ELSE NUCLEAR

NAUSICAA IC-T/ICP-T

Pressurised ion chamber gamma monitor, 10 nSv/h–10 Sv/h

Gamma monitoring unit with a pressurised ion chamber, electrometer and CPU-based control unit, with very high sensitivity and stable response. IC-T is intended for environmental measurements and IC-T-PF for pulsed fields around accelerators. ICP-T is the same detector managed by a SATURN ratemeter, and DISCOVERY IC-T is an IP65 version for outdoor use.



Detector type
Pressurised ion chamber, a rgon 8 atm + xenon 2 atm, 10 L total volume [1]

Energy range
30 keV–10 MeV [1]

Weight
21 kg (NAUSICAA IC-T); 16 kg (ICP-T) [1]

Specifications

DETECTOR

Detector type	Pressurised ion chamber, argon 8 atm + xenon 2 atm, 10 L total volume	[1]

PERFORMANCE

Accuracy	±5% at environmental background radiation levels	[1]

MEASURING RANGE

Dose-rate range	10 nSv/h–10 Sv/h (standard); 10 nSv/h–100 mSv/h (PF pulsed-field version)	[1]
Energy range	30 keV–10 MeV	[1]
Ion chamber sensitivity	Approx. 2 × 10⁻⁸ A/(R/h)	[1]

CONNECTIVITY & INTERFACE

Communication	Ethernet or serial connection to a host PC running 5700 sMON	[2]

MECHANICAL

Weight	21 kg (NAUSICAA IC-T); 16 kg (ICP-T)	[1]
Dimensions	365 × 390 × 600 mm (NAUSICAA IC-T); 256 × 327 × 600 mm (ICP-T) (W × D × H)	[1]

ENVIRONMENT & RATINGS

perating temperature	−25 to +50 °C	[1]

ORDERING & ACCESSORIES

Configurations	NAUSICAA IC-T with CPU-based control unit; ICP-T without CPU, managed by a SATURN ratemeter; DISCOVERY IC-T in an IP65 housing for outdoor u se with wireless data transfer	[2]

Accessories	Traceable calibration (^{137}Cs), E-N-KEY external keyboard and ALU alarm unit (IC-T), trolley, wall mounting kit, IP54 enclosure, GPS and photovoltaic panel (DISCOVERY IC-T)	[1]

GENERAL

Electronics	Two alternative electrometers with automatic scale change: 9 decades for environmental measurements (IC-T), 7 decades for pulsed fields around accelerators (IC-T-PF)	[1]

Sources

[1] **NAUSICAA IC-T, ICP-T Ion-Chamber-based Gamma Monitoring Units (datasheet)**
ELSE NUCLEAR · datasheet · p. 1; p. 2, Technical Specifications; p. 2, Technical Specifications · checked 2026-10-16
https://www.elsenuclear.com/wp-content/uploads/2026/10/DAT_IONCHAMBERDET_EN_1.14.pdf

[2] **NAUSICAA IC-T, ICP-T Ion-Chamber-based Gamma Monitoring Units**
ELSE NUCLEAR · product-page · Product page · checked 2026-10-16
https://www.elsenuclear.com/portfolio/nausicaa-ic-t-icp-t/

Every value is taken from the manufacturer's own document; the number after the value refers to the source list. Always check against the latest datasheet before ordering.

The data comes from the manufacturer's published documents. Manufacturers may change specifications; the current configuration and performance are confirmed in the quotation.