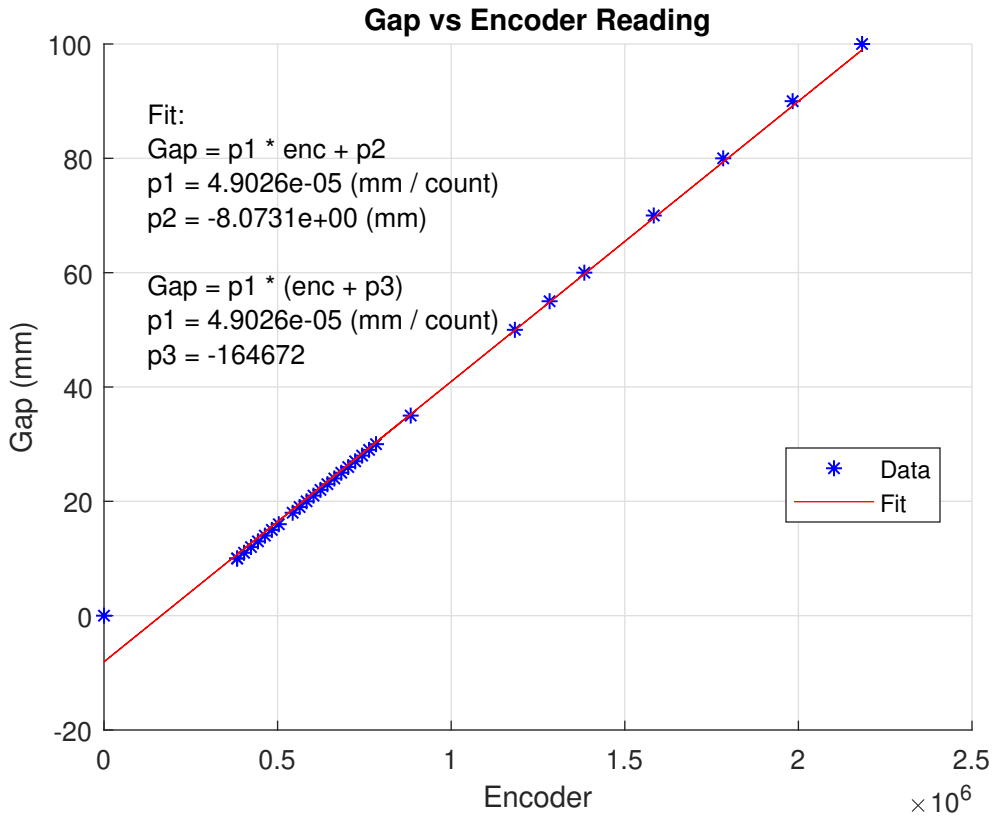
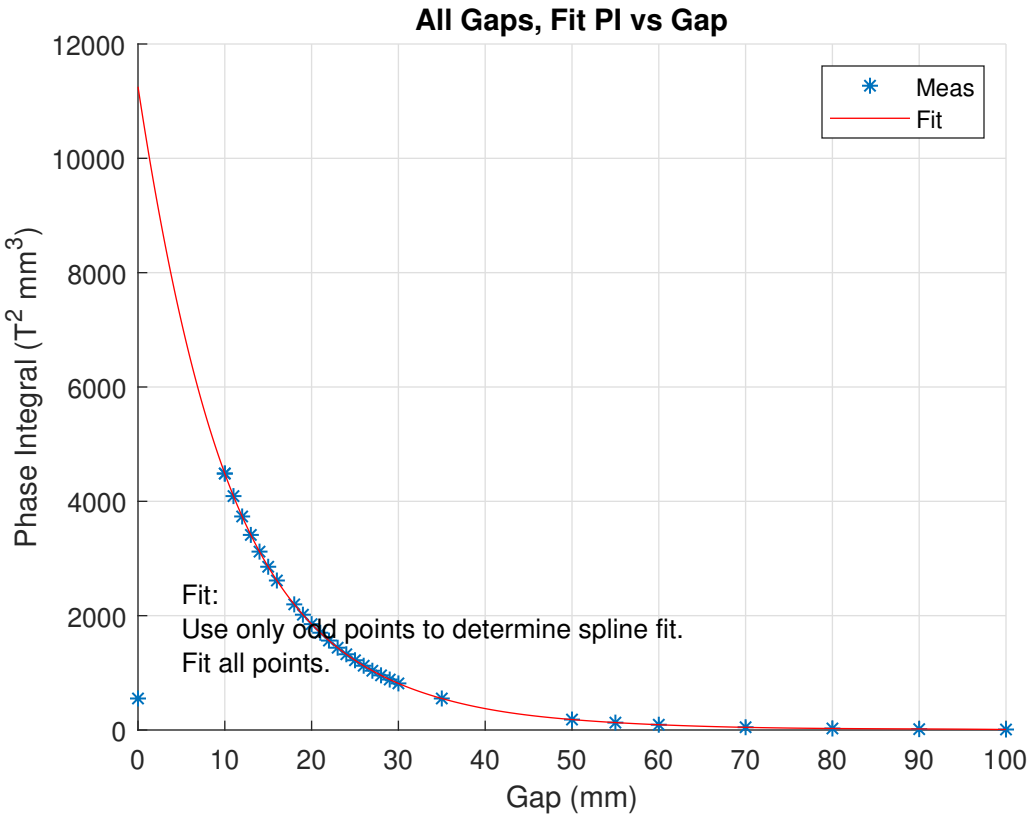
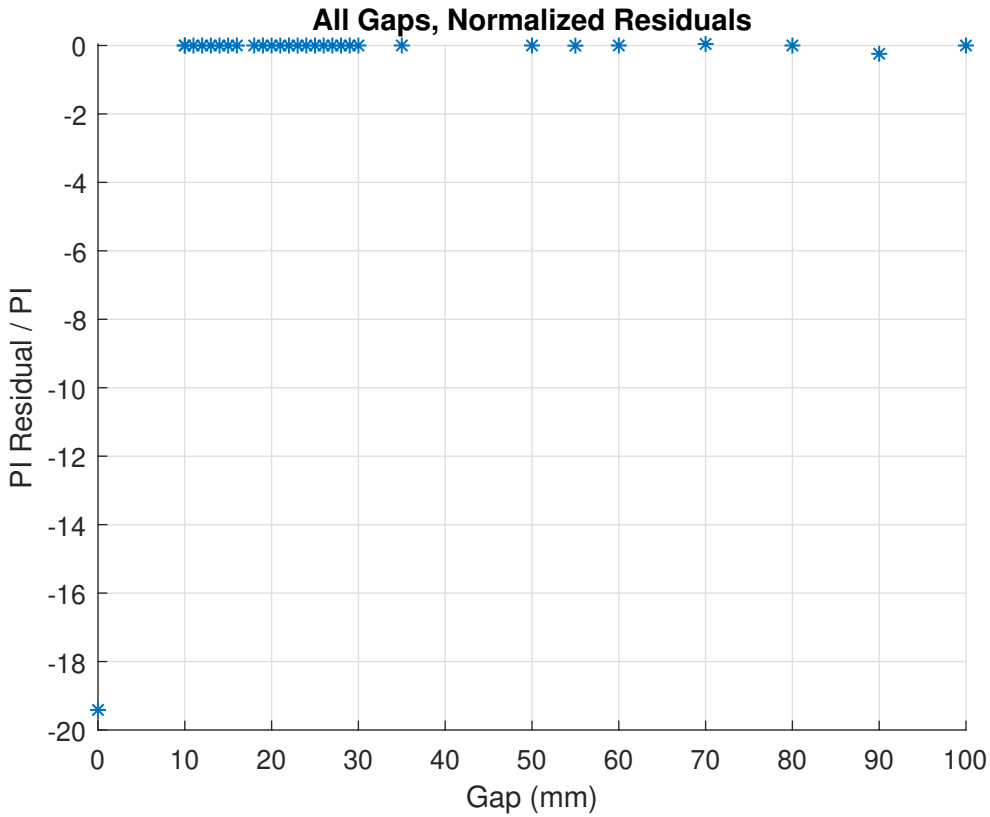
SLAC Magnetic Measurements#
Date: 05-03-2018#
Time: 10:57:41#


Gap vs Encoder Reading
Fit:
Gap = p1 * enc + p2
p1 = 4.9026e-05 (mm / count)
p2 = -8.0731e+00 (mm)
Gap = p1 * (enc + p3)
p1 = 4.9026e-05 (mm / count)
p3 = -164672
Data
Fit
Gap (mm)
Encoder
100
80
60
40
20
0
-20
0
0.5
1
1.5
2
2.5
×10^6


All Gaps, Fit PI vs Gap
Phase Integral (T^2 mm^3)
Gap (mm)
Meas
Fit
Fit:
Use only odd points to determine spline fit.
Fit all points.
0
2000
4000
6000
8000
10000
12000
0
10
20
30
40
50
60
70
80
90
100


All Gaps, Normalized Residuals
PI Residual / PI
0
-2
-4
-6
-8
-10
-12
-14
-16
-18
-20
0
10
20
30
40
50
60
70
80
90
100
Gap (mm)