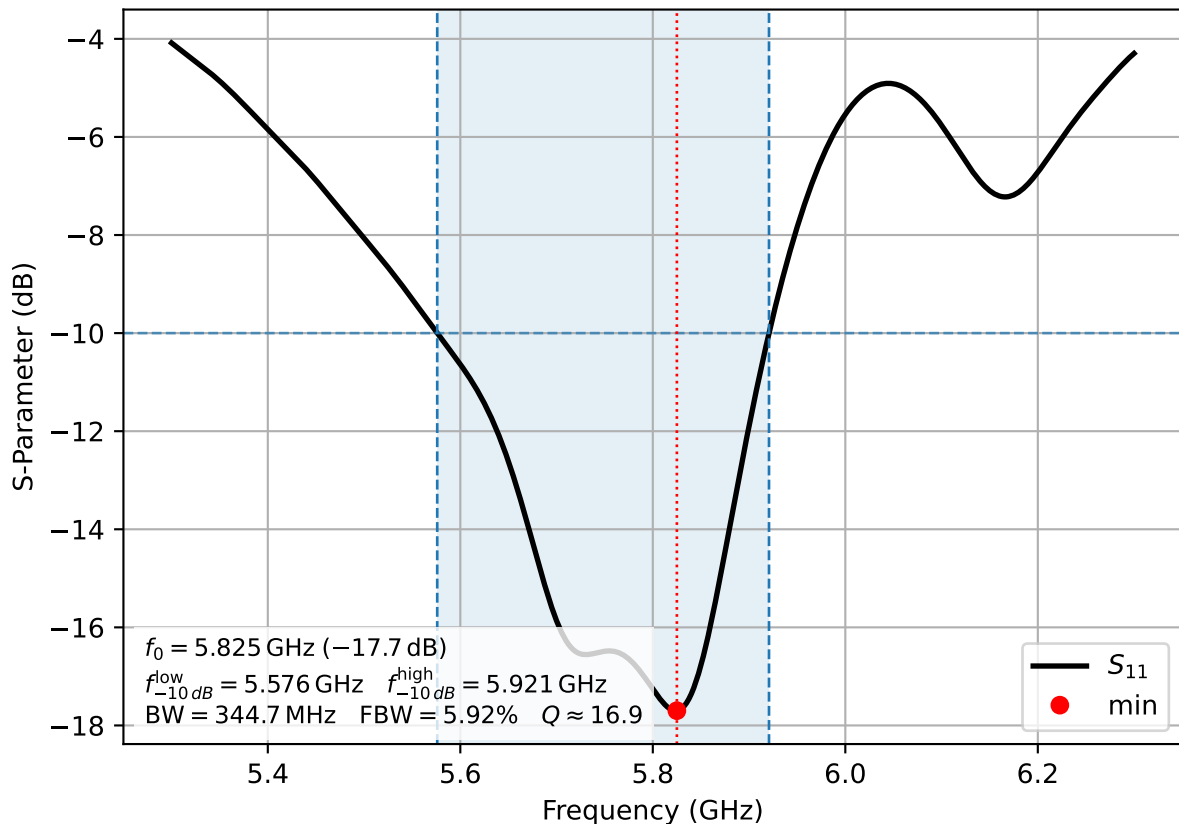


Reflection Coefficient S_{11}

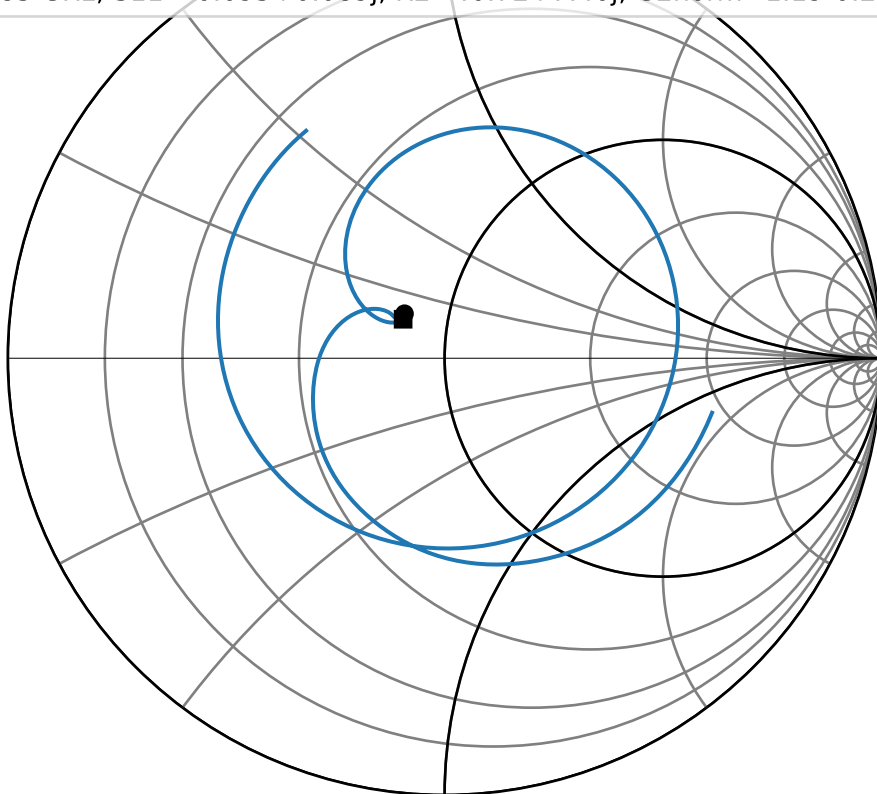


Smith Chart

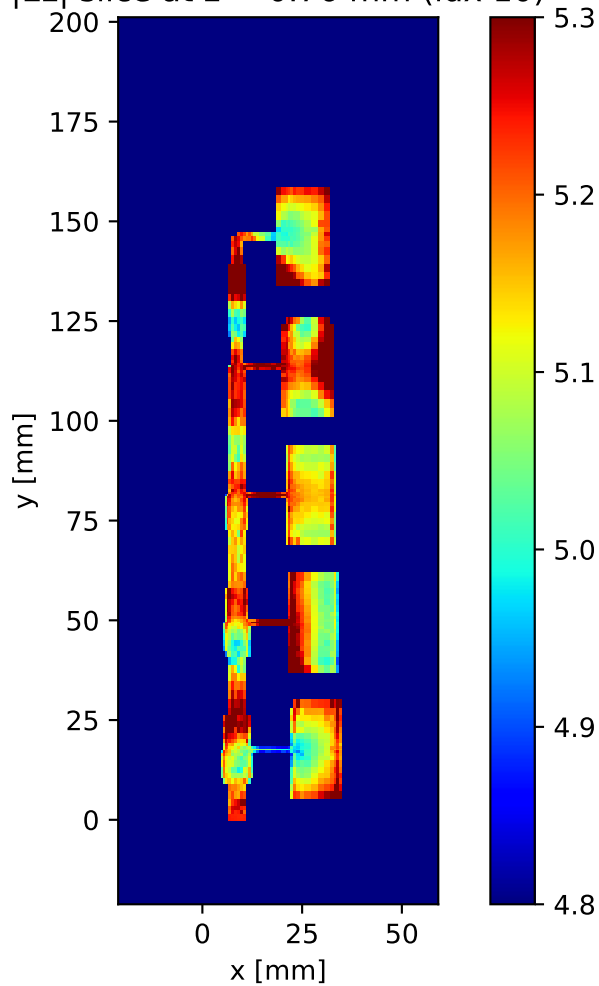
— S11 (Patch W=20.10 mm, L=10.70 mm)

● 5.80 GHz, $S_{11} = -0.092 + 0.102j$, $R = 40.80 + 8.47j$, $G_{\text{norm}} = 1.17 - 0.24j$

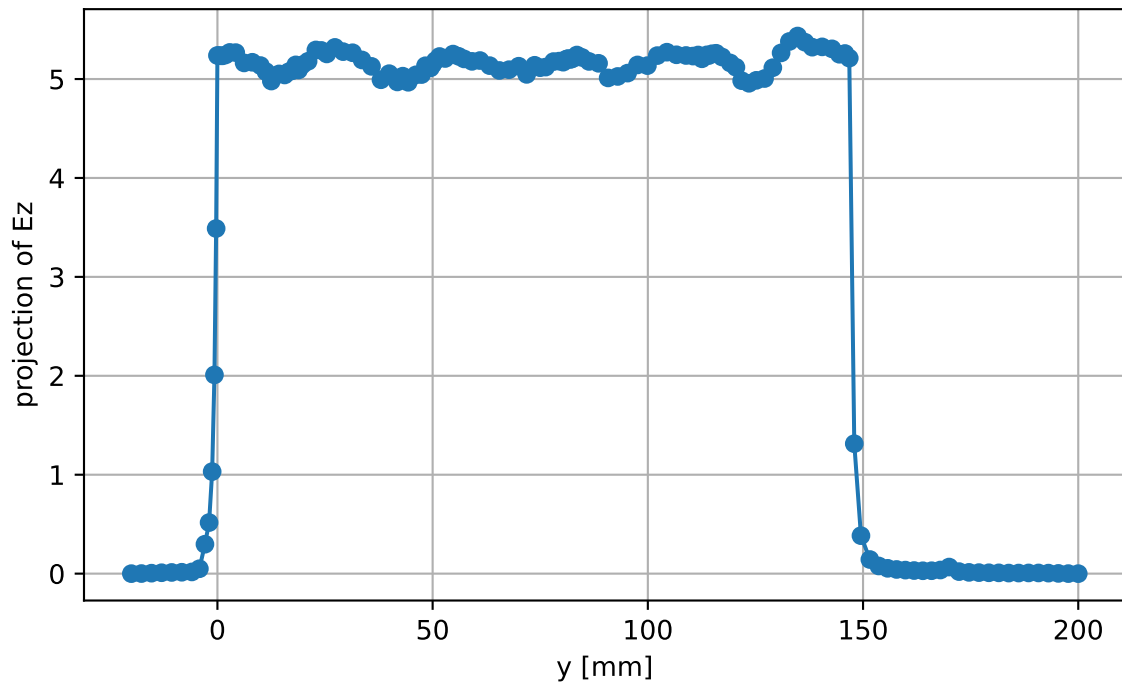
■ 5.83 GHz, $S_{11} = -0.095 + 0.089j$, $R_2 = 40.72 + 7.40j$, $G_{2\text{norm}} = 1.19 - 0.22j$



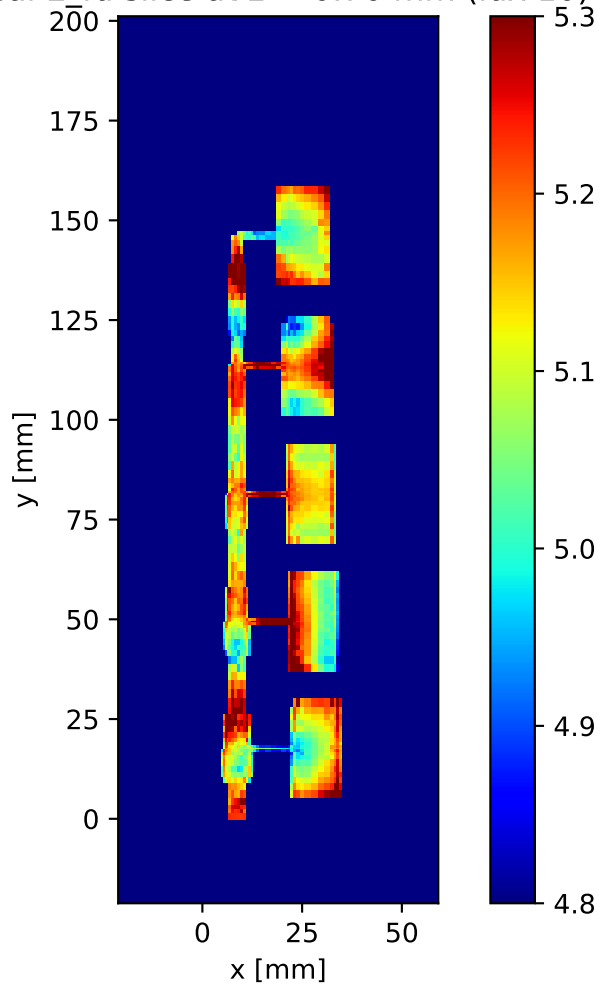
$|E_z|$ slice at $z = 0.76$ mm (idx 10)



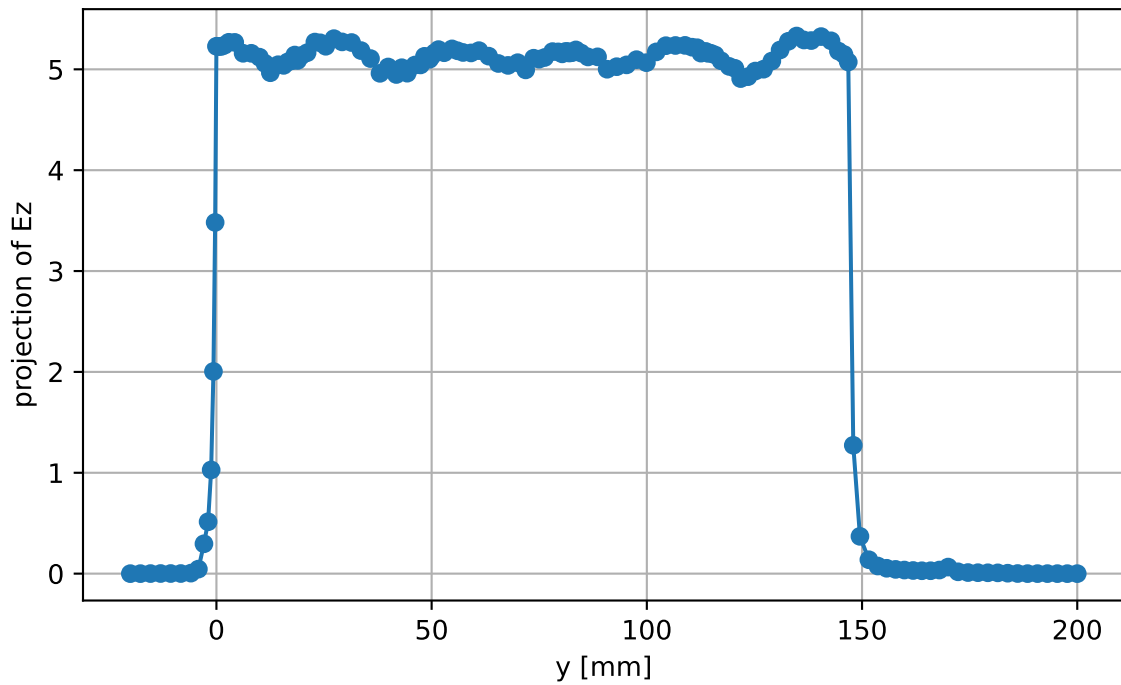
$|E_z|$ line cut along Y at $x=9.20$ mm, $z=0.76$ mm
(idx $x=20$, $z=10$)



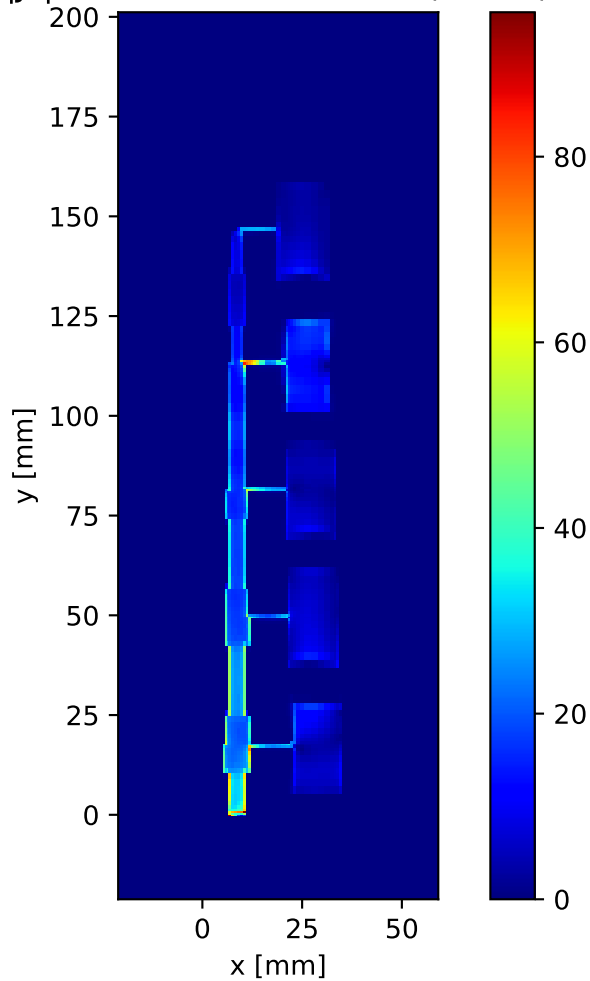
Real E_{fd} slice at z = 0.76 mm (idx 10)



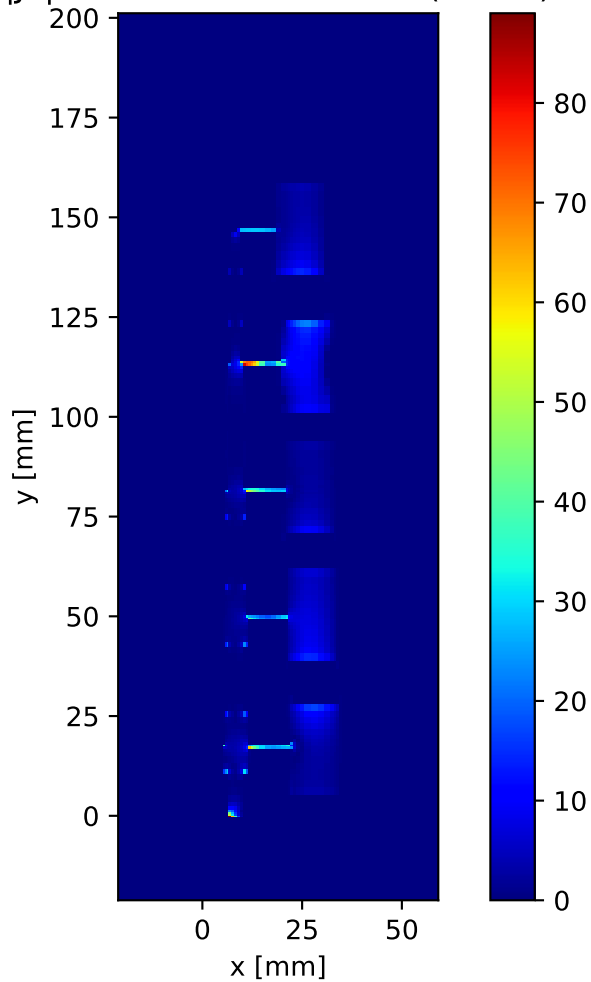
Real E_{fd} line cut along Y at x=9.20 mm, z=0.76 mm
(idx x=20, z=10)



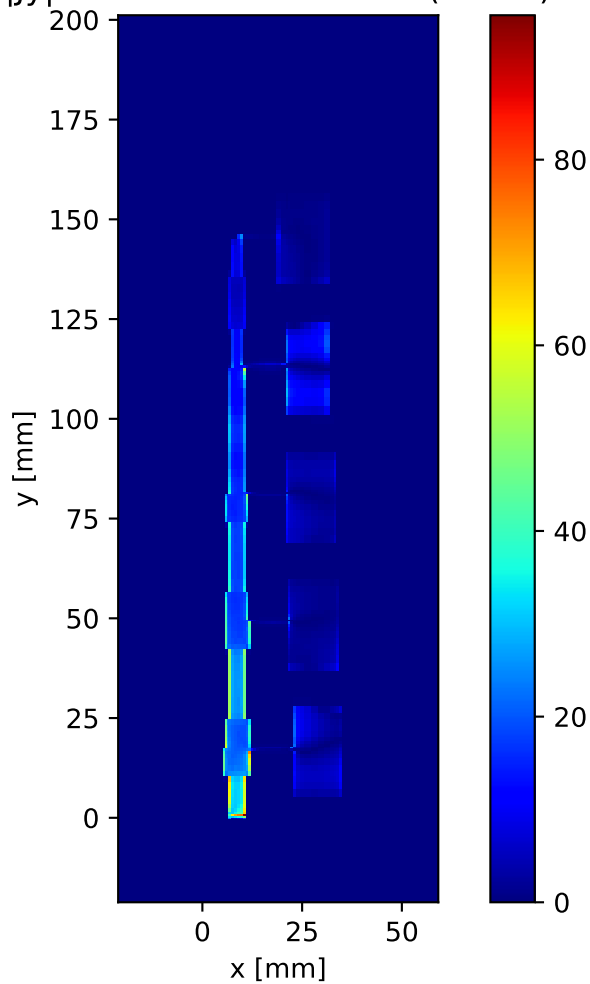
$|J_s|$ slice at $z = 1.525$ mm (idx 12)



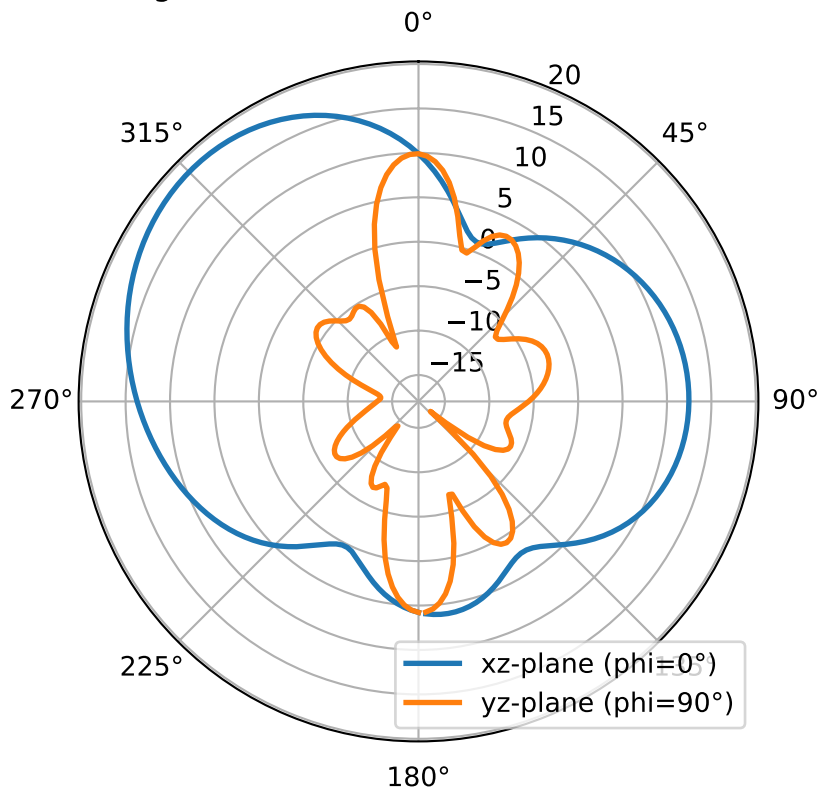
$|J_x|$ slice at $z = 1.525$ mm (idx 12)



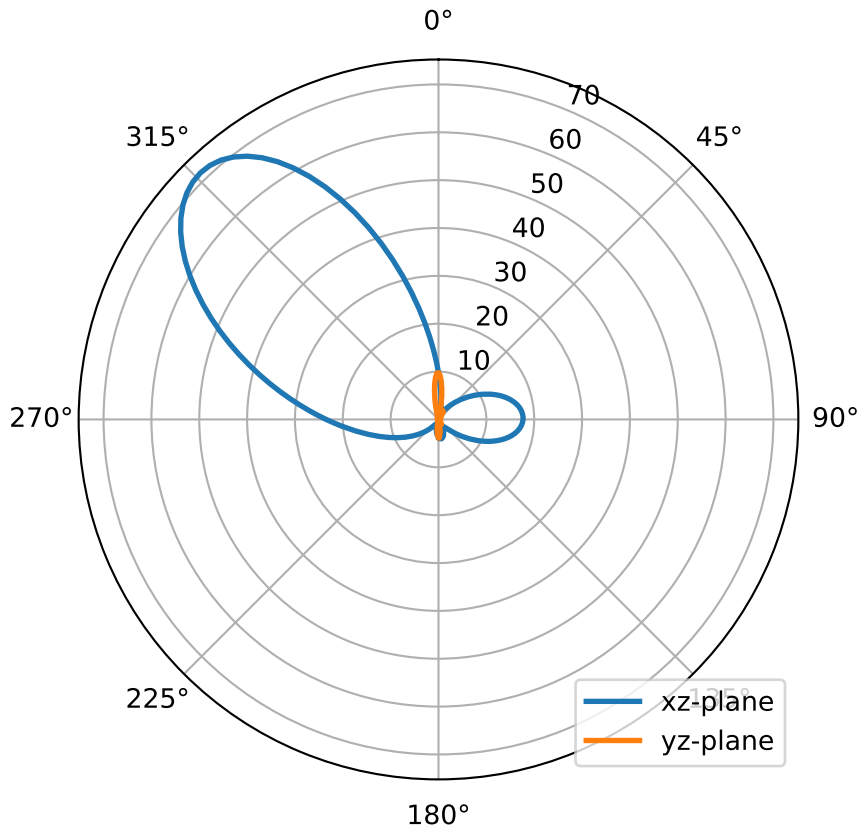
$|j_y|$ slice at $z = 1.525$ mm (idx 12)



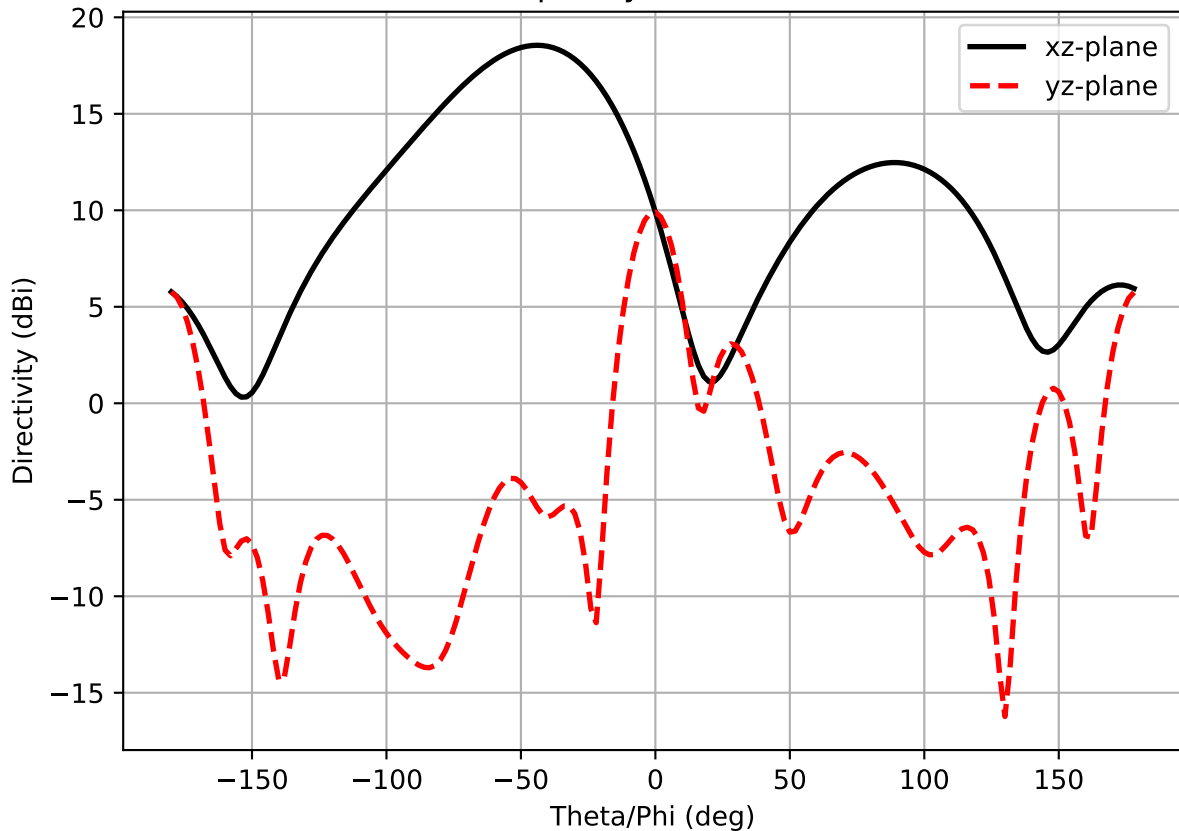
$f = 5.800 \text{ GHz}$ — Directivity (dB)
 $D_{\text{max}} (\text{integrated}) \approx 18.55 \text{ dB}$, $\text{nf2ff } D_{\text{max}} = 18.55 \text{ dB}$



Frequency: 5.800 GHz — Directivity (linear). Dmax: 71.631



Frequency: 5.800 GHz



3D Directivity Pattern
 $f = 5.800 \text{ GHz}$, $D_{\text{max}} = 18.55 \text{ dBi}$

