2011-07-24 Friday Morning Notes

Friday, June 24, 2011
7:57 AM

Numbers

- Stacking
  - Pbars stacked: 567.42 E10
  - Time stacking: 23.73 Hr
  - Average stacking rate: 23.91 E10/Hr

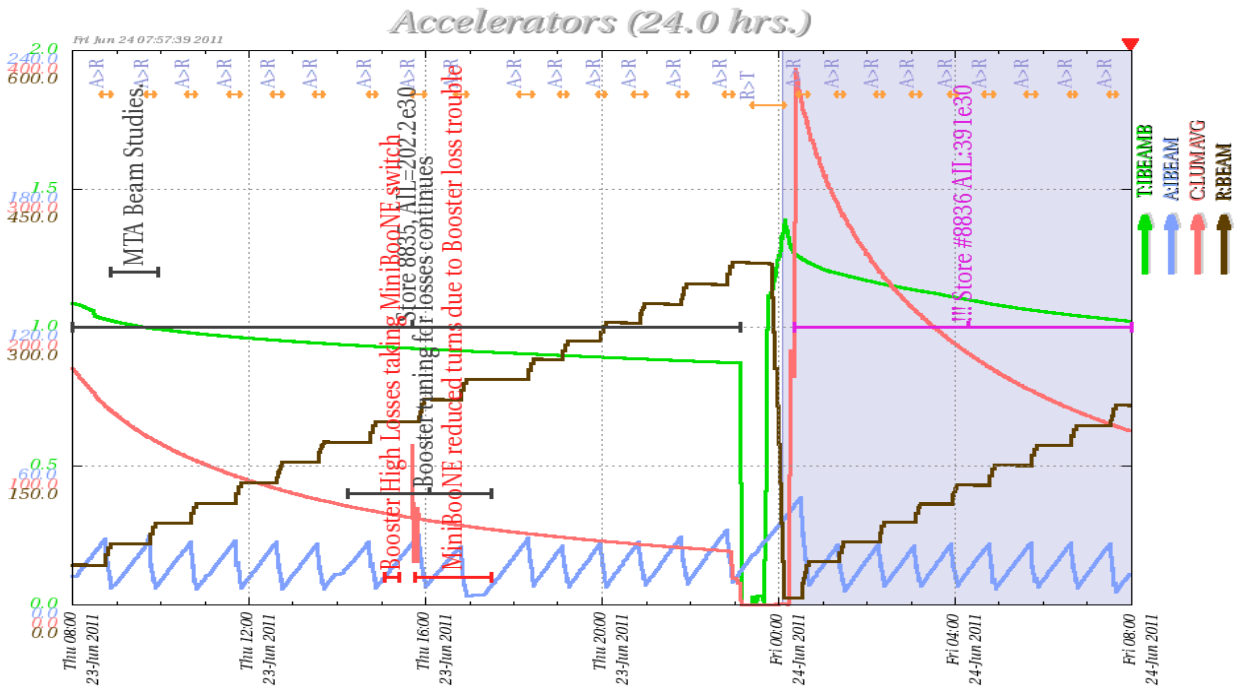
- Uptime
  - Number of pulses while in stacking mode: 35976
  - Number of pulses with beam: 34387
  - Fraction of up pulses was: 95.58%

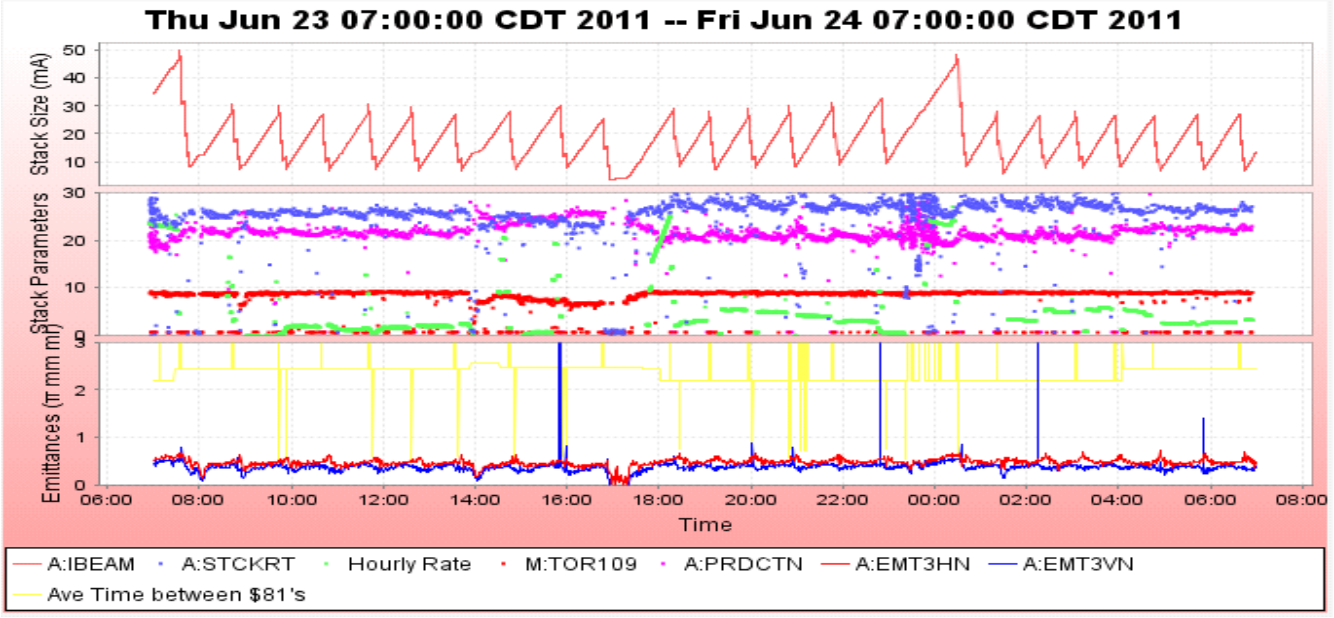
- The uptime's effect on the stacking numbers
  - Corrected time stacking: 22.68 Hr
  - Possible average stacking rate: 25.02 E10/Hr
  - Could have stacked: 593.64 E10/Hr

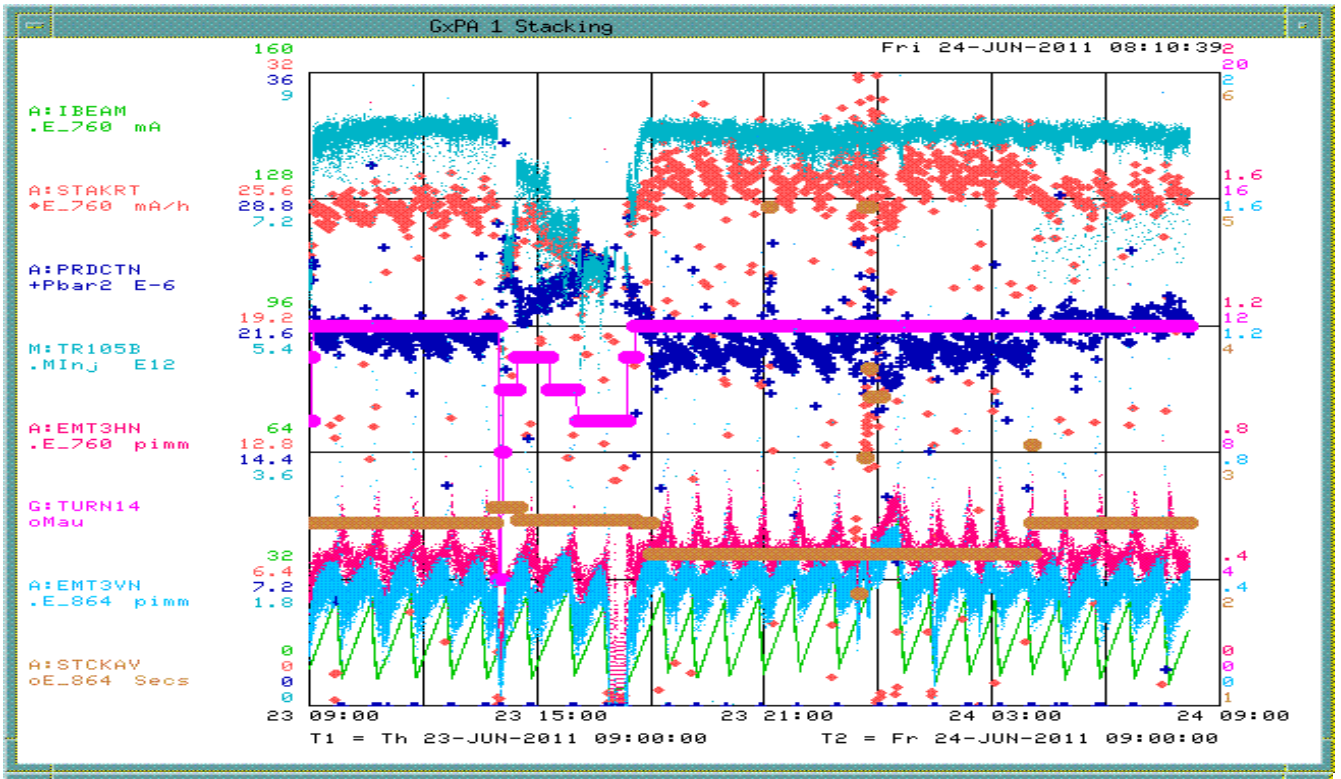
- Recycler Transfers
  - Pbars sent to the Recycler: 559.29 E10
  - Number of transfers : 72
  - Number of transfer sets: 24
  - Average Number of transfer per set: 3.00
  - Time taken to shoot including reverse proton tuneup: 00.25 Hr
  - Transfer efficiency: 96.32%

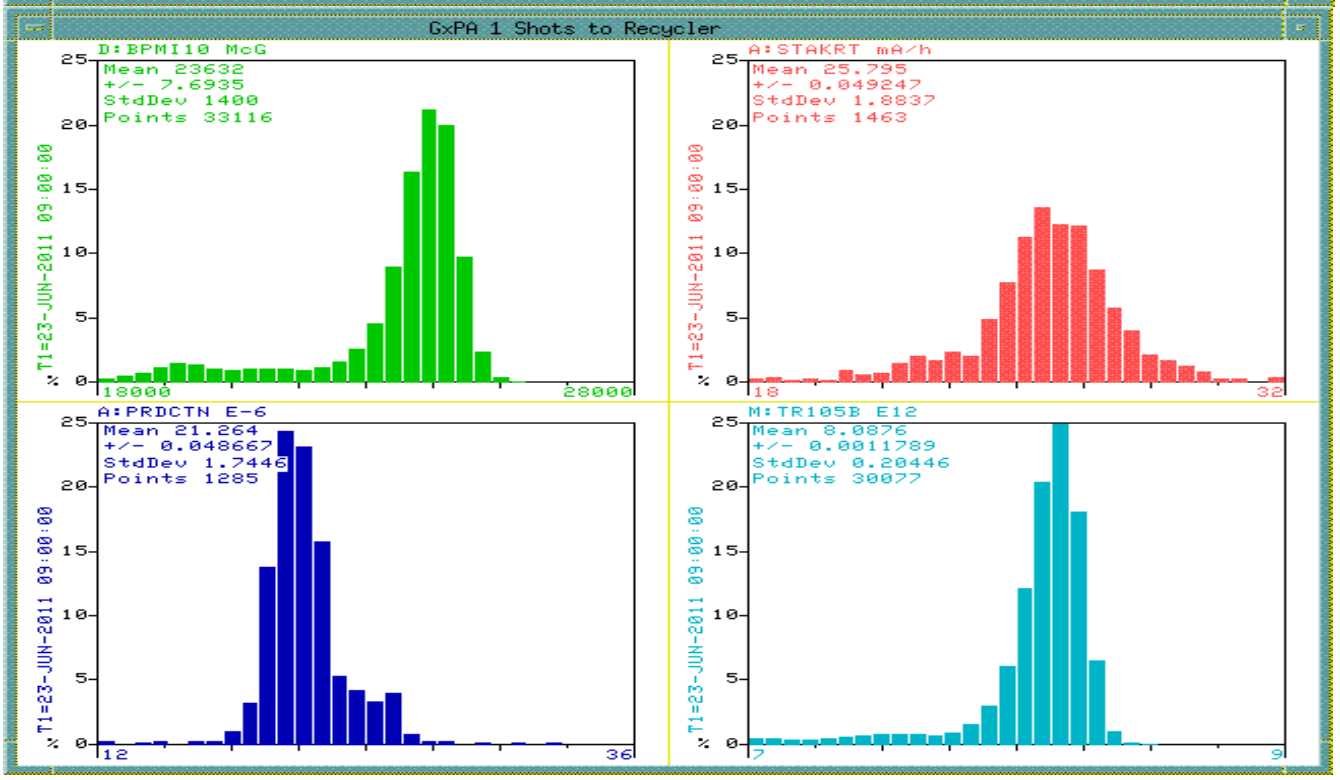
- Other Info
  - Average POT : 7.91 E12
  - Average production: 20.86 pbars/E6 protons

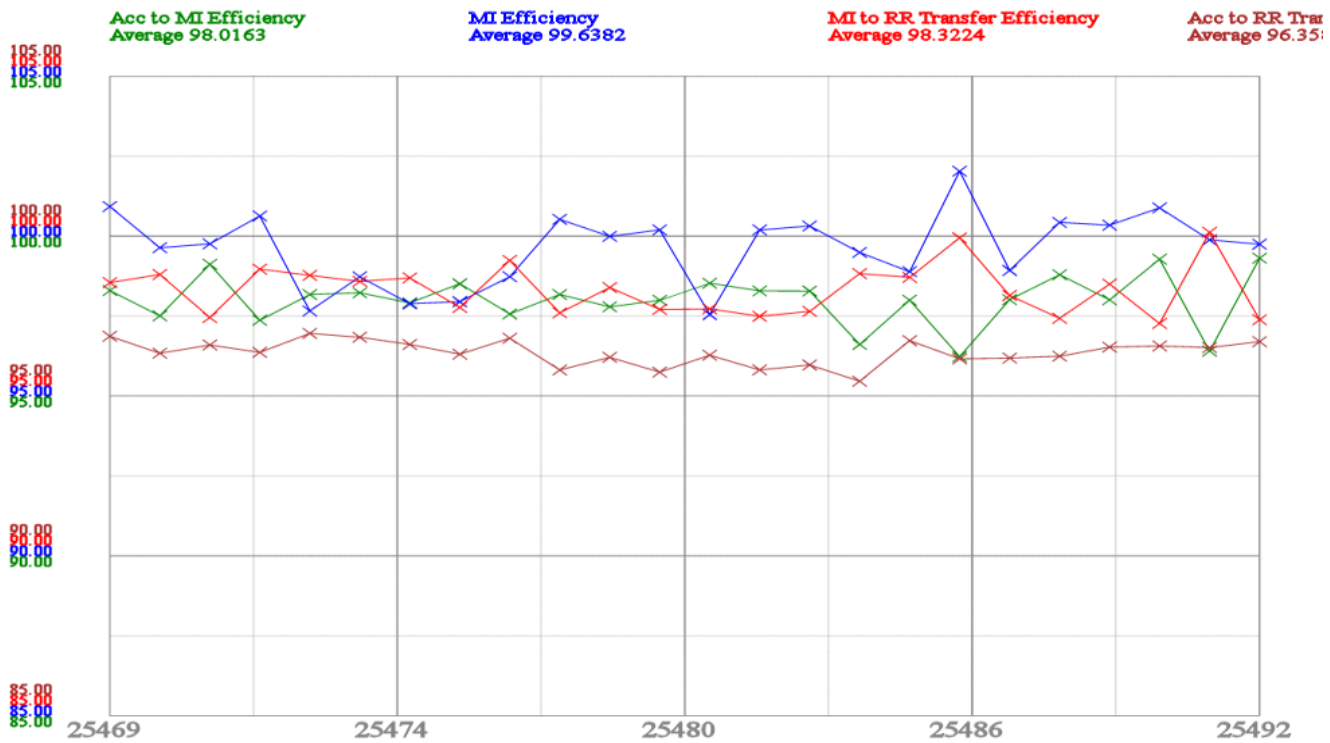
Plots


Accelerators (24.0 hrs.)
Fri Jun 24 07:57:39 2011
MTA Beam Studies
Booster High Losses taking MiniBooNE switch
Store 8835, AIL=202.2e30
Booster running for losses continues
MiniBooNE reduced turns due to Booster loss trouble
!!! Store #8836:AIL:391e30
T:IBEAMB
A:IBEAM
C:LUMAVG
R:BEAM
Thu 08:00 23-Jun 2011
Thu 12:00 23-Jun 2011
Thu 16:00 23-Jun 2011
Thu 20:00 23-Jun 2011
Fri 00:00 24-Jun 2011
Fri 04:00 24-Jun 2011
Fri 08:00 24-Jun 2011


Thu Jun 23 07:00:00 CDT 2011 -- Fri Jun 24 07:00:00 CDT 2011
Stack Size (mA)
Stack Parameters
Emittances (π mm mr)
Time
A:IBEAM
A:STCKRT
Hourly Rate
M:TOR109
A:PRDCTN
A:EMT3HN
A:EMT3VN
Ave Time between $81's


GxPA 1 Stacking
Fri 24-JUN-2011 08:10:39
A:IBEAM
.E_760 mA
A:STAKRT
+E_760 mA/h
A:PRDCTN
+Pbar2 E-6
M:TR105B
.MInj E12
A:EMT3HN
.E_760 pimm
G:TURN14
oMau
A:EMT3VN
.E_864 pimm
A:STCKAV
oE_864 Secs
23 09:00
23 15:00
23 21:00
24 03:00
24 09:00
T1 = Th 23-JUN-2011 09:00:00
T2 = Fr 24-JUN-2011 09:00:00


GxPA 1 Shots to Recycler
D:BPMI10 McG
Mean 23632
+/- 7.6935
StdDev 1400
Points 33116
A:STAKRT mA/h
Mean 25.795
+/- 0.049247
StdDev 1.8837
Points 1463
A:PRDCTN E-6
Mean 21.264
+/- 0.048667
StdDev 1.7446
Points 1285
M:TR105B E12
Mean 8.0876
+/- 0.0011789
StdDev 0.20446
Points 30077
T1=23-JUN-2011 09:00:00



Column 1 Number_0_Pbar Transfer Shot #	Column 4 Number_3_Transfer Time		Column 21 Number_20_A:I BEAMB sampled on $91 (A:BEAM7), E10	Column 22 Number_21_A:I BEAMB sampled on $94 (A:BEAM9), E10	Unstacked (mA)	Column 23 Number_22_R:BEAMS (R:BEAME0[0]) pre xfer E10	Column 24 Number_23_R:BEAM (R:BEAME0[1]) post xfer, E10	Stashed	Acc to RR Eff	Acc to MI Eff	Acc to MI2 Eff	Acc to MI * Acc to MI2 Efficiency	Transfers	Sets	Column 5 Number_4_Acc Horizontal Emittance	Column 6 Number_5_Acc Vertical Emittance	Column 8 Number_7_Acc Longitudinal Emittance
	Totals =>				571.35			550.38	96.33%	98.06%	97.68%	95.79%	73	24	4.6498	3.4898	2.0175
	Daily Average =>				571.35			550.38					73	24			
25492	Friday, June 24, 2011	7:31	26.55	5.66	23.30	193.79	216.15	22.54	96.76%	98.97%	98.65%	97.63%	3	1	4.331	2.794	2.017
25491	Friday, June 24, 2011	6:37	27.08	7.02	22.70	172.44	194.19	21.91	96.51%	96.63%	97.14%	93.86%	3	1	4.599	3.609	2.054
25490	Friday, June 24, 2011	5:43	27.36	7.07	22.94	150.78	172.80	22.17	96.62%	99.19%	100.19%	99.38%	3	1	4.836	3.495	2.032
25489	Friday, June 24, 2011	4:46	26.57	6.71	22.46	129.50	151.02	21.66	96.46%	98.18%	98.43%	96.64%	3	1	4.559	3.368	2.017
25488	Friday, June 24, 2011	3:55	26.83	8.14	21.41	109.18	129.70	20.64	96.43%	98.53%	99.26%	97.80%	3	1	4.67	3.441	2.023
25487	Friday, June 24, 2011	3:05	26.10	7.66	21.21	89.04	109.33	20.40	96.16%	98.26%	97.12%	95.42%	3	1	5.063	3.445	2.042
25486	Friday, June 24, 2011	2:16	26.83	7.97	21.63	68.51	89.18	20.82	96.27%	96.68%	98.14%	94.88%	3	1	4.901	3.698	2.031
25485	Friday, June 24, 2011	1:21	26.47	5.75	22.42	47.03	68.64	21.67	96.64%	97.92%	97.12%	95.10%	3	1	4.579	3.185	1.996
25484	Friday, June 24, 2011	0:31	46.94	8.56	42.29	7.20	47.23	40.31	95.33%	96.91%	96.44%	93.46%	4	1	5.558	4.106	2.004
25483	Thursday, June 23, 2011	22:50	32.73	9.47	25.96	346.51	371.14	24.91	95.96%	98.36%	98.24%	96.62%	3	1	5.051	3.893	2.028
25482	Thursday, June 23, 2011	21:48	29.87	8.81	23.75	325.33	347.82	22.80	96.00%	98.19%	98.82%	97.03%	3	1	4.939	3.842	2.04
25481	Thursday, June 23, 2011	20:51	27.93	8.14	22.51	304.90	326.30	21.69	96.34%	98.57%	96.74%	95.36%	3	1	4.966	3.622	2.03
25480	Thursday, June 23, 2011	19:58	26.87	7.63	21.88	285.15	305.88	20.97	95.86%	98.13%	97.49%	95.66%	3	1	4.574	3.503	2.018
25479	Thursday, June 23, 2011	19:06	25.91	7.11	21.36	265.51	285.86	20.55	96.23%	97.79%	98.43%	96.26%	3	1	4.37	3.327	2.014
25478	Thursday, June 23, 2011	18:19	29.08	8.24	23.54	243.62	266.04	22.58	95.93%	98.07%	98.68%	96.78%	3	1	4.816	3.849	2.013
25477	Thursday, June 23, 2011	16:48	25.72	3.88	23.38	221.93	244.39	22.62	96.75%	97.96%	96.54%	94.58%	3	1	3.632	2.544	1.935
25476	Thursday, June 23, 2011	15:51	30.47	7.61	25.34	198.22	222.40	24.40	96.29%	98.79%	96.78%	95.61%	3	1	4.536	3.576	1.978
25475	Thursday, June 23, 2011	14:44	28.12	7.12	23.54	176.07	198.67	22.72	96.54%	98.34%	96.54%	94.93%	3	1	4.286	3.643	2.016
25474	Thursday, June 23, 2011	13:34	26.93	6.83	22.72	154.57	176.41	22.02	96.90%	98.33%	97.18%	95.56%	3	1	4.63	3.27	2.02
25473	Thursday, June 23, 2011	12:38	27.62	6.83	23.32	132.38	154.87	22.61	96.96%	98.37%	96.12%	94.55%	3	1	4.593	3.301	2.038
25472	Thursday, June 23, 2011	11:42	28.34	7.28	23.67	109.95	132.61	22.79	96.28%	97.47%	98.02%	95.54%	3	1	4.53	3.773	2.014
25471	Thursday, June 23, 2011	10:41	27.26	6.95	22.91	88.10	110.12	22.12	96.55%	99.00%	98.51%	97.52%	3	1	4.542	3.307	2.026
25470	Thursday, June 23, 2011	9:45	27.81	7.17	23.23	65.95	88.22	22.36	96.28%	97.43%	96.88%	94.38%	3	1	4.51	3.493	2.028
25469	Thursday, June 23, 2011	8:45	28.73	7.39	23.89	43.07	66.08	23.11	96.70%	98.23%	98.10%	96.37%	3	1	4.523	3.672	2.006

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	Totals =>				529.07			510.06	96.41%	98.15%	97.78%	95.98%	69	23	4.6103	3.463	2.0181
	Daily Average =>				529.07			510.06					69	23			
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