

Ratings, types and voltages

ACS800-01

ACS800 - 01 - XXXX -

2
3

 + XXXX

Nominal ratings		No-overload use	Light-overload use		Heavy-duty use		Noise level	Heat dissipation	Air flow	Type designation	Frame size
$I_{cont. max}$	I_{max}	$P_{cont. max}$	I_N	P_N	I_{hd}	P_{hd}	dB(A)	W	m ³ /h		
A	A	kW	A	kW	A	kW					
$U_N = 230 V$ (Range 208 to 240 V). The power ratings are valid at nominal voltage 230 V.											
5.1	6.5	1.1	4.7	0.75	3.4	0.55	62	100	35	ACS800-01-0001-2	R2
6.5	8.2	1.5	6	1.1	4.3	0.75	62	100	35	ACS800-01-0002-2	R2
8.5	10.8	1.5	7.7	1.5	5.7	1.1	62	100	35	ACS800-01-0003-2	R2
10.9	13.8	2.2	10.2	2.2	7.5	1.5	62	120	35	ACS800-01-0004-2	R2
13.9	17.6	3	12.7	3	9.3	2.2	62	140	35	ACS800-01-0005-2	R2
19	24	4	18	4	14	3	62	160	69	ACS800-01-0006-2	R3
25	32	5.5	24	5.5	19	4	62	200	69	ACS800-01-0009-2	R3
34	46	7.5	31	7.5	23	5.5	62	250	69	ACS800-01-0011-2	R3
44	62	11	42	11	32	7.5	62	340	103	ACS800-01-0016-2	R4
55	72	15	50	11	37	7.5	62	440	103	ACS800-01-0020-2	R4
72	86	18.5	69	18.5	49	11	65	530	250	ACS800-01-0025-2	R5
86	112	22	80	22	60	15	65	610	250	ACS800-01-0030-2	R5
103	138	30	94	22	69	18.5	65	810	250	ACS800-01-0040-2	R5
141	164	37	132	37	97	30	65	1190	405	ACS800-01-0050-2	R6
166	202	45	155	45	115	30	65	1190	405	ACS800-01-0060-2	R6
202	282	55	184	55	141	37	65	1440	405	ACS800-01-0070-2	R6
$U_N = 400 V$ (Range 380 to 415 V). The power ratings are valid at nominal voltage 400 V.											
5.1	6.5	1.5	4.7	1.5	3.4	1.1	62	100	35	ACS800-01-0003-3	R2
6.5	8.2	2.2	5.9	2.2	4.3	1.5	62	120	35	ACS800-01-0004-3	R2
8.5	10.8	3	7.7	3	5.7	2.2	62	140	35	ACS800-01-0005-3	R2
10.9	13.8	4	10.2	4	7.5	3	62	160	35	ACS800-01-0006-3	R2
13.9	17.6	5.5	12.7	5.5	9.3	4	62	200	35	ACS800-01-0009-3	R2
19	24	7.5	18	7.5	14	5.5	62	250	69	ACS800-01-0011-3	R3
25	32	11	24	11	19	7.5	62	340	69	ACS800-01-0016-3	R3
34	46	15	31	15	23	11	62	440	69	ACS800-01-0020-3	R3
44	62	22	41	18.5	32	15	62	530	103	ACS800-01-0025-3	R4
55	72	30	50	22	37	18.5	62	610	103	ACS800-01-0030-3	R4
72	86	37	69	30	49	22	65	810	250	ACS800-01-0040-3	R5
86	112	45	80	37	60	30	65	990	250	ACS800-01-0050-3	R5
103	138	55	94	45	69	37	65	1190	250	ACS800-01-0060-3	R5
145	170	75	141	75	100	45	65	1440	405	ACS800-01-0075-3	R5
166	202	90	155	75	115	55	65	1940	405	ACS800-01-0100-3	R6
202	282	110	184	90	141	75	65	2310	405	ACS800-01-0120-3	R6
225	326	110	220	110	163	90	65	2810	405	ACS800-01-0135-3	R6
260	326	132	254	132	215	110	65	3260	405	ACS800-01-0165-3	R6
290	351	160	285	160	234	132	65	4200	405	ACS800-01-0205-3	R6

Brake options

Brake chopper

The ACS800 series has built-in brake choppers for all types. Therefore, no additional space or installation time is needed. The brake chopper is part of the standard delivery for the frame sizes R2 - R3; R4 only 690 V. For the other frames a brake chopper is a selectable option.

Braking control is integrated into the ACS800 series. It controls the braking, supervises the system status and detects failures such as brake resistor and resistor cable short circuits, chopper short circuit, and calculated resistor overtemperature.

Brake resistor

The SACE/SAFUR brake resistors are separately available for all ACS800 types. Resistors other than the standard resistors may be used providing the specified resistance value is not decreased, and the heat dissipation capacity of the resistor is sufficient for the drive application.

For ACS800 units, no separate fuses in the brake circuit are required if the following conditions are met:

- The ACS800 mains cable is protected with fuses
- No mains cable/fuse overrating takes place

$U_N = 230 \text{ V}$ (Range 208 to 240 V)

ACS800 type designation	Brake chopper power	Brake resistor(s)			
	Continuous P_{brcont} [kW]	Type	R [Ohm]	E_f [kJ]	P_{rcont} [kW]
ACS800-01-0001-2	0.6	SACE08RE44	44	210	1
ACS800-01-0002-2	0.8	SACE08RE44	44	210	1
ACS800-01-0003-2	1.1	SACE08RE44	44	210	1
ACS800-01-0004-2	1.5	SACE08RE44	44	210	1
ACS800-01-0005-2	2.2	SACE15RE22	22	420	2
ACS800-01-0006-2	3	SACE15RE22	22	420	2
ACS800-01-0009-2	4	SACE15RE22	22	420	2
ACS800-01-0011-2	5.5	SACE15RE13	13	435	2
ACS800-01-0016-2	11	SAFUR90F575	8	1800	4.5
ACS800-01-0020-2	17	SAFUR90F575	8	1800	4.5
ACS800-01-0025-2	23	SAFUR80F500	6	2400	6
ACS800-01-0030-2	28	SAFUR125F500	4	3600	9
ACS800-01-0040-2	33	SAFUR125F500	4	3600	9
ACS800-01-0050-2	45	2xSAFUR125F500	2	7200	18
ACS800-01-0060-2	56	2xSAFUR125F500	2	7200	18
ACS800-01-0070-2	68	2xSAFUR125F500	2	7200	18

ACS800 type designation	Brake chopper power				Brake resistor(s)			
	5 / 60 s P_{br5} [kW]	10 / 60 s P_{br10} [kW]	30 / 60 s P_{br30} [kW]	Continuous P_{brcont} [kW]	Type	R [Ohm]	E_f [kJ]	P_{rcont} [kW]
ACS800-02-0080-2	68	68	68	54	SAFUR 160F380	1.78	3600	9
ACS800-02-0100-2	83	83	83	54	SAFUR 160F380	1.78	3600	9
ACS800-02-0120-2	105	67	60	40	2xSAFUR200F500	1.35	10800	27
ACS800-02-0140-2	135	135	135	84	2xSAFUR160F380	0.89	7200	18
ACS800-02-0170-2	135	135	135	84	2xSAFUR160F380	0.89	7200	18
ACS800-02-0210-2	165	165	165	98	2xSAFUR160F380	0.89	7200	18
ACS800-02-0230-2	165	165	165	113	2xSAFUR160F380	0.89	7200	18
ACS800-02-0260-2	223	170	125	64	4xSAFUR160F380	0.45	14400	36
ACS800-02-0300-2	223	170	125	64	4xSAFUR160F380	0.45	14400	36

$U_N = 400 \text{ V}$ (Range 380 to 415 V)

ACS800 type designation	Brake chopper power	Brake resistor(s)			
	Continuous P_{brcont} [kW]	Type	R [Ohm]	E_f [kJ]	P_{rcont} [kW]
ACS800-01-0003-3	1.1	SACE08RE44	44	210	1
ACS800-01-0004-3	1.5	SACE08RE44	44	210	1
ACS800-01-0005-3	2.2	SACE08RE44	44	210	1
ACS800-01-0006-3	3	SACE08RE44	44	210	1
ACS800-01-0009-3	4	SACE08RE44	44	210	1
ACS800-01-0011-3	5.5	SACE15RE22	22	420	2
ACS800-01-0016-3	7.5	SACE15RE22	22	420	2
ACS800-01-0020-3	11	SACE15RE22	22	420	2
ACS800-01-0025-3	23	SACE15RE13	13	430	2
ACS800-01-0030-3	28	SACE15RE13	13	430	2
ACS800-01-0040-3	33	SAFUR90F575	8	1800	4.5
ACS800-01-0050-3	45	SAFUR90F575	8	1800	4.5
ACS800-01-0060-3	56	SAFUR90F575	8	1800	4.5
ACS800-01/07-0075-3	70	SAFUR80F500	6	2400	6
ACS800-01/07-0100-3	83	SAFUR125F500	4	3600	9
ACS800-01/07-0120-3	113	SAFUR125F500	4	3600	9
ACS800-01/07-0135-3	132	SAFUR200F500	2.7	5400	13.5
ACS800-01/07-0165-3	132	SAFUR200F500	2.7	5400	13.5
ACS800-01/07-0205-3	160	SAFUR200F500	2.7	5400	13.5

ACS800 type designation	Brake chopper power				Brake resistor(s)			
	5 / 60 s P_{br5} [kW]	10 / 60 s P_{br10} [kW]	30 / 60 s P_{br30} [kW]	Continuous P_{brcont} [kW]	Type	R [Ohm]	E_f [kJ]	P_{rcont} [kW]
ACS800-02-0140-3	135	135	100	80	SAFUR200F500	2.70	5400	13.5
ACS800-02-0170-3	165	150	100	80	SAFUR200F500	2.70	5400	13.5
ACS800-02-0210-3	165	150	100	80	SAFUR200F500	2.70	5400	13.5
ACS800-02/07-0260-3	240	240	240	173	2xSAFUR210F575	1.70	8400	21
ACS800-02/07-0320-3	300	300	300	143	2xSAFUR200F500	1.35	10800	27
ACS800-02/07-0400-3	375	375	273	130	4xSAFUR125F500	1.00	14400	36
ACS800-02/07-0440-3	473	355	237	120	4xSAFUR210F575	0.85	16800	42
ACS800-02/07-0490-3	500	355	237	120	4xSAFUR210F575	0.85	16800	42