

RE-2G(st)H - BS EN 50288-7 Si / CAM / LSZH Instrumentation Cable



Eland Product Group: I

APPLICATION

These cables are designed to connect electrical instrument circuits and provide communication services in and around process plants (e.g. petrochemical industry etc.). Not suitable for direct burial applications. Used in areas where circuit integrity is required in the event of a fire situation. For installations where fire, smoke emissions and toxic fumes create a potential risk to life and equipment.

CONSTRUCTION

Conductor

Class 2 stranded copper conductor

Insulation

El2 Silicone rubber according to EN 50363-1

Individual And Collective Screen Or Collective Screen

PET (Polyester Tape)

AL/PET (Aluminium/Polyester Tape) with tinned drain wire

Multi-Core, Multi-Pair, PIMF and TiMF Type

Sheath

LSZH (Low Smoke Zero Halogen) according to BS EN 50290

CABLE STANDARDS

BS EN 50288-1, BS EN 50288-7, HD 383, BS EN 50290-2,
BS EN/IEC 60332-1, BS EN/IEC 60332-3-24
BS EN 61034-2, BS EN 50267-2-3, BS EN 50267-2-1,
IEC 60331-23 & 21, BS EN 60228



The electrical and dimensional properties of this product are measured by the Technical and Quality Assurance department at the Eland Cables laboratory. Cable performance in respect of conductor resistance, construction quality (workmanship), dimensional consistency, and other parameters are verified to published standards and approved product drawings. Conformance to RoHS (Restriction of the use of Hazardous Substances) is determined and confirmed.

CHARACTERISTICS

Voltage Rating (U_o/U)

300/500V

Operating Temperature

Fixed: -30°C to +90°C

Minimum Bending Radius

7.5 x overall diameter

Core Identification

○ White and ● Black numbered

● Blue and ● Black numbered on request

Sheath Colour

● Blue ● Black ● Orange ● Red

Note

90V and 500V rated cables available on request

DIMENSIONS

Collectively Screened Multi-Core

ELAND PART NO.	NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHC2C05**	2	0.5	5.6	45
RE2GHC2C75**	2	0.75	6	50
RE2GHC2C10**	2	1	6.4	58
RE2GHC2C15**	2	1.5	7	70
RE2GHC2C25**	2	2.5	8.5	100
RE2GHC3C05**	3	0.5	5.8	50
RE2GHC3C75**	3	0.75	6.2	59
RE2GHC3C10**	3	1	6.7	70
RE2GHC3C15**	3	1.5	7.4	91
RE2GHC3C25**	3	2.5	8.8	130
RE2GHC4C05**	4	0.5	6.3	58
RE2GHC4C75**	4	0.75	6.6	72
RE2GHC4C10**	4	1	7.2	88
RE2GHC4C15**	4	1.5	8	111
RE2GHC4C25**	4	2.5	9.6	163
RE2GHC5C05**	5	0.5	6.9	68
RE2GHC5C75**	5	0.75	7.3	87
RE2GHC5C10**	5	1	7.4	98
RE2GHC5C15**	5	1.5	9	137
RE2GHC5C25**	5	2.5	10.6	200
RE2GHC6C05**	6	0.5	7.4	78
RE2GHC6C75**	6	0.75	7.9	102
RE2GHC6C10**	6	1	8.7	121
RE2GHC6C15**	6	1.5	9.7	165
RE2GHC6C25**	6	2.5	11.7	243
RE2GHC7C05**	7	0.5	7.4	84
RE2GHC7C75**	7	0.75	7.9	109
RE2GHC7C10**	7	1	8.7	130
RE2GHC7C15**	7	1.5	9.7	179
RE2GHC7C25**	7	2.5	11.7	265
RE2GHC10C05**	10	0.5	9.4	115
RE2GHC10C75**	10	0.75	10.1	152
RE2GHC10C10**	10	1	11.1	192
RE2GHC10C15**	10	1.5	12.4	253
RE2GHC10C25**	10	2.5	15	374
RE2GHC12C05**	12	0.5	9.6	135
RE2GHC12C75**	12	0.75	10.4	173
RE2GHC12C10**	12	1	11.5	220
RE2GHC12C15**	12	1.5	12.8	292
RE2GHC12C25**	12	2.5	15.4	433
RE2GHC19C05**	19	0.5	11.5	201
RE2GHC19C75**	19	0.75	12.3	260
RE2GHC19C10**	19	1	13.4	322
RE2GHC19C15**	19	1.5	15.1	445
RE2GHC19C25**	19	2.5	18.3	665

ELAND PART NO.	NO. OF CORES	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHC24C05**	24	0.5	13.2	248
RE2GHC24C75**	24	0.75	14.4	328
RE2GHC24C10**	24	1	15.7	405
RE2GHC24C15**	24	1.5	17.8	556
RE2GHC24C25**	24	2.5	21.5	830

Collectively Screened Multi-Pair

ELAND PART NO.	NO. OF PAIRS	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHC1P05**	1	0.5	6.1	45
RE2GHC1P75**	1	0.75	6.6	50
RE2GHC1P10**	1	1	7.1	73
RE2GHC1P13**	1	1.3	7.4	72
RE2GHC1P15**	1	1.5	7.5	87
RE2GHC2P05**	2	0.5	8.7	92
RE2GHC2P75**	2	0.75	9.4	120
RE2GHC2P10**	2	1	10.1	140
RE2GHC2P13**	2	1.3	10.7	163
RE2GHC2P15**	2	1.5	11.2	174
RE2GHC4P05**	4	0.5	10.1	125
RE2GHC4P75**	4	0.75	11.2	166
RE2GHC4P10**	4	1	12.1	206
RE2GHC4P13**	4	1.3	12.8	227
RE2GHC4P15**	4	1.5	13.3	259
RE2GHC6P05**	6	0.5	12.4	217
RE2GHC6P75**	6	0.75	13.4	262
RE2GHC6P10**	6	1	14.6	315
RE2GHC6P13**	6	1.3	15.6	359
RE2GHC6P15**	6	1.5	16	397
RE2GHC8P05**	8	0.5	13.8	240
RE2GHC8P75**	8	0.75	14.9	295
RE2GHC8P10**	8	1	16	350
RE2GHC8P13**	8	1.3	17.3	416
RE2GHC8P15**	8	1.5	17.7	452
RE2GHC10P05**	10	0.5	15.5	296
RE2GHC10P75**	10	0.75	17	378
RE2GHC10P10**	10	1	18.2	426
RE2GHC10P13**	10	1.3	19.7	514
RE2GHC10P15**	10	1.5	20.3	561
RE2GHC12P05**	12	0.5	15.8	328
RE2GHC12P75**	12	0.75	17.3	412
RE2GHC12P10**	12	1	18.6	498
RE2GHC12P13**	12	1.3	20.1	588
RE2GHC12P15**	12	1.5	20.7	646
RE2GHC16P05**	16	0.5	18.1	423
RE2GHC16P75**	16	0.75	20.1	546
RE2GHC16P10**	16	1	21.3	650

ELAND PART NO.	NO. OF PAIRS	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHC16P13**	16	1.3	23.1	789
RE2GHC16P15**	16	1.5	23.7	857
RE2GHC20P05**	20	0.5	20.4	512
RE2GHC20P75**	20	0.75	22.3	644
RE2GHC20P10**	20	1	24.1	780
RE2GHC20P13**	20	1.3	26	946
RE2GHC20P15**	20	1.5	26.8	1039
RE2GHC24P05**	24	0.5	22.2	598
RE2GHC24P75**	24	0.75	24.1	761
RE2GHC24P10**	24	1	26.2	923
RE2GHC24P13**	24	1.3	28.3	1123
RE2GHC24P15**	24	1.5	29	1246

Collectively and Individually Screened Pairs in Metal Foil - PiMF

ELAND PART NO.	NO. OF PAIRS	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHI2P05**	2	0.5	9.9	112
RE2GHI2P75**	2	0.75	10.6	145
RE2GHI2P10**	2	1	11.6	168
RE2GHI2P13**	2	1.3	12.4	188
RE2GHI2P15**	2	1.5	12.7	189
RE2GHI4P05**	4	0.5	11.7	178
RE2GHI4P75**	4	0.75	12.6	211
RE2GHI4P10**	4	1	13.4	251
RE2GHI4P13**	4	1.3	14.6	284
RE2GHI4P15**	4	1.5	15	314
RE2GHI6P05**	6	0.5	14.3	273
RE2GHI6P75**	6	0.75	15.3	319
RE2GHI6P10**	6	1	16.5	380
RE2GHI6P13**	6	1.3	17.7	434
RE2GHI6P15**	6	1.5	18.3	467
RE2GHI8P05**	8	0.5	15.3	320
RE2GHI8P75**	8	0.75	16.8	376
RE2GHI8P10**	8	1	17.9	450
RE2GHI8P13**	8	1.3	19.4	505
RE2GHI8P15**	8	1.5	19.9	545
RE2GHI10P05**	10	0.5	18.3	396
RE2GHI10P75**	10	0.75	19.8	463
RE2GHI10P10**	10	1	21.2	546
RE2GHI10P13**	10	1.3	23	631
RE2GHI10P15**	10	1.5	23.7	685
RE2GHI12P05**	12	0.5	19	446
RE2GHI12P75**	12	0.75	20.5	539
RE2GHI12P10**	12	1	22.1	629
RE2GHI12P13**	12	1.3	23.7	727
RE2GHI12P15**	12	1.5	24.7	804
RE2GHI16P05**	16	0.5	21.3	575
RE2GHI16P75**	16	0.75	22.9	700

ELAND PART NO.	NO. OF PAIRS	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHI16P10**	16	1	24.8	828
RE2GHI16P13**	16	1.3	26.6	960
RE2GHI16P15**	16	1.5	27.6	1058
RE2GHI20P05**	20	0.5	23.7	694
RE2GHI20P75**	20	0.75	25.7	842
RE2GHI20P10**	20	1	27.7	1002
RE2GHI20P13**	20	1.3	29.7	1158
RE2GHI20P15**	20	1.5	30.9	1274
RE2GHI24P05**	24	0.5	26.6	839
RE2GHI24P75**	24	0.75	28.8	1015
RE2GHI24P10**	24	1	31.1	1193
RE2GHI24P13**	24	1.3	33.5	1397
RE2GHI24P15**	24	1.5	34.6	1522

Collectively and Individually Screened Triple in Metal Foil - TiMF

ELAND PART NO.	NO. OF TRIPLE	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHI2T05**	2	0.5	10.1	125
RE2GHI2T75**	2	0.75	10.8	145
RE2GHI2T10**	2	1	11.8	176
RE2GHI2T13**	2	1.3	12.7	205
RE2GHI2T15**	2	1.5	13.2	224
RE2GHI4T05**	4	0.5	12	203
RE2GHI4T75**	4	0.75	12.8	238
RE2GHI4T10**	4	1	13.8	247
RE2GHI4T13**	4	1.3	15.1	343
RE2GHI4T15**	4	1.5	15.5	376
RE2GHI6T05**	6	0.5	14.5	288
RE2GHI6T75**	6	0.75	15.6	361
RE2GHI6T10**	6	1	17	437
RE2GHI6T13**	6	1.3	18.3	518
RE2GHI6T15**	6	1.5	19	568
RE2GHI8T05**	8	0.5	15.7	358
RE2GHI8T75**	8	0.75	17.1	442
RE2GHI8T10**	8	1	18.3	534
RE2GHI8T13**	8	1.3	20.1	644
RE2GHI8T15**	8	1.5	20.8	710
RE2GHI10T05**	10	0.5	18.7	452
RE2GHI10T75**	10	0.75	20.3	564
RE2GHI10T10**	10	1	22	687
RE2GHI10T13**	10	1.3	24	811
RE2GHI10T15**	10	1.5	24.8	898
RE2GHI12T05**	12	0.5	19.2	522
RE2GHI12T75**	12	0.75	21	651
RE2GHI12T10**	12	1	22.8	794
RE2GHI12T13**	12	1.3	25	944
RE2GHI12T15**	12	1.5	25.7	1052

ELAND PART NO.	NO. OF TRIPLE	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL OVERALL DIAMETER mm	NOMINAL WEIGHT kg/km
RE2GHI16T05**	16	0.5	21.5	678
RE2GHI16T75**	16	0.75	23.5	854
RE2GHI16T10**	16	1	25.5	1005
RE2GHI16T13**	16	1.3	28	1254
RE2GHI16T15**	16	1.5	28.8	1384
RE2GHI20T05**	20	0.5	24.2	843
RE2GHI20T75**	20	0.75	26.3	1050
RE2GHI20T10**	20	1	28.5	1270
RE2GHI20T13**	20	1.3	31.2	1543
RE2GHI20T15**	20	1.5	32.2	1700
RE2GHI24T05**	24	0.5	27.5	1020
RE2GHI24T75**	24	0.75	29.5	1250
RE2GHI24T10**	24	1	32	1466
RE2GHI24T13**	24	1.3	35	1844
RE2GHI24T15**	24	1.5	36.4	2050

Eland Part No. shown above designate the sheath colour (). For each colour substitute * for a colour code as listed below. e.g. RE2GHI24T15RD = 1.5mm² Red

Colour Codes

COLOUR	Black	Blue	Red	Orange
CODE	BK	BL	RD	OR

CONDUCTORS

NOMINAL CROSS SECTIONAL AREA mm ²	MAXIMUM DC RESISTANCE OF CONDUCTOR AT 20°C ohms/km	
	Class 1 & 2	Class 5
0.5	36	39
0.75	24.5	26
1	18.1	19.5
1.3	13.9	-
1.5	12.1	13.3
2.5	7.41	7.98

ELECTRICAL CHARACTERISTICS

Individually and Collectively Screened Cables

NOMINAL CROSS SECTIONAL AREA mm ²	MUTUAL CAPACITANCE pF/m				MINIMUM INSULATION RESISTANCE AT 20°C Mohms/km	MAXIMUM L/R RATIO μH/ohms
	Multi-Core	Multi-Pair	PIMF	TIMF		
0.5	115	110	150	150	300	25
0.75	115	110	150	150	300	25
1	115	110	150	150	300	25
1.3	-	-	150	150	300	40
1.5	115	110	150	150	300	40
2.5	115	110	-	-	300	60

The information contained within this datasheet is for guidance only and is subject to change without notice or liability. All the information is provided in good faith and is believed to be correct at the time of publication. When selecting cable accessories, please note that actual cable dimensions may vary due to manufacturing tolerances.