



## ALL ALUMINUM CONDUCTOR STEEL REINFORCED (ACSR) - AS 3607:1989

Code Name / Nominal Area	Sectional Area	Stranding		Wire diameter		Diameter of Complete Conductor	Conductor Weight	Rated Strength	DC Resistance @ 20°C	Current Capacity			
		No. of Wires		AL	Steel					AL	Steel	@ 75°C	@ 85°C
		(No.)	(No.)	(mm)	(mm)					(mm)	(Kg/km)	KN	(Ω/Km)
34	34.36	6	1	2.50	2.50	7.50	119	10.5	0.9750	110	131		
42	41.58	6	1	2.75	2.75	8.30	144	12.6	0.8050	124	148		
49	49.48	6	1	3.00	3.00	9.00	171	14.9	0.6770	137	164		
77	77.31	6	1	3.75	3.75	11.30	268	22.7	0.4330	178	216		
120	120.40	6	7	4.75	1.60	14.30	402	33.4	0.2710	235	287		
182	181.60	30	7	2.50	2.50	17.50	677	63.5	0.1960	306	377		
262	261.50	30	7	3.00	3.00	21.00	973	90.4	0.1360	378	470		
307	306.90	30	7	3.25	3.25	22.80	1140	105.0	0.1160	414	518		
356	356.00	30	7	3.50	3.50	24.50	1320	122.0	0.1000	450	565		
431	431.20	54	7	3.00	3.00	27.00	1440	119.0	0.0758	516	653		
506	506.00	54	7	3.25	3.25	29.30	1690	137.0	0.0646	564	718		
587	586.90	54	7	3.50	3.50	31.50	1960	159.0	0.0557	612	783		
672	672.00	54	19	3.75	2.25	33.80	2240	178.0	0.0485	660	850		
17	16.84	3	4	1.75	1.75	5.30	95	12.7	3.2500	56	67		
34	34.36	3	4	2.50	2.50	7.50	195	24.4	1.5900	86	103		
49	49.48	4	3	3.00	3.00	9.00	243	28.3	0.8970	119	143		
77	77.31	4	3	3.75	3.75	11.30	380	43.9	0.5730	155	188		

**Note:** Current capacity based on referenced conductor temperature, 0.56 m/s wind, 0 m Elevation, 0.45 Emmissivity, 0.80 absorptivity, 45°C Ambient temperatures, 1045 W/m<sup>2</sup> Solar radiation

