

DEFENDER TURN SIGNAL SYSTEM

Thank you for purchasing XTC Power Products Turn Signal System. Our new Easy Install Turn System is unique from the other kits on the market. This kit is completely plug and play, no wires to cut, no crimping with only power, ground and plug it into the OEM harness. Like many cars on the road today, our kit uses the factory brake lights as turn indicators.

For more details on installation go to www.xtcinstall.com

Please read the instructions fully and familiarize yourself with the components before starting the install. These instructions are a guideline, the system can be installed in many locations depending on other installed options.

1. **Remove** the passenger side floor and center kick panel.





2. **Mount Control Unit** - Mount the control box under the glove box, there are two posts that are 4.75" apart, using the silver #8 x ½" screws and a P2 Philips screwdriver mount the unit on two of these posts. If you want the turn switch mounted on the drivers left side of the steering wheel or if unable because of factory installed options, choose another suitable place to mount the control box under the dash using the optional screws provided. If installing the ATS it would mount in the same place as the TSS.





3. Run the Rear Extension Harness – Under the dump bed on the passenger side there is a thin wire coming from the rear of the dump bed up to a 3-pin connector, unplug the harness and plug our long Extension Harness with the 3-pin connector into the car side of the connector (Note: If 2020 Model there is a included adapter that will be used). Making sure to keep the harness away from any HOT or moving parts, run the other side with the 4-pin connector down through

the opening that leads into the center tunnel, unlatch the cars cable harness's and insert our harness up to the control box. Secure using the supplied cable ties at each end.



4. Install Rear Light Harness – Remove both rear taillights by removing two bolts from the side of each one using a #10 Socket. Starting at the new harness installed in the previous step plug the 4-pin connector into the new rear harness. Run the rear harness along the OEM harness, slide the heat tubing to the same spots as the factory reflective heat shield and cable tie in place. Continue attaching to the OEM cable, the green wire goes to the right-side light and the yellow wire goes to the left-side, cable tie at the same points as the OEM harness, plug each light in and reinstall taillights.



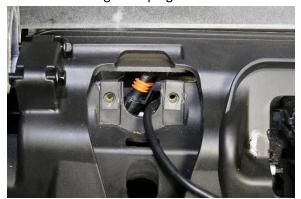
WARNING! Verify that there is clearance before drilling holes for the LED's or switches.

5. **Install Front LED Turn Lights** - Mark and drill 5/8" holes or if using the rubber grommet ¾" holes in the front corners of the fenders, remove the rubber grommet from the LED and insert into hole with the Top marking up. If using the grommet push the grommet into the ¾" hole and then insert the LED through grommet with the word TOP at the top.





6. Install Front Harness – There is a rubber seal that runs across the frame sealing the cab. Remove the winch control outlet to gain access, run the front harness up behind the plastic mount, lift the rubber seal and push the four-pin connector through and plug into the control box.





- 7. Attach Front Harness to lights The Green and white wire go to the right/passenger side LED, attach the Green to the Black and the White to the White, the Yellow and white wire go to the Left/Driver side LED, attach the yellow to the Black and the white to the White. NOTE: Black wire is positive and go to the Green and Yellow wire, they will not work if reversed. White is ground. Pull any excess wire back under the dash and secure the Harness using the provided cable ties.
- 8. Install the Turn and Horn/Hazard Switch's Using a new sharp razor, cut two of the rectangle openings in the dash to install the turn switch and the Horn/Hazard Switch. Run our switch connector's through the opening's and attach to our turn switch and Horn Switch (see below about grease) and insert the switch into the opening





Note: Dielectric Grease- Just like the OEM uses on their switches, we recommend using Dielectric Grease on all switch terminals, this keeps the water out, thereby reducing corrosion and helps increase reliability! Open the grease and put on the switch terminals and the connector terminals on both the Turn and Horn switches, the more the better.

9. **Install Horn** - Install the horn bracket onto the horn with the provided hardware. Mount the horn on the A-Arm top cross bar in front of the radiator in the existing holes using the ¼" x ¾" screw and Lock Nut. Attach Violet and Black wire from front harness to horn terminal.





- **10. Run power wire** The power wire needs to be run in the dash over to the factory Busbar in the center dash pocket. Using a #10 deep socket remove the nut at the far end. The Red wire goes to the post with the red wire with black stripe on the rear Busbar Post. Re-install nut. Remove the front Busbar nut and install the ground wire.
- 11. Verify operation of all lights. Cable tie any extra harness under dash. Reinstall center tunnel.



Model Year 2020 Adapter Included.

XTC Power Products

A Division of XTC Motorsports LLC 380 E Comstock Dr. Chandler AZ 85225 480-558-8588

www.xtcpowerproducts.com

*Disclaimer: This kit is intended for off road use only and XTC Motorsports claims no responsibility for it use. It is up to the purchaser to make sure it complies with all Federal, State and Local laws. R4.1

Copyright © 2021 XTC MOTORSPORTS LLC, all rights reserved.