

Aluminium Conductor Steel Supported (ACSS/RW - AW(X))

ACSS/RW (AW2 & AW3 (ASTM B856))																			
Code Name	Strands No.		Diameter (mm)			Area (mm ²)			Weight of Conductor (kg/km)			Rated Strength (kN)		Resistance (Ω/km)			Coefficient of Linear Expansion *10 ⁻⁶ (1/°C)	Modulus of Elasticity (final) (kg/mm ²)	Creep Temp. EST. (°C)
	Al.	St.	Al.	St.	Total	Al.	St.	Total	Al.	St.	Total	AW2	AW3	DC at 20 °C	AC at 25 °C	AC at 75 °C			
Petrel	12	7	2.34	2.34	11.70	51.58	30.09	81.66	143.00	199.06	342.06	43.15	45.37	0.4636	0.4730	0.5658	16.71	9740.58	16.57
Minorca	12	7	2.44	2.44	12.20	56.15	32.76	88.91	155.69	216.72	372.42	47.15	49.37	0.4258	0.4345	0.5197	16.71	9740.58	16.57
Leghorn	12	7	2.69	2.69	13.45	68.19	39.78	107.97	189.06	263.18	452.24	57.38	60.05	0.3507	0.3579	0.4281	16.71	9740.58	16.57
Guinea	12	7	2.92	2.92	14.62	80.55	46.99	127.54	223.34	310.89	534.23	67.61	70.72	0.2968	0.3032	0.3626	16.71	9740.58	16.57
Dotterel	12	7	3.08	3.08	15.42	89.61	52.27	141.88	248.46	345.86	594.32	75.17	76.95	0.2668	0.2725	0.3259	16.71	9740.58	16.57
Dorking	12	7	3.20	3.20	16.01	96.68	56.40	153.08	268.07	373.16	641.23	81.40	83.18	0.2473	0.2526	0.3021	16.71	9740.58	16.57
Brahma	16	19	2.86	2.48	18.13	102.97	91.89	194.86	285.50	609.22	894.71	129.44	135.66	0.2138	0.2185	0.2610	15.71	10846.74	16.65
Cochin	12	7	3.37	3.37	16.85	107.07	62.46	169.53	296.86	413.24	710.11	87.63	92.07	0.2233	0.2283	0.2730	16.71	9740.58	16.57
Junco	30	7	2.40	2.40	16.77	135.17	31.54	166.71	375.70	208.68	584.38	49.82	52.04	0.1966	0.2010	0.2409	19.05	7818.68	17.86
Patridge	26	7	2.57	2.00	16.30	135.19	22.02	157.21	374.82	145.72	520.54	37.23	39.50	0.2006	0.2051	0.2458	19.89	7292.20	18.40
Ostrich	26	7	2.73	2.12	17.27	151.96	24.73	176.69	421.33	163.62	584.94	41.81	44.48	0.1784	0.1827	0.2190	19.89	7290.80	18.41
Linnet	26	7	2.89	2.25	18.30	170.31	27.78	198.09	472.20	183.80	656.01	46.70	49.82	0.1592	0.1633	0.1957	19.89	7293.78	18.40
Oriole	30	7	2.69	2.69	18.83	170.47	39.78	210.25	473.81	263.18	736.99	63.16	65.83	0.1559	0.1599	0.1916	19.05	7818.68	17.86
Lbis	26	7	3.14	2.44	19.89	201.26	32.82	234.08	558.02	217.18	775.19	55.16	57.82	0.1347	0.1382	0.1656	19.89	7293.62	18.40
Lark	30	7	2.92	2.92	20.46	201.38	46.99	248.37	559.71	310.89	870.61	74.28	77.84	0.1320	0.1353	0.1622	19.05	7818.68	17.86
Brant	24	7	3.27	2.18	19.61	201.42	26.11	227.54	558.48	172.76	731.23	46.26	48.93	0.1360	0.1395	0.1673	20.36	7020.51	18.70
Hawk	26	7	3.44	2.67	21.78	241.52	39.33	280.85	669.65	260.21	929.85	66.28	69.39	0.1123	0.1154	0.1383	19.89	7291.56	18.40
Hen	30	7	3.20	3.20	22.42	241.71	56.40	298.11	671.81	373.16	1044.97	89.40	91.18	0.1100	0.1130	0.1354	19.05	7818.68	17.86
Flicker	24	7	3.58	2.39	21.49	241.77	31.34	273.11	670.32	207.36	877.68	55.60	57.82	0.1133	0.1165	0.1397	20.36	7020.51	18.70
Dove	26	7	3.72	2.89	23.54	281.97	45.93	327.91	781.80	303.91	1085.71	77.84	80.95	0.0962	0.0992	0.1189	19.89	7292.09	18.40
Eagle	30	7	3.46	3.46	24.22	281.98	65.80	347.78	783.73	435.33	1219.06	101.86	106.75	0.0943	0.0972	0.1165	19.05	7818.68	17.86
Parakeet	24	7	3.87	2.58	23.21	282.07	36.54	318.61	782.07	241.77	1023.84	64.94	67.61	0.0972	0.1002	0.1201	20.36	7019.79	18.70
Squabe	26	7	3.87	3.01	24.53	306.38	49.89	356.27	849.47	330.09	1179.56	84.51	87.63	0.0885	0.0916	0.1098	19.89	7291.59	18.40
Wood Duck	30	7	3.61	3.61	25.25	306.51	71.52	378.03	851.91	473.19	1325.10	108.53	113.42	0.0867	0.0898	0.1076	19.05	7818.68	17.86
Teal	30	19	3.61	2.16	25.25	306.51	69.88	376.39	851.91	463.30	1315.20	111.20	118.32	0.0869	0.0899	0.1078	19.11	7780.92	17.89
Peacock	24	7	4.03	2.68	24.17	306.66	39.40	346.06	850.25	260.70	1110.95	70.72	73.39	0.0894	0.0925	0.1110	20.38	7010.92	18.71
Scoter	30	7	3.70	3.70	25.89	322.25	75.19	397.44	895.65	497.49	1393.14	111.64	119.21	0.0825	0.0854	0.1023	19.05	7818.68	17.86
Egret	30	19	3.70	2.22	25.89	322.25	73.54	395.79	895.65	487.53	1383.18	116.98	124.54	0.0826	0.0855	0.1025	19.11	7782.40	17.89
Grosbeak	26	7	3.97	3.09	25.16	322.25	52.45	374.69	893.48	347.00	1240.47	88.52	90.29	0.0841	0.0871	0.1044	19.89	7290.89	18.41
Rook	24	7	4.14	2.76	24.81	322.30	41.75	364.06	893.63	276.26	1169.89	74.28	76.95	0.0850	0.0880	0.1055	20.36	7019.84	18.70
Gannet	26	7	4.07	3.16	25.75	337.68	54.98	392.65	936.25	363.75	1300.00	92.96	94.74	0.0803	0.0835	0.1001	19.89	7291.37	18.40
Flamingo	24	7	4.23	2.82	25.40	337.93	43.78	381.71	936.95	289.66	1226.61	77.84	80.95	0.0811	0.0840	0.1007	20.36	7019.85	18.70
Redwing	30	19	3.92	2.35	27.46	362.38	82.73	445.11	1007.19	548.45	1555.64	131.22	137.44	0.0735	0.0764	0.0916	19.11	7783.02	17.89
Starling	26	7	4.21	3.28	26.69	362.59	59.02	421.61	1005.31	390.52	1395.83	97.86	101.86	0.0748	0.0778	0.0933	19.89	7291.17	18.40
Stilt	24	7	4.39	2.92	26.32	362.69	46.99	409.68	1005.61	310.89	1316.51	83.62	86.74	0.0756	0.0786	0.0942	20.36	7019.88	18.70
Condor	54	7	3.08	3.08	27.73	402.59	52.19	454.77	1116.22	345.29	1461.51	92.96	94.74	0.0681	0.0712	0.0854	20.36	7020.51	18.70
Turn	45	7	3.38	2.25	27.01	402.72	27.84	430.57	1116.60	184.22	1300.82	60.05	63.16	0.0694	0.0726	0.0871	21.40	6483.40	19.29

Aluminium Conductor Steel Supported (ACSS/RW - AW(X))

ACSS/RW (AW2 & AW3 (ASTM B856))																			
Code Name	Strands No.		Diameter (mm)			Area (mm ²)			Weight of Conductor (kg/km)			Rated Strength (kN)		Resistance (Ω/km)			Coefficient of Linear Expansion *10 ⁻⁶ (1/°C)	Modulus of Elasticity (final) (kg/mm ²)	Creep Temp. EST. (°C)
	Al.	St.	Al.	St.	Total	Al.	St.	Total	Al.	St.	Total	AW2	AW3	DC at 20 °C	AC at 25 °C	AC at 75 °C			
Cuckoo	24	7	4.62	3.08	27.73	402.81	52.19	455.00	1116.84	345.29	1462.13	92.96	94.74	0.0680	0.0712	0.0854	20.36	7019.91	18.70
Mallard	30	19	4.14	2.48	28.95	402.88	91.89	494.77	1119.76	609.22	1728.97	146.34	152.57	0.0661	0.0692	0.0829	19.11	7781.58	17.89
Macaw	42	7	3.50	1.94	26.79	402.93	20.70	423.63	1117.18	136.98	1254.15	50.71	52.49	0.0698	0.0730	0.0876	21.77	6314.03	19.48
Drake	26	7	4.44	3.45	28.13	402.99	65.60	468.60	1117.35	434.05	1551.40	108.53	112.98	0.0673	0.0704	0.0844	19.89	7291.20	18.40
Ruddy	45	7	3.59	2.40	28.74	455.89	31.54	487.43	1264.00	208.68	1472.68	68.05	70.28	0.0613	0.0646	0.0775	21.40	6483.86	19.29
Canary	54	7	3.28	3.28	29.51	456.03	59.11	515.14	1264.39	391.12	1655.52	103.19	107.20	0.0601	0.0633	0.0760	20.36	7020.51	18.70
Canvasback	30	19	4.53	2.72	31.70	483.25	110.22	593.47	1343.13	730.72	2073.85	175.25	182.81	0.0551	0.0581	0.0696	19.11	7781.52	17.89
Cardinal	54	7	3.38	3.38	30.38	483.27	62.65	545.91	1339.92	414.49	1754.41	109.42	113.42	0.0567	0.0598	0.0717	20.36	7020.51	18.70
Rail	45	7	3.70	2.47	29.59	483.37	33.44	516.81	1340.20	221.26	1561.46	72.06	74.28	0.0578	0.0610	0.0731	21.40	6483.85	19.29
Redbird	24	7	5.06	3.38	30.39	483.51	62.65	546.16	1340.59	414.49	1755.08	24.60	113.42	0.0567	0.0597	0.0716	20.36	7019.96	18.70
Towhee	48	7	3.58	2.79	29.85	483.53	42.68	526.21	1340.65	282.41	1623.06	84.51	87.63	0.0574	0.0606	0.0726	21.05	6659.78	19.10
Ortolan	45	7	3.85	2.57	30.78	523.34	36.18	559.52	1451.02	239.39	1690.41	78.28	80.51	0.0534	0.0568	0.0681	21.40	6483.40	19.29
Curlew	54	7	3.51	3.51	31.62	523.34	67.84	591.18	1451.02	448.85	1899.88	116.09	123.21	0.0524	0.0557	0.0667	20.36	7020.51	18.70
Snowbird	42	7	3.99	2.21	30.55	523.89	26.91	550.80	1452.55	178.03	1630.58	65.83	68.50	0.0537	0.0571	0.0684	21.77	6313.85	19.48
Bluejay	45	7	4.00	2.66	26.63	564.18	38.96	603.13	1564.25	257.74	1821.99	84.07	86.74	0.0495	0.0527	0.0632	21.41	6482.58	19.29
Finch	54	19	3.65	2.19	32.82	564.22	71.37	635.59	1572.00	473.14	2045.13	127.66	135.22	0.0488	0.0519	0.0623	20.41	6994.05	18.73
Grackle	54	19	3.77	2.27	33.98	604.19	76.60	680.79	1683.37	507.82	2191.19	137.00	145.00	0.0456	0.0490	0.0587	20.41	6996.50	18.73
Bunting	45	7	4.14	2.76	33.08	604.32	41.75	646.07	1675.55	276.26	1951.81	90.29	92.96	0.0462	0.0497	0.0596	21.41	6483.01	19.29
Bittern	45	7	4.27	2.85	34.16	644.31	44.57	688.88	1786.42	294.90	2081.32	96.08	99.19	0.0434	0.0466	0.0559	21.40	6483.79	19.29
Pheasant	54	19	3.90	2.34	35.09	644.70	81.66	726.36	1796.22	541.38	2337.60	145.89	151.68	0.0427	0.0459	0.0550	20.41	6995.54	18.73
Martin	54	19	4.02	2.41	36.16	684.78	86.70	771.48	1907.90	574.80	2482.70	155.24	161.02	0.0402	0.0437	0.0524	20.41	6995.09	18.73
Dipper	45	7	4.40	2.93	35.21	684.78	47.32	732.10	1898.65	313.06	2211.71	145.89	151.68	0.0408	0.0443	0.0532	21.41	6483.03	19.29
Bobolink	45	7	4.53	3.02	36.23	724.87	50.14	775.01	2009.79	331.76	2341.55	108.09	111.64	0.0386	0.0419	0.0502	21.40	6483.77	19.29
Plover	54	19	4.14	2.48	37.22	725.18	91.89	817.08	2020.47	609.22	2629.68	164.13	170.80	0.0380	0.0413	0.0495	20.41	6995.98	18.73
Parrot	54	19	4.25	2.55	38.22	764.91	96.85	861.76	2131.16	642.07	2773.23	173.03	179.70	0.0360	0.0396	0.0475	20.41	6995.12	18.73
Nuthatch	45	7	4.65	3.10	37.22	765.26	52.88	818.14	2121.77	349.86	2471.63	114.31	116.09	0.0365	0.0402	0.0482	21.41	6483.05	19.29
Falcon	54	19	4.36	2.62	39.23	805.70	102.13	907.83	2244.80	677.10	2921.90	182.81	189.48	0.0342	0.0376	0.0451	20.41	6996.38	18.73
Lapwing	45	7	4.78	3.18	38.20	805.88	55.69	861.57	2234.42	368.44	2602.85	120.10	122.32	0.0347	0.0382	0.0458	21.41	6483.06	19.29
Ratite	42	7	4.94	2.75	37.89	805.90	41.45	847.34	2234.45	274.23	2508.68	100.97	104.08	0.0349	0.0384	0.0460	21.76	6314.51	19.48
Chukar	84	19	3.70	2.22	33.28	902.29	73.37	975.66	2513.92	486.42	3000.34	149.45	157.01	0.0310	0.0346	0.0415	21.17	6596.39	19.17
Mockingbird	72	7	4.27	2.85	34.16	1030.89	44.57	1075.46	2872.21	294.90	3167.11	117.87	120.99	0.0275	0.0312	0.0374	21.94	6234.40	19.56
Roadrunner	76	19	4.18	1.95	34.82	1042.05	56.78	1098.84	2903.32	376.45	3279.76	134.77	141.00	0.0271	0.0307	0.0368	21.70	6344.12	19.45
Bluebird	84	19	4.07	2.44	36.62	1092.32	88.91	1181.23	3043.36	589.42	3632.78	181.03	187.26	0.0256	0.0295	0.0354	21.17	6597.10	19.17
Kiwi	72	7	4.41	2.94	35.26	1098.19	47.48	1145.67	3059.71	314.14	3373.86	125.43	128.99	0.0258	0.0298	0.0357	21.94	6234.39	19.56
Thrasher	76	19	4.43	2.07	36.92	1171.25	63.79	1235.04	3263.29	422.89	3686.18	151.68	158.35	0.0241	0.0278	0.0333	21.70	6343.84	19.45
Joree	76	19	4.62	2.16	38.50	1274.16	69.39	1343.55	3550.00	460.04	4010.04	165.02	172.14	0.0221	0.0260	0.0312	21.70	6343.83	19.45