

# ADDI-DATA: starting IOC, testing latch interrupt with digital output

Ford, Christopher

Thu 4/7/2016 10:51 AM

To: Ford, Christopher <caf@slac.stanford.edu>;

---[ cpu-b34-mc22 ]----

```
$ su -
```

```
# cd /afs/slac/g/lcls/epics/R3-14-12-4_1-0/iocTop/users/caf/addi-data/apci1710-asyn/apci1710-asyn-R1-0-1/iocBoot/apci1710-ioc
```

```
# ./st.cmd
```

```
Successfully locked memory using mlockAll
```

```
#!../bin/linuxRT_glibc-x86_64/apci1710App
```

```
< envPaths
```

```
epicsEnvSet("ARCH","linuxRT_glibc-x86_64")
```

```
epicsEnvSet("IOC","apci1710-ioc")
```

```
epicsEnvSet("TOP","../..")
```

```
epicsEnvSet("EPICS_SITE_TOP","/afs/slac/g/lcls/epics/R3-14-12-4_1-0")
```

```
epicsEnvSet("BASE_SITE_TOP","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/base")
```

```
epicsEnvSet("MODULES_SITE_TOP","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules")
```

```
epicsEnvSet("IOC_SITE_TOP","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/iocTop")
```

```
epicsEnvSet("PACKAGE_SITE_TOP","/afs/slac/g/lcls/package")
```

```
epicsEnvSet("TOOLS_SITE_TOP","/afs/slac/g/lcls/tools")
```

```
epicsEnvSet("ALARM_CONFIGS_TOP","/afs/slac/g/lcls/tools/AlarmConfigsTop")
```

```
epicsEnvSet("EPICS_MODULES","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules")
```

```
epicsEnvSet("SNCSEQ","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/seq/seq-R2-1-6_1-3")
```

```
epicsEnvSet("AUTOSAVE","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/autosave/autosave-R5-5_0-0")
```

```
epicsEnvSet("CAPUTLOG","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/caPutLog/caPutLog-R3-3-0")
```

```
epicsEnvSet("IOCADMIN","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/iocAdmin/iocAdmin-R3-1-14_1-0")
```

```
epicsEnvSet("EVRCLIENT","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/evrClient/evrClient-R1-0-p4")
```

```
epicsEnvSet("MISCUTILS","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/miscUtils/miscUtils-R2-2-2")
```

```
epicsEnvSet("EVENT","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/event/event-R4-1-6")
```

```
epicsEnvSet("RTEMSUTILS","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/rtemsutils/rtemsutils-R1-0-0-lcls5")
```

```
epicsEnvSet("ASYN","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/asyn/asyn-R4-26_0")
```

```
epicsEnvSet("CEXP","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/modules/cexpsh/cexpsh-R1-0-0")
```

```
epicsEnvSet("EPICS_BASE","/afs/slac/g/lcls/epics/R3-14-12-4_1-0/base/base-R3-14-12-4_1-0")
```

```
epicsEnvSet("LINUX_KERNEL_MODULES","/afs/slac/g/lcls/package/linuxKernel_Modules")
```

```
## Register all support components
```

```
dbLoadDatabase("../db/apci1710.dbd",0,0)
```

```
apci1710_registerRecordDeviceDriver(pdbbase)
```

```
Warning: IOC is booting with TOP = "../.."
```

```
but was built with TOP = "../.."
```

```

dbLoadTemplate("APCI1710.substitutions")
APCI1710Config("apci1710", 0)
ctr_init(0) ok
iocInIt()
Starting iocInIt
#####
## EPICS R3.14.12.4-1-0 $Date: Mon 2013-12-16 15:51:45 -0600$
## EPICS Base built Jan  9 2015
#####
iocRun: All initialization complete
epics>
epics> dbl
mc22:addidata:Counter1Reset
mc22:addidata:Counter2Reset
mc22:addidata:Counter3Reset
mc22:addidata:Counter4Reset
mc22:addidata:Counter1Counts
mc22:addidata:Counter1RTCounts
mc22:addidata:Counter2Counts
mc22:addidata:Counter2RTCounts
mc22:addidata:Counter3Counts
mc22:addidata:Counter3RTCounts
mc22:addidata:Counter4Counts
mc22:addidata:Counter4RTCounts
mc22:addidata:asyn1
epics>
epics>  -> counter=8690 pulseid=0
        -> counter=9801 pulseid=0

epics>

-----

# echo 1 > /proc/driver/apci1710ctr0/intEnable
# echo 1 > /proc/driver/apci1710ctr0/digout
[ 610.235554]
[ 610.235554] i_APCI1710_TestInterrupt: mm = 0, im = 1, latch = 8690
[ 610.243310] apci1710_interrupt: ringbufPushLocked(chan=0, val=8690) succeeded!
[ 610.243315] apci1710ctr: read(ctr=0) waking up
# [ 610.254988] apci1710ctr: read(ctr=0) = 12
[ 610.259171] apci1710ctr: read(ctr=0) going to sleep

# echo 0 > /proc/driver/apci1710ctr0/digout
#
# echo 1 > /proc/driver/apci1710ctr0/digout
[ 622.658898]
[ 622.658898] i_APCI1710_TestInterrupt: mm = 0, im = 1, latch = 9801
[ 622.666650] apci1710_interrupt: ringbufPushLocked(chan=0, val=9801) succeeded!
[ 622.666654] apci1710ctr: read(ctr=0) waking up
# [ 622.678307] apci1710ctr: read(ctr=0) = 12

```

```
[ 622.682500] apci1710ctr: read(ctr=0) going to sleep
```

```
# echo 0 > /proc/driver/apci1710ctr0/digout
```

```
#
```