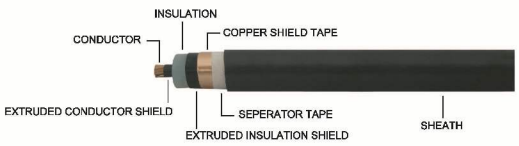
6/10 KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_o/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	16	6	3.4	1.5	18.5	1.15	3,100	134	440	500/D
	25	6	3.4	1.6	20	0.727	2,700	176	550	500/D
	35	6	3.4	1.6	21	0.524	2,450	214	700	500/D
	50	6	3.4	1.7	22	0.387	2,200	258	850	500/D
	70	12	3.4	1.7	24	0.268	1,900	322	1,100	500/D
	95	15	3.4	1.8	26	0.193	1,700	394	1,300	500/D
	120	18	3.4	1.8	27	0.153	1,550	456	1,600	500/D
	150	18	3.4	1.9	29	0.124	1,450	518	1,900	500/D
	185	30	3.4	1.9	31	0.0991	1,300	598	2,300	500/D
	240	34	3.4	2.0	33	0.0754	1,150	710	2,900	500/D
	300	34	3.4	2.1	36	0.0601	1,050	816	3,500	500/D
	400	53	3.4	2.2	39	0.0470	950	949	4,400	500/D
	500	53	3.4	2.3	42	0.0366	850	1,109	5,500	500/D
	630	53	3.4	2.4	46	0.0283	750	1,290	7,000	500/D
	800	53	3.4	2.5	50	0.0221	650	1,482	8,500	500/D
	1,000	53	3.4	2.6	56	0.0176	600	1,631	11,000	500/D

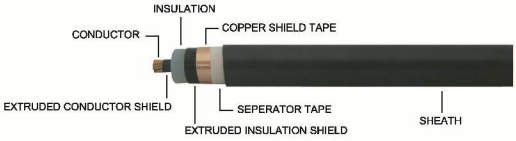
* REMARK : Special protection can be produced

D : Packing in drum

6/10 KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_0/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

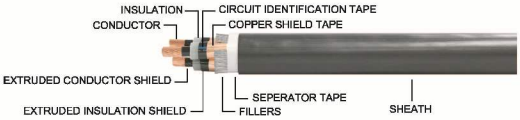
Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	16	1.4703	0.64100	0.20138	1.48400
	25	0.9271	0.61100	0.19195	0.94673
	35	0.6683	0.58900	0.18504	0.69343
	50	0.4936	0.56900	0.17876	0.52498
	70	0.3419	0.54800	0.17216	0.38282
	95	0.2466	0.53000	0.16650	0.29751
	120	0.1957	0.51700	0.16242	0.25432
	150	0.1586	0.50900	0.15991	0.22521
	185	0.1271	0.49800	0.15645	0.20158
	240	0.0971	0.48700	0.15300	0.18123
	300	0.0778	0.47900	0.15048	0.16939
	400	0.0612	0.47100	0.14797	0.16013
	500	0.0487	0.46400	0.14577	0.15370
	630	0.0387	0.45600	0.14326	0.14840
	800	0.0316	0.44900	0.14106	0.14456
	1,000	0.0271	0.44000	0.13823	0.14087

Laying Type : Touching

6/10KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_0/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	16	6	3.4	2.2	37	1.15	3,100	109	1,500	500/D
	25	6	3.4	2.2	40	0.727	2,700	143	1,900	500/D
	35	6	3.4	2.3	42	0.524	2,450	174	2,200	500/D
	50	6	3.4	2.4	45	0.387	2,200	208	2,700	500/D
	70	12	3.4	2.6	49	0.268	1,900	259	3,500	500/D
	95	15	3.4	2.7	53	0.193	1,700	317	4,400	500/D
	120	18	3.4	2.8	57	0.153	1,550	366	5,500	500/D
	150	18	3.4	2.9	60	0.124	1,450	416	6,000	500/D
	185	30	3.4	3.0	64	0.0991	1,300	481	7,500	500/D
	240	34	3.4	3.2	70	0.0754	1,150	569	9,500	300/D
	300	34	3.4	3.3	75	0.0601	1,050	683	11,500	300/D
	400	53	3.4	3.6	81	0.0470	950	789	14,000	300/D

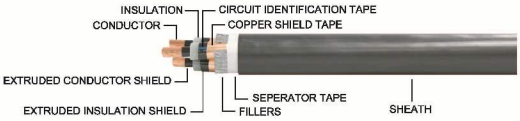
* REMARK : Special protection can be produced

D : Packing in drum

6/10KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_0/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

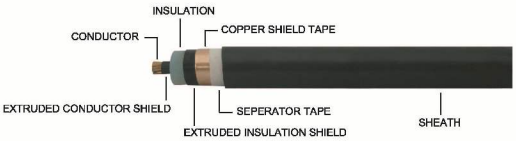
For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	16	1.47037	0.410	0.12881	1.47600
	25	0.92709	0.381	0.11969	0.93478
	35	0.66827	0.362	0.11373	0.67788
	50	0.49367	0.343	0.10776	0.50529
	70	0.34212	0.324	0.10179	0.35694
	95	0.24674	0.308	0.09676	0.26503
	120	0.19585	0.298	0.09362	0.21708
	150	0.15927	0.289	0.09079	0.18333
	185	0.12768	0.281	0.08828	0.15523
	240	0.09808	0.271	0.08514	0.12988
	300	0.07906	0.264	0.08294	0.11458
	400	0.06307	0.257	0.08074	0.10245

8.7/15KV-CV

IEC 60502-2

8.7/15(17.5)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor Compact round stranded annealed copper,
Single-core : Sizes 25 mm² up to 1,000 mm²
Multi-cores : Sizes 25 mm² up to 400 mm²

Insulation Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 17,500 Volts
Rated voltage (U_0/U) 8.7/15 kV
8,700 Volts between Line-to-Earth
15,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 30,500 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	25	6	4.5	1.6	22	0.727	3,300	177	650	500/D
	35	6	4.5	1.7	23	0.524	3,000	215	750	500/D
	50	6	4.5	1.7	25	0.387	2,700	258	900	500/D
	70	12	4.5	1.8	26	0.268	2,400	322	1,200	500/D
	95	15	4.5	1.8	28	0.193	2,100	394	1,400	500/D
	120	18	4.5	1.9	30	0.153	1,950	455	1,700	500/D
	150	18	4.5	1.9	31	0.124	1,800	517	2,000	500/D
	185	30	4.5	2.0	33	0.0991	1,650	596	2,400	500/D
	240	34	4.5	2.1	36	0.0754	1,500	706	3,000	500/D
	300	34	4.5	2.1	38	0.0601	1,350	813	3,700	500/D
	400	53	4.5	2.2	41	0.0470	1,200	944	4,500	500/D
	500	53	4.5	2.3	45	0.0366	1,100	1,103	5,500	500/D
	630	53	4.5	2.4	48	0.0283	950	1,283	7,000	500/D
	800	53	4.5	2.6	53	0.0221	850	1,470	8,500	500/D
	1,000	53	4.5	2.7	58	0.0176	750	1,679	11,500	300/D

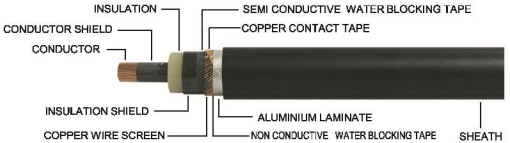
* REMARK : Special protection can be produced

D : Packing in drum

69KV-CE

TIS 2202-2547 (IEC 60840)

69 kV 90° C CROSS - LINKED POLYETHYLENE INSULATED WITH COPPER WIRE SCREEN AND POLYETHYLENE JACKETED POWER CABLE



CABLE STRUCTURE

Conductor : Compact concentric stranded uncoated annealed Copper conductor
Single-core : Sizes 400 mm² up to 800 mm²
Insulation : Cross-linked polyethylene (XLPE)
Core identification
Single-core : Natural (Translucent)
Sheath : Polyethylene (PE)

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
Testing voltage : 90,000 Volts
Reference standard :TIS 2202, TIS 2427 (IEC 60840, IEC 60228)

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of cores	Nominal Cross sectional area (mm²)	Number of wires minimum (No.)	Conductor diameter approx. (mm)	Conductor shield thickness nominal (mm)	Insulation thickness nominal (mm)	Insulation shield thickness nominal (mm)	Copper wire area nominal (mm²)	Jacket thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Current Rating in ground maximum (A)	Weight of cable approx. (kg/km)	Standard length (m)
1	400/95	53	23.5	1.5	11.0	1.5	95	3.1	66	0.0470	690	7,000	500/D
	500/95	53	26.7	1.5	11.0	1.5	95	3.2	69	0.0366	785	8,000	300/D
	630/120	53	30.3	1.5	11.0	1.5	120	3.4	74	0.0283	895	10,000	300/D
	800/120	53	34.1	1.5	11.0	1.5	120	3.5	78	0.0221	1,010	11,500	300/D

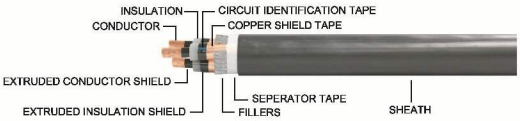
D: Packing in drum.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	400	0.0614	0.5800	0.1822	0.1923
	500	0.0485	0.5634	0.1770	0.1835
	630	0.0385	0.5521	0.1734	0.1777
	800	0.0312	0.5415	0.1701	0.1730

8.7/15KV-CV

IEC 60502-2

8.7/15(17.5)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor Compact round stranded annealed copper,
Single-core : Sizes 25 mm2 up to 1,000 mm2
Multi-cores : Sizes 25 mm^2 up to 400 mm^2

Insulation Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 17,500 Volts
Rated voltage (U_0/U) 8.7/15 kV
8,700 Volts between Line-to-Earth
15,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 30,500 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	25	6	4.5	2.4	45	0.727	3,300	146	2,200	500/D
	35	6	4.5	2.5	48	0.524	3,000	176	2,600	500/D
	50	6	4.5	2.6	51	0.387	2,700	211	3,100	500/D
	70	12	4.5	2.7	54	0.268	2,400	263	3,900	500/D
	95	15	4.5	2.8	58	0.193	2,100	321	4,800	500/D
	120	18	4.5	2.9	62	0.153	1,950	370	5,500	500/D
	150	18	4.5	3.1	66	0.124	1,800	420	6,500	500/D
	185	30	4.5	3.2	69	0.0991	1,650	484	8,000	500/D
	240	34	4.5	3.4	75	0.0754	1,500	573	10,000	300/D
	300	34	4.5	3.5	80	0.0601	1,350	659	12,000	300/D
	400	53	4.5	3.7	86	0.0470	1,200	764	15,000	300/D

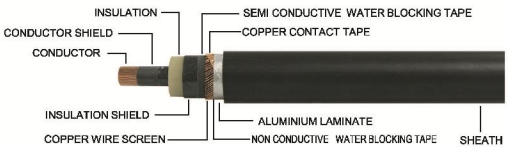
* REMARK : Special protection can be produced

D : Packing in drum

115KV-CE

TIS 2202-2547 (IEC 60840)

115 kV 90° C CROSS - LINKED POLYETHYLENE INSULATED WITH COPPER WIRE SCREEN AND POLYETHYLENE JACKETED POWER CABLE



CABLE STRUCTURE

Conductor : Compact concentric stranded uncoated annealed Copper conductor
Single-core : Sizes 400 mm² up to 800 mm²

Insulation : Cross-linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)

Sheath : Polyethylene (PE)

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C

Testing voltage : 160,000 Volts

Reference standard : TIS 2202, TIS 2427 (IEC 60840, IEC 60228)

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of cores	Nominal Cross sectional area (mm²)	Number of wires minimum (No.)	Conductor diameter approx. (mm)	Conductor shield thickness nominal (mm)	Insulation thickness nominal (mm)	Insulation shield thickness nominal (mm)	Copper wire area nominal (mm²)	Jacket thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Current Rating in ground maximum (A)	Weight of cable approx. (kg/km)	Standard length (m)
1	400/95	53	23.5	1.5	16.0	1.5	95	3.5	76	0.0470	690	8,000	300/D
	500/95	53	26.7	1.5	16.0	1.5	95	3.6	80	0.0366	785	9,000	300/D
	630/120	53	30.3	1.5	16.0	1.5	120	3.7	84	0.0283	895	11,000	300/D
	800/120	53	34.1	1.5	16.0	1.5	120	3.9	88	0.0221	1,010	13,000	300/D

D: Packing in drum.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	400	0.0614	0.6145	0.1931	0.2026
	500	0.0485	0.5974	0.1877	0.1938
	630	0.0384	0.5807	0.1824	0.1864
	800	0.0311	0.5666	0.1780	0.1807

FHC

TIS 64-2517

HARD DRAWN COPPER STRANDED CONDUCTOR

CONDUCTOR

CABLE STRUCTURE

Conductor Hard drawn copper wires, concentric stranded conductor
Sizes 10 mm^2 up to 500 mm^2
Stranding direction the outermost layer Z

TECHNICAL DATA

Reference standard TIS 64-2517

APPLICATION

For grounding wire

Nominal Cross Sectional area (mm²)	Number and diameter of wires (No./mm)	Conductor diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Breaking strength (kgf)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
10	7/1.35	4.05	1.80548	438	90	9	100/C
16	7/1.70	5.10	1.13857	694	125	140	100/C
25	7/2.14	6.42	0.71851	1,076	160	230	100/C
35	7/2.52	7.56	0.51815	1,459	200	320	100/C
50	7/3.02	9.06	0.35896	2,095	250	450	100/C
50	19/1.78	8.90	0.38252	2,021	250	430	100/C
70	19/2.14	10.70	0.26466	2,921	310	600	500/D
95	19/2.52	12.60	0.19183	3,961	380	850	500/D
120	19/2.85	14.25	0.14922	5,067	440	1,100	500/D
150	37/2.25	15.75	0.12384	6,289	510	1,300	500/D
185	37/2.52	17.64	0.09813	7,713	585	1,700	500/D
240	61/2.25	20.25	0.07528	10,369	700	2,200	500/D
300	61/2.52	22.68	0.06002	12,717	800	2,800	500/D
400	61/2.85	25.65	0.04692	16,266	900	3,600	500/D
500	61/3.20	28.80	0.03703	20,506	1,110	4,500	500/D

C : Packing in coil
D : Packing in drum

24 KV-OC

ICEA S-66-524
ICEA S-93-639

24 kV CROSS-LINKED POLYETHYLENE PARTIAL INSULATED ALL ALUMINIUM CABLE

CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single-core : Sizes 35 mm² up to 185 mm²

Insulation : Cross-linked polyethylene (XLPE)

Core identification
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 24,000 Volts

Testing voltage : 11,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator)

Number of core	Nominal cross sectional area (mm²)	Minimum number of wires (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6° C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	1.8	12.0	0.868	900	140	5,591	170	1,000/D
	50	6	8.11	2.2	14.0	0.641	880	170	7,313	220	1,000/D
	70	12	9.73	2.1	15.0	0.443	800	215	10,420	290	1,000/D
	95	15	11.43	2.5	18.0	0.320	750	270	14,098	400	1,000/D
	120	15	13.05	2.6	19.5	0.253	700	310	18,518	490	1,000/D
	150	15	14.37	2.6	21.0	0.206	650	355	22,457	550	1,000/D
	185	30	16.08	2.55	23.0	0.164	600	410	28,974	700	1,000/D

D : Packing in drum

33KV-OC

ICEA S-66-524
ICEA S-93-639

33 kV CROSS-LINKED POLYETHYLENE PARTIAL INSULATED ALL ALUMINIUM CABLE

CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single-core : Size 35 mm^2 up to 185 mm^2

Insulation : Cross-linked polyethylene (XLPE)

Core identification
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 33,000 Volts

Testing voltage : 17,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator)

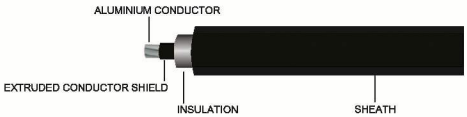
Number of core	Nominal cross sectional area (mm^2)	Minimum number of wires (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	3.0	14.5	0.868	1,350	145	5,591	220	1000/D
	50	6	8.11	3.2	16.5	0.641	1,300	175	7,313	280	1000/D
	70	12	9.73	3.2	18.0	0.443	1,200	220	10,420	350	1000/D
	95	15	11.43	3.5	20.0	0.320	1,100	270	14,098	460	1000/D
	120	15	13.05	3.6	22.0	0.253	1,000	315	18,518	550	1000/D
	150	15	14.37	3.6	23.0	0.206	950	360	22,457	650	1000/D
	185	30	16.08	3.9	26.0	0.164	900	415	28,974	800	1000/D

D : Packing in drum

15KV-CC

ICEA S-66-524
ICEA S-93-639

15 kV ALL ALUMINIUM CONDUCTOR SPACED AERIAL CABLE



CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single Core : Size 35 mm^2 up to 240 mm^2

Insulation : Cross-linked polyethylene (XLPE)
Color : Natural

Sheath : Cross-linked polyethylene (XLPE)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
: Circuit voltage not exceeding 15,000 Volts

Testing voltage : 27,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator or spacer)

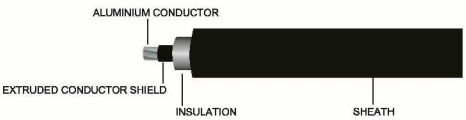
Number of core	Nominal cross sectional area (mm^2)	Number of stranded (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	1.91	1.91	16.5	0.868	1,750	164	5,591	260	500/D
	50	6	8.11	1.91	1.91	18.0	0.641	1,550	198	7,313	320	500/D
	70	12	9.73	1.91	1.91	19.5	0.443	1,400	250	10,420	390	500/D
	95	15	11.43	1.91	1.91	21.0	0.320	1,250	306	14,098	490	500/D
	120	15	13.05	1.91	1.91	23.0	0.253	1,150	355	18,518	600	500/D
	150	15	14.37	1.91	1.91	24.0	0.206	1,050	405	22,457	650	500/D
	185	30	16.08	1.91	1.91	26.0	0.164	980	468	28,974	800	500/D
	240	30	18.57	1.91	1.91	28.0	0.125	850	560	37,506	1,000	500/D

D : Packing in drum

25 KV-CC

ICEA S-66-524
ICEA S-93-639

25 kV ALL ALUMINIUM CONDUCTOR SPACED AERIAL CABLE



CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single Core : Size 35 mm^2 up to 240 mm^2

Insulation : Cross-linked polyethylene (XLPE)
Color : Natural

Sheath : Cross-linked polyethylene (XLPE)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 25,000 Volts

Testing voltage : 38,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator or spacer)

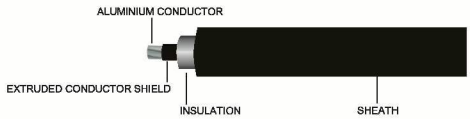
Number of core	Nominal cross sectional area (mm²)	Number of stranded (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking Strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	3.175	3.175	22	0.868	2,500	165	5,591	400	500/D
	50	6	8.11	3.175	3.175	23	0.641	2,250	199	7,313	460	500/D
	70	12	9.73	3.175	3.175	25	0.443	2,050	250	10,420	550	500/D
	95	15	11.43	3.175	3.175	26	0.320	1,850	305	14,098	650	500/D
	120	15	13.05	3.175	3.175	28	0.253	1,700	353	18,518	750	500/D
	150	15	14.37	3.175	3.175	29	0.206	1,600	402	22,457	850	500/D
	185	30	16.08	3.175	3.175	31	0.164	1,450	464	28,974	1,000	500/D
	240	30	18.57	3.175	3.175	33	0.125	1,300	553	37,506	1,200	500/D

D : Packing in drum

35 KV-CC

ICEA S-66-524
ICEA S-93-639

35 kV ALL ALUMINIUM CONDUCTOR SPACED AERIAL CABLE



CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single Core : Size 50 mm^2 up to 240 mm^2

Insulation : Cross-linked polyethylene (XLPE)
Color : Natural

Sheath : Cross-linked polyethylene (XLPE)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
: Circuit voltage not exceeding 35,000 Volts

Testing voltage : 49,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator or spacer)

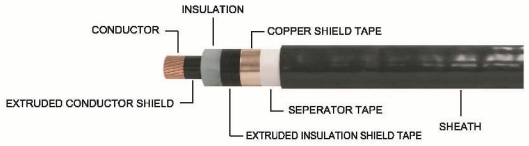
Number of core	Nominal cross sectional area (mm²)	Number of stranded (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Approx. Overall diameter (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking Strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	50	6	8.11	4.445	3.175	26	0.641	2,500	200	7,313	550	500/D
	70	12	9.73	4.445	3.175	27	0.443	2,300	251	10,420	650	500/D
	95	15	11.43	4.445	3.175	29	0.320	2,100	306	14,098	750	500/D
	120	15	13.05	4.445	3.175	31	0.253	1,950	355	18,518	900	500/D
	150	15	14.37	4.445	3.175	32	0.206	1,800	403	22,457	1,000	500/D
	185	30	16.08	4.445	3.175	34	0.164	1,690	464	28,974	1,100	500/D
	240	30	18.57	4.445	3.175	36	0.125	1,500	552	37,506	1,400	500/D

D : Packing in drum

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_o/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 63,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	8.9	2.0	33	0.524	4,680	214	1,200	500/D
	50	6	8.0	2.0	32	0.387	4,010	257	1,300	500/D
	70	12	8.0	2.0	34	0.268	3,620	320	1,500	500/D
	95	15	8.0	2.1	36	0.193	3,260	390	1,900	500/D
	120	18	8.0	2.1	37	0.153	3,020	450	2,200	500/D
	150	18	8.0	2.2	39	0.124	2,820	511	2,500	500/D
	185	30	8.0	2.2	41	0.0991	2,620	587	2,900	500/D
	240	34	8.0	2.3	43	0.0754	2,370	695	3,500	500/D
	300	34	8.0	2.4	46	0.0601	2,190	797	4,200	500/D
	400	53	8.0	2.5	48	0.0470	2,000	925	5,000	500/D
	500	53	8.0	2.6	52	0.0366	1,800	1,078	6,500	500/D
	630	53	8.0	2.7	56	0.0283	1,630	1,252	7,500	500/D
	800	53	8.0	2.8	60	0.0221	1,480	1,437	9,500	300/D
	1,000	53	8.0	3.0	66	0.0176	1,300	1,638	12,000	300/D

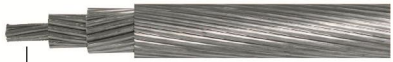
* Remark : Special protection can be produced

D : Packing in drum

AAC

TIS 85-2548

ALL ALUMINIUM STRANDED CONDUCTOR



CABLE STRUCTURE

Conductor : Concentric stranded hard drawn aluminium wires sizes 16 mm^2 up to 1,000 mm^2

Standing Direction : The outermost layer Z

TECHNICAL DATA

Reference standard : TIS 85-2548

APPLICATION

For overhead transmission and distribution line

Nominal cross sectional area (mm^2)	Number and approx diameter of wire (No./mm)	Overall conductor diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Breaking strength (kgf)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
16	7/1.70	5.10	1.802	290	110	44	3000/D
25	7/2.14	6.42	1.138	440	145	70	3000/D
35	7/2.52	7.56	0.820	585	180	95	3000/D
50	7/3.02	9.06	0.571	805	225	140	2500/D
50	19/1.83	9.15	0.5757	890	225	140	2500/D
70	19/2.15	10.75	0.4171	1,205	270	190	2500/D
95	19/2.52	12.60	0.3036	1,585	340	260	2500/D
120	19/2.85	14.25	0.2374	1,980	390	330	2000/D
150	37/2.25	15.75	0.1960	2,570	455	400	2000/D
185	37/2.52	17.64	0.1563	3,085	550	500	2000/D
240	61/2.25	20.25	0.1192	4,015	625	650	1500/D
300	91/2.52	22.68	0.0950	4,820	710	850	1500/D
400	61/2.85	25.65	0.0743	6,025	855	1,100	1000/D
500	61/3.25	29.25	0.0571	7,695	990	1,400	1000/D
625	91/2.96	32.56	0.0463	9,694	1,140	1,700	500/D
800	91/3.35	36.85	0.0361	12,055	1,340	2,200	500/D
1000	91/3.74	41.14	0.0290	14,845	1,540	2,800	500/D

D : Packing in drum

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_0/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 63,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

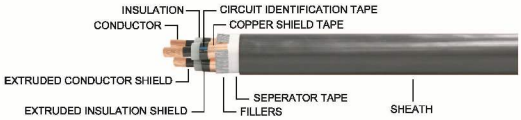
For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	35	0.66831	0.681	0.21386	0.70169
	50	0.49361	0.644	0.20229	0.53345
	70	0.34200	0.618	0.19419	0.39329
	95	0.24650	0.596	0.18726	0.30956
	120	0.19550	0.580	0.18223	0.26726
	150	0.15870	0.568	0.17853	0.23887
	185	0.12711	0.555	0.17428	0.21571
	240	0.09711	0.540	0.16955	0.19539
	300	0.07784	0.528	0.16596	0.18331
	400	0.06150	0.517	0.16234	0.17360
	500	0.04868	0.506	0.15909	0.16637
	630	0.03865	0.495	0.15557	0.16030
	800	0.03140	0.485	0.15249	0.15569
	1,000	0.02633	0.474	0.14892	0.15123

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2
Insulation : Cross-Linked polyethylene (XLPE)
Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue
Shield : Copper tape
Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_o/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line
Insulation shield layer : Semi-conducting covering remove at splices or terminals
Testing voltage : 63,000 Volts
Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1
***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	35	6	8.9	3.1	68	0.524	4,680	183	4,300	500/D
	50	6	8.0	3.2	67	0.387	4,010	218	4,500	500/D
	70	12	8.0	3.3	71	0.268	3,620	270	5,500	300/D
	95	15	8.0	3.4	75	0.193	3,260	328	6,500	300/D
	120	18	8.0	3.5	79	0.153	3,020	377	7,500	300/D
	150	18	8.0	3.6	82	0.124	2,820	428	8,500	300/D
	185	30	8.0	3.7	86	0.0991	2,620	491	10,000	300/D
	240	34	8.0	3.9	91	0.0754	2,370	579	12,000	300/D
	300	34	8.0	4.0	97	0.0601	2,190	664	14,000	300/D
	400	53	8.0	4.3	103	0.0470	2,000	767	17,000	200/D

* Remark : Special protection can be produced

D : Packing in drum

THWA

TIS 293-2541

750 V 70°C ALUMINIUM CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid and stranded hard drawn aluminium wires
Size 10 mm^2 up to 500 mm^2

Insulation : Polyvinyl chloride (PVC)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 750 Volts

Testing voltage : 2,500 Volts
Reference standard : TIS 293-2541, Table 1

APPLICATION

For aerial cable (Service & Main)

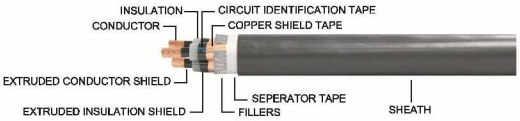
Nominal cross sectional area (mm²)	Number and diameter of wires (No./mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Breaking strength of conductor minimum (N)	continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
10	1/3.49	1.1	6.0	3.08	0.0078	1,562	52	50	500/C
10	7/1.32	1.1	6.5	3.08	0.0070	1,769	52	55	500/C
16	1/4.43	1.1	7.0	1.91	0.0064	2,445	70	70	500/C
16	7/1.68	1.1	7.6	1.91	0.0058	2,781	70	80	500/C
25	7/2.12	1.3	9.3	1.20	0.0055	4,241	95	120	300/C
35	7/2.49	1.3	10.5	0.868	0.0048	5,703	117	160	200/C
50	7/2.90	1.5	12.0	0.641	0.0047	7,423	143	210	200/C
50	19/1.76	1.5	12.5	0.641	0.0047	8,114	143	210	200/C
70	19/2.12	1.5	14.0	0.443	0.0040	11,487	185	280	100/C
95	19/2.49	1.7	16.5	0.320	0.0038	15,470	226	390	100/C
120	19/2.80	1.7	18.0	0.253	0.0035	18,810	264	470	500/D
120	37/2.01	1.7	18.0	0.253	0.0034	20,114	264	470	500/D
150	37/2.23	1.9	20.0	0.206	0.0035	24,704	302	600	500/D
185	37/2.50	2.1	22.0	0.164	0.0034	30,187	352	700	500/D
240	61/2.23	2.3	25.0	0.125	0.0033	38,568	421	900	500/D
300	61/2.49	2.5	28.0	0.100	0.0032	46,901	487	1,100	500/D
400	61/2.82	2.7	32.0	0.0778	0.0031	57,948	574	1,400	500/D
500	61/3.20	3.1	36.0	0.0605	0.0031	73,194	675	1,900	500/D

C : Packing in coil
D : Packing in drum

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_o/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 63,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	35	0.66830	0.464	0.14591	0.68404
	50	0.49370	0.427	0.13414	0.51160
	70	0.34200	0.403	0.12655	0.36466
	95	0.24661	0.381	0.11979	0.27416
	120	0.19570	0.367	0.11518	0.22708
	150	0.15890	0.355	0.11150	0.19412
	185	0.12740	0.343	0.10766	0.16680
	240	0.09745	0.328	0.10315	0.14190
	300	0.07850	0.317	0.09972	0.12691
	400	0.06240	0.307	0.09631	0.11476

THWA-C

TIS 293-2541

750 V 70°C COMPACTED ALUMINIUM CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Compact stranded hard drawn aluminium wires
Sizes 10 mm^2 up to 500 mm^2

Insulation : Polyvinyl chloride (PVC)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 750 Volts

Testing voltage : 2,500 Volts
Reference standard : TIS 293-2541, Table 2

APPLICATION

For aerial cable (Service & Main)

Nominal cross sectional area (mm^2)	Actual cross sectional area (mm^2)	Minimum number of wires (No.)	Compact conductor diameter approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20° C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Breaking strength of conductor minimum (N)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
10	9.64	6	3.72	1.1	6.3	3.08	0.0084	1,768	52	50	500/C
16	15.55	6	4.69	1.1	7.2	1.91	0.0068	2,734	69	75	500/C
25	24.75	6	5.90	1.3	8.8	1.20	0.0064	4,120	93	110	300/C
35	34.21	6	6.95	1.3	9.9	0.868	0.0056	5,591	115	150	300/C
50	46.32	6	8.01	1.5	11.5	0.641	0.0059	7,313	141	200	200/C
70	67.03	12	9.73	1.5	13.5	0.443	0.0050	10,420	178	270	100/C
95	92.79	15	11.40	1.7	15.5	0.320	0.0047	14,098	220	370	100/C
120	117.37	15	12.95	1.7	17.0	0.253	0.0042	18,518	258	460	100/C
150	144.15	15	14.27	1.9	18.5	0.206	0.0042	22,457	294	550	500/D
185	181.06	30	15.98	2.1	21.0	0.164	0.0042	28,974	342	700	500/D
240	237.55	30	18.47	2.3	24.0	0.125	0.0040	37,506	410	900	500/D
300	296.94	30	20.68	2.5	26.0	0.100	0.0038	45,642	475	1,100	500/D
400	381.67	53	23.39	2.7	30.0	0.0778	0.0036	56,992	560	1,400	500/D
500	490.81	53	26.67	3.1	34.0	0.0605	0.0037	72,195	659	1,800	500/D

C : Packing in coil
D : Packing in drum

ACSR

TIS 85-2548

ALUMINIUM CONDUCTOR STEEL REINFORCED

CABLE STRUCTURE

Conductor : Hard drawn aluminium wire
Sizes 16 mm^2 up to 680 mm^2

Steel Core : Galvanized steel (Zinc coated),solid and concentric stranded, sizes 2.5 mm^2 up to 85 mm^2

Stranding Direction
: The outermost layer Z

TECHNICAL DATA

Reference standard : TIS 85-2548

APPLICATION

For overhead transmission and distribution line

Nominal cross sectional area	ALUMINIUM		STEEL WIRE		Overall conductor diameter approx.	Conductor resistance at 20° C maximum	Breaking strength	Continuous current rating free air maximum	Cable weight approx.	Standard length
	Number and approx. diameter of wire	Cross sectional area	Number and approx. diameter of wire	Cross sectional area						
(mm^2)	(No./mm)	(mm^2)	(No./mm)	(mm^2)	(mm)	(Ω/km)	(kgf)	(A)	(kg/km)	(m)
16/2.5	6/1.80	15.3	1/1.80	2.54	5.40	1.880	592	90	60	4,000/D
25/4	6/2.25	23.9	1/2.25	3.98	6.75	1.203	916	125	95	4,000/D
35/6	6/2.70	34.4	1/2.70	5.73	8.10	0.8353	1,265	145	140	3,000/D
50/8	6/3.20	48.3	1/3.20	8.04	9.60	0.5947	1,716	170	200	3,000/D
50/30	12/2.33	51.2	7/2.33	29.85	11.50	0.5644	4,380	170	380	3,000/D
70/12	26/1.85	69.9	7/1.44	11.40	11.50	0.4131	2,676	290	280	3,000/D
95/15	26/2.15	94.4	7/1.67	15.33	13.50	0.3058	3,565	350	380	3,000/D
95/55	12/3.20	96.5	7/3.20	56.30	16.00	0.2993	7,965	350	700	3,000/D
120/20	26/2.44	121.6	7/1.90	19.85	15.50	0.2375	4,555	410	490	2,000/D
120/70	12/3.60	122.1	7/3.60	71.25	18.00	0.2365	10,034	410	900	2,000/D
125/30	30/2.33	127.9	7/2.33	29.85	16.00	0.2259	5,759	425	600	2,000/D
150/25	26/2.70	148.9	7/2.10	24.25	17.00	0.1939	5,513	470	600	2,000/D

D : Packing in drum

ACSR

TIS 85-2548

ALUMINIUM CONDUCTOR STEEL REINFORCED

GALVANIZED STEEL WIRE

HARD DRAWN ALUMINIUM WIRE

CABLE STRUCTURE

Conductor : Hard drawn aluminium wire
Sizes 16 mm^2 up to 680 mm^2

Steel Core : Galvanized steel (Zinc coated),solid and concentric stranded, sizes 2.5 mm^2 up to 85 mm^2

Stranding Direction
: The outermost layer Z

TECHNICAL DATA

Reference standard : TIS 85-2548

APPLICATION

For overhead transmission and distribution line

Nominal cross sectional area	ALUMINIUM		STEEL WIRE		Overall conductor diameter approx.	Conductor resistance at 20° C maximum	Breaking strength	Continuous current rating free air maximum	Cable weight approx.	Standard length
	Number and approx. diameter of wire	Cross sectional area	Number and approx. diameter of wire	Cross sectional area						
(mm^2)	(No./mm)	(mm^2)	(No./mm)	(mm^2)	(mm)	(Ω/km)	(kgf)	(A)	(kg/km)	(m)
170/40	30/2.70	171.8	7/2.70	40.08	18.50	0.1683	7,675	520	800	2,000/D
185/30	26/3.00	183.8	7/2.33	29.85	18.50	0.1571	6,618	535	750	2,000/D
210/35	26/3.20	209.1	7/2.49	34.09	20.00	0.1381	7,489	590	850	1,500/D
210/50	30/3.00	212.1	7/3.00	49.48	21.00	0.1363	9,390	610	1,000	1,500/D
230/10	24/3.50	230.9	7/2.33	29.85	21.00	0.1250	7,313	630	900	1,500/D
240/40	26/3.45	243.1	7/2.68	39.49	21.00	0.1188	8,640	645	1,000	1,500/D
265/35	24/3.74	263.7	7/2.49	34.10	22.00	0.1095	8,307	680	1,000	1,000/D
300/50	26/3.86	304.3	7/3.00	49.50	24.00	0.0949	10,702	740	1,200	1,000/D
305/40	54/2.68	304.6	7/2.68	39.50	24.00	0.0949	9,942	740	1,200	1,000/D
380/50	54/3.00	381.7	7/3.00	49.50	27.00	0.0758	12,312	840	1,500	1,000/D
435/55	54/3.20	434.3	7/3.20	56.30	28.00	0.0666	13,673	900	1,700	1,000/D
490/65	54/3.40	490.3	7/3.40	63.60	30.00	0.0590	15,343	960	1,900	1,000/D
550/70	54/3.60	549.7	7/3.60	71.30	32.00	0.0526	17,096	1,020	2,100	500/D
680/85	54/4.00	678.6	19/2.40	86.00	36.00	0.0426	12,040	1,150	2,600	500/D

D : Packing in drum

60227 IEC 01 THW

TIS 11 Part 3-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1.5 mm^2 up to 400 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 3-2553, Table 1

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1.5	1	0.7	2.6	3.2	12.1	0.011	21	21	100/C
1.5	2	0.7	2.7	3.3	12.1	0.010	21	22	100/C
2.5	1	0.8	3.2	3.9	7.41	0.010	29	32	100/C
2.5	2	0.8	3.3	4.0	7.41	0.009	29	35	100/C
4	1	0.8	3.6	4.4	4.61	0.0085	39	47	100/C
4	2	0.8	3.8	4.6	4.61	0.0077	39	50	100/C
6	1	0.8	4.1	5.0	3.08	0.0070	49	65	100/C
6	2	0.8	4.3	5.2	3.08	0.0065	49	70	100/C
10	1	1.0	5.3	6.4	1.83	0.0070	69	110	100/C
10	2	1.0	5.6	6.7	1.83	0.0065	69	120	100/C
16	2	1.0	6.4	7.8	1.15	0.0050	92	180	100/C
25	2	1.2	8.1	9.7	0.727	0.0050	125	280	100/C
35	2	1.2	9.0	10.9	0.524	0.0043	154	370	100/C
50	2	1.4	10.6	12.8	0.387	0.0043	188	500	500/D
70	2	1.4	12.1	14.6	0.268	0.0035	239	700	500/D
95	2	1.6	14.1	17.1	0.193	0.0035	297	1,000	500/D
120	2	1.6	15.6	18.8	0.153	0.0032	347	1,200	500/D
150	2	1.8	17.3	20.9	0.124	0.0032	398	1,500	500/D
185	2	2.0	19.3	23.3	0.0991	0.0032	461	1,900	500/D
240	2	2.2	22.0	26.6	0.0754	0.0032	552	2,500	500/D
300	2	2.4	24.5	29.6	0.0601	0.0030	640	3,100	500/D
400	2	2.6	27.5	33.2	0.0470	0.0028	749	3,900	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 01 THW

TIS 11 Part 3-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1.5 mm^2 up to 400 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 3-2553, Table 1

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Size mm^2	A.C. Resistance R (Ohm/km.)	Inductance L (mH/km.)	Reactance XL (Ohm/km.)	Impedance Z (Ohm/km.)
1.5(1)	14.5	0.53540	0.1682	14.5010
1.5(7)	14.5	0.52489	0.1649	14.5009
2.5(1)	8.87	0.50866	0.1598	8.8714
2.5(7)	8.87	0.50102	0.1574	8.8714
4(1)	5.52	0.49847	0.1566	5.5222
4(7)	5.52	0.48701	0.1530	5.5221
6(1)	3.69	0.47174	0.1482	3.6930
6(7)	3.69	0.47174	0.1482	3.6930
10(1)	2.19	0.47174	0.1461	2.1949
10(7)	2.19	0.46505	0.1461	2.1949
16	1.38	0.44786	0.1407	1.3872
25	0.861	0.44532	0.1399	0.8723
35	0.6271	0.43481	0.1366	0.6418
50	0.4633	0.43481	0.1366	0.4830
70	0.3210	0.42590	0.1338	0.3478
95	0.2314	0.42367	0.1331	0.2669
120	0.1837	0.41953	0.1318	0.2261
150	0.1492	0.41921	0.1317	0.1990
185	0.1196	0.41858	0.1315	0.1778
240	0.0915	0.41635	0.1308	0.1596
300	0.0736	0.41508	0.1304	0.1497
400	0.0583	0.41317	0.1298	0.1423

(_) : No of copper wire

60227 IEC 10 NYY

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey
or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	1.5	1	0.7	0.4	1.2	7.6	10.0	12.1	0.011	19	120	100/C
	1.5	2	0.7	0.4	1.2	7.8	10.5	12.1	0.010	19	130	100/C
	2.5	1	0.8	0.4	1.2	8.6	11.5	7.41	0.010	26	160	100/C
	2.5	2	0.8	0.4	1.2	9.0	12.0	7.41	0.009	26	180	100/C
	4	1	0.8	0.4	1.2	9.6	12.5	4.61	0.0085	34	210	100/C
	4	2	0.8	0.4	1.2	10.0	13.0	4.61	0.0077	34	220	100/C
	6	1	0.8	0.4	1.2	10.5	13.5	3.08	0.0070	44	270	100/C
	6	2	0.8	0.4	1.2	11.0	14.0	3.08	0.0065	44	190	100/C
	10	1	1.0	0.6	1.4	13.0	16.5	1.83	0.0070	60	420	500/D
	10	2	1.0	0.6	1.4	13.5	17.5	1.83	0.0065	60	460	500/D
	16	2	1.0	0.6	1.4	15.5	20.0	1.15	0.0052	80	650	500/D
	25	2	1.2	0.8	1.4	18.5	24.0	0.727	0.0050	107	950	500/D
	35	2	1.2	1.0	1.6	21.0	27.5	0.524	0.0044	131	1,300	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
2	1.5 (1)	14.47766	0.33715	0.10592	14.47805
	1.5 (7)	14.47766	0.32216	0.10121	14.47801
	2.5 (1)	8.86608	0.32386	0.10174	8.86666
	2.5 (7)	8.86608	0.31600	0.09928	8.86664
	4 (1)	5.51589	0.30370	0.09541	5.51672
	4 (7)	5.51589	0.29313	0.09209	5.51666
	6 (1)	3.68527	0.28640	0.08997	3.68636
	6 (7)	3.68527	0.27891	0.08762	3.68631
	10 (1)	2.18967	0.28221	0.08866	2.19147
	10 (7)	2.18968	0.27380	0.08602	2.19137
	16 (7)	1.37612	0.25760	0.08093	1.37850
	25 (7)	0.87009	0.25619	0.08048	0.87380
	35 (19)	0.62731	0.24617	0.07734	0.63206

( ) : No of copper wire

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey
or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	1.5	1	0.7	0.4	1.2	8.0	10.5	12.1	0.011	17	140	100/C
	1.5	2	0.7	0.4	1.2	8.2	11.0	12.1	0.010	17	150	100/C
	2.5	1	0.8	0.4	1.2	9.2	12.0	7.41	0.010	22	190	100/C
	2.5	2	0.8	0.4	1.2	9.4	12.5	7.41	0.009	22	210	100/C
	4	1	0.8	0.4	1.2	10.0	13.0	4.61	0.0085	29	250	100/C
	4	2	0.8	0.4	1.2	10.5	13.5	4.61	0.0077	29	270	100/C
	6	1	0.8	0.4	1.4	11.5	14.5	3.08	0.0070	37	340	100/C
	6	2	0.8	0.4	1.4	12.0	15.5	3.08	0.0065	37	370	100/C
	10	1	1.0	0.6	1.4	14.0	17.5	1.83	0.0070	52	520	500/D
	10	2	1.0	0.6	1.4	14.5	19.0	1.83	0.0065	52	570	500/D
	16	2	1.0	0.8	1.4	16.5	27.5	1.15	0.0052	69	810	500/D
	25	2	1.2	0.8	1.6	20.5	26.0	0.727	0.0050	92	1,200	500/D
	35	2	1.2	1.0	1.6	22.0	29.0	0.524	0.0040	113	1,600	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	1.5 (1)	14.47766	0.33715	0.10592	14.47805
	1.5 (7)	14.47766	0.32216	0.10121	14.47801
	2.5 (1)	8.86608	0.32386	0.10174	8.86666
	2.5 (7)	8.86608	0.31600	0.09928	8.86664
	4 (1)	5.51589	0.30370	0.09541	5.51672
	4 (7)	5.51589	0.29313	0.09209	5.51666
	6 (1)	3.68527	0.28640	0.08997	3.68636
	6 (7)	3.68527	0.27891	0.08762	3.68631
	10 (1)	2.18967	0.28221	0.08866	2.19147
	10 (7)	2.18968	0.27380	0.08602	2.19137
	16 (7)	1.37612	0.25760	0.08093	1.37850
	25 (7)	0.87009	0.25619	0.08048	0.87380
	35 (19)	0.62731	0.24617	0.07734	0.63206

(_) : No of copper wire

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard :TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
4	1.5	1	0.7	0.4	1.2	8.6	11.5	12.1	0.011	17	160	100/C
	1.5	2	0.7	0.4	1.2	9.0	12.0	12.1	0.010	17	180	100/C
	2.5	1	0.8	0.4	1.2	10.0	13.0	7.41	0.010	22	230	100/C
	2.5	2	0.8	0.4	1.2	10.0	13.5	7.41	0.009	22	250	100/C
	4	1	0.8	0.4	1.4	11.5	14.5	4.61	0.0085	29	320	100/C
	4	2	0.8	0.4	1.4	12.0	15.0	4.61	0.0077	29	340	100/C
	6	1	0.8	0.6	1.4	12.5	16.0	3.08	0.0070	37	440	500/D
	6	2	0.8	0.6	1.4	13.0	17.0	3.08	0.0065	37	470	500/D
	10	1	1.0	0.6	1.4	15.5	19.0	1.83	0.0070	52	660	500/D
	10	2	1.0	0.6	1.4	16.0	20.5	1.83	0.0065	52	700	500/D
	16	2	1.0	0.8	1.4	18.0	23.5	1.15	0.0052	69	1,000	500/D
	25	2	1.2	1.0	1.6	22.5	28.5	0.727	0.0050	92	1,600	500/D
	35	2	1.2	1.0	1.6	24.5	32.0	0.524	0.0044	113	2,000	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores: Blue and Brown
3 Cores: Brown, Black and Grey
or Blue, Brown and Green/Yellow
4 Cores: Blue, Brown, Black and Grey
or Brown, Black, Grey and Green/Yellow
5 Cores: Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard :TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
4	1.5 (1)	14.47766	0.37758	0.11862	14.47814
	1.5 (7)	14.47766	0.36259	0.11391	14.47811
	2.5 (1)	8.86608	0.36428	0.11444	8.86682
	2.5 (7)	8.86608	0.35643	0.11198	8.86679
	4 (1)	5.51589	0.34413	0.10811	5.51695
	4 (7)	5.51589	0.33356	0.10479	5.51689
	6 (1)	3.68526	0.32682	0.10267	3.68669
	6 (7)	3.68526	0.31933	0.10032	3.68662
	10 (1)	2.18966	0.32263	0.10136	2.19201
	10 (7)	2.18966	0.31422	0.09872	2.19189
	16 (7)	1.37609	0.29802	0.09363	1.37927
	25 (7)	0.87004	0.29662	0.09318	0.87502
	35 (19)	0.62724	0.28659	0.09004	0.63367

( ) : No of copper wire

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
5	1.5	1	0.7	0.7	1.2	9.4	12.0	12.1	0.011	17	200	100/C
	1.5	2	0.7	0.7	1.2	9.8	12.5	12.1	0.010	17	220	100/C
	2.5	1	0.8	0.8	1.2	11.0	14.0	7.41	0.010	22	280	100/C
	2.5	2	0.8	0.8	1.2	11.0	14.5	7.41	0.009	22	310	100/C
	4	1	0.8	0.8	1.4	12.5	16.0	4.61	0.0085	29	410	100/C
	4	2	0.8	0.8	1.4	13.0	17.0	4.61	0.0077	29	430	100/C
	6	1	0.8	0.8	1.4	13.5	17.5	3.08	0.0070	37	530	500/D
	6	2	0.8	0.8	1.4	14.5	18.5	3.08	0.0065	37	570	500/D
	10	1	1.0	1.0	1.4	17.0	21.0	1.83	0.0070	52	800	500/D
	10	2	1.0	1.0	1.4	17.5	22.0	1.83	0.0065	52	870	500/D
	16	2	1.0	1.0	1.6	20.5	26.0	1.15	0.0052	69	1,300	500/D
	25	2	1.2	1.2	1.6	24.5	31.5	0.727	0.0050	92	1,900	500/D
	35	2	1.2	1.2	1.6	27.0	35.0	0.524	0.0044	113	2,500	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70ºC
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross section area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
5	1.5 (1)	14.47766	0.37758	0.11862	14.47814
	1.5 (7)	14.47766	0.36259	0.11391	14.47811
	2.5 (1)	8.86608	0.36428	0.11444	8.86682
	2.5 (7)	8.86608	0.35643	0.11198	8.86679
	4 (1)	5.51589	0.34413	0.10811	5.51695
	4 (7)	5.51589	0.33356	0.10479	5.51689
	6 (1)	3.68526	0.32682	0.10267	3.68669
	6 (7)	3.68526	0.31933	0.10032	3.68662
	10 (1)	2.18966	0.32263	0.10136	2.19201
	10 (7)	2.18966	0.31422	0.09872	2.19189
	16 (7)	1.37609	0.29802	0.09363	1.37927
	25 (7)	0.87004	0.29662	0.09318	0.87502
	35 (19)	0.62724	0.28659	0.09004	0.63367

( ) : No of copper wire

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 3

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area	Class of conductor	Insulation thickness nominal	Outer sheath thickness nominal	Overall diameter diameter maximum	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	Continuous current rating maximum		Cable weight approx.	Standard length
								Free air at 40 °C	Under ground at 30 °C		
	(mm²)		(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(A)	(kg/km)	(m)
1	1	1	1.5	1.8	8.6	18.1	0.0207	19	25	80	100/C
	1	2	1.5	1.8	8.8	18.1	0.0200	19	25	80	100/C
	1.5	1	1.5	1.8	9.0	12.1	0.0184	24	31	85	100/C
	1.5	2	1.5	1.8	9.2	12.1	0.0175	24	31	90	100/C
	2.5	1	1.5	1.8	9.4	7.41	0.0157	32	41	100	100/C
	2.5	2	1.5	1.8	9.8	7.41	0.0146	32	41	110	100/C
	4	1	1.5	1.8	10.0	4.61	0.0135	43	53	120	100/C
	4	2	1.5	1.8	10.5	4.61	0.0124	43	53	130	100/C
	6	2	1.5	1.8	11.0	3.08	0.0107	54	68	160	100/C
	10	2	1.5	1.8	12.0	1.83	0.0088	73	79	210	500/D
	16	2	1.5	1.8	13.0	1.15	0.0074	97	118	280	500/D
	25	2	1.5	1.8	14.5	0.727	0.0061	129	153	390	500/D
	35	2	1.5	1.8	16.0	0.524	0.0053	159	185	490	500/D
	50	2	1.5	1.8	17.0	0.387	0.0046	191	220	620	500/D
	70	2	1.5	1.8	19.0	0.268	0.0039	241	271	850	500/D
	95	2	1.7	1.8	21.5	0.193	0.0038	297	326	1,100	500/D
	120	2	1.7	1.8	23.0	0.153	0.0034	345	372	1,400	500/D
	150	2	1.9	2.0	26.0	0.124	0.0034	397	418	1,700	500/D
	185	2	2.1	2.0	28.0	0.0991	0.0034	456	473	2,100	500/D
	240	2	2.3	2.2	31.5	0.0754	0.0033	541	549	2,700	500/D
	300	2	2.5	2.2	35.0	0.0601	0.0032	628	624	3,400	500/D
	400	2	2.7	2.2	38.5	0.0470	0.0030	733	713	4,300	500/D
	500	2	3.1	2.4	43.0	0.0366	0.0031	848	810	5,400	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core Identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 3

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1 (1)	21.6987	0.770	0.24186	21.70000
	1 (7)	21.6987	0.758	0.23808	21.70000
	1.5 (1)	14.4982	0.735	0.23082	14.50000
	1.5 (7)	14.4982	0.720	0.22632	14.50000
	2.5 (1)	8.8703	0.693	0.21775	8.87300
	2.5 (7)	8.8705	0.675	0.21222	8.87300
	4 (1)	5.5201	0.657	0.20650	5.52400
	4 (7)	5.5204	0.639	0.20063	5.52400
	6	3.6900	0.610	0.19176	3.69500
	10	2.1896	0.575	0.18068	2.19700
	16	1.3804	0.546	0.17162	1.39100
	25	0.8610	0.522	0.16403	0.87649
	35	0.6271	0.504	0.15837	0.64679
	50	0.4633	0.490	0.15379	0.48816
	70	0.3210	0.474	0.14896	0.35388
	95	0.2314	0.466	0.14636	0.27380
	120	0.1836	0.458	0.14393	0.23329
	150	0.1491	0.458	0.14380	0.20715
	185	0.1195	0.453	0.14243	0.18592
	240	0.0914	0.450	0.14140	0.16837
	300	0.0734	0.445	0.13994	0.15802
	400	0.0582	0.441	0.13846	0.15018
	500	0.0462	0.411	0.13844	0.14595

(_) : No of copper wire

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core: Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 4

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area	Class of conductor	Insulation thickness nominal	Inner sheath thickness nominal	Outer sheath thickness nominal	Overall diameter maximum	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	Continuous current rating maximum		Cable weight approx.	Standard length
									Free air at 40 °C	Under ground at 30 °C		
	(mm²)		(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(A)	(kg/km)	(m)
2	50	2	1.5	1.2	2.2	33.5	0.387	0.0046	160	195	1,800	500/D
	70	2	1.5	1.5	2.2	38.0	0.268	0.0039	200	239	2,400	500/D
	95	2	1.7	1.5	2.2	42.5	0.193	0.0038	245	288	3,200	500/D
	120	2	1.7	1.5	2.4	46.5	0.153	0.0034	285	329	3,900	500/D
	150	2	1.9	1.8	2.6	52.0	0.124	0.0034	325	368	4,800	500/D
	185	2	2.1	1.8	2.8	57.0	0.0991	0.0034	374	417	6,000	500/D
	240	2	2.3	2.0	3.0	64.0	0.0754	0.0033	440	481	7,500	300/D
	300	2	2.5	2.0	3.2	70.5	0.0601	0.0032	505	541	9,500	300/D

Class of conductor 2 : Strand D : Packing in drum

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
2	50	0.4635	0.250	0.07856	0.47011
	70	0.3214	0.241	0.07570	0.33019
	95	0.2319	0.239	0.07505	0.24374
	120	0.1843	0.235	0.07376	0.19851
	150	0.1499	0.234	0.07364	0.16701
	185	0.1205	0.234	0.07342	0.14111
	240	0.0928	0.232	0.07275	0.11793
	300	0.0752	0.230	0.07228	0.10427

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core Identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 4

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum Free air at 40 °C (A)	Continuous current rating maximum Under ground at 30 °C (A)	Cable weight approx. (kg/km)	Standard length (m)
3	50	2	1.5	1.2	2.2	36.0	0.387	0.0046	136	164	1,800	500/D
	70	2	1.5	1.5	2.2	40.5	0.268	0.0039	174	205	2,400	500/D
	95	2	1.7	1.5	2.2	46.0	0.193	0.0038	213	245	3,200	500/D
	120	2	1.7	1.5	2.4	50.5	0.153	0.0034	247	279	3,900	500/D
	150	2	1.9	1.8	2.6	56.0	0.124	0.0034	284	315	4,800	500/D
	185	2	2.1	1.8	2.8	61.5	0.0991	0.0034	325	355	6,000	300/D
	240	2	2.3	2.0	3.0	69.0	0.0754	0.0033	384	411	7,500	300/D
	300	2	2.5	2.0	3.2	76.0	0.0601	0.0032	438	462	9,500	200/D

Class of conductor 2 : Strand D : Packing in drum

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	50	0.4635	0.25000	0.07856	0.47011
	70	0.3214	0.24100	0.07570	0.33019
	95	0.2319	0.23900	0.07505	0.24374
	120	0.1843	0.23500	0.07376	0.19851
	150	0.1499	0.23400	0.07364	0.16701
	185	0.1205	0.23400	0.07342	0.14111
	240	0.0928	0.23200	0.07275	0.11793
	300	0.0752	0.23000	0.07228	0.10427

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 4

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum Free air at 40 °C (A)	Continuous current rating maximum Under ground at 30 °C (A)	Cable weight approx. (kg/km)	Standard length (m)
4	50	2	1.5	1.5	2.2	39.5	0.387	0.0046	136	164	2,900	500/D
	70	2	1.5	1.5	2.4	44.5	0.268	0.0039	174	205	3,900	500/D
	95	2	1.7	1.8	2.6	51.5	0.193	0.0038	213	245	5,500	500/D
	120	2	1.7	1.8	2.8	56.0	0.153	0.0034	247	279	6,500	500/D
	150	2	1.9	2.0	3.0	62.0	0.124	0.0034	284	315	8,000	300/D
	185	2	2.1	2.0	3.2	68.0	0.0991	0.0034	325	355	10,000	300/D
	240	2	2.3	2.2	3.4	76.5	0.0754	0.0033	384	411	13,000	200/D
	300	2	2.5	2.2	3.8	85.0	0.0601	0.0032	438	462	16,000	200/D

Class of conductor 2 : Strand

D : Packing in drum

Number of core	Nominal cross sectional cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
4	50	0.4634	0.29700	0.09321	0.47268
	70	0.3213	0.28800	0.09035	0.33376
	95	0.2318	0.28600	0.08970	0.24855
	120	0.1842	0.28100	0.08842	0.20432
	150	0.1497	0.28100	0.08828	0.17379
	185	0.1203	0.28000	0.08809	0.14910
	240	0.0924	0.27800	0.08740	0.12722
	300	0.0747	0.27700	0.08694	0.11463

NYY-G

TIS 11 Part 101-2553

450/750 V 70°C STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED WITH GROUND

CABLE STRUCTURE

Conductor : Stranded annealed copper
: 2 cores up to 4 cores with ground
: Size 25 mm^2 up to 300 mm^2
Ground Wire : Stranded annealed copper,
: Size 16 mm^2 up to 150 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : : Brown, Black and Grey
4 Cores : : Blue, Brown, Black and Grey
Ground wire : Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 5

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum		Cable weight approx. (kg/km)	Standard length (m)
									Free air (A)	Under ground (A)		
2+G	25	2	1.3	1.2	2.0	28.0	0.727	0.0054	108	136	1,200	500/D
	16 (G)	2	1.1				1.15					
	35	2	1.3	1.2	2.0	30.0	0.524	0.0047	132	165	1,500	500/D
	16 (G)	2	1.1				1.15					
	50	2	1.5	1.2	2.2	34.0	0.387	0.0046	160	195	2,000	500/D
	25 (G)	2	1.3				0.727					
	70	2	1.5	1.5	2.2	38.5	0.268	0.0039	200	239	2,700	500/D
	35 (G)	2	1.3				0.524					
	95	2	1.7	1.5	2.2	43.5	0.193	0.0038	245	288	3,600	500/D
	50 (G)	2	1.5				0.387					
	120	2	1.7	1.5	2.4	47.5	0.153	0.0034	285	329	4,500	500/D
	70 (G)	2	1.5				0.268					
	150	2	1.9	1.8	2.6	53.0	0.124	0.0034	325	368	5,500	500/D
	95 (G)	2	1.7				0.193					
	185	2	2.1	1.8	2.8	57.5	0.0991	0.0034	374	417	6,500	500/D
	95 (G)	2	1.7				0.193					
	240	2	2.3	2.0	3.0	64.5	0.0754	0.0033	440	481	8,500	500/D
	120 (G)	2	1.7				0.153					
	300	2	2.5	2.0	3.2	71.0	0.0601	0.0032	505	541	10,500	300/D
	150 (G)	2	1.9				0.124					

Class of conductor 2 : Strand G : Ground conductor D : Packing in drum

NYY-G

TIS 11 Part 101-2553

450/750 V 70°C STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED WITH GROUND

CABLE STRUCTURE

Conductor : Stranded annealed copper
: 2 cores up to 4 cores with ground
: Size 25 mm^2 up to 300 mm^2
Ground Wire : Stranded annealed copper,
: Size 16 mm^2 up to 150 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : : Brown, Black and Grey
4 Cores : : Blue, Brown, Black and Grey
Ground wire : Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 5

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum		Cable weight approx. (kg/km)	Standard length (m)
									Free air (A)	Under ground (A)		
3+G	25	2	1.3	1.2	2.0	30.5	0.727	0.0054	94	117	1,500	500/D
	16 (G)	2	1.1				1.15					
	35	2	1.3	1.2	2.0	33.0	0.524	0.0047	115	141	1,900	500/D
	16 (G)	2	1.1				1.15					
	50	2	1.5	1.5	2.2	38.5	0.387	0.0046	136	164	2,600	500/D
	25 (G)	2	1.3				0.727					
	70	2	1.5	1.5	2.2	42.5	0.268	0.0039	174	205	3,500	500/D
	35 (G)	2	1.3				0.524					
	95	2	1.7	1.5	2.4	48.5	0.193	0.0038	213	245	4,700	500/D
	50 (G)	2	1.5				0.387					
	120	2	1.7	1.8	2.6	53.5	0.153	0.0034	247	279	6,000	500/D
	70 (G)	2	1.5				0.268					
	150	2	1.9	1.8	2.8	59.0	0.124	0.0034	284	315	7,500	500/D
	95 (G)	2	1.7				0.193					
	185	2	2.1	2.0	3.0	64.5	0.0991	0.0034	325	355	9,000	500/D
	95 (G)	2	1.7				0.193					
	240	2	2.3	2.0	3.2	72.0	0.0754	0.0033	384	411	11,500	300/D
	120 (G)	2	1.7				0.153					
	300	2	2.5	2.2	3.4	79.5	0.0601	0.0032	438	462	14,000	300/D
	150 (G)	2	1.9				0.124					

Class of conductor 2 : Strand G : Ground conductor D : Packing in drum

NYY-G

TIS 11 Part 101-2553

450/750 V 70°C STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED WITH GROUND

CABLE STRUCTURE

Conductor : Stranded annealed copper
: 2 cores up to 4 cores with ground
: Size 25 mm^2 up to 300 mm^2
Ground Wire : Stranded annealed copper,
: Size 16 mm^2 up to 150 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : : Brown, Black and Grey
4 Cores : : Blue, Brown, Black and Grey
Ground wire : Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 5

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum		Cable weight approx. (kg/km)	Standard length (m)
									Free air (A)	Under ground (A)		
4+G	25	2	1.3	1.2	2.0	34.0	0.727	0.0054	94	117	1,900	500/D
	16 (G)	2	1.1				1.15					
	35	2	1.3	1.5	2.2	39.0	0.524	0.0047	115	141	2,400	500/D
	16 (G)	2	1.1				1.15					
	50	2	1.5	1.5	2.2	43.5	0.387	0.0046	136	164	3,300	500/D
	25 (G)	2	1.3				0.727					
	70	2	1.5	1.5	2.4	49.0	0.268	0.0039	174	205	4,500	500/D
	35 (G)	2	1.3				0.524					
	95	2	1.7	1.8	2.6	56.5	0.193	0.0038	213	245	6,100	500/D
	50 (G)	2	1.5				0.387					
	120	2	1.7	1.8	2.8	61.5	0.153	0.0034	247	279	7,500	500/D
	70 (G)	2	1.5				0.268					
	150	2	1.9	2.0	3.0	68.0	0.124	0.0034	284	315	9,500	300/D
	95 (G)	2	1.7				0.193					
	185	2	2.1	2.0	3.2	75.0	0.0991	0.0034	325	355	11,500	300/D
	95 (G)	2	1.7				0.193					
	240	2	2.3	2.2	3.4	84.5	0.0754	0.0033	384	411	14,500	300/D
	120 (G)	2	1.7				0.153					
	300	2	2.5	2.2	3.8	93.5	0.0601	0.0032	438	462	18,000	200/D
	150 (G)	2	1.9				0.124					

Class of conductor 2 : Strand G : Ground conductor D : Packing in drum

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-core : Sizes 4 mm² up to 35 mm²
Multi-cores : Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core Identification

Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	4	5	0.9	1.4	8.6	4.95	0.0084	41	90	100/C
	6	5	0.9	1.4	9.4	3.30	0.0071	53	120	100/C
	10	5	1.1	1.8	12.0	1.91	0.0068	74	210	100/C
	16	5	1.1	1.8	13.5	1.21	0.0050	99	270	100/C
	25	5	1.3	2.2	16.0	0.780	0.0048	129	410	100/C
	35	5	1.3	2.2	17.5	0.554	0.0041	160	550	500/D
2	4	5	0.9	1.6	14.5	4.95	0.0084	34	230	100/C
	6	5	0.9	1.6	16.0	3.30	0.0071	44	320	100/C
	10	5	1.1	1.8	20.0	1.91	0.0068	63	500	500/D
	16	5	1.1	2.2	23.0	1.21	0.0050	82	700	500/D
	25	5	1.3	2.4	27.5	0.780	0.0048	108	1,000	500/D
	35	5	1.3	2.6	31.0	0.554	0.0041	133	1,400	500/D

Class of conductor 5 : Flexible

C : Packing in coil
D : Packing in drum

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-core : Sizes 4 mm² up to 35 mm²
Multi-cores : Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	4	5.9200	0.58267	0.18305	5.9228
	6	3.9500	0.54956	0.17265	3.9538
	10	2.2900	0.54230	0.17037	2.2963
	16	1.4500	0.52085	0.16363	1.4592
	25	0.9334	0.51783	0.16268	0.9475
	35	0.6630	0.49968	0.15698	0.6813
2	4	5.9200	0.29835	0.09373	5.9207
	6	3.9500	0.27741	0.08715	3.9510
	10	2.2900	0.29736	0.08474	2.4418
	16	1.4520	0.25745	0.08088	1.4543
	25	0.9369	0.25468	0.08001	0.9403
	35	0.6677	0.24497	0.07696	0.6721

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-core : Sizes 4 mm² up to 35 mm²
Multi-cores : Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification

Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	4	5	0.9	1.6	15.5	4.95	0.0084	29	280	100/C
	6	5	0.9	1.8	17.5	3.30	0.0071	38	390	100/C
	10	5	1.1	2.0	21.5	1.91	0.0068	53	650	500/D
	16	5	1.1	2.4	25.0	1.21	0.0050	71	900	500/D
	25	5	1.3	2.6	30.0	0.780	0.0048	94	1,300	500/D
	35	5	1.3	2.8	33.5	0.554	0.0041	116	1,700	500/D
4	4	5	0.9	1.8	17.0	4.95	0.0084	29	350	100/C
	6	5	0.9	2.0	19.5	3.30	0.0071	38	490	100/C
	10	5	1.1	2.2	24.0	1.91	0.0068	53	800	500/D
	16	5	1.1	2.6	28.0	1.21	0.0050	71	1,100	500/D
	25	5	1.3	2.8	33.0	0.780	0.0048	94	1,700	500/D
	35	5	1.3	3.1	37.0	0.554	0.0041	116	2,200	500/D

Class of conductor 5 : Flexible

C : Packing in coil
D : Packing in drum

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-c : Sizes 4 mm² up to 35 mm²
Multi-cor: Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification
Single-co : Black
2 Cores : Brown and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	4	5.9200	0.29835	0.09373	5.9207
	6	3.9500	0.27741	0.08715	3.9510
	10	2.2900	0.26977	0.08475	2.2916
	16	1.4500	0.25745	0.08088	1.4523
	25	0.9335	0.25468	0.08001	0.9369
	35	0.6632	0.24497	0.07696	0.6677
4	4	5.9200	0.34495	0.10837	5.9210
	6	3.9500	0.32410	0.10182	3.9513
	10	2.2900	0.31624	0.09935	2.2922
	16	1.4500	0.30417	0.09556	1.7366
	25	0.9335	0.30171	0.09469	0.9383
	35	0.6631	0.29062	0.09130	0.6694

VCT-G

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 35 mm²
Ground wire : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 16 mm²
Insulation : Polyvinyl chloride (PVC/D)
Core identification
2 Cores : Blue and Brown
3 Cores : Blue,Brown and Grey
4 Cores : Blue,Brown,Black and Grey
Ground core : Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line
Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 8

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2+G	4	5	0.9	1.6	15.5	4.95	0.0084	34	280	100/C
	4 (G)	5	0.9			4.95				
	6	5	0.9	1.8	17.5	3.30	0.0071	44	400	100/C
	6 (G)	5	0.9			3.30				
	10	5	1.1	2.0	21.5	1.91	0.0068	63	650	500/D
	10 (G)	5	1.1			1.91				
	16	5	1.1	2.4	25.0	1.21	0.0050	82	900	500/D
	16 (G)	5	1.1			1.21				
	25	5	1.3	2.6	28.5	0.780	0.0048	108	1,200	500/D
	16 (G)	5	1.1			1.21				
	35	5	1.3	2.8	31.5	0.554	0.0041	133	1,500	500/D
	16 (G)	5	1.1			1.21				

Class of conductor 5 : Flexible

G : Ground conductor

C : Packing in coil
D : Packing in drum

VCT-G

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 35 mm²
Ground wire : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 16 mm²
Insulation : Polyvinyl chloride (PVC/D)
Core identification
2 Cores : Blue and Brown
3 Cores : Blue,Brown and Grey
4 Cores : Blue,Brown,Black and Grey
Ground core : Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line
Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 8

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3+G	4	5	0.9	1.8	17.0	4.95	0.0084	29	360	100/C
	4 (G)	5	0.9			4.95				
	6	5	0.9	2.0	19.5	3.30	0.0071	38	500	100/C
	6 (G)	5	0.9			3.30				
	10	5	1.1	2.2	24.0	1.91	0.0068	53	800	500/D
	10 (G)	5	1.1			1.91				
	16	5	1.1	2.6	28.0	1.21	0.0050	71	1,200	500/D
	16 (G)	5	1.1			1.21				
	25	5	1.3	2.8	33.0	0.780	0.0048	94	1,600	500/D
	16 (G)	5	1.1			1.21				
	35	5	1.3	3.1	37.0	0.554	0.0041	118	2,100	500/D
	16 (G)	5	1.1			1.21				

Class of conductor 5 : Flexible

G : Ground conductor

C : Packing in coil
D : Packing in drum

VCT-G

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 35 mm²

Ground wire : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 16 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification
2 Cores : Blue and Brown
3 Cores : Blue,Brown and Grey
4 Cores : Blue,Brown,Black and Grey
Ground core : Green/Yellow

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification: Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 8

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
4+G	4	5	0.9	1.8	18.5	4.95	0.0084	29	440	100/C
	4 (G)	5	0.9			4.95				
	6	5	0.9	2.0	21.5	3.30	0.0071	38	600	500/D
	6 (G)	5	0.9			3.30				
	10	5	1.1	2.2	26.5	1.91	0.0068	53	1,000	500/D
	10 (G)	5	1.1			1.91				
	16	5	1.1	2.6	30.5	1.21	0.0050	71	1,400	500/D
	16 (G)	5	1.1			1.21				
	25	5	1.3	2.8	36.5	0.780	0.0048	94	2,000	500/D
	16 (G)	5	1.1			1.21				
	35	5	1.3	3.1	41.5	0.554	0.0041	116	2,600	500/D
	16 (G)	5	1.1			1.21				

Class of conductor 5 : Flexible

G : Ground conductor

C : Packing in coil
D : Packing in drum

500V-NYY-SWA

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 1.5 mm^2 up to 35 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core Identification

2 Cores : Blue and Brown

3 Cores : Brown, Black and Grey

4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification :Maximum conductor temperature 70°C
:Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
	1.5	1/1.38	0.7	0.4	0.8	1.8	12.5	12.1	0.011	29	300	500/D
	1.5	7/0.53	0.7	0.4	0.8	1.8	13.0	12.1	0.010	29	310	500/D
	2.5	1/1.78	0.8	0.4	0.8	1.8	14.0	7.41	0.010	38	320	500/D
	2.5	7/0.67	0.8	0.4	0.8	1.8	14.5	7.41	0.009	38	340	500/D
	4	1/2.25	0.8	0.4	0.8	1.8	15.0	4.61	0.0085	50	370	500/D
2	4	7/0.85	0.8	0.4	0.8	1.8	15.5	4.61	0.0077	50	400	500/D
	6	7/1.04	0.8	0.4	0.8	1.8	17.5	3.08	0.0065	63	600	500/D
	10	7/1.35	1.0	0.6	1.25	1.8	21.0	1.83	0.0065	84	950	500/D
	16	7/1.70	1.0	0.6	1.6	1.8	24.0	1.15	0.0052	109	1,300	500/D
	25	7/2.14	1.2	0.8	1.6	1.8	28.0	0.727	0.0050	141	2,000	500/D
	35	19/1.53	1.2	1.0	2.0	1.9	31.0	0.524	0.0044	169	2,400	500/D

D : Packing in drum

500V-NYY-SWA

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 1.5 mm^2 up to 35 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

3 Cores : Brown, Black and Grey

4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	1.5	1/1.38	0.7	0.4	0.8	1.8	13.0	12.1	0.011	25	330	500/D
	1.5	7/0.53	0.7	0.4	0.8	1.8	13.5	12.1	0.010	25	340	500/D
	2.5	1/1.78	0.8	0.4	0.8	1.8	14.5	7.41	0.010	33	350	500/D
	2.5	7/0.67	0.8	0.4	0.8	1.8	15.0	7.41	0.009	33	380	500/D
	4	1/2.25	0.8	0.4	0.8	1.8	15.5	4.61	0.0085	43	420	500/D
	4	7/0.85	0.8	0.4	0.8	1.8	16.0	4.61	0.0077	43	450	500/D
	6	7/1.04	0.8	0.4	1.25	1.8	18.5	3.08	0.0065	54	700	500/D
	10	7/1.35	1.0	0.6	1.25	1.8	22.0	1.83	0.0065	71	1,200	500/D
	16	7/1.70	1.0	0.8	1.6	1.8	25.0	1.15	0.0052	93	1,600	500/D
	25	7/2.14	1.2	0.8	2.0	1.9	30.0	0.727	0.0050	120	2,300	500/D
	35	19/1.53	1.2	1.0	2.0	2.0	33.0	0.524	0.0044	144	2,800	500/D

D : Packing in drum

500V-NYY-SWA

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 1.5 mm^2 up to 35 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request
Armor : Galvanized Steel Wires
Inner Sheath : Black polyvinyl chloride (PVC)
Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
4	1.5	1/1.38	0.7	0.4	0.8	1.8	13.5	12.1	0.011	25	360	500/D
	1.5	7/0.53	0.7	0.4	0.8	1.8	14.0	12.1	0.010	25	380	500/D
	2.5	1/1.78	0.8	0.4	0.8	1.8	15.5	7.41	0.010	33	400	500/D
	2.5	7/0.67	0.8	0.4	0.8	1.8	16.0	7.41	0.009	33	420	500/D
	4	1/2.25	0.8	0.4	1.25	1.8	17.5	4.61	0.0085	43	480	500/D
	4	7/0.85	0.8	0.4	1.25	1.8	18.5	4.61	0.0077	43	650	500/D
	6	7/1.04	0.8	0.6	1.25	1.8	20.0	3.08	0.0065	54	800	500/D
	10	7/1.35	1.0	0.6	1.6	1.8	24.0	1.83	0.0065	71	1,400	500/D
	16	7/1.70	1.0	0.8	1.6	1.8	27.0	1.15	0.0052	93	1,800	500/D
	25	7/2.14	1.2	1.0	2.0	2.0	33.0	0.727	0.0050	120	2,800	500/D
	35	19/1.53	1.2	1.0	2.0	2.1	36.0	0.524	0.0044	144	3,500	500/D

D : Packing in drum

60227 IEC 02 THW (f)

TIS 11 Part 3-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Size 1.5 mm^2 up to 240 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core Identification
Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 3-2553, Table 3

APPLICATION

For indoor fixed installations in dry locations, for electrical panels connection or for electrical apparatus

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1.5	5	0.7	2.8	3.4	13.3	0.010	21	24	100/C
2.5	5	0.8	3.4	4.1	7.98	0.009	28	37	100/C
4	5	0.8	3.9	4.8	4.95	0.007	38	54	100/C
6	5	0.8	4.4	5.3	3.30	0.0060	48	75	100/C
10	5	1.0	5.7	6.8	1.91	0.0056	69	130	100/C
16	5	1.0	6.7	8.1	1.21	0.0046	92	185	100/C
25	5	1.2	8.4	10.2	0.780	0.0044	123	285	100/C
35	5	1.2	9.7	11.7	0.554	0.0038	154	400	100/C
50	5	1.4	11.5	13.9	0.386	0.0037	196	555	500/D
70	5	1.4	13.2	16.0	0.272	0.0032	247	765	500/D
95	5	1.6	15.1	18.2	0.206	0.0032	296	1,000	500/D
120	5	1.6	16.7	20.2	0.161	0.0029	350	1,300	500/D
150	5	1.8	18.6	22.5	0.129	0.0029	405	1,600	500/D
185	5	2.0	20.6	24.9	0.106	0.0029	461	1,900	500/D
240	5	2.2	23.5	28.4	0.0801	0.0028	554	2,500	500/D

Class of conductor 5 : Flexible

C : Packing in coil
D : Packing in drum

NYY-SWA

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 50 mm^2 up to 300 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

3 Cores : Brown, Black and Grey

4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	50	19/1.78	1.5	1.2	2.0	2.1	36.0	0.387	0.0046	199	3,000	500/D
	70	19/2.14	1.5	1.5	2.0	2.2	41.0	0.268	0.0039	244	4,000	500/D
	95	19/2.52	1.7	1.5	2.5	2.4	47.0	0.193	0.0038	292	5,000	500/D
	120	37/2.03	1.7	1.5	2.5	2.6	51.0	0.153	0.0034	334	6,000	500/D
	150	37/2.25	1.9	1.8	2.5	2.7	56.0	0.124	0.0034	373	7,000	500/D
	185	37/2.52	2.1	1.8	2.5	2.9	61.0	0.099	0.0034	420	8,500	300/D
	240	61/2.25	2.3	2.0	2.5	3.1	68.0	0.075	0.0033	483	10,500	300/D
	300	61/2.52	2.5	2.0	3.15	3.4	76.0	0.0601	0.0032	538	13,500	200/D

D : Packing in drum

60227 IEC 05 IV

TIS 11 Part 3-2553

300/500 V 70°C SOLID CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid annealed copper,
Size 0.5 mm^2 up to 1 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification
Single core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 3-2553, Table 5

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	1	0.6	1.9	2.3	36.0	0.015	11	8.8	100/C
0.75	1	0.6	2.1	2.5	24.5	0.012	14	12.0	100/C
1	1	0.6	2.2	2.7	18.1	0.011	16	14.0	100/C

Class of conductor 1 : Solid

C : Packing in coil

NYY-SWA

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 50 mm^2 up to 300 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	50	19/1.78	1.5	1.5	2.0	2.2	39.0	0.387	0.0046	168	3,600	500/D
	70	19/2.14	1.5	1.5	2.0	2.3	43.0	0.268	0.0039	209	4,600	500/D
	95	19/2.52	1.7	1.5	2.5	2.5	50.0	0.193	0.0038	248	6,500	500/D
	120	37/2.03	1.7	1.8	2.5	2.7	55.0	0.153	0.0034	283	7,500	300/D
	150	37/2.25	1.9	1.8	2.5	2.8	59.0	0.124	0.0034	310	9,000	300/D
	185	37/2.52	2.1	2.0	2.5	3.0	65.0	0.0991	0.0034	357	10,500	300/D
	240	61/2.25	2.3	2.0	2.5	3.3	73.0	0.0754	0.0033	427	13,000	200/D
	300	61/2.52	2.5	2.2	3.15	3.5	81.0	0.0601	0.0032	453	17,000	200/D

D : Packing in drum

60227 IEC 06 IV (f)

TIS 11 Part 3-2553

300/500 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Size 0.5 mm^2 up to 1 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 3-2553, Table 7

APPLICATION

For indoor fixed installations in dry locations, for electrical panels connection or for electrical apparatus

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	5	0.6	2.1	2.5	39.0	0.013	11	9	100/C
0.75	5	0.6	2.2	2.7	26.0	0.011	14	12	100/C
1	5	0.6	2.4	2.8	19.5	0.010	16	15	100/C

Class of conductor 5 : Flexible

C : Packing in coil

NYY-SWA

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED , WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper,
Sizes 50 mm^2 up to 300 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area	Number and diameter of wire	Insulation thickness nominal	Inner sheath thickness nominal	Diameter of steel wire armor nominal	Outer sheath thickness nominal	Overall diameter approx.	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	Continuous current rating in underground maximum	Cable weight approx.	Standard length
	(mm^2)	(No./mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(kg/km)	(m)
4	50	19/1.78	1.5	1.5	2.0	2.3	43.0	0.387	0.0046	168	4,300	500/D
	70	19/2.14	1.5	1.5	2.0	2.5	49.0	0.268	0.0039	209	6,000	500/D
	95	19/2.52	1.7	1.8	2.5	2.7	55.0	0.193	0.0038	248	8,000	300/D
	120	37/2.03	1.7	1.8	2.5	2.9	60.0	0.153	0.0034	283	9,000	300/D
	150	37/2.25	1.9	2.0	2.5	3.	65.0	0.124	0.0034	310	11,000	300/D
	185	37/2.52	2.1	2.0	2.5	3.2	72.0	0.0991	0.0034	357	13,000	200/D
	240	61/2.25	2.3	2.2	3.15	3.5	81.0	0.0754	0.0033	427	17,500	150/D
	300	61/2.52	2.5	2.2	3.15	3.8	89.0	0.0601	0.0032	453	21,000	150/D

D : Packing in drum

60227 IEC 07 HIV

TIS 11 Part 3-2553

300/500 V 90°C SOLID CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid annealed copper,
Size 0.5 mm^2 up to 2.5 mm^2

Insulation : Polyvinyl chloride (PVC/E)

Core identification
Single core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 3-2553, Table 9

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	1	0.6	1.9	2.3	36.0	0.015	15	8.6	100/C
0.75	1	0.6	2.1	2.5	24.5	0.013	18	11.0	100/C
1	1	0.6	2.2	2.7	18.1	0.012	22	14.0	100/C
1.5	1	0.7	2.6	3.2	12.1	0.011	28	20.0	100/C
2.5	1	0.8	3.2	3.9	7.41	0.009	38	32.0	100/C

Class of conductor 1 : Solid

C : Packing in coil

60227 IEC 08 HIV (f)

TIS 11 Part 3-2553

300/500 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Size 0.5 mm^2 up to 2.5 mm^2

Insulation : Polyvinyl chloride (PVC/E)

Core identification
Single-core : Any Color

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 3-2553, Table 11

APPLICATION

For indoor fixed installations in dry locations, for electrical panels connection or for electrical apparatus

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	5	0.6	2.1	2.5	39.0	0.013	14	9	100/C
0.75	5	0.6	2.2	2.7	26.0	0.012	18	12	100/C
1	5	0.6	2.4	2.8	19.5	0.010	21	15	100/C
1.5	5	0.7	2.8	3.4	13.3	0.009	27	21	100/C
2.5	5	0.8	3.4	4.1	7.98	0.009	37	33	100/C

Class of conductor 5 : Flexible

C : Packing in coil

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_o/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard : IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No./mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	1.5	7/0.53	0.7	1.4	6.3	12.1	2,500	31	50	500/D
	2.5	7/0.67	0.7	1.4	6.8	7.41	2,100	42	60	500/D
	4	7/0.85	0.7	1.4	7.3	4.61	1,700	55	80	500/D
	6	7/1.04	0.7	1.4	7.9	3.08	1,450	69	100	500/D
	10	6	0.7	1.4	8.4	1.83	1,250	93	140	500/D
	16	6	0.7	1.4	9.4	1.15	1,000	123	200	500/D
	25	6	0.9	1.4	11.0	0.727	1,050	164	300	500/D
	35	6	0.9	1.4	12.0	0.524	900	202	400	500/D
	50	6	1.0	1.4	13.5	0.387	850	245	500	500/D
	70	12	1.1	1.4	15.0	0.268	800	309	750	500/D
	95	15	1.1	1.5	17.5	0.193	650	383	1,000	500/D
	120	18	1.2	1.5	19.0	0.153	650	446	1,200	500/D
	150	18	1.4	1.6	21	0.124	700	510	1,500	500/D
	185	30	1.6	1.6	23	0.0991	700	591	1,900	500/D
	240	34	1.7	1.7	26	0.0754	650	705	2,500	500/D
	300	34	1.8	1.8	29	0.0601	600	814	3,100	500/D
	400	53	2.0	1.9	32	0.0470	600	950	3,900	500/D
	500	53	2.2	2.0	36	0.0366	600	1,111	5,000	500/D
	630	53	2.4	2.2	40	0.0283	550	1,293	6,500	500/D
	800	53	2.6	2.3	45	0.0221	550	1,486	8,500	300/D
	1,000	53	2.8	2.4	51	0.0176	500	1,701	10,500	300/D

D : Packing in drum

T-AV

TIS 118-2522

60°C LOW VOLTAGE FLEXIBLE CONDUCTOR FOR AUTOMOBILE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes. 0.5 mm² up to 95 mm²

Insulation : Polyvinyl chloride (PVC)
Color : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 60°C
: Low voltage circuit

Testing voltage : 1,000 Volts

Reference standard : TIS 118-2522

Remark: Nowadays the wires are produced according to two kinds of Standard. But such the Ministerial Regulations shall come into force upon their publication in Government Gazette, the production must be in the way of THAI INDUSTRIAL STANDARD.

APPLICATION

For automobile

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Conductor diameter approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	0.5	16/0.20	0.95	0.6	2.2	37.1	11	9	100/C
	0.5	7/0.30	0.95	0.6	2.2	37.1	11	9	100/C
	0.75	24/0.20	1.15	0.6	2.4	24.7	14	11	100/C
	0.85	12/0.30	1.20	0.6	2.4	22.0	15	12	100/C
	1.0	32/0.20	1.30	0.6	2.6	18.5	16	14	100/C
	1.25	40/0.20	1.50	0.6	2.7	14.8	19	17	100/C
	1.25	18/0.30	1.50	0.6	2.7	14.7	19	17	100/C
	1.5	30/0.25	1.60	0.6	2.8	12.7	20	19	100/C
	2	28/0.30	1.90	0.6	3.1	9.42	25	24	100/C
	2.5	50/0.25	2.10	0.7	3.5	7.60	28	30	100/C
	3	44/0.30	2.30	0.7	3.7	6.00	32	37	100/C
	4	56/0.30	2.60	0.8	4.2	4.71	38	47	100/C
	5	70/0.30	3.0	0.8	4.6	3.77	44	57	100/C
	6	84/0.30	3.2	0.9	5.0	3.14	49	69	100/C
	8	63/0.40	3.7	0.9	5.5	2.31	59	88	100/C
	10	84/0.40	4.2	1.1	6.4	1.82	69	114	100/C
	16	126/0.40	5.8	1.1	8.0	1.16	95	173	100/C
	25	196/0.60	7.0	1.4	9.8	0.770	123	261	100/C
	35	280/0.40	8.5	1.4	11.3	0.524	158	366	100/C
	50	399/0.40	10.9	1.6	14.1	0.357	207	537	500/D
	70	361/0.50	12.6	2.0	16.6	0.268	250	727	500/D
	95	475/0.50	14.1	2.0	18.1	0.193	305	971	500/D

C : Packing in coil
D : Packing in drum

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_o/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard : IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1.5	15.4287	0.5005	0.1572	15.4295
	2.5	9.4485	0.4665	0.1466	9.4496
	4	5.8782	0.4339	0.1363	5.8798
	6	3.9273	0.4103	0.1289	3.9295
	10	2.3335	0.3916	0.1230	2.3367
	16	1.4665	0.3670	0.1153	1.4710
	25	0.9272	0.3540	0.1112	0.9338
	35	0.6684	0.3410	0.1070	0.6769
	50	0.4938	0.3300	0.1037	0.5046
	70	0.3423	0.3200	0.1005	0.3567
	95	0.2469	0.3120	0.0982	0.2657
	120	0.1961	0.3070	0.0965	0.2185
	150	0.1594	0.3070	0.0965	0.1863
	185	0.1279	0.3050	0.0958	0.1598
	240	0.0983	0.3000	0.0943	0.1362
	300	0.0793	0.2970	0.0934	0.1225
	400	0.0633	0.2950	0.0927	0.1122
	500	0.0510	0.2920	0.0914	0.1050
	630	0.0415	0.2900	0.0911	0.1001
	800	0.0348	0.2870	0.0903	0.0967
	1,000	0.0303	0.2830	0.0889	0.0939

Laying Type : Touching

J-AV

JIS C 3406

60°C LOW VOLTAGE FLEXIBLE CONDUCTOR FOR AUTOMOBILE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes. 0.5 mm² up to 60 mm²

Insulation : Polyvinyl chloride (PVC)
Color : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 60°C
: Low voltage circuit
Testing voltage : 5,000 Volts
Reference standard : JIS C 3406

APPLICATION

For automobile

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Conductor diameter approx. (mm)	Conductor diameter approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	0.5	20/0.18	0.95	1.0	0.6	2.1	36.7	12	8.5	100/C
	0.5	7/0.32	1.00	1.0	0.6	2.1	32.7	12	9	100/C
	0.75	30/0.18	1.15	1.20	0.6	2.3	24.4	14	12	100/C
	0.85	11/0.32	1.25	1.20	0.6	2.4	20.8	15	13	100/C
	1.25	50/0.18	1.50	1.50	0.6	2.7	14.7	19	17	100/C
	1.25	16/0.32	1.50	1.50	0.6	2.7	14.3	19	17	100/C
	2	26/0.32	1.90	1.90	0.6	3.1	8.81	26	26	100/C
	3	41/0.32	2.40	2.30	0.7	3.8	5.59	34	40	100/C
	5	65/0.32	3.00	3.0	0.8	4.5	3.52	45	60	100/C
	8	50/0.45	3.70	3.7	0.9	5.4	2.32	59	90	100/C
	15	84/0.45	5.10	5.8	1.1	7.2	1.38	82	160	100/C
	20	247/0.32	6.30	7.0	1.1	8.2	0.887	109	230	100/C
	30	361/0.32	7.60	8.5	1.4	10.5	0.520	156	380	500/D
	40	494/0.32	8.90	10.9	1.4	11.5	0.428	175	450	500/D
	50	608/0.32	9.80	12.6	1.6	13.0	0.337	206	570	500/D
	60	741/0.32	10.00	14.1	1.6	13.5	0.287	227	670	500/D

C : Packing in coil
D : Packing in drum

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90ºC
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_0/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard : IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1.5	15.4287	0.6391	0.2008	15.4300
	2.5	9.4485	0.6051	0.1901	9.4500
	4	5.9782	0.5726	0.1799	5.8810
	6	3.9273	0.5489	0.1724	3.9311
	10	2.3335	0.5302	0.1666	2.3394
	16	1.4664	0.5056	0.1589	1.4750
	25	0.9271	0.4930	0.1547	0.9399
	35	0.6683	0.4790	0.1506	0.6851
	50	0.4937	0.4690	0.1473	0.5152
	70	0.3420	0.4590	0.1441	0.3711
	95	0.2465	0.4510	0.1417	0.2844
	120	0.1957	0.4460	0.1400	0.2406
	150	0.1588	0.4460	0.1400	0.2117
	185	0.1272	0.4440	0.1394	0.1887
	240	0.0973	0.4390	0.1379	0.1688
	300	0.0781	0.4360	0.1369	0.1576
	400	0.0618	0.3430	0.1362	0.1496
	500	0.0490	0.4310	0.1353	0.1439
	630	0.0390	0.4290	0.1347	0.1402
	800	0.0318	0.4260	0.1338	0.1375
	1,000	0.0268	0.4210	0.1324	0.1351

Laying type : Spacing

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_0/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard: IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1.5	15.4287	0.4542	0.1427	15.4294
	2.5	9.4485	0.4203	0.1320	9.4494
	4	5.8782	0.3877	0.1218	5.8795
	6	3.9273	0.3640	0.1144	3.9280
	10	2.3335	0.3453	0.1085	2.3360
	16	1.4665	0.3208	0.1008	1.4699
	25	0.9272	0.3080	0.0967	0.9322
	35	0.6684	0.2950	0.0925	0.6748
	50	0.4938	0.2840	0.0892	0.5018
	70	0.3423	0.2740	0.0860	0.3529
	95	0.2469	0.2660	0.0836	0.2607
	120	0.1961	0.2610	0.0820	0.2125
	150	0.1594	0.2610	0.0819	0.1792
	185	0.1279	0.2590	0.0813	0.1516
	240	0.0983	0.2540	0.0798	0.1266
	300	0.0793	0.2510	0.0788	0.1118
	400	0.0633	0.2490	0.0781	0.1006
	500	0.0501	0.2460	0.0772	0.0925
	630	0.0415	0.2440	0.0766	0.0871
	800	0.0348	0.2410	0.0757	0.0834
	1,000	0.0303	0.2370	0.0743	0.0803

Laying Type : Trefoil

60227 IEC 52 VKF

TIS 11 Part 5-2553

300/300 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.5 mm^2 and 0.75 mm^2

Insulation : Polyvinyl chloride (PVC/D)

Core identification

2 Cores : Blue and Brown

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 7

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	3.0 x 4.9	3.7 x 5.9	39.0	0.012	10	28	100/C
	0.75	5	0.5	0.6	3.2 x 5.2	3.8 x 6.3	26.0	0.010	12	35	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 52 VKF

TIS 11 Part 5-2553

300/300 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.5 mm^2 and 0.75 mm^2

Insulation : Polyvinyl chloride (PVC/D)

Core identification

2 Cores : Blue and Brown

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 7

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	3.0 x 4.9	3.7 x 5.9	39.0	0.012	10	28	100/C
	0.75	5	0.5	0.6	3.2 x 5.2	3.8 x 6.3	26.0	0.010	12	35	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 52 VCT

TIS 11 Part 5-2553

300/300 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.5 mm^2 and 0.75 mm^2

Insulation : Polyvinyl chloride (PVC/D)

Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and grey
or Blue, Brown and Green/yellow

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553, Table 7

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	4.6	5.9	39.0	0.012	10	40	100/C
	0.75	5	0.5	0.6	4.9	6.3	26.0	0.010	12	48	100/C
3	0.5	5	0.5	0.6	4.9	6.3	39.0	0.012	8	47	100/C
	0.75	5	0.5	0.6	5.2	6.7	26.0	0.010	10	58	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 53 VKF

TIS 11 Part 5-2553

300/500 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.75 mm^2 and 1 mm^2
Insulation : Polyvinyl chloride (PVC/D)
Core identification
2 Cores : Blue and Brown
Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line
Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553, Table 9

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	3.7 x 6.0	4.5 x 7.2	26.0	0.011	12	43	100/C
	1	5	0.6	0.8	3.9 x 6.2	4.7 x 7.5	19.5	0.010	15	50	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 53 VCT or 60227 IEC 53 VCT-G

TIS 11 Part 5-2553

300/500 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Sizes. 0.75 mm² up to 2.5 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification

2 cores: Blue and Brown

3 cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow

4 cores: Brown, Black, Grey and Blue
or Brown, Black, Grey and Green/Yellow

5 cores : Blue, Brown,Black, Grey and Black
or Blue, Brown, Black,Grey and Green/Yellow

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 9

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	5.7	7.2	26.0	0.011	12	60	100/C
	1	5	0.6	0.8	5.9	7.5	19.5	0.010	14	70	100/C
	1.5	5	0.7	0.8	6.8	8.6	13.3	0.010	18	93	100/C
	2.5	5	0.8	1.0	8.4	10.6	7.98	0.009	25	140	100/C
3	0.75	5	0.6	0.8	6.0	7.6	26.0	0.011	10	70	100/C
	1	5	0.6	0.8	6.3	8.0	19.5	0.010	12	82	100/C
	1.5	5	0.7	0.9	7.4	9.4	13.3	0.010	16	115	100/C
	2.5	5	0.8	1.1	9.2	11.4	7.98	0.009	21	175	100/C
4	0.75	5	0.6	0.8	6.6	8.3	26.0	0.011	10	84	100/C
	1	5	0.6	0.9	7.1	9.0	19.5	0.010	12	105	100/C
	1.5	5	0.7	1.0	8.4	10.5	13.3	0.010	16	145	100/C
	2.5	5	0.8	1.1	10.1	12.5	7.98	0.009	21	215	100/C
5	0.75	5	0.6	0.9	7.4	9.3	26.0	0.011	10	105	100/C
	1	5	0.6	0.9	7.8	9.8	19.5	0.010	12	125	100/C
	1.5	5	0.7	1.1	9.3	11.6	13.3	0.010	16	175	100/C
	2.5	5	0.8	1.2	11.2	13.9	7.98	0.009	21	265	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 56 HVKF

TIS 11 Part 5-2553

300/300 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
: Size 0.5 mm^2 and 0.75 mm^2
Insulation : Polyvinyl chloride (PVC/E)
Core identification
2 Cores : Blue and Brown
Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line
Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553,Table 11

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	3.0 x 4.9	3.7 x 5.9	39.0	0.012	13	28	100/C
	0.75	5	0.5	0.6	3.2 x 5.2	3.8 x 6.3	26.0	0.010	16	35	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 56 HVCT

TIS 11 Part 5-2553

300/300 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes 0.5 mm² and 0.75 mm²
Insulation : Polyvinyl chloride (PVC/E)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553,Table 11

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	4.6	5.9	39.0	0.012	13	38	100/C
	0.75	5	0.5	0.6	4.9	6.3	26.0	0.010	16	46	100/C
3	0.5	5	0.5	0.6	4.9	6.3	39.0	0.012	11	44	100/C
	0.75	5	0.5	0.6	5.2	6.7	26.0	0.010	13	55	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 56 HVCT

TIS 11 Part 5-2553

300/300 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes 0.5 mm² and 0.75 mm²
Insulation : Polyvinyl chloride (PVC/E)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553,Table 11

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	4.6	5.9	39.0	0.012	13	38	100/C
	0.75	5	0.5	0.6	4.9	6.3	26.0	0.010	16	46	100/C
3	0.5	5	0.5	0.6	4.9	6.3	39.0	0.012	11	44	100/C
	0.75	5	0.5	0.6	5.2	6.7	26.0	0.010	13	55	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 57 HVKF

TIS 11 Part 5-2553

300/500 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire,
Size 0.75 mm^2 and 1 mm^2

Insulation : Polyvinyl chloride (PVC/E)

Core identification

2-Cores : Blue and Brown

Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 13

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	3.7 x 6.0	4.5 x 7.2	39.0	0.011	16	42	100/C
	1	5	0.6	0.8	3.9 x 6.2	4.7 x 7.5	19.5	0.010	19	50	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 57 HVCT

TIS 11 Part 5-2553

300/500 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire,
Sizes 0.75 mm² up to 2.5 mm²

Insulation : Polyvinyl chloride (PVC/E)

Core identification

2-Cores : Blue and Brown

3 Cores :Brown, Black and Grey
or Blue, Brown and Green/Yellow

4-Cores : Brown, Black, Grey and Blue
or Brown, Black, Grey and Green/Yellow

5-Cores : Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow

Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 13

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	5.7	7.2	26.0	0.011	16	57	100/C
	1	5	0.6	0.8	5.9	7.5	19.5	0.010	19	66	100/C
	1.5	5	0.7	0.8	6.8	8.6	13.3	0.010	24	89	100/C
	2.5	5	0.8	1.0	8.4	10.6	7.98	0.009	33	135	100/C
3	0.75	5	0.6	0.8	6.0	7.6	26.0	0.011	14	66	100/C
	1	5	0.6	0.8	6.3	8.0	19.5	0.010	16	78	100/C
	1.5	5	0.7	0.9	7.4	9.4	13.3	0.010	21	110	100/C
	2.5	5	0.8	1.1	9.2	11.4	7.98	0.009	28	170	100/C
4	0.75	5	0.6	0.8	6.6	8.3	26.0	0.011	14	80	100/C
	1	5	0.6	0.9	7.1	9.0	19.5	0.010	16	99	100/C
	1.5	5	0.7	1.0	8.4	10.5	13.3	0.010	21	140	100/C
	2.5	5	0.8	1.1	10.1	12.5	7.98	0.009	28	205	100/C
5	0.75	5	0.6	0.9	7.4	9.3	26.0	0.011	14	99	100/C
	1	5	0.6	0.9	7.8	9.8	19.5	0.010	16	120	100/C
	1.5	5	0.7	1.1	9.3	11.6	13.3	0.010	21	170	100/C
	2.5	5	0.8	1.2	11.2	13.9	7.98	0.009	28	250	100/C

Class of conductor 5 : Flexible

C : Packing in coil

VAF

TIS 11 Part 101-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1 mm^2 up to 16 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

Sheath : White polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 101-2553, Table 1

APPLICATION

Building wiring for surface or above ceiling wiring or direct embeded in plaster.

Number of core	Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Lower limit (mm)	Overall diameter Upper limit (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	1	1	0.6	0.9	4.0 x 6.2	4.7 x 7.4	18.1	0.0110	13	50	100/C
	1.5	1	0.7	0.9	4.4 x 7.0	5.4 x 8.4	12.1	0.0110	17	70	100/C
	2.5	1	0.8	1.0	5.2 x 8.4	6.2 x 9.8	7.41	0.0100	23	100	100/C
	4	2	0.8	1.1	5.6 x 9.6	7.2 x 11.5	4.61	0.0077	31	150	100/C
	6	2	0.8	1.1	6.4 x 10.5	8.0 x 13.0	3.08	0.0065	40	200	100/C
	10	2	1.0	1.2	7.8 x 13.0	9.6 x 16.0	1.83	0.0065	55	310	100/C
	16	2	1.0	1.3	9.0 x 15.5	11.0 x 18.5	1.15	0.0052	74	450	100/C

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil

VAF

TIS 11 Part 101-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1 mm^2 up to 16 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

Sheath : White polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 101-2553, Table 1

APPLICATION

Building wiring for surface or above ceiling wiring or direct embeded in plaster.

Number of core	Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Lower limit (mm)	Overall diameter Upper limit (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	1	1	0.6	0.9	4.0 x 6.2	4.7 x 7.4	18.1	0.0110	13	50	100/C
	1.5	1	0.7	0.9	4.4 x 7.0	5.4 x 8.4	12.1	0.0110	17	70	100/C
	2.5	1	0.8	1.0	5.2 x 8.4	6.2 x 9.8	7.41	0.0100	23	100	100/C
	4	2	0.8	1.1	5.6 x 9.6	7.2 x 11.5	4.61	0.0077	31	150	100/C
	6	2	0.8	1.1	6.4 x 10.5	8.0 x 13.0	3.08	0.0065	40	200	100/C
	10	2	1.0	1.2	7.8 x 13.0	9.6 x 16.0	1.83	0.0065	55	310	100/C
	16	2	1.0	1.3	9.0 x 15.5	11.0 x 18.5	1.15	0.0052	74	450	100/C

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil

VAF-G

TIS 11 Part 101-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, FLAT TYPE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper
Sizes 1.0 mm² up to 16 mm²

Ground wire : Solid and stranded annealed copper
Sizes 1.0 mm² up to 16 mm²

Insulation : Polyvinyl chloride (PVC/C)

Core identification
2 Cores : Blue and Brown
Ground-Cores : Green/Yellow

Sheath : White polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 101-2553, Table 1

APPLICATION

Building wiring for surface or above ceiling wiring or direct embeded in plaster.

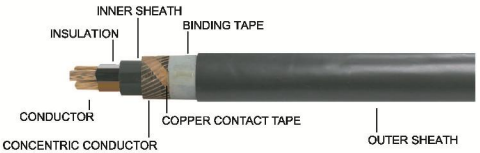
Number of core	Nominal cross sectional area (mm²)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Lower limit (mm)	Overall diameter Upper limit (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2+G	1	1	0.6	0.9	4.0 x 8.4	4.7 x 9.8	18.1	0.0110	13	75	100/C
	1 (G)	1	0.6	0.9			18.1				
	1.5	1	0.7	0.9	4.4 x 9.8	5.4 x 11.5	12.1	0.0110	17	100	100/C
	1.5 (G)	1	0.7	0.9			12.1				
	2.5	1	0.8	1.0	5.2 x 11.5	6.2 x 13.5	7.41	0.0100	23	150	100/C
	2.5 (G)	1	0.8	1.0			7.41				
	4	2	0.8	1.1	5.8 x 13.4	7.4 x 16.5	4.61	0.0077	31	220	100/C
	4 (G)	2	0.8	1.1			4.61				
	6	2	0.8	1.1	6.4 x 15.0	8.0 x 18.0	3.08	0.0065	40	290	100/C
	6 (G)	2	0.8	1.1			3.08				
	10	2	1.0	1.2	7.8 x 19.0	9.6 x 22.5	1.83	0.0065	55	460	100/C
	10 (G)	2	1.0	1.2			1.83				
	16	2	1.0	1.3	9.0 x 22.0	11.0 x 26.5	1.15	0.0052	74	650	500/D
	16 (G)	2	1.0	1.3			1.15				

Class of conductor 1 : Solid
2 : Strand
G : Ground conductor
C : Packing in coil
D : Packing in drum

500V-NYCY

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH CONCENTRIC CONDUCTORS POWER CABLE



CABLE STRUCTURE

Phase Conductor : Concentric stranded annealed copper wires, Sizes 1.5 mm^2 up to 35 mm^2

Concentric shield : Annealed copper wires with helix of copper tape fully covers

Insulation : Polyvinyl chloride (PVC/C)

Core identification

3 Cores : Brown, Black and Grey

Other colors are available on customer request

Inner Sheath : Polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

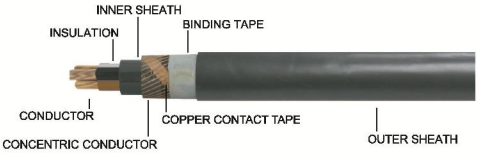
Nominal cross sectional area (mm^2)		Number and diameter of wire (No./mm)		Insulation thickness nominal	Inner sheath thickness nominal	Outer thickness nominal	Overall diameter approx.	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	continuous current rating in free air maximum	Cable weight approx.	Standard length
Phase	Concentric shield	Phase	Concentric shield	(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(kg/km)	(m)
3x1.5	1.5	1/1.38	8/0.50	0.7	0.4	1.2	11.5	12.1	0.011	25	180	500/D
3x1.5	1.5	7/0.53	8/0.50	0.7	0.4	1.2	12.0	12.1	0.010	25	190	500/D
3x2.5	2.5	1/1.78	13/0.50	0.8	0.4	1.2	13.0	7.41	0.010	33	250	500/D
3x2.5	2.5	7/0.67	13/0.50	0.8	0.4	1.2	14.0	7.41	0.009	33	260	500/D
3x4	4	1/2.25	14/0.60	0.8	0.4	1.2	14.5	4.61	0.0085	43	320	500/D
3x4	4	7/0.85	14/0.60	0.8	0.4	1.2	15.0	4.61	0.0077	43	340	500/D
3x6	6	7/1.04	21/0.60	0.8	0.4	1.4	19.5	3.08	0.0065	54	460	500/D
3x10	10	7/1.35	20/0.80	1.0	0.6	1.4	20.0	1.83	0.0065	71	700	500/D
3x16	16	7/1.70	19/1.04	1.0	0.8	1.4	24.0	1.15	0.0052	93	1,000	500/D
3x25	16	7/2.14	19/1.04	1.2	0.8	1.6	28.0	0.727	0.0050	120	1,500	500/D
3x35	16	19/1.53	19/1.04	1.2	1.0	1.6	31.0	0.524	0.0044	144	1,800	500/D

D : Packing in drum

NYCY

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH CONCENTRIC CONDUCTORS POWER CABLE



CABLE STRUCTURE

Phase Conductor : Concentric stranded annealed copper wires, Sizes 50 mm^2 up to 300 mm^2

Concentric shield : Annealed copper wires with helix of copper tape fully covers

Insulation : Polyvinyl chloride (PVC/C)

Core identification

3 Cores : Brown, Black and Grey

Other colors are available on customer request

Inner Sheath : Polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

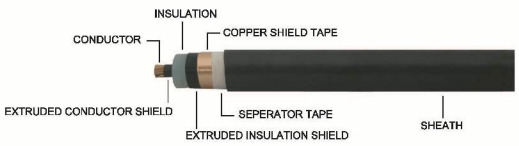
Nominal cross sectional area (mm^2)		Number and diameter of wire (No./mm)		Insulation thickness nominal	Inner sheath thickness nominal	Outer thickness nominal	Overall diameter approx.	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	continuous current rating in free air maximum	Cable weight approx.	Standard length
Phase	Concentric shield	Phase	Concentric shield	(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(kg/km)	(m)
3x50	25	19/1.78	25/1.13	1.5	1.5	2.2	38.0	0.387	0.0046	142	2,600	500/D
3x50	35	19/1.78	23/1.38	1.5	1.5	2.2	39.0	0.387	0.0046	142	2,700	500/D
3x70	35	19/2.14	23/1.38	1.5	1.5	2.2	43.0	0.268	0.0039	178	3,500	500/D
3x70	50	19/2.14	27/1.53	1.5	1.5	2.2	43	0.268	0.0039	178	3,600	500/D
3x95	50	19/2.52	27/1.53	1.7	1.5	2.4	48	0.193	0.0038	219	4,700	500/D
3x95	70	19/2.52	31/1.70	1.7	1.5	2.4	49	0.193	0.0038	219	5,000	500/D
3x120	70	37/2.03	31/1.70	1.7	1.8	2.6	53	0.153	0.0034	254	6,000	500/D
3x120	95	37/2.03	36/1.83	1.7	1.8	2.6	54	0.153	0.0034	254	6,000	500/D
3x150	70	37/2.25	31/1.70	1.9	1.8	2.8	58	0.124	0.0034	290	7,000	300/D
3x150	95	37/2.25	36/1.83	1.9	1.8	2.8	58	0.1240	0.0034	290	7,500	300/D
3x150	120	37/2.25	37/2.03	1.9	1.8	2.8	59	0.1240	0.0034	290	7,500	300/D
3x185	95	37/2.52	36/1.83	2.1	2.0	3.0	64	0.0991	0.0034	332	9,000	300/D
3x185	120	37/2.52	37/2.03	2.1	2.0	3.0	65	0.0991	0.0034	332	9,000	300/D
3x240	120	61/2.25	37/2.03	2.3	2.0	3.2	72	0.0601	0.0033	389	11,500	200/D
3x300	150	61/2.52	41/2.14	2.5	2.2	3.4	79	0.0601	0.0032	445	14,000	200/D

D : Packing in drum

6/10 KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_o/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	16	6	3.4	1.5	18.5	1.15	3,100	134	440	500/D
	25	6	3.4	1.6	20	0.727	2,700	176	550	500/D
	35	6	3.4	1.6	21	0.524	2,450	214	700	500/D
	50	6	3.4	1.7	22	0.387	2,200	258	850	500/D
	70	12	3.4	1.7	24	0.268	1,900	322	1,100	500/D
	95	15	3.4	1.8	26	0.193	1,700	394	1,300	500/D
	120	18	3.4	1.8	27	0.153	1,550	456	1,600	500/D
	150	18	3.4	1.9	29	0.124	1,450	518	1,900	500/D
	185	30	3.4	1.9	31	0.0991	1,300	598	2,300	500/D
	240	34	3.4	2.0	33	0.0754	1,150	710	2,900	500/D
	300	34	3.4	2.1	36	0.0601	1,050	816	3,500	500/D
	400	53	3.4	2.2	39	0.0470	950	949	4,400	500/D
	500	53	3.4	2.3	42	0.0366	850	1,109	5,500	500/D
	630	53	3.4	2.4	46	0.0283	750	1,290	7,000	500/D
	800	53	3.4	2.5	50	0.0221	650	1,482	8,500	500/D
	1,000	53	3.4	2.6	56	0.0176	600	1,631	11,000	500/D

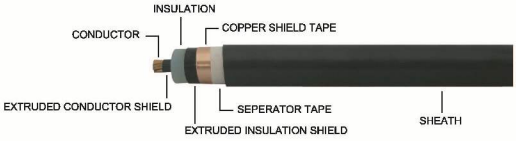
* REMARK : Special protection can be produced

D : Packing in drum

6/10 KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_0/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

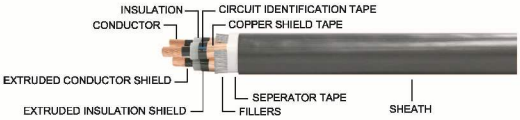
Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	16	1.4703	0.64100	0.20138	1.48400
	25	0.9271	0.61100	0.19195	0.94673
	35	0.6683	0.58900	0.18504	0.69343
	50	0.4936	0.56900	0.17876	0.52498
	70	0.3419	0.54800	0.17216	0.38282
	95	0.2466	0.53000	0.16650	0.29751
	120	0.1957	0.51700	0.16242	0.25432
	150	0.1586	0.50900	0.15991	0.22521
	185	0.1271	0.49800	0.15645	0.20158
	240	0.0971	0.48700	0.15300	0.18123
	300	0.0778	0.47900	0.15048	0.16939
	400	0.0612	0.47100	0.14797	0.16013
	500	0.0487	0.46400	0.14577	0.15370
	630	0.0387	0.45600	0.14326	0.14840
	800	0.0316	0.44900	0.14106	0.14456
	1,000	0.0271	0.44000	0.13823	0.14087

Laying Type : Touching

6/10KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_0/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	16	6	3.4	2.2	37	1.15	3,100	109	1,500	500/D
	25	6	3.4	2.2	40	0.727	2,700	143	1,900	500/D
	35	6	3.4	2.3	42	0.524	2,450	174	2,200	500/D
	50	6	3.4	2.4	45	0.387	2,200	208	2,700	500/D
	70	12	3.4	2.6	49	0.268	1,900	259	3,500	500/D
	95	15	3.4	2.7	53	0.193	1,700	317	4,400	500/D
	120	18	3.4	2.8	57	0.153	1,550	366	5,500	500/D
	150	18	3.4	2.9	60	0.124	1,450	416	6,000	500/D
	185	30	3.4	3.0	64	0.0991	1,300	481	7,500	500/D
	240	34	3.4	3.2	70	0.0754	1,150	569	9,500	300/D
	300	34	3.4	3.3	75	0.0601	1,050	683	11,500	300/D
	400	53	3.4	3.6	81	0.0470	950	789	14,000	300/D

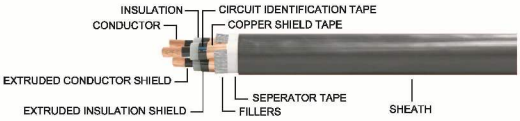
* REMARK : Special protection can be produced

D : Packing in drum

6/10KV-CV

IEC 60502-2

6/10(12)KV 90°C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 16 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 16 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 12,000 volts
Rated voltage (U_0/U) 6/10 kV
6,000 Volts between Line-to-Earth
10,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 21,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

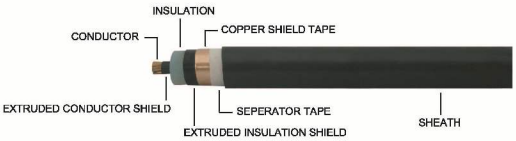
For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	16	1.47037	0.410	0.12881	1.47600
	25	0.92709	0.381	0.11969	0.93478
	35	0.66827	0.362	0.11373	0.67788
	50	0.49367	0.343	0.10776	0.50529
	70	0.34212	0.324	0.10179	0.35694
	95	0.24674	0.308	0.09676	0.26503
	120	0.19585	0.298	0.09362	0.21708
	150	0.15927	0.289	0.09079	0.18333
	185	0.12768	0.281	0.08828	0.15523
	240	0.09808	0.271	0.08514	0.12988
	300	0.07906	0.264	0.08294	0.11458
	400	0.06307	0.257	0.08074	0.10245

8.7/15KV-CV

IEC 60502-2

8.7/15(17.5)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor Compact round stranded annealed copper,
Single-core : Sizes 25 mm² up to 1,000 mm²
Multi-cores : Sizes 25 mm² up to 400 mm²

Insulation Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 17,500 Volts
Rated voltage (U_0/U) 8.7/15 kV
8,700 Volts between Line-to-Earth
15,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 30,500 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	25	6	4.5	1.6	22	0.727	3,300	177	650	500/D
	35	6	4.5	1.7	23	0.524	3,000	215	750	500/D
	50	6	4.5	1.7	25	0.387	2,700	258	900	500/D
	70	12	4.5	1.8	26	0.268	2,400	322	1,200	500/D
	95	15	4.5	1.8	28	0.193	2,100	394	1,400	500/D
	120	18	4.5	1.9	30	0.153	1,950	455	1,700	500/D
	150	18	4.5	1.9	31	0.124	1,800	517	2,000	500/D
	185	30	4.5	2.0	33	0.0991	1,650	596	2,400	500/D
	240	34	4.5	2.1	36	0.0754	1,500	706	3,000	500/D
	300	34	4.5	2.1	38	0.0601	1,350	813	3,700	500/D
	400	53	4.5	2.2	41	0.0470	1,200	944	4,500	500/D
	500	53	4.5	2.3	45	0.0366	1,100	1,103	5,500	500/D
	630	53	4.5	2.4	48	0.0283	950	1,283	7,000	500/D
	800	53	4.5	2.6	53	0.0221	850	1,470	8,500	500/D
	1,000	53	4.5	2.7	58	0.0176	750	1,679	11,500	300/D

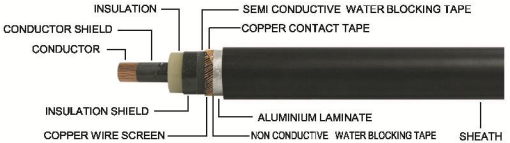
* REMARK : Special protection can be produced

D : Packing in drum

69KV-CE

TIS 2202-2547 (IEC 60840)

69 kV 90° C CROSS - LINKED POLYETHYLENE INSULATED WITH COPPER WIRE SCREEN AND POLYETHYLENE JACKETED POWER CABLE



CABLE STRUCTURE

Conductor : Compact concentric stranded uncoated annealed Copper conductor
Single-core : Sizes 400 mm² up to 800 mm²
Insulation : Cross-linked polyethylene (XLPE)
Core identification
Single-core : Natural (Translucent)
Sheath : Polyethylene (PE)

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
Testing voltage : 90,000 Volts
Reference standard :TIS 2202, TIS 2427 (IEC 60840, IEC 60228)

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of cores	Nominal Cross sectional area (mm²)	Number of wires minimum (No.)	Conductor diameter approx. (mm)	Conductor shield thickness nominal (mm)	Insulation thickness nominal (mm)	Insulation shield thickness nominal (mm)	Copper wire area nominal (mm²)	Jacket thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Current Rating in ground maximum (A)	Weight of cable approx. (kg/km)	Standard length (m)
1	400/95	53	23.5	1.5	11.0	1.5	95	3.1	66	0.0470	690	7,000	500/D
	500/95	53	26.7	1.5	11.0	1.5	95	3.2	69	0.0366	785	8,000	300/D
	630/120	53	30.3	1.5	11.0	1.5	120	3.4	74	0.0283	895	10,000	300/D
	800/120	53	34.1	1.5	11.0	1.5	120	3.5	78	0.0221	1,010	11,500	300/D

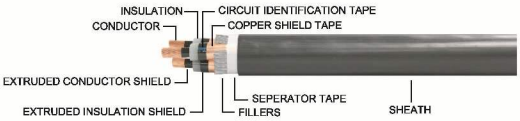
D: Packing in drum.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	400	0.0614	0.5800	0.1822	0.1923
	500	0.0485	0.5634	0.1770	0.1835
	630	0.0385	0.5521	0.1734	0.1777
	800	0.0312	0.5415	0.1701	0.1730

8.7/15KV-CV

IEC 60502-2

8.7/15(17.5)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor Compact round stranded annealed copper,
Single-core : Sizes 25 mm2 up to 1,000 mm2
Multi-cores : Sizes 25 mm^2 up to 400 mm^2

Insulation Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 17,500 Volts
Rated voltage (U_0/U) 8.7/15 kV
8,700 Volts between Line-to-Earth
15,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 30,500 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	25	6	4.5	2.4	45	0.727	3,300	146	2,200	500/D
	35	6	4.5	2.5	48	0.524	3,000	176	2,600	500/D
	50	6	4.5	2.6	51	0.387	2,700	211	3,100	500/D
	70	12	4.5	2.7	54	0.268	2,400	263	3,900	500/D
	95	15	4.5	2.8	58	0.193	2,100	321	4,800	500/D
	120	18	4.5	2.9	62	0.153	1,950	370	5,500	500/D
	150	18	4.5	3.1	66	0.124	1,800	420	6,500	500/D
	185	30	4.5	3.2	69	0.0991	1,650	484	8,000	500/D
	240	34	4.5	3.4	75	0.0754	1,500	573	10,000	300/D
	300	34	4.5	3.5	80	0.0601	1,350	659	12,000	300/D
	400	53	4.5	3.7	86	0.0470	1,200	764	15,000	300/D

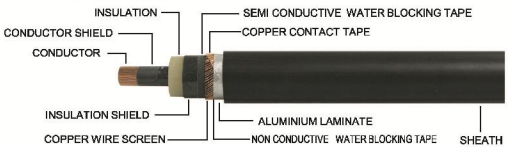
* REMARK : Special protection can be produced

D : Packing in drum

115KV-CE

TIS 2202-2547 (IEC 60840)

115 kV 90° C CROSS - LINKED POLYETHYLENE INSULATED WITH COPPER WIRE SCREEN AND POLYETHYLENE JACKETED POWER CABLE



CABLE STRUCTURE

Conductor : Compact concentric stranded uncoated annealed Copper conductor
Single-core : Sizes 400 mm² up to 800 mm²

Insulation : Cross-linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)

Sheath : Polyethylene (PE)

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C

Testing voltage : 160,000 Volts

Reference standard : TIS 2202, TIS 2427 (IEC 60840, IEC 60228)

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of cores	Nominal Cross sectional area (mm²)	Number of wires minimum (No.)	Conductor diameter approx. (mm)	Conductor shield thickness nominal (mm)	Insulation thickness nominal (mm)	Insulation shield thickness nominal (mm)	Copper wire area nominal (mm²)	Jacket thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Current Rating in ground maximum (A)	Weight of cable approx. (kg/km)	Standard length (m)
1	400/95	53	23.5	1.5	16.0	1.5	95	3.5	76	0.0470	690	8,000	300/D
	500/95	53	26.7	1.5	16.0	1.5	95	3.6	80	0.0366	785	9,000	300/D
	630/120	53	30.3	1.5	16.0	1.5	120	3.7	84	0.0283	895	11,000	300/D
	800/120	53	34.1	1.5	16.0	1.5	120	3.9	88	0.0221	1,010	13,000	300/D

D: Packing in drum.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	400	0.0614	0.6145	0.1931	0.2026
	500	0.0485	0.5974	0.1877	0.1938
	630	0.0384	0.5807	0.1824	0.1864
	800	0.0311	0.5666	0.1780	0.1807

FHC

TIS 64-2517

HARD DRAWN COPPER STRANDED CONDUCTOR

CONDUCTOR

CABLE STRUCTURE

Conductor Hard drawn copper wires, concentric stranded conductor
Sizes 10 mm^2 up to 500 mm^2
Stranding direction the outermost layer Z

TECHNICAL DATA

Reference standard TIS 64-2517

APPLICATION

For grounding wire

Nominal Cross Sectional area (mm²)	Number and diameter of wires (No./mm)	Conductor diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Breaking strength (kgf)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
10	7/1.35	4.05	1.80548	438	90	9	100/C
16	7/1.70	5.10	1.13857	694	125	140	100/C
25	7/2.14	6.42	0.71851	1,076	160	230	100/C
35	7/2.52	7.56	0.51815	1,459	200	320	100/C
50	7/3.02	9.06	0.35896	2,095	250	450	100/C
50	19/1.78	8.90	0.38252	2,021	250	430	100/C
70	19/2.14	10.70	0.26466	2,921	310	600	500/D
95	19/2.52	12.60	0.19183	3,961	380	850	500/D
120	19/2.85	14.25	0.14922	5,067	440	1,100	500/D
150	37/2.25	15.75	0.12384	6,289	510	1,300	500/D
185	37/2.52	17.64	0.09813	7,713	585	1,700	500/D
240	61/2.25	20.25	0.07528	10,369	700	2,200	500/D
300	61/2.52	22.68	0.06002	12,717	800	2,800	500/D
400	61/2.85	25.65	0.04692	16,266	900	3,600	500/D
500	61/3.20	28.80	0.03703	20,506	1,110	4,500	500/D

C : Packing in coil
D : Packing in drum

24 KV-OC

ICEA S-66-524
ICEA S-93-639

24 kV CROSS-LINKED POLYETHYLENE PARTIAL INSULATED ALL ALUMINIUM CABLE

CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single-core : Sizes 35 mm² up to 185 mm²

Insulation : Cross-linked polyethylene (XLPE)

Core identification
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 24,000 Volts

Testing voltage : 11,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator)

Number of core	Nominal cross sectional area (mm²)	Minimum number of wires (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6° C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	1.8	12.0	0.868	900	140	5,591	170	1,000/D
	50	6	8.11	2.2	14.0	0.641	880	170	7,313	220	1,000/D
	70	12	9.73	2.1	15.0	0.443	800	215	10,420	290	1,000/D
	95	15	11.43	2.5	18.0	0.320	750	270	14,098	400	1,000/D
	120	15	13.05	2.6	19.5	0.253	700	310	18,518	490	1,000/D
	150	15	14.37	2.6	21.0	0.206	650	355	22,457	550	1,000/D
	185	30	16.08	2.55	23.0	0.164	600	410	28,974	700	1,000/D

D : Packing in drum

33KV-OC

ICEA S-66-524
ICEA S-93-639

33 kV CROSS-LINKED POLYETHYLENE PARTIAL INSULATED ALL ALUMINIUM CABLE

CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single-core : Size 35 mm^2 up to 185 mm^2

Insulation : Cross-linked polyethylene (XLPE)

Core identification
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 33,000 Volts

Testing voltage : 17,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator)

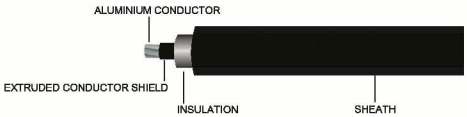
Number of core	Nominal cross sectional area (mm^2)	Minimum number of wires (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	3.0	14.5	0.868	1,350	145	5,591	220	1000/D
	50	6	8.11	3.2	16.5	0.641	1,300	175	7,313	280	1000/D
	70	12	9.73	3.2	18.0	0.443	1,200	220	10,420	350	1000/D
	95	15	11.43	3.5	20.0	0.320	1,100	270	14,098	460	1000/D
	120	15	13.05	3.6	22.0	0.253	1,000	315	18,518	550	1000/D
	150	15	14.37	3.6	23.0	0.206	950	360	22,457	650	1000/D
	185	30	16.08	3.9	26.0	0.164	900	415	28,974	800	1000/D

D : Packing in drum

15KV-CC

ICEA S-66-524
ICEA S-93-639

15 kV ALL ALUMINIUM CONDUCTOR SPACED AERIAL CABLE



CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single Core : Size 35 mm^2 up to 240 mm^2

Insulation : Cross-linked polyethylene (XLPE)
Color : Natural

Sheath : Cross-linked polyethylene (XLPE)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
: Circuit voltage not exceeding 15,000 Volts

Testing voltage : 27,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator or spacer)

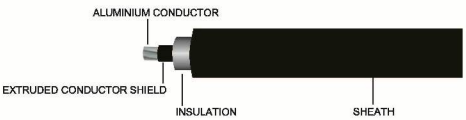
Number of core	Nominal cross sectional area (mm^2)	Number of stranded (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	1.91	1.91	16.5	0.868	1,750	164	5,591	260	500/D
	50	6	8.11	1.91	1.91	18.0	0.641	1,550	198	7,313	320	500/D
	70	12	9.73	1.91	1.91	19.5	0.443	1,400	250	10,420	390	500/D
	95	15	11.43	1.91	1.91	21.0	0.320	1,250	306	14,098	490	500/D
	120	15	13.05	1.91	1.91	23.0	0.253	1,150	355	18,518	600	500/D
	150	15	14.37	1.91	1.91	24.0	0.206	1,050	405	22,457	650	500/D
	185	30	16.08	1.91	1.91	26.0	0.164	980	468	28,974	800	500/D
	240	30	18.57	1.91	1.91	28.0	0.125	850	560	37,506	1,000	500/D

D : Packing in drum

25 KV-CC

ICEA S-66-524
ICEA S-93-639

25 kV ALL ALUMINIUM CONDUCTOR SPACED AERIAL CABLE



CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single Core : Size 35 mm^2 up to 240 mm^2

Insulation : Cross-linked polyethylene (XLPE)
Color : Natural

Sheath : Cross-linked polyethylene (XLPE)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 25,000 Volts

Testing voltage : 38,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator or spacer)

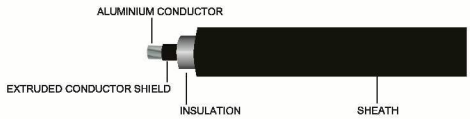
Number of core	Nominal cross sectional area (mm²)	Number of stranded (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking Strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	7.05	3.175	3.175	22	0.868	2,500	165	5,591	400	500/D
	50	6	8.11	3.175	3.175	23	0.641	2,250	199	7,313	460	500/D
	70	12	9.73	3.175	3.175	25	0.443	2,050	250	10,420	550	500/D
	95	15	11.43	3.175	3.175	26	0.320	1,850	305	14,098	650	500/D
	120	15	13.05	3.175	3.175	28	0.253	1,700	353	18,518	750	500/D
	150	15	14.37	3.175	3.175	29	0.206	1,600	402	22,457	850	500/D
	185	30	16.08	3.175	3.175	31	0.164	1,450	464	28,974	1,000	500/D
	240	30	18.57	3.175	3.175	33	0.125	1,300	553	37,506	1,200	500/D

D : Packing in drum

35 KV-CC

ICEA S-66-524
ICEA S-93-639

35 kV ALL ALUMINIUM CONDUCTOR SPACED AERIAL CABLE



CABLE STRUCTURE

Conductor : Compacted round stranded hard drawn aluminium wires
Single Core : Size 50 mm^2 up to 240 mm^2

Insulation : Cross-linked polyethylene (XLPE)
Color : Natural

Sheath : Cross-linked polyethylene (XLPE)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
: Circuit voltage not exceeding 35,000 Volts

Testing voltage : 49,000 Volts

Reference standard : ICEA S-66-524, ICEA S-93-639

APPLICATION

Aerial distribution cable (installed with pin insulator or spacer)

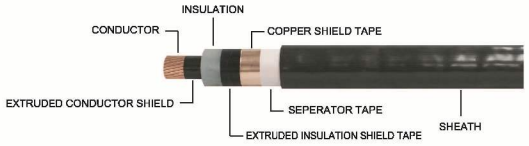
Number of core	Nominal cross sectional area (mm²)	Number of stranded (No.)	Diameter of conductor approx. (mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Approx. Overall diameter (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 15.6°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Breaking Strength (N)	Cable weight approx. (kg/km)	Standard length (m)
1	50	6	8.11	4.445	3.175	26	0.641	2,500	200	7,313	550	500/D
	70	12	9.73	4.445	3.175	27	0.443	2,300	251	10,420	650	500/D
	95	15	11.43	4.445	3.175	29	0.320	2,100	306	14,098	750	500/D
	120	15	13.05	4.445	3.175	31	0.253	1,950	355	18,518	900	500/D
	150	15	14.37	4.445	3.175	32	0.206	1,800	403	22,457	1,000	500/D
	185	30	16.08	4.445	3.175	34	0.164	1,690	464	28,974	1,100	500/D
	240	30	18.57	4.445	3.175	36	0.125	1,500	552	37,506	1,400	500/D

D : Packing in drum

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_o/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 63,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous currunt rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	35	6	8.9	2.0	33	0.524	4,680	214	1,200	500/D
	50	6	8.0	2.0	32	0.387	4,010	257	1,300	500/D
	70	12	8.0	2.0	34	0.268	3,620	320	1,500	500/D
	95	15	8.0	2.1	36	0.193	3,260	390	1,900	500/D
	120	18	8.0	2.1	37	0.153	3,020	450	2,200	500/D
	150	18	8.0	2.2	39	0.124	2,820	511	2,500	500/D
	185	30	8.0	2.2	41	0.0991	2,620	587	2,900	500/D
	240	34	8.0	2.3	43	0.0754	2,370	695	3,500	500/D
	300	34	8.0	2.4	46	0.0601	2,190	797	4,200	500/D
	400	53	8.0	2.5	48	0.0470	2,000	925	5,000	500/D
	500	53	8.0	2.6	52	0.0366	1,800	1,078	6,500	500/D
	630	53	8.0	2.7	56	0.0283	1,630	1,252	7,500	500/D
	800	53	8.0	2.8	60	0.0221	1,480	1,437	9,500	300/D
	1,000	53	8.0	3.0	66	0.0176	1,300	1,638	12,000	300/D

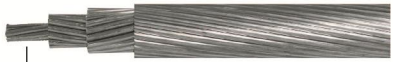
* Remark : Special protection can be produced

D : Packing in drum

AAC

TIS 85-2548

ALL ALUMINIUM STRANDED CONDUCTOR



CABLE STRUCTURE

Conductor : Concentric stranded hard drawn aluminium wires sizes 16 mm^2 up to 1,000 mm^2

Standing Direction : The outermost layer Z

TECHNICAL DATA

Reference standard : TIS 85-2548

APPLICATION

For overhead transmission and distribution line

Nominal cross sectional area (mm^2)	Number and approx diameter of wire (No./mm)	Overall conductor diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Breaking strength (kgf)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
16	7/1.70	5.10	1.802	290	110	44	3000/D
25	7/2.14	6.42	1.138	440	145	70	3000/D
35	7/2.52	7.56	0.820	585	180	95	3000/D
50	7/3.02	9.06	0.571	805	225	140	2500/D
50	19/1.83	9.15	0.5757	890	225	140	2500/D
70	19/2.15	10.75	0.4171	1,205	270	190	2500/D
95	19/2.52	12.60	0.3036	1,585	340	260	2500/D
120	19/2.85	14.25	0.2374	1,980	390	330	2000/D
150	37/2.25	15.75	0.1960	2,570	455	400	2000/D
185	37/2.52	17.64	0.1563	3,085	550	500	2000/D
240	61/2.25	20.25	0.1192	4,015	625	650	1500/D
300	91/2.52	22.68	0.0950	4,820	710	850	1500/D
400	61/2.85	25.65	0.0743	6,025	855	1,100	1000/D
500	61/3.25	29.25	0.0571	7,695	990	1,400	1000/D
625	91/2.96	32.56	0.0463	9,694	1,140	1,700	500/D
800	91/3.35	36.85	0.0361	12,055	1,340	2,200	500/D
1000	91/3.74	41.14	0.0290	14,845	1,540	2,800	500/D

D : Packing in drum

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core Identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90ºC
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_0/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 63,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

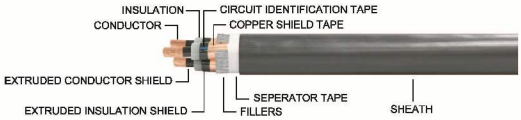
For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	35	0.66831	0.681	0.21386	0.70169
	50	0.49361	0.644	0.20229	0.53345
	70	0.34200	0.618	0.19419	0.39329
	95	0.24650	0.596	0.18726	0.30956
	120	0.19550	0.580	0.18223	0.26726
	150	0.15870	0.568	0.17853	0.23887
	185	0.12711	0.555	0.17428	0.21571
	240	0.09711	0.540	0.16955	0.19539
	300	0.07784	0.528	0.16596	0.18331
	400	0.06150	0.517	0.16234	0.17360
	500	0.04868	0.506	0.15909	0.16637
	630	0.03865	0.495	0.15557	0.16030
	800	0.03140	0.485	0.15249	0.15569
	1,000	0.02633	0.474	0.14892	0.15123

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2
Insulation : Cross-Linked polyethylene (XLPE)
Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue
Shield : Copper tape
Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_o/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line
Insulation shield layer : Semi-conducting covering remove at splices or terminals
Testing voltage : 63,000 Volts
Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1
***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number of wires minimum (No.)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	35	6	8.9	3.1	68	0.524	4,680	183	4,300	500/D
	50	6	8.0	3.2	67	0.387	4,010	218	4,500	500/D
	70	12	8.0	3.3	71	0.268	3,620	270	5,500	300/D
	95	15	8.0	3.4	75	0.193	3,260	328	6,500	300/D
	120	18	8.0	3.5	79	0.153	3,020	377	7,500	300/D
	150	18	8.0	3.6	82	0.124	2,820	428	8,500	300/D
	185	30	8.0	3.7	86	0.0991	2,620	491	10,000	300/D
	240	34	8.0	3.9	91	0.0754	2,370	579	12,000	300/D
	300	34	8.0	4.0	97	0.0601	2,190	664	14,000	300/D
	400	53	8.0	4.3	103	0.0470	2,000	767	17,000	200/D

* Remark : Special protection can be produced

D : Packing in drum

THWA

TIS 293-2541

750 V 70°C ALUMINIUM CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid and stranded hard drawn aluminium wires
Size 10 mm^2 up to 500 mm^2

Insulation : Polyvinyl chloride (PVC)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 750 Volts

Testing voltage : 2,500 Volts
Reference standard : TIS 293-2541, Table 1

APPLICATION

For aerial cable (Service & Main)

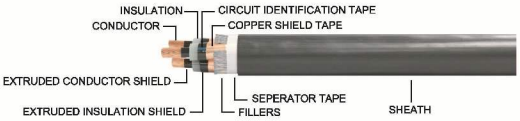
Nominal cross sectional area (mm²)	Number and diameter of wires (No./mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Breaking strength of conductor minimum (N)	continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
10	1/3.49	1.1	6.0	3.08	0.0078	1,562	52	50	500/C
10	7/1.32	1.1	6.5	3.08	0.0070	1,769	52	55	500/C
16	1/4.43	1.1	7.0	1.91	0.0064	2,445	70	70	500/C
16	7/1.68	1.1	7.6	1.91	0.0058	2,781	70	80	500/C
25	7/2.12	1.3	9.3	1.20	0.0055	4,241	95	120	300/C
35	7/2.49	1.3	10.5	0.868	0.0048	5,703	117	160	200/C
50	7/2.90	1.5	12.0	0.641	0.0047	7,423	143	210	200/C
50	19/1.76	1.5	12.5	0.641	0.0047	8,114	143	210	200/C
70	19/2.12	1.5	14.0	0.443	0.0040	11,487	185	280	100/C
95	19/2.49	1.7	16.5	0.320	0.0038	15,470	226	390	100/C
120	19/2.80	1.7	18.0	0.253	0.0035	18,810	264	470	500/D
120	37/2.01	1.7	18.0	0.253	0.0034	20,114	264	470	500/D
150	37/2.23	1.9	20.0	0.206	0.0035	24,704	302	600	500/D
185	37/2.50	2.1	22.0	0.164	0.0034	30,187	352	700	500/D
240	61/2.23	2.3	25.0	0.125	0.0033	38,568	421	900	500/D
300	61/2.49	2.5	28.0	0.100	0.0032	46,901	487	1,100	500/D
400	61/2.82	2.7	32.0	0.0778	0.0031	57,948	574	1,400	500/D
500	61/3.20	3.1	36.0	0.0605	0.0031	73,194	675	1,900	500/D

C : Packing in coil
D : Packing in drum

18/30KV-CV

IEC 60502-2

18/30(36)kV 90° C CROSS-LINKED POLYETHYLENE INSULATED AND PVC SHEATHED POWER CABLE



CABLE STRUCTURE

Conductor : Compact round stranded annealed copper,
Single-core : Sizes 35 mm^2 up to 1,000 mm^2
Multi-cores : Sizes 35 mm^2 up to 400 mm^2

Insulation : Cross-Linked polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
3 Cores : White, Red, and Blue

Shield : Copper tape

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 36,000 Volts
Rated voltage (U_o/U) 18/30 kV
18,000 Volts between Line-to-Earth
30,000 Volts between Line-to-Line

Insulation shield layer : Semi-conducting covering remove at splices or terminals

Testing voltage : 63,000 Volts

Reference standard : IEC 60502-2, IEC 60228, IEC 60332-1

***Remark**

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	35	0.66830	0.464	0.14591	0.68404
	50	0.49370	0.427	0.13414	0.51160
	70	0.34200	0.403	0.12655	0.36466
	95	0.24661	0.381	0.11979	0.27416
	120	0.19570	0.367	0.11518	0.22708
	150	0.15890	0.355	0.11150	0.19412
	185	0.12740	0.343	0.10766	0.16680
	240	0.09745	0.328	0.10315	0.14190
	300	0.07850	0.317	0.09972	0.12691
	400	0.06240	0.307	0.09631	0.11476

THWA-C

TIS 293-2541

750 V 70°C COMPACTED ALUMINIUM CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Compact stranded hard drawn aluminium wires
Sizes 10 mm^2 up to 500 mm^2

Insulation : Polyvinyl chloride (PVC)
Color : Black

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 750 Volts

Testing voltage : 2,500 Volts
Reference standard : TIS 293-2541, Table 2

APPLICATION

For aerial cable (Service & Main)

Nominal cross sectional area (mm^2)	Actual cross sectional area (mm^2)	Minimum number of wires (No.)	Compact conductor diameter approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20° C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Breaking strength of conductor minimum (N)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
10	9.64	6	3.72	1.1	6.3	3.08	0.0084	1,768	52	50	500/C
16	15.55	6	4.69	1.1	7.2	1.91	0.0068	2,734	69	75	500/C
25	24.75	6	5.90	1.3	8.8	1.20	0.0064	4,120	93	110	300/C
35	34.21	6	6.95	1.3	9.9	0.868	0.0056	5,591	115	150	300/C
50	46.32	6	8.01	1.5	11.5	0.641	0.0059	7,313	141	200	200/C
70	67.03	12	9.73	1.5	13.5	0.443	0.0050	10,420	178	270	100/C
95	92.79	15	11.40	1.7	15.5	0.320	0.0047	14,098	220	370	100/C
120	117.37	15	12.95	1.7	17.0	0.253	0.0042	18,518	258	460	100/C
150	144.15	15	14.27	1.9	18.5	0.206	0.0042	22,457	294	550	500/D
185	181.06	30	15.98	2.1	21.0	0.164	0.0042	28,974	342	700	500/D
240	237.55	30	18.47	2.3	24.0	0.125	0.0040	37,506	410	900	500/D
300	296.94	30	20.68	2.5	26.0	0.100	0.0038	45,642	475	1,100	500/D
400	381.67	53	23.39	2.7	30.0	0.0778	0.0036	56,992	560	1,400	500/D
500	490.81	53	26.67	3.1	34.0	0.0605	0.0037	72,195	659	1,800	500/D

C : Packing in coil
D : Packing in drum

ACSR

TIS 85-2548

ALUMINIUM CONDUCTOR STEEL REINFORCED

CABLE STRUCTURE

Conductor : Hard drawn aluminium wire
Sizes 16 mm^2 up to 680 mm^2

Steel Core : Galvanized steel (Zinc coated),solid and concentric stranded, sizes 2.5 mm^2 up to 85 mm^2

Stranding Direction
: The outermost layer Z

TECHNICAL DATA

Reference standard : TIS 85-2548

APPLICATION

For overhead transmission and distribution line

Nominal cross sectional area	ALUMINIUM		STEEL WIRE		Overall conductor diameter approx.	Conductor resistance at 20° C maximum	Breaking strength	Continuous current rating free air maximum	Cable weight approx.	Standard length
	Number and approx. diameter of wire	Cross sectional area	Number and approx. diameter of wire	Cross sectional area						
(mm^2)	(No./mm)	(mm^2)	(No./mm)	(mm^2)	(mm)	(Ω/km)	(kgf)	(A)	(kg/km)	(m)
16/2.5	6/1.80	15.3	1/1.80	2.54	5.40	1.880	592	90	60	4,000/D
25/4	6/2.25	23.9	1/2.25	3.98	6.75	1.203	916	125	95	4,000/D
35/6	6/2.70	34.4	1/2.70	5.73	8.10	0.8353	1,265	145	140	3,000/D
50/8	6/3.20	48.3	1/3.20	8.04	9.60	0.5947	1,716	170	200	3,000/D
50/30	12/2.33	51.2	7/2.33	29.85	11.50	0.5644	4,380	170	380	3,000/D
70/12	26/1.85	69.9	7/1.44	11.40	11.50	0.4131	2,676	290	280	3,000/D
95/15	26/2.15	94.4	7/1.67	15.33	13.50	0.3058	3,565	350	380	3,000/D
95/55	12/3.20	96.5	7/3.20	56.30	16.00	0.2993	7,965	350	700	3,000/D
120/20	26/2.44	121.6	7/1.90	19.85	15.50	0.2375	4,555	410	490	2,000/D
120/70	12/3.60	122.1	7/3.60	71.25	18.00	0.2365	10,034	410	900	2,000/D
125/30	30/2.33	127.9	7/2.33	29.85	16.00	0.2259	5,759	425	600	2,000/D
150/25	26/2.70	148.9	7/2.10	24.25	17.00	0.1939	5,513	470	600	2,000/D

D : Packing in drum

ACSR

TIS 85-2548

ALUMINIUM CONDUCTOR STEEL REINFORCED

GALVANIZED STEEL WIRE

HARD DRAWN ALUMINIUM WIRE

CABLE STRUCTURE

Conductor : Hard drawn aluminium wire
Sizes 16 mm^2 up to 680 mm^2

Steel Core : Galvanized steel (Zinc coated),solid and concentric stranded, sizes 2.5 mm^2 up to 85 mm^2

Stranding Direction
: The outermost layer Z

TECHNICAL DATA

Reference standard : TIS 85-2548

APPLICATION

For overhead transmission and distribution line

Nominal cross sectional area	ALUMINIUM		STEEL WIRE		Overall conductor diameter approx.	Conductor resistance at 20° C maximum	Breaking strength	Continuous current rating free air maximum	Cable weight approx.	Standard length
	Number and approx. diameter of wire	Cross sectional area	Number and approx. diameter of wire	Cross sectional area						
(mm^2)	(No./mm)	(mm^2)	(No./mm)	(mm^2)	(mm)	(Ω/km)	(kgf)	(A)	(kg/km)	(m)
170/40	30/2.70	171.8	7/2.70	40.08	18.50	0.1683	7,675	520	800	2,000/D
185/30	26/3.00	183.8	7/2.33	29.85	18.50	0.1571	6,618	535	750	2,000/D
210/35	26/3.20	209.1	7/2.49	34.09	20.00	0.1381	7,489	590	850	1,500/D
210/50	30/3.00	212.1	7/3.00	49.48	21.00	0.1363	9,390	610	1,000	1,500/D
230/10	24/3.50	230.9	7/2.33	29.85	21.00	0.1250	7,313	630	900	1,500/D
240/40	26/3.45	243.1	7/2.68	39.49	21.00	0.1188	8,640	645	1,000	1,500/D
265/35	24/3.74	263.7	7/2.49	34.10	22.00	0.1095	8,307	680	1,000	1,000/D
300/50	26/3.86	304.3	7/3.00	49.50	24.00	0.0949	10,702	740	1,200	1,000/D
305/40	54/2.68	304.6	7/2.68	39.50	24.00	0.0949	9,942	740	1,200	1,000/D
380/50	54/3.00	381.7	7/3.00	49.50	27.00	0.0758	12,312	840	1,500	1,000/D
435/55	54/3.20	434.3	7/3.20	56.30	28.00	0.0666	13,673	900	1,700	1,000/D
490/65	54/3.40	490.3	7/3.40	63.60	30.00	0.0590	15,343	960	1,900	1,000/D
550/70	54/3.60	549.7	7/3.60	71.30	32.00	0.0526	17,096	1,020	2,100	500/D
680/85	54/4.00	678.6	19/2.40	86.00	36.00	0.0426	12,040	1,150	2,600	500/D

D : Packing in drum

60227 IEC 01 THW

TIS 11 Part 3-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1.5 mm^2 up to 400 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 3-2553, Table 1

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1.5	1	0.7	2.6	3.2	12.1	0.011	21	21	100/C
1.5	2	0.7	2.7	3.3	12.1	0.010	21	22	100/C
2.5	1	0.8	3.2	3.9	7.41	0.010	29	32	100/C
2.5	2	0.8	3.3	4.0	7.41	0.009	29	35	100/C
4	1	0.8	3.6	4.4	4.61	0.0085	39	47	100/C
4	2	0.8	3.8	4.6	4.61	0.0077	39	50	100/C
6	1	0.8	4.1	5.0	3.08	0.0070	49	65	100/C
6	2	0.8	4.3	5.2	3.08	0.0065	49	70	100/C
10	1	1.0	5.3	6.4	1.83	0.0070	69	110	100/C
10	2	1.0	5.6	6.7	1.83	0.0065	69	120	100/C
16	2	1.0	6.4	7.8	1.15	0.0050	92	180	100/C
25	2	1.2	8.1	9.7	0.727	0.0050	125	280	100/C
35	2	1.2	9.0	10.9	0.524	0.0043	154	370	100/C
50	2	1.4	10.6	12.8	0.387	0.0043	188	500	500/D
70	2	1.4	12.1	14.6	0.268	0.0035	239	700	500/D
95	2	1.6	14.1	17.1	0.193	0.0035	297	1,000	500/D
120	2	1.6	15.6	18.8	0.153	0.0032	347	1,200	500/D
150	2	1.8	17.3	20.9	0.124	0.0032	398	1,500	500/D
185	2	2.0	19.3	23.3	0.0991	0.0032	461	1,900	500/D
240	2	2.2	22.0	26.6	0.0754	0.0032	552	2,500	500/D
300	2	2.4	24.5	29.6	0.0601	0.0030	640	3,100	500/D
400	2	2.6	27.5	33.2	0.0470	0.0028	749	3,900	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 01 THW

TIS 11 Part 3-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1.5 mm^2 up to 400 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 3-2553, Table 1

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Size mm^2	A.C. Resistance R (Ohm/km.)	Inductance L (mH/km.)	Reactance XL (Ohm/km.)	Impedance Z (Ohm/km.)
1.5(1)	14.5	0.53540	0.1682	14.5010
1.5(7)	14.5	0.52489	0.1649	14.5009
2.5(1)	8.87	0.50866	0.1598	8.8714
2.5(7)	8.87	0.50102	0.1574	8.8714
4(1)	5.52	0.49847	0.1566	5.5222
4(7)	5.52	0.48701	0.1530	5.5221
6(1)	3.69	0.47174	0.1482	3.6930
6(7)	3.69	0.47174	0.1482	3.6930
10(1)	2.19	0.47174	0.1461	2.1949
10(7)	2.19	0.46505	0.1461	2.1949
16	1.38	0.44786	0.1407	1.3872
25	0.861	0.44532	0.1399	0.8723
35	0.6271	0.43481	0.1366	0.6418
50	0.4633	0.43481	0.1366	0.4830
70	0.3210	0.42590	0.1338	0.3478
95	0.2314	0.42367	0.1331	0.2669
120	0.1837	0.41953	0.1318	0.2261
150	0.1492	0.41921	0.1317	0.1990
185	0.1196	0.41858	0.1315	0.1778
240	0.0915	0.41635	0.1308	0.1596
300	0.0736	0.41508	0.1304	0.1497
400	0.0583	0.41317	0.1298	0.1423

(_) : No of copper wire

60227 IEC 10 NYY

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey
or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	1.5	1	0.7	0.4	1.2	7.6	10.0	12.1	0.011	19	120	100/C
	1.5	2	0.7	0.4	1.2	7.8	10.5	12.1	0.010	19	130	100/C
	2.5	1	0.8	0.4	1.2	8.6	11.5	7.41	0.010	26	160	100/C
	2.5	2	0.8	0.4	1.2	9.0	12.0	7.41	0.009	26	180	100/C
	4	1	0.8	0.4	1.2	9.6	12.5	4.61	0.0085	34	210	100/C
	4	2	0.8	0.4	1.2	10.0	13.0	4.61	0.0077	34	220	100/C
	6	1	0.8	0.4	1.2	10.5	13.5	3.08	0.0070	44	270	100/C
	6	2	0.8	0.4	1.2	11.0	14.0	3.08	0.0065	44	190	100/C
	10	1	1.0	0.6	1.4	13.0	16.5	1.83	0.0070	60	420	500/D
	10	2	1.0	0.6	1.4	13.5	17.5	1.83	0.0065	60	460	500/D
	16	2	1.0	0.6	1.4	15.5	20.0	1.15	0.0052	80	650	500/D
	25	2	1.2	0.8	1.4	18.5	24.0	0.727	0.0050	107	950	500/D
	35	2	1.2	1.0	1.6	21.0	27.5	0.524	0.0044	131	1,300	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
2	1.5 (1)	14.47766	0.33715	0.10592	14.47805
	1.5 (7)	14.47766	0.32216	0.10121	14.47801
	2.5 (1)	8.86608	0.32386	0.10174	8.86666
	2.5 (7)	8.86608	0.31600	0.09928	8.86664
	4 (1)	5.51589	0.30370	0.09541	5.51672
	4 (7)	5.51589	0.29313	0.09209	5.51666
	6 (1)	3.68527	0.28640	0.08997	3.68636
	6 (7)	3.68527	0.27891	0.08762	3.68631
	10 (1)	2.18967	0.28221	0.08866	2.19147
	10 (7)	2.18968	0.27380	0.08602	2.19137
	16 (7)	1.37612	0.25760	0.08093	1.37850
	25 (7)	0.87009	0.25619	0.08048	0.87380
	35 (19)	0.62731	0.24617	0.07734	0.63206

( ) : No of copper wire

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey
or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	1.5	1	0.7	0.4	1.2	8.0	10.5	12.1	0.011	17	140	100/C
	1.5	2	0.7	0.4	1.2	8.2	11.0	12.1	0.010	17	150	100/C
	2.5	1	0.8	0.4	1.2	9.2	12.0	7.41	0.010	22	190	100/C
	2.5	2	0.8	0.4	1.2	9.4	12.5	7.41	0.009	22	210	100/C
	4	1	0.8	0.4	1.2	10.0	13.0	4.61	0.0085	29	250	100/C
	4	2	0.8	0.4	1.2	10.5	13.5	4.61	0.0077	29	270	100/C
	6	1	0.8	0.4	1.4	11.5	14.5	3.08	0.0070	37	340	100/C
	6	2	0.8	0.4	1.4	12.0	15.5	3.08	0.0065	37	370	100/C
	10	1	1.0	0.6	1.4	14.0	17.5	1.83	0.0070	52	520	500/D
	10	2	1.0	0.6	1.4	14.5	19.0	1.83	0.0065	52	570	500/D
	16	2	1.0	0.8	1.4	16.5	27.5	1.15	0.0052	69	810	500/D
	25	2	1.2	0.8	1.6	20.5	26.0	0.727	0.0050	92	1,200	500/D
	35	2	1.2	1.0	1.6	22.0	29.0	0.524	0.0040	113	1,600	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	1.5 (1)	14.47766	0.33715	0.10592	14.47805
	1.5 (7)	14.47766	0.32216	0.10121	14.47801
	2.5 (1)	8.86608	0.32386	0.10174	8.86666
	2.5 (7)	8.86608	0.31600	0.09928	8.86664
	4 (1)	5.51589	0.30370	0.09541	5.51672
	4 (7)	5.51589	0.29313	0.09209	5.51666
	6 (1)	3.68527	0.28640	0.08997	3.68636
	6 (7)	3.68527	0.27891	0.08762	3.68631
	10 (1)	2.18967	0.28221	0.08866	2.19147
	10 (7)	2.18968	0.27380	0.08602	2.19137
	16 (7)	1.37612	0.25760	0.08093	1.37850
	25 (7)	0.87009	0.25619	0.08048	0.87380
	35 (19)	0.62731	0.24617	0.07734	0.63206

(_) : No of copper wire

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard :TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
4	1.5	1	0.7	0.4	1.2	8.6	11.5	12.1	0.011	17	160	100/C
	1.5	2	0.7	0.4	1.2	9.0	12.0	12.1	0.010	17	180	100/C
	2.5	1	0.8	0.4	1.2	10.0	13.0	7.41	0.010	22	230	100/C
	2.5	2	0.8	0.4	1.2	10.0	13.5	7.41	0.009	22	250	100/C
	4	1	0.8	0.4	1.4	11.5	14.5	4.61	0.0085	29	320	100/C
	4	2	0.8	0.4	1.4	12.0	15.0	4.61	0.0077	29	340	100/C
	6	1	0.8	0.6	1.4	12.5	16.0	3.08	0.0070	37	440	500/D
	6	2	0.8	0.6	1.4	13.0	17.0	3.08	0.0065	37	470	500/D
	10	1	1.0	0.6	1.4	15.5	19.0	1.83	0.0070	52	660	500/D
	10	2	1.0	0.6	1.4	16.0	20.5	1.83	0.0065	52	700	500/D
	16	2	1.0	0.8	1.4	18.0	23.5	1.15	0.0052	69	1,000	500/D
	25	2	1.2	1.0	1.6	22.5	28.5	0.727	0.0050	92	1,600	500/D
	35	2	1.2	1.0	1.6	24.5	32.0	0.524	0.0044	113	2,000	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores: Blue and Brown
3 Cores: Brown, Black and Grey
or Blue, Brown and Green/Yellow
4 Cores: Blue, Brown, Black and Grey
or Brown, Black, Grey and Green/Yellow
5 Cores: Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard :TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm^2)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
4	1.5 (1)	14.47766	0.37758	0.11862	14.47814
	1.5 (7)	14.47766	0.36259	0.11391	14.47811
	2.5 (1)	8.86608	0.36428	0.11444	8.86682
	2.5 (7)	8.86608	0.35643	0.11198	8.86679
	4 (1)	5.51589	0.34413	0.10811	5.51695
	4 (7)	5.51589	0.33356	0.10479	5.51689
	6 (1)	3.68526	0.32682	0.10267	3.68669
	6 (7)	3.68526	0.31933	0.10032	3.68662
	10 (1)	2.18966	0.32263	0.10136	2.19201
	10 (7)	2.18966	0.31422	0.09872	2.19189
	16 (7)	1.37609	0.29802	0.09363	1.37927
	25 (7)	0.87004	0.29662	0.09318	0.87502
	35 (19)	0.62724	0.28659	0.09004	0.63367

( ) : No of copper wire

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
5	1.5	1	0.7	0.7	1.2	9.4	12.0	12.1	0.011	17	200	100/C
	1.5	2	0.7	0.7	1.2	9.8	12.5	12.1	0.010	17	220	100/C
	2.5	1	0.8	0.8	1.2	11.0	14.0	7.41	0.010	22	280	100/C
	2.5	2	0.8	0.8	1.2	11.0	14.5	7.41	0.009	22	310	100/C
	4	1	0.8	0.8	1.4	12.5	16.0	4.61	0.0085	29	410	100/C
	4	2	0.8	0.8	1.4	13.0	17.0	4.61	0.0077	29	430	100/C
	6	1	0.8	0.8	1.4	13.5	17.5	3.08	0.0070	37	530	500/D
	6	2	0.8	0.8	1.4	14.5	18.5	3.08	0.0065	37	570	500/D
	10	1	1.0	1.0	1.4	17.0	21.0	1.83	0.0070	52	800	500/D
	10	2	1.0	1.0	1.4	17.5	22.0	1.83	0.0065	52	870	500/D
	16	2	1.0	1.0	1.6	20.5	26.0	1.15	0.0052	69	1,300	500/D
	25	2	1.2	1.2	1.6	24.5	31.5	0.727	0.0050	92	1,900	500/D
	35	2	1.2	1.2	1.6	27.0	35.0	0.524	0.0044	113	2,500	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

60227 IEC 10 NYY or 60227 IEC 10 NYY-G

TIS 11 Part 4-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper, Multi-core
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey or Blue, Brown and Green/Yellow
4 Cores : Blue, Brown, Black and Grey or Brown, Black, Grey and Green/Yellow
5 Cores : Blue, Brown, Black, Grey and Black or Blue, Brown, Black, Grey and Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70ºC
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553, Table 1

APPLICATION

For installation exposed, or in raceway, wet or dry location.

Number of core	Nominal cross section area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
5	1.5 (1)	14.47766	0.37758	0.11862	14.47814
	1.5 (7)	14.47766	0.36259	0.11391	14.47811
	2.5 (1)	8.86608	0.36428	0.11444	8.86682
	2.5 (7)	8.86608	0.35643	0.11198	8.86679
	4 (1)	5.51589	0.34413	0.10811	5.51695
	4 (7)	5.51589	0.33356	0.10479	5.51689
	6 (1)	3.68526	0.32682	0.10267	3.68669
	6 (7)	3.68526	0.31933	0.10032	3.68662
	10 (1)	2.18966	0.32263	0.10136	2.19201
	10 (7)	2.18966	0.31422	0.09872	2.19189
	16 (7)	1.37609	0.29802	0.09363	1.37927
	25 (7)	0.87004	0.29662	0.09318	0.87502
	35 (19)	0.62724	0.28659	0.09004	0.63367

( ) : No of copper wire

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 3

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area	Class of conductor	Insulation thickness nominal	Outer sheath thickness nominal	Overall diameter diameter maximum	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	Continuous current rating maximum		Cable weight approx.	Standard length
								Free air at 40 °C	Under ground at 30 °C		
	(mm²)		(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(A)	(kg/km)	(m)
1	1	1	1.5	1.8	8.6	18.1	0.0207	19	25	80	100/C
	1	2	1.5	1.8	8.8	18.1	0.0200	19	25	80	100/C
	1.5	1	1.5	1.8	9.0	12.1	0.0184	24	31	85	100/C
	1.5	2	1.5	1.8	9.2	12.1	0.0175	24	31	90	100/C
	2.5	1	1.5	1.8	9.4	7.41	0.0157	32	41	100	100/C
	2.5	2	1.5	1.8	9.8	7.41	0.0146	32	41	110	100/C
	4	1	1.5	1.8	10.0	4.61	0.0135	43	53	120	100/C
	4	2	1.5	1.8	10.5	4.61	0.0124	43	53	130	100/C
	6	2	1.5	1.8	11.0	3.08	0.0107	54	68	160	100/C
	10	2	1.5	1.8	12.0	1.83	0.0088	73	79	210	500/D
	16	2	1.5	1.8	13.0	1.15	0.0074	97	118	280	500/D
	25	2	1.5	1.8	14.5	0.727	0.0061	129	153	390	500/D
	35	2	1.5	1.8	16.0	0.524	0.0053	159	185	490	500/D
	50	2	1.5	1.8	17.0	0.387	0.0046	191	220	620	500/D
	70	2	1.5	1.8	19.0	0.268	0.0039	241	271	850	500/D
	95	2	1.7	1.8	21.5	0.193	0.0038	297	326	1,100	500/D
	120	2	1.7	1.8	23.0	0.153	0.0034	345	372	1,400	500/D
	150	2	1.9	2.0	26.0	0.124	0.0034	397	418	1,700	500/D
	185	2	2.1	2.0	28.0	0.0991	0.0034	456	473	2,100	500/D
	240	2	2.3	2.2	31.5	0.0754	0.0033	541	549	2,700	500/D
	300	2	2.5	2.2	35.0	0.0601	0.0032	628	624	3,400	500/D
	400	2	2.7	2.2	38.5	0.0470	0.0030	733	713	4,300	500/D
	500	2	3.1	2.4	43.0	0.0366	0.0031	848	810	5,400	500/D

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil
D : Packing in drum

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core Identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 3

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1 (1)	21.6987	0.770	0.24186	21.70000
	1 (7)	21.6987	0.758	0.23808	21.70000
	1.5 (1)	14.4982	0.735	0.23082	14.50000
	1.5 (7)	14.4982	0.720	0.22632	14.50000
	2.5 (1)	8.8703	0.693	0.21775	8.87300
	2.5 (7)	8.8705	0.675	0.21222	8.87300
	4 (1)	5.5201	0.657	0.20650	5.52400
	4 (7)	5.5204	0.639	0.20063	5.52400
	6	3.6900	0.610	0.19176	3.69500
	10	2.1896	0.575	0.18068	2.19700
	16	1.3804	0.546	0.17162	1.39100
	25	0.8610	0.522	0.16403	0.87649
	35	0.6271	0.504	0.15837	0.64679
	50	0.4633	0.490	0.15379	0.48816
	70	0.3210	0.474	0.14896	0.35388
	95	0.2314	0.466	0.14636	0.27380
	120	0.1836	0.458	0.14393	0.23329
	150	0.1491	0.458	0.14380	0.20715
	185	0.1195	0.453	0.14243	0.18592
	240	0.0914	0.450	0.14140	0.16837
	300	0.0734	0.445	0.13994	0.15802
	400	0.0582	0.441	0.13846	0.15018
	500	0.0462	0.411	0.13844	0.14595

(_) : No of copper wire

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core: Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 4

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area	Class of conductor	Insulation thickness nominal	Inner sheath thickness nominal	Outer sheath thickness nominal	Overall diameter maximum	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	Continuous current rating maximum		Cable weight approx.	Standard length
									Free air at 40 °C	Under ground at 30 °C		
	(mm²)		(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(A)	(kg/km)	(m)
2	50	2	1.5	1.2	2.2	33.5	0.387	0.0046	160	195	1,800	500/D
	70	2	1.5	1.5	2.2	38.0	0.268	0.0039	200	239	2,400	500/D
	95	2	1.7	1.5	2.2	42.5	0.193	0.0038	245	288	3,200	500/D
	120	2	1.7	1.5	2.4	46.5	0.153	0.0034	285	329	3,900	500/D
	150	2	1.9	1.8	2.6	52.0	0.124	0.0034	325	368	4,800	500/D
	185	2	2.1	1.8	2.8	57.0	0.0991	0.0034	374	417	6,000	500/D
	240	2	2.3	2.0	3.0	64.0	0.0754	0.0033	440	481	7,500	300/D
	300	2	2.5	2.0	3.2	70.5	0.0601	0.0032	505	541	9,500	300/D

Class of conductor 2 : Strand D : Packing in drum

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
2	50	0.4635	0.250	0.07856	0.47011
	70	0.3214	0.241	0.07570	0.33019
	95	0.2319	0.239	0.07505	0.24374
	120	0.1843	0.235	0.07376	0.19851
	150	0.1499	0.234	0.07364	0.16701
	185	0.1205	0.234	0.07342	0.14111
	240	0.0928	0.232	0.07275	0.11793
	300	0.0752	0.230	0.07228	0.10427

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core Identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 4

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum Free air at 40 °C (A)	Continuous current rating maximum Under ground at 30 °C (A)	Cable weight approx. (kg/km)	Standard length (m)
3	50	2	1.5	1.2	2.2	36.0	0.387	0.0046	136	164	1,800	500/D
	70	2	1.5	1.5	2.2	40.5	0.268	0.0039	174	205	2,400	500/D
	95	2	1.7	1.5	2.2	46.0	0.193	0.0038	213	245	3,200	500/D
	120	2	1.7	1.5	2.4	50.5	0.153	0.0034	247	279	3,900	500/D
	150	2	1.9	1.8	2.6	56.0	0.124	0.0034	284	315	4,800	500/D
	185	2	2.1	1.8	2.8	61.5	0.0991	0.0034	325	355	6,000	300/D
	240	2	2.3	2.0	3.0	69.0	0.0754	0.0033	384	411	7,500	300/D
	300	2	2.5	2.0	3.2	76.0	0.0601	0.0032	438	462	9,500	200/D

Class of conductor 2 : Strand D : Packing in drum

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	50	0.4635	0.25000	0.07856	0.47011
	70	0.3214	0.24100	0.07570	0.33019
	95	0.2319	0.23900	0.07505	0.24374
	120	0.1843	0.23500	0.07376	0.19851
	150	0.1499	0.23400	0.07364	0.16701
	185	0.1205	0.23400	0.07342	0.14111
	240	0.0928	0.23200	0.07275	0.11793
	300	0.0752	0.23000	0.07228	0.10427

NYY

TIS 11 Part 101-2553

450/750 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED

CABLE STRUCTURE

Conductor : Solid and Stranded annealed copper
Single-core : Sizes 1 mm² up to 500 mm²
Multi-cores : Sizes 50 mm² up to 300 mm²
Insulation : Polyvinyl chloride (PVC/C)
Core identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Inner sheath : Black polyvinyl chloride (PVC) (Multi-cores only)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553 Table 4

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum Free air at 40 °C (A)	Continuous current rating maximum Under ground at 30 °C (A)	Cable weight approx. (kg/km)	Standard length (m)
4	50	2	1.5	1.5	2.2	39.5	0.387	0.0046	136	164	2,900	500/D
	70	2	1.5	1.5	2.4	44.5	0.268	0.0039	174	205	3,900	500/D
	95	2	1.7	1.8	2.6	51.5	0.193	0.0038	213	245	5,500	500/D
	120	2	1.7	1.8	2.8	56.0	0.153	0.0034	247	279	6,500	500/D
	150	2	1.9	2.0	3.0	62.0	0.124	0.0034	284	315	8,000	300/D
	185	2	2.1	2.0	3.2	68.0	0.0991	0.0034	325	355	10,000	300/D
	240	2	2.3	2.2	3.4	76.5	0.0754	0.0033	384	411	13,000	200/D
	300	2	2.5	2.2	3.8	85.0	0.0601	0.0032	438	462	16,000	200/D

Class of conductor 2 : Strand

D : Packing in drum

Number of core	Nominal cross sectional cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
4	50	0.4634	0.29700	0.09321	0.47268
	70	0.3213	0.28800	0.09035	0.33376
	95	0.2318	0.28600	0.08970	0.24855
	120	0.1842	0.28100	0.08842	0.20432
	150	0.1497	0.28100	0.08828	0.17379
	185	0.1203	0.28000	0.08809	0.14910
	240	0.0924	0.27800	0.08740	0.12722
	300	0.0747	0.27700	0.08694	0.11463

NYY-G

TIS 11 Part 101-2553

450/750 V 70°C STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED WITH GROUND

CABLE STRUCTURE

Conductor : Stranded annealed copper
: 2 cores up to 4 cores with ground
: Size 25 mm^2 up to 300 mm^2
Ground Wire : Stranded annealed copper,
: Size 16 mm^2 up to 150 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : : Brown, Black and Grey
4 Cores : : Blue, Brown, Black and Grey
Ground wire : Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 5

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum		Cable weight approx. (kg/km)	Standard length (m)
									Free air (A)	Under ground (A)		
2+G	25	2	1.3	1.2	2.0	28.0	0.727	0.0054	108	136	1,200	500/D
	16 (G)	2	1.1				1.15					
	35	2	1.3	1.2	2.0	30.0	0.524	0.0047	132	165	1,500	500/D
	16 (G)	2	1.1				1.15					
	50	2	1.5	1.2	2.2	34.0	0.387	0.0046	160	195	2,000	500/D
	25 (G)	2	1.3				0.727					
	70	2	1.5	1.5	2.2	38.5	0.268	0.0039	200	239	2,700	500/D
	35 (G)	2	1.3				0.524					
	95	2	1.7	1.5	2.2	43.5	0.193	0.0038	245	288	3,600	500/D
	50 (G)	2	1.5				0.387					
	120	2	1.7	1.5	2.4	47.5	0.153	0.0034	285	329	4,500	500/D
	70 (G)	2	1.5				0.268					
	150	2	1.9	1.8	2.6	53.0	0.124	0.0034	325	368	5,500	500/D
	95 (G)	2	1.7				0.193					
	185	2	2.1	1.8	2.8	57.5	0.0991	0.0034	374	417	6,500	500/D
	95 (G)	2	1.7				0.193					
	240	2	2.3	2.0	3.0	64.5	0.0754	0.0033	440	481	8,500	500/D
	120 (G)	2	1.7				0.153					
	300	2	2.5	2.0	3.2	71.0	0.0601	0.0032	505	541	10,500	300/D
	150 (G)	2	1.9				0.124					

Class of conductor 2 : Strand G : Ground conductor D : Packing in drum

NYY-G

TIS 11 Part 101-2553

450/750 V 70°C STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED WITH GROUND

CABLE STRUCTURE

Conductor : Stranded annealed copper
: 2 cores up to 4 cores with ground
: Size 25 mm^2 up to 300 mm^2
Ground Wire : Stranded annealed copper,
: Size 16 mm^2 up to 150 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : : Brown, Black and Grey
4 Cores : : Blue, Brown, Black and Grey
Ground wire : Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 5

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum		Cable weight approx. (kg/km)	Standard length (m)
									Free air (A)	Under ground (A)		
3+G	25	2	1.3	1.2	2.0	30.5	0.727	0.0054	94	117	1,500	500/D
	16 (G)	2	1.1				1.15					
	35	2	1.3	1.2	2.0	33.0	0.524	0.0047	115	141	1,900	500/D
	16 (G)	2	1.1				1.15					
	50	2	1.5	1.5	2.2	38.5	0.387	0.0046	136	164	2,600	500/D
	25 (G)	2	1.3				0.727					
	70	2	1.5	1.5	2.2	42.5	0.268	0.0039	174	205	3,500	500/D
	35 (G)	2	1.3				0.524					
	95	2	1.7	1.5	2.4	48.5	0.193	0.0038	213	245	4,700	500/D
	50 (G)	2	1.5				0.387					
	120	2	1.7	1.8	2.6	53.5	0.153	0.0034	247	279	6,000	500/D
	70 (G)	2	1.5				0.268					
	150	2	1.9	1.8	2.8	59.0	0.124	0.0034	284	315	7,500	500/D
	95 (G)	2	1.7				0.193					
	185	2	2.1	2.0	3.0	64.5	0.0991	0.0034	325	355	9,000	500/D
	95 (G)	2	1.7				0.193					
	240	2	2.3	2.0	3.2	72.0	0.0754	0.0033	384	411	11,500	300/D
	120 (G)	2	1.7				0.153					
	300	2	2.5	2.2	3.4	79.5	0.0601	0.0032	438	462	14,000	300/D
	150 (G)	2	1.9				0.124					

Class of conductor 2 : Strand G : Ground conductor D : Packing in drum

NYY-G

TIS 11 Part 101-2553

450/750 V 70°C STRANDED CONDUCTOR PVC INSULATED AND DOUBLE SHEATHED WITH GROUND

CABLE STRUCTURE

Conductor : Stranded annealed copper
: 2 cores up to 4 cores with ground
: Size 25 mm^2 up to 300 mm^2
Ground Wire : Stranded annealed copper,
: Size 16 mm^2 up to 150 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : : Brown, Black and Grey
4 Cores : : Blue, Brown, Black and Grey
Ground wire : Green/Yellow
Inner sheath : Black polyvinyl chloride (PVC)
Outer sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 5

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating maximum		Cable weight approx. (kg/km)	Standard length (m)
									Free air (A)	Under ground (A)		
4+G	25	2	1.3	1.2	2.0	34.0	0.727	0.0054	94	117	1,900	500/D
	16 (G)	2	1.1				1.15					
	35	2	1.3	1.5	2.2	39.0	0.524	0.0047	115	141	2,400	500/D
	16 (G)	2	1.1				1.15					
	50	2	1.5	1.5	2.2	43.5	0.387	0.0046	136	164	3,300	500/D
	25 (G)	2	1.3				0.727					
	70	2	1.5	1.5	2.4	49.0	0.268	0.0039	174	205	4,500	500/D
	35 (G)	2	1.3				0.524					
	95	2	1.7	1.8	2.6	56.5	0.193	0.0038	213	245	6,100	500/D
	50 (G)	2	1.5				0.387					
	120	2	1.7	1.8	2.8	61.5	0.153	0.0034	247	279	7,500	500/D
	70 (G)	2	1.5				0.268					
	150	2	1.9	2.0	3.0	68.0	0.124	0.0034	284	315	9,500	300/D
	95 (G)	2	1.7				0.193					
	185	2	2.1	2.0	3.2	75.0	0.0991	0.0034	325	355	11,500	300/D
	95 (G)	2	1.7				0.193					
	240	2	2.3	2.2	3.4	84.5	0.0754	0.0033	384	411	14,500	300/D
	120 (G)	2	1.7				0.153					
	300	2	2.5	2.2	3.8	93.5	0.0601	0.0032	438	462	18,000	200/D
	150 (G)	2	1.9				0.124					

Class of conductor 2 : Strand G : Ground conductor D : Packing in drum

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-core : Sizes 4 mm² up to 35 mm²
Multi-cores : Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core Identification

Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	4	5	0.9	1.4	8.6	4.95	0.0084	41	90	100/C
	6	5	0.9	1.4	9.4	3.30	0.0071	53	120	100/C
	10	5	1.1	1.8	12.0	1.91	0.0068	74	210	100/C
	16	5	1.1	1.8	13.5	1.21	0.0050	99	270	100/C
	25	5	1.3	2.2	16.0	0.780	0.0048	129	410	100/C
	35	5	1.3	2.2	17.5	0.554	0.0041	160	550	500/D
2	4	5	0.9	1.6	14.5	4.95	0.0084	34	230	100/C
	6	5	0.9	1.6	16.0	3.30	0.0071	44	320	100/C
	10	5	1.1	1.8	20.0	1.91	0.0068	63	500	500/D
	16	5	1.1	2.2	23.0	1.21	0.0050	82	700	500/D
	25	5	1.3	2.4	27.5	0.780	0.0048	108	1,000	500/D
	35	5	1.3	2.6	31.0	0.554	0.0041	133	1,400	500/D

Class of conductor 5 : Flexible

C : Packing in coil
D : Packing in drum

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-core : Sizes 4 mm² up to 35 mm²
Multi-cores : Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification
Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	4	5.9200	0.58267	0.18305	5.9228
	6	3.9500	0.54956	0.17265	3.9538
	10	2.2900	0.54230	0.17037	2.2963
	16	1.4500	0.52085	0.16363	1.4592
	25	0.9334	0.51783	0.16268	0.9475
	35	0.6630	0.49968	0.15698	0.6813
2	4	5.9200	0.29835	0.09373	5.9207
	6	3.9500	0.27741	0.08715	3.9510
	10	2.2900	0.29736	0.08474	2.4418
	16	1.4520	0.25745	0.08088	1.4543
	25	0.9369	0.25468	0.08001	0.9403
	35	0.6677	0.24497	0.07696	0.6721

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-core : Sizes 4 mm² up to 35 mm²
Multi-cores : Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification

Single-core : Black
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	4	5	0.9	1.6	15.5	4.95	0.0084	29	280	100/C
	6	5	0.9	1.8	17.5	3.30	0.0071	38	390	100/C
	10	5	1.1	2.0	21.5	1.91	0.0068	53	650	500/D
	16	5	1.1	2.4	25.0	1.21	0.0050	71	900	500/D
	25	5	1.3	2.6	30.0	0.780	0.0048	94	1,300	500/D
	35	5	1.3	2.8	33.5	0.554	0.0041	116	1,700	500/D
4	4	5	0.9	1.8	17.0	4.95	0.0084	29	350	100/C
	6	5	0.9	2.0	19.5	3.30	0.0071	38	490	100/C
	10	5	1.1	2.2	24.0	1.91	0.0068	53	800	500/D
	16	5	1.1	2.6	28.0	1.21	0.0050	71	1,100	500/D
	25	5	1.3	2.8	33.0	0.780	0.0048	94	1,700	500/D
	35	5	1.3	3.1	37.0	0.554	0.0041	116	2,200	500/D

Class of conductor 5 : Flexible

C : Packing in coil
D : Packing in drum

VCT

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Single-c : Sizes 4 mm² up to 35 mm²
Multi-cor: Sizes 4 mm² up to 35 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification
Single-co : Black
2 Cores : Brown and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 7

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
3	4	5.9200	0.29835	0.09373	5.9207
	6	3.9500	0.27741	0.08715	3.9510
	10	2.2900	0.26977	0.08475	2.2916
	16	1.4500	0.25745	0.08088	1.4523
	25	0.9335	0.25468	0.08001	0.9369
	35	0.6632	0.24497	0.07696	0.6677
4	4	5.9200	0.34495	0.10837	5.9210
	6	3.9500	0.32410	0.10182	3.9513
	10	2.2900	0.31624	0.09935	2.2922
	16	1.4500	0.30417	0.09556	1.7366
	25	0.9335	0.30171	0.09469	0.9383
	35	0.6631	0.29062	0.09130	0.6694

VCT-G

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 35 mm²
Ground wire : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 16 mm²
Insulation : Polyvinyl chloride (PVC/D)
Core identification
2 Cores : Blue and Brown
3 Cores : Blue,Brown and Grey
4 Cores : Blue,Brown,Black and Grey
Ground core : Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line
Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 8

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2+G	4	5	0.9	1.6	15.5	4.95	0.0084	34	280	100/C
	4 (G)	5	0.9			4.95				
	6	5	0.9	1.8	17.5	3.30	0.0071	44	400	100/C
	6 (G)	5	0.9			3.30				
	10	5	1.1	2.0	21.5	1.91	0.0068	63	650	500/D
	10 (G)	5	1.1			1.91				
	16	5	1.1	2.4	25.0	1.21	0.0050	82	900	500/D
	16 (G)	5	1.1			1.21				
	25	5	1.3	2.6	28.5	0.780	0.0048	108	1,200	500/D
	16 (G)	5	1.1			1.21				
	35	5	1.3	2.8	31.5	0.554	0.0041	133	1,500	500/D
	16 (G)	5	1.1			1.21				

Class of conductor 5 : Flexible

G : Ground conductor

C : Packing in coil
D : Packing in drum

VCT-G

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 35 mm²
Ground wire : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 16 mm²
Insulation : Polyvinyl chloride (PVC/D)
Core identification
2 Cores : Blue and Brown
3 Cores : Blue,Brown and Grey
4 Cores : Blue,Brown,Black and Grey
Ground core : Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line
Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 8

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3+G	4	5	0.9	1.8	17.0	4.95	0.0084	29	360	100/C
	4 (G)	5	0.9			4.95				
	6	5	0.9	2.0	19.5	3.30	0.0071	38	500	100/C
	6 (G)	5	0.9			3.30				
	10	5	1.1	2.2	24.0	1.91	0.0068	53	800	500/D
	10 (G)	5	1.1			1.91				
	16	5	1.1	2.6	28.0	1.21	0.0050	71	1,200	500/D
	16 (G)	5	1.1			1.21				
	25	5	1.3	2.8	33.0	0.780	0.0048	94	1,600	500/D
	16 (G)	5	1.1			1.21				
	35	5	1.3	3.1	37.0	0.554	0.0041	118	2,100	500/D
	16 (G)	5	1.1			1.21				

Class of conductor 5 : Flexible

G : Ground conductor

C : Packing in coil
D : Packing in drum

VCT-G

TIS 11 Part 101-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 35 mm²

Ground wire : Flexible annealed copper
Multi-cores : Sizes 4 mm² up to 16 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification
2 Cores : Blue and Brown
3 Cores : Blue,Brown and Grey
4 Cores : Blue,Brown,Black and Grey
Ground core : Green/Yellow

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification: Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 101-2553, Table 8

APPLICATION

For mobile-electrical equipment used in mines, factories, farm or household appliances. This cable is suitable for use in places where cables come in contact with oils.

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
4+G	4	5	0.9	1.8	18.5	4.95	0.0084	29	440	100/C
	4 (G)	5	0.9			4.95				
	6	5	0.9	2.0	21.5	3.30	0.0071	38	600	500/D
	6 (G)	5	0.9			3.30				
	10	5	1.1	2.2	26.5	1.91	0.0068	53	1,000	500/D
	10 (G)	5	1.1			1.91				
	16	5	1.1	2.6	30.5	1.21	0.0050	71	1,400	500/D
	16 (G)	5	1.1			1.21				
	25	5	1.3	2.8	36.5	0.780	0.0048	94	2,000	500/D
	16 (G)	5	1.1			1.21				
	35	5	1.3	3.1	41.5	0.554	0.0041	116	2,600	500/D
	16 (G)	5	1.1			1.21				

Class of conductor 5 : Flexible

G : Ground conductor

C : Packing in coil
D : Packing in drum

500V-NYY-SWA

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 1.5 mm^2 up to 35 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core Identification

2 Cores : Blue and Brown

3 Cores : Brown, Black and Grey

4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification :Maximum conductor temperature 70°C
:Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
	1.5	1/1.38	0.7	0.4	0.8	1.8	12.5	12.1	0.011	29	300	500/D
	1.5	7/0.53	0.7	0.4	0.8	1.8	13.0	12.1	0.010	29	310	500/D
	2.5	1/1.78	0.8	0.4	0.8	1.8	14.0	7.41	0.010	38	320	500/D
	2.5	7/0.67	0.8	0.4	0.8	1.8	14.5	7.41	0.009	38	340	500/D
	4	1/2.25	0.8	0.4	0.8	1.8	15.0	4.61	0.0085	50	370	500/D
2	4	7/0.85	0.8	0.4	0.8	1.8	15.5	4.61	0.0077	50	400	500/D
	6	7/1.04	0.8	0.4	0.8	1.8	17.5	3.08	0.0065	63	600	500/D
	10	7/1.35	1.0	0.6	1.25	1.8	21.0	1.83	0.0065	84	950	500/D
	16	7/1.70	1.0	0.6	1.6	1.8	24.0	1.15	0.0052	109	1,300	500/D
	25	7/2.14	1.2	0.8	1.6	1.8	28.0	0.727	0.0050	141	2,000	500/D
	35	19/1.53	1.2	1.0	2.0	1.9	31.0	0.524	0.0044	169	2,400	500/D

D : Packing in drum

500V-NYY-SWA

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 1.5 mm^2 up to 35 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

3 Cores : Brown, Black and Grey

4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	1.5	1/1.38	0.7	0.4	0.8	1.8	13.0	12.1	0.011	25	330	500/D
	1.5	7/0.53	0.7	0.4	0.8	1.8	13.5	12.1	0.010	25	340	500/D
	2.5	1/1.78	0.8	0.4	0.8	1.8	14.5	7.41	0.010	33	350	500/D
	2.5	7/0.67	0.8	0.4	0.8	1.8	15.0	7.41	0.009	33	380	500/D
	4	1/2.25	0.8	0.4	0.8	1.8	15.5	4.61	0.0085	43	420	500/D
	4	7/0.85	0.8	0.4	0.8	1.8	16.0	4.61	0.0077	43	450	500/D
	6	7/1.04	0.8	0.4	1.25	1.8	18.5	3.08	0.0065	54	700	500/D
	10	7/1.35	1.0	0.6	1.25	1.8	22.0	1.83	0.0065	71	1,200	500/D
	16	7/1.70	1.0	0.8	1.6	1.8	25.0	1.15	0.0052	93	1,600	500/D
	25	7/2.14	1.2	0.8	2.0	1.9	30.0	0.727	0.0050	120	2,300	500/D
	35	19/1.53	1.2	1.0	2.0	2.0	33.0	0.524	0.0044	144	2,800	500/D

D : Packing in drum

500V-NYY-SWA

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 1.5 mm^2 up to 35 mm^2
Insulation : Polyvinyl chloride (PVC/C)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request
Armor : Galvanized Steel Wires
Inner Sheath : Black polyvinyl chloride (PVC)
Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
4	1.5	1/1.38	0.7	0.4	0.8	1.8	13.5	12.1	0.011	25	360	500/D
	1.5	7/0.53	0.7	0.4	0.8	1.8	14.0	12.1	0.010	25	380	500/D
	2.5	1/1.78	0.8	0.4	0.8	1.8	15.5	7.41	0.010	33	400	500/D
	2.5	7/0.67	0.8	0.4	0.8	1.8	16.0	7.41	0.009	33	420	500/D
	4	1/2.25	0.8	0.4	1.25	1.8	17.5	4.61	0.0085	43	480	500/D
	4	7/0.85	0.8	0.4	1.25	1.8	18.5	4.61	0.0077	43	650	500/D
	6	7/1.04	0.8	0.6	1.25	1.8	20.0	3.08	0.0065	54	800	500/D
	10	7/1.35	1.0	0.6	1.6	1.8	24.0	1.83	0.0065	71	1,400	500/D
	16	7/1.70	1.0	0.8	1.6	1.8	27.0	1.15	0.0052	93	1,800	500/D
	25	7/2.14	1.2	1.0	2.0	2.0	33.0	0.727	0.0050	120	2,800	500/D
	35	19/1.53	1.2	1.0	2.0	2.1	36.0	0.524	0.0044	144	3,500	500/D

D : Packing in drum

60227 IEC 02 THW (f)

TIS 11 Part 3-2553

450/750 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Size 1.5 mm^2 up to 240 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core Identification
Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts
Reference standard : TIS 11 Part 3-2553, Table 3

APPLICATION

For indoor fixed installations in dry locations, for electrical panels connection or for electrical apparatus

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1.5	5	0.7	2.8	3.4	13.3	0.010	21	24	100/C
2.5	5	0.8	3.4	4.1	7.98	0.009	28	37	100/C
4	5	0.8	3.9	4.8	4.95	0.007	38	54	100/C
6	5	0.8	4.4	5.3	3.30	0.0060	48	75	100/C
10	5	1.0	5.7	6.8	1.91	0.0056	69	130	100/C
16	5	1.0	6.7	8.1	1.21	0.0046	92	185	100/C
25	5	1.2	8.4	10.2	0.780	0.0044	123	285	100/C
35	5	1.2	9.7	11.7	0.554	0.0038	154	400	100/C
50	5	1.4	11.5	13.9	0.386	0.0037	196	555	500/D
70	5	1.4	13.2	16.0	0.272	0.0032	247	765	500/D
95	5	1.6	15.1	18.2	0.206	0.0032	296	1,000	500/D
120	5	1.6	16.7	20.2	0.161	0.0029	350	1,300	500/D
150	5	1.8	18.6	22.5	0.129	0.0029	405	1,600	500/D
185	5	2.0	20.6	24.9	0.106	0.0029	461	1,900	500/D
240	5	2.2	23.5	28.4	0.0801	0.0028	554	2,500	500/D

Class of conductor 5 : Flexible

C : Packing in coil
D : Packing in drum

NYY-SWA

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 50 mm^2 up to 300 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

3 Cores : Brown, Black and Grey

4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	50	19/1.78	1.5	1.2	2.0	2.1	36.0	0.387	0.0046	199	3,000	500/D
	70	19/2.14	1.5	1.5	2.0	2.2	41.0	0.268	0.0039	244	4,000	500/D
	95	19/2.52	1.7	1.5	2.5	2.4	47.0	0.193	0.0038	292	5,000	500/D
	120	37/2.03	1.7	1.5	2.5	2.6	51.0	0.153	0.0034	334	6,000	500/D
	150	37/2.25	1.9	1.8	2.5	2.7	56.0	0.124	0.0034	373	7,000	500/D
	185	37/2.52	2.1	1.8	2.5	2.9	61.0	0.099	0.0034	420	8,500	300/D
	240	61/2.25	2.3	2.0	2.5	3.1	68.0	0.075	0.0033	483	10,500	300/D
	300	61/2.52	2.5	2.0	3.15	3.4	76.0	0.0601	0.0032	538	13,500	200/D

D : Packing in drum

60227 IEC 05 IV

TIS 11 Part 3-2553

300/500 V 70°C SOLID CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid annealed copper,
Size 0.5 mm^2 up to 1 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification
Single core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 3-2553, Table 5

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	1	0.6	1.9	2.3	36.0	0.015	11	8.8	100/C
0.75	1	0.6	2.1	2.5	24.5	0.012	14	12.0	100/C
1	1	0.6	2.2	2.7	18.1	0.011	16	14.0	100/C

Class of conductor 1 : Solid

C : Packing in coil

NYY-SWA

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Sizes 50 mm^2 up to 300 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area (mm^2)	Number and diameter of wire (No./mm)	Insulation thickness nominal (mm)	Inner sheath thickness nominal (mm)	Diameter of steel wire armor nominal (mm)	Outer sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in underground maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
3	50	19/1.78	1.5	1.5	2.0	2.2	39.0	0.387	0.0046	168	3,600	500/D
	70	19/2.14	1.5	1.5	2.0	2.3	43.0	0.268	0.0039	209	4,600	500/D
	95	19/2.52	1.7	1.5	2.5	2.5	50.0	0.193	0.0038	248	6,500	500/D
	120	37/2.03	1.7	1.8	2.5	2.7	55.0	0.153	0.0034	283	7,500	300/D
	150	37/2.25	1.9	1.8	2.5	2.8	59.0	0.124	0.0034	310	9,000	300/D
	185	37/2.52	2.1	2.0	2.5	3.0	65.0	0.0991	0.0034	357	10,500	300/D
	240	61/2.25	2.3	2.0	2.5	3.3	73.0	0.0754	0.0033	427	13,000	200/D
	300	61/2.52	2.5	2.2	3.15	3.5	81.0	0.0601	0.0032	453	17,000	200/D

D : Packing in drum

60227 IEC 06 IV (f)

TIS 11 Part 3-2553

300/500 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Size 0.5 mm^2 up to 1 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

Single-core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 3-2553, Table 7

APPLICATION

For indoor fixed installations in dry locations, for electrical panels connection or for electrical apparatus

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	5	0.6	2.1	2.5	39.0	0.013	11	9	100/C
0.75	5	0.6	2.2	2.7	26.0	0.011	14	12	100/C
1	5	0.6	2.4	2.8	19.5	0.010	16	15	100/C

Class of conductor 5 : Flexible

C : Packing in coil

NYY-SWA

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED , WITH GALVANIZED STEEL WIRES ARMORED POWER CABLE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper,
Sizes 50 mm^2 up to 300 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey

Other colors are available on customer request

Armor : Galvanized Steel Wires

Inner Sheath : Black polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
:Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Number of core	Nominal cross sectional area	Number and diameter of wire	Insulation thickness nominal	Inner sheath thickness nominal	Diameter of steel wire armor nominal	Outer sheath thickness nominal	Overall diameter approx.	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	Continuous current rating in underground maximum	Cable weight approx.	Standard length
	(mm^2)	(No./mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(kg/km)	(m)
4	50	19/1.78	1.5	1.5	2.0	2.3	43.0	0.387	0.0046	168	4,300	500/D
	70	19/2.14	1.5	1.5	2.0	2.5	49.0	0.268	0.0039	209	6,000	500/D
	95	19/2.52	1.7	1.8	2.5	2.7	55.0	0.193	0.0038	248	8,000	300/D
	120	37/2.03	1.7	1.8	2.5	2.9	60.0	0.153	0.0034	283	9,000	300/D
	150	37/2.25	1.9	2.0	2.5	3.	65.0	0.124	0.0034	310	11,000	300/D
	185	37/2.52	2.1	2.0	2.5	3.2	72.0	0.0991	0.0034	357	13,000	200/D
	240	61/2.25	2.3	2.2	3.15	3.5	81.0	0.0754	0.0033	427	17,500	150/D
	300	61/2.52	2.5	2.2	3.15	3.8	89.0	0.0601	0.0032	453	21,000	150/D

D : Packing in drum

60227 IEC 07 HIV

TIS 11 Part 3-2553

300/500 V 90°C SOLID CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Solid annealed copper,
Size 0.5 mm^2 up to 2.5 mm^2

Insulation : Polyvinyl chloride (PVC/E)

Core identification
Single core : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 3-2553, Table 9

APPLICATION

Building wiring for installation on insulator or in raceway, dry location.

Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	1	0.6	1.9	2.3	36.0	0.015	15	8.6	100/C
0.75	1	0.6	2.1	2.5	24.5	0.013	18	11.0	100/C
1	1	0.6	2.2	2.7	18.1	0.012	22	14.0	100/C
1.5	1	0.7	2.6	3.2	12.1	0.011	28	20.0	100/C
2.5	1	0.8	3.2	3.9	7.41	0.009	38	32.0	100/C

Class of conductor 1 : Solid

C : Packing in coil

60227 IEC 08 HIV (f)

TIS 11 Part 3-2553

300/500 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED, SINGLE CORE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Size 0.5 mm^2 up to 2.5 mm^2

Insulation : Polyvinyl chloride (PVC/E)

Core identification
Single-core : Any Color

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 3-2553, Table 11

APPLICATION

For indoor fixed installations in dry locations, for electrical panels connection or for electrical apparatus

Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
0.5	5	0.6	2.1	2.5	39.0	0.013	14	9	100/C
0.75	5	0.6	2.2	2.7	26.0	0.012	18	12	100/C
1	5	0.6	2.4	2.8	19.5	0.010	21	15	100/C
1.5	5	0.7	2.8	3.4	13.3	0.009	27	21	100/C
2.5	5	0.8	3.4	4.1	7.98	0.009	37	33	100/C

Class of conductor 5 : Flexible

C : Packing in coil

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_o/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard : IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	Number of wires minimum (No./mm)	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 20°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	1.5	7/0.53	0.7	1.4	6.3	12.1	2,500	31	50	500/D
	2.5	7/0.67	0.7	1.4	6.8	7.41	2,100	42	60	500/D
	4	7/0.85	0.7	1.4	7.3	4.61	1,700	55	80	500/D
	6	7/1.04	0.7	1.4	7.9	3.08	1,450	69	100	500/D
	10	6	0.7	1.4	8.4	1.83	1,250	93	140	500/D
	16	6	0.7	1.4	9.4	1.15	1,000	123	200	500/D
	25	6	0.9	1.4	11.0	0.727	1,050	164	300	500/D
	35	6	0.9	1.4	12.0	0.524	900	202	400	500/D
	50	6	1.0	1.4	13.5	0.387	850	245	500	500/D
	70	12	1.1	1.4	15.0	0.268	800	309	750	500/D
	95	15	1.1	1.5	17.5	0.193	650	383	1,000	500/D
	120	18	1.2	1.5	19.0	0.153	650	446	1,200	500/D
	150	18	1.4	1.6	21	0.124	700	510	1,500	500/D
	185	30	1.6	1.6	23	0.0991	700	591	1,900	500/D
	240	34	1.7	1.7	26	0.0754	650	705	2,500	500/D
	300	34	1.8	1.8	29	0.0601	600	814	3,100	500/D
	400	53	2.0	1.9	32	0.0470	600	950	3,900	500/D
	500	53	2.2	2.0	36	0.0366	600	1,111	5,000	500/D
	630	53	2.4	2.2	40	0.0283	550	1,293	6,500	500/D
	800	53	2.6	2.3	45	0.0221	550	1,486	8,500	300/D
	1,000	53	2.8	2.4	51	0.0176	500	1,701	10,500	300/D

D : Packing in drum

T-AV

TIS 118-2522

60°C LOW VOLTAGE FLEXIBLE CONDUCTOR FOR AUTOMOBILE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes. 0.5 mm² up to 95 mm²

Insulation : Polyvinyl chloride (PVC)
Color : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 60°C
: Low voltage circuit

Testing voltage : 1,000 Volts

Reference standard : TIS 118-2522

Remark: Nowadays the wires are produced according to two kinds of Standard. But such the Ministerial Regulations shall come into force upon their publication in Government Gazette, the production must be in the way of THAI INDUSTRIAL STANDARD.

APPLICATION

For automobile

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Conductor diameter approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	0.5	16/0.20	0.95	0.6	2.2	37.1	11	9	100/C
	0.5	7/0.30	0.95	0.6	2.2	37.1	11	9	100/C
	0.75	24/0.20	1.15	0.6	2.4	24.7	14	11	100/C
	0.85	12/0.30	1.20	0.6	2.4	22.0	15	12	100/C
	1.0	32/0.20	1.30	0.6	2.6	18.5	16	14	100/C
	1.25	40/0.20	1.50	0.6	2.7	14.8	19	17	100/C
	1.25	18/0.30	1.50	0.6	2.7	14.7	19	17	100/C
	1.5	30/0.25	1.60	0.6	2.8	12.7	20	19	100/C
	2	28/0.30	1.90	0.6	3.1	9.42	25	24	100/C
	2.5	50/0.25	2.10	0.7	3.5	7.60	28	30	100/C
	3	44/0.30	2.30	0.7	3.7	6.00	32	37	100/C
	4	56/0.30	2.60	0.8	4.2	4.71	38	47	100/C
	5	70/0.30	3.0	0.8	4.6	3.77	44	57	100/C
	6	84/0.30	3.2	0.9	5.0	3.14	49	69	100/C
	8	63/0.40	3.7	0.9	5.5	2.31	59	88	100/C
	10	84/0.40	4.2	1.1	6.4	1.82	69	114	100/C
	16	126/0.40	5.8	1.1	8.0	1.16	95	173	100/C
	25	196/0.60	7.0	1.4	9.8	0.770	123	261	100/C
	35	280/0.40	8.5	1.4	11.3	0.524	158	366	100/C
	50	399/0.40	10.9	1.6	14.1	0.357	207	537	500/D
	70	361/0.50	12.6	2.0	16.6	0.268	250	727	500/D
	95	475/0.50	14.1	2.0	18.1	0.193	305	971	500/D

C : Packing in coil
D : Packing in drum

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_o/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard : IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1.5	15.4287	0.5005	0.1572	15.4295
	2.5	9.4485	0.4665	0.1466	9.4496
	4	5.8782	0.4339	0.1363	5.8798
	6	3.9273	0.4103	0.1289	3.9295
	10	2.3335	0.3916	0.1230	2.3367
	16	1.4665	0.3670	0.1153	1.4710
	25	0.9272	0.3540	0.1112	0.9338
	35	0.6684	0.3410	0.1070	0.6769
	50	0.4938	0.3300	0.1037	0.5046
	70	0.3423	0.3200	0.1005	0.3567
	95	0.2469	0.3120	0.0982	0.2657
	120	0.1961	0.3070	0.0965	0.2185
	150	0.1594	0.3070	0.0965	0.1863
	185	0.1279	0.3050	0.0958	0.1598
	240	0.0983	0.3000	0.0943	0.1362
	300	0.0793	0.2970	0.0934	0.1225
	400	0.0633	0.2950	0.0927	0.1122
	500	0.0510	0.2920	0.0914	0.1050
	630	0.0415	0.2900	0.0911	0.1001
	800	0.0348	0.2870	0.0903	0.0967
	1,000	0.0303	0.2830	0.0889	0.0939

Laying Type : Touching

J-AV

JIS C 3406

60°C LOW VOLTAGE FLEXIBLE CONDUCTOR FOR AUTOMOBILE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes. 0.5 mm² up to 60 mm²

Insulation : Polyvinyl chloride (PVC)
Color : Any color

TECHNICAL DATA

Classification : Maximum conductor temperature 60°C
: Low voltage circuit
Testing voltage : 5,000 Volts
Reference standard : JIS C 3406

APPLICATION

For automobile

Number of core	Nominal cross sectional area (mm²)	Number and diameter of wire (No./mm)	Conductor diameter approx. (mm)	Conductor diameter approx. (mm)	Insulation thickness nominal (mm)	Overall diameter approx. (mm)	Conductor resistance at 20°C maximum (Ω/km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
1	0.5	20/0.18	0.95	1.0	0.6	2.1	36.7	12	8.5	100/C
	0.5	7/0.32	1.00	1.0	0.6	2.1	32.7	12	9	100/C
	0.75	30/0.18	1.15	1.20	0.6	2.3	24.4	14	12	100/C
	0.85	11/0.32	1.25	1.20	0.6	2.4	20.8	15	13	100/C
	1.25	50/0.18	1.50	1.50	0.6	2.7	14.7	19	17	100/C
	1.25	16/0.32	1.50	1.50	0.6	2.7	14.3	19	17	100/C
	2	26/0.32	1.90	1.90	0.6	3.1	8.81	26	26	100/C
	3	41/0.32	2.40	2.30	0.7	3.8	5.59	34	40	100/C
	5	65/0.32	3.00	3.0	0.8	4.5	3.52	45	60	100/C
	8	50/0.45	3.70	3.7	0.9	5.4	2.32	59	90	100/C
	15	84/0.45	5.10	5.8	1.1	7.2	1.38	82	160	100/C
	20	247/0.32	6.30	7.0	1.1	8.2	0.887	109	230	100/C
	30	361/0.32	7.60	8.5	1.4	10.5	0.520	156	380	500/D
	40	494/0.32	8.90	10.9	1.4	11.5	0.428	175	450	500/D
	50	608/0.32	9.80	12.6	1.6	13.0	0.337	206	570	500/D
	60	741/0.32	10.00	14.1	1.6	13.5	0.287	227	670	500/D

C : Packing in coil
D : Packing in drum

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90ºC
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_0/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard : IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1.5	15.4287	0.6391	0.2008	15.4300
	2.5	9.4485	0.6051	0.1901	9.4500
	4	5.9782	0.5726	0.1799	5.8810
	6	3.9273	0.5489	0.1724	3.9311
	10	2.3335	0.5302	0.1666	2.3394
	16	1.4664	0.5056	0.1589	1.4750
	25	0.9271	0.4930	0.1547	0.9399
	35	0.6683	0.4790	0.1506	0.6851
	50	0.4937	0.4690	0.1473	0.5152
	70	0.3420	0.4590	0.1441	0.3711
	95	0.2465	0.4510	0.1417	0.2844
	120	0.1957	0.4460	0.1400	0.2406
	150	0.1588	0.4460	0.1400	0.2117
	185	0.1272	0.4440	0.1394	0.1887
	240	0.0973	0.4390	0.1379	0.1688
	300	0.0781	0.4360	0.1369	0.1576
	400	0.0618	0.3430	0.1362	0.1496
	500	0.0490	0.4310	0.1353	0.1439
	630	0.0390	0.4290	0.1347	0.1402
	800	0.0318	0.4260	0.1338	0.1375
	1,000	0.0268	0.4210	0.1324	0.1351

Laying type : Spacing

0.6/1KV-CV

IEC 60502-1

0.6/1 kV 90°C CROSS-LINKED POLYETHYLENE INSULATED PVC SHEATHED POWER CABLE

CABLE STRUCTURE

Conductor : Concentric Stranded and compacted round annealed copper
Single-core : Sizes 1.5 mm² up to 1,000 mm²
Multi-cores : Sizes 1.5 mm² up to 400 mm²

Insulation : Cross-linked Polyethylene (XLPE)

Core identification
Single-core : Natural (Translucent)
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
4 Cores : Blue, Brown, Black and Grey
Other colors are available on customer request

Sheath : Black polyvinyl chloride (PVC/ST2)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 1,200 Volts
Rated voltage (U_0/U) 0.6/1 kV
600 Volts between Line-to-Earth
1,000 Volts between Line-to-Line

Testing voltage : 3,500 Volts

Reference standard: IEC 60502-1,IEC 60228,IEC 60332-1

APPLICATION

Use for installation in open tray, conduit, underground duct trench or direct burial in ground, at wet or dry location.

Number of core	Nominal cross sectional area (mm²)	A.C. Resistance R (Ω/km)	Inductance L (mH/km)	Reactance XL (Ω/km)	Impedance Z (Ω/km)
1	1.5	15.4287	0.4542	0.1427	15.4294
	2.5	9.4485	0.4203	0.1320	9.4494
	4	5.8782	0.3877	0.1218	5.8795
	6	3.9273	0.3640	0.1144	3.9280
	10	2.3335	0.3453	0.1085	2.3360
	16	1.4665	0.3208	0.1008	1.4699
	25	0.9272	0.3080	0.0967	0.9322
	35	0.6684	0.2950	0.0925	0.6748
	50	0.4938	0.2840	0.0892	0.5018
	70	0.3423	0.2740	0.0860	0.3529
	95	0.2469	0.2660	0.0836	0.2607
	120	0.1961	0.2610	0.0820	0.2125
	150	0.1594	0.2610	0.0819	0.1792
	185	0.1279	0.2590	0.0813	0.1516
	240	0.0983	0.2540	0.0798	0.1266
	300	0.0793	0.2510	0.0788	0.1118
	400	0.0633	0.2490	0.0781	0.1006
	500	0.0501	0.2460	0.0772	0.0925
	630	0.0415	0.2440	0.0766	0.0871
	800	0.0348	0.2410	0.0757	0.0834
	1,000	0.0303	0.2370	0.0743	0.0803

Laying Type : Trefoil

60227 IEC 52 VKF

TIS 11 Part 5-2553

300/300 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.5 mm^2 and 0.75 mm^2

Insulation : Polyvinyl chloride (PVC/D)

Core identification

2 Cores : Blue and Brown

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 7

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	3.0 x 4.9	3.7 x 5.9	39.0	0.012	10	28	100/C
	0.75	5	0.5	0.6	3.2 x 5.2	3.8 x 6.3	26.0	0.010	12	35	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 52 VKF

TIS 11 Part 5-2553

300/300 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.5 mm^2 and 0.75 mm^2

Insulation : Polyvinyl chloride (PVC/D)

Core identification

2 Cores : Blue and Brown

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 7

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	3.0 x 4.9	3.7 x 5.9	39.0	0.012	10	28	100/C
	0.75	5	0.5	0.6	3.2 x 5.2	3.8 x 6.3	26.0	0.010	12	35	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 52 VCT

TIS 11 Part 5-2553

300/300 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.5 mm^2 and 0.75 mm^2

Insulation : Polyvinyl chloride (PVC/D)

Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and grey
or Blue, Brown and Green/yellow

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553, Table 7

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	4.6	5.9	39.0	0.012	10	40	100/C
	0.75	5	0.5	0.6	4.9	6.3	26.0	0.010	12	48	100/C
3	0.5	5	0.5	0.6	4.9	6.3	39.0	0.012	8	47	100/C
	0.75	5	0.5	0.6	5.2	6.7	26.0	0.010	10	58	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 53 VKF

TIS 11 Part 5-2553

300/500 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wires
Size 0.75 mm^2 and 1 mm^2
Insulation : Polyvinyl chloride (PVC/D)
Core identification
2 Cores : Blue and Brown
Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line
Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553, Table 9

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	3.7 x 6.0	4.5 x 7.2	26.0	0.011	12	43	100/C
	1	5	0.6	0.8	3.9 x 6.2	4.7 x 7.5	19.5	0.010	15	50	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 53 VCT or 60227 IEC 53 VCT-G

TIS 11 Part 5-2553

300/500 V 70°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
Sizes. 0.75 mm² up to 2.5 mm²

Insulation : Polyvinyl chloride (PVC/D)

Core identification

2 cores: Blue and Brown

3 cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow

4 cores: Brown, Black, Grey and Blue
or Brown, Black, Grey and Green/Yellow

5 cores : Blue, Brown,Black, Grey and Black
or Blue, Brown, Black,Grey and Green/Yellow

Sheath : Black polyvinyl chloride (PVC/ST5)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 9

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	5.7	7.2	26.0	0.011	12	60	100/C
	1	5	0.6	0.8	5.9	7.5	19.5	0.010	14	70	100/C
	1.5	5	0.7	0.8	6.8	8.6	13.3	0.010	18	93	100/C
	2.5	5	0.8	1.0	8.4	10.6	7.98	0.009	25	140	100/C
3	0.75	5	0.6	0.8	6.0	7.6	26.0	0.011	10	70	100/C
	1	5	0.6	0.8	6.3	8.0	19.5	0.010	12	82	100/C
	1.5	5	0.7	0.9	7.4	9.4	13.3	0.010	16	115	100/C
	2.5	5	0.8	1.1	9.2	11.4	7.98	0.009	21	175	100/C
4	0.75	5	0.6	0.8	6.6	8.3	26.0	0.011	10	84	100/C
	1	5	0.6	0.9	7.1	9.0	19.5	0.010	12	105	100/C
	1.5	5	0.7	1.0	8.4	10.5	13.3	0.010	16	145	100/C
	2.5	5	0.8	1.1	10.1	12.5	7.98	0.009	21	215	100/C
5	0.75	5	0.6	0.9	7.4	9.3	26.0	0.011	10	105	100/C
	1	5	0.6	0.9	7.8	9.8	19.5	0.010	12	125	100/C
	1.5	5	0.7	1.1	9.3	11.6	13.3	0.010	16	175	100/C
	2.5	5	0.8	1.2	11.2	13.9	7.98	0.009	21	265	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 56 HVKF

TIS 11 Part 5-2553

300/300 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire
: Size 0.5 mm^2 and 0.75 mm^2
Insulation : Polyvinyl chloride (PVC/E)
Core identification
2 Cores : Blue and Brown
Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line
Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553,Table 11

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	3.0 x 4.9	3.7 x 5.9	39.0	0.012	13	28	100/C
	0.75	5	0.5	0.6	3.2 x 5.2	3.8 x 6.3	26.0	0.010	16	35	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 56 HVCT

TIS 11 Part 5-2553

300/300 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes 0.5 mm² and 0.75 mm²
Insulation : Polyvinyl chloride (PVC/E)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553,Table 11

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	4.6	5.9	39.0	0.012	13	38	100/C
	0.75	5	0.5	0.6	4.9	6.3	26.0	0.010	16	46	100/C
3	0.5	5	0.5	0.6	4.9	6.3	39.0	0.012	11	44	100/C
	0.75	5	0.5	0.6	5.2	6.7	26.0	0.010	13	55	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 56 HVCT

TIS 11 Part 5-2553

300/300 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper
: Sizes 0.5 mm² and 0.75 mm²
Insulation : Polyvinyl chloride (PVC/E)
Core identification
2 Cores : Blue and Brown
3 Cores : Brown, Black and Grey
or Blue, Brown and Green/Yellow
Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/300 Volts
300 Volts between Line-to-Earth
300 Volts between Line-to-Line

Testing voltage : 2,000 Volts
Reference standard : TIS 11 Part 5-2553,Table 11

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.5	5	0.5	0.6	4.6	5.9	39.0	0.012	13	38	100/C
	0.75	5	0.5	0.6	4.9	6.3	26.0	0.010	16	46	100/C
3	0.5	5	0.5	0.6	4.9	6.3	39.0	0.012	11	44	100/C
	0.75	5	0.5	0.6	5.2	6.7	26.0	0.010	13	55	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 57 HVKF

TIS 11 Part 5-2553

300/500 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire,
Size 0.75 mm^2 and 1 mm^2

Insulation : Polyvinyl chloride (PVC/E)

Core identification

2-Cores : Blue and Brown

Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 13

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm^2)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	3.7 x 6.0	4.5 x 7.2	39.0	0.011	16	42	100/C
	1	5	0.6	0.8	3.9 x 6.2	4.7 x 7.5	19.5	0.010	19	50	100/C

Class of conductor 5 : Flexible

C : Packing in coil

60227 IEC 57 HVCT

TIS 11 Part 5-2553

300/500 V 90°C FLEXIBLE CONDUCTOR PVC INSULATED AND SHEATHED, ROUND TYPE

CABLE STRUCTURE

Conductor : Flexible annealed copper wire,
Sizes 0.75 mm² up to 2.5 mm²

Insulation : Polyvinyl chloride (PVC/E)

Core identification

2-Cores : Blue and Brown

3 Cores :Brown, Black and Grey
or Blue, Brown and Green/Yellow

4-Cores : Brown, Black, Grey and Blue
or Brown, Black, Grey and Green/Yellow

5-Cores : Blue, Brown, Black, Grey and Black
or Blue, Brown, Black, Grey and Green/Yellow

Sheath : Black polyvinyl chloride (PVC/ST10)

TECHNICAL DATA

Classification : Maximum conductor temperature 90 °C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 5-2553, Table 13

APPLICATION

For household appliances, electrical equipment and electrical illumination

Number of core	Nominal cross sectional area (mm²)	Class of conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Minimum (mm)	Overall diameter Maximum (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 90°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	0.75	5	0.6	0.8	5.7	7.2	26.0	0.011	16	57	100/C
	1	5	0.6	0.8	5.9	7.5	19.5	0.010	19	66	100/C
	1.5	5	0.7	0.8	6.8	8.6	13.3	0.010	24	89	100/C
	2.5	5	0.8	1.0	8.4	10.6	7.98	0.009	33	135	100/C
3	0.75	5	0.6	0.8	6.0	7.6	26.0	0.011	14	66	100/C
	1	5	0.6	0.8	6.3	8.0	19.5	0.010	16	78	100/C
	1.5	5	0.7	0.9	7.4	9.4	13.3	0.010	21	110	100/C
	2.5	5	0.8	1.1	9.2	11.4	7.98	0.009	28	170	100/C
4	0.75	5	0.6	0.8	6.6	8.3	26.0	0.011	14	80	100/C
	1	5	0.6	0.9	7.1	9.0	19.5	0.010	16	99	100/C
	1.5	5	0.7	1.0	8.4	10.5	13.3	0.010	21	140	100/C
	2.5	5	0.8	1.1	10.1	12.5	7.98	0.009	28	205	100/C
5	0.75	5	0.6	0.9	7.4	9.3	26.0	0.011	14	99	100/C
	1	5	0.6	0.9	7.8	9.8	19.5	0.010	16	120	100/C
	1.5	5	0.7	1.1	9.3	11.6	13.3	0.010	21	170	100/C
	2.5	5	0.8	1.2	11.2	13.9	7.98	0.009	28	250	100/C

Class of conductor 5 : Flexible

C : Packing in coil

VAF

TIS 11 Part 101-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1 mm^2 up to 16 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

Sheath : White polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 101-2553, Table 1

APPLICATION

Building wiring for surface or above ceiling wiring or direct embeded in plaster.

Number of core	Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Lower limit (mm)	Overall diameter Upper limit (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	1	1	0.6	0.9	4.0 x 6.2	4.7 x 7.4	18.1	0.0110	13	50	100/C
	1.5	1	0.7	0.9	4.4 x 7.0	5.4 x 8.4	12.1	0.0110	17	70	100/C
	2.5	1	0.8	1.0	5.2 x 8.4	6.2 x 9.8	7.41	0.0100	23	100	100/C
	4	2	0.8	1.1	5.6 x 9.6	7.2 x 11.5	4.61	0.0077	31	150	100/C
	6	2	0.8	1.1	6.4 x 10.5	8.0 x 13.0	3.08	0.0065	40	200	100/C
	10	2	1.0	1.2	7.8 x 13.0	9.6 x 16.0	1.83	0.0065	55	310	100/C
	16	2	1.0	1.3	9.0 x 15.5	11.0 x 18.5	1.15	0.0052	74	450	100/C

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil

VAF

TIS 11 Part 101-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND SHEATHED, FLAT TYPE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper, Size 1 mm^2 up to 16 mm^2

Insulation : Polyvinyl chloride (PVC/C)

Core identification

2 Cores : Blue and Brown

Sheath : White polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 101-2553, Table 1

APPLICATION

Building wiring for surface or above ceiling wiring or direct embeded in plaster.

Number of core	Nominal cross sectional area (mm^2)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Lower limit (mm)	Overall diameter Upper limit (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2	1	1	0.6	0.9	4.0 x 6.2	4.7 x 7.4	18.1	0.0110	13	50	100/C
	1.5	1	0.7	0.9	4.4 x 7.0	5.4 x 8.4	12.1	0.0110	17	70	100/C
	2.5	1	0.8	1.0	5.2 x 8.4	6.2 x 9.8	7.41	0.0100	23	100	100/C
	4	2	0.8	1.1	5.6 x 9.6	7.2 x 11.5	4.61	0.0077	31	150	100/C
	6	2	0.8	1.1	6.4 x 10.5	8.0 x 13.0	3.08	0.0065	40	200	100/C
	10	2	1.0	1.2	7.8 x 13.0	9.6 x 16.0	1.83	0.0065	55	310	100/C
	16	2	1.0	1.3	9.0 x 15.5	11.0 x 18.5	1.15	0.0052	74	450	100/C

Class of conductor 1 : Solid
2 : Strand

C : Packing in coil

VAF-G

TIS 11 Part 101-2553

300/500 V 70°C SOLID AND STRANDED CONDUCTOR PVC INSULATED AND SHEATHED WITH GROUND, FLAT TYPE

CABLE STRUCTURE

Conductor : Solid and stranded annealed copper
Sizes 1.0 mm² up to 16 mm²

Ground wire : Solid and stranded annealed copper
Sizes 1.0 mm² up to 16 mm²

Insulation : Polyvinyl chloride (PVC/C)

Core identification
2 Cores : Blue and Brown
Ground-Cores : Green/Yellow

Sheath : White polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 101-2553, Table 1

APPLICATION

Building wiring for surface or above ceiling wiring or direct embeded in plaster.

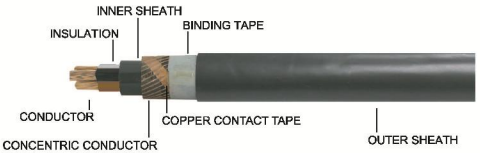
Number of core	Nominal cross sectional area (mm²)	Class of Conductor	Insulation thickness nominal (mm)	Sheath thickness nominal (mm)	Overall diameter Lower limit (mm)	Overall diameter Upper limit (mm)	Conductor resistance at 20°C maximum (Ω/km)	Insulation resistance at 70°C minimum (MΩ-km)	Continuous current rating in free air maximum (A)	Cable weight approx. (kg/km)	Standard length (m)
2+G	1	1	0.6	0.9	4.0 x 8.4	4.7 x 9.8	18.1	0.0110	13	75	100/C
	1 (G)	1	0.6	0.9			18.1				
	1.5	1	0.7	0.9	4.4 x 9.8	5.4 x 11.5	12.1	0.0110	17	100	100/C
	1.5 (G)	1	0.7	0.9			12.1				
	2.5	1	0.8	1.0	5.2 x 11.5	6.2 x 13.5	7.41	0.0100	23	150	100/C
	2.5 (G)	1	0.8	1.0			7.41				
	4	2	0.8	1.1	5.8 x 13.4	7.4 x 16.5	4.61	0.0077	31	220	100/C
	4 (G)	2	0.8	1.1			4.61				
	6	2	0.8	1.1	6.4 x 15.0	8.0 x 18.0	3.08	0.0065	40	290	100/C
	6 (G)	2	0.8	1.1			3.08				
	10	2	1.0	1.2	7.8 x 19.0	9.6 x 22.5	1.83	0.0065	55	460	100/C
	10 (G)	2	1.0	1.2			1.83				
	16	2	1.0	1.3	9.0 x 22.0	11.0 x 26.5	1.15	0.0052	74	650	500/D
	16 (G)	2	1.0	1.3			1.15				

Class of conductor 1 : Solid
2 : Strand
G : Ground conductor
C : Packing in coil
D : Packing in drum

500V-NYCY

THAI-YAZAKI STANDARD

300/500 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH CONCENTRIC CONDUCTORS POWER CABLE



CABLE STRUCTURE

Phase Conductor : Concentric stranded annealed copper wires, Sizes 1.5 mm^2 up to 35 mm^2

Concentric shield : Annealed copper wires with helix of copper tape fully covers

Insulation : Polyvinyl chloride (PVC/C)

Core identification

3 Cores : Brown, Black and Grey

Other colors are available on customer request

Inner Sheath : Polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 300/500 Volts
300 Volts between Line-to-Earth
500 Volts between Line-to-Line

Testing voltage : 2,000 Volts

Reference standard : TIS 11 Part 4-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

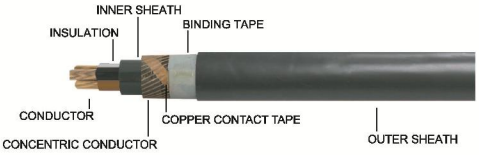
Nominal cross sectional area (mm^2)		Number and diameter of wire (No./mm)		Insulation thickness nominal	Inner sheath thickness nominal	Outer thickness nominal	Overall diameter approx.	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	continuous current rating in free air maximum	Cable weight approx.	Standard length
Phase	Concentric shield	Phase	Concentric shield	(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(kg/km)	(m)
3x1.5	1.5	1/1.38	8/0.50	0.7	0.4	1.2	11.5	12.1	0.011	25	180	500/D
3x1.5	1.5	7/0.53	8/0.50	0.7	0.4	1.2	12.0	12.1	0.010	25	190	500/D
3x2.5	2.5	1/1.78	13/0.50	0.8	0.4	1.2	13.0	7.41	0.010	33	250	500/D
3x2.5	2.5	7/0.67	13/0.50	0.8	0.4	1.2	14.0	7.41	0.009	33	260	500/D
3x4	4	1/2.25	14/0.60	0.8	0.4	1.2	14.5	4.61	0.0085	43	320	500/D
3x4	4	7/0.85	14/0.60	0.8	0.4	1.2	15.0	4.61	0.0077	43	340	500/D
3x6	6	7/1.04	21/0.60	0.8	0.4	1.4	19.5	3.08	0.0065	54	460	500/D
3x10	10	7/1.35	20/0.80	1.0	0.6	1.4	20.0	1.83	0.0065	71	700	500/D
3x16	16	7/1.70	19/1.04	1.0	0.8	1.4	24.0	1.15	0.0052	93	1,000	500/D
3x25	16	7/2.14	19/1.04	1.2	0.8	1.6	28.0	0.727	0.0050	120	1,500	500/D
3x35	16	19/1.53	19/1.04	1.2	1.0	1.6	31.0	0.524	0.0044	144	1,800	500/D

D : Packing in drum

NYCY

THAI-YAZAKI STANDARD

450/750 V 70°C PVC INSULATED AND DOUBLE SHEATHED, WITH CONCENTRIC CONDUCTORS POWER CABLE



CABLE STRUCTURE

Phase Conductor : Concentric stranded annealed copper wires, Sizes 50 mm^2 up to 300 mm^2

Concentric shield : Annealed copper wires with helix of copper tape fully covers

Insulation : Polyvinyl chloride (PVC/C)

Core identification

3 Cores : Brown, Black and Grey

Other colors are available on customer request

Inner Sheath : Polyvinyl chloride (PVC)

Outer Sheath : Black polyvinyl chloride (PVC/ST4)

TECHNICAL DATA

Classification : Maximum conductor temperature 70°C
: Circuit voltage not exceeding 450/750 Volts
450 Volts between Line-to-Earth
750 Volts between Line-to-Line

Testing voltage : 2,500 Volts

Reference standard : TIS 11 Part 101-2553

APPLICATION

For installation exposed, or in raceway, wet or dry location, or direct burial in ground.

Nominal cross sectional area (mm^2)		Number and diameter of wire (No./mm)		Insulation thickness nominal	Inner sheath thickness nominal	Outer thickness nominal	Overall diameter approx.	Conductor resistance at 20°C maximum	Insulation resistance at 70°C minimum	continuous current rating in free air maximum	Cable weight approx.	Standard length
Phase	Concentric shield	Phase	Concentric shield	(mm)	(mm)	(mm)	(mm)	(Ω/km)	(MΩ-km)	(A)	(kg/km)	(m)
3x50	25	19/1.78	25/1.13	1.5	1.5	2.2	38.0	0.387	0.0046	142	2,600	500/D
3x50	35	19/1.78	23/1.38	1.5	1.5	2.2	39.0	0.387	0.0046	142	2,700	500/D
3x70	35	19/2.14	23/1.38	1.5	1.5	2.2	43.0	0.268	0.0039	178	3,500	500/D
3x70	50	19/2.14	27/1.53	1.5	1.5	2.2	43	0.268	0.0039	178	3,600	500/D
3x95	50	19/2.52	27/1.53	1.7	1.5	2.4	48	0.193	0.0038	219	4,700	500/D
3x95	70	19/2.52	31/1.70	1.7	1.5	2.4	49	0.193	0.0038	219	5,000	500/D
3x120	70	37/2.03	31/1.70	1.7	1.8	2.6	53	0.153	0.0034	254	6,000	500/D
3x120	95	37/2.03	36/1.83	1.7	1.8	2.6	54	0.153	0.0034	254	6,000	500/D
3x150	70	37/2.25	31/1.70	1.9	1.8	2.8	58	0.124	0.0034	290	7,000	300/D
3x150	95	37/2.25	36/1.83	1.9	1.8	2.8	58	0.1240	0.0034	290	7,500	300/D
3x150	120	37/2.25	37/2.03	1.9	1.8	2.8	59	0.1240	0.0034	290	7,500	300/D
3x185	95	37/2.52	36/1.83	2.1	2.0	3.0	64	0.0991	0.0034	332	9,000	300/D
3x185	120	37/2.52	37/2.03	2.1	2.0	3.0	65	0.0991	0.0034	332	9,000	300/D
3x240	120	61/2.25	37/2.03	2.3	2.0	3.2	72	0.0601	0.0033	389	11,500	200/D
3x300	150	61/2.52	41/2.14	2.5	2.2	3.4	79	0.0601	0.0032	445	14,000	200/D

D : Packing in drum