

AntMiner-U1 user guide

1 Install driver

Cgminer for antminer-U1:

<https://github.com/AntMiner/AntGen1/tree/master/cgminer>

CP2102 Driver:

<http://www.silabs.com/products/mcu/Pages/USBtoUARTBridgeVCPDrivers.aspx>

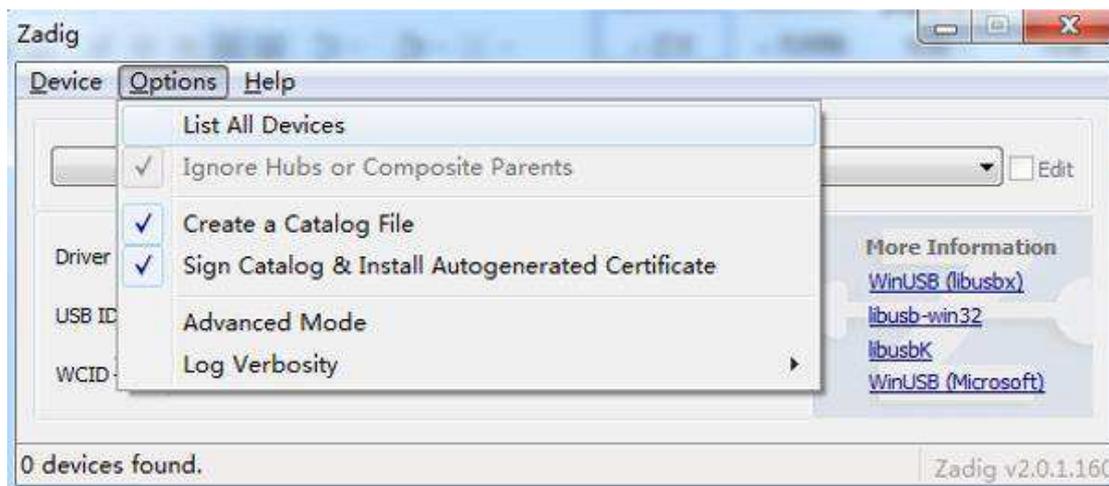
zadig:

<http://zadig.akeo.ie/>

Step1: install CP210x_VCP driver.

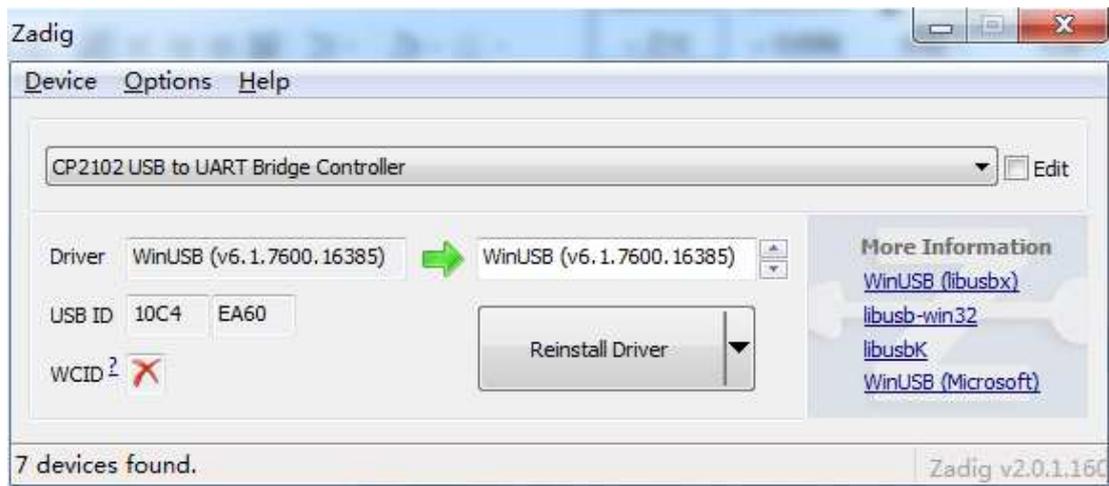
Step2: Plug in antminer-U1.

Step3: Open Zadig and click "Options -> List All Devices"



Step4: Select CP2102 USB to UART Bridge Controller, and then click "Reinstall

Driver"

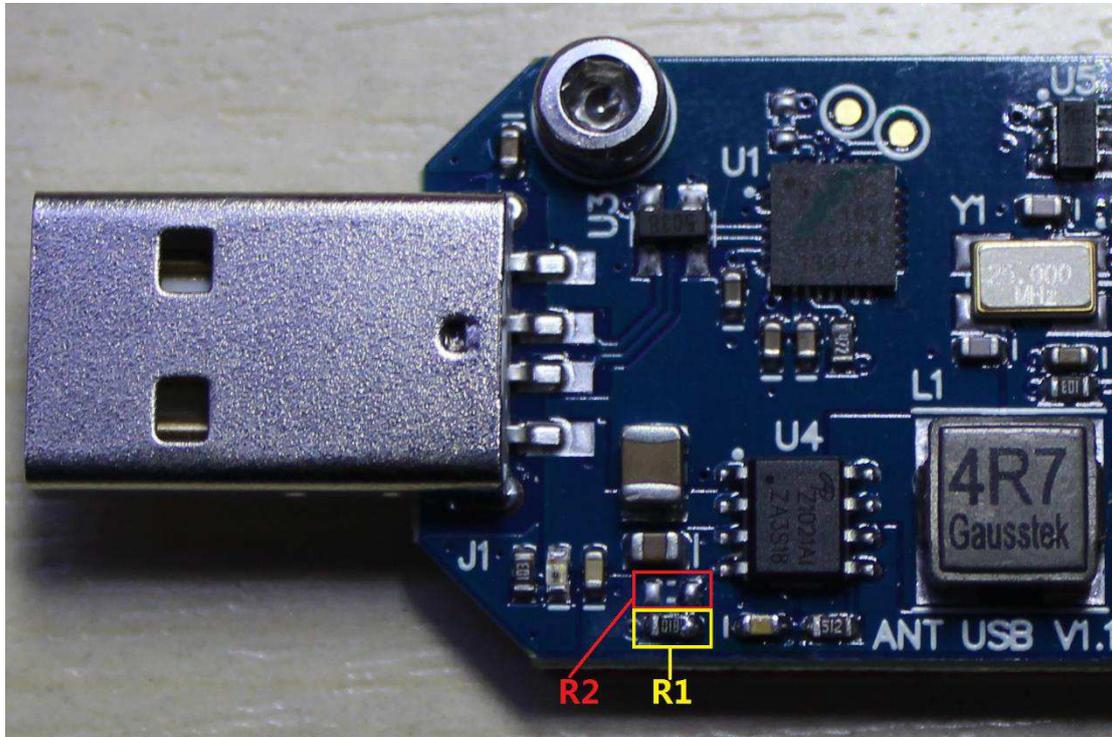


Step5: run cgminer. In next time, please run cgminer directly.

```
cgminer.exe --bmsc-options 115200:20 -o 50.31.149.57:3333 -u ktzhan_3 -p 123 --  
bmsc-freq 0781
```



2 Over clocking guideline



DC/DC component: AOZ1021AI

DC/DC output formula: $V_o=0.8*(1+R1/R2)$

Typical value

DC/DC output	R1	R2
0.8V(Default)	1K	OPEN
0.9V	1.24K	10K
1.0V	2.49K	10K
1.1V	3.74K	10K
1.2V	4.99K	10K

cgminer --bmsc-freq option

Frequency (MHz)	ASIC hash rate (GHz)	Frequency Hex
150	1.2	0581
175	1.4	0681
200	1.6	0781
225	1.8	0881

250	2.0	0981
275	2.2	0A81
300	2.4	0B81
325	2.6	4C81
350	2.8	4D81
375	3.0	4E81
400	3.2	4F81
425	3.4	5081
450	3.6	5181
475	3.8	5281
500	4.0	5381

Frequency Hex description

15	14	13:7	6:2	1:0
0	BS	M[6:0]	N[4:0]	OD[1:0]

NR=N+1

NF=M+1

OD[1:0]	0	1	2	3
NO	1	2	4	8

$F_{out} = 25 * NF / (NR * NO)$, where NR =1 or 2.

When BS=1, $62.5 \leq F_{out} \leq 1000$; $500 \leq F_{out} * NO \leq 1000$

When BS=0, $37.5 \leq F_{out} \leq 600$; $300 \leq F_{out} * NO \leq 600$