Fifth Wheel Lubrication Plates

Did you know that fifth wheel lubrication plates should be specified and installed as part of the original manufacturing process?

The reason for this is relatively simple. The fifth wheel and kingpin work together based on specific SAE (Society of Automotive Engineers) standards. These standards control the proper engagement of the fifth wheel lock jaws around the kingpin neck. A lubrication plate may act as a shim and create a situation where the fifth wheel lock jaws are no longer in proper engagement around the kingpin neck.

If you want to run your new Cottrell trailer with a lubrication plate, it must be specified as part of the original manufacturing build. When a lubrication plate is specified, Cottrell incorporates a longer kingpin so that proper engagement of the fifth wheel lock jaws is maintained.

If your Cottrell trailer, old or new, was originally manufactured and delivered without a lubrication plate and you wish to install a lubrication plate, the original kingpin must be cut out and replaced with a longer kingpin. This is required in order to maintain the proper relationship between the kingpin jaws and the kingpin neck.

Cottrell warns against the installation of these “Add-On” lubrication plates in the Cottrell Operator’s Manual. In addition, Cottrell ships every unit with a warranty packet which includes Fontaine literature also warning against these aftermarket lubrication plates. The warnings are included in this posting for easy reference.

Please contact Cottrell if you have any questions.

From the Cottrell Operator’s Manual, p 17:

**Use of Fifth Wheel Add-On Lube Plates (Teflon disks)**

An add-on aftermarket lube plate is a lubricated, impregnated plastic disk which is placed between the fifth wheel top plate and the trailer bolster plate to eliminate the need to lubricate the top plate with grease.

If an add-on lube plate is to be installed, the kingpin must meet the SAE J700 kingpin dimension standards AFTER installation of the lube plate. If the kingpin does not meet SAE dimensions standards (see Holland Fifth Wheels Service Bulletin contained in the Appendix), a new kingpin must be installed to accommodate the lube plate thickness.

**WARNING**

Failure to comply with SAE kingpin dimensions after the installation of an add-on lube plate to the trailer bolster plate could result in coupling difficulties, premature fifth wheel lock and kingpin wear, and the potential for tractor/trailer separation that, if not avoided, could result in death or serious injury.
See Holland Fifth Wheels Service Bulletin contained in the Appendix.

From the Cottrell Operator’s Manual, Appendix A-3:

3. NEVER install an add-on aftermarket lube plate directly to a Holland fifth wheel top plate.

NOTE: The use of add-on aftermarket lube plates on a Holland fifth wheel top plate will void the warranty coverage.

IMPORTANT: An aftermarket add-on lube plate used on a Holland fifth wheel that is not designed for a lube plate changes the kingpin interface dimension of the fifth wheel locks (Figure 3).

WARNING: DO NOT install add-on lube plates directly to Holland fifth wheel top plates. Failure to observe this instruction may result in coupling difficulties, premature fifth wheel or kingpin failure, and the potential of tractor-trailer separation which, if not avoided, may result in death or serious injury.
Pre-service procedures

2. Lubrication

1. Tilt the top plate forward (front of the fifth wheel down) and apply grease to each bearing area through the zerk fitting each side of the top plate just to the front of the bracket pins. Continue to apply grease until it is coming out of the back of the bearing. It may be necessary to raise the rear of the fifth wheel with a pry bar to open up the pocket and allow the grease to flow through. Periodically remove the fifth wheel to clean old grease from the bracket grease channels to help insure even distribution of fresh grease. A substantial amount of grease may be required initially to fill the reservoir. Tilt the wheel to the rear (rear of the wheel down) and repeat the procedure. Rock the top plate back and forth several times to spread the grease over the bearing surface.

Inspect the trailer kingpin plate and top surface of the fifth wheel to make sure each is properly greased. A liberal coating of grease should be applied to the complete surfaces of both the trailer kingpin plate and the top surface of the fifth wheel. A paddle or brush will make this job easier.

Do not use a lube plate (high density polyethylene) on top of the fifth wheel or on the kingpin in lieu of grease without prior approval by Fontaine Fifth Wheel. The additional thickness of this material can prevent the proper operation of the fifth wheel and can cause a dangerous condition.

2. Lubricate the fifth wheel prior to opening and closing. Referring to figures 3 & 4 on next page, grease the jaw and wedge on top and bottom. Separate the jaw and wedge with a large screwdriver and distribute the grease along the full length of the jaw and wedge mating surfaces. Open and close the fifth wheel several times to further distribute the grease.

Lightly oil other moving parts in the fifth wheel.