

FIAMM



The FIAMM'S OPzS monoblocs are vented lead-acid stationary batteries. Their positive plate tubular design offer very high cyclability, which make them optimal solution for applications with high charge and discharge loads, such as switchgears, electrical utilities, emergency lighting, alarms, control and monitoring systems, signalling, railways, airports etc.. The high cycling capacity is achieved through the protective action that the woven gauntlets are performing on the positive active material. The lead selenium alloy reduces the frequency of watering intervals. Case material and design are the optimal combination for the max chemical resistance and mechanical strength. FIAMM has a program of continuous improvement investing in manufacturing processes, equipment and technology. FIAMM's Standby Battery manufacture is in compliance with ISO 9001 and ISO 14001 quality assurance standards. Our continuous investment in battery technology is reflected by means of premium products that are of the highest quality and reliability. FIAMM OPzS block tubular vented lead acid batteries are the ideal economic energy source for many different standby applications.

OPzS

ENDURLITE range

TECHNICAL FEATURES

- ▶ **Positive tubular plates:** with lead selenium alloy to reduce frequency of watering intervals. The tubular design prevents the loss of active material during operation, this result in a longer operating life and high performance.
- ▶ **Negative plates:** designed to have service life consistent with the positive plates. The alloy and curing process are designed so that porosity of active material is maintained during operation.
- ▶ **Electrolyte:** high purity sulphuric acid solution with a specific gravity of 1.24 (± 0.01) at 77°F, lower specific gravity acid available upon request.
- ▶ **Separators:** made of high quality microporous material, with low electrical resistance to achieve the lowest self discharge and highest efficiency.
- ▶ **Containers:** injection moulded from high quality transparent SAN (Styrene acrylonitrile) for easy cell status inspection.
- ▶ **Lids:** made of opaque SAN.
- ▶ **Vent Caps:** cells incorporate flame retardant ceramic plugs that prevent any electrolyte from escaping with gases. The safety vent is designed to prevent any errant spark or flame from entering the battery.
- ▶ **Connectors:** flexible, fully insulated cable connectors, bolted to the terminal with an insulated screw, having a probe hole on the top for electric measurement.
- ▶ **Terminals:** female threaded terminal ensure perfect contact and a low resistance with the flexible cable connectors.

APPLICATIONS

- ▶ Electrical Utilities/Switchgear
- ▶ Telecom
- ▶ Control and monitoring (railways, airports)
- ▶ Signalling
- ▶ Emergency lighting
- ▶ Solar



PRODUCT FEATURES

- ▶ Safe
- ▶ Multicell Design
- ▶ Floor Space Savings
- ▶ Reliable
- ▶ Design Life: 15 years on float in temperature controlled environments
- ▶ Low Maintenance
- ▶ Great for cycling
- ▶ Capacity range from 25 Ah to 300 Ah



Standby Batteries

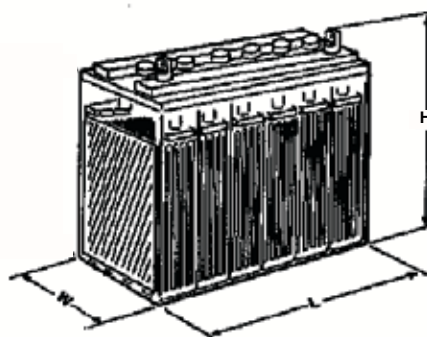
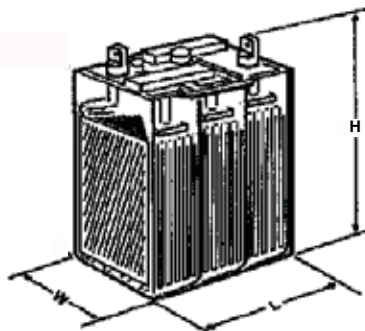
OPzS

ENDURLITE range



6V

12V



(Drawing for dimensions reference only, not representative of the real battery)

ELECTRICAL CHARACTERISTICS

- ▶ Nominal Voltage : 6 and 12 Volt
- ▶ Float Voltage at 77°F :2.23 Vpc
- ▶ Equalizing Charge :2.4 Vpc
- ▶ Self Discharge : <2% per month at 77°F
- ▶ Electrolyte :1.24 ± 0.01 at 77°F

FIAMM OPzS Multicell Range

BATTERY TYPE	Nom. Capacity Ah 8 hrs to 1.75 Vpc at 77°F	Nom. Voltage (V)	DIMENSIONS in (mm)			Weight (lbs)	Electrolyte Volume (Gals)
			L	W	H		
12V 1 OPzS 25	25	12	10.67 (271)	6.5 (165)	11.22 (285)	52.9	1.37
12V 2 OPzS 50	50	12	10.67 (271)	6.5 (165)	11.22 (285)	66.6	1.27
12V 2 OPzS 100	100	12	10.71 (272)	8.1 (205)	14.84 (377)	112.0	2.64
12V 3 OPzS 150	150	12	14.96 (380)	8.1 (205)	14.84 (377)	155.0	3.7
6V 4 OPzS 200	200	6	10.71 (272)	8.1 (205)	14.84 (377)	105.8	2.64
6V 5 OPzS 250	250	6	14.96 (380)	8.1 (205)	14.84 (377)	138.9	3.83
6V 6 OPzS 300	300	6	14.96 (380)	8.1 (205)	14.84 (377)	149.9	3.70



www.fiammamerica.com

Standby Batteries



OPzS

ENDURLITE range

Constant current discharge rates Amperes to 1.75 Vpc at 77°F (25°C) Sg 1.24

BATTERY TYPE	DISCHARGE TIME (minutes)											
	1	10	15	30	60	180	240	300	360	480	600	1440
12V 1 OPzS 25	43.50	27.88	24.14	18.00	12.38	6.39	5.33	4.53	3.94	3.12	2.58	1.15
12V 2 OPzS 50	84.00	52.90	48.00	35.70	24.80	12.80	10.50	9.00	7.90	6.25	5.30	2.40
12V 2 OPzS 100	121.40	100.80	91.80	72.00	50.70	25.80	21.12	17.90	15.66	12.50	10.51	4.80
12V 3 OPzS 150	180.00	147.80	135.10	107.40	78.20	39.14	32.00	27.10	23.69	18.95	15.76	7.20
6V 4 OPzS 200	208.99	191.58	181.69	149.56	105.78	52.31	42.71	36.45	31.76	25.45	21.21	10.10
6V 5 OPzS 250	249.90	231.95	221.30	184.20	133.00	65.30	52.70	44.90	39.40	31.60	26.63	12.69
6V 6 OPzS 300	299.60	280.00	263.70	220.00	157.60	77.70	63.50	53.65	47.10	37.75	31.65	15.40

Constant current discharge rates Amperes to 1.80 Vpc at 77°F (25°C) Sg 1.24

BATTERY TYPE	DISCHARGE TIME (minutes)											
	1	10	15	30	60	180	240	300	360	480	600	1440
12V 1 OPzS 25	36.07	25.14	22.24	16.73	11.68	6.00	4.95	4.30	3.74	2.99	2.49	1.13
12V 2 OPzS 50	76.20	49.50	44.80	33.70	23.60	12.40	10.30	8.76	7.60	6.00	5.00	2.26
12V 2 OPzS 100	110.00	91.20	82.80	65.60	47.70	25.10	20.50	17.40	15.30	12.30	10.30	4.75
12V 3 OPzS 150	145.00	129.50	121.54	98.88	72.50	37.60	30.90	26.20	22.87	18.54	15.45	7.10
6V 4 OPzS 200	184.50	169.00	159.30	132.30	95.30	49.70	41.00	34.70	30.40	24.40	20.40	9.80
6V 5 OPzS 250	221.24	205.94	195.23	167.48	125.05	63.20	51.41	43.40	37.90	30.50	25.77	12.40
6V 6 OPzS 300	260.20	233.00	220.80	187.10	139.85	72.82	60.20	51.70	45.12	36.23	30.50	14.94



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FIAMM Technologies LLC reserves the right to change or revise without notice any information or detail given in this publication



Standby Batteries



Secure Power Solutions

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