Electric Power Steering (optional)

- 13mm, 15mm, ⅜" sockets, 6mm, ⅛" hex key, ½", ⅜", 17mm wrenches, marker, grinder, hack saw
- Electric steering components, Hot Rod steering shaft components.

The power steering unit may need to be rotated in order to clear the engine or oil pan that is being used. The bearing mount has holes to fit the 4.6L and 302 Ford engines with a stock style double sump pan. If a different pan or engine is used, it is better to install the engine without the power steering unit installed or only installed with one bolt and the motor pointed down to make sure there is no interference. Below is a hole template for the motor. It can be used on the backside of the bearing mount bracket. The holes with the cross hairs are the electric steering mount holes.
If your motor has an aluminum piece with a bearing mounted on the rear triangular mounted bolts, like the one above, remove it from the motor.

Attach a joint to the front of the electric steering unit.
Insert the small ¾” DD shaft into the joint on the front of the electric steering unit.

Insert the ¾” DD shaft into the steering rack joint.
Attach the rack joint onto the steering rack so the screw is on the flat side.

Mount the electric steer unit on the frame mount below the engine mount. It is mounted on the front face of this bracket with the hardware provided with the unit.
If necessary for frame clearance, remove the cover on the top of the unit.
Tighten the locking screws and nuts for the front shaft.

Remove the locking bolt from the remaining splined joint with a 6mm hex key and insert the 15\(\frac{1}{16}\)” middle steering shaft into the joint.
Make the end of the shaft flush with the inside face of the joint and use a marker in the bolt hole to mark the position of the needed relief.

Grind a relief in the steering shaft for the bolt that is used in the steering joints.
Insert and attach the steering shaft into the splined joint and loosely insert the locking bolt.

Attach the splined u-joint to the back of the electric steering unit loosely with the locking bolt.
Hold the middle shaft up to the joint that is mounted on the firewall and mark where the shaft needs to be cut so that the end is flush with the inside of the joint.

Remove the shaft and cut the end of the shaft with a hack saw or similar and grind the end of the shaft so that it will slide into the joint a little easier.
Insert the shaft into the joint on the firewall.

Remove the splined joint from the electric steering unit and push it onto the shaft.
Push the splined joint onto the electric steering unit.

Tighten all of the set screws, jam nuts and flange bearing fasteners. Don’t forget to locktite the small set screw on the firewall joint.
Wiring

Insert the harness plugs into the control module.

Mount the control module either in the engine bay where the wires will reach or behind the dash (if you extend the wires) so that the module does not get excessive water contact. These pictures show a fabricated bracket mounted to the 1.50” square tube in front of the driver footbox.
Use the diagram above for hole drilling.
Run the power wires from the control module up into the pedalbox area where the brake lines come out.
Run the wires up the side of the 1.50” square tube.

Wire the large red wire to constant +12 volts.