



## Battery box FG21202 24V – 12Ah C20

### Protection mode:

Type of protection: II 2G EEx e II T6  
 Class of temperature: T6  
 Ambient Temp : -20/+50°C  
 Zones : 1-2

### Description:

**FG21202 24V 12Ah C20** 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 Sealed Power 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.

1x Battery box including 2 x FIAMM FG21202 cells (approx. dimensions 230x170x h180mm). The battery box is manufactured in stainless steel AISI 316L with bolted on top plate, complete with 2 x stainless steel cable glands.



(cable above unsupplied)



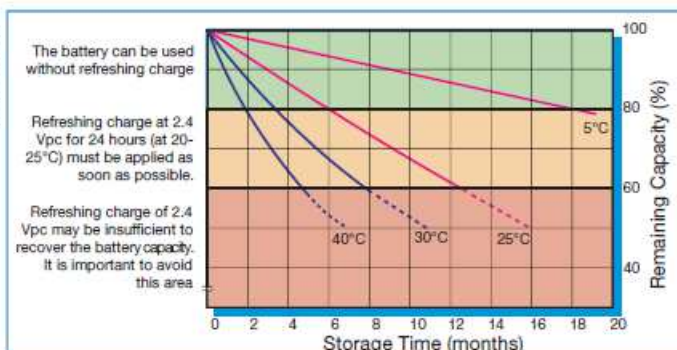
### Technical specs:

<b>Nominal Voltage</b>	12 Volt
<b>Nominal Capacity</b>	12ah 20 hours rate to 1,75 Vpc at 25°C
<b>Float charging voltage</b>	13.50 - 13.80 V/bloc at 25 °C
<b>Boost charge voltage</b>	14.40 - 15.00 V/bloc at 25 °C
<b>Float voltage compensation</b>	-18mV/°C
<b>Maximum charging current</b>	3 A
<b>Case</b>	ABS with HB fiammability rate (according UL 94)
<b>Internal resistance</b>	14.8 mΩ in full charged condition
<b>Operative temperature range</b>	-20 °C to 50 °C
<b>Shelf life procedures</b>	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

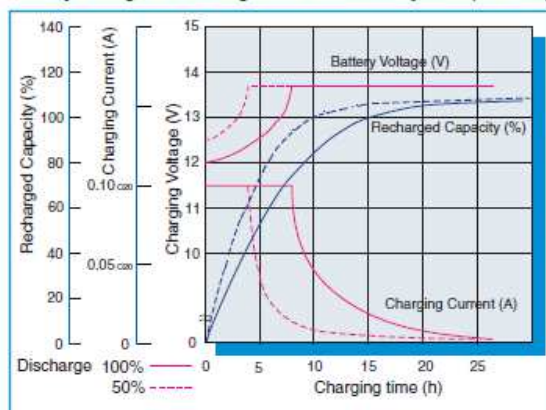


## Battery box FG21202 24V – 12Ah C20

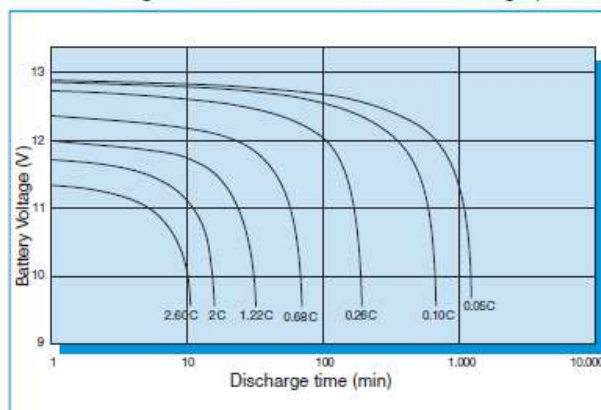
Capacity loss during storage at various temperatures



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



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



Constant Power discharge table (Watts per bloc) at 25 °C

end voltage	5 min	10 min	15 min	20 min	30 min	45 min	1 h	2 h	3 h	5 h	10 h	20 h
9.60 V	391	284	221	182	138	104	84.3	49.0	36.0	24.1	13.5	7.31
9.90 V	382	279	218	179	137	103	84.0	48.6	35.8	24.0	13.4	7.29
10.02 V	377	275	217	178	136	102	83.4	48.4	35.6	23.9	13.3	7.29
10.20 V	373	273	215	177	135	102	82.9	48.3	35.5	23.9	13.3	7.28
10.50 V	359	266	213	176	134	101	81.8	47.8	35.2	23.8	13.2	7.26
10.80 V	330	246	196	165	127	96.5	78.6	46.4	34.3	23.3	13.0	7.16

Constant Current discharge table (Amperes) at 25 °C

end voltage	5 min	10 min	15 min	20 min	30 min	45 min	1 h	2 h	3 h	5 h	10 h	20 h
9.60 V	39.2	27.7	21.1	17.0	12.7	9.37	7.50	4.30	3.14	2.09	1.16	0.63
9.90 V	38.1	27.0	20.7	16.7	12.5	9.23	7.44	4.25	3.10	2.07	1.15	0.62
10.02 V	37.1	26.4	20.4	16.6	12.3	9.12	7.34	4.21	3.07	2.05	1.14	0.62
10.20 V	35.7	25.7	20.1	16.4	12.2	9.02	7.24	4.17	3.04	2.04	1.13	0.62
10.50 V	34.0	24.5	19.1	15.7	11.8	8.79	7.07	4.08	2.98	2.00	1.11	0.60
10.80 V	31.5	23.0	17.8	14.8	11.2	8.39	6.78	3.96	2.91	1.97	1.09	0.60