

#### **Suggested Spares Guide**



280 Engine Side Feed Baler 14", 16" Chambers

A Product of

Allied Systems
Sherwood, Oregon USA

Part Number	Description	Qty On Baler	Order Qty		
	Section 1 - Front End				
HTH0021097	Hitch	1			
HTH0031000	Hitch Ball W/Nut & Washer	1			
F000000440	Ferrule, Drawbar Latch Lever	1			
Se	ction 2 - Frame and Tension System (Hay Dogs, Chamber, Hub/S	Spindles)			
F00000188	Spring, Hay Dog	7			
F000000220	Pin, Hay Dog	1			
F000001589	Kit, Haydog Pads W/Screws	7			
F000007911	Haydog, Top	2			
F000000837	Haydog, Bottom	3			
F000007563	Haydog, RH	1			
F000007562	Haydog, LH	1			
F000001609	Stationary Knife (16")	1			
F000007744	Stationary Knife (14")	1			
F000007439	Knife Guide	1			
F000007762	Chamber Liner, Bottom LH	1			
F000007763	Chamber Liner, Top LH	1			
F000007767	Chamber Liner, Bottom RH	1			
F000007809	Chamber Liner, Bottom RH	1			
F000007810	Chamber Liner, Bottom Center	1			
F000007811	Chamber Liner, Bottom, LH	1			
PLG0026593	Rail, Plunger Side, RH Bottom	1			
Y09G-516	Capscrew, Chamber Rails	49			
Y09G-520	Capscrew, Chamber Rails	4			
Y09G-524	Capscrew, Chamber Rails	13			
Y09G-528	Capscrew, Chamber Rails	5			
F000007769	Plunger Face Adjusting Pad, LH, Top	1			
F000008116	Plunger Face Adjusting Pad, RH, Top	1			
F000008117	Plunger Face Adjusting Pad, Ctr	1			
F000007777	Plunger Face Adjusting Pad, LH, Bottom (16")	1			
F007777-14	Plunger Face Adjusting Pad, LH, Bottom (14")	1			
902704	Chamber Wedges (With Hardware)	1			
F000008110	Twine Guide Rod	1			
ZZ00000218	Bushing, Side Tension Cylinder, 10GA	A/R			
ZZ00000219	Bushing, Side Tension Cylinder, 14GA	A/R			
F000008003	Hub/Spindle Assy, Hwy/8-Ply Float	2			
F000008002	. Hub Assy	2			
F000007995	. Retainer, Grease	2			
F000008000	. Hub Cap	2			

# FREEMAN\_\_\_\_\_

Part Number	Description	Qty On Baler	Order Qty
	Section 4 - Power unit (Engine, Clutch)		1 3.57
252494	Oil Filter	1	
257240	Fuel Filter	1	
255494	Air Filter, Outer	1	
255495	Air Filter, Inner	1	
ACL0000004	Air Restriction Indicator, Mini	1	
257241	Belt, Alternator	1	
253343	Belt, Cooling Fan	1	
F000007000	Belt, Drive	1	
SWI0001140	Switch, Ignition	1	
DTZ1173470	Head Temperature Switch	1	
257239	Oil Temperature Switch	1	
257238	Oil Pressure Sender	1	
257242	Stop Switch, Broken Belt	1	
CIR0029071	Auto Shutdown Module	1	
253015	Fuel Solenoid	1	
CLH0203569	Clutch Facing Plate	1	
CLH0332919	Clutch Kit	1	
901667	Actuator, Throttle	1	
F000001689	Cap, Fuel Tank	1	
Section	5 - Drive System (Flywheel, Pinion, Bullgear, Con Rod, Plunger, S	top Dog)	
BSH0007127MP2	Flywheel Bushing (set of 2)	1	
SSC0000516	Shear Bolt & Nut Kit, Flywheel	1	
F000001132	Shear Bushing, Flywheel Hub	1	
F000001614	Shear Bushing, Flywheel (Flanged)	1	
HUB0007157	Shear Hub, Flywheel	1	
F000001132	. Bushing, Shear Hub (Included With HUB0007157 Above)	1	
ZZ00002008	Collar, Flywheel Shaft	1	
906113	Bullgear Pinion Shaft Pillow Block Bearing.	2	
GER0007128	Gear, Pinion	2	
F000007035	Seal, Side Plate Assy, Bullgear	4	
F000007033	Bearing Cone, Side Plate Assy, Bullgear	4	
204631	Bearing Cup, Side Plate Assy, Bullgear	4	
F000007036	Race, Seal, Side Plate Assy, Bullgear	2	
F000007037	Nut, Adjusting, Side Plate Assy, Bullgear	2	
F000007488	Key, Pinion Shaft, Bullgear	2	
F000007626	Grease, Bullgear, 1 Gal.	A/R	
LUB0323060	Fitting, Pressure Valve, Bullgear Luber	2	
F000000046	Pin, Connecting Rod To Bullgear	1	

Part Number	Description	Qty On Baler	Order Qty
Section 5 -	Drive System (Flywheel, Pinion, Bullgear, Con Rod, Plunger, Stop	Dog) Cont	
PIN0008670	Pin, Connecting Rod Pivot	1	
F000007914	Pin, Connecting Rod, Plunger Side	1	
F000008078	Bushing, Connecting Rod To Bearing Housing	1	
F000008114	Connecting Rod Bearing Housing	1	
F000008077	Race, Inner, Connecting Rod To Bearing Housing	1	
R1574466	Bearing, Connection Rod - Plunger	1	
ZZ00000200	Bushing, Connecting Rod - Plunger	A/R	
KNF0011157	Knife, Plunger (16")	1	
KNF0021901	Knife, Plunger (14")	1	
F000000227	Plunger Knife Bolt	3	
BRG0001636	Plunger Top Roller Bearing.	1	
F000000774	Plunger Roller Wiper, Front	2	
F000000775	Plunger Roller Bearing, L. Rear	1	
PIN0007831	Roll Pin, Plunger Roller	4	
PLG0007839	Roller Angle, RH	1	
PLG0007840	Angle Weldment, RH	1	
F000000986	Plunger Roller Wiper, Rear	2	
F000001537	Plunger Slide	4	
NYL0001250	Tubing, Lubrication, Plunger	8 Feet*	
F000001441	Lube Fitting, Elbow W/Sleeve	5	
F000007547	Stop Dog, Plunger (14" & 16")	1	

<sup>\*</sup> Indicates that the part is used in multiple locations. Qty shown is for the listed location only.



Part Number	Description	Qty On Baler	Order Qty	
Section 6 - Pickup (Pickup, Drive Chain Assy)				
BRG0000202	Pickup Driveshaft Bearing, Outer	1		
F000007063	Pickup Driveshaft Bearing, Inner	1*		
BRG0020016	Pickup Clutch Bushing	1		
F000001791	Pin, Clutch, Pickup Drive Chain	2		
F000001790	Spring, Clutch Pin, Pickup Drive Chain	2		
F000001793	Friction Disk, F/PTO to Clutch, Pickup Drive Chain	2		
SHF0021219	Shaft, Pickup Drive Chain Assy	1		
ZZ00000228	Bushing, Pickup Drive Chain Assy, Spk - Brg.	1		
BRG0006219	Pickup Tooth Bar Cam Lever Bearing	12		
CAM0033355	Pickup Tooth Bar Cam Lever Assy.	6		
LEV0033355	. Cam Lever	1		
BRG0002029	. Bearing	1		
BSH0006231	. Bushing	1		
222477	. Capscrew	1		
NCX0005000	. Nut	1		
F000000101	Pickup Tooth Guide Pipe	60		
NFX0000313	Nut, Flex Loc, Pickup Tooth Attaching	96		
PCY0033352	Spacer, Pickup Tooth	78		
SHF0033356	Pivot Shaft, Pickup Tooth Bar	6		
TTH0033171	Pickup Tooth	78		
STR0033500	Stripper, Outer, Pickup	1		
STR0033501	Stripper, Inner, Pickup	1		
STR0033502	Stripper, Center, Pickup	25		
F000000440	Ferrule, Lift Spring Plate, Pickup Assy	1		
BRG0067000	Bearing, Pickup Auger	2		
F000008011	Bearing Cup, Pickup Auger	2		
SPK0002318	Sprocket, Idler, Pickup Auger	2		
SPK0040030	Sprocket, Driven, Pickup Auger	1		
SPK0040045	Sprocket, Drive, Pickup Auger	1		
CHN0040125	Drive Chain, Pickup Auger	1		
F000004073	Master Link, Pickup Auger Drive Chain	3		
F000008102	Kit, Bearing/Flanges, Pickup Real Shaft	2		
F000008339	Kit, U-Joint Repair, Pickup Driveline	2		

<sup>\*</sup> Indicates that the part is used in multiple locations. Qty shown is for the listed location only.

Dort Number	Description	Qty On Baler	Order
Part Number	Description  Section 7 - Feeder and Feed Fork (Feed Arm, Fork, House)		Qty
F000007145	Wear Plate, Feed House-Chamber	1	
F000007143	Spring, Feed House Latch	1	
F000000281	Catch, Torque Shaft	1	
F000007363	Ferrule, Feeder House Latch	1	
F000007276	Bumper, Rubber, Feed Arm Stop	1	
F000008284 F000008232	Feed Fork Frame	1	
F000008232		3	
	Clip, Feed Fork	_	
F000007970	Strap, Inside, Rear Feed Fork Tines	3	
F000007971	Strap, Outside, Rear Feed Fork Tines	3	
F000007967	Tine, Inside Trailing (16")	1	
F000007968	Tine, Outside Trailing (16")	1	
F000007969	Tine, Center Trailing (16")	1	
F000001189	Tine, Leading Feeder (16")	1	
F007967-14	Tine, Inside Trailing (14")	1	
F007968-14	Tine, Outside Trailing (14")	1	
F007969-14	Tine, Center Trailing (14")	1	
F001189-14	Tine, Leading Feeder (14")	1	
F000001603	Tine, Short, Leading	2	
F000001193	Feed Fork Tine Bushing	15	
F000000822	Feed Arm, Spring Arm Cam Follower	1	
F000004050	Latch Roller	1	
F000007529	Pivot Shaft Arm	1	
F000007604	Hook, Feed Arm Latch	1	
F000007605	Pin, Latch Hinge	1	
F000007606	Trip Arm	1	
F000001556	. Feed Arm Trip Lever Bushing	1	
F000007607	Inner Race, Latch Hinge	1	
F000007610	Latch Hinge	1	
F000008126	Shaft, Pivot Feed Arm	1	
F000008129	Cap, Bearing Housing, Pivot Shaft, Feed Arm	1	
F000008130	Retaining Ring, Bearing Housing, Pivot Shaft, Feed Arm	1	
F000008131	Nut, Bearing Housing, Pivot Shaft, Feed Arm	2	
F000008132	Lock Washer, Bearing Housing, Pivot Shaft, Feed Arm	1	
F000008133	Bearing Cup, Bearing Housing, Pivot Shaft, Feed Arm	1	
F000008134	Bearing Cone, Bearing Housing, Pivot Shaft, Feed Arm	2	
F000008135	Seal, Oil, Bearing Housing, Pivot Shaft, Feed Arm	1	
F000008136	Dust Cap, Bearing Housing, Pivot Shaft, Feed Arm	1	
F000008139	Sleeve, Pivot Shaft, Feed Arm	1	



Part Number	Description	Qty On Baler	Order Qty
	Section 7 - Feeder and Feed Fork (Feed Arm, Fork, House) Cont		
F000008141MP2	Bushing, Pair, Feed Arm	1 PR	
F000008187	Washer, Feed Arm Height	A/R	
F000008334	Washer, Feed Arm Pivot Shaft	A/R	
F000008262	Sleeve, Spring Arm	1	
PIN24065-1	Kit, Feed Arm Pin (Pin, Bearing, Nuts)	1	
903598	Kit, Latch Roller Assy	1	
F000001907	Rubber Wheel, Hay Saver	1	
BSH0162048	Bushing, Hay Saver Wheel	1	
	Section 8 - Knotter (Conventional)		
902848	Knotter Top Plate	1	
F000007891	Twine Tension Assy	2	
F000007890	. Top Plate, Twine Tensioner	1	
F000007449	Brake Plate & Lining, Inside, Knotter	1	
F000007450	Brake Plate & Lining, Outer, Knotter	1	
F000007453	Spring, Brake Plate, Knotter	2	
F000007454	Kit, Brake Lining W/Rivets	1	
F000007559	Spring, Saddle Lever, Knotter Brake	1	
F000007585	Sleeve, Saddle Lever Anchor, Knotter	1	
F000007586	Bushing, Saddle Lever Anchor, Knotter	1	
F000007587	Seal, Saddle Lever Assy, Knotter	2	
F000004089	Grease Fitting, Saddle Lever Roller	1	
CLH0020799	Clutch Pawl, Knotter	1	
F000004115	Spring, Knotter Clutch Pawl	1	
PIN0020739	Pin, Clutch Pawl	1	
F000004134	Bearing, Knotter Clutch Disk	1	
F000004135	Inner Race, Knotter Clutch Disk	1	
F000004136	Large Washer, Clutch Housing-to-Disk	1	
F000007063	Pickup Chain Drive, Knotter Shaft	2*	
F000007397	Sprocket, Idler, Knotter Drive	4	
F000008084	Rod, Chain Tightener, Knotter Drive	1	
F000001517	Twine Finger Shaft Spring	1*	
F000000181	Twine Finger Bushing	2	
F000008391	Twine Finger Drive Rod	2	
F000001294	Ball Joint, Twine Finger Drive Rod End, RH	1	
F000001295	Ball Joint, Twine Finger Drive Rod End, LH	1	
NFL0003750	Twine Finger Drive Rod Jam Nut, LH	2	
R013803692	Twine Finger Drive Rod Jam Nut, RH	2	
F000008095	Kit, Bearing/Flanges, Twine Finger Drive Shaft	2	

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Part Number	Description	Qty On Baler	Order Qty
	Section 8 - Knotter (Conventional) Cont		
KNT006006A	Knotter Head Assy, Conventional (Includes Shaded Items below)	2	
900182	. Kit, One Knotter Rebuild	Qty In Kit	
F000008050	Arm, Knife, Complete	1	
F000008274	Roller, Knife Arm	1	
F000008280	Washer, Roller, Knife Arm	2*	
F000008049	Knife, Twine	1	
F000007860	Washer, Knife Arm, Knotter	1	
F000008051	Cam, Knotter Hook	1	
F000007868	Twine Holder	1	
F000008052	Spring, Twine Holder	3	
F000007876	Shaft, W/Worm Gear	1	
F000007871	Pinion, Twine Holder	1	
GER0007873	Pinion Gear, Worm Shaft, Knotter	1	
RS00006015	Bill Hook (Standard < 280 Twine)	1	
253270	Pinion, Bill Hook	1	
RS00006002	Bushing, Bill Hook	1	
253271	Spiral Pin, Bill Hook Gear	1	
RS00006003	Bushing, Twine Disk	1	
RS00006085	Retainer, Twine Disk	1	
RS00602201	Bushing, Knife Arm	1	
RS206377212	. Kit, Knife Arm Pin, Washers, Nut	2	
F000007976	. Snap Ring, Knife Arm Shaft, Knotter	1	
F000001680	. Washer, Knotter Worm Shaft	1*	
RS05227344	. Pin, Spiral, Worm Pinion & Twine Disk Pinion	2	
RS00006035	. Bill Hook (Option, Larger = > 280 Twine)	1	
RS00003786	. Trigger, Bill Hook	1	
RS00001514	. Roll Pin, Bill Hook	1	
F000008068	. Spacer, Bill Hook Pinion 0.020"	A/R**	
F000008069	. Spacer, Bill Hook Pinion 0.035"	A/R**	
F000007870	. Cleaner, Twine Disc	2	
900249	. Knotter Clutch Disk	1	
F000007948	. Screw, Adjusting Hook Cam	2	

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Part Number	Description	Qty On Baler	Order Qty
	Section 8 - Knotter (Conventional) Cont		
GER0006068	Gear, Modular Cam, Knotter	2	
F000008199	Sight Tube, Knotter Lube Tank	2	
FIL0009052	Filter, Knotter Luber	1	
259013	. Element & Seal Kit, Knotter Luber	1	
259014	. Spring Kit, Knotter Luber	1	
F000001441	Lube Fitting, Elbow W/Sleeve (To Manifold)	1	
F000008312	Sleeve, Luber Manifold, Knotter	1	
F000008306	Ferrule, Auto Luber Fitting	12	
LUB0083313	Injector, Luber, Knotter, With Compression Nut/Sleeve	12	
LUB0083924	. Compression Nut/Sleeve, Injector, Knotter	1	
NYL0001250	Tubing, Lubrication, Knotter	36 Feet*	
F000008287	Lube Fitting, Knotter	4	
F000008288	Lube Fitting, Knotter	8	
F000004160	Bushings, Knotter Shaft (14GA)	A/R	
F000004161	Bushings, Knotter Shaft (18GA)	A/R	
BRG0001572	Follower Cam, Knotter Trip Bar	1	
F000000278	Spring, Knotter Trip Arm	1	
F000001517	Knotter Trip Spring	1*	
F000000440	Ferrule, Knotter Trip Mount	1	
F000001687	Friction Disk	1	
F000001531	Meter Wheel	1	
KNT0032132	Bar Assy, Trip Meter	1	
	Section 9 - Needle Yoke and Needles		
904347	Needle Yoke	1	
904343	Bearing Assy, LH, Needle Yoke	1	
256736	. Bearing, Needle Yoke	1*	
904344	Bearing Assy, RH, Needle Yoke	1	
256736	. Bearing, Needle Yoke	1*	
226272	Bushing, Needle Yoke	2	
F000001549	Needle Yoke Drive Rod End, RH	1	
F000001550	Needle Yoke Drive Rod End, LH	1	
ZZ00000118	Grease Fitting, Needle Yoke Drive Rod Ends	2	
F000001611	Needle	2	
F000000856	Twine Guide Bushing	8	
F000000857	Twine Guide Snap Ring	8	
F000007552	Kit, Carriage Bolt & Nut, Needle to Yoke	4	
SPG0020662	Spring, Stop Dog Return	1	

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Part Number	Description	Qty On Baler	Order Qty
	Section 10 - Hydraulics		
YL-402-C2	Cartridge Check Valve	1	
2500282	. Seal Kit	1	
257438	Valve, Pilot (System Pressure Unloader)	1	
252566	. Seal Kit	1*	
257439	Valve, Relief (System Relief)	1	
242101	. Seal Kit	1*	
257469	Valve, Solenoid (Drawbar Direction)	1	
256864	. Coil, 12 VDC	2*	
905172	. Seal Kit	1*	
257470	Valve, Solenoid (Pickup Direction)	1	
256864	. Coil, 12 VDC	2*	
905172	. Seal Kit	1*	
257472	Valve, Solenoid (Accumulator Drain)	1	
256865	. Coil, 12 VDC	1*	
251383	. Seal Kit	1	
257473	Valve, Solenoid (Tension Rail Opening)	1	
256864	. Coil, 12 VDC	1*	
244583	. Seal Kit	1	
257440	Valve, Pressure Reducer (Tension Pressure Control)	1	
252566	. Seal Kit	1*	
257474	Valve, Relief (Tension Pressure Relief)	1	
256864	. Coil, 12 VDC	1*	
905173	. Seal Kit	1	
2502101	Cartridge, Counterbalance (Pickup Anti-Creep)	1	
242101	. Seal Kit	1*	
FILS1510V3	Filter, Hydraulic Tank	1	
252801	Filter Element, High Pressure	1	
FIL0HF6613	Filter Element, Return	1	
256629	Gear Pump	1	

<sup>\*</sup> Indicates that the part is used in multiple locations. Qty shown is for the listed location only.

## FREEMAN\_\_\_\_\_

Part Number	Description	Qty On Baler	Order Qty
	Section 10 - Hydraulics Cont		
27626	Hydraulic Hose Assembly, Manifold	1	
R12579545	Hydraulic Hose Assembly, Manifold	1	
248075	Hydraulic Hose Assembly, Manifold	1	
254198	Hydraulic Hose Assembly, Manifold	1	
233464	Hydraulic Hose Assembly, Manifold	1	
252867	Hydraulic Hose Assembly, Manifold	1	
902222	Hydraulic Hose Assembly, Manifold	1	
CYL0009014	Cylinder, Drawbar	1	
258627	. Packing Kit, Drawbar Cylinder	1	
R12565833	Hose Assembly, Drawbar	2	
CYL0033749	Cylinder, Tension, Top/Bottom	2	
SEL000KT25	. Seal Kit	1	
F000006519	Cylinder, Tension, Side	1	
SEL0008408	. Seal Kit	1	
23955	Hose Assembly, Tension	1	
25363	Hose Assembly, Tension	1	
245285	Hose Assembly, Tension	1	
245873	Hose Assembly, Tension	1	
R12565833	Hose Assembly, Tension	2	
HOS036659A	Hose Assembly, Tension	2	
F000006724	Cylinder, Hydraulic, Pickup Lift	1	
F000006727	. Seal Kit	1	
251611	Hydraulic Hose Assembly, Pickup Lift	1	
251612	Hydraulic Hose Assembly, Pickup Lift	1	

Part Number	Description	Qty On Baler	Order Qty
	Section 11 - Electrical System		
229289	Toggle Switch	3	
CBK0005515	Circuit Breaker, 15A	1	
CBK0014520	Circuit Breaker, 20A	1	
200274	Circuit Breaker, 30A	1	
LIT1250410	Indicator Lamp	4	
901521	Work Light	3	
LIT037164B	Tail Light Assy, RH	1	
LIT037163B	Tail Light Assy, LH	1	
903158	Bullgear Sensor	1	
903218	Knotter Sensor	1	
254837	Expansion Module	1	
906695	In Cab Monitor (ICM) - Programmed	1	
252639	Cable for ICM	1	
	Section 12 - Misc Parts/ Tools		
F000004067	Cable Roller, Bale Weight Indicator	1	
X-203242	Hay Dog Tool		
WRN035826B	Wrench, Feed Fork Pivot Shaft		
WRN036554B	Wrench, Bearing Locknut		
588466	Socket Set, 3/8" Drive, 3/8" - 7/8" STD/Deep 22 Piece		
588467	Socket Set, 1/2" Drive, 3/8" - 1-1/4" STD/Deep 30 Piece		
588468	Socket Set, 3/4" Drive, 7/8" - 2-3/8" STD 29 Piece		
588469	Combination Wrench Set, 5/16" - 2-1/2" 31 Piece		
588528	Combination Wrench Set, 7mm - 24mm, 18 Piece		
588527	Hex Key Set, 1/4" - 5/8", 18 PC		
906600	Kit, Digital Pressure Gauge W/Female QD, -14.5 to +250 psi		

#### Notes:

One dot preceding the description indicates that the item is a component part of the previously listed item or assembly with no dot. Two dots preceding the description indicates that the item is a component part of the previously listed item or assembly with one dot. Example below, the "Rubber Boot Seal" is included in the "Switch Assembly." Qty's listed for component parts indicate how many are included in the previously listed item.

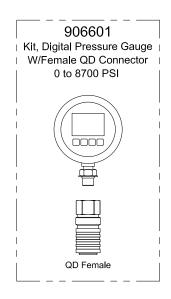
Switch Assembly 4 (# assemblies on baler)
. Rubber Boot Seal 1 (# seals in assembly)

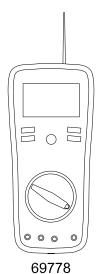
Please include your baler serial number when ordering parts.

<sup>\*</sup> In the "Qty On Baler" column indicates that the part is used in more than one location. Qty shown is for the listed location only.



### **Diagnostic Tools**





Multi-Meter, 12 Function

AC/DC Voltage & Current, Resistance, Capacitance, Frequency, Type K & IR Temperature, Diode/Continuity, Duty Cycle Non-Contact InfraRed Thermometer CAT III Test Leads Type K Bead Wire Temp Probe Order from Allied Systems Service Parts Department 503-625-2560.

