

TY250



 **YAMAHA**

Components with trial-oriented designs



Frame

In order to withstand the rigors of widely varying trials sections, the TY250 utilizes a diamond-type frame. This slender-tube, high-tensile-strength, steel frame is able to absorb all of the impacts and stresses that are incurred from an exceptionally difficult section, and this frame is also able to carry the engine at a point for a low center of gravity, thereby attaining very good stability.

Front Forks

Hydraulically-damped front forks of the TY250 are designed especially for trials riding with a travel of 170 mm. The forks are able to absorb large shocks, while maintaining optimum control and balance, without sacrificing any of the bike's good maneuverability characteristics.

Rear Shock Absorbers

The bike uses highly responsive, outer-spring, hydraulically-damped rear shock absorbers which adequately cushion the bike while following the contour of the path, assuring excellent stability and balance. Also, these shocks are adjustable in 5-steps so that the tension of the rear shocks can more accurately match that of the section to be ridden.

Chain Tensioner and Oiler

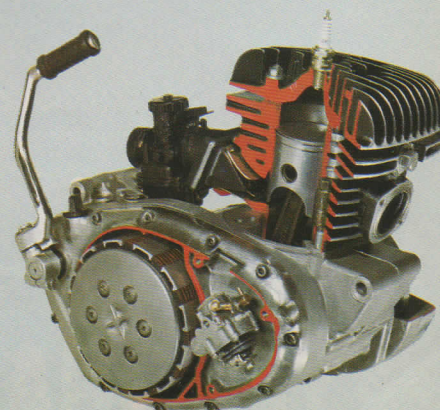
The chain of the TY250 passes through a spring-loaded tensioner which maintains even tension on the chain and takes up any slack, protecting the chain from excessive shocks and ensuring smooth riding at very slow speed. Also, incorporated in the rear swing arm is a chain oiler. With these two features, a longer, more durable chain life can be expected.

Flywheel and Magneto

In order to attain the smooth operation necessary at ultra-slow speed, the mass of the flywheel and magneto has been increased to yield a larger inertial force. The precise nature of the mass increase was also given careful consideration so that the engine response would be equally as smooth at higher engine speeds.

Autolube

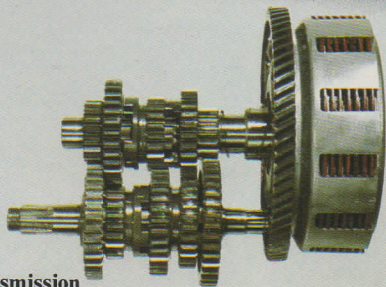
As a further convenience feature and to increase the operating efficiency of the engine, Autolube, YAMAHA's exclusive oil lubrication system, is included on the bike. This system continuously monitors the speed of the engine and throttle opening, and automatically supplies a precise amount of oil, from a separate tank, to be mixed with the fuel. The result is a longer-lasting, cleaner-operating engine.





Engine

Especially designed for trials riding, the rugged 2-stroke, single-cylinder engine is able to smoothly and positively operate from ultra-slow walking speed to making very good time in between sections. With excellent heat-dissipating characteristics and YAMAHA's original Torque Induction, this engine is highly efficient and is able to maintain a uniform throttle response over the entire power band. Also, lightweight materials and construction techniques have been implemented to further increase the bike's power-to-weight ratio.



Transmission

The rugged, 5-speed transmission is designed for first, second and possibly third to be used through a section while fourth and fifth are for the roads in between the sections. The shift lever is a 90°, fold-away type that is spring-loaded so that if it should be hit by some obstacle along the path, the machine won't be knocked out of gear. Also, the gears have been specially hardened for lasting durability.

Skid Plate

In order to further protect the engine, an aluminum skid plate is installed under the engine. This prevents rocks from hitting and damaging the engine. Also, as another lightweight feature, this tough skid plate is made of aluminum.

Brakes

The drum brakes on the front and the rear of the bike feature YAMAHA's labyrinth-seal, special-double-ridge design which prevents water or dust from entering the drum and affecting the operation. Also, the surface area of the shoes is such that maximum control is attained without the brakes grabbing. Smooth control with safe stops under all riding conditions.

The one to watch at the trials events



He's talking about Yamaha's TY250. And he should know what he's talking about. Born in Britain, this remarkable sport is sweeping the world. It demands great skill, absolute balance, strength and stamina. And a machine to match. This is it. Working directly with Yamaha in Japan, Mick Andrews helped develop this machine, his skill and experience being invaluable in such matters as machine power-to-weight characteristics, the slim design, and the special design of the flywheel and crankshaft mass for top performance trials. And for a bike that will literally stand on its tail, Yamaha has developed specially adjustable rear shocks and responsive front forks. Trial riding is more than a sport, it's a way of life... and Yamaha has developed the machine for it.

SPECIFICATIONS

PERFORMANCE

Min. turning radius 1,600 mm
Min. braking distance 15 m @ 50 km/h

ENGINE

Type 2-stroke, Torque Induction, Single
Displacement 246 cc
Bore & Stroke 70x64 mm
Compression ratio 6.2:1
Lubrication system Autolube
Starting system Primary kick
Transmission 5-speed gearbox

DIMENSIONS

Overall length 2,015 mm
Overall width 840 mm
Overall height 1,125 mm
Wheelbase 1,295 mm
Min. ground clearance 280 mm

WEIGHT (net) 97 kg

FUEL TANK CAPACITY 5 lit.

OIL TANK CAPACITY 0.35 lit.

TIRES front 2.75-21-4PR

rear 4.00-18-4PR

** Specifications subject to change without notice.*



YAMAHA, It's a way of life



SINCE 1887

YAMAHA MOTOR N. V.

Postbus 7829 PROF. E. M. Meyerslaan 3
Amstelveen (Amsterdam), Holland

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