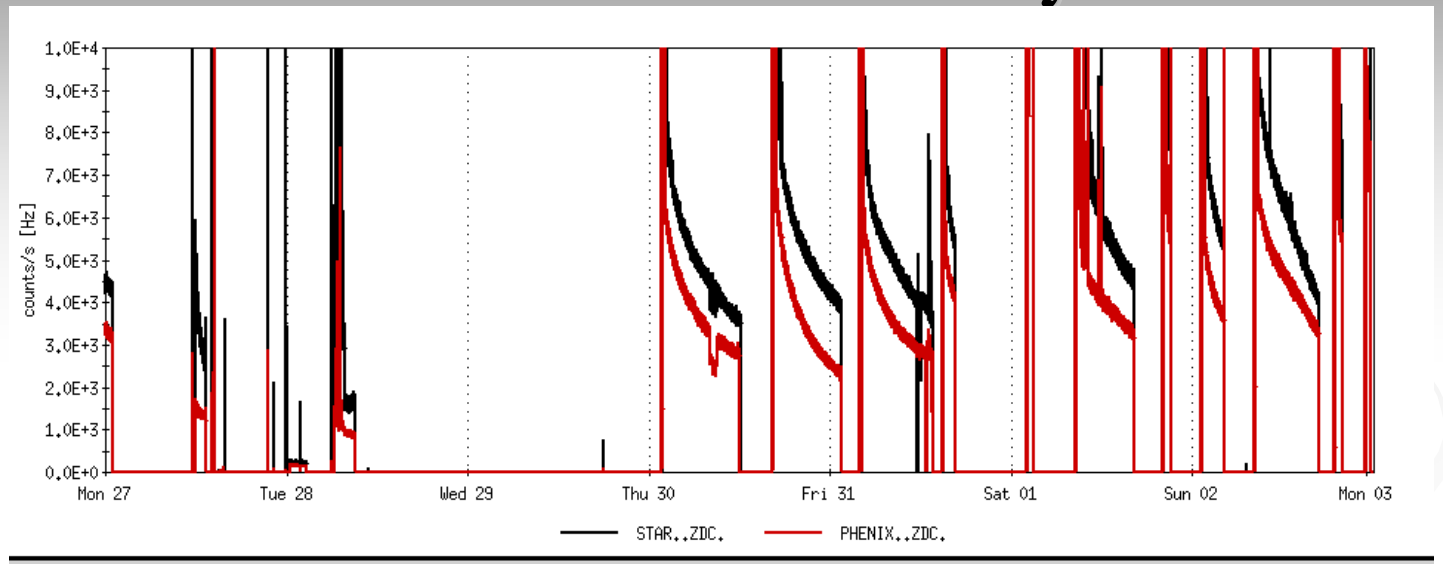
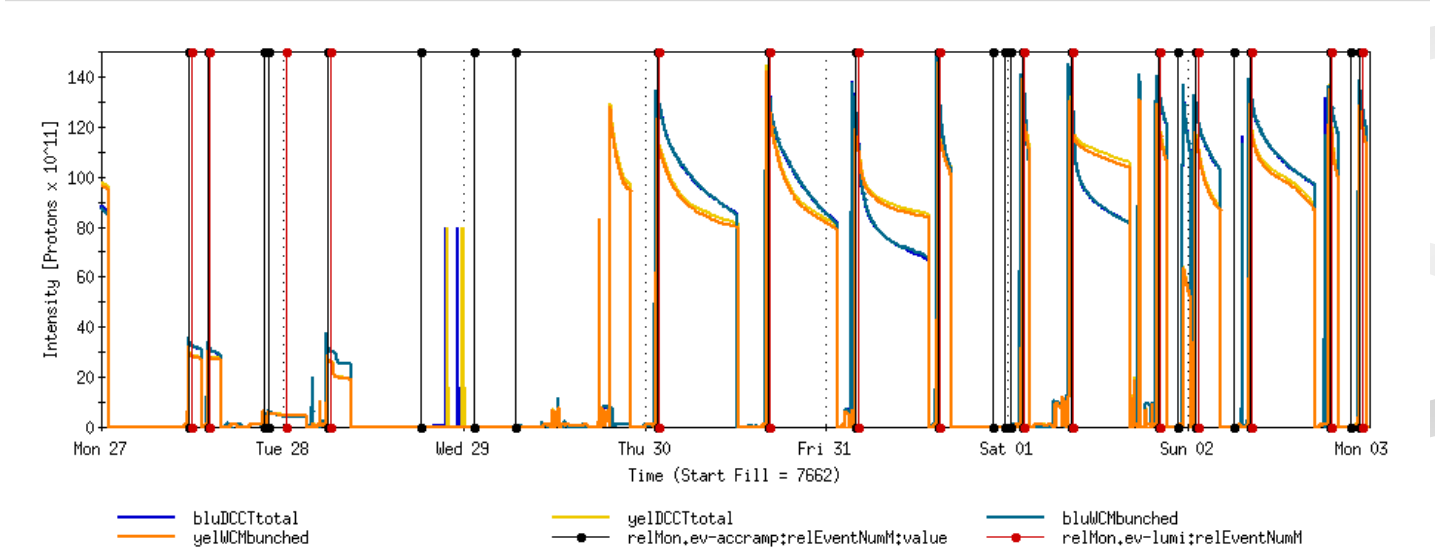
RHIC Status

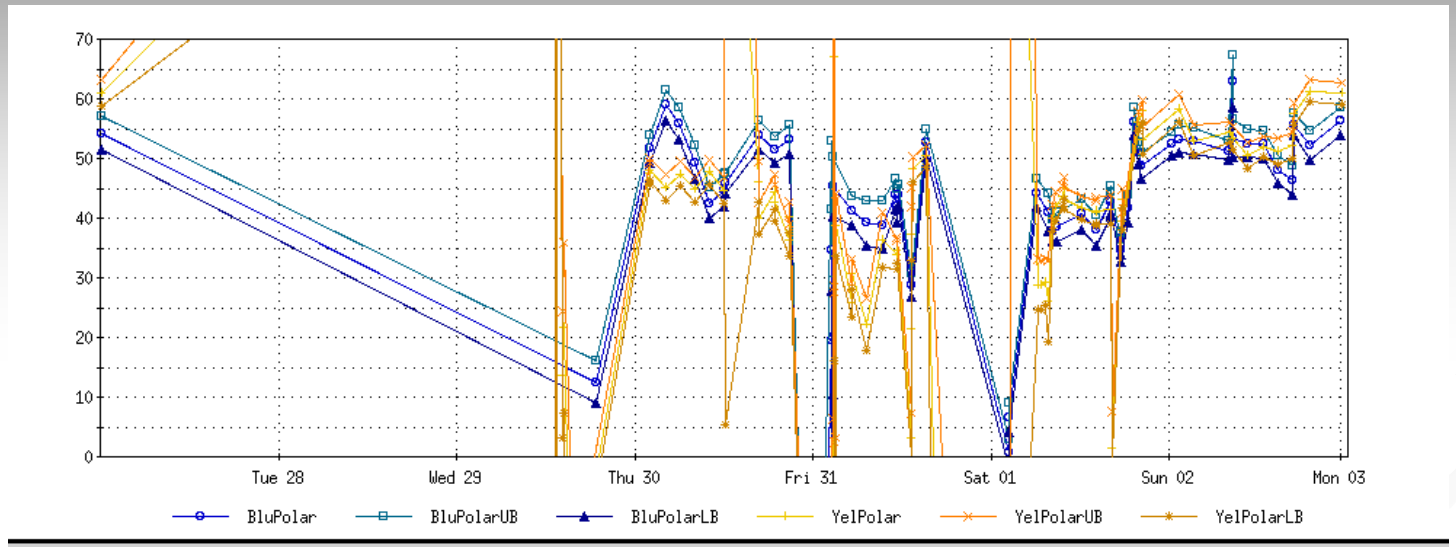
V.Ptitsyn

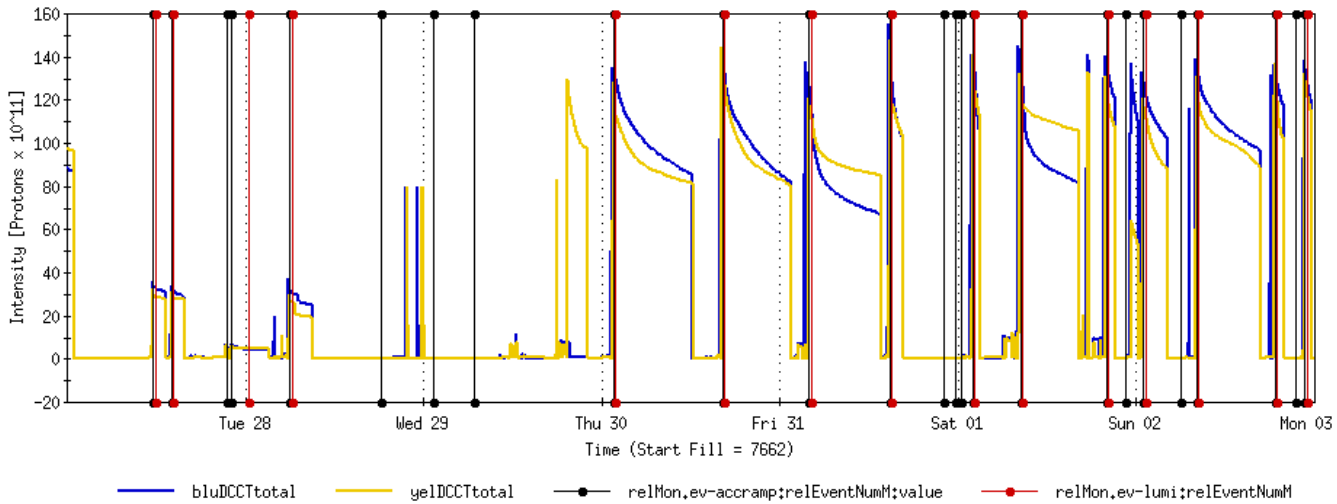
Week 4: Luminosity

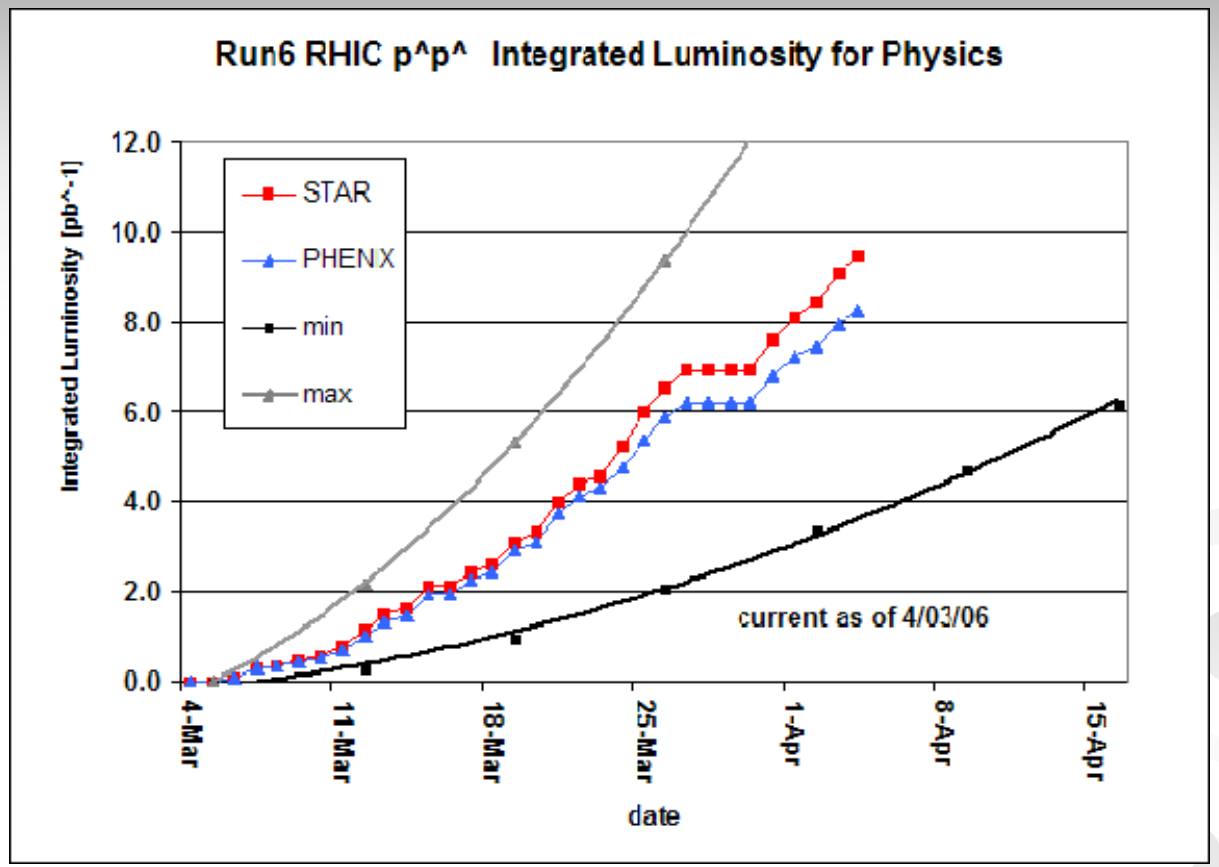


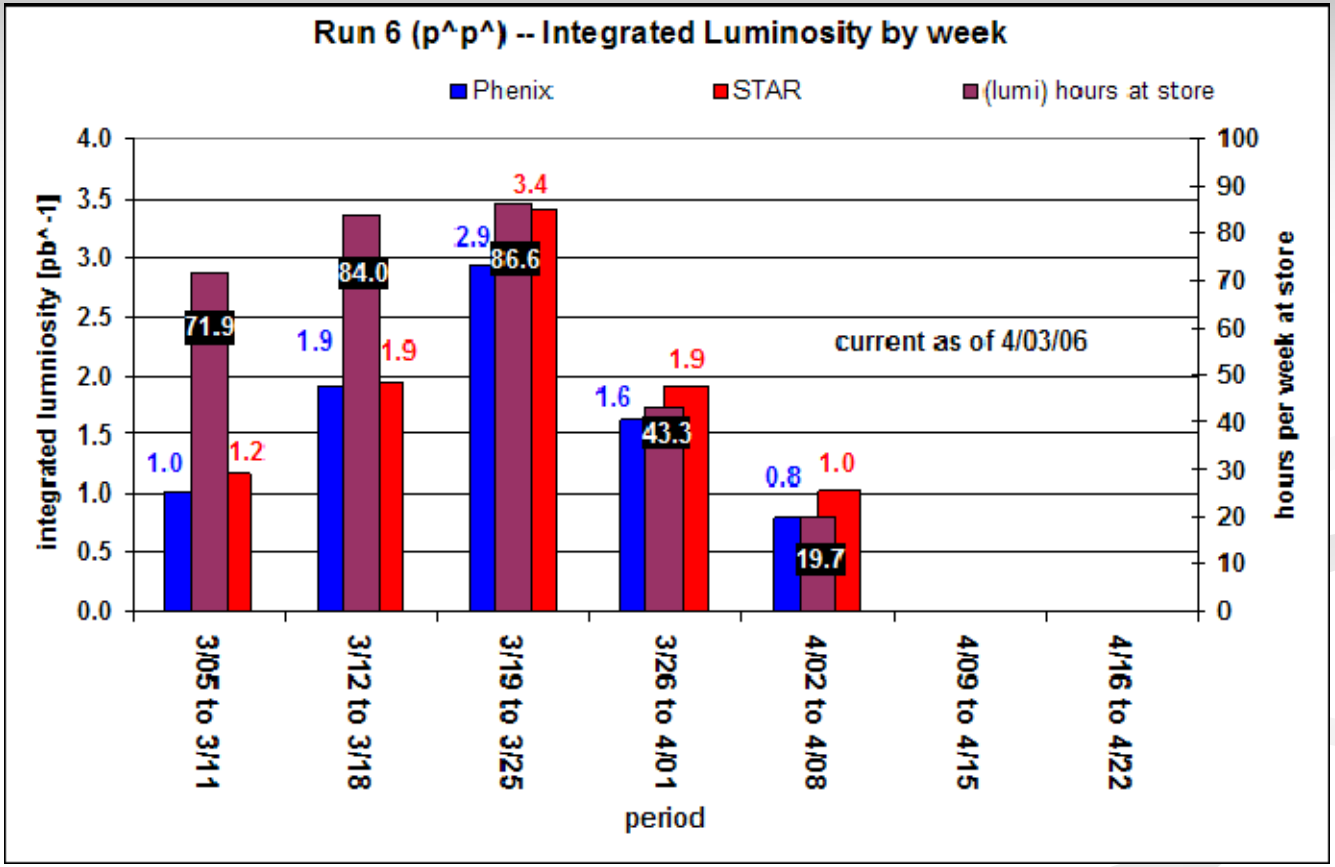


Week 4: Polarization






Run6 RHIC p^p^ Integrated Luminosity for Physics
Integrated Luminosity [pb^-1]
12.0
10.0
8.0
6.0
4.0
2.0
0.0
STAR
PHENX
min
max
current as of 4/03/06
4-Mar
11-Mar
18-Mar
25-Mar
1-Apr
8-Apr
15-Apr
date


Run 6 (p^p^) -- Integrated Luminosity by week
Phenix
STAR
(lumi) hours at store
integrated lumniosity [pb^-1]
hours per week at store
4.0
3.5
3.0
2.5
2.0
1.5
1.0
0.5
0.0
100
90
80
70
60
50
40
30
20
10
0
1.0
71.9
1.2
1.9
84.0
1.9
2.9
86.6
3.4
1.6
43.3
1.9
0.8
19.7
1.0
current as of 4/03/06
3/05 to 3/11
3/12 to 3/18
3/19 to 3/25
3/26 to 4/01
4/02 to 4/08
4/09 to 4/15
4/16 to 4/22
period

Machine Developments

- Main developments during the week:
  - Getting luminosities and polarization to the level achieved a week before.
  - Second Vernier scans: STAR and PHENIX beam collision sizes are the same.
  - Yellow total intensity limit at the injection: RF loops need adjustments.

- Further tasks:
  - Increase of total beam current up to the limit.
  - 10 Hz feedback applications at the store
  - Back to Vertex reduction efforts: longitudinal emittance from the injectors, quad pumping, storage cavities.