FP7K & FP7K-XLT

7000 lb Capacity Service/Storage Lift

Installation & Operation Manual



7,000 LB. / 9,000 LB. STORAGE / SERVICE

LIFT

7,000 lb./ 9,000 lb. capacity and large 3" cylinder, one-piece diamond-plate runways and scratch-resistant powder coat paint.

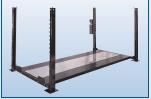


Features:

- 7,000 lb./9,000 lb.
 lifting capacity
- Carriages completely enclosed for safety
- Aircraft quality cables rated at 14,500 lbs.
- 18" wide runways formed with one piece %6" non-skid diamond plate
- Hydraulic pump available in 110 or 220 vac
- Easy operation—lock handle is located by power unit minimizing any bending or squatting
- Large 3" diameter cylinder is located safely under runway

-Options

SPECIFICATIONS	FP9K (Not Shown)	FP7K	FP7K-XLT (Not Shown)
Lifting capacity	9,000 lbs.	7,000 lbs.	7,000 lbs.
Overall length (to outside base plates)	175"	170"	190"
Total width (to outside base plates)	103.38"	108.38"	108.38"
Overall height	82"	82"	92"
Track length (without ramp)	165"	160"	180"
Track width	18 %"	18 ¾"	18 %"
Rate of lift	90 sec.	90 sec.	100 sec.
Width between posts	94"	99"	99"
Maximum clearance under tracks	68"	64"	74"
Shipping weight	1,485 lbs.	1,485 lbs.	1,680 lbs.





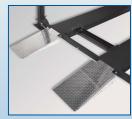
One-Step Caster Kit

Easy to install with no tools— simply pin them on, lower lift, casters automatically lift the columns; allows mobility with or without a vehicle; turn lift sideways to park two vehicles underneath.



Solid Deck Option

Large storage area. Two diamond plate platforms drop between tracks for storage of snowmobiles, ATVs and garden equipment. Available in steel or lightweight aluminum.



Aluminum Approach Ramps

These lightweight ramps weigh only 18 lbs. each compared with the 53 lbs. of standard ramps.

Stackable Poly Drip Trays, 3

Lightweight polyethylene; stackable: simply slide to back and stack! 8" or 12" widths.

TUXEDO DISTRIBUTORS LIMITED WARRANTY

Structural Warranty:

The following parts and structural components carry a five year warranty:

Columns Top Rail Beam Uprights Arms Swivel Pins

Legs Carriages Tracks Overhead Beam Cross Rails

Limited One-Year Warranty:

Tuxedo Distributors, LLC ("Tuxedo") offers a limited one-year warranty to the original purchaser of Tuxedo lifts and Wheel Service in the United States and Canada. Tuxedo will replace, without charge, any part found defective in materials or workmanship under normal use, for a period of one year after purchase. The purchaser is responsible for all shipping charges. This warranty does not apply to equipment that has been improperly installed or altered or that has not been operated or maintained according to specifications.

Other Limitations:

This warranty does not cover:

- 1. Parts needed for normal maintenance
- 2. Wear parts, including but not limited to cables, slider blocks, chains, rubber pads and pulleys
- 3. Replacement of lift and tire changer cylinders after the first 30 days. A seal kit and installation instructions will be sent for repairs thereafter.
- 4. On-site labor

Upon receipt, the customer must visually inspect the equipment for any potential freight damage before signing clear on the shipping receipt. Freight damage is not considered a warranty issue and therefore must be noted for any potential recovery with the shipping company.

The customer is required to notify Tuxedo of any missing parts within 72 hours. Timely notification must be received to be covered under warranty.

Tuxedo will replace any defective part under warranty at no charge as soon as such parts become available from the manufacturer. No guarantee is given as to the immediate availability of replacement parts.

Tuxedo reserves the right to make improvements and/or design changes to its lifts without any obligation to previously sold, assembled or fabricated equipment.

There is no other express warranty on the Tuxedo lifts and this warranty is exclusive of and in lieu of all other warranties, expressed or implied, including all warranties of merchantability and fitness for a particular purpose.

To the fullest extent allowed by law, Tuxedo shall not be liable for loss of use, cost of cover, lost profits, inconvenience, lost time, commercial loss or other incidental or consequential damages.

This Limited Warranty is granted to the original purchaser only and is not transferable or assignable.

Some states do not allow exclusion or limitation of consequential damages or how long an implied warranty lasts, so the above limitations and exclusions may not apply. This warranty gives you specific legal rights and you may have other rights, which may vary from state to state.

7,000lb capacity 4 Post Lift Installation Manual

Parts Checklist

	Miles in the least of the control of
1	Main side track with 9/16" hole on cylinder end complete with cylinder,
	hose and connector
1	Offside track
2	Cross Rails pre-assembled with pulleys, pulley covers, and slider blocks
4	Columns with top caps and bolts
2	Short rods with heim ends
1	Long rod with heim ends
1	½" x 50" Bent Rod
4	Ramp Clips
4	Removable Wheel Stop
	Ms7000 // ms7000XLT cables with hardware
1	8' 4" Cable //
1	13' 4 ¾" Cable //
1	21' 1/2" Cable //
1	26" 1 3/4" Cable //
1	71" Hose with anti-kink spring and fittings
2	18" x 80" Plastic Sheets
1	Power Unit
2	Drive on Ramps
1	Bolt Box that includes the following:
16	Anchors for optional bolting to floor
8	Bolts, nuts, washers and lock washers for securing ramps
4	Bolts, nuts and washers for mounting power unit

Note: save packing bolts for installing top caps

Options:

Caster Kit with 4 caster pins Jack Tray Drip Tray Solid Deck

Important Notes

- 1. Always inspect the lift for damage and make note of any damage on the bill of lading.
- 2. In case of freight damage, call the truck line immediately and report the damage as a freight claim.
- 3. Always read the directions.
- Do a thorough inventory of your parts and measure your cables.
- 5. Never raise a car until you have double-checked all bolts and nuts and hose fittings.
- 6. Always level and check for leaks. Never stand or store a car under this lift without the locks engaged.
- 7. Please obtain a qualified electrician to provide wiring in compliance with your local electrical codes.

Tools Required

- 1. Metric Open or box end wrenches
- Metric socket set.
- 3. Large adjustable wrench.
- 4. Vise grips or locking pliers.
- 5. Large punch to align holes.

Make sure you have extra help or heavy duty lifting equipment when unloading and assembling. Make sure you have enough room to install the lock rods, at least a 9' clearance. The power unit may be installed on the driver's front corner or the passenger rear corner.

Installation Time

The lift should take between four and six hours to install.

Hydraulic Oil

Use AW-32 or ISO-32 hydraulic oil for your power unit. (10wt non-detergent hydraulic oil) DO NOT USE DEXRON. It will damage the seals and shorten the life of your hydraulic components.

Floor Plan

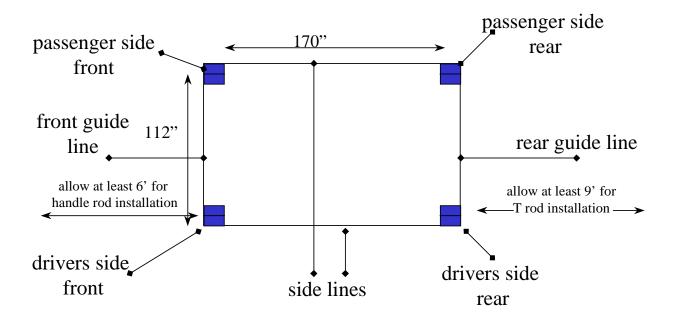


figure 1

BEFORE ATTEMPTING TO ASSEMBLE THIS LIFT STUDY FLOOR PLAN CAREFULLY. MAKE SURE YOU HAVE ENOUGH ROOM. KEEP FLOOR PLAN AREA CLEAR OF LIFT COMPONENTS UNTIL THEY ARE READY TO BE INSTALLED. TAKE SPECIAL NOTE OF SPACE NEEDED FOR SAFETY ROD ASSEMBLY

A.COLUMN AND CROSSBAR ASSEMBLY

- Locate the four columns. One column has a bracket for the power unit. Determine placement of power unit column. (drivers side front or passenger side rear) For this installation we will be placing the power unit in the drivers side front position.
- 2. Take column with the power unit bracket and stand it up in the *drivers side front* corner (see fig.1) with the opening facing in and the lock blocks located on the right side of the column opening (as you stand facing the opening) along the front guide line.
- 3. Stand up another column in *passenger side front* position. Make sure that the opening is facing in towards the *drivers side front* column and the lock blocks are on the left side of the column opening, along the front guide line.
- 4. Tilt the columns back and lay each on the ground along the side guide lines. Remove the top caps.
- 5. Place a crossbar at the top of the 2 columns. Be sure that the spring loaded lock latches at either end of the crossbar are facing up, with bevel side up.
- 6. With a helper slide the cross rail into the top of the columns. In order to lower the cross rail all the way down it will be necessary to manually hold the lock latches out of the way of the stop blocks. Release latches to engage the lowest lock blocks(16" off the ground). Stand the assembly up.
- 7. Repeat process for rear columns and cross rail. Make sure the lock blocks on the driver's side rear column are on the left of the column opening along the rear guide line, and that the lock blocks on the passenger side rear column are on the right side of the column opening along the rear guide line. When complete the cross rails will be approximately 160" apart.

B. TRACK INSTALLATION

- 1. Locate the track with the cylinder attached underneath. Now find the ¾" hole in the side of the ramp. This hole will be positioned next to the power post (*driver's side front*). The ledge running down the side of the ramp always goes on the inside. (it's used to support the drip trays and other options)
- 2. To aid lifting, position the track on two 2x4s or blocks on the floor just outside the column assemblies taking care to keep ledge facing in.
- 3. With two people on each end of the track, lift the ends of the track onto the cross rails. You will need to walk one end at a time into the floor plan area to clear the column assemblies. Using a large punch, line up the holes in the cross rail with those on the track and temporarily bolt together using one bolt in each end.
- 4. Install offside track by repeating steps 1 through 3. Remember to keep the ledge running the length of track facing to the inside.
- 5. Locate the 4 drop-in ramp clips and working on one end at a time, carefully remove the track bolts, install the ramp clip, with spacing collars towards cross rail, and reinstall using both bolts and tighten.

C. CABLE INSTALLATION

- 1. Lay out all cables and measure from the inside of the button end to the end of the cable bolt to insure proper cable lengths. See fig.3 for measurements.
- 2. In order to attach the cable buttons to the mounting bracket on the end of the ram, the ram must be extended. Below are two suggested methods of extending ram
 - a. Using the cable mounting-bracket on the end of the ram, pull the ram out with a come-along.

b. Position yourself under the track with your hands gripping the edge of the track, then put your feet against the cable bracket and push the ram out.

IMPORTANT: Take care not to score the ram when pulling the ram manually or tightening the nut. This will ruin the seal.

Since the nub end of the cable is easier end to feed through the pulley, start with the pulley at the end of the crossbar and work your way back to the ram. (Refer to fig 3 for cable routing.)

- 3. Install cable buttons into the appropriate slots in thick plate and secure with slots on thin plate. (see fig3a) Tighten enough so the nylock nut is fully threaded onto the head of the ram and that at least three threads are exposed past the top of the nut. The cable bracket should still be able to move freely on the ram head.
- 4. Run the threaded cable ends into the hole in the top caps and secure with washer and nylock nut.

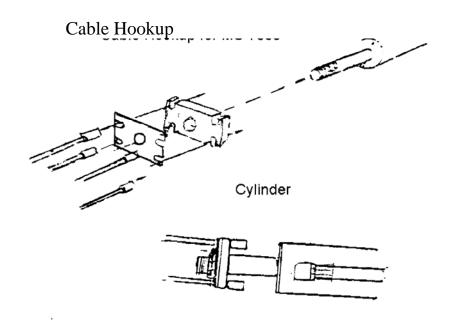


fig 3a

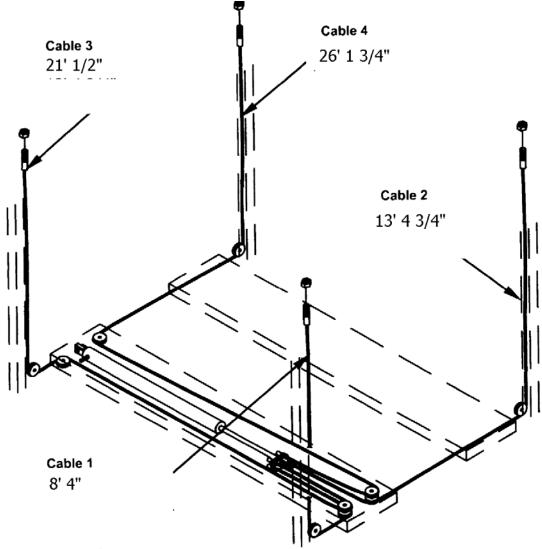


Figure 3

D. HYDRAULIC ASSEMBLY

- 1. Find the 4, 1" x 5/16" bolts, nuts and lock washers. With one helper holding the power unit, line up the holes on power unit with the holes in mounting bracket and attach with the four mounting bolts. Remove the plastic-cap from the port on the power unit and attach the o-ring elbow. Do not over tighten, backing nut and o-ring will complete seal.
- 2. Connect power unit hose (the hose with the spring on it) to the o-ring fitting on the power unit. Do not over-tighten.
- 3. On the end of the cylinder hose, located under the track, remove the backing nut from the bulkhead fitting, insert fitting through hole in side of track and secure with backing nut.

- 4. Attach loose end of power unit hose to the bulk head fitting
- 5. Use 3 gallons of ISO-32 or AW-32 hydraulic oil (can be purchased at local auto parts discount supplier) to fill reservoir (10wt non-detergent hydraulic oil)

F. LOCK LINKAGE ASSEMBLY

Remember: This manual is installing the power column at the driver's side front position

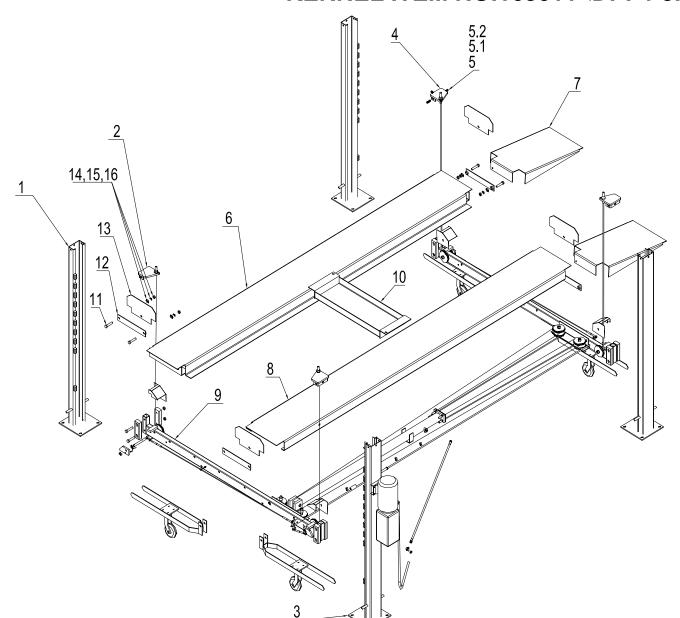
- 1. The single point safety lock is a system of connecting rods and linkage that disengage the four lock latches that secure the lift to each column. Locate the 6 rods:
 - 2 long rods, 2 short rods, 1 handle, 1 tee.
- 2. Starting with the handle, insure that spacer is installed over threaded end of handle and inset rod into hole on cross bar near power column. Take care to run rod through rod guide located under track.
- 3. Install long rod into the hole on the cross rail near the driver's rear column. Make sure the spacer is on the rod and take care to run rod through rod guide.
- 4. Thread nut onto ends of handle rod and "T" rod. With the T on the handle set at 12:00 o'clock and the T on the long rod set at 12:30 when viewed from power unit end, attach coupler and tighten with lock nuts. Rod should be secure but free enough to swing.
- 5. Starting at the power unit end, attach linkage bolt at one end of the long ¼" rod into the hole located in the lock latch near the passenger front column and secure with nut. Attach the other end of the long ¼" rod to the top of the handle T
- 6. Repeat using short ¼" rod attaching to the lock latch near the driver's side front column and attach the other end to the bottom of the handle T
- 7. Repeat process on rear cross rail.

G. FINAL ADJUSTMENTS

- 1. Please obtain a qualified electrician to provide wiring in compliance with your local electrical codes.
- 2. Depress power up button for 10 seconds. Then while continuing to hold power button open release lever for another 5-10 seconds, allowing air to be bled from the system.
- 3. Run power until tracks begin to rise. Go to the top of each column and tighten any cables that are slack. All cables should have even tension and platform must hang level. (Check by using a level on the crossbars). Never adjust cables with a vehicle on the lift. This will damage threads on cable.
- 4. Run lift up and down a few times to insure that the locks are engaging uniformly and that the release mechanism is functioning properly. Have helper check to be sure that far side lock latches are disengaging as fully as the near side lock latches
- 5. With lift all the way down, install the approach ramps and carefully drive a vehicle onto the tracks.
- 6. Run the lift up and down a few times rechecking all function. If cables need to be adjusted vehicle must be removed first or damage to threads on cable will occur.

TX FP7K KERNEL ITEM NO.163011<DPF4-3.2A>

Kernel Edtion 1.0 Mar.2008



Spare Parts List

ITEM	DESCRIPTION	QTY
1	Column parts	2
2	Top plate parts	2
3	Column parts	2
4	Top plate parts	2
5	Galvanized bolt	12
5.1	Flat washer	24
5.2	Galvanized nut	12
6	Punway parts	1
7	Brae	2
8	Punway parts	1
9	Cross beam parts	2
10	Toolbox parts	1
11	Bolt	8
12	Rub blocks	4
13	Ramp broad	4
14	Galvanized flat washer	8
15	Spring washer	8
16	Galvanized nut	8

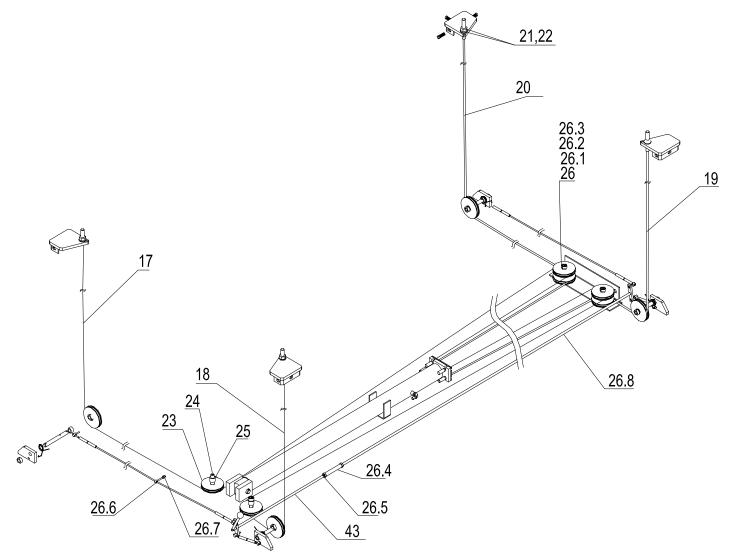
* Easily Worn Parts

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TX FP7K KERNEL ITEM NO.163011<DPF4-3.2A>

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Spare Parts List

ITEM	DESCRIPTION	QTY
17	Steel cable	1
18	Steel cable	1
19	Steel cable	1
20	Steel cable	1
21	Lock nut	4
22	Flat washer	4
23	Pulley	10
24	Core shaft	4
25	Sheath	2
26	Sheath	2
26.1	Flat washer	6
26.2	Bush	6
26.3	Bolt	4
26.4	Aunectent shaft	1
26.5	Galvanized nut	2
26.6	Bolt	2
26.7	Galvanized nut	2
26.8	Up-rights	1
43	Untie lock handle	1

* Easily Worn Parts

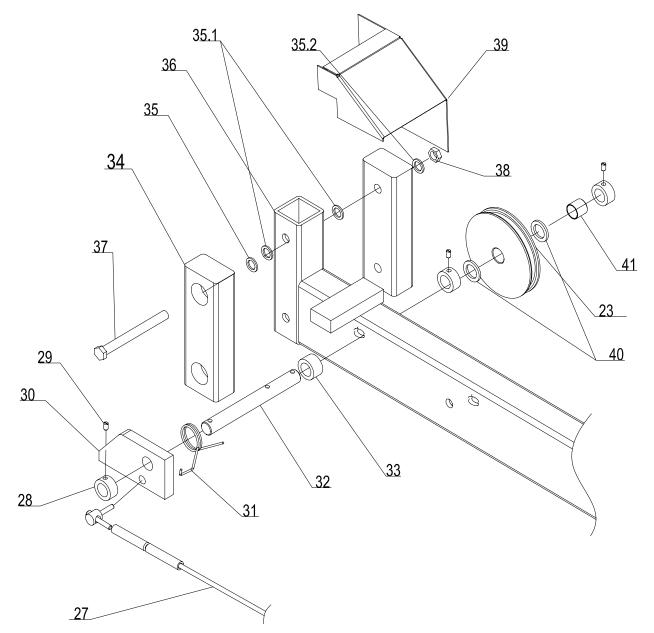
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TX FP7K

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KERNEL ITEM NO.163011<DPF4-3.2A>



Spare Parts List

ITEM	DESCRIPTION	QTY
23	Pulley	10
27	Pole	2
28	Sheath	8
29	Bolt	12
30	Retropack bolt	4
31	Wrest spring(right)	2
32	Bushing	4
33	Spring sheath	4
34	Rubber block	8
35	Washer	32
35.1	Flat washer	16
35.2	Flat washer	24
36	Cross beam parts	2
37	Galvanized bolt	8
38	Galvanized nut	8
39	Cover A	2
40	Flat washer	12
41	Bush	4

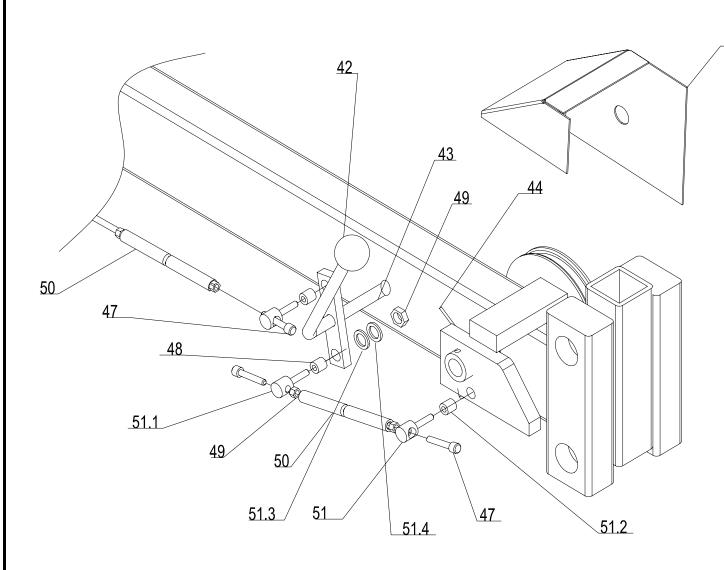
* Easily Worn Parts

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Spare Parts List

ITEM	DESCRIPTION	QTY
42	Bakelite ball	1
43	Untie lock handle	1
44	Wrest spring(left)	2
45	Cover B	2
47	Bolt	8
48	Cover	4
50	Bushing	6
51	Small shaft	4
51.1	Small shaft	4
51.2	Cover	4
51.3	Flat washer	8
51.4	Spring washer	8

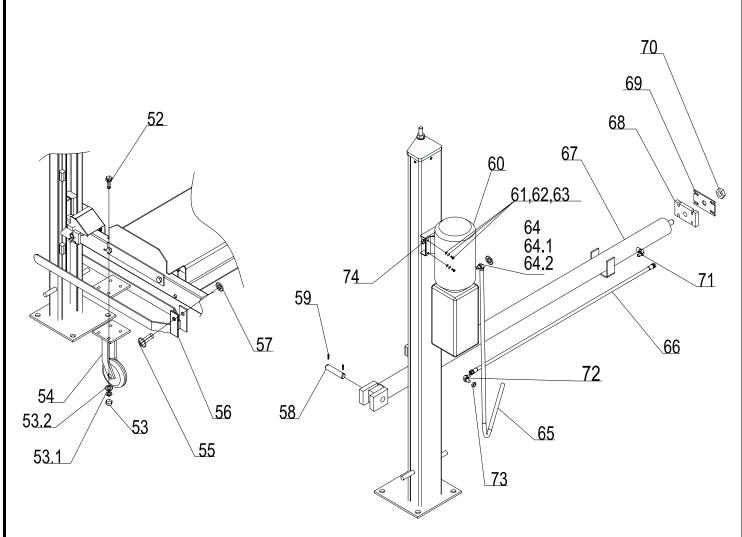
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Spare Parts List

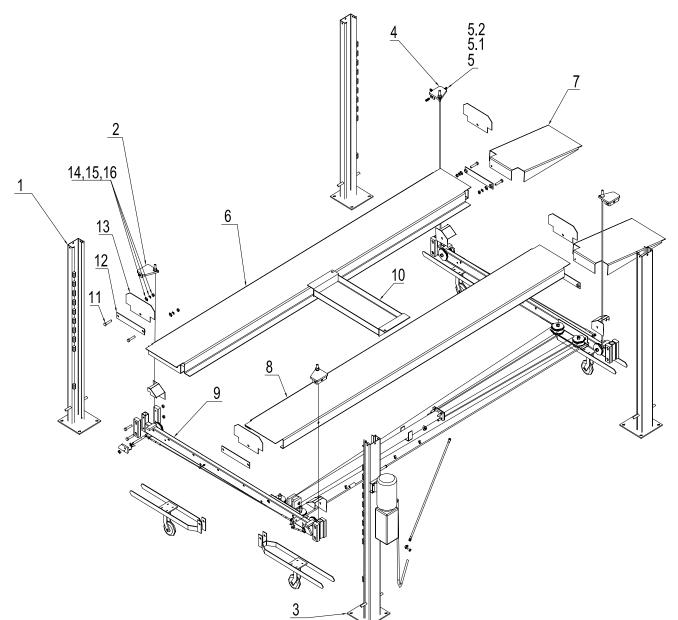
ITEM	DESCRIPTION	QTY
52	Galvanized bolt	16
53	Galvanized nut	16
53.1	Spring washer	16
53.2	Flat washer	16
54	Caster	4
55	Raw pin	4
56	Plank parts	4
57	Spring block	4
58	Hydraulic cylinder pin	1
59	Shaft sheath	2
60	Hydraulic pump	1
61	Flat washer	8
62	Spring washer	4
63	Galvanized bolt	4
64	Right-angled Tie-in	1
64.1	Hydraulic extention	1
64.2	Bushing	1
65	Oil hose	1
66	Oil hose	1
67	Hydraulic cylinder	1
68	Wheel stop plates	1
69	Front of wheel stop plates	1
70	Locknut	1
71	Right-angled Tie-in	1
72	Right-angled Tie-in	1
73	Nut	1
74	Galvanized nut	4

* Easily Worn Parts

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Spare Parts List

ITEM	DESCRIPTION	QTY
1	Column parts	2
2	Top plate parts	2
3	Column parts	2
4	Top plate parts	2
5	Galvanized bolt	12
5.1	Flat washer	24
5.2	Galvanized nut	12
6	Punway parts	1
7	Brae	2
8	Punway parts	1
9	Cross beam parts	2
10	Toolbox parts	1
11	Bolt	8
12	Rub blocks	4
13	Ramp broad	4
14	Galvanized flat washer	8
15	Spring washer	8
16	Galvanized nut	8

* Easily Worn Parts

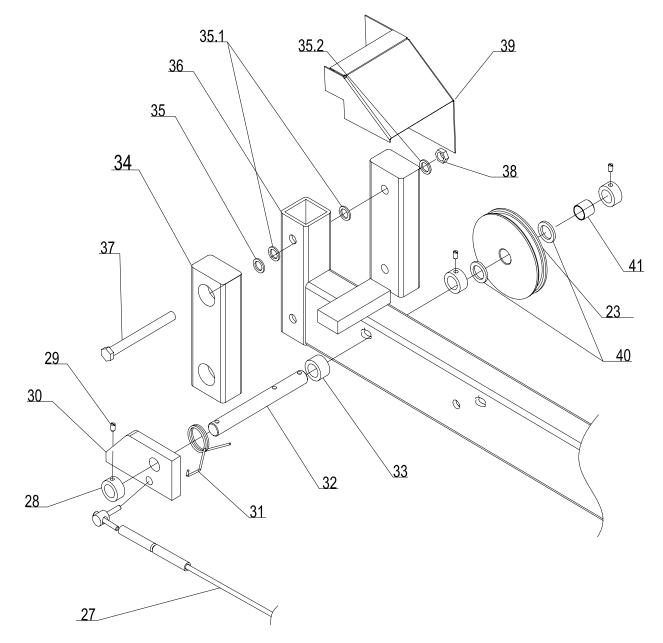
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TX FP7K-XLT

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KERNEL ITEM NO.163013<DPF4-3.2B>



Spare Parts List

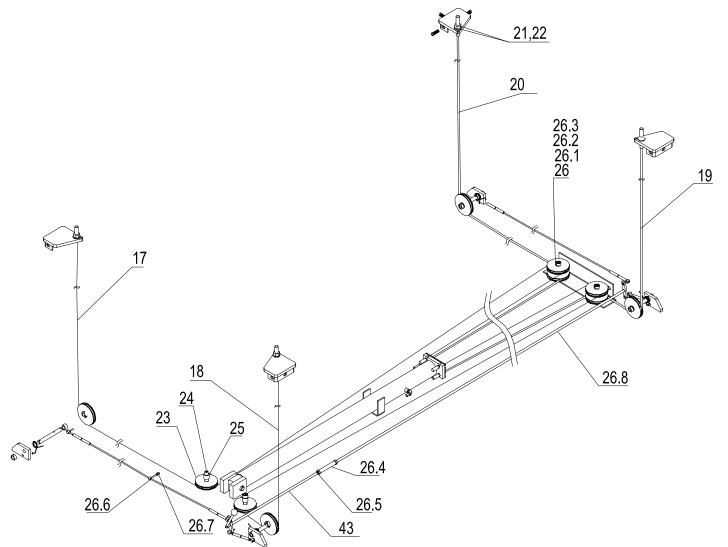
ITEM	DESCRIPTION	QTY
23	Pulley	10
27	Pole	2
28	Sheath	8
29	Bolt	12
30	Retropack bolt	4
31	Wrest spring(right)	2
32	Bushing	4
33	Spring sheath	4
34	Rubber block	8
35	Washer	32
35.1	Flat washer	16
35.2	Flat washer	24
36	Cross beam parts	2
37	Galvanized bolt	8
38	Galvanized nut	8
39	Cover A	2
40	Flat washer	12
41	Bush	4

* Easily Worn Parts

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Spare Parts List

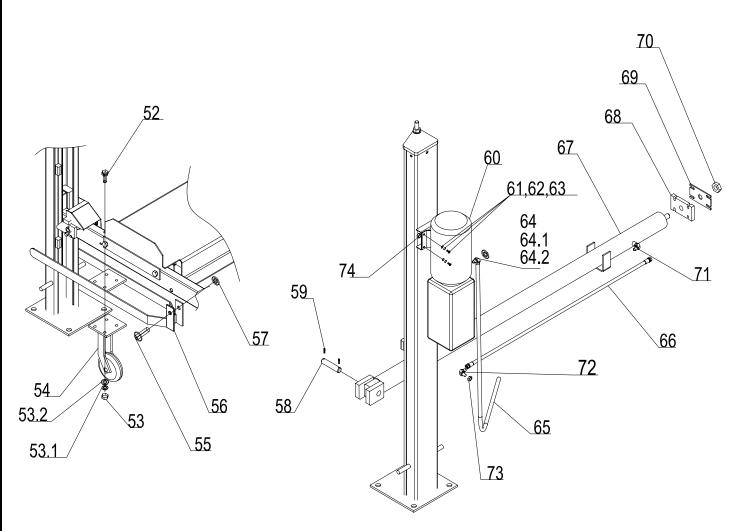
ITEM	DESCRIPTION	QTY
17	Steel cable	1
18	Steel cable	1
19	Steel cable	1
20	Steel cable	1
21	Lock nut	4
22	Flat washer	4
23	Pulley	10
24	Core shaft	4
25	Sheath	2
26	Sheath	2
26.1	Flat washer	6
26.2	Bush	6
26.3	Bolt	4
26.4	Aunectent shaft	1
26.5	Galvanizedn nut	2
26.6	Bolt	2 2 2
26.7	Galvanized nut	2
26.8	Up-rights	1
43	Untie lock handle	1

* Easily Worn Parts

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Spare Parts List

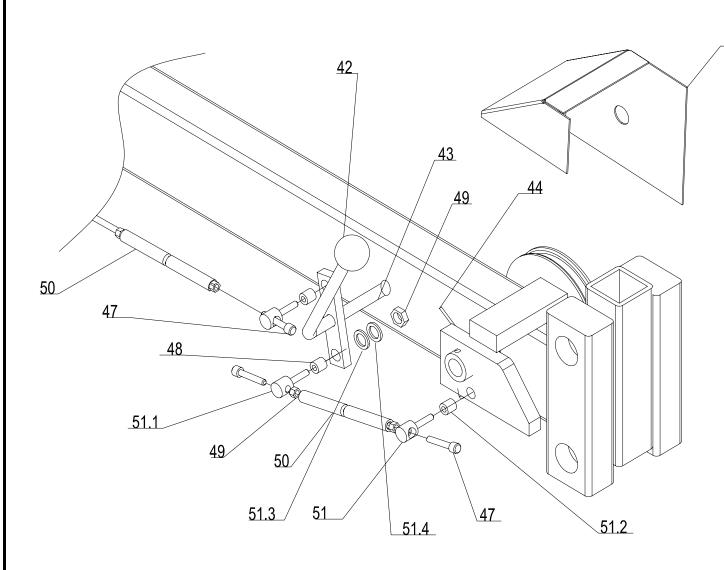
ITEM	DESCRIPTION	QTY
52	Galvanized bolt	16
53	Galvanized nut	16
53.1	Spring washer	16
53.2	Flat washer	16
54	Caster	4
55	Raw pin	4
56	Plank parts	4
57	Spring block	4
58	Hydraulic cylinder pin	1
59	Shaft sheath	2
60	Hydraulic pump	1
61	Flat washer	8
62	Spring washer	4
63	Galvanizantion bolt	4
64	Right-angled Tie-in	1
64.1	Hydraulic extention	1
64.2	Bushing	1
65	Oil hose	1
66	Oil hose	1
67	Hydraulic cylinder	1
68	Wheel stop plates	1
69	Front of wheel stop plates	1
70	Locknut	1
71	Right-angled Tie-in	1
72	Right-angled Tie-in	1
73	Nut	1
74	Galvanized nut	4

* Easily Worn Parts

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Spare Parts List

ITEM	DESCRIPTION	QTY
42	Bakelite ball	1
43	Untie lock handle	1
44	Wrest spring(left)	2
45	Cover B	2
47	Bolt	8
48	Cover	4
50	Bushing	6
51	Small shaft	4
51.1	Small shaft	4
51.2	Cover	4
51.3	Flat washer	8
51.4	Spring washer	8

* Easily Worn Parts

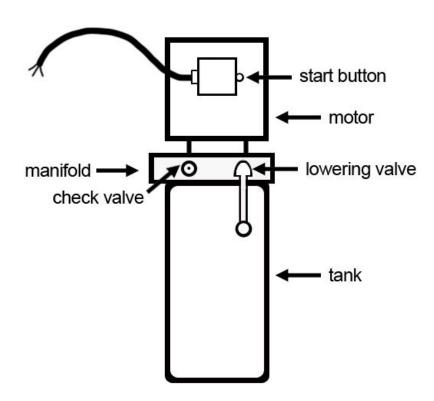
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IMPORTANT

POWER UNIT PRIMING PROCEDURE

THE PROBLEM: Power unit runs fine but will not pump any fluid.

Step 1 – Locate the check valve, the flush plug to the left of the lowering valve. (See drawing below.)



Step 2 – Using an Allen wrench and shop towel – with shop towel in place to catch fluid – loosen the check valve plug 2 ½ turns to allow it to leak.

Step 3 – Push the START button for one second, then release for three seconds. Repeat these steps until unit starts pumping fluid.

Step 4 – Tighten the check valve plug.

YOUR POWER UNIT SHOULD BE PRIMED