

Brake Bleeding on 2004 Toyota Prius with Toyota Techstream software...

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One has to hook up a computer, with specialized software and cable, to talk to the antilock brake system computer in order to bleed the brake system. One has 3 different choices:

- Usual air bleeding
- Actuator has been removed (ABS Pump)
- Master Cylinder or Stroke Simulator has been removed

So, for “Usual Air Bleed”, one can do all 4 lines, or select specific lines. I start by trying to bleed just the specific line (right rear) that was opened up and lost fluid. Very little, but some flow, when opened. It is not like the brake pedal goes down. Close it up and there is absolutely no braking action at that wheel when the pedal is pushed.

Try some more... Tell the computer to do all the lines. All 3 other lines bleed well. They often flow enough that they sound like a faucet running, because there is a pressurized bladder in the ABS pump supplying the flow... you don't have to depress the pedal one stroke at a time. Right rear is still barely flowing.

Try this a couple of more times. Same result.

Tried running the full “Actuator (ABS Pump) removed” protocol which does all four corners plus a bit more (plugging and unplugging the ABS pump motor relays, etc.). Same result.

Start questioning things... “Do I have a collapsed brake hose going to the right rear? Is that why that wheel was locking up before starting the repair?” After WD40 and vice grips, get the brake hose broken free from the brake line, upstream of the hose. Fluid dripping out. Try to bleed again with the line “well cracked open”. Still little flow... just a modest dripping.

In the end, I went through the Techstream software, cleared the trouble codes (DTCs), which include brake system codes. Try bleeding again. Right rear now flows tons, like a faucet.

So, in my mind, I look at it this way: this super smart Toyota Techstream computer system knows that you are trying to bleed the right rear brake system, it knows that you have a computer connected and are obviously repairing the brakes, and yet it is not smart enough to open whatever port in the ABS system feeds the right rear brake? What is the point of telling the computer that you are bleeding the right rear brake system if it is not going to open the port for you? It does it for all the other lines. Why would I have to know to clear all the codes before even starting to bleed the system?

My only possible explanation for this is that it might be thought of as some sort of safety feature? If you are driving down the road, a rock or debris punctures a brake line or brake hose, the system senses the loss of pressure. It turns off the port to that wheel in order to prevent fluid loss and maintain braking power to the other 3 corners. Maybe? But even if this were the case, then why was there still a modest flow of fluid to right rear when initially bleeding it, and more importantly, again, why did it not turn on full flow when it knew I was repairing / bleeding the brakes?