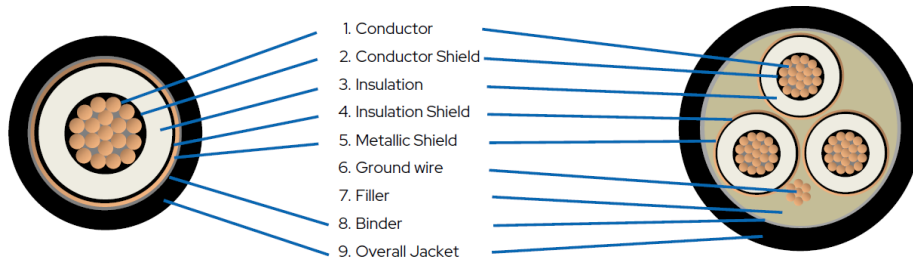


15kV CU EPR 133% IL CTS PVC TYPE MV-105 - Silicone Free

Type MV-105 Copper Conductor, No Lead Ethylene Propylene Rubber (NL-EPR) 15kV 133% Insulation Level, Copper Tape Shield, Polyvinyl Chloride (PVC) Jacket.



CONSTRUCTION:

- | | |
|-----------------------------|----------------------------------------------------------------------------|
| 1. Conductor | Class B compressed or compact stranded bare copper per ASTM B3 and ASTM B8 |
| 2. Conductor Shield | Semi-conducting cross-linked copolymer |
| 3. Insulation | No Lead Ethylene Propylene Rubber (NL-EPR) 133% Insulation Level |
| 4. Insulation Shield | Stripable semi-conducting cross-linked copolymer |
| 5. Metallic Shield | Copper tape helically wrapped 5 mils copper tape with 25% overlap |
| 6. Ground Wire | Class B compressed or compact stranded bare copper per ASTM B3 and ASTM B8 |
| 7. Filler | Suitable filler |
| 8. Binder | Glass tape |
| 9. Overall Jacket | Polyvinyl Chloride (PVC) |

APPLICATIONS AND FEATURES:

15kV cables are suited for use in wet and dry areas, conduits, ducts, direct burial, trays and where superior electrical properties are desired. These cables are capable of operating continuously at the conductor temperature not in excess of 105°C for normal operation, 140°C for emergency overload, and 250°C for short circuit conditions.

SPECIFICATIONS:

- ASTM B3 Soft or annealed copper
- ASTM B8 Concentric-lay-standard copper
- UL 1072 Medium Voltage Power Cables
- ICEA S-97-682 Utility Shielded Power Cables Rated 5 through 46kV
- UL 1685 CT Flame Exposure Test
- UV Resistant
- Outdoor Rated

Cable Information: 1 Core (133%) (Compress Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Cable Diameter (Approx) [inches]	Bending Radius (min) [inches]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [inches]	Thickness (Nom) [mils]	Diameter (Approx) [inches]	Thickness (Nom)[mils]				
020115KVEPRPVC	2	7	0.280	220	0.77	80	1.043	10.4	714	0.534
010115KVEPRPVC	1	19	0.319	220	0.81	80	1.102	11.0	797	0.423
1/00115KVEPRPVC	1/0	19	0.362	220	0.85	80	1.130	11.3	891	0.335
2/00115KVEPRPVC	2/0	19	0.405	220	0.889	80	1.169	11.7	1008	0.266
3/00115KVEPRPVC	3/0	19	0.456	220	0.941	80	1.220	12.2	1154	0.211
4/00115KVEPRPVC	4/0	19	0.512	220	0.996	80	1.275	12.8	1329	0.167
2500115KVEPRPVC	250	37	0.558	220	1.05	80	1.330	13.4	1494	0.141
3500115KVEPRPVC	350	37	0.661	220	1.15	80	1.429	14.3	1876	0.101
5000115KVEPRPVC	500	37	0.789	220	1.275	80	1.555	15.6	2433	0.0708
7500115KVEPRPVC	750	61	0.968	220	1.46	110	1.803	18.1	3478	0.0472

Cable Information: 3 Core (133%) (Compress Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Ground Size (AWG)	Cable Diameter (Approx) [inches]	Bending Radius (min) [inches]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [inches]	Thickness (Nom) [mils]	Diameter (Approx) [inches]	Thickness (Nom) [mils]					
020315KVEPRPVC	2	7	0.280	220	0.77	110	6	2.106	21.1	2473	0.534
010315KVEPRPVC	1	19	0.319	220	0.81	110	4	2.205	22.1	2833	0.423
1/00315KVEPRPVC	1/0	19	0.362	220	0.85	110	4	2.343	23.5	3070	0.335
2/00315KVEPRPVC	2/0	19	0.405	220	0.889	110	4	2.422	24.3	3446	0.266
3/00315KVEPRPVC	3/0	19	0.456	220	0.941	110	3	2.54	25.4	3947	0.211
4/00315KVEPRPVC	4/0	19	0.512	220	0.996	110	3	2.658	26.6	4504	0.167
2500315KVEPRPVC	250	37	0.558	220	1.05	140	2	2.835	28.4	5243	0.141
3500315KVEPRPVC	350	37	0.661	220	1.15	140	2	3.032	30.4	6474	0.101
5000315KVEPRPVC	500	37	0.789	220	1.275	140	1	3.307	33.1	8312	0.0708
7500315KVEPRPVC	750	61	0.968	220	1.46	140	1/0	3.741	37.4	11342	0.0472

Cable Information: 1 Core (133%) (Compress Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Cable Diameter (Approx) [mm]	Bending Radius (min) [mm]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [mm]	Thickness (Nom)[mm]	Diameter (Approx) [mm]	Thickness (Nom)[mm]				
020115KVEPRPVC	2	7	7.1	5.588	19.58	2.032	26.5	265	714	0.534
010115KVEPRPVC	1	19	8.1	5.588	20.58	2.032	28	280	797	0.423
1/00115KVEPRPVC	1/0	19	9.2	5.588	21.6	2.032	28.7	287	891	0.335
2/00115KVEPRPVC	2/0	19	10.3	5.588	22.6	2.032	29.7	297	1008	0.266
3/00115KVEPRPVC	3/0	19	11.6	5.588	23.9	2.032	31	310	1154	0.211
4/00115KVEPRPVC	4/0	19	13.0	5.588	25.3	2.032	32.4	324	1329	0.167
2500115KVEPRPVC	250	37	14.2	5.588	26.7	2.032	33.8	338	1494	0.141
3500115KVEPRPVC	350	37	16.8	5.588	29.2	2.032	36.3	363	1876	0.101
5000115KVEPRPVC	500	37	20.0	5.588	32.4	2.032	39.5	395	2433	0.0708
7500115KVEPRPVC	750	61	24.6	5.588	37.1	2.794	45.8	458	3478	0.0472

Cable Information: 3 Core (133%) (Compress Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Ground Size (AWG)	Cable Diameter (Approx) [mm]	Bending Radius (min) [mm]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [mm]	Thickness (Nom) [mm]	Diameter (Approx) [mm]	Thickness (Nom) [mm]					
020315KVEPRPVC	2	7	7.1	5.588	19.58	2.794	6	53.5	535	2473	0.534
010315KVEPRPVC	1	19	8.1	5.588	20.58	2.794	4	56.0	560	2833	0.423
1/00315KVEPRPVC	1/0	19	9.2	5.588	21.6	2.794	4	59.5	595	3070	0.335
2/00315KVEPRPVC	2/0	19	10.3	5.588	22.6	2.794	4	61.5	615	3446	0.266
3/00315KVEPRPVC	3/0	19	11.6	5.588	23.9	2.794	3	64.5	645	3947	0.211
4/00315KVEPRPVC	4/0	19	13.0	5.588	25.3	2.794	3	67.5	675	4504	0.167
2500315KVEPRPVC	250	37	14.2	5.588	26.7	3.556	2	72	720	5243	0.141
3500315KVEPRPVC	350	37	16.8	5.588	29.2	3.556	2	77	770	6474	0.101
5000315KVEPRPVC	500	37	20.0	5.588	32.4	3.556	1	84	840	8312	0.0708
7500315KVEPRPVC	750	61	24.6	5.588	37.1	3.556	1/0	95	950	11342	0.0472

Cable Information: 1 Core (133%) (Compact Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Cable Diameter (Approx) [inches]	Bending Radius (min) [inches]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [inches]	Thickness (Nom) [mils]	Diameter (Approx) [inches]	Thickness (Nom)[mils]				
020115KVEPRPVCCPT	2	7	0.270	220	0.761	80	1.043	10.4	707	0.534
010115KVEPRPVCCPT	1	19	0.304	220	0.794	80	1.083	11	785	0.423
1/00115KVEPRPVCCPT	1/0	19	0.339	220	0.830	80	1.102	11.3	877	0.335
2/00115KVEPRPVCCPT	2/0	19	0.382	220	0.873	80	1.161	11.7	997	0.266
3/00115KVEPRPVCCPT	3/0	19	0.43	220	0.920	80	1.201	12.2	1140	0.211
4/00115KVEPRPVCCPT	4/0	19	0.481	220	0.972	80	1.26	12.8	1312	0.167
2500115KVEPRPVCCPT	250	37	0.524	220	1.023	80	1.299	13.4	1473	0.141
3500115KVEPRPVCCPT	350	37	0.619	220	1.117	80	1.398	14.3	1853	0.101
5000115KVEPRPVCCPT	500	37	0.741	220	1.239	80	1.516	15.6	2407	0.0708
7500115KVEPRPVCCPT	750	61	0.91	220	1.417	110	1.752	18.1	3443	0.0472

Cable Information: 3 Core (133%) (Compact Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Ground Size (AWG)	Cable Diameter (Approx) [inches]	Bending Radius (min) [inches]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [inches]	Thickness (Nom) [mils]	Diameter (Approx) [inches]	Thickness (Nom) [mils]					
1/00315KVEPRPVCCPT	1/0	19	0.339	220	0.851	110	4	2.245	22.5	2954	0.335
2/00315KVEPRPVCCPT	2/0	19	0.382	220	0.890	110	4	2.323	23.3	3337	0.266
3/00315KVEPRPVCCPT	3/0	19	0.430	220	0.941	110	3	2.441	24.5	3824	0.211
4/00315KVEPRPVCCPT	4/0	19	0.481	220	0.997	110	3	2.540	25.4	4370	0.167
2500315KVEPRPVCCPT	250	37	0.524	220	1.052	110	2	2.658	26.6	4927	0.141
3500315KVEPRPVCCPT	350	37	0.619	220	1.150	140	2	2.914	29.2	6298	0.101
5000315KVEPRPVCCPT	500	37	0.741	220	1.276	140	1	3.170	31.7	8118	0.0708
7500315KVEPRPVCCPT	750	61	0.910	220	1.461	140	1/0	3.563	35.7	11109	0.0472

Cable Information: 1 Core (133%) (Compact Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Cable Diameter (Approx) [mm]	Bending Radius (min) [mm]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [mm]	Thickness (Nom)[mm]	Diameter (Approx) [mm]	Thickness (Nom)[mm]				
020115KVEPRPVCCPT	2	7	6.85	5.588	19.33	2.032	26.5	265	707	0.534
010115KVEPRPVCCPT	1	19	7.7	5.588	20.18	2.032	27.5	275	785	0.423
1/00115KVEPRPVCCPT	1/0	19	8.6	5.588	21.08	2.032	28.0	280	877	0.335
2/00115KVEPRPVCCPT	2/0	19	9.7	5.588	22.18	2.032	29.5	295	997	0.266
3/00115KVEPRPVCCPT	3/0	19	10.9	5.588	23.38	2.032	30.5	305	1140	0.211
4/00115KVEPRPVCCPT	4/0	19	12.2	5.588	24.68	2.032	32.0	320	1312	0.167
2500115KVEPRPVCCPT	250	37	13.3	5.588	25.98	2.032	33.0	330	1473	0.141
3500115KVEPRPVCCPT	350	37	15.7	5.588	28.38	2.032	35.5	355	1853	0.101
5000115KVEPRPVCCPT	500	37	18.8	5.588	31.48	2.032	38.5	385	2407	0.0708
7500115KVEPRPVCCPT	750	61	23.1	5.588	35.98	2.794	44.5	445	3443	0.0472

Cable Information: 3 Core (133%) (Compact Conductor) - Test Voltage 44kV

DWC Part No.	Size (AWG/MCM)	Conductor		Insulation		Jacket	Ground Size (AWG)	Cable Diameter (Approx) [mm]	Bending Radius (min) [mm]	Cable Weight [lbs/1000ft]	Max. Conductor Resistance (20°C)Ω/km
		No	Diameter [mm]	Thickness (Nom) [mm]	Diameter (Approx) [mm]	Thickness (Nom) [mm]					
1/00315KVEPRPVCCPT	1/0	19	8.6	5.588	21.6	2.794	4	57.0	570	2954	0.335
2/00315KVEPRPVCCPT	2/0	19	9.7	5.588	22.6	2.794	4	59.0	590	3337	0.266
3/00315KVEPRPVCCPT	3/0	19	10.9	5.588	23.9	2.794	3	62.0	620	3824	0.211
4/00315KVEPRPVCCPT	4/0	19	12.2	5.588	25.3	2.794	3	64.5	645	4370	0.167
2500315KVEPRPVCCPT	250	37	13.3	5.588	26.7	2.794	2	67.5	675	4927	0.141
3500315KVEPRPVCCPT	350	37	15.7	5.588	29.2	3.556	2	74.0	740	6298	0.101
5000315KVEPRPVCCPT	500	37	18.8	5.588	32.4	3.556	1	80.5	805	8118	0.0708
7500315KVEPRPVCCPT	750	61	23.1	5.588	37.1	3.556	1/0	90.5	905	11109	0.0472

Ampacities - According to NEC

Size	Isolated in Air [NEC Table 310.60(C) (60)]	Directly Buried [NEC TABLE 310.60(C)(81)]	Underground Electrical Ducts [NEC TABLE 310.60(C)(77)]
2 AWG	215	225	165
1 AWG	250	260	185
1/0 AWG	290	295	215
2/0 AWG	335	335	245
3/0 AWG	385	380	275
4/0 AWG	445	435	315
250 MCM	495	475	345
350 MCM	610	575	415
500 MCM	765	700	500
750 MCM	990	865	610
1000 MCM	1185	1005	690

Maximum Side Pressure, Pull Tensions

Size	Maximum Side Pressure [lbs/ft]	Pull Tensions [lbs]
2 AWG	500	531
1 AWG	500	670
1/0 AWG	500	845
2/0 AWG	500	1065
3/0 AWG	500	1342
4/0 AWG	500	1693
250 MCM	500	2000
350 MCM	500	2800
500 MCM	500	4000
750 MCM	500	6000
1000 MCM	500	8000

Product details and specifications are subject to manufacturing variations and accepted industry tolerances. Please contact your DWC Account Manager with questions or to confirm specific product requirements.