



| Subject: Setting the Processing Window parameters |                      |
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Being a Treatise on the proper and correct methods that can be used to assign proper and correct but in no case erroneous or in other manner inappropriate values to the parameters of the EUV processing window function, while at the same time avoiding the necessity for difficult or otherwise vexatious and troublesome hard thinking.

The command addressed here is E\_PROC\_WINDOW OPEN=xx CLOSE=yy. I describe how to determine the values of the OPEN and CLOSE parameters.

The first step is to think of the command as controlling a function to *inhibit*, not to enable processing. See Figure 1 for an overview. Then the process is:

- 1. Decide on the spin phases (expressed in ticks (1 tick =  $0.1^{\circ}$  in spin phase)) where you want to *start* inhibit and *stop* inhibit.
- 2. Figure out whether you are dealing with Figure 1's Case 1 (inhibit does not cross a nadir) or Case 2 (inhibit crosses a nadir).
- 3. If it's Case 1:
  - a. OPEN = start CLOSE = stop - start
- 4. If it's Case 2:
  - a. OPEN = *start*
  - b. CLOSE = stop start + 3600

Figure 1 makes it clear why these expressions work.

Supporting material attached:

Figure 2. Jianxin's timing diagram for the proc\_window function.

- Figure 3. An example from the EUV flight software testing. Case 1: inhibit does not cross nadir.
- Figure 4. An example from the EUV flight software testing. Case 2: inhibit crosses a nadir.











## Timing for EUV Sun Protection and Processing Window Functions

d:/image/text/flight software/timing.doc



Figure 2



Figure 3



e\_proc\_window open- 3000 cluse= 1500

Figure 4