

SAS Expander Kit Install Guide: Intel® Storage Server SSR212MC2BR/ SSR212MC2RBR

**A Guide for Technically Qualified Assemblers of Intel® Identified Subassemblies/
Products**

Intel Order Number: D92863-002



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Safety Information

Important Safety Instructions

Read all caution and safety statements in this document before performing any of the instructions. See also Intel Server Boards and Server Chassis Safety Information on the *Intel® Server Deployment Toolkit CD* and/or at:

<http://support.intel.com/support/motherboards/server/sb/cs-010770.htm>.

Wichtige Sicherheitshinweise

Lesen Sie zunächst sämtliche Warnung und Sicherheitshinweise in diesem Dokument, bevor Sie eine der Anweisungen ausführen. Beachten Sie hierzu auch die Sicherheitshinweise zu Intel-Serverplatinen und Servergehäusen auf der *Intel® Server Deployment Toolkit CD* oder unter:

<http://support.intel.com/support/motherboards/server/sb/cs-010770.htm>.

Consignes de sécurité

Lisez attention toutes les consignes de sécurité et les mises en garde indiquées dans ce document avant de suivre toute instruction. Consultez Intel Server Boards and Server Chassis Safety Information sur le *Intel® Server Deployment Toolkit CD* ou bien rendez-vous sur le site:

<http://support.intel.com/support/motherboards/server/sb/cs-010770.htm>.

Instrucciones de seguridad importantes

Lea todas las declaraciones de seguridad y precaución de este documento antes de realizar cualquiera de las instrucciones. Vea Intel Server Boards and Server Chassis Safety Information en el *Intel® Server Deployment Toolkit CD* y/o en:

<http://support.intel.com/support/motherboards/server/sb/cs-010770.htm>.

重要安全指导

在执行任何指令之前，请阅读本文档中的所有注意事项及安全声明。和/或 <http://support.intel.com/support/motherboards/server/safecert.htm> 上的 *Intel Server Boards and Server Chassis Safety Information* (《Intel 服务器主板与服务器机箱安全信息》)。

Warnings

Heed safety instructions: Before working with your server product, whether you are using this guide or any other resource as a reference, pay close attention to the safety instructions. You must adhere to the assembly instructions in this guide to ensure and maintain compliance with existing product certifications and approvals. Use only the described, regulated components specified in this guide. Use of other products / components will void the UL listing and other regulatory approvals of the product and will most likely result in noncompliance with product regulations in the region(s) in which the product is sold.

System power on/off: The power button DOES NOT turn off the system AC power. To remove power from system, you must unplug the AC power cord from the wall outlet. Make sure the AC power cord is unplugged before you open the chassis, add, or remove any components.

Hazardous conditions, devices and cables: Hazardous electrical conditions may be present on power, telephone, and communication cables. Turn off the server and disconnect the power cord, telecommunications systems, networks, and modems attached to the server before opening it. Otherwise, personal injury or equipment damage can result.

Electrostatic discharge (ESD) and ESD protection: ESD can damage disk drives, boards, and other parts. We recommend that you perform all procedures in this chapter only at an ESD workstation. If one is not available, provide some ESD protection by wearing an antistatic wrist strap attached to chassis ground any unpainted metal surface on your server when handling parts.

ESD and handling boards: Always handle boards carefully. They can be extremely sensitive to ESD. Hold boards only by their edges. After removing a board from its protective wrapper or from the server, place the board component side up on a grounded, static free surface. Use a conductive foam pad if available but not the board wrapper. Do not slide board over any surface.

Installing or removing jumpers: A jumper is a small plastic encased conductor that slips over two jumper pins. Some jumpers have a small tab on top that you can grip with your fingertips or with a pair of fine needle nosed pliers. If your jumpers do not have such a tab, take care when using needle nosed pliers to remove or install a jumper; grip the narrow sides of the jumper with the pliers, never the wide sides. Gripping the wide sides can damage the contacts inside the jumper, causing intermittent problems with the function controlled by that jumper. Take care to grip with, but not squeeze, the pliers or other tool you use to remove a jumper, or you may bend or break the pins on the board.

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SAS Expander Kit Install Guide

The SAS Expander device supports the connection of either SAS or SATA target devices. It provides control and status information on each of the connected disk hard drive devices.

Tools Needed

- Flat-head screwdriver

Kit Contents

Fan Module Kit (FMCSASX)

Item	Quantity
SAS Expander	1
Install Guide	1

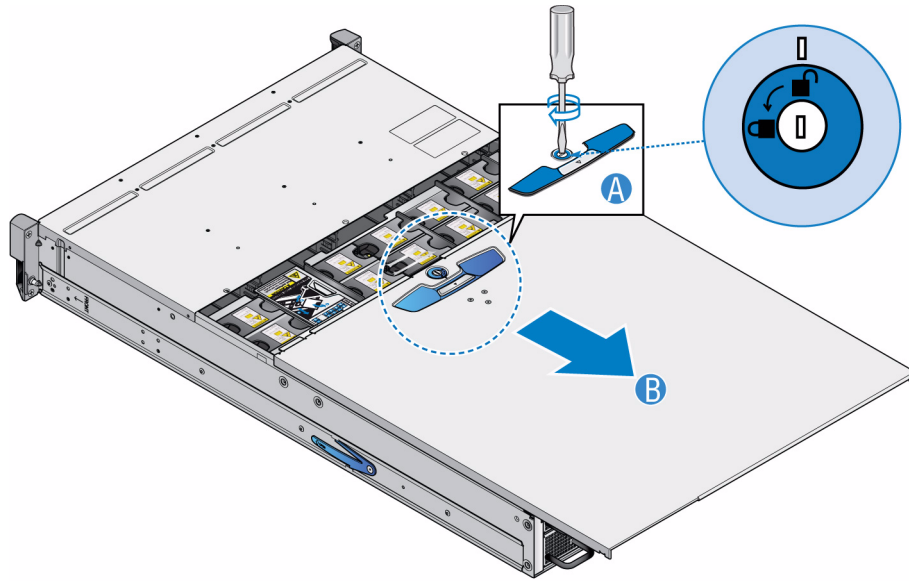
SAS Expander Kit Installation Instructions

Warning: *Hot surfaces - Disconnect power and allow system to cool before servicing.*

Prepare System

1. Read all caution and safety statements listed in this document before performing any of the steps. See the *Intel® Server Boards and Server Chassis Safety Information* document at <http://support.intel.com/support/motherboards/server/sb/cs-010770.htm> for a complete listing of all caution and safety statements. Before performing any maintenance on the system, back up the data.
2. Turn off all peripheral devices connected to the storage server. Power down the storage server.
3. Disconnect the AC power cord(s).

4. Remove the enclosure cover by turning the lock mechanism with a flat-head screwdriver to the “unlocked” position (see letter “A” in the following figure) and sliding the cover back until it stops (see letter “B”). Lift the cover to completely remove it from the chassis.

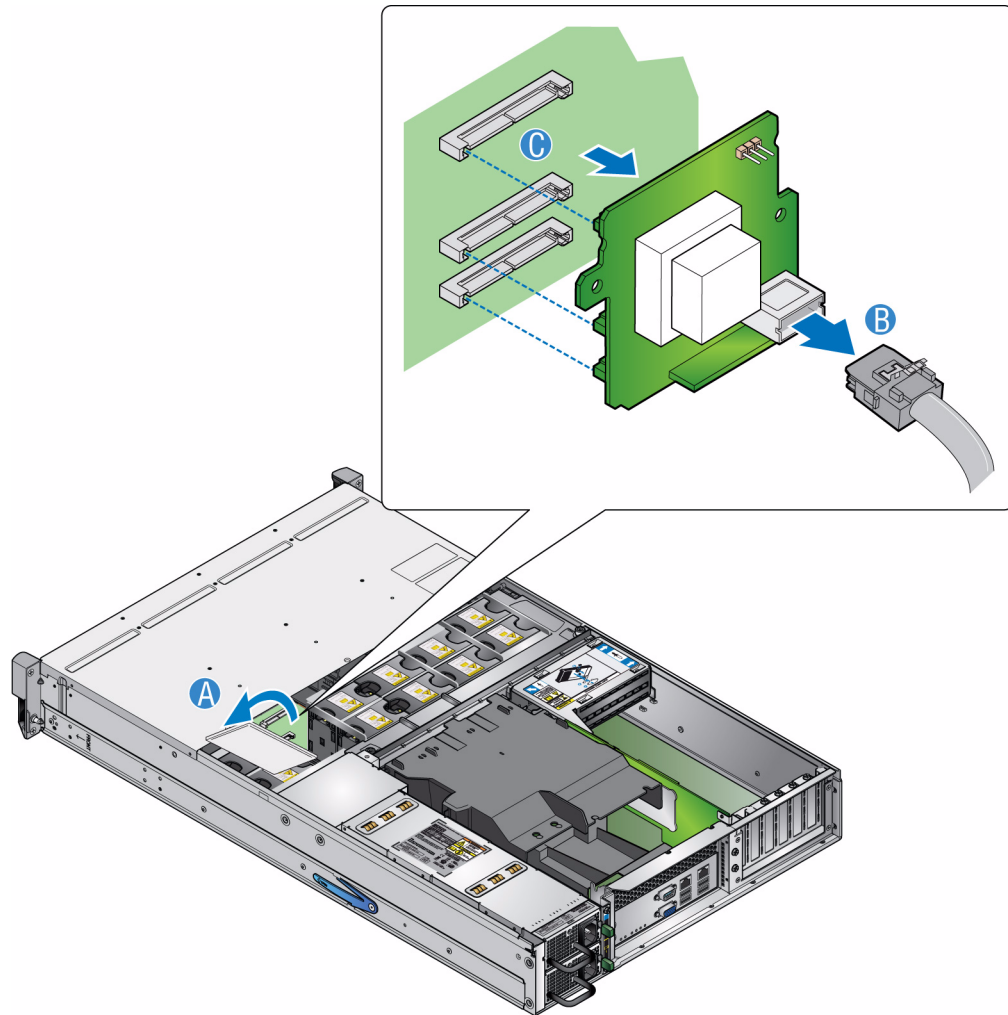


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Figure 1. Removing the Enclosure Cover

Remove Faulty SAS Expander

5. Open the PCB cover (see letter “A” in the following figure). Remove the SAS cable (see letter “B”). Pull the SAS Expander PCB assembly forward, unplugging it from the backplane (see letter “C”).

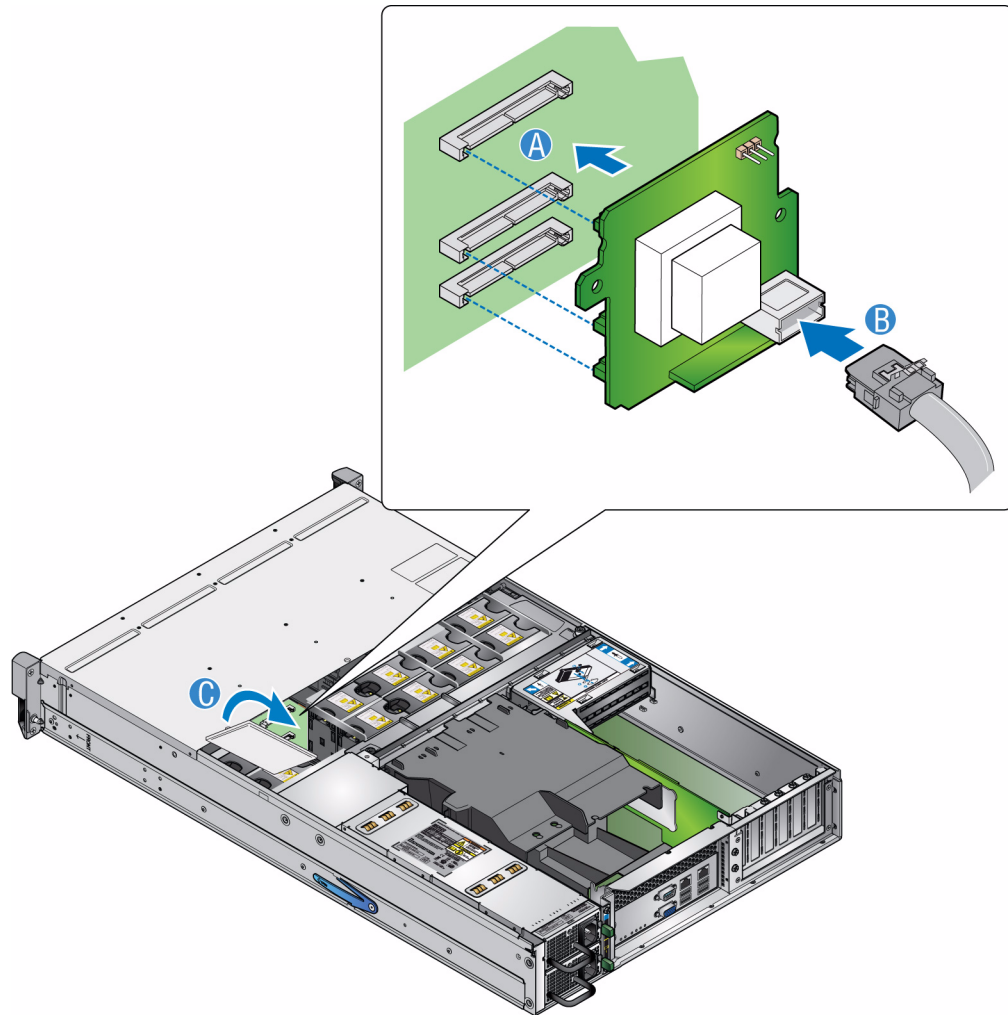


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Figure 2. Removing Faulty SAS Expander

Install Replacement SAS Expander

6. Insert replacement SAS Expander PCB and plug the assembly into the backplane PCB (see letter “A” in the following figure). Attach the SAS cable (see letter “B”). Close the PCB cover (see letter “C”).

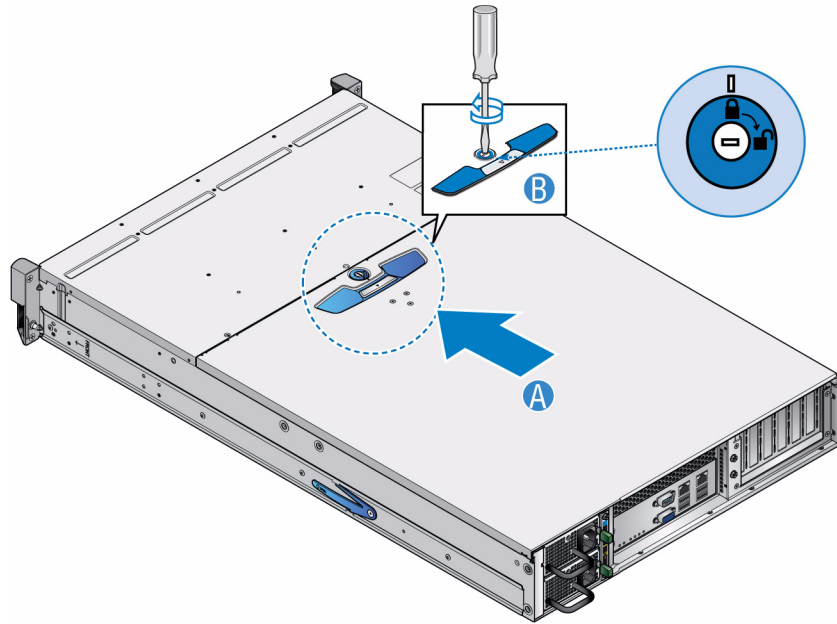


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Figure 3. Installing Replacement SAS Expander

Complete Setup

7. Re-install the enclosure cover (see letter “A” in the following figure) and latch securely by turning the lock mechanism with a flat-head screwdriver until the “locked” symbol aligns with the notch in cover (see letter “B”).



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Figure 4. Re-installing Enclosure Cover

8. Reconnect all peripheral devices. Reconnect the AC power cord(s). Power up the storage server.

