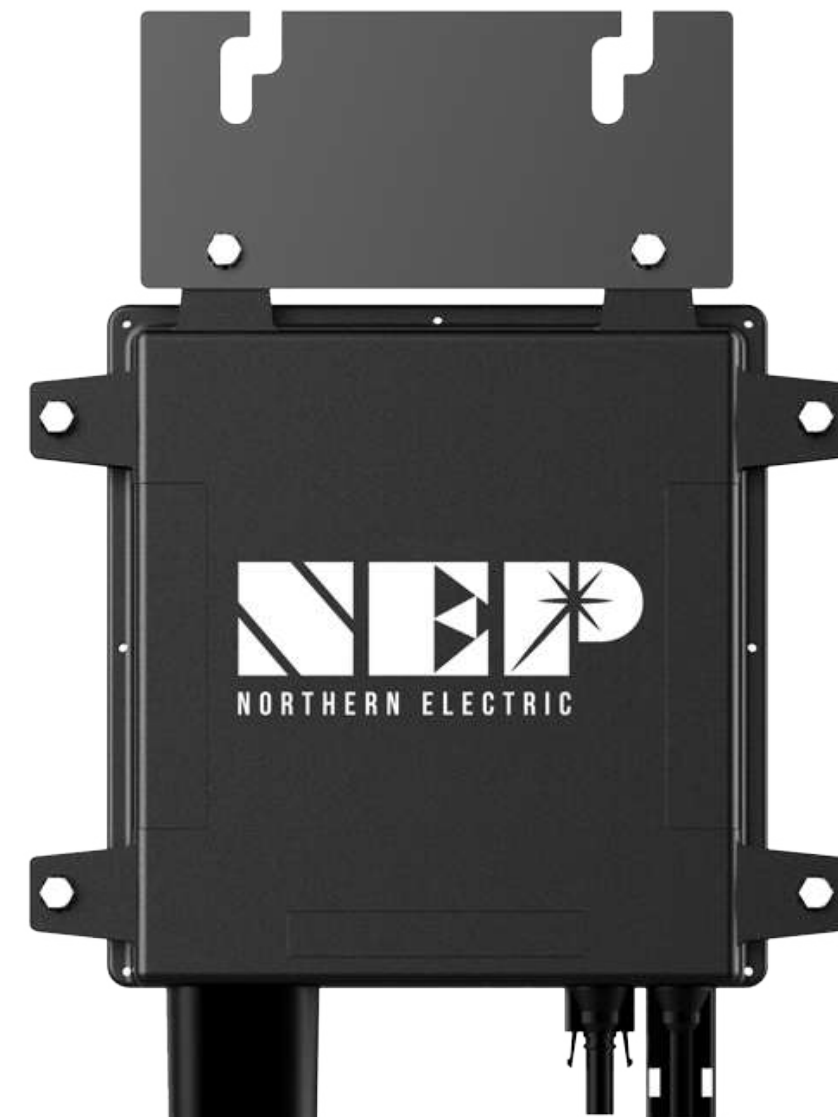
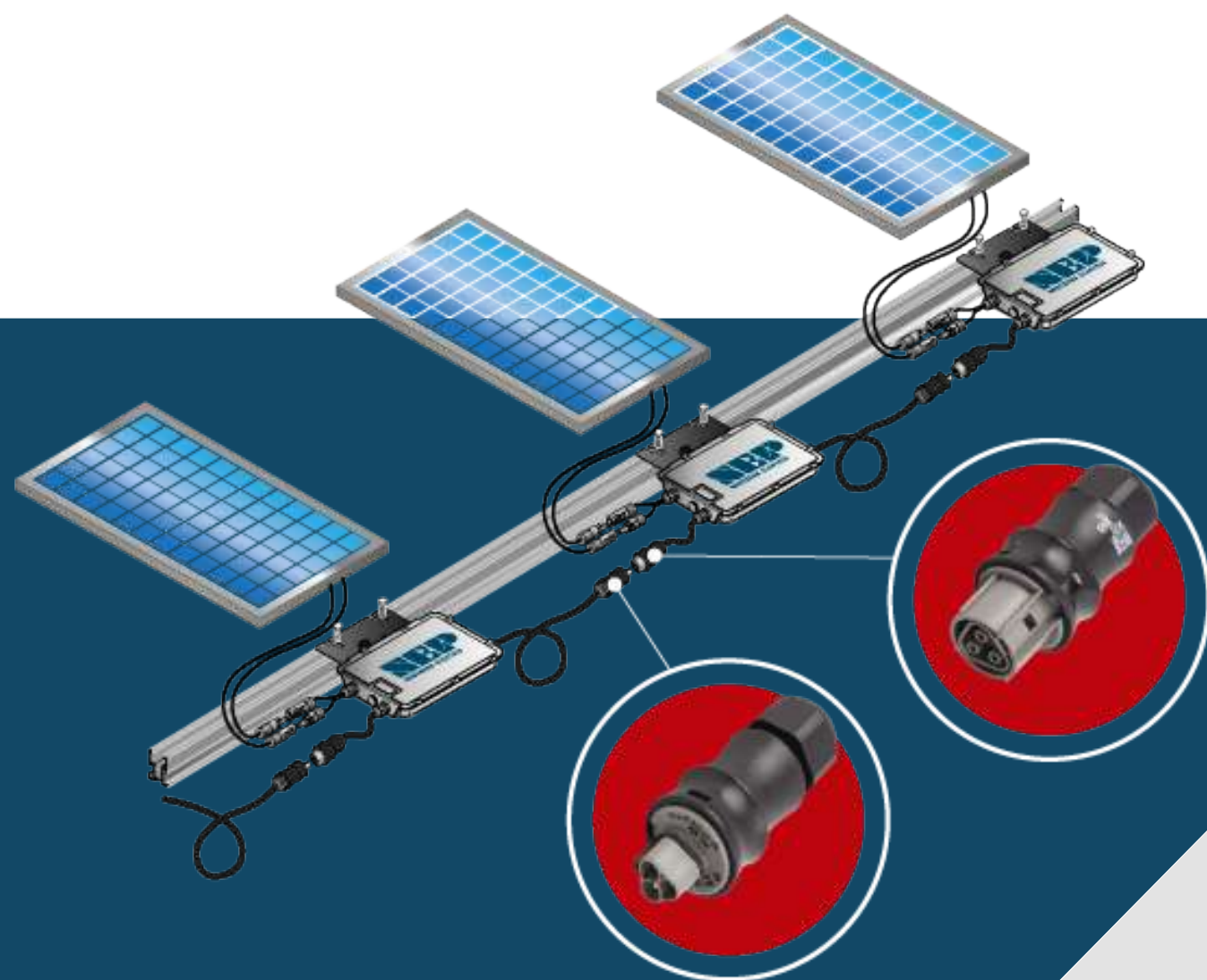
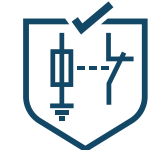


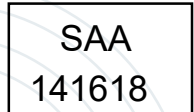
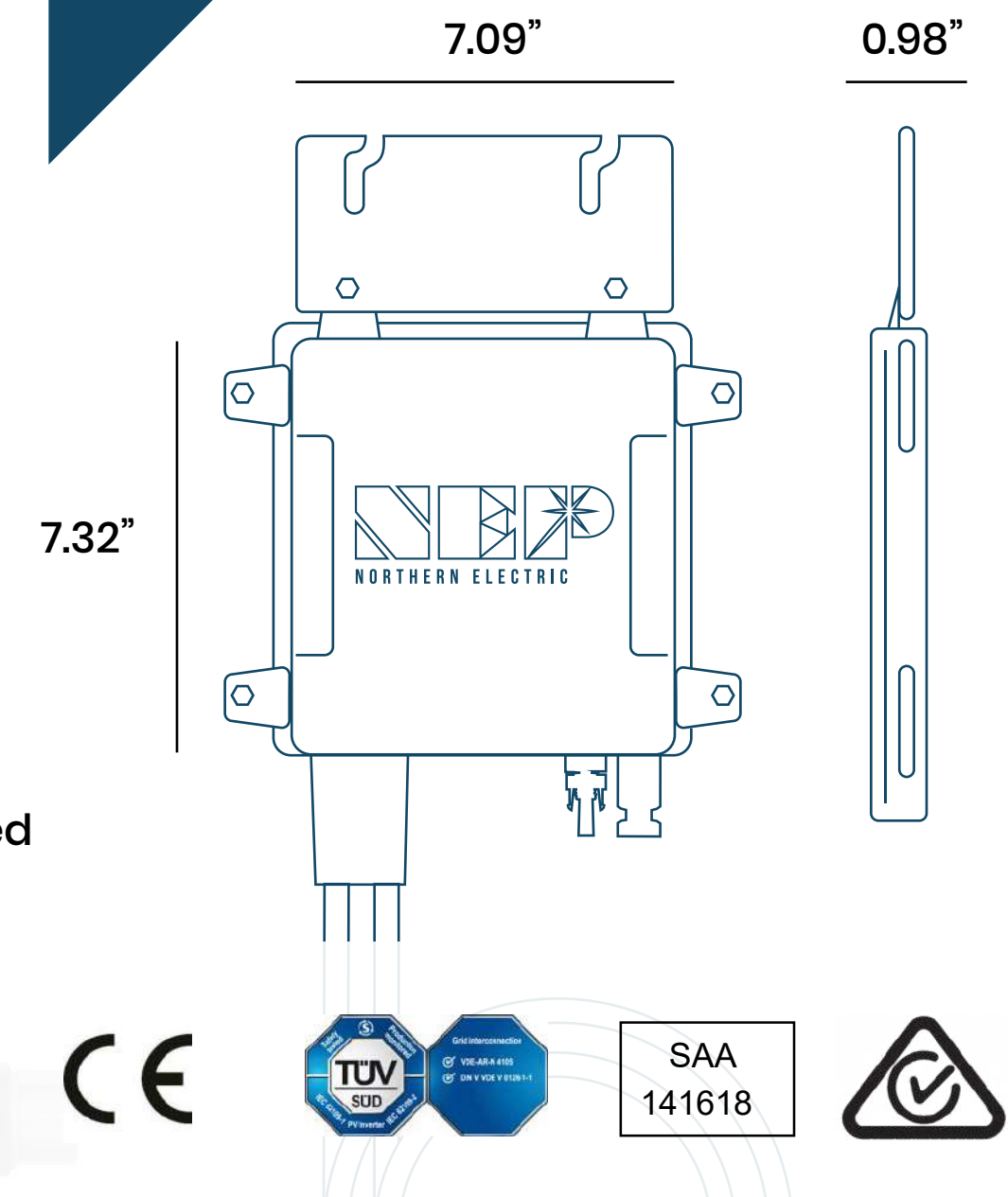
# BDM 300 MICROINVERTER

## Features

- Qualified equipment that meets Hawaiian Electric TrOV-2 and full frequency and voltage ride-through
  - Cable options including conventional trunk cable and daisy chain
  - Thinnest micro inverter in world, 25mm in thickness
- Designed for frame mount (AC module), as well as rail mount solutions 38 W solar panels
- High efficiency with 95.5% CEC
  - Globally certified for c-ETL-us, SAA, TUV, VDE-ARN-N 4105, VDE 0126 G83/2, CEL 021, IEC61727, EN50438
  - Integrated grounding for easy installation
  - NEMA-6/IP-66/IP-67 enclosure rating
  - Integrated monitoring and power line communication with BDG-256 gateway
  - Fully comply with NEC 2014/2017 section 690.12 Rapid Shutdown requirement. No additional equipment is required



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## Important product information

- NEP is committed to developing Clean, Affordable, Reliable and Efficient (CARE) products for our customers worldwide.
- NEP microinverters have an isolation transformer and basic isolation between the DC input and the AC output network.



## BDM 300 MICROINVERTER



### INPUT(DC)

### OUTPUT (AC)

### SYSTEM EFFICIENCY

### PROTECTION FUNCTIONS

INPUT(DC)	Recommended Max PV Power (Wp)	450			
	Max DC Open Circuit Voltage (Vdc)	60			
	Max DC Input Current (Adc)	14			
	MPPT Tracking Accuracy	>99.5%			
	MPPT Tracking Range (Vdc)	22-55			
	Isc PV (absolute maximum) (Adc)	18			
	Maximum Inverter Backfeed Current to the Array (Adc)	0			
OUTPUT (AC)	Peak AC Output Power (Wp)	300			
	Rated AC Output Power (Wp)	250			
	Nominal Power Grid Voltage (Vac)	240	208	230	
	Allowable Power Grid Voltage (Vac)	211V-264*	183V-229*	configurable*	
	Allowable Power Grid Frequency (Hz)	59.3 a 60.5*		configurable*	
	THD	<3% (at rated power)			
	Power Factor (cos phi, fixed)	>0.99 (at rated power)			
	Rated Output Current (Aac)	1.04	1.2	1.09	
	Current (inrush)(Peak and Duration)	12A, 15us			
	Nominal Frequency (Hz)	60	50		
	Maximum Output Fault Current (Aac)	2.2A peak			
	Maximum Output Overcurrent Protection (Aac)	6.3			
	Maximum Number of Units Per Branch (20A) (All NEC adjustment factors have been considered)	15	13	14	
	SYSTEM EFFICIENCY	Weighted Averaged Efficiency (CEC)	95.50%		
		Night Time Tare Loss (Wp)	0.08	0.06	0.07
Over/Under Voltage Protection		Yes			
Over/Under Frequency Protection		Yes			
Anti-Islanding Protection		Yes			
Over Current Protection		Yes			
Reverse DC Polarity Protection		Yes			
Overload Protection		Yes			
Protection Degree		NEMA-6 / IP-66 / IP-67			
Ambient Temperature		-40°F to +149°F (-40°C to +65°C)			
Operating Temperature		-40°F to +185°F (-40°C to +85°C)			
Display		LED LIGHT			
Comunications		Power Line			
Dimension (W-H-D)		7.09" x7.32" x 0.98" (180x186x25 mm)			
Weight		3.3 lbs. (1.5 kg)			
Environment Category		Indoor and outdoor			
Wet Location		Suitable			
Pollution Degree	PD 3				
Overvoltage Category	II(PV), III (AC MAINS)				
Product Safety Compliance	UL 1741 CSA C22.2 No. 107.1	IEC/EN 62109-1 IEC/EN 62109-2			
Grid Code Compliance* (Refer to the label for the detailed grid code compliance)	IEEE 1547	VDE-AR-N 4105* VDE V 0126-1-1/A1 G83/2, CEI 021 AS 4777.2 & AS 4777.3,EN50438			

\* Grid parameters are configurable through a BDG-256 or BDG-256P3 gateway

\* All NEC required adjustment factors have been considered for AC outputs. AC current outputs will not exceed stated values for Rated Output AC Current

#### COMPLIANCE

\*NEC 2014 Section 690.11 DC Arc-Fault Circuit Protection

\*NEC 2014 Section 690.12 Rapid Shutdown of PV Systems on Buildings

\*NEC 2014 Section 705.12 Point of Connection (AC Arc-Fault Protection)