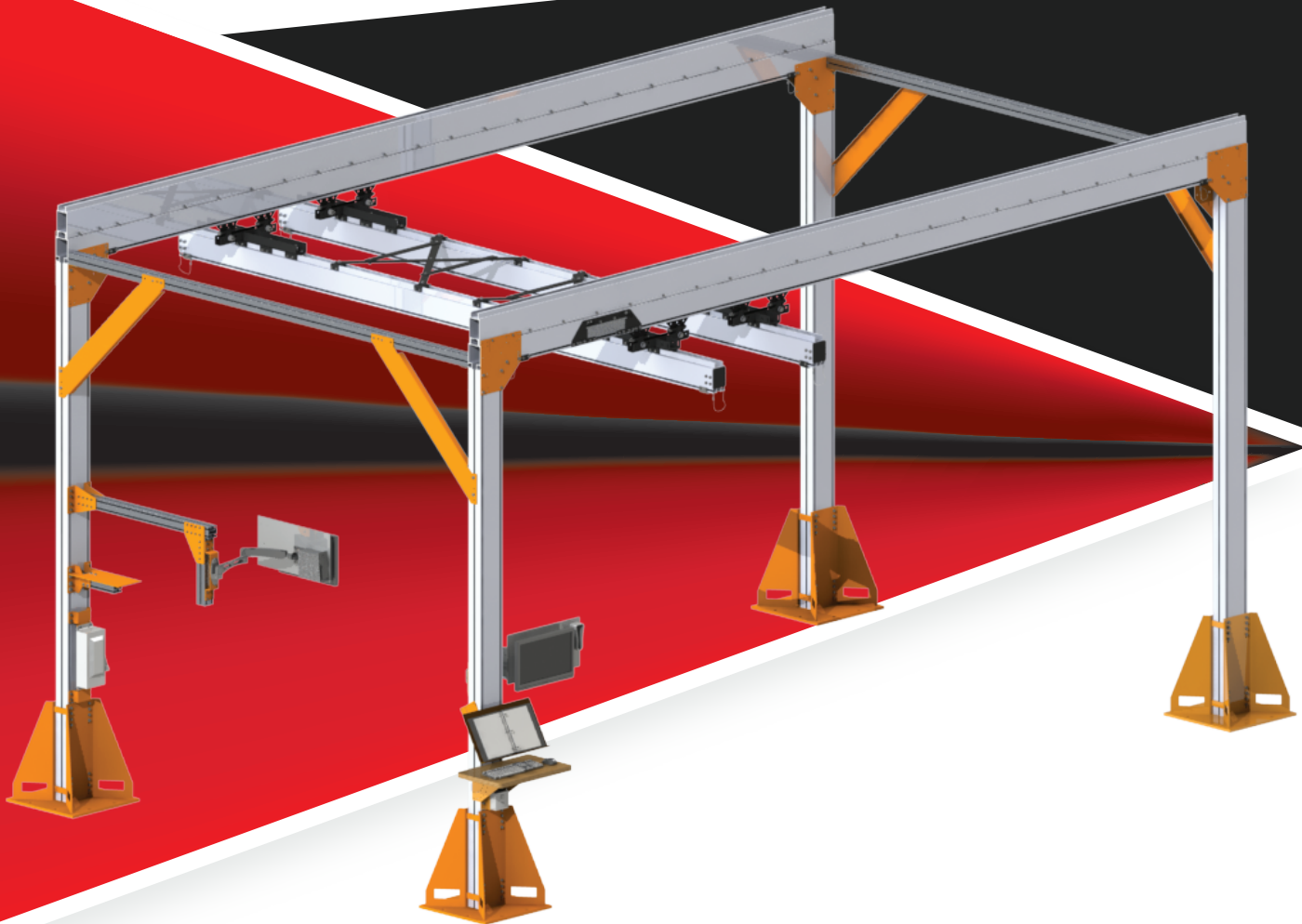




# KNIGHT

GLOBAL



## Floor Mounted Rail Systems

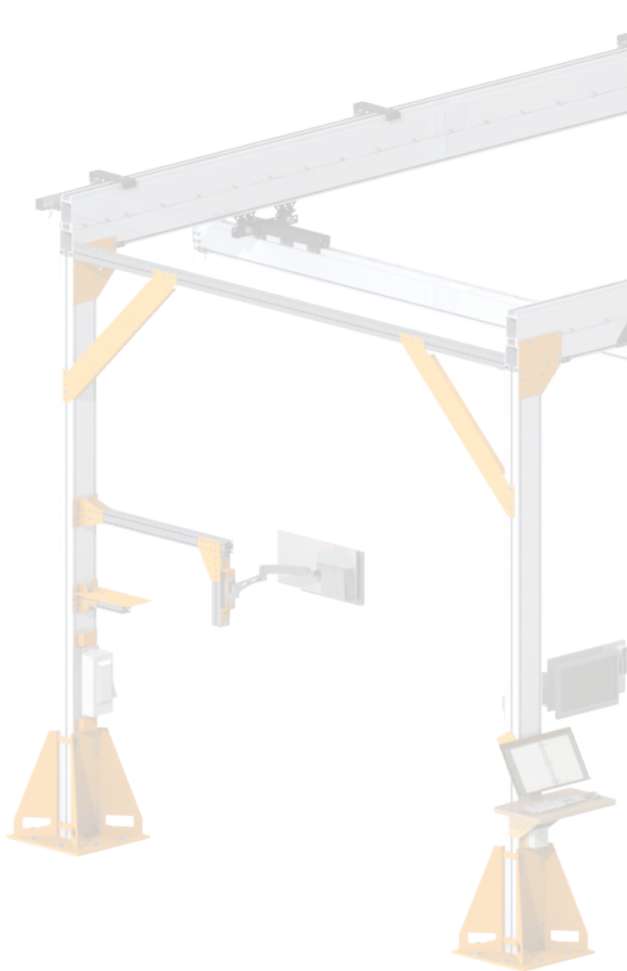
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## **Introduction**

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We are committed to  
**Total Customer Satisfaction**  
through  
QUALITY, RELIABILITY and  
EMPLOYEE INVOLVEMENT.

## **Knight Global | Warranty Information**

Knight warrants that its products and parts shall meet all applicable specifications, performance requirements, and be free from defects in material and workmanship for one year, (Servo Systems for two years, Pneumatic Lift Tables for 5 years), from the date of invoice, unless otherwise noted. One exclusion would include any purchased components not manufactured by Knight and their specific individual warranties. Paint defects, scratches and marring from shipping are also excluded.

This warranty shall not cover the failure or defective operation caused by inadequate training provided by customer regarding the operation and / or maintenance of the tool, misuse, negligence, misadjustment, or any alteration not approved by Knight. Knight's obligation is limited to the replacement or repair of Knight's products at a location designated by Knight. Buyer is responsible for all associated internal removal and reinstallation costs as well as freight charges to and from Knight Industries. Knight's maximum liability shall not in any case exceed the contract price for the products claimed to be defective.

Any field modification made to Knight Products or Systems without the written authorization by Knight Global shall void Knight's warranty obligation.

Knight warrants the Servo Hoist, Arms, and Tractors to be free from defects in material or workmanship for a period of two years or 6000 hours use from the date of shipment.

Knight Distributors/ Agents are not authorized to circumvent or change any of these terms and or conditions of this warranty unless prior approval is received in writing by Knight Global Management. Verbal statements made by Knight Distributors/ Agents do not constitute warranties.

On a design and build job, the customer is the owner of the equipment once they authorize shipment. The purchased equipment can not be returned for reimbursement or credit.

DISCLAIMERS: OTHER THAN AS SET FORTH HEREIN, NO OTHER EXPRESSED WARRANTIES, AND NO IMPLIED WARRANTIES, ORAL AND WRITTEN, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE, ARE MADE BY KNIGHT GLOBAL WITH RESPECT TO ITS PRODUCTS AND ALL SUCH WARRANTIES ARE HEREBY SPECIFICALLY DISCLAIMED.

KNIGHT GLOBAL SHALL NOT BE LIABLE UNDER ANY CIRCUMSTANCES FOR ANY INCIDENTAL, SPECIAL AND/OR CONSEQUENTIAL DAMAGES WHATSOEVER, WHETHER OR NOT FORESEEABLE, INCLUDING BUT NOT LIMITED TO DAMAGES FOR LOST PROFITS AND ALL SUCH INCIDENTAL, SPECIAL AND/OR CONSEQUENTIAL DAMAGES ARE HEREBY ALSO SPECIFICALLY DISCLAIMED.

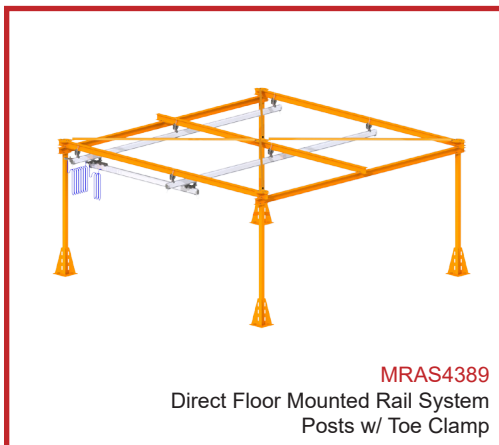
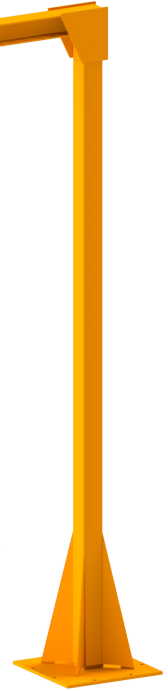
KNIGHT GLOBAL WILL NOT BE LIABLE FOR ANY LOSS, INJURY OR DAMAGE TO PERSONS OR PROPERTY, NOR FOR DAMAGES OF ANY KIND RESULTING FROM FAILURE OR DEFECTIVE OPERATION OF ANY MATERIALS OR EQUIPMENT FURNISHED HEREUNDER.

# Overview

## Knight Floor Mounted Rail Systems

Knight Global's Rail Systems are designed to provide a safe, efficient solution to your ergonomic challenges. Rail Systems are available in Knight's RAD4110, RAD6110 and RAD7510 Series rail sizes. Knight suspension rail systems include an enclosed trolley track that resists dirt build up for a smoother, quieter operation. A wide range of options are available with each system to meet all your specific engineering and application requirements. A Knight Global Representative will assist you in selecting and developing alternatives when designing your rail system.

MRAS4203 Offset Floor  
Mounted Rail System Post



# MRAS4389 Rail System



## DIRECT FLOOR MOUNTED RAIL SYSTEM POSTS

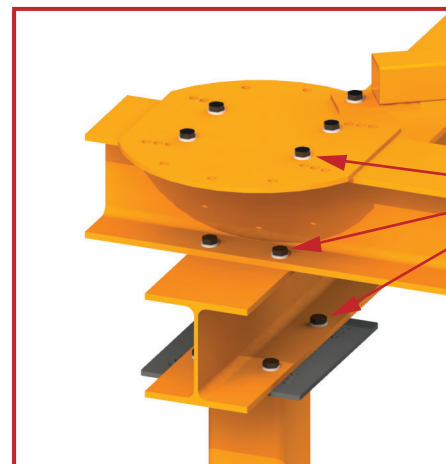
Knight Global's **MRAS4389** Direct Floor Mounted Rail System Posts with Toe Clamps are designed to provide a safe and efficient solution to your ergonomic challenges. A wide array of options are available to meet all your specific engineering and application requirements. Posts are also available with a "Bolt-Together" style. Each system is designed individually to your application and capacity requirements. The MRAS4389 Floor Mounted Rail System is available in Knights RAD4110 Series, RAD6110 series and RAD7510 Series Aluminum Rail.

## Features and Benefits

- Mechanical Properties:
  - ASTM A36 Steel Floor Mounted Posts
- Floor Mounted Configuration.
- Suspends Knights **RAD4110**, **RAD6110** and **RAD7510** Series workstation crane systems.
- **Toe Clamp or Bolt-Together Style**
- I-Beam Structure.
- Maximum Capacity: **Varies per application.**
- Designed specifically to your application and capacity requirements.
- Efficient and economical solution when an overhead structure is not available to mount a workstation crane system.

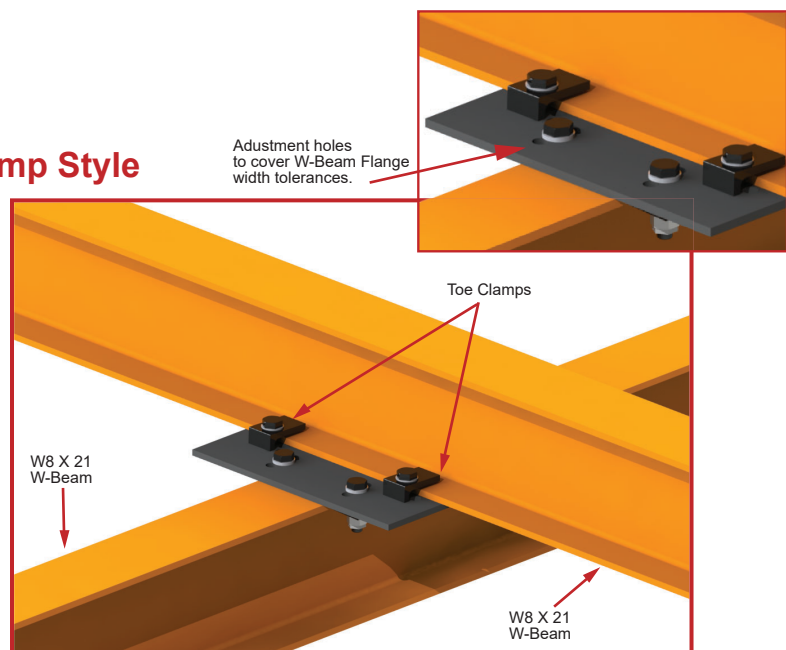
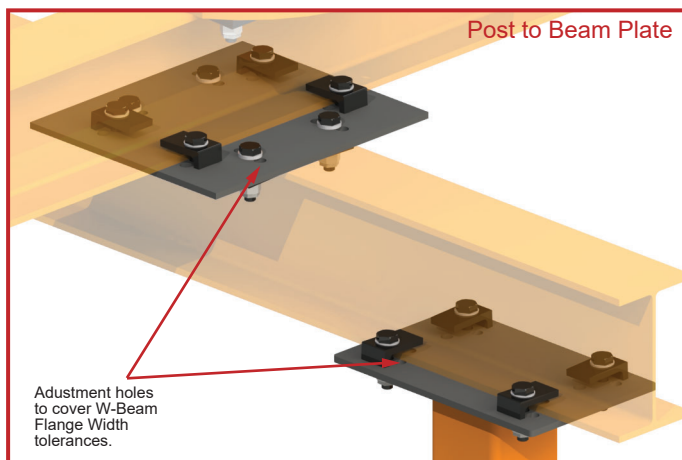
**Note:** The **MRAS4389** Direct Floor Mounted Rail System is designed for the use of **W8 X 21 W-Beam**. If other beams are used instead of **W8 X 21 W-Beam**, custom beam and post plates must be supplied. For more information, contact a Knight representative.

### Bolt-Together Style



- A325 structural bolt.
- A194 Hex Nut.
- Heavy Hex Nut.
- F436 Washer
- Structural Washer.
- Hex Pal Nut.

### Toe-Clamp Style



Beam to Beam Plate

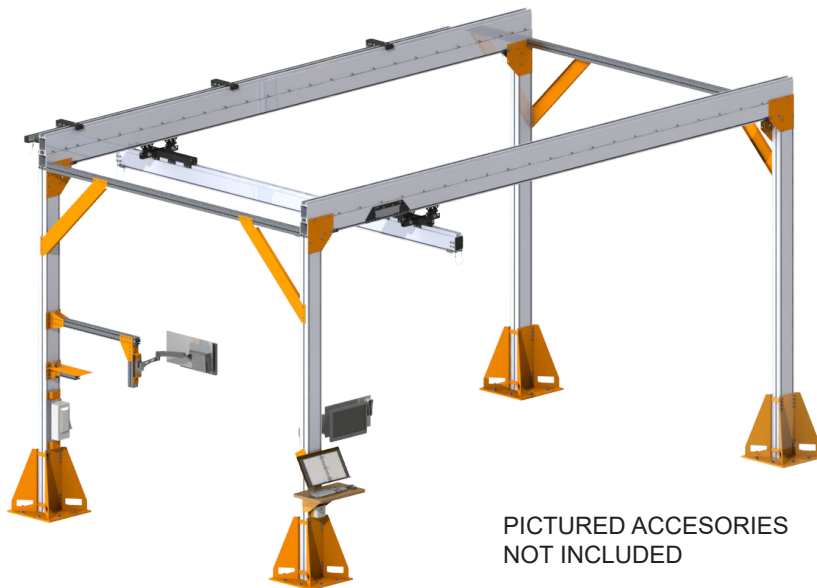
# AFMRS1000 Rail System

## ALUMINUM FLOOR MOUNTED RAIL SYSTEM

Knight's Aluminum Floor Mounted Rail System is an easy to assemble lightweight alternative to the traditional steel four post system. The channels in the extruded aluminum posts can be used to mount torque monitors, tool holders, keyboards, television screens, tables and more. Each AFMRS1000 Floor mounted Rail System is designed individually to your application and capacity requirements.

### Features

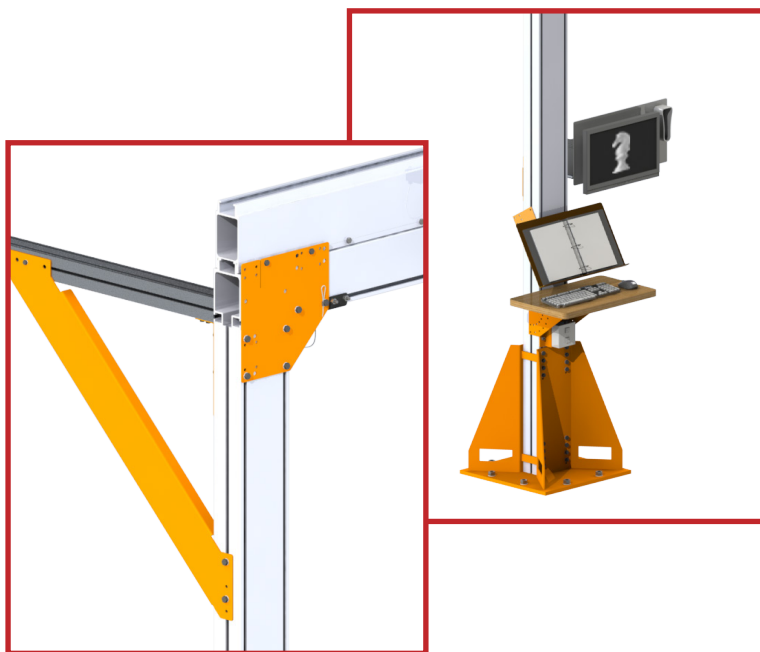
- Suspends Knight's **RAD4110**, **RAD6110** and **RAD7510** bridges.
- Engineered Aluminum Posts.
- Engineered Aluminum Cross Brace Supports.
- Bridge Type: Single/ Dual.
- Runway Rail Type: RAD7510.
- Max. Runway Length: 30 ft. [9144mm].
- Max. Bridge Length:
  - RAD7510 - 30 ft. [9144mm].
  - RAD6110/ RAD4110 - 25ft. [7620mm].
- Max. Post Height: 15ft. [4.5m] (to bottom of runway).
- Max. Capacity: **3,000 lbs [1360kg]**.



PICTURED ACCESSORIES  
NOT INCLUDED

### Benefits

- Posts no longer require welded construction which improves delivery time.
- Posts integrated channel design allows for attachment of accessories such as: Controls boxes, FRLs, etc.
- Bolt-together construction.
- Integrated runway rails.
- Integrated inspection gate on runways.





# AFMRS2000 Rail System

## ALUMINUM FLOOR MOUNTED RAIL SYSTEM “EXPANDABLE”

Knight's Expandable Aluminum Floor Mounted Rail System is an easy to assemble lightweight alternative to the traditional steel four post system. The AFMRS2000 is a readily “expandable” system allow for more than four posts to be used and the option of continuous runways. The channels in the extruded aluminum posts can be used to mount torque monitors, tool holders, keyboards, television screens, tables and more. Each AFMRS2000 Floor Mounted Rail System is designed individually to your application and capacity requirements.

### Features

- Suspends Knight's **RAD4110**, **RAD6110** and **RAD7510** bridges.
- Engineered Aluminum Posts.
- Engineered Aluminum Cross Brace Supports.
- Bridge Type: Single/ Dual.
- Runway Rail Type: RAD7510 / 6110 / 4110
- Max. Bridge Length:
  - RAD7510 - 27 ft. [9144mm].
  - RAD6110/ RAD4110 - 25 ft. [7620mm].
- Max. Post Height: 12 ft. [657mm] (to bottom of runway).
- Max. Capacity: **3,000 lbs [1360kg]**.



### Benefits

- System is readily expandable allowing for more than four posts to be used and the option of continuous runways.
- Posts no longer require welded construction which improves delivery time.
- Posts integrated channel design allows for attachment of accessories such as: Controls boxes, FRLs, etc.
- Bolt-together construction.
- No max runway length.
- Optional integrated inspection gate on runways.



# MRAS4203 Offset Posts

## OFFSET FLOOR MOUNTED RAIL SYSTEM POSTS

Knight Global's MRAS4203 Offset Floor Mounted Rail System Posts provide a safe and stable platform to your floor mounted rail system. Each Direct Floor mounted Rail System Post is designed individually to your application and capacity requirements. The MRAS4203 Floor Mounted Rail System Post is designed to suspend Knights RAD4110, RAD6110 and RAD7510 Series Aluminum Rail.

### Features and Benefits

- Mechanical Properties:
  - ASTM A36 Steel Floor Mounted Posts
- Designed specifically to your application and capacity requirements.
- Suspends Knights RAD4110, RAD6110 and RAD7510 Series workstation crane systems.
- Post Heights: Up to 20 ft. [6.1m].
- Maximum Capacity: **Varies per application.**
- Designed specifically to your application and capacity requirements.



MRAS4203  
Offset Post

\* For more detailed information on Knight Rail Systems. Please visit [knightglobal.com](http://knightglobal.com) or contact a Knight representative.

## CANTILEVERED RAIL SYSTEMS

Knight Global's Cantilevered Rail Systems are designed to eliminate the need for a four post floor structure system. It provides an alternative to workstations with minimal floor space.

A wide range of options are available with each system to meet all your specific engineering and application requirements. A Knight Representative will assist you in selecting and developing alternatives when designing your rail system.



### Features

- Maximum Column Height:  
17 ft. [5181mm].
- Maximum Beam Length:  
23 ft. [7010mm].
- Rigid End Trucks to prevent skewing of the bridge and for precise loading and unloading operations.
- End-Caps with Shocks to absorb the bridge hitting the end of the rail.
- Extended Stack Hangers with 1.5 in. [38mm] of vertical adjustment in 0.25 in. [6mm] increments.
- Sway Cables with turnbuckles for adjustment.
- Integrated beam pad eyes to secure safety and lateral sway cables.
- Beam pad eyes assist in the lifting of the beam for assembly of the rail system.
- Maximum capacity varies by system requirements. See specification sheet for more information.

### Benefits

- Additional columns to minimize deflection.
- Extended Runways over 27 ft. [8230mm]
  - Requires Runway Rail Splice kit.
- Mid Rail Stops.
- Dual Cantilevered Rail System Configuration.
- Offset Three Post Cantilevered Rail System Configuration.

**Note:** Additional columns can be added to the two post system to achieve **greater load capacities and minimize deflection**. Additional bridge rails can be added also to multiple bay systems to support multiple operations.



### Configurations

