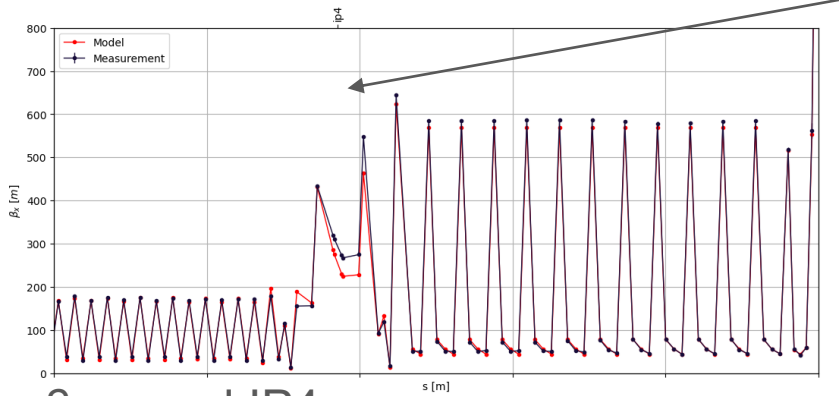


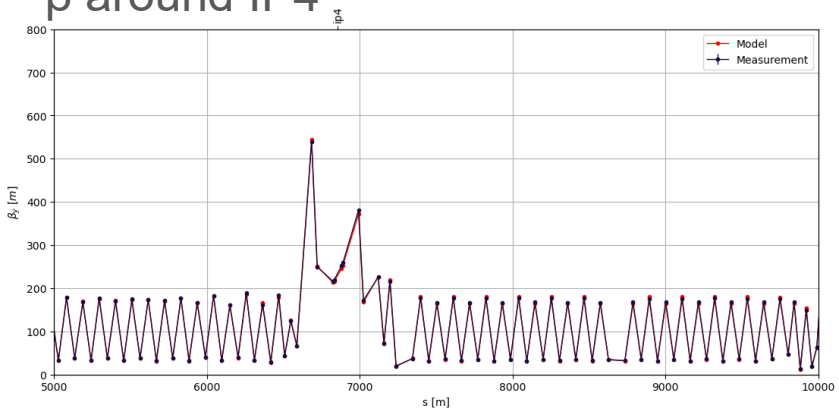
# HV optics MD and local arc errors

OMC Meeting, 26-11-24  
Yannis Angelis

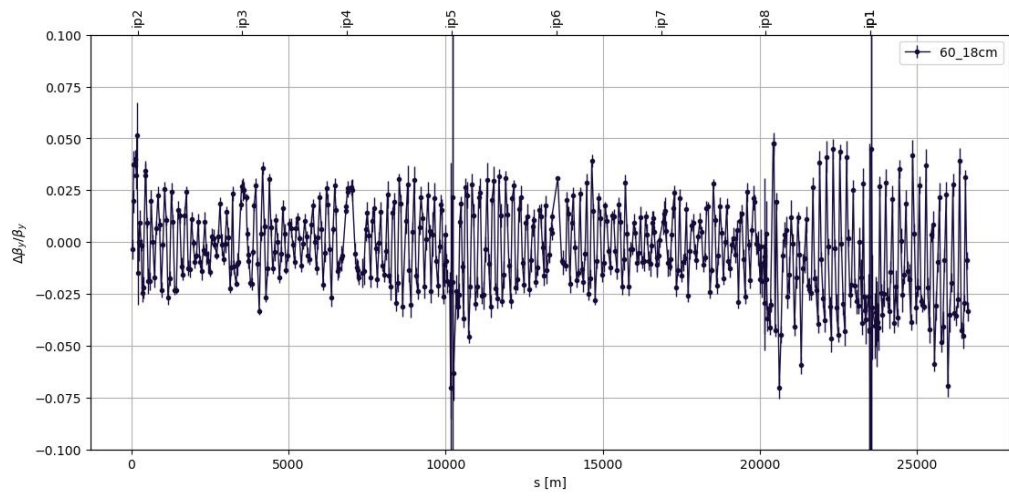
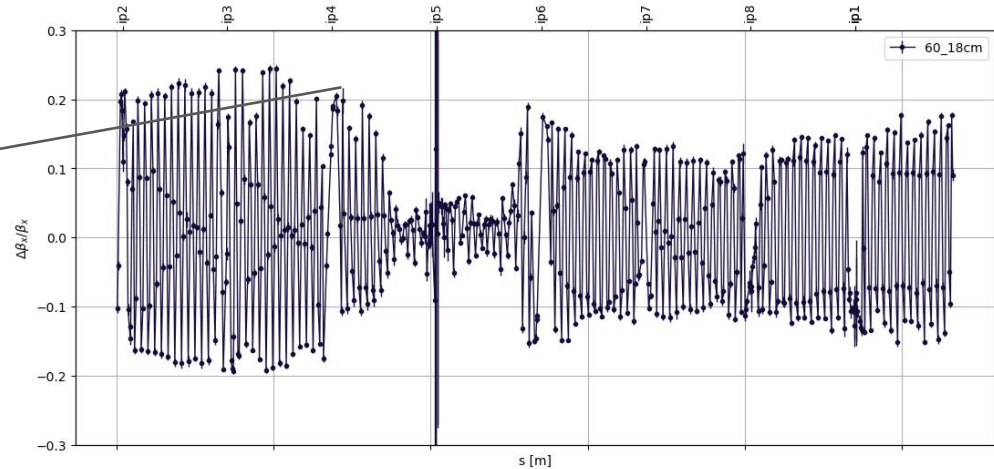
# Beam 1



$\beta$  around IP4

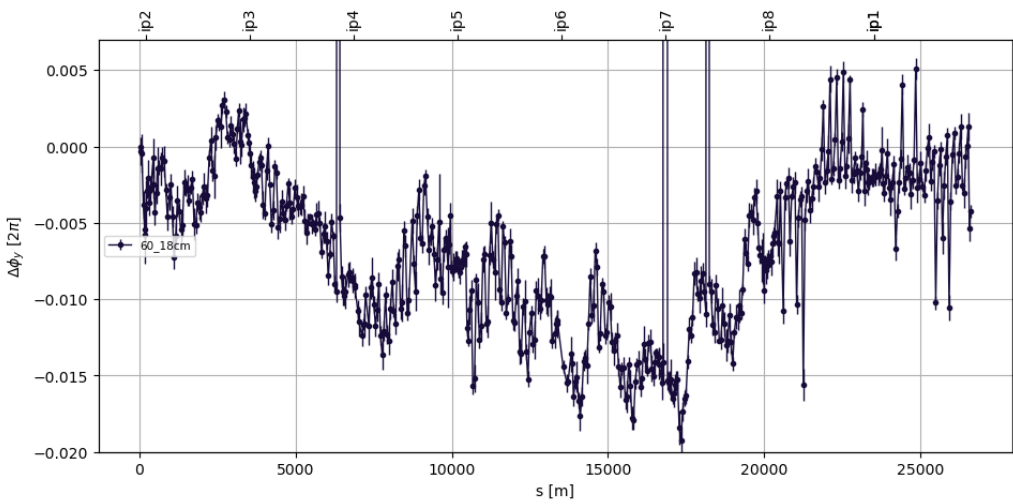
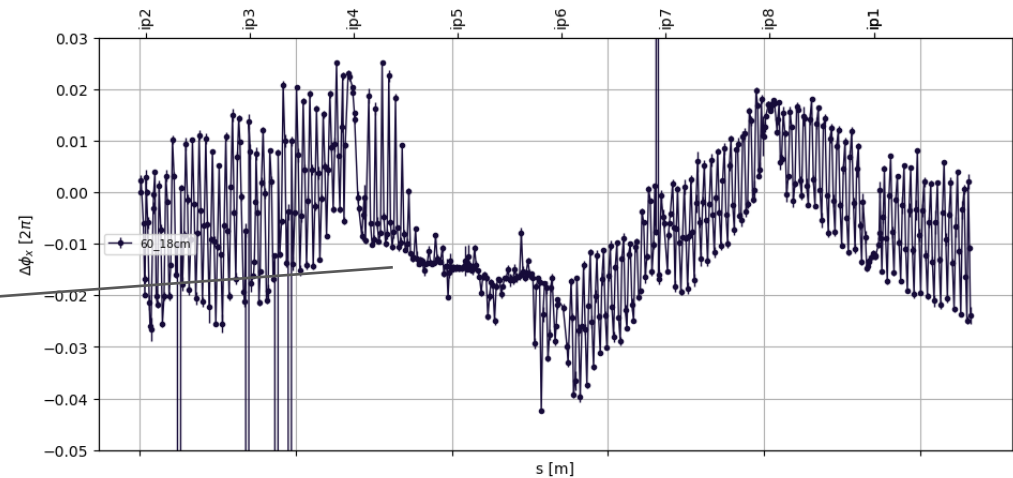
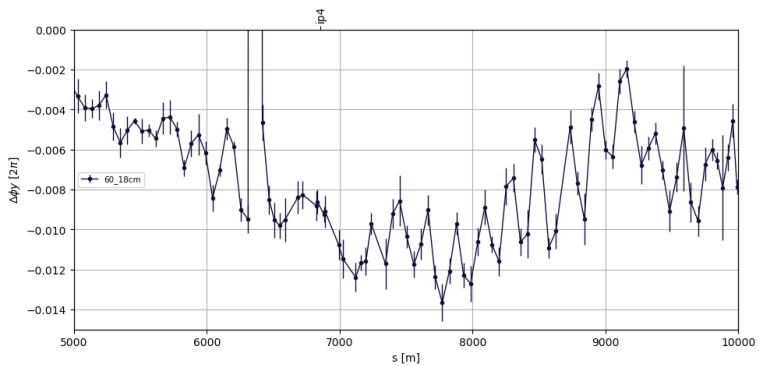
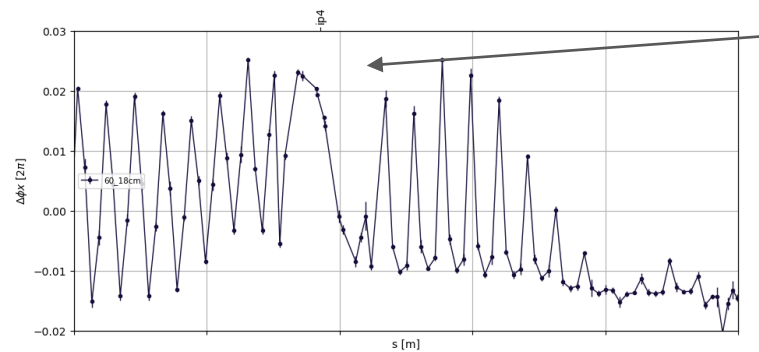


# Beating



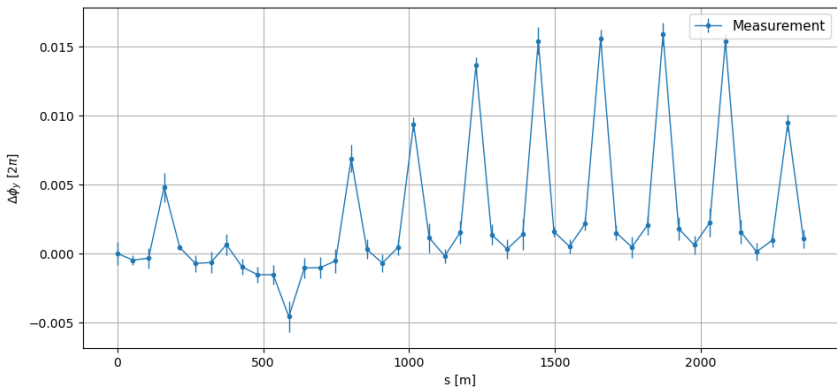
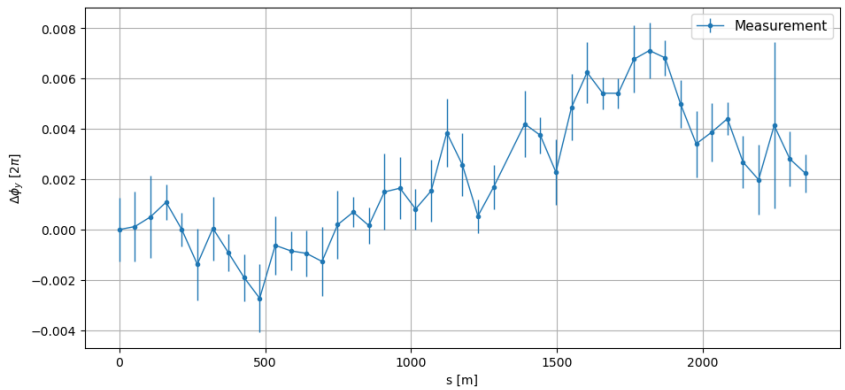
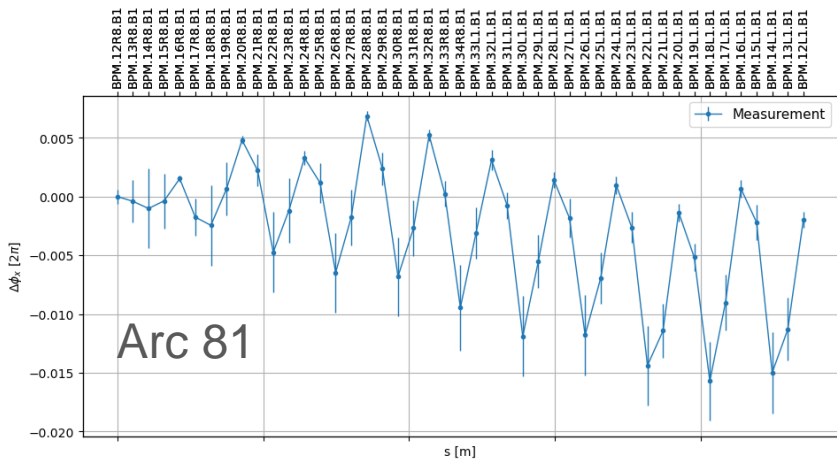
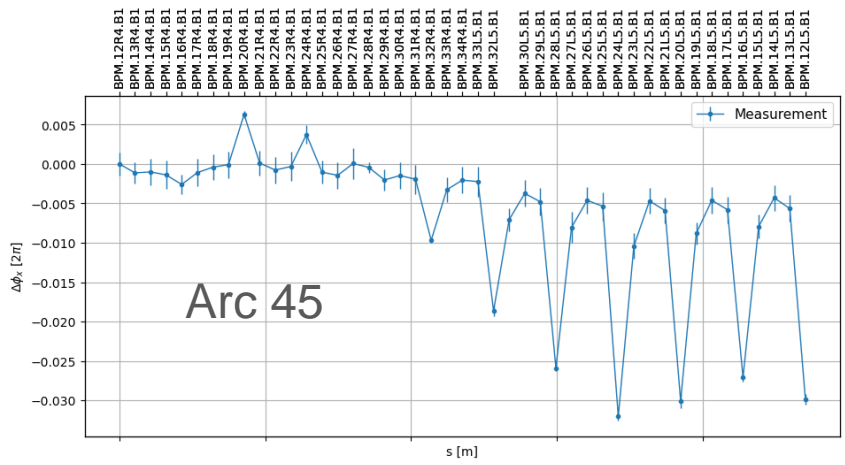
# Beam 1

Zoomed in around IP4



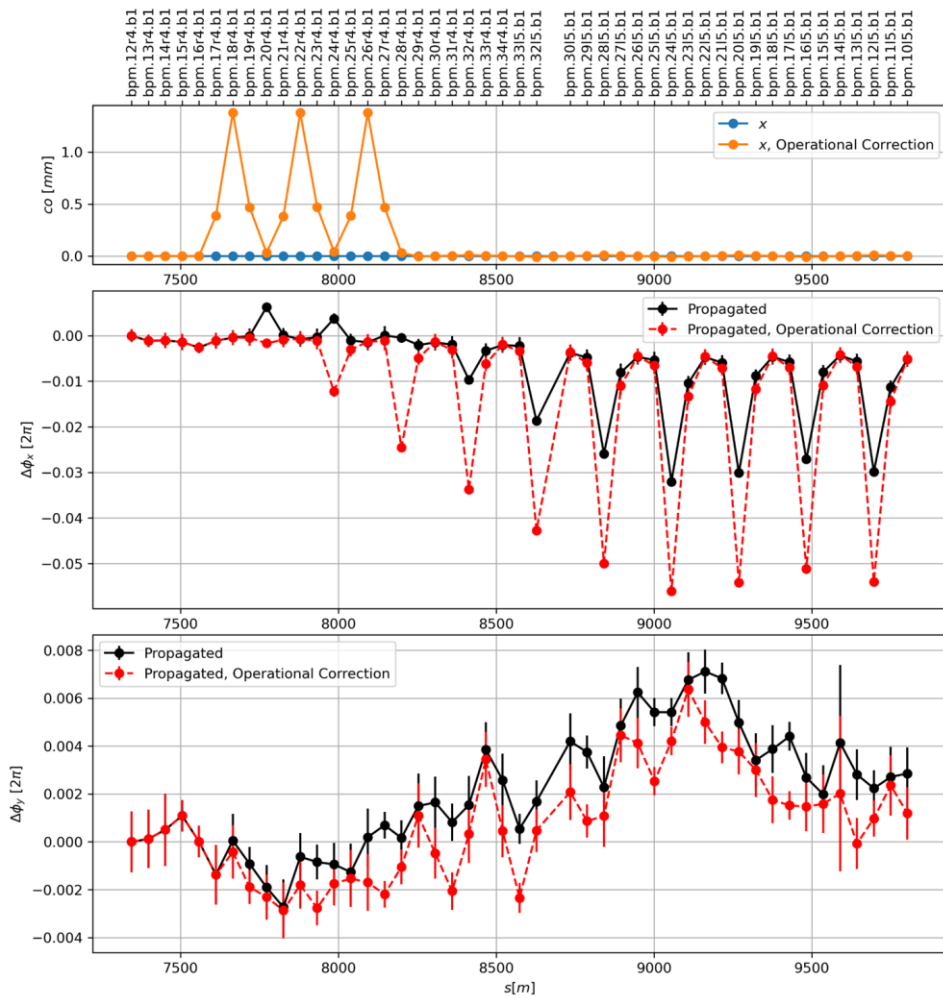
# Beam 1, Segment by Segment

The two arcs with corrections



# Beam 1, Segment by Segment

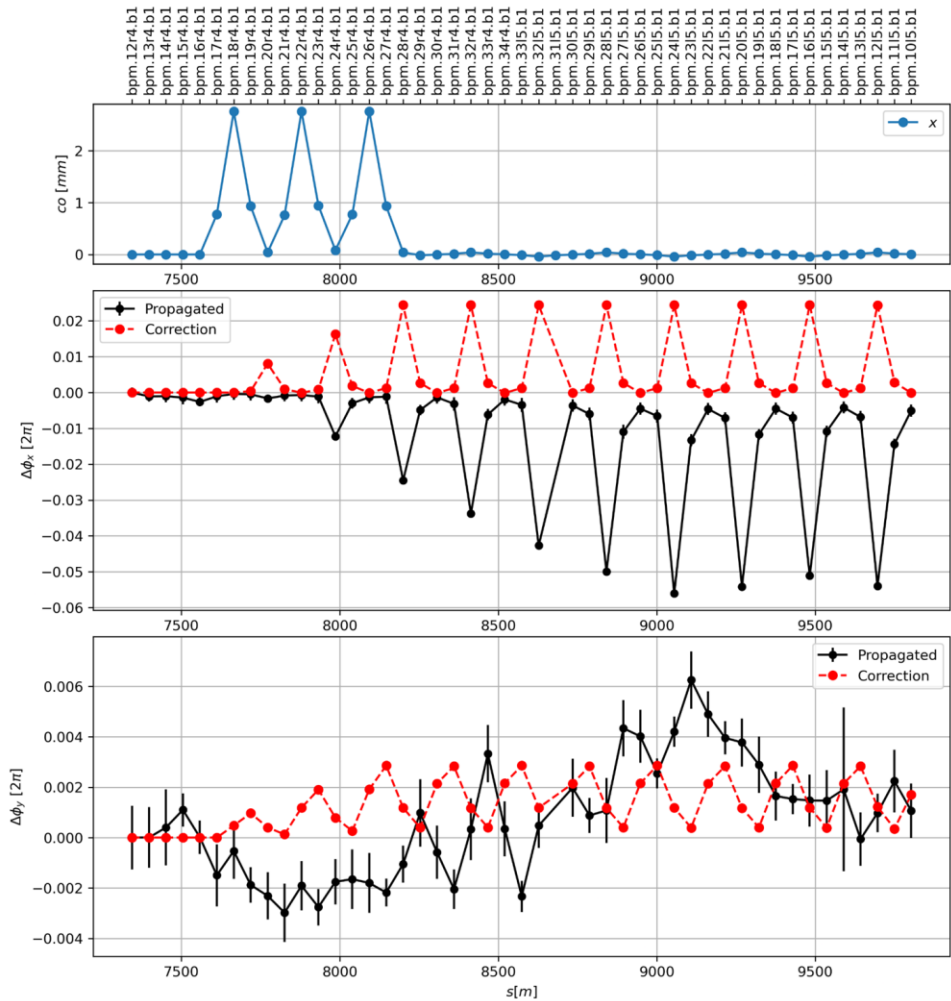
To study extra corrections, we should include operational corrections into the model



# Beam 1, Segment by Segment

Including correction in the model

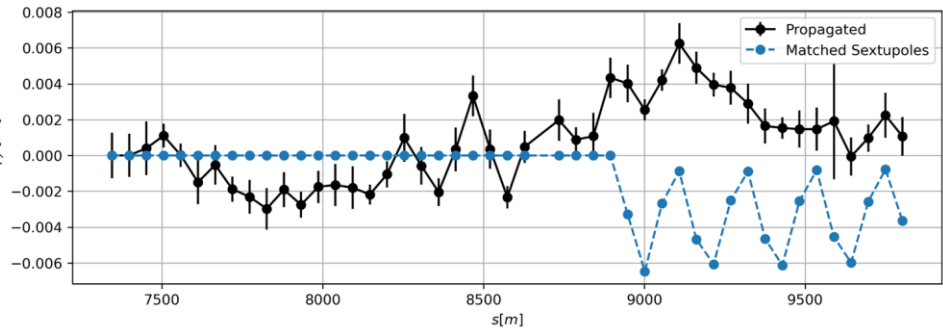
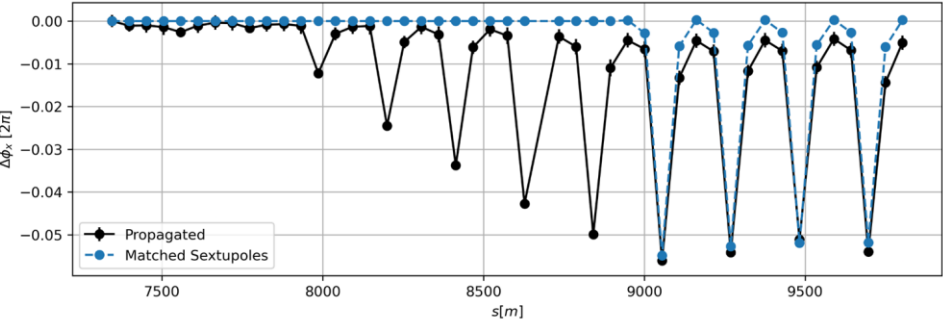
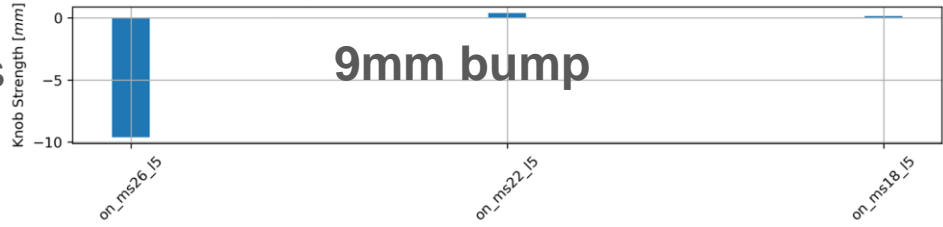
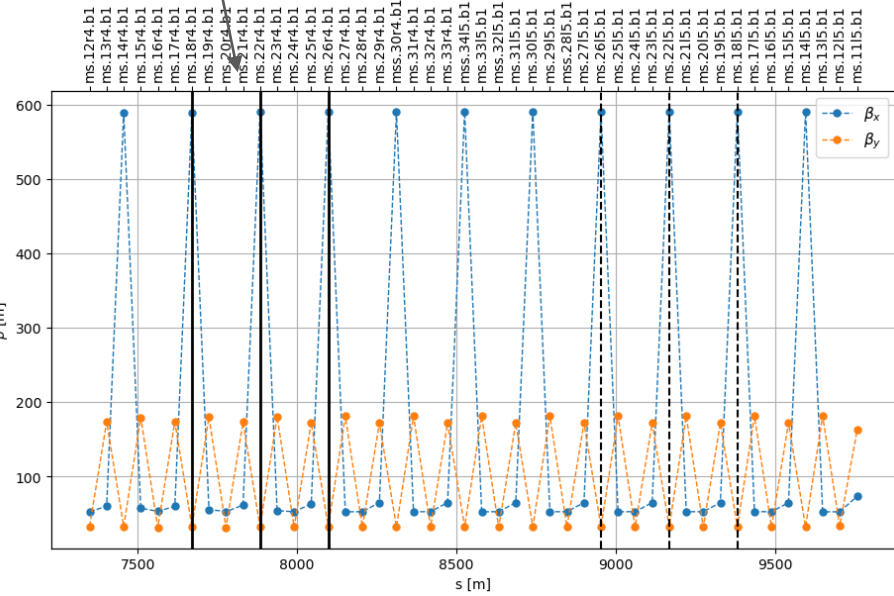
Simple approach: Knob at value 2



# Beam 1, Segment by Segment

Including correction in the model

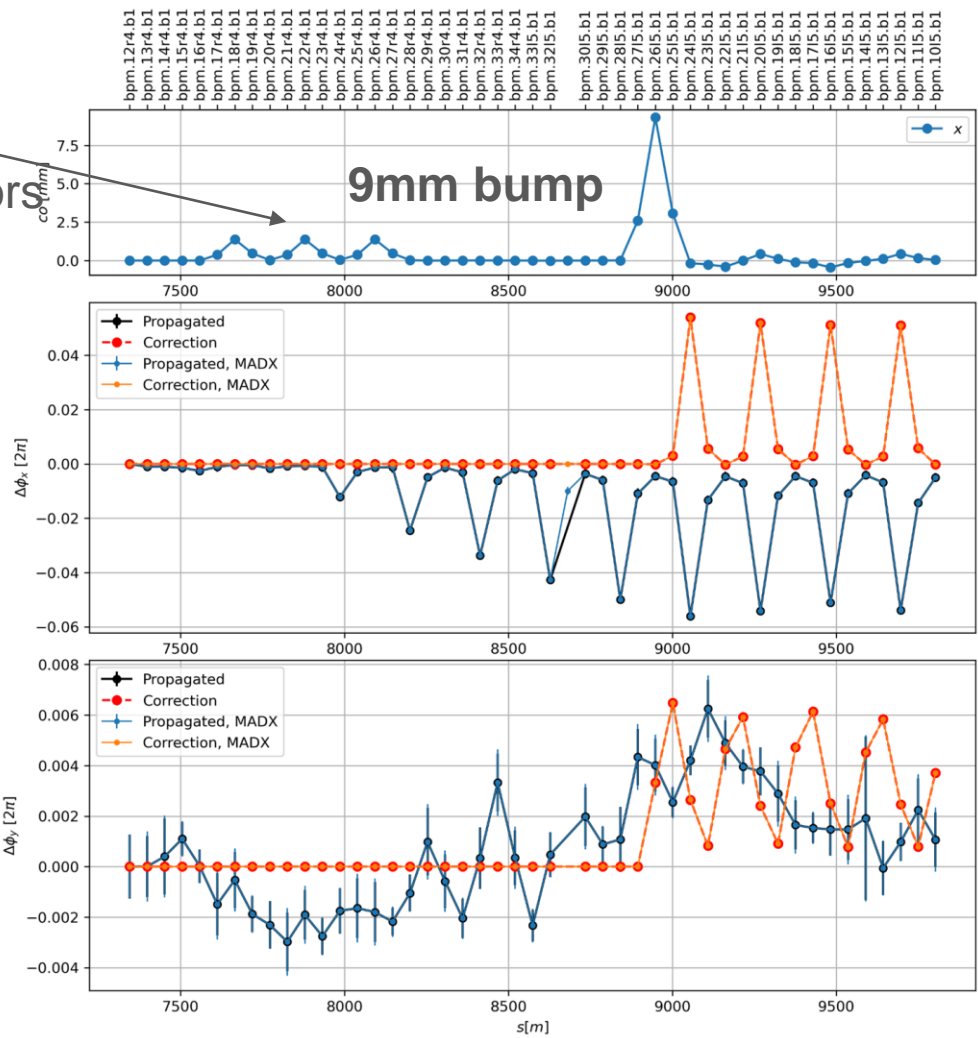
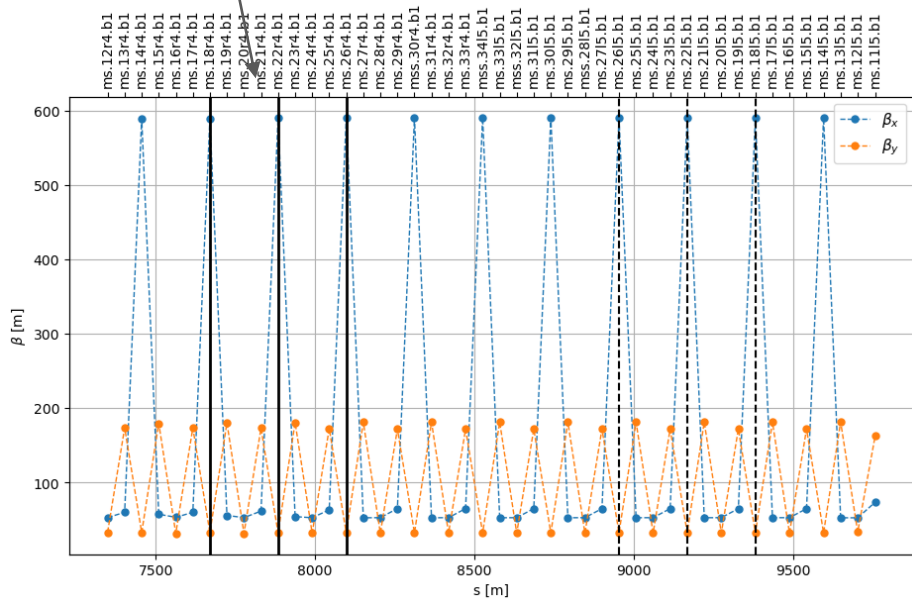
Response matrix approach with phase errors for individual sextupole bumps



# Beam 1, Segment by Segment

Including correction in the model

Response matrix approach with phase errors for individual sextupole bumps



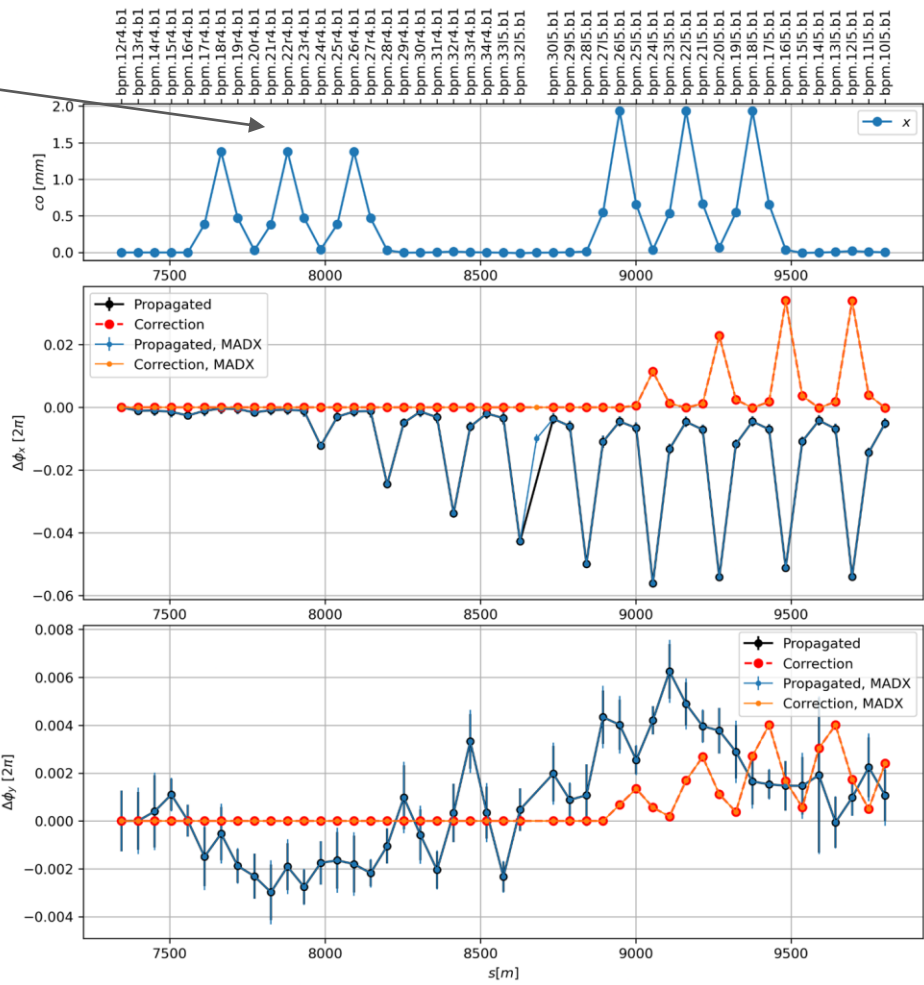
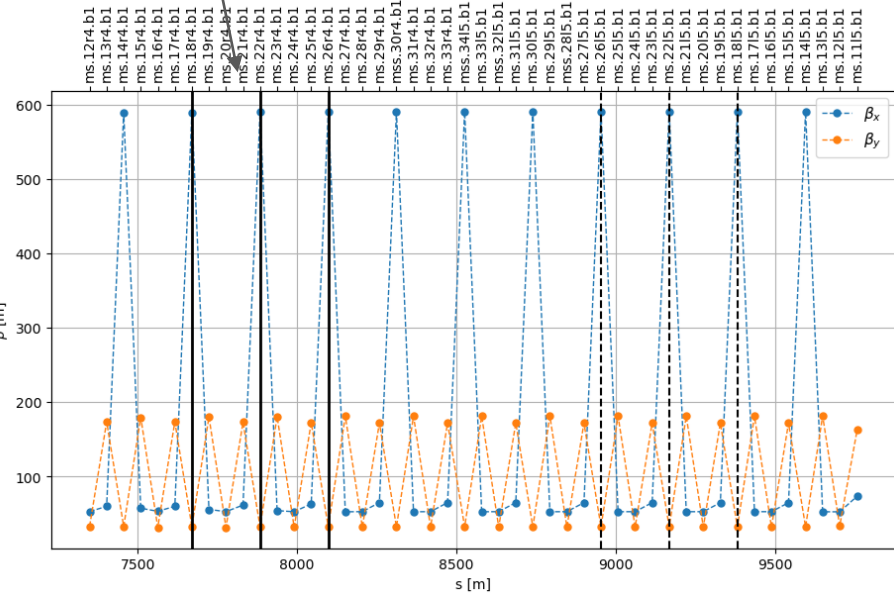


# Beam 1, Segment by Segment

Including correction in the model

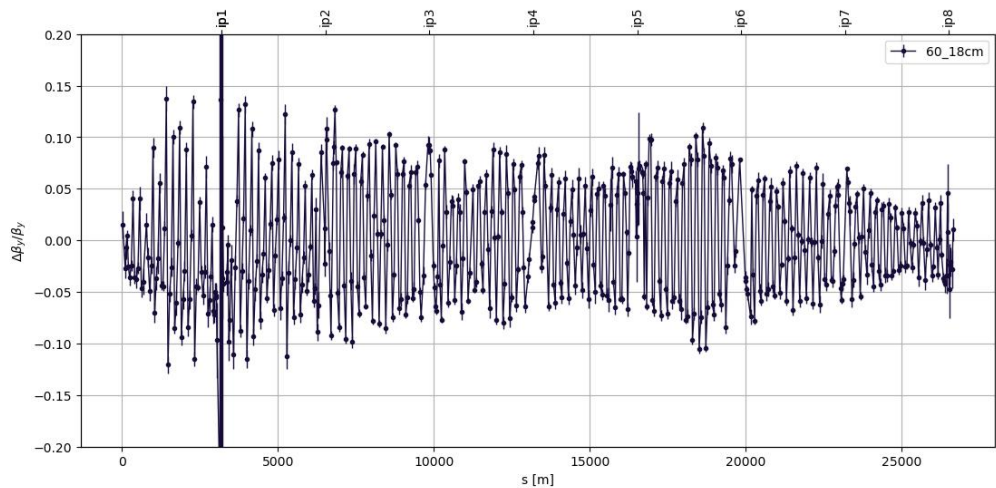
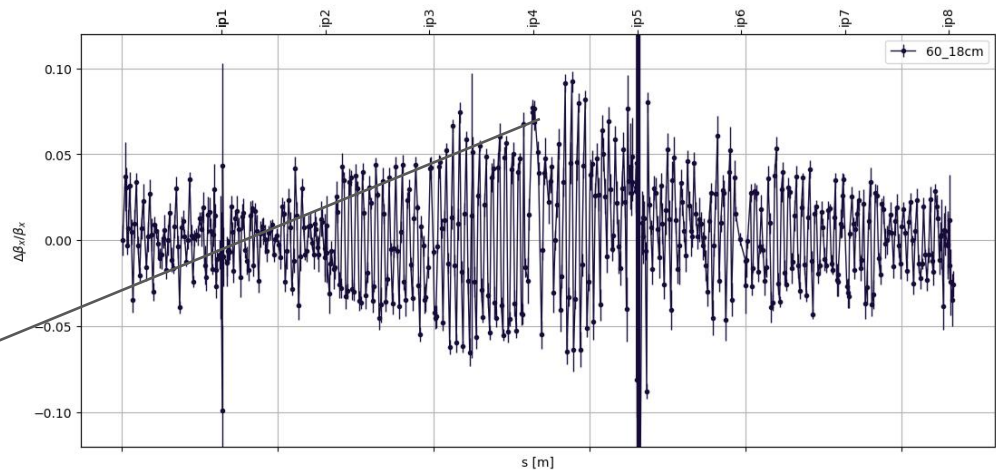
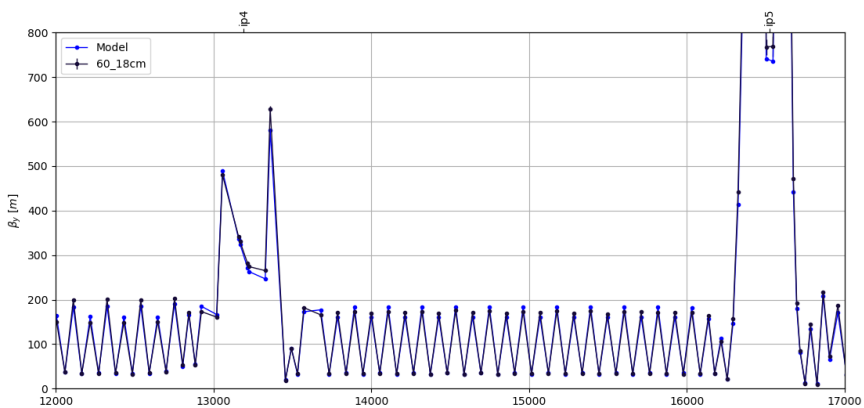
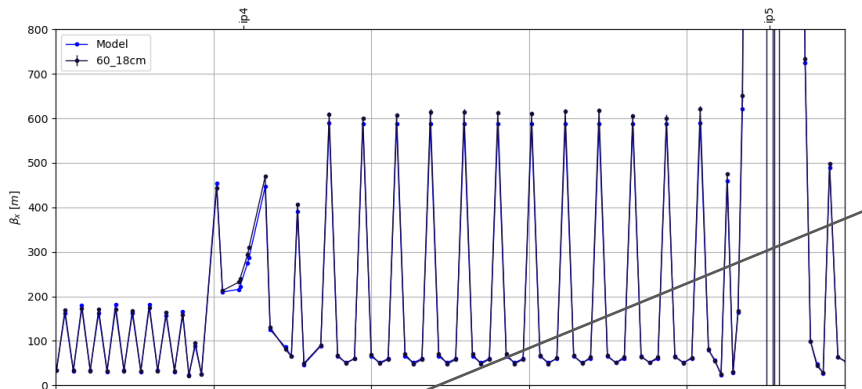
Response matrix approach with phase errors for individual sextupole bumps

Setting new corrections by hand to 2



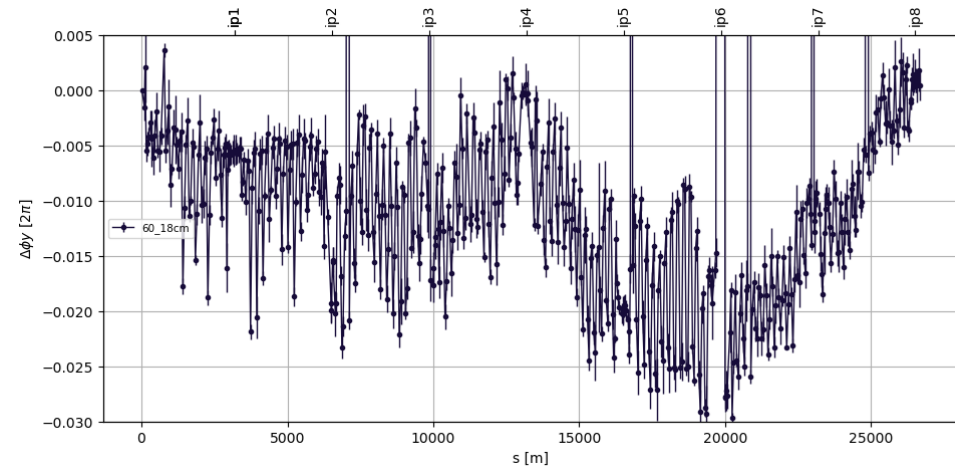
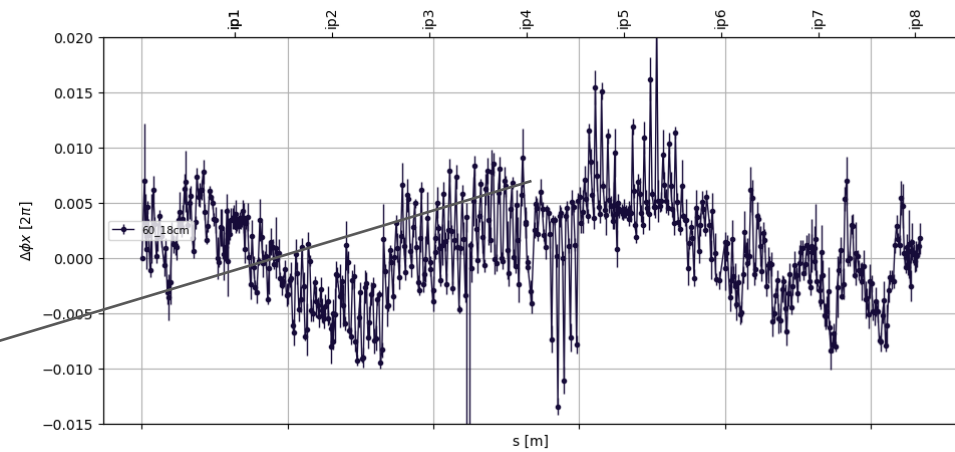
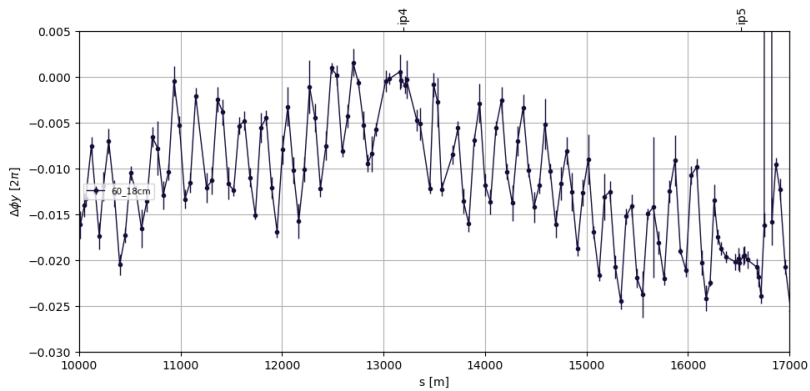
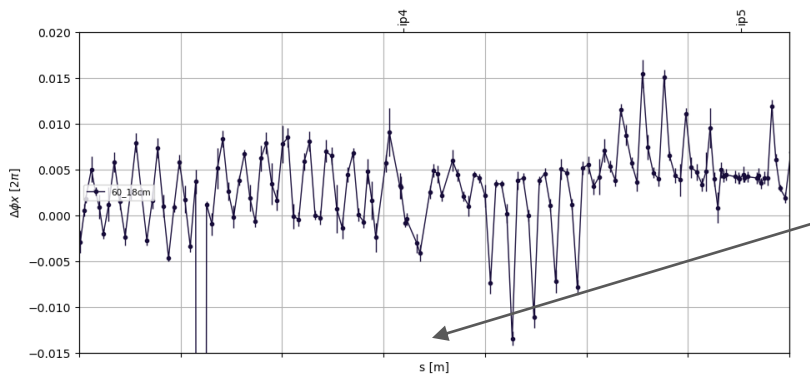
# Beam 2

## Zoomed in around IP4



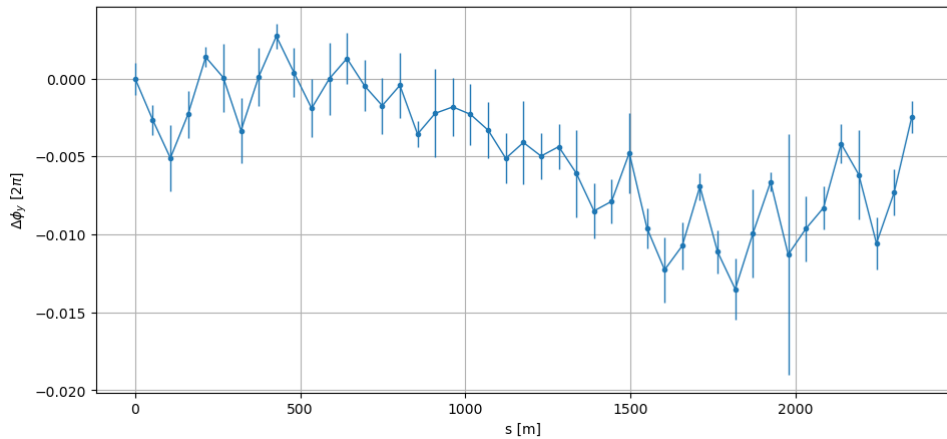
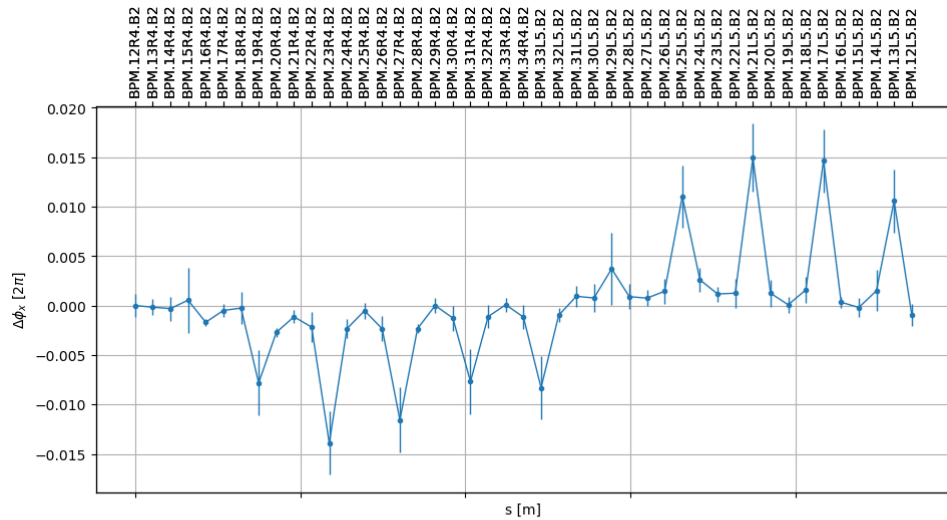
# Beam 2

Zoomed in around IP4



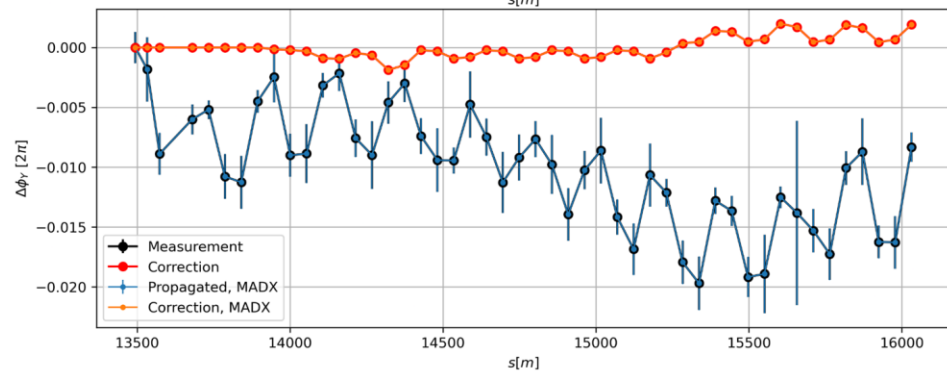
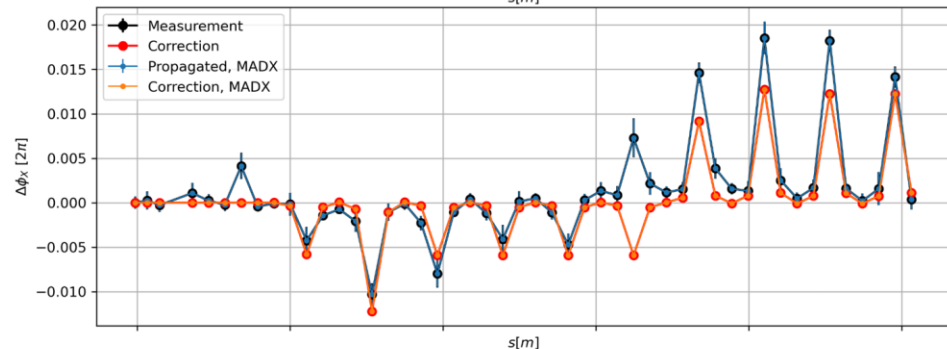
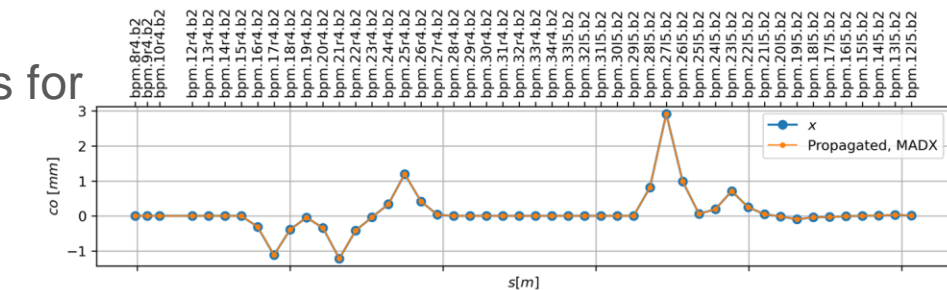
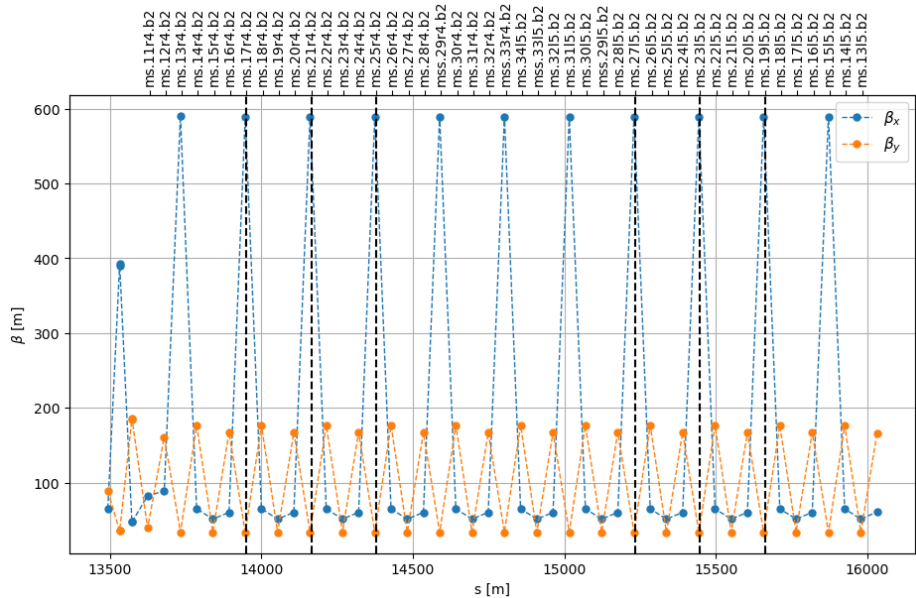
# Beam 2

No arc corrections in Beam 2



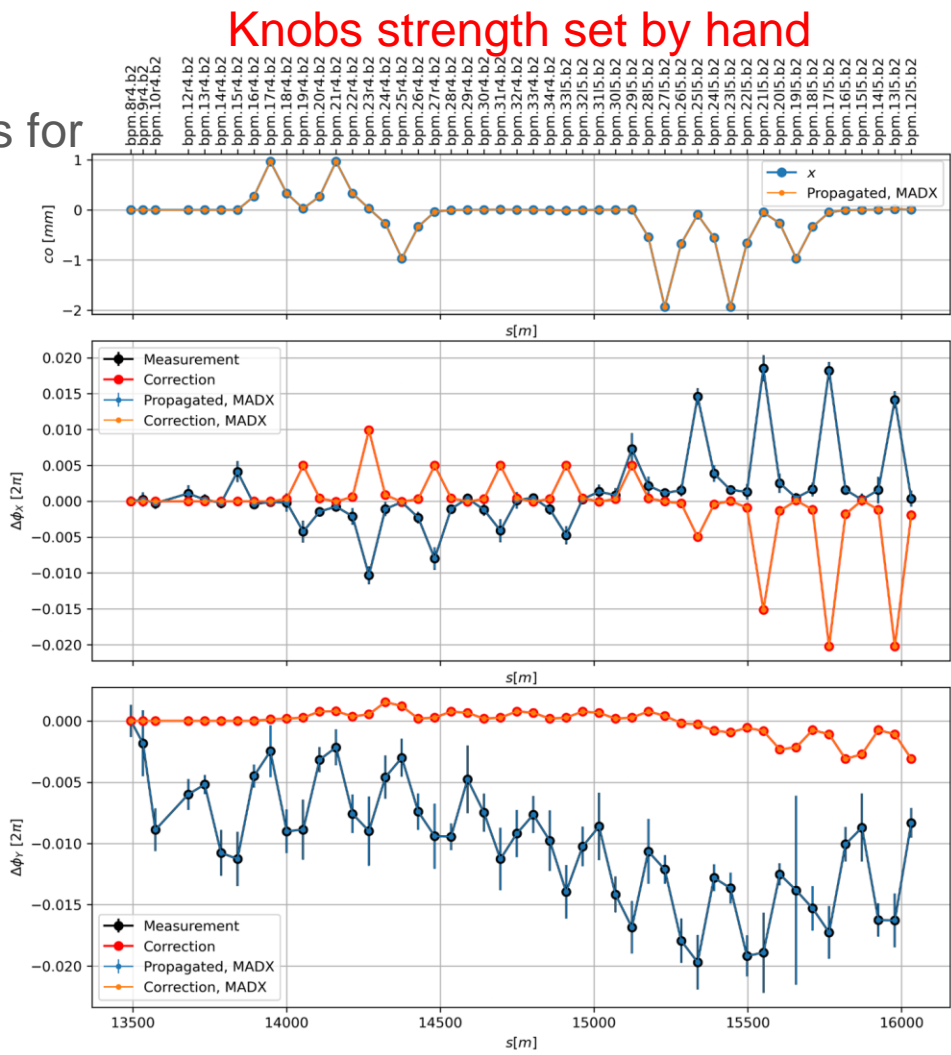
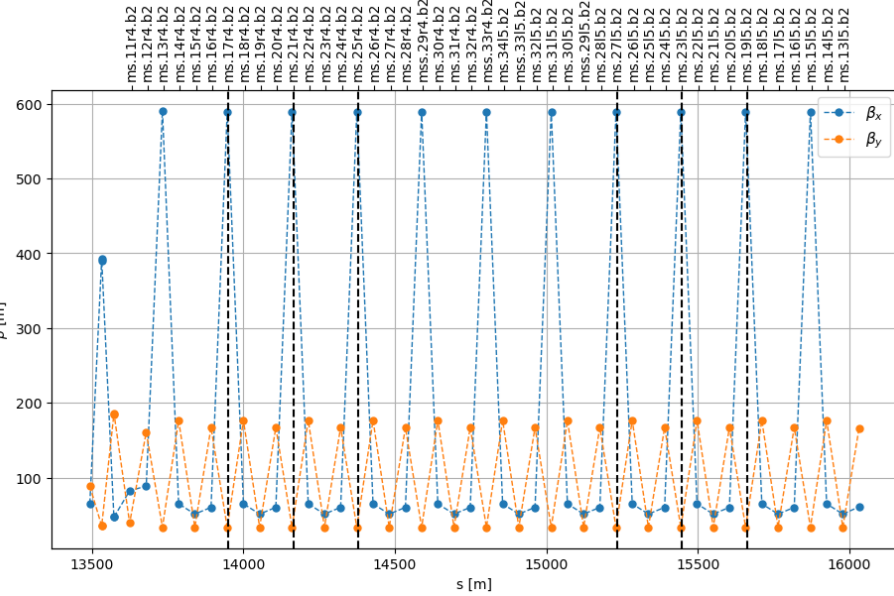
# Beam 2, Attempting corrections

Response matrix approach with phase errors for individual sextupole bumps



# Beam 2, Attempting corrections

Response matrix approach with phase errors for individual sextupole bumps



# Beam 2 DY

