

Norbert Holtkamp  
Accelerator Systems Division  
Division Director

PHONE: (865) 241-6945  
FAX: (865) 241-6739  
Cell Phone: (865) 919 1070  
E-MAIL: [holtkamp@sns.gov](mailto:holtkamp@sns.gov)

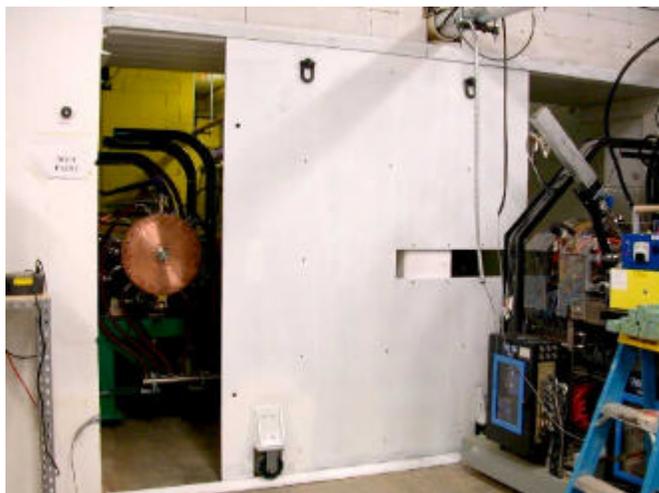
10/14/2003

DTL 1 installation and integration has lost approximately 1 week due to leaks that were detected after e-beam welding on the post couplers. Leaks were detected prior to shipping and shipping was stopped and repair initiated immediately. While the repair itself technically is a minor issue the schedule slip starts to threaten the ARR (Accelerator Readiness Review) date, June 24<sup>th</sup>-26<sup>th</sup>. A new and further compressed schedule was developed, which indicates that conditioning of the tank will begin the same the week the review will be held. We are in close contact with the ARR team led by Ed Lessart from BNL to coordinate the activity.

We believe that the weld deficiencies on the post couplers are due to improperly placed welds. The post couplers were shipped back to ESCO over the weekend and are now being inspected for proper weld location and adequate weld width. If the weld locations and weld width are deemed to be satisfactory the post couplers will be shipped backed to CMI for re-inspection and then returned to Los Alamos for final processing. Units requiring weld repair will be welded with new procedure (already qualified on tubing specimens and spacers); pressure/vacuum leak checked at ESCO, shipped to CMI for re-machining (will require removing material from inner surface of body flange and RF seal groove) and re-inspection; then shipped to Los Alamos for final processing. First batch of slug tuners (4 units) was shipped to Oak Ridge Friday, June 6th; second batch will ship at COB today (June 9th). Spool piece and other parts required for transition to MEBT are projected to be ready by Friday June 13th.

Regarding tank 4, work has resumed on the machining of drift tube bodies. Profiles will be machined within .020" of final form prior to cap weld. A cosmetic pass will also be applied over all water channel welds during cap welding episode. Two of the drift tubes are being accelerated ahead of main group to test and qualify the new procedures including the cosmetic weld.

DTL-1 has been moved back onto the beam line and anchored in place. DT alignment checks have been performed, the data assessed, and no adjustments are required. Electrical cables and cooling headers are being reconnected and component testing will begin later this week. The 1" thick shield door that is located between DTL-1 and the MEBT has been installed. Final adjustments are in progress. (see attached picture)



Picture shows DTL 1 behind movable shield in the Front End Building. The MEBT can be seen on the right hand side of the picture.

Component	Engineer	Tank 4					Tank 5				
		Identifier	Quantity	Shipping Date	Delivered	Change from last week	Identifier	Quantity	Shipping Date	Delivered	Change from last week
Drift Tubes	Gentzlinger	4A	7	24-Jul-03	0		5E	8	22-Aug-03	0	
		4B	6	31-Jul-03	0		5F	7	28-Aug-03	0	
		4C	6	7-Aug-03	0		5G	8	4-Sep-03	0	
		4D	8	14-Aug-03	0						
Dummies	Gentzlinger			With DT Groups				With DT Groups			
EMDs	O'Hara		4	20-Oct-03	0		4	20-Oct-03	0		
BPMs	O'Hara		2	20-Oct-03	0		2	20-Oct-03	0		
Top hats	Rowton	1.25"	27	5-Aug-03	0	1.25"	23	5-Aug-03	0		
Shrouds	Rowton		27	5-Aug-03	0		23	5-Aug-03	0		
Endwalls	Turon		2	Complete	2		2	Complete	2		
Post Coupler Kits	Rowton		27	Bead Pull + 15	0		23	Bead Pull + 15	0		
Slug Tuners	Rowton		12	Bead Pull + 7	0		12	Bead Pull + 7	0		
Access Ports			2		0		2		0		
RF Grills			4		0		4		0		
Wave Guide-Iris	Valdiviez		1	30-Jul-03	0		1	7-Aug-03	0		
Window	Cummings		1	14-Jul-03	0		1	14-Jul-03	0		
Stands	Turon		1	Complete	1		1	Complete	1	0	

Milestones	Date	Date
Ready for RF		
Ready for Beam	1-Dec-03	1-Dec-03
Tank Commissioning complete	1-Apr-04	1-Apr-04

Tank 6						Tank 2					
Identifier	Quantity	Shipping Date	Delivered	Change from last week		Identifier	Quantity	Shipping Date	Delivered	Change from last week	
6H	10	12-Sep-03	0			2J		16-Sep	0		
6I	11	22-Sep-03	0			2K		22-Sep	0		
						2L		26-Sep	0		
		With DT Groups				2M	41	2-Oct	0		
	4	1-Oct-03	0					None	0		
	2	1-Oct-03	0				4	1-Oct-03	0		
1.25"	21	5-Aug-03	0			.75"	41	17-Jun-03	0		
	21	5-Aug-03	0			1.00"	6	10-Jul-03			
	2	Complete	2				47	10-Jul-03	0		
	21	Bead Pull + 15	0				2	Complete	2		
	12	Bead Pull + 7	0				27	Bead Pull + 15	0		
	2		0				12	Bead Pull + 7	0		
	4		0				1		0		
	1	23-Aug-03	0				4		0		
	1	28-Aug-03	0				1	3-Sep-03	0		
	1	Complete	1	0			1	28-Aug-03	1		
							1	Complete			

Date	Date
1-Dec-03	1-Dec-03
1-Apr-04	1-Apr-04

