This tool is only applicable to AntMiners and does not support miners of other brand.

Brief Introduction:

Batch monitoring status of miners; configuring static IP; upgrading firmware and restarting miners.

【Tips】
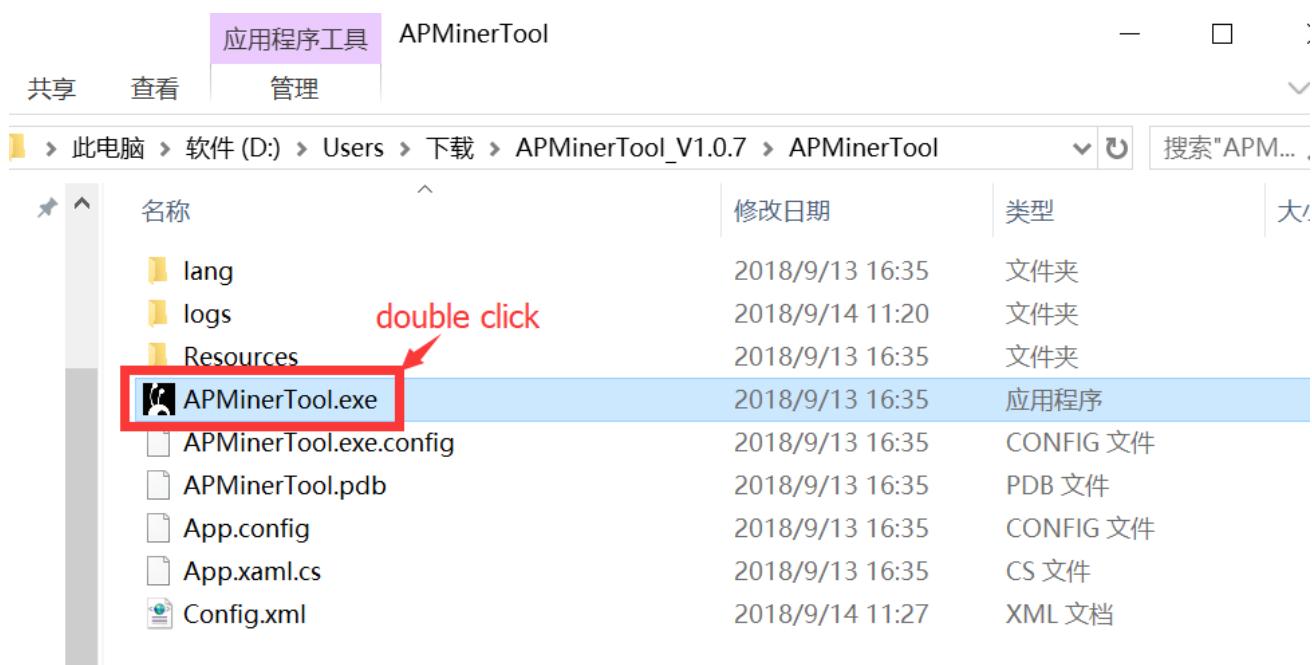
1. This tool requires Windows7 or above system. It cannot be used in XP and IOS system
2. The tool language is automatically adapted according to the system. It will display in Chinese when system language is Chinese and display in English when being used in non-Chinese system.
3. If warning of virus pops up by downloading, it is recommended to try another browser. The file is completely safe.
4. Extract the file before using it, otherwise there will be errors.
5. The computer running the tool should be in the same network with the miners.

● **Batch Configuring Static IP**

(If you have already configured miner IP, please skip this step)

Computer and miners should be in the same IP range.
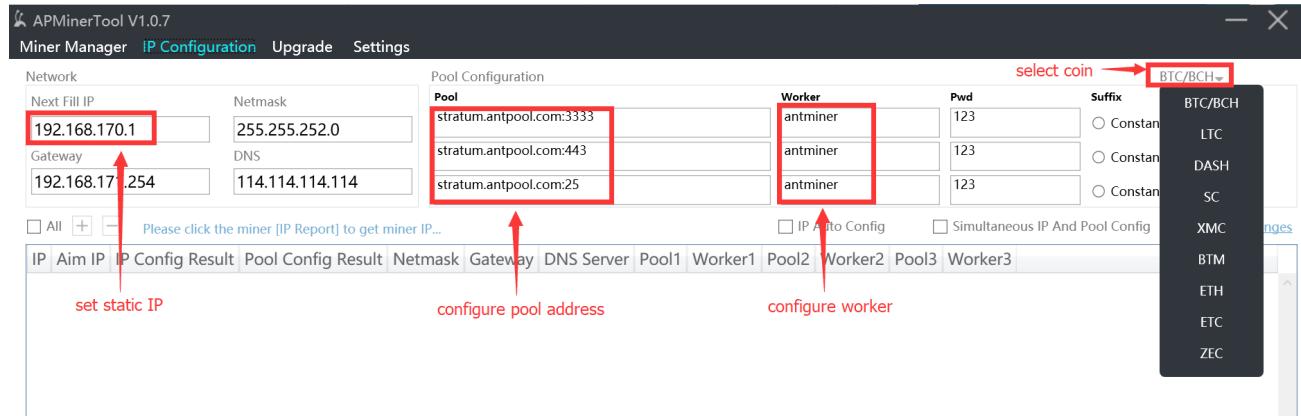
1. Double click to open the software.
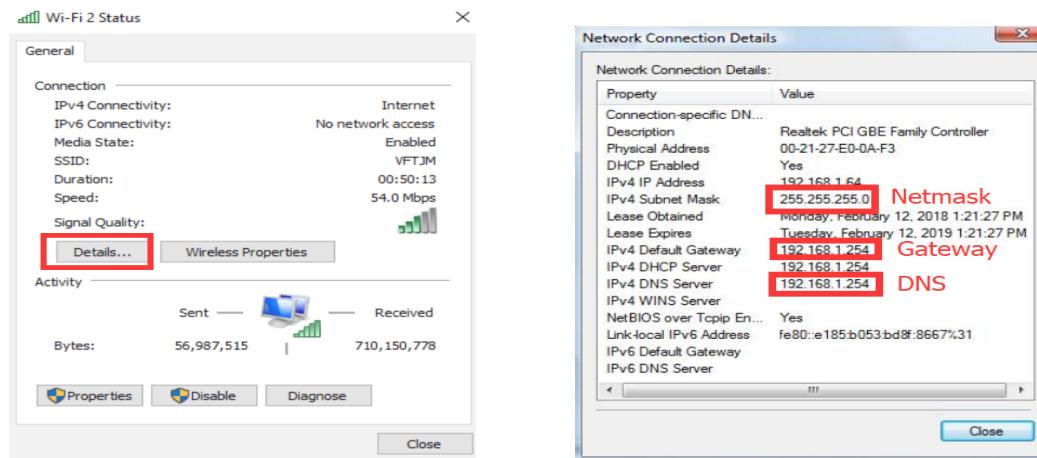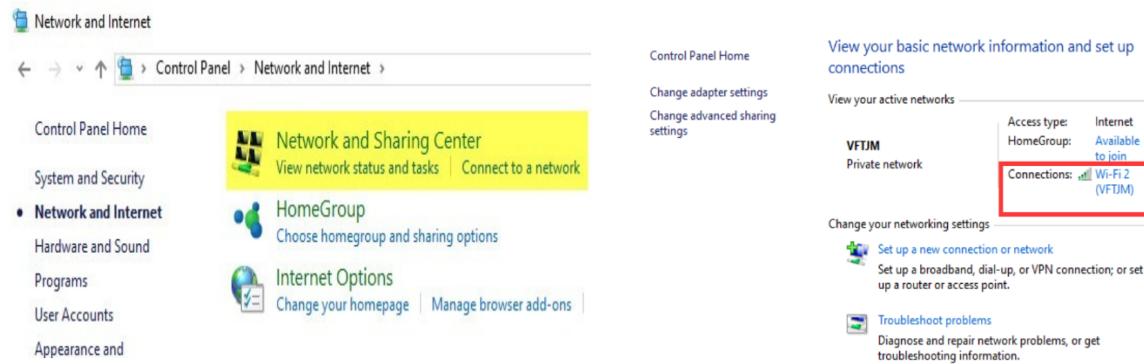
After miner is connected to network and powered on, the IP obtained during miner configuration is in DHCP mode, and the IP address is not fixed. If you own many miners, this tool can set static IP address in batches for you to better manage these miners. The IP Range of a normal router is 1-254. If you want to set miner static IP from 1, to avoid IP conflict, it is recommended to let the router assign IP in DHCP mode from 100.

For example: Router assigns IP in DHCP mode: 101-254; Static IP for miners: 1-100

2. Fill the static IP you would like to set for miner into "next fill IP" and select coin type for miner. Configure stratum pool address, worker and password in batches under "Pool Configuration".
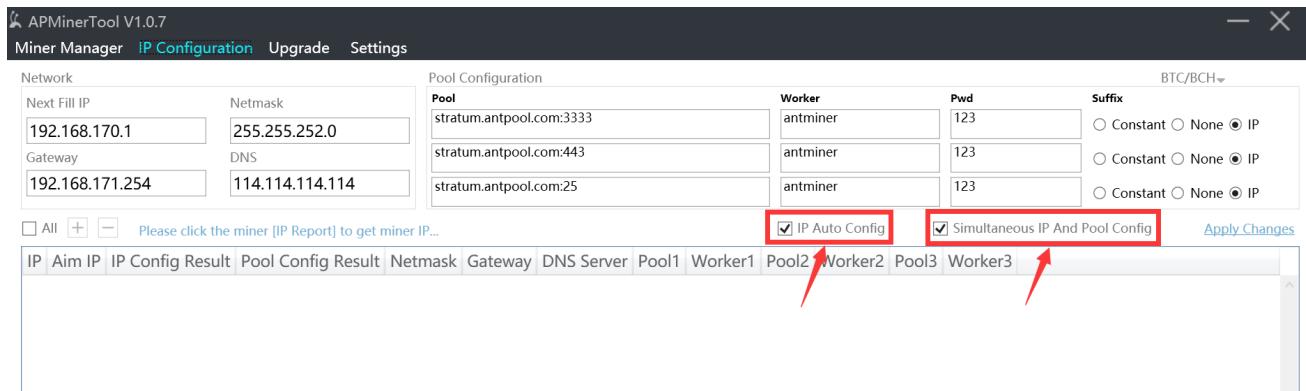
3. Check "Netmask", "Gateway", "DNS" in computer "Network and sharing Center", and fill in accordingly

4. It is recommended to check "√" the "IP Auto Config" option, static IP will then be automatically allocated to next miner in order. If not checked, you will need to manually enter the static IP one by one. After completing above configurations, press the "IP report" button on each miner for 3-5 seconds, static IP will then be allocated to

miner one by one. Option "Simultaneous IP And Pool Config" could be checked based on your own needs.

- **Batch Managing Miners**

1.   Detect miners in specific IP range
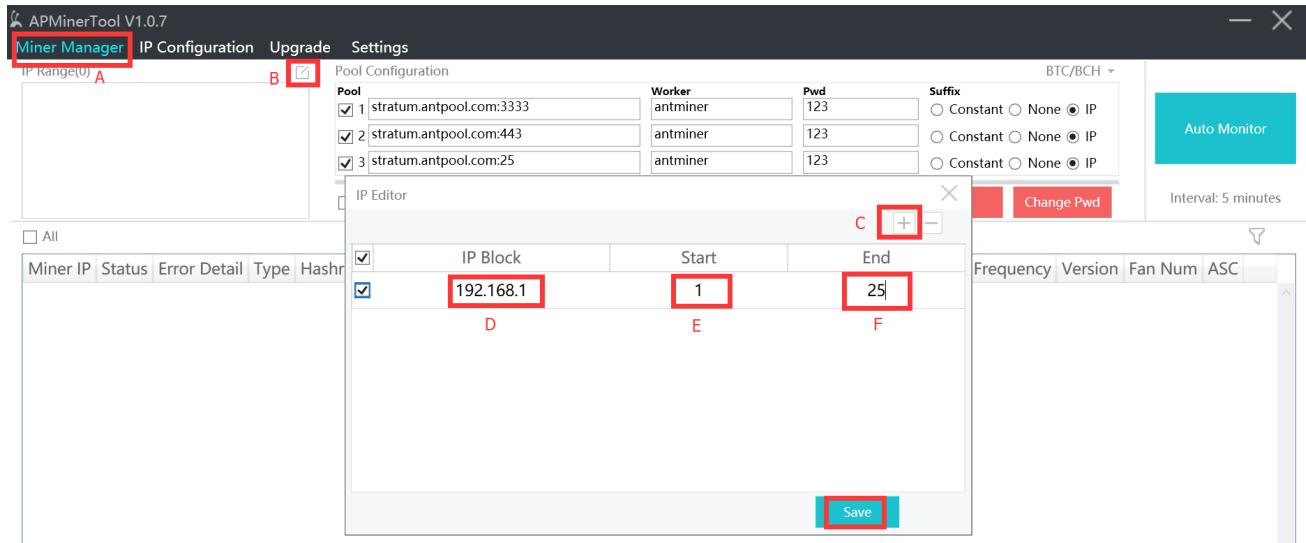
 A: click on "Miner Manager" to switch to miner management interface

 B: click to activate "IP Editor"

 C: click "+" to obtain IP range

 D, E, F: double click on each IP sector to modify

 Click "Save".

2.   Click "Start Scan", to scan miners that have been configured.

     After the selected IP Range is scanned, a window will pop up displaying the number of miners in each state.

     (normal, low, other exception, lost, fail)

You can choose to only display miners which have been successfully scanned based on your own needs.
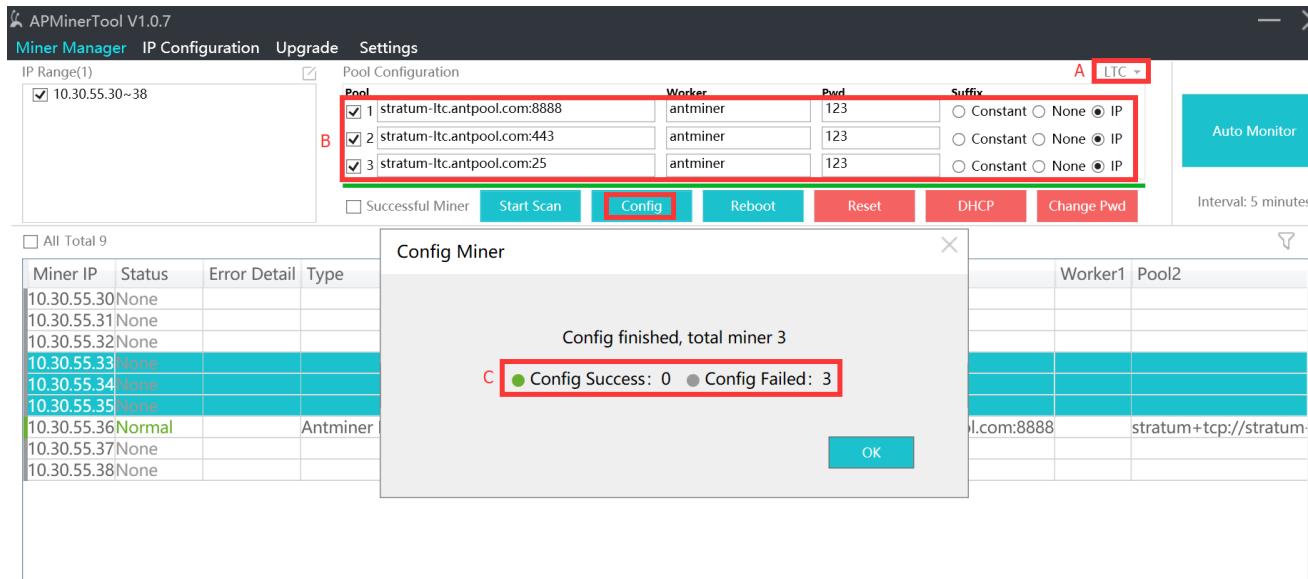
3. Configure Miners

A: Switch coin type, corresponding stratum address of each pool will be filled in "Pool" automatically after switching. You can also modify it manually by yourself. (Coin switching could be operated only when monitoring is not turned on or monitoring is stopped)

B: Select all miners or "Ctrl select" specific miners for corresponding coin mining, set worker name, password etc. for these miners in batches
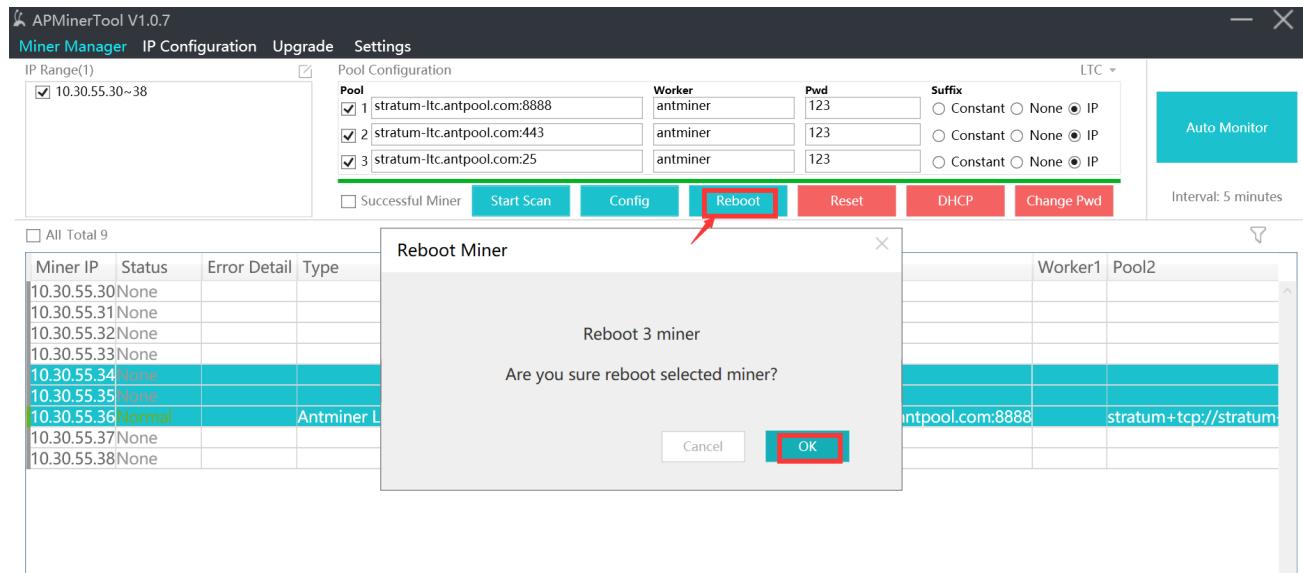
C: Click on "Config" to configure the selected miners. After configuration is done, a window will pop up displaying the number of miners in state "config success" or "config failed".

Suffix of worker name could be modified under "suffix". Default suffix is set to be the last 2 sectors of allocated IP. After modifying, click on "Config", miners will be automatically configured. Then click on "Auto Monitor" to start monitoring the miners.
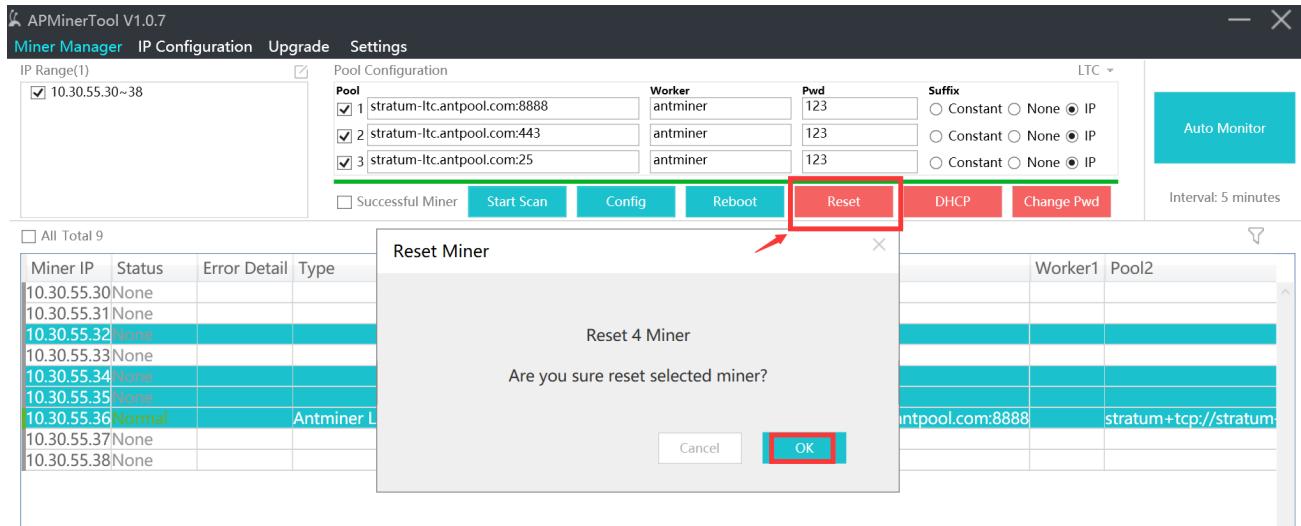
4. Batch Rebooting miners

If miners need to be restarted, select the miners and click on "Reboot", then confirm the pop-up window to get miners restarted.
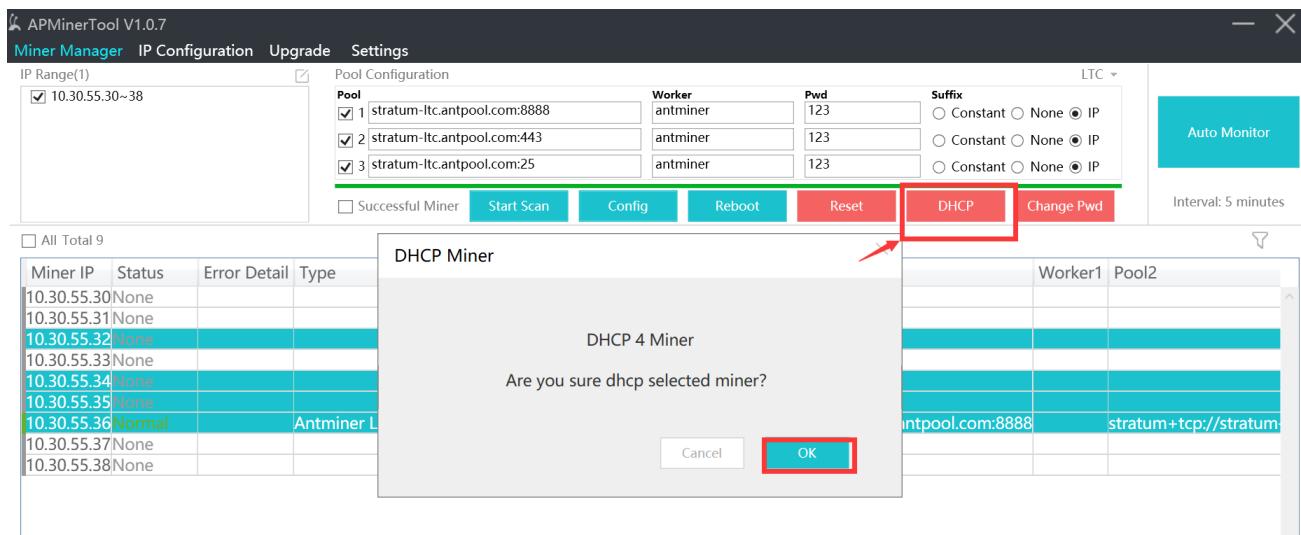
5. Batch resetting miners

If miners need to be restored to the factory settings, select the miners and click on "Reset", then confirm the pop-up window to get miners restored to the factory settings.

6. Batch restoring DHCP mode

If miners with static IP need to be restored to DHCP mode, select the miners and click on "DHCP", then confirm the pop-up window to get miners restored to DHCP mode.
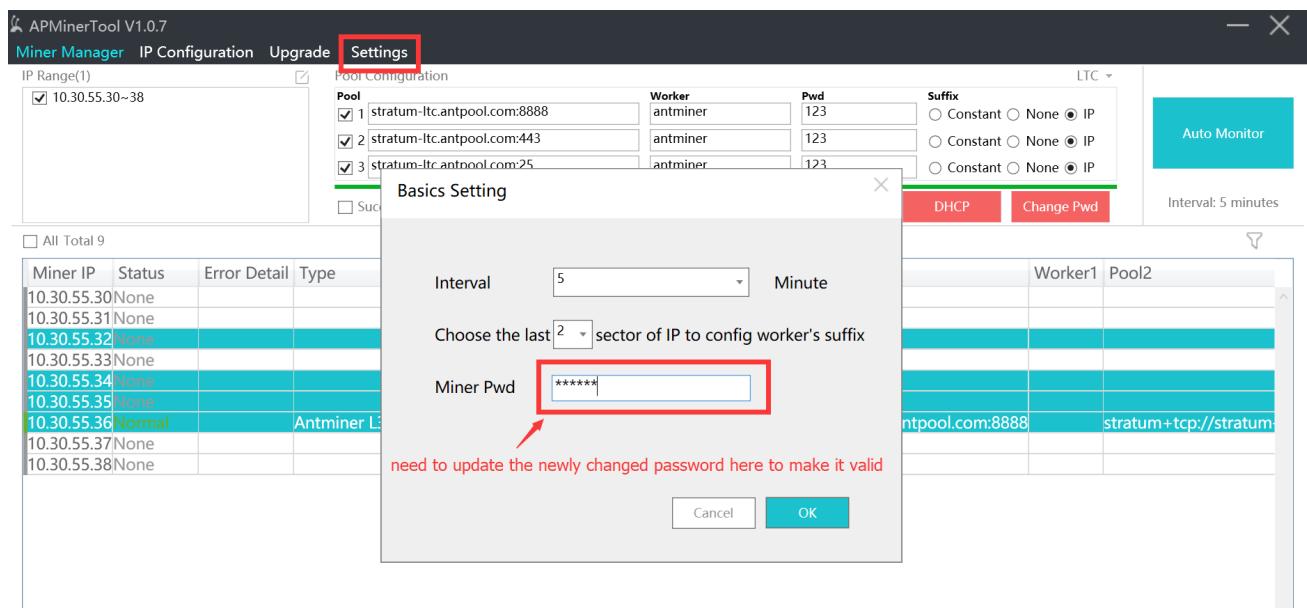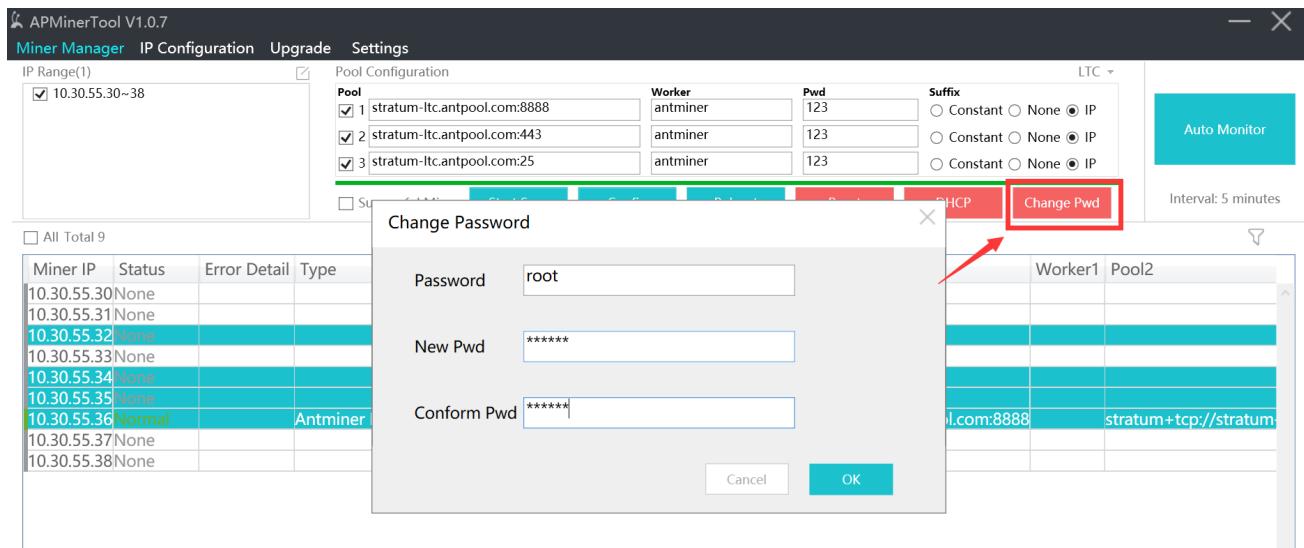
7. Batch changing password
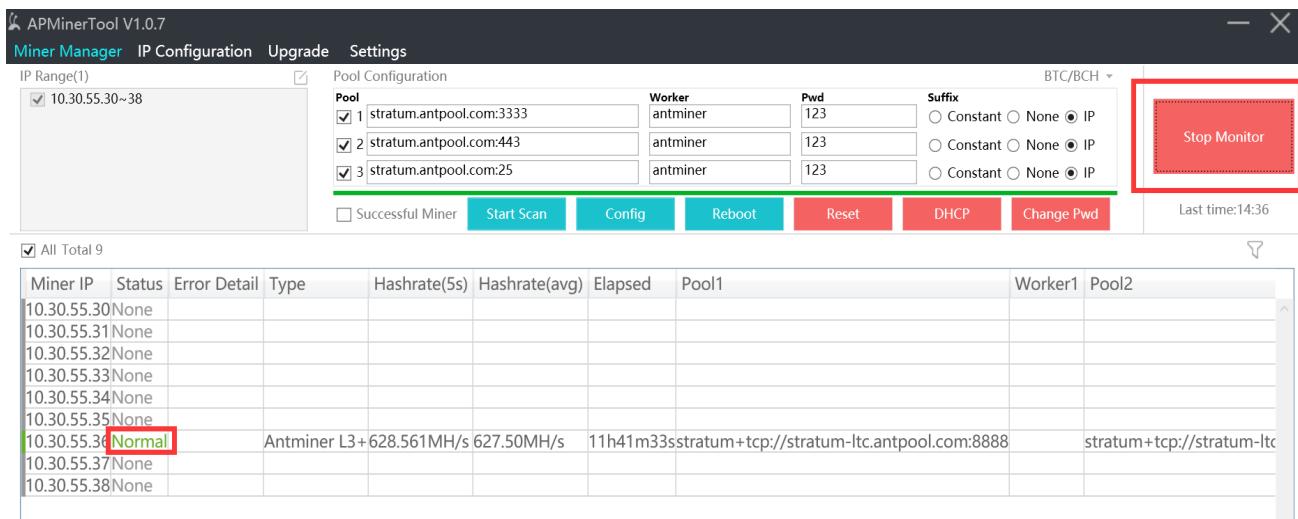
If you would like to set new password for miners, select the miners and click on "Change Pwd". After change is done, you also need to update the new password under "Settings-Basic Settings-Miner Pwd" to make it effective.

For example: default password (root), new Pwd (123456), confirm Pwd (123456)

(Note: Please do not forget the password once changed. If you forgot the password, miners will need to be restored to factory settings before you can log into miner backstage again.)
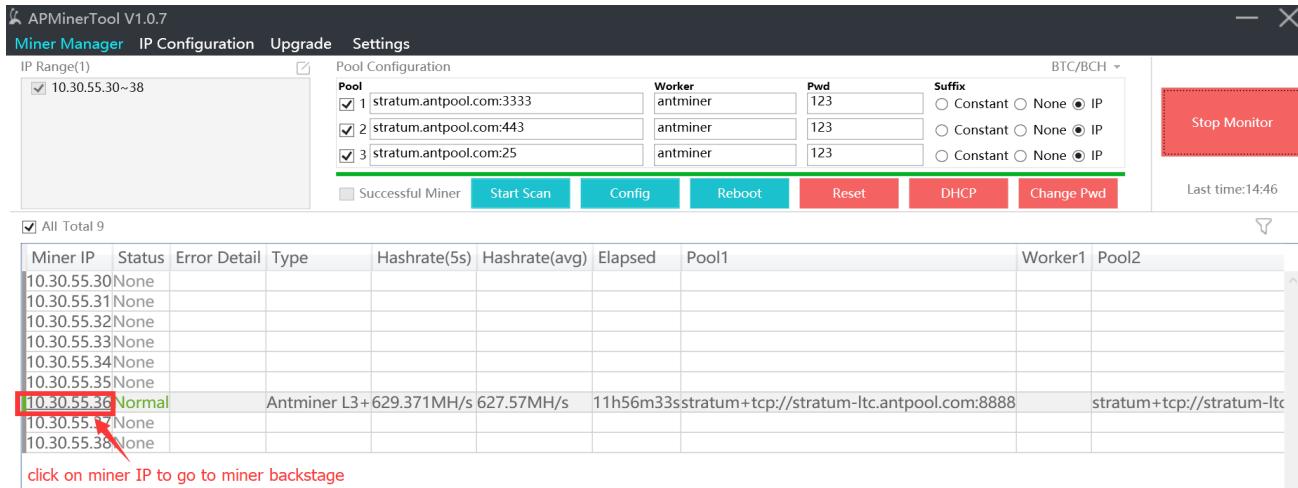
8. After miner configuration is done, click on "Auto Monitor" to start monitoring the miners. Default frequency is to refresh status every 5 minutes. Status will be displayed in different colors: normal (green), low (orange), Other Exception (blue), lost (red)

9. Click on miner IP, you will be directed to miner backstage page.

● **Batch upgrading firmware**

If miners have issue and miner firmware needs to be upgraded, you can use the batch upgrading firmware function.
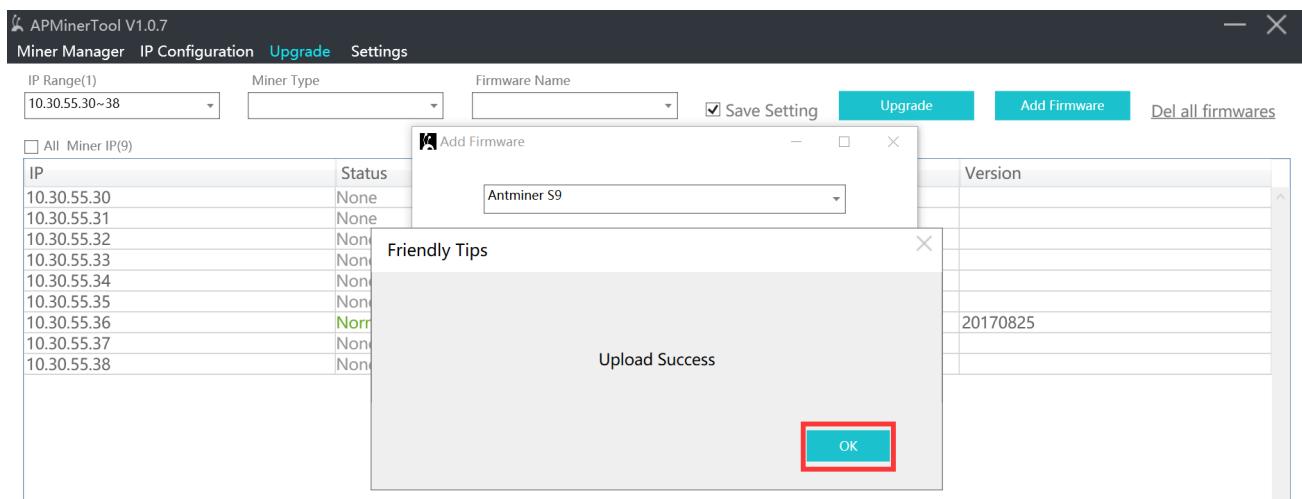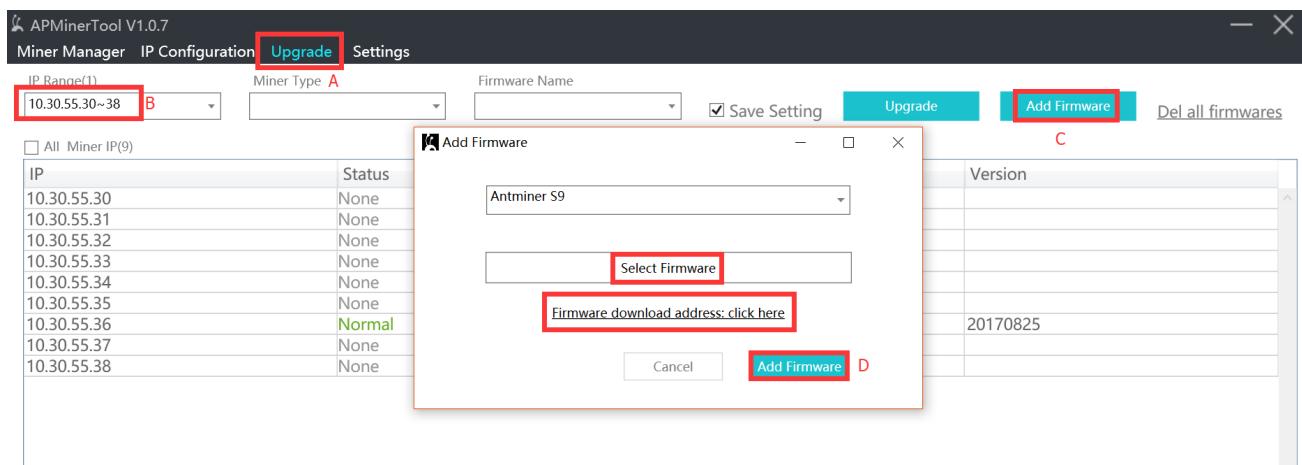
1. How to operate:

A: Click on "Upgrade " to switch interface
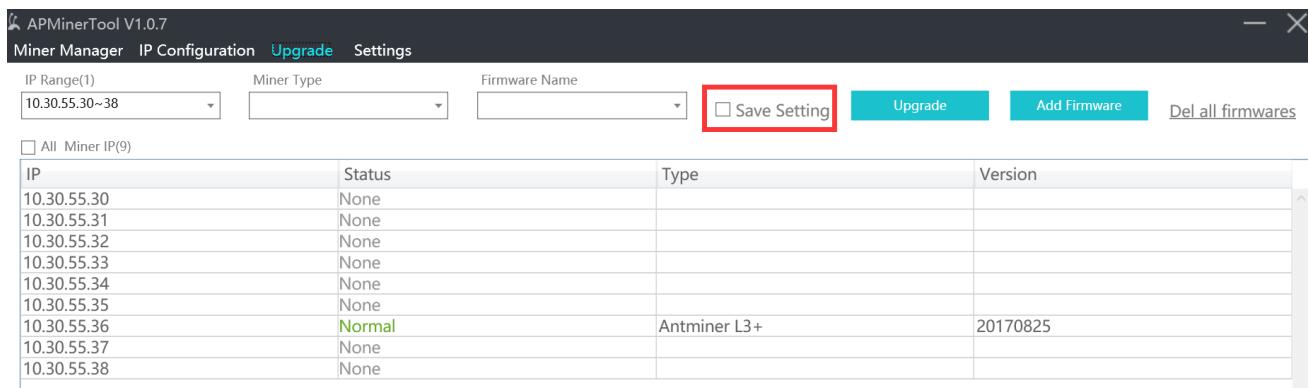
B: Select the corresponding IP range where the miners are located, check"√" the miners which need to be upgraded.

C: Add firmware (if you have not downloaded the firmware, click on "Firmware Download Address -" to download first. After downloaded, click "Select Firmware" to upload.) Firmware file does not need to be extracted and can be uploaded directly.

D: Click on "Add Firmware", window displaying "Upload Success" will pop up when upload is done.
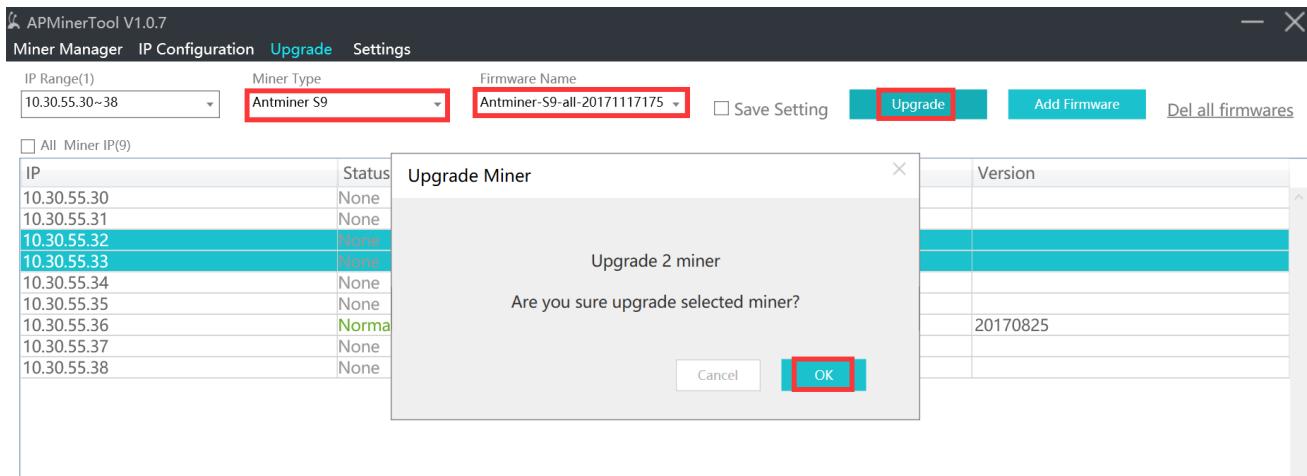
2. This tool will "Save Setting" by default when batch upgrading firmware. If you do not want to keep setting of miners, you could remove the "√" beside the "Save Setting" option before upgrade. (Generally, firmware upgrade does not keep miner settings.)
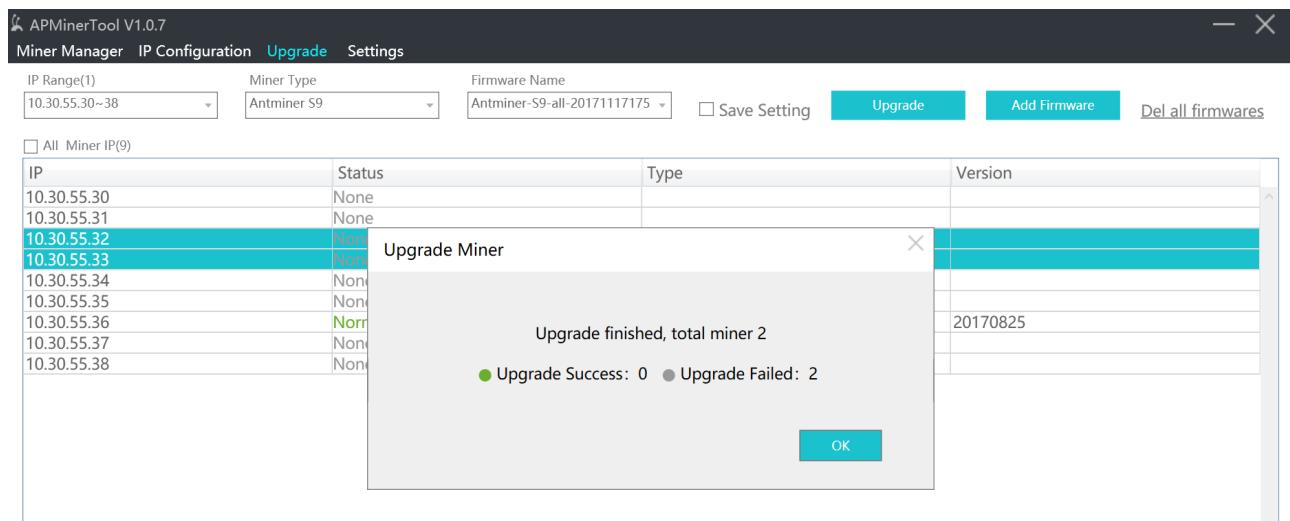
3. Select "Miner Type" and "Firmware Name", click on "Upgrade". Window will pop up displaying number of miners to be upgraded. Confirm and wait for about 2 minutes, upgrade result will be prompted whether successful or not.

- **Settings**

There are three options under "Settings", namely: "Basics Setting", "Miner Alert", "IP Editor"
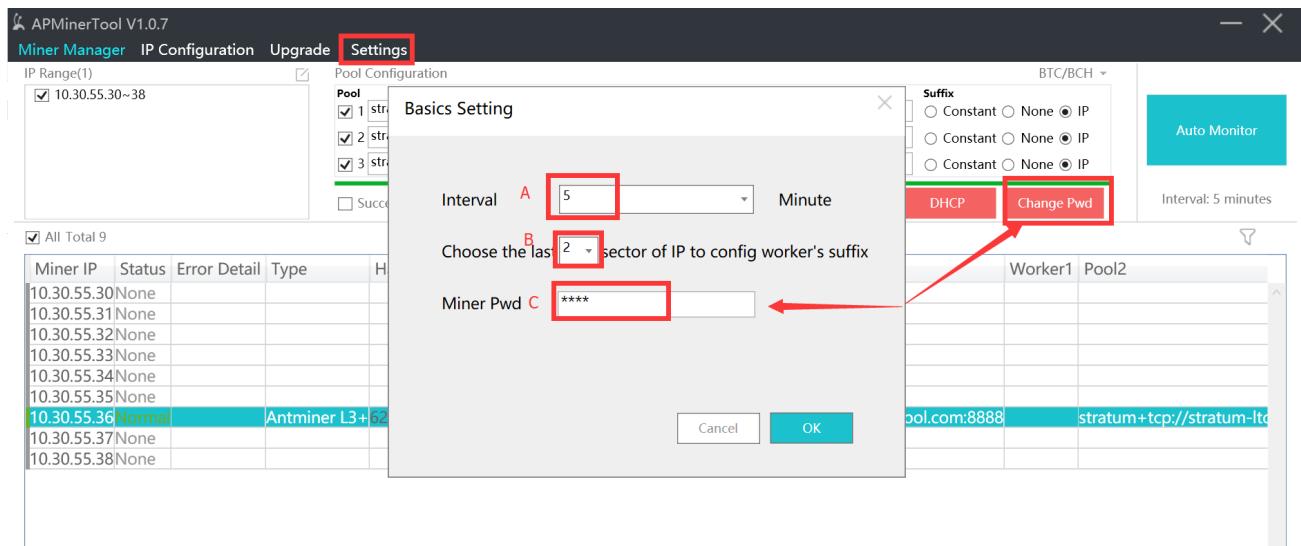
1. Basics setting

A: edit the interval of status refreshing while monitoring miners
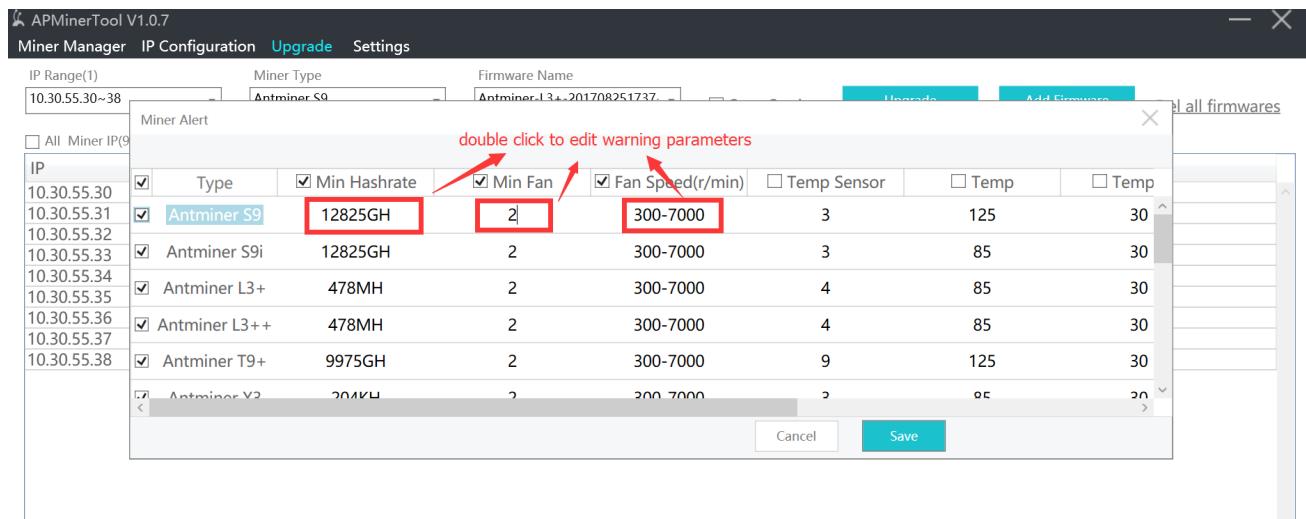
B: choose specific sector of IP to configure worker's suffix

C: Default password is "root". If you would like to set new password for miners, as mentioned in previous section, you need to not only change the password here but please also remember to change under "Miner Manager"-"Change Pwd" at the same time to make the new password effective.
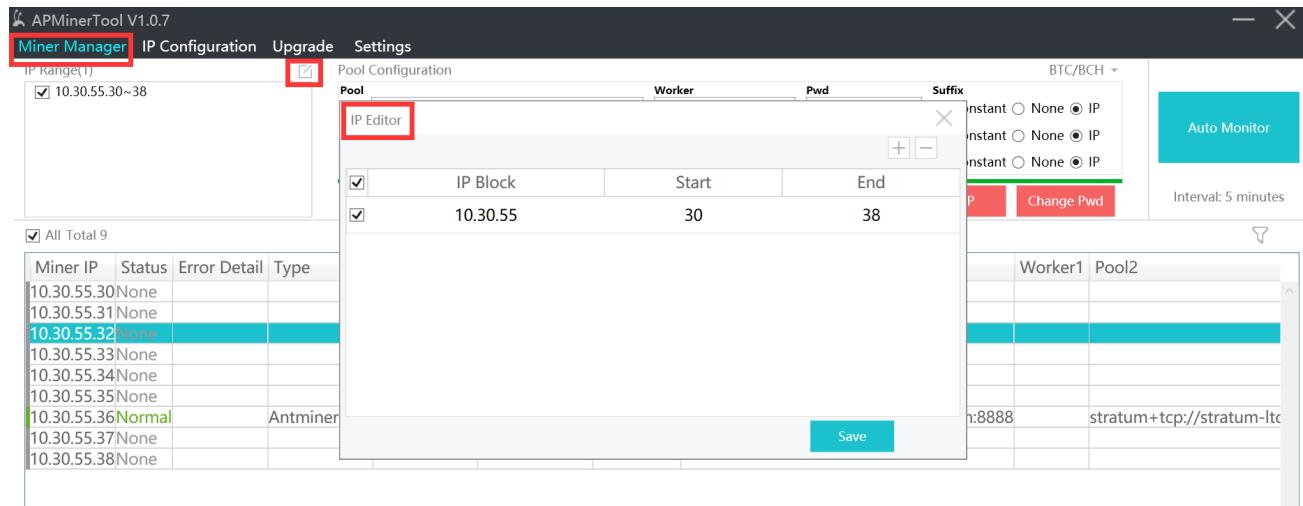
2. Miner Alert (If monitoring data reached the upper or lower limit of certain parameter, there will be a warning indicating miner abnormality.)

   If hash rate is low, status will be displayed as "low". If there are abnormality in other parameters, this tool will prompt that there are other exceptions.
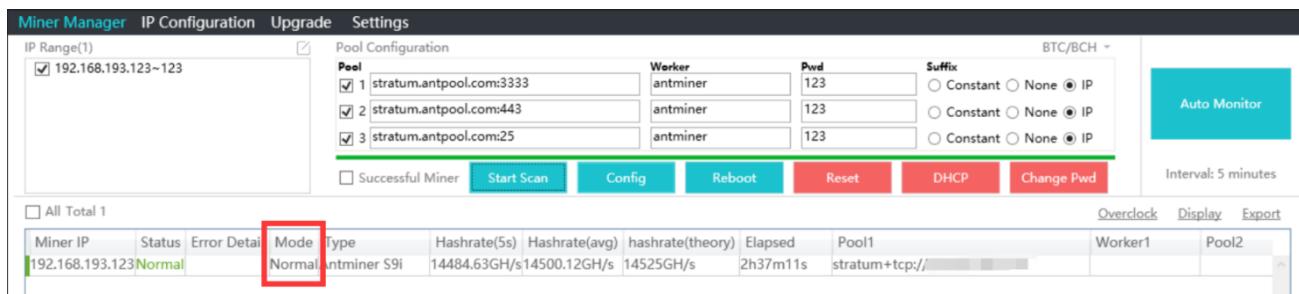
3. IP Editor

This setting has the same function as to click the edit button under "Miner Manager" interface.

● **Overclock function**
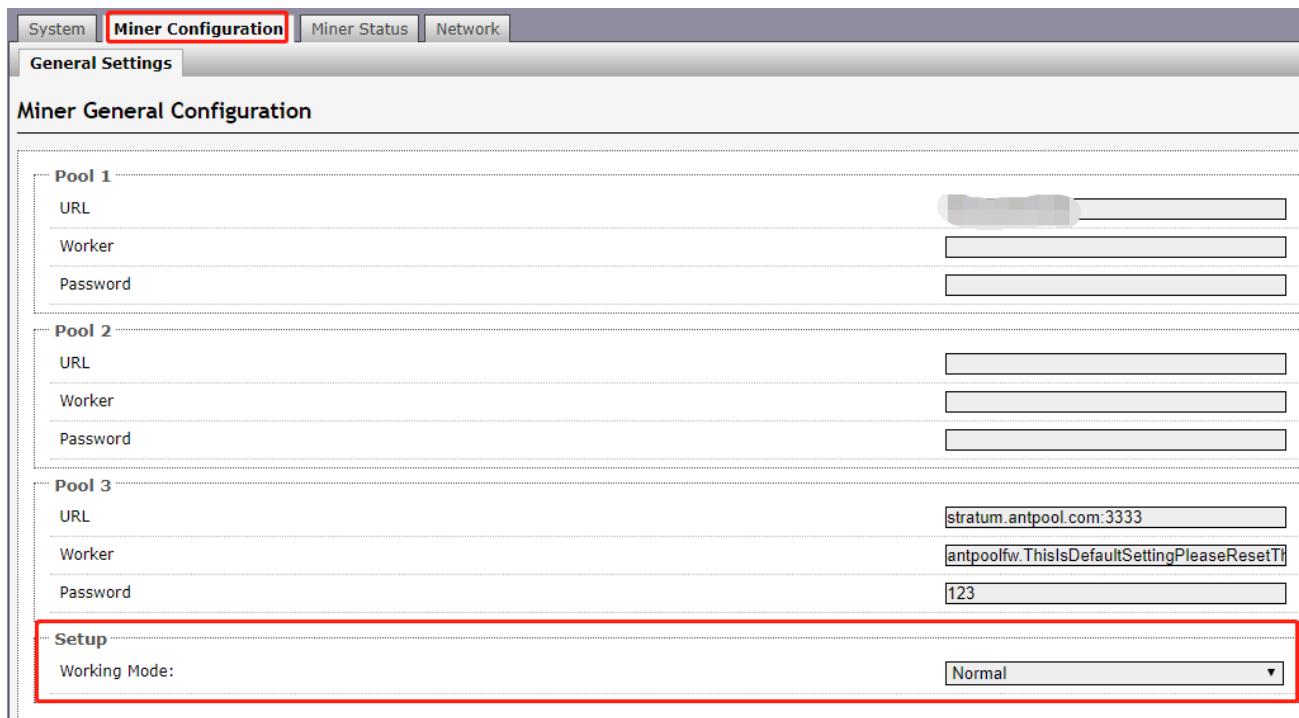
1. Before overclocking your miners, you need to first upgrade the latest multi-option firmware on your miners. The firmware could be downloaded from this link: https://service.bitmain.com.cn/support/download

2. After firmware upgrade, check in APMinerTool if your miner could be overclocked

1) By miner scanning, check if there is data displayed in the "Mode" column. If there is data, you can overclock the miner.
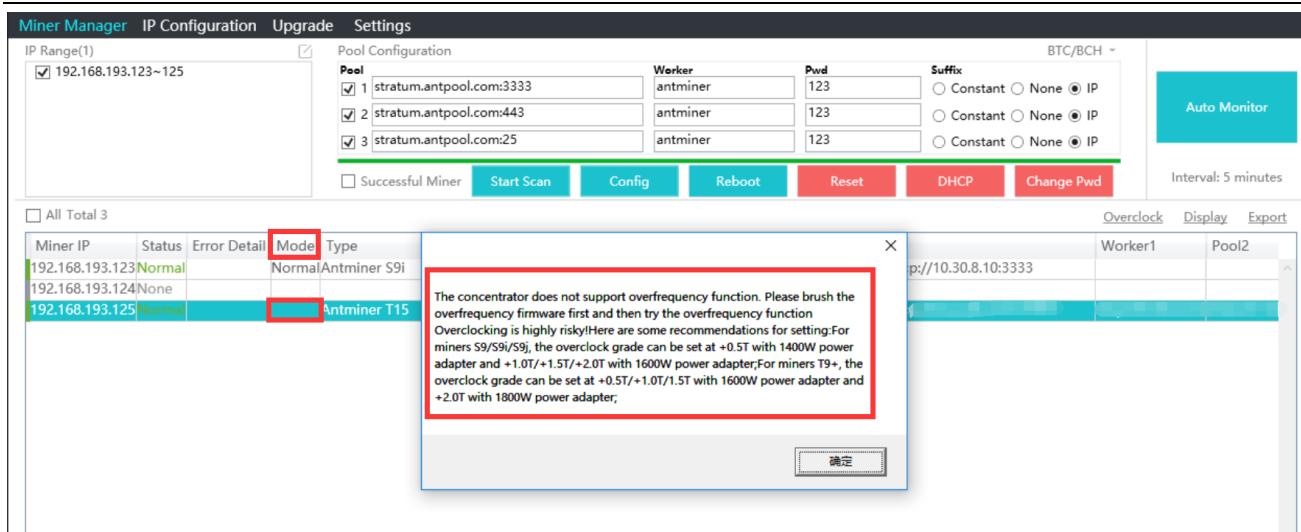
2) Or you could login miner backstage, on the "Miner Configuration" page, you can see the "Working Mode" option and overclock your miner accordingly.
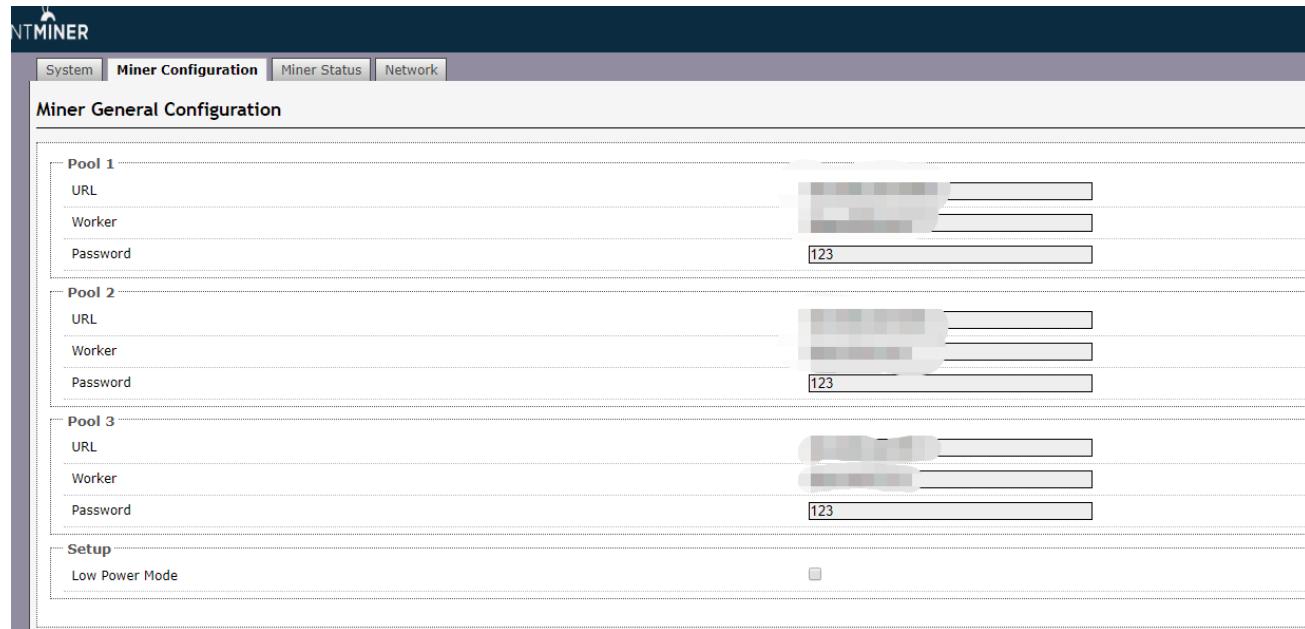
3) If there is no data displayed in the "Mode" column in APMinerTool, it means that the latest multi-option firmware has not been upgraded on your miner. Click on the "Overclock" button, message will show up and inform you "The selected miner does not support the overclocking function"

and if you check from miner backstage, there will be no "Working Mode" column on the "Miner Configuration" page in this case.
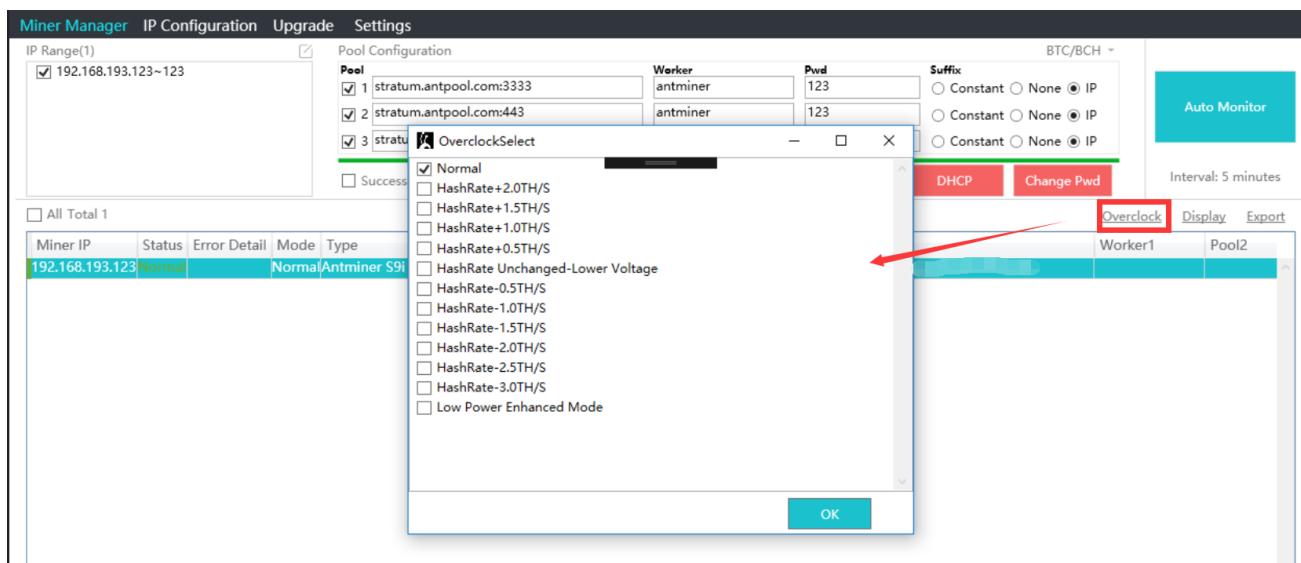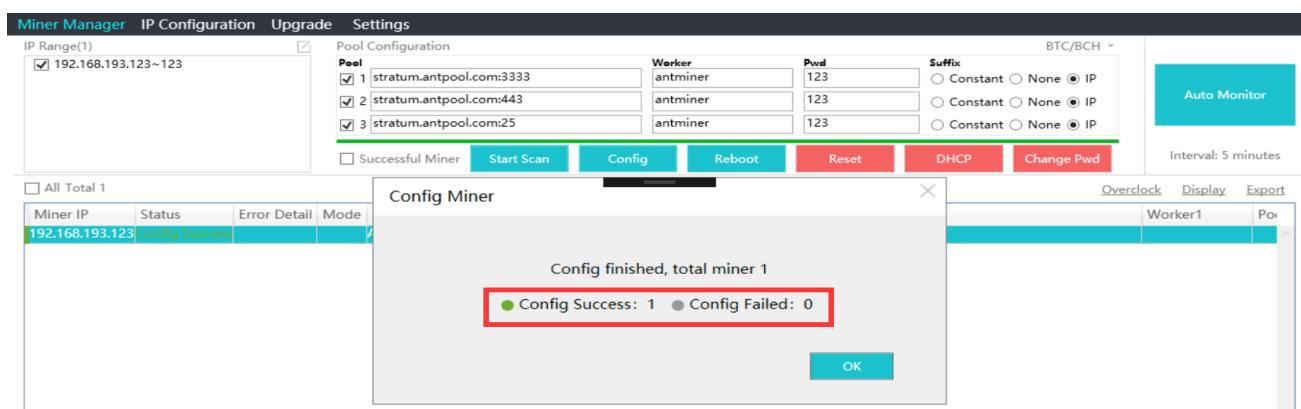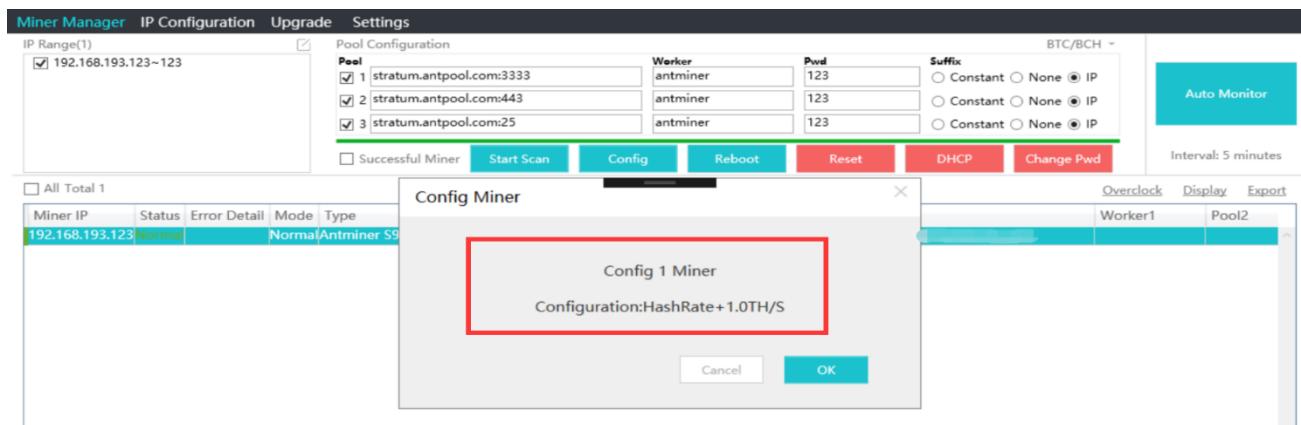
3. Select the miners you want to overclock, click the "overclock" button in tool, select the corresponding mode and click to confirm

4. Wait till the miner is restarted, the overclock mode configuration is completed.

Note:

1.Please be cautious with the overclock operation.
Currently only T9+ and the S9 series miners support overlock function.

Power Supply Requirement and Working Mode Adjustment Suggestions:

1)   For S9/S9i/S9j miners:

+0.5T mode can be run by 1400W power supply,
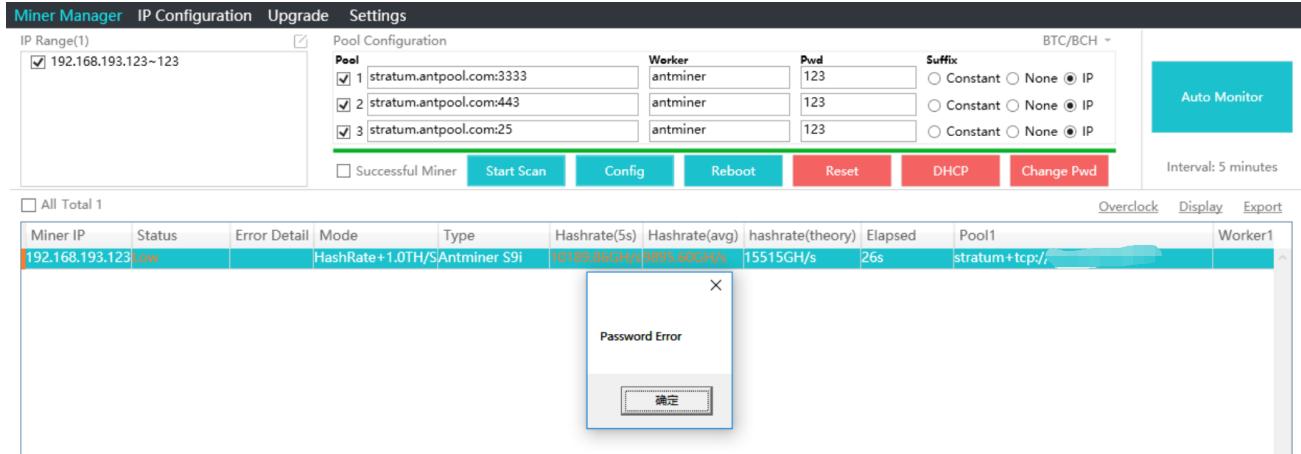
+1.0T/+1.5T/+2.0T modes can be run by 1600W power supply.

2)   For T9+ miner:

+0.5T/+1.0T/+1.5T modes can be run by 1600W power supply,

+2.0T mode can be run by 1800W power supply.

2. If message shows up saying "Password Error" after clicking the "overclock" button, you need to first change
miners' password under "Settings-Basic Settings" in tool to the same password as from miner backstage.

- **Anti-Virus function**

1. Select the IP range, click "Start Scan" to scan the miners
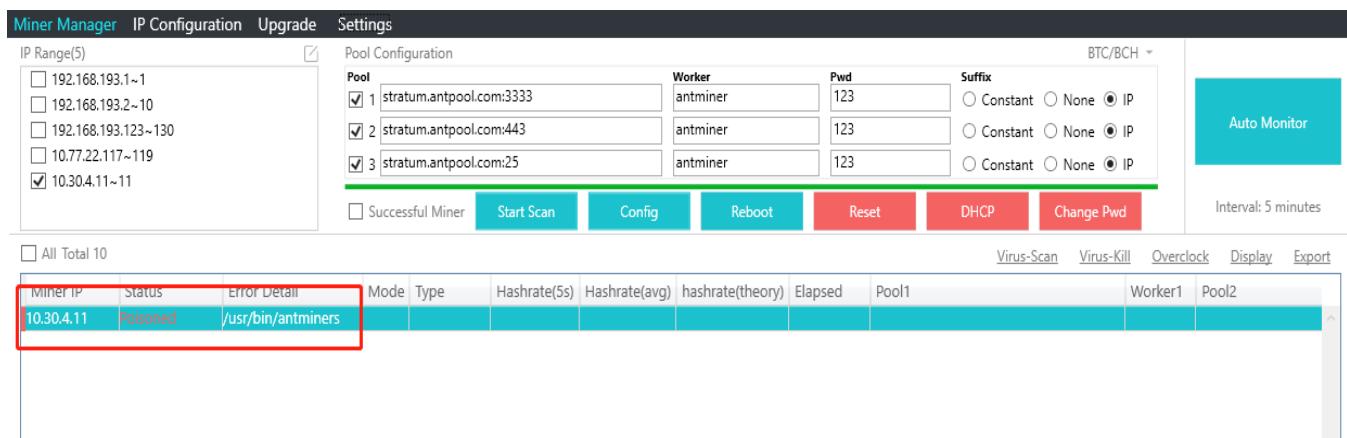
2. Select the miners, which need to be checked, click "Virus-Scan". After the scanning process, you will see 4 kinds of results: "Normal", "Infected", "Secure Firmware", "Not Supported":

Function	Status	Error Detail	Description
Virus-Scan	Normal		No virus detected
	Poisoned	poisoned files	Virus detected and displaying infected files
	Secure Firmware		Secure Firmware installed on miner (port 22 closed) ,cannot be scanned for virus
	Not supported	SSH failed	SSH password changed or 22 port closed, recommended to use SD card to reset the miner
		{XXX minertype} Not supported	Miner type not supported, cannot be scanned for virus

2-1 Normal - No virus detected
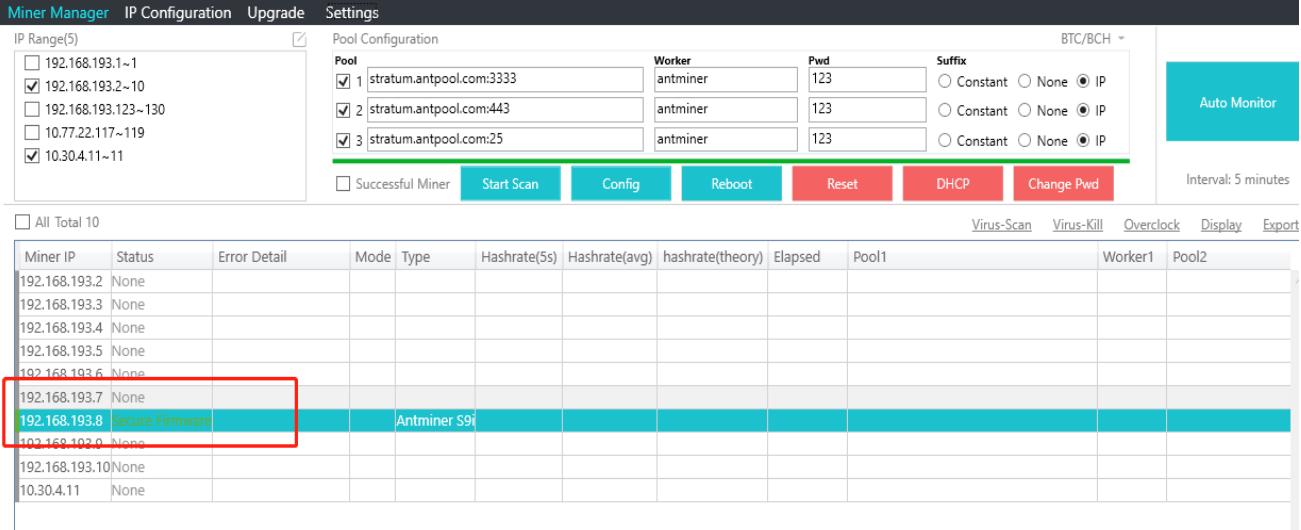
2-2 Infected - Virus detected and infected files will be displayed under "Error Detail"

2-3. Secure firmware: Secure Firmware installed on miner, port 22 is closed/ SSH function is disabled, miner cannot
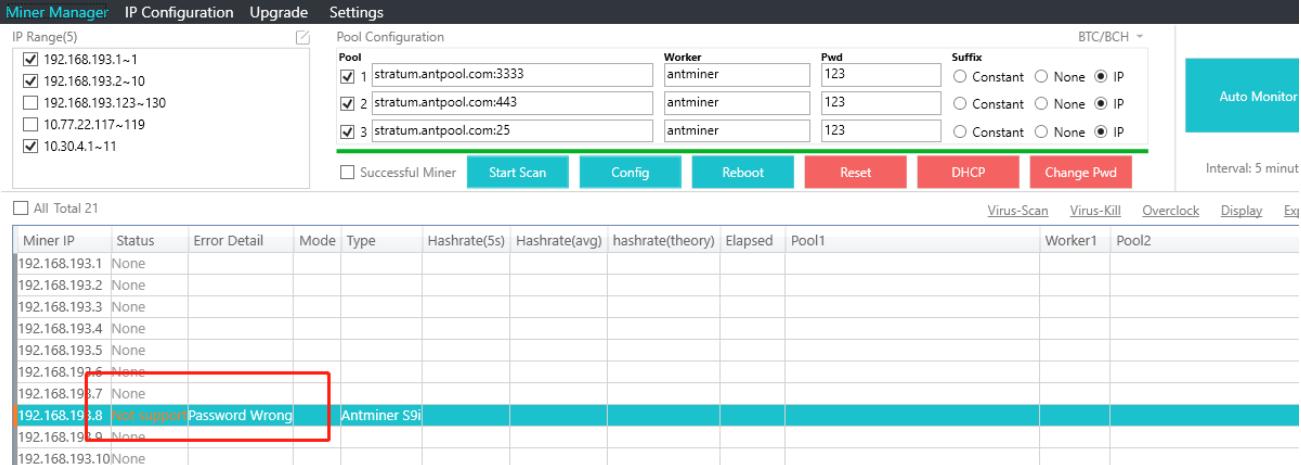
be scanned for virus

2-4.Not supported: there could be 3 kinds of errors

1) Password Wrong – The password of the miner is not the same as password in this tool. You need to change the password in "Settings" – "Basic Settings" to make the miner have same password in tool as from miner backstage. Then you could go on with the virus scanning operation.

2) SSH failed: SSH password changed or 22 port closed, cannot be scanned for virus, recommended to use SD card to reset the miner

3) { XXX minertype} Not supported: Miner type not supported, cannot be scanned for virus

3. To remove virus from infected miners, select the miners and click "Virus kill" – "Download" to download the anti-virus firmware for corresponding miners. If you have downloaded the anti-virus firmware once, you will not see the "download" button next time and you could click on "kill virus" button directly
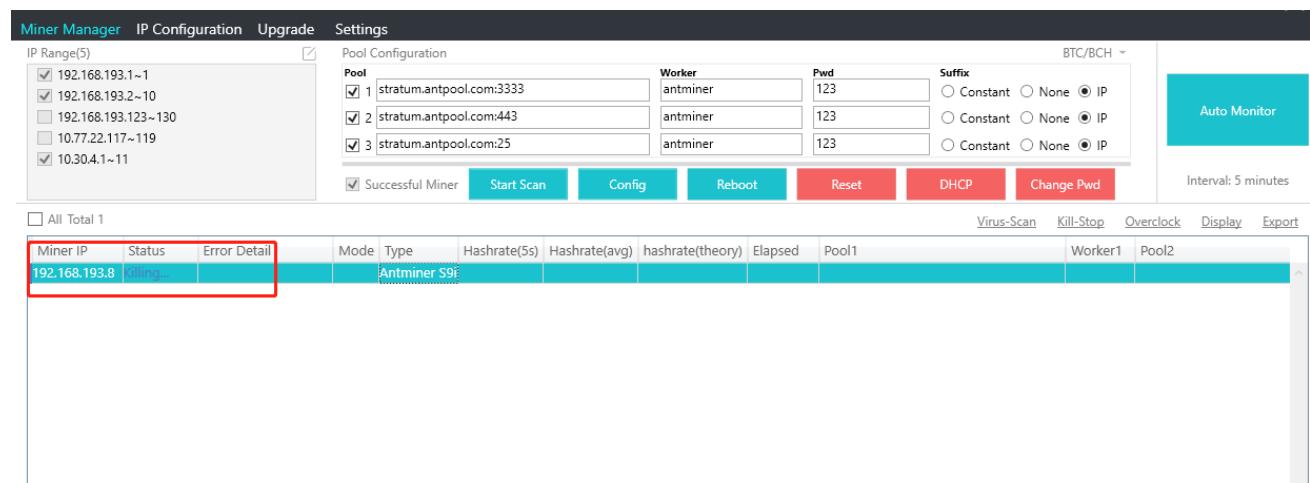
4. After the firmware is downloaded, click "Kill Virus" to continue

5. After virus is removed, system will automatically prompt "Operation Finish" – "Kill Success"

6. In addition to "Kill success", there also could be other results:

Function	Status	Error Detail	Description
Virus-removal	Kill Success		Virus has been removed successfully
	Kill Error	SSH failed	SSH password changed or 22 port closed, recommended to use SD card to reset the miner
		Password wrong	You need to change the password to make the miner have same password in tool as from miner backstage
	Not supported	SSH failed	SSH password changed or 22 port closed, recommended to use SD card to reset the miner
		{XXX minertype} Not supported	Miner type not supported, cannot be scanned for virus
	None		No miner could be found

Note:

1. Currently supported AntMiners: S9,S9i, S9j, T9, T9+ ,L3, L3+, L3++, A3, D3, X3, E3, Z9, Z9mini, R4, DR3, V9, etc.

2. If the firmware of the miner is old, the miner configuration might get lost after firmware upgrading. In this case you need to reconfigure the miner.