



# RSC-2M

**Rackmount Chassis  
User's Manual**

# Table of Contents

<b>Preface</b> .....	<b>i</b>
<b>Safety Instructions</b> .....	<b>ii</b>
<b>About This Manual</b> .....	<b>iv</b>
<b>Chapter 1. Product Features</b> .....	<b>1</b>
1.1 Components .....	1
1.2 Specifications .....	2
1.3 Feature .....	2
<b>Chapter 2. Hardware Setup</b> .....	<b>5</b>
2.1 Top Cover .....	5
2.2 Power Supply Unit Module .....	6
2.3 Fan Module .....	7
2.4 Hard Disk Drive .....	8
2.5 HDD Backplane Module .....	10
2.6 Slide Rail Installation .....	11
<b>Chapter 3. Hardware Specifications</b> .....	<b>14</b>
3.1 HDD Backplane .....	14
3.1.1 Layout .....	14
3.1.2 Connector and Jumper .....	15
<b>Chapter 4. Technical Support</b> .....	<b>16</b>

## Document Release History

Release Date	Version	Update Content
June 2019	1	User's Manual release to public.
August 2019	1.1	Slide rail update.
August 2020	1.2	Update logo.



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# Preface

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## Changes

The material in this document is for information purposes only and is subject to change without notice.

## Warning

1. A shielded-type power cord is required in order to meet FCC emission limits and also to prevent interference to the nearby radio and television reception. It is essential that only the supplied power cord be used.
2. Use only shielded cables to connect I/O devices to this equipment.
3. You are cautioned that changes or modifications not expressly approved by the party responsible for compliance could void your authority to operate the equipment.

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# Safety Instructions

Before getting started, please read the following important cautions:

- All cautions and warnings on the equipment or in the manuals should be noted.
- Most electronic components are sensitive to electrical static discharge. Therefore, be sure to ground yourself at all times when installing the internal components.
- Use a grounding wrist strap and place all electronic components in static-shielded devices. Grounding wrist straps can be purchased in any electronic supply store.
- Be sure to turn off the power and then disconnect the power cords from your system before performing any installation or servicing. A sudden surge of power could damage sensitive electronic components.
- Do not open the system's top cover. If opening the cover for maintenance is a must, only a trained technician should do so. Integrated circuits on computer boards are sensitive to static electricity. Before handling a board or integrated circuit, touch an unpainted portion of the system unit chassis for a few seconds. This will help to discharge any static electricity on your body.
- Place this equipment on a stable surface when install. A drop or fall could cause injury.
- Please keep this equipment away from humidity.
- Carefully mount the equipment into the rack, in such manner, that it won't be hazardous due to uneven mechanical loading.
- This equipment is to be installed for operation in an environment with maximum ambient temperature below 35°C.
- The openings on the enclosure are for air convection to protect the equipment from overheating. **DO NOT COVER THE OPENINGS.**
- Never pour any liquid into ventilation openings. This could cause fire or electrical shock.
- Make sure the voltage of the power source is within the specification on the label when connecting the equipment to the power outlet. The current load and output power of loads shall be within the specification.
- This equipment must be connected to reliable grounding before using. Pay special attention to power supplied other than direct connections, e.g. using of power strips.
- Place the power cord out of the way of foot traffic. Do not place anything over the power cord. The power cord must be rated for the product, voltage and current marked on the product's electrical ratings label. The voltage and current rating of the cord should be greater than the voltage and current rating marked on the product.
- If the equipment is not used for a long time, disconnect the equipment from mains to avoid being damaged by transient over-voltage.
- Never open the equipment. For safety reasons, only qualified service personnel should open the equipment.

- If one of the following situations arise, the equipment should be checked by service personnel:
  1. The power cord or plug is damaged.
  2. Liquid has penetrated the equipment.
  3. The equipment has been exposed to moisture.
  4. The equipment does not work well or will not work according to its user manual.
  5. The equipment has been dropped and/or damaged.
  6. The equipment has obvious signs of breakage.
  7. Please disconnect this equipment from the AC outlet before cleaning. Do not use liquid or detergent for cleaning. The use of a moisture sheet or cloth is recommended for cleaning.
- Module and drive bays must not be empty! They must have a dummy cover.

# About This Manual

Thank you for selecting and purchasing RSC-2M

This user's manual is provided for professional technicians to perform easy hardware setup, basic system configurations, and quick software startup. This document pellucidly presents a brief overview of the product design, device installation, and firmware settings for 2M Rackmount Chassis. For the latest version of this user's manual, please refer to the AIC website: <https://www.aicipc.com/en/productdetail/51126>.

## **Chapter 1 Product Features**

This chapter delivers the overall layout of the product, including the fundamental components of the rackmount chassis, design specifications, and noteworthy features.

## **Chapter 2 Hardware Setup**

This chapter displays an easy installation guide for assembling the chassis. Utmost caution for proceeding to set up the hardware is highly advised.

## **Chapter 3 Hardware Specifications**

This chapter elaborates the overall layout of the hardware design, including multifarious connectors, jumpers, and LED descriptions.

## **Chapter 4 Technical Support**

For more information or suggestion, please contact the nearest AIC corporation representative in your district or visit the AIC website: <http://www.aicipc.com/en>. It is our greatest honor to provide the best service for our customers.



# Chapter 1. Product Features

RSC-2M is a flexible rackmount storage chassis with tool-less design. This product supports hot swappable HDDs and easy swap fans. For more information about our product, please visit our website at <http://www.aicipc.com/en>.

Before removing the subsystem from the shipping carton, visually inspect the physical condition of the shipping carton. Exterior damage to the shipping carton may indicate that the contents of the carton are damaged. If any damage is found, do not remove the components; contact the dealer where the subsystem was purchased for further instructions. Before continuing, first unpack the subsystem and verify that the number of components in the shipping carton is accurate and in good condition.

## 1.1 Components

This product contains the components listed below.

Please confirm the number and the condition of the components before installation.

- System barebone (includes power supply, fan & hard disk drive tray)
- Power cord (vary per region)
- Slide rail x 1 set (optional)

**Product specifications and features are subject to change without prior notice.**

## 1.2 Specifications

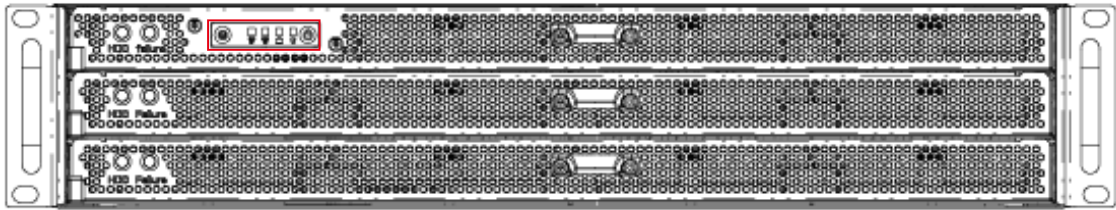
<b>Dimensions</b> (W x D x H)	mm : 438 x 924 x 88		
	inches : 17.2 x 36.3 x 3.46		
<b>Industry Standard</b>	EIA-RS310D		
<b>Material</b>	SGCC		
<b>Color</b>	Front Panel : Black		
<b>Cooling</b>	3 x 80x38mm PWM fans		
<b>Power Supply</b>	1U 850W 1+1 redundant power supply		
<b>Expansion Slot</b>	7 low profile		
<b>Front Panel</b>	System power switch and System reset switch		
<b>LED Indicators</b>	System power, HDD, LAN 1 and LAN 2		
<b>System Board</b>	Up to 12" x 13" EATX MB		
<b>Drive Bays</b>	Internal	3.5" hot swap	24
		2.5"	2 (7mm SSD)

<b>Backplanes</b>	6 x 4-port 12Gb SATA/SAS backplanes with SFF-8643connectors	
<b>Storage Temperature</b>	0°C(32°F) ~ 50°C(122°F)	
<b>Humidity</b>	5%~95% non-condensing	
<b>Gross Weight</b>	(w/ PSU & Rail)	kgs : 34
		lbs : 75
<b>Packaging Dimensions</b>	(W x D x H)	mm : 602 x 1116 x 292
		inches : 23.7 x 45 x 11.5
<b>Cubic Feet</b>	6.92	
<b>Container Load Quantity</b>	20'	150
	40'	320
	40' H	360
<b>Mounting</b>	Standard	30" slide rail







## 1.3 Feature

- High-density storage server solution in 2U
- Tool-less HDD installation
- Expander supports 2 ports 8644 for JBOD

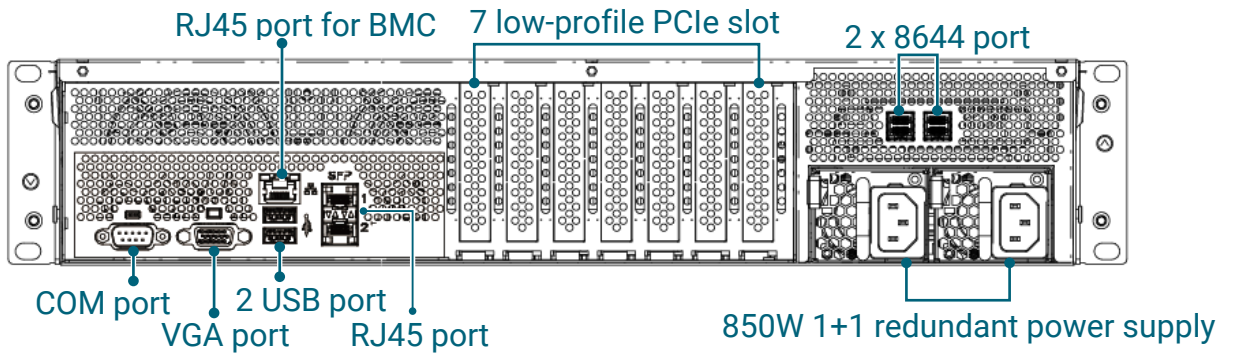
### Front Panel



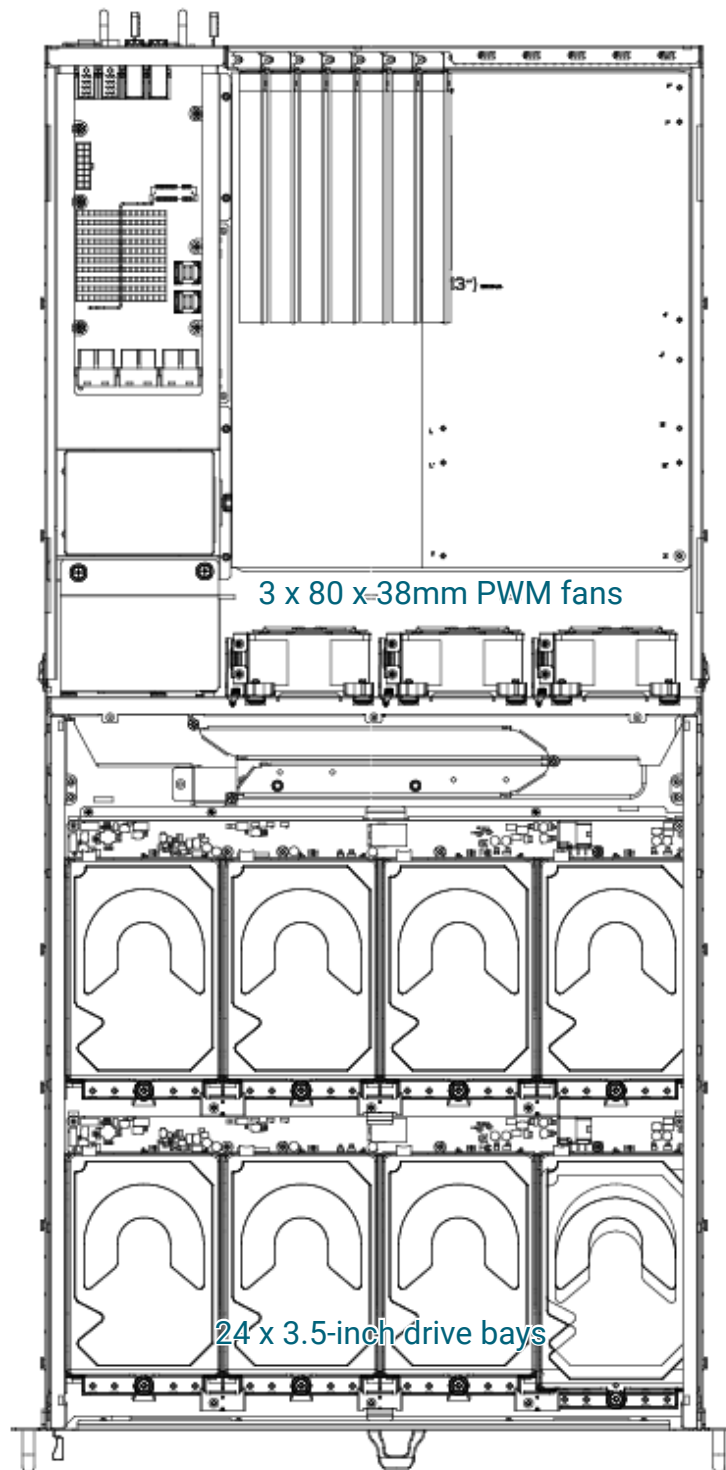
System Button and LED Indicator

	System power button
	System power LED
	HDD activity LED
	LAN1 LED
	LAN 2 LED
	System reset button

### Rear Panel



### Top View



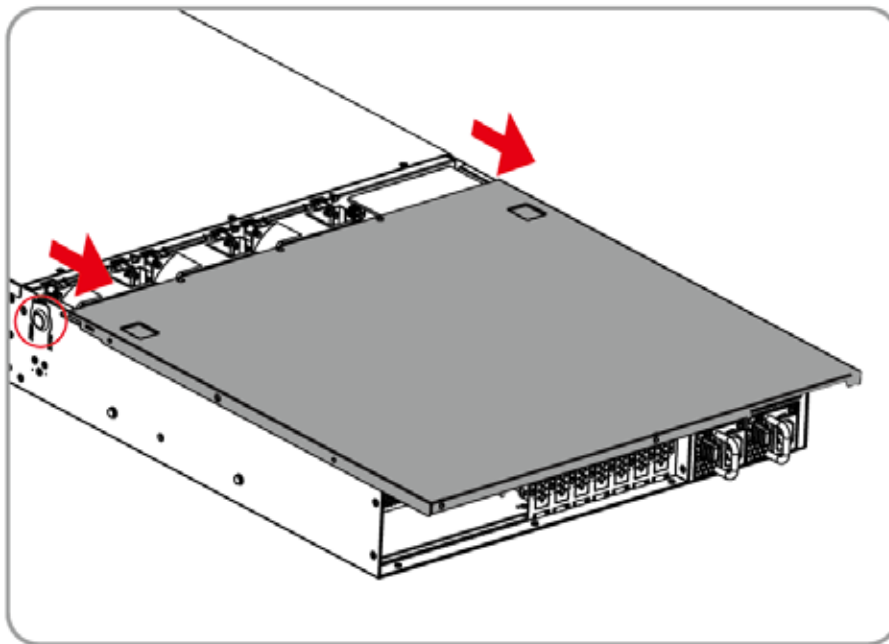
**NOTE**

Motherboard is not included in this product.

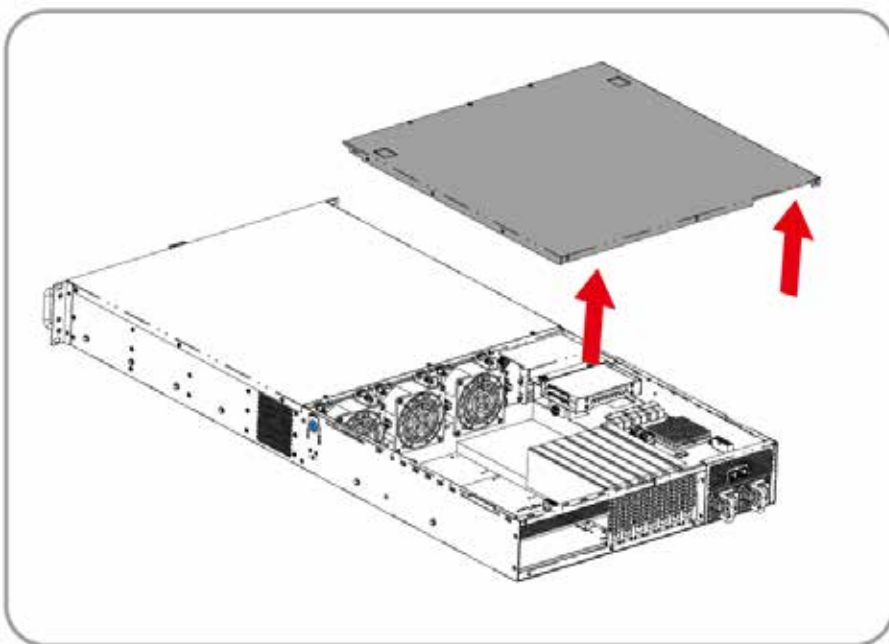
# Chapter 2. Hardware Setup

## 2.1 Top Cover

- ① Push the release button on both sides of the chassis and push the cover towards the rear panel.

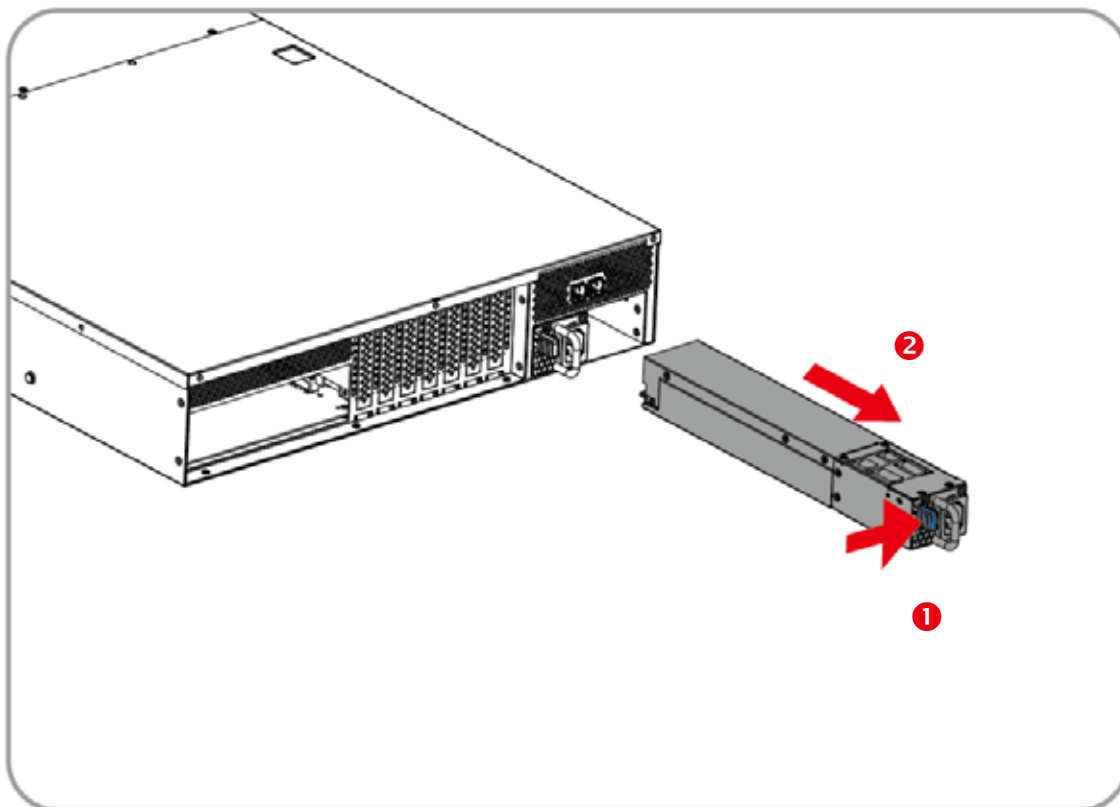


- ② Lift the top cover upward.



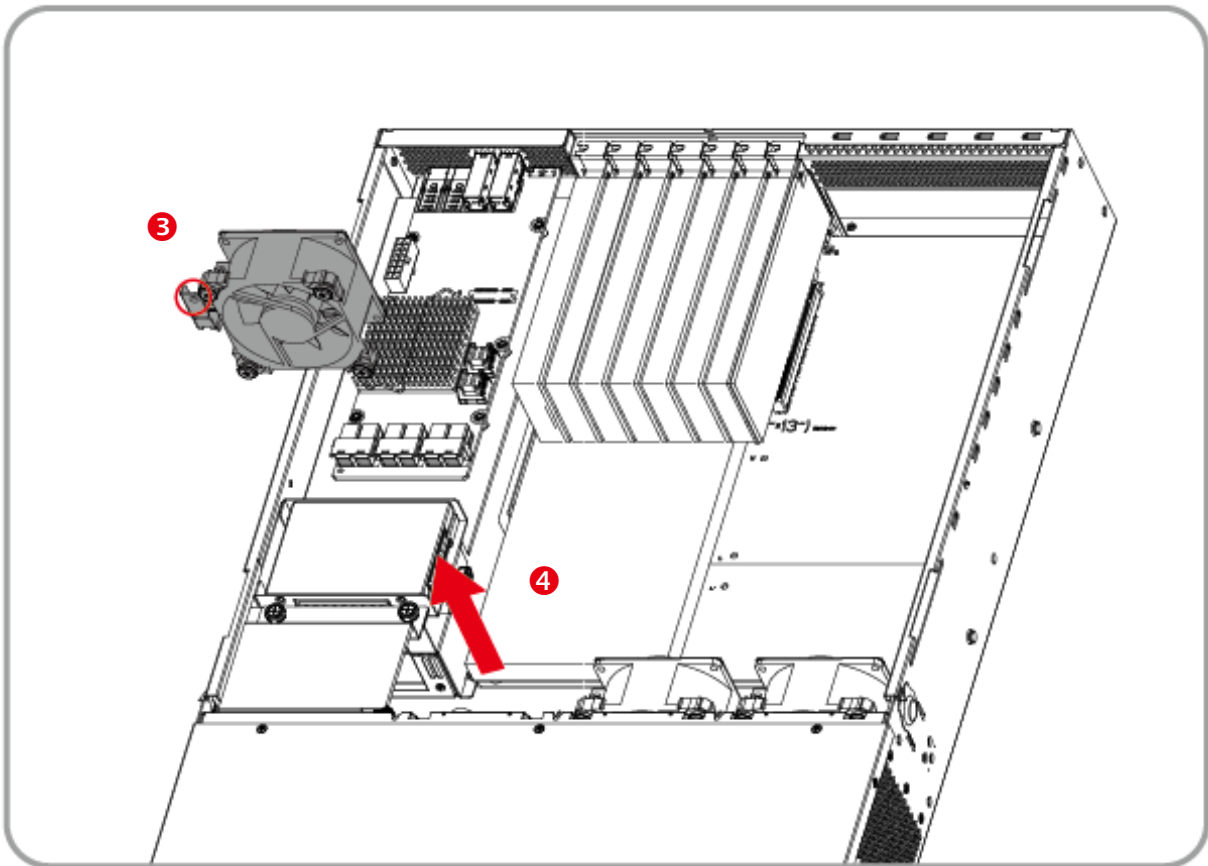
## 2.2 Power Supply Unit Module

- ① Remove the power supply unit by pushing the ejector and pull the power supply unit outward.
- ② Pull the module out of the chassis.
- ③ Push the replaced module into the chassis to complete installation. Ensure that the module is accurately inserted and locked into the chassis.



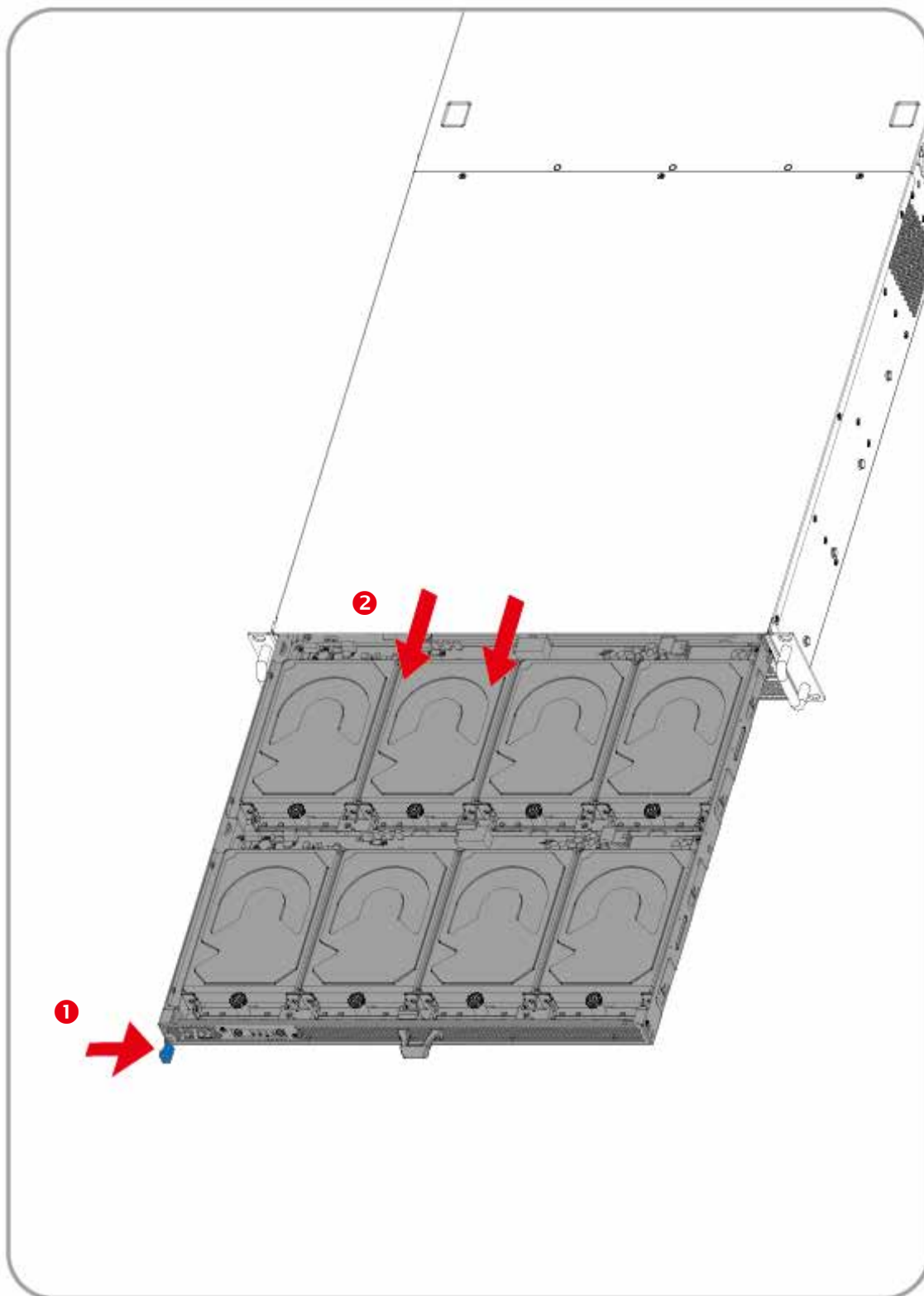
## 2.3 Fan Module

- ① Remove the top cover of the chassis. Please refer to Section 2.1.
- ② Unplug the cables and connectors.
- ③ Remove the fan module by dislodging the screw on the fan bracket.
- ④ Lift the fan module upward. Check to carefully dislodge the rubber connectors from the attached bracket.
- ⑤ Insert the replaced fan into the chassis. Verify to align the rubber connectors with the appropriate slot in the bracket.
- ⑥ Secure the screw to complete installation.



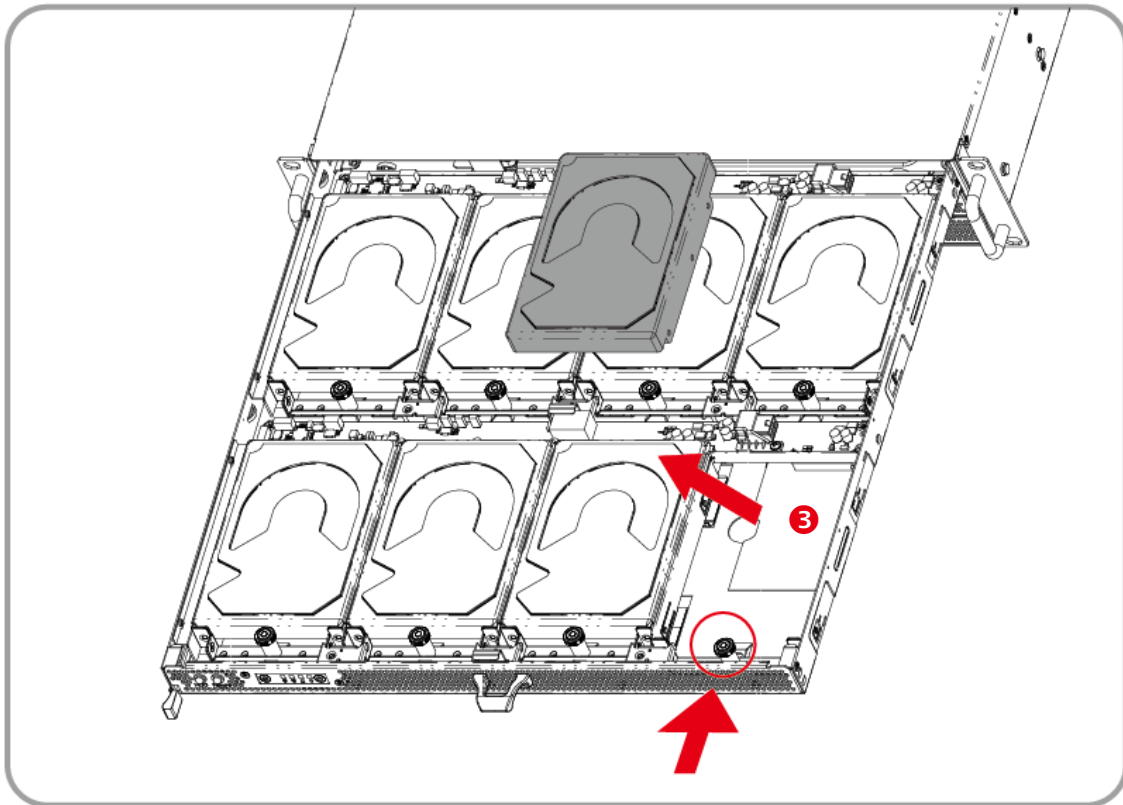
## 2.4 Hard Disk Drive

- ① Press the release button on the tray and pull.
- ② Pull the tray out of the chassis.



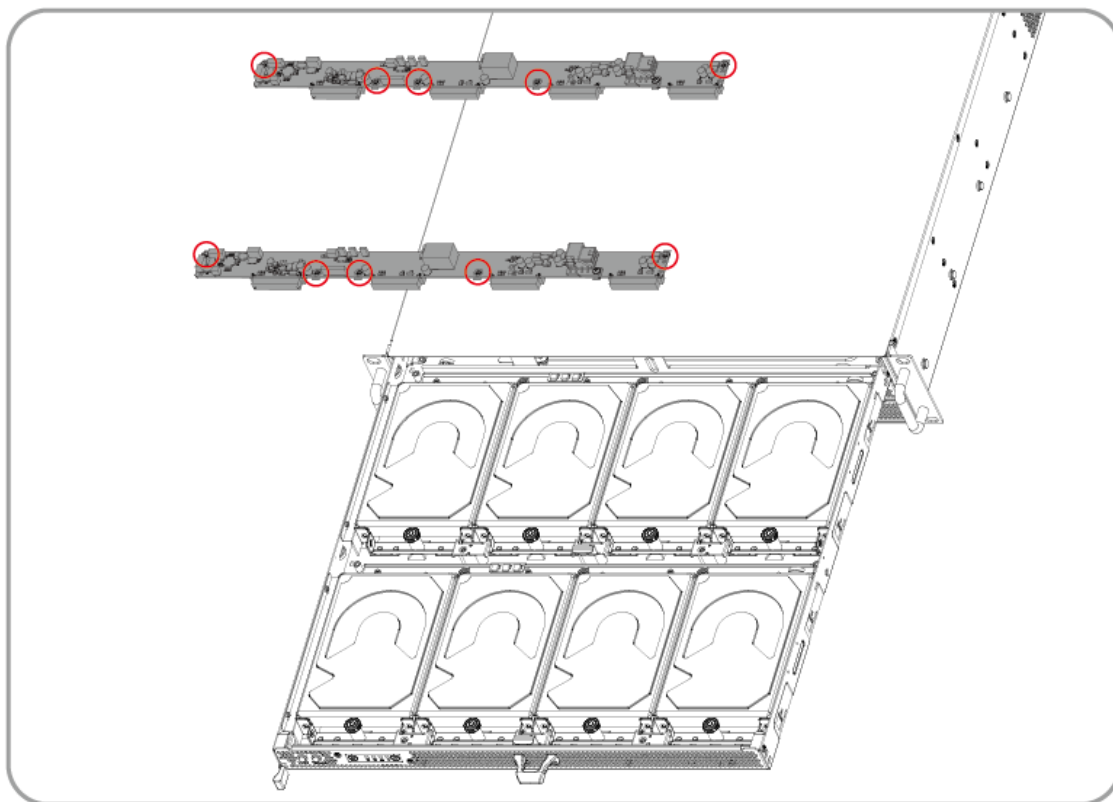


- ③ Remove the HDD by pushing the plunger inward and lifting the HDD from the chassis.
- ④ Insert the replaced HDD into the chassis. Ensure that the HDD is aligned and locked into the tray.
- ⑤ Push the tray into the chassis to complete installation.



## 2.5 HDD Backplane Module

- ① Remove all of the HDD from the chassis. Please refer to section 2.5.
- ② Remove the backplane module by dislodging the screws that secure the HDD backplane to the chassis.
- ③ Pull the HDD backplane from the chassis.
- ④ Insert the replaced module into the chassis and secure the screws to complete installation.



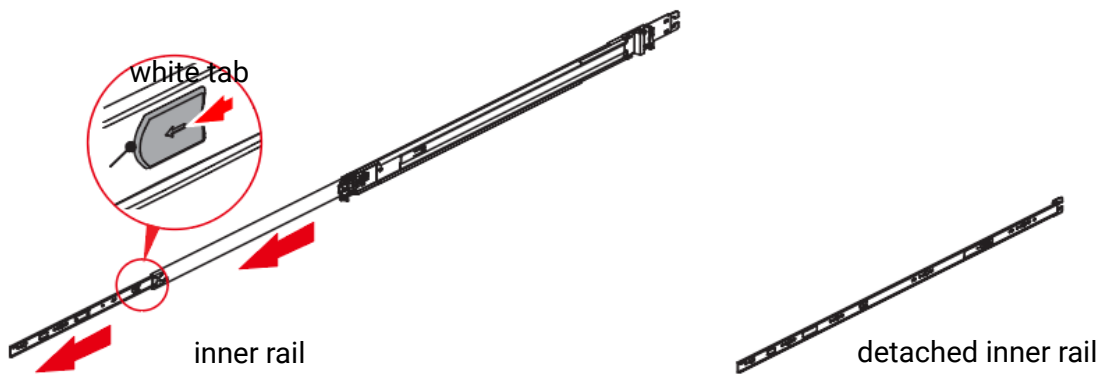
## 2.6 Slide Rail Installation

### NOTE

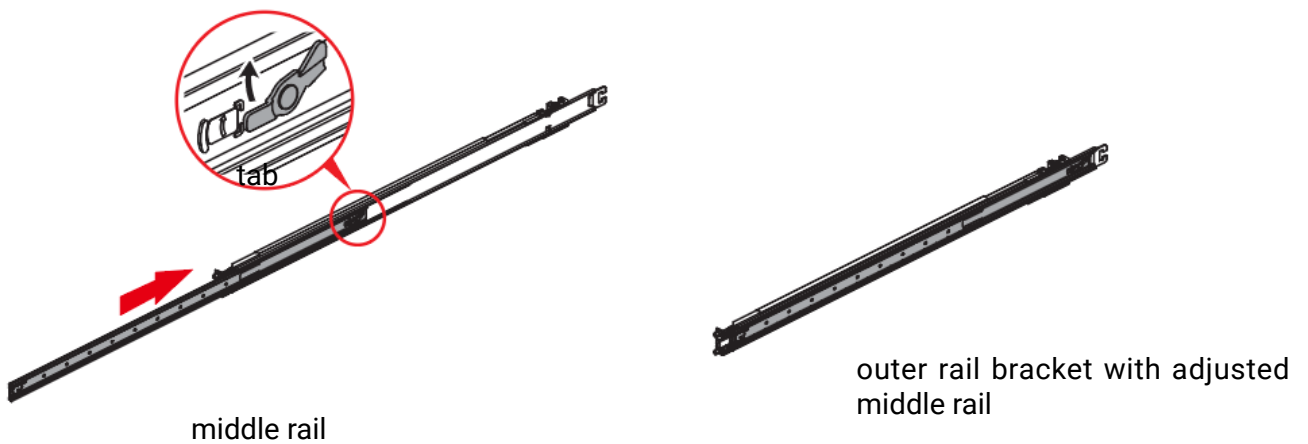


This sections provides a basic instruction for mounting the slide rail onto the system. Tool-less rails vary per order. The rail in this manual may not exactly match the rail for your system. Please refer to the specifications or quick installation guide that came with your purchased product.

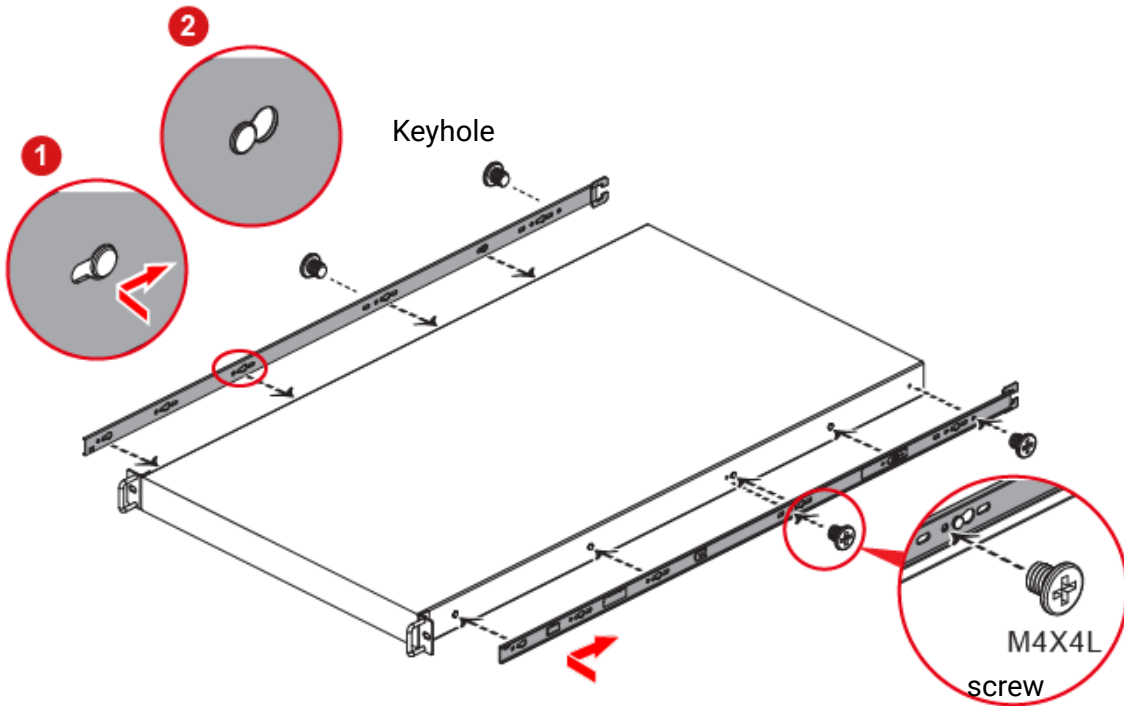
- ① Pull the inner rail out of the slide rail until it clicks.
- ② Detach the inner rail completely from the slide rail by pulling the white tab forward.



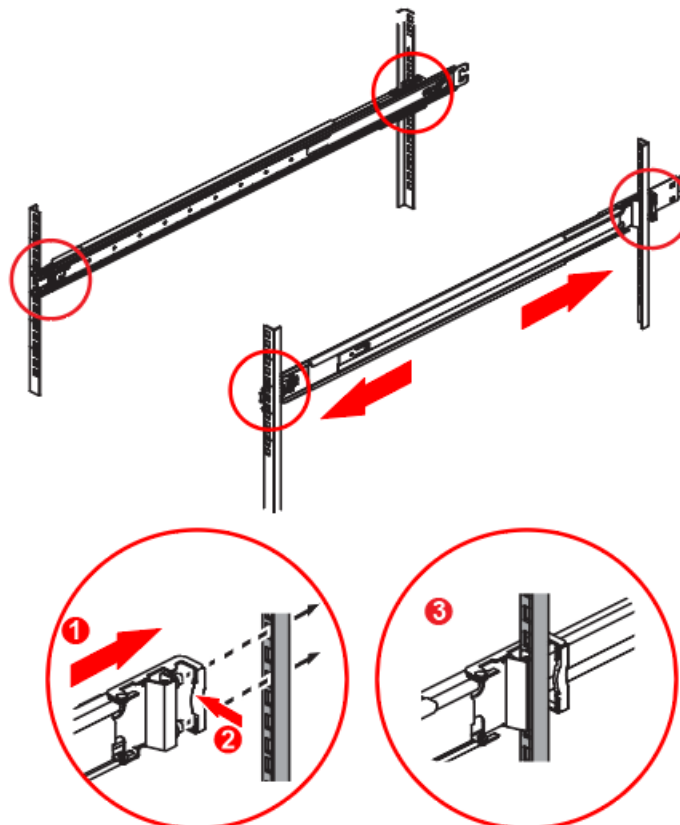
- ③ After the inner rail is dislodged, adjust the middle rail back to its original position by pushing the tab on the middle rail.



- ④ Install the inner rail onto the system barebone. Lock the keyholes and secure the screws on sides of the system.

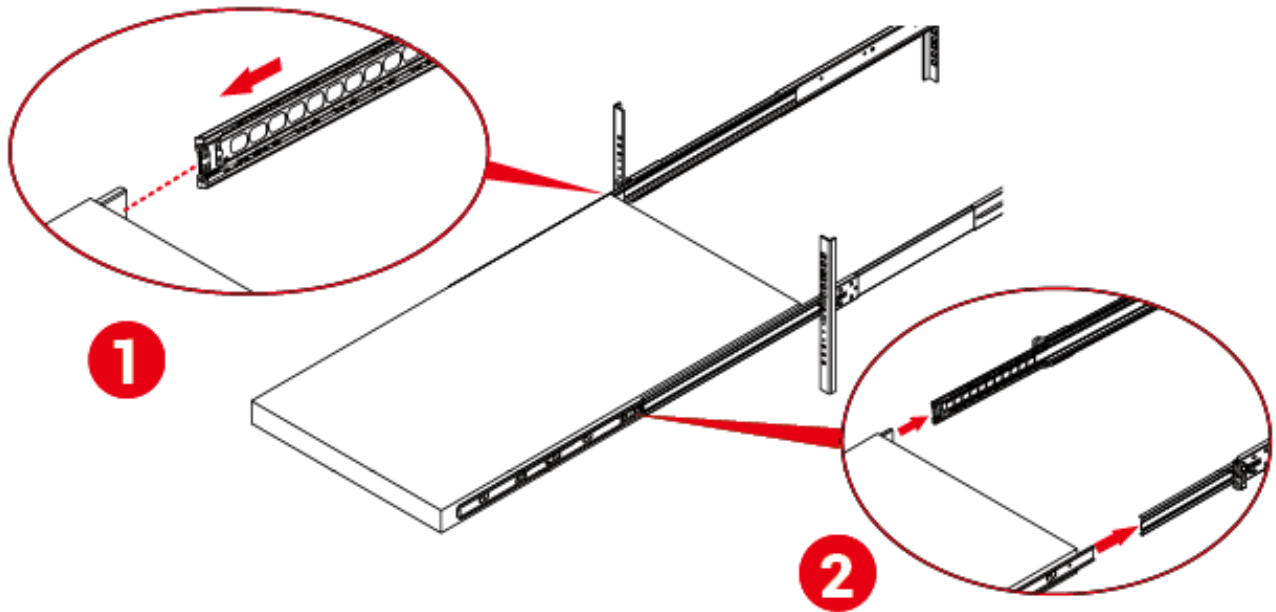


- ⑤ Continue installing the outer rail bracket to the mounting frame. Attach the outer rail assembling to the frame and press the bracket to form a rack on both ends. Repeat to fully mount the bracket assembly on the other side.



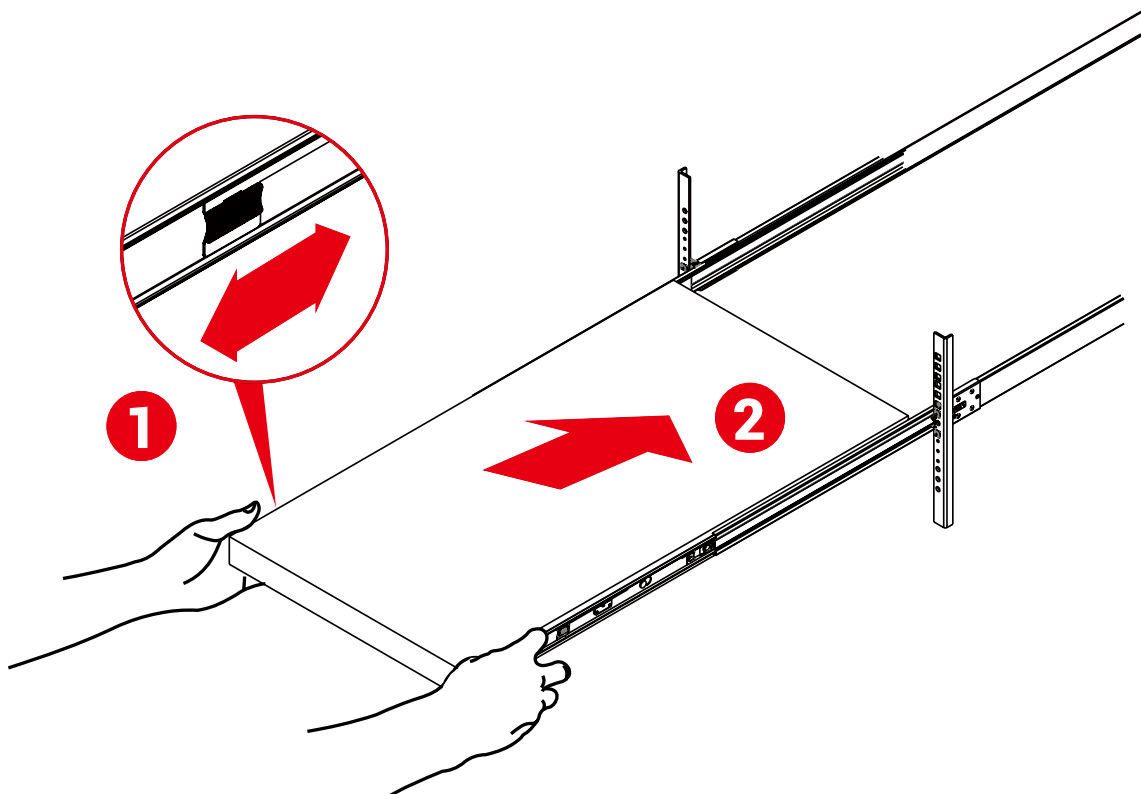
Attach and press bracket.      bracket secured.

- ⑥ Pull out the middle channel until the ball bearing retainer is locked forward.

**CAUTION**

Verify ball bearing retainer is locked forward.

- ⑦ Slide the release tab and push barebone into rack. Make sure the barebone is completely installed onto the rack.



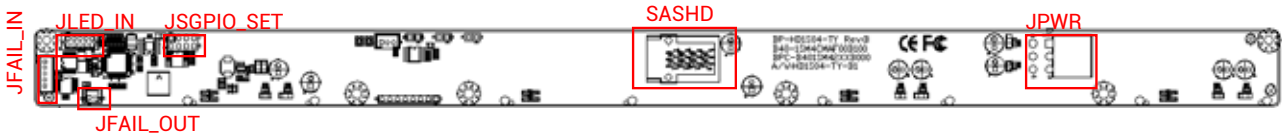
# Chapter 3. Hardware Specifications

This chapter illustrates a detailed instruction guide on hardware specifications.

## 3.1 HDD Backplane

### 3.1.1 Layout

Top view

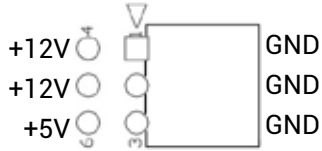


Bottom view

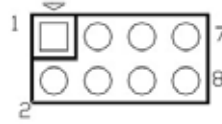


### 3.1.2 Connector and Jumper

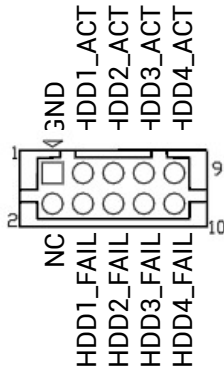
#### Power Connector (JPWR)



#### SGPIO Jumper Function and Setting



#### Status LED Header (JLED\_IN)

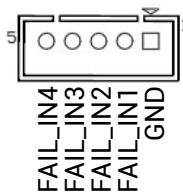


Pin	Status	Description
1, 2	Open	Disable External Access LED input.
	Close	Enable External Access LED input.
3, 4	Open	Access LED from HDD Pin P11.
	Close	Access LED from SGPIO.
5, 6	Open	Identify behavior according to Host.
	Close	Identify LED blinking behavior.
7, 8	Open	Disable SGPIO.
	Close	Enable SGPIO.

#### Fail LED Header (JFAIL\_OUT)



#### Fail LED Status Header (JFAIL\_IN)



# Chapter 4. Technical Support



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