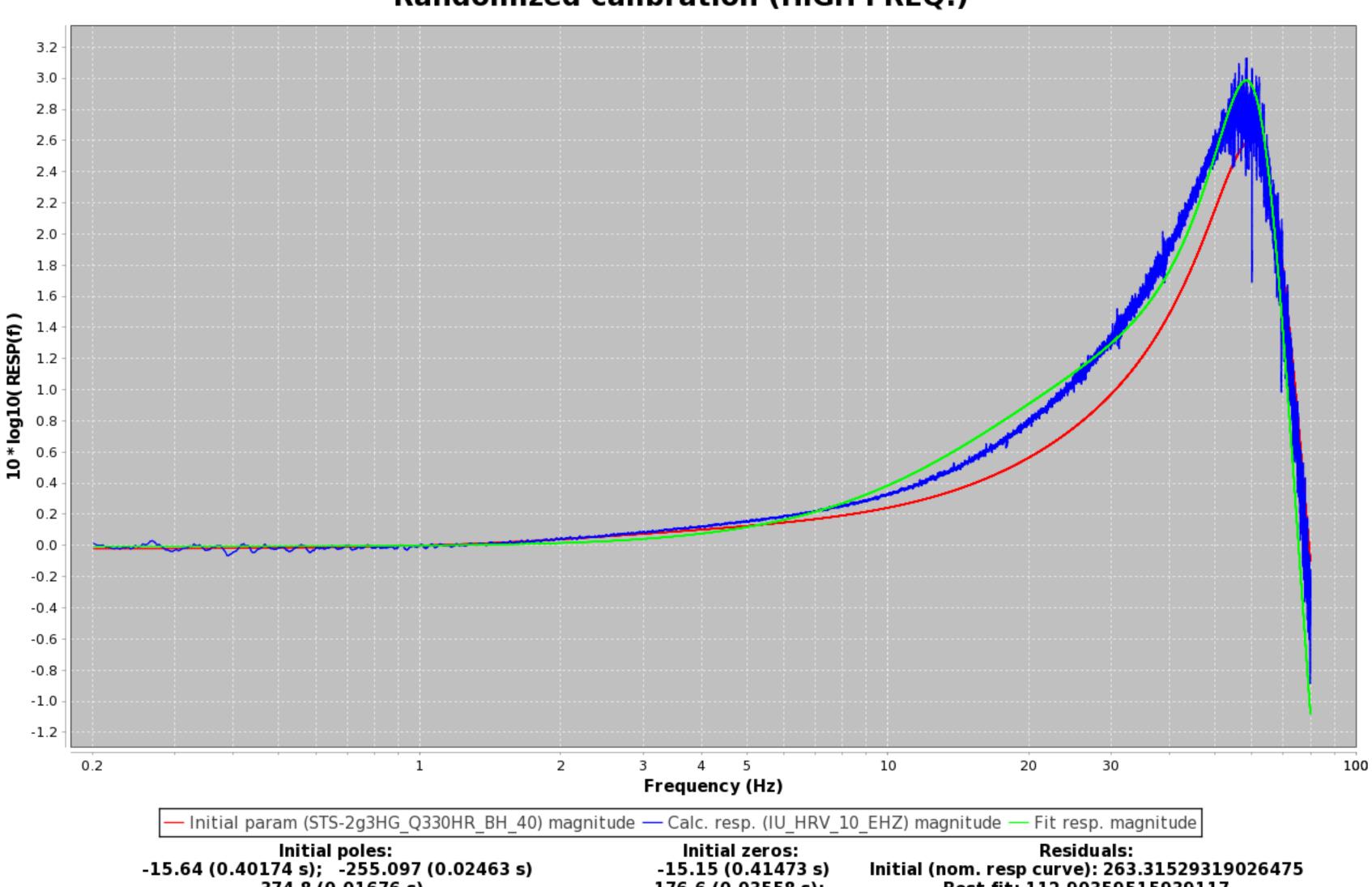
# Randomized calibration (HIGH FREQ.)



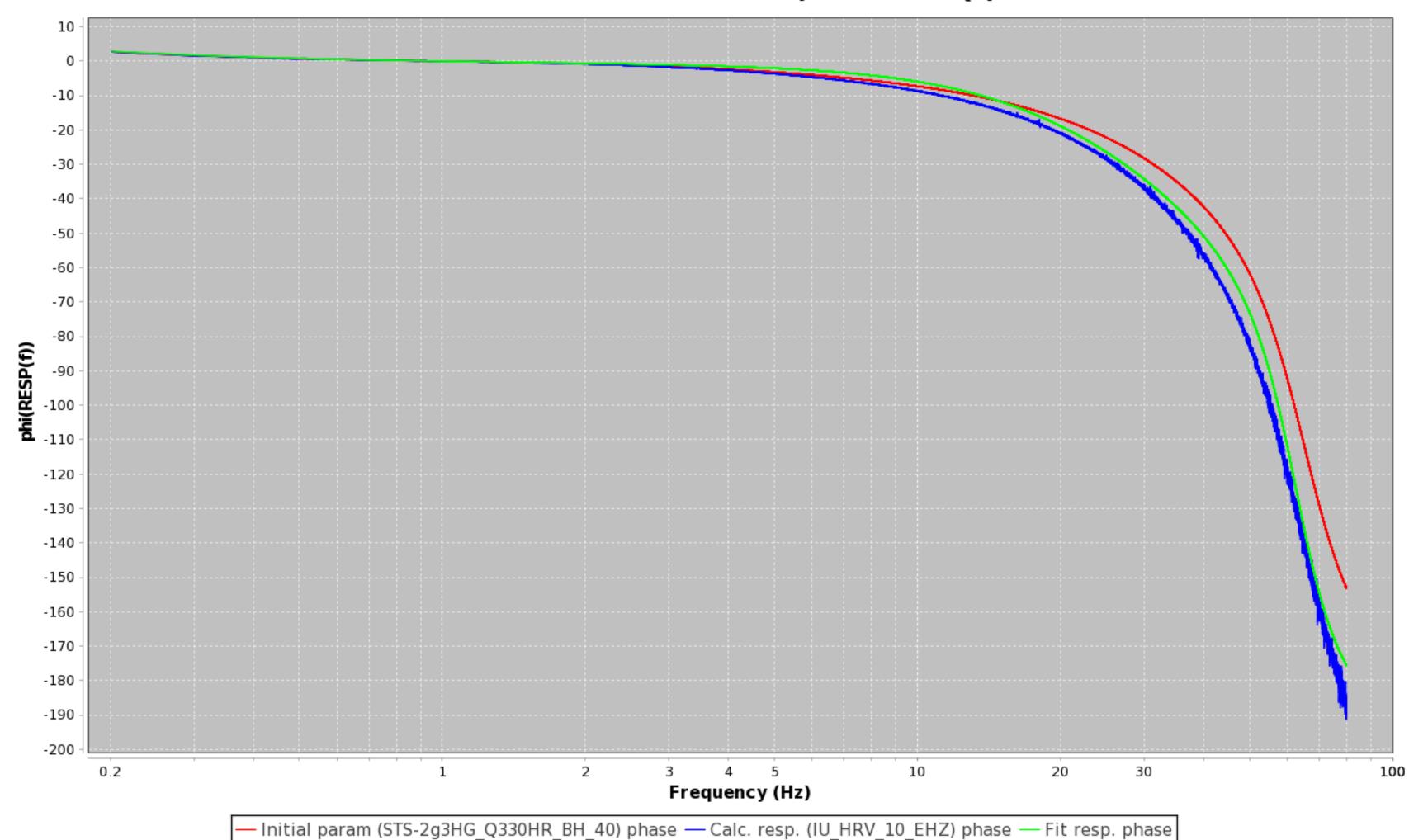
-374.8 (0.01676 s) -97.34 - 400.7i; -97.34 + 400.7i (0.01524 s) Fit poles: -55.67984 (0.11284 s); -203.31908 (0.0309 s)

-176.6 (0.03558 s); Fit zeros: -54.40106 (0.1155 s) -106.91529 (0.05877 s); Best fit: 112.90359515939117

-209.42541 (0.03 s) -77.30073 - 387.02796i; -77.30073 + 387.02796i (0.01592 s)

**NUMBER OF ITERATIONS: 25** 

## Randomized calibration (HIGH FREQ.)



Initial poles: -15.64 (0.40174 s); -255.097 (0.02463 s) -374.8 (0.01676 s) -97.34 - 400.7i; -97.34 + 400.7i (0.01524 s) Fit poles:

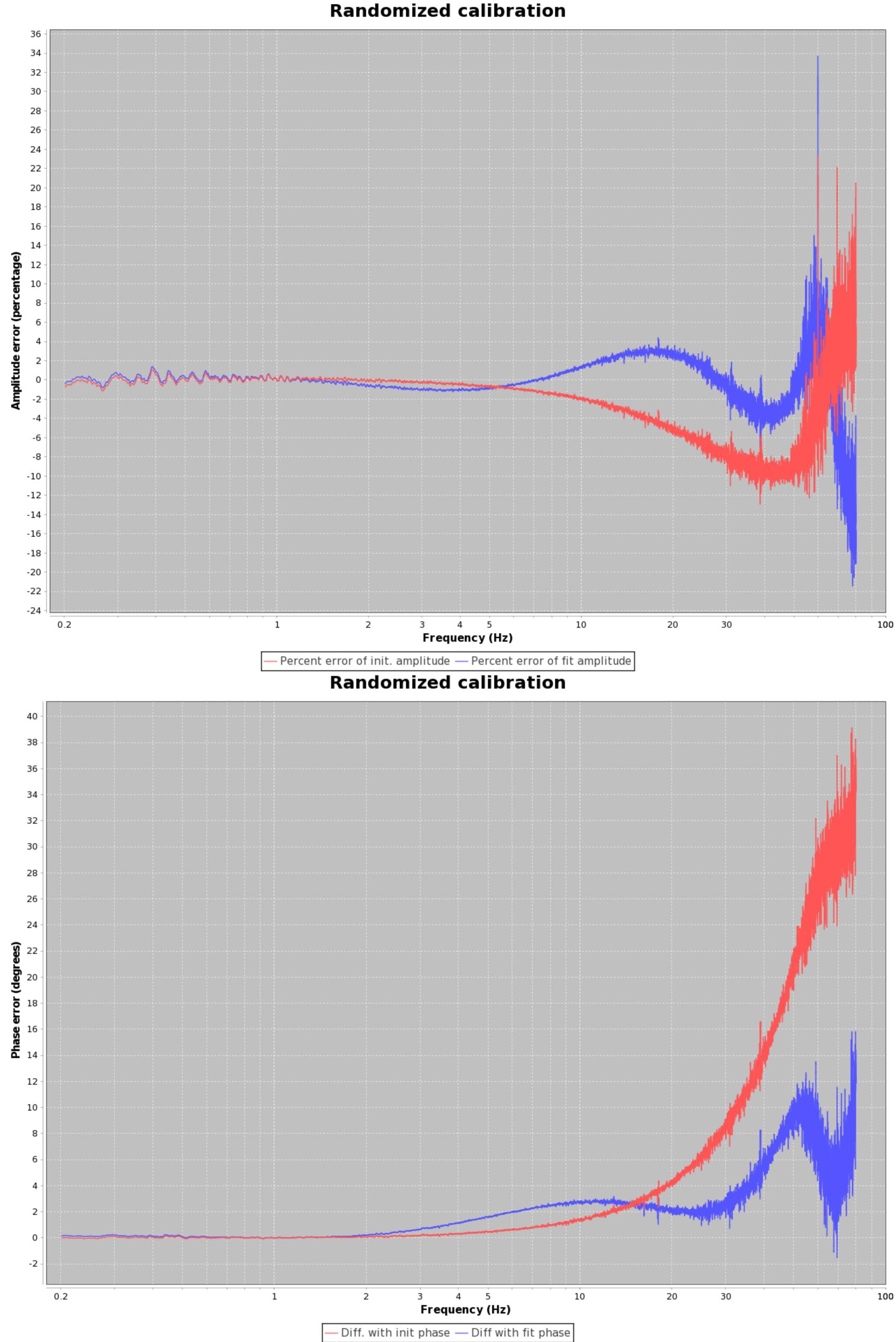
Initial zeros: -15.15 (0.41473 s) -176.6 (0.03558 s); Fit zeros: -54.40106 (0.1155 s) -106.91529 (0.05877 s);

Residuals: Initial (nom. resp curve): 263.31529319026475 Best fit: 112.90359515939117

-209.42541 (0.03 s) -77.30073 - 387.02796i; -77.30073 + 387.02796i (0.01592 s)

-55.67984 (0.11284 s); -203.31908 (0.0309 s)

**NUMBER OF ITERATIONS: 25** 

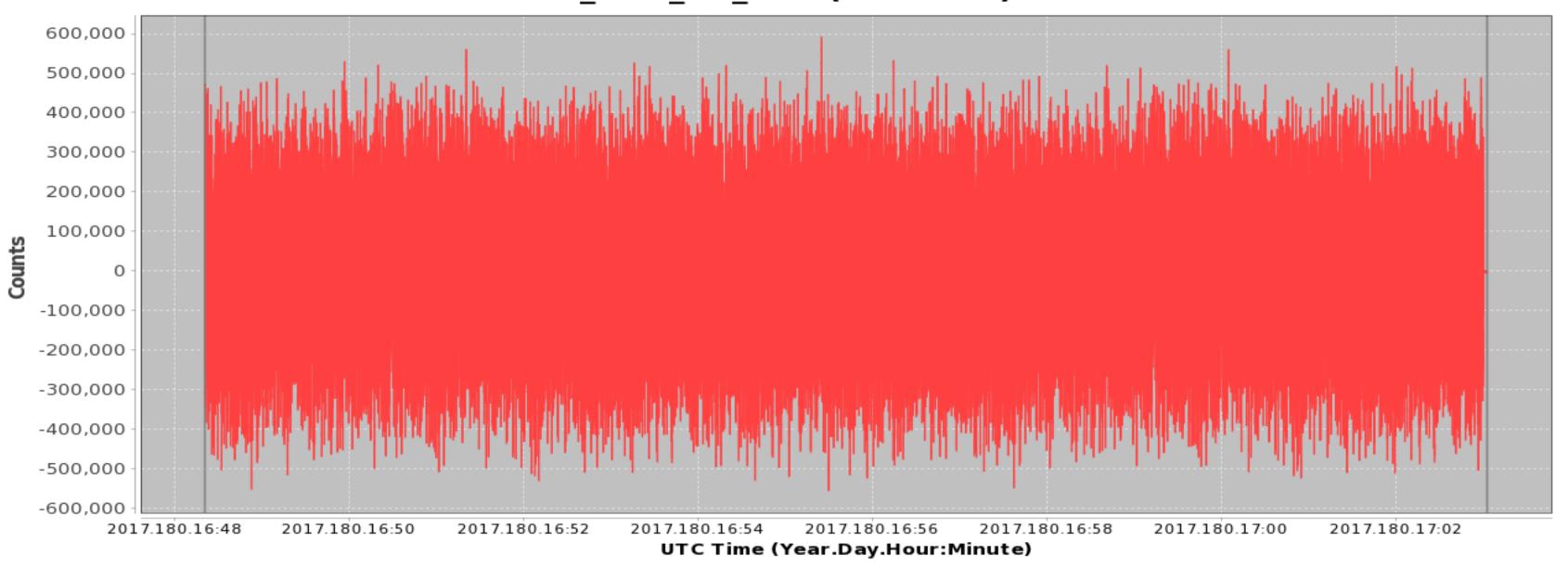


```
Initial poles:
-15.64 (0.40174 s); -255.097 (0.02463 s)
-374.8 (0.01676 s)
-97.34 - 400.7i; -97.34 + 400.7i (0.01524 s)
Fit poles:
-55.67984 (0.11284 s); -203.31908 (0.0309 s)
-209.42541 (0.03 s)
-77.30073 - 387.02796i; -77.30073 + 387.02796i (0.01592 s)
Initial zeros:
-15.15 (0.41473 s)
-176.6 (0.03558 s);
Fit zeros:
-54.40106 (0.1155 s)
-106.91529 (0.05877 s);
Residuals:
Initial (nom. resp curve): 263.31529319026475
Best fit: 112.90359515939117
Iteration count from solver: 25
Input filenames, with SEED and RESP files paired as appropriate:
IU_HRV_CB_BC1
IU HRV 10 EHZ
STS-2q3HG Q330HR BH 40
Residuals weighting:
    Amplitude: 319.7911026998516
    Phase: 0.3196250980579124
Time of report generation:
2017.268.17:06:53
Data start time:
2017.180.16:48:20
Data end time:
2017.180.17:03:02
```

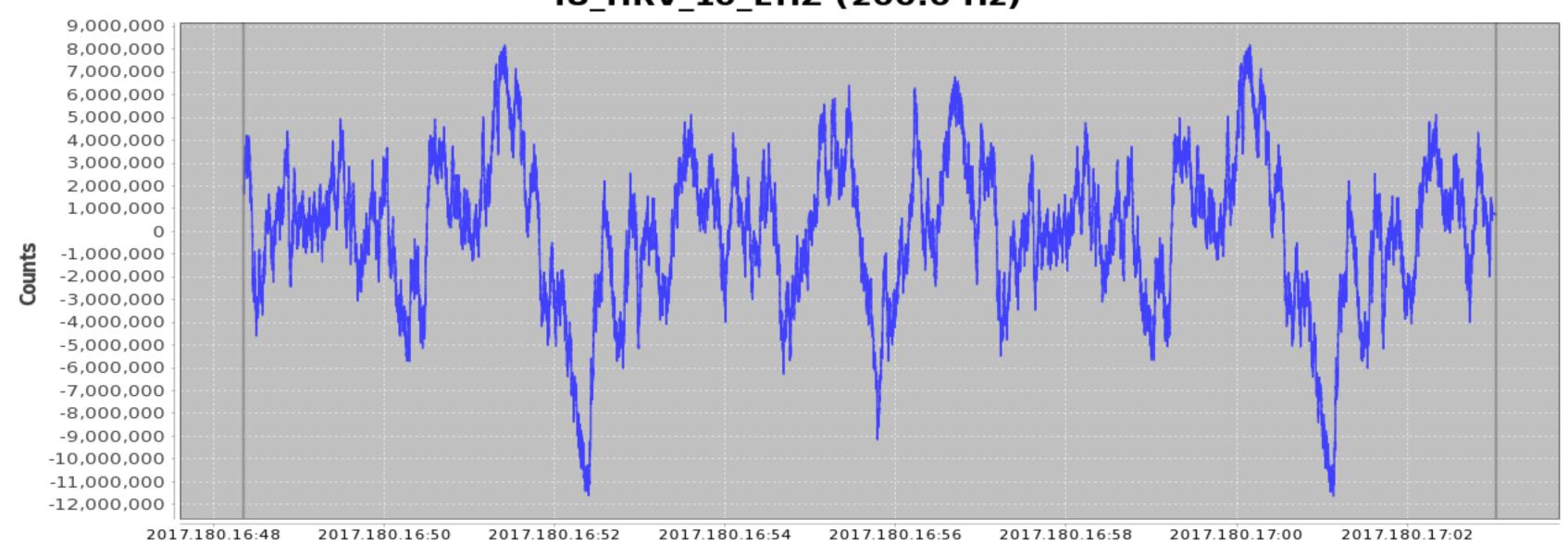
### POLE VARIABLES, AS CSV:

Init	Fit	Diff	Mean	PctDiff
-15.64	-55.6798	+40.0398	-35.6599	-71.9108
+0	+0	+0	+0	+0
-255.097	-203.3191-51.7779		-229.208	+25.4663
+0	+0	+0	+0	+0
-374.8	-209.4254-165.3746-292.1127+78.9659			
+0	+0	+0	+0	+0
-97.34	-77.3007	-20.0393	-87.3204	+25.9238
-400.7	-387.028	-13.672	-393.864	+3.5326
ZERO VARIABLES, AS CSV:				
Init	Fit	Diff	Mean	PctDiff
-15.15	-54.4011	+39.2511	-34.7755	-72.1513
+0	+0	+0	+0	+0
-176.6	-106.9153-69.6847		-141.7576+65.1775	
+0	+0	+0	+0	+0

IU\_HRV\_CB\_BC1 (200.0 Hz)



### IU\_HRV\_10\_EHZ (200.0 Hz)



UTC Time (Year.Day.Hour:Minute)

```
Response name: STS-2g3HG_Q330HR_BH_40
```

### Gain stage values:

0: 33,554,420,000

1: 20,000

2: 1,677,721

Normalization: 3.4684E17

Normalization frequency (Hz): 1.0

Transfer function is LAPLACIAN

Response input units: velocity (m/s)

#### Response zeros:

- 0: 0
- 1: 0
- 2: -15.15
- 3: -176.6
- 4: -463.1 430.5i
- 5: -463.1 + 430.5i

#### Response poles:

- 0: -0.037 0.037i
- 1: -0.037 + 0.037i
- 2: -15.64
- 3: -255.097
- 4: -374.8
- 5: -97.34 400.7i
- 6: -97.34 + 400.7i
- 7: -520.3
- 8: -13,300
- 9: -10,530 10,050i
- 10: -10,530 + 10,050i