



CHARGER SPECIFICATION

CHARGER SELECTION TABLE

FILON FUTUR M Characteristics

Charging voltages: 12V, 24V, 36V or 48V
 Max. rated output: 1,5 kW
 Mains voltages: 207-253V 50/60Hz - also 100-120V and 100-253V optional
 Protection category: IP 21 higher protection categories up to IP 54 on request
 Protection class: I

M	Cabinet	Width	Height	Depth
	HF 180	260	164	93
	HF 190	260	164	113

FILON FUTUR M Options

- **ConVision** The compact programming and analysis package for mobile service applications, consisting of service module and software
- **Protection category IP44-IP54** With special cabinets for IP44-IP54 protection
- **On-Board** Customizable, individual implementations (incl. drive-off protection)
- **Temperature compensation** Temperature-controlled charge, e.g. for cold store applications
- **EUW*** Electrolyte circulation for reducing charge time by up to 2.5 h
- **Pulse charge** Ionic electrolyte circulation for reducing charge time by up to 2 h and for very smooth and energy saving charging
- **Graphical display blue backlight*** Detailed indication of charging settings, charging progress, and warning and malfunction messages, remote display available upon request
- **Battery Management System* (BMS)** The central IEB monitoring system, ideal for battery charging stations
- **Battery Management Counter* (BMC)** External, two-digit counter (up to 99), starts counting automatically after charging is finished
- **Control column*** External indicator light to signal charging status, visible at a distance
- **Remote LED indicator** As LED control panel or DUO LED (up to 2 m)

*Only possible with cabinet HF 450

Output Voltage	Charger Type	Nominal Current [A]	Charging Curve/Charging Time/Battery Capacity K _h [Ah]					IUla (G1V)	IUla (P2V)	Current [A]	Cabinet	Weight [kg]	Type No.
			IUIa	IUIa	IUIa	IUIa	IUIa						
12 V	E 230 G 12 / 6 B50-FP	6	30 - 37	37 - 48	48 - 60	60 - 75	33 - 50	40 - 50	0,5	HF 180	3	76006	
	E 230 G 12 / 8 B50-FP	8	40 - 50	50 - 64	64 - 80	80 - 100	44 - 67	54 - 67	0,6	HF 180	3	76008	
	E 230 G 12 / 10 B50-FP	10	50 - 62	63 - 80	80 - 100	100 - 125	56 - 83	67 - 83	0,7	HF 180	3	76010	
	E 230 G 12 / 12 B50-FP	12	60 - 75	75 - 96	96 - 120	120 - 150	67 - 100	80 - 100	0,9	HF 180	3	76012	
	E 230 G 12 / 15 B50-FP	15	75 - 93	94 - 120	120 - 150	150 - 187	83 - 125	100 - 125	1,1	HF 180	3	76015	
	E 230 G 12 / 20 B50-FP	20	100 - 125	125 - 160	160 - 200	200 - 250	111 - 167	133 - 167	1,4	HF 180	3	76020	
	E 230 G 12 / 25(22) B50-FP	25(22)	125 - 156	157 - 200	200 - 250	250 - 312	139 - 208	167 - 208	1,7(1,6)	HF 180	3	76025	
	E 230 G 12 / 30 B50-FP	30	150 - 187	188 - 240	240 - 300	300 - 375	167 - 250	200 - 250	2,1	HF 180	3	76030	
	E 230 G 12 / 35 B50-FP	35	175 - 218	219 - 280	280 - 350	350 - 437	194 - 292	233 - 292	2,4	HF 180	3	76035	
	E 230 G 12 / 40 B50-FP	40	200 - 250	250 - 320	320 - 400	400 - 500	222 - 333	267 - 333	2,8	HF 180	3	76040	
	E 230 G 12 / 50(45) B50-FP	50(45)	250 - 312	313 - 400	400 - 500	500 - 625	278 - 417	333 - 417	3,5(3,1)	HF 180	3	76050	
	24 V	E 230 G 24 / 6 B50-FP	6	30 - 37	37 - 48	48 - 60	60 - 75	33 - 50	40 - 50	0,9	HF 180	3	76106
E 230 G 24 / 8 B50-FP		8	40 - 50	50 - 64	64 - 80	80 - 100	44 - 67	54 - 67	1,2	HF 180	3	76108	
E 230 G 24 / 10 B50-FP		10	50 - 62	63 - 80	80 - 100	100 - 125	56 - 83	67 - 83	1,4	HF 180	3	76110	
E 230 G 24 / 12 B50-FP		12	60 - 75	75 - 96	96 - 120	120 - 150	67 - 100	80 - 100	1,7	HF 180	3	76112	
E 230 G 24 / 15 B50-FP		15	75 - 93	94 - 120	120 - 150	150 - 187	83 - 125	100 - 125	2,1	HF 180	3	76115	
E 230 G 24 / 20 B50-FP		20	100 - 125	125 - 160	160 - 200	200 - 250	111 - 167	133 - 167	2,8	HF 180	3	76120	
E 230 G 24 / 25(22) B50-FP		25(22)	125 - 156	157 - 200	200 - 250	250 - 312	139 - 208	167 - 208	3,5(3,1)	HF 180	3	76125	
E 230 G 24 / 30 B50-FP		30	150 - 187	188 - 240	240 - 300	300 - 375	167 - 250	200 - 250	4,2	HF 180	3	76130	
E 230 G 24 / 35 B50-FP		35	175 - 218	219 - 280	280 - 350	350 - 437	194 - 292	233 - 292	4,9	HF 190	3,5	76135	
E 230 G 24 / 40 B50-FP		40	200 - 250	250 - 320	320 - 400	400 - 500	222 - 333	267 - 333	5,6	HF 190	3,5	76140	
E 230 G 24 / 50(45) B50-FP		50(45)	250 - 312	313 - 400	400 - 500	500 - 625	278 - 417	333 - 417	7,0(6,3)	HF 190	3,5	76150	
36 V		E 230 G 36 / 10 B50-FP	10	50 - 62	63 - 80	80 - 100	100 - 125	56 - 83	67 - 83	2,1	HF 180	3	76310
	E 230 G 36 / 12 B50-FP	12	60 - 75	75 - 96	96 - 120	120 - 150	67 - 100	80 - 100	2,6	HF 180	3	76312	
	E 230 G 36 / 15 B50-FP	15	75 - 93	94 - 120	120 - 150	150 - 187	83 - 125	100 - 125	3,2	HF 180	3	76315	
	E 230 G 36 / 20 B50-FP	20	100 - 125	125 - 160	160 - 200	200 - 250	111 - 167	133 - 167	4,2	HF 180	3	76320	
	E 230 G 36 / 25(22) B50-FP	25(22)	125 - 156	157 - 200	200 - 250	250 - 312	139 - 208	167 - 208	5,2(4,6)	HF 190	3,5	76325	
	E 230 G 36 / 30 B50-FP	30	150 - 187	188 - 240	240 - 300	300 - 375	167 - 250	200 - 250	6,3	HF 190	3,5	76330	
	E 230 G 36 / 35 B50-FP	35	175 - 218	219 - 280	280 - 350	350 - 437	194 - 292	233 - 292	7,3	HF 190	3,5	76335	
	E 230 G 36 / 40 B50-FP	40	200 - 250	250 - 320	320 - 400	400 - 500	222 - 333	267 - 333	8,3	HF 190	3,5	76340	
48 V	E 230 G 48 / 10 B50-FP	10	50 - 62	63 - 80	80 - 100	100 - 125	56 - 83	67 - 83	2,7	HF 180	3	76510	
	E 230 G 48 / 12 B50-FP	12	60 - 75	75 - 96	96 - 120	120 - 150	67 - 100	80 - 100	3,5	HF 180	3	76512	
	E 230 G 48 / 15 B50-FP	15	75 - 93	94 - 120	120 - 150	150 - 187	83 - 125	100 - 125	4,2	HF 180	3	76515	
	E 230 G 48 / 20 B50-FP	20	100 - 125	125 - 160	160 - 200	200 - 250	111 - 167	133 - 167	5,6	HF 190	3,5	76520	
	E 230 G 48 / 25(22) B50-FP	25(22)	125 - 156	157 - 200	200 - 250	250 - 312	139 - 208	167 - 208	7,0(6,3)	HF 190	3,5	76525	
	E 230 G 48 / 30 B50-FP	30	150 - 187	188 - 240	240 - 300	300 - 375	167 - 250	200 - 250	8,3	HF 190	3,5	76530	

¹PzS, PzB, GIS, CSM, etc. ²pulse/ionic mixing