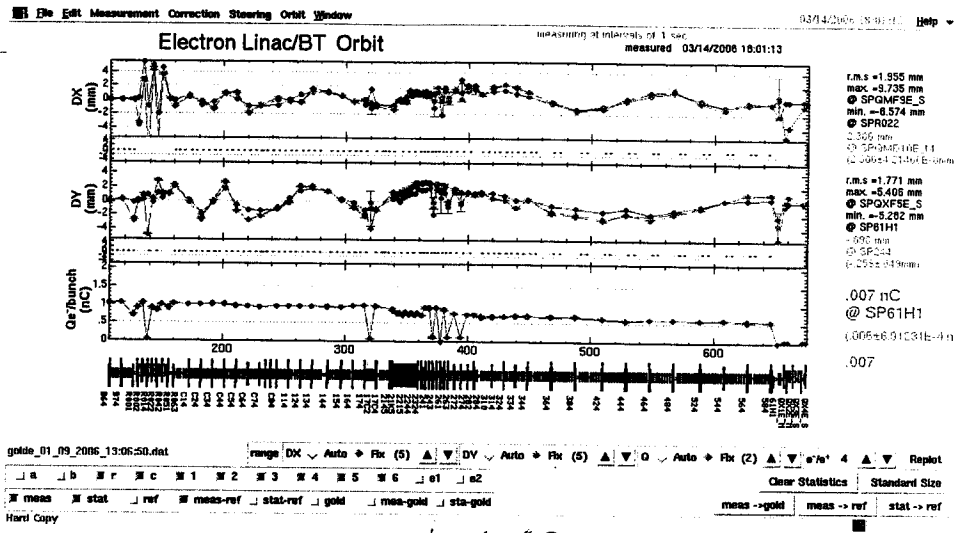
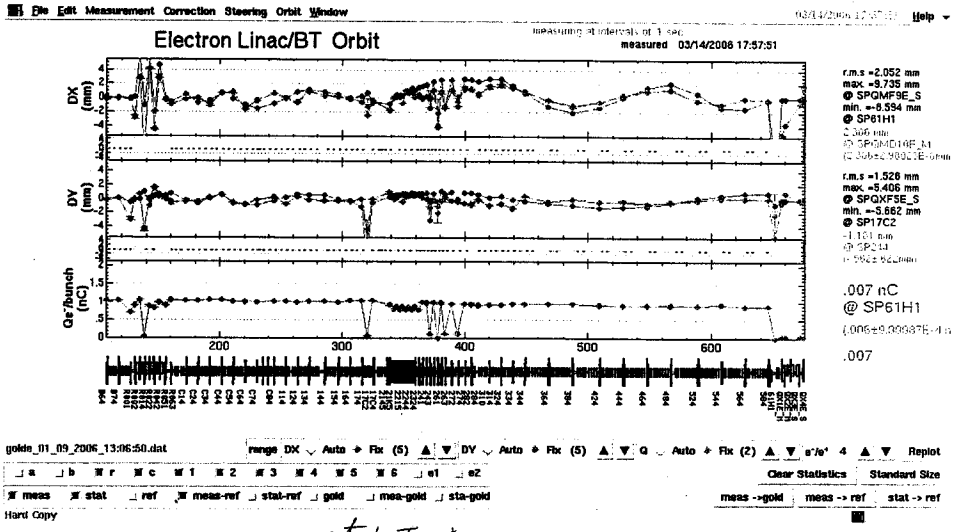
81

Energy 1.545 → 1.5548



16:00 に set したもの

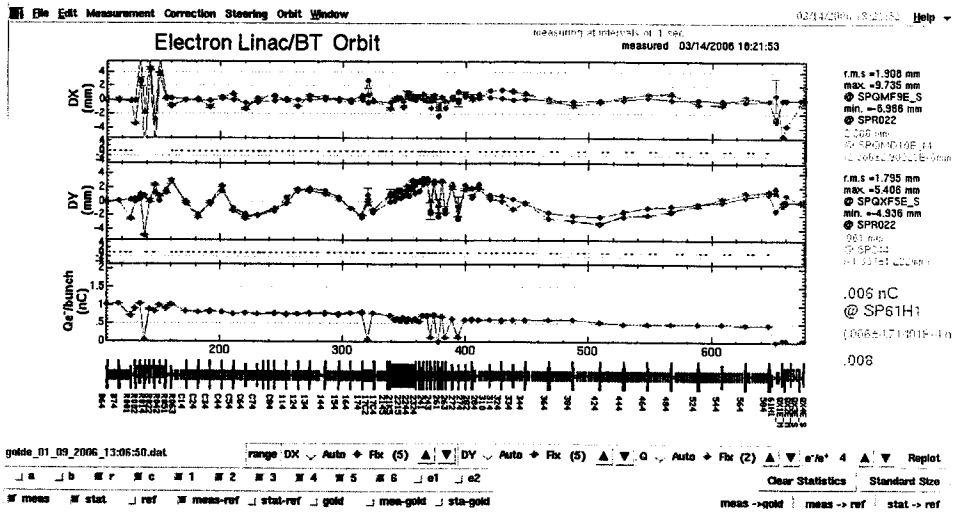


17:36 に set したもの

やはり、下流に軌道が出る。

18:15 アーク内の Sx を ϕ に set.

16:00 に set したもの.



Ref に、
E = 1.545 を
入れておく.

E = E₀ 1.5449
(= 1.~~5546~~)
→ 18:23 に scan

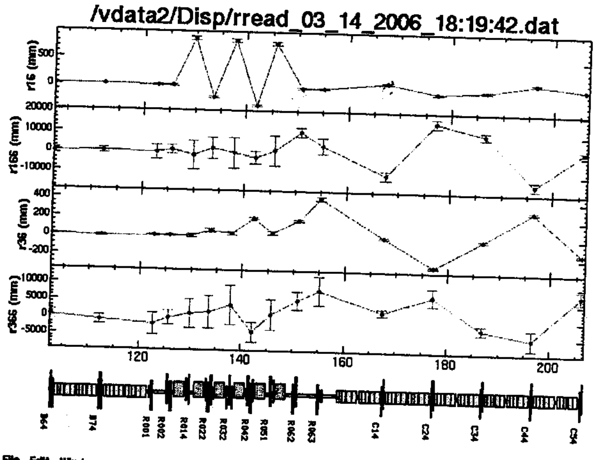
E = 1.5548
→ 18:24

t Window

36(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

Help

Energy = 1.54403013006 [GeV]



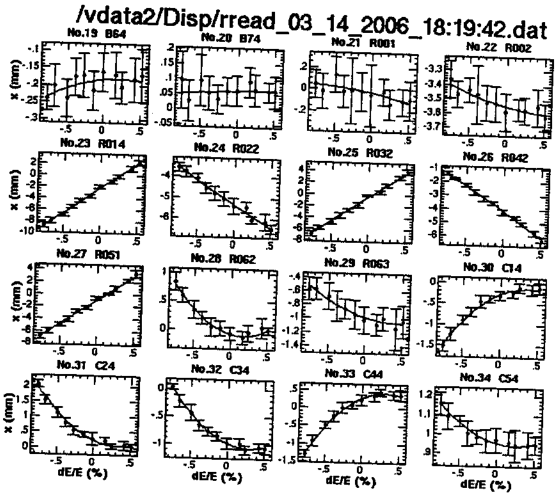
Measurement
Low energy: 1.5340
High energy: 1.5556
Delta energy: .002
Iterations/step: 10
Comments: <none>
◆ No Streak Camera   Use Streak Camera
Wait for Streak Camera
Debugging Mode ◆ Execution Mode
Go
Abort

Files
Load Raw Data File
Dispersion file: rmeas_03_14_2006_18:19:42.dat
Write Dispersion File

Analysis
<none>
Drop streak points (1): 0
Drop streak points (2): 0
Energy Scale Factor (current): 1
Energy Scale Factor (replot): .268070434675282
Energy Offsets (current): 0
Energy Offsets (replot): 0

File Edit Window

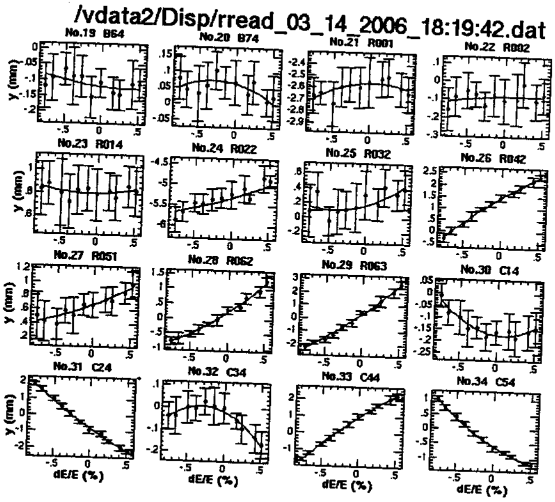
R16(6), R36(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit



File name
/vdata2/Disp/rread_03_14_2006_18:19:42.dat

File Edit Window

R16(6), R36(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit



File name
/vdata2/Disp/rread_03_14_2006_18:19:42.dat

16:00に
setしたもの
(P.79)

SXTを
Ø1=1.2
程度.

r36は $\frac{4}{3}$倍
に。

83

六極を Off にすると、3.4.5 sector で H. dispersion は、φに近い。

〃　　V. dispersion は大きくなる。

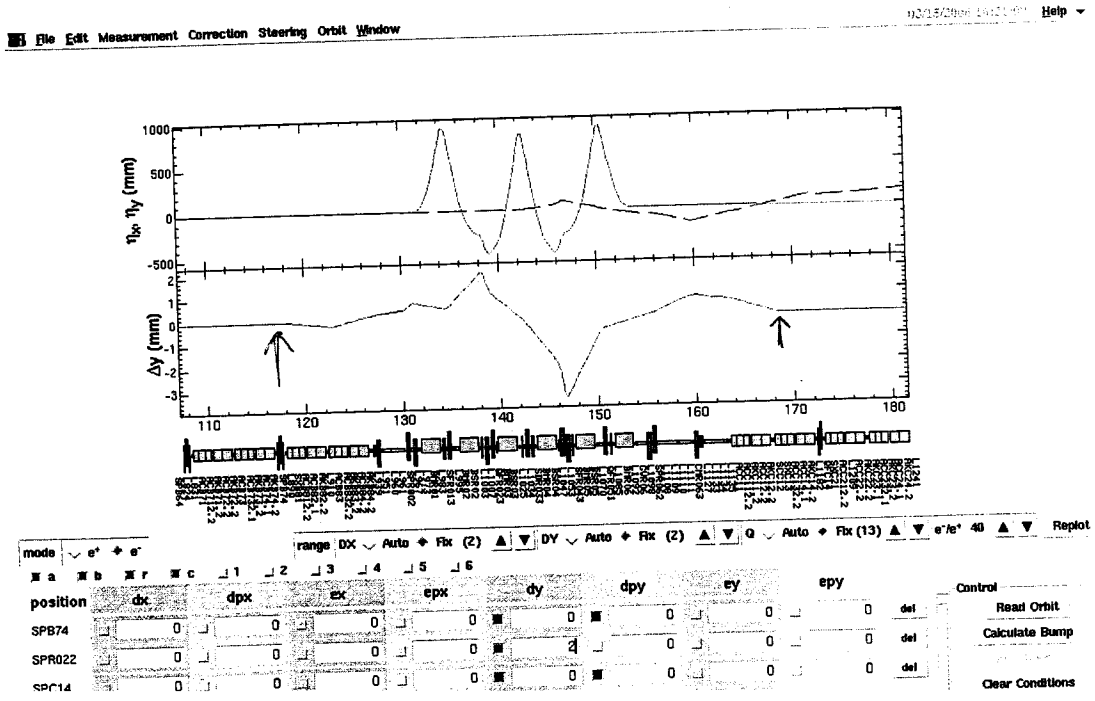
06/3/15　本日の予定　　飯田、小磯

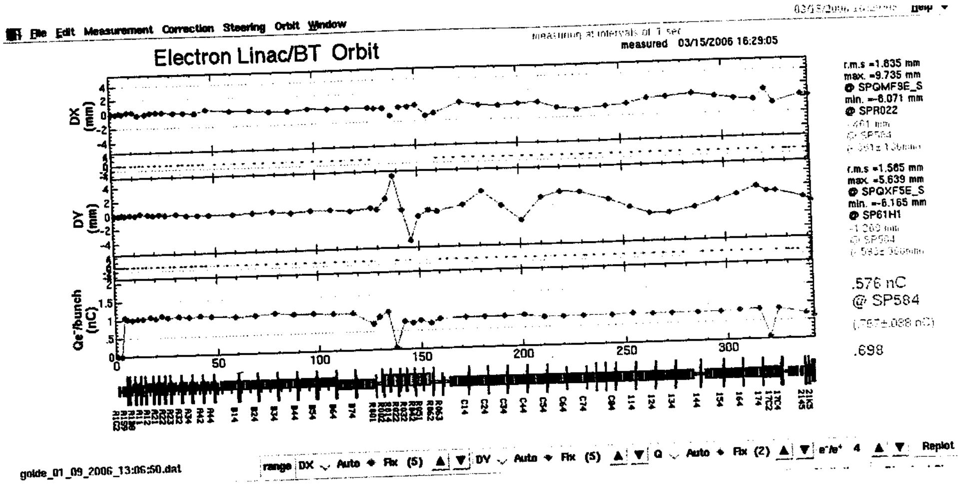
1. JArc { Quad BPM ← ●三菱サに依頼
   六極 BPM
2. 下流の BPM も全て読み込んで Dispersion 測定をする。
3. V. Bump を閉じるように QDR022 の Fudge Factor を求める。

JArc 内の BPM 対応を確認（佐藤氏）
作業終了後、VME が立ち上がらない。

16:23　→復活

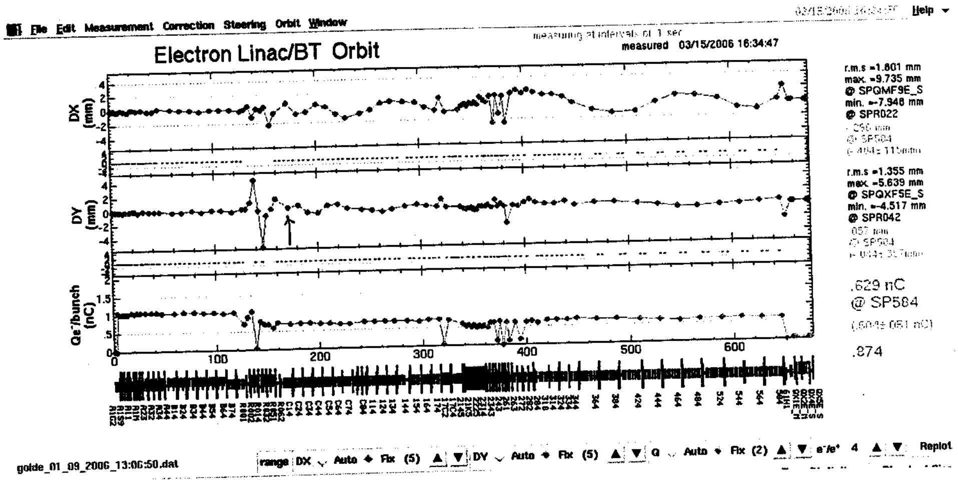
16:25　3. V. Bump を閉じるように QDRØ22 の FF を求める。
QDRØ22 で 2mm の V.H. → 4mm 立つ
FF. 37.656 → 37.773 [A]



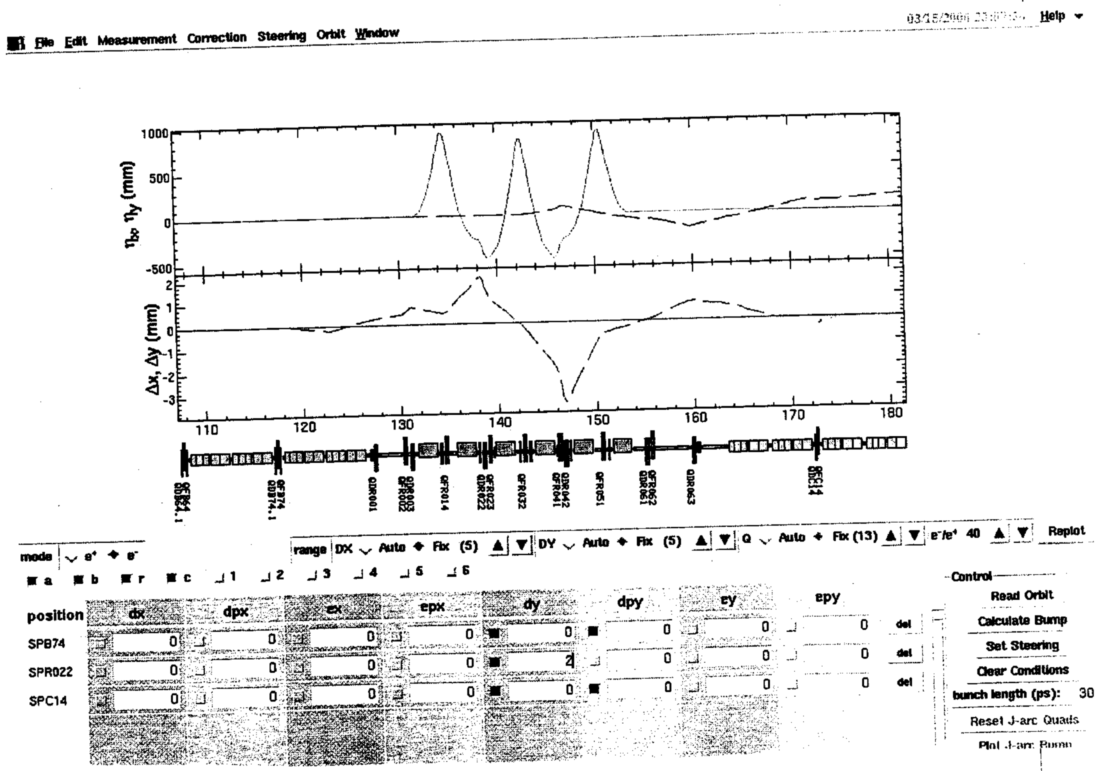


V. Bumpを立てると、
Arcのうしろで
V.軌道が
モレる。

QDR022
37.656[A]
↓
37.773[A]



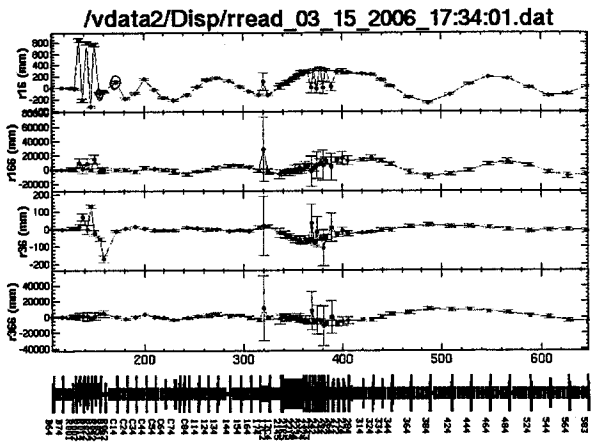
New panelに!



85

Window

(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit



Energy = 1.53902115898 [GeV]

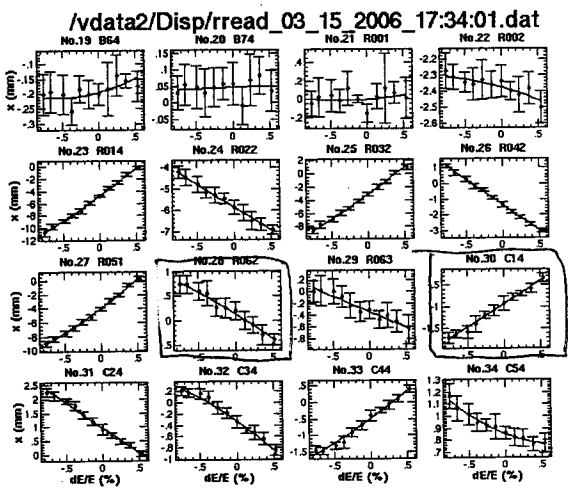
Measurement
Low energy: 1.5295
High energy: 1.5511
Delta energy: .002
Iterations/step: 10
Comments: <none>
◆ No Streak Camera Use Streak Camera
Wait for Streak Camera
Debugging Mode ◆ Execution Mode
Go
Abort

Files
Load Raw Data File
Dispersion file: /vdata2/Disp/rmeas_03_15_2006_
Write Dispersion File

Analysis
<none>
Drop streak points (1): 0
Drop streak points (2): 0
Energy Scale Factor (current): 1
Energy Scale Factor (replot): .908663826113541
Energy Offsets (current): 0
Energy Offsets (replot): 0

File Edit Window

R16(6), R36(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

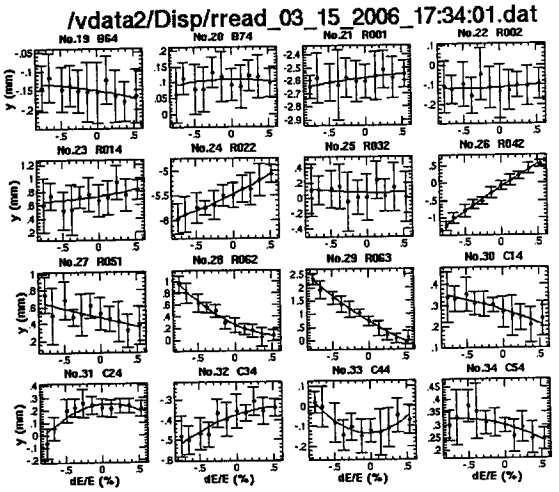


File name
/vdata2/Disp/rread_03_15_2006_17:34:01.dat

	η_x
R062	−0.0938
C14	0.10675

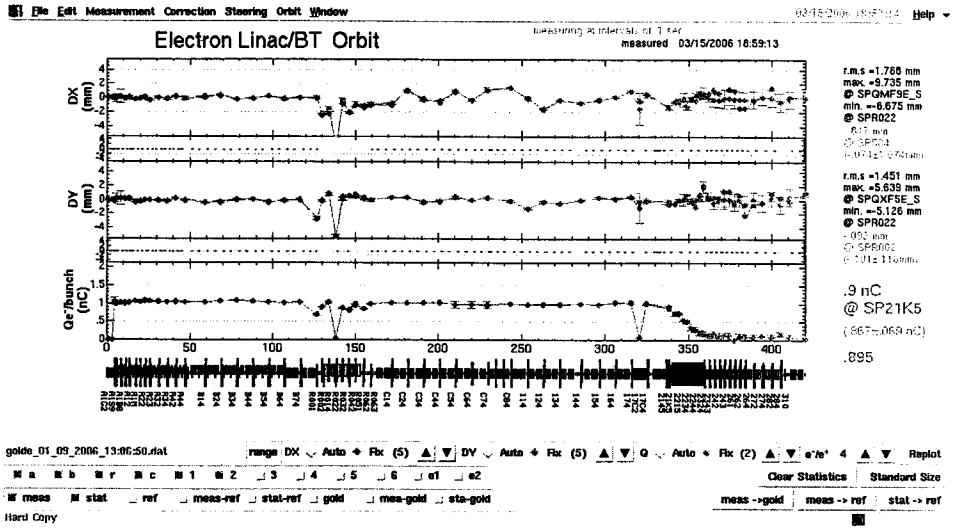
File Edit Window

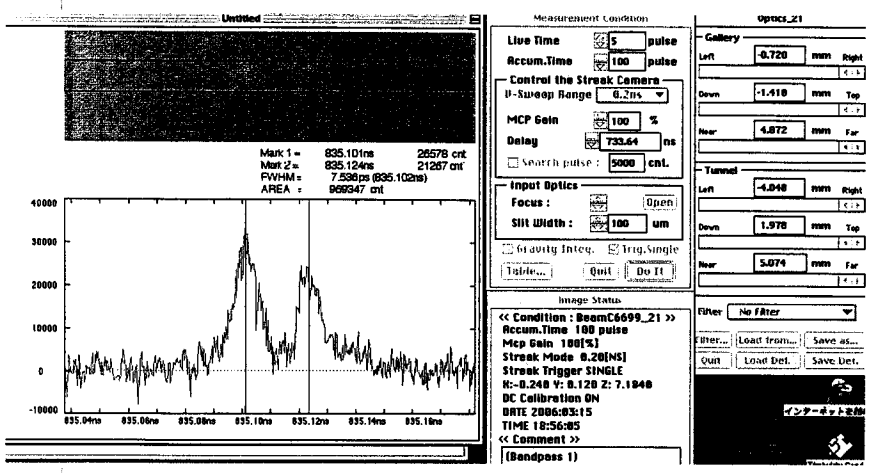
R16(6), R36(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

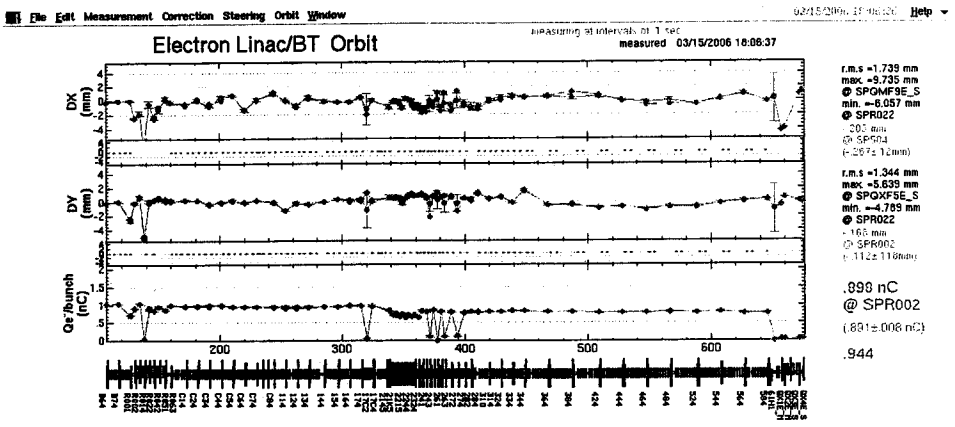


File name
/vdata2/Disp/rread_03_15_2006_17:34:01.dat

Energy knob
① 1.546 テスト.



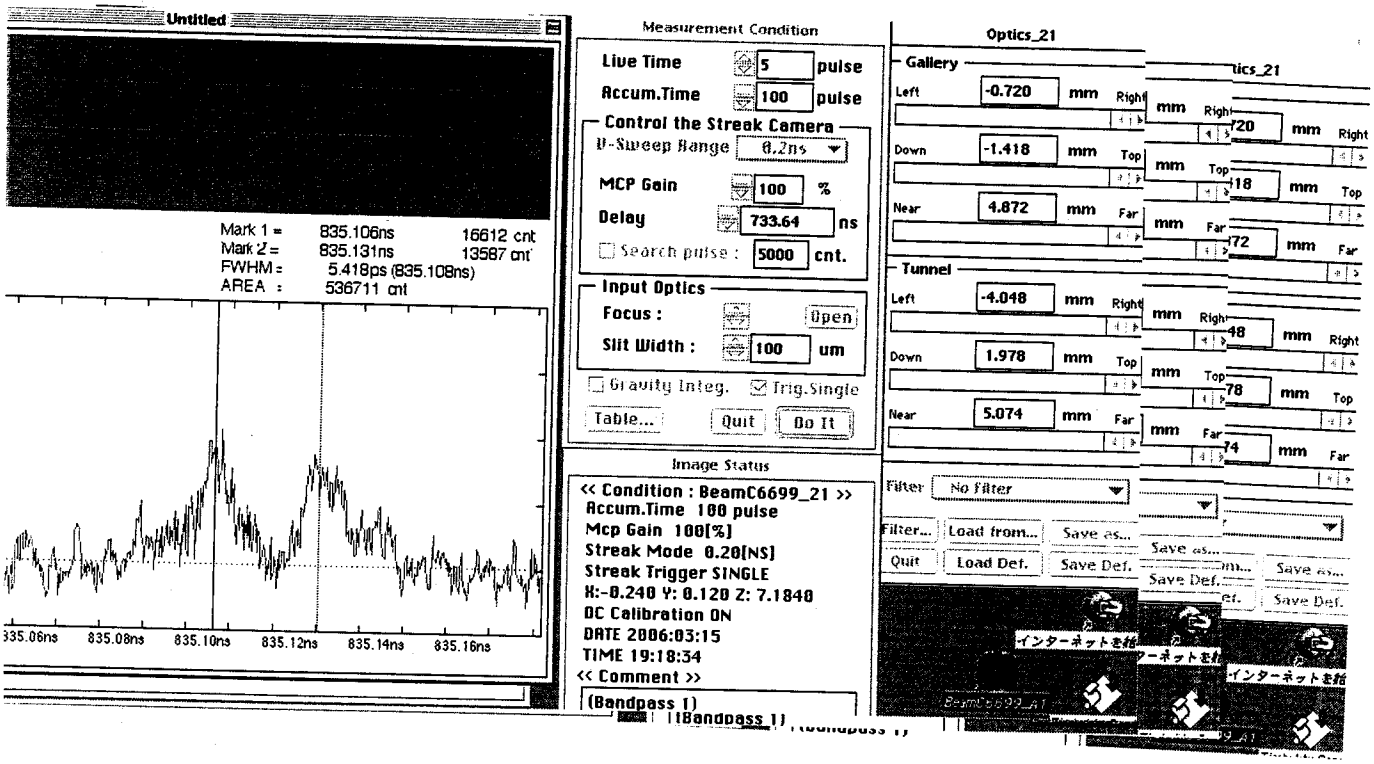


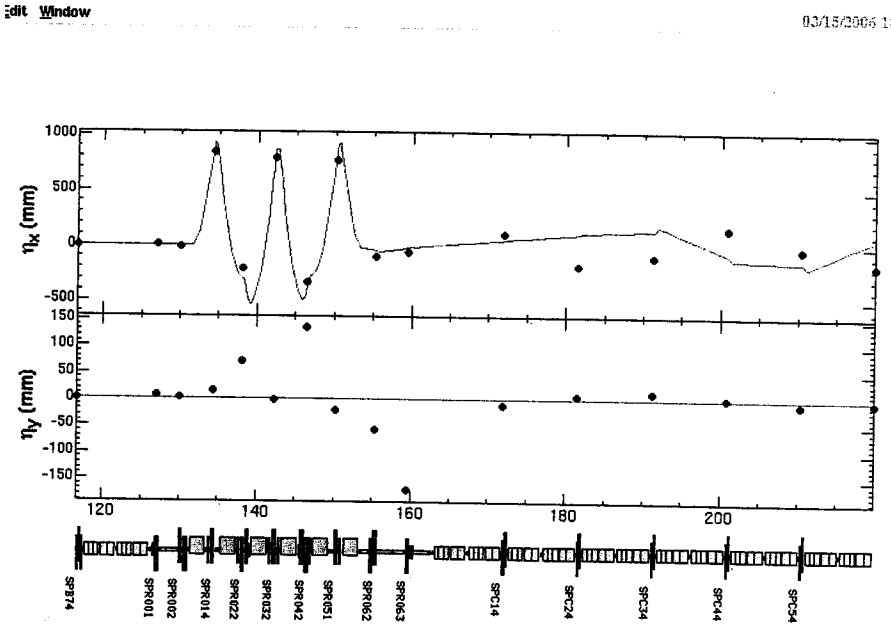


Q変えた後
2セクターcharge減

87

기차 ① 1.5335
② 1.5435
③ 1.5542

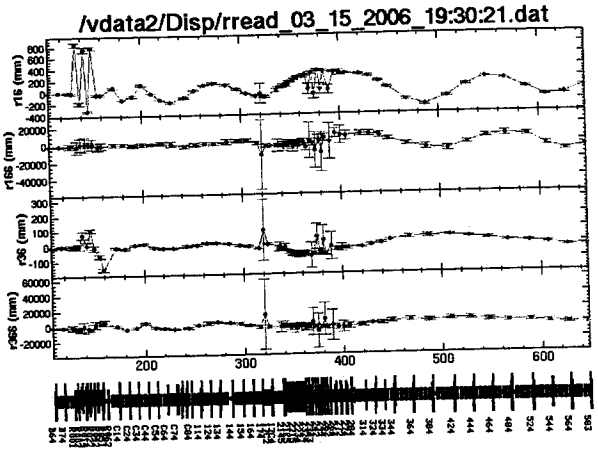




ff11 = 0.5
(Damping Factor)

Window

(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit



Energy = 1.54378120359 [GeV]

Measurement

Low energy:	1.5330
High energy:	1.5546
Delta energy:	.002
Iterations/step:	10
Comments:	<none>

No Streak Camera Use Streak Camera

Wait for Streak Camera

Debugging Mode Execution Mode

Go

Abort

Files

Load Raw Data File

Dispersion file: /vdata2/Disp/rmeas_03_15_2006_

Write Dispersion File

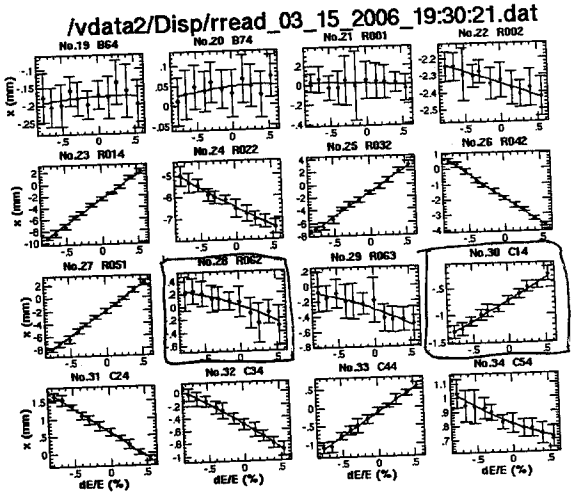
Analysis

<none>

Drop streak points (1):	0
Drop streak points (2):	0
Energy Scale Factor (current):	1
Energy Scale Factor (replot):	.8731552869215 51
Energy Offsets (current):	0
Energy Offsets (replot):	0

Help

Ms) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

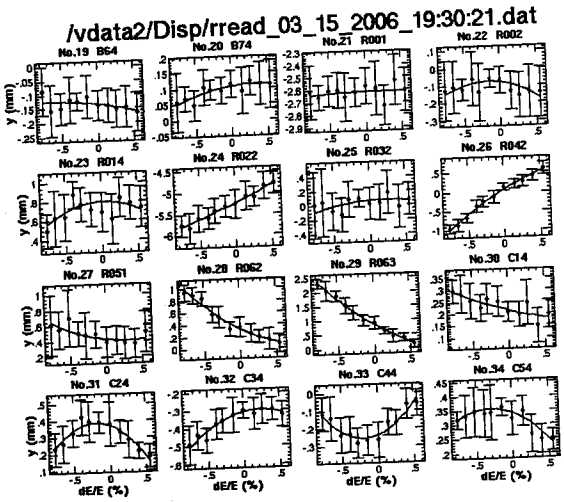


File name

/vdata2/Disp/rread_03_15_2006_19:30:21.dat

Help

Ms) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit



File name

/vdata2/Disp/rread_03_15_2006_19:30:21.dat

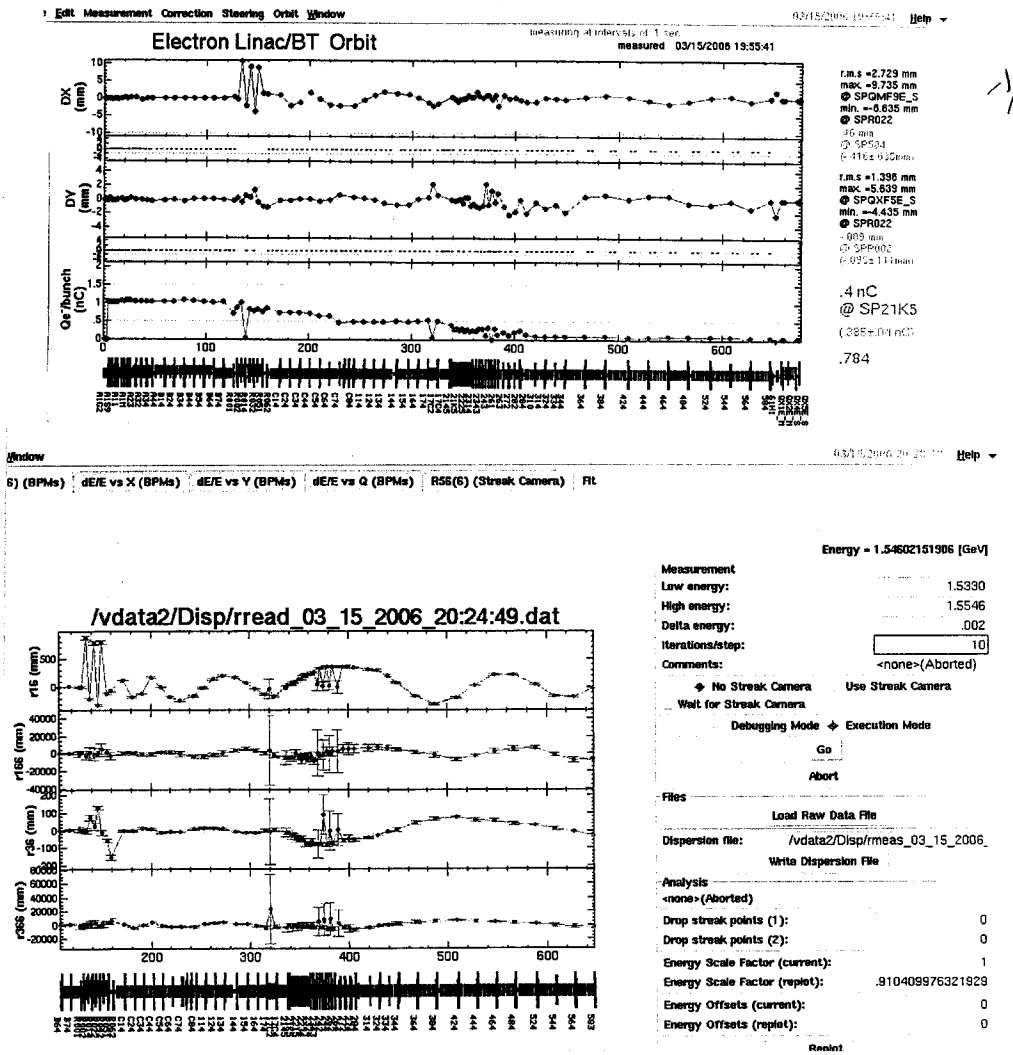
η_x

R062 -0.04022

C14 0.07710

89

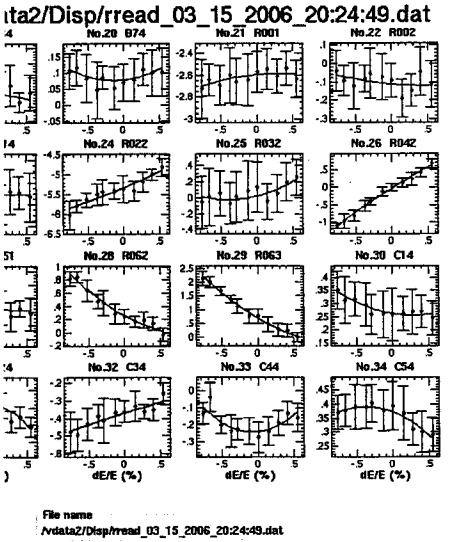
ff11=0.5 で set し、試しに energy を変えてみた。

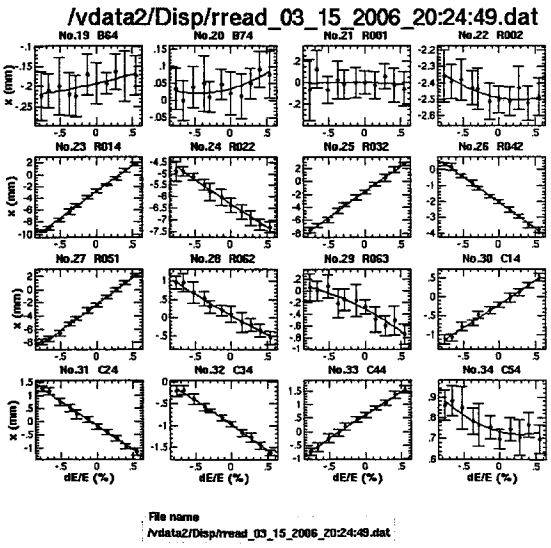


少しQMが弱い。

ff11=0.3 で set し、測定してみた。

全然変わらない。





再度、運転値からやり直し。

V. Bump をたてて、QDR022を調整。

Edit Measurement Correction Steering Orbit Window Help

Electron Linac/BT Orbit

measured 03/15/2006 20:59:00

DX (mm) / DY (mm) / Qe/bunch (nC)

r.m.s =1.813 mm
max. =9.735 mm
@ SPQMF9E_S
min. =-7.678 mm
@ SPR022

r.m.s =1.466 mm
max. =5.639 mm
@ SPQXF5E_S
min. =-5.006 mm
@ SPR042

.579 nC
@ SP584
(.580±.054 nC)

.945

PF入射

QDR022
37.773[A]
P.84と
同じ値だが
C14で
きれいに閉じない
とりあえずOK.

運転値の
14.7%
測定

Window Help

(6) (BPMs) | dE/E vs X (BPMs) | dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

/vdata2/Disp/rread_03_15_2006_21:19:29.dat

r16 (mm) / r166 (mm) / r26 (mm) / r266 (mm)

Energy = 1.54726191247 [GeV]

Measurement
Low energy: 1.5364
High energy: 1.5581
Delta energy: .002
Iterations/step: 5
Comments: <none>
No Streak Camera | Use Streak Camera
Wait for Streak Camera
Debugging Mode | Execution Mode
Go
Abort

Files
Load Raw Data File
Dispersion file: /vdata2/Disp/rmeas_03_15_2006_
Write Dispersion File

Analysis
<none>
Drop streak points (1): 0
Drop streak points (2): 0
Energy Scale Factor (current): 1
Energy Scale Factor (replot): .942244116712752
Energy Offsets (current): 0
Energy Offsets (replot): 0

dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

/vdata2/Disp/rread_03_15_2006_21:19:29.dat

No.19 B64 | No.20 B74 | No.21 R001 | No.22 R002
No.23 R014 | No.24 R022 | No.25 R032 | No.26 R042
No.27 R051 | No.28 R062 | No.29 R063 | No.30 C14
No.31 C24 | No.32 C34 | No.33 C44 | No.34 C54

x (mm) / dE/E (%)

File name
/vdata2/Disp/rread_03_15_2006_21:19:29.dat

dE/E vs Y (BPMs) | dE/E vs Q (BPMs) | R56(6) (Streak Camera) | Fit

/vdata2/Disp/rread_03_15_2006_21:19:29.dat

No.19 B64 | No.20 B74 | No.21 R001 | No.22 R002
No.23 R014 | No.24 R022 | No.25 R032 | No.26 R042
No.27 R051 | No.28 R062 | No.29 R063 | No.30 C14
No.31 C24 | No.32 C34 | No.33 C44 | No.34 C54

y (mm) / dE/E (%)

File name
/vdata2/Disp/rread_03_15_2006_21:19:29.dat