These experiments are built into the Blynk Board's core firmware, and documented in a tutorial.

The tutorial follows a "Connecting your Blynk Board" guide, which demonstrates the commissioning process, and leaves the user with a connected Blynk Board and a new Blynk Project, which has the zeRGBa to control the WS2812 RGB LED.

Experiment #	Experiment Name	Physical Pin(s)	Virtual Pin(s)	Virtual In (to app) or Out (to board)?	Suggested (Extra) Hardware	Backup If No External Hardware	Description	Notes
1	App Button to Physical LED	D5 ~ LED					Use a button in the Blynk app to turn a phyiscal LED on or off.	
2	Physical Button to App LED	D0 ~ Button	1 ~ Button 0 Status	In			Use a button on the Blynk board to turn a Blynk app LED on or off.	
3	Slider LED Control	D5 ~ LED	2 ~ Red 3 ~ Green 4 ~ Blue	Out			Use the large slider to control the brightness of the D5 LED. Use the small sliders to set the color of the RGB LED	
4	Humidity/Temp to Values		5 ~ Temperature (F) 6 ~ Humidity 7 ~ Temperature (C) 28 ~ Temp Offset	In			Use the value widget to monitor temperature and humidity on-board.	
5	Gauging the ADC	A0 ~ ADC	8 ~ Voltage	In	3x Alligator clips Large Slide potentiometer	Measure your body resistance - place one finger on ADC, other on GND	Use the gauge widget to measure an ADC. Connect a slide pot to the ADC to manually move the widget.	Also consider a photocell, resistor voltage divider instead
6	Automating Your Outlet	D12 (Any available digital pin)			Power Switch Tail 2x Alligator clips 2x Jumper wires SparkFun Mini Screwdriver	Timer to start the RGB LED rainbow	Set a timer to turn a relay on and off at specific times of the day.	
7	Humidity/Temp to LCD		10 ~ LCD Widget 11 ~ Display TH 12 ~ Display inputs 13 ~ Display runtime	In			Temperature values are displayed in F and C above humidity. LCD allows us to display more information than value	This could be slotted for an alternative I2C device
8	Bot Beginnings	15	14 ~ Servo X/Y 16 ~ Servo Max 17 ~ Angle output	Out	Servo motor 3x Jumper Wire 3x Alligator Clips	Use a gauge on V14 to display the calculated angle	Use the Joystick to control the position of a servo motor. A slider is used to set the maximum angle of the servo. The angle is calculated by the Blynk Board, then output to a virtual pin	
9	Graphing Daylight	I2C (or A0)	18 ~ Lux Value 19 ~ Lux Update Rate	In	TSL2561 Luminosity Sensor -or- Resistor/photocell & 3x Alligator Clips	Graph temperature, humidity	Graph a light sensor, adjusting the graph rate with a slider.	
10	Plotting Out a Battery's History	A0	20 ~ Voltage	In	3x Alligator clips 2x 10k Resistors 1x 850mAh LiPo Battery	Graph temperature, humidity	Measure the battery voltage over time. Twist the two 10k resistors together to create a voltage divider. Plug alligator clips into GND, VIN, and ADC	
11	Serial Terminal Chat		21 ~ Serial	In/Out			Set up a chat terminal between your Blynk Board and the Blynk terminal.	Consider moving this higher
12	BotaniTweeting	A0	23 ~ Moisture Threshold 24 ~ Tweet Rate	In	Soil Moisture Sensor Breakout 3x Jumper Wires 3x Alligator Clips		Read the ADC - connected to a soil moisture sensor - every X minutes, and post to Twitter.	
13	Door Status Push Notifications	16	25 ~ Door state output	In	Door Switch 2x Alligator Clips		The Blynk Board sends a phone notification whenever a door switch opens or closes.	Pin 16 has pull-down resistor. Switch should connect to 3.3V and 16
14	Blynk Board Status Emails	D0, D16, A0	21 ~ Serial Terminal 27 ~ Send Email	In			The Blynk Board gathers data from all inputs, and sends them in the body of an email.	
0	Do the ZeRGBa	D4 ~ RGB	0 ~ RGB LED 9 ~ RGB Rainbow Mode 29 ~ RGB Strip Length	Out	1x WS2812 Strip 1x WS2812-to-JST Pigtail	Control the on-board RGB LED	Use the zeRGBa to control the color of an RGB LED strip	