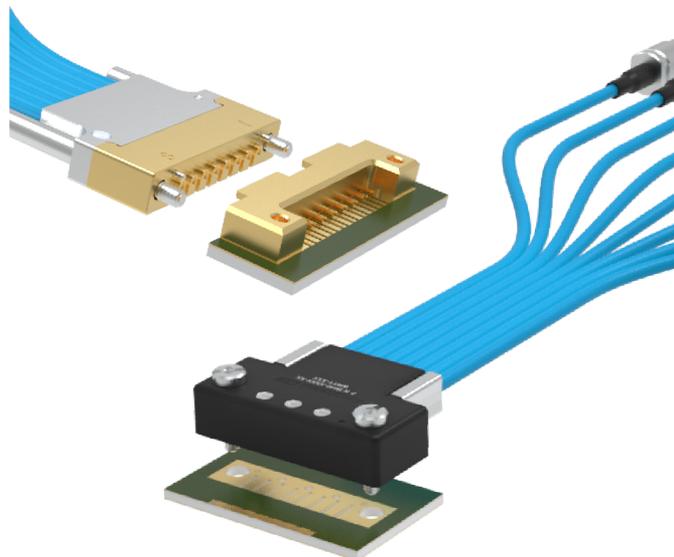


# CoreHC™ Ganged Interconnect

## INTRODUCTION



CoreHC™ is a high-performance, **solderless ganged coaxial solution** designed **for direct PCB attachment**. Featuring a **2.5mm pitch signal-to-signal configuration**, it enables engineers to maximize space savings while reducing PCB size and cost. The DC-67GHz connector **minimizes trace lengths, optimizing insertion loss and ensuring superior performance**.

Available in **vertical launch, edge launch** (blind mate to CoreHC™ assembly), and **right angle** configurations, CoreHC™ supports a broad performance range for both RF and Digital Applications.

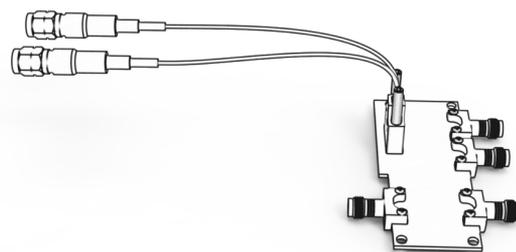
## KEY BENEFITS

- 67GHz | 56G PAM 4 | 112G PAM 4
- Ruggedized with 1000-cycle mate/ de-mate
- Density: 2.5mm signal-to-signal
- Quick attach of Multiple RF/Digital
- Reusable and field replaceable

## APPLICATIONS

- Semiconductor validation and characterization
- ATE and Production Test
- Military and Commercial Aerospace
- Quantum Computing
- High Density Environments

## PERFORMANCE

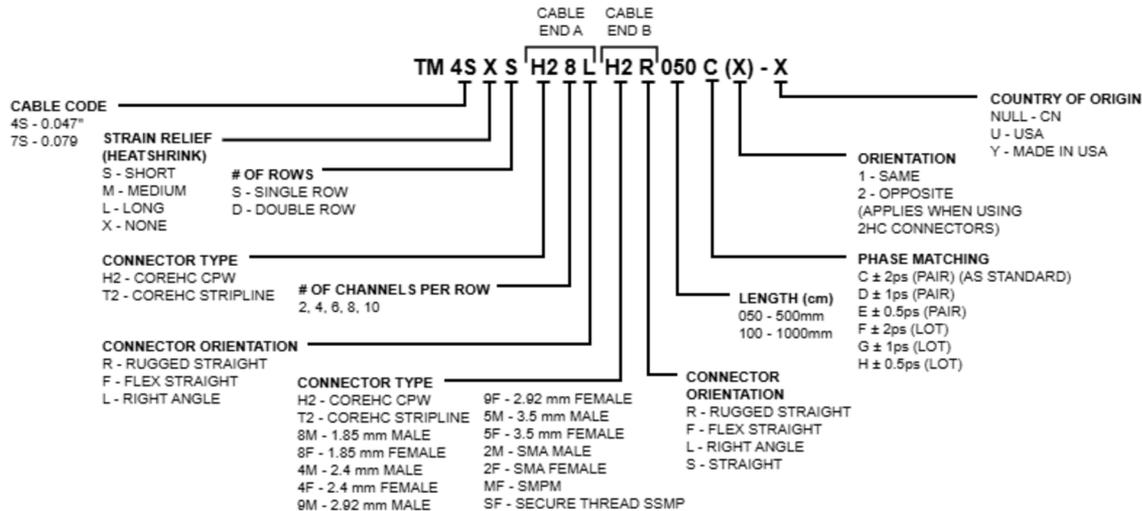


- TM50-0118\_03\_HC\_P2\_1.s2p [S21]
- TM50-0118\_03\_HC\_P2\_1.s1p [S11]

# CoreHC™ Ganged Interconnect

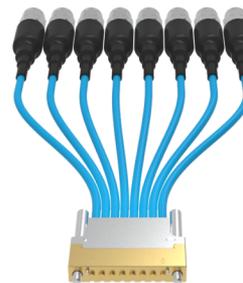
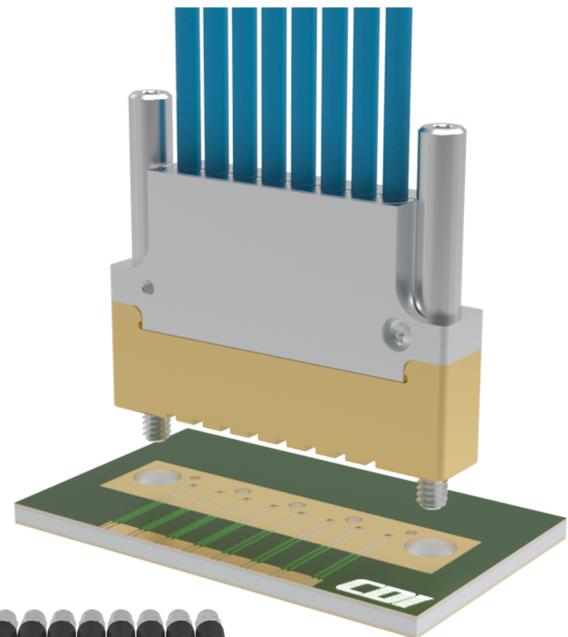
## SPECIFICATIONS

## PART BUILDER



## SPECIFICATIONS

	DC - 50GHz 56Gbps PAM4	50 - 67GHz 112 Gbps PAM4
<b>Electrical Specifications</b>		
Insertion Loss **Meter	.047": -9.25 dB @ 40GHz	.047": -13.5 dB @ 67GHz
	.078": -6 dB @ 40GHz	.078": -9 dB @ 67GHz
Return Loss	-20 dB thru 28 GHz   -16 dB thru 50 GHz   -14 dB thru 67 GHz	
Xtalk (Assembly Only)	<-60dB thru 67GHz	
Impedance	50Ω +/- 2.5Ω	
Phase Matching	+/- 2ps Standard, +/- 1 and +/-0.5ps available upon request	
VSWR	DC 28GHz: 1.22:1   28-50 GHz: 1.38   50-67GHz: 1.50:1	
Max Current (amps)	1A	
<b>Mechanical Specifications</b>		
Pitch	2.5 mm	
PCB Transition	Microstrip/CPW & Stripline	
Cable Options	.047" & .078"	
Cable Static Bend Radius	.047" (4.7mm)   .078 (6.4mm)	
End 2 Connector	SMA 3.5mm, 2.92mm SMP	2.4mm, 1.85mm SMPM
Compliant Connector Design	Spring Loaded Center Contact and Ground Shielding	
# of Rows/Assembly	Single & Dual Row Available	
Standard Channel Counts:	Single Row: 1, 2, 4, 6, 8, 10	
	Dual Row: 4, 8, 12, 16, 20	
Standard Lengths	4" (~10cm), 6" (~15cm), 9" (~23cm), 12" (~30cm), 18" (~46cm)	
Form Factors	Vertical Launch	Vertical Launch
	Right Angle	Edge Launch
	Edge Launch	
Mate & De-Mate Cycles	1000	
Repair & Replaceable	Single Channel Sub-Assemblies allow for Easy Field Replacement	



Interested in learning more?

Email us or refer to the CoreHC™ Catalog (TM99-0035-00)