

Chapter number	Software required (With version)	Hardware specifications	OS required
01	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November 2017, Kernel Version 4.9</li> <li>• Git core</li> <li>• WiringPi</li> <li>• Blynk libraries</li> <li>• nano</li> </ul>	<ul style="list-style-type: none"> <li>• Raspberry Pi 3 (Raspberry Pi 1 and 2 also works)</li> </ul>	
02	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November 2017, Kernel Version 4.9</li> <li>• nano</li> </ul>	<ul style="list-style-type: none"> <li>• Raspberry Pi 3 board</li> <li>• A Breadboard</li> <li>• An LED - Basic Red 5mm (<a href="https://www.sparkfun.com/products/9590">https://www.sparkfun.com/products/9590</a>)</li> <li>• A 330 Ohm 1/6 Watt PTH resistor (<a href="https://www.sparkfun.com/products/11507">https://www.sparkfun.com/products/11507</a>) Color Code Orange, Orange, Brown, Gold.</li> <li>• Two Male-Female jumper wires</li> </ul>	Raspbian Stretch LITE
03	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November 2017, Kernel Version 4.9</li> <li>• nano</li> </ul>	<ul style="list-style-type: none"> <li>• Raspberry Pi 3 board</li> <li>• 1 x RGB LED with common cathode (<a href="https://www.sparkfun.com/products/105">https://www.sparkfun.com/products/105</a>)</li> <li>• 3 x 220 Ohm resistors</li> <li>• Small breadboard</li> <li>• Few hookup wires</li> </ul>	Raspbian Stretch LITE
04	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November 2017, Kernel Version 4.9</li> <li>• nano</li> </ul>	<ul style="list-style-type: none"> <li>• A potentiometer</li> <li>• Breadboard</li> <li>• Few hookup wires</li> <li>• A momentary push button</li> </ul>	Raspbian Stretch LITE
05	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November</li> </ul>	<ul style="list-style-type: none"> <li>• Raspberry Pi</li> <li>• Momentary push button</li> <li>• Breadboard</li> </ul>	Raspbian Stretch LITE

	2017, Kernel Version 4.9 <ul style="list-style-type: none"> <li>• nano</li> </ul>	<ul style="list-style-type: none"> <li>• Hookup wires</li> </ul>	
06	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November 2017, Kernel Version 4.9</li> <li>• nano</li> </ul>	-	Raspbian Stretch LITE
07		<ul style="list-style-type: none"> <li>• Raspberry Pi 3 board</li> </ul>	Raspbian Stretch LITE
08	<ul style="list-style-type: none"> <li>• Raspbian Stretch LITE, November 2017, Kernel Version 4.9</li> <li>• nano</li> </ul>	<ul style="list-style-type: none"> <li>• Any 2-wheeled drive chassis kit with a caster ball/wheel</li> <li>• Raspberry Pi 3 board</li> <li>• TB6612FNG Dual Motor Driver Carrier (<a href="https://www.pololu.com/product/713">https://www.pololu.com/product/713</a>)</li> <li>• 2 x DC gear motors</li> <li>• 5V USB battery pack</li> <li>• 4 x Rechargeable NiMH AA Battery, 1.2 V, 2200 mAh (<a href="https://www.pololu.com/product/1003">https://www.pololu.com/product/1003</a>)</li> <li>• 4-AA Battery Holder (<a href="https://www.pololu.com/product/1153">https://www.pololu.com/product/1153</a>)</li> </ul>	Raspbian Stretch LITE