

Description

- Lynxmotion MES Reconfigurable Folding UAV Frame Kit
- Features a reconfigurable modular multirotor frame kit
- Offers mounting for one or two batteries / Removable landing gear
- Has a variety of multi-purpose mounting options
- Provides quick release & damped payload system (ex. gimbal)
- Is compatible with Lynxmotion Quadrino Nano and other flight controllers

The Lynxmotion MES Reconfigurable Folding UAV Frame Kit is an all-in-one frame designed to allow the user to easily experiment with a variety of different multirotor designs, without having to invest in a variety of custom frames. The frame is based on the M.E.S. system which uses aluminum tubing clamps, G10 composite plates and carbon fiber tubing. A wide variety of different designs can be created using this single frame system and each can vary in terms of arm length, motor configurations, accessories and more. ESCs are mounted (easy access) next to the corresponding motor and wiring is hidden within the tubing. The central tower adds mounting options and protection for the flight controller.



Applications

• UAV / drone / multirotor education



- Multirotor optimization, development & experimentation
- Sensor experimentation
- Design & payload optimization
- Anything you can think of

Configurations

The Lynxmotion MES let you experiment with various frame configurations, and everything frame related is included in this kit to allow you to create the following configurations (BLDC motors shown but sold separately):



MES - Y4

MES - Y6

MES - Quad X







MES - Quad X8

MES - HEX 6

MES - HEX 12

Specifications

Compatibility

- BLDC motor sizes: 45mm maximum outside diameter
- Propeller sizes: range from 8" to 14" (configuration dependent)
- Flight controller: Check compatibility with the frame configuration

Mechanics

- Tubing sections are compatible with Lynxmotion M.E.S.tubing clamps
- Carbon fiber tubes are standard 16mm (OD)
- Lynxmotion S.E.S. pattern



What's Included

- Matte black G10 composite (non-conductive) parts for complete frame assembly
- Lynxmotion orange anodized aluminum tubing clamps
- Lynxmotion light weight black anodized aluminum standoffs
- Carbon fiber tubes (220mm landing / 300mm arms / 50mm filler)
- Velcro straps for batteries
- Hardware (screws, standoffs, grommets, bearings, foam, etc)

What's Needed / Sold Separately

- Brushless DC (BLDC) motors (4 to 12 depending on design) and corresponding mounting screws
- Electronic Speed Controllers (ESCs) compatible with BLDC motors selected
- Flight controller (Lynxmotion Quadrino Nano Drone/UAV Flight Controller (with GPS) suggested)
- Power Distribution (Lynxmotion MES Power Distribution Board (PDB) for UAV suggested)
- Battery compatible with BLDC motors (one or two can be mounted)
- Remote Control (RC) system with minimum 4ch and receiver
- Optional: Gimbal; Video transmitter / receiver; Camera; Sensors etc.

Useful Links

Website

Lynxmotion Website - Home

Wiki

- Lynxmotion Wiki Home
- Lynxmotion Wiki MES Reconfigurable Modular Frame

Dimensions

Size

- Motor to motor: ~650 mm
- Ground to bottom of the frame: ~215 mm
- Ground to optional payload / gimbal plate: ~155 mm
- Landing tube (front to back) distance: ~250 mm
- Weight of HEX: 819 g / 28.89 oz

The configuration selected will affect the maximum propeller size possible. Examples with with propellers dimensions:



