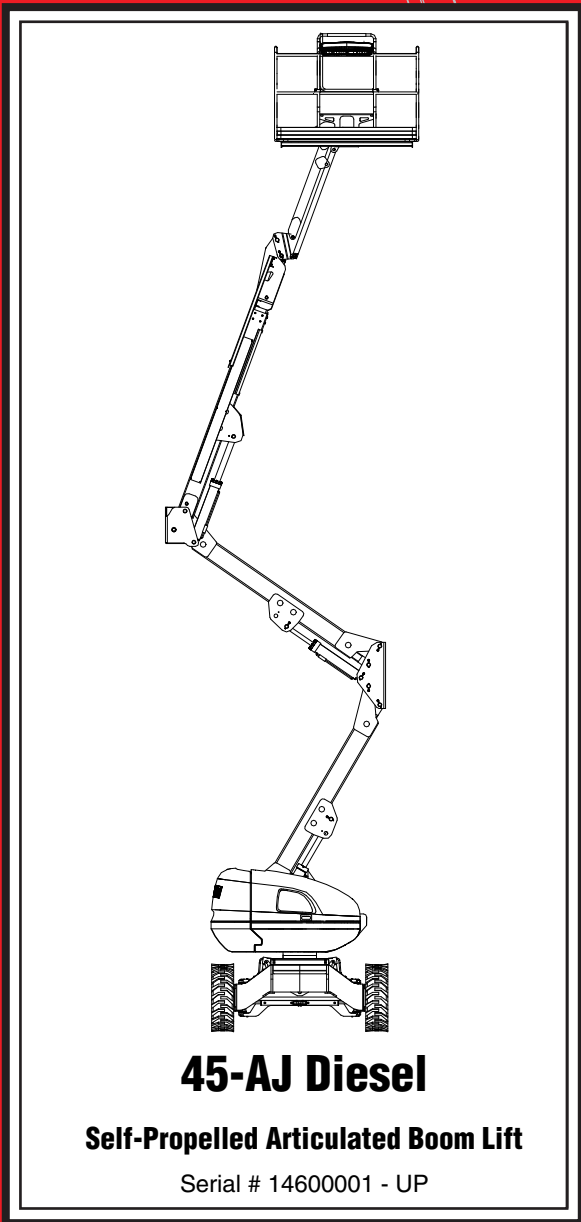


Operator's Manual

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45-AJ Diesel

Self-Propelled Articulated Boom Lift

Serial # 14600001 - UP

94533r1
December 2017

Multiple patents pending.

—Specifications—

45-AJ Diesel		
Working Height*		51 ft 15.5 m
Platform Height		45 ft 13.7 m
Maximum Outreach		25 ft 2 in. 7.7 m
Maximum Up and Over Height		24 ft 6 in 7.5 m
Turntable Swing		Continuous
Jib Range Of Motion		120°
Platform Rotation		180° (90° each side)
Machine Weight** (Unloaded)		16,400 lbs 7,440 kg
Lift Capacity		
Unrestricted Standard		500 lb 227 kg
Maximum Occupants		2
Stowed Height		98 in 2.49 m
Overall Length		23 ft 10 in 7.3 m
Overall Width		90.5 in 2.3 m
Tailswing		Zero
Wheel Base		87 in 2.2 m
Platform Details	Width	72 in 1.8 m
	Depth	40 in 1 m
	Entry	1 End Swing Gate, 2 Slide Bar Entries
Turning Radius, Inside		6 ft 6 in 2 m
Ground Clearance		12 in 0.3 m
Lift Speed		35 sec
Extend Speed		20 sec
Jib Lift Speed		15 sec
Drive Speed	Stowed	0-3.6 mph 0-5.8 km/h
(Proportional)	Raised or extended	0-.5 mph 0-.8 km/h
Gradeability	Stowed, downhill	40%/22°
	Stowed, uphill	40%/22°
Maximum Allowable Operating Wind Speed		28 mph 12.5 m/sec (45 km/h)
Engine		48 hp Kubota Diesel
Fuel Type		Diesel
Fuel Capacity		24 gal 90 liter
Hydraulic Fluid Capacity		49 gal 185 liter
Meets applicable requirements of ANSI A92.5-2006 and CSA B354.4-2002.		
Allowable ambient temperature range: -20° F to 120° F (-29° C to 49° C). Consult with MEC for operation outside of this range.		
*Working Height adds 6 feet (2 m) to platform height. **Weight may increase with certain options.		

Introduction

This Operator's Manual has been designed to provide you, the owner, user or operator, with the instructions and operating procedures essential to properly and safely operate your MEC Aerial Work Platform for positioning personnel, along with their necessary tools and materials, to overhead work locations.



This Operator's Manual and other manuals provided by MEC on the machine must be read and understood prior to operating your MEC Aerial Work Platform. The operator should not accept operating responsibility until he/she has read and understands the operator's manual as well as having operated the MEC Aerial Work Platform under supervision of an authorized, trained and qualified operator.

It is essential that the operator of the aerial work platform is not alone at the workplace during operation.

Modifications of this machine from the original design and specifications without written permission from MEC are strictly forbidden. A modification may compromise the safety of the machine, subjecting the platform occupants and personal around the machine to serious injury or death.

Your MEC Aerial Work Platform has been designed, built, and tested to provide safe, dependable service. Only authorized, trained and qualified personnel shall be allowed to operate or service the machine.

MEC, as manufacturer, has no direct control over machine application and operation. Proper safety practices are the responsibility of the owner, user and operator.

If there is a question on application and/or operation contact:

Revision History

Original Release Date: August 2017

Date	Reason for Update
Dec 2017	New Base Control Decal Icon Configuration



MEC Aerial Platform Sales Corp.

1401 South Madera Ave • Kerman, CA 93630 USA
 Ph: 1-877-635-5438 • 559-842-1500 • Fax: 559-842-1522
www.mecawp.com

Safety

DO NOT operate this machine until you have read and understood this manual, have performed the Workplace Inspection, Pre-Start Inspection and Routine Maintenance, and have completed all the test operations detailed in the Operating Instructions section.

Failure to read, understand and follow all safety rules, warnings, and instructions could result in serious injury or death. For your safety and the safety of those around you, you must operate your machine as instructed in this manual.

MEC designs aerial work platforms to safely and reliably position personnel, along with their necessary tools and materials, at overhead work locations. The owner/user/operator of the machine should not accept responsibility for the operation of the machine unless properly trained.

ANSI and other applicable standards identify requirements of all parties who may be involved with boom-supported elevating work platforms. The ANSI/SIA A92.5-2006 Manual of Responsibilities is considered a part of this machine and can be found in the manual compartment, located at the platform control station. To ensure safe use of machine, inspections and training specified in ANSI/SIA A92.5-2006 must be performed at designated intervals as prescribed.

General

This section prescribes the proper and safe practices for major areas of machine usage. In order to promote proper usage of the machine, it is mandatory that a daily routine be established based on instructions given in this section. A maintenance program must also be established by a qualified person and must be followed to ensure that the machine is safe to operate.

The owner/user/operator of the machine should not accept operating responsibility until this manual has been read and understood, and operation of the machine, under the supervision of an experienced and qualified person, has been completed. If there is a question on application and/or operation, MEC Aerial Platform Sales Corp. should be consulted.

Most accidents that involve product operation, maintenance and repair are caused by failure to observe basic safety rules or precautions. An accident can often be avoided by recognizing potentially hazardous situations before an accident occurs. A person must be alerted to potential hazards. This person should also have the necessary training, skills, and tools to perform these functions properly.

Improper operation, lubrication, maintenance or repair of this product can be dangerous and could result in injury or death. Do not operate product, until you have read and understand the operation information.

California Proposition 65 Warning

This product contains chemicals known to the State of California to cause cancer and/or birth defects or other reproductive harm.

Safety Alert Symbols & Safety Signal Words

MEC manuals and decals use symbols, colors and signal words to help you recognize important safety, operation and maintenance information.



This is the Safety Alert Symbol. It is intended to alert operators, users and owners to potential personal injury hazards. Always obey all messages that follow this symbol.



RED and the word DANGER– Indicates an imminently hazardous situation which, if not avoided, will result in death or serious injury.



ORANGE and the word WARNING– Indicates a potentially hazardous situation which, if not avoided, could result in death or serious injury.



YELLOW with alert symbol and the word CAUTION– Indicates a potentially hazardous situation which, if not avoided, may result in minor or moderate injury.

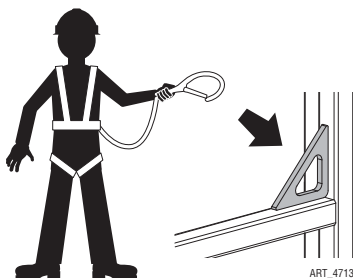


YELLOW without alert symbol and the word CAUTION– Indicates a potentially hazardous situation which, if not avoided, may result in property damage.



BLUE and the word NOTICE– Indicates operation or maintenance information.

Fall Protection



Personal fall protection equipment (PFPE) is required when operating this machine.

All PFPE must comply with employer and job site rules and applicable governmental regulations, and must be inspected and used in accordance with the PFPE manufacturer's instructions.

ALWAYS wear approved fall protection, properly attached to a designated anchor point, when operating the machine.

DO NOT attach more than one lanyard per anchor point.

Electrocution Hazard



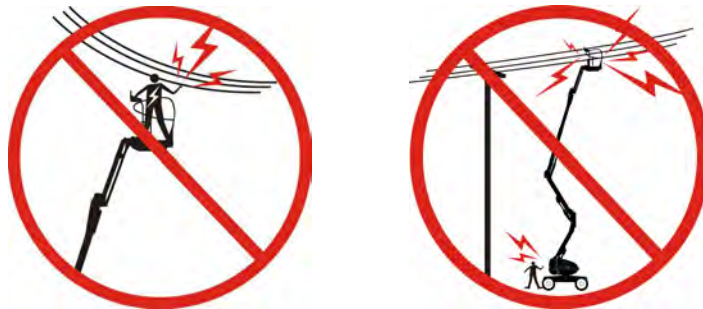
ELECTROCUTION HAZARD! THIS MACHINE IS NOT INSULATED!

DEATH OR SERIOUS INJURY will result from contact with or inadequate clearance from any electrically charged conductor.

You must maintain a CLEARANCE OF AT LEAST 10 FEET (3.05 m) between any part of the machine, or its load, and any energized electrical line or apparatus carrying over 300 Volts up to 50,000 Volts. One foot (30.5 cm) additional clearance is required for every additional 30,000 Volts.

Observe Minimum Safe Approach Distance.

- This machine is not insulated and does not provide protection from contact or proximity to electrical current.



- Maintain distance from electrical lines, apparatus, or any energized (exposed or insulated) parts according to the Minimum Approach Distance

Minimum Approach Distances

Voltage Range (Phase to Phase)	MINIMUM APPROACH DISTANCE in Feet (Meters)
0 to 50 KV	10 (3)
Over 50KV to 200 KV	15 (5)
Over 200 KV to 350 KV	20 (6)
Over 350 KV to 500 KV	25 (8)
Over 500 KV to 750 KV	35 (11)
Over 750 KV to 1000 KV	45 (14)

NOTE: This requirement shall apply except where employer, local or governmental regulations are more stringent.

- Allow for machine movement and electrical line swaying.
- Maintain a clearance of at least 10 ft. (3m) between any part of the machine and its occupants, their tools, and their equipment from any electrical line or apparatus carrying up to 50,000 volts. One foot additional clearance is required for every additional 30,000 volts or less.
- Keep away from the machine if it contacts energized electrical lines. Personnel on the ground or in the platform must not touch or operate the machine until energized power lines are shut off.

Tip-over Hazards



DO NOT OVERLOAD

DO NOT exceed the maximum platform capacity. The weight of options and accessories will reduce the rated platform capacity and must be factored into the total platform load. Refer to the decals on the options or contact MEC.



DO NOT DRIVE ON UNEVEN OR UNSTABLE SURFACE WHEN THE PLATFORM IS ELEVATED OR EXTENDED

Driving: DO NOT drive the machine on a slope that exceeds the maximum uphill or downhill slope rating. Slope rating applies to machines in the stowed position.

Driving in stowed position: Use extreme care and reduce speed when driving across uneven terrain, debris, unstable or slippery surfaces, and near holes or drop-offs.

Driving with the platform elevated: DO NOT drive on or near uneven terrain, unstable surfaces, curbs, drop-offs or other hazardous conditions.

DO NOT elevate the platform when the machine is on a surface that is soft and / or on a slope.

STOP ALL MOVEMENT if the alarm sounds and the red Tilt Indicator Light illuminates when the platform is raised – see *Tilt Indicator Light* on page 27 for instructions.

Ensure that all tires are in good condition and lug nuts are properly torqued.



DO NOT PUSH OR PULL OBJECTS OUTSIDE PLATFORM

DO NOT push off or pull toward any object outside the platform.

Maximum Allowable Side Force: 100 lbs (445 N).

NEVER transport tools and materials unless they are firmly secured. Secure all tools and loose materials. DO NOT carry materials or tools on the guardrails. DO NOT allow tools, supplies or any items to extend outside the platform.



DO NOT ELEVATE IN GUSTY CONDITIONS OR WHEN WIND EXCEEDS 28 MPH (12.5 M/S)

DO NOT elevate the platform when wind speeds are in excess of 28 m.p.h. (12.5 m/s). If wind speeds exceed 28 m.p.h. (12.5 m/s) when the platform is elevated, carefully lower the platform and discontinue operation.

DO NOT increase the surface area of the platform (i.e. cover the rails with tarp or plywood). Increased surface area exposed to the wind will decrease machine stability.

NEVER modify or alter the work platform without written permission from MEC.



DO NOT USE AS CRANE

DO NOT attach overhanging loads or use the machine as a crane. Do not allow anything (hoses, cords, wires, ropes, etc.) to hang from the platform.

NEVER alter or disable any machine components.

DO NOT replace any part of the machine with anything except MEC-supplied or MEC-approved parts.

NEVER use ladders or scaffolds in the platform or allow them to touch any part of the machine.

NEVER use the machine on a moving or mobile surface or vehicle.

Fall Hazards



DO NOT CLIMB ON RAILS

DO NOT sit, stand or climb on the platform guard rails. Maintain a firm footing on the platform floor at all times.

Keep the platform floor clear of debris.

DO NOT fasten a fall restraint lanyard to an adjacent structure.

Ensure that all gates are properly closed and secured before operating the machine.

Operators must comply with employer and job site rules and governmental regulations regarding the use of Personal Fall Protective Equipment.



DO NOT ENTER OR EXIT PLATFORM
WHEN ELEVATED

DO NOT exit the platform when elevated

Collision Hazards



ALWAYS check over, under and around the machine for personnel, structures and obstructions before activating any control function and continue to watch for hazards while operating the machine.

Check path before moving for equipment, materials or other obstructions.

Check for overhead obstructions before moving.

DO NOT place the boom or platform against another structure.



Check path before moving for crushing hazards when holding the platform rail.

Reduce travel speed when moving the machine on slopes, when near personnel and obstacles, or when surface conditions are wet, slippery or otherwise limiting.

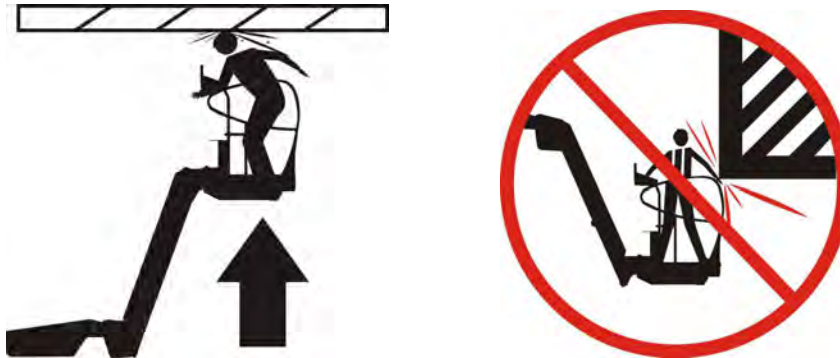
DO NOT operate in the path of any crane unless the controls of the crane have been locked out and/or precautions have been taken to prevent any possible collision.

Stunt driving and horseplay are PROHIBITED.



Check for personnel and obstructions below the platform when lowering the platform.

- Approved head gear must be worn by all operating and ground personnel.
- Check work area for clearances overhead, on sides, and bottom of platform when lifting or lowering platform, and driving.

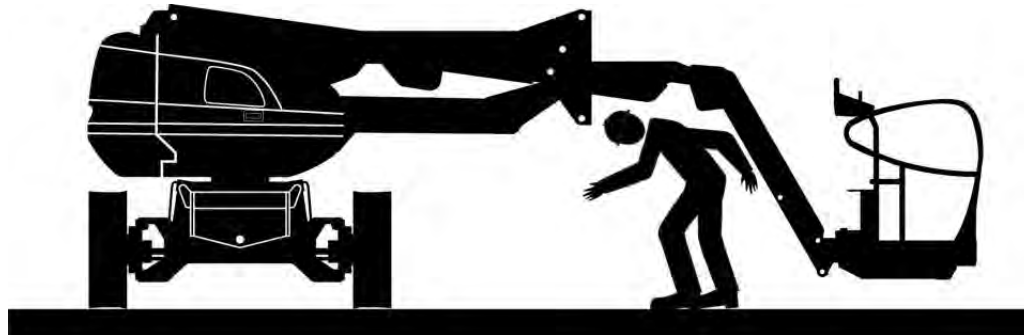


- During operation, keep all body parts inside platform railing.
- Use the boom functions, not the drive function, to position the platform close to obstacles.
- Always post a lookout when driving in areas where vision is obstructed.
- Keep non-operating personnel at least 6 ft. (1.8m) away from machine during all driving and swing operations.
- Limit travel speed according to conditions of ground surface, congestion, visibility, slope, location of personnel, and other factors which may cause collision or injury to personnel.
- Be aware of stopping distances in all drive speeds. When driving in high speed, switch to low speed before stopping.
- Travel grades in low speed only.
- Do not use high speed drive in restricted or close quarters or when driving in reverse.



- Exercise extreme caution at all times to prevent obstacles from striking or interfering with operating controls and persons in the platform.
- Be sure that operators of other overhead and floor level machines are aware of the aerial work platform's presence. Disconnect power to overhead cranes.

- Warn personnel not to work, stand, or walk under a raised boom or platform. Position barricades on floor if necessary.



Towing, Lifting and Hauling

- Never allow personnel in platform while towing, lifting, or hauling.
- This machine should not be towed, except in the event of emergency, malfunction, power failure, or loading/unloading. Refer to Page 43 of this manual for emergency towing procedures.
- Ensure boom is in the stowed position and the turntable locked prior to towing, lifting or hauling. The platform must be completely empty of tools.
- When lifting machine, lift only at designated areas of the machine. Lift the unit with equipment of adequate capacity.
- Refer to Page 41 of this manual for lifting information.

Additional Hazards / Safety

- Do not use machine as a ground for welding.
- When performing welding or metal cutting operations, precautions must be taken to protect the chassis from direct exposure to weld and metal cutting spatter.
- Do not refuel the machine with the engine running.
- Battery fluid is highly corrosive. Avoid contact with skin and clothing at all times.
- Charge batteries only in a well ventilated area.

Additional Safety Hazards

Explosion and Fire Hazards

DO NOT operate the machine in hazardous locations or locations where potentially flammable or explosive gasses or particles may be present.

Damaged Machine Hazards

Conduct a thorough pre-start inspection of the machine and test all functions before each work shift to check for damage, malfunction and unauthorized modification. Tag and remove a damaged, malfunctioning or modified machine from service. DO NOT use a damaged, malfunctioning or modified machine.

Routine maintenance must be performed by the operator before each work shift. Scheduled maintenance must be performed by a qualified service technician at scheduled intervals. Tag and remove from service any machine that has not had scheduled preventative maintenance performed.

Check that all safety and instructional decals are in place and undamaged.

Check that the operator's, safety and responsibilities manuals are present in the storage container located in the platform. All manuals must be complete, undamaged and readable.

Bodily Injury Hazards

DO NOT operate the machine when there is a hydraulic fluid or air leak. Hydraulic fluid or air under pressure can penetrate and burn skin, damage eyes, and may cause serious injury, blindness, and death. Repair leaks immediately. Fluid leaks under pressure may not always be visible. Check for pin hole leaks with a piece of cardboard, not your hand.

All compartments must remain closed and secure during machine operation. Improper contact with components under any cover will cause serious injury. Only trained maintenance personnel should access compartments. The operator should only access a compartment when performing pre-operation inspection.

Weld Line to Platform Safety (if equipped)

Read, understand and follow all warnings and instructions provided with the welding power unit.

DO NOT connect weld leads or cables unless the welding power unit is turned off at the platform controls.

DO NOT operate unless the weld cables are properly connected.

DO NOT connect the ground lead to the platform. Do not use any part of the machine as a ground for welding.

Battery Safety

Burn Hazards

Batteries contain acid. Always wear protective clothing and eye wear when working with batteries.

Explosion Hazard

Avoid spilling or contacting battery acid. Neutralize battery acid spills with baking soda and water.

Keep sparks, flame and lighted tobacco away from batteries. Batteries emit explosive gas.

Electrocution Hazard

Avoid contact with electrical terminals.

User Responsibility, Machine Preparation and Inspection

Personnel Training

The aerial platform is a personnel handling device; so it is necessary that it be operated and maintained only by trained personnel.



PERSONS UNDER THE INFLUENCE OF DRUGS OR ALCOHOL OR WHO ARE SUBJECT TO SEIZURES, DIZZINESS OR LOSS OF PHYSICAL CONTROL MUST NOT OPERATE THIS MACHINE.

Operator Training

Operator training must cover:

- Use and limitations of the controls in the platform and at the ground, emergency controls and safety systems.
- Control labels, instructions, and warnings on the machine.
- Rules of the employer and government regulations.
- Use of approved fall protection device.
- Enough knowledge of the mechanical operation of the machine to recognize a malfunction or potential malfunction.
- The safest means to operate the machine where overhead obstructions, other moving equipment, and obstacles, depressions, holes, drop offs.
- Means to avoid the hazards of unprotected electrical conductors.
- Specific job requirements or machine application.

Training Supervision

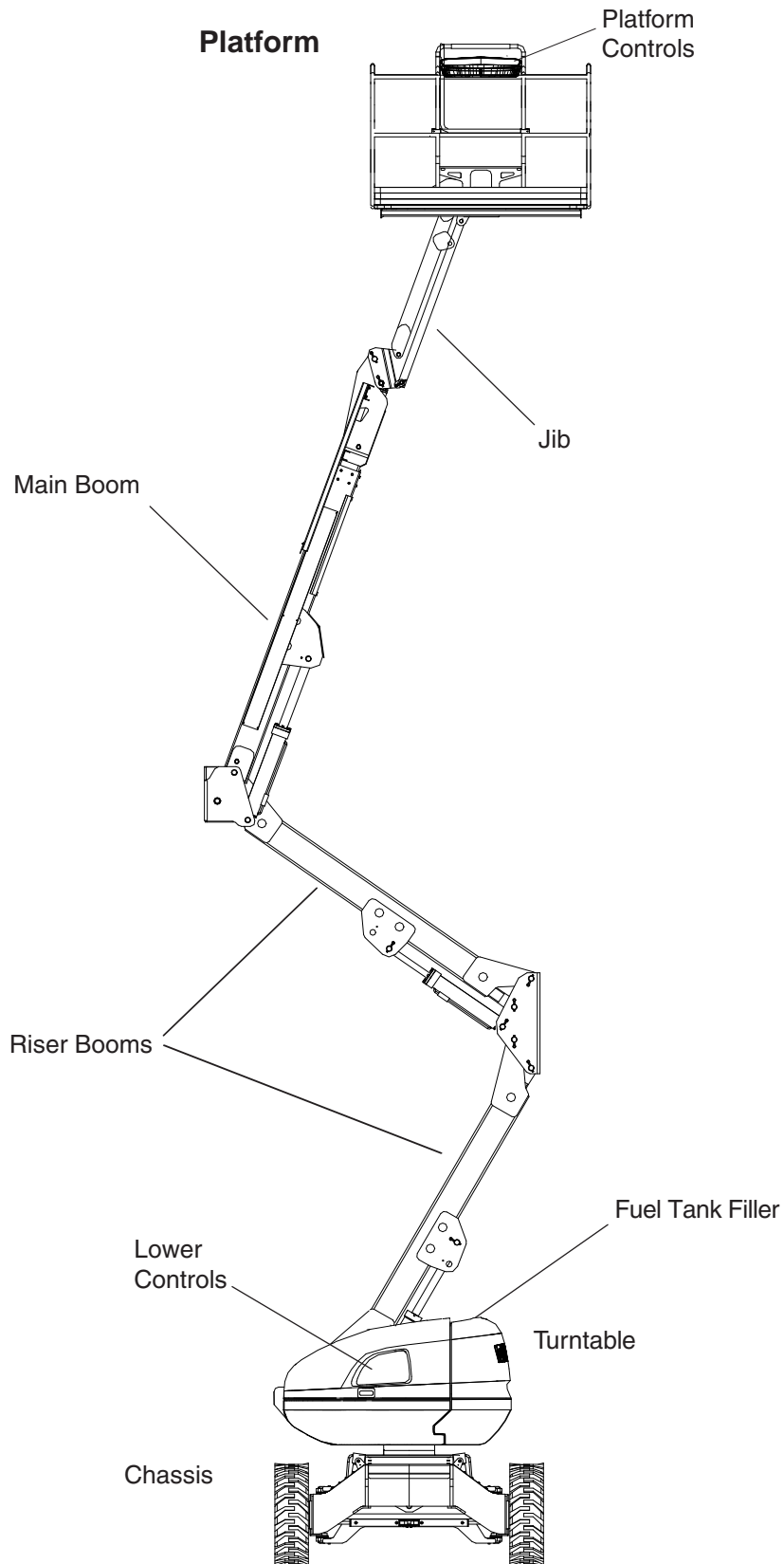
Training must be done under the supervision of a qualified person in an open area free of obstructions until the trainee has developed the ability to safely control and operate the machine.

Operator Responsibility

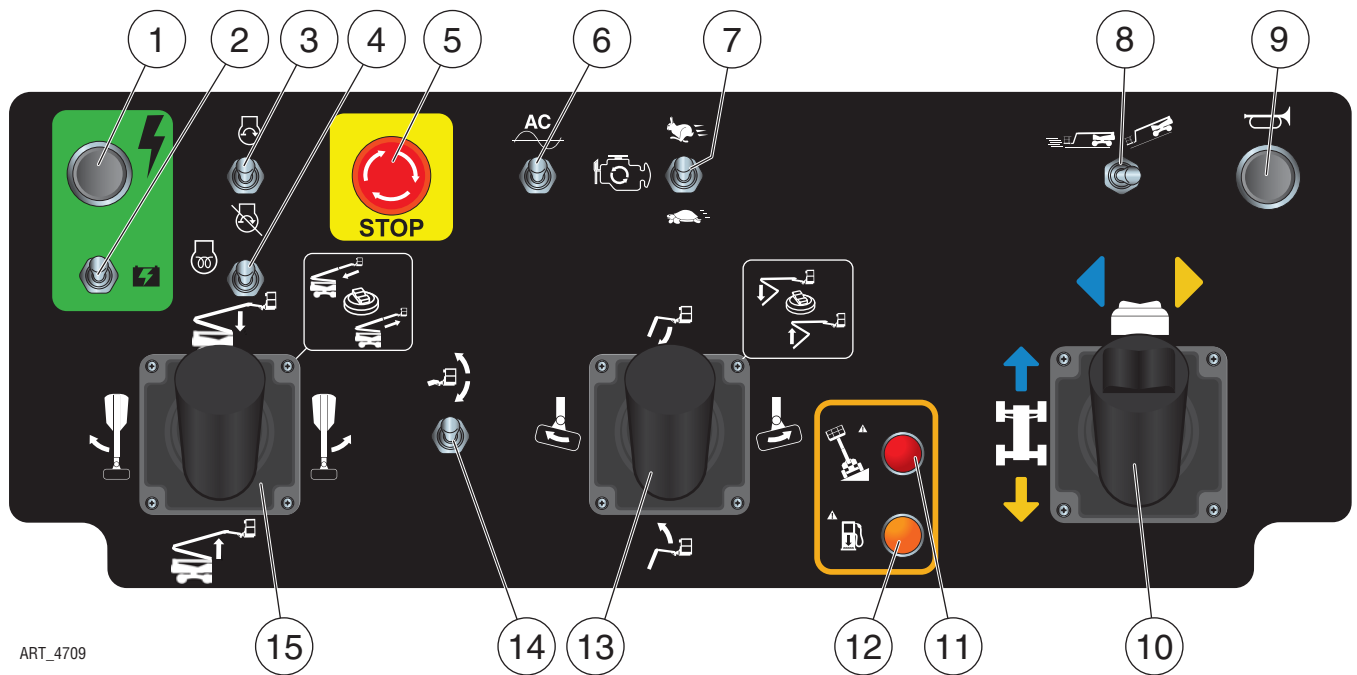
The operator must be instructed that he/she has the responsibility and authority to shut down the machine in case of a malfunction or other unsafe condition of either the machine or the job site.

Controls & Components

Component Locations



Platform Control Station



ART_4709

WARNING

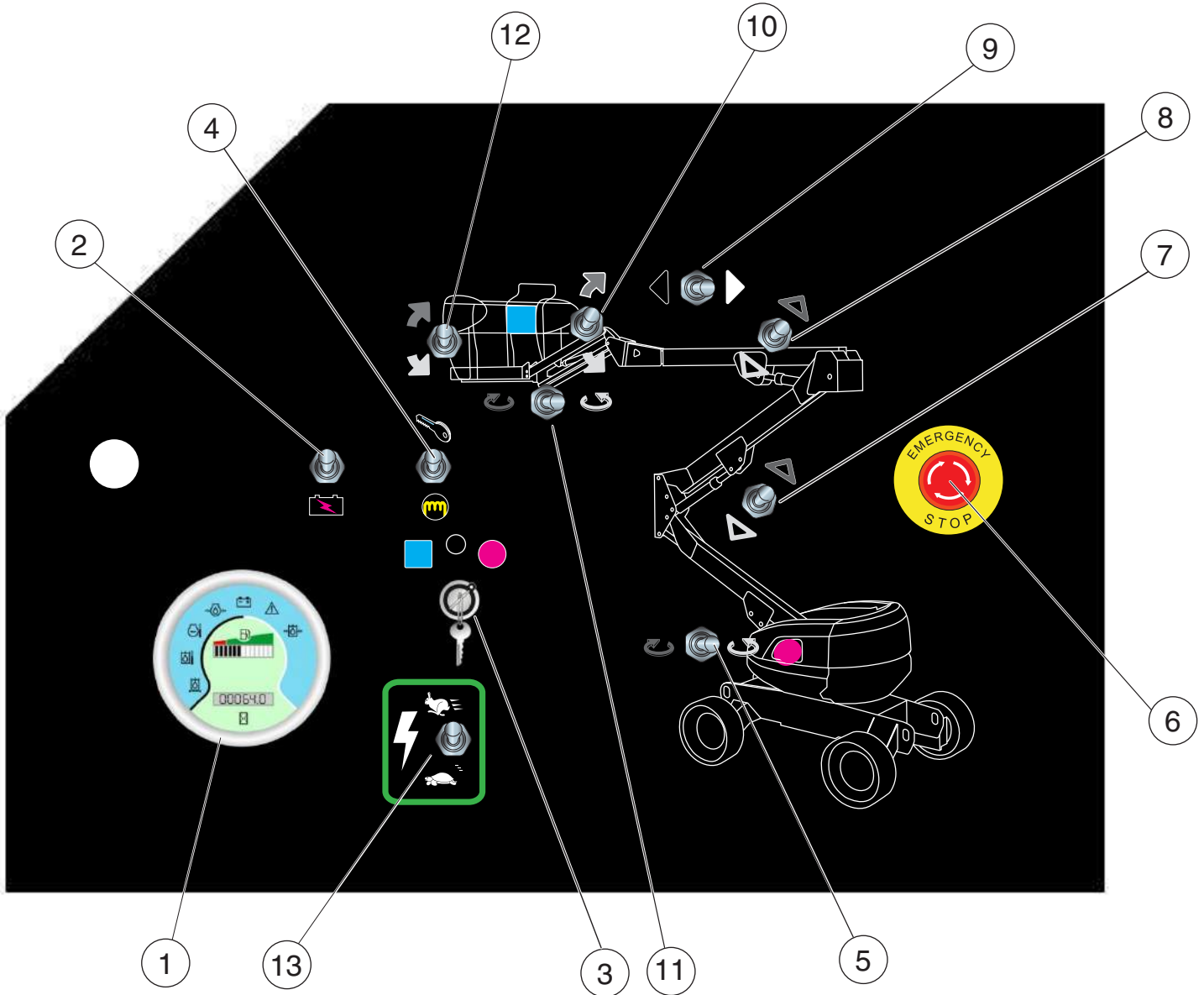
ALWAYS check over, under and around the machine for personnel, structures and obstructions before activating any control function and continue to watch for hazards while operating the machine

CONTROL		DESCRIPTION
1	Function Enable Button	Press and hold this button to enable platform trim.
2	Auxiliary Power	If normal power fails, press and hold while using Boom Retract and Boom Lower functions.
3	Start/Stop Switch	Move this switch up to start engine. Press this switch down to stop engine.
4	Glow Switch	Move this switch up to activate glow plugs prior to cold starting the engine.
5	Emergency Stop Switch	Press the EMERGENCY STOP switch at any time to stop all machine functions. Turn switch <i>clockwise</i> to reset
6	Generator Switch (Optional)	Turn switch ON to engage optional AC generator. Generator switches off when any other function is enabled.
7	Engine Speed Select Switch	Use this switch to set the engine speed when functions are enabled. Setting this switch to low idle speed allows the operator to move the machine slowly and precisely. Move this switch up for high idle speed and fast function speed. Move this switch down for low idle speed and slow function speed.
8	Speed Torque Switch	Move this switch to the left for high speed drive. Push this switch to the right for high torque drive.
9	Horn Button	Press to sound warning horn.

Platform Console: The emergency power only is functional for platform rotation, jib lifting up and down, riser boom and upper boom lifting down, upper boom retracting, turntable swing and leveling up and down

CONTROL		DESCRIPTION	
10	Drive/Steer Control Lever	Depending on the position of the turntable, the machine may move in unexpected directions when the Drive and Steer functions are activated. The color- and shape-coded arrows on the joystick decal correspond to similar arrow decals on the machine chassis. Be sure to check the arrows on the chassis before using the Drive or Steer functions.	
		Drive Function	Depress the enable bar on front of the control lever, then push the control lever forward or backward to drive the machine.
		Steer Function	Depress the enable bar on front of the control lever, then press the thumb switch on top of the control lever to steer left or right.
11	Tilt Indicator Light	This light illuminates and an alarm sounds when the machine is not level. Follow the instructions on page 27 to safely lower the platform.	
12	Low Fuel Indicator Light	If this amber light is illuminated, the fuel level is low. Refuel soon.	
13	Jib/Platform/Riser Control Lever	Jib Lift/Lower Function	Depress the enable bar on front of the control lever, then pull the control lever backward to lift the jib. Depress the enable bar on front of the control lever, then push the control lever forward to lower the jib.
		Platform Rotate Function	Depress the enable bar on front of the control lever, then push the control lever right to rotate the platform counterclockwise. Depress the enable bar on front of the control lever, then push the control lever left to rotate the platform clockwise.
		Riser Boom Lift/Lower Function	Depress the enable bar on front of the control lever, then push the thumb switch on top of the control lever back to raise the Riser Boom. Depress forward to lower the Riser Boom.
14	Platform Level Switch	Press the Function Enable Button (#1) to enable this function, then press this switch up to manually level the platform upward or down to manually level the platform downward.	
15	Boom/Turntable Control Lever	Turntable Rotate Function	Depress the enable bar on front of the control lever, then push the control lever to the left to rotate the turntable clockwise or right to rotate the turntable counterclockwise.
		Boom Lift/Lower Function	Depress the enable bar on front of the control lever, then pull the control lever back to elevate the boom. Depress the enable bar on front of the control lever, then push the control lever forward to lower the boom.
		Boom Extend/Retract Function	Depress the enable bar on front of the control lever, then push the thumb switch on top of control lever back to extend the boom. Depress the enable bar on front of the control lever, then push the thumb switch forward to retract the boom.

Base Controls






Base Control Panel



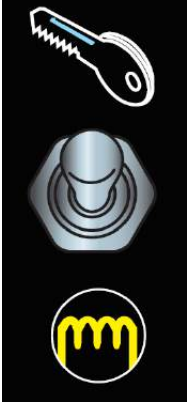
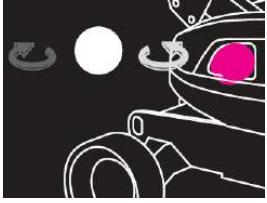

WARNING

ALWAYS check over, under and around the machine for personnel, structures and obstructions before activating any control function and continue to watch for hazards while operating the machine

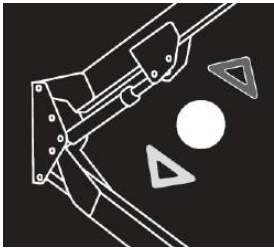
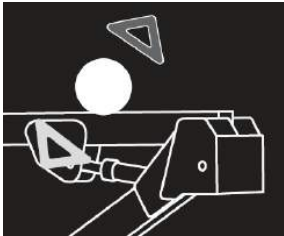
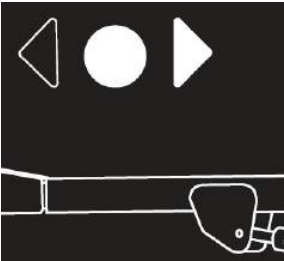
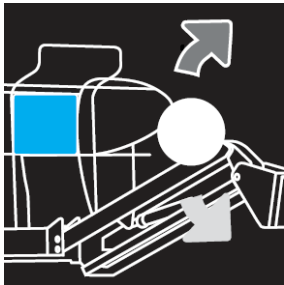
Base Console Panel

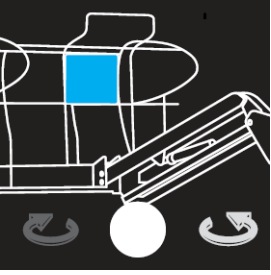
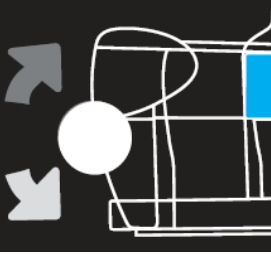


Item	Name	Description
1	<p>The Multifunction Gauge</p> 	<p>The Multifunction Gauge, is used to Display the following:</p> <ul style="list-style-type: none"> ● Fuel level ● Hour Meter ● The Alarm Light for the Engine High Coolant Temperature. ● The Alarm Light for the Engine Low Oil Pressure
2	<p>Auxiliary Power Switch</p> 	<p>A Two Position Toggle Switch, choose the Auxiliary Power to operate the machine in Emergency Situations. It returns back to neutral position once released.</p> <ul style="list-style-type: none"> ● Push and hold the Toggle Switch to battery direction ; The Auxiliary power will be selected ● Operation of the Auxiliary Power also acts as an enable switch to enable machine operation. <div style="text-align: center; background-color: yellow; padding: 5px; margin: 10px 0;"> ⚠ CAUTION </div> <p><i>Ground Console: The emergency power only is functional for, jib lifting down, riser boom and upper boom lifting down, upper boom retracting, turntable swing and leveling up and down.</i></p> <p><i>Check auxiliary power daily.</i></p>
3	<p>The Ground and Platform Controls Selecting Switch</p> 	<p>A three position key switch supplies power to the ground controls or platform console or the center off position</p> <ul style="list-style-type: none"> ● Normally, it is in Center, the Power is cut off ● Turn the Key Switch Counter-clockwise to the Blue Square Position, the machine would be controlled by the Platform Controls. ● Turn the Key Switch Clockwise to the Red Circle Position, the machine would be controlled by the Ground Controls.

Base Console Panel

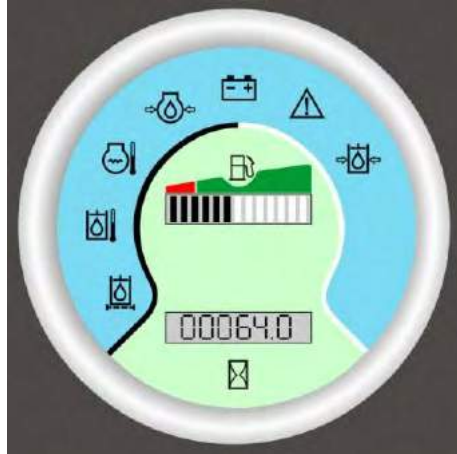
Item	Name	Description
4	<p>Engine Start Switch</p> 	<p>A three position Toggle Switch, It is used to start the engine or power the glow plug to assist to start the engine in cold weather.</p> <ul style="list-style-type: none"> To start engine, push the toggle switch Up to the Key Icon, until the engine starts running, release the switch once the engine starts. It will return back to Neutral position once be released. In cold weather, first push the toggle switch lever down to Glow Plug Icon for about 7 seconds, the glow plug will be energized, then push the toggle switch up to Key Icon to start the engine. <div style="text-align: center; margin: 10px 0;"> <div style="background-color: #0070C0; color: white; padding: 5px; display: inline-block;">NOTICE</div> </div> <p>If the engine fails to start - wait 25 secs and repeat the process</p>
5	<p>Turntable Swing</p> 	<p>A three position Toggle Switch allows the operator to swing the turntable to left or right according the indication direction. It will return to Neutral once released.</p>
6	<p>Emergency Stop</p> 	<p>A two-position red mushroom shaped switch furnishes power to Ground Select switch, it is used to shut down the engine and Turn off the system power in emergency situation.</p> <ul style="list-style-type: none"> Push the switch, to shut the power off. Turn the mushroom clockwise to turn ON the power.

Base Console Panel

Item	Name	Description
7	Riser Boom Up & Down 	A Three Position Toggle Switch. Push the toggle lever Up according to UP Arrow direction, the Riser Booms will be raised simultaneously. Push the toggle lever down will lower the Riser Booms. Once the toggle lever is released, it will return to the Neutral position.
8	Main Boom Up and Down 	A Three Position Toggle Switch. Push the toggle lever Up to raise the Main Boom. Push the toggle lever down to lower the Main Boom. Once the toggle lever is released, it will return to the Neutral position.
9	Main Boom Telescope 	A Three Position Toggle Switch. Push the toggle lever LEFT to telescope the Main Boom out. Push the toggle lever to the right to retract the Main Boom in. Once the toggle lever is released, it will return to the Neutral position.
10	Jib Boom Up & Down 	A Three Position Toggle Switch. Push the toggle lever Up to raise the Jib. Push the toggle lever down to lower the Jib. Once the toggle lever is released, it will return to the Neutral position.








11	<p>Platform Rotate</p> 	<p>A three position Toggle Switch allows the operator to rotate the platform to left or right according the indication direction. It will return to Neutral once released.</p>
12	<p>Platform Leveling Trim</p> 	<p>A three position switch allows the operator to trim the platform automatic self leveling system.</p> <div style="text-align: center; margin: 10px 0;">  WARNING </div> <p><i>ONLY USE THE PLATFORM LEVELING OVERRIDE FUNCTION FOR SLIGHT LEVELING OF THE PLATFORM. INCORRECT USE COULD CAUSE THE LOAD/OCCUPANTS TO SHIFT OR FALL. FAILURE TO DO SO COULD RESULT IN DEATH OR SERIOUS INJURY.</i></p>
13	<p>Function Enable</p> 	<ul style="list-style-type: none"> • Press and hold this switch to enable operation of machine functions from the base controls. • Press down to operate the controls at slow speed. • Press up to operate the controls at higher speed. • Releasing this switch will disable machine functions.

The Multi-Function Gauge



Multi-Function Display Gauge

Multi-Function Gauge Display Explanations

Item	Name & Figure	Description
1		Hydraulic Filter Warning indicator. It will be displayed if the filter is clogged. Change the filter element.
2		Hydraulic oil high temperature Warning indicator. It will be displayed once the hydraulic oil temperature in the reservoir is excessive. Stop the machine to cool the hydraulic oil, and investigate.
3		Engine coolant high temperature Warning indicator. It will be displayed once the coolant temperature is excessive. Stop the machine to cool the coolant, and investigate.
4		Engine Oil Pressure Warning Indicator, it will be displayed if the engine oil pressure is too low. Stop the machine and investigate.
5		Battery Voltage low Warning indicator, it will be displayed if the battery voltage is too low.
6		System Error Warning indicator. It will be displayed if there is any trouble and the error code would be flashing.
7		Low Charge Pressure Warning Indicator.(Option) It would be displayed and flash once the charge pressure is less than 10bar. Stop the machine and investigate.

Workplace Inspection

DO NOT operate this machine until you have read and understood this manual, have performed the Workplace Inspection, Pre-Start Inspection and Routine Maintenance, and have completed all the test operations detailed in the Operating Instructions section.

Inspect the workplace and determine whether the workplace is suitable for safe machine operation. Do this before moving the machine to the workplace.

Be sure the lift is the correct machine for the job.

Be aware of workplace conditions, and continue to watch for hazards while operating the machine.



ELECTROCUTION HAZARD! THIS MACHINE IS NOT INSULATED!

DEATH OR SERIOUS INJURY will result from contact with or inadequate clearance from any electrically charged conductor.

You must maintain a CLEARANCE OF AT LEAST 10 FEET (3.05 m) between any part of the machine, or its load, and any energized electrical line or apparatus carrying over 300 Volts up to 50,000 Volts. One foot (30.5 cm) additional clearance is required for every additional 30,000 Volts.

Observe Minimum Safe Approach Distance.

See page 4 for more information.

Workplace Inspection

Before operating the machine, check the workplace for all possible hazards, including but not limited to:

- drop-offs or holes, including those concealed by water, ice, mud, etc.
- sloped, unstable or slippery surfaces
- bumps, surface obstructions and debris
- overhead obstructions and electrical conductors
- other objects or equipment
- hazardous locations and atmospheres
- inadequate surface and support to withstand all load forces imposed by the machine
- wind and weather conditions
- the presence of unauthorized personnel
- other possible unsafe conditions

Operating Instructions & Pre-Operation Function Tests

DO NOT operate this machine until you have read and understood this manual, have performed the Workplace Inspection (Page 20), Pre-Start Inspection and Routine Maintenance (Page 34), and have completed all the test operations detailed in this Operating Instructions section.

This section provides instructions and tests for each function of machine operation. Follow all safety rules and instructions. The operator must conduct inspections and a Functions Test of the machine before each work shift to check that all machine systems are working properly.

Test the machine on a firm level surface with no debris, drop-offs, potholes or overhead obstructions. Perform each step outlined in this section.

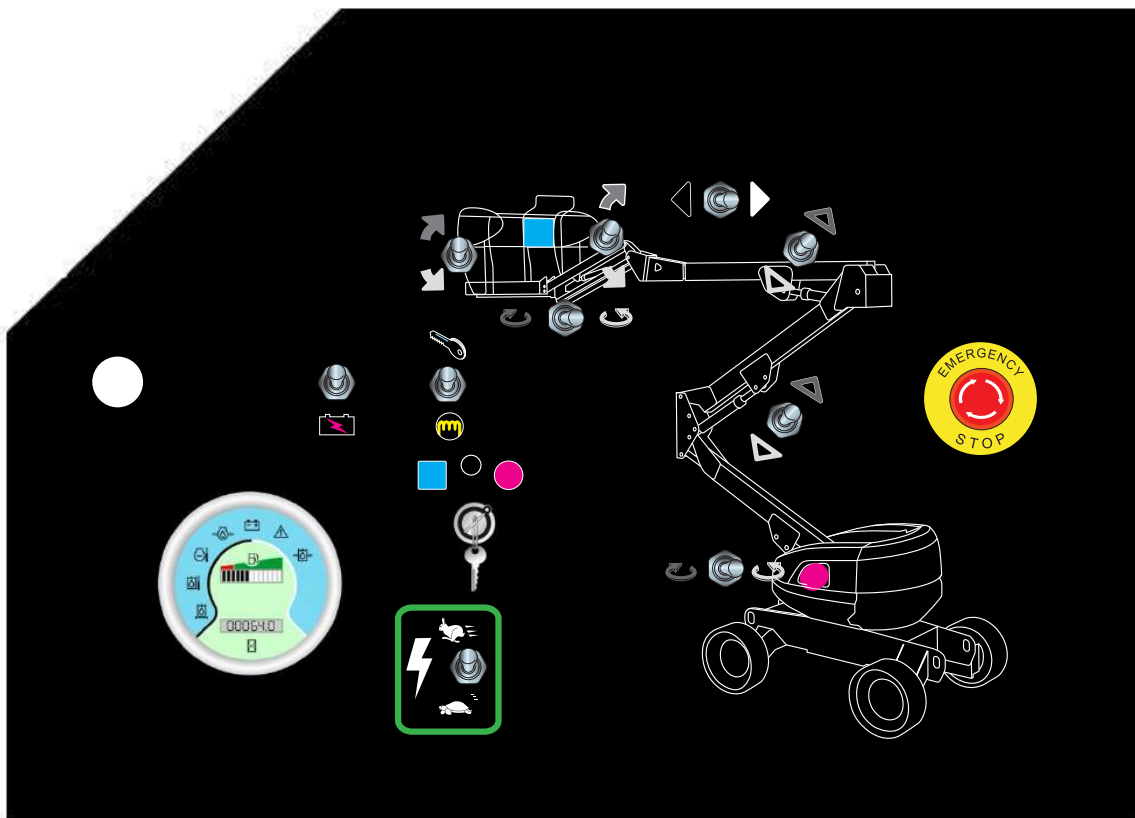
This machine shall only be operated by trained and authorized personnel. If multiple operators use this machine, all must be trained, qualified and authorized to use it. New operators must perform a Pre-Start Inspection and Functions Test prior to operating the machine.

Operators must comply with all employer and job site rules and governmental regulations regarding the use of personal protective equipment – see *Fall Protection* on page 3.

DO NOT use a machine that is malfunctioning. If any function does not perform as described, tag the machine and remove for repair by a qualified service technician. After repairs are completed, a Pre-Start Inspection and Functions Test must be performed before using the machine.

WARNING

ALWAYS check over, under and around the machine for personnel, structures and obstructions before activating any control function and continue to watch for hazards while operating the machine





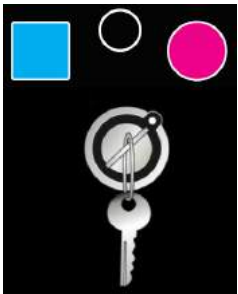
Emergency Stop

- Perform Pre-Start Inspection (See Page 34)
- Check Emergency Stop Switches at both the base and platform controls - turn clockwise to reset.
- Depress the EMERGENCY STOP switch whenever the machine is not in operation. Turn switch clockwise to reset.



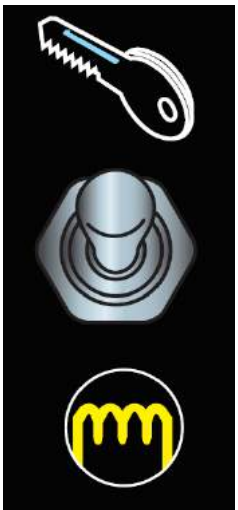
Auxiliary Power Switch

- Push and hold the Toggle Switch to battery direction ; The Auxiliary power will be selected
- Operation of the Auxiliary Power also acts as an enable switch to enable machine operation.



Ground and Platform Selection Switch

- Normally, it is in Center, the Power is cut off
- Turn the Key Switch Counter-clockwise to the Blue Square Position, the machine would be controlled by the Platform Controls.
- Turn the Key Switch Clockwise to the Red Circle Position, the machine would be controlled by the Ground Controls.

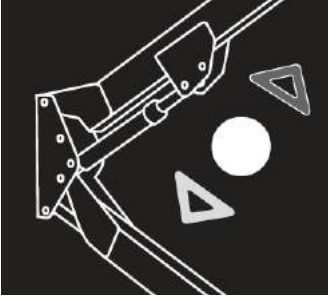


Engine Start Switch

A three position Toggle Switch, It is used to start the engine or power the glow plug to assist to start the engine in cold weather.

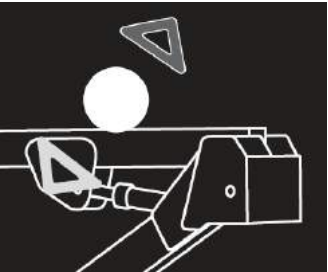
- To start engine, push the toggle switch Up to the Key Icon, until the engine starts running, release the switch once the engine starts. It will return back to Neutral position once be released.
- In cold weather, first push the toggle switch lever down to Glow Plug Icon for about 7 seconds, the glow plug will be energized, then push the toggle switch up to Key Icon to start the engine.

Riser Boom UP and DOWN



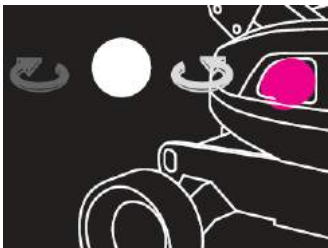
- Push and hold the High Engine Speed Enable Switch.
- Push the Toggle lever Up according to UP Arrow Direction, the Riser Booms will be raised simultaneously.
- Push the Toggle lever down will lower the Riser Booms simultaneously.
- Releasing the switch will stop Riser Boom Up and Down function.
- Pressing the Emergency Stop Switch will stop Riser Boom function.

Main Boom UP and Down



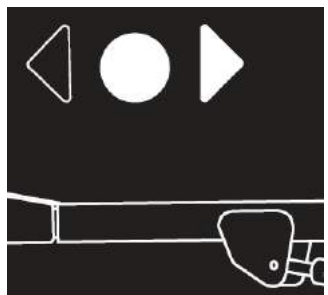
- Push and hold the High Engine Speed Enable Switch.
- Push the Toggle lever Up to raise the Main Boom.
- Push the Toggle Lever Down to lower the Main Boom
- Releasing the switch will stop Main Boom Up and Down function.
- Pressing the Emergency Stop Switch will stop Main Boom function.

Turntable Swing



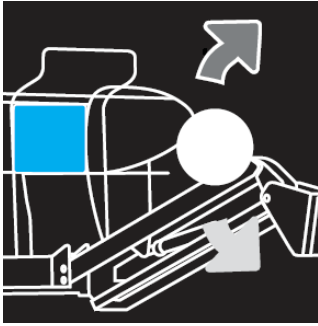
- Push and hold the High Engine Speed Enable Switch.
- Push the switch to the left and right. The turntable should swing accordingly.
- Releasing the switch will stop Turntable Swing
- Pressing the Emergency Stop Switch will stop Turntable Swing function.

Main Boom Telescope



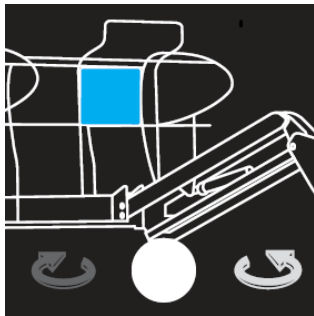
- Push and hold the High Engine Speed Enable Switch.
- Push the Toggle Lever LEFT to telescope the Main Boom out.
- Push the toggle lever to the right to retract the Main Boom in.
- Extend Boom until it stops. Boom should extend to maximum length.
- Retract Boom until it stops. Boom should retract to minimum length.
- Releasing the switch will stop Main Boom Telescope.
- Pressing the Emergency Stop Switch will stop Main Boom Telescope function.

Jib Boom UP and DOWN



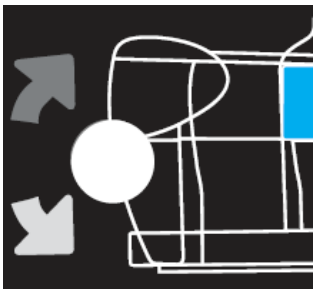
- **Test Operation**
- Press and hold the High Engine Speed Enable Switch
- Push the Jib Boom UP/DOWN switch on the base control panel to lift or lower the Jib.
- Raise the Jib until it stops.
- Lower the Jib until it stops.
- Releasing the switch will stop Jib Boom UP and DOWN function.
- Pressing the Emergency Stop Switch will stop Jib Boom UP/DOWN function.

Platform Rotate



- **Test Operation**
- Press and hold the High Engine Speed Enable Switch.
- Press and hold the Platform Rotate Switch on the base control panel to rotate the platform.
- Push the switch left and right. The platform should rotate accordingly.
- Releasing the switch will stop platform rotate function.
- Pressing the Emergency Stop Switch will stop platform rotate function.

Platform Leveling Trim



- The platform will automatically level as the boom is lifted or lowered. The platform Level function allows manual level adjustment of the platform. Manual leveling may be used to adjust the platform within 5 Degrees of Level.

Test Operation

- Press and hold the High Engine Speed Enable Switch.
- Push the switch up and down. The platform level should change accordingly.
- Releasing the switch will stop platform level function.
- Pressing the Emergency Stop Switch will stop platform level function.

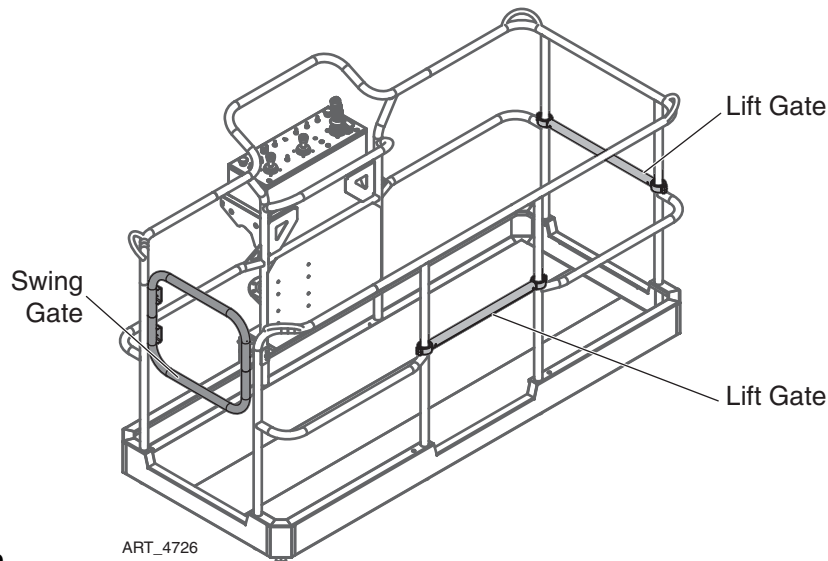
Platform Control Operation & Pre-Operation Functions Test

Entering The Platform

Personnel shall enter and exit the platform only at the Personnel Entry Gates, and only when the boom is fully retracted and lowered.

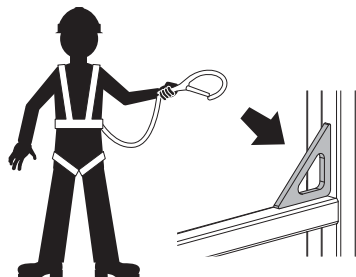
Ensure that all Personnel Entry Gates are properly closed and that the Swing Gate is latched in the closed position before operating the machine.

Personnel Entry Gates



ART_4726

Fall Protection

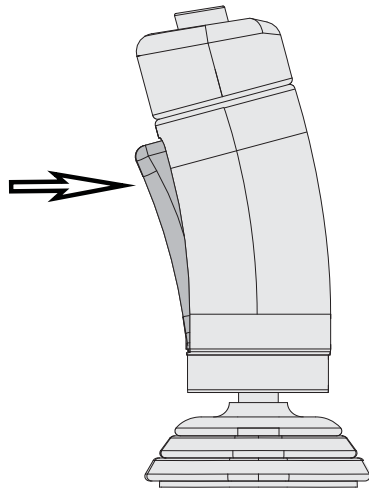


Personal fall protection equipment (PFPE) is required when operating this machine.

All PFPE must comply with employer and job site rules and applicable governmental regulations, and must be inspected and used in accordance with the PFPE manufacturer's instructions.

ALWAYS wear approved fall protection, properly attached to a designated anchor point, when operating the machine.

DO NOT attach more than one lanyard per anchor point.



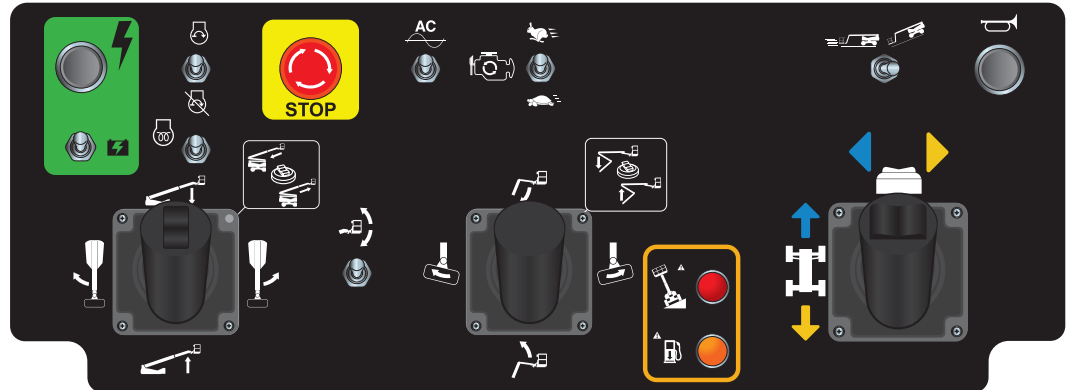
ART_4729

Function Enable At Platform Controls

Note: If any Function Enable trigger or button is depressed for seven (7) seconds without any function being activated, the Enable System times out and deactivates. Release the trigger or button and reengage to activate the Function Enable System.

The Drive function and most boom functions are enabled by squeezing the trigger at the front of the appropriate control handle.

Platform Control Panel



WARNING

ALWAYS check over, under and around the machine for personnel, structures and obstructions before activating any control function and continue to watch for hazards while operating the machine.

DO NOT hang anything over any control handle at any time.

Platform Operations Test



ART_3353

Emergency Stop

- Press the EMERGENCY STOP switch at any time to stop all machine functions.
- Turn switch *clockwise* to reset.
- Depress the EMERGENCY STOP switch whenever the machine is not in operation. Turn switch *clockwise* to reset.



WARNING

Activation of the EMERGENCY STOP switch will apply brakes immediately. This will cause sudden platform movement as the machine comes to an abrupt stop. Brace yourself and secure objects on the platform during operation of machine.



Select PLATFORM Operation

- **Base Controls:** Turn the selector switch clockwise to PLATFORM.



ART_4725



ART_3359

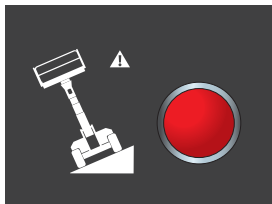
Operate from Platform

- Enter the platform through one of the personnel entry gates. Close and secure the entry.
- Press the Start/Stop switch UP to start. Release the switch when the engine starts.
- Press the Horn Button to verify proper operation.

Tilt Indicator Light



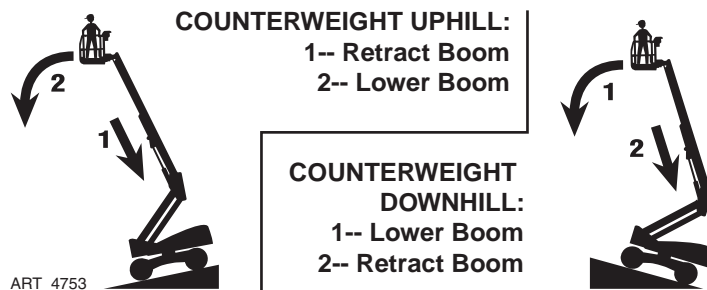
STOP ALL MOVEMENT if Tilt Alarm sounds. Death or Serious Injury may occur.



ART_3363b

Light ON and alarm sounding indicates an unsafe condition.

- STOP ALL MOVEMENT. The machine is not level.
- Look at the diagram to determine the condition of the counterweight as it relates to the slope, then use extreme caution while following the instructions. DO NOT rotate the turntable while lowering.



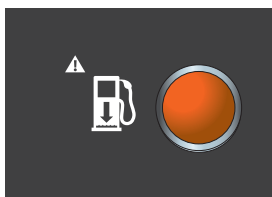
ART_4753

- If the Tilt Alarm sounds while the counterweight is uphill, first retract the boom, then lower the boom.
- If the Tilt Alarm sounds while the counterweight is downhill, first lower the boom, then retract the boom.
- Move the machine to a firm, level surface before continuing operation.

Low Fuel Indicator Light

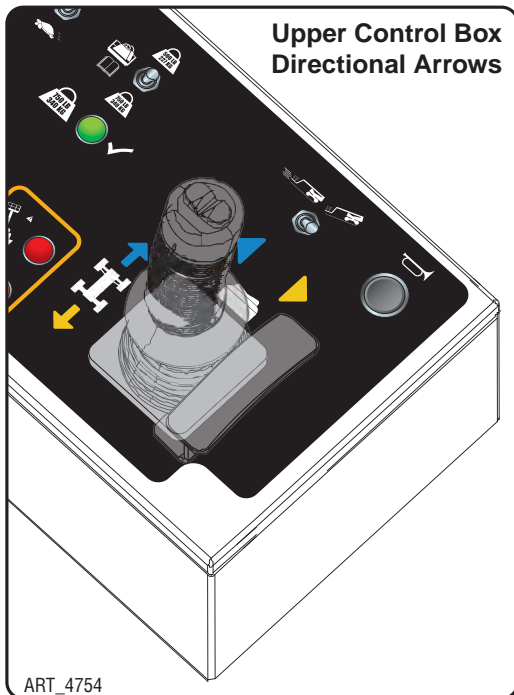
Light ON indicates a low-fuel alert condition.

- Refuel soon.



ART_3363

Drive Control Lever Operation



Depending on the orientation of the boom and chassis, the Drive and Steer functions may move the machine in directions opposite of the motion of the control lever. The color- and shape-coded arrows on the control lever decal correspond to similar arrow decals on the machine chassis (see illustrations). Be sure to check the arrows on the chassis before activating and using the Drive or Steer functions.

- Drive Function speed is proportional and is controlled by the positional of the control lever. The further it is moved from the neutral (center) position, the faster the speed will be.
- When the boom is elevated out of the stowed position, the maximum drive speed is reduced to 0.5 mph (0.8 km/h). Drive function speed is still fully proportional to the position of the drive control handle.
- The control lever returns to the neutral (center) position when released.
- Steering Function is not proportional.

Note: The Steering Function **does not** automatically return the steering wheels to the centered position. Always check the position of the steering wheels before and during machine operation.

Test Operation

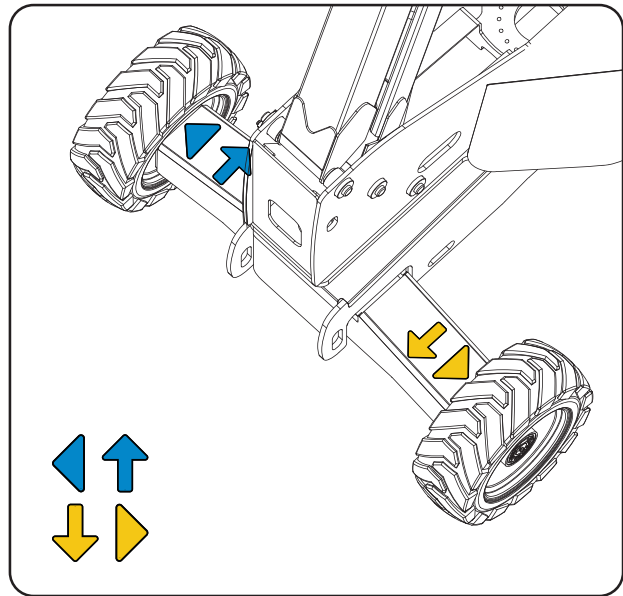
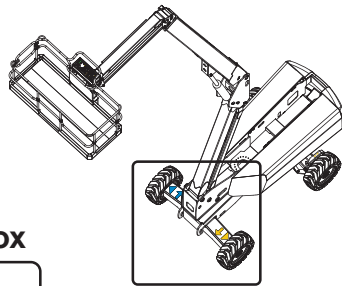
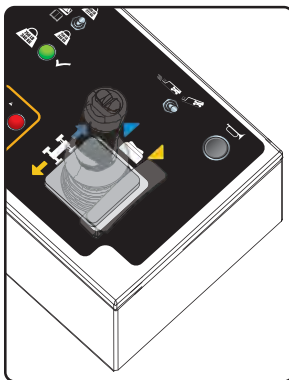
- Drive: Squeeze the enable trigger, then move the control lever in the desired direction of movement. The further it is moved from the neutral (center) position, the faster the speed will be.
- Stop: Return the control lever to the neutral (center) position. Releasing the control lever will also stop the machine. Releasing the trigger will result in a rapid stop.
- Extend the boom approximately 3 feet (1 m), then drive the machine. Speed should be reduced significantly from the fully-retracted, fully-lowered speed. Retract the boom.
- Elevate the boom approximately 10°, then drive the machine. Speed should be reduced significantly from the fully-retracted, fully-lowered speed. Lower the boom.
- Steering: Squeeze the enable trigger, then press the thumb switch on top of the control lever to steer in the desired direction.

Note: The Steering Function **does not** automatically return the steering wheels to the centered position. Stay alert to the position of the steering wheels before and during machine operation.

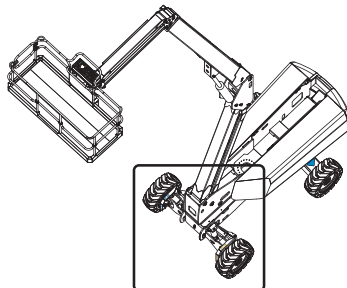
Drive & Steer Directional Arrows

Pay careful attention to the Chassis Drive & Steer arrows for machine direction.

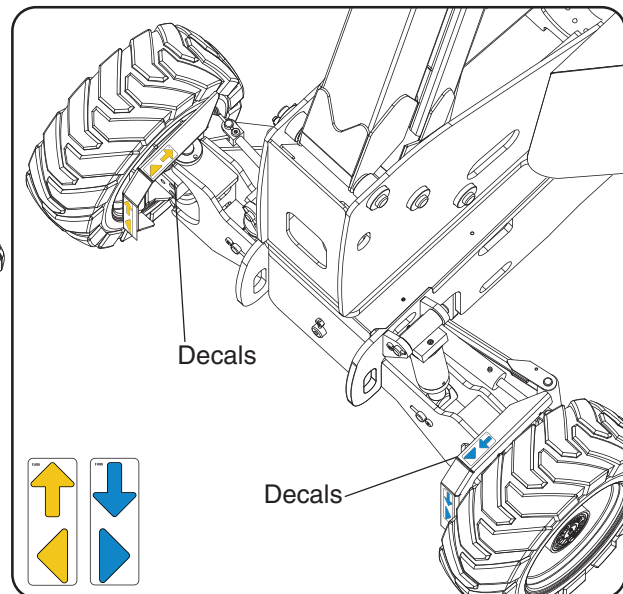
Upper Control Box



Platform over non-steering wheels

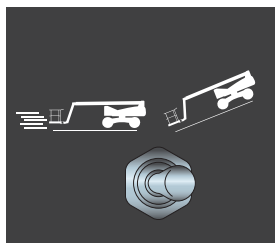


When the platform is over the steering wheels, the machine moves in the opposite direction of the Control Lever.



Platform over steering wheels

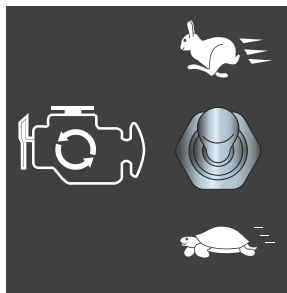
ART_4747



ART_4757

Speed/Torque Switch

Move this switch to the left for high speed drive. Push this switch to the right for high torque drive.



ART_4755

Engine Speed Select

Use this switch to set the engine speed when functions are enabled. Setting this switch to low idle speed allows the operator to move the machine slowly and precisely.

Move this switch up for high idle speed and fast function speed.

Move this switch down for low idle speed and slow function speed.

Boom Functions Control Lever

This control lever controls the Boom Extend/Retract, Boom Lift/Lower and Turntable Rotate functions. The control lever is fully proportional for the Boom Lift/Lower and Turntable Rotate functions.

These functions are enabled by pressing the trigger on the front of the control lever.

Test Operation

To test the Boom Extend/Retract function:

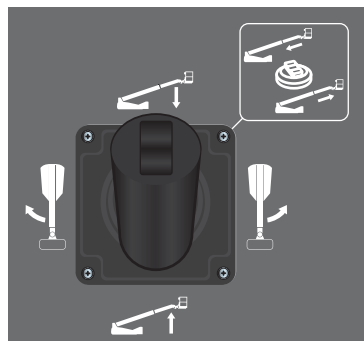
- Squeeze the enable trigger, then press and hold the thumb switch on top of the control lever rearward until the boom reaches full extension.
- Squeeze the enable trigger, then press and hold the thumb switch forward to retract the boom.

To test the Boom Lift/Lower function:

- Squeeze the enable trigger, then pull the control handle back to lift the boom. Lift the boom completely.
- Squeeze the enable trigger, then push the control handle forward to lower the boom. Lower the boom to its stowed position.

To test the Turntable Rotate function:

- Squeeze the enable trigger, then push the control handle to the left to rotate the turntable clockwise.
- Squeeze the enable trigger, then push the control handle to the right to rotate the turntable counterclockwise.



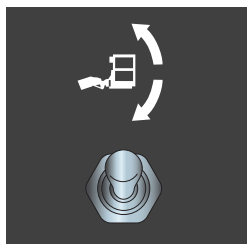
ART_4731

Platform Level Switch

The platform will automatically level as the boom is lifted or lowered. The Platform Level function allows manual level adjustment of the platform. Manual leveling may be used to adjust the platform within 5° of level.

Test Operation

- Press and hold the Function Enable button.
- Push the Platform Level switch up or down to adjust the position of the platform.
- Platform Level power is disabled upon exceeding 5° out of level when out of the stowed position. Power is allowed only to the direction that returns the platform toward level.



ART_4732

Platform Level Function Enable

The Platform Level Function is enabled by pressing and holding the green Enable button at the top left of the Platform Control Station.



ART_4728

⚠ WARNING

ONLY USE THE PLATFORM LEVELING OVERRIDE FUNCTION FOR SLIGHT LEVELING OF THE PLATFORM. INCORRECT USE COULD CAUSE THE LOAD/OCCUPANTS TO SHIFT OR FALL. FAILURE TO DO SO COULD RESULT IN DEATH OR SERIOUS INJURY.

Platform/Jib/Riser Functions Control Lever

The Platform/Jib/Riser Functions control lever controls the Platform Rotate, Jib Lift/Lower functions, and Riser Boom Lift/Lower functions. The control lever is fully proportional for platform rotate and jib functions.

These functions are enabled by pressing the trigger on the front of the control lever.

Test Operation

To test the Jib Lift/Lower function:

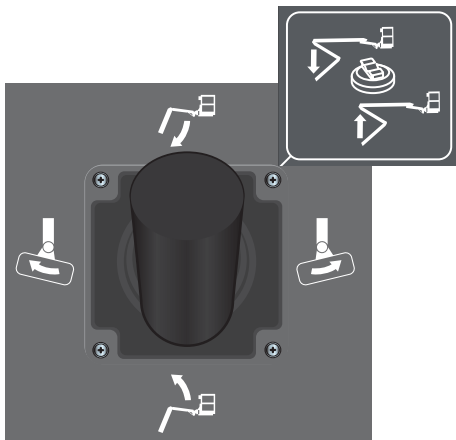
- Squeeze the enable trigger, then pull the control lever back to raise the jib.
- Squeeze the enable trigger, then push the control lever forward to lower the jib.

To test the Platform Rotate function:

- Squeeze the enable trigger, then push the control lever left to turn the platform clockwise.
- Squeeze the enable trigger, then push the control lever right to turn the platform counter clockwise.

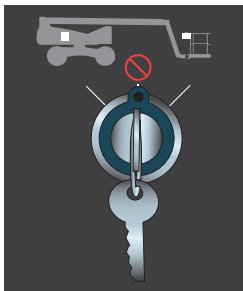
To test the Riser Lift/Lower Function

- Squeeze the enable trigger, then push the thumb switch on top of the control lever back to raise the Riser Boom.
- Depress forward to lower the the Riser Boom



ART_4733

Shutdown Procedure



ART_4734

- When finished with the machine, place the platform in the stowed position.
- Park the machine on a level surface.
- Carefully exit the platform using a constant three (3) point dismount/grip.
- Turn the Selector Key Switch to the OFF position and remove the key to prevent unauthorized use. Always put the switch in OFF position when leaving the machine at the end of the work day.

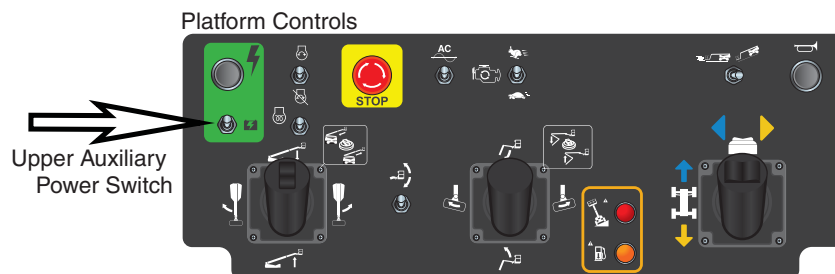
Auxiliary Power System & Test



If primary power fails while the platform is elevated, use the Auxiliary Power System to safely lower the platform.

Do not climb down the boom assembly or exit the platform while elevated.

ALWAYS check over, under and around the machine for personnel, structures and obstructions before activating any control function and continue to watch for hazards while operating the machine



Auxiliary Power

A toggle type auxiliary power control switch is located on the platform control station and another is located on the ground control station. Operation of either switch turns on the electrically driven auxiliary hydraulic pump. This should be used in case of failure of the main power. When platform control is chosen, the auxiliary pump will operate boom lift down, main boom retract, jib lift up and down, turntable swing, platform rotate and level. Otherwise, when ground control is chosen, the auxiliary pump will not operate jib lift up and platform rotate.

NOTICE

WHEN OPERATING ON AUXILIARY POWER, DO NOT OPERATE MORE THAN ONE FUNCTION AT THE SAME TIME. SIMULTANEOUS OPERATION CAN OVERLOAD THE AUXILIARY PUMP MOTOR.

The main function of auxiliary power is to lower the platform in the event of primary power failure. Determine the reason for primary power failure and have the problem corrected by a certified service technician. Operate as follows:

To activate auxiliary power from the platform control station:

- 1) Position PLATFORM/GROUND SELECT KEY SWITCH to PLATFORM.
- 2) Position EMERGENCY STOP switch to ON.
- 3) Position AUXILIARY POWER switch to ON and hold.
- 4) Operate appropriate control switch, lever or controller for desired function and hold.
- 5) Release AUXILIARY POWER switch, selected control switch, lever or controller.
- 6) Position POWER/EMERGENCY STOP switch to OFF.

To activate auxiliary power from the ground control station:

- 1) Position PLATFORM/GROUND SELECT KEY SWITCH to GROUND.
- 2) Position EMERGENCY STOP switch to ON.
- 3) Position AUXILIARY POWER switch to ON and hold.
- 4) Operate appropriate control switch or controller for desired function and hold.
- 5) Release AUXILIARY POWER switch, and appropriate control switch or controller.
- 6) Position EMERGENCY STOP switch to OFF.

Machine Inspections and Maintenance

DO NOT operate this machine until you have read and understood this manual, have performed the Workplace Inspection, Pre-Start Inspection and Routine Maintenance, and have completed all the test operations detailed in the Operating Instructions section.

Tag and remove a damaged, malfunctioning or modified machine from service. DO NOT use a damaged, malfunctioning or modified machine.

Use the Pre-Start Inspection to determine what Routine Maintenance is required. The operator may perform only the routine maintenance items specified in this manual.

IMPORTANT—Scheduled maintenance inspection checklists are included in this manual for use only by qualified service technicians. Only qualified service technicians may perform repairs to the machine. After repairs are completed, the operator must perform a Pre-Start Inspection before proceeding to the Functions Test.



Hydraulic fluid under pressure can penetrate and burn skin, damage eyes, and may cause serious injury, blindness, and death. Repair leaks immediately. Fluid leaks under pressure may not always be visible. Check for pin hole leaks with a piece of cardboard, not your hand.



NEVER perform work under the boom assembly with the platform elevated without first supporting the boom assembly.

Failure to perform scheduled maintenance at recommended intervals may result in injury or death. Keep maintenance records current and accurate.

Immediately report any damage, defect, unauthorized modification or malfunction to your supervisor. Any defect must be repaired prior to continued use. DO NOT use a damaged, modified or malfunctioning machine.

DO NOT hang anything over any control handle at any time.



Never leave hydraulic components or hoses open. Plug all hoses and fitting immediately after disassembly to protect the system from outside contamination (including rain).

Never open a hydraulic system when there are contaminants in the air.

Always clean the surrounding area before opening hydraulic systems.

Use only recommended lubricants. Improper lubricants or incompatible lubricants may cause as much damage as no lubrication.

Watch for makeshift "fixes" which can jeopardize safety as well as lead to more costly repair.

Inspection and maintenance should be performed by qualified personnel familiar with the equipment.

Pre-Start Inspection Checklist

The operator must conduct a Pre-Start Inspection of the machine before each work shift.

DO NOT use a damaged or malfunctioning machine.

Initial	Description
---------	-------------

- | | |
|-------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| _____ | Check that the operator's manual and manual of responsibilities are in the storage container located on the platform. |
| _____ | Perform a visual inspection of all machine components. Look for missing parts; torn or loose hoses; hydraulic fluid leaks; loose, torn or disconnected wires; damaged tires; etc. |
| _____ | Check all structural components of the machine for cracked welds, corrosion and collision damage. |
| _____ | Check the security and condition of the lanyard attachment points. |
| _____ | Check all controls for any damage and proper function. |
| _____ | Check all hoses and the cables for worn or chafed areas. |
| _____ | Check the platform rails and sliding mid-rail entries for damage or modification. Check the swing gate for proper operation and latching. |
| _____ | Check that all warning and instructional decals are legible and secure. |
| _____ | Check the tires for damage. |
| _____ | All structural components, pins and fasteners are present and properly tightened. |
| _____ | Check for fluid leaks. |
| _____ | Check hydraulic fluid level (check with platform fully lowered). |
| _____ | Check engine oil level. |
| _____ | Check engine coolant level at overflow bottle. |
| _____ | Check fuel tank level. |
| _____ | Secure all covers, panels and hoods. |
| _____ | Ensure that all gates are properly closed and secured before operating the machine. |

Routine Maintenance

IMPORTANT— The operator may perform only maintenance items on the Pre-Start Inspection Checklist. Frequent and Annual maintenance must be performed by qualified service technicians.

Pre-Start Inspection Perform routine maintenance as identified in the *Pre-Start Inspection Checklist* on page 34.

Frequent and Annual Maintenance

Frequent Inspection Checklists and Annual Inspection Reports must be completed by qualified service technicians trained and authorized to perform maintenance on this machine, and must be done in accordance with the procedures outlined in the service manual. Scheduled maintenance inspection checklists are included in this manual for use by qualified service technicians.

Machines that have been out of service for more than three months must have the Frequent Inspection Checklists completed before returning to service.

Frequent Inspection Checklist



This checklist must be used at 3-month intervals or every 150 hours of machine use, whichever occurs first. Failure to do so could result in death or serious injury.

Frequent Maintenance Inspections should be conducted by qualified service technicians only. Photocopy this page for reuse. Keep inspections records up to date. Record and report all discrepancies to your supervisor.

Model Number _____ **Serial Number** _____ **Hour Meter Reading** _____

Initial	Description
---------	-------------

- | | |
|-------|-------------------------------------------------------------------------------------------------------------------------------|
| _____ | Perform all checks listed on Pre-Start Inspection. |
| _____ | Replace engine oil and filter after the first 100 hours of service. |
| _____ | See Kubota engine operator's manual for other engine maintenance information. |
| _____ | Inspect the condition of hydraulic fluid in the reservoir. Oil should be a clear amber color. |
| _____ | Check battery electrolyte level and connections. |
| _____ | Check wheel lug nuts for proper torque (see "Machine Specifications"). |
| _____ | Check if tires are leaning in or out. |
| _____ | Inspect all structure and pivot points for signs of wear and/or damage. |
| _____ | Check the pin joints and retaining rings for security. |
| _____ | Inspect the entire machine for signs of damage, broken welds, loose bolts, improper or makeshift repairs. |
| _____ | Check that the platform does not drift down with a full load. |
| _____ | Check all wire connections for tightness and corrosion. |
| _____ | Check the operation speeds to ensure they are within specified limits (see <i>Specifications</i>). |
| _____ | Check the Auxiliary Power System. |
| _____ | Clean and lubricate all push button switches with dry lubricant and ensure that the switches operate freely in all positions. |
| _____ | Check the tightness of the platform frame and the linkage pins. |
| _____ | Check the overall platform and guardrail component security. |
| _____ | Check the electrical mounting and hardware connections for security. |
| _____ | Check the steering kingpins for excessive play. |

Additional maintenance requirements for severe conditions

- _____ If the machine is used in very dusty, exceptionally hot or exceptionally cold conditions, replace hydraulic filter element and air filter element (under normal conditions replace every 6 months or 300 hours, whichever comes first).

DATE _____ **INSPECTED BY** _____

Annual Inspection Report



Annual Inspection Report

MEC Aerial Platform Sales Corp.
 1401 S. Madera Avenue • Kerman, CA 93630 USA
 800-387-4575 • 559-842-1500 • Fax: 559-842-1522

Date _____
 Serial Number _____
 Model Number _____
 Date Of Last Inspection _____
 Date Placed In Service _____

Customer _____
 Street _____
 City/State/Zip _____
 Phone Number _____
 Contact _____

Dealer _____
 Street _____
 City/State/Zip _____
 Phone Number _____
 Contact _____

- Check each item listed below.
- Use proper Operator's, Service and Parts manual for specific information and settings.
- If an item is found to be "Unacceptable" make the necessary repairs and check the "Repaired" box.
- When all items are "Acceptable", the unit is ready for service.

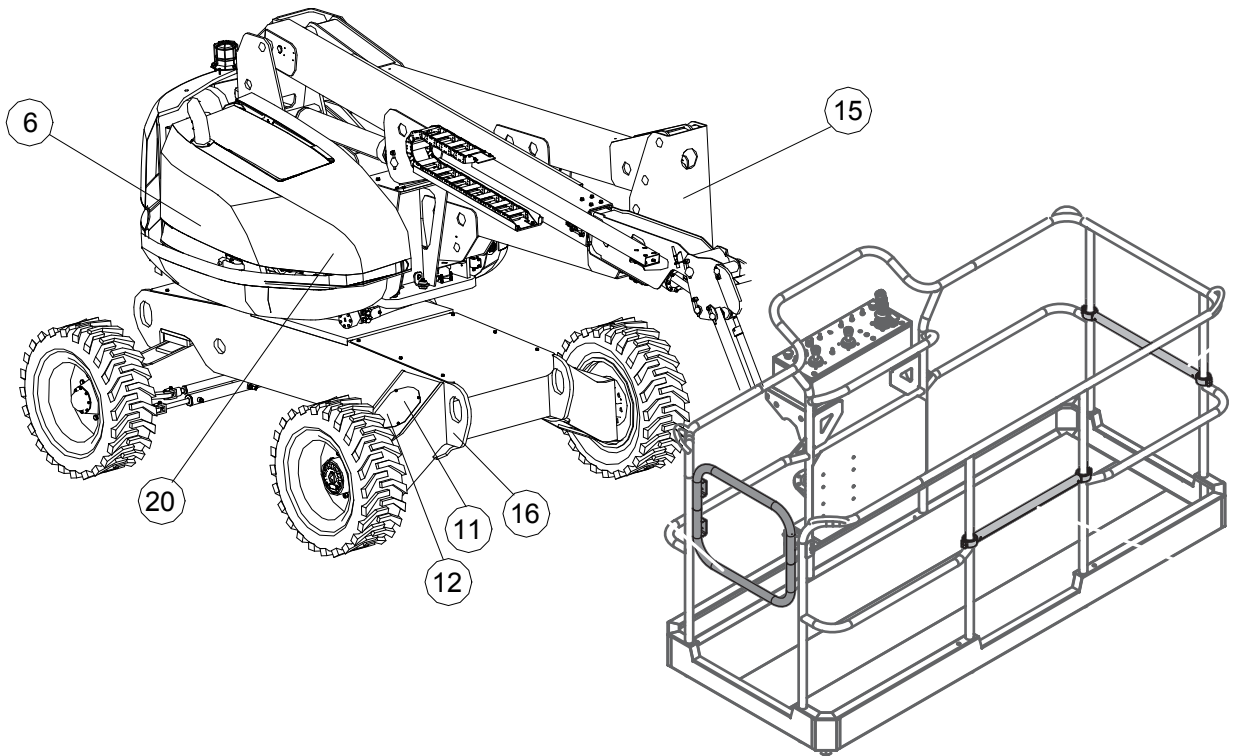
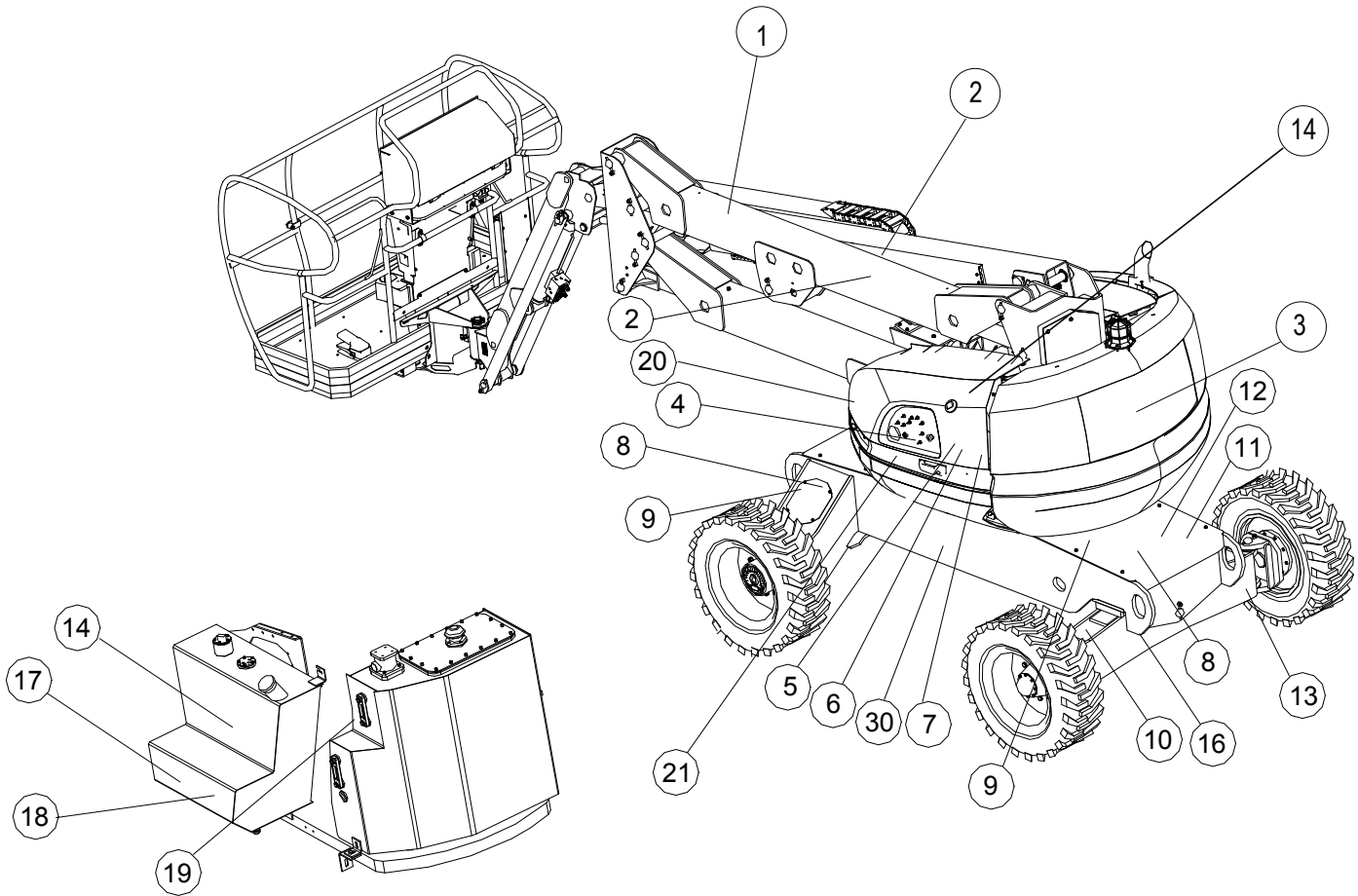
Key: 'Y' Yes/Acceptable
'N' No/Unacceptable
'R' Repaired
'U' Unnecessary/Not Applicable

	Y	N	R	U		Y	N	R	U		Y	N	R	U
Decals:					Base:					Operation:				
Proper Placement/Quantity					Cover Panels Secure					Wires Tight				
Legibility					Base Fasteners Tight					Switches Secure				
Correct Capacity Noted					Bolts Tight					All Functions Operational				
Rails:					Front Axle Mounting (4WD)					Auxiliary Power Operational				
All Rail Fasteners Secure					Front Axle/Front Wheel Assemblies:					Slow Speed Proximity Switch:				
Entry Gate Closes Properly					Wheel Motors-Mounting Secure					Set Properly				
Manual/Safety Data In Box					Wheel Motors-Leaks					Proximity Switches Adjusted				
Platform:					Lug Nuts Torqued Properly					Pressures & Hydraulics:				
Platform Bolts Tight					Steering Cylinder Pins Secure					Oil Filter Secure/Chg				
Platform Structure					Swing Bearing Lubed					Oil Level Correct/Chg				
All Decals Present And Legible					Wheel Assemblies:					Steering Pressure Set				
					Brakes Operational					Drive Pressure Set				
					Wheel Motors-Mounting Secure					Lift Pressure Set				
Wire Harnesses:					Wheel Motors-Leaks					Engine:				
Mounted Correctly					Lug Nuts Torqued Properly					Engine Mounts Tight				
Physical Appearance					Axle Lock Operational					Fuel Lines Secure				
110/220V Outlet Safe/Working					Component Area:					Fuel Lines Free Of Leaks				
Elevating Assembly:					Valve Manifold(s) Secure					Fuel Tanks Secure				
Boom Structures					Hoses Tight/No Leaks					Fuel Shut Off Valves Func.				
Welds					D/C Mtr(s) Secure/Operational					All Shields/Guards In Place				
Retaining Rings					Contactors Secure					Oil Level				
Cylinder Pins Secure					Pump Secure					Oil Filter				
Boom Shimming					Batteries:					Air Filter				
Torque on Slew Ring Bolts					Secure					Operator's Manual Present:				
					Fully Charged					Manual Of Responsibilities Present:				
					Emergency Stop:									
					Breaks All Circuits									

Comments: _____

Signature/Mechanic: _____ Date: _____
 Signature/Owner-User: _____ Date: _____





① 94513 2 Places



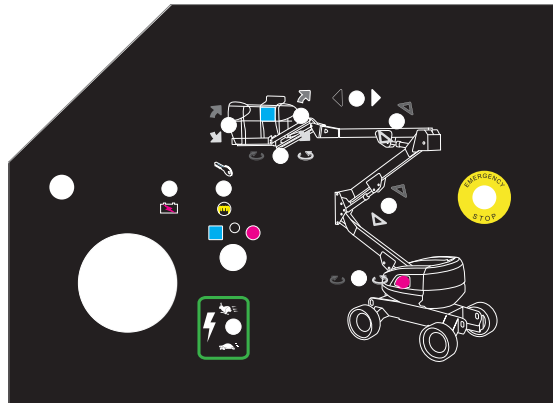
② 94514 2 Places



③ 94520



④ 94560



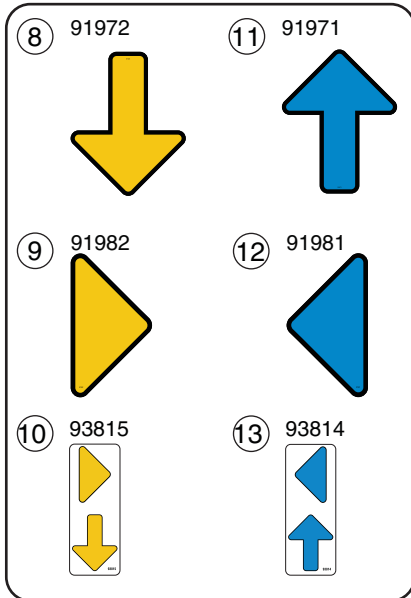
⑤ 93755



⑮ 90719



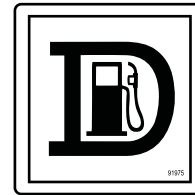
2 places each



⑥ 93801 2 places



⑭ 91975 2 places



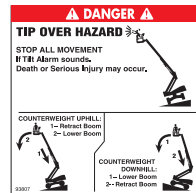
⑳ 93804 2 places



⑲ 92117



⑦ 93807



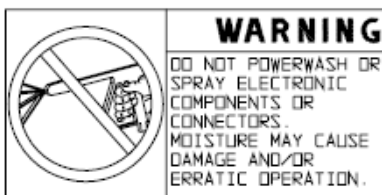
⑯ 91973 8 places



⑰ 93805



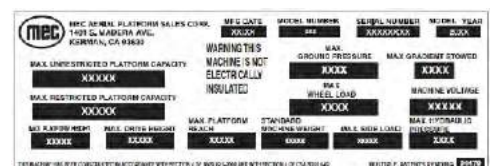
⑱ 90732

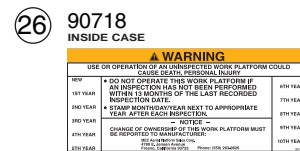
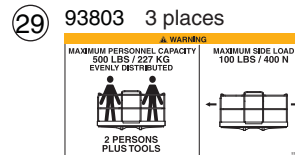
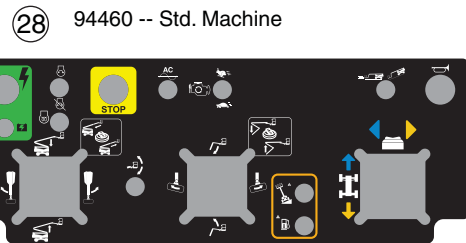
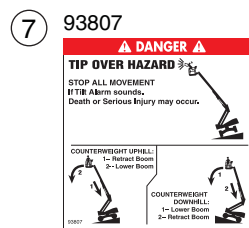
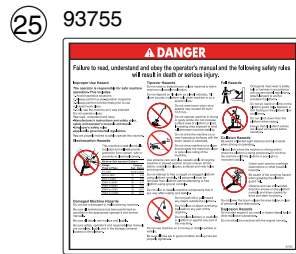
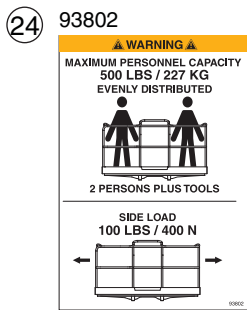
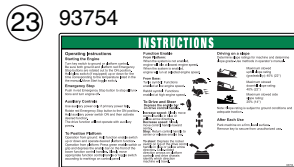
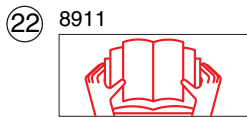
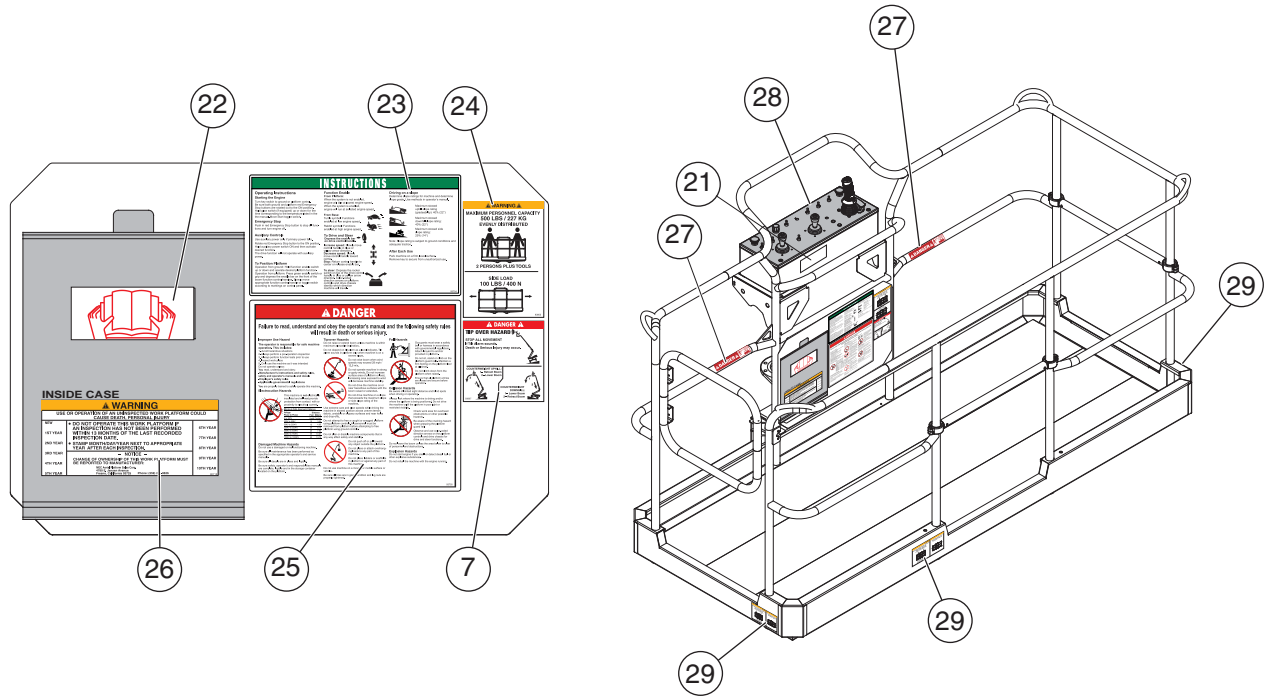


㉑ 90732 2 places



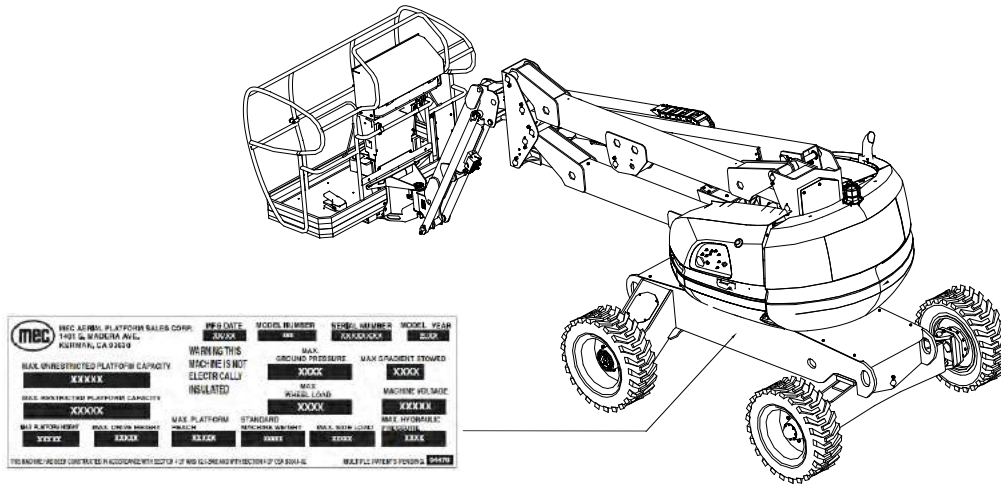
⑳ 94479





Serial Plate Location

The serial plate is attached to the machine at the time of manufacture. Important information about the machine is recorded on the serial plate. The Serial Plate is located on the side of the chassis below the Base Controls.



Serial Plate Description

MFG DATE. Month / Year of manufacture

MODEL NUMBER. Identifies the machine.

SERIAL NUMBER. Identifies a machine with reference to its original owner. Refer to the number when requesting information or ordering parts.

MODEL YEAR. Identifies the model year of the machine.

MAX. PLATFORM UNRESTRICTED CAPACITY. The maximum safe load (material, persons + equipment) which can be correctly placed on the platform within any range of motion.

MAX. HYDRAULIC SYSTEM PRESSURE. The maximum pressure generated by the machine's hydraulic system.

MAX. WHEEL LOAD. The maximum safe weight applied to each wheel. Calculated with all available options installed.

$$Fw = 30\% (Wm + Wc + Wopt)$$

MACHINE VOLTAGE. The electrical voltage at which the machine operates.

MAX. PLATFORM HEIGHT. The maximum attainable height measured from level ground surface to platform floor.

MAX. DRIVE HEIGHT. The maximum safe platform height at which the machine can be driven.

MAX. PLATFORM REACH. The maximum horizontal outreach of the extended boom.

STANDARD MACHINE WEIGHT. The weight of the machine with no options.

MAX. GROUND PRESSURE. The amount of pressure exerted on the surface at each wheel. Calculated with all available options installed.

$$Pmax = 30\% (Wm + Wc + Wopt) / \text{Contact Area}$$

MAX. SIDE LOAD. The maximum safe force that the occupant can exert laterally on an object outside the platform.

Transport and Lifting Instructions

Safety Information



This section is provided for reference and does not supersede any government or company policy regarding the loading, transport or lifting of MEC machinery.

Truck drivers are responsible for loading and securing machines, and should be properly trained and authorized to operate MEC machinery. Drivers are also responsible for selecting the correct and appropriate trailer according to government regulations and company policy. Drivers must ensure that the vehicle and chains are strong enough to hold the weight of the machine (see the serial number plate for machine weight).

ONLY properly trained and qualified operators shall load and unload this machine.

Loading

Free-wheel configuration for Winching or Towing.



RUNAWAY HAZARD!

After releasing the brakes there is nothing to stop machine travel. Machine will roll freely on slopes. ALWAYS chock the wheels before manually releasing the brakes.

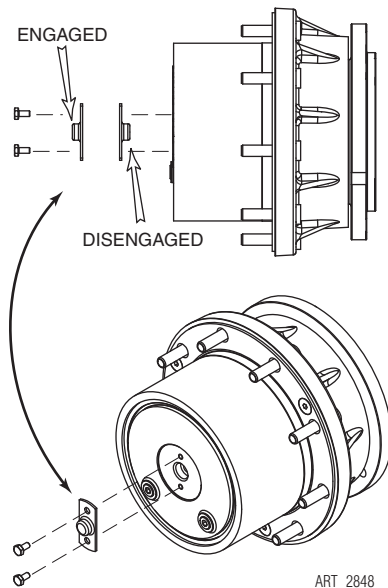
The machine can be winched or towed short distances at speeds not to exceed 5 MPH (8 km/h). Before towing or winching the machine, it is necessary to release the brakes. Reset the brakes after towing or winching.

Disengage Brakes before Towing or Winching

- Chock the wheels.
- Remove the Torque Engage Cap and reinstall with the bump facing inward on all four (4) hubs.

Engage Brakes before Driving

- Remove the Torque Engage Cap and reinstall with the bump facing outward on all four (4) hubs.



Driving or Winching onto or off of a Transport Vehicle

Before loading the machine, orient the turntable so that the platform is over the non-steering wheels so that the steering wheels are at the front.

WARNING

ONLY properly trained and qualified operators shall load and unload this machine. Read and understand all safety, control, and operating information found on the machine and in this manual before operating the machine. Whether winching or driving the machine on to a truck or trailer, always check the area for dangerous situations before moving the machine. If driving the machine, always use a second person acting as a spotter to make sure the person loading the machine avoids dangerous situations.

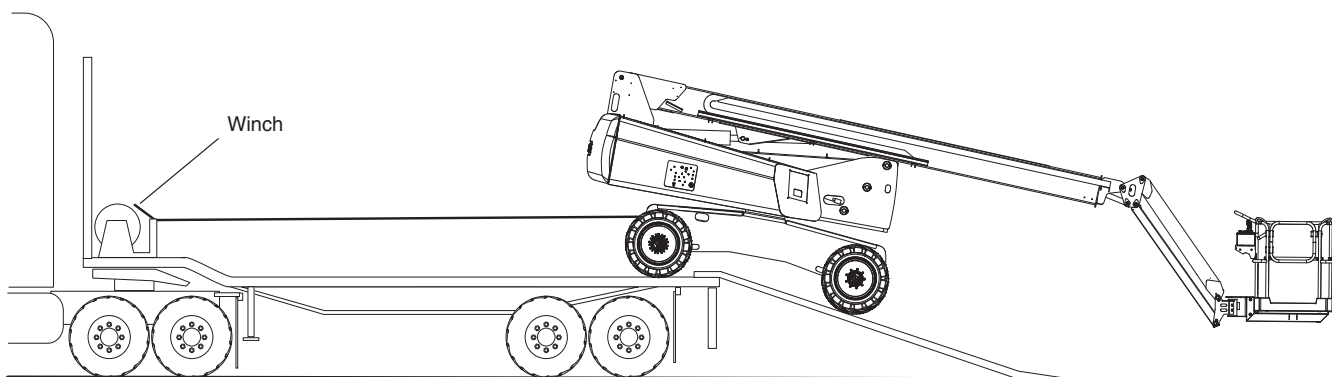
Driving

- Turn the Base Key Switch to PLATFORM. Check that the Emergency Stop Switch is reset by turning it clockwise.
- Enter the platform and reset the Platform Emergency Stop Switch.
- Test platform control functions.
- Raise the jib slightly for platform ground clearance.
- Carefully drive the machine off or on to the transport vehicle.
- Make sure you can see the second person giving guidance.

Note: The brakes are automatically released for driving and will automatically apply when the control lever is returned to neutral which causes the machine to stop.

Winching

- Chock the wheels, then disengage brakes (see *Disengage Brakes before Towing or Winching* on page 41).
- Carefully operate the winch to lower the machine down the ramp or pull the machine up the ramp.
- Chock the wheels and engage the brakes before disengaging the winch.



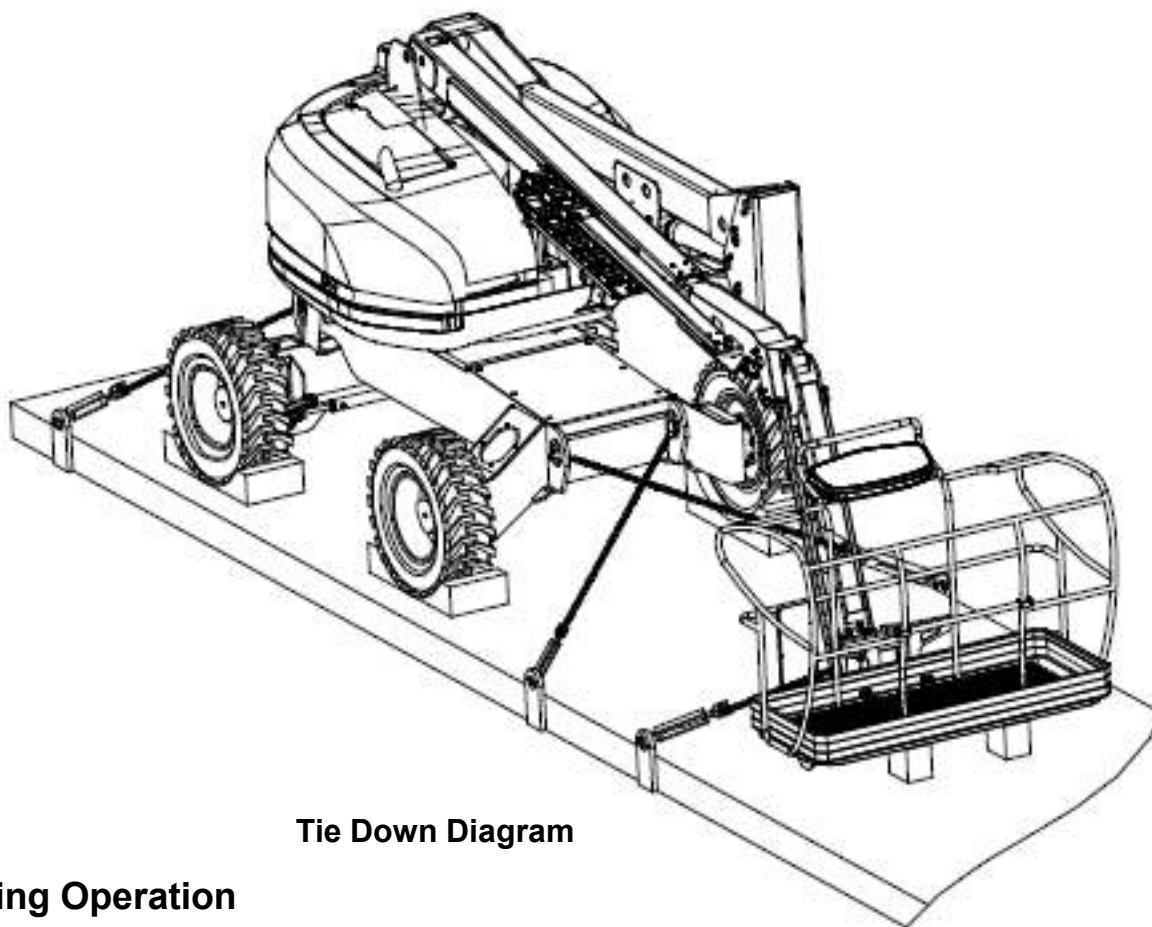
ART_4741

Tie Down Operation

NOTICE

WHEN TRANSPORTING MACHINE, BOOM MUST BE IN THE STOWED MODE AND MACHINE SECURELY TIED DOWN TO TRUCK OR TRAILER DECK. FOUR TIE DOWN EYES ARE PROVIDED IN THE FRAME SLAB, ONE AT EACH CORNER OF THE MACHINE.

- 1) Place the boom in the stowed position.
- 2) Remove all loose items from the machine.
- 3) Secure the chassis and the platform using straps or chains of adequate strength.



Tie Down Diagram

Towing Operation

⚠ WARNING

RUNAWAY VEHICLE/MACHINE HAZARD. MACHINE HAS NO TOWING BRAKES. TOWING VEHICLE MUST BE ABLE TO CONTROL MACHINE AT ALL TIMES. ON-HIGHWAY TOWING NOT PERMITTED. FAILURE TO FOLLOW INSTRUCTIONS COULD CAUSE SERIOUS INJURY OR DEATH.

Lifting and Tie Down

Lifting Operation

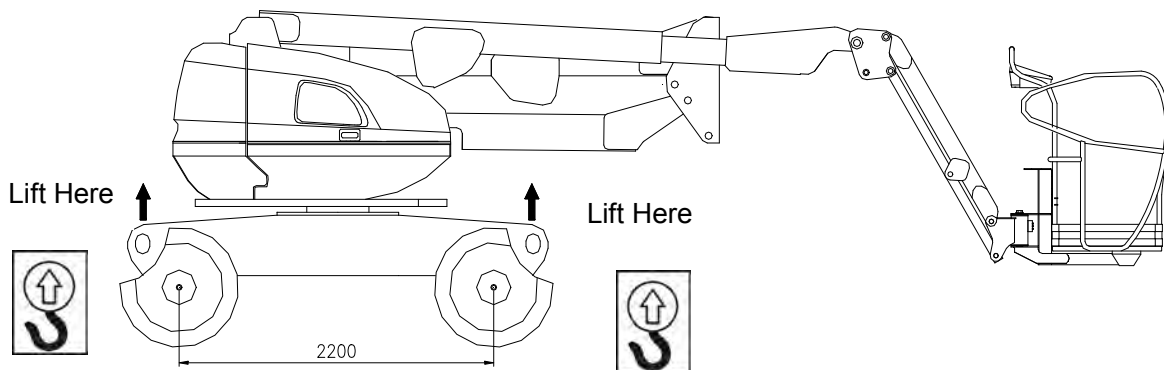
- 1) Refer to the Serial Number Tag, to make sure the Gross Vehicle Weight.
- 2) Place the boom in the stowed position.
- 3) Remove all loose items from the machine.
- 4) Properly adjust the rigging to prevent damage to the machine and so the machine remains level.

If it becomes necessary to lift the machine using an overhead or mobile crane, it is very important that the lifting devices are attached only to the designated lifting eyes. (See Figure) Lifting

Diagram

NOTICE

LIFTING EYES ARE PROVIDED AT THE FRONT AND REAR IN THE FRAME SLAB. EACH OF THE FOUR CHAINS OR SLINGS USED FOR LIFTING MACHINE MUST BE ADJUSTED INDIVIDUALLY SO MACHINE REMAINS LEVEL WHEN ELEVATED.



Lifting Diagram



Limited Owner Warranty

MEC Aerial Platform Sales Corp. warrants its equipment to the original purchaser against defects in material and/or workmanship under normal use and service for one (1) year from date of registered sale or date the unit left the factory if not registered. MEC Aerial Platform Sales Corp. further warrants the structural weldments of the main frame and scissor arms to be free from defects in material or workmanship for five (5) years from date of registered sale or date unit left the factory if not registered. Excluded from such warranty is the battery(s) which carries a ninety (90) day warranty from described purchase date. Warranty claims within such warranty period shall be limited to repair or replacement, MEC Aerial Platform Sales Corp's option, of the defective part in question and labor to perform the necessary repair or replacement based on MEC Aerial Platform Sales Corp's then current flat rate, provided the defective part in question is shipped prepaid to MEC Aerial Platform Sales Corp. and is found upon inspection by MEC Aerial Platform Sales Corp. to be defective in material and/or workmanship. MEC Aerial Platform Sales Corp. shall not be liable for any consequential, incidental or contingent damages whatsoever. Use of other than factory authorized parts; misuse, improper maintenance, or modification of the equipment voids this warranty. The foregoing warranty is exclusive and in lieu of all other warranties, express or implied. All such other warranties, including implied warranties of merchantability and of fitness for a particular purpose, are hereby excluded. No Dealer, Sales Representative, or other person purporting to act on behalf of MEC Aerial Platform Sales Corp. is authorized to alter the terms of this warranty, or in any manner assume on behalf of MEC Aerial Platform Sales Corp. any liability or obligation which exceeds MEC Aerial Platform Sales Corp's obligations under this warranty.



MEC Aerial Platform Sales Corp.

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