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FERTILIZER

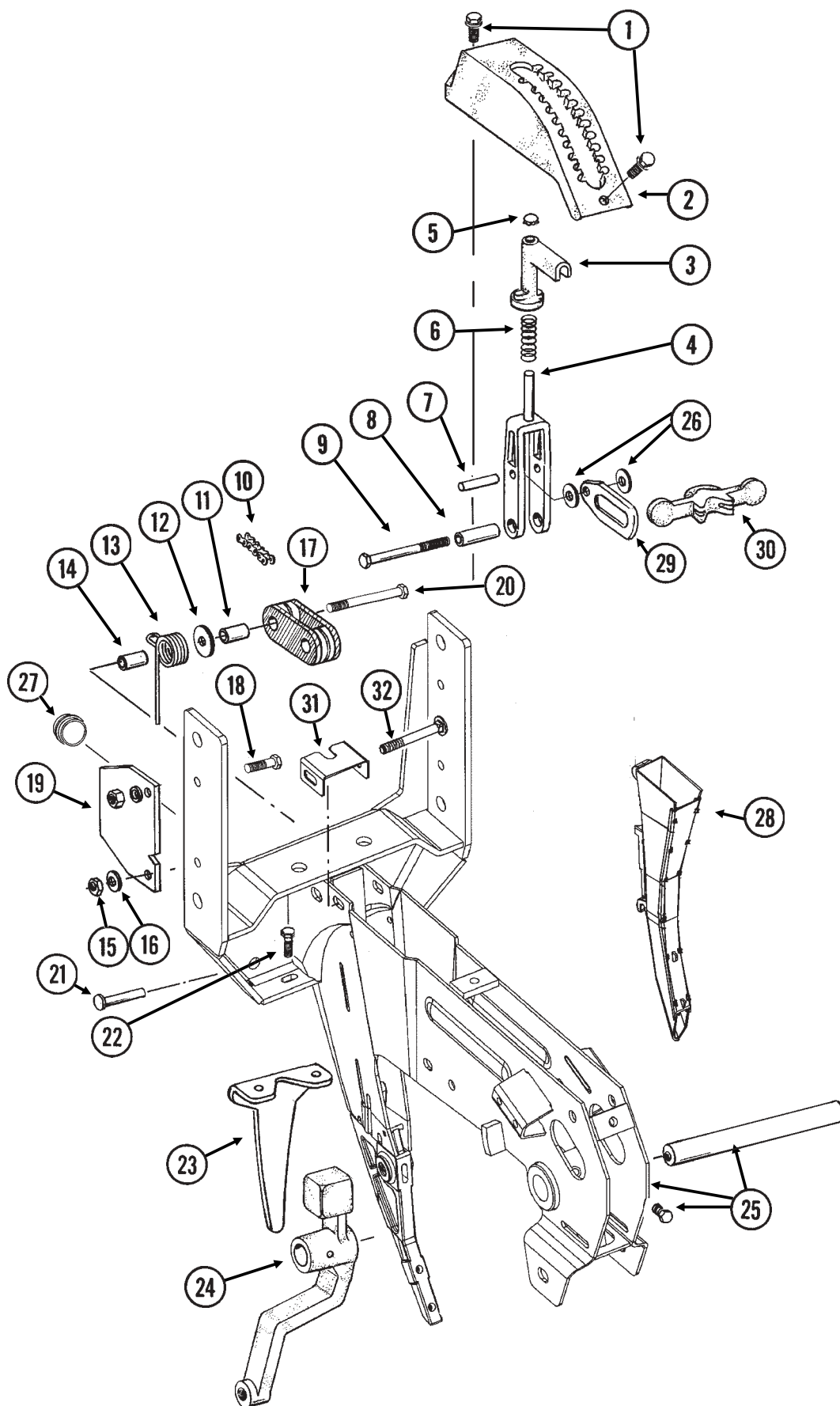
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SHANK ASSEMBLY, SEED TUBE AND DEPTH ADJUSTMENT

(METR29c)

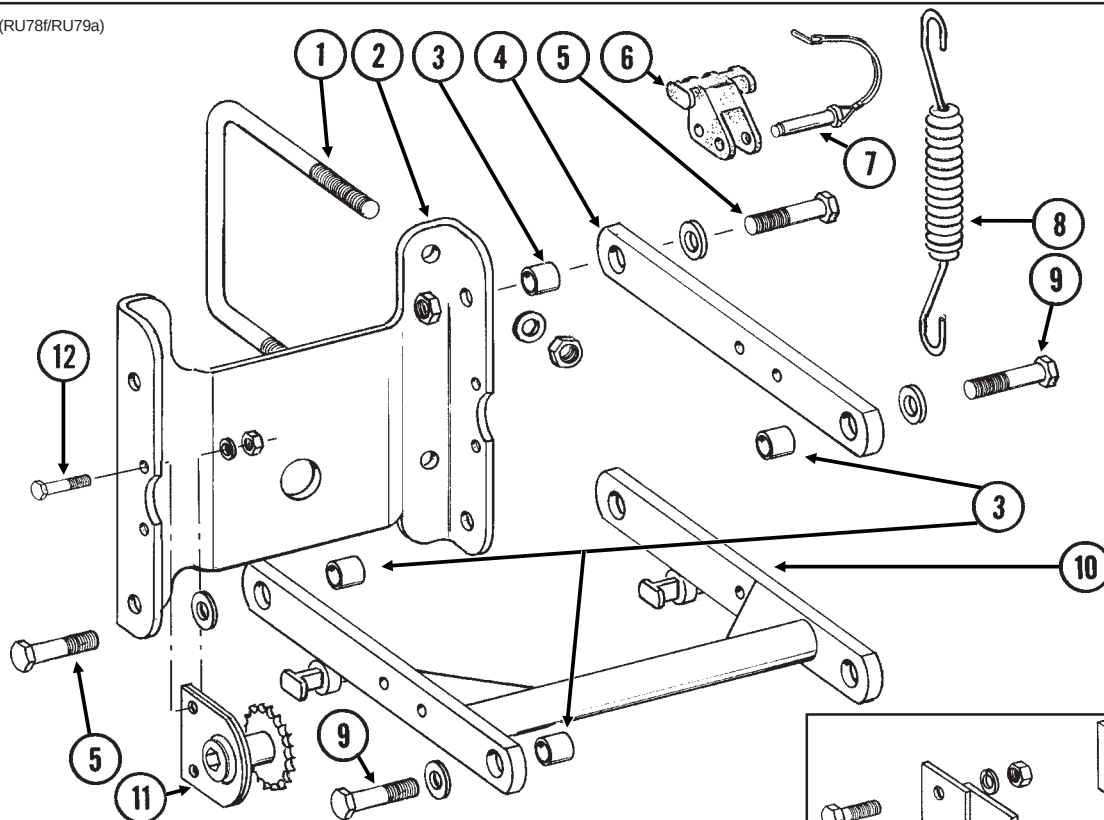


SHANK ASSEMBLY, SEED TUBE AND DEPTH ADJUSTMENT

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G11015	2	Hex Washer Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
2.	GB0274	1	Cover, Depth Adjustment
3.	GB0266	1	Handle, Depth Adjustment
4.	GB0267	1	Lever, Depth Adjustment
5.	GD3612	1	Cap Plug
6.	GD10993	1	Spring
7.	GD13361	1	Pin, $\frac{3}{8}$ " x 1 $\frac{2}{3}$ "
8.	GD11259	1	Sleeve, $\frac{3}{8}$ " I.D. x $\frac{5}{8}$ " O.D. x 1 $\frac{25}{32}$ " Long
9.	G11008	1	Hex Head Cap Screw, $\frac{3}{8}$ "-24 x 2 $\frac{1}{2}$ ", Grade 8
	G11007	1	Lock Nut, $\frac{3}{8}$ "-24, Grade C
10.	G3303-98	1	Chain, No. 41, 98 Pitch Including Connector Link
	G3303-16	1	Chain, No. 41, 16 Pitch Including Connector Link (Used W/Row Unit Extension Brackets)
	GR0196	1	Connector Link, No. 41
11.	GD1026	1	Sleeve, 1 $\frac{3}{16}$ " Long
12.	G10201	1	Special Washer, $\frac{3}{8}$ " x 1 $\frac{1}{2}$ " O.D.
13.	GD1065	1	Idler Spring
14.	GD7318	1	Sleeve, 1" Long
15.	G10108	1	Lock Nut, $\frac{3}{8}$ "-16
16.	G10210	1	Washer, $\frac{3}{8}$ " USS
17.	GD11962	1	Idler
18.	G10003	3	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{2}$ "
	G10108	3	Lock Nut, $\frac{3}{8}$ "-16
19.	GD10867	2	Stop
20.	G10326	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 3 $\frac{3}{4}$ "
21.	G10551	1	Clevis Pin, $\frac{1}{4}$ " x 2 $\frac{1}{2}$ "
	G10669	1	Hair Pin Clip, No. 22
22.	G10312	2	Carriage Bolt, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
	G10620	2	Serrated Flange Nut, $\frac{5}{16}$ "-18
23.	GD1033	1	Shield
24.		-	Wheel Arm, See "Gauge Wheels", Pages P6 And P7
25.	GA10157	1	Shank W/Gauge Wheel Pivot Spindle And Set Screw
	GD11001	-	Spindle
	G10438	-	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x $\frac{3}{4}$ "
26.	G10207	2	Washer, $\frac{7}{8}$ " O.D. x $\frac{13}{32}$ " I.D. x .134" (If Applicable)
27.	GD11845	1	Dust Cap
28.			See "KPM I/KPM II Stack-Mode Electronic Seed Monitor", Pages P92 And P93
29.	GB0285	1	Collar, Depth Adjustment
30.	GB0265	1	Pivot Link, Depth Adjustment
31.	GD15970	1	Sun Shade
32.	G10304	1	Carriage Bolt, $\frac{3}{8}$ "-16 x 3"
	G10108	1	Lock Nut, $\frac{3}{8}$ "-16

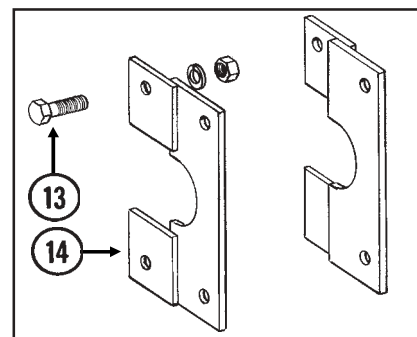
PARALLEL ARMS, MOUNTING SUPPORT PLATE AND QUICK ADJUSTABLE DOWN FORCE SPRINGS

RUB021/RUB022(RU78/RU79a)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
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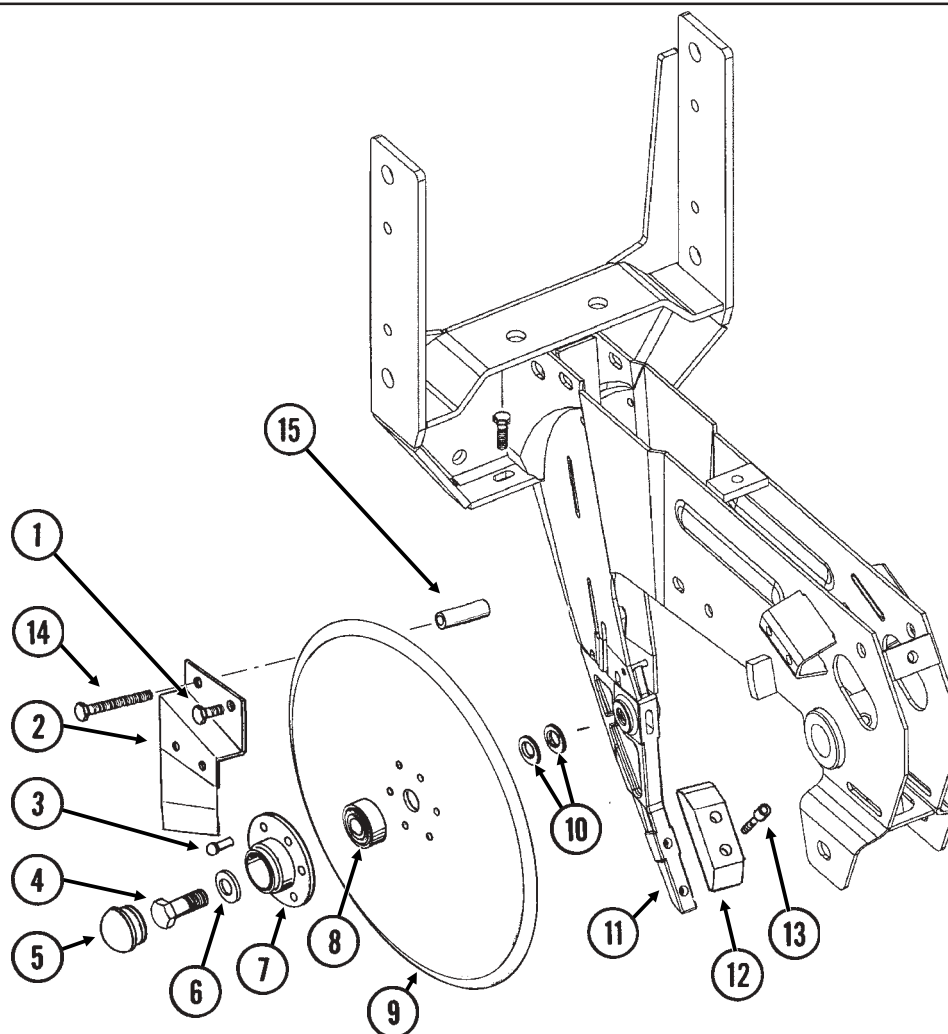
1.	GD1113	2	U-Bolt, 5" x 7" x $\frac{5}{8}$ "-11
	G10230	4	Lock Washer, $\frac{5}{8}$ "
	G10104	4	Hex Nut, $\frac{5}{8}$ "-11
2.	GD10036	1	Mounting Support Plate
3.	GB0218	4	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
4.	GD11422	2	Upper Parallel Arm
5.	G10732	4	Hex Head Cap Screw, $\frac{5}{8}$ "-18 x 2"
	GD7805	4	Special Washer, $\frac{5}{8}$ ", Hardened
	G10412	4	Lock Nut, $\frac{5}{8}$ "-18
6.	GB0186	2	Spring Anchor
7.	GD14217	2	Tab Lock Pin, $\frac{7}{16}$ " x 1 $\frac{1}{2}$ "
8.	GD8249	2-4	Spring
9.		-	See "Hopper Support And Meter Drive", Page P12
10.	GA5651	1	Lower Parallel Arm
11.	GA1720	1	Bearing/Sprocket, $\frac{7}{8}$ " Hex Bore
12.	G10004	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10229	2	Lock Washer, $\frac{3}{8}$ "
	G10101	2	Hex Nut, $\frac{3}{8}$ "-16
13.	G10007	4	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{1}{2}$ "
	G10230	4	Lock Washer, $\frac{5}{8}$ "
	G10104	4	Hex Nut, $\frac{5}{8}$ "-11
14.	GA7410	2	Extension Bracket



A.	G6325X	-	U-Bolt Package For 5" x 7" Toolbar, Includes: (2) GD1113, (4) G10230, (4) G10104
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15" SEED OPENER DISC BLADE/BEARING ASSEMBLY AND SCRAPERS

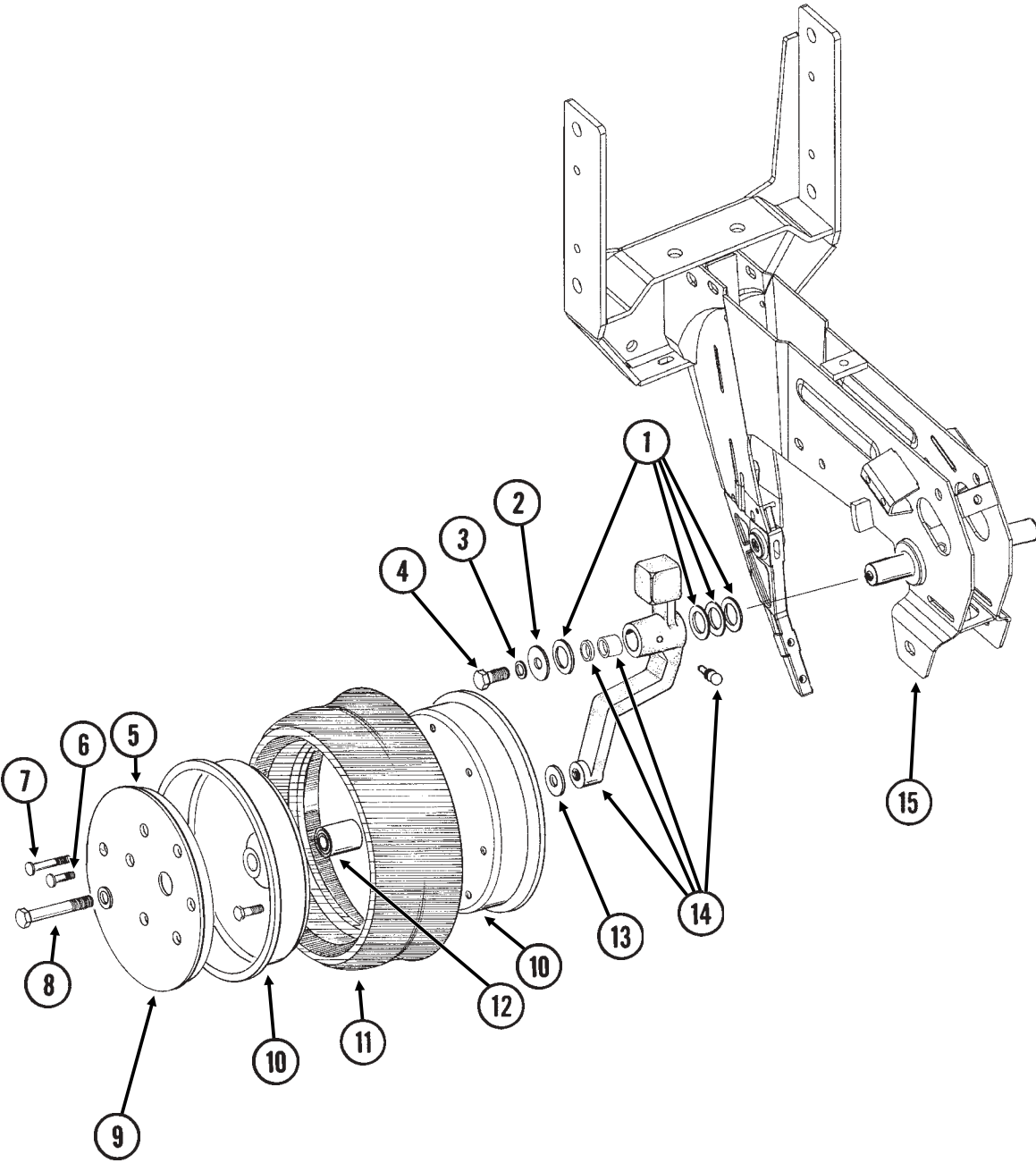
(RU139)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10328	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x $\frac{5}{8}$ "
	G10622	2	Serrated Flange Nut, $\frac{3}{8}$ "-16
2.	GA2012R	1	Disc Scraper, R.H.
	GA2012L	-	Disc Scraper, L.H. (Shown)
3.	G10427	12	Rivet, $\frac{1}{4}$ " x $\frac{1}{2}$ "
4.	GD11017	1	Special Hex Head Cap Screw, $\frac{5}{8}$ "-11 x $1\frac{1}{2}$ ", L.H. Threads
	G10007	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x $1\frac{1}{2}$ "
5.	GD11845	2	Dust Cap
6.	G10204	2	Special Machine Bushing, $\frac{5}{8}$ " x 1" O.D.
7.	GD10473	2	Bearing Housing
8.	GA2014	2	Bearing
9.	GD11306	2	Disc Blade, 3.5 mm x 15"
10.	G10213	-	Machine Bushing, $\frac{5}{8}$ " (.030" Thick)(As Required)
11.		-	See "Shank Assembly", Pages P2 And P3
12.	GB0301	1	Seed Tube Guard/Inner Scraper
13.	G10912	2	Hex Socket Head Cap Screw, $\frac{5}{16}$ "-18 x 1", Grade 8
14.	G10325	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x $2\frac{3}{4}$ "
	G10622	1	Serrated Flange Nut, $\frac{3}{8}$ "-16
15.	GD11259	1	Sleeve, $\frac{3}{8}$ " I.D. x $\frac{5}{8}$ " O.D. x $1\frac{25}{32}$ " Long
A.	GA8324	-	Disc Blade/Bearing Assembly, Less Dust Cap (Items 3 And 7-9)

GAUGE WHEELS

(RU140)

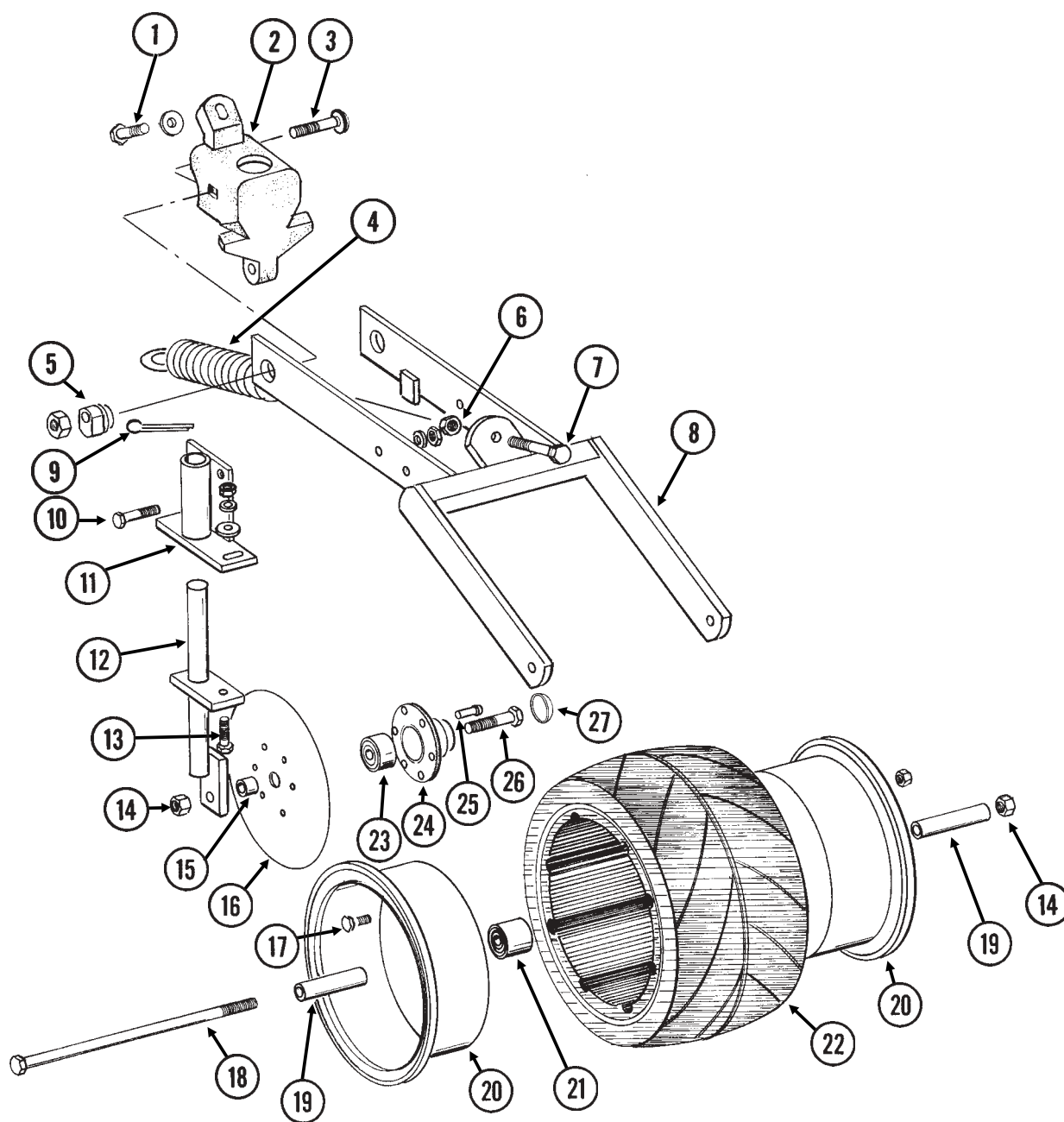


GAUGE WHEELS

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10940	-	Machine Bushing, 1" (.048" Thick)
2.	G10216	2	Washer, 1/2" USS
3.	G10228	2	Lock Washer, 1/2"
4.	G10014	1	Hex Head Cap Screw, 1/2"-13 x 1"
5.	GD11453	2	Cover
6.	G10338	12	Carriage Bolt, 5/16"-18 x 1 1/4"
	G10620	12	Serrated Flange Nut, 5/16"-18
7.	G10924	8	Carriage Bolt, 5/16"-18 x 1 3/4"
	G10620	8	Serrated Flange Nut, 5/16"-18
8.	G10010	2	Hex Head Cap Screw, 5/8"-11 x 3"
	G10230	2	Lock Washer, 5/8"
9.	G10018	14	Hex Head Cap Screw, 5/16"-18 x 5/8"
	G10109	14	Lock Nut, 5/16"-18, Grade 8
10.	GD11423	4	Half Wheel
11.	GD1086	2	Tire
12.	GA6171	2	Bearing
13.	G10204	2	Special Machine Bushing, 5/8" x 1" O.D.
14.	GA7975	1	Wheel Arm W/Grease Fitting, Bushings And Seals, L.H. (Shown)
	GA7976	1	Wheel Arm W/Grease Fitting, Bushings And Seals, R.H.
	G10640	1	Grease Fitting, 1/4"-28 (Per Arm)
	GB0276	2	Bushing, 1" I.D. x 1 1/4" O.D. x 1" Long (Per Arm)
	GD10991	2	Seal (Per Arm)
15.		-	See "Shank Assembly", Pages P2 And P3
A.	GA7949	-	Gauge Wheel Complete (Items 5-7 And 9-12)

COVERING DISCS/SINGLE PRESS WHEEL

RUA054/RUB026(RU94d)

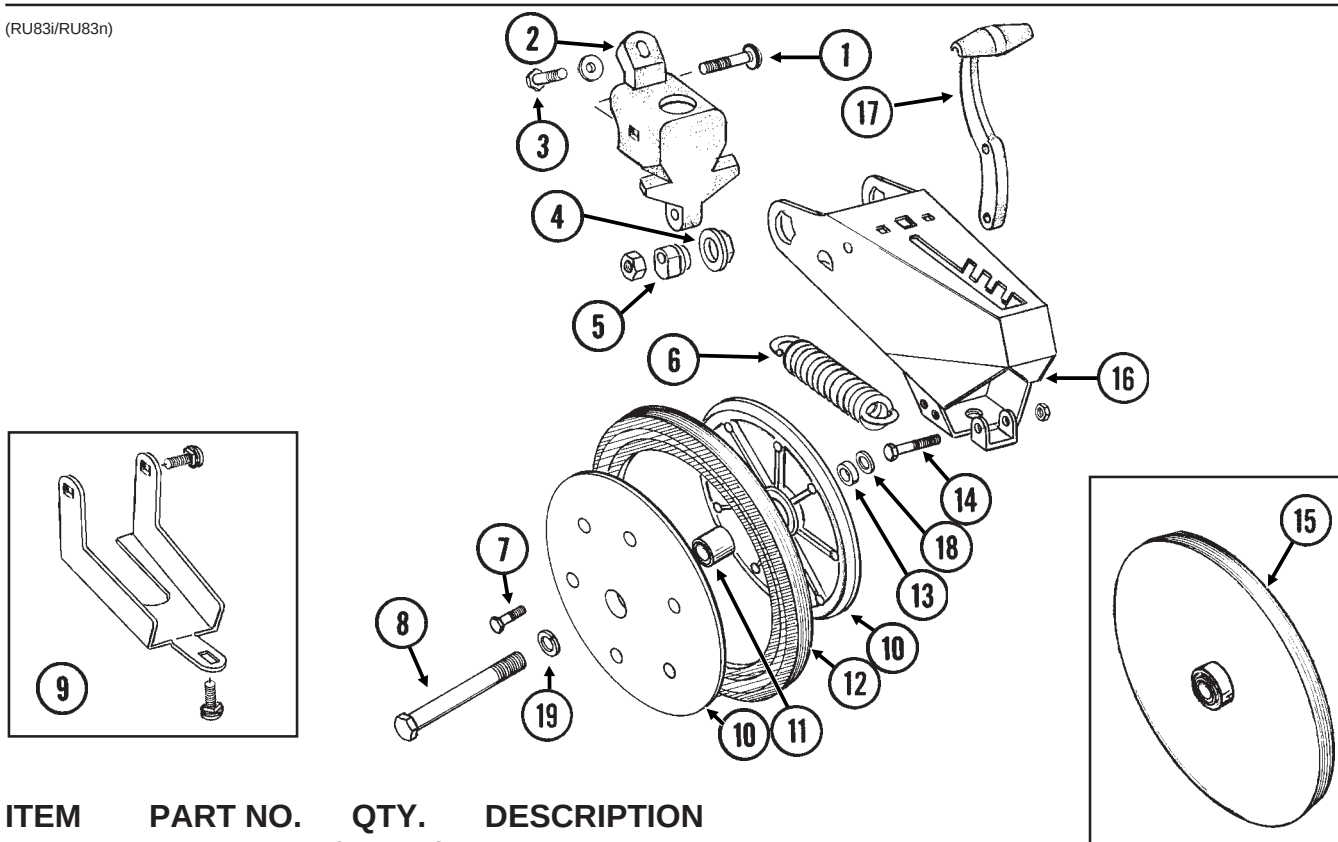


COVERING DISCS/SINGLE PRESS WHEEL

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10001	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1"
	G10210	1	Washer, $\frac{3}{8}$ " USS
2.	GB0268	1	Wheel Arm Stop
3.	G10801	2	Carriage Bolt, $\frac{1}{2}$ "-13 x 2 $\frac{1}{4}$ "
	G10315	-	Carriage Bolt, $\frac{1}{2}$ "-13 x 2 $\frac{1}{2}$ " (Used W/Straight Drop In-Furrow Granular Chemical Bracket)
	G10102	2	Hex Nut, $\frac{1}{2}$ "-13
4.	GA2054	1	Spring
5.	GB0239	2	Eccentric Bushing
6.	G10102	1	Hex Nut, $\frac{1}{2}$ "-13
7.	G10015	1	Adjusting Bolt, $\frac{1}{2}$ "-13 x 5"
8.	GA6619	1	Mounting Arm
9.	G10463	2	Cotter Pin, $\frac{1}{4}$ " x 1 $\frac{1}{2}$ "
10.	G10171	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{4}$ "
	G10232	4	Lock Washer, $\frac{5}{16}$ "
	G10106	4	Hex Nut, $\frac{5}{16}$ "-18
11.	GA6620	2	Bracket
12.	GA6618	2	Mount
13.	G10303	2	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10219	2	Washer, $\frac{5}{16}$ " USS
	G10232	2	Lock Washer, $\frac{5}{16}$ "
	G10106	2	Hex Nut, $\frac{5}{16}$ "-18
14.	G10107	3	Lock Nut, $\frac{5}{8}$ "-11
15.	GD1109	2	Bushing, $\frac{41}{64}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{1}{4}$ " Long
16.	GD9290	2	Disc Blade, 8"
17.	G10018	7	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x $\frac{5}{8}$ "
	G10109	7	Lock Nut, $\frac{5}{16}$ "-18, Grade 8
18.	G10152	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 9"
19.	GD3180-12	2	Sleeve, $\frac{5}{8}$ " I.D. x $\frac{7}{8}$ " O.D. x 2 $\frac{7}{8}$ " Long
20.	GD9562	2	Half Wheel
21.	GA6171	1	Bearing
22.	GD9305	1	Tire
23.	GA2014	2	Bearing
24.	GD10473	2	Bearing Housing
25.	G10427	12	Rivet, $\frac{1}{4}$ " x $\frac{1}{2}$ "
26.	G10006	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 2 $\frac{1}{4}$ "
27.	GD11845	2	Dust Cap
A.	GA6733	-	Single Press Wheel Complete W/Bearing (Items 17 And 20-22)
B.	GA6801	-	Covering Disc Blade Complete W/Bearing (Items 16 And 23-25)

"V" CLOSING WHEELS

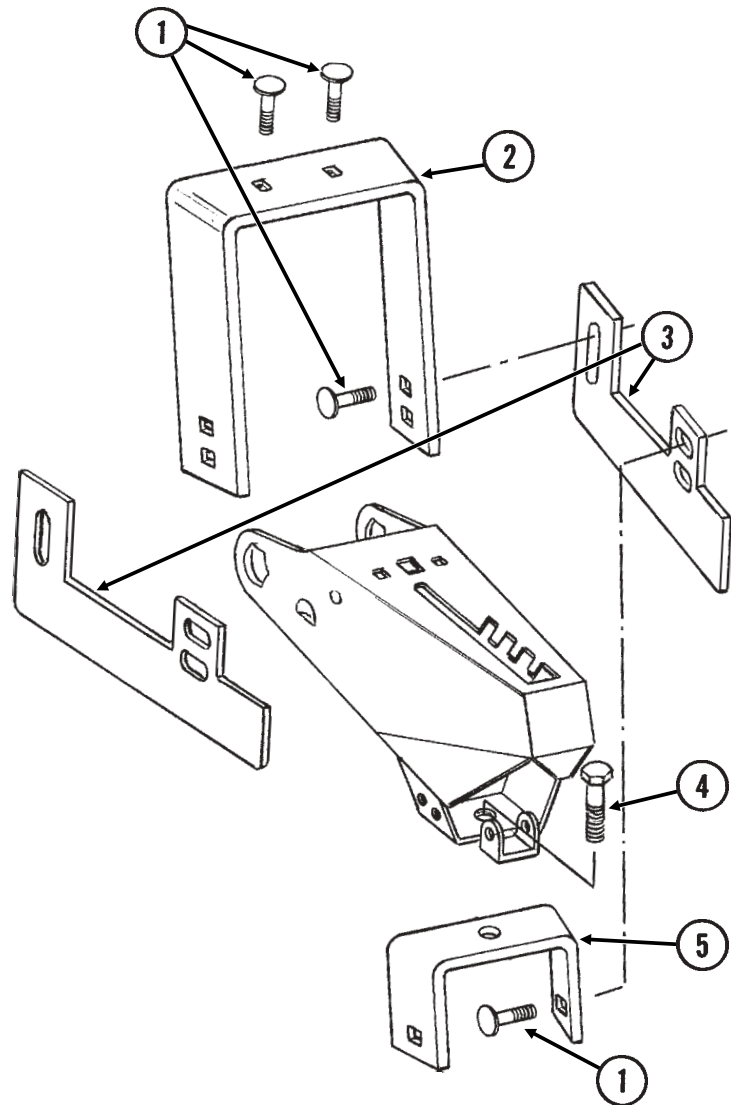
(RU83/RU83n)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10801	2	Carriage Bolt, 1/2"-13 x 2 1/4"
	G10315	-	Carriage Bolt, 1/2"-13 x 2 1/2" (Used W/Straight Drop In-Furrow Granular Chemical Bracket)
	G10111	2	Lock Nut, 1/2"-13
2.	GB0268	1	Wheel Arm Stop
3.	G10001	1	Hex Head Cap Screw, 3/8"-16 x 1"
	G10210	1	Washer, 3/8" USS
4.	GB0282	2	Stepped Bushing
5.	GB0239	2	Eccentric Bushing
6.	GD8460	1	Spring
7.	G10064	6	Hex Head Cap Screw, 1/4"-20 x 1"
8.	G10013	2	Hex Head Cap Screw, 5/8"-11 x 3 1/2"
	G10107	2	Lock Nut, 5/8"-11
9.	G1K345	-	Closing Wheel Shield Kit W/Hardware And Instruction
	G10308	3	Carriage Bolt, 3/8"-16 x 3/4"
	G10210	1	Washer, 3/8" USS
	G10229	3	Lock Washer, 3/8"
	G10101	3	Hex Nut, 3/8"-16
10.	GD9120	4	Nylon Half Wheel
11.	GA6171	2	Bearing
12.	GD1085	2	Rubber Tire, 1" x 12"
13.	GD1109	2	Bushing, 41/64" I.D. x 7/8" O.D. x 1/4" Long
14.	G10133	1	Hex Head Cap Screw, 5/16"-18 x 1 1/2"
	G10109	1	Lock Nut, 5/16"-18, Grade 8
15.	GA6597	-	Cast Iron Closing Wheel W/Bearing
	GA6171	-	Bearing
16.	GA8322	1	Arm
17.	GB0254	1	Lever
18.	GD7805	2	Special Washer, 5/8", Hardened
19.	G10230	2	Lock Washer, 5/8"
A.	GA6434	-	Rubber Closing Wheel Complete W/Bearing (Items 7 And 10-12)

DRAG CLOSING ATTACHMENT

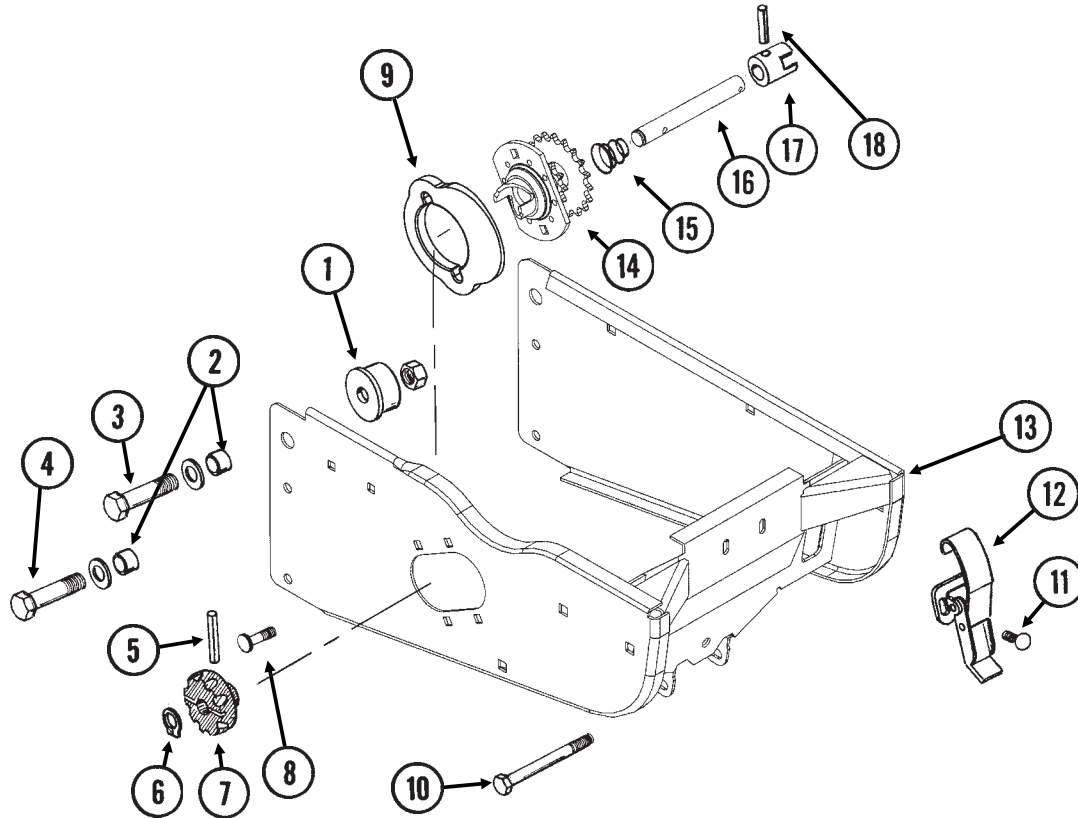
RUB050(RU90c)



ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Row)	
1.	G10599	6	Carriage Bolt, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10210	6	Washer, $\frac{3}{8}$ " USS
	G10229	6	Lock Washer, $\frac{3}{8}$ "
	G10101	6	Hex Nut, $\frac{3}{8}$ "-16
2.	GD11508	1	Front Bracket
3.	GD11313	2	Blade
4.	G10007	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{1}{2}$ "
	G10230	1	Lock Washer, $\frac{5}{8}$ "
	G10104	1	Hex Nut, $\frac{5}{8}$ "-11
5.	GD11509	1	Rear Bracket
A.	G7566X	-	Drag Closing Attachment Complete (Items 1-5)

HOPPER SUPPORT AND METER DRIVE

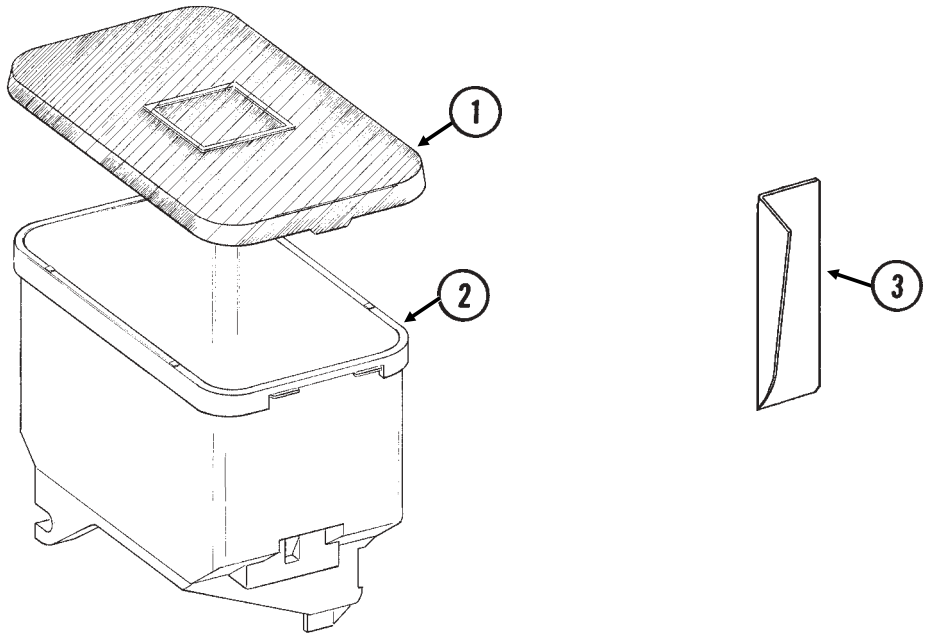
(METR22d)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	GB0314	2	Hopper Mount
2.	GB0218	4	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
3.	G10752	2	Hex Head Cap Screw, $\frac{5}{8}$ "-18 x 2 $\frac{1}{4}$ "
	GD7805	2	Special Washer, $\frac{5}{8}$ ", Hardened
	G10412	2	Lock Nut, $\frac{5}{8}$ "-18
4.	G10751	2	Hex Head Cap Screw, $\frac{5}{8}$ "-18 x 1 $\frac{3}{4}$ "
	GD7805	2	Special Washer, $\frac{5}{8}$ ", Hardened
	G10412	2	Lock Nut, $\frac{5}{8}$ "-18
5.	G10602	1	Spring Pin, $\frac{1}{4}$ " x 1 $\frac{1}{2}$ "
6.	G10567	1	External Retaining Ring, $\frac{5}{8}$ "
7.	GD11239	1	Knob
8.	G10338	2	Carriage Bolt, $\frac{5}{16}$ "-18 x 1 $\frac{1}{4}$ "
	G10620	2	Serrated Flange Nut, $\frac{5}{16}$ "-18
9.	GB0331	1	Clutch Adapter Plate
10.	G10061	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 3 $\frac{1}{2}$ "
	G10210	2	Washer, $\frac{3}{8}$ " USS
	G10108	1	Lock Nut, $\frac{3}{8}$ "-16
11.	G10309	2	Carriage Bolt, $\frac{1}{4}$ "-20 x $\frac{5}{8}$ ", Grade 2
	G10621	2	Serrated Flange Nut, $\frac{1}{4}$ "-20
12.	GA2007	1	Hopper Hold Down Latch
13.	GA10155	1	Hopper Support
14.	GA10137	1	Double Sprocket And Bearing, Drive Clutch, 11/19 Tooth
15.	GD11413	1	Spring
16.	GD15747	1	Shaft
17.	GB0278	1	Coupler
18.	G10546	1	Spring Pin, $\frac{3}{16}$ " x 1 $\frac{1}{4}$ "
A.	GA10151	-	Meter Drive Assembly Complete (Items 5-7 And 14-18)

SEED HOPPER AND LID

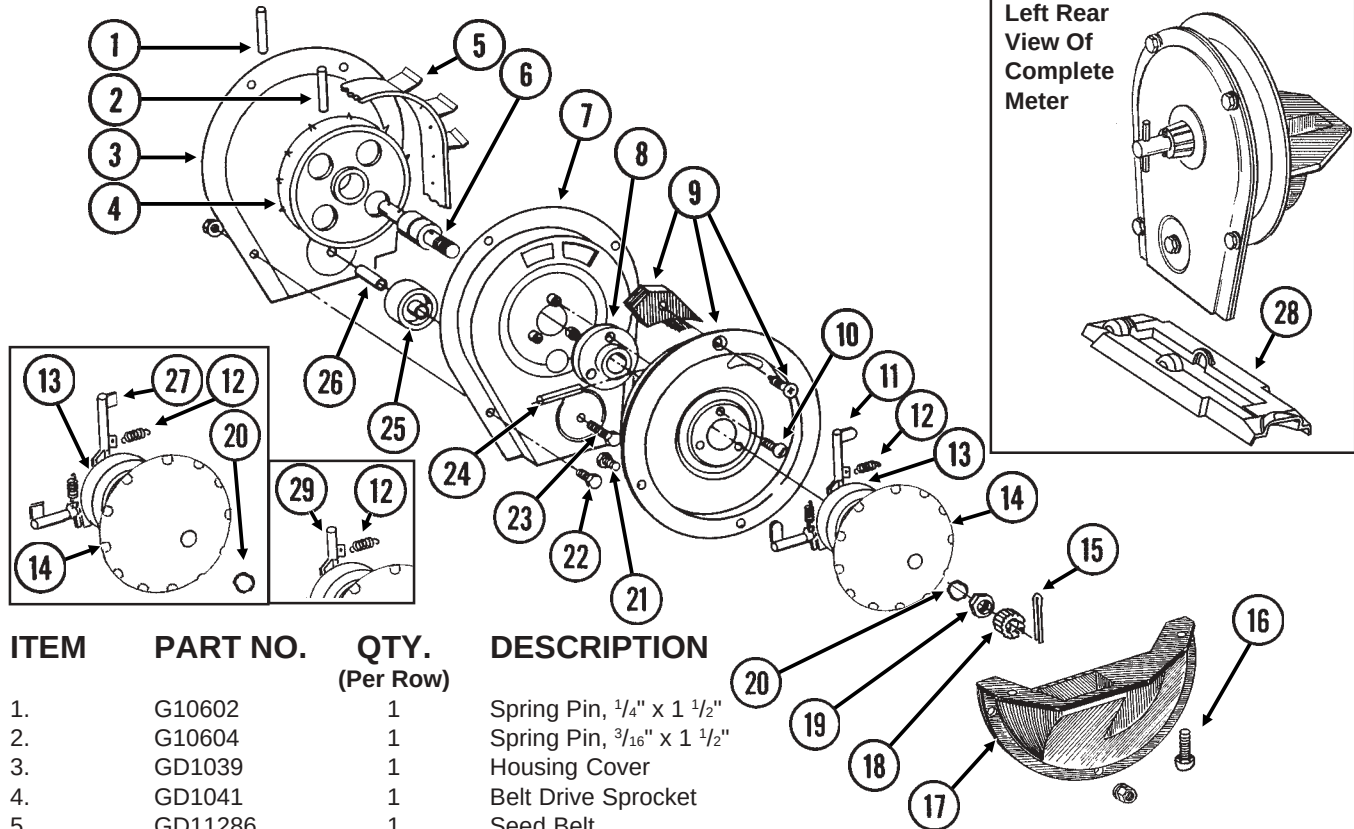
(RU87e/RU87a)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	GD11279	1	Lid
2.	GA9714	1	Seed Hopper, Reinforced
3.	GD11747	1	Seed Reserve Baffle

FINGER PICKUP SEED METER

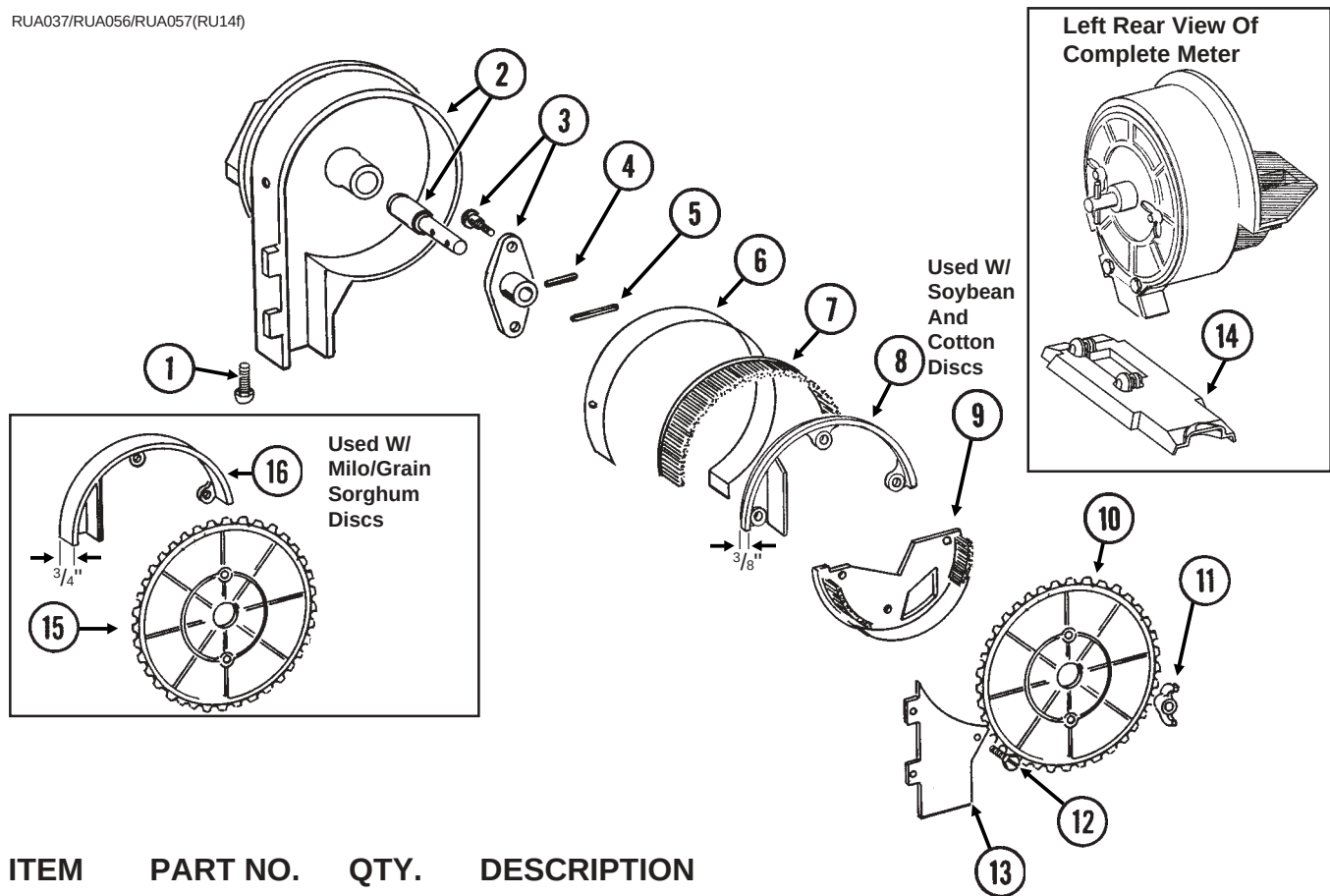
RUA015/RUA056/RUA057(RU13k/RU13d)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10602	1	Spring Pin, 1/4" x 1 1/2"
2.	G10604	1	Spring Pin, 3/16" x 1 1/2"
3.	GD1039	1	Housing Cover
4.	GD1041	1	Belt Drive Sprocket
5.	GD11286	1	Seed Belt
6.	GA2019	1	Bearing
7.	GA2018	1	Conveyor Housing
8.	GB0110	1	Bearing Housing
9.	GR1569	1	Carrier Plate W/Brush And Screw
	GA2020	-	Brush
	G10690	-	Rolling Thread Screw, No. 10 x 3/4"
10.	G10401	3	Slotted Hex Washer Head Screw, No. 10-32 x 5/8"
11.	GD10733	12	Finger, Corn
12.	GD6501	12	Spring
13.	GB0111	1	Cam
14.	GD11528	1	Finger Holder
15.	G10470	1	Cotter Pin, 5/32" x 1"
16.	G11009	2	Locking Thumbscrew, 5/16"-18 x 3/4"
17.	GD11311	1	Seed Baffle
18.	GD1083	1	Cover Nut
19.	G10500	1	Jam Nut, 5/8"-18 UNF
20.	GA8343	1	Wave Washer, 5/8" (Triple Wave)
21.	G10020	3	Hex Head Cap Screw, 1/4"-20 x 5/8"
	G10323	3	Hex Flange Nut, 1/4"-20
22.	G10022	4	Hex Head Cap Screw, 1/4"-20 x 1/2"
	G10621	4	Serrated Flange Nut, 1/4"-20
23.	G10021	1	Hex Head Cap Screw, 1/4"-20 x 1 1/2"
	G10621	1	Serrated Flange Nut, 1/4"-20
24.	G10603	1	Spring Pin, 1/4" x 1 1/4"
25.	GD1042	1	Idler
26.	GB0120	1	Bushing, 17/64" I.D. x 1 1/32" Long
27.	GD10226	12	Finger, Oil Sunflower
28.	GD15698	1	Shank Cover, Finger Pickup Seed Meter
29.	GD11787	-	Half Rate Blank Finger
A.	GR1487	-	Finger Assembly, Corn (Items 11-14 And 20)
B.	GR1327	-	Finger Assembly, Oil Sunflower (Items 12-14, 20 And 27)

BRUSH-TYPE SEED METER

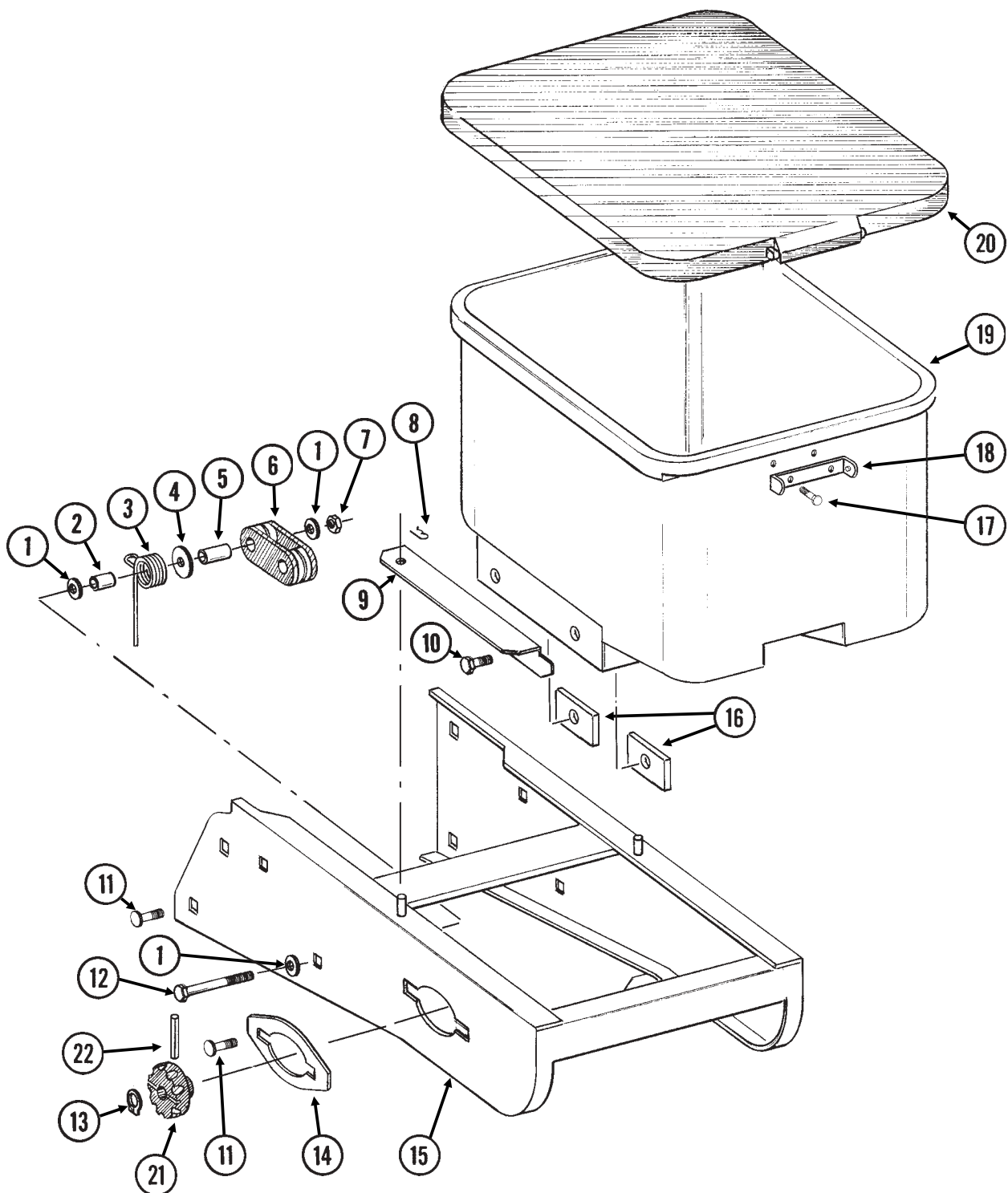
RUA037/RUA056/RUA057(RU14f)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G11009	2	Locking Thumbscrew, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
2.	GA6027	1	Housing W/Bearing
	GA5698	-	Bearing
3.	GA6038	1	Hub W/Shoulder Bolts
	GD1755	-	Shoulder Bolt, $\frac{1}{4}$ "-20 (2 Used)
4.	G10603	1	Spring Pin, $\frac{1}{4}$ " x $1\frac{1}{4}$ "
5.	G10602	1	Spring Pin, $\frac{1}{4}$ " x $1\frac{1}{2}$ "
6.	GD8778	1	Wear Strip
7.	GA5699	1	Upper Brush
8.	GD11122	1	Upper Brush Retainer (Used W/Soybean And Cotton Discs)
9.	GA5834	1	Lower Brush
10.	GA5794	-	Seed Disc, Soybean, 60 Cell, Black Color-Coded
	GA6184	-	Seed Disc, Specialty Soybean, 48 Cell, Dark Blue Color-Coded
	GA5796	-	Seed Disc, Cotton, Acid-Delinted, 30 Cell, White Color-Coded
	GA6168	-	Seed Disc, Large Cotton, Acid-Delinted, 36 Cell, Tan Color-Coded
	GA6478	-	Seed Disc, High-Rate Cotton, Acid-Delinted, 48 Cell, Light Green Color-Coded
	GA6182	-	Seed Disc, Hill-Drop Cotton, Acid-Delinted, 12 Cell, Brown Color-Coded
	GA7255	-	Seed Disc, Small Hill-Drop Cotton, Acid-Delinted, 12 Cell, Dark Green Color-Coded
11.	G10531	2	Wing Nut W/Nylon Insert, $\frac{1}{4}$ "-20
12.	G11151	9	Hex Washer Head Screw, No. 10-24 x $\frac{1}{2}$ "
	G10634	-	Slotted Tap Screw, No. 10-24 x $\frac{5}{8}$ " (Use As Required)
13.	GD7878	1	Cover
14.	GD15699	1	Shank Cover, Brush-Type Seed Meter
15.	GA5982	-	Seed Disc, Small Milo/Grain Sorghum, 30 Cell, Red Color-Coded
	GA6187	-	Seed Disc, Large Milo/Grain Sorghum, 30 Cell, Light Blue Color-Coded
	GA5795	-	Seed Disc, High-Rate Small Milo/Grain Sorghum, 60 Cell, Red Color-Coded
	GA6633	-	Seed Disc, High-Rate Large Milo/Grain Sorghum, 60 Cell, Yellow Color-Coded
16.	GD8237	-	Upper Brush Retainer (Used W/Milo/Grain Sorghum Discs)

GRANULAR CHEMICAL HOPPER AND HOPPER PANEL EXTENSION

(METR14d)

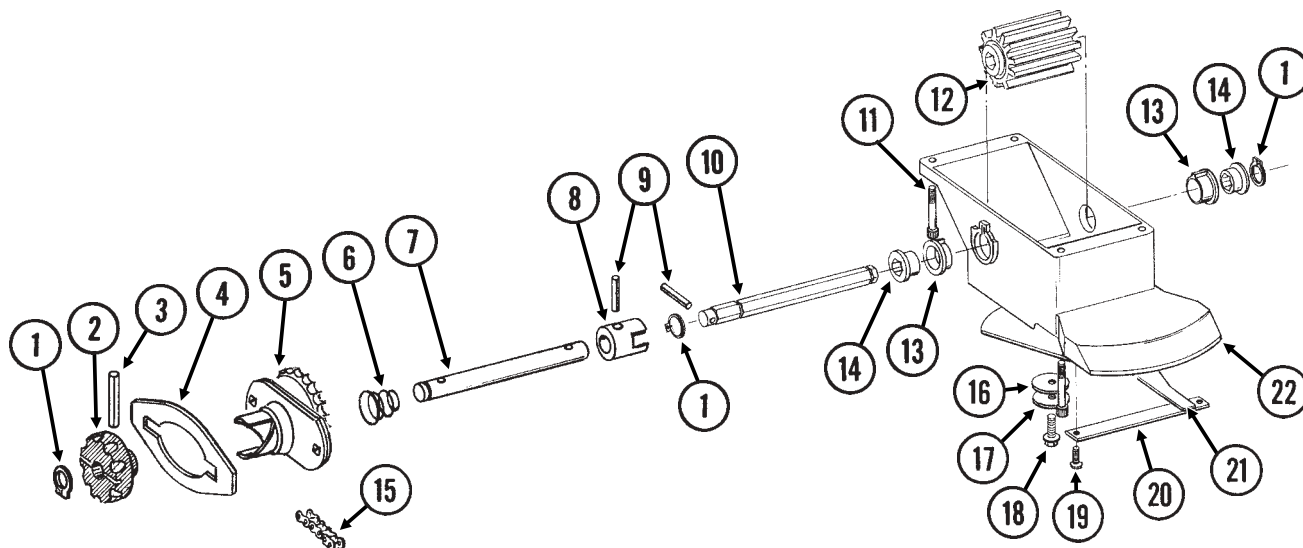


GRANULAR CHEMICAL HOPPER AND HOPPER PANEL EXTENSION

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10210	3	Washer, $\frac{3}{8}$ " USS
2.	GD2971-10	1	Sleeve, $\frac{9}{16}$ " Long
3.	GD11219	1	Spring
4.	G10201	1	Special Washer, $\frac{3}{8}$ " x 1 $\frac{1}{2}$ " O.D.
5.	GD1026	1	Sleeve, 1 $\frac{3}{16}$ " Long
6.	GD11962	1	Idler
7.	G10108	1	Lock Nut, $\frac{3}{8}$ "-16
8.	G10670	2	Hair Pin Clip, No. 3
9.	GD1059L	1	Support, L.H. (Shown)
	GD1059R	1	Support, R.H.
10.	G10002	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x $\frac{3}{4}$ "
	G10229	4	Lock Washer, $\frac{3}{8}$ "
11.	G10312	8	Carriage Bolt, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
	G10620	8	Serrated Flange Nut, $\frac{5}{16}$ "-18
12.	G10325	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 2 $\frac{3}{4}$ "
13.	G10567	3	External Retaining Ring, $\frac{5}{8}$ "
14.	GD11305	1	Plate
15.	A10759	1	Hopper Panel Extension (Non-Stock Item) (Sub Wholegoods Order Code 700-01099)
16.	GD11424	4	Block
17.	G10023	2	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x $\frac{3}{4}$ "
	G10621	2	Serrated Flange Nut, $\frac{1}{4}$ "-20
18.	GD1060	1	Hinge
19.	GA8371	1	Hopper
20.	GA4444	1	Lid
21.	GD11239	1	Knob
22.	G10602	1	Spring Pin, $\frac{1}{4}$ " x 1 $\frac{1}{2}$ "

GRANULAR CHEMICAL METER AND METER DRIVE

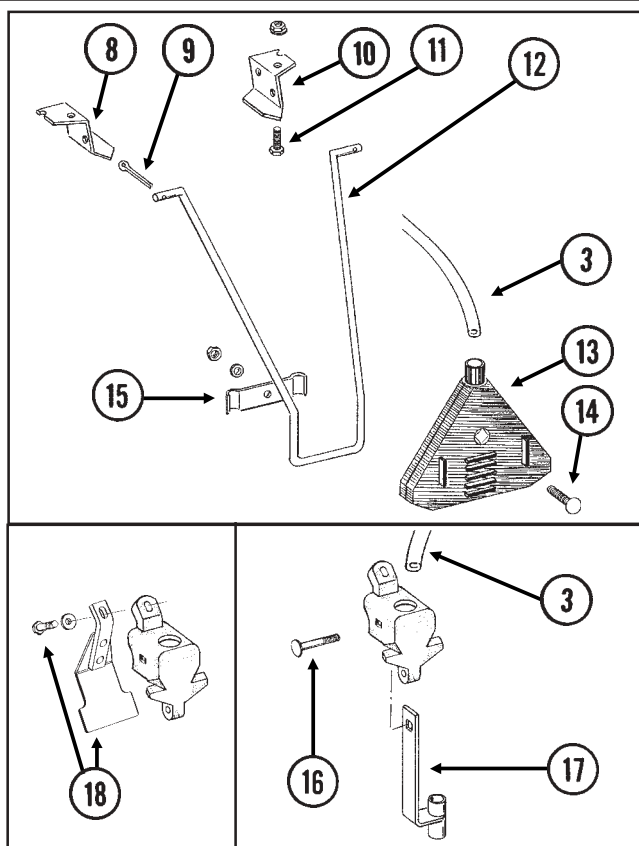
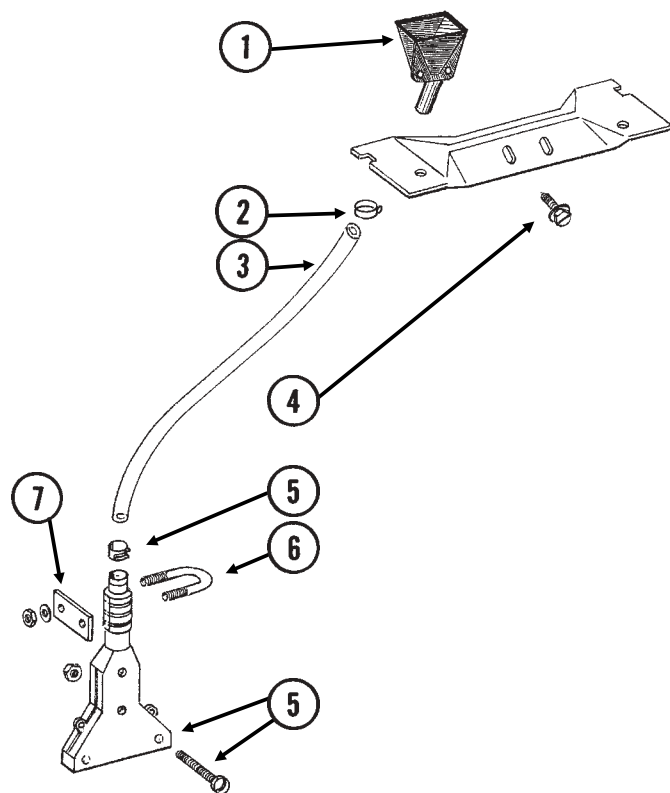
RUA051/RUB028(RU91a)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10567	3	External Retaining Ring, $\frac{5}{8}$ "
2.	GD11239	1	Knob
3.	G10602	1	Spring Pin, $\frac{1}{4}$ " x 1 $\frac{1}{2}$ "
4.		-	See "Granular Chemical Hopper And Hopper Panel Extension", Pages P16 And P17
5.	GA8364	1	Sprocket And Bearing, Drive Clutch, 24 Tooth
6.	GD11413	1	Spring
7.	GD11240	1	Shaft
8.	GB0278	1	Coupler
9.	G10546	2	Spring Pin, $\frac{3}{16}$ " x 1 $\frac{1}{4}$ "
10.	GD11297	1	Shaft
11.	G10921	4	Hex Socket Head Cap Screw, No. 10-24 x $\frac{7}{8}$ "
	G10257	4	Lock Washer, No. 10
12.	GD7148	1	Feed Roller, Hex Bore
13.	GB0115	2	Bearing
14.	GD7258	2	Hex Bushing
15.	G3303-114	1	Chain, No. 41, 114 Pitch Including Connector Link
	GR0196	1	Connector Link, No. 41
16.	G10660	1	Wave Washer, $\frac{1}{2}$ "
17.	G10209	1	Washer, $\frac{1}{4}$ " USS
18.	G10570	1	Slotted Hex Self-Tapping Screw, $\frac{1}{4}$ "-20 x $\frac{3}{4}$ "
19.	G11073	2	Slotted Hex Self-Tapping Screw, No. 10 x $\frac{3}{8}$ "
20.	GD1061	1	Support Strap
21.	GD1063	1	Metering Gate
22.	GB0116	1	Granular Housing
A.	GA8326	-	Granular Chemical Meter Complete (Items 1, 9, 10, 12-14 And 16-22)

GRANULAR CHEMICAL BANDING OPTIONS

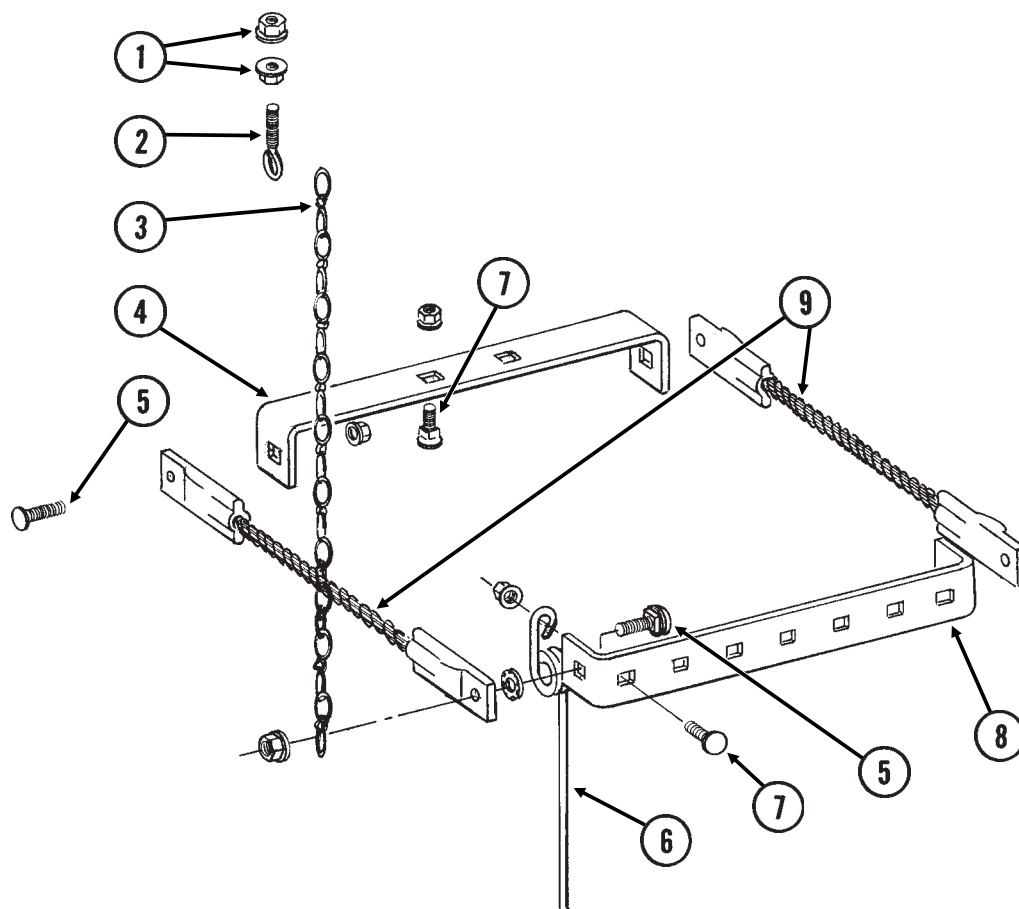
RUA061/RUA073(RU101m/RU83m)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GD2423	1	Funnel
2.	G10673	1	Hose Clamp, No. 8
3.	GD2947	1	Hose, 7/16" x 28"
4.	G10523	2	Slotted Pan Head Self-Tapping Screw, No. 10 x 1/2"
5.	GA6907	1	Slope-Compensating Bander W/Hardware (4 1/2" Band Width)
	G10864	1	Uni-Clamp
	G10757	2	Pan Head Screw, No. 10-32 x 1 1/4"
	G10758	2	Hex Nut, No. 10-32
6.	GD10963	1	U-Bolt, 1 1/2" x 1 5/16" x 1/4"-20
	G10209	2	Washer, 1/4" USS
	G10110	2	Lock Nut, 1/4"-20, Grade B
7.	GD10984	1	Spacer
8.	GD1115L	-	Hanger Bracket, L.H.
9.	G10452	-	Cotter Pin, 1/8" x 1/2"
10.	GD1115R	-	Hanger Bracket, R.H.
11.	G10310	-	Carriage Bolt, 1/4"-20 x 3/4", Grade 2
	G10227	-	Lock Washer, 1/4"
	G10103	-	Hex Nut, 1/4"-20
12.	GD1116	-	Hanger
13.	GA2075	-	Diffuser, 14" Band
14.	G10306	-	Carriage Bolt, 3/8"-16 x 2"
	G10229	-	Lock Washer, 3/8"
	G10101	-	Hex Nut, 3/8"-16
15.	GD1118	-	Clamp
16.	G10315	1	Carriage Bolt, 1/2"-13 x 2 1/2"
			(Replaces Existing 1/2" x 2 1/4" Hardware)
17.	GA6741	1	Bracket (Straight Drop In-Furrow)
18.	G1K385	-	Bander Shield Kit W/Hardware And Instruction
	G10003	1	Hex Head Cap Screw, 3/8"-16 x 1 1/2"
	GD14659	1	Special Washer, 3/8", Hardened

SPRING TOOTH INCORPORATOR

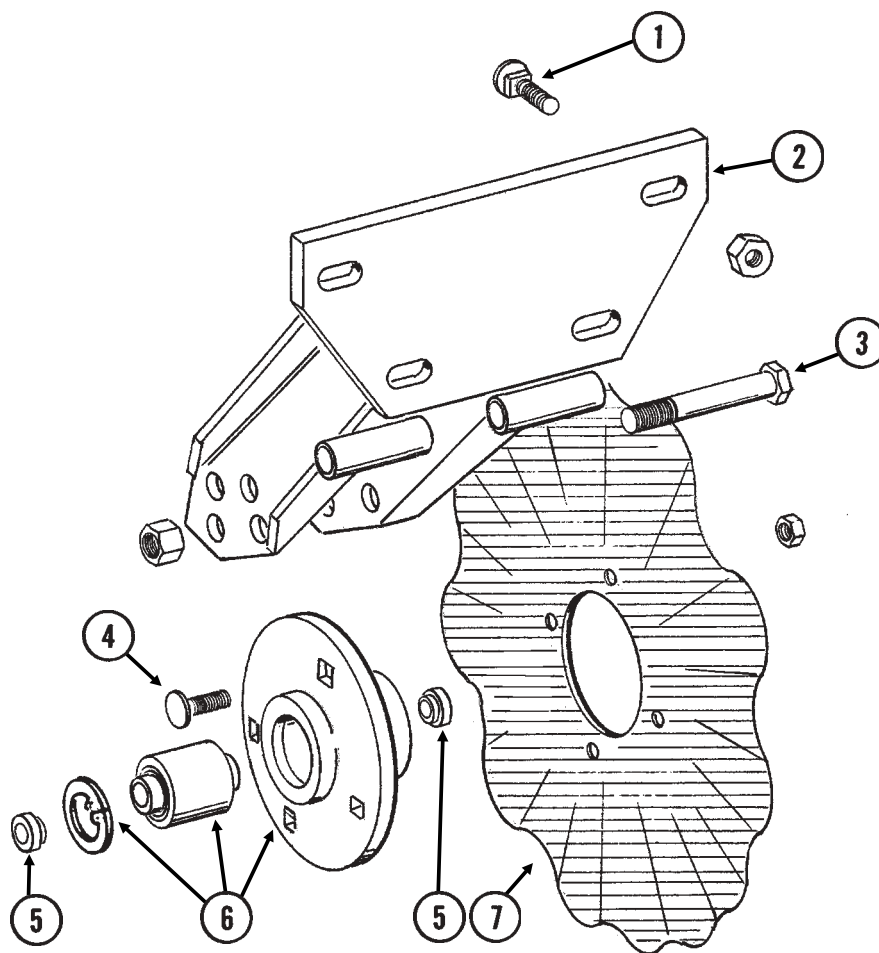
RUA055(RU95)



ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10621	4	Serrated Flange Nut, 1/4"-20
2.	GD2460	2	Eyebolt, 1/4"-20
3.	G3305-01	4	Twin Loop Chain, 9 Links
4.	GD1143	1	Front Bracket
5.	G10305	4	Carriage Bolt, 3/8"-16 x 1"
	G10529	4	External Tooth Lock Washer, 3/8"
	G10622	4	Serrated Flange Nut, 3/8"-16
6.	GD1145	7	Spring Tooth
7.	G10308	9	Carriage Bolt, 3/8"-16 x 3/4"
	G10622	9	Serrated Flange Nut, 3/8"-16
8.	GD1144	1	Rear Bracket
9.	GA2094	2	Cable Assembly

ROW UNIT MOUNTED NO TILL COULTER

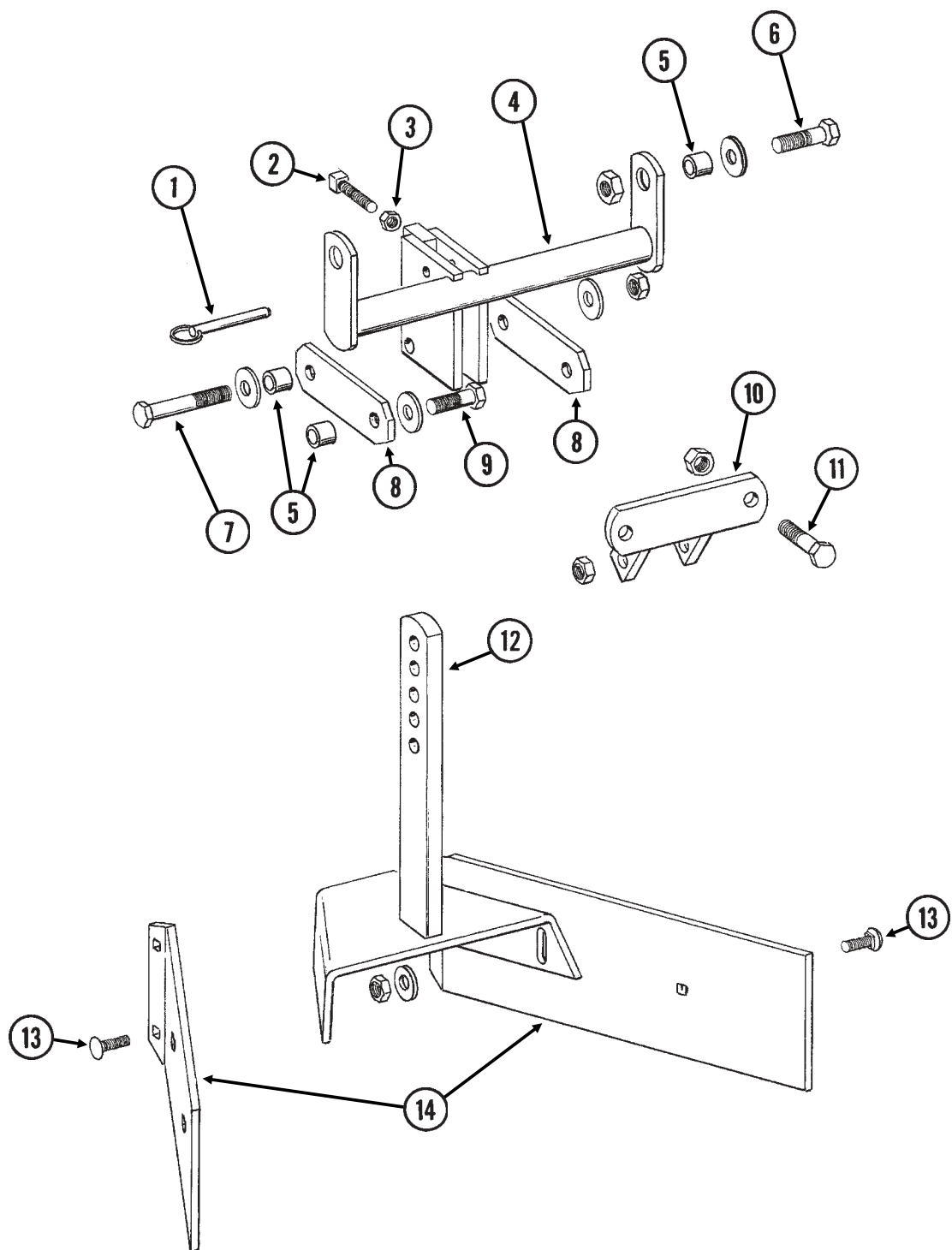
RUA061(RU102/RU102c)



ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Row)	
1.	G10574	4	Carriage Bolt, 1/2"-13 x 1 1/4"
	G10111	4	Lock Nut, 1/2"-13
2.	GA5625	1	Arm
3.	G10036	1	Hex Head Cap Screw, 5/8"-11 x 4"
	G10107	1	Lock Nut, 5/8"-11
4.	G10574	4	Carriage Bolt, 1/2"-13 x 1 1/4"
	G10111	4	Lock Nut, 1/2"-13
5.	GD11677	2	Adapter
6.	GA8641	1	Hub W/Bearing And Retaining Ring
	GA8603	-	Double Row Bearing
	GD11652	-	Retaining Ring, 2 7/16"
7.	GD7803	-	Disc Blade, Fluted, 1", 8 Flutes (Shown)
	GD7804	-	Disc Blade, Bubbled, 1"
	GD9254	-	Disc Blade, Fluted, 3/4", 13 Flutes

ROW UNIT MOUNTED BED LEVELER

RUA059/RUA060(RU99/RU100)

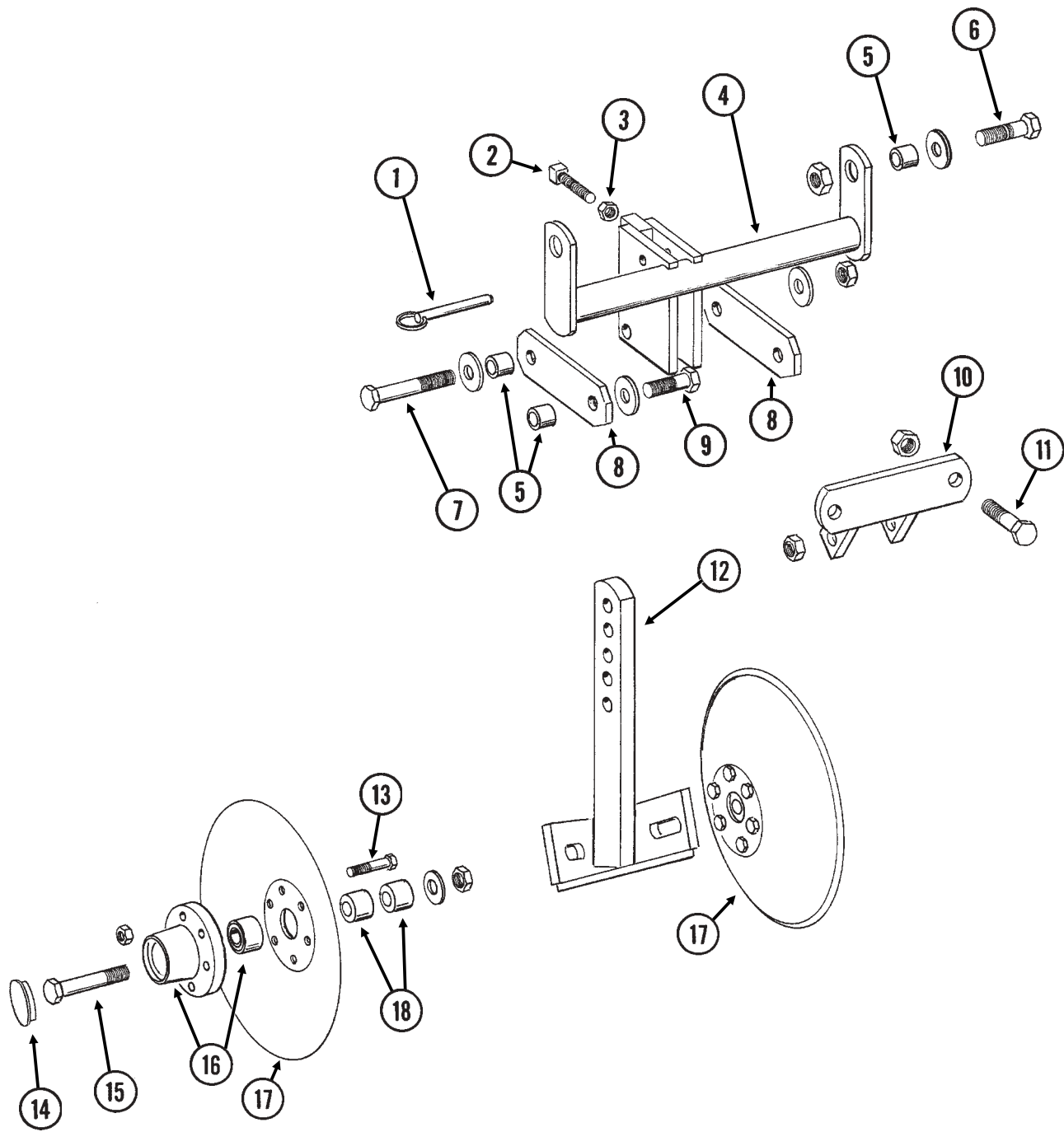


ROW UNIT MOUNTED BED LEVELER

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Row)	
1.	G10536	1	Detent Pin, 1/2" x 2 1/2" Grip
2.	G10597	1	Square Head Set Screw, 5/8"-11 x 2 1/4"
3.	G10503	1	Hex Jam Nut, 5/8"-11, Grade 2
4.	GA5719	1	Mounting Bracket
5.	GD7889	6	Bushing, 1" O.D. x 9/16" I.D. x 7/16" Long
6.	G10039	2	Hex Head Cap Screw, 1/2"-13 x 1 3/4"
	G10216	2	Washer, 1/2" USS
	G10111	2	Lock Nut, 1/2"-13
7.	G10585	1	Hex Head Cap Screw, 1/2"-13 x 3 1/4"
	G10216	2	Washer, 1/2" USS
	G10111	1	Lock Nut, 1/2"-13
8.	GD7890	2	Link
9.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10216	2	Washer, 1/2" USS
	G10111	2	Lock Nut, 1/2"-13
10.	GA5715	1	Anchor
11.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10111	2	Lock Nut, 1/2"-13
12.	GA5892	1	Leveler
13.	G10303	6	Carriage Bolt, 5/16"-18 x 1"
	G10219	4	Washer, 5/16" USS
	G10109	6	Lock Nut, 5/16"-18, Grade 8
14.	GD8266	2	Blade

ROW UNIT MOUNTED DISC FURROWER

RUA059/RUA058(RU99/RU98g)

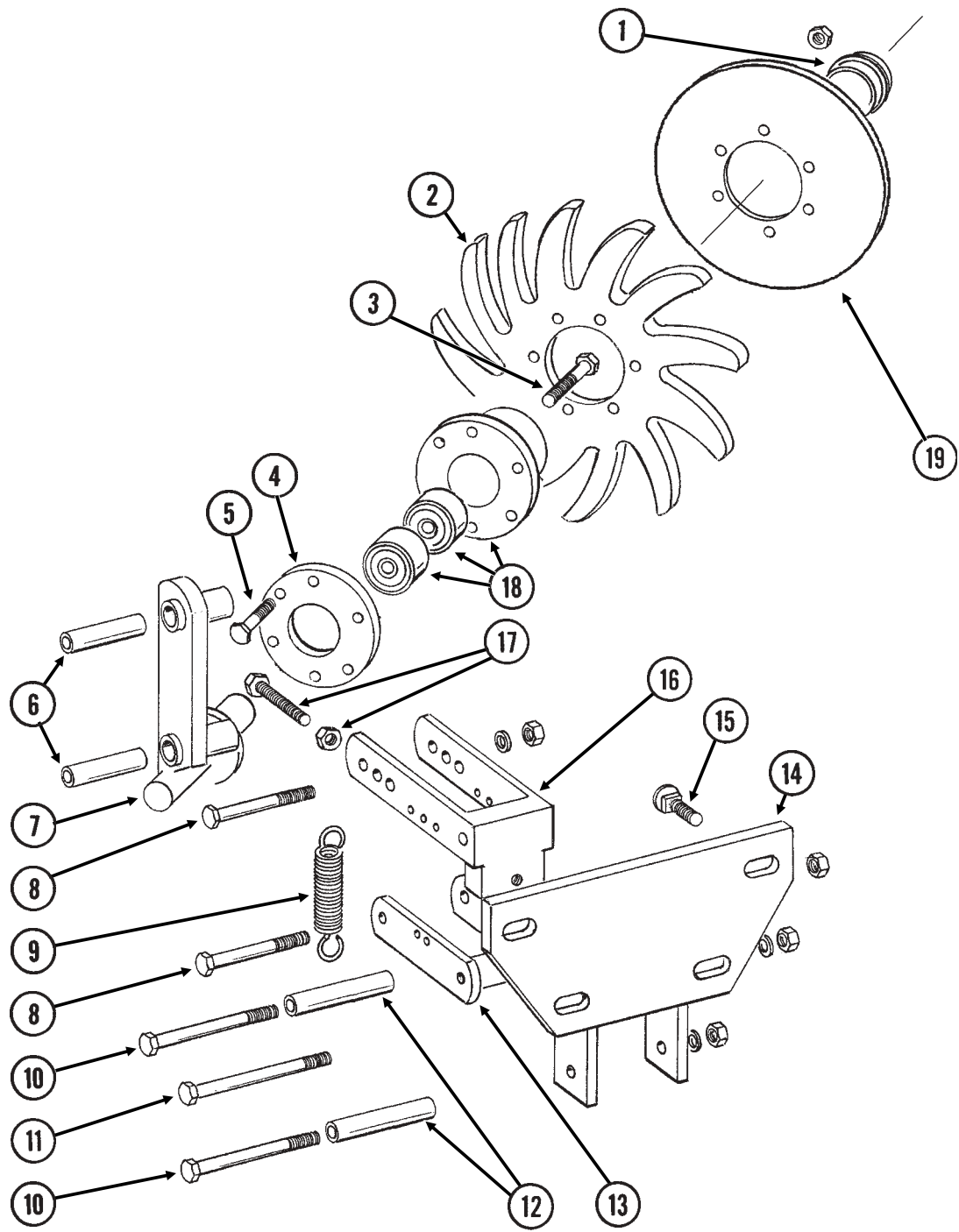


ROW UNIT MOUNTED DISC FURROWER

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G10536	1	Detent Pin, 1/2" x 2 1/2" Grip
2.	G10597	1	Square Head Set Screw, 5/8"-11 x 2 1/4"
3.	G10503	1	Hex Jam Nut, 5/8"-11, Grade 2
4.	GA5719	1	Mounting Bracket
5.	GD7889	6	Bushing, 1" O.D. x 9/16" I.D. x 7/16" Long
6.	G10039	2	Hex Head Cap Screw, 1/2"-13 x 1 3/4"
	G10216	2	Washer, 1/2" USS
	G10111	2	Lock Nut, 1/2"-13
7.	G10585	1	Hex Head Cap Screw, 1/2"-13 x 3 1/4"
	G10216	2	Washer, 1/2" USS
	G10111	1	Lock Nut, 1/2"-13
8.	GD7890	2	Link
9.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10216	2	Washer, 1/2" USS
	G10111	2	Lock Nut, 1/2"-13
10.	GA5715	1	Anchor
11.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10111	2	Lock Nut, 1/2"-13
12.	GA5718	1	Support Arm
13.	G10572	6	Truss Head Slotted Machine Screw, 5/16"-18 x 7/8"
	G10106	6	Hex Nut, 5/16"-18
14.	GD1132	2	Dust Cap
15.	G10318	2	Hex Head Cap Screw, 5/8"-11 x 4 1/2"
	GD7805	2	Special Washer, 5/8", Hardened
	G10107	2	Lock Nut, 5/8"-11
16.	GA5654	2	Hub W/Bearings
	GA2014	-	Bearing
17.	GD7823	-	Disc Blade, Solid, 12" (Shown)
	GD8307	-	Disc Blade, Notched, 12"
18.	GD7817-01	2	Spacer, 11/16" I.D. x 3/4" Long
	GD7817-04	2	Spacer, 11/16" I.D. x 1/2" Long

ROW UNIT MOUNTED RESIDUE WHEEL

(RU103d)

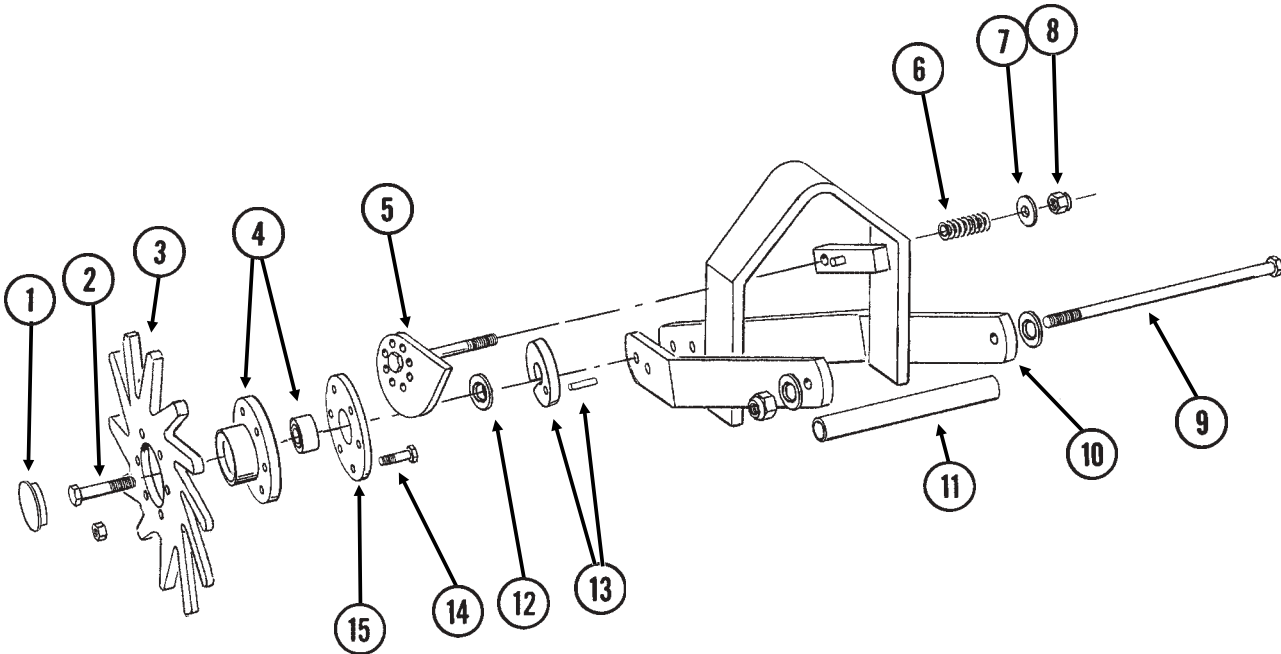


ROW UNIT MOUNTED RESIDUE WHEEL

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Row)	
1.	GD1132	1	Dust Cap
2.	GD10552	1	Wheel, 12 Tine, $\frac{3}{8}$ " x 12"
3.	G10006	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 2 $\frac{1}{4}$ "
4.	GD9724	1	Backing Plate
5.	G10133	6	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{2}$ "
	G10109	6	Lock Nut, $\frac{5}{16}$ "-18, Grade 8
6.	GD9720	2	Spacer, $\frac{1}{2}$ " x 2 $\frac{3}{16}$ " Long
7.	GA6838	1	Wheel Mount
8.	G10033	2	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 3 $\frac{1}{2}$ "
	G10228	2	Lock Washer, $\frac{1}{2}$ "
	G10102	2	Hex Nut, $\frac{1}{2}$ "-13
9.	GD5857	2	Spring
10.	G10045	2	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 4 $\frac{1}{2}$ "
	G10228	2	Lock Washer, $\frac{1}{2}$ "
	G10102	2	Hex Nut, $\frac{1}{2}$ "-13
11.	G10348	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 5" (Lockup Bolt)
	G10111	1	Lock Nut, $\frac{1}{2}$ "-13
12.	GD9715	2	Spacer, $\frac{1}{2}$ " x 3" Long
13.	GA6834	1	Lower Link
14.	GA6832	1	Mount
15.	G10574	4	Carriage Bolt, $\frac{1}{2}$ "-13 x 1 $\frac{1}{4}$ "
	G10111	4	Lock Nut, $\frac{1}{2}$ "-13
16.	GA6833	1	Upper Link
17.	G10371	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 3", Full Thread
	G10501	1	Hex Jam Nut, $\frac{1}{2}$ "-13, Grade 2
18.	GA5654	1	Hub W/Bearings
	GA2014	-	Bearing
19.	GD12534	-	Cover
A.	GA7446	-	Wheel Assembly, 12 Tine (Items 2, 4, 5 And 18)

COULTER MOUNTED RESIDUE WHEELS

RUA063(RU104u)

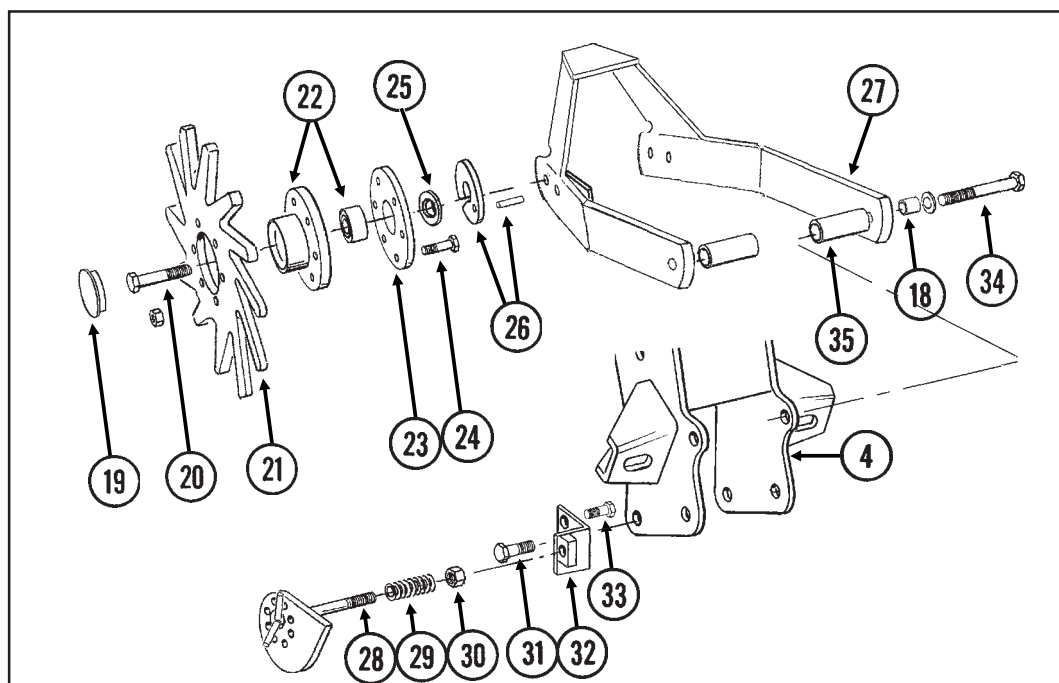
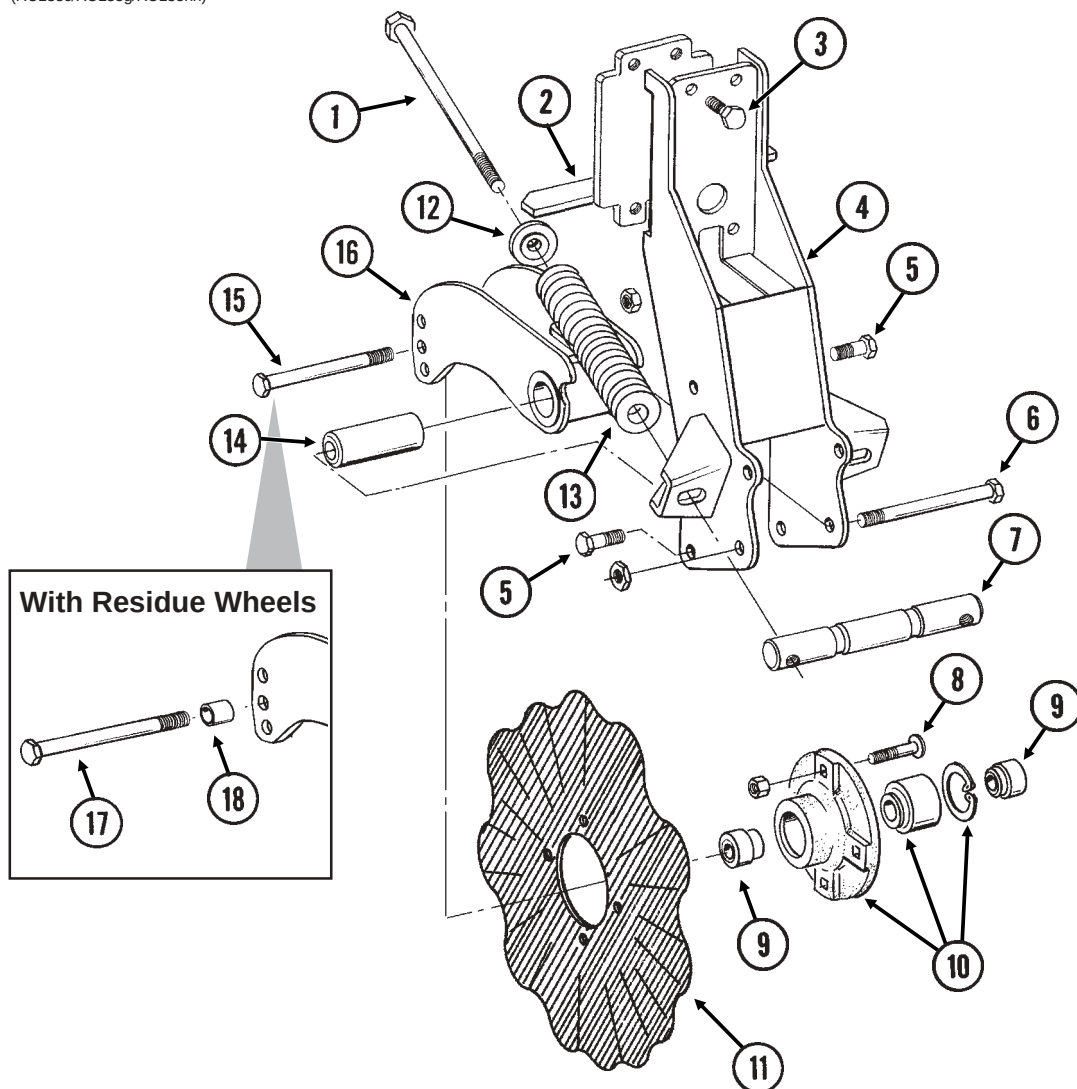


COULTER MOUNTED RESIDUE WHEELS

ITEM	PART NO.	QTY.	DESCRIPTION
(Per Row)			
1.	GD1132	2	Dust Cap
2.	G10010	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 3"
	G10503	2	Hex Jam Nut, $\frac{5}{8}$ "-11, Grade 2
3.	GD10552	2	Wheel, 12 Tine, $\frac{3}{8}$ " x 12"
4.	GA5654	2	Hub W/Bearings
	GA2014	-	Bearing
5.	GA7412	1	Cam
6.	GD10519	1	Spring
7.	G10206	1	Washer, $\frac{1}{2}$ " SAE
8.	G10974	1	Lock Nut W/Nylon Insert, $\frac{1}{2}$ "-13
9.	G11098	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 9 $\frac{1}{2}$ ", Grade 8
	GD14674	2	Special Washer, $\frac{1}{2}$ ", Hardened
	G10974	1	Lock Nut W/Nylon Insert, $\frac{1}{2}$ "-13
10.	GA7271	1	Mount
11.	GD10526	1	Sleeve, 7 $\frac{1}{2}$ "
12.	G10213	2	Machine Bushing, $\frac{5}{8}$ " (.030" Thick)
13.	GA8760	2	Weed Guard W/Spring Pin
	G10765	-	Spring Pin, $\frac{1}{4}$ " x 1"
14.	G10133	12	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{2}$ "
	G10109	12	Lock Nut, $\frac{5}{16}$ "-18, Grade 8
15.	GD9724	2	Backing Plate
A.	GA7446	-	Wheel Assembly, 12 Tine, R.H. (Items 3, 4, 14 And 15) (Shown)
	GA7445	-	Wheel Assembly, 12 Tine, L.H. (Items 3, 4, 14 And 15)

FRAME MOUNTED COULTER W/RESIDUE WHEELS

(RU135c/RU135g/RU135hh)



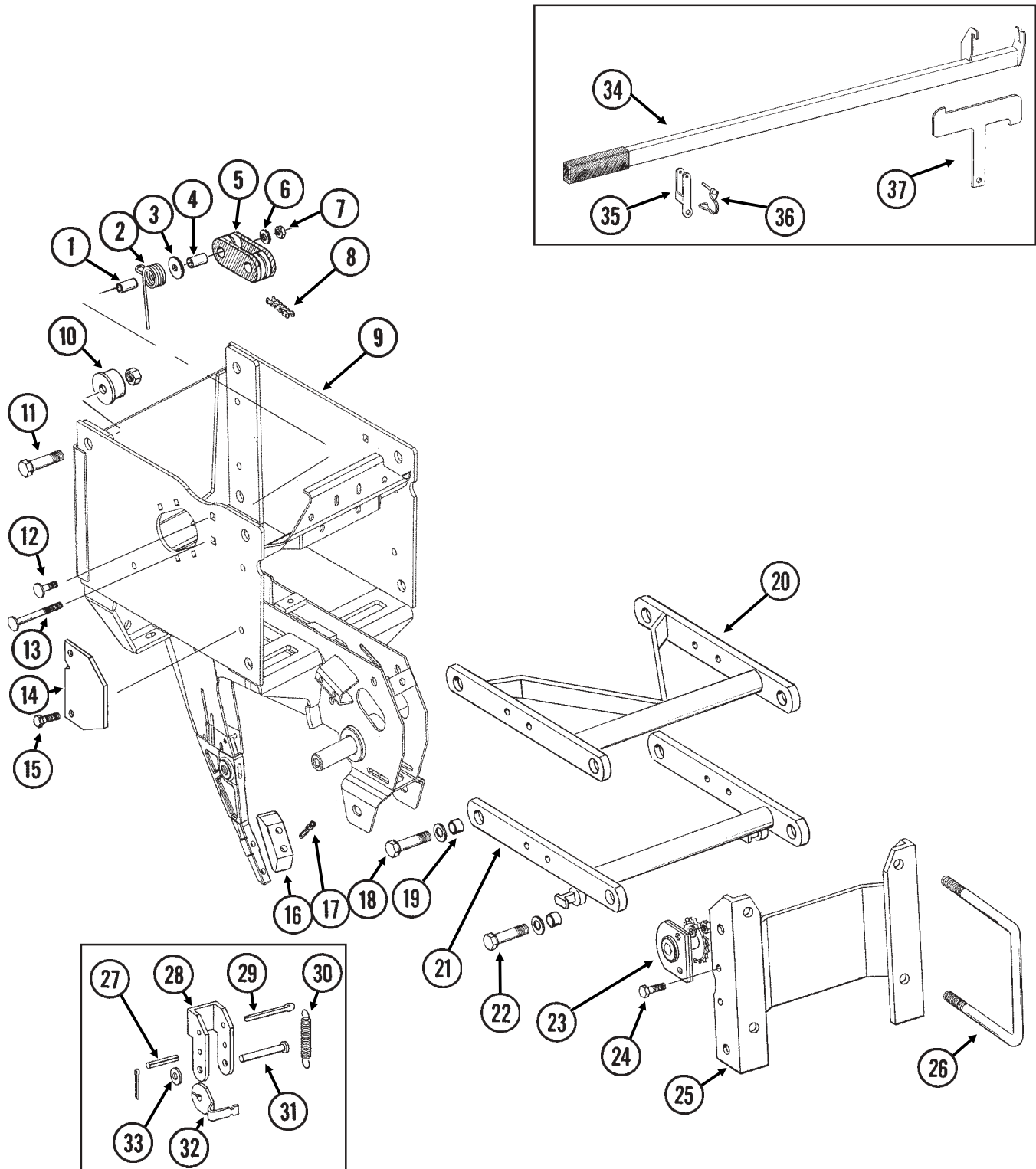
FRAME MOUNTED COULTER W/RESIDUE WHEELS

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	G11010	2	Hex Head Cap Screw, $\frac{3}{4}$ "-10 x 12"
2.	GA9844	1	Plate W/Angle
3.	G10039	4	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{3}{4}$ "
4.	GA9131	1	Coulter Frame
5.	G10007	4	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{1}{2}$ "
	G10107	4	Lock Nut, $\frac{5}{8}$ "-11
6.	G10400	1	Hex Head Cap Screw, $\frac{3}{4}$ "-10 x 6 $\frac{1}{2}$ "
	G10112	1	Lock Nut, $\frac{3}{4}$ "-10
7.	GD12826	1	Spring Anchor Bar
8.	G10574	4	Carriage Bolt, $\frac{1}{2}$ "-13 x 1 $\frac{1}{4}$ "
	G10111	4	Lock Nut, $\frac{1}{2}$ "-13
9.	GD12827	2	Adapter
10.	GA8641	1	Hub W/Bearing And Retaining Ring
	GA8603	1	Double Row Bearing
	GD11652	1	Retaining Ring, 2 $\frac{7}{16}$ "
11.	GD7803	1	Disc Blade, Fluted, 1", 8 Flutes (Shown)
	GD7804	-	Disc Blade, Bubbled, 1"
	GD9254	-	Disc Blade, Fluted, $\frac{3}{4}$ ", 13 Flutes
12.	GB0213	2	Spring Seat
13.	GD12817	2	Compression Spring
14.	GD12829	1	Sleeve
15.	G10046	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 5"
	G10107	1	Lock Nut, $\frac{5}{8}$ "-11
16.	GA9845	1	Coulter Arm W/Grease Fitting
	G10643	-	Grease Fitting, 45°, $\frac{1}{4}$ "-28
17.	G10011	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 5 $\frac{1}{2}$ "
	G10107	1	Lock Nut, $\frac{5}{8}$ "-11
18.	GB0218	3	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
19.	GD1132	2	Dust Cap
20.	G10010	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 3"
	G10503	2	Hex Jam Nut, $\frac{5}{8}$ "-11, Grade 2
21.	GD10552	2	Wheel, 12 Tine, $\frac{3}{8}$ " x 12"
22.	GA5654	2	Hub W/Bearings
	GA2014	-	Bearing
23.	GD9724	2	Backing Plate
24.	G10133	12	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{2}$ "
	G10109	12	Lock Nut, $\frac{5}{16}$ "-18, Grade 8
25.	G10213	2	Machine Bushing, $\frac{5}{8}$ " (.030" Thick)
26.	GA9862	2	Weed Guard W/Spring Pin
	G10765	-	Spring Pin, $\frac{1}{4}$ " x 1"
27.	GA9865	1	Mount
28.	GA9861	1	Cam
29.	GD10519	1	Spring
30.	G10974	1	Lock Nut W/Nylon Insert, $\frac{1}{2}$ "-13
31.	G10005	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{3}{4}$ "
	G10107	4	Lock Nut, $\frac{5}{8}$ "-11
32.	GA9864	1	Support
33.	G10014	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1"
	G10102	1	Hex Nut, $\frac{1}{2}$ "-13
34.	G10011	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 5 $\frac{1}{2}$ "
	G10205	2	Washer, $\frac{5}{8}$ " SAE
	G10730	2	Lock Nut W/Nylon Insert, $\frac{5}{8}$ "-11
35.	GD14170	2	Sleeve, 3"
A.	GA7446	-	Wheel Assembly, 12 Tine, R.H. (Items 21-24) (Shown)
	GA7445	-	Wheel Assembly, 12 Tine, L.H. (Items 21-24)

INTERPLANT® PUSH ROW UNIT

(RU121/RU141a)

NOTE: Push row units use the same seed tube, row unit depth adjustment components, quick adjustable down force springs, 15" opener disc blades, gauge wheels, closing wheels, meter drive and seed hopper as the pull row unit. See those pages for common parts.

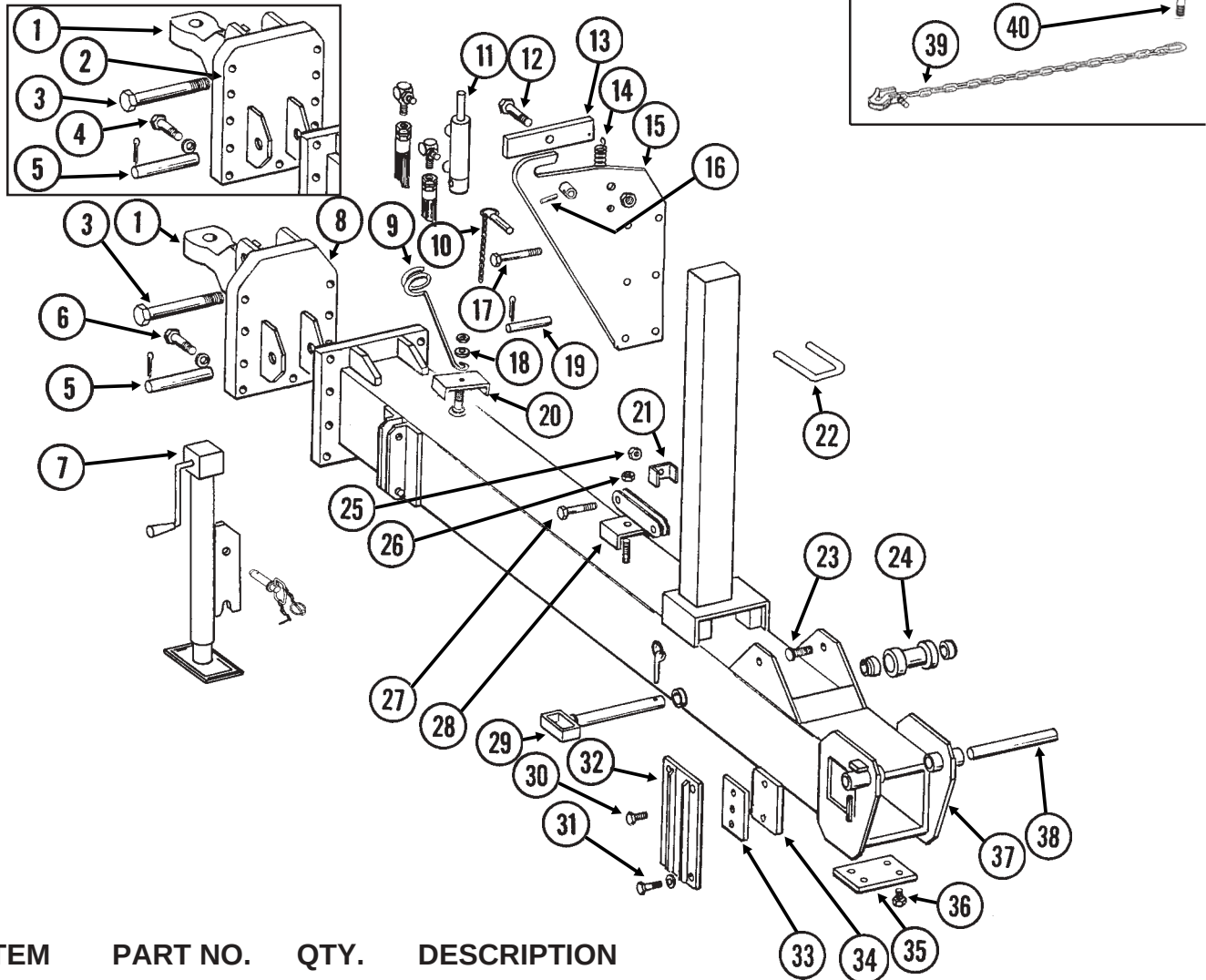


INTERPLANT® PUSH ROW UNIT

ITEM	PART NO.	QTY. (Per Row)	DESCRIPTION
1.	GD1026	1	Sleeve, 1 ³ / ₁₆ " Long
2.	GD11218	1	Spring
3.	G10201	1	Special Washer, ³ / ₈ " x 1 ¹ / ₂ " O.D.
4.	GD8893-01	1	Sleeve, 1 ³ / ₈ " Long
5.	GD11962	1	Idler
6.	G10210	1	Washer, ³ / ₈ " USS
7.	G10108	1	Lock Nut, ³ / ₈ "-16
8.	G3303-96	1	Chain, No. 41, 96 Pitch Including Connector Link
	GR0196	1	Connector Link, No. 41
9.	GA10161	-	Push Row Unit Shank
10.	GB0314	2	Hopper Mount
11.	G10751	2	Hex Head Cap Screw, ⁵ / ₈ "-18 x 1 ³ / ₄ "
	G10412	2	Lock Nut, ⁵ / ₈ "-18
12.	G10599	1	Carriage Bolt, ³ / ₈ "-16 x 1 ¹ / ₄ "
	G10101	1	Hex Nut, ³ / ₈ "-16
	G10108	1	Lock Nut, ³ / ₈ "-16
13.	G10307	1	Carriage Bolt, ³ / ₈ "-16 x 3 ¹ / ₂ "
14.	GD10867	2	Stop
15.	G10004	4	Hex Head Cap Screw, ³ / ₈ "-16 x 1 ¹ / ₄ "
	G10108	4	Lock Nut, ³ / ₈ "-16
16.	GB0301	1	Seed Tube Guard/Inner Scraper
17.	G10912	2	Hex Socket Head Cap Screw, ⁵ / ₁₆ "-18 x 1", Grade 8
18.	G10751	4	Hex Head Cap Screw, ⁵ / ₈ "-18 x 1 ³ / ₄ "
	GD7805	4	Special Washer, ⁵ / ₈ ", Hardened
	G10412	4	Lock Nut, ⁵ / ₈ "-18
19.	GB0218	8	Bushing, ²¹ / ₃₂ " I.D. x ⁷ / ₈ " O.D. x ¹⁹ / ₃₂ " Long
20.	GA8930	-	Upper Arm
21.	GA5787	1	Lower Arm
22.	G10732	4	Hex Head Cap Screw, ⁵ / ₈ "-18 x 2"
	GD7805	4	Special Washer, ⁵ / ₈ ", Hardened
	G10412	4	Lock Nut, ⁵ / ₈ "-18
23.	GA1720	1	Bearing/Sprocket, ⁷ / ₈ " Hex Bore
24.	G10004	2	Hex Head Cap Screw, ³ / ₈ "-16 x 1 ¹ / ₄ "
	G10229	2	Lock Washer, ³ / ₈ "
	G10101	2	Hex Nut, ³ / ₈ "-16
25.	GA5786	1	Mounting Plate
26.	GD1113	2	U-Bolt, 5" x 7" x ⁵ / ₈ "-11
	G10230	4	Lock Washer, ⁵ / ₈ "
	G10104	4	Hex Nut, ⁵ / ₈ "-11
27.	G10718	2	Spring Pin, ⁵ / ₁₆ " x 1 ¹ / ₈ "
28.	GD11264	2	Lockup
29.	G10463	2	Cotter Pin, ¹ / ₄ " x 1 ¹ / ₂ "
30.	GD11447	2	Spring
31.	G10284	2	Clevis Pin, ¹ / ₂ " x 1 ¹ / ₂ "
	G10456	2	Cotter Pin, ¹ / ₈ " x ³ / ₄ "
32.	GD11263	2	Spring Tab
33.	G10216	2	Washer, ¹ / ₂ " USS
34.	GA8651	1	Lift Lever W/Boot
	GD11649	-	Boot
35.	GD11659	1	Bracket
36.	GD9695	1	Wire Lock Pin, ¹ / ₄ " x 1 ³ / ₄ "
37.	GD11752	1	Mount

OUTER HITCH/SAFETY CHAIN

PHA038/PHA025(TWL1f/WGN47a)



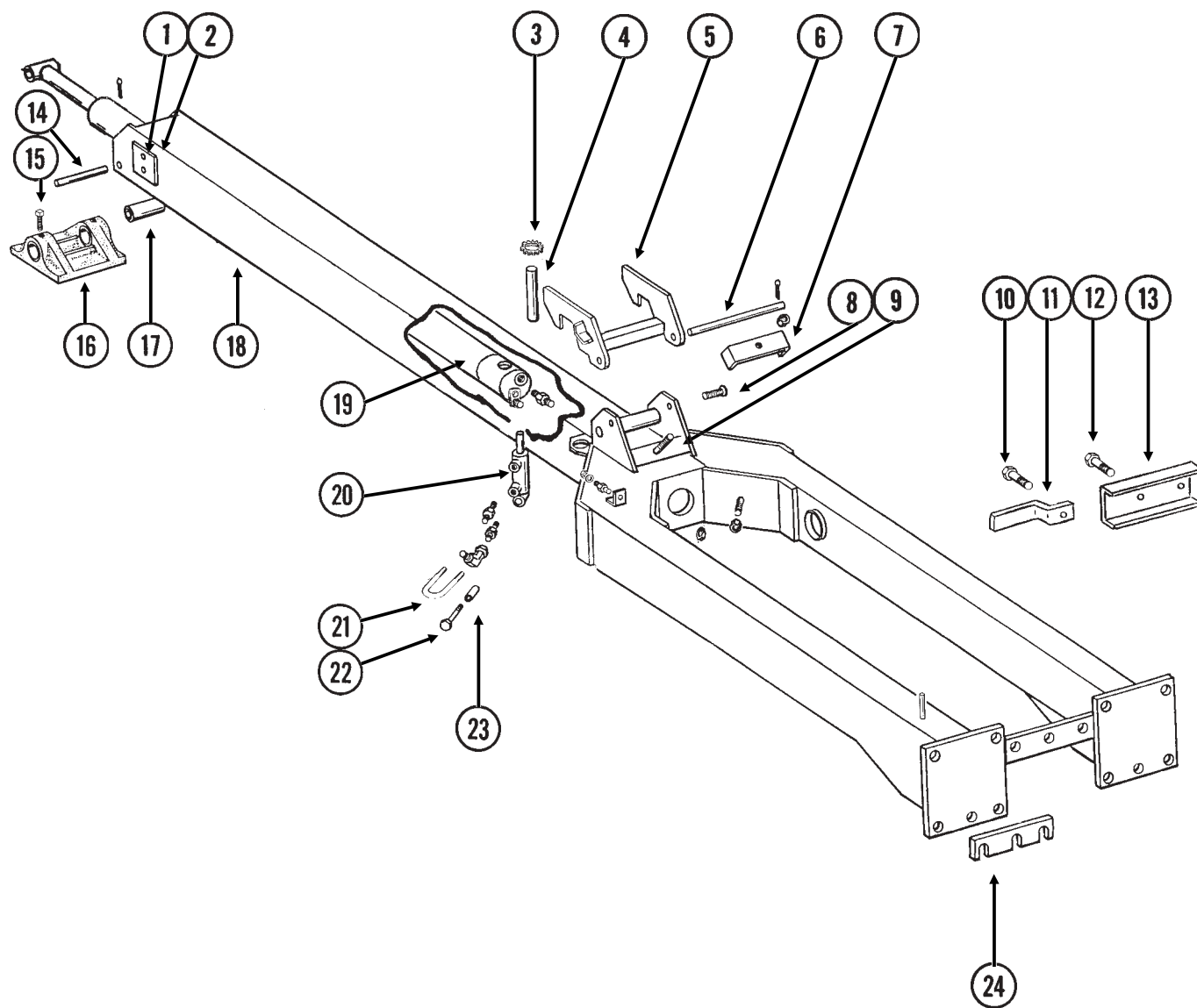
ITEM	PART NO.	QTY.	DESCRIPTION
1.	GB0237	1	Clevis, Single
2.	GA9837	-	Hitch Mount, 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
3.	G10169	1	Hex Head Cap Screw, 1 1/4"-7 x 6"
	G10157	1	Lock Nut, 1 1/4"-7
4.	G10802	11	Hex Head Cap Screw, 3/4"-10 x 2 3/4"
	G10231	11	Lock Washer, 3/4"
	G10105	11	Hex Nut, 3/4"-10
5.	GD5173	1	Pin, 1 1/4" x 5 1/8"
	G10462	2	Cotter Pin, 3/16" x 2"
6.	G10009	9	Hex Head Cap Screw, 5/8"-11 x 2 1/2"
	G10230	9	Lock Washer, 5/8"
	G10104	9	Hex Nut, 5/8"-11
7.	GA4994	1	Jack Assembly Complete
	GA4995	-	Detent Pin Assembly
	GR0517	-	Pin
	GR0516	-	Crank Assembly
	GR0515	-	Bevel Gear
8.	GA9836	1	Hitch Mount, 8 Row 36"/38" And 12 Row 30", 12 Row 36"/38" ("Y" Hitch Only)
9.	GD8260	1	Hose Holder
10.	GA7022	1	Detent Pin W/Chain (Transport Latch Locking Pin)
11.			See "Transport Latch Cylinder", Page P74
12.	G10006	1	Hex Head Cap Screw, 5/8"-11 x 2 1/4"
	GB0218	1	Bushing, 21/32" I.D. x 7/8" O.D. x 19/32" Long
	GD7805	1	Special Washer, 5/8", Hardened
	G10107	1	Lock Nut, 5/8"-11
13.	GA7016	1	Catch Bar
14.	GD5857	1	Spring

OUTER HITCH/SAFETY CHAIN

ITEM	PART NO.	QTY.	DESCRIPTION
15.	GA7433	1	Transport Latch
16.	G10765	-	Spring Pin, 1/4" x 1"
17.	G10809	1	Hex Head Cap Screw, 3/8"-16 x 3 1/4"
	GD2971-09	1	Sleeve, 2" Long
	G10108	1	Lock Nut, 3/8"-16
18.	G10216	1	Washer, 1/2" USS
	G10111	1	Lock Nut, 1/2"-13
19.	GD7137	1	Pin, 3/4" x 3 3/8"
	G10457	2	Cotter Pin, 5/32" x 1 1/2"
20.	GD8188	-	Clamp, 7/8" x 3" x 5 3/8"
	GD8189	-	Rubber Pad
21.	GD5892	2	Hose Clamp, 5/8" x 1 1/2" x 1 1/2"
22.	GD9953	3	U-Bolt, 3" x 4" x 5/8"-11
	G10205	1	Washer, 5/8" SAE
	G10230	6	Lock Washer, 5/8"
	G10104	6	Hex Nut, 5/8"-11
23.			See "Hose Take-Up", Pages P40 And P41
24.	GA4418	1	Roller W/Bronze Bushings, 8 Row "Y" And "T" Hitch, 12 Row "Y" Hitch
	GA4842	-	Roller W/Bronze Bushings, 12 Row "T" Hitch And 16 Row "Y" and "T" Hitch
	GD6556	1	Bronze Bushing
25.	G10108	1	Lock Nut, 3/8"-16
26.	G10111	1	Lock Nut, 1/2"-13
27.	G10026	1	Hex Head Cap Screw, 3/4"-10 x 2"
	G10112	1	Lock Nut, 3/4"-10
28.	GA5842	1	Bracket, Jack Mount
	GD8189	-	Rubber Pad
29.	GA4402	1	Safety Pin, 12 3/4", 8 Row 36"/38" And 12 Row 30", 12 Row 36"/38" ("Y" Hitch Only)
	GA4845	-	Safety Pin, 14 3/4", 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
	GD2558	-	Lynch Pin, 1/4"
	GD2557	-	Lynch Pin, 7/16"
30.	G10016	8	Hex Head Cap Screw, 1/2"-13 x 2"
	G10228	8	Lock Washer, 1/2"
31.	G10017	8	Hex Head Cap Screw, 1/2"-13 x 1 1/2", 8/12 Row
	G10016	10	Hex Head Cap Screw, 1/2"-13 x 2", 16 Row
	G10228	8-10	Lock Washer, 1/2"
	G10102	8-10	Hex Nut, 1/2"-13
32.	GA7029	2	Wear Mount, 8 Row 36"/38" And 12 Row 30", 12 Row 36"/38" ("Y" Hitch Only)
	GA7084	-	Wear Mount, L.H., 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
	GA7085	-	Wear Mount, R.H., 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
	GA7083	-	Wear Pad Retainer, 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
33.	GD5154	-	Shim, 4" x 4" (As Required), All Sizes
	GD3501	-	Shim, 4" x 6" (As Required), 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
34.	GD9959	-	Wear Pad, Nylatron, 4" x 4" (As Required), All Sizes
	GD9960	-	Wear Pad, Nylatron, 4" x 6" (As Required), 12 Row 36"/38" ("T" Hitch Only) And 16 Row 30"
35.	GD7519	3	Shim, 16 Gauge (16 Row Only)
	GD7518	1	Shim, 3/8" (16 Row Only)
36.	G10014	4	Hex Head Cap Screw, 1/2"-13 x 1"
	G10228	4	Lock Washer, 1/2"
	G10216	4	Washer, 1/2" USS
37.	A7835	-	Outer Hitch, "Y", 73", 8 Row 36"/38" (Non-Stock Item)
	A7836	-	Outer Hitch, "T", 97", 8 Row 36"/38" (Non-Stock Item)
	A7010	-	Outer Hitch, "Y", 97", 12 Row 30" (Non-Stock Item)
	A7061	-	Outer Hitch, "T", 121", 12 Row 30" (Non-Stock Item)
	A7044	-	Outer Hitch, "Y", 121", 12 Row 36"/38" (Non-Stock Item)
	A7072	-	Outer Hitch, "T", 151 1/2", 12 Row 36"/38" (Non-Stock Item)
	A7088	-	Outer Hitch, "Y", 127 1/2", 16 Row 30" (Non-Stock Item)
	A7073	-	Outer Hitch, "T", 151 1/2", 16 Row 30" (Non-Stock Item)
38.	GD5804	1	Pin, 1 1/4" x 12", 8 Row "Y" And "T" Hitch, 12 Row "Y" Hitch
	GD7251	1	Pin, 1 1/4" x 14", 12 Row "T" Hitch And 16 Row "Y" and "T" Hitch
	G10610	2	Spring Pin, 3/8" x 2"
39.	GA7533	1	Safety Chain, 1/2"
40.	G11058	1	Hex Head Cap Screw, 1 1/4"-7 x 3"
	GD10646	1	Special Washer
	G10226	1	Washer, 1 1/4" SAE
	G10157	1	Lock Nut, 1 1/4"-7

INNER HITCH, "Y"

PHA035/PHA037(TWL2i)

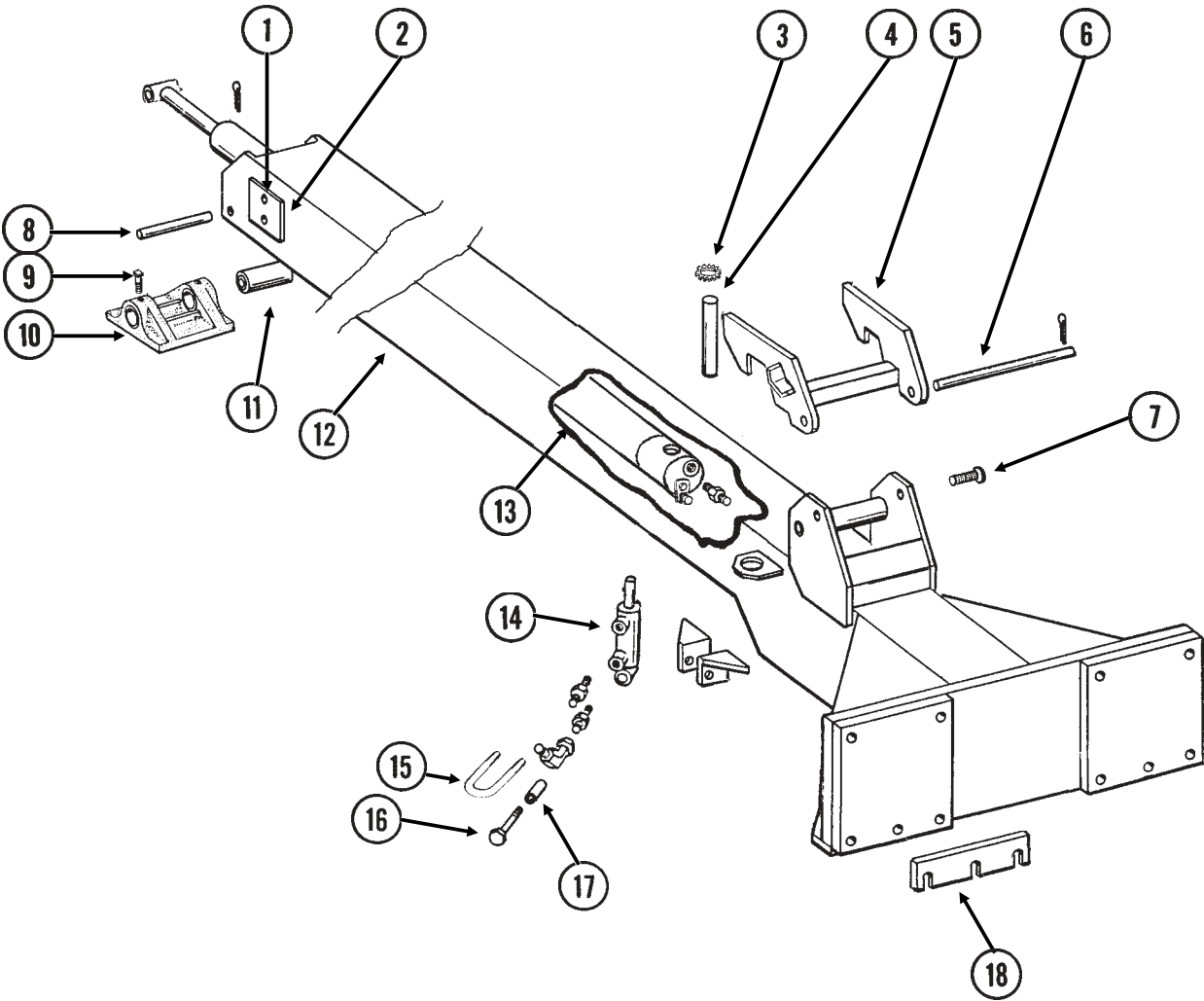


INNER HITCH, "Y"

ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10014	4	Hex Head Cap Screw, 1/2"-13 x 1", 8 Row 36"/38" And 12 Row 30"/36"/38"
	G10017	4	Hex Head Cap Screw, 1/2"-13 x 1 1/2", 16 Row 30"
	G10228	4	Lock Washer, 1/2", 16 Row 30"
2.	GD9959	2	Wear Pad, Nylatron, 4" x 4"
	GD5154	4-6	Shim, 4" x 4"
3.	G10894	-	External Washer
4.	GD3537-17	1	Shaft, 1 1/4" x 6 3/8", 8 Row 36"/38" And 12 Row 30"/36"/38"
	GD3537-18	-	Shaft, 1 1/4" x 7 3/8", 16 Row 30"
5.	GA7423	1	Tongue Hook W/Grease Fittings, 8/12 Row
	GA7424	-	Tongue Hook W/Grease Fittings, 16 Row
	G10641	-	Grease Fitting, 1/8" NPT
6.	GD5804	1	Pin, 1 1/4" x 12", 8/12 Row
	GD7883	-	Pin, 1 1/4" x 14 1/2", 16 Row
	G10468	2	Cotter Pin, 3/8" x 2"
7.	GD8188	-	Clamp, 7/8" x 3" x 5 3/8"
	GD8189	-	Rubber Pad
8.			See "Hose Take-Up", Pages P40 And P41
9.	G11077	1	Hex Head Cap Screw, 1/2"-13 x 2 1/4"
	G10111	1	Lock Nut, 1/2"-13
10.	G10004	1	Hex Head Cap Screw, 3/8"-16 x 1 1/4"
	G10229	1	Lock Washer, 3/8"
	G10101	1	Hex Nut, 3/8"-16
11.	GD10650	1	Hose Clamp
12.	G10003	1	Hex Head Cap Screw, 3/8"-16 x 1 1/2"
	G10210	1	Washer, 3/8" USS
	G10108	1	Lock Nut, 3/8"-16
13.	GD10664	1	Shield (If Applicable)
14.	GD5173	1	Pin, 1 1/4" x 5 1/8"
	G10462	1	Cotter Pin, 3/16" x 2"
15.	G10131	1	Square Head Set Screw, 5/16"-18 x 3/4"
16.	GB0246	1	Shoe
17.	GD3537-11	1	Shaft, 1 1/4" x 7", 8/12 Row
	GD3537-12	-	Shaft, 1 1/4" x 8", 16 Row
18.	A7427	-	Inner Hitch, 145 3/8", 8 Row 36"/38" (Non-Stock Item)
	A7429	-	Inner Hitch, 169 3/8", 12 Row 30" (Shown) (Non-Stock Item)
	A7428	-	Inner Hitch, 191 5/8", 12 Row 36"/38" (Non-Stock Item)
	A7426	-	Inner Hitch, 205 3/8", 16 Row 30" (Non-Stock Item)
19.		-	See "Tongue Cylinder", Pages P75-P77
20.		-	See "Tongue Lock Cylinder", Page P74
21.	GD10530	1	U-Bolt, 2 1/8" x 1 7/8" x 3/8"-16
	G10229	2	Lock Washer, 3/8"
	G10101	2	Hex Nut, 3/8"-16
22.	G10585	1	Hex Head Cap Screw, 1/2"-13 x 3 1/4"
	G10216	1	Washer, 1/2" USS
	G10228	1	Lock Washer, 1/2"
	G10102	1	Hex Nut, 1/2"-13
23.	GD10538-01	1	Sleeve
24.	GD13543	1	Shim, 2 1/2" x 10", 7 Gauge
	GD13544	1	Shim, 2 1/2" x 10", 10 Gauge
	GD13545	1	Shim, 2 1/2" x 10", 12 Gauge
	GD13546	1	Shim, 2 1/2" x 10", 14 Gauge

INNER HITCH, "T"

PHA035/PHA036(TWL3f)

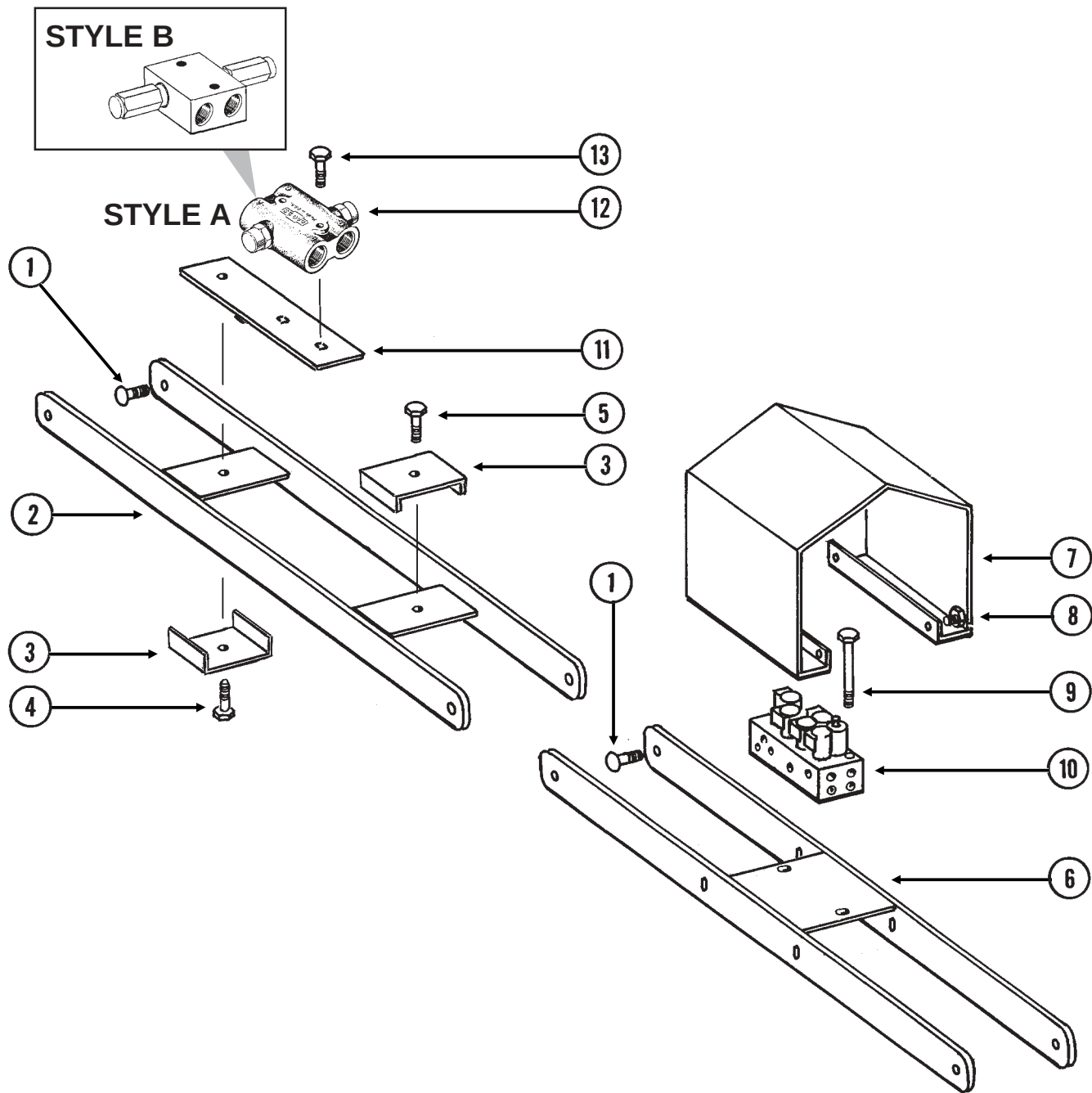


INNER HITCH, "T"

ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10014	4	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1", 8 Row 36"/38" And 12 Row 30"
	G10017	4	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{1}{2}$ ", 12 Row 36"/38" And 16 Row 30"
	G10228	4	Lock Washer, $\frac{1}{2}$ ", 12 Row 36"/38" And 16 Row 30"
2.	GD9959	2	Wear Pad, Nylatron, 4" x 4"
	GD5154	4-6	Shim, 4" x 4"
3.	G10894	-	External Washer
4.	GD3537-17	1	Shaft, 1 $\frac{1}{4}$ " x 6 $\frac{3}{8}$ ", 8 Row 36"/38" And 12 Row 30"
	GD3537-18	-	Shaft, 1 $\frac{1}{4}$ " x 7 $\frac{3}{8}$ ", 12 Row 36"/38" And 16 Row 30"
5.	GA7423	1	Tongue Hook W/Grease Fittings, 8 Row 36"/38" And 12 Row 30"
	GA7424	-	Tongue Hook W/Grease Fittings, 12 Row 36"/38" And 16 Row 30"
	G10641	-	Grease Fitting, $\frac{1}{8}$ " NPT
6.	GD5804	1	Pin, 1 $\frac{1}{4}$ " x 12", 8 Row 36"/38" And 12 Row 30"
	GD7883	-	Pin, 1 $\frac{1}{4}$ " x 14 $\frac{1}{2}$ ", 12 Row 36"/38" And 16 Row 30"
	G10468	2	Cotter Pin, $\frac{3}{8}$ " x 2"
7.		-	See "Hose Take-Up", Pages P40 And P41
8.	GD5173	1	Pin, 1 $\frac{1}{4}$ " x 5 $\frac{1}{8}$ "
	G10462	1	Cotter Pin, $\frac{3}{16}$ " x 2"
9.	G10131	1	Square Head Set Screw, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
10.	GB0246	1	Shoe
11.	GD3537-11	1	Shaft, 1 $\frac{1}{4}$ " x 7", 8 Row 36"/38" And 12 Row 30"
	GD3537-12	-	Shaft, 1 $\frac{1}{4}$ " x 8", 12 Row 36"/38" And 16 Row 30"
12.	A7431	-	Inner Hitch, 121 $\frac{5}{8}$ ", 8 Row 36"/38" (Non-Stock Item)
	A7432	-	Inner Hitch, 145 $\frac{3}{8}$ ", 12 Row 30" (Shown) (Non-Stock Item)
	A7430	-	Inner Hitch, 183 $\frac{1}{8}$ ", 12 Row 36"/38" And 16 Row 30" (Non-Stock Item)
13.		-	See "Tongue Cylinder", Pages P76-P78
14.		-	See "Tongue Lock Cylinder", Page P74
15.	GD10530	1	U-Bolt, 2 $\frac{1}{8}$ " x 1 $\frac{7}{8}$ " x $\frac{3}{8}$ "-16
	G10229	2	Lock Washer, $\frac{3}{8}$ "
	G10101	2	Hex Nut, $\frac{3}{8}$ "-16
16.	G10585	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 3 $\frac{1}{4}$ "
	G10216	1	Washer, $\frac{1}{2}$ " USS
	G10228	1	Lock Washer, $\frac{1}{2}$ "
	G10102	1	Hex Nut, $\frac{1}{2}$ "-13
17.	GD10538-01	1	Sleeve
18.	GD13543	1	Shim, 2 $\frac{1}{2}$ " x 10", 7 Gauge
	GD13544	1	Shim, 2 $\frac{1}{2}$ " x 10", 10 Gauge
	GD13545	1	Shim, 2 $\frac{1}{2}$ " x 10", 12 Gauge
	GD13546	1	Shim, 2 $\frac{1}{2}$ " x 10", 14 Gauge

HOSE TAKE-UP

PHA039(TWL137/TWL171)



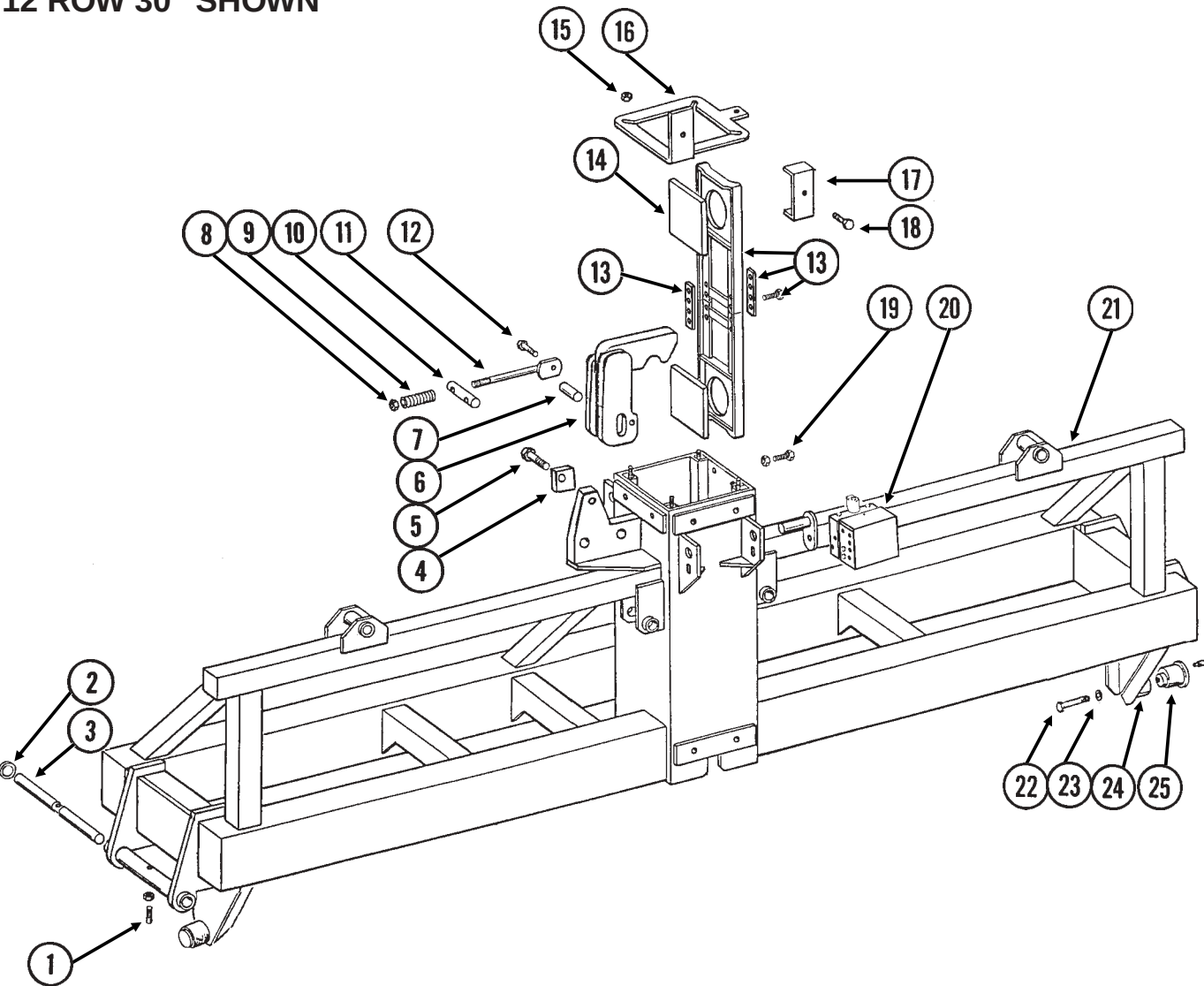
HOSE TAKE-UP

ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10689	6	Carriage Bolt, $\frac{5}{8}$ "-11 x 2"
	GB0218	6	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
	GD7805	6	Special Washer, $\frac{5}{8}$ ", Hardened
	G10107	6	Lock Nut, $\frac{5}{8}$ "-11
2.	GA7058	1	Take-Up, 28 $\frac{1}{4}$ ", 8 Row 36"/38" "Y" Hitch
	GA7013	-	Take-Up, 44 $\frac{1}{4}$ ", 8 Row 36"/38" "T" Hitch And 12 Row 30" "Y" Hitch (Shown)
	GA7049	-	Take-Up, 56 $\frac{1}{4}$ ", 12 Row 30" "T" Hitch, 12 Row 36"/38" And 16 Row 30" "Y" Hitch
	GA7074	-	Take-Up, 67 $\frac{5}{8}$ ", 12 Row 36"/38" And 16 Row 30" "T" Hitch
3.	GD8188	2	Clamp, $\frac{7}{8}$ " x 3" x 5 $\frac{3}{8}$ "
	GD8189	2	Rubber Pad
4.	G10581	1-2	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 2 $\frac{1}{4}$ "
	G10053	-	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 2 $\frac{1}{2}$ "
	G10111	1	Lock Nut, $\frac{1}{2}$ "-13
5.	G10581	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 2 $\frac{1}{4}$ "
	G10111	1	Lock Nut, $\frac{1}{2}$ "-13
6.	GA7057	1	Take-Up, 28 $\frac{1}{4}$ ", 8 Row 36"/38" "Y" Hitch
	GA7021	-	Take-Up, 44 $\frac{1}{4}$ ", 8 Row 36"/38" "T" Hitch And 12 Row 30" "Y" Hitch (Shown)
	GA7050	-	Take-Up, 56 $\frac{1}{4}$ ", 12 Row 30" "T" Hitch And 12 Row 36"/38" And 16 Row 30" "Y" Hitch
	GA7075	-	Take-Up, 67 $\frac{5}{8}$ ", 12 Row 36"/38" And 16 Row 30" "T" Hitch
7.	GD9952	1	Cover, 8 Row 36"/38" "T" Hitch, 12 Row 30"/36"/38" "Y"/"T" Hitch And 16 Row 30" "Y"/"T" Hitch (Shown)
	GD10295	-	Cover, 8 Row 36"/38" "Y" Hitch
8.	G10004	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10229	4	Lock Washer, $\frac{3}{8}$ "
	G10203	8	Washer, $\frac{3}{8}$ " SAE
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
9.	G10172	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 5"
	G10210	2	Washer, $\frac{3}{8}$ " USS
	G10108	2	Lock Nut, $\frac{3}{8}$ "-16
10.			See "Valve Block - Located On Hitch", Pages P82 And P83
11.	GA8131	1	Mount
12.		-	See "Relief Valve - Located On Hitch", Page P85
13.	G10902	2	Carriage Bolt, $\frac{5}{16}$ "-18 x 2 $\frac{1}{2}$ "
	G10232	2	Lock Washer, $\frac{5}{16}$ "
	G10106	2	Hex Nut, $\frac{5}{16}$ "-18

CENTER FRAME

PFA070/VVB034(TWL138a)

12 ROW 30" SHOWN

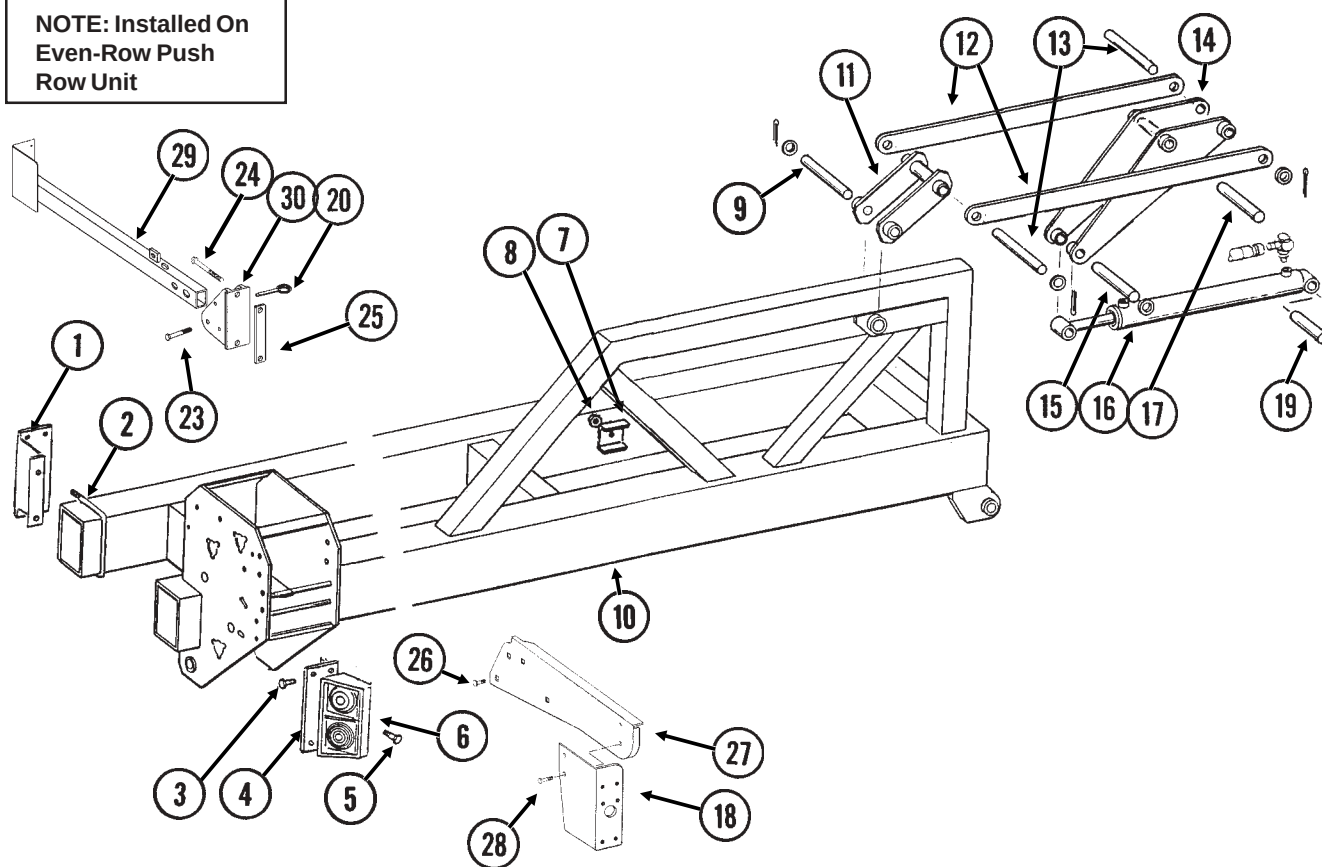
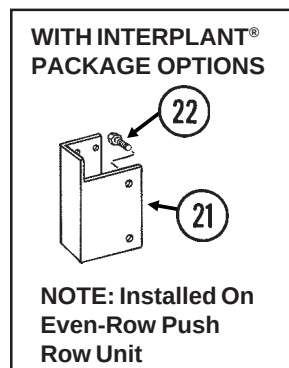


CENTER FRAME

ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10102	1	Hex Nut, 1/2"-13
	G10828	1	Hex Socket Set Screw, 1/2"-13 x 1 1/4"
2.	G10404	-	Machine Bushing, 3 1/8" x 2 1/8" x 3/16" (As Required)
	G10234	-	Machine Bushing, 2 1/8", 10 Gauge (As Required)
	G10336	-	Machine Bushing, 2 1/8", 14 Gauge (As Required)
3.	GD10531	1	Hinge Pin, 2 1/8" x 25 3/4"
4.	GD10492	2	Adjustment Block
5.	G10085	-	Hex Head Cap Screw, 3/4"-10 x 3 3/4"
	G10218	-	Washer, 3/4" USS
	G10112	-	Lock Nut, 3/4"-10
6.	GA7390	-	Safety Hook
7.	GD9898	1	Pin, 1 1/4" x 2 15/16"
8.	G10205	2	Washer, 5/8" SAE
	G10107	2	Lock Nut, 5/8"-11
9.	GD10006	2	Spring
10.	GD9870	1	Pin 1 1/4" x 6"
11.	GA6943	2	Spring Rod
12.	G10037	2	Hex Head Cap Screw, 1/2"-13 x 1 1/4"
	G10206	2	Washer, 1/2" SAE
	G10228	2	Lock Washer, 1/2"
	GD7904-02	2	Sleeve, 1/2" x 1/2" Long
13.	GA7579	4	Pad Holder W/Bars
	GD10706	-	Bar, 1 1/4" x 6" (1/4" Thick)
	GD10707	-	Bar, 1 1/4" x 6" (3/8" Thick)
	G10001	-	Hex Head Cap Screw, 3/8"-16 x 1"
14.	GD10053	8	Wear Pad, 7" x 7", 1/2" Thick
15.	GD7805	4	Special Washer, 5/8", Hardened
	G10104	4	Hex Nut, 5/8"-11
16.	GD9968	1	Cap
17.	GD8188	1	Clamp, 7/8" x 3" x 5 3/8"
	GD8189	1	Rubber Pad
18.	G10053	1	Hex Head Cap Screw, 1/2"-13 x 2 1/2"
	G10228	1	Lock Washer, 1/2"
	G10102	1	Hex Nut, 1/2"-13
19.	G10543	16	Hex Head Cap Screw, 3/4"-10 x 3", Full Thread
	G10105	16	Hex Nut, 3/4"-10
20.		-	See "Valve Blocks - Located On Rear Center Frame", Page P81
21.	A7394	1	Frame W/Cam Follower Mounts, 166", 8 Row 36"/38" And 12 Row 36"/38" (Non-Stock Item)
	A7393	-	Frame W/Cam Follower Mounts, 136", 12 Row 30" And 16 Row 30" (Non-Stock Item)
	GA6929	-	Cam Follower Mount, L.H.
	GA6928	-	Cam Follower Mount, R.H.
22.	G10025	2	Hex Head Cap Screw, 3/4"-10 x 1 1/2"
23.	GD9052	2	Special Washer, 3/4" I.D. x 2" O.D., Hardened
24.	GD10532	2	Sleeve
25.	GA6497	2	Cam Follower W/Grease Fitting
	G10640	-	Grease Fitting, 1/4"-28

WING FRAME

(TWL180a/TWL139g)



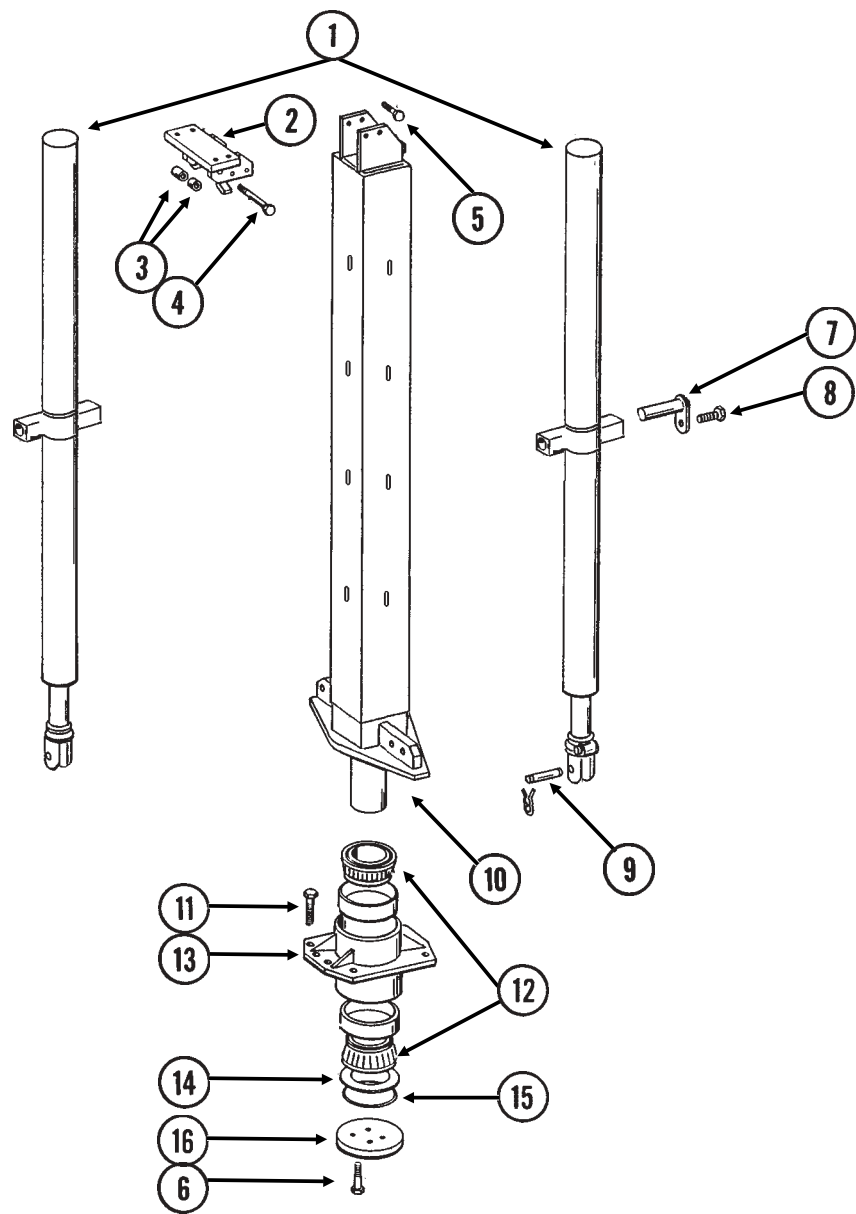
ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA6792	1	Light Bracket (Wide Row Sizes Only)
2.	GD1113	1	U-Bolt, 5" x 7" x 5/8"-11
	G10230	2	Lock Washer, 5/8"
	G10104	2	Hex Nut, 5/8"-11
3.	G10001	2	Hex Head Cap Screw, 3/8"-16 x 1"
	G10210	1	Washer, 3/8" USS
	G10229	2	Lock Washer, 3/8"
	G10101	2	Hex Nut, 3/8"-16
4.	GD9681	1	Light Bracket (Wide Row Sizes Only)
5.	G10064	8	Hex Head Cap Screw, 1/4"-20 x 1"
	G10110	8	Lock Nut, 1/4"-20, Grade B
6.		-	See "Electrical Components", Pages P90 And P91

WING FRAME

ITEM	PART NO.	QTY.	DESCRIPTION
7.	GD5875	-	Hose Clamp, $\frac{9}{16}$ " x 2 $\frac{1}{2}$ " x 2"
8.	G10108	-	Lock Nut, $\frac{3}{8}$ "-16
9.	GD9963	1	Pin, 1 $\frac{1}{4}$ " x 9"
	G10460	2	Cotter Pin, $\frac{1}{4}$ " x 2"
10.	A7834	-	Wing, R.H., 75 $\frac{1}{2}$ ", 8 Row 36"/38" (Non-Stock Item)
	A7833	-	Wing, L.H., 75 $\frac{1}{2}$ ", 8 Row 36"/38" (Non-Stock Item)
	A6904	-	Wing, R.H., 119 $\frac{1}{4}$ ", 12 Row 30" (Non-Stock Item)
	A6905	-	Wing, L.H., 119 $\frac{1}{4}$ ", 12 Row 30" (Non-Stock Item)
	A7028	-	Wing, R.H., 152", 12 Row 36"/38" (Non-Stock Item)
	A7027	-	Wing, L.H., 152", 12 Row 36"/38" (Non-Stock Item)
	A6892	-	Wing, R.H., 179 $\frac{1}{4}$ ", 16 Row 30" (Two Wheel Towers Per Wing) (Non-Stock Item)
	A6893	-	Wing, L.H., 179 $\frac{1}{4}$ ", 16 Row 30" (Two Wheel Towers Per Wing) (Non-Stock Item)
11.	GA7018	1	Link
12.	GD10049	2	Strap, 56", 8 Row 36"/38" And 12 Row 36"/38"
	GD9956	2	Strap, 41", 12 Row 30" And 16 Row 30"
13.	GD9964	2	Pin, 1 $\frac{1}{4}$ " x 10 $\frac{1}{2}$ "
	G10159	4	Machine Bushing, 1 $\frac{1}{4}$ ", 10 Gauge
	G10460	4	Cotter Pin, $\frac{1}{4}$ " x 2"
14.	GA7019	1	Toggle Link
15.	GD4108	1	Pin, 1 $\frac{1}{4}$ " x 7"
	G10159	2	Machine Bushing, 1 $\frac{1}{4}$ ", 10 Gauge
	G10460	2	Cotter Pin, $\frac{1}{4}$ " x 2"
16.		-	See "Wing Lock Cylinder", Page P79
17.	GD9955	1	Pin 1 $\frac{1}{4}$ " x 7"
	G10606	2	Spring Pin, $\frac{1}{4}$ " x 2"
18.	GD12724	1	Bracket
19.	GD6136	2	Pin, 1 $\frac{1}{4}$ " x 5"
	G10460	4	Cotter Pin, $\frac{1}{4}$ " x 2"
20.	G10874	1	Detent Pin, $\frac{1}{2}$ " x 3 $\frac{1}{2}$ " Grip
21.	GD12703	1	Push Row Unit Light Bracket
22.	G10001	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1"
	G10229	2	Lock Washer, $\frac{3}{8}$ "
	G10101	2	Hex Nut, $\frac{3}{8}$ "-16
23.	G10033	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 3 $\frac{1}{2}$ "
	G10206	4	Washer, $\frac{1}{2}$ " SAE
	G10111	1	Lock Nut, $\frac{1}{2}$ "-13
24.	G10439	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 7"
	G10230	2	Lock Washer, $\frac{5}{8}$ "
	G10104	2	Hex Nut, $\frac{5}{8}$ "-11
25.	GD1908	1	Mounting Bracket
26.	G10312	2	Carriage Bolt, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
	G10620	2	Serrated Flange Nut, $\frac{5}{16}$ "-18
27.	GD15950	1	Light Mount Extension
28.	G10064	2	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x 1"
	G10227	2	Lock Washer, $\frac{1}{4}$ "
	G10103	2	Hex Nut, $\frac{1}{4}$ "-20
29.	GA9840	1	Light Bracket
30.	GB0309	1	Light Mount Bracket
A.	G7698X	-	Push Row Unit Mounted Light Bracket Package (Items 21 And 22 On This Page And 42" Harness Extension, Item 5 On Pages P90 And P91)

CENTER PIVOT

PFA067/PFA068(TWL7c)

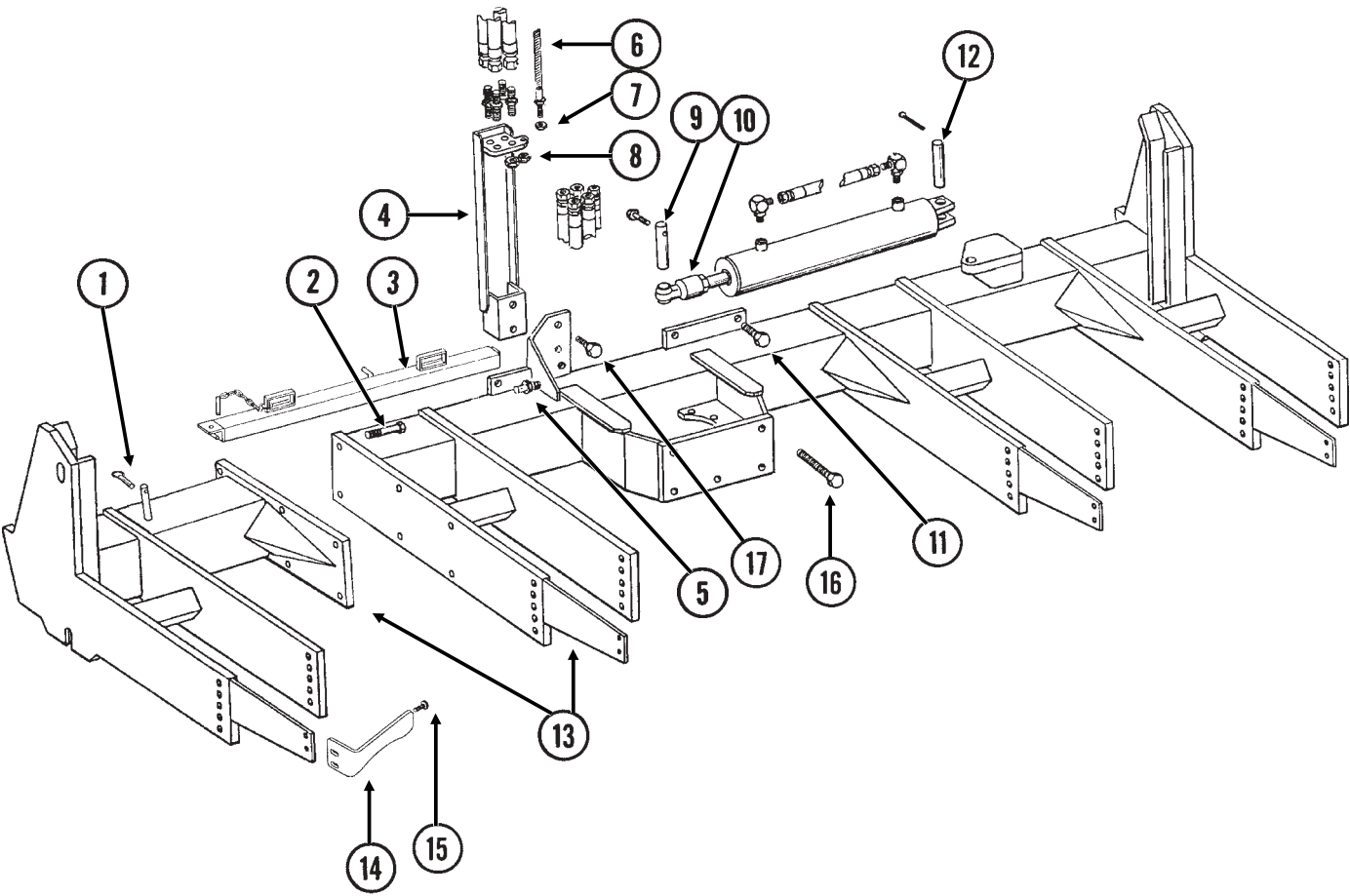


CENTER PIVOT

ITEM	PART NO.	QTY.	DESCRIPTION
1.		-	See "Center Lift Cylinder", Page P72
2.	GA6964	1	Hook Strap
3.	GD10447	1	Sleeve, 3 ⁵ / ₈ "
	GD10446	1	Sleeve, 3 ¹³ / ₁₆ "
4.	G10011	1	Hex Head Cap Screw, ⁵ / ₈ "-11 x 5 ¹ / ₂ "
	G10107	1	Lock Nut, ⁵ / ₈ "-11
5.	G10689	4	Carriage Bolt, ⁵ / ₈ "-11 x 2"
	G10107	4	Lock Nut, ⁵ / ₈ "-11
6.	G10027	4	Hex Head Cap Screw, ³ / ₄ "-10 x 2 ¹ / ₂ "
	GD2169	1	Special Washer, ²⁵ / ₃₂ " I.D. x 1 ¹ / ₄ " O.D., Hardened
7.	GA5121	4	Pin, 2 ¹ / ₈ "
8.	G10017	4	Hex Head Cap Screw, ¹ / ₂ "-13 x 1 ¹ / ₂ "
	G10216	4	Washer, ¹ / ₂ " USS
	G10228	4	Lock Washer, ¹ / ₂ "
	G10102	4	Hex Nut, ¹ / ₂ "-13
9.	GR0375	2	Pin, 1" x 3 ¹ / ₂ "
	GR0193	4	Hair Pin Clip
10.	GA7540	1	Center Post
11.	G10441	8	Hex Head Cap Screw, ⁷ / ₈ "-9 x 3", Grade 8
	GD10063	8	Hardened Washer, ⁷ / ₈ "
	G11053	8	Hex Nut, ⁷ / ₈ "-9, Grade 8
12.	GA7096	2	Cone
13.	GA7067	1	Bearing Housing W/Cups And Grease Fitting
	GD10011	2	Cup
	G10779	1	Grease Fitting, 90°, ¹ / ₄ "-28
14.	GD10012	-	Shim, .005" Thick (As Required)
	GD10013	-	Shim, .020" Thick (As Required)
	GD10014	-	Shim, .007" Thick (As Required)
15.	GD9130	1	O-Ring
16.	GD9636	1	Bearing Cap

AXLE ASSEMBLY

HTA043/HTA044/PFA071/PHA033/PHA034/PFA073(TWL140c)

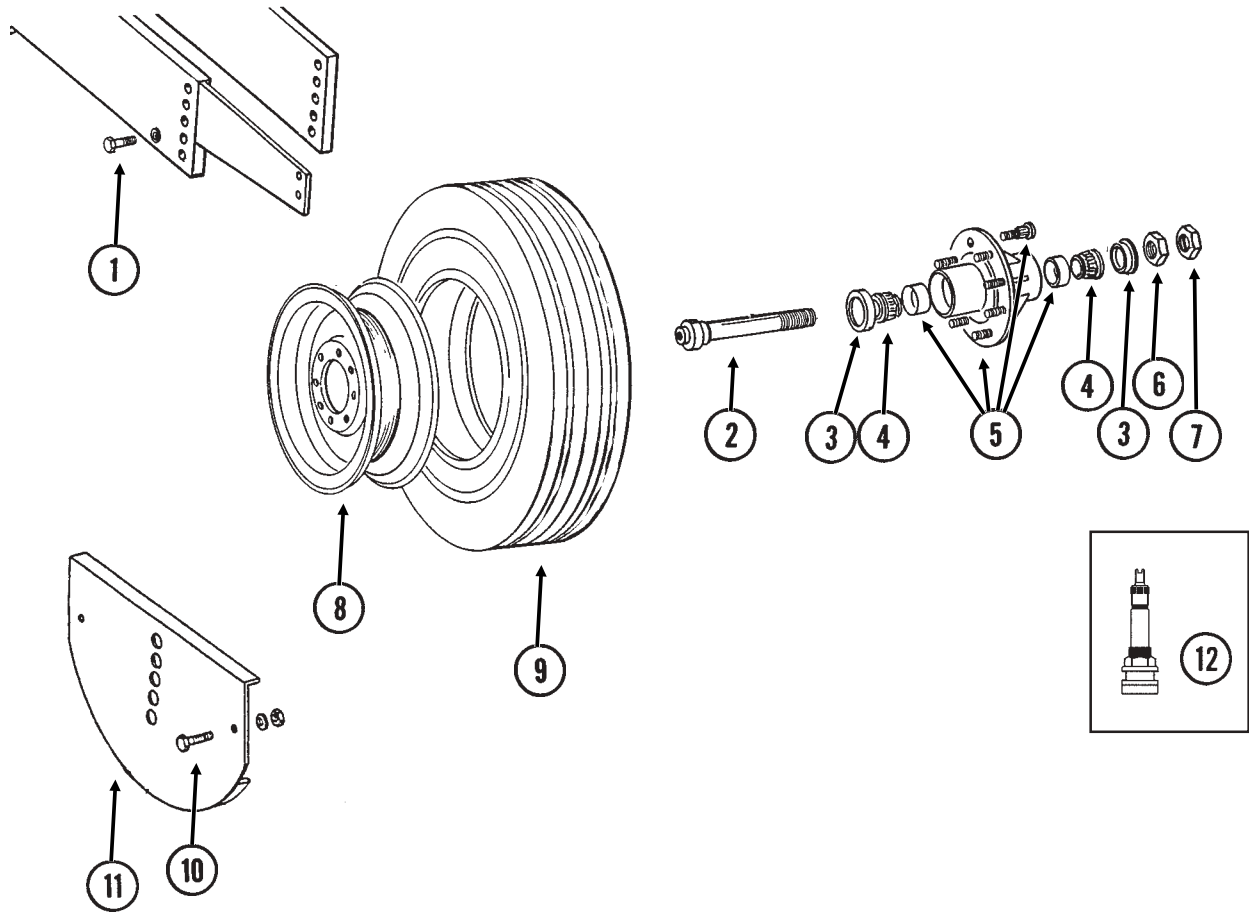


AXLE ASSEMBLY

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GD2558	1	Lynch Pin, 1/4"
2.	G10802	6	Hex Head Cap Screw, 3/4"-10 x 2 3/4"
	G10028	-	Hex Head Cap Screw, 3/4"-10 x 3"
	G10231	6	Lock Washer, 3/4"
	G10105	6	Hex Nut, 3/4"-10
3.	GA7098	1	Manual Safety Lockup W/Detent Pin
	GA7022	1	Detent Pin W/Chain
4.	GA7048	1	Hose Support/Junction
5.	GD8276	1	Pin
	G10237	1	Lock Washer, 7/16"
	G10100	1	Hex Nut, 7/16"-14
6.	GA7120	1	Cable, 8 Row 36"/38" And 12 Row 36"/38"
	GA6608	-	Cable Assembly, 12 Row 30" And 16 Row 30"
7.	G10228	2	Lock Washer, 1/2"
	G10102	2	Hex Nut, 1/2"-13
8.	G306-08	2	Lock Nut, 3/4"-16
	G306-10	2	Lock Nut, 7/8"-14
9.	GD10092	1	Pin, 1 1/4" x 5 1/4"
	G10226	4	Washer, 1 1/4" SAE
	G10049	1	Hex Head Cap Screw, 3/8"-16 x 2 1/2"
	G10108	1	Lock Nut, 3/8"-16
10.		-	See "Rotation Cylinder", Page P72
11.	G10437	4	Hex Head Cap Screw, 3/4"-8 x 2 1/2", Grade 8, "Y" Hitch
	G10810	4	Hex Head Cap Screw, 3/4"-10 x 3 1/2", Grade 8, "T" Hitch
	GD2169	4	Special Washer, 25/32" I.D. x 1 1/4" O.D., Hardened
	G10436	4	Hex Nut, 3/4"-10
12.	GD10064	1	Pin, 1 1/4" x 5 1/4", 8/12/16 Row
	G10460	2	Cotter Pin, 1/4" x 2"
13.	GA8062	-	Axle W/Stub Axle, 12 Row 30" And 16 Row 30"
	GA9883	-	Stub Axle, Narrow Row
	GA8063	-	Axle W/Stub Axle, 8 Row 36"/38" And 12 Row 36"/38"
	GA9882	-	Stub Axle, Wide Row
14.	GD12543	-	Scraper
15.	G10636	-	Carriage Bolt, 1/2"-13 x 1 1/2"
	G10216	-	Washer, 1/2" USS
	G10228	-	Lock Washer, 1/2"
	G10102	-	Hex Nut, 1/2"-13
16.	G10808	6	Hex Head Cap Screw, 1"-8 x 10", Grade 8, "Y" Hitch
	G10811	6	Hex Head Cap Screw, 1"-8 x 11", Grade 8, "T" Hitch
	GD10231	6	Special Washer, 1 1/16" I.D. x 2" O.D.
	G10647	6	Hex Nut, 1"-8, Grade 8
17.	G10636	-	Carriage Bolt, 1/2"-13 x 1 1/2"
	G10228	-	Lock Washer, 1/2"
	G10102	-	Hex Nut, 1/2"-13

TRANSPORT WHEELS/ROCK GUARDS

HTA032/HTA040/HTA043/HTA004(TWL141c)



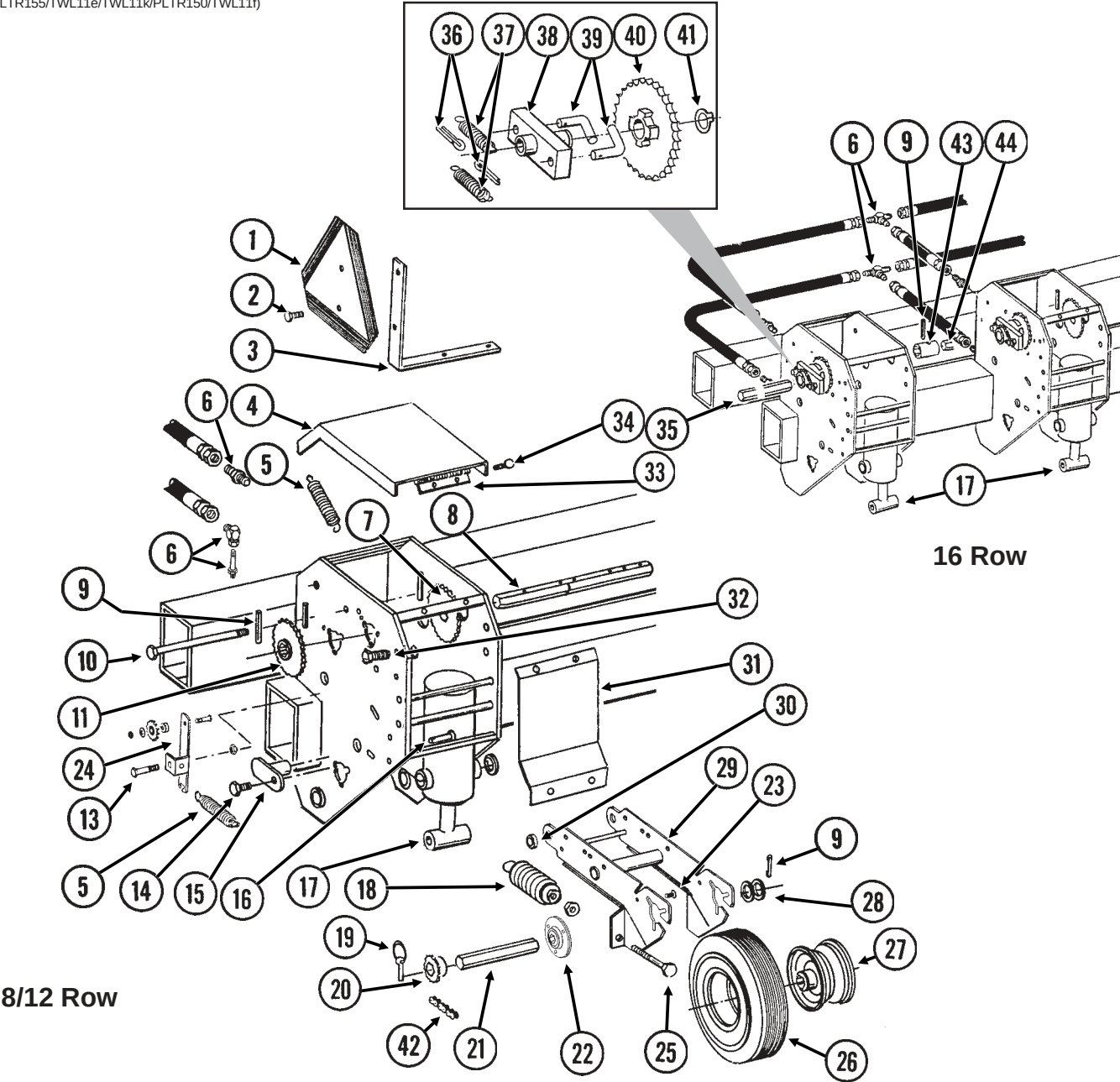
TRANSPORT WHEELS/ROCK GUARDS

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	G10448	2	Hex Head Cap Screw, $\frac{7}{8}$ "-9 x 2 $\frac{1}{2}$ ", Grade 8
	G10330	2	Lock Washer, $\frac{7}{8}$ "
2.	GA4727	1	Spindle W/Retaining Ring, 1 $\frac{3}{4}$ "
	G10913	-	External Retaining Ring, 2 $\frac{1}{2}$ "
3.	GA4722	2	Seal
4.	GA4723	2	Bearing
5.	GA4729	1	Hub W/Cups, Bolts, Nuts And Grease Fitting, 8 Bolt, 1 $\frac{3}{4}$ " Bore
	G10640	-	Grease Fitting, $\frac{1}{4}$ "-28
	GD7079	-	Cup
	GR0528	-	Lug Bolt, $\frac{5}{8}$ "-12 x 2 $\frac{1}{4}$ "
	GR0531	-	Lug Nut, $\frac{5}{8}$ "-18 UNF
6.	GD7089	1	Special Nut, 1 $\frac{3}{4}$ "-12 UNF
7.	GD7864	1	Special Hex Nut, 1 $\frac{3}{4}$ "-12 UNF
8.	GA9544	-	Rim, 5.5" x 22.5", 8/12/16 Row
9.	GD13409	-	Tire, 255-70R 22.5" W/O Center Rib, Tubeless (Specify Brand*)
10.	G10037	-	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{1}{4}$ "
	G10228	-	Lock Washer, $\frac{1}{2}$ "
	G10102	-	Hex Nut, $\frac{1}{2}$ "-13
11.	GA5716	-	Rock Guard (Optional)
12.	GA7434	-	Valve Stem
A.	GA9545	-	Tire And Rim Assembly (Items 8, 9 And 12) (Specify Brand*)

* Specific brand requests will be supplied only as available from current KINZE® Repair Parts stock. If a specific brand requested is not in stock, the brand available will be supplied.

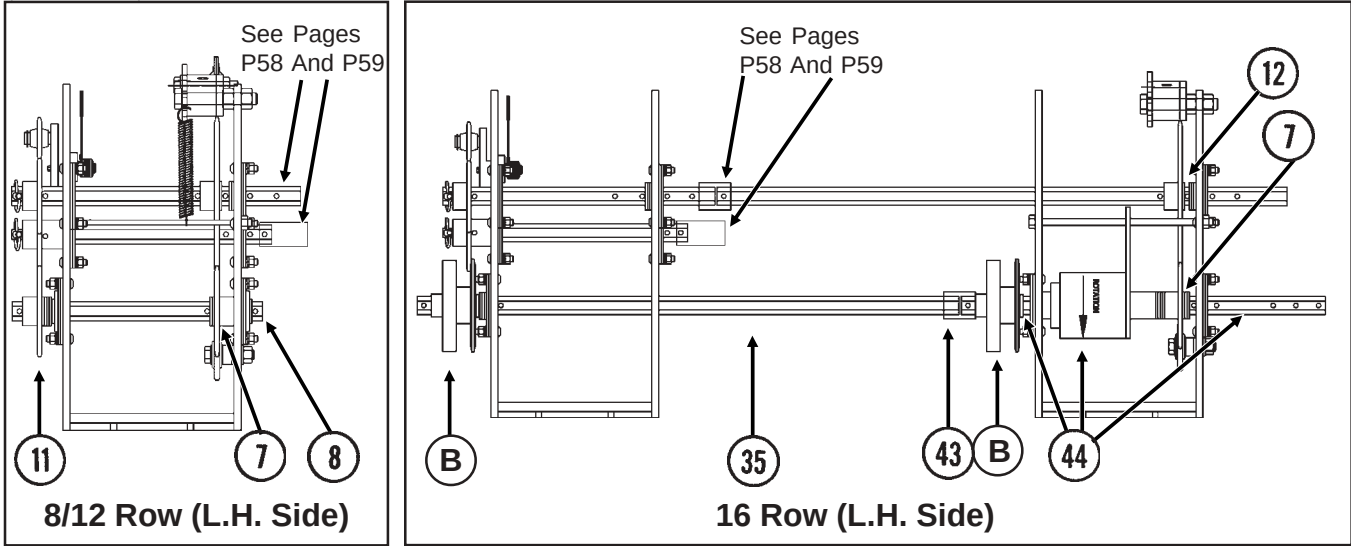
CONTACT DRIVE WHEEL AND DRIVE SHAFT(S)

(PLTR155/TWL11e/TWL11k/PLTR150/TWL11f)



CONTACT DRIVE WHEEL AND DRIVE SHAFT(S)

(TWL157/TWL156)



ITEM	PART NO.	QTY.	DESCRIPTION
(Per Assy.)			
1.	GD2199	1	SMV Sign
2.	G10022	2	Hex Head Cap Screw, 1/4"-20 x 1/2"
	G10227	2	Lock Washer, 1/4"
	G10103	2	Hex Nut, 1/4"-20
3.	GD9969	1	Bracket
4.	GD10298	1	Cover
5.	GD5857	2	Spring
6.		-	See "Hydraulic Hoses And Fittings On Planter Frame", Pages P88 And P89
7.		-	See "Inner Module Drive", Page P59
8.	GD10543	1	Hex Shaft, 7/8" x 13", See "Point Row Clutch", Pages P60-P63 For 8 And 12 Row Machines Equipped With Point Row Clutches
9.	G10602	4	Spring Pin, 1/4" x 1 1/2"
10.	G10595	-	Hex Head Cap Screw, 3/8"-16 x 10" (Used To Secure Point Row Clutch)
	G10108	-	Lock Nut, 3/8"-16
11.	GA5114	1	Sprocket, 30 Tooth
12.	G10233	2	Machine Bushing, 1", 10 Gauge
	G10345	2	Machine Bushing, 1", 14 Gauge
13.	G10036	1	Hex Head Cap Screw, 5/8"-11 x 4"
	G10104	1	Hex Nut, 5/8"-11
	G10107	1	Lock Nut, 5/8"-11
14.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10216	2	Washer, 1/2" USS
	G10228	2	Lock Washer, 1/2"
	G10102	2	Hex Nut, 1/2"-13
15.	GA5121	2	Pin, 2 1/8"
16.	G10870	1	Clevis Pin, 3/8" x 1"
	G10860	1	Retaining Ring, 3/8"
17.		-	See "Wing Lift Cylinder", Page P73
18.	GA2068	2	Spring W/Plug
19.	GD2558	1	Lynch Pin, 1/4"
20.	GA5114	1	Sprocket, 30 Tooth
	GA5105	-	Sprocket, 15 Tooth, Half Rate (2 To 1) Drive

(Continued On Following Page)

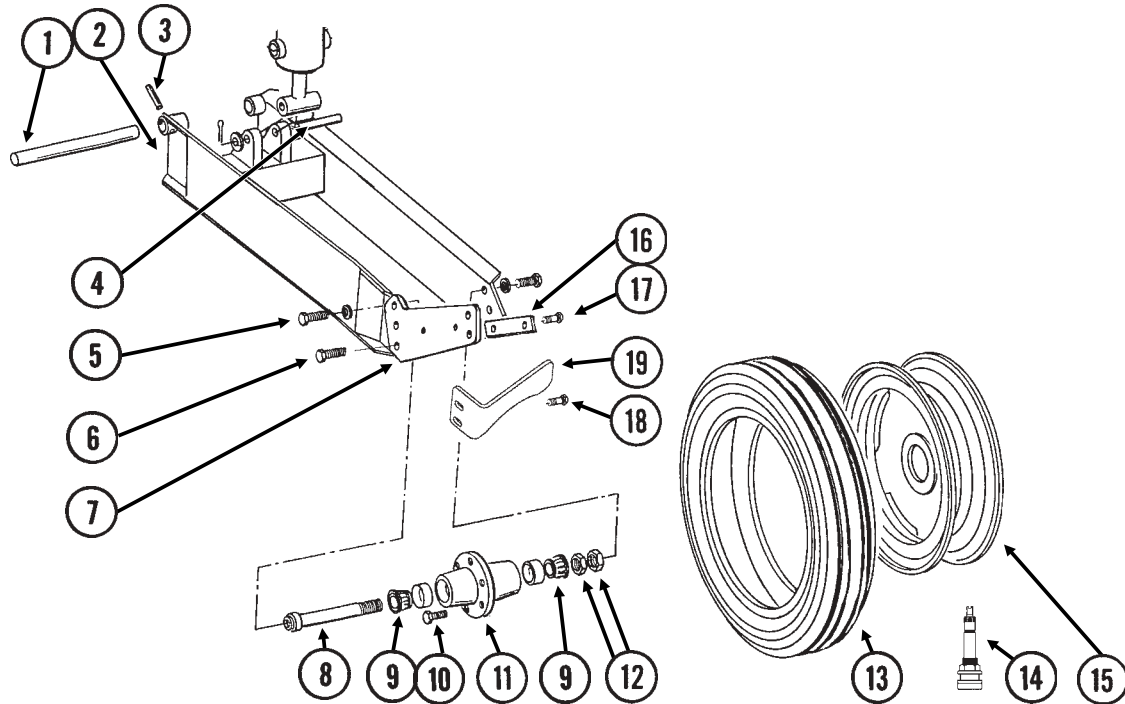
CONTACT DRIVE WHEEL AND DRIVE SHAFT(S)

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
(Continued)			
21.	GD6775	1	Hex Shaft, $\frac{7}{8}$ " x 11 $\frac{3}{4}$ " (2 Holes)
22.	GA9846	-	Flanged Bearing, $\frac{7}{8}$ " Hex Bore
23.	G10303	6	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10232	6	Lock Washer, $\frac{5}{16}$ "
	G10106	6	Hex Nut, $\frac{5}{16}$ "-18
24.	GA9553	1	Idler W/Sprocket And Hardware, L.H. Side Of Planter
	GA9554	-	Idler W/Sprocket And Hardware, R.H. Side Of Planter
	GA7154	-	Sprocket W/Bearing, 19 Tooth
	G10017	-	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{1}{2}$ "
	G10128	-	Machine Bushing, $\frac{1}{2}$ ", 14 Gauge
	G10501	-	Hex Jam Nut, $\frac{1}{2}$ "-13, Grade 2
25.	G10890	2	Hex Head Adjusting Bolt, $\frac{1}{2}$ "-13 x 4", Grade 2
	G10501	2	Hex Jam Nut, $\frac{1}{2}$ "-13, Grade 2
26.	GD4700	1	Tire, 4.80" x 8", 4 Ply, Rib Implement (Specify Brand*)
	GD4701	-	Valve Stem
27.	GA3553	1	Rim, 3.75" x 8"
28.	G10233	-	Machine Bushing, 1", 10 Gauge
29.	GA7372	1	Wheel Arm
30.	GB0218	2	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
31.	GD6895	1	Shield
32.	G10005	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{3}{4}$ "
	G10235	4	Machine Bushing, $\frac{7}{8}$ ", 14 Gauge
	GD7805	2	Special Washer, $\frac{5}{8}$ ", Hardened
	G10205	2	Washer, $\frac{5}{8}$ " SAE
	G10107	2	Lock Nut, $\frac{5}{8}$ "-11
33.	GD5789	1	Hinge, Female
	GD5790	1	Hinge W/Pins, Male
34.	G10064	6	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x 1"
	G10209	4	Washer, $\frac{1}{4}$ " USS
	G10227	6	Lock Washer, $\frac{1}{4}$ "
	G10103	6	Hex Nut, $\frac{1}{4}$ "-20
35.	GD10099	-	Hex Shaft, $\frac{7}{8}$ " x 29 $\frac{5}{8}$ "
36.	G10464	2	Cotter Pin, $\frac{3}{16}$ " x 1"
37.	GD1256	2	Spring
38.	GA0378	1	Block And Hub Assembly
39.	GD1255	2	L-Pin
40.	GA5165	1	Sprocket, 30 Tooth
41.	G10430	1	External Retaining Ring, 1 $\frac{1}{4}$ "
42.	G3310-110	1	Chain, No. 40, 110 Pitch Including Connector Link, Half Rate (2 To 1) Drive
	G3310-118	-	Chain, No. 40, 118 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
43.	GD5212	1	Coupler, 1 $\frac{3}{4}$ ", 16 Row Only
44.		-	See "Point Row Clutch", Pages P60-P63
A.	GA3552	-	Tire And Rim Assembly (Items 26 And 27) (Specify Brand*)
B.	GA5164	-	Ratchet/Sprocket Assembly, L.H. Side Of Planter (Items 36-41)
	GA9843	-	Ratchet/Sprocket Assembly, R.H. Side Of Planter (Items 36-41)
C.	G1K324	-	Contact Wheel Arm Replacement Kit (Items 9, 21-23, 25, 28 And 29)

* Specific brand requests will be supplied only as available from current KINZE® Repair Parts stock. If a specific brand requested is not in stock, the brand available will be supplied. Different brand tires may have different diameters. Change in tire brand may affect rates. Field checks are recommended after any change in contact tires.

GROUND DRIVE WHEEL

PTD057(TWL142c)

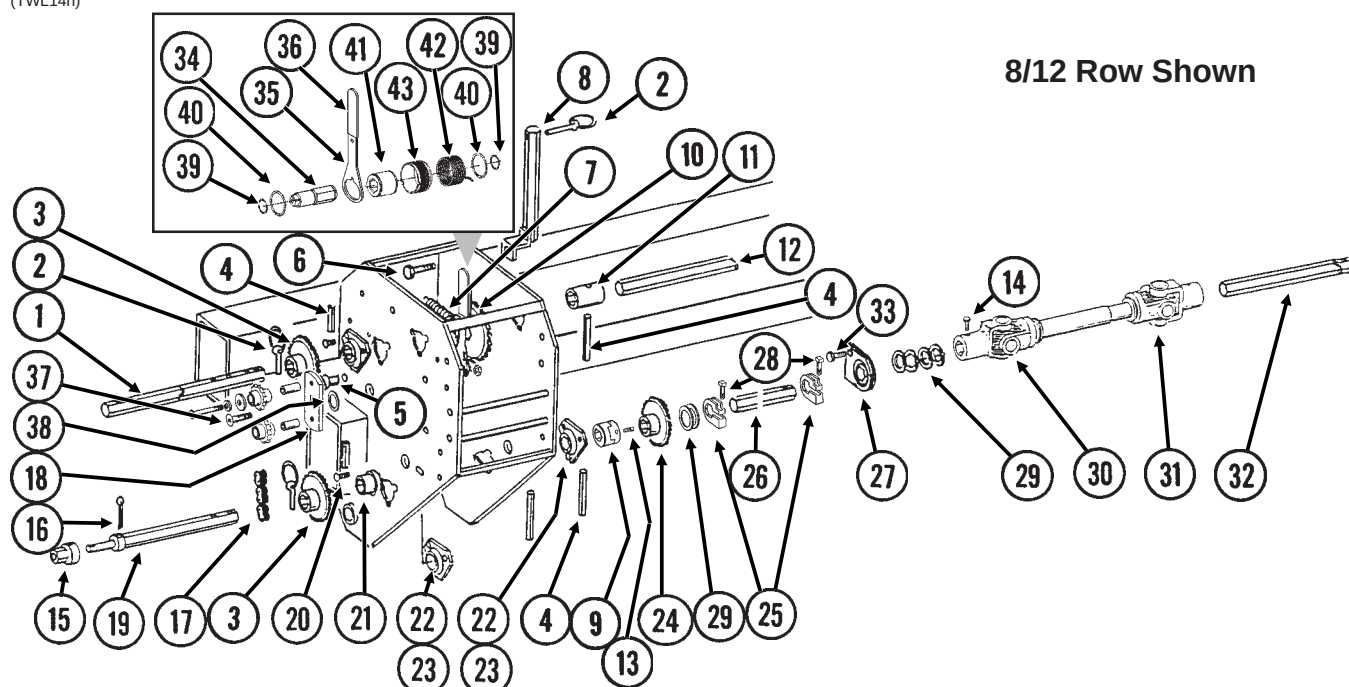


ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	GD11695	-	Pin, 1 1/4" x 13 1/4"
2.	GA8677	1	Wheel Module
3.	G10610	-	Spring Pin, 3/8" x 2"
4.	GD5841	1	Pin, 1 1/4" x 5 5/8"
	G10226	2	Washer, 1 1/4" SAE
	G10460	2	Cotter Pin, 1/4" x 2"
5.	G10026	2	Hex Head Cap Screw, 3/4"-10 x 2"
	G10231	2	Lock Washer, 3/4"
6.	G10026	2	Hex Head Cap Screw, 3/4"-10 x 2"
	G10231	2	Lock Washer, 3/4"
	G10105	2	Hex Nut, 3/4"-10
7.	GD10128	1	Scraper Arm
8.	GA4376	1	Spindle W/Round External Retaining Ring, 10"
	GD11490	-	Round External Retaining Ring
9.	GA0895	2	Bearing
10.	GR0270	6	Lug Bolt, 9/16"-18
11.	GA2148	1	Hub W/Cups, 6 Bolt
	GR0434	-	Cup
12.	G11081	2	Hex Jam Nut, 1 1/2"-12, Grade 2
13.	GD13401	1	Tire, 7.50" x 20", 8 Ply, Tubeless W/O Center Rib (Specify Brand*)
14.	GA7434	-	Valve Stem
15.	GA2908	1	Rim, 5.5" x 20"
16.	GD10144	1	Bar Clamp
17.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10228	2	Lock Washer, 1/2"
	G10102	2	Hex Nut, 1/2"-13
18.	G10636	2	Carriage Bolt, 1/2"-13 x 1 1/2"
	G10216	2	Washer, 1/2" USS
	G10228	2	Lock Washer, 1/2"
	G10102	2	Hex Nut, 1/2"-13
19.	GD12543	1	Scraper
A.	GA7997	-	Tire And Rim Assembly (Specify Brand*)(Items 13-15)
B.	GA4377	-	Hub And Spindle Assembly (Items 8, 9, 11 And 12)

* Specific brand requests will be supplied only as available from current KINZE® Repair Parts stock. If a specific brand requested is not in stock, the brand available will be supplied.

SEED RATE TRANSMISSION AND ROW UNIT DRILL SHAFTS

(TWL14n)



ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
1.	GD6780	1	Shaft, 7/8" x 15"
2.	GD2558	3	Lynch Pin, 1/4"
3.	GA5106	1	Sprocket, 17 Tooth
	GA5107	1	Sprocket, 19 Tooth
	GA5108	2	Sprocket, 23 Tooth
	GA5109	1	Sprocket, 24 Tooth
	GA5110	1	Sprocket, 25 Tooth
	GA5111	1	Sprocket, 26 Tooth
	GA5112	1	Sprocket, 27 Tooth
	GA5113	1	Sprocket, 28 Tooth
4.	G10602	-	Spring Pin, 1/4" x 1 1/2"
5.	G10870	1	Clevis Pin, 3/8" x 1"
	G10860	1	Retaining Ring, 3/8"
6.	G10016	1	Hex Head Cap Screw, 1/2"-13 x 2"
	GD10356	1	Bushing, 3/4" Long
	G10228	1	Lock Washer, 1/2"
	G10527	2	Lock Washer, 1/2", Internal/External
	G10102	1	Hex Nut, 1/2"-13
7.	GD5857	1	Spring
8.	GA4630	1	Sprocket Storage Rod
9.	GB0287	2	Coupler
10.		-	See "Inner Module Drive", Page P59
11.	GD5212	1	Coupler, 1 3/4", 16 Row Only
12.	GD10100	1	Hex Shaft, 7/8" x 31 3/8", 16 Row Only
13.	G10131	4	Square Head Set Screw, 5/16"-18 x 3/4"
14.	G10688	-	Square Head Set Screw, 3/8"-16 x 5/8"
15.	GD7127	1	Shear Coupler
16.	G10462	-	Cotter Pin, 3/16" x 2"
17.	G3310-80	1	Chain, No. 40, 80 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
18.	GA7336	1	Idler W/Bolt-On Sprockets
	GD7426	-	Sprocket, 12 Tooth
	G10047	-	Hex Head Cap Screw, 3/8"-16 x 1 3/4"
	GD1026	-	Sleeve, 1 3/16" Long
	G10210	-	Washer, 3/8" USS
	G10229	-	Lock Washer, 3/8"

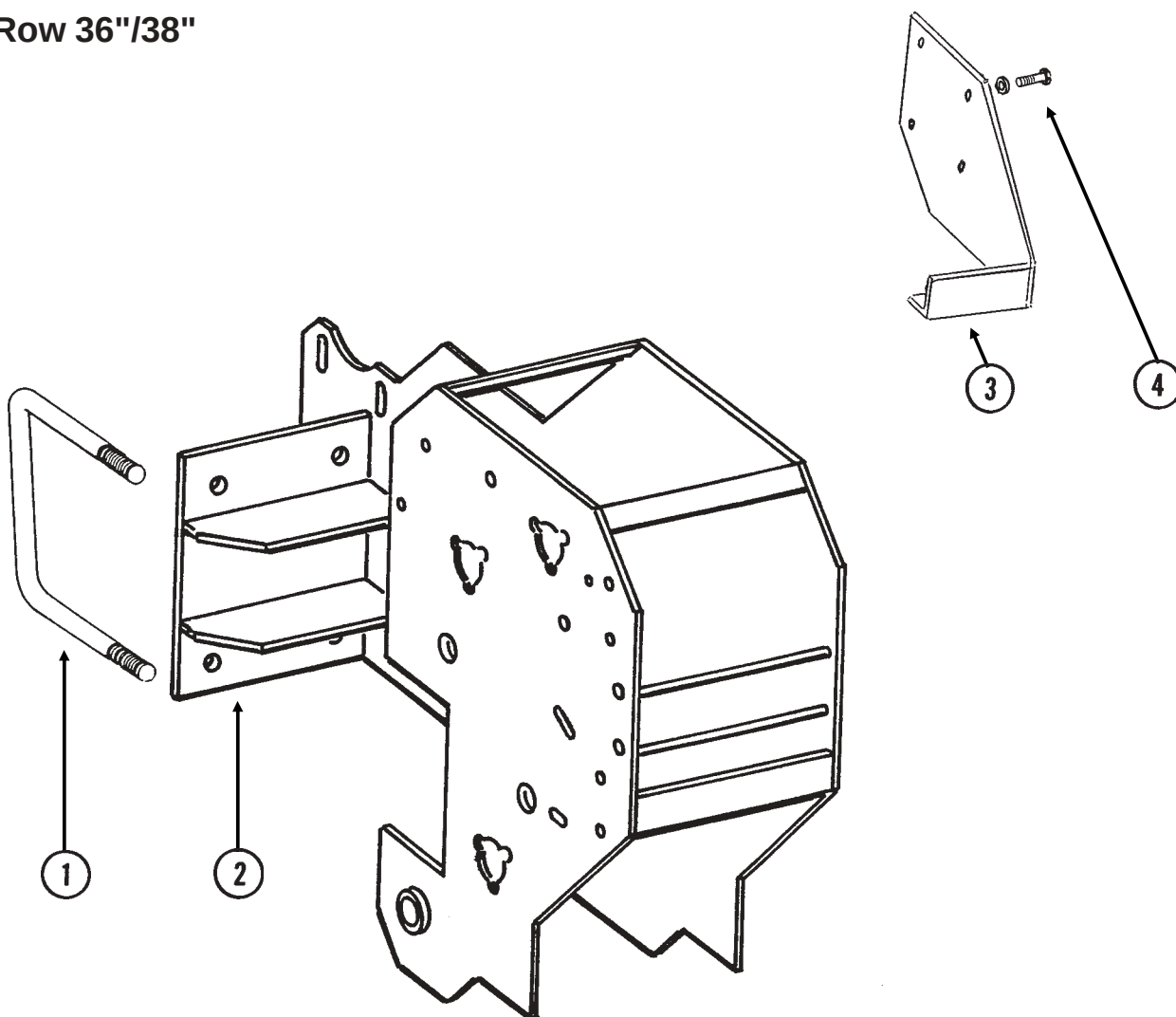
SEED RATE TRANSMISSION AND ROW UNIT DRILL SHAFTS

ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
19.	GD7612	1	Shaft, $\frac{7}{8}$ " x 13 $\frac{1}{2}$ "
20.	G10303	-	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10232	-	Lock Washer, $\frac{5}{16}$ "
	G10106	-	Hex Nut, $\frac{5}{16}$ "-18
21.	GA5548	1	Special Bearing
22.	G3400-01	-	Flangette
23.	G2100-03	-	Bearing, $\frac{7}{8}$ " Hex Bore, Spherical
24.	GA5107	1	Sprocket, 19 Tooth, Interplant® Package Drive
25.	GD11045	-	Lock Clamp
26.	GD0914-58.5	2	Hex Shaft, $\frac{7}{8}$ " x 58 $\frac{1}{2}$ " (No Holes), Wing, 8 Row 36"/38"
	GD0914-106.5	-	Hex Shaft, $\frac{7}{8}$ " x 106 $\frac{1}{2}$ " (No Holes), Wing, 12 Row 30"
	GD0914-134.5	-	Hex Shaft, $\frac{7}{8}$ " x 134 $\frac{1}{2}$ " (No Holes), Wing, 12 Row 36"/38"
	GD0914-166.75	-	Hex Shaft, $\frac{7}{8}$ " x 166 $\frac{3}{4}$ " (No Holes), Wing, 16 Row 30"
27.	GA2180	-	Hanger Bearing, $\frac{7}{8}$ " Hex Bore
28.	G10130	-	Square Head Machine Bolt, $\frac{5}{16}$ "-18 x 1 $\frac{3}{4}$ "
	G10923	-	Flange Nut, $\frac{5}{16}$ "-18, No Serration
29.	G10233	-	Machine Bushing, 1", 10 Gauge
30.	GA7053	1	U-Joint W/Grease Fitting, Female, 18 $\frac{1}{8}$ " Long, 8 Row 36"/38" And 12 Row 36"/38"
	GA7052	-	U-Joint W/Grease Fitting, Female, 10 $\frac{1}{4}$ " Long, 12 Row 30" And 16 Row 30"
	GR1557	-	Grease Fitting, 45°, Metric
	GR1298	-	Inboard Yoke And Outer Profile (18 $\frac{1}{4}$ " U-Joint)
	GR1297	-	Inboard Yoke And Outer Profile (10 $\frac{1}{4}$ " U-Joint)
	GR1294	-	Cross And Bearing Kit
	GR1293	-	Yoke, $\frac{7}{8}$ " Hex
31.	GA7051	-	U-Joint, W/Grease Fitting, Male, 12 $\frac{1}{4}$ " Long
	GR1557	-	Grease Fitting, 45°, Metric
	GR1296	-	Inner Profile
	GR1295	-	Inboard Yoke
	GR1301	-	Spring Pin, 8mm x 50mm
	GR1294	-	Cross And Bearing Kit
	GR1293	-	Yoke, $\frac{7}{8}$ " Hex
32.	GD0914-53	1	Hex Shaft, $\frac{7}{8}$ " x 53" (No Holes), R.H. Main Frame, 8 Row 36"/38" And 12 Row 36"/38"
	GD0914-44	1	Hex Shaft, $\frac{7}{8}$ " x 44" (No Holes), L.H. Main Frame, 8 Row 36"/38" And 12 Row 36"/38"
	GD0914-45	1	Hex Shaft, $\frac{7}{8}$ " x 45" (No Holes), R.H. Main Frame, 12 Row 30" And 16 Row 30"
	GD0914-35	-	Hex Shaft, $\frac{7}{8}$ " x 35" (No Holes), L.H. Main Frame, 12 Row 30" And 16 Row 30"
33.	G10004	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10229	2	Lock Washer, $\frac{3}{8}$ "
	G10101	-	Hex Nut, $\frac{3}{8}$ "-16
34.	GD14426	1	Tightener Shaft, 3 $\frac{3}{8}$ "
35.	GD14431	1	Handle
36.	G11078	1	Vinyl Cap
37.	G11100	1	Hex Socket Button Head Screw, $\frac{1}{4}$ "-20 x $\frac{1}{2}$ ", Grade 8
	G10227	1	Lock Washer, $\frac{1}{4}$ "
	G10209	1	Washer, $\frac{1}{4}$ " USS
38.	G10235	1	Machine Bushing, $\frac{7}{8}$ ", 14 Gauge
39.	G10496	2	External Inverted Snap Ring, 1 $\frac{1}{2}$ "
40.	G11075	2	Internal Inverted Snap Ring, $\frac{7}{8}$ "
41.	GD14432	1	Sleeve, 1 $\frac{1}{4}$ "
42.	GD14414	1	Torsion Spring, R.H. (Used On L.H. Wrap Spring Wrench)(Shown)
	GD14413	-	Torsion Spring, L.H. (Used On R.H. Wrap Spring Wrench)
43.	GD14429	-	Release Collar, Silver, L.H. (Shown)
	GD14430	1	Release Collar, Gold, R.H.
A.	G1K269	-	Lock Clamp Kit (Items 25 And 28)
B.	G1K381	-	Wrap Spring Wrench Replacement Kit, Silver Collar, L.H. (Items 34-43) (Shown)
	G1K380	1	Wrap Spring Wrench Replacement Kit, Gold Collar, R.H. (Items 34-43)

BOLT-ON WHEEL MODULE/TRANSPORT LATCH CATCH

PFA072(TWL15a)

8 Row 36"/38"
12 Row 36"/38"

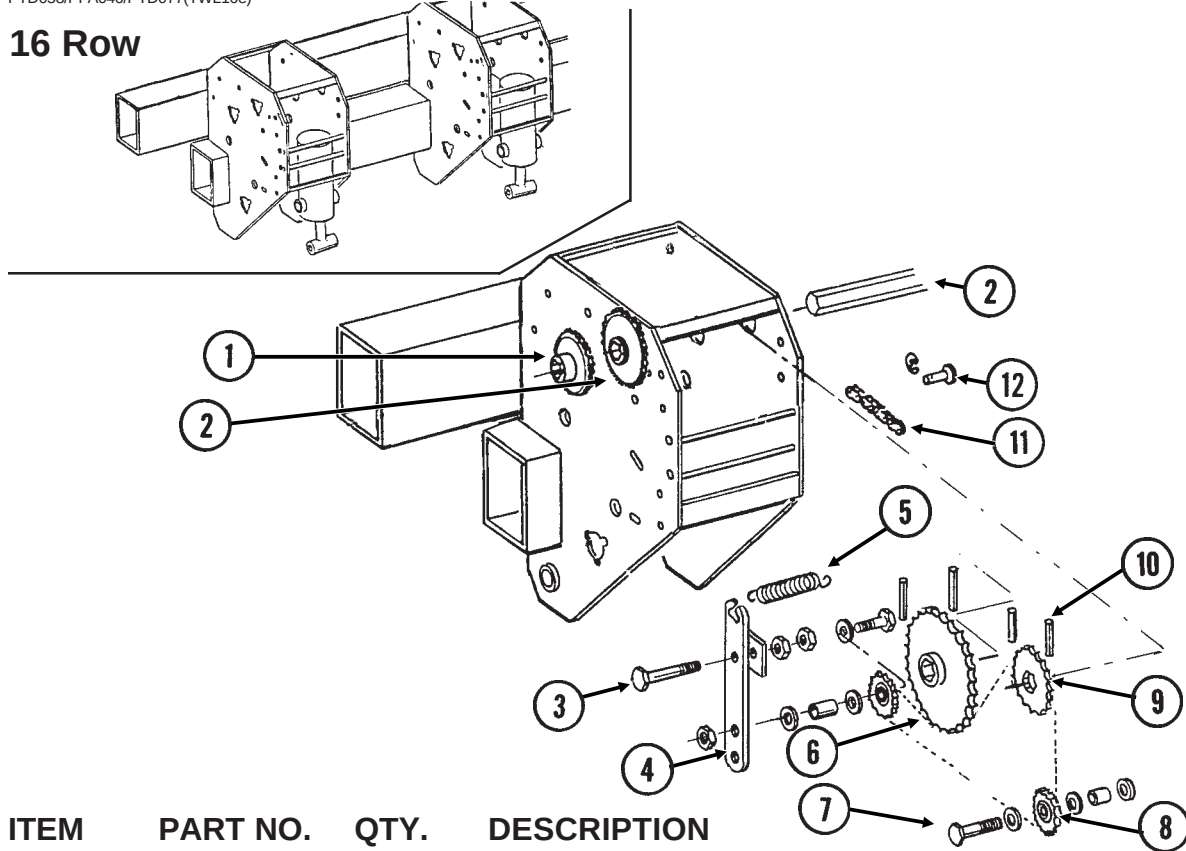


ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
1.	GD1747	5	U-Bolt, 5" x 7" x 3/4"-10
	G10231	10	Lock Washer, 3/4"
	G10105	10	Hex Nut, 3/4"-10
2.	GA8071	1	Wheel Tower W/Grease Fitting, L.H.
	GA8070	-	Wheel Tower W/Grease Fitting, R.H.
	G10640	-	Grease Fitting, 1/4"-28
3.	GA7108	1	Transport Latch Catch
4.	G10007	4	Hex Head Cap Screw, 5/8"-11 x 1 1/2"
	G10230	4	Lock Washer, 5/8"

INNER MODULE DRIVE

PTD058/PFA046/PTD077(TWL16e)

16 Row

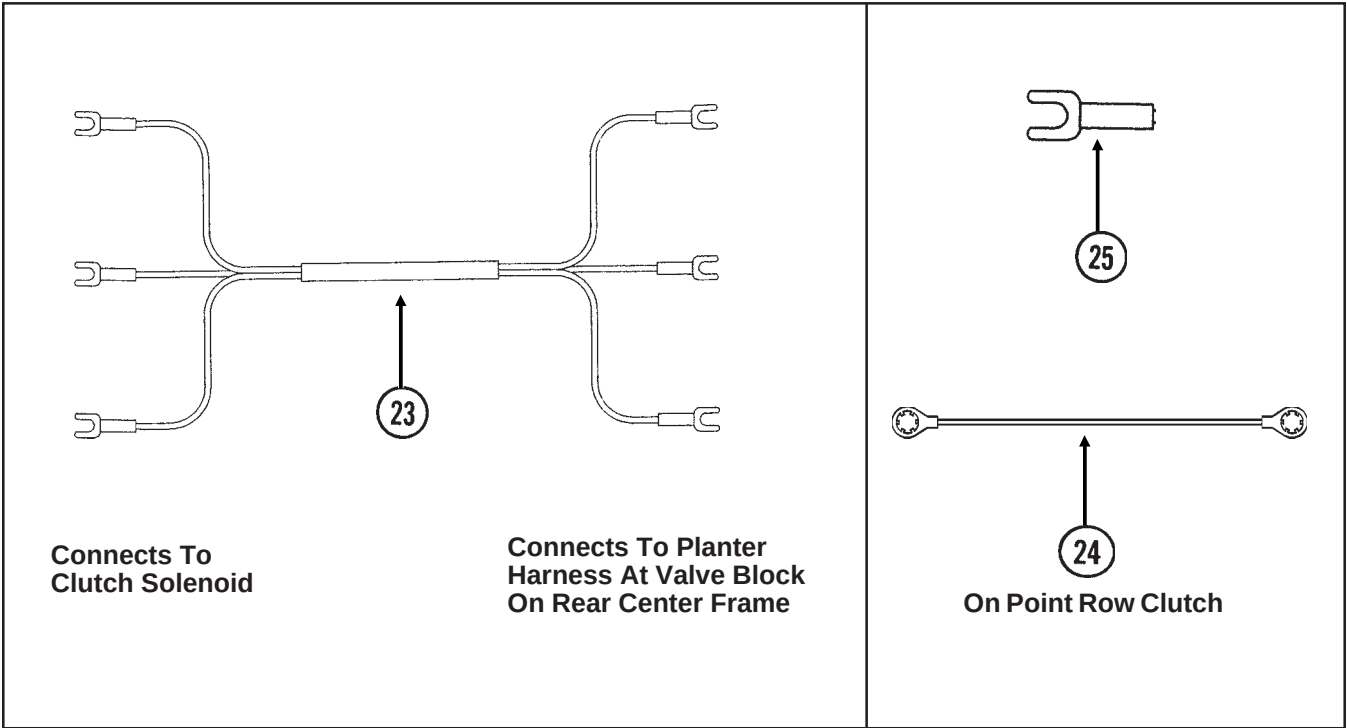
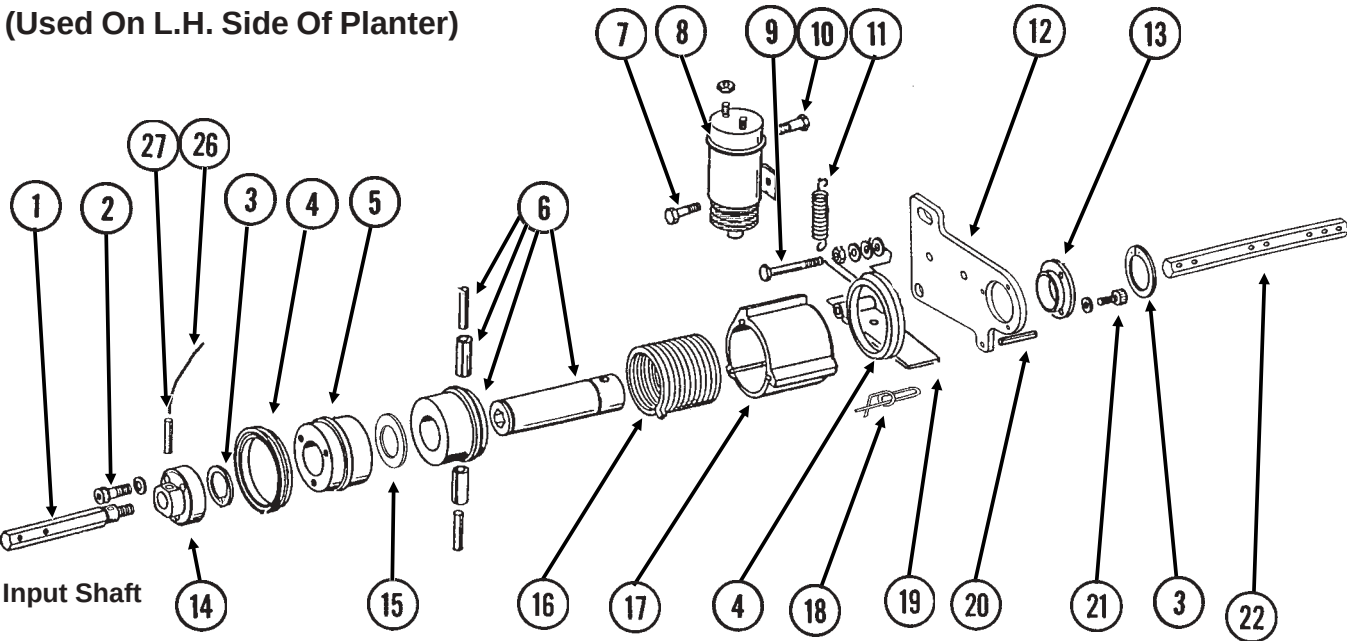


ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Module)	
1.		-	See "Seed Rate Transmission And Row Unit Drill Shafts", Pages P56 And P57
2.		-	See "Contact Drive Wheel And Drive Shaft(s)", Pages P52-P54
3.	G10743	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x $3\frac{3}{4}$ "
	G10918	3	Machine Bushing, $\frac{5}{8}$ ", 14 Gauge (As Required)
	G10104	1	Hex Nut, $\frac{5}{8}$ "-11
	G10107	1	Lock Nut, $\frac{5}{8}$ "-11
4.	GA9558	1	Idler W/Sprocket And Hardware, L.H. Side Of Planter
	GA9557	-	Idler W/Sprocket And Hardware, R.H. Side Of Planter
	GA7154	-	Sprocket W/Bearing, 18 Tooth
	G10038	-	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 3"
	GD10007	-	Spacer, 1 $\frac{1}{8}$ "
	G10206	-	Washer, $\frac{1}{2}$ " SAE
	G10111	-	Lock Nut, $\frac{1}{2}$ "-13
5.	GD5857	1	Spring
6.	GA5194	1	Sprocket, 50 Tooth
7.	G10581	1	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x $2\frac{1}{4}$ "
	GD7889	1	Bushing, 1" O.D. x $\frac{9}{16}$ " I.D. x $\frac{7}{16}$ " Long
	G10168	2	Machine Bushing, $\frac{1}{2}$ ", 7 Gauge
	G10205	2	Washer, $\frac{5}{8}$ " SAE
	G10111	1	Lock Nut, $\frac{1}{2}$ "-13
8.	GA7154	1	Sprocket W/Bearing, 18 Tooth
9.	GA5113	1	Sprocket, 28 Tooth
10.	G10602	-	Spring Pin, $\frac{1}{4}$ " x 1 $\frac{1}{2}$ "
11.	G3310-100	1	Chain, No. 40, 100 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
12.	G10870	1	Clevis Pin, $\frac{3}{8}$ " x 1"
	G10860	1	Retaining Ring, $\frac{3}{8}$ "

POINT ROW CLUTCH

PRC019(TWL70d/TWL71d/TWL71/TWL18/A10054)

L.H. Point Row Clutch Shown
(Used On L.H. Side Of Planter)



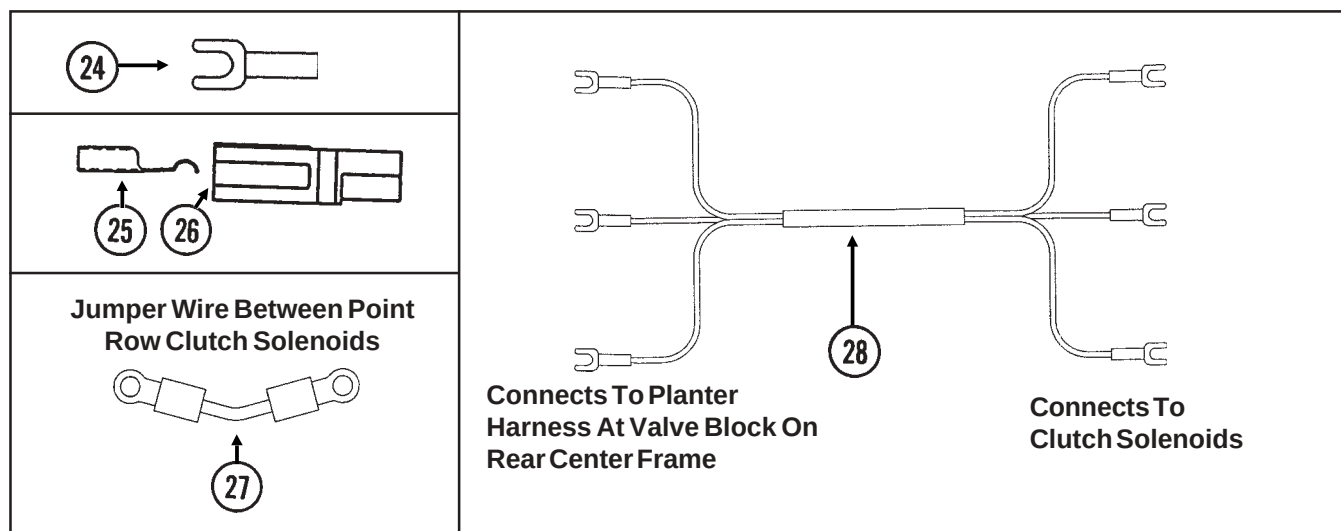
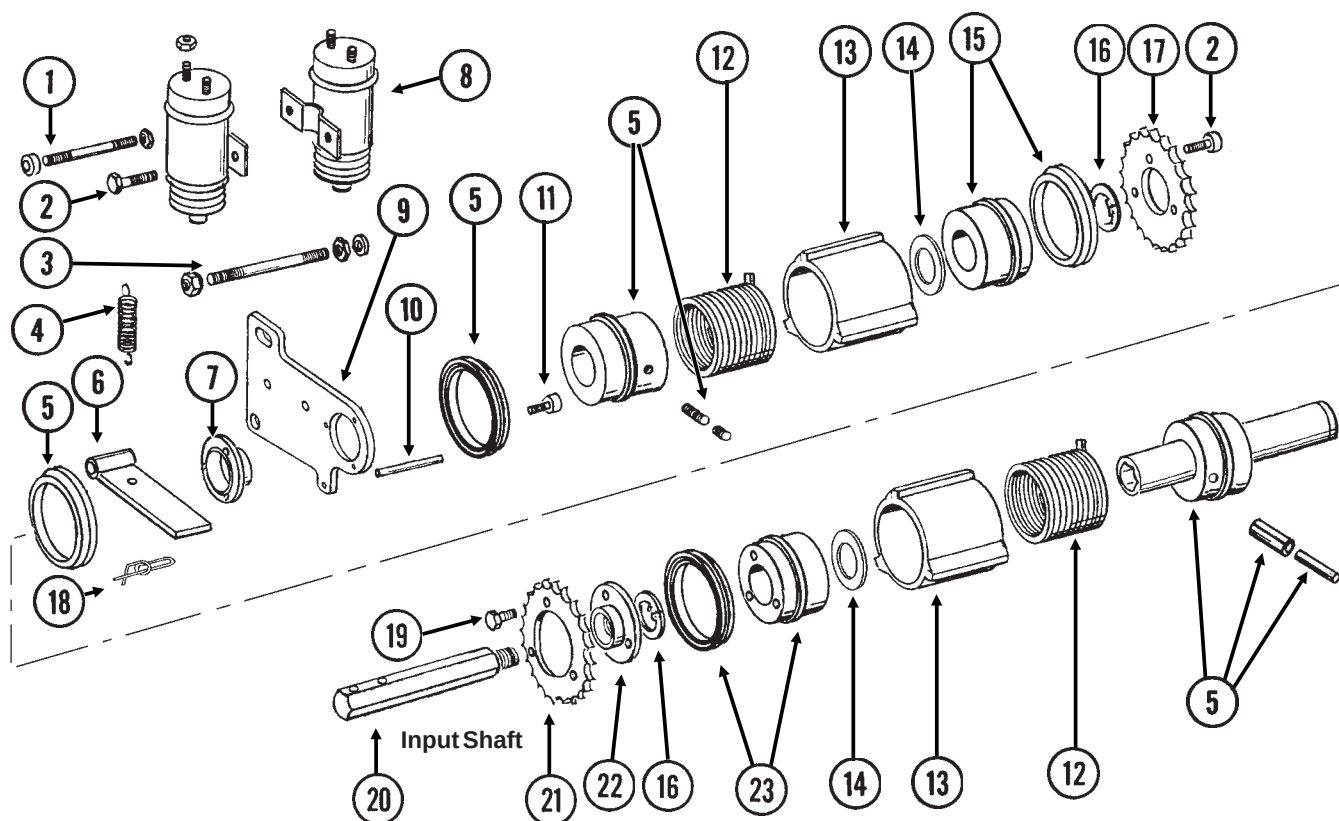
POINT ROW CLUTCH

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	GD10068	1	Input Shaft, R.H. Threads (Shown)
	GD10069	1	Input Shaft, L.H. Threads
2.	G10374	3	Hex Socket Head Screw, 1/4"-20 x 1"
	G10227	3	Lock Washer, 1/4"
3.	G10496	2	External Inverted Snap Ring, 1 1/2"
4.	GD14512	2	V-Ring Seal
5.	GD10104	1	Input Hub
6.	GA7137	1	Hub/Sleeve Assembly W/Spring Pins
	G10765	-	Spring Pin, 1/4" x 1"
	G10804	-	Spring Pin, 5/32" x 7/8"
7.	G10023	1	Hex Head Cap Screw, 1/4"-20 x 3/4"
	G10227	1	Lock Washer, 1/4"
	G10103	1	Hex Nut, 1/4"-20
8.	GA8393	1	Solenoid Complete
	GR1306	1	Snap Ring
	GR1303	1	Spring
	GR1304	1	Boot
	GR1305	1	Plunger
9.	G10049	1	Hex Head Cap Screw, 3/8"-16 x 2 1/2"
	G10101	1	Hex Nut, 3/8"-16
	G10203	1	Washer, 3/8" SAE
	G10229	2	Lock Washer, 3/8"
	G10497	1	Hex Jam Nut, 3/8"-16, Grade 2
10.	G10900	1	Hex Socket Head Cap Screw, 1/4"-20 x 1 3/4", Grade 8
	G10227	1	Lock Washer, 1/4"
	G10103	2	Hex Nut, 1/4"-20
11.	GD10123	1	Spring
12.	GD10103	1	Mounting Plate
13.	GD9667	1	Bushing
14.	GD10070	1	Coupler W/R.H. Threads (Shown)
	GD10071	1	Coupler W/L.H. Threads
15.	GD14513	1	Felt Washer
16.	GD9671	-	Spring, L.H. (Shown)
	GD9672	-	Spring, R.H.
17.	GD10102	1	Stop Collar
18.	GD11120	1	Rue Ring Cotter, 5/16"
19.	GD10510	1	Actuator Arm
20.	G10859	1	Spring Pin, 3/16" x 2 1/4"
21.	G10253	3	Hex Socket Head Screw, No. 10-32 x 1/2"
	G10257	3	Lock Washer, No. 10
22.	GD10543	-	Hex Shaft, 7/8" x 13"
23.	GA9490	1	Wiring Harness, 192", R.H. Side, 8 Row 36"/38"
	GA9479	1	Wiring Harness, 228", L.H. Side, 8 Row 36"/38" And R.H. Side, 12 Row 30"
	GA9480	-	Wiring Harness, 264", L.H. Side, 12 Row 30" And R.H. Side, 12 Row 36"/38"
	GA9489	-	Wiring Harness, 312", L.H. Side, 12 Row 36"/38"
	GA9483	-	Wiring Harness, 252", R.H. Side, 16 Row 30"
	GA9482	-	Wiring Harness, 300", L.H. Side, 16 Row 30"
24.	GA10054	-	Ground Cable, Green
25.	G10996	-	Fork Terminal
26.	GD13524-01	1	Lock Wire, 10", Stainless Steel
27.	G10546	1	Spring Pin, 3/16" x 1 1/4"
A.	GA7110	-	Point Row Clutch Assembly, R.H. (R.H. Side Of Machine) (Items 1-21, 24, 26 And 27)
	GA7111	-	Point Row Clutch Assembly, L.H. (L.H. Side Of Machine) (Items 1-21, 24, 26 And 27)

TWO-SPEED POINT ROW CLUTCH

PRC023(FF47b/A7274/TWL71/TWL18/A10054)

**L.H. Two-Speed Point Row Clutch Shown
(Used On L.H.Side Of Planter)**

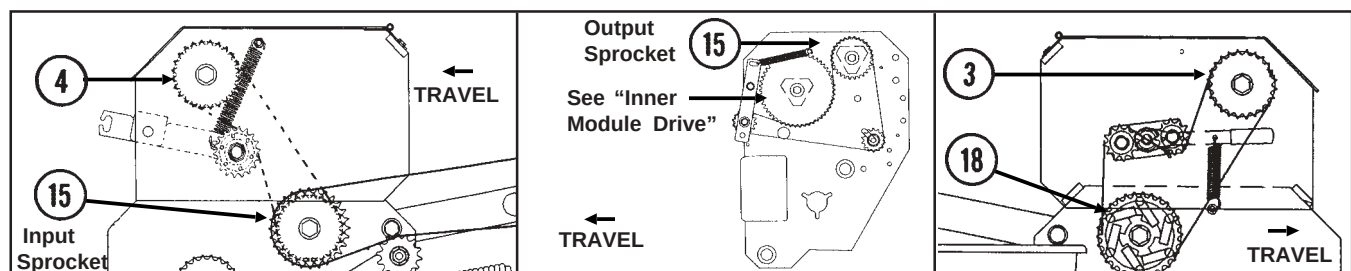
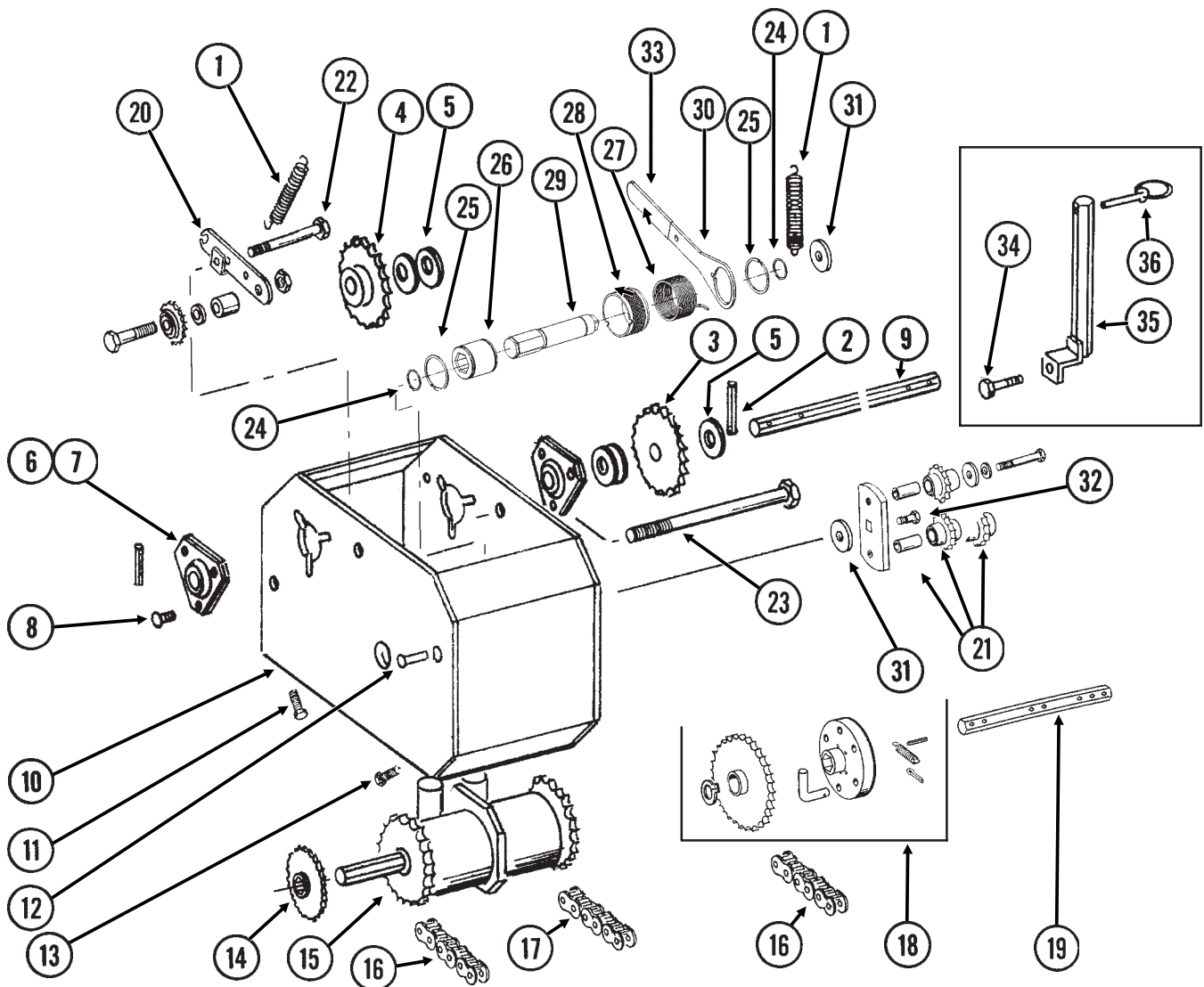


TWO-SPEED POINT ROW CLUTCH

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	GD10635	1	Threaded Rod, 1/4"-20 x 3 1/2"
	G10103	2	Hex Nut, 1/4"-20
	G10227	2	Lock Washer, 1/4"
	GD10282	2	Allen Nut, 1/4"-20
2.	G10023	4	Hex Head Cap Screw, 1/4"-20 x 3/4"
	G10227	4	Lock Washer, 1/4"
	G10103	1	Hex Nut, 1/4"-20
3.	GD10636	1	Threaded Rod, 3/8"-16 x 4 1/4"
	G10108	2	Lock Nut, 3/8"-16
	G10229	2	Lock Washer, 3/8"
	G10101	2	Hex Nut, 3/8"-16
4.	GD10123	2	Spring
5.	GA7463	1	Hub/Sleeve Assembly W/Seals, Sleeve, Pins And Screws
	GD10120	-	Seal
	GD10584	-	Sleeve
	G10873	-	Hex Socket Set Screw, 5/16"-18 x 3/4"
	G10872	-	Hex Socket Set Screw, 5/16"-18 x 1/4"
	G10804	-	Spring Pin, 5/32" x 7/8"
	G10765	-	Spring Pin, 1/4" x 1"
6.	GD10510	2	Actuator Arm
7.	GD10586	1	Bushing
8.	GA8393	2	Solenoid Complete
	GR1306	-	Snap Ring
	GR1303	-	Spring
	GR1304	-	Boot
	GR1305	-	Plunger
9.	GD10103	1	Mounting Plate
10.	G10859	1	Spring Pin, 3/16" x 2 1/4"
11.	G10876	3	Hex Socket Head Screw, No. 10-32 x 1/4"
12.	GD9671	2	Spring, L.H. (Shown)
	GD9672	-	Spring, R.H.
13.	GD10585	2	Stop Collar
14.	GD14513	2	Felt Washer
15.	GA9572	1	Hub W/Seal
	GD10120	-	Seal
16.	G10496	2	External Inverted Snap Ring, 1 1/2"
17.	GD10579	1	Output Sprocket, 28 Tooth
18.	GD11120	2	Rue Ring Cotter, 5/16"
19.	G10374	3	Hex Socket Head Screw, 1/4"-20 x 1"
	GD10588	3	Key
20.	GD10068	1	Input Shaft, R.H. Threads (Shown)
	GD10069	-	Input Shaft, L.H. Threads
21.	GD10578	1	Input Sprocket, 28 Tooth
22.	GD10638	1	Coupler W/R.H. Threads (Shown)
	GD10587	-	Coupler W/L.H. Threads
23.	GA9571	1	Hub W/Seal
	GD10120	-	Seal
24.	G10996	-	Fork Terminal
25.	GD9530	-	Contact
26.	GD9529	-	Housing, Black
	GD12726	-	Housing, Red
27.	GA7274	1	Jumper Wire W/Ring Terminals, 2 3/16"
28.	GA9479	1	Wiring Harness, 228", R.H. And L.H. Sides, 8 Row 36"/38" And R.H. Side, 12 Row 30"
	GA9480	-	Wiring Harness, 264", L.H. Side, 12 Row 30" And R.H. Side 12 Row 36"/38"
	GA9489	-	Wiring Harness, 312", L.H. Side, 12 Row 36"/38"
	GA9483	-	Wiring Harness, 252", R.H. Side, 16 Row 30"
	GA9482	-	Wiring Harness, 300", L.H. Side, 16 Row 30"

TWO-SPEED POINT ROW CLUTCH WHEEL MODULE EXTENSION

(TWL77g/TWL84b/TWL79a/TWL80)



TWO-SPEED POINT ROW CLUTCH WHEEL MODULE EXTENSION

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	GD5857	2	Spring
2.	G10602	3	Spring Pin, $\frac{1}{4}$ " x $1\frac{1}{2}$ "
3.	GA5109	1	Sprocket, 24 Tooth
	GA5105	1	Sprocket, 15 Tooth
	GA5106	1	Sprocket, 17 Tooth
	GA5112	1	Sprocket, 27 Tooth
	GA5108	-	Sprocket, 23 Tooth (From Transmission)
	GA5110	-	Sprocket, 25 Tooth (From Transmission)
	GA5111	-	Sprocket, 26 Tooth (From Transmission)
4.	GA5113	1	Sprocket, 28 Tooth
5.	G10233	-	Machine Bushing, 1", 10 Gauge
6.	G3400-01	-	Flangette
7.	G2100-03	-	Bearing, $\frac{7}{8}$ " Hex Bore, Spherical
8.	G10312	6	Carriage Bolt, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
	G10232	6	Lock Washer, $\frac{5}{16}$ "
	G10106	6	Hex Nut, $\frac{5}{16}$ "-18
9.	GD10355	1	Shaft, $\frac{7}{8}$ " x $13\frac{3}{4}$ "
10.	GA7306	1	Extension Bracket
11.	G10857	2	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x $1\frac{1}{4}$ "
	G10209	2	Washer, $\frac{1}{4}$ " USS
	G10227	2	Lock Washer, $\frac{1}{4}$ "
	G10103	2	Hex Nut, $\frac{1}{4}$ "-20
12.	G10408	1	Clevis Pin, $\frac{5}{16}$ " x $\frac{3}{4}$ "
	G10409	1	Retaining Ring, $\frac{5}{16}$ "
13.	G10064	2	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x 1"
	G10209	2	Washer, $\frac{1}{4}$ " USS
	G10227	2	Lock Washer, $\frac{1}{4}$ "
	G10103	2	Hex Nut, $\frac{1}{4}$ "-20
14.		-	See "Contact Drive Wheel And Drive Shaft(s)", Pages P52-P54
15.		-	See "Two-Speed Point Row Clutch", Pages P62 And P63
16.	G3310-74	2	Chain, No. 40, 74 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
17.	G3310-100	1	Chain, No. 40, 100 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
18.	GA7320	1	Overrunning Sprocket Assembly, R.H.
	GA7321	-	Overrunning Sprocket Assembly, L.H.
	G10430	1	External Retaining Ring, $1\frac{1}{4}$ "
	GD1255	6	L-Pin
	G10546	6	Spring Pin, $\frac{3}{16}$ " x $1\frac{1}{4}$ "
	G10470	6	Cotter Pin, $\frac{5}{32}$ " x 1"
	GD10366	6	Spring
	GA7317	1	Block
	GA7319	1	Sprocket W/Bushing, 30 Tooth
19.	GD10543	1	Hex Shaft, $\frac{7}{8}$ " x 13"
20.	GA9918	1	Idler W/Sprocket And Hardware
	GD10356	-	Bushing, $\frac{3}{4}$ " Long
	G10128	-	Machine Bushing, $\frac{1}{2}$ ", 14 Gauge
	G10501	-	Hex Jam Nut, $\frac{1}{2}$ "-13, Grade 2
	G10053	-	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x $2\frac{1}{2}$ "
	GA7154	-	Sprocket W/Bearing, 18 Tooth

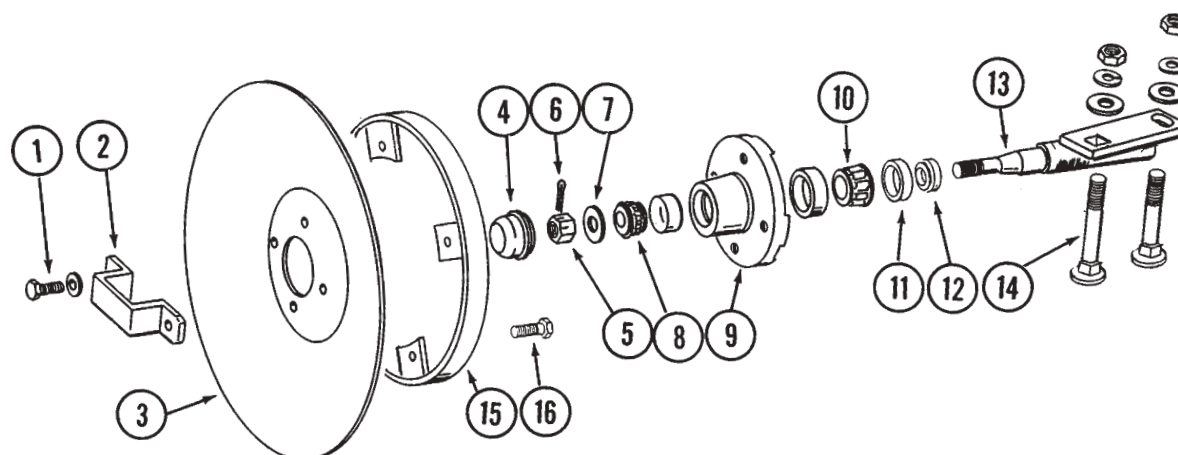
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TWO-SPEED POINT ROW CLUTCH WHEEL MODULE EXTENSION

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
(Continued)			
21.	GA7336	1	Idler W/Bolt-On Sprockets
	GD7426	-	Sprocket, 12 Tooth
	GD1026	-	Sleeve, 1 ³ / ₁₆ " Long
	G10210	-	Washer, ³ / ₈ " USS
	G10229	-	Lock Washer, ³ / ₈ "
	G10047	-	Hex Head Cap Screw, ³ / ₈ "-16 x 1 ³ / ₄ "
22.	G10036	1	Hex Head Cap Screw, ⁵ / ₈ "-11 x 4"
	G10107	1	Lock Nut, ⁵ / ₈ "-11
	G10104	1	Hex Nut, ⁵ / ₈ "-11
23.	G10595	1	Hex Head Cap Screw, ³ / ₈ "-16 x 10"
	G10108	1	Lock Nut, ³ / ₈ "-16
24.	G10496	2	External Inverted Snap Ring, 1 ¹ / ₂ "
25.	G11075	2	Internal Inverted Snap Ring, ⁷ / ₈ "
26.	GD14432	1	Sleeve, 1 ¹ / ₄ "
27.	GD14414	1	Torsion Spring, R.H. (Used On L.H. Wrap Spring Wrench) (Shown)
	GD14413	-	Torsion Spring, L.H. (Used On R.H. Wrap Spring Wrench)
28.	GD14429	-	Release Collar, Silver, L.H. (Shown)
	GD14430	1	Release Collar, Gold, R.H.
29.	GD14426	1	Tightener Shaft, 3 ³ / ₈ "
30.	GD14431	1	Handle
31.	G10235	2	Machine Bushing, ⁷ / ₈ ", 14 Gauge
32.	G11100	1	Hex Socket Button Head Screw, ¹ / ₄ "-20 x ¹ / ₂ ", Grade 8
	G10227	1	Lock Washer, ¹ / ₄ "
	G10209	1	Washer, ¹ / ₄ " USS
33.	G11078	1	Vinyl Cap
34.	G10037	1	Hex Head Cap Screw, ¹ / ₂ "-13 x 1 ¹ / ₄ "
	G10216	1	Washer, ¹ / ₂ " USS
	G10228	1	Lock Washer, ¹ / ₂ "
	G10102	1	Hex Nut, ¹ / ₂ "-13
35.	GA7313	1	Sprocket Storage Rod
36.	GD2558	2	Lynch Pin, ¹ / ₄ "
A.	G1K381	-	Wrap Spring Wrench Replacement Kit, Silver Collar, L.H. (Items 24-33) (Shown)
	G1K380	1	Wrap Spring Wrench Replacement Kit, Gold Collar, R.H. (Items 24-33)

ROW MARKER SPINDLE/HUB/BLADE

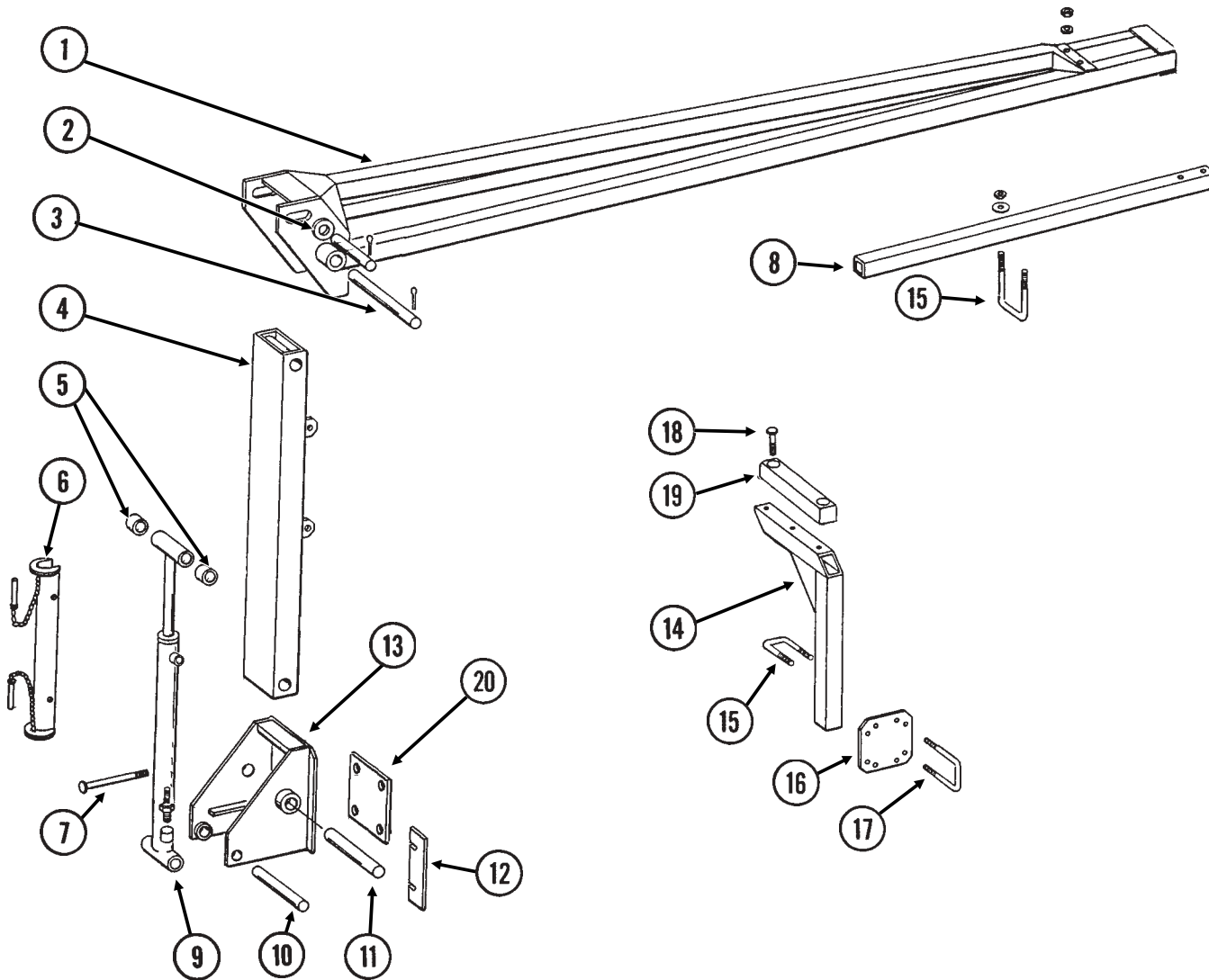
MKR020(MKR4)



ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
1.	G10722	4	Hex Head Cap Screw, $\frac{1}{2}$ "-20 x 1"
	G10228	4	Lock Washer, $\frac{1}{2}$ "
2.	GD2597	1	Retainer
3.	GD0746	1	Disc Blade, Solid, 16" (Shown)
	GD10283	-	Disc Blade, Notched, 16" (Optional)
4.	GD0840	1	Dust Cap
5.	G10725	1	Slotted Hex Nut, $\frac{5}{8}$ "-18
6.	G10544	1	Cotter Pin, $\frac{5}{32}$ " x 1"
7.	G10724	1	Washer, $\frac{5}{8}$ " SAE
8.	GA0257	1	Bearing
9.	GA0167	1	Hub W/Cups
	GR0151	-	Outer Cup
	GR0150	-	Inner Cup
10.	GA0245	1	Bearing
11.	GA0243	1	Grease Seal
12.	GA0899	1	Rubber Seal
13.	GA1676	1	Spindle, R.H.
	GA1677	-	Spindle, L.H. (Shown)
14.	G10844	2	Carriage Bolt, $\frac{1}{2}$ "-13 x 3 $\frac{1}{2}$ "
	G10168	2	Machine Bushing, $\frac{1}{2}$ ", 7 Gauge
	G10228	2	Lock Washer, $\frac{1}{2}$ "
	G10102	2	Hex Nut, $\frac{1}{2}$ "-13
15.	GA5853	1	Depth Band
16.	G10019	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1"
	G10109	4	Lock Nut, $\frac{5}{16}$ "-18, Grade 8
A.	GA1679	-	Hub And Spindle Assembly, L.H. (Items 1, 2 And 4-13)
	GA1678	-	Hub And Spindle Assembly, R.H. (Items 1, 2 And 4-13)

ROW MARKER ASSEMBLY, 8 ROW 36"/38" AND 12 ROW 30"

MKR019/MKR027(MKR14i)

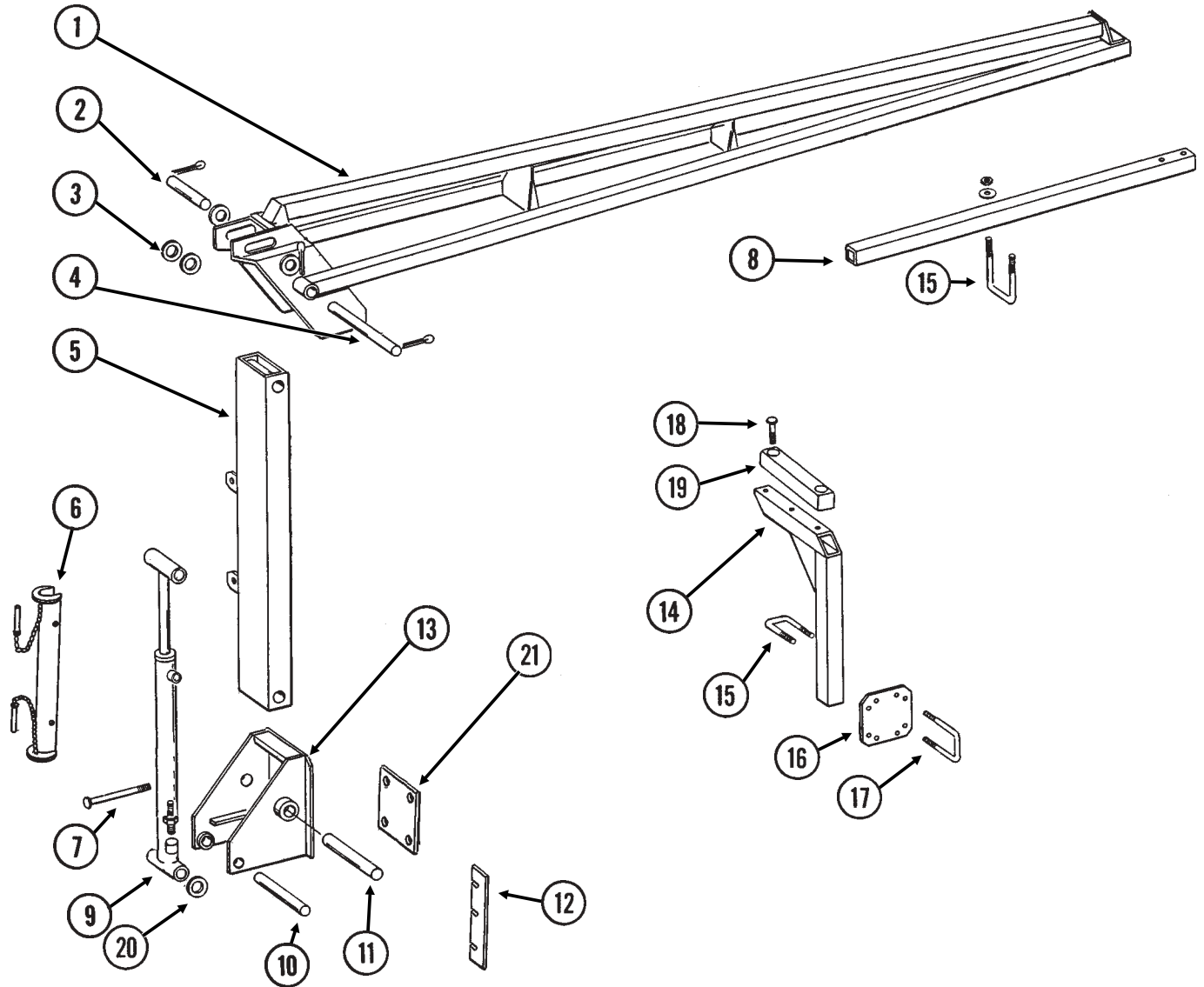


ROW MARKER ASSEMBLY, 8 ROW 36"/38" AND 12 ROW 30"

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	GA4353	1	Arm W/Grease Fittings, Second Stage, 110", 12 Row 30"
	G10641	-	Grease Fitting, 1/8" NPT
	GA5192	-	Arm, Second Stage, 67", 8 Row 36"/38"
2.	G10226	-	Washer, 1 1/4" SAE (As Required)
	G10159	-	Machine Bushing, 1 1/4", 10 Gauge (As Required)
	G10322	-	Machine Bushing, 1 1/4", 18 Gauge (As Required)
3.	GD3214	1	Pin, 1 1/4" x 12 1/4"
	G10460	2	Cotter Pin, 1/4" x 2"
4.	GA4611	1	Arm W/Grease Fittings, First Stage
	G10641	-	Grease Fitting, 1/8" NPT
5.	GD0752-41	4	Sleeve, 1"
6.	GA8170	1	Safety Lockup W/Detent Pins, 19 3/8"
	G10536	-	Detent Pin, 1/2" x 2 1/2" Grip
7.	G10011	4	Hex Head Cap Screw, 5/8"-11 x 5 1/2" (If Applicable)
	G10046	-	Hex Head Cap Screw, 5/8"-11 x 5" (If Applicable)
	G10008	-	Hex Head Cap Screw, 5/8"-11 x 2" (If Applicable)
	GD7805	8	Special Washer, 5/8", Hardened
	G10205	-	Washer, 5/8" SAE
	G10230	4	Lock Washer, 5/8"
	G10104	4	Hex Nut, 5/8"-11
8.	GD0453-07	1	Extension Tube, 45", 12 Row 30"
	GD0453-04	-	Extension Tube, 60", 12 Row 30" (L.H. Even-Row Marker) (If Applicable)
	GD0453-08	-	Extension Tube, 65", 8 Row 36"/38"
9.		-	See "Row Marker (Cushion) Cylinder", Page P79
10.	GD2161	2	Pin, 1 1/4" x 8 1/4"
	G10460	4	Cotter Pin, 1/4" x 2"
11.	GD0652	1	Pin, 1 1/4" x 9 1/2"
	G10460	2	Cotter Pin, 1/4" x 2"
12.	GD10792	-	Shim, 2 1/2" x 7 1/4", 16 Gauge (As Required)
13.	GA5130	1	Mount
14.	GA7042	1	Stand, 20" (12 Row 30" Only)
15.	GD2721	3	U-Bolt, 2" x 2" x 1/2"-13
	G10228	6	Lock Washer, 1/2"
	G10102	6	Hex Nut, 1/2"-13
16.	GD9981	1	Bar
17.	GD4743	2	U-Bolt, 3" x 3" x 1/2"-13
	G10216	4	Washer, 1/2" USS
	G10228	4	Lock Washer, 1/2"
	G10102	4	Hex Nut, 1/2"-13
18.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10206	2	Washer, 1/2" SAE
	G10111	2	Lock Nut, 1/2"-13
19.	GA9088	-	Molded Stop, 12 1/4" Long
20.	GD13360	2	Plate, 6" x 6"

ROW MARKER ASSEMBLY, 12 ROW 36"/38" AND 16 ROW 30"

MKR019/MKR023MKR027(MKR15)

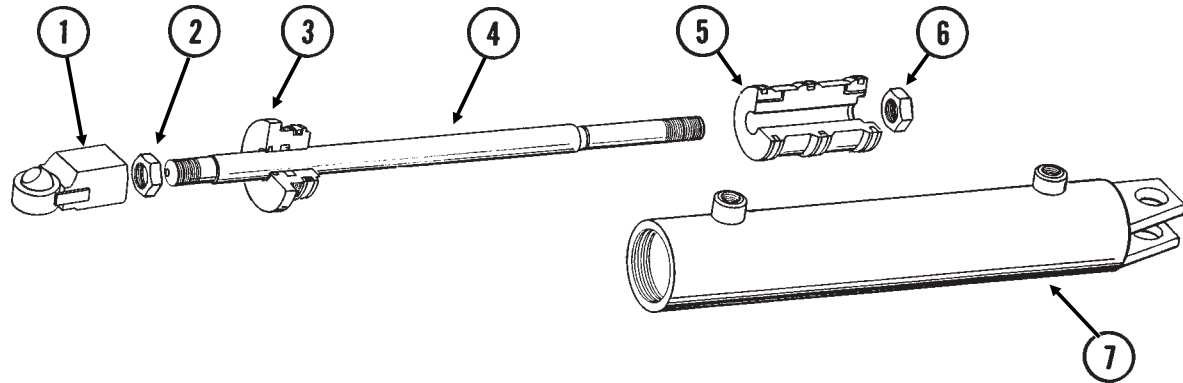


ROW MARKER ASSEMBLY, 12 ROW 36"/38" AND 16 ROW 30"

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
1.	GA7116	1	Arm, Second Stage, 138 1/4", 12 Row 36"/38"
	GA7118	-	Arm, Second Stage, 172 1/4", 16 Row 30"
2.	GD1701	1	Pin, 1 1/4" x 6 1/2"
	G10460	2	Cotter Pin, 1/4" x 2"
3.	G10979	4	Special Washer, 1 1/4" (As Required)
	G10159	-	Machine Bushing, 1 1/4", 10 Gauge (As Required)
	G10322	-	Machine Bushing, 1 1/4", 18 Gauge (As Required)
4.	GD0737	1	Pin, 1 1/4" x 13 1/4"
	G10460	2	Cotter Pin, 1/4" x 2"
5.	GA4878	1	Arm W/Grease Fittings, First Stage, R.H.
	GA4983	-	Arm W/Grease Fittings, First Stage, L.H.
	G10641	-	Grease Fitting, 1/8" NPT
6.	GA8170	1	Safety Lockup W/Detent Pins, 19 3/8"
	G10536	-	Detent Pin, 1/2" x 2 1/2" Grip
7.	G10012	-	Hex Head Cap Screw, 5/8"-11 x 6 1/2" (If Applicable)
	G10068	-	Hex Head Cap Screw, 5/8"-11 x 6" (If Applicable)
	G10008	-	Hex Head Cap Screw, 5/8"-11 x 2" (If Applicable)
	GD7805	8	Special Washer, 5/8", Hardened
	G10205	-	Washer, 5/8" SAE
	G10230	6	Lock Washer, 5/8"
	G10104	6	Hex Nut, 5/8"-11
8.	GD0453-09	1	Extension Tube, 75", 12 Row 36"/38" And 16 Row 30" (L.H. Ever-Row Marker) (If Applicable)
	GD0453-03	-	Extension Tube, 50", 16 Row 30"
9.		-	See "Row Marker (Cushion) Cylinder", Page P79
10.	GD0652	1	Pin, 1 1/4" x 9 1/2"
	G10460	2	Cotter Pin, 1/4" x 2"
11.	GD7209	1	Pin, 1 1/4" x 11 1/2"
	G10049	1	Hex Head Cap Screw, 3/8"-16 x 2 1/2"
	G10108	1	Lock Nut, 3/8"-16
12.	GD10793	-	Shim, 2 1/2" x 12 1/2", 16 Gauge (As Required) (Shown)
	GD11791	-	Shim, 2 1/2" x 8 1/4", 16 Gauge (As Required)
13.	GA4877	1	Mount
14.	GA7043	1	Stand, 30"
15.	GD2721	3	U-Bolt, 2" x 2" x 1/2"-13
	G10228	6	Lock Washer, 1/2"
	G10102	6	Hex Nut, 1/2"-13
16.	GD9981	1	Bar
17.	GD4743	2	U-Bolt, 3" x 3" x 1/2"-13
	G10216	4	Washer, 1/2" USS
	G10228	4	Lock Washer, 1/2"
	G10102	4	Hex Nut, 1/2"-13
18.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10206	2	Washer, 1/2" SAE
	G10111	2	Lock Nut, 1/2"-13
19.	GA9088	-	Molded Stop, 12 1/4" Long
20.	G10979	4	Special Washer, 1 1/4" (As Required)
21.	GD13359	2	Plate, 7" x 7"

ROTATION CYLINDER, ALL SIZES

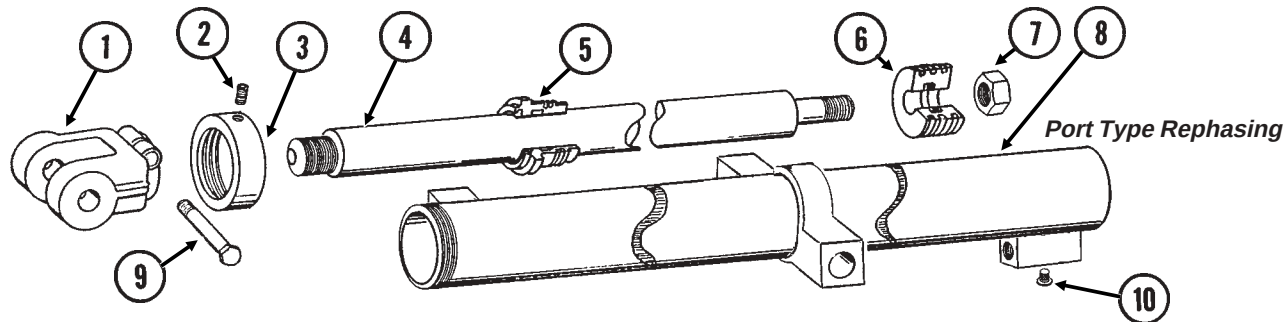
(CYL11i)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA7221	1	Threaded Ball Joint End
2.	G10509	1	Hex Jam Nut, 1 1/4"-12, Grade 2
3.	GD11988	1	Gland
4.	GD11991	1	Rod
5.	GD11992	1	Piston
6.	G10972	1	Lock Nut, 1 1/4"-12
7.	A7220	1	Barrel (Non-Stock Item)
A.	GA8904	-	Cylinder Complete, 4" x 16" <i>(Part Number Stamped On Barrel)</i>
B.	GR1524	-	Seal Kit, Includes: (2) O-Rings, (1) U-Cup, (1) Wiper, (1) Seal, (2) Cast Iron Rings, (1) BU Ring, (1) Expander

CENTER LIFT CYLINDER, ALL SIZES

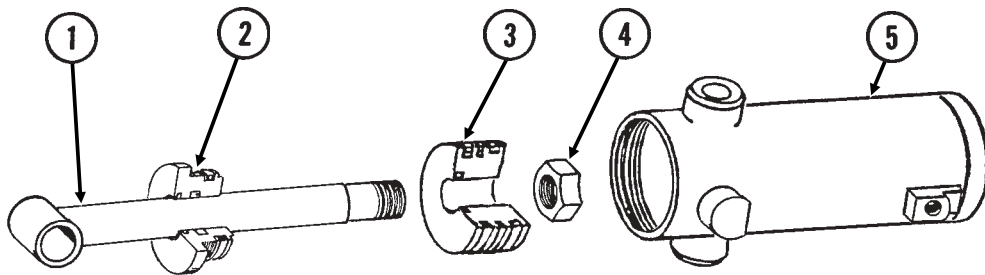
(CYL39c)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GD11951	1	Clevis
2.	G10907	1	Set Screw, 1/4"-20 x 1/4"
3.	GD11193	1	Cap
4.	GD10936	1	Rod
5.	GD10211	1	Gland
6.	GD11253	1	Piston
7.	G10958	1	Lock Nut, 1"-14
8.	GA8149	1	Barrel
9.	G10939	1	Hex Head Cap Screw, 3/8"-16 x 2 1/4"
	G10108	1	Lock Nut, 3/8"-16
10.	G6408-H04-O	1	Hex Socket Head Plug W/O-Ring, 7/16"-20 O-Ring
	GR1465	1	O-Ring
A.	GA8908	-	Cylinder Complete, 3" x 48" <i>(Part Number Stamped On Barrel)</i>
B.	GR1428	-	Seal Kit, Includes: (2) O-Rings, (2) BU Rings, (1) Wiper, (1) U-Cup, (1) Piston Seal, (2) Cast Iron Rings, (1) Expander

WING LIFT CYLINDER, 8 AND 12 ROW

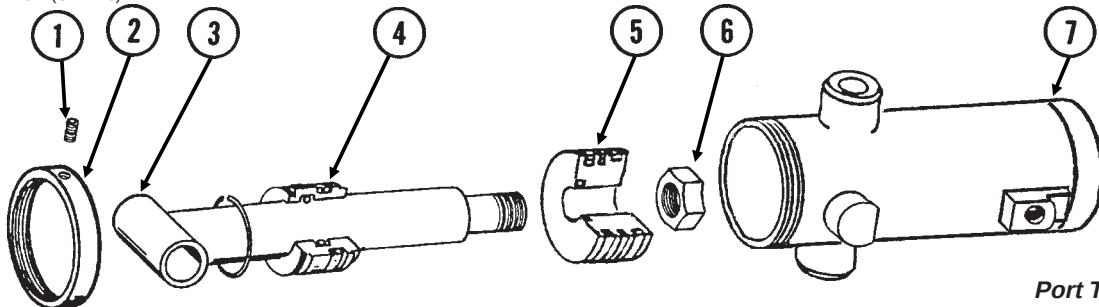
CYL031/CYL011(CYL45d)



ITEM	PART NO.	QTY	DESCRIPTION	Port Type Rephasing
1.	GA8320	1	Rod Assembly W/Grease Fitting	
	G10640	-	Grease Fitting, 1/4"-28	
2.	GD11995	1	Gland	
3.	GD11994	1	Piston	
4.	G10958	1	Lock Nut, 1"-14	
5.	A8797	1	Barrel (Non-Stock Item)	
A.	GA8909	-	Cylinder Complete, 4 1/4" x 6" (Part Number Stamped On Barrel)	
B.	GR1523	-	Seal Kit, Includes: (1) Wiper, (2) O-Rings, (1) BU Ring, (1) U-Cup, (1) Seal, (2) Cast Iron Rings, (1) Expander	

WING LIFT CYLINDER, 16 ROW

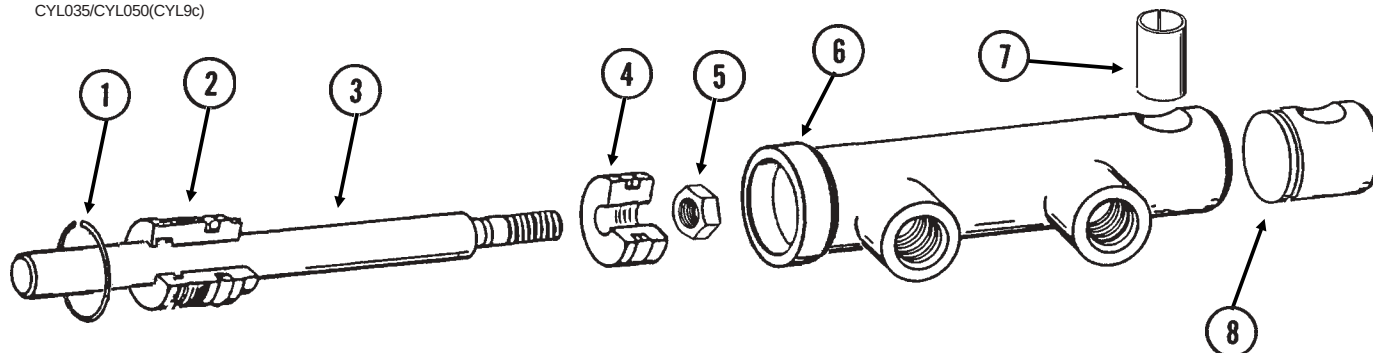
CYL031/CYL011(CYL41c)



ITEM	PART NO.	QTY.	DESCRIPTION	Port Type Rephasing
1.	G10907	1	Set Screw, 1/4"-20 x 1/4"	
2.	GD11193	1	Cap	
3.	GA8157	1	Rod Assembly W/Grease Fitting	
	G10449	-	Grease Fitting, 3/16", Drive-In	
4.	GD11194	1	Gland	
5.	GD11253	1	Piston	
6.	G10958	1	Lock Nut, 1"-14	
7.	A8873	1	Barrel (Non-Stock Item)	
A.	GA8874	-	Cylinder Complete, 3" x 6" (Part Number Stamped On Barrel)	
B.	GR1417	-	Seal Kit, Includes: (2) O-Rings, (2) BU Rings, (1) Expander, (1) Wiper, (1) U-Cup, (1) Piston Seal, (2) Cast Iron Rings	

TRANSPORT LATCH CYLINDER, ALL SIZES

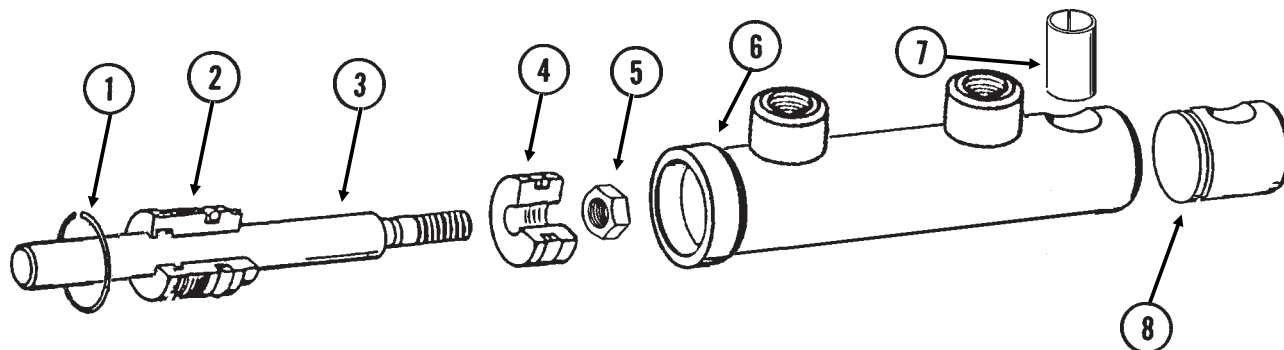
CYL035/CYL050(CYL9c)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10770	1	Internal Retaining Ring, 1 ¹¹ / ₁₆ "
2.	GD13170	1	Gland
3.	GD13425	1	Rod
4.	GD13172	1	Piston
5.	G11016	1	Lock Nut, 1/2"-20
6.	D13426	1	Barrel (Non-Stock Item)
7.	GD13400	1	Tension Bushing, 1" x 2" Long
8.	GD13173	1	End Cap
A.	GA9559	-	Cylinder Complete, 1 1/2" x 2 1/2" (Part Number Stamped On Barrel)
B.	GR1598	-	Seal Kit, Includes: (3) O-Rings, (2) BU Rings, (1) Wiper, (1) T-Seal, (1) Bronze Bushing, (1) Seal, (1) U-Cup

TONGUE LOCK CYLINDER, ALL SIZES

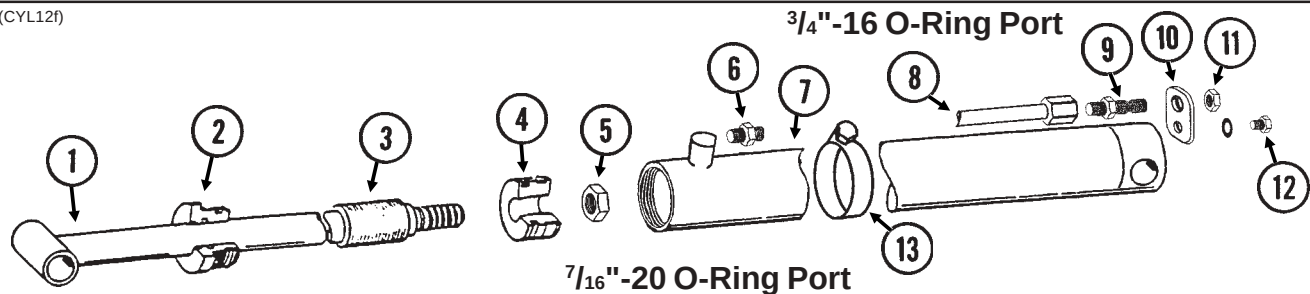
CYL035(CYL9d)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10770	1	Internal Retaining Ring, 1 ¹¹ / ₁₆ "
2.	GD13170	1	Gland
3.	GD13171	1	Rod
4.	GD13172	1	Piston
5.	G11016	1	Lock Nut, 1/2"-20
6.	D13169	1	Barrel (Non-Stock Item)
7.	GD13400	1	Tension Bushing, 1" x 2" Long
8.	GD13173	1	End Cap
A.	GA9205	-	Cylinder Complete, 1 1/2" x 2 1/2" (Part Number Stamped On Barrel)
B.	GR1598	-	Seal Kit, Includes: (3) O-Rings, (2) BU Rings, (1) Wiper, (1) T-Seal, (1) Bronze Bushing, (1) Seal, (1) U-Cup

TONGUE CYLINDER, 8 ROW 36"/38" WITH "Y" HITCH

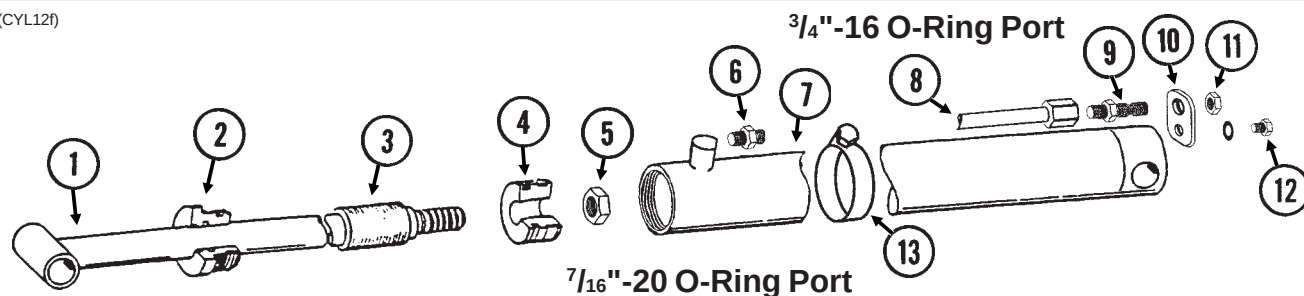
(CYL12f)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA8867	1	Rod Assembly
2.	GD11984	1	Gland
3.	GD7147	1	Spacer
4.	GD11970	1	Piston
5.	G10972	1	Lock Nut, 1 1/4"-12
6.	G6400-08-04	1	Connector W/O-Ring, 3/4"-16 Male JIC To 7/16"-20 O-Ring
	GR1465	-	O-Ring
7.	A8869	1	Barrel (Non-Stock Item)
8.	GA8981	1	Steel Hydraulic Line, 44 11/16"
9.	G2700-08	1	Bulkhead Tube Union, 3/4"-16 Male JIC
10.	GD12597	1	Bracket
11.	G306-08	1	Lock Nut, 3/4"-16
12.	G10328	1	Hex Head Cap Screw, 3/8"-16 x 5/8"
	G10229	1	Lock Washer, 3/8"
13.	G10990	1	Hose Clamp, No. 52
A.	GA8870	-	Cylinder Complete, 3" x 36" <i>(Part Number Stamped On Barrel)</i>
B.	GR1519	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring, (1) Wear Ring, (1) Wiper, (1) U-Cup, (1) T-Seal

TONGUE CYLINDER, 8 ROW 36"/38" WITH "T" HITCH, 12 ROW 30" WITH "Y" HITCH

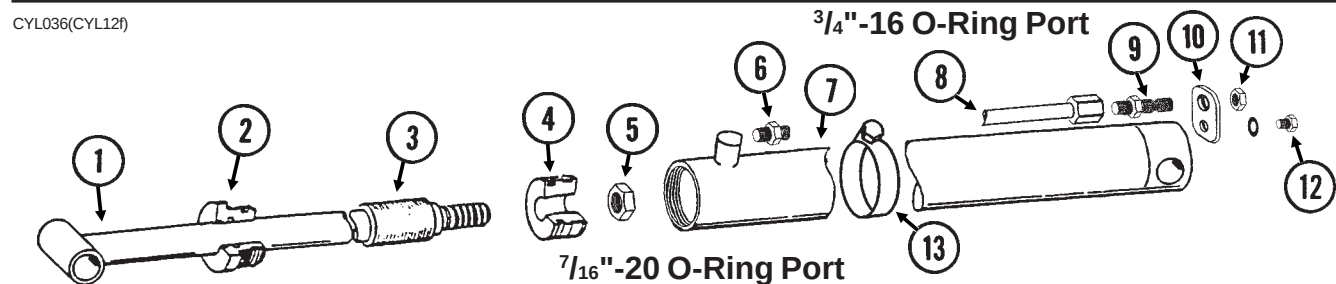
(CYL12f)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA8893	1	Rod Assembly
2.	GD11984	1	Gland
3.	GD7147	1	Spacer
4.	GD11970	1	Piston
5.	G10972	1	Lock Nut, 1 1/4"-12
6.	G6400-08-04	1	Connector W/O-Ring, 3/4"-16 Male JIC To 7/16"-20 O-Ring
	GR1465	-	O-Ring
7.	GA8858	1	Barrel
8.	GA8978	1	Steel Hydraulic Line, 68 11/16"
9.	G2700-08	1	Bulkhead Tube Union, 3/4"-16 Male JIC
10.	GD12597	1	Bracket
11.	G306-08	1	Lock Nut, 3/4"-16
12.	G10328	1	Hex Head Cap Screw, 3/8"-16 x 5/8"
	G10229	1	Lock Washer, 3/8"
13.	G10990	1	Hose Clamp, No. 52
A.	GA8857	-	Cylinder Complete, 3" x 60" (Part Number Stamped On Barrel)
B.	GR1519	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring, (1) Wear Ring, (1) Wiper, (1) U-Cup, (1) T-Seal

TONGUE CYLINDER, 12 ROW 30" WITH "T" HITCH, 12 ROW 36"/38" AND 16 ROW 30" WITH "Y" HITCH

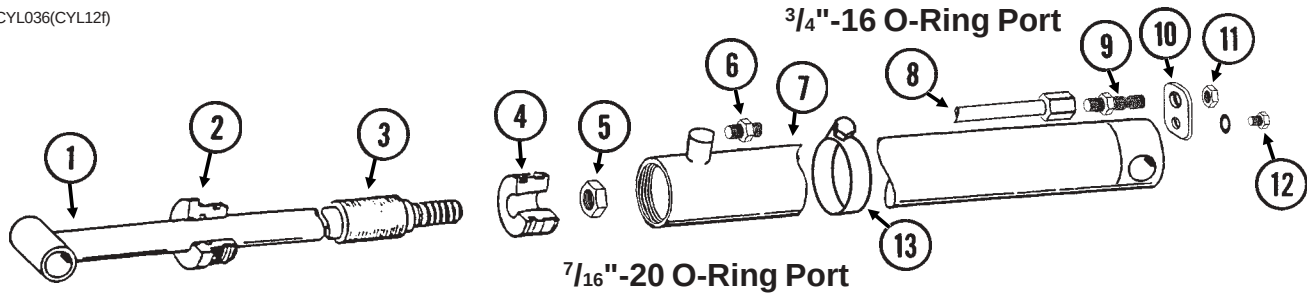
CYL036(CYL12f)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA8859	1	Rod Assembly
2.	GD11984	1	Gland
3.	GD7147	1	Spacer
4.	GD11970	1	Piston
5.	G10972	1	Lock Nut, 1 1/4"-12
6.	G6400-08-04	1	Connector W/O-Ring, 3/4"-16 Male JIC To 7/16"-20 O-Ring
	GR1465	-	O-Ring
7.	GA8861	1	Barrel
8.	GA8979	1	Steel Hydraulic Line, 92 11/16"
9.	G2700-08	1	Bulkhead Tube Union, 3/4"-16 Male JIC
10.	GD12597	1	Bracket
11.	G306-08	1	Lock Nut, 3/4"-16
12.	G10328	1	Hex Head Cap Screw, 3/8"-16 x 5/8"
	G10229	1	Lock Washer, 3/8"
13.	G10990	1	Hose Clamp, No. 52
A.	GA8862	-	Cylinder Complete, 3" x 84" (Part Number Stamped On Barrel)
B.	GR1519	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring, (1) Wear Ring, (1) Wiper, (1) U-Cup, (1) T-Seal

TONGUE CYLINDER, 12 ROW 36"/38" AND 16 ROW 30" WITH "T" HITCH

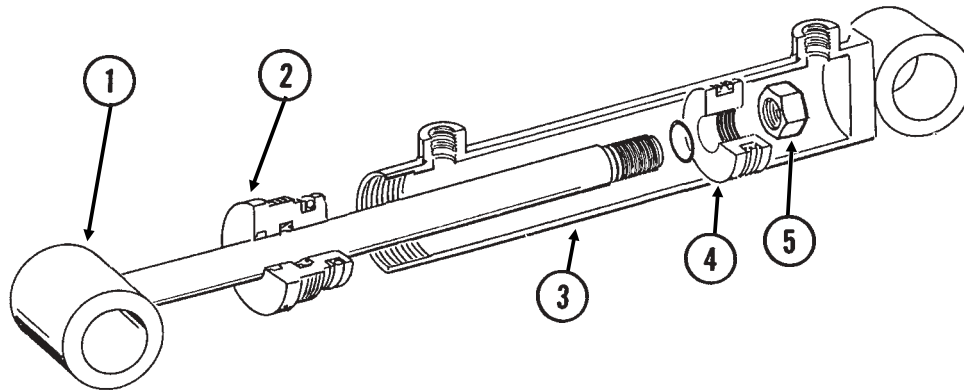
CYL036(CYL12f)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA8863	1	Rod Assembly
2.	GD11984	1	Gland
3.	GD7147	1	Spacer
4.	GD11970	1	Piston
5.	G10972	1	Lock Nut, 1 1/4"-12
6.	G6400-08-04	1	Connector W/O-Ring, 3/4"-16 Male JIC To 7/16"-20 O-Ring
	GR1465	-	O-Ring
7.	GA8865	1	Barrel
8.	GA8980	1	Steel Hydraulic Line, 116 11/16"
9.	G2700-08	1	Bulkhead Tube Union, 3/4"-16 Male JIC
10.	GD12597	1	Bracket
11.	G306-08	1	Lock Nut, 3/4"-16
12.	G10328	1	Hex Head Cap Screw, 3/8"-16 x 5/8"
	G10229	1	Lock Washer, 3/8"
13.	G10990	1	Hose Clamp, No. 52
A.	GA8866	-	Cylinder Complete, 3" x 108" (Part Number Stamped On Barrel)
B.	GR1519	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring, (1) Wear Ring, (1) Wiper, (1) U-Cup, (1) T-Seal

WING LOCK CYLINDER, ALL SIZES

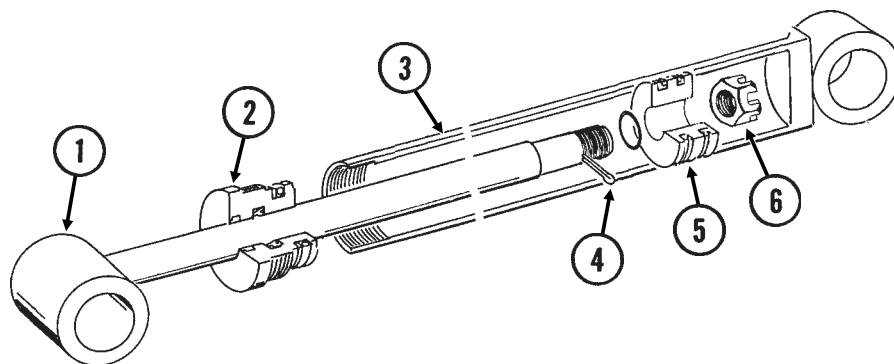
CYL032(CYL3f)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA8898	1	Rod Assembly
2.	GD11985	1	Gland
3.	A8822	1	Barrel (Non-Stock Item)
4.	GD11986	1	Piston
5.	G10969	1	Lock Nut, $\frac{7}{8}$ "-14
A.	GA8899	-	Cylinder Complete, 2 $\frac{1}{2}$ " x 20 $\frac{1}{16}$ " (Part Number Stamped On Barrel)
B.	GR1522	-	Seal Kit, Includes: (1) T-Seal, (2) O-Rings, (1) BU Ring, (1) U-Cup, (1) Wiper

MARKER (Cushion) CYLINDER, ALL SIZES

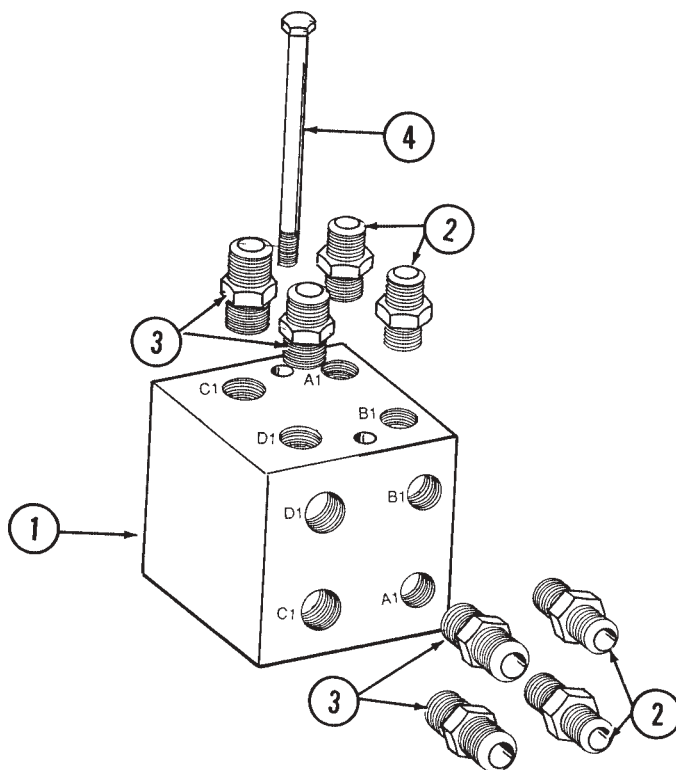
(CYL3d)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA8871	1	Rod Assembly
2.	GD10207	1	Gland
3.	A7524	1	Barrel (Non-Stock Item)
4.	G10827	1	Cotter Pin, $\frac{1}{8}$ " x 1 $\frac{3}{4}$ "
5.	GD11983	1	Piston
6.	G10962	1	Slotted Hex Nut, $\frac{7}{8}$ "-14
A.	GA8895	-	Cylinder Complete, 2 $\frac{1}{2}$ " x 20 $\frac{1}{16}$ " (Part Number Stamped On Barrel)
B.	GR1521	-	Seal Kit, Includes: (1) T-Seal, (2) O-Rings, (1) BU Ring, (1) Cast Iron Ring, (1) Wiper, (1) U-Cup

JUNCTION BLOCK - LOCATED ON R.H. SIDE OF CENTER PIVOT

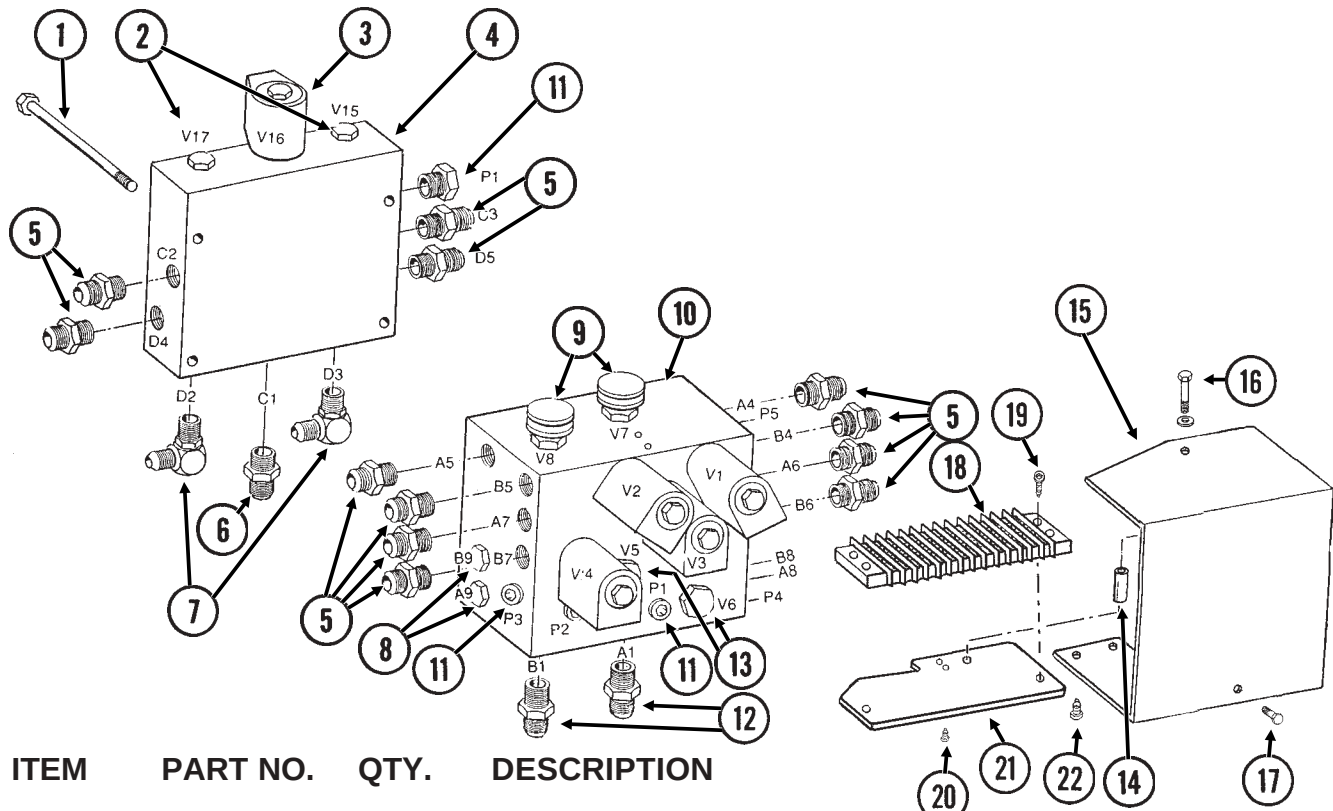
VVB036(TWL24)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GD9971	1	Manifold Block
2.	G6400-08	4	Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
3.	G6400-10-08	4	Connector W/O-Ring, $\frac{7}{8}$ "-14 Male JIC To $\frac{3}{4}$ "-16 O-Ring
	GR1037	-	O-Ring
4.	G10172	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 5"
	G10229	2	Lock Washer, $\frac{3}{8}$ "
	G10101	2	Hex Nut, $\frac{3}{8}$ "-16

VALVE BLOCKS - LOCATED ON REAR CENTER FRAME

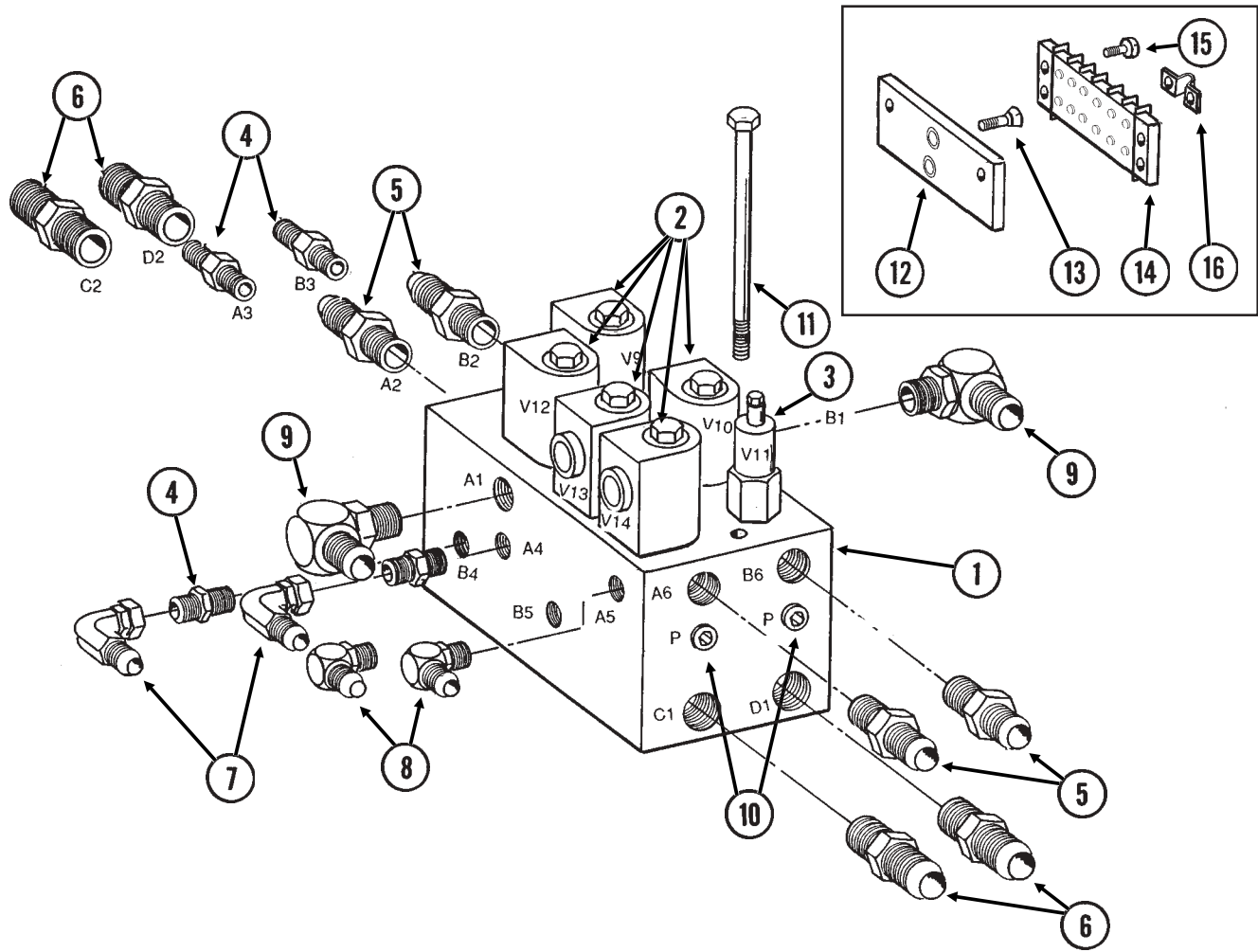
VVB034(TWL25e)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10583	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 2 $\frac{3}{4}$ "
	G10232	4	Lock Washer, $\frac{5}{16}$ "
2.		2	See "Check Valve", Page P85
3.		5	See "Solenoid Valve", Page P84
4.	GD9977	1	Block
5.	G6400-08	12	Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
6.	G6400-10	1	Connector W/O-Ring, $\frac{7}{8}$ "-14 Male JIC To O-Ring
	GR1466	-	O-Ring
7.	G6801-08-10	2	Elbow W/O-Ring, 90°, $\frac{3}{4}$ "-16 Male JIC To $\frac{7}{8}$ "-14 O-Ring
	GR1466	-	O-Ring
8.	G6408-08	4	Plug W/O-Ring, $\frac{3}{4}$ "-16 O-Ring
	GR1037	-	O-Ring
9.		2	See "Flow Control Valve", Page P84
10.	GD9533	1	Block
11.	G6408-H06-O	6	Hex Socket Head Plug W/O-Ring, $\frac{9}{16}$ "-18 O-Ring
	GR1045	-	O-Ring
12.	G6400-08-10	2	Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To $\frac{7}{8}$ "-14 O-Ring
	GR1466	-	O-Ring
13.	G6408-10	2	Plug W/O-Ring, $\frac{7}{8}$ "-14 O-Ring
	GR1466	-	O-Ring
14.	GD8066-02	1	Sleeve, 1" Long
15.	GD13146	1	Cover
16.	G10133	1	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{2}$ "
	G10232	1	Lock Washer, $\frac{5}{16}$ "
17.	G10054	1	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x $\frac{1}{2}$ "
	G10232	1	Lock Washer, $\frac{5}{16}$ "
	G10106	1	Hex Nut, $\frac{5}{16}$ "-18
18.	GA9097	1	Terminal Strip W/Screws, No. 6, 14 Terminal
	GR1635	-	Screw, No. 6-32 x $\frac{1}{4}$ "
19.	G11067	2	Phillips Pan Head Machine Screw, No. 8-32 x $\frac{3}{4}$ ", Stainless Steel
20.	G11066	2	Phillips Pan Head Machine Screw, No. 10-24 x $\frac{3}{4}$ ", Stainless Steel
21.	GA9095	1	Terminal Strip Mount
22.	G10977	2	Phillips Pan Head Machine Screw, No. 10-24 x $\frac{1}{2}$ ", Stainless Steel

VALVE BLOCK - LOCATED ON HITCH

VVB035(TWL26f)



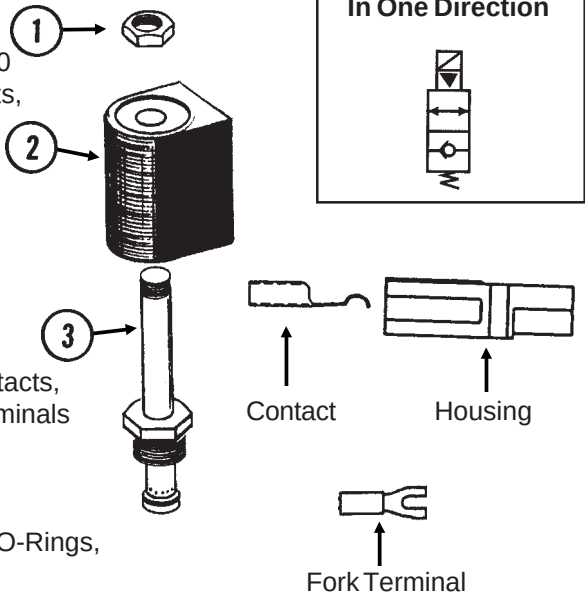
VALVE BLOCK - LOCATED ON HITCH

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GD9905	1	Block
2.		-	See "Solenoid Valve", Page P84
3.		-	See "Pressure Relief Valve", Page P84
4.	G6400-06	4	Connector W/O-Ring, $\frac{9}{16}$ "-18 Male JIC To O-Ring
	GR1045	-	O-Ring
5.	G6400-08	4	Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
6.	G6400-10	4	Connector W/O-Ring, $\frac{7}{8}$ "-14 Male JIC To O-Ring
	GR1466	-	O-Ring
7.	G6500-06	2	Swivel Elbow, 90°, $\frac{9}{16}$ "-18 Male JIC To Female
8.	G6801-06	2	Elbow W/O-Ring, 90°, $\frac{9}{16}$ "-18 Male JIC To O-Ring
	GR1045	-	O-Ring
9.	G6801-08	2	Elbow W/O-Ring, 90°, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
10.	G6408-H06-O	2	Hex Socket Head Plug W/O-Ring, $\frac{9}{16}$ "-18 O-Ring
	GR1045	-	O-Ring
11.		-	See "Hose Take-Up", Pages P40 And P41
12.	GD12818	-	Terminal Strip Mount
13.	G11068	2	Phillips Flat Head Machine Screw, No. 10-24 x $\frac{5}{8}$ ", Stainless Steel
14.	GA9098	-	Terminal Strip W/Screws, No. 6, 8 Terminal
	GR1635	-	Screw, No. 6-32 x $\frac{1}{4}$ "
15.	G11065	2	Phillips Pan Head Machine Screw, No. 8-32 x $\frac{5}{8}$ ", Stainless Steel
16.		-	See "Electrical Components", Pages P90 And P91

SOLENOID VALVE

VVB019(TWL27c/TWL18/PLTR75c/A9481)

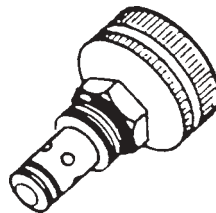
ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR0761	1	Special Hex Nut, 1/2"-20
2.	G1K274	1	Coil Kit W/Coil, Contacts, Housings And Fork Terminals
	GD9529	2	Housing, Black
	GD9530	2	Contact
	G10996	2	Fork Terminal
3.	GR0763	1	Cartridge
A.	G1K275	-	Solenoid Valve Kit W/Solenoid Valve, Contacts, Housings And Fork Terminals
	GD9529	2	Housing, Black
	GD9530	2	Contact
	G10996	2	Fork Terminal
B.	GR0764	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring



FLOW CONTROL VALVE

VVB020(TWL28)

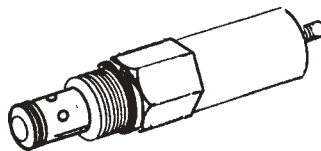
ITEM	PART NO.	QTY.	DESCRIPTION
A.	GA3413	-	Flow Control Valve
B.	GR0764	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring



PRESSURE RELIEF VALVE

VVB020(TWL29)

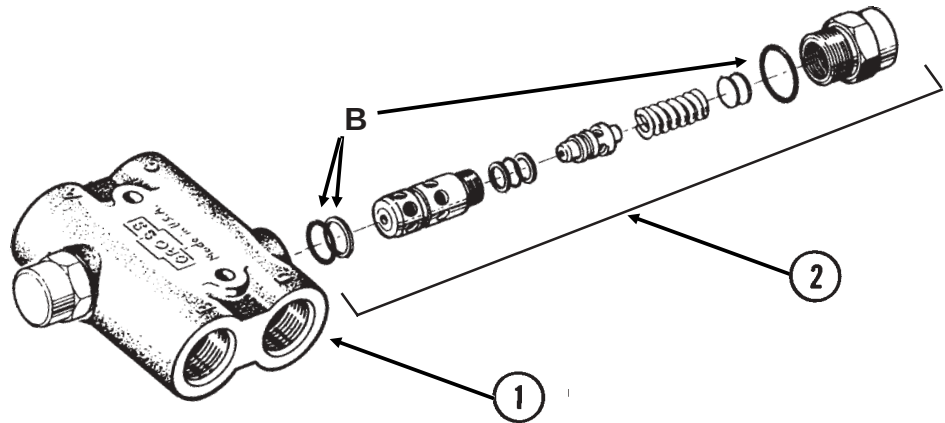
ITEM	PART NO.	QTY.	DESCRIPTION
A.	GA3407	-	Pressure Relief Valve, 1000 PSI
B.	GR0764	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring



RELIEF VALVE (Located On Hitch) 8, 12 AND 16 ROW (IF APPLICABLE)

(TWL147)

STYLE A

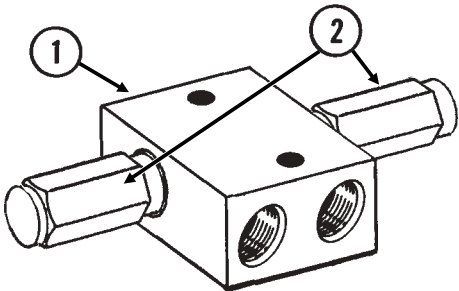


ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR1402	1	Body
2.	GR1403	2	Cartridge
A.	GA8129A	-	Relief Valve Complete
B.	GR1404	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring

STYLE B

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR1513	1	Body
2.	GR1514	2	Cartridge
A.	GA8129B	-	Relief Valve Complete
B.	GR1515	-	Seal Kit, Includes: (2) O-Rings, (2) BU Rings

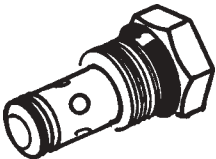
(TWL171)



CHECK VALVE

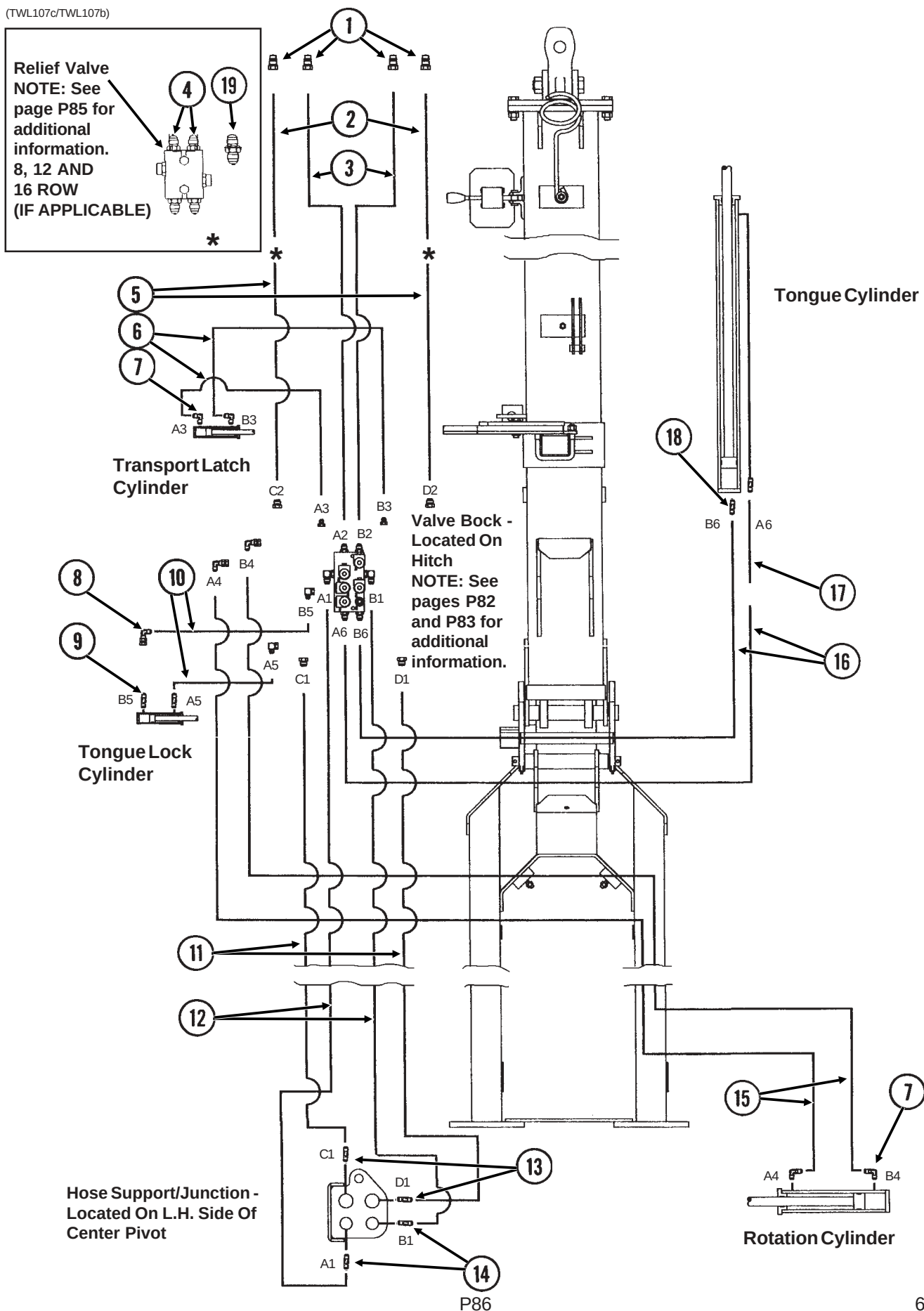
ITEM	PART NO.	QTY.	DESCRIPTION
A.	GA4293	-	Check Valve
B.	GR0764	-	Seal Kit, Includes: (2) O-Rings, (1) BU Ring

VVB020(TWL30)



HYDRAULIC HOSES AND FITTINGS ON HITCH

(TWL107c/TWL107b)



HYDRAULIC HOSES AND FITTINGS ON HITCH

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GD4086	4	ISO Coupler
2.	*A1417	2	Hose Assembly, 1/2" x 138", 8 Row 36"/38" "Y" Hitch
	*A8204	2	Hose Assembly, 1/2" x 159", 8 Row 36"/38" "T" Hitch
	*A8206	2	Hose Assembly, 1/2" x 147", 12 Row 30" "Y" Hitch
	*A8205	2	Hose Assembly, 1/2" x 182", 12 Row 30" "T" Hitch
	*A8200	2	Hose Assembly, 1/2" x 178", 12 Row 36"/38" And 16 Row 30" "Y" Hitch
	*A8207	2	Hose Assembly, 1/2" x 209", 12 Row 36"/38" And 16 Row 30" "T" Hitch
3.	*A1075	2	Hose Assembly, 3/8" x 156", 8 Row 36"/38" "Y" Hitch
	*A3182	2	Hose Assembly, 3/8" x 203", 8 Row 36"/38" "T" Hitch
	*A3133	2	Hose Assembly, 3/8" x 191", 12 Row 30" "Y" Hitch
	*A1032	2	Hose Assembly, 3/8" x 240", 12 Row 30" "T" Hitch
	*A3183	2	Hose Assembly, 3/8" x 246", 12 Row 36"/38" And 16 Row 30" "Y" Hitch
	*A3184	2	Hose Assembly, 3/8" x 300", 12 Row 36"/38" And 16 Row 30" "T" Hitch
4.	G6400-10	4	Connector W/O-Ring, 7/8"-14 Male JIC To O-Ring
	GR1466	-	O-Ring
5.	*A8202	2	Hose Assembly, 1/2" x 17", 8 Row 36"/38" "Y" Hitch
	*A8203	2	Hose Assembly, 1/2" x 43", 8 Row 36"/38" "T" And 12 Row 30" "Y" Hitch
	*A1463	2	Hose Assembly, 1/2" x 68", 12 Row 30" "T" Hitch,
			12 Row 36"/38" "Y" Hitch And 16 Row 30" "Y" Hitch
	*A8201	2	Hose Assembly, 1/2" x 90", 12 Row 36"/38" "T" Hitch And 16 Row 30" "T" Hitch
6.	*A1170	2	Hose Assembly, 1/4" x 90", 8 Row 36"/38" "Y" Hitch
	*A1106	2	Hose Assembly, 1/4" x 130", 8 Row 36"/38" "T" Hitch
	*A1103	2	Hose Assembly, 1/4" x 110", 12 Row 30" "Y" Hitch
	*A1183	2	Hose Assembly, 1/4" x 157", 12 Row 30" "T" Hitch And 12 Row 36"/38" "Y" Hitch
	*A1156	2	Hose Assembly, 1/4" x 204", 12 Row 36"/38" "T" Hitch
	*A1129	2	Hose Assembly, 1/4" x 168", 16 Row 30" "Y" Hitch
	*A1119	2	Hose Assembly, 1/4" x 216", 16 Row 30" "T" Hitch
7.	G6801-06-08	4	Elbow W/O-Ring, 90°, 9/16"-18 Male JIC To 3/4"-16 O-Ring
	GR1037	-	O-Ring
8.	G6502-06	1	Swivel Elbow, 45°, 9/16"-18 Male JIC To Female
9.	G6400-06-08	2	Connector W/O-Ring, 9/16"-18 Male JIC To 3/4"-16 O-Ring
	GR1037	-	O-Ring
10.	*A1181	2	Hose Assembly, 1/4" x 32", 8 Row 36"/38" "Y" Hitch
	*A1139	2	Hose Assembly, 1/4" x 40", 8 Row 36"/38" "T" Hitch, 12 Row 30" "Y"/"T" Hitch,
			12 Row 36"/38" "Y"/"T" Hitch And 16 Row 30" "Y"/"T" Hitch
11.	*A1494	2	Hose Assembly, 1/2" x 112", 8 Row 36"/38" "Y" Hitch
	*A1463	2	Hose Assembly, 1/2" x 68", 8 Row 36"/38" "T" Hitch
	*A1464	2	Hose Assembly, 1/2" x 72", 12 Row 30" "T" Hitch
	*A1467	2	Hose Assembly, 1/2" x 120", 12 Row 30"/36"/38" "Y" Hitch
	*A1462	2	Hose Assembly, 1/2" x 78", 12 Row 36"/38" And 16 Row 30" "T" Hitch
	*A1478	2	Hose Assembly, 1/2" x 128", 16 Row 30" "Y" Hitch
12.	*A1024	2	Hose Assembly, 3/8" x 116", 8 Row 36"/38" "Y" Hitch
	*A1039	2	Hose Assembly, 3/8" x 76", 8 Row 36"/38" "T" Hitch
	*A3129	2	Hose Assembly, 3/8" x 79", 12 Row 30" "T" Hitch
	*A1011	2	Hose Assembly, 3/8" x 125", 12 Row 30"/36"/38" "Y" Hitch
	*A3113	2	Hose Assembly, 3/8" x 84", 12 Row 36"/38" And 16 Row 30" "T" Hitch
	*A1041	2	Hose Assembly, 3/8" x 130", 16 Row 30" "Y" Hitch
13.	G2700-10	2	Bulkhead Tube Union, 7/8"-14 Male JIC
14.	G2700-08	2	Bulkhead Tube Union, 3/4"-16 Male JIC
15.	*A1105	2	Hose Assembly, 1/4" x 125", 8 Row 36"/38" "Y" Hitch
	*A1114	2	Hose Assembly, 1/4" x 85", 8 Row 36"/38" And 12 Row 30" "T" Hitch
	*A1106	2	Hose Assembly, 1/4" x 130", 12 Row 30"/36"/38" "Y" Hitch
	*A1102	2	Hose Assembly, 1/4" x 95", 12 Row 36"/38" "T" Hitch And 16 Row 30" "T" Hitch
	*A1116	2	Hose Assembly, 1/4" x 136", 16 Row 30" "Y" Hitch
16.	*A1022	2	Hose Assembly, 3/8" x 60", 8 Row 36"/38" "Y" Hitch
	*A1087	2	Hose Assembly, 3/8" x 74", 8 Row 36"/38" "T" Hitch
	*A3156	2	Hose Assembly, 3/8" x 68", 12 Row 30"/36"/38" "Y" Hitch
	*A3159	2	Hose Assembly, 3/8" x 97", 12 Row 36"/38" And 16 Row 30" "T" Hitch
	*A3129	2	Hose Assembly, 3/8" x 79", 12 Row 30" "T" Hitch
	*A3118	2	Hose Assembly, 3/8" x 80", 16 Row 30" "Y" Hitch
17.	*A1072	1	Hose Assembly, 3/8" x 48", 8 Row 36"/38" "Y" Hitch (If Applicable)
	*A3215	1	Hose Assembly, 3/8" x 72", 8 Row 36"/38" "T" And 12 Row 30" "Y" Hitch
			(If Applicable)
	*A3216	1	Hose Assembly, 3/8" x 96", 12 Row 36"/38" "Y" Hitch, 12 Row 30" "T" Hitch
			And 16 Row 30" "Y" Hitch (If Applicable)
18.	G6400-08	1	Connector W/O-Ring, 3/4"-16 Male JIC To O-Ring
	GR1037	-	O-Ring
19.	G2403-10	2	Union, 7/8"-14 Male JIC

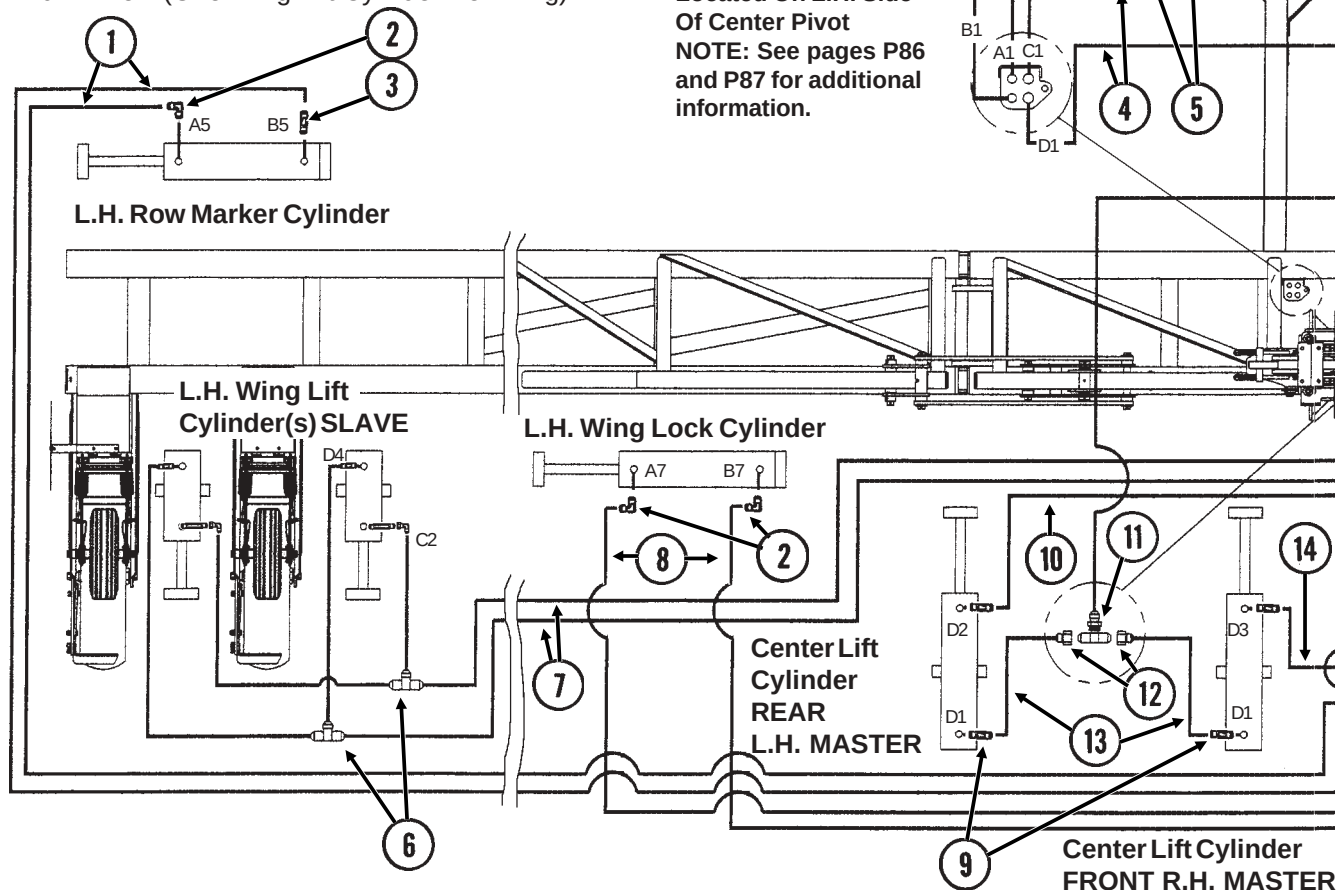
* Hydraulic hose is not stocked by KINZE® Repair Parts, but can be made available on a special order basis. Call for quote.

HYDRAULIC HOSES AND FITTINGS ON PLANTER FRAME

(TWL105b)

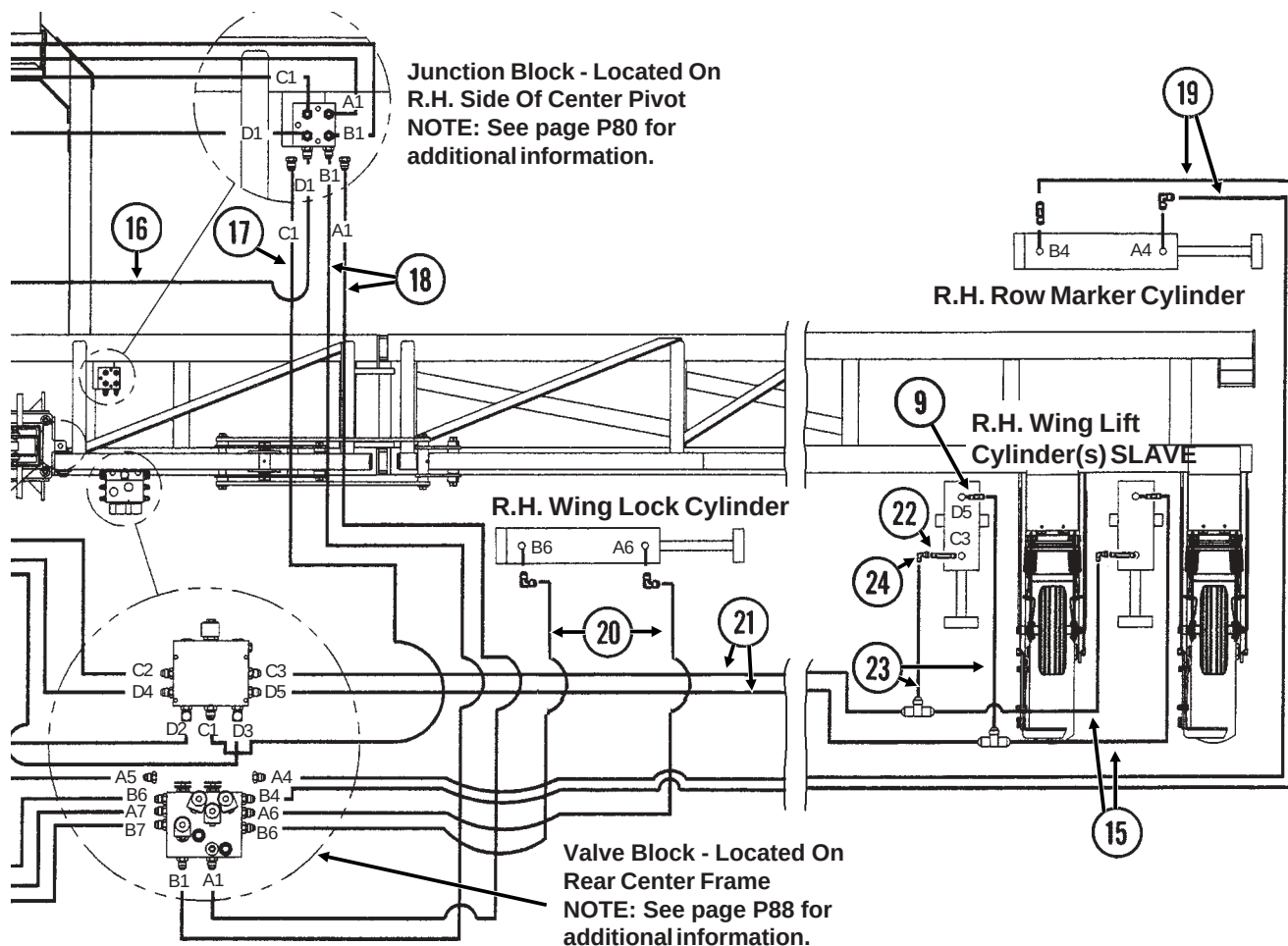
16 Row Shown (Two Wing Lift Cylinders Per Wing)
8 And 12 Row (One Wing Lift Cylinder Per Wing)

Hose Support/Junction - Located On L.H. Side Of Center Pivot
NOTE: See pages P86 and P87 for additional information.



ITEM	PART NO.	QTY.	DESCRIPTION
1.	*A3141	2	Hose Assembly, $\frac{3}{8}$ " x 260", 8 Row 36"/38"
	*A1034	2	Hose Assembly, $\frac{3}{8}$ " x 272", 12 Row 30"
	*A3106	2	Hose Assembly, $\frac{3}{8}$ " x 318", 12 Row 36"/38"
	*A3181	2	Hose Assembly, $\frac{3}{8}$ " x 332", 16 Row 30"
2.	G6801-08	6	Elbow W/O-Ring, 90°, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
3.	G6400-08-04	2	Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To $\frac{7}{16}$ "-20 O-Ring
	GR1465	-	O-Ring
4.	*A1425	2	Hose Assembly, $\frac{1}{2}$ " x 60", 8 Row 36"/38" And 12 Row 36"/38"
	*A1403	2	Hose Assembly, $\frac{1}{2}$ " x 56", 12 Row 30" And 16 Row 30"
5.	*A1022	2	Hose Assembly, $\frac{3}{8}$ " x 60", 8 Row 36"/38" And 12 Row 36"/38"
	*A1021	2	Hose Assembly, $\frac{3}{8}$ " x 56", 12 Row 30" And 16 Row 30"
6.	G2603-08	4	Tee, $\frac{3}{4}$ "-16 Male JIC, 16 Row 30"
7.	*A1093	2	Hose Assembly, $\frac{3}{8}$ " x 230", 8 Row 36"/38"
	*A1033	2	Hose Assembly, $\frac{3}{8}$ " x 250", 12 Row 30"
	*A3185	2	Hose Assembly, $\frac{3}{8}$ " x 284", 12 Row 36"/38"
	*A1034	2	Hose Assembly, $\frac{3}{8}$ " x 272", 16 Row 30"
8.	*A1055	2	Hose Assembly, $\frac{3}{8}$ " x 66"
9.	G6400-08	8	Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
10.	*A3131	1	Hose Assembly, $\frac{3}{8}$ " x 42"
11.	G2703-10	1	Bulkhead Tee, $\frac{7}{8}$ "-14 Male JIC
12.	G2406-10-08	2	Reducer, $\frac{7}{8}$ "-14 Female JIC To $\frac{3}{4}$ "-16 Male JIC
13.	*A1076	2	Hose Assembly, $\frac{3}{8}$ " x 30"

HYDRAULIC HOSES AND FITTINGS ON PLANTER FRAME

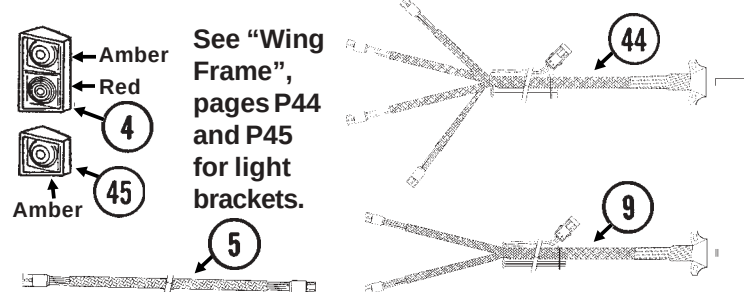
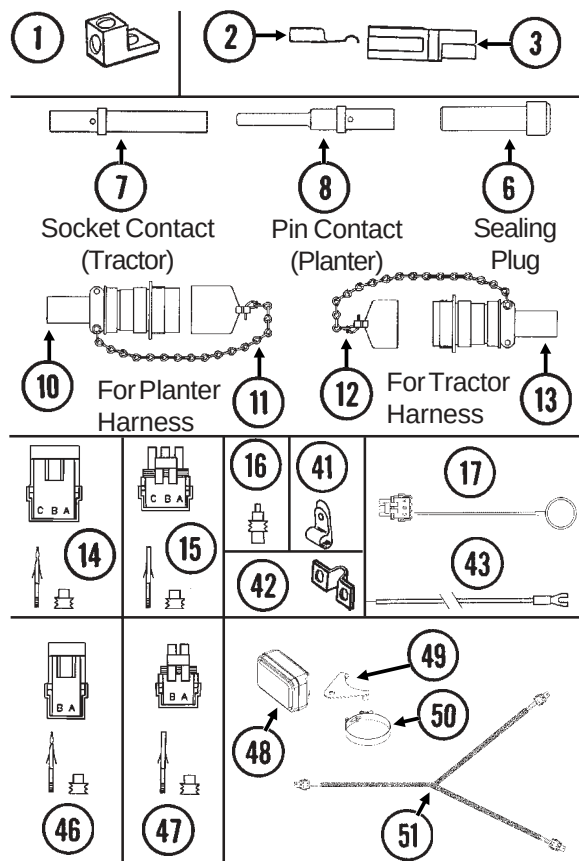


ITEM	PART NO.	QTY.	DESCRIPTION
14.	*A3128	1	Hose Assembly, $\frac{3}{8}$ " x 52"
15.	*A1018	4	Hose Assembly, $\frac{3}{8}$ " x 40", 16 Row 30"
16.	*A1404	1	Hose Assembly, $\frac{1}{2}$ " x 41"
17.	*A1424	1	Hose Assembly, $\frac{1}{2}$ " x 30"
18.	*A1076	2	Hose Assembly, $\frac{3}{8}$ " x 30"
19.	*A1054	2	Hose Assembly, $\frac{3}{8}$ " x 204", 8 Row 36"/38"
	*A3163	2	Hose Assembly, $\frac{3}{8}$ " x 225", 12 Row 30"
	*A1036	2	Hose Assembly, $\frac{3}{8}$ " x 280", 12 Row 36"/38"
	*A1097	2	Hose Assembly, $\frac{3}{8}$ " x 288", 16 Row 30"
20.	*A1076	2	Hose Assembly, $\frac{3}{8}$ " x 30"
21.	*A3101	2	Hose Assembly, $\frac{3}{8}$ " x 168", 8 Row 36"/38"
	*A1028	2	Hose Assembly, $\frac{3}{8}$ " x 186", 12 Row 30"
	*A1031	2	Hose Assembly, $\frac{3}{8}$ " x 234", 12 Row 36"/38"
	*A1057	2	Hose Assembly, $\frac{3}{8}$ " x 216", 16 Row 30"
22.	G6400-L-08	-	Long Connector W/O-Ring, $\frac{3}{4}$ "-16 Male JIC To O-Ring
	GR1037	-	O-Ring
23.	*A3122	4	Hose Assembly, $\frac{3}{8}$ " x 10 $\frac{1}{2}$ ", 16 Row 30"
24.	G6500-08	-	Swivel Elbow, 90°, $\frac{3}{4}$ "-16 Male JIC To Female

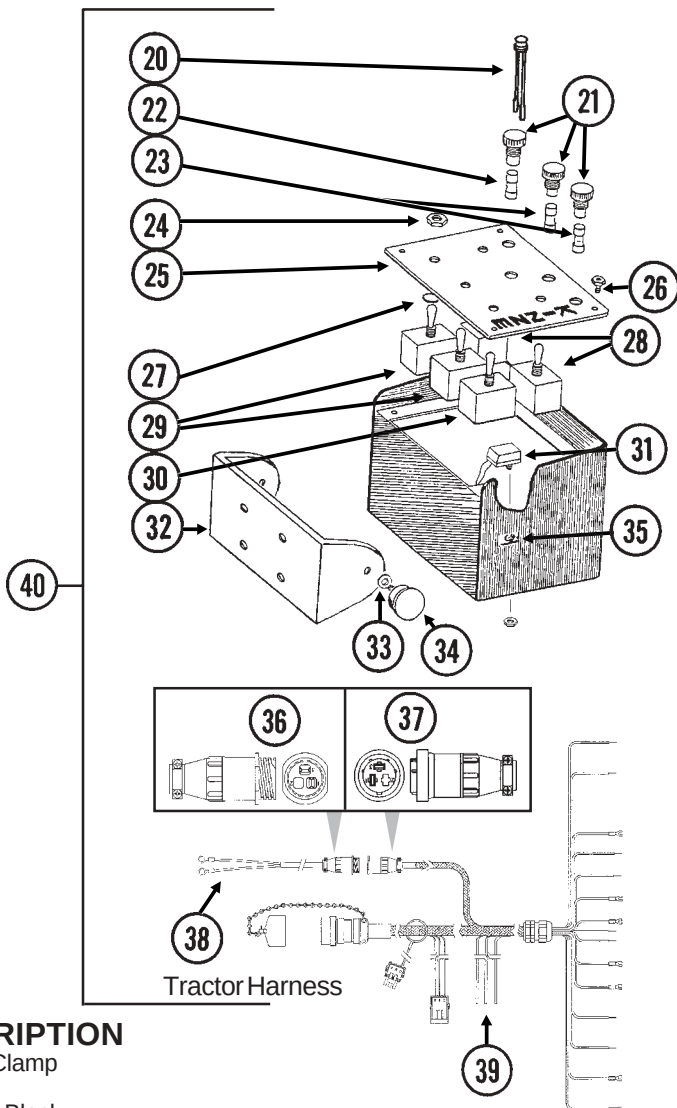
* Hydraulic hose is not stocked by KINZE® Repair Parts, but can be made available on a special order basis. Call for quote.

ELECTRICAL COMPONENTS

(TWL19a/TWL18/ELC14/ELC3a/ELC5c/MTR27a/ELC39/TWL26e/ELC8/A9481/ELC12b/MTR27i/A9689/A10924ELC4/FF27b/FF27c/ELC38/A9201a/A9202a/TWL20g/ELC34/ELC35/ELC10c)



See "Wing Frame", pages P44 and P45 for light brackets.



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA3584	-	Ground Clamp
2.	GD9530	-	Contact
3.	GD9529	-	Housing, Black
	GD12726	-	Housing, Red
4.	GA6699	1	Double Light Assembly (Shown)
	GA6700	1	Double Light Assembly
	GR1203	-	Red Lens
	GR1204	-	Amber Lens
	GR1205	-	Cover
	GR1206	-	Rubber Grommet (4)
	GR1207	-	Lamp Unit
	GR1208	-	Bulb
5.	GA9096	-	Harness Extension, 42"
6.	GD8739	-	Sealing Plug, No. 12
7.	GD8740	-	Socket Contact, No. 14
8.	GD8741	-	Pin Contact, No. 14

ELECTRICAL COMPONENTS

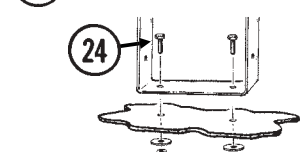
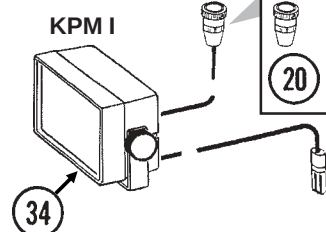
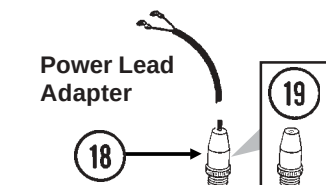
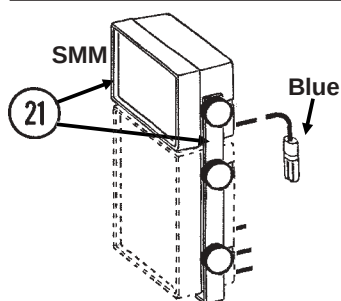
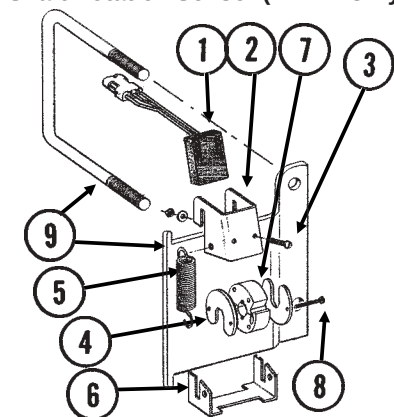
ITEM	PART NO.	QTY.	DESCRIPTION
9.	GA9202	-	Wiring Harness W/7 Terminal Female Connector, 786" (2 Light Connections), 12 Row 30"
	GA9204	-	Wiring Harness W/7 Terminal Female Connector, 882" (2 Light Connections), 16 Row 30"
	GA5385	-	7 Terminal Female Connector
10.	GA6109	1	Connector W/Cable Clamp, 23 Pin Capacity
11.	GA7862	-	Dust Cap W/Chain
12.	GA7863	-	Dust Cap W/Chain
13.	GA6108	1	Connector W/Cable Clamp, 23 Socket Capacity
14.	G1K248	-	3-Pin Female Connector Kit (Black), Includes: (3) 3-Pin Female Housings, (9) Pin Contacts, (9) Seals
15.	G1K252	-	3-Pin Male Connector Kit (Black), Includes: (3) 3-Pin Male Housings, (9) Socket Contacts, (9) Seals
16.	GD11089	-	Sealing Plug
17.	GA8047	-	Dust Plug (Black)
18.	GA9112	1	Wiring Harness W/Dust Cap, 516", 8 Row 36"/38" And 12 Row 30"
	GA9113	-	Wiring Harness W/Dust Cap, 636", 12 Row 36"/38" And 16 Row 30"
19.	GA7399	-	Harness Extension W/Dust Caps, 180"
20.	GA7077	1-4	Indicator Light
21.	GA2612	3-5	Fuse Holder W/Spade, 1 ³³ / ₅₀ "
22.	GD2829	1-2	Fuse, 15 Amp, Type AGC
23.	GD10243	2-6	Fuse, MDL 10 Amp Delay Action
24.	GR1363	5	Hex Face Nut, ¹⁵ / ₃₂ "-32
	GR1364	5	Internal Tooth Lock Washer, ¹⁵ / ₃₂ "
25.	GA8734	1	Cover Plate (Shown)
	GA8735	-	Cover Plate, Planters Equipped With Two-Speed Point Row Clutch
26.	GR1292	4	Pan Head Screw, No. 8-32 x ¹ / ₂ "
27.	GD3860	-	O-Ring (If Applicable)
28.	GA2528	2	Switch, 3 Position Toggle, On-Off-On
29.	GA6978	2	Switch, 3 Position Toggle, Momentary On-Off-Momentary On
30.	GA6977	1-2	Switch, 2 Position Toggle, On-Off
31.	GA8731	1	Switch, Push Button W/Transformer
32.	GD9896	1	Mounting Bracket
33.	G10211	4	Washer, ¹ / ₄ " SAE
34.	GA6975	2	Knob
35.	GR1290	2	Cage Nut, ¹ / ₄ "-20
36.	G1K267	-	Power Lead Adapter Connector Kit, Includes: (1) 3-Pin Connector, (1) Cable Clamp, (3) Male Terminal Pins
37.	G1K268	-	Console Cable Connector Kit, Includes: (1) 3-Pin Connector, (1) Cable Clamp, (1) Lock Ring, (3) Female Terminal Pins
38.	GA7856	1	Power Lead Adapter
39.	GA8729	1	Wiring Harness W/Dust Cap And Power Cable
40.	G7633X	-	Backlit Control Console Assembly W/Mounting Brackets, Short Harness W/Dust Cap And Power Cable
	G7639X	-	Backlit Control Console Assembly W/Mounting Brackets, Short Harness W/Dust Cap And Power Cable, Planters Equipped With Two-Speed Point Row Clutch
41.	GD6291	-	Insulated Clamp, ³ / ₈ "
	GD13348	-	Insulated Clamp, ¹¹ / ₁₆ "
42.	GD13310	-	Jumper, ⁷ / ₁₆ "
43.	GA9481	-	Jumper Wire W/Fork Terminal, 13"
	G10996	-	Fork Terminal
44.	GA9201	1	Wiring Harness W/7 Terminal Female Connector, 714" (4 Light Connections), 8 Row 36"/38"
	GA9203	-	Wiring Harness W/7 Terminal Female Connector, 870" (4 Light Connections), 12 Row 36"/38"
	GA5385	-	7 Terminal Female Connector
45.	GA6701	1	Single Amber Light Assembly
	GR1204	-	Amber Lens
	GR1206	-	Rubber Grommet (2)
	GR1207	-	Lamp Unit
	GR1208	-	Bulb
46.	G1K321	-	2-Pin Female Connector Kit (Black), Includes: (3) 2-Pin Female Housings, (6) Pin Contacts, (6) Seals
47.	G1K320	-	2-Pin Male Connector Kit (Black), Includes: (3) 2-Pin Male Housings, (6) Socket Contacts, (6) Seals
48.	GA9689	2	Work Light Assembly
49.	GD16046	2	Bracket
50.	G11159	1-2	T-Bolt Clamp, 3 ¹ / ₂ " Stainless Steel
51.	GA10924	1	Wiring Harness, 348"

NOTE: See "Point Row Clutch" or "Two-Speed Point Row Clutch" for R.H. and L.H. Wiring Harness for the point row clutches. See "KPM I/KPM II Electronic Seed Monitor" or "KPM II Stack-Mode Electronic Seed Monitor" for those components.

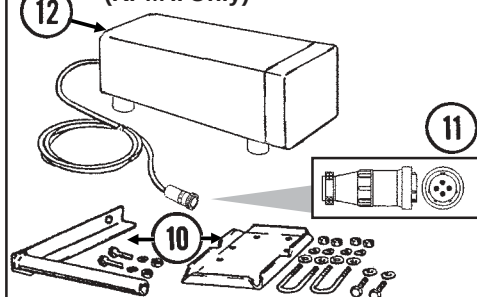
KPM I/KPM II STACK-MODE ELECTRONIC SEED MONITOR

(MTR430)

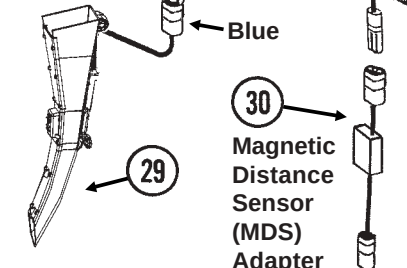
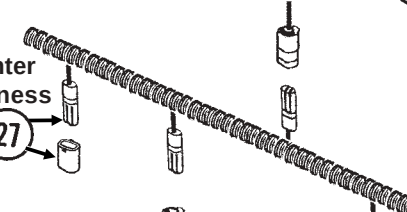
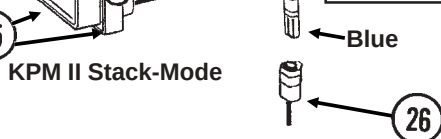
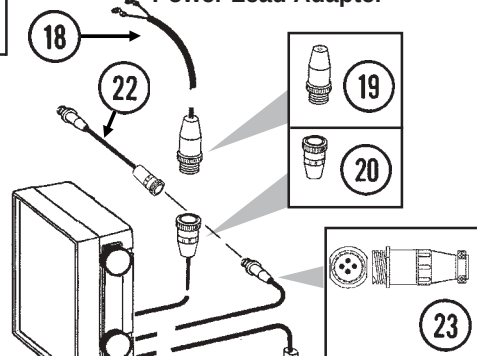
Shaft Rotation Sensor (KPM II Only)



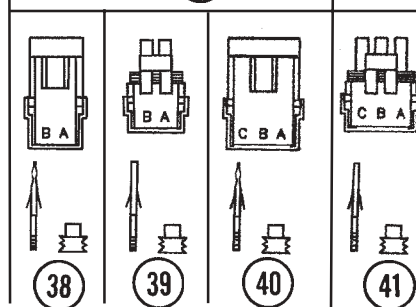
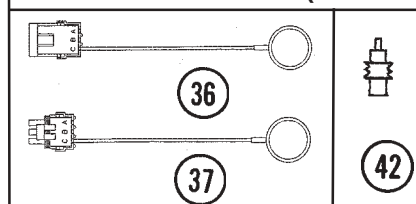
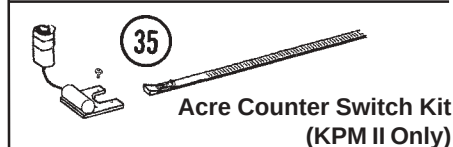
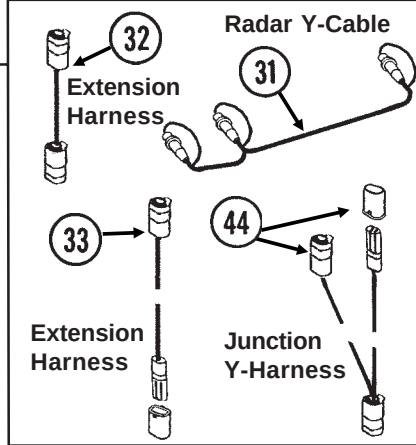
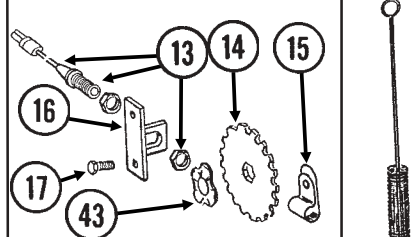
Radar Distance Sensor (KPM II Only)



Power Lead Adapter



Magnetic Distance Sensor (MDS) (KPM II Only)



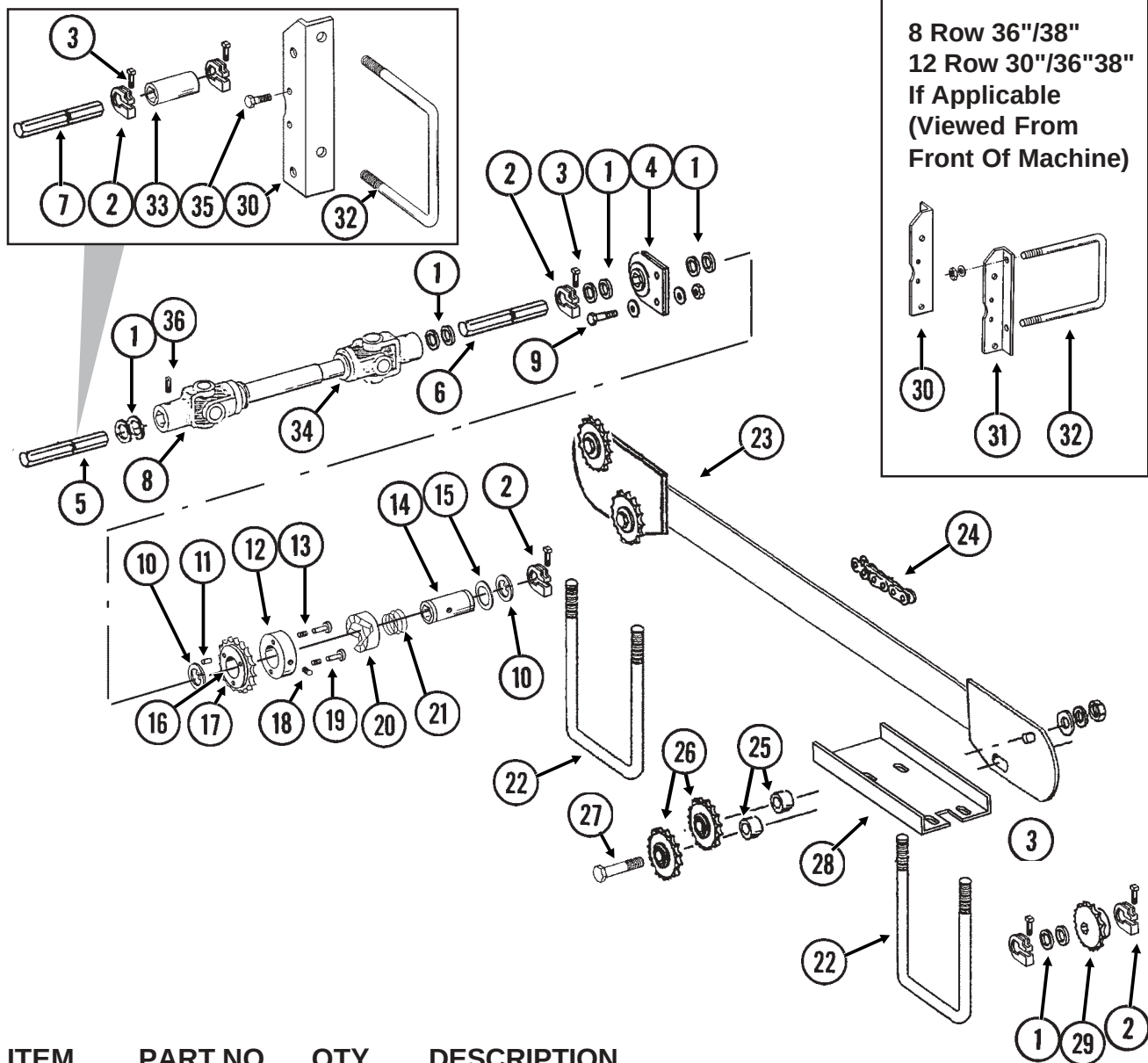
ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR1415	1	Rotation Sensor
2.	GD11169	1	Mount
3.	G10757	2	Pan Head Screw, No. 10-32 x 1 1/4"
	G10243	2	Washer, No. 10 SAE
	G10758	2	Hex Nut, No. 10-32
4.	GD11474	2	Cover
5.	GD5857	2	Spring
6.	GD11170	1	Spring Mount
7.	GR1414	1	Actuator
8.	G10927	2	Pan Head Machine Screw, No. 8-32 x 1 1/4", Stainless Steel
	G10931	2	Lock Washer, No. 8, Internal/External, Stainless Steel
	G10928	2	Hex Nut, No. 8-32, Stainless Steel
9.	G1K364	-	Rotation Sensor Mount Kit, Includes: (2) Mounts, (2) GD11721 5" x 7" U-Bolts, (4) G10228 Lock Washers, (4) G10102 Hex Nuts, (1) Instruction
10.	GA8026	-	Radar Sensor Pipe/Mounting Bracket Package
11.	G1K323	-	4-Pin Connector Kit W/Female Housing, 4 Pins And Cable Clamp
12.	GA7858	-	Radar Distance Sensor W/20' Cable

KPM I/KPM II STACK-MODE ELECTRONIC SEED MONITOR

ITEM	PART NO.	QTY.	DESCRIPTION
13.	GA5600	1	Magnetic Distance Sensor
14.	GD8751	-	Magnetic Distance Sensor Pulse Wheel
15.	GD6291	-	Insulated Clamp, ³ / ₈ "
16.	GD8770	1	Bracket
17.	G10001	2	Hex Head Cap Screw, ³ / ₈ "-16 x 1"
	G10229	2	Lock Washer, ³ / ₈ "
	G10101	2	Hex Nut, ³ / ₈ "-16
18.	GA7856	1	Power Lead Adapter
19.	G1K267	-	Power Lead Adapter Connector Kit, Includes: (1) Cable Clamp, (1) 3-Pin Connector, (3) Male Terminal Pins
20.	G1K268	-	Console Cable Connector Kit, Includes: (1) Cable Clamp, (1) 3-Pin Connector, (1) Lock Ring, (3) Female Terminal Pins
21.	GA9857	1	SMM Backlit Console W/Mounting Bracket And Dust Plug (Item 36)
	GR1631	-	Mounting Bracket, KPM II Stack-Mode And SMM Consoles
	GR1632	-	Console Mounting Bracket Hardware Package (Includes 2 Knobs And ¹ / ₄ " Hardware)
22.	GA9144	-	Monitor/Radar Adapter, 10"
23.	G1K322	-	4-Pin Connector Kit W/Male Housing, 4 Female Socket Contacts And Cable Clamp
24.	G10022	2	Hex Head Cap Screw, ¹ / ₄ "-20 x ¹ / ₂ "
	G10211	2	Washer, ¹ / ₄ " SAE
	G10227	2	Lock Washer, ¹ / ₄ "
	G10103	2	Hex Nut, ¹ / ₄ "-20
25.	GA10575	-	KPM II Backlit Console W/Mounting Bracket, Fuse Holder And Fuse, Power Lead Adapter (Item 18), Brush (Item 28), Dust Plug (Item 36) And Monitor/Radar Adapter, 10" (Item 22)
	GR1391	-	Mounting Bracket, KPM II
	GR1393	-	Console Mounting Bracket Hardware Package (Includes 4 Knobs And ¹ / ₄ " Hardware)
	GA10601	-	Fuse Holder
	GD7639	-	Fuse
26.		-	Included In Tractor/Planter Wiring Harnesses, See Items 18 And 39 On Pages P90 And P91
27.	GA8022	1	Planter Harness W/Dust Caps, 6 Row (9 Connectors)
	GA7850	1	Planter Harness W/Dust Caps, 8 Row (12 Connectors)
	GA7851	-	Planter Harness W/Dust Caps, 12 Row (16 Connectors)
	GA7852	1	Planter Harness W/Dust Caps, 16 Row (20 Connectors)
	GD11993	-	Dust Cap
28.	GR0594	-	Brush
29.	GA10901	-	Seed Tube W/Computerized Sensor (Shown)
	GR1629	-	Sensor Only
	GA10940	-	Seed Tube (With Holes For Sensor Installation)
	GA10142	-	Seed Tube W/Computerized Sensor (Optional For Large Seed)
	GR1737	-	Sensor Only
	GA10136	-	Seed Tube (With Holes For Sensor Installation)
30.	GA7859	1	Magnetic Distance Sensor Adapter (Analog To Digital)
31.	GR0586	1	Radar Y-Cable (Used To Connect Radar Distance Sensor For Multiple Functions)
32.	GA7857	-	Extension Harness, 1'
33.	GA7854	-	Extension Harness W/Dust Cap, 15'
	GA7855	-	Extension Harness W/Dust Cap, 30'
	GD11993	-	Dust Cap
34.	GA10570	1	KPM I Backlit Console W/Mounting Bracket, Fuse Holder And Fuse, Power Lead Adapter (Item 18), Brush (Item 28) And Dust Plug (Item 36)
	GR1390	-	Mounting Bracket, KPM I
	GR1392	-	Console Mounting Bracket Hardware Package (Includes 2 Knobs And ¹ / ₄ " Hardware)
	GA10601	-	Fuse Holder
	GD7639	-	Fuse
35.	G1K249	-	Acre Counter Switch Kit
36.	GA8046	-	Dust Plug (Black)
	GA9978	-	Dust Plug (Blue)
37.	GA8047	-	Dust Plug (Black)
	GA9979	-	Dust Plug (Blue)
38.	G1K321	-	2-Pin Female Connector Kit (Black), Includes: (3) 2-Pin Female Housings, (6) Pin Contacts, (6) Seals
39.	G1K320	-	2-Pin Male Connector Kit (Black), Includes: (3) 2-Pin Male Housings, (6) Socket Contacts, (6) Seals
40.	G1K248	-	3-Pin Female Connector Kit (Black), Includes: (3) 3-Pin Female Housings, (9) Pin Contacts, (9) Seals
	G1K362	-	3-Pin Female Connector Kit (Blue), Includes: (3) 3-Pin Female Housings, (9) Pin Contacts, (9) Seals
41.	G1K252	-	3-Pin Male Connector Kit (Black), Includes: (3) 3-Pin Male Housings, (9) Socket Contacts, (9) Seals
	G1K363	-	3-Pin Male Connector Kit (Blue), Includes: (3) 3-Pin Male Housings, (9) Socket Contacts, (9) Seals
42.	GD11089	-	Sealing Plug
43.	GD8771	1	Spring Wave Washer
44.	GA7853	-	Junction Harness W/Dust Cap
	GD11993	-	Dust Cap
A.	GA6147	-	Magnetic Distance Sensor And Mounting Package (Items 13-17 And 43)

INTERPLANT® PUSH ROW UNIT DRIVE

PTD073/PTD076(RU134/TWL33n/TWL33o)



ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Side)	

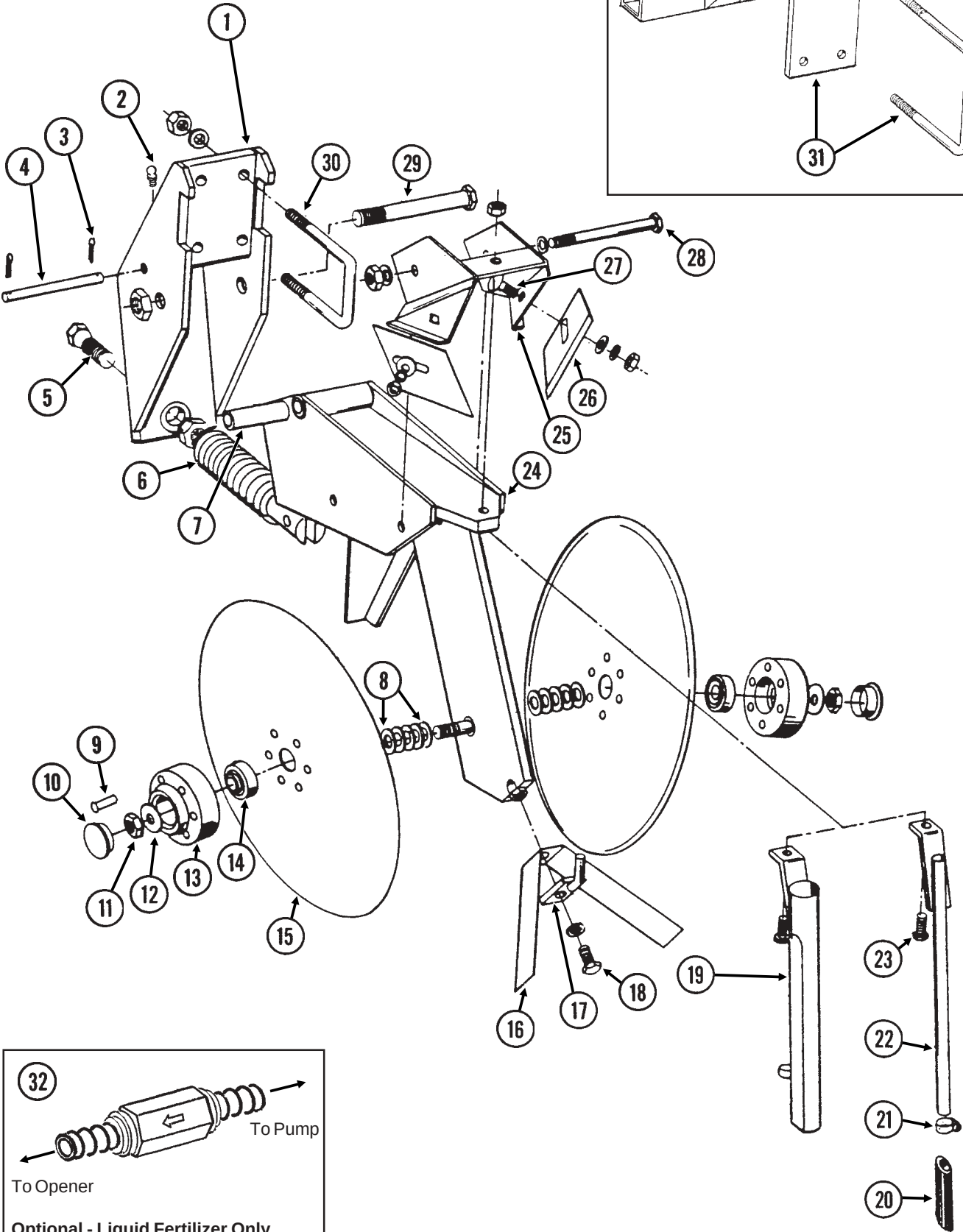
1.	G10233	-	Machine Bushing, 1", 10 Gauge (As Required)
2.	GD11045	-	Lock Clamp
3.	G10130	-	Square Head Machine Bolt, $\frac{5}{16}$ "-18 x 1 $\frac{3}{4}$ "
	G10923	-	Flange Nut, $\frac{5}{16}$ "-18, No Serration
4.	GA2180	-	Hanger Bearing, $\frac{7}{8}$ " Hex Bore
5.	GD0914-55	1	Hex Shaft, $\frac{7}{8}$ " x 55" (No Holes), R.H. Side, 8 Row 36"/38"
	GD0914-84	1	Hex Shaft, $\frac{7}{8}$ " x 84" (No Holes), L.H. Side, 8 Row 36"/38"
	GD0914-48	-	Hex Shaft, $\frac{7}{8}$ " x 48" (No Holes), R.H. Side, 12 Row 30" And 16 Row 30"
	GD0914-66	-	Hex Shaft, $\frac{7}{8}$ " x 66" (No Holes), L.H. Side, 12 Row 30" And 16 Row 30"
	GD0914-55	-	Hex Shaft, $\frac{7}{8}$ " x 55" (No Holes), R.H. Side, 12 Row 36"/38"
	GD0914-84	-	Hex Shaft, $\frac{7}{8}$ " x 84" (No Holes), L.H. Side, 12 Row 36"/38"
6.	GD0914-49	1	Hex Shaft, $\frac{7}{8}$ " x 49" (No Holes), Both Sides, 8 Row 36"/38"
	GD0914-90	-	Hex Shaft, $\frac{7}{8}$ " x 90" (No Holes), Both Sides, 12 Row 30"
	GD0914-108	-	Hex Shaft, $\frac{7}{8}$ " x 108" (No Holes), Both Sides, 12 Row 36"/38"
	GD0914-124	-	Hex Shaft, $\frac{7}{8}$ " x 124" (No Holes), R.H. Side, 16 Row 30"
	GD0914-138	-	Hex Shaft, $\frac{7}{8}$ " x 138" (No Holes), L.H. Side, 16 Row 30"
7.	GD0914-24	-	Hex Shaft, $\frac{7}{8}$ " x 24" (No Holes), 12 Row 30" W/Even-Row Push Row Unit
	GD0914-33	-	Hex Shaft, $\frac{7}{8}$ " x 33" (No Holes), 16 Row 30" W/Even-Row Push Row Unit

INTERPLANT® PUSH ROW UNIT DRIVE

ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
8.	GA7053	1	U-Joint W/Grease Fitting, Female, 18 1/8" Long, 8 Row 36"/38" And 12 Row 36"/38"
	GA7052	-	U-Joint W/Grease Fitting, Female, 10 1/4" Long, 12 Row 30" And 16 Row 30"
	GR1557	-	Grease Fitting, 45°, Metric
	GR1297	-	Inboard Yoke And Outer Profile (10 1/4" U-Joint)
	GR1298	-	Inboard Yoke And Outer Profile (18 1/8" U-Joint)
	GR1294	-	Cross And Bearing Kit
	GR1293	-	Yoke, 7/8" Hex
9.	G10004	-	Hex Head Cap Screw, 3/8"-16 x 1 1/4"
	G10210	-	Washer, 3/8" USS
	G10229	-	Lock Washer, 3/8"
	G10101	-	Hex Nut, 3/8"-16
10.	G10496	2	External Inverted Snap Ring, 1 1/2"
11.	G10968	1	Spring Pin, 5/32" x 7/16"
12.	GR1405	1	Lock Collar
13.	GR1413	1	Spring
14.	GR1407	1	Drive Shaft
15.	GR1411	1	Shim
16.	GR1406	1	Bushing
17.	GR1412	1	Sprocket, 19 Tooth
18.	G10535	1	Hex Socket Set Screw, 3/8"-16 x 3/4"
19.	GR1410	1	Pin
20.	GR1409	1	Knurled Collar
21.	GR1408	1	Compression Spring
22.	GD8306	2	U-Bolt, 7" x 5" x 1/2"-13
	G10228	4	Lock Washer, 1/2"
	G10102	4	Hex Nut, 1/2"-13
23.	GA9138	1	Mount
24.	G3310-226	1	Chain, No. 40, 226 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
25.	GD9229	4	Spacer, 1 1/4" O.D. x 1/2" Long (If Applicable)
26.	GA7154	4	Sprocket W/Bearing, 18 Tooth
27.	G10016	4	Hex Head Cap Screw, 1/2"-13 x 2"
	G10168	4-8	Machine Bushing, 1/2", 7 Gauge
	G10228	4	Lock Washer, 1/2"
	G10102	4	Hex Nut, 1/2"-13
28.	GD14417	1	Hose Protector
29.	GA5107	2	Sprocket, 19 Tooth
30.	GD11972	-	Support Angle, R.H.
31.	GD11973	-	Support Angle, L.H.
32.	GD1113	-	U-Bolt, 5" x 7" x 5/8"-11
	G10230	-	Lock Washer, 5/8"
	G10104	-	Hex Nut, 5/8"-11
33.	GD1719	-	Coupler, 4"
34.	GA7051	1	U-Joint W/Grease Fitting, Male, 12 1/4" Long
	GR1557	-	Grease Fitting, 45°, Metric
	GR1296	-	Inner Profile
	GR1295	-	Inboard Yoke
	GR1301	-	Spring Pin, 8mm x 50mm
	GR1294	-	Cross And Bearing Kit
	GR1293	-	Yoke, 7/8" Hex
35.	G10752	-	Hex Head Cap Screw, 5/8"-18 x 2 1/4"
	GD7805	-	Special Washer, 5/8", Hardened
	G10412	-	Lock Nut, 5/8"-18
36.	G10688	-	Square Head Set Screw, 3/8"-16 x 5/8"
A.	GA8092	-	Clutch Sprocket Assembly, 19 Tooth (Items 10-21)
B.	G1K269	-	Lock Clamp Kit (Items 2 And 3)
C.	G1K331	-	Clutch Sprocket Kit (Items 11, 16 And 17)

DOUBLE DISC FERTILIZER OPENER AND MOUNT

FOC007(PT25e/TWL34a/FRTZ208)

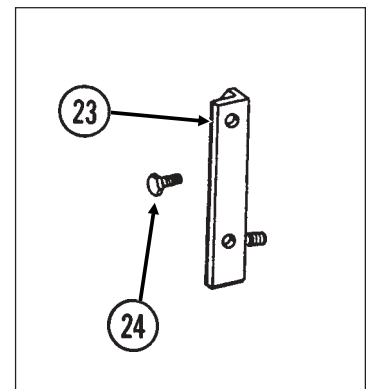
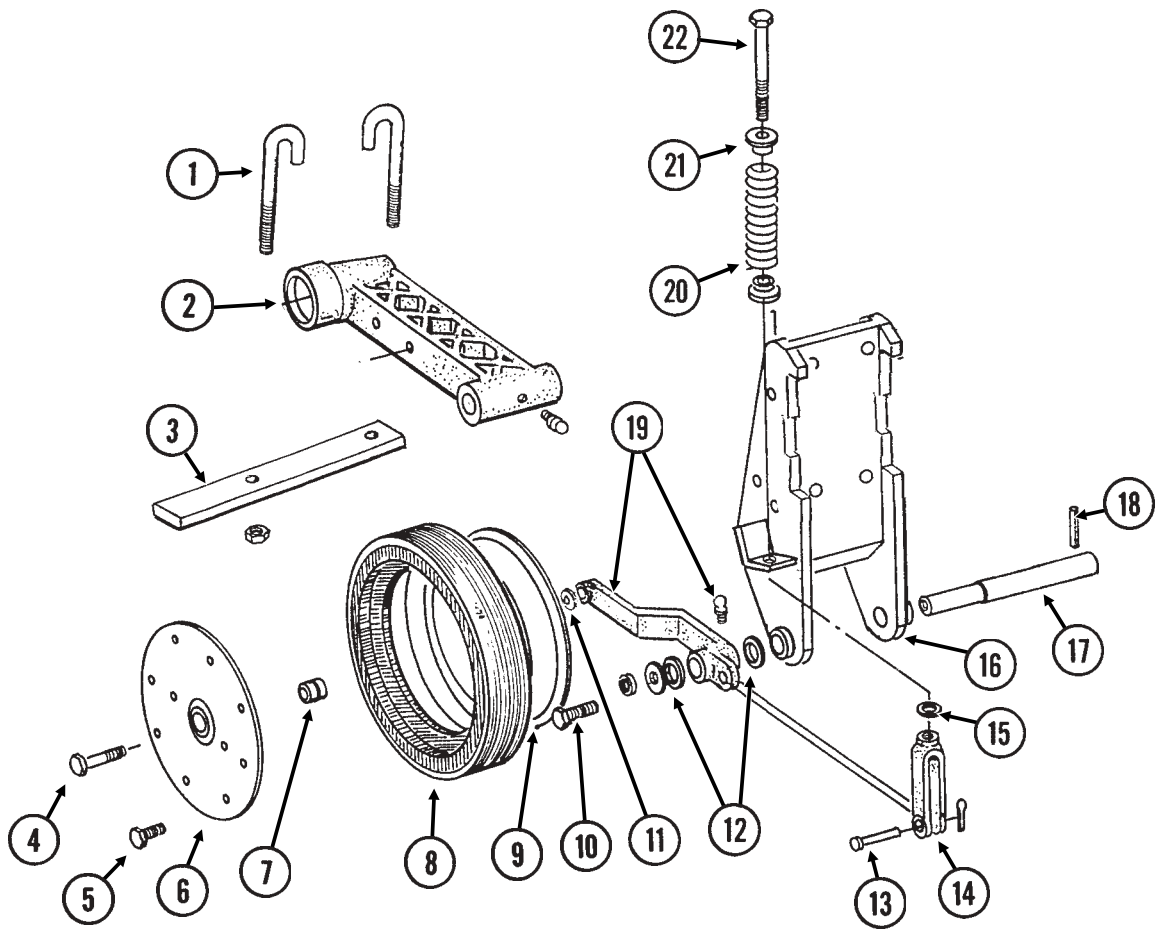


DOUBLE DISC FERTILIZER OPENER AND MOUNT

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
1.	GA8483	1	Bracket
2.	G10938	1	Grease Fitting, 1/4"-28, Taper Thread
3.	G10451	2	Cotter Pin, 1/8" x 1"
4.	GD1657	1	Lockup Pin
5.	GD0962	1	Hex Head Adjusting Bolt, 5/8"-18 x 3 1/4"
	G10499	1	Hex Jam Nut, 5/8"-18, Grade 2
6.	GA0328	1	Spring
7.	GD0487	1	Bushing, 41/64" I.D. x 3 1/2" Long
8.	G10213	-	Machine Bushing, 5/8" (.030" Thick)
9.	G10542	12	Rivet, 1/4" x 1 5/16"
10.	GD1132	2	Dust Cap
11.	G10503	1	Hex Jam Nut, 5/8"-11, Grade 2
	G10504	1	Hex Jam Nut, 5/8"-11, L.H. Threads, Grade 2
12.	G10204	2	Special Machine Bushing, 5/8" x 1" O.D.
13.	GB0134	2	Hub
14.	GA2014	2	Bearing
15.	GD11306	2	Disc Blade, 3.5 mm x 15"
16.	GD2589	1	Inner Scraper
17.	GA0312	1	Mount
18.	G10019	1	Hex Head Cap Screw, 5/16"-18 x 1"
	G10232	1	Lock Washer, 5/16"
19.	GA1369	-	Drop Tube, Dry Fertilizer
20.	GD11705	-	Extension
21.	G10681	-	Hose Clamp, No. 6
22.	GA8685	-	Drop Tube, Liquid Fertilizer
23.	G10133	1	Hex Head Cap Screw, 5/16"-18 x 1 1/2"
	G10221	1	Washer, 5/16" SAE
	G10109	1	Lock Nut, 5/16"-18, Grade 8
24.	GA9195	1	Shank
25.	GA0810	1	Scraper Mount
26.	GD1673	2	Scraper
27.	G10305	2	Carriage Bolt, 3/8"-16 x 1"
	G10210	2	Washer, 3/8" USS
	G10229	2	Lock Washer, 3/8"
	G10101	2	Hex Nut, 3/8"-16
28.	G10045	1	Hex Head Cap Screw, 1/2"-13 x 4 1/2"
	G10111	1	Lock Nut, 1/2"-13
29.	G10046	1	Hex Head Cap Screw, 5/8"-11 x 5"
	G10107	1	Lock Nut, 5/8"-11
30.	GD1138	2	U-Bolt, 2 1/2" x 2 1/2" x 1/2"-13
	G10228	4	Lock Washer, 1/2"
	G10102	4	Hex Nut, 1/2"-13
31.	GA7135	1	Mount (One Per Opener) W/U-Bolts
	GD1113	2	U-Bolt, 5" x 7" x 5/8"-11
	G10230	4	Lock Washer, 5/8"
	G10104	4	Hex Nut, 5/8"-11
32.	GA8983	-	Check Valve, Low Rate
A.	GA8845	-	Disc Blade And Bearing Assembly (Items 9 And 13-15)

HD SINGLE DISC FERTILIZER OPENER (Soil Press Wheel)

(TWL35d/TWL35b)

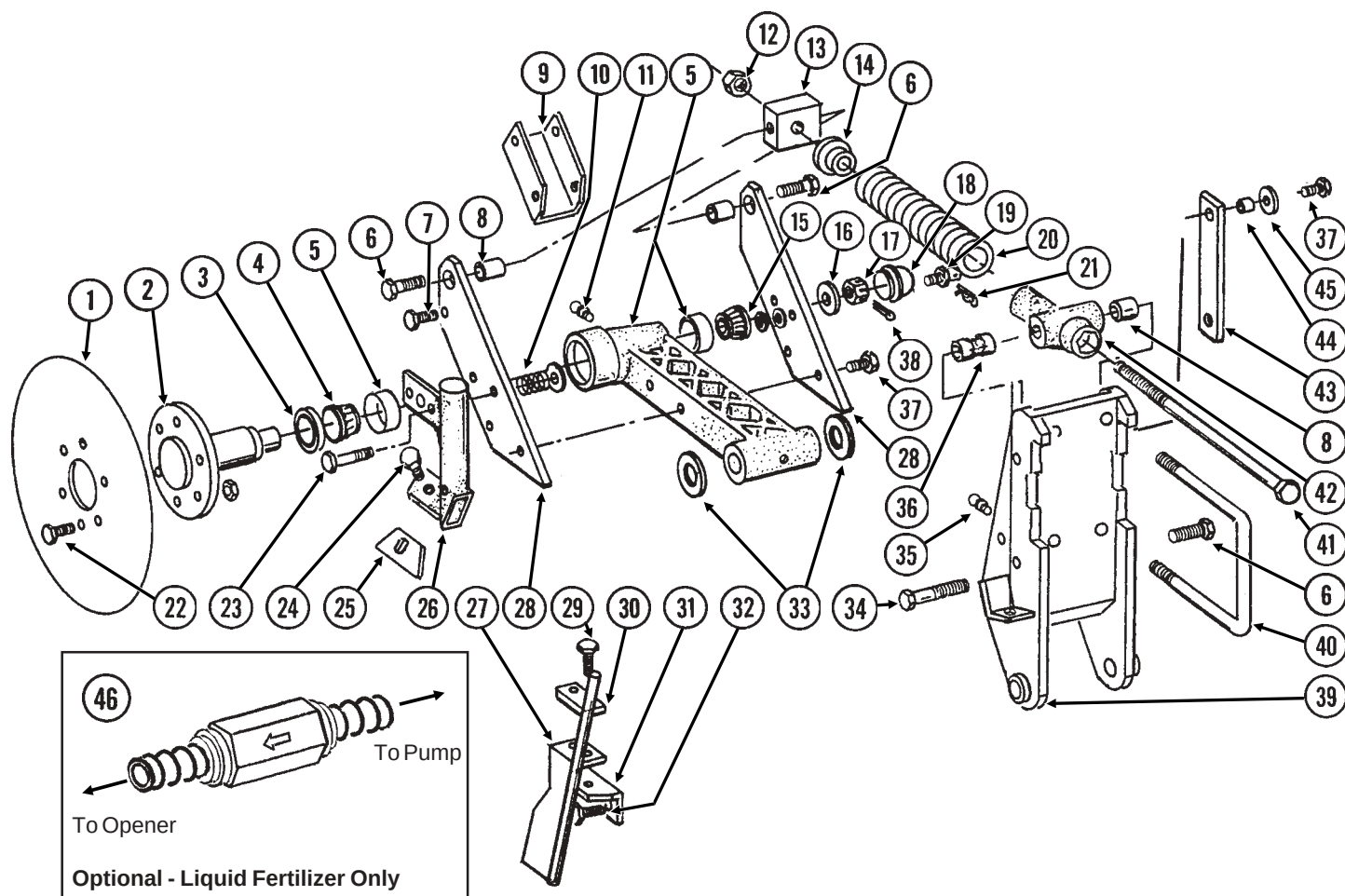


HD SINGLE DISC FERTILIZER OPENER (Soil Press Wheel)

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
1.	GD9705	2	J-Bolt, 1/2"-13
	G10228	2	Lock Washer, 1/2"
	G10102	2	Hex Nut, 1/2"-13
2.		-	See "HD Single Disc Fertilizer Opener (Blade And Drop Tube)", Pages P100 And P101
3.	GD9706	1	Lockup Bar
4.	G10010	1	Hex Head Cap Screw, 5/8"-11 x 3"
5.	G10961	11	Flanged Whiz-Lock Screw, 5/16"-18 x 5/8", No Serration
	G10620	11	Serrated Flange Nut, 5/16"-18
6.	GD11954	1	Half Wheel Cover, Nylon
7.	GA6171	1	Bearing
8.	GD11953	1	Offset Tire
9.	GD11423	1	Half Wheel
10.	G10438	1	Hex Head Cap Screw, 1/2"-13 x 3/4"
	G10228	1	Lock Washer, 1/2"
	G10216	1	Washer, 1/2" USS
11.	G10230	1	Lock Washer, 5/8"
12.	G10526	10	Machine Bushing, 1" (.048" Thick)
13.	G10560	1	Clevis Pin, 1/2" x 1 3/4"
	G10456	1	Cotter Pin, 1/8" x 3/4"
14.	GD8218	1	Yoke
15.	G10205	1	Washer, 5/8" SAE
16.		-	See "HD Single Disc Fertilizer Opener (Blade And Drop Tube)", Pages P100 And P101
17.	GD7911	1	Pivot Pin
18.	G10610	1	Spring Pin, 3/8" x 2"
19.	GA8306	-	Wheel Arm W/Grease Fitting, R.H.
	GA8305	1	Wheel Arm W/Grease Fitting, L.H. (Shown)
	G10640	1	Grease Fitting, 1/4"-28
20.	GD8308	1	Spring
21.	GB0212	2	Washer
22.	GD9709	1	Special Bolt
23.	GA6345	-	Mounting Angle, L.H. (As Required) (Shown)
	GA6344	-	Mounting Angle, R.H. (As Required)
24.	G10005	-	Hex Head Cap Screw, 5/8"-11 x 1 3/4"
	G10230	-	Lock Washer, 5/8"
	G10104	-	Hex Nut, 5/8"-11
A.	G1K215	-	Lockup Kit (Items 1 And 3)
B.	GA8877	-	Gauge Wheel Complete (Items 5-9)

HD SINGLE DISC FERTILIZER OPENER (Blade And Drop Tube)

FOC016/FOC007/FOC019(PT27c/FRTZ208)



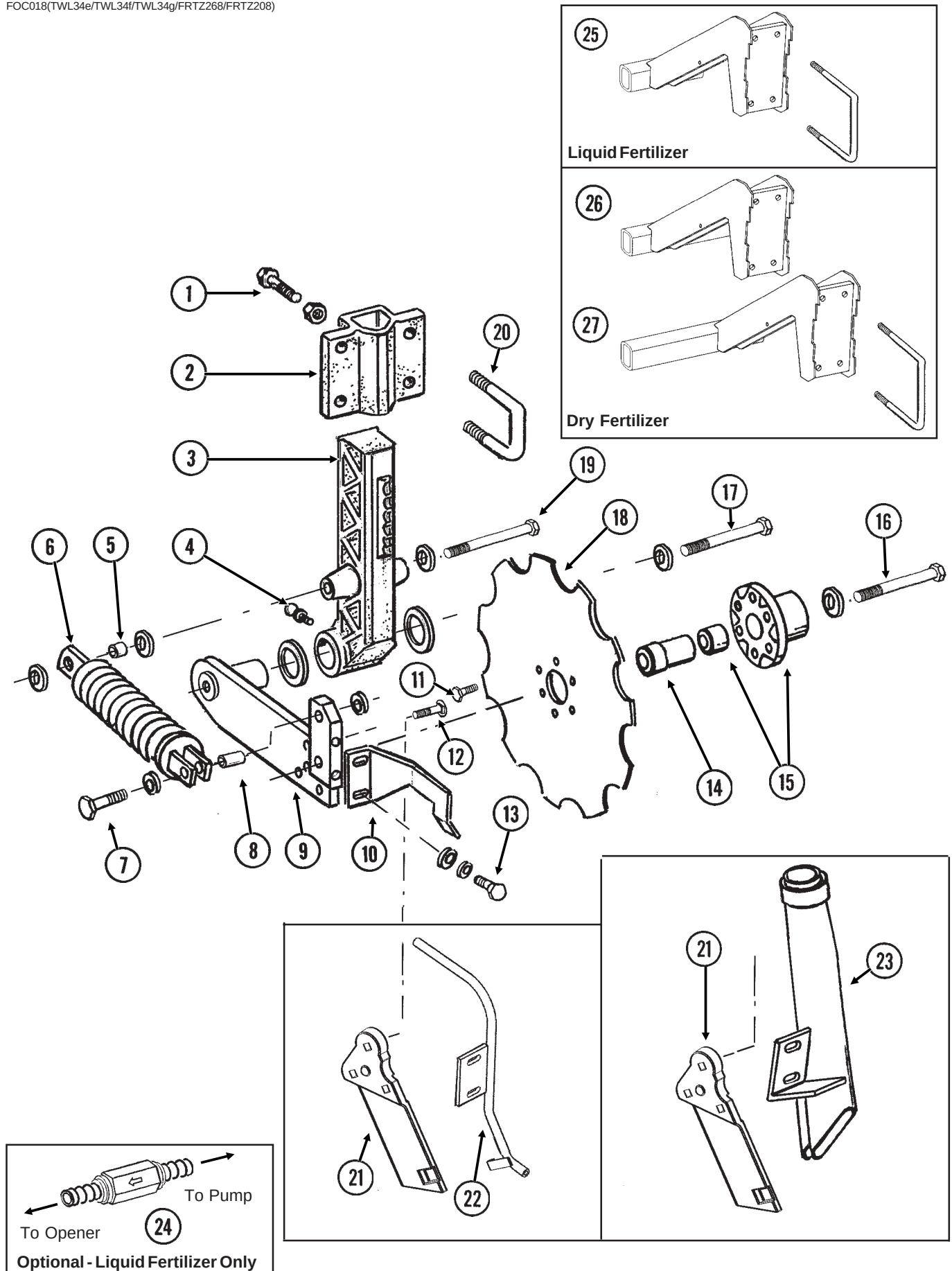
ITEM	PART NO.	QTY.	DESCRIPTION
(Per Assy.)			
1.	GD7900	1	Disc Blade, 18"
	GD8247	-	Disc Blade, 20" (Optional)
2.	GB0205	1	Spindle
3.	GA4286	1	Seal
4.	GA4287	1	Bearing
5.	GA5887	1	Arm W/Cups And Washers
	GD6553	-	Inner Cup
	GR0188	-	Outer Cup
	G10205	3	Washer, 5/8" SAE
6.	G10007	3	Hex Head Cap Screw, 5/8"-11 x 1 1/2"
7.	G10001	2	Hex Head Cap Screw, 3/8"-16 x 1"
	G10108	2	Lock Nut, 3/8"-16
8.	GB0218	3	Bushing, 21/32" I.D. x 7/8" O.D. x 19/32" Long
9.	GD8238	1	Channel
10.	GD7962	2	Spring
11.	G10641	2	Grease Fitting, 1/8" NPT
12.	G10105	3	Hex Nut, 3/4"-10
13.	GD7908	1	Tap Block
14.	GB0213	1	Spring Seat
15.	GA0237	1	Bearing
16.	G10220	1	Machine Bushing, 1 1/16", 10 Gauge
17.	G10507	1	Slotted Nut, 1"-14
18.	GD1104	1	Dust Cap

HD SINGLE DISC FERTILIZER OPENER (Blade And Drop Tube)

ITEM	PART NO.	QTY. (Per Assy.)	DESCRIPTION
19.	GD8276	1	Pin
	G10237	1	Lock Washer, $\frac{7}{16}$ "
	G10100	1	Hex Nut, $\frac{7}{16}$ "-14
20.	GD10273	1	Compression Spring
21.	G10592	1	Hair Pin Clip, No. 11
22.	G10594	6	Bolt, $\frac{1}{2}$ "-13 x 1 $\frac{1}{2}$ "
	G10111	6	Lock Nut, $\frac{1}{2}$ "-13
23.	G10049	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 2 $\frac{1}{2}$ "
	G10210	2	Washer, $\frac{3}{8}$ " USS
	G10108	2	Lock Nut, $\frac{3}{8}$ "-16
24.	G10599	1	Carriage Bolt, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10210	1	Washer, $\frac{3}{8}$ " USS
	G10229	1	Lock Washer, $\frac{3}{8}$ "
	G10101	1	Hex Nut, $\frac{3}{8}$ "-16
25.	GD7912	1	Scraper
26.	GB0210	-	Drop Tube, R.H., Dry Fertilizer
	GB0209	1	Drop Tube, L.H., Dry Fertilizer (Shown)
27.	GA8689	1	Drop Tube, L.H., Liquid Fertilizer (Shown)
	GA8688	-	Drop Tube, R.H., Liquid Fertilizer
28.	GD8224	2	Bar
29.	G10004	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10229	2	Lock Washer, $\frac{3}{8}$ "
30.	GD10487	1	Clamp
31.	GD10304	-	Angle, R.H.
	GD10303	1	Angle, L.H. (Shown)
32.	G10016	2	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 2"
	G10111	2	Lock Nut, $\frac{1}{2}$ "-13
33.	G10322	-	Machine Bushing, 1 $\frac{1}{4}$ ", 18 Gauge (As Required)
34.	G10862	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 3 $\frac{1}{4}$ "
	G10205	2	Washer, $\frac{5}{8}$ " SAE
	G10230	1	Lock Washer, $\frac{5}{8}$ "
35.	G10640	1	Grease Fitting, $\frac{1}{4}$ "-28
36.	GD10242	1	Bushing, 2 $\frac{1}{4}$ "
37.	G10039	5	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{3}{4}$ "
	G10111	5	Lock Nut, $\frac{1}{2}$ "-13
38.	G10459	1	Cotter Pin, $\frac{3}{16}$ " x 1 $\frac{1}{2}$ "
39.	GA7240	-	Opener Mount, R.H.
	GA7239	1	Opener Mount, L.H. (Shown)
40.	GD1113	2	U-Bolt, 5" x 7" x $\frac{5}{8}$ "-11
	G10230	4	Lock Washer, $\frac{5}{8}$ "
	G10104	4	Hex Nut, $\frac{5}{8}$ "-11
41.	GD7907	1	Special Bolt
42.	GB0206	1	Rod Guide
43.	GD8239	1	Storage Strap
44.	GD7904-02	1	Sleeve, $\frac{1}{2}$ " x $\frac{1}{2}$ " Long
45.	G10216	3	Washer, $\frac{1}{2}$ " USS
46.	GA8983	-	Check Valve, Low Rate

NOTCHED SINGLE DISC FERTILIZER OPENER

FOC018(TWL34e/TWL34f/TWL34g/FRTZ268/FRTZ208)



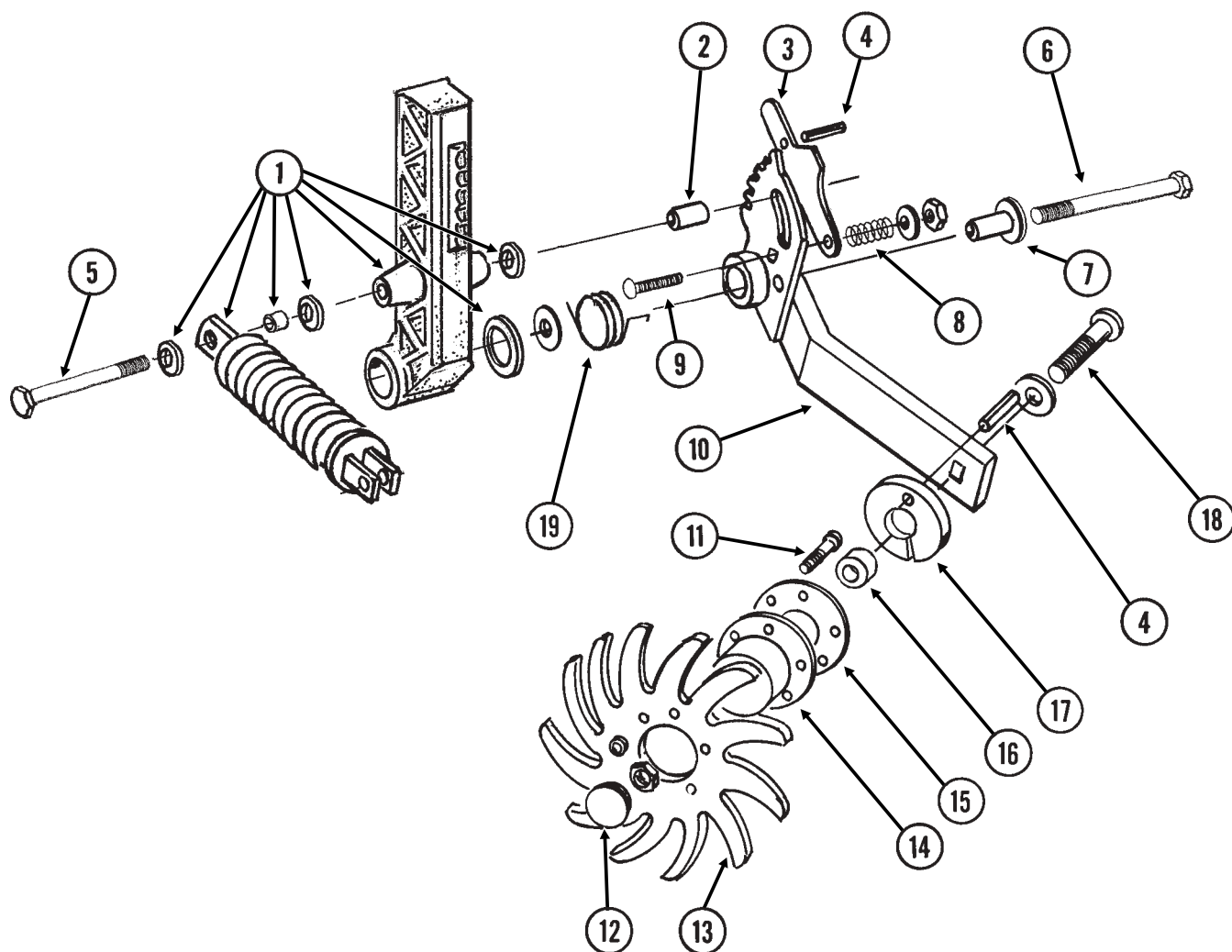
NOTCHED SINGLE DISC FERTILIZER OPENER

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
1.	G10017	3	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10102	3	Hex Nut, 1/2"-13
2.	GB0297	1	Mount
3.	GB0296	1	Arm, 13 1/2"
4.	G10640	1	Grease Fitting, 1/4"-28
5.	GD12685	1	Bushing, 3/4" O.D. x 1/2" Long
6.	GA6966	1	Compression Spring Assembly
7.	G10047	1	Hex Head Cap Screw, 3/8"-16 x 1 3/4"
	G10210	2	Washer, 3/8" USS
	G10108	1	Lock Nut, 3/8"-16
8.	GD1026	1	Sleeve, 1 3/16" Long
9.	GA9433	1	Pivot Arm, L.H. (Shown)
	GA9434	-	Pivot Arm, R.H.
10.	GD11557	1	Scraper, L.H. (Shown)
	GD11558	-	Scraper, R.H.
11.	G10002	6	Hex Head Cap Screw, 3/8"-16 x 3/4"
12.	G10306	3	Carriage Bolt, 3/8"-16 x 2"
	G10108	3	Lock Nut, 3/8"-16
13.	G10991	2	Hex Head Cap Screw, 5/16"-18 x 7/8"
	G10232	2	Lock Washer, 5/16"
	G10219	6	Washer, 5/16" USS
14.	GD12679	1	Stepped Spacer, 3" Long
15.	GA9437	1	Hub W/Bearing
	GA8603	-	Double Row Bearing
16.	G10011	1	Hex Head Cap Screw, 5/8"-11 x 5 1/2"
	GD12677	1	Washer, 1 1/2" O.D., 7 Gauge, Hardened
	G10107	1	Lock Nut, 5/8"-11
17.	G10046	1	Hex Head Cap Screw, 5/8"-11 x 5"
	G10217	1	Washer, 5/8" USS
	G10450	2	Machine Bushing, 1 1/2", 18 Gauge (As Required)
	G10107	1	Lock Nut, 5/8"-11
18.	GD12676	1	Disc Blade, Notched, 16 3/4"
19.	G10871	1	Hex Head Cap Screw, 1/2"-13 x 6"
	G10206	3	Washer, 1/2" SAE
	G10111	1	Lock Nut, 1/2"-13
20.	GD13287	2	U-Bolt, 1 1/2" x 2 1/2" x 1/2"-13
	G10228	4	Lock Washer, 1/2"
	G10102	4	Hex Nut, 1/2"-13
21.	GB0323	1	Knife, L.H. (Shown)
	GB0322	-	Knife, R.H.
22.	GA10213	-	Drop Tube, L.H., Liquid Fertilizer (Shown)
	GA10214	1	Drop Tube, R.H., Liquid Fertilizer
23.	GA10047	-	Drop Tube, L.H., Dry Fertilizer (Shown)
	GA10048	1	Drop Tube, R.H., Dry Fertilizer
24.	GA8983	-	Check Valve, Low Rate
25.	GA9565	1	Mount W/U-Bolts, Liquid Fertilizer
	GD1113	2	U-Bolt, 5" x 7" x 5/8"-11
	G10230	4	Lock Washer, 5/8"
	G10104	4	Hex Nut, 5/8"-11
26.	GA9821	-	Mount W/U-Bolts, L.H., Dry Fertilizer
	GD1113	2	U-Bolt, 5" x 7" x 5/8"-11
	G10230	4	Lock Washer, 5/8"
	G10104	4	Hex Nut, 5/8"-11
27.	GA9822	-	Mount W/U-Bolts, R.H., Dry Fertilizer
	GD1113	2	U-Bolt, 5" x 7" x 5/8"-11
	G10230	4	Lock Washer, 5/8"
	G10104	4	Hex Nut, 5/8"-11

RESIDUE WHEEL ATTACHMENT FOR NOTCHED SINGLE DISC FERTILIZER OPENER

DFC024(FRTZ165)

FOR USE WITH NOTCHED SINGLE DISC FERTILIZER OPENER



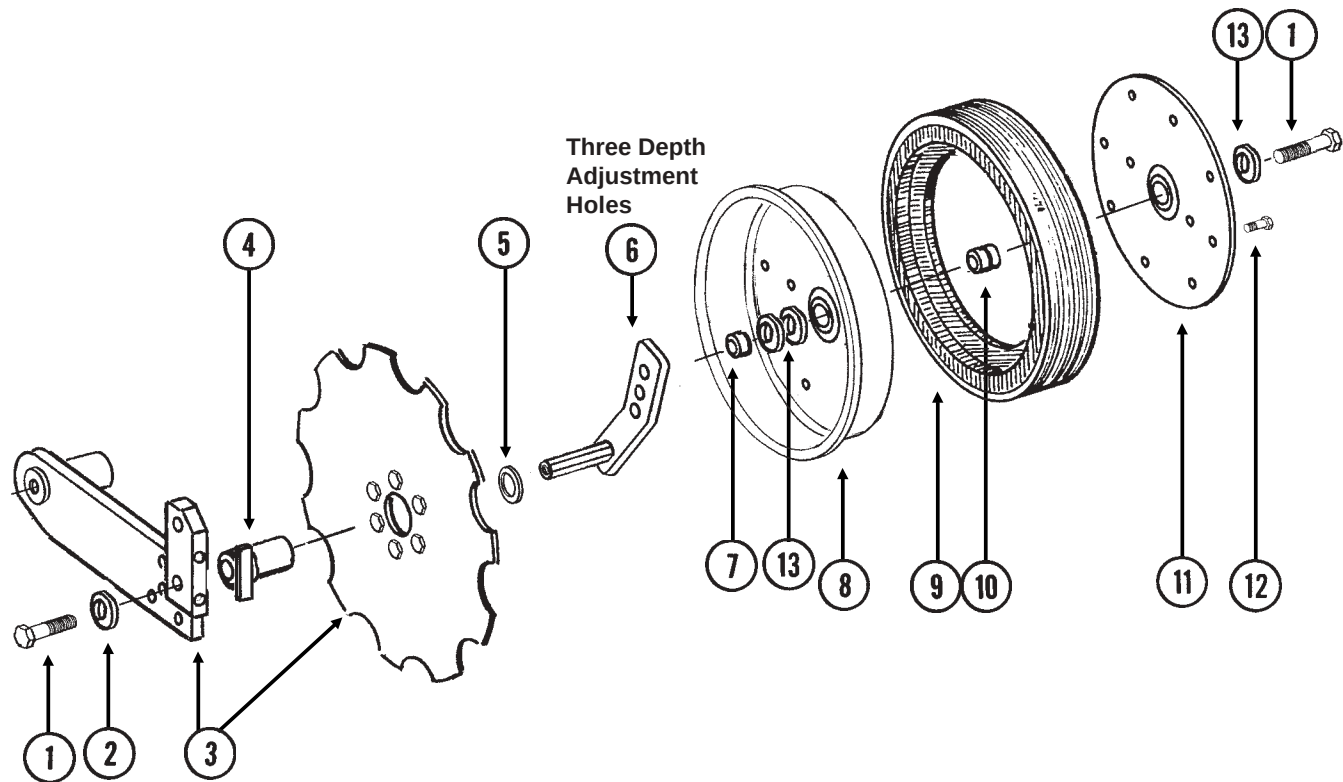
RESIDUE WHEEL ATTACHMENT FOR NOTCHED SINGLE DISC FERTILIZER OPENER

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
1.		-	See "Notched Single Disc Fertilizer Opener", Pages P102 And P103
2.	GD12684	1	Bushing, 1 1/3" Long
3.	GD11178	1	Adjustment Lever
4.	G10603	2	Spring Pin, 1/4" x 1 1/4"
5.	G11034	1	Hex Head Cap Screw, 1/2"-13 x 7"
	G10111	1	Lock Nut, 1/2"-13
6.	G10830	1	Hex Head Cap Screw, 5/8"-11 x 7 1/2"
	GD7805	1	Special Washer, 5/8", Hardened
	G10107	1	Lock Nut, 5/8"-11
7.	GD11836	1	Sleeve, 2 1/8" Long
8.	GD7962	1	Spring
9.	G10306	1	Carriage Bolt, 3/8"-16 x 2"
	G10203	1	Washer, 3/8" SAE
	G10108	1	Lock Nut, 3/8"-16
10.	GA7999	1	Mount W/Grease Fitting, L.H. (Shown)
	GA7998	-	Mount W/Grease Fitting, R.H.
	G10640	-	Grease Fitting, 1/4"-28
11.	G10133	6	Hex Head Cap Screw, 5/16"-18 x 1 1/2"
	G10109	6	Lock Nut, 5/16"-18, Grade 8
12.	GD1132	2	Dust Cap
13.	GD10552	2	Wheel, 12 Tine, 3/8" x 12"
14.	GA5654	1	Hub W/Bearings
	GA2014	-	Bearing
15.	GD9724	1	Backing Plate
16.	GD7817-04	1	Spacer, 11/16" I.D. x 1/2" Long
17.	GD11188	1	Spacer
18.	G10908	1	Carriage Bolt, 5/8"-11 x 3"
	G10503	1	Hex Jam Nut, 5/8"-11, Grade 2
19.	GD11265	1	Spring, L.H. (Shown)
	GD11266	-	Spring, R.H.
A.	GA7445	-	Wheel Assembly, 12 Tine, L.H. (Items 11 And 13-15)(Shown)
	GA7446	-	Wheel Assembly, 12 Tine, R.H. (Items 11 And 13-15)

DEPTH/GAUGE WHEEL ATTACHMENT FOR NOTCHED SINGLE DISC FERTILIZER OPENER

(FRTZ256)

FOR USE WITH NOTCHED SINGLE DISC FERTILIZER OPENER

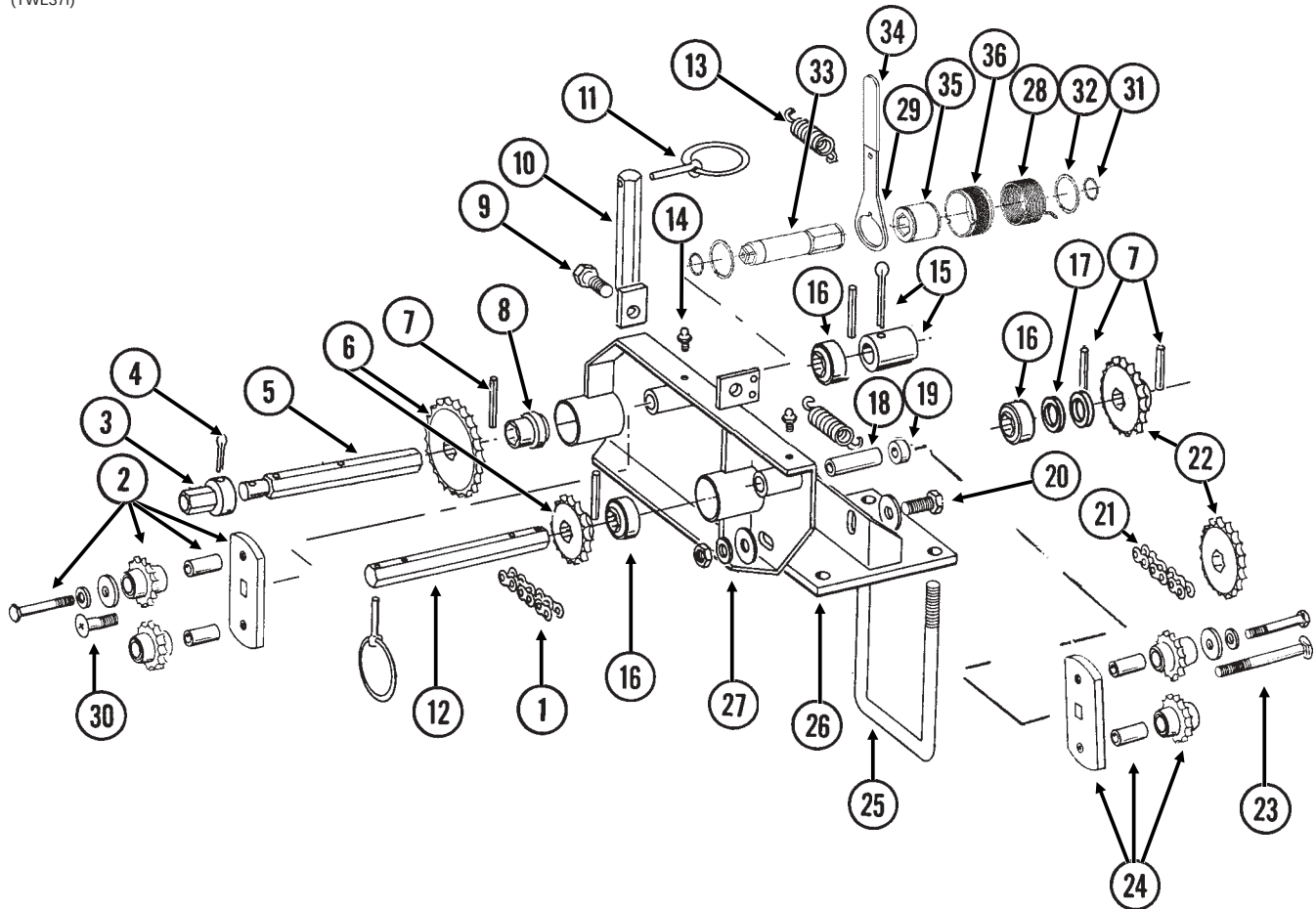


DEPTH/GAUGE WHEEL ATTACHMENT FOR NOTCHED SINGLE DISC FERTILIZER OPENER

ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Assy.)	
1.	G10010	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 3"
2.	GD7805	1	Special Washer, $\frac{5}{8}$ ", Hardened
3.		-	See "Notched Single Disc Fertilizer Opener", Pages P102 And P103
4.	GA9472	1	Blade Mount
5.	G10233	1	Machine Bushing, 1", 10 Gauge
6.	GA10037	1	Wheel Mount, L.H. (Shown)
	GA10036	1	Wheel Mount, R.H.
7.	GD13309	1	Spacer
8.	GD11423	1	Half Wheel
9.	GD11953	1	Offset Tire
10.	GA6171	1	Bearing
11.	GD11954	1	Half Wheel Cover, Nylon
12.	G10961	11	Flanged Whiz-Lock Screw, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ ", No Serration
	G10620	11	Serrated Flange Nut, $\frac{5}{16}$ "-18
13.	G10204	-	Special Machine Bushing, $\frac{5}{8}$ " x 1" O.D. (As Required)
A.	GA8877	-	Gauge Wheel Complete (Items 8-12)

DRY FERTILIZER DRIVE

(TWL379)



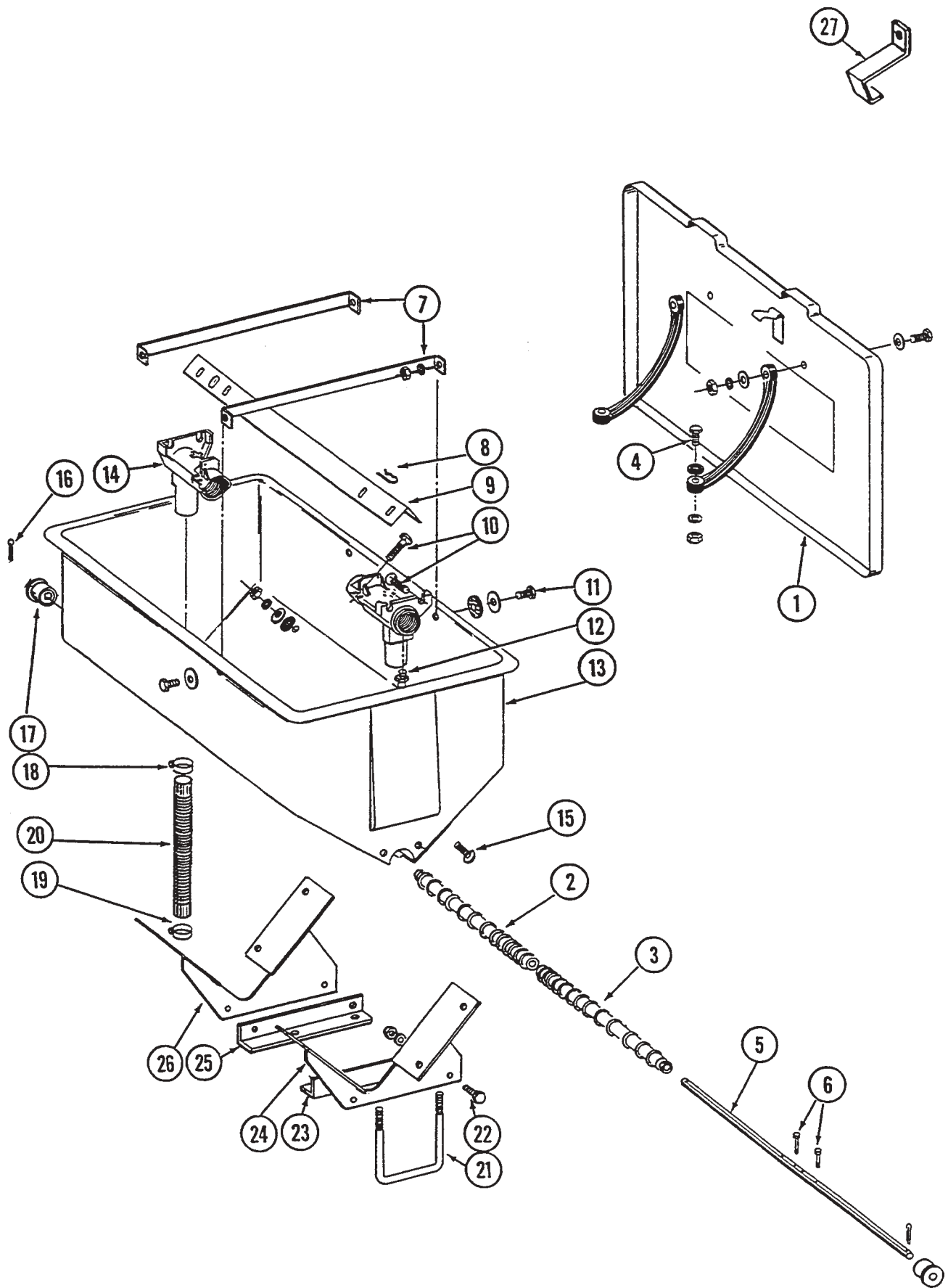
ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
1.	G3310-88	1	Chain, No. 40, 88 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
2.	GA7336	1	Idler W/Bolt-On Sprockets
	GD7426	-	Sprocket, 12 Tooth
	GD1026	-	Sleeve, 1 ³ / ₁₆ " Long
	G10210	-	Washer, ³ / ₈ " USS
	G10229	-	Lock Washer, ³ / ₈ "
	G10047	-	Hex Head Cap Screw, ³ / ₈ "-16 x 1 ³ / ₄ "
3.	GD7127	1	Shear Coupler
4.	G10462	1	Cotter Pin, ³ / ₁₆ " x 2"
5.	GD7866	1	Shaft, ⁷ / ₈ " x 7 ¹ / ₂ "
6.	GA5105	1	Sprocket, 15 Tooth
	GA5107	1	Sprocket, 19 Tooth
	GA5114	1	Sprocket, 30 Tooth
	GA5115	1	Sprocket, 33 Tooth
	GA6337	1	Sprocket, 35 Tooth
7.	G10602	6	Spring Pin, ¹ / ₄ " x 1 ¹ / ₂ "
8.	GA5624	1	Special Bearing, ⁷ / ₈ " Hex Bore x 1.6"
9.	G10037	1	Hex Head Cap Screw, ¹ / ₂ "-13 x 1 ¹ / ₄ "
	G10111	1	Lock Nut, ¹ / ₂ "-13

DRY FERTILIZER DRIVE

ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
10.	GA5229	1	Sprocket Storage Rod
11.	GD2558	3	Lynch Pin, 1/4"
12.	GD10119	1	Shaft, 7/8" x 7 7/16"
13.	GD5857	2	Spring
14.	G10640	2	Grease Fitting, 1/4"-28
15.		-	See "Dry Fertilizer Couplers/Shafts", Pages P112 And P113
16.	GA5116	3	Bearing, 7/8" Hex Bore, Cylindrical
17.	G10233	2	Machine Bushing, 1", 10 Gauge
18.	GD3180-10	1	Sleeve, 5/8" I.D. x 7/8" O.D. x 3 1/4" Long
19.	GD2734-08	1	Sleeve, 1 1/4" O.D. x 5/8" Long
20.	G10017	2	Hex Head Cap Screw, 1/2"-13 x 1 1/2"
	G10206	4	Washer, 1/2" SAE
	G10228	2	Lock Washer, 1/2"
	G10102	2	Hex Nut, 1/2"-13
21.	G3310-130	1	Chain, No. 40, 130 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
22.	GA5109	2	Sprocket, 24 Tooth
23.	G10419	1	Carriage Bolt, 1/2"-13 x 4 1/2"
	G10206	1	Washer, 1/2" SAE
	G10111	1	Lock Nut, 1/2"-13
24.	GA7396	1	Idler W/Bolt-On Sprockets
	GD7426	-	Sprocket, 12 Tooth
	GD1026	-	Sleeve, 1 3/16" Long
	G10210	-	Washer, 3/8" USS
	G10229	-	Lock Washer, 3/8"
	G10047	-	Hex Head Cap Screw, 3/8"-16 x 1 3/4"
	G10049	-	Hex Head Cap Screw, 3/8"-16 x 2 1/2"
	G10108	-	Lock Nut, 3/8"-16
25.	GD1134	2	U-Bolt, 7" x 5" x 5/8"-11
	G10230	4	Lock Washer, 5/8"
	G10104	4	Hex Nut, 5/8"-11
26.	GA7129	1	Mount, L.H. (Shown)
	GA7130	-	Mount, R.H.
27.	GA5671	1	Transmission Plate, L.H. (Shown)
	GA5672	-	Transmission Plate, R.H.
28.	GD14413	-	Torsion Spring, L.H. (Used On R.H. Wrap Spring Wrench) (Shown)
	GD14414	1	Torsion Spring, R.H. (Used On L.H. Wrap Spring Wrench)
29.	GD14431	1	Handle
30.	G11100	1	Hex Socket Button Head Screw, 1/4"-20 x 1 1/2", Grade 8
	G10227	1	Lock Washer, 1/4"
	G10209	1	Washer, 1/4" USS
31.	G11075	2	Internal Inverted Snap Ring, 7/8"
32.	G10496	2	External Inverted Snap Ring, 1 1/2"
33.	GD14427	1	Tightener Shaft, 4 7/8"
34.	G11078	1	Vinyl Cap
35.	GD14432	1	Sleeve, 1 1/4"
36.	GD14430	1	Release Collar, Gold, R.H. (Shown)
	GD14429	-	Release Collar, Silver, L.H.
A.	G1K378	1	Wrap Spring Wrench Replacement Kit, Gold Collar, R.H. (Items 28-36) (Shown)
	G1K379	-	Wrap Spring Wrench Replacement Kit, Silver Collar, L.H. (Items 28-36)

DRY FERTILIZER HOPPER AND MOUNTS

DFC009/DFC018(TWL36)

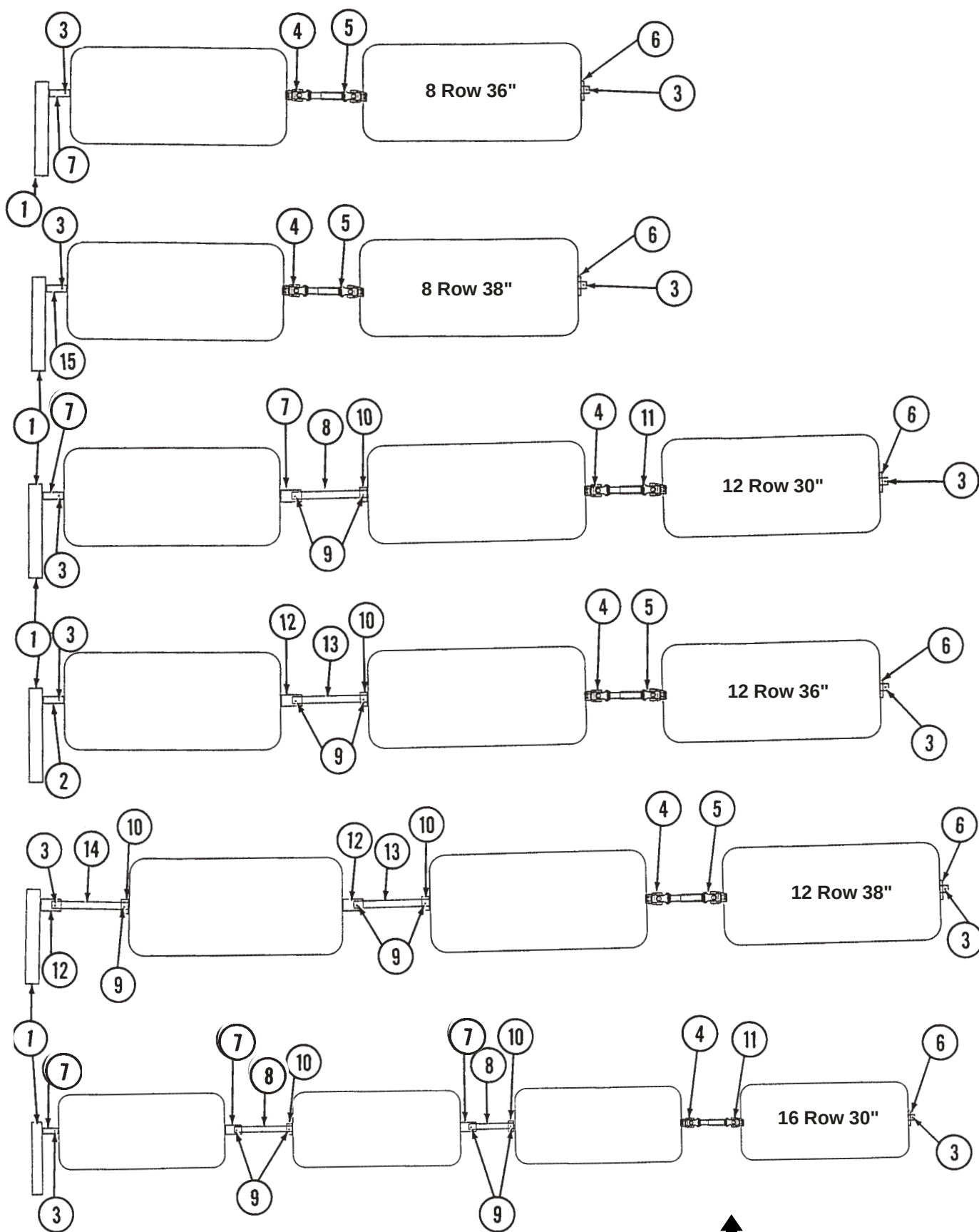


DRY FERTILIZER HOPPER AND MOUNTS

ITEM	PART NO.	QTY. (Per Hopper)	DESCRIPTION
1.	GA0898	1	Lid W/Retainers, Clips, Rivets, Rubber Straps And Hardware
	GD1380	-	Front Clip
	GD2412	-	Rear Retainer
	G10655	-	Rivet, $\frac{3}{16}$ " x $\frac{13}{32}$ "
	GD1210	-	Rubber Strap
	G10171	-	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{4}$ "
	G10219	-	Washer, $\frac{5}{16}$ " USS
	G10232	-	Lock Washer, $\frac{5}{16}$ "
	G10106	-	Hex Nut, $\frac{5}{16}$ "-18
2.	GB0198	1	Auger, R.H.
3.	GB0199	1	Auger, L.H.
4.	G10133	2	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{2}$ "
	G10219	2	Washer, $\frac{5}{16}$ " USS
	G10232	2	Lock Washer, $\frac{5}{16}$ "
	G10106	2	Hex Nut, $\frac{5}{16}$ "-18
5.	GD7848	1	Shaft
6.	G10587	2	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x 2", Stainless Steel
	G10588	2	Hex Nut, $\frac{1}{4}$ "-20, Stainless Steel
7.	GD1209	2	Strap
8.	G10670	2	Hair Pin Clip, No. 3
9.	GD1207	1	Baffle
10.	G10303	8	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10219	8	Washer, $\frac{5}{16}$ " USS
	G10232	8	Lock Washer, $\frac{5}{16}$ "
	G10106	8	Hex Nut, $\frac{5}{16}$ "-18
11.	G10171	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1 $\frac{1}{4}$ "
	G10201	4	Special Washer, $\frac{3}{8}$ " x 1 $\frac{1}{2}$ " O.D.
	GD1213	4	Rubber Washer
	G10232	4	Lock Washer, $\frac{5}{16}$ "
	G10106	4	Hex Nut, $\frac{5}{16}$ "-18
12.	G10641	2	Grease Fitting, $\frac{1}{8}$ " NPT
13.	GD1379	1	Hopper
14.	GD1200	2	Outlet Housing
15.	G10303	8	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10201	8	Special Washer, $\frac{3}{8}$ " x 1 $\frac{1}{2}$ " O.D.
	GD1213	8	Rubber Washer
	G10232	8	Lock Washer, $\frac{5}{16}$ "
	G10106	8	Hex Nut, $\frac{5}{16}$ "-18
16.	G10460	2	Cotter Pin, $\frac{1}{4}$ " x 2"
17.	GB0200	2	Bearing
18.	G10676	2	Hose Clamp, No. 36
19.	G10672	2	Hose Clamp, No. 28
20.	GD3790	2	Rubber Tube
21.	GD1134	2	U-Bolt, 7" x 5" x $\frac{5}{8}$ "-11
	G10230	4	Lock Washer, $\frac{5}{8}$ "
	G10104	4	Hex Nut, $\frac{5}{8}$ "-11
22.	G10017	4	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{1}{2}$ "
	G10228	4	Lock Washer, $\frac{1}{2}$ "
	G10102	4	Hex Nut, $\frac{1}{2}$ "-13
23.	GD9131	1	Angle, L.H.
24.	GA6437	1	Mount, L.H.
25.	GD9132	1	Angle, R.H.
26.	GA6436	1	Mount, R.H.
27.	GD8722	-	Holder, Rubber Tube (As Required)
A.	GA6503	-	Hopper Sub-Assembly (Items 8, 10 And 12-15)
B.	GA5667	-	Hopper Hardware Box (Items 2-7, 9, 11, 16 And 17)

DRY FERTILIZER COUPLERS/SHAFTS

RH100594(TWL38a)



L.H. Side Of Machine Shown

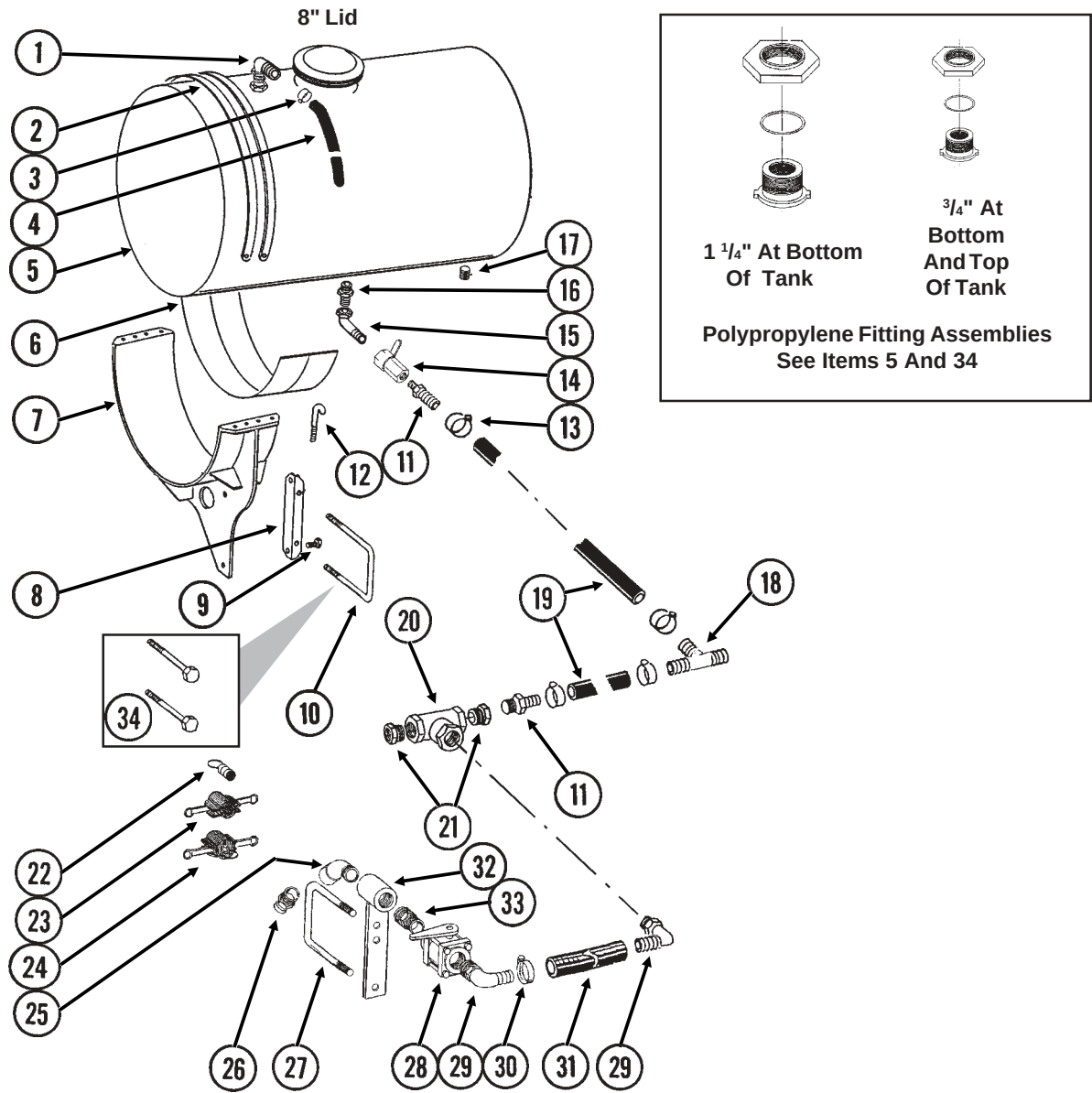
Direction Of Travel

DRY FERTILIZER COUPLERS/SHAFTS

ITEM	PART NO.	QTY.	DESCRIPTION
1.		-	See "Dry Fertilizer Drive", Pages P108 And P109
2.	GD10109	-	Coupler, 6"
3.	G10460	-	Cotter Pin, 1/4" x 2"
4.	GA7051	-	U-Joint W/Grease Fitting, Male, 12 1/4" Long
	GR1293	-	Yoke, 7/8" Hex
	GR1294	-	Cross And Bearing Kit
	GR1295	-	Inboard Yoke
	GR1296	-	Inner Profile
	GR1557	-	Grease Fitting, 45°, Metric
	GR1301	-	Spring Pin, 8mm x 50mm
5.	GA7146	-	U-Joint W/Grease Fitting, Female, 22 1/16" Long
	GR1293	-	Yoke, 7/8" Hex
	GR1294	-	Cross And Bearing Kit
	GR1299	-	Inboard Yoke And Outer Profile
	GR1557	-	Grease Fitting, 45°, Metric
6.	G10233	-	Machine Bushing, 1", 10 Gauge
7.	GD7867	-	Coupler, 3"
8.	GD2548-15.5	-	Hex Shaft, 7/8" x 15 1/2" (1 Hole)
9.	G10602	-	Spring Pin, 1/4" x 1 1/2"
10.	GD5886	-	Coupler, 1 3/4"
11.	GA7052	-	U-Joint W/Grease Fitting, Female, 10 1/4" Long
	GR1293	-	Yoke, 7/8" Hex
	GR1294	-	Cross And Bearing Kit
	GR1297	-	Inboard Yoke And Outer Profile
	GR1557	-	Grease Fitting, 45°, Metric
12.	GD10126	-	Coupler, 4"
13.	GD2548-24.5	-	Hex Shaft, 7/8" x 24 1/2" (1 Hole)
14.	GD2548-13.5	-	Hex Shaft, 7/8" x 13 1/2" (1 Hole)
15.	GD10773	-	Coupler, 10 3/4"
16.	G10688	-	Square Head Set Screw, 3/8"-16 x 5/8"

LIQUID FERTILIZER TANKS, SADDLES, SADDLE MOUNTS AND HOSES

LFC021/LFC023/LFC030/LFC012(FRTZ201g)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10917	2	Elbow, 90°, 3/4" NPT To Barb
2.	GD1520	-	Band, 30" (4 Per Tank)
3.	G10278	2	Hose Clamp, No. 16
4.	G4205-11	-	Hose, 3/4" x 72" (One Per Tank)
5.	GA9905	-	Tank W/Lid And Fittings, 30" x 150 Gallon, 8 Row Sizes (Qty. 2), 12/16 Row Sizes (Qty. 4)
	GR1678	-	Lid W/Vent, 8" (Top Of Tank)
	GR0513	-	3/4" Polypropylene Fitting Assembly (Overflow Fitting, Nut, Bushing And O-Ring) (Top And Bottom Of Tank)
	GR1397	-	Overflow Fitting
	GR0508	-	1 1/4" Polypropylene Fitting Assembly (Nut, Bushing And O-Ring) (Bottom Of Tank)

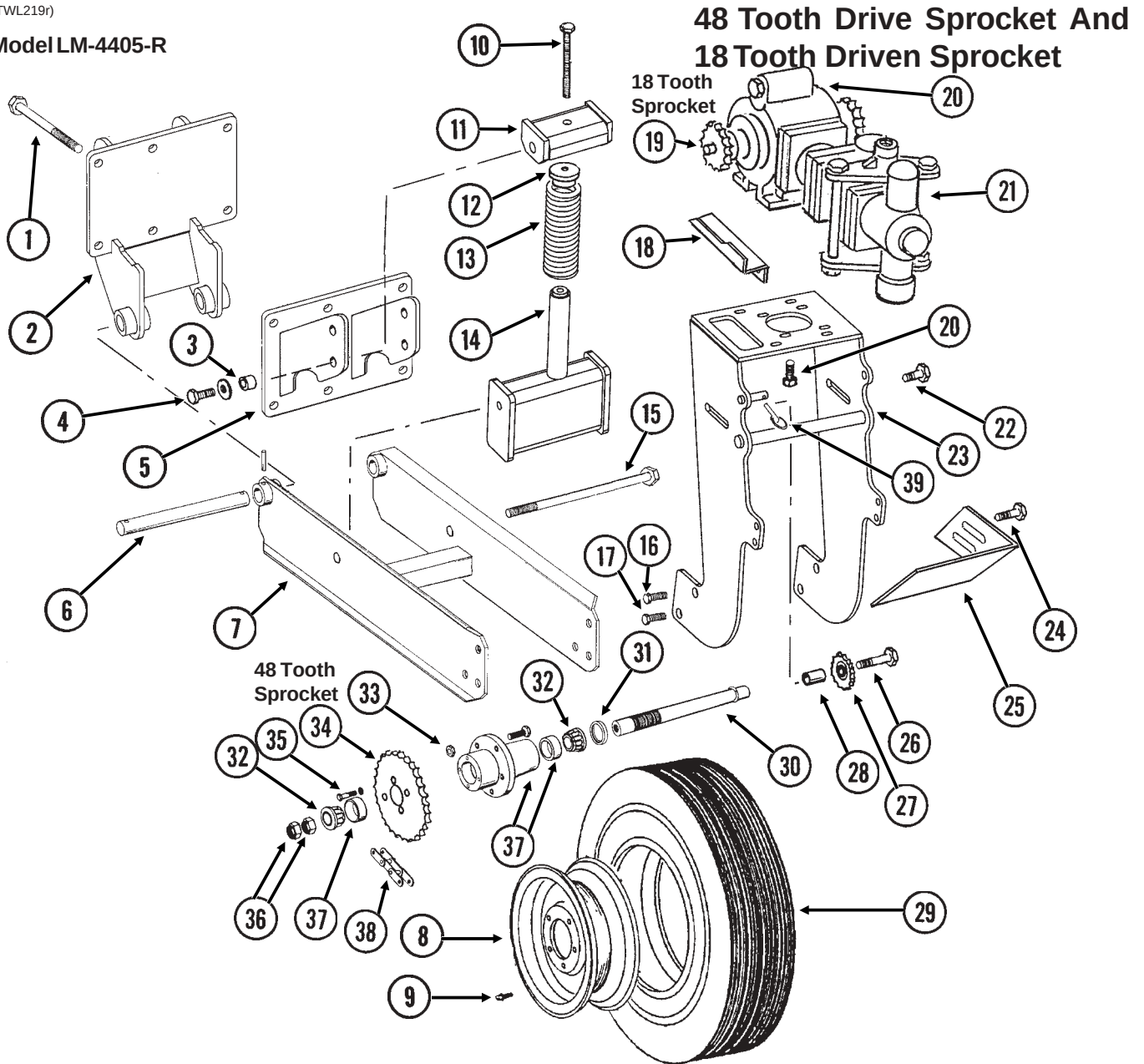
LIQUID FERTILIZER TANKS, SADDLES, SADDLE MOUNTS AND HOSES

ITEM	PART NO.	QTY.	DESCRIPTION
6.	GD1862	-	Pad, 8" x 14' (For Two 30" Tanks)
7.	GA7133	-	Tank Mount (2 Per Tank)
8.	GD10110	-	Mounting Angle (2 Per Tank)
9.	G10007	-	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{1}{2}$ "
	G10230	-	Lock Washer, $\frac{5}{8}$ "
	G10104	-	Hex Nut, $\frac{5}{8}$ "-11
10.	GD1747	-	U-Bolt, 5" x 7" x $\frac{3}{4}$ "-10
	G10231	-	Lock Washer, $\frac{3}{4}$ "
	G10105	-	Hex Nut, $\frac{3}{4}$ "-10
11.	G10626	-	Adapter, 1 $\frac{1}{4}$ " NPT To Barb
12.	GD1337	-	J-Bolt, $\frac{5}{16}$ "-18 (8 Per Tank)
	G10109	-	Lock Nut, $\frac{5}{16}$ "-18, Grade 8 (8 Per Tank)
13.	G10674	-	Hose Clamp, No. 24
14.	GA4976	-	Shutoff Valve, 1 $\frac{1}{4}$ " NPT
	GR1015	-	Body O-Ring
	GR1016	-	Stem O-Ring
	GR1017	-	Teflon Seat
	GR1018	-	Ball
	GR1019	-	Handle
15.	G10887	-	Elbow, 90°, 1 $\frac{1}{4}$ " Male NPT To Female
16.	G10619	-	Close Nipple, 1 $\frac{1}{4}$ " NPT
17.	G10096	-	Pipe Plug, $\frac{3}{4}$ " NPT
18.	G10633	-	Tee, 1 $\frac{1}{4}$ " Barb
19.	G4200-03	1	Hose, 1 $\frac{1}{4}$ " x 32', 8 Row 36"/38" And 12 Row 30"
	G4200-06	-	Hose, 1 $\frac{1}{4}$ " x 40', 12 Row 36"/38" And 16 Row 30"
20.	G10888	-	Tee, 2" Female NPT
21.	G10616	-	Reducing Bushing, 2" Male NPT To 1 $\frac{1}{4}$ " Female
22.	GD10777	-	Dust Plug, 2" Male Cam Lock
23.	GD3622	-	Adapter, 2" Female NPT To Cam Lock
24.	GD3951	-	Dust Cap, 2" Cam Lock
25.	G10889	-	Elbow, 45°, 2" Male NPT To Female
26.	GD3623	-	Adapter, 2" Male NPT To Cam Lock
27.	GD1113	-	U-Bolt, 5" x 7" x $\frac{5}{8}$ "-11
	G10230	-	Lock Washer, $\frac{5}{8}$ "
	G10104	-	Hex Nut, $\frac{5}{8}$ "-11
28.	GA2660	-	Shutoff Valve, 2" NPT
29.	G10630	-	Elbow, 90°, 2" NPT To Barb
30.	G10676	-	Hose Clamp, No. 36
31.	G4201-02	-	Hose, 2" x 12', 8 Row
	G4201-03	-	Hose, 2" x 18', 12/16 Row
32.	GA7845	-	Quick Fill Mount, 2"
33.	G10623	-	Close Nipple, 2" NPT
34.	G10342	-	Hex Head Cap Screw, $\frac{3}{4}$ " - 10 x 8"
	G10218	-	Washer, $\frac{3}{4}$ " USS
	G10231	-	Lock Washer, $\frac{3}{4}$ "
	G10105	-	Hex Nut, $\frac{3}{4}$ "-10

LIQUID FERTILIZER PISTON PUMP MOUNT AND GROUND DRIVE WHEEL

(TWL219r)

Model LM-4405-R



ITEM	PART NO.	QTY.	DESCRIPTION
1.	G10830	6	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 7 $\frac{1}{2}$ "
	G10230	6	Lock Washer, $\frac{5}{8}$ "
	G10104	6	Hex Nut, $\frac{5}{8}$ "-11
2.	GA10624	1	Wheel Arm Mount
3.	GB0218	2	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
4.	G10005	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{3}{4}$ "
	GD7805	2	Special Washer, $\frac{5}{8}$ ", Hardened
	G10107	2	Lock Nut, $\frac{5}{8}$ "-11
5.	GA10622	1	Spring Mount
6.	GD2681	1	Pin, 1 $\frac{1}{4}$ " x 13 $\frac{1}{2}$ "
	G10460	2	Cotter Pin, $\frac{1}{4}$ " x 2"
7.	GA10621	1	Arm W/Grease Fittings
	G10641	2	Grease Fitting, $\frac{1}{8}$ " NPT
8.	GA0241	1	Wheel, 5" x 15"

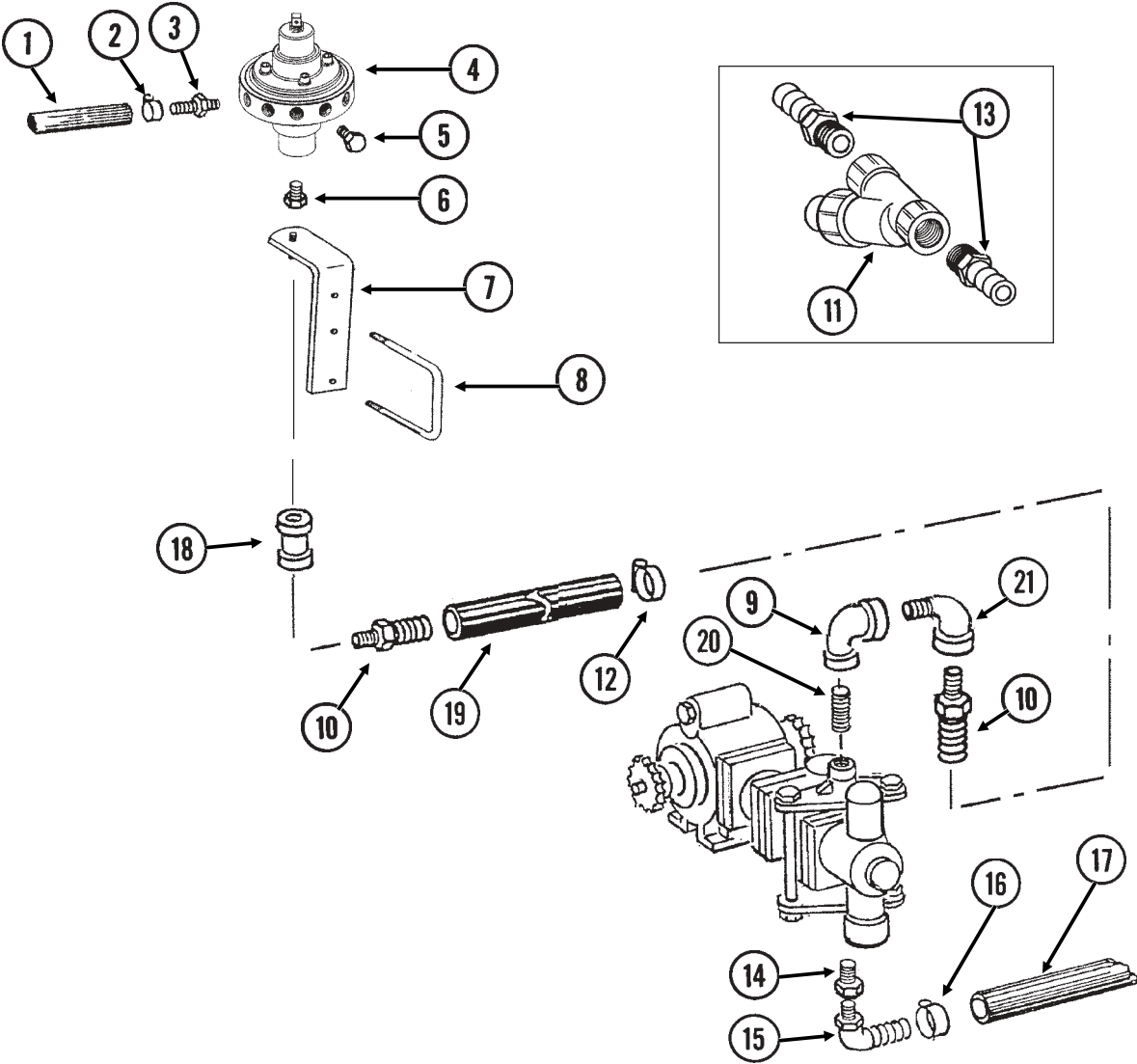
LIQUID FERTILIZER PISTON PUMP MOUNT AND GROUND DRIVE WHEEL

ITEM	PART NO.	QTY.	DESCRIPTION
9.	GD1166	1	Valve Stem
10.	G10012	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 6 $\frac{1}{2}$ "
	GD7805	1	Special Washer, $\frac{5}{8}$ ", Hardened
11.	GA10908	1	Spring Mount
12.	GB0196	1	Washer
13.	GD7831	1	Compression Spring
14.	GA10907	1	Spring Guide
15.	G11122	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 12"
	G10107	1	Lock Nut, $\frac{5}{8}$ "-11
16.	G10026	2	Hex Head Cap Screw, $\frac{3}{4}$ "-10 x 2"
	G10231	2	Lock Washer, $\frac{3}{4}$ "
17.	G11042	2	Hex Head Cap Screw, $\frac{3}{4}$ "-10 x 1 $\frac{3}{4}$ "
	G10231	2	Lock Washer, $\frac{3}{4}$ "
	G10105	2	Hex Nut, $\frac{3}{4}$ "-10
18.	GD13744	1	Hose Holder
19.	GR1146	1	Sprocket, 18 Tooth
20.		-	See "Liquid Fertilizer Piston Pump (Crankcase Assembly)", Pages P120 And P121
	GR0200	1	Offset Link, No. 2050
21.		-	See "Liquid Fertilizer Piston Pump (Cylinder Assembly)", Pages P122 And P123
22.	G10007	2	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{1}{2}$ "
	G10217	2	Washer, $\frac{5}{8}$ " USS
	G10230	2	Lock Washer, $\frac{5}{8}$ "
	G10104	2	Hex Nut, $\frac{5}{8}$ "-11
23.	GA10894	1	Pump Mount
24.	G10017	2	Hex Head Cap Screw, $\frac{1}{2}$ "-13 x 1 $\frac{1}{2}$ "
	G10216	2	Washer, $\frac{1}{2}$ " USS
	G10228	2	Lock Washer, $\frac{1}{2}$ "
	G10102	2	Hex Nut, $\frac{1}{2}$ "-13
25.	GD13328	1	Scraper
26.	G10013	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 3 $\frac{1}{2}$ "
	G10205	1	Washer, $\frac{5}{8}$ " SAE
	G10230	1	Lock Washer, $\frac{5}{8}$ "
	G10104	1	Hex Nut, $\frac{5}{8}$ "-11
27.	GA0262	1	Idler Sprocket W/Bearing, 15 Tooth
28.	GD7817-05	1	Spacer, $\frac{11}{16}$ " I.D. x 1 $\frac{1}{4}$ " Long
29.	GD0844	1	Tire, 7.60" x 15", 8 Ply (Specify Brand*)
30.	GA2559	1	Spindle
31.	GA0252	2	Seal
32.	GA0251	2	Bearing
33.	GR0267	5	Lug Nut, $\frac{1}{2}$ "-20
34.	G2500-84	1	Sprocket, 48 Tooth
35.	G10019	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1"
	G10232	4	Lock Washer, $\frac{5}{16}$ "
36.	GD0831	2	Shoulder Nut, 1 $\frac{1}{4}$ "-12 UNF-2A
37.	GA0547	1	Hub W/Cups And Studs, 5 Bolt
	GR0190	2	Cup
	GR0204	5	Stud
38.	G3200-62	1	Chain, No. 2050, 62 Pitch Including Connector Link And Offset Link
	GR0195	1	Connector Link, No. 2050
39.	GD2558	1	Lynch Pin, $\frac{1}{4}$ "

* Specific brand requests will be supplied only as available from current KINZE® Repair Parts stock. If a specific brand requested is not in stock, the brand available will be supplied. Different brand tires may have different diameters. Change in tire brand may affect rates. Field checks are recommended after any change in tires.

LIQUID FERTILIZER FLOW DIVIDER MOUNT AND HOSES

(FRTZ215d/FRTZ215e/FRTZ215f/FRTZ215k)



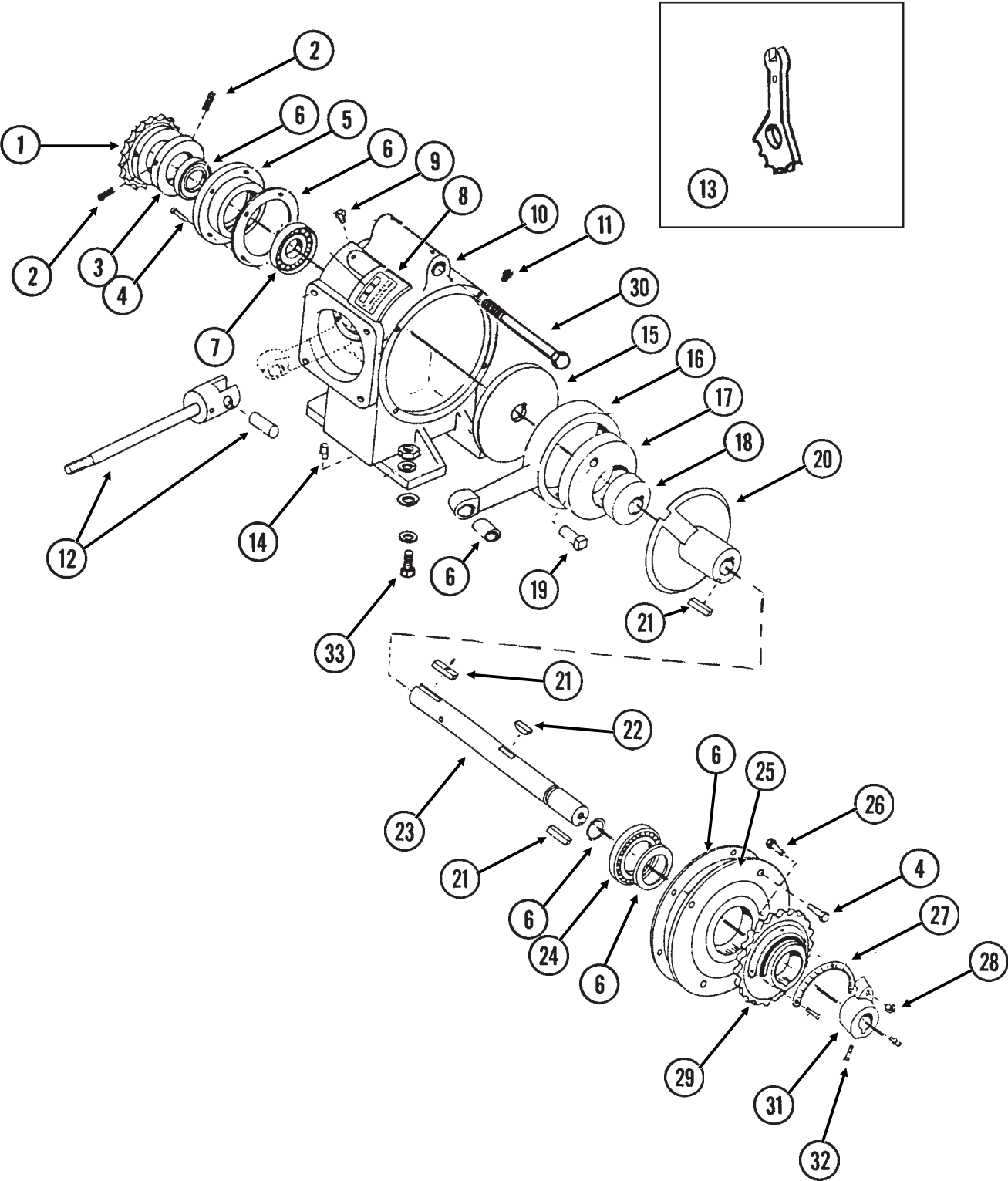
LIQUID FERTILIZER FLOW DIVIDER MOUNT AND HOSES

ITEM	PART NO.	QTY.	DESCRIPTION
1.	G4301-06	1	Hose, $\frac{3}{8}$ " x 160', 12 Row 30"
	G4301-05	1-2	Hose, $\frac{3}{8}$ " x 120', 8 Row 36"/38", 12 Row 36"/38" And 16 Row 30"
2.	G10681	-	Hose Clamp, No. 6
3.	GD11700	-	Adapter, $\frac{1}{4}$ " NPT To $\frac{3}{8}$ " Barb
4.		-	See "Liquid Fertilizer Flow Divider", Pages P124 And P125
5.	G10292	-	Pipe Plug, $\frac{1}{4}$ " NPT
6.	G10737	1	Reducing Bushing, 1 $\frac{1}{4}$ " Male NPT To $\frac{3}{4}$ " Female (If Applicable)
	G10995	-	Reducing Bushing, 1" Male NPT To $\frac{3}{4}$ " Female, Stainless Steel (If Applicable)
7.	GA6527	1	Support, $\frac{3}{4}$ " NPT
8.	GD1113	1	U-Bolt, 5" x 7" x $\frac{5}{8}$ "-11
	G10230	2	Lock Washer, $\frac{5}{8}$ "
	G10104	2	Hex Nut, $\frac{5}{8}$ "-11
9.	G10733	1	Elbow, 90°, $\frac{3}{4}$ " Female NPT
10.	G10734	-	Adapter, $\frac{3}{4}$ " NPT To Barb
11.	GA3893	1	Strainer Complete
	GR0880	-	Screen, No. 40 Mesh
	GR0881	-	Gasket
	GR0882	-	Y-Body
	GR0883	-	End Cap
12.	G10278	-	Hose Clamp, No. 16
13.	G10626	2	Adapter, 1 $\frac{1}{4}$ " NPT To Barb
14.	G10615	1	Reducing Bushing, 1 $\frac{1}{2}$ " Male NPT To 1 $\frac{1}{4}$ " Female
15.	G10629	1	Elbow, 90°, 1 $\frac{1}{4}$ " NPT To Barb
16.		-	1 $\frac{1}{4}$ " Hose, See "Liquid Fertilizer Tanks, Saddles, Saddle Mounts And Hoses", Pages P114 And P115
17.	G10674	2	Hose Clamp, No. 24
18.	G11083	1	Coupler, $\frac{3}{4}$ " Female NPT
19.	G4205-10	-	Hose, $\frac{3}{4}$ " x 200"
20.	G10389	1	Pipe Nipple, $\frac{3}{4}$ " NPT x 1 $\frac{1}{2}$ " Long
21.	G10735	1	Elbow, 90°, $\frac{3}{4}$ " Male NPT To Female

LIQUID FERTILIZER PISTON PUMP (Crankcase Assembly)

(PT38a/GR1100)

Model L-4405



LIQUID FERTILIZER PISTON PUMP (Crankcase Assembly)

ITEM	PART NO.	QTY.	DESCRIPTION
1.		-	See "Liquid Fertilizer Piston Pump Mount And Ground Drive Wheel", Pages P116 And P117
2.	G10688	2	Square Head Set Screw, $\frac{3}{8}$ "-16 x $\frac{5}{8}$ "
3.	GR1147	1	Spacer
4.	G10019	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1"
5.	GR1102	1	Housing
6.	GR1173	-	Repair Kit, Includes Item 5 On "Liquid Fertilizer Piston Pump (Cylinder Assembly)", Pages P140 And P141
7.	GR1104	1	Bearing
8.	GR1105	1	Name Plate
9.	G10054	2	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x $\frac{1}{2}$ "
10.	GR1106	1	Crankcase
11.	GR1107	1	Vent Plug
12.		-	See "Liquid Fertilizer Piston Pump (Cylinder Assembly)", Pages P122 And P123
13.	GR1100	1	Adjustment Wrench
14.	GR1123	3	Plug
15.	GR1108	1	Disc
16.	GR1109	1	Connecting Rod
17.	GR1110	1	Large Eccentric
18.	GR1111	1	Small Eccentric
19.	GR1120	1	Eccentric Pin
20.	GR1119	1	Sleeve
21.	GR1118	3	Setting Arm Key
22.	GR1112	1	Woodruff Key
23.	GR1148	1	Crankshaft
24.	GR1116	1	Bearing
25.	GR1166	1	Cover Plate
26.	GR1167	1	Square Head Bolt, $\frac{3}{8}$ "-16 x 1 $\frac{3}{4}$ "
27.	GR1168	1	Scale
28.	G10108	1	Lock Nut, $\frac{3}{8}$ "-16
29.	GR1114	1	Flange
30.	G10318	1	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 4 $\frac{1}{2}$ "
	G10104	1	Hex Nut, $\frac{5}{8}$ "-11
31.	GR1165	1	Arm
32.	G10693	4	Hex Socket Head Set Screw, $\frac{5}{16}$ "-18 x $\frac{3}{8}$ "
33.	G10003	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{2}$ "
	GR1122	4	Rubber Washer
	G10210	8	Washer, $\frac{3}{8}$ " USS
	G10229	4	Lock Washer, $\frac{3}{8}$ "
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
A.	GA6154	1	Piston Pump Complete Less Sprocket (L-4405), Includes Crankcase (Items 2-33 On This Page) And Cylinder Assemblies (Items 1-22 On Pages P122 And P123)

(PT39a)

This exploded view diagram illustrates the assembly of a mechanical component, likely a pump or valve. The diagram includes the following numbered parts:

- 1**: Main housing or motor unit.
- 2**: A long pin or shaft.
- 3**: A bracket or mounting plate.
- 4**: A small circular component, possibly a seal or washer.
- 5**: A small circular component, possibly a seal or washer.
- 6**: A long pin or shaft.
- 7**: A small circular component, possibly a seal or washer.
- 8**: A small circular component, possibly a seal or washer.
- 9**: A larger circular component, possibly a cover or end plate.
- 10**: A threaded bolt or screw.
- 11**: A small circular component, possibly a seal or washer.
- 12**: A cylindrical component, possibly a piston or plunger.
- 13**: A larger cylindrical component, possibly a cylinder or housing.
- 14**: A small circular component, possibly a seal or washer.
- 15**: A small circular component, possibly a seal or washer.
- 16**: A small circular component, possibly a seal or washer.
- 17**: A small circular component, possibly a seal or washer.
- 18**: A small circular component, possibly a seal or washer.
- 19**: A small circular component, possibly a seal or washer.
- 20**: A long pin or shaft.
- 21**: A small circular component, possibly a seal or washer.
- 22**: A small circular component, possibly a seal or washer.

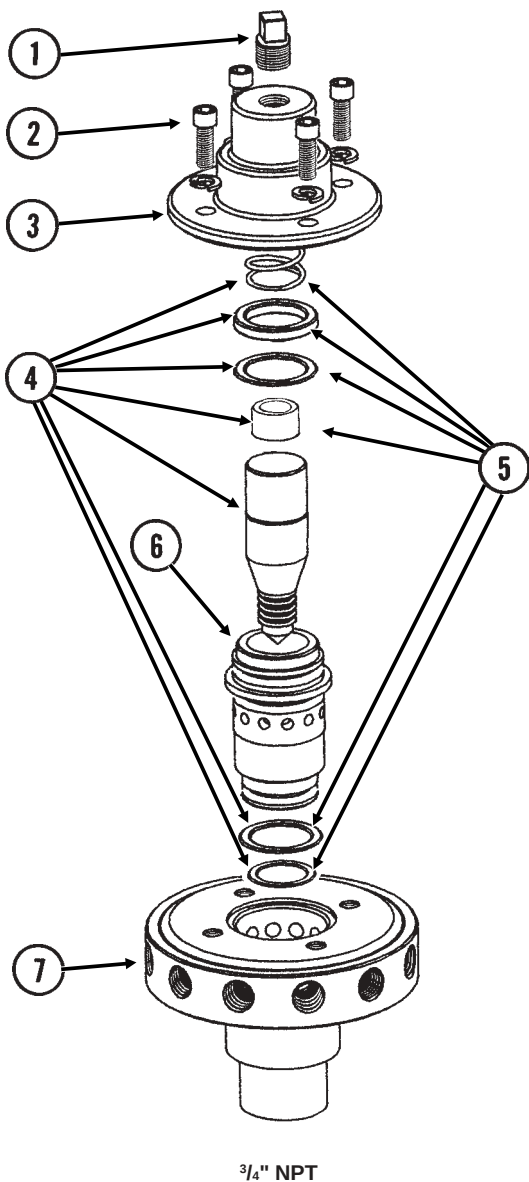
LIQUID FERTILIZER PISTON PUMP (Cylinder Assembly)

ITEM	PART NO.	QTY.	DESCRIPTION
1.		-	See "Liquid Fertilizer Piston Pump (Crankcase Assembly)", Pages P120 And P121
2.	G10686	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 8"
	G10101	2	Hex Nut, $\frac{3}{8}$ "-16
3.	GR1145	1	Discharge Manifold
4.	GR1144	2	Discharge Valve
5.	GR1173	-	Repair Kit, Includes Item 6 On "Liquid Fertilizer Piston Pump (Crankcase Assembly)", Pages P120 And P121
6.	G10687	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 5 $\frac{1}{2}$ "
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
7.	GR1143	1	Outboard Cylinder
8.	GR1142	2	Suction Valve
9.	GR1140	1	Suction Manifold
10.		-	See "Liquid Fertilizer Piston Pump Mount And Ground Drive Wheel", Pages P116 And P117
11.	GR1137	1	Flange Packing Washer
12.	GR1136	1	Plunger
13.	GR1135	1	Inboard Cylinder
14.	GR1134	1	Stuffing Box Insert
15.	GR1133	1	Retaining Ring
16.	GR1129	3	Washer
17.	GR1130	2	Packing Spring
18.	GR1132	1	Outboard Stuffing Box
19.	GR1127	1	Crosshead Guide
20.	GR1125	1	Piston Rod
21.	GR1124	1	Pin
22.	G10019	4	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 1"

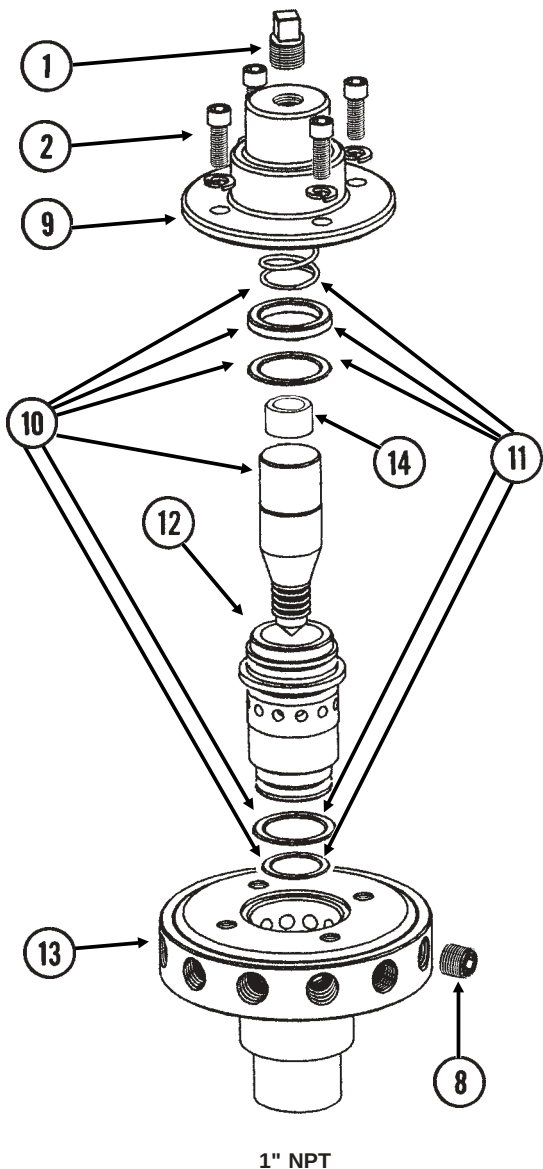
LIQUID FERTILIZER PISTON PUMP FLOW DIVIDER

(FRTZ159/PT40a/FRTZ202c)

**Model FD-1200 Flow Divider,
12 Outlet**



**Model FD-2000 Flow Divider,
20 Outlet**

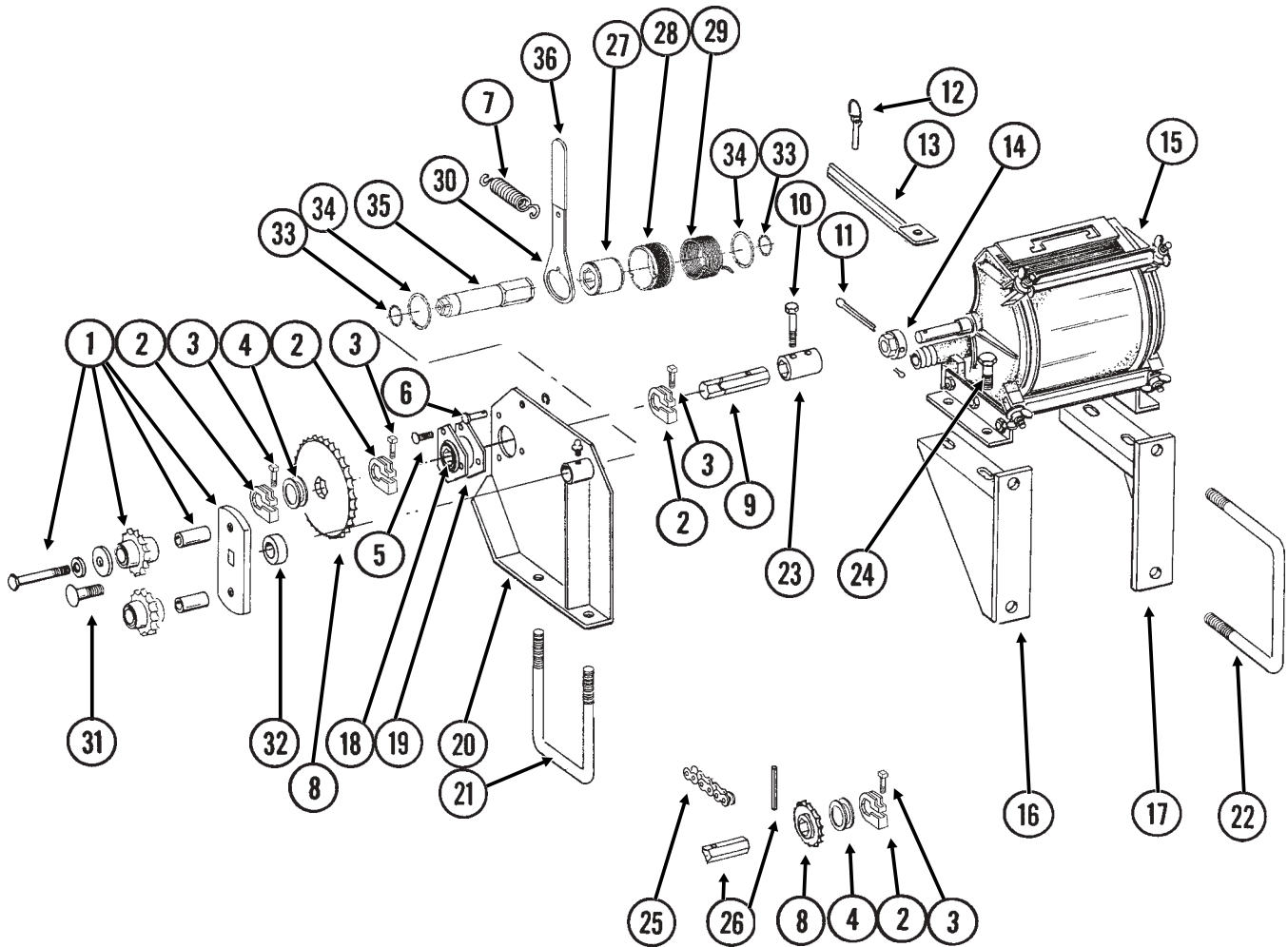


LIQUID FERTILIZER PISTON PUMP FLOW DIVIDER

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR1543	1	Plug
2.	GR1542	4	Hex Socket Head Screw, 1/4"-20 x 3/4", Stainless Steel
	GR1541	4	Lock Washer, 1/4", Stainless Steel
3.	GR1540	1	Cap
4.	GR1544	1	Needle Assembly W/Seal Kit (Item 22)
5.	GR1545	1	Seal Kit, Includes: (3) O-Rings, (1) Seal, (1) Spring, (1) Stainless Steel Sleeve
6.	GR1535	1	Sleeve
7.	GR1533	1	Body
8.	G10350	4	Hex Socket Head Plug, 1/4" NPT, Stainless Steel
9.	GR1566	1	Cap
10.	GR1567	1	Needle Assembly W/Seal Kit (Item 22)
11.	GR1568	1	Seal Kit, Includes: (3) O-Rings, (1) Seal, (1) Spring
12.	GR1561	1	Sleeve
13.	GR1559	1	Body
14.	GR1574	1	Sleeve, 1" O.D. x 1/2" Long, Stainless Steel
A.	GA8931	1	Liquid Fertilizer Piston Pump Flow Divider Complete, 12 Outlet (Model FD-1200) (Items 1-7) (8/12 Row Planters)
B.	GA9407	1	Liquid Fertilizer Piston Pump Flow Divider Complete, 20 Outlet (Model FD-2000) (Items 1, 2 And 8-14) (16 Row Planters)

LIQUID FERTILIZER SQUEEZE PUMP DRIVE

(TWL46e)



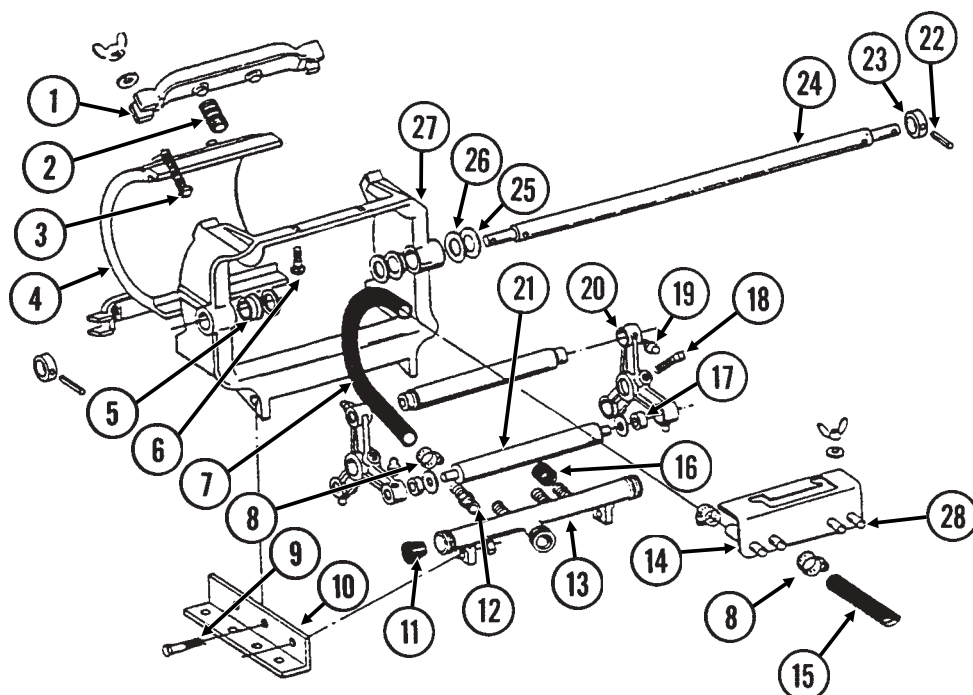
ITEM	PART NO.	QTY.	DESCRIPTION
		(Per Side)	
1.	GA7336	1	Idler W/Bolt-On Sprockets
	GD7426	-	Sprocket, 12 Tooth
	GD1026	-	Sleeve, 1 3/16" Long
	G10210	-	Washer, 3/8" USS
	G10229	-	Lock Washer, 3/8"
	G10047	-	Hex Head Cap Screw, 3/8"-16 x 1 3/4"
2.	GD11045	4	Lock Clamp
3.	G10130	4	Square Head Machine Bolt, 5/16"-18 x 1 3/4"
	G10923	4	Flange Nut, 5/16"-18, No Serration
4.	G10233	-	Machine Bushing, 1", 10 Gauge (As Required)
5.	G10303	3	Carriage Bolt, 5/16"-18 x 1"
	G10219	3	Washer, 5/16" USS
	G10232	3	Lock Washer, 5/16"
	G10106	3	Hex Nut, 5/16"-18
6.	G10478	1	Clevis Pin, 5/16" x 1"
	G10409	1	Retaining Ring, 5/16"
7.	GD5857	1	Spring

LIQUID FERTILIZER SQUEEZE PUMP DRIVE

ITEM	PART NO.	QTY. (Per Side)	DESCRIPTION
8.	GA5105	1	Sprocket, 15 Tooth
	GA5107	1	Sprocket, 19 Tooth
	GA6513	1	Sprocket, 32 Tooth
	GA5202	1	Sprocket, 34 Tooth
	GA6514	1	Sprocket, 46 Tooth
	GA6515	-	Sprocket, 62 Tooth (Optional)
9.	GD2548-48	1	Hex Shaft, $\frac{7}{8}$ " x 48" (1 Hole), 8 Row
	GD2548-54	-	Hex Shaft, $\frac{7}{8}$ " x 54" (1 Hole), 12/16 Row
10.	G10339	1	Hex Head Cap Screw, $\frac{5}{16}$ "-18 x 2"
	G10232	1	Lock Washer, $\frac{5}{16}$ "
	G10106	1	Hex Nut, $\frac{5}{16}$ "-18
11.	G10462	1	Cotter Pin, $\frac{3}{16}$ " x 2"
12.	GD2558	1	Lynch Pin, $\frac{1}{4}$ "
13.	GA5229	1	Sprocket Storage Rod
14.	GD7127	1	Shear Coupler
15.		-	See "Liquid Fertilizer Squeeze Pump", Pages P128-P131
16.	GA4619	1	Pump Mount, L.H.
17.	GA4620	1	Pump Mount, R.H.
18.	G2100-03	1	Bearing, $\frac{7}{8}$ " Hex Bore, Spherical
19.	G3400-01	2	Flangette
20.	GA4617	1	Drive Plate W/Grease Fitting
	GA4618	-	Drive Plate W/Grease Fitting (Shown)
	G10640	-	Grease Fitting, $\frac{1}{4}$ "-28
21.	GD1134	1	U-Bolt, 7" x 5" x $\frac{5}{8}$ "-11
	G10230	2	Lock Washer, $\frac{5}{8}$ "
	G10104	2	Hex Nut, $\frac{5}{8}$ "-11
22.	GD1113	2	U-Bolt, 5" x 7" x $\frac{5}{8}$ "-11
	G10230	4	Lock Washer, $\frac{5}{8}$ "
	G10104	4	Hex Nut, $\frac{5}{8}$ "-11
23.	GD6924	1	Coupler
24.	G10004	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10210	4	Washer, $\frac{3}{8}$ " USS
	G10229	4	Lock Washer, $\frac{3}{8}$ "
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
25.	G3310-170	1	Chain, No. 40, 170 Pitch Including Connector Link
	GR0912	-	Connector Link, No. 40
26.		-	See "Seed Rate Transmission And Row Unit Drill Shafts", Pages P56 And P57
27.	GD14432	1	Sleeve, 1 $\frac{1}{4}$ "
28.	GD14429	-	Release Collar, Silver, L.H. (Shown)
	GD14430	1	Release Collar, Gold, R.H.
29.	GD14414	1	Torsion Spring, R.H. (Used On L.H. Wrap Spring Wrench) (Shown)
	GD14413	-	Torsion Spring, L.H. (Used On R.H. Wrap Spring Wrench)
30.	GD14431	1	Handle
31.	G11100	1	Hex Socket Button Head Screw, $\frac{1}{4}$ "-20 x $\frac{1}{2}$ ", Grade 8
	G10227	1	Lock Washer, $\frac{1}{4}$ "
	G10209	1	Washer, $\frac{1}{4}$ " USS
32.	GD2734-08	1	Sleeve, 1 $\frac{1}{4}$ " O.D. x $\frac{5}{8}$ " Long
33.	G11075	2	Internal Inverted Snap Ring, $\frac{7}{8}$ "
34.	G10496	2	External Inverted Snap Ring, 1 $\frac{1}{2}$ "
35.	GD14427	1	Tightener Shaft, 4 $\frac{7}{8}$ "
36.	G11078	1	Vinyl Cap
A.	G1K269	-	Lock Clamp Kit (Items 2 And 3)
B.	G1K379	-	Wrap Spring Wrench Replacement Kit, Silver Collar, L.H. (Items 27-36) (Shown)
	G1K378	1	Wrap Spring Wrench Replacement Kit, Gold Collar, R.H. (Items 27-36)

LIQUID FERTILIZER SQUEEZE PUMP, 8 ROW SIZES

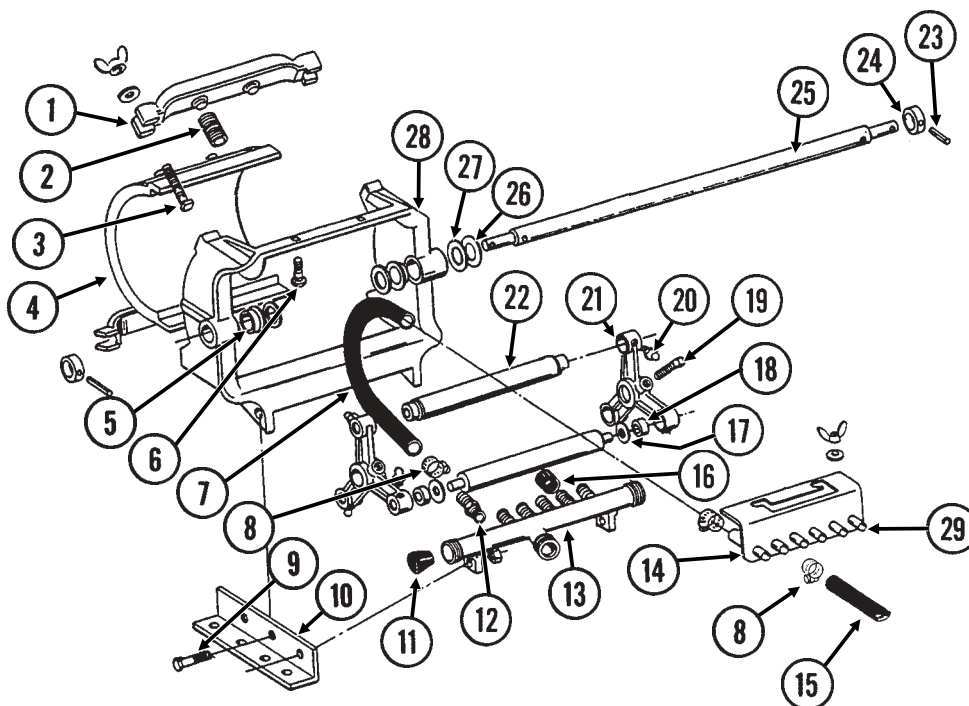
LFC011(PT46a)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR0216	2	Spring Anchor Bar
2.	GR0214	4	Spring
3.	G10130	4	Square Head Machine Bolt, $\frac{5}{16}$ "-18 x 1 $\frac{3}{4}$ "
	G10219	4	Washer, $\frac{5}{16}$ " USS
	G10144	4	Wing Nut, $\frac{5}{16}$ "-18
4.	GR0212	1	Plate
5.	GR0207	2	Nylon Bushing
6.	G10303	2	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10219	2	Washer, $\frac{5}{16}$ " USS
	G10144	2	Wing Nut, $\frac{5}{16}$ "-18
7.	GR0215	4	Metering Hose, $\frac{1}{2}$ " x 13"
8.	G10681	-	Hose Clamp, No. 6
9.	G10004	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
10.	GR0213	2	Angle
11.	GR0217	2	Manifold Plug
12.	GR0232	4	Adapter
13.	GR0228	1	Intake Manifold
14.	GR1484	1	Discharge Manifold Less Hose Barbs
15.	G4301-05	1	Hose, $\frac{3}{8}$ " x 120'
16.	GR0211	-	Rubber Cap
17.	GR0227	6	Nylon Washer
18.	G10131	2	Square Head Set Screw, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
19.	G10640	2	Grease Fitting, $\frac{1}{4}$ "-28
20.	GR0223	2	Roller Arm
21.	GR0209	3	Roller
22.	G10718	2	Spring Pin, $\frac{5}{16}$ " x 1 $\frac{1}{8}$ "
23.	GD9109	2	Sleeve
24.	GD9107	1	Shaft
25.	GR0226	2	Shim, $\frac{3}{64}$ "
26.	GR0225	2	Shim, $\frac{1}{32}$ "
27.	GR0208	1	Frame
28.	GR1577	4	Nylon Hose Barb, $\frac{1}{2}$ " x $\frac{3}{8}$ " (If Applicable)
A.	GA8690	2	Squeeze Pump Complete, 4 Rows (Items 1-14, 16-21 And 24-28)

LIQUID FERTILIZER SQUEEZE PUMP, 12 ROW SIZES

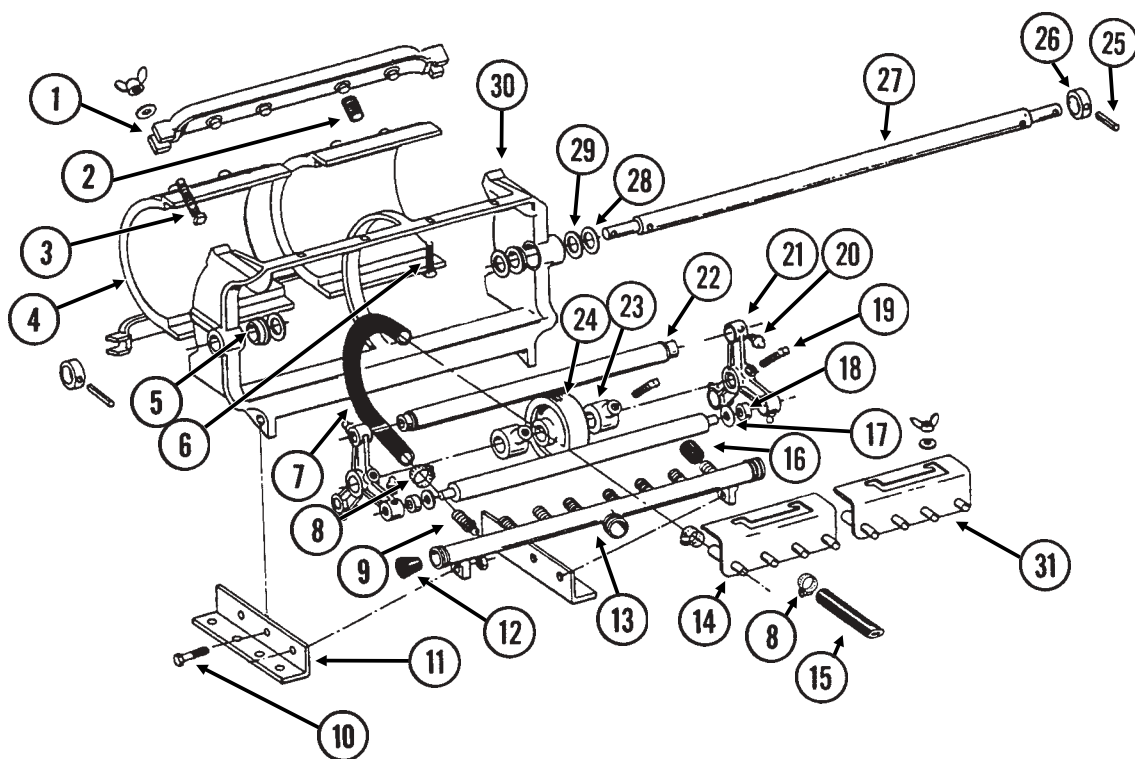
LFC011/LFC011(PT47a)



ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR0216	2	Spring Anchor Bar
2.	GR0214	4	Spring
3.	G10130	4	Square Head Machine Bolt, $\frac{5}{16}$ "-18 x 1 $\frac{3}{4}$ "
	G10219	4	Washer, $\frac{5}{16}$ " USS
	G10144	4	Wing Nut, $\frac{5}{16}$ "-18
4.	GR0212	1	Plate
5.	GR0207	2	Nylon Bushing
6.	G10303	2	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10219	2	Washer, $\frac{5}{16}$ " USS
	G10144	2	Wing Nut, $\frac{5}{16}$ "-18
7.	GR0215	6	Metering Hose, $\frac{1}{2}$ " x 13"
8.	G10681	-	Hose Clamp, No. 6
9.	G10004	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
10.	GR0213	2	Angle
11.	GR0217	2	Manifold Plug
12.	GR0232	6	Adapter
13.	GR0228	1	Intake Manifold
14.	GR1484	1	Discharge Manifold Less Hose Barbs
15.	G4301-06	1	Hose, $\frac{3}{8}$ " x 160', 12 Row 30"
	G4301-05	2	Hose, $\frac{3}{8}$ " x 120', 12 Row 36"/38"
16.	GR0211	-	Rubber Cap
17.	GR0229	6	Nylon Washer
18.	GR1626	6	Bushing
19.	G10131	2	Square Head Set Screw, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
20.	G10640	8	Grease Fitting, $\frac{1}{4}$ "-28
21.	GR0231	2	Roller Arm
22.	GR0233	3	Roller
23.	G10718	2	Spring Pin, $\frac{5}{16}$ " x 1 $\frac{1}{8}$ "
24.	GD9109	2	Sleeve
25.	GD9107	1	Shaft
26.	GR0226	2	Shim, $\frac{3}{64}$ "
27.	GR0225	2	Shim, $\frac{1}{32}$ "
28.	GR0208	1	Frame
29.	GR1577	6	Nylon Hose Barb, $\frac{1}{2}$ " x $\frac{3}{8}$ " (If Applicable)
A.	GA8691	2	Squeeze Pump Complete, 6 Rows (Items 1-13, 15-22 And 25-29)

LIQUID FERTILIZER SQUEEZE PUMP, 16 ROW SIZE

LFC010(PT48a)

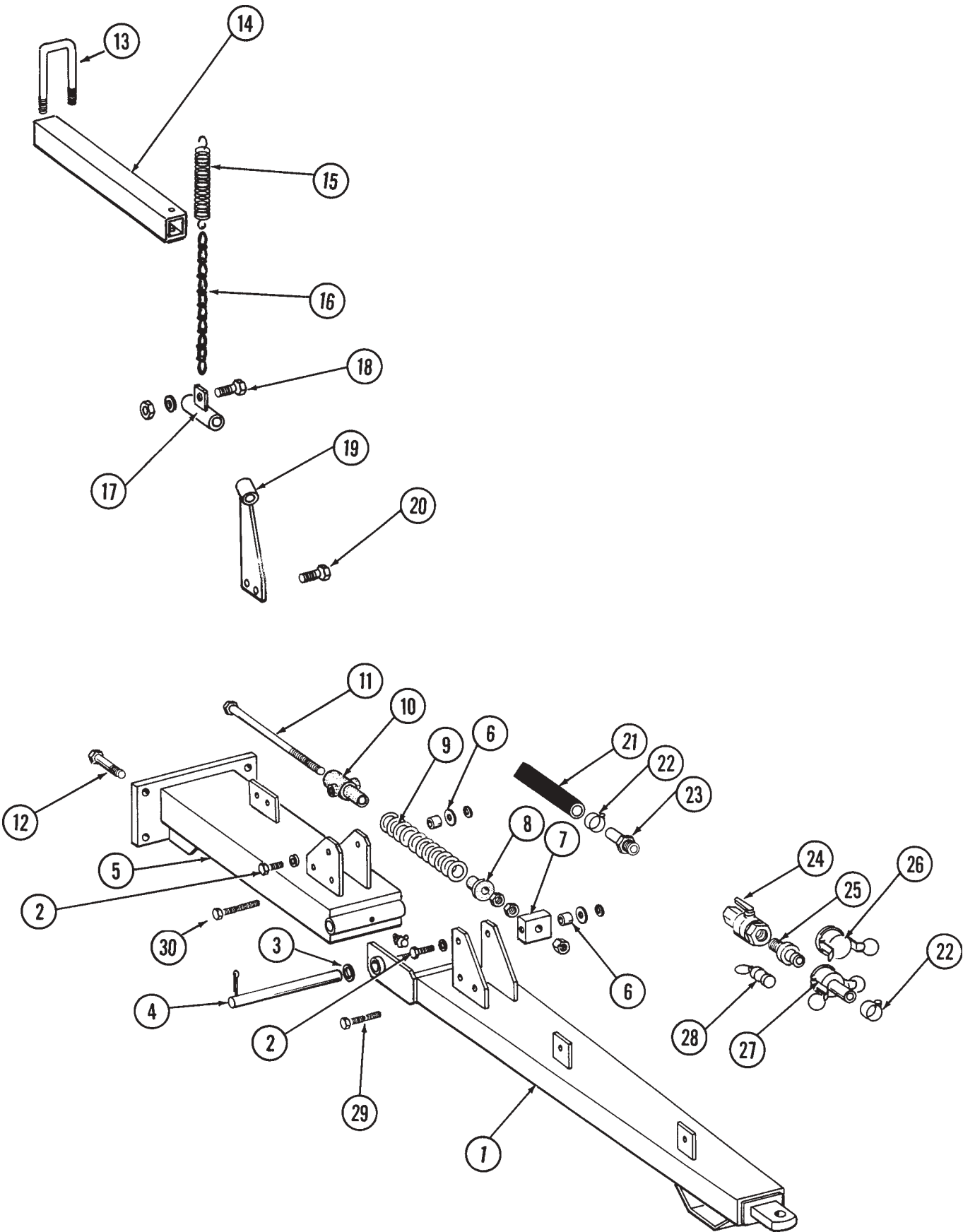


LIQUID FERTILIZER SQUEEZE PUMP, 16 ROW SIZE

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GR0221	2	Spring Anchor Bar
2.	GR0214	8	Spring
3.	G10130	4	Square Head Machine Bolt, $\frac{5}{16}$ "-18 x 1 $\frac{3}{4}$ "
	G10219	4	Washer, $\frac{5}{16}$ " USS
	G10144	4	Wing Nut, $\frac{5}{16}$ "-18
4.	GR0212	2	Plate
5.	GR0207	2	Nylon Bushing
6.	G10303	4	Carriage Bolt, $\frac{5}{16}$ "-18 x 1"
	G10219	4	Washer, $\frac{5}{16}$ " USS
	G10144	4	Wing Nut, $\frac{5}{16}$ "-18
7.	GR0215	8	Metering Hose, $\frac{1}{2}$ " x 13"
8.	G10681	-	Hose Clamp, No. 6
9.	GR0232	8	Adapter
10.	G10004	4	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10101	4	Hex Nut, $\frac{3}{8}$ "-16
11.	GR0279	1	Angle, L.H.
	GR0280	1	Angle, R.H.
12.	GR0217	2	Manifold Plug
13.	GR0284	1	Intake Manifold
14.	GR1485	2	Discharge Manifold Less Hose Barbs
15.	G4301-05	1	Hose, $\frac{3}{8}$ " x 120'
16.	GR0211	-	Rubber Cap
17.	GR0229	6	Nylon Washer
18.	GR1626	6	Bushing
19.	G10131	2	Square Head Set Screw, $\frac{5}{16}$ "-18 x $\frac{3}{4}$ "
20.	G10640	8	Grease Fitting, $\frac{1}{4}$ "-28
21.	GR0231	2	Roller Arm
22.	GR0283	3	Roller
23.	GR0282	2	Set Collar
24.	GR0281	1	Back Up Roller
25.	G10718	2	Spring Pin, $\frac{5}{16}$ " x 1 $\frac{1}{8}$ "
26.	GD9109	2	Sleeve
27.	GD9108	1	Shaft
28.	GR0226	4	Shim, $\frac{3}{64}$ "
29.	GR0225	4	Shim, $\frac{1}{32}$ "
30.	GR0222	1	Frame
31.	GR1577	8	Nylon Hose Barb, $\frac{1}{2}$ " x $\frac{3}{8}$ " (If Applicable)
A.	GA8692	2	Squeeze Pump Complete, 8 Rows (Items 1-14, 16-24 And 27-31)

REAR TRAILER HITCH

PHA032/LFC003(TWL47a)



REAR TRAILER HITCH

ITEM	PART NO.	QTY.	DESCRIPTION
1.	GA6961	1	Hitch
2.	G10007	4	Hex Head Cap Screw, $\frac{5}{8}$ "-11 x 1 $\frac{1}{2}$ "
	GD7805	4	Special Washer, $\frac{5}{8}$ ", Hardened
	G10230	4	Lock Washer, $\frac{5}{8}$ "
3.	G10226	2	Washer, 1 $\frac{1}{4}$ " SAE
4.	GD3547	1	Pin, 1 $\frac{1}{4}$ " x 12 $\frac{3}{4}$ "
	G10460	2	Cotter Pin, $\frac{1}{4}$ " x 2"
5.	GA6960	1	Hitch
6.	GB0218	4	Bushing, $\frac{21}{32}$ " I.D. x $\frac{7}{8}$ " O.D. x $\frac{19}{32}$ " Long
7.	GD7908	1	Tap Block
8.	GB0213	1	Spring Seat
9.	GD2115	1	Spring
10.	GB0206	1	Rod Guide
11.	GD7907	1	Special Bolt
	G10105	3	Hex Nut, $\frac{3}{4}$ "-10
12.	G10826	5	Hex Head Cap Screw, 1"-8 x 2 $\frac{1}{2}$ "
	G10396	5	Lock Nut, 1"-8
13.	GD2721	2	U-Bolt, 2" x 2" x $\frac{1}{2}$ "-13
	G10228	4	Lock Washer, $\frac{1}{2}$ "
	G10102	4	Hex Nut, $\frac{1}{2}$ "-13
14.	GD10196	-	Hanger Tube
15.	GD0829	-	Spring
16.	G3305-03	-	Twin Loop Chain, 15 Links
17.	GA7209	-	Hose Support
18.	G10064	1	Hex Head Cap Screw, $\frac{1}{4}$ "-20 x 1"
	G10209	2	Washer, $\frac{1}{4}$ " USS
	G10110	1	Lock Nut, $\frac{1}{4}$ "-20, Grade B
19.	GA7208	-	Hose Support
20.	G10004	2	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 1 $\frac{1}{4}$ "
	G10108	2	Lock Nut, $\frac{3}{8}$ "-16
21.	G4200-01	1	Hose, 1 $\frac{1}{4}$ " x 22'
22.	G10672	6	Hose Clamp, No. 28
23.	G10626	1	Adapter, 1 $\frac{1}{4}$ " NPT To Barb
24.	GA4976	1	Shutoff Valve, 1 $\frac{1}{4}$ " NPT
	GR1015	-	Body O-Ring
	GR1016	-	Stem O-Ring
	GR1017	-	Teflon Seat
	GR1018	-	Ball
	GR1019	-	Handle
25.	GD1514	1	Adapter, 1 $\frac{1}{4}$ " Male NPT To Cam Lock
26.	GD1515	1	Dust Cap, 1 $\frac{1}{4}$ " Cam Lock
27.	GD1516	1	Adapter, 1 $\frac{1}{4}$ " Barb To Female Cam Lock
28.	GD1517	1	Dust Plug, 1 $\frac{1}{4}$ " Male Cam Lock
29.	G10172	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 5"
	G10229	1	Lock Washer, $\frac{3}{8}$ "
	G10101	1	Hex Nut, $\frac{3}{8}$ "-16
30.	G10756	1	Hex Head Cap Screw, $\frac{3}{8}$ "-16 x 6"
	G10229	1	Lock Washer, $\frac{3}{8}$ "
	G10101	1	Hex Nut, $\frac{3}{8}$ "-16

DECALS, PAINT AND MISCELLANEOUS



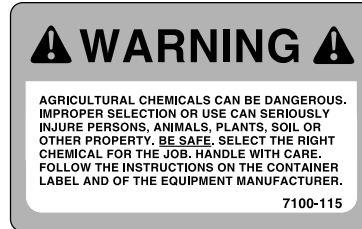
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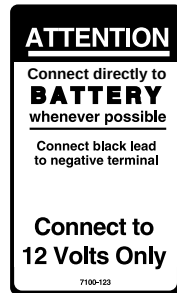
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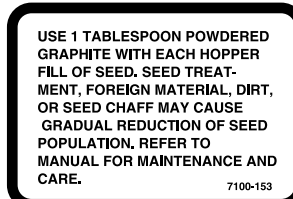
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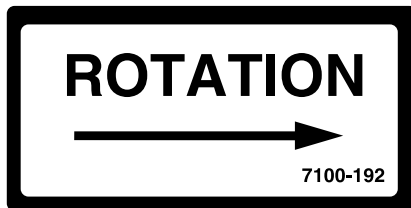
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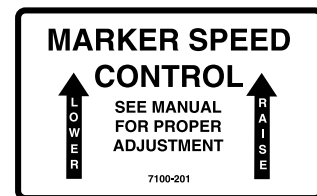
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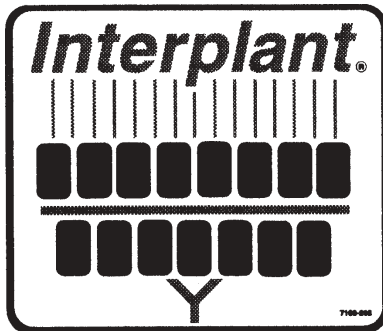
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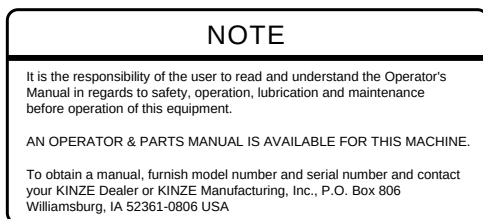
TRANSMISSION RATE REDUCTION		
CHISE	DRIVEN	% REDUCTION IN POPULATION
15	30	50
17	30	43
20	30	33
24	30	25
28	30	17
35	30	13
37	30	10

**Use sprockets off seed drive transmission

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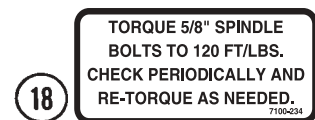
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KINZE 3600

19



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DECALS, PAINT AND MISCELLANEOUS



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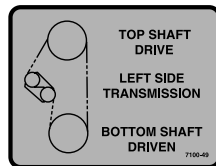
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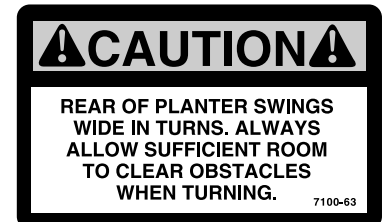
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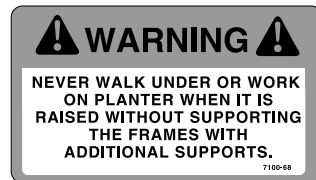
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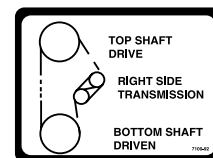
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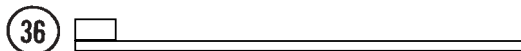
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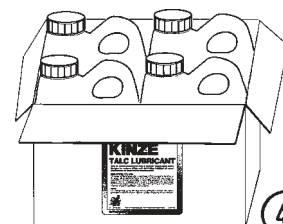
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DECALS, PAINT AND MISCELLANEOUS

ITEM	PART NO.	QTY.	DESCRIPTION
1.	G7100-02	3	Decal, Warning
2.	G7100-110	-	Decal, Grease Weekly
3.	G7100-111	-	Decal, Oil Daily
4.	G7100-115	-	Decal, Warning (1 Per Granular Chemical Hopper)
5.	G7100-116	-	Decal, Grease Daily
6.	G7100-117	1	Decal, Danger
7.	G7100-123	1	Decal, Attention
8.	G7100-153	-	Decal, Information (1 Per Brush-Type Seed Meter)
9.	G7100-177	1	Decal, Twin-Line®, 3/4" x 3"
10.	G7100-192	-	Decal, Point Row Clutch Rotation
11.	G7100-200	-	Decal, Warning
12.	G7100-201	1	Decal, Information
13.	G7100-208	-	Decal, Interplant®
14.	G7100-214	-	Decal, Two-Speed Point Row Clutch Rate Reduction
15.	G7100-215	1	Decal, Danger
16.	G7100-217	-	Decal, Note
17.	G7100-219	-	Decal, Warning
18.	G7100-234	-	Decal, Bolt Torque
19.	G7100-245	2	Decal, KINZE® 3600
20.	G7100-247	-	Decal, Logo, 4 3/8" x 4 1/2" (2 Per Row Unit)
	G7100-252	-	Decal, Logo, 3 1/2" x 3 5/8" (Hopper Panel Extension)
21.	G7100-295	-	Decal, Spring Tension Release
22.	G7100-249	-	Decal, Caution
23.	G7100-42	4	Decal, Warning
24.	G7100-46	1	Decal, Warning
25.	G7100-49	1	Decal, Left Side Transmission
26.	G7100-302	1	Decal, Warning
27.	G7100-63	2	Decal, Caution
28.	G7100-68	3	Decal, Warning
29.	G7100-75	4	Decal, Caution
30.	G7100-83	2	Decal, Warning (1 Per Marker Lockup)
31.	G7100-89	2	Decal, Danger
32.	G7100-90	1	Decal, Warning
33.	G7100-92	1	Decal, Right Side Transmission
34.	GD10057-01	-	Hose Identification Sleeve, Red AA
	GD10057-02	-	Hose Identification Sleeve, Red BB
	GD10057-03	-	Hose Identification Sleeve, Blue AA
	GD10057-04	-	Hose Identification Sleeve, Blue BB
35.	GM0195	-	Operator & Parts Manual, Model 3600 (Mechanical Seed Metering System)
36.	GD1512	-	Tie Strap, 7 1/2"
	GD2117	-	Tie Strap, 14 1/2"
	GD1162	-	Tie Strap, 28"
	GD2984	-	Tie Strap, 34"
37.	GD2199	1	SMV Sign
38.	GR0146	-	Powdered Graphite, 1 Pound Container
	GR0146MPP	-	Powdered Graphite, Twenty-Four 1 Pound Containers
39.	GR0155	-	Blue Paint, Aerosol Can
	GR0155MPP	-	Blue Paint, Twelve Aerosol Cans
40.	GR1570MPP	-	Talc Lubricant, Four 8 Pound Containers
41.	G7100-261	-	Reflective Decal, Red, 1 3/4" x 9", Die-Cut (If Applicable)
	G7100-262	-	Reflective Decal, Amber, 1 3/4" x 9", Die-Cut (If Applicable)
	G7100-263	-	Reflective Decal, Orange, 1 3/4" x 9", Die-Cut (If Applicable)
42.	G7100-258	-	Reflective Decal, Red, 1 1/2" x 9", Rectangular (If Applicable)
	G7100-259	-	Reflective Decal, Amber, 1 1/2" x 9", Rectangular (If Applicable)
	G7100-260	-	Reflective Decal, Orange, 1 1/2" x 9", Rectangular (If Applicable)

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