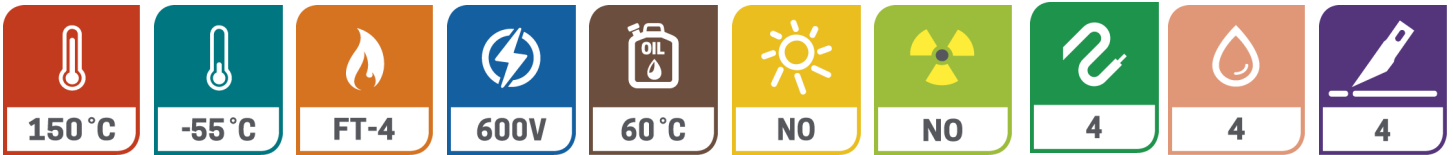




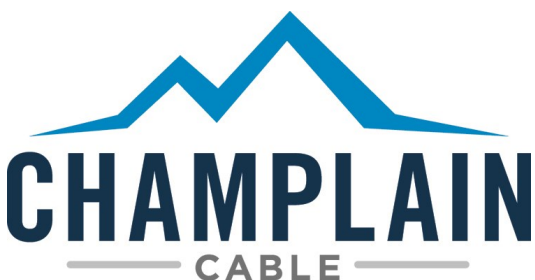
150 HVFX High Voltage Powertrain Wire

ISO-6722-1, Class D, 150°C, Thick Wall, 600V

- Highly Engineered EXTRAD[®] 150HVFX Irradiation Crosslinked Polyolefin
- Flexible for Easier Installation in Tight Routing and Spaces.
- Survives Temperature Spikes of 240°C and Higher
- 600V High Voltage Rating for EV/HEV Applications
- More Robust Performance for Today's Longer Vehicle Warranties
- Life Expectancy of Over 10,000hrs at 125°C



Product Number	Standard Metric Conductors Bare Copper	Nom. Conductor Diameter		Nom. Insulation Thickness		Nom. Finished OD		Nom. Finished Weight (KG/100m)	Ampacity At 40°C in Free Air
		in.	mm.	in.	mm.	in.	mm.		
EXRAD-HVFX-PT-0.50-XX	0.50mm ² (19/.18)	.034	.86	.025	.64	.084	2.13	.80	15
EXRAD-HVFX-PT-0.75-XX	0.75mm ² (19/.22)	.043	1.08	.026	.66	.095	2.40	1.1	21
EXRAD-HVFX-PT-1.0-XX	1.0 mm ² (19/.25)	.048	1.22	.026	.66	.100	2.54	1.3	28
EXRAD-HVFX-PT-1.5-XX	1.5mm ² (19/32)	.062	1.57	.026	.66	.114	2.89	1.9	46
EXRAD-HVFX-PT-2.5-XX	2.5mm ² (37/.29)	.078	1.98	.028	.70	.133	3.38	2.8	60
EXRAD-HVFX-PT-4.0-XX	4.0mm ² (37/.38)	.103	2.62	.031	.78	.165	4.19	4.4	80



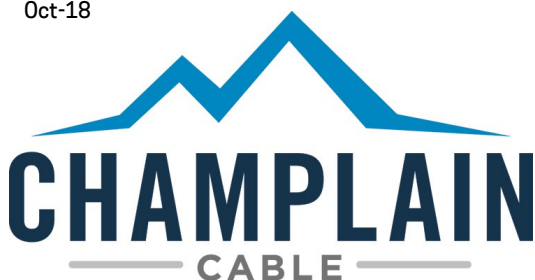


150 HVFX High Voltage Powertrain Wire

Section	Description	Requirement	Typical Results	(35mm2 Sample)
5.1	Outside Cable Diameter	10.40 max.	9.98mm	Pass
5.2	Insulation Thickness	0.64mm min.	0.84mm	Pass
5.3	Conductor Diameter	8.50mm max.	8.08mm	Pass
5.4	Conductor Resistance	0.527 mohms/m @20°C max.	0.521 mohms/m	Pass
5.5	Withstand Voltage	600V 5kV for 5 minutes	No Dielectric Breakdown	Pass
5.6	Insulation Faults	Sparktest @ 12.5kV	No Faults	Pass
5.7	Insulation Volume Resistivity	10 ⁹ Ω /mm min.	1.66 10 ¹⁶ Ω /mm	Pass
5.8	Pressure at High Temperature	0.8N @150°C no dielectric breakdown	No Breakdown	Pass
5.9	Strip Force / Adhesion	Per customer agreement	NA	Pass
5.1	Low Temperature Winding	3 tns 2.5kg - 40°C no dielectric breakdown	No Dielectric Breakdown, No Cracking	Pass
5.11	Impact	300gm @-40°C no breakdown	No Breakdown	Pass
5.12.4.1	Sandpaper Abrasion	NA	NA	Pass
5.12.4.2	Scrape Abrasion	NA	NA	Pass
5.13	Long-Term Heat Aging	150°C 3000 hours	No Breakdown, No Cracks	Pass
5.15	Thermal Overload	200°C 6 hours	No Breakdown, No Cracks	Pass
5.16	Shrinkage by heat	2mm max. 150°C	No Shrinkage	Pass
5.17	Fluid Compatibility	Gasoline 15% max.	7.50%	Pass
		Diesel Fuel 15% max.	2.70%	Pass
		Engine Oil 15% max.	3.20%	Pass
		Ethanol 15% max.	4.70%	Pass
		Power Steering 30% max	4.10%	Pass
		Automatic Transmission 25% max	3.20%	Pass
		Engine Coolant 15% max	0.40%	Pass
		Battery Acid no breakdown	No Breakdown	Pass
5.19	Ozone Resistance	45°C 85% Relative Humidity 70 hours, Ozone 50 +/- 5 pphm, 1kV 1 min. (no breakdown)	No Breakdown	Pass
5.2	Resistance to hot water	Not less than 10-5 ohm-mm	10-14 ohm-mm	Pass
5.21	Temperature and Humidity Cycling	40 - 8 hours cycles -40°C and 125°C 80 - 100% relative humidity	No Dielectric Breakdown, No Cracking	Pass

We cannot anticipate all conditions under which this information and our products or the products of other manufacturers in combination with our products may be used. We accept no responsibility for results obtained by the application of this information or the safety and suitability of our products alone or in combination with other products. Users are advised to make their own tests to determine the safety and suitability of each such product combination for their own purpose. Unless otherwise agreed in writing, we sell the products without warranty, and buyers and users assume all responsibility and liability for loss and damage arising from the handling and use of our products whether used alone or in combination with other products

Oct-18



Manufacturing Locations:
Colchester, Vermont
El Paso, Texas
www.champcable.com