

## Q1) P51 issue

I started from scenario "T +139h 46m CMC power up and GNC power up" and I just follow the check lists: "CMC Power Up" ... but before entering the "Load PAD" .... Editing V48E and so on ... I wait for almost 8 min until when the COMP ACTY It went off ... (no time acceleration during waiting period)

Next I did the "G&N Power Up" following each checklist item ...

During "IMU Power Up" I waited for 90 sec until NO ATT It > OFF (no time acceleration):

During "OSS Power Up" I wait for 15s before doing OPT ZERO – OFF (no time acceleration)

I waited for "MCC Update" ... than I saved the scenario: -> "T +140h 7m after Block Data 15".

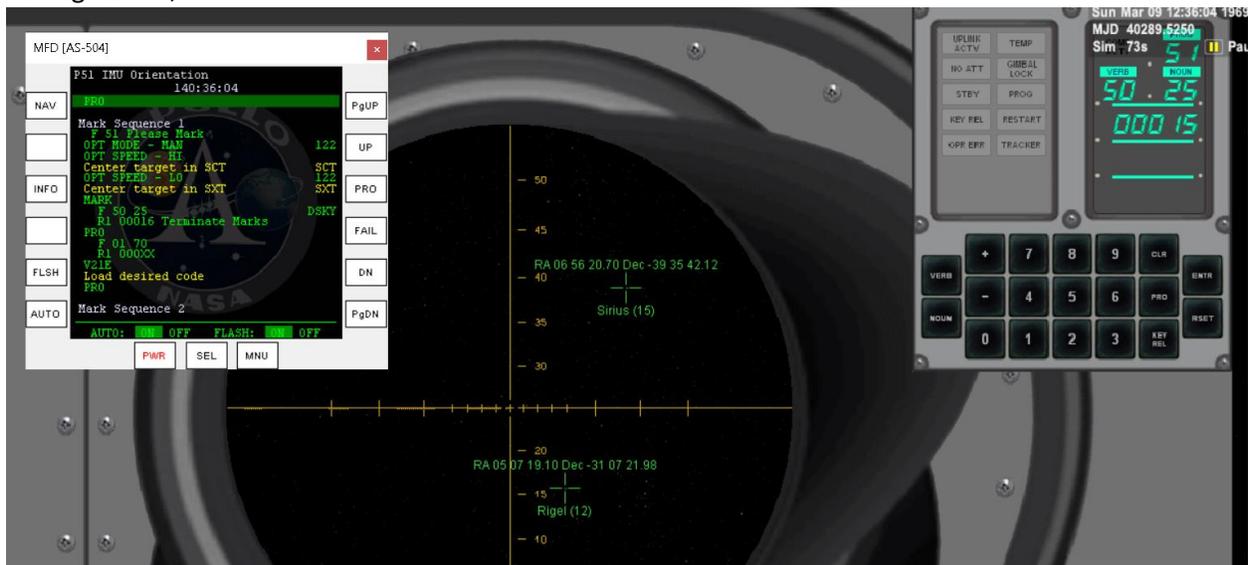
Then I went LVLH hds DN ... before doing P51 ... to acquire stars

At about 140h 35m I re-check to be LVLH hds DN and use KILL ROT to dump all rates ....

At this point I make the scenario: "T +140h 35m before P51" ... and next I did P51 (I didn't wait for the 10min as in the checklist says)

## 1<sup>st</sup> test

During P51 ... ;



1<sup>st</sup> star – 07; 2<sup>nd</sup> star – 15



Huge angle error ??? -> I REJECT (click "FAIL") and do V32E:

1<sup>st</sup> star (after V32E) -> 12; 2<sup>nd</sup> star - 14 -> GOOD RESULTS



But the angle difference seems to depend on the stars selected ---> SEE NEXT TESTs - again started from the same scenario at T +140h 35m ... but selecting different stars...

**2<sup>nd</sup> TEST:**

After P51 ....1<sup>st</sup> star = 12, 2<sup>nd</sup> star = 14 -> good results immediatly



**3<sup>rd</sup> test:**

1<sup>st</sup> star = 11, 2<sup>nd</sup> star = 14 -> bad results



**Huge values** -> Click FAIL -> V32E

1<sup>st</sup> star (after V32E) = 17, 2<sup>nd</sup> star = 16 -> good results



**This time I managed to get good results only after only one repetition of V32E**, but when I posted the questions in OF even after 2 or 3 repetitions I didn't get good results, **and the CMS was drifting very far from the LVLH attitude**, so I start all over again by choosing different pairs of stars (in LVLH) and I got good results immediately...

as said it happened like this so far all time I had to do P51 according the checklist and I have just started Day 7.

The question is I don't know what I am doing wrong to get inconsistent results?

I don't think the pair of stars to chose should play a role?

Isn't it?