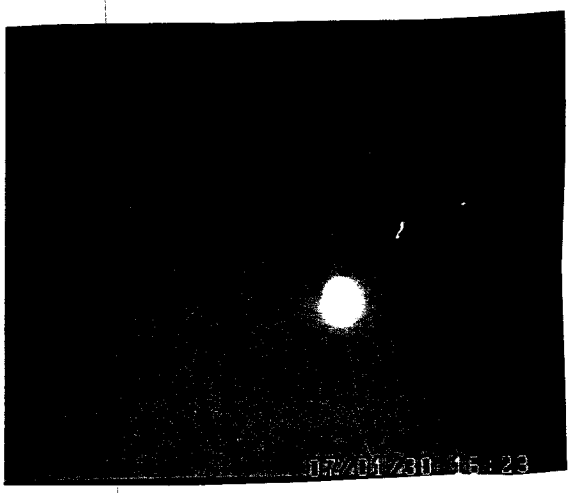
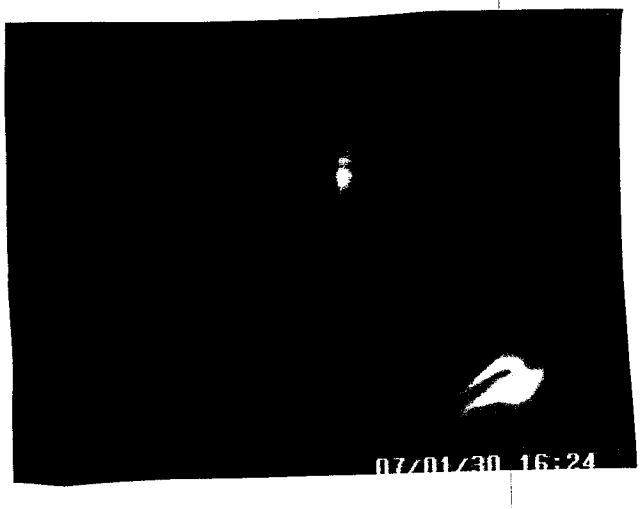
181



SC_IN_05

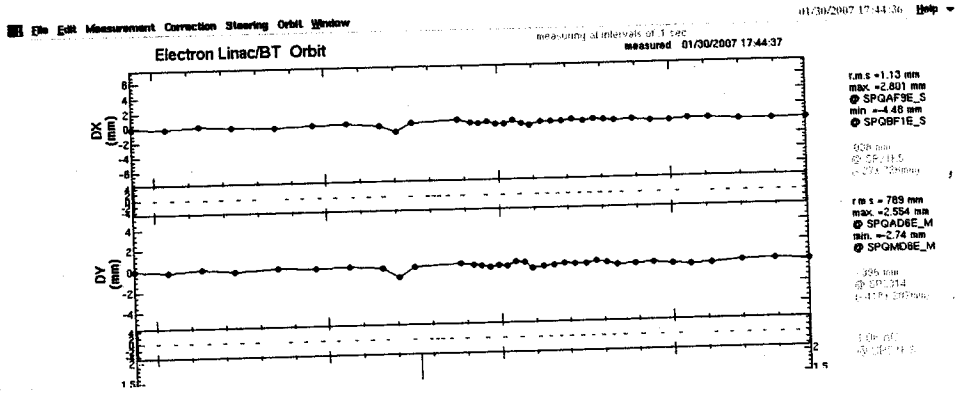


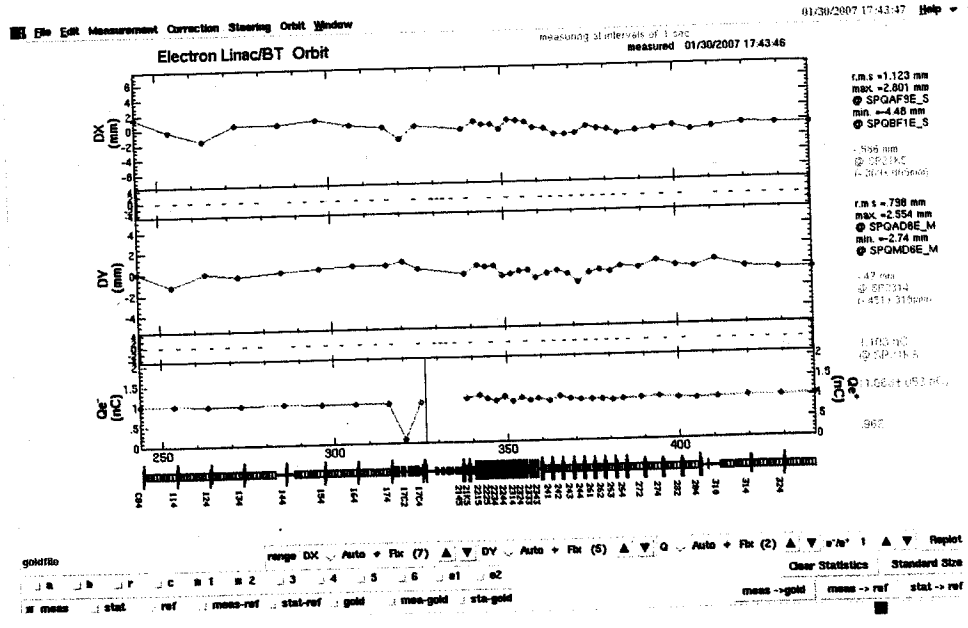
SC_21_45

16:29 BT パラメータ 保存
RF phase "

KEKB e⁻ モードに変更

17:38





h=3.0設定
↓
3.1 実績

(3.31@ inc
4.02@ peak
3.0@TGT
↓
fractionでいく

bump-height [h] (mm) @target	Q@2145	Q@2215	Q@2343	xpsp 17α @
0	1.096	1.152	1.073	0.0
3.0	1.			3.2
(factor 없는 경우)				
0.0	1.050	1.152	1.073	0.0
3.0	1.067	1.163	1.063	3.4
3.5	1.063	1.158	1.055	3.9
4.0	1.059	1.152	1.062	4.5
4.5	1.035	1.125	1.056	5.0
5.0	0.997	1.043	0.984	5.5
5.5	0.708	0.777	0.712	6.1
6.0	0.362	0.316	0.333	6.6
6.5	0.191	0.107	0.134	7.2
7.0	0.163	0.054	0.102	7.6
0				
4.0	1.061	1.154	1.069	4.5
4.2	1.044	1.135	1.069	4.8
4.4	1.033	1.128	1.048	5.0
4.6	1.023	1.114	1.047	5.2
4.8	0.976	1.058	1.007	5.4
5.0	0.953	1.034	0.950	5.6
5.2	0.904	0.965	0.882	5.8
5.4	0.810	0.850	0.779	6.0
5.6	0.669	0.691	0.669	6.3
5.8	0.475	0.468	0.433	6.5
6.0	0.328	0.316	0.297	6.7
6.2	0.244	0.215	0.203	6.8
6.4	0.199	0.145	0.151	7.0
6.6	0.165	0.081	0.120	7.2
6.8	0.150	0.074	0.109	7.4
7.0	0.151	0.057	0.109	7.6

18:15

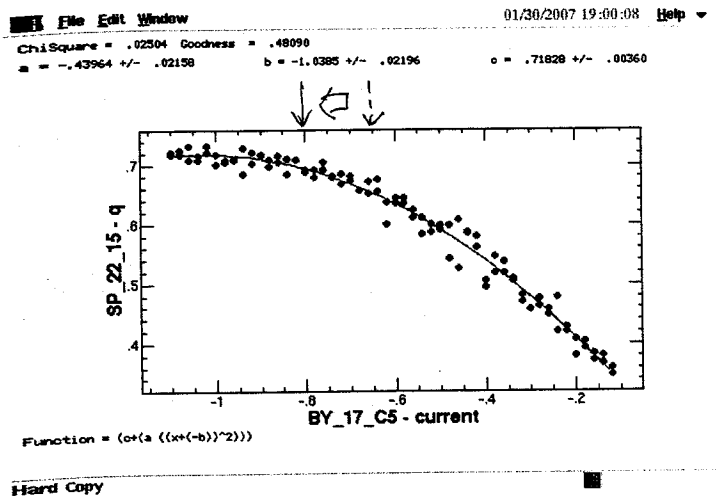
183

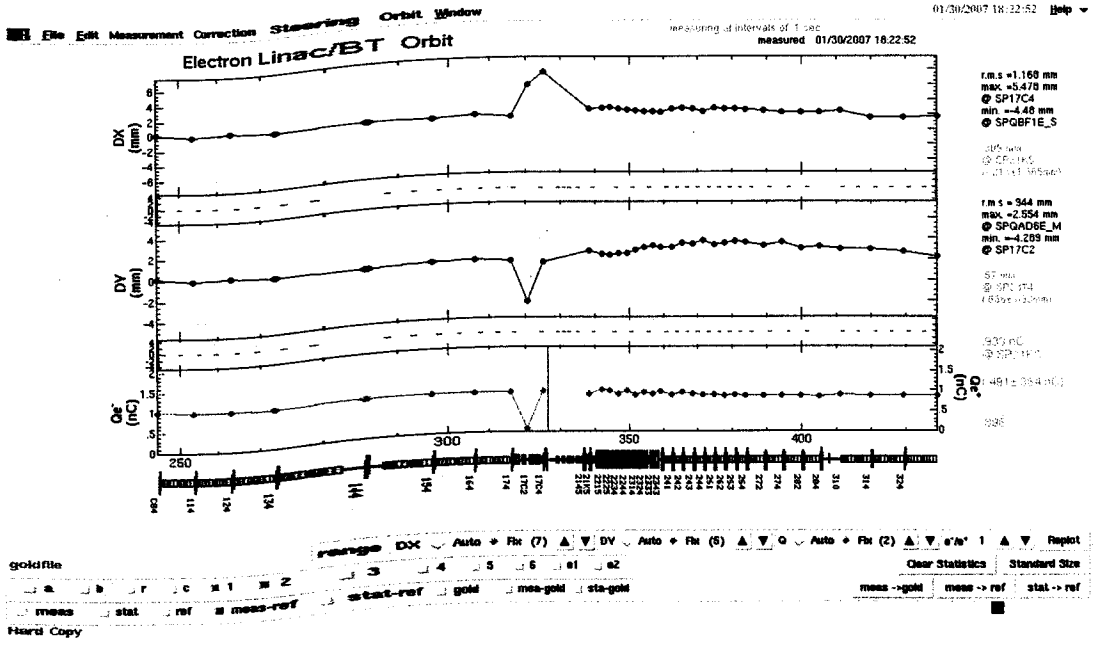
Target を決める

Q@17C4 = 1.0

bump-height (mm)	Q@21K5	Q@2215	Q@2343	xsp@17C4
0	0.146	0.049	0.103	0.0
3.5	0.163	0.065	0.116	3.9 (?)
4.0	0.200	0.120	0.149	4.1 (?)
4.5	0.346	0.334	0.323	5.1
5.0	0.626	0.646	0.622	5.6
5.5	0.594	0.612	0.606	6.2
6.0	0.291	0.280	0.296	6.8
6.5	0.159	0.090	0.122	7.2
7.0	0.159	0.048	0.135	7.6
0				
5.0				

ここで y方向のスキャンを行う。 -0.65 → -0.80 A

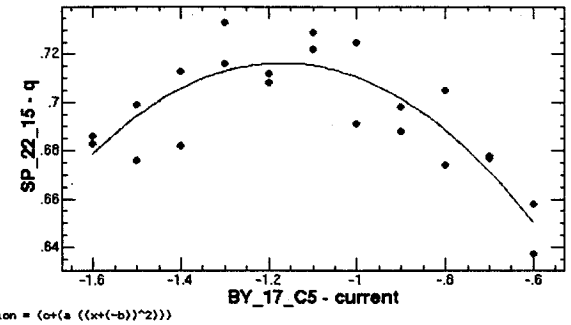




FCV

File Edit Window 01/30/2007 19:04:17 Help

ChiSquare = .00334 Goodness = .45684
a = -.20268 +/- .03202 b = -1.1704 +/- .02478 c = .71627 +/- .00420

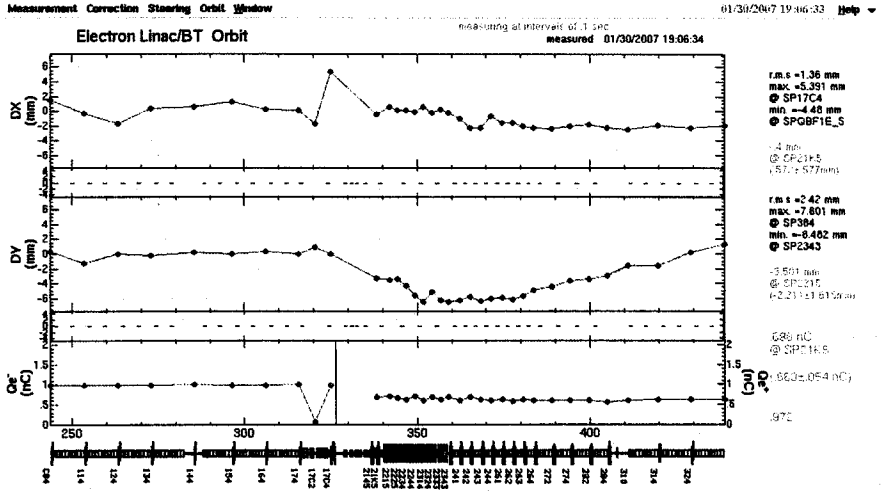


Function = (c+(a ((x+(-b))^2)))

Hard Copy

一旦
BY_17_C5を
-0.8A → -1.2Aにしたが
軌道が大きく出すぎるので
もどした。

File Edit Measurement Correction Steering Orbit Window 01/30/2007 19:06:33 Help

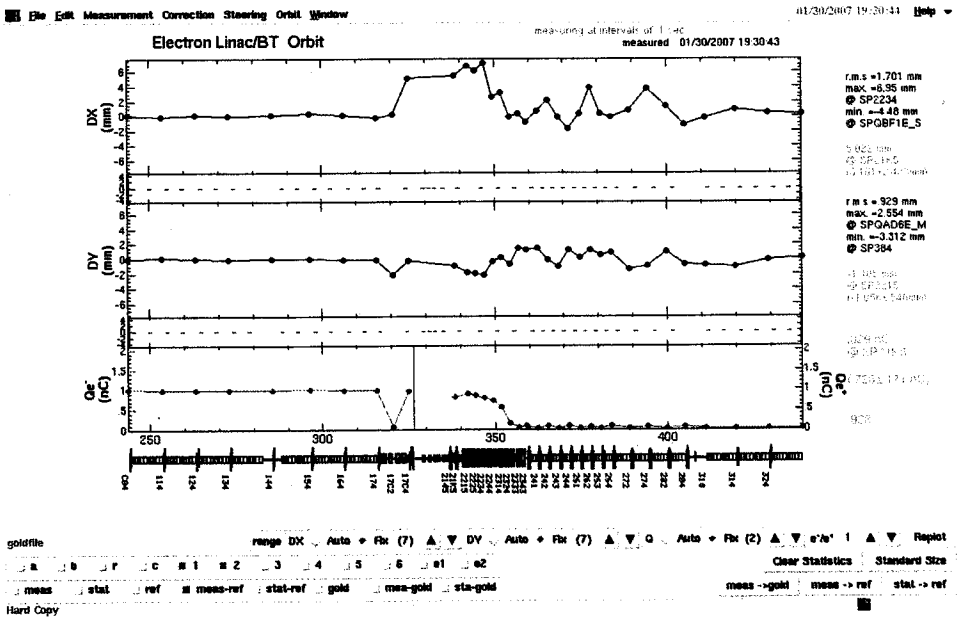


goldfile range DX Auto + Fix (7) DY Auto + Fix (7) Q Auto + Fix (2) e-/e+ 1 Replot
a b r c ≡ 1 ≡ 2 3 4 5 6 e1 e2 Clear Statistics Standard Size
≡ meas stat ref meas-ref stat-ref gold mea-gold sta-gold meas -gold meas -> ref stat -> ref

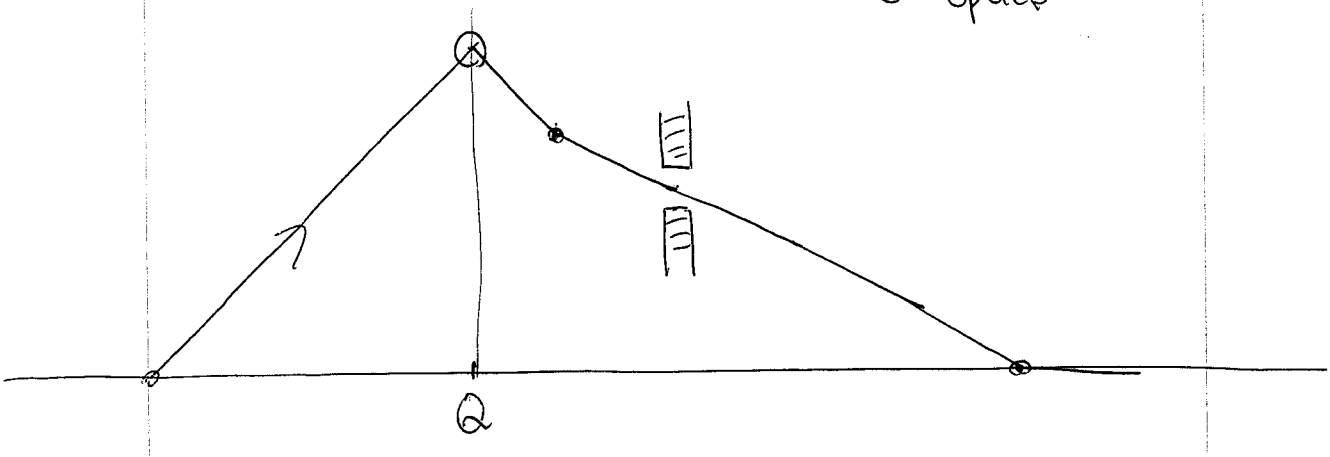
Hard Copy

Fine Scan を行なう

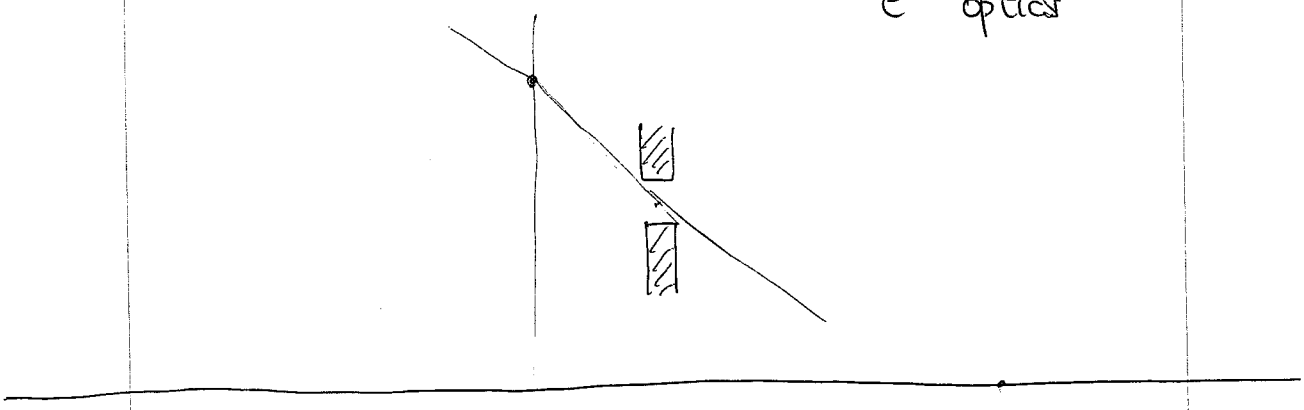
bump-height (mm)	Q@2145	Q@2215	Q@2343	spx@1704
0	0.146	0.050	0.165	0.0
4.0	0.210	0.136	0.151	4.5
4.2	0.274	0.230	0.230	4.8
4.4	0.307	0.281	0.300	5.0
4.6	0.408	0.405	0.409	5.2
4.8	0.558	0.562	0.544	5.4
5.0	0.651	0.694	0.653	5.6
5.2	0.687	0.724	0.682	5.9
5.4	0.640	0.676	0.661	6.1
5.6	0.593	0.606	0.555	6.2
5.8	0.450	0.421	0.422	6.4
6.0	0.339	0.362	0.273	6.7
6.2	0.202	0.150	0.154	6.9
6.4	0.165	0.099	0.133	7.2



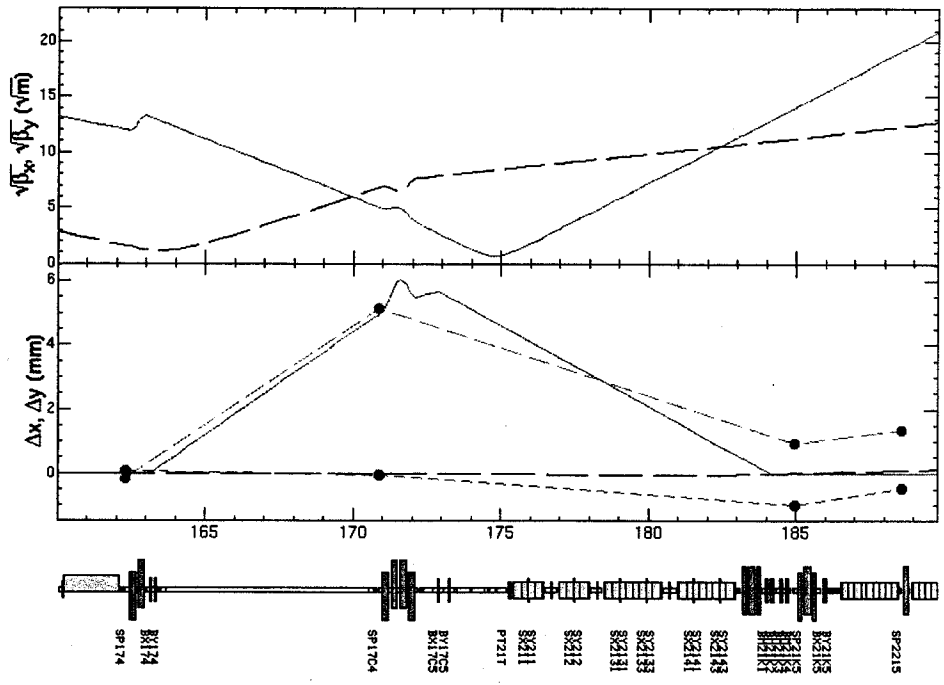
e^+ optics



e^- optics

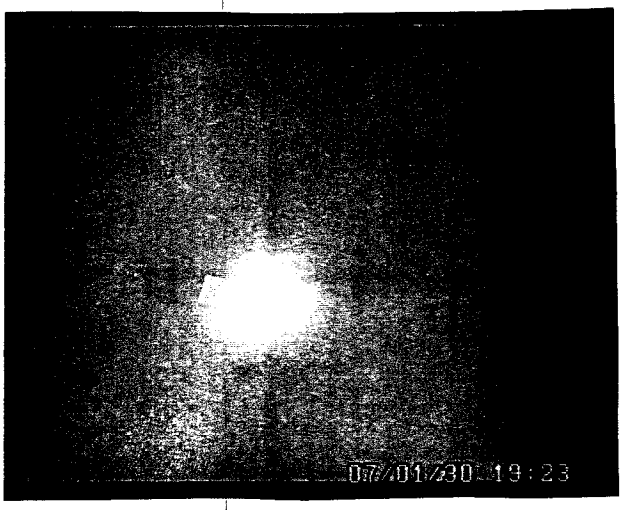


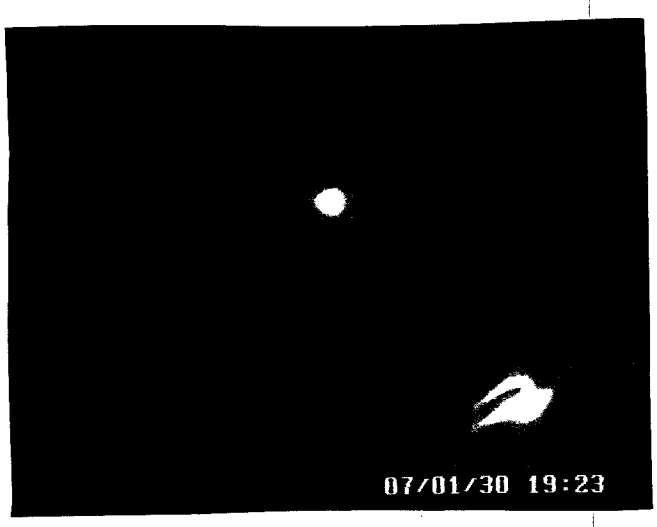
File Edit Window e⁻ mode 01/30/2007 19:39:47 Help

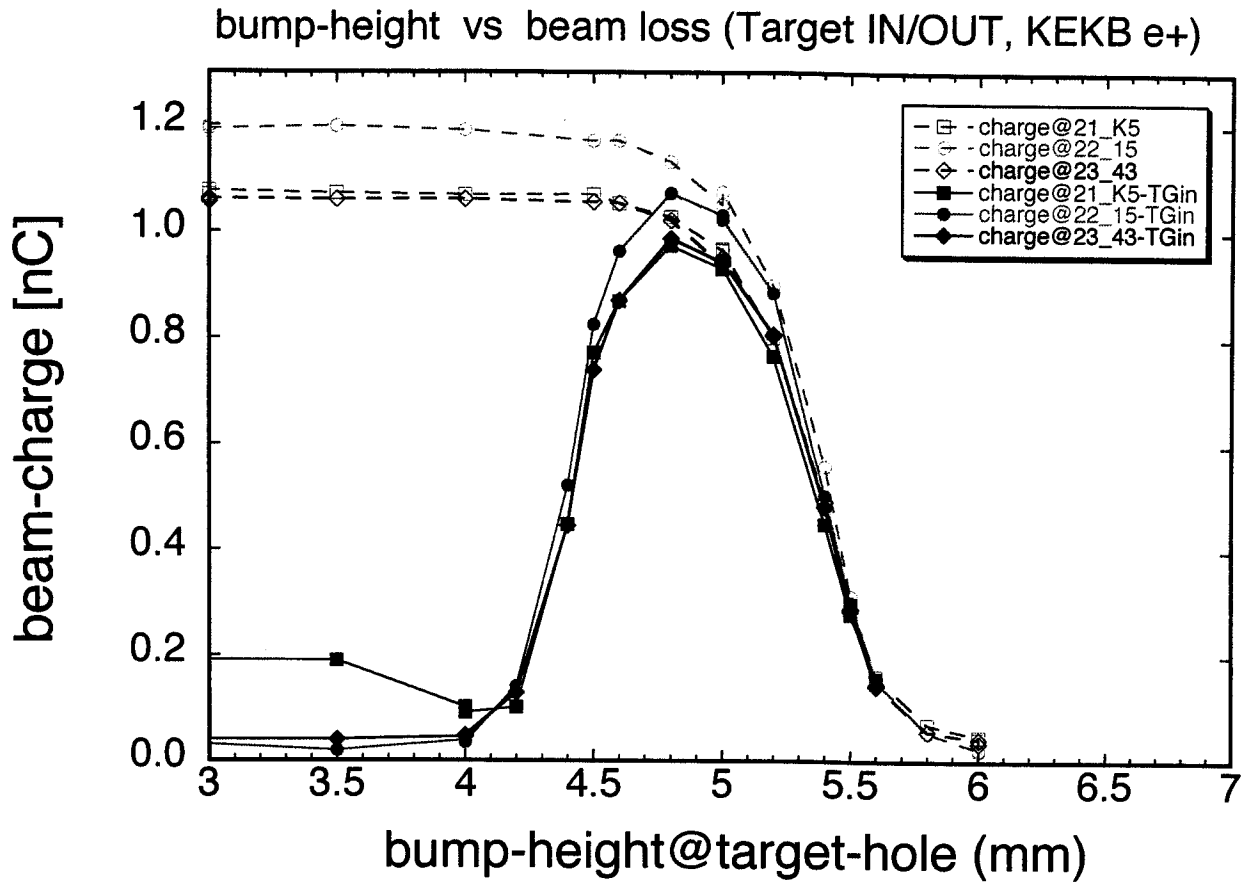


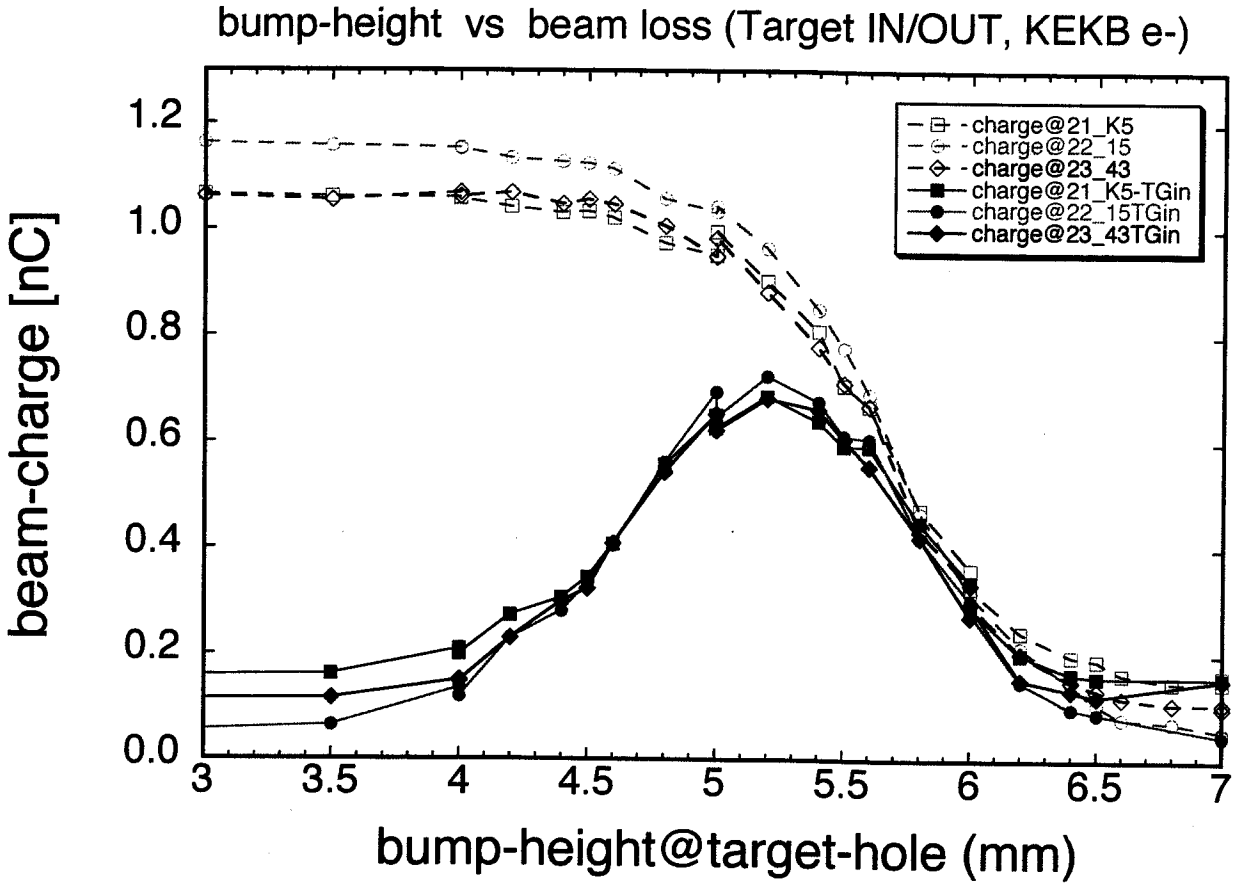
Read Optics	s1(m) 160	Bump (mm)	4.5	Read steering	BX174 (mrad)	-.644	I(A)	6.810	ΔI(A) 4.353
Pol Q(2345)	s2(m) 190	Mode	e-	Save steering	BX17C5 (mrad)	.741	I(A)	-1.255	ΔI(A) -1.191
Set ref		Calc		Set steering	BM21K2 (mrad)	-.503	I(A)	1.055	ΔI(A) 1.054
Clear ref									
Plot orbit									

Hard Copy



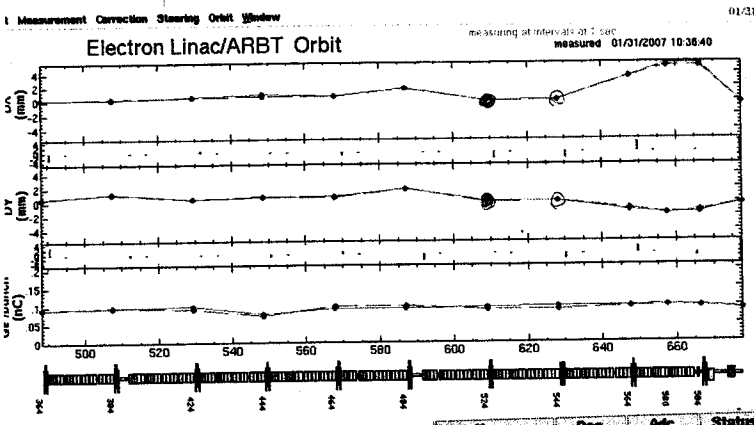



bump-height vs beam loss (Target IN/OUT, KEKB e+)
beam-charge [nC]
bump-height@target-hole (mm)
charge@21_K5
charge@22_15
charge@23_43
charge@21_K5-TGin
charge@22_15-TGin
charge@23_43-TGin
0.0
0.2
0.4
0.6
0.8
1.0
1.2
3
3.5
4
4.5
5
5.5
6
6.5
7


bump-height vs beam loss (Target IN/OUT, KEKB e-)
beam-charge [nC]
bump-height@target-hole (mm)
charge@21_K5
charge@22_15
charge@23_43
charge@21_K5-TGin
charge@22_15TGin
charge@23_43TGin
0.0
0.2
0.4
0.6
0.8
1.0
1.2
3
3.5
4
4.5
5
5.5
6
6.5
7

189 5セクター Alignment 測定 (P.158 9つづき)

AR e⁻ で測定 (3.0GeV 0.1nC)



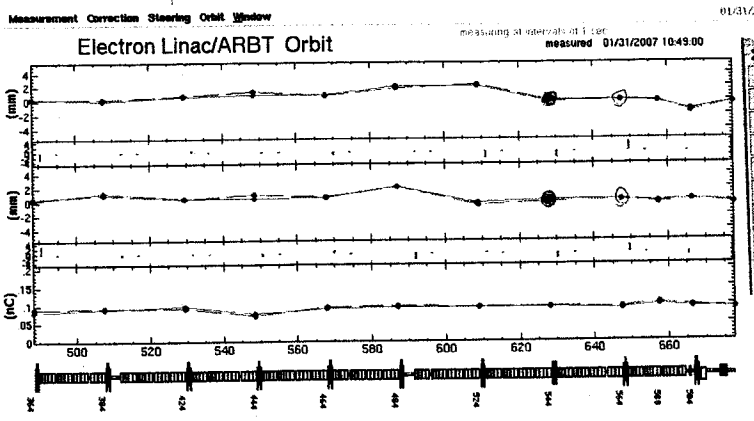
Name	Dac	Adc	Status
	-0.131	-0.132	
SX_41_3	0.284	0.288	
SX_43_1	0.001	0.002	
SX_43_3	0.001	0.000	
SX_45_1	0.001	0.000	
SX_45_3	0.001	0.002	
SX_47_1	-0.680	-0.681	
SX_47_3	0.001	0.000	

Name	Dac	Adc
BY_38_4	-0.277	-0.273
SY_41_3	0.270	0.273
SY_43_1	0.001	0.000
SY_43_3	0.001	0.005
SY_45_1	0.370	0.369
SY_45_3	0.001	0.005
SY_47_1	0.284	0.285
SY_47_3	0.001	0.002

Name	Dac	Adc	Status
	-0.211	-0.215	
SX_51_3	0.001	0.000	
SX_53_1	0.001	0.002	
SX_53_3	0.001	-0.002	
SX_55_1	0.001	0.000	
SX_55_3	0.001	-0.005	
SX_57_1	0.001	0.000	
SX_57_3	0.001	-0.002	
BX_58_4	0.005	-0.020	

Name	Dac	Adc
BY_48_4	-0.236	-0.237
SY_51_3	0.001	0.000
SY_53_1	0.001	0.000
SY_53_3	0.001	0.000
SY_55_1	0.001	0.000
SY_55_3	0.001	0.002
SY_57_1	0.001	0.000
SY_57_3	0.001	0.005
BY_58_4	-0.464	-0.430

Name	Dac	Adc	Status
	9.553	9.536	
QF_52_4	8.557	8.525	
QD/D_54_4	0.000	0.015	
QF_54_4	0.000	0.015	
QD/D_56_4	0.000	0.015	
QF_56_4	0.000	0.015	
QD/D_58_4	10.945	10.913	
QF_58_4	11.341	11.309	



Name	Dac	Adc	Status
BX_46_4	-0.057	-0.059	
SX_51_3	0.001	0.000	
SX_53_1	-3.100	-3.096	
SX_53_3	0.001	-0.002	
SX_55_1	0.001	0.000	
SX_55_3	0.001	-0.005	
SX_57_1	0.001	-0.002	
SX_57_3	0.001	-0.002	
BX_58_4	0.005	-0.020	

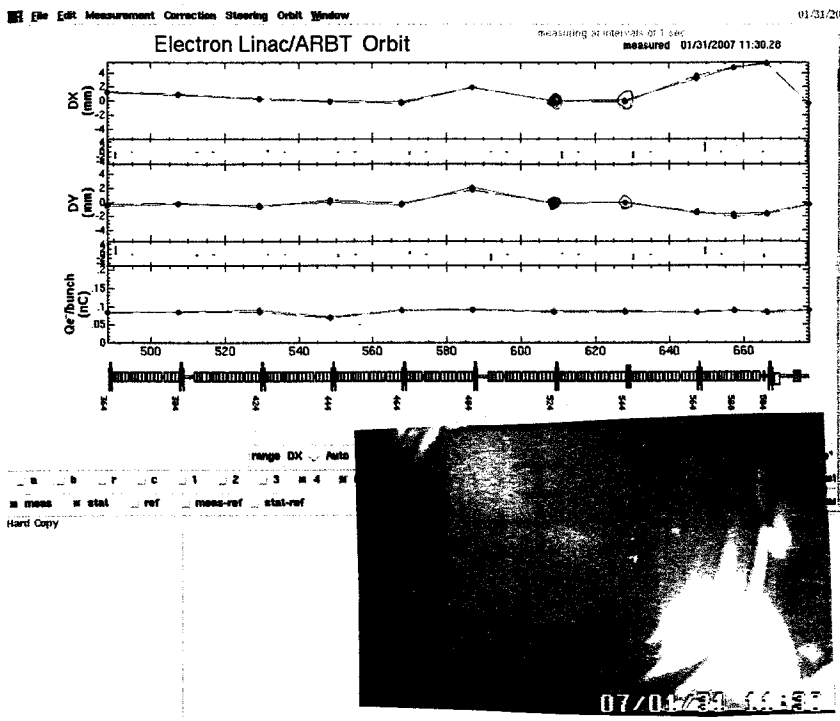
Name	Dac	Adc
BY_46_4	-0.257	-0.264
SY_51_3	0.001	0.000
	0.099	0.100
SY_53_3	0.001	0.000
SY_55_1	0.001	-0.002
SY_55_3	0.001	0.002
SY_57_1	0.001	0.000
SY_57_3	0.001	0.002
BY_58_4	-0.464	-0.439

@SPQROD3_I

1.042

Name	Dac	Adc	Status
	9.553	9.521	
QF_52_4	8.557	8.525	
QD/D_54_4	9.377	9.375	
QF_54_4	9.700	9.668	
QD/D_56_4	0.000	0.015	
QF_56_4	0.000	0.015	
QD/D_58_4	10.945	10.913	
QF_58_4	11.341	11.309	

PFで e⁻ で測定 (2.5GeV 0.1nC)



Name	Dac	Adc	Status
	-0.168	-0.166	
SX_41_3	0.448	0.457	
SX_43_1	0.001	0.000	
SX_43_3	0.001	0.000	
SX_45_1	-0.038	-0.039	
SX_45_3	0.001	0.002	
SX_47_1	0.499	0.496	
SX_47_3	0.001	0.000	

Name	Dac
BY_38_4	-0.258
SY_41_3	-0.026
SY_43_1	0.001
SY_43_3	0.001
SY_45_1	-0.269
SY_45_3	0.001
SY_47_1	0.001
SY_47_3	0.001

Name	Dac	Adc	Status
BX_48_4	-0.243	-0.244	
SX_51_3	0.001	0.000	
SX_53_1	0.001	0.002	
SX_53_3	0.001	-0.002	
SX_55_1	0.001	0.000	
SX_55_3	0.001	-0.005	
SX_57_1	0.001	-0.002	
SX_57_3	0.001	-0.002	
BX_58_4	1.900	1.914	

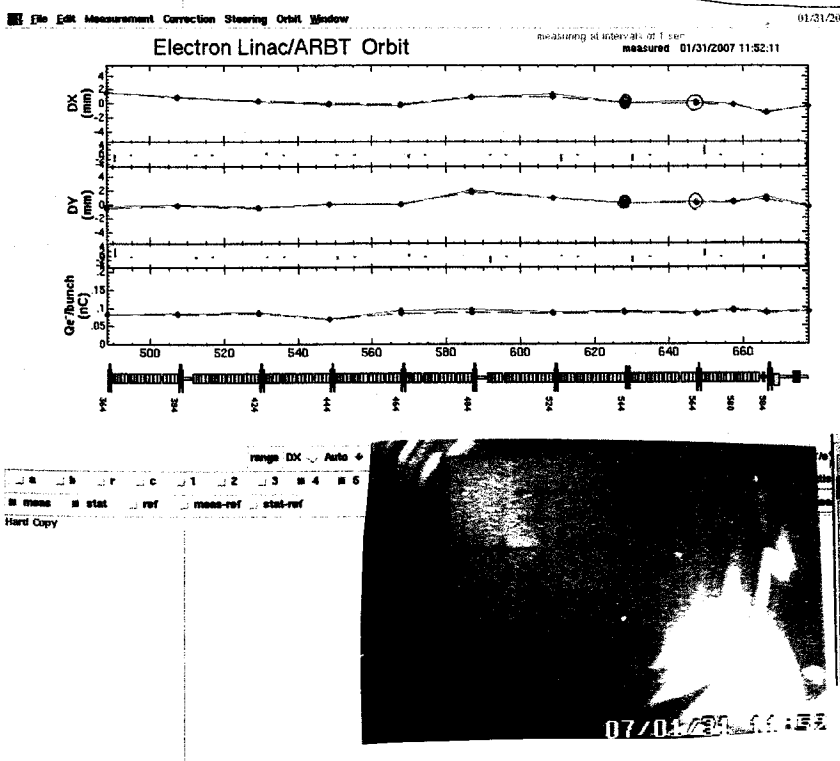
Name	Dac
	-0.265
SY_51_3	-0.001
SY_53_1	0.001
SY_53_3	0.001
SY_55_1	0.001
SY_55_3	0.001
SY_57_1	0.001
SY_57_3	0.001
BY_58_4	0.103

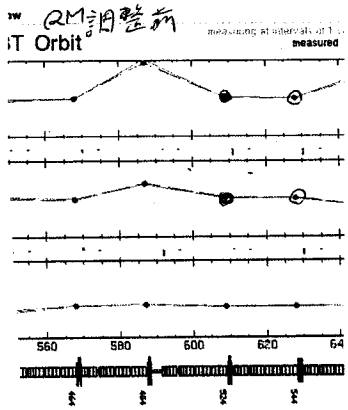
Q.524を調整して↘
.684で小さくなるように
した.

しかし. 実際には
56~58のOrbitに
あまり違いはなかった.

Name	Dac
	5.861
QF_52_4	5.319
QD/D_54_4	0.000
QF_54_4	0.000
QD/D_56_4	0.000
QF_56_4	0.000
QD/D_58_4	0.103
QF_58_4	10.637

QM調整前





Name	Dac	Adc	Status
	-0.077	-0.061	
SX_51_3	0.001	0.000	
SX_53_1	-2.500	-2.500	
SX_53_3	0.001	-0.002	
SX_55_1	0.001	0.000	
SX_55_3	0.001	-0.002	
SX_57_1	0.001	0.000	
SX_57_3	0.001	-0.002	
BX_58_4	1.900	1.904	

Name	Dac
BY_48_4	-0.158
SY_51_3	-0.001
SY_53_1	-0.099
SY_53_3	0.001
SY_55_1	0.001
SY_55_3	0.001
SY_57_1	0.001
SY_57_3	0.001
BY_58_4	0.103

Name	Dac
	17.061
QF_52_4	17.319
QD/D_54_4	23.751
QF_54_4	23.179
QD/D_56_4	0.000
QF_56_4	0.000
QD/D_58_4	0.103
QF_58_4	10.637