

Charge Controllers



Model		TS-45	TS-60
Voltage	V	12,24,48	12,24,48
Load current	A	45	60
Peak current	A	300	300
Consumption	mA	20	20
Battery parameters		ajustáveis	ajustáveis
LVD		sim	sim
Equalization		sim	sim
Size	mm	260x127x71	260x127x71
Weight	kg	1,6	1,6
Part#		29033	29039



TS-60 with optional display

Optional:

	Model	Part#
Display	TS-M	29682
Remote Display w/ 9m cable	TS-RM	29683
Battery temperature sensor w/ 3m cable	RTS	29684

Phocus Charge Controllers

CA Series: Low cost, 12V
 CML Series: Low cost, 12/24V, 3 LEDs battery charge indicator
 CX Series: 12/24V, LCD battery charge indicator
 CIS Series: 12/24, programmable, infrared link, waterproof (IP68)



Series CA



Series CML



Series CX



Series CIS

Model		CA 6A	CA 14A	CML 10A	CML 15A	CML 20A	CX 10A	CX 20A	CX 40A	CIS 10A	CIS 20A	
Nominal voltage	V	12	12	12/24	12/24	12/24	12/24	12/24	12/24	12/24	12/24	
Load current	A	6	14	10	15	20	10	20	40	10	20	
Environment		IP22						IP68				
Size	mm	80x100x32						89x90x39		82x58x20		
Weight	g	180						150		150		
Part #		59234	59235	56877	59236	59237	59238	59239	50681	59240	59241	

DC-DC Converters

Input Voltage (V)	Output Voltage (V)	Output Current (A)*	Ripple (mV)	Consumption without load (mA)	Protection		AVEL Part #/ RF COM
					Auto-off Input (V)	Current Fold-back (A)	
12 (11-15)	13,7 ± 0,2	5	<60	<100	<9, >15	6,5	LC100/12/12 / 19811
12 (11-15)	13,7 ± 0,2	12	<50	<100	<9, >15	21	LC200/12/12 / 19812
12 (11-15)	24,0 ± 0,5	2,5	<60	<100	<9, >15	5,3	LC100/12/24 / 19813
12 (11-15)	24,0 ± 0,5	6	<90	<100	<9, >15	11	LC200/12/24 / 19814
12 (11-16)	48,0 ± 1	7,5	<600	<500	-	9	HC350/12/48 / 19815
24 (18-32)	13,7 ± 0,3	2	<100	<20	<18	10,5	LC80/24/12 / 19816
24 (18-33)	13,7 ± 0,2	6	<40	<100	<18, >34	10,5	LC100/24/12 / 19817
24 (18-32)	13,7 ± 0,2	12	<50	<100	<18, >34	21	LC200/24/12 / 19818
24 (18-32)	24,0 ± 0,5	3	<50	<100	<18, >34	5,3	LC100/24/24 / 19819
24 (18-32)	24,0 ± 0,5	6	<50	<85	<18, >34	11	LC200/24/24 / 19820
24 (16-50)	48,0 ± 0,5	2,5	<250	<100	-	3	HC100/24/48 / 19821
24 (20-30)	48,0 ± 1	7,5	<400	<200	-	9	HC350/24/48 / 19822
48 (29-59)	13,7 ± 0,3	2	<100	<20	<18	10,5	LC80/48/12 / 19823
48 (36-54)	13,7 ± 0,2	12	<50	<50	<36, >68	21	LC200/48/12 / 19824
48 (29-59)	24,0 ± 0,5	2,5	<100	<20	<18	5,3	LC80/48/24 / 19825
48 (36-54)	24,0 ± 0,5	6	<50	<50	<36, >68	11	LC200/48/24 / 19826



*Continuous system