

## AGM Thin Plate Pure Lead - High Rate



The NSB UPS Battery® delivers superior performance at high discharge rates down to <15 mins.

- Performance excels at high rates of discharge and recharge
- Pure lead electrochemistry greatly increases temp and corrosion resistance while reducing component aging
- Thin plates deliver large surface area high power density and low resistance
- Design life 15+ years at 20°C (68°F)
- EUROBAT design life definition: Long Life (12+ years)
- High energy density
- Operating temperature range -40°C to +65°C (-40°F to 149°F)
- State-of-the-art automated manufacturing ensures consistency and reliability
- Advanced 3 stage terminal design to ensure leak-free operation - brass terminals provide maximum performance
- High modulus Polyphenylene Oxide (PPO) plastic materials designed to withstand extended elevated operating temperatures and maintain high battery compression essential for reliable operation
- Non-halogenated thermally sealed plastic casing
- Approved as non-hazardous cargo for ground sea and air transport DOT 49CFR173.159(d), (i) and (ii)

# NSB 12-540

## Nominal Technical Specifications

### Electrical

Terminal torque	8.0 Nm (71 in-lbs)	4C (15min) power to 1.67 VPC	540 Watts/Cell
Float voltage	2.28 VPC	Shelf life	2 years
Conductance	1952 S	Impedance (1Khz)	2.7 mΩ @ 25°C (77°F)
Short circuit current	3600 A	Operation temperature range	-40°C to +65°C
Nominal voltage	12 V	Silver equivalent	NSB 12-540

### Dimensions

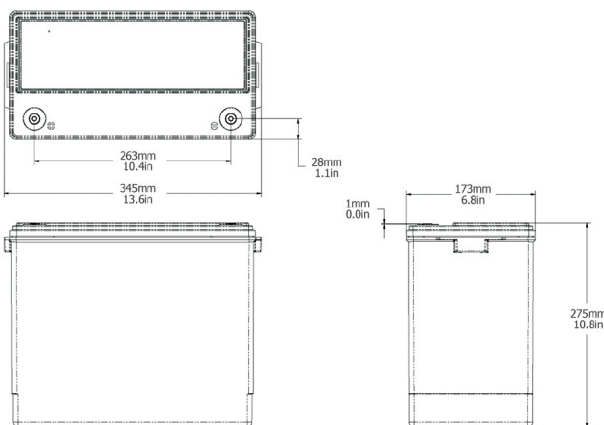
Height	275 mm	Width	173 mm
Length	345 mm	Weight	44 kg

### Constant Power Discharge Ratings (WPC @ 25°C/77°F)

Duration (minutes) (watts/cell @ 25°C/77°F)

End of discharge (Volts)	2 min	5 min	10 min	15 min	20 min	30 min	45 min	60 min	120 min
1.75	1083	858	630	502	420	319	236	189	106
1.70	1197	925	667	527	438	329	242	193	107
1.67	1259	961	687	540	447	335	245	194	107
1.65	1298	984	699	548	452	338	247	195	108
1.60	1381	1032	775	564	464	345	251	198	108

### Technical Drawing



All NorthStar batteries are compliant with: Telcordia SR4228, IEC 60896; Bellcore GR-63-Core, Issue 1; British, German, and Russian telecom standards; UL approved and UN2800 certified. NorthStar is registered to ISO 9001 and ISO 14001.

NorthStar Americas PARTIAL  
NorthStar Battery Company LLC  
4000 Continental Way  
Springfield, MO, 65803,  
United States of America  
info@northstarbattery.com  
Tel: +1 417 575 8200  
Fax: +1 417 575 8250

NorthStar Europe  
SiteTel Sweden AB  
Haukadalsgatan 8A  
SE-164 40 Kista,  
Stockholm, Sweden  
europe@northstarbattery.com  
Tel: +46 8 410 102 00  
Fax: +46 8 638 06 00

NorthStar Middle East, Africa  
NorthStar Battery DMCC  
Office 702, Saba 1 Tower  
Jumeirah Lake Towers, Dubai  
United Arab Emirates  
mea@northstarbattery.com  
Tel: +971 4 423 8060  
Fax: +971 4 423 8061

NorthStar Asia-Pacific  
NS Asia Pacific Sdn. Bhd.  
B2-3A-13A, Solaris Dutamas  
No. 1, Jalan Dutamas 1, 50480  
Kuala Lumpur, Malaysia  
asia@northstarsitetel.com  
Tel: +60 3 6419 0711