STRUCTURAL TESTING

PRODUCT DESCRIPTION

Redwire’s mass simulators are custom and tunable payload surrogates used for testing, integration operations, and can also be used as flight surrogates in the event the actual satellite is not available for launch.

PARAMETERS

- 8600 square feet of lab space
- 10-ton overhead crane
- Universal/modular structural load frame
- 20 load control channels
- 256 strain/displacement channels
- Actuator capacities 1.2kip to 220kip
- Load cell capacities from 500lbs to 200kip
- 50 linear displacement transducers

MISSION HERITAGE

- Sandia National Labs targets and countermeasures
- Boeing Delta IV Payload Attach Fitting
- ULA Atlas V Interstage Adapter
- AFRL/RV ISS ROSA
- Moog EAGLE ESPA, ESPA Grande, ESPA Qual
- Moog GRAIL Adapter
- ORS-3
- Design Net Engineering – ETAP Adapter
- Spaceflight GTO-1 conical adapters
- Spaceflight SSO-A secondary payload adapters
MASS SIMULATOR

PRODUCT DESCRIPTION

Redwire’s mass simulators are custom and tunable payload surrogates used for testing, integration operations, and can also be used as flight surrogates in the event the actual satellite is not available for launch.

IMPORTANT SPECIFICATIONS

+ 3U and 6U CubeSat mass simulators
  - Modular design
  - Tunable mass and CG
  - Flight qualified
  - CubeSat XL and tabbed/CSD versions

+ Custom mass simulators
  - Point design
  - Tunable for unique payloads/dispensers

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PAYLOAD ADAPTER

PRODUCT DESCRIPTION

The CubeCone and Lower Free Flyer (LoFF) payload adapter from the Redwire Company is a launch accommodation retrofitted as payload adapter. The LoFF offers 48-3U payloads or equivalent.

Each is delivered with flight qualified mass stimulators.

IMPORTANT SPECIFICATIONS

+ CubeStack
  ESPA ring that can hold 8 3U CubeSat dispensers

+ CubeCone
  Transitional ring that could also hold secondaries

+ LoFF
  Custom adapter that hosted 48 3U CubeSats for SSO-A

+ XPOD
  Custom adapter designed to host 3 XPOD dispensers