

## **Power Window Relay Kit Instructions**



## **Notes:**

1. Note: please read through all instructions prior to removing or installing any part. If you do not feel comfortable with the instructions or in your ability to install or modify your vehicle, please take to a reputable mechanic to have them perform the installation. BJ's Off-Road can not and will not determine your ability to install this kit, and the extent of our warranty and liability only cover the components of this kit, and do not cover improper installation, abuse, neglect, labor rates, etc. Contact us with any questions prior to installation.



It is best to unplug your battery cables before beginning this procedure to reduce the chance of getting shocked or short anything out. This is also a good opportunity to inspect the condition of all of your wires in your doors, where they go through your door to inside the cab and clean any switches or wire terminals. You may also want to inspect any other components in your door while you have the panel off to see if they need to be cleaned and re-greased. Or if you have anything starting to rust, right now would be a good time to take care of that if you have the abilities to do so. It is also a good time to check the condition of your inner and outer window wipes, glass slide channel for all doors, your front and rear vent window division bars with seals and replace as needed. This is recommended, because if these are bad, they can also impede your power window function. Do not do anything stated above that you do not feel comfortable doing

- 1. Unplug the 2-pin Weather-Pack connector that connects the window switch to the power window motor if your model has this type. There is only one way to hook these up, because one side has a female connector and the other is a male. They started putting Weather-Pack connectors on them in 1987. If you have an earlier model that does not have the Weather-Pack connectors or if for some reason your 1987-later does not have them, then you will use the provided pigtails and heat shrink butt splices provided. You will cut the connector end off as close to the connector as possible. You will follow the pinout diagram on where these wires go. Some years are yellow and brown, and some are yellow and orange. The yellow will always go to the yellow and the brown will go to the brown or the orange
- 2. For the power wire you will use the T-tap that is crimped and heat shrunk at the end of the red wire. The yellow piece will pull off to make it easier if you need to. Just make sure to plug it back in after you take it off and while doing so, make sure the spade goes into the socket end. For the rear doors, there will be a 3-pin flat molded connector. You will tap into the wire that is coming from the cab. For the front doors there should be a 4-wire square molded plug, you will tap into wire coming from the cab identified in the power wire color diagram. This wire should be a switched 12 volt wire, not a constant 12 volt wire.
- 3. We recommend you check for continuity to a known good ground area inside the cab, to verify where you are hooking your ground wire to, is a good ground. Use what you feel is appropriate and clean the area before installing the ground wire if necessary. There is a ¼" ring terminal installed for the door ground wires, so you could use an existing bolt and not have to drill any holes if that is what you choose to do. Mount your relay holder in a spot of your choosing. Make sure the relay holder and all wiring is secured and away from any moving parts. Secure your battery cables back to your battery and verify everything is working properly.



## **Pinout Diagram**

Door Power Windows									
1	2	3	4	5	6				
30	Plug	86	30	Plug	86				
Yellow to	N/A	Yellow to	Brown to	N/A	Brown to				
Window Motor	IN/A	Window Switch	Window Motor	IN/A	Window Switch				
7	8	9	10	11	12				
85	87A	87	85	87A	87				
Black to	Black to	Red to Switched	Black to	Black to	Red to Switched				
Ground	Ground	Power	Ground	Ground	Power				

**Example of 3 Pin Flat Molded Connector that goes to Cab Side** 



**Example of 4 Pin Square Molded Connector** 





## Example of a T-tap and a Heat Shrink Butt Splice



Year	Tailgate	Front Driver Win.	Front Passenger Win.	Rear Driver Win.	Rear Passenger Win.	Door Lock
	(Constant Power)	(Switched Power)	(Switched Power)	(Switched Power)	(Switched Power)	(Constant Power)
1991	Red w/Tr	Red	Violet	Red	Violet	Red w/Tr
1990	Red w/Tr	Red	Violet	Red	Violet	Red w/Tr
1989	Red w/Tr	Red	Violet	Red	Violet	Red w/Tr
1988	Violet w/Tr	Violet	Violet	Red	Red	Red w/Tr
1987	Orange	Violet	Violet	Red	Red	Red w/Tr
1986	Orange	Violet	Violet	Red	Red	Red w/Tr
1985	Orange	Red	Red	Red	Red	Red w/Tr
1984	Orange	Red	Red	Red	Red	Red w/Tr
1983	Orange	Red	Red	Red	Red	Red w/Tr
1982	Orange	Red	Red	Red	Red	Red w/Tr
1981	Orange	Red	Red	Red	Red	Red w/Tr
1980	Orange	Red	Red	Red	Red	Red w/Tr
1979	Red w/Tr					
1978	Red					
1977	Red					
1976	Red					
1975	Red or Red w Tr					
1974	Red w/Tr					
1973	Red w/Tr					