DRAFT

SEP 15 2006

Summary of Losses, Heat Loads, and Electric Power Requirements
14mr-14mr Beam Delivery System Configuration

Area	Section	Sum of Total Magnet Power (kW)	Sum of Total Cable Loss (kW)	Sum of Total PS Loss to Air (kW)	Sum of Total PS Loss to Water (kW)	Sum of Required Water Flow (gpm)	Sum of Total of All Losses (kW)	Sum of Expected Running kVA
Source Transport	e-	0	0	0	0	0	0	0
	e+	977	1,537	377	0	0	2,892	3,402
Source Transport Total		977	1,537	377	0	0	2,892	3,402
Damping Ring	e-	2,289	2,079	415	240	91	5,022	5,909
	e+1	2,289	2,079	415	240	91	5,022	5,909
	e+2	2,289	2,079	415	240	91	5,022	5,909
Damping Ring Total		6,866	6,236	1,244	721	273	15,067	17,726
RTML	e-	947	218	175	0	0	1,340	1,576
	e+	947	218	175	0	0	1,340	1,576
RTML Total		1,894	436	349	0	0	2,679	3,152
LINAC	e-	407	102	76	0	0	586	689
	e+	407	102	76	0	0	586	689
LINAC Total		814	205	153	0	0	1,172	1,379
BDS	e- Common	1,409	55	68	152	57	1,684	1,981
	e+ Common	1,409	55	68	152	57	1,684	1,981
	e- 14mr1	2,984	239	207	277	105	3,706	4,360
	e+ 14mr1	2,984	239	207	277	105	3,706	4,360
	e- 14mr2	3,043	241	216	277	105	3,777	4,444
	e+ 14mr2	3,043	241	216	277	105	3,777	4,444
BDS Total		14,872	1,070	982	1,410	534	18,333	21,569
Grand Total		25,424	9,484	3,105	2,131	807	40,144	47,228