

Jake K. Project – Detailed view (v1)

By Bill Weis

Requirements:

1. Be able to voice control his Leggett and Platt Prodigy 2.0 bed

Solution – High Level:

1. Designed a voice activated bed controller which will give Jake voice control over four functions that are important to him. (Head up/down and Feet up/down)

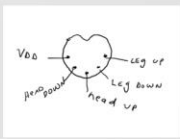
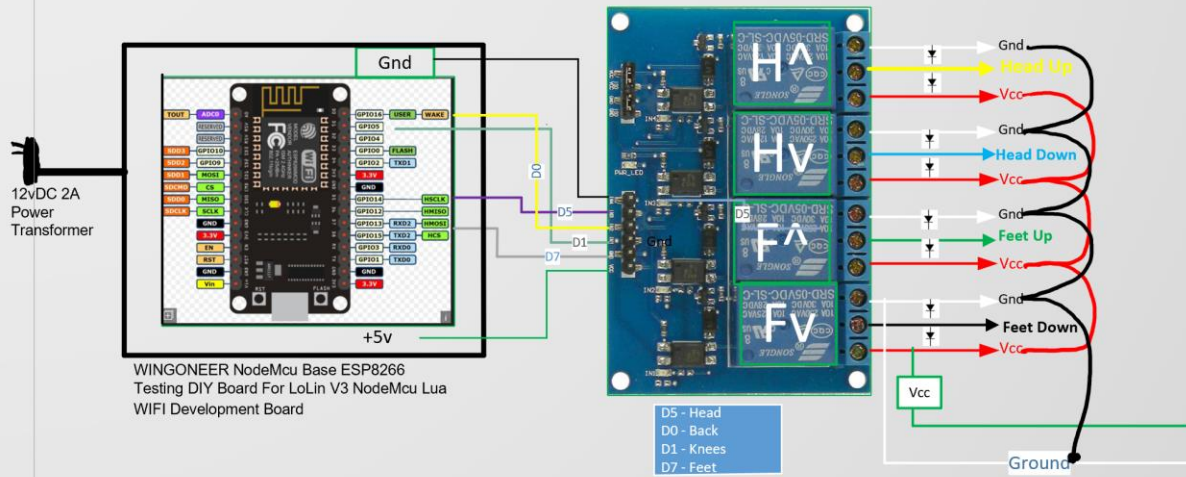
Details of the Solution

1 – Voice Control his bed – Jake has a Leggett and Platt Prodigy 2.0 bed that is controlled by an OKIN RF Touch wireless remote that operates at 2.4ghz. We started out by sending Jake a Google Pixel 3 phone which enabled him to connect to the bed using Bluetooth. OKIN has an app that runs on a phone which provides a virtual remote. Since Jake uses a Tobii device as a communicator, he was able to configure scrcpy in a way that he can use eye movement on the Tobii to control the OKIN remote.

Jake wanted to have a backup to the Bluetooth solution. We were able to easily tap into the existing actuator harness with a switchbox (which is plugged into an Amazon Smart Switch) that allows Jake to control the bed using either the Bluetooth/Virtual Remote feature or our voice activated bed controller.

The drawing for the voice solution is on the next page.

Voice Controlled Bed Controller for Leggett and Platt Prodigy 2 bed
 (Jake K)
 Bill Weis 12-14-21
 S/N 21098.06



Wires From Relays to 5 Pin DIN

On Leggett and Platt Prodigy 2 beds, the head actuator has a cable with a three way splitter. One leg of that splitter is the 29v power connection, the second leg of that splitter is a 2 pin control connection to the foot actuator, and the third leg goes to a 5 pin DIN which then connects to the OKIN controller box. Our solution replaces the OKIN controller box, but only for head up/down and foot up/down. You lose head tilt and massage if that exists. We then provide a switch box that is powered by a smart switch, so using voice commands you can switch between our controller and the OKIN controller.

Resources

- [Amazon Echo](#)
- [Alexa Support](#) (Contact Support via the Amazon Alexa app - can have them call your number)
- [Google Home getting started](#)
- [Google Home Help Forum](#)
- [Google Home Support](#) Phone number for Google Home hardware support = 855-971-9121 (24/7 days a week)
- [Logitech Harmony Knowledge Base](#)
- [Logitech Harmony Support](#) Phone # for Support = 866-601-5644 (M-F 8am to 6pm PST)
- [Lifx](#)
- [Wemo Support](#) Phone number for Support = 1-844-745-wemo (9366)