

## ANNEALED COPPER STRANDED NON COMPACTED CONDUCTOR

### NON COMPACTED SIZES

AREA NOMINAL	AREA ACTUAL	stranding & wire diameter	Approx overall $\phi$	Approx weight	Nominal breaking load	maximum resistance dc at 20°	Current Rating	
							temperate amp	tropical amp
mm <sup>2</sup>	mm <sup>2</sup>	mm	mm	kg/km	KGF	ohm/km		
4	3.97	7/0.85	2.55	36	93	4.61	43	29
6	5.94	7/1.04	3.12	53	140	3.08	61	41
10	10.01	7/1.35	4.05	90	235	1.83	83	56
16	15.89	7/1.7	5.1	143	374	1.15	106	72
25	24.25	7/2.1	6.3	218	570	0.727	136	92
35	34.36	7/2.5	7.5	309	808	0.524	163	110
50	49.48	7/3.0	9	445	1164	0.387	192	130
50	48.36	19/1.8	9	437	1137	0.268	192	130
70	65.82	19/2.10	10.5	595	1548	0.268	237	160
95	93.27	19/2.50	12.5	843	2194	0.193	286	193
120	117	19/2.80	14	1057	2752	0.153	322	218
150	147.1	37/2.25	15.7	1333	3460	0.124	357	242
185	181.6	37/2.50	17.5	1645	4271	0.0991	399	270
240	242.5	37/2.89	20.2	2197	5704	0.0754	459	310
240	242.5	61/2.25	20.2	2201	5704	0.0754	459	310
300	299.4	61/2.50	22.5	2718	7042	0.0601	518	351
400	400.1	61/2.89	26	3632	9410	0.0470	572	387
500	499.8	61/3.23	29.1	4537	11755	0.0366	636	430
630	631.0	61/2.63	22.5	5728	14841	0.0283	712	482
800	801.0	61/4.09	26	7272	18840	0.0221	911	617



A MEMBER OF EL SAYAD GROUP  
SINCE 1935

# EGYPT CABLE

## ANNEALED COPPER STRANDED COMPACTED CONDUCTOR

### COMPACTED SIZES

AREA NOMINAL	AREA ACTUAL	stranding & wire diameter	Approx overall $\phi$	Approx weight	Nominal breaking load	maximum resistance dc at 20°	Rating current	
							temperate amp	tropical amp
mm <sup>2</sup>	mm <sup>2</sup>	mm	mm	kg/km	KGF	ohm/km		
4	3.97	7/1.85	2.45/2.55	35	93	4.61	43	29
6	5.94	7/1.04	3/3.12	52	140	3.08	61	41
10	10.01	7/1.35	3.6/4	87	235	1.83	83	56
16	15.89	7/1.7	4.6/5.2	140	374	1.15	106	72
25	24.25	7/2.1	5.6/6.5	218	570	0.727	136	92
35	34.36	7/2.5	6.6/7.5	305	808	0.524	163	110
50	48.36	19/1.8	7.7/8.5	436	1137	0.268	192	130
70	65.82	19/2.10	9.3/10.2	611	1548	0.268	237	160
95	93.27	19/2.50	11/12.	829	2194	0.193	286	193
120	117	19/2.80	12.3/13.5	1047	2752	0.153	322	218
150	147.1	37/2.25	13.7/15	1308	3460	0.124	357	242
185	181.6	37/2.50	15.3/16.8	1614	4271	0.099	399	270
240	242.5	37/2.89	17.6/19.2	2093	5704	0.0754	459	310
300	299.4	61/2.50	19.7/21.6	2617	7042	0.0601	518	351
400	400.1	61/2.89	22.3/24.6	3489	9410	0.0470	572	387
500	499.8	61/3.23	25.3/27.6	4361	11755	0.0366	636	430
630	631.0	61/2.63	28.7/32.5	5495	14841	0.0283	712	482
800	801.0	61/4.09	33.5/35.5	6978	18840	0.0221	911	617

**HARD DRAWN COPPER STRANDED CONDUCTOR  
NON COMPACTED SIZES**

AREA NOMINAL	AREA ACTUAL	stranding & wire diameter	Approx overall $\Phi$	Approx weight	Nominal breaking load	maximum resistance dc at 20°	Current Rating	
							temperate amp	tropical amp
mm <sup>2</sup>	mm <sup>2</sup>	mm	mm	kg/km	KGF	ohm/km		
4	3.97	7/.85	2.55	35.5	156	4.74	41	28
6	5.94	7/1.04	3.12	53.5	233	3.17	59	40
10	10.01	7/1.35	4.05	90	392	1.88	80	54
16	15.89	7/1.7	5.1	44	623	1.18	103	70
25	24.25	7/2.1	6.3	67	951	0.748	132	90
35	34.36	7/2.5	7.5	94	1347	0.539	158	107
50	49.48	7/3.0	9	135	1940	0.398	187	126
50	48.36	19/1.8	9	133	1896	0.276	187	126
70	65.82	19/2.10	10.5	181	2580	0.276	230	156
95	93.27	19/2.50	12.5	256	3656	0.199	278	188
120	117	19/2.80	14	322	4586	0.157	313	212
150	147.1	37/2.25	15.7	406	5766	0.128	347	235
185	181.6	37/2.50	17.5	501	7119	0.1020	388	262
240	242.5	37/2.89	20.2	670	9506	0.0776	446	302
240	242.5	61/2.25	20.2	670	9506	0.0776	446	302
300	299.4	61/2.50	22.5	827	11736	0.0619	503	341
400	400.1	61/2.89	26	1105	15684	0.0484	556	376
500	499.8	61/3.23	29.1	1381	19592	0.0377	618	418
630	631.0	61/2.63	22.5	827	24734	0.0291	692	468
800	801.0	61/4.09	26	1105	31400	0.0227	886	599

Density 8.89 g/mm<sup>3</sup>

Coefficient of linear expansion for copper  $17 \times 10^{-6}$  per deg C

Temperature Coefficient of resistance for copper 0.00393

Resistivity for hard drawn copper 0.1777 - 0.01786  $\Omega$ mm<sup>2</sup>/m

Ultimate tensile strength for hard drawn copper 40 kg/mm<sup>2</sup>

Resistivity for annealed copper 0.01724  $\Omega$ mm<sup>2</sup>/m

Ultimate tensile strength for annealed copper 24-26 kg/mm<sup>2</sup>

Note ; all the values in this catalogue for information purpose only.