

Prop Selection Chart

This chart is provided as a guide to demonstrate what has worked for different sizes of engines in various aircraft. The extremes on either end of the scale may provide poor performance for your aircraft. Use these figures *only* as a guide for possible configurations. Begin by using the propeller diameter and pitch recommended by the engine manufacturer. If this information is not available, choose the diameter of propeller within the middle of the scale and experiment with the different pitches listed. This will provide a good performance propeller regardless of your aircraft set up. On the other hand, if you already discovered turning a very small or a much larger diameter propeller on your engine has provided superior performance, continue using this diameter and experiment with the pitch to fine tune for optimum performance. A general rule is that planes with a lot of drag perform better with a larger diameter propellers and a finer pitch. Airplanes with very little drag perform better with smaller diameter propellers and a coarser pitch. In unique situations, such as “engine break-in”, it may be necessary to use a pitch that is not listed until the “break-in”

2 and 4 Cycle Engines

Note: 4 cycle engines use the larger diameter props.

Engine Conversion Formula

- to find “Cubic Centimeters” multiply “Cubic Inches” by 16.393
- to find “Cubic Inches” multiply “Cubic Centimeters” by 0.061

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
1.00 Cubic Inch (16cc)	2 Blade	16	5 to 7
		18	5
1.50 Cubic Inch (25cc)	2 Blade	16	8 to 10
		18	6 to 8
		20	6
2.00 Cubic Inch (33cc)	3 Blade	16	6
	2 Blade	16	10 to 12
		18	8 to 11
		20	6 to 8

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options	
2.00 Cubic Inch (33cc) <i>Continued</i>	2 Blade	22	6	
	3 Blade	16	6 to 8	
2.50 Cubic Inch (40cc)	2 Blade	16	12	
		18	10 to 12	
		20	8 to 11	
		22	6 to 8	
		24	6	
	3 Blade	16	8 to 10	
		18	6 to 8	
	4 Blade	16	6 to 8	
	3.00 Cubic Inch (50cc)	2 Blade	18	12
			20	10 to 12
		22	8 to 10	
		24	6 to 8	
		26	6	
3 Blade		16	10 to 12	
		18	8 to 10	
		20	6 to 8	

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
3.00 Cubic Inch (50cc) <i>Continued</i>	4 Blade	16	8 to 10
		18	6 to 8
3.50 Cubic Inch (57cc)	2 Blade	20	12
		22	9 to 11
		24	8 to 10
		26	6 to 8
	3 Blade	18	10 to 12
		20	8 to 10
		22	6 to 8
	4 Blade	16	10 to 12
		18	8 to 10
		20	6 to 8
	4.00 Cubic Inch (65cc)	2 Blade	22
		24	9 to 11
		26	8 to 10
3 Blade		18	12
		20	10 to 12
		22	7 to 9

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
4.00 Cubic Inch (65cc) <i>Continued</i>	4 Blade	16	12 to 14
		18	10 to 12
		20	7 to 9
4.50 Cubic Inch (74cc)	2 Blade	22	11 to 13
		24	10 to 12
		26	9 to 11
		28	8
	3 Blade	20	10 to 13
		22	8 to 10
		24	8
	4 Blade	18	10 to 13
		20	8 to 10
		22	6 to 8
5.00 Cubic Inch (82cc)	2 Blade	22	12 to 14
		24	11 to 13
		26	10 to 12
		28	8 to 10
	3 Blade	20	11 to 14

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
5.00 Cubic Inch (82cc) <i>Continued</i>	3 Blade	22	8 to 11
		24	7 to 10
	4 Blade	18	11 to 14
		20	8 to 11
		22	7 to 10
5.50 Cubic Inch (90cc)	2 Blade	22	14
		24	12 to 14
		26	10 to 13
		28	8 to 11
	3 Blade	20	14
		22	9 to 12
		24	8 to 11
	4 Blade	18	14 to 16
		20	9 to 12
		22	8 to 11
6.00 Cubic Inch (98cc)	2 Blade	24	14
		26	11 to 13
		28	9 to 11

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
6.00 Cubic Inch (98cc) <i>Continued</i>	3 Blade	22	11 to 14
		24	9 to 12
		26	8 to 10
	4 Blade	20	11 to 14
		22	9 to 12
		24	14 to 16
6.50 Cubic Inch (107cc)	2 Blade	26	11 to 14
		28	9 to 12
		30	8
	3 Blade	22	14
		24	11 to 14
		26	9 to 11
	4 Blade	20	14 to 16
		22	11 to 14
		24	8 to 10
7.00 Cubic Inch (115cc)	2 Blade	26	12 to 14
		28	10 to 12
		30	8 to 10

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
7.00 Cubic Inch (115cc) <i>Continued</i>	3 Blade	24	12 to 14
		26	10 to 12
		28	8
	4 Blade	20	14 to 16
		22	11 to 14
		24	8 to 10
7.50 Cubic Inch (123cc)	2 Blade	26	13 to 14
		28	10 to 13
		30	8 to 11
	3 Blade	24	13
		26	11 to 13
		28	8 to 10
	4 Blade	22	13 to 15
		24	11 to 13
8.00 Cubic Inch (130cc)	2 Blade	26	14
		28	11 to 13
		30	9 to 11

Prop Selection Chart

Engine Size	Prop Type 2, 3, or 4 Blade	Prop Diameter	Pitch Options
8.00 Cubic Inch (130cc) <i>Continued</i>	3 Blade	24	14
		26	11 to 14
		28	8 to 11
	4 Blade	22	14 to 16
		24	11 to 14
		26	8 to 11
8.50 Cubic Inch (140cc)	2 Blade	28	11 to 14
		30	9 to 12
		32	8
	3 Blade	26	12 to 14
		28	9 to 12
		30	8 to 10
	4 Blade	24	12 to 15
		26	9 to 12
	28	7 to 10	