

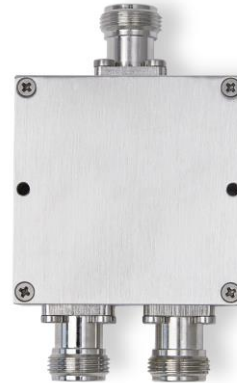
RF HOUSINGS

The TBRFH3 series of RF housings are ideal for prototyping RF building blocks such as power splitters, directional couplers, mixers, etc. The housings are milled from aluminium and equipped with N-female connectors.

The TBRFH4 housing is ideal for RF building blocks such as amplifiers or similar. The housing is milled from aluminium and equipped with SMA-female connectors and a feed through capacitor for the power supply line.



TBRFH3 - 5527



TBRFH3 - 5555



TBRFH4



TBRFH4, interior

1 Technical data

Part #	Outer dimensions [mm]	inner dimensions [mm]	Material	Surface finishing	RF connectors	detail	Weight [g]
TBRFH3-5527	55 x 27,5 x 21,5	45 x 14,5 x 11,5	Alu A6061	brushed, linear	N-Female	-	130
TBRFH3-5555	55 x 55 x 21,5	45 x 45 x 11,5	Alu A6061	brushed, linear	N-Female	-	185
TBRFH4	48 x 76 x 12	40,2 x 67,7 x 6,5	Alu A6061	sandblasted	SMA-Female	Feed through capacitor, 10nF, 50V	

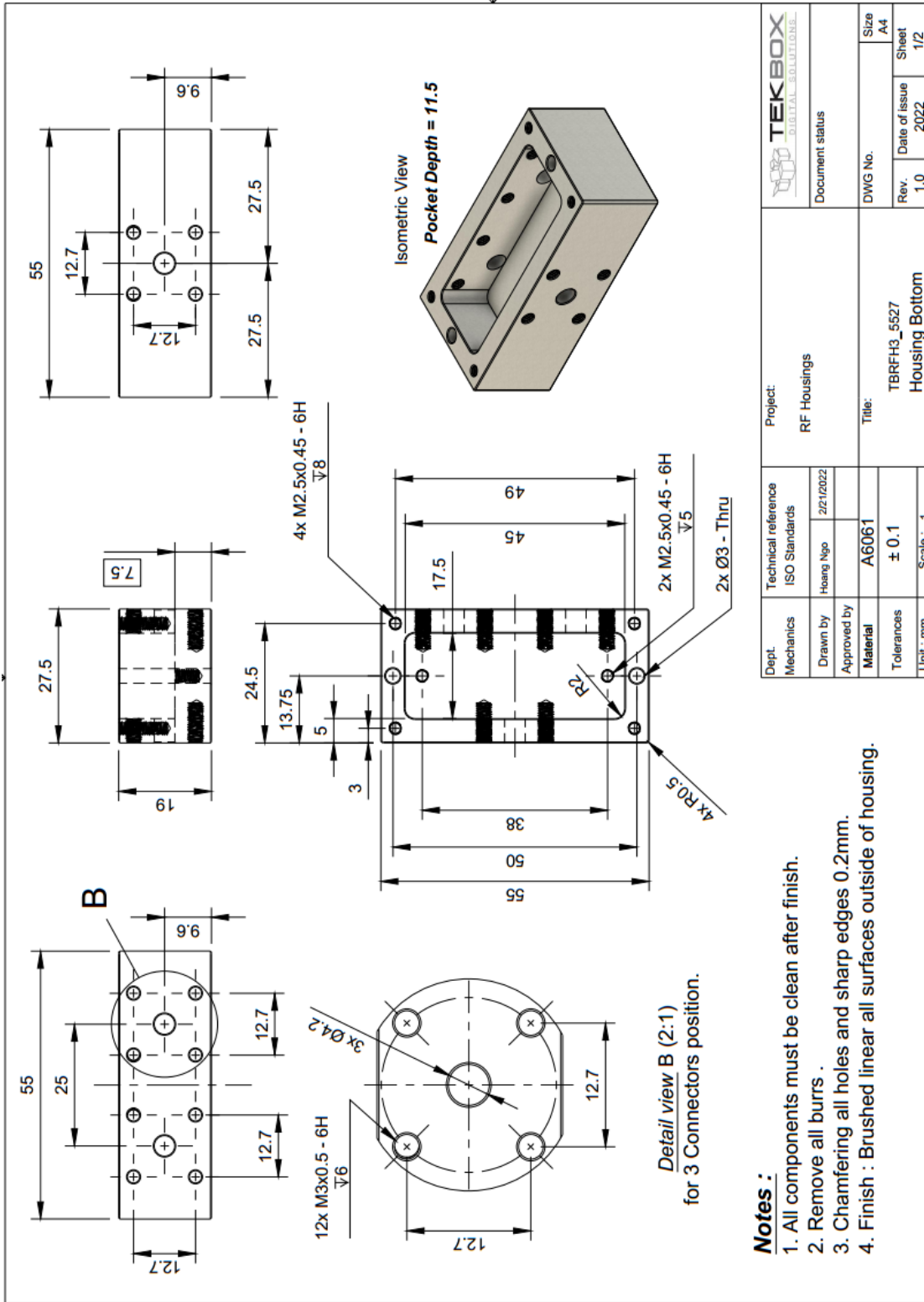
2 Customization

Contact us, if you need customized housings. Following details can be customized, depending on ordering volume:

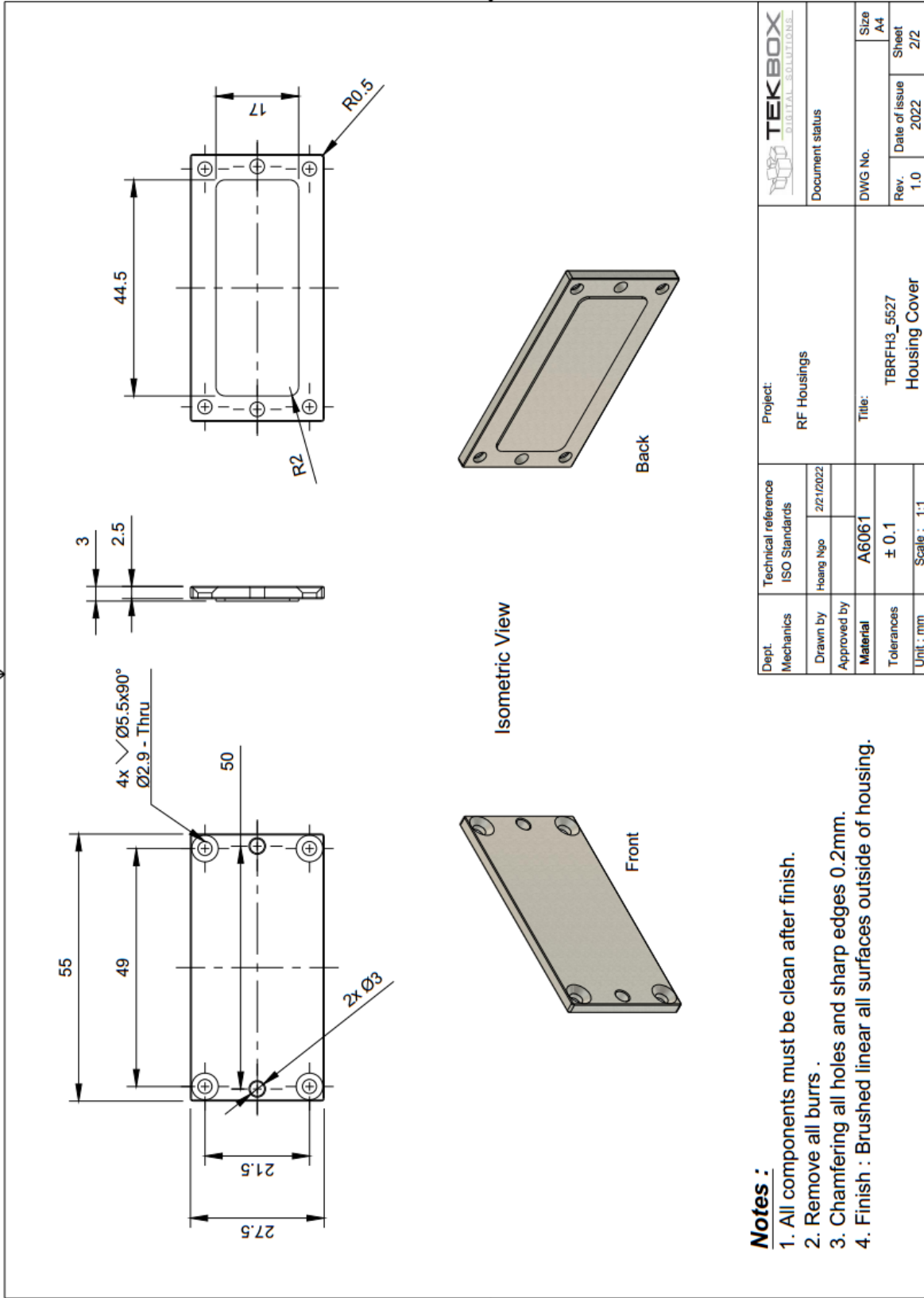
- RF connectors
- Absorbing foam
- Position and number of feed-through capacitors
- Laser engraving
- Surface finishing

RF HOUSINGS

3 Mechanical drawings

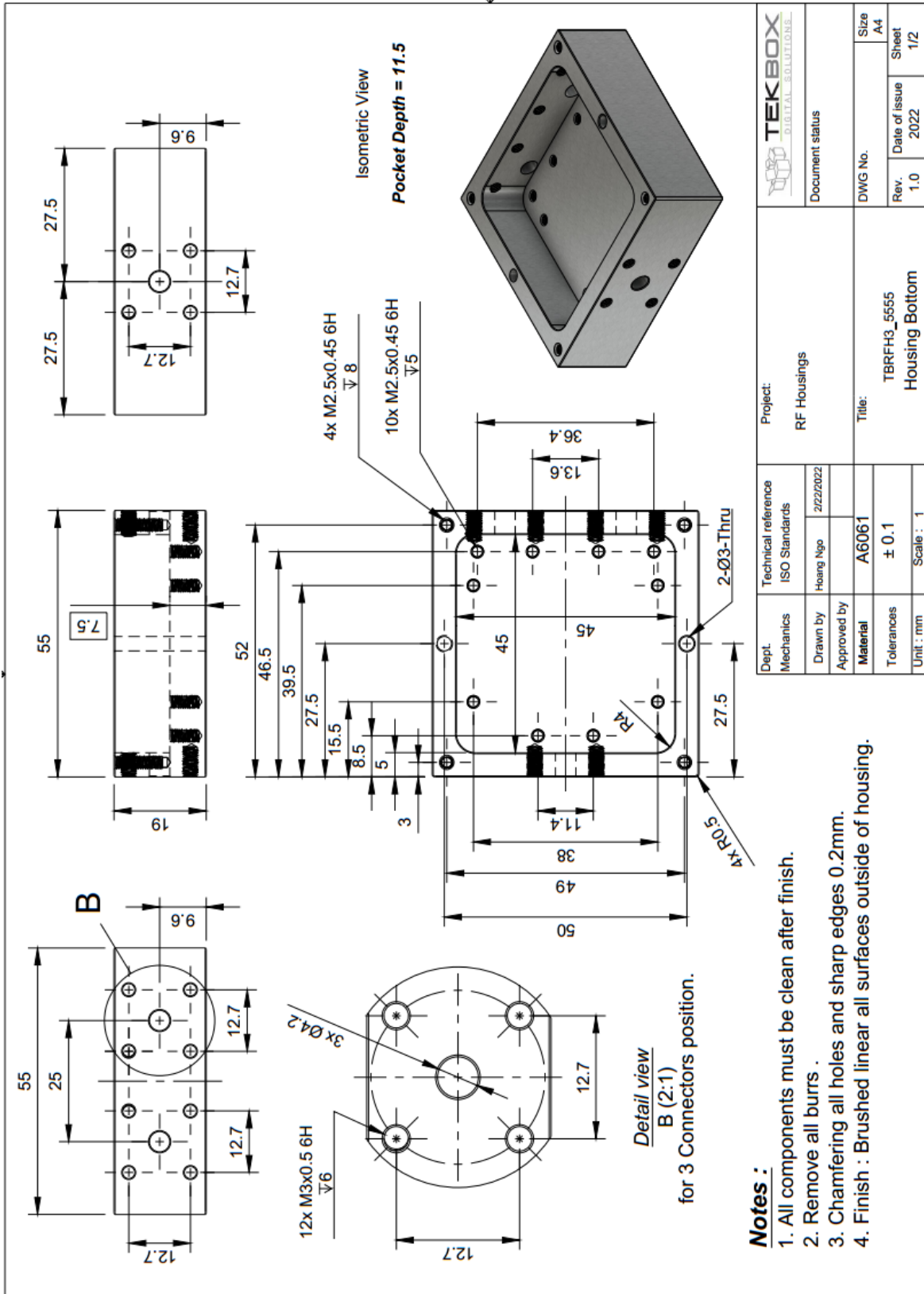


RF HOUSINGS



Dept. Mechanics	Technical reference	Project: RF Housings	TEKBOX DIGITAL SOLUTIONS
	ISO Standards		
Drawn by	Hoang Ngo	DWG No.	Size A4
Approved by	2/2-1/2022	Rev.	Date of issue 2022
Material	A6061	Title: TBRFH3_5527 Housing Cover	
Tolerances	± 0.1	Sheet	2/2
Unit : mm	Scale : 1:1		

RF HOUSINGS

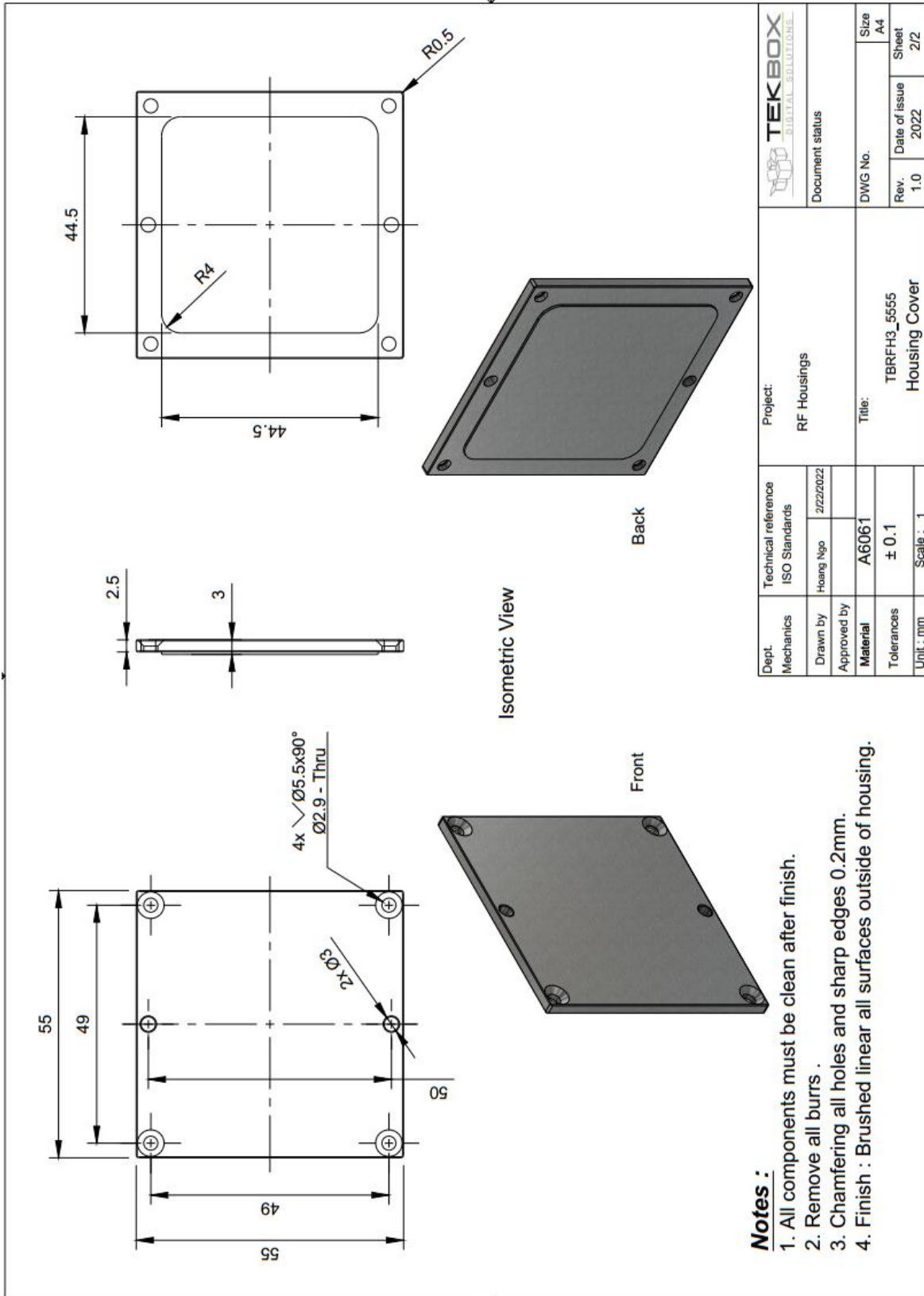


Notes :

1. All components must be clean after finish.
2. Remove all burrs .
3. Chamfering all holes and sharp edges 0.2mm.
4. Finish : Brushed linear all surfaces outside of housing.

Dept. Mechanics	Technical reference ISO Standards	Project: RF Housings	TEKBOX DIGITAL SOLUTIONS
Drawn by Hoang Ngo	2/22/2022	Document status	
Approved by		DWG No.	Size A4
Material A6061		Rev. 1.0	Sheet 1/2
Tolerances ± 0.1		Date of issue 2022	
Unit : mm	Scale : 1	Title: TBRFH3_5555 Housing Bottom	

RF HOUSINGS



Dept. Mechanics	Technical reference	Project:		DWG No.	Size A4
	ISO Standards	RF Housings			
Drawn by	Hoang Ngo	2/22/2022		Rev.	2/2
Approved by				1.0	2022
Material	A6061	Title:		TBRFH3_5555 Housing Cover	
Tolerances	± 0.1	Unit : mm		Scale : 1	

RF HOUSINGS

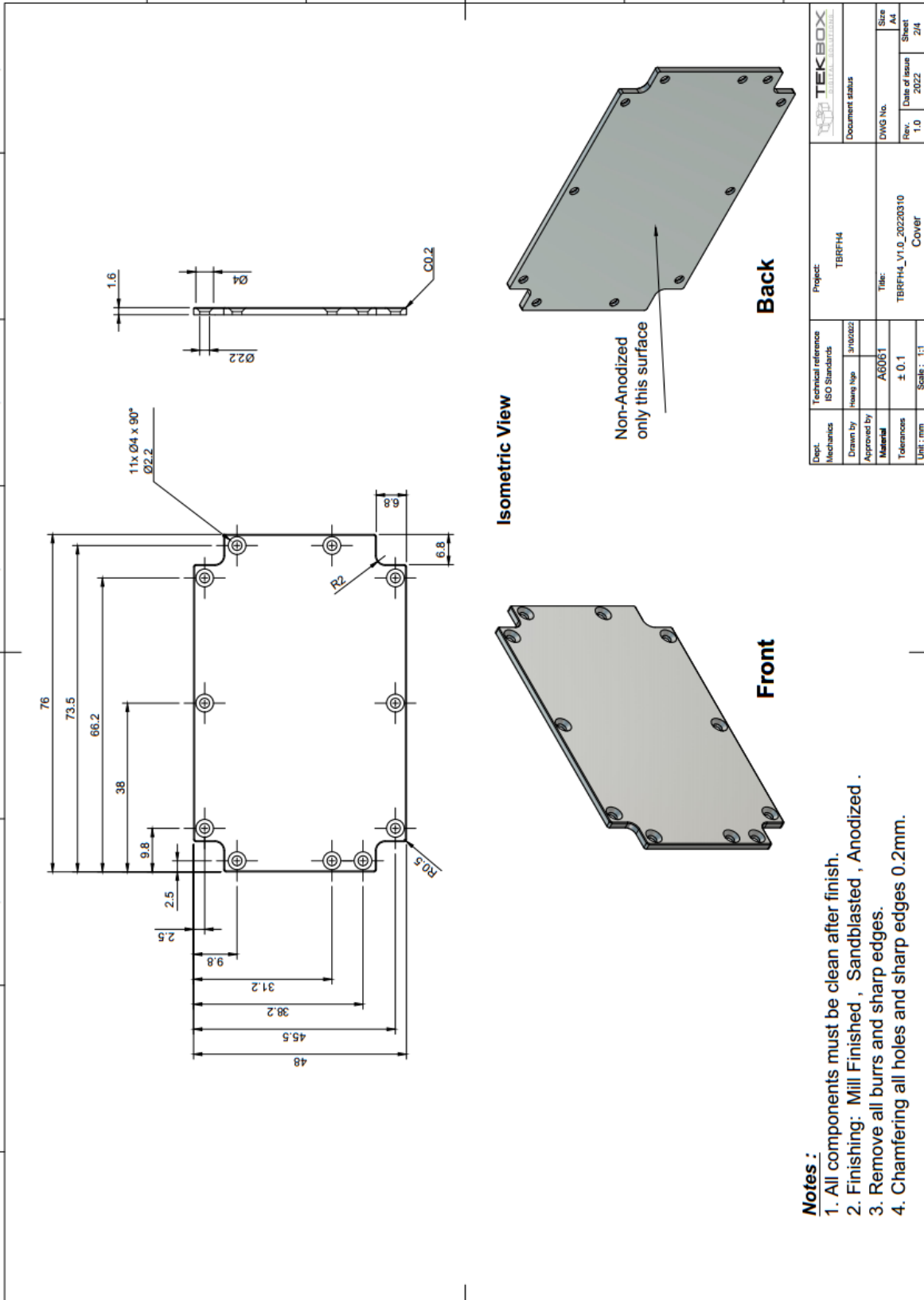
Parts List				
Item	Qty	Part Number	Material	
1	1	Cover	Aluminum 6061	
2	1	Bottom	Aluminum 6061	
3	2	SMA_connector	Default	
4	11	M2x5_ Phillips Flat Head Screw	Stainless Steel	
5	4	M2x5_ Pan Head Phillips Screws with captive washer	Stainless Steel	

Dept. Mechanics	Technical reference	Project: TBRFH4	TEKBOX DIGITAL SOLUTIONS	Document status	DWG No.	Size A4
	ISO Standards					
Drawn by Hoang Ngo	3/10/2022	Title: TBRFH4_V1.0_20220310	Rev. 1.0	Date of issue 2022	Sheet 1/4	
Approved by Minh Nguyen						
Material						
Tolerances						
Unit : mm	Scale : 1:1					

Technical Requirements :

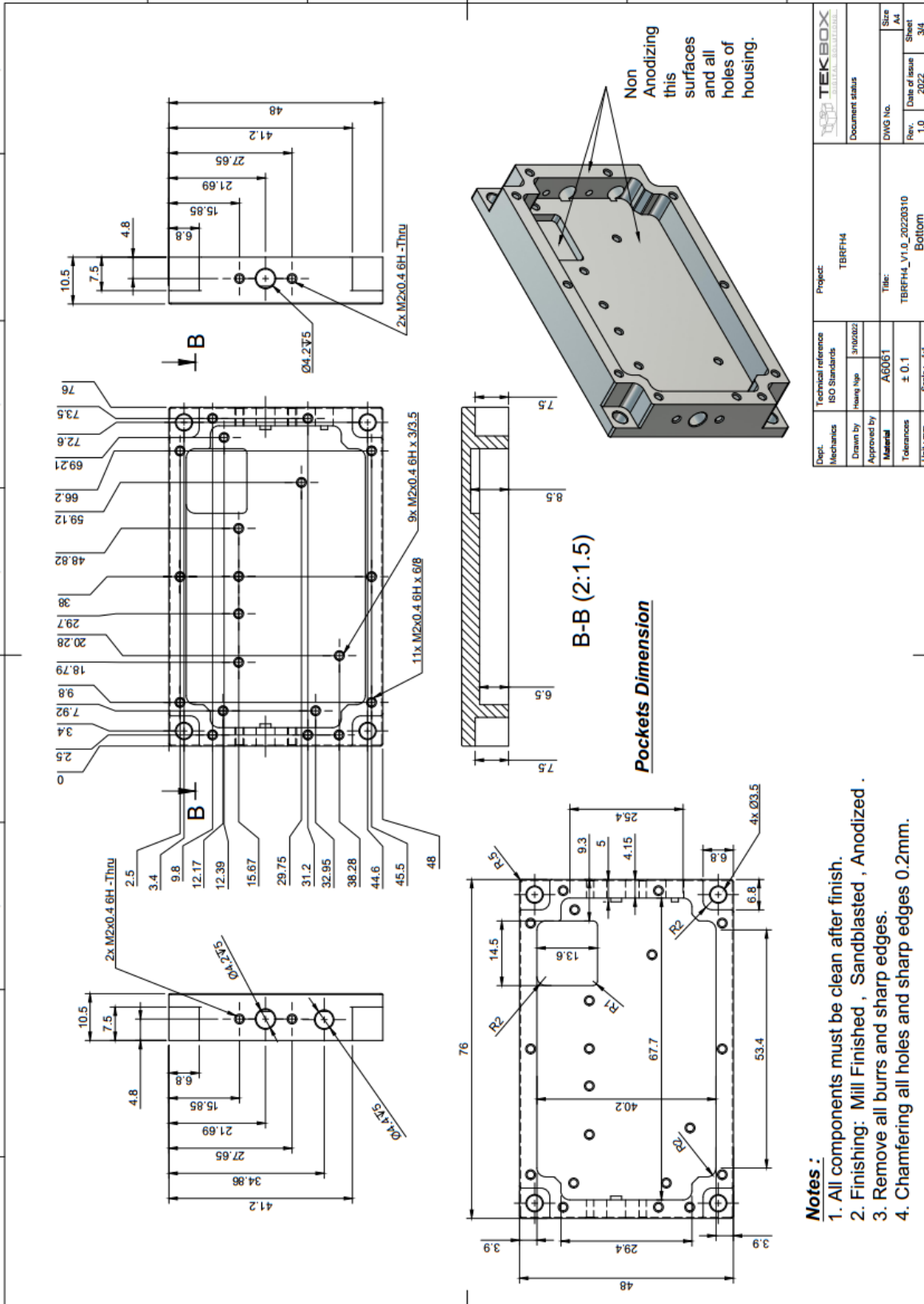
- All components must be clean after finish.
- Finishing : Anodized (Silver Anodized).

RF HOUSINGS





RF HOUSINGS

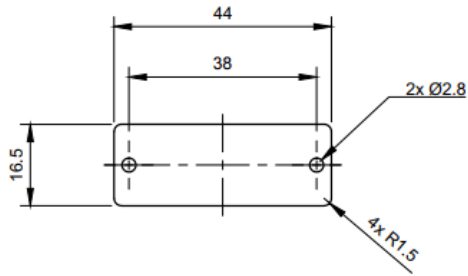


Dept. Mechanics	Technical reference ISO Standards	Project: TBRFH4	Document status
Drawn by jrut0202	Housing type jrut0202	DWG No.	Rev. 1.0
Approved by	Material A6061	Title: TBRFH4_V1.0_20220310	Date of issue 2022
Tolerances ± 0.1	Scale: 1:1	Size A4	Sheet 3/4
Unit: mm		Bottom	

- Notes:**
- All components must be clean after finish.
 - Finishing: Mill Finished, Sandblasted, Anodized.
 - Remove all burrs and sharp edges.
 - Chamfering all holes and sharp edges 0.2mm.

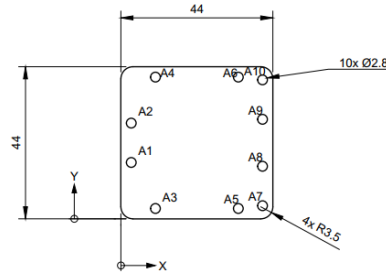
RF HOUSINGS

*Recommended PCB Dimension
PCB thickness : 1.2mm



TBRFH3_552

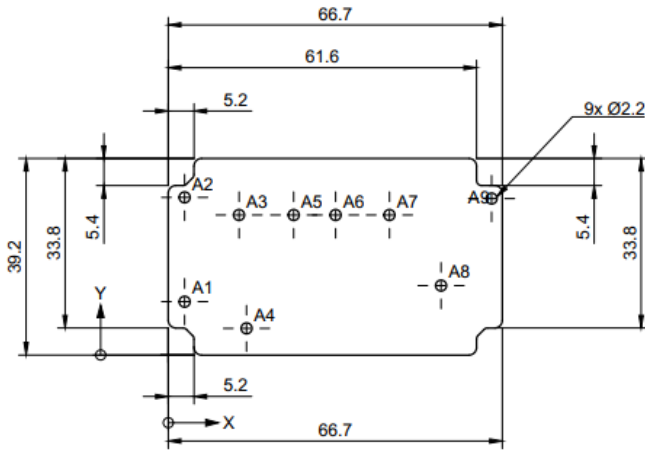
*Recommended PCB Dimension
PCB thickness : 1.2mm



TBRFH3_5555

A10	41	40.2
A9	41	28.8
A8	41	15.2
A7	41	3.8
A6	34	41
A5	34	3
A4	10	41
A3	10	3
A2	3	27.7
A1	3	16.3
Hole	X Dim	Y Dim
Hole Table		

*Recommended PCB Dimension
PCB thickness : 1mm



TBRFH4

A9	64.56	31.21
A8	54.47	13.85
A7	44.17	27.93
A6	33.42	27.93
A5	25.05	27.93
A4	15.63	5.32
A3	14.14	27.93
A2	3.27	31.43
A1	3.27	10.65
Hole	X Dim	Y Dim
Hole Table		

RF HOUSINGS

4 Ordering Information

Part Number	Description
TBRFH3-5527	55 x 27,5 x 21,5 mm RF housing, pre-assembled with N-female connectors
TBRFH3-5555	55 x 55 x 21,5 mm RF housing, pre-assembled with N-female connectors
TBRFH4	48 x 76 x 12 mm RF housing, pre-assembled with SMA-female connectors and feed through capacitor

5 History

Version	Date	Author	Changes
V 1.0	10.6.2022	Mayerhofer	Creation of the document
V 1.1	07.02.2023	Minh Nguyen	Update drawing (Add Recommended PCB dimension)