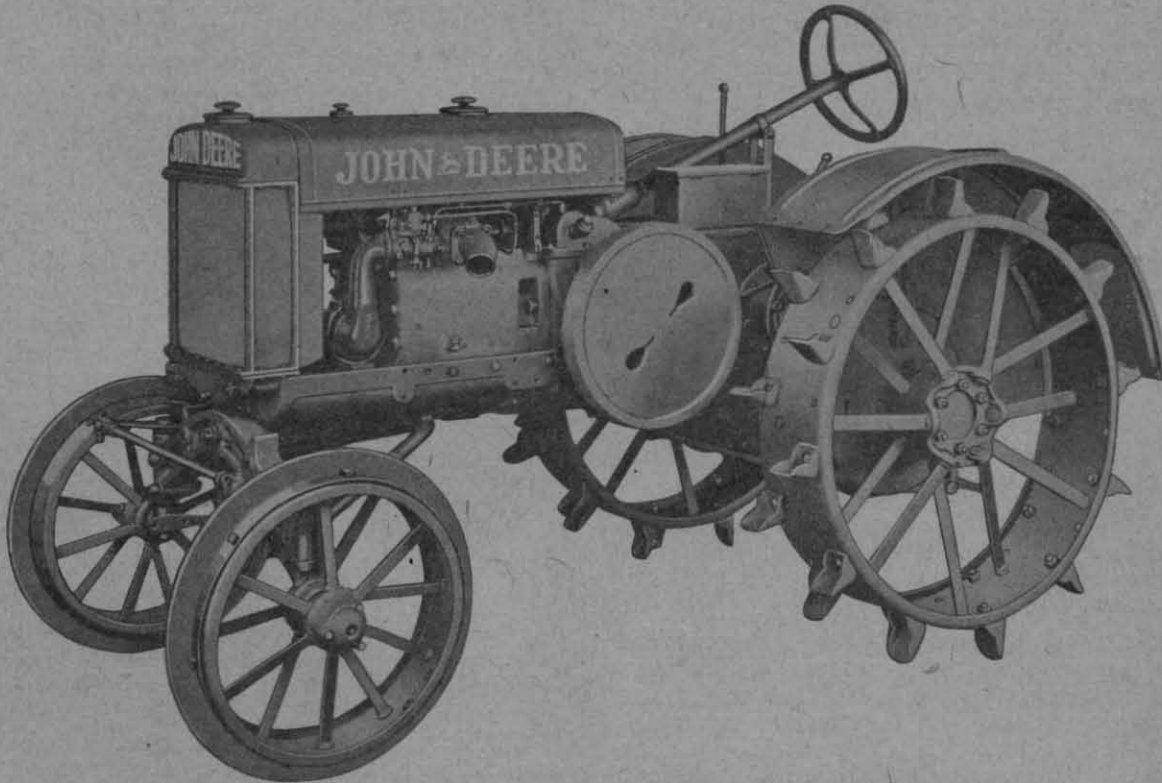


**READ AND FOLLOW THESE DIRECTIONS CAREFULLY AND  
KEEP THEM FOR FUTURE REFERENCE**

# INSTRUCTIONS AND PARTS LIST No. 32



## JOHN DEERE TRACTOR MODEL "GP" READ THIS BOOK CAREFULLY BEFORE STARTING TRACTOR. KEEP IT FOR REFERENCE.

This tractor is designed and built for farm work. Simplicity and the accessibility of all parts make it possible for the operator to make his own adjustments without the aid of an expert. Read and study these instructions carefully, and preserve for future reference. Give the machine daily attention, and make sure that all parts are kept tight and properly oiled. This attention and care will result in continuous and satisfactory service, and reduce wear and breakage to a minimum. Good oil and proper care mean reduction of your maintenance expense.

**JOHN DEERE TRACTOR COMPANY**  
WATERLOO, IOWA, U. S. A.

## BEFORE STARTING TRACTOR, EXAMINE FOR ANY DAMAGE CAUSED BY SHIPPING OR UNLOADING

**Seat.** Assemble seat on tractor. Short leaf must be outside.

**Extension Drawbar.** Straddle swinging link on drawbar cross members and bolt in center hole.

**Fenders and Platform.** Bolt platform assembly on back of rear housings. Bolt fenders to rear housing case and platform. Bolt platform shields and fender braces in place. Use lock washers for all bolts, and pull nuts down tight.

**Lugs.** Bolt on rear wheel lugs, using plain square washers and lock washers under nuts.

Front wheel grousers should be put on with the vertical flange nearest the center of wheel, bolt in *outside* row of holes. (See cut on cover.)

Use lock washers on all bolts. Tighten bolts thoroughly after first half day's use.

**Spark Plugs and Priming Cups.** Spark plugs and priming cups are packed in tool box. Check spark plug points to .020 inch before screwing in cylinder.

Screw priming cups in cylinder.

**Oil.** Put 1-1/2 gallons good tractor-engine oil in crank case through filler pipe at left side of governor case. Summer, medium tractor oil; winter, medium auto oil.

Put 2 gallons of medium - weight transmission oil (not grease) in transmission case through filler hole in rear cover or until oil shows at plug on side of case at back. Put 2 quarts medium transmission oil (not grease) in each rear chain housing or to level of upper plug. Use funnel furnished. Thin with kerosene in cold weather.

Fill the Zerk oil gun furnished, with engine or transmission oil. Fill oilers at front fan bearing—5 on front axle, 1 on radius rod pivot, 4 on steering drag link and tie rod, and 1 on steering gear housing until oil shows at bearings.

The use of CLEAN, high-quality oil and grease will make the tractor run better, last longer, and will prevent delays.

**Air Cleaner.** Soak air cleaner filter in engine oil for five minutes to be sure filter material is thoroughly saturated. Drain off surplus oil and replace filter.

**Fuel.** Before filling fuel tanks, shut off carburetor by turning the 3-way cock lever forward.

Fill kerosene at rear cap 15 gallons; gasoline at small cap 1-1/2 gallons. Water and dirt in fuel are sure to cause trouble. (Always strain fuel.) Be sure that vent hole in gasoline tank cap is open.

**Water.** Fill radiator with CLEAN water. Soft water is best—9 gallons.

## TRACTOR OPERATION

**To Start Engine.** (1) Close water valve, set gear shift lever in neutral and pull clutch lever back.

(2) Set speed control lever forward. Pull spark control lever back to retard position.

(3) Close 3-way cock. Lever forward.

(4) Drain kerosene from carburetor.

(5) Set 3-way cock on gasoline, lever down.

(6) Turn (clockwise) both LOAD needle "G" and IDLE needle "A" *lightly* against seat to close. Open LOAD needle "G" one turn and IDLE needle "A" two turns.

(7) Impulse is automatic. Should impulse stick, it can be engaged manually by pressing down button at inner top end of magneto. (CAUTION—Do not press down button when engine is running.)

(8) Open priming cocks. Prime with fresh gasoline.

(9) Turn flywheel over to front (anti-clockwise).

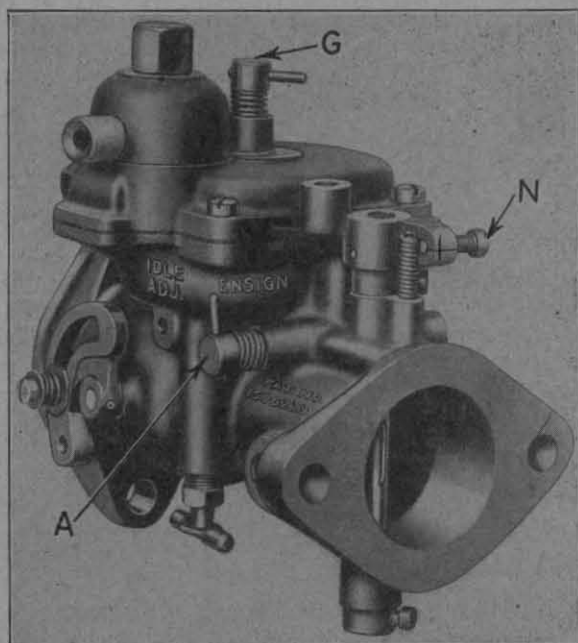
**Running Engine.** (1) When engine starts, oil indicator RED HEAD must rise. Close priming cocks.

(2) Set spark lever back to retarded position when idling or to warm up engine. Set clear ahead to advanced position when pulling load.

(3) When top of radiator feels hot, turn 3-way cock lever toward rear for kerosene. Radiator should always be hot. Cover radiator if necessary in cool weather.

(4) Start engine on gasoline. Warm up engine thoroughly under load. Set 3-way cock to use fuel desired.

With tractor pulling load, close LOAD needle "G" to point where engine loses power or backfires; then unscrew needle slowly until required power is developed. In warm weather, this should leave needle "G" open approximately 1/2 to 3/4



turn, using gasoline, and from 3/4 to 1-1/4 turns, using kerosene. More opening may be required for starting, for cold weather or for very heavy load. Keep LOAD needle "G" closed as far as possible for best fuel economy.

After adjusting LOAD needle "G", retard spark lever (clear back) and push throttle lever clear forward. Adjust IDLE needle "A" until engine runs evenly. In warm weather, this varies from 1-3/4 to 2 turns on gasoline to 1 or 1-1/2 turns on kerosene. This setting may vary on individual tractors, and, when made, let the IDLE adjustment alone.

If, when load is released, governor closes throttle clear shut, causing uneven running (governor opening and closing), screw the throttle stop screw "N" in against stop spring until idling is satisfactory. With spark lever clear back and throttle lever nearly back against stop, engine should idle at 350-400 revolutions per minute.

(5) Engine speed is regulated by speed control lever. To increase speed, push lever forward. The engine develops its rated horse power at 950 R. P. M.

(6) Never overload the tractor. Run at part load first twenty hours.

## STARTING TRACTOR

(1) With engine running, stop pulley by pulling clutch lever back. This insures clutch being disengaged and applies pulley brake. Do not shift gears until pulley stops.

(2) The gear shift lever operates as follows:

Neutral, lever center; reverse, lever forward to the left—slot marked "Rev.".

High speed forward, lever back and to left—slot marked "High".

Intermediate speed forward, lever back and to right—slot marked "Int.".

Low speed forward, lever forward and to right—slot marked "Low".

(3) If gears do not shift freely, move clutch lever forward until pulley turns slowly. This allows gear teeth to line up for shifting. Shift gears carefully. Clashing them causes unnecessary wear and breakage.

(4) When gears are shifted, push clutch lever forward slowly until tractor starts; then shove clear ahead until it locks in place. The clutch is self-locking. See "Adjustment of Clutch" for further information.

(5) After backing into belt, set and latch brakes, throw clutch out, turn pulley backward by pulling on belt to relieve bind in gear shift, shift gears to neutral.

**Stopping Tractor.** Disengage clutch by pulling clutch lever clear back. Always place gear shift lever in neutral after disengaging clutch, and engage clutch if tractor is idling. This reduces wear on clutch facings.

**Stopping the Engine.** (1) In stopping engine after running on kerosene, turn lever of 3-way cock forward, shutting off fuel. Engine will stop when fuel is used from carburetor. Pull spark lever and speed control lever back to run slowly. Pull speed control lever clear back to stop.

(2) If engine has been stopped on kerosene, it can be started while still hot by priming with gasoline. If engine is cold, kerosene must be drained from carburetor and gasoline turned on before starting. Prime with fresh gasoline—high-test in cold weather.



## CARE OF TRACTOR

Before making adjustments on tractor, disconnect spark plug wires to prevent accidental starting of engine.

Keep your engine and tractor clean, well lubricated and adjusted properly. Before changing magneto or timing gears, be sure to read and understand instructions on timing. Mark parts so they can be put back in original position if removed.

Keep all bolts and nuts tight.

Examine spark plugs occasionally, and keep them clean, with gap properly adjusted. In removing spark plugs, be careful not to break insulation.

Always use CLEAN oil, grease and water.

**Oiling System.** When engine starts, oil indicator RED HEAD must rise to insure lubrication. If it does not, check supply of oil in crank case and see that oil indicator works freely. Examine pressure relief valve in pump cover; see that it is clean and works freely. See that oil pipe joints are not leaking. *Indicator must be up when engine is running.*

If engine uses over 1 gallon of oil in 10 hours' operation, examine the connecting rods and adjust if necessary. If it continues to use more than 1 gallon of oil, remove one or two washers from under

the relief valve spring in pump cover below fly-wheel main bearing. To use more oil, add one or two washers. Pressure is set to use 1/2 to 1 gallon of oil in 10 hours, depending upon load. Drain oil to center cock in right-hand side of tractor every 10 hours, and fill to where oil runs out of upper cock (about one gallon). Drain out and wash crank case with gasoline or kerosene every 60 hours' operation.

If gasket between pump and pump cover is renewed, new gasket must not be thicker than the old one (.015 inch) or pump will not maintain pressure.

Keep oil in transmission case up to oil level plug on side of case. In cold weather, mix at least two quarts kerosene with oil in transmission so that oil will carry up.

Keep oil in chain housings up to upper plug. Thin with kerosene in cold weather.

**Fuel System.** If fuel does not flow readily, clean fuel screens at tank and carburetor screen at lower end of fuel line by removing fuel line, nut and cap.

To stop pre-ignition, turn water feed lever (at left of case) to the left. Feed *only enough* water to stop pre-ignition. Turn water off when engine is stopped.

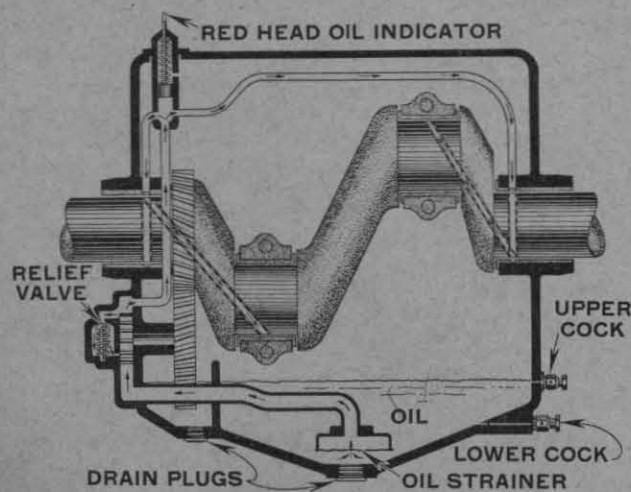
Should it be necessary to replace either the float assembly or the float valve assembly, the following must be observed:

Be sure the cork float, when in its upper position holding valve on the seat, projects 1/4-inch below the flange of the float chamber cover all the way around. To set the cork float, bend the lever.

**Air Cleaner.** Before each day's work, remove filter and rinse in gasoline or kerosene to remove dirt; then dip in new or used crankcase oil. Drain off surplus oil and replace.

Also unscrew dust cap on bottom of Auxiliary Cleaner and clean out. Do not remove filter or dust cap while engine is running.

**Cooling System.** Screen on top of radiator tubes prevents foreign matter from clogging tubes. Keep this screen clean. Always use clean water, preferably soft water, and keep level above radiator tubes. Do not put water into empty cooling system when engine is hot.



If engine overheats, examine air passages in radiator core; remove all chaff, dirt, etc., and straighten bent fins. Adjust tappets for proper clearance; adjust carburetor to secure lean mixture. Check magneto and valve timing, renew oil in crank case, and test compression for leaky valves.

Keep radiator partly covered in cold weather to keep water hot, and save fuel. In freezing weather, drain all water from cooling system.

**Ignition and Magneto.** Magneto is properly aligned and timed when tractor leaves the factory. If it has been removed or timing changed, it may be re-timed as follows:

(1) Secure the magneto to engine, aligned with driving shaft member.

(2) Turn engine in direction it runs to end of compression stroke on left-hand cylinder with the mark on the flywheel (L. H. IMPULSE) in line with mark on spline shaft cover.

(3) Pull spark lever (R. H.) clear back to retard position.

(4) Loosen cap screws on timing plate clamp ring. This allows magneto to turn independent of engine.

(5) Turn magneto same direction as flywheel runs until impulse trip gives spark on left-hand cylinder spark plug wire.

(6) Wire from rear terminal to left spark plug. Wire from forward terminal to right spark plug.

(7) Tighten cap screws on timing plate clamp ring.

(8) Check impulse trip by turning flywheel back 1/2 turn, and, when moved forward slowly, impulse should trip or click as mark on flywheel (L. H. IMPULSE) is in line with mark on spline shaft cover, if not, loosen cap screws on timing plate clamp ring, and if trip is early, turn magneto opposite direction engine runs; if trip is late, turn magneto same direction as engine runs.

• **Clutch.** Clutch is properly adjusted when three adjusting nuts are drawn up to exactly the same tension, with clutch engaged, the clutch operating with a snap requiring some pressure to lock.

To tighten clutch, set clutch lever in engaged

position, tighten each nut one slot to right; replace cotter. Repeat if necessary.

To replace clutch facings, remove nuts on adjusting bolts and remove outer adjusting disk. Remove cap screw on end of crank shaft and loosen clamp screws on driving disk. The driving disk can then be loosened by snapping clutch lever back and forth, then pulling it off splines. In replacing outer disk, be sure facing is in place. Adjust all three nuts to uniform tension with clutch engaged—*this is important.*

**Pulley Brake.** To adjust pulley brake, turn set-screw until brake holds pulley from turning when clutch lever is held clear back.

**Differential Brakes.** To adjust foot pedal, loosen clamp screw on end of pedal and raise or lower one notch on shaft. Brake shaft stop need not be changed unless pedals set too high.

**Steering Gear.** To take up lost motion in steering gear, loosen lock nut on adjusting screw on top of steering gear case and adjust. Do not adjust too tight and be sure to tighten lock nut. Take up end play in worm by tightening outer column nut tighter, then back off 1/8 turn. Take out back lash between worm and gear by removing worm housing shims.

**Valves.** Loss of power is frequently due to poor compression caused by leaky valves. Turn engine over against compression to test for valve leaks. To grind valves, remove radiator and cylinder head. Remove valves and grind to an even seat, refacing valves and seat if rough or pitted. After grinding, test valves for leaks by filling ports with gasoline. A tight valve will hold gasoline even when rotated.

**Timing Valves.** (1) Remove inspection case cover on top of cylinder and turn flywheel until all tappets are free one-quarter turn of flywheel before left-hand exhaust valve opens. Adjust tappets by adjusting screws until clearance is .030 inch. Be sure lock nuts are tight.

(2) Turn flywheel in direction engine runs until exhaust or left-hand valve on left-hand cylinder just starts to open.

(3) Mark on flywheel—"L. H. Exh. Open"—should be in line with or within 1 inch of mark on spline shaft cover. Use mark on cover in line with flywheel rim. Note: Left-hand side of tractor means left hand when operator is on seat looking forward.

(4) If not within one inch, remove governor case and left-hand cam shaft bearing.

(5) Mesh cam shaft gear with crank-shaft gear so left-hand exhaust valve just starts to open when flywheel mark is in line with arrow.

(6) Re-assemble parts removed and see magneto instruction sheet for re-timing magneto.

**Bearings.** To adjust connecting rod bearings, remove cap and brass laminated shims. Pull one .003 inch layer off each laminated shim. Tighten bolts and try rod. It should fit snugly, but not tight enough to bind. Repeat if necessary. Bearing caps and brass-backed bearings are marked and must be put back in their proper place. Laminated

shims must be between steel shims. Nuts must be tight and cotters replaced.

To adjust main bearings, remove flywheel (by loosening bolts and prying off) and end cover on left main bearing. Remove clutch fork bearing and belt pulley. See instructions on replacing clutch facings. Loosen both main bearing caps, slip out the brass laminated shim and proceed as for connecting rod bearings.

**Fan.** Examine fan friction facing once each season.

Fan spring should not be compressed to less than 1 inch in length. Fan should not slip easily when engine is standing still. It should require at least a 12-pound pull at outer end of fan blade to slip it.

## LUBRICATING CHART

The use of *high-quality* oil and grease will make your engine run better, last longer, and will prevent delays.

### Every 10 Hours

Crank Case.... Drain crank-case oil at center cock and fill to upper cock. { Summer—Medium Tractor Oil.  
Winter—Medium Auto Oil.

Front Fan Bearing.....	(1) Fill oiler until oil starts out	} Use Transmission or Engine Oil in oil gun.
Front Axle.....	(5) Fill oiler until oil starts out	
Radius Rod Pivot.....	(1) Fill oiler until oil starts out	
Tie Rod.....	(2) Fill oiler until oil starts out	
Drag Link.....	(2) Fill oiler until oil starts out	
Front Wheels.....	(2) Fill oiler until oil starts out	
Steering Gear Housing.....	(1) Fill oiler until oil starts out	

### Every 60 Hours

Drain crank case and oil pump gear sump. Wash crank case with kerosene. Fill to upper cock with high-grade oil.

Left Spline Shaft Bearing..... { On continuous belt work only.  
Remove cap. } Pack with cup grease.

### Every 200 Hours

Transmission—Fill to oil level plug..... { Medium-weight transmission oil.  
Chain Housing—Fill to upper plug..... { Thin with kerosene in cold weather.

**Important.** Continuous tractor service with few repairs results from proper lubrication. Use good grade of engine oil, and use it regularly. Oil is cheaper than repairs.



# Instructions For Ordering Parts

1. Always give serial number of tractor.
2. Give number and name of part ordered. If in doubt, send sketch or return broken parts, charges prepaid.
3. Order parts from regular John Deere dealer.
4. State how parts are to be shipped—freight, express or parcel post.

Number	Description	Number	Description
<b>Transmission Case</b>		<b>Cam Follower</b>	
AC-166	Gasket—complete—rear cover	C-37-R	Guide—cam follower
AC-255	Case—transmission—main	C-420	Adjusting screw—cam follower
C-690	Cover—front	C-624	Cam follower
C-719	Stud—differential quill to case		
C-783	Stud—cylinder to case (long)		
C-826	Stud—cylinder to case (short)		
C-826	Stud—front end to case		
C-961	Cover—rear		
C-1001	Gasket—complete—front cover		
C-1019	Stud—control quadrant to case		
C-1038	Washer—cover cap screw		
D-625	Pipe plug—transmission filler and oil drain		
D-625	Pipe plug—crankcase drain		
K-2471	Plug—oil sump drain and transmission oil level		
294-R	Stud—steering gear housing to case		
<b>Engine</b>		<b>Cylinder—Valves—Manifold</b>	
AC-125	Flywheel with bolts and dowel pin	AC-251	Manifold—intake and exhaust with exhaust elbow studs
AC-161	Main bearing housing with cap—L. H.	AC-257	Cylinder—complete with studs and valve guides
AC-162	Main bearing housing with cap—R. H.	C-246-R	Guide—valve
C-35-R	Cover—L. H. main bearing	C-248-R	Exhaust elbow
C-138	Collar—flywheel spacing	C-412	Lock washer—valve stem—half
C-491	Shim—main bearing—steel	C-524	Priming cup
C-520	Shim—main bearing—laminated	C-882	Cap screw—front end to cylinder—drilled head
C-602	Gasket—L. H. main bearing cover	C-949	Cap—valve spring
C-618	Adjusting screw—L. H. main bearing	C-992	Spring—valve
C-673	Gasket—L. H. main bearing—housing to case	C-1002	Gasket—valve cover
C-981	Bolt—flywheel	C-1003	Gasket—cylinder to case
C-1100	Bushing—main bearing—half	C-1006	Gasket—manifold to cylinder
D-174	Adjusting screw—R. H. main bearing	C-1009	Cover—valve
D-186	Dowel pin—flywheel—1/4" x 1/2"	C-1012	Valve—intake and exhaust
D-626	Felt—R. H. main bearing	C-1174	Stud—manifold to cylinder
D-1080	Screw—flywheel locating	K-2198	Stud—for cylinder head
		K-2525	Plug—water drain—cylinder
		294-R	Stud—exhaust elbow to manifold
		321-R	Gasket—carburetor to manifold
		508-R	Spark plug
<b>Pistons—Connecting Rod—Crankshaft</b>		<b>Cylinder Head</b>	
AC-177	Crankshaft with gear	C-250-R	Cylinder head
AC-193	Connecting rod—complete	C-251-R	Water inlet pipe—cylinder head
AC-194	Connecting rod and cap with piston pin bushing	C-1005	Gasket—head to cylinder
AD-102	Bolt with nut and cotter—connecting rod	K-2525	Plug—cylinder head drain
C-150	Gear—crankshaft		
C-245-R	Piston		
C-921	Pin—piston		
C-958	Shim—connecting rod—steel		
C-968	Shim—connecting rod—laminated		
C-1014	Ring—piston (3 used per piston)		
C-1015	Ring—piston—oil drain (1 used per piston)		
C-1099	Bushing—piston pin		
C-1101	Bushing—connecting rod—half		
D-186	Dowel pin—crankshaft 1/4" x 1/2"		
D-334	Set-screws—piston pin		
D-342	Key—gear to crankshaft		
<b>Cam Shaft</b>		<b>Governor</b>	
AC-80	Bearing—cam shaft—R. H. with cup	AC-201	Weight—governor
AC-81	Bearing—cam shaft—L. H. with cup	AC-276	Gear—governor drive with cam shaft gear
AC-276	Gear—cam shaft—complete with governor drive gear	AC-283	Sleeve—governor shaft
C-303	Shaft—cam	C-306-R	Case—governor
C-305	Clamp ring—cam gear	C-308	Gear—fan drive bevel
C-528	Cap screw—cam gear 3/8" x 1-1/2" drilled head	C-311-R	Housing—R. H. governor bearing
C-759	Gasket—cam shaft bearing—L. H.	C-902	Pin—governor weight to gear
C-784	Spring—cam shaft thrust	C-903	Pin—governor weight to spring
JD-7203	Cone with rollers—cam shaft bearing—Timken No. 09074	C-908	Shaft—inside governor lever
JD-7250	Cup—cam shaft bearing—Timken No. 09194	C-950	Lever—governor inside
JD-7303	Timken bearing—complete—cam shaft	C-993	Spring—governor weight
P-15	Key—cam gear to shaft	C-998	Thrust bearing—complete
		C-1193	Shaft—governor
		C-1195	Gear—governor
		C-1196	Snap ring—L. H. governor bearing
		C-1197	Felt washer—R. H. governor bearing
		C-1200	Nut—slotted—governor and fan shaft
		C-1201	Lock nut—fan drive bevel gear
		C-1202	Lock washer—fan drive bevel gear
		C-1209	Elbow—oil filler
		D-167	Plug—oil filler elbow
		D-297	Gasket—governor bearings—thick
		D-403	Key—fan drive bevel gear
		D-509	Gasket—governor bearings—thin
		JD-7203	Cone includes roller—R. H. governor bearing—Timken No. 09074
		JD-7209	Cone includes roller—L. H. governor bearing—Timken No. 15118
		JD-7250	Cup—R. H. governor bearing—Timken No. 09194
		JD-7259	Cup—L. H. governor bearing—Timken No. 15250
		JD-7303	Timken bearing—complete—R. H. governor
		JD-7309	Timken bearing—complete—L. H. governor

## LIST OF REPAIR PARTS

Number	Description	Number	Description
<b>Lubricating System—Oil Pump</b>		<b>Fan</b>	
AC-22	Strainer—complete	AC-49	Spider and blades—complete
C-168-R	Gear—oil pump drive	C-308	Gear—fan drive bevel
C-169-R	Body—oil pump	C-310-R	Housing—rear fan bearing
C-401	Pin—oil pump cover	C-312-R	Cover—front fan bearing
C-604	Gasket—oil pump body to case	C-1194	Shaft—fan
C-674	Gasket—strainer flange	C-1198	Adjusting nut—front fan bearing
C-725	Oil pump drive shaft and gear	C-1199	Lock for front fan bearing adjusting nut
C-726	Oil pump idler shaft and gear	C-1207	Bevel pinion—on fan shaft
C-1115	Screen—strainer	C-1217	Gasket—front fan bearing cover
D-29-R	Cover—oil pump gear	D-297	Gasket—rear fan housing—thick
D-162	Relief valve—oil pump cover	D-378	Spring—fan friction
D-180	Nut—relief valve	D-396	Disk—fan drive
D-302	Gasket—oil pump cover—1/64" thick	D-399	Facing—fan friction
D-379	Spring—relief valve	D-400	Key—fan disk
D-453	Washer—relief valve—pressure	D-403	Key—bevel pinion
D-456	Elbow—discharge pipe 3/8"	D-509	Gasket—fan and governor housing—thin
D-465	Gasket—relief valve nut	D-655	Felt retainer—fan shaft—in water pipe
D-793	Body—oil level test cock	D-684	Felt washer—fan shaft—in water pipe
D-794	Plug—oil level test cock	D-825	Felt washer—front fan bearing cover
E-2207	Key—drive gear to shaft	D-826	Felt washer—front fan bearing cover
<b>Oil Indicator and Piping</b>		JD-7203	Cone includes rollers—fan shaft bearing—Timken No. 09074
AC-227	Oil pipe to governor case	JD-7250	Cup—fan shaft bearing—Timken No. 09194
AD-41	Oil pipe to R. H. main bearing	JD-7303	Timken bearing—fan shaft—front and rear
AD-44	Oil pipe to L. H. main bearing	JD-7792	Zerk fitting—front fan bearing 1/8" Bassick No. 1365
AD-290	Piston with rod—oil indicator	27-R	Washer—fan shaft—front
AD-453	Body—oil indicator	1707-R	Washer—spring thrust
C-629	Discharge pipe—pump to indicator	<b>Pulley and Clutch</b>	
C-972	Oil jet—governor case	AC-47	Brake with lining—pulley
D-310	Gasket—indicator body	AC-130	Pulley with cone, bushing and gear
D-380	Spring—oil indicator	AC-229	Disk—clutch driving with bolts
D-392	Body—solder bushing 5/16"	AC-237	Shaft and lever—clutch throw-out
D-417	Elbow—solder bushing 5/16"	C-9-R	Cone—clutch
D-458	Packing nut—discharge pipe	C-74-R	Dog—clutch
D-818	Bushing—discharge pipe to indicator body	C-116	Gear—pulley
<b>Fuel System</b>		C-142-R	Disk—clutch adjusting
AC-102	Gasoline strainer—complete	C-171-R	Fork—clutch
AC-116	Fuel tank—complete	C-172-R	Bearing—clutch fork
AC-183	Bracket—fuel tank—front and rear	C-184-R	Cover—pulley and spline gear
AC-204	Gasoline pipe—complete	C-404	Pin—clutch cone drive
AC-205	Fuel strainer—complete	C-434	Toggle—clutch dog
AD-41	Fuel pipe—complete	C-511	Dust shield—clutch
AD-78	Filler cap—complete—kerosene	C-603	Gasket—clutch fork shaft bearing
AD-97	Screw head and stud—filler cap	C-614	Facing—clutch friction
AD-320	3-way cock	C-643	Bolt—clutch operating
D-19-R	Cap—gas filler	C-667	Snap ring—gear retainer
D-126	Baffle—filler cap	C-717	Gasket—pulley and spline gear cover
D-288	Gasket—fuel tank filler cap	C-732	Welsh plug—clutch fork bearing
D-319-R	Cap—kerosene filler	C-834	Cap screw—dust shield—drilled head
D-362	Clamp bar—filler cap	C-932	Washer on dust shield cap screws
D-468	Cushion—fuel tank bracket	D-100-R	Collar—clutch
1415-R	Drain plug—fuel tank	D-141	Washer—drive disk to crank shaft
<b>Hood</b>		D-178	Cap screw pivot—clutch fork
AC-178	Hood—complete	D-202	Bolt—clutch drive disk
C-941	Clamp—hood	D-279	Key—belt pulley gear
<b>Cooling System</b>		D-339	Pin—clutch dog to link
AC-123	Radiator—complete	D-355	Pin—clutch dog to pulley
AD-86	Filler cap—complete—radiator	D-359	Snap ring—bearing retainer
AD-97	Screw head and stud—filler cap	D-377	Spring—clutch release
C-252-R	Upper water pipe	D-385	Lining—pulley brake
C-256-R	Top tank—radiator	D-552	Bushing—pulley
C-257-R	Radiator side	D-651	Washer—pulley bearing
C-258-R	Bottom tank—radiator	D-917	Retainer—felt washer
C-259-R	Lower connection—radiator	D-918	Felt washer—pulley bearing
C-589	Gasket—upper and lower connections to radiator	JD-7494	Outer race—Hyatt bearing—Hyatt No. OR-212
C-616	Hose—radiator	JD-7544	Roller assembly—Hyatt bearing—Hyatt No. RA-212
C-617	Hose clamp	JD-7594	Inner race—Hyatt bearing—Hyatt No. IR-212
C-928	Strap—radiator	JD-7644	Hyatt bearing—complete—pulley (same as AD-1)
C-1004	Gasket—radiator top and bottom	<b>Spline Shaft</b>	
C-1023	Screen over radiator tubes	AC-79	Gear—spline shaft
C-1106	Core—radiator	AC-176	Quill—spline shaft, C-149-R, complete with bearing cup
D-126	Baffle—radiator filler cap	C-85	Pinion—low and reverse—sliding
D-305	Gasket—lower—water pipe—cylinder to radiator	C-207	Pinion—high and intermediate—sliding
D-319-R	Cap—radiator filler	C-422	Key—spline and shaft gear
D-362	Clamp bar—filler cap	C-490	Cover—spline shaft—left
D-473	Gasket—radiator cap	C-535	Hexagon nut—spline shaft
E-2142	Plug—water drain	C-591	Gasket—left spline shaft cover
27-R	Washer—upper water pipe cap screw	C-658	Oil collar—spline shaft
2205-R	Stud—radiator to front end	C-660	Shaft—spline
		C-666	Snap ring—spline shaft bearing
		D-136	Washer—spline shaft nut
		D-490	Washer—spline shaft nut, R. H.



Number	Description	Number	Description
<b>Spline Shaft—Continued</b>			
JD-7214	Cone—includes rollers—spline shaft bearing, L. H.—Timken No. 3193	C-595	Gasket—rear axle quill
JD-7225	Cone—includes rollers—spline shaft bearing, R. H.—Timken No. 447	C-597	Gasket—rear axle nut cover
JD-7260	Cup—spline shaft bearing, L. H.—Timken No. 3120	C-620	Cover—rear axle nut
JD-7274	Cup—spline shaft bearing, R. H.—Timken No. 432	C-1008	Cover—rear axle housing, R. H. and L. H.
JD-7314	Timken bearing—complete—spline shaft, L. H.	C-1010	Drive wheel—complete
JD-7325	Timken bearing—complete—spline shaft, R. H.	C-1031	Stud—platform and fender supports, 2" x 5/8"
<b>Gear Shift</b>		D-233	Spade lug—4" high
AC-71	Fork—shift—low and reverse—complete	D-411	Bolt—spade lug
AC-72	Fork—shift—high and intermediate—complete	D-938	Washer—used on spade lug bolts
AC-210	Gear—idler with bushing—power shaft	D-1078	Spade lug—5" high
C-27-R	Gate—gear shift	E-97-R	Plug—oil filler
C-98-R	Arm—on gear shift lever	JD-7242	Cone—includes roller—rear axle bearing—Timken No. 3982
C-443	Lever—gear shift	JD-7292	Cup—rear axle bearing—Timken No. 3920
C-457	Yoke—shift fork	JD-7342	Timken bearing—complete—rear axle
C-549	Spring—gear shift lever	<b>Brakes</b>	
C-686	Shaft—shifting fork	AC-48	Brake pedal—complete—right and left
C-1060	Washer—leather—gear shift lever	AC-197	Brake band—complete with lining
C-1098	Bushing—power shaft idler gear	AC-208	Brake drum with hub
D-342	Key—arm to lever	C-271	Brake cam—R. H.
D-678	Adjusting screw—shift shaft	C-272	Brake cam—L. H.
D-789	Nipple—stop pin	C-423	Anchor pin—brake
K-2573	Washer—gear shift lever	C-485	Clip—brake lever spring
1146-R	Spring—stop pin	C-494	Washer—felt retainer—brake
2323-R	Pin—stop	C-596	Gasket—brake cam
<b>Reverse Shaft</b>		C-656	Stop—brake lever
AC-73	Reverse gear with bushing	C-700	Guard—brake drum, R. H.
C-107-R	Collar—reverse shaft	C-701	Guard—brake drum, L. H.
C-426	Shaft—reverse	C-1023	Latch—brake
C-496	Washer—reverse shaft spacing	C-1029	Spacer—brake lever latch
C-619	Welsh plug—reverse shaft	C-1087	Lining—brake band
C-1098	Bushing—reverse gear	C-1088	Spring—brake band
<b>Differential</b>		D-635	Felt retainer—brake hub
AC-149	Gears—high and low with spider	D-636	Felt washer—brake hub
AC-150	Gear—intermediate with spider	K-2573	Washer—brake cam
AC-272	Quill—differential shaft—L. H., with snap ring	372-R	Spring—brake lever
C-20-R	Sprocket—differential shaft	1706-R	Washer—brake latch bolt
C-296-R	Quill—differential shaft—R. H.	<b>Controls</b>	
C-409	Dowel pin	AC-226	Speed change lever and trunnion
C-437	Shaft—differential	AC-249	Crank—speed control
C-462	Washer—differential sprocket bearing	AC-273	Lever—water feed with clips, spring and slide
C-535	Hexagon nut—differential shaft	AC-275	Water feed needle with coupling
C-578	Bolt—differential quill to housing	C-253-R	Quadrant—control
C-594	Gasket—quill to housing	C-261-R	Arm—governor speed control
C-672	Gasket—quill, L. H.	C-440	Clip—clutch operating rod
C-692	Snap ring—outside—differential bearing	C-447	Lever—clutch operating
C-718	Gasket—quill, R. H.	C-545	Pin—pulley brake
C-719	Stud—differential quill to case	C-904	Throttle rod
C-786	Case—differential—pilot side	C-908	Shaft—governor control
C-787	Case—differential—recess side	C-912	Bushing—control quadrant stud
C-788	Spider—differential pinion	C-916	Sleeve—speed change spring
C-789	Pinion—differential	C-924	Rod—spark control
C-790	Gear—bevel side	C-925	Rod—speed control
C-791	Bolt—differential flange	C-927	Rod—clutch operating
D-359	Snap ring—inside—differential bearing	C-954	Bracket—speed control crank
D-490	Washer—differential shaft	C-956	Clip—water feed lever—rear
D-651	Shim washer—differential bearing	C-957	Clip—control rod tube
JD-7674	Ball bearing—differential shaft—outside	C-994	Spring—governor speed change
JD-7691	Ball bearing—differential shaft—inside	C-1018	Tube—control rod
1304-R	Nut—differential flange bolt	C-1019	Stud—control quadrant to case
<b>Final Drive and Rear Wheels</b>		C-1091	Bolt—governor control fork
AC-7	Drive chain, 45 links	C-1185	Rod—choker
AC-212	Housing with studs—rear axle, R. H.	D-87-R	Lever—spark and speed control
AC-213	Housing with studs—rear axle, L. H.	D-157	End—carburetor control rod
C-23-R	Sprocket—rear axle	D-330	Bolt—clutch operating lever
C-24-R	Collar—rear axle	D-393-R	Yoke—clutch operating rod
C-97	Shaft—rear axle	D-407	Pin—clutch rod yoke
C-413	Bolt—rear wheel to axle	E-2057	Washer on throttle rod
C-470	Washer—rear axle sprocket	K-2172	Spring—control lever friction
C-484	Clamp—quill bolt	<b>Water Feed</b>	
C-498	Dust collar—rear axle	AC-274	Water feed pipe
C-538	Nut—rear axle	C-299	Body—water feed valve
C-559	Felt retainer—rear axle	C-663	Check—water valve
C-561	Felt washer—inside—rear axle	C-1181	Water valve nozzle
C-562	Felt washer—outside—rear axle	D-410	Packing nut—needle valve
C-565	Snap ring—rear axle bearing	D-449	Packing nut—water feed
		E-2149	Nut—solder bushing—water feed pipe
		E-2150	Gland—water feed pipe

Number	Description	Number	Description
<b>Front Axle and Steering</b>		<b>Fenders and Platform</b>	
AC-119	Hub cap with oil fitting	AC-220	Fender—complete—R. H.
AC-167	Front wheel with races, less hub cap	AC-221	Fender—complete—L. H.
AC-171	Drag link—complete	C-933	Brace—fender to housing
AC-185	Front axle with steering spindle bushings	C-943	Cross angle
AC-188	Spindle and knuckle—front wheel	C-945	Platform—rear
AC-189	Front wheel knuckle and nut, less spindle	C-946	Platform—center
AC-191	Radius rod with bushing	C-947	Platform—right
AD-452	Nut—front wheel bearing	C-1032	Platform—left
C-112-R	Collar—steering column	C-1177	Support—platform—front
C-232	Arm—steering gear	<b>Magneto</b>	
C-254-R	Wheel—steering worm	AC-199	Magneto, less control arm and advance stop
C-262-R	Housing—steering gear	AC-284	Wire—R. H. spark plug
C-274-R	Housing—steering worm	AC-285	Wire—L. H. spark plug
C-275-R	Worm—steering	C-309	Flange—magneto drive
C-276-R	Adjusting nut—steering worm	C-417	Collar—magneto drive
C-292	Steering arm—R. H.	C-424	Plate—magneto timing
C-293	Steering arm—L. H.	C-471	Clamp ring—magneto timing plate
C-302-R	Front end support	C-1016	Bracket—magneto
C-531	Thrust bearing—front axle	C-1203	Arm—magneto control
C-662	Shim—radius rod	C-1204	Stop—magneto advance
C-677	Gasket—front wheel hub cap	C-1300	Safety nipple—spark plug wire
C-678	Wheel—steering	D-316	Washer—magneto bracket
C-740	Pivot—front axle	D-369	Wood clamp—spark plug wires
C-838	Bearing—ball stud	D-403	Key—magneto drive flange
C-840	Screw plug	135-R	Hood—magneto
C-907	Dowel pin—steering gear housing	508-R	Spark plug
C-909	Stop pin—steering	<b>Magneto Parts</b>	
C-915	Steering shaft	AC-301	Brush holder with brushes and springs
C-917	Shaft—steering gear	C-1302	Screw—spark advance stop
C-918	Coupling—steering shaft	C-1303	Lock washer—spark advance stop and end cap cover screw
C-919	Spindle—front wheel knuckle	C-1304	Screw—in end cap cover (drilled head)
C-934	Support—steering column	C-1305	Adjustment hole screw plug with link
C-977	Adjusting screw—steering gear shaft	C-1306	End cap
C-978	Stop screw—steering gear	C-1307	Felt washer—end cap
C-979	Set screw—headless—steering shaft coupling	C-1308	Gasket—end cap
C-985	Nut—steering wheel	C-1317	Ground brush with spring
C-989	Tube—steering gear shaft	C-1319	Screw—brush holder to frame
C-1007	Gasket—steering worm housing	C-1320	Lock washer—brush holder to frame screw
C-1020	Tube—steering shaft	C-1321	Collector brush
C-1021	Bushing—steering shaft—upper	C-1322	Spring—collector brush
C-1024	Tie rod	C-1324	Lock washer—collector brush spring screw
C-1040	Guide band 2" high—front wheel (2 used per wheel)	C-1325	Gasket—brush holder
C-1059	Thrust washer—steering worm wheel	C-1330	Lock wire—armature shaft nut
C-1102	Bushing—steering gear shaft	C-1331	Nut—armature shaft
C-1104	Nut—steering gear shaft	C-1338	Collector ring
C-1108	Washer—front axle spindle—upper	C-1339	Screw—collector brush spring
C-1109	Yoke—tie rod	C-1341	Breaker bar and point with stationary contact point
C-1215	Spring—oil seal—lower steering gear shaft	D-395	Magneto seal
D-96-R	Nut—front axle pivot pin	<b>Impulse Starter</b>	
D-342	Key—steering shaft	AC-305	Impulse starter—rotating unit—complete
D-372	Felt washer—lower steering gear shaft	AC-306	Impulse drive member with pawls—fits armature shaft
D-555	Bushing—front axle spindle	C-1327	End cover—impulse starter
D-635	Felt retainer—front wheel	C-1328	Felt washer—end cover
D-636	Felt washer—front wheel	C-1329	Washer—end cover felt washer retaining
D-743	Washer—oil seal—lower steering gear shaft	C-1330	Lock wire—armature shaft nut
JD-7203	Cone—includes rollers—steering worm—front bearing—Timken No. 09074	C-1331	Nut—armature shaft
JD-7209	Cone—includes rollers—steering worm bearing—rear—Timken No. 15118	C-1332	Cam member—fits drive collar
JD-7216	Cone—includes rollers—front wheel bearing—outside—Timken No. 2785	C-1333	Impulse spring
JD-7224	Cone—includes rollers—front wheel bearing—inside—Timken No. 3383	C-1334	Pawl—impulse drive member
JD-7250	Cup—steering worm bearing—front—Timken No. 09194	C-1335	Key—impulse drive member to shaft
JD-7259	Cup—steering worm bearing—rear—Timken No. 15250	C-1336	Pawl stop screw—impulse starter
JD-7266	Cup—front wheel bearing—outside—Timken No. 2720	C-1362	Rivet—impulse pawl to member
JD-7270	Cup—front wheel bearing—inside—Timken No. 3320	C-1363	Screw—impulse starter end cover
JD-7303	Bearing—complete—steering worm—front	<b>Carburetor</b>	
JD-7309	Bearing—complete—steering worm—rear	AC-174	Carburetor—complete
JD-7316	Timken bearing—complete—front wheel—outside (same as AD-4)	C-1117	Spring—throttle stop
JD-7324	Timken bearing—complete—front wheel—inside (same as AD-201)	C-1118	Disk—throttle
JD-7792	Zerk fitting—front axle and steering shafts 1/8" Bassick No. 1365	C-1119	Gasket—strainer cage
<b>Drawbar and Seat</b>		C-1120	Screw—float lever
AC-282	Seat spring and leaf	C-1121	Washer—float lever screw
AC-286	Swinging drawbar	C-1122	Float—cork
C-1022	Seat	C-1123	Float—lever
C-1210	Drawbar	C-1125	Pivot—float lever
C-1211	Cross member for swinging drawbar	C-1126	Screen—strainer cage
C-1213	Spacer—drawbar	C-1127	Nut—strainer cage
C-1214	Cap screw—drawbar	C-1128	Control—fuel
D-897	Stud—seat spring clamp	C-1129	Cover—fuel bowl
D-898	Clamp—seat spring	C-1130	Screw—idle speed adjusting
D-901	Cap screw—seat spring	C-1131	Disk—choker

Number	Description	Number	Description
<b>Carburetor—Continued</b>		<b>Power Shaft Parts</b>	
C-1132	Staple—choker and throttle disk	C-154-R	Lock nut—power shaft housing
C-1133	Bushing—throttle bearing	C-313	Power shaft
C-1134	Cage—strainer	C-314	Housing—power shaft—main
C-1135	Screw—throttle shaft pin	C-315	Gear—spur—power shaft
C-1136	Screw—fuel bowl	C-316	Gear—bevel—power shaft—long
C-1137	Spring—idling adjustment	C-317-R	Quill—power shaft bevel gear
C-1138	Plug—5/16" welsh	C-318	Retainer—packing—power shaft—front
C-1139	Plug—3/16" welsh	C-319	Retainer—packing—power shaft—rear
C-1140	Plug—1/8" welsh	C-320	Gear—bevel—power shaft—short
C-1141	Gasket—fuel bowl cover	C-535	Hexagon nut—power shaft—bevel gear—1" S. A. E.
C-1142	Gasket—fuel control bottom	C-598	Gasket—power shaft housing to case
C-1143	Gasket—fuel control top	C-691	Lock washer—power shaft quill
C-1144	Washer—choker friction screw—large	C-1075	Cover—front—power shaft packing
C-1145	Screw—choker lever friction	C-1076	Cover—rear—power shaft packing
C-1146	Washer—choker friction screw—small	C-1083	Ring—packing—power shaft—front and rear
C-1148	Spacer—choker friction screw	C-1092	Gasket—bearing retainer—front—thick
C-1149	Spring—choker lever friction	C-1094	Gasket—bearing retainer—rear—thick
C-1150	Throttle shaft with lever	C-1096	Cap screw—power shaft housing to case, 1/2"x 1-1/4" drilled head
C-1151	Air choker lever and shaft	C-1159	Gasket—power shaft housing cover
C-1152	Float valve	C-1160	Cover—power shaft housing
C-1153	Screw—load adjusting	C-1205	Gasket—bearing retainer—front—thin
C-1154	Screw—idle adjusting	C-1206	Gasket—bearing retainer—rear—thin
C-1155	Body casting	D-136	Washer—spur gear nut
S-1121	Cock—drain	E-97-R	Plug—oil filler
<b>Air Cleaner</b>		JD-7209	Cone—includes rollers—power shaft front bearing—Timken No. 15118
AC-172	Air cleaner—complete	JD-7213	Cone—includes rollers—power shaft rear bearing—Timken No. 2558
AD-115	Filter collar	JD-7223	Cone—includes rollers—power shaft—long bevel gear—Timken No. 350
C-265-R	Intake pipe—carburetor to air cleaner	JD-7259	Cup—power shaft front bearing—Timken No. 15250
C-910	Brace—air cleaner	JD-7263	Cup—power shaft rear bearing—Timken No. 2523
C-1033	Gasket—intake pipe to air cleaner	JD-7309	Bearing—complete—power shaft—front end
C-1116	Cap—auxiliary drain on air cleaner	JD-7313	Bearing—complete—power shaft—rear end
D-1034	Gasket—intake pipe to carburetor	<b>Power Lift Parts</b>	
<b>Tool Box and Tools</b>		AC-260	Clutch foot trip—power lift
AC-228	Tool box—complete	AC-265	Housing with bushings—power lift shaft
D-742	Socket wrench for 3/4" hexagon nuts	AC-266	Clutch plate—complete—power lift
D-1083	Socket wrench for connecting rod nuts	AC-267	Shaft—power lift with bushing
E-2125	Funnel	C-281-R	Worm wheel—power lift
JD-7752	Grease gun—Bassick No. Z-6-BI	C-282-R	Pawl—clutch
<b>Extra Equipment—Wheels</b>		C-284-R	Yoke—clutch foot trip rod
C-722	Extension rim—front wheel—5" wide	C-619	Welsh plug—power lift shaft hole
C-1027	Extension rim—rear wheel—6-1/2" wide	C-1061	Stud—power lift shaft
C-1030	Extension rim clip—rear wheel	C-1062	Arm—clutch pawl
C-1040	Guide band—2" high—front wheel (2 used per wheel)	C-1063	Pin—clutch dog link
D-233	Spade lug—4" high	C-1064	Pin—clutch dog pivot
D-411	Bolt—spade lug	C-1065	Roller—clutch
D-583	Rim clamp—front wheel extension rim	C-1066	Pin—clutch roller
D-584-R	Washer—rim clamp—front wheel extension rim	C-1067	Pin—clutch foot trip rod yoke
D-938	Washer—used on spade lug bolt	C-1069	Rod—clutch foot trip
D-1078	Spade lug—5" high	C-1073	Strap—clutch dog
<b>Extra Equipment—Wheel Scrapers</b>		C-1074	Bearing—clutch foot trip
C-264-R	Blade holder—rear wheel scraper	C-1077	Cover—packing ring—power lift shaft
C-753	Scraper—front wheel	C-1078	Retainer—packing ring—clutch pawl arm
C-1055	Scraper blade—rear wheel scraper	C-1079	Bushing—center—power lift shaft
C-1056	Brace—platform to rear wheel scraper	C-1082	Gasket—power lift housing
<b>Extra Equipment—Miscellaneous</b>		C-1085	Ring—packing—power lift shaft
AC-236	Radiator guard—complete	C-1086	Ring—packing—clutch pawl arm
C-1089	Curtain—cloth	C-1163	Spring—clutch pawl
C-1090	Roller—curtain—wood	C-1164	Spring—clutch dog
D-564	Bracket—R. H. radiator curtain	C-1168	Bushing—inside—power lift housing
D-572	Bracket—L. H. radiator curtain	C-1170	Bushing—outside—power lift housing
		C-1178	Dog—clutch
		C-1179	Link—clutch dog
		C-1216	Spacer—clutch foot trip bearing
		D-469	Plug—clutch pawl arm hole
		E-2065	Screw—in packing ring cover and retainer
		K-2471	Plug—oil drain



## THE MANUFACTURER'S INTEREST IN YOUR TRACTOR

The value of your tractor investment depends upon, first, the amount of continuous service it gives you; second, the cost of operation and upkeep. The best-built tractor may prove to be a poor investment if proper care and precautions are not used in operating it. In the John Deere, we use the best quality of materials made up in accordance with the best-known engineering design. We employ highly-skilled mechanics, so that the finished tractor will be a machine capable of doing the hard, steady work for which it is built. We furnish carefully-written, detailed instructions on how to care for and operate the tractor, and then must depend upon its owner to follow them carefully if he is to get the full value from his investment.

### IMPORTANCE OF KNOWING YOUR TRACTOR

Study the manual of instructions sent with your tractor—this is vitally important. Go over your tractor as you read your instruction book—become familiar with every part, its operation, care and adjustment. A little attention daily in keeping the working parts in good condition will prevent small troubles from becoming serious and costly.

Do not hesitate to employ the same type of skilled help for tractor repair

work that you would employ for your automobile. Proper care will pay big dividends in better and longer service and low repair bills.

### IMPORTANCE OF GOOD LUBRICATION

There are many oil manufacturers in the country who make hundreds of brands of oil. No one brand is always obtainable by all tractor owners. It is, therefore, impractical to recommend brands of oil for each locality. The selection of oil must be left largely to the judgment of the owner. A number of oil companies employ experienced lubricating engineers, who determine, by actual test, the most effective oil to use in every make of tractor. Recommendations made from the results of these tests are widely advertised. Reliable companies making such recommendations assume responsibility for the performance of their oil in your tractor. There are some irresponsible concerns who make a practice of meeting responsible competition with "just as good" an oil at a much lower price. The use of such oils is hazardous and may result in serious damage to the tractor before the quality can be determined. Oils should be bought on a basis of quality and on the reputation of the manufacturer.

**Good High-Grade Oil Doubles the Life of Your Tractor**