

### KOO Series Adjustable Long Throw Multi-Jet Nozzle Diffuser

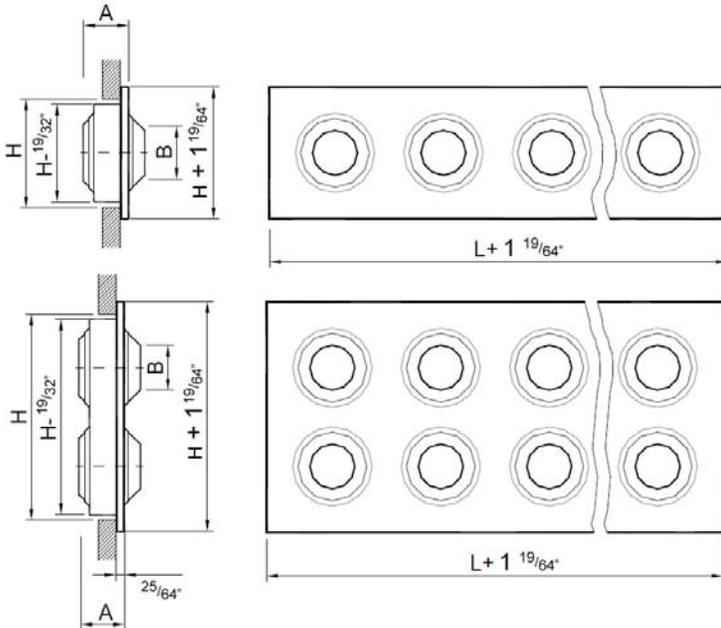
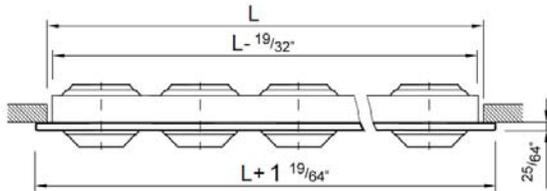
**Material** | Aluminum jet nozzles and galvanized steel panel

**Air Pattern** | Long throw, independently adjustable directional jets



**KOO**  
by MADEL®

**PATENTED**

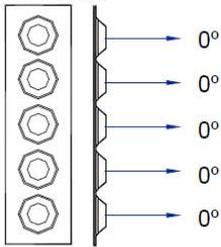


Select Dimension						
✓	List Size	Nb Nozzles	L	H	A	B
	8 x 4	2 x 1	7 7/8"	3 15/16"	1 3/8"	1 47/64"
	12 x 4	3 x 1	11 13/16"	3 15/16"	1 3/8"	1 47/64"
	16 x 4	4 x 1	15 3/4"	3 15/16"	1 3/8"	1 47/64"
	20 x 4	5 x 1	19 11/16"	3 15/16"	1 3/8"	1 47/64"
	24 x 4	6 x 1	23 5/8"	3 15/16"	1 3/8"	1 47/64"
	28 x 4	7 x 1	27 9/16"	3 15/16"	1 3/8"	1 47/64"
	32 x 4	8 x 1	31 1/2"	3 15/16"	1 3/8"	1 47/64"
	36 x 4	9 x 1	35 7/16"	3 15/16"	1 3/8"	1 47/64"
	40 x 4	10 x 1	39 3/8"	3 15/16"	1 3/8"	1 47/64"
	8 x 8	2 x 2	7 7/8"	7 7/8"	1 3/8"	1 47/64"
	12 x 8	3 x 2	11 13/16"	7 7/8"	1 3/8"	1 47/64"
	16 x 8	4 x 2	15 3/4"	7 7/8"	1 3/8"	1 47/64"
	20 x 8	5 x 2	19 11/16"	7 7/8"	1 3/8"	1 47/64"
	24 x 8	6 x 2	23 5/8"	7 7/8"	1 3/8"	1 47/64"
	28 x 8	7 x 2	27 9/16"	7 7/8"	1 3/8"	1 47/64"
	32 x 8	8 x 2	31 1/2"	7 7/8"	1 3/8"	1 47/64"
	36 x 8	9 x 2	35 7/16"	7 7/8"	1 3/8"	1 47/64"
	40 x 8	10 x 2	39 3/8"	7 7/8"	1 3/8"	1 47/64"
	12 x 6	2 x 1	11 13/16"	5 29/32"	2 1/4"	2 13/32"
	18 x 6	3 x 1	17 23/32"	5 29/32"	2 1/4"	2 13/32"
	24 x 6	4 x 1	23 5/8"	5 29/32"	2 1/4"	2 13/32"
	30 x 6	5 x 1	29 17/32"	5 29/32"	2 1/4"	2 13/32"
	36 x 6	6 x 1	35 7/16"	5 29/32"	2 1/4"	2 13/32"
	42 x 6	7 x 1	41 11/32"	5 29/32"	2 1/4"	2 13/32"
	48 x 6	8 x 1	47 1/4"	5 29/32"	2 1/4"	2 13/32"
	12 x 12	2 x 2	11 13/16"	11 13/16"	2 1/4"	2 13/32"
	18 x 12	3 x 2	17 23/32"	11 13/16"	2 1/4"	2 13/32"
	24 x 12	4 x 2	23 5/8"	11 13/16"	2 1/4"	2 13/32"
	30 x 12	5 x 2	29 17/32"	11 13/16"	2 1/4"	2 13/32"
	36 x 12	6 x 2	35 7/16"	11 13/16"	2 1/4"	2 13/32"
	42 x 12	7 x 2	41 11/32"	11 13/16"	2 1/4"	2 13/32"
	48 x 12	8 x 2	47 1/4"	11 13/16"	2 1/4"	2 13/32"

## Balancing Position

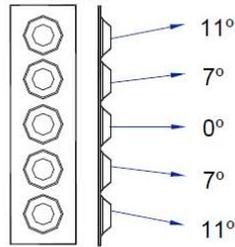
POSITION 1 (0°)

KOO Lx4  
KOO Lx6



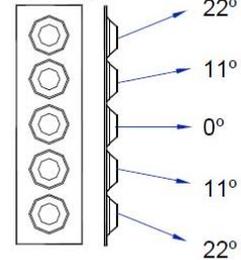
POSITION 2 (22°)

KOO Lx4  
KOO Lx6



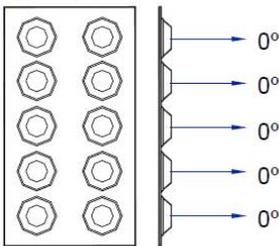
POSITION 3 (45°)

KOO Lx4  
KOO Lx6



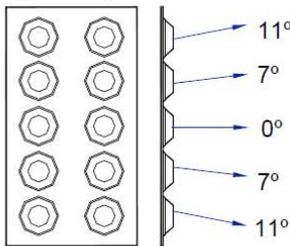
POSITION 1 (0°)

KOO Lx8  
KOO Lx12



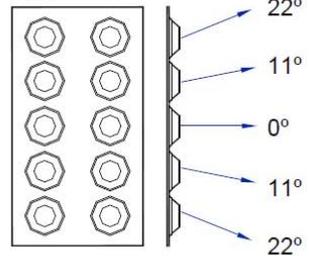
POSITION 2 (22°)

KOO Lx8  
KOO Lx12

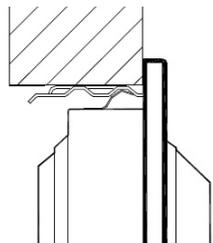


POSITION 3 (45°)

KOO Lx8  
KOO Lx12

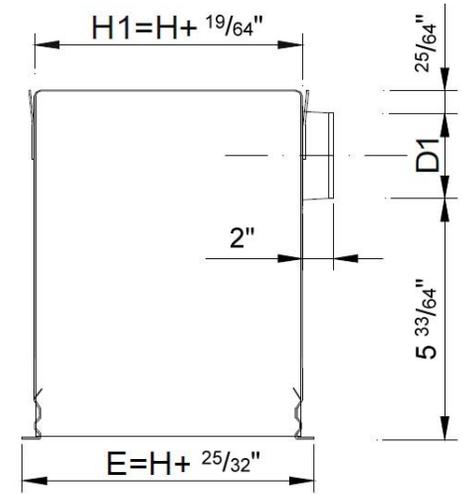
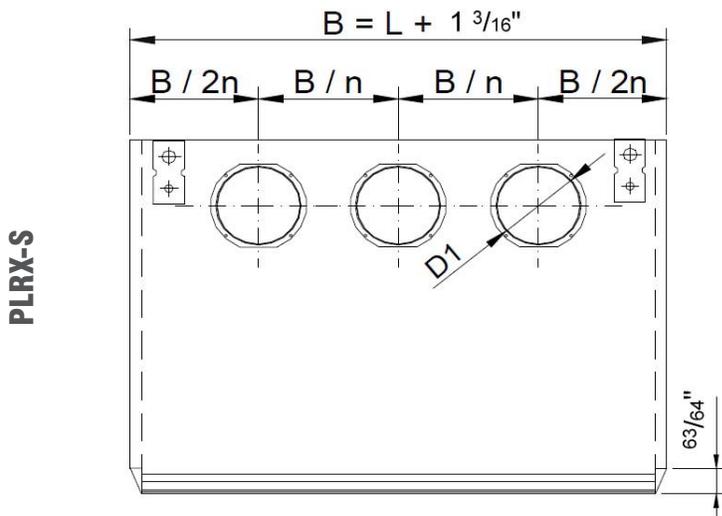
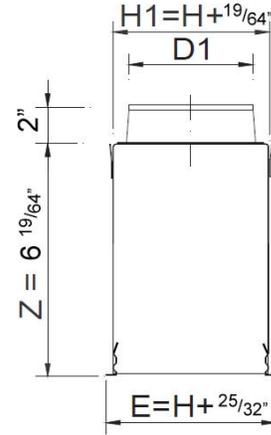
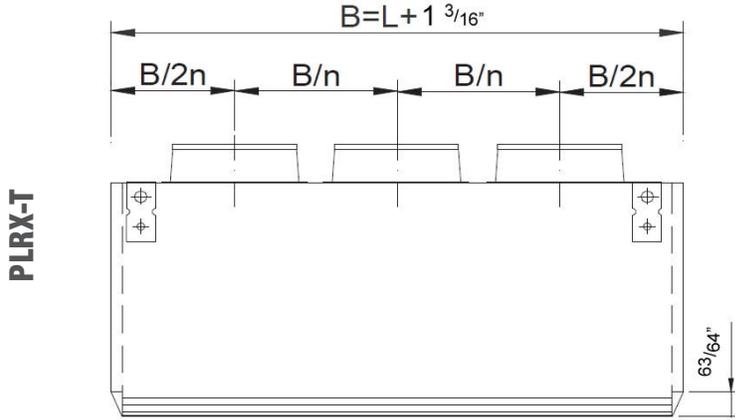


## Spring Clips Mounting



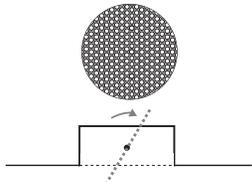
Invisible fixing by means of pressure clips with security hooks for ceiling installation. Requires PLRX plenum or CM mounting frame.

### PLRX Plenum



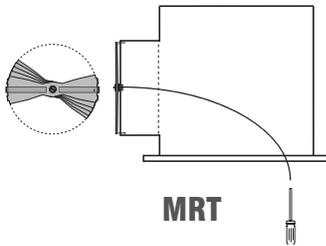
Neck Diameter and Quantity (n x D)						
L		< 24"	< 36"	< 40"	< 48"	>= 48"
H	4"	1x 4"D	2x 4"D	2x 4"D	2x 4"D	3x 4"D
	6"	1x 5"D	2x 5"D	2x 5"D	2x 5"D	3x 5"D
	8"	1x 8"D	1x 8"D	2x 8"D	2x 8"D	2x 8"D
	12"	1x 10"D	1x 10"D	1x 10"D	2x 10"D	2x 10"D

## Integrated Air Volume Dampers



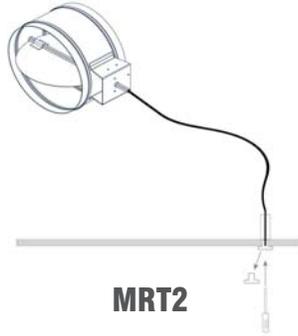
**R**

Perforated damper +  
air equalizer



**MRT**

Manually operated damper,  
cable inside the plenum,  
adjustment through face



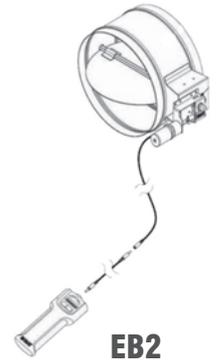
**MRT2**

Manually operated damper,  
cable through drywall with  
termination fixture



**EB**

Battery operated  
electro-balance damper  
with remote control,  
cable through face



**EB2**

Battery operated  
electro-balance damper  
with remote control,  
cable through drywall  
with termination fixture

**Important Note:** MRT, MRT2, EB and EB2 Damper Options are only available for KOO with 2 rows (Height 8" and 12").

## Accessories

### EB-SP1

Single Connector  
Drywall Termination  
Fixture for EB  
dampers



### EB-AB8

Eight Connector  
Wall Bracket for EB  
dampers



### EB-SP8

Eight Connector  
Drywall Termination  
Fixture for EB  
dampers



### EB-REMOTE

Remote Control for  
EB dampers



<b>Balancing Position (optional)</b>	
<b>1</b>	Straight - 0 Degrees (Default)
<b>2</b>	22 Degrees Spread
<b>3</b>	45 Degrees Spread

<b>Mounting</b>	
<b>S</b>	Invisible fixing by means of pressure clips
<b>T</b>	Visible Screws

<b>Finish</b>	
<b>M9016</b>	Powder Coated White RAL 9016
<b>M9006</b>	Powder Coated Metallic Grey RAL 9006
<b>RAL xxxx</b>	Please Specify:

<b>Plenum</b>	
<b>PLRX-T</b>	Top (Back) connection
<b>PLRX-S</b>	Side connection

<b>Insulation</b>	
<b>AL</b>	1/2" Interior Accoustical Liner
<b>R6</b>	2" Exterior R6 Thermal Insulation

<b>Neck-Installed Air Volume Damper</b>	
<b>R</b>	Perforated air volume damper/equalizer
<b>MRT</b>	Manually operated, cable thru face
<b>MRT2</b>	Manually operated, termination fixture
<b>EB</b>	Electro-balanced, battery powered, cable thru face
<b>EB2</b>	Electro-balanced, battery powered, cable thru drywall

<b>Cable Length (MRT2 or EB2)</b>	

<b>Project:</b>
<b>Engineer:</b>
<b>Architect:</b>
<b>Contractor:</b>