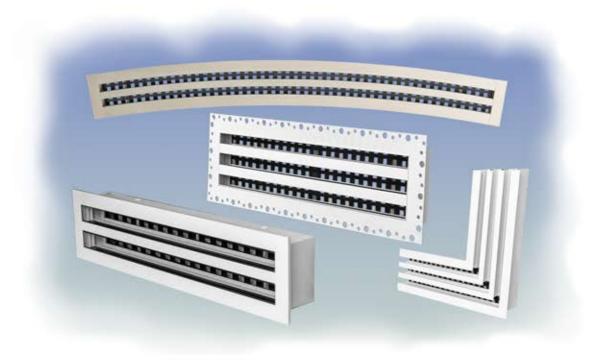
# LINEAR SLOT DIFFUSERS



SLSD Supply Linear Slot Diffuser with Hit & Miss Damper and with Deflectors.

RLSD Return Linear Slot Diffuser without Hit & Miss Damper and without Deflectors.

SLSD-P Supply Plaster Linear Slot Diffuser with Hit & Miss Damper and with Deflectors Plaster Type

RLSD-P Return Plaster Linear Slot Diffuser without Hit & Miss Damper and without Deflectors.



#### **APPLICATIONS**

Linear Slot Diffuser (LSD) is a high capacity slot diffuser suited to a wide range of applications.

With its pleasant aesthetic appearance it can be used in variety of prestigious locations such as Lobbies, Dining Hall, Hotels, Palaces and Building Entrances where aesthetic is architecturally critical. For this purpose, LSD can be supplied in a straight or curved shape with a wide variety of powder coated colors.

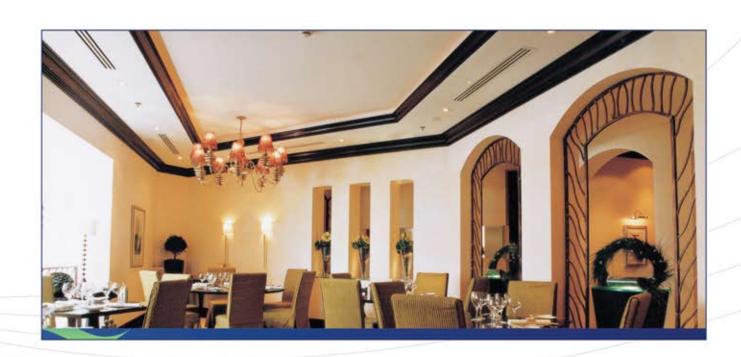
Functionally, Linear Slot Diffusers are used in large open areas where perimeter supply or return is required. LSD is provided with unique curved design of air deflecting vanes which can be adjusted as required to achieve precise control of air flow direction. Usually directional control is required towards perimeter heat source or away from adjacent glass areas.

With its steady performance at variable air flow rates, LSD can be effectively used as part of VAV systems. It can be combined with unitary plenum boxes of designer choice.

LSD can be used as supply air diffuser, return air diffuser or dummy ceiling diffuser for decorative purposes.







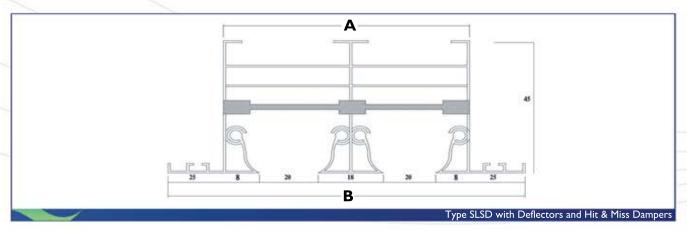
#### **LINEAR SLOT DIFFUSER (SLSD & RLSD)**



#### **Products Features:**

- Frame and curved deflection blades are made of extruded aluminium alloy 6063 to T6 Heat Treatment.
- Available in Hit and Miss Damper of GI sheet to control air flow rate without affecting the air flow patterns.
- 180° fully adjustable air flow patterns by means of two air deflector blades per slot.
- Both Deflector Blades and Hit & Miss Damper are powder coated with black color.
- Available in 1 to 8 slots.
- Standard slot width is 1/2" (16mm), 3/4" (20mm) and 1" (25mm).

- For maximum rigidity, profiles are fixed at equally spaced intervals using Screw Rods and Cylindrical shims of 6mm diameter, made of extruded aluminium.
- Maximum of one piece length is 3000mm. Larger pieces are jointed using hairline butt joints held by special aligntment strips to ensure continuous unbroken runs.
- Curved Segments are available for both sidewall curves (CS) and ceiling curves (CP), with minimum radius of curvature of 1000mm.
- Surface mount design.
- Also available with a 90° end cap

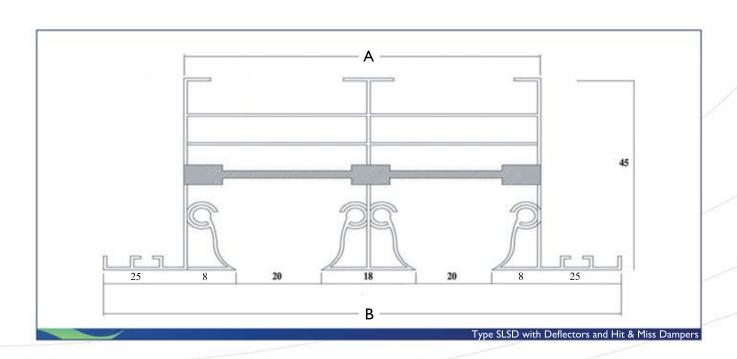


#### DIMENSIONS (FIXED 45° ENDCAP)

Standard Slot Size 25n	nm							
No. of Slots	l Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	45	89	134	177	222	265	309	353
Flange Size B (mm)	91	137	179	223	269	314	355	399

Standard Slot Size 20n	nm							
No. of Slots	l Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	40	79	118	157	196	235	274	313
Flange Size B (mm)	87	125	164	200	242	281	320	359

Standard Slot Size 16n	ım							
No. of Slots	I Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	35	69	103	137	171	205	239	275
Flange Size B (mm)	82	116	150	184	218	252	286	320

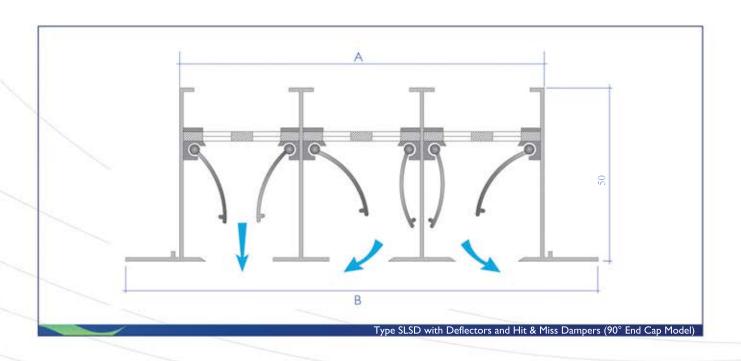


#### DIMENSIONS (REMOVABLE 90° END CAP MODEL)

Standard Slot Size 25n	nm							
No. of Slots	l Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	45	89	133	177	221	265	309	355
Flange Size B (mm)	81	125	170	215	260	304	347	393

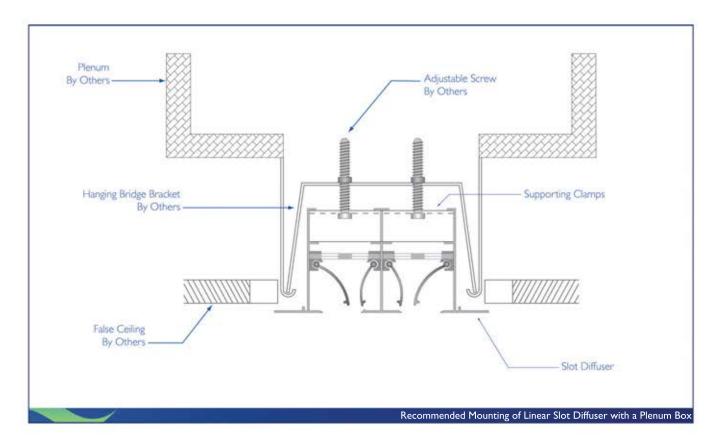
Standard Slot Size 20n	nm							
No. of Slots	l Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	40	79	118	157	198	235	274	315
Flange Size B (mm)	76	115	154	193	235	272	312	354

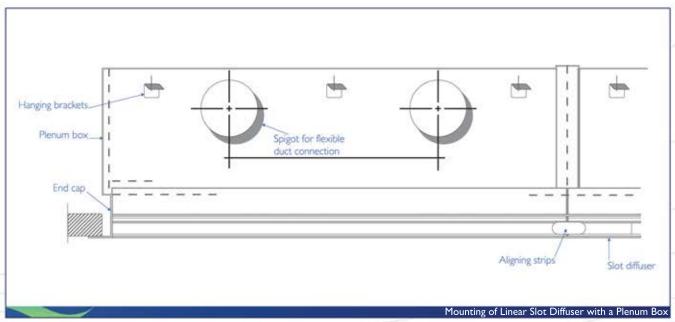
Standard Slot Size 16n	nm							
No. of Slots	l Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	36	70	104	138	172	206	240	274
Flange Size B (mm)	72	106	140	174	208	244	276	313



#### **MOUNTING / FINISH OPTIONS**

- Available in powder coated RAL 9010 or 9016 as standard color.
- Other powder coated finishes are available on request.
- Deflectors and Hit & Miss Damper are powder coated in black color as standard.

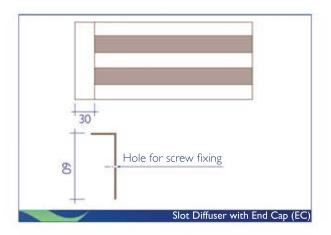




#### **ACCESSORIES (90° END CAP MODEL)**

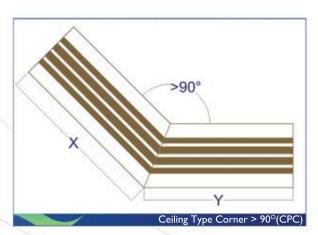
#### **END CAP (EC)**

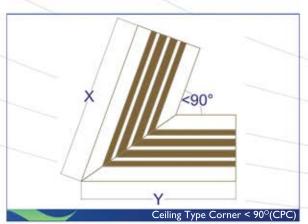
30mm x 60mm "L" shaped removable End Caps are supplied free with each full length to suit any LSD size. The end cap allows the extending or the shortening of slot diffusers lines without replacing existing pieces. A mitred end cap is available upon request.



#### Corner Piece - Wall (CPW) / Ceiling (CPC)

300mm × 300mm up to 1200mm × 1200mm Corner Pieces are available at 45° to 135° angles for all standard slot sizes.

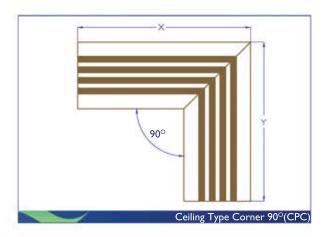


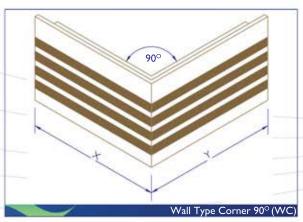


#### Curved Slot Diffusers (CSD)

Slot diffusers can be supplied as a ceiling type curve with a minimum radius of I meter. Our technician will assist in taking site measurements for special curvatures.







#### **ACCESSORIES**

#### Plenum Boxes:

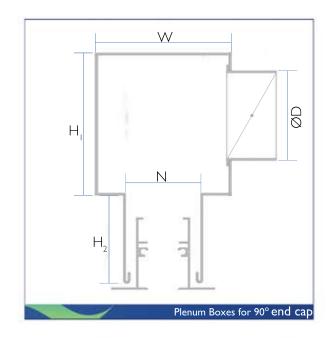
- Suitable for supply and exhaust linear slot diffuser.
- Galvanized steel construction.
- Supply as standard with one side inlet per metre length.
- Special constructions available on request.

#### **Options:**

Manual quadrant damper, code RVCD.

#### Sizes:

- Maximum length available 2000mm.
- Other Ø D available on request.



25mm Slots - 90° en	d cap							
No. of Slots		2	3	4	5	6	7	8
H	225	225	275	275	325	325	375	375
$H_2$	75	75	75	75	75	75	75	75
N	53	97	141	185	229	273	317	363
ØD	150	150	200	200	250	250	300	300
W	153	197	241	285	329	373	417	463

20mm Slots - 90° end	d сар		W	S	) a		0	9
No. of Slots	I	2	3	4	5	6	7	8
H <sub>1</sub>	225	225	275	275	325	325	375	375
H <sub>2</sub>	75	75	75	75	75	75	75	75
Ν	48	87	126	165	206	243	282	323
ØD	150	150	200	200	250	250	300	300
W	148	187	226	265	306	343	382	423

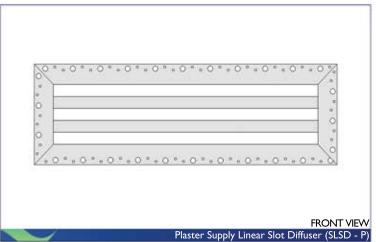
16mm Slots - 90° en	d сар							
No. of Slots		2	3	4	5	6	7	8
H	175	225	225	275	275	325	325	375
H <sub>2</sub>	75	75	75	75	75	75	75	75
N	44	78	112	146	180	214	248	282
ØD	100	150	150	200	200	250	250	300
W	144	178	212	246	280	314	348	382

- \* The above parameters for I m length.

  \* Maximum length as a single piece is 4m.

#### PLASTER LINEAR SLOT DIFFUSER (SLSD-P & RLSD-P)





#### **Products Features:**

- Suitable for installation within ceilings. Can directly install it in a cut out in the plaster board ceiling where the outer boarder sets in suitable for a plaster skim.
- Frame and curved deflection blades are made of extruded aluminium alloy 6063 to T6 Heat Treatment.
- Available in Hit and Miss Damper of GI sheet to control air flow rate without affecting the air flow patterns.
- 180° fully adjustable air flow patterns by means of two air deflector blades per slot.

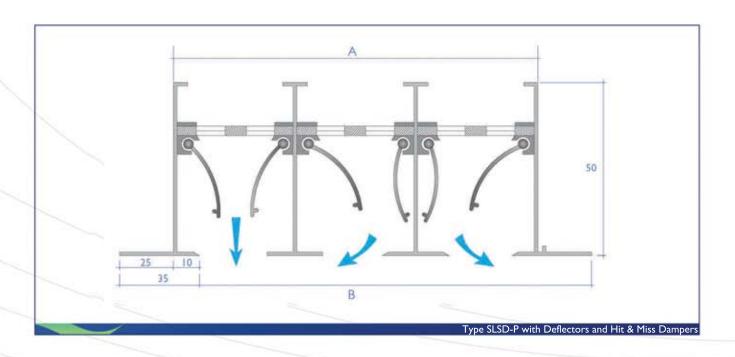
- Both Deflector Blades and Hit & Miss Damper are powder coated with black color.
- Available in 1 to 8 slots.
- Standard slot width is 1/2"(16mm), 3/4"(20mm) and 1" (25mm).
- Maximum of one piece length is 3000mm. Larger pieces are jointed using hairline butt joints held by special alignment strips to ensure continuous unbroken runs.
- Plaster-in design.

# DIMENSIONS

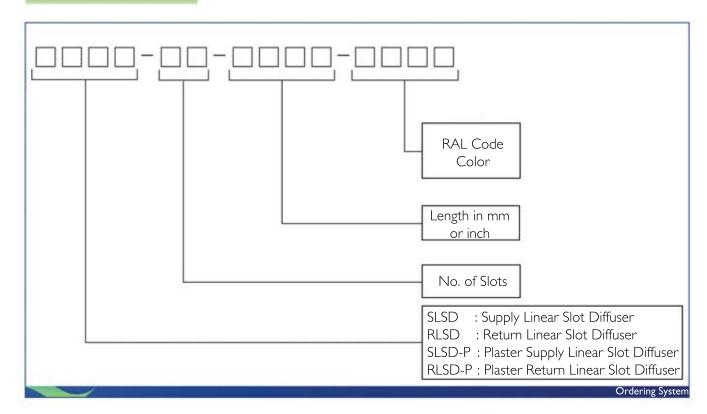
andard Slot Size 2	5mm							
No. of Slots	1 Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	45	90	134	179	223	268	311	355
Flange Size B (mm)	95	138	183	229	273	318	362	405

No. of Slots	1 Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	40	80	119	158	197	236	275	310
Flange Size B (mm)	90	130	170	206	245	287	325	362

No. of Slots	1 Slot	2 Slot	3 Slot	4 Slot	5 Slot	6 Slot	7 Slot	8 Slot
Neck Size A (mm)	35	70	105	140	175	207	242	275
Flange Size B (mm)	85	120	157	187	225	257	294	327



#### **ORDERING SYSTEM**



#### ORDERING EXAMPLE

#### SLSD-3S-1200-9016

Stands for SLSD model, 3-Slots, 1200mm length and powder coated to RAL-9016 color code.

Aligning strips are provided with each length of 3m.

For Curved Segments, remark of curvature and plan of curvature shall be included in the order. Our technicians are available, at your request, to take actual measurements on site without any extra charges.

#### **GENERAL NOTES**

Pages onwards give performance data for all models and variants, and unless otherwise stated the following general notes apply:

- 1. Throws shown are to three terminal velocity of 0.25m/s, 0.50m/s, 0.75m/s, (50fpm, 100fpm, 150fpm) with coanda effect across a flat ceiling and with supply air at conditions with max  $\Delta T = 10k$  cooling.
- 2. For standard room height of 2.75 metres, throws should be taken as the distance to the nearest wall (minimum plan dimension, MPD), or to half the distance between linear slot diffuser centres.
- 3. Care should be taken to avoid 'dumping' on cooling cycles if low jet velocities at the diffuser core. In order to avoid this, it is advisable to ensure that neck velocities do not drop below 0.75m/s.
- 4. The acoustic data were tested in accordance to ASHRAE 70-1991 standard. The octave band sound power levels obtained were plotted to determine the point of tangency with the highest rank Noise Criteria curve (NC) to establish the NC.

Noise Criteria ratings were determined by subtracting room absorption of IOdB from the sound power level data.

- 5. NC and Pressure values shown, are based on a slot diffuser where the pattern control vanes were set for maximum horizontal throw for one of the test and positioned fully open for the vertical throw test. The hit and miss damper is aligned at a fully open position. The damper should only be used for fine balancing, as for every doubling of pressure there is a resulting increase in the noise level of +9dB for supply, or +5dB for exhaust.
- 6. The following tables include the results of tests conducted on samples of air terminals. The test results include Noise Criteria (NC), static pressure versus air flow, throw and effective area. Extrapolation was used to obtain the performance for other sizes and other parameters within the range of products mentioned above.

Test method included in Report.

#### **PERFORMANCE DATA - SI UNITS**

#### **SYMBOLS**

L/Sec : Air Volume in Litres per second.

Af : Effective free area in square meters per Lm.

Vf : Face Velocity in meters per second.
Ak : Neck Area in square meters per Lm.
Vk : Neck Velocity in meters per second.

Pt : Total pressure in Pascal.
Th : Throw in meters.
NC : Noise Criteria.

#### **NOTES**

- The large throw values are based on the minimum terminal velocity of 0.25 m/sec.
- The middle throw values are based on the medium terminal velocity of 0.50 m/sec.
- The small throw values are based on the maximum terminal velocity of 0.75 m/sec.

#### **CONDITIONS**

- Supply or Return as indicated.
- Noise Criteria values are based on (10dB) room attenuation.
- Damper is fully open.
- Maximum room height = 4.0m
- Maximum Cooling @ ΔT = 10K

Notes:	



#### **SUPPLY AIR SLOT DIFFUSER - SLSD**

HORIZONTAL

#### **SI-UNITS**

NO. OF	AIR FLOW		16mm S	SLOTW	/IDTH				20mm S	SLOTW	IDTH				25mm S	SLOTWI	DTH		
SLOTS	(L/s) / LM	EFFECTIVE AREA (m2/LM)	Pt (Pa)		HROW (		NC	EFFECTIVE AREA (m2/LM)	Pt (Pa)		HROW @ 0.50/0.75		NC	EFFECTIVE AREA (m2/LM)	Pt (Pa)		HROW ( 0.50/0.75		NC
	25		14:	2.8	1,6	0.7	24		9	2.5	1,3	0.4	19		6	2.2	2.0	1,2	<15
	40	0.004	38	3.8	2.5	1.5	35	0.005	24	3.5	2.2	1.2	28	0.006	16	3.2	1.9	1.0	23
	55		70	6.2	3.9	2.4	46	0.003	45	5.7	3.6	2.1	36	0.006	29	5.2	3.3	1.8	29
	70		112	8.4	5.7	3.9	54		72	7.8	5.1	3.6	43		46	7.2	4.5	3.3	34
	25		5	2.8	1.9	1,2	16		3	2.5	1.6	0.9	<15		2	2.2	1.3	0.9	<15
2	50	0.011	19	5.7	3.4	1.5	27	0.013	12	5.4	3.1	1.2	22	0.018	8	4.8	2.8	0.9	17
2	75	0.011	42	7.7	4,4	2.0	41	0.013	27	7.0	4.0	1.7	33	0.016	17	6.4	3.7	1.4	26
	100		74	9.8	6.5	3.0	52		47	8.9	5.9	2.7	42		30	8.2	5.3	2.4	33
	50		9	4.0	2.0	1.3	22		6	3.7	1,7	1.0	18		4	3.4	1.4	0.9	<15
3	75	0.018	20	6.4	3.2	1.9	31	0.025	10	4.2	1.9	1.6	24	0.028	8	5.4	2.6	1.3	19
	100		36	8.1	4.8	2.3	41	0.025	18	7.5	4.4	2.0	33	0.020	15	6.9	4.0	1.7	26
	125		58	10.2	6.5	3.4	49		27	8.6	5.9	3.1	39		24	8.6	5.3	2.8	31
	75		12	5.1	2.3	1.6	25		7	4.8	1.8	1.3	20		5	4.5	1.7	1.0	16
4	100	0.024	21	6.4	3.6	1.9	33	0.03	13	5.8	3.3	1.6	26	0.038	8	5.4	3.0	1.3	21
-1	125		32	7.9	4.8	2.4	40		20	6.4	4.4	2.1	31		13	6.6	4.1	1.8	25
	150		46	9.8	6.6	3.3	46		29	7.4	6.0	3.0	37		19	8.5	5.4	2.7	29
	100		16	5.8	2.7	2.0	28		10	5.2	2.4	1.7	22		6	4.8	2.1	1.4	18
5	125	0.03	24	7.0	4.0	2.6	34	0.038	15	6.9	4.1	2.5	27	0.048	10	5.8	3.4	2.0	22
2	150	0.03	35	8.3	5.2	3.2	40	0.038	22	9.3	6.2	3.6	31	0.048	14	6.9	4.4	2.5	25
	175		47	10.2	6.9	4.0	46		30	7.9	5.1	3.0	36		19	8.4	5.7	3.2	29
	125		18	5.9	3.0	2.0	30		12	6.1	3.4	2.1	24		8	4.7	2.2	1.4	19
1	150	0.027	26	7.1	4.1	2.6	36	0.046	17	6.5	3.8	2.3	29	0.000	11	5.9	3.4	2.0	23
6	175	0.037	36	8.8	5.5	3.1	41	0.046	23	8.1	5.1	2.8	33	0.058	15	7.3	4.5	2.5	26
	200		47	10.6	7.0	3.6	46		30	9.7	6.4	3.3	36		19	8.8	5.8	3.0	29

#### **SUPPLY AIR SLOT DIFFUSER - SLSD**



SI-UNITS

VERTICAL

NO OF	AIR FLOW		I6m	ım			20r	nm			25	mm	
NO. OF SLOTS	(L/s) / LM	EFFECTIVE AREA (m2/LM)	Pt (Pa)	THROW (m)	NC	EFFECTIVE AREA (m2/LM)	Pt (Pa)	THROW (m)	NC	EFFECTIVE AREA (m2/LM)	Pt (Pa)	THROW (m)	NC
	25		10	2.5	15		7	2.2	<15		4	1.9	<15
	40		28	3.5	23		18	3.1	18		12	2.7	<15
7	55	0.006	38	5.5	32	0.008	33	4.9	25	0010	21	4.3	21
1	60	0.006	42	6.2	35	0.008	39	5.6	28	0.010	25	5.0	22
	75		96		42		62		34		39		26
	90		141		49		90	it:	39		58	(*)	30
	25		4	2.5	16		2	2.2	<15		2	1.9	<15
	50		14	5.4	21		9	4.8	17		6	4.2	<15
2	75	0.017	31	6.7	30	0010	20	6.1	24	0.007	13	5.5	19
2	100	0.017	56	8.7	42	0.019	36	8.0	32	0.026	23	7.3	27
	125		87	-	48		55		36		35		31
	150		125		56		80		41		51		35
	50		7	3.3	17		4	2.9	<15		3	2.6	<15
	75		14	5.5	21		9	4.9	17		6	4.3	<15
2	100		26	7.2	30	0.000	11	6.6	24	0.000	11	6.0	19
3	125	0.024	40	9.0	38	0.029	16	8.3	30	0.038	16	7.7	24
	150		57		45		29		35		23		28
	175		78	- 3	50		37	4	40		32	4	32
	75		9	4.5	17		6	4.2	<15		4	3.9	<15
	100		15	5.5	22		10	5.1	18		6	4.8	<15
2.00	125		24	6.9	29		15	6.3	23		10	5.7	19
4	150	0.030	35	8.9	35	0.037	22	8.2	28	0.046	14	7.5	22
	175		47		40		30		32		19	-	25
	200		62	19	43		40	1941	35		25	848	28
	100		10	4.8	16		7	4.5	<15		4	4.2	<15
	125		16	5.9	21		10	5.6	16		6	5.2	<15
120	150		23	7.5	27		14	6.9	22		9	6.3	17
5	175	0.037	31	9.1	33	0.046	20	8.4	26	0.058	13	7.7	21
	200		40		37		26		29		16		23
	225		51	-	42		33		33		21	+	27
	125		Ti	5.0	16		7	4.6	<15		5	4.2	<15
	150		16	6.2	20	1	10	5.6	16		7	5.0	<15
- 26	175	255555	22	7.8	25	100000	14	7.2	20	70/202	9	6.6	<15
6	200	0.043	29	9.7	29	0.056	18	9.0	23	0.068	12	8.2	19
	225		37		33		23	×.w	26		15		21
	250		45		37		29	-	29		19	-	24

# PLASTER SUPPLY AIR SLOT DIFFUSER SLSD - P



#### SI-UNITS

NO OF	AIR FLOW		I6m	ım			20r	nm			25	mm	
NO. OF SLOTS	(L/s) / LM	EFFECTIVE AREA (m2/LM)	Pt (Pa)	THROW (m)	NC	EFFECTIVE AREA (m2/LM)	Pt (Pa)	THROW (m)	NC	EFFECTIVE AREA (m2/LM)	Pt (Pa)	THROW (m)	NC
	25		10	2.5	15		7	2.2	<15		4	1.9	<15
	40		28	3.5	23		18	3.1	18		12	2.7	<15
1	55	0.006	38	5.5	32	0.008	33	4.9	25	0010	21	4.3	21
	60	0.006	42	6.2	35	0.008	39	5.6	28	0.010	25	5.0	22
	75		96		42		62		34		39		26
	90		141		49		90	it:	39		58	(*)	30
	25		4	2.5	16		2	2.2	<15		2	1.9	<15
	50		14	5.4	21		9	4.8	17		6	4.2	<15
2	75	0.017	31	6.7	30	0010	20	6.1	24	0.007	13	5.5	19
2	100	0.017	56	8.7	42	0.019	36	8.0	32	0.026	23	7.3	27
	125		87		48		55		36		35		31
	150		125		56		80		41		51		35
	50		7	3.3	17		4	2.9	<15		3	2.6	<15
	75		14	5.5	21		9	4.9	17		6	4.3	<15
3	100		26	7.2	30		11	6.6	24	0.000	11	6.0	19
3	125	0.024	40	9.0	38	0.029	16	8.3	30	0.038	16	7.7	24
	150		57		45		29		35		23		28
	175		78	- 3	50		37	4	40		32	4	32
	75		9	4.5	17		6	4.2	<15		4	3.9	<15
	100		15	5.5	22		10	5.1	18		6	4.8	<15
2.00	125		24	6.9	29		15	6.3	23		10	5.7	19
4	150	0.030	35	8.9	35	0.037	22	8.2	28	0.046	14	7.5	22
	175		47		40		30		32		19	-	25
	200		62	19	43		40	1941	35		25	848	28
	100		10	4.8	16		7	4.5	<15		4	4.2	<15
	125		16	5.9	21		10	5.6	16		6	5.2	<15
12	150		23	7.5	27		14	6.9	22		9	6.3	17
5	175	0.037	31	9.1	33	0.046	20	8.4	26	0.058	13	7.7	21
	200		40		37		26	-	29		16	-	23
	225		51		42		33		33		21	+	27
	125		11	5.0	16		7	4.6	<15		5	4.2	<15
	150		16	6.2	20		10	5.6	16		7	5.0	<15
- 2	175	256000	22	7.8	25	100000	14	7.2	20	757273	9	6.6	<15
6	200	0.043	29	9.7	29	0.056	18	9.0	23	0.068	12	8.2	19
	225		37		33		23	***	26		15		21
	250		45		37		29	-	29		19	-	24
	230	L.	13		3/	1/4	67		67		17		27

# RETURN AIR SLOT DIFFUSER- RLSD



#### SI-UNITS

NO. OF	AIR FLOW	16mm SLO	TWIDTH	20mm SLO	TWIDTH	25mm SLO	TWIDTH
SLOTS	(L/s) / LM	Pt (Pa)	NC	Pt (Pa)	NC	Pt (Pa)	NC
	40	46	27	29	22	19	17
	50	70	33	45	27	29	22
31	65	118	45	76	36	49	29
	80	180	54	115	43	74	34
	75	47	26	30	21	19	17
2	90	69	34	44	28	28	22
2	100	84	38	54	31	35	25
	125	129	47	83	38	53	30
	100	47	27	30	22	19	17
3	125	72	35	46	27	30	22
3	150	104	41	66	33	43	27
	200	187	52	120	41	77	33
	150	74	30	47	24	30	19
4	175	100	37	64	30	41	24
4	200	128	42	82	33	53	27
	250	198	50	127	40	81	31
	150	52	28	33	22	21	18
5	200	92	37	59	29	38	23
2).	250	144	44	92	35	59	28
	300	206	51	132	40	84	32
	200	72	31	46	24	30	19
6	250	113	38	72	31	46	24
0	300	162	46	104	36	66	29
	350	220	52	141	41	90	33

# PLASTER RETURN AIR SLOT DIFFUSER RLSD - P



#### SI-UNITS

NO. OF	AIR FLOW	16mm SLO	TWIDTH	20mm SLO	TWIDTH	25mm SLO	TWIDTH
SLOTS	(L/s) / LM	Pt (Pa)	NC	Pt (Pa)	NC	Pt (Pa)	NC
	40	46	27	29	22	19	17
112	50	70	33	45	27	29	22
-1	65	118	45	76	36	49	29
	80	180	54	115	43	74	34
	75	47	26	30	21	19	17
	90	69	34	44	28	28	22
2	100	84	38	54	31	35	25
	125	129	47	83	38	53	30
	100	47	27	30	22	19	17
-	125	72	35	46	27	30	22
3	150	104	41	66	33	43	27
	200	187	52	120	41	77	33
	150	74	30	47	24	30	19
225	175	100	37	64	30	41	24
4	200	128	42	82	33	53	27
	250	198	50	127	40	81	31
	150	52	28	33	22	21	18
900	200	92	37	59	29	38	23
5	250	144	44	92	35	59	28
	300	206	51	132	40	84	32
	200	72	31	46	24	30	19
s i	250	113	38	72	31	46	24
6	300	162	46	104	36	66	29
	350	220	52	141	41	90	33

#### **PERFORMANCE DATA - IP UNITS**

#### **SYMBOLS**

CFM : Air Volume in cubic feet per minute.Af : Effective free area in square feet per L.Ft.

Vf : Face Velocity in feet per minute.
Ak : Neck Area in square feet per L.Ft.
Vk : Neck Velocity in feet per minute.
Pt : Total pressure in inches water gauge.

Th : Throw in feet. NC : Noise Criteria.

#### **NOTES**

- The large throw values are based on the minimum terminal velocity of 50 fpm.
- The middle throw values are based on the medium terminal velocity of 100 fpm.
- The small throw values are based on the maximum terminal velocity of 150 fpm.

#### **CONDITIONS**

- Supply or Return as indicated.
- Noise Criteria values are based on (10dB) room attenuation.
- Damper is fully open.
- Maximum room height = 4.0m
- Maximum Cooling @ ΔT = 10K

Notes:			
4			
<u> </u>			
<del></del>			
_			
			7
=			

#### **SUPPLY AIR SLOT DIFFUSER - SLSD**

HORIZONTAL

#### **IP-UNITS**

NO. OF	AIR FLOW		1/2" SI	_OTWII	OTH				3/4" SL	OTWII	ОТН				I" SLC	OTWIDT	н		
SLOTS	(CFM / LFT)	EFFECTIVE AREA (Sq.Ft./LFT)	Pt (In-Wg)	(50/	HROW 100/150) ninal Vel	fpm	NC	EFFECTIVE AREA (Sq.Ft./LFT)	Pt (In-Wg)	(50/1	-IROW ( 100/150) ninal Velo	fpm	NC	EFFECTIVE AREA (Sq.Ft./LFT)	Pt (In-Wg)	(50/	HROW ( 00/150) ninal Velo	fpm	NC
	16		0.057	9	5	2	24		0.037	8	4	- 1	19		0.024	7	7	- 4	<15
- 1	26	0.013	0.153	13	8	5	35	0.016	0.098	12	7	4	28	0.020	0.063	1.1	6	3	23
	36	0.013	0.283	20	13	8	46	0.016	0.181	19	12	7	36	0.020	0.116	17	H	6	29
	45		0.449	27	19	13	54		0.287	26	17	12	43		0.184	24	15	11	34
	16		0.018	9	6	4	16		0.012	8	5	3	<15	la control of the con	0.008	7	4	3	<15
2	32	0.036	0.076	19	1.1	5	27	0.043	0.049	18	10	4	22	0.059	0.031	16	9	3	17
2	48	0.036	0.168	25	14	6	41	0.043	0.107	23	13	5	33	0.059	0.069	21	12	- 4	26
	65		0.298	32	21	10	52		0.191	29	19	9	42		0.122	27	17	8	33
	32		0.038	13	6	4	22		0.024	12	5	3	18		0.016	11	4	3	<15
3	48	0.050	0.082	21	- 11	6	31	0.082	0.040	19	10	5	24	0.003	0.034	18	9	4	19
3	65	0.059	0.146	27	16	8	41	0.082	0.072	24	14	7	33	0.092	0.060	22	13	6	26
	81		0.232	33	21	11	49		0.108	32	19	10	39		0.095	28	17	9	31
	48		0.047	17	8	5	25		0.030	16	6	4	20		0.019	15	6	3	16
4	65	0.070	0.083	21	12	6	33	0.000	0.053	19		5	26	0.105	0.034	18	10	4	21
4	81	0.079	0.128	26	16	8	40	0.098	0.082	21	15	7	31	0.125	0.053	22	13	6	25
	97		0.185	32	22	11	46		0.118	24	20	10	37		0.076	28	18	9	29
	65		0.063	19	9	6	28		0.040	17	8	5	22		0.026	16	7	4	18
г	81	0.098	0.097	23	13	8	34	0.125	0.062	23	13	8	27	0.157	0.039	19	-13	6	22
5	97	0.078	0.139	27	17	П	40	0.125	0.089	30	20	12	31	0.157	0.057	23	14	8	25
	113		0.190	34	23	13	46		0.121	26	17	10	36		0.078	28	19	10	29
	81		0.074	19	10	6	30		0.048	20	11	7	24	No.	0.030	15	7	5	19
1	97	0.121	0.106	23	14	9	36	0.151	0.068	21	13	8	29	0.190	0.043	19	11	7	23
6	113	0.121	0.145	29	18	10	41	0.151	0.093	26	17	9	33	0.190	0.059	24	15	8	26
	129		0.190	35	23	12	46		0.122	32	21	11	36		0.078	29	19	10	29

# LINEAR SLOT DIFFUSERS

# SUPPLY AIR SLOT DIFFUSER - SLSD



IP-UNITS

ON P	AIR FLOW		1/2"								<u></u>		
SLOTS	(CFM / LFT)	) EFFECTIVE AREA (Sq.Ft./LFT)	Pt (In-Wg)	THROW (ft)	UZ	EFFECTIVE AREA (Sq.Ft./LFT)	Pt (In-Wg)	THROW (ft)	NC	EFFECTIVE AREA (Sq.Ft./LFT)	Pt (In-Wg)	THROW (ft)	UN
	91		0.042	Φ	15		0.027	7	<15		0.017	9	<15
	26		0.113	12	23		0.072	0	80		0.046	6	<15
ā	36	0000	0,153	8	32	2000	0.134	91	25	5000	0.085	14	21
7	39	0700	0.170	20	35	0.026	0.158	8	28	0,033	0.101	9	22
	48		0.387	4	42		0,248		34		0.158		26
	58		0.566	k :	46		0.362		39		0.232		90
	91		0.014	∞	91		60000	7	<15		9000	9	<15
	32		0.057	<u>&amp;</u>	21		0.036	91	17		0.023	4	×   5
C	48	2000	0.126	22	30	6700	0.080	20	24	0.000	0.051	8	61
7	65	9000	0.225	28	42	7900	0.144	756	32	0,083	0.092	24	27
	18		0.348	×	48		0.223		36		0.142		3
	76		0.502		56		0.321		4		0.206		35
	32		0.027		17		0,017	01	>		0.011	6	<15
	48		0.058	- 81	21	. 73	0.037	91	17		0.024	14	<15
C	65	0200	0.104	23	30	0000	0.044	21	24	3010	0.043	20	61
2	18	67000	0.160	30	38	0,075	0.064	27	30	07.70	990:0	25	24
	76		0.229	10	45	an 13	0.116		35	Section 1	0.094	*	28
	-13		0.312	2.00	20		0.149	ě.	40		0.128	*	32
	48		0.035	15	17		0.023	4	<15		0.015	m	<15
	65		0.062	- 18	22		0.040	17	8		0.026	91	<   >
7	18	0000	0.097	23	29	1010	0.062	21	23	1310	0.039	6	61
1	76	0,078	0.139	29	35	0.121	0.089	27	28	0.10	0.057	25	22
	=3		0.189	3.7	40		0.121	-	32		0.078	£.	25
	129		0.248		43		0.159	34	35		0.102		28
	65		0.041	91	91		0.026	15	<15		0.017	14	<15
	18		0.063	61	21		0.040	18	91		0.026	17	<15
U	44	1010	160.0	25	27	0.101	0.058	23	22	olo	0.037	21	17
n	 	17170	0.124	200	33	TO CO	6/000	28	56	06150	0.051	25	21
	129		0.161	4	37		0.103	24	29		990'0	050	23
	145		0.204	A S	42		0.131	*	33		0.084		27
	18		0.045	91	9		0.029	15	<15		0.018	4	<   5
	97		0.065	70	20		0.042	18	91		0.027	91	< S
7	= 13	1710	0.089	25	25	7107	0.057	23	50	5000	0.036	21	<15
0	129	5	0.115	32	29	00	0.074	29	23	0.44.3	0.047	27	61
	145		0.147		33		0.094	4	26		0900	*	21
	162		0.182		37		0.117	Ŧ	56		0.074	*	24
See notes	See notes on page D-18												



# **RETURN AIR SLOT DIFFUSER - RLSD**

#### **IP-UNITS**

NO. OF SLOTS	AIR FLOW (CFM / LFT)	I/2" SLOT	WIDTH	3/4" SLOT	WIDTH	I" SLOTW	IDTH
		Pt (In-Wg)	NC	Pt (In-Wg)	NC	Pt (In-Wg)	NC
	26	0.185	27	0.118	22	0.076	17
	32	0.280	33	0.179	27	0.115	22
- 1	42	0.476	45	0.305	36	0.195	29
	52	0.724	54	0.463	43	0.296	34
	48	0.190	26	0.122	21	0.078	17
4	58	0.277	34	0.177	28	0.113	22
2	65	0.339	38	0.217	31	0.139	25
	81	0.518	47	0.332	38	0.212	30
	65	0.188	27	0.120	22	0.077	17
3	81	0.290	35	0.186	27	0.119	22
3	97	0.417	41	0.267	33	0.171	27
	129	0.751	52	0.481	41	0.308	33
	97	0.296	30	0.189	24	0.121	19
::ale	113	0.400	37	0.256	30	0.164	24
4	129	0.516	42	0.330	33	0.211	27
	162	0.797	50	0.510	40	0.326	31
	97	0.208	28	0.133	22	0.085	18
Ter i	129	0.369	37	0.236	29	0.151	23
5	162	0.577	44	0.369	35	0.236	28
	194	0.828	51	0.530	40	0.339	32
	129	0.290	31	0.186	24	0.119	19
2	162	0.452	38	0.290	31	0.185	24
6	194	0.651	46	0.417	36	0.267	29
	226	0.883	52	0.565	41	0.362	33