



**QNAP**

# TS-h1283XU-RP

使用者指南

# 目錄

<b>1. 前言</b>	
關於本指南.....	3
適用對象.....	3
慣用符號.....	3
<b>2. 產品概觀</b>	
關於 TS-h1283XU-RP.....	4
硬體規格.....	4
包裝內容.....	6
元件.....	6
前方面板.....	7
背部面板.....	7
系統板.....	8
硬碟編號.....	9
安裝需求.....	9
安全資訊.....	9
設定 NAS.....	10
<b>3. 安裝與設定</b>	
硬體安裝.....	12
取下機殼蓋.....	12
裝上機殼蓋.....	13
硬碟安裝.....	14
更換記憶體模組.....	18
更換擴充卡.....	21
熱抽換備援電源供應器.....	24
機架滑軌.....	25
安裝擴充設備.....	25
QuTS hero 安裝.....	29
使用 Qfinder Pro 安裝 QuTS hero.....	30
使用 Cloud Key 安裝 QuTS hero.....	31
<b>4. 基本操作</b>	
電源按鈕.....	33
重設按鈕.....	33
LED 燈號.....	34
警示音.....	35
<b>5. 疑難排解</b>	
強制 Qfinder Pro 或 myQNAPcloud 定位 NAS.....	36
熱抽換故障硬碟.....	36
支援和其他資源.....	36
<b>6. 詞彙</b>	
CloudKey.....	38
myQNAPcloud Link.....	38
myQNAPcloud.....	38
myQNAPcloud ID.....	38
Qfinder Pro.....	38
QuTS hero.....	38

## 7. 聲明

有限保固.....	39
免責聲明.....	39
GNU Public License.....	39
CE 聲明.....	47
FCC 聲明.....	47
VCCI 聲明.....	47
經濟部標準檢驗局聲明.....	48
SJ/T 11364-2006.....	48

# 1. 前言





## 關於本指南

本指南涵蓋 QNAP TS-h1283XU-RP NAS 的相關資訊，以及安裝硬體的逐步指示。此外，本指南也提供基本操作說明與疑難排解資訊。

## 適用對象

本文件的適用對象為儲存裝置管理員。本指南預設使用者具有相關知識概念，且有能力安裝、維護儲存裝置並排解有關伺服器、伺服器元件和儲存系統的相關問題。本指南亦預設使用者受過相關訓練，能夠識別各種危險跡象，在發生危險時也知道該如何處理，以避免受傷及資料/資產受損。

## 慣用符號

符號	說明
	注意事項。用於提供預設組態設定與其他補充資訊。
	重要注意事項。用於提供必要組態設定及其他重要資訊。
	提示。用於提供任務執行或組態設定的建議或替代方式。
	警告。忽略此類資訊可能導致潛在損失、受傷甚至死亡事故。

## 2. 產品概觀

本章介紹 QNAP TS-h1283XU-RP NAS 的基本資訊。

### 關於 TS-h1283XU-RP

TS-h1283XU-RP 是一種企業級 NAS，搭載 Intel®Xeon®E -2236 處理器，並且可於最新的 QNAP QuTS hero 作業系統上執行。全新 QuTS hero 作業系統於功能強大的 ZFS 檔案系統上最佳化了 QuTS hero 應用程式。TS-h1283XU-RP 支援不同硬碟儲存設定，可加以滿足各類虛擬化和資料儲存需求。其同時配備四個長 DIMM 記憶體插槽（記憶體可擴充至 128 GB）、擴充卡插槽，以及各式輸入/輸出 (I/O) 連接埠，擴充性與靈活性十足。

### 硬體規格





#### 提示

型號規格如有變更，恕不另行通知。若要查看最新規格，請前往 <https://www.qnap.com>。

訂購料號	CPU	記憶體	電源供應器
TS-h1283XU-RP-E2236-32G	Intel® Xeon® E-2236	32 GB	備援
TS-h1283XU-RP-E2236-128G	Intel® Xeon® E-2236	128 GB	備援

元件	TS-h1283XU-RP-E2236-32G	TS-h1283XU-RP-E2236-128G
處理器		
CPU	Intel® Xeon® E-2236	
頻率	6 核心/12 執行緒 3.2 GHz 基頻/4.8 GHz 超頻	
架構	x86 64 位元	
加密引擎	AES-NI	
記憶體		
預載記憶體	32 GB RAM : 2 x 16 GB UDIMM DDR4 ECC	128 GB RAM : 4 x 32 GB UDIMM DDR4 ECC
記憶體插槽	4 x Long-DIMM DDR4	
	<div style="display: flex; align-items: center;"> <div style="text-align: center; margin-right: 10px;"> </div> <div> <p><b>重要</b></p> <ul style="list-style-type: none"> <li>僅限使用 QNAP 記憶體模組以維護系統效能和穩定性。若是具有一個以上記憶體插槽的 NAS 硬碟，請使用規格相同的 QNAP 記憶體模組。</li> <li>使用不支援的記憶體模組會導致效能降級、產生錯誤，或造成作業系統無法啟動。</li> </ul> </div> </div>	
最大記憶體	128 GB : 4 x 32 GB	
快閃記憶體	5 GB ( 雙啟動作業系統防護 )	
儲存		
硬碟插槽	12 x 3.5 吋 SATA 6 Gbps	
	<div style="display: flex; align-items: center;"> <div style="text-align: center; margin-right: 10px;"> </div> <div> <p><b>提示</b></p> <p>硬碟插槽與 SATA 3 Gbps 硬碟回溯相容。</p> </div> </div>	

元件	TS-h1283XU-RP-E2236-32G	TS-h1283XU-RP-E2236-128G
硬碟相容性	3.5 吋插槽： <ul style="list-style-type: none"> <li>• 3.5 吋 SATA 硬碟</li> <li>• 2.5 吋 SAS 硬碟</li> <li>• 2.5 吋 SATA 固態硬碟</li> </ul>	
SSD 快取加速技術支援	3.5 吋硬碟插槽：1 至 12	
熱抽換	此裝置支援熱抽換硬碟 (SSD 快取硬碟除外)。	
網路		
10 Gigabit 乙太網路埠	<ul style="list-style-type: none"> <li>• 2 x 10GbE SFP+ SmartNIC</li> <li>• 2 x 10GBase-T RJ45</li> </ul>	
Gigabit 乙太網路埠	4 x GbE RJ45	
外接 I/O 埠和擴充插槽		
PCIe 插槽	<ul style="list-style-type: none"> <li>• 1 x PCIe Gen 2.0 x4</li> <li>• 2 x PCIe Gen 3.0 x4</li> <li>• 1 x PCIe Gen 3.0 x8</li> </ul> <div style="border-left: 2px solid #ccc; padding-left: 10px; margin-top: 10px;"> <p> <b>提示</b></p> <ul style="list-style-type: none"> <li>• 兩個 PCIe 插槽已預先安裝 10GbE 網路擴充卡。如需詳細資訊，請參見：<a href="#">更換記憶體模組</a>。</li> <li>• 請前往 <a href="https://www.qnap.com/compatibility">https://www.qnap.com/compatibility</a> 查看相容的擴充卡清單。</li> </ul> </div>	
USB 連接埠	<ul style="list-style-type: none"> <li>• 2 x USB 3.2 Gen2 5V/3A 10Gbps C 型</li> <li>• 4 x USB 3.2 Gen2 5V/1A 10Gbps A 型</li> </ul>	
介面		
按鈕	<ul style="list-style-type: none"> <li>• 電源</li> <li>• 重設</li> </ul>	
尺寸		
外型	2U 機架式	
尺寸 (高 x 寬 x 深)	88.3 x 482 x 562 mm ( 3.48 x 18.98 x 22.13 吋 )	
淨重	11.75 kg (25.90 lbs)	
其他		
滑軌相容性	RAIL-B02 <div style="border-left: 2px solid #ccc; padding-left: 10px; margin-top: 10px;"> <p> <b>注意</b></p> <ul style="list-style-type: none"> <li>• NAS 不含機架滑軌，必須另外購買。如需詳細資訊，請聯絡授權經銷商或前往 <a href="http://shop.qnap.com">http://shop.qnap.com</a>。</li> <li>• 您可以在機架滑軌的包裝中找到安裝資訊。</li> </ul> </div>	

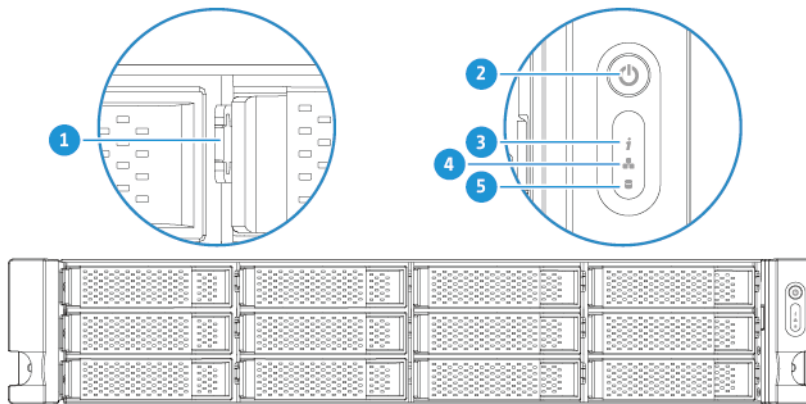
元件	TS-h1283XU-RP-E2236-32G	TS-h1283XU-RP-E2236-128G
電源供應器	TS-h1283XU-RP : 2 x 300W · 100-240V AC · 50/60Hz	
系統電池	CR2032 鋰電池 ( 3V · 225 mAh )   <b>重要</b> 請遵照當地法規或電池製造商的指示處置廢棄電池。	
噪音值	40.6 dB(A)   <b>注意</b> 從旁觀者位置 ( 距 NAS 一公尺內 ) 測試噪音值。在測試用的 NAS 中安裝最多數量的硬碟，並以低速運行。	
風扇	系統：2 x 60mm · 12V DC 風扇	
操作溫度	0°C 到 40°C ( 32°F 到 104°F )	
相對濕度	<ul style="list-style-type: none"> <li>不凝結相對溼度：5% 至 95%</li> <li>濕球溫度：27°C (80.6°F)</li> </ul>	

## 包裝內容

項目	數量
TS-h1283XU-RP	1
電源線	2
乙太網路線	<ul style="list-style-type: none"> <li>• 2 x 1GbE ( 黑色 Cat5e )</li> <li>• 2 x 10GbE ( 藍色 Cat6a )</li> </ul>
2.5 吋硬碟用螺絲	36
3.5 吋硬碟用螺絲	48
快速安裝手冊 (QIG)	1

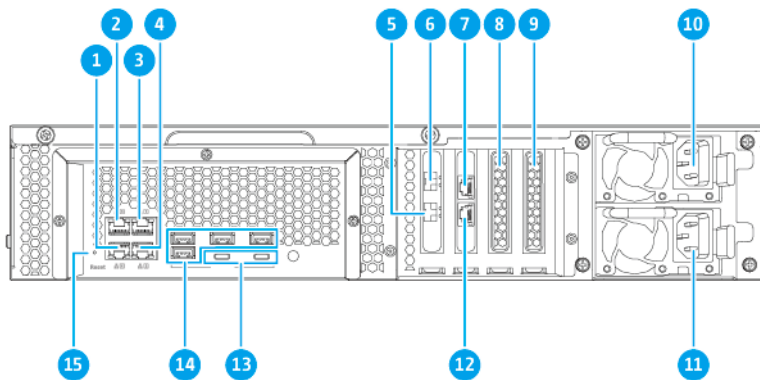
## 元件

## 前方面板



編號	元件	編號	元件
1	硬碟 LED 燈	4	LAN LED 燈
2	電源按鈕	5	擴充設備 LED 燈
3	狀態 LED 燈	-	-

## 背部面板

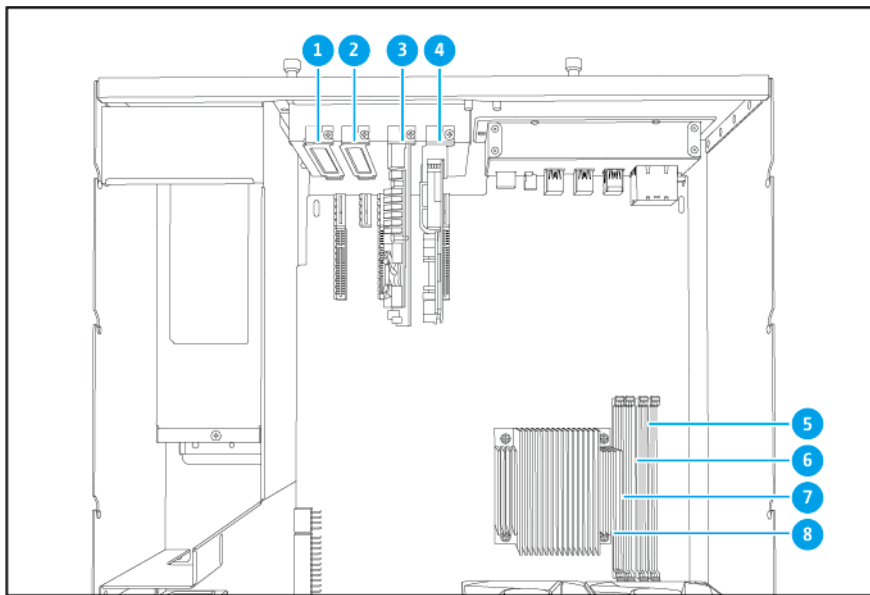




編號	元件	編號	元件
1	乙太網路埠 4 (GbE RJ45)	9	PCIe 2.0 x4 插槽 1
2	乙太網路埠 3 (GbE RJ45)	10	電源供應器 1



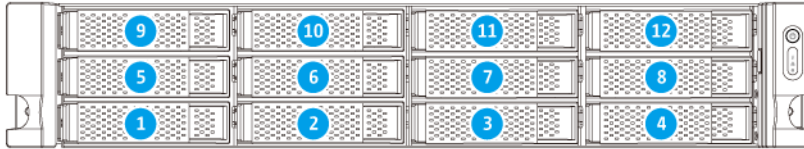
編號	元件	編號	元件
3	乙太網路埠 1 (GbE RJ45)	11	電源供應器 2
4	乙太網路埠 2 (GbE RJ45)	12	乙太網路埠 5 (10GbaseT RJ45)
5	乙太網路埠 7 (10GbE SFP+)	13	USB 3.2 Gen 2 C 型連接埠
6	乙太網路埠 8 (10GbE SFP+)	14	USB 3.2 Gen 2 A 型連接埠
7	乙太網路埠 6 (10GbaseT RJ45)	15	重設按鈕
8	PCIe 3.0 x8 插槽 2	-	-

## 系統板



編號	元件	編號	元件
1	PCIe 2.0 x4 插槽 1	5	記憶體插槽 1
2	PCIe 3.0 x8 插槽 2	6	記憶體插槽 2
3	PCIe 3.0 x4 插槽 3	7	記憶體插槽 3
	 <b>注意</b> 此 PCIe 槽已安裝一個雙埠 10GBASE-T RJ45 擴充卡。		
4	PCIe 3.0 x4 插槽 4	8	記憶體插槽 4
	 <b>注意</b> 此 PCIe 插槽已安裝一個雙埠 10 GbE SFP+ 擴充卡。		

## 硬碟編號



## 安裝需求

類別	項目
環境	<ul style="list-style-type: none"> <li>• 室溫：0°C 到 40°C ( 32°F 到 104°F )</li> <li>• 不凝結相對溼度：5% 至 95%</li> <li>• 濕球溫度：27°C (80.6°F)</li> <li>• 平坦且防靜電的表面，不受陽光直射，亦不與液體或化學物質接觸</li> </ul>
硬體和週邊設備	<ul style="list-style-type: none"> <li>• 儲存硬碟 請前往 <a href="https://www.qnap.com/compatibility">https://www.qnap.com/compatibility</a> 以查看相容的硬碟機型清單。</li> <li>• 網路線</li> </ul>
工具	<ul style="list-style-type: none"> <li>• 1 號或 2 號十字螺絲起子</li> <li>• 防靜電腕帶</li> </ul>

## 安全資訊

以下指示幫助確保人身安全及環境安全。執行任何操作前，請仔細閱讀本安全指示。

### 一般指示

- NAS 應放置在實施進出管制的場所，控管方式包括工具、鎖鑰或其他安全機制。
- 唯有具技能且獲得授權的合格裝置管理員能夠存取 NAS；合格裝置管理員必須熟悉所有管制方法、安全注意事項、安裝及保養程序。
- 為避免受傷或元件損壞，在觸碰硬碟及其他內部系統元件前，請先確認其是否已經冷卻。
- 請遵守靜電放電 (ESD) 程序以防止潛在傷害或元件損壞。

## 電源

- 為了降低走火或觸電風險，務必只將電源線連接至適當的接地電源插座。



裝置至少配備一條電源供應器 (PSU) 的電源線。為防止嚴重傷害事故發生，在安裝或替換系統元件前，應由受過訓練的技術人員拔下所有 PSU 電源線。

## 系統電池

- 更換電池時，請務必使用相同類型的電池，以免電池爆炸造成受傷或元件損壞。
- 請遵照當地法規或電池製造商的指示妥善處置廢棄電池。

## 移動零件



**轉動中之風扇葉片：**裝置連接至電源時，請使身體部位遠離轉動中之風扇葉片。



**移動元件：**使身體部位遠離其他移動元件。

## 設定 NAS



### 重要

設定 NAS 或安裝 NAS 元件前，請詳閱[安全資訊](#)中所有安全要求及資訊。

- 將 NAS 裝置放置在符合需求的環境。  
如需詳細資訊，請參見：[安裝需求](#)。
- 選擇性: 更換記憶體模組。  
如需詳細資訊，請參見：[更換記憶體模組](#)。
- 選擇性: 更換擴充卡。  
如需詳細資訊，請參見：[更換擴充卡](#)。
- 安裝硬碟。  
如需詳細資訊，請參見下列主題：
  - 在 3.5 吋托盤上安裝 3.5 吋硬碟
  - 在 3.5 吋托盤上安裝 2.5 吋硬碟或固態硬碟
- 連接電源線與所有適用的網路線。
- 開啟 NAS。
- 安裝 QuTS hero。  
如需詳細資訊，請參見：[QuTS hero 安裝](#)。

## 8. 登入 QuTS hero °

### 3. 安裝與設定

本章介紹特定硬體及韌體的安裝與設定步驟。

#### 硬體安裝

本節介紹安裝硬碟、記憶體模組以及擴充卡的相關資訊。

#### 取下機殼蓋



#### 警告

- 



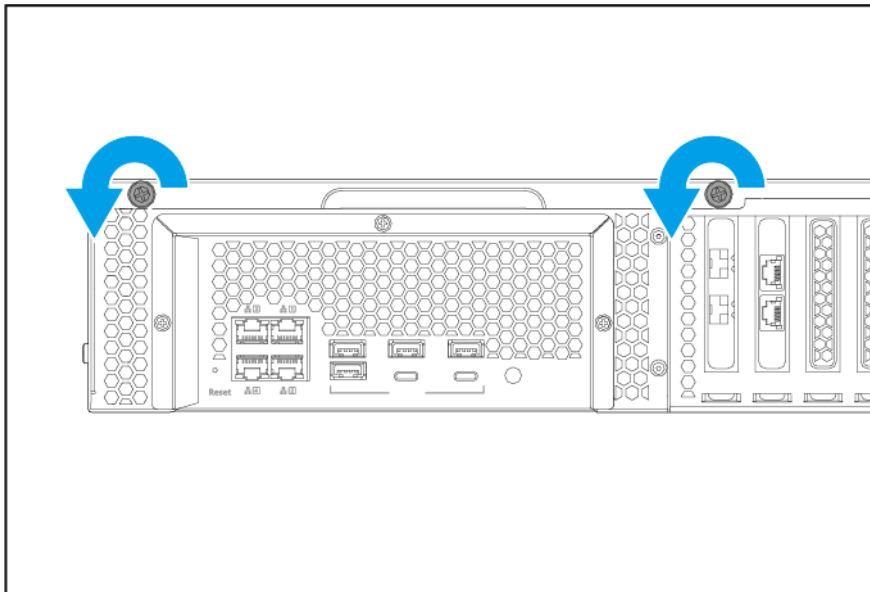
**轉動中之風扇葉片：**使雙手及其他身體部位遠離轉動中之風扇葉片。

- 



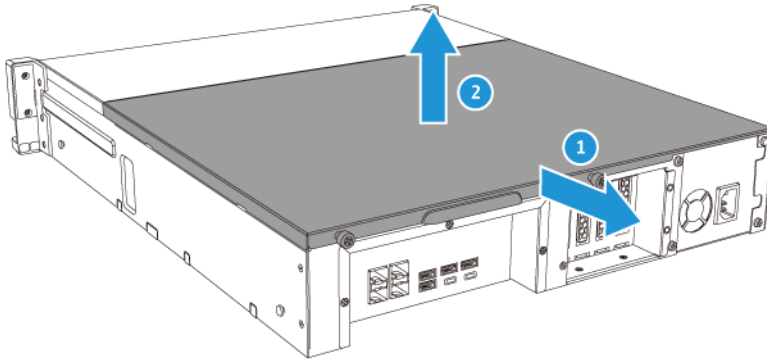
**其他移動元件：**使雙手及其他身體部位遠離其他移動元件。

1. 關閉 NAS 電源。
2. 從電源插座拔下電源線。
3. 中斷所有連接線和外接裝置的連線。
4. 取下機殼蓋。
  - a. 鬆開螺絲。



- b. 將殼蓋往後推。

- c. 提起殼蓋，使其脫離 NAS。



## 裝上機殼蓋



### 警告

•



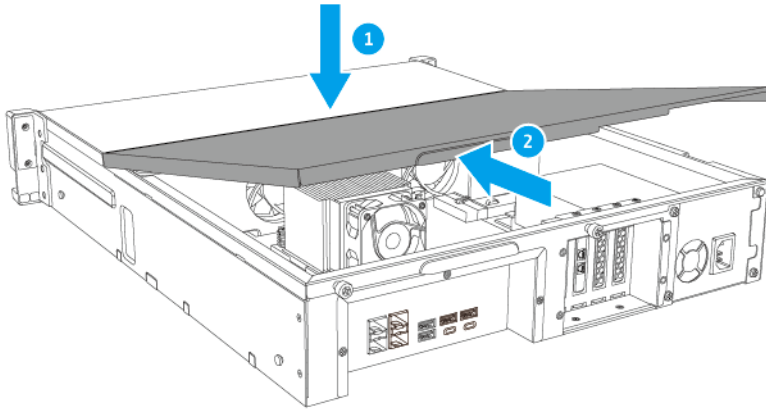
轉動中之風扇葉片：使雙手及其他身體部位遠離轉動中之風扇葉片。

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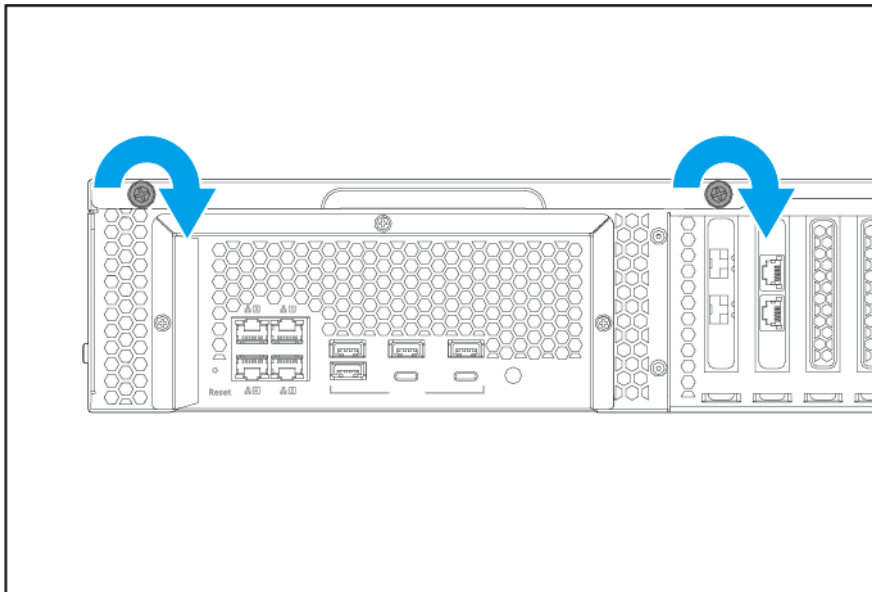


其他移動元件：使雙手及其他身體部位遠離其他移動元件。

1. 將機殼蓋放在 NAS 上。
2. 將殼蓋往前推。



### 3. 鎖緊螺絲。



4. 連上所有連接線和外接裝置。
5. 將電源線插入電源插座。
6. 開啟 NAS 電源。

## 硬碟安裝

TS-h1283XU-RP 與 3.5 吋 和 2.5 吋硬碟以及 2.5 吋固態硬碟相容。

### 在 3.5 吋托盤上安裝 3.5 吋硬碟

請前往 <https://www.qnap.com/compatibility> 以查看相容的硬碟機型清單。

**警告**

- 安裝硬碟與安裝 QuTS hero 會刪除硬碟上的所有資料。

- 



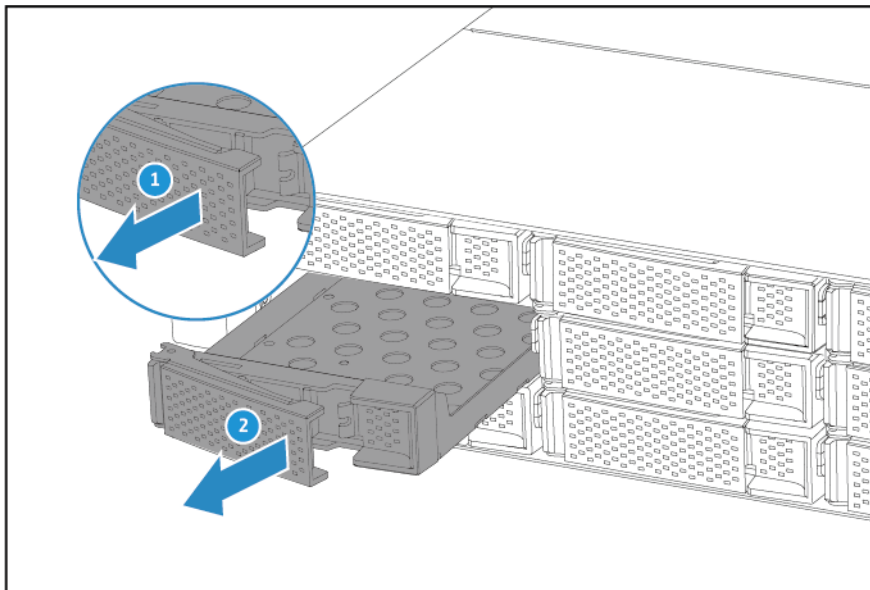
**轉動中之風扇葉片：**使雙手及其他身體部位遠離轉動中之風扇葉片。

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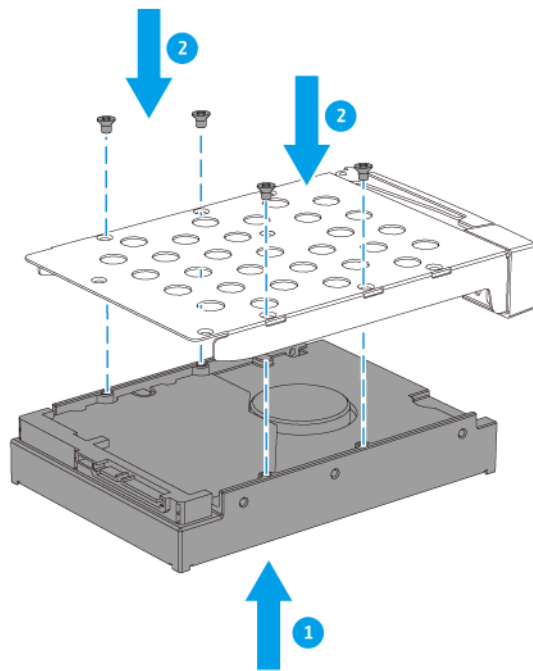
**其他移動元件：**使雙手及其他身體部位遠離其他移動元件。

1. 關閉 NAS 電源。
2. 抽出硬碟托盤。
  - a. 拉把手以鬆開托盤。
  - b. 將托盤拉出。

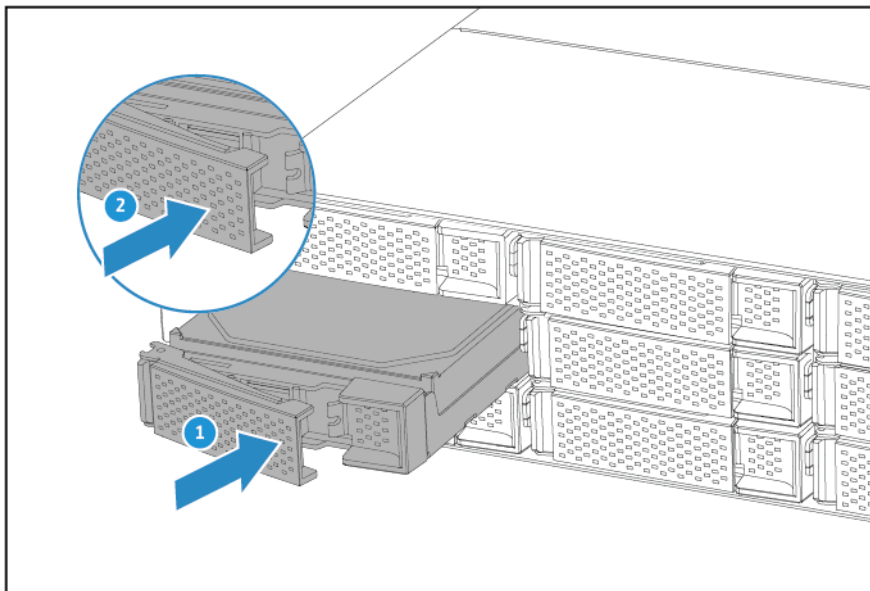


3. 在托盤上安裝硬碟。
  - a. 將硬碟放在托盤上，讓硬碟底部的孔洞與托盤底部的孔洞對齊。
  - b. 鎖上螺絲。





4. 將托盤裝入插槽。
  - a. 將托盤插入插槽。
  - b. 推入把手。



5. 開啟 NAS。

#### 在 3.5 吋托盤上安裝 2.5 吋硬碟或固態硬碟

請前往 <https://www.qnap.com/compatibility> 以查看相容的硬碟機型清單。

**警告**

- 安裝硬碟與安裝 QuTS hero 會刪除硬碟上的所有資料。

- 



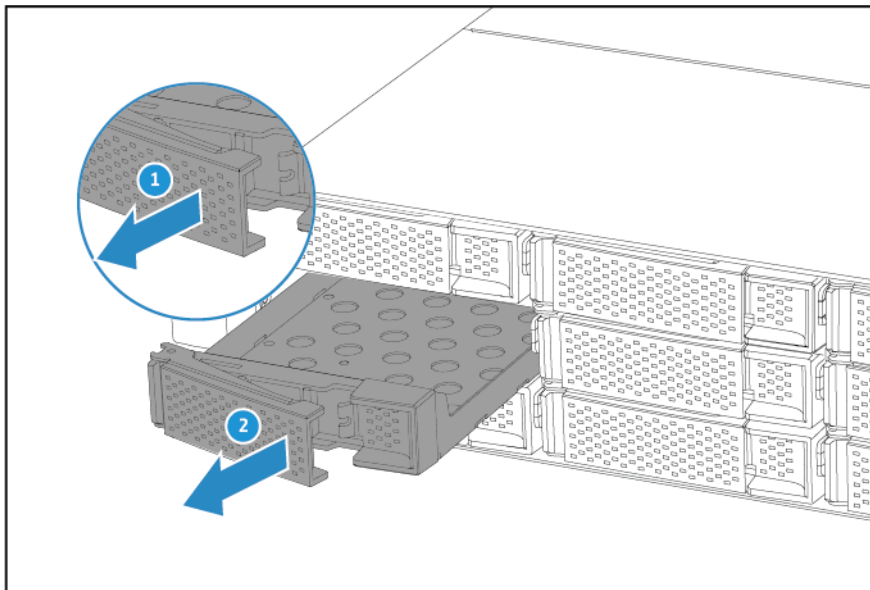
**轉動中之風扇葉片：**使雙手及其他身體部位遠離轉動中之風扇葉片。

- 

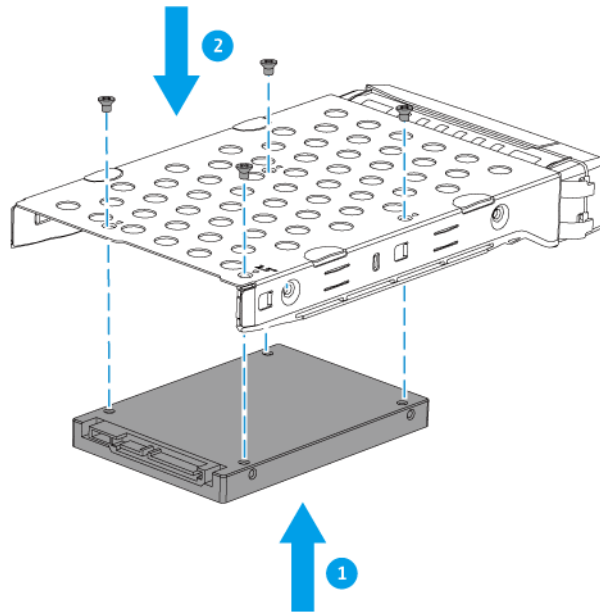


**其他移動元件：**使雙手及其他身體部位遠離其他移動元件。

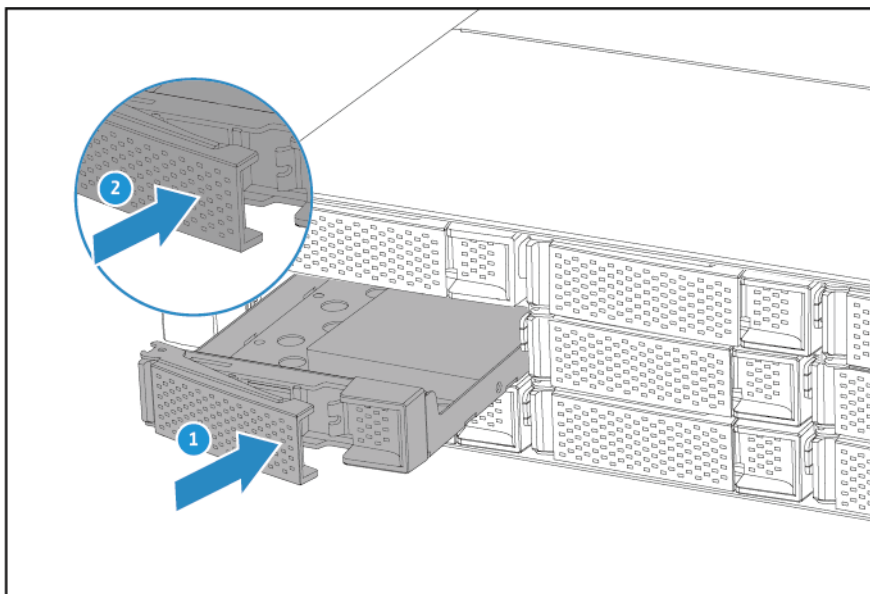
1. 關閉 NAS 電源。
2. 抽出硬碟托盤。
  - a. 拉把手以鬆開托盤。
  - b. 將托盤拉出。



3. 在托盤上安裝硬碟。
  - a. 將硬碟放在托盤上，讓硬碟底部的孔洞與托盤底部的孔洞對齊。
  - b. 鎖上螺絲。



4. 將托盤裝入插槽。
  - a. 將托盤插入插槽。
  - b. 推入把手。



5. 開啟 NAS。

### 更換記憶體模組

NAS 具有四個記憶體插槽。您可以升級記憶體模組以增加 NAS 的記憶體容量。

僅使用相同類型與容量的 QNAP 記憶體模組，以維持系統效能和穩定性。您可向授權經銷商購買 QNAP 記憶體模組。



### 重要

QNAP 建議成對安裝記憶體模組。

- 確認每對皆使用相同的記憶體模組。
- 按順序安裝記憶體模組組合，並依照文中指示裝在指定插槽。
- 將記憶體模組以兩個或四個為一組進行安裝。當安裝兩個記憶體模組時，請將記憶體安裝在插槽 1 和 3。當安裝四個模組時，則請將記憶體安裝在插槽 1、3、2 和 4。

如需插槽編號的詳細資訊，請參見：[系統板](#)。



### 警告

- 



**轉動中之風扇葉片：**使雙手及其他身體部位遠離轉動中之風扇葉片。

- 



**其他移動元件：**使雙手及其他身體部位遠離其他移動元件。

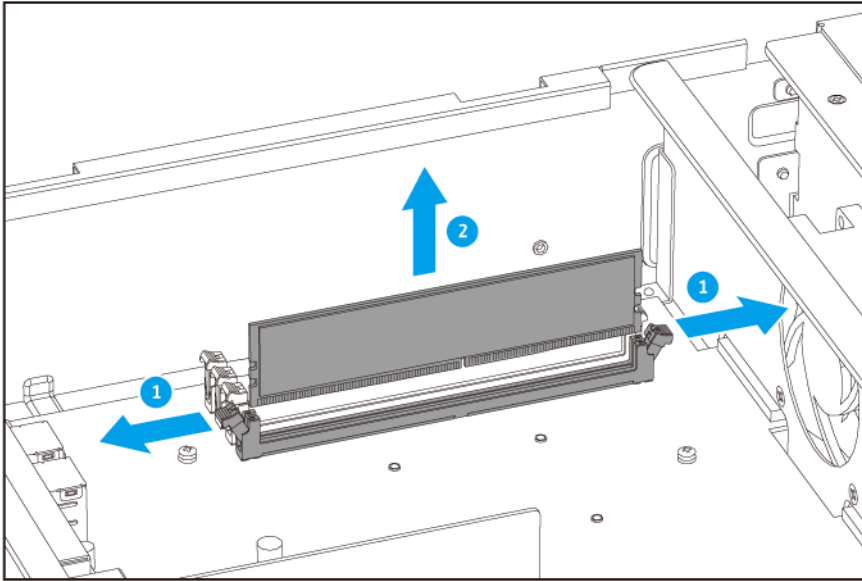
1. 關閉 NAS 電源。
2. 從電源插座拔下電源線。
3. 中斷所有連接線和外接裝置的連線。
4. 取下機殼蓋。  
如需詳細資訊，請參見：[取下機殼蓋](#)。
5. 取下現有的記憶體模組。
  - a. 將固定夾同時往外推以鬆開記憶體模組。



### 警告

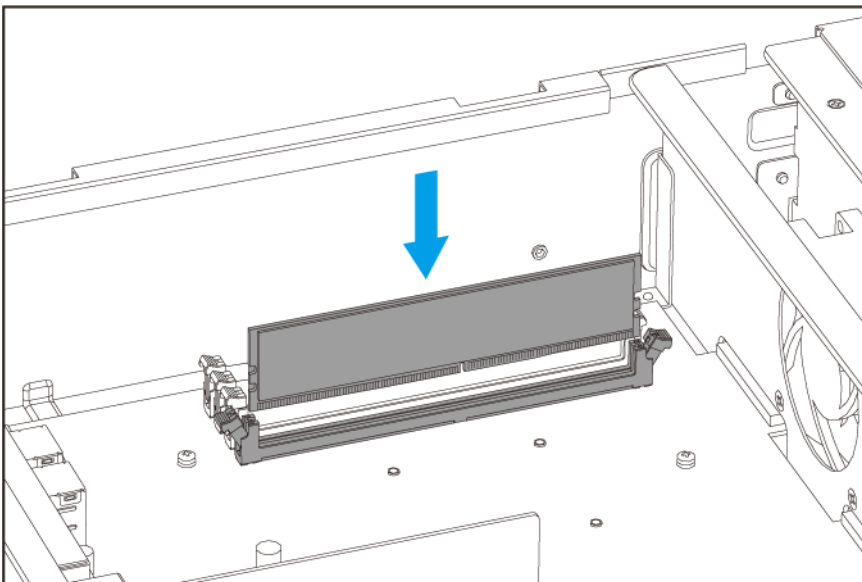
若嘗試取下未完全鬆脫的記憶體模組，可能會損壞記憶體模組與主機板。

- b. 握住模組的邊緣。



6. 安裝新的記憶體模組。

- a. 將接口與插槽的凸出部分對齊。
- b. 將記憶體模組插入插槽。
- c. 確認金屬接頭已完全插入插槽。
- d. 小心按下記憶體模組，直到固定夾正確扣住記憶體模組。



7. 裝上機殼蓋。  
如需詳細資訊，請參見：[裝上機殼蓋](#)。
8. 連上所有連接線和外接裝置。
9. 開啟 NAS。

10. 確認 NAS 可辨識記憶體模組。
  - a. 以管理員身分登入 QuTS hero。
  - b. 前往 [ 控制台 ] > [ 系統 ] > [ 系統狀態 ] > [ 硬體資訊 ]。
  - c. 查看 [ 總記憶體 ] 的值。

## 更換擴充卡

TS-h1283XU-RP 支援特定的擴充卡，其中部分需要使用 QNAP 短版 PCIe 固定片。在公司網站購買的 QNAP 品牌擴充卡會隨附所有 QNAP NAS 型號適用的必要固定片。



### 注意

PCIe 3.0 插槽 3 已預載雙埠 10Gbase-T RJ45 網路擴充卡，而 PCIe 3.0 插槽 4 上則預載了雙埠 10 GbE SFP+ 網路擴充卡。



### 警告

- 



轉動中之風扇葉片：使雙手及其他身體部位遠離轉動中之風扇葉片。

- 



其他移動元件：使雙手及其他身體部位遠離其他移動元件。

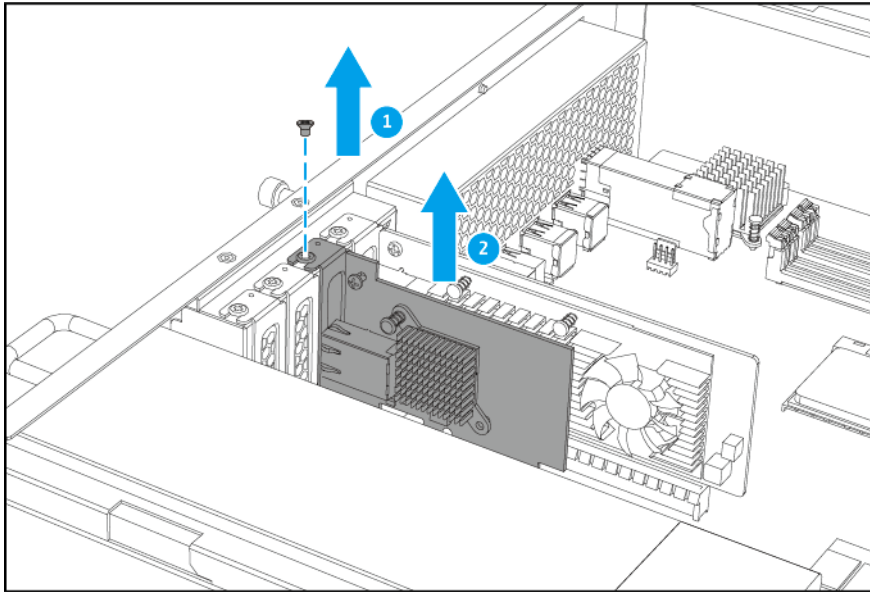
1. 關閉 NAS 電源。
2. 從電源插座拔下電源線。
3. 中斷所有連接線和外接裝置的連線。
4. 取下機殼蓋。  
如需詳細資訊，請參見：[取下機殼蓋](#)。



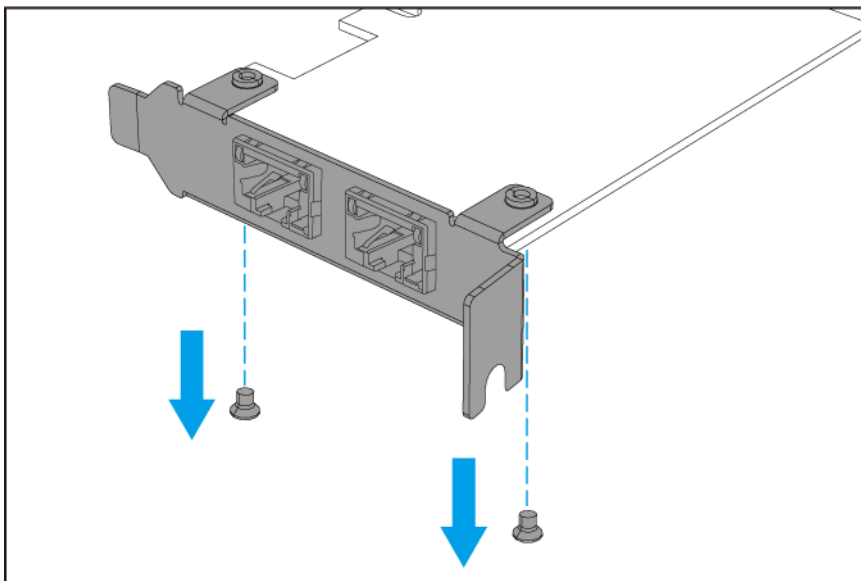
### 警告

為避免受傷或元件損壞，在觸碰硬碟及其他內部系統元件前，請先確認其是否已經冷卻。

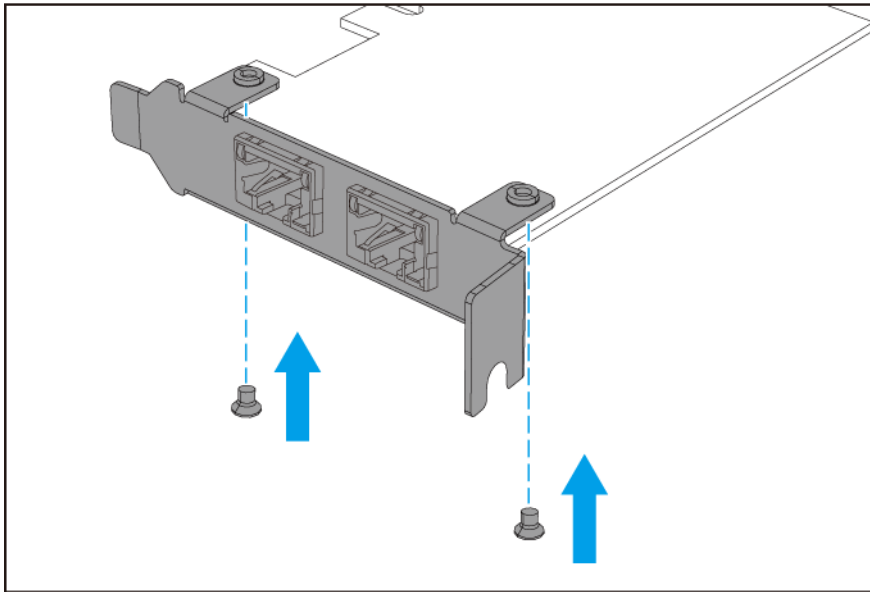
5. 取下現有的擴充卡。
  - a. 取下用於固定 PCIe 固定片和機殼的螺絲。
  - b. 握住擴充卡的邊緣。
  - c. 小心將卡拉出插槽。



6. 選擇性: 將 QNAP 固定片裝至擴充卡。
- a. 取下現有固定片的所有螺絲。
  - b. 小心地將固定片與擴充卡分開。

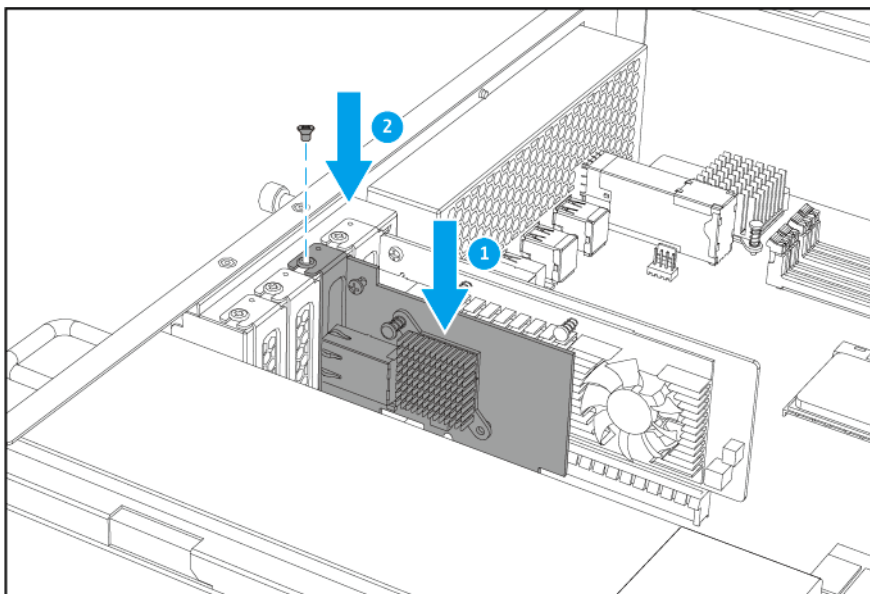


- c. 利用相同的螺絲將 QNAP 固定片裝至擴充卡。
- d. 確認固定片是否牢固不動。



7. 選擇性: 安裝擴充卡。

- a. 握住擴充卡的邊緣。
- b. 將擴充卡插入插槽。
- c. 鎖上螺絲。



8. 裝上機殼蓋。

如需詳細資訊，請參見：[裝上機殼蓋](#)。

9. 連上所有連接線和外接裝置。

10. 將電源線插入電源插座。

11. 開啟 NAS 電源。



## 熱抽換備援電源供應器

隨附備援電源供應器 (PSU) 的 NAS 裝置支援熱抽換。

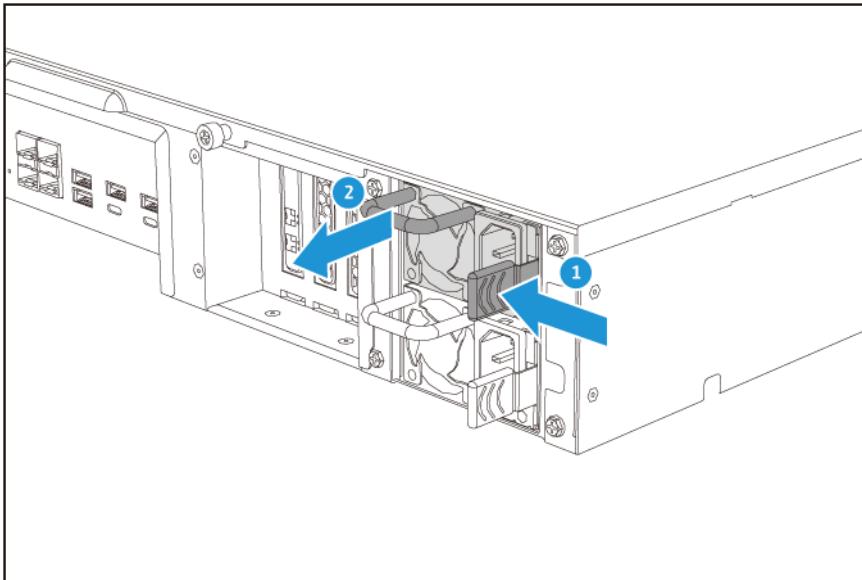


### 警告

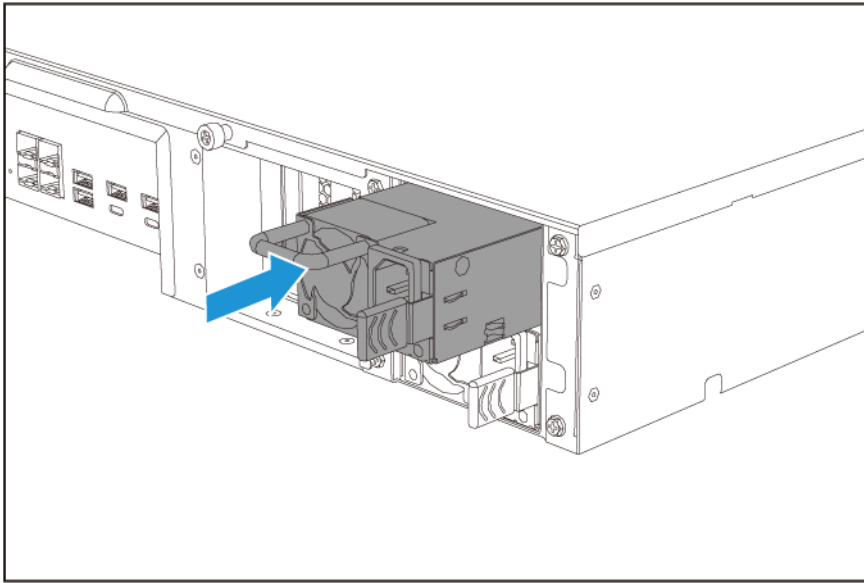


NAS 至少配備一條電源供應器 (PSU) 的電源線。為防止嚴重傷害事故發生，在安裝或替換系統元件前，應由受過訓練的技術人員拔下所有 PSU 電源線。

1. 關閉 NAS 電源。
2. 從電源插座和更換的電源供應器上拔下電源線。
3. 朝把手方向按住門門，然後拉出電源供應器。



4. 插入新的電源供應器。



5. 將電源線連上電源供應器並插入電源插座。
6. 開啟 NAS。
7. 啟用電源供應器故障警訊。
  - a. 以管理員身分登入 QuTS hero。
  - b. 前往 [ 控制台 ] > [ 系統 ] > [ 硬體 ] > [ 一般 ]。
  - c. 選擇 [ 啟動備援電源模式 ]。
  - d. 按一下 [ 全部套用 ]。

### 機架滑軌

NAS 不含機架滑軌，必須另外購買。如需詳細資訊，請聯絡授權經銷商或前往 <http://shop.qnap.com>。

TS-h1283XU-RP 與下列機架滑軌型號相容：

- RAIL-B02

您可以在機架滑軌的包裝中找到安裝資訊。

### 安裝擴充設備

TS-h1283XU-RP 支援 SAS 擴充設備、USB 擴充設備和 SATA JBOD 擴充設備。如需詳細資訊，請參見下方表格。

您可以向 QNAP 或授權經銷商購買儲存擴充配件。

如需詳細資訊，請瀏覽：<https://shop.qnap.com/>。

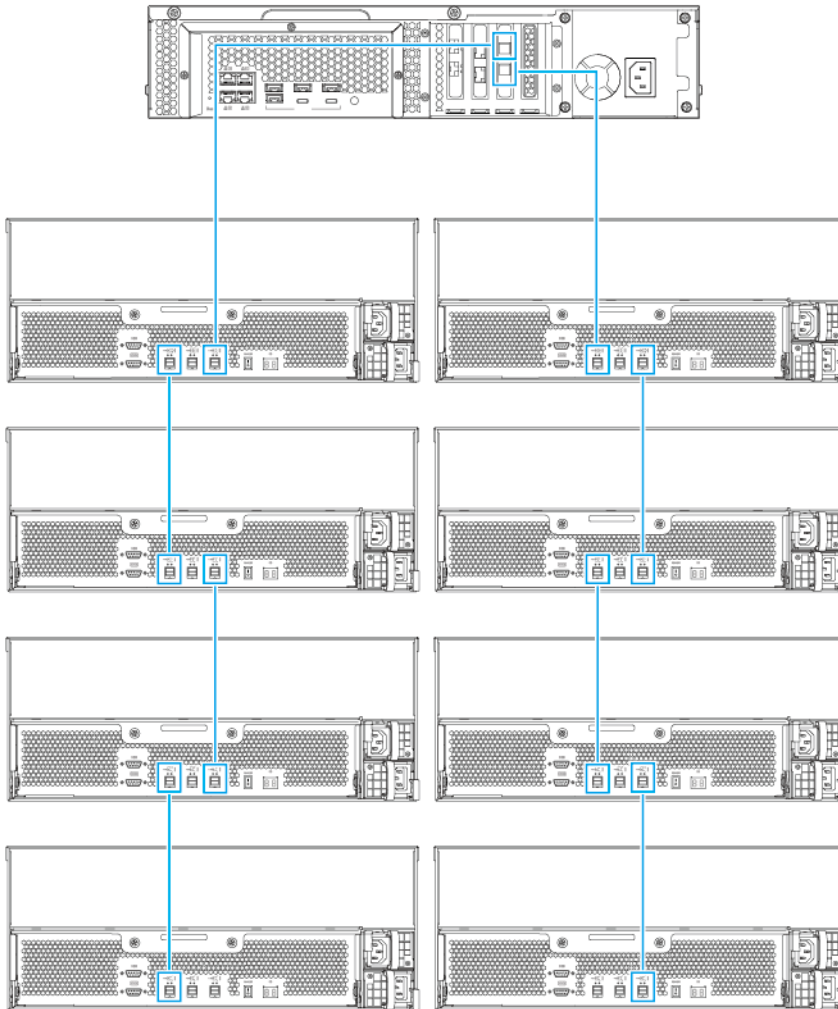
如需相容擴充設備清單以及適用擴充設備的數量上限，請前往：<http://www.qnap.com/go/compatibility-expansion>。

擴充設備類型	說明	必要配件	
REXP-1620U-RP	<ul style="list-style-type: none"> <li>• 使用 SAS 12 Gbps (SFF-8644) 介面</li> <li>• 支援 SAS/SATA HDD/SSD</li> </ul>	<ul style="list-style-type: none"> <li>• SAS-12G2E 儲存擴充卡</li> <li>• Mini-SAS SFF-8644 連接線</li> <li>• RAIL-A03-57</li> </ul>	
REXP-1220U-RP			
REXP-1610U-RP			
REXP-1210U-RP			
TL-D400S	<ul style="list-style-type: none"> <li>• 使用 SAS 6 Gbps (SFF-8088) 介面</li> <li>• 支援 SATA/HDD/SSD</li> </ul>	<ul style="list-style-type: none"> <li>• 1 x SFF-8088 接頭纜線</li> <li>• QXP-400eS-A1164 主機匯流排介面卡</li> </ul>	
TL-D800S		<ul style="list-style-type: none"> <li>• 2 x SFF-8088 接頭纜線</li> <li>• QXP-800eS-A1164 主機匯流排介面卡</li> </ul>	
TL-D1600S		<ul style="list-style-type: none"> <li>• 4 x SFF-8088 轉 SFF-8644 接頭纜線</li> <li>• QXP-1600eS 主機匯流排介面卡</li> </ul>	
TL-R400S		<ul style="list-style-type: none"> <li>• 1 x SFF-8088 接頭纜線</li> <li>• QXP-400eS-A1164 主機匯流排介面卡</li> <li>• RAIL-B02</li> </ul>	
TL-R1200S-RP		<ul style="list-style-type: none"> <li>• 3 x SFF-8088 轉 SFF-8644 接頭纜線</li> <li>• QXP-1600eS 主機匯流排介面卡</li> <li>• RAIL-B02</li> </ul>	
TR-002		<ul style="list-style-type: none"> <li>• 使用 USB 3.2 Gen 2 C 型介面</li> <li>• 支援 SATA</li> </ul>	USB 3.2 Gen 2 A 型轉 C 型連接線
TR-004		<ul style="list-style-type: none"> <li>• 使用 USB 3.2 Gen 1 C 型介面</li> <li>• 支援 SATA</li> </ul>	USB 3.2 Gen 1 A 型轉 C 型連接線
TR-004U	<ul style="list-style-type: none"> <li>• USB 3.2 Gen 1 A 型轉 C 型連接線</li> <li>• RAIL-B02</li> </ul>		
TL-D800C	<ul style="list-style-type: none"> <li>• 使用 USB 3.2 Gen 2 C 型介面</li> <li>• 支援 SATA</li> </ul>	USB 3.2 Gen 2 A 型轉 C 型連接線	
TL-R1200C-RP		<ul style="list-style-type: none"> <li>• USB 3.2 Gen 2 A 型轉 C 型連接線</li> <li>• RAIL-B02</li> </ul>	

### 連接 SAS 擴充設備

若要連接 TS-h1283XU-RP 至 SAS 擴充設備，NAS 必須安裝儲存擴充卡。如需必要配件的詳細資訊，請參見：[安裝擴充設備](#)。

1. 在 PCIe 插槽安裝儲存擴充卡。  
如需詳細資訊，請參見：[更換擴充卡](#)。
2. 請按照下列拓樸圖，將擴充設備連接到 NAS。



3. 開啟擴充設備的電源。
4. 確認 NAS 可辨識所有擴充設備。
  - a. 以管理員身分登入 QuTS hero。
  - b. 前往 [ 主選單 ] > [ 儲存與快照總管 ] > [ 總覽 ] > [ 系統 ]。
  - c. 確認畫面列出擴充設備。

## 連線 SATA JBOD 擴充設備

若要連接 TS-h1283XU-RP 至 SATA JBOD 擴充設備，必須先在 NAS 安裝主機匯流排介面卡。如需必要配件的詳細資訊，請參見：[安裝擴充設備](#)。

1. 關閉 NAS 電源。
2. 在 PCIe 插槽安裝主機匯流排介面卡。

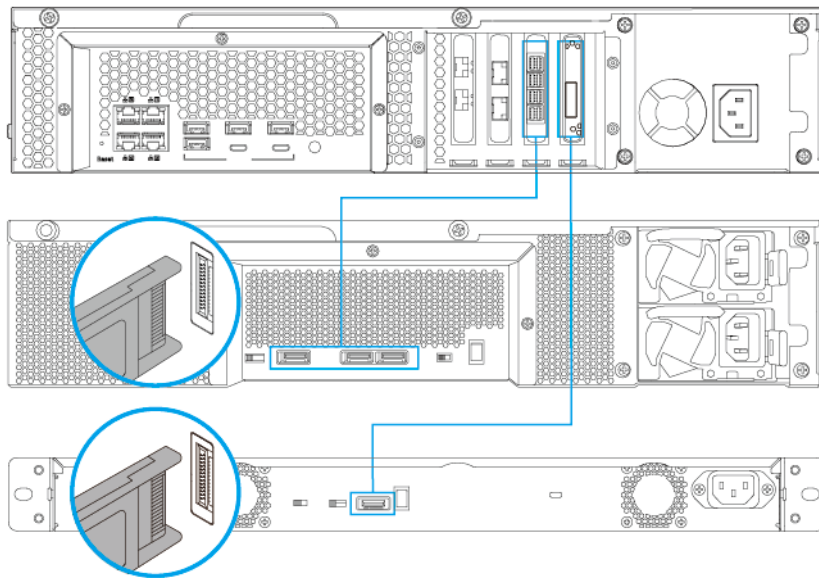


### 重要

連接 SATA JBOD 擴充裝置至主機裝置需要 QNAP QXP 主機匯流排介面卡。第三方主機匯流排介面卡與 QNAP JBOD 擴充裝置不相容。

如需詳細資訊，請參見：[更換擴充卡](#)。

3. 請按照下列拓模圖，將擴充設備連接到 NAS。



### 注意

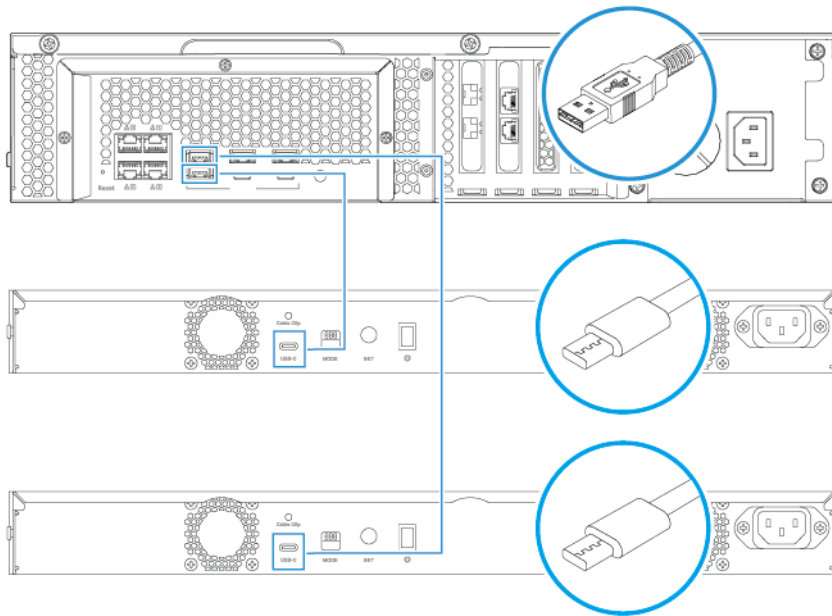
本圖顯示 NAS 連接至 JBOD 擴充設備 TL-R400S 及 TL-R1200S-RP。

4. 開啟 SATA JBOD 擴充設備的電源。
5. 開啟 NAS。
6. 確認 NAS 可辨識所有擴充設備。
  - a. 以管理員身分登入 QuTS hero。
  - b. 前往 [ 主選單 ] > [ 儲存與快照總管 ] > [ 總覽 ] > [ 系統 ]。
  - c. 確認畫面列出擴充設備。

## 連接 USB 擴充設備

若要将 TS-h1283XU-RP 連接到 USB 擴充設備，需要使用 USB A 型轉 USB C 型的連接線或轉接器。如需必要配件的詳細資訊，請參見：[安裝擴充設備](#)。

1. 將擴充設備連接至 NAS。
  - a. 將 USB 連接線接至擴充設備上的 USB C 型連接埠。
  - b. 將 USB 連接線接至 NAS 上的 USB 3.2 Gen 1 A 型連接埠。



2. 開啟擴充設備的電源。
3. 確認 NAS 可辨識所有擴充設備。
  - a. 以管理員身分登入 QuTS hero。
  - b. 前往 [ 主選單 ] > [ 儲存與快照總管 ] > [ 總覽 ] > [ 系統 ]。
  - c. 確認畫面列出擴充設備。

## QuTS hero 安裝

TS-h1283XU-RP 使用 QNAP QuTS hero 作業系統。您可以使用下列其中一種方式安裝 QuTS hero：

方法	描述	需求
Qfinder Pro 安裝 (建議使用)	<p>如果 NAS 已連接您的區域網路，您可以執行下列操作：</p> <ul style="list-style-type: none"> <li>• 使用 Qfinder Pro 定位 NAS。</li> <li>• 完成「智慧安裝導引」精靈中的步驟。</li> </ul> <p>如需詳細資訊，請參見：<a href="#">使用 Qfinder Pro 安裝 QuTS hero</a>。</p>	<ul style="list-style-type: none"> <li>• 電腦</li> <li>• 網路線</li> <li>• Qfinder Pro 安裝程式</li> </ul>

方法	描述	需求
雲端安裝	<p>如果 NAS 已連接網際網路，您可以執行下列操作：</p> <ul style="list-style-type: none"> <li>• 掃描 NAS 上的 QR 碼。</li> <li>• 登入 myQNAPcloud 帳號。</li> <li>• 使用 myQNAPcloud Link 遠端存取您的 NAS。</li> <li>• 完成「智慧安裝導引」精靈中的步驟。</li> </ul> <p>如需詳細資訊，請參見：<a href="#">使用 Cloud Key 安裝 QuTS hero</a>。</p>	<ul style="list-style-type: none"> <li>• 電腦或行動裝置。</li> <li>• 網路線</li> <li>• myQNAPcloud 帳號</li> <li>• CloudKey</li> </ul>

## 使用 Qfinder Pro 安裝 QuTS hero



### 警告

安裝 QuTS hero 會刪除硬碟上的所有資料。繼續操作前請先備份資料。



### 注意

您可以隨時回復到 QTS 作業系統。如需詳細資訊，請參見《QuTS hero 使用者指南》。

1. 打開 NAS 電源。
2. 將 NAS 連接至區域網路。
3. 在連接相同區域網路的電腦上執行 Qfinder Pro。



### 注意

若要下載 Qfinder Pro，請前往 <https://www.qnap.com/utilities>。

4. 在清單中找到 NAS，然後按兩下它的名稱或 IP 位址。  
「智慧安裝導引」隨即在預設的網頁瀏覽器中開啟。
5. 按一下 [ 啟動智慧安裝導引 ]。
6. 輸入下列資訊：
  - **NAS 名稱**：輸入 1 到 14 個字元的名稱。名稱支援使用英文字母 (A 到 Z、a 到 z)、數字 (0 到 9) 以及連字號 (-)，但不能以連字號做結尾。
  - **密碼**：指定 1 到 64 個字元的管理員密碼。密碼支援使用所有 ASCII 字元。
7. 按一下 [ 下一步 ]。
8. 指定時區、日期和時間。



### 提示

QNAP 建議連接至 NTP 伺服器，以確保 NAS 符合國際標準時間 (UTC) 的標準。

9. 按一下 [ 下一步 ]。
10. 選擇 [ 自動取得 IP 位址 (DHCP) ]。
11. 按一下 [ 下一步 ]。

12. 選擇將用於存取 NAS 共用資料夾的裝置類型。
13. 按一下 [ 下一步 ]。
14. 檢視設定值。
15. 按一下 [ 套用 ]。  
確認訊息隨即出現。

**警告**

按一下 [ 確認 ] 後，系統會在安裝 QuTS hero 前刪除硬碟的所有資料。

16. 按一下 [ 確認 ]。  
QuTS hero 已安裝。

## 使用 Cloud Key 安裝 QuTS hero

**警告**

安裝 QuTS hero 會刪除硬碟上的所有資料。繼續操作前請先備份資料。

**注意**

您可以隨時回復到 QTS 作業系統。如需詳細資訊，請參見《QuTS hero 使用者指南》。

1. 打開 NAS 電源。
2. 將 NAS 連接至網際網路。
3. 使用下列其中一種方式前往 QNAP 雲端安裝頁面：
  - 使用電腦前往 <http://install.qnap.com/>。
  - 使用行動裝置掃描 NAS 上的 QR 碼。

該網頁列出區域網路內所有未初始化的 QNAP NAS 裝置。

4. 在清單中找出自己的 NAS，然後按一下 [ 初始化 ]。

**注意**

如果未列出您的 NAS，請按照網頁上的指示指定 NAS 的 Cloud Key。

安裝精靈隨即在預設的網頁瀏覽器中開啟。

5. 建立帳號或登入 myQNAPcloud。

**注意**

建立帳號之後，必須返回此頁面完成安裝步驟。

6. 指定 NAS 的 myQNAPcloud 裝置名稱。

**注意**

- 遠端存取 NAS 時，需要用到 myQNAPcloud 裝置名稱。
- 基於安全考量，NAS 將於初始化後停用 myQNAPCloud Link 遠端連線服務。日後若要再度啟用，請透過區域網路連接至 QuTS hero，然後安裝 myQNAPCloud Link。

7. 按一下 [ 下一步 ]。  
「智慧安裝導引」隨即在預設的網頁瀏覽器中開啟。



8. 按一下 [ 啟動智慧安裝導引 ] 。
9. 輸入下列資訊：
  - **NAS 名稱**：輸入 1 到 14 個字元的名稱。名稱支援使用英文字母 ( A 到 Z、a 到 z )、數字 ( 0 到 9 ) 以及連字號 (-)，但不能以連字號做結尾。
  - **密碼**：指定 1 到 64 個字元的管理員密碼。密碼支援使用所有 ASCII 字元。
10. 按一下 [ 下一步 ] 。
11. 指定時區、日期和時間。

**提示**

QNAP 建議連接至 NTP 伺服器，以確保 NAS 符合國際標準時間 (UTC) 的標準。

12. 按一下 [ 下一步 ] 。
- [ 編輯網路設定 ] 畫面隨即出現。
13. 選擇 [ 自動取得 IP 位址 (DHCP) ] 。
- 您也可以選擇固定 IP 位址配置選項來滿足網路需求。您只能應用一種網路配置方法。
14. 按一下 [ 下一步 ] 。
- [ 跨平台檔案傳輸服務 ] 畫面隨即出現。
15. 選擇將用於存取 NAS 共用資料夾的裝置類型。
16. 按一下 [ 下一步 ] 。
- [ 摘要 ] 視窗隨即顯示。
17. 檢視設定值。
18. 按一下 [ 套用 ] 。
- 確認訊息隨即出現。

**警告**


按一下 [ 確認 ] 後，系統會在安裝 QuTS hero 前刪除硬碟的所有資料。

19. 按一下 [ 確認 ] 。
- QuTS hero 已安裝。

## 4. 基本操作

本章介紹 NAS 的基本操作。

### 電源按鈕

操作	使用者動作	結果
開啟電源	按一下按鈕。	NAS 電源開啟。
關閉電源	按住按鈕 1.5 秒。	NAS 電源關閉。
強制關機	按住按鈕 5 秒。	NAS 關機。   <b>重要</b> 僅在 NAS 沒有回應時使用此方法。

### 重設按鈕

操作	使用者動作	結果
系統基本重設	按住按鈕 3 秒。	<p>以下設定將回復至預設值：</p> <ul style="list-style-type: none"> <li>系統管理員密碼：無特殊字元的介面卡 1 MAC 位址。例如，若介面卡 1 的 MAC 位址為 11:22:33:44:55:66，則管理員密碼為 112233445566。</li> </ul> <p> <b>提示</b> 您可以透過 Qfinder Pro 找到介面卡 1 MAC 位址。黏貼至裝置的標籤亦將位址列為 MAC1。</p> <ul style="list-style-type: none"> <li>TCP/IP 設定： <ul style="list-style-type: none"> <li>使用動態 IP 位址</li> <li>停用 Jumbo Frame</li> <li>若已啟用 Port Trunking (僅適用於支援多 LAN 的型號)，系統將重設為「Active Backup (網路容錯)」模式。</li> </ul> </li> <li>系統通訊埠：8080 (系統服務埠)</li> <li>安全等級：低 (接受所有連線)</li> <li>LCD 面板密碼：(空白)</li> <li>VLAN：已停用</li> </ul>
系統進階重設	按住按鈕 15 秒。	<p>回復為出廠預設值。</p> <ul style="list-style-type: none"> <li>若要在系統進階重設後取得舊有資料，請在 NAS 上重建先前的資料夾結構。</li> </ul>

## LED 燈號

LED 燈號指示 NAS 開機時的系統狀態與相關資訊。下列 LED 燈號資訊僅適用於已正確安裝硬碟，且 NAS 已連線至網路的狀態下。

如需 LED 燈號的位置資訊，請參見：[前方面板](#)。

LED	狀態	說明
系統狀態	綠燈與紅燈每 0.5 秒交錯閃爍	<ul style="list-style-type: none"> <li>• 硬碟正在格式化。</li> <li>• NAS 正在初始化。</li> <li>• 作業系統正在更新。</li> <li>• RAID 重建作業正在進行。</li> <li>• 線上 RAID 容量擴充正在進行。</li> <li>• 線上 RAID 組態遷移正在進行。</li> </ul>
	紅燈	<ul style="list-style-type: none"> <li>• 硬碟無效。</li> <li>• 磁碟區容量已滿。</li> <li>• 磁碟區容量將滿。</li> <li>• 系統風扇異常。</li> <li>• 資料存取（讀寫）錯誤。</li> <li>• 硬碟壞軌。</li> <li>• NAS 處於降階唯讀模式（RAID 5 或 RAID 6 有兩個硬碟故障，但資料仍可讀取）。</li> <li>• 硬體自我檢查發生錯誤。</li> </ul>
	紅燈每 0.5 秒閃爍	NAS 處於降階模式（RAID 1、RAID 5 或 RAID 6 有一個硬碟故障）。
	綠燈每 0.5 秒閃爍	<ul style="list-style-type: none"> <li>• NAS 啟動中。</li> <li>• NAS 未設定。</li> <li>• 硬碟未格式化。</li> </ul>
	綠燈	NAS 已就緒。
硬碟	關閉	所有硬碟處於待命模式。
	綠燈	硬碟已就緒。
	綠燈閃爍	正在存取硬碟。
	紅燈	發生讀寫錯誤。
擴充設備	紅燈閃爍	在 QuTS hero 上找到硬碟。
	橙燈	已連接一個擴充設備。
LAN	關閉	未連接擴充設備。
	橙燈	NAS 網路連線使用中。
	橙燈閃爍	正在存取 NAS。
	關閉	無網路連結。

## 警示音

期間	頻率	描述
短嗶 ( 0.5 秒 )	1 聲	<ul style="list-style-type: none"> <li>• NAS 啟動中。</li> <li>• NAS 關閉中 ( 軟體關機 )。</li> <li>• 使用者按下 [ 重設 ] 按鈕。</li> <li>• 作業系統已更新。</li> </ul>
	3 聲	使用者嘗試將 NAS 資料複製到正面 USB 埠中的外接儲存裝置，但資料無法複製。
短嗶 ( 1.5 秒 )	3 聲 ( 每 5 分鐘 )	系統風扇異常。
	2 聲	<ul style="list-style-type: none"> <li>• 磁碟區容量將滿。</li> <li>• 磁碟區容量已滿。</li> <li>• 硬碟進入降階模式。</li> <li>• 使用者開始硬碟重建程序。</li> <li>• 插入或抽出硬碟。</li> </ul>
	1 聲	<ul style="list-style-type: none"> <li>• NAS 強制關機 ( 硬體關機 )。</li> <li>• NAS 成功開機且可供使用。</li> </ul>

## 5. 疑難排解

本章介紹基本的疑難排解資訊。

### 強制 Qfinder Pro 或 myQNAPcloud 定位 NAS

如果 Qfinder Pro 或 myQNAPcloud 在安裝 QuTS hero 期間找不到 NAS，表示硬碟或資料出現問題。

1. 關閉 NAS 電源。
2. 移除所有硬碟。
3. 開啟 NAS。
4. 使用 Qfinder Pro 或 myQNAPcloud 定位 NAS。
5. 將硬碟重新插入。
6. 繼續執行 QuTS hero 安裝作業。

### 熱抽換故障硬碟

NAS 支援熱插拔下列情況的硬碟：

- RAID 1：一個硬碟故障
- RAID 5：一個硬碟故障
- RAID 6：一或兩個硬碟故障

1. 登入 QuTS hero。
2. 前往 [ 主選單 ] > [ 儲存空間總管 ] > [ 儲存空間 ] > [ 磁碟/VJBOD ]。
3. 找出故障的硬碟。
4. 準備一個新的硬碟，且容量至少與故障硬碟相同。
5. 將 NAS 的故障硬碟拔出。
6. 等待 20 秒或等到 NAS 發出兩次嗶聲。
7. 將故障硬碟從硬碟托盤取下。
8. 將新的硬碟插入硬碟托盤。
9. 安裝新的硬碟。  
NAS 會發出兩次嗶聲。
10. 前往 [ 主選單 ] > [ 儲存空間總管 ] > [ 儲存空間 ]。
11. 找出新硬碟所在的磁碟區，然後確認其狀態為重建中。

### 支援和其他資源

QNAP 提供下列資源：

資源	URL
文件	<a href="https://docs.qnap.com">https://docs.qnap.com</a>
服務入口網站	<a href="https://service.qnap.com">https://service.qnap.com</a>
下載	<a href="https://download.qnap.com">https://download.qnap.com</a>
社群論壇	<a href="https://forum.qnap.com">https://forum.qnap.com</a>

## 6. 詞彙

### CloudKey

指定至每個 NAS 裝置的唯一 8 位數代碼

### myQNAPcloud Link

讓您透過網際網路存取 NAS，無需配置複雜的連接埠轉址設定

### myQNAPcloud

提供各種遠端存取服務，例如 DDNS 與 myQNAPcloud Link

### myQNAPcloud ID

用來註冊 myQNAPcloud 帳號的電子郵件地址

### Qfinder Pro

QNAP 應用工具可讓您定位和存取區域網路內的 QNAP NAS 裝置

### QuTS hero

QNAP NAS 作業系統配備 ZFS 檔案系統

## 7. 聲明

本章介紹擔保、免責聲明、授權以及聯辦法規的相關資訊。

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显示	0	0	0	0	0	0
印刷电路板	0	0	0	0	0	0
金属螺帽	0	0	0	0	0	0
电缆组装	0	0	0	0	0	0
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