

FIAMM

Industrial Batteries

FG series



FG21803

12 Volt 18 Ah

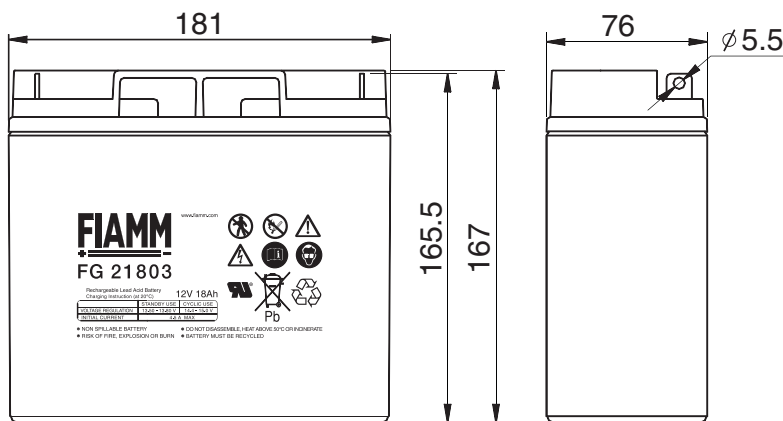
FG21803 is a general purpose application battery. Within the FG range FIAMM offer 6V and 12V monoblocs at various amp hour capacities enable the right battery selection for each requirement. FIAMM is a Manufacturer of VRLA batteries and is supported by a dedicated sales network with market knowledge and experience of small sealed lead acid battery applications.

Features

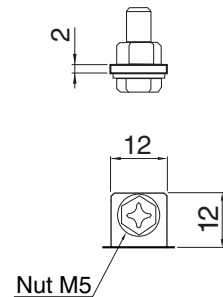
Nominal Voltage	12 Volt
Nominal Capacity	18 Ah 20 hours rate to 1.75 Vpc at 25 °C
Float charging voltage	13.50 - 13.80 V/bloc at 25 °C
Boost charge voltage	14.40 - 15.00 V/bloc at 25 °C
Float voltage compensation	-18mV/°C
Maximum charging current	4.50 A
Case	ABS with HB flammability rate (according UL 94)
Internal resistance	9.8 mΩ in full charged condition
Weight	5.90 kg
Dimensions	L x W x H (TH): 181 x 76 x 167 (167))
Operative temperature range	-20 °C to 50 °C

Shelf life procedures

As batteries lose part of their capacity, during storage, due to self discharge. Fiamm recommends FG range of batteries can be stored for 6 months at an ambient temperature of 20 and 25 °C (see attached graph on reverse). Longer storage requires a recharge. This should be carried out in line with Fiamm recommended method; 2.4 V/cell for no longer than 24 hours at 20 °C



Flag Ø 5.5 mm
(Bolt and Nut M5)



SSLA Products

FG21803 12 Volt 18 Ah

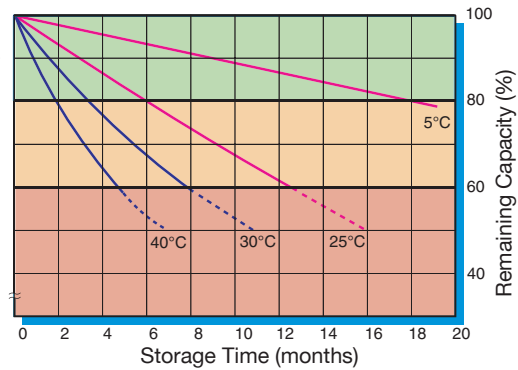


Capacity loss during storage at various temperatures

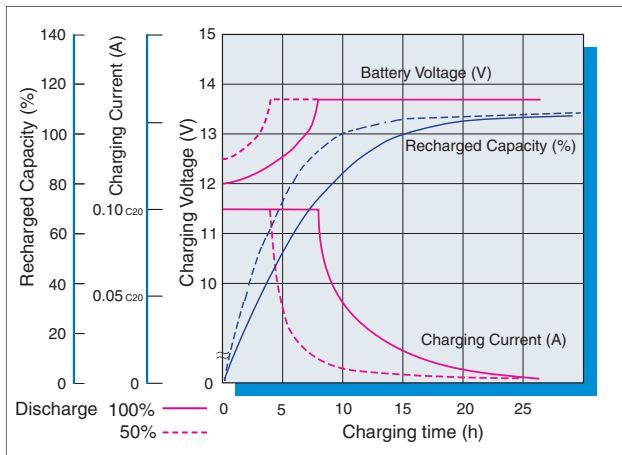
The battery can be used without refreshing charge

Refreshing charge at 2.4 Vpc for 24 hours (at 20-25°C) must be applied as soon as possible.

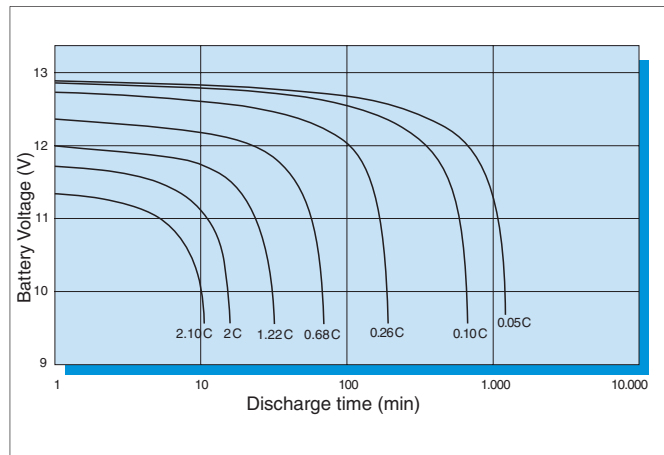
Refreshing charge of 2.4 Vpc may be insufficient to recover the battery capacity. It is important to avoid this area



Battery Voltage and Charge Time for Standby Use (at 25°C)



Discharge curves at different current / final voltage (at 25°C)



Costant Current discharge table (Amperes)

End voltage	5 min	10 min	15 min	20 min	30 min	45 min	1 hour	2 hrs	3 hrs	5 hrs	10 hrs	20 hrs
9.60 V	60.2	40.2	30.2	24.5	18.1	13.5	10.9	6.35	4.66	3.11	1.72	0.94
9.90 V	58.3	39.3	29.7	24.1	17.9	13.3	10.8	6.28	4.61	3.06	1.70	0.93
10.02 V	57.3	38.7	29.3	23.9	17.8	13.2	10.7	6.22	4.58	3.04	1.69	0.92
10.20 V	55.8	38.1	29.0	23.7	17.7	13.2	10.7	6.17	4.55	3.02	1.67	0.92
10.50 V	53.5	37.0	28.3	23.2	17.4	13.0	10.5	6.06	4.46	2.96	1.64	0.90
10.80 V	50.9	36.0	27.7	22.7	17.1	12.8	10.4	5.96	4.40	2.91	1.61	0.89

Costant Power discharge table (Watts per bloc)

End voltage	5 min	10 min	15 min	20 min	30 min	45 min	1 hour	2 hrs	3 hrs	5 hrs	10 hrs	20 hrs
9.60 V	602	413	317	261	198	150	123	72.4	53.5	35.9	20.0	11.0
9.90 V	585	406	313	258	196	148	122	71.8	53.1	35.5	19.8	10.9
10.02 V	576	401	310	257	195	148	121	71.3	52.9	35.4	19.7	10.8
10.20 V	562	395	307	255	194	147	121	70.7	52.7	35.2	19.6	10.8
10.50 V	540	385	301	251	192	146	120	69.9	51.9	34.7	19.4	10.7
10.80 V	516	375	296	247	190	144	118	69.0	51.4	34.2	19.0	10.7