

AUSS MOBILE

Automated Ultrasonic Scanning System

THE NEXT-GENERATION DIGITAL MOBILE SCANNING SOLUTION

AUSS Mobile stands as the latest addition to the AUSS product family. This distinctive and portable C-scan inspection system seamlessly integrates ultrasonics, eddy current, and bond testing into a unified platform. Such integration facilitates diverse inspections, making it an ideal solution for aircraft production, maintenance, and sustainment programs.



FEATURES:

- **Direct Replacement for MAUS V**
 - Offers enhanced capabilities to meet current data acquisition needs.
- **Boeing's Superior AUSS Software Architecture**
 - Included in a portable, modular, and affordable package.
- **Multi-Modal Design for Various Inspection Applications**
 - Ultrasonic Sensors/Multi-Element Arrays (32 x 28)
 - Bond Testing – Resonance, Pitch/Catch, and Mechanical Impedance Analysis (MIA)
 - Eddy Current Sensors/Arrays (Up to 512 Elements)
- **High Resolution Digital Waveform Capture**
 - Enables unparalleled interpretation capabilities.
 - Supports off-line data post processing.
- **Latest Phased Array Technology**
 - Delivers significant performance improvements.
 - Ensures faster inspection speed, especially in highly demanding applications.
- **Versatile Platform for Scanning Peripherals**
 - Accommodates a variety of scanning peripherals to fulfill unique customer requirements.
- **Fully Integrated Two-Axis Motion System**
 - Allows customization of scanning platforms for diverse needs.
- **Flexible Deployment for Quality Scanning**
 - Equipped to bring the highest quality scanning and imaging to the inspection cell, factory, or fleet, offering versatility in deployment locations.

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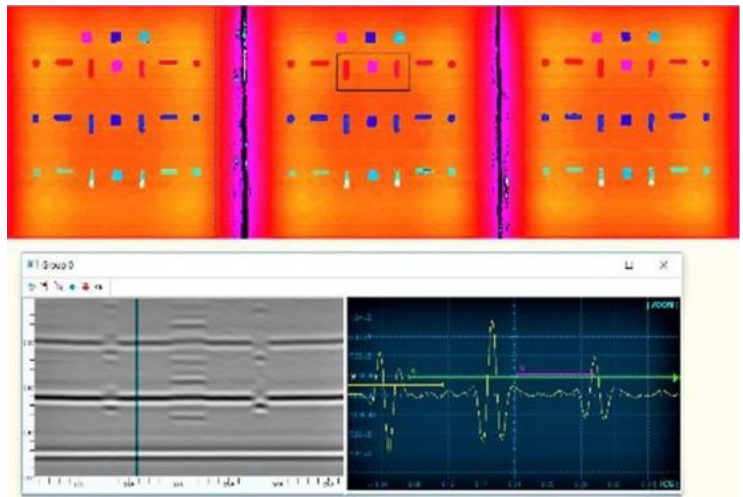
BENEFITS:

■ Managed System Investment

- Multiple capabilities in one portable unit enhance the versatility and efficiency in system management.
- Reduces need for multiple unique NDI systems.
- Standardized data format for all AUSS products.
- Reduces maintenance costs and promotes proficiency among users across various AUSS platforms.

■ Superior C-Scan Imaging Capability

- Enables technicians to conduct inspections with in-depth and comprehensive results.
- Integration of A, B, and C-scan views for improved interpretation.
- True acquired waveform ensuring the accuracy and reliability of data collected.
- Unique algorithms and tools enhance the precision and efficiency of the inspection process.
- Refined color palette facilitates clear visualization and interpretation of data.



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SPECIFICATIONS:

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|----------|---|----------|--|
| 1 | Power Supply <ul style="list-style-type: none">• 24 VDC External Power | 5 | Ultrasonic <ul style="list-style-type: none">• Conventional UT, Phased Array, Full Matrix Capture, and Total Focusing Method |
| 2 | Laptop Connection <ul style="list-style-type: none">• Gigabit Ethernet | 6 | Continuous Wave <ul style="list-style-type: none">• Standard 41-Pin Connector for: Resonance, all Eddy Current (EC) Functionality, Mechanical Impedance Analysis (MIA), and Pitch/Catch |
| 3 | External Data System <ul style="list-style-type: none">• Gigabit Ethernet and External Encoder Trigger | 7 | Scanner Control <ul style="list-style-type: none">• Motor and Encoder Connection |
| 4 | Auxiliary Equipment Control <ul style="list-style-type: none">• Six I/O Connections | | |

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GENERAL

Power: 120-240 VAC 50/60Hz 10A External Supply
Computer Interface: Gigabit Ethernet
Dimensions without handles: 13.75"W, 5.25"H, 11.75"D
Dimensions with handles: 16.75"W, 7.75"H, 14.5"D
Weight: 18 lb. (20 lb. with external power supply)
IP Rating: IP3x
Encoders: 2 Quadrature

ULTRASONIC

Pulser Voltage: 100V
Pulse Width: 20-1000 ns
Maximum PRF: 20 KHz
Pulse Width Resolution: 4 ns
Pulse Type: Negative Square
Pulse Focusing Delay: 0-40 μ s

RECEIVER

Sensitivity: 14 bits
DDF: Up to 64 points
Gain Range: 12-110 dB
Focusing Delay: 50 kHz to 20 MHz
Focusing Delay Resolution: 0-40 μ s at 100 MHz

SYSTEM

Configuration: 32 Channel/128 Element
Probe Connector: IPEX
Configurations: Pulse/Echo, Through Transmission

CONTINUOUS WAVE

Connector: 41-Pin Circular Connector
Output Current: 1A Max.
Frequency Range: 20 Hz to 2 MHz
Generators/Coil Drivers: 2 Fully Independent
Drive Voltage: 0-20 Vpp Single Driver
Eddy Current Array: Up to 128 Coils
Probes Inputs: 8 (128 with Multiplexer)
Data Rate: 40,000 Data Points/sec
A/D Converters: 24-bits
Data Format: 32-bits