



## WORK INSTRUCTION

## TAPING ASSEMBLY PROCESS

Effectivity Date:

January 5, 2024

Process Name/Title:

Model code/Part number:

ES1 / 7M0510-7020C

Customer:

TRJ

Car Model:

SUBARU-FORESTER

Validity Date:

n/a

Document No.:

WI-ENG-PDE-366B

Purpose:

☐ PROTOTYPE☐ PRE-LAUNCH☒ MASSPRO

Revision No.:

9

Page No.:

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PARTS:

1. Assy parts; Connector 7282-8324 (W); Black Sv tube ø5 L=58±2mm; Black Corrugated tube ø7 L=30±3mm (with slit)

JIG:

1. Adopter jig  
2. Locking jig

NO.

PROCESS NAME

WORK PROCEDURE/ ILLUSTRATION

TOOLS/PPE

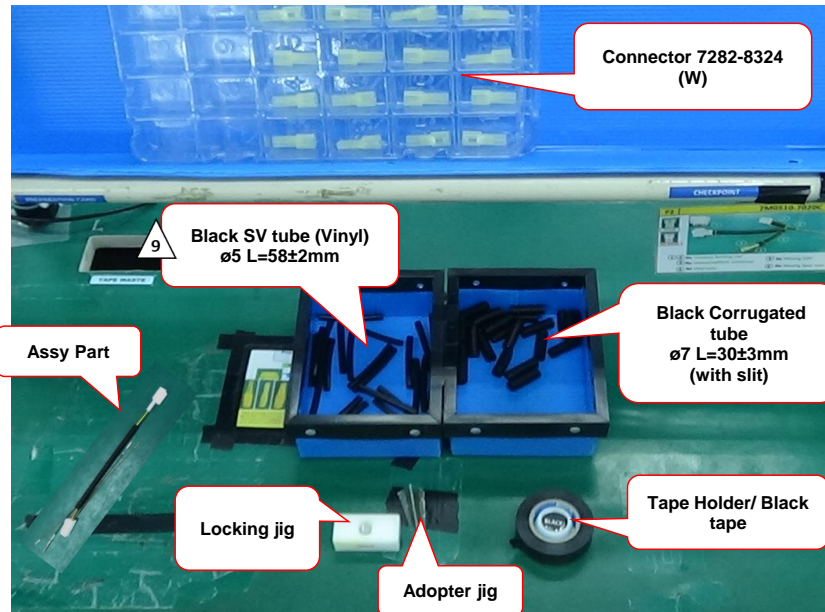
QUALITY POINTERS

1

P2

Table Lay-out

## Table Lay-out

**Safety Instruction**

Be sure to wear prescribed personal protective equipment during operation (gloves, finger cots, etc.)

**Housekeeping**

1. Maintain and always practice 5's.
2. Personal things on the workplace is prohibited. Keep it in your locker.

**Alert level**

For any trouble, inform the Assembly Assistant Supervisor or Line Leader for immediate corrective action.

1. No missing parts/tools
2. No excess parts/tools

## Revision History

Prepared by

Reviewed by

Approved by

Noted by

01/05/24

9

Change Length of Black SV tube (Vinyl) from ø5 L=57±3mm to ø5 L=58±2mm due to prone to wrong use of tube. Update table lay-out and Quality checkpoints. Transfer process from WI-ENG-PDE-366B to WI-ENG-PDE-366C due to Process improvement.

D.Castillo

C. Villanueva

A. Arañes

n/a

09/29/23

8

Change Length of Black Vinyl tube from "ø5 L=57±3mm to ø5 L=58±2mm" due to NG dimension.

A.Hernandez

C. Villanueva

A. Arañes

n/a

09/28/23

7

Change Length of Black Vinyl tube from "ø5 L=60±3mm to ø5 L=57±3mm" and change the measurement from end of vinyl tube up to terminal pointed tip from "31(+2/-1)mm to 34(±2)mm" due to Customer Complain of NG dimension. Update template inclusion of Car Model.

A.Hernandez

J. Loterte

C. Villanueva

A. Arañes

Eff. Date

Rev. No

Details of Change

Revised

Reviewed

Approved

Noted


Est. Date:

November 6, 2021

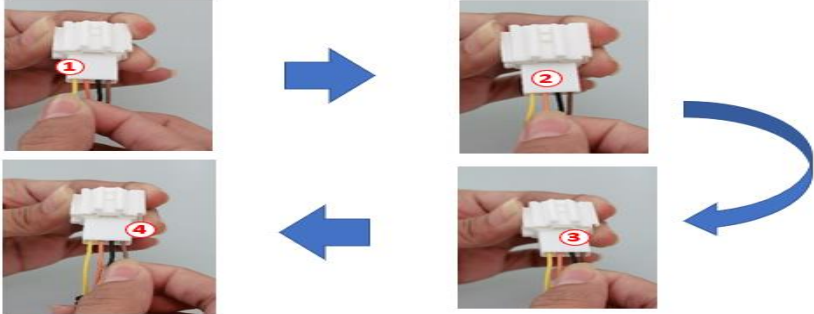
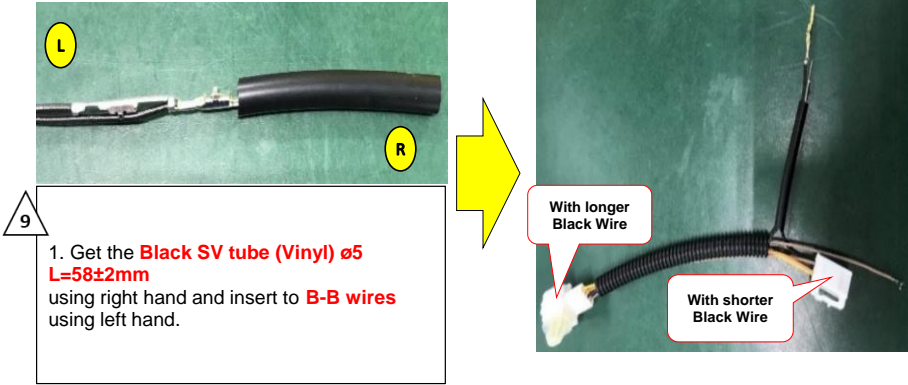
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|---|--------------------------------|--|---|--|-------------------------------------|-----------------------------------|---|-----------------|---------------|---|-----------|
|  | <b>WORK INSTRUCTION</b>        |  |   |  | Effectivity Date:                   | January 5, 2024                   |   |                 |               |   |           |
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|   | Process Name/Title:            |  | Model code/Part number: <b>ES1 / 7M0510-7020C</b> |  | Customer: <b>TRJ</b>                | Car Model: <b>SUBARU-FORESTER</b> | Document No.:                               | WI-ENG-PDE-366B |               |   |           |
|   | Purpose:                       |  | <input type="checkbox"/> PROTOTYPE                |  | <input type="checkbox"/> PRE-LAUNCH |                                   | <input checked="" type="checkbox"/> MASSPRO |                 | Revision No.: | 9 | Page No.: |

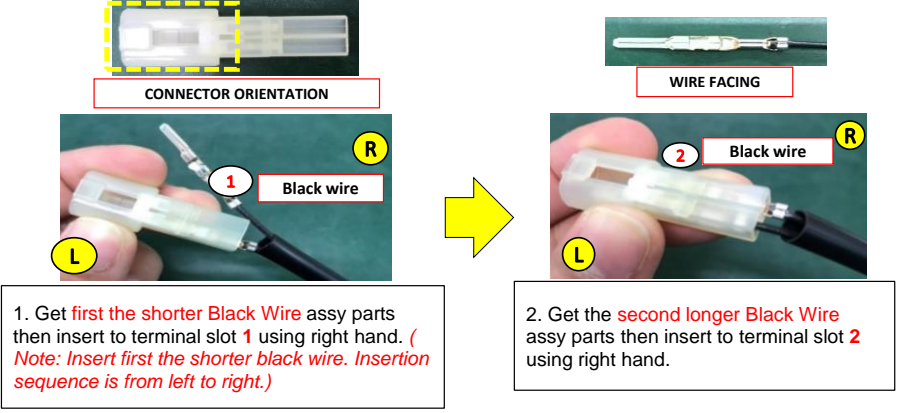
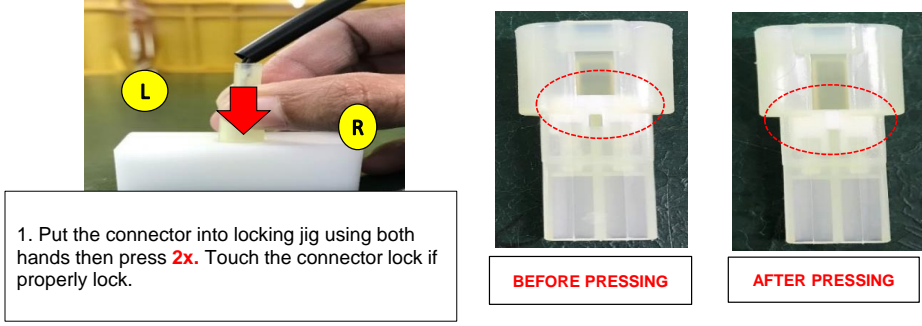

|               |  |  |                  |  |     |
|---------------|--|--|------------------|--|-----|
| <b>PARTS:</b> |  | 1. Assy parts<br>2. Black SV tube (Vinyl) ø5 L=58±2mm  |                  | JIG:   | n/a |
| <b>NO.</b>    | <b>PROCESS NAME</b>                            | <b>WORK PROCEDURE/ ILLUSTRATION</b>  | <b>TOOLS/PPE</b> | <b>QUALITY POINTERS</b>  |     |
| 2             | Wire insertion confirmation (Assy part)        |  <div style="border: 1px solid black; padding: 5px; margin-top: 10px;">         1. Get the assy part, conduct Pull-Push-Pull-Push to the wire insertion one-by-one.<br/> <b>Sequence: Y-OR-B-BR</b> </div>         | n/a              | 1. No missing parts/tools<br>2. No excess parts/tools  |     |
| 3             | Wire insertion to Black Vinyl tube ø5 L=58±2mm |  <div style="border: 1px solid black; padding: 5px; margin-top: 10px;">         1. Get the <b>Black SV tube (Vinyl) ø5 L=58±2mm</b> using right hand and insert to <b>B-B wires</b> using left hand.       </div> |                  | <b>Document reference/s:</b><br><b>1. Refer to WI-PRO-CNC-017 for Wire and Strip Length Tolerance</b><br><br>1. No deformed terminal<br>2. No wrong usage of parts |     |

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|   | Model code/Part number:                            | <b>ES1 / 7M0510-7020C</b>  | Customer: <b>TRJ</b> | Car Model: <b>SUBARU-FORESTER</b> | Document No.:   | <b>WI-ENG-PDE-366B</b> |                  |
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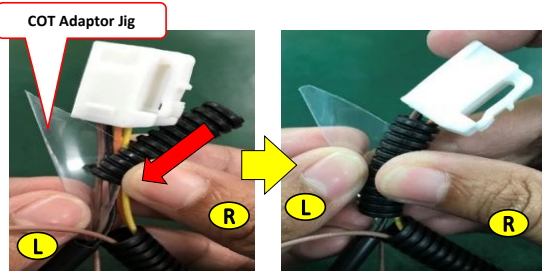

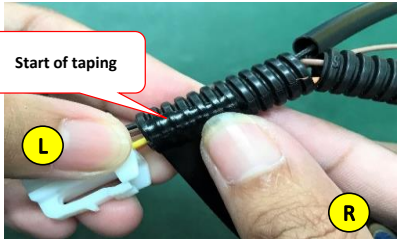
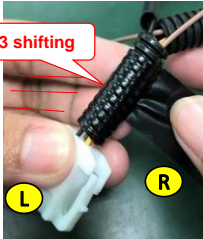
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|---------------|--|--|--|--|---------------|
| <b>PARTS:</b> | 1. Assy parts<br>2.Connector 7282-8324 (W) |  |  | JIG:   | 1.Locking Jig |
| <b>NO.</b>    | <b>PROCESS NAME</b>                        | <b>WORK PROCEDURE/ ILLUSTRATION</b>  | <b>TOOLS/PPE</b>   | <b>QUALITY POINTERS</b>  |               |
| 3             | Wire insertion to Connector 7282-8324 (W)  |  <p>1. Get <b>first the shorter Black Wire</b> assy parts then insert to terminal slot <b>1</b> using right hand. (<i>Note: Insert first the shorter black wire. Insertion sequence is from left to right.</i>)</p> <p>2. Get the <b>second longer Black Wire</b> assy parts then insert to terminal slot <b>2</b> using right hand.</p> | n/a  | 1. No wrong orientation of connector<br>2. No wrong use of connector<br>3. No damaged connector<br>4. No wrong insertion of wires<br>5. No loose insertion<br>6. No wrong insertion<br>7. One by one insertion<br>8. No deformed terminal<br>9. No wrong wire facing<br><br><b>Important reminders/Note/s:</b><br><b>1. Please hold the wire near terminal.</b><br><b>2. Make sure wires are properly inserted. Conduct Pull-Push-Pull-Push after insertion.</b><br><b>Do not exert extra force.</b><br><br><b>Document reference/s:</b><br><b>1. Refer to GL-PRO-ASY-029 for Pull-Push procedure.</b> |               |
| 4             | Connector Lock                             |  <p>1. Put the connector into locking jig using both hands then press <b>2x</b>. Touch the connector lock if properly lock.</p> <p><b>BEFORE PRESSING</b>      <b>AFTER PRESSING</b></p>  | Locking jig<br> | <b>Important reminders/Note/s:</b><br><b>1.Manual locking may cause damaged connector.</b><br><br>1. No unlock/half-locked connector<br>2. No damaged connector lock   |               |

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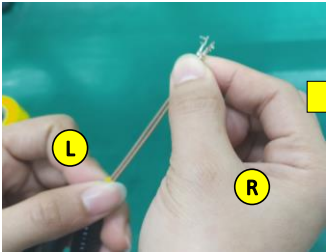
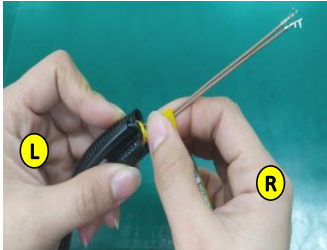
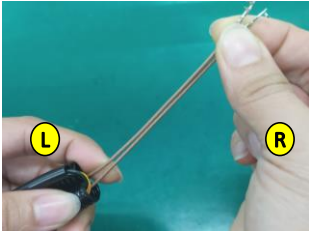

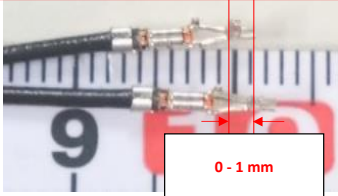
  

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|---|---|---|---|---|
| <b>PARTS:</b><br>1. Assy parts<br>2. Black Corrugated tube $\phi 7$ L=30 $\pm$ 3mm (with slit)<br>3. Black tape |   | JIG:  | 1.COT Adaptor jig   |   |
| <b>NO.</b>  | <b>PROCESS NAME</b>   | <b>WORK PROCEDURE/ ILLUSTRATION</b>   | <b>TOOLS/PPE</b>  | <b>QUALITY POINTERS</b>   |
| 5   | P2<br>Wire insertion to Black Corrugated tube $\phi 7$ L=30 $\pm$ 3mm (with slit) |  <p>1. Put the wires on COT Adaptor. Get the Corrugated tube <math>\phi 7</math> L=30<math>\pm</math>3mm (with slit) using right hand and COT adaptor using left hand. Slide the corrugated tube slit in COT Adaptor in same timing. Make sure all wires are inserted.</p>  |  | 1. No wrong use of parts<br>2. No wires left in between the COT slit  |
| 6   | Half wrap taping to Black Corrugated tube $\phi 7$ L=30 $\pm$ 3mm (with slit)     |  <p>1. Hold the assy parts using left hand, get the <b>Black tape</b> using right hand then make <b>2 windings</b> of tape before shifting.</p>  <p>2. Make <b>1/3 shifting</b> until it covers the slit of COT, make <b>2 windings</b> of tape before cutting.</p> | n/a   | 1. No flip-out tape<br>2. No peel-off tape<br>3. No loose tape<br>4. No missing tape<br>5. No wrong use of tape<br>6. No wrong dimension<br>7.No exposed COT ,It must be covered with tape<br><br><b>Important reminders/Note/s:</b><br><b>1. Please use calibrated/verified measuring tape when getting the measurement.</b> |

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|               |                                      |  |  |  |     |  |  |
|---------------|--------------------------------------|--|--|--|-----|--|--|
| <b>PARTS:</b> | 1. Assy parts<br>2. Black tape [1pc] |  |  | JIG:   | n/a |  |  |
| <b>NO.</b>    | <b>PROCESS NAME</b>                  | <b>WORK PROCEDURE/ ILLUSTRATION</b>  | <b>TOOLS/PPE</b>   | <b>QUALITY POINTERS</b>  |     |  |  |
| 7             | P2<br>Spot Taping                    | <div></div> <div>1. Hold the wires using left hand.</div> <div>2. Get the <b>Black tape</b> and start taping on the Brown wires. Conduct <b>3x windings</b> of tape before cutting using both hands.</div> <div>3. After taping, check the taping condition and alignment of terminal height.</div> | <div></div> <div>MEASURING TAPE</div> | <div><div>Wire alignment tolerance</div><div>0 - 1 mm</div></div> <div>1. No flip-out tape<br/>2. No peel-off tape<br/>3. No loose tape<br/>4. No missing tape<br/>5. No wrong use of tape<br/>6. No wrong dimension</div> <div><b>Important reminders/Note/s:</b><br/><b>1. Use <u>YELLOW TAPE</u> for easy visualization of shifting lines, but actual should be <u>BLACK TAPE</u>.</b></div> |     |  |  |

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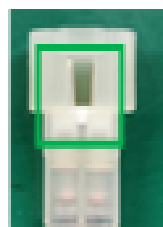
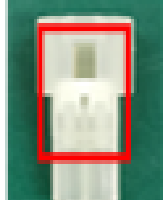
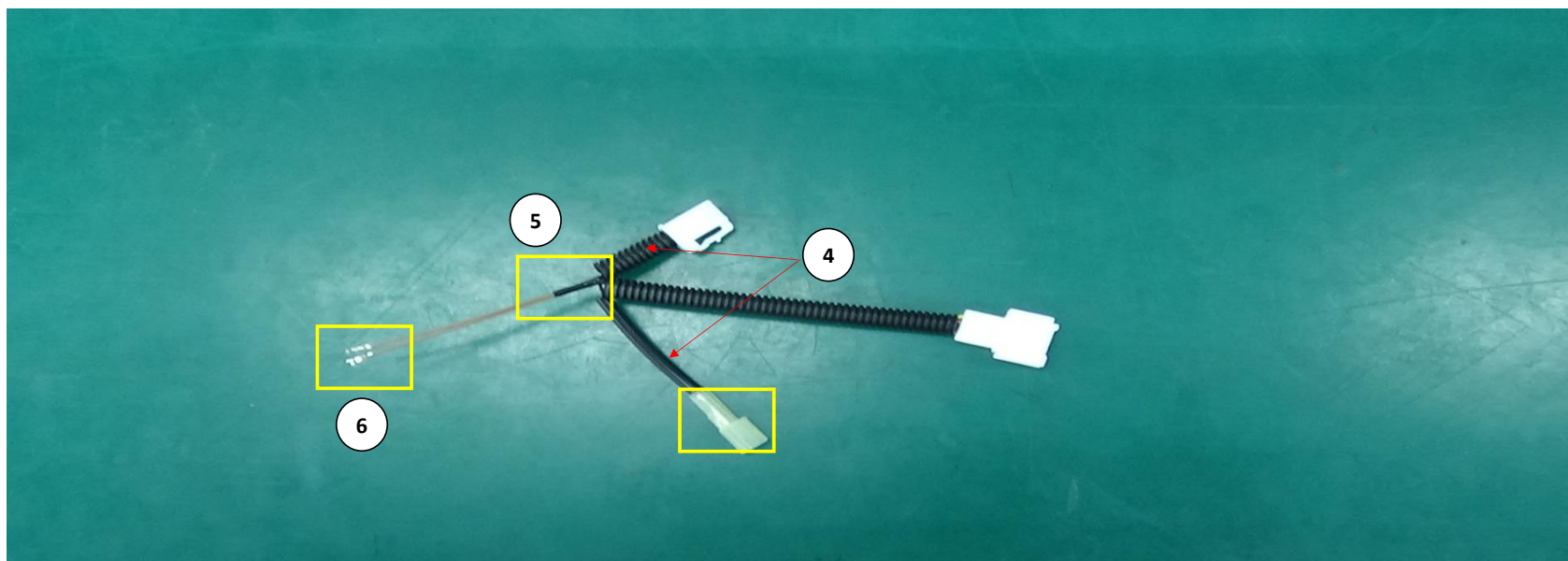
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**PARTS:**

n/a

JIG:

n/a

**QUALITY CHECKPOINTS****P2****7M0510-7020C****GOOD****NO GOOD****1 No Unlock/Halflock****3 No Terminal Backing Out****5 No Missing Spot tape****2 No Wrong Insert****4 No Missing Parts****6 No Deform Terminal**

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