FUNDAMENTALS.

MECHANICAL / VACUUM – CAN LEAK CHECK, CAN COOLDOWN, NO COLD LEAKS.

ISSUES: BELLOWS MOTION
VALVE BOX LEAKS

CRYOGENICS – FRIGE PROCESS O.K., OPS O.K.
HEAT LOAD O.K.

ISSUES: VALVE SEALS
REDUNDANCY

CONTROLS – FUNCTIONALITY O.K, INDICATIONS OF PROBLEMS (RESPONSE TIMES, LOST COMMANDS –)

POWER SUPPLIES – WHEN HARDWARE WORKED SYSTEM APPEARS STABLE, NOISE WITHIN SPECS.

ISSUES: – RETROFITS
MISSING HARDWARE
HIGH EXCITATION

RF – LLRF O.K., 28 MHz, [FREQUENCY, RADIUS],

ISSUES: 200 MHz

INJECTOR/INJECTION – MEETS GOALS

ISSUES: KICKER STRENGTH / LOSSES

OPERATIONS.

START TO INTEGRATE OPS WHERE POSSIBLE ASAP e.g. BEAM TO DUMP. (SYSTEM GUIDES FOR MCR).

SEQUENCER - BASICS APPEARS TO BE IN PLACE

1 FAILURE / MONTH / SYSTEM !

AS INTENSITY RISES THEN BEAM HALO / COLLIMATION BECOMES AN ISSUE:

BEAM LIFETIME - BOOSTER ?

COMMISSIONING - PHASE II

NEED TO ESTABLISH COLLISIONS 'ON DEMAND' - GOAL

DATA BASE FIDELITY
RAMP FIDELITY
INSTRUMENTATION FIDELITY

MCR EFFICIENCY

HARDWARE RELIABILITY - P.S. + SOME RF

POST MORTEM SUPPORT - DIAGNOSE ON A SINGLE FAILURE

SOME SYS. INTEGRATION IS STILL NEEDED - P.S + RAMPS.

PERMIT LINK / BEAM DUMP NOT TOUCHED YET.

HEAD-ON HOW?