

Scorpion SII-2215-1127 Motor Propeller Data									
Motor Wind 15-Turn Delta		Motor Kv 1127 RPM/Volt		No-Load Current I ₀ = 0.73 Amps @ 10v		Motor Resistance R _m = 0.078 Ohms		I Max 20 Amps	P Max (3S) 220 W
Outside Diameter 27.9 mm, 1.098in.		Body Length 33.0 mm, 1.299 in.		Total Shaft Length 52.0 mm, 2.047 in.		Shaft Diameter 2.98 mm, 0.117 in.		Motor Weight 68.8 gm, 2.43 oz	
Prop Manf.	Prop Size	Input Voltage	Motor Amps	Watts Input	Prop RPM	Pitch Speed	Thrust Grams	Thrust Ounces	Thrust Eff. Grams/W
APC	9x3.8-SF	7.4	9.92	73.4	7,240	26.1	546.9	19.29	7.45
APC	9x4.5-E	7.4	9.29	68.7	7,373	31.4	527.8	18.62	7.68
APC	9x4.7-SF	7.4	10.39	76.9	7,140	31.8	574.2	20.25	7.47
APC	9x6-E	7.4	10.65	78.8	7,082	40.2	526.7	18.58	6.68
APC	9x6-SF	7.4	15.11	111.8	6,186	35.1	618.1	21.80	5.53
APC	9x7.5-E	7.4	14.12	104.5	6,355	45.1	523.2	18.46	5.01
APC	9x7.5-SF	7.4	17.03	126.0	5,816	41.3	578.4	20.40	4.59
APC	9x9-E	7.4	16.58	122.7	5,884	50.1	465.5	16.42	3.79
APC	10x3.8-SF	7.4	14.16	104.8	6,365	22.9	710.3	25.05	6.78
APC	10x4.7-SF	7.4	15.09	111.7	6,188	27.5	731.9	25.82	6.55
APC	10x5-E	7.4	12.04	89.1	6,812	32.3	637	22.47	7.15
APC	10x6-E	7.4	13.34	98.7	6,553	37.2	665.4	23.47	6.74
APC	10x7-E	7.4	14.70	108.8	6,272	41.6	658.2	23.22	6.05
APC	10x7-SF	7.4	18.58	137.5	5,476	36.3	727.8	25.67	5.29
APC	10x10-E	7.4	19.53	144.5	5,313	50.3	495.5	17.48	3.43
APC	11x3.8-SF	7.4	15.31	113.3	6,122	22.0	777.9	27.44	6.87
APC	11x4.7-SF	7.4	17.65	130.6	5,651	25.2	834.1	29.42	6.39
APC	11x5.5-E	7.4	15.31	113.3	6,138	32.0	777.8	27.44	6.87
APC	11x7-E	7.4	17.20	127.3	5,777	38.3	788.4	27.81	6.19
APC	11x7-SF	7.4	21.18	156.7	4,929	32.7	828.3	29.22	5.29
APC	11x8-E	7.4	18.31	135.5	5,538	42.0	707.6	24.96	5.22
APC	11x8.5-E	7.4	18.89	139.8	5,437	43.8	746.9	26.35	5.34
APC	11x10-E	7.4	21.54	159.4	4,902	46.4	569.9	20.10	3.57
APC	12x3.8-SF	7.4	19.40	143.5	5,289	19.0	886.4	31.27	6.18
APC	12x6-E	7.4	17.84	132.0	5,608	31.9	870.4	30.70	6.59
APC	13x4-E	7.4	16.69	123.5	5,878	22.3	896.7	31.63	7.26
GEM	8x4.5-C	7.4	9.17	67.9	7,135	30.4	478.1	16.86	7.04
GEM	9x4.7-C	7.4	10.51	77.8	6,889	30.7	562.3	19.83	7.23
GEM	10x4.5	7.4	14.60	108.0	6,280	26.8	712	25.11	6.59
GEM	10x4.5-C	7.4	14.08	104.2	6,228	26.5	693.9	24.48	6.66
GEM	11x4.7-C	7.4	17.55	129.8	5,699	25.4	843.2	29.74	6.49
GEM	12x4.5-C	7.4	19.50	144.3	5,291	22.5	832.6	29.37	5.77
GWS	8x4x3-DD	7.4	6.87	50.8	8,021	30.4	393.9	13.89	7.75
GWS	9x5-DD	7.4	9.16	67.8	7,392	35.0	538.7	19.00	7.95
GWS	9x5x3-DD	7.4	11.08	82.0	6,982	33.1	578.6	20.41	7.05
GWS	9x7.5-DD	7.4	13.52	100.1	6,500	46.2	516.2	18.21	5.16
GWS	10x6-DD	7.4	11.83	87.5	6,831	38.8	635	22.40	7.25
GWS	10x6x3-DD	7.4	14.54	107.6	6,292	35.8	721.6	25.45	6.71
GWS	10x8-HD	7.4	16.87	124.9	5,834	44.2	610.6	21.54	4.89
GWS	11x4.7-SF	7.4	17.39	128.7	5,706	25.4	829.9	29.27	6.45
GWS	11x7-DD	7.4	16.05	118.8	6,006	39.8	798.2	28.16	6.72
GWS	12x8-DD	7.4	20.03	148.2	5,167	39.1	860.1	30.34	5.80
MAS	7x4x3	7.4	5.75	42.5	8,160	46.4	238.8	8.42	5.61
MAS	8x6x3	7.4	10.25	75.9	7,162	40.7	411.1	14.50	5.42
MAS	9x7x3	7.4	14.21	105.1	6,364	42.2	561.1	19.79	5.34
MAS	10x5x3	7.4	12.95	95.8	6,613	31.3	657	23.17	6.86
MAS	10x7x3	7.4	16.64	123.1	5,881	39.0	714.6	25.21	5.81
MAS	11x7x3	7.4	18.64	138.0	5,467	36.2	811.6	28.63	5.88
MAS	11x8x3	7.4	19.60	145.1	5,298	40.1	807.4	28.48	5.57
Prop Manf.	Prop Size	Input Voltage	Motor Amps	Watts Input	Prop RPM	Pitch Speed	Thrust Grams	Thrust Ounces	Thrust Eff. Grams/W
APC	7x4-E	11.1	8.93	99.1	11,764	44.6	568.9	20.07	5.74
APC	7x4-SF	11.1	9.13	101.3	11,724	44.4	552.1	19.47	5.45
APC	7x5-E	11.1	11.26	125.0	11,203	53.0	577	20.35	4.62
APC	7x5-SF	11.1	11.08	123.0	11,243	53.2	590.7	20.84	4.80
APC	7x6-E	11.1	11.71	130.0	11,094	63.0	618.2	21.81	4.76
APC	7x6-SF	11.1	13.30	147.7	10,764	61.2	575.3	20.29	3.90
APC	8x3.8-SF	11.1	14.60	162.1	10,473	37.7	840.5	29.65	5.19
APC	8x4-E	11.1	12.72	141.2	10,878	41.2	762.2	26.89	5.40
APC	8x6-E	11.1	17.19	190.8	9,872	56.1	836	29.49	4.38
APC	8x6-SF	11.1	21.54	239.0	8,897	50.6	848.8	29.94	3.55
APC	8x8-E	11.1	21.59	239.7	8,861	67.1	715	25.22	2.98
APC	9x4.5-E	11.1	16.92	187.8	9,940	42.4	1005.2	35.46	5.35
APC	9x6-E	11.1	18.97	210.6	9,454	53.7	955.4	33.70	4.54
APC	9x7.5-E	11.1	24.18	268.4	8,206	58.3	895	31.57	3.33
GEM	8x4.5-C	11.1	16.15	179.2	9,646	41.1	888.5	31.34	4.96
GEM	9x4.7-C	11.1	17.80	197.6	9,277	41.3	1016.6	35.86	5.14
GEM	10x4.5-C	11.1	23.29	258.6	7,989	34.0	1186.2	41.84	4.59
MAS	7x4x3	11.1	10.15	112.7	11,479	43.5	541.8	19.11	4.81
MAS	8x6x3	11.1	17.62	195.6	9,791	55.6	858.9	30.30	4.39
MAS	9x7x3	11.1	23.38	259.6	8,417	55.8	1095.7	38.65	4.22

Propeller Chart Color Code Explanation

- The prop is too small to get good performance from the motor. (Less than 50% power)
- The prop is sized right to get good power from the motor. (50 to 80% power)
- The prop can be used, but full throttle should be kept to short bursts. (80 to 100% power)
- The prop is too big for the motor and should not be used. (Over 100% power)

PLEASE NOTE:

The data contained in this prop chart is based on actual measurements taken in a controlled test environment. The test voltages used are based on a properly sized Li-Po battery for the current draw of the motor being tested. If you are using a larger than normal capacity battery, or a very high C-Rated battery, your actual voltages will be higher than those shown in this chart, and this will result in higher current draw for each prop used. You should always test your power system with a watt meter whenever a prop is used to ensure that you are not exceeding the recommended rating of the motor being used. The prop recommendations in this chart are based on the motor receiving adequate cooling throughout its operation. If your motor is being used inside a cowl, you must provide adequate cooling to the motor and make sure that the motor is not getting too hot during operation.