

HoloCMA

Coarse-mode aerosol monitoring—made easy

HoloCMA enables in situ, continuous, long-term monitoring and real-time analysis of coarse-mode aerosols (CMA). Using 3D holographic imaging and deep-learning analytics, it delivers particle type, morphology, and optical signatures beyond size and concentration in a compact, field-deployable system.

Key Features

- Real-time particle type, morphology, optical properties (beyond size & concentration)
- For particles $\geq 5 \mu\text{m}$
- Dual sampling modes: active-flow inlet or passive open-path sampling with minimal loss
- 20 Hz sampling rate @ 30 L/min
- Wireless control + integrated software for remote monitoring and field deployment
- Portable, rugged design for unattended, long-term operation

Applications

- Forest/terrestrial: pollen, spores, plant debris, mineral dust
- Marine: sea-salt aerosols
- Cloud microphysics: cloud droplets, ice crystals
- Events & emissions: wildfire smoke, volcanic ash
- Indoor air quality

For more information, please contact: info@particle4x.com