

# 1DPAMZT Model Recalibration

Drivers:

Fit 3-FEPs/0 Video Board configuration now that there is enough data

1DPAMYT On this back wall facing away.

1DPAMZT Therm  
Add HRC-I and HRC-S bias parameters

-Z ←

Solarheat dP's min values set to 0.0

More accurate model preparatory to considering increasing Planning and Yellow High limit

# Summary of Changes

Added Pseudo-node to adjust model response.

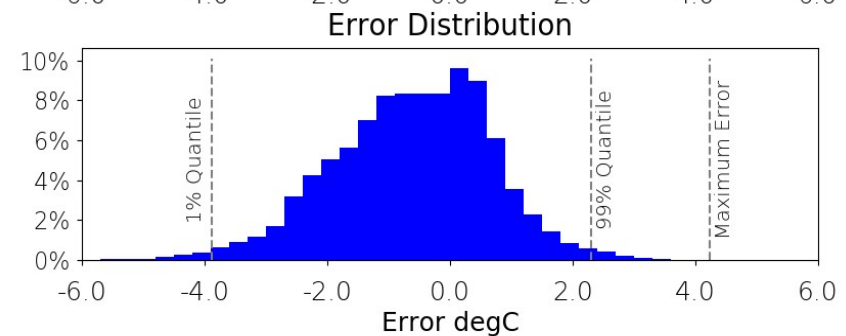
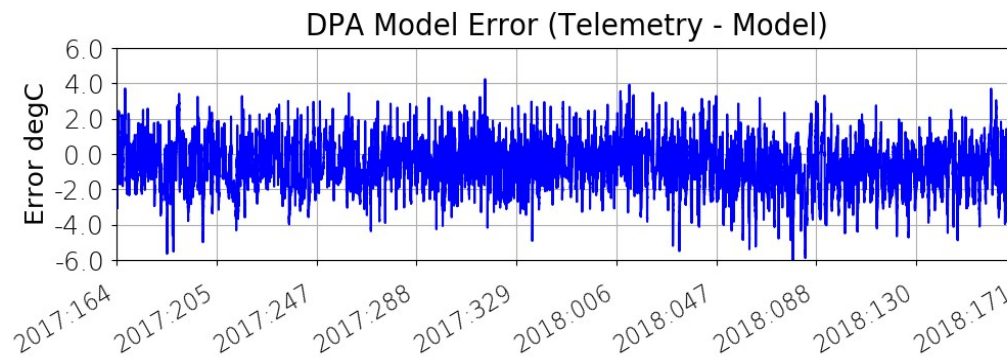
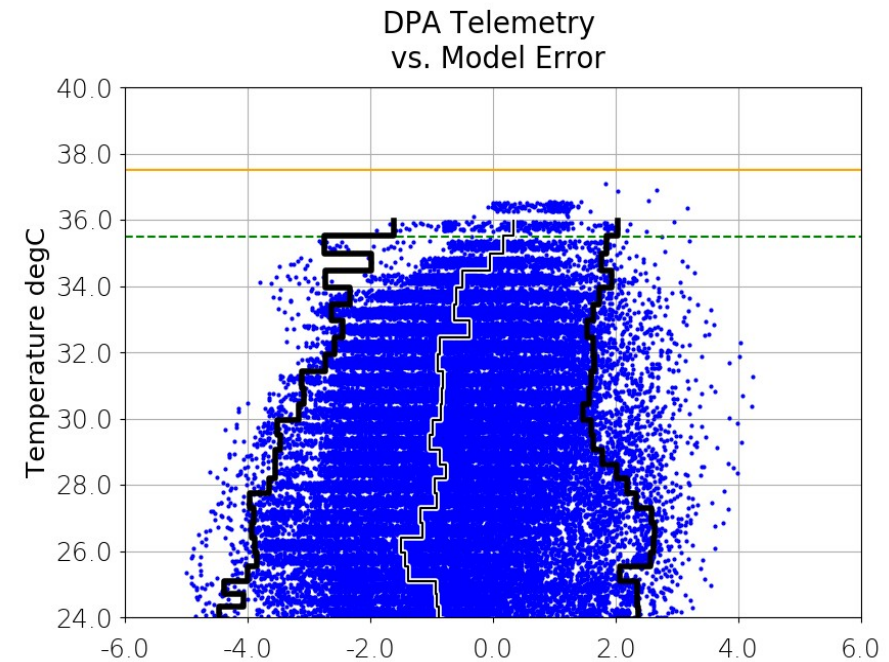
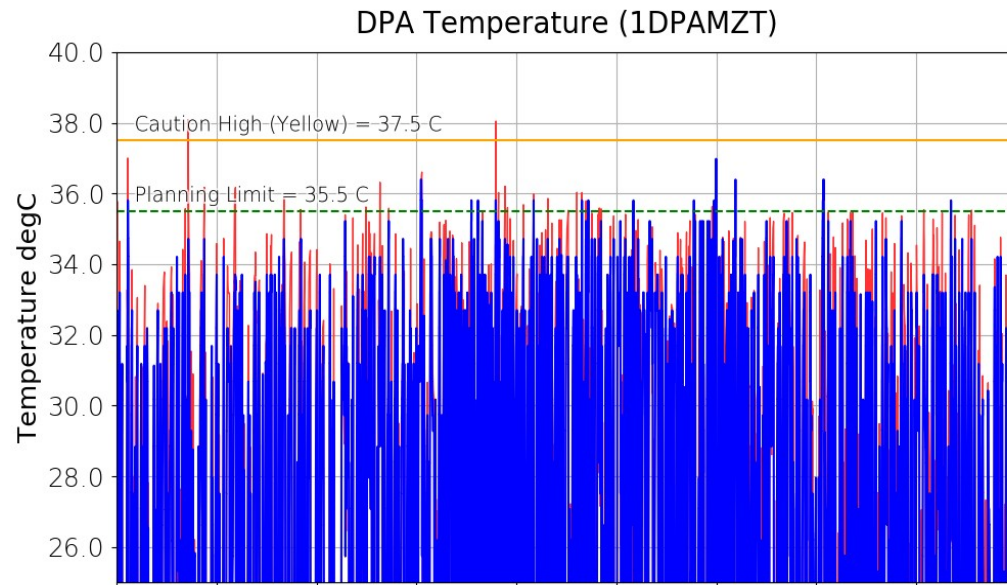
Added several pitch bins

Set min values of solarheat dP's to 0.0

Cleaned up power coefficients

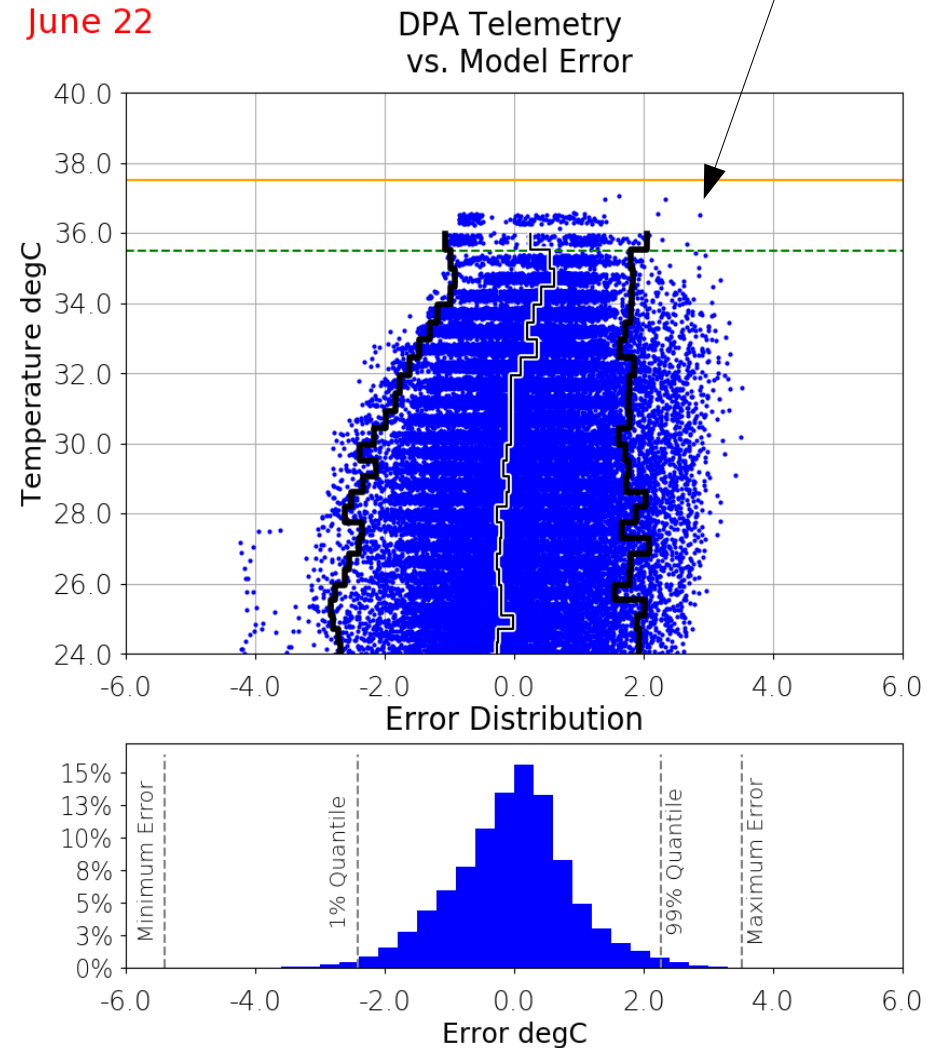
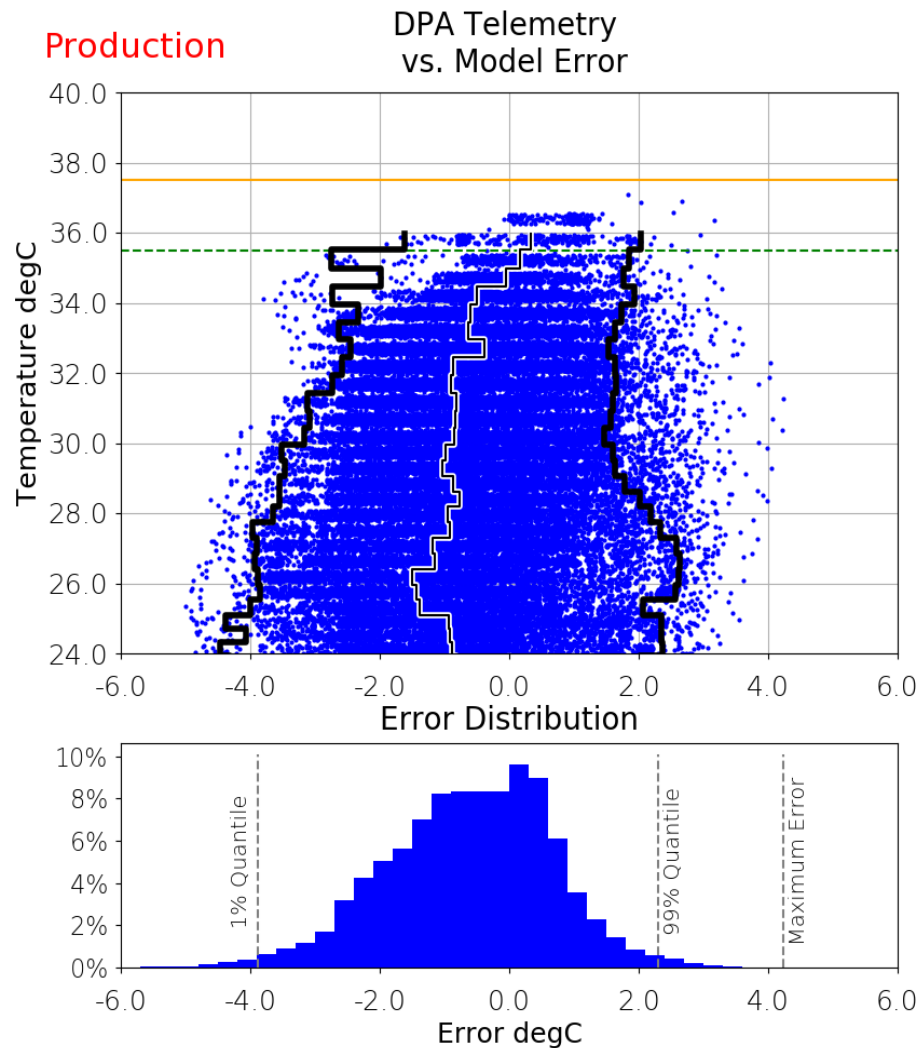
e.g. Removed 55x0; replaced with 5xx0 and 5xx1

# Production Dashboard (2017 Fit)



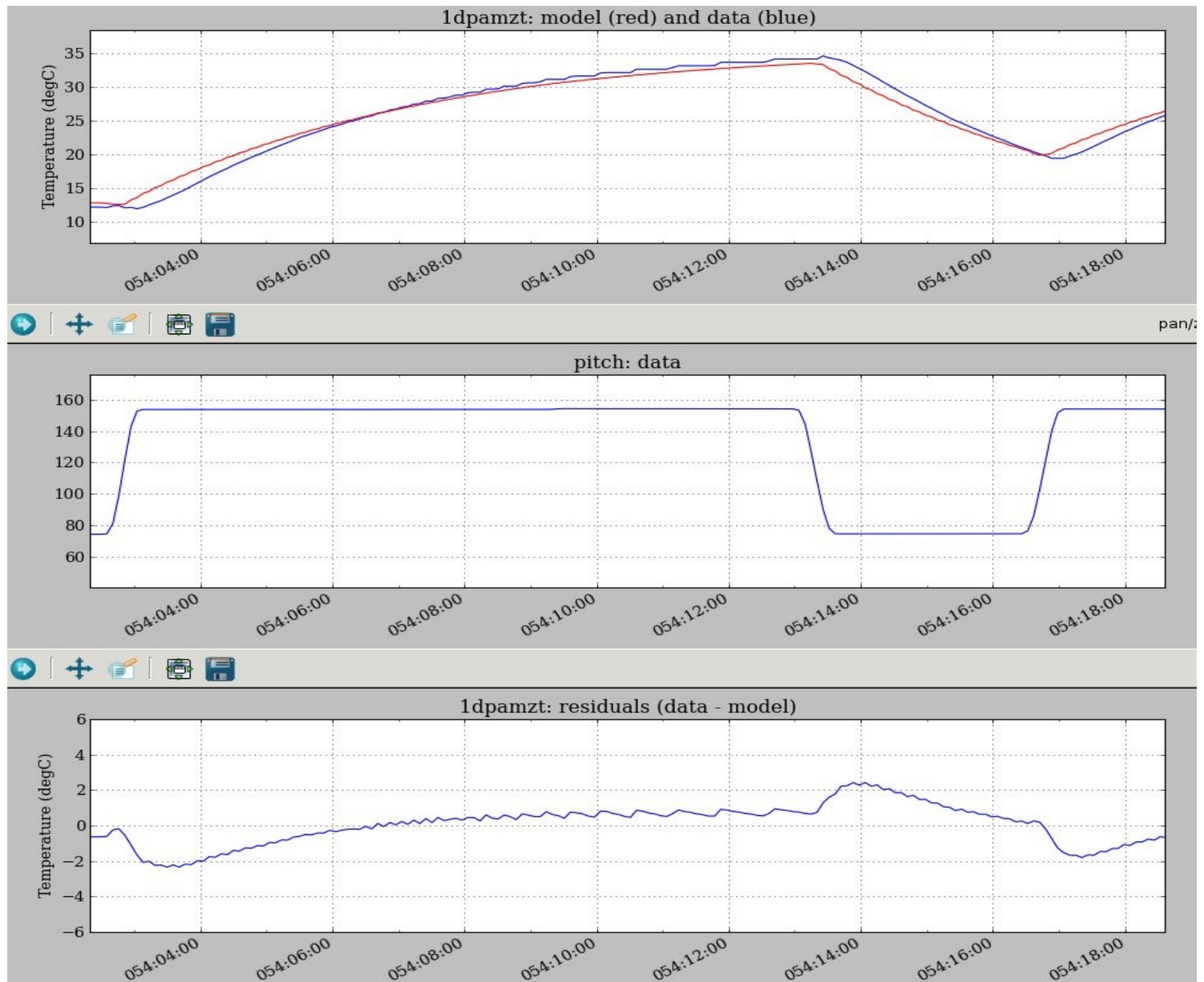
# Error Plots: Production v June 22

Problem Temps

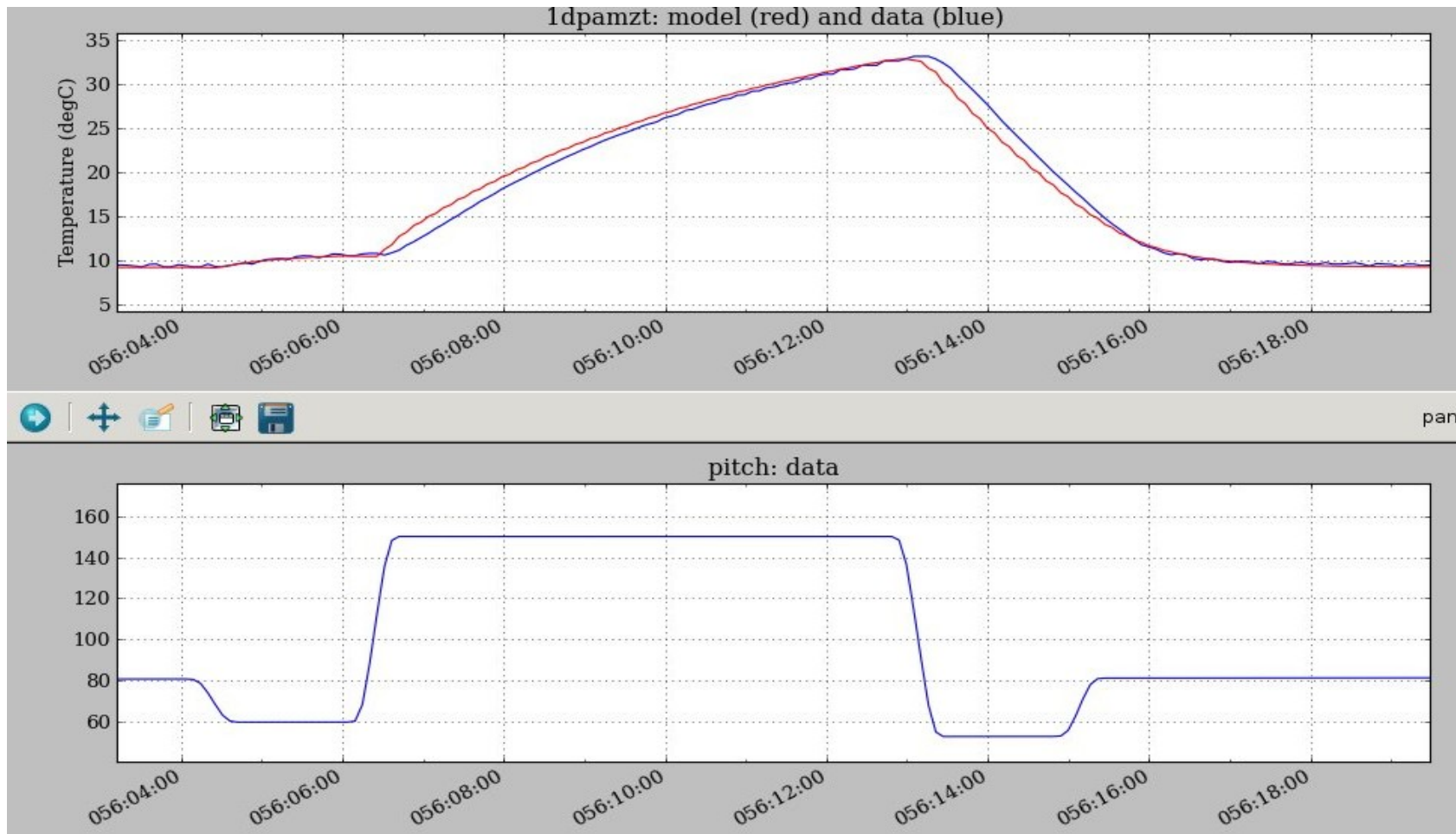




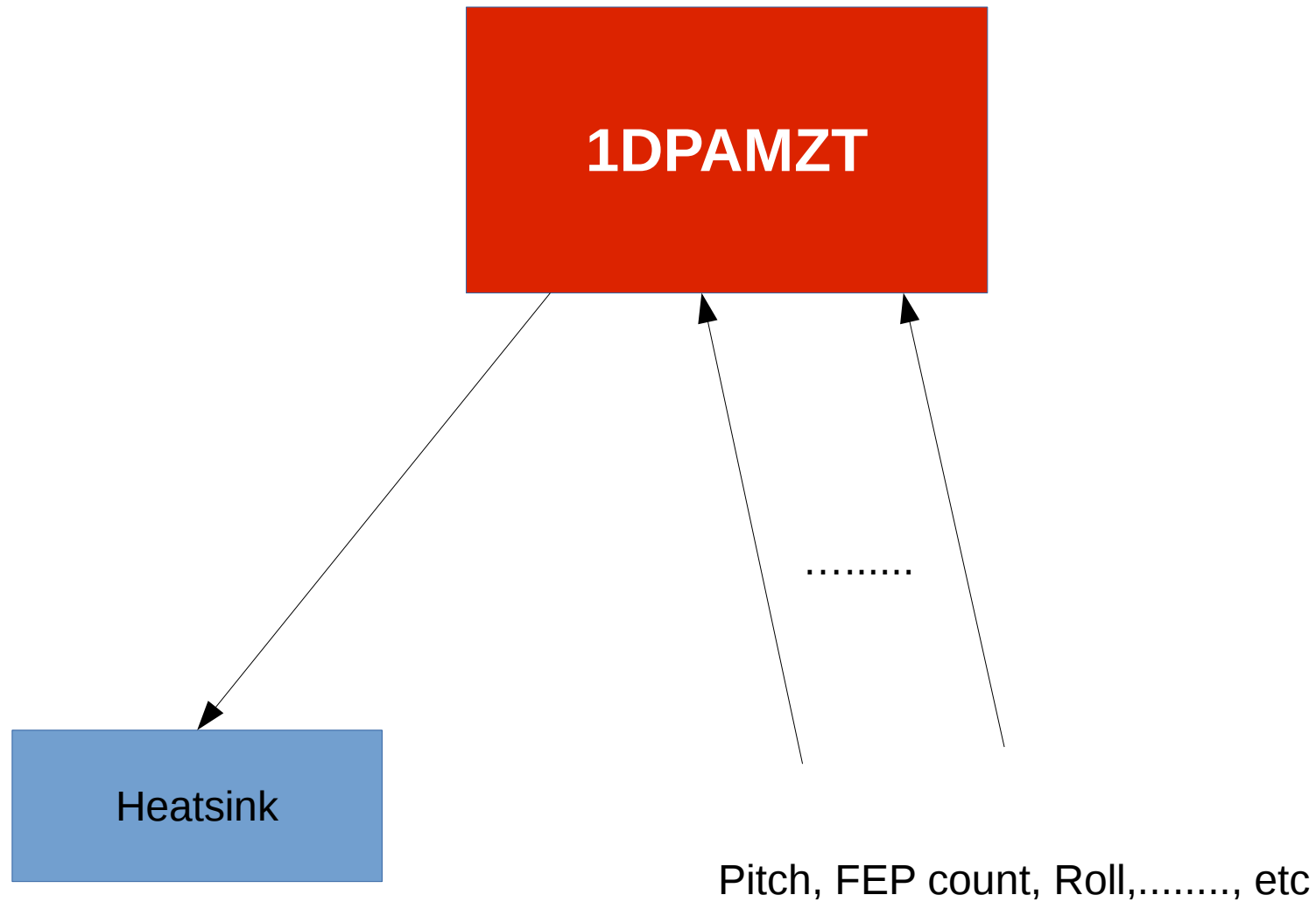
# The Cause: Model Leads Data (DOY 054)



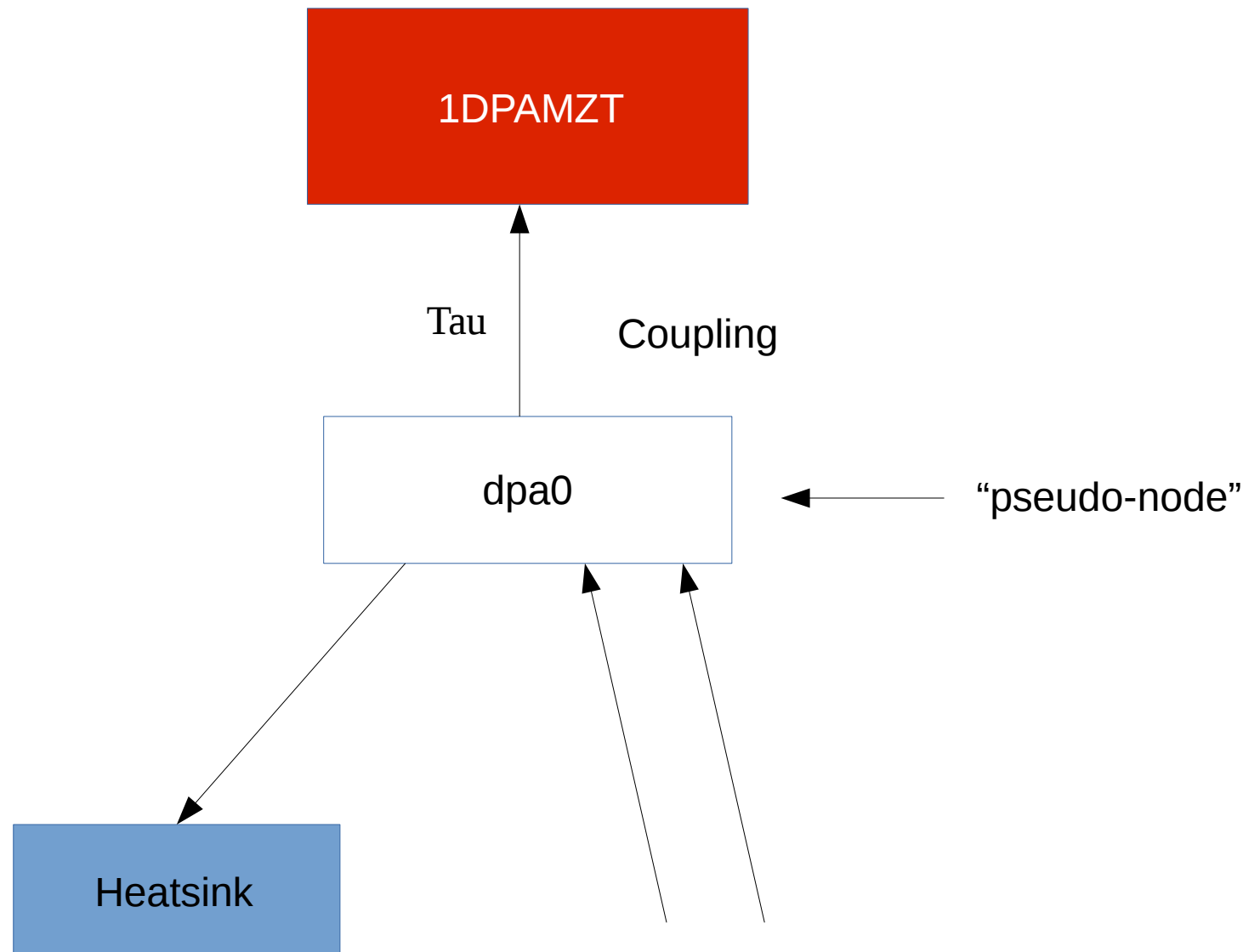
For every “problem temperature”, (and at many other less critical temperatures), the model leads the data and it occurs at the Pitch changes. (DOY 056)



# Original Model Configuration

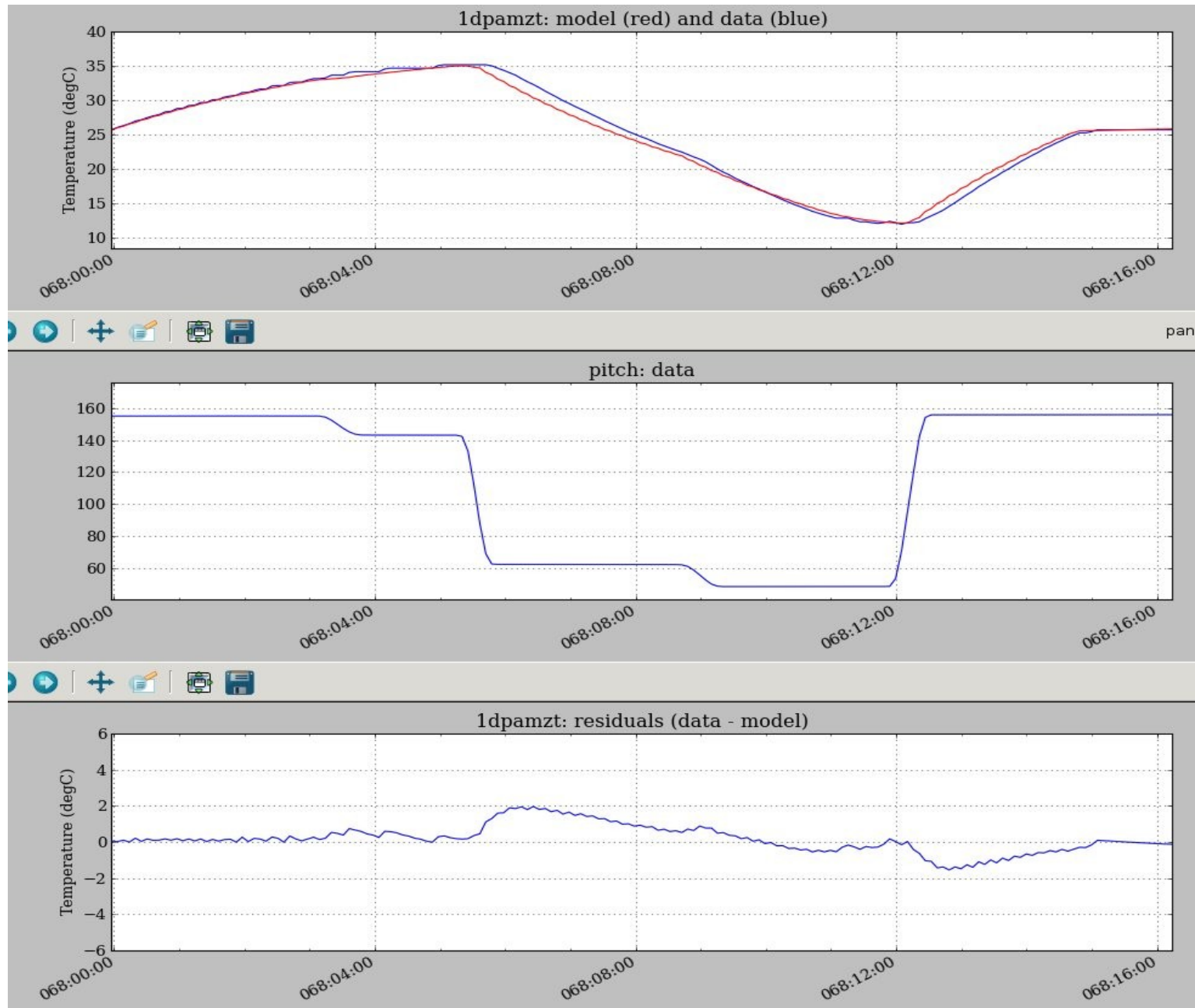


# Pseudo-node To Regulate Model Response

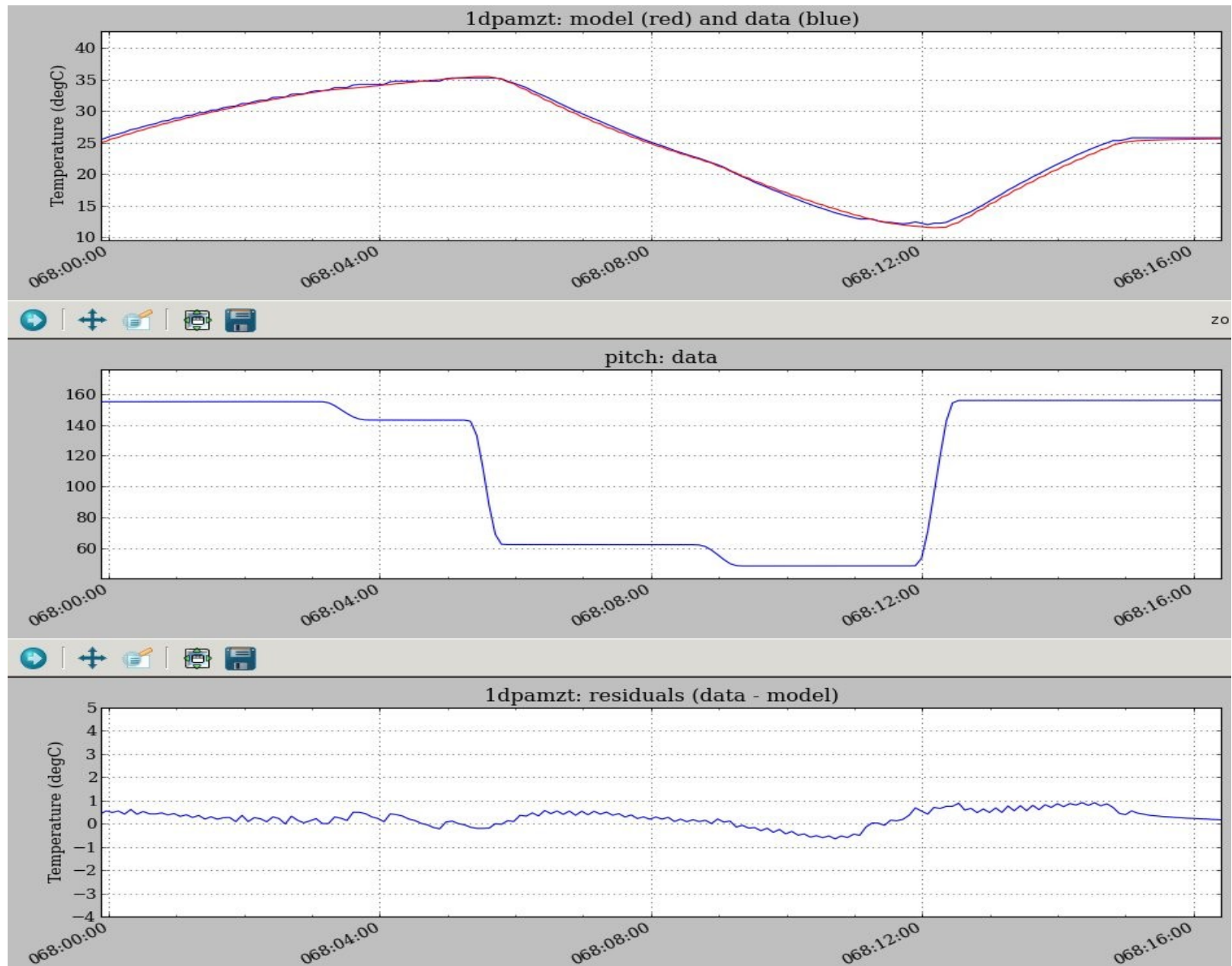




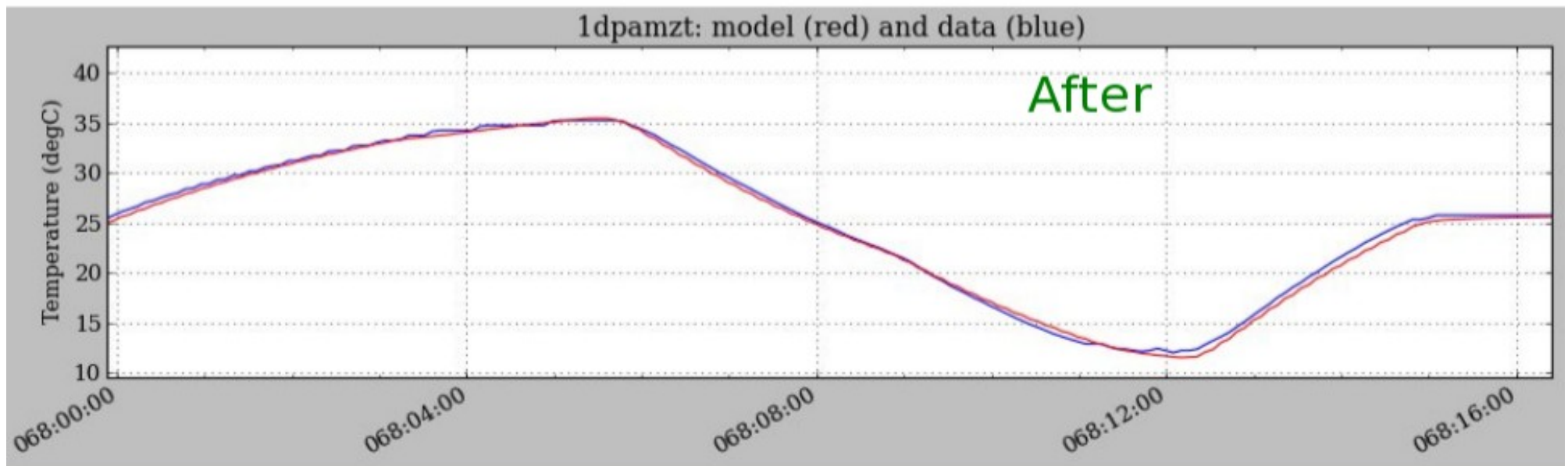
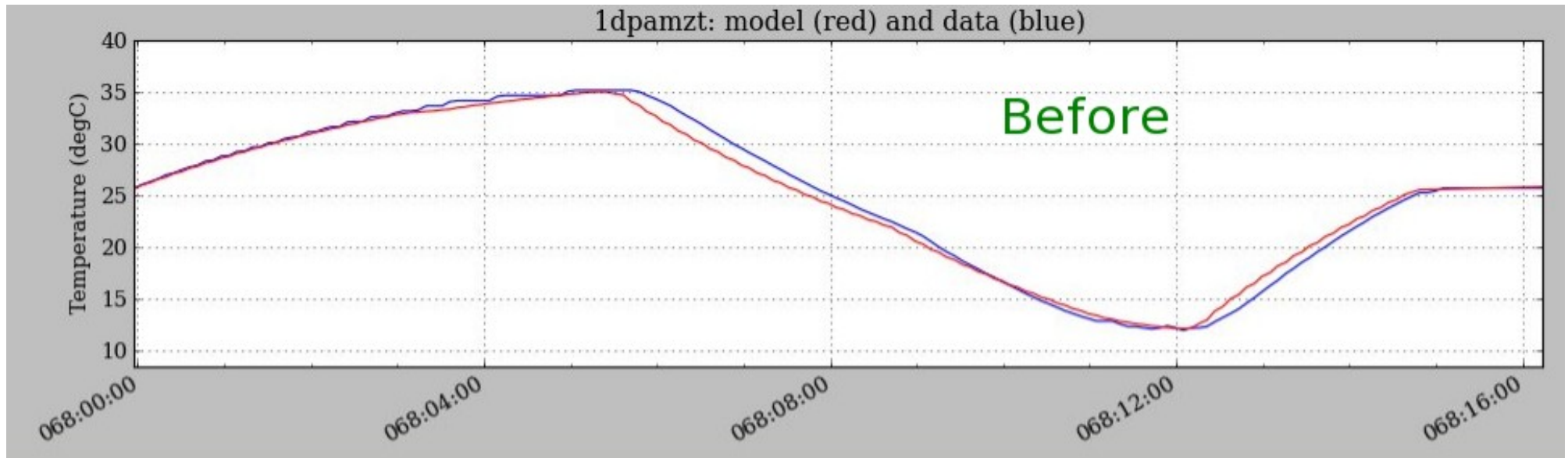
# DOY 068 Production model



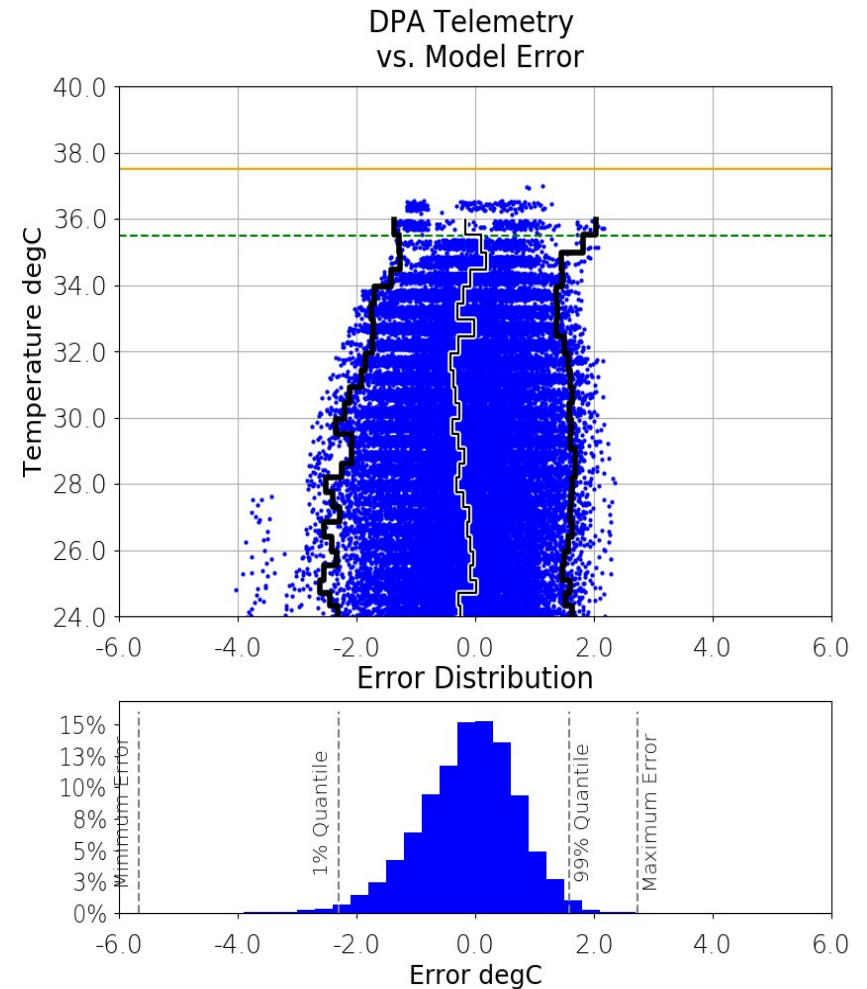
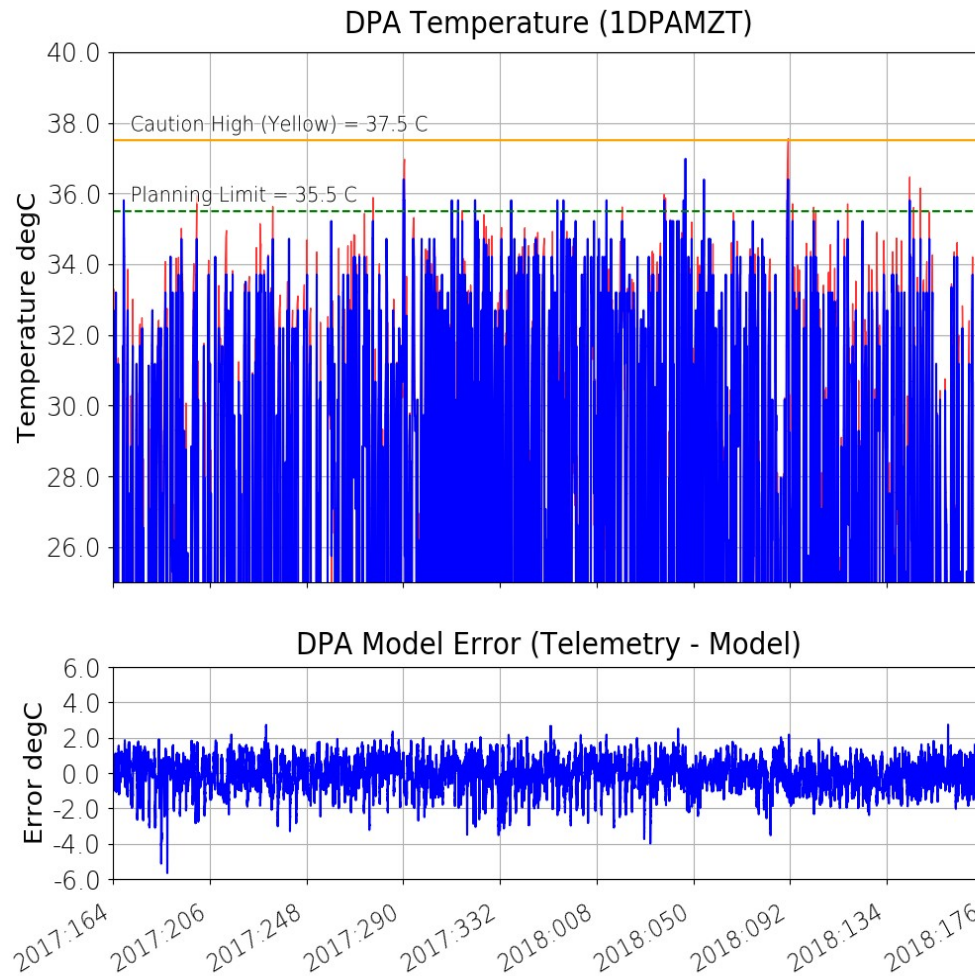
# DOY 068 After Addition of the Pseudo-node



# DOY 068 Before and After



# Latest Fit Dashboard

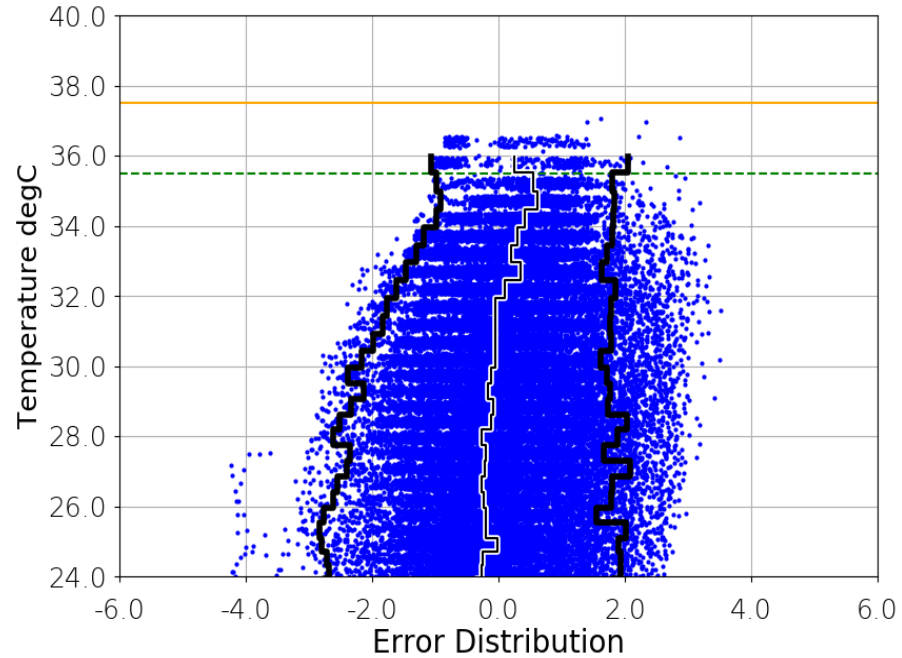


# Error Plot Comparison: June 22 v Latest

i.e. After pseudo-node addition

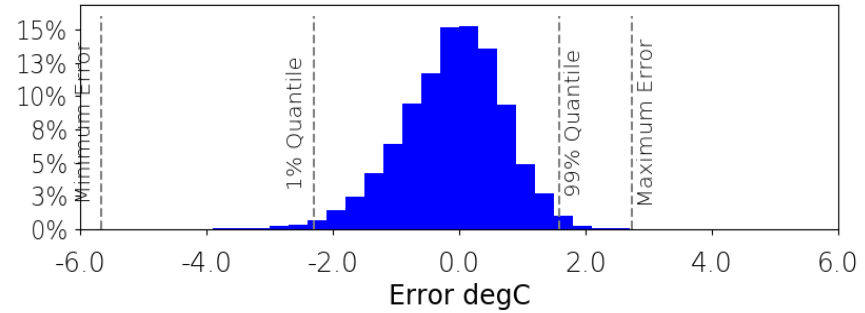
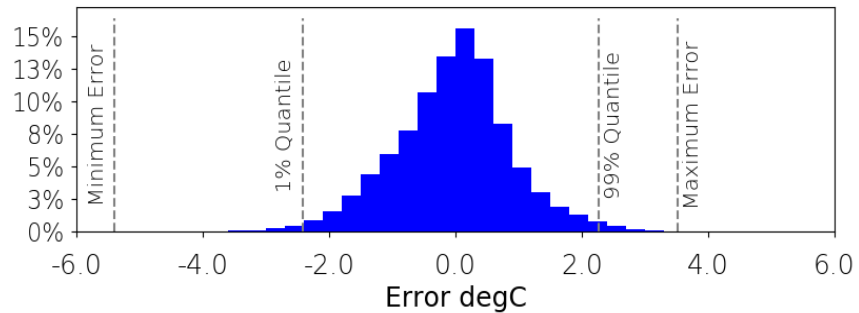
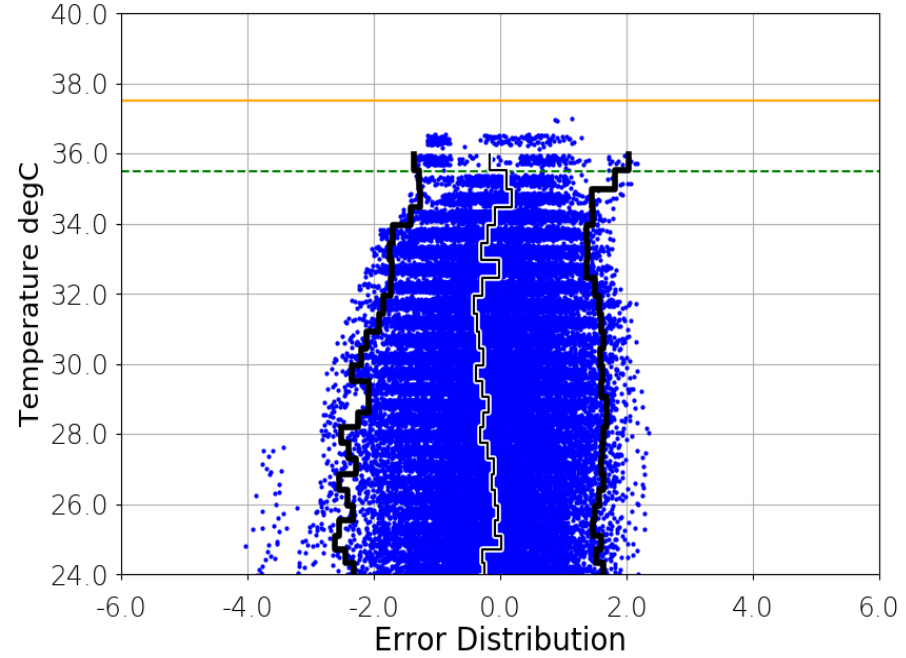
June 22

DPA Telemetry  
vs. Model Error



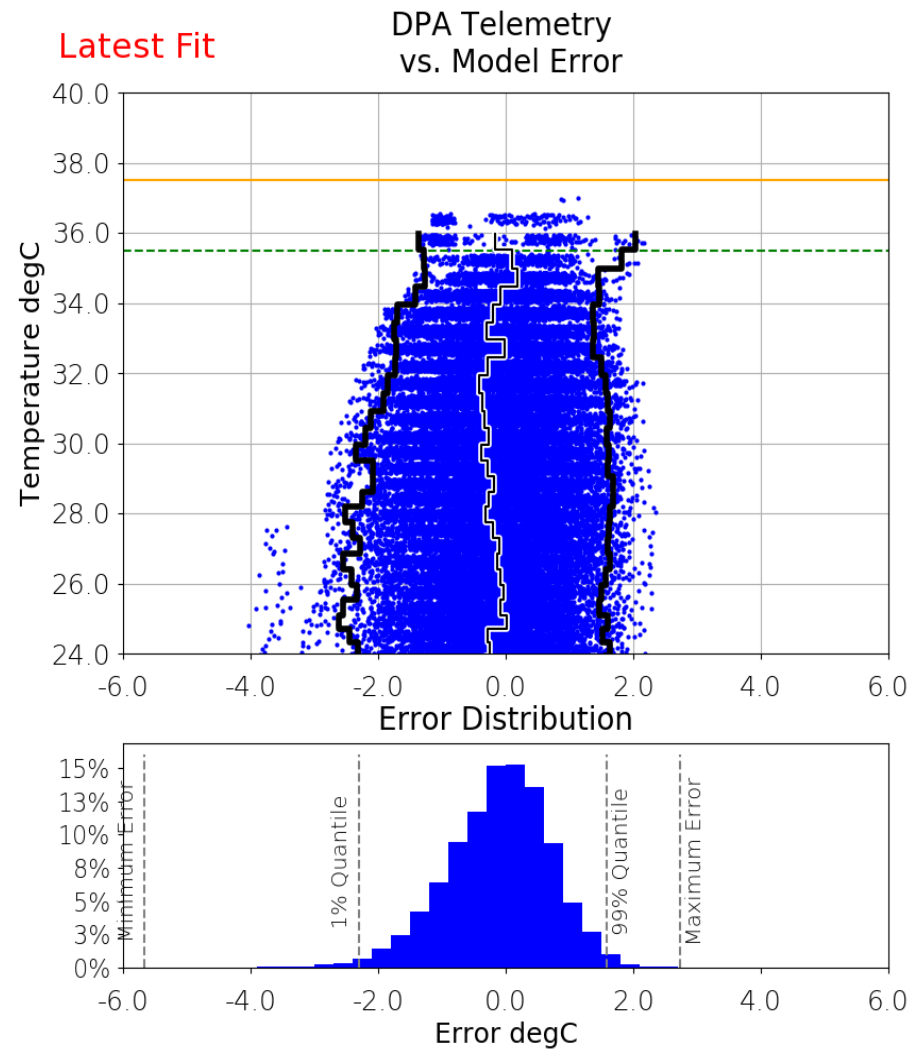
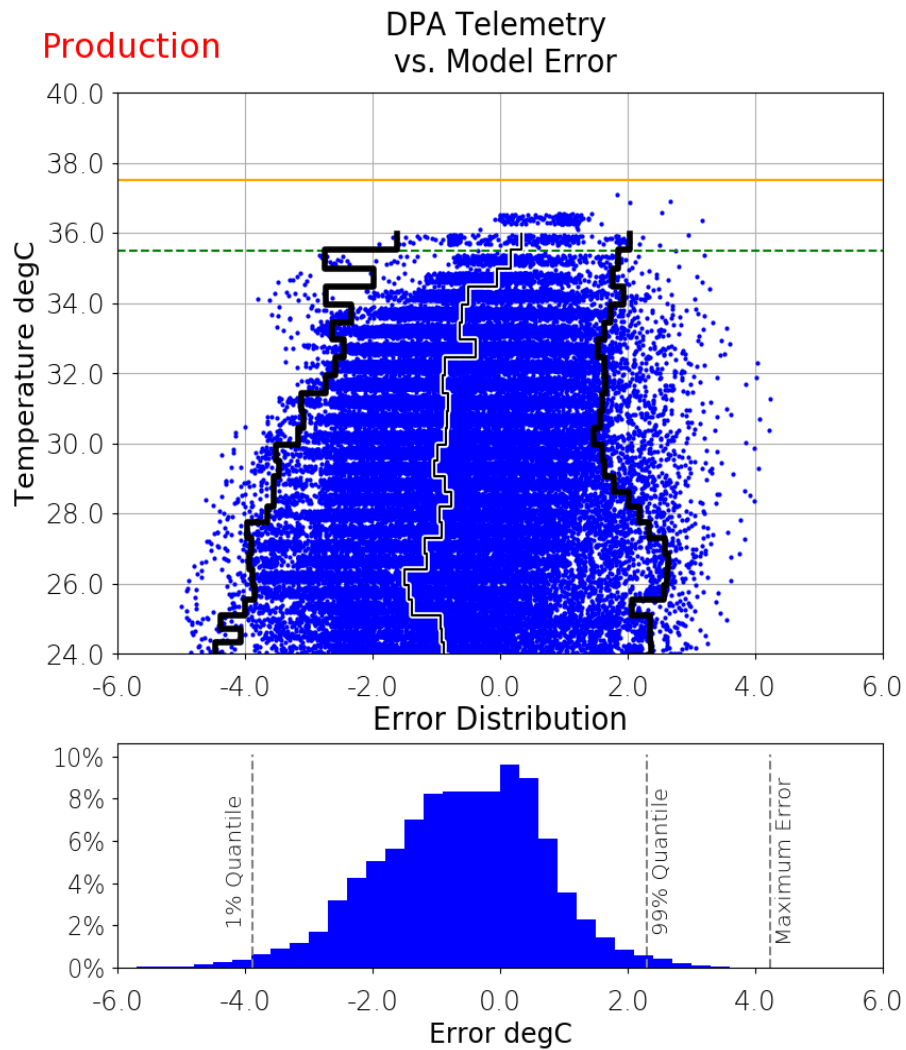
Latest Fit

DPA Telemetry  
vs. Model Error

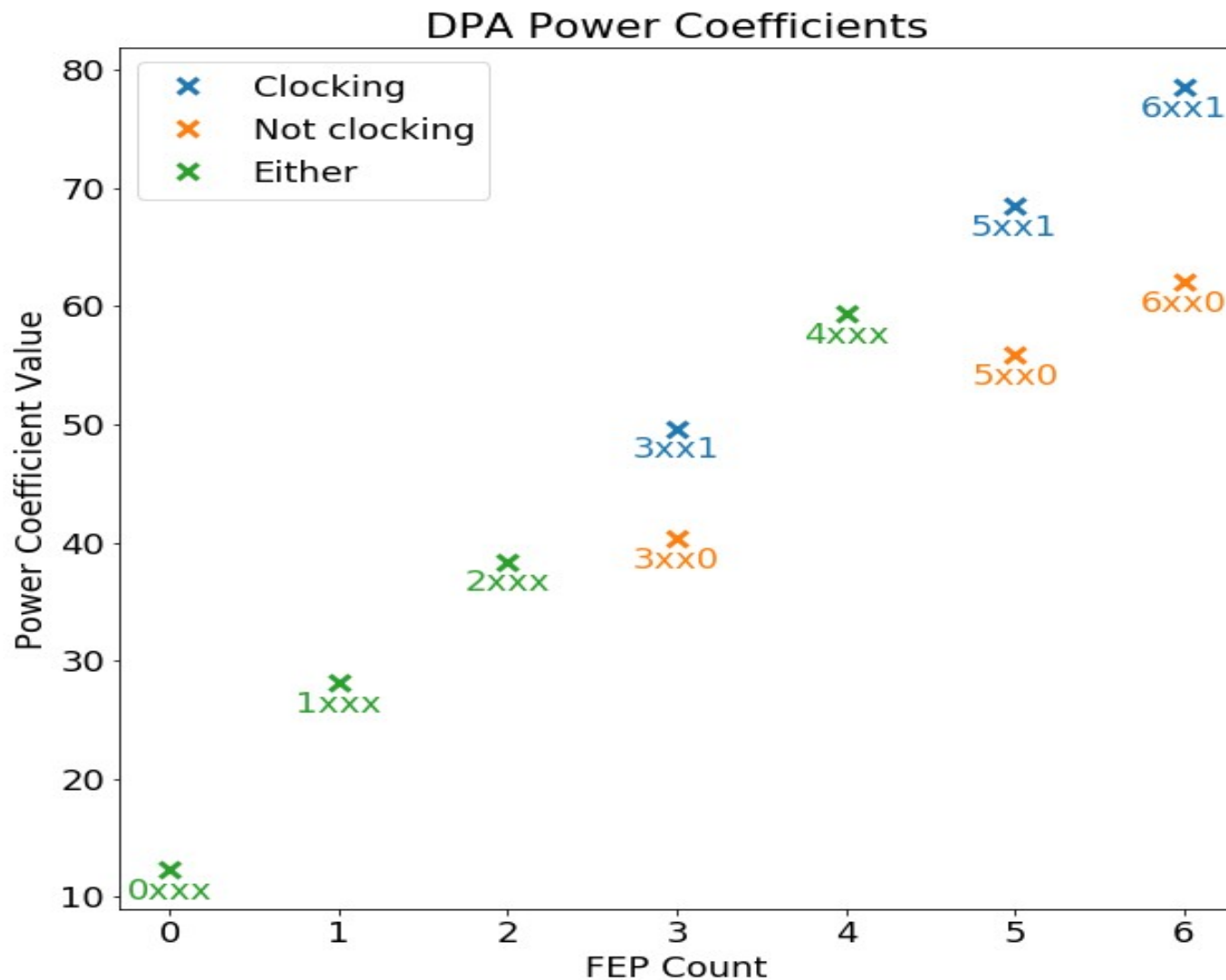




# Error Plot Comparison: Production v Latest



# 1DPAMZT Power Coefficients



# Supplementary Slides

# Future Investigation

The pseudo-node adjusts the entire model

Possible that one (or more) specific component causes the model lead.

One possibility: Sun (pitch)

Will also look at change in FEP count.

# Future Enhancement (cont'd)

