



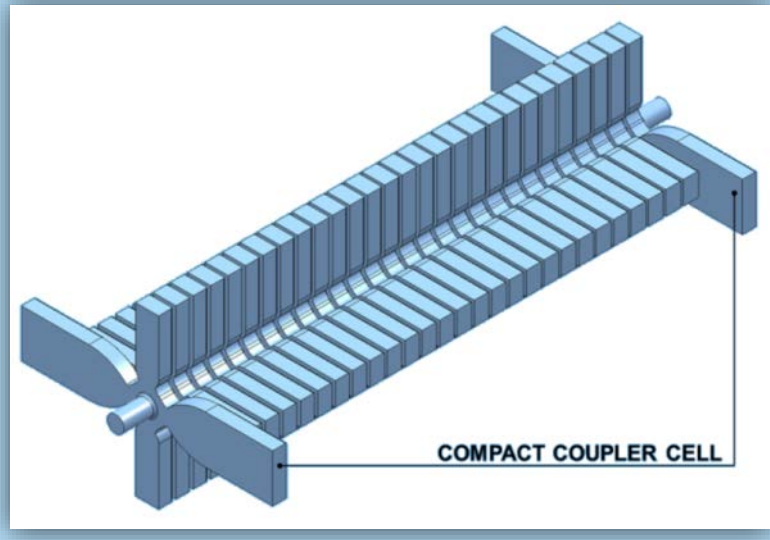
CLIC x-band accelerating structures

CLIC X-band production team

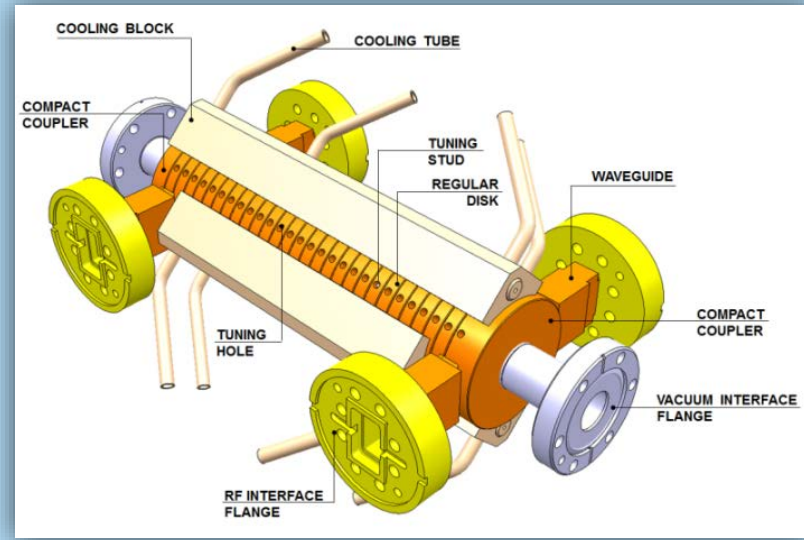


Manufacturing workflow

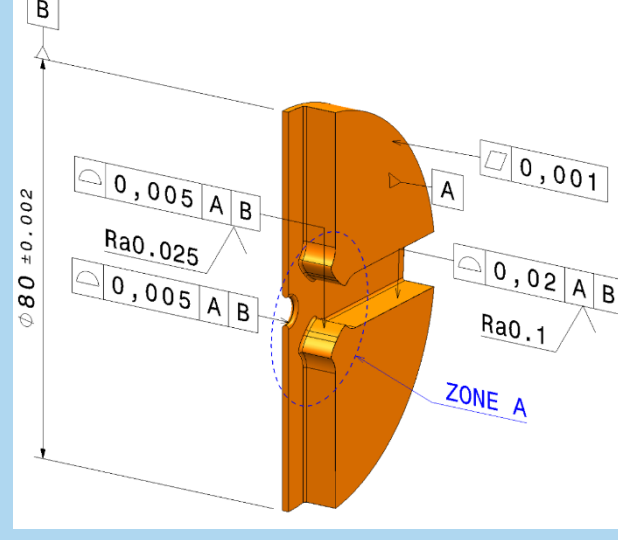
RF DESIGN



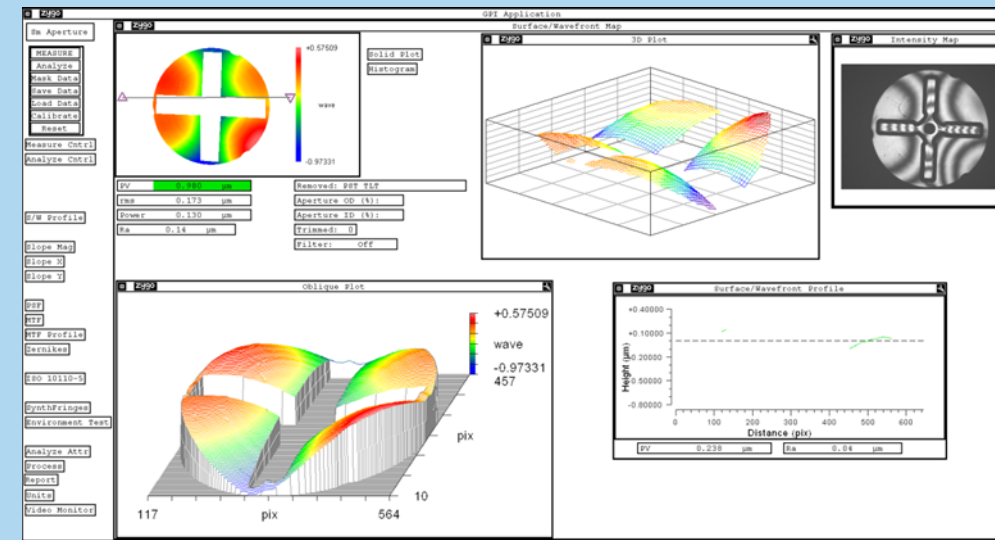
ENGINEERING DESIGN (3D models, 2D drawings)



ULTRA PRECISION MACHINING



QUALITY CONTROL AT CERN



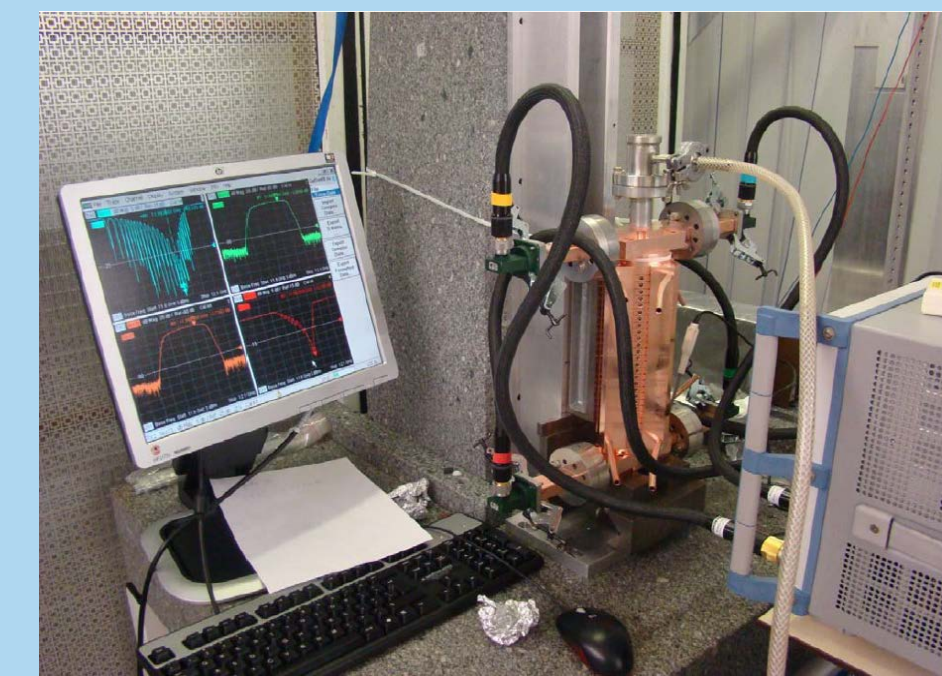
CLEANING



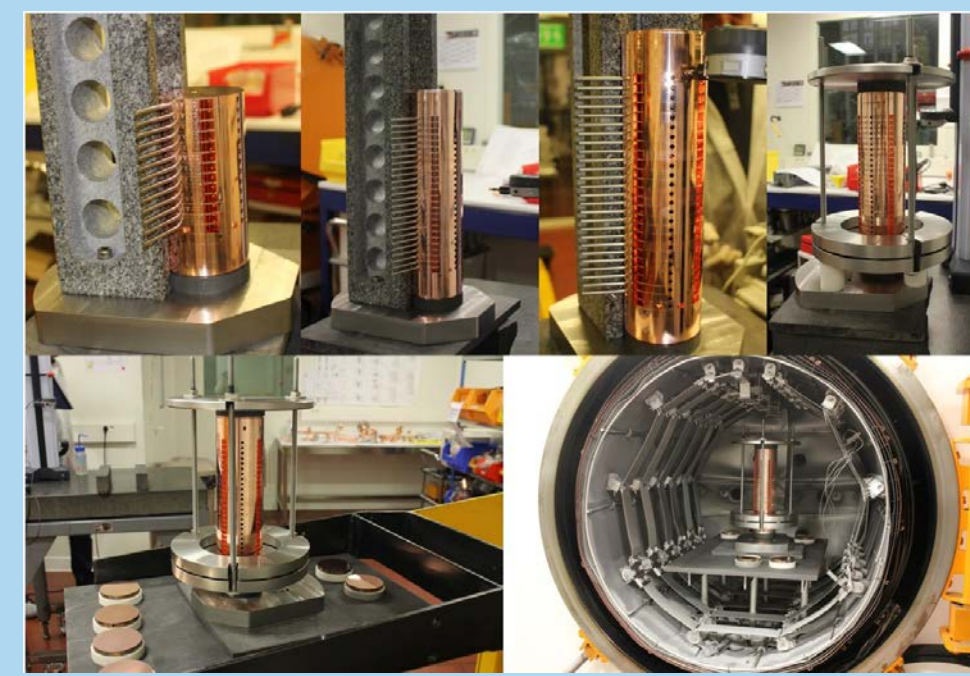
ASSEMBLY OF COUPLERS (brazing, machining)



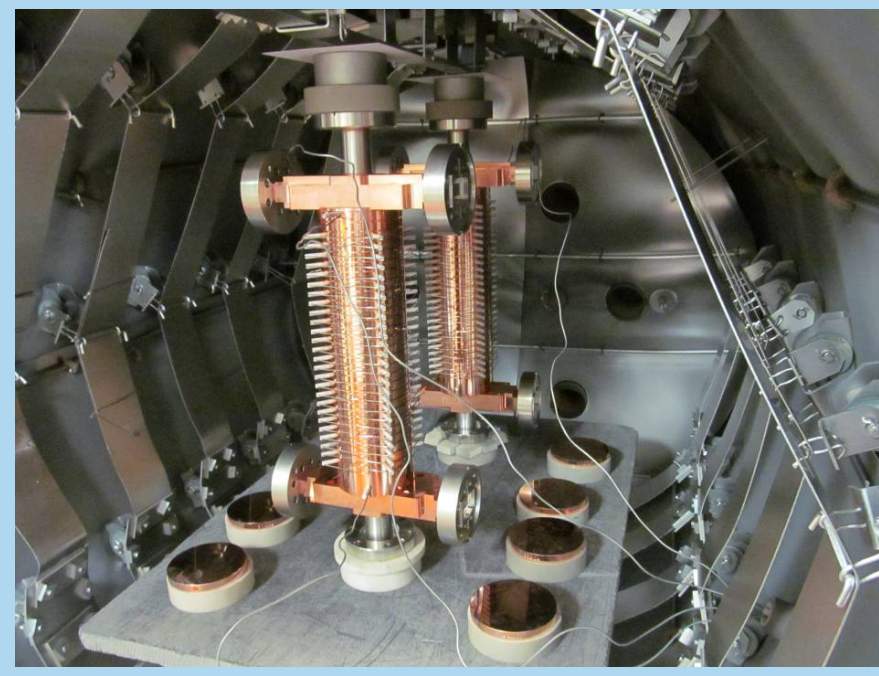
PRELIMINARY RF CHECK



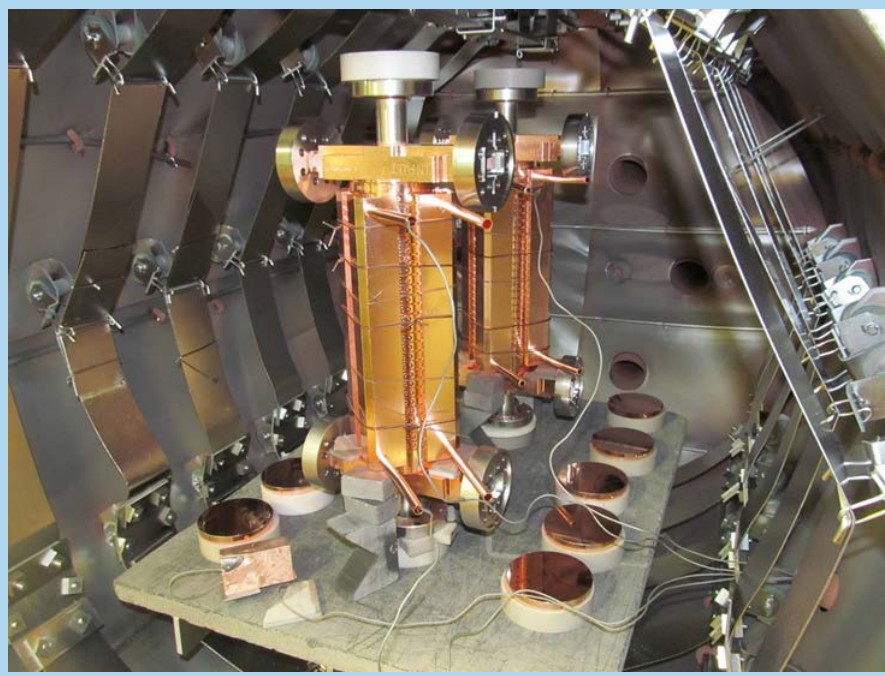
DIFFUSION BONDING OF DISC STACK



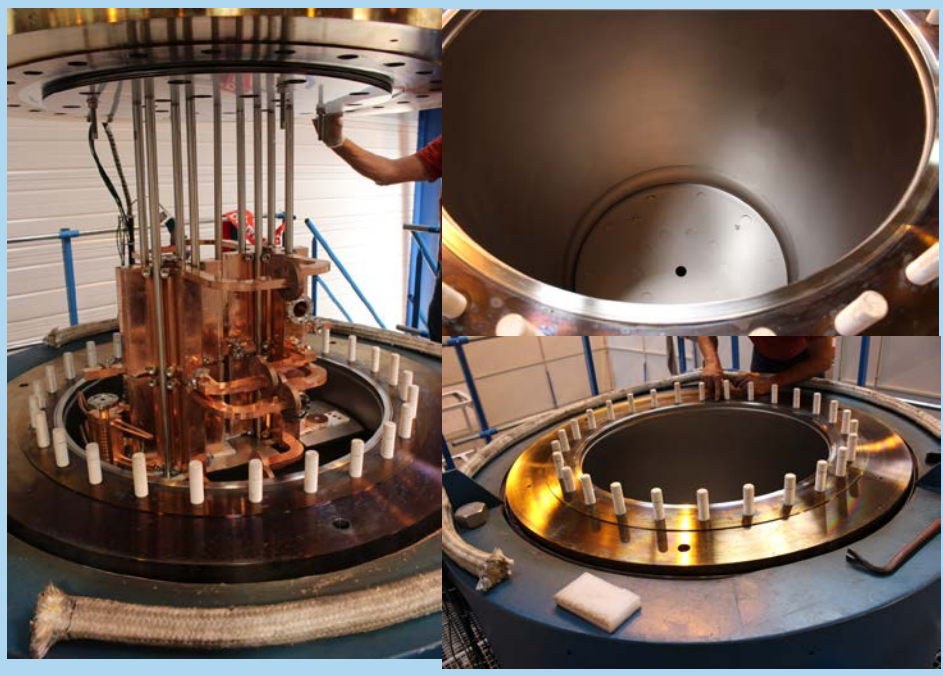
BRAZING OF COUPLERS, TUNING STUDS



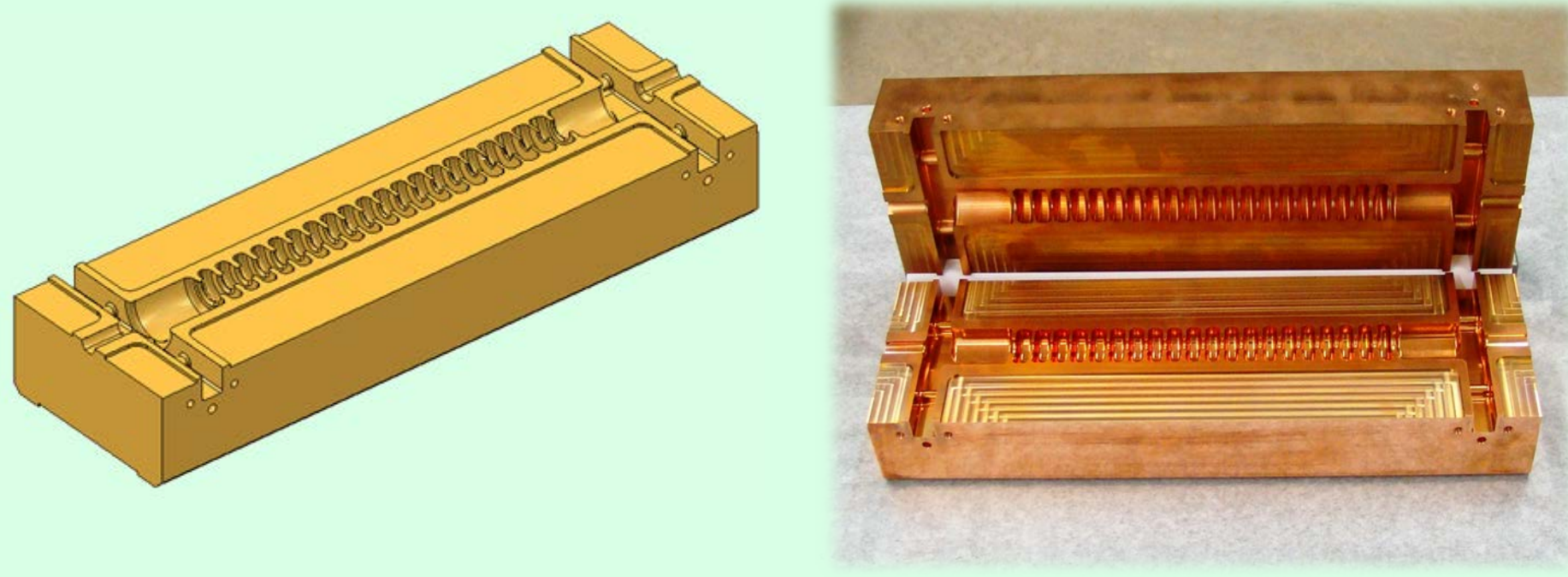
BRAZING OF COOLING CIRCUITS



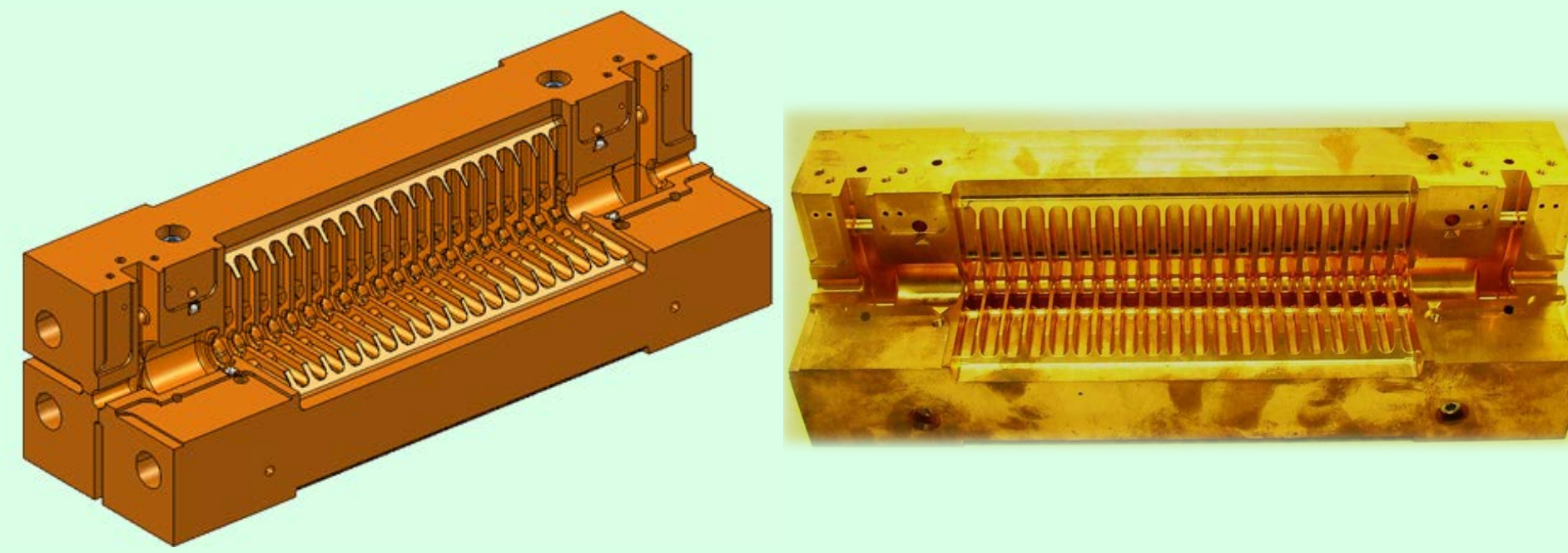
BAKING (vacuum 650 °C, 3 days)



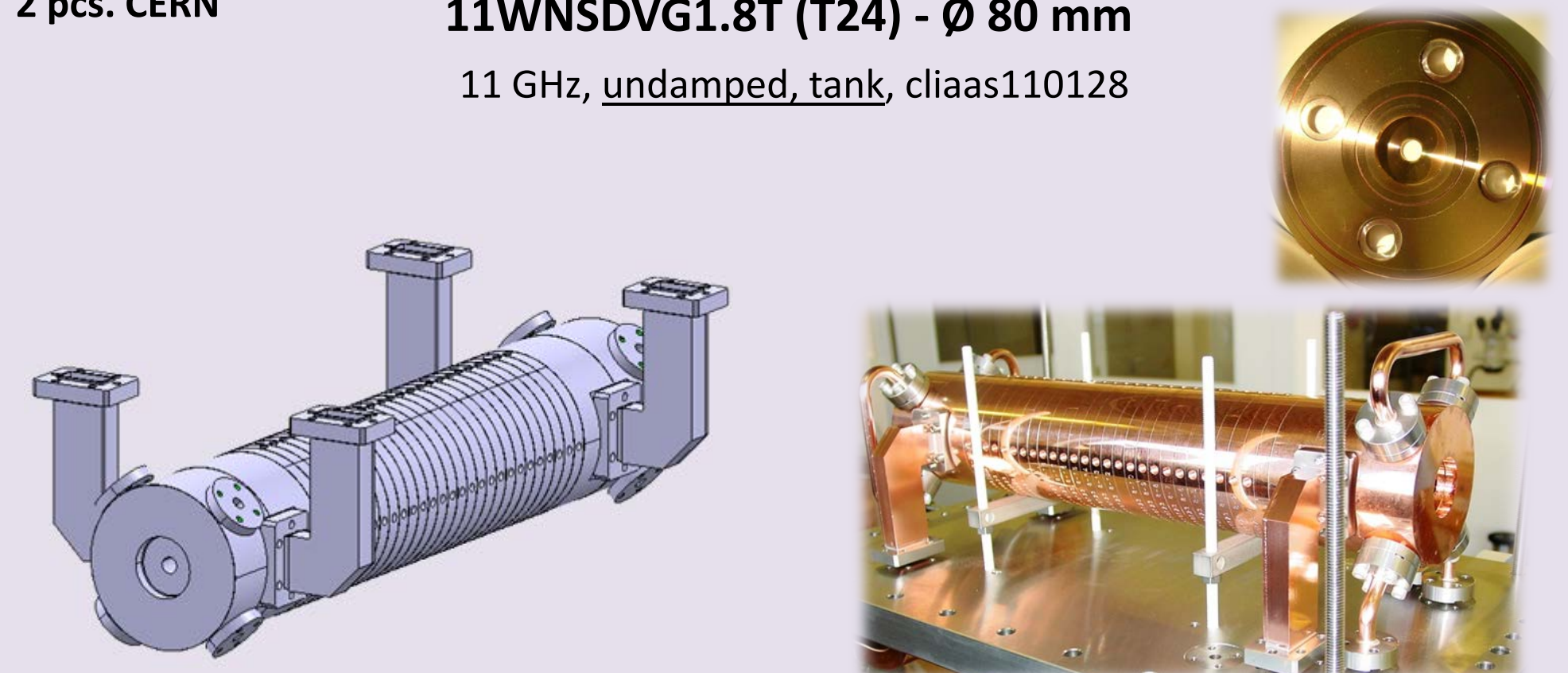
Prototype CERN
11WNSHVG1 (T18 HALVES)
11 GHz, undamped, tank, cliaas110405



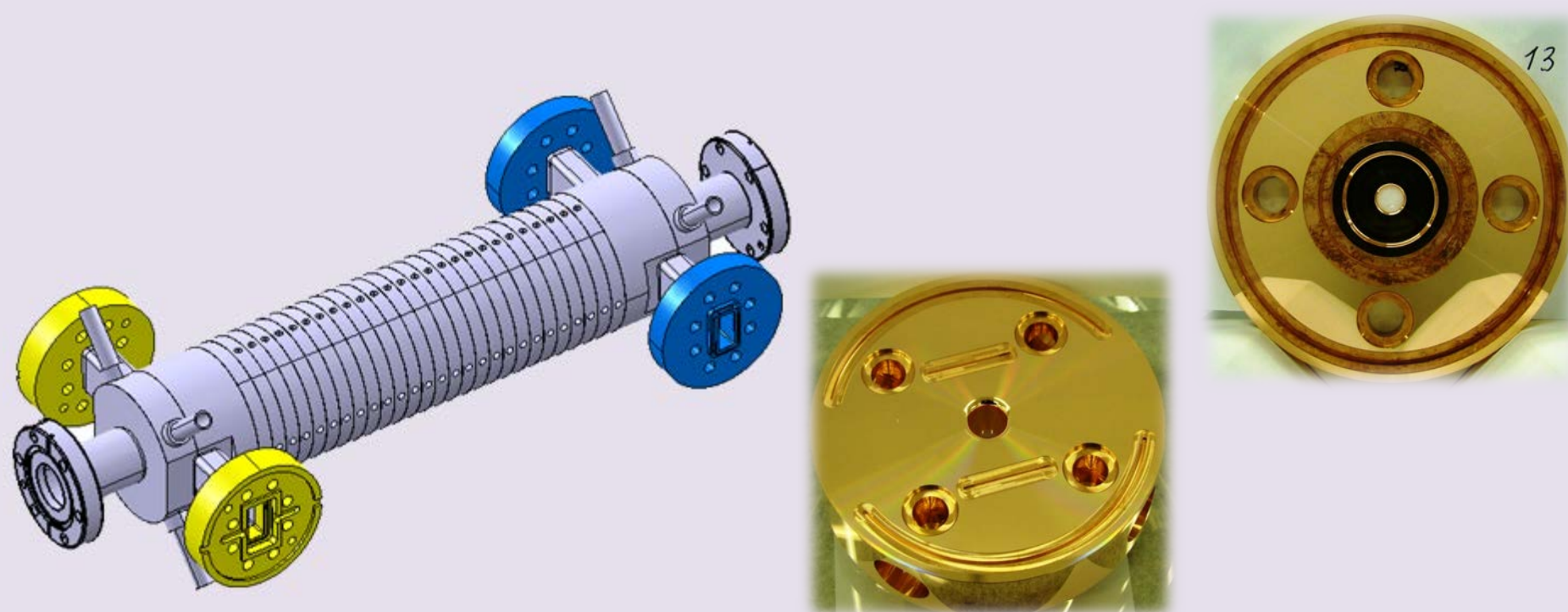
3 pcs. KEK-SLAC
2 pcs. CERN
11WDSQVG1 (TD18 QUADRANT)
11 GHz, damped, cliaas110048



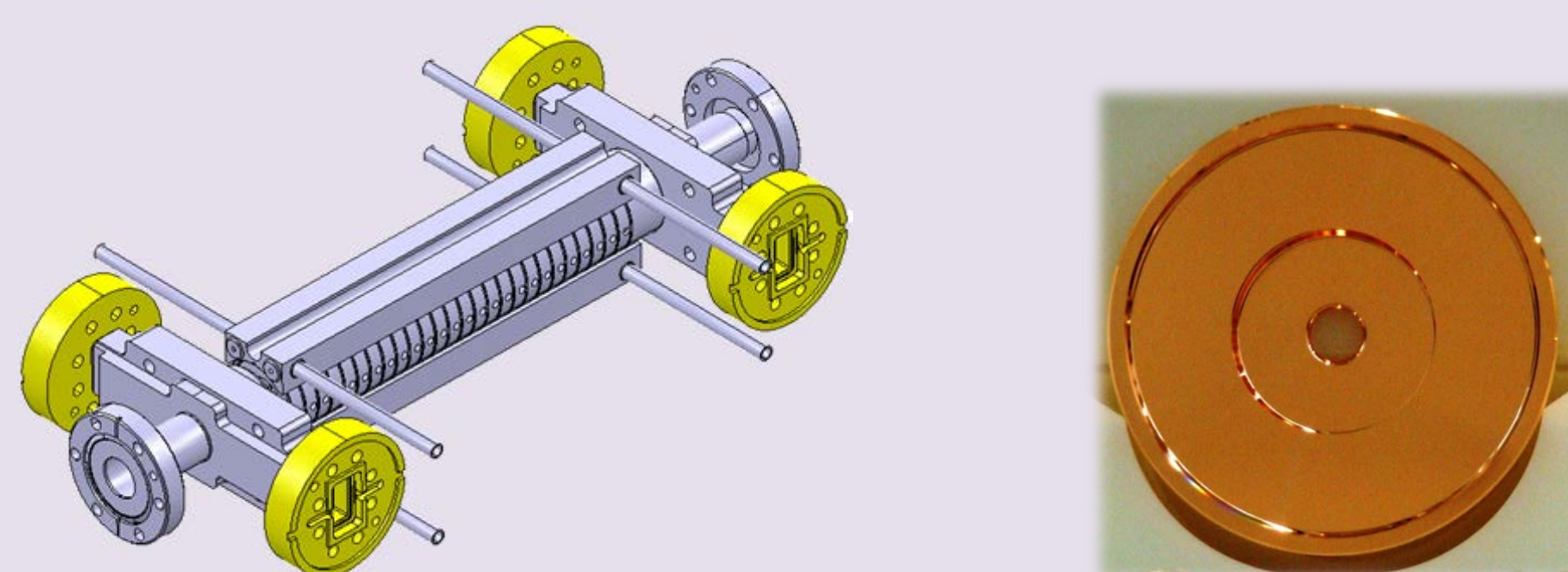
2 pcs. CERN
11WNSDVG1.8T (T24) - Ø 80 mm
11 GHz, undamped, tank, cliaas110128



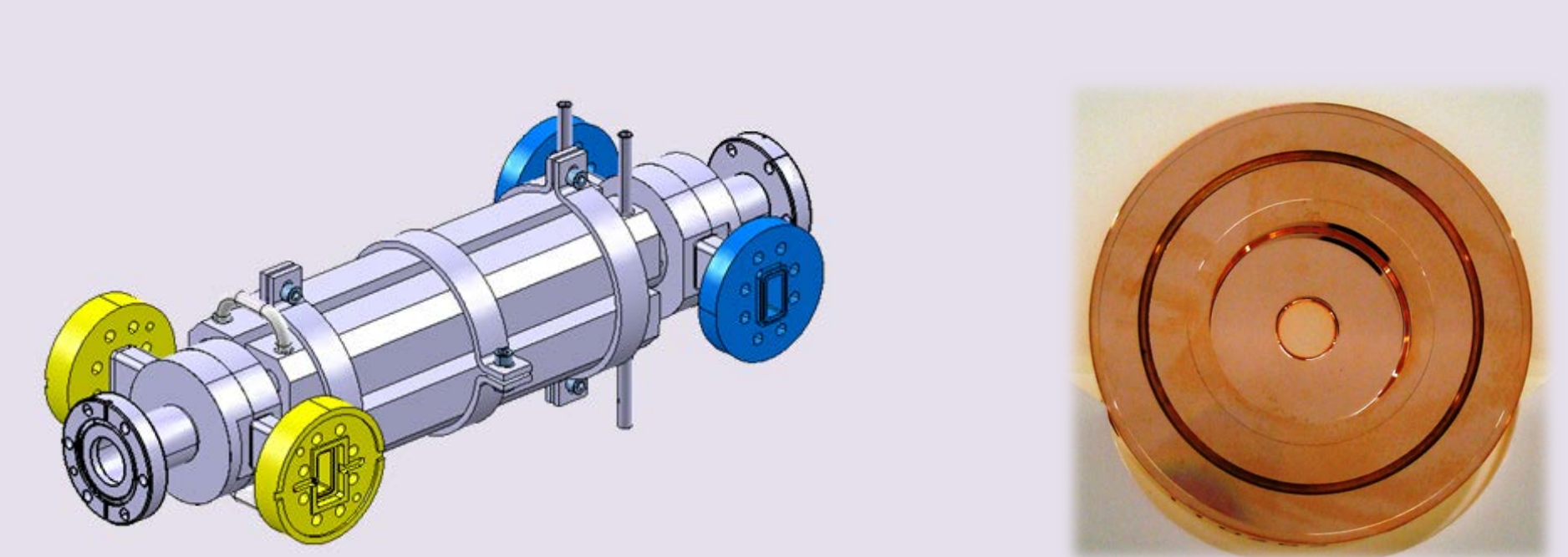
2 pcs. CERN
11WNSDVG1.8S (T24) - Ø 80 mm
11 GHz, undamped, sealed, cliaas110139, brazing design



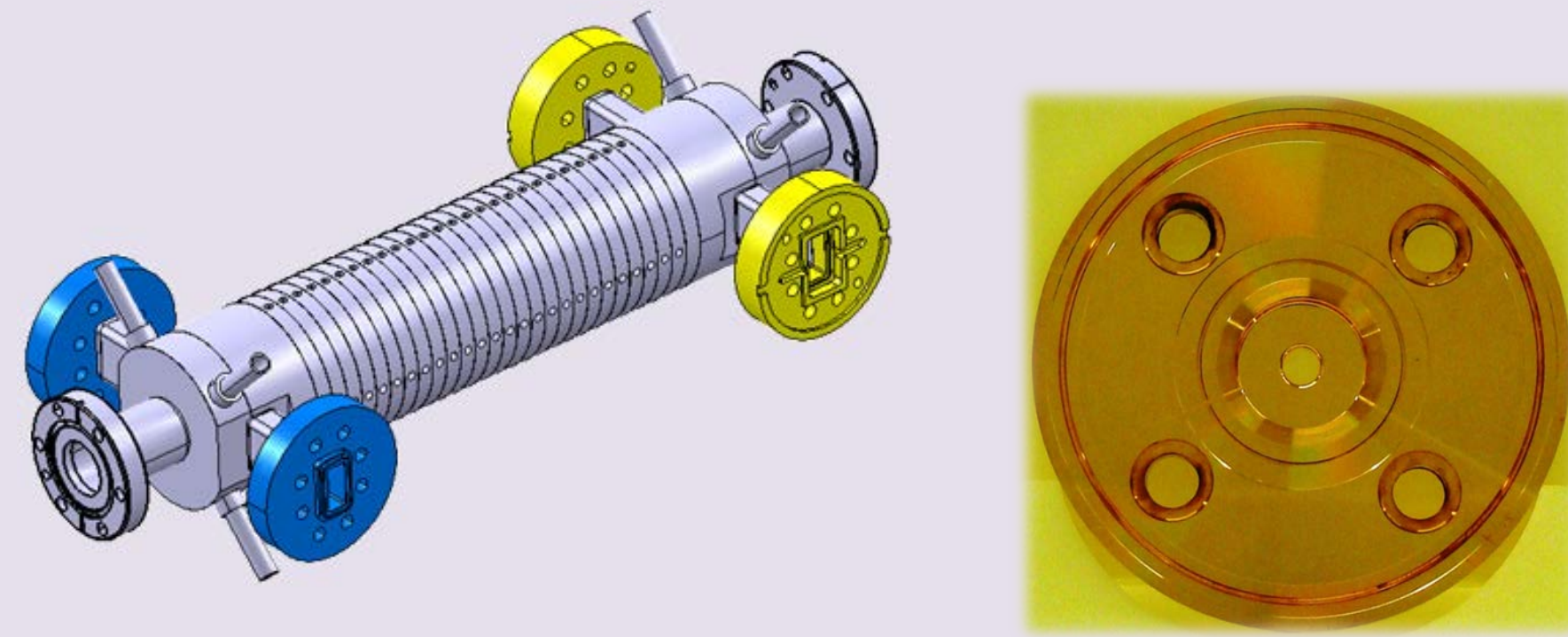
2 pcs KEK-SLAC
3 pcs. CERN
11WNSDVG1.8KEK (T24 KS) - Ø 45 mm
11 GHz, undamped, sealed, cliaas110388 **120 MV/m**



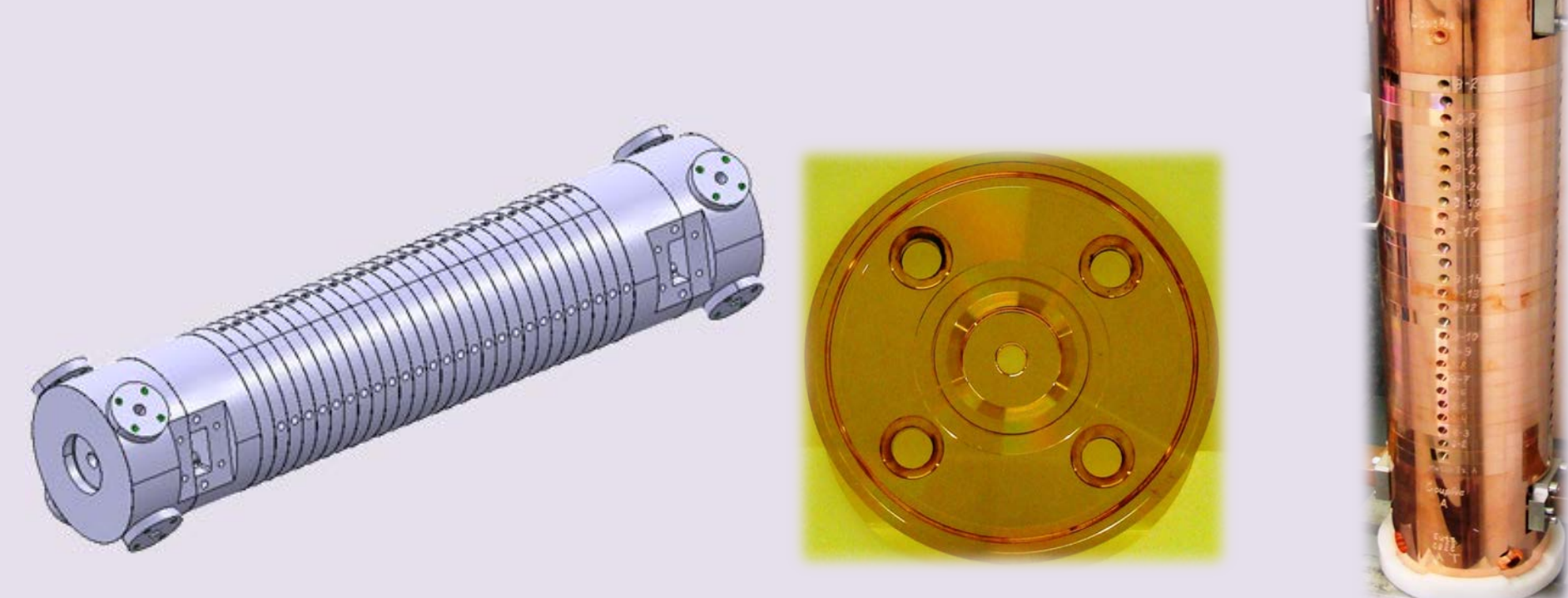
2 pcs. CERN
11WNSDVG1.8VBS (T24) - Ø 45 mm
11 GHz, undamped, sealed, cliaas110277, brazing design, bonded



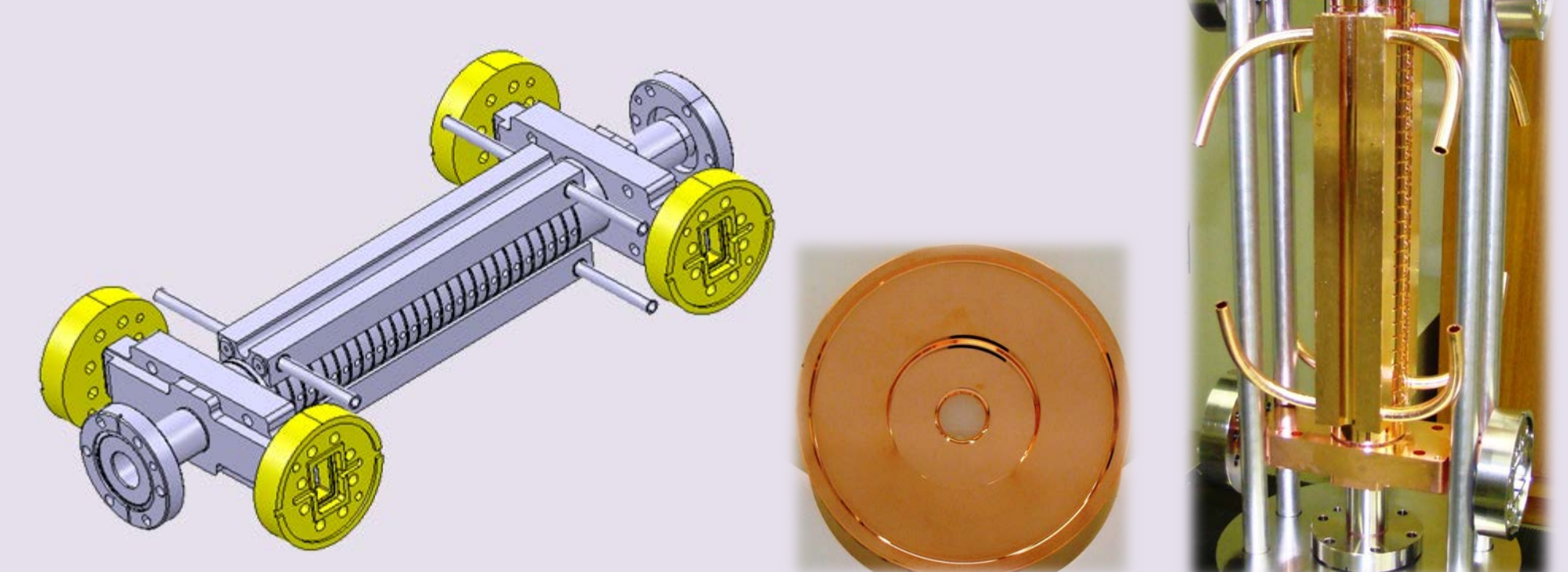
1 pc. CERN
12WNSDVG1.8S (T24) - Ø 80 mm
12 GHz, undamped, sealed, cliaas120014



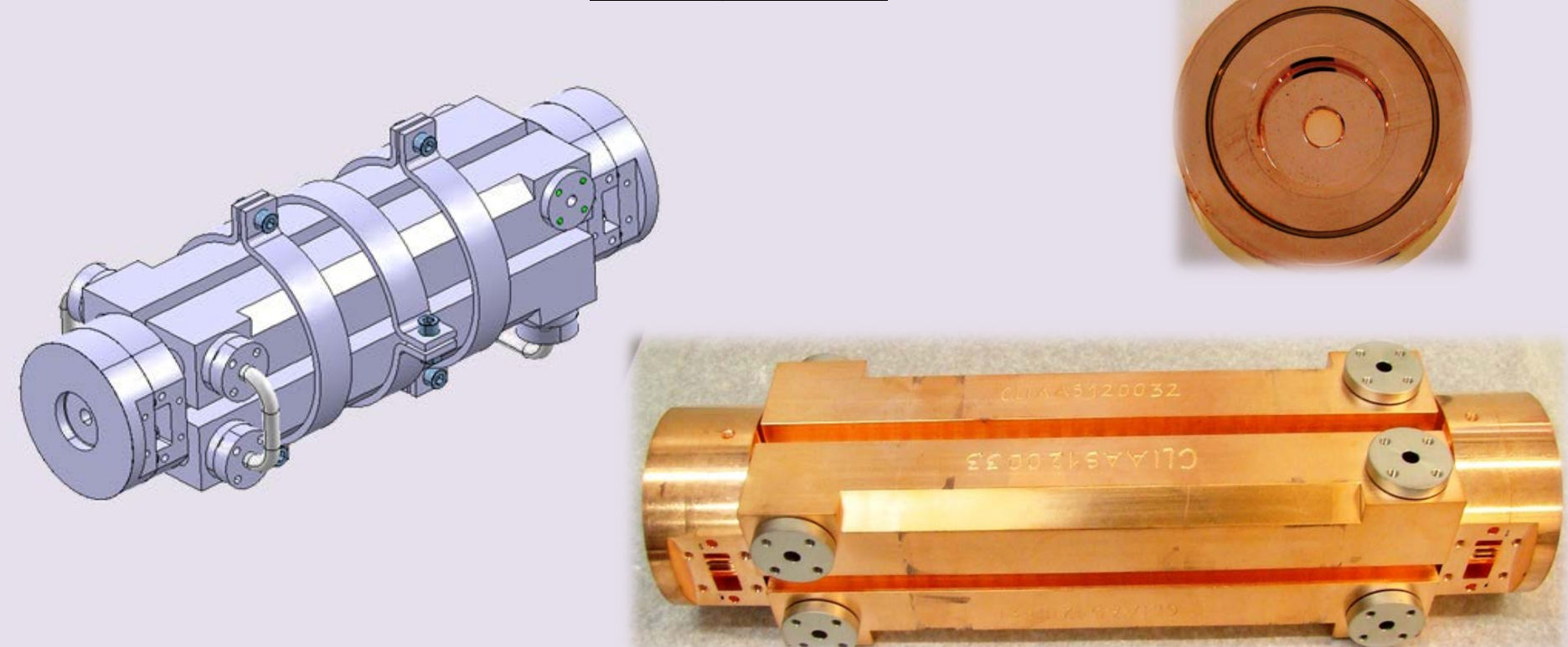
1 pc. CERN
12WNSDVG1.8T (T24) - Ø 80 mm
12 GHz, undamped, tank, cliaas120003



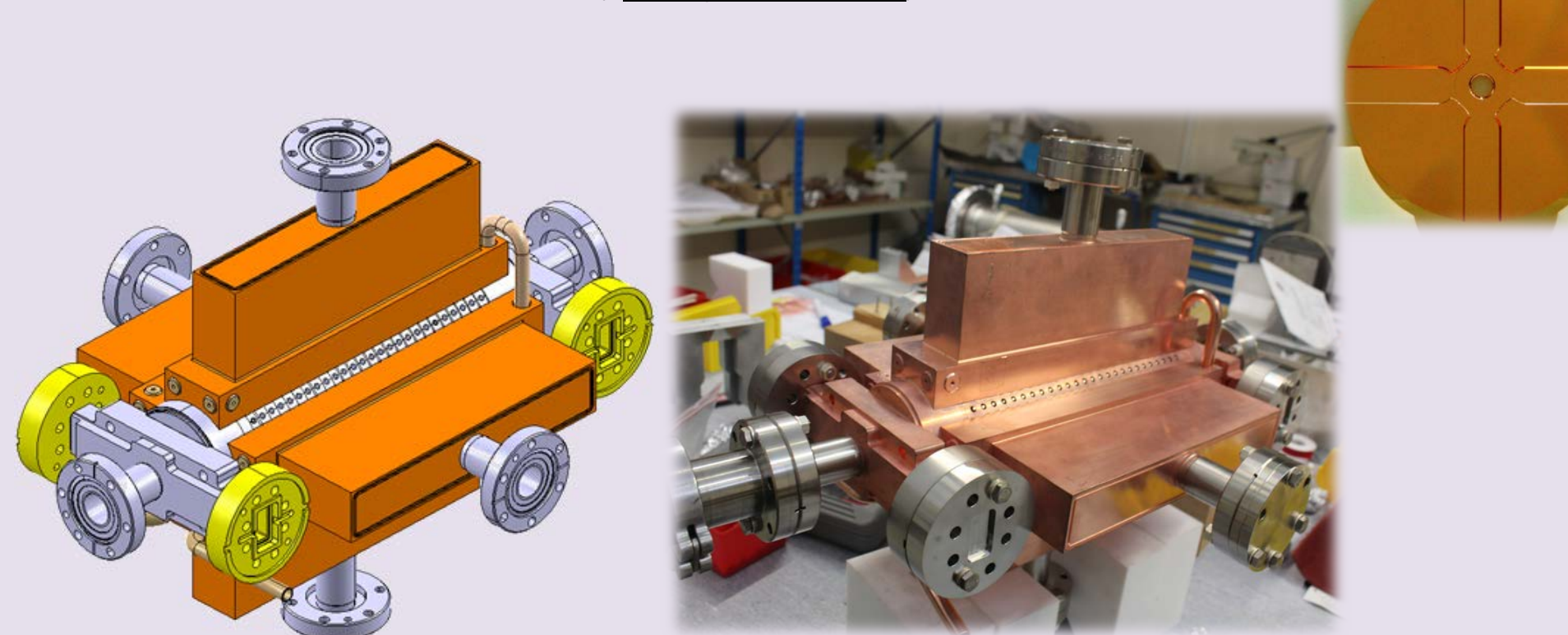
3 pcs. CERN
12WNSDVG1.8KEK (T24 KS) - Ø 45 mm
12 GHz, undamped, sealed, cliaas120061



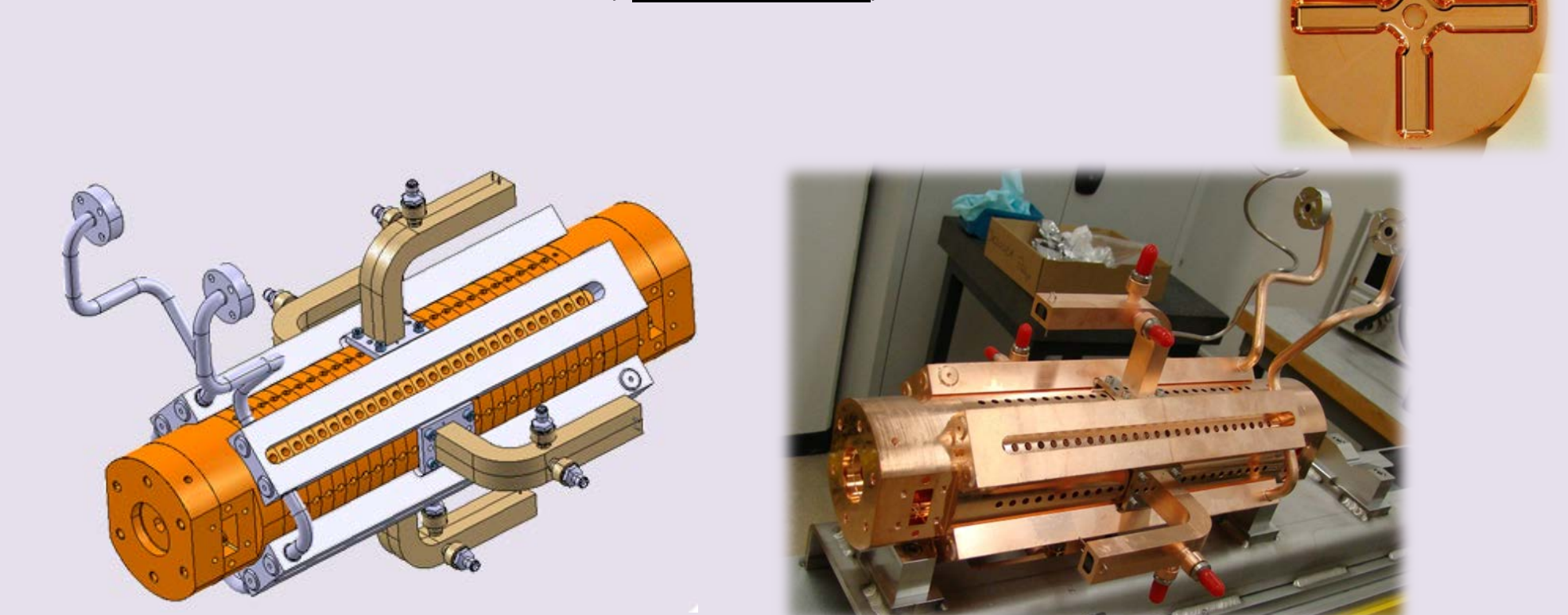
1 pc. CERN
12WNSDVG1.8VBT (T24) - Ø 45 mm
12 GHz, undamped, tank, cliaas120046



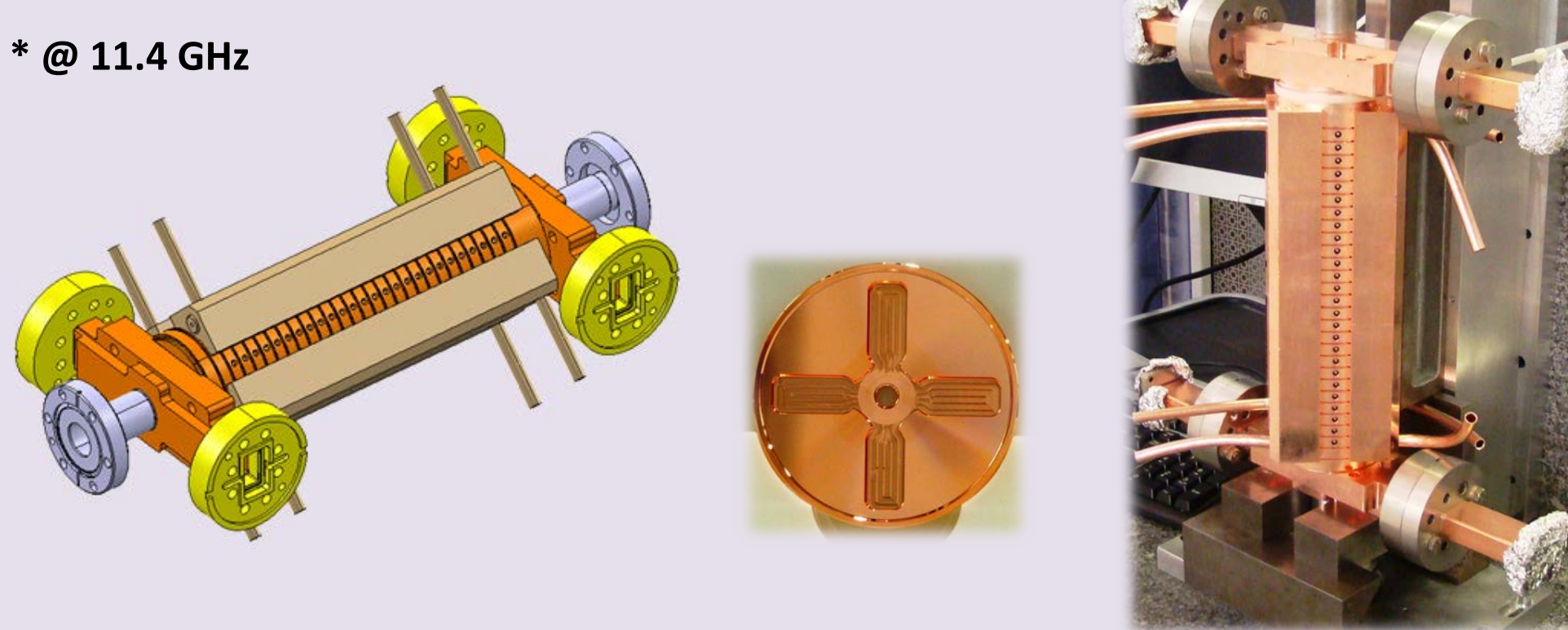
2 pcs. CERN
12SMV18024-__01CTSI (TD24 SiC R05) - Ø 80 mm
12 GHz, damped, sealed, cliaas120132



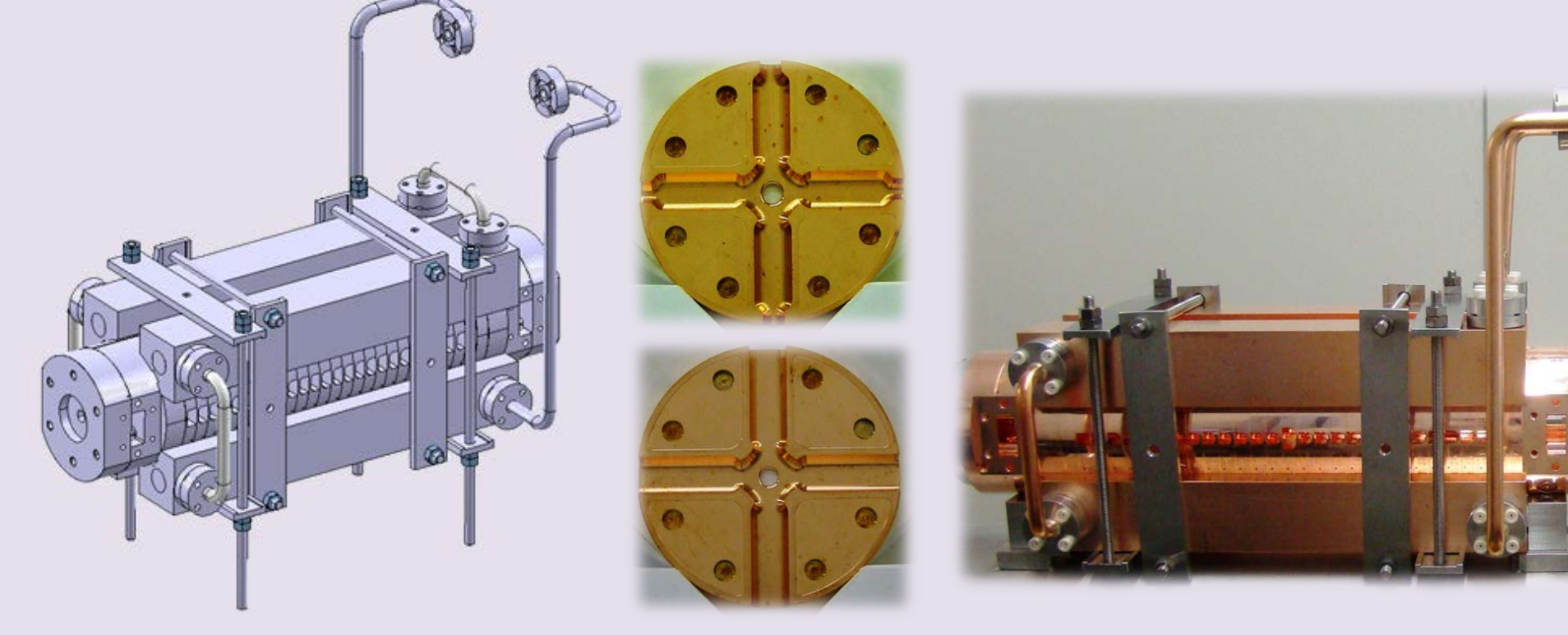
4 pcs. CERN
12WDSVG1.8T WFM (TD24 WFM) - Ø 80 mm
12 GHz, damped, tank, cliaas0027



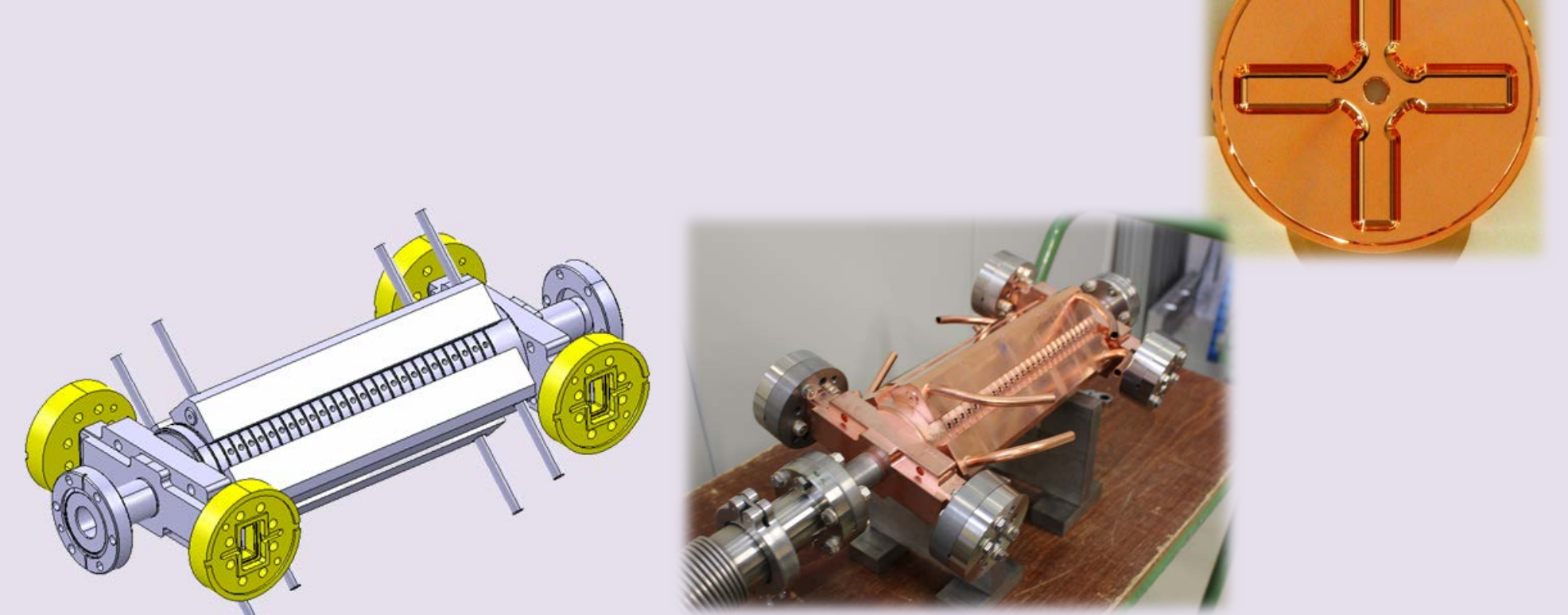
4 pcs KEK/SLAC*
3 pcs. CERN
12WDSVG1.8R05 (TD24 R05 KS) - Ø 74 mm
12 GHz, damped, sealed, cliaas120079



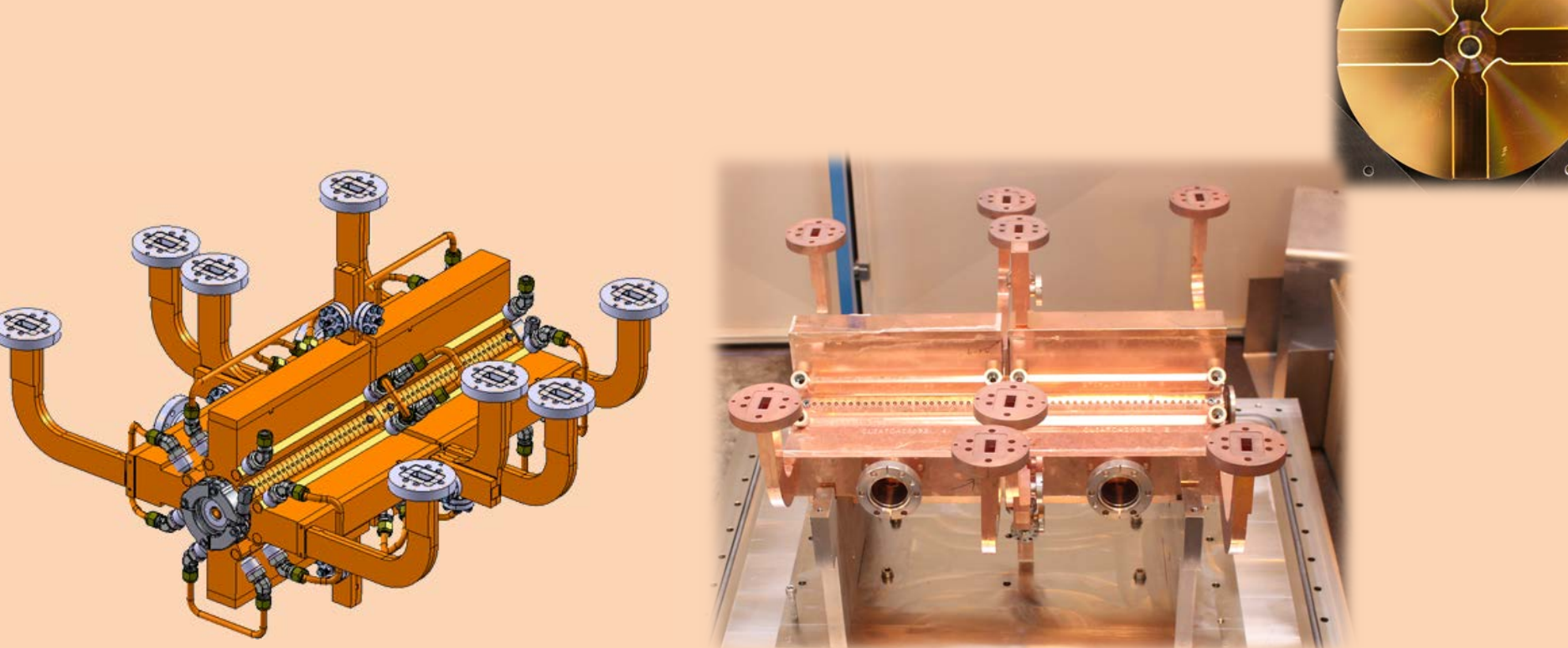
2 pcs. CERN
12WDSVG1.8T (TD24) - Ø 80 mm
12 GHz, damped, tank, cliaas120025



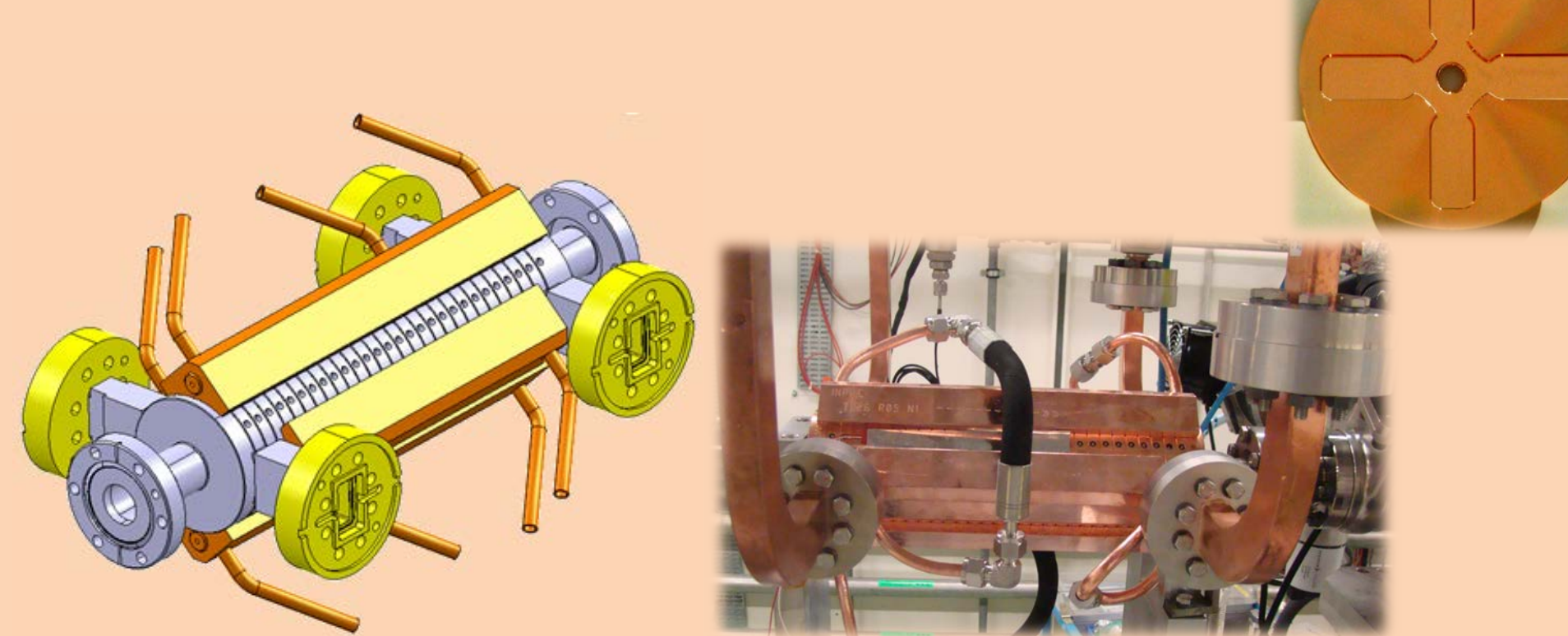
3 pcs. CERN
12WDSVG1.8KEK (TD24 KS) - Ø 74 mm
12 GHz, damped, sealed, cliaas120075



8 pcs. CERN
12SMV18026-CSWFCC (TD26 CLEX) - Ø 80 mm
12 GHz, damped, sealed, cliaas0163



3 pcs. CERN
12SW18026-__01CSCC (TD26 KS) - Ø 74 mm
12 GHz, damped, sealed, cliaas120084



4 pcs. machining
12SW18026-__01CSR1CC (TD26 R1 CC) - Ø 83 mm
12 GHz, damped, sealed, cliaas120245

