

Cavity status; recent KEK activities

(1) MHI-010, MHI-011, MHI_A ; 9 cell cavities field measurements

MHI-010: 3rd VT 20MV/m @ $Q_0=1.1E10$ Sep 02,2010

MHI-011: 3rd VT 18MV/m @ $Q_0=0.17E10$ Sep 09,2010

MHI_A: 1st VT 29MV/m @ $Q_0=1.1E10$ Oct 28,2010

(2) KEK-FNAL collaboration; on RI-026 and AES-001

These cavities were borrowed for the tuning machine commissioning, and local grinding studies.

The local grinding were done for these cavities.

AES001 was used for the tuning machine commissioning. (RI-026 was not.)

(3) DESY-FNAL-KEK collaboration; on tuning machine

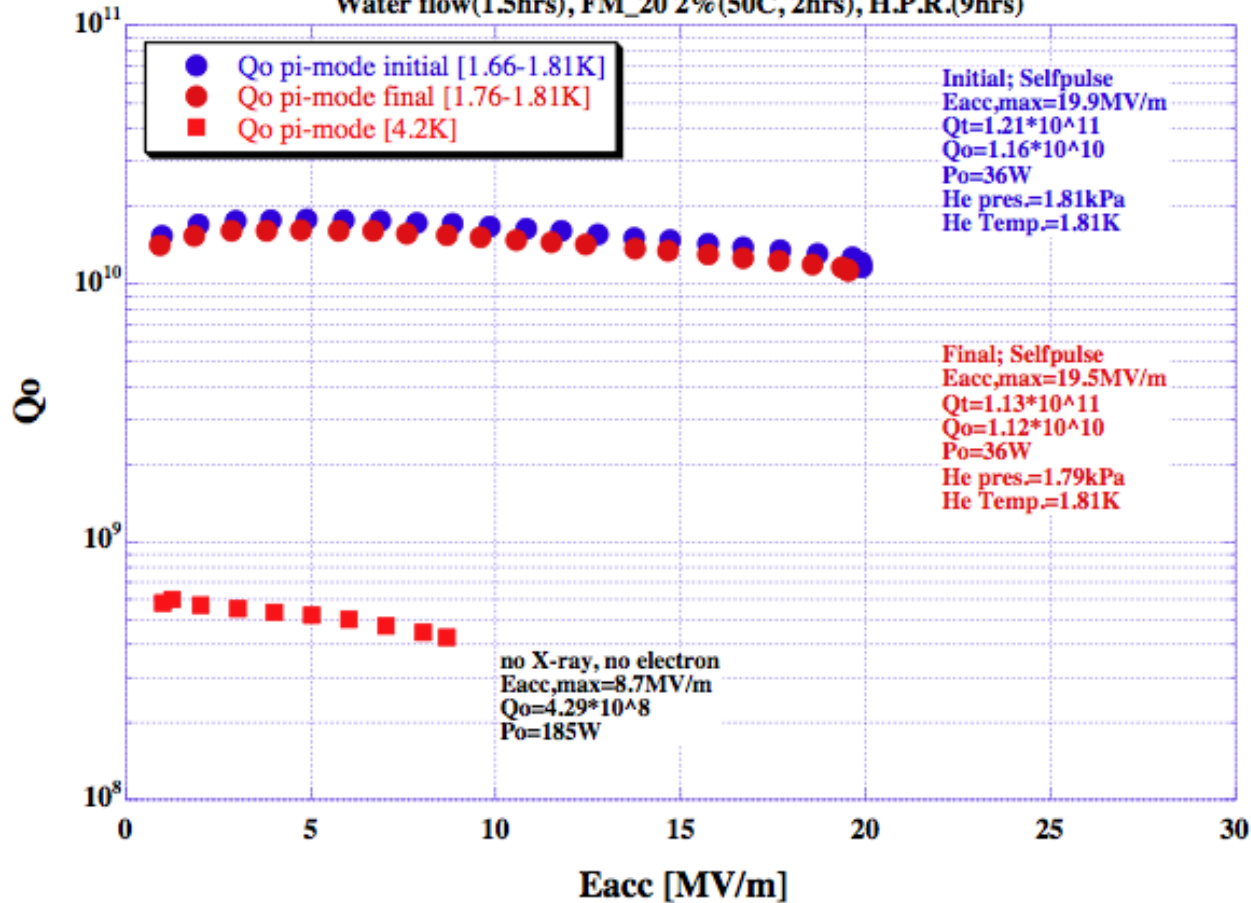
The start up of tuning machine at STF is on-going.

AES001 and Z-142 are used for this start up.



MHI-010

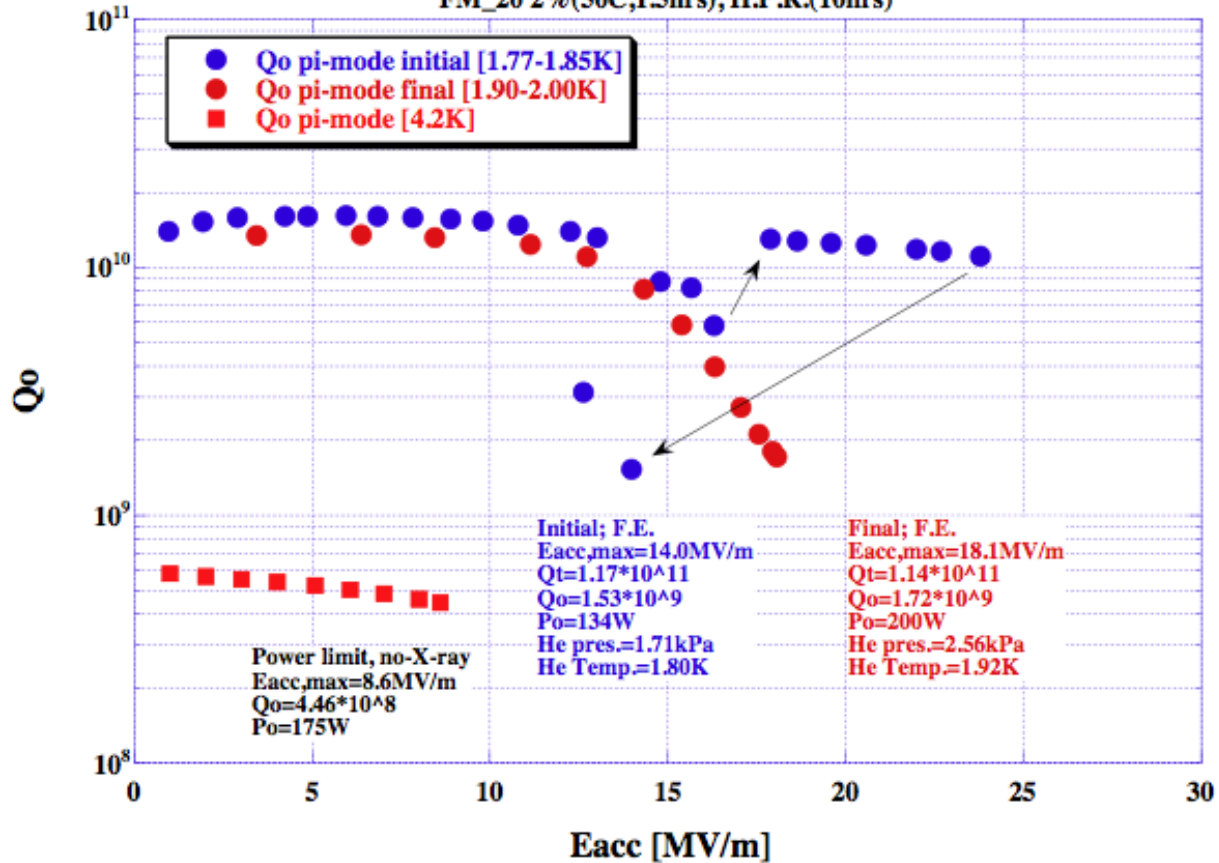
STF Baseline Cavity #10 3rd. Vertical Test 09/02/2010
Local Grinding, Low Current Density EP-II(20 μ m) with N2 gas,
Water flow(1.5hrs), FM_20 2% (50C, 2hrs), H.P.R.(9hrs)



Quench at #1cell 330 degree
(Local grinding place)

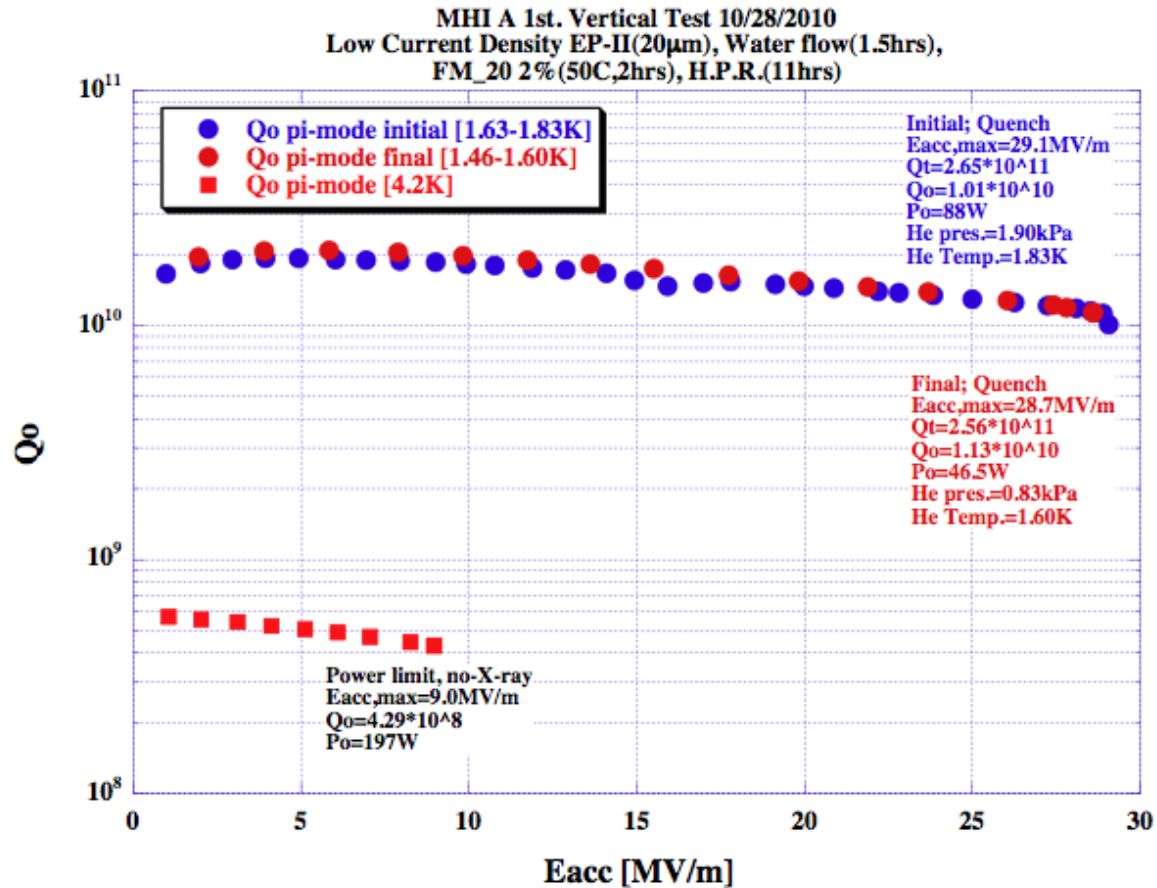
MHI-011

STF Baseline Cavity #11 3rd. Vertical Test 09/09/2010
 Low Current Density EP-II(20 μ m) with Air, Water flow(1.5hrs),
 FM_20 2%(50C,1.5hrs), H.P.R.(10hrs)



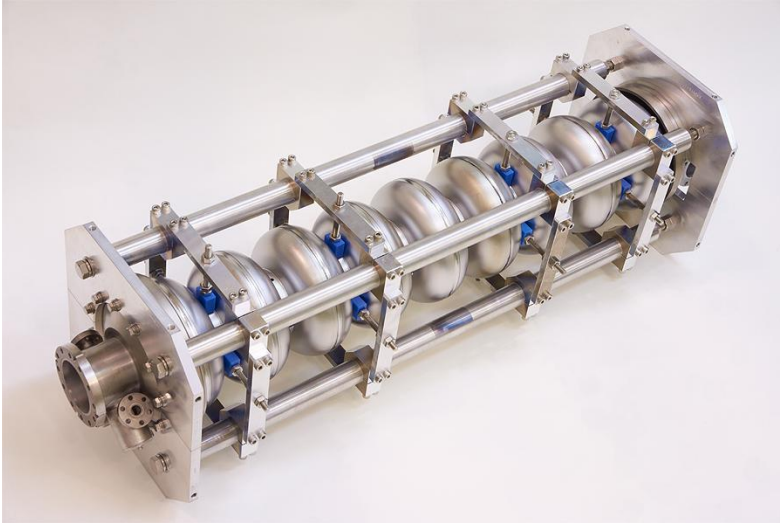
Field emission turned on.

MHI-A

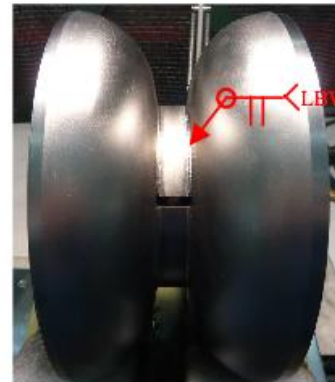


Quench at #8cell 180 degree

MHI-A cavity



Deep drawing of HOM cup,
Laser beam welding,
more smooth EBW seam



mechanical grinding of two FNAL cavities; Ken Watanabe

(19MV/m, field emission)

TB9RI 026: 8-9 iris, t = 107 deg. Pit-type



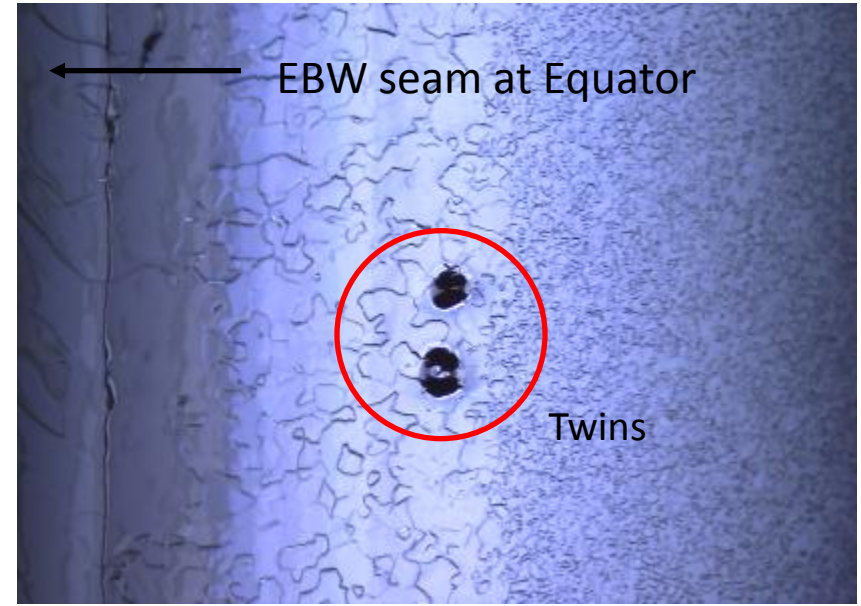
To 9-cell equator

Grinder #3 used for grind at Iris.

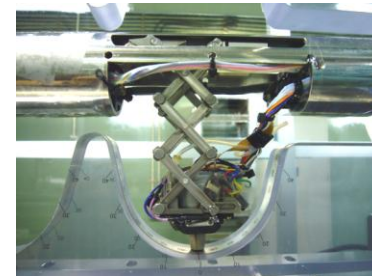


(22MV/m, quench)

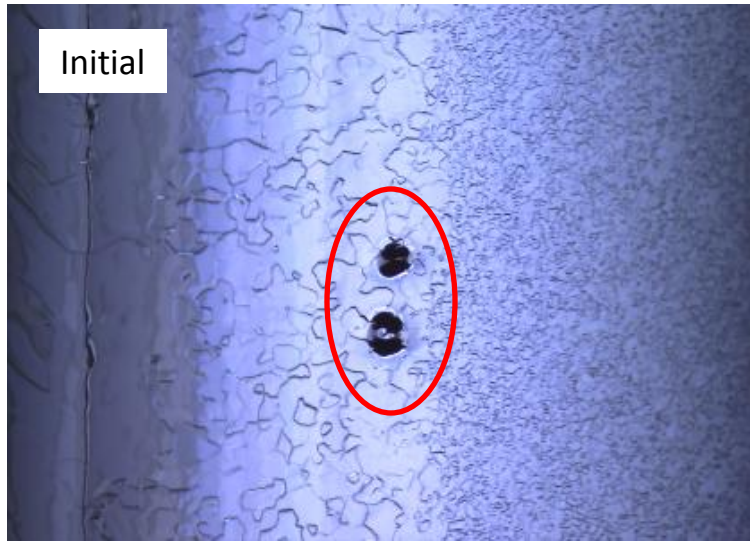
AES-001: 3-cell equator, t = 169 deg. Bump type



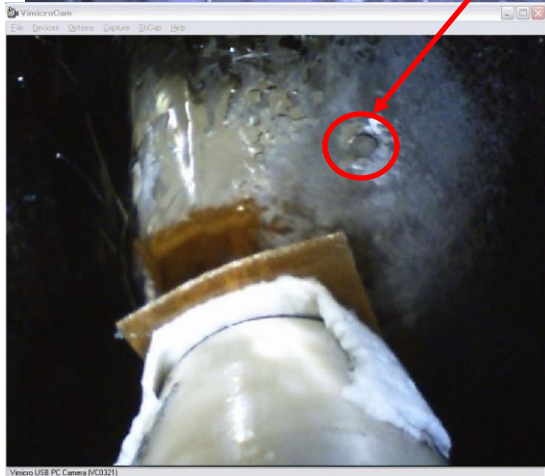
Grinder #1 used for grind at Equator



AES-001 : Grinding (1)

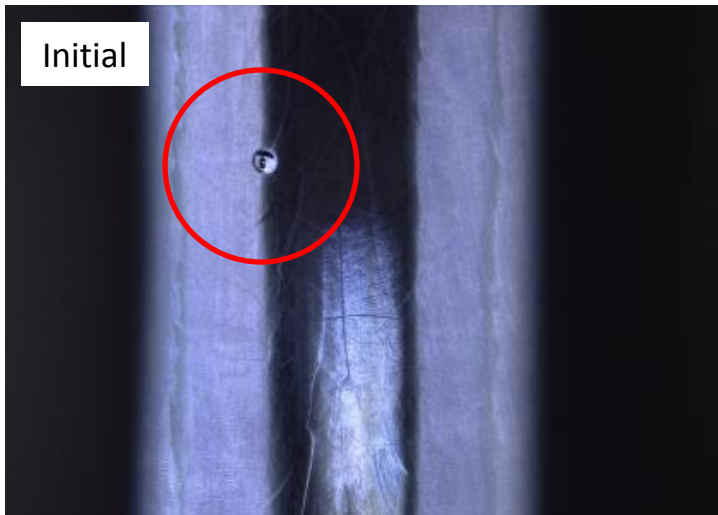


AES-001 : Grinding (2)



Two bumps were removed completely.

TB9RI 026 : Grinding (1)



To 9-cell equator

