Synology®

Synology RackStation RS3617xs

Quick Installation Guide

Table of Contents

Chapter 1: Before You Start

Chapter 2: Hardware Setup

Chapter 3: Install DSM on RackStation

Appedix A: Specifications

Appedix B: LED Indicator Table

Before You Start

Thank you for purchasing this Synology product! Before setting up your new RackStation, please check the package contents to verify that you have received the items below. Also, make sure to read the safety instructions carefully to avoid harming yourself or damaging your RackStation.

> *Note:* All images below are for illustrative purposes only, and may differ from the actual product.

Package Contents

Main unit x 1	AC power cord x 1
	Screws for 2.5" drives x 52
	Screws for 3.5" drives x 52

Synology RackStation at a Glance
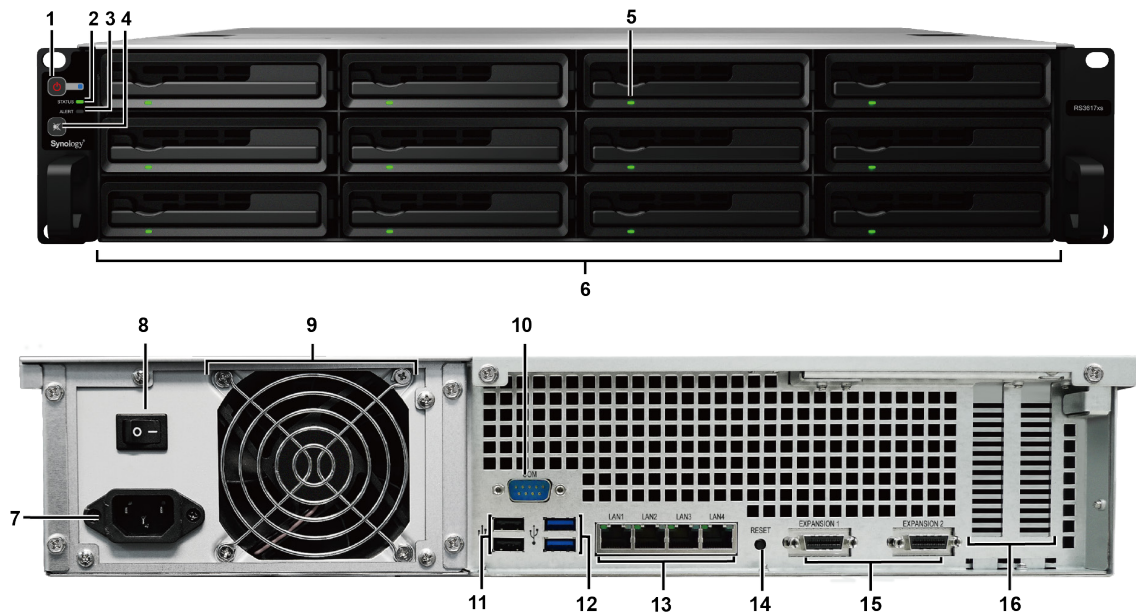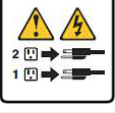
No.	Article Name	Location	Description
1	Power Button and Indicator	Front Panel	1. Press to power on the RackStation. 2. To power off the RackStation, press and hold until you hear a beep sound and the Power LED starts blinking.
2	Status Indicator		Displays the status of the system. For more information, see "Appendix B: LED Indicator Table".
3	Alert Indicator		Displays warnings regarding fan or temperature. For more information, see "Appendix B: LED Indicator Table".
4	Beep Off Button		Press to deactivate the beeping sound that is emitted when a malfunction occurs.
5	Drive Status Indicator		Displays the status of drives. For more information, see "Appendix B: LED Indicator Table".
6	Drive Tray		Install drives (hard disk drives or solid state drives) here.
7	Power Port	Back Panel	Connect power cord here to supply power to your RackStation.
8	Power Supply On/Off Switch		Press to turn on/off the power supply.
9	PSU Fan		Disposes of excess heat and cools the PSU.
10	Console Port		This port is used for manufacturing use only.
11	USB 2.0 Port		Connect external drives, or other USB devices to the RackStation here.
12	USB 3.0 Port		Connect external drives, or other USB devices to the RackStation here.
13	LAN Port		Connect RJ-45 network cables here.
14	RESET Button		1. Press and hold until you hear a beep sound to restore the default IP address, DNS server, and password for the **admin** account. 2. Press and hold until you hear a beep sound, then press and hold again until you hear three beep sounds to return the RackStation to "Not Installed" status so that DiskStation Manager (DSM) can be reinstalled.
15	Expansion Port		Connect Synology Expansion Units[1] to your Synology RackStation.
16	PCI Express Expansion Slot		Supports two PCIe x8[2] add-on network interface cards.

[1] For more information about Synology Expansion Unit supported by your RackStation, please visit **www.synology.com**.

[2] White at x8 mode and black at x4 mode.

Safety Instructions

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		Keep away from direct sunlight and away from chemicals. Make sure the environment does not experience abrupt changes in temperature or humidity.
		Place the product right side up at all times.
		Do not place near any liquids.
		Before cleaning, unplug the power cord. Wipe with damp paper towels. Do not use chemical or aerosol cleaners.
		To prevent the unit from falling over, do not place on carts or any unstable surfaces.
		The power cord must plug in to the correct supply voltage. Make sure that the supplied AC voltage is correct and stable.
		To remove all electrical current from the device, ensure that all power cords are disconnected from the power source.
		Risk of explosion if battery is replaced with an incorrect type. Dispose of used batteries appropriately.

Hardware Setup

Tools and Parts for Drive Installation

- A screwdriver
- At least one 3.5" or 2.5" SATA drive (please visit **www.synology.com** for compatible drive models.)

Warning: If you install a drive that contains data, the system will format the drive and erase all existing data. Please back up any important data before installation.

Install Drives

1 Find the small button located on the drive tray handle. Press the button down and pull the drive try handle out as illustrated below.
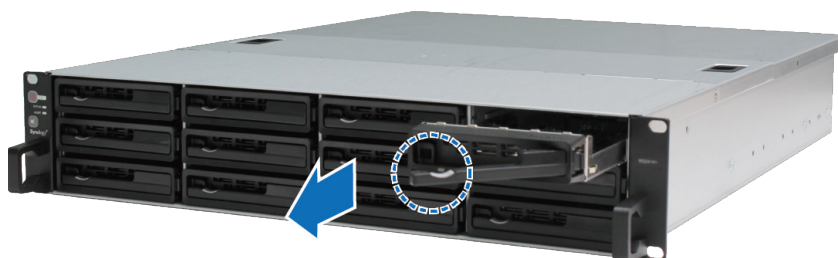
2 Load drives in the drive trays:

- **For 3.5" drives:** Place the drive in the drive tray. Turn the tray upside down and tighten screws into the four spots indicated below to secure the drive.
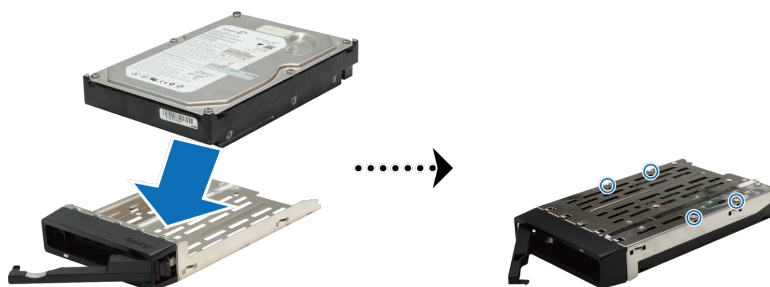
- **For 2.5" drives:** Place the drive in the drive tray. Turn the tray upside down and tighten screws into the four spots indicated below to secure the drive.

3 Insert the loaded drive tray into the empty hard drive bay.

Important: Make sure the drive tray is completely inserted. Otherwise, the drive might not function properly.

4 Push the handle inward to secure the drive tray.

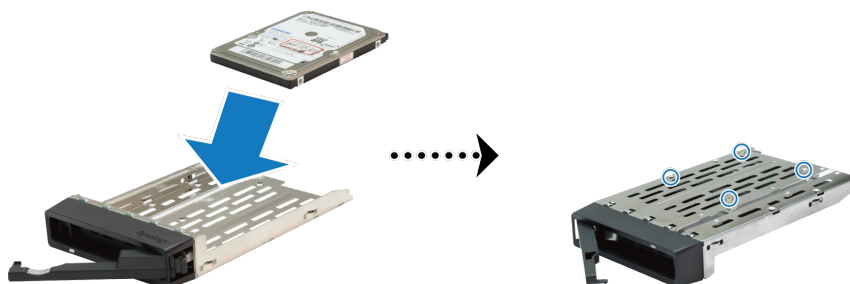**5** Repeat the steps above to install all prepared drives.

6 Drives are numbered as shown below.

Note: If you want to create a RAID volume, we recommend all installed drives be the same size in order to optimize drive capacity usage.

Add a RAM Module on RackStation

Synology offers RAM modules which allow you to expand the memory capacity of your RackStation. To install, check, or remove your RAM module, please follow the steps below.

To install a RAM module:

1 Shut down the RackStation and disconnect all connected cables to prevent any possible damage.

> *Important:* Before installing the RAM module, please wait for at least 30 seconds after detaching the power cord(s) from the RackStation to ensure complete discharge. Also, please remove any static electricity before installation by touching water pipes, a metal conduit, or another person to get rid of excess charge and avoid damaging the motherboard, peripherals, and other components.
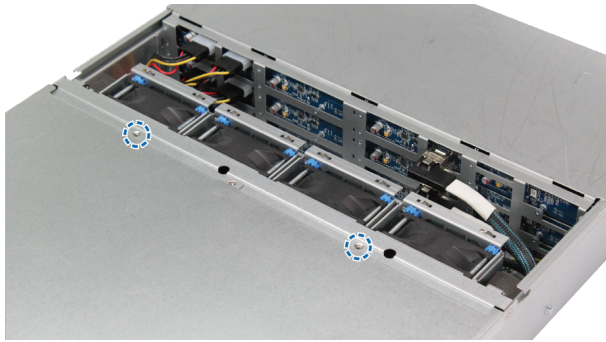
2 Slide the latches shown below to release the fan cover.

3 Lift and remove the fan cover.

4 To remove the screws securing the top cover, follow the steps below:

    a Remove the two screws illustrated below.

    b Remove the two screws located on the back. Then slide the top cover in the direction indicated below and lift.

    c Remove the screws of the securing bracket and remove the securing bracket to reveal the RAM slots.
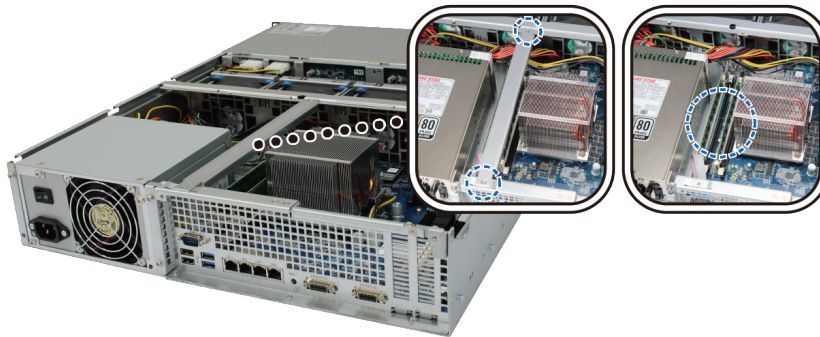
Important: Removing the cover will expose sensitive internal components to possible harm. Please avoid touching any other components when adding or removing memory.

5 To insert the new memory module, follow the steps below:

  a Release the ejectors on the memory slot by pushing them outwards.
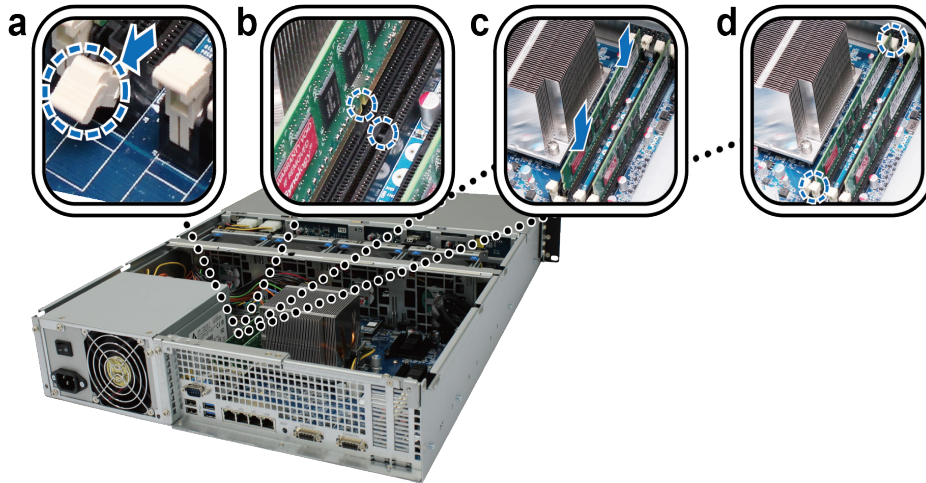
  b Align the notch on the gold edge of the module with the notch in the memory slot.

  c Use two fingers to apply firm, even pressure and push the memory module downward.

  d When the memory is inserted correctly, the ejectors will snap into place.

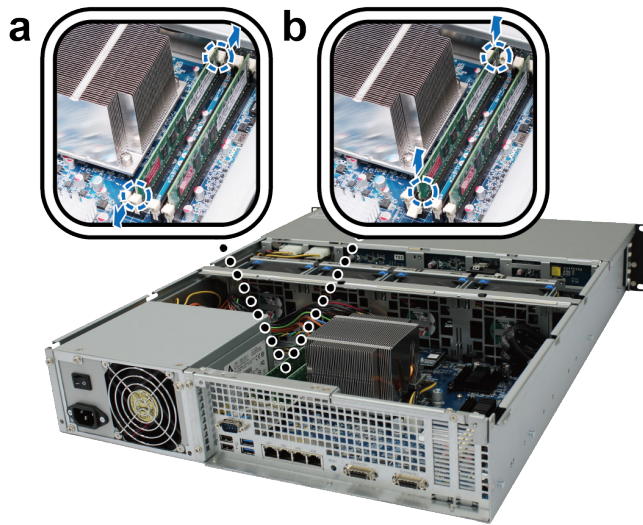**6** Replace the top cover, slide it into place, and tighten all screws.

To make sure RackStation recognizes the new memory capacity:

1 Log in to DSM as **admin** or a user belonging to the **administrators** group. .

2 Check Total Physical Memory in Control Panel > Info Center.

If your RackStation does not recognize the memory or does not start up successfully, confirm that the memory is installed correctly.

To remove the RAM Module:

1 Follow steps 1 to 4 of "Install a RAM Module" to remove the cover from the RackStation.

2 To remove the RAM module, follow the steps below:

    a Release the ejectors on the memory slot by pushing outwards simultaneously.

   **b** Hold the memory module by the edges and remove it from the slot.

3 Replace the top cover, slide it into place, and tighten the two back screws.

Add a Network Interface Card to RackStation

Your RackStation contains two PCI Express expansion slots which allow you to install two 10G/E or Gigabit network interface cards for LAN port expansion.[1] Before installation, make sure your network interface cards come with "low-profile" brackets.
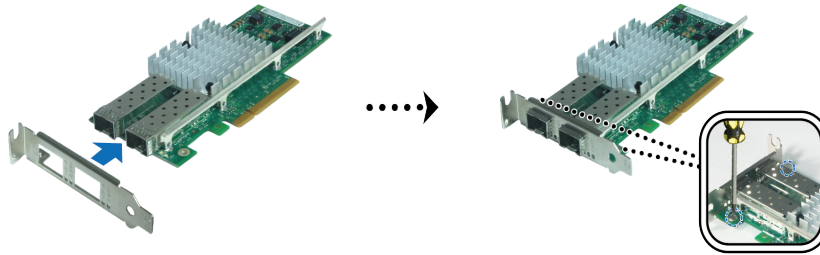
To replace a full-profile bracket with a low-profile bracket:

1 Remove the two screws holding the full-profile bracket to the interface card. Then remove the bracket.

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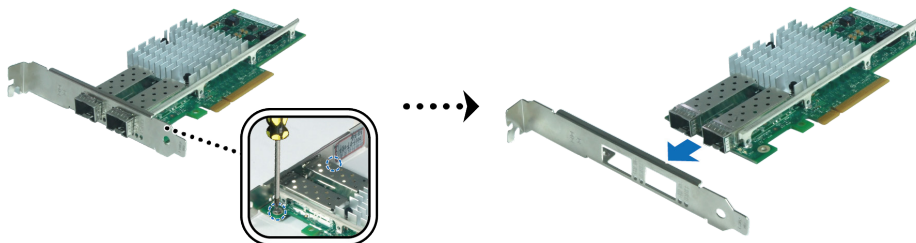
[1] For more information about supported 10G/E or Gigabit network interface cards, visit **www.synology.com**.

**2** Tighten the screws to secure the low-profile bracket.

To install the network interface card:

1 Follow steps 1 to 4 of "Install a RAM Module" to remove the cover from the RackStation.

2 To install the network interface card, follow the steps below:

   a Remove the screw on the port access cover. Then remove the access cover.

   b Align the card connector with the expansion slot and insert the card into the slot.

> *Important:* Make sure the connector is fully inserted. Otherwise, the network interface card might not be able to function properly. For greater perfomance, we highly recommend installing the network interface card into the PCI-E 3.0x8 (white) slot first.
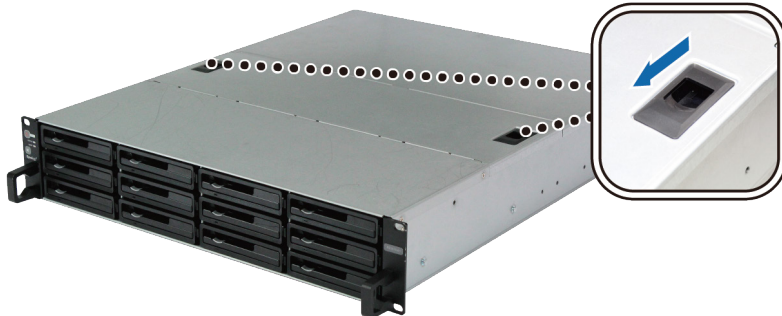
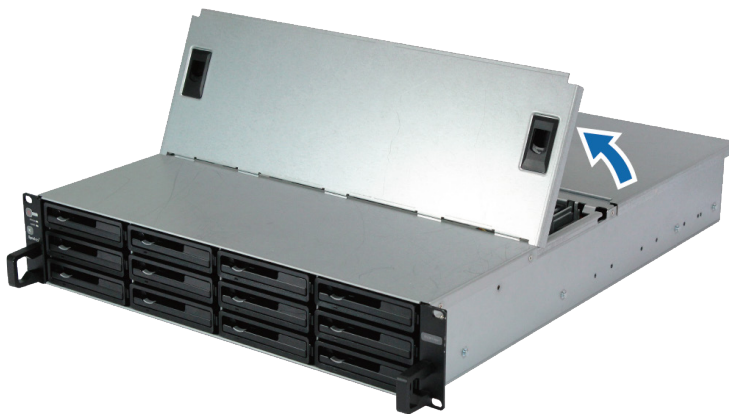   **c** Tighten the screw to secure the network interface card.
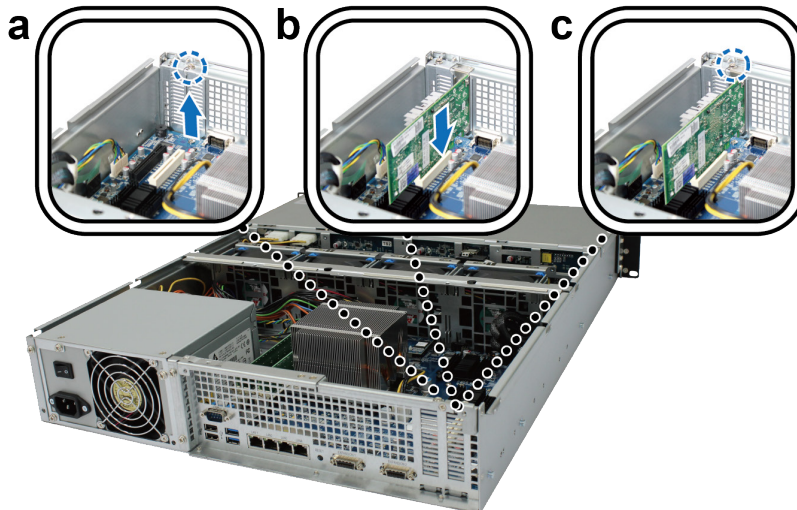
Replace System Fan

If a system fan malfunctions, please see the instructions below to open the RackStation and replace the malfunctioning fan.

1 Slide the latches shown below to release the fan cover.

2 Lift to remove the fan cover.

3 Fans are numbered as shown below:
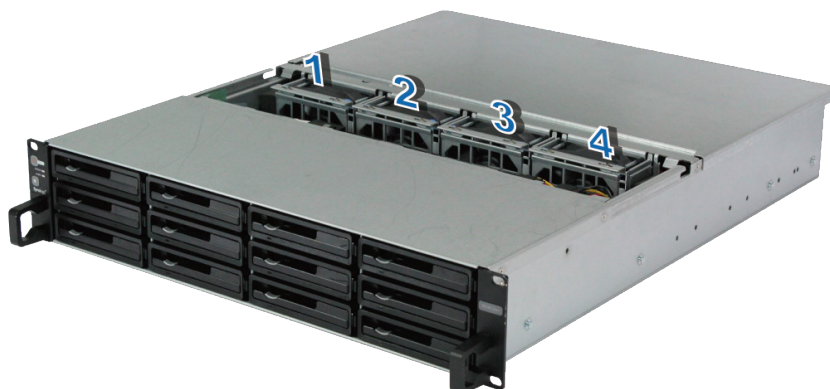
4 Find the malfunctioning fan and lift it upward to remove.
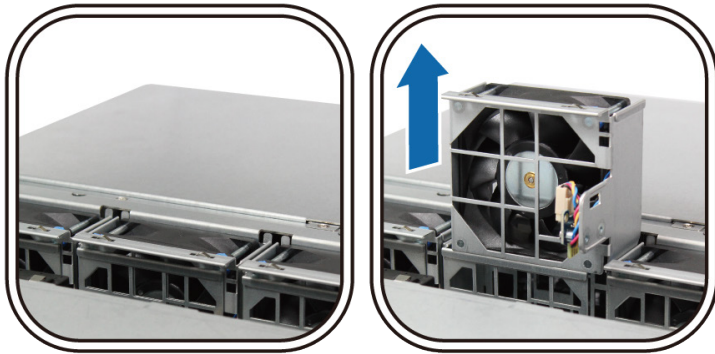
5 Apply firm pressure to the power plug and slide it off the power port as show below. Then remove the malfunctioning fan from the fan casing.

a   **b**   **c**
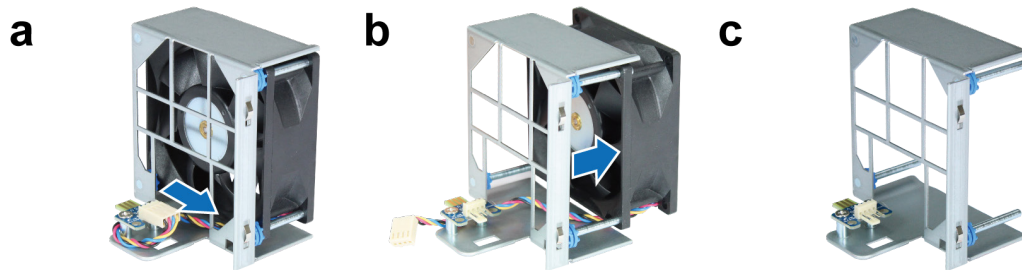
6 Slide a new fan into the casing. Plug the power cord into the power port.

a   **b**   **c**
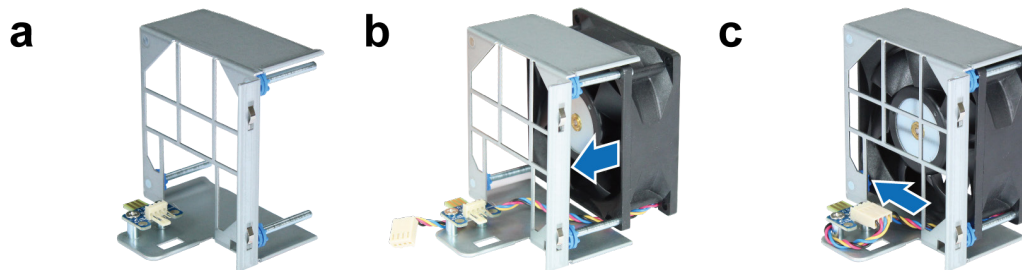
7 Slide the new cooling fan unit into the RackStation. Make sure the power port is aligned properly.
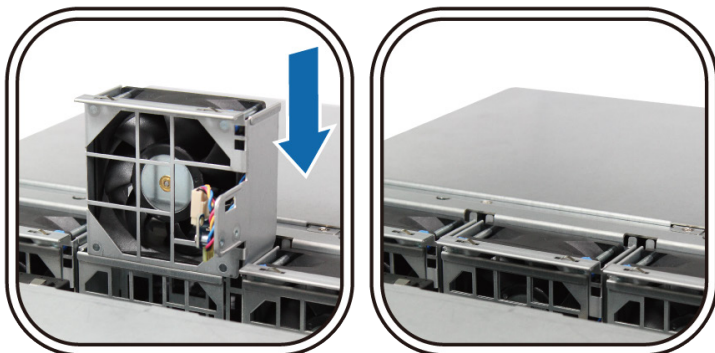
Start Up Your RackStation

1 Connect one end of the power cord to the power port located on the back of the RackStation.

2 Connect at least one LAN cable to one of the LAN ports and the other end to your switch, router, or hub.
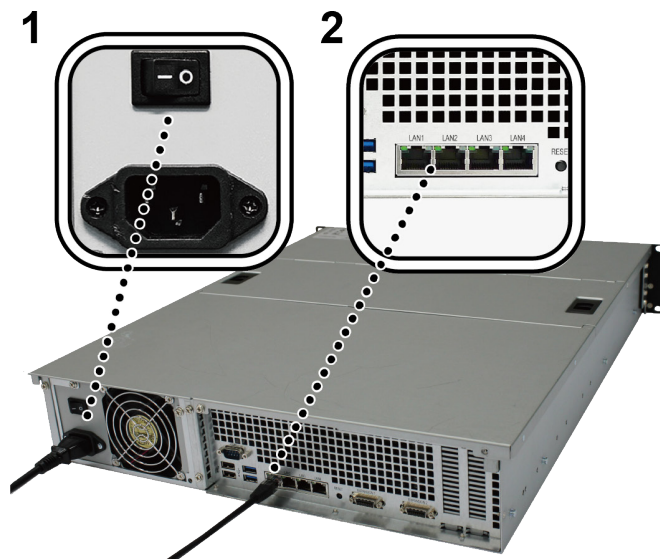
3 Make sure the Power Supply On/Off Switch is turned on ("|").

4 Press the power button to turn on the RackStation.

Your RackStation is now online and detectable from a network computer.

Install DSM on RackStation

After hardware setup is finished, please install DiskStation Manager (DSM) – Synology's browser-based operating system – on your RackStation.

Install DSM with Web Assistant

Your RackStation comes with a built-in tool called **Web Assistant** that helps you download the latest version of DSM from the Internet and install it on the RackStation. To use Web Assistant, please follow the steps below.

1 Power on the RackStation.

2 Open a web browser on a computer in the same network as the RackStation.

3 Enter either of the following into the address bar of your browser:

  a **find.synology.com**

  b **rackstation:5000**

4 Web Assistant will be launched in your web browser. It will search and find your RackStation within the local network. The status of your RackStation should be **Not Installed**.

5 Click **Connect** to start the setup process and follow the on-screen instructions.

> *Note:*
> 1. The RackStation must be connected to the Internet to install DSM with Web Assistant.
> 2. Suggested browsers: Chrome, Firefox.
> 3. Both the RackStation and the computer must be in the same local network.

Learn More

Congratulations! Your RackStation is now ready for action. For more information or online resources about your RackStation, please visit **www.synology.com**.

Specifications

Item	RS3617xs
Internal Drive	3.5" / 2.5" SATA III / SATA II x 12
Maximum Raw Capacity	• 96 TB (12 x 8 TB HDD) • 288 TB with RX1217/RX1217RP (expansion unit) x 2
External Device Port	• USB 3.0 x 2 • USB 2.0 x 2 • Expansion port x2 (Infiniband)
LAN Port	1GbE (RJ-45) x 4
PCIe Slot	PCIe x8 Slot x 2 (White slot links at x8 mode, black slot links at x4 mode)
Size (H x W x D) (mm)	• 88 x 480 x 605 (Including rack mount kits) • 88 x 445 x 570 (Not including rack mount kits)
Weight (kg)	15.5
Supported Client	• Windows 7 onwards • Mac OS X 10.10 onwards
File System	• Internal: Btrfs, ext4 • External: Btrfs, ext4, ext3, FAT, NTFS, HFS+
Supported RAID Type	• Basic • JBOD • RAID 0 • RAID 1 • RAID 5 • RAID 6 • RAID 10
Agency Certification	• FCC Class A • CE Class A • BSMI Class A
HDD Hibernation	Yes
Scheduled Power On/Off	Yes
Wake on LAN	Yes
Language Localization	• English • Deutsch • Français • Italiano • Español • Dansk • Norsk • Svensk • Nederlands • Русский • Polski • Magyar • Português do Brasil • Português Europeu • Türkçe • Český • 日本語 • 한국어 • 繁體中文 • 简体中文
Environment Requirement	• Line voltage: 100V to 240V AC • Frequency: 50/60Hz • Operating Temperature: 40 to 95˚F (5 to 35˚C) • Storage Temperature: -5 to 140˚F (-20 to 60˚C) • Relative Humidity: 5% to 95% RH

Note: Model specifications are subject to change without notice. Please refer to **www.synology.com** for the latest information.

LED Indicator Table

LED Indicator	Color	Status	Description
Power	Blue	Static	Powered on
		Blinking	Booting up / Shutting down
	Off		Powered off
STATUS	Green	Static	Volume normal
	Orange	Blinking	Volume degraded / Volume crashed
			Volume not created
			DSM not installed
	Off		HDD hibernation
ALERT	Orange	Blinking	Fan failure / Over temperature
	Off		System normal
Drive Status Indicator (on tray)	Green	Static	Drive ready and idle
		Blinking	Accessing drive
	Red	Static	Drive error / Port disabled[1]
	Off		No internal drive
Rear LAN (on left side of jack)	Green	Static	Network connected
		Blinking	Network active
	Off		No network
Rear LAN (on right side of jack)	Green	Static	Gigabit connection
	Orange	Static	100 Mbps connection
	Off		10 Mbps connection / No network

Note: Model specifications are subject to change without notice. Please refer to **www.synology.com** for the latest information.

[1] Please try to restart your RackStation or re-insert the drive(s), and then run the HDD/SSD manufacturer's diagnostic tool to check the health status of the drive(s). If you can log into DSM, please run the built-in S.M.A.R.T. test to scan the drive(s). If the problem remains unresolved, please contact Synology Technical Support for help.