

Daniel Stern Lighting

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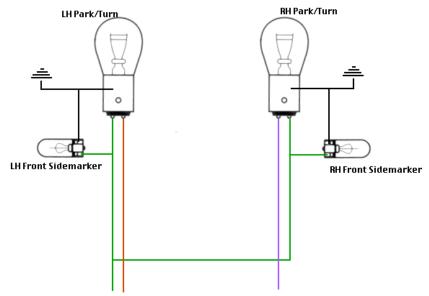
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Flashing Sidemarker Lamps

Many cars have amber front sidemarker lamps that DON'T flash with the turn signals. This is permitted by our (outmoded, inadequate) lighting and signalling specifications in North America, but these lamps are also permitted to flash. Having them flash is an advantage, because that way your turn indicators are more visible to drivers who are flanking your car, and cannot see your front or rear indicators.

Here's how the front parking, turn signal and sidemarker lights are wired so that the sidemarkers DO NOT flash:



- PARKING LAMP FEED (+12V when parking lamps on)
- GROUND (body, chassis, battery negative -)
- LEFT TURN SIGNAL FEED (pulsed + 12V when LH turn signalled)
- RIGHT TURN SIGNAL FEED (pulsed + 12V when RH turn signalled)

This diagram shows the common "park/turn" bulbs, with a bright turn signal filament and a dim parking lamp filament in the one bulb. Each filament has its own feed terminal on the bulb base. The wiring is essentially the same in systems that have separate bulbs for the parking lamp and turn signal.

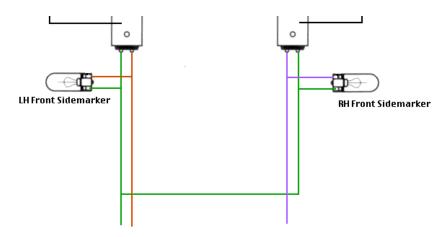
With this hookup, the sidemarker lamps are wired exactly like the parking lamps. They are always grounded, and they receive $\pm 12V$ whenever the parking lamps are on. Therefore, they illuminate steadily whenever the parking lamps are on, and never flash.

Here's how the system is wired to make the front sidemarkers do double duty as side turn signal flashers:









- PARKING LAMP FEED (+12V when parking lamps on)
- GROUND (body, chassis, battery negative -)
- LEFT TURN SIGNAL FEED (pulsed + 12V when LH turn signalled)
- RIGHT TURN SIGNAL FEED (pulsed + 12V when RH turn signalled)

There's only one difference between this setup and the non-flashing one: Instead of the sidemarkers being wired across parking lamp feed and ground, they're wired across parking lamp feed and *turn signal feed*.

The side marker bulb socket is isolated from ground, and one bulb lead goes to the running lamp positive circuit. The other lead is tied into the turn signal positive lead.

When the parking lights are on and the turn signal off, it grounds throught the turn signal filament and illuminates the marker lamp. When the turn signal flashes, it interrupts the ground and the marker will flash. When the running lights are off, the process is reversed, with the ground being through the filaments of the running light circuit, and the marker will flash in sync with the turn signal instead of alternately.

It's usually very easy to make this change, since it only requires rerouting one wire on each side of the car.

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