block and a dispenser on the floor. Here's what you can craft with it.

(to download the image, click [here](#))



That's it!

If you have got any questions, write a message to me:

<https://www.planetminecraft.com/member/skyball/>

Thanks for using it!