

Fifth Generation. First Choice.

Designed for the Most Demanding Applications



DAS N51/N52-Series

With 40+ years of experience and thousands of systems installed for critical safety applications worldwide, the **AP Sensing Distributed Acoustic Sensing (DAS)** system has stemmed from an improved understanding of our customers' needs and our **unique 2P Squared technology**.

The result? A unique system architecture that not only achieves the **world's leading measurement range** for true phase-based systems without the use of amplification, but also results in **enhanced usability**, **reduced signal artifacts** such as fading, and **improved measurement performance**. These proven system capabilities are all encompassed within a compact and portable system design that can operate even in harsh environmental conditions.



Performance

- Measurement performance that balances detection sensitivity (probability of detection) and detection reliability (reduced false and nuisance alarm rate)
- AI-based detection algorithms enable rapid adaptation of the DAS system to the environment
- Application-specific extraction and processing of measurement data
- New algorithms improve the dynamic range and minimum detectable signal by more than 75%



Reliability

- Significantly improved product lifetime (more than doubled)
- Standard operating temperature range improved by 25%
- Extremely low false alarm rate
- 30% reduced power consumption, ideal for installation in remote and low voltage environments
- Intelligent self-diagnosis tool for improved troubleshooting and smooth operation
- State-of-the-art IT security standards



Ease of use

- Intelligent commissioning features for reduced setup time
- API feature set provides the capability to develop project specific software applications
- Lightweight and integrable design supports portability
- Various solutions for integration into third-party software or custom cloud-based solutions
- Increased data storage expansion options

	N5125B-Series	N5225B-Series	N5226B-Series
Power cable monitoring	✓	✓	
Pipeline leakage detection	✓	✓	
Well & reservoir monitoring			✓
Geo- & hydrological monitoring			✓
Perimeter monitoring	✓	✓	
Railway monitoring		✓	



Digging events



Walking/climbing



Leakage detection



PIG tracking



Motor vehicle



Train traffic



Explosion/faults



Gunshot



Acoustic profiling



Rockfall



Subsea hazard



Reservoir Monitoring



Why Choose AP Sensing's 5th Generation DAS?

- **Revolutionary 2P Squared technology** provides a true linear measurement of strain changes generated by acoustic/vibration signals along the sensing fiber.
- **Intelligent event detection:** AP Sensing's proprietary deep learning algorithms precisely analyze acoustic patterns and reliably classify events.
- **Outstanding signal-to-noise ratio (SNR)** accompanied by a **world-leading measurement range** for phase-based systems without additional amplification.
- **Leading performance from noise floor improvements** of over 75% and an **improved pulse rate** that doubles both the resolvable acoustic frequency and the distortion-free acoustic amplitude.
- Available in **single and simultaneous two-channel versions** with extended standard temperature performance. Features a 100 km measurement range with two simultaneous channels.



Learn More About the Product:
www.apsensing.com/product/das-n51/n52-series



More Information:
+49 7031 309 6610
www.apsensing.com
info@apsensing.com