

## User's Manual

**NAS-7202**

**2-Bay SATA NAS RAID Server**



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## Revision

User's Manual for PLANET 2-Bay SATA NAS RAID Server

Model: NAS-7202

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# Table of Contents

1. Introduction .....	4
1.1 Overview .....	4
1.2 Key Features .....	4
1.3 Package Contents .....	4
2. Front and Rear Panel .....	5
2.1 Hardware Installation .....	7
2.2 Connection and Removing Connection .....	9
3. Setup Wizard .....	10
3.1 Use the product on PC (Windows XP/Vista/Windows 7) .....	10
3.2 Use the product on MAC (above Mac 10.5.5) .....	16
4. Explorer .....	17
5. Downloads .....	18
5.1 Downloading .....	18
5.2 Complete .....	19
5.3 Trash .....	20
6. Settings .....	21
6.1 User .....	21
6.2 Folder .....	22
6.3 Disk .....	23
6.4 Network Setting .....	26
6.5 Network Services .....	33
6.6 Power .....	40
6.7 System .....	43
6.8 Wizard .....	46
7. Help .....	47
Appendix A: iTunes service .....	48
Appendix B: DLNA service .....	50
Appendix C: Access on PC .....	53
Appendix D: Functional Specifications .....	55

# 1. Introduction

Thank you for purchasing NAS-7202. It is a flexible, economical and powerful solution for your network storage application. The following instructions will help you to learn more about the connections, set-ups, and configurations of it.

## 1.1 Overview

This user's manual explains how to operate the NAS-7202 from a computer. Basically, the user's manual is written to be read on the computer display. However, users might consider printing it out to access easily and read it before you operate the NAS-7202. This manual shows how to set up the NAS-7202.

## 1.2 Key Features

Supports RAID 0, 1 and JBOD

Provides scalability up to 6TB (with 3TB per HDD)

Mobile Devices Remote Monitoring (NAS Viewer)

Easy access with PLANTE Dynamic DNS

Supports Windows / MAC utility and Web based management

Share music, pictures, movies and data over network

Supports BT download, DLNA, iTunes Media Server

The administrator can allocate the amount of available disk space to individual users

Aluminum enclosure with an internal cooling fan for continuous operation

2 standard USB 2.0 port for external USB HDD and print server sharing

Gigabit Ethernet for speedy performance with read speed up to 400Mbit/s

10/100/1000 Base-TX (Auto MDI / MDI-X) interface supports auto crossover detection

Supports most popular OS including Windows 7 / Vista / XP, Mac OS x v10.5 or above, Linux Kernel 2.6 and above

## 1.3 Package Contents

NAS-7202 x 1

Power Adapter x 1

RJ-45 Cable x 1

CD-ROM x 1

Quick Installation Guide x 1

HDD Screw x 8

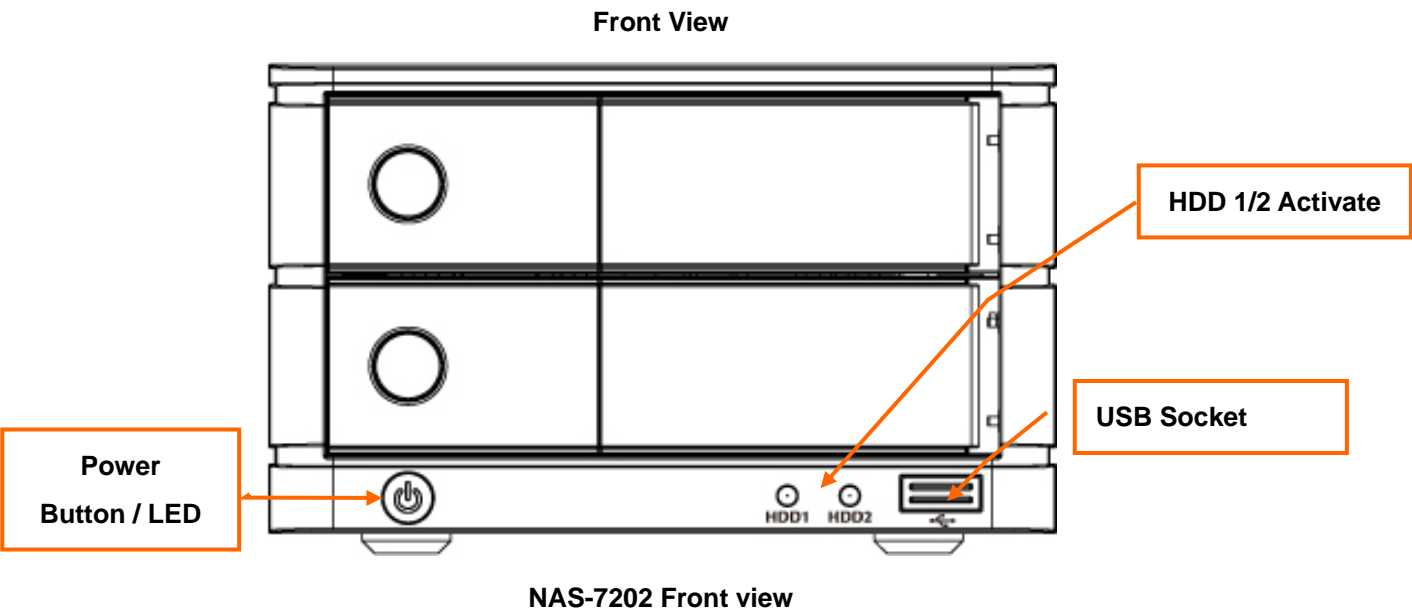


- 
1. If any of the above items are missing, please contact your dealer immediately.
  2. Using the power supply that is not the one included in unit packet will cause damage and void the warranty for this product.
-

# 2. Front and Rear Panel

## Physical Details

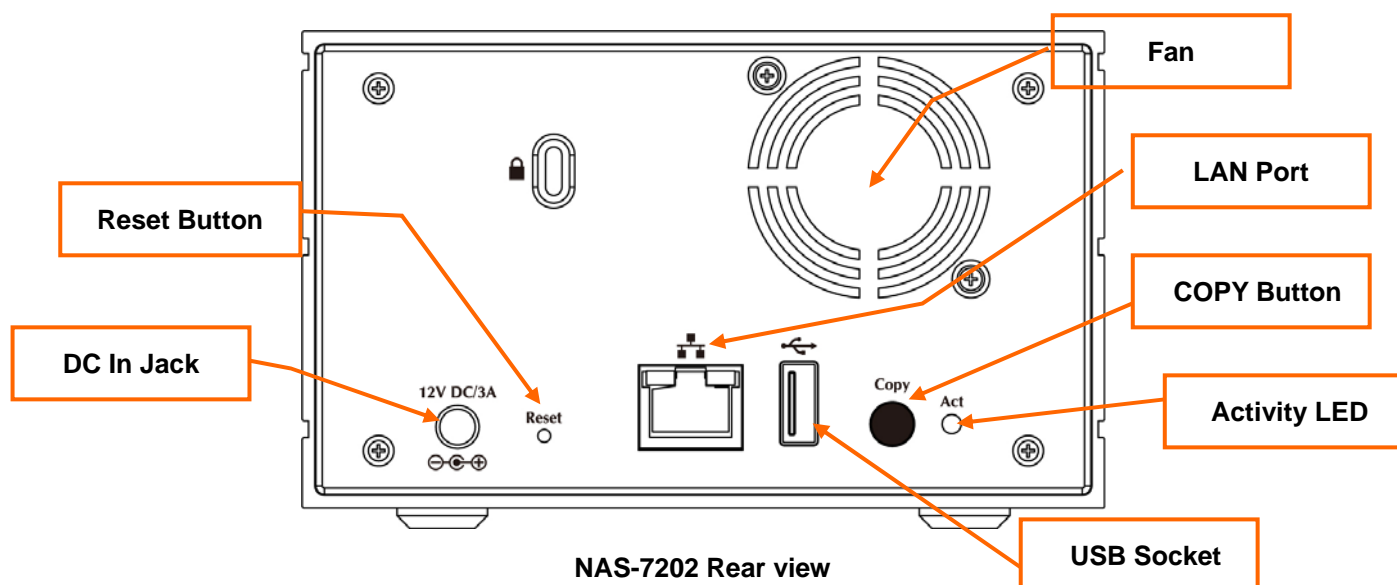
The following figure illustrates the front/rear panel of NAS-7202.



LED	Color	Description
Power	Blue	On: Power on. Off: Power off.
HDD	Green	Blinking: HDD is accessing. Off: HDD is no action.

Button	Description
Power	Press to start or shut down.

Connector	Description
USB	Connect your print server



LEDs	Color	Description
Act	Orange	Activity status of USB Storage

Connector	Description
DC Connector	Connect the bundled power adapter.
LAN	Supports 10/100/1000Base-T interface.
USB	Connect your USB flash disk for firmware upgrade.

Button	Description
Reset	Press to reset NVR to factory default.

## 2.1 Hardware Installation

**Step 1: Push the silver button to release the HDD tray.**



**Step 2: Pull out the HDD tray.**



**Step 3: Place the HDD on the tray and secure the HDD with the screws at the bottom (as illustrate).**



**Step 4: Push the tray back in the unit and press down the black bar to secure the tray.**



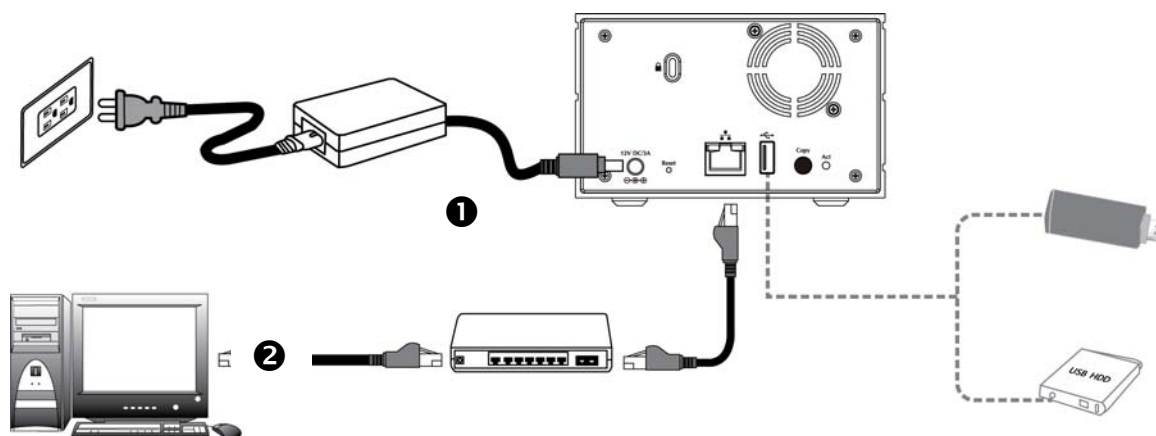
**Note**

---

Before slide in the HDD, please do make sure the HDD is in the correct direction. Slide in and push the HDD with violent could damage the SATA interface of the RAID Server.

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## 2.2 Connection and Removing Connection



Steps	Description
1	Connect NAS-7202 and a Switch, Hub, Router, or computer with RJ-45 Ethernet cable.
2	[optional] Connect USB storage device(s) to this device with USB cable(s). NAS-7202 can automatically mount the USB devices connected.
3	Connect the power supply to NAS-7202.
4	Press the “Power button” to turn on NAS-7202. The HDD activate LED on the front panel will light up during booting-up. NAS-7202 will be ready to use when the blue LED lights up steady.

## 3. Setup Wizard

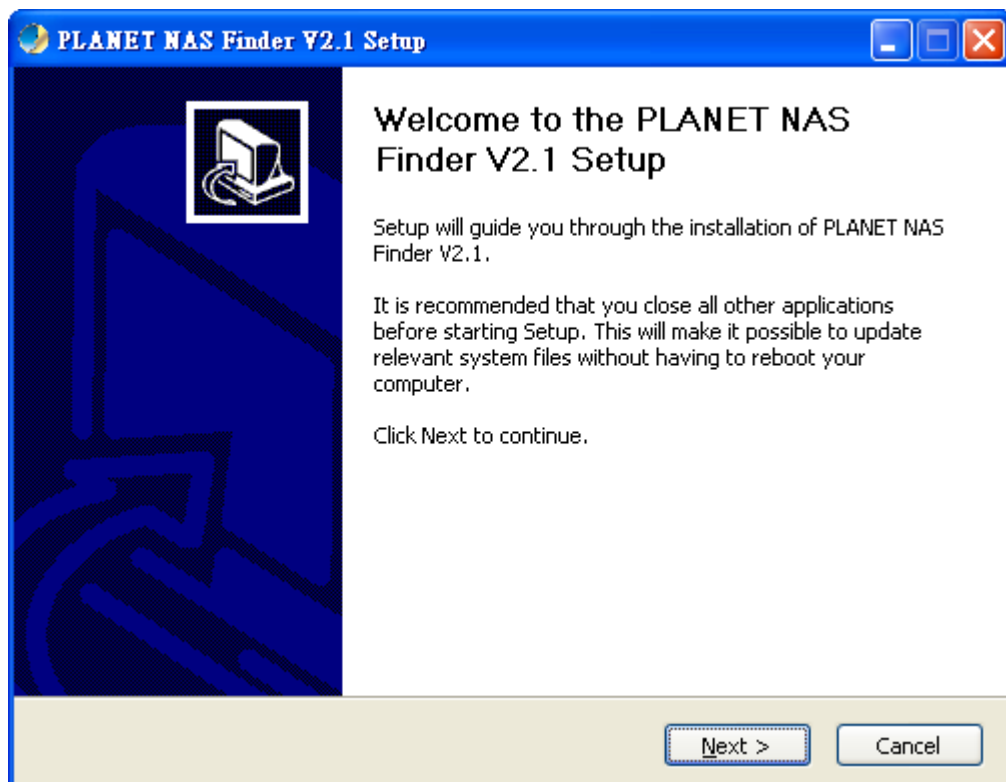
### 3.1 Use the product on PC (Windows XP/Vista/Windows 7)

#### 3.1.1 Client tool installation

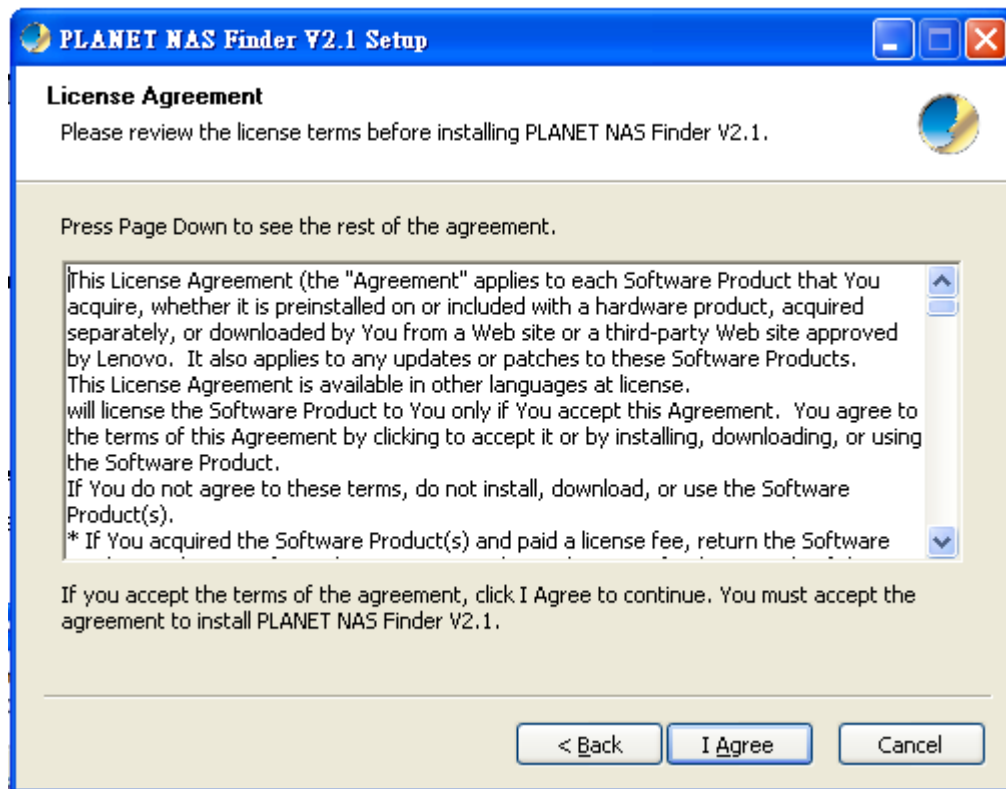
Once you insert the CD into your computer, open up the folder and double click “NAS Finder for Windows V2.1 Setup.exe” for installation. The Language setup window will pop up.



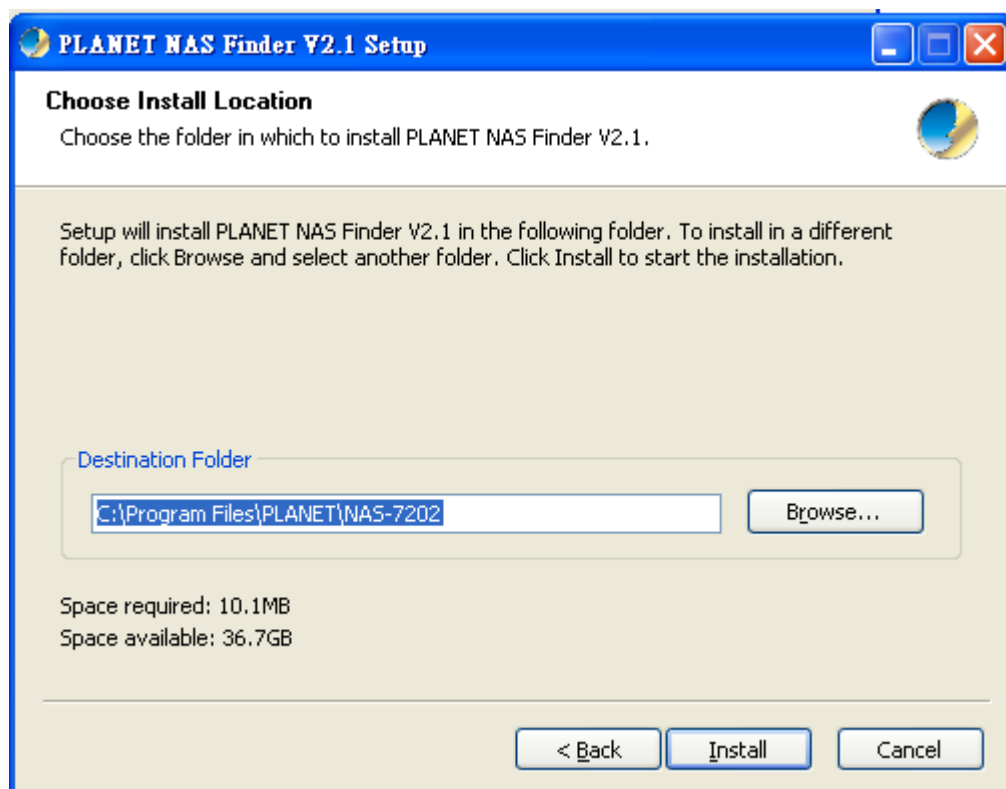
After a language is selected (If the operating system is English System, this step is not needed), click “OK”, and then the PLANET Tools Setup Wizard will pop-up.



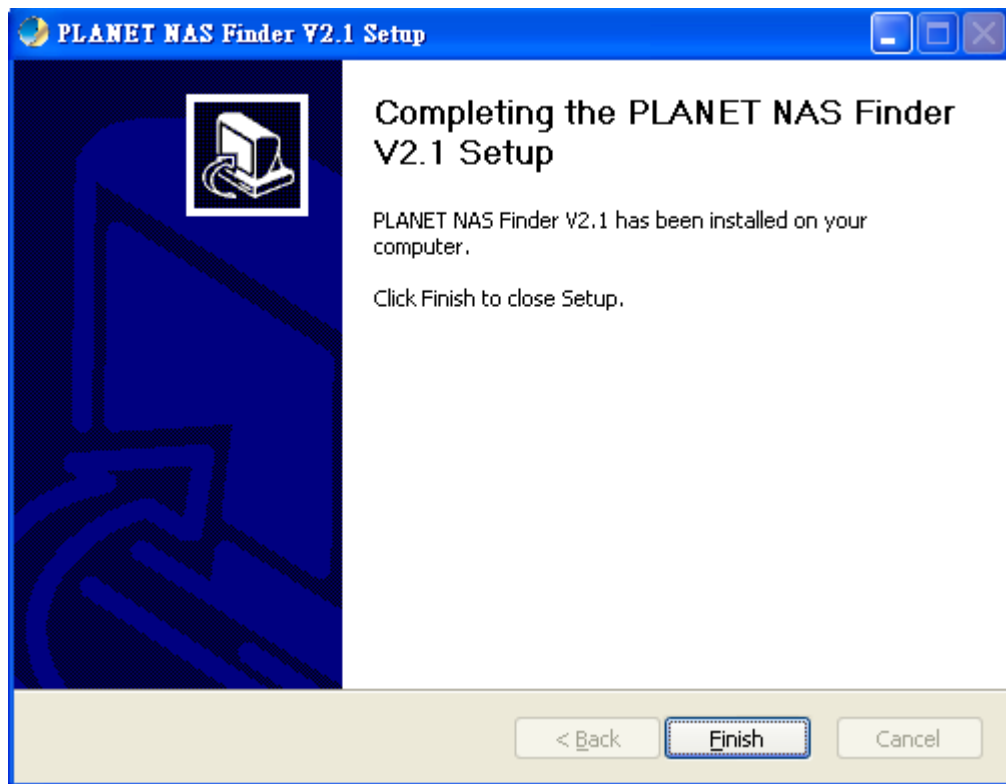
Click “Next” to continue, a License Agreement window will pop up. The software installation will continue only after the terms listed under License Agreement are accepted by clicking “I Agree”.



After clicking “I Agree”, enter installation path selection screen. Click “Browse” to choose a custom installation path or use the default setting to install.



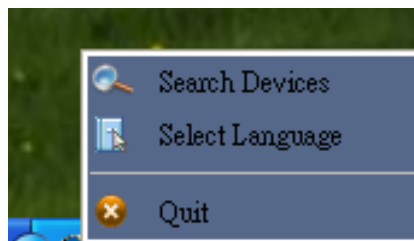
Click “Install” button for the installation of software and the installation progress will be shown at the bottom of interface of path. After the installation, a dialogue box of “running the program now or not” pops up and it is shown as follows.



Click “Finish” to complete the installation, the installation is completed. The PLANET Tools shortcut icon will appear on the desktop automatically and the Quick Launch Toolbar.



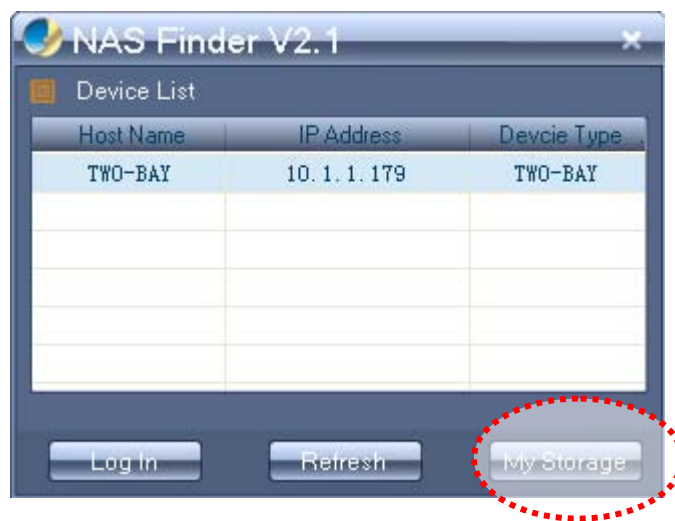
Right click tool icon at the toolbar, you can search devices located in your LAN and select language.



### 3.1.2 Use the client tool

#### 3.1.2.1 My Storage

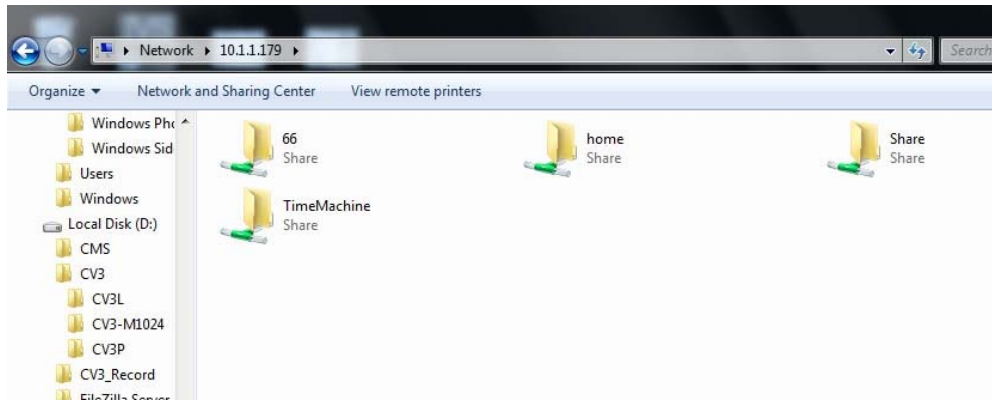
Open this tool and click “Storage” button to access my storage.



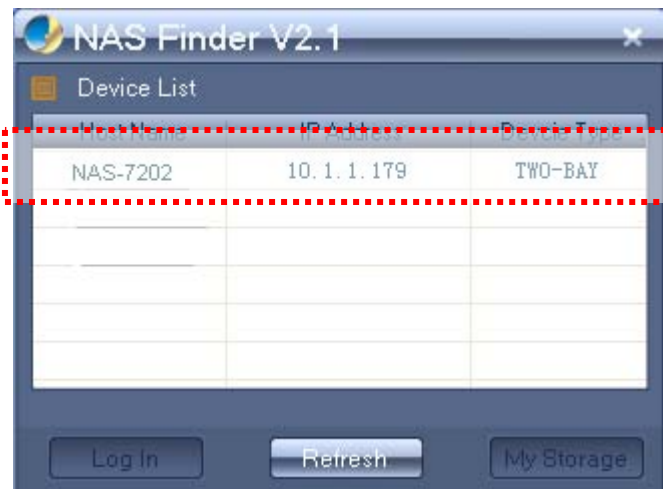
System will pop up a window as below. Enter user name and password and click “OK” to login. (The default User Name and Password are both “admin”).



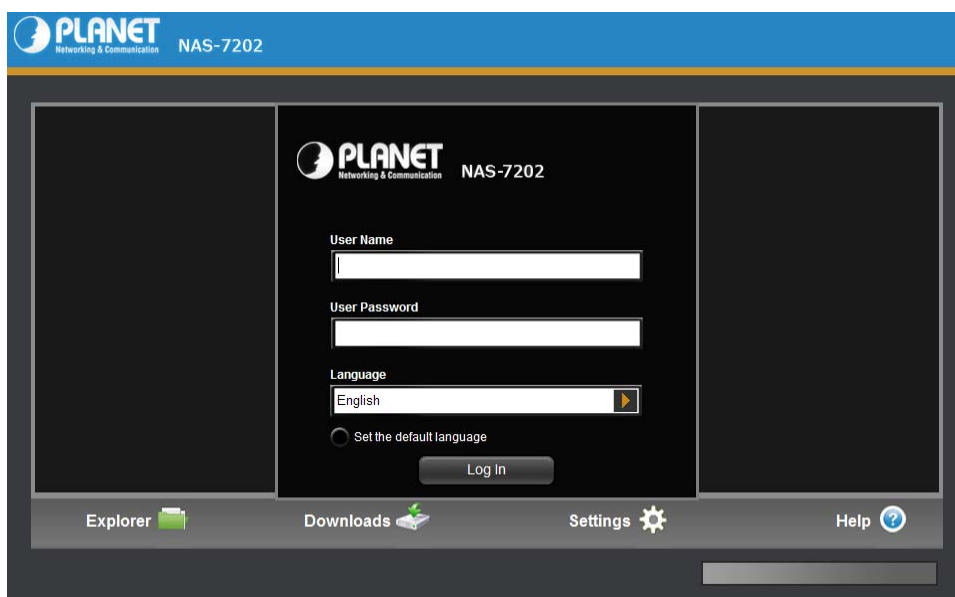
Finally you can discover these folders: home 、 Share 、 Time machine and others created by admin.



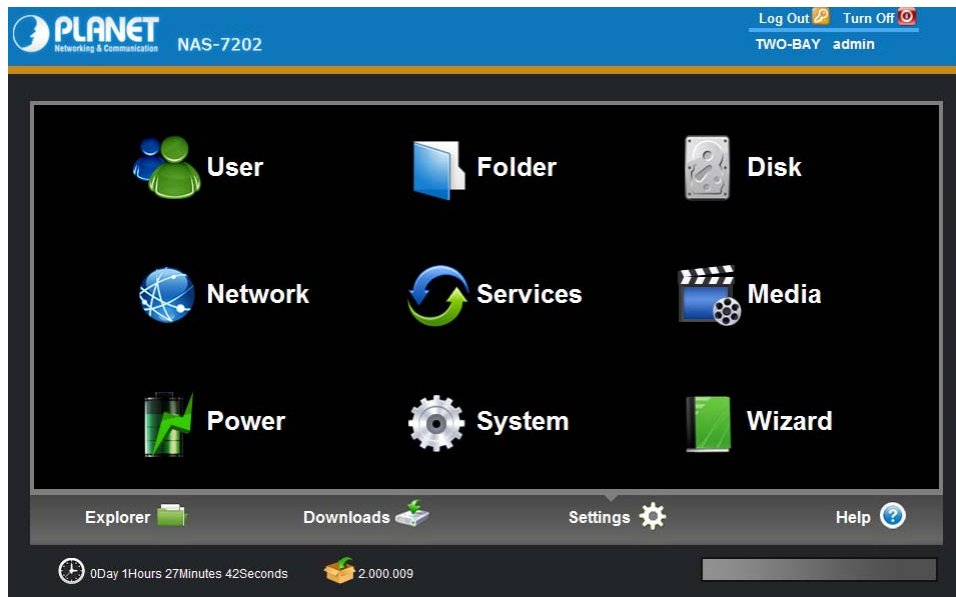
### 3.1.2.2 Web login



As shown in the picture above, please select your device, and click “Login” button. It will go to the Web management page on web browser.



Enter User Name and Password to login. Default User Name and Password are “**admin**”. (If you want to change User Name and the Password, once you login as admin, you can custom your User Name and Password by the pop up wizard).



**Note**

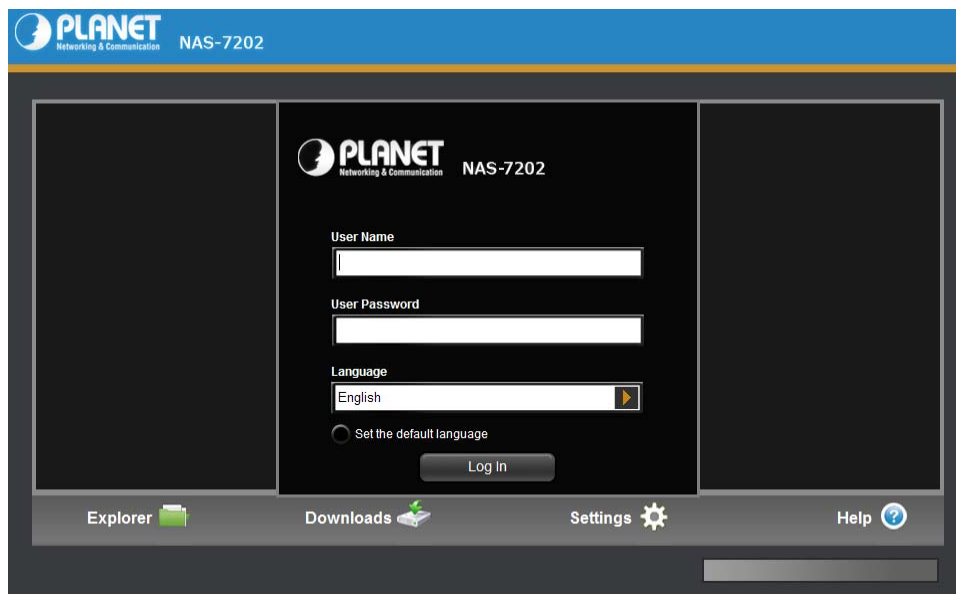
Also you can access web manually by typing IP address on web explorer, like <http://xx.xx.xx>. (Default is “**192.168.0.100**”).

## 3.2 Use the product on MAC (above Mac 10.5.5)

Use the MAC version client tool to search device, then press “log in” to access NAS by safari.

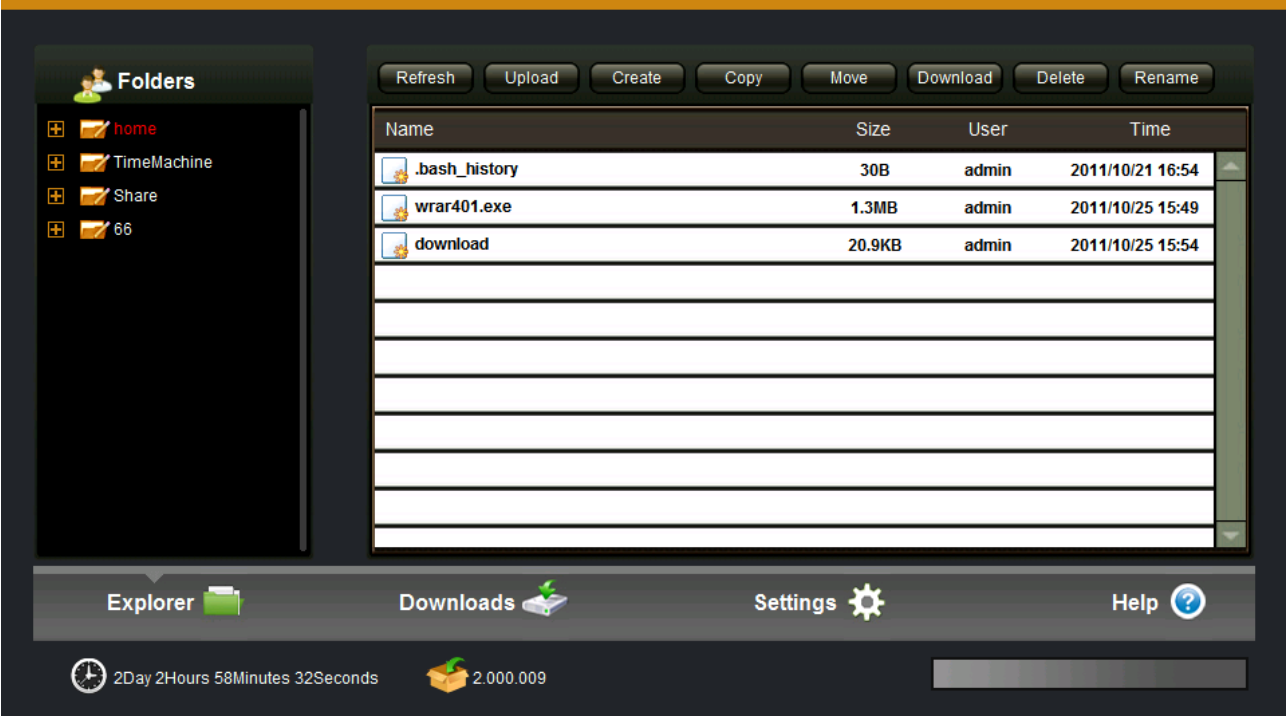


Or you can access NAS by way of opening Safari and type IP address as <http://xx.xx.xx>. (Default is “192.168.0.100”) and go.



# 4. Explorer

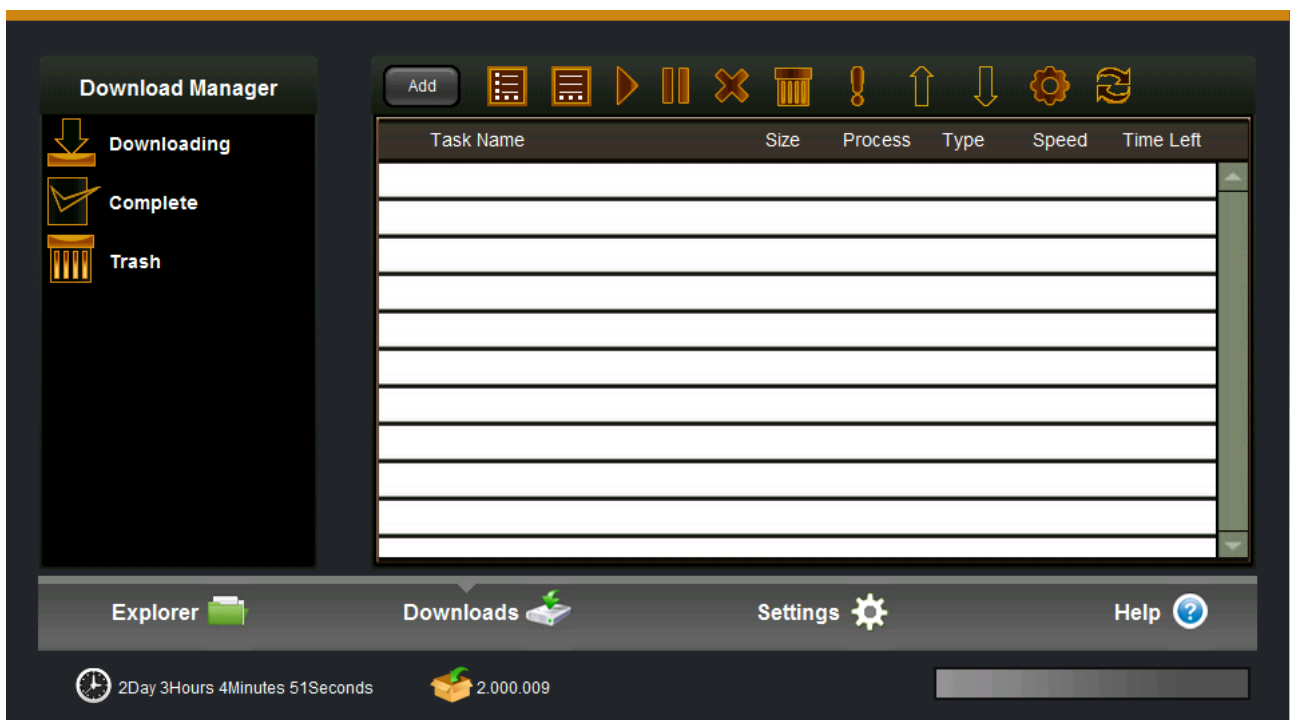
There is a NAS folder explorer through WebDAV , you can do download(upload) files from(to) between NAS and client computer. Also you can do copy/move/create operation on NAS.



## 5. Downloads

To add new BT download task, set the “BT seed” option first, find and select BT Seed File, then select an appropriate path for the download file to be save. Click “confirm” and the newly created download task is displayed on the downloading list.

### 5.1 Downloading



Item	Action
<b>Start</b>	Click “Start” to resume a Task, which has been paused
<b>Stop</b>	Click “Stop” to suspend the downloading task.
<b>Delete</b>	Click “Delete” to stop and delete the download task. The deleted task will be removed to Trash and it can be restored.
<b>Info</b>	Select one task, and press information icon to see the more detail information of this task.
<b>Settings</b>	You can set downloading task number, max download speed, max upload speed and so on.

## 5.2 Complete

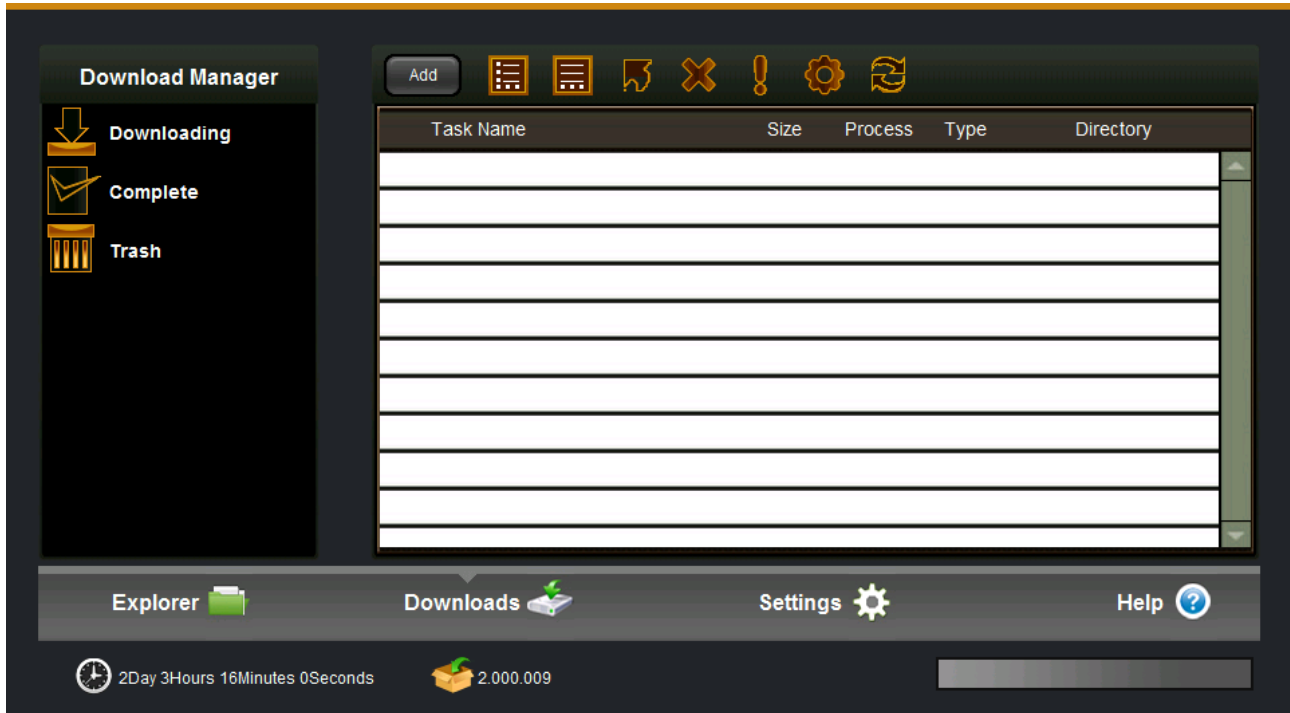
The completed tasks are displayed on the sidebar of the completed tasks list. Select a task and click “Delete” to delete the completed task. Only the download task will be deleted and the actual downloaded file will still remain in the saved directory.

The screenshot displays the 'Download Manager' application window. On the left sidebar, there are three sections: 'Downloading' (with a download icon), 'Complete' (with a checkmark icon), and 'Trash' (with a trash can icon). The 'Complete' section is currently selected. The main area shows a table of completed tasks. The table has columns for 'Task Name', 'Size', 'Process', 'Type', and 'Directory'. There are three rows of completed tasks, each with a checkmark in the first column. The tasks are: 'download' (20.9KB, 100%, Type: download icon, Directory: /homes/brandon), 'download' (20.9KB, 100%, Type: download icon, Directory: /homes/admin), and 'wrar401.exe' (1.3MB, 100%, Type: download icon, Directory: /homes/admin). Below the table, there is a navigation bar with 'Explorer' (folder icon), 'Downloads' (download icon), 'Settings' (gear icon), and 'Help' (question mark icon). At the bottom, there is a status bar showing a clock icon, the time '2Day 3Hours 12Minutes 17Seconds', a box icon, and the number '2,000.009'.

Task Name	Size	Process	Type	Directory
✓ download	20.9KB	100%	download	/homes/brandon
✓ download	20.9KB	100%	download	/homes/admin
✓ wrar401.exe	1.3MB	100%	download	/homes/admin

## 5.3 Trash

Trash has a function of retrieving a deleted task to continue downloading. Click “Trash” to select a deleted task that you want to continue downloading and then click “Reload”. The task will be restored to the download list



### Note

It will continue downloading from the last completed percentage when it was deleted.

## 6. Settings

### 6.1 User

Administrator can create/edit/remove general user accounts. The general user accounts are used to login services to confirm whether can accessed these services, including web management access, samba access, NFS access, ftp access, AFT/time machine service and so on.

**User**

admin

User Name: admin

Description: admin

Password:

Confirm Password:

Note: Password must be alphanumeric and at least 6 characters long. Password is case sensitive.

Save

Add User

Explorer Downloads Settings Help

2Day 2Hours 48Minutes 39Seconds 2,000,009

Item	Action
User Name	This is the user account name when you login in
Password	The password is case sensitive and should be 6 to 64 displayable characters, including letters, numbers.
Add user	Press “Add user” button, enter the user information and press “save” button to create one user account.

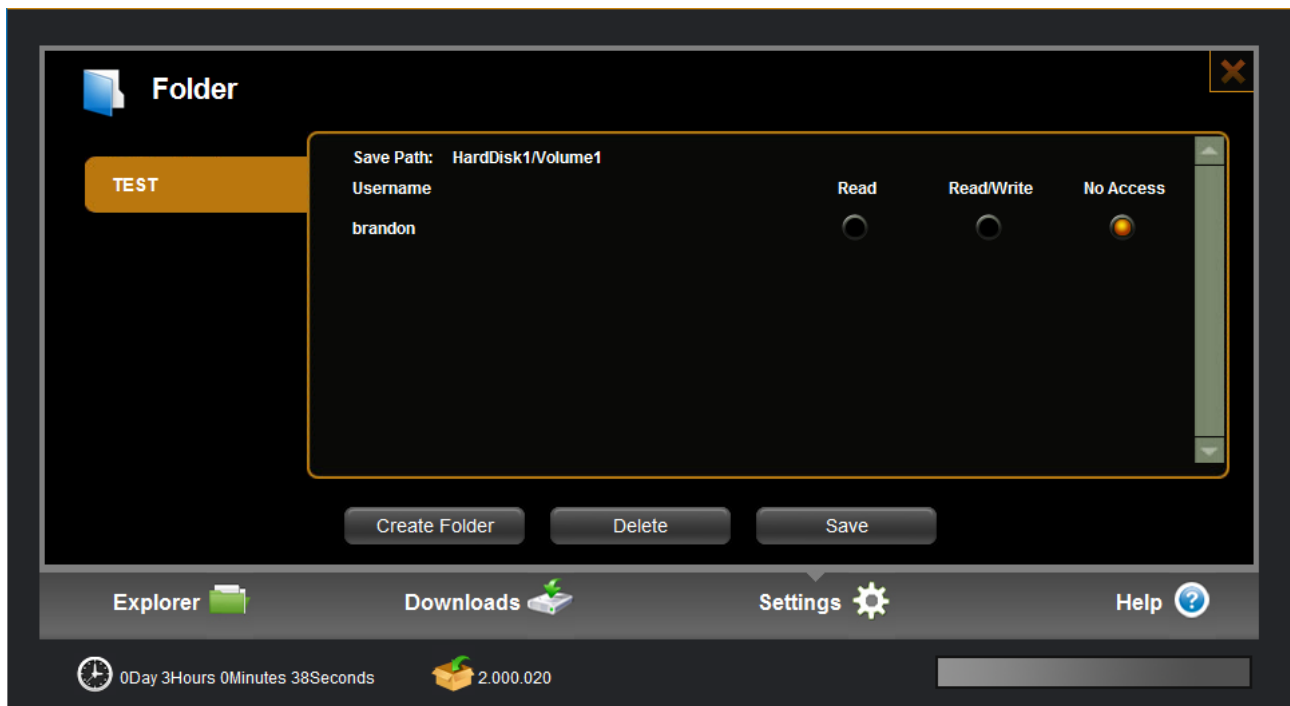


#### Note

Password must be alphanumeric and at least 6 characters long. Password is case sensitive.

## 6. 2 Folder

Administrator can create/remove and edit share folders, for each share folder, administrator can set access privilege separately for each user account.



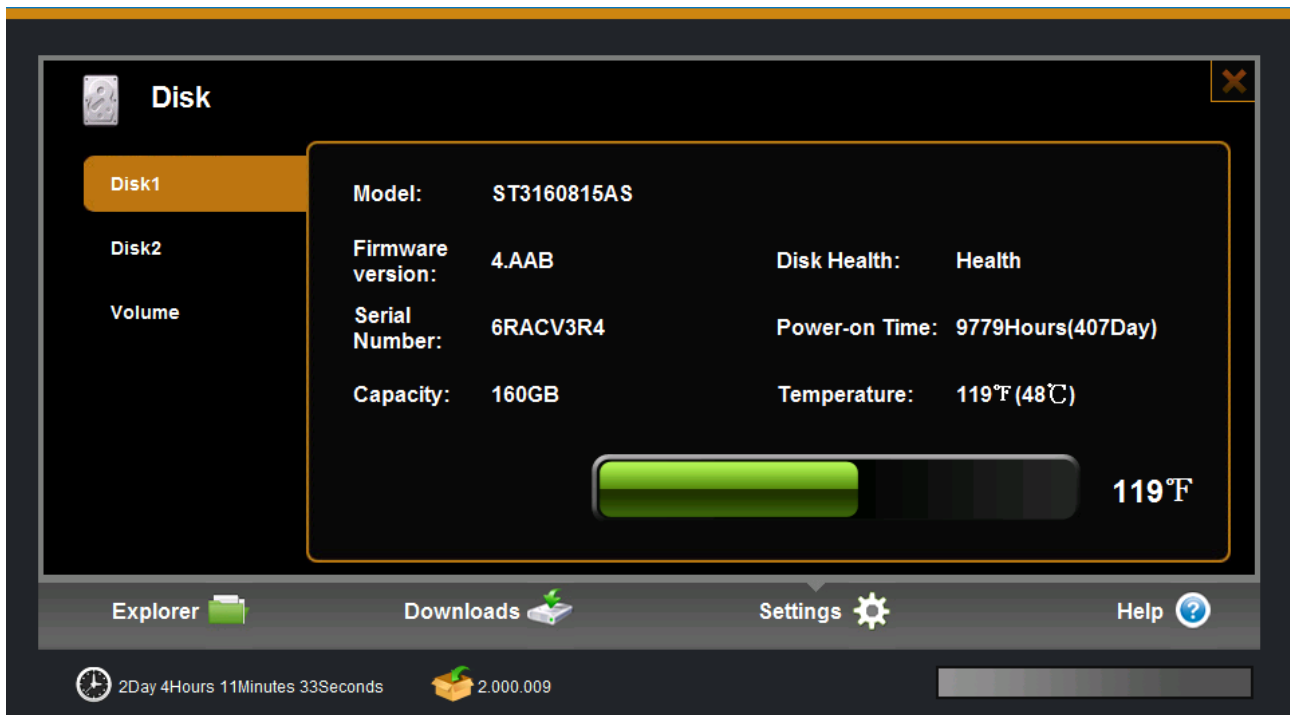
Select the target share folder at left list, at right window, set privilege which general users access to folder. Press “save” button to execute the change.

There are “**Read**”, “**Read/Write**” and “**No Access**” option for access privilege setting. The default setting is “no access”, that's mean this user cannot even see this folder.

The folder name only uses letters and numbers. The dash (-) or underscore (\_) may be used to separate two names. Maximum folder name is up to 26 characters.

The privilege setting works in all kinds of access modes, including ftp/samba/web/AFP and so on.

## 6.3 Disk



**1) Disk :** Here is the hard disk physical information. Administrator can check disk model, Power on time, disk health status, capacity and temperature.

That information comes from hard disk S.M.A.R.T message.

If the temperature is up to 55 degree C, the build in Fan will begin to work.

**2) External USB storage:** you can get the capacity information, and safely remove it.

**3) Volume:** There are volume settings; for example, create a new volume, and format current volume. Also it can check volume information such as, available free space and types of file system.

Only support XFS format file system

Format or create volume operation will cause lost data in the hard disk. In wizard setting, when you enter to create disk volume, there are four disk array mode to choose ,such as "Create single Disk Volume" , "Create RAID 0 Volume" ,"Create RAID 1 Volume "and "Create JBOD Volume".

### Note

Creating single disk volume, If you just put one disk, please places it on disk1 (disk1 that location on the disk box above)

## Hard Disk Initialization

Select Disk:

☒ Disk1 ☐ Disk2

Select Volume Type:

- ☐ **On/Off** Create Single Disk Volume
- ☒ **On/Off** Create Best Performance Volume (RAID 0/Stripe - Need two physical disks)
- ☐ **On/Off** Create Best Security Volume (RAID 1/Mirror - Need two physical disks)
- ☐ **On/Off** Create Linear Disk Volume (JBOD - Need two physical disks)

Save

Item	Action
Create Single Disk Volume	<p>If you don't want to create the disk array model, perhaps you can choose the mode. If install two hard disks, you should create two volumes, also system files stored the first volume and the two volumes without correlation.</p> <p><b>Note: This mode can also be one hard disk, and then you just need create one volume.</b></p>
Create RAID 0 Volume	<p>RAID 0, also known as Striping or Stripe, It represents the highest of all RAID levels of storage performance. Improve the performance of RAID 0 storage principle is the continuous data access across two disks, This data parallel operation on the bus can take advantage of the bandwidth, significantly improving the speed of disk storage.</p> <p>If one of disks has a smaller capacity, the total array size will be based on the smaller capacity multiplied by 2. For example, if a 120GB disk is striped together with a 100GB disk, the size of the array will be 200GB.</p> <p><b>Note: if one hard disk is unhealthy, all data is lost. And this mode is not conducive to data security storage.</b></p>
Create RAID 1 Volume	<p>RAID 1 also known as Mirror or Mirroring (mirroring), and its purpose is to ensure maximum data availability and user-repairable. RAID 1 mode is the user data written to disk one hundred percent automatically copied to another hard disk. Mirror, although not improve storage performance, but because of its high data security,</p>

making it particularly suitable for storing important data, such as server and database storage and other fields.

Total array size can only be as big as the smallest capacity disk. For example, if you connect a 120GB disk and a 100GB disk, the size of the array will only be 100GB.

**Note: In order to improve the stability of RAID and disk utilization, we suggest the best use of the two disks which are the same brand, same capacity, and same cache.**

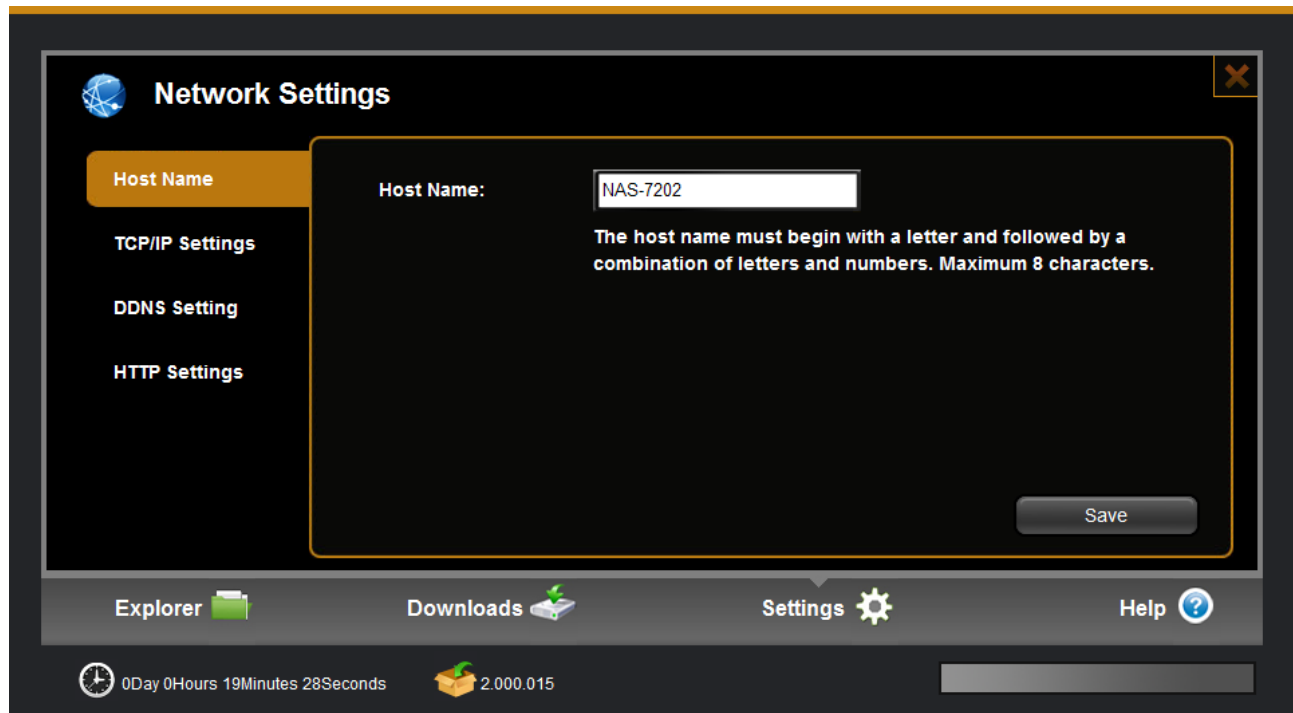
#### **JBOD**

JBOD (Just a Bunch Of Disks, JBOD) is installed on a floor with multiple disk drive storage devices. Usually referred to as Span. JBOD is logically combine several physical disks one by one in series together, thus providing a large logical disk. Data storage starts from the first hard disk when the first disk storage space is exhausted, and then began to turn from the back of the disk to store data. JBOD access to exactly the same performance on a single disk access operation. JBOD does not provide data security. It simply provides a method of using disk space, JBOD storage capacity equal to the composition of the sum of the capacity of all disks.

## 6.4 Network Setting

Network settings include hostname, TCP/IP setting, DDNS setting, HTTP setting.

### 6.4.1 Host Name



Item	Action
Hot Name	<p>Host name is used to identify this product in LAN. You can use the host name to login in samba (on windows series, type"<a href="#">\\hostname</a>" in file manager address bar), ftp (on windows series, type"ftp://hostname" in web explorer address bar), and web (on windows series, type"http://hostname" in web explorer address bar). Also you can use the host name to identify the NAS on our application tools on PC/MAC. And so on.</p> <p>The host name must begin with a letter and followed by a combination of letters and numbers. Maximum 8 characters.</p>

### 6.4.2 TCP/IP Settings

Network Settings

Host Name

TCP/IP Settings

DDNS Setting

HTTP Settings

Configure IPV4:

☒ Auto ☐ Manual

If your router supports DHCP function, please select "Auto". Otherwise, please select "Manual" to specify IP address.

IP Address:

10.1.1.179

Subnet Mask:

255.255.255.0

Router(Gateway):

10.1.1.254

DNS 0 Server:

10.1.1.2

DNS 1 Server:

10.1.1.3

Save

Explorer

Downloads

Settings

Help

0Day 0Hours 27Minutes 38Seconds

2,000.015

Item	Action
Auto	Auto: It is default option, if the LAN have DHCP server, the NAS will get these configurations from DHCP server, if not or cannot get configurations successfully, the system will set to default IP address: <b>192.168.0.100</b>
Manual	You can configure these settings manually; you can reference your computer configurations or get more help from internet.

## 6.4.3 DDNS Setting



**Network Settings**

Host Name

TCP/IP Settings

**DDNS Setting**

HTTP Settings

Enable DDNS to allow user to remotely access the device by a registered hostname.

Enable DDNS: ☐ on/off

Server Provider:

Hostname:

Username:

Password:

Confirm Password:

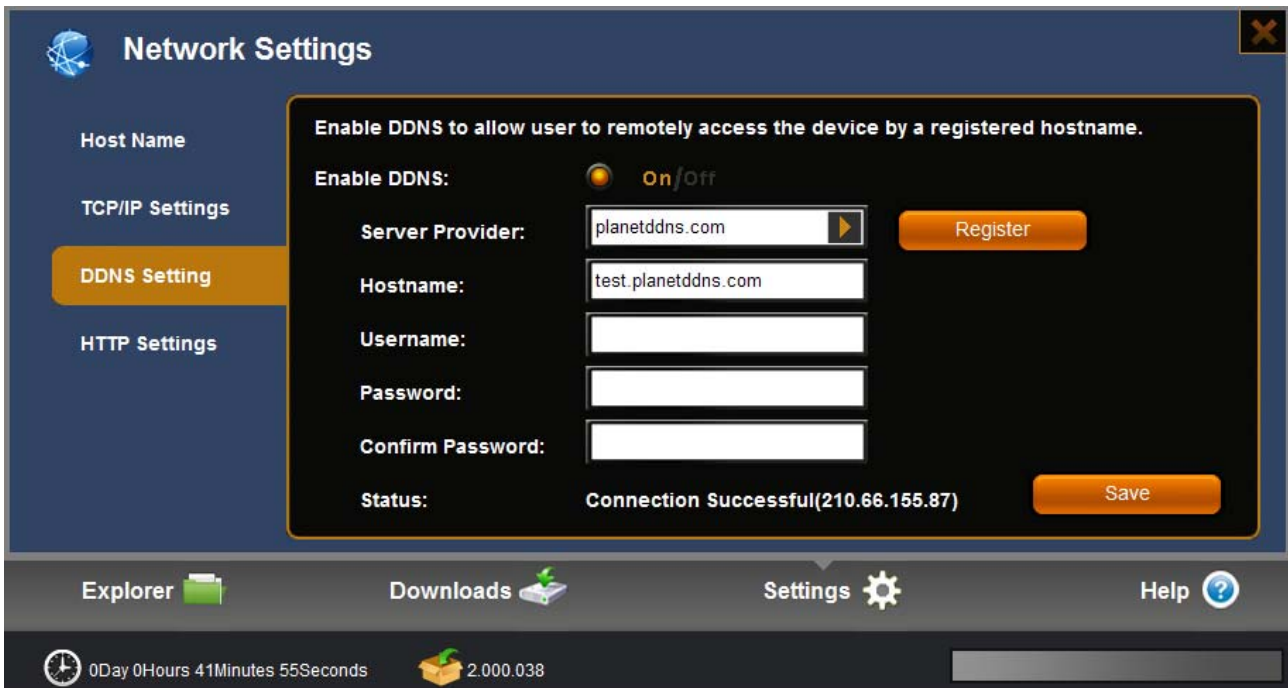
Status:

Save

Explorer Downloads Settings Help

0Day 0Hours 35Minutes 37Seconds 2,000.015

DDNS means Dynamic DNS; it is a method / protocol / network service that provides the capability for a networked device, to notify a [Domain Name System](#) (DNS) [name server](#) to change. In real time, the active DNS configuration of its configured hostnames, addresses or other information. So DDNS can let you access your NAS-on Internet at anywhere.



**Network Settings**

Host Name

TCP/IP Settings

**DDNS Setting**

HTTP Settings

Enable DDNS to allow user to remotely access the device by a registered hostname.

Enable DDNS: ☒ On/off

Server Provider:  Register

Hostname:

Username:

Password:

Confirm Password:

Status: Connection Successful(210.66.155.87) Save

Explorer Downloads Settings Help

0Day 0Hours 41Minutes 55Seconds 2,000.038

You can apply a username/password at [www.planetddns.com](http://www.planetddns.com) and choose "planet" to log in.

Configure DDNS steps:

**Step 1:** Enable DDNS option through accessing web page of NAS

**Step 2.** Select on DDNS server provide, and register an account if you do not use yet.

Let's take dyndns.org as an example. Register an account in <http://planetddns.com>

The screenshot shows the PLANET DDNS website. At the top, there's a dark header with the PLANET logo and 'Networking & Communication' tagline. Below the header, the main content area features a 'Sign in' form with fields for 'ID / Email' and a password, a 'Sign in' button, and links for 'Forgotten Password / Create A New Account'. To the right of the sign-in form is a large image of a modern living room with a sofa and a coffee table. Below the sign-in form, there are three product showcases: 1. XRT-401F Internet Broadband Router, 2. ICA-HM132 2 Mega-Pixel 20M IR Vari-Focal Dome IP Camera, and 3. ICA-HM316 2 Mega-Pixel 11m Outdoor IR IP Camera. Each product has a 'More Info' button. At the bottom, there's a dark grey section with two main areas: 'Access anytime & anywhere' which explains the benefit of DDNS, and 'Support & Download' which provides links to drivers, firmware updates, and documentation. A 'Go!' button is also present. The footer contains links for 'About DDNS | Term of Usage' and copyright information for PLANET Technology Corp. ©2012.

**PLANET DDNS**

PLANET Website FAQ Support

**Sign in**

ID / Email

Sign in

Forgotten Password / Create A New Account

**XRT-401F**  
Internet Broadband Router  
More Info

**ICA-HM132**  
2 Mega-Pixel 20M IR Vari-Focal Dome IP Camera  
More Info

**ICA-HM316**  
2 Mega-Pixel 11m Outdoor IR IP Camera  
More Info

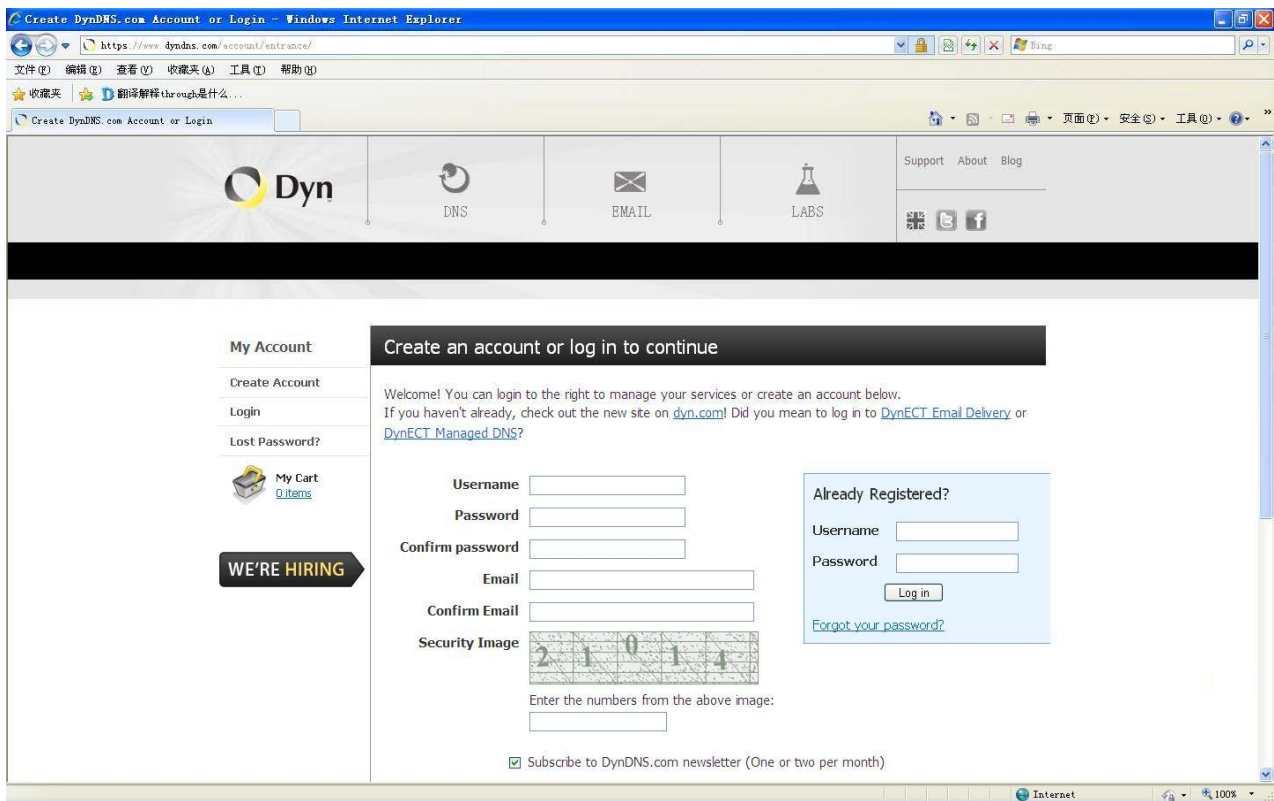
**Access anytime & anywhere**  
Sign-in PLANET DDNS to register a simple domain name to access home device anytime and anywhere.

**Support & Download**  
You can find drivers, firmware updates, other software and documentation for your PLANET products

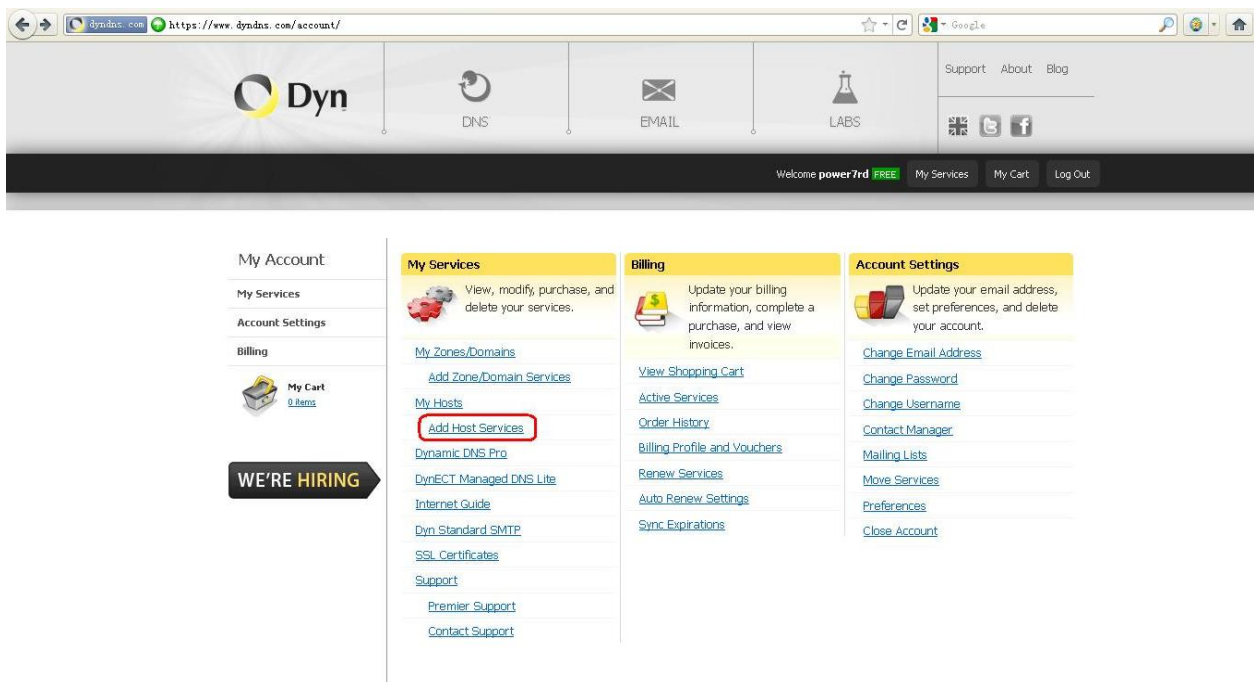
**Go!**

[About DDNS | Term of Usage](#)  
PLANET Technology Corp. Copyright ©2012 All Rights Reserved.

or <https://www.dyndns.com/account/entrance> free of charge, shown as follows:



An account and password are acquired once the registration succeeds, and then apply for a DDNS domain name. Enter “my account”, click “add host services” to enter the application window of domain name.



Fill hostname/IP address, (hostname will be as domain name go to access NAS, fill IP address by Address list box below showing). If your PC and NAS are in the same LAN, type http://domain name (planetrd.dyndns.org) to access NAS in the WAN (filling domain name and IP are corresponding)

Dynect SMB  
**MailHop Outbound**  
SSL Certificates  
Renew Services  
Auto Renew Settings  
Sync Expirations  
**Account Settings**  
Billing  
**My Cart**  
[0 items](#)  
  
Powered by Dyn

TTL value is 60 seconds. [Edit TTL.](#)

**Mail Routing:** ☐ Yes, let me configure Email routing. [\[?\]](#)

**What do you want to use this host for?**  
Select services and devices you would like to use with this hostname.  
  
Work From Home Office or VPN:  

vpn

remote file access

remote desktop

mail server

web server

chat server

ftp backup

ssh

database

voip

  
Hosting and Design For Web Sites and Blogs:  

blog

gallery

wiki

portfolio

ecommerce

web page

  
Remote Access For Devices:  

dvr

webcam

data storage

cctv

printer

alarm and security

thermostat

weather station

game server

home automation

Meanwhile, select the purpose of application;

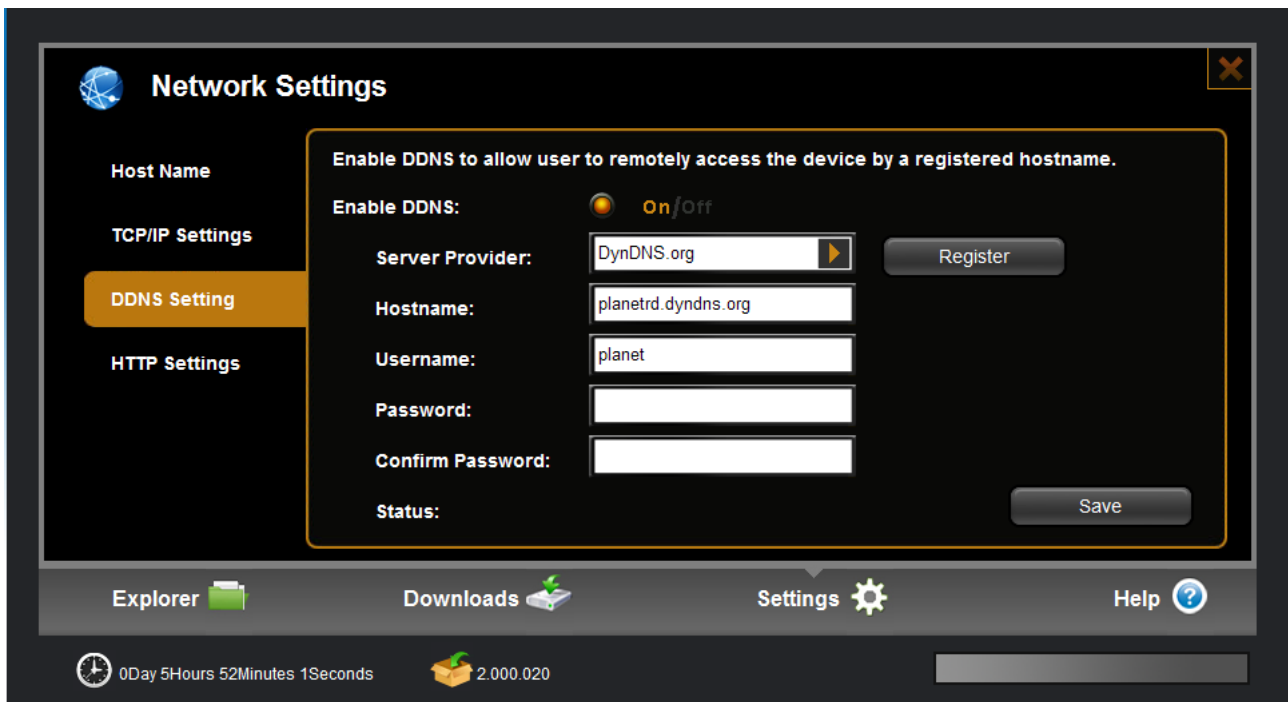
Your domain name can be seen in Host Service of DynDNS website once the application succeeds, shown as follows:

The screenshot shows the DynDNS website interface. The top navigation bar includes links for DynDNS, DNS, EMAIL, and LABS. The main content area is titled "Host Services" and contains a table with the following data:

Hostname	Service	Details	Last Updated
planetrd.dyndns.org	Host	113.92.134.204	Aug. 05, 2011 4:15 AM

Below the table, there is a link to "Host Update Logs" and a button to "Add New Host". The left sidebar contains a "My Account" section with links to My Services, Dynamic DNS Pro, Internet Guide, Premier Support, Domain names, DNS hosting, Dyn Email services, Dynamic DNS Hosts, DyNECT Managed DNS Lite, Dyn Standard SMTP, SSL Certificates, Renew Services, Auto Renew Settings, Sync Expirations, Account Settings, and Billing. The bottom of the page shows the DynDNS logo and a "My Cart" link.

**Step 3:** Enter the hostname/username/password as just got from server provider. And press “confirm” to execute the setting, also you should add NAS IP address to router DMZ zone, see router manual for more reference. Follow:

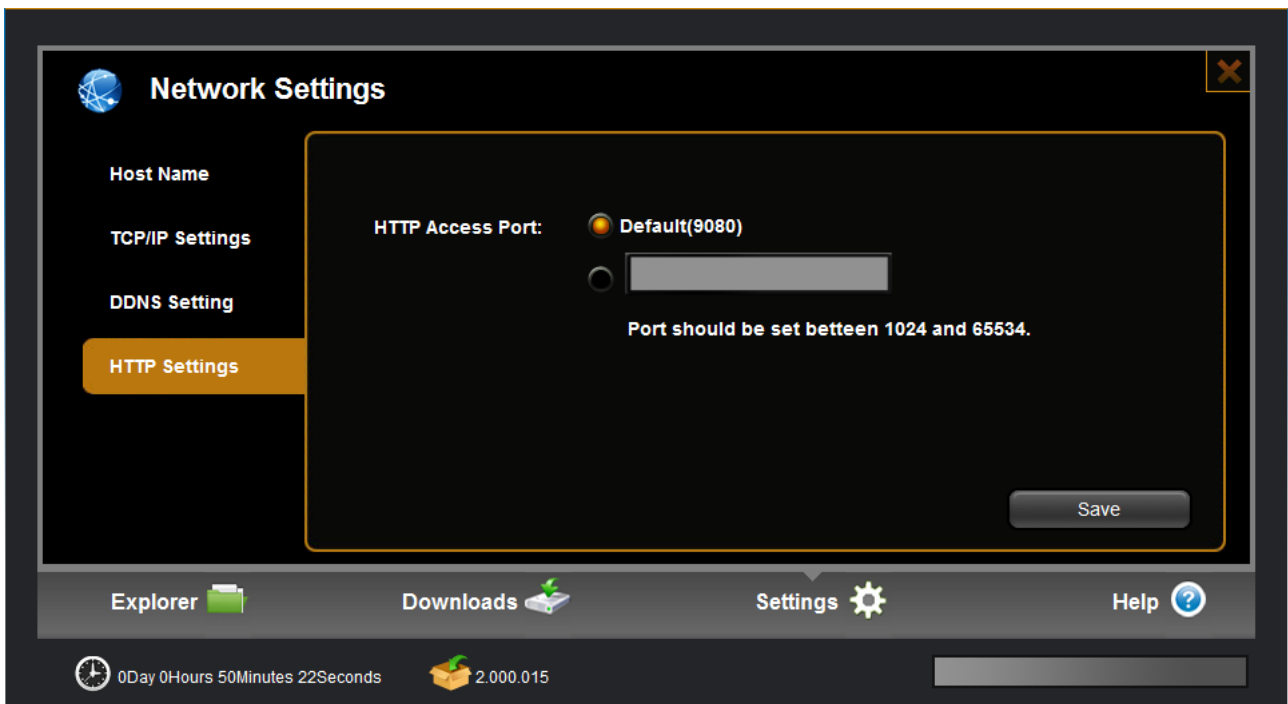


The screenshot shows the 'Network Settings' window with the 'DDNS Setting' tab selected. The window has a sidebar with 'Host Name', 'TCP/IP Settings', 'DDNS Setting', and 'HTTP Settings'. The main area contains the following fields and controls:

- Enable DDNS:** A radio button is selected for 'On', with an 'Off' option also visible.
- Server Provider:** A dropdown menu is set to 'DynDNS.org', with a 'Register' button next to it.
- Hostname:** A text field containing 'planetrd.dyndns.org'.
- Username:** A text field containing 'planet'.
- Password:** An empty text field.
- Confirm Password:** An empty text field.
- Status:** A label with no associated field.
- Save:** A button at the bottom right of the settings area.

The bottom status bar shows '0Day 5Hours 52Minutes 1Seconds' and a download icon with '2,000.020'.

## 6.4.4 HTTP Settings



The screenshot shows the 'Network Settings' window with the 'HTTP Settings' tab selected. The window has the same sidebar as the previous screenshot. The main area contains the following fields and controls:

- HTTP Access Port:** A radio button is selected for 'Default(9080)', with an empty text field next to it.
- Port should be set between 1024 and 65534.** A note below the port selection.
- Save:** A button at the bottom right of the settings area.

The bottom status bar shows '0Day 0Hours 50Minutes 22Seconds' and a download icon with '2,000.015'.

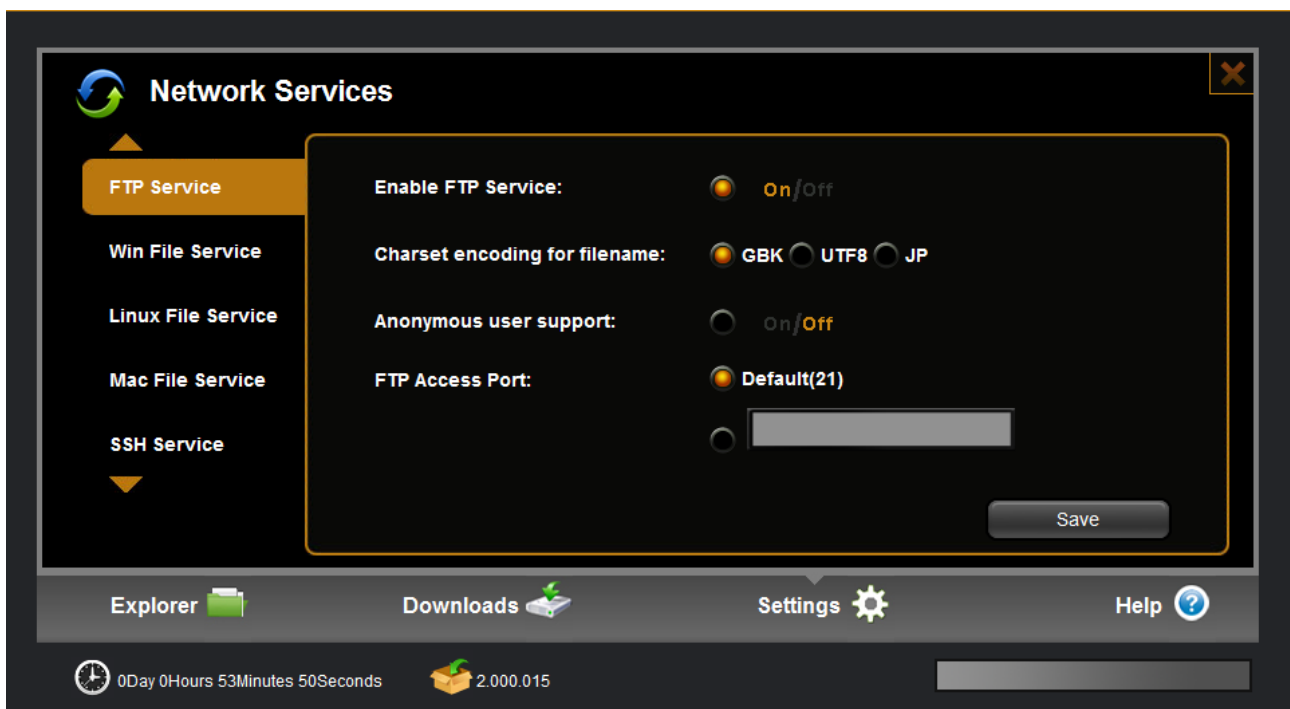
Item	Action
------	--------

**HTTP Access Port** HTTP setting is used to set web access port, the default port is 9080, you can modify as need. Also we support standard default port 80 additional at same time. This port is very important for DDNS.

## 6.5 Network Services

Two Methods to access NAS by FTP are described below. Please make FTP service enable in the web management.

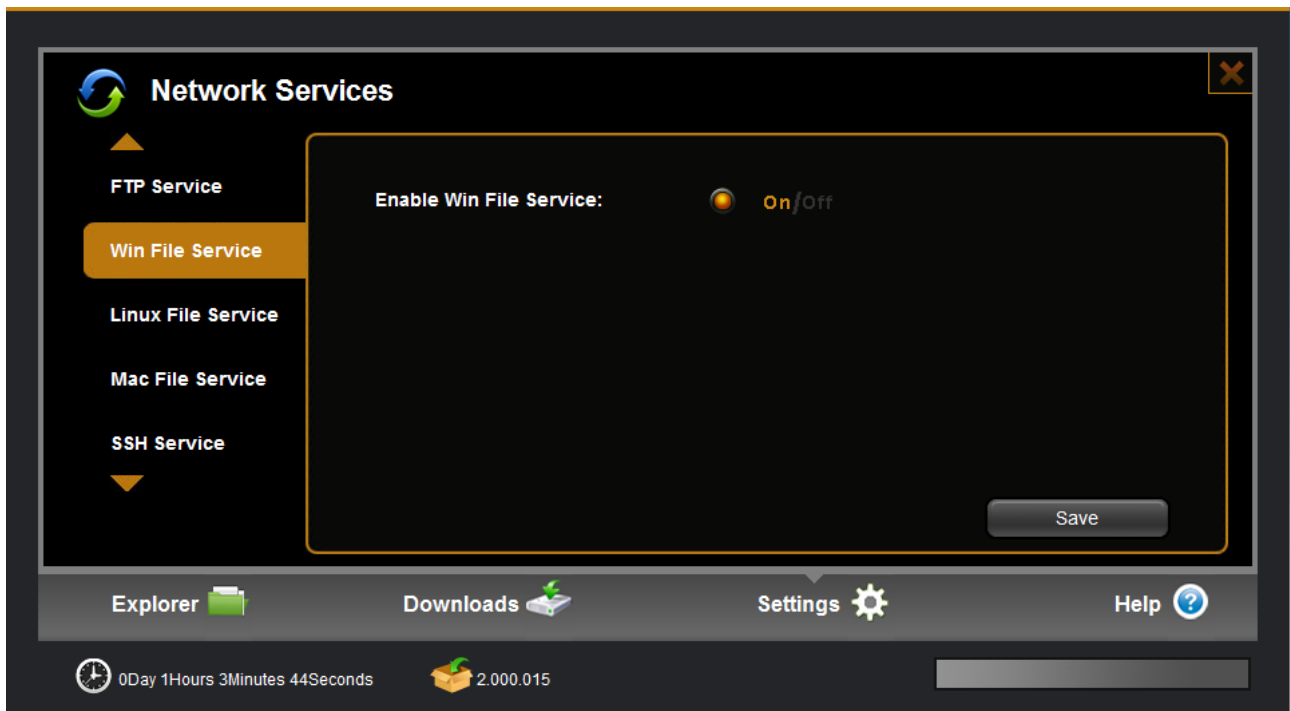
### 6.5.1 FTP Service



- 1) User can access NAS data through FTP service in LAN or WAN(based on DDNS).
- 2) Support Unicode filename: select the right option based on your language you used.
- 3) Anonymous enable: enable this option to let anonymous user access your data, anonymous user only can see "share" folder.
- 4) FTP access port: the default access port is standard 21, you can change the option if needed.

## 6.5.2 Win File Service

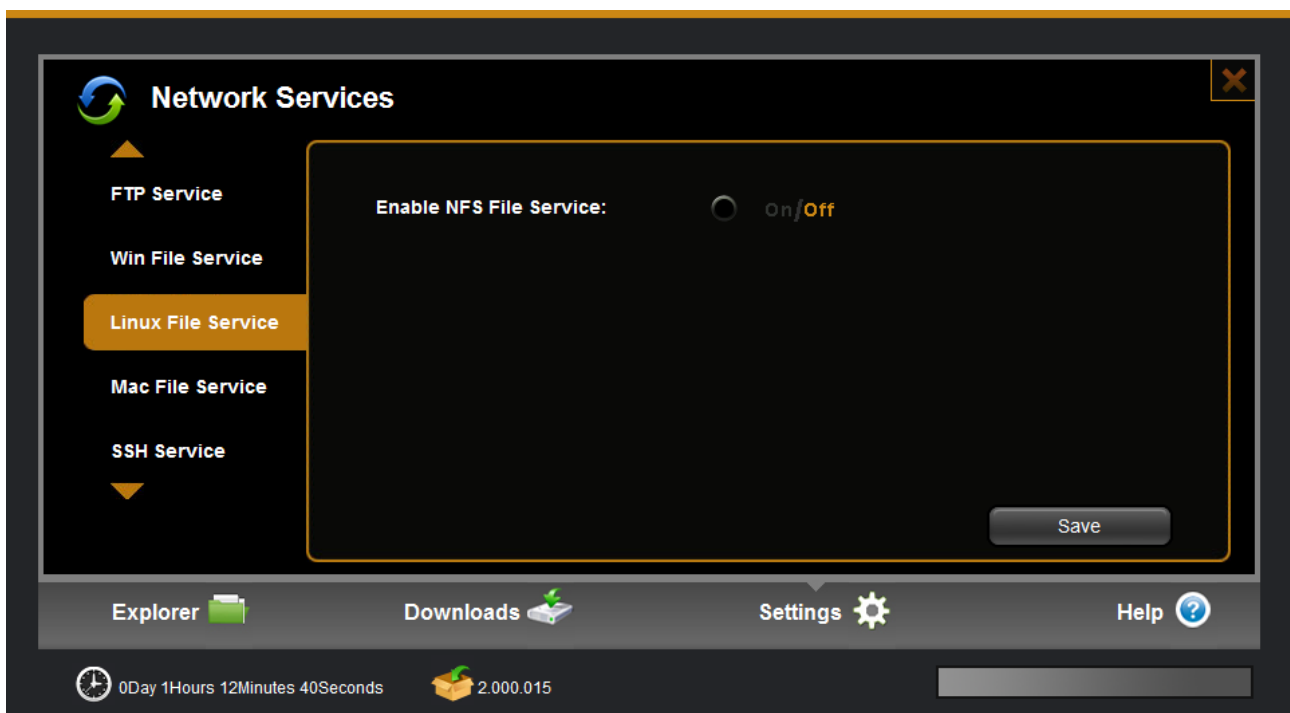
Win file service make it possible that you can share files with others in local area network. First enable this function before use.



## 6.5.3 Linux File Service

It is used on Linux OS to access NAS through NFS.

Allow write IP address: Access IP is used to specify a range of IP address in your local network for computers that can access and do write operation on NFS share directory.



## How to use NFS:

1. Enable the NFS server function in “service→Linux file service “on web.

2. On Linux OS, open terminal and change into root account as below

```
[steve@localhost ~]$ su
```

password :

3 .In Terminal, show the NAS server’s directory as below commands:

```
[root@localhost steve]#showmount -e xxx.xxx.xxx (NAS’s IP address)
```

Export list for xxxx.xxx.xxx.xxx:/data/HardDisk1/Volume1 \*

4. In Terminal, restart the NFS server as below command:

```
[root@localhost steve]# service nfs restart
```

```
Shutting down NFS mountd: [ OK ]
```

```
Shutting down NFS daemon: [ OK ]
```

```
Shutting down NFS quotas: [ OK ]
```

```
Shutting down NFS services: [FAILED]
```

WARNING: Deprecated config file /etc/modprobe.conf, all config files belong into /etc/modprobe.d/.

```
Starting NFS services: [ OK ]
```

```
Starting NFS quotas: [ OK ]
```

```
Starting NFS daemon: [ OK ]
```

```
Starting NFS mountd: [ OK ]
```

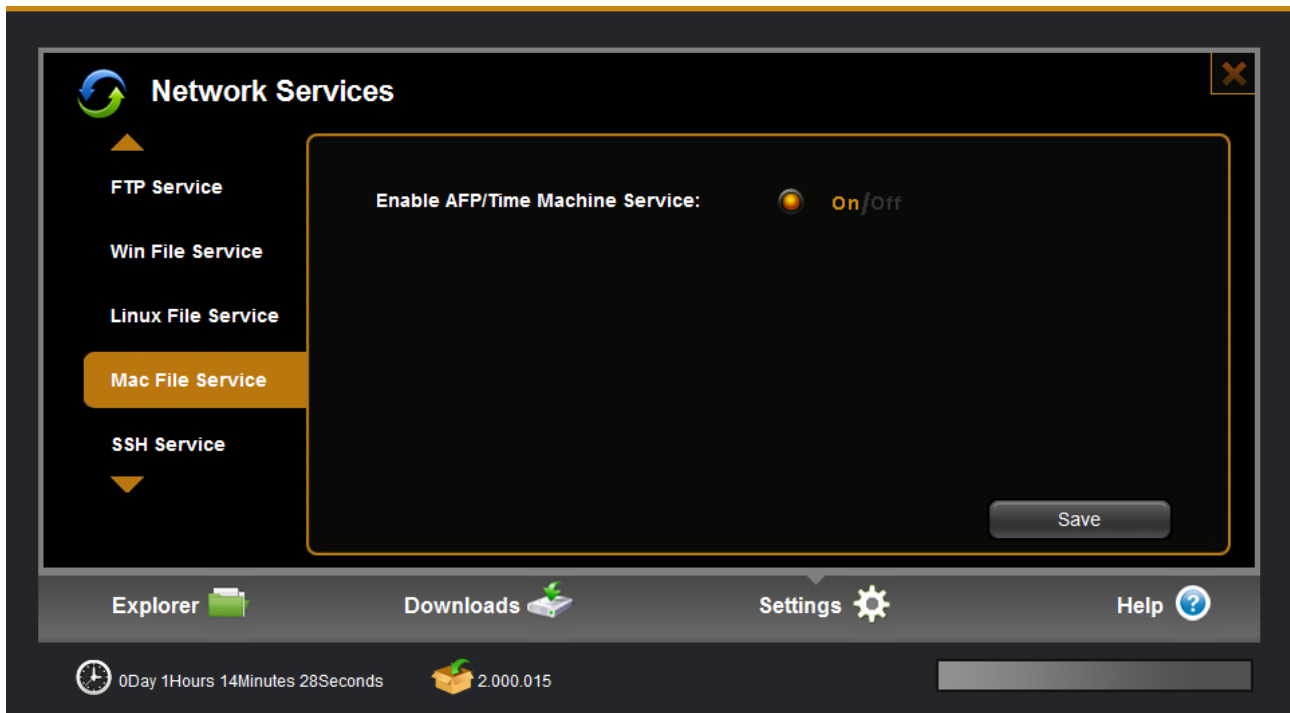
5. In Terminal, mount the NAS directory to Linux OS as below command:

```
[root@localhost steve]# mount -t nfs 192.168.7.186:/data/HardDisk1/Volume1/Share /mnt -o nolock
```

At last you can check that the NAS directories have been displayed in filesystem-(mnt on your Linux computer, and you can do operation as it is in local.

## 6.5.4 MAC File Service

This function is used to work with Mac computer and compatible with Time Machine backup function, for more information about Time Machine. If you need help, please refer to MacOS help or go on their website for more information.

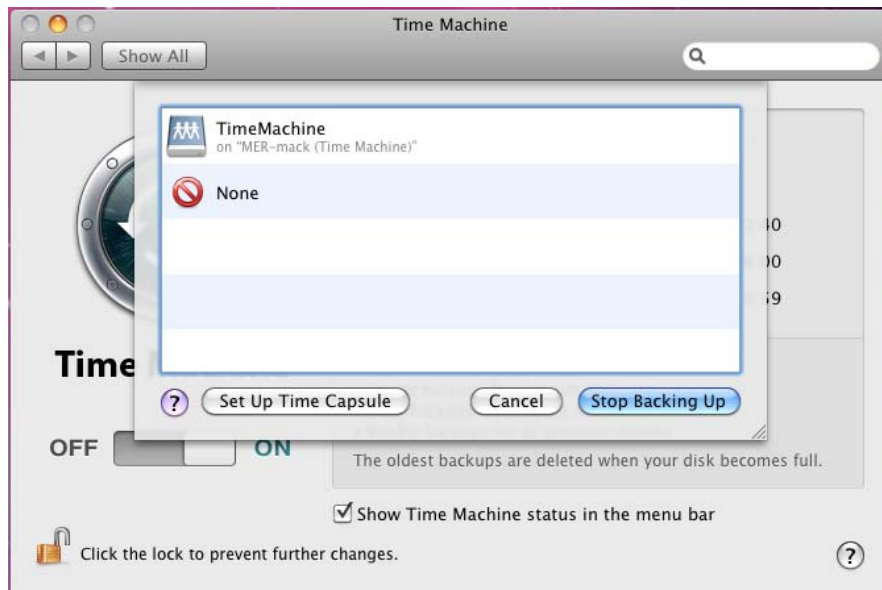


How to use this function :

Enable this function in server--- > Mac file service on web

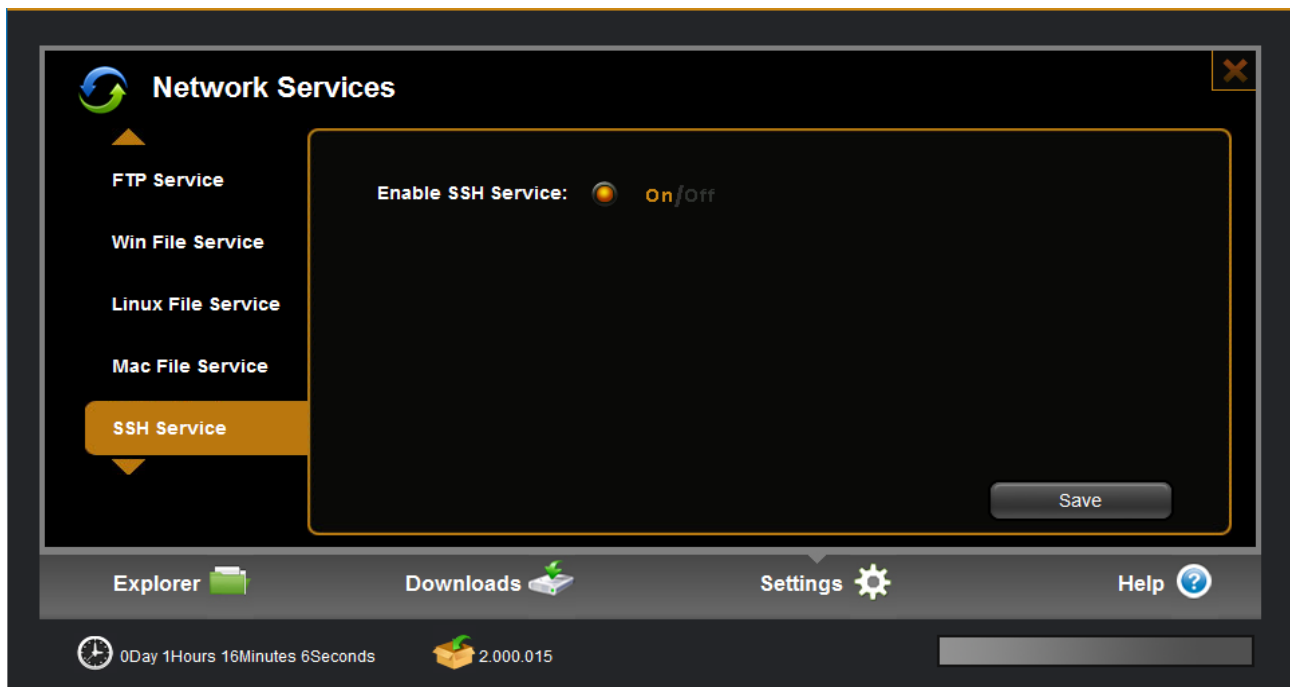
On MAC computer, go to system preference->Time Machine, turn on the function and in "select disk" option, select the NAS folder as the target, you need type the NAS account and password. Now it work and then your backup data will be stored into NAS at Time Machine folder.



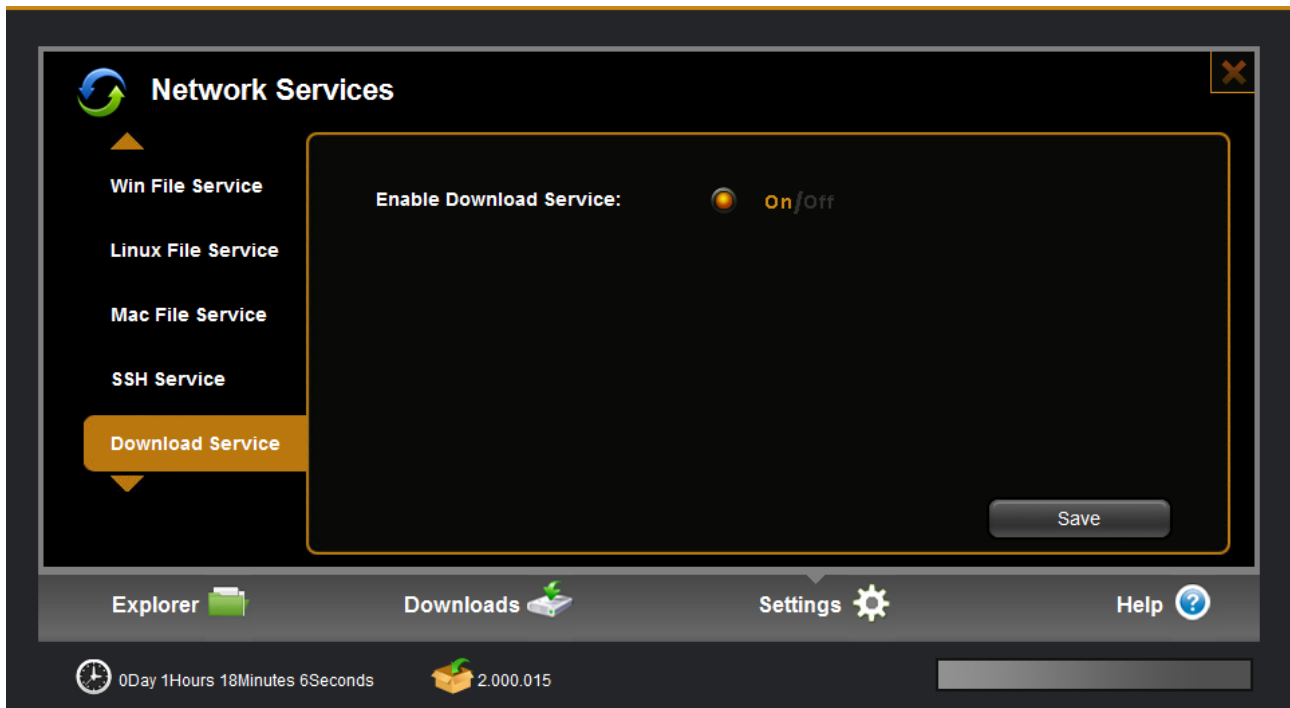


### 6.5.5 SSH Service

SSH allowed you to remote login to the NAS Linux OS and do some operation, you can use “putty” or other tool to connect. You can use admin or general account to login, or you can use “root “account (password: 20080826) to login.



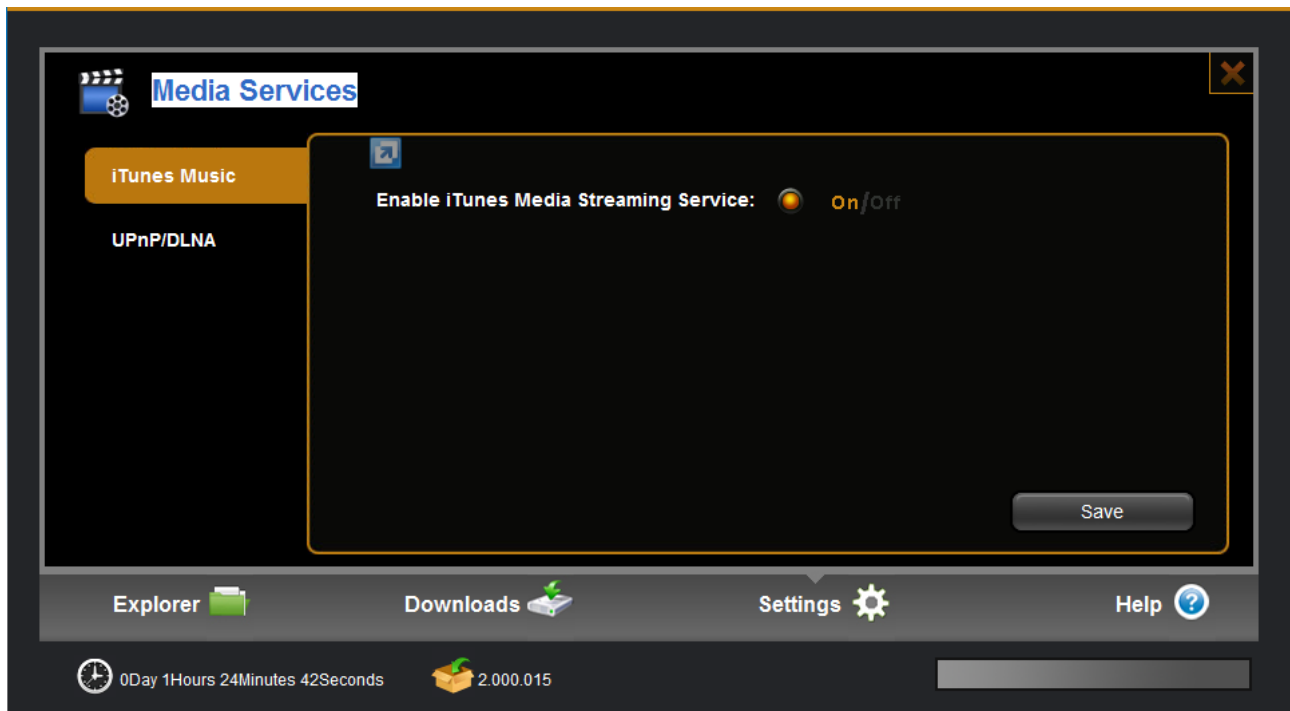
### 6.5.6 Download Service



## 6.5.7 Media Services

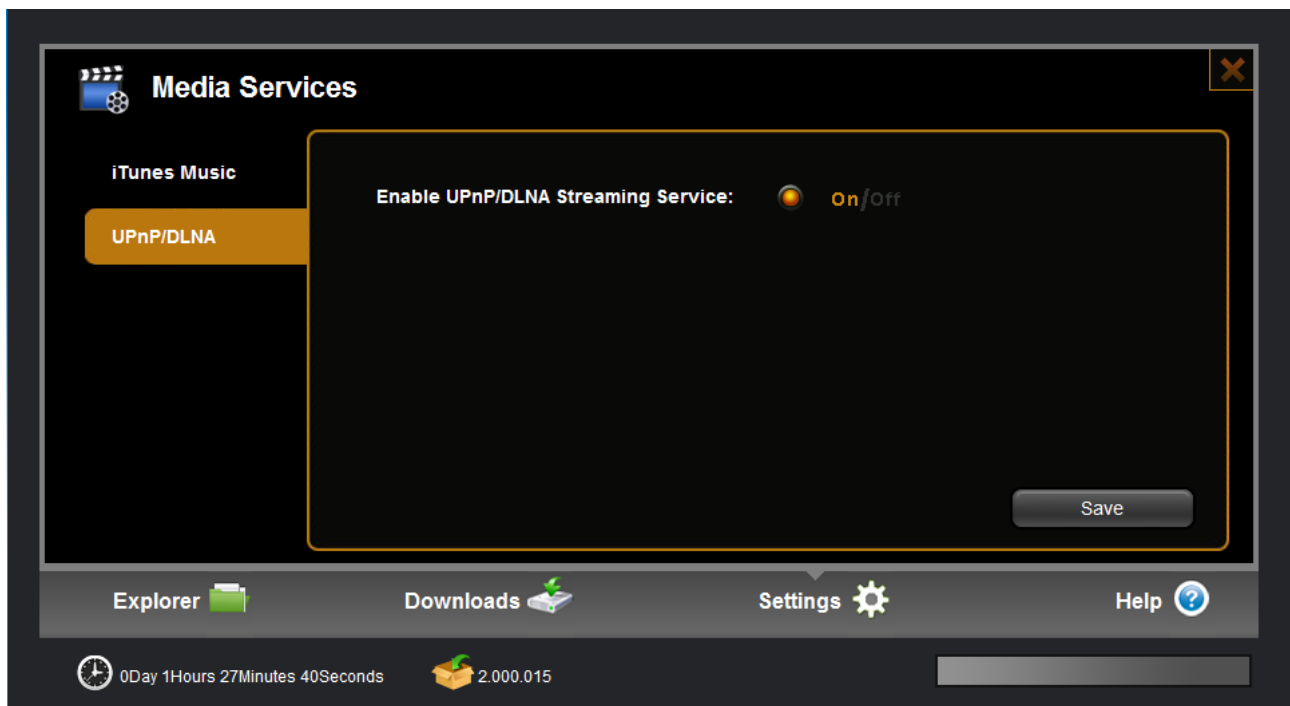
### 6.5.7.1 iTunes Music

iTunes service allows user play NAS music library at iTunes client.



### 6.5.7.2 UPnP/DLNA

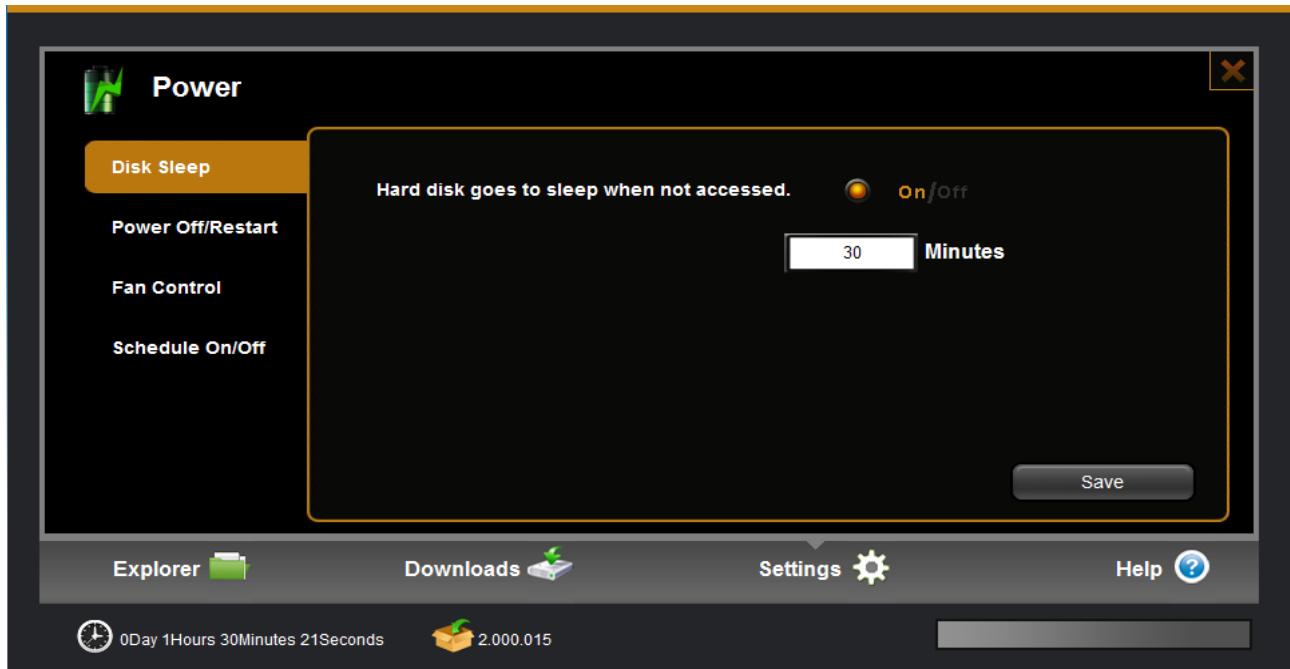
DLNA allow NAS streaming media (movie/photo/music) to client player, like windows media player, net TV, network Media Player, Play station 3, Xbox 360 and other DLNA compatible devices.



## 6.6 Power

### 6.6.1 Disk Sleep

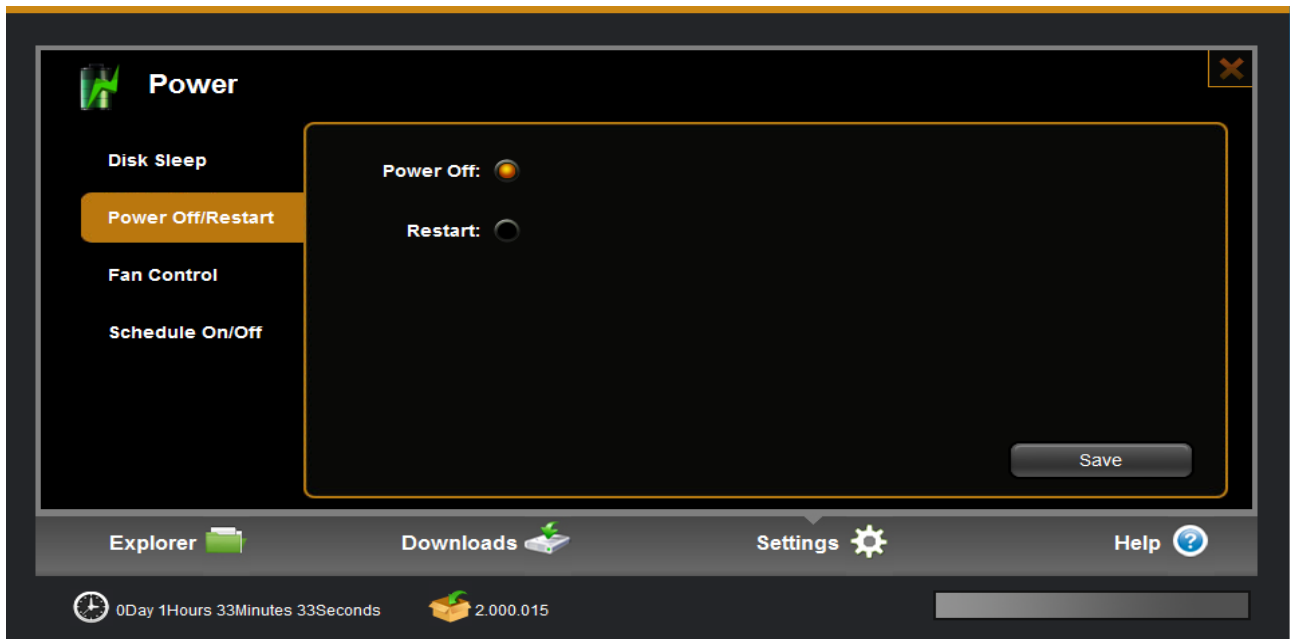
This setting is used to let system go to sleep mode after no access setting time. In sleep mode, the hard disk will go to sleep and the fan will be shut off. When there are access requirement from user, the system will leave sleep mode to general mode.



### 6.6.2 POWER Off / Restart

To power off the device, select “power off” option and click “confirm” button and system will power off and Status LED will flicker then off.

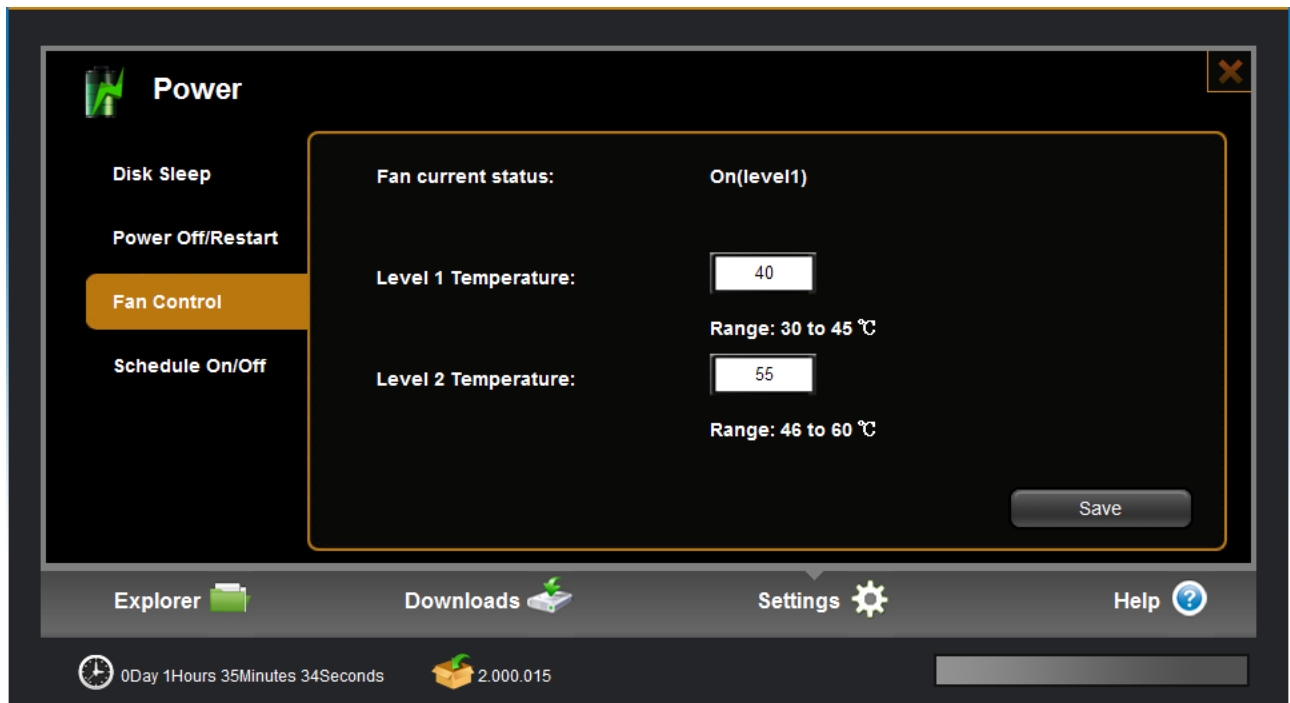
To restart the device, select “restart” option and click “confirm” button to do, Status LED will flicker then be on when restart is finished. Web page turns to the new page for login.



### 6.6.3 Fan Control

Some model have built in fan, the system always check the hard disk temperature, if the temperature is equal or higher than the setting limitation. The fan will work when the temperature is exceeding the limitation, otherwise it will be off.

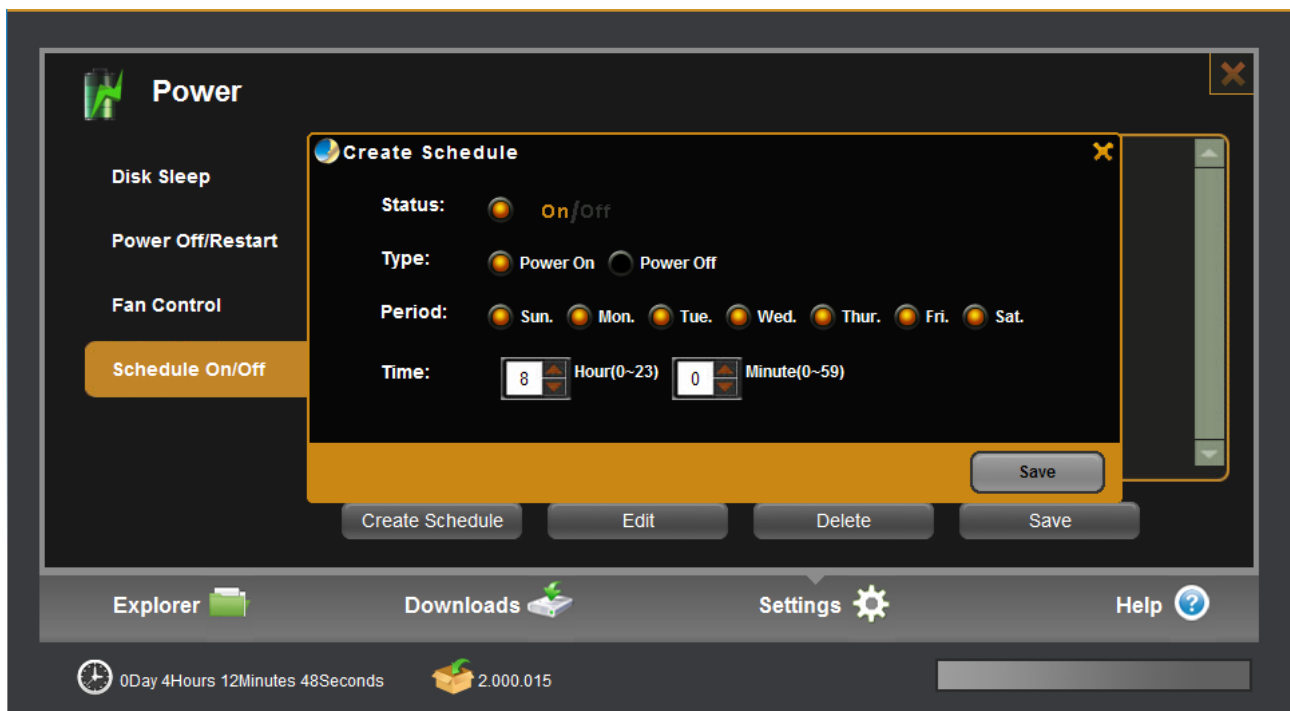
Fan open temperature: it is used to set the fan working temperature threshold.



Item	Action
<b>Level 1 Temperature</b>	When the disk temperature is higher than the temperature of level1 setting and lower than the temperature of the level2 setting, the fan will run at low speed.
<b>Level 2 Temperature</b>	When the disk temperature is higher than the temperature of level2 setting, the fan will run at high speed.

## 6.6.4 Schedule On/Off

You can create schedule to guide NAS shutdown or power time.



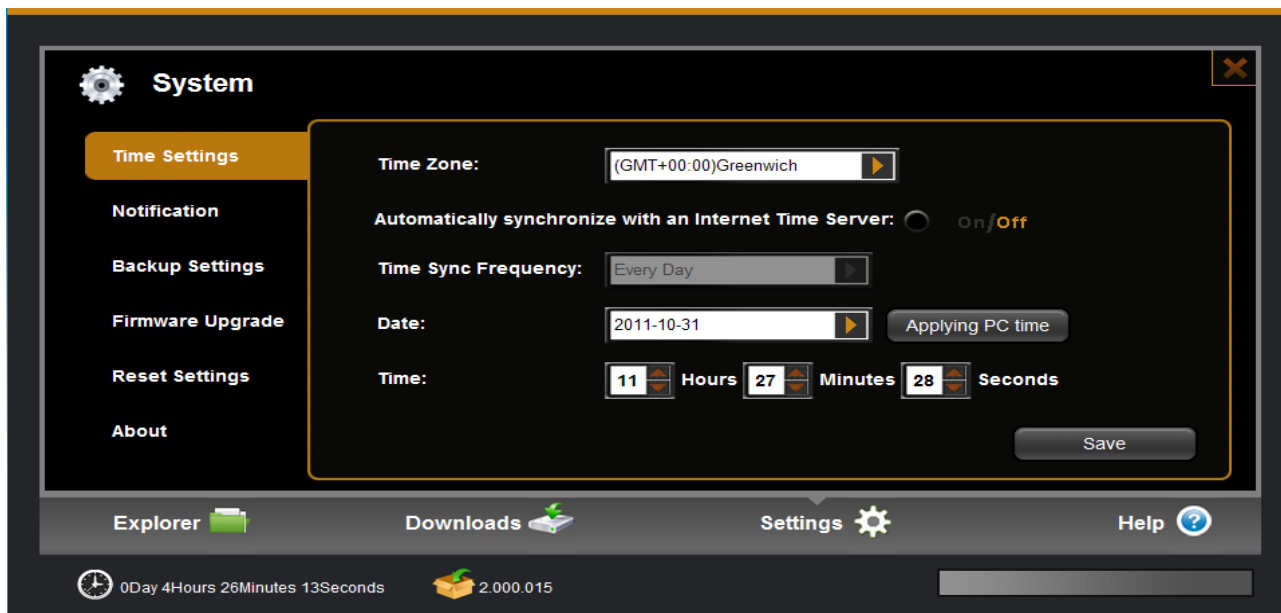
Item	Action
<b>Status</b>	Make sure it is on state, thus your setting is effective.
<b>Type</b>	If you check Power On, means that you set the time will guide NAS boot; If you check Power Off, means that you set the time will guide NAS shutdown.
<b>Period / Time</b>	The two options will guide NAS shutdown or power time.

## 6.7 System

### 6.7.1 Time Settings

The time of the device can be set automatically, over the Internet using NTP (Network Time Protocol) server or by hand setting.

Depending on the location, select the time zone from the drop-down list. If the time is set over the internet enable Internet Sync, enter time sync frequency (NTP update frequency). It will become effective after press confirm button.



The screenshot shows the 'System' settings window with the 'Time Settings' tab selected. The interface includes a sidebar with options: Time Settings, Notification, Backup Settings, Firmware Upgrade, Reset Settings, and About. The main content area contains the following fields and controls:

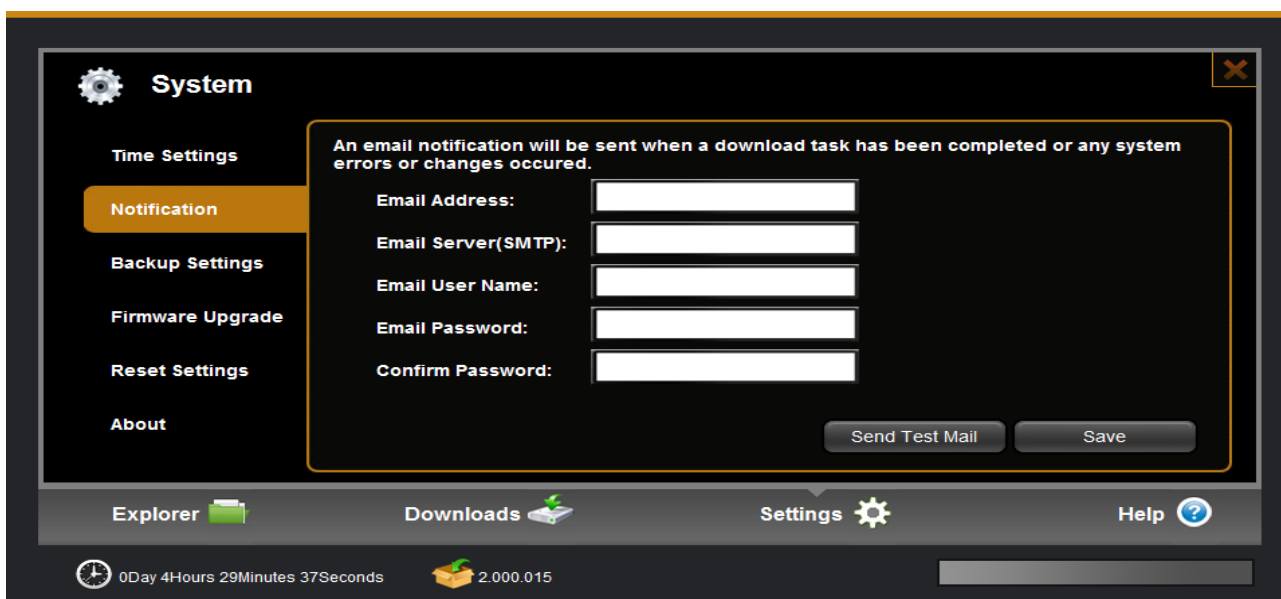
- Time Zone:** A dropdown menu showing '(GMT+00:00)Greenwich'.
- Automatically synchronize with an Internet Time Server:** A radio button labeled 'on/off'.
- Time Sync Frequency:** A dropdown menu showing 'Every Day'.
- Date:** A text input field showing '2011-10-31' and a button labeled 'Applying PC time'.
- Time:** Three spinners for 'Hours' (11), 'Minutes' (27), and 'Seconds' (28).
- Save:** A button at the bottom right of the settings area.

The bottom status bar displays 'Explorer', 'Downloads', 'Settings', and 'Help' icons, along with a clock showing '0Day 4Hours 26Minutes 13Seconds' and a file icon with '2,000.015'.

### 6.7.2 Notification Settings

Setting of email notification: in case of application of email notification service, it's required to fill in the email address, email server, user name and email password, confirm the password and press "confirm" button to execute this setting.

The email specified by user can receive the prompt message and completed download task of device.



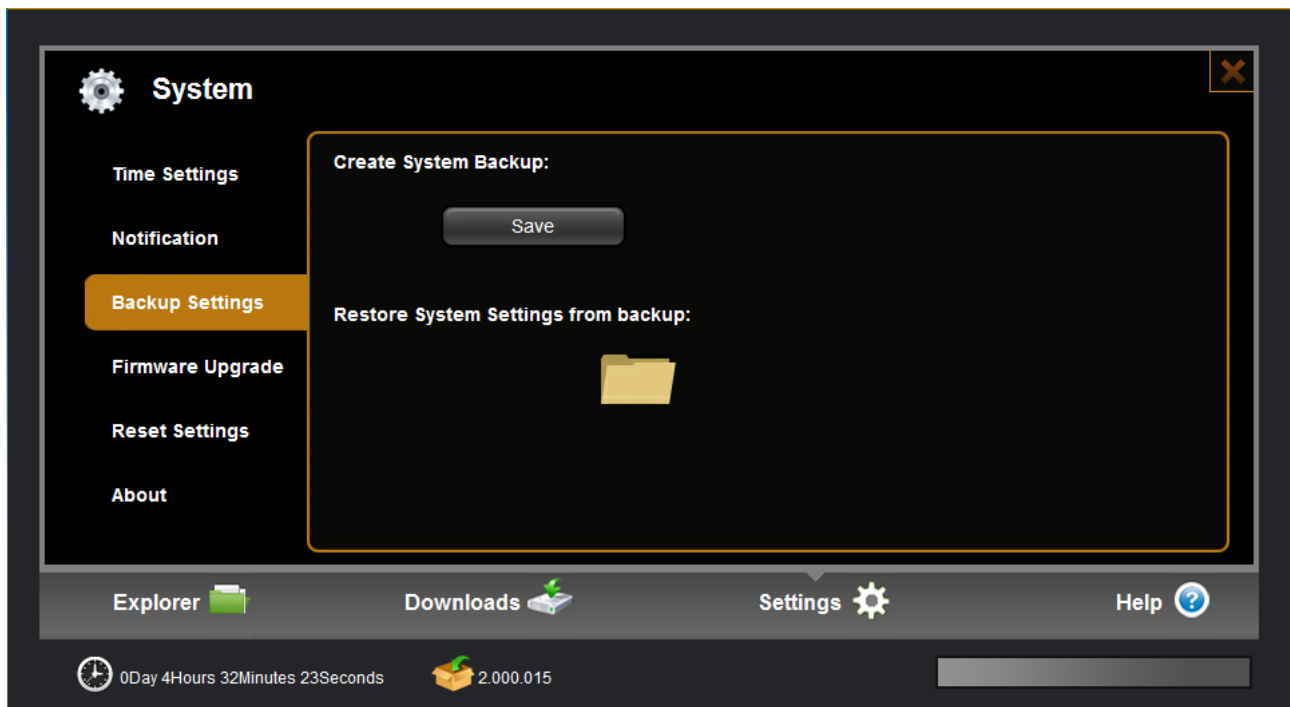
The screenshot shows the 'System' settings window with the 'Notification' tab selected. The interface includes a sidebar with options: Time Settings, Notification, Backup Settings, Firmware Upgrade, Reset Settings, and About. The main content area contains the following fields and controls:

- Notification:** A text box with the message: 'An email notification will be sent when a download task has been completed or any system errors or changes occurred.'
- Email Address:** A text input field.
- Email Server(SMTP):** A text input field.
- Email User Name:** A text input field.
- Email Password:** A text input field.
- Confirm Password:** A text input field.
- Send Test Mail:** A button.
- Save:** A button.

The bottom status bar displays 'Explorer', 'Downloads', 'Settings', and 'Help' icons, along with a clock showing '0Day 4Hours 29Minutes 37Seconds' and a file icon with '2,000.015'.

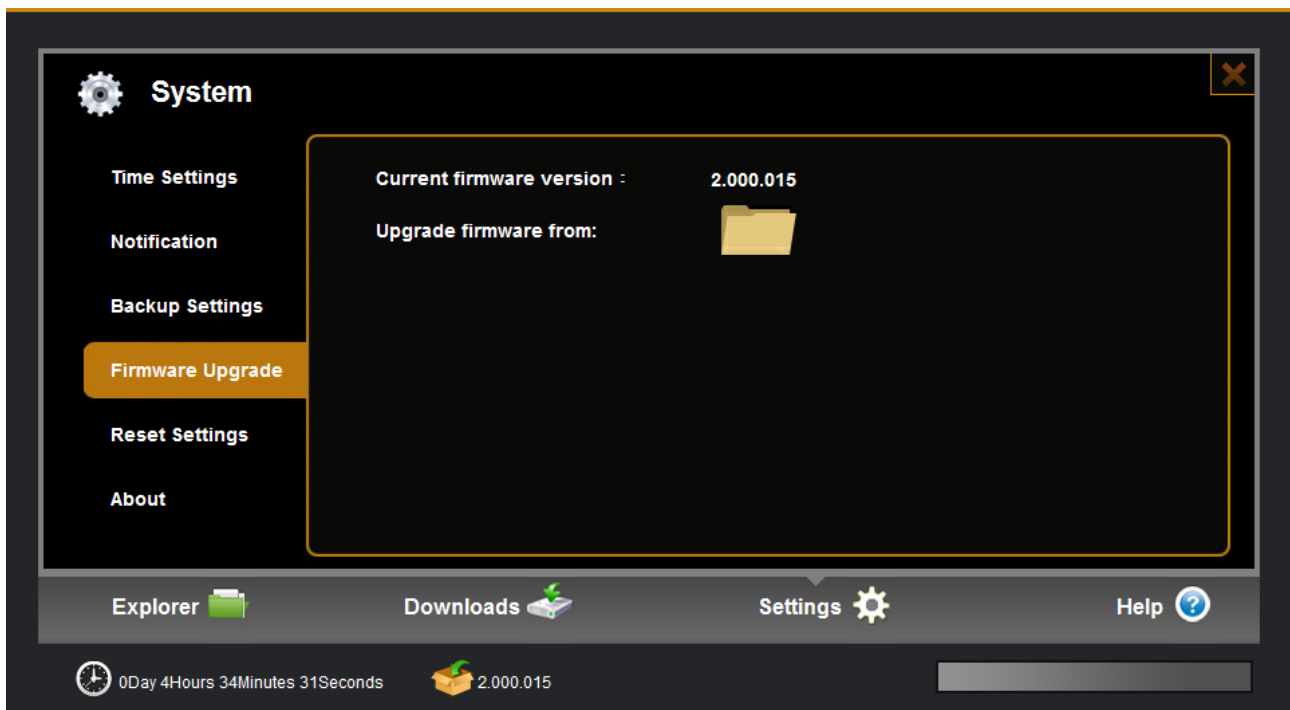
### 6.7.3 Backup Settings

Backup settings are used to save the current setting parameters of the Device system. Also you can restore the setting from the saved setting file.



### 6.7.4 Firmware Upgrade

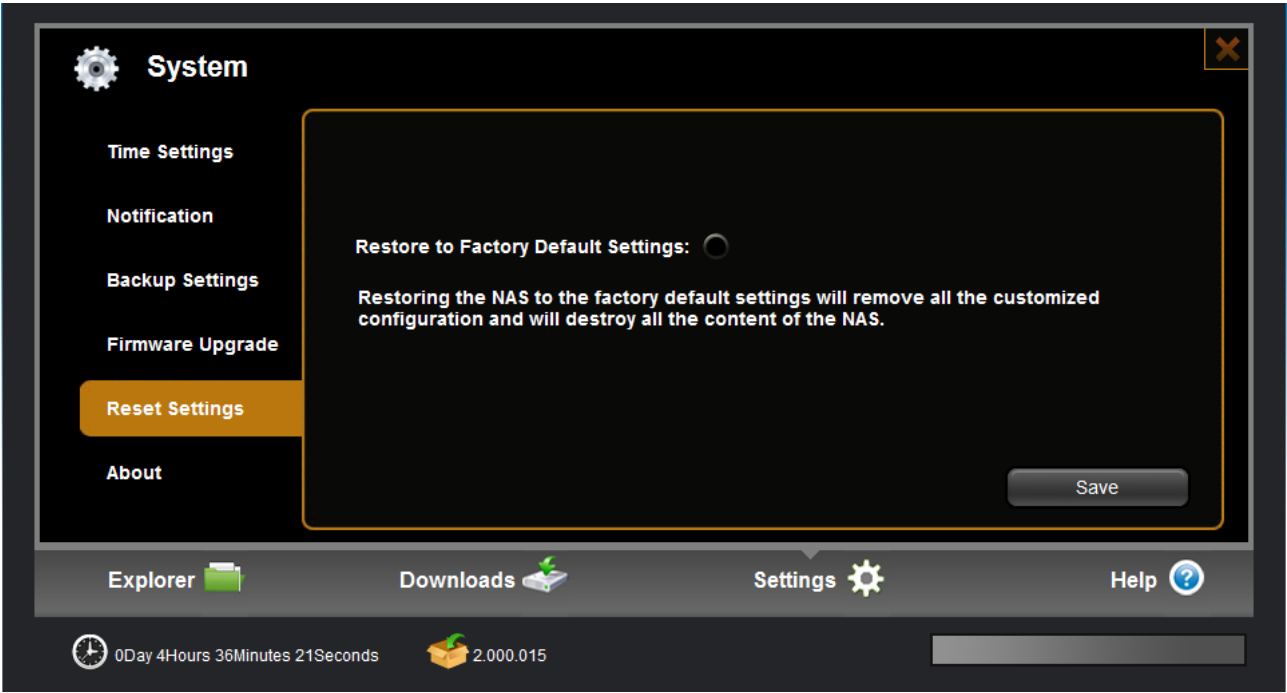
This feature is used to update device firmware.



**Step 1.** Download the latest version of firmware from the device manufacturer website. Click the folder icon to locate the downloaded firmware.

**Step 2.** Click “confirm” button to begin upgrading. After upgrading the system will reboot and you can check firmware version at the bottom of main UI.

# 6.7.5 Reset Settings



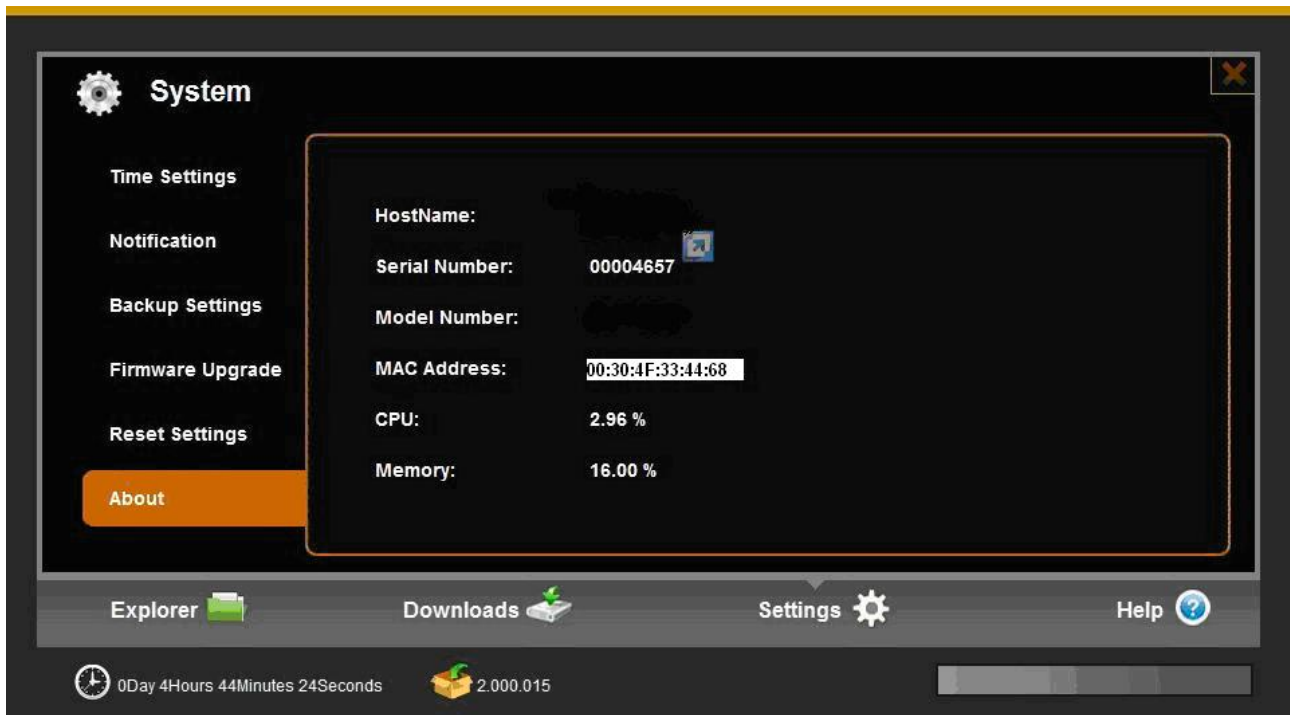
Item	Action
Restore to Factory Default	Restoring the NAS to the factory default settings will remove all the customized configuration and will destroy all the content of the NAS

 **Note**

The feature only restores the device default settings for all functions. The current downloading tasks are not affected by this operation. After the device is restored to default configuration, the IP address is 192.168.0.100.

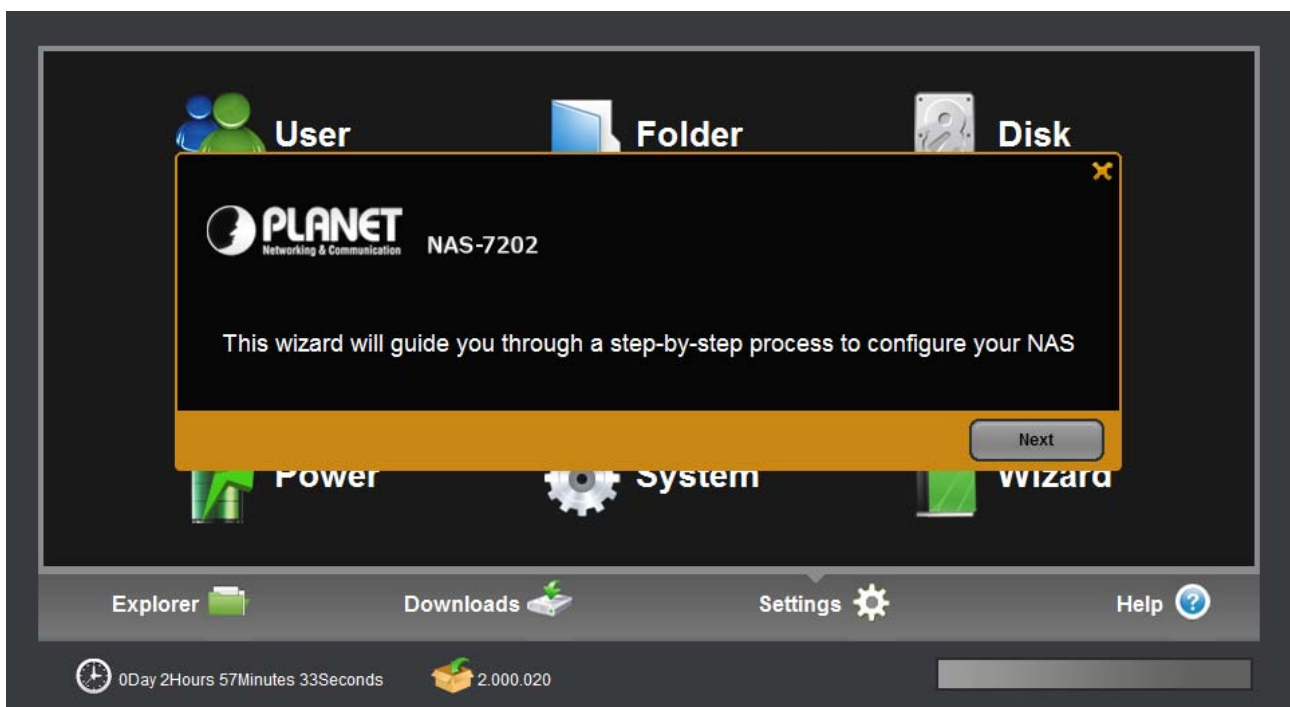
## 6.7.6 About

Here is some information of the device.



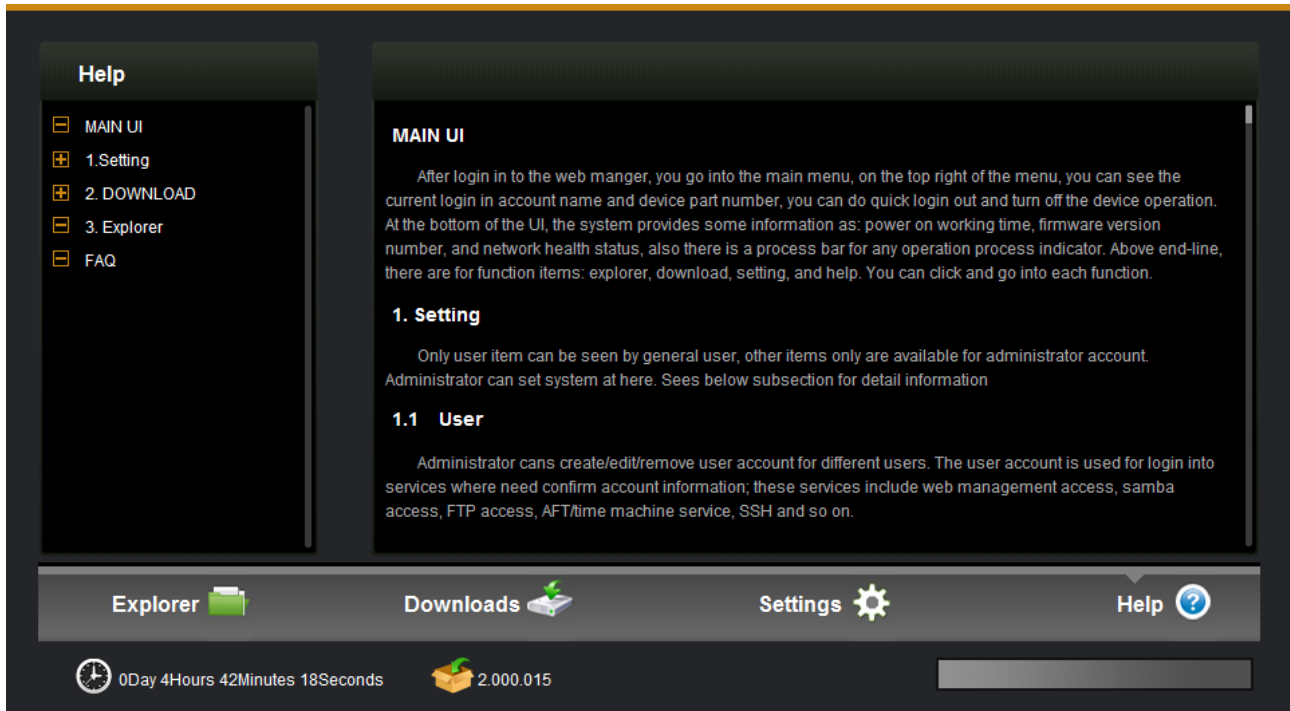
## 6.8 Wizard

Here is a wizard for basic setting step by step.



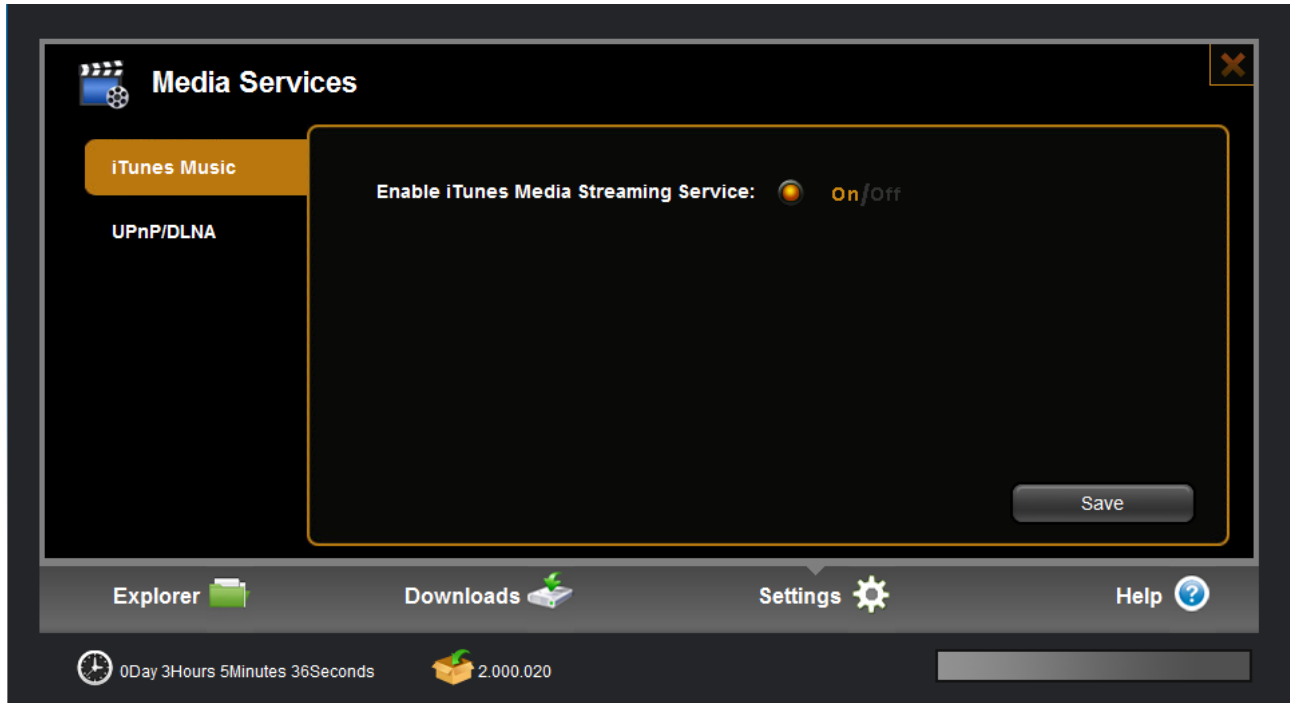
## 7. Help

Here is Help information of the device.



# Appendix A: iTunes service

**Step1.**Enable the iTunes service in the web management



**Step2.** Copy several songs to built-in disk by samba or FTP, which are recommended put into “music” inside of “share”.



**Step3.** Then open iTunes in your computer. It will search network share devices automatically, you can find device name at the left list, pitch on the device to open music playlist.



## File types supported by iTunes server

- \*.mp3
- \*.m4a
- \*.wav
- \*.aiff

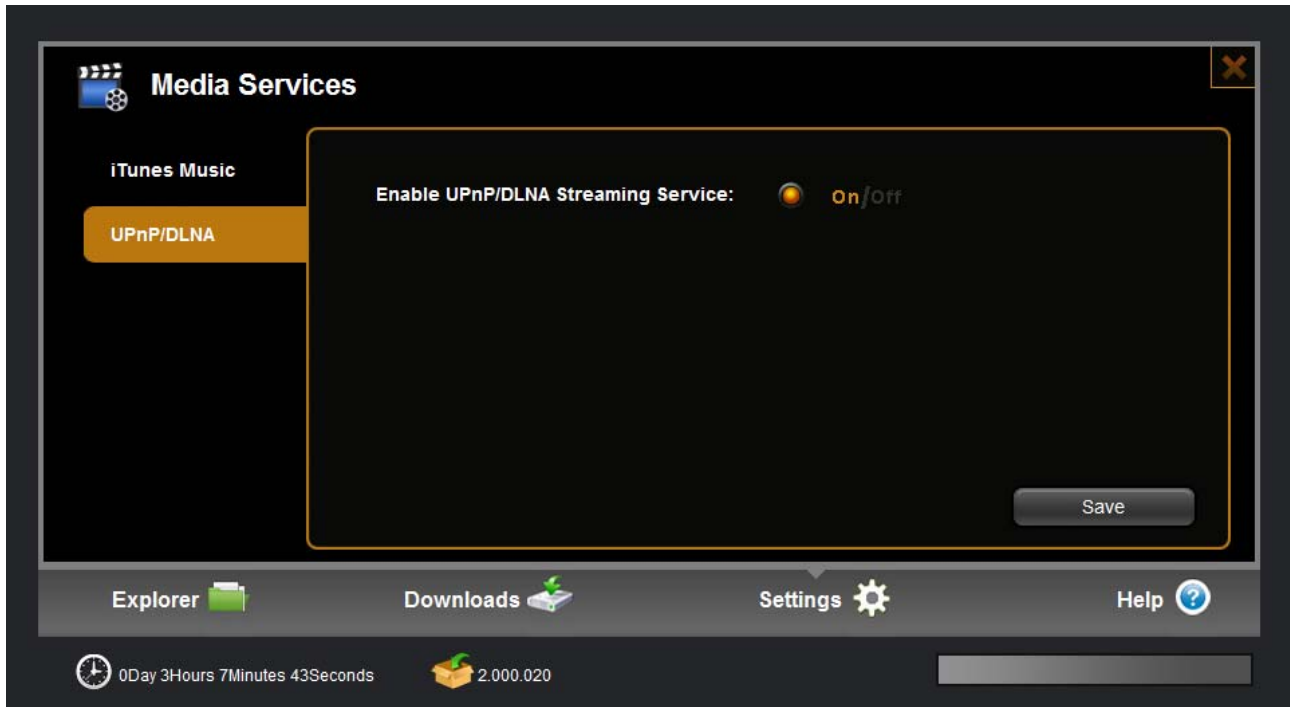
### Note

(1) Newly increased media files to device maybe need restart of iTunes service, and then iTunes client can recognize them.

(2) Not only on Mac but also on PC, this function can be applied properly.

## Appendix B: DLNA service

Enable DLNA service in the web management.

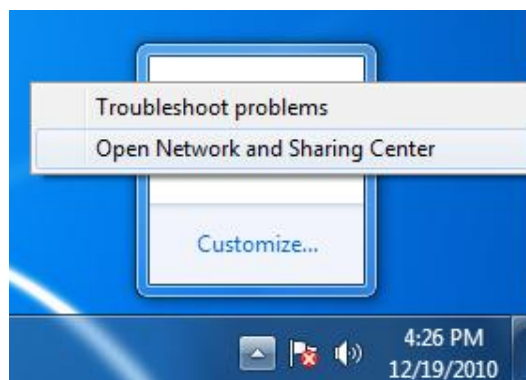


### Application on PC

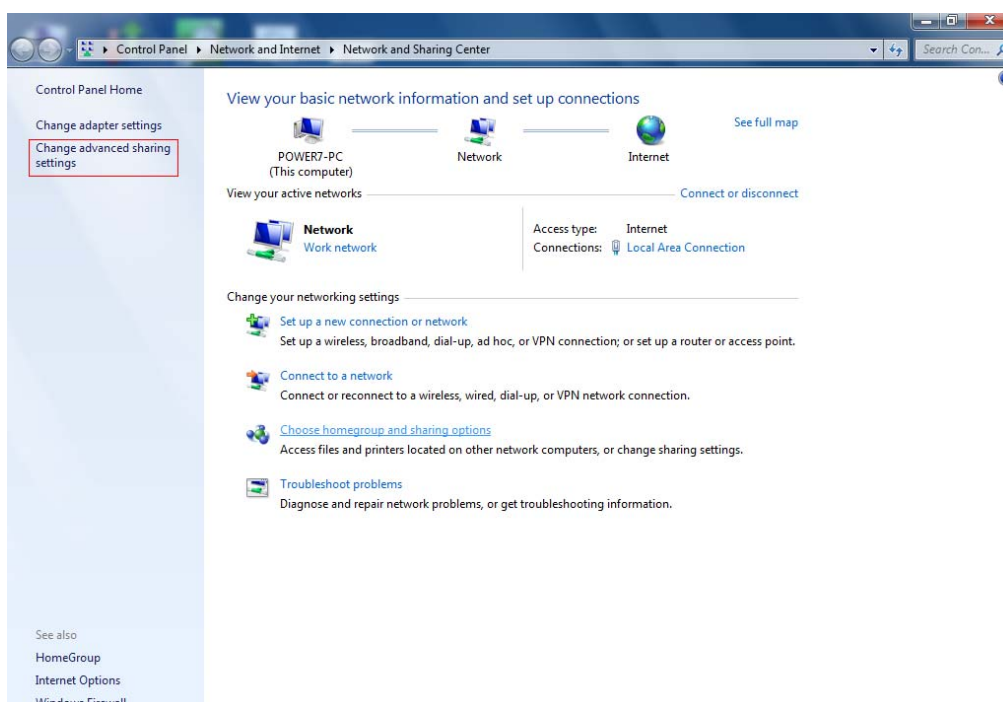
Operation procedure:

1. Please make sure client PC has been set to a shared network.(In Windows 7 for example)

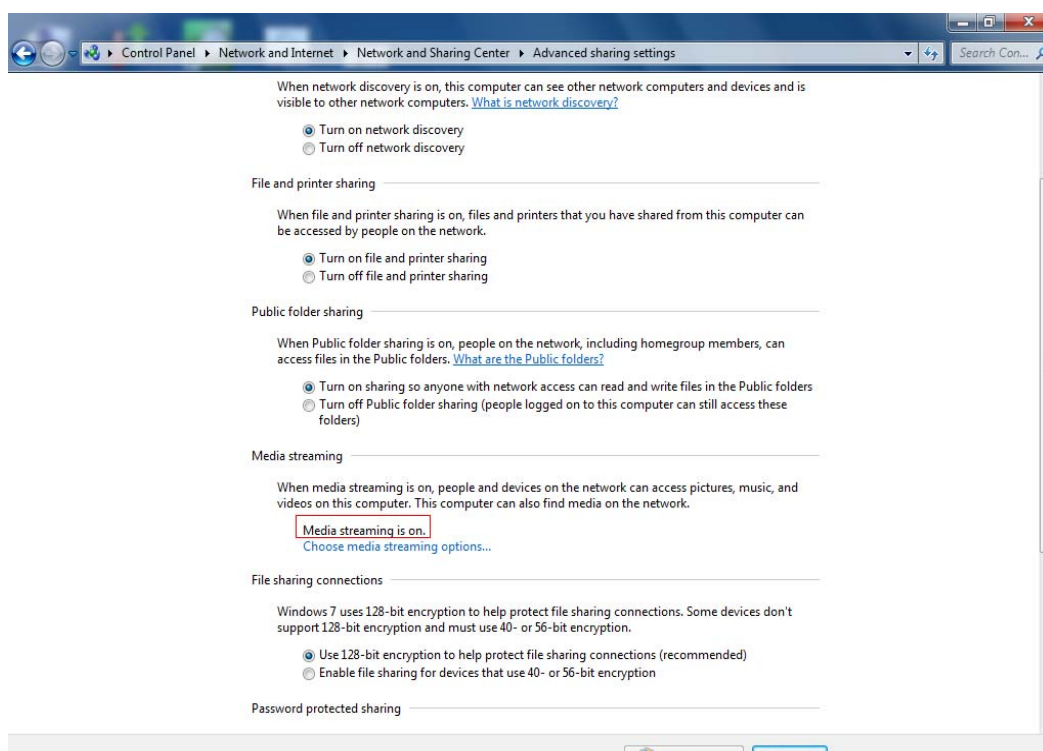
Click the lower right corner on the toolbar of PC monitor "network" icon, click the option "Open Network and Sharing Center".



Click the option "Change advanced sharing settings" on the left side of the interface.



Open "Media streaming" that you can find media on the network.



2. Add media files folders to the shared.

Access device by Samba / FTP (section 3, section 4), and copy multimedia files to "Music", "Movies", "Pictures" folder under the "share" directory.

## Media Types Supported by DLNA

Shared Audios	Shared Videos	Shared Photos
Audio Files	Video Files	Image Files
MP3	AVI	JPEG
WMA	DIVX	PNG
WAV	M2TS	TIFF
MP4	MKV	BMP
M4A	MOV	GIF
AAC	MP4	
AC3	NPG	
AIFF	TS	
	VOB	
	WMV	

3. Open Windows Media Player 11 (Windows Vista / Windows 7), click the device name on the left, and you will see media files stored in the device. Then you can select the desired one to play.

### Note

---

DLNA service can also support other DLNA-compatible devices, such as Media Player, Play station 3, Xbox 360.

---

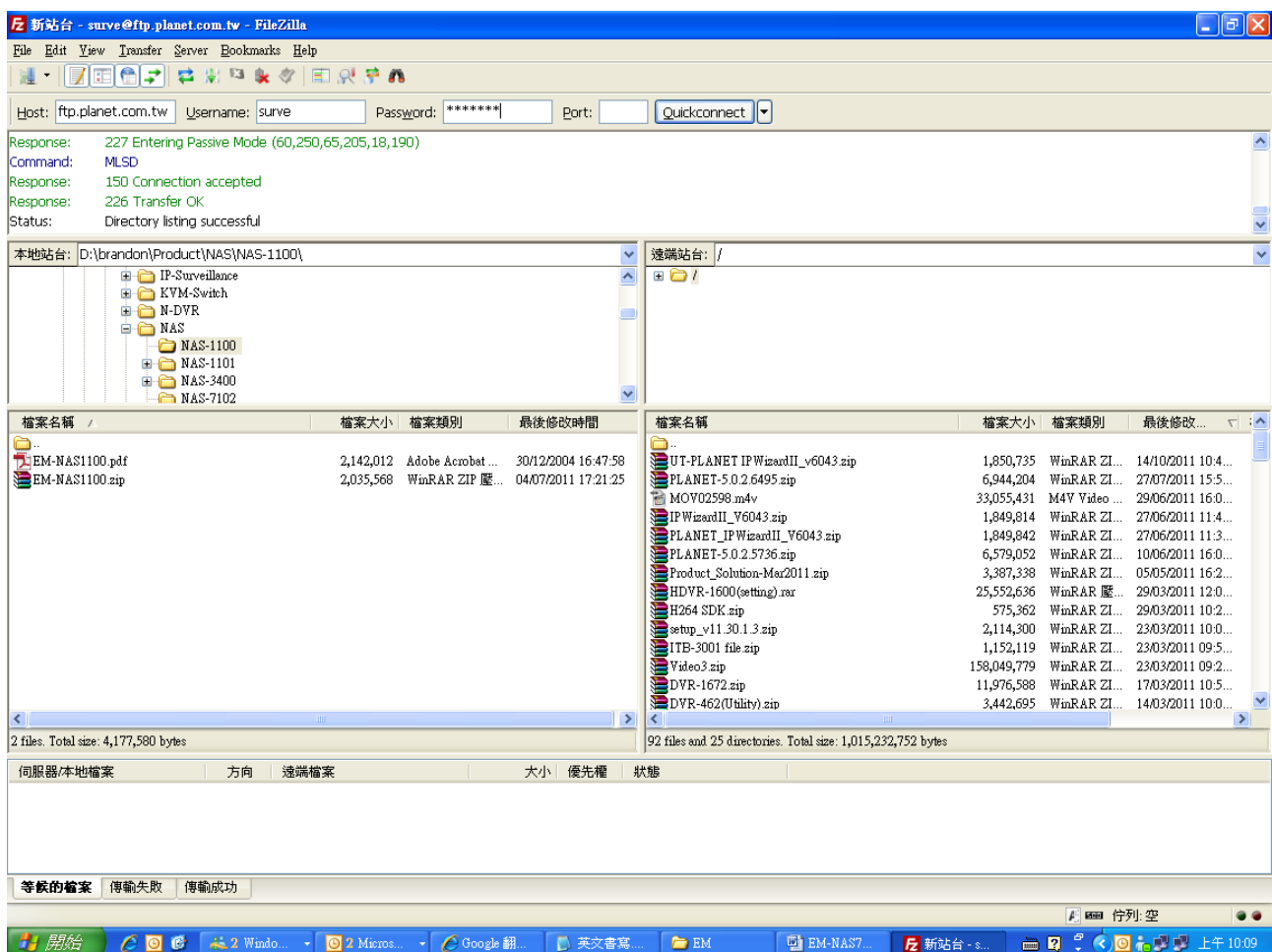
# Appendix C: Access on PC

## Accessing device with FTP client tool

1. Please install FTP client software like Filezilla Client.

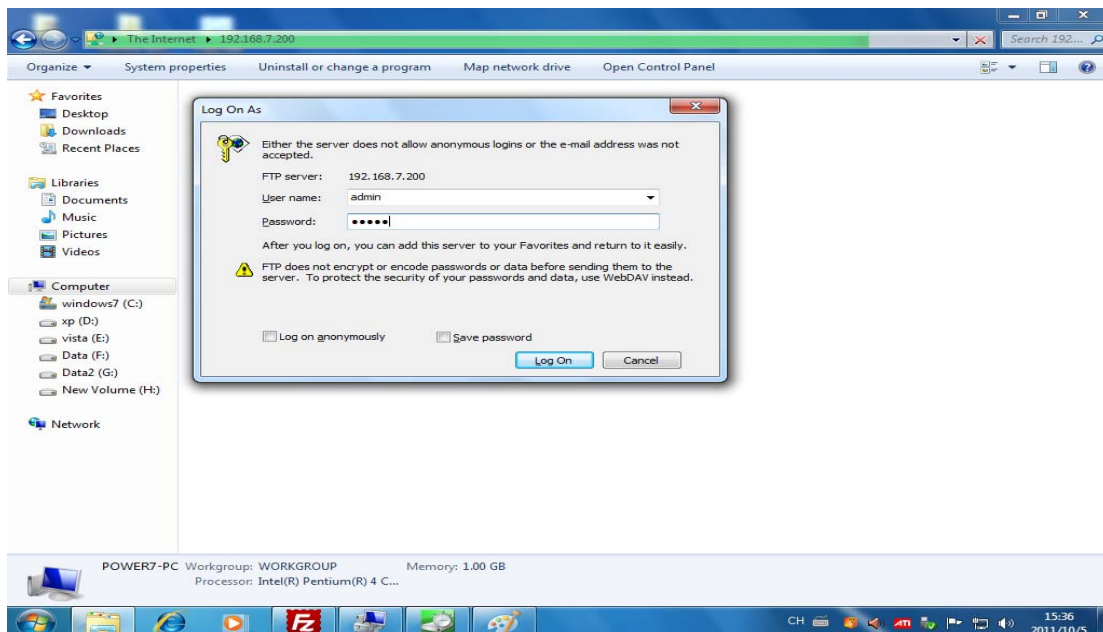


2. Double click the icon on desktop to open, and then enter the host name as “ftp:// xx.xx.xx”.(IP address) or “ftp://device name”, user name, and password to login, shown as below.

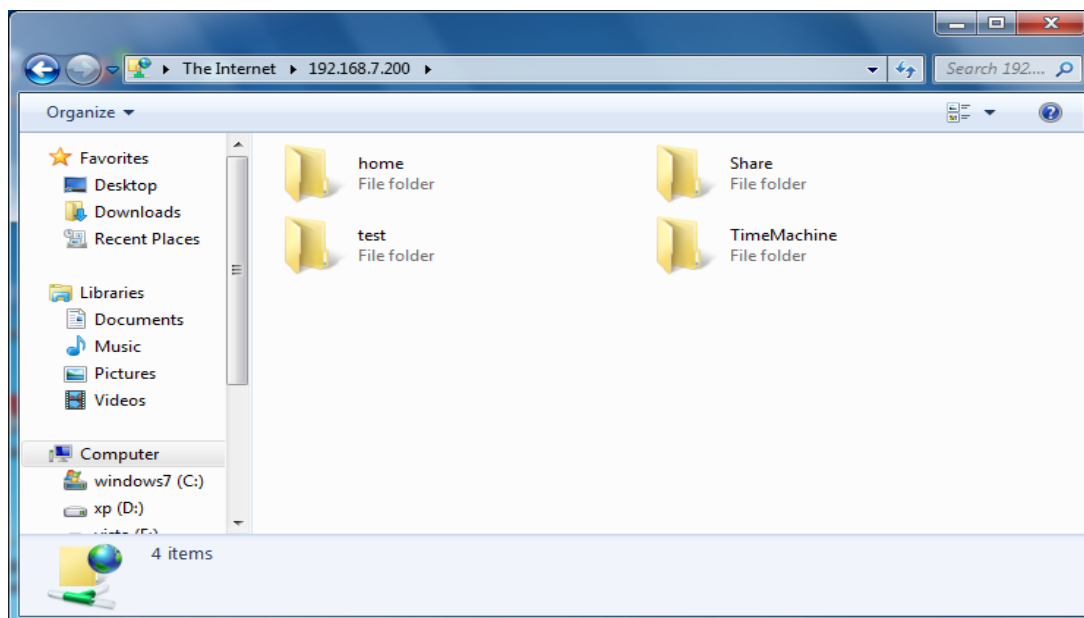


## Accessing device without tool

1. Type “ftp:// xx.xx.xx ” (e.g. ftp://192.168.7.200) in “my computer” or browser.



2. Then enter user name and password to login. (For more detail please see 6.1.1)



### Note

When access the device through above two methods, if Chinese characters show messy code, please try to change the encoded mode for UTF-8 in the browser or FTP terminal software.

## Appendix D: Functional Specifications

Hardware Specification	
Supported HDD	Two 3.5", SATA I/II interface
LAN Connector	One RJ-45 Interface (10/100/1000Mbps)
USB Connector	2 x USB 2.0 Compatible (Type A)
USB Connectivity	External Storage and Network Printer Server
Transport Protocol	TCP/IP, NTP, SMTP, DDNS
File Protocols	WebDAV, SMB/CIFS, FTP, NFS, AFP (Apple Talk) / Time Machine, SSH
Multimedia Server	iTunes/ DLNA / UPnP AV Server
Client OS	Windows 7/Vista/XP , Mac OS 10.5 and above , Linux Kernel 2.6 and above
System Configuration	Windows/Mac Base utility, Web Browser
Supported Concurrent Users	32
Max. User Account	12
Backup	USB One-touch Backup
Operating	Temperature: 5 ~ 40 Degree C Humidity: 5 ~ 90% (non-condensing)
Storage	Temperature: 0 ~ 60 Degree C Humidity: 5 ~ 90% (non-condensing)
Dimension (W x D x H)	220 x 126 x 78.2mm
Weight	730g (without HD)
Power Adapter	12V / 3A
Regulatory	FCC, CE