

# CAS/EW



**HIGHLY EFFICIENT  
IE3-COMPLIANT  
THREE-PHASE MOTORS**



**VARIABLE SPEED DRIVE**  
VSD: Variable Speed Drive.  
· VSD1/A-RFM  
· VSD3/A-RFT  
Supply on request

**CONTROL**  
Supply optional accessory

**SUPPLY**  
VSD1/A-RFM:  
220-240 V 50/60 Hz  
VSD3/A-RFT:  
380-415 V 50/60 Hz

**High-efficiency centrifugal single-inlet, high-pressure fans with casing and sheet steel impeller, fitted with IE3 asynchronous motor adjustable electronically.**

Fan:

- Steel sheet casing
- Impeller with backward-facing blades made from galvanised sheet steel, except models 640, 645 and 650 which have a cast aluminium impeller.

Motor and electronic variable speed:

- Motors with IE3 efficiency adjustable electronically.
- The variable speed drive VSD will be supplied as per order.
- Electronic variable speed drive (VSD) can be adjusted by external 0-10 V signal.
- It is advisable to install sinusoidal filters between the fan and the electronic variable speed drive (VSD) when they are far apart.
- Electronic variable speed drive (VSD), available with single-phase 220-240 V 50/60 Hz input (VSD1/B type) or three-phase 380-415 V 50/60 Hz (VSD3/B type).
- By default, the electronic variable speed drive (VSD) is delivered programmed for constant speed.
- Working fan temperature:  
-25 °C +120 °C.
- Working temperature (VSD):  
-25 °C +50 °C.

- Class F motors with ball bearings, IP55 protection.

- Three-phase 230/400 V. 50 Hz. (up to c) and 400/690 V. 50 Hz. (power over 5.5 CV)

Finish:

- Anticorrosive finish in polyester resin polymerised at 190°C, after alkaline degreasing with nanotechnology treatment and phosphate-free.

On request:

- Fan designed to transport air up to 250°C.
- Stainless steel fans

## Fan order code

**CAS/EW — 463 — 2T — 5.5 — IE3**

CAS/EW: High-efficiency centrifugal single-inlet, high-pressure fans with casing and sheet steel impeller, "Efficient work"

Impeller size

Number of motor poles:  
2=2850 r/min

Motor power (CV)

Three-phase motor IE3

**CAS/EW — 463 — 2T — 5.5 — IE3 — VSD1 — D**

CAS/EW: High-efficiency centrifugal single-inlet, high-pressure fans with casing and sheet steel impeller, "Efficient work"

Impeller size

Number of motor poles:  
2=2850 r/min

Motor power (CV)

Three-phase motor IE3

VSD1: Fitted with VSD1/A-RFM, electronic variable speed, single phase power supply 220-240 V 50/60 Hz.

VSD3: Fitted with VSD3/A-RFT, electronic variable speed, three-phase power supply 380-415 V 50/60 Hz.

D: Standard version, VSD supplied programmed for constant speed.  
P: Supplied with VSD programmed for pressure control and Si-Presión pressure transmitter  
K: Supplied with VSD programmed for pressure control and built into a BOXPRES KIT/B box. Only available for fans with motor power less than or equal to 2.2 kW.

### Technical characteristics

Model	Speed min/max (r/min)	Single-phase VSD 230 V 50/60 Hz		Three-phase VSD 400 V 50/60 Hz		Maximum current Motor 50 Hz			Installed power (kW)	Maximum airflow min/max (m³/h)	Sound pressure level min/max dB(A)	Weight approx. (Kg)
		Maximum current input (A)	Model VSD	Maximum current input (A)	Model VSD	230V	400V (A)	690V				
CAS/EW-463-2T-5.5	1160/2900	-	-	9.44	VSD3/A-RFT-5.5	13.00	7.50	-	4.00	460 / 1150	62 / 82	57
CAS/EW-463-2T-7.5	1170/2930	-	-	12.91	VSD3/A-RFT-7.5	-	10.10	5.86	5.50	800 / 2000	63 / 83	58
CAS/EW-467-2T-7.5	1170/2930	-	-	12.91	VSD3/A-RFT-7.5	-	10.10	5.86	5.50	620 / 1550	64 / 84	69
CAS/EW-467-2T-10	1175/2935	-	-	17.45	VSD3/A-RFT-10	-	13.90	8.06	7.50	1040 / 2600	65 / 85	70
CAS/EW-571-2T-10	1175/2935	-	-	17.45	VSD3/A-RFT-10	-	13.90	8.06	7.50	800 / 2000	66 / 86	64
CAS/EW-571-2T-15	1170/2925	-	-	25.48	VSD3/A-RFT-15	-	19.60	11.40	11.00	1380 / 3450	67 / 87	65
CAS/EW-640-2T-2	1150/2875	16.15	VSD1/A-RFM-2	4.49	VSD3/A-RFT-2	5.34	3.07	-	1.50	1040 / 2600	57 / 77	56
CAS/EW-645-2T-3	1165/2910	23.25	VSD1/A-RFM-3	6.46	VSD3/A-RFT-3	7.32	4.21	-	2.20	800 / 2000	56 / 76	55
CAS/EW-645-2T-4	1165/2910	-	-	7.27	VSD3/A-RFT-5.5	10.00	5.77	-	3.00	1200 / 3000	61 / 81	55
CAS/EW-650-2T-5.5	1160/2900	-	-	9.44	VSD3/A-RFT-5.5	13.00	7.50	-	4.00	1400 / 3500	61 / 81	59
CAS/EW-650-2T-7.5	1170/2930	-	-	12.91	VSD3/A-RFT-7.5	-	10.10	5.86	5.50	1895 / 4750	63 / 83	52
CAS/EW-852-2T-7.5	1170/2930	-	-	12.91	VSD3/A-RFT-7.5	-	10.10	5.86	5.50	1400 / 3500	61 / 81	68
CAS/EW-852-2T-10	1175/2935	-	-	17.45	VSD3/A-RFT-10	-	13.90	8.06	7.50	2200 / 5500	65 / 85	68
CAS/EW-856-2T-15	1170/2925	-	-	25.48	VSD3/A-RFT-15	-	19.60	11.40	11.00	3000 / 7500	65 / 85	63
CAS/EW-863-2T-15	1170/2925	-	-	25.48	VSD3/A-RFT-15	-	19.60	11.40	11.00	1600 / 4000	64 / 84	67
CAS/EW-863-2T-20	1180/2945	-	-	33.97	VSD3/A-RFT-20	-	27.60	16.00	15.00	2805 / 7000	66 / 86	69
CAS/EW-971-2T-25	1180/2945	-	-	41.67	VSD3/A-RFT-25	-	33.50	19.40	18.50	2325 / 5800	67 / 87	67
CAS/EW-971-2T-30	1180/2955	-	-	49.39	VSD3/A-RFT-30	-	38.80	22.50	22.00	3235 / 8100	68 / 88	68
CAS/EW-1250-2T-15/A	1170/2925	-	-	25.48	VSD3/A-RFT-15	-	19.60	11.40	11.00	4800 / 12000	64 / 84	75
CAS/EW-1456-2T-25/A	1180/2945	-	-	41.67	VSD3/A-RFT-25	-	33.50	19.40	18.50	7210 / 18000	67 / 87	80
CAS/EW-790-2T-20	1180/2945	-	-	33.97	VSD3/A-RFT-20	-	27.60	16.00	15.00	840 / 2100	68 / 88	73
CAS/EW-980-2T-30	1180/2955	-	-	49.39	VSD3/A-RFT-30	-	38.80	22.50	22.00	1915 / 4800	67 / 87	61

### Acoustic features at maximum speed

The specified values are determined according to free field measurements of sound levels in dB(A) at an equivalent distance of twice the fan's span plus the impeller's diameter, with a minimum of 1.5 m.

Sound power Lw(A) spectrum in dB(A) via frequency band in Hz.

Model	63	125	250	500	1000	2000	4000	8000	Model	63	125	250	500	1000	2000	4000	8000
CAS/EW-463-2-5.5	57	69	82	91	93	93	89	80	CAS/EW-852-2-7.5	68	72	82	88	92	92	89	84
CAS/EW-463-2-7.5	58	70	83	92	94	94	90	81	CAS/EW-852-2-10	68	76	86	93	96	96	92	84
CAS/EW-467-2-7.5	69	74	83	95	95	97	93	85	CAS/EW-856-2-15	63	76	90	96	96	94	90	84
CAS/EW-467-2-10	70	75	84	96	96	98	94	86	CAS/EW-863-2-15	67	81	87	96	96	95	92	87
CAS/EW-571-2-10	64	76	86	96	99	99	94	86	CAS/EW-863-2-20	69	81	92	99	98	95	93	87
CAS/EW-571-2-15	65	77	87	97	100	100	95	87	CAS/EW-971-2-25	67	81	90	102	98	96	93	89
CAS/EW-640-2-2	56	67	75	82	88	84	83	76	CAS/EW-971-2-30	68	82	91	103	99	97	94	90
CAS/EW-645-2-3	55	66	74	81	87	83	82	75	CAS/EW-1250-2-15/A	75	88	97	94	91	86	82	73
CAS/EW-645-2-4	55	66	77	86	90	91	87	79	CAS/EW-1456-2-25/A	80	93	102	99	96	90	87	78
CAS/EW-650-2-5.5	59	75	84	90	93	90	85	78	CAS/EW-790-2-20	73	77	88	99	105	96	89	83
CAS/EW-650-2-7.5	52	68	81	91	96	93	85	78	CAS/EW-980-2-30	61	70	76	91	105	97	94	90

### Positions

LG 270 standard supply  
LG 180 positions on request  
and with special fixing measurements.



Supplied on request  
RD 180 positions with special  
fixing measurements.



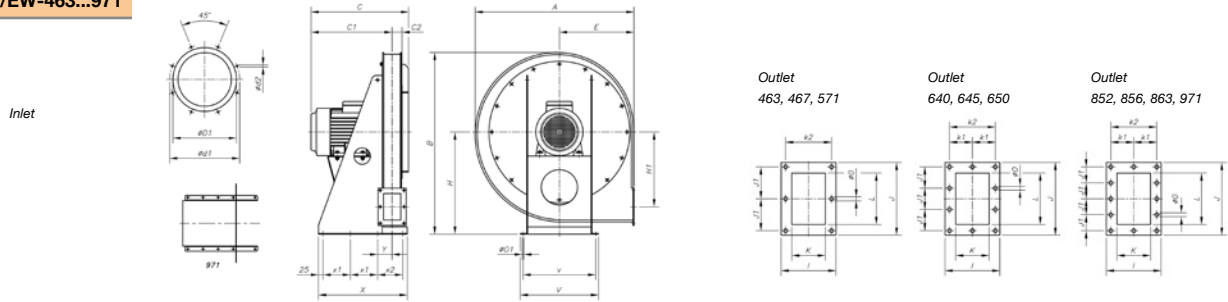


**EFFICIENT WORK**



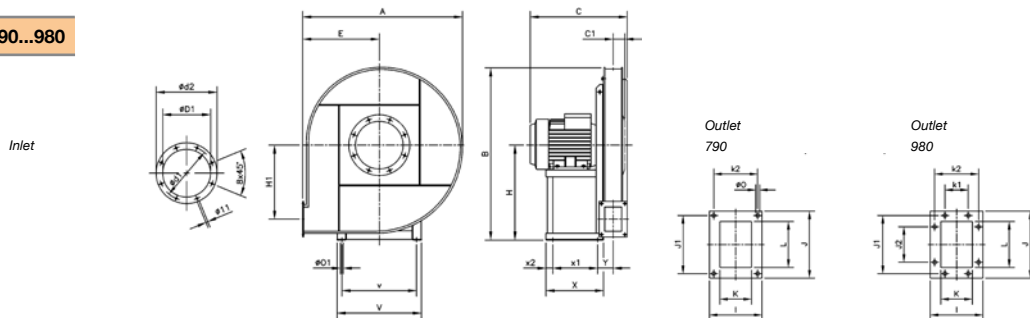
**Dimensions in mm**

**CAS/EW-463...971**



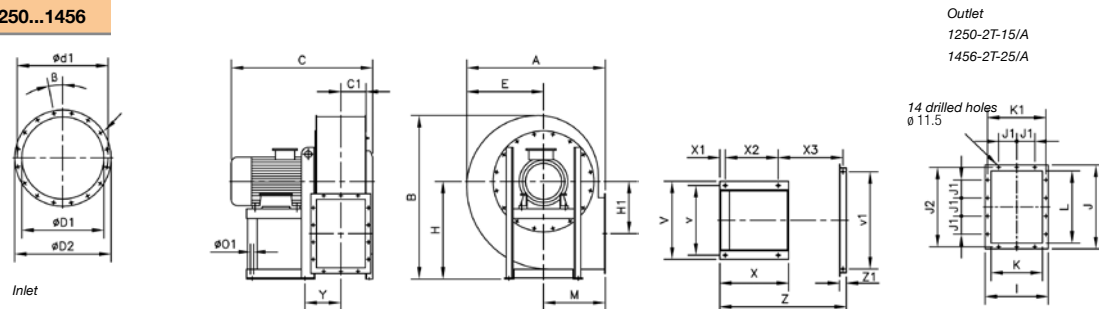
Model	A	B	C	C1	$\phi D1$	$\phi D2$	$\phi d1$	x $\phi$	$\beta$	E	H	H1	I	J	J1	J2	K	K1	L	M	$\phi O1$	V	v	X	X1	X2	Y
CAS-463-2T-5.5	782	875	459	383.5	200	M8	240	-	-	370	485	362	145	185	80	-	85	-	125	-	14	380	380	370	115	-	73.5
CAS-463-2T-7.5	782	875	517	441.5	200	M8	240	-	-	370	485	362	145	185	80	-	85	-	125	-	14	380	380	370	115	-	73.5
CAS-467-2T-7.5	833	945	530	442	224	M8	258	-	-	390	530	395	150	190	82.5	-	90	-	130	-	14	405	405	300	125	-	76
CAS-467-2T-10	833	945	530	442	224	M8	258	-	-	390	530	395	150	190	82.5	-	90	-	130	-	14	405	405	300	125	-	76
CAS-571-2T-10	873	995	536	445.5	250	M8	275	-	-	410	560	410	155	205	90	-	95	-	145	-	14	430	430	350	150	-	79.5
CAS-571-2T-15	873	995	671	580.5	250	M8	275	-	-	410	560	410	155	205	90	-	95	-	145	-	14	430	430	410	180	-	79.5
CAS-640-2T-2	639	728	446	350.5	250	M8	275	-	-	300	410	250	185	260	78	-	125	80	200	-	14	340	340	350	100	-	93.5
CAS-645-2T-3	699	788	461	358	250	M8	275	-	-	330	440	267.5	200	284	86	-	140	87.5	224	-	14	380	380	380	115	-	101
CAS-645-2T-4	699	788	491	388	250	M8	275	-	-	330	440	267.5	200	284	86	-	140	87.5	224	-	14	380	380	380	115	-	101
CAS-650-2T-5.5	782	875	534	421	250	M8	275	-	-	370	485	300	220	310	95	-	160	97.5	250	-	14	405	405	490	125	190	111
CAS-650-2T-7.5	782	875	572	459	250	M8	275	-	-	370	485	300	220	310	95	-	160	97.5	250	-	14	405	405	490	125	190	111
CAS-852-2T-7.5	833	945	603	470	380	M8	310	-	-	390	530	320	240	340	78	-	180	107.5	280	-	14	430	430	540	150	190	122
CAS-852-2T-10	833	945	603	470	380	M8	310	-	-	390	530	320	240	340	78	-	180	107.5	280	-	14	430	430	540	150	190	122
CAS-856-2T-15	833	945	708	575	355	M8	395	-	-	390	530	320	240	340	78	-	180	107.5	280	-	14	430	430	600	180	190	122
CAS-863-2T-15	873	995	728	585	355	M8	410	-	-	410	560	325	260	375	87.5	-	200	117.5	315	-	14	430	430	620	180	210	132
CAS-863-2T-20	873	995	728	585	355	M8	410	-	-	410	560	325	260	375	87.5	-	200	117.5	315	-	14	430	430	620	180	210	132
CAS-971-2T-25	1012	1170	759	598	400	M10	450	-	-	460	670	420	294	425	100	-	224	132	355	-	14	550	550	500	150	150	145
CAS-971-2T-30	1012	1170	881	720	400	M10	450	-	-	460	670	420	294	425	100	-	224	132	355	-	14	550	550	500	150	150	145

**CAS/EW-790...980**

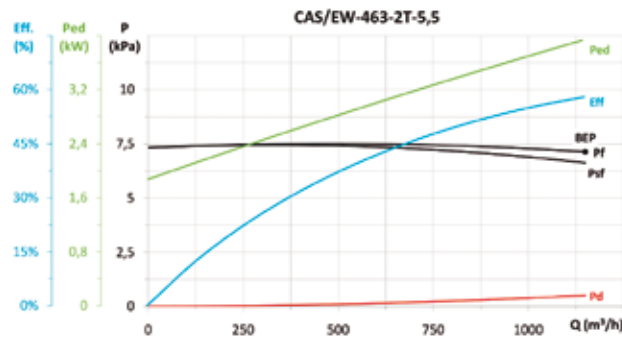


Model	A	B	C	C1	$\phi D1$	$\phi D2$	$\phi d1$	x $\phi$	$\beta$	E	H	H1	I	J	J1	J2	K	K1	L	M	$\phi O1$	V	v	X	X1	X2	Y
CAS-790-2T-20	1100	1180	650	58	185	255	219	-	-	530	630	520	140	172	140	-	80	-	112	-	14	440	440	425	340	30	103
CAS-980-2T-30	1120	1250	725	90	255	325	292	-	-	530	710	530	210	270	241	112	140	112	200	-	14	440	440	425	340	35	145

**CAS/EW-1250...1456**

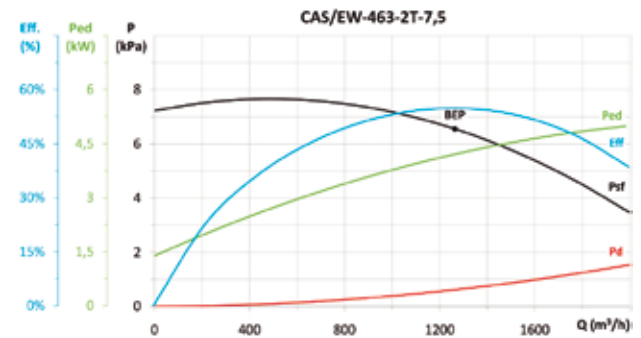


Model	A	B	C	C1	$\phi D1$	$\phi D2$	$\phi d1$	x $\phi$	$\beta$	E	H	H1	I	J	J1	J2	K	K1	L	M	$\phi O1$	V	v	X	X1	X2	Y
CAS-1250-2T-15/A	865	1055	885	160	361	441	405	8x11.5	22°30'	510	630	365	360	480	125	448	280	332	400	355	14	440	440	425	30	340	202
CAS-1456-2T-25/A	970	1185	900	163	456	535	497	12x12	15°	555	710	410	395	530	125	497	315	366	450	400	14	440	440	425	30	340	219


**Erp. Characteristic curves and ErP data**


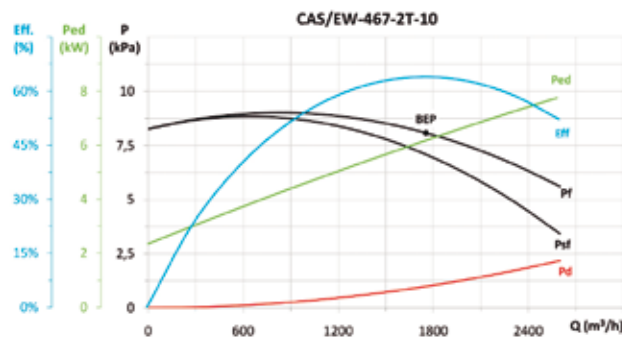
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,07	1,05	60,7%	65,0	3,931	1150	7135	2916	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



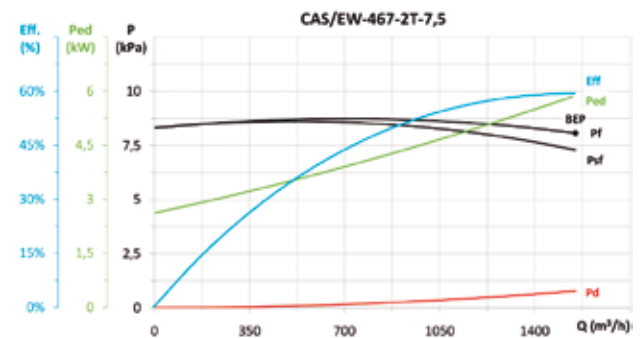
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,07	1,04	57,3%	61,3	4,195	1264	6557,2	2954	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



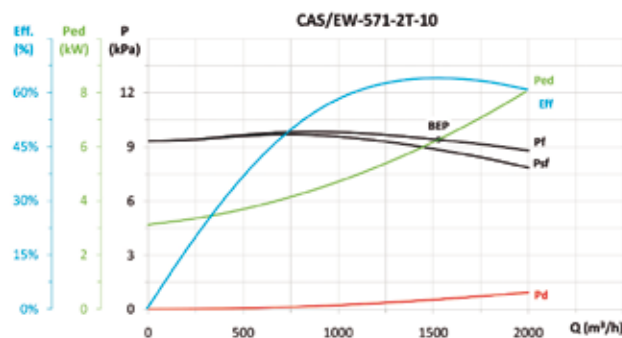
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,08	1,04	66,5%	68,7	6,152	1754	8078,7	2954	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



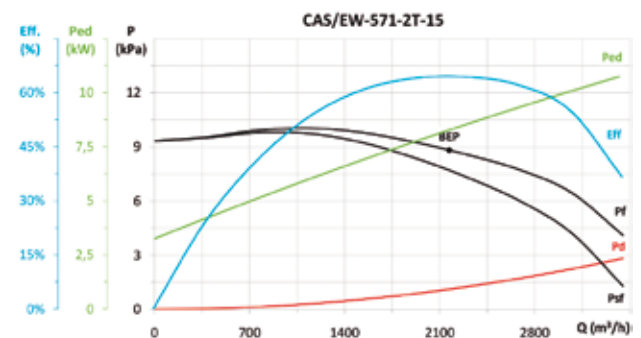
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,08	1,04	61,8%	64,3	5,845	1550	8070,3	2936	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



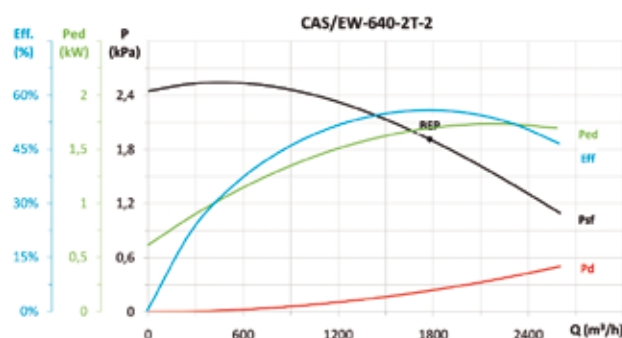
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,09	1,04	66,6%	68,7	6,231	1528	9400,4	2953	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



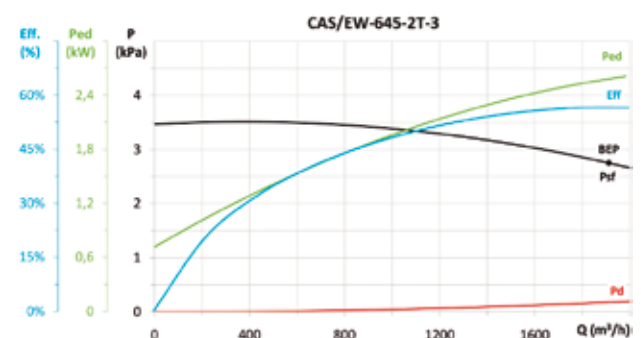
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,09	1,04	67,1%	68,0	8,238	2170	8822,4	2951	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,02	1,07	59,8%	67,9	1,693	1778	1912,7	2886	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,03	1,06	60,1%	66,3	2,576	1912	2750,8	2913	NECESSARY

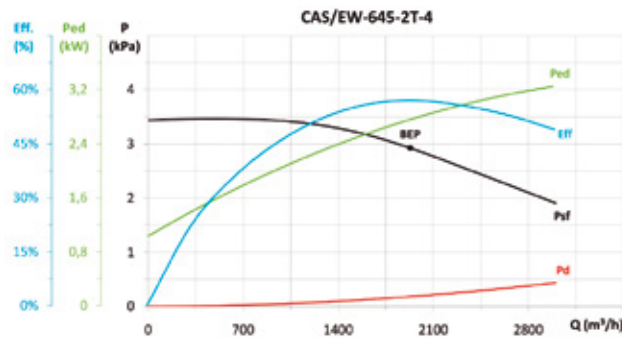
\* $\eta_e$  (%) = Eff. (%) x Cc



**EFFICIENT WORK**

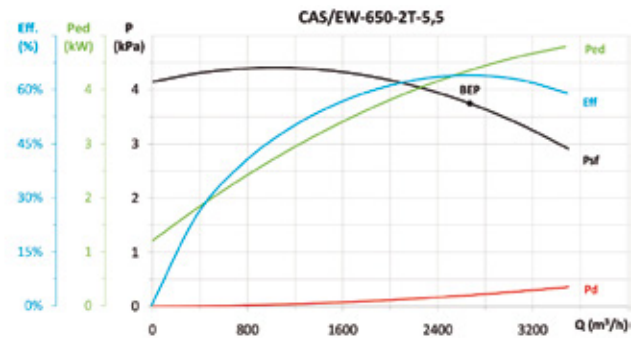


**Erp. Characteristic curves and ErP data**



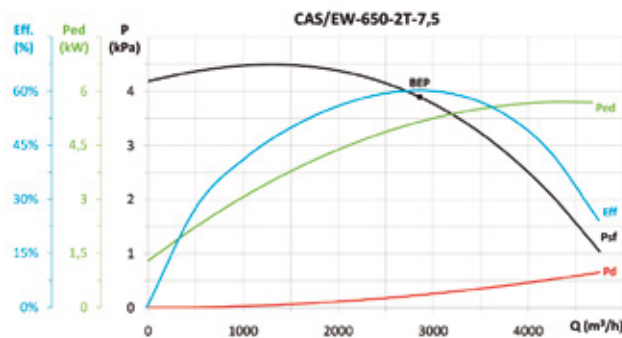
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,03	1,06	60,3%	66,2	2,750	1930	2925,2	2932	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



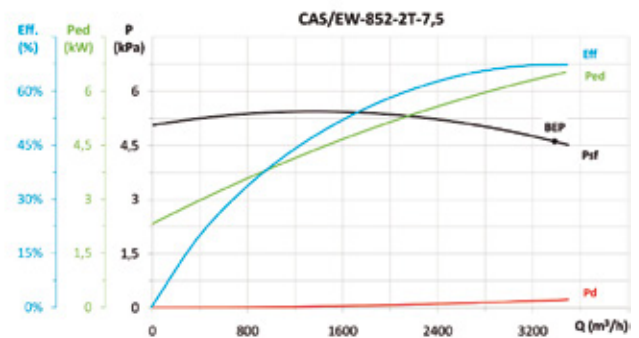
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,04	1,04	66,8%	70,6	4,344	2671	3747,6	2908	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



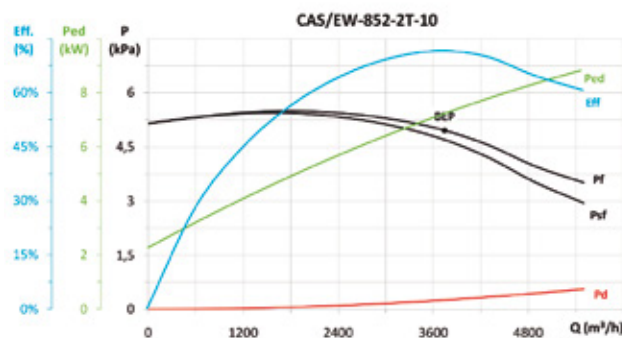
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,04	1,04	62,6%	65,6	5,136	2858	3893,6	2944	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



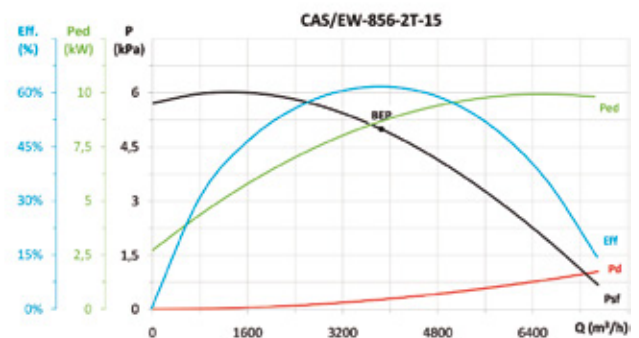
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,05	1,04	70,1%	72,1	6,438	3385	4613,0	2930	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



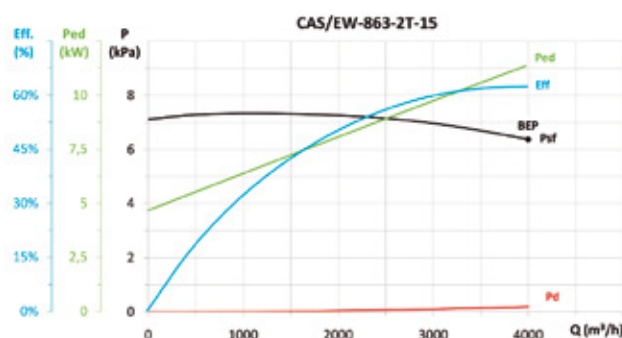
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,05	1,04	74,5%	76,0	7,202	3744	4959,4	2946	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



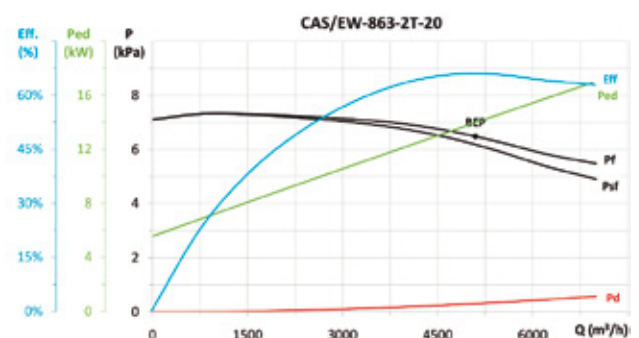
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,05	1,04	64,2%	64,8	8,657	3851	4993,7	2949	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,06	1,04	64,9%	64,8	11,344	3998	6372,7	2933	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



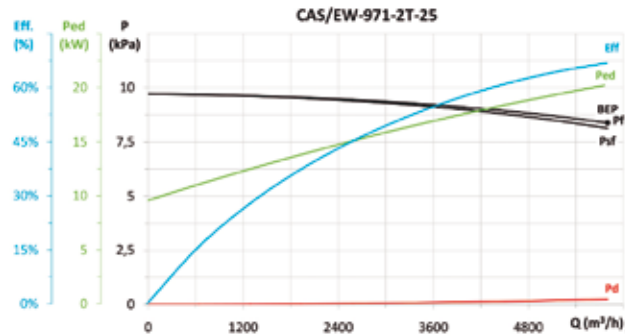
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,06	1,04	68,7%	68,4	13,911	5097	6485,8	2955	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



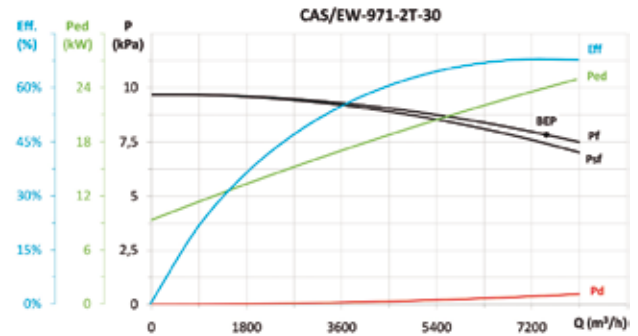


## Erp. Characteristic curves and ErP data



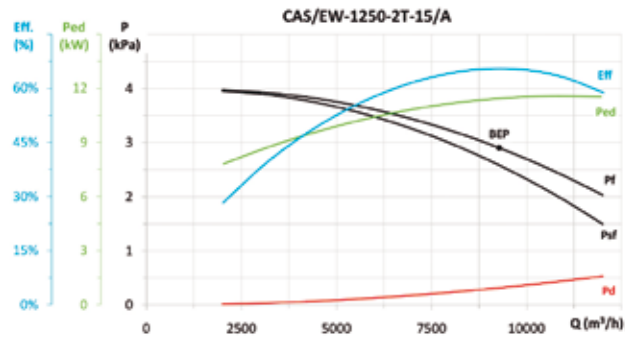
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,08	1,04	69,5%	68,8	20,204	5800	8386,5	2946	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



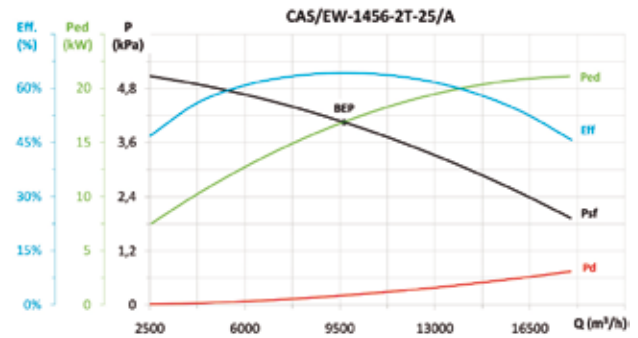
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,08	1,04	70,7%	69,8	23,927	7478	7832,6	2956	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



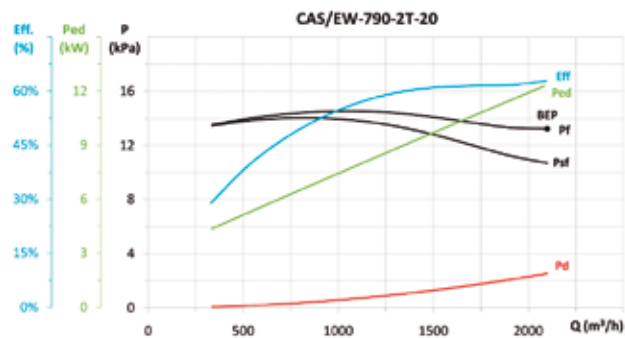
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,03	1,04	68,1%	68,0	11,435	9279	2904,1	2932	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



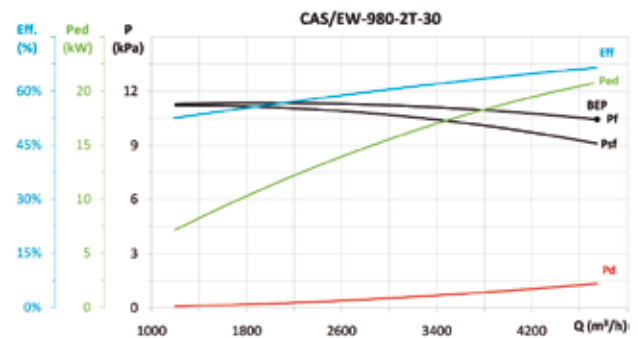
MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
A	S	1,04	1,04	66,8%	66,3	16,913	9659	4051,3	2955	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,13	1,04	65,3%	65,1	12,280	2100	13220	2959	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc



MC	EC	SR	Cc	$\eta_e$ (%)*	N	[kW]	[m³/h]	[Pa]	[rpm]	VSD
B	T	1,10	1,04	69,1%	68,4	20,726	4750	10439	2962	NECESSARY

\* $\eta_e$  (%) = Eff. (%) x Cc

## Accessories

See accessories section.



INT

VSD1/A-RFM  
VSD3/A-RFT

AET

RPA

B

BIC

ACE

CJACUS

S

REG

CONTROL UNITS  
AND SENSORS