

MDX-P300 Battery Conductance and Electrical System Tester

EASY & ACCURATE RESULTS

Complete with an integrated printer, The Midtronics MDX-P300 makes it easy and more affordable to determine and present the current state of a battery and electrical system.

The MDX-P300 is simple to use, performing accurate battery or system tests in seconds without heat, sparks, or the need for user interpretation. Results can be printed and reviewed immediately with customers for added impact to preventative maintenance routines and customer service.

With patented conductance technology and proven reliability, Midtronics testers are required for warranty testing and preventative maintenance at automotive dealers and service providers around the world.

Features:

- Integrated printer provides immediate results to review with the customer
- User-defined headers on printout
- Tests 12 volt batteries and electrical systems for cars and light trucks
- Tests starting and charging system voltage and displays results
- Tests batteries from 100 to 1400 CCA
- Bad cell detection
- Reverse polarity protection
- Tests discharged batteries down to one volt
- Multiple rating system compatible (CCA, CA, MCA, SAE, DIN, EN, IEC, JIS)
- Tests multiple battery chemistries including standard flooded, AGM, and GEL
- Multiple language capability: English, French-Canadian, Spanish and Japanese



SPECIFICATIONS:

Model:

- MDX-P300

Display:

- LCD text display

Temperature Compensation:

- Tester-prompted

Operating Temperature:

- 32°F to 120°F/ 0°C to 50°C

Test Range:

- 100-1400 CCA
- 100-1400 CA
- 100-1400 MCA
- 100-1400 SAE
- 100-550 DIN
- 100-900 EN
- 100-550 IEC
- JIS#

Built-in Printer:

- Powered by battery under test

Voltage Range:

- Tests 12 volt batteries down to one volt

Cable Length:

- 21 in/ 533.4 mm

Power Requirements:

- Uses power of battery under test or 9 volt battery

Voltmeter:

- .9-16 Vdc, +/- 0.05 Vdc

Languages:

- English
- Spanish
- French-Canadian
- Japanese

Housing Material:

- Acid-resistant ABS plastic

MIDTRONICS

MDX-P300

MIDTRONICS, INC.
7000 Monroe Street
Willowbrook, IL
60527
630 323 2844

BATTERY TEST

GOOD BATTERY

VOLTS: 12.64V
MEASURED: 541 CCA
RATING: 600CCA

BATT. TYPE: REGULAR
BATT. LOCATION: OUT OF VEHICLE
BATT. TEMP: ABOVE 32°F

STARTER TEST

OK

VOLTS: 10.56V

CHARGING TEST

OK

VOLTS: 14.63V

Version 1.0 ©2006

Sample print-out

Dimensions:

- 9 in x 4 in x 2.5 in
(230 mm x 102 mm x 65 mm)

Weight:

- 1.16 lb / 499 g



MDX-P300
with Integrated Printer



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MIDTRONICSAdvancing
Battery Management

MDX-600 Series

Battery Conductance and Electric System Analyzers

The Midtronics MDX-600 Series combines 30 years of experience and innovation gained from selling essential tools to nearly every car and truck OEM in the world. With industry standard conductance technology for battery testing, the MDX Series is:

SAFE Worry-free operation anywhere, even in front of customers

FAST Accurate testing of the battery or electrical system in seconds

SIMPLE Proven user interface eliminates guesswork and user error to provide an accurate analysis every time

The MDX Series delivers solid benefits:

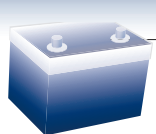
- Save time and money with improved battery and electrical diagnostic productivity
- Improve customer service by reducing wait time
- Increase sales by proactively testing batteries and electrical systems
- Promote customer satisfaction by identifying potential problems before they occur

MDX Series advanced features include:

- Multiple vehicle applications, battery types, and rating systems
- Large back-lit screen and improved user interface
- Integrated printer option
- Replaceable cable design



Patented Conductance Technology is at the Heart of Our Analyzers



NEW BATTERY

Rating: 500 CCA
Measured:
600 CCA

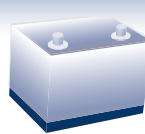
Conductance is a unique electrical measurement that determines the ability of a battery to transmit current through its internal structure. Years of laboratory and field research have proven that conductance provides a reliable indication of battery State of Health (SOH) and a correlation to the battery's cranking ability.



DURING LIFE

450-600 CCA

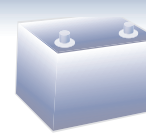
Conductance Technology can be used to detect cell defects, shorts, and normal aging. Midtronics Conductance Technology is recognized globally as the standard to determine battery condition and control battery charging. Conductance is the required test method for battery warranty decisions at most automotive OEMs.



APPROACHING END OF LIFE

430 CCA

A new battery, when fully charged, will have a high conductance reading of anywhere from 10% to 15% higher than its full CCA rating.



REPLACE BATTERY

350 CCA

As a battery ages, its internal components wear out through corrosion, disintegration, and shedding. Performance of the battery is significantly degraded and can be measured through its conductance value.

The Complete Tool for all vehicle and battery applications



Vehicle Applications

- Automotive
- Motorcycle
- Marine Cranking
- Lawn and Garden
- Group 31
- Commercial 4D/8D



Global Systems

- CCA, CA, MCA, JIS, SAE, EN, DIN, IEC
- 6 & 12 volt batteries
- 12 & 24 volt charging system testing (650/650P only)



Battery Type

- Regular flooded
- AGM flat plate
- AGM spiral
- Gel



Advanced Starter/Alternator Testing (650 / 650P only)

- Quick starter analysis without disabling the ignition
- Advanced menu-driven interface for a complete charging system analysis in seconds



Specifications



MDX-640

Available Models

- **MDX-640**
Battery Conductance Analyzer
for battery testing only
(6 and 12 volt batteries)

MDX-600 Series products can be purchased with an integrated printer or a portable IR printer to provide a professional diagnostic report to your customers.

- Increase customer satisfaction by identifying potential problems before they occur
- Complete system information in an easy-to-read format
- Date and time for accurate records
- User-definable header



MDX-640



Sample Printout



MDX-650P

- **MDX-650**
Battery and Electrical System Analyzer combines the full MDX-640 capabilities for battery testing with in-vehicle capabilities to analyze starting and charging systems
(6 & 12 volt batteries and 12 & 24 volt charging systems)
- **MDX-650P**
All of the MDX-650 features, plus an integrated printer



MDX-650



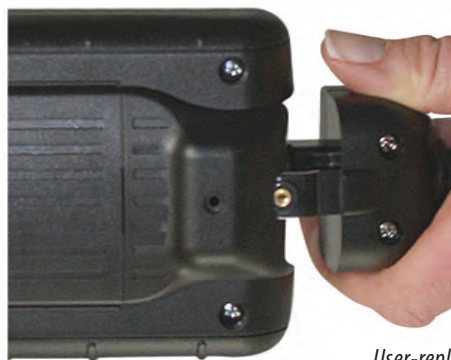
MDX-650P

SPECIFICATIONS:**Models:**

- **MDX-640** Battery Conductance Analyzer
Includes: MDX-600 Series Analyzer, MDX-640 software (installed), manual, lead stud adapter set, 4-ft cable set
- **MDX-650** Battery Conductance and Electrical System Analyzer
Includes: MDX-600 Series Analyzer, MDX-650 software (installed), manual, lead stud adapter set, 10-ft cable set, carrying bag
- **MDX-650P** Battery Conductance and Electrical System Analyzer with Integrated Printer
Includes: MDX-600 Series Analyzer with integrated printer, MDX-650 software (installed), manual, lead stud adapter set, 10-ft cable set, carrying bag

Available Accessories:

- A156 Universal Soft Carry-All Bag
- A207 4-ft Replaceable Cable
- A208 10-ft Replaceable Cable
- A033 Lead Stud Adapter Set (2 male, 2 female)
- A095 6-Pack Thermal Printer Paper*
- *Replacement paper rolls available at most office supply stores
- A087 Infrared Printer with Charger (for MDX-640)

*User-replaceable cable sets***Applications:**

- Automotive
- Marine Cranking
- Group 31
- 6 & 12 Volt batteries
- 12 & 24 Volt charging systems (650/650P Only)
- Motorcycle
- Lawn & Garden
- Commercial 4D/8D

Display:

5-line Text/Graphical Backlit Display

Operating Temperature:

0°C to +50°C (32°F to +122°F)

Test Range:

- CCA: 100-2000 BY 5
- MCA: 100-2000 BY 5
- EN: 100-2000 BY 5
- SAE: 100-2000 by 5
- CA: 100-2000 BY 5
- JIS#: By Part Number
- DIN: 100-1200 by 5
- IEC: 100-1200 by 5

Voltage Range:

1Vdc – 30Vdc

Cable Length:

- 4-ft/122cm (MDX-640)
- 10-ft/305cm (MDX-650/650P)

Power Requirements:

Uses the power of the battery under test and 6AA internal batteries

Languages:

- English
- French-Canadian
- Spanish
- Portuguese

Housing Material:

Acid-resistant ABS plastic

Dimensions:

MDX-640/ MDX-650: 7.7" x 3.9" x 2.4"
(19.5cm x 10cm x 5cm)

MDX-650P: 10.6" x 3.9" x 2.4" (27cm x 10cm x 5cm)

Weight:

MDX-640/650: 1.2 lbs (544g)

MDX-650P: 1.7 lbs (771g)

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The Midtronics logo, featuring the word "MIDTRONICS" in white, bold, sans-serif capital letters on a blue rectangular background. A stylized white line graphic resembling a pulse or a battery symbol is positioned below the text.

MIDTRONICS

Advancing
Battery Management

MDX-700 HD

Heavy Duty Battery Conductance and Electrical System Analyzer

ADVANCED ANALYTICS FOR MULTIPLE BATTERY VEHICLES

Introducing the MDX-700 HD from Midtronics, the worldwide leader in battery and electrical diagnostics.

Created specifically for the heavy-duty commercial/fleet market, the new MDX-700 HD uses Midtronics' advanced conductance technology, making it easy for anyone to test the full electrical system on heavy duty vehicles.

Technicians can quickly find the problem – in the battery, starting or charging system – in minutes, not hours.

Test results, including multiple battery tests, can be printed on an optional integrated printer.

The MDX-700's 15' cable set allows for starting and charging system tests to be run from the cab, for complete control and simplicity.

The analyzer's user-friendly interface intuitively prompts the user through the entire test sequence quickly and easily.

Using patented conductance technology and an advanced heavy duty battery testing algorithm, the MDX-700 HD provides accurate test results reliably for multiple configurations up to 2000 CCA.



- **SAFE** to use anywhere, even in front of the customer
- **FAST** and accurate testing of the battery or full system accurately in seconds
- **SIMPLE** proven user interface eliminates guesswork and user error, providing accurate analysis every time

The MDX-700 HD helps to:

- Save time and money by improving battery and electrical diagnostic productivity
- Improve customer service by reducing wait time
- Increase sales by pro actively testing batteries and systems
- Increase customer satisfaction by identifying problems before they occur

Innovative Tool of the Year Award Winner, 2011





MDX-700HD

MDX-700HD OVERVIEW

Heavy Duty Battery Conductance and Electrical System Analyzer for testing 6 and 12 volt batteries in 12 to 24 volt systems consisting of one or as many as six batteries (in a pack)

- In-vehicle capabilities for analyzing the starting and charging systems
- Date and time for accurate records
- User definable header
- Complete system information in an easy to read and understand format

MIDTRONICS
MDX-700 HD

04/21/2010
9:56 AM

PACK 1381

CHECK PACK

VOLTS	11.40V
MEASURED	428 CCA
RATING	550 CCA
BATTERY TYPE	REGULAR FLOODED
BRT. LOCATION	IN VEHICLE
POST TYPE	TOP POST
APPLICATION	GROUP 31
CHARGE STATE	BEFORE CHARGE

BATTERY 1 GOOD BATTERY

VOLTS	12.51V
MEASURED	541 CCA

BATTERY 2 GOOD BATTERY

VOLTS	12.53V
MEASURED	546 CCA

BATTERY 3 GOOD BATTERY

VOLTS	12.54V
MEASURED	546 CCA

BATTERY 4 REPLACE BATTERY

VOLTS	11.40V
MEASURED	264 CCA

Sample Printout



MDX-700P HD

AVAILABLE MODELS

MDX-700HD Series products can be purchased with an integrated printer or a portable IR printer to provide a professional diagnostic report to the consumer.

- **MDX-700HD**
Battery Conductance and Electrical System Analyzer w/15' cable and heavy duty battery clamps
- **MDX-700PHD**
Battery Conductance and Electrical System Analyzer w/15' cable and heavy duty battery clamps and an integrated thermal printer

Midtronics is focused on developing innovative technologies for battery management.

For preventive maintenance, professional service and warranty management, our battery and electrical diagnostic equipment is the accepted standard by new vehicle dealers, service centers and battery retailers worldwide.

Removable Cable set



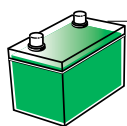
SIMM Card Data Transfer



Extra Long Cable set allows testing from the cab



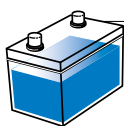
PATENTED CONDUCTANCE TECHNOLOGY IS AT THE HEART OF OUR ANALYZERS



NEW BATTERY

Rating: 500 CCA
Measured:
600 CCA

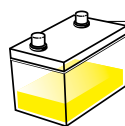
Conductance is a unique electrical measurement that determines the ability of a battery to transmit current through its internal structure. Years of laboratory and field research have proven that conductance provides a reliable indication of battery state-of-health and a correlation to the battery's cranking ability



DURING LIFE

450-600 CCA

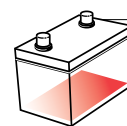
Conductance Technology can be used to detect cell defects, shorts, and normal aging. Midtronics Conductance Technology is recognized globally as the standard for determining battery condition and controlling battery charging. Conductance is the required test method for battery warranty decisions at most automotive OEMs.



APPROACHING END OF LIFE

430 CCA

A new battery, when fully charged, will have a high conductance reading, anywhere from 10% to 15% higher than its full CCA rating.



REPLACE BATTERY

350 CCA

As a battery ages, its internal components wear out through corrosion, disintegration, and shedding. Performance of the battery is significantly degraded and can be measured through its conductance value.

THE COMPLETE TOOL FOR ALL VEHICLE AND BATTERY APPLICATIONS

The MDX-700HD combines all of the testing functionality of our MDX-650 series with the added ability to test the multiple battery systems found in trucks and commercial equipment



Vehicle Applications

- Group 31
- Automotive
- Motorcycle
- Marine Cranking
- Lawn and Garden
- Commercial 4D/8D



Battery Types

- Regular flooded
- AGM flat plate
- AGM spiral
- Gel



Global Systems

- CCA, CA, MCA, JIS, SAE, EN, DIN, IEC
- 6 and 12 volt batteries
- 12 & 24 volt charging system testing



Starter/ Alternator Testing

- Quick starter analysis without disabling the ignition
- Advanced menu-driven interface for a complete charging system analysis in seconds



Battery Pack Testing

- Test the pack with batteries connected for PM testing
- Routine for testing and reporting individual battery results from multiple battery systems

Additional Features

- VIEW/PRINT – to view last test from memory or print another copy
- QC MODE for performing quality control testing
- Multiple Languages
- COUNTER Information to track activity, including good vs. replace, batteries and system test results
- Large back-lit display keeps operation simple for all levels of users
- Data card reader for software upgrades
- 15' Heavy Duty Removable cable set allows running tests from the cab

SPECIFICATIONS:**Models:**

- **MDX-700HD** Battery Conductance and Electrical System Analyzer
Includes: MDX-700HD Series Analyzer, MDX-700HD Software (installed), Manual, stud adapters, 15' cable set, tool bag.
- **MDX-700PHD** Battery Conductance and Electrical System Analyzer
Includes everything from MDX-700HD with the addition of an Integrated Printer.

Available Accessories:

- A156 Tool Bag Carrying Case
- A260 Replacement 15' Battery Test Cable
- A033 Lead Stud Adapters, 2 male, 2 female
- A095 6 pack, thermal paper*
** Replacement paper rolls available at most office supply stores*
- A087 IR Printer with Charger (for MDX-700HD)

Applications:

- Group 31
- Automotive
- Motorcycle
- Marine
- Lawn & Garden
- Group 31
- Commercial 4D/8D

Display:

5-line Text/Graphical Backlit Display

MDX-700HD



MDX-700PHD

**Operating Temperature:**

0°C to +50°C (32°F to +122°F)

Test Range:

- CCA: 100-2000 BY 5
- MCA: 100-2000 BY 5
- EN: 100-2000 BY 5
- SAE: 100-2000 by 5
- CA: 100-2000 BY 5
- JIS#: By Part Number
- DIN: 100-1200 by 5
- IEC: 100-1200 by 5

Voltage Range:

.9Vdc – 30Vdc

Cable Length:

- 15'/455cm (standard)

Power Requirements:

Uses the power of the battery under test and 6 AA Internal Batteries

Languages:

- English
- French Canadian
- Spanish

Housing Material:

Acid resistant ABS plastic

Dimensions:

MDX-700HD: 19.5cm x 10cm x 5cm
(7.7" x 3.9" x 2.4")

MDX-700PHD: 27cm x 10cm x 5cm (10.6" x 3.9" x 2.4")

Weight:

MDX-700 HD: 544g (1.2 lbs)

MDX-700P HD: 771g (1.7 lbs)

Use your smart phone
QR scanner app to read
this code and view a
product video



For additional information or to place an order, please contact:

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