

SI-BACK C



Centrifugalni ventilator sa lopaticama unazad, malim protokom i visokim pritiskom

Centrifugal backward curved blade fan low capacities and high pressures

APLIKACIJE

Ventilatori serije SI-BACK C su namenjeni za instalacije koje zahtevaju skromne brzine protoka vazduha sa visokim pritiscima, u kanalnim instalacijama. Na primer: usisavanje i filtracija velikih industrijskih postrojenja, pneumatski transport, transport materijala pomešanih sa vazduhom, strugotinama i piljevinom, sa neukrštenim ventilatorom.

DOMET

Asortiman se sastoji od 7 veličina sa prečnikom radnog kola od 350 do 710mm.

KARAKTERISTIKE

Asortiman SI-BACK C ventilatora odlikuje se izuzetnom robusnošću zbog konstrukcije od obojenog čelika i debljine korišćenih materijala.

Još jedna karakteristika je raznolikost modela i verzija koje čine asortiman.

KONSTRUKCIJA

- Vijak za obojeni čelični lim. Standardna prirubnica
- UNI EN ISO 13351 / Tab.1.
- Visokoeffikasno radno kolo sa zakrivljenim sečivom. Balansiranje prema UNI ISO 21940-11 standardima.
- Trofazni ili monofazni asinhroni elektromotor, stepen zaštite IP 55, klasa izolacije F, servis S1, oblik B3 ili B5, konstrukcija u skladu sa IEC/EEC (UNEL MEC).
- Izvedbe 4 i 5 (propeler direktno povezan sa vratilom motora).

TEHNIČKE SPECIFIKACIJE

SI-BACK C standard

- Preneti vazduh: čak i prašnjav, transport materijala.
- Temperatura transportovanog vazduha: $-20^{\circ}\text{C} / +60^{\circ}\text{C}$.
- Napon napajanja:
Trofazni (T) 400V - 50Hz.
Jednofazni (M) 230V - 50Hz

ARANŽMANI

- SI-BACK C izvedba 4: radno kolo direktno spojeno na osovinu motor, motor postavljen na oslonac (stolica)
- SI-BACK C izvedba 5: radno kolo direktno spojeno na osovinu motora, motor je prirubnički pričvršćen na spiralu ventilatora.

PRIBOR

- Zaštitna mreža na usisnoj strani (IPG-SBC)
- (Neophodno za upotrebu sa slobodnim ustima)
- Zaštitna mreža na strani napajanja (OPG-SBC) (neophodna za upotrebu sa slobodnim ustima)
- Antivibracioni usisni spoj (IFC-SBC)
- Antivibracioni spoj za pritiskanje (OFC-SBC)
- Usisna kontraprirubnica (ICF-SBC). Dostavna kontraflanca (OCF-SBC).
- Inspekcijski otvor (ID-SBC).
- Antivibracioni nosači (AM).
- Otvor za odvod kondenzata (CD)

NA ZAHTEV

- Atex verzija (SI-BACK C AteX).
- Verzije od nerđajućeg čelika.
- Verzije sa toplim gasom (150°C za direktno spajanje).

APPLICATIONS

SI-BACK C fans are designed for installations requiring modest air deliveries with relatively high pressures, in duct mounted applications. For instance: exhausting and filtering of industrial plants, pneumatic conveyance, transport of solid material mixed with air, sawdust and woodchips).

RANGE

This line consists of 12 sizes with impeller diameter from 350 up to 710 mm.

ADVANTAGES

SI-BACK C line is characterized by the extreme sturdiness due to the rigid construction in enamelled sheet metal and the thickness of the materials. Another feature is the variety of models and versions composing the series.

CONSTRUCTION

- Volute in epoxy painted enamelled steel sheet. Fixing flanges according to UNI EN ISO 13351/Tab.1. standards.
- High efficiency backward curved blade impeller. Balancing according to UNI ISO 21940-11.
- Asynchronous three or single phase, electric motor, protection IP 55, insulation class F, service S1, mounting type B3 or B5, construction according to IEC/EEC (UNEL MEC).
- Arrangement 4 or 5 (impeller directly coupled to motor shaft); arrangement 1, 9, 12 (belt driven, with impeller coupled to the motor by mean of transmission).

TECHNICAL SPECIFICATIONS

SI-BACK C standard

- Conveyed air: very dusty, conveyence solid materials.
- Temperature of conveyed air: $-20^{\circ}\text{C} / +60^{\circ}\text{C}$.
- Voltage:
three phase version (T) 400V – 50Hz.
single phase version (M) 230V – 50Hz

ARRANGEMENTS

- SI-BACK C arrangement 4: impeller directly coupled to motor shaft, motor placed on the motor support.
- SI-BACK C arrangement 5: impeller directly coupled to motor shaft, motor flanged on the fan volute.

ACCESSORIES

- Inlet protection grid (IPG-SBC) (Necessary for use in free air)
- Outlet protection grid (OPG-SBC) (Necessary for use in free air)
- Inlet flexible joint (IFC-SBC)
- Outlet flexible joint (OFC-SBC)
- Inlet counter flange (ICF-SBC).
- Outlet counter flange (OCF-SBC).
- Inspection door (ID-SBC).
- AV mounts (AM).
- Condensation drain hole (CD)

ON REQUEST

- Explosion proof versions (SI-BACK C AteX).
- Stainless steel version.
- High temperature version (150°C for direct coupling and 300°C for belt coupling version).

SI-BACK C | Uglovi pražnjenja

Discharge angles

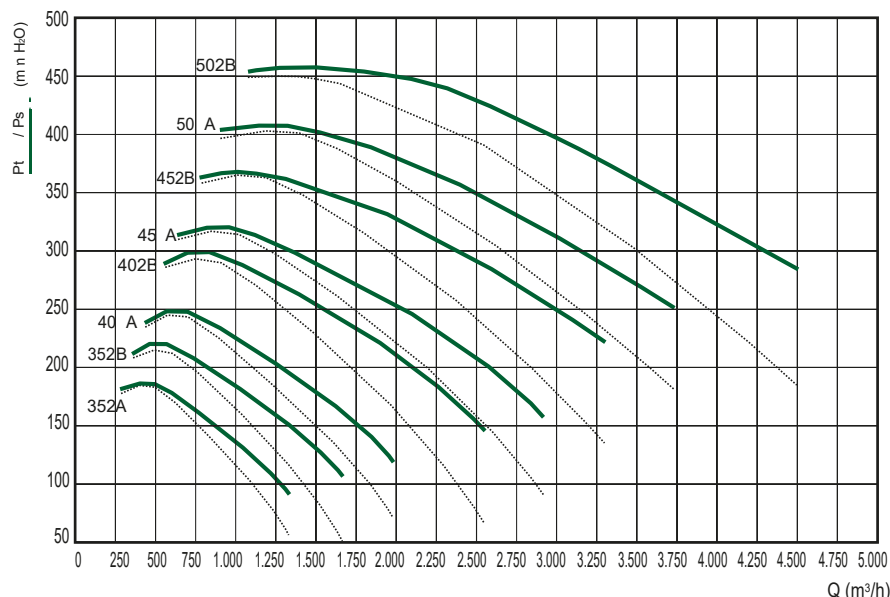
RD	RD 0	RD 45	RD 90	RD 135	RD 180	RD 225	RD 270	RD 315
LG	LG 0	LG 45	LG 90	LG 135	LG 180	LG 225	LG 270	LG 315

Orijentacija 180° - 225° : zahteva posebnu konstrukciju | Discharge angles 180° - 225° : request special construction

Performanse prikazane na dijagramima odnose se na vazduh na temperaturi od 15°C i nadmorskoj visini od 0 metara, a dobijene su u instalacijama tipa "D" u odsustvu mreže i pribora..
 Performances shown in the selection diagrams refer to air at 15°C temperature and 0 mt a.s.l. altitude, and they were obtained in installation type "D" with no grid nor accessories.

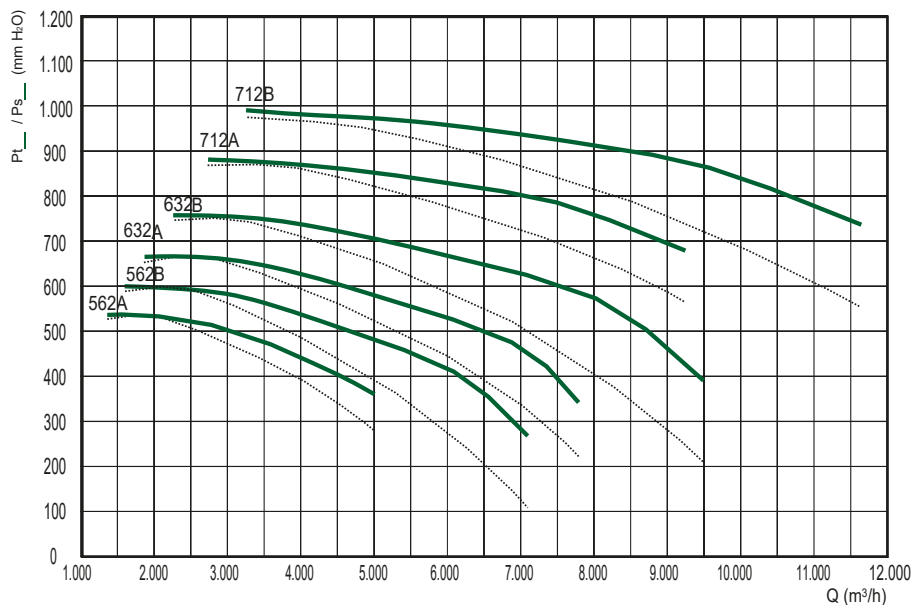
2 POLA/POLES (3000 rpm) - T: trofazno/three-phase (3Ph-400V-50 Hz)

Model	Pm (kW)	In max (A)	Mot (H)	Lp dB(A)
352/A T	0,75	1,9	80	60
352/B T	1,1	2,5	80	61
402/A T	1,5	3,2	90	63
402/B T	2,2	4,7	90	67
452/A T	3	6,1	100	67
452/B T	4	7,5	112	70
502/A T	4	7,5	112	70
502/B T	5,5	10,4	132	70



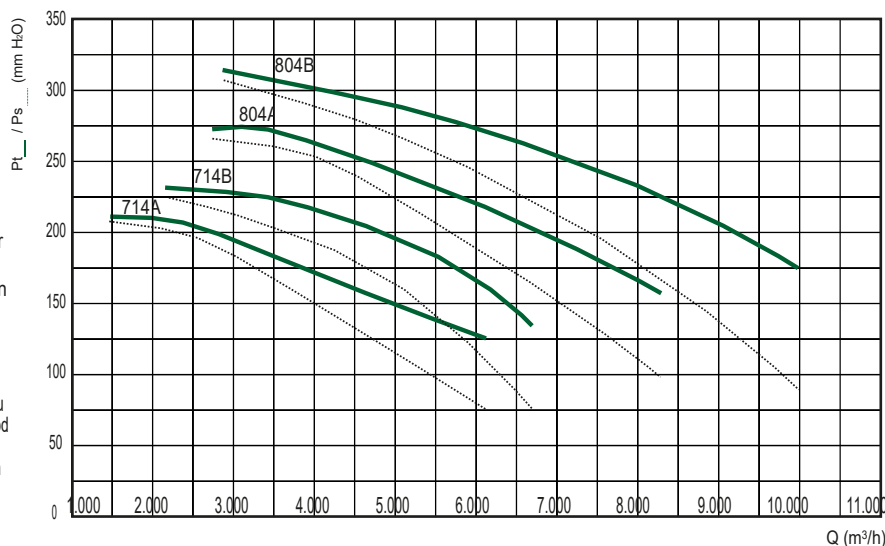
2 POLA/POLES (3000 rpm) - T: trofazno/three-phase (3Ph-400V-50 Hz)

Model	Pm (kW)	In max (A)	Mot (H)	Lp dB(A)
562/A T	7,5	13,9	132	74
562/B T	11	19,9	160	75
632/A T	15	26,2	160	76
632/B T	18,5	32,1	160	76
712/A T	22	40,4	180	77
712/B T	30	53,2	200	78



4 POLA/POLES (1500 rpm) - T: trofazno/three-phase (3Ph-400V-50 Hz)

Model	Pm (kW)	In max (A)	Mot (H)	Lp dB(A)
714/A T	4	8,3	112	64
714/B T	5,5	11	132	65
804/A T	7,5	14,6	132	67
804/B T	11	18	132	68



Tolerancije: aerodinamičke performanse i buka su unutar tolerancija navedenih u DIN 24166, klasa 2.

Tolerances: performances and sound power levels within the tolerances allowed by the DIN 24166 standard for Class 2.

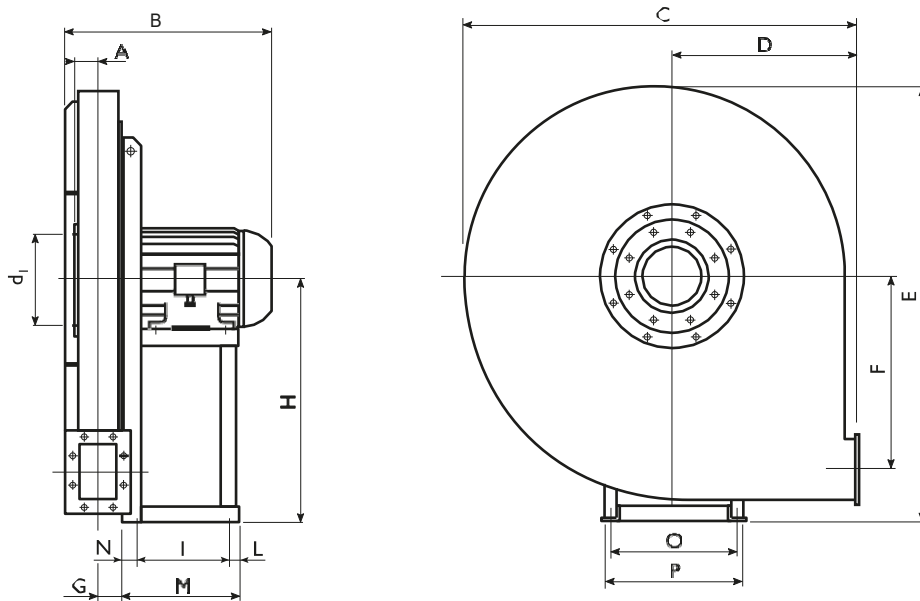
LpA [dB (A)]: Određivanje nivoa zvučne snage obavljeno je prema UNI EN ISO 3746: 1997 standardu. Merenja nivoa zvučnog pritiska vršena su na površini u obliku paralelepipeda koja zatvara mašinu, na udaljenosti od 2 m od površina same mašine*.

LpA [dB(A)]: Measurement of the sound power level was carried out in compliance with UNI EN ISO 3746:1997. The sound pressure was measured on the surface of a parallelepiped that encloses the machine at a distance of 2 meters from its surface*.

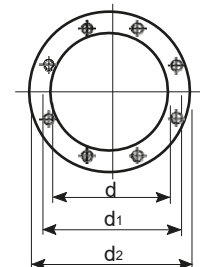
Model	Mot (H)	Pm (kW)	Kg	Ventilator Fan										Baza Base						
				A	B	C	D	E	F	G	H			I	L	M	N	O	P	Ø
											0° 135°	180° 225°	270° 315°							
352/A T	80	0,75	35	65	377	535	250	617	215	56	355	250	355	121	45	211	45	203	225	10
352/B T	80	1,1	36																	
402/A T	90	1,5	46	71	437	590	280	659	238	63	375	280	375	133	58	246	55	234	260	10
402/B T	90	2,2	50																	
452/A T	100	3	60	78	482	645	300	713	265	70	400	300	400	197	49	276	30	289	324	12
452/B T	112	4	80		503															
502/A T	112	4	92	86	520	715	335	795	297	78	450	335	450	197	49	276	30	289	324	12
502/B T	132	5,5	107		560									237	59	336	40	337	372	12
562/A T	132	7,5	122	95	579	805	375	893	337	88	500	375	500	237	40	336	40	337	372	12
562/B T	160	11	163		684									337	50	436	50	395	440	14
632/A T	160	15	175	105	703	910	425	1000	381	98	560	425	560	337	49	436	50	395	440	14
632/B T	160	18,5	193											337						
712/A T	180	22	300	115	809	1015	475	1123	426	108	630	475	630	357	33	460	70	434	488	17
712/B T	200	30	390		917									381	39	500	80	506	568	19
714/A T	112	4	194	115	583	1015	475	1123	426	108	630	475	630	197	49	276	30	289	324	12
714/B T	132	5,5	211		623									237	59	336	40	337	372	12
804/A T	132	7,5	255	127	648	1140	530	1265	481	121	710	530	710	237	59	336	40	337	372	12
804/B T	160	11	286		753									237	49	436	50	595	440	14

Dimenzije u mm/Dimensions in mm

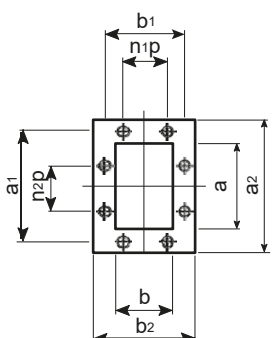
Težina ventilatora u kg (u kompletu sa motorom) • Weight of fan in kg (complete with motor)



(fig. 1)



(fig. 2)

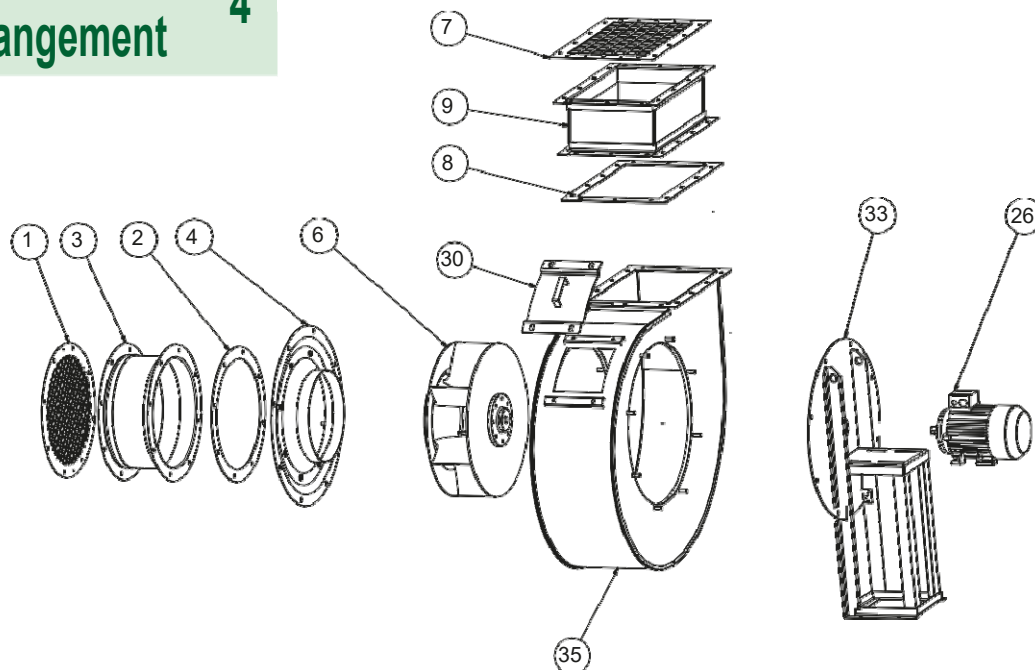


Model	Ulazna priрубnica (sl. 1) Ulazna priрубnica					Presna priрубnica (sl. 2) Izlazne priрубnice										
	d	d1	d2	n°	Ø	a	b	a1	b1	a2	b2	n1xp	n2xp	n°	Ø	
350	185	219	250	8	8	146	105	182	139	216	175	-	1x112	6	12	
400	205	241	275	8	8	166	117	200	151	236	187	-	1x112	6	12	
450	228	265	298	8	8	185	131	219	165	255	201	-	1x112	6	12	
500	255	292	325	8	10	207	148	241	182	277	218	1x112	1x112	8	12	
560	285	332	365	8	12	231	166	265	200	301	236	1x112	1x112	8	12	
630	320	366	400	8	12	258	185	292	219	328	255	1x112	2x112	10	12	
710	360	405	440	8	12	288	205	332	249	368	285	1x125	2x125	10	12	
800	405	448	485	12	12	322	229	366	273	402	309	1x125	2x125	10	12	

Dimenzije u mm/Dimensions in mm

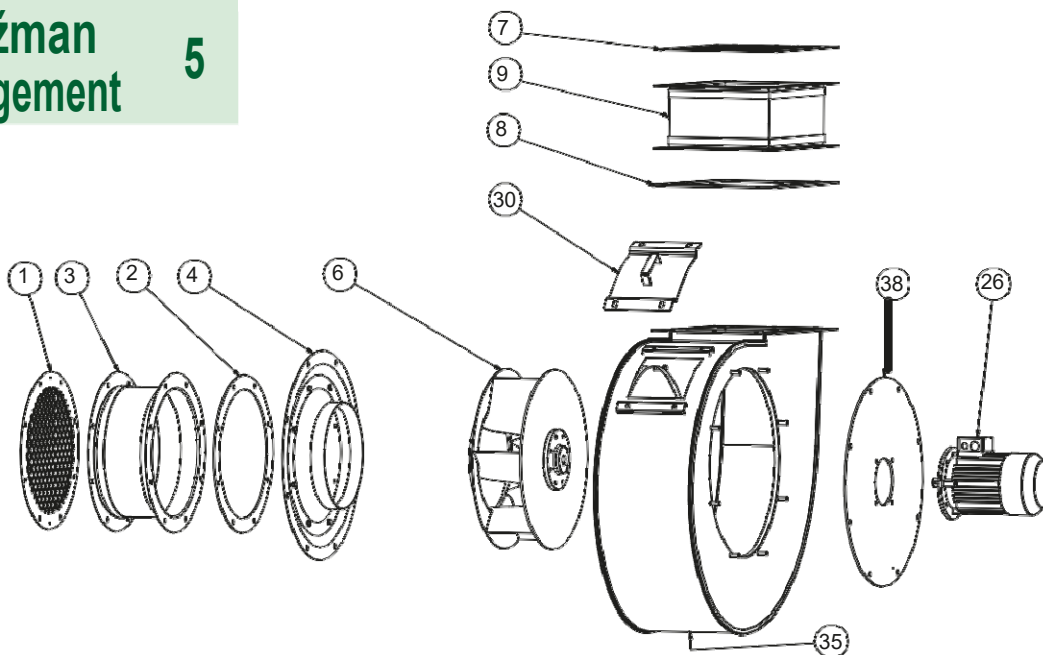
**Aranžman
Arrangement**

4



**Aranžman
Arrangement**

5



OPIS/DESCRIPTION

1 - Mreža za zaštitu od usisavanja	Inlet protection grid
2 - Usisna kontraflanca	Inlet counter flange
3 - Antivibracioni usisni spoj	Inlet flexible joint
4 - Usnik za usisavanje	Inlet nozzle
6 - Impler	Impeller
7 - Mreža za zaštitu od pritiska	Outlet protection grid
8 - Pritisna kontraflanca	Outlet counter flange
9 - Antivibracioni spoj za pritiskanje	Outlet flexible joint
17 - Monobloc podrška	Single-block support
18 - Remenica	Pulley
19 - Kompas	Bush
21 - Karter za kaiš	Belt transmission guard
22 - Baza	Base
24 - Motorni klizači	Motor slides

25 - Matice sa navojem za zatezanje	Threaded drawplates for tensioning
26 - Električni motor	Electric Motor
30 - Inspeksijski otvor	Inspection door
31 - Klinasti remenica	V-belts
32 - Kiper	Tipper
33 - Podloga za podršku (stolica)	Motor supporting base (pedestal)
35 - Ventilatorska stolarija	Fan frame
38 - Disk držača motora	Motor holding disc
42 - Jednodelno zaštitno kućište	Single-block protecting guard
43 - Čepovi za odvod	Tappi di scarico
44 - Carter potporni nosači	Carter supporting brackets
45 - Podrška za preklop	Tipper support
49 - Zaštita poklopca zgloba	Joint-cover guard