

Welded Storage Rack



by Mr Philip Becker



Preliminary Information

This instruction goes best with the additional video and blog article:

- YouTube: <https://youtu.be/wTaYrKZ-viM>
- Blog: <https://philip-becker.de/2023/01/15/welded-storage-rack-for-hardware-store-boxes/>

Tools needed:

- Welder (the type is not important, as long as you can weld steel with it)
- Angle Grinder
- Optional: Stationary saw to cut the profiles to length (absolutely not necessary, but it speeds things up)

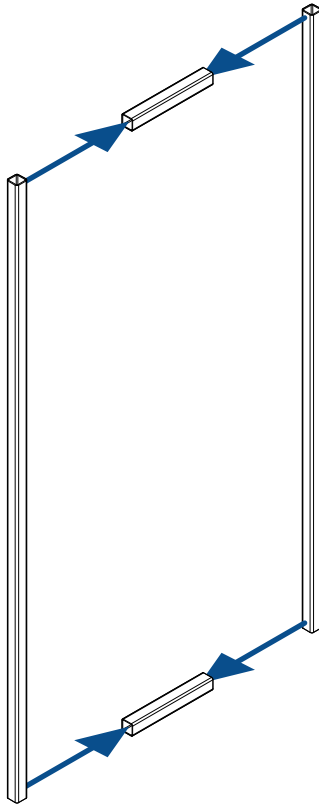
Additional needed Hardware (used for leveling the rack):

- 6x M6 or M8 (Lock) Nuts
- 6x M6 or M8 Hex Head Screws

You can find the dimensions of the hardware store boxes I used on page 9.
Adjust the dimensions of the rack according to the boxes you are using.
I marked the important ones in the drawing on page 8.

1

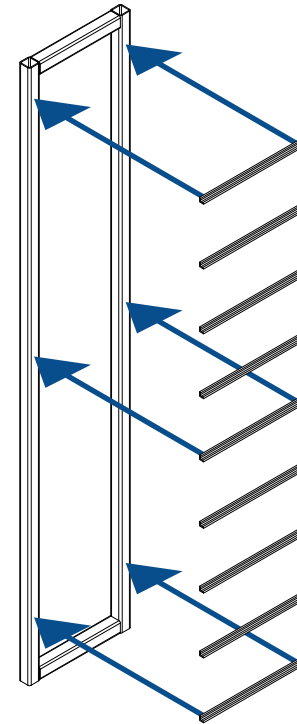
Side Frames (4x)



2

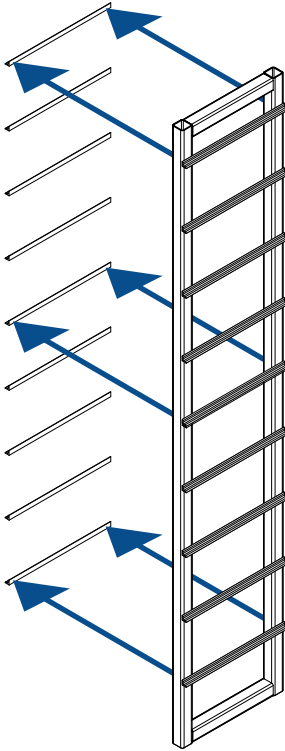
Rails to the Side Frames (4x)

Make yourself a welding jig, the dimensions are on page 10.



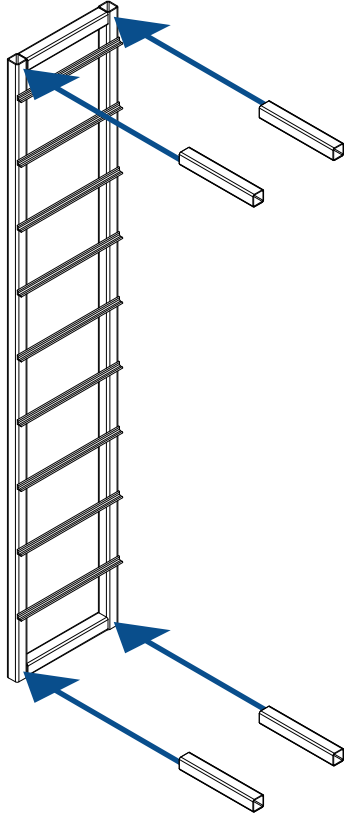
3

Rails to the inner Side Frames (2x)



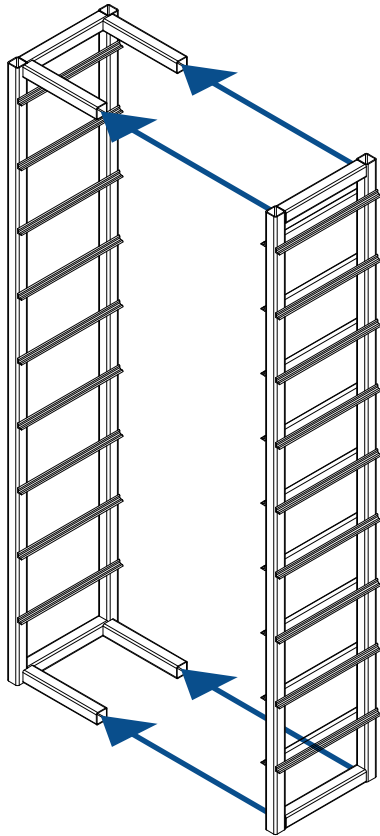
4

Connection pieces



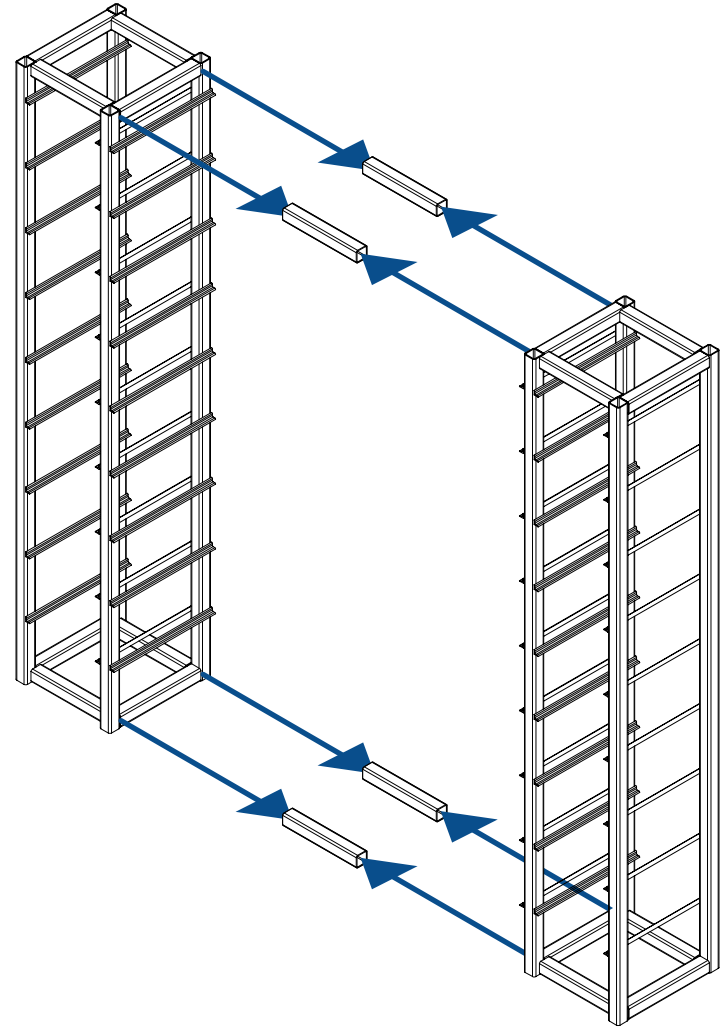
5

Connecting 2 Side Frames together



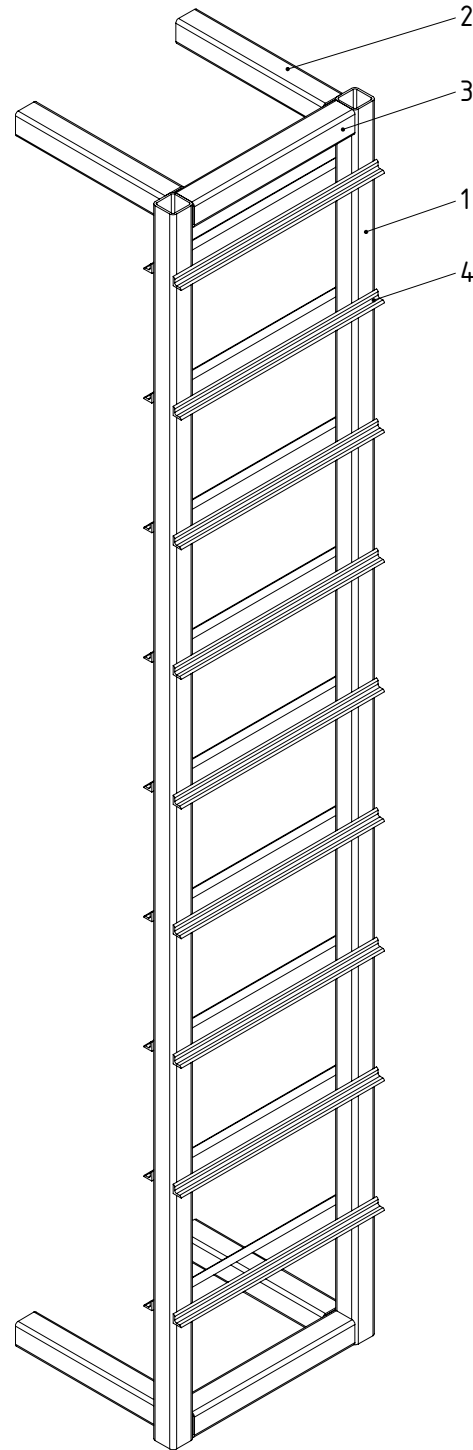
6

Final Assembly

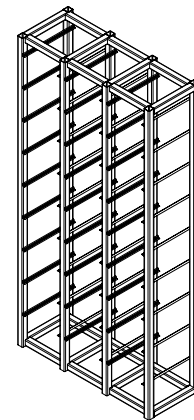
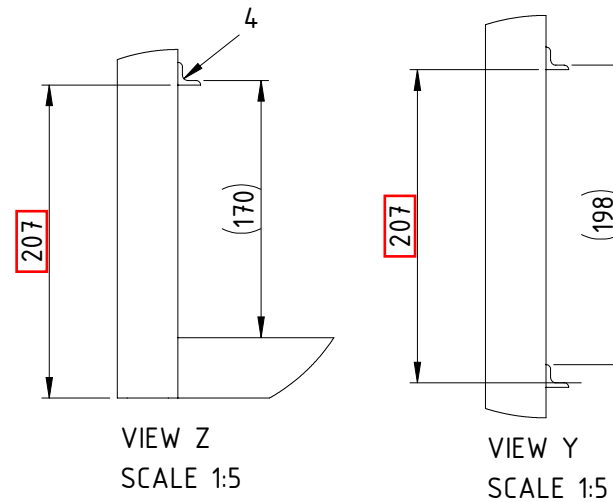
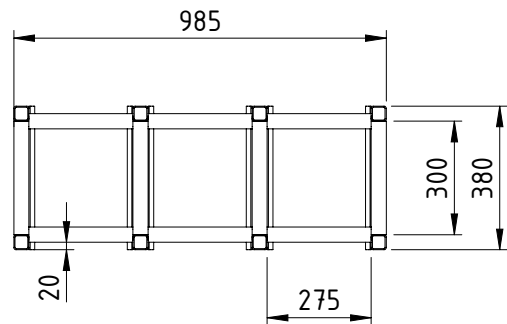
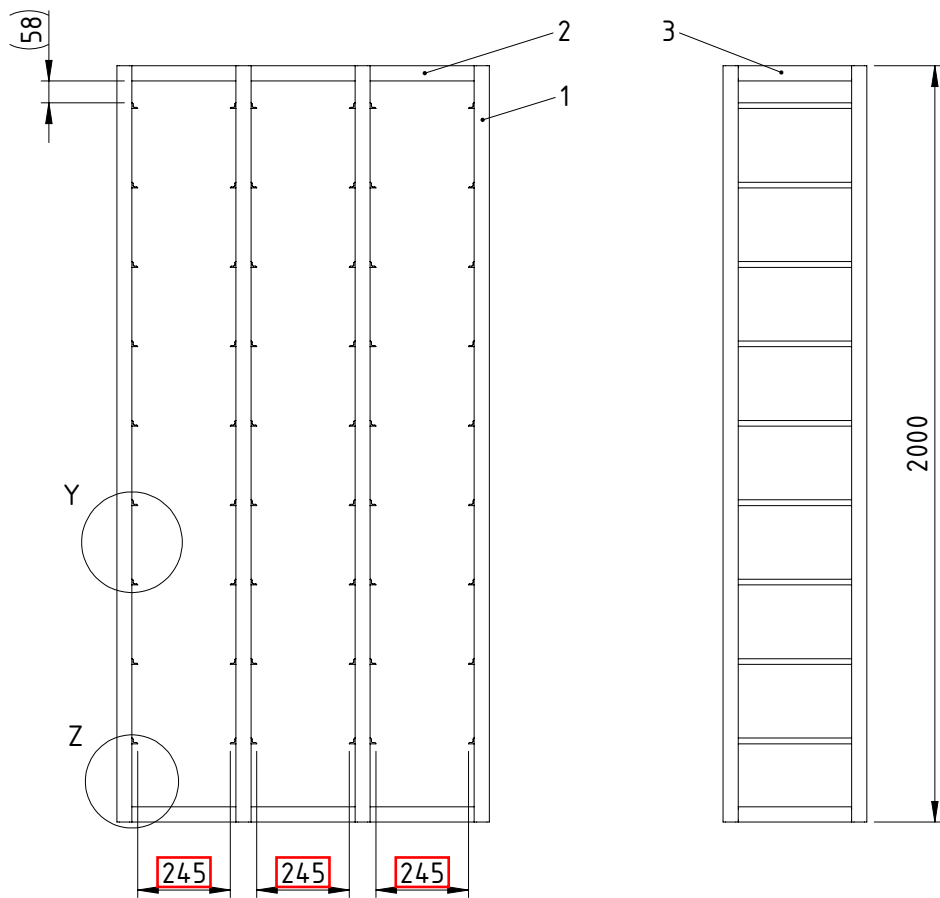


7

Additional Section (for 9 more boxes)



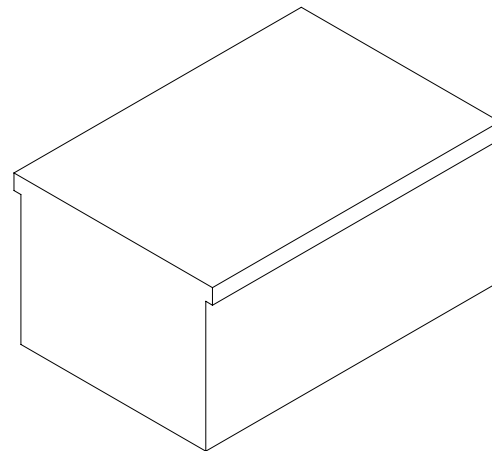
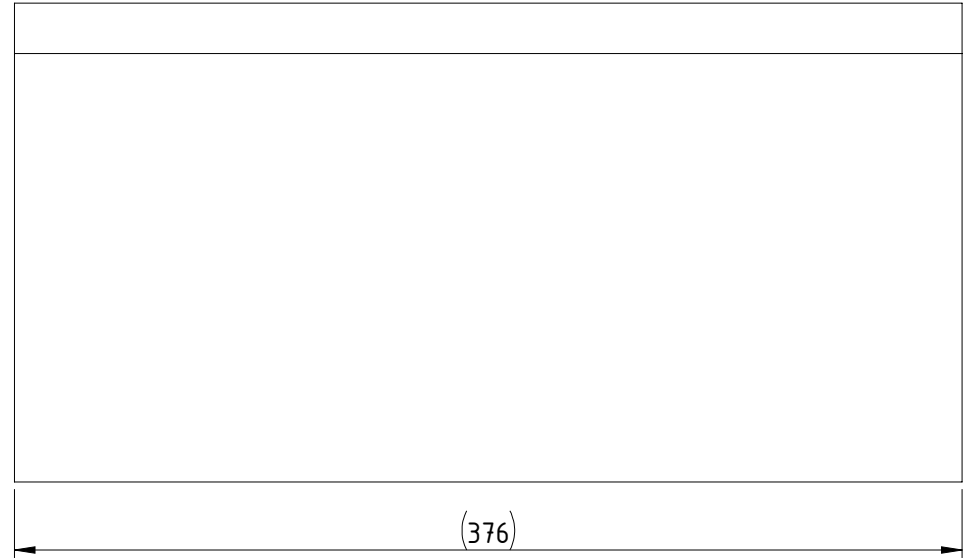
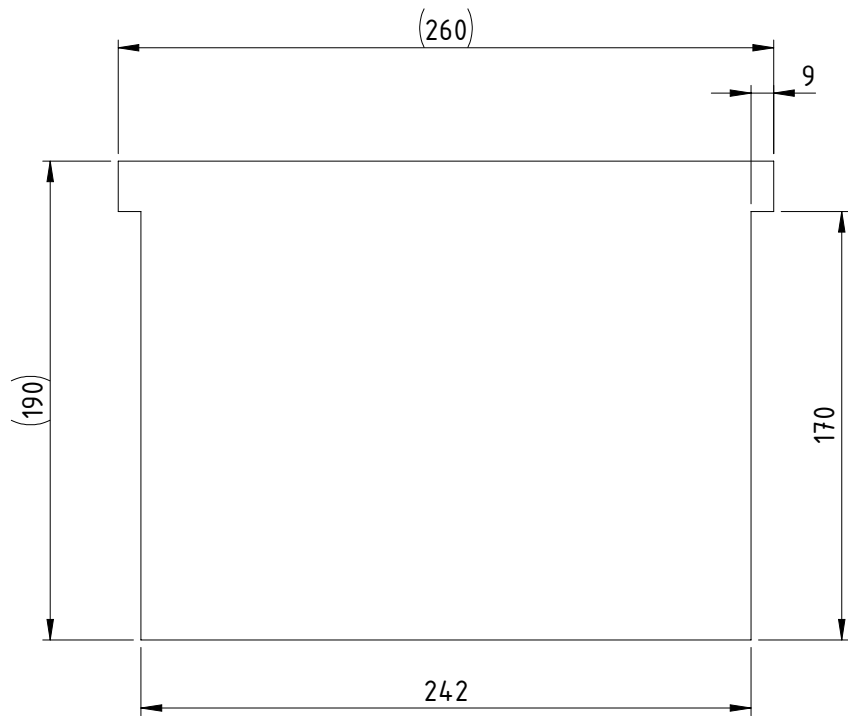
Nr	Stk	Part	Length	
1	2	40 x 40 x 3.2	2000	
2	4	40 x 40 x 2.6	275	
3	2	40 x 40 x 2.6	300	
4	18	15x15x3	380	
Project		Material		
Storage Rack		S235JR (1.0037)		
Part		Designer		
Additional Section		Becker		
Drawing		General Tolerance	Units	Size
pbe027_reg_kis_weld_add		ISO 2768 m-K	mm	A4
philip-becker.de		Version / Date	Scale	Page
		01 / 15.01.2023	1:10	7



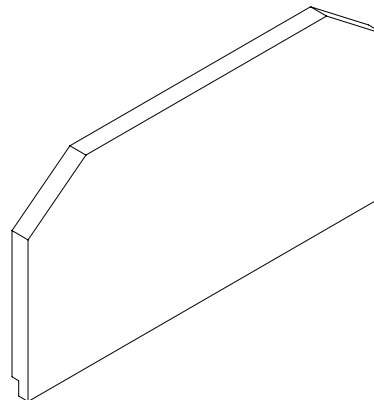
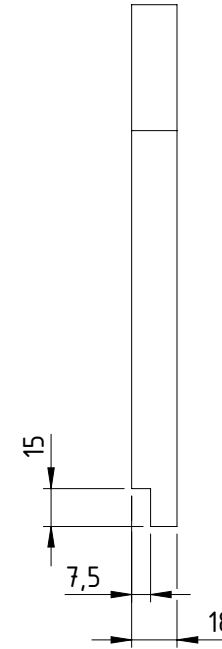
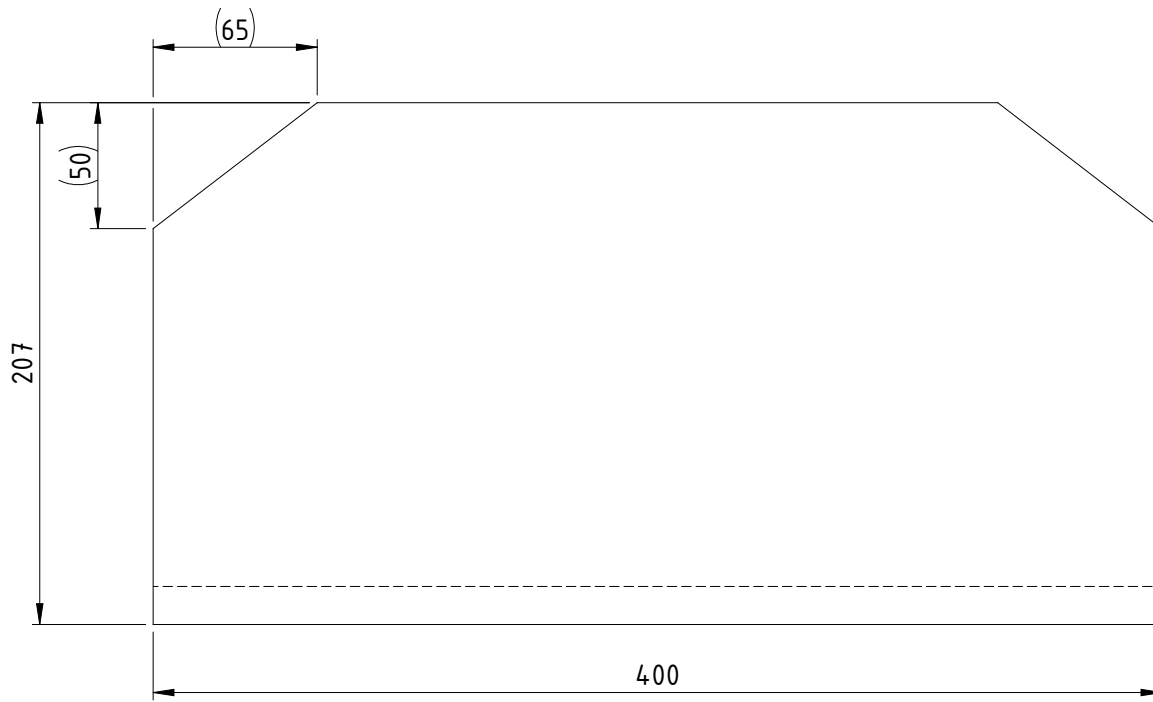
 Adjust these dimensions according to the boxes you are using

No	Qty	Part	Length
1	8	40 x 40 x 3.2	2000
2	12	40 x 40 x 2.6	275
3	8	40 x 40 x 2.6	300
4	54	15x15x3	380

Project Storage Rack		Material S235JR (1.0037)	
Part Rack		Designer Becker	
Drawing pbe027_reg_kis_weld	General Tolerance ISO 2768 m-K	Units mm	Size A4
philip-becker.de	Version / Date 02 / 03.01.2023	Scale 1:20	Page 8



Project Storage Rack	Material		
Part Hardware Store Bin	Designer Becker		
Drawing pbe000_kiste_xs	General Tolerance ISO 2768 m-K	Units mm	Size A4
philip-becker.de	Version / Date 01 / 15.01.2023	Scale 1:3	Page 9



Project	Storage Rack	Material	Plywood	
Part	Rail Welding Jig	Designer	Becker	
Drawing	pbe027_reg_kis_vor	General Tolerance	ISO 2768 m-K	Units mm
	philip-becker.de	Version / Date	01 / 15.01.2023	Size A4
			Scale 1:3	Page 10