# COMPLETE PRODUCTION WORK ORDER PACKAGE

**ROOT / MAIN: WO-2026-000068  SELECTED BOM: BOM-000010 / Rev.0**

Contains full frozen details for MAIN + every nested Child BOM Work Order.
PDF Generated: 2026-11-20 03:29:38

## WORK ORDER / BOM RELATIONSHIP INDEX

| Level | Work Order | Parent | Parent Operation | Product / BOM | Qty | Status |
|---|---|---|---|---|---|---|
| MAIN | WO-2026-000068 | | ROOT | C1 1000 02X05BB5LYYGDC0Y \| BOM-000010 | 1000 m | PLANNED |
| L1 | WO-2026-000069 | WO-2026-000068 | 10 OP090 Cabling / Lay-up | > S1001 01B5YLY070B5YYYA22 \| BOM-000008 | 1015 m | PLANNED |
| L2 | WO-2026-000070 | WO-2026-000069 | 10 OP060 Insulation Extrusion | > > BCL5 U-S000-0027-0250A04Y \| BOM-000006 | 1015 kg | PLANNED |
| L3 | WO-2026-000071 | WO-2026-000070 | 10 OP030 Bunching / Double Twist | > > > BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg | PLANNED |
| L4 | WO-2026-000072 | WO-2026-000071 | 10 OP020 Multiwire Drawing | > > > > BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg | PLANNED |
| L3 | WO-2026-000073 | WO-2026-000070 | 10 OP030 Bunching / Double Twist | > > > BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg | PLANNED |
| L4 | WO-2026-000074 | WO-2026-000073 | 10 OP020 Multiwire Drawing | > > > > BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg | PLANNED |
| L3 | WO-2026-000075 | WO-2026-000070 | 10 OP030 Bunching / Double Twist | > > > BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg | PLANNED |
| L4 | WO-2026-000076 | WO-2026-000075 | 10 OP020 Multiwire Drawing | > > > > BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg | PLANNED |
| L1 | WO-2026-000077 | WO-2026-000068 | 10 OP090 Cabling / Lay-up | > S1001 01B5YLY070B5YYYA22 \| BOM-000008 | 1015 m | PLANNED |
| L2 | WO-2026-000078 | WO-2026-000077 | 10 OP060 Insulation Extrusion | > > BCL5 U-S000-0027-0250A04Y \| BOM-000006 | 1015 kg | PLANNED |
| L3 | WO-2026-000079 | WO-2026-000078 | 10 OP030 Bunching / Double Twist | > > > BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg | PLANNED |
| L4 | WO-2026-000080 | WO-2026-000079 | 10 OP020 Multiwire Drawing | > > > > BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg | PLANNED |
| L3 | WO-2026-000081 | WO-2026-000078 | 10 OP030 Bunching / Double Twist | > > > BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg | PLANNED |
| L4 | WO-2026-000082 | WO-2026-000081 | 10 OP020 Multiwire Drawing | > > > > BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg | PLANNED |
| L3 | WO-2026-000083 | WO-2026-000078 | 10 OP030 Bunching / Double Twist | > > > BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg | PLANNED |
| L4 | WO-2026-000084 | WO-2026-000083 | 10 OP020 Multiwire Drawing | > > > > BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg | PLANNED |

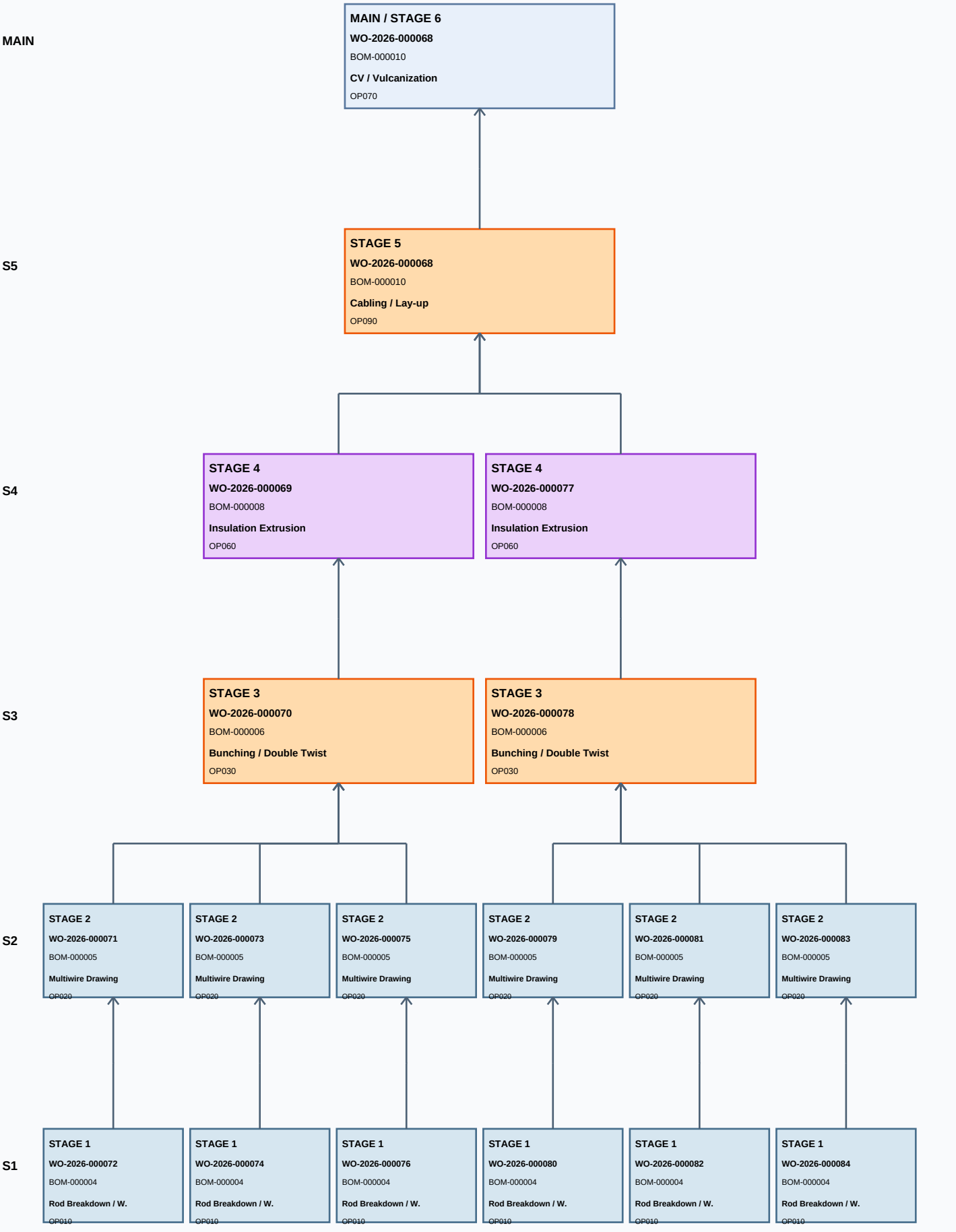
## PRODUCTION / MANUFACTURING SEQUENCE - PRODUCE FROM DEEPEST CHILD TO MAIN

| Prod Seq | Level | Work Order | Parent | Parent Operation | Product / BOM | Qty |
|---|---|---|---|---|---|---|
| 1 | L4 | WO-2026-000072 | WO-2026-000071 | 10 OP020 Multiwire Drawing | BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg |
| 1 | L4 | WO-2026-000074 | WO-2026-000073 | 10 OP020 Multiwire Drawing | BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg |
| 1 | L4 | WO-2026-000076 | WO-2026-000075 | 10 OP020 Multiwire Drawing | BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg |
| 1 | L4 | WO-2026-000080 | WO-2026-000079 | 10 OP020 Multiwire Drawing | BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg |
| 1 | L4 | WO-2026-000082 | WO-2026-000081 | 10 OP020 Multiwire Drawing | BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg |
| 1 | L4 | WO-2026-000084 | WO-2026-000083 | 10 OP020 Multiwire Drawing | BCL1 N-N000-0001-1250005Y \| BOM-000004 | 339.686633 kg |
| 2 | L3 | WO-2026-000071 | WO-2026-000070 | 10 OP030 Bunching / Double Twist | BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg |
| 2 | L3 | WO-2026-000073 | WO-2026-000070 | 10 OP030 Bunching / Double Twist | BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg |
| 2 | L3 | WO-2026-000075 | WO-2026-000070 | 10 OP030 Bunching / Double Twist | BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg |
| 2 | L3 | WO-2026-000079 | WO-2026-000078 | 10 OP030 Bunching / Double Twist | BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg |
| 2 | L3 | WO-2026-000081 | WO-2026-000078 | 10 OP030 Bunching / Double Twist | BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg |
| 2 | L3 | WO-2026-000083 | WO-2026-000078 | 10 OP030 Bunching / Double Twist | BCL5 N-N000-0009-0250007Y \| BOM-000005 | 338.3333 kg |
| 3 | L2 | WO-2026-000070 | WO-2026-000069 | 10 OP060 Insulation Extrusion | BCL5 U-S000-0027-0250A04Y \| BOM-000006 | 1015 kg |
| 3 | L2 | WO-2026-000078 | WO-2026-000077 | 10 OP060 Insulation Extrusion | BCL5 U-S000-0027-0250A04Y \| BOM-000006 | 1015 kg |
| 4 | L1 | WO-2026-000069 | WO-2026-000068 | 10 OP090 Cabling / Lay-up | S1001 01B5YLY070B5YYYA22 \| BOM-000008 | 1015 m |
| 4 | L1 | WO-2026-000077 | WO-2026-000068 | 10 OP090 Cabling / Lay-up | S1001 01B5YLY070B5YYYA22 \| BOM-000008 | 1015 m |
| 5 | MAIN | WO-2026-000068 | | FINAL / MAIN | C1 1000 02X05BB5LYYGDC0Y \| BOM-000010 | 1000 m |

| | |
|---|---|
| 1. | **Production Stage 1 = ALL Work Orders on the deepest hierarchy level. They may be produced in parallel.** |
| 2. | **After every Work Order in a stage is completed, move one level upward to the next Production Stage.** |
| 3. | **The MAIN Work Order is the final stage and starts after all required child/semi-finished stages are completed.** |

# VISUAL WORK ORDER / BOM HIERARCHY

Real operation flow: parallel BOM branches merge at the consuming process, then continue as ONE line.




Parallel inputs converge into ONE consuming operation. After the merge, the route continues as ONE process line. MAIN = actual final operation.

**MAIN WORK ORDER** **ROOT OF SELECTED BOM TREE**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000068

**PRODUCT**

**C1 1000 02X05BB5LYYGDC0Y | H07RN-F 2X2.5** mm2

Qty: 1000 m Customer: |

WO Date/Time: 2026-10-04 14:27:05

**MAIN WO BARCODE**

WO-2026-000068-MAIN-000069

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000010 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | MAIN / L0 | **Parent WO** | |
| **Parent Operation** | -- | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | 450/750 | **Core / Section** | 2 / 2.5 mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:05 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000010 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000010 / Rev.0 | **OP090 \| Cabling / Lay-up** | F02-M03 \| Rigid Strander | \| |
| **20** | BOM-000010 / Rev.0 | **OP070 \| CV / Vulcanization** | F03-M08 \| Outer Sheathing Line | \| |

## OP 10 - OP090 | Cabling / Lay-up

BOM: BOM-000010 / Rev.0 Source Seq: 10

Machine: F02-M03 | Rigid Strander Work Centre: |

**Speed: 144 m/min**

Setup: 34324 min Scrap: 0%

WO-2026-000068-010-OP090-76

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **1000 m** | **m** | **144 m/min** | 34324 min | 131 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Lay Type** | **234324** | | | | |
| **Lay Direction** | **234324** | | | | |
| **Minimum Lay Length** | **23432** | 4324 | 234 | | |
| **Nominal Lay Length** | | | | | |
| **Maximum Lay Length** | | | | | |
| **Lay Ratio** | | | 234 | | |
| **Minimum Diameter** | | | | | |
| **Nominal Diameter** | | | | | |
| **Maximum Diameter** | | | | | |
| **Filler Cord Count** | | | | | |
| **Filler Cord Diameter** | | | | | |
| **Dummy Core Count** | | | | | |
| **Dummy Core Diameter** | | | | | |
| **Filler Cord Material** | | | | | |
| **Filler Cord Weight** | | | | | |
| **Yarn Material** | | | | | |
| **Yarn Weight** | | | | | |
| **Color and Number Sequence** | | | | | |

| | | | | | |
|---|---|---|---|---|---|
| **Process Type** | **4324** | | | | |
| **Material Standard** | **234** | | | | |
| **Color** | | | | | |
| **Color Masterbatch Ratio (%)** | | | | % | |
| **Color Masterbatch Type** | | | | | |
| **Input Diameter** | | | | | |
| **Manufacturing Wall Thickness (mm)** | | | | mm | |
| **Manufacturing Minimum Wall Thickness (mm)** | | | | mm | |
| **Manufacturing Maximum Wall Thickness (mm)** | | | | mm | |
| **Manufacturing Nominal Diameter (mm)** | | | | mm | |
| **Manufacturing Minimum Diameter (mm)** | | | | mm | |
| **Manufacturing Maximum Diameter (mm)** | **234** | | 234 | mm | |
| **Standard Minimum Diameter** | | | | | |
| **Standard Maximum Diameter** | **42** | 4234 | | | 42334 |
| **Material Weight (kg/km)** | | | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | | | | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Assembly OD** | | | | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **S1001 01B5YLY070B5YYYA22 \| Single \| H07RN-F \| - \| 0.5 \| Bare bunched class 5 \| YOK \| P-EPR \| YOK \| 0,7 \| B \| YOK \| Y \| YOK \| NO CLOUR \| EN 50525-2-21** | BOM-000008 / Rev.0 | 1015 m | 1015 m | **WO-2026-000069** | NEXT: WO-2026-000068 -> WO-2026-000069 |
| **S1001 01B5YLY070B5YYYA22 \| Single \| H07RN-F \| - \| 0.5 \| Bare bunched class 5 \| YOK \| P-EPR \| YOK \| 0,7 \| B \| YOK \| Y \| YOK \| NO CLOUR \| EN 50525-2-21** | BOM-000008 / Rev.0 | 1015 m | 1015 m | **WO-2026-000077** | NEXT: WO-2026-000068 -> WO-2026-000077 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

## OP 20 - OP070 | CV / Vulcanization

BOM: BOM-000010 / Rev.0 Source Seq: 20

Machine: F03-M08 | Outer Sheathing Line Work Centre: |

**Speed: 45 m/min**

Setup: 4545 min Scrap: 1%

WO-2026-000068-020-OP070-77

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **1000 m** | **1000 m** | **45 m/min** | 4545 min | 4545 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Process Type** | | | | | |
| **Material Standard** | | | | | |
| **Color** | | | | | |
| **Color Masterbatch Ratio (%)** | | | | % | |

| | | | | | |
|---|---|---|---|---|---|
| **Color Masterbatch Type** | | | | | |
| **Catalyst Ratio (%)** | | | | % | |
| **Insulation Input Diameter** | | | | | |
| **Nominal Wall Thickness (mm)** | | | | mm | |
| **Minimum Point Wall Thickness (mm)** | | | | mm | |
| **Maximum Point Wall Thickness (mm)** | | | | mm | |
| **Manufacturing Nominal Diameter (mm)** | | | | mm | |
| **Manufacturing Minimum Diameter (mm)** | | | | mm | |
| **Manufacturing Maximum Diameter (mm)** | | | | mm | |
| **Insulation Resistance (M?.km)** | | | | Mohm/km | |
| **Standard Minimum Diameter** | | | | | |
| **Standard Maximum Diameter** | | | | | |
| **Material Weight (kg/km)** | | | | kg/km | |
| **Insulation Marking** | | | | | |
| **Note** | | | | | |
| **Tensile Strength / Elongation Values** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Curing Pressure** | | | | bar | |
| **Curing Temperature** | | | | ?C | |
| **Line Speed** | | | | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Hot Set Elongation** | | | | % | |

## RAW MATERIALS / COMPONENTS - OP 20 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **CMP-RUB-002** | CPE Rubber Sheathing Compound | 100 | **105** | kg | | 5% | |

## OP 20 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 1** **PARENT WO-2026-000068 / OP 10 OP090 Cabling / Lay-up**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000069

**PRODUCT**

**S1001 01B5YLY070B5YYYA22 | Single |** H07RN-F | - | 0.5 | Bare bunched class 5 | YOK | P-EPR | YOK | 0,7 | B | YOK | Y | YOK | NO CLOUR | EN 50525-2-21

Qty: 1015 m Customer: |

WO Date/Time: 2026-10-04 14:27:05

**MAIN WO BARCODE**

WO-2026-000069-MAIN-000070

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000008 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L1 | **Parent WO** | WO-2026-000068 |
| **Parent Operation** | 10 \| OP090 Cabling / Lay-up | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:05 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000068 / OP 10 OP090

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000008 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000008 / Rev.0 | **OP060 \| Insulation Extrusion** | F02-M04 \| XLPE Insulation Line | \| |

## OP 10 - OP060 | Insulation Extrusion

BOM: BOM-000008 / Rev.0 Source Seq: 10

Machine: F02-M04 | XLPE Insulation Line Work Centre: |

**Speed: 100 m/min**

Setup: 45 min Scrap: 5%

WO-2026-000069-010-OP060-78

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **1015 m** | **1000 m** | **100 m/min** | 45 min | 23 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Process Type** | | | | | |
| **Material Standard** | | | | | |
| **Color** | | | | | |
| **Color Masterbatch Ratio (%)** | | | | % | |
| **Color Masterbatch Type** | | | | | |
| **Catalyst Ratio (%)** | | | | % | |
| **Anti-Rodent Additive Ratio (%)** | | | | % | |
| **Anti-Termite Additive Ratio (%)** | | | | % | |
| **Flame-Retardant Additive Ratio (%)** | | | | % | |
| **Foaming Additive Ratio (%)** | | | | % | |
| **Nominal Wall Thickness (mm)** | | | | mm | |
| **Minimum Point Wall Thickness (mm)** | | | | mm | |
| **Nominal Diameter (mm)** | | | | mm | |
| **Minimum Diameter (mm)** | | | | mm | |
| **Maximum Diameter (mm)** | | | | mm | |
| **Manufacturing Wall Thickness (mm)** | | | | mm | |
| **Manufacturing Minimum Wall Thickness (mm)** | | | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Manufacturing Maximum Wall Thickness (mm)** | | | | mm | |
| **Material Weight (kg/km)** | | | | kg/km | |
| **Manufacturing Nominal Diameter (mm)** | | | | mm | |
| **Manufacturing Minimum Diameter (mm)** | | | | mm | |
| **Manufacturing Maximum Diameter (mm)** | | | | mm | |
| **Insulation Input Diameter** | | | | | |
| **Maximum Point Wall Thickness (mm)** | | | | mm | |
| **Insulation Resistance (M?.km)** | | | | Mohm/km | |
| **Standard Minimum Diameter** | | | | | |
| **Standard Maximum Diameter** | | | | | |
| **Insulation Marking** | | | | | |
| **Note** | | | | | |
| **Tensile Strength / Elongation Values** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Extruder Zone Temperatures** | | | | ?C | |
| **Head Temperature** | | | | ?C | |
| **Screw Speed** | | | | rpm | |
| **Line Speed** | | | | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Minimum Thickness** | | | | mm | |
| **Spark Test Voltage** | | | | kV | |
| **Insulated Core OD** | | | | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL5 U-S000-0027-0250A04Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| Unilay concentric EU \| S Left \| 27 x 0.25 mm \| Lay 16D \| 1.5 mm2** | BOM-000006 / Rev.0 | 1000 kg | 1015 kg | **WO-2026-000070** | NEXT: WO-2026-000069 -> WO-2026-000070 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 2** **PARENT WO-2026-000069 / OP 10 OP060 Insulation Extrusion**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000070

**PRODUCT**

**BCL5 U-S000-0027-0250A04Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
Unilay concentric EU | S Left | 27 x 0.25 mm | Lay 16D | 1.5 mm2

Qty: 1015 kg Customer: |

WO Date/Time: 2026-10-04 14:27:05

**MAIN WO BARCODE**

WO-2026-000070-MAIN-000071

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000006 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L2 | **Parent WO** | WO-2026-000069 |
| **Parent Operation** | 10 \| OP060 Insulation Extrusion | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:05 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000069 / OP 10 OP060

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000006 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000006 / Rev.0 | **OP030 \| Bunching / Double Twist** | F03-M05 \| Cabling Machine | \| |

## OP 10 - OP030 | Bunching / Double Twist

BOM: BOM-000006 / Rev.0 Source Seq: 10

Machine: F03-M05 | Cabling Machine Work Centre: |

**Speed: 232323 m/min**

Setup: 3434324 min Scrap: 55555%

WO-2026-000070-010-OP030-79

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **1015 kg** | **m** | **232323 m/min** | 3434324 min | 234324 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ADSAD** | | | | |
| **Construction** | **SADSAD** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | | | | |
| **Nominal Lay Length** | | | | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | | | | |
| **Maximum Conductor Resistance** | | | | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | | | | kg/km | |
| **Note** | **AD** | | | | |
| **Lay Type** | | | | | |
| **Minimum Lay Length** | | | | | |
| **Lay Ratio** | | | | | |
| **Minimum Diameter** | | | | | |

| | | | | | |
|---|---|---|---|---|---|
| **Nominal Diameter** | | | | | |
| **Maximum Diameter** | | | | | |
| **Filler Cord Count** | | | | | |
| **Filler Cord Diameter** | | | | | |
| **Dummy Core Count** | | | | | |
| **Dummy Core Diameter** | | | | | |
| **Filler Cord Material** | | | | | |
| **Filler Cord Weight** | | | | | |
| **Yarn Material** | **DASD** | | | | |
| **Yarn Weight** | | | | | |
| **Color and Number Sequence** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Bow / Rotor Speed** | | | | rpm | |
| **Line Speed** | | | | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor OD** | | | | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL5 N-N000-0009-0250007Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| NOT \| NOT \| 9 x 0.25 mm \| Lay NOT \| 6 mm2** | BOM-000005 / Rev.0 | 333.3333 kg | 338.3333 kg | **WO-2026-000071** | NEXT: WO-2026-000070 -> WO-2026-000071 |
| **BCL5 N-N000-0009-0250007Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| NOT \| NOT \| 9 x 0.25 mm \| Lay NOT \| 6 mm2** | BOM-000005 / Rev.0 | 333.3333 kg | 338.3333 kg | **WO-2026-000073** | NEXT: WO-2026-000070 -> WO-2026-000073 |
| **BCL5 N-N000-0009-0250007Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| NOT \| NOT \| 9 x 0.25 mm \| Lay NOT \| 6 mm2** | BOM-000005 / Rev.0 | 333.3333 kg | 338.3333 kg | **WO-2026-000075** | NEXT: WO-2026-000070 -> WO-2026-000075 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 3** **PARENT WO-2026-000070 / OP 10 OP030 Bunching / Double Twist**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000071

**PRODUCT**

**BCL5 N-N000-0009-0250007Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
NOT | NOT | 9 x 0.25 mm | Lay NOT | 6 mm2

Qty: 338.3333 kg Customer: |

WO Date/Time: 2026-10-04 14:27:05

**MAIN WO BARCODE**

WO-2026-000071-MAIN-000072

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000005 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L3 | **Parent WO** | WO-2026-000070 |
| **Parent Operation** | 10 \| OP030 Bunching / Double Twist | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:05 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000070 / OP 10 OP030

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000005 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000005 / Rev.0 | **OP020 \| Multiwire Drawing** | F03-M02 \| Fine Wire Drawing Machine | \| |

## OP 10 - OP020 | Multiwire Drawing

BOM: BOM-000005 / Rev.0 Source Seq: 10

Machine: F03-M02 | Fine Wire Drawing Machine Work Centre: |

**Speed: 33333 m/min**

Setup: 545 min Scrap: 1%

WO-2026-000071-010-OP020-80

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **338.3333 kg** | **m** | **33333 m/min** | 545 min | 30 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ERSDF** | | | | |
| **Construction** | **DSF** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | **4534** | 4544 | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | 4 | 44 | | |
| **Nominal Lay Length** | | | 44 | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | 44 | 6 | | |
| **Maximum Conductor Resistance** | | 4 | 4 | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | **4** | 4 | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | **12** | 8 | 15 | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Wire Diameter** | **8768** | 6767 | 6767 | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL1 N-N000-0001-1250005Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 1.25 mm \| Lay NOT \| 2.5 mm2** | BOM-000004 / Rev.0 | 1004 kg | 339.686633 kg | **WO-2026-000072** | NEXT: WO-2026-000071 -> WO-2026-000072 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 4** **PARENT WO-2026-000071 / OP 10 OP020 Multiwire Drawing**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000072

**PRODUCT**

**BCL1 N-N000-0001-1250005Y | Bare Copper |** IEC | Round/Bunch | IEC 60228 Class 1 | NOT | NOT | 1 x 1.25 mm | Lay NOT | 2.5 mm2

Qty: 339.686633 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000072-MAIN-000073

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000004 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L4 | **Parent WO** | WO-2026-000071 |
| **Parent Operation** | 10 \| OP020 Multiwire Drawing | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000071 / OP 10 OP020

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000004 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000004 / Rev.0 | **OP010 \| Rod Breakdown / Wire Drawing** | F03-M01 \| Rod Breakdown Machine | \| |

## OP 10 - OP010 | Rod Breakdown / Wire Drawing

BOM: BOM-000004 / Rev.0 Source Seq: 10

Machine: F03-M01 | Rod Breakdown Machine Work Centre: |

**Speed: 4 m/min**

Setup: 30 min Scrap: 1%

WO-2026-000072-010-OP010-81

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **339.686633 kg** | **1000 kg** | **4 m/min** | 30 min | 15 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **copper** | | | | |
| **Construction** | | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | **33** | | | | |
| **Diameter** | **33** | 5 | 333 | | |
| **Nominal Lay Length** | | | 33 | | |
| **Maximum Lay Length** | **3** | | 3 | | |
| **Theoretical Conductor Resistance** | **3** | | 3 | | |
| **Maximum Conductor Resistance** | **3** | 3 | | | |
| **Maximum Standard Resistance** | **3** | | 3 | | |
| **Material Weight (kg/km)** | **3** | | 3 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Inlet Diameter** | **333** | 33 | 33 | mm | |
| **Outlet Diameter** | **3** | 3 | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Line Speed** | **3333** | 33 | 3 | m/min | |
| **Annealer Current** | **333** | 3 | 33 | A | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor Resistance** | **33** | 3 | 33 | ohm/km | |
| **Wire Diameter** | **333333** | 33333 | 3 | mm | |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **BCL1 N-N000-0001-8000012Y** | Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 8 mm \| Lay NOT \| 50 mm2 | 1000 | **343.083499** | kg | | 1% | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 3** **PARENT WO-2026-000070 / OP 10 OP030 Bunching / Double Twist**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000073

**PRODUCT**

**BCL5 N-N000-0009-0250007Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
NOT | NOT | 9 x 0.25 mm | Lay NOT | 6 mm2

Qty: 338.3333 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000073-MAIN-000074

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000005 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L3 | **Parent WO** | WO-2026-000070 |
| **Parent Operation** | 10 \| OP030 Bunching / Double Twist | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000070 / OP 10 OP030

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000005 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000005 / Rev.0 | **OP020 \| Multiwire Drawing** | F03-M02 \| Fine Wire Drawing Machine | \| |

## OP 10 - OP020 | Multiwire Drawing

BOM: BOM-000005 / Rev.0 Source Seq: 10

Machine: F03-M02 | Fine Wire Drawing Machine Work Centre: |

**Speed: 33333 m/min**

Setup: 545 min Scrap: 1%

WO-2026-000073-010-OP020-82

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **338.3333 kg** | **m** | **33333 m/min** | 545 min | 30 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ERSDF** | | | | |
| **Construction** | **DSF** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | **4534** | 4544 | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | 4 | 44 | | |
| **Nominal Lay Length** | | | 44 | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | 44 | 6 | | |
| **Maximum Conductor Resistance** | | 4 | 4 | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | **4** | 4 | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | **12** | 8 | 15 | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Wire Diameter** | **8768** | 6767 | 6767 | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL1 N-N000-0001-1250005Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 1.25 mm \| Lay NOT \| 2.5 mm2** | BOM-000004 / Rev.0 | 1004 kg | 339.686633 kg | **WO-2026-000074** | NEXT: WO-2026-000073 -> WO-2026-000074 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 4** **PARENT WO-2026-000073 / OP 10 OP020 Multiwire Drawing**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000074

**PRODUCT**

**BCL1 N-N000-0001-1250005Y | Bare Copper |** IEC | Round/Bunch | IEC 60228 Class 1 | NOT | NOT | 1 x 1.25 mm | Lay NOT | 2.5 mm2

Qty: 339.686633 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000074-MAIN-000075

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000004 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L4 | **Parent WO** | WO-2026-000073 |
| **Parent Operation** | 10 \| OP020 Multiwire Drawing | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000073 / OP 10 OP020

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000004 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000004 / Rev.0 | **OP010 \| Rod Breakdown / Wire Drawing** | F03-M01 \| Rod Breakdown Machine | \| |

## OP 10 - OP010 | Rod Breakdown / Wire Drawing

BOM: BOM-000004 / Rev.0 Source Seq: 10

Machine: F03-M01 | Rod Breakdown Machine Work Centre: |

**Speed: 4 m/min**

Setup: 30 min Scrap: 1%

WO-2026-000074-010-OP010-83

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **339.686633 kg** | **1000 kg** | **4 m/min** | 30 min | 15 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **copper** | | | | |
| **Construction** | | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | **33** | | | | |
| **Diameter** | **33** | 5 | 333 | | |
| **Nominal Lay Length** | | | 33 | | |
| **Maximum Lay Length** | **3** | | 3 | | |
| **Theoretical Conductor Resistance** | **3** | | 3 | | |
| **Maximum Conductor Resistance** | **3** | 3 | | | |
| **Maximum Standard Resistance** | **3** | | 3 | | |
| **Material Weight (kg/km)** | **3** | | 3 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Inlet Diameter** | **333** | 33 | 33 | mm | |
| **Outlet Diameter** | **3** | 3 | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Line Speed** | **3333** | 33 | 3 | m/min | |
| **Annealer Current** | **333** | 3 | 33 | A | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor Resistance** | **33** | 3 | 33 | ohm/km | |
| **Wire Diameter** | **333333** | 33333 | 3 | mm | |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **BCL1 N-N000-0001-8000012Y** | Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 8 mm \| Lay NOT \| 50 mm2 | 1000 | **343.083499** | kg | | 1% | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 3** **PARENT WO-2026-000070 / OP 10 OP030 Bunching / Double Twist**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000075

**PRODUCT**

**BCL5 N-N000-0009-0250007Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
NOT | NOT | 9 x 0.25 mm | Lay NOT | 6 mm2

Qty: 338.3333 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000075-MAIN-000076

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000005 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L3 | **Parent WO** | WO-2026-000070 |
| **Parent Operation** | 10 \| OP030 Bunching / Double Twist | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000070 / OP 10 OP030

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000005 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000005 / Rev.0 | **OP020 \| Multiwire Drawing** | F03-M02 \| Fine Wire Drawing Machine | \| |

## OP 10 - OP020 | Multiwire Drawing

BOM: BOM-000005 / Rev.0 Source Seq: 10

Machine: F03-M02 | Fine Wire Drawing Machine Work Centre: |

**Speed: 33333 m/min**

Setup: 545 min Scrap: 1%

WO-2026-000075-010-OP020-84

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **338.3333 kg** | **m** | **33333 m/min** | 545 min | 30 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ERSDF** | | | | |
| **Construction** | **DSF** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | **4534** | 4544 | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | 4 | 44 | | |
| **Nominal Lay Length** | | | 44 | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | 44 | 6 | | |
| **Maximum Conductor Resistance** | | 4 | 4 | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | **4** | 4 | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | **12** | 8 | 15 | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Wire Diameter** | **8768** | 6767 | 6767 | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL1 N-N000-0001-1250005Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 1.25 mm \| Lay NOT \| 2.5 mm2** | BOM-000004 / Rev.0 | 1004 kg | 339.686633 kg | **WO-2026-000076** | NEXT: WO-2026-000075 -> WO-2026-000076 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 4** **PARENT WO-2026-000075 / OP 10 OP020 Multiwire Drawing**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000076

**PRODUCT**

**BCL1 N-N000-0001-1250005Y | Bare Copper |** IEC | Round/Bunch | IEC 60228 Class 1 | NOT | NOT | 1 x 1.25 mm | Lay NOT | 2.5 mm2

Qty: 339.686633 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000076-MAIN-000077

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000004 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L4 | **Parent WO** | WO-2026-000075 |
| **Parent Operation** | 10 \| OP020 Multiwire Drawing | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000075 / OP 10 OP020

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000004 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000004 / Rev.0 | **OP010 \| Rod Breakdown / Wire Drawing** | F03-M01 \| Rod Breakdown Machine | \| |

## OP 10 - OP010 | Rod Breakdown / Wire Drawing

BOM: BOM-000004 / Rev.0 Source Seq: 10

Machine: F03-M01 | Rod Breakdown Machine Work Centre: |

**Speed: 4 m/min**

Setup: 30 min Scrap: 1%

WO-2026-000076-010-OP010-85

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **339.686633 kg** | **1000 kg** | **4 m/min** | 30 min | 15 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **copper** | | | | |
| **Construction** | | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | **33** | | | | |
| **Diameter** | **33** | 5 | 333 | | |
| **Nominal Lay Length** | | | 33 | | |
| **Maximum Lay Length** | **3** | | 3 | | |
| **Theoretical Conductor Resistance** | **3** | | 3 | | |
| **Maximum Conductor Resistance** | **3** | 3 | | | |
| **Maximum Standard Resistance** | **3** | | 3 | | |
| **Material Weight (kg/km)** | **3** | | 3 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Inlet Diameter** | **333** | 33 | 33 | mm | |
| **Outlet Diameter** | **3** | 3 | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Line Speed** | **3333** | 33 | 3 | m/min | |
| **Annealer Current** | **333** | 3 | 33 | A | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor Resistance** | **33** | 3 | 33 | ohm/km | |
| **Wire Diameter** | **333333** | 33333 | 3 | mm | |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **BCL1 N-N000-0001-8000012Y** | Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 8 mm \| Lay NOT \| 50 mm2 | 1000 | **343.083499** | kg | | 1% | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 1** **PARENT WO-2026-000068 / OP 10 OP090 Cabling / Lay-up**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000077

**PRODUCT**

**S1001 01B5YLY070B5YYYA22 | Single |** H07RN-F | - | 0.5 | Bare bunched class 5 | YOK | P-EPR | YOK | 0,7 | B | YOK | Y | YOK | NO CLOUR | EN 50525-2-21

Qty: 1015 m Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000077-MAIN-000078

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000008 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L1 | **Parent WO** | WO-2026-000068 |
| **Parent Operation** | 10 \| OP090 Cabling / Lay-up | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000068 / OP 10 OP090

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000008 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000008 / Rev.0 | **OP060 \| Insulation Extrusion** | F02-M04 \| XLPE Insulation Line | \| |

## OP 10 - OP060 | Insulation Extrusion

BOM: BOM-000008 / Rev.0 Source Seq: 10

Machine: F02-M04 | XLPE Insulation Line Work Centre: |

**Speed: 100 m/min**

Setup: 45 min Scrap: 5%

WO-2026-000077-010-OP060-86

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **1015 m** | **1000 m** | **100 m/min** | 45 min | 23 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Process Type** | | | | | |
| **Material Standard** | | | | | |
| **Color** | | | | | |
| **Color Masterbatch Ratio (%)** | | | | % | |
| **Color Masterbatch Type** | | | | | |
| **Catalyst Ratio (%)** | | | | % | |
| **Anti-Rodent Additive Ratio (%)** | | | | % | |
| **Anti-Termite Additive Ratio (%)** | | | | % | |
| **Flame-Retardant Additive Ratio (%)** | | | | % | |
| **Foaming Additive Ratio (%)** | | | | % | |
| **Nominal Wall Thickness (mm)** | | | | mm | |
| **Minimum Point Wall Thickness (mm)** | | | | mm | |
| **Nominal Diameter (mm)** | | | | mm | |
| **Minimum Diameter (mm)** | | | | mm | |
| **Maximum Diameter (mm)** | | | | mm | |
| **Manufacturing Wall Thickness (mm)** | | | | mm | |
| **Manufacturing Minimum Wall Thickness (mm)** | | | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Manufacturing Maximum Wall Thickness (mm)** | | | | mm | |
| **Material Weight (kg/km)** | | | | kg/km | |
| **Manufacturing Nominal Diameter (mm)** | | | | mm | |
| **Manufacturing Minimum Diameter (mm)** | | | | mm | |
| **Manufacturing Maximum Diameter (mm)** | | | | mm | |
| **Insulation Input Diameter** | | | | | |
| **Maximum Point Wall Thickness (mm)** | | | | mm | |
| **Insulation Resistance (M?.km)** | | | | Mohm/km | |
| **Standard Minimum Diameter** | | | | | |
| **Standard Maximum Diameter** | | | | | |
| **Insulation Marking** | | | | | |
| **Note** | | | | | |
| **Tensile Strength / Elongation Values** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Extruder Zone Temperatures** | | | | ?C | |
| **Head Temperature** | | | | ?C | |
| **Screw Speed** | | | | rpm | |
| **Line Speed** | | | | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Minimum Thickness** | | | | mm | |
| **Spark Test Voltage** | | | | kV | |
| **Insulated Core OD** | | | | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL5 U-S000-0027-0250A04Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| Unilay concentric EU \| S Left \| 27 x 0.25 mm \| Lay 16D \| 1.5 mm2** | BOM-000006 / Rev.0 | 1000 kg | 1015 kg | **WO-2026-000078** | NEXT: WO-2026-000077 -> WO-2026-000078 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 2** **PARENT WO-2026-000077 / OP 10 OP060 Insulation Extrusion**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000078

**PRODUCT**

**BCL5 U-S000-0027-0250A04Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
Unilay concentric EU | S Left | 27 x 0.25
mm | Lay 16D | 1.5 mm2
Qty: 1015 kg Customer: |
WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000078-MAIN-000079

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000006 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L2 | **Parent WO** | WO-2026-000077 |
| **Parent Operation** | 10 \| OP060 Insulation Extrusion | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000077 / OP 10 OP060

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000006 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000006 / Rev.0 | **OP030 \| Bunching / Double Twist** | F03-M05 \| Cabling Machine | \| |

## OP 10 - OP030 | Bunching / Double Twist

BOM: BOM-000006 / Rev.0 Source Seq: 10
Machine: F03-M05 | Cabling Machine Work Centre: |

**Speed: 232323 m/min**
Setup: 3434324 min Scrap: 55555%

WO-2026-000078-010-OP030-87

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **1015 kg** | **m** | **232323 m/min** | 3434324 min | 234324 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ADSAD** | | | | |
| **Construction** | **SADSAD** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | | | | |
| **Nominal Lay Length** | | | | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | | | | |
| **Maximum Conductor Resistance** | | | | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | | | | kg/km | |
| **Note** | **AD** | | | | |
| **Lay Type** | | | | | |
| **Minimum Lay Length** | | | | | |
| **Lay Ratio** | | | | | |
| **Minimum Diameter** | | | | | |

| | | | | | |
|---|---|---|---|---|---|
| **Nominal Diameter** | | | | | |
| **Maximum Diameter** | | | | | |
| **Filler Cord Count** | | | | | |
| **Filler Cord Diameter** | | | | | |
| **Dummy Core Count** | | | | | |
| **Dummy Core Diameter** | | | | | |
| **Filler Cord Material** | | | | | |
| **Filler Cord Weight** | | | | | |
| **Yarn Material** | **DASD** | | | | |
| **Yarn Weight** | | | | | |
| **Color and Number Sequence** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Bow / Rotor Speed** | | | | rpm | |
| **Line Speed** | | | | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor OD** | | | | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL5 N-N000-0009-0250007Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| NOT \| NOT \| 9 x 0.25 mm \| Lay NOT \| 6 mm2** | BOM-000005 / Rev.0 | 333.3333 kg | 338.3333 kg | **WO-2026-000079** | NEXT: WO-2026-000078 -> WO-2026-000079 |
| **BCL5 N-N000-0009-0250007Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| NOT \| NOT \| 9 x 0.25 mm \| Lay NOT \| 6 mm2** | BOM-000005 / Rev.0 | 333.3333 kg | 338.3333 kg | **WO-2026-000081** | NEXT: WO-2026-000078 -> WO-2026-000081 |
| **BCL5 N-N000-0009-0250007Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60028 Class 5 \| NOT \| NOT \| 9 x 0.25 mm \| Lay NOT \| 6 mm2** | BOM-000005 / Rev.0 | 333.3333 kg | 338.3333 kg | **WO-2026-000083** | NEXT: WO-2026-000078 -> WO-2026-000083 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 3** **PARENT WO-2026-000078 / OP 10 OP030 Bunching / Double Twist**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000079

**PRODUCT**

**BCL5 N-N000-0009-0250007Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
NOT | NOT | 9 x 0.25 mm | Lay NOT | 6 mm2

Qty: 338.3333 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000079-MAIN-000080

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000005 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L3 | **Parent WO** | WO-2026-000078 |
| **Parent Operation** | 10 \| OP030 Bunching / Double Twist | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000078 / OP 10 OP030

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000005 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000005 / Rev.0 | **OP020 \| Multiwire Drawing** | F03-M02 \| Fine Wire Drawing Machine | \| |

## OP 10 - OP020 | Multiwire Drawing

BOM: BOM-000005 / Rev.0 Source Seq: 10

Machine: F03-M02 | Fine Wire Drawing Machine Work Centre: |

**Speed: 33333 m/min**

Setup: 545 min Scrap: 1%

WO-2026-000079-010-OP020-88

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **338.3333 kg** | **m** | **33333 m/min** | 545 min | 30 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ERSDF** | | | | |
| **Construction** | **DSF** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | **4534** | 4544 | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | 4 | 44 | | |
| **Nominal Lay Length** | | | 44 | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | 44 | 6 | | |
| **Maximum Conductor Resistance** | | 4 | 4 | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | **4** | 4 | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | **12** | 8 | 15 | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Wire Diameter** | **8768** | 6767 | 6767 | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL1 N-N000-0001-1250005Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 1.25 mm \| Lay NOT \| 2.5 mm2** | BOM-000004 / Rev.0 | 1004 kg | 339.686633 kg | **WO-2026-000080** | NEXT: WO-2026-000079 -> WO-2026-000080 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 4** **PARENT WO-2026-000079 / OP 10 OP020 Multiwire Drawing**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000080

**PRODUCT**

**BCL1 N-N000-0001-1250005Y | Bare Copper |** IEC | Round/Bunch | IEC 60228 Class 1 | NOT | NOT | 1 x 1.25 mm | Lay NOT | 2.5 mm2

Qty: 339.686633 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000080-MAIN-000081

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000004 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L4 | **Parent WO** | WO-2026-000079 |
| **Parent Operation** | 10 \| OP020 Multiwire Drawing | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000079 / OP 10 OP020

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000004 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000004 / Rev.0 | **OP010 \| Rod Breakdown / Wire Drawing** | F03-M01 \| Rod Breakdown Machine | \| |

## OP 10 - OP010 | Rod Breakdown / Wire Drawing

BOM: BOM-000004 / Rev.0 Source Seq: 10

Machine: F03-M01 | Rod Breakdown Machine Work Centre: |

**Speed: 4 m/min**

Setup: 30 min Scrap: 1%

WO-2026-000080-010-OP010-89

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **339.686633 kg** | **1000 kg** | **4 m/min** | 30 min | 15 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **copper** | | | | |
| **Construction** | | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | **33** | | | | |
| **Diameter** | **33** | 5 | 333 | | |
| **Nominal Lay Length** | | | 33 | | |
| **Maximum Lay Length** | **3** | | 3 | | |
| **Theoretical Conductor Resistance** | **3** | | 3 | | |
| **Maximum Conductor Resistance** | **3** | 3 | | | |
| **Maximum Standard Resistance** | **3** | | 3 | | |
| **Material Weight (kg/km)** | **3** | | 3 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Inlet Diameter** | **333** | 33 | 33 | mm | |
| **Outlet Diameter** | **3** | 3 | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Line Speed** | **3333** | 33 | 3 | m/min | |
| **Annealer Current** | **333** | 3 | 33 | A | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor Resistance** | **33** | 3 | 33 | ohm/km | |
| **Wire Diameter** | **333333** | 33333 | 3 | mm | |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **BCL1 N-N000-0001-8000012Y** | Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 8 mm \| Lay NOT \| 50 mm2 | 1000 | **343.083499** | kg | | 1% | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 3** **PARENT WO-2026-000078 / OP 10 OP030 Bunching / Double Twist**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000081

**PRODUCT**

**BCL5 N-N000-0009-0250007Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
NOT | NOT | 9 x 0.25 mm | Lay NOT | 6 mm2

Qty: 338.3333 kg Customer: |

WO Date/Time: 2026-10-04 14:27:06

**MAIN WO BARCODE**

WO-2026-000081-MAIN-000082

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000005 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L3 | **Parent WO** | WO-2026-000078 |
| **Parent Operation** | 10 \| OP030 Bunching / Double Twist | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:06 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000078 / OP 10 OP030

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000005 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000005 / Rev.0 | **OP020 \| Multiwire Drawing** | F03-M02 \| Fine Wire Drawing Machine | \| |

## OP 10 - OP020 | Multiwire Drawing

BOM: BOM-000005 / Rev.0 Source Seq: 10

Machine: F03-M02 | Fine Wire Drawing Machine Work Centre: |

**Speed: 33333 m/min**

Setup: 545 min Scrap: 1%

WO-2026-000081-010-OP020-90

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **338.3333 kg** | **m** | **33333 m/min** | 545 min | 30 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ERSDF** | | | | |
| **Construction** | **DSF** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | **4534** | 4544 | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | 4 | 44 | | |
| **Nominal Lay Length** | | | 44 | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | 44 | 6 | | |
| **Maximum Conductor Resistance** | | 4 | 4 | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | **4** | 4 | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | **12** | 8 | 15 | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Wire Diameter** | **8768** | 6767 | 6767 | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL1 N-N000-0001-1250005Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 1.25 mm \| Lay NOT \| 2.5 mm2** | BOM-000004 / Rev.0 | 1004 kg | 339.686633 kg | **WO-2026-000082** | NEXT: WO-2026-000081 -> WO-2026-000082 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 4** **PARENT WO-2026-000081 / OP 10 OP020 Multiwire Drawing**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000082

**PRODUCT**

**BCL1 N-N000-0001-1250005Y | Bare Copper |** IEC | Round/Bunch | IEC 60228 Class 1 | NOT | NOT | 1 x 1.25 mm | Lay NOT | 2.5 mm2

Qty: 339.686633 kg Customer: |

WO Date/Time: 2026-10-04 14:27:07

**MAIN WO BARCODE**

WO-2026-000082-MAIN-000083

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000004 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L4 | **Parent WO** | WO-2026-000081 |
| **Parent Operation** | 10 \| OP020 Multiwire Drawing | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:07 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000081 / OP 10 OP020

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000004 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000004 / Rev.0 | **OP010 \| Rod Breakdown / Wire Drawing** | F03-M01 \| Rod Breakdown Machine | \| |

## OP 10 - OP010 | Rod Breakdown / Wire Drawing

BOM: BOM-000004 / Rev.0 Source Seq: 10

Machine: F03-M01 | Rod Breakdown Machine Work Centre: |

**Speed: 4 m/min**

Setup: 30 min Scrap: 1%

WO-2026-000082-010-OP010-91

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **339.686633 kg** | **1000 kg** | **4 m/min** | 30 min | 15 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **copper** | | | | |
| **Construction** | | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | **33** | | | | |
| **Diameter** | **33** | 5 | 333 | | |
| **Nominal Lay Length** | | | 33 | | |
| **Maximum Lay Length** | **3** | | 3 | | |
| **Theoretical Conductor Resistance** | **3** | | 3 | | |
| **Maximum Conductor Resistance** | **3** | 3 | | | |
| **Maximum Standard Resistance** | **3** | | 3 | | |
| **Material Weight (kg/km)** | **3** | | 3 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Inlet Diameter** | **333** | 33 | 33 | mm | |
| **Outlet Diameter** | **3** | 3 | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Line Speed** | **3333** | 33 | 3 | m/min | |
| **Annealer Current** | **333** | 3 | 33 | A | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor Resistance** | **33** | 3 | 33 | ohm/km | |
| **Wire Diameter** | **333333** | 33333 | 3 | mm | |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **BCL1 N-N000-0001-8000012Y** | Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 8 mm \| Lay NOT \| 50 mm2 | 1000 | **343.083499** | kg | | 1% | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 3** **PARENT WO-2026-000078 / OP 10 OP030 Bunching / Double Twist**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000083

**PRODUCT**

**BCL5 N-N000-0009-0250007Y | Bare Copper |**
IEC | Round/Bunch | IEC 60028 Class 5 |
NOT | NOT | 9 x 0.25 mm | Lay NOT | 6 mm2

Qty: 338.3333 kg Customer: |

WO Date/Time: 2026-10-04 14:27:07

**MAIN WO BARCODE**

WO-2026-000083-MAIN-000084

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000005 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L3 | **Parent WO** | WO-2026-000078 |
| **Parent Operation** | 10 \| OP030 Bunching / Double Twist | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:07 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000078 / OP 10 OP030

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000005 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000005 / Rev.0 | **OP020 \| Multiwire Drawing** | F03-M02 \| Fine Wire Drawing Machine | \| |

## OP 10 - OP020 | Multiwire Drawing

BOM: BOM-000005 / Rev.0 Source Seq: 10

Machine: F03-M02 | Fine Wire Drawing Machine Work Centre: |

**Speed: 33333 m/min**

Setup: 545 min Scrap: 1%

WO-2026-000083-010-OP020-92

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **338.3333 kg** | **m** | **33333 m/min** | 545 min | 30 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **ERSDF** | | | | |
| **Construction** | **DSF** | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | **4534** | 4544 | | | |
| **Lay Direction** | | | | | |
| **Diameter** | | 4 | 44 | | |
| **Nominal Lay Length** | | | 44 | | |
| **Maximum Lay Length** | | | | | |
| **Theoretical Conductor Resistance** | | 44 | 6 | | |
| **Maximum Conductor Resistance** | | 4 | 4 | | |
| **Maximum Standard Resistance** | | | | | |
| **Material Weight (kg/km)** | **4** | 4 | 4 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Line Speed** | **12** | 8 | 15 | m/min | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Wire Diameter** | **8768** | 6767 | 6767 | mm | |

## CHILD BOM / NEXT WORK ORDER(S) FROM THIS OPERATION

| Child Product | Child BOM | Qty/Output | WO Required | Generated Child WO | Relationship |
|---|---|---|---|---|---|
| **BCL1 N-N000-0001-1250005Y \| Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 1.25 mm \| Lay NOT \| 2.5 mm2** | BOM-000004 / Rev.0 | 1004 kg | 339.686633 kg | **WO-2026-000084** | NEXT: WO-2026-000083 -> WO-2026-000084 |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| - | No material line stored for this operation. | | | | | | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |

**CHILD WORK ORDER - LEVEL 4** **PARENT WO-2026-000083 / OP 10 OP020 Multiwire Drawing**

THIS SECTION CONTAINS THE COMPLETE FROZEN BOM / ROUTING / PARAMETERS / MATERIALS FOR THIS WORK ORDER.

# PRODUCTION WORK ORDER
# WO-2026-000084

**PRODUCT**

**BCL1 N-N000-0001-1250005Y | Bare Copper |** IEC | Round/Bunch | IEC 60228 Class 1 | NOT | NOT | 1 x 1.25 mm | Lay NOT | 2.5 mm2

Qty: 339.686633 kg Customer: |

WO Date/Time: 2026-10-04 14:27:07

**MAIN WO BARCODE**

WO-2026-000084-MAIN-000085

## WORK ORDER DETAILS

| | | | |
|---|---|---|---|
| **Selected BOM** | BOM-000004 / Rev.0 | **Status / Priority** | PLANNED / NORMAL |
| **WO Role / Level** | CHILD / L4 | **Parent WO** | WO-2026-000083 |
| **Parent Operation** | 10 \| OP020 Multiwire Drawing | **Frozen Snapshot** | v1 |
| **Standard / Voltage** | IEC | **Core / Section** | mm2 |
| **Factory** | | **Department** | |
| **Work Centre** | | **Responsible** | |
| **Order / Due** | 2026-10-04 | **Planned Start** | |
| **WO Created Date / Time** | 2026-10-04 14:27:07 | **PDF Generated Date / Time** | 2026-11-20 03:29:38 |

## WORK ORDER NOTES

Generated from parent WO-2026-000083 / OP 10 OP020

## THIS WORK ORDER - PRODUCT TREE / BOM SEQUENCE

| | |
|---|---|
| **1.** | **BOM-000004 / Rev.0** |

## THIS WORK ORDER - ROUTING / OPERATION SEQUENCE

| WO Seq | Source BOM | Operation | Machine | Work Centre |
|---|---|---|---|---|
| **10** | BOM-000004 / Rev.0 | **OP010 \| Rod Breakdown / Wire Drawing** | F03-M01 \| Rod Breakdown Machine | \| |

## OP 10 - OP010 | Rod Breakdown / Wire Drawing

BOM: BOM-000004 / Rev.0 Source Seq: 10

Machine: F03-M01 | Rod Breakdown Machine Work Centre: |

**Speed: 4 m/min**

Setup: 30 min Scrap: 1%

WO-2026-000084-010-OP010-93

## PLANNED PRODUCTION

| Start | Finish | Input Qty | Output Qty | Speed | Setup | Duration | Semi-Finished Output |
|---|---|---|---|---|---|---|---|
| | | **339.686633 kg** | **1000 kg** | **4 m/min** | 30 min | 15 min | |

## TECHNICAL / ENGINEERING PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Material Type** | **copper** | | | | |
| **Construction** | | | | | |
| **Conductor Stranding Type** | | | | | |
| **Layer Diameters for Rolling** | | | | | |
| **Lay Direction** | **33** | | | | |
| **Diameter** | **33** | 5 | 333 | | |
| **Nominal Lay Length** | | | 33 | | |
| **Maximum Lay Length** | **3** | | 3 | | |
| **Theoretical Conductor Resistance** | **3** | | 3 | | |
| **Maximum Conductor Resistance** | **3** | 3 | | | |
| **Maximum Standard Resistance** | **3** | | 3 | | |
| **Material Weight (kg/km)** | **3** | | 3 | kg/km | |
| **Note** | | | | | |

## PRODUCTION PROCESS PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Inlet Diameter** | **333** | 33 | 33 | mm | |
| **Outlet Diameter** | **3** | 3 | | mm | |

| | | | | | |
|---|---|---|---|---|---|
| **Line Speed** | **3333** | 33 | 3 | m/min | |
| **Annealer Current** | **333** | 3 | 33 | A | |

## QUALITY / TEST PARAMETERS

| Parameter | Required / Target | Min | Max | Unit | Remarks |
|---|---|---|---|---|---|
| **Conductor Resistance** | **33** | 3 | 33 | ohm/km | |
| **Wire Diameter** | **333333** | 33333 | 3 | mm | |

## RAW MATERIALS / COMPONENTS - OP 10 ONLY

| Material Code | Material Name | BOM Qty | WO Required | Unit | Role | Scrap % | Notes |
|---|---|---|---|---|---|---|---|
| **BCL1 N-N000-0001-8000012Y** | Bare Copper \| IEC \| Round/Bunch \| IEC 60228 Class 1 \| NOT \| NOT \| 1 x 8 mm \| Lay NOT \| 50 mm2 | 1000 | **343.083499** | kg | | 1% | |

## OP 10 - OPERATOR / QC SIGN-OFF

| Operator / Sign | Actual Start / Stop | Actual Output / Scrap | QC / Supervisor / Sign |
|---|---|---|---|
| | | | |