



Airmaster

High Performance Propeller Systems

AP533

Constant Speed Feathering Propeller



Higher Performance for your Aircraft

Airmaster Propellers are setting new standards of performance and value in the light experimental aircraft market. By combining the best composite blade technology currently available, with a precise and reliable constant speed hub system, Airmaster is able to provide a unique performance enhancement to today's modern aircraft.



Mission Statement

Our aim is to produce a range of the highest quality, best performing Constant Speed Propeller systems at a reasonable cost. Our goal is for the Airmaster name to be synonymous with: Quality, Performance, Technical Innovation and Value.

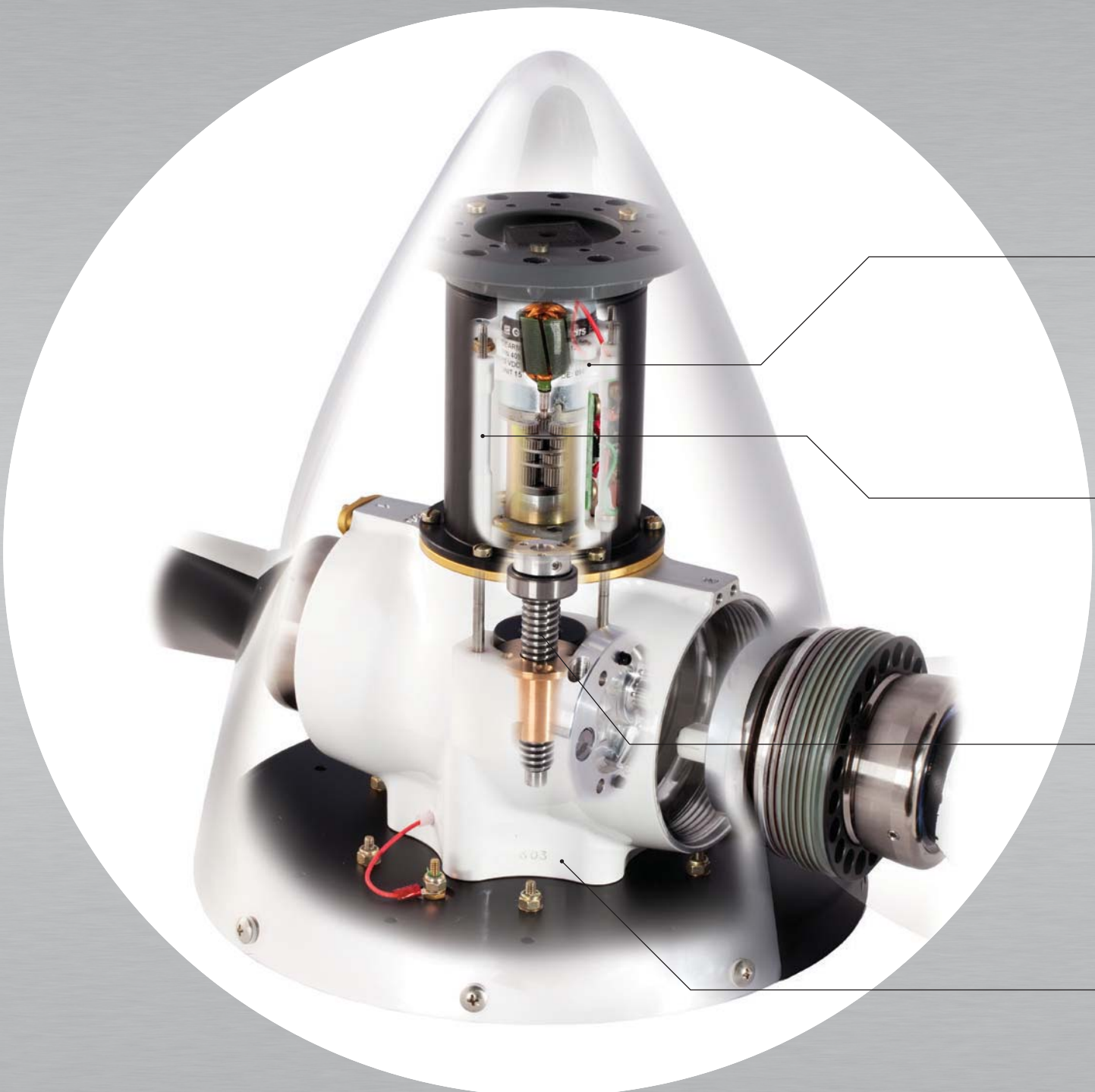


Money Back Guarantee

We place a lot of pride in the quality of our propellers and offer a money back guarantee of satisfaction in addition to the standard product warranty of two years.

We are so confident that you will be pleased with the performance and quality of your Airmaster propeller, we are willing to fully refund the purchase price any time up to sixty days after delivery.

This gives you complete buying protection and peace of mind.



Model AP420 shown for illustration purposes

Airmaster AC200 'SmartPitch' Controllers



Easy to Operate with simple selection of engine speeds for TakeOff, Climb and Cruise.



Precise Speed Control from modern electric 'solid state' governor.



Hold Speed adjustable in flight to pilots requirements.

Flexible and Robust with full manual override.

Advanced Functions feathering capability is standard and reversing functions are available as an option for amphibious aircraft.



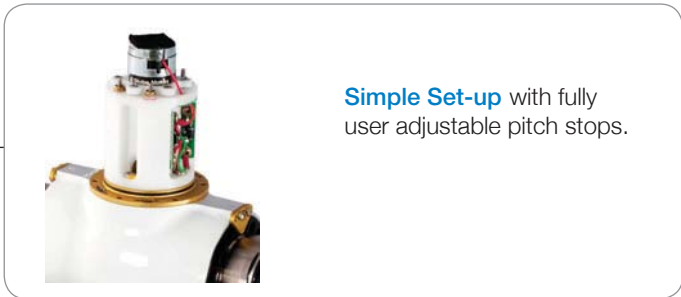
Instant Pilot Feedback through clear indications informing the pilot of the propeller status.

Product Features

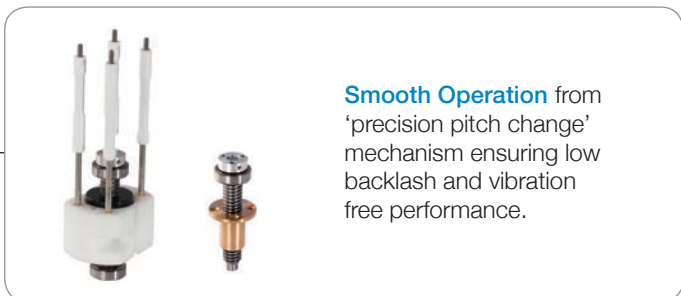
Each Airmaster propeller is crafted to the specific requirements of your aircraft and engine combination. We supply a full system incorporating CS hub, composite blades, CS governor, spinner, extensions, wiring and hardware.



Electric Actuation using a quality servo gearmotor



Simple Set-up with fully user adjustable pitch stops.



Smooth Operation from 'precision pitch change' mechanism ensuring low backlash and vibration free performance.



Superior Strength from fully machined, one piece hub.



Easy Installation and maintenance due to removable blade cartridge.



Blade Options AP533

A range of high performing blades using the industry standard 2.375in shank are available.

- Aerodynamically advanced blade designs from Whirlwind Propellers Corp (USA). Efficient, quiet and light weight.
- Solid metal inlaid leading edge provides excellent protection against airborne water damage.
- Flexible design allows for clockwise and anti-clockwise rotation on tractor and pusher applications. Available for a range diameters and a variety of airspeeds.
- High gloss, natural carbon fibre finish gives good looks and a long life.



Spinner Options

High quality spun aluminium spinners, pre-cut and fitted in a choice of sizes and finishes of painted, polished, or matt for painting.

Mounting Options

Propeller extensions available in sizes 0.5in (12.5mm) up to 4in (100mm) to suit every engine and aircraft combination.

AP533 Specifications			
Power Capacity	Direct drive 4 cyl	180hp (135kW)*	
	Direct drive 6 cyl	200hp (150kW)*	
	Geared Engines	220hp (165kW)*	
Maximum Speed	3000rpm		
Maximum Diameter	Up to 72in (1828mm)*		
Moment of Inertia	~0.72kgm ² *		
Weight	On engine weight (hub, blades, spinner, brush block).	34lb (15.5kg)*	
	In cockpit weight (controller and cables).	0.6lb (0.3kg)	
Prop Flange	SAE-1 (SAE-2 with adapter).		
Engines	UL520iS, Lycoming O-320 / O-360**, Jabiru 5100 Other engines may be suitable, please enquire.		
Controller Power	Voltage supply	10V-16V DC (12V DC nominal)	
	Current supply	Stand-by:	0.1A
		Cycling	0.5 – 2.0A
Breaker	3A		
Program Interface	USB / RS232 to PC		
Speed Control	Take Off	Factory pre-set, may be customised with serial cable and PC.	
	Climb	Factory pre-set, may be customised with serial cable and PC.	
	Cruise	Factory pre-set, may be customised with serial cable and PC.	
	Hold	Factory pre-set, may be customised with serial cable and PC.	
Feather Function	Automatic feather and un-feather cycle. Manual feather if required.		
Visual indication	Fine stop, coarse stop, feather stop, fine running, coarse running, feather running, motor over-current, system open circuit, speed signal loss.		
Installation	Controller fits standard 2 ¼ in instrument cut-out.		

AP533 Options			
Blade Options	Spec	Diameter	Application
	WWR68A	68in (1727mm)	High Speed
	WWR72A	72in (1828mm)	High Speed
	Other makes and models available, please enquire.		
Direction of Rotation	Clockwise		
Direction of Thrust	Tractor		
Spinner Diameter	10.3in (261mm), 11.2in (284mm), 12.2in (310mm).		
Spinner Finish	Polished aluminium, Painted White, Matt (for painting).		
Programming	Kit available for reprogramming parameters. Includes MS Windows compatible program and serial (USB) cable.		

* depends on blade selection.

** provisional (special functions not available)

Performance



An Airmaster CS Propeller System will give you:

- Higher top speed
- Shorter take-off roll
- Quicker climb
- Steeper descent
- Improved efficiency and flight range
- Quieter operation and lower pilot fatigue
- Safer flying
- Easy maintenance
- Complete backup from 'the factory' and a reseller network

Performance tests have shown up to:

- 33% shorter ground roll
- 10% better climb than fixed pitch prop
- 20% improvement in cruise and economy

Endorsements

Nick Otterback

To say the least I was very impressed with the prop. We exceeded all the number by a substantial amount over stock. The prop gives better braking effect on approach and the aircraft does not float with excess airspeed.

Jim Roberts

I was impressed with the quality and completeness of the propeller package. Two full turns on the fine pitch adjustment cam and I was able to hit all the published RPM numbers

Peter Mickelson

We generally get off the runway about a third less than with the fixed pitch prop. I cannot hold the aircraft on the brakes at full throttle on the grass... this prop just drags the aircraft with the wheels locked!!

Bob Brook

The installation was simple and quick. Thank goodness. Take off position seems to work great. It allows me the time to fly the plane instead of constantly having to correct pitch.

Stephen Field

The Airmaster system is very pilot friendly with a minimum of input required to operate. The pre-set engine revs for take-off, climb and cruise make it all so simple.

Arthur Hoadley

Everything worked great! I did full power runs at the pre-set prop speeds and got 12 mph faster than my previous prop.

Contact

Contact us today to discuss your unique requirements.



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