Protocol for 13C NMR (BBO probe) at NMR400 (AV NEO 400)

Book time and log in computer as usual

Ac13cpd (BBO probe)
30 degree pulse angle for routine C-13 with H-1 decoupling

Procedure:

Open Topspin 4.0.6

run H-1 NMR prior to C-13 NMR (Ah1): follow the basic procedure from your basic H1 training.
run C-13 NMR with H-1 decoupling
A. Under "Start",
   1. create dataset: name; exp #; pro #; solvent; directory (D:\group name\user name\yrmo)
   2. rpar Ac13* (select Ac13cpd)
B. Under "Acquire",
   3. no eject sample (ej)/no insert sample (ij)
   4. no lock
   5. tune (wobb): manual (13C: 7964/994)
   6. no spinning
   7. no shim (topshim)
   8. prosol (getprosol)
   9. gain (rga)
  10. check: ns, ds, d1
  11. go (zg)
C. Under "Process",
   12. efp;apk
   13. adjust phase if necessary
   14. calibrate spectrum
   15. pick peaks
   16. integrate
   17. advanced if necessary
D. Under "Analyse"
   18. eject sample (ej); take sample; ij to close air
   19. close topspin
   20. log off

d1 is relaxation time in seconds
ds is dummy scans for warming up the spin system
ns is number of scans

Remark:
" lock and shim well
" tune probe
" no spinning
" no pulse cal in automation
" optimize offset (o1p) and SW (ppm) for advanced applications