

Dial into the victorYZone.

Yamaha has been building winning motocross bikes for five decades. During this time the MX world has seen the rapid development of new technologies that have transformed the sport. And the YZ450F's Power Tuner is at the forefront of the digital revolution that is taking motocross to the next level.

It's easy to use your smartphone to connect with the bike's ECU and pre-programme the all-new YZ450F with a range of different engine maps. Which means that you can instantly select the best fueling and ignition set up to maximize your winning potential in different riding conditions.

Together with the new YZ450F's increased power, lower weight and class-leading suspension, the Power Tuner provides you the set-up for the most advanced, race-ready machine.



- Ultra-compact new 450cc engine, power with control
- Lighter and more compact rearwardslanted cylinder
- Yamaha Power Tuner for instant trackside tuning
- Handlebar switch for easily adjustable mapping
- Compact electric starter with ultra-light battery
- Launch Control System for quicker, smoother starts
- Advanced fuel injection system for optimum power
- Angled radiators ensure effective engine cooling
- Robust transmission for positive shifting
- Compact mass-centralized wraparound exhaust
- Lighter aluminium frame, sharper handling



Tune in to victory.

Less weight, more power and sharper handling: The new YZ450F raises the bar in every way. Which makes it the clear choice for every racer who demands winning performance combined with total control.

The all-new engine comes with a lighter cylinder that maximizes the winning potential of the high compression head, forged piston and aggressive cam profiles. And the YZ450F's digital Power Tuner lets you make instant trackside engine mapping adjustments and gain a real advantage in all riding conditions.

Its new aluminium bilateral frame comes with thicker down tubes and thinner main spars for reduced weight and sharper handling – while the industry-leading coil spring-type forks and linkage rear suspension deliver exceptional balance.







Ultra-compact new 450cc engine

Equipped with a high compression cylinder head as well as a durable forged piston and aggressive cam profiles, the compact new 450cc engine gives you the best balance of race-winning performance together with ultimate controllability. Delivering more power right where you need it, the new 2020 YZ450F has the ability to take you to the top.



Lighter rearward-slanted cylinder

Positioned in the chassis to ensure optimum mass centralisation, the YZ450F's distinctive rearward-slanted cylinder is even lighter and more compact for 2020. Together with the highefficiency reverse cylinder head, long and straight inlet, and high compression piston, this sophisticated design gives you race winning performance in all conditions.



Yamaha Power Tuner

When it comes to trackside tuning, nothing comes close to the revolutionary Yamaha Power Tuner. Simply download the App to your device, and using wireless connectivity you can adjust fuel/air mix and ignition timing to suit different tracks and conditions. What's more, this innovative system also lets you access valuable engine running and maintenance data.



Easily adjustable mapping

Once you've preloaded the YZ450F with your own engine maps using the Power Tuner you can select your preferred mapping using the handlebar-mounted switch. This on-the-fly adjustment means you can instantly change from a superaggressive map for fast dry tracks to a more useable map in muddy or technical situations, giving you ultimate control in all conditions.



Compact electric starter

The new 450cc engine is equipped with a compact and lightweight electric starter that gives push-button convenience and saves you valuable seconds when you need to restart under pressure during a race. Powered by a high capacity four-cell lithium-ion battery, it helps to keep the 2020 YZ450F's weight down to a minimum.



Launch Control System

The YZ450F's Launch Control System (LCS) optimises the engine's power output and running characteristics during the first few seconds of the race after the gate drops. By helping to transmit power more efficiently, the LCS gives you greater controllability off the line, increasing your holeshot-winning performance every time.



YZ450F

Engine	
Engine type	4-stroke; Liquid-cooled; DOHC; 4-valves; Rear ward slanting single cylinder
Displacement	449cc
Bore x stroke	97.0 mm x 60.9 mm
Compression ratio	13.0:1
Lubrication system	Wet sump
Clutch Type	Wet; Multiple Disc
Ignition system	TCI
Starter system	Electric
Transmission system	Constant Mesh; 5-speed
Final transmission	Chain
Carburettor	Fuel Injection

Chassis	
Frame	Bilateral Beam frame
Front suspension system	KYB® spring-type fork, fully adjustable with speed
	sensitive damping
Front travel	310 mm
Rear suspension system	Monoshock
Rear Travel	317 mm
Front brake	Hydraulic single disc, Ø270 mm
Rear brake	Hydraulic single disc, Ø240 mm
Front tyre	80/100-21 MX3S
Rear tyre	120/80-19 MX3S
Caster Angle	27.3°
Trail	120mm

Dimensions	
Overall length	2,185 mm
Overall width	825 mm
Overall height	1,285 mm
Seat height	980 mm
Wheel base	1,485 mm
Minimum ground clearance	330 mm
Wet weight (including full oil and fuel tank)	111 kg
Fuel tank capacity	6.1litres
Oil tank capacity	0.90litres



YZ450F

Always wear a helmet, eye protection and protective clothing. Yamaha encourage you to ride safely and respect fellow riders and the environment. Images shown depict professional riders performing under controlled conditions. Specifications and appearance of Yamaha products as shown here are subject to change without notice and may vary according to requirements and conditions. For further details, please consult your Yamaha dealer.