

CABLINE[®]-CX II

The simulation of passing PLUG through hinge

Part No. Plug:, 20977-040T-01, 20978-040T-01

Technical Report

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1. Purpose

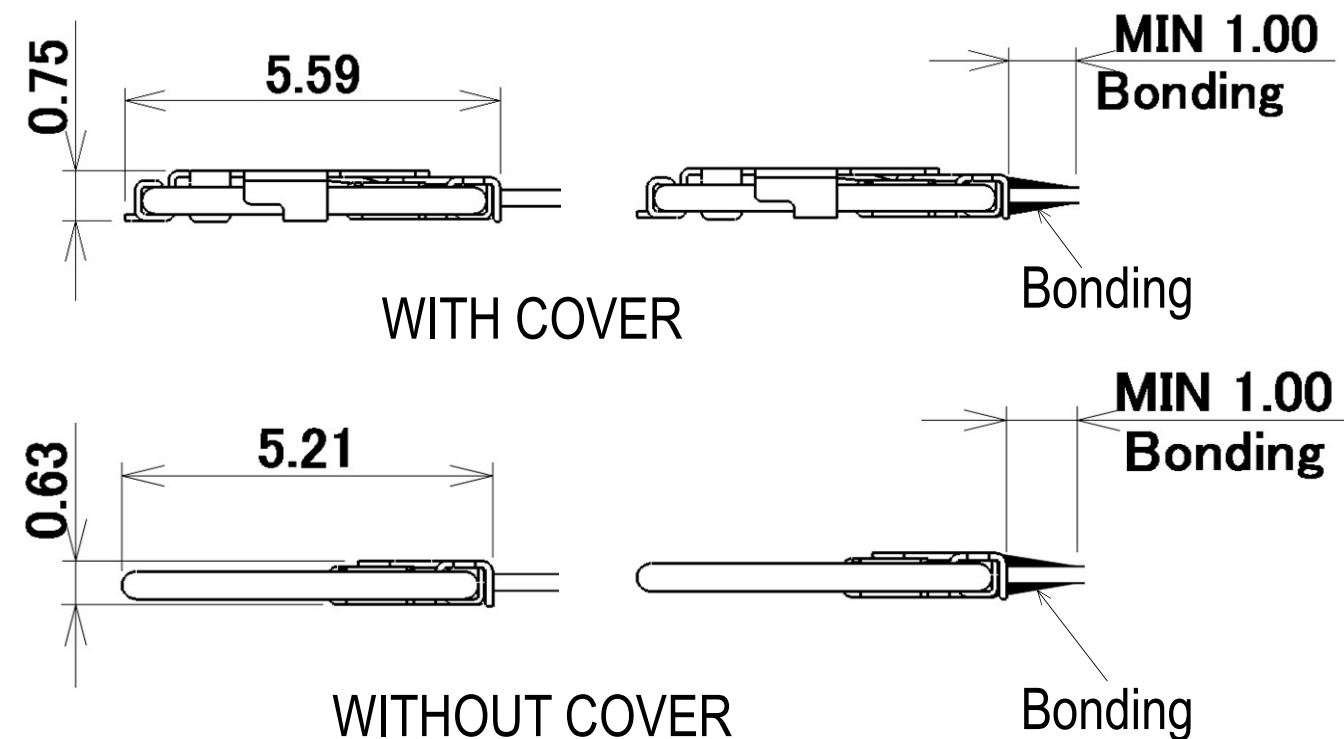
We report the simulation results of the minimum diameter of the hinge that can store the connector(CABLINE-CX II Plug) and cable.

2. Simulation conditions

- Connector : CABLINE-CX II PLUG WITH COVER CABLE ASS'Y (20977-040T-01)
CABLINE-CX II PLUG WITHOUT COVER CABLE ASS'Y (20978-040T-01)
- Number of pins : 40P
- Cable : MICRO-COAX CABLE AWG#44,46 (See Table.1 for jacket diameter.)
✕ Each simulation is connected to all Pins.
- Bonding : CABLINE-CXII recommends bonding cable outlets.
Be sure to bend the cable from the end of the bonding.

Table.1 Cable jacket(outer) diameter (mm)

AWG#	Impedance matching	
	45ohm	50ohm
44	0.24	/
46	0.22	



The simulation results presented in this report are not guaranteed. The diameter of the hinge that can be passed through may vary depending on the processing method of the harness and the type of cables used. Please use the results as a reference value. Furthermore, the utilization of bonding is recommended.

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3. Simulation result

The simulation results are shown in Table.2 and 3.

※ See the next page for details.

Table.2 WITH COVER - minimum hinge inner diameter (mm)

Cable	Size	AWG#44	AWG#46	
	Impedance matching	45ohm	45ohm	50ohm
	Jacket diameter	0.24	0.22	0.24
Minimum hinge inner diameter	Connector 40P	7.35	7.33	7.35

Table.3 WITHOUT COVER - Minimum hinge inner diameter (mm)

Cable	Size	AWG#44	AWG#46	
	Impedance matching	45ohm	45ohm	50ohm
	Jacket diameter	0.24	0.22	0.24
Minimum hinge inner diameter	Connector 40P	6.98	6.96	6.98

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3. Simulation result

Simulation results with AWG #44.

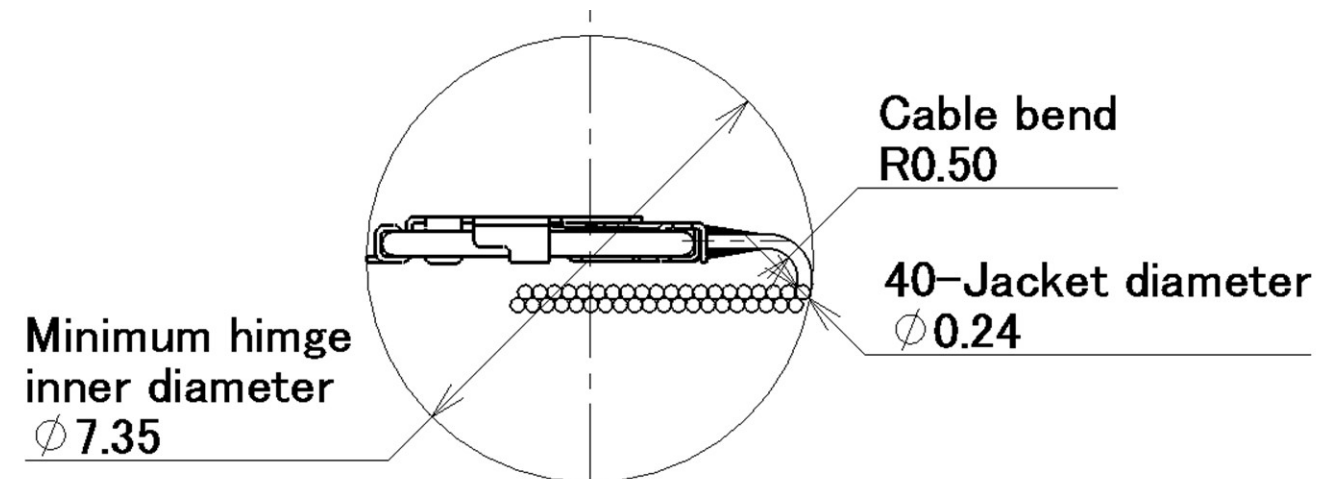


Fig.1 WITH COVER - AWG#44 (45ohm) 40P

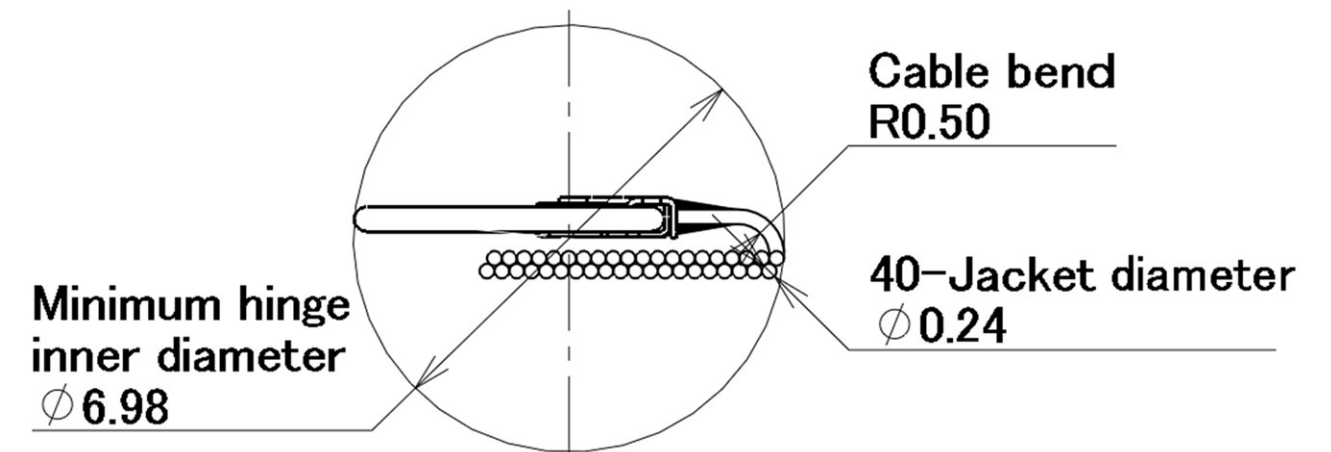


Fig.2 WITHOUT COVER - AWG#44 (45ohm) 40P

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3. Simulation result

Simulation results with AWG #46.

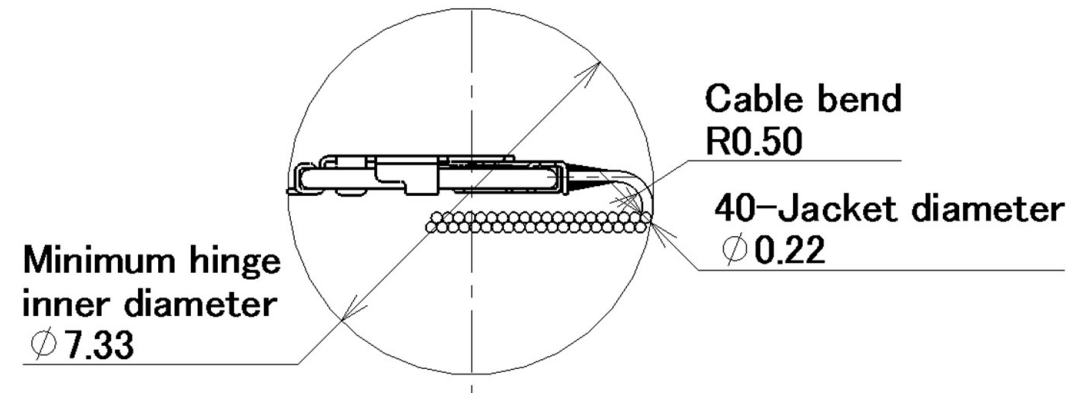


Fig.3 WITH COVER - AWG#46 (45ohm) 40P

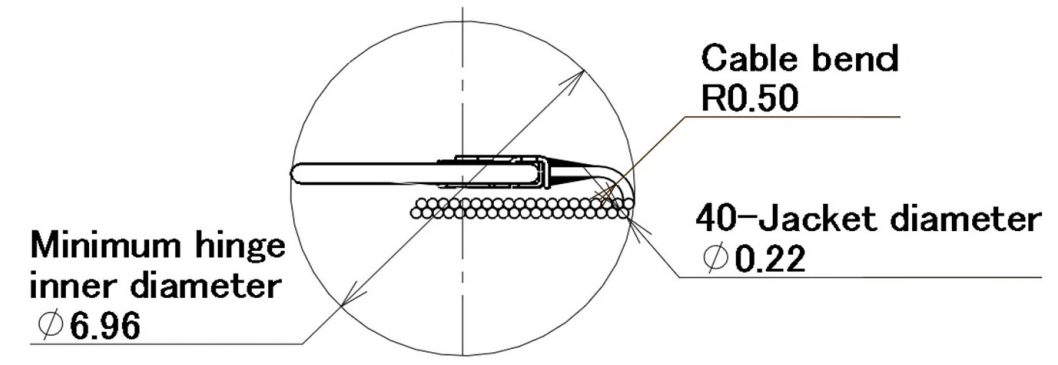


Fig.4 WITHOUT COVER - AWG#46 (45ohm) 40P

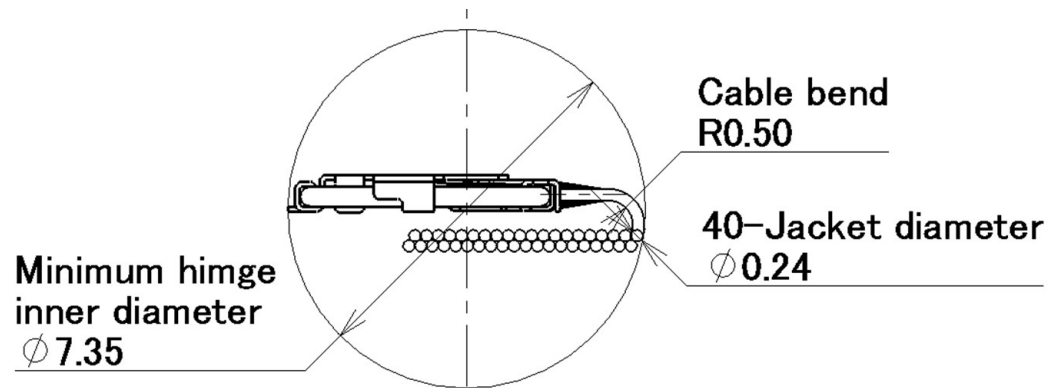


Fig.5 WITH COVER - AWG#46 (50ohm) 40P

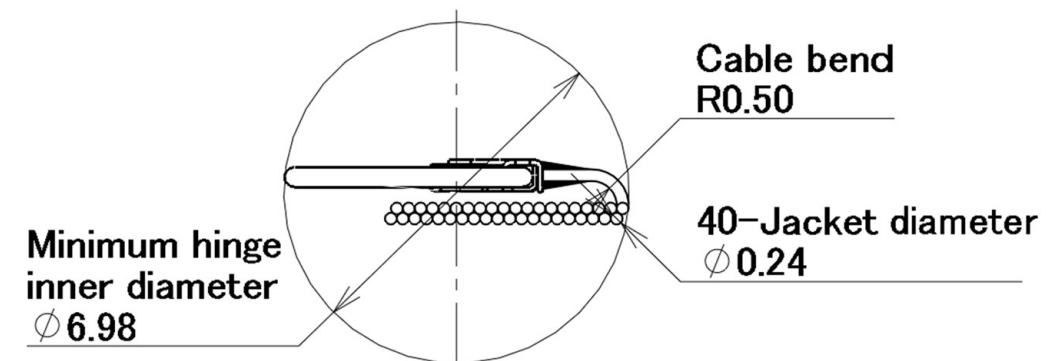


Fig.6 WITHOUT COVER - AWG#46 (50ohm) 40P

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