

FOR SHEET 2 OF THIS DRAWING SEE DU11-103-0501

ALL DIMENSIONS IN CENTIMETRES UNLESS OTHERWISE STATED

01		ORIGINAL DU-03-209.2-0500-R02 IS NOW SUPERSEDED BY THIS NEW DRAWING/REVISION. CHANGED TO SECTION 11. GENERAL UPDATES. CHANGED TO NEW DWG. & NUMBERING FORMAT. UPDATED DETAILS TO FIGURES.	PC	ММ	ММ	ММ			
		UPDATED NOTE 5. ADDED NOTES 13, 14, 15 & 16.							
Rev No.	Date	Revision Particulars	dwn	ckd	des	арр			

# hydrone

## Hydro One Networks Inc.

TYPICAL ALL-IN-DUCT TRENCH DETAIL

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NOTES:

- 1. BACKFILL: ENSURE 5cm CLEAN MASONRY SAND BETWEEN THE TRENCH BASE AND THE DUCTS TO PROTECT THE DUCTS FROM SHARP ROCKS. IF THE TRENCH BOTTOM IS FREE OF SHARP ROCKS THE SAND MAY BE OMITTED. 15cm OF SAND BUFFER SHALL BE PLACED BETWEEN THE DUCTS AND NATIVE BACKFILL NATIVE BACKFILL MUST BE CLEAN AND FREE OF DEBRIS TO PREVENT DAMAGE TO THE DUCT. BACKFILL SHALL BE WELL TAMPED.
- WHEREVER POSSIBLE AVOID THE SECONDARY SPLICE AT THE PROPERTY LINE BY INSTALLING A CONTINUOUS DUCT FROM THE TRANSFORMER TO THE METER BASE. IF SPLICE IS REQUIRED, FLEXIBLE CONDUIT SHALL NOT BE USED.
- THE TRENCH SHOULD BE AS STRAIGHT AS POSSIBLE, TO ENSURE AN OPTIMAL CABLE PULL.
- PULL TAPE: A 1/2" WIDE POLYESTER PULLING TAPE MUST BE INSTALLED THROUGH THE ENTIRE LENGTH OF THE DUCT.
- INSTALL METER COMPARTMENT AS PER ONTARIO ELECTRICAL SAFETY CODE (OESC), USE ONLY HYDRO ONE APPROVED METER BASES LISTED IN THE HYDRO ONE 'METER SOCKET BASE' LIST.
- 6. TELECOMMUNICATION PLANT MAY SHARE SERVICE TRENCH BUT MUST BE INSTALLED IN ITS OWN CONDUIT.
- 7. PREFERRED ROUTING FOR GAS SERVICE SHALL BE ON OPPOSITE SIDE OF THE BUILDING THAN THAT OF THE ELECTRICAL SERVICE. IF COMMON TRENCHING IS UNAVOIDABLE, 30cm MINIMUM CLEAR SEPARATION SHALL BE MAINTAINED IN ALL DIRECTIONS BETWEEN GAS SERVICE AND ELECTRICAL SUPPLY CABLE.
- CLEARANCES, DEPTHS, SEPARATIONS AND FORMS OF MECHANICAL PROTECTION OF THE CABLE ARE MINIMUM REQUIREMENTS. INCREASED CLEARANCES AND OR ADDITIONAL FORMS OF MECHANICAL PROTECTION ARE CONSIDERED POSITIVE DEVIATIONS AND ARE ALLOWED.
- 9. FLEXIBLE CONDUIT, WITH APPROVED COUPLER MAY BE INSTALLED, IF SPLICE IS NOT REQUIRED.
- 10. RADIUS MUST BE GREATER THAN THE SPECIFIED CABLE MINIMUM BENDING RADIUS.
- 11. CUSTOMER SUPPLIED AND INSTALLED METER BASE, CONDUIT, CLAMPS AND ASSOCIATED HARDWARE INSTALLED PER ONTARIO ELECTRICAL SAFETY CODE (OESC).
- 12. THE METER BASE CONDUITS WILL VARY IN SIZE DEPENDING ON CONDUCTOR SIZE (i.e. 2" DIAMETER FOR 3/0 AWG, 3" FOR 250 kcmil or 500 kcmil CONDUCTOR). ONLY ONE SERVICE CABLE PERMITTED PER CONDUIT.
- 13. THE SUPPLY SERVICE CABLE AT THE METER BASE SHALL BE HOUSED IN ITS OWN DISTINCT CUSTOMER SUPPLIED CONDUIT (CONDUIT SHALL NOT HOUSE ANY OTHER PLANT), AND SHALL NOT HAVE ANY ACCESS PORT (LB CONDUIT FITTING, JUNCTION BOX, ETC.). ANY MODIFICATION TO CUSTOMER OWNED METER-BASE WHICH VOIDS CSA CERTIFICATION IS NOT PERMITTED.
- 14. FOR TYPICAL TEMPORARY TERMINATION SEE FIG.2.
- 15. SCHEDULE 40 PVC CONDUIT AND ASSOCIATED FITTINGS ARE ACCEPTABLE POSITIVE DEVIATION, IF DB2 CONDUIT IS NOT AVAILABLE, PROVIDED SEPARATIONS SPECIFIED ON THIS DRAWING ARE MAINTAINED.
- 16. METER BASE TO MAINTAIN 1m MINIMUM CLEARANCE FROM DISCHARGE OF ANY COMBUSTIBLE GAS RELIEF DEVICE OR VENT. IF 1m CLEARANCE IS NOT AVAILABLE IT CAN BE REDUCED TO 0.3m MINIMUM CLEARANCE WHICH IS ONLY APPLICABLE IF REGULATORS EQUIPPED WITH CERTIFIED OVERPRESSURE CUT-OFF/SHUT-OFF WITH LIMITED OR NO RELIEF IS INSTALLED FOR THE GAS DISCHARGE OPENING. THE OVERPRESSURE RELIEF DEVICES MUST BE MARKED "LR-OPCO", "P-OPCO" OR "OPSO".

	PARTS LIST				
PART No.	MM No.	DESCRIPTION	QTY.		
1	30031918	COUPLER KIT, 4", FLEX TO 4" RIGID	A/R		
2	30031917	CONDUIT, FLEX, 4"	A/R		
3	30005908	SERVICE CABLE, 3/0 AWG, 3-COND., AL. SERVICE CABLE, 250Kcmil, 3-COND., AL. SERVICE CABLE, 500Kcmil, 3-COND., AL.	A/R		
4	30007710	CONDUIT, PVC, 4", DB2	A/R		
5	20002181	CAUTION TAPE, BURIED ELECTRIC LINE	A/R		
6	30007687	SWEEP, 4" x 16" RADIUS, SCHEDULE 40, PVC	A/R		
7	30007583	CONDUIT, 4", SCHEDULE 40, PVC	A/R		
8	30031602	CAP, 4", SCHEDULE 40, PVC	A/R		
9	30031626	COUPLER, 4", DB2 TO 4" RIGID			
10	30003292	COUPLER, PVC DUCT, PUSH FIT, 4"	A/R		
11	30031628	CONDUIT, 4", SPLIT DB2	A/R		
12	20000007	TAPE, PULLING, 1/2" WIDE, POLYESTER	A/R		
13	30006455	CONNECTOR, SPLICE, 600V, 3/0 AWG CONNECTOR, SPLICE, 600V, 250Kcmil CONNECTOR, SPLICE, 600V, 500Kcmil	A/R		
14		COLD SHRINK, 600V, 2/0 AWG-250Kcmil COLD SHRINK, 600V, 500Kcmil	A/R		
15	30013701	SWEEP, 4" x 16" RADIUS, PVC, FOR DB2	A/R		
мм#	= REFER TO	SECTION 16 ONLY A/R = AS REQUIRED			
* =	SUPPLIED I	BY CUSTOMER			

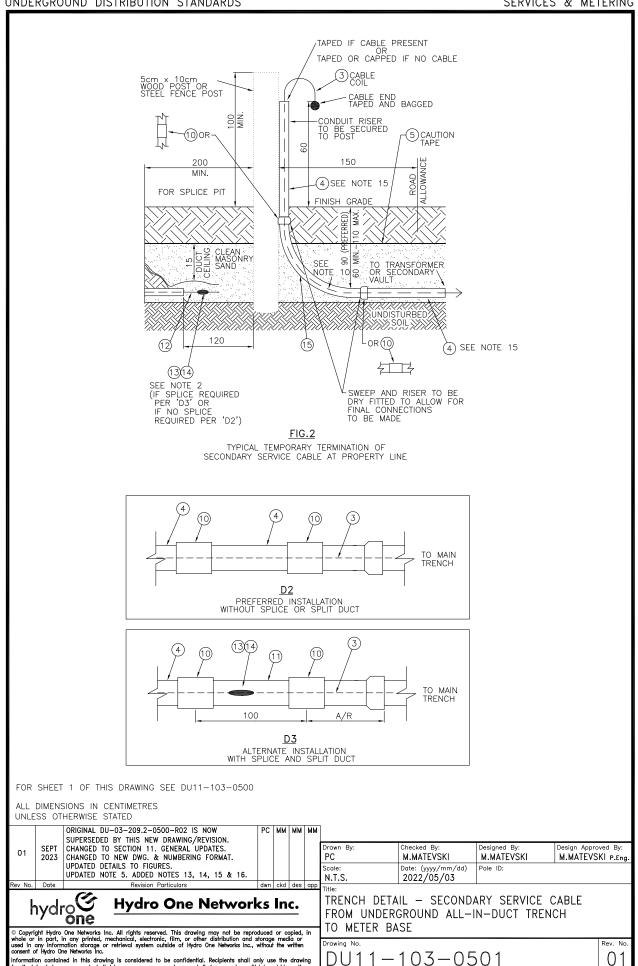
Drawn By: PC	Checked By: M.MATEVSKI		Design Approved By: M.MATEVSKI P.Eng.
Scale: N.T.S.	Date: (yyyy/mm/dd) 2022/05/03	Pole ID:	

TRENCH DETAIL — SECONDARY SERVICE CABLE FROM UNDERGROUND ALL—IN—DUCT TRENCH TO METER BASE

DU11-103-0500

Rev. No

1/2



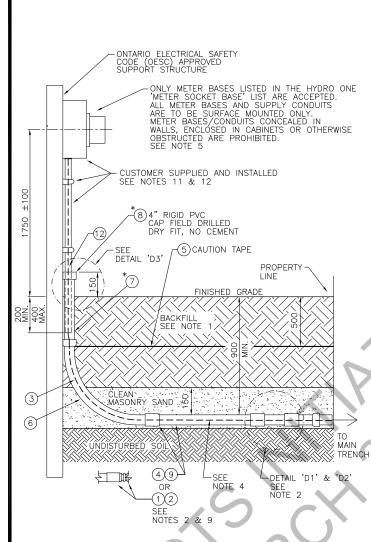
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2 / 2 Sheet Number:



FOR SHEET 2 OF THIS DRAWING SEE DU-03-209.2-0501

ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

02	APR 2022	UPDATED PART #8, 13 & 14. ADDED NEW PART #9 & 15. UPDATED NOTES 2, 5 & 9. ADDED NOTES 11 & 12. UPDATED MAIN LAYOUT DIMENSION AND CLARIFIED OPTIONS FOR APPLICABLE PARTS.  UPDATED 'D4' LAYOUT AND PARTS.	PC	ММ	KA	ММ
01		GENERAL UPDATES. CHANGED 4" SWEEP AND PULLING TAPE. CHANGED TO NEW DWG. & NUMBERING FORMAT. FOR PREVIOUS REVISIONS REFER TO DU-03-209.2-RO.	S0	PC	AS	PS
Rev No.	Date	Revision Particulars	dwn	ckd	des	арр

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information ocntained in this drawing is considered to be confidential. Recipients shall only use the drawing for its intended purpose and shall take necessary measures to prevent disclosure or transmittal to outside parties.

#### NOTES:

- 1. BACKFILL: ENSURE 50mm CLEAN MASONRY SAND BETWEEN THE TRENCH BASE AND THE DUCTS TO PROTECT THE DUCTS FROM SHARP ROCKS. IF THE TRENCH BOTTOM IS FREE OF SHARP ROCKS THE SAND MAY BE OMITTED. 150mm OF SAND BUFFER SHALL BE PLACED BETWEEN THE DUCTS AND NATIVE BACKFILL. NATIVE BACKFILL MUST BE CLEAN AND FREE OF DEBRIS TO PREVENT DAMAGE TO THE DUCT. BACKFILL SHALL BE WELL TAMPED.
  - 2. WHEREVER POSSIBLE AVOID THE SECONDARY SPLICE AT THE LOT LINE BY INSTALLING A CONTINUOUS DUCT FROM THE TRANSFORMER TO THE METER BASE. IF SPLICE IS REQUIRED, FLEXIBLE CONDUIT SHALL NOT BE LISED.
- 3. THE TRENCH SHOULD BE AS STRAIGHT AS POSSIBLE, TO ENSURE AN OPTIMAL CABLE PULL.
- 4. PULL TAPE: A 1/2" WIDE POLYESTER PULLING TAPE MUST BE INSTALLED THROUGH THE ENTIRE LENGTH OF THE DUCT.
- 5. INSTALL METER COMPARTMENT AS PER ONTARIO ELECTRICAL SAFETY CODE (OESC), USE ONLY HYDRO ONE APPROVED METER BASES LISTED IN THE HYDRO ONE 'METER SOCKET BASE' LIST. METER BASE TO MAINTAIN 1 METER MINIMUM CLEARANCE FROM DISCHARGE OF ANY COMBUSTIBLE GAS RELIEF DEVICE OR VENT.
- 6. TELECOMMUNICATION PLANT MAY SHARE SERVICE TRENCH BUT MUST BE INSTALLED IN ITS OWN CONDUIT.
- 7. PREFERRED ROUTING FOR GAS SERVICE SHALL BE ON OPPOSITE SIDE OF THE BUILDING THAN THAT OF THE ELECTRICAL SERVICE. IF COMMON TRENCHING IS UNAVOIDABLE, 300mm MINIMUM CLEAR SEPARATION SHALL BE MAINTAINED IN ALL DIRECTIONS BETWEEN GAS SERVICE AND ELECTRICAL SUPPLY CABLE.
- 8. CLEARANCES, DEPTHS, SEPARATIONS AND FORMS OF MECHANICAL PROTECTION OF THE CABLE ARE MINIMUM REQUIREMENTS. INCREASED CLEARANCES AND OR ADDITIONAL FORMS OF MECHANICAL PROTECTION ARE CONSIDERED POSITIVE DEVIATIONS AND ARE ALLOWED.
- 9. FLEXIBLE CONDUIT, WITH APPROVED COUPLER MAY BE INSTALLED, IF SPLICE IS NOT REQUIRED.
- 10. RADIUS MUST BE GREATER THAN THE SPECIFIED CABLE MINIMUM BENDING RADIUS.
- 11. CUSTOMER SUPPLIED AND INSTALLED METER BASE, CONDUIT, CLAMPS AND ASSOCIATED HARDWARE INSTALLED PER ONTARIO ELECTRICAL SAFETY CODE (OESC).
- 12. THE METER BASE CONDUITS WILL VARY IN SIZE DEPENDING ON CONDUCTOR SIZE (i.e. 2" DIAMETER FOR 3/0 AWG, 3" FOR 250 kcmil or 500 kcmil CONDUCTOR). ONLY ONE SERVICE CABLE PERMITTED PER CONDUIT.

	PARTS LIST				
PART No.	MM No.	DESCRIPTION	QTY.		
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2	30031917	CONDUIT, FLEX, 4"	A/R		
3	30005908 30005915	SERVICE CABLE, 3/0 AWG, 3-COND., AL. SERVICE CABLE, 250Kcmil, 3-COND., AL. SERVICE CABLE, 500Kcmil, 3-COND., AL.	A/R		
4	30007710	CONDUIT, PVC, 4", DB2	A/R		
5	20002181	CAUTION TAPE, BURIED ELECTRIC LINE	A/R		
6		SWEEP, 4" x 16" RADIUS, RIGID PVC	A/R		
7	30007583	CONDUIT, 4", RIGID PVC	A/R		
8	30031602	CAP, 4", SCHEDULE 40, PVC	A/R		
9	30031626	COUPLER, 4", DB2 TO 4" RIGID			
10	30003292	COUPLER, POLY, PUSH FIT	A/R		
11		CONDUIT, 4", SPLIT DB2	A/R		
12	20000007	TAPE, PULLING, 1/2" WIDE, POLYESTER	A/R		
13	30006455	CONNECTOR, SPLICE, 600V, 3/0 AWG CONNECTOR, SPLICE, 600V, 250Kcmil CONNECTOR, SPLICE, 600V, 500Kcmil	A/R		
14	30008346 COLD SHRINK 600V 2/0 AWG-250Komil		A/R		
15	30013701	SWEEP, 4" x 16" RADIUS, PVC, FOR DB2	A/R		
мм#	MM# = REFER TO SECTION 16 ONLY A/R = AS REQUIRED				
* = SUPPLIED BY CUSTOMER					

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TRENCH DETAIL — SECONDARY SERVICE CABLE FROM UNDERGROUND ALL—IN—DUCT TRENCH TO METER BASE

DU-03-209.2-0500

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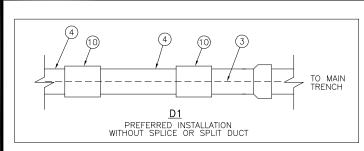
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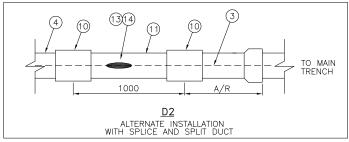
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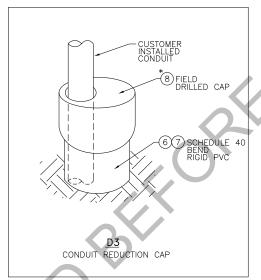
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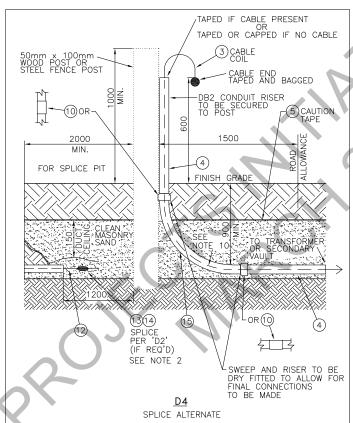
Rev. No.

02









FOR SHEET 1 OF THIS DRAWING SEE DU-03-209.2-0500

ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

Rev No.	Date	Revision Particulars	dwn	ckd	des	арр
01	SEP 2018	GENERAL UPDATES. CHANGED 4" SWEEP AND PULLING TAPE. CHANGED TO NEW DWG. & NUMBERING FORMAT. FOR PREVIOUS REVISIONS REFER TO DU-03-209.2-RO.	S0	PC	AS	PS
02	APR 2022	UPDATED PART #8, 13 & 14. ADDED NEW PART #9 & 15. UPDATED NOTES 2, 5 & 9. ADDED NOTES 11 & 12. UPDATED MAIN LAYOUT DIMENSION AND CLARIFIED OPTIONS FOR APPLICABLE PARTS.  UPDATED 'D4' LAYOUT AND PARTS.		ММ		ММ

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Scale:	Date: (yyyy/mm/dd)	Pole ID:	
N.T.S.	2014/03/20		

TRENCH DETAIL - SECONDARY SERVICE CABLE FROM UNDERGROUND ALL-IN-DUCT TRENCH TO METER BASE

Drawing No.	Rev.	No.
DU-03-209.2-0501	0	2

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