

SIRI _d

Installation – Commissioning – Maintenance

20150318

Installation

The SIRI damper should be installed at a suitable distance from obstruction sources. The SIRI damper must not be strained by the weight from connecting ducts. This is especially the case if it is connected to a vertical run of ducts. In undisturbed measurement an accuracy of $\pm 5\%$ is achieved. With installation options according to figure 2, an accuracy of $\pm 10\%$ is achieved. Casing leakage is according to ductwork leakage class C (EN 1751).

Commissioning

Maximum measurement deviation is $\pm 10\%$, even when the damper is positioned near a T-piece, transition piece or duct bend. See figure 2, regarding straight duct length demands. The pressure differential can be read and the airflow can be determined from K-factors (COP) or commissioning diagrams by using the fixed measuring points.

A label containing k-factor table and commissioning diagrams is attached to one of the measuring points at delivery. When commissioning, set desired throttling using a screwdriver or ring spanner. See table "Ring spanner sizes".

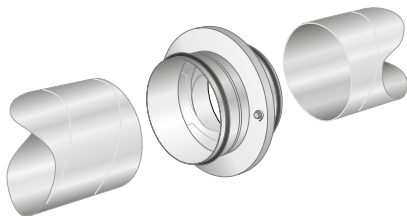


Figure 1. Installation.

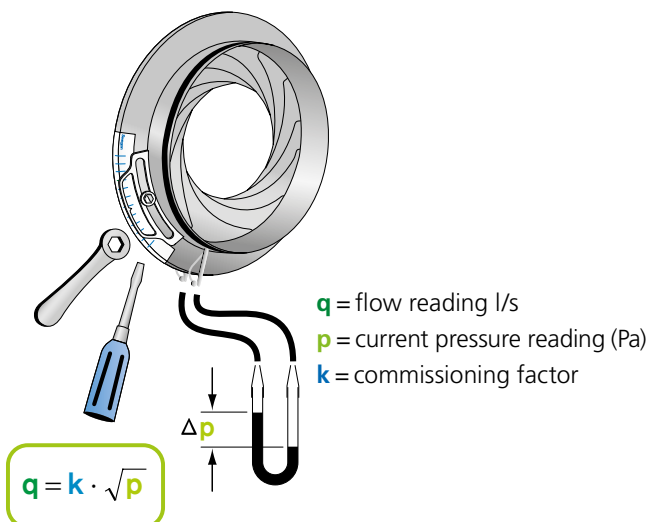


Figure 2. Commissioning air flow.

Maintenance

The damper is maintenance-free. Whenever needed, clean the damper by vacuum-cleaning with a brush nozzle.

When cleaning a duct, first note what position the damper is set to before opening fully. Restore the setting of the damper after cleaning.

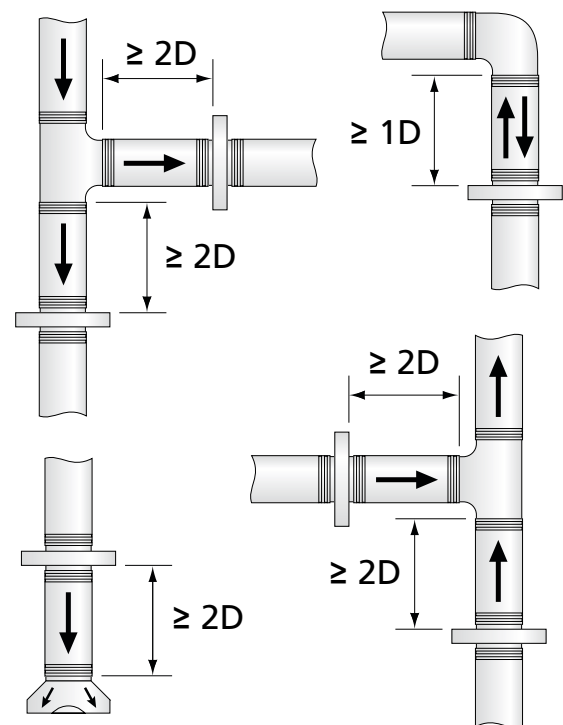


Figure 3. Installation alternatives and straight duct length demands.

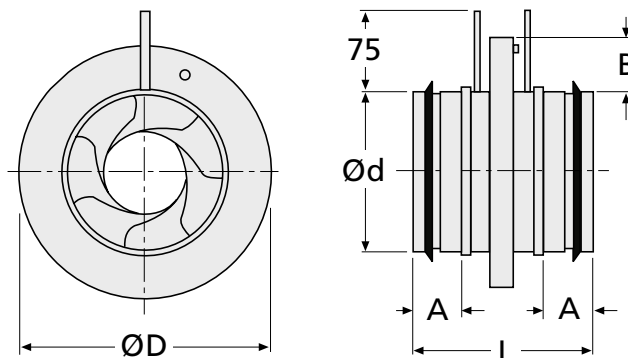
Ring spanner sizes

SIRI – Size	Ring spanner size
80-160	8 mm
250-315	10 mm
400-630	15 mm
800	22 mm

Dimensions and weight

SIRI

Size	Dimensions (mm)					Weight (Kg)
	Ød	ØD	L	A	B	
80	78	145	115	30	35	0,5
100	98	165	120	30	35	0,6
125	123	188	130	40	35	0,8
160	158	230	140	40	35	1,1
200	198	285	140	40	45	1,5
250	248	285	180	55	45	2,2
315	313	410	180	55	50	3,0
400	398	525	220	60	65	5,0
500	498	655	220	60	80	8,5
630	628	815	220	65	95	12,1
800	798	1020	280	85	107	24,5



Figur 3. SIRI – dimensions.

K-factors (COP)

Possible damper positions	K-factors for current sizes dependent of damper position										
	80	100	125	160	200	250	315	400	500	630	800
1	3,9	6	10,2	21,3	35,4	53,3	85,3	119	218	325	540
2	2,1	3,8	6,7	15	24,7	39,3	65,3	95,3	176	272	446
3	1,2	2,6	4,7	11,1	18,3	30,4	52,1	78,5	148	233	379
4	0,7	1,8	3,3	8,5	14	24,2	42,9	65,7	124	202	325
5	0,3	1,2	2,3	6,6	10,8	19,4	35,6	55,6	107	177	282
6		0,7	1,5	5,1	8,4	15,7	29,8	47,2	93,1	156	247
7				3,9	6,4	12,6	24,9	40,1	81,2	139	216
8					4,9	10,1	20,7	34	71	123	190
9						7,8	17	28,7	62	109	167
10							13,9	23,8	54	96,7	147
11							11,1	19,5	46,7	85,8	129
12								15,6	40,4	75,6	112
13								12,3	34,4	66,8	98,7
14									29,4	58,9	85,6