

Robust Quadrocopter For Surveying



The PMSQ - The robust and very easy to fly Quadrocopter for surveying applications

In cooperation with the Swiss company FlyingHigh AG we developed a robust Quadrocopter which is specifically optimized for surveying flights and traffic accident surveying in rather harsh daily work environments.

Hardware

Very small: Size approx. 52 * 52 * 28 cm

Weight with camera and battery approx 2.2kg

Payload (camera) up to 400g

Wide landing gear and a low center of gravity, allowing simple and safe landings on uneven surfaces like grass or gravel

Very good vibration isolation of the camera, shutter speeds down to 1/15s possible

Motorized camera mounted, inclination of the camera remotely controlled

Strong flash facing downwards for daytime traffic accident surveying during darkest nights

The Quadrocopter can be tilted to the side to be able to operate the camera pleasantly

The frame is simple and robust and very easy to repair with standard materials

Remote Control: Graupner MX-20

Comes in a robust Peli case which contains everything you need to fly: The Quadrocopter with remote control and spare batteries, 230V and 12V charger for Lipo Batteries, tools and replacement parts

Manual flight (no GPS reception)

Flight time 15 to 20 minutes

Flyable up to 50 km/h Wind

Extremely docile handling

Automatic Barometric altitude control and regulation and automatic flight stabilization on all axes

Automatic Fail Safe at reception failure with automatic landing

Maximum altitude preset via rotary-control, 1 meter per notch

Manual flight with GPS support

Fully automatic altitude and position control up to approximately 40 km/h wind

Automatic Flying Back to the starting point (Coming Home)

Independent direction control (Carefree)

Fully automated flight with GPS support

Automatic waypoint flight (WP) with defined speeds and heights with simultaneous triggering of the camera, camera automatically aligns itself to a point of interest

Fully automatic fly and photograph the contents of fields in a raster. The raster areas can be defined either by a Windows Software or an Android App

General Features

Extensive telemetry to the remote control with display and voice output and/or on a mobile phone or tablet

Speech output on the remote control by means of headphones: Flight time, altitude, distance, Lipo-capacity, status messages like "GPS on", altitude, etc.

Adjustable battery warning (Low voltage warning) with signalling via buzzer or on the transmitter (HoTT / Jeti radio system) and optically by LED

Acoustic output of altitude change (Variometer sound)

Acoustic signalling of error messages, status message of the motor control (BL-controller) - current, temperature, blocked motor etc.

Made in Switzerland

Optional Accessories

Video glasses with receiving electronics at comfortable shoulder strap: The preview of the camera is transmitted up to 300m

Tripod with 7" or 10" LCD Monitor. The preview of the camera is transmitted up to 300m

To learn to fly with the original Graupner remote control on the PC flight simulator software