

LTS Skid Mounted Tower

Description

The LTS Skid Mounted Tower offers customers the ability to use our large tower in permanent or semi-permanent installations. The installation, qualified by Tower Solution requirements, could range from staking the unit to ground anchors, with stabilization by guy wires; to securing the skid on a customer supplied foundation or structural base that meets Tower Solution specifications. If conditions permit, the installation of the tower mechanism could be on level grade, in a below-ground pit (with or without door covering), on a customer supplied truck/trailer or integrated into a qualifying building structure.

The skid mounted tower can raise (or lower) a payload to a height of 77 feet (23.47 meters) in 5 minutes or less. Tower rigidity and stability is enhanced by an extra heavy duty base frame from which the interlocking tower lattice rises. This extra rigid frame, along with secure attachment to a qualifying foundation, would allow the tower unit to be operated un-guyed during many applications.

Specifications

The Tower

- Height:** Maximum tower height of the tower payload mounting bracket is 77 feet (23.47 meters) above the ground, with stowed height of 11 feet (3.35 meters) plus payload. If a mount is used that is not on ground, the maximum height of deployment will change accordingly. The tower can be stopped and utilized at any desired height between its stowed and maximum height.
- Payload:** Maximum tower payload capacity is application dependent. For most applications, however, the payload is established at 2,000 pounds (907 kg) for a 77 foot (23.47 meters) tower height.



Construction: The tower lattice chain sections are constructed of 6061-T6 aluminum extrusions assembled with robust bolts and rivets. During deployment, cast stainless steel hooks engage to rigidly attach and hold together individual tower sections in the triangular shape. Key tower technologies are protected by patents.

Heavy mounting brackets are provided as standard equipment at each of the three tower corners for attaching customers' equipment using ½ inch (1.27 cm) diameter bolts.

An extra-heavy steel frame supports the tower mechanism to offset the need for outriggers and to facilitate load transfer to a rigid permanent mounting.

**Deployment &
Retraction
Speed:**

From the towers stowed height, an electric motor/gear drive system will self-erect the tower to a height of 77 feet (23.47 meters) in approximately 5 minutes "at the push of a button". By releasing the button, the tower can be stopped (and held by the brake) for payload utilization at any height between the stowed and maximum limits.

Drive:

Either an AC or DC electric motor/gear drive system is offered, both of which include a heavy duty brake that is rated for severe conditions. No active power is required once the tower sections have been raised to the desired height and automatically secured by the brake.

Power Source:

An appropriate AC or DC electrical power source is required for use only when raising or lowering the tower. This can be a customer supplied power source or one of Tower Solutions' available power options.

Emergency

Crank Down:

The tower is equipped with an emergency, manual crank down or up system. If conditions permit, a customer supplied battery-powered electric drill can be substituted for the crank.

Enclosures:

All electrical controls are enclosed in drip proof enclosures.

During tower deployment or retraction, the slowly rotating bales of tower sections are contained within the tower frame, but not fully enclosed.

Tower Control System:

Standard control for the skid mounted tower consists of UP and DOWN buttons located on the main tower control box.

Leveling:

For the skid mount, tower leveling is assumed to be accomplished by customer supplied means, either through pre-leveled pads, foundation mounting points or customer supplied outriggers / vehicle. Bubble level units are provided at each corner of the frame to further facilitate the leveling process.

To aid in maintaining level operation, a level sensing system notifies the operator with an indicator light when the unit is level within +/- 1 degree.

General Features

Color:

The standard skid mounted tower is delivered with the tower frame and mechanism tan in color and the tower sections in natural aluminum. Standard product identification, instructional, safety and operational information decals are strategically applied to the unit for operator convenience and safety.

Overall Size: The retracted footprint is approximately 8 feet (2.44 meters) wide x 17 feet-8 inches (5.39 meters) long x 8 feet (2.44 meters) high. Total approximate weight less customer payload is 9,000 pounds (4,082 kg).

Options

Options are available to meet specific customer requirements.