

Control Panel Functions



1- Power/Emergency Stop

Rotate Clockwise to power on, push off. CAUTION, Do not turn off while in motion unless emergency stop is needed. This aggressively shuts down system and locks park brake. Possible tug or aircraft damage may occur.

2- Best Tugs Logo

Touch here to activate Alien Abduction Deterrent System. The AADS has proven 98% effective in keeping our customers on this planet.

3-System Status Indicator

Flashing Codes indicate operator and or system error. See System Status Chart for code fault definitions.

4-Auto Park Indicator

Red light on when park brake is set. Use of appropriate aircraft wheel chocks is always required. Park will engage when tug comes to a stop and will remain "in park" when system is powered down. Manual park override is located under tug ABS skin. (Lift Red handle on motor to unlock park in the event batteries are dead)

5- Battery Charge Status

Recharge tug when power indicates 50-60% with tug at rest. A quiet "click" sound will confirm internal charger has power. *If tug has the APU option the voltage display will light up.

6-Helicopter Lift

Lift and Lower helicopter/trailer attachment if equipped.

7-Direction Control

"Push" to push aircraft, "Pull" to pull aircraft. Twist grip controls speed by rolling on like a motorcycle grip.

8-LED Lights

9-Air Compressor

When activated the air compressor will come on until pressure reaches approximately 100psi then turns off until pressure drops below 80psi. System will naturally bleed down pressure over time so be sure system is off when not in use.

10-High/Low Range

High range allows maximum speed. Use Low range when maneuvering in tight or restrictive areas for better control and safety. It is ok to switch between speeds when in motion, no damage will occur.

System Status Chart

Most Codes are safely reset by simply turning off the tug for 3 seconds than back on again. Common codes are highlighted in blue. If system fails to reset please contact Best Tugs right away for assistance.

All codes are two digits. Count Flashes (*)

LED off System powered down after 20 minutes of no use

LED On Controller Operational, No Faults

1,1 ** Temperature Fault (Aircraft Chocked or Brake Set)

1,2 *** Throttle Fault

1,3 **** Speed Limit Fault

1,4 * **** Low Battery (Charge System)

1,5 ***** Over Voltage (Unplug Tug Before Use)

2,1 ** Main Contactor Driver Failed Open

2,3 **** Main Contactor Stuck, Driver Fail, or Brake Coil

2,4 ***** Main Contactor Driver Failed Closed

3,1 **** HPD Fault

3,2 **** Brake On (Electromagnetic Brake open or shorted)

3,3 ***** PreCharge Fault (Low Battery)

3,4 ***** Brake Off (Electromagnetic Brake open or shorted)

3,5 *** ***** HPD Fault (Throttle on when tug powered on)

4,1 ***** Current Fault (Controller Failure, Motor or wire failure)

4,2 ***** Motor Voltage (Short in Motor or wiring)

4,3 ***** EEPROM Failure

4,4 ***** Power Section Fault

Attaching Aircraft

(Always Chock Aircraft Mains)

Retractable Gear

1. Remove Quick-Lock Fork
2. Install Nose Wheel Chock with Roller.
3. Position tug with ramp centered on nose wheel.
4. Put winch in neutral/reverse and pull enough strap to attach Keeper Strap around nose-gear strut.
5. Put winch in gear for pulling. (Forgetting this step could result in serious injury or aircraft damage)
6. Put tug in low range and slowly drive it under the aircraft nose wheel while cranking winch to keep the strap tight.
7. Once nose wheel touches Wheel Chock continue to tighten winch strap about a half turn. If Keeper Strap is too long wrap nose strut twice.
8. To unload; Chock aircraft mains.
9. Crank winch handle slightly to release stress on winch direction selector; Switch to unload/neutral.
10. Select "Pull" on control panel and slowly drive tug out from under aircraft. Leaving tug attached to aircraft unspools the winch strap so it's ready for your next load. (Caution; KEEP HAND CLEAR OF WINCH HANDLE)



Wheel Pant Aircraft

1. Remove Nose Wheel Chock.
2. Install Quick-Lock™ Fork with pin provided. (Be sure the strap-hook is "up" to keep it from crashing into the frame when loading aircraft. Also, Quick Lock fork must be right side up. Top has two pull pins seen here.
3. Select size by pulling pin on left and Turing handle; Pull pin on right to attach to nose wheel.
4. Push right shaft in until pin drops. (Wiggle fork to be sure it's secure)
5. Put winch in gear for pulling. (Forgetting this step could result in serious injury or aircraft damage)
6. Put tug in low range and slowly drive it under the aircraft nose wheel while cranking winch to keep the strap tight; continue until Quick-Lock for is firmly locked in against frame backstop.
7. Unload same as above 9-10 above.

