# **THK Linear Bearing Slide Guide Block**

Linear Guides are a block and rail system that helps support the motion of an application.

#### **How linear Guides Work**

There are two parts to the Linear Guide System: the Linear Block and the Linear Rail. The linear block moves along the linear rail along the plane the rail is positioned for. The block moves forward and backward along the straight linear rail. Linear blocks connect to the moving components by mounting to the block to support the motion for the specified component. The motion is created along the rail through recirculating ball bearings within the block that is contacted on the rail.

### **Basic Types of Linear Guides**

Two basic types of linear guides are predominantly used in industry today. These types are: sliding contact linear motion bearing and rolling element linear motion bearing guides. The main distinction between the two is how the motion of the linear block occurs along the linear rail.

## **Specification of Linear Guide Rail:**

Model No.	Oute	r dimens	ions	Basic load rating					
	Height	Width	Lengh	Rad	dial	Rever	se radial	S	ide
			t		1				
	н	W	L	Dynami	Static	Dynami	Static	Dynam	Static
	mm	mm	mm	С		С		ic	
				rating	rating	rating	rating	rating	rating
				С	C0	CL	C0L	СТ	C0T
HSR 20LA	30	63	90	21.3	31.8	21.3	31.8	21.3	31.8
HSR	30	63	90	21.3	31.8	21.3	31.8	21.3	31.8
20LAM									
HSR 25LA	36	70	102.2	27.2	45.9	27.2	45.9	27.2	45.9
HSR	36	70	102.2	27.2	45.9	27.2	45.9	27.2	45.9
25LAM									
HSR 30LA	42	90	120.6	37.3	62.5	37.3	62.5	37.3	62.5
HSR	42	90	120.6	37.3	62.5	37.3	62.5	37.3	62.5
30LAM									
HSR 35LA	48	100	134.8	50.2	81.5	50.2	81.5	50.2	81.5
HSR	48	100	134.8	50.2	81.5	50.2	81.5	50.2	81.5
35LAM									
HSR 45LA	60	120	170.8	80.4	127	80.4	127	80.4	127
HSR 55LA	70	140	201.1	119	183	119	183	119	183
HSR 65LA	90	170	245.5	192	286	192	286	192	286
HSR 85LA	110	215	303	282	412	282	412	282	412

## **Applications that Use Linear Guides**

Linear guides are used to move a machine table in either the X or Y direction. Applications which require high precision use linear guides due to their high accuracy and precision capabilities.

PART NUMBER/CODE	BRAND	DESCRIPTION	QTY
RA451240BNC2K02P5	NSK	LINEAR GUIDE 70MMX86MMX1240MM	2
3			
30TAC62BDFFC9PN7	NSK	BEARING INSIDE DIA 30MM OUTER DIA 62MM	1
A		WIDTH 60MM	
RA301040ANC2K03P5	NSK	LINEAR GUIDE 45MMX60MMX1040MM	2
3			
RA451000ANC2K09P5	NSK	LINEAR GUIDE 70MMX86MMX1000MM	2
3			
30TAC62BDFDC9PN7	NSK	BEARING INSIDE DIA 30MM OUTER DIA 45MM	2
A		WIDTH 60MM	
35TAC72BDFFC9PN7	NSK	BEARING INSIDE DIA 35MM OUTER DIA 72MM	2
A		WIDTH 60MM	
HSR25R1SSC1+460L	THK	LINEAR GUIDE 40MMX48MMX460MM	2
HSR25R1SSC1+160L	THK	LINEAR GUIDE 40MMX48MMX160MM	2
BNT2010-2.6ZZ+410LT	THK	BALL SCREW 46MMX48MMX410MM	2

## **Sales and Service**

Providing the Best Sales, Service and Support Available