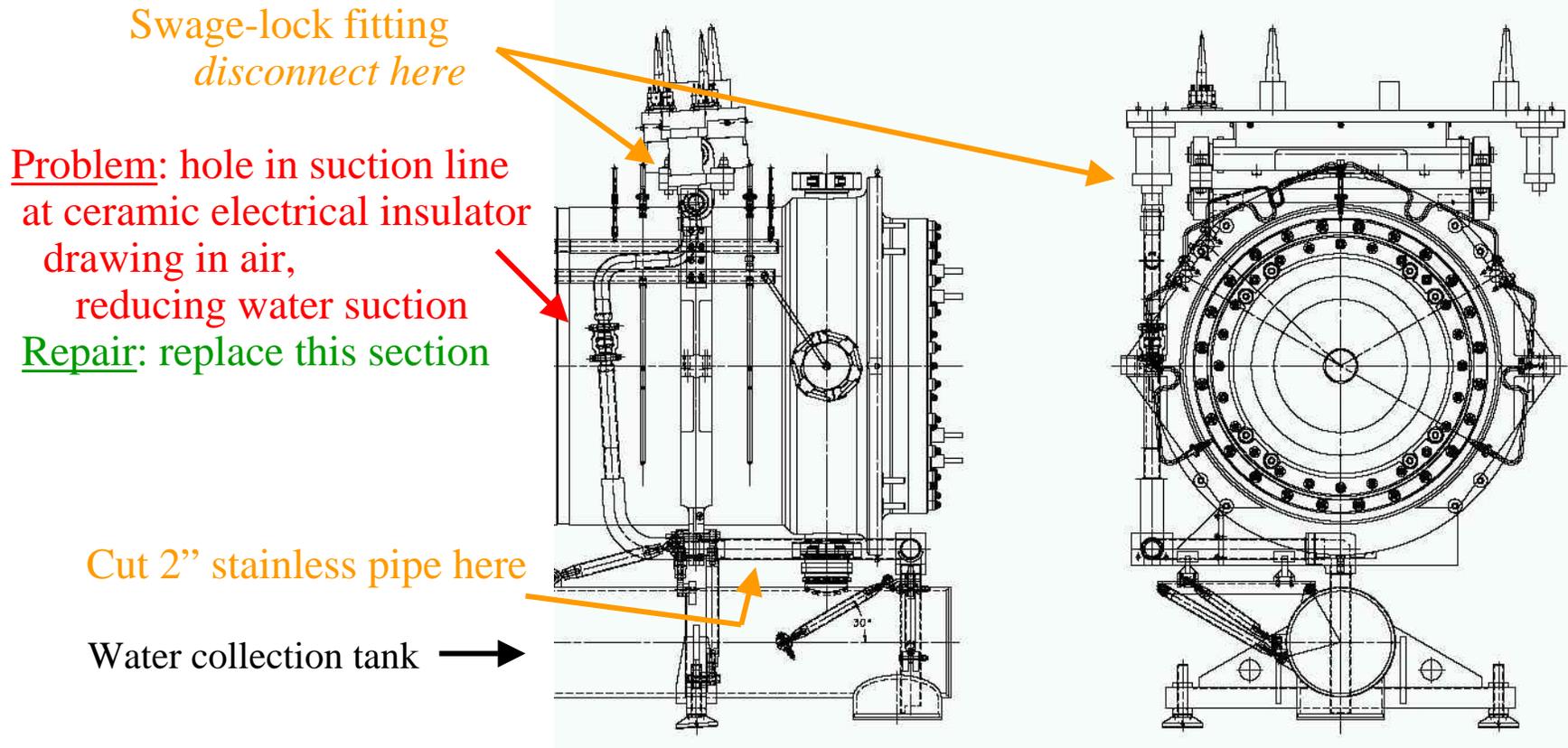




Horn 2 repair update

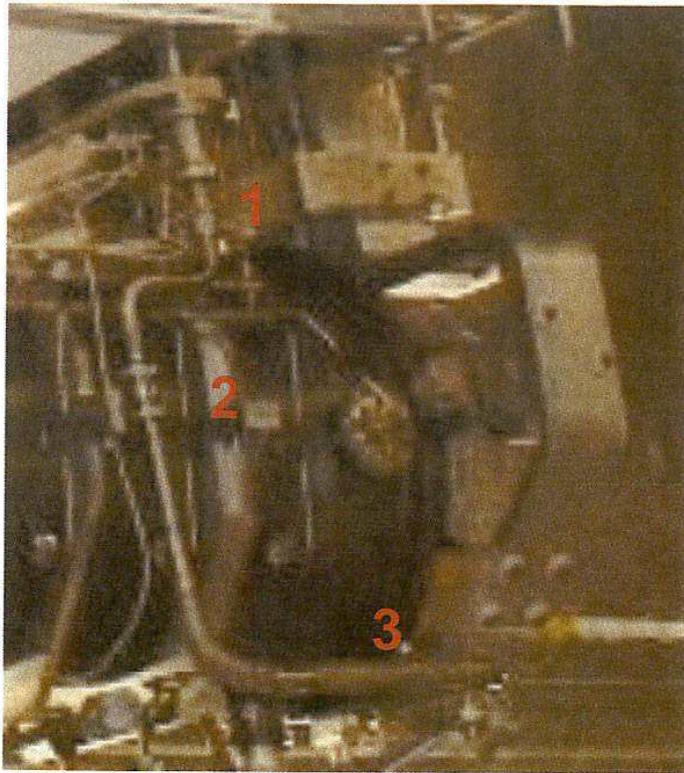
Symptom: Suction of water back from Horn 2 could not keep up with water spray rate to the horn – *water built up in the horn*





The challenge for repair is the residual radiation field

30 R/hr – 50 R/hr in chase around horn before horn removal



All Doserates in R/hr

After horn removal	O.C.	1 foot	~ 18"
1	8	4.5	3
2	7	4	3
3	5	3	2.5

Allowable ~ 1 minute per person at arms length

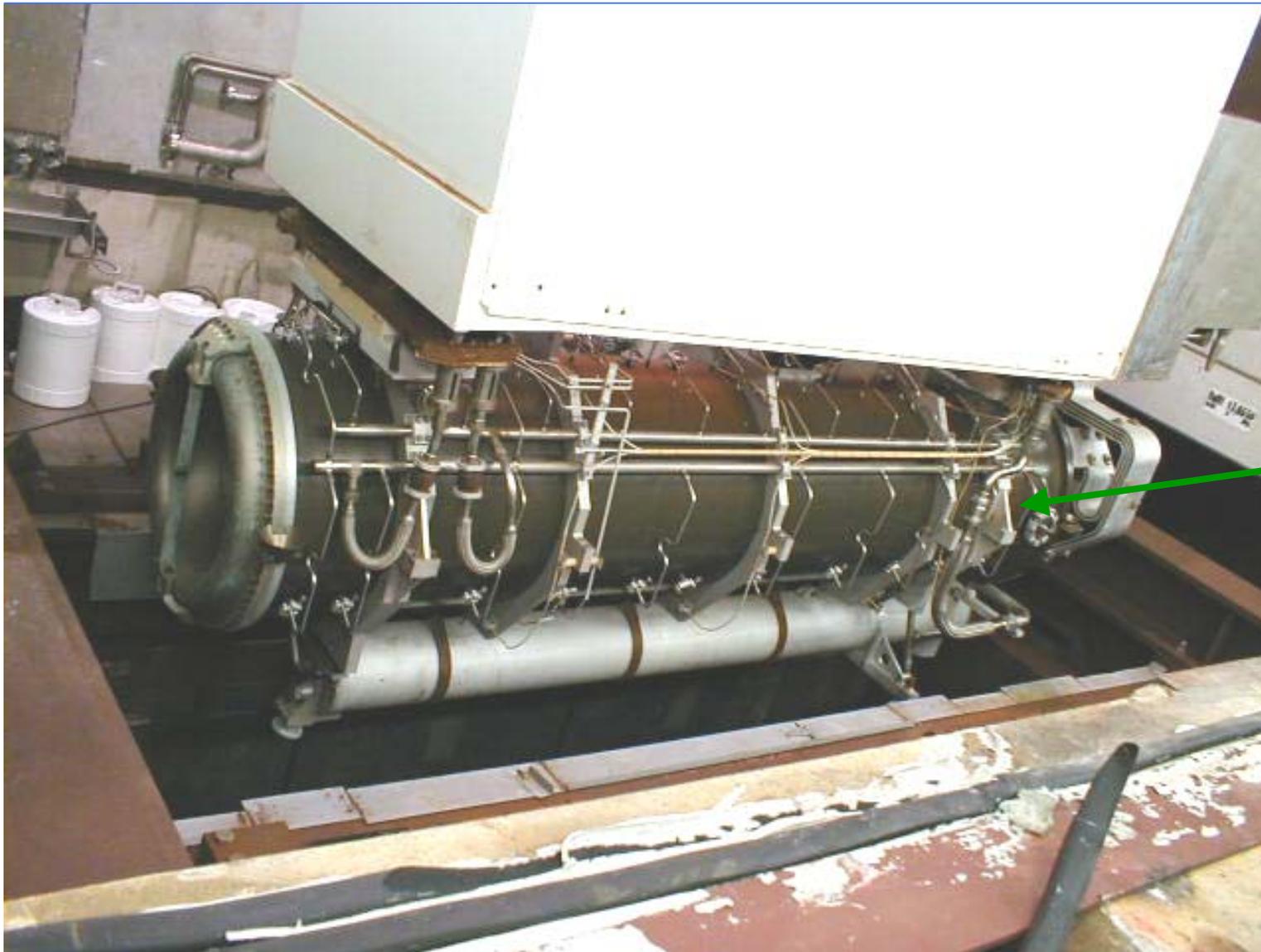


Status: bad water-line has been successfully replaced !

- On April 18, bad section was replaced
- Horn is back in target pile
- Tests so far:
 - « Water flow now works as designed, no sign of water or air leaks
 - « Hi-Pot of horn is acceptable
(changed deionization bottle to improve water resistivity)
- Before declaring total victory,
 - want to see repair survive vibration from horn pulsing
 - Pulse test must wait for completion of installation
of new motorized switch on 13.8 kV power*



Repaired horn going into target pile



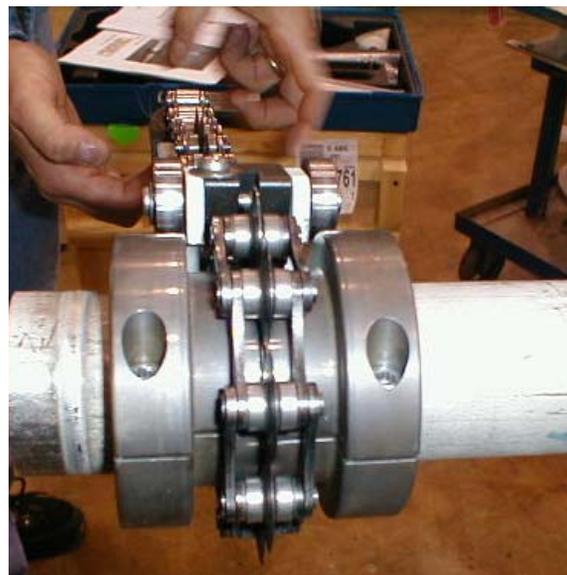
Repaired
line



Some pictures from practice



Set up temporary shielding
with slot



Cut 2"
steel pipe

No chips

Note
alignment
jig



Hydraulic Swaging of compression fitting



Job well done !

The ALARA plan estimated about 277 mrem to the repair crew including 25% for contingencies. (~ 1 mrem/second)
The job was done with a total dose of 244 mrem.

The repair team deserves recognition for a well planned, excellently executed job! The careful planning, prototyping, fabrication of special tools, and practice paid off.

Lead engineer: Vladimir Sidorov

Tech crew: Hiep Le, Cervando Castro, Keith Anderson, Willie Stitts, E. Henry Schram, Robert Albrecht, Justin Mc Vicker

RCT: Tony Busch

Plan consultants: Gary Lauten, Tony Leveling, Kris Anderson