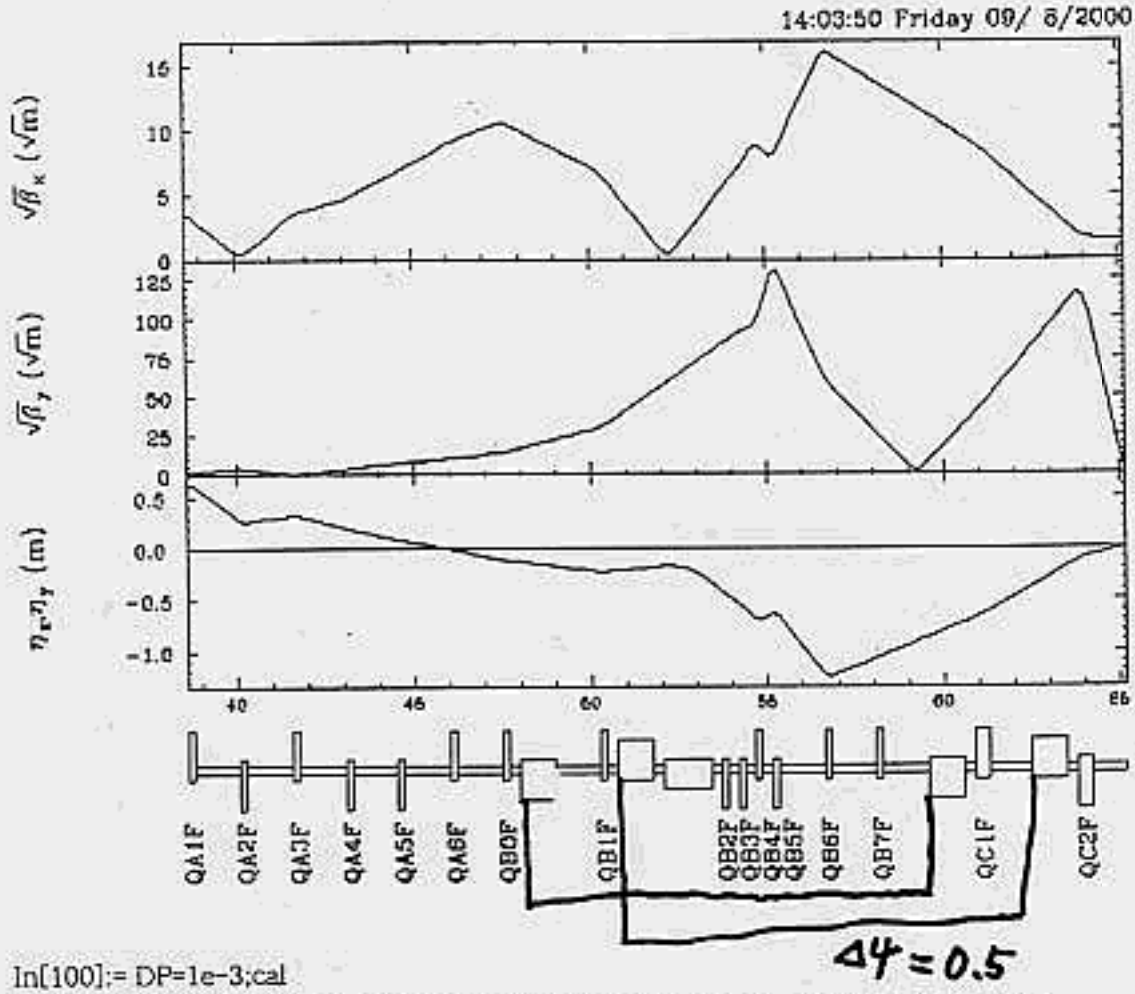
extff0




```
In[100]:= DP=1e-3;cal
Residual = 6.3658E-04  DP = 0.00100  DP0 = 0.00000  ExponentOfResidual = 2.0
OffMomentumWeight =  1.000
        DP          -.001 -8E-4 -5E-4 -3E-4  .000 5.E-4 8.E-4  .001
        Res.        3.E-4 7.E-5 8.E-6 7.E-7 5.E-5 3.E-6 3.E-5 2.E-4
SF1F/SF2F NX  ##### # .500 .500 .500 .500 .500 .500 .500 .500
SF1F/SF2F NY  ##### # .500 .500 .500 .500 .500 .500 .500 .500
SD1F/SD2F NX  ##### # .500 .500 .500 .500 .500 .500 .500 .500
SD1F/SD2F NY  ##### # .500 .500 .500 .500 .500 .500 .500 .500
$$$     fAX  0     9  .015  .014  .010  .004 -4E-5 -.005 -.009 -.017
$$$     fBX  ##### # 1.736 1.858 1.948 2.001 2.015 1.926 1.828 1.703
$$$     fNX  ##### # 2.927 2.920 2.915 2.912 2.911 2.912 2.915 2.921
$$$     fAY  0     9 -.072 -.036 -.011  .003  .007 -.008 -.025 -.044
$$$     fBYM 1E-4  9 1.E-4 1.E-4 1.E-4 1.E-4 1.E-4 1.E-4 1.E-4 1.E-4
$$$     fNY  ##### # 3.283 3.276 3.270 3.267 3.264 3.264 3.265 3.267
$$$     fEX  0     9  .004  .002 4.E-4 3.E-5 1.E-5 -3E-4 -.001 -.003
$$$     fLENG ##### # 65.161819
```

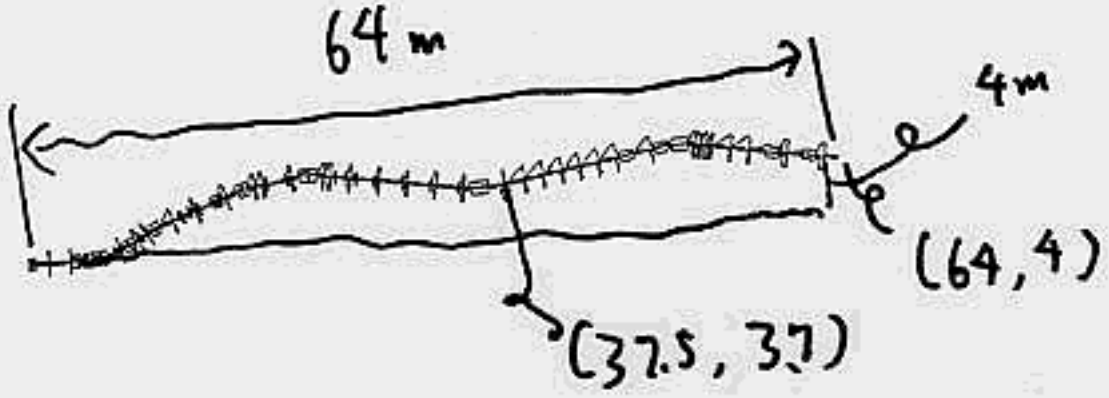
E=1.54 GeV

$\gamma\varepsilon_x=3\times10^{-6}$m, $\gamma\varepsilon_y=3\times10^{-8}$m

```
In[91]:= DP=1e-3;mea
Statistics at $$:   particles = 1000
RAD: T, RFSW: T, GAUSS: T, DP =  .001000, DP0 =  .000000, GCUT = 1.0000E35
                x    px/p0       y    py/p0       z    dp/p0
 C of M : -1.994E-05-9.126E-06 1.911E-09 2.257E-05-2.505E-05 4.479E-05
     x :  2.036E-09
  px/p0 : -2.727E-11 6.575E-09
     y :  2.355E-14 7.442E-14 1.208E-15
  py/p0 :  6.125E-11-5.966E-10 2.318E-12 1.006E-07
     z :  2.348E-10-8.474E-09-5.557E-14 9.974E-10 1.377E-08
  dp/p0 : -2.729E-09 7.303E-08 5.310E-13-8.128E-09-1.113E-07 9.260E-07
x-y projected(coupled) parameters:
emitx: 1.2720E-09 bx:  1.594    ax:-0.1478    ex:-2.9469E-03 epx: 7.8868E-02
emity: 1.0769E-11 by: 1.1212E-04 ay:-0.2156    ey: 5.7340E-07 epy:-8.7779E-03
x-y decoupled parameters:
emitu: 1.2720E-09 bu:  1.594    au:-0.1478    eu:-2.9466E-03 epu: 7.8868E-02
emitv: 1.0763E-11 bv: 1.1206E-04 av:-0.2156    ev:-2.3879E-06 epv:-1.2918E-02
  r1:-8.8607E-06 r2:-3.7879E-05 r3:-1.1667E-02 r4:-5.2931E-02detr: 2.7060E-08
 sigx: 4.5122E-05  sigy: 3.4754E-08   tilt:-1.1566E-05
sigpx: 8.1087E-05 sigpy: 3.1716E-04
sigp/p: 9.6227E-04  sigz: 1.1733E-04 dp/p/z:-9.4828E-04/sigz
```

```
;
DRIFT LDF  =(L =.1 )  LA1F  =(L =1.3 ) LA2F  =(L =1.3 )
    LA3F  =(L =1.3 ) LA4F  =(L =1.3 ) LA6F  =(L =1.3 )
    LA7F  =(L =1.3 ) LB0F  =(L =.3 )  LB1F  =(L =1.3 )
    LB2F  =(L =.3 )  LB3F  =(L =.3 )  LB4F  =(L =.3 )
    LB5F  =(L =.3 )  LB6F  =(L =.3 )  LB7F  =(L =.3 )
    LB8F  =(L =1.3 ) LB9F  =(L =1.3 ) LB10F =(L =1.3 )
    LB11F =(L =.3 )  LC1F  =(L =1.2 ) LC2F  =(L =.3 )
    LC3F  =(L =1 )
;
QUAD  QA1F  =(L =.18 K1 =.902406791402 )
    QA2F  =(L =.18 K1 =-1.1814235442215 )
    QA3F  =(L =.18 K1 =.4402380076565 )
    QA4F  =(L =.18 K1 =-.1222267654219 )
    QA5F  =(L =.18 K1 =-.0213478151473 )
    QA6F  =(L =.18 K1 =.0559560683224 )
    QB0F  =(L =.18 K1 =.2318743741557 )
    QB1F  =(L =.18 K1 =.3233651742199 )
    QB2F  =(L =.18 K1 =-.0106673820277 )
    QB3F  =(L =.18 K1 =-.0480588971658 )
    QB4F  =(L =.18 K1 =.7124582472136 )
    QB5F  =(L =.18 K1 =-1.0049814778477 )
    QB6F  =(L =.18 K1 =.4615785732361 )
    QB7F  =(L =.18 K1 =.0026831041968 )
    QC1F  =(L =.4  K1 =.0839895048349 )
    QC2F  =(L =.4  K1 =-1.1348444157469 )
;
SEXT  SF1F  =(L =1  K2 =-18.7684392687942 )
    SD1F  =(L =1  K2 =31.9650206730401 )
    SF2F  =(L =1  K2 =-.2788122139491 )
    SD2F  =(L =1  K2 =4.8256034046531 )
```

14:01:53 Friday 09/ 8/2000



Element #	Gx	Gy	Gz	s	Length	Value	Chi1	Chi2	Chi3
IPF0 000000	37.486250	3.700000	.000000	38.591819	.000000	0		8.945747	-
SSS 000000	63.743747	3.956483	.000000	65.161819	.000000	0		-8.953408	-

194

237