Reconditioning Flooded Farm Implements

Farm machinery covered by floodwater may be permanently damaged if it isn't reconditioned right away. Here are some general suggestions for reconditioning flooded farm machinery:

- Before putting the machine in service, thoroughly clean the exterior. Mud and silt can be removed by pressurized water. Brushing with fuel oil or kerosene may clean some silt deposits.
- Carefully assess how much of the implement was submerged.
- Overlubricate plain bearings and antifriction bearings equipped with grease fittings to flush out dirt and water with fresh lubricant. Either take a chance that sealed bearings are still sealed, or replace them. Remove, clean, lubricate and replace all wheel bearings.
- Turn the machine by hand to make sure all moving parts are free before applying power. Be sure they are completely dry before painting.
- Thoroughly clean and dry all belts before replacing.
- Prevent rust on brightly polished working parts by cleaning and applying a rust preventive coating.
- Don't tow a vehicle very far if it has been submerged, and don't attempt to start the engine. The engine should be removed and completely disassembled for cleaning. Have this done by a competent mechanic in a well-equipped shop. For a tractor that was not submerged deeper than the bottom of the chassis and has no water in the engine, you will need to service only wheel bearings and other submerged parts.

Relatively new equipment or that under warranty should be serviced by a competent technician. Here are additional tips for older but still serviceable equipment:

- Take diesel engines to your local dealer for inspection of fuel injection systems. Some small, older gasoline engines may be able to be serviced. Start with a thorough cleaning and servicing of the engine before attempting to start it.
- Drain crankcase oil, and remove the oil pan. Clean inside the engine with flushing oil or kerosene. Replace the oil pan, and fill the crankcase with a new lubricant. Install a new filter element.

- Remove cylinder head from any engine if floodwater has been near the level of the combustion chamber. Clean thoroughly, dry and replace. Then lubricate rings by putting oil on cylinder walls.
- Remove the carburetor, intake and exhaust manifolds; dry and clean if water has entered them.
- Have an authorized mechanic clean, dry and service all distributors, generators and starters that have been under floodwater.
- Remove a flooded fuel tank and flush clean.
- Drain the cooling system and flush with clean water. Clean mud from radiator fans with pressurized water.
- If brakes and clutches were under water, disassemble, clean and adjust.
- Drain the transmission, differential and steering gear housings. Flush with fuel oil and refill with a new lubricant.
- Clean, dry and repack all wheel bearings.
- Start tractor or engine. If it heats up, stop, and recheck your work.

For renovating combines:

- Clean up the auxiliary engine as previously explained.
- Thoroughly clean and dry V-belts and chains. Dip clean chains in oil, and drain before they are installed. Clean all pulleys and sprockets before chains or belts are replaced.
- On old equipment, if wooden straw walkers, shaker arms, rollers or other parts are badly warped, replace them.
- Thoroughly clean and dry inside of machine and bearings. Turn by hand to be sure all moving parts are free. Operate slowly after overgreasing to flush dirt from bearings. Sealed bearings may need to be replaced.

The following points will help repair seeders and planters:

- Clean and dry seed, fertilizer and pesticide boxes. Be sure seed tubes are open and loose in the boot at the disk.

- Remove all caked material from the fertilizer box or feed mechanism with a screw driver or scraper. Use fuel oil or penetrating oil to loosen stuck parts.
- Clean, dry and lubricate all transport and packer wheel bearings.
- Thoroughly clean and dry calibration mechanisms.
- Disassemble and inspect seed-drop mechanisms. Dry and remove all dirt. Be sure mechanisms operate freely.
- Clean and apply rust preventive to brightly polished working parts

Source: *Iowa State University - http://www.extension.iastate.edu/disasterrecovery/info/farmimplements.htm*