

CLOUD MONITORING DATA VISUALIZATION AND ALARM PLATFORM



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MONITORING & INFRASTRUCTURE

UNIFIED DATA VISUALIZATION AND ALARM CLOUD PLATFORM

MAS connects the power of the Internet, IoT, big data and advanced 3D visualization technologies to provide a robust data visualization and alarm platform for accessing, visualizing, analyzing and managing alarms from remote sites. The platform effectively manages the complexities of integrating and analyzing data from disparate monitoring devices across multiple industries, enhancing operational monitoring and decision-making capabilities.

EFFICIENT DATA MANAGEMENT, SINGLE-SCREEN DATA INTEGRATION

MAS integrates remote sensing data from multiple sources, including DEM, GIS maps, satellite and radar imagery, and 3D oblique photography for realistic scene reconstruction. Users can intuitively view and interact with radar and multiple sensor data on a single screen, complete with clickable icons for detailed infographics. The platform provides comprehensive radar management services such as device access, parameter setting, control, and display functions. It dynamically displays radar deformation results over specific time periods, allowing users to visually track area deformation. Built-in GIS tools support onmap measurement capabilities for easy analysis and evaluation.

ADVANCED ANALYSIS AND REPORTING, COMPREHENSIVE MONITORING ACROSS DEVICES

The platform accommodates extensive data input from multiple monitoring devices, including radars, GNSS receivers, and environmental sensors, ensuring thorough data acquisition. It includes synergistic analytics tools that enable detailed visualization of correlations and trends to improve predictive maintenance and risk management. Integrated video monitoring capabilities enhance security and operational control, further improving system reliability.

PROACTIVE ALARM MANAGEMENT, CUSTOMIZABLE ALARM SYSTEMS

Featuring a four-level alarm system that can be customized to meet any operational requirement, the MAS. Platform offers flexible notification options including SMS, audible, email and direct alerts. This ensures that all critical information reaches the appropriate stakeholders in a timely manner, improving safety and operational responsiveness. Tools for detailed alarm analysis and documentation promote continuous improvement of operational procedures.

AUTOMATED REPORTING FOR INFORMED DECISION MAKING, STREAMLINED DATA REPORTING

The streamlined process for creating and distributing detailed reports provides quick access to critical data and insights. Automated report generation can be customized for frequency and format, ensuring that stakeholders receive timely updates tailored to their specific needs. It supports improved decision making and continuous project management optimization.

ANYWHERE, ANYTIME ACCESS FLEXIBLE ACCESS ACROSS PLATFORMS

With support for web, application, and H5 interfaces, MAS ensures that you can monitor, control, and analyze your operations from anywhere in the world. Real-time access to data-including meteorological information, sensor data, and video-along with comprehensive project overviews and management tools provide unprecedented control over your environmental structural and land monitoring projects









Open Pit Mines

Factors such as displacement, deformation, stress and slope geology are monitored and evaluated, along with environmental data such as rainfall and groundwater, to ensure mine safety and prevent slope failure.



Tailings Ponds

Tailings pond conditions, including physical and chemical properties of tailings, water levels, dam structure and stability, and the surrounding environment, are continuously monitored and analyzed to ensure safety and stability.



Geological Hazards

Phenomena and indicators related to geological risks such as landslides, collapses, debris flows and subsidence are evaluated. Real-time monitoring provides early warning and a scientific basis for disaster prevention, mitigation and response.



Water Conservation

Water levels, flow rates, water quality, and the condition of hydraulic structures such as dams and canals are monitored to provide a comprehensive understanding of real-time water resource conditions and support safe operation of water conservation projects.

SPECIFICATIONS

Foundation module (1) Multi-project management: A multi-project management platform that sets different permissions for users at different levels to view project data and manage the platform, meeting the needs of rapid management and global viewing. (2) Multi-source data fusion:	Syste	m recommendations	F
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(5) Data monitoring: Real-time monitoring of data and equipment status, timely discovery of problems and notification in multiple ways, and timely handling of data interruption.

Radar module	In addition to foundation module.	
	(1) Radar control: The software remotely enables the radar to be turned on and stopped.	
	(2) Multiple radar access: Multiple radars can be accessed to the same platform, and the data is fused and displayed, and it can also support the fusion display with other sensors.	
	(3) Multiple ways of monitoring: According to the requirements, it can be monitored through points of interest, lines of interest, and areas of interest.	
	(4) Multiple monitoring results: Display the result data from different perspectives, such as scatter plots, intensity maps, and deformation maps.	
	(5) Multiple alarm methods: Support global alarms and monitoring point alarms. Global alarms support alarms based on the alarm area, the number of alarm points, and equipment status alarms. Monitoring point alarms support speed, deformation, and acceleration alarms.	
App module	In addition to foundation module.	
	(1) Real-time meteorological information.	
	(2) Real-time viewing of monitoring data.	
	(3) Video surveillance control.	
	(4) Data management.	
	(5) Overview of project operation.	

ifications are subject to change without notice.

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WWW.CHCNAV.COM MARKETING@CHCNAV.COM

CHC Navigation Headquarter

Shanghai Huace Navigation Technology Ltd. 577 Songying Road, Qingpu, 201703 Shanghai, China +86 21 54260273

CHC Navigation Europe

Office Campus, Building A, Gubacsi út 6, 1097 Budapest, Hungary Las Vegas, NV 89118, USA +36 20 421 6430 Europe_office@chcnav.com

CHC Navigation USA LLC

6380 S. Valley View Blvd, Suite 246, +1 702 405 6578

CHC Navigation India

409 Trade Center, Khokhra Circle, Maninagar East, Ahmedabad, Gujarat, India +91 90 99 98 08 02