

# Bulock Home Technical Systems

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# Internet Service Provider

**Service Provider:** Wide Open West (WOW!)

**Contact:** 1-866-496-9669

**Account Number:** 14364727

**Service:** 110M down / 10M up

**Modem:** ARRIS SURFboard SB6183

**Modem HFC MAC:** 78:96:84:e8:28:ee

**Modem Web Interface:** <http://192.168.100.1>

## Network

**Router:** Ubiquiti EdgeRouter X SFP

**Router Web Interface:** <https://router/>

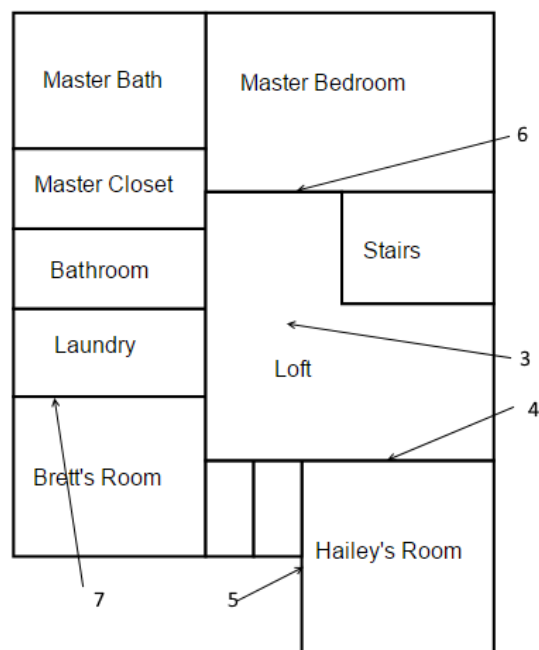
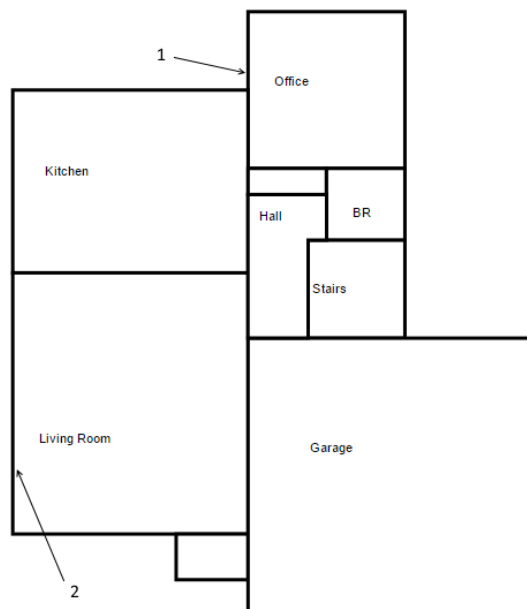
**Primary Switch:** UniFi Switch 24

**UniFi Cloud Controller:** <https://unifi:8443/>

# Ethernet Layout

## Patch Panel

1. Office
2. Living Room
3. Loft WAP
4. Loft
5. Hailey's Room
6. Master Bedroom
7. Brett's Room
8. Basement WAP
9. Living Room
10. Backyard WAP
11. Unused
12. Unused
13. Unused
14. Unused
15. Unused
16. Unused



# Wireless Network

**SSID:** BullockWireless

**Guest SSID:** BullockGuestServices

## Controller

**Hardware:** Ubiquiti UniFi Cloud Key

**Controller MAC:** f0:9f:c2:18:5d:e0

**Controller IP:** 10.0.0.3

**Controller Web Interface:** <https://unifi:8443>

**Controller Username:** admin

## Access Points

### Loft

**Hardware:** UniFi AP-AC-Lite

**AP MAC:** 44:d9:e7:f6:c8:34

**AP IP:** 10.0.10.2

### Basement

**Hardware:** UniFi AP-AC-Lite

**AP MAC:** 80:2a:a8:13:15:51

**AP IP:** 10.0.10.0

### Backyard

**Hardware:** UniFi AP-AC-Mesh

**AP MAC:** 78:8a:20:b3:74:1c

**AP IP:** 10.0.0.13

# Network Services

## DNS

### Primary

**Device:** HA Docker

**Container:** dnsmasq

**IP Address:** 10.10.10.10

**VLAN:** 53

### Secondary

**Device:** Basement Docker

**Container:** dnsmasq

**IP Address:** 10.10.10.11

**VLAN:** 53

## DHCP

**Device:** UniFi Security Gateway

**IP Address:** 10.0.0.1

## Reverse Proxy

**Device:** HA Docker

**Container:** proxy

**IP Address:** 10.0.0.50

**Platform:** Nginx

## Plex Media Server

**Device:** Basement Docker

**Container:** plex

**IP Address:** 10.0.0.51

# Databases / Data

## MariaDB

**Device:** QNAP TS-453A NAS

**IP Address:** 10.0.0.25

## InfluxDB

**Device:** HA Docker

**Container:** influxdb

**IP Address:** 10.0.0.50

## Grafana

**Device:** HA Docker

**Container:** grafana

**IP Address:** 10.0.0.50

**Web Interface:** <https://data.bulock.house>

## Backups

**Server:** nas.bulock

**IP Address:** 10.0.0.25

**File Path:** /share/ServerBackups/

## HA Docker

**Server:** ha.docker

**File Path on NAS:** /share/ServerBackups/nuc/opt

## Basement Docker

**Server:** basement.docker

**File Path on NAS:** /share/ServerBackups/basement.docker/opt

## Nagios

**Server:** nagios.bulock

**File Path on NAS:** /share/ServerBackups/nagios/

## Living Room Pi

**Server:** 10.0.0.93

**File Path on NAS:** /share/ServerBackups/plant/

# App Server

**Server:** app.bulock

**IP Address:** 10.0.0.20

This server is planning to be retired

## Running Applications

- mqtt-dasher (Amazon Dash buttons to MQTT)



# Network Devices

Device	Wireless MAC	Ethernet MAC	Hostname	IP Address
OnePlus 6T	64:a2:f9:bf:c9:7f		phone.cameron	10.0.1.10
Desktop		18:31:bf:4e:dd:af	desktop.cameron	10.0.1.11
Chromebook	D0:E7:82:BA:E4:89		chromebook.cameron	10.0.1.12
MacBook	a0:99:9b:13:28:0d		macbook.cameron	10.0.1.13
Watch	24:00:ba:af:0a:26		watch.cameron	10.0.1.14
Nintendo Switch	64:b5:c6:17:97:c3		nswitch.cameron	10.0.1.15
Phone (Note 8)	b8:d7:af:0e:b1:77		phone.rachael	10.0.1.20
Laptop	74:E5:0B:0A:91:DC		laptop.rachael	10.0.1.21
iPad	1C:AB:A7:91:53:20		ipad.rachael	10.0.1.22
iPod Touch	C0:63:94:9E:75:74		ipod.rachael	10.0.1.23
Kindle	f0:4f:7c:d3:c3:b6		kindle.rachael	10.0.1.24
Work Laptop	c4:d9:87:85:1c:40		work.rachael	10.0.1.25
iPhone	6c:e8:5c:70:75:c0		phone.hailey	10.0.1.30
Desktop	90:48:9A:AB:ED:AB		desktop.hailey	10.0.1.31
XBox			xbox.hailey	10.0.1.32
Kindle			kindle.hailey	10.0.1.33
OnePlus 6T	64:a2:f9:bf:cd:cc		phone.brett	10.0.1.40
Desktop		40:8d:5c:74:a0:f1	desktop.brett	10.40.0.2
XBox			xbox.brett	10.0.1.42
Raspberry Pi			pi.brett	10.0.1.43
Laptop	F4:B7:E2:8E:11:93	44:87:FC:40:A0:86	laptop.brett	10.0.1.44
PSVita			psvita.brett	10.0.1.45
Kindle			kindle.brett	10.0.1.46
Nintendo Switch	04:03:d6:79:f9:7d		nswitch.brett	10.0.1.47
3DS			3ds.brett	10.0.1.48
Living Room	a4:8d:3b:b3:a5:ef	c4:1c:ff:18:a2:13	living.chromecast	10.0.2.10
Master Bedroom	6C:AD:F8:35:EA:2B	00:e0:4c:36:b1:44	master.chromecast	10.0.2.11
Loft	A4:77:33:3B:49:1C	00:e0:4c:36:b1:39	loft.chromecast	10.0.2.12
Basement	6C:AD:F8:95:CF:34		basement.chromecast	10.0.2.13
Hailey's Room	f4:f5:d8:6a:35:e6		hailey.chromecast	10.0.2.14
Living Room	a4:8d:3b:bd:1c:c3	c4:1c:ff:00:c2:aa	living.audio.chromecast	10.0.2.20
Hot Tub	A4:77:33:F6:95:EC	00:e0:4c:36:a0:c1	hottub.audio.chromecast	10.0.2.21
Pergola		e8:c7:4f:05:22:f5	pergola.audio.chromecast	10.0.2.22
Wii U	40:F4:07:A7:40:D3		wiiu	10.0.2.50
Wii			wii	10.0.2.51
PS3			ps3	10.0.2.52
RetroPie		b8:27:eb:6b:15:2d	retropie	10.0.2.53
PS4	0C:FE:45:0F:0D:E4		ps4	10.0.2.54
RetroArch		4c:ed:fb:68:31:e6	retroarch	10.0.2.55
TV (Loft)	00:6B:9E:F6:56:5E	00:6B:9E:FA:49:3C	loft.tv	10.0.2.60
TV Remote (Living Room)	c4:1c:ff:03:45:57		remote.living.tv	10.0.2.61
Roku Ultra	c8:3a:6b:56:a0:03		roku	10.0.2.90
Osram Gateway	84:18:26:7d:72:f9		osram	10.50.0.12
Lutron Bridge	60:64:05:53:0d:d3		lutron	10.50.0.13
Xiaomi Gateway	78:11:dc:64:f5:87		xiaomi	10.50.0.14
ecobee Thermostat	18:B4:30:2B:1B:65		thermostat	10.0.3.10
Garage Door	5c:cf:7f:59:f2:0d		garagedoor	10.50.0.51
Doorbell	64:16:66:6d:ab:b3		doorbell	10.0.3.13
Master Bedroom Remote	34:ea:34:40:7b:39		master.remote	10.50.0.80
Brett's Bedroom Remote			brett.remote	10.50.0.81
Christmas Tree Light	ec:fa:bc:14:e9:8c		christmastree.light	10.50.1.40
Roomba	f0:03:8c:b6:0b:89		roomba	10.0.3.14
Hailey's Room Echo Dot	68:54:fd:75:f5:28		hailey.echo	10.0.3.32
Brett's Room Echo Dot	34:d2:70:e3:43:f5		brett.echo	10.0.3.33
Downstairs Google Home	d8:6c:63:47:95:62		downstairs.gh	10.0.3.40
Master Bedroom Google Home	20:df:b9:d4:de:f5		master.gh	10.0.3.41

Device	Wireless MAC	Ethernet MAC	Hostname	IP Address
Hailey's Room Google Home	20:df:b9:0a:25:c8		hailey.gh	10.0.3.42
Brett's Room Google Home	20:df:b9:77:7f:2f		brett.gh	10.0.3.43
Kid's Bathroom Google Home	20:df:b9:64:32:f6		kids.bathroom.gh	10.0.3.44
Master Bathroom Google Home	30:fd:38:a1:6c:f7		master.bathroom.gh	10.0.3.45
Kitchen Google Home Hub	d8:6c:63:47:95:62		kitchen.ghh	10.0.3.50
Router		44:D9:E7:07:A3:52	router	10.0.0.1
Cloud Key		f0:9f:c2:18:5d:e0	unifi	10.0.0.3
Basement WAP		80:2a:a8:13:15:51	basement.wap	10.0.0.10
Loft WAP		44:d9:e7:f6:c8:34	loft.wap	10.0.0.12
Backyard WAP		78:8a:20:b3:74:1c	backyard.wap	10.0.0.13
Modem		D4:04:CD:7E:9C:D6	modem	192.168.100.1
Primary Switch		f0:9f:c2:68:31:14	primary.switch	10.0.0.31
Media Cabinet Switch		f0:9f:c2:cf:03:a3	mc.switch	10.0.0.32
Basement PoE Switch		78:8a:20:46:9b:3f	poe.switch	10.0.0.33
Cameron Laundry	34:d2:70:2d:b2:d9			10.0.3.121
Rachael Laundry	fc:a6:67:7f:5d:5a			10.0.3.122
Hailey Laundry	fc:a6:67:f1:7a:cc			10.0.3.123
Brett Laundry	ac:63:be:b4:cd:be			10.0.3.124
Pasta Part Reminder	fc:a6:67:17:a5:92			10.0.3.125
NAS		24:5e:be:00:2a:82	nas	10.0.0.25
NAS2		24:5e:be:12:8b:35	nas2	10.0.0.26
Office Printer		64:eb:8c:84:63:04	printer	10.0.0.100
Select Mini 3D Printer		b8:27:eb:1d:9a:8c	select-mini.3dprinter	10.0.0.101
Mini Delta 3D Printer	b8:27:eb:d4:41:f1		mini-delta.3dprinter	10.0.0.102
Lenovo Laptop	7c:e9:d3:17:51:3b		laptop	10.0.0.92
Laundry Tablet	10:bf:48:ea:8d:95		laundry.tablet	10.0.0.91
HA Dev Server	40:a5:ef:0c:a1:25		hadev	10.0.0.90
HA Docker		94:c6:91:19:3e:09	ha.docker	10.0.0.50
Basement Docker (eth0)	68:94:23:5C:B1:EB	96:24:a1:9e:e3:f8	basement.docker	10.0.0.51
App Server		B8:27:EB:A1:94:A5	app	10.0.0.20
Nagios		b8:27:eb:b2:5b:f7	nagios	10.200.0.10
Living Room Pi		b8:27:eb:e0:60:e4	livingroom-pi	10.0.0.93

# Automation Controllers

## Primary HA Server

**Device:** NUC7-i3-BNK

**Z-Wave Controller:** Aeotec Z-Stick Gen5

**IP Address:** 10.0.0.50

**Server Application:** Home Assistant

**Web Interface:** <https://bulock.house>

**Location:** Media Cabinet – Living Room

## Osram Gateway

**Device:** Osram LIGHTIFY Gateway

**IP Address:** 10.50.0.12

**Location:** Loft

## Lutron Bridge

**Device:** Lutron Smart Bridge Pro 2

**IP Address:** 10.50.0.13

**Location:** Basement Rack

## Xiaomi Gateway

**Device:** Xiaomi Gateway

**IP Address:** 10.50.0.14

**Location:** Kitchen

## Automation Devices

### Lighting

#### Wall Switches

**Device:** Lutron Caseta Wireless In-Wall Dimmer

**Network:** Lutron ClearConnect

**Hub:** Lutron Bridge

#### Outdoor Lights

**Device:** Osram LIGHTIFY RGBW Bulbs

**Network:** Zigbee

**Hub:** Osram Gateway

#### Kids's Lamps

**Device:** Osram LIGHTIFY RGBW Bulbs

**Network:** Zigbee

**Hub:** Osram Gateway

#### Living Room Lamp

**Device:** GE Link Bulb

**Network:** Zigbee

**Hub:** Osram Gateway

#### Master Bedroom Lamp

**Device:** GE Link Bulb

**Network:** Zigbee

**Hub:** Osram Gateway

#### Kitchen Cabinets

**Device:** Osram LIGHTIFY RGBW Light Strips

**Network:** Zigbee

**Hub:** Osram Gateway

#### Fireplace

**Device:** Remotec Z-Wave Dry Contact Fixture Module

**Network:** Z-Wave

**Hub:** Primary HA Server

### Outdoor Holiday Lights

**Device:** GE Smart Plug

**Network:** Z-Wave

**Hub:** Primary HA Server

### Christmas Tree

**Device:** Sonoff Wireless Switch

**Network:** Wifi

**Hub:** Primary HA Server (interfaces through MQTT)

### Snowman Christmas Decoration

**Device:** Leviton Smart Plug

**Network:** Z-Wave

**Hub:** Primary HA Server

### Indoor Christmas Decorations

**Device:** GE Smart Plug

**Network:** Z-Wave

**Hub:** Primary HA Server

### Loft Christmas Lights

**Device:** Inovelli Smart Plug

**Network:** Z-Wave

**Hub:** Primary HA Server

## Motion Sensors

### Breakfast Bar

**Device:** GoControl Motion Sensor

**Network:** Z-Wave

**Hub:** Primary HA Server

### Stairs

**Device:** EcoLink Motion Sensor

**Network:** Z-Wave

**Hub:** Primary HA Server

### Bathrooms

**Device:** Xiaomi Aqara Human Body Sensor

**Network:** Zigbee

**Hub:** Xiaomi Gateway

## Door/Window Sensors

### Front/Back Doors, Basement Window

**Device:** GoControl Door/Window Sensors

**Network:** Z-Wave

**Hub:** Primary HA Server

### Washing Machine Door

**Device:** EcoLink Door Sensor

**Network:** Z-Wave

**Hub:** Primary HA Server

### Bathrooms

**Device:** Xiaomi Aqara Smart Window Door Sensor

**Network:** Zigbee

**Hub:** Xiaomi Gateway

## Security

### Locks

**Device:** Schlage Connect

**Network:** Z-Wave

**Hub:** Primary HA Server

## Climate

### Thermostat / Humidistat

**Device:** Ecobee3

**Network:** Wifi

**Hub:** Primary HA Server

### Bathroom Sensors

**Device:** Xiaomi Aqara Temperature Humidity Sensor

**Network:** Zigbee

**Hub:** Xiaomi Gateway

## Misc

### Plants

**Device:** Xiaomi Mi Flora Monitor

**Network:** Bluetooth LE

**Hub:** Living Room Pi (communicated to Primary HA Server over MQTT)

### Power Monitoring

**Device:** Aeotec Smart Switch 6

**Network:** Z-Wave

**Hub:** Primary HA Server

### Christmas Tree Water Levels

**Device:** Aeotec Water Sensor

**Network:** Z-Wave

**Hub:** Primary HA Server