



MC-VCM

Flyable ARINC 818 Multichannel Video Converter Module

Extend the life of airborne video components by quickly linking them to ARINC 818 architecture. Connect sensors, cameras, and displays. The MC-VCM increases the switching or converting capacity of the original single-channel VCM and can be certified to DO-254.

APPLICATIONS:

Rugged Conversion between:

- Sensors
- Cameras
- Displays

LINK RATES: (Gbps)

- 1.0625
- 2.125
- 3.1875
- 4.25
- 6.375
- 8.5

FORMAT CONVERSIONS:

Each unit is factory configured to one of the following:

- Up to 6 Channel conversion: ARINC 818 to or from other protocols (DVI/HDMI, Ethernet, 3G-SDI, NTSC/PAL, or HotLink)
- Up to Eight-Channel (8 in/8 out) ARINC 818 cross-point switching with options for 12x12

To discuss other format conversions, give us a call!



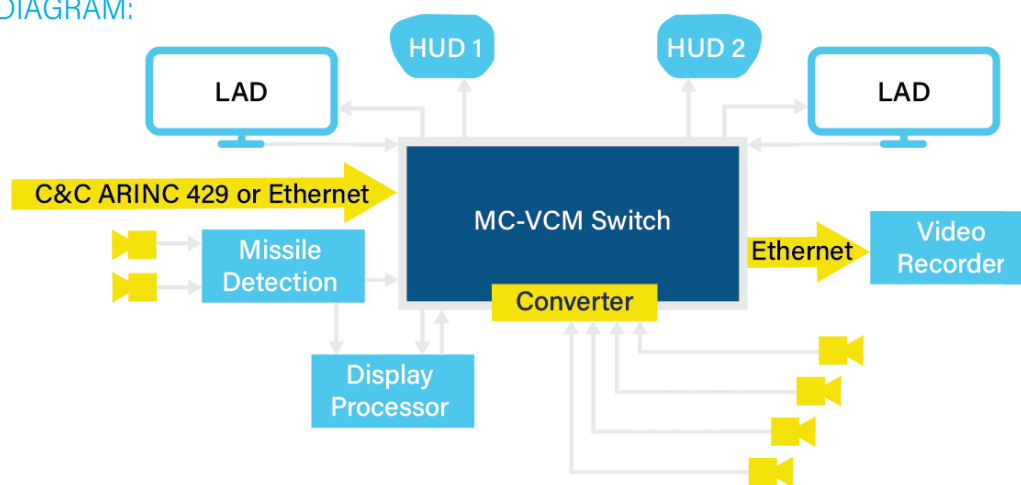
FEATURES:

- Up to 6 channel video conversion to/from ARINC 818 and/or ARINC 818 to ARINC 818 (8x8 switch)
- Multi-ICD capabilities
- Supports mixed link rates on different channels
- 28 VDC power input per MIL-STD-704F and RTCA DO-160F hardware qualification
- HIRF protected, EMI shielded design
- Command and Control options via Ethernet, ARINC 429, and RS-485/422 interface
- Conduction cooled
- Stale video monitoring and reporting
- SEU monitoring and recovery

EXAMPLE AVIONICS SYSTEM BLOCK DIAGRAM:

The MC-VCM enables the connection of older cameras and sensors, together with newer, high-resolution large area displays (LADs), HUDs and EO/IR sensors.

Video COAX is support is available through a 38999 connector with coax inserts, or via individual DIN 1.0/2.3 coax.



SPECIFICATIONS:

Power Requirement	18W - 40W, configuration dependent	Connectors	Custom
Operating Temperature	-40 to 55°C (-40 to 131°F)	Form Factor	Custom
Weight (4-tab)	~ 3.75 lbs	Fiber	850nm, multimode
Physical Dimensions	8.0" x 6.9" x 2.4"	Standards	ARINC 818

ENVIRONMENTAL CONDITIONS (DO-160G, SUBJECT TO CHANGE):

Sec. 4: Temperature and Altitude Overpressure	A1
Sec. 5: Temperature Variation	B
Sec. 6: Humidity	A
Sec. 7: Shock and Crash Safety	B
Sec. 8: Vibrations	R/C/C1
Sec. 9: Explosion Proofness	E
Sec. 10: Water Proofness	Y
Sec. 11: Fluids Susceptibility, Cleaning Fluids	F
Sec. 12: Sand and Dust	D
Sec. 13: Fungus Resistance, Analysis	F
Sec. 14: Salt Spray Testing, Analysis	S
Sec. 15: Magnetic Effect	Z
Sec. 16: Power Input	B (50 ms)
Sec. 17: Voltage Spike	A
Sec. 18: AF Conducted Susceptibility	B
Sec. 19: Induced Signal Susceptibility	ZC
Sec. 20: RF Radiated and Conducted Susceptibility	R
Sec. 21: RF Radiated and Conducted Emissions	M
Sec. 22: Lightning Induced Transient	A2J2M2 (shielded)
Sec. 24: Icing	A
Sec. 25: ESD Susceptibility	A (equipment off)
Sec. 26: Fire, Flammability	C

HOW TO BUY:

Determine your part number for the ARINC 818 Video Converter Module as follows:

1 - A8 - 2 - 3 - O8 - 4 - 5 - - - -

For Example:

MB-A8-44-O8-2X-DR-DDDD

Product Group 1

MC = No Bracket
MB = 6-tab Bracket

Configuration 2

00 = No Switch
44 = 4x4 Switch
66 = 6x6 Switch
88 = 8x8 Switch
LS = Line Spy
(ARINC 818 inputs)

Link Rate (Gbps) 3

1X = 1.0625
2X = 2.125
3X = 3.1875
4X = 4.250
6X = 6.375
8X = 8.50
ZZ = Custom

Video Port 4

DR = DVI RX
DT = DVI TX
TM = Multiple TX Channels
RM = Multiple RX Channels

Channel Assignments 5

D = DVI/HDMI
E = Ethernet
H = SDI (SD/HD/3G)
N = NTSC
P = PAL

