

ALPHA TTC VME Registers

A32 –Address Space

XX000000: Run Mode register – 8 bits (Reset 0x00) (Read/Write)
Bit 0: Normal Mode 0, Calibrate Mode 1

XX000001: TTC Status Register – 8 bits (Read Only)
Bit 0: VA1 Control Shiftout BusyN
Bit 1: FEC Readout BusyN

XX000002: FEC Address Register – 6 bits (Reset 0x00) (Read/Write)

XX000003: Command Register – 8 bits (Write Only)

Command:

- 0x08 – Reset VA1TA Readout
- 0x07 – Read VA1TA Control Register
- 0x06 - Write VA1TA Control Register
- 0x05 – VA1 Readout Start

XX000004: ADC Trigger Delay – 8bits (Reset 0x00) (Read/Write)
50ns steps
0x01 : 95ns
0x02 : 145ns
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0xFF : 12795ns
0x00 : 12845ns

XX000005: VETO Delay (VA1 Readout Delay) – 8bits (Reset 0x00) (Read/Write)
200ns steps
0x01 : 850ns
0x02 : 1050ns
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0xFF : 51650ns
0x00 : 51850ns

XX000006: DAC B Data – 8bits (Reset 0x00) (Read/Write)
0x00 : 2.7mV
0x10 : 22.66mV
0x20 : 47.5mV
0x40 : 97.5mV
0x60 : 148.5mV
0x80 : 198.5mV

XX000007: DAC A Data – 8bits (Reset 0x00) (Read/Write)

0x00 : 2.7mV
0x10 : 22.66mV
0x20 : 47.5mV
0x40 : 97.5mV
0x60 : 148.5mV
0x80 : 198.5mV

XX000100 – XX000154: VA1TA Chip0 Control Register Bits (D32) (Read/Write)

LSB MSB

XX000100 ... 32bits

XX000104 ... 32bits

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XX00014C ... 32bits

XX000150 ... 32bits

XX000154 ... 8bits (Still written D32 cycle)

XX000180 – XX0001D4: VA1TA Chip1 Control Register Bits (D32) (Read/Write)

XX000200 – XX000254: VA1TA Chip2 Control Register Bits (D32) (Read/Write)

XX000280 – XX0002D4: VA1TA Chip3 Control Register Bits (D32) (Read/Write)

XX000300 – XX000354: VA1TA Chip0 Control Register Bits (D32) (Read/Write)

XX000380 – XX0003D4: VA1TA Chip1 Control Register Bits (D32) (Read/Write)

XX000400 – XX000454: VA1TA Chip2 Control Register Bits (D32) (Read/Write)

XX000480 – XX0004D4: VA1TA Chip3 Control Register Bits (D32) (Read/Write)