

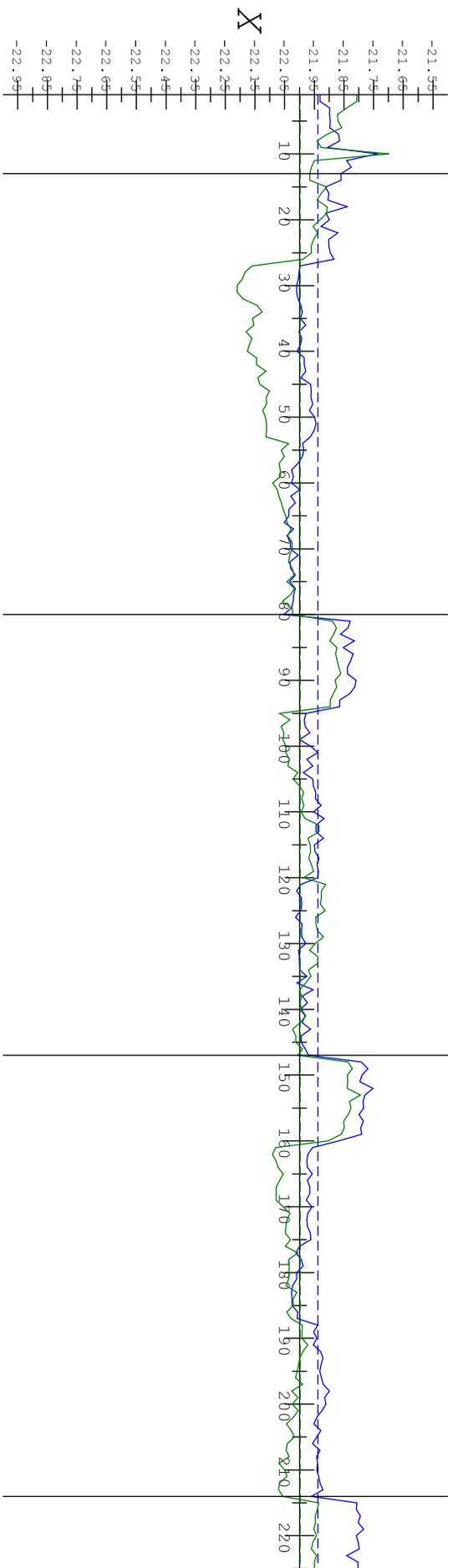
Symmetry Axis is the symmetry axis between the Upper and Lower Pole Tips
 Included Angle is the angle between the Upper and Lower Pole Tips



Undulator Pole Tip Angles
 Post Magnetic Alignment

DATE: 20-OCT-2010
 UNDULATOR # 02
 DATASET # 0003
 PROGRAM VERSION 2.9

Pole Tip Number ----->

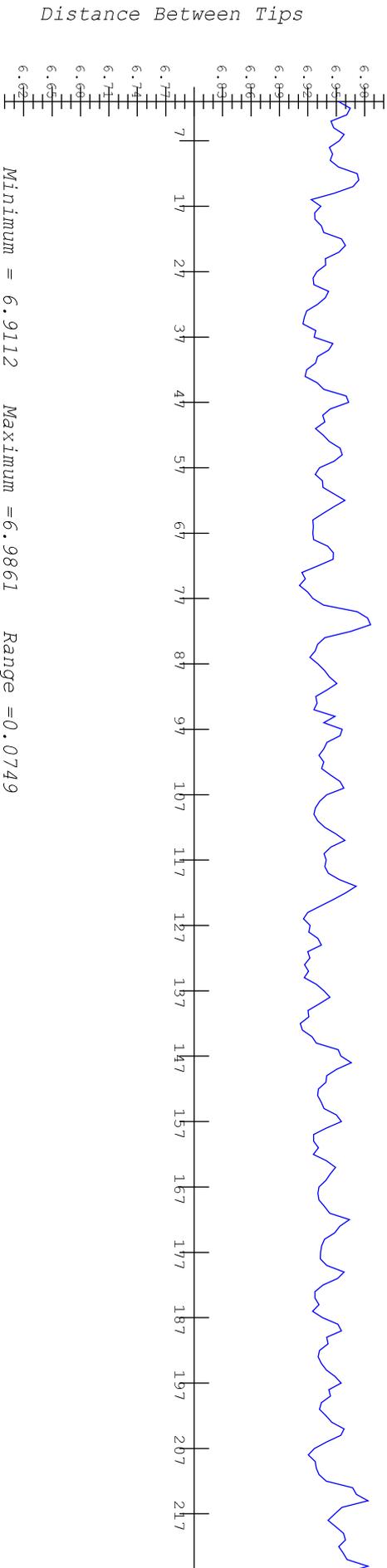


Undulator Pole Tip Location Post Magnetic Alignment

DATE: 20-OCT-2010
 UNDULATOR # 02
 DATASET # 0003
 PROGRAM VERSION 2.9

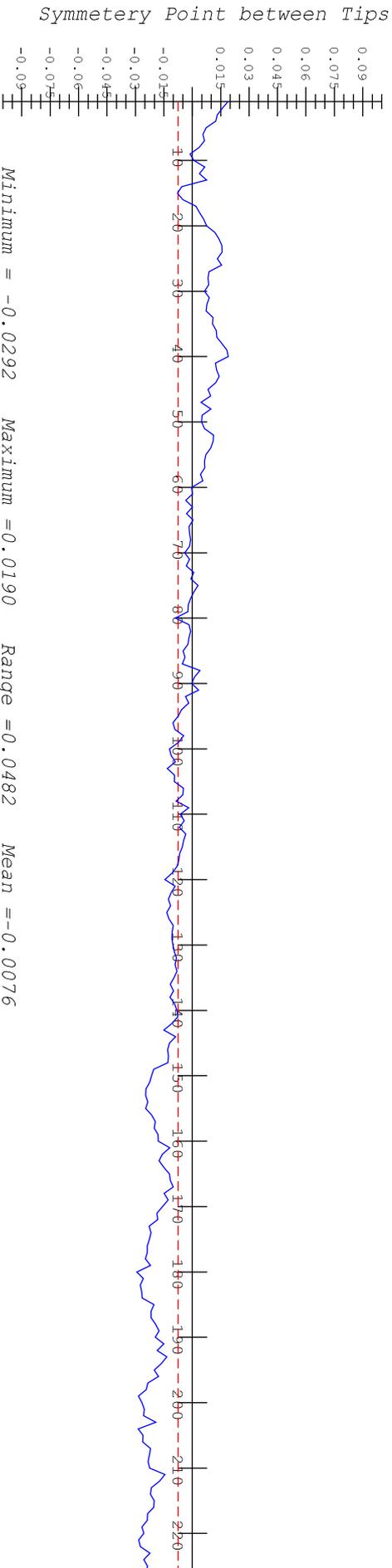
Green Solid = Point on front face of Upper Pole Tip 10mm above Magnetic C/L
 Green Dash = Mean value of all Upper Pole Tips 10mm above Magnetic C/L
 Blue Solid = Point on front face of Lower Pole Tip 10mm below Magnetic C/L
 Blue Dash = Mean value of all Lower Pole Tips 10mm below Magnetic C/L

Mean value Upper Pole Tips = -21.998
 Mean value Lower Pole Tips = -21.938



in mm

Pole Tip Number ----->



Symmetry Point is the symmetry point between the Upper and Lower Pole Tips were they intersect a YZ plane at the Magnetic C\L
 Broken Red line is Mean Value of Symmetry Points
 Distance Between Tips is the distance between the Upper and Lower Pole Tips were they intersect a YZ plane at the Magnetic C\L

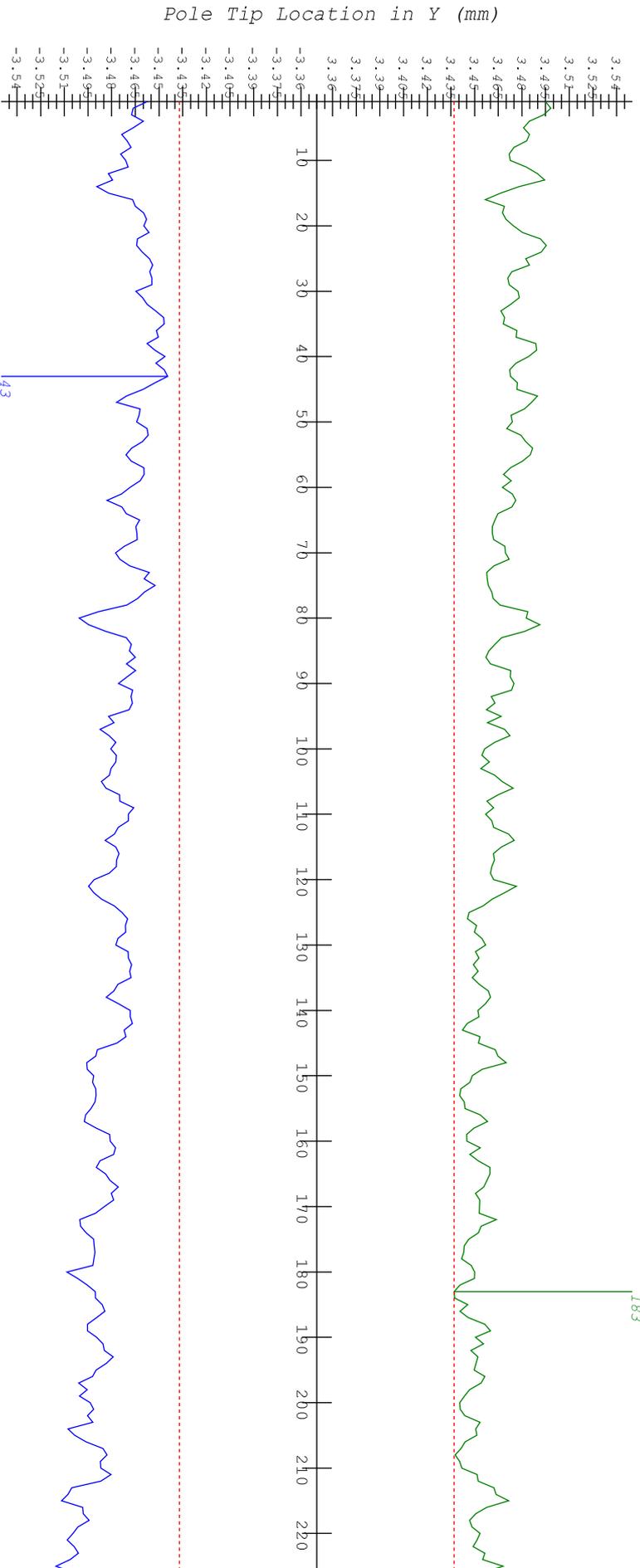


Undulator Pole Tip Location
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Maximum Chamber Gap = 6.8741

Minimum = 3.4371 Maximum = 3.4983 Range = 0.0613



Minimum = -3.5153 Maximum = -3.4444 Range = 0.0709

Pole Tip Number ----->

Green = The position of the Upper Pole Tips at Magnetic C\L
Blue = The position of the Lower Pole Tips at Magnetic C\L
Max. Chamber Gap = The maximum width vacuum chamber that will fit centered on the Magnetic C\L (2*Min. Dev. from C\L)



Undulator Pole Tip Location
Post Magnetic Alignment

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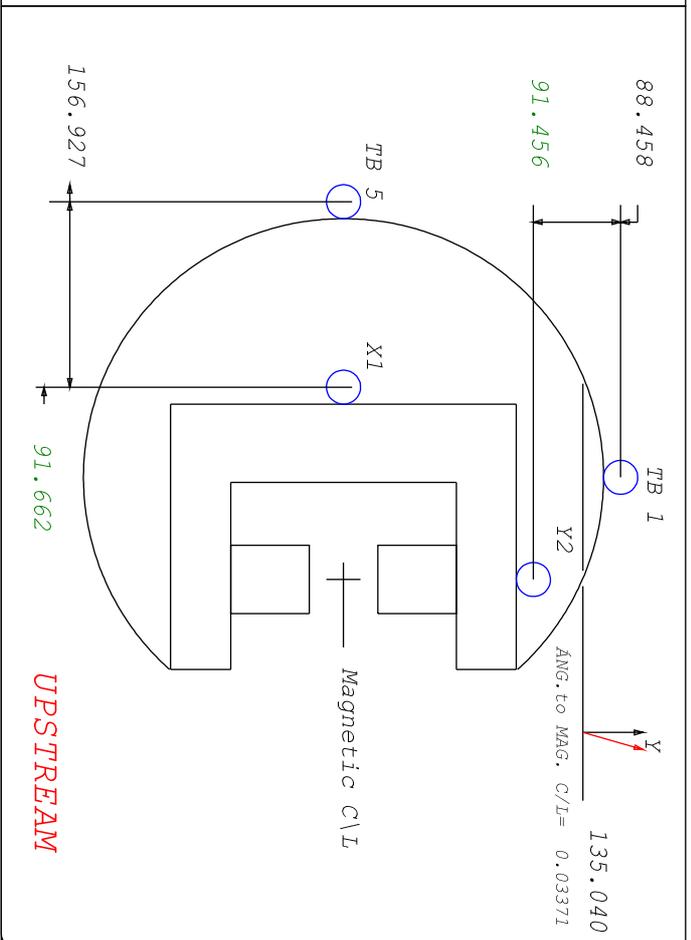
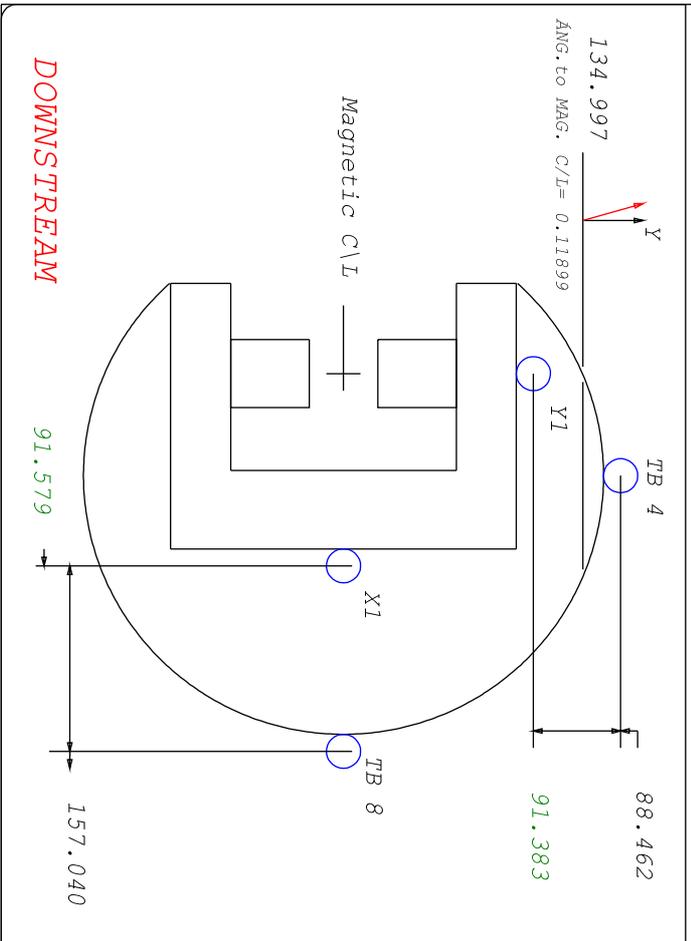
TOOLING BALL LOCATIONS

NUM.	X	Y	Z
1	0.1623	179.9140	-1558.198
2	0.3572	179.8333	-584.6062
3	0.2616	179.8095	591.3351
4	0.2090	179.8448	1562.2452
5	248.5893	-0.0647	-1558.192
6	248.6606	-0.1523	-584.5550
7	248.6678	-0.1300	591.5787
8	248.6195	-0.0058	1562.4251

	C/L Offset	Length
Top Magnetic Structure	0.002	3380.947
Bottom Magnetic Structure	-0.002	3380.939
Strongback	0.422	3399.999

Dimensions in mm

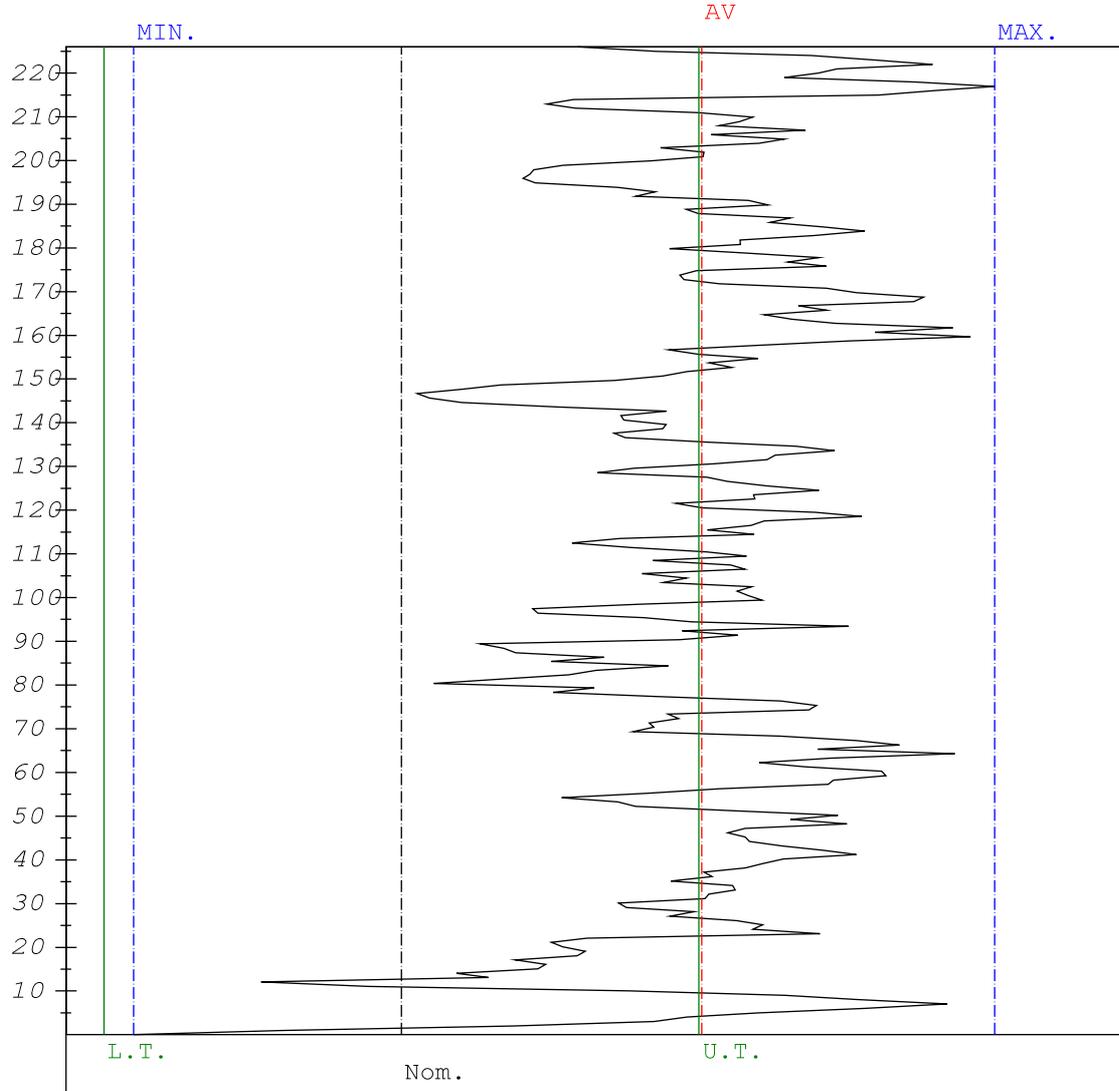
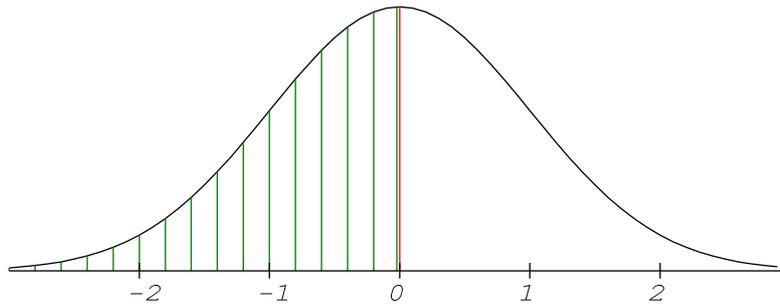
Angles in mrad



MMF GRE 45129

Undulator Dimensional Fiducialization Post Magnetic Alignment

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Nominal : 4.5000	Averag : 5.0047	Cent.-Dev. : 0.5047
Up. Tol. : 0.5	Maximum : 5.4974	U.Tol.Ex. > : 50.9 %
Low.Tol. : -0.5	Minimum : 4.0501	L.Tol.Ex. < : 0.0 %
Spl.Size : 226	Stand.-Dev.: 0.2189	In Tolerance: 49.1 %
Outlier : 0	Distribution : NOR	Dimension : mrad



Statistical Evaluation
Pole Tip Gap Angle
Post Magnetic Alignment

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