

D92024

Rechargeable Smart Battery Pack Li-Ion 14.40V / 6.60Ah / 95.0Wh



Features

- Worldwide approvals and certification of safety standards
- No development costs, fast time-to-market
- Smart batteries with numerous features according to the SMBus specification
- Integrated LED State of Charge (SoC) indicator
- State-of-the-art lithium-ion cells with the market's highest energy density
- High discharge performance
- JEITA charging profile optimization
- Numerous and redundant safety features, e.g.:
 - CUV (Cell Under Voltage): protection against deep discharge
 - COV (Cell Over Voltage): protection against over charge
 - OTC (Over Temperature in Charge): protection against overheating while charging
 - OTD (Over Temperature in Discharge): protection against overheating during discharging
 - Life-End-Control: protection against rapid cell ageing
- Increased ESD protection up to 8kV
- SHA-1 cryptosystem to prevent plagiarism

Applications

Suitable for use with tablet PC's, notebooks, industrial and medical devices, etc





Specification

| General | |
|----------------------------------|--|
| Delivery status battery capacity | 30% |
| Compliance information | CE / UL2054 / FCC / PSE / KC / Gost / EAC / CQC / RCM / IEC62133 / UN38.3 / RoHS / REACH / BIS / TISI / BSMI |
| Operating temperature | 0°C to 45°C (charge) -20°C to 60°C (discharge) |
| Storage temperature | -20°C to 50°C max. -20°C to 25°C recommended |

| Electrical Parameters | |
|-----------------------|---|
| Nominal voltage | 14.40V |
| Nominal capacity | 6.60Ah |
| Initial impedance | <150mΩ @ 1kHz at 25°C |
| Max. charge current | 4.53A |
| Max. charge voltage | 16.80V |
| Max. discharge | 10.00A |
| Life expectancy | 300 cycles with ≥ 63% of initial capacity |
| | CC/CV Charge: 4.53A / 16.80V Discharge: 6.45A down to 12.00V @25°C |

| Battery Dimensions | |
|--------------------|---------------------|
| Length | 167.2mm +0.50/-0.50 |
| Width | 107.2mm +0.40/-0.30 |
| Thickness | 21.5mm +0.30/-0.50 |
| Weight | 600g |
| Contacts | +, D, C, T, - |

| Safety Parameters PCM | |
|--|--------|
| Overcharge detection voltage / cell | 4.30V |
| Overdischarge detection voltage / cell | 2.50V |
| Overcharge detection current | 6.45A |
| Overdischarge detection current | 11.00A |



Recommended Accessories

| Туре | Product | P/N | Application |
|----------------------------|--|--------------------------------------|---|
| Battery Charger | SMB-UBC SMB-UBC-M | D90481 D90551 | 65W standard battery charger for optimized charging process. With external power supply for worldwide use. |
| Battery Charger | SMB-DBC | D90512 | Dual bay standard battery charger for optimized charging process. With external power supply for worldwide use. |
| Power Management Module | PMM240 | D90513 | Power management module for smart battery charging with automatic power source selection. Fits to all D9C20xx standard smart batteries. |
| Power Supply AC/DC | PS65 | D90540 | External power supply for power management module PMM240 or for mobile devices. Included in SMB-UBC/MBC. |
| 3-pol AC-Cable | US-Version EU-Version UK-Version AU-Version | 210950 210951 211333 211334 | Country specific power cable for PS65. |
| Car Adapter DC/DC | SMB-CAR | D90554 | 90W car adapter with USB charging port. Power suppling in cars and trucks for SMB-UBC, SMB-MBC, PMM240 or mobile devices. |

TECHNICAL DATA SHEET





| Туре | Product | P/N | Application |
|-------------------|-----------------------------------|------------------|---|
| Design-In Tool | SMBus-Reader | D90534 | Simple read out of SMBus batteries data. No external power supply required. 5way blade connector and RS232 interface. |
| | | | |
| Battery Connector | RRC-MC20-90-10 RRC-MC20-180-10 | D90536 D90537 | Mating connector for standard smart batteries. Suitable for D920xx batteries. Available for 90° or 180° PCB mounting. |

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