

ODP 100 PPS

***Click for
Parts Manual***



HOGG & DAVIS, Inc.

The information, specifications, and illustrations in this manual are on the basis of information available at the time it was written. The specifications, torque values, pressures of operation, measurements, adjustments, illustrations, and other items can change at any time.

These changes can affect the service of the given product.

For the complete and most current information, contact:

Hogg & Davis, Inc
P.O. Box 405 / 3800 Eagle Loop
Odell, OR 97044-0405
541-354-1001
541-354-1080 Fax

**For most recent manual
version please visit:**

www.hoggdavis.com

ODP 100 PPS 10,000 Lb Drum Puller

Table of Contents

Table of Contents	- 2 -
Product Warnings	- 3 -
General Specifications	- 4 -
Puller – Main Unit Curb Side.....	- 6 -
Puller – Main Unit – Street Side	- 7 -
Control Panel	- 8 -
Joystick Functions	- 9 -
Drive Engagement	- 11 -
Setup on the Job	- 12 -
Setup of the unit	- 12 -
Position of unit.....	- 12 -
Tie Down/ Brake/ Chock.....	- 12 -
Rope Payout Procedure (Free Wheel)	- 13 -
Pulling Computer	- 13 -
Operation	- 14 -
Set Pull	- 15 -
Pull Screen - MAIN	- 15 -
Hours Screen	- 17 -
System Screen.....	- 18 -
Joystick.....	- 19 -
Engine.....	- 20 -
Pulling Control	- 21 -
System Brakes.....	- 21 -
Level wind	- 21 -
LUBRICATION AND MAINTENANCE	- 21 -
Set Screws.....	- 22 -
15-15 Warranty.....	- 23 -
Parts and other manufacturer manuals.....	- 24 -



ODP 100 PPS 10,000 Lb Drum Puller

Product Warnings

⚠ DANGER

**AN UNTRAINED OPERATOR
SUBJECTS HIMSELF AND
OTHERS TO**

DEATH OR SERIOUS INJURY

**YOU MUST NOT OPERATE
THIS MACHINE UNLESS**

- You have been trained in the safe operation of this machine.
- You have read, understand and follow the safety and operating recommendations contained in the machine manufacturer's manuals, your employer's work rules and applicable government regulations.
- You are sure the machine is operating properly and has been inspected and maintained in accordance with the manufacturer's manuals.
- You are sure that all safety signs, guards and other safety features are in place and in proper condition.

© H&D, Inc. 1999

⚠ DANGER



**REACHING INTO REEL AREA
OR CONTACTING TURNING
REEL OR MOVING LINE
DURING OPERATION MAY
RESULT IN**

DEATH OR SERIOUS INJURY

© H&D, Inc. 1999

⚡ DANGER

**ELECTROCUTION HAZARD EXISTS
WHEN PULLING LINE OR
CONDUCTOR IS NEAR ENERGIZED
LINES. MAKE SURE MACHINE IS
PROPERLY GROUNDED AND
OPERATOR IS PROPERLY
PROTECTED.**

© H&D, Inc. 1999

⚠ DANGER



**JACKSTAND AND OUTRIGGER
CONTACT WILL CAUSE SERIOUS
CRUSHING INJURY.**

STAND CLEAR

⚠ WARNING



**Escaping fluid under pressure
can penetrate skin causing
serious injury.**

Relieve pressure before disconnecting hydraulic lines. Keep away from leaks and pin holes. Use a piece of cardboard or paper to search for leaks. Do not use your hand.

Fluid injected into skin must be surgically removed within a few hours by a doctor familiar with this type injury or gangrene will result.

© H&D, Inc. 1999

These warning labels and others like it are placed in critical areas of the machine. The warnings are to be read and fully understood prior to operation of the unit.

ODP 100 PPS 10,000 Lb Drum Puller

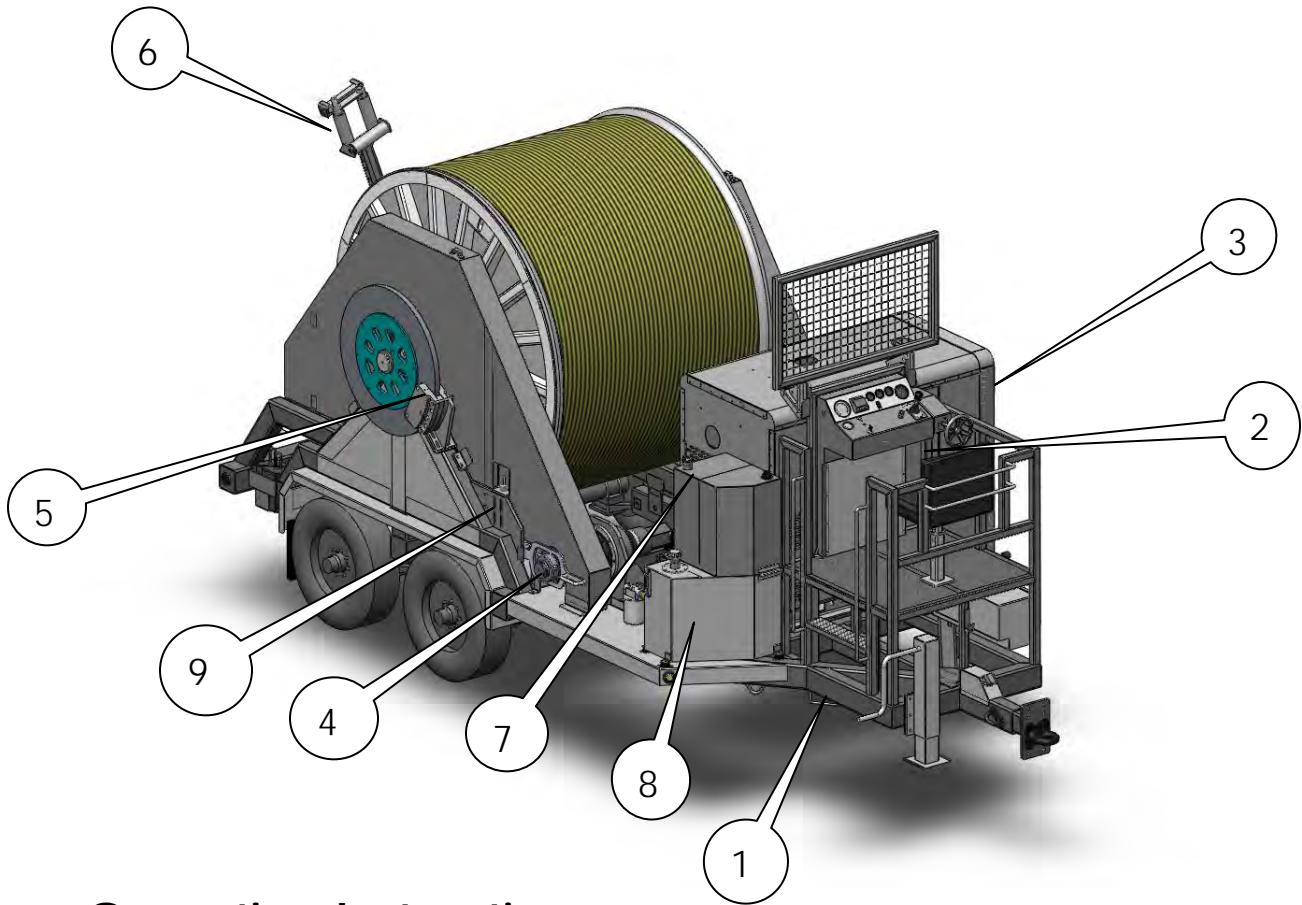
General Specifications

This unit is designed to install overhead cable/conductor.

- Single Reel Puller
- Pulling Computer
- Constant Line Pull System
- 10,000 lbs Maximum Line Pull
- 185 hp John Deere Tier III Diesel
- 20,000' of 1" synthetic rope capacity
- Post Style Level wind
- Dual Drive System
- Fuel Capacity – 26 Gallons
- Hydraulic Oil Capacity – 37 Gallons



ODP 100 PPS 10,000 Lb Drum Puller



Operating Instructions

All persons operating this machine must read and understand this manual as well as the operating, danger, and warning decals placed on the machine. Failure to read and understand these items subjects the operator and others to **DEATH or SERIOUS INJURY**.

Operators shall make themselves familiar with the placement of the following operating and safety features of the machine.

ODP 100 PPS 10,000 Lb Drum Puller

Puller – Main Unit Curb Side

1. Grounding Lugs. There are two lugs welded to the front of the trailer tongue as well as one welded to the rear of the trailer.
They are to be used for grounding only.
2. Operators Station
3. Hydraulic Oil Cooler. This unit transfers the heat from the hydraulic oil during use. It is to be kept clean and clear of dust and debris. Failure to do so may increase hydraulic system operating temperature and may also damage the components in the system.
4. Drive Dog Clutches. There is a unit located on both sides. These are the primary drives for the pulling operation. They are able to be engaged and disengaged by removing the drive pin and pulling or pushing on the lever provided. **DO NOT OPERATE THE UNIT WITHOUT BOTH DRIVES ENGAGED.** It may be necessary for the operator to rotate the reel to allow for the drive dogs to be engaged. Placing pressure on the lever while rotating the reel allows for this to happen. **NEVER OPERATE THE UNIT WITHOUT THE PINS ENGAGED.**
5. Brake Rotor and Caliper. This brake system is for use during the free wheel payout of the installation rope. During the free wheel operation of the unit, this rotor will become extremely hot. **DO NOT OPERATE THE PULLING FUNCTION OF THIS UNIT WHILE THE BRAKE SYSTEM IS APPLIED.**
6. Levelwind. This unit is controlled by a momentary switch on the operators console. It is independently operated.
7. Fuel Tank . 26 gallons. **DEISEL FUEL ONLY**
8. Hydraulic Tank. ISO 46 or equivalent . 37 gallons
9. Drive Chain Tensioner.

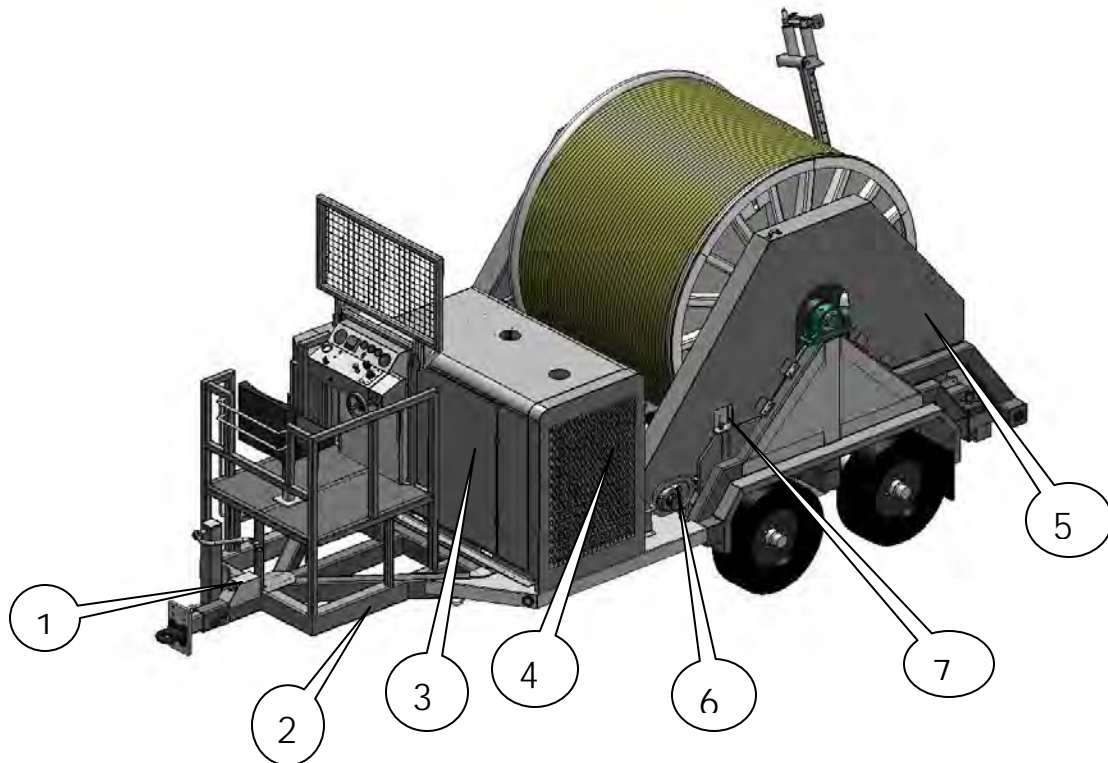


"Rugged Dependability."

© COPYRIGHT 2013 HOGG & DAVIS, INC



ODP 100 PPS 10,000 Lb Drum Puller



Puller – Main Unit – Street Side

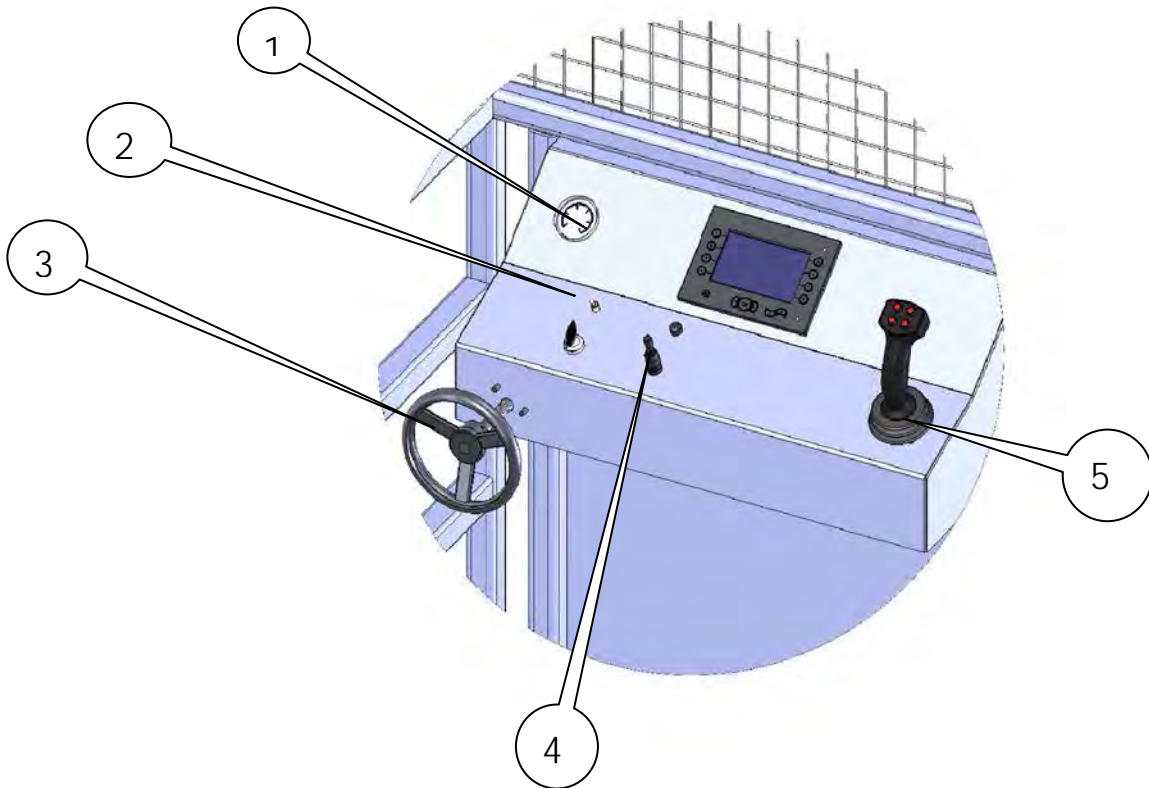
1. Lighting Connector
2. Grounding Lug
3. Engine Access
4. Oil cooler and radiator
5. Chain Guards. Located on both sides of large secondary sprocket. **DO NOT OPERATE PULLER WITHOUT GUARDS IN PLACE.**
6. Drive Dog Clutches. There is a unit located on both sides. These are the primary drives for the pulling operation. They are able to be engaged and disengaged by removing the drive pin and pulling or pushing on the lever provided. **DO NOT OPERATE THE UNIT WITHOUT BOTH DRIVES ENGAGED.** It may be necessary for the operator to rotate the reel to allow for the drive dogs to be engaged. Placing pressure on the lever while rotating the reel allows for this to happen.

ODP 100 PPS 10,000 Lb Drum Puller

NEVER OPERATE THE UNIT WITHOUT THE PINS ENGAGED.

7. Drive Chain Tensioner

Control Panel

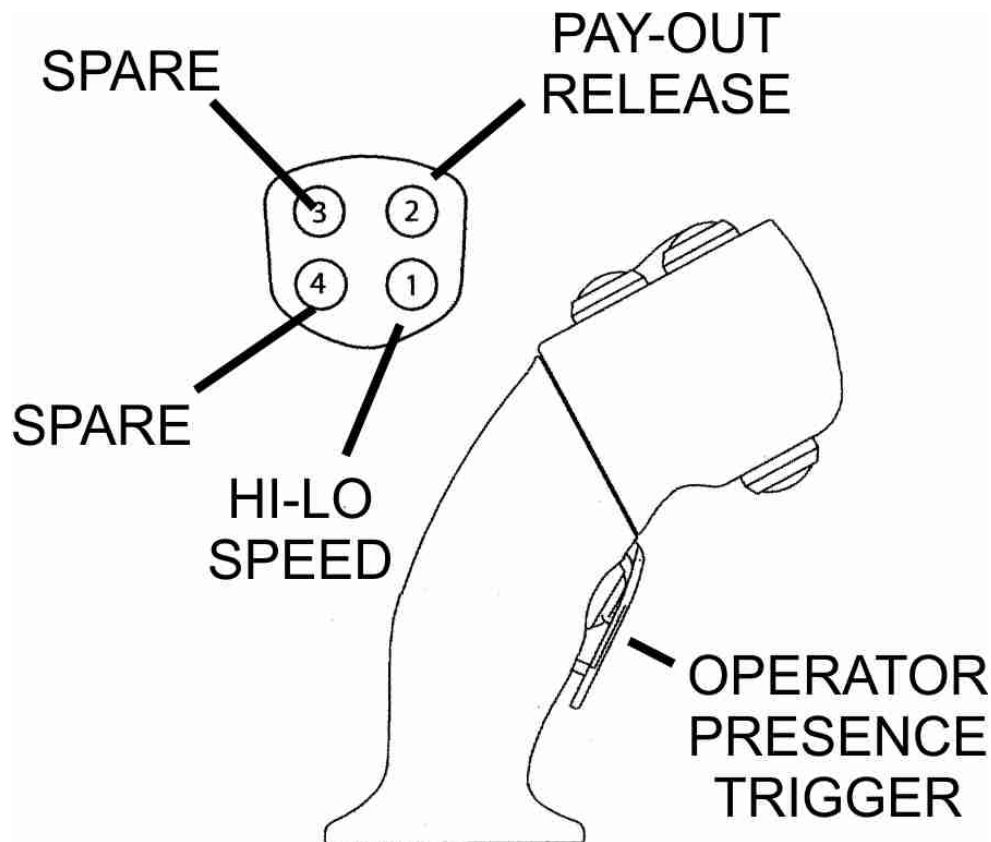


1. Over spin Brake Pressure. This gauge displays the pressure at which the Over spin Brake is operating. **DO NOT EXCEED 600 PSI.**
2. Sensor Heat. In cold conditions, it may be necessary to heat the pulling sensor for a few minutes prior to operation

ODP 100 PPS 10,000 Lb Drum Puller

3. Over spin Brake. This controls the over spin brake and at what pressure you apply. Clockwise to apply and counter clockwise to release. **DO NOT OPERATE PULLER WITH BRAKE APPLIED.** Damage to the brake caliper and rotor may occur as well as providing false pressure readings.
4. Level wind control.
5. Joystick. This joystick is a friction style control. It has a positive stop but releasing control will NOT return control to neutral. In order to stop pull, operator must return joystick to neutral.

Joystick Functions



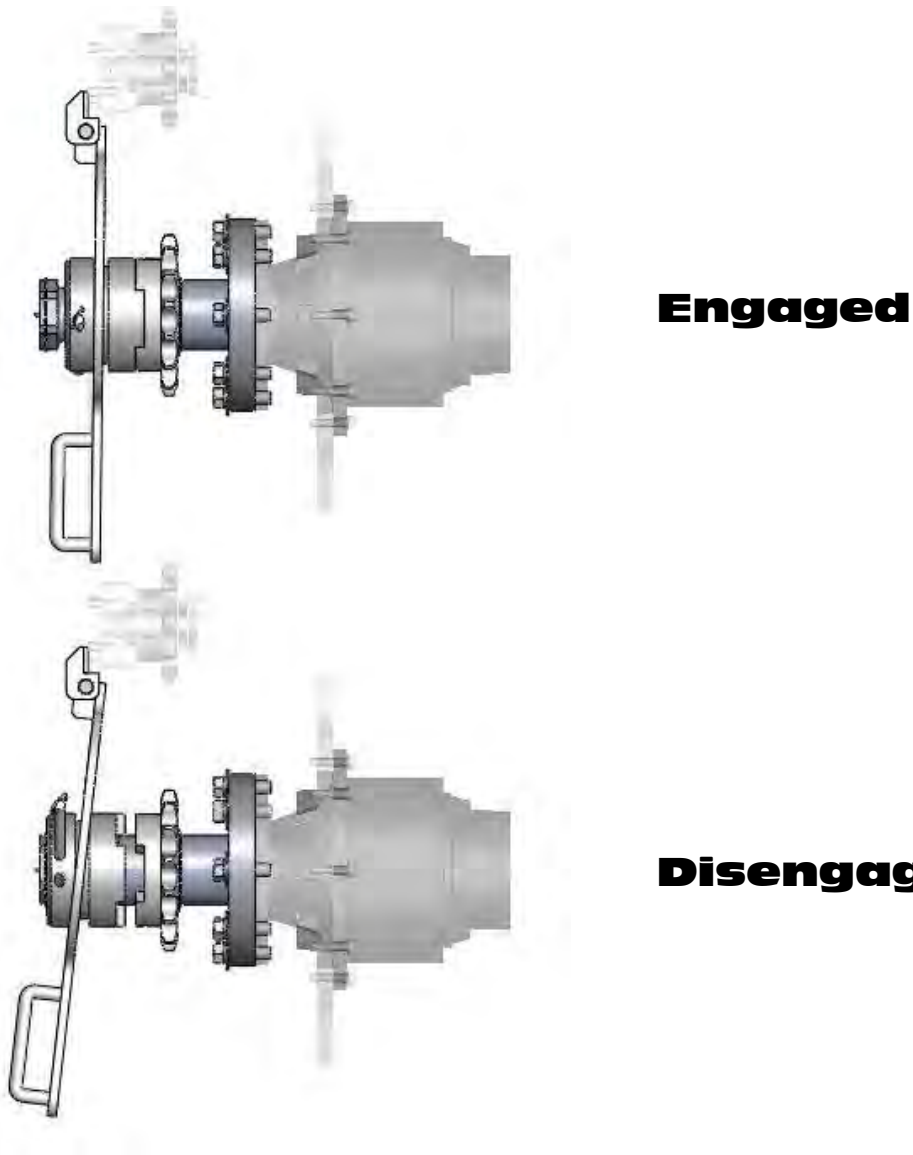
ODP 100 PPS 10,000 Lb Drum Puller

- Pay Out Release. This button must be pressed while attempting to pay out under power. By pressing the Operator Presence Trigger while pressing the Pay Out Release, moving the Joystick towards the Pay Out position will allow the reel to pay out under power. Once the reel begins to pay out, these buttons may be released. The Pay Out Lockout will automatically reset when the Joystick is returned to neutral.
- Hi-Lo Speed. Pressing this button during take up or payout will manually shift the pull speed. Although the computer is still in control of the maximum line speed and line pull and it will not be exceeded.
- Operator Presence Trigger. This must be pressed during the beginning of all Joystick functions. Once the unit is working, it may be released. The trigger will reset when the Joystick is returned to neutral.

Warning: These functions are present to protect the operator and the crews on the ground. If any of these are not functioning properly, contact vendor immediately. These are not to be circumvented in any way. Creating shortcuts to control machines of this nature can cause SERIOUS INJURY or DEATH to those operating this machine and those that are working with it.



ODP 100 PPS 10,000 Lb Drum Puller



Drive Engagement

Above is a top view of the drive dog couplers in their engaged and disengaged state. Please be sure all clutch pins are installed when engaged and disengaged, or damage may occur.

ODP 100 PPS 10,000 Lb Drum Puller

Setup on the Job

Setup of the unit

Hogg & Davis, Inc. recommends following the methods described in the following publications:

IEEE Std 524-1992

IEEE Guide to the Installation of Overhead Transmission Line Conductors

IEEE Std 542a-1993

IEEE Guide to Grounding During the Installation of Overhead Transmission Line Conductors

Position of unit

Position the unit with the centerline of the trailer in line with the pull. Place the unit at a minimum of two times the height of the first block. Positioning the unit this way decreases the stress on the level wind system.

Tie Down/ Brake/ Chock

Chock all wheels and set brakes (if applicable). It should be noted that the fully loaded puller weight may exceed the tension desired during the pull. As the pull progresses, the weight of the puller may increase or decrease, therefore proper securing procedures should be followed during operation.



"Rugged Dependability."

© COPYRIGHT 2013 HOGG & DAVIS, INC



ODP 100 PPS 10,000 Lb Drum Puller

Rope Payout Procedure (Free Wheel)

When beginning the rope payout feature, be sure that the engine is turned off. Ensure that all tension is removed from the pulling rope before attempting to release drive dogs.

Adjust reel brake to provide tension to the reel of rope. Disengage the drive dog(s) from the sprocket drive(s). Begin to pull rope through the blocks while continuing to adjust the over spin brake. When the rope install is completed, engage both of the sprocket drives.

******These instructions assume that the operator has set the proper drive dog(s) for the reel to be pulled in.***

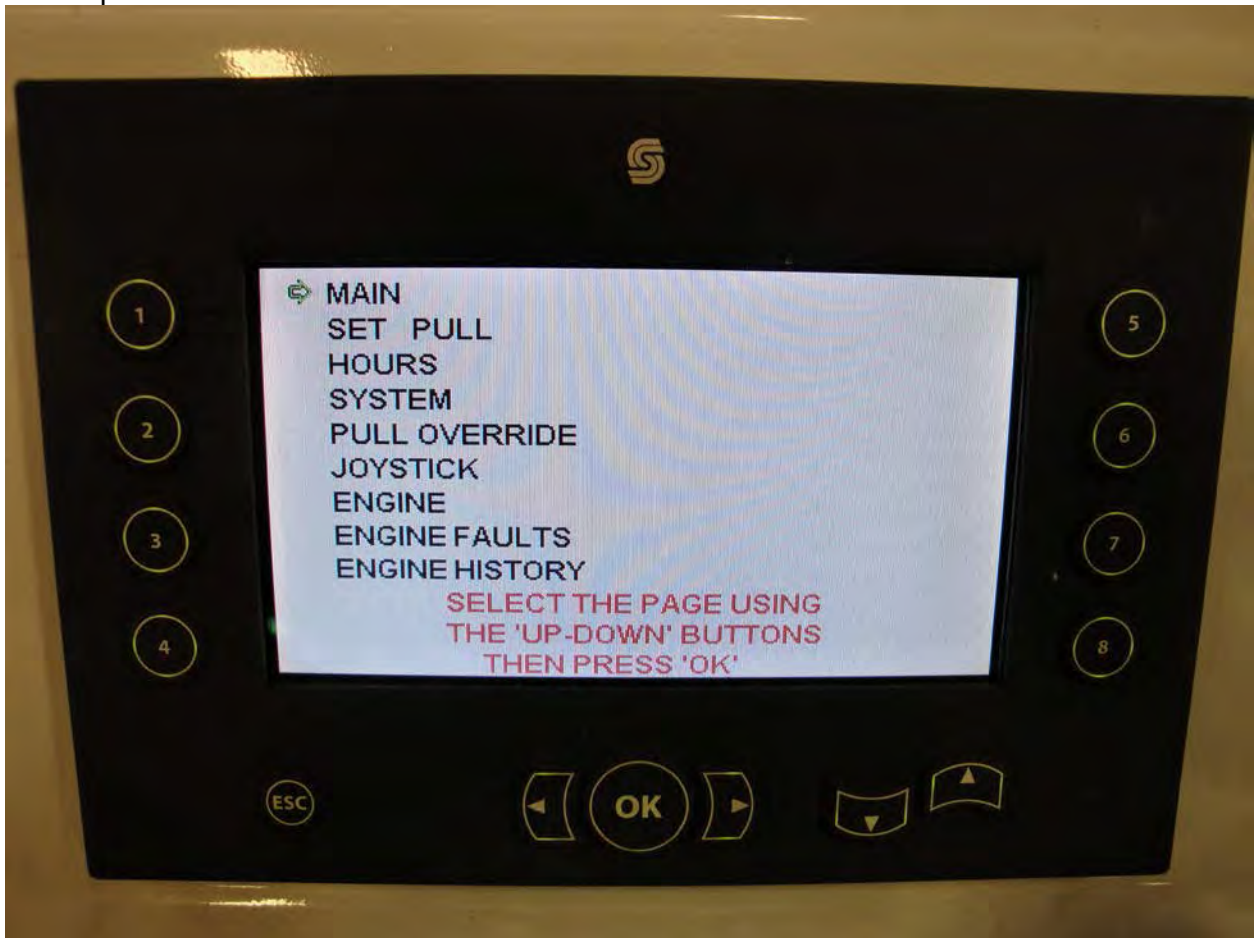
Pulling Computer

This unit is equipped with a computer control that allows the operator to preset the Maximum Line Pull as well as the Maximum Line Speed. During the pull, no matter the length of cable in the air, the computer calculates the drum diameter and adjusts the hydraulic system to provide a constant pulling control. Throughout the pull, the Line Pull and the Line Speed will be maintained at a constant set by the operator. This type of system allows for greater control of the overall pull, as well as eliminating the "estimation process" and constant adjustment of hydraulic system to maintain the maximum preset.

ODP 100 PPS 10,000 Lb Drum Puller

Operation

Setup Screen. Select the page using the "up-down" buttons and then press enter.



ODP 100 PPS 10,000 Lb Drum Puller

Set Pull

There can be up to four preset "Pulls" in the computer at one time. They are labeled, Pull 1-4 and utilize the corresponding buttons on the left hand side of the pulling computer control.

Select the pull you wish to modify and increase the Maximum Pull by using the "up-down" buttons. When the desired Line Pull Max is set, press enter.

The computer can also control the line speed for that set pull. The buttons on the right side of the pulling computer 5-8 correspond with the pulls set 1-4. Pressing the 5-8 buttons will allow the operator to set the maximum Line Speed for the pull. FPM and MPH are both displayed. They are set relevant to the other. Example 352 FPM = 4.0 MPH.

When the Maximum Line Pull and Line Speed are set, press the ESC key and return to Pull Screen.

Pull Screen - MAIN

The pull screen displays the most needed displays for the pull.

- Pull – This displays the Current Line Pull in lbs. NOT THE MAXIMUM
- Fuel – Fuel Level in the Puller tank.
- Drum Diameter – Current diameter of the drum.
- FPM – Current FPM
- MPH – Current MPH
- Engine Gauges – This display's the engine temp, oil pressure, RPM PCT of Load and battery voltage.
- Throttle – The engine throttle is increased or decreased by using the Left-Right buttons on each side of the OK button.



"Rugged Dependability."

© COPYRIGHT 2013 HOGG & DAVIS, INC



ODP 100 PPS 10,000 Lb Drum Puller

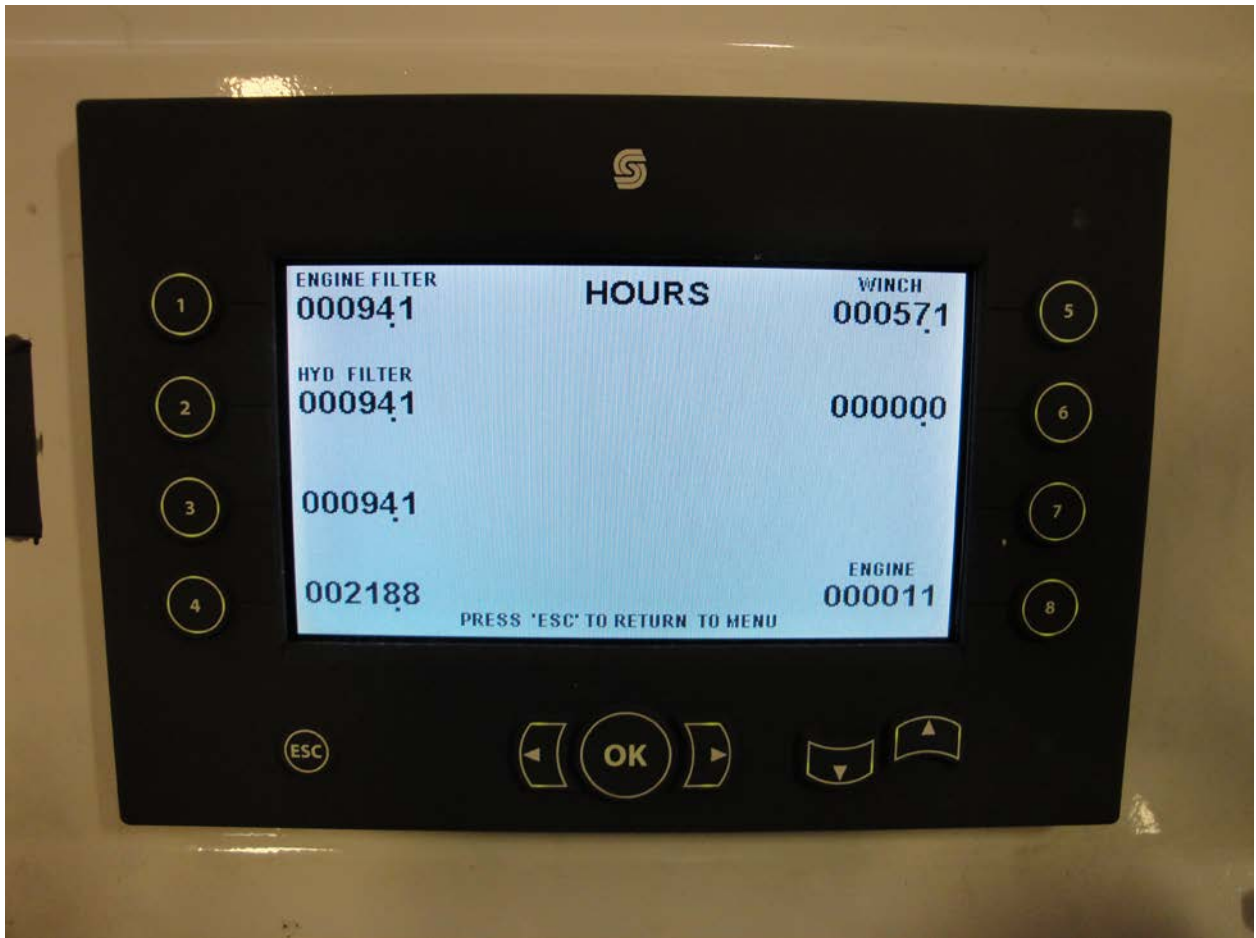
- Menu – Returns to the Main Menu Screen.
- Pull and Speed – Below the Menu label on the screen, the PRESET Maximum Line Pull and Speed are displayed.
- Select Pull – This button brings up the Select Pull Screen.
- Camera – If the unit is equipped, this will allow for remote viewing.



ODP 100 PPS 10,000 Lb Drum Puller

Hours Screen

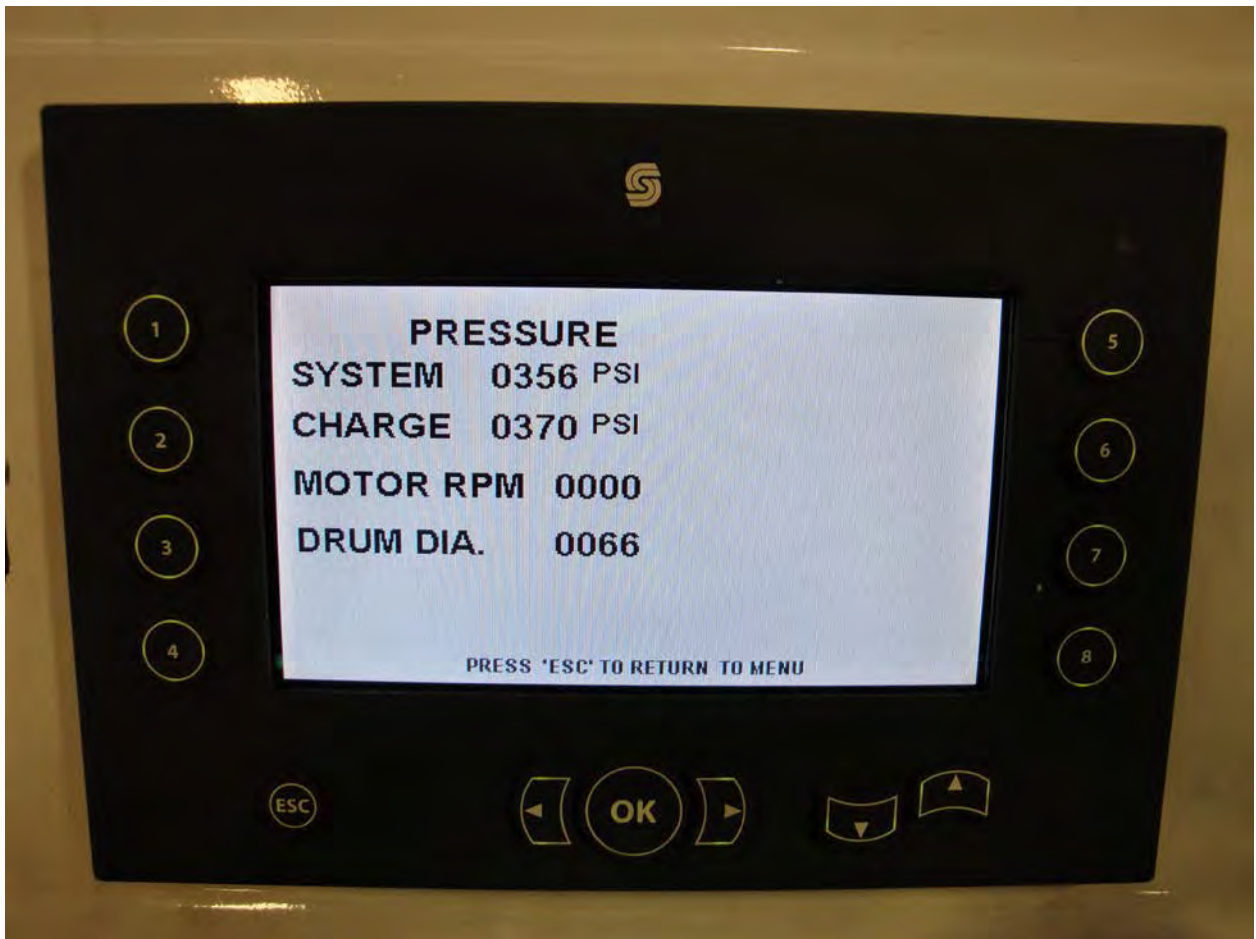
This screen displays the current hours on the engine oil filters, hydraulic oil filters, the time the winch has been activated (pay in and pay out time) and engine hours.



ODP 100 PPS 10,000 Lb Drum Puller

System Screen

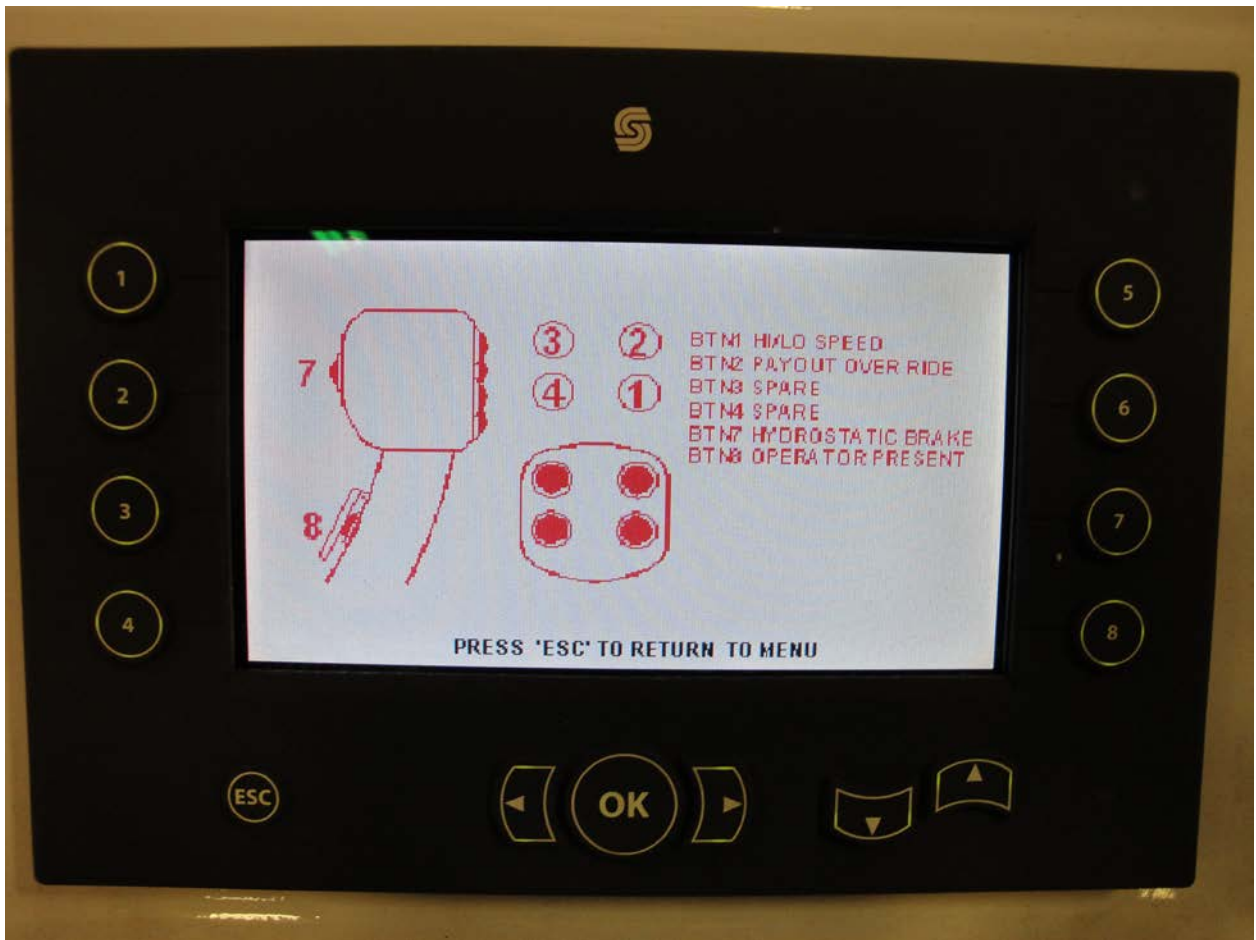
This screen displays the current System Pressure, Charge Pressure, Motor RPM, and the Drum Diameter. This screen is primarily used for troubleshooting.



ODP 100 PPS 10,000 Lb Drum Puller

Joystick

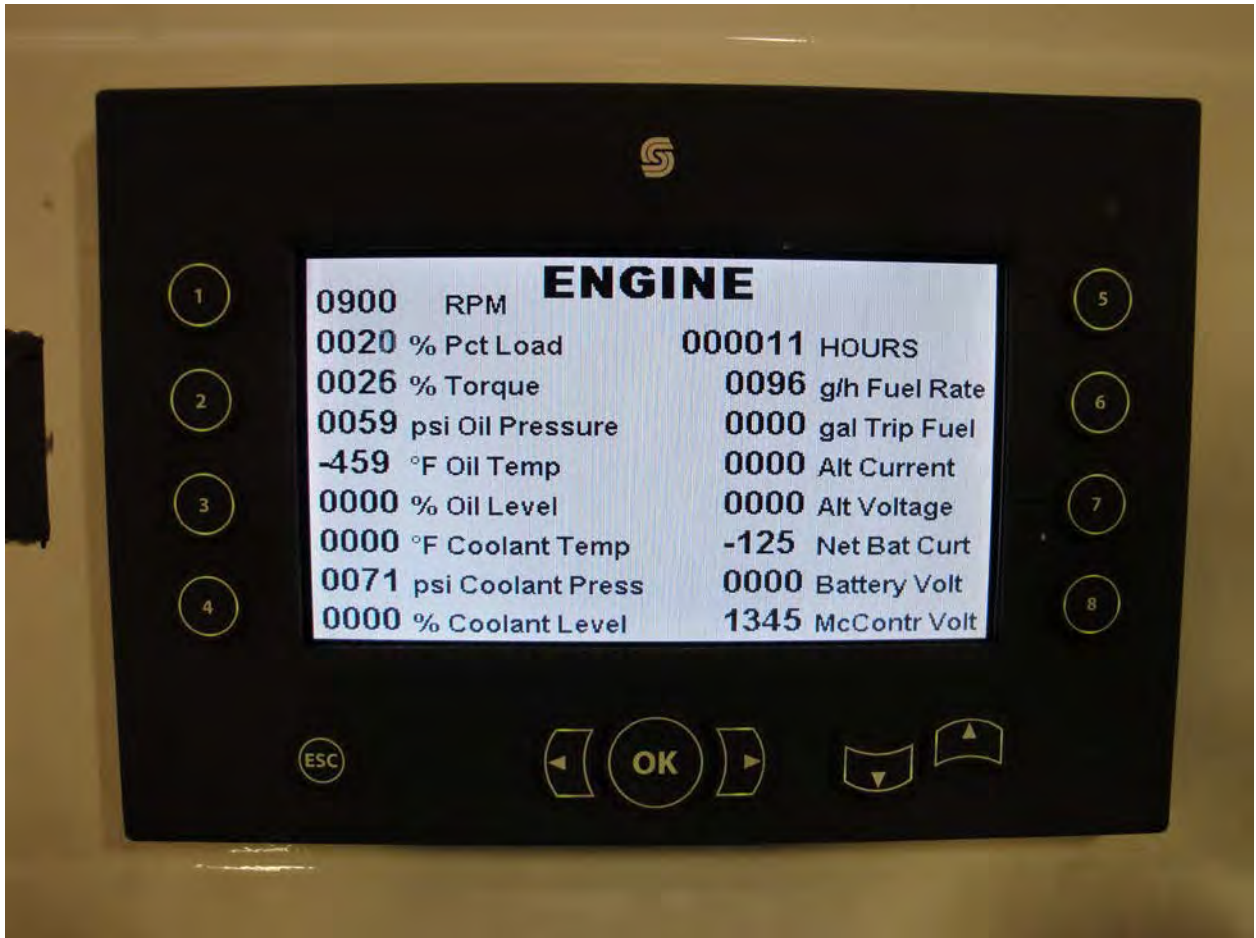
This screen gives a graphic display of the Joystick and its functions.



ODP 100 PPS 10,000 Lb Drum Puller

Engine

This screen displays all current information regarding the engine on the puller.



ODP 100 PPS 10,000 Lb Drum Puller

Pulling Control

The Following instructions explain how to properly set up the unit.

1. Release the hydraulic over spin brake.
2. Set Job Pull Settings on the Pull Computer.
3. Return computer to Main Screen.
4. Increase Throttle to 1500 RPM or desired setting.
5. Squeeze trigger and move Joystick to take up.
6. Adjust line speed with joystick.
7. Return joystick to neutral to stop pull and set holding brake.

System Brakes

The internal braking system is spring applied / hydraulic release on the drive motors. When the joystick is in neutral, the brakes are automatically applied

Level wind

This unit is equipped with manual post style level wind. Operator must control during pull as needed for even take up of rope on reel.

LUBRICATION AND MAINTENANCE

This unit has no set PM schedule beyond that of the engine manufacturers suggested maintenance schedule. This unit should be visually inspected prior to each use while repairing any and all discrepancies prior to use.

ODP 100 PPS 10,000 Lb Drum Puller

Items to be inspected prior to use are:

- Drive Chains and sprockets for wear and slack
- All welds and seams
- Loose or missing fasteners (bolts, nuts, set screws)
- Loose or leaking hydraulic hoses
- Damaged or worn hydraulic hoses
- Brake calipers (loose fittings, hoses, worn linings)
- Brake Pads (over spin brake)
- Brake rotors
- Tires and brakes
- Engine and hydraulic system fluid levels.
- Set screws (see set screw section)

Lubrication Schedule

- Drive chain and sprockets (daily)
- Reel Shaft Bearings (as needed)
- Reel Bearings (as needed)
- Engine oil as per manufacturers recommendation
- Idler sprocket (daily)
- Axle Bearings (as needed)
- Level wind grease fittings (as needed)

Set Screws

Due to the rugged nature of this machine. All set screws on the shafts, reels and bearings have a thread locker and may be double set screwed. Please do not assume that screws are tight when performing maintenance. When checking or tightening these set screws, remove the first and then tighten the first.



"Rugged Dependability."

© COPYRIGHT 2013 HOGG & DAVIS, INC



ODP 100 PPS 10,000 Lb Drum Puller

15-15 Warranty

Hogg and Davis, Inc. warrants its trailers against defects in material or workmanship for period of 15 months from the date of shipment from Hogg and Davis, Inc. (see General Conditions & Exceptions). Hogg and Davis, Inc. will replace, free of charge, F.O.B. Hogg and Davis, Inc. factory, such parts or parts thereof, that in their judgement have proven defective. Additionally, Hogg and Davis, Inc. will pay reasonable and customary labor charges when defective part is replaced, installed or repaired by a fully authorized Hogg and Davis, Inc. trailer dealer at his facility.

Warranty credit will be issued only upon receipt and inspection of defective parts of at the Hogg and Davis, Inc. factory.

Hogg and Davis, Inc. warrants its trailer main frame assemblies (except pintle eyes or other towing attachments, spindles and axles) against defects in material or workmanship for a period of **15 years** from the date of shipment from Hogg and Davis, Inc. (see General Conditions & Exceptions). Hogg and Davis, Inc. shall replace or repair, in a manner as it shall determine, free of charge, F.O.B. factory, any parts or parts thereof, that in its judgement have proven defective. Additionally, Hogg and Davis, Inc. will pay reasonable and customary labor charges when defective part is replaced, installed or repaired by a fully authorized Hogg and Davis, Inc. trailer dealer at his facility

General Conditions & Exceptions

All warranties, options and representations made herein shall apply only provide such equipment shall not have been subject to misuse, negligence or accident and has been operated in accordance with factory approved procedures. This warranty does not obligate Hogg and Davis, Inc. or its authorized dealers to bear the cost of parts obtained from or labor performed by unauthorized sources. Nor does it obligate Hogg and Davis, Inc. **or its** authorized dealers to bear the cost of transportation of parts or equipment for repair or **replacement purposes**. This warranty is in lieu of any other warranty, expressed **or implied**, or any other obligation or liability on the part of Hogg and Davis, Inc and no persons or entity is authorized to make any representation beyond those stated herein.

Hogg and Davis, Inc. shall not be held liable for consequential damage of any kind. Hogg and Davis, Inc. also reserves the right to make changes and improvements in its products without incurring any obligation to install any such changes or improvements upon its products previously manufactured.

The above warranty shall not be misconstrued to mean warranty of tires, clutch, transmission assemblies or customer requested accessory equipment other than the warranty extended by their respective manufactures to Hogg and Davis, Inc. In addition, friction, drive rollers are warranted only to extent of bonding failure. All warranties, options and representations made herein are applicable to the original end-user of the product and are not sellable or transferable in any manner.



"Rugged Dependability."

© COPYRIGHT 2013 HOGG & DAVIS, INC



ODP 100 PPS 10,000 Lb Drum Puller

Parts and other manufacturer manuals

The Following drawings are for part identification only. Please reference the unit V.I.N. number and the corresponding part number when ordering.

The information, specifications, and illustrations in this manual are on the basis of information available at the time it was written. The specifications, torque values, pressures of operation, measurements, adjustments, illustrations, and other items can change at any time. These changes can affect the service of the given product.

For the complete and most current information, contact:

Hogg & Davis, Inc
P.O. Box 405 / 3800 Eagle Loop
Odell, OR 97044-0405
541-354-1001
541-354-1080 Fax
www.hoggdavis.com

NOTES:



© COPYRIGHT 2013 HOGG & DAVIS, INC



Parts Manual



The information, specifications, and illustrations in this manual are on the basis of information available at the time it was written. The specifications, torque values, pressures of operation, measurements, adjustments, illustrations, and other items can change at any time. These changes can affect the service of the given product.

For the complete and most current information, contact:

Hogg & Davis, Inc
P.O. Box 405 / 3800 Eagle Loop
Odell, OR 97044-0405
541-354-1001
541-354-1080 Fax

For most recent manual
version please visit:
www.hoggdavis.com



"Rugged Dependability."

© COPYRIGHT 2013 HOGG & DAVIS, INC

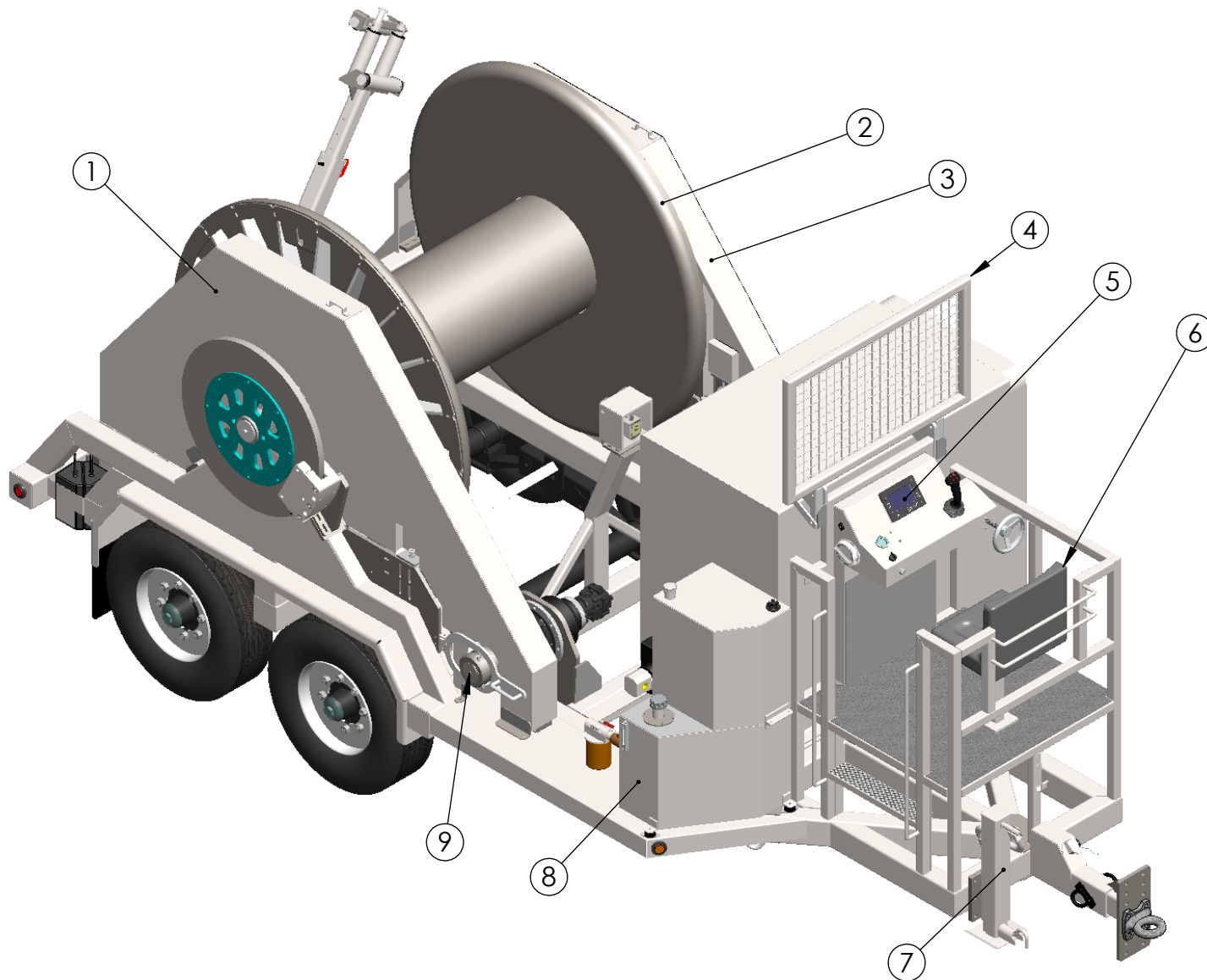


ver. 1.1

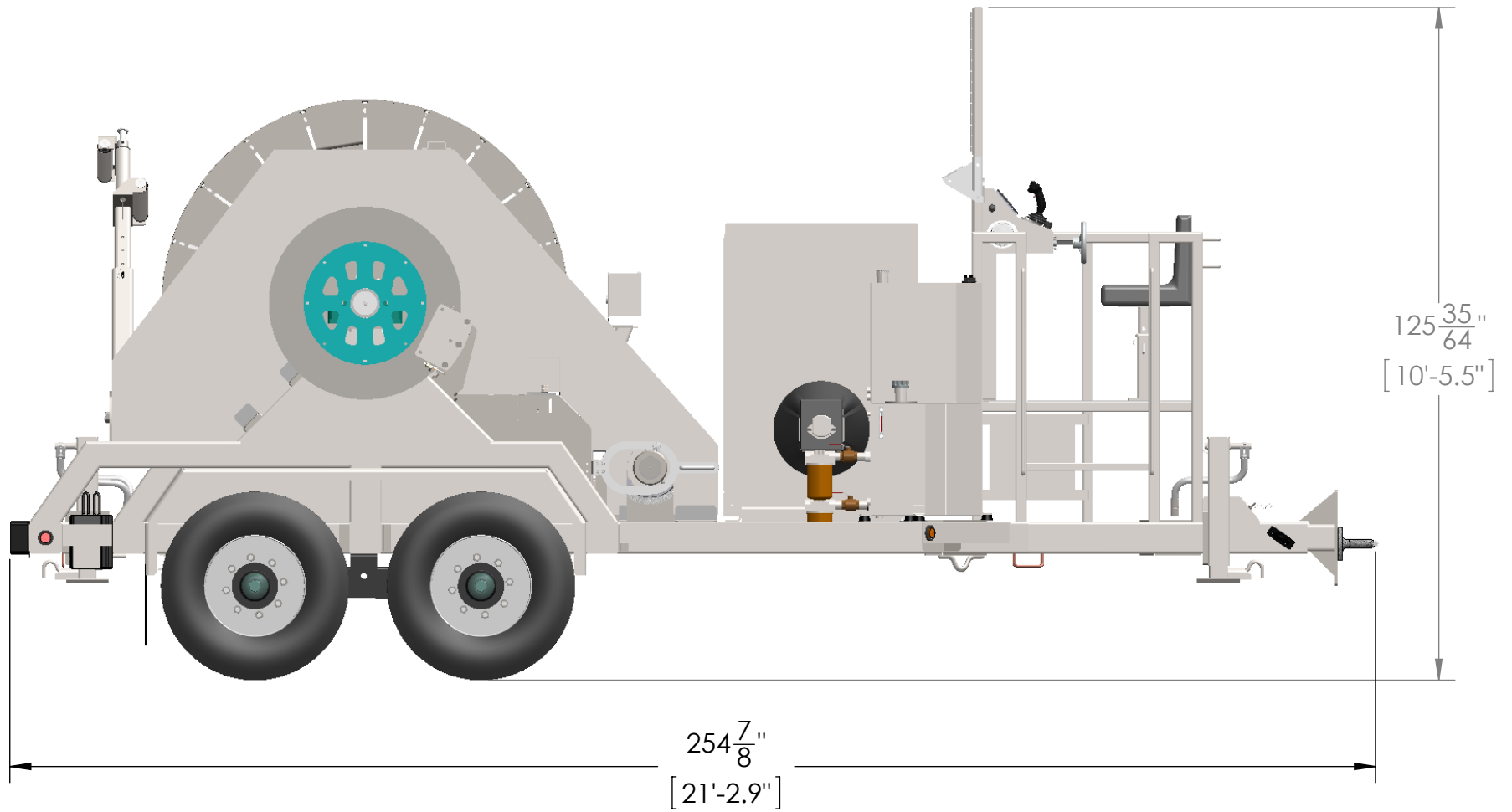
Table of Contents

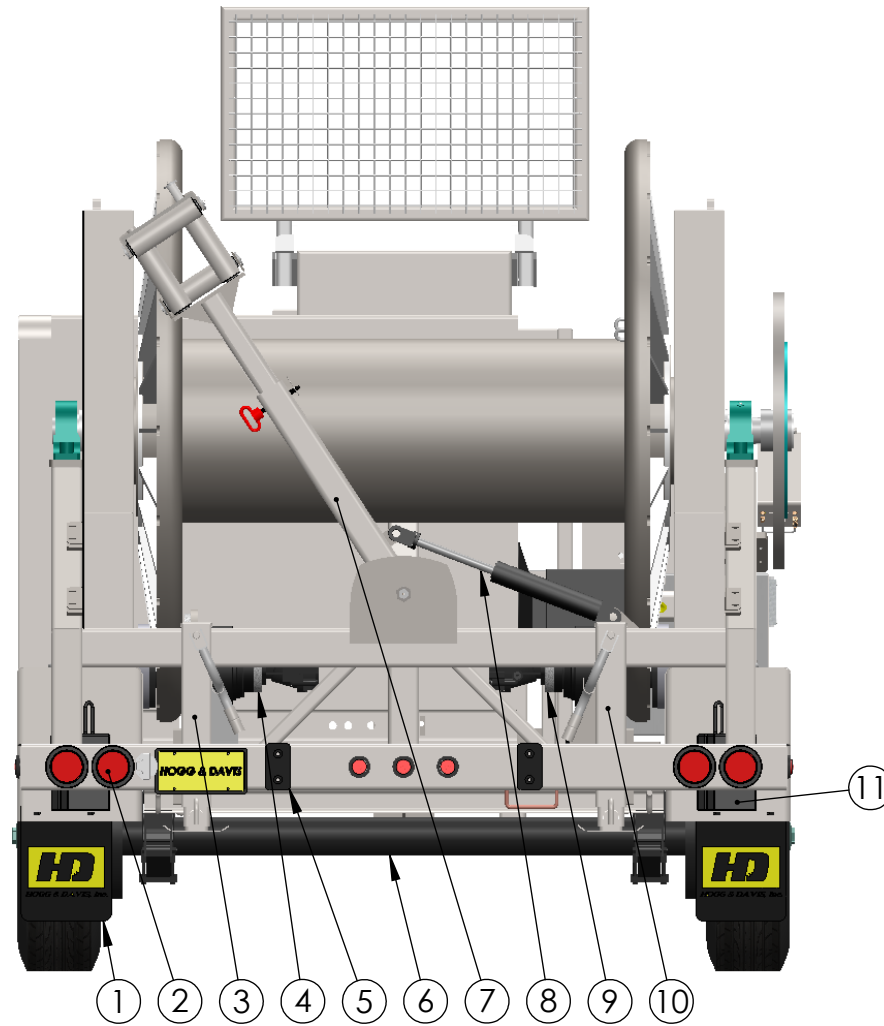
<i>Isometric View</i>	1
<i>Curbside View</i>	2
<i>Rear View</i>	3
<i>Reel Assembly</i>	4
<i>Brake Assembly</i>	5
<i>Overspin Brake</i>	6
<i>Levelwind Assembly</i>	7
<i>Planetary Drive</i>	8
<i>Engine/Pump Assembly</i>	9
<i>Operator Controls</i>	10
<i>HD Brake Cylinder</i>	12
<i>Hyd/Fuel Tanks</i>	13
<i>Operator Seat</i>	14
<i>Jackstands</i>	15
<i>Electrical Hood</i>	16
<i>LED Trailer Lights</i>	17
<i>Standard Trailer Lights</i>	18
<i>Electrical Schematics</i>	19-26
<i>Hydraulic Schematics</i>	27
<i>Wheel Torque Requirements</i>	28-29
<i>Decals/ Decal Locations</i>	30-35
<i>Brake Bleeding Inst.</i>	36



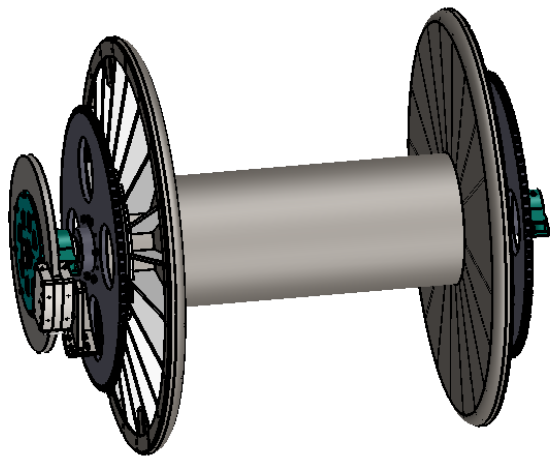
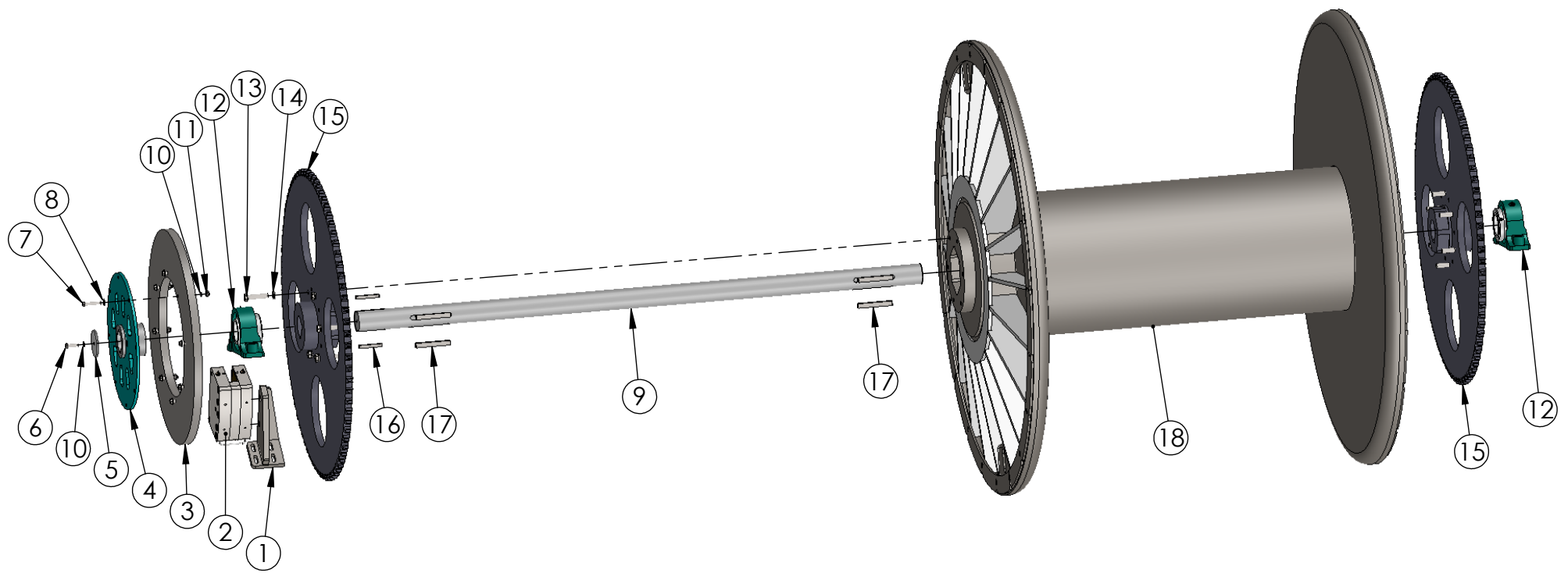


ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	G09226	Chain Guard RH	1
2	Reel Assembly	See Reel Assembly Sheet	1
3	G09225	Chain Guard LH	1
4	S08059	Screen Assembly	1
5	Controls	See Controls Sheet	1
6	Seat Assembly	See Seat Sheet	1
7	J04045	Street-Side Jack Assy.	1
8	Tank Assembly	See Tank Assembly	1
9	Drive Assembly	See Drive Assembly Sheet	1



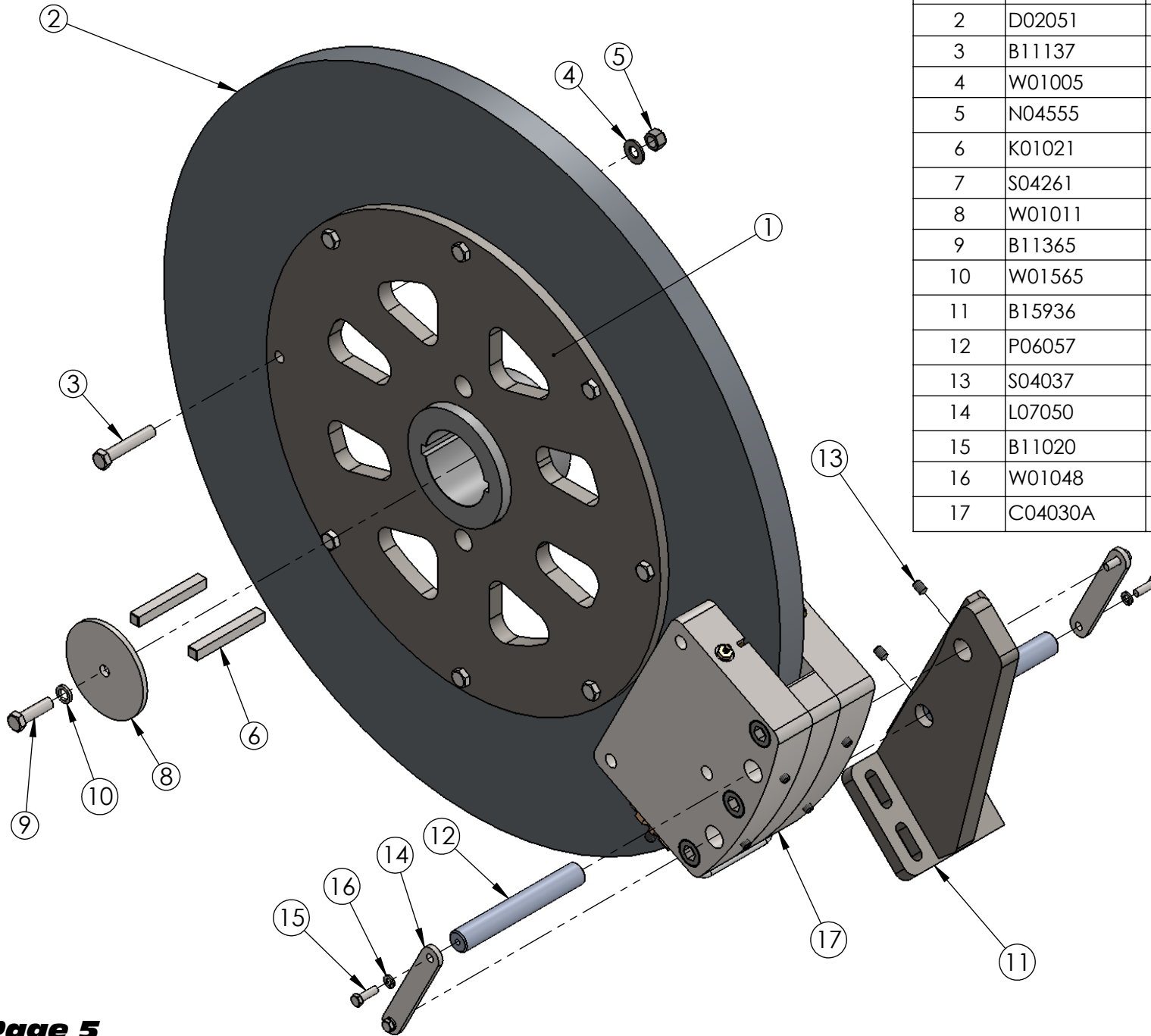


ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	F10010	Mud Flap	2
2	Lighting	See Lighting Sheets	1
3	J04047	Jackstand	1
4	Drive Assembly LH	See Planetary Drive Sheet	1
5	B20002	3X6 Bumper	2
6	A07115	AXLE	1
7	Levelwind Assembly	See Levelwind Sheet	1
8	C32020	Cylinder, Levelwind	1
9	Drive Assembly RH	See Planetary Drive Sheet	1
10	J04046	Jackstand	1
11	C12005	Wheel Chock	4

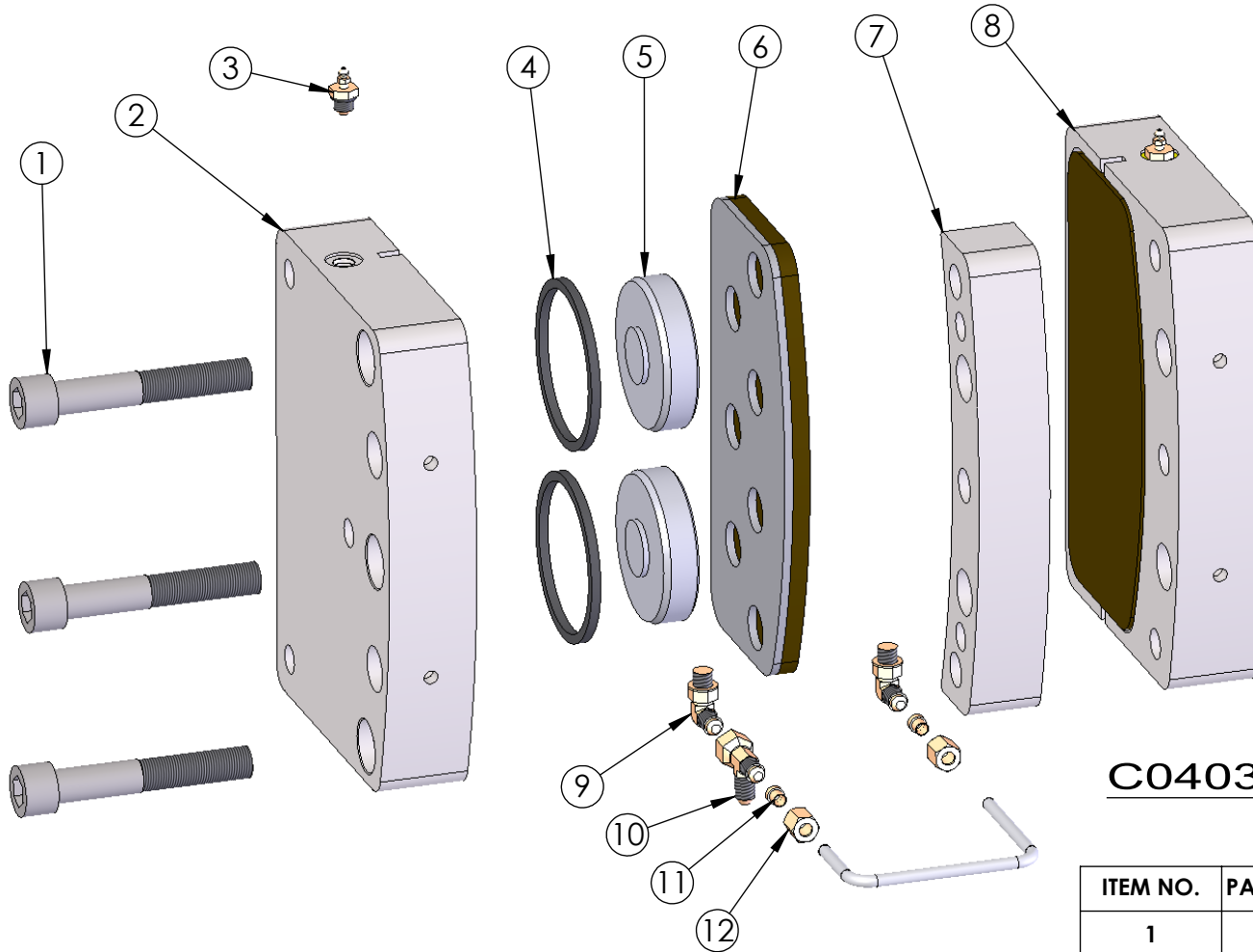


ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	B15936	Brake Caliper Mount	1
2	C04030A	10" HD Brake Caliper w/ spacer	1
3	D02045	Brake Disc	1
4	H09114	Hub, Brake Disc	1
5	W01011	Cap, Hub	1
6	B11365	Bolt Hx head 1/2-20x1-3/4	1
7	B11137	Bolt Hx head 1/2-13x2-3/4 Z8	8
8	W01005	Washer Flat SAE 1/2	8
9	S43051	Shaft, 3 7/16" Stress Proof	1
10	W01565	Washer, Split Lock 1/2"	9
11	N04555	Nut, Hex Nylock® 1/2"-13	8
12	B07406	Bearing, Pillow Block	2
13	B11464	Bolt Hx head 3/4-10x3-1/2 Z8	12
14	W01585	Washer Split Lock 3/4	12
15	S29071	Sprocket	2
16	K01021	Keystock, 1/2" x 4"	2
17	K01022	Keystock, 3/4"	4
18	R07021	ODP100 Reel	1

D02051: min. thickness - 1.1875"

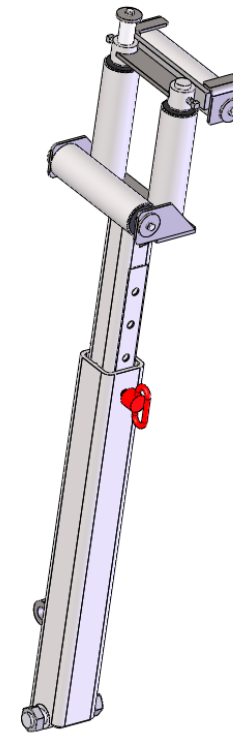
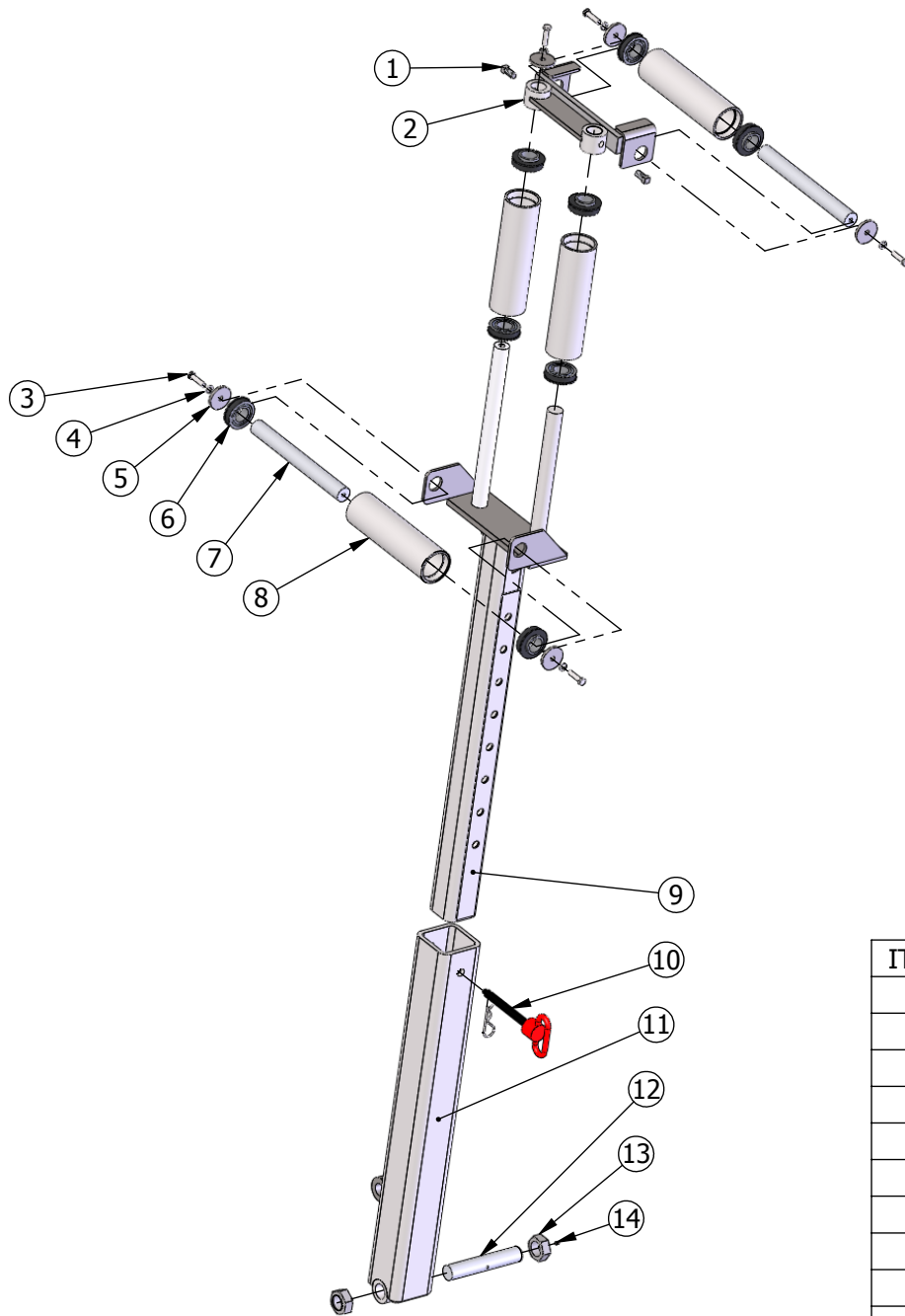


ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	H09114	Hub, Brake 36" x 20" Disc	1
2	D02051	Brake Disc	1
3	B11137	Bolt, Hx Head 1/2"-13 x 2-3/4" Z8	8
4	W01005	Washer, Flat SAE 1/2"zinc	8
5	N04555	Nut, Hx Nylock® 1/2"-13	8
6	K01021	Keystack, 1/2" x 4"	2
7	S04261	Screw, Set 1/2"-13 x 1/2" CP	2
8	W01011	1/4" PLATE	1
9	B11365	Bolt, Hx Head 1/2"-20 x 1-3/4"	1
10	W01565	Washer, Split Lock 1/2"zinc	1
11	B15936	Brake Caliper Mount	1
12	P06057	Pin, Caliper Mount	2
13	S04037	Screw, Set 3/8"-24x 1/2" CP	2
14	L07050	Link, Caliper Mounting	2
15	B11020	Bolt, Hx Head 5/16"-18 x 1"	4
16	W01048	Washer, Split Lock 5/16"zinc	4
17	C04030A	10" HD Brake Caliper w/ spacer	1



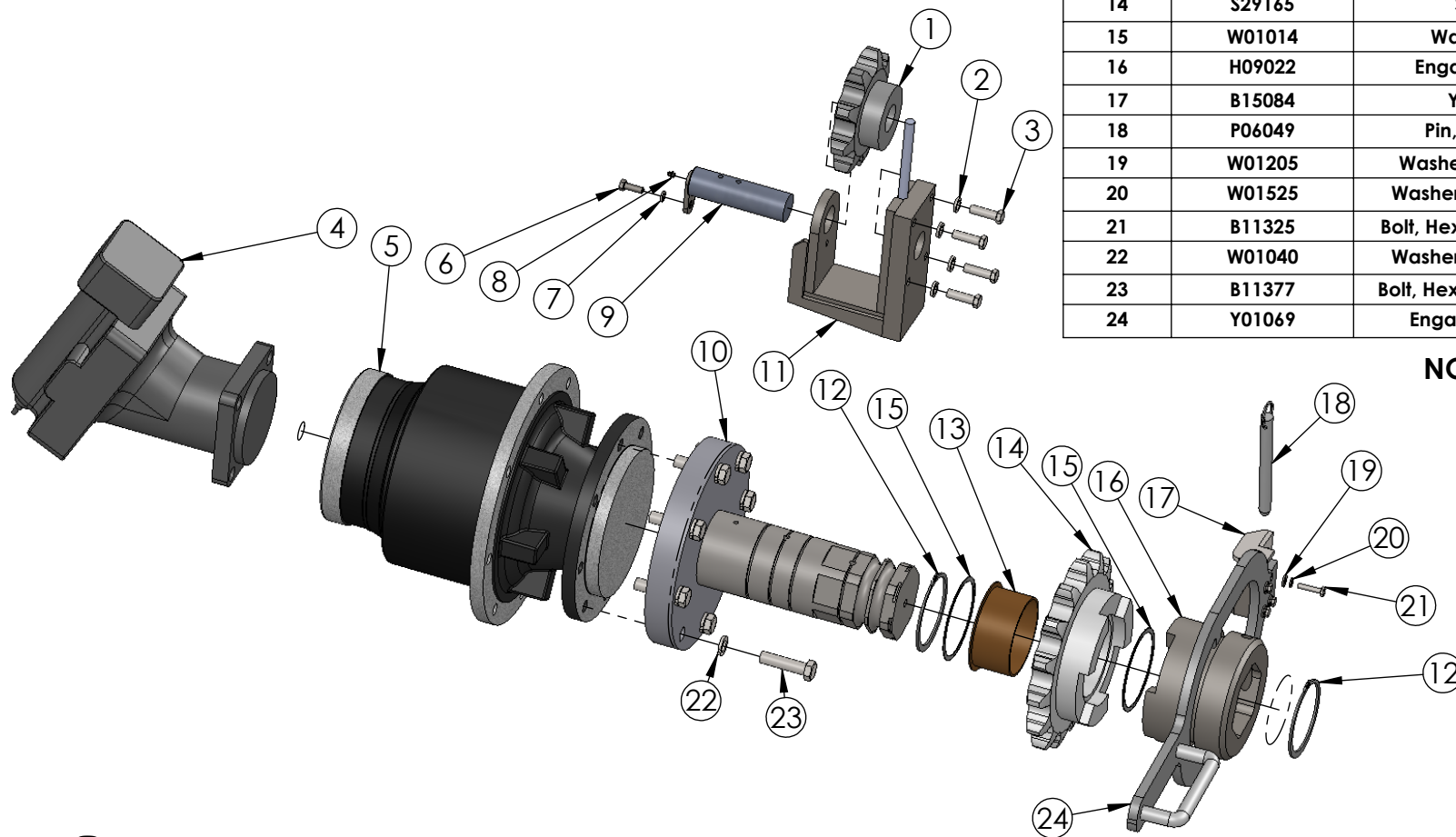
**C04030A--Complete Assembly
Contains all parts
Listed Below**

ITEM NO.	PART NUMBER	DESCRIPTION	Qty.
1	S04251	3/4-16 x 4-1/2 SHCS	3
2	C04035	Caliper Half, Countersink	1
3	B18005	Bleader, -4 o-ring	2
4	O01225	O-ring, Piston	4
5	P08004	3-3/8" Piston	4
6	P01011	10" HD Brake Pad	2
7	S24017	Spacer, 10" Hd caliper	1
8	C04036	Caliper Half, Threaded	1
9	F05725	4 JIC to -4 SAE	2
10	F05067	-4 Swivel Nut Run T	1
11	F05113	Fitting, Sleeve -4	2
12	F05300	Fitting, -4 nut	2

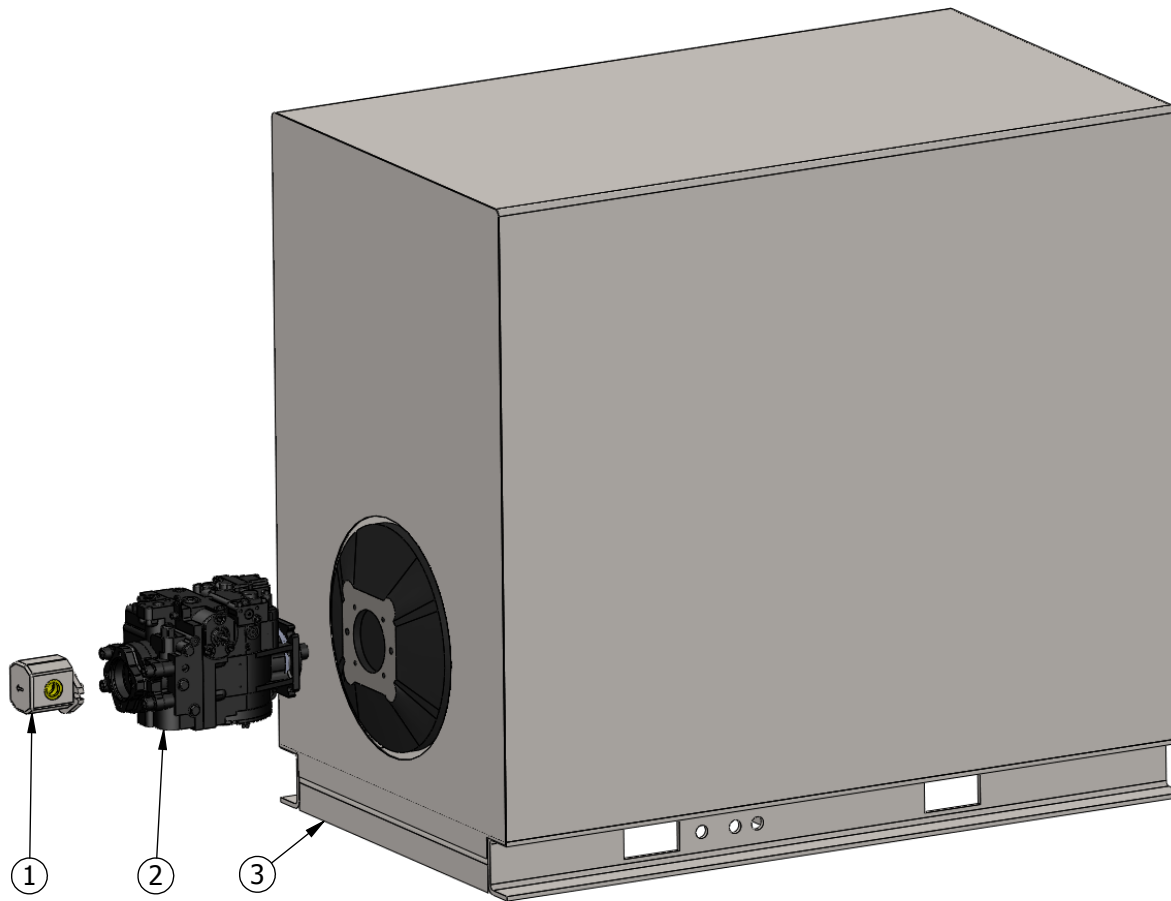


ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	S04475	Screw, Set Sq Head 1/2 x 1	2
2	B15897	Bracket Assembly	1
3	B11344	Bolt Hx head 3/8-16x1-1/2	5
4	W01545	Washer, Split Lock 3/8"	5
5	C06041	Cap, End	5
6	B07110	Bearing, Roller	8
7	S43129	Shaft, Roller	2
8	R20044	Roller, Painted Steel	4
9	A08091	Arm, Levelwind Carriage	1
10	P06027	Pin, Height Adjust	1
11	S17001	Sleeve Arm	1
12	P06156	Pin, Levelwind Pivot	1
13	N04097	Nut Hex Jam 1-1/4-12	2
14	F05071	Grease Zerk 1/4"-28 tap	1

ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	S29019	Sprocket, Idler	1
2	W01565	Washer, Split Lock 1/2"	4
3	B11350	Bolt, Hx 7/16"-20 x 1-1/2"	4
4	M08100	Motor, Hydraulic	1
5	G12009	Auburn Planetary	1
6	B11338	Bolt, Hex 5/16"-18 x 1"	1
7	W01048	Washer, Split Lock 5/16"	1
8	F05071	Grease Zerk 1/4-28 tap	1
9	S43062	Shaft, Idler Sprocket	1
10	S43058	Hex Shaft	1
11	I02101	Idler Sprocket Bracket	1
12	R18014	Ring, Snap External	2
13	B21018	Bushing, Bronze, 4x4-1/4x2	1
14	S29165	Sprocket	1
15	W01014	Washer, Thrust	2
16	H09022	Engagement Hub	1
17	B15084	Yoke Pivot	1
18	P06049	Pin, w/ Lanyard	1
19	W01205	Washer, Flat SAE 1/4"	4
20	W01525	Washer, Split Lock 1/4"	4
21	B11325	Bolt, Hex 1/4"-20 x 1-1/4"	4
22	W01040	Washer, Split Lock 5/8"	8
23	B11377	Bolt, Hex 5/8"-11 x 2-1/2"	8
24	Y01069	Engagement Yoke	1

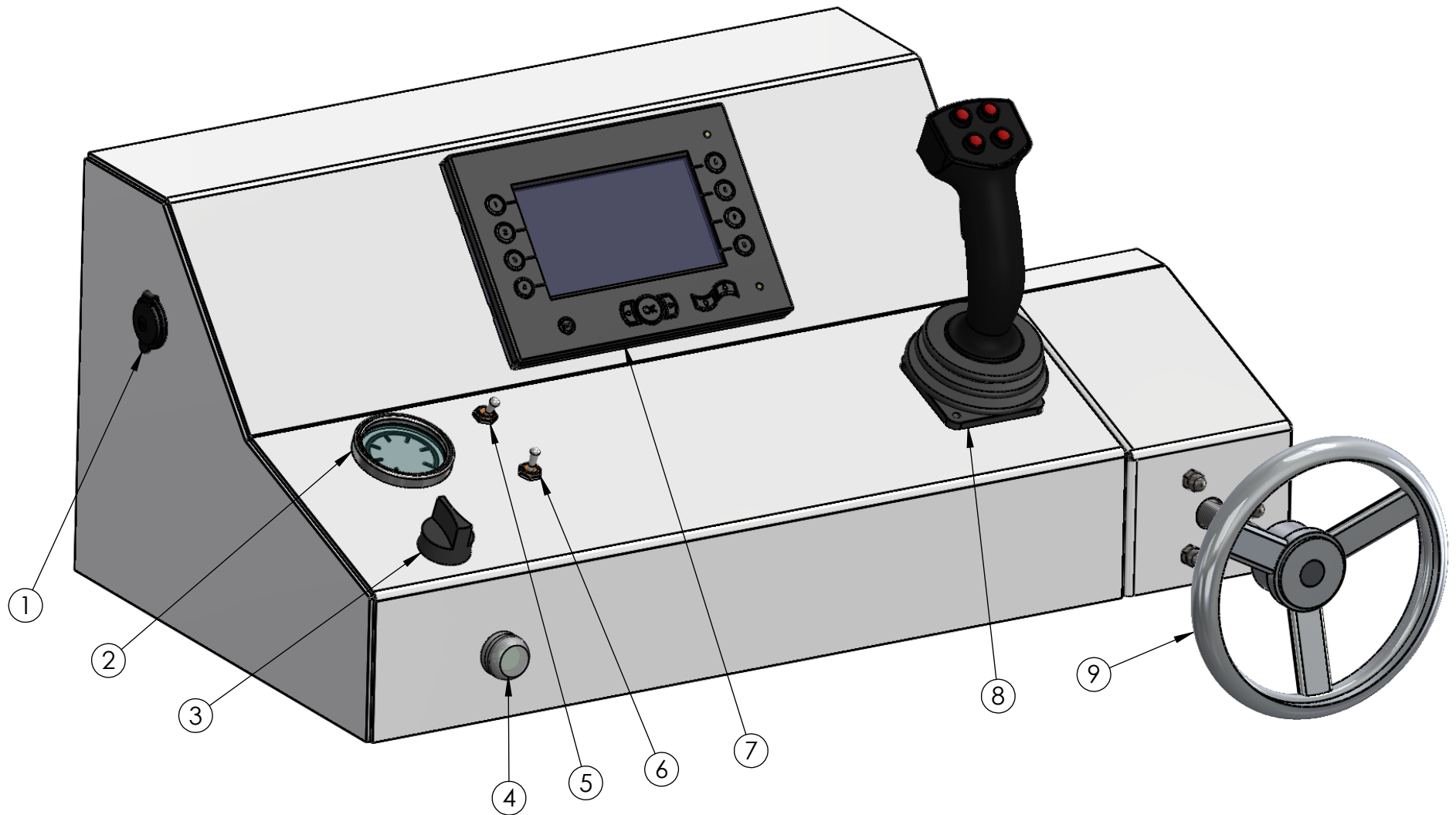


NOTE: Parts Are Identical
For Left & Right Side

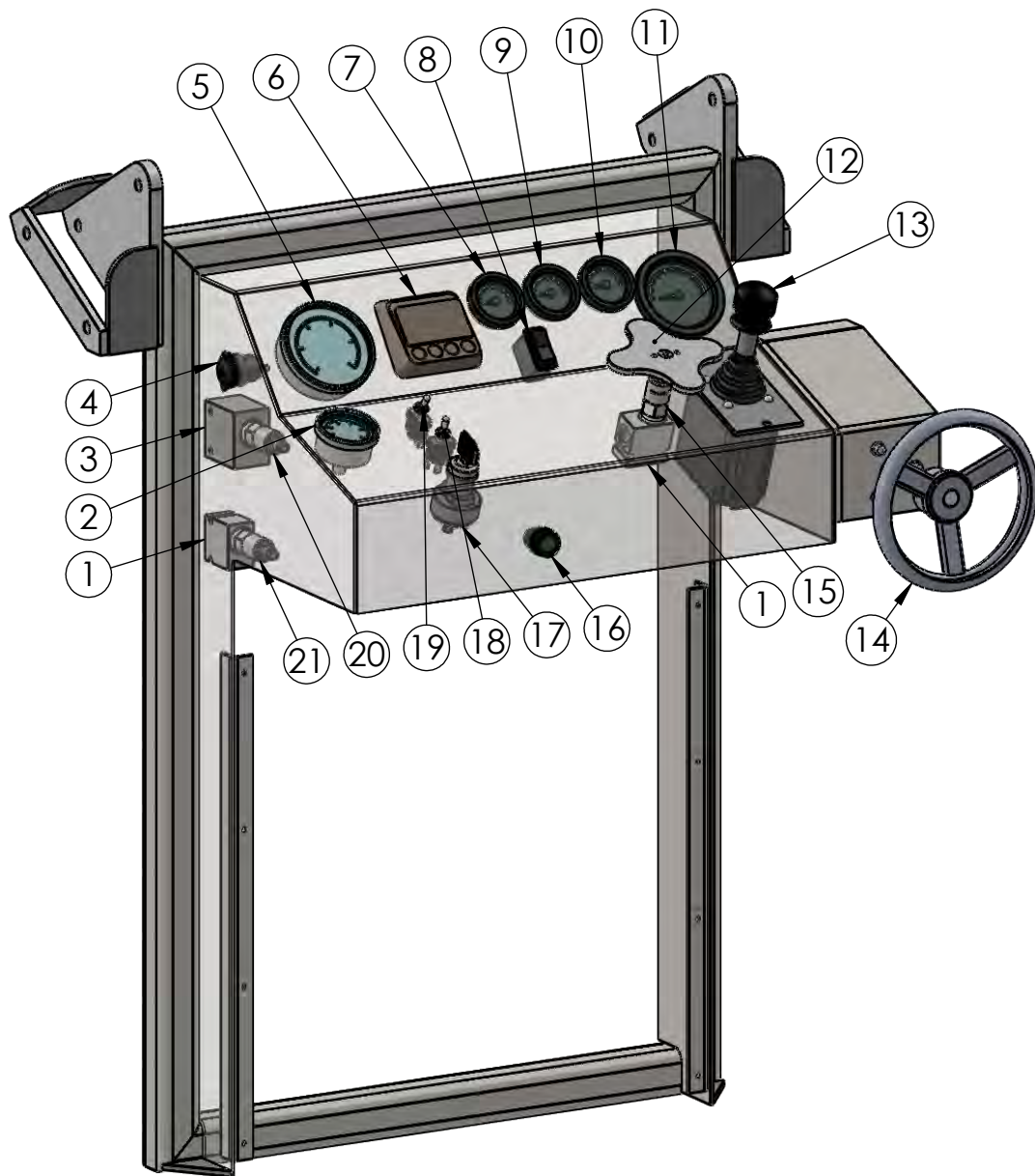


Engine/Pump Assembly

ITEM NO.	PART NUMBER	DESCRIPTION	For Manual/QTY.
1	P20103	Pump, 10gpm	1
2	P20007	Pump	1
3	E02085	John Deere 185 HP engine	1



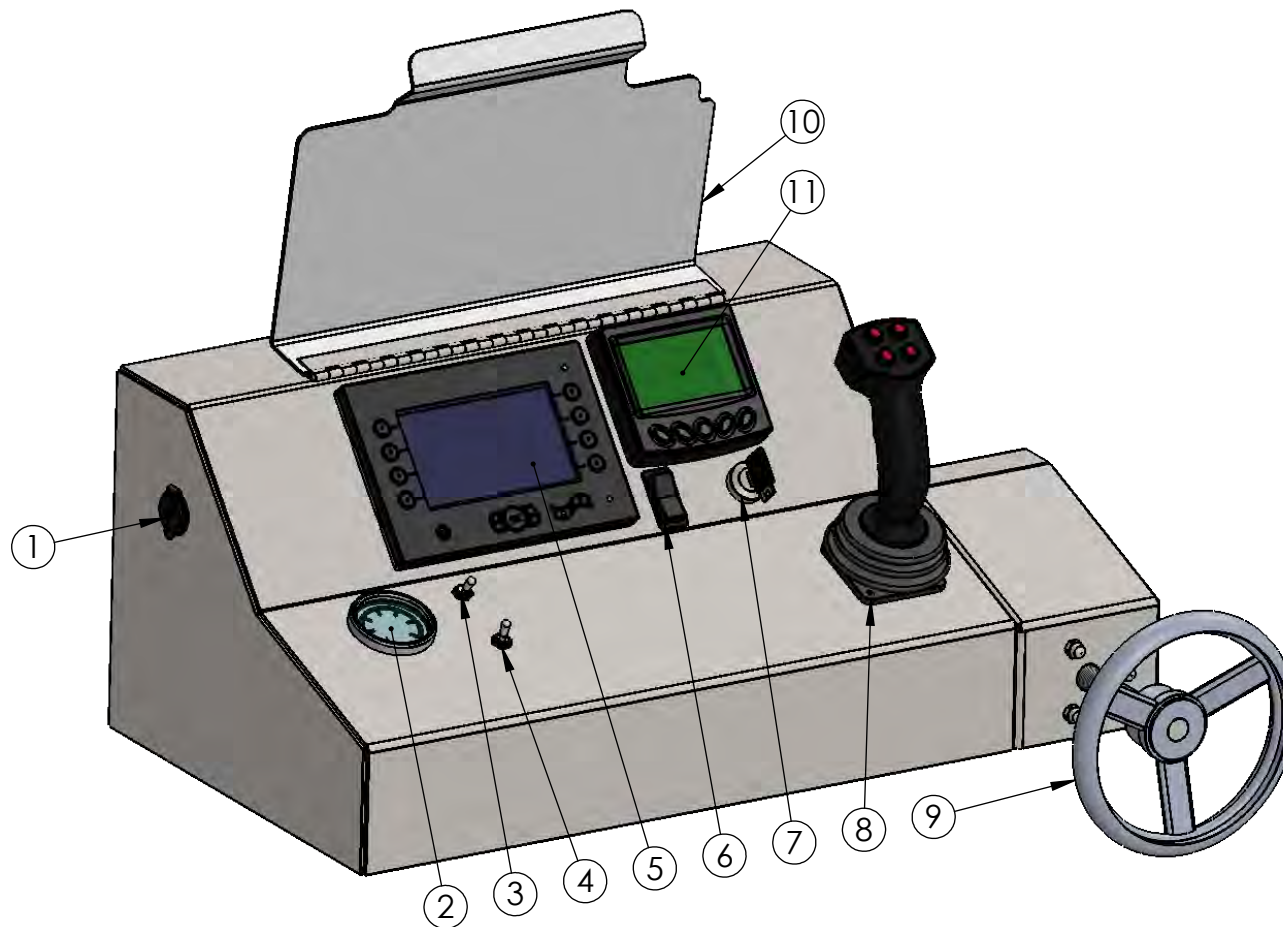
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	S21020	12v Socket	1
2	G02008	3" 600PSI GAUGE	1
3	S40070	Switch, Key Cole Hersee	1
4	S40169	Switch, Payout Lock-Out	1
5	S40035	Switch, SP/ST Toggle	1
6	S40100	Switch, SP/DT Momentary	1
7	D09020	Display, Color DP600 TFT	1
8	C34033	JS6000 +1 Joystick Controller	1
9	C32004	Brake Cylinder	1



ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	M04051	Manifold, Aluminum	2
2	G02008	Gauge, 3" 600PSI	1
3	M04052	Manifold, Steel	1
4	R12005	12v Socket	1
5	G02007	Gauge, 4" 600PSI	1
6	D09001	John Deere PowerView Gauge	1
7	Water Temp	Water Temp John Deere	1
8	T06007	Throttle Switch, John Deere	1
9	Volts	Voltmeter John Deere	1
10	Oil Psi	Oil Pressure John Deere	1
11	Tachometer	Tachometer John Deere	1
12	H02062	RV-5 Handle	1
13	C34030	Controller, Joystick MCH	1
14	C32004	Brake Cylinder	1
15	V02076	Valve, Relief RV5 /50	1
16	S40169	Switch, Payout Lock-Out	1
17	S41100	Switch Ignition JDD	1
18	S40100	Switch, SP/DT Momentary	1
19	S40035	Switch, SP/ST Toggle	1
20	V02077	Valve, Relief RV1 /9	1
21	V02078	Valve, Relief RV1 /18	1

**ODP100 Controls Manual
Pressure Control**

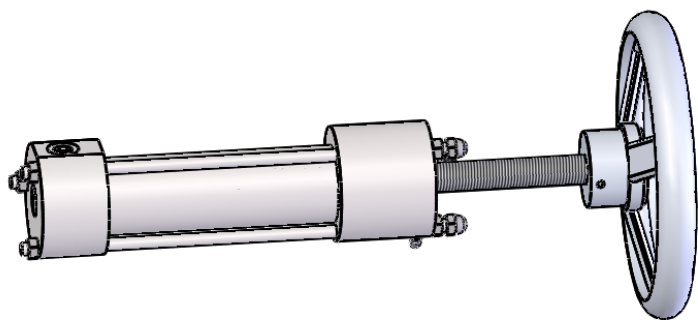
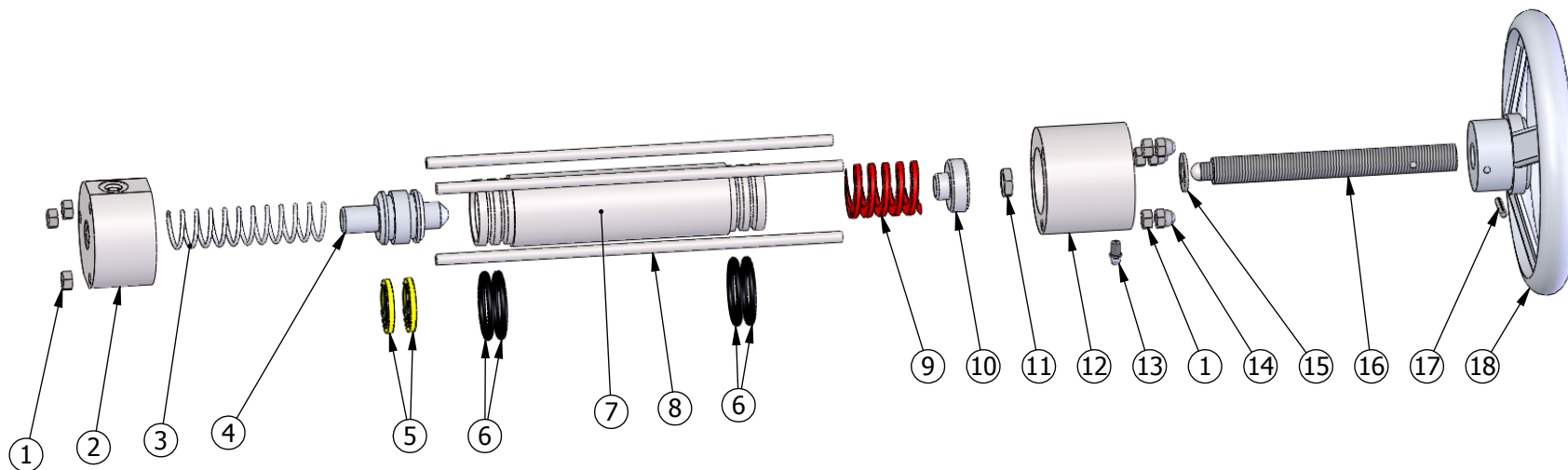




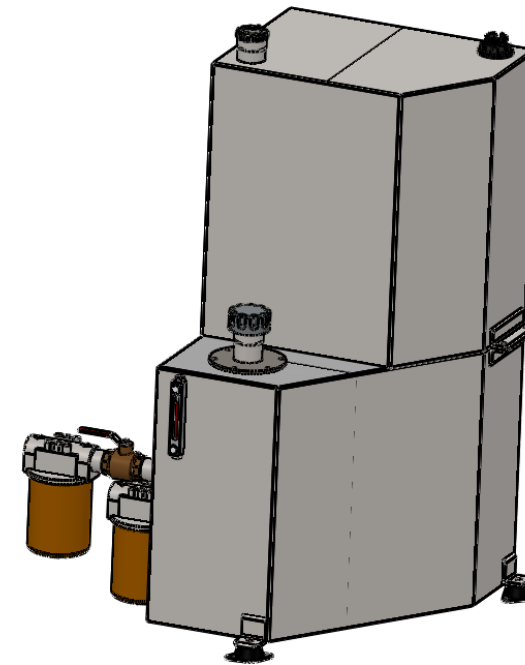
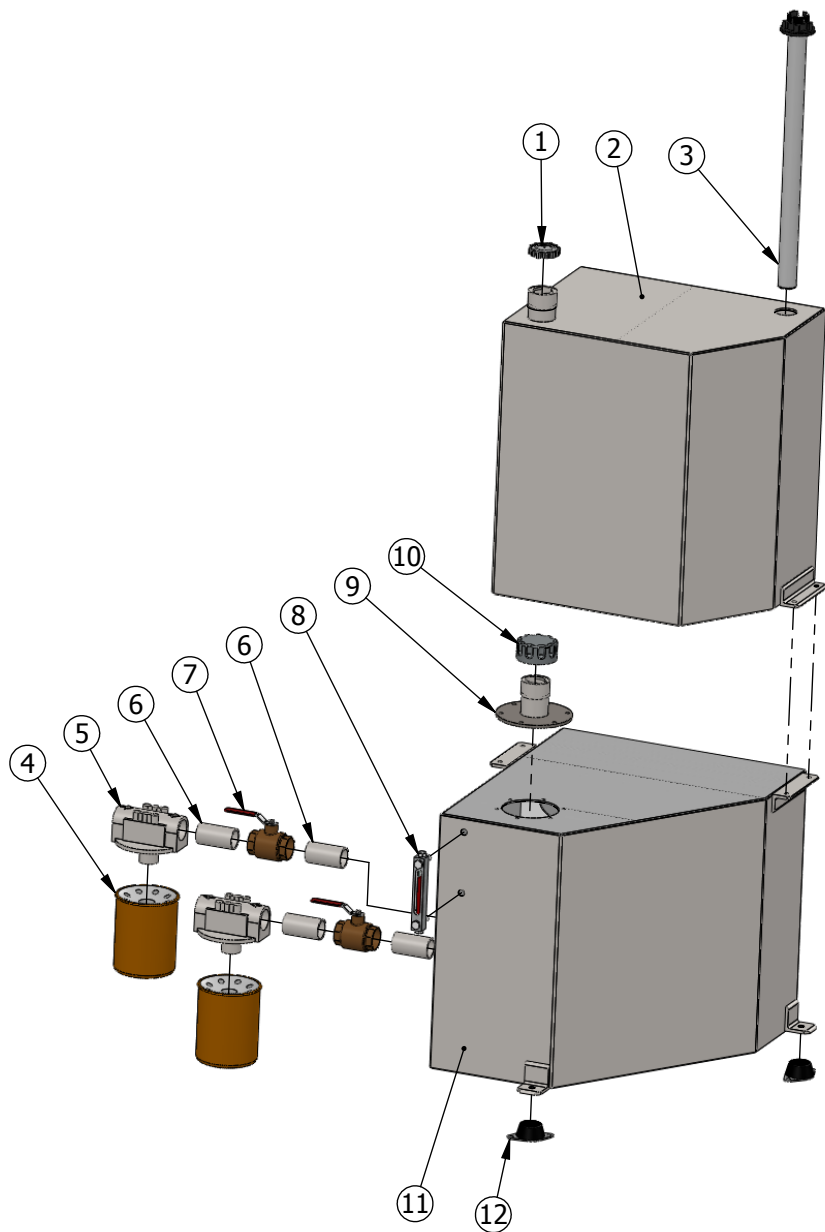
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	R12005	12v Socket	1
2	G02008	Gauge, 3" 600PSI	1
3	S40035	Switch, SP/ST Toggle	1
4	S40100	Switch, SP/DT Momentary	1
5	D09020	Display, Color DP600 TFT	1
6	T06007	Throttle Switch, John Deere	1
7	S41100	Switch Ignition JDD	1
8	C34033	JS6000 +1 Joystick Controller	1
9	C32004	Brake Cylinder	1
10	C29037	Cover, Display	1
11	PV480	Display, Engine	1



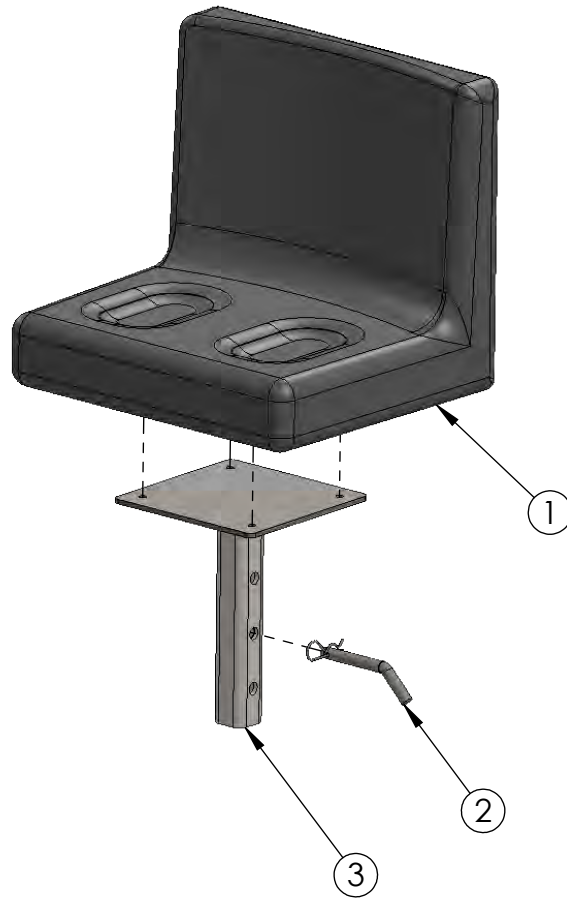
Controls Tier 4 Final



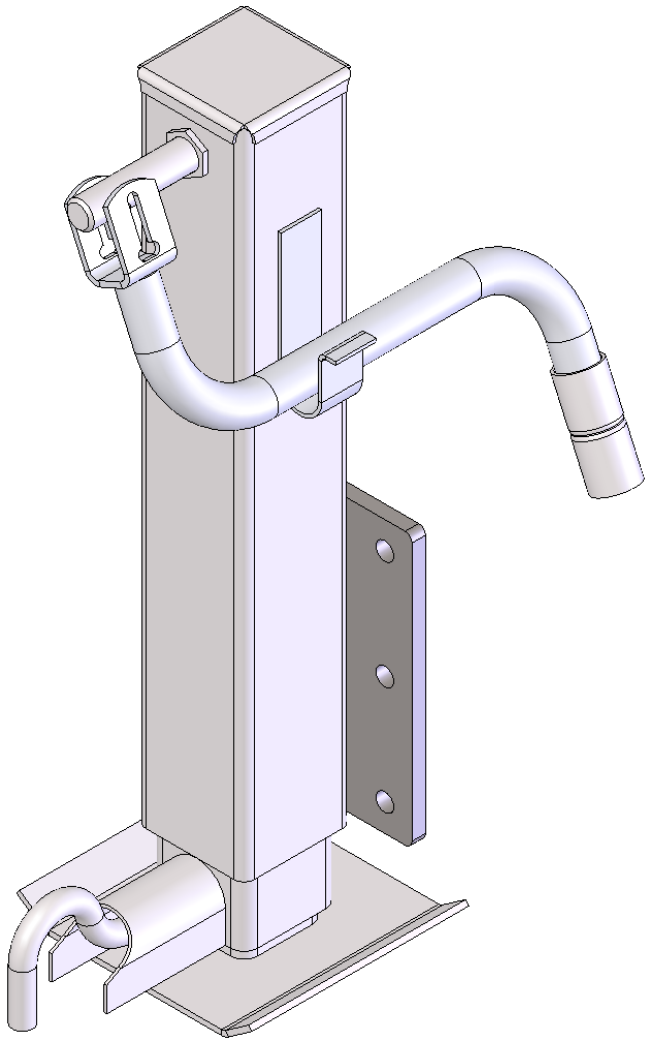
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	N04107	Nut Hex 5/16"-18	6
2	C06009	Bar round 3" 1018	1
3	S28022	Return Spring	1
4	P08017	Piston, Aluminum two groove	1
5	O01061	Seal	2
6	O01060	O-Ring	4
7	H08003	Cylinder Tube	1
8	R19007	Bar round 5/16" 1018	3
9	S28021	Spring	1
10	P08016	2" Aluminum RB	1
11	N04039	Nut Hex Jam 1/2-20	1
12	C06012	Bar round 3" 1018	1
13	F05630	Fitting, 1/4"-28 Zerk	1
14	N04103	Nut Hex 5/16"-18 Acorn	3
15	W01005	Washer, Flat SAE 1/2"	1
16	S04006-001	Bar 3/4"-8 acme thread	1
17	P06186	Pin, Roll 3/16 "x 1"	1
18	H02060	Handle, 8" Dia.	1



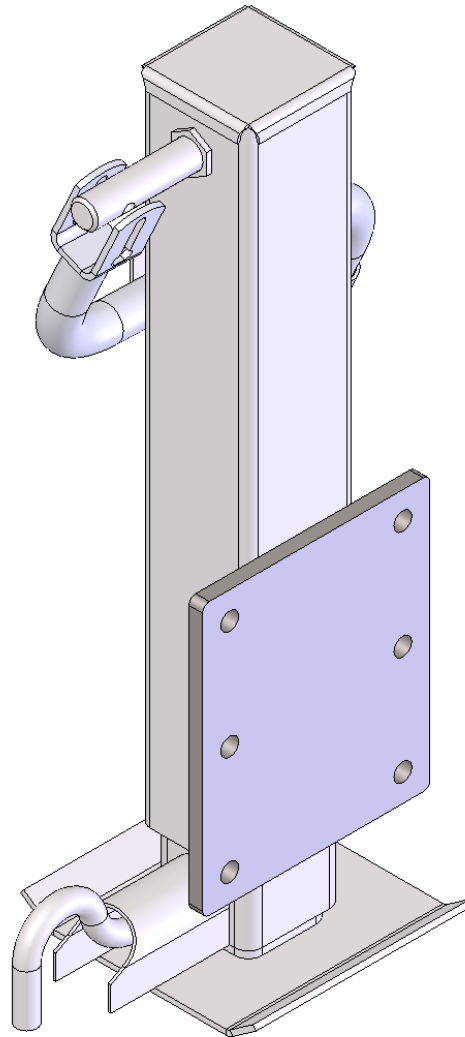
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	C06205	Cap, Fuel	1
2	T01009	Tank, Fuel 26 Gallon	1
3	S46006	Fuel Sender	1
4	F04020	Filter 10 micron	2
5	F04021	Filter Head	2
6	N02001	Nipple, 1-1/4" x 3"LG	4
7	V02001	Valve, Ball 1-1/4" NPT	2
8	G02046	Gauge, Hyd oil level	1
9	N07002	Neck, Hydraulic fill	1
10	C06155A	Cap, Hydraulic	1
11	T01105	Tank, Hydraulic 37.5 gallon	1
12	I04003	Insulator, Small	4



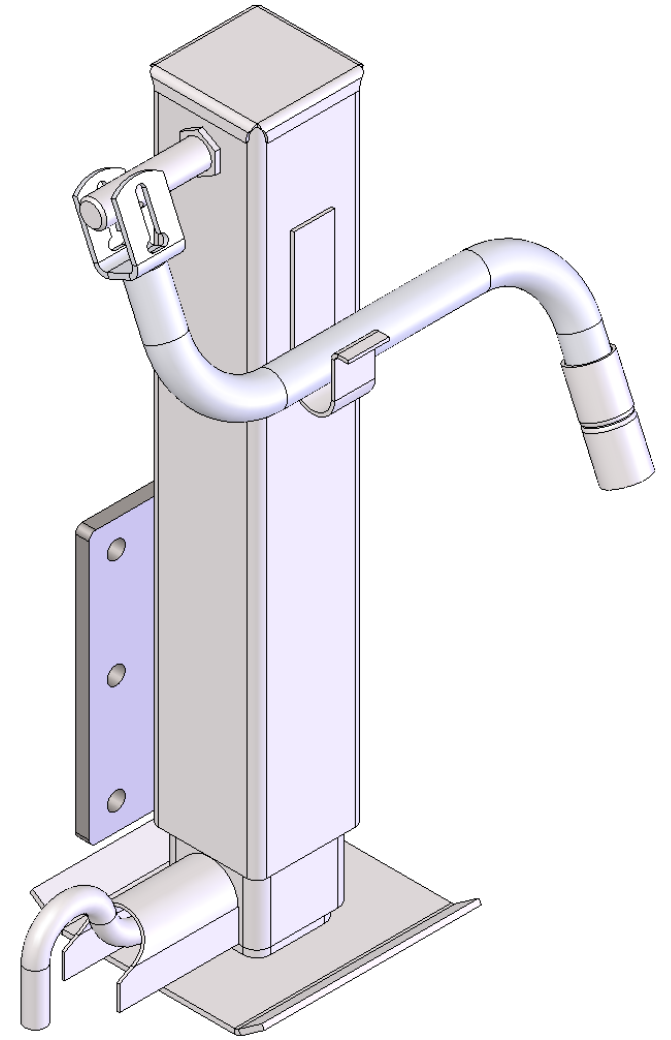
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	S03040	Seat, Operator JD	1
2	P06999	Pin, Bent Hitch 5/8 x 3"	1
3	P14051	Post, Seat Mount	1



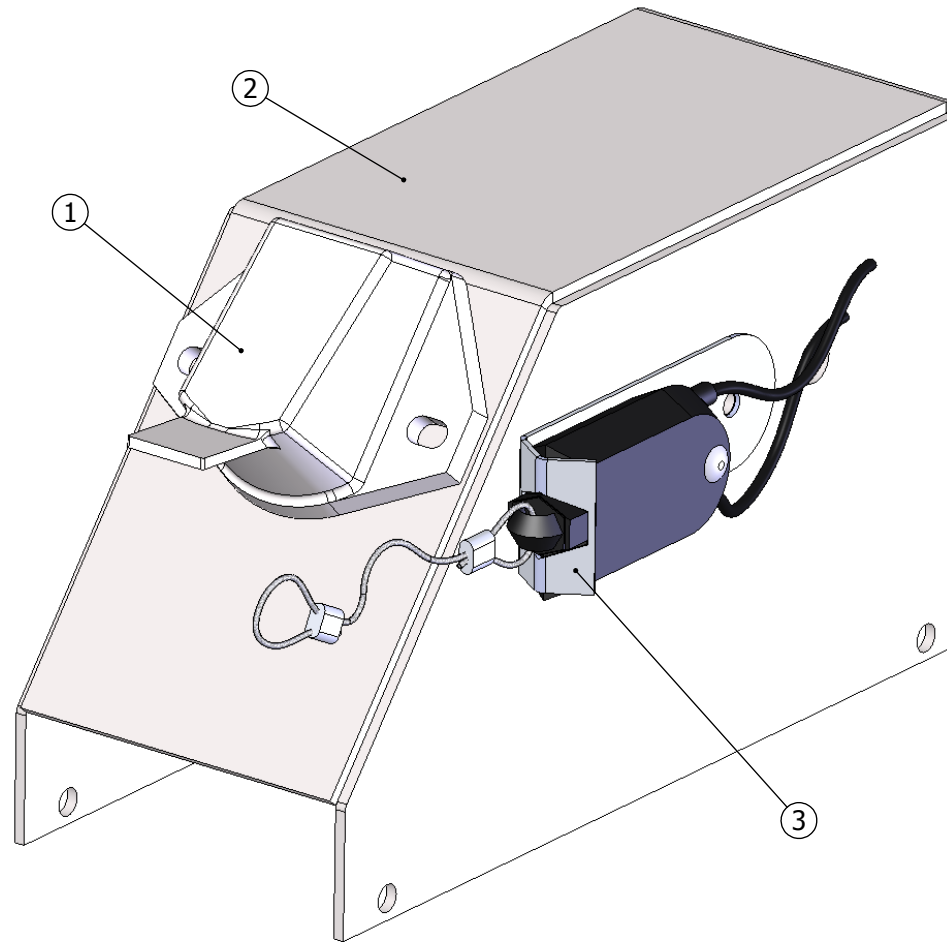
J04041
Front Jackstand



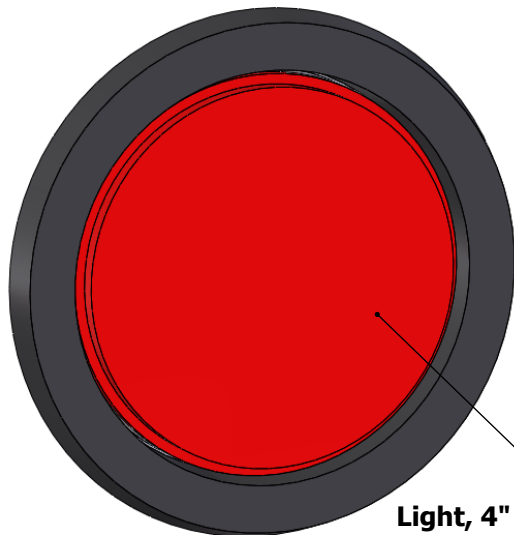
J04046
Streetside Rear Jackstand



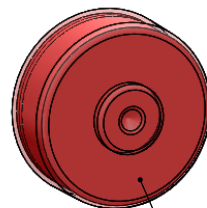
J04047
Curbside Rear Jackstand



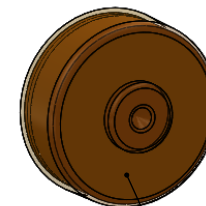
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	S21035	Socket 7-wire Pollak	1
2	H05072	Hood, Electrical	1
3	S40003	Switch, Breakaway	1



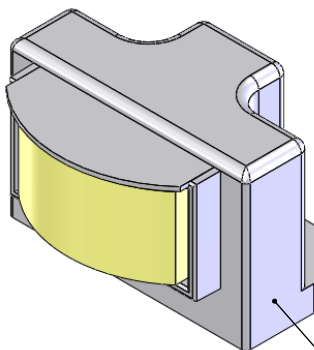
L04032
Light, 4" Tail/Stop/Turn Kit LED



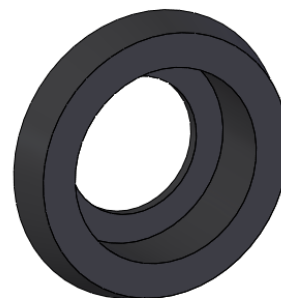
L04310
Light Red 2" LED



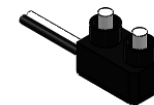
L04311
Light Amber 2" LED



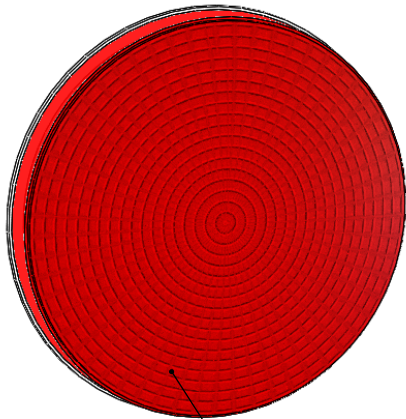
L04055
Light, License plate



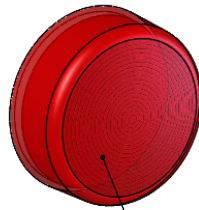
G08005
Grommet 2" Light



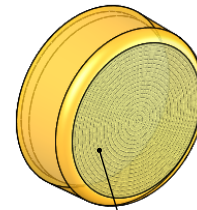
P05025
Pigtail 2 wire



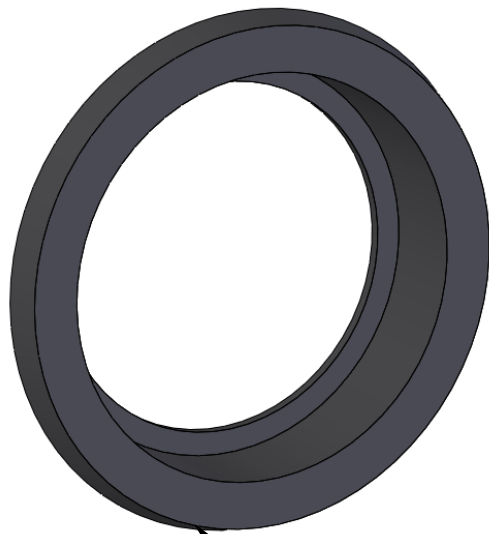
L04030
Light, 4" Tail Stop Turn



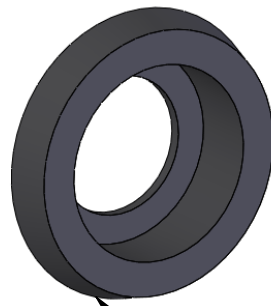
L04070
Light, 2" Red



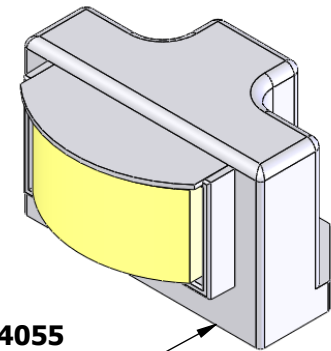
L04035
Light, 2" Amber



G08010
Grommet, 4" Tail/Stop/Turn

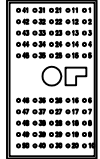


G08005
Grommet 2" Light



L04055
Light, License plate

MC050-10-00000
P/N 10100900

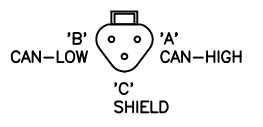


SD PLUG AND CONTACTS
P/N 10100946 BAG ASSY
DEUTSCH
PLUG DRC 26-50S-01
SOCKET CONTACT (SOLID)
0462-201-20141
SOCKET CONTACT (STAMPED)
1062-20-0122

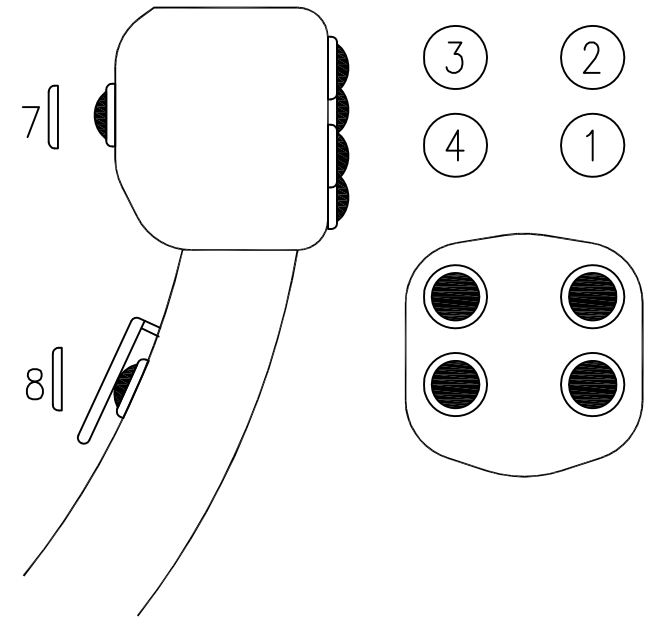
C1P1	POWER GROUND -	
C1P2	POWER SUPPLY +	
C1P3	CAN HIGH + (BLACK)	
C1P4	CAN LOW - (WHITE)	
C1P5	AIN/CAN SHIELD	
C1P6	DIN	BRAKE
C1P7	DIN	MTR1_DIR
C1P8	SENSOR POWER +	
C1P9	SENSOR POWER GRD	
C1P10	DIN	MTR2_DIR
C1P11	DIN	XXX
C1P12	DIN	XXX
C1P13	DIN	XXX
C1P14	DIN/AIN	US_SNR
C1P15	DIN/AIN	CHRG_PRESS
C1P16	DIN/AIN	SYS_PRESS
C1P17	DIN/AIN	XXX
C1P18	DIN/AIN/FREQIN	XXX
C1P19	DIN/AIN/FREQIN	XXX
C1P20	CAN HIGH + (BLACK)	
C1P21	CAN LOW - (WHITE)	
C1P22	AIN/CAN SHIELD	
C1P23	DIN/AIN/FREQIN	MTR1_FREQ
C1P24	DIN/AIN/FREQIN	MTR2_FREQ
C1P25	DIN/AIN/FREQIN	XXX
C1P26	DIN/AIN/FREQIN	XXX
C1P27	AIN/TEMP/RHEO	XXX
C1P28	AIN/TEMP/RHEO	XXX
C1P29	AIN/TEMP/RHEO	XXX
C1P30	AIN/TEMP/RHEO	FUEL_LEVEL
C1P31	DOUT	XXX
C1P32	DOUT	XXX
C1P33	DOUT	XXX
C1P34	DOUT/PVG_PWR1	XXX
C1P35	DOUT/PVG_PWR2	XXX
C1P36	DOUT/PVG_PWR3	XXX
C1P37	PWM/DOUT/PVGOUT1	PUMP2_EDC-PAYOUT_20K
C1P38	PWM/DOUT/PVGOUT1	PUMP2_EDC-PAYIN_20K
C1P39	PWM/DOUT/PVGOUT1	MTR2_EDC_20K
C1P40	PWM/DOUT/PVGOUT1	XXX
C1P41	DOUT/PVGOUT2	XXX
C1P42	PWM/DOUT/PVGOUT2	PUMP1_EDC-PAYOUT_10-20K
C1P43	PWM/DOUT/PVGOUT2	PUMP1_EDC-PAYIN_10-20K
C1P44	PWM/DOUT/PVGOUT2	MTR1_EDC_10-20K
C1P45	PWM/DOUT/PVGOUT3	PRR1_10-20K
C1P46	DOUT/PVGOUT3	THROTTLE_????
C1P47	POWER SUPPLY +	
C1P48	POWER SUPPLY +	
C1P49	POWER SUPPLY +	
C1P50	POWER SUPPLY +	

RESISTOR

1	EA TEE	DT04-3P-P007
2	EA PLUG	DT06-3S
1	EA BLU WEDGE W3S-1939	
1	EA GRN WEDGE W3S-P012	
6	EA SOCKET	0462-201-16141
1	EA RESISTOR	DT06-3S-P006
2	EA BOOT	DT06-3S-BT



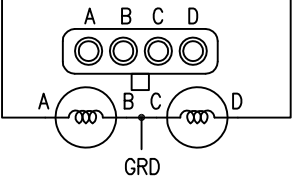
- BTN1 LOW/HIGH SPEED
- BTN2 PAYOUT OVERRIDE
- BTN3 SPARE
- BTN4 SPARE
- BTN7 HYDRASTATIC BRAKE
- BTN8 OPERATOR PRESENT



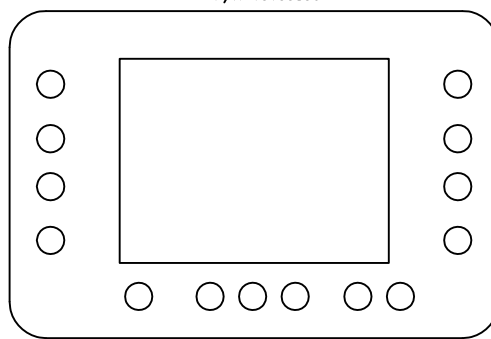
- PIN 1 GRD
- PIN 2 +12 VDC
- PIN 3 +HIGH CAN
- PIN 4 -LOW CAN
- PIN 5 SHIELD
- PIN 6 NOT USED

1	EA TEE	DT04-3P-P007
3	EA PLUG	DT06-3S
2	EA BLU WEDGE W3S-1939	
1	EA GRN WEDGE W3S-P012	
9	EA SOCKET	0462-201-16141
3	EA BOOT	DT06-3S-BT

1	EA PLUG	DTM06-6SA
1	EA ORG WEDGE WM-6S	
5	EA SOCKET	0462-201-20141
1	EA BLANKING PIN	0413-204-2005
1	EA BOOT	DTM06-6SBT



DP600 DISPLAY
P/N 10100890



C1P1	POWER GROUND -	
C1P2	POWER SUPPLY +	
C1P3	CAN1 HIGH + (BLACK)	
C1P4	CAN1 LOW - (WHITE)	
C1P5	AIN/CAN SHIELD (GREEN)	
C1P6	CAN0 HIGH + (BLACK)	
C1P7	CAN0 LOW - (WHITE)	
C1P8	XXX	XXX
C1P9	XXX	XXX
C1P10	XXX	XXX
C1P11	XXX	XXX
C1P12	BUZZER (GRD)	XXX

RESISTOR

1	EA TEE	DT04-3P-P007
2	EA PLUG	DT06-3S
1	EA BLU WEDGE W3S-1939	
1	EA GRN WEDGE W3S-P012	
6	EA SOCKET	0462-201-16141
1	EA RESISTOR	DT06-3S-P006
2	EA BOOT	DT06-3S-BT

C4P1	GRD	XXX
C4P2	VIDEO POWER 12	XXX
C4P3	VIDEO INPUT 1	XXX
C4P4	VIDEO GRD	XXX
C4P5	VIDEO INPUT 2	XXX

1	EA PLUG	DTM06-12SA
1	EA ORG WEDGE WM-12S	
12	EA SOCKET	0462-201-20141
7	EA BLANKING PIN	0413-204-2005
1	EA BOOT	DTM06-12SBT

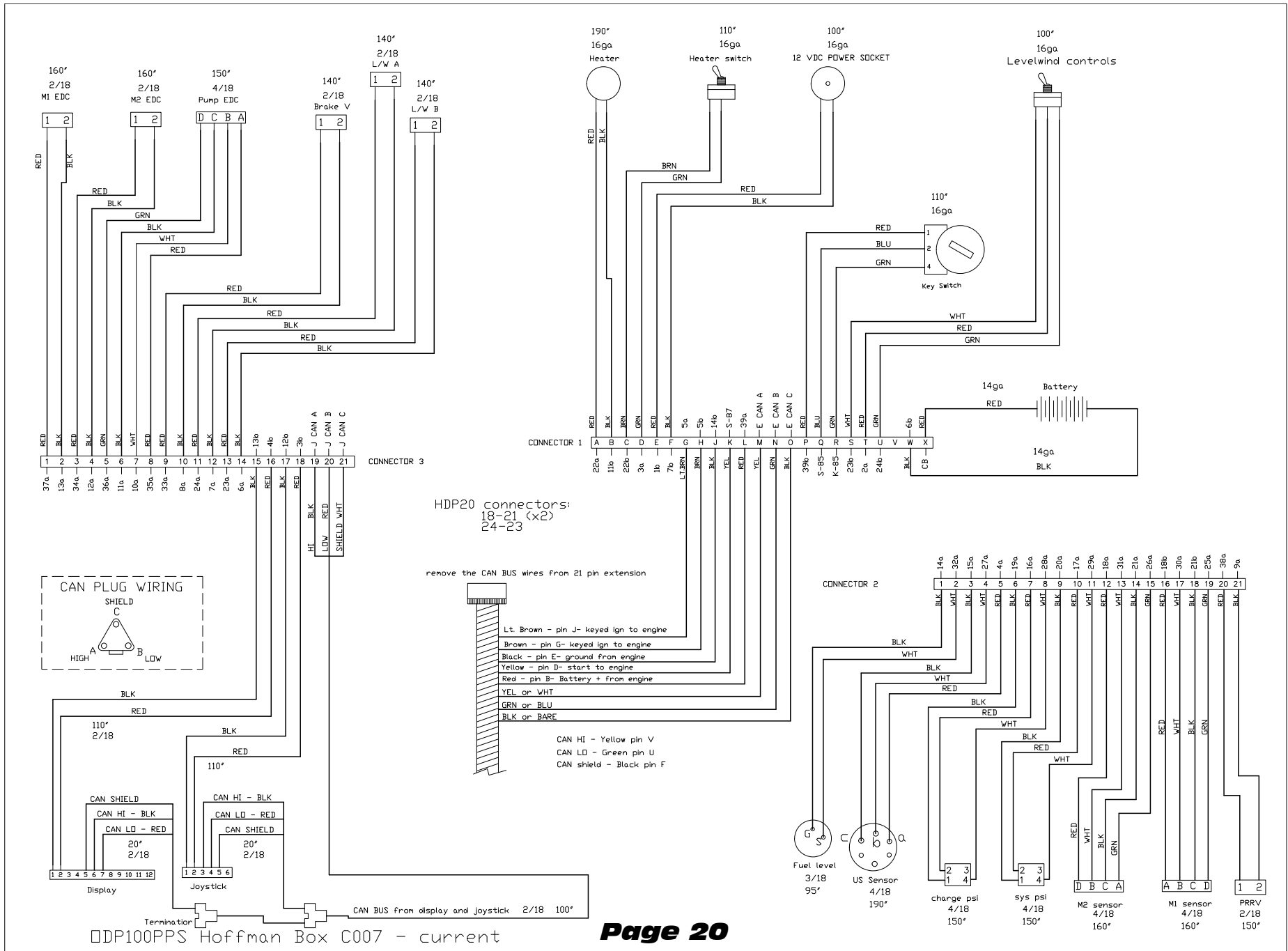
JS6000-NY-CAN-FSFCN-J331-A40B-RRRRNNRR
EV58-34-0-N-80 LOGIC VALVE VC08-3 CAVITY
TS58-2050-0-N-12DR PROP'L RV VALVE VC08-2 CAVITY

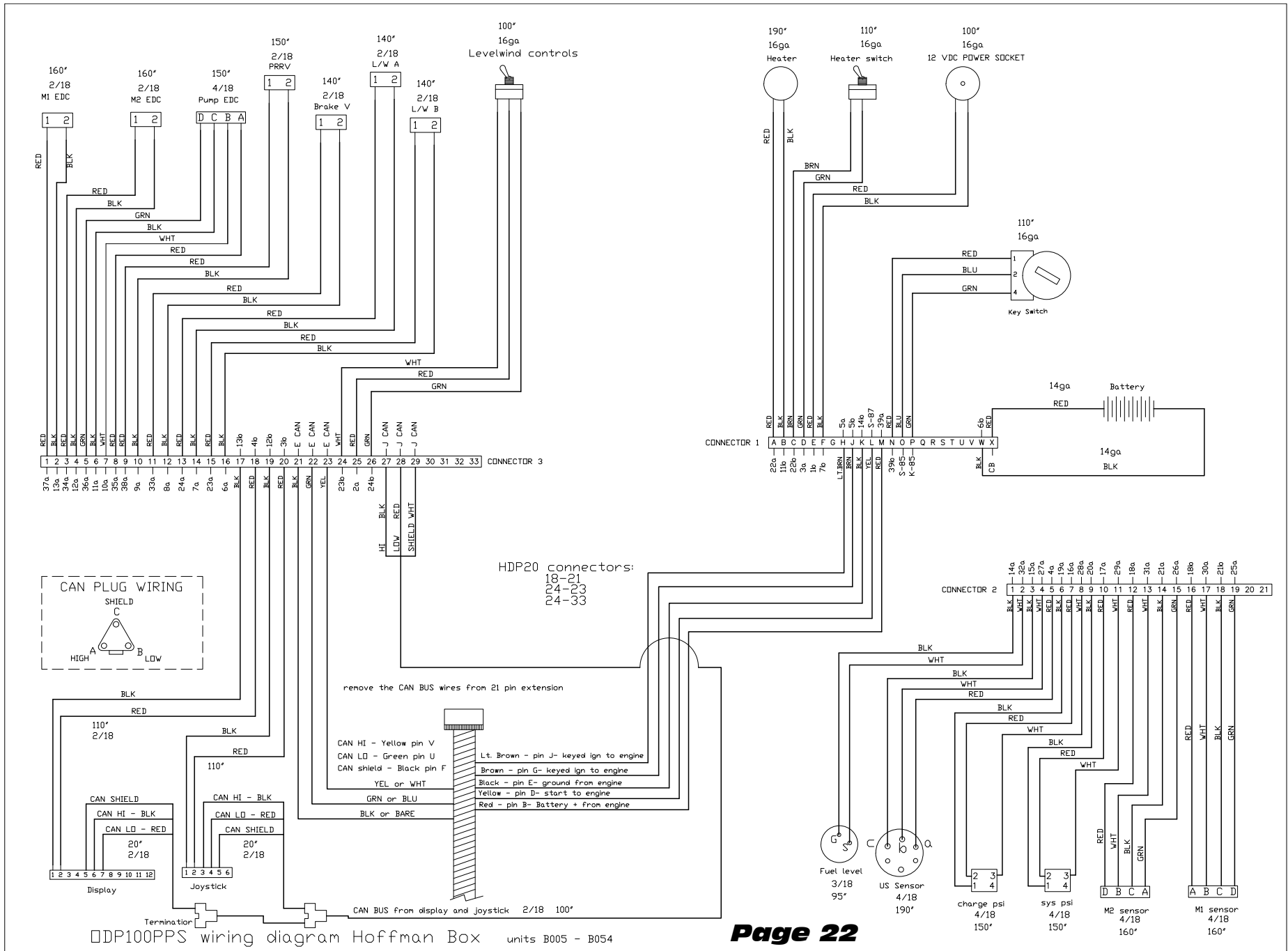
LOC	REV	DESCRIPTION	CHK'D	INT	DATE
		SHEET # OF #			
		DRAWN BY: DRAWN_BY			
		FILE NAME: FILE_NAME			
		CHECKED: CHECKED_BY			

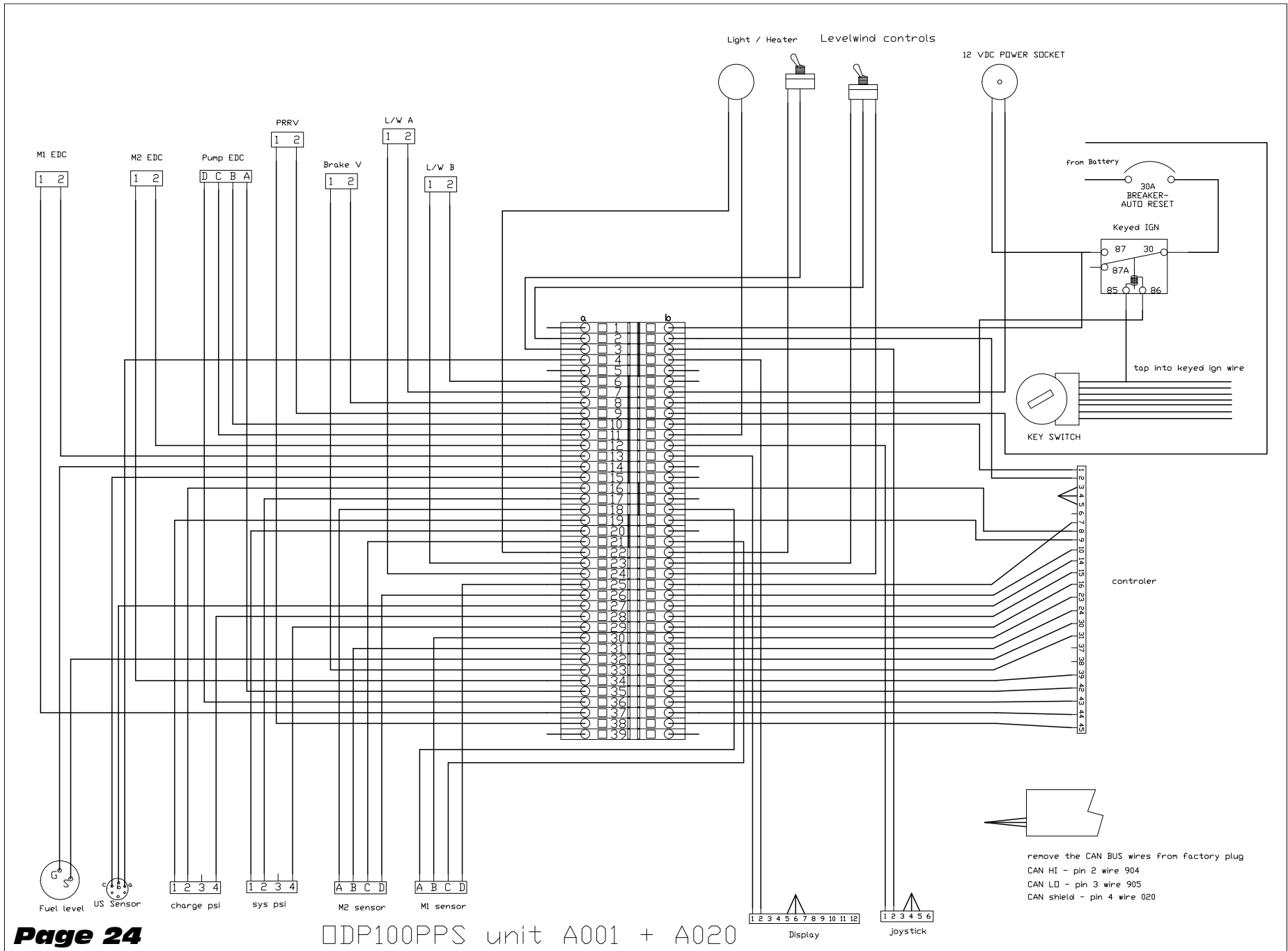
THIS DRAWING CONTAINS INFORMATION PROPRIETARY TO BERENDSEN FLUID POWER. IT IS SUBMITTED IN CONFIDENCE AND IS TO BE SOLELY FOR THE PURPOSE OR PROJECT FOR WHICH IT IS FURNISHED AND RETURNED UPON REQUEST. NO ALTERATION OR MODIFICATION OF THE INFORMATION CONTAINED HEREIN IS TO BE MADE WITHOUT FIRST OBTAINING THE WRITTEN APPROVAL OF BERENDSEN FLUID POWER. THIS DRAWING AND SUCH INFORMATION IS NOT TO BE REPRODUCED, TRANSMITTED, DISCLOSED OR USED OTHERWISE IN WHOLE OR IN PART WITHOUT THE WRITTEN AUTHORIZATION OF BERENDSEN FLUID POWER. ANY REPRODUCTION, TRANSMISSION, DISCLOSURE OR USE OF THE INFORMATION CONTAINED HEREIN WITHOUT THE WRITTEN AUTHORIZATION OF BERENDSEN FLUID POWER IS AT THE SOLE RISK OF THE USER AND WITHOUT LIABILITY TO BERENDSEN FLUID POWER.

TITLE: **HOGG & DAVIS
10K PULLER
SCHEMATIC**

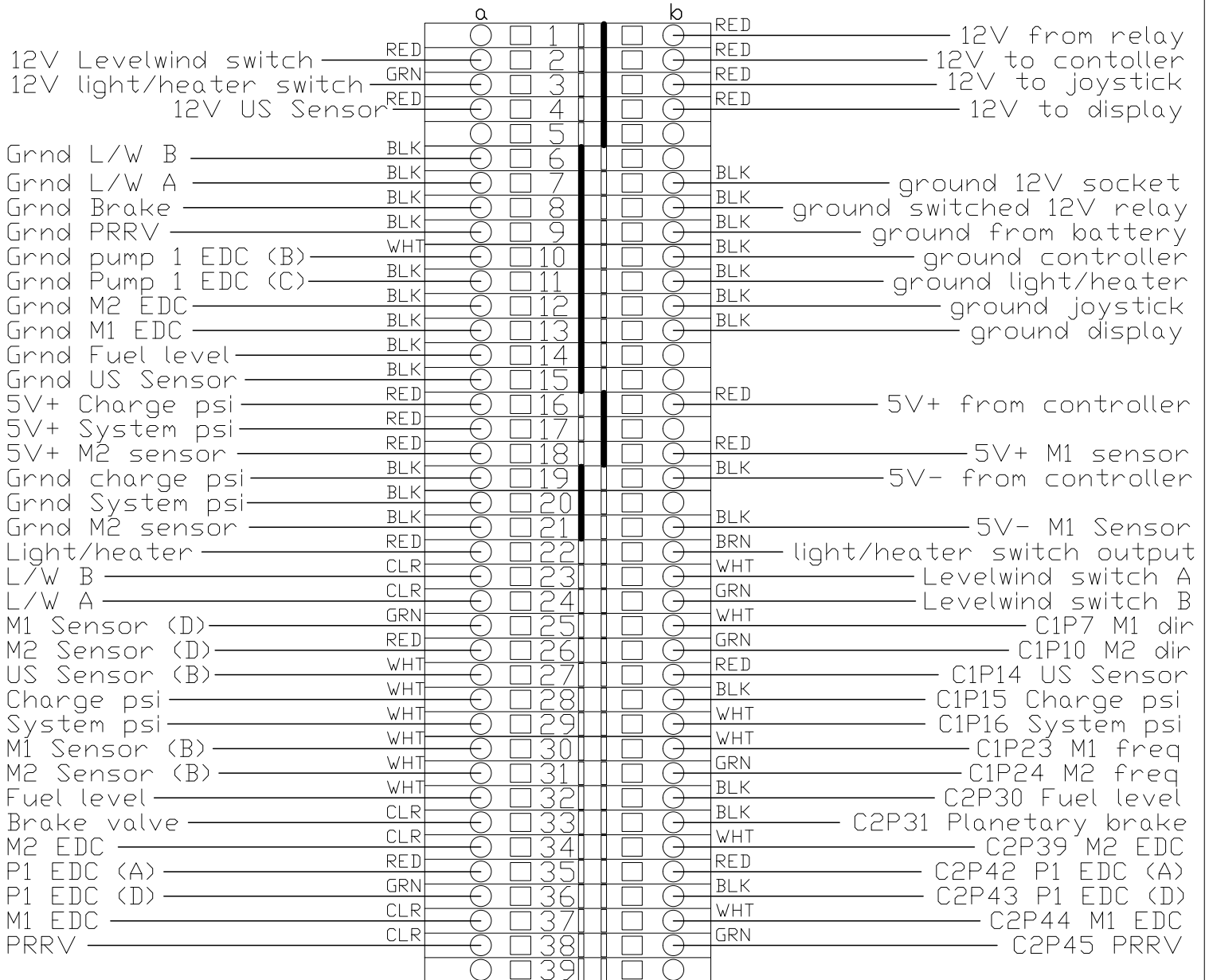
DATE:	DATE_DRAWN	TOLERANCE UNLESS NOTED	DRAWING NUMBER:	REV
SCALE:	SIZE	FRACTIONS: ±1/32 2 PLACE (.00) ±.010 3 PLACE (.000) ±.005 ANGLE ±1°	1198	E1
DWG_SCALE	SIZE	METRIC: 0 PLACE ±1mm 1 PLACE ±.25mm 2 PLACE ±.12mm ANGLE ±1°		





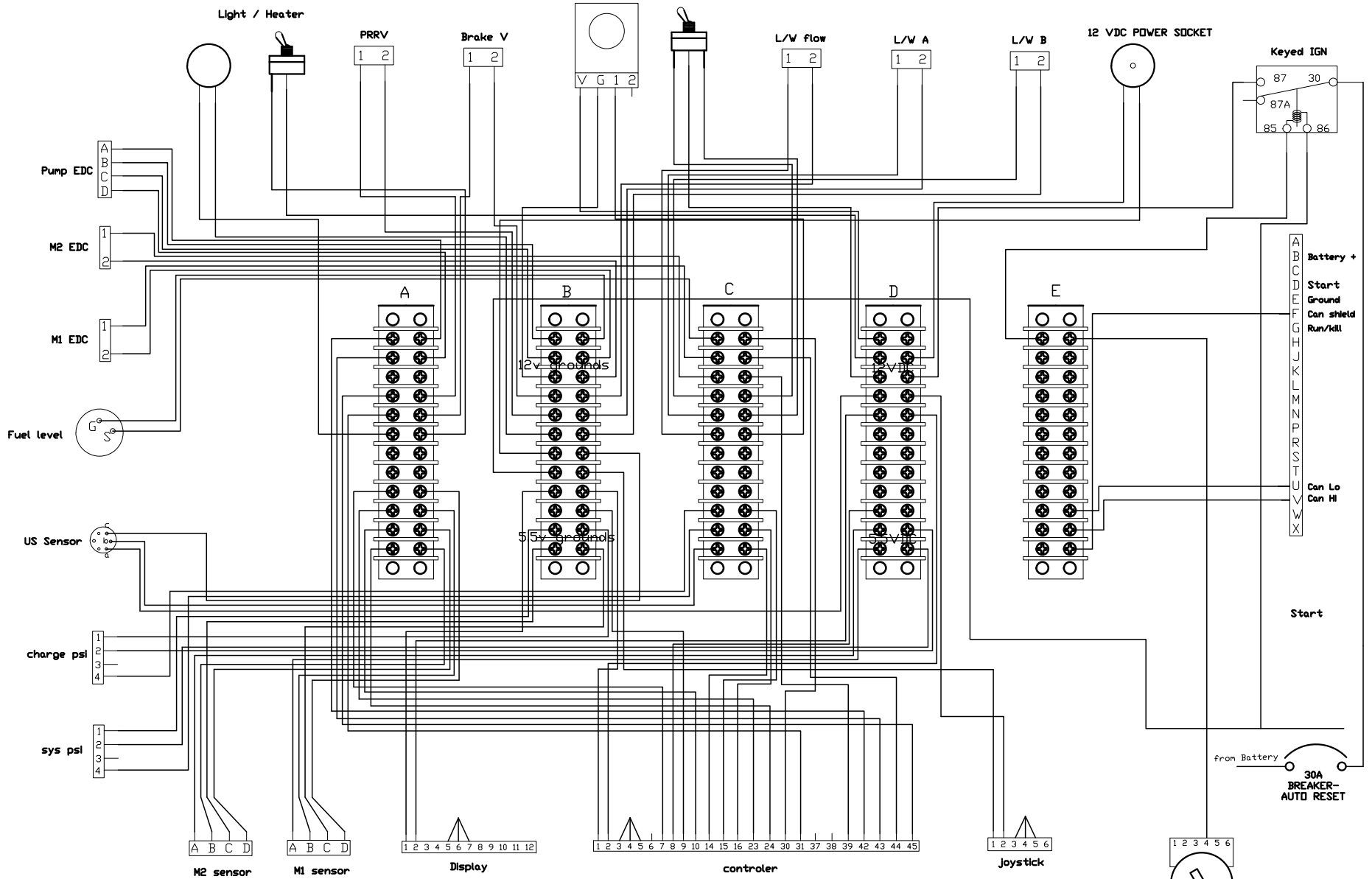


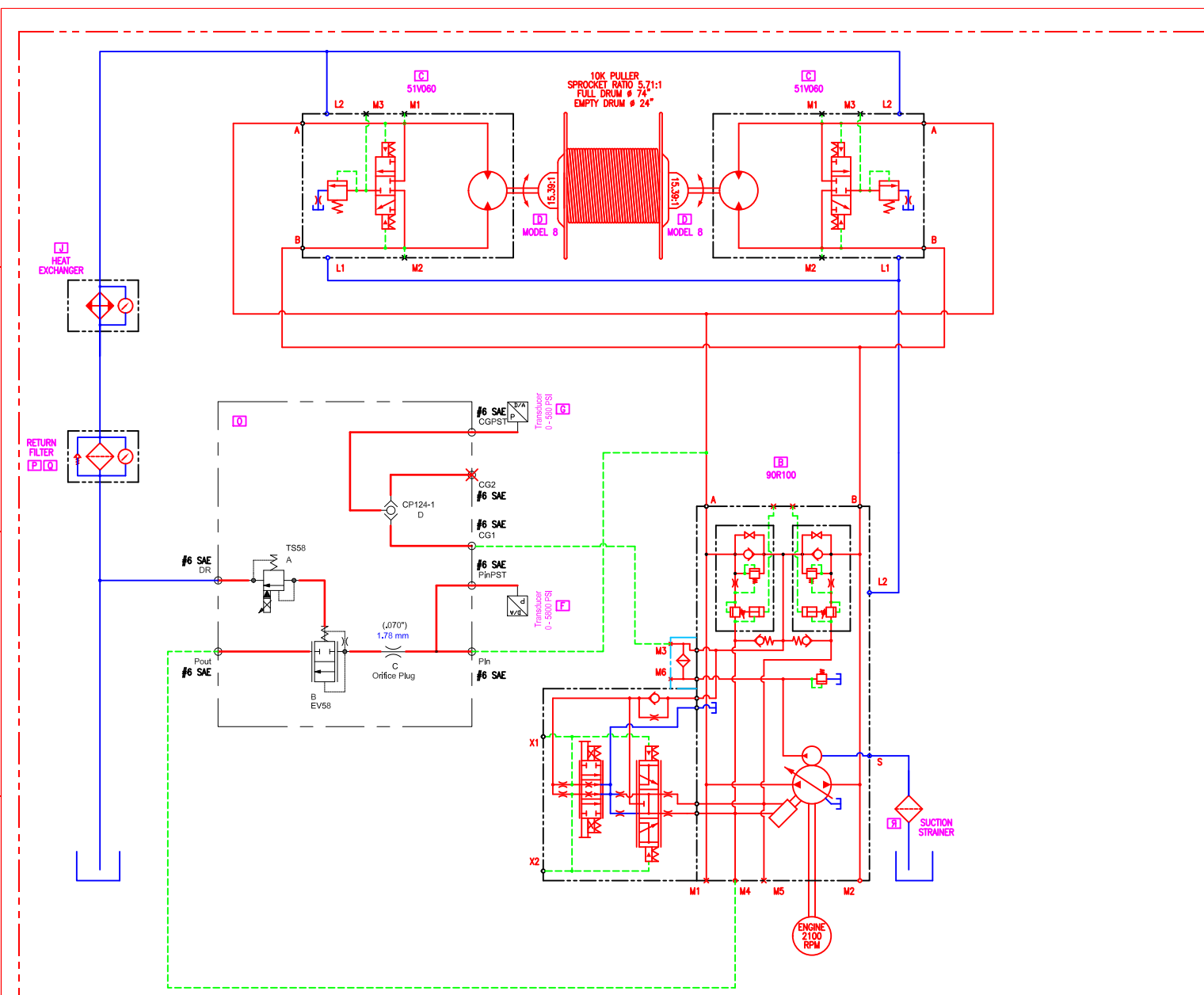
10K plus1 wiring terminals



ODP100PPS units A001 + A020

Levelwind controls





REVISIONS		
DESCRIPTION	DATE	REV
X		X

REV	QTY	P/N	DESCRIPTION
DR	1	n/a	SUCTION SCREEN
DO	1	n/a	FILTER ELEMENT
DP	1	n/a	FILTER HEAD
DO	1	n/a	Constant Tension Press Lim Man
DU	1	11067500_p1	Screw/Level Wind Manifold
DM	1	PC20	PROP CONTROLLER
DL	1	10T00946	50 pin connector kit
DK	1	10T00900	MC5010 CONTROLLER
DJ	1	M-40	HEAT EXCHANGER
DI	1	J56000YCANFSCN31A40BNNRRRNNRR	JOYSTICK
DH	1	10T00890	Display DP600
DG	1	11044545	0 to 40 bar [580 psi]
DF	1	11044548	0 to 400 bar [5800 psi]
DE	1	1035090	SONIC SENSOR
DD	2	8S2C1415F585T	PLANETARY W/BRAKE & SPINDLE
DC	2	51V060R51N1B1VBG0ACAD18E4D400	HYDROSTATIC MOTOR
DB	1	X	X
DA	1	90R100KP1A860S4F1E03GBA292924	FRONT HYDROSTATIC PUMP

LOC	REV	DESCRIPTION	CHK'D	INT	6-23-09
SHEET 1 OF 1					
DRAWN BY: LUTZ					
FILE NAME: N/A					
CHECKED: N/A					

THIS DRAWING CONTAINS INFORMATION PROPRIETARY TO BERENDSEN FLUID POWER. IT IS SUBMITTED IN CONFIDENCE AND IS TO BE SOLELY FOR THE PURPOSE OR PROJECT FOR WHICH IT IS FURNISHED AND RETURNED UPON REQUEST. NO ALTERATION OR MODIFICATION OF THE INFORMATION CONTAINED HEREIN IS TO BE MADE WITHOUT FIRST OBTAINING THE WRITTEN APPROVAL OF BERENDSEN FLUID POWER. THIS DRAWING AND SUCH INFORMATION IS NOT TO BE REPRODUCED, TRANSMITTED, DISCLOSED OR USED OTHERWISE IN WHOLE OR IN PART WITHOUT THE WRITTEN AUTHORIZATION OF BERENDSEN FLUID POWER. ANY REPRODUCTION, TRANSMISSION, DISCLOSURE OR USE OF THE INFORMATION CONTAINED HEREIN WITHOUT THE WRITTEN AUTHORIZATION OF BERENDSEN FLUID POWER IS AT THE SOLE RISK OF THE USER AND WITHOUT LIABILITY TO BERENDSEN FLUID POWER.

TITLE: **HOGG & DAVIS**
10K Constant Tension

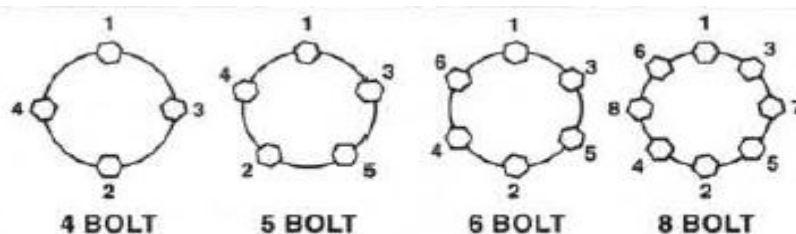
DATE	SCALE	SIZE	TOLERANCE UNLESS NOTED	DRAWING NUMBER	REV
6-23-09	N/A	D	UNLESS NOTED FINISHES: A1/32 0 PLACE 0.001 2 PLACE 0.001 0.010 1 PLACE 0.0005 3 PLACE 0.0005 0.005 2 PLACE 0.010mm	1198	S2

Wheel Torque Requirements

Be sure to use only the fasteners matched to the cone angle of your wheel (usually 60° or 90°). The proper procedure for attaching your wheels is as follows:

1. Start all bolts or nuts by hand to prevent cross threading.
2. Tighten bolts or nuts in the sequence shown for wheel torque requirements.
3. The tightening of the fasteners should be done in stages. Following the recommended sequence, tighten fasteners as shown in the chart below.
4. Wheel nuts/bolts should be torqued before first road use and after each wheel removal. Check and re-torque after the first 10 miles, 25 miles and again at 50 miles. Check periodically thereafter.

Wheel Size	1st Stage	2nd Stage	3rd Stage
12"	20-25	35-40	50-75
13"	20-25	35-40	50-75
14"	20-25	50-60	90-120
15"	20-25	50-60	90-120
16"	20-25	50-60	90-120
16.5" x 6.75"	20-25	50-60	90-120
16.5" x 9.75"	55-60	120-125	175-225
14.5" Demount	Tighten Sequentially to		85-95
17.5" Hub Pilot Clamp Ring & Cone Nuts	50-60	100-120	190-210
17.5" Hub Pilot 5/8" Flange Nuts	50-60	90-200	275-325



Maximum Wheel Fastener Torque

The wheel mounting studs used on Dexter Axles conforms to the SAE standards for grade 8. The maximum torque level that can be safely applied to these studs is listed in the following chart:

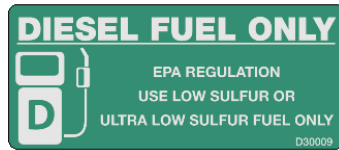
Stud Size	Max. Torque
1/2"-20 UNF, class 2A	120 lb ft.
9/16"-18, class 2A	170 lb ft.
5/8"-18, class 2A	325 lb ft.

CAUTION

Exceeding the above listed torque limits can damage studs and/or nuts and lead to eventual fractures and dangerous wheel separation.



D30001
(1)



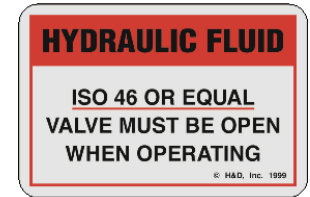
D30009
(1)



D30010
(3)



D30015
(2)



D30033
(1)



D30042
(10)



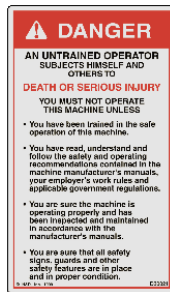
D30090
(2)



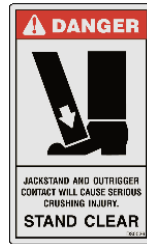
D30034
(3)



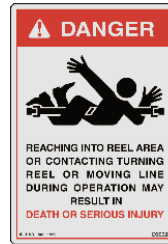
D30017
(1)



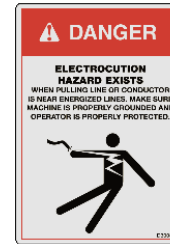
D30021
(1)



D30026
(3)



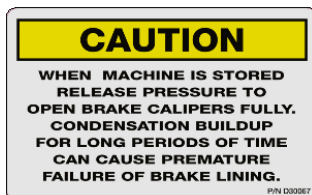
D30028
(5)



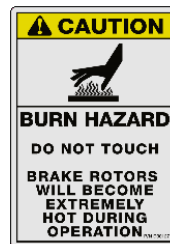
D30036
(4)



D30081
(2)



D30067
(2)



D30127
(2)



D30069
(2)



D30080
(2)

CAUTION

THE REEL DRIVE DOG PINS MUST BE INSTALLED PRIOR TO OPERATION. FAILURE TO DO SO COULD RESULT IN MACHINE DAMAGE AND MAY ALLOW REEL TO BECOME DISENGAGE DURING OPERATION

D30091
(1)

PULLING CONTROL
The following instructions explain how to properly set up the unit.

1. Release the Hydraulic Overspin brake
2. Set Job Pull Setting under MENU > SET PULL
3. Return to MAIN OPERATOR SCREEN
4. Increase to FULL THROTTLE
5. Squeeze trigger switch and move joystick to take-up
6. Adjust line speed with joystick
7. Return joystick to neutral to stop pull and set holding brake.

FREE WHEEL PROCEDURE
Adjust the reel brake to provide tension to the reel. Remove the Dog Pin and disengage the Reel Drive Dogs. Replace Pin. Begin to pull rope while adjusting the over spin brake. When rope is installed, engage the Reel Drive Dogs and Pin.

SYSTEM BRAKES
The internal braking system is spring applied / hydraulic release on the drive motors. When the joystick is in neutral, the brakes are automatically applied. When system pressure is increased for the desired pull settings, the brakes will release when the draw system has built the pressure needed to maintain line tension.

PAY OUT UNDER POWER
The machine is designed to pay out under power only when the Pay Out release is pressed during operation from neutral to pay out. The unit NOT pay out by actuating the joystick without pressing the switch.

D30103
(1)

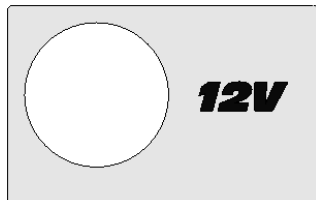
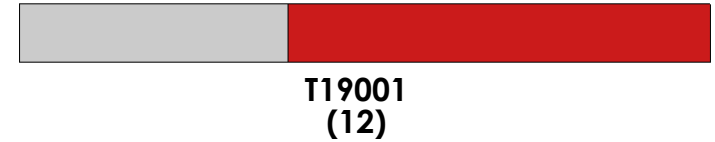
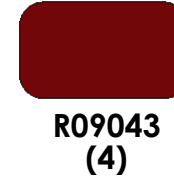
CAUTION

THE REEL DRIVE DOG PINS MUST BE INSTALLED PRIOR TO OPERATION. FAILURE TO DO SO COULD RESULT IN MACHINE DAMAGE AND MAY ALLOW REEL TO BECOME DISENGAGED DURING OPERATION

IMPORTANT

WHEN MACHINE IS STORED
RELEASE PRESSURE TO
OPEN BRAKE CALIPERS FULLY.
CONDENSATION BUILDUP
FOR LONG PERIODS OF TIME
CAN CAUSE PREMATURE
FAILURE OF BRAKE LINING

D30105
(1)



D30083
(1)

SENSOR HEAT

LEVELWIND

OVERSPIN BRAKE PRESSURE

SPARE

SPARE

HI-LO SPEED

PAY-OUT RELEASE

HYDROSTATIC BRAKE

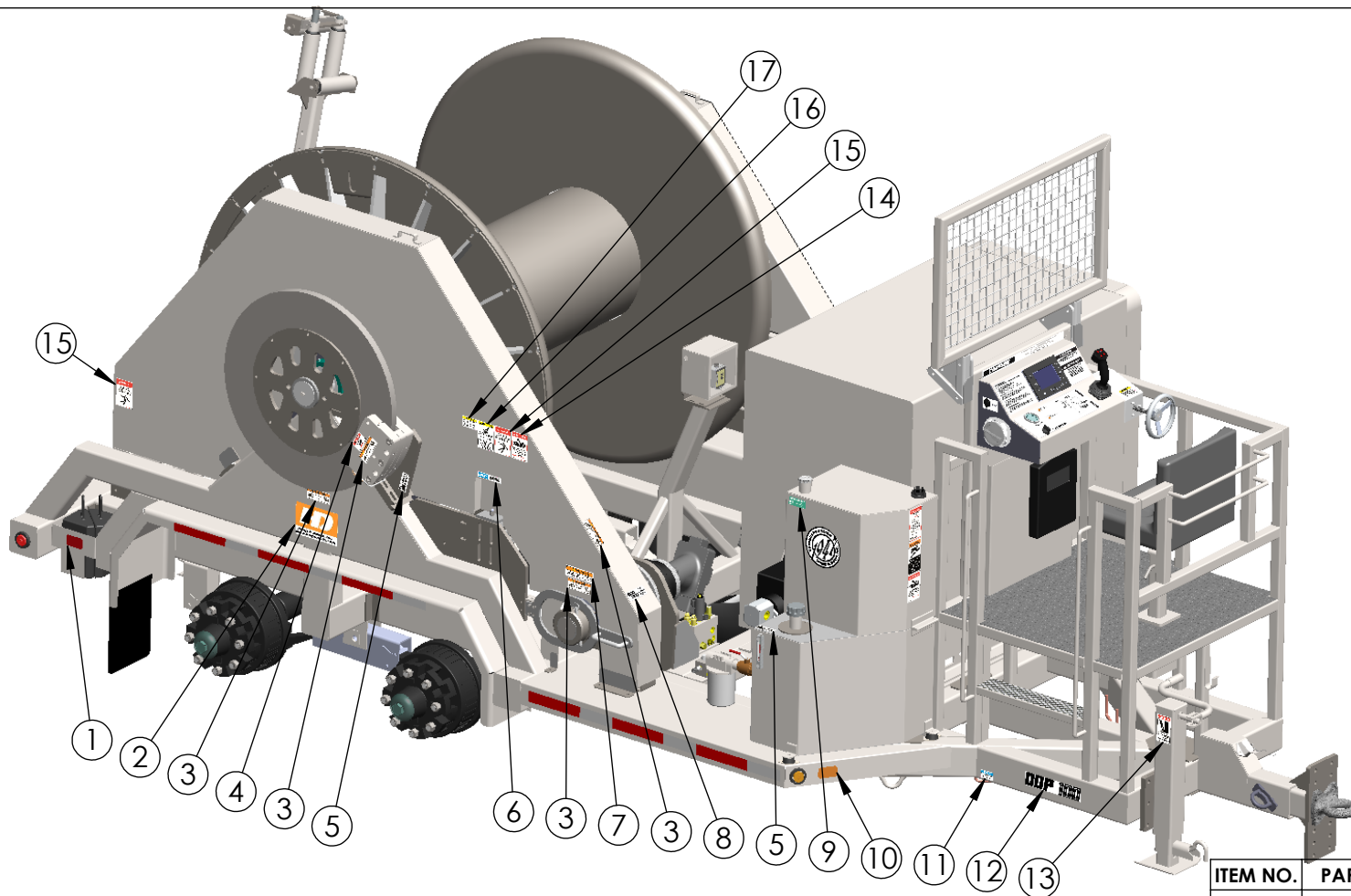
OPERATOR PRESENCE TRIGGER

PAY OUT

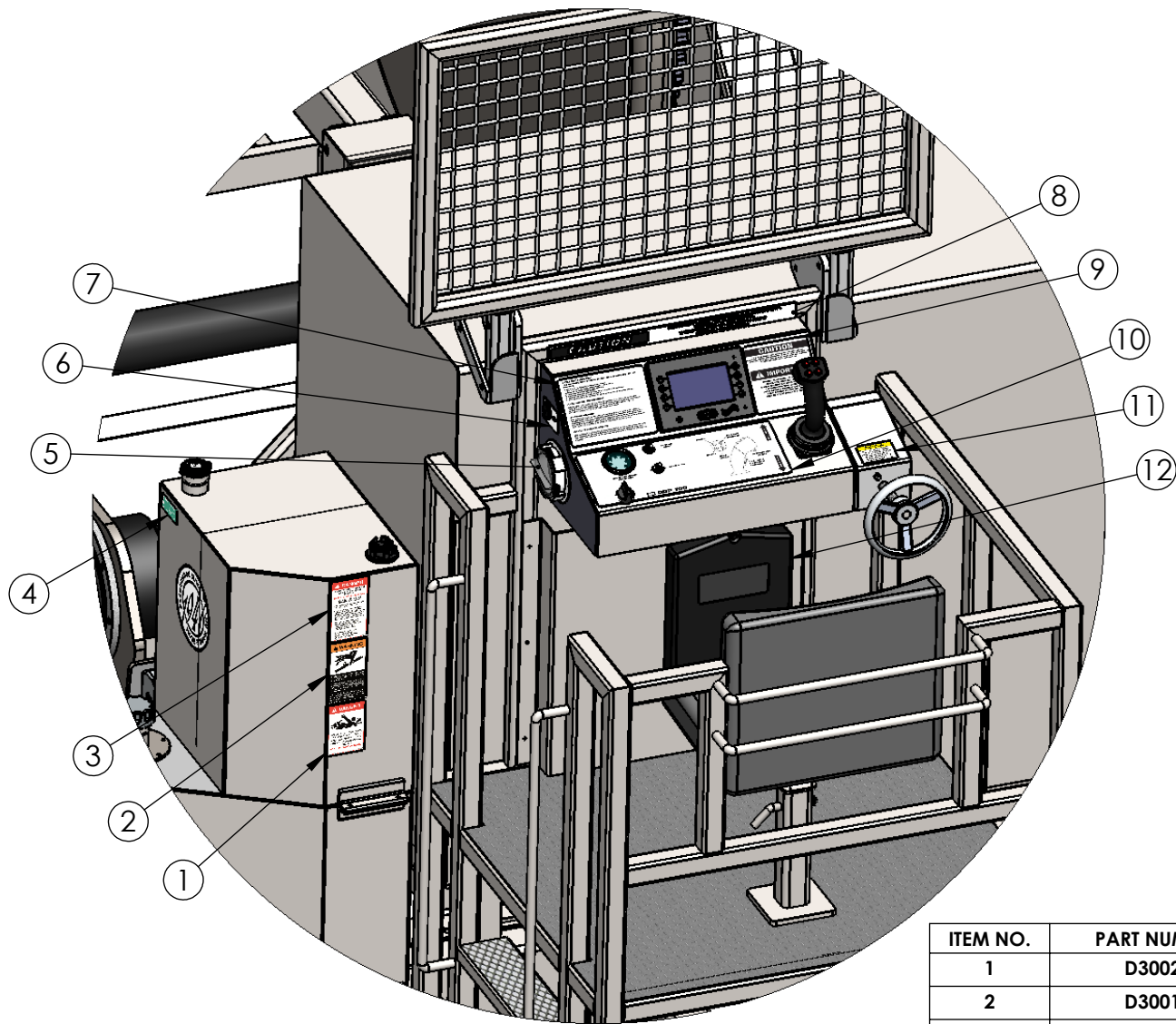
TAKE UP

HD ODP 100

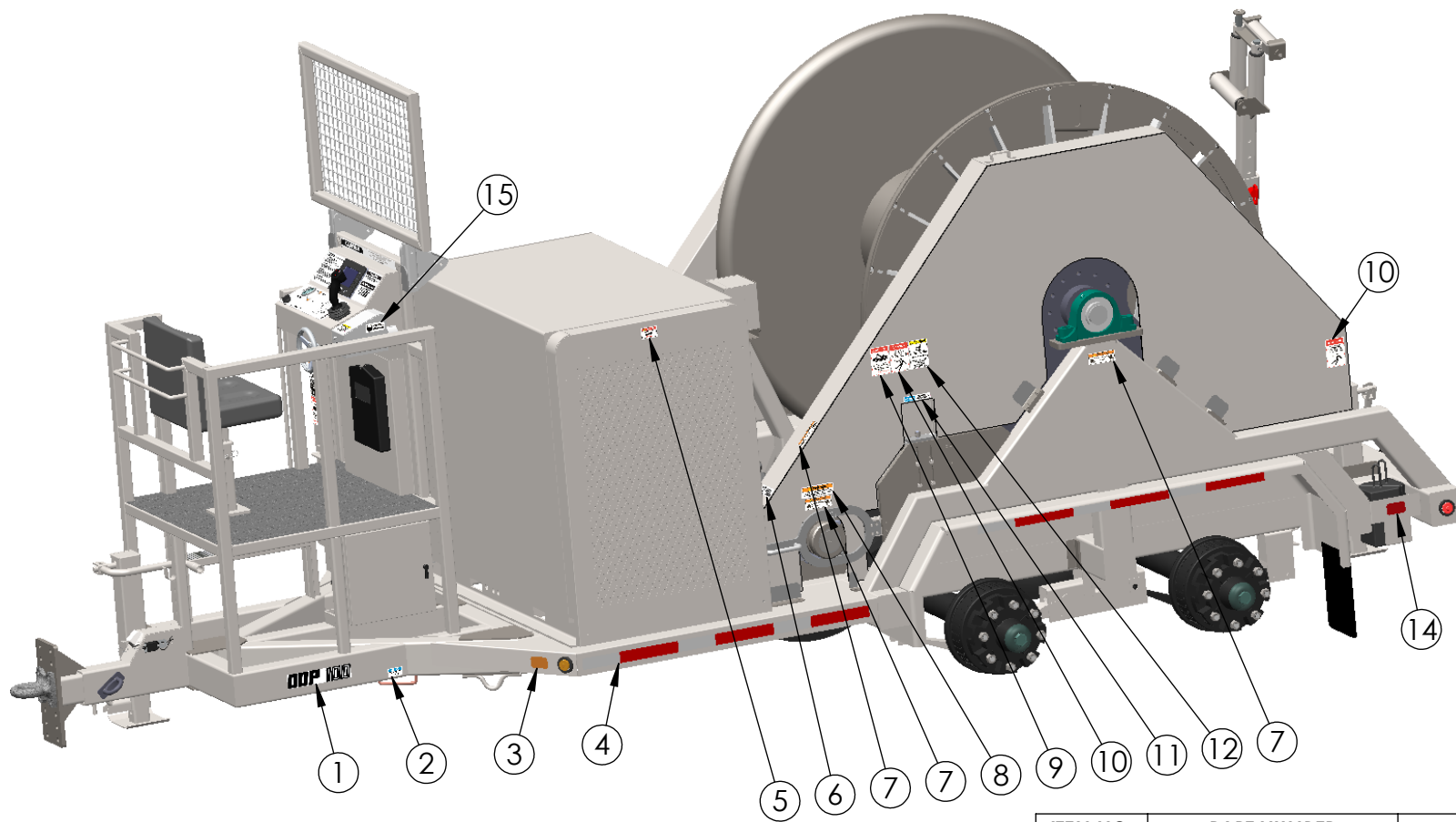
D30104
(1)



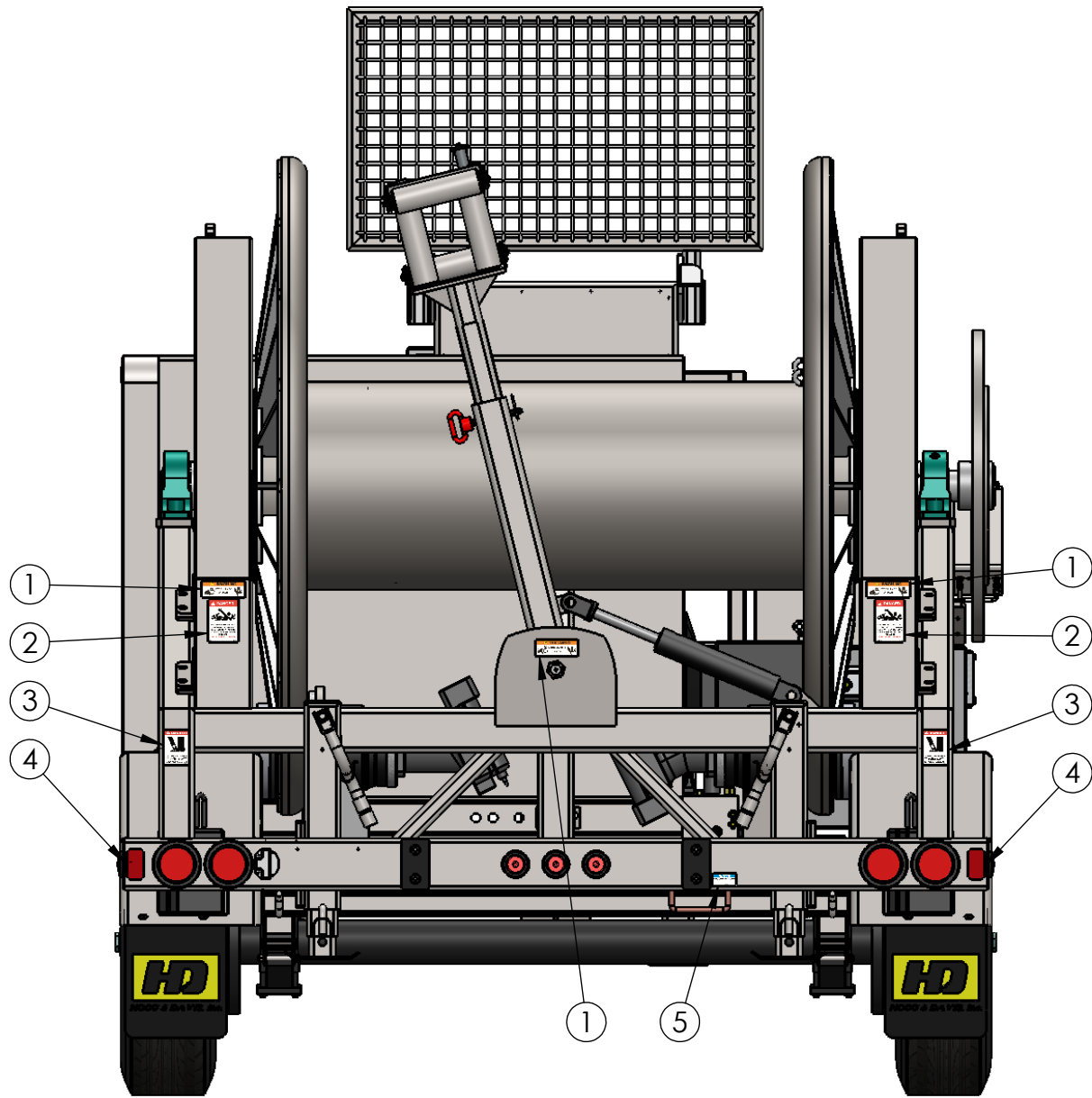
ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	R09043	Reflector, Red 2x3-1/2	4
2	D30001	HD Logo 6x9	1
3	D30042	Decal, Keep Hands Clear	10
4	D30015	Decal, Hot Surface	2
5	D30010	Decal, Hydraulic Fluid Only	3
6	D30069	Decal, Lubricate Chain Daily	2
7	D30080	Decal, Caution Drive Dogs	2
8	D30081	Decal, Reel Drive Dog Engage	2
9	D30009	Decal, Diesel Fuel Only	1
10	R09044	Reflector, Amber 2x3-1/2	2
11	D30034	Decal, Grounding Lug	3
12	D30090	Tongue Decal ODP100	2
13	D30026	Decal, Danger Stand Clear	3
14	D30028	Decal, Danger Twisty Man	5
15	D30036	Decal, Electrocution Hazard	4
16	D30127	Decal, Burn Hazard	2
17	D30067	Decal, Release Pressure	2



ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	D30028	Decal, Danger Twisty Man	5
2	D30017	Decal, Danger Fluid Pressure	1
3	D30021	Decal, Untrained Operator	1
4	D30009	Decal, Diesel Fuel Only	1
5	H10020	Holder, Registration	1
6	D30083	Decal, 12v Socket	1
7	D30103	Decal, Upper Control 1	1
8	D30091	Decal, Drive Dog Pin	1
9	D30105	Decal, Upper Control 2	1
10	D30104	Decal, Lower Control	1
11	D30067	Decal, Release Pressure	2
12	H10075	Holder, Manual	1



ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	D30090	Tongue Decal ODP100	2
2	D30034	Decal, Grounding Lug	3
3	R09044	Reflector, Amber 2x3-1/2	2
4	T19001	Red/White Reflective tape	12
5	D30015	Decal, Hot Surface	2
6	D30081	Decal, Reel Drive Dog Engage	2
7	D30042	Decal, Keep Hands Clear	10
8	D30080	Decal, Caution Drive Dogs	2
9	D30028	Decal, Danger Twisty Man	5
10	D30036	Decal, Electrocution Hazard	4
11	D30069	Decal, Lubricate Chain Daily	2
12	D30127	Decal, Burn Hazard	2
13	D30001	HD Logo 6x9	1
14	R09043	Reflector, Red 2x3-1/2	4
15	D30010	Decal, Hydraulic Fluid Only	3



ITEM NO.	PART NUMBER	DESCRIPTION	QTY.
1	D30042	Decal, Keep Hands Clear	10
2	D30028	Decal, Danger Twisty Man	5
3	D30026	Decal, Danger Stand Clear	3
4	R09043	Reflector, Red 2x3-1/2	4
5	D30034	Decal, Grounding Lug	3

Step 4: Crack fitting to let any trapped air out
not all systems may have a gauge

Step 3: Crack bleeder and pump oil through system until no more air comes out of caliper

Step 5: Pump system up to 500psi and look for leaks. When finished, let the pressure in the system reach zero, then disconnect oil supply.

Step 2: Attach pressurized hydraulic oil source to connector if needed

ISO46 hydraulic oil

Step 1: Back handle all the way out, turn in 1-1/2 turns.

C28072 male quick connect fitting

Pad set - P01011
pads are 3/8" thick

