# Marathon L-XL / L2V470

## INDUSTRIAL BATTERIES / NETWORK POWER

Designed for durability in telecommunications and electric utility applications, the Marathon L/XL series provides high performance and reliability in medium and long duration discharge applications.

**Part Number: NALL020470HM0FA**


## APPLICATIONS

## SPECIFICATIONS

- Maintenance-free (no topping up) during the whole service life
- High-Compression Absorbent Glass Mat (AGM) technology
- Design life: »> 12 years– Very Long Life« according to EUROBAT 2015 Classification
- Available as standard or flame retardant version (UL 94-V0)
- Grid plates with superior lead calcium alloy for excellent corrosion resistance
- Very low gassing due to internal gas recombination (99 % efficiency)
- Low self discharge rate, enabling extended storage capability
- Designed in accordance with IEC 60896-21/-22
- Approval: UL (Underwriters Laboratories)
- Trouble-free transportation of operational blocks and cells. no restriction for most rail, road, sea and air transportation (IATA, DGR clause A67)
- Manufactured in Europe in our ISO 9001 certified production plants

Design life > 12 years – Very Long Life

Block battery/ single cell

Grid plate

Recyclable


Valve regulated lead-acid batteries

Maintenance free (no topping up)

Special high current performance

**RECYCLE WITH EXIDE.**

Exide Technologies takes pride in its commitment to a better environment. An integrated approach to manufacturing, distributing and recycling of lead-acid batteries has been developed to ensure a safe and responsible life cycle for all of its products.

For more information please contact your local dealer

## TECHNICAL CHARACTERISTICS AND DATA

| | |
|---|---|
| **Nominal voltage** | 2 V |
| **Float charge** | 2,27 V/C @ 20 °C |
| **Capacity** | CP 10min 1,6V/C 20°C 1885W/Bloc<br>CC 10h 1,8V/C 20°C 470Ah |
| **Short circuit current** | 9445 A (IEC60896-21/22) |
| **Internal resistance** | 0,22 mΩ (IEC60896-21/22) |

| | |
|---|---|
| **Terminal** | 2 x F M8 |
| **Terminal Torque** | 20 Nm |
| **Container** | UL 94-HB (Polypropylene) |
| **Temperature range** | -40°C to 55°C |
| **Dimensions (l x b/w x h)** | 209 x 270 x 283 mm |
| **Weight** | 32,6 kg |
| **Origin** | Castanheira, Portugal |

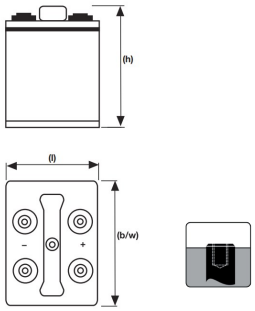
## CONSTANT POWER DISCHARGE

| W @ 20 °C | 3 min | 5 min | 10 min | 15 min | 20 min | 30 min | 45 min | 1 h | 2 h | 3 h | 5 h | 8 h | 10 h |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1,900 V/C | 1230 | 1155 | 1010 | 880 | 795 | 652 | 520 | 437 | 281 | 215 | 146 | 99,2 | 82,3 |
| 1,850 V/C | 1595 | 1480 | 1255 | 1080 | 955 | 770 | 599 | 496 | 308 | 234 | 158 | 109 | 89,2 |
| 1,800 V/C | 1940 | 1780 | 1470 | 1240 | 1080 | 855 | 657 | 540 | 331 | 247 | 165 | 111 | 92,4 |
| 1,750 V/C | 2245 | 2035 | 1645 | 1375 | 1185 | 928 | 705 | 573 | 341 | 251 | 166 | 113 | 93,2 |
| 1,700 V/C | 2480 | 2220 | 1765 | 1455 | 1245 | 962 | 724 | 586 | 345 | 254 | 168 | 113 | 93,9 |
| 1,650 V/C | 2655 | 2365 | 1835 | 1495 | 1270 | 982 | 737 | 595 | 348 | 255 | 169 | 114 | 94,3 |
| 1,600 V/C | 2760 | 2450 | 1885 | 1550 | 1305 | 1000 | 748 | 602 | 350 | 256 | 169 | 114 | 94,5 |

## CONSTANT CURRENT DISCHARGE

| A @ 20 °C | 3 min | 5 min | 10 min | 15 min | 20 min | 30 min | 45 min | 1 h | 2 h | 3 h | 5 h | 8 h | 10 h | 20 h |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1,950 V/C | 460 | 433 | 390 | 348 | 317 | 272 | 217 | 183 | 118 | 88,4 | 60,2 | 41,5 | 34,6 | 18,5 |
| 1,900 V/C | 690 | 644 | 550 | 482 | 428 | 352 | 274 | 228 | 145 | 109 | 72,6 | 49,4 | 41 | 21,8 |
| 1,850 V/C | 895 | 820 | 688 | 595 | 520 | 419 | 321 | 264 | 162 | 121 | 80,5 | 54,4 | 45 | 24,3 |
| 1,800 V/C | 1085 | 980 | 805 | 688 | 590 | 466 | 356 | 291 | 174 | 128 | 84,3 | 56,7 | 47 | 25,3 |
| 1,750 V/C | 1290 | 1150 | 905 | 765 | 645 | 503 | 377 | 305 | 179 | 130 | 85,7 | 57,3 | 47,4 | 25,7 |
| 1,700 V/C | 1455 | 1290 | 995 | 818 | 684 | 528 | 391 | 314 | 182 | 133 | 86,7 | 57,8 | 47,6 | 25,9 |
| 1,650 V/C | 1630 | 1420 | 1065 | 860 | 720 | 540 | 399 | 320 | 185 | 135 | 87,2 | 58,1 | 47,9 | 26 |
| 1,600 V/C | 1740 | 1505 | 1120 | 895 | 743 | 554 | 405 | 324 | 187 | 136 | 87,6 | 58,3 | 48,1 | 26,1 |

## Technical drawing




## Float Voltage vs Temperature