



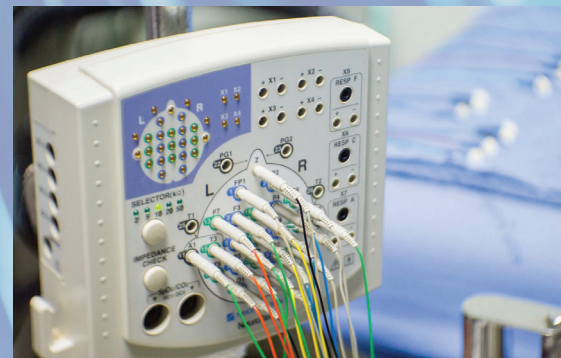
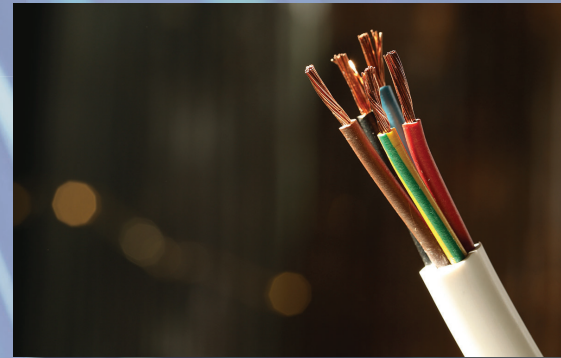
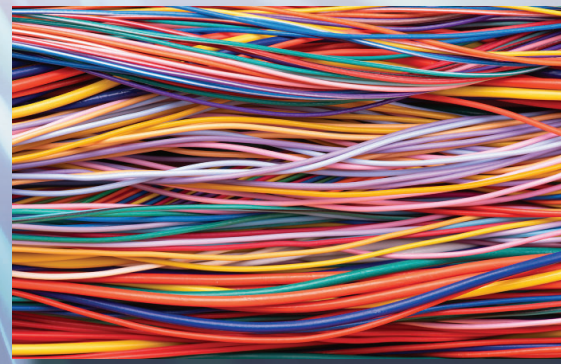
APEX[®] WIRE & CABLE

COMPOUNDS

APEX flexible vinyl compounds are the foundation of the Teknor Apex portfolio of Wire and Cable insulation and jacket compounds.

Flexible, Oil Resistant and Flame Retardant

- RoHS and REACH compliant for no SVHC
- Can be formulated for oil, flame, UV and fungus resistance as well as low acid gas content
- Majority are UL Recognized -- accelerating speed to market by reducing new product testing required for UL Listing



APPLIANCE WIRE

		UL Style 1061	MIL-W-16878	UL Style 1007, 60°C Oil, VW-1	UL Style 1015, VW-1	UL Style 1015, 60°C Oil, VW-1, ≤ 14 AWG	UL Style 1015, 60°C Oil, VW-1, ≤ 18 AWG	UL Style 1015, 80°C Oil, VW-1, ≤ 14 AWG	UL Style 1569, VW-1, ≤ 14 AWG	UL Style 1569, VW-1, ≤ 18 AWG	UL Style 10974, 80°C Oil, VW-1, ≤ 14 AWG	UL Style 2464, Cable Flame over PVC core	UL Style 2464, Cable Flame over PE core	UL Style 2448, 60°C Cable Flame	UL Style 2448, 80°C Cable Flame	UL Style 20276, 60°C Cable Flame	UL Style 20276, 80°C Cable Flame
Compound Property	Test Method	Apex 80862	Apex 80851-F	Apex 80853-A	Apex 84132	Apex 80853-A	Apex 80881-B Natural 14	14-A6457A-98	Apex 80853-A	Apex 80881-B Natural 14	14-A6457A-98	Apex 84132	Apex 82-E254-V	Apex 80328-Y FR Natural 14	Apex 84132	Apex 80328-Y FR Natural 14	Apex 84132
Use: I = Insulation, J = Jacket		I	I	I	I	I	I	I	I	I	I	J	J	J	J	J	J
Temperature Rating, °C	ASTM D794	105	105	105	80	105	105	105	105	105	105	80	80	75	80	75	80
Shore Hardness, delayed	ASTM D2240	90C	71C	76C	83A	76C	90C	74C	76C	90C	74C	83A	90A	85A	83A	85A	83A
Specific Gravity	ASTM D792	1.30	1.30	1.37	1.36	1.37	1.38	1.39	1.37	1.38	1.39	1.36	1.38	1.46	1.36	1.46	1.36
Tensile Strength, MPa	ASTM D638	24.1	22.1	20.0	17.4	20.0	26.2	23.8	20.0	26.2	23.8	17.4	20.7	16.6	17.4	16.6	17.4
Tensile Elongation, %	ASTM D638	235	320	290	360	290	250	290	290	250	290	360	360	300	360	300	360
Brittleness Temperature, °C	ASTM D746	-30	-24	-11	-30	-11	-20	-20	-11	-20	-20	-30	-25	-29	-30	-29	-30
Oxygen Index, %	ASTM D2863	30	28	28	29	28	34	32	28	34	32	29	34	29	29	29	29

BUILDING WIRE

		TW, THW, THW-2, THHW, THHN, THWN, THWN-2, PR I&II, VW-1, CT Use	TW, THW, THW-2, THHW, THHN, THWN, THWN-2, PR I&II, MTW, VW-1, CT Use	TW, THW, THW-2, THHW, THHN, THWN, THWN-2, PR I&II, VW-1, CT Use	TW, THW, THW-2, THHW, THHN, THWN, THWN-2, PR I&II, Fungus Res, MIL-I-631-D VW-1, CT Use	TW, THW, THHW, THHN, THWN, PR I, VW-1	TW, THW, THHW, THHN, THWN, PR I&II	TW, THW, THHW, THHN, THWN, Low Temp, PR I&II	TW, THW, THHW, THHN, THWN, PR I&II	TW, THW, THHW, THHN, THWN	TW, THW, THHW, THHN, THWN	TW, THW, VW-1	TW, THW, PR I VW-1	TW, THW, THHW, THHN, THWN, PR I&II, VW-1	TW, THW, PR I VW-1	NM-B	Type SE
Compound Property	Test Method	Apex 80853-C	Apex 80853-F	Apex 80853-B	Apex 80853-X	Apex 80853-A	Apex 80851	Apex 80851-B	Apex 80873	Apex 80880-A	Apex 80881-A	Apex 84458	Apex 84842	Apex 84853-L	Apex 84856	03-A0573H-89	Apex 80328-Y FR
Use: I = Insulation, J = Jacket		I	I	I	I	I	I	I	I	I	I	I	I	I	I	J	J
Temperature Rating, °C	ASTM D794	105	105	105	105	105	105	105	105	105	105	105	105	105	90	80	75
Shore Hardness, delayed	ASTM D2240	71C	72C	75C	72C	76C	71C	71C	83C	74C	88C	90A	86A	75C	67C	89A	85A
Specific Gravity	ASTM D792	1.31	1.31	1.31	1.32	1.37	1.30	1.30	1.30	1.34	1.35	1.39	1.33	1.38	1.38	1.46	1.44
Tensile Strength, MPa	ASTM D638	21.4	19.3	21.4	19.3	20.0	22.1	22.8	24.5	23.8	25.2	19.3	17.9	19.3	19.3	17.0	14.8
Tensile Elongation, %	ASTM D638	350	350	350	350	290	320	325	320	260	300	330	360	285	310	300	300
Brittleness Temperature, °C	ASTM D746	-19	-19	-20	-19	-11	-24	-33	-13	-25	-21	-21	-30	-17	-24	-34	-29
Oxygen Index, %	ASTM D2863	27	28	27	27	28	28	28	27	31	30	27	29	28	29	23	27

TRAY CABLE

		TC, Oil I & II, 720 hour Sunlight Resistant	TC, 720 hour Sunlight Resistant	TC, 720 hour Sunlight Resistant	TC, Oil I, 720 hour Sunlight Resistant	TC, Oil I, 720 hour Sunlight Resistant	TC, Oil I&II, UL 1685 FT-4, 720 hour Sunlight Resistant	TC over XLPE, Oil I, UL 1685 FT-4	TC over XLPE, Oil I, UL 1685 ST1 FT-4	ITC/PLTC, Oil I, 720 hour Sunlight Resistant	TC, PLTC, Oil I&II, UL 1685 FT-4	TC, UL 1685 FT-4, Oil I&II	TC over XLPE, PLTC, Oil I, UL 1685 FT-4	TC over XLPE, Oil I, UL 1685 FT-4	TC/PLTC, Oil I&II, UL 1685 FT-4, Low Temp, PVC Blend	TC/PLTC, Oil I&II, UL 1685 FT-4, Low Temp, PVC Blend	Low Acid Gas Teck 90
Compound Property	Test Method	Apex 4157	Apex 80328-Y FR Natural 14	Apex 84856	Apex 84468-H	Apex 84842-B	Apex 70005	Apex 70006	Apex 70008 LS UV	Apex 70010	Apex 70011 UV	Apex 70020	Apex 70021	Apex 65007-A1	Apex P-55003	Apex N-56001	Apex 72000
Use: I = Insulation, J = Jacket		J	J	J	J	J	J	J	J	J	J	J	J	J	J	J	J
Temperature Rating, °C	ASTM D794	105	75	90	105	105	90	105	105	105	105	105	105	105	90	105	90
Shore Hardness, delayed	ASTM D2240	79A	85A	67C	85A	86A	80A	88A	51D	76A	84A	85A	64A	86A	86A	76A	81A
Specific Gravity	ASTM D792	1.39	1.46	1.38	1.33	1.32	1.39	1.49	1.40	1.34	1.37	1.39	1.43	1.49	1.33	1.35	1.47
Tensile Strength, MPa	ASTM D638	16.6	16.6	19.3	19.7	19.0	18.5	18.3	17.0	15.9	13.0	14.7	19.2	13.8	24.8	16.7	12.1
Tensile Elongation, %	ASTM D638	425	300	310	360	360	410	330	290	360	315	340	295	315	420	425	355
Brittleness Temperature, °C	ASTM D746	-33	-29	-24	-28	-32	-42	-18	-26	-28	-48	-47	-29	-27	-57	-55	-41
Oxygen Index, %	ASTM D2863	31	29	29	31	29	31	38	44	30	32	34	37	36	32	33	30

AUDIO VIDEO CABLE									
		Snake Cable, Ultra Matte Finish, VW-1	PLTC/AWM, Matte Finish, VW-1	Non-FR, Matte Finish	Indoor, FR Coax, VW-1	Indoor, High FR Coax, VW-1	Indoor/Outdoor Coax, VW-1	Indoor/Outdoor Coax, VW-1	Outdoor Coax, VW-1
Compound Property	Test Method	12-G2756A-75	09-G0298A-78	Apex 87-L101F-3	Apex CXFR 2001-84	Apex CXFR 2004-88	Apex CXFR 2011-85	Apex CXFR 2013-85	Apex CX 2015-75A
Use: I = Insulation, J = Jacket		J	J	J	J	J	J	J	J
Temperature Rating, °C	ASTM D794	75	75	75	80	75	75	75	60
Shore Hardness, delayed	ASTM D2240	75A	78A	73A	84A	90A	89A	85A	80A
Specific Gravity	ASTM D792	1.31	1.42	1.42	1.42	1.42	1.46	1.39	1.35
Tensile Strength, MPa	ASTM D638	13.1	14.9	9.3	15.2	18.3	17.9	16.8	14.5
Tensile Elongation, %	ASTM D638	315	330	275	310	325	300	395	330
Brittleness Temperature, °C	ASTM D746	-36	-33	-35	-22	-24	-34	-41	-46
Oxygen Index, %	ASTM D2863	27	31	--	29	33	30	31	--

DATA CABLE (COPPER)									
		Cat5 Riser, Indoor	Cat5 Riser, Indoor/Outdoor	Cat 6 Riser, Indoor	Cat6 Riser, Low Temp, Indoor/Outdoor	Cat6 Riser, Indoor/Outdoor	Cat6 Riser, Indoor	Cat6 Riser, Indoor	Cat6 Riser, Indoor, Non-Phthalate
Compound Property	Test Method	Apex 65005	Apex 65007	Apex 65008-D	Apex 65014 UVF	Apex 65027 UV	Apex 65040	Apex 65044	Apex 65049NP
Use: I = Insulation, J = Jacket		J	J	J	J	J	J	J	J
Temperature Rating, °C	ASTM D794	75	90	75	90	75	75	75	105
Shore Hardness, delayed	ASTM D2240	74C	86A	83C	74C	70C	79C	75C	89A
Specific Gravity	ASTM D792	1.54	1.54	1.58	1.53	1.51	1.59	1.60	1.56
Tensile Strength, MPa	ASTM D638	18.0	14.1	19.3	17.2	17.9	16.4	16.0	24.6
Tensile Elongation, %	ASTM D638	275	275	220	290	270	280	270	325
Brittleness Temperature, °C	ASTM D746	-19	-27	-8	-29	-27	-16	-22	-21
Oxygen Index, %	ASTM D2863	38	39	43	40	40	41	43	42

DATA CABLE (OPTICAL FIBER)									
		OFNR, Tight Buffer	OFNR, Tight Buffer	OFNR, Pinchable Buffer	OFNR, Indoor/Outdoor	OFNR, Low Shrinkage, Indoor/Outdoor	OFNR, Low Temp, UV & Fungus Resistant	OFNR, High FR, UV & Fungus Resistant	OFNR, Low Temp, UV & Fungus Resistant
Compound Property	Test Method	Apex 60290 FOB	Apex 60001-L	Apex 60007	Apex 65290	Apex 65026	Apex 65034NP	Apex 65045-D UVF	Apex 65047 UVF
Use: B = Buffer, J = Jacket		B	B	B	J	J	J	J	J
Temperature Rating, °C	ASTM D794	75	60	75	80	90	90	90	90
Shore Hardness, delayed	ASTM D2240	73C	88C	89A	70C	79C	74C	52D	64C
Specific Gravity	ASTM D792	1.38	1.33	1.49	1.39	1.43	1.33	1.47	1.39
Tensile Strength, MPa	ASTM D638	22.1	23.4	12.1	21.4	23.0	25.0	15.9	17.7
Tensile Elongation, %	ASTM D638	245	275	300	320	265	315	300	345
Brittleness Temperature, °C	ASTM D746	-32	-11	-29	-30	-32	-40	-38	-44
Oxygen Index, %	ASTM D2863	32	31	29	33	36	32	48	32

FIRE ALARM CABLE, SECURITY CABLE									
		FPL/FPLR, Wet-rated	FPL, Wet-rated, Low Temp	FPL	FPLR	FPL	FPLR	FPLR	FPLR, Non-Phthalate
Compound Property	Test Method	Apex 80853-A Natural 14	Apex 80851-B Natural 14	Apex 65291	Apex 65290	Apex 84856	Apex 84855	Apex 65048	Apex 65049 NP
Use: I = Insulation, J = Jacket		I	I	J	J	J	J	J	J
Temperature Rating, °C	ASTM D794	105	105	75	80	90	90	105	105
Shore Hardness, delayed	ASTM D2240	76C	71C	90A	70C	67C	65C	65C	89A
Specific Gravity	ASTM D792	1.38	1.30	1.42	1.39	1.38	1.42	1.41	1.56
Tensile Strength, MPa	ASTM D638	20.0	22.8	17.6	21.4	19.3	19.3	17.8	24.6
Tensile Elongation, %	ASTM D638	290	325	300	320	310	325	345	325
Brittleness Temperature, °C	ASTM D746	-11	-33	-18	-30	-24	-25	-31	-21
Oxygen Index, %	ASTM D2863	31	28	30	33	29	33	33	42

FLEXIBLE CORD									
		SJT, SJTW, ST, STW, SJTO, SJTOW, STO, STOW, VW-1	SJTW, STW, SJTO, STO, SJTOW, STOW, SJTOOW, STOOW, VW-1	SJT, ST, VW-1	SJT, ST, SJTO, STO, VW-1	SJT, ST, VW-1	SJT, SJTO, SJTOW, SJTW, STJ, STO, STOW, STW, VW-1	SJT, ST	SJT, SJTO, SJTOW, SJTW, STO, STOW, STW
Compound Property	Test Method	Apex 80328-Y FR Natural	Apex 80842 Natural 14	01-A0488D-87	01-A0383A-85	Apex 80-C118-M	Apex 4150	Apex 4167	Apex 157V-4
Use: I = Insulation, J = Jacket		I/J	I/J	I	I	J	I	J	J
Temperature Rating, °C	ASTM D794	75	105	90	105	105	105	60	105
Shore Hardness, delayed	ASTM D2240	85A	82A	87A	85A	85A	75A	75A	72A
Specific Gravity	ASTM D792	1.44	1.31	1.33	1.36	1.35	1.24	1.23	1.37
Tensile Strength, MPa	ASTM D638	14.8	16.6	18.8	20.0	17.9	15.8	15.9	14.5
Tensile Elongation, %	ASTM D638	300	400	330	310	360	385	360	400
Brittleness Temperature, °C	ASTM D746	-29	-31	--	-25	-33	-50	-56	-35
Oxygen Index, %	ASTM D2863	27	28	26	26	28	26	26	25

FIXTURE WIRE, MACHINE TOOL WIRE						MEDICAL CABLE			
		MTW	MTW, Oil I	MTW, Oil I	TFN/TFN, VW-1	Non-Phthalate, VW-1	Non-Phthalate, VW-1	Non-Phthalate, VW-1	Non-DEHP, UV Stabilized, VW-1
Compound Property	Test Method	Apex 80853-F	Apex 4460	Apex 70015	Apex 80881-B Natural 14	94-A1165A-95-NT Clear	08-A0349A-83-NT NP Water Clear	94-A1165A-92-NT Water Clear	03-A0030F1-80-NT Water Clear
Use: I = Insulation, J = Jacket		I	J	J	I	I	I/J	I/J	J
Temperature Rating, °C	ASTM D794	105	105	105	90	105	105	90	60
Shore Hardness, delayed	ASTM D2240	72C	80A	65C	90C	70C	83A	67C	80A
Specific Gravity	ASTM D792	1.31	1.43	1.43	1.38	1.30	1.26	1.29	1.23
Tensile Strength, MPa	ASTM D638	19.3	15.9	18.2	26.2	22.1	20.9	20.1	19.7
Tensile Elongation, %	ASTM D638	350	400	315	250	375	390	245	360
Brittleness Temperature, °C	ASTM D746	-19	-26	-23	-20	--	-27	--	--
Oxygen Index, %	ASTM D2863	28	29	29	34	26	26	26	25



Vinyl Manufacturing Sites

About Teknor Apex

The Teknor Apex Company, a privately-owned company founded in 1924, is one of the world's leading customer-specific plastic compounders. Teknor Apex produces flexible and rigid vinyl, thermoplastic elastomers, polyamides, specialty compounds, color masterbatches, chemicals and garden hoses.

The company is based in Pawtucket, RI, USA. It operates fourteen production plants worldwide: in the United States, Belgium, Germany, China and Singapore.

Industries Served



BUILDING & CONSTRUCTION



CONSUMER PRODUCTS



ELECTRICAL & ELECTRONICS



INDUSTRIAL



MEDICAL



PACKAGING



TRANSPORTATION

APEX[®]

Contact Teknor Apex to begin customizing your solution today.

✉ vinyl@teknorapex.com

☎ 800-554-9892

www.teknorapex.com

Americas
505 Central Avenue
Pawtucket
Rhode Island 02861
+1 401 725 8000

Europe
Umonderbaan 22
6167RD Geleen
Netherlands
+31 46 7020 950

Asia
41 Shipyard Road
Singapore 628134
+65 6265 2544

*The information and recommendations contained in this bulletin are, to the best of our knowledge, accurate and reliable but no guarantee of their accuracy is made. All products are sold upon conditions that purchasers shall make their own tests to determine the suitability of such products for their particular purposes and uses and purchaser assumes all risks and liability for the results of use of the products, including use in accordance with seller's recommendations. Nothing in this bulletin constitutes permission or a recommendation to practice or use any invention covered by any patent owned by this company or by others. There is no warranty of merchantability and there are no other warranties for the products described. For detailed Product Stewardship information, please contact us. Any product of Teknor Apex, including product names, shall not be used or tested in any medical or food contact application without the prior written acknowledgement of Teknor Apex as to the intended use. Please note that some products may not be available in one or more countries.