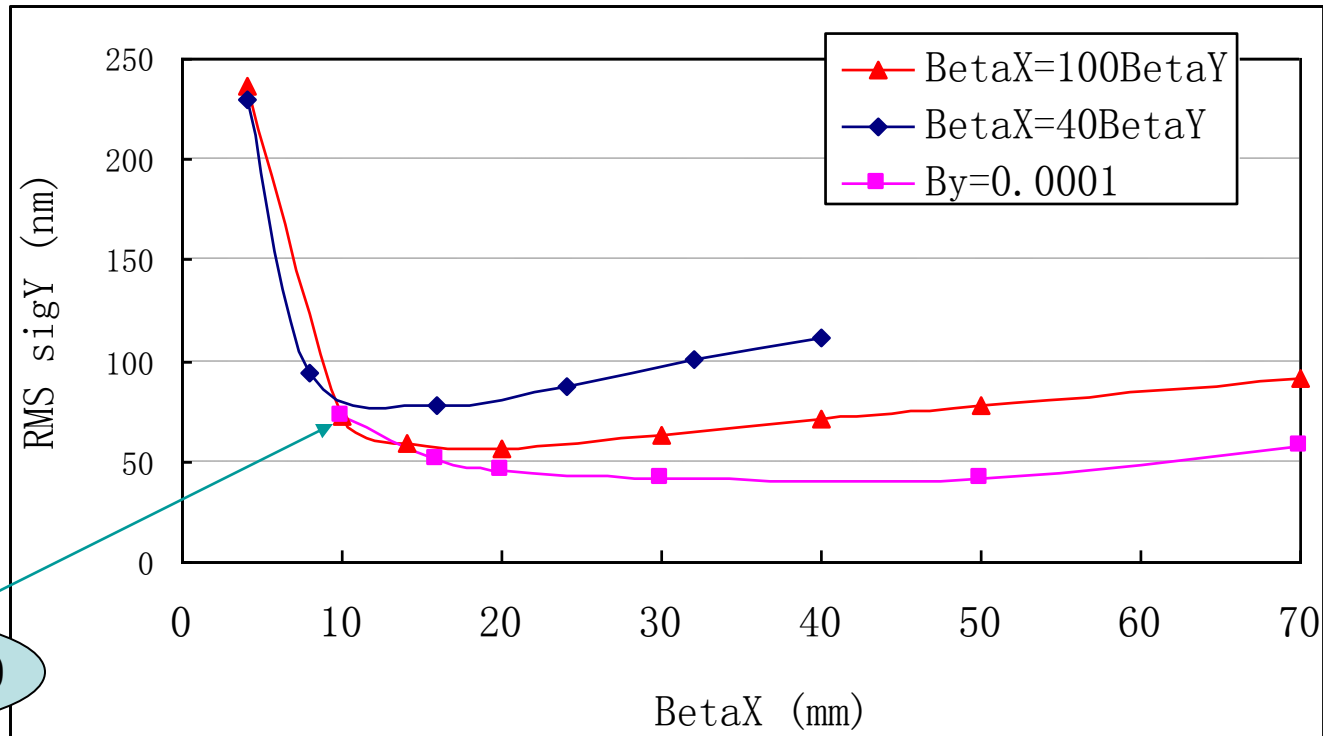


# 1<sup>st</sup> strategy discussion: issue of magnet quality

- (1) Magnet swaps ( $\sim 4-6$ )  $\rightarrow$  benefit threshold ?
  - (2) Rotate sextupoles based on magnetic measurements  $\rightarrow$  safe ?
  - (3) Tune installed skew sextupole  $\rightarrow$  reliable ? (Cf. Glen's talk)
  - (4) Increase  $\beta^*$  for more tolerance to uncertainty
- $\rightarrow$  re-evaluate above with more complete knowledge of multipoles now available (e.g. angle reference)

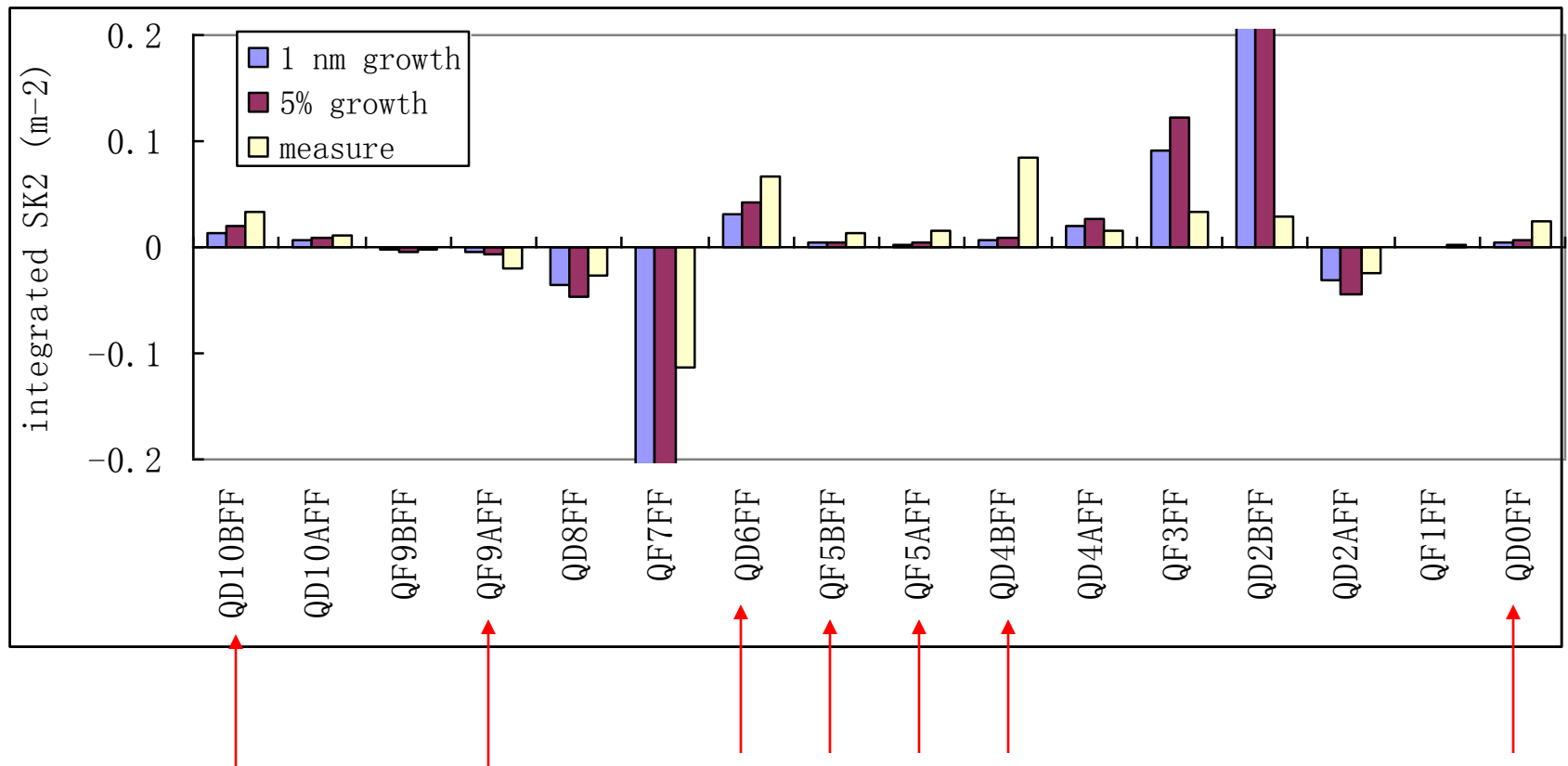
# betaX\* optimization



BX2.5BY1.0

- When  $\beta X^* > 1$  cm, the effect of multipoles become weaker.
- A new lattice has been designed using MADX and MAPCLASS, namely BX2.5BY1.0.

# Comparison of skew sextupole measurements and sensitivities for FFS quadrupoles



This suggest how the swapping should be made.

# skew sextupole tolerance compared to the measurement for the quadrupoles

Best quadrupoles: QM15FF, QD10X, QF11X, QF17X, QD18X

Worst quadrupoles: QD4BFF, QD0FF, QF5AFF, QF9AFF, QF5BFF

