

# CABLINE®-CAF

Part No. 20858-0\*\*T-01

## Assembly Manual

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Rev.	ECN	Date	Prepared by	Checked by	Approved by

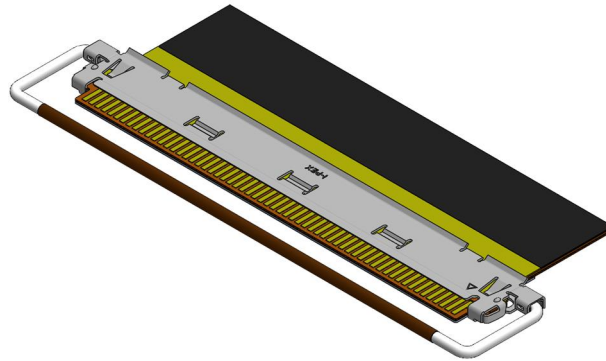
## 1. Purpose

This manual explains how to assemble FPC to CABLINE-CAF connector.

## 2. Connector Name and Part Number

Name: CABLINE-CAF plug shell assembly

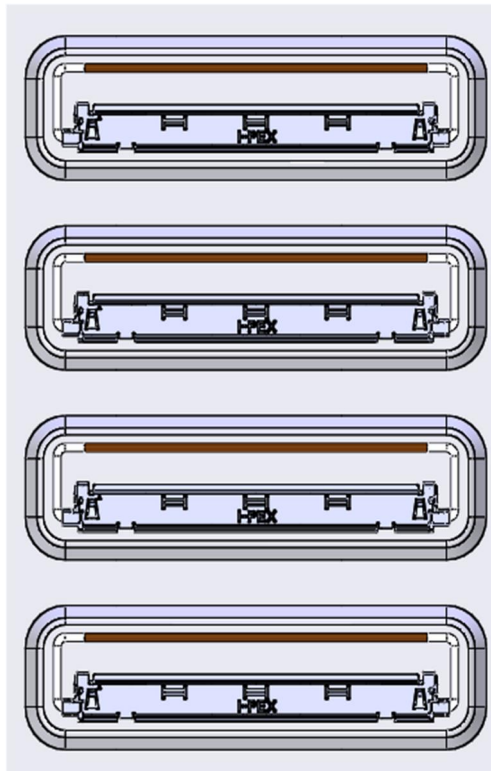
Parts Number: 20858-0\*\*T-01



**Fig. 1 SHELL Assembly with FPC**

## 3. Connector Delivery Package

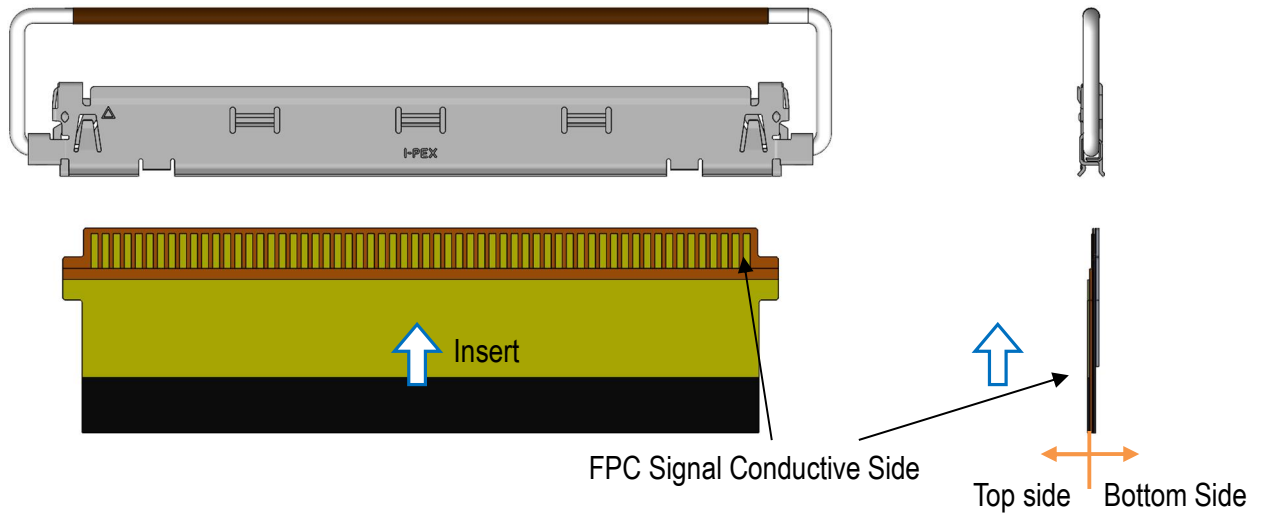
Carrier cut shell assemblies are delivered in a tray.



**Fig. 2 Shell Assemblies in Tray**

## 4. How to Assemble the FPC into the Shell Assembly

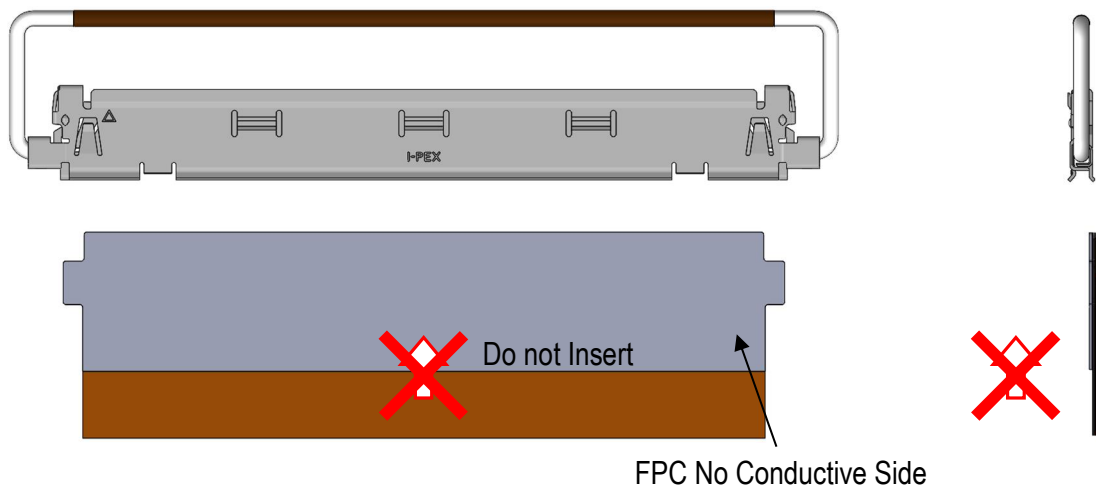
4-1. Position the FPC with its signal conductive side facing upward and horizontally insert into the shell.



**Fig. 3 FPC Assembly Positions**

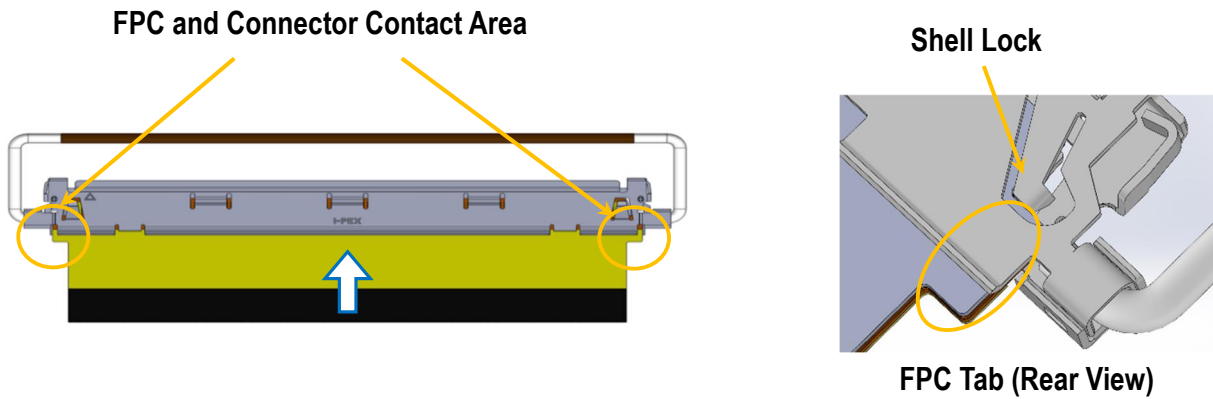
### Caution 1

Do not insert the FPC with the no conductive side facing upward.



**Fig. 4 Incorrect FPC Orientation**

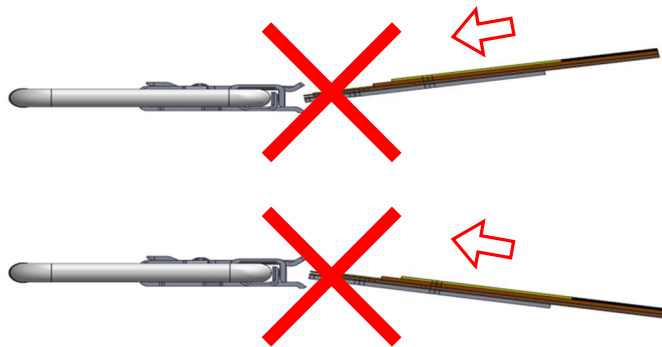
4-2. Pre-insert the FPC until its tabs contact the shell locks to ensure the correct insert position, then insert the FPC horizontally along the bottom side of the shell.



**Fig. 5 FPC Insertion**

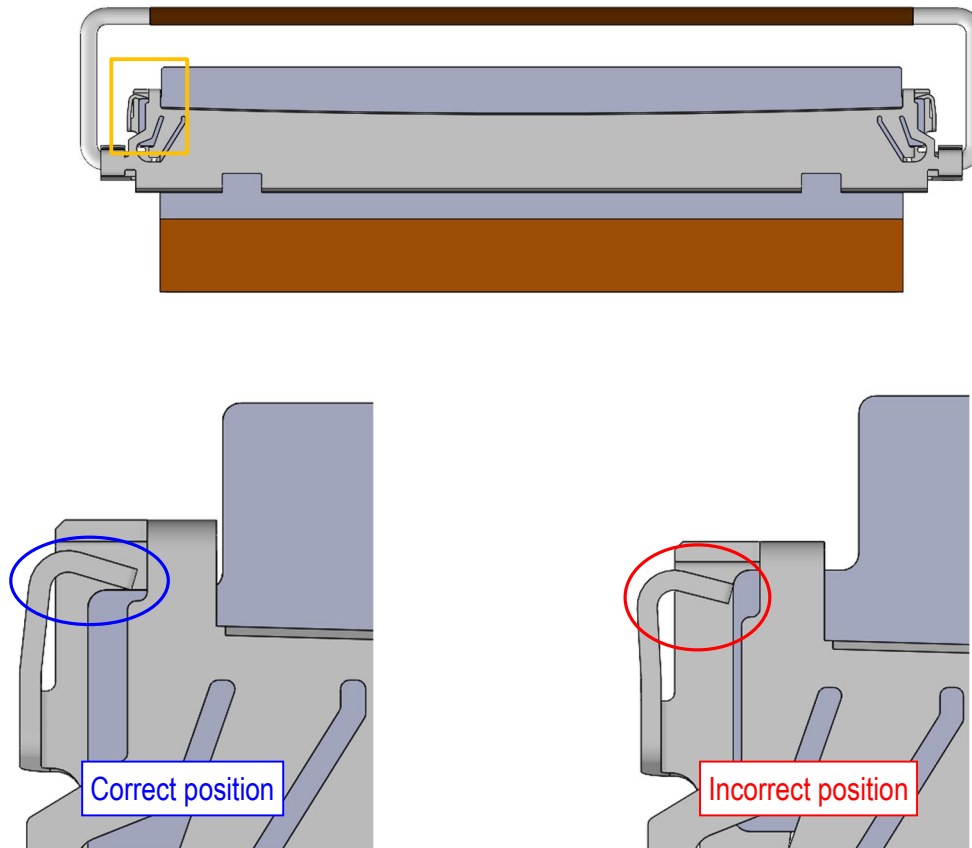
### Caution 2

Do not insert the FPC at an angle as it may result in the FPC deformation or damage.



**Fig. 6 Incorrect FPC Insertion**

4-3. After inserting the FPC, ensure that the shell spring is correctly positioned as indicated below.



**Fig. 7 Shell Spring Position**

4-4. Ensure that both shell locks are locking FPC properly.

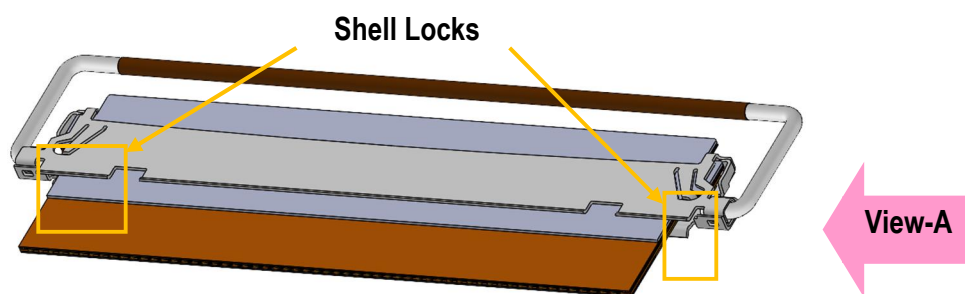
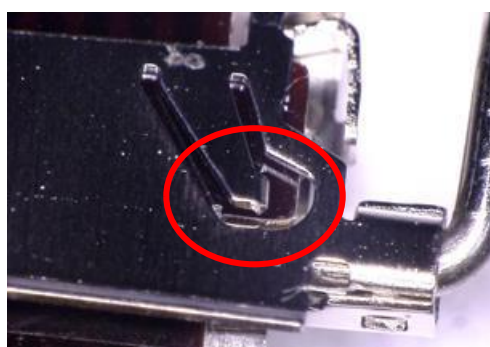


Fig. 8 Shell Locks

Enlarged View of Shell Lock

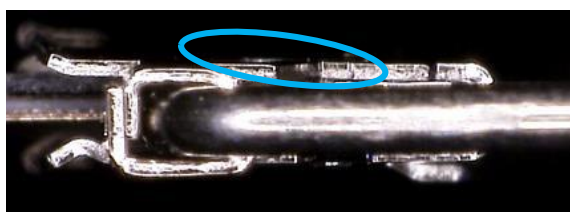


Locked



Unlocked

View-A



Locked



Unlocked

Photo. 1 Shell Lock Details

5. Soldering FPC

FPC Preparation

Ensure that the solderable areas on the top surface of the FPC is ready for soldering.  
Refer to the product drawing for FPC details.

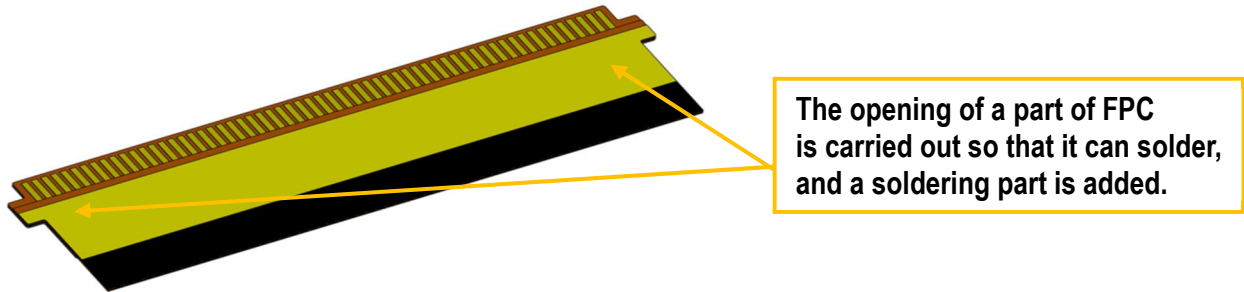


Fig. 9 FPC Soldering Area

Holding Jig Setup

Hold top and bottom surfaces of the shell with a jig before soldering or mating failure may occur.

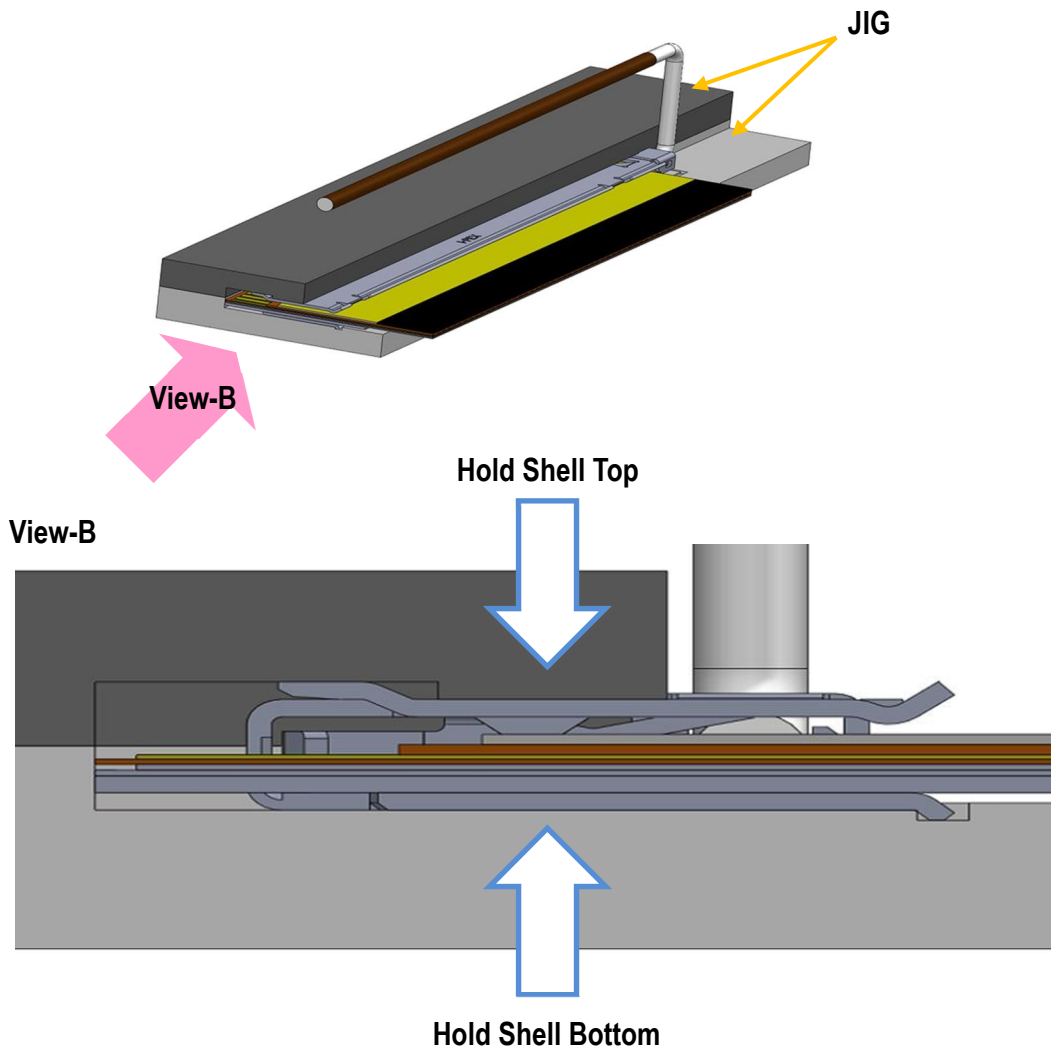
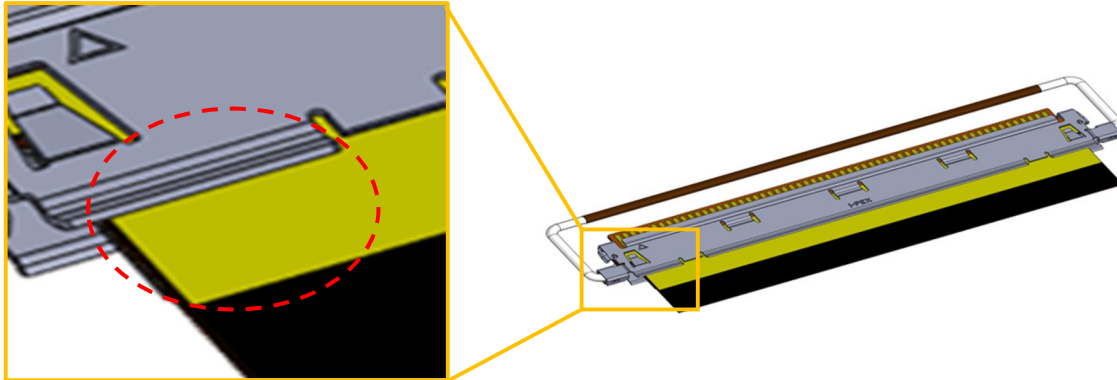


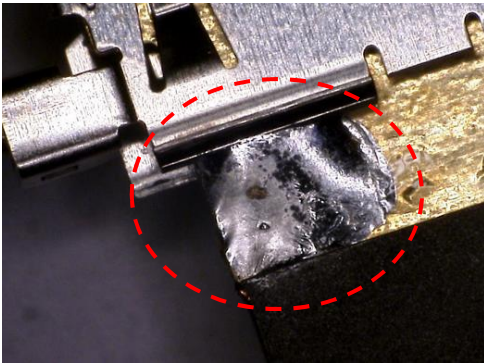
Fig. 10 JIG Example

## 5-1. Solder the FPC

I-PEX recommends soldering at two places on the top and bottom surfaces.



**Fig. 11 FPC Soldering Area**



**Photo. 2 FPC Soldering Example**



5-2. Solder the area indicated by the red line with the appropriate amount of solder to connect the FPC to the shell.



Photo. 3 Soldering of Shell and FPC

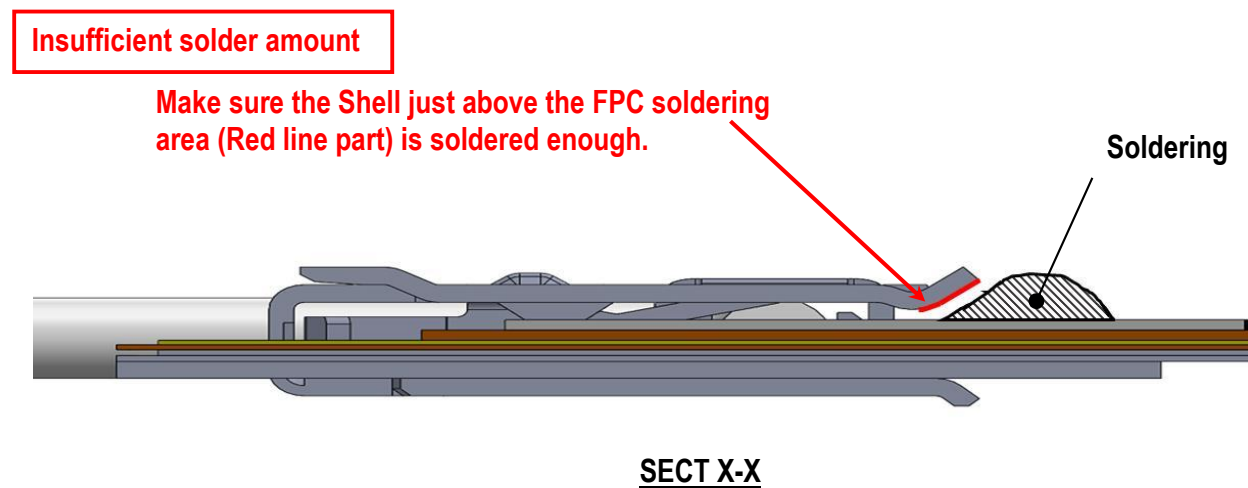
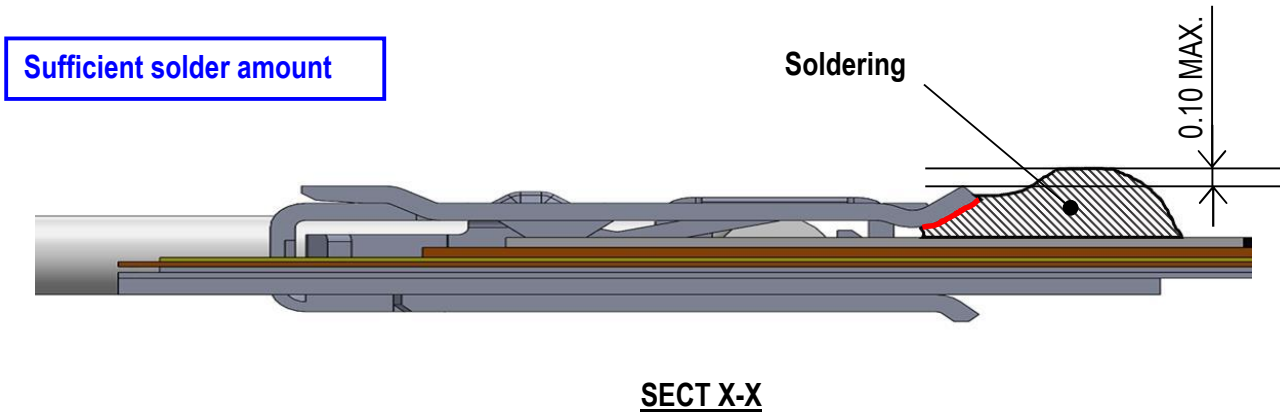


Fig. 12 Solder Amount