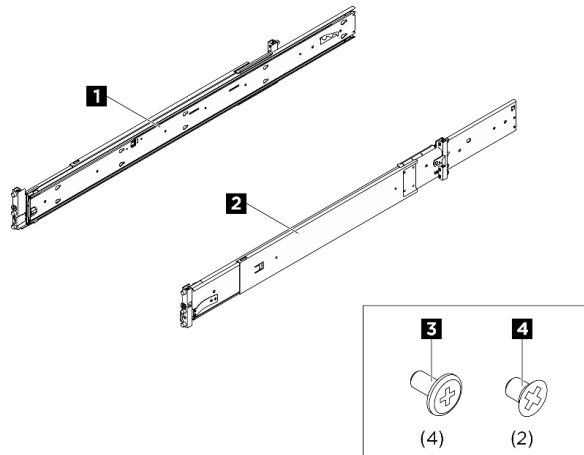


Rail Installation Guide

Rail kit parts inventory

The Toolless Rail Kit includes the following parts:



1 One left rail

2 One right rail

3 Four M5 screws

4 Two M4 screws

Notes:

- This kit can be installed in both square hole and round hole rack.
- If any parts is missing, contact local service.
- The replacement in this document requires the lift handles in the server package. Have them on site beforehand.

Read these guidelines first

Read the following guidelines before installing the rail kit and server to the rack.

- The maximum rail travel distance is 960 mm (37.8 inches).
- Install the server to a rack that meets the following requirements:
 - Minimum depth of 119.8 mm (4.72 inches) between the front mounting flanges and inside of the front door.
 - Minimum depth of 176.8 mm (6.96 inches) between the server rear wall and inside of the rear door.
 - The distance between the front and rear mounting flanges is 660.4-863.6 mm (26-34 inches).
 - To install the rails and a 0U PDU into the same rack, the rack must meet the following height and depth requirements:
 - 42U or higher
 - Without CMA: at least 1200-mm (47.24-inch) deep
 - Only install the server into a rack with perforated doors. Remove the rack doors and side panels for easy access during installation.
 - When installing multiple units, start with installing the heaviest device to the lowest part of the rack.
 - See the *User Guide* for the requirements of room air temperature.
 - Do not block any air vents. Spare at least 15 cm (6 inches) of space for proper airflow.
 - Do not leave the unoccupied space above or below an installed server in the rack empty. To prevent damage to server components, always install filler panels to cover unoccupied space to ensure proper air circulation.
 - Do not leave more than one server slid out from the rack at the same time.
 - Do not overload the power outlet when multiple devices are installed in the rack.

If you need to remove the rail from rack, refer to the “Hardware replacement procedures” chapter in the server *User Guide*. Search your server and select its *User Guide* at Lenovo server product portfolio page: <https://pubs.lenovo.com/>.



R006



CAUTION:
Do not place any object on top of a rack-mounted device unless that rack-mounted device is intended for use as a shelf.

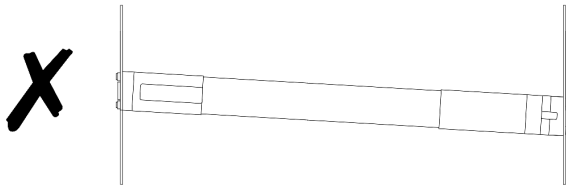
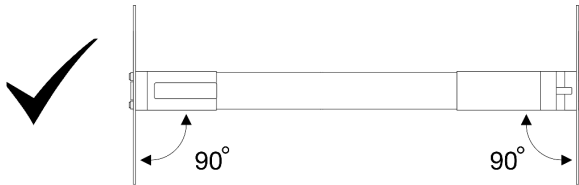
S037



CAUTION:
The weight of this part or unit is more than 55 kg (121.2 lb). It takes specially trained persons, a lifting device, or both to safely lift this part or unit.

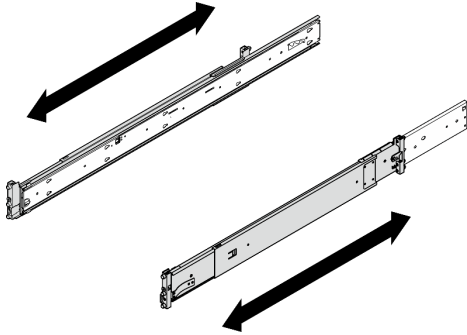
Install the rail kit to the rack

Important: Make sure both ends of the rail are seated at the same height.



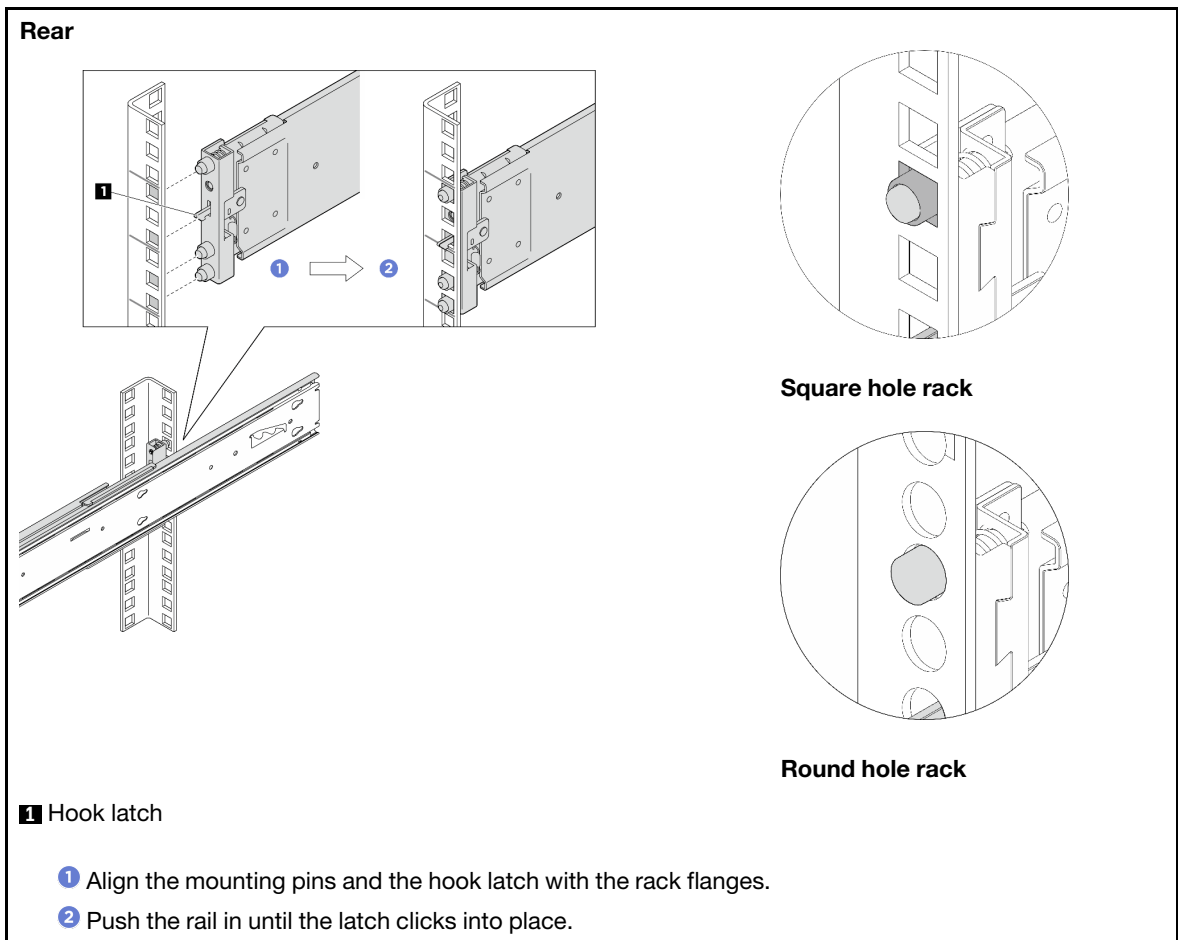
Notes:

- The rails are extensible as shown in the following illustration.

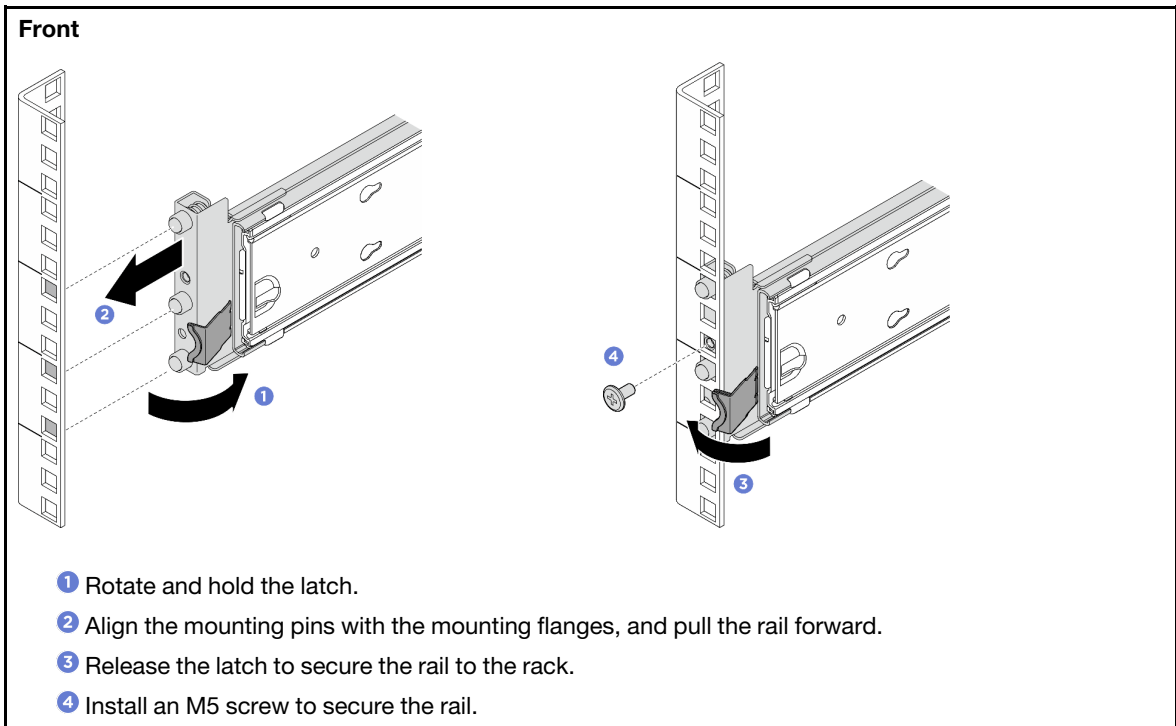


- Install the rail to the rack, starting from the rear and proceeding to the front.
- Make sure the rail is shortened to the shortest position.
- The rail mounting pins take up 2U space. Follow the U space marking on the rack when installing the rail kit.

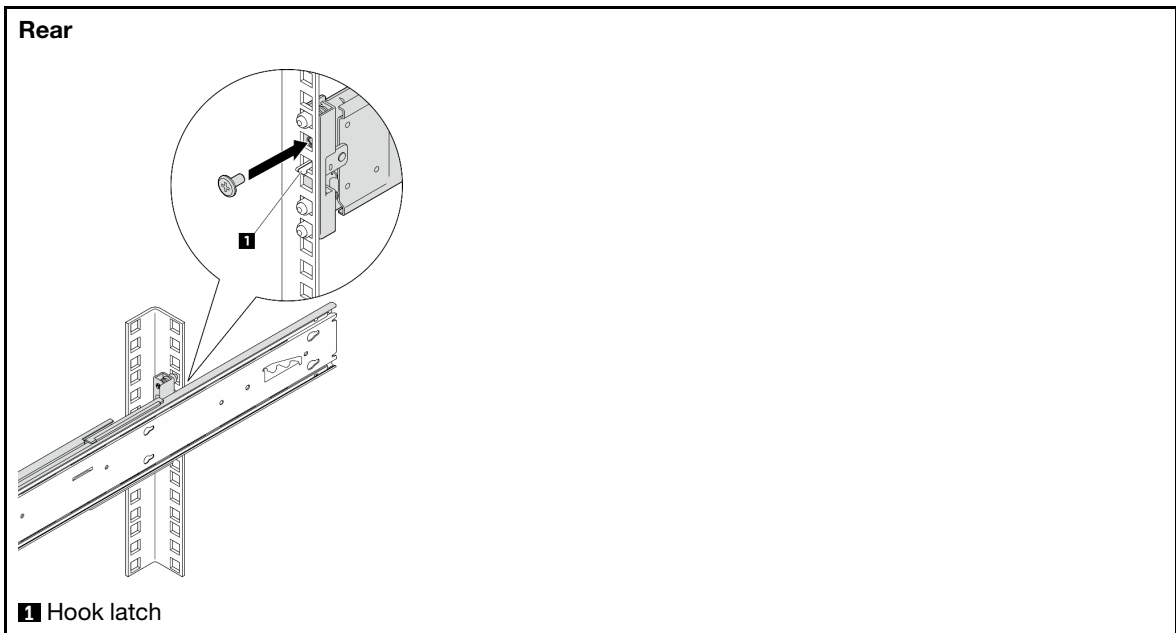
Step 1. Install the rear mounting pins to the rack.



Step 2. Install the front mounting pins to the rack.



Step 3. Install an M5 screw to the hole above the hook latch on the rear of the rail.



Step 4. Repeat the previous three steps on the other rail.

Install the server to rails

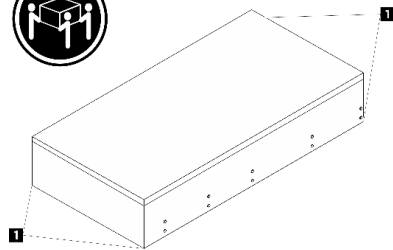
Step 1. Make sure a lifting device is available on site to lift the server and place it on a flat and stable surface.

S037



CAUTION:

The weight of this part or unit is more than 55 kg (121.2 lb). It takes specially trained persons, a lifting device, or both to safely lift this part or unit.

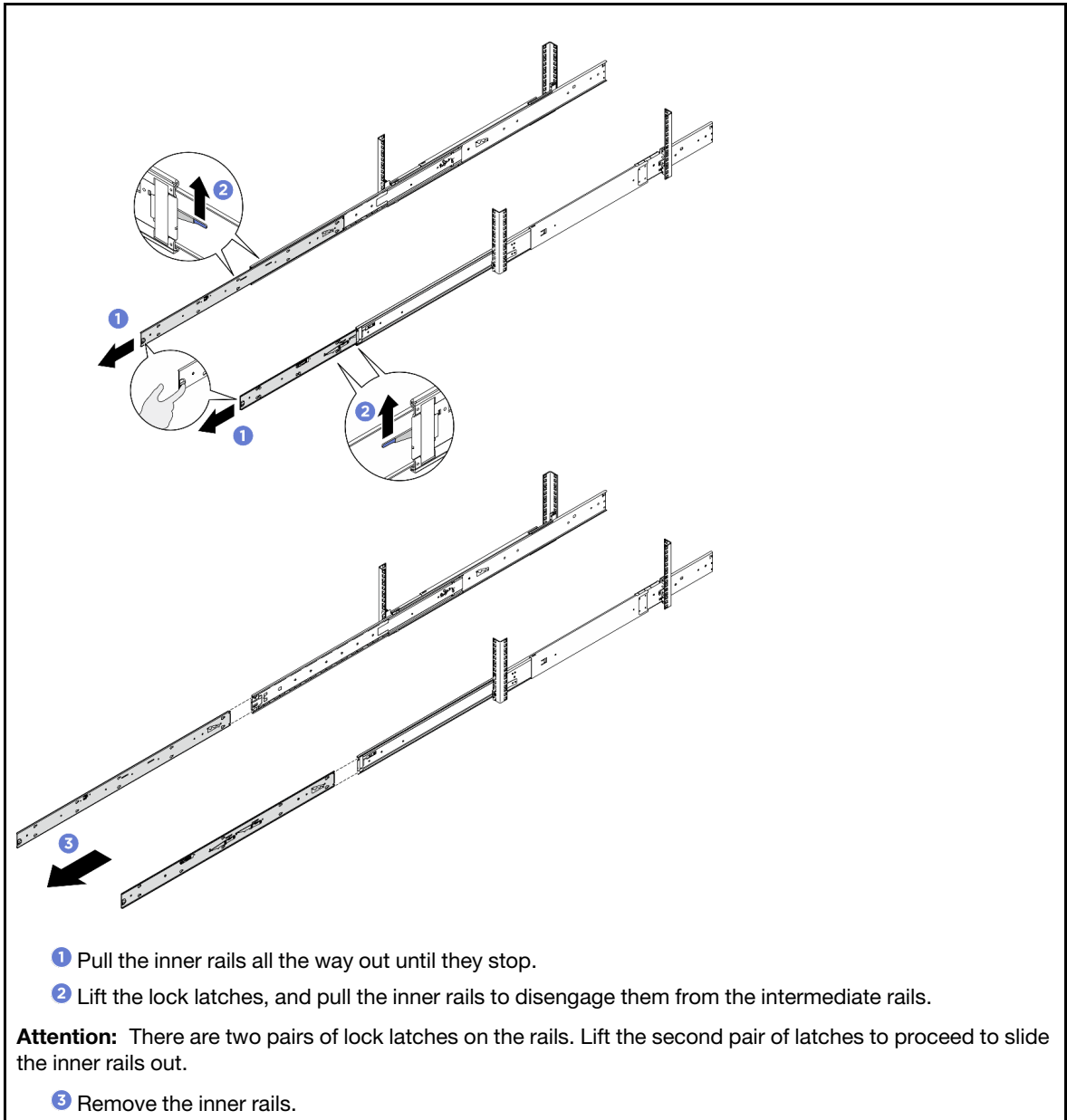


1 Lift point

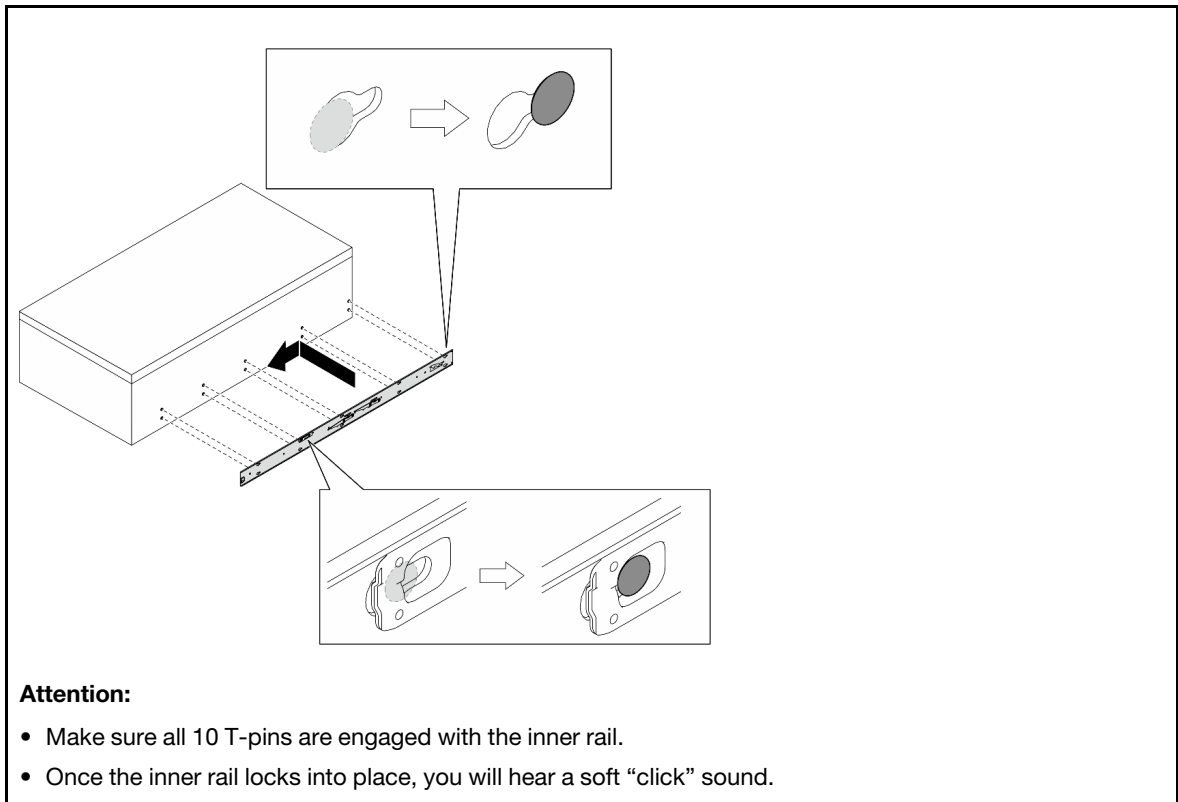
CAUTION:

Make sure to lift the server by holding the lift points.

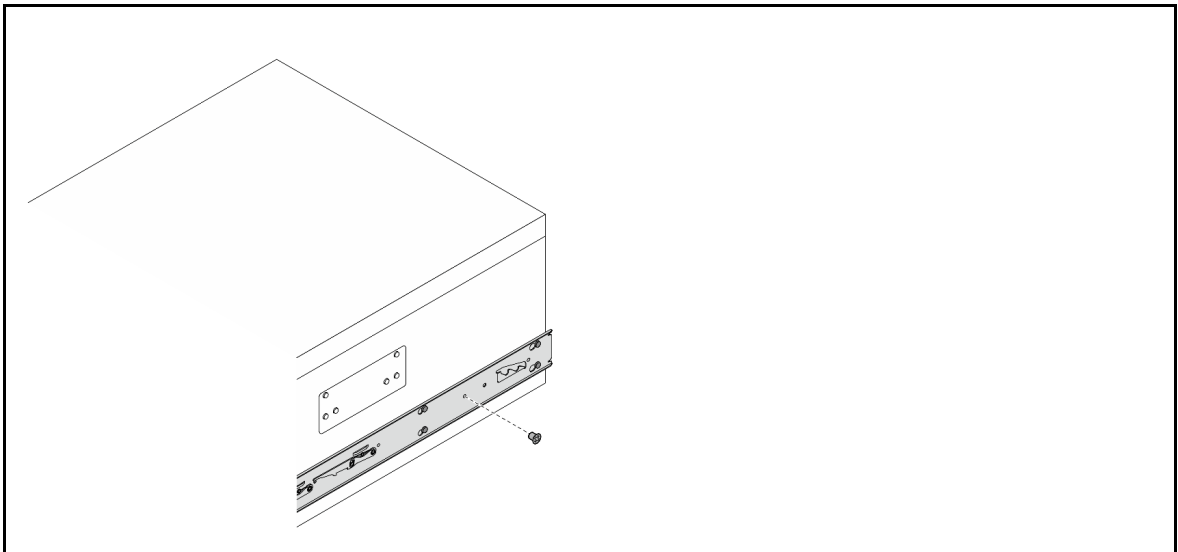
Step 2. Remove the inner rails from the intermediate rails.



Step 3. Align the slots on the inner rail with the corresponding T-pins on the side of the server; then, install and slide the inner rail towards the front of the server until the T-pins lock into place.

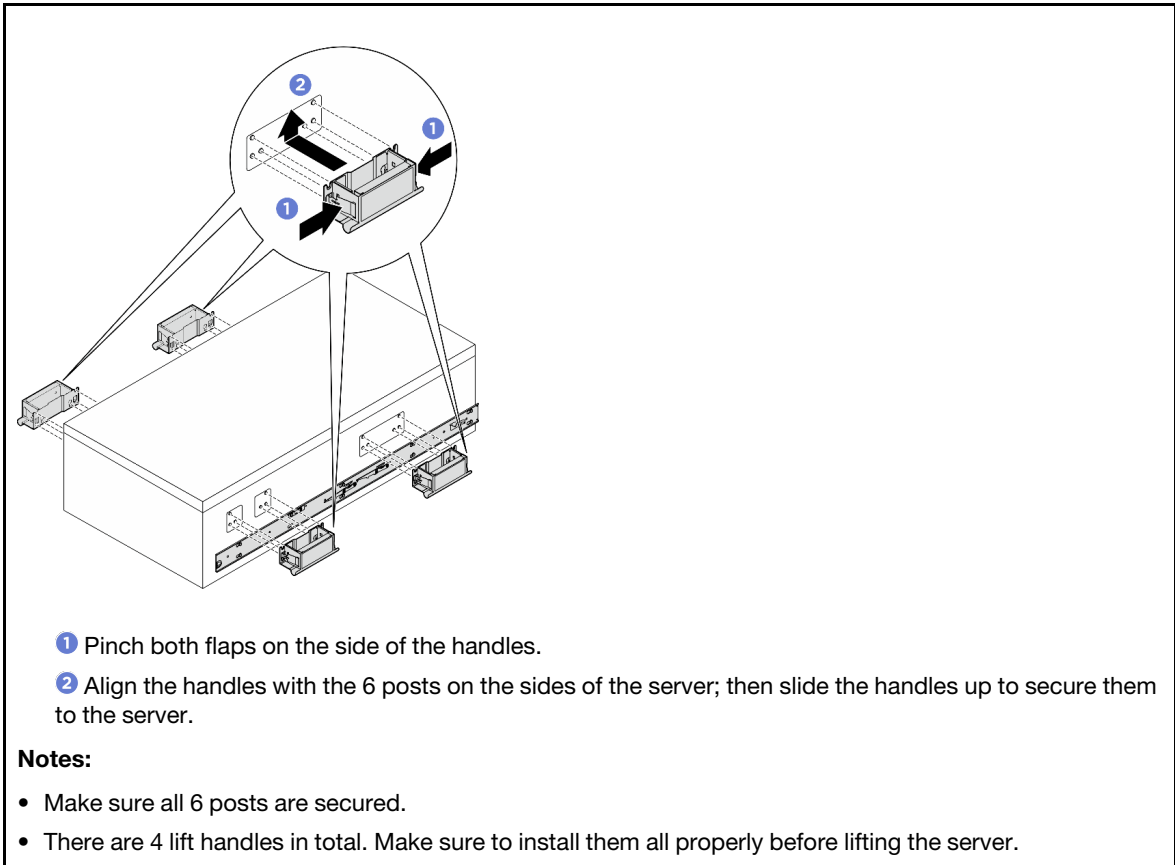


Step 4. Insert and tighten an M4 screw to secure the inner rail as shown.

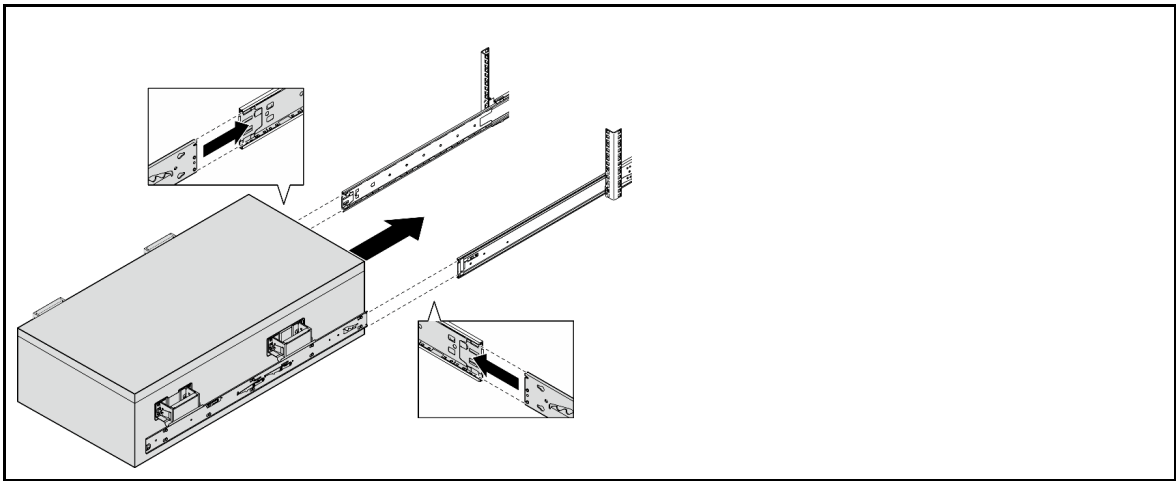


Step 5. Repeat the previous two steps on the other rail.

Step 6. Attach the lift handles.



Step 7. Align both rear ends of the inner rails with the openings in the intermediate rails, and make sure the two pairs of rails mate correctly. Then, carefully slide the server into the rack until the rails snap into place.



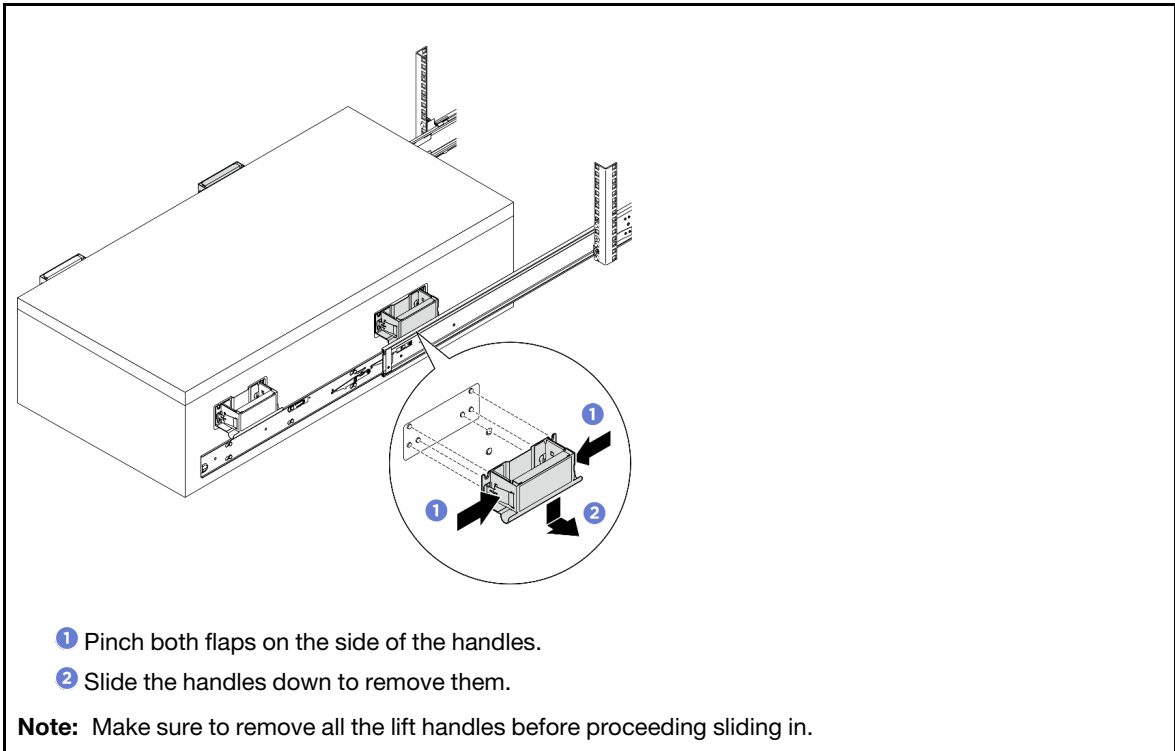
Attention: When moving the server, hold the server by its lift points or the lift handles at all time.

A circular warning icon. It shows a hand gripping a server's lift handle. Above the hand is a warning triangle with an exclamation mark inside, indicating a safety precaution.

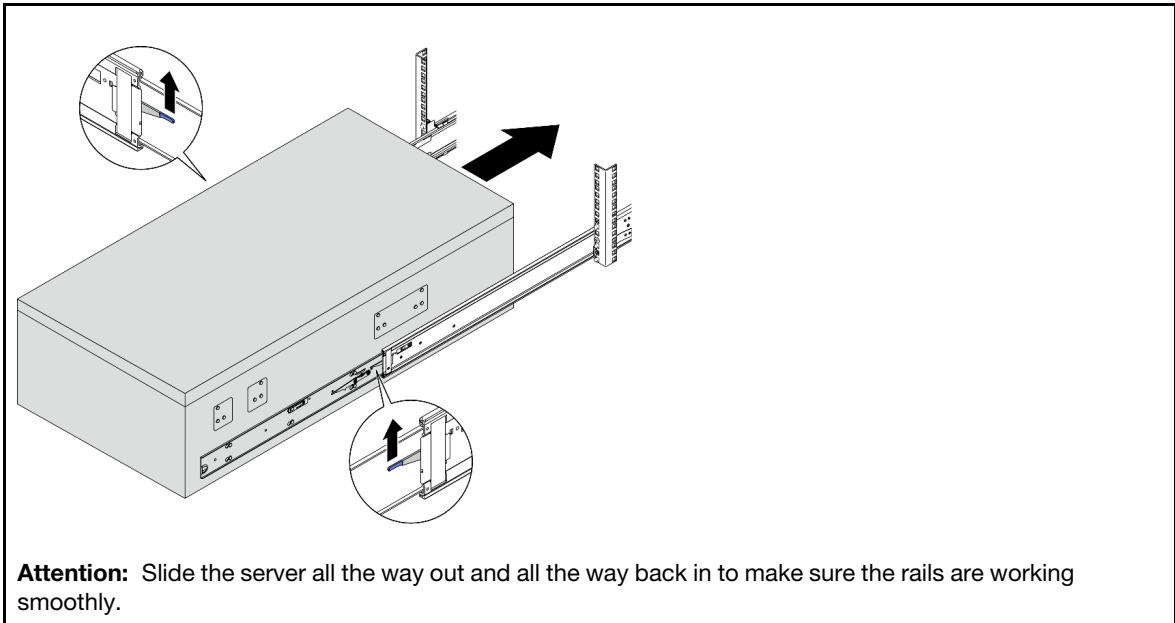
Attention: Before inner rail is inserted into intermediate rail, ensure that the ball retainer is at the foremost of the intermediate rail.

A technical diagram of the intermediate rails. It shows two parallel rails on a vertical post. A callout box with a speech bubble points to a specific feature on the rail, which is the ball retainer mechanism mentioned in the text.

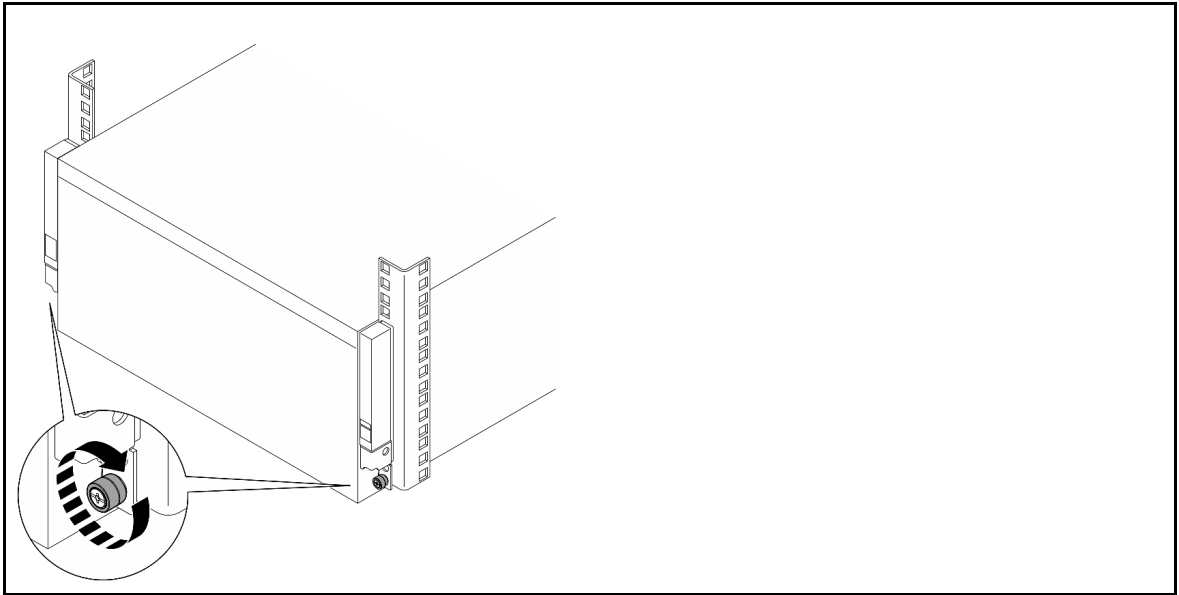
Step 8. Remove the lift handles.



Step 9. Lift the first pair of lock latches to proceed to slide the server in.




Step 10. Tighten the thumbscrews to secure the server to the rack.



Remove the server from rails

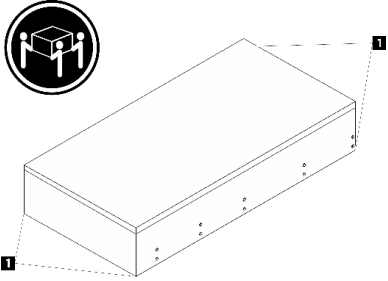
Step 1. Make sure a lifting device is available on site to lift the server.

S037



55-100 kg
121-220 lb

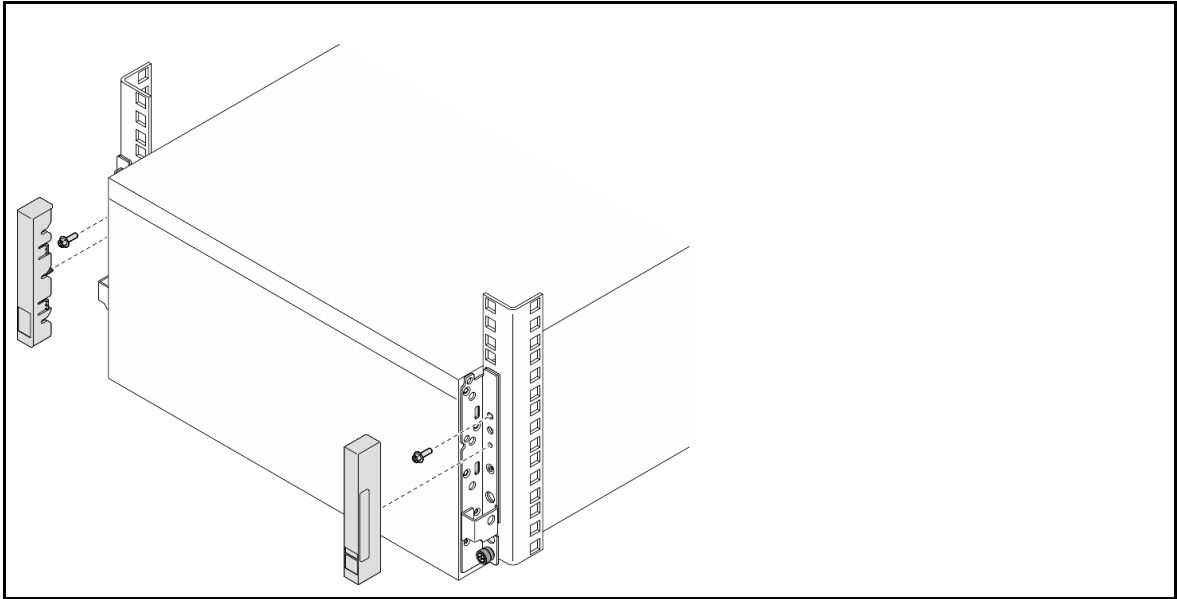
CAUTION:
The weight of this part or unit is more than 55 kg (121.2 lb). It takes specially trained persons, a lifting device, or both to safely lift this part or unit.



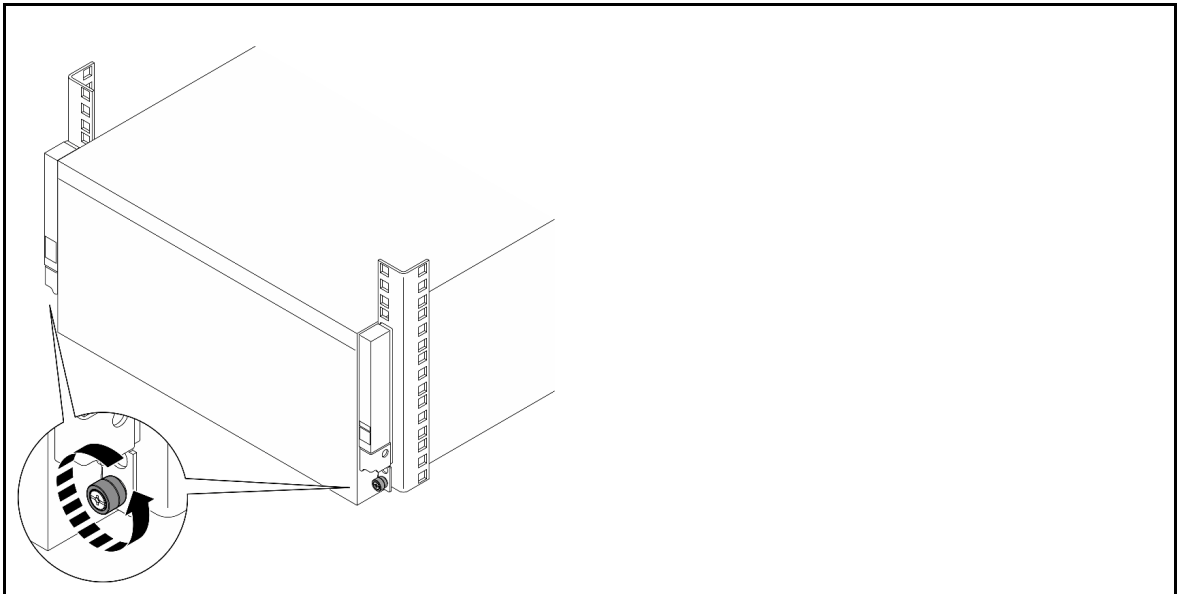
CAUTION:
Make sure to lift the server by holding the lift points.

1 Lift point

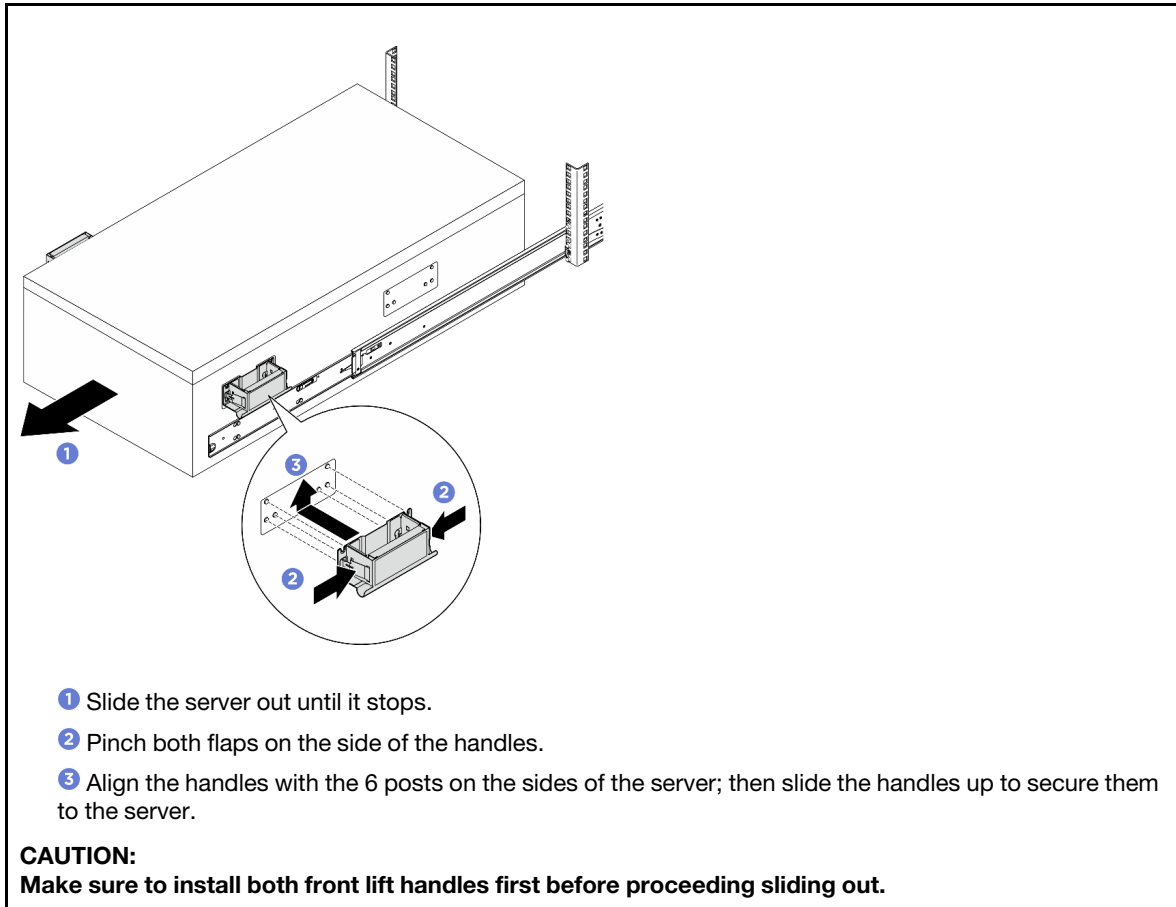
Step 2. If the chassis was shipped in the rack cabinet, remove the EIA covers and remove the two M5 screws; then, install the EIA covers back in place.



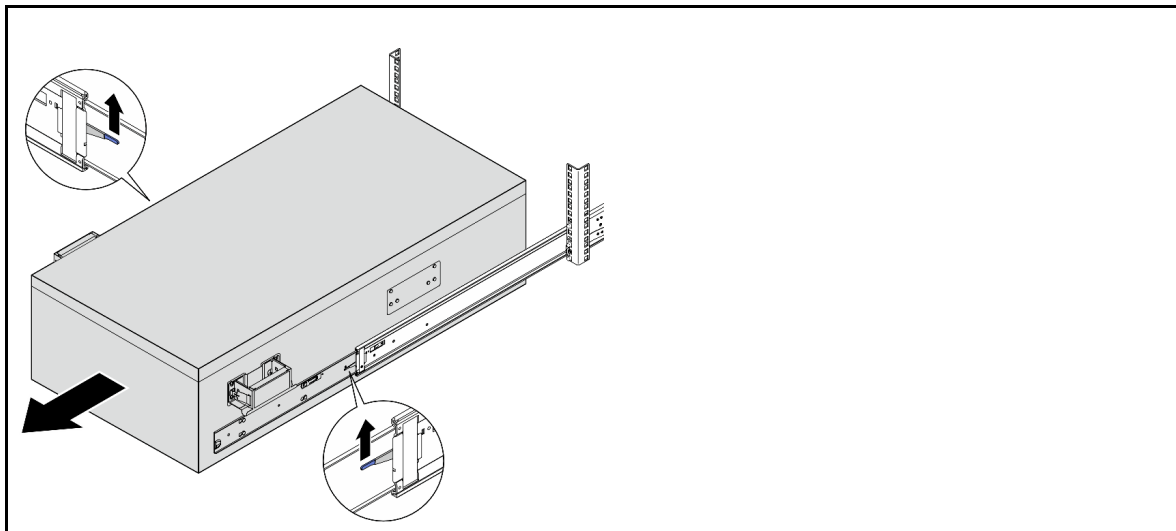
Step 3. Loosen the thumbscrews.



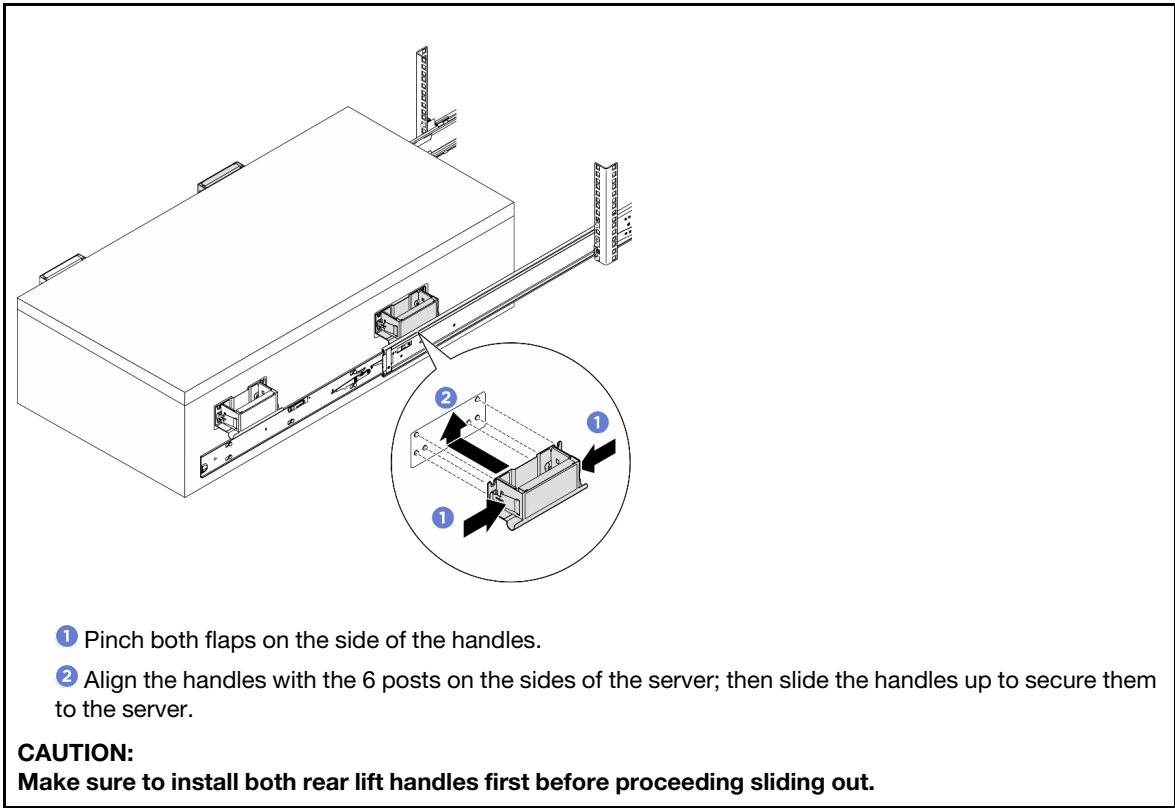
Step 4. Install the front lift handle.



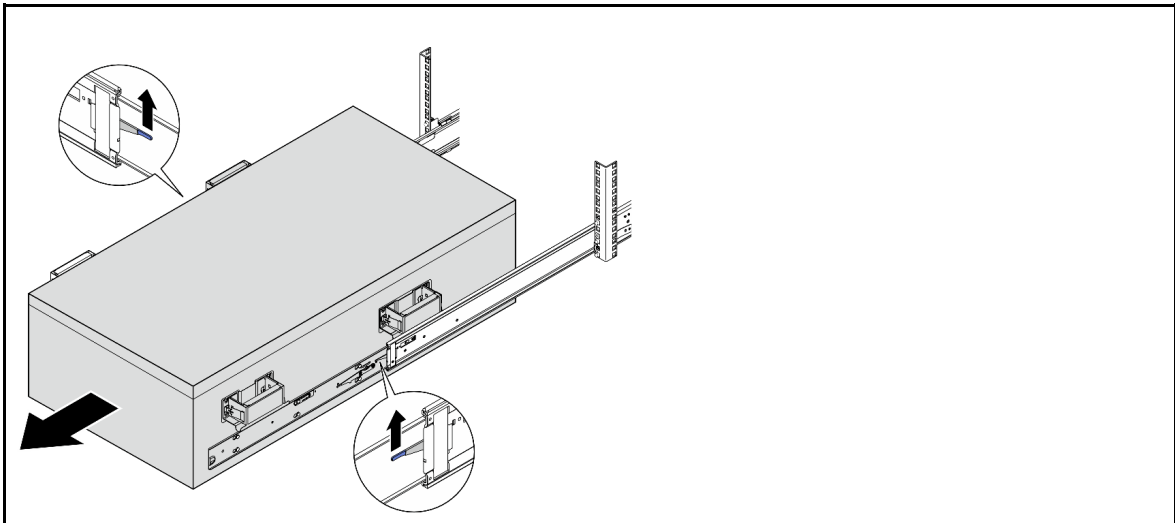
Step 5. Lift the first lock latches up to proceed sliding out.



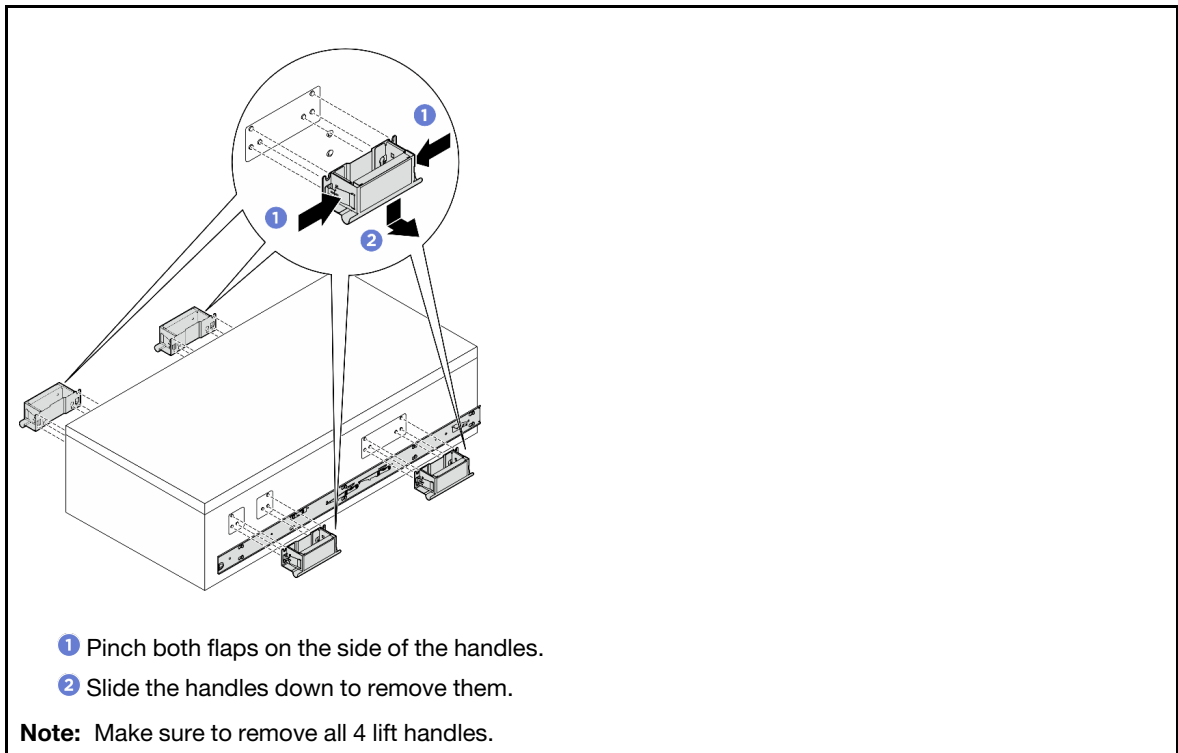
Step 6. Attach the rear handles.



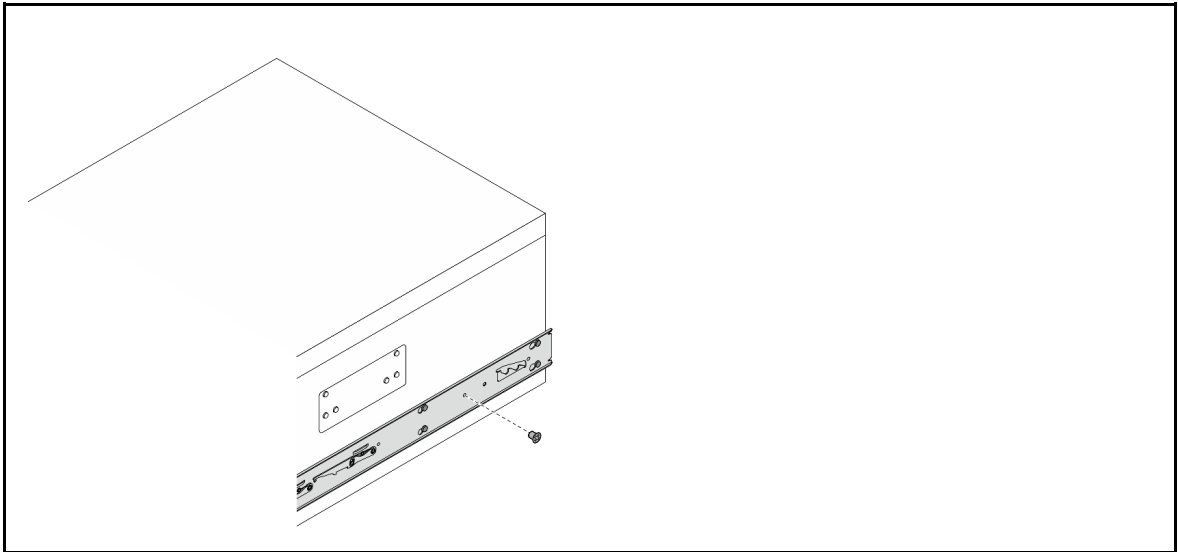
Step 7. Lift the second lock latches up and remove the server completely from the rack; then place it on a flat and stable surface.



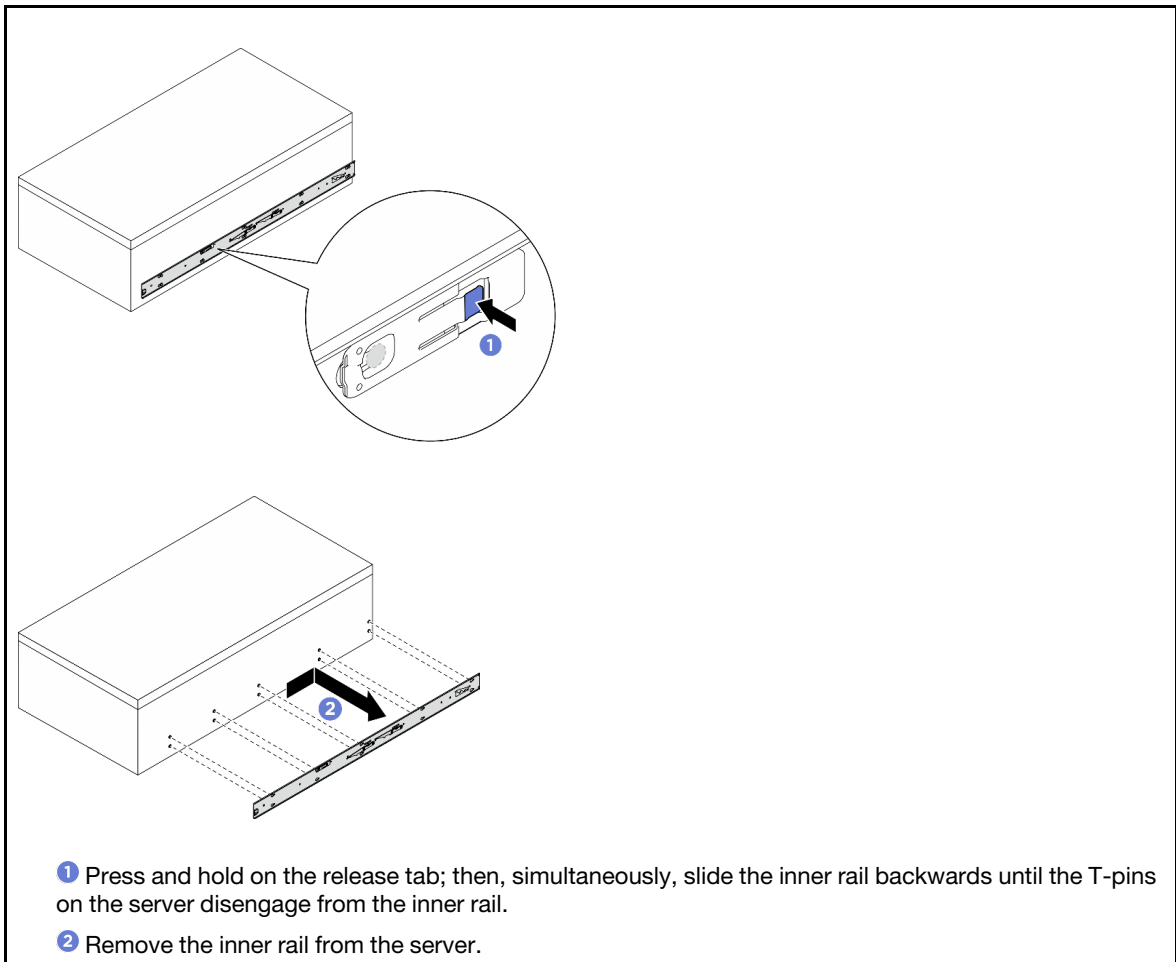
Step 8. Remove the lift handles.



Step 9. Loosen and remove an M4 screw in the corresponding hole on both inner rails as shown.



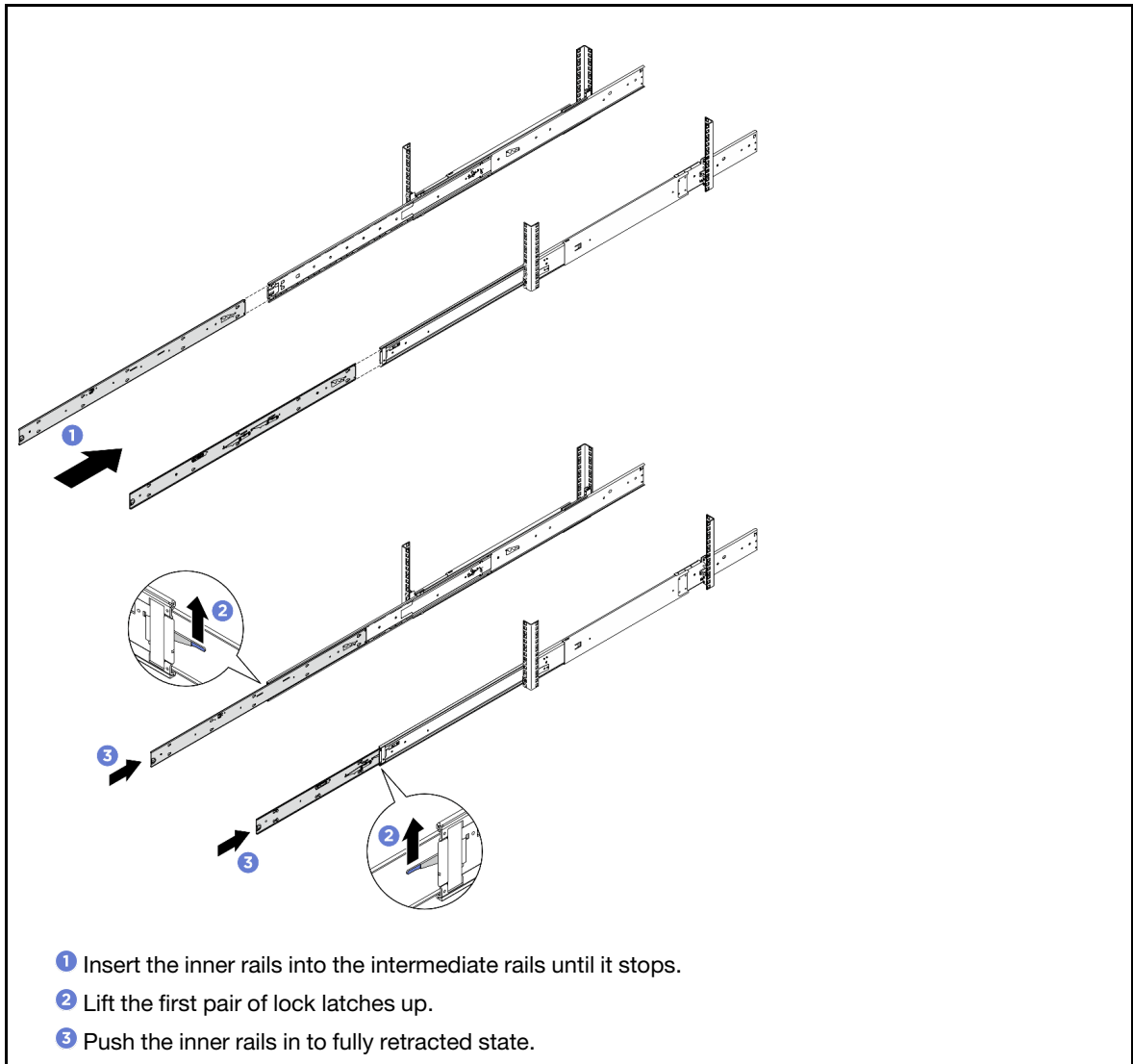
Step 10. Remove the inner rail from the server.



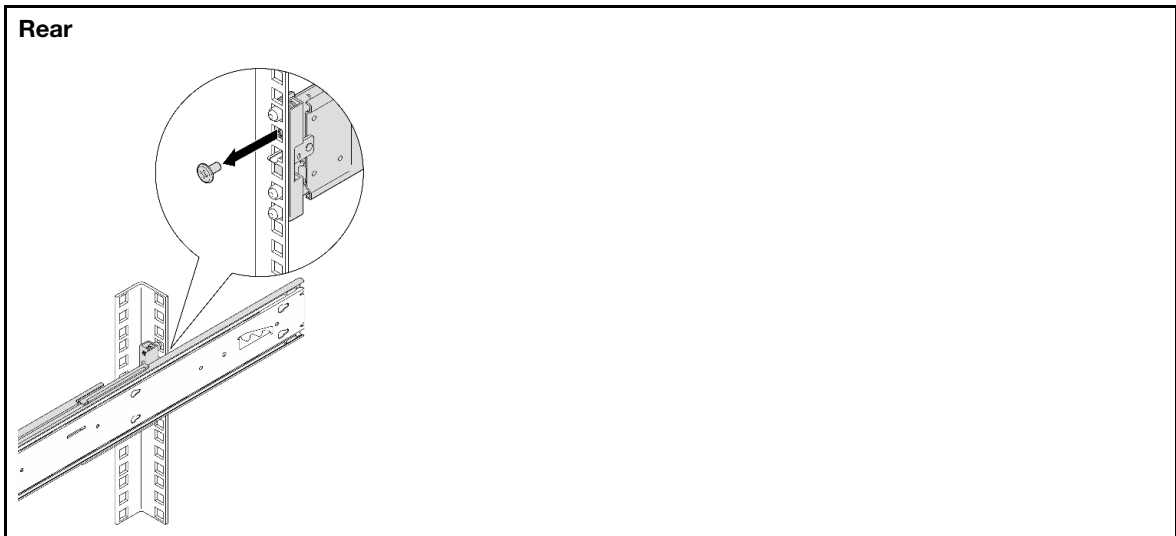
Step 11. Repeat the previous step on the other rail.

Remove the rails from the rack

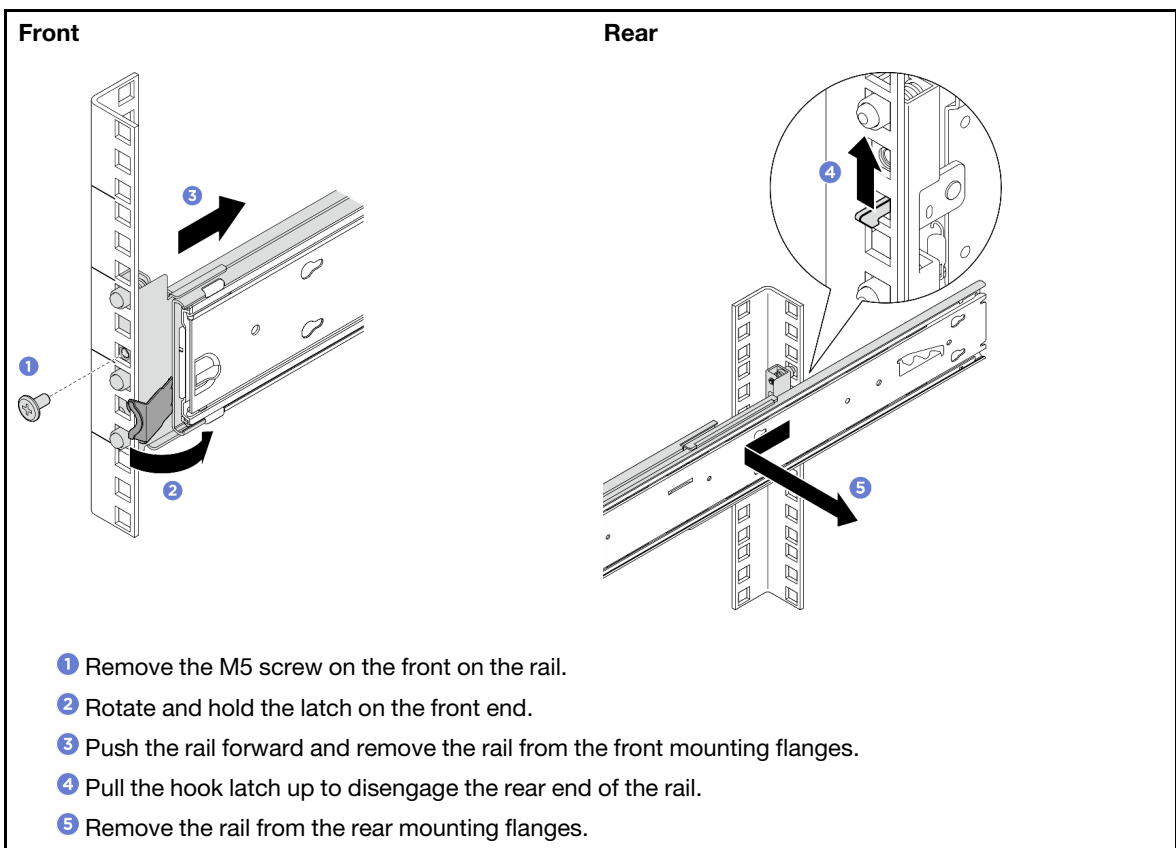
Step 1. Retract the rails into fully retracted state.



Step 2. Remove the M5 screw on the rear of the rail.



Step 3. Remove the rail from the rack.



Step 4. Repeat the previous step on the other rail.

Second Edition (August 2024)

© Copyright Lenovo 2024.

LIMITED AND RESTRICTED RIGHTS NOTICE: If data or software is delivered pursuant to a General Services Administration (GSA) contract, use, reproduction, or disclosure is subject to restrictions set forth in Contract No. GS-35F-05925.

Printed in China
(1P) P/N: 1PSP47C01572

