



CONNECT AND PROTECT

Flexible IP-protected enclosure solution for harsh environments

Protects sensitive electronics with up to IP67

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nvent

SCHROFF

IP-Pro Alu EMC

Protects sensitive electronics with up to IP67

The die-cast aluminium enclosure **IP-Pro Alu EMC** from **nVent SCHROFF** offers robust IP protection up to IP67, is EMC shielded, as well as shock, vibration and weather resistant. It can be configured for electronics with standardized or customer-specific form factors.

The enclosure can be complemented by the expertise of **nVent SCHROFF**, which includes innovative solutions for PCB fixing, cable management and optimized cooling concepts.



Order Number	Height (mm)	Width (mm)	Depth (mm)	IP-Level
26880-001	90	122	122	66/67
26880-002	90	220	122	66/67
26880-003	90	160	160	66/67
26880-004	90	260	160	66/67
26880-005	90	360	160	65
26880-006	110	200	230	66/67
26880-007	180	200	230	66/67
26880-008	110	330	230	65
26880-009	180	330	230	65
26880-010	110	401	230	65
26880-011	110	600	230	66/67
26880-012	110	402	310	65
26880-013	180	402	310	65
26880-014	110	600	310	66/67
26880-015	180	600	310	66/67

CUSTOMER-SPECIFIC DESIGN FOR EVERY APPLICATION



Configuration of a Flexible Enclosure Solution

The availability of 15 different dimensions and individual mechanical modifications, as well as solutions for PCB fixation and cable management, allow the use within different applications.



Optimal Heat Dissipation Concept

Convection and conduction cooling enables heat dissipation via the enclosure itself and can be adapted to the respective application.



Protection of Electronics in Indoor and Outdoor Applications

- Railway & Transportation
- Telecommunications
- Aerospace & Defense
- (Industrial) IoT



Simulations & Tests

Thermal simulations, IP or EMC tests ensure the design functionality.



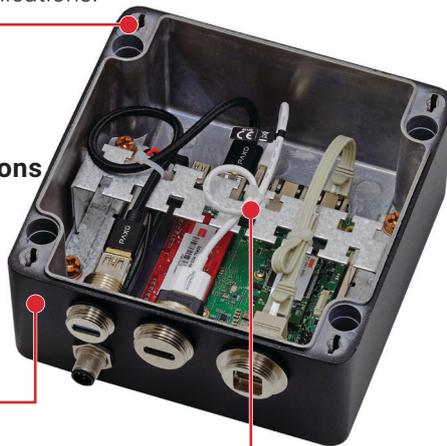
Aesthetic Enclosure Design

The enclosure can be finished with powder coating, screen printing or digital printing. Colors have a high resistance to environmental conditions or chemicals.



Development and Integration of Electronic Components

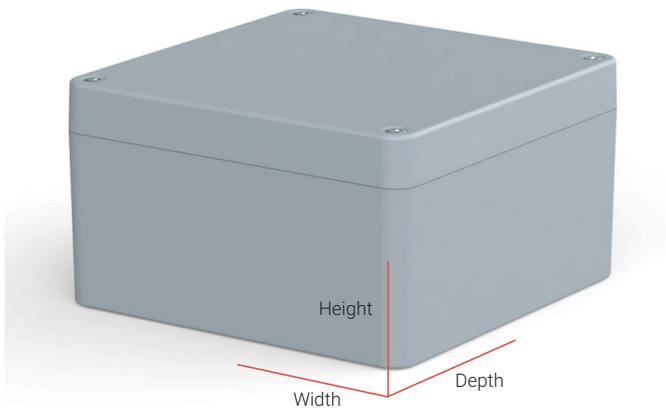
Customer-specific solutions including cabling, boards (e.g. COM Carrier) and integration services.



The product shown above is an EMC-protected enclosure with the dimensions H90 x W160 x D160 mm (26880-003) and has an integrated embedded NUC™ board.

Flexible IP-protected enclosure solution for harsh environments

TECHNICAL DATA



Available in a Wide Range of Dimensions

- 15 different sizes from H90 x W122 x D122 mm to H180 x W600 x D310 mm
- Standard version in silver-grey (RAL 7001)

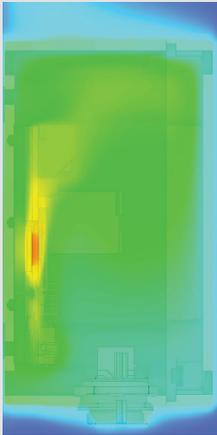
High Resistance to Environmental Conditions

- Protection against water and dust with up to IP67 according to EN 60529
- Temperature range of the enclosure -40 to $+90^{\circ}\text{C}$
- Weather resistant powder coating to suit outdoor applications

Reliable Protection Even in Harsh Conditions

- IK09 protection from external mechanical impacts according to IEC 62262
- Shock and vibration resistant according to EN 61373 Cat. 2 and AREMA Class I

THERMAL SIMULATIONS & EMC-TESTS



Temperature ($^{\circ}\text{C}$)

- 68
- 61.67
- 55.33
- 49
- 42.67
- 36.33
- 30

At **nVent SCHROFF**, thermal simulations are used in the early phase of product development in order to equip enclosures with an optimal cooling concept suitable for the application.

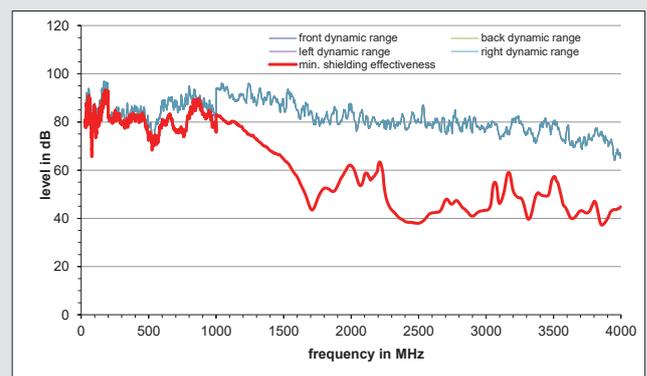
Test Setup with Conduction Cooling (pictured left):

- Processor: Intel® i7, 10th generation processor (mobile)
- Power dissipation of the processor: 15 W
- Ambient temperature: 30°C (87°F)
- Mounting the enclosure on an insulated wall
- Enclosure Size: H90 x W160 x D160 mm

Excellent EMC Properties

The integrated EMC shielding ensures reliable operation of the electronic components built into the enclosure.

Tested with an enclosure size of H90 x W160 x D160 mm for a frequency range from 30 MHz to 4 GHz.



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