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SUCCESS OF INNOVATECH'S QUALITY IMPROVEMENT PROGRAM.

INSTRUCTION MANUAL

Innovatech™

Terminator® T-2200Pro Propane Powered Floor Scraper

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Introduction

The Terminator® Carpet and Tile Removal Machine is intended for use on large demolition and asbestos abatement projects as well as smaller floor covering removal jobs. Designed and built by experienced floor covering demolition and installation experts, the machine incorporates several design features that are essential for efficient operation:

- Tricycle wheelbase and short turning radius allows for better turning ability – especially in narrow spaces.
- Blade vertical and tilt position adjustments allow for positioning the angle of the blade for each application.
- Ballast in front and rear provides extra traction needed for tile and glue removal.
- Built-in forklift transport slots allows for easy loading and unloading at job sites.
- Variable displacement hydraulic control for a very smooth start and stop.

If operated and cared for as instructed in this Manual, the Terminator® provides trouble-free, safe, and efficient performance.

About This Manual

This Manual contains the information and procedures to assist you to operate and maintain the Terminator® machine safely and correctly. Read this Manual before you operate or service the equipment. If you need additional information or assistance, please get in touch with our Customer Service Department:

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Everett, WA 98203 USA
(425) 402-1881 or 800-267-6682
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NOTE: Throughout this Manual directional instructions (left, right, up, down, push, pull, etc.) are given from the point of view of the operator performing the action.

Important Safety Instructions



WARNING: THE TERMINATOR T-2200PRO CAN PRODUCE CARBON MONOXIDE WHILE THE ENGINE IS RUNNING. PROVIDE ADEQUATE VENTILATION WHEN OPERATING THE TERMINATOR T-2200PRO IN AN ENCLOSED BUILDING. READ ALL INSTRUCTIONS

Safety Instructions for All Tools

- **KEEP GUARDS IN PLACE** and in working order.
- **REMOVE ADJUSTING TOOLS AND WRENCHES.** Form habit of checking to see that keys and adjusting wrenches are removed from the Terminator® before turning tool on.
- **KEEP WORK AREA CLEAN.** Cluttered areas invite accidents.
- **KEEP CHILDREN AWAY.** All visitors should be kept a safe distance from the work area.
- **WEAR PROPPER APPAREL.** No loose clothing, gloves, neckties, rings, bracelets or other jewelry to get caught in moving parts. Non-slip footwear is recommended. Wear protective hair covering to contain long hair.
- **ALWAYS WEAR SAFETY GLASSES.** Also use a face or dust mask if operating in a dusty environment. All users and bystanders must wear eye protection that conforms to ANSI Z87.1. (CAN/CSA Z94.3)
- **MAINTAIN EQUIPMENT WITH CARE.** Keep equipment clean for best and safest performance. Follow instructions for lubrication and changing accessories.
- **DISCONNECT BATTERY** before servicing.
- **REDUCE THE RISK OF UNINTENTIONAL STARTING.** Make sure handles are centered and the engine throttle control is at the lowest setting.
- **USE RECOMMENDED ACCESSORIES.** Consult the instruction manual for recommended accessories. The use of improper accessories may cause risk of injury to persons.
- **NEVER STAND ON TOOL.** Serious injury could occur if the machine is tipped or rocked.
- **CHECK DAMAGED PARTS.** Before further use of the tool, a guard or other part that is damaged should be carefully checked to determine that it will operate properly and perform its intended function—check for alignment of moving parts, binding of moving parts, breakage of parts, mounting and any other conditions that may affect its operation. A guard or other part that is damaged should be properly repaired or replaced. Do not use tool if switch does not turn it on and off.
- **NEVER LEAVE EQUIPMENT RUNNING UNATTENDED. TURN POWER OFF.** Don't leave equipment until it comes to a complete stop.
- **DO NOT OPERATE ELECTRIC TOOLS NEAR FLAMABLE LIQUIDS OR GASSES OR EXPLOSIVE ATMOSPHERES.** Motors in these tools may spark and ignite fumes.
- **ALWAYS WEAR A HARD HAT.** Wear head protection to protect the head from flying debris. All personnel in the work area, including the operator, must always wear a hard hat when operating the machine.
- **ALWAYS PROVIDE PROPER VENTILATION.** Ventilation is required when using the Terminator T-2200PRO. Positive or negative pressure ventilators must be used in any enclosed space where the machine is to be used. Use Carbon Monoxide (CO) monitoring when the machine is used in doors. The Carbon Monoxide generated by propane engines can be hazardous to your health if proper ventilation is not provided.

Additional Safety Rules for Riding Floor Scrapers

⚠ CAUTION: FAILURE TO HEED THESE WARNINGS MAY RESULT IN SERIOUS PERSONAL INJURY OR DEATH AND SERIOUS DAMAGE TO THE TERMINATOR®.

The Terminator® is to be operated only by qualified, trained personnel.

DON'T attempt to operate the Terminator® if you are not thoroughly familiar with the operation of the Terminator®.

DON'T operate the Terminator® unless every guard, warning notice or sign is in place.

DON'T use the Terminator® on roofs or floors not designed to carry the weight of the machine. The Terminator weighs 2,780 lbs.

DON'T attempt to operate on anything but the designated voltage.

DON'T operate unless blade clamps are tight.

DON'T wedge anything against the motor fan to hold motor shaft.

DON'T operate equipment without guards in place.

DON'T operate the Terminator® near an open flame or smoking materials

DON'T operate the the Terminator® while under the influence of drugs, alcohol or medication.

DON'T engage in horseplay on or near the Terminator®

DON'T stand directly behind or in front of the the Terminator® when power is enabled.

DON'T lift the hood, inspect the blade, or otherwise service or maintain the Terminator® while power is enabled.

DON'T operate the Terminator® if the top cover is open.

DON'T overreach. Keep proper footing and balance at all times.

DON'T run the machine into piles of debris, as this may cause the machine to become unstable and tip over.

DON'T sit on or stand next to, under or around the Terminator® when it is being transported in a moving vehicle, whether by itself or with other equipment.

DON'T attempt to use the Terminator® on a non-horizontal surface or turn the Terminator® around on a ramp or hill.

DON'T put your hands or feet in the blade area when the Terminator® is running.

DO turn the power off when not in use.

DO use personal safety equipment such as steel toe shoes, safety glasses, gloves, and ear plugs.

DO use gloves when changing blades and removal tools. Tools may be hot and cause burns.

DO familiarize yourself with all safety features and controls before each use.

DO use the Terminator® only for the purpose for which it was designed. Attempting to alter the Terminator® will invalidate applicable warranties and possibly damage the machine.

DO reduce speed next to walls, machinery and other objects.

DO pre-survey the floor for cracks, ditches, trenches, electrical outlets or bolts, which could catch the blade of the machine.

DO use the seat belt on the machine.

DO operate the Terminator at a safe speed.

General Operating Instructions for the Terminator®

- The Terminator® is designed to remove carpet, tile and glue residue from floors.
- When removing product, position removed product so it rolls to the side of the machine or have someone on the side of the machine remove the product. NEVER WALK IN FRONT OF OR BEHIND THE TERMINATOR® WHILE IT IS RUNNING.
- Sharpen blades or dice material into narrower widths if machine slows down or seems to be struggling.
- Do not use the Terminator® within one foot of walls or stationary objects. Damage to objects may occur if the Terminator® strikes them.
- Use safe, OSHA approved tools and methods for sharpening blades.
- Make sure the Terminator® has a charged fire extinguisher, working back up beacon and strobe light before operating.

Safety Features

The Terminator® is equipped with several features to help ensure your safety and the safety of workers around you.

Warning Light and Back-Up Beacon

An amber light is installed on the top rear section of the hood. When the Terminator's® ignition is in the ON position, the warning light will flash. When the drive control is set in REVERSE, the back-up beacon sounds to warn people nearby that the machine is backing up.

Fire Extinguisher

A fire extinguisher with gauge is installed on the hood behind the operator's seat, within the operator's reach. As a safety measure, regularly inspect the gauge and recharge the fire extinguisher as needed to maintain full capacity. Always recharge the extinguisher after each use.

Auto-stop

The Terminator® has two drive levers located to the right and left of the operator seat. The drive levers control the forward, reverse, left, and right directions of the machine; the blade height slider module raises and lowers the blade. You must push (forward) or pull (reverse) and hold the levers in position to drive the machine in the direction desired. Additionally there are dead man levers on the front of each joystick and an operator presence switch in the seat. When you release both dead man levers or get off the seat the Terminator® automatically STOPS and will not move again until you push/pull and hold the levers again and sit in the seat. However, these safety features are not meant as brakes. Block wheels with a floor block when stopping on a ramp and use the emergency brake. Without the emergency brake the machine may roll forward or backwards on any sloping surface.

Emergency Battery Disconnect

Under the hood at the front of the engine is a battery disconnect. This disconnect will remove power from the motor and other electronic components. Warning! Removing power from the Terminator® while on a hill or ramp can lead to a dangerous rollaway situation. Always engage the parking brake before disconnecting power.

Safety Instructions

The Terminator® is designed for safe operation by trained, designated personnel. To help ensure your safety as a designated operator, read these safety instructions before you operate the equipment. Regardless of your experience with machinery, the Terminator® has unique features and systems which you need to know about and understand before you operate or service the machine.

Terminator® Specifications

Element	English	Metric
Length	63.5"	1613 mm
Width	26.5"	673 mm
Height	52"	1321mm
Weight*	2355 Lbs	1068 Kg
Tires	15" OD x 8" W	381 mm OD x 203 mm W
Engine Type	Kubota WG1605-L-E3	
Motor Power (SAE J1995)	55 HP @ 3600 RPM	41 kW @ 3600 RPM
Max Torque (SAE J1349)	86.3 Lb-Ft @ 2400 RPM	117 N•m @ 2400 RPM
Engine Oil	SAE 10W or SAE 10W-30	
Engine Oil Capacity	1.59 Gal	6.0L
Coolant Capacity	1.07 Gal	4.0L
Motor Operating Speed	1000-3600 RPM	
Hydraulic Oil Type	ISO 46	
Hydraulic Oil Capacity	11 Gal	41.6 L
Hydraulic Relief Valve Pressure	1800 PSI	12.4 MPa

*Weight includes the base machine and 4 Rear Weights, 3 Front Weights and 2 Wheel Weights.

Tools & Supplies

Maintenance tools and supplies are not provided with the machine. You are responsible for purchase of these items. The following are suggested items to have on the job site.

- | | |
|---|---|
| <ol style="list-style-type: none"> 1. 4" or 7" Grinder 2. 10"-15" Crescent Wrench 3. 16-20 oz. Hammer 4. 3/8" or 1/2" Socket Set 5. Grease Gun | <ol style="list-style-type: none"> 6. WD 40 7. 3/4 Open End and Box Wrench 8. Screw Driver Set 9. Safety Glasses 10. Ear Plugs |
|---|---|

Ventilation Requirements

The Terminator® engine, like all combustion engines, relies on the combustion of fuel and oxygen to produce power. While most of the exhaust produced is in the form of water vapor and carbon dioxide the engine can produce harmful carbon monoxide. CARBON MONOXIDE (CO) IS A COLORLESS, ODORLESS, HIGHLY POISONOUS GAS THAT IS HARMFUL AND IN SUFFICIENT CONCENTRATIONS MAY CAUSE ILLNESS OR DEATH. **Never** run the Terminator in enclosed areas without sufficient ventilation. Additionally, running the Terminator in a confined area can deplete the oxygen in the area and lead to suffocation.

Guards, Warning Notices & Signs

The guards, warning notices and signs are placed on the Terminator® for your protection. If one of them becomes damaged or is lost, contact our Customer Service Department to order a replacement.

Service Instructions & Personnel

Like other machinery, the Terminator® requires regular inspection and maintenance of the batteries, motor, hydraulic system and other parts. To prolong the safe and efficient operating life of the machine, clean and service it as instructed in the Maintenance section of this manual.

Always use trained personnel to service the equipment. **Never** allow anyone to service the equipment that has not been specifically trained to do so.

If you need help with a service or maintenance problem, contact our Customer Service Department.

Replacement Parts & Materials

The Terminator® is designed and engineered to operate safely and efficiently with the parts and materials installed on it in our

factory. To ensure the continued safe and efficient operation of the equipment, use replacement parts and materials that meet both of the following requirements:

- Innovatech must solely authorize replacement parts and materials.
- Replacement parts and materials must be identical to the items originally provided with the machine, except as authorized by Innovatech.

Never use “equivalent” or substitute parts, except as expressly authorized by Innovatech.

If you fail to adhere to these instructions, you may cause injury to yourself and/or others, cause damage to the Terminator®, and invalidate applicable warranties.

If you are in doubt about any replacement parts or materials, call our Customer Service Department at 1-800-267-6682 for assistance.

Uncrating The Terminator® And Preparing It For Operation

When you receive the Terminator®, inspect the outside of the crate completely, to detect damage to the crate itself. If it is damaged, notify the carrier immediately and follow his/her instructions to file a claim.

Carefully uncrate the machine and inspect it for damage that may have occurred during shipping. If the shipment is damaged, notify the carrier immediately and file a claim in the normal manner.

Check packing slip for complete shipment. If shipment is incomplete, notify our Customer Service Department within 24 hours.

Remove the crate debris, set aside the blades and other packages, and prepare the Terminator® for operation:

DO NOT MOVE THE TERMINATOR® MACHINE WITH THE LID OPEN!

To remove the TERMINATOR® from crate with a forklift:

1) Forklift Slots have been provided on the sides of the Terminator® for moving the terminator with a forklift.

To remove the TERMINATOR® from crate without a forklift:

- 1) Turn the Battery Disconnect to the “On” position.
- 2) Take 2 x 4’s off the edge of the crate and between the wheels.
- 3) Place 2 x 4’s behind the crate of the rear of the machine.
- 4) Make a ramp with the 2 x 4’s and the crate material.
- 5) To start the TERMINATOR®, turn the key.
- 6) Lift front wheel off of the crate 5 inches by using the blade adjustment slider on the Joystick. (Front blade holder will be on crate).
- 7) Pull back the left and right handles evenly. The machine will start moving slowly backwards.
- 8) Ensure that both rear wheels come off the crate evenly. Failure to back off evenly could result in the machine tipping over and harm to the operator.
- 9) As machine moves back, ensure that the center wheel clears the crate. If center wheel does not clear the crate adjust the blade holder until the wheel clears the crate.
- 10) Once machine is on the ramp, slide all the way to the bottom, then lift jaw up and set center wheel down to the ground.

Loading/Unloading Procedures:

- Do not load or unload the Terminator® on uneven ground.
- Ensure ramps into moving vehicles are stable and square to the ground.
- Always turn the Terminator® OFF when you transport the Terminator® by forklift or other vehicle.
- Load and unload the machine with a properly weighted forklift or lift-gate.
- Make sure all safety stops are installed on a lift-gate before loading or unloading.
- Never position yourself under or around the machine while moving it with other machinery.
- Park the machine with the blade completely down after loading.
- Properly secure the machine with chains, tire chocks, and other necessary tie downs.
- Never ride in a moving vehicle next to a Terminator®. It may tip, causing severe injury.

Operator Controls

The operator controls consist of the key switch, drive levers, and blade height slider module, and throttle slider module.

Drive And Blade Controls

The drive controls are located to the left and right of the operator seat. The drive levers (left and right) control the direction of rotation of the rear wheels. The blade height slider module controls the vertical position of the blade. The throttle slider module controls the RPM of the engine.

From the view of the seated operator:

Push the left and right levers forward **together** and hold them in position to move the machine forward.

Pull the left and right levers back **together** to move the machine in reverse. (The alarm sounds.)

Push only the left lever forward to turn the machine to the right.

Push only the right lever forward to turn the machine to the left.

To adjust the blade down, push and hold blade slider forward. To adjust the blade up, pull and hold the blade switch back.

Auto Stop

When you release the drive levers or the blade height slider module the motor continues to run but the drive or blade motion automatically stops and will not start again until you push or pull the levers again.

Operator Presence Switch and Safety Grips

The Terminator T-2200PRO is equipped with an operator presence switch and trigger switches on the under side of the left and right grips. The operator must be seated on the operator seat and hold either of the safety switches to operate the machine. The wheel hydraulics will not function without an operator and one of the switches being held.

Warning: The Terminator T-2200PRO will stop abruptly if both trigger switches are released or if the operator tries to leave the seat while the machine is moving.

Emergency Brake

The Terminator® is supplied with an emergency brake to prevent an intended movement when left unattended. The brake handle is located to the left of the operator seat. Pull the handle up to engage the brake, push the handle down to release the brake. To increase tension on the brake you can rotate the end of the handle in a clockwise direction. Rotate the end of the handle counter clockwise to reduce the tension.

Carbon Monoxide Warning

IMPORTANT!

Carbon Monoxide – What Service Personnel Should Know!

OSHA Requirement

The CO level shall not exceed 35 ppm measured over an 8-hour period in the work environment.

How does parts per million (ppm) relate to percentage numbers?

One million parts per million equals one hundred percent of the engines exhaust gases.

- 10% CO EQUALS 100,000 PPM
- 1% CO EQUALS 10,000 PPM
- .1% CO EQUALS 1,000 PPM
- .01% CO EQUALS 100 PPM

For each one one-hundredth of one percent, you will have 100 ppm.

Example: $.01\% \times 1,000,000 \text{ ppm CO} = 100 \text{ ppm CO}$.

With adequate ventilation and following the enclosed adjustment instructions, you should be able to keep the carbon monoxide level below the OSHA requirement.

We strongly recommend the use of a carbon monoxide analyzer.

Displays and Indicators

Tachometer and Information Display

The tachometer shows the current RPM. The information display shows the instantaneous readings of selected engine sensors. In addition, the information display can show any active error codes from the engine control unit (ECU).

Malfunction Indicator Light

The Malfunction Indicator Light (MIL) will illuminate when the engine is running out of specification. The illumination of the MIL will typically be accompanied by an error code. The error codes can be accessed and displayed on the information display.

Hydraulic Filter Clog Indicator

The hydraulic oil filter is equipped with a clog indicator which will illuminate when the hydraulic oil filter is clogged. (Note: The indicator may also inadvertently come on in cases when the hydraulic oil is very cold, the light will stop illuminating once the hydraulic oils has warmed to normal operating temperature.)

Blade Assembly

Blades are available in different configurations and thickness. An assortment of blades is included in the purchase price of the Terminator®. Extra blades are available upon request from Innovatech Products & Equipment Co., Inc.

Installing a Blade

- 1.) Raise the blade assembly to maximum up position, which is five inches off the floor.
- 2.) Unwrap the pre-sharpened blades and select the blade thickness and length you need for the job.
- 3.) Loosen the 7 holding bolts.
- 4.) Insert the sharpened blade.
- 5.) Tighten bolts firmly, starting from the center and working out. Bolts should be snug but not over tightened.

Taking Up Floor Coverings

- 1.) Insert blade. (As explained above)
- 2.) Lower blade to floor. Lift caster wheel off the floor ¼ inch. Use previous procedures to drive forward.
- 3.) As the Terminator® is removing flooring material, it is recommended to have another person at the side of the machine remove all debris.

Ballast

The Terminator® is equipped with weights in front (30 pounds each) and rear (75 pounds each) to provide traction for tough jobs. These weights can be removed to reduce traction for certain jobs, and to transport the Terminator® by forklift or truck or elevator. Wear gloves when handling these weights. Use caution to not smash toes and fingers. Use OSHA approved lifting technique.

Tricycle Or Caster Wheelbase And Tires

The tricycle wheelbase allows better turning ability. The wheel bearings on the front caster roller require lubrication with grease every 30 hours of machine operation. There are three fittings, two on the wheel and one on the housing. When running over debris such as carpet, the carpet yarn will get caught between the wheel and the housing. Clean out wheel and housing regularly.

The rear tires are solid rubber, tubeless, and require no maintenance. Over time, they may wear out and need to be replaced. Before each job, inspect the rear tires and lug bolts. Tighten the lug bolts as needed to 70 foot-pounds torque. It is important to keep the lug bolts tight.

Wheel hub should be tightened from 310 to 350 ft.-lb. Inspect and re-torque every 60 hours of operation. Lift machine off of floor so no weight is on wheel when re-torquing pack nut.

OSHA FACT SHEETS

CARBON MONOXIDE POISONING

U.S. Department of Labor
Program Highlights
Fact Sheet No. OSHA 92-11

What Is Carbon Monoxide?

Carbon monoxide -- a colorless, odorless, tasteless gas -- is one of the most common industrial hazards. Mild poisoning can cause such symptoms as nausea, dizziness, or headaches while severe poisoning can result in brain or heart damage or even death. The incomplete burning of any material containing carbon, such as gasoline, natural gas, oil, propane, coal, or wood, produces this poisonous gas. Forges, blast furnaces and coke ovens all produce carbon monoxide, but one of the most common sources of exposure in the workplace is the internal combustion engine.

Be suspicious of carbon monoxide poisoning if you develop headache, flushed face, dizziness, or weakness. Bear in mind that although carbon monoxide has no telltale odor, it may mix with gases that do have an odor. Thus, the smell of other gases does not mean the absence of carbon monoxide.

Are You Likely To Be Poisoned?

If you have a heart condition, your condition may be aggravated by carbon monoxide. Ingestion of barbiturates and alcohol may increase the gas health effects. Further, smokers will have a higher carboxyhemoglobin than nonsmokers have, and therefore face higher risk from carbon monoxide exposures on the job.

Harmful levels of carbon monoxide are a potential danger to: acetylene workers, blast furnace workers, boiler room workers,

brewery workers, carbon black makers, coke oven workers, customs workers, diesel engine operators, dock workers, garage mechanics, metal oxide reducers, miners, organic chemical synthesizers, petroleum refinery workers, pulp and paper workers, steel workers, toll booth and tunnel attendants, and warehouse workers.

How Does Carbon Monoxide Harm You?

Large amounts of carbon monoxide can kill in minutes. The more carbon monoxide in the air and the longer you are exposed to it, the greater the danger. Any one or more of the following symptoms can signal carbon monoxide poisoning: headaches, tightness across the chest, nausea, drowsiness, inattention, or fatigue. As the amount of carbon monoxide in the air increases, symptoms that are more serious may develop such as lack of coordination, weakness, and confusion.

The poisoning can be reversed if caught in time. However, even if you recover, acute poisoning may result in permanent damage to the parts of your body that require a lot of oxygen, such as the heart and brain. There is a significant reproductive risk involved with carbon monoxide. An American Journal of Industrial Medicine article quotes two studies showing that acute carbon monoxide exposures that were non-lethal to the mother were associated with fetal loss.

What Can You Do About Carbon Monoxide?

If you suspect carbon monoxide, get out of the area and into the open fresh air. Remove anyone overcome by the gas immediately and give the person artificial respiration. Call for a doctor and continue the artificial respiration until the doctor arrives or the person recovers. Prompt action can make the difference between life and death.

Suggestions to Prevent Carbon Monoxide Poisoning

Employers

1. Install an effective ventilation system to remove poisonous carbon monoxide from the area.
2. Maintain appliances and equipment in good order, adjusting flames, burners, and drafts to reduce the formation of carbon monoxide.
3. Consider switching from fossil fuel-powered equipment to battery-powered machinery when possible.
4. Provide approved respirators for emergency use. Regular respirators (negative pressure) will not work in this atmosphere. If necessary, provide an independent air supply to workers.
5. Install carbon monoxide monitors or regularly test air in areas when carbon monoxide is generated or used.
6. Provide pre-placement and periodic medical examinations for workers who may be exposed to carbon monoxide. If possible, transfer affected workers to other jobs.
7. Instruct workers in the hazards of carbon monoxide and train them in the proper use of respirators.

Workers

1. Report to your employer any condition that might make carbon monoxide form or accumulate.
2. Be alert to ventilation problems, especially in enclosed areas where gases of burning fuels may be released.
3. Report complaints early. Do not overexert yourself if you suspect carbon monoxide poisoning. Physical activity increases the body's need for oxygen and thus increases the danger of poisoning.
4. In you get sick, do not forget to tell you doctor about the possibility of exposure to carbon monoxide.
5. Think carefully about your smoking habits. Tobacco, when burned, releases carbon monoxide, which reduces the oxygen-carrying ability of the blood, even before any industrial exposure is added.

What Are The Federal Standards?

The Occupational Safety and Health Administration (OSHA) standard for exposure to carbon monoxide prohibits workers' exposure to more than 35 parts of the gas per million parts of air (ppm), averaged over an 8-hour workday. There is also a ceiling limit of 200 ppm (as measured over a 15-minute period.)
* This is one of a series of fact sheets highlighting U.S. Department of Labor programs. It is intended as a general description only and does not carry the force of legal opinion.

Propane Safety

Liquid petroleum gas (propane) is flammable and potentially explosive. ALWAYS obey proper handling, lighting, and ventilating procedures provided by the manufacturer. In addition, obey the safety warnings and procedures below, which are provided to supplement, not replace, or substitute for the manufacturer's instructions.

NOTE: All new propane tanks must be purged before use.

Precautions and Warnings

Wear insulated gloves when you handle propane tanks.

Do not attempt to adjust the pressure regulator because the manufacturer sets it. Only a qualified liquid petroleum gas service technician should make any required adjustments.

Inspect the fuel lines and connectors before each job or at the beginning of the day, to detect any leaks or potential problems. NEVER check for propane leaks with an open flame.

NEVER use ammoniated household-type detergents to detect leaks or to clean any portion of the fuel system or the tank. These substances can cause cracks on brass fittings and on the fuel line. If the leak cannot be located, take the tank to a certified liquid petroleum gas service representative.

NEVER store or carry propane containers in a closed space or inside your passenger vehicle. Propane containers are equipped with safety devices that relieve excessive pressure by discharging gas to the atmosphere and leaks can occur at the fittings or connectors.

NEVER fill a tank more than 80% of capacity. Overfilling can

cause uncontrolled gas flow, which in turn, can cause fire and/or explosion.

What to Do If You Smell Gas

1. Immediately extinguish any open flames, pilot lights and all smoking materials.
2. Turn the engine OFF; do not touch any electrical switches or other device that may produce sparks.
3. Shut OFF the fuel flow switch.
4. Open all doors and windows to allow maximum ventilation.
5. Leave the area until the odor clears.
6. Inspect the fuel lines and connectors to determine the source of the leak. Correct the problem before you use the Terminator T-2200PRO again.

Maintenance Schedule

Procedure / Hours	Every 8 Hours (daily)	Every 50 Hours (weekly)	Every 100 Hours	Every 200 Hours	Every 1000 Hours	Every 2000 Hours	Yearly	Each 2 Years
Check Hydraulic Oil Level	•							
Change Hydraulic Oil Filter		(initially)		•				
Change Hydraulic Oil					•			
Check Brake Pad Wear			•					
Adjust Emergency Brake as needed	•							
Replace Brake Pads (as needed)							•	
Re-torque Wheel Lugs		•						
Re-torque Pack Nuts		•						
Adjust Wheel Scrapers		•						
Grease Caster Wheel		•						
Check Engine Oil/Replenish	•							
Change Engine Oil		(Initially)	•					
Clean Spark Plug and Adjust if Necessary			•					
Replace Spark Plug						•		
Check Air Cleaner	•							
Clean Air Cleaner			•					
Replace Air Cleaner^					•			
Replace Intake Pipe/Clamp Bands								•
Check Fuel Filter			•					
Replace Fuel Filter			As needed					
Fuel Line Clamps/Hoses	•							
Check for Fuel Leakage		•						
Replace LPG Hoses								•

Procedure / Hours	Every 8 Hours (daily)	Every 50 Hours (weekly)	Every 100 Hours	Every 200 Hours	Every 1000 Hours	Every 2000 Hours	Yearly	Every 2 Years
Change Breather Tube								•
Check PCV Valve					•			
Check LPG Vaporizer Regulator					•			
Change LPG Vaporizer Water Hoses								•
Check LPG Vaporizer Regulator Inner Parts*								•
LPG Lockoff Valve					•		•	
Check Radiator Coolant	•							
Change Radiator Coolant								•
Check Radiator Hoses and Clamp Bands				•				
Change Radiator Hoses and Clamp Bands								•
Clean Radiator and Water Jacket							•	
Check Fan Belt Tension			•					
Adjust Fan Belt Tension			As needed					
Adjust Valve Clearance *					•			

^ Change more often when operating under dusty conditions.

*If you do not have the proper tools and/or are not mechanically proficient, contact your local dealer.

Warranty

Innovatech warrants to the original buyer, for a period of one (1) year or 300 operating hours (whichever comes first) from the date of delivery, that Equipment is free from defects in materials and workmanship and that the Equipment conforms to the operating specifications supplied with the Equipment. The foregoing warranty is subject to proper operation and maintenance of the Equipment in accordance with the operating instruction and manual supplied to Buyer with the Equipment.

Warranty claims shall be made by Buyer in writing. Innovatech's sole obligation under the foregoing warranty, where it appears to Innovatech's satisfaction that the defect was present at the time of delivery, is at Innovatech's sole option, to repair, replace or correct any such defect.

EXCEPT AS STATED ABOVE THERE ARE NO WARRANTIES, EXPRESS OR IMPLIED. INNOVATECH EXPRESSLY DISCLAIMS ANY WARRANTY, EXPRESS OR IMPLIED, THAT EQUIPMENT SOLD HEREUNDER IS OF MERCHANTABLE QUALITY OR THAT IT CAN BE USED FOR OR IS FIT FOR ANY PARTICULAR PURPOSE. ANY DESCRIPTION OF THE EQUIPMENT IN THIS AGREEMENT OR IN MANUALS, BROCHURES OR LITERATURE AND ANY USE OF ANY SAMPLE, MODEL OR PROTOTYPE OF THE EQUIPMENT IS FOR THE SOLE PURPOSE OF IDENTIFYING OR ILLUSTRATING THE EQUIPMENT, IS NOT PART OF THE BASIS OF THE AGREEMENT BETWEEN INNOVATECH AND BUYER, AND DOES NOT CONSTITUTE A WARRANTY THAT THE EQUIPMENT, AS SUPPLIED, WILL CONFORM TO ANY DESCRIPTION OR TO ANY SAMPLE, MODEL OR PROTOTYPE. INNOVATECH DISCLAIMS ANY WARRANTY RESPECTING OPERATING CAPACITY OR CAPABILITY OF THE EQUIPMENT OR THE ABILITY OF THE EQUIPMENT TO MEET ANY PARTICULAR NEEDS OF THE BUYER. THE EQUIPMENT IS POWERED TO OPERATE AS STATED IN THE OPERATING SPECIFICATIONS SUPPLIED WITH THE EQUIPMENT BUT IT IS UNDERSTOOD AND AGREED TO BUY BUYER THAT ACTUAL OPERATING CAPABILITIES VARY UNDER DIFFERENT OPERATING CONDITIONS FOR WHICH INNOVATECH CAN ASSUME NO RESPONSIBILITY.

BUYER'S EXCLUSIVE REMEDY FOR CLAIMS ARISING UNDER THIS AGREEMENT SHALL BE FOR REPAIR OR, AT INNOVATECH'S SOLE OPTION, REPLACEMENT OF ANY ITEM OF DEFECTIVE EQUIPMENT. INNOVATECH'S LIABILITY FOR ANY LOSSES OR DAMAGE, WHETHER ON ACCOUNT OF NEGLIGENCE, BREACH, WARRANTY OR OTHERWISE SHALL IN NO EVENT EXCEED THE PURCHASE PRICE OF THE PARTICULAR ITEM OF EQUIPMENT WITH RESPECT TO WHICH SUCH LOSSES OR DAMAGE OCCURRED. IN NO EVENT WILL INNOVATECH BE LIABLE FOR ANY DAMAGES CAUSED BY BUYER'S FAILURE TO PERFORM BUYER'S RESPONSIBILITIES, OR FOR ANY LOST PROFITS, LOST PRODUCTION, LOSS OF ANTICIPATED PROFITS OF OTHER INCIDENTAL OR CONSEQUENTIAL DAMAGES, EVEN IF INNOVATECH HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. IN NO EVENT WILL INNOVATECH BE LIABLE FOR ANY DAMAGES RESULTING FROM ANY CLAIM AGAINST BUYER BY ANY OTHER PARTY.

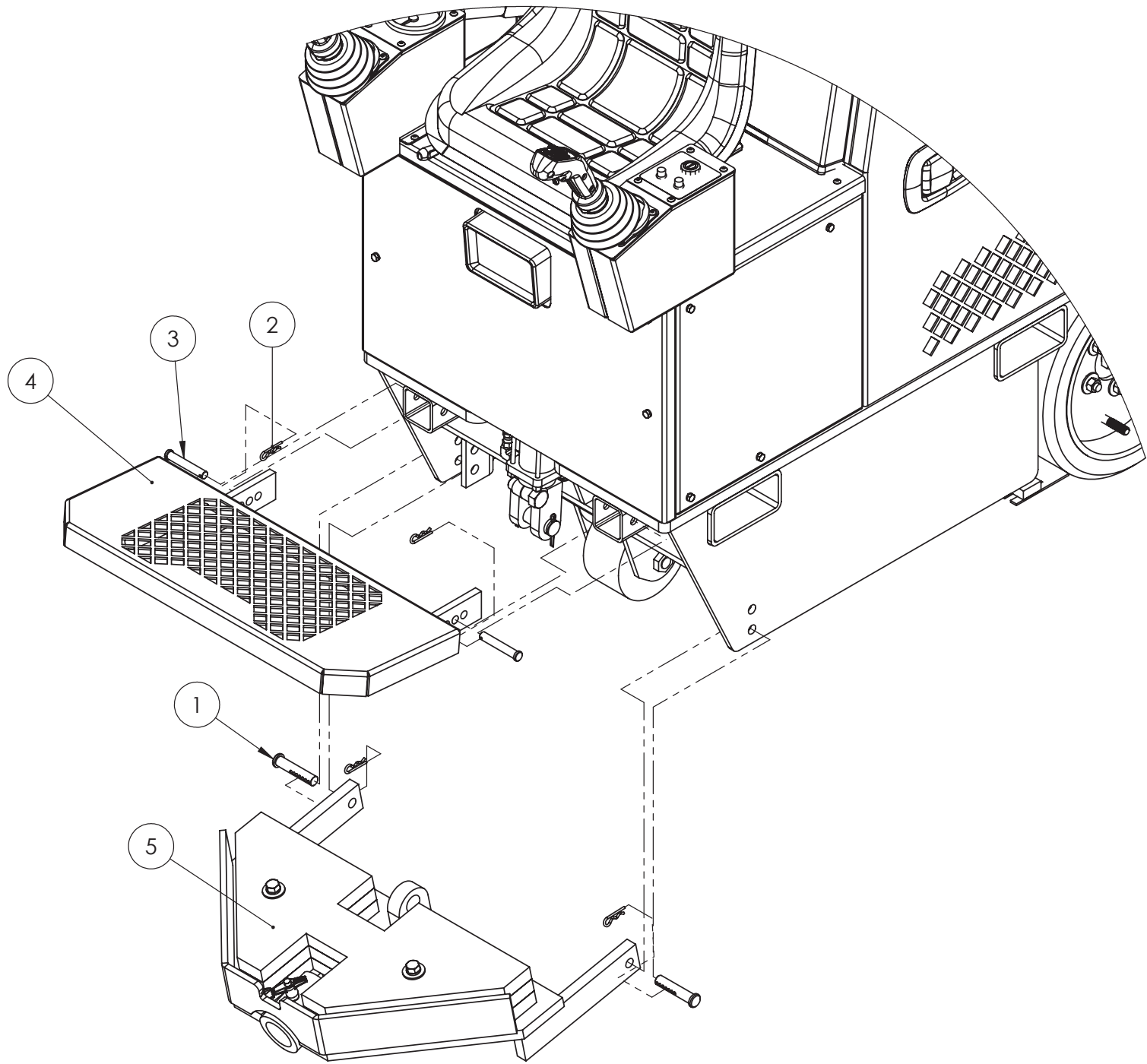
FACTORY SERVICE

A warranty will not be valid unless a written claim authorization comes with returned parts. Innovatech will not provide for any shipping costs for items returned for repair. To obtain warranty repairs, buyer must prepay shipment and return all warranty parts to Innovatech. Damage occurring during shipment is deemed the responsibility of the carrier and claims should be made directly with such carrier.

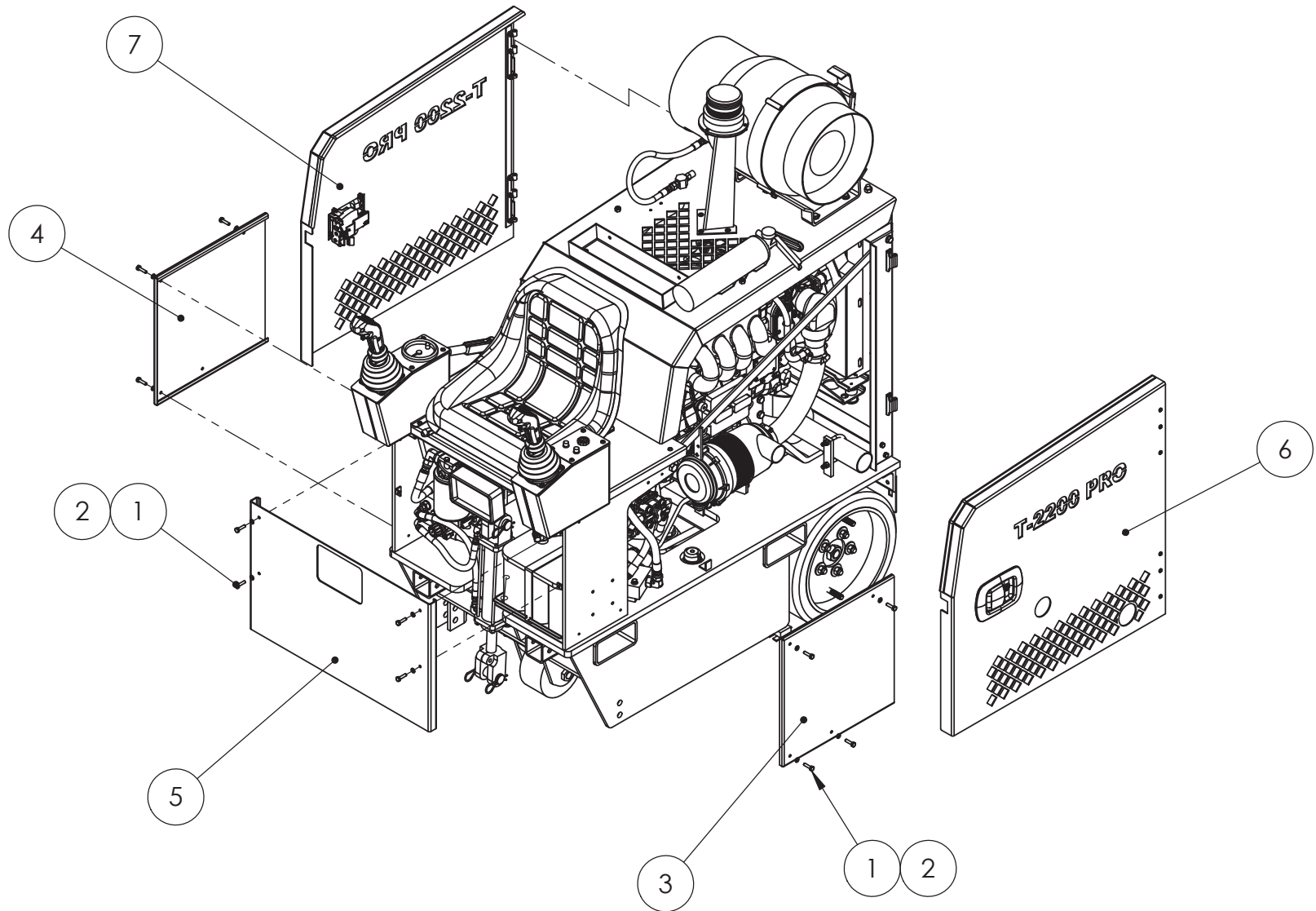
It will be the customer's responsibility to pay for any non-warranty replacement parts plus the current hourly labor rates for any work done on any machine or part. Service is available upon request; call Innovatech for current labor rates.

Parts Diagrams

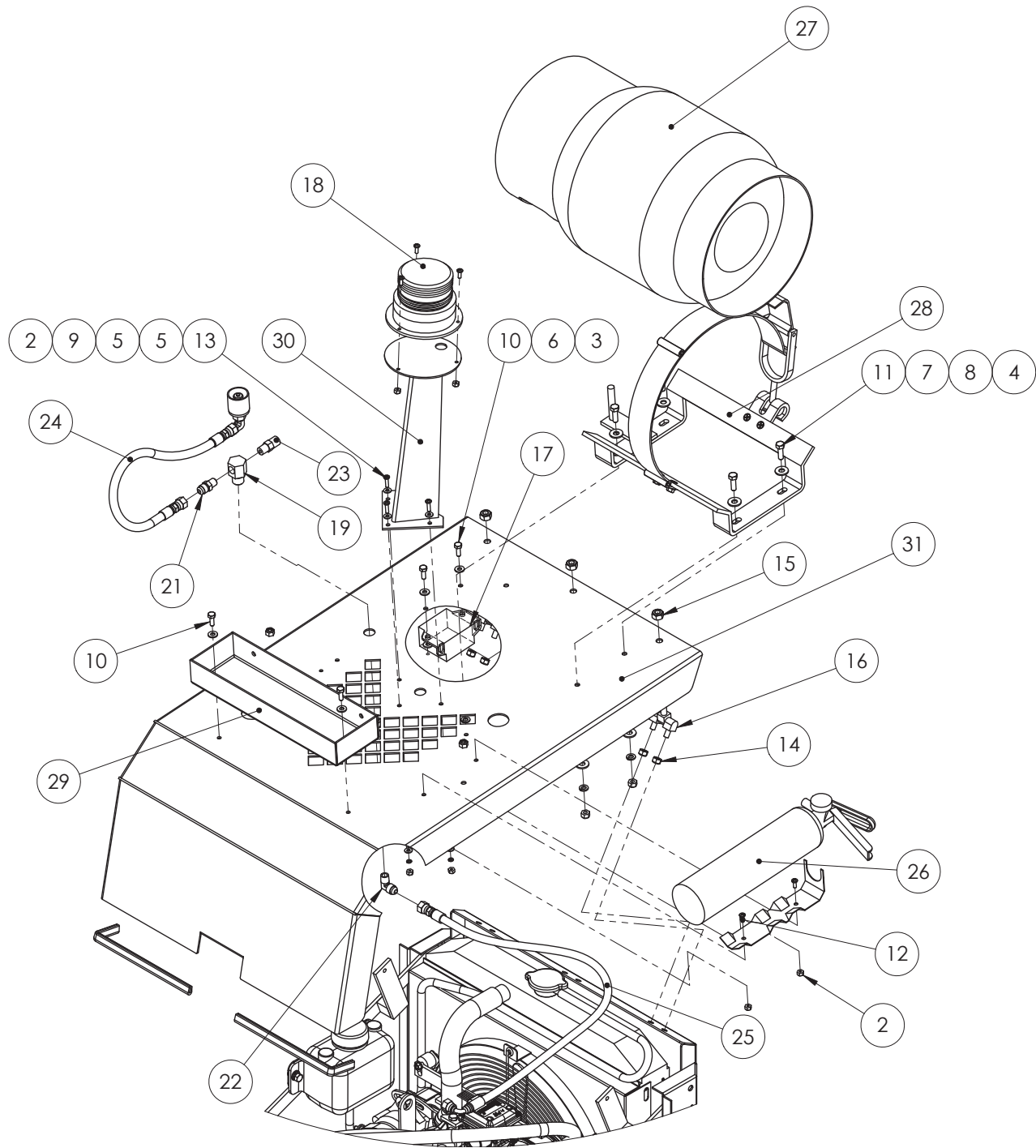
Item No.	Part Number	Description	Qty.
1	11-0045	Adjustable Clevis Pin, 5/8" x 3"L	2
2	11-0052	Hitch Pin, Steel, ZP, Up to 5/8" Dia.	4
3	11-0236	Clevis pin, 1/2 dia. x 3 L	2
4	53-0117	Foot Rest Assembly	1
5	96-0197	T-2100 Pro, Jaw Assembly with Weights	1



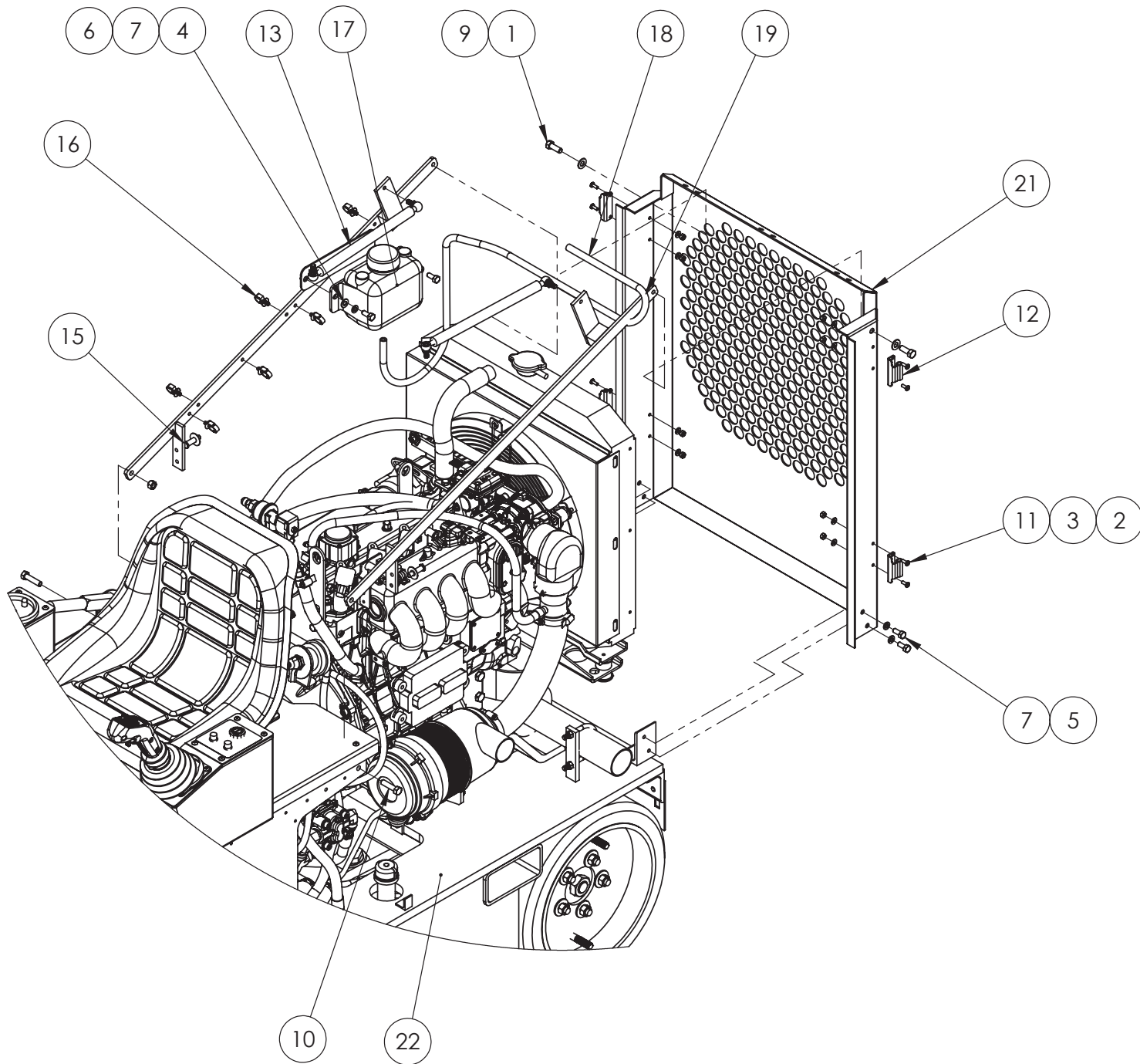
Item No.	Part Number	Description	Qty.
1	11-0059	Alloy Steel Hex Head Cap Screw, GR8, 1/4"-20 x 1" ZP	12
2	11-0069	Steel Split Lock Washer, 1/4"	12
3	53-0135	Console Side Panel, T-2100 Pro, Left, Painted	1
4	53-0136	Console Side Panel, T-2100 Pro, Right, Painted	1
5	53-0138	Console Front Panel, T-2100PRO, Painted	1
6	96-0290	Door Assembly, T-2200Pro, Left	1
7	96-0291	Door Assembly, Right, T-2200 Pro	1



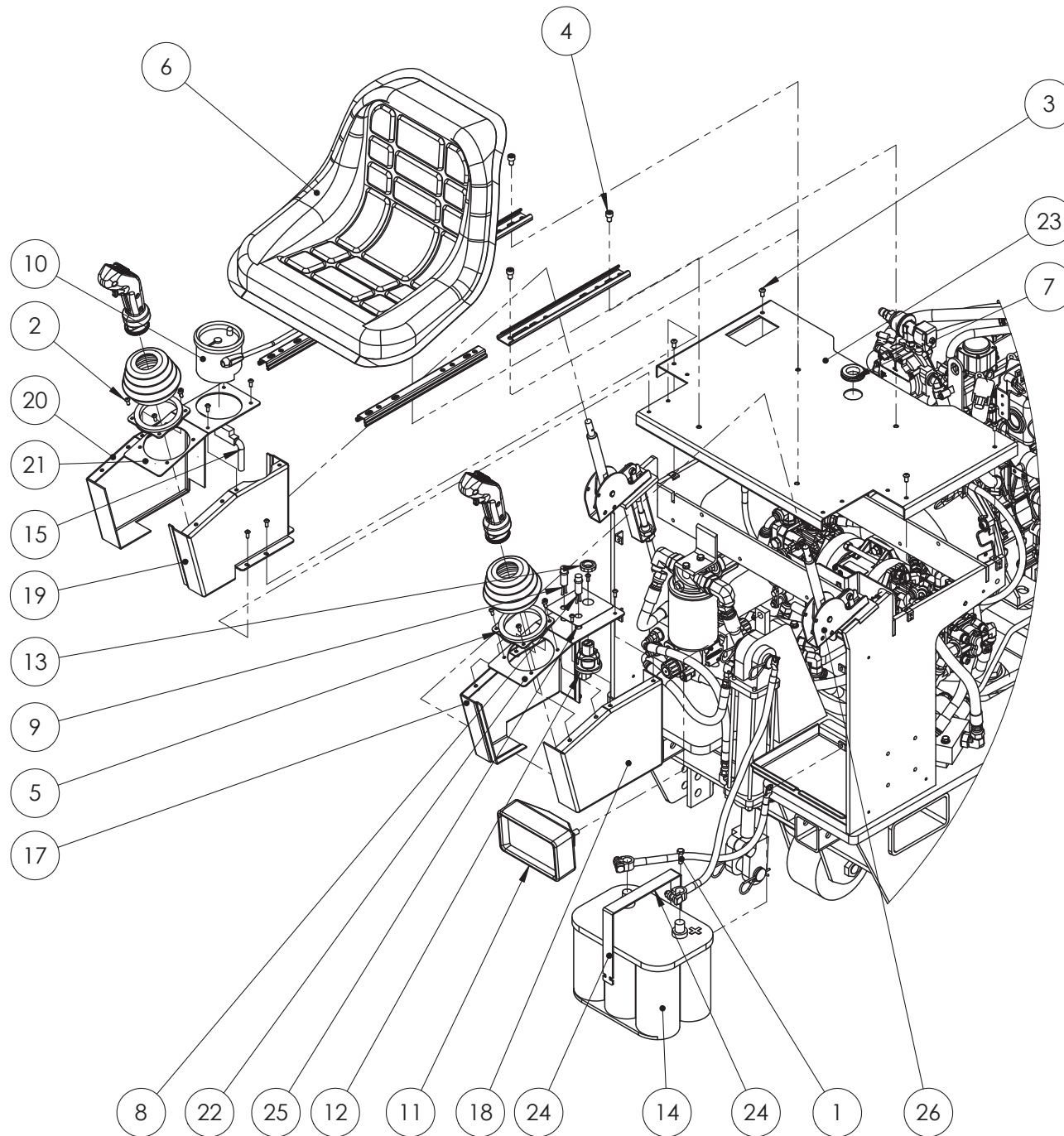
Item No.	Part Number	Description	Qty.
1	03-0008	Edge Trim, Black Neoprene	2
2	11-0023	Steel Nylon-Insert Lock Nut,#10-24, ZP	8
3	11-0024	Steel Nylon-Insert Lock Nut, 1/4"-20 ZP	4
4	11-0025	Steel Nylon-Insert Lock Nut, 5/16"-18	6
5	11-0030	Steel SAE Flat Washer, #10size	6
6	11-0033	Flat Washer, 0.25, ZP	8
7	11-0034	Steel USS Flat Washer, GR2: 5/16"	8
8	11-0040	Split Lock Washer, 5/16"	4
9	11-0072	Steel Split Lock Washer, #10, ZP	3
10	11-0133	Steel Hex Head Cap Screw, Gr5, 1/4"-20 x 3/4"L, ZP	4
11	11-0192	Hex Bolt, 5/16"-18 x 1", GR8, ZP	4
12	11-0250-08	Steel Pan Head Phillips, #10-24 x 1/2"L, ZP	5
13	11-0250-12	Screw, Pan Head Phillips Machine Screw, #10-24x3/4", ZP	3
14	12-0021-08	Nylon Insert Hex Nut, M8 x 1.25, Class 8, ZP	6
15	12-0021-10	Nylon Insert Hex Nut, M10 x 1.5, Class 8, ZP	3
16	13-0234	Hinge	3
17	22-0005	Backup Alarm	1
18	22-0006	Strobe Light	1
19	41-0006	Bulkhead Fitting	1
20	41-0006	Hex Nut Comes with Bulkead Fitting	1
21	41-0014	Brass Pipe Nipple, 1/4"NPT to JIC	1
22	41-0016	Brass 90deg Fitting	1
23	41-0021	Pressure Relief Valve	1
24	41-0026	Fuel Hose, T-2100 Pro	1
25	41-0027	Fuel Hose, Bulkhead to Lock-off	1
26	42-0001	Fire Extinguisher, 2.5lb ABC	1
27	44-0046	Propane Tank, 20#	1
28	44-0047	Propane Tank Bracket	1
29	53-0177	Tool Tray	1
30	53-0077	Strobe Light Bracket, T-2100 Pro	1
31	53-0099	Top Cover, T-2100 Pro, Welded & Painted	1



Item No.	Part Number	Description	Qty.
1	11-0007	Hex Bolt, 3/8"-16 x 1", ZP	2
2	11-0023	Steel Nylon-Insert Lock Nut,#10-24, ZP	8
3	11-0030	Steel SAE Flat Washer, #10 Size	8
4	11-0034	5/16" Steel Flat Washer	2
5	11-0040	Split Lock Washer, 5/16"	4
6	11-0040	Split Lock Washer, 5/16"	2
7	11-0118	Hex Bolt, 5/16"-18 x 3/4", Gr5, ZP	6
8	11-0124	Steel Hex Nut, Gr8 3/8"-16 x 2-1/4", ZP	4
9	11-0126	Steel SAE Flat Washer, 3/8"	2
10	11-0194	Hex Bolt, 3/8"-16 x 1.5", ZP	2
11	11-0250-08	Steel Pan Head Phillips, #10-24 x 1/2"L, ZP	8
12	13-0232	Concealed Hinge	4
13	13-0256	Gas Spring	1
14	13-0256	Gas Spring	1
15	13-0341	Striker Bolt	2
16	13-0374	Snap-In Wire Clip	6
17	43-0196-10	Coolant Overflow Tank	1
18	44-0053-04	High Temperature Hose, 40"L	1
19	53-0314	Support Member	1
20	53-0315	Support Member	1
21	53-0319	T-2200 Pro Rear Cover	1
22	96-0297	T-2200 Pro Engine & Electronic Assembly	1



Item No.	Part Number	Description	Qty.
1	11-0059	Alloy Steel Hex Head Cap Screw, GR8, 1/4"-20 x 1" ZP	1
2	11-0134	Steel Button Head Cap Screw, #10-24 x .5", ZP	22
3	11-0212	Screw, Button Head Socket Cap Screw, 1/4"-20x1/2", 18-8 SS	4
4	12-0023-12	Socket Cap Screw, Metric, Low Head, Class 8.8 Steel, M8 x 1.25 x 12mm	4
5	51-0936	Joystick Boot Adapter	2
6	13-0257	Seat Assembly	1
7	13-0269	Push-In Grommet, 1"ID	1
8	21-0007	Indicator Light, Red	1
9	21-0008	Indicator Light, Amber	1
10	21-0019	4K RPM Tachometer/Information Display	1
11	22-0004	Halogen Head Light	1
12	22-0058	Ignition Switch	1
13	22-0058	Plastic Nut for Ignition Switch	1
14	23-0011	Battery	1
15	24-0175	Wiring Harness, Tach Display	1
16	24-0176	Battery Cable, Negative Jumper	1
17	53-0127	Joystick Cover, Left Inside, Terminator, Painted	1
18	53-0128	Joystick Cover, Left Outside, Terminator, Painted	1
19	53-0129	Joystick Cover, Right Inside, Terminator, Painted	1
20	53-0130	Joystick Cover, Right Outside, Terminator, Painted	1
21	53-0131	Joystick Cover, Right Top, Terminator, Painted	1
22	53-0132	Joystick Cover, Left Top, Terminator, Painted	1
23	53-0137	Console Top Panel, Terminator, Painted	1
24	53-0214	Battery Hold Down Strap	1
25	61-0062	Decal, T-2100Pro Instrument Panel	1
26	96-0140	Joystick Assembly	2



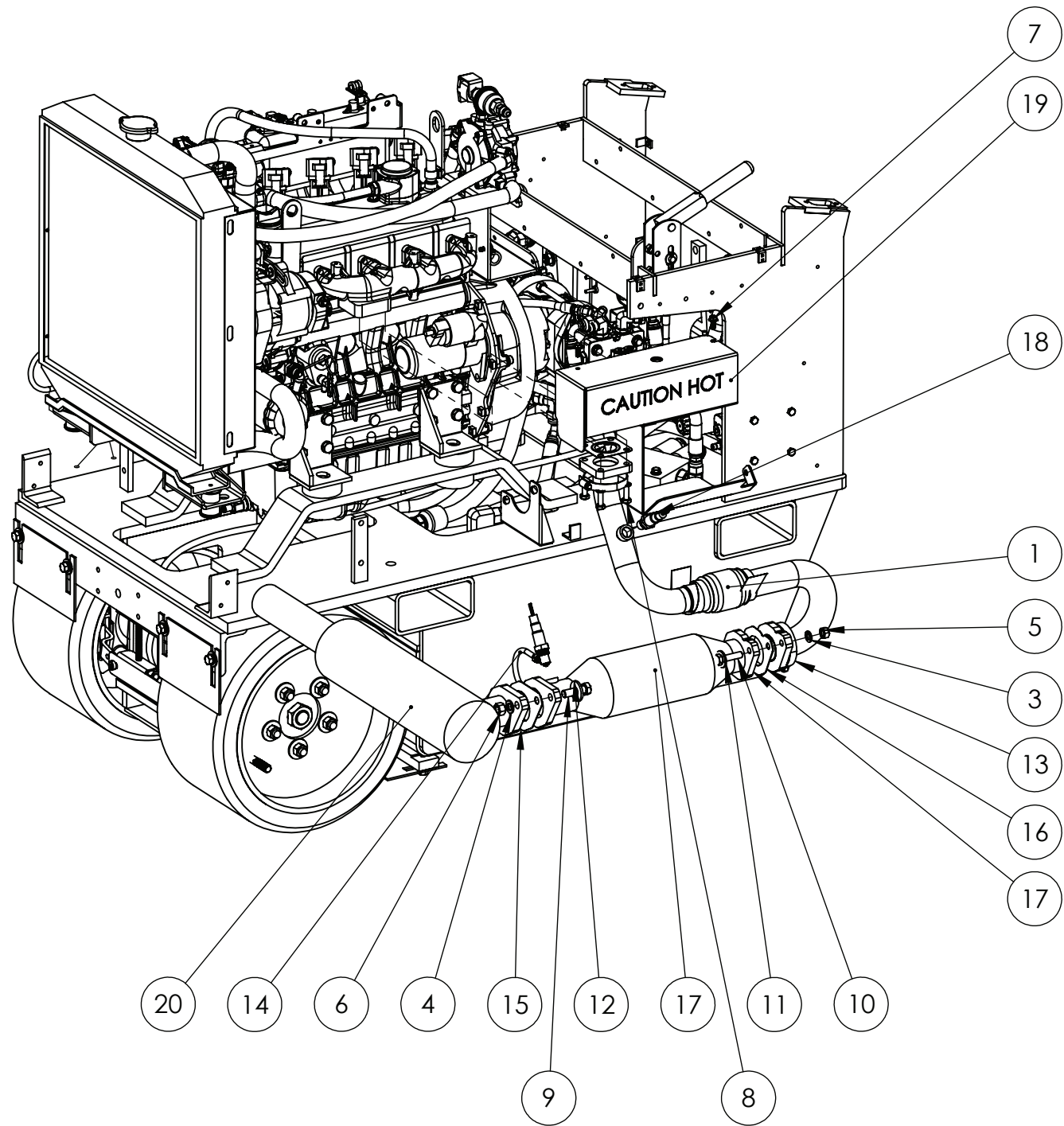
Item No.	Part Number	Description	Qty.
1	03-0030	Exhaust Wrap, 2"W x 20'	1
2	12-0018-08	Split Lock Washer, 8mm, ZP	4
3	12-0018-10	Split Lock Washer, 10mm, ZP	2
4	12-0018-12	Split Lock Washer, 12mm, ZP	2
5	12-0027-10	Metric Hex Nut, Steel, M10 x 1.5, ZP	2
6	12-0027-12	Metric Hex Nut, Steel, M12 x 1.75, ZP	2
7	12-0032-16	Metric Hex cap screw, M8 x 1.25 x 16mm, Steel, ZP	2
8~	12-0032-25	Steel Hex Head Cap Screw, GR8.8: M8-1.25mmX16mm, ZP	4
9#	12-0033-40	Steel Hex Head Cap Screw, M12 x 1.75, 40mm L, GR8.8, ZP	2
10^	12-0034-40	Steel Hex Head Cap Screw, M10 x 1.5, 40mm, GR8.8, ZP	2
11	12-0035-10	Plain washer, Steel, 10 mm, Regular	2
12	12-0035-12	Plain Washer, Steel, 10mm, Regular	2
13	13-0274	2.5" Hose Clamp	2
14	13-0340	Steel U-Bolt, 5/16"-18 x 1" Thread Length, for 2-1/2" OD, ZP	2
15	43-0188	Exhaust Gasket, 2 Bolt, 110mm Bolt Spacing	1
16	43-0189	Exhaust Gasket, 2 Bolt, 92mm Bolt Spacing	1
17	43-0191	Catalytic Converter	1
18'	43-0192	Heated O2 Sensor	2
19	52-0191	Exhaust Manifold Heat Shield	1
20	53-0312	T-2200 Muffler Assembly	1
21	53-0332	Exhaust Pipe Pre-Cat Section, T-2200 Pro	1

* Tightening Torque: 29.5 - 44.3 ft-lb (40.0 - 60.0 N*m)

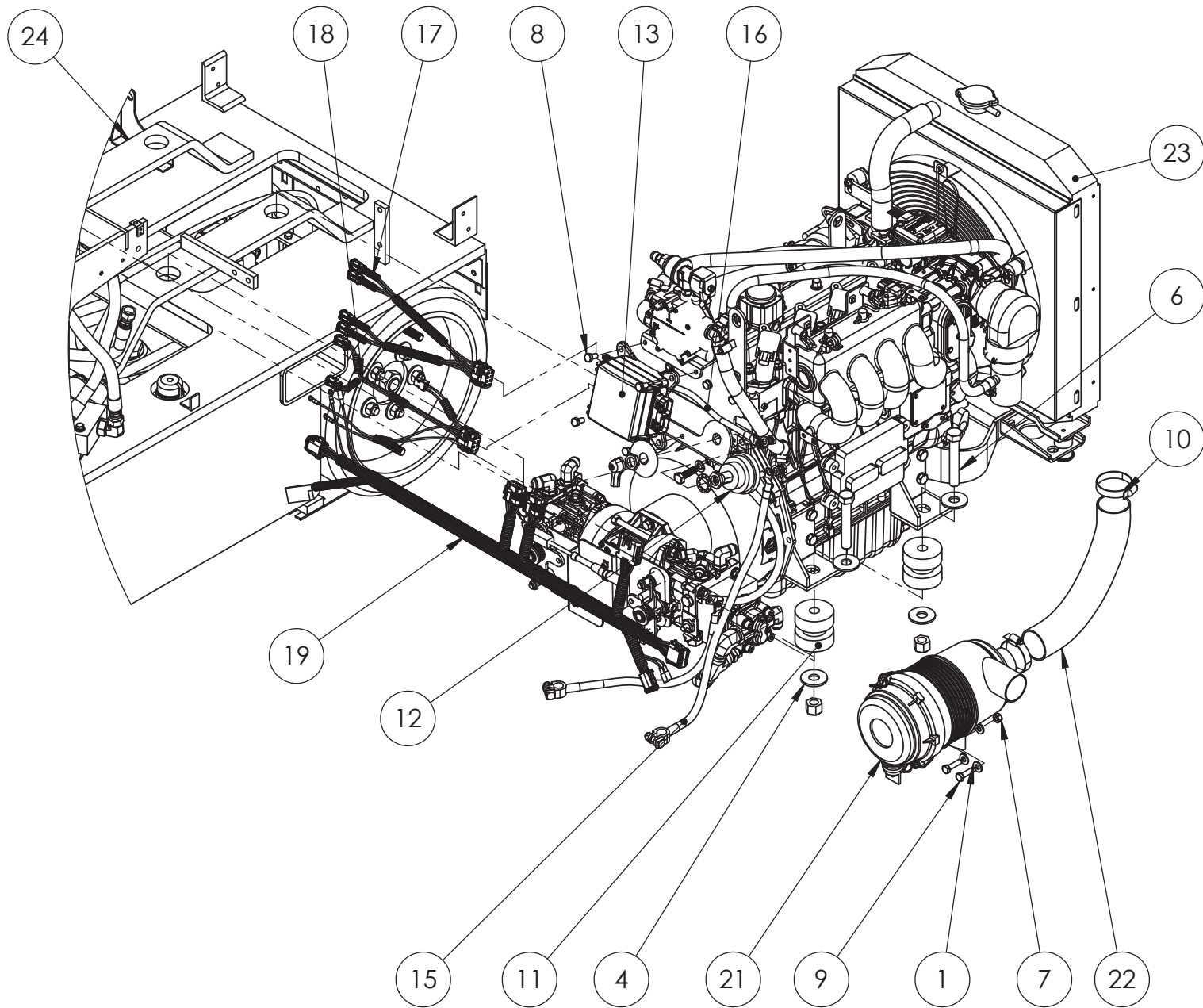
~ Tightening Torque: 21.7 - 25.2 ft-lb (29.4 - 34.3 N*m)

^ Tightening Torque: 35.5 - 41.2 ft-lb (48.1 - 55.9 N*m)

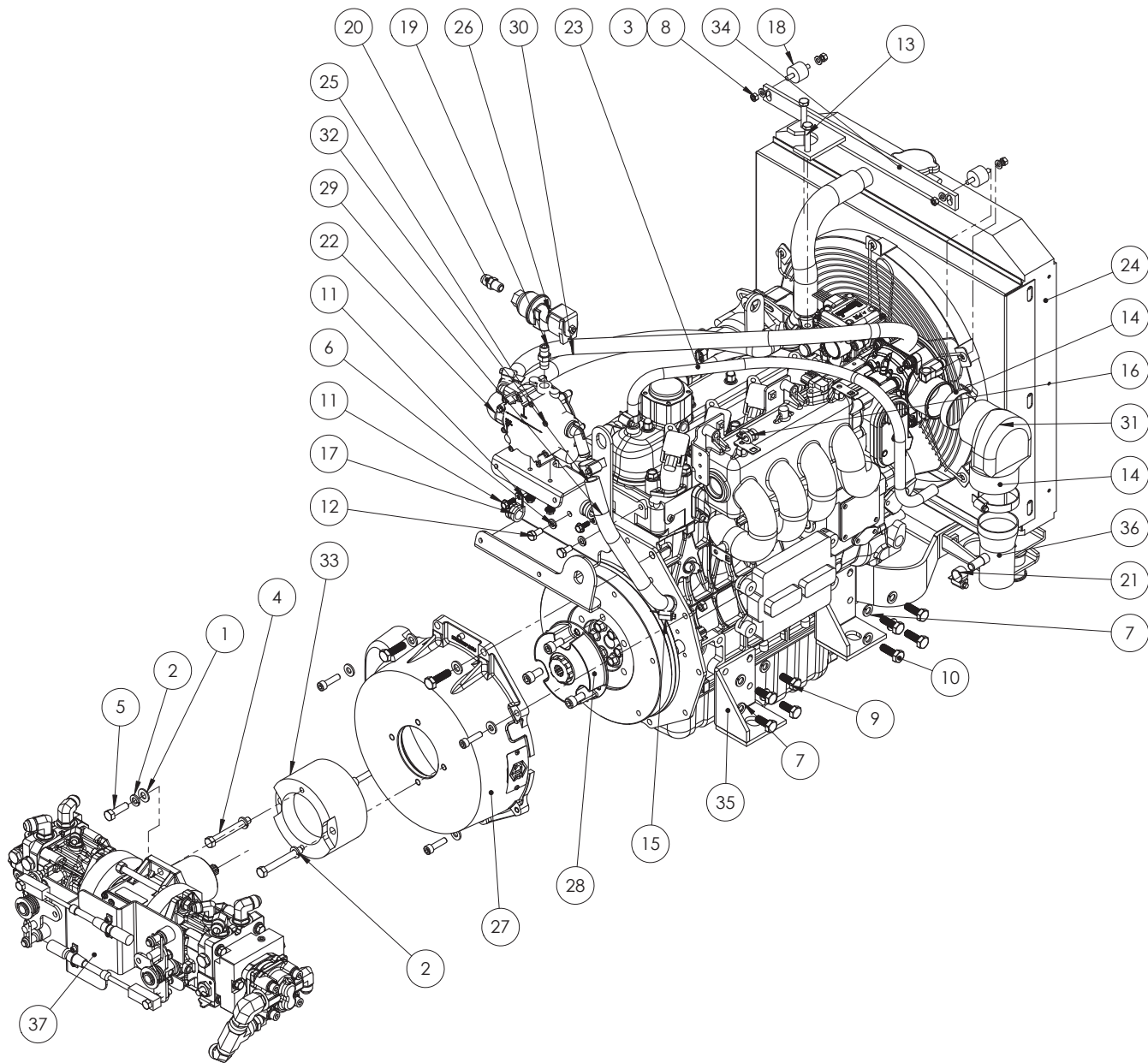
Tightening Torque: 35.5 - 41.2 ft-lb (48.1 - 55.9 N*m)



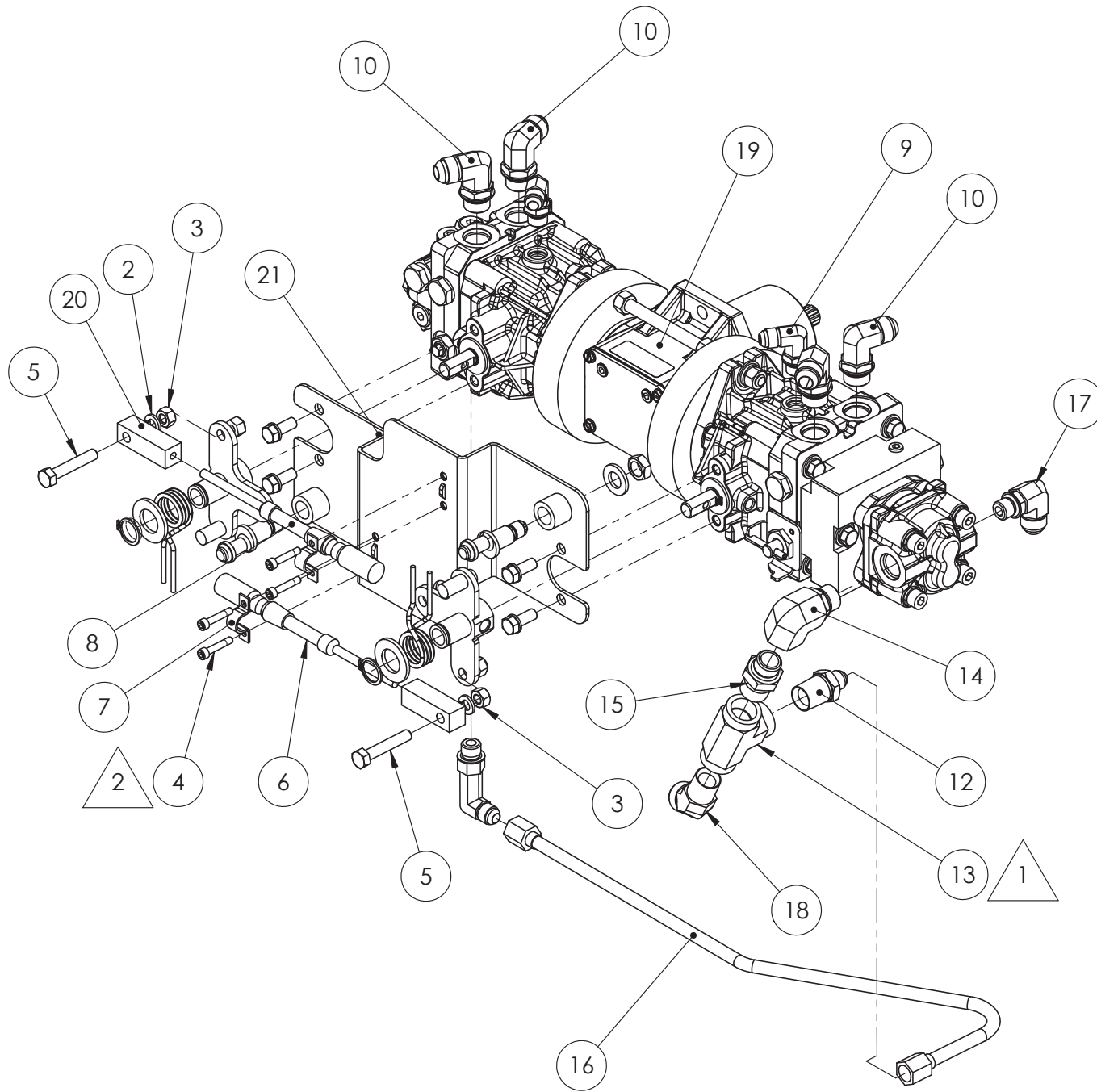
Item No.	Part Number	Description	Qty.
1	11-0038	Steel Flat Washer, 8mm, ZP	4
2	11-0040	Split Lock Washer, 5/16"	1
3	11-0118	Hex Bolt, 5/16"-18 x .75"L, GR5, ZP	1
4	11-0148	Steel USS Flat Washer, GR2: 5/8" ZP	8
5	11-0331	Steel Nylon-Insert Lock Nut 5/8"-18, ZP	4
6	11-0332-60	Steel Hex Head Cap Screw, GR5: 5/8"-18 x 3.75", ZP	4
7	12-0021-08	Nylon Insert Hex Nut, M8 x 1.25, Class 8, ZP	2
8	12-0032-16	Metric Hex cap screw, M8 x 1.25 x 16mm, Steel, ZP	4
9	12-0032-30	Steel Hex Head Cap Screw, GR8.8: M8-1.25mmX30mm, ZP	2
10	12-0274	Hose Clamp, Worm Drive, SAE 36	2
11	13-0339	Vibration Damping Mount	4
12	22-0059	Battery Disconnect Switch	1
13	23-0138	Vehicle Electrical Center, T-2200 Pro	1
14	24-0070	Battery Cable Negative	1
15	24-0170	Battery to Disconnect Cable, T-2200Pro	1
16	24-0171	Disconnect to Starter Cable, T-2200Pro	1
17	24-0173	Wiring Harness, Lockoff Solenoids, T-2200Pro	1
18	24-0174	Wiring Harness, Backup-Alarm, Seat Switch, Solenoid Valve, T-2200Pro	1
19	24-0175	Wiring Harness, T-2200Pro, Joystick, Display & Switch	1
20	24-0176	Battery Cable, Negative, Jumper, T-2200PRO Terminator	1
21	43-0186	Air Cleaner Assembly (Replacement Element Only: 43-0186-01)	1
22	44-0027	2" Air Hose, 12.5"	1
23	96-0274	T-2200Pro Engine Assembly	1
24	96-0287	T-2200Pro Hydraulic Assembly	1



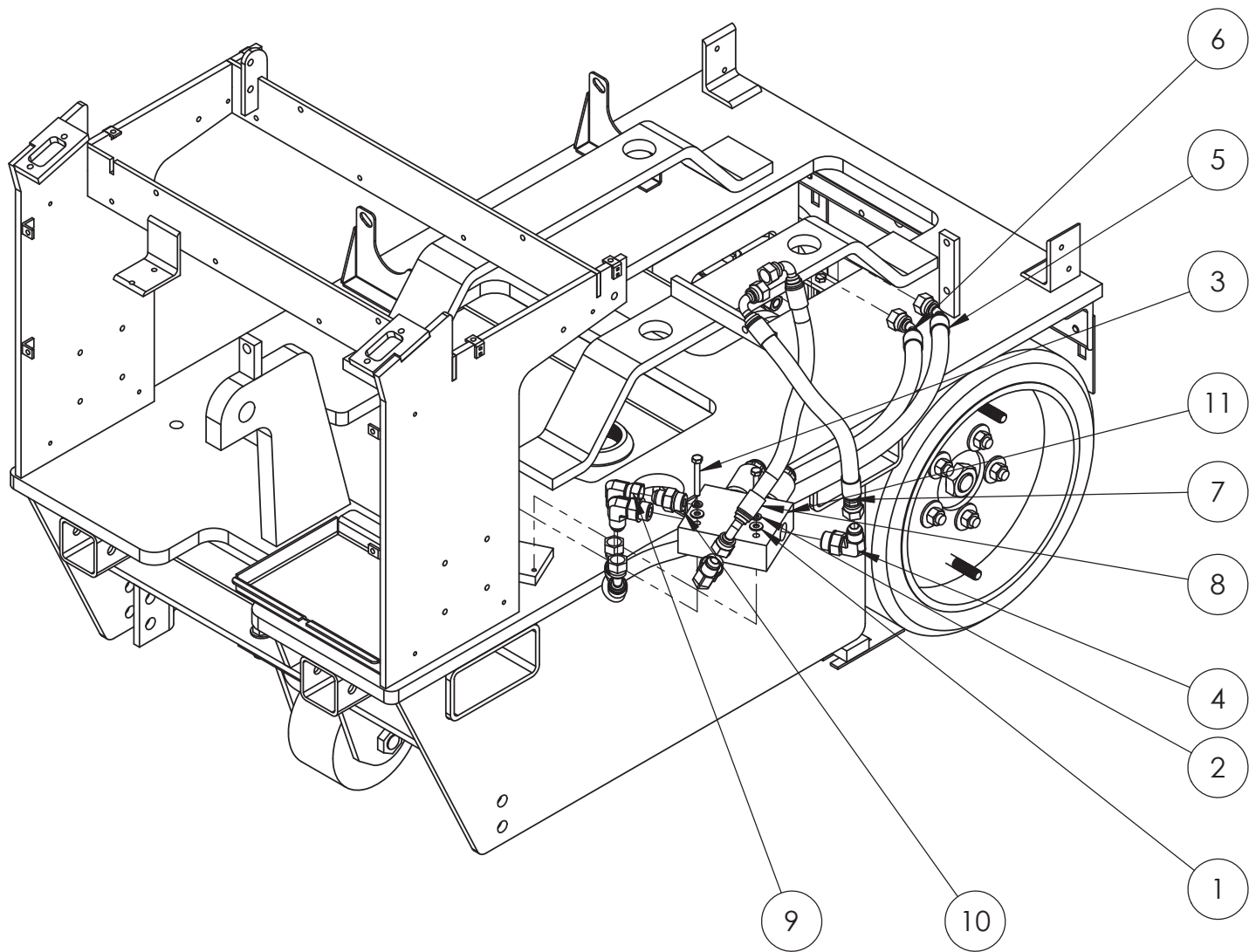
Item No.	Part Number	Description	Qty.
1	11-0126	Steel SAE Flat Washer, 3/8"	2
2	11-0129	Steel Split Lock Washer, 3/8", ZP	4
3	11-0163	Steel Flat Washer, 6mm, ZP	4
4	11-0256	Alloy Steel Hex Head Cap Screw, GR8: 3/8"-16x3", Yellow Zinc Fully Threaded	2
5	11-0290	Hex Head Cap Screw, Gr5: 3/8"-16 x 1-1/4", YZP	2
6	12-0018-08	Steel Split Lock Washer, 8mm, ZP	2
7	12-0018-10	Split Lock Washer, 10mm, ZP	16
8	12-0021-06	Hex Nut, Nylon Insert, M6 x 1.00, ZP	4
9	12-0028-25	Steel Hex Head Cap Screw, M10x1.25 mm, 25 mm L, Class 8.8, ZP Fully Threaded	8
10	12-0028-30	Steel Hex Head Cap Screw, M10x1.25 mm, 30mm L, Class 8.8, ZP Fully Threaded	8
11	12-0031-16	Steel Hex Flange Cap Screw, M6 x 1.0, 16mm L, Black	4
12	12-0032-16	Metric Hex cap screw, M8 x 1.25 x 16mm, Steel, ZP	2
13	12-0032-40	Metric Hex Cap Screw, M8 x 1.25mm x 40mm, ZP	2
14	13-0274	Hose Clamp, Worm Drive, SAE 36	2
15	13-0275	Hose Clamp, Worm Drive, SAE 12	6
16	13-0285-03	Rubber Cushioned Loop Clamp, 3/8"ID, Zinc plated Steel, EPDM Cushion	1
17	13-0285-05	Rubber Cushioned Loop Clamp, 5/8"ID, Zinc plated Steel, EPDM Cushion	2
18	13-0329	Vibration Isolation Mount	2
19	31-0157	1/4" NPTF Pipe Nipple, Brass	1
20	41-0014	Brass Pipe Nipple, 1/4"NPT to JIC	1
21	41-0036	Hose Clamp, Worm Drive, SAE 6, 7/16" to 25/32", 1/2" Band, Stainless	2
22	41-0044	Propane Vapor Hose, 3/4"	1
23	41-0045-06	3/8" Fuel Line Hose, 28"L	1
24	43-0181	Engine and Radiator Assembly	1
25	43-0182	Propane Regulator Assembly	1
26	43-0183	Propane Fuel Lockoff	1
27	43-0184	Bell Housing Kit w/Hardware	1
28	43-0185	Flywheel Adapter, SAE "A" 9 Tooth	1
29	44-0020	Heater Hose, 11"	1
30	44-0020	Heater Hose, 29.5"	1
31	44-0050	Intake Adapter	1
32	51-0849	Regulator Mount Bracket	1
33	53-0216	T-Drive Mounting Adapter, T-2100PRO, Zinc Plated	1
34	53-0299	Upper Radiator Bracket	1
35	53-0301	Engine Mount, Kubota 1.6L	4
36	53-0328	Crank Case Off-gas Coupler	1
37	96-0177	Sub-Assy, T-Hydraulic unit w/Fittings, Terminator	1



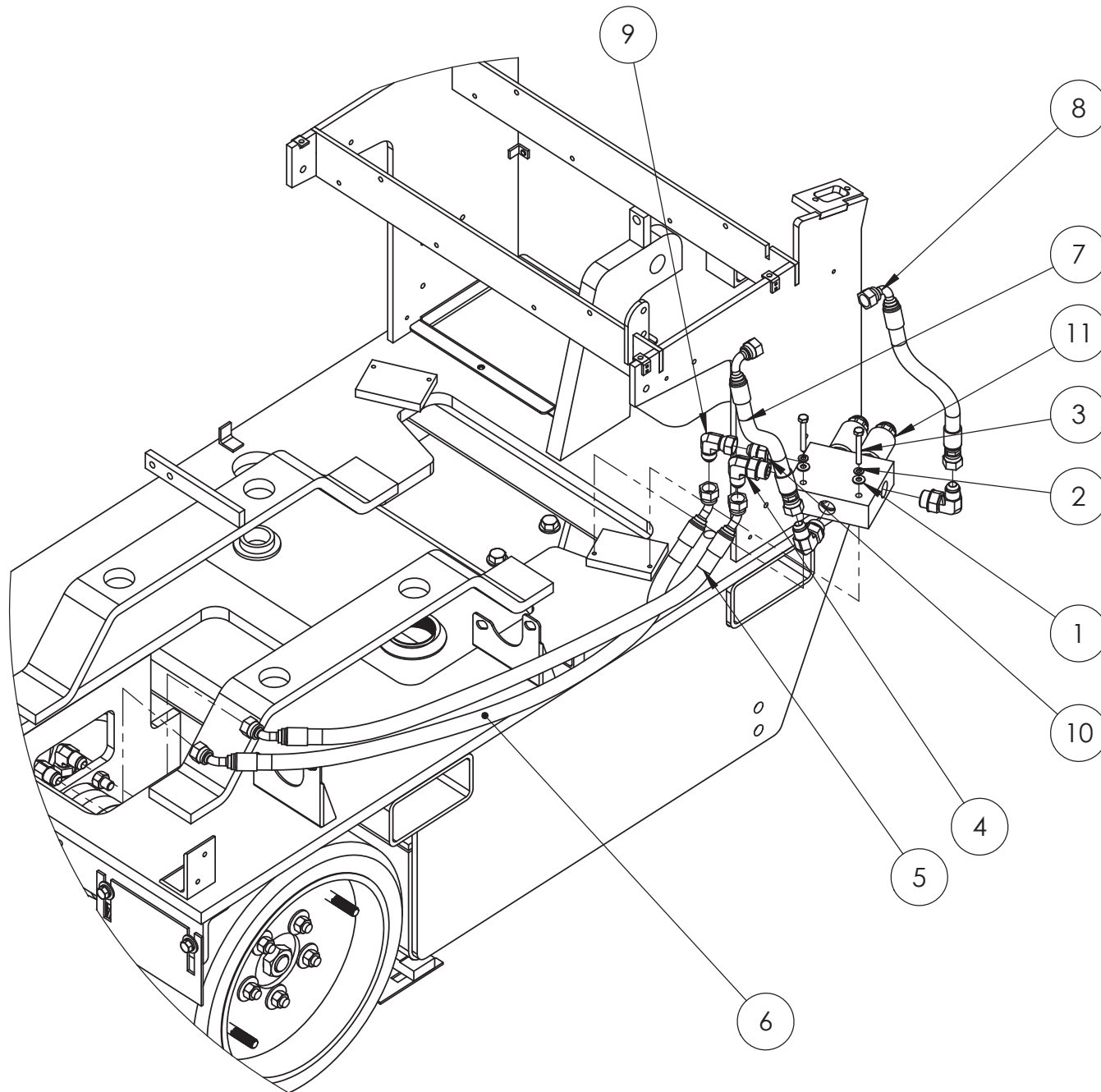
Item No.	Part Number	Description	Qty.
1	11-0025	Steel Nylon-Insert Lock Nut, 5/16"-18, ZP	2
2	11-0040	Split Lock Washer, 5/16"	2
3	11-0067	Steel Hex Nut, 5/16"-18, ZP	2
4	11-0297	Steel Socket Head Cap Screw, #10-24x1", ZP	4
5	11-0321	Hex Cap Screw, GR8: 5/16"-18x1-3/4" YZP fully threaded	2
6	13-0277	Push Pull Cable, 28"L, LD	1
7	13-0278	Conduit Clamp, Bolt Down for LD cable	2
8	13-0281	Push Pull Cable, 29.5"L, LD	1
9	31-0056	Hyd. Fitting, Male #6 SAE Oring to Male #6 JIC 37deg Flare	2
10	31-0094	Hyd. Fitting, Male #8 SAE Oring to Male #8 JIC 37deg Flare	4
11	31-0101	Hydraulic Fitting, Straight, 1/2" NPTF Male to #6 Male 37 Flare	1
12	31-0102	Hydraulic Fitting, Long 90 Deg, #6 Male 37 Flare to #6 SAE O-ring	1
13	31-0165	Hydraulic Fitting, Straight, #8 SAE O-ring to 1/2" NPT Male, Steel, Zinc Plated	1
14	31-0192	Hyd. Fitting, 90 Deg, #8 SAE O-ring Male to #8 SAE O-ring Female, Steel, ZP	1
15	31-0193	Hydraulic Fitting, Straight, #8 SAE O-ring to 1/2" NPT Male, Steel, Zinc Plated	1
16	31-0194	Suction Hard Tube Assy	1
17	31-0195	Hydraulic Fitting, 90 Deg, #8JIC To #6 SAE O-ring	1
18	31-0236	Hydraulic Fitting, 45 deg, #10 Male 37 Flare to 1/2" NPT Male	1
19	33-0018	Hyd. Pump Assy, Pumps & Gear Box	1
20	51-0833	Joystick Cable End	2
21	53-0100	Push Pull Cable Mount	1



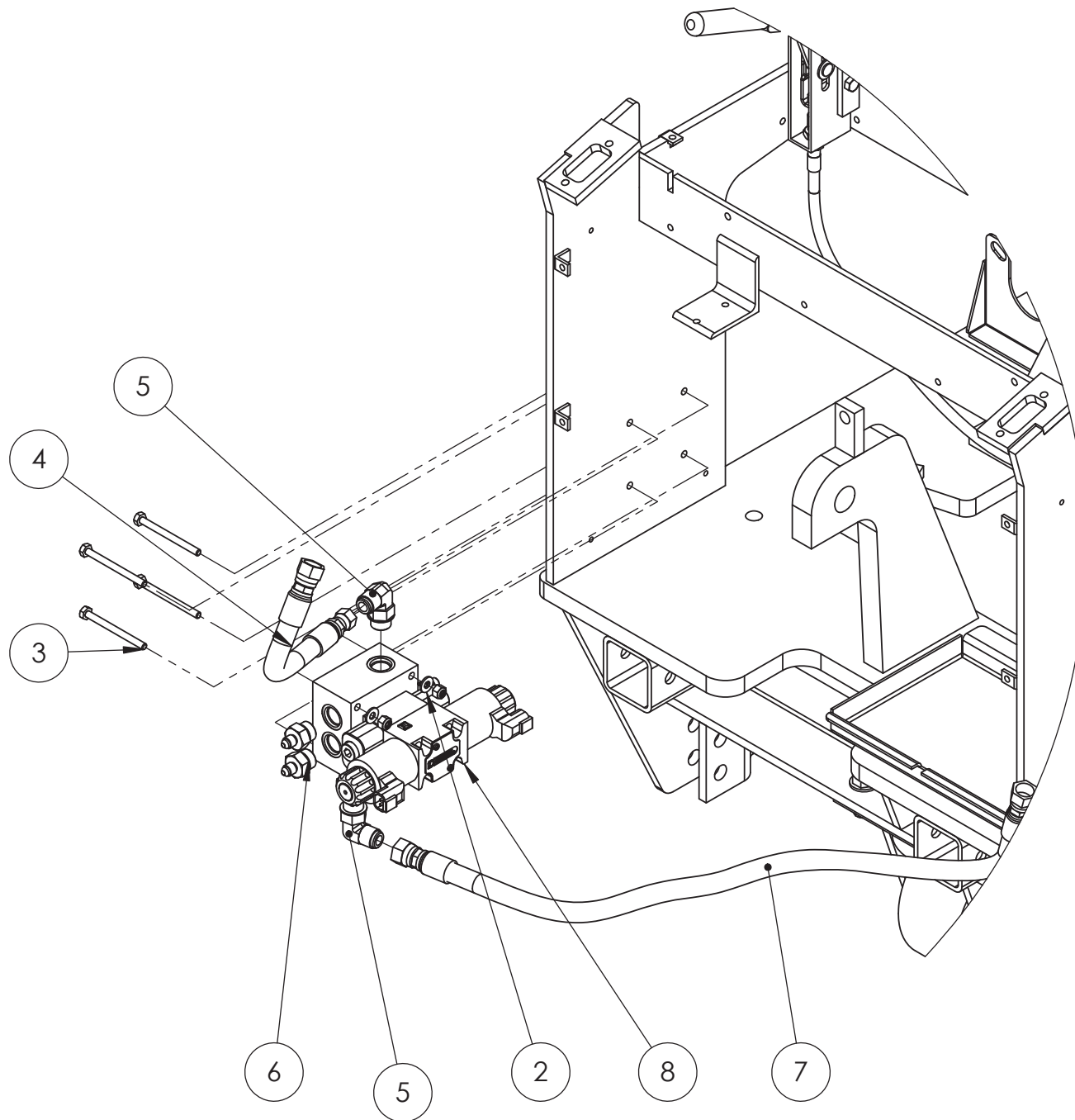
Item No.	Part Number	Description	Qty.
1	11-0033	Flat Washer, 0.25, ZP	2
2	11-0069	Split Lock Washer, 1/4"	2
3	11-0279-32	Hex Bolt, 1/4"-20 x 2"	2
4	31-0053	Hydraulic Fitting, 90 Deg, #8 Male 37 Flare to #10 SAE O-ring	3
5	31-0092	Hydraulic Hose	1
6	31-0092	Hydraulic Hose	1
7	31-0182	Hydraulic Hose	1
8	31-0182	Hydraulic Hose	1
9	31-0186	Hydraulic Fitting, 90 Deg	1
10	31-0187	Hydraulic Fitting, Straight	1
11	32-0022	Solenoid Valve	1



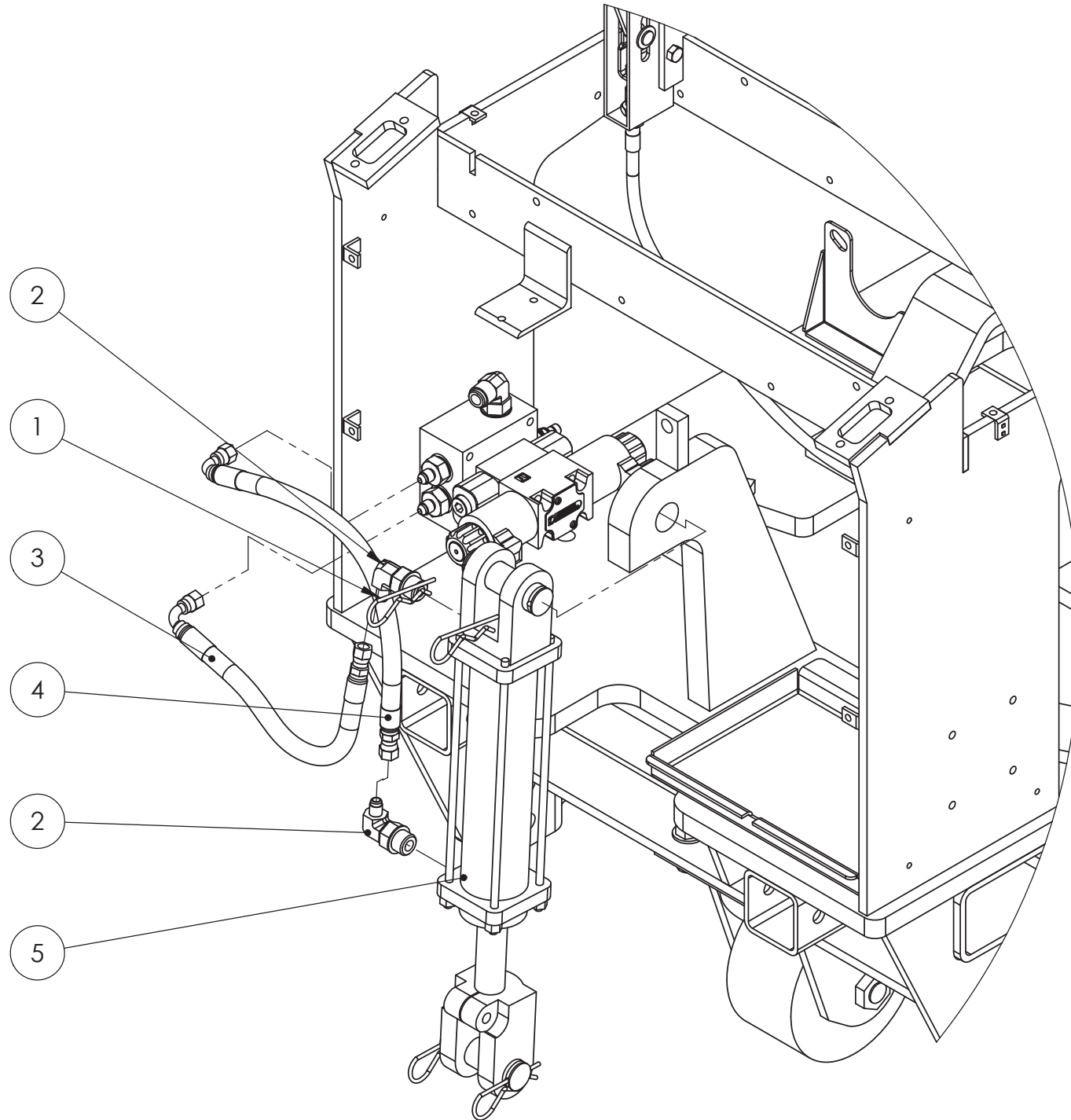
Item No.	Part Number	Description	Qty.
1	11-0033	Flat Washer, 0.25, ZP	2
2	11-0069	Split Lock Washer, 1/4"	2
3	11-0279-32	Hex Bolt, 1/4"-20 x 2"	2
4	31-0053	Hydraulic Fitting, 90 Deg, #8 Male 37 Flare to #10 SAE O-ring	3
5	31-0092	Hydraulic Hose	1
6	31-0092	Hydraulic Hose	1
7	31-0182	Hydraulic Hose	1
8	31-0182	Hydraulic Hose	1
9	31-0186	Hydraulic Fitting, 90 Deg	1
10	31-0187	Hydraulic Fitting, Straight	1
11	32-0022	Solenoid Valve	1



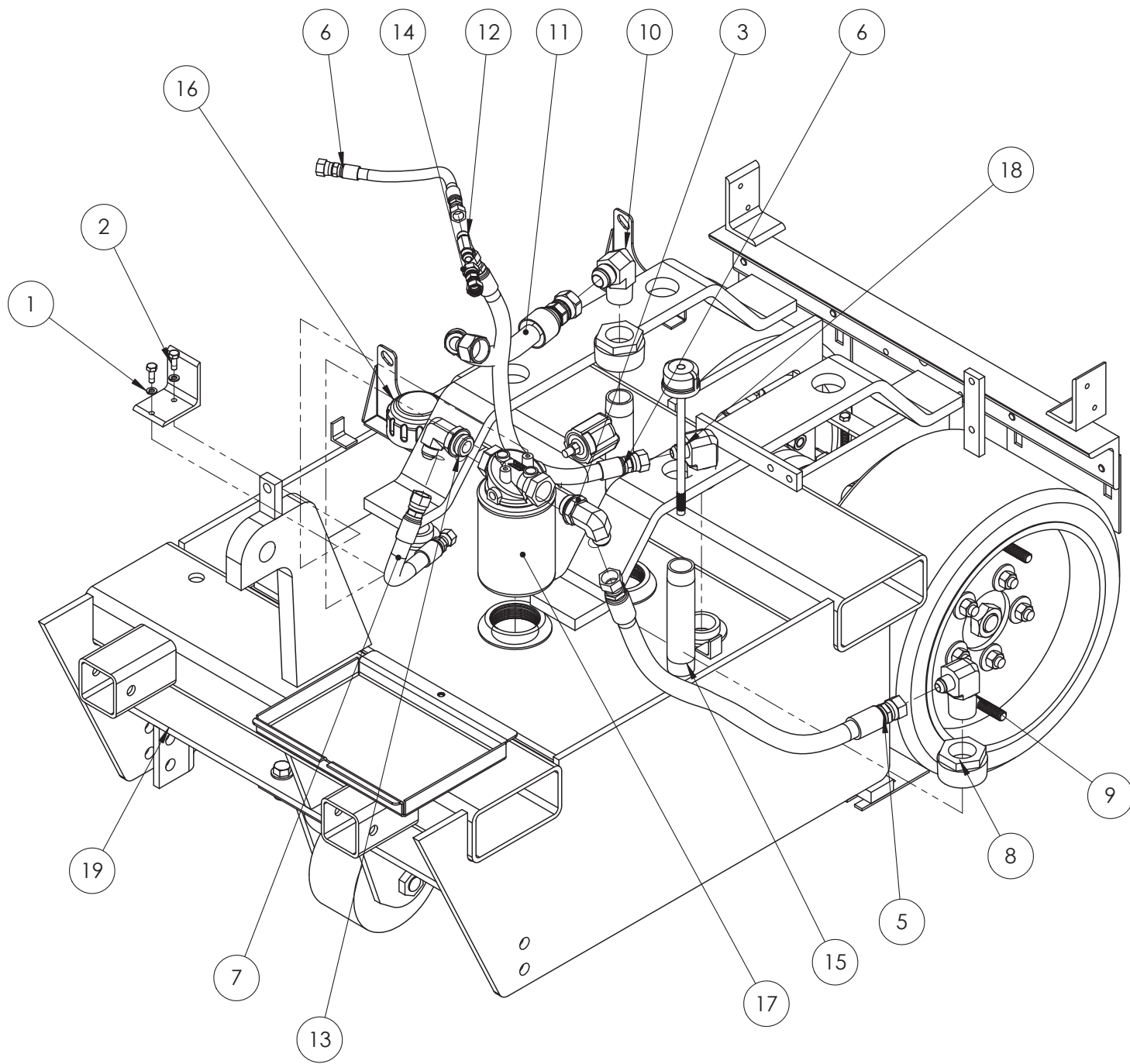
Item No.	Part Number	Description	Qty.
1	11-0024	Steel Nylon-Insert Lock Nut, 1/4"-20 ZP	4
2	11-0033	Flat Washer, 0.25, ZP	4
3	11-0279-48	Hex Bolt, 1/4"-20 x 3"	4
4	31-0090	Hydraulic Hose	1
5	31-0094	Hydraulic Fitting, 90 deg	2
6	31-0163	Hydraulic Fitting, #6 JIC to #8 SAE ORB, w/Reducing Orifice	2
7	31-0232	Hydraulic Hose	1
8	32-0023	Solenoid Valve	1



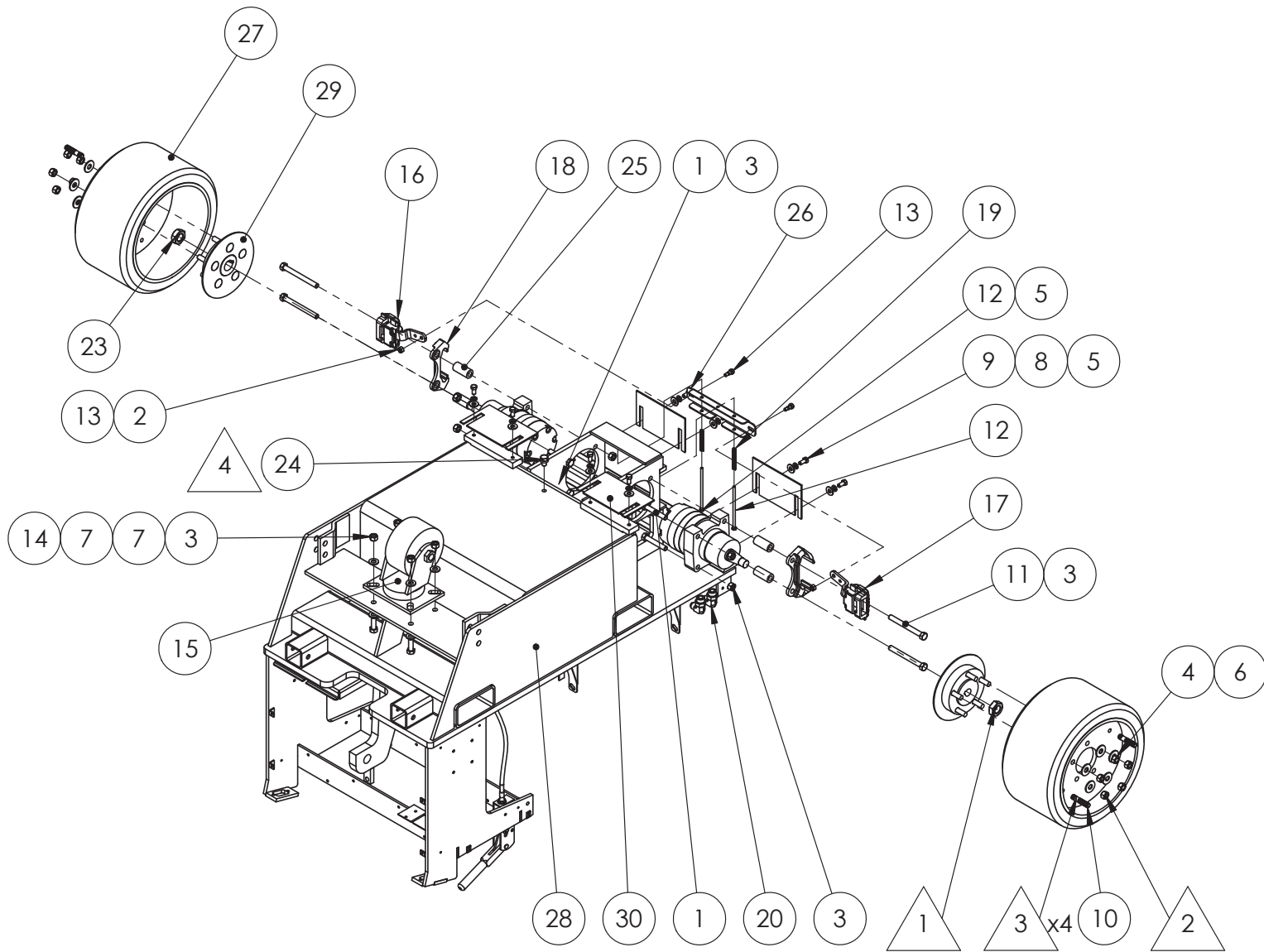
Item No.	Part Number	Description	Qty.
1	11-0052	Hitch Pin	2
2	31-0043	Hydraulic Fitting, 90 Deg	2
3	31-0088	Hydraulic Hose	1
4	31-0231	Hydraulic Hose	1
5	34-0008	Hydraulic Cylinder	1



Item No.	Part Number	Description	Qty.
1	11-0069	Split Lock Washer, 1/4"	2
2	11-0133	Steel Hex Head Cap Screw, Gr5, 1/4"-20 x 3/4"L, ZP	2
3	31-0052	Hydraulic Fitting, 90 Deg	1
4	31-0083	Hydraulic Hose	1
5	31-0084	Hydraulic Hose	1
6	31-0085	Hydraulic Hose	1
7	31-0090	Hydraulic Hose	1
8	31-0124	Threaded Tank Fitting	2
9	31-0127	Hydraulic Fitting, 90 Deg	2
10	31-0128	Hydraulic Fitting, 90 Deg	1
11	31-0130	Hydraulic Hose	1
12	31-0144	Hydraulic Tee	1
13	31-0162	Hydraulic Fitting, 90 Deg	
14	31-0196	Hydraulic Fitting, Straight	1
15	35-0004	Pipe Nipple, 6"	2
16	35-0021	Hydraulic Breather Cap	1
17	35-0036	Hydraulic Filter Assembly	1
18	53-0159	Dip Stick	1
19	96-0273	Frame & Wheel Assembly	1



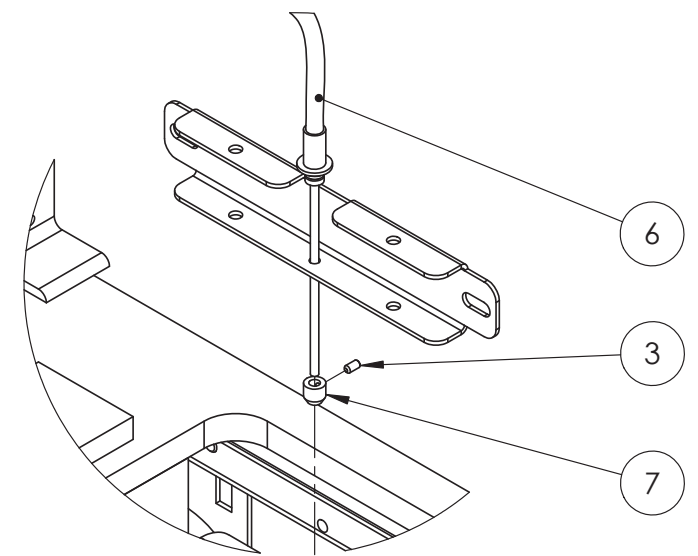
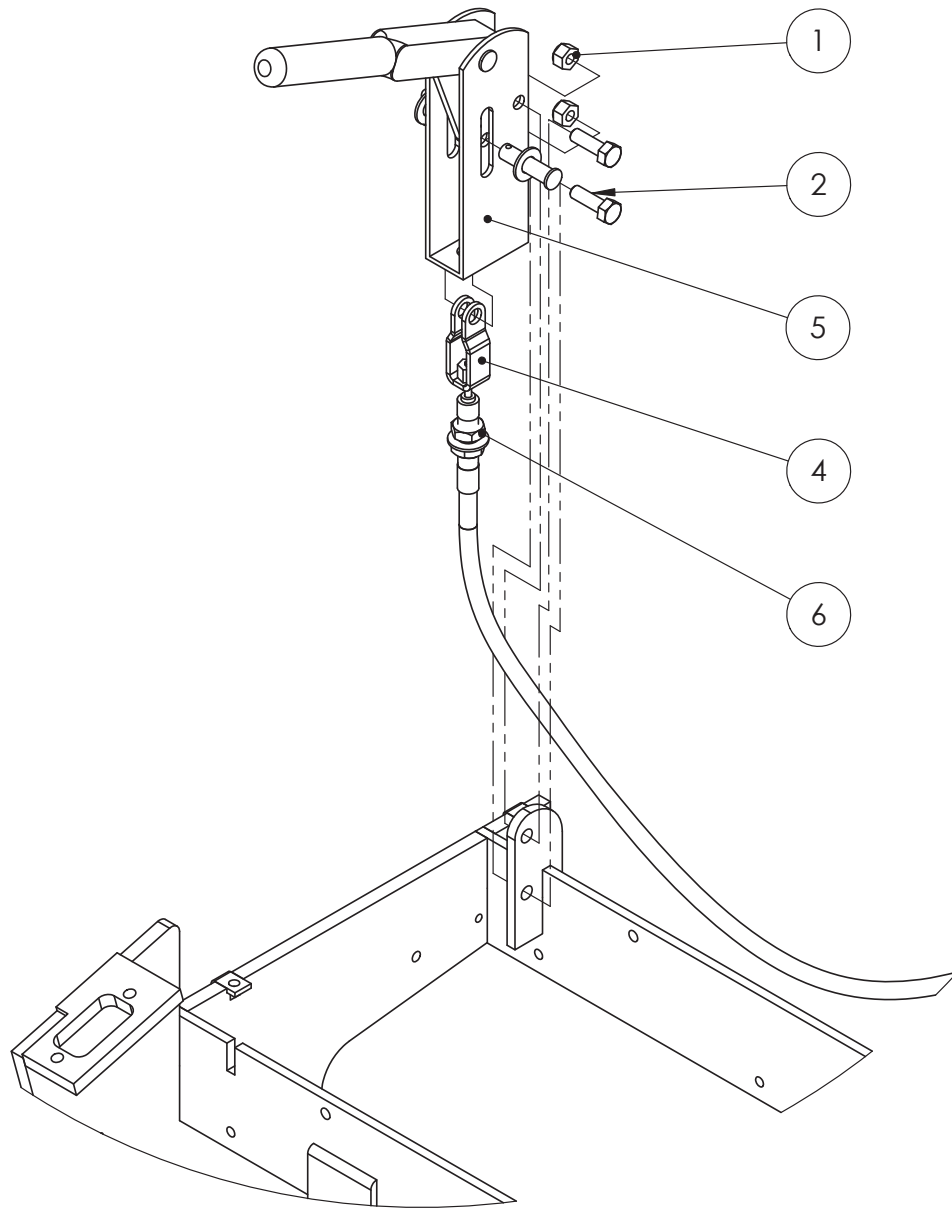
Item No.	Part Number	Description	Qty.
1	11-0013	Hex Bolt, 1/2"-13 x 3", GR5, ZP	4
2	11-0025	Hex Nut, 5/16"-18, Steel, Nylon Insert, ZP	2
3	11-0028	Hex Nut, 1/2"-13, Nylon Insert, Steel, ZP	12
4	11-0029	Hex Nut, 1/2"-20, Nylon Insert, Steel, ZP	10
5	11-0035	Steel USS Flat Washer, 3/8"ID, ZP	8
6	11-0037	Flat Washer, 1/2", Steel, ZP	10
7	11-0037	Flat Washer, 1/2", Steel, ZP	8
8	11-0129	Steel Split Lock Washer, 3/8", ZP	8
9	11-0130	Steel Hex Head Cap Screw, GR5: 3/8"-16x3/4" ZP	8
10	11-0187	Double Ended Stud, 1/2"-13 x 2.5"	4
11	11-0228	Hex Bolt, 1/2"-13 x 5", ZP	4
12	11-0279-88	Hex Bolt, 1/4"-20 x 5.5", GR8, ZP	2
13	11-0287	Socket Head Shoulder Screw, 3/8"OD x 3/8"L	2
14	11-0296	Hex Bolt, 1/2"-13 x 1.5"L, GR5, ZP	4
15	13-0008	Caster Wheel Assembly	1
16	13-0020	Brake Caliper, Left	1
17	13-0021	Brake Caliper, Right	1
18	13-0022	Brake Mounting Bracket	2
19	13-0276	Compression Spring	2
20	31-0053	Hydraulic Fitting, 90 Deg, #8 Male 37 Flare to #10 SAE O-ring	4
21	33-0002	Wheel Motor, Left Side	1
22	33-0003	Wheel Motor, Right Side	1
23	35-0013	Wheel Motor Pack Nut	2
24	35-0014	Hydraulic Tank Plug	1
25	51-0491	Brake Spacer Standoff, T-2100 Pro	4
26	53-0134	Brake Actuator, T-2100PRO, Painted	1
27	53-0208	Wheel and Tire 11.25Dia x 8"w, Non Marking, 2" Off Set	2
28	53-0295	Frame Assembly, T-2200 Pro	1
29	70-0016	Wheel Hub, 5 Bolt w/Brake Disc	2
30	81-0091	Wheel Scraper Blade, 2 Slot, 7.5" x 4.5"	4



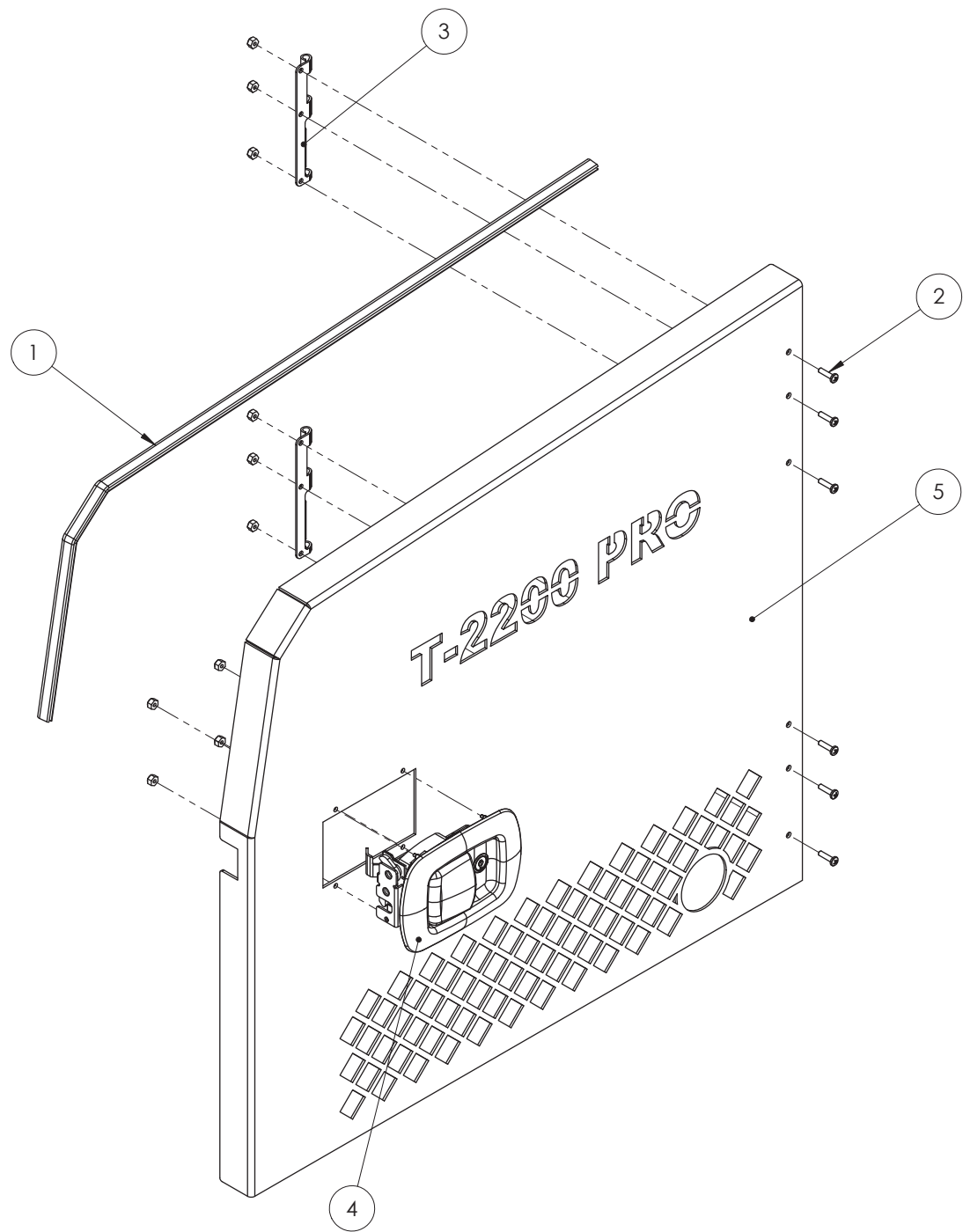
Notes:

1. Tighten Pack nut 310-350 ft-lbs.
2. Tighten Wheel Lugs to 70 ft-lbs.
3. Use Thread Locking Compound - Loctite - Red 271 or equiv.
4. Use Sealing washer and Use Thread Locking Compound Loctite - Blue 242 or equiv.

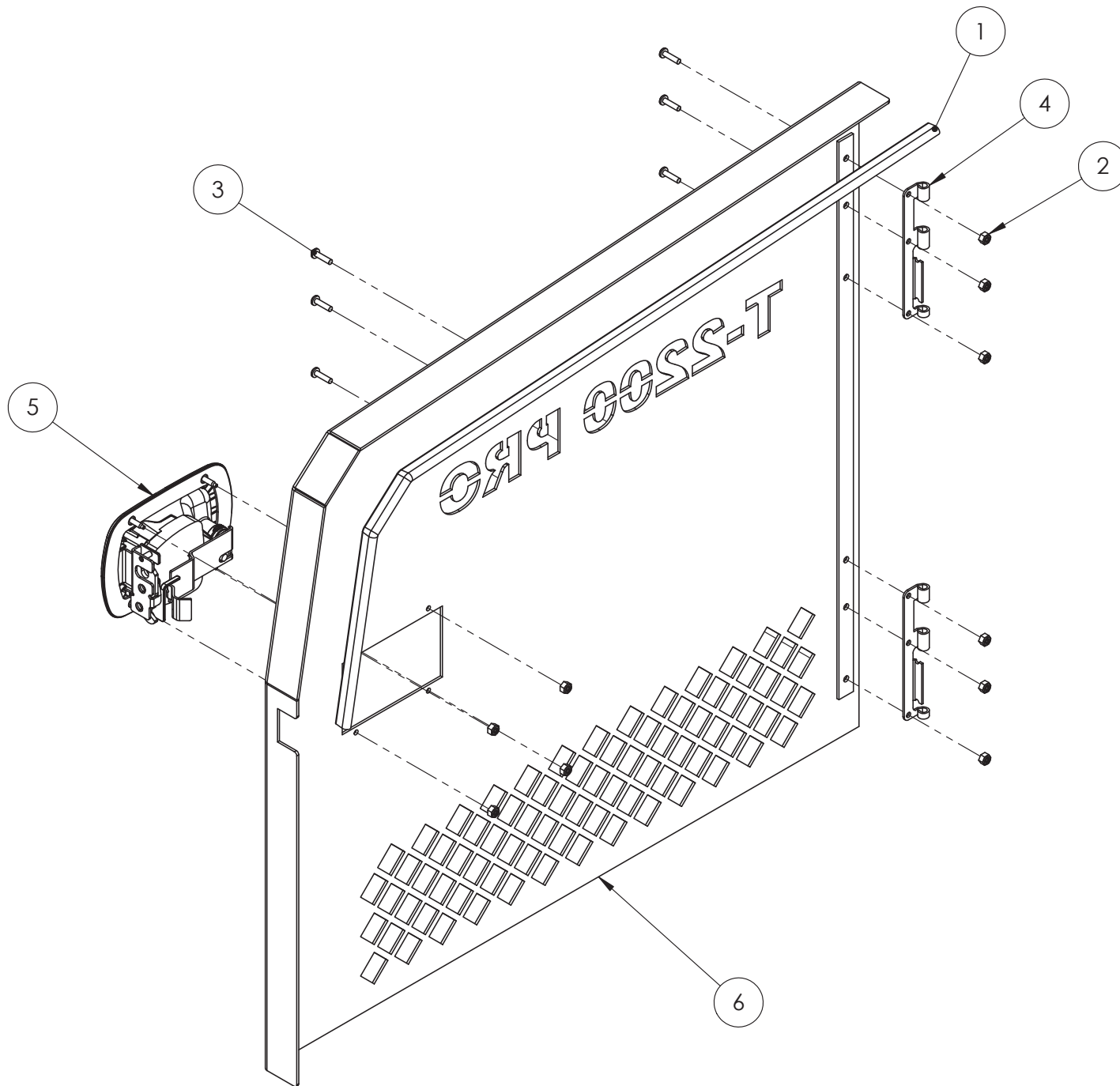
Item No.	Part Number	Description	Qty.
1	11-0025	Steel Nylon-Insert Lock Nut, 5/16"-18	2
2	11-0132	Steel Hex Head Cap Screw, Gr5: 5/16"-18x1", ZP, Full Thread	2
3	11-0270	Set Screw (Socket Drive, Cup Point), #10-24x3/8"	1
4	13-0027	Brake Clevis	1
5	13-0050	Brake Lever	1
6	13-0302	Brake Cable	1
7	51-0513	Cable Clamp	1



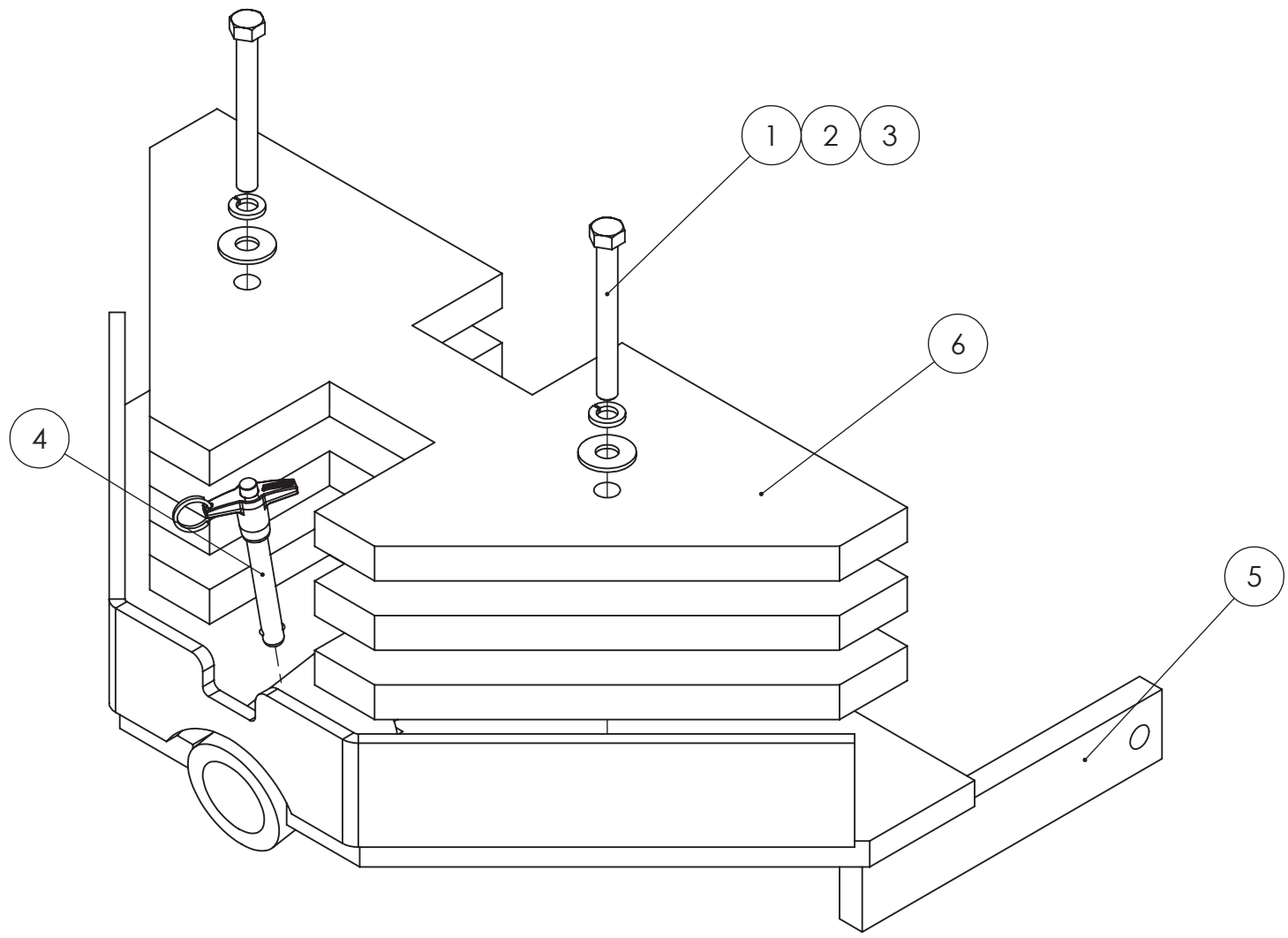
Item No.	Part Number	Description	Qty.
1	03-0008	Edge Trim, Neoprene Rubber, 38"	1
2	11-0250-12	Screw, Pan Head Phillips Machine Screw, #10-24x3/4", ZP	6
3	13-0230	Door Leaf Hinge, Type A	2
4	13-0337	Door Latch	1
5	53-0310	Door Panel, T-2200 Pro, Left, Welded & Painted	1
6	11-0023	Steel Nylon-Insert Lock Nut,#10-24, ZP	10



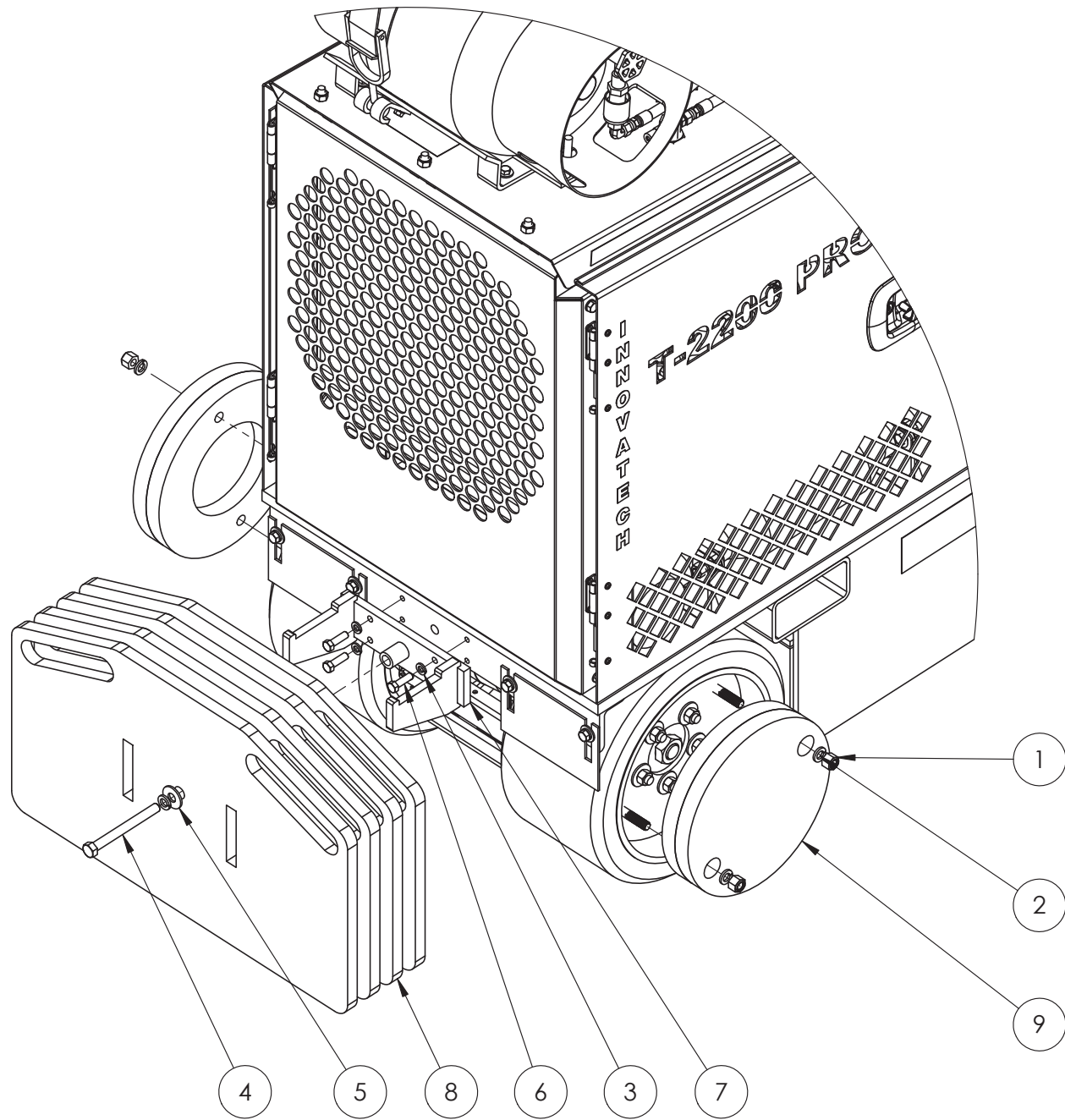
Item No.	Part Number	Description	Qty.
1	03-0008	Edge Trim, Neoprene Rubber, 38"	1
2	11-0023	Steel Nylon-Insert Lock Nut,#10-24, ZP	10
3	11-0250-12	Screw, Pan Head Phillips Machine Screw, #10-24x3/4", ZP	6
4	13-0231	Hinge, Concealed, Removable, Door Leaf, Type B	2
5	13-0337	Door Latch	1
6	53-0311	Door Panel, Right, T-2200 Pro, Welded & Painted	1



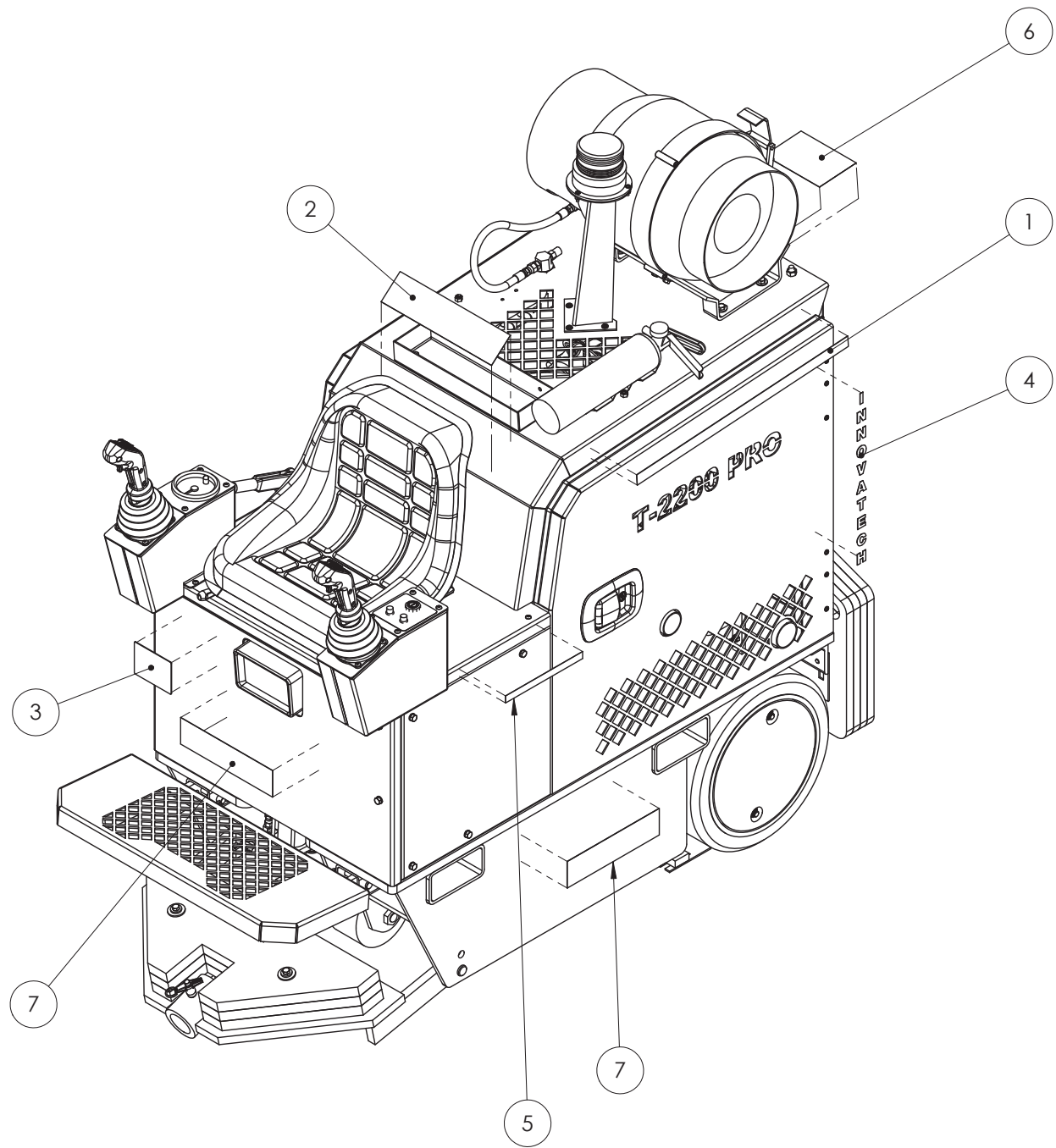
Item No.	Part Number	Description	Qty.
1	11-0014	Hex Cap Screw, GR5: 1/2"-13 x 4-1/2" ZP	2
2	11-0041	1/2" Steel Split Lock Washer, ZP	2
3	11-0230	1/2" Steel Flat Washer, ZP	2
4	13-0035	T-Handle Pin, 4130 Shank, 1/2" Dia X 3.00"	1
5	53-0054	Front Jaw Assembly, T-2100 Pro	1
6	53-0133	Front Weight Painted	3



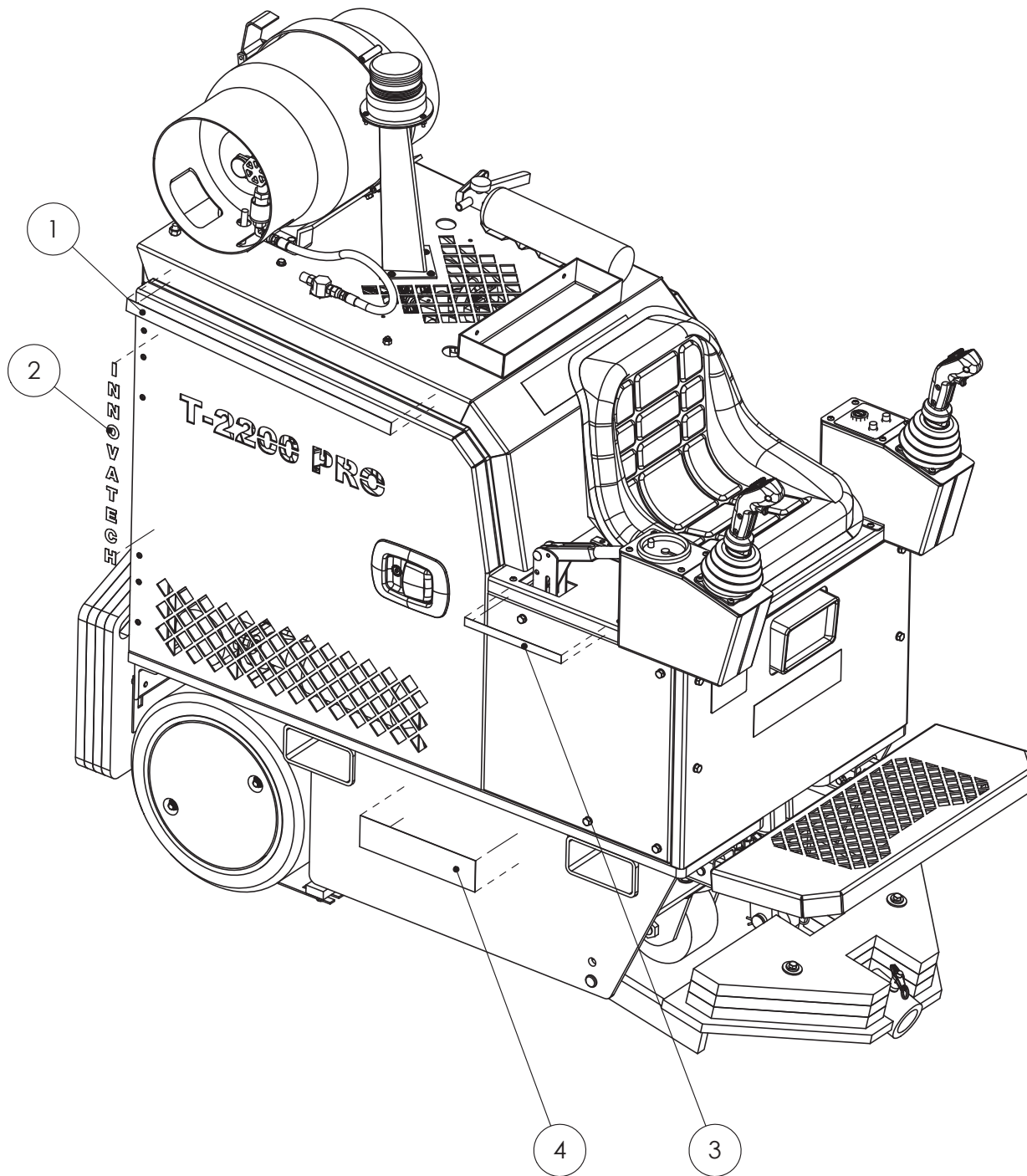
Item No.	Part Number	Description	Qty.
1	11-0028	Steel Nylon-Insert Lock Nut, 1/2"-13, ZP	4
2	11-0041	Steel Split Lock Washer, 1/2", ZP	5
3	11-0129	Steel Split Lock Washer, 3/8", ZP	4
4	11-0228	Hex Bolt, 1/2"-13 x 5", ZP	1
5	11-0230	Steel Flat Washer, 1/2", ZP	1
6	11-0290	Hex Head Cap Screw, Gr5: 3/8"-16 x 1-1/4", YZP	4
7	53-0113	Rear Weight Holder	1
8	53-0119	Rear Weight, 75lbs, Painted	4
9	53-0212	Wheel Weights, 2" Wide	2



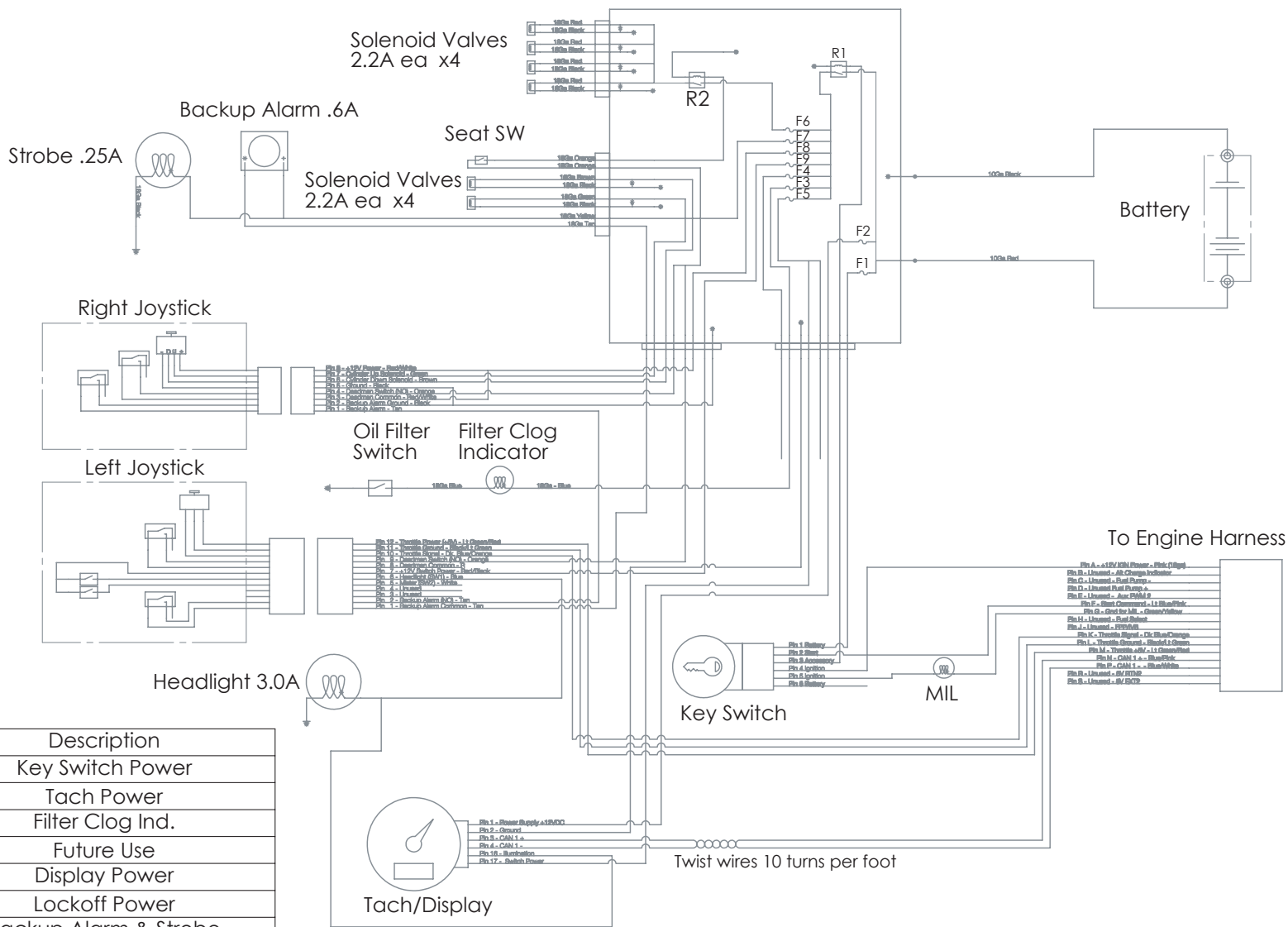
Item No.	Part Number	Description	Qty.
1	61-0004	Decal, "USE IN WELL VENTILATED AREAS ONLY"	4
2	61-0005	Decal, "WARNING, ONLY Designated Persons to Operate Machine"	5
3	61-0019	Serial Number Plate	4
4	61-0021	Decal, "INNOVATECH" Vertical Letters	1
5	61-0025	Decal, Exhaust Gas Warning	1
6	61-0039	Decal, LPG Fuel Cylinder Replacement Procedure	4
7	61-0063	Decal, "TERMINATOR T-2200PRO"	2

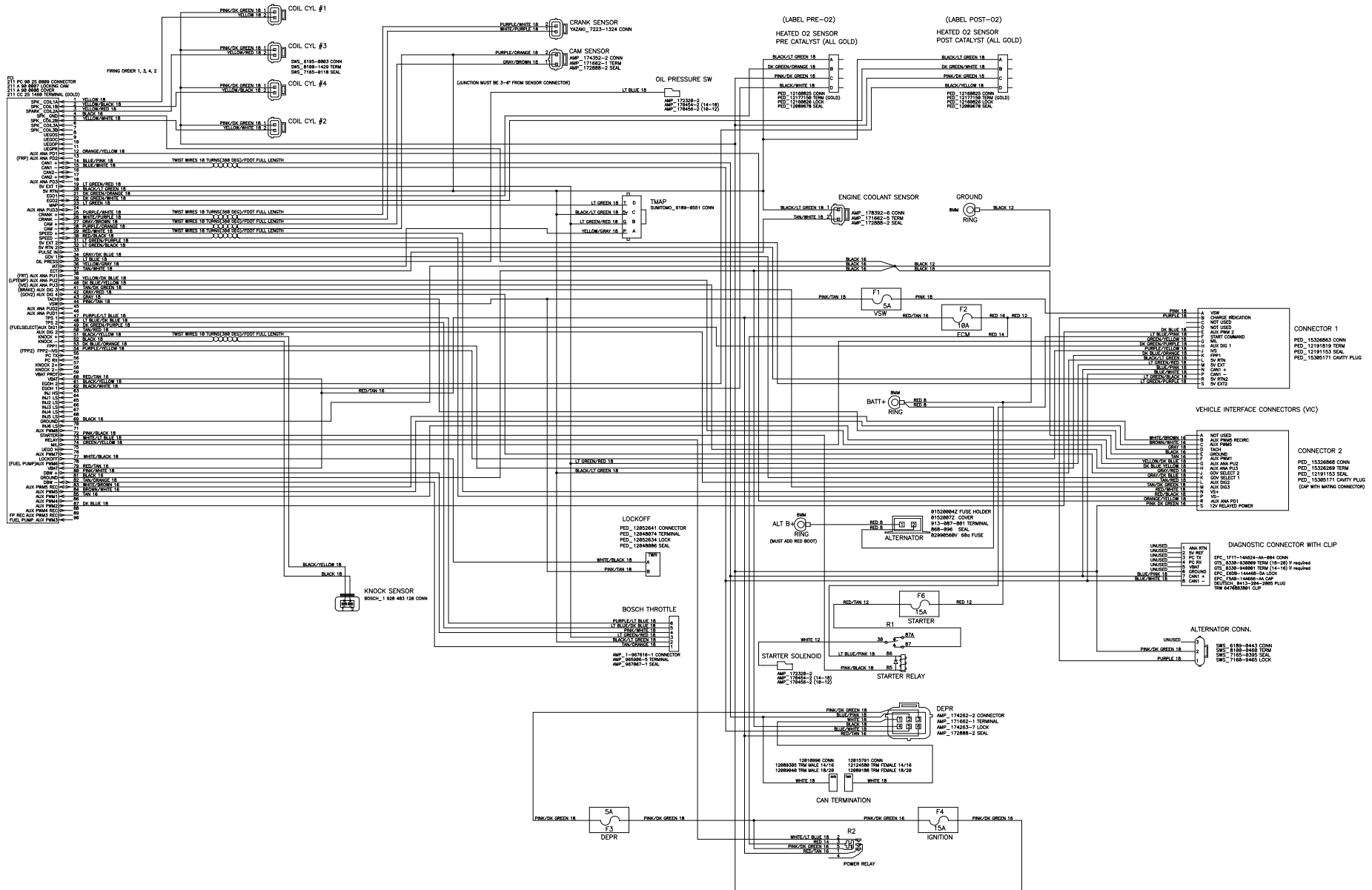


Item No.	Part Number	Description	Qty.
1	61-0004	Decal, "USE IN WELL VENTILATED AREAS ONLY"	1
2	61-0021	Decal, "INNOVATECH" Vertical Letters	1
3	61-0025	Decal, Exhaust Gas Warning	1
4	61-0063	Decal, "TERMINATOR T-2200PRO"	1



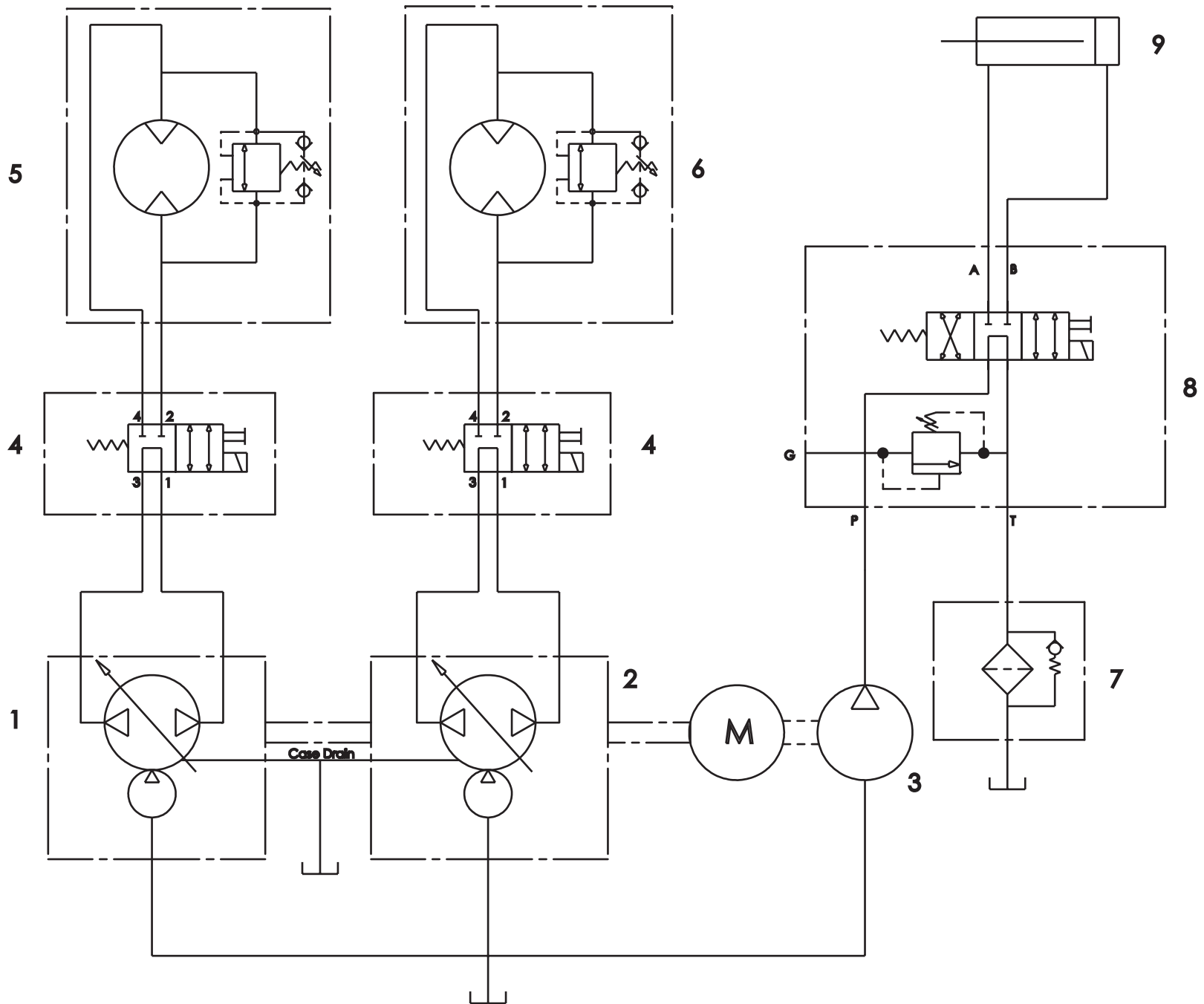
Electrical Schematic





Item No.	Part Number	Description	Qty.
1	33-0009	Right Wheel Hydraulic Pump	1
2	33-0017	Left Wheel Hydraulic Pump	1
3	33-0017	Gear Pump	1
4	32-0024	Solenoid Valve	2
5	33-0003	Right Wheel Motor	1
6	33-0002	Left Wheel Motor	1
7	35-0036	Hydraulic Filter Assembly	1
7a	35-0037	Replacement Filter Only	1
8	32-0023	Directional Valve	1
9	34-0008	Hydraulic Cylinder	1

Hydraulic Schematic





Material Safety Data Sheet

SECTION 1 PRODUCT AND COMPANY IDENTIFICATION

Chevron Rando® HD

Product Use: Hydraulic Oil

Product Number(s): CPS273277, CPS273278, CPS273279

Synonyms: Rando® HD ISO 32, Rando® HD ISO 46, Rando® HD ISO 68

Company Identification

Chevron Products Company
 a division of Chevron U.S.A. Inc.
 6001 Bollinger Canyon Rd.
 San Ramon, CA 94583
 United States of America
 www.chevronlubricants.com

Transportation Emergency Response

CHEMTREC: (800) 424-9300 or (703) 527-3887

Health Emergency

Chevron Emergency Information Center: Located in the USA. International collect calls accepted. (800) 231-0623 or (510) 231-0623

Product Information

email : lubemsds@chevron.com
 Product Information: (800) LUBE TEK

SECTION 2 COMPOSITION/ INFORMATION ON INGREDIENTS

COMPONENTS	CAS NUMBER	AMOUNT
Highly refined mineral oil (C15 - C50)	Mixture	70 - 100 %wt/wt

SECTION 3 HAZARDS IDENTIFICATION

IMMEDIATE HEALTH EFFECTS

Eye: Not expected to cause prolonged or significant eye irritation.

Skin: Contact with the skin is not expected to cause prolonged or significant irritation. Contact with the skin is not expected to cause an allergic skin response. Not expected to be harmful to internal organs if absorbed through the skin. High-Pressure Equipment Information: Accidental high-velocity injection under the skin of materials of this type may result in serious injury. Seek medical attention at once should an accident like this occur. The initial wound at the injection site may not appear to be serious at first; but, if left untreated, could result in disfigurement or amputation of the affected part.

Ingestion: Not expected to be harmful if swallowed.

Inhalation: Not expected to be harmful if inhaled. Contains a petroleum-based mineral oil. May cause

respiratory irritation or other pulmonary effects following prolonged or repeated inhalation of oil mist at airborne levels above the recommended mineral oil mist exposure limit. Symptoms of respiratory irritation may include coughing and difficulty breathing.

SECTION 4 FIRST AID MEASURES

Eye: No specific first aid measures are required. As a precaution, remove contact lenses, if worn, and flush eyes with water.

Skin: No specific first aid measures are required. As a precaution, remove clothing and shoes if contaminated. To remove the material from skin, use soap and water. Discard contaminated clothing and shoes or thoroughly clean before reuse.

Ingestion: No specific first aid measures are required. Do not induce vomiting. As a precaution, get medical advice.

Inhalation: No specific first aid measures are required. If exposed to excessive levels of material in the air, move the exposed person to fresh air. Get medical attention if coughing or respiratory discomfort occurs.

Note to Physicians: In an accident involving high-pressure equipment, this product may be injected under the skin. Such an accident may result in a small, sometimes bloodless, puncture wound. However, because of its driving force, material injected into a fingertip can be deposited into the palm of the hand. Within 24 hours, there is usually a great deal of swelling, discoloration, and intense throbbing pain. Immediate treatment at a surgical emergency center is recommended.

SECTION 5 FIRE FIGHTING MEASURES

Leaks/ruptures in high pressure system using materials of this type can create a fire hazard when in the vicinity of ignition sources (eg. open flame, pilot lights, sparks, or electric arcs).

FIRE CLASSIFICATION:

OSHA Classification (29 CFR 1910.1200): Not classified by OSHA as flammable or combustible.

NFPA RATINGS: Health: 0 Flammability: 1 Reactivity: 0

FLAMMABLE PROPERTIES:

Flashpoint: (Cleveland Open Cup) 170 °C (338 °F) Minimum

Autoignition: No data available

Flammability (Explosive) Limits (% by volume in air): Lower: Not Applicable Upper: Not Applicable

EXTINGUISHING MEDIA: Use water fog, foam, dry chemical or carbon dioxide (CO₂) to extinguish flames.

PROTECTION OF FIRE FIGHTERS:

Fire Fighting Instructions: This material will burn although it is not easily ignited. For fires involving this material, do not enter any enclosed or confined fire space without proper protective equipment, including self-contained breathing apparatus.

Combustion Products: Highly dependent on combustion conditions. A complex mixture of airborne solids, liquids, and gases including carbon monoxide, carbon dioxide, and unidentified organic compounds will be evolved when this material undergoes combustion.

SECTION 6 ACCIDENTAL RELEASE MEASURES

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Protective Measures: Eliminate all sources of ignition in vicinity of spilled material.
Spill Management: Stop the source of the release if you can do it without risk. Contain release to prevent further contamination of soil, surface water or groundwater. Clean up spill as soon as possible, observing precautions in Exposure Controls/Personal Protection. Use appropriate techniques such as applying non-combustible absorbent materials or pumping. Where feasible and appropriate, remove contaminated soil. Place contaminated materials in disposable containers and dispose of in a manner consistent with applicable regulations.

Reporting: Report spills to local authorities and/or the U.S. Coast Guard's National Response Center at (800) 424-8802 as appropriate or required.

SECTION 7 HANDLING AND STORAGE

Precautionary Measures: DO NOT USE IN HIGH PRESSURE SYSTEMS in the vicinity of flames, sparks and hot surfaces. Use only in well ventilated areas. Keep container closed.

General Handling Information: Avoid contaminating soil or releasing this material into sewage and drainage systems and bodies of water.

Static Hazard: Electrostatic charge may accumulate and create a hazardous condition when handling this material. To minimize this hazard, bonding and grounding may be necessary but may not, by themselves, be sufficient. Review all operations which have the potential of generating and accumulating an electrostatic charge and/or a flammable atmosphere (including tank and container filling, splash filling, tank cleaning, sampling, gauging, switch loading, filtering, mixing, agitation, and vacuum truck operations) and use appropriate mitigating procedures. For more information, refer to OSHA Standard 29 CFR 1910.106, 'Flammable and Combustible Liquids', National Fire Protection Association (NFPA 77, 'Recommended Practice on Static Electricity', and/or the American Petroleum Institute (API) Recommended Practice 2003, 'Protection Against Ignitions Arising Out of Static, Lightning, and Stray Currents'.

Container Warnings: Container is not designed to contain pressure. Do not use pressure to empty container or it may rupture with explosive force. Empty containers retain product residue (solid, liquid, and/or vapor) and can be dangerous. Do not pressurize, cut, weld, braze, solder, drill, grind, or expose such containers to heat, flame, sparks, static electricity, or other sources of ignition. They may explode and cause injury or death. Empty containers should be completely drained, properly closed, and promptly returned to a drum reconditioner or disposed of properly.

SECTION 8 EXPOSURE CONTROLS/PERSONAL PROTECTION

GENERAL CONSIDERATIONS:

Consider the potential hazards of this material (see Section 3), applicable exposure limits, job activities, and other substances in the work place when designing engineering controls and selecting personal protective equipment. If engineering controls or work practices are not adequate to prevent exposure to harmful levels of this material, the personal protective equipment listed below is recommended. The user should read and understand all instructions and limitations supplied with the equipment since protection is usually provided for a limited time or under certain circumstances.

ENGINEERING CONTROLS:

Use in a well-ventilated area.

PERSONAL PROTECTIVE EQUIPMENT

Eye/Face Protection: No special eye protection is normally required. Where splashing is possible, wear safety glasses with side shields as a good safety practice.

Skin Protection: No special protective clothing is normally required. Where splashing is possible, select protective clothing depending on operations conducted, physical requirements and other substances in the workplace. Suggested materials for protective gloves include: 4H (PE/EVAL), Nitrile Rubber, Silver

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Shield, Viton.

Respiratory Protection: No respiratory protection is normally required. If user operations generate an oil mist, determine if airborne concentrations are below the occupational exposure limit for mineral oil mist. If not, wear an approved respirator that provides adequate protection from the measured concentrations of this material. For air-purifying respirators use a particulate cartridge. Use a positive pressure air-supplying respirator in circumstances where air-purifying respirators may not provide adequate protection.

Occupational Exposure Limits:

Component	Agency	TWA	STEL	Ceiling	Notation
Highly refined mineral oil (C15 - C50)	ACGIH	5 mg/m ³	10 mg/m ³	--	--
Highly refined mineral oil (C15 - C50)	OSHA Z-1	5 mg/m ³	--	--	--

Consult local authorities for appropriate values.

SECTION 9 PHYSICAL AND CHEMICAL PROPERTIES

Attention: the data below are typical values and do not constitute a specification.

Color: Yellow

Physical State: Liquid

Odor: Petroleum odor

pH: Not Applicable

Vapor Pressure: <0.01 mmHg @ 37.8 °C (100 °F)

Vapor Density (Air = 1): >1

Boiling Point: >315°C (599°F)

Solubility: Soluble in hydrocarbon solvents; insoluble in water.

Freezing Point: Not Applicable

Density: 0.87 kg/l @ 15°C (59°F) (Typical)

Viscosity: 28.8 mm²/s @ 40°C (104°F) Minimum

SECTION 10 STABILITY AND REACTIVITY

Chemical Stability: This material is considered stable under normal ambient and anticipated storage and handling conditions of temperature and pressure.

Incompatibility With Other Materials: May react with strong acids or strong oxidizing agents, such as chlorates, nitrates, peroxides, etc.

Hazardous Decomposition Products: None known (None expected)

Hazardous Polymerization: Hazardous polymerization will not occur.

SECTION 11 TOXICOLOGICAL INFORMATION

IMMEDIATE HEALTH EFFECTS

Eye Irritation: The eye irritation hazard is based on evaluation of data for similar materials or product components.

Skin Irritation: The skin irritation hazard is based on evaluation of data for similar materials or product components.

Skin Sensitization: The skin sensitization hazard is based on evaluation of data for similar materials or product components.

Acute Dermal Toxicity: The acute dermal toxicity hazard is based on evaluation of data for similar materials or product components.

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Acute Oral Toxicity: The acute oral toxicity hazard is based on evaluation of data for similar materials or product components.

Acute Inhalation Toxicity: The acute inhalation toxicity hazard is based on evaluation of data for similar materials or product components.

ADDITIONAL TOXICOLOGY INFORMATION:

This product contains petroleum base oils which may be refined by various processes including severe solvent extraction, severe hydrocracking, or severe hydrotreating. None of the oils requires a cancer warning under the OSHA Hazard Communication Standard (29 CFR 1910.1200). These oils have not been listed in the National Toxicology Program (NTP) Annual Report nor have they been classified by the International Agency for Research on Cancer (IARC) as; carcinogenic to humans (Group 1), probably carcinogenic to humans (Group 2A), or possibly carcinogenic to humans (Group 2B). These oils have not been classified by the American Conference of Governmental Industrial Hygienists (ACGIH) as: confirmed human carcinogen (A1), suspected human carcinogen (A2), or confirmed animal carcinogen with unknown relevance to humans (A3).

SECTION 12 ECOLOGICAL INFORMATION

ECOTOXICITY

This material is not expected to be harmful to aquatic organisms. The ecotoxicity hazard is based on an evaluation of data for the components or a similar material.

ENVIRONMENTAL FATE

Ready Biodegradability: This material is not expected to be readily biodegradable. The biodegradability of this material is based on an evaluation of data for the components or a similar material.

SECTION 13 DISPOSAL CONSIDERATIONS

Use material for its intended purpose or recycle if possible. Oil collection services are available for used oil recycling or disposal. Place contaminated materials in containers and dispose of in a manner consistent with applicable regulations. Contact your sales representative or local environmental or health authorities for approved disposal or recycling methods.

SECTION 14 TRANSPORT INFORMATION

The description shown may not apply to all shipping situations. Consult 49CFR, or appropriate Dangerous Goods Regulations, for additional description requirements (e.g., technical name) and mode-specific or quantity-specific shipping requirements.

DOT Shipping Description: PETROLEUM LUBRICATING OIL, NOT REGULATED AS A HAZARDOUS MATERIAL FOR TRANSPORTATION UNDER 49 CFR

IMO/IMDG Shipping Description: PETROLEUM LUBRICATING OIL; NOT REGULATED AS DANGEROUS GOODS FOR TRANSPORT UNDER THE IMDG CODE

ICAO/IATA Shipping Description: PETROLEUM LUBRICATING OIL; NOT REGULATED AS DANGEROUS GOODS FOR TRANSPORT UNDER ICAO TI OR IATA DGR

SECTION 15 REGULATORY INFORMATION

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EPCRA 311/312 CATEGORIES:

- 1. Immediate (Acute) Health Effects: NO
- 2. Delayed (Chronic) Health Effects: NO
- 3. Fire Hazard: NO
- 4. Sudden Release of Pressure Hazard: NO
- 5. Reactivity Hazard: NO

REGULATORY LISTS SEARCHED:

- 01-1=IARC Group 1
- 01-2A=IARC Group 2A
- 01-2B=IARC Group 2B
- 02=NTP Carcinogen
- 03=EPCRA 313
- 04=CA Proposition 65
- 05=MA RTK
- 06=NJ RTK
- 07=PA RTK

No components of this material were found on the regulatory lists above.

CHEMICAL INVENTORIES:

All components comply with the following chemical inventory requirements: AICS (Australia), DSL (Canada), EINECS (European Union), ENCS (Japan), IECSC (China), KECI (Korea), PICCS (Philippines), TSCA (United States).

NEW JERSEY RTK CLASSIFICATION:

Under the New Jersey Right-to-Know Act L. 1983 Chapter 315 N.J.S.A. 34:5A-1 et. seq., the product is to be identified as follows: PETROLEUM OIL (Hydraulic oil)

WHMIS CLASSIFICATION:

This product is not considered a controlled product according to the criteria of the Canadian Controlled Products Regulations.

SECTION 16 OTHER INFORMATION

NFPA RATINGS: Health: 0 Flammability: 1 Reactivity: 0

HMIS RATINGS: Health: 1 Flammability: 1 Reactivity: 0
 (0-Least, 1-Slight, 2-Moderate, 3-High, 4-Extreme, PPE:- Personal Protection Equipment Index recommendation, *- Chronic Effect Indicator). These values are obtained using the guidelines or published evaluations prepared by the National Fire Protection Association (NFPA) or the National Paint and Coating Association (for HMIS ratings).

LABEL RECOMMENDATION:

Label Category : INDUSTRIAL OIL 1 - IND1

REVISION STATEMENT: This revision updates the following sections of this Material Safety Data Sheet: 1,2,9,16

Revision Date: FEBRUARY 16, 2012

ABBREVIATIONS THAT MAY HAVE BEEN USED IN THIS DOCUMENT:

TLV - Threshold Limit Value	TWA - Time Weighted Average
STEL - Short-term Exposure Limit	PEL - Permissible Exposure Limit
	CAS - Chemical Abstract Service Number

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ACGIH - American Conference of Governmental Industrial Hygienists	IMO/IMDG Code	International Maritime Dangerous Goods
API - American Petroleum Institute	MSDS	Material Safety Data Sheet
CVX - Chevron	NFPA	National Fire Protection Association (USA)
DOT - Department of Transportation (USA)	NTP	National Toxicology Program (USA)
IARC - International Agency for Research on Cancer	OSHA Administration	Occupational Safety and Health

Prepared according to the OSHA Hazard Communication Standard (29 CFR 1910.1200) and the ANSI MSDS Standard (Z400.1) by the Chevron Energy Technology Company, 100 Chevron Way, Richmond, California 94802.

The above information is based on the data of which we are aware and is believed to be correct as of the date hereof. Since this information may be applied under conditions beyond our control and with which we may be unfamiliar and since data made available subsequent to the date hereof may suggest modifications of the information, we do not assume any responsibility for the results of its use. This information is furnished upon condition that the person receiving it shall make his own determination of the suitability of the material for his particular purpose.

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To find more information about our other tools and products visit our website at:

www.InnovatechProducts.com

Contact us by E-Mail at:

Sales@InnovatechProducts.com

Contact us by Phone at:

1.800.267.6682

Contact us by U.S. Mail at:

832 80th ST SW
Everett, WA 98203, U.S.A.

