



ARTEMIS
TESTING INSTRUMENTS



Product Catalogue 2026

Meet ARTEMIS: The New Gold Standard in Plastics Testing

Introduction

Welcome to the Future of Precision: The 2026 Artemis Instruments Catalogue

In the rapidly evolving world of polymer science, data is only as good as the instrument that captures it. At **Artemis Instruments**, we don't just manufacture testing equipment; we engineer the benchmarks for accuracy, durability, and specialised performance in the plastics industry.

Our 2026 collection represents the pinnacle of our "Total Control" philosophy. By maintaining a complete in-house ecosystem—encompassing **bespoke mechanical machining, custom electronic PCB design, and proprietary software development**—we eliminate the limitations of third-party components. This vertical integration allows us to deliver instruments that are not only compliant with international standards like ISO and ASTM but are also uniquely adaptable to your specific laboratory requirements.

Why Choose Artemis Instruments?

- **Engineering Synergy:** Because our software and hardware teams work side-by-side, our interfaces are intuitive, our data transfer is seamless, and our mechanical tolerances are industry-leading.
- **True Customisation:** We understand that no two R&D departments are identical. Our machining capabilities allow us to modify and tailor every apparatus to fit your unique testing environment.
- **Uncompromising Reliability:** From our Melt Flow Indexers to our Precision Friction Testers, every machine is built to withstand the rigors of high-volume quality control while maintaining laboratory-grade precision.

Explore the Range Online

For further detailed technical knowledge and specifications, you can find more at www.artemisinstruments.com

Whether you are upgrading a single station or outfitting a complete new facility, Artemis Instruments provides the tools you need to push the boundaries of plastic innovation.

Artemis Instruments: The right equipment, The right results, Every time.



Index

Melt Flow Indexers

4	ART-MFI10
5	ART-MFI10-WL
6	ART-MFI20
7	ART-MFI20-WL
8	ART-MFI30
9	ART-MFI30-WL

Sample Analysis Apparatus

11	ART-ESCR	Environmental Stress Cracker
12	ART-ULTS	Thermal Film Shrinkage
13	ART-HPFS	Hot Plate Thermal Film Shrinkage
14	ART-DDi10	Drop Dart
15	ART-DDi20	Drop Dart
16	ART-UIPT	Universal pendulum Impact Tester
18	ART-COF	Co-efficient Friction Tester

Sample Preperation

20	ART-FSC	Film Strip Cutter
21	ART-MSP	Manual Sample Press
22	ART-PSP	Pneumatic Sample Press
23	ART-TSCS	Test Sample Cutting
24	ART-MNC	Notching Cutter

Bulk Density Apparatus

26	ART-BDA-ISO-6186
27	ART-BDA-ISOR60
28	ART-BDA-ASTM D1895-C
29	ART-BDA-ASTM D1895-B
30	ART-BDA-ASTM D1895-A

Shore Density Apparatus

32	ART-SH-D	Shore Durometer
33	ART-SH-A	Shore Durometer
34	ART-SHRB-A	Referance Blocks
35	ART- SHRB-D	Referance Blocks
36	ART-DTS	Durometer Stand

Software

37	LABlogic+	Instrument Software Platform
----	-----------	------------------------------



ARTEMIS
TESTING INSTRUMENTS

The ARTEMIS Melt Flow Indexer Range: Precision in Every Gram

The **ARTEMIS Melt Flow Indexer (MFI)** range is engineered for the modern laboratory, where high-throughput testing must coexist with absolute scientific integrity. Designed to measure the mass flow rate (MFR) and volume flow rate (MVR) of a wide array of thermoplastic materials, our MFI units are the backbone of quality control for resin producers and processors alike.

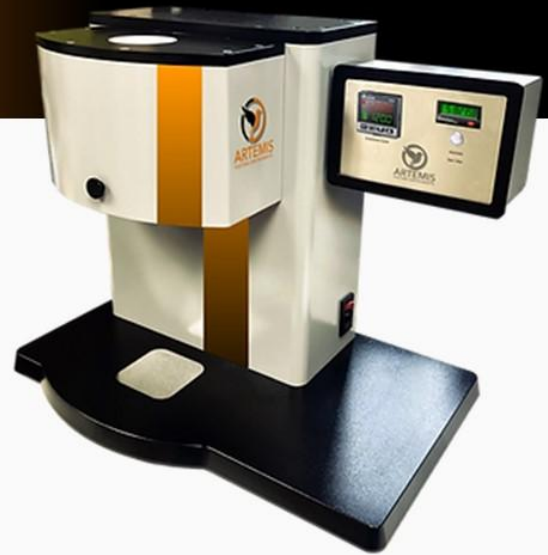
At the heart of the ARTEMIS range is a commitment to **thermal stability and mechanical alignment**. By leveraging our in-house mechanical machining, we ensure that every heating barrel and piston assembly exceeds the stringent tolerances required by **ISO 1133** and **ASTM D1238**.

Key Features of the ARTEMIS MFI Range:

- **Intelligent Thermal Control:** Using proprietary software and custom-designed PCB controllers, ARTEMIS indexers maintain industry-leading temperature uniformity throughout the barrel, critical for testing temperature-sensitive polymers.
- **Intuitive Touchscreen Interface:** We've designed our own software environment to be "operator-first." The high-resolution interface provides real-time graphing, automated data logging, and seamless export to your LIMS or quality management system.
- **Customizable Orifice & Piston Options:** Because we machine our own parts, we can provide bespoke tungsten carbide die geometries and piston weights for specialized high-flow or low-flow applications that off-the-shelf units simply can't handle.

Whether you are performing simple incoming material checks or complex R&D characterization, the ARTEMIS MFI range provides the **consistency, automation, and data accuracy** required to keep your production lines moving and your quality standards uncompromised.





ART-MFi10

Melt Flow Indexer

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Melt Flow Index is one of the most widely used parameters for the quality control of polymers and is the mass flow rate (g/10min) of a molten polymer at controlled conditions of temperature and pressure, extruded through a very precise orifice.

The MFi10 instrument offered by **Artemis** is the basic entry level Melt Flow Indexer ideal for laboratories that only do occasional testing. Controlled by a 16th Din PID temperature controller and PT100 thermocouple, temperature set points are easily entered and displayed. Sample cuts are taken manually using the supplied cut off knife at timed intervals which can be monitored using the on-board electronic timer. MFI test results are calculated easily by weighing each sample and conducting a manual calculation.

Supplied as standard the Artemis MFi10 comes complete with tooling to get you started from switch on including a standard discharge piston, test die and 2.16kg test load. To compliment the instrument a standard cleaning kit is supplied which includes cleaning rod, test die cleaning tool, cotton cleaning cloth and wire bristled brush. The die go/no-go gauge is also supplied to keep check on the die size and a graduated filling cylinder.

Options for the apparatus include, Pneumatic weight loader and Hastelloy barrel, piston and test die for test corrosive materials such as PVC.

The apparatus conforms to ASTM D3364, ASTM D1238, ISO 1133, DIN 53735 amongst others

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Basic entry level Melt Flow Indexer
- 1/16 Din PID Temperature controlled
- Temp Range - Ambient to 450 DegC
- Temperature accuracy +/-0.1 DegC
- Thermal stability +/- 0.2 DegC
- Timer resolution 1.0 sec
- Quick change barrel
- Manual sample cut off
- Supplied complete with tooling kit including cleaning tools, levelling device, die go/no-go gauge, standard test die and piston
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 61.5W x 37D x 57H
- Net Weight (Kg) - 35
- 110v - 240vAC, 50 - 60Hz

Options

- Pneumatic Weight Loader
- Test Loads 1.0kg to 21.6kg
- Hastelloy anti corrosive barrel, piston, test die
- Analytical weighing balance

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-MFi10-WL

Melt Flow Indexer inc Weight Loader

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Melt Flow Index is one of the most widely used parameters for the quality control of polymers and is the mass flow rate (g/10min) of a molten polymer at controlled conditions of temperature and pressure, extruded through a very precise orifice.

The MFi10 instrument complete with weight loader offered by **Artemis** is the basic entry level Melt Flow Indexer ideal for laboratories that only do occasional testing. Controlled by a 16th Din PID temperature controller and PT100 thermocouple, temperature set points are easily entered and displayed. Sample cuts are taken manually using the supplied cut off knife at timed intervals which can be monitored using the on-board electronic timer. MFI test results are calculated easily by weighing each sample and conducting a manual calculation.

Supplied as standard the Artemis **MFi10** comes complete with tooling to get you started from switch on including a standard discharge piston, test die and 2.16kg test load. To compliment the instrument a standard cleaning kit is supplied which includes cleaning rod, test die cleaning tool, cotton cleaning cloth and wire bristled brush. The die go/no-go gauge is also supplied to keep check on the die size and a graduated filling cylinder. Optional anti corrosive cylinder, piston and test die can be supplied if corrosive materials such as PVC is to be tested.

Fitted to the instrument is the optional weight loader. Pneumatically operated to 11bar (150 psi) this is an ideal option when using heavier test loads up to 21.6kg. Weights are mounted on the weight stack so they do not have to be lifted onto the piston each test. Momentary switches are fitted to the control panel for moving the weight loader up and down. A cleaning tool attachment is also supplied for a simple cleaning process between tests.

The apparatus conforms to ASTM D3364, ASTM D1238, ISO 1133, DIN 53735 amongst others

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Basic entry level Melt Flow Indexer complete with Pneumatic weight loader
- 1/16 Din PID Temperature controlled
- Temp Range - Ambient to 450 DegC
- Temperature accuracy +/-0.1 DegC
- Thermal stability +/- 0.2 DegC
- Timer resolution 1.0 sec
- Quick change barrel
- Manual sample cut off
- Supplied complete with tooling kit including cleaning tools, levelling device, die go/no-go gauge, standard test die and piston
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 61.5W x 37D x 105H
- Net Weight (Kg) - 55

Options

- Test Loads 1.0kg to 21.6kg
- Hastelloy anti corrosive barrel, piston & test die
- Analytical weighing balance

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com

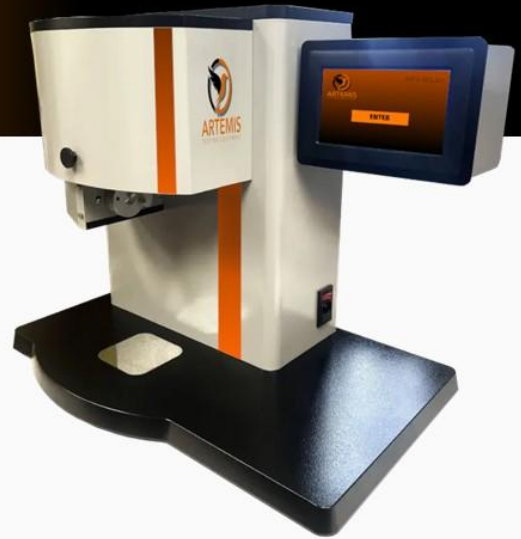


Image shown without guard

ART-MFi20

Melt Flow Indexer

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Melt Flow Index is one of the most widely used parameters for the quality control of polymers and is the mass flow rate (g/10min) of a molten polymer at controlled conditions of temperature and pressure, extruded through a very precise orifice. The MFi20 instrument offered by **Artemis** has a dedicated microprocessor and 7" touch screen interface and conforms to Methods A of International Test standards. Extruded samples are cut by the integrated Auto Cut Device at set time intervals for accurate and repeatable sample weights. MFI test results are calculated easily by weighing each cut or the mean weight of a batch of samples and entering the weight into the microprocessor. Test results are automatically displayed on the touch screen display and can be downloaded into the dedicated LABLogic+ software platform supplied with the instrument. High and low test values can be input for internal QA/QC and Stored Test Parameters can easily be recalled from memory for easy test setup.

Supplied as standard the Artemis MFi20 comes complete with tooling to get you started from switch on including a standard discharge piston, test die and 2.16kg test load. To compliment the instrument a standard cleaning kit is supplied which includes cleaning rod, test die cleaning tool, cotton cleaning cloth and wire bristled brush. The die go/no-go gauge is also supplied to keep check on the die size and a graduated filling cylinder.

Options for the apparatus include, Pneumatic weight loader and Hastelloy barrel, piston and test die for test corrosive materials such as PVC.

The apparatus conforms to ASTM D3364, ASTM D1238, ISO 1133, DIN 53735 amongst others

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Microprocessor controlled
- 7" touch screen panel
- Ethernet, USB & flash drive connection
- LABLogic+ download Software
- Temp Range - Ambient to 450 DegC
- Dual zone heating
- Temperature accuracy +/- 0.1 DegC
- Thermal stability +/- 0.2 DegC
- Timer resolution 0.01 sec
- Automatic sample cut off
- Quick change barrel
- Supplied complete with tooling kit including cleaning tools, levelling device, die go/no-go gauge, standard test die and piston
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 61.5W x 37D x 57H
- Net Weight (Kg) - 35
- 110v—240v AC , 50-60 Hz

Options

- Pneumatic Weight Loader
- Test Loads 1.0kg to 21.6kg
- Hastelloy anti corrosive barrel, piston & test die
- Analytical weighing balance

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-MFi20-WL

Melt Flow Indexer inc Weight Loader

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Melt Flow Index is one of the most widely used parameters for the quality control of polymers and is the mass flow rate (g/10min) of a molten polymer at controlled conditions of temperature and pressure, extruded through a very precise orifice. The MFi20 instrument offered by **Artemis** has a dedicated microprocessor and 7" touch screen interface and conforms to Methods A of International Test standards. Extruded samples are cut by the integrated Auto Cut Device at set time intervals for accurate and repeatable sample weights. MFI test results are calculated easily by weighing each cut or the mean weight of a batch of samples and entering the weight into the microprocessor. Test results are automatically displayed on the touch screen display and can be downloaded into the dedicated LABLogic+ software platform supplied with the instrument. High and low test values can be input for internal QA/QC and Stored Test Parameters can easily be recalled from memory for easy test set-up.

Supplied as standard the Artemis MFi20 comes complete with tooling to get you started from switch on including a standard discharge piston, test die and 2.16kg test load. To compliment the instrument a standard cleaning kit is supplied which includes cleaning rod, test die cleaning tool, cotton cleaning cloth and wire bristled brush. The die go/no-go gauge is also supplied to keep check on the die size and a graduated filling cylinder. Optional anti corrosive cylinder, piston and test die can be supplied if corrosive materials such as PVC is to be tested.

Fitted to the instrument is the optional weight loader. Pneumatically operated to 11bar (150 psi) this is an ideal option when using heavier test loads up to 21.6kg. Weights are mounted on the weight stack so they do not have to be lifted onto the piston each test. Touchscreen operated via the control panel for moving the weight loader up and down the weight loader can also be configured to load the piston automatically at a set period to the test starting. Ideal for faster flowing polymers. A cleaning tool attachment is also supplied for a simple cleaning process between tests.

The apparatus conforms to ASTM D3364, ASTM D1238, ISO 1133, DIN 53735 amongst others

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.



Image shown without guard

Specifications

- Microprocessor controlled Melt Flow Indexer with Pneumatic Weight Loader Fitted
- 7" touch screen panel
- Ethernet, USB & flash drive connection
- LabLogic+ download Software
- Temp Range - Ambient to 450 DegC
- Dual zone heating
- Temperature accuracy +/-0.1 DegC
- Thermal stability +/- 0.2 DegC
- Timer resolution 0.01 sec
- Automatic sample cut off
- Quick change barrel
- Supplied complete with tooling kit including cleaning tools, levelling device, die go/no-go gauge, standard test die and piston
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 61.5W x 37D x 105H
- Net Weight (Kg) - 55

Options

- Test Loads 1.0kg to 21.6kg
- Hastelloy anti corrosive barrel, piston & test die
- Analytical weighing balance

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com

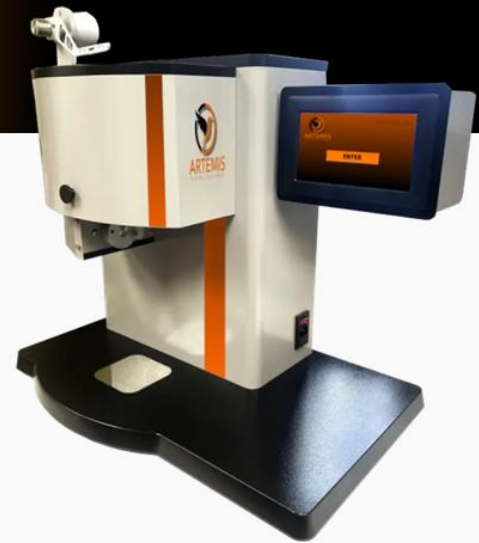


Image shown without guard

ART-MFi30

Melt Flow Indexer

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Melt Flow Index is one of the most widely used parameters for the quality control of polymers and is the mass flow rate (g/10min) of a molten polymer at controlled conditions of temperature and pressure, extruded through a very precise orifice. The MFi30 instrument offered by **Artemis** has a dedicated microprocessor and 7" touch screen interface and conforms to Methods A,B, & C (Method D, FRR with the addition of the weight loader) of International Test standards. Extruded samples can be cut by the integrated Auto Cut Device (method A testing) at set time intervals for accurate and repeatable sample weights and a 10k PPR rotary encoder is fitted which accurately measures the piston displacement for method B,C and D testing. MFR and MVR test results are calculated easily by using the materials Density at Test Temperature value. Test results are automatically displayed on the touch screen display and can be downloaded into the dedicated LABLogic+ software platform supplied with the instrument. The apparatus can quickly calculate MFR, MVR, Viscosity, Shear Stress, Shear rate and Intrinsic Viscosity amongst others. High and low test values can be input for internal QA/QC and multi-slicing values give real time graph analysis and tabular results of the material under test so no physical cutting of the material needs to be done, and Stored Test Parameters can easily be recalled from memory for easy test setup.

Supplied as standard the Artemis **MFi30** comes complete with tooling to get you started from switch on including a standard discharge piston, test die and 2.16kg test load. To compliment the instrument a standard cleaning kit is supplied which includes cleaning rod, test die cleaning tool, cotton cleaning cloth and wire bristled brush. The die go/no-go gauge is also supplied to keep check on the die size and a graduated filling cylinder.

Options for the apparatus include, Pneumatic weight loader and Hastelloy barrel, piston and test die for test corrosive materials such as PVC.

The apparatus conforms to ASTM D3364, ASTM D1238, ISO 1133, DIN 53735 amongst others

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Microprocessor controlled
- 7" touch screen panel
- Ethernet, USB & flash drive connection
- LABLogic+ download Software
- Temp Range - Ambient to 450 DegC
- Dual zone heating
- Temperature accuracy +/-0.1 DegC
- Thermal stability +/- 0.2 DegC
- Timer resolution 0.01 sec
- 10k PPR digital rotary encoder
- Automatic sample cut off
- Quick change barrel
- Supplied complete with tooling kit including cleaning tools, levelling device, die go/no-go gauge, standard test die and piston
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 61.5W x 37D x 57H
- Net Weight (Kg) - 35

Options

- Pneumatic Weight Loader
- Test Loads 1.0kg to 21.6kg
- Hastelloy anti corrosive barrel, piston & test die

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ART-MFi30-WL

Melt Flow Indexer inc Weight Loader

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Melt Flow Index is one of the most widely used parameters for the quality control of polymers and is the mass flow rate (g/10min) of a molten polymer at controlled conditions of temperature and pressure, extruded through a very precise orifice. The MFi30 instrument has a dedicated microprocessor and 7" touch screen interface and conforms to Methods A, B, & C of International Test standards. Extruded samples can be cut by the integrated Auto Cut Device (method A testing) at set time intervals for accurate and repeatable sample weights and a 10k PPR rotary encoder is fitted which accurately measures the piston displacement for method B, C and D testing. MFR and MVR test results are calculated easily by using the materials Density at Test Temperature value. Test results are automatically displayed on the touch screen display and can be downloaded into the dedicated LABLogic+ software platform supplied with the instrument. The apparatus can quickly calculate MFR, MVR, Viscosity, Shear Stress, Shear rate and Intrinsic Viscosity amongst others. High and low test values can be input for internal QA/QC and multi-slicing values give real time graph analysis and tabular results of the material under test so no physical cutting of the material needs to be done, and Stored Test Parameters can easily be recalled from memory for easy test setup.

Supplied as standard the Artemis **MFi30** comes complete with tooling to get you started from switch on including a standard discharge piston, test die and 2.16kg test load. To complement the instrument a standard cleaning kit is supplied which includes cleaning rod, test die cleaning tool, cotton cleaning cloth and wire bristled brush. The die go/no-go gauge is also supplied to keep check on the die size and a graduated filling cylinder. Optional anti corrosive cylinder, piston and test die can be supplied if corrosive materials such as PVC is to be tested.

Fitted with the instrument is the optional weight loader. Pneumatically operated to 11bar (150 psi) this is an ideal option when using heavier test loads up to 21.6kg. Weights are mounted on the weight stack so they do not have to be lifted onto the piston each test. Touchscreen operated via the control panel for moving the weight loader up and down the weight loader can also be configured to load the piston automatically at a set period to the test starting. Ideal for faster flowing polymers. A cleaning tool attachment is also supplied for a simple cleaning process between tests. The fitted weight loader option can also perform FRR tests to method D of the ASTM test standard.

The apparatus conforms to ASTM D3364, ASTM D1238, ISO 1133, DIN 53735 amongst Others. The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.



Image shown without guard

Specifications

- Microprocessor controlled Melt Flow Indexer with Pneumatic Weight Loader fitted
- 7" touch screen panel
- Ethernet, USB & flash drive connection
- LABLogic+ download Software
- Temp Range - Ambient to 450 DegC
- Dual zone heating
- Temperature accuracy +/-0.1 DegC
- Thermal stability +/- 0.2 DegC
- Timer resolution 0.01 sec
- 10k PPR digital rotary encoder
- Automatic sample cut off
- Quick change barrel
- Supplied complete with tooling kit including cleaning tools, levelling device, die go/no-go gauge, standard test die and piston
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 61.5W x 37D x 57H
- Net Weight (Kg) - 35

Options

- Test Loads 1.0kg to 21.6kg
- Hastelloy anti corrosive barrel, piston & test die

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

Precision You Can Trust: The ARTEMIS Edge

In material science, precision isn't just a goal—it's a requirement. **ARTEMIS Sample Analysis Instruments** delivers the high-accuracy data you need to innovate with confidence and maintain a competitive edge.

- **Global Compliance:** Engineered to meet rigid **ASTM, ISO, and DIN** standards for international market readiness.
- **Intelligent Design:** User-friendly **PLC touch-screens** and automated data logging eliminate human error and streamline lab workflows.
- **Total Analysis:** From **Melt Flow Indexing** and **Tensile Strength** to **Impact Resistance**, we provide a complete ecosystem for polymer and material characterization.
- **Industrial Durability:** Built for 24/7 laboratory environments, ensuring a low cost of ownership and long-term reliability.

Stop guessing, start measuring. Choose ARTEMIS for the gold standard in sample analysis.





ART-ESCR

Environmental Stress Cracker

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The **Environmental Stress Cracking Apparatus** is used to determine the susceptibility of ethylene plastics to environmental stress-cracking when subject to conditions of stress in the presence of environments such as soaps, wetting agents, oils or detergents. Under certain conditions of stress these environments can accelerate the mechanical failure of the material by cracking, defined by an internal or external rupture caused by tensile stresses less than its short time mechanical strength

Designed in accordance with the ASTM D1693 international test standard the apparatus is extremely cost effective, very simple to use and is ideal for polymer testing laboratories for testing Environmental Stress-Cracking Resistance of High Density Polyethylene.

Manufactured to a high standard the instrument comes with an integrated temperature bath manufactured from 316 stainless steel and fitted with a 16th Din PID digital temperature controller, heater and a PT100 platinum resistance thermometer which accurately maintains the test temperature, usually $50\text{ }^{\circ}\text{C} \pm 0.5\text{ }^{\circ}\text{C}$ or $100\text{ }^{\circ}\text{C} \pm 0.5\text{ }^{\circ}\text{C}$. To ensure temperature stability within the bath a stirrer motor is fitted and the duration of the test is monitored by a built in electronic timer. For safety the apparatus is fitted with a thermostat and emergency stop and comes complete with a lid to cover the bath when in use.

Internally the bath is fitted with a 316 stainless steel sample rack which holds up to 46 borosilicate test tubes which are immersed in a heat transfer medium. Rubber stoppers to seal the tubes and brass test sample specimen holders are supplied for each tube. The specimen holder is designed to maintain a constant stress on the mid section of the test samples with up to 10 specimens fitted into a specimen holder at one time.

To Compliment the apparatus a full set of tooling is supplied to prepare the sample ready for test. This includes, sample cutting die (38mm x 13mm), sample bending clamp, Sample nicking jig and sample transfer tool.

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Simple Stress Cracking Determination for Ethylene Plastics
- PID temperature control
- Temperature resolution +/- 0.1 °C
- Thermal stability +/- 0.2 °C
- Integrated electronic timer HR:MIN:SEC
- 316 stainless steel bath and test tube rack
- Emergency stop and over temperature thermostat
- Supplied with 46 test tubes, rubber stoppers and brass sample holders.
- Complete with sample cutting die (38mm x 13mm), sample bending clamp, sample nicking jig and sample transfer tool.
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 67W x 33D x 42H
- Net Weight (Kg) - 25
- Available in 110-120v 60Hz and 220-240v 50Hz

Options

- 316 Stainless Steel sample holders
- Manual Sample Press
- Pneumatic Sample Press
- Sample Notching Blades

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS



ART-ULTS

Unrestrained Linear Thermal Film Shrinkage Apparatus

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The **Unrestrained Linear Thermal Film Shrinkage Apparatus** is used to determine the thermal shrinkage of plastic film using a liquid immersion method of testing. The instrument is designed in accordance with the ASTM D2732 International Test Standard and is extremely cost effective, very simple to use and is ideal for polymer testing laboratories within the flexible packaging industry for testing the percentage shrinkage rates of polymer films.

Due to the films manufacturing process internal stresses may be locked into a film or sheet which can be released by heating, causing shrinkage of the material. The amount of shrinkage which takes place is dependent on the test temperature the material is exposed too. Test results are plotted on a graph showing percentage shrinkage against temperature.

Manufactured to a high standard the instrument comes with an integrated temperature bath manufactured from 316 stainless steel and fitted with a 16th Din PID digital temperature controller, heater and a PT100 platinum resistance thermometer which accurately maintains the test temperature to ± 0.1 °C. To ensure temperature stability within the bath a stirrer motor is fitted and the duration of the test monitored by a built in electronic timer. For safety, the apparatus is fitted with a thermostat and emergency stop and comes complete with a lid to cover the bath when in use.

Internally the bath is fitted with a sample rack also made from 316 stainless steel and is supplied with 8 stainless steel sample holders which are immersed in a heat transfer medium. To Compliment the apparatus a sample cutting template 100mm x 100mm is supplied so test samples can be accurately cut with a sharp blade to the required sample dimensions.

To perform a test the apparatus is heated to test temperature and the test samples immersed in the heat transfer medium. After 10 seconds they are removed and allowed to cool back to room temperature. A measurement of the sample is taken across longitudinal and transverse directions and the percentage shrinkage calculated against its original size.

The instrument's economical features and high temperature accuracy make it a valuable piece of testing equipment within the polymer film industry

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Simple determination of thermal film shrinkage
- Liquid immersion method. Conforms to ASTM D2732
- PID temperature control
- Temperature resolution ± 0.1 °C
- Thermal stability ± 0.2 °C
- Integrated electronic timer HR:MIN:SEC
- 316 stainless steel bath and sample rack holder
- Emergency stop and over temperature thermostat
- Supplied with 8 stainless steel sample holders.
- Supplied complete with sample cutting template 100mm x 100mm
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 67W x 33D x 42H
- Net Weight (Kg) - 25
- Available in 110-120v 60Hz and 220-240v 50Hz

Options

- 316 Stainless Steel sample holders
- Manual Sample Press
- Pneumatic Sample Press
- Test Sample Cutting die 100mm x 100mm

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-HPFS

Hot Plate Thermal Film Shrinkage Apparatus

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The **Hot Plate Thermal Film Shrinkage Apparatus** is used to determine the thermal shrinkage of plastic film using a "Hot Plate" method of testing. The instrument has been designed to be extremely cost effective, very simple to use and is ideal for polymer testing laboratories within the flexible packaging industry for testing the percentage shrinkage rates of polymer films.

Due to the films manufacturing process internal stresses may be locked into a film or sheet which can be released by heating, causing shrinkage of the material. The amount of shrinkage which takes place is dependent on the test temperature the material is exposed too. Test results are plotted on a graph showing percentage shrinkage against temperature.

Manufactured to a high standard the instrument comes with an integrated heated sample plate manufactured from 304 stainless steel. Temperature is controlled by a 16th Din PID digital temperature controller, heater and a PT100 platinum resistance thermometer which accurately maintains the test temperature to +/- 0.1 °C. A built in electronic timer monitors the duration of the test. For safety, the apparatus is fitted with an over temperature thermostat.

To Compliment the apparatus a sample cutting template 100mm x 100mm is supplied so test samples can be accurately cut with a sharp blade to the required sample dimensions. The Template is also used as a weight to keep the film pressed flat against the heated sample plate.

To conduct simple test a film sample of round or rectangular shape is placed on the hot plate which is maintained at a constant temperature. The surface of the hot plate is lightly oiled with silicone oil to ensure good heat transfer from the hot plate to the film and a light cover plate which keeps the film flat is placed on the top of the film sample. After a set time the film is removed from the hot plate and cooled to room temperature. It is then re-measured and its percentage shrinkage determined.

Although the apparatus is not controlled by any International test standard the instrument's economical features and high temperature accuracy make it a valuable piece of testing equipment within the polymer film industry

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Simple determination of thermal film shrinkage
- Hot Plate method of testing
- Hot Plate size 128mm x 128mm
- PID temperature control
- Temperature Range ambient to 200°C
- Temperature resolution +/- 0.1 °C
- Thermal stability +/- 0.2 °C
- Integrated electronic timer HR:MIN:SEC
- 304 stainless steel heated plate
- Over temperature thermostat
- Supplied complete with sample cutting template 100mm x 100mm
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 40W x 30D x 15H
- Net Weight (Kg) - 15
- Available in 110-120v 60Hz and 220-240v 50Hz

Options

- Manual Sample Press
- Pneumatic Sample Press
- Test Sample Cutting die 100mm x 100mm

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ART-DDi10

Falling Drop Dart Tester

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The **Falling Dart Impact Tester** provides a basic method for determining the energy that causes plastic film or other flexible materials, usually no greater than 0.25mm, to fail under impact from a free falling dart. The energy required to tear or puncture the test specimen is expressed in terms of the darts weight (mass) which would result in the failure of 50% of specimens being tested. The instrument complies with methods A & B of the ASTM D1709 and ISO 7765 testing standards

The methods of holding the test specimen and releasing the dart are designed so that they may be accurately repeated for each test performed. Test specimens are securely clamped in the two piece pneumatic clamp system ensuring test repeatability without slippage of the sample. Standard dart drop heights of 660mm or 1500mm (optional extension kit required) fulfil the test requirement and can be easily set up. The instrument is a two handed operation to ensure optimum operator safety, to clamp the sample which then allows you to release the dart which is secured by an electro magnet. A dart rebound guard is also supplied to ensure the operators safety from rebounding darts.

Test calculations and reports are generated manually after each test and sample batch.

The apparatus is supplied as standard with an aluminium dart with a 38.1mm (1 1/2") spherical radius tip and a set of binary weights for testing up to 2kg in drop mass. Additional weights can be supplied if required (optional)

The instrument is multi voltage and designed to be bench mounted at 660mm drop height but can easily be placed on a floor if the 1.5mtr drop height test is required and you have limited ceiling height.

The instrument is ideal for laboratories that require simple testing to the ISO and ASTM test standards for the flexible packaging industry.



Specifications

- Conforms to ASTM D1709 & ISO 7765 test standards
- Bench mounted
- 660mm drop height as standard
- Manually operated
- Pneumatic sample clamp system
- Electro magnet dart release
- Two handed operation for user safety
- Simple to operate
- Weight (kg) - 35kg
- Dimensions - 44cm x 54cm x 120cm
- Traceable calibration certificate
- Product user manual
- UKCA/CE Declaration
- Warranty - 1 year return to base.
- 110v—240v AC, 50-60 Hz

Options

- Method B extension kit - includes 50.8mm (2.0") dart & weight set
- Addition test weights methods A & B

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ART-DDi20

Falling Drop Dart Tester

V1.02

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The free **Falling Dart Impact Tester** provides an advanced method of testing over the basic model for determining the energy that causes plastic film or other flexible materials, usually no greater than 0.25mm, to fail under impact from a free falling dart. The energy required to tear or puncture the test specimen is expressed in terms of the darts weight (mass) which would result in the failure of 50% of specimens being tested. The instrument complies with methods A & B of the ASTM D1709 and ISO 7765 testing standards

Integrated with a dedicated microprocessor and 7" touch screen interface test results and sample batches are simple to calculate and report. Test setup is entered and stored for future use and test results are automatically displayed on the touch screen display which can be downloaded into the dedicated LABLogic+ software platform, supplied with the instrument, by Ethernet or USB connection to PC or downloaded straight to a USB flash drive.

The methods of holding the test specimen and releasing the dart are designed so that they may be accurately repeated for each test performed. Test specimens are securely clamped in the two piece pneumatic clamp system ensuring test repeatability without slippage of the sample. Standard dart drop heights of 660mm or 1500mm (optional extension kit required) fulfil the test requirement and can be easily set up. The instrument is a two handed operation to ensure optimum operator safety, to clamp the sample which then allows you to release the dart which is secured by an electro magnet. A dart rebound guard is also supplied to ensure the operators safety from rebounding darts.

The apparatus is supplied as standard with an aluminium dart with a 38.1mm (1 1/2") spherical radius tip and a set of binary weights for testing up to 2kg in drop mass. Additional weights can be supplied if required (optional)

The instrument is multi voltage and designed to be bench mounted at 660mm drop height but can easily be placed on a floor if the 1.5mtr drop height test is required and you have limited ceiling height.



Specifications

- Conforms to ASTM D1709 & ISO 7765 test standards
- Dedicated Microprocessor and 7" touch screen display
- LabLogic+ software included
- Bench mounted
- 660mm drop height as standard
- Polycarbonate Anti-Rebound Tube
- Pneumatic sample clamp system
- Electro magnet dart release
- Two handed operation for user safety
- Weight (kg) - 35kg
- Dimensions - 44cm x 54cm x 120cm
- Traceable calibration certificate
- Product user manual
- UKCA/CE Declaration
- Warranty - 1 year return to base.
- 110-240v AC, 50-60 Hz

Options

- Method B extension kit - includes 50.8mm (2.0") dart & weight set
- Addition test weights methods A & B

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS

TESTING INSTRUMENTS

ART-DDi20

Falling Drop Dart Tester Display

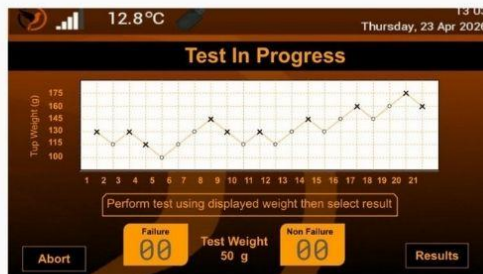
V1.02

Performing Drop Dart tests has never been so simple using the Artemis DDi20 Drop Dart Impact Tester. Intuitive setup and test procedures are performed with ease eliminating operator error and calculating test results saving time manually calculating test results and populating statistical graphs.



Simple data entry for test setup using the large 7" touch screen keypad is simple. User, sample identification and batch data are all input and stored in memory for future recall as well testing configurations for general results

Graphical display of the test in process is shown clearly with each Failure/Non-Failure of the sample material identified and counted. Simple prompts tell the user when to add or remove weight after each test.



Batch Statistics		Test Results		
No. of Tests	21	No. of Tests	Start Time	TUP (g)
Failure Count	10	18	1:35:25	160
Non Failure Count	11	19	1:38:54	175
Test Status	Valid Test Completed	20	1:41:43	160
Impact Failure Weight	134.0 g	21	2:03:37	165

End of test is clearly defined with final test result automatically calculated. History of the individual test results can be clearly seen in tabular form and can either downloaded to LABlogic+ software for reporting or exported to connected USB stick.



Specifications

- 7" touch screen display
- Simple parameter and test setup
- User ID, Sample ID, Tip Type stored in memory
- Staircase graphical display of test in progress
- Each test recorded as Failure/Non Failure so you can keep track of how many samples have been tested
- Simple user prompt to add or remove weight after each sample tested
- Automatic end of test displays test result and batch statistics and test result history displayed in tabular form
- Batch Results automatically updated after each round of tests
- Results can be downloaded supplied LABlogic+ software for reporting or exported to a connected USB stick for future recall into LABlogic+

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-UPIT

Universal Pendulum Impact Tester

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The Artemis **Universal Pendulum Impact Tester** has been designed in accordance with ISO13802 to determine the energy required to break test specimens processed from plastics, composites, ceramics and non ferrous metallic materials to International testing methods for Izod, Charpy, Tensile Impact testing and Component testing, including small pipe sections and should more than meet your growing demand for accurate and precise testing to ASTM and ISO testing methods for resin manufacturers, polymer processors, construction, automotive and aerospace industries.

The instruments ease of operation and high accuracy makes it ideal for QA/QC within Production, Research and Development labs and Teaching Institutions. Impact velocities are variable up to 3.8 m/s covering testing methods ASTM D256 (Izod), ASTM D6110 (Charpy), ISO179 (Charpy), ISO180 (Izod) and ISO8256 (Tensile Impact). Highly accurate variable weight and single piece impact pendulums are available up to 50J capacity which are released by an electro magnet. Impact energies are calculated using a 1k PPR optical rotary encoder which records the lost angle of rise after impacting a test sample against the angle of rise recorded from the pendulums initial calibration procedure at a given velocity, taking into account friction and windage. The resulting lost angle is calculated as the test sample's Impact Energy in KJ/M, KJ/M² or ft-lbs/in, ft-lbs/in².

Test setup is simple by entering data on the 7" touch screen panel which provides simple on screen instructions. Test parameters such as operator names, material reference codes and batch codes are entered and stored in lists for test result presentation and future test result recall. Test type and testing parameters such as impact hammer weight, impact velocity and sample dimensions are entered to give the required testing conditions. For QA/QC purposes high and low limits can easily be set allowing the user to instantly assess if the material under test is a pass or fail.

Test results are recorded and displayed after each test and downloaded into the supplied **LABLogic+** software either by USB, Ethernet or direct download to USB flashdrive for import into **LABLogic+**. Batch statistics of mean, standard deviation and co-efficient of variation are automatically updated after each test and results are shown in graphical and tabular format for analysis and reporting. Sample break types are also captured as Full, Partial, Hinged and Non-break and detailed on the test report.

The instrument is supplied complete with fully interlocked enclosure and dual button pendulum release for user safety as well as a pendulum brake, The instrument conforms to ISO13802, ASTM D256, ASTM D6110, ISO179, ISO180, ISO8256 method A amongst others.

The apparatus is supplied multi voltage 110-240v 50/60 Hz.

Specifications

- Microprocessor controlled
- 7" touch screen panel
- Ethernet, USB, Flash drive connection and LabLogic+ PC Software
- Graphical and Tabular result profiles and statistical analysis
- Conforms to ISO 13802
- Up to 50J testing energies for Izod, Charpy, Tensile Impact and Component testing
- Conforms to ISO and ASTM Testing methods ASTM D256 and 6110, ISO 179 and 180, ISO 8256 method A (specimen in bed)
- Test results units in KJ/M, KJ/M² and FT/LBs force
- Variable Velocity to 3.8 m/s (12.47 ft/sec) with Electro magnet pendulum release
- 1k PPR digital rotary encoder
- Self calibrating for Frictional losses and windage
- Electro magnetic pendulum brake
- Fully Interlocked enclosure and 2 button pendulum release for operator safety.
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 110W x 52D x 78H
- Net Weight (Kg) - 145

Options

- Izod, Charpy, Tensile Impact Fixtures
- Component Fixtures to customers specific requirement
- Izod, Charpy and Tensile Impact Pendulums to 50J

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-COF

Co-efficient of Friction Tester

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The **Co-efficient of Friction Tester** is one of the most widely used instruments in the quality control of polymer films within the flexible packaging and coatings industries and has been designed to meet ASTM D1894 and ISO 8295 international Testing Standards to understand the "Slip" properties of materials that impact the production process of polymer films or frictional properties coatings have on base materials.

A dedicated flat bed (horizontal) test instrument, Static and Dynamic (kinetic) coefficient of friction properties of materials are calculated using specified test conditions such as test sled weight, test velocity and temperature making this apparatus ideal for all types of flexible packaging, foils, paper, board, rubber, laminates and textiles for R&D laboratories or QA/QC validation and verification. Repeatable test results for co-efficient values with normal separating loads less than 1 kgf are easily determined using the standard test sled or specific peel attachments. Complimented with a 7" touch screen panel, test setup is simple and can be configured for test speed, test distance, test temperature (optional heated bed required), test sled weight and sled dwell time.

During the test procedure the static friction value is taken at the precise moment that movement occurs then dynamic (kinetic or sliding) friction is immediately observed and recorded graphically. To measure this peak friction value, the on-board microprocessor continually monitors the output signals of the load cell. Load cell readings are taken beyond the peak static load in order to confirm that the slope of the load curve is reducing. When the static frictional value has been determined by the microprocessor the dynamic friction is measured during the selected travel distance. The result given is the average of these readings. However, by displaying the results graphically on a computer, each of the readings can be inspected to examine any variation in the test results over the selected travel distance. High and low test values can be input for internal QA/QC and multi-slicing values give real time graph analysis and tabular results of the material under test so no physical cutting of the material needs to be done, and Stored Test Parameters can easily be recalled from memory for easy test setup.

Supplied as standard with a 200g test sled to either the ASTM or ISO test standard, calibration kit and Artemis' LABLogic+ software for reporting. Connectivity to PC is via USB or Ethernet or direct download to USB flash drive so test results can be opened in LABLogic+. The apparatus is available with a heated bed for sample testing at elevated temperatures or vacuum bed option to ensure material lies flat to the test bed. Other options are available for 90deg and 180 deg peel testing for pressure sensitive tapes.

The machine is multi voltage as standard 110v—240v 50/60hz but configured to correct country voltage if heated bed option is fitted.

Specifications

- **Microprocessor controlled**
- 7" touch screen panel
- Ethernet, USB & flash drive connection
- LABLogic+ download Software
- 1kg (10N) load cell fitted as standard
- Variable test speeds up to 1600mm/min
- Variable test travel distance up to 350mm
- Calculations for Static and Dynamic (kinetic) COF values. μ & grams
- Servo motor control
- User definable sample dwell period
- Graphical test results.
- Sample cutting template
- Supplied complete with ASTM od ISO 200g test sled and load cell calibration kit
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 65W x 40D x 20H
- Net Weight (Kg) - 20

Options

- Heated Bed
- Vacuum Bed
- Test sled with adjustable mass (no greater than load cell capacity).
- "Fishtail effect" stabilizer

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ARTEMIS: Strength in Every Sample

Whether you're in a high-throughput lab or a specialized research cell, the quality of your pellet dictates the quality of your data. **ARTEMIS** provides the heavy-duty precision required to transform raw powders into perfect samples.

The ARTEmis Press Advantage

- **Complete Control:** Choose between our **Manual Sample Presses** for tactile, cost-effective precision or our **Pneumatic Presses** for high-volume repeatability and reduced operator fatigue.
- **Precision-Engineered Dies:** Our high-grade stainless steel **Press Sample Dies** are polished to a mirror finish, ensuring easy pellet release and zero cross-contamination.
- **Built to Last:** Engineered for durability, our equipment handles high-pressure loads (up to **25+ Tons**) without frame deflection, ensuring uniform density every time.
- **Standardized Results:** Eliminate crumbling or inhomogeneous samples. ARTEmis hardware provides the consistent compression necessary for *XRF*, *FTIR*, and XRD analysis.

Stop fighting with inconsistent pellets. From manual versatility to pneumatic power, ARTEMIS delivers the force you need with the precision you demand.

ARTEMIS. The Foundation of Great Analysis.

ARTEMIS
TESTING INSTRUMENTS



ART-FSC

Film Strip Cutter

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The Film Strip Cutter offers simplicity for producing parallel rectangular test samples to meet International Test Standards such as ASTM and ISO for tensile and tear testing, from materials such as Foils, Films and Papers making the apparatus a perfect fit for the flexible packaging industry.

The instrument is ideal for laboratory use to produce test samples very quickly and efficiently when conventional cutting dies would not be suitable or recommended due to the thickness of the material and length of the sample needed.

Extremely simple to use with a push down and pull application, the spring loaded cutting head is supported on a linear rail guide to ensure rigidity and accuracy when cutting.

The instrument base is recessed to accept a self sealing cutting base pad which increases blade life and cut quality. An integral bar clamping mechanism is also fitted to firmly support the sample material during the cutting process.

As standard the cutting stroke length is 455mm so can easily accommodate A4 sample length sizes but this can be increased to suit customer's individual requirements if needed. The maximum cutting width is 150mm and cutting heads can be supplied in various widths from 0.25mm to 150mm. Due to the gantry style design rolls of film can easily be pulled through the apparatus which saves material.

Stainless Steel razor blades are fitted to the cutting head as standard but are also available TiN coated or PTFE coated to reduce friction and increase blade life during the cutting process. With a minimum cut width of 0.25mm, cutting heads can be supplied to cut single or multiple test samples in one single pass which increases your testing capacity and productivity.

To operate the instrument, clamp the sample in place, push the cutter down on top of the material and pull the cutter forward to the end of its travel or the length of the sample needed. Simply release the clamp, remove the material and trim the sample to the required length.

Specifications

- Simple to operate Film Strip Cutter
- Ideal for cutting flexible films, foils and paper
- Robust linear guideway rail system
- Spring loaded cutting head assembly
- Integral sample clamping rail
- Interchangeable cutting heads
- Cutting head widths from 0.25mm to 150mm
- Multi-Strip cutters available
- Maximum cutting stroke 455mm
- Dimensions (w x d x h)
60cm x 30cm x 17cm
- Weight (kg) 15
- Product user manual
- UKCA/CE declaration certificate

Options

- Multi width cutting heads available to customers requirements
- Stainless Steel, PTFE & TiN cutting blades available

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-MSP

Manual Sample Press

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The Manual Sample Press offers simplicity for producing a variety of test sample shapes to meet International Test Standards such as ASTM D412, D638 and ISO 527 and many more from materials including Plastics (including pipe), Rubbers, Fabrics, Foils, Films and Papers.

Ideal for laboratories and workshop for low volume applications the apparatus can quickly produce test samples very efficiently. Test Sample Cutting Dies for the apparatus are also available from **Artemis** to any recognized International Test Standard or customer's own requirements.

The apparatus has a two handed lever operation capable of producing 6KN of cutting force depending on the user and has a maximum cut thickness of 5mm depending on material type.

The apparatus is supplied with an adjustable arbor attachment for ease of mounting and setting the cutting dies so the correct cutting depth can be obtained. Non standard arbors can also be manufactured to suit customer's own unique requirements.

A generous cutting board footprint of 30cm x 25cm is standard and cutting boards of different material densities are available to suit the materials being cut. Natural Polypropylene is supplied as standard.



Specifications

- Manual Lever Operation
- Fmax - 6KN
- Throat Depth 105mm
- Two Handed Operation for Safety
- Height Adjustable Cutting Arbor
- Simple Cutting Die Attachment
- 30cm x 250cm Cutting Base
- Supplied with PP Cutting Board
- UKCA/CE Certified
- Dimension (CM) -34W x 34D x 75H
- Net Weight (Kg) - 10

Options

- Cast Nylon Cutting Board (Ideal for Films/Foils)
- Test Sample Cutting Dies manufactured to recognized International Testing Standards such as ASTM, ISO, DIN, and JISK amongst others.

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-PSP

Pneumatic Sample Press

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**

The Electro-Pneumatic Sample Press offers user safety and simplicity for producing a variety of test sample shapes to meet International Test Standards such as ASTM D412, D638 and ISO 527 and many more from materials including Plastics (including pipe), Rubbers, Fabrics, Foils, Films and Papers.

Ideal for laboratories and workshop use the apparatus can quickly produce test samples very efficiently. Test Sample Cutting Dies for the apparatus are also available from **Artemis** to any recognized International Test Standard or customers own requirements.

The apparatus has a two handed push button operation for user safety and has a maximum operating pressure of 160 PSI (11 Bar) generating a maximum cutting force of 50KN and has a maximum cut thickness of 8mm depending on material type.

The apparatus is supplied with an adjustable arbor attachment for ease of mounting and setting the cutting dies so the correct cutting depth can be obtained. Non standard arbors can also be manufactured to suit customers own unique requirements.

A generous cutting board footprint of 30cm x 25cm is standard and cutting boards of different material densities are available to suit the materials being cut. Natural Polypropylene is supplied as standard.

The apparatus can be supplied in either 110-120v 60 Hz and 220-240v 50 Hz.

Specifications

- Electro-Pneumatic Operation
- 110-120v 60Hz or 220-240v 50Hz
- 160 PSI (11 Bar) Max Pressure
- Fmax - 50Kn
- Throat Depth 125mm
- Two Handed Operation for Safety
- Height Adjustable Cutting Arbor
- Simple Cutting Die Attachment
- 30cm x 25cm Cutting Base
- Supplied with PP Cutting Board
- UKCA/CE Certified
- Dimension (CM) -35W x 47D x 65H
- Net Weight (Kg) - 60

Options

- Cast Nylon Cutting Board (Ideal for Films/Foils)
- Test Sample Cutting Dies manufactured to recognized International Testing Standards such as ASTM, ISO, DIN, and JISK amongst others.

Artemis Instruments

A Microtrol Brand

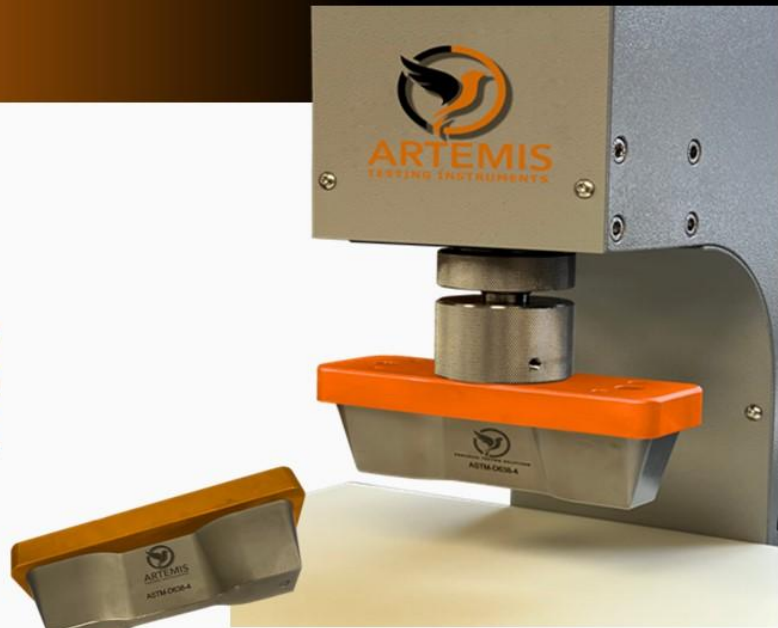
16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-TSCD Test Sample Cutting



Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

The Test Sample Cutting Dies offer simplicity for producing a variety of test sample shapes to meet International Test Standards for example, ASTM D412, D638, ISO 527 and many more from materials such as Plastics (including pipe), Rubbers, Fabrics, Foils, Films and Papers.

These cutters are Ideal for laboratories and workshops to produce test samples very quickly and efficiently and are complimentary to the range of Cutting Presses offered by **Artemis** which are available in Manually Operated or Electro-Pneumatic variants. Cutters are manufactured and supplied to any International Test Standard or can be manufactured to customers specific requirements.

Manufactured from high quality press tool grade carbon steel the cutters are EDM machined for accurate tolerancing, heat treated and diamond lapped on each of the cutting edges to increase wear resistance and tool life.

Cutting dies are fitted with a 25mm dia fixing arbor as standard . Non standard arbors can also be fitted to meet customers specific requirements so the cutters fit into other manufacturers equipment. Also supplied as standard is a spring loaded ejection system which not only ejects the sample after being cut but also protects the cutting edge and users hands when handling the dies.

If required the cutting dies can also be supplied without the fitted ejection system to meet customers specific applications.

Specifications

- Robust Test Sample Cutting Dies
- Manufactured to International Testing Standards such as ASTM, ISO, DIN, and JISK amongst others
- Manufactured from high quality press tool grade steel
- EDM machined for accurate tolerancing
- Diamond lapped cutting edges
- Spring Loaded Ejection System for easy automatic sample ejection and cutter edge protection
- Standard Arbor 25mm Dia
- Ideal for cutting soft plastics, rubbers, films, foils and papers
- Certificate of conformity supplied

Options

- Non Standard arbors to suit customers requirements.

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-MNC

Motorized Notching Cutter

V1.01

In modern materials testing, precision isn't optional, it is the foundation on which every credible result is built. Nowhere is this more evident than in the preparation of Impact and Charpy specimens, where the geometry of a single notch can influence the outcome of an entire test series. Stepping firmly into this critical space, **Artemis Instruments** presents the **Motorized Notching Cutter**, a machine engineered not only to meet the stringent requirements of **ISO 179, ISO 180, ASTM D256 and ASTM D6110**, but to raise the standard of what laboratories can expect from automated specimen preparation.

At the centre of the system is Artemis' advanced adaptive microprocessor control unit, designed to ensure that feed and cutter speeds are always optimised for the material under test. Operators work through a clear, intuitive touchscreen interface, with all cutting parameters stored in onboard memory for rapid recall. With cutter speeds ranging from 350 to 2350 rpm and feed rates as low as 0.05 mm/rev, the machine delivers consistent performance across routine plastics and more demanding engineering materials alike.

Efficiency is built into every aspect of the design. The anti vibration guide rail system ensures exceptional profile accuracy, while the multi sample vice holds up to 20 specimens, 4 mm thick, enabling a full batch to be notched in roughly 20 seconds. The auto return mechanism resets the vice for the next loading cycle, and precision tools including micro height adjustment, a notch depth comparator and a sample setting gauge guarantee uniform notch geometry across every specimen produced.

Safety remains a priority. A full polycarbonate guard encloses the cutting area and incorporates an electrical interlock, preventing operation when open and ensuring safe, controlled workflow in busy laboratory environments. An emergency stop compliments user safety requirements.

Completing the system are Artemis' tungsten carbide cutting wheels, each optically ground to minimise cutter load and maximise durability. A full range of "V" and "U" notch profiles are available, alongside custom geometries for specialised applications.

With intelligent control, robust engineering and high throughput capability, the **Artemis Instruments Autocycle Notching Cutter** is built for laboratories where precision truly matters.

The apparatus is multi voltage from in **110-240 V - 50-60 Hz**.

Specifications

- Fully compliant with ISO and ASTM International Test Standards amongst others.
- Adaptive microprocessor control for optimised cutting parameters
- Intuitive touchscreen interface with onboard memory
- High precision feed rates down to 0.05 mm/rev
- Cutter speed range 350-2350 rpm
- Multi sample vice: holds up to 20 specimens (4 mm thick)
- Batch notching cycle: ~20 seconds
- Anti vibration guide rail for profile accuracy
- Auto return vice positioning
- Manual cutter height adjustment
- Tungsten carbide cutting wheels
- Polycarbonate safety enclosure with electrical interlock
- Emergency Stop
- Fully traceable certificate of calibration and instrument user manual
- UKCA/CE Certified
- Dimension (CM) - 57W x 35D x 31H
- Net Weight (Kg) - 15
- 110-240v - 50-60Hz
- Warranty 12 months

Options

- Standard Cutter wheels - V notch: 0.10 mm, 0.25mm, 1.00 mm -U notch: 0.80 mm, 2.00 mm
- Air Cooling

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ARTEMIS: Precision in Every Particle

In industries where efficiency is measured by the gram, understanding **Bulk Density** is the key to optimizing transportation costs, processing throughput, and storage footprints. **ARTEMIS Testing Instruments** provides a brand-new range of world-class apparatuses designed to transform material handling into a precise science.

Our Specialized Range

We offer a comprehensive selection of instruments engineered to meet the most rigorous international standards:

- **ASTM D1895 Method B:** Features a **2.54cm outlet bore**, making it the ideal solution for powders that typically "cake" or "bridge" in smaller funnels.
- **ASTM D1895 Method C:** Designed specifically for bulky materials like **coarse flakes, chips, and cut fibers**. It includes a weight plunger with an integrated metric scale for precise compression measurements.
- **ISO R60:** A robust system with a **3.3cm outlet bore**, perfect for larger granules (>3mm) or materials prone to clogging.
- **ISO 6186 (Bulk Density & Pourability):** The ultimate in versatility, supplied with **three interchangeable nozzles** (10mm, 15mm, and 25mm) to accurately ascertain the processability of various powders and granules.

The ARTEMIS Advantage

- **Premium Engineering:** Every funnel is **CNC machined from aluminium**, polished internally to reduce friction, and **anodized** to minimize electrostatic discharge during testing.
- **Ready for Compliance:** All units are **UKCA/CE Certified** and supplied with a **Certificate of Calibration**, ensuring your lab stays audit-ready.
- **Total Workflow Support:** Our apparatuses come complete with measuring cups, overflow catch trays, and robust stands with integrated **material shut-off** to prevent flow prior to testing.

Standardize your quality control and eliminate the guesswork in material processing. Choose ARTEMIS for bulk density analysis that is as reliable as your research.

ARTEMIS. Precision. Efficiency. Consistency.



ARTEMIS
TESTING INSTRUMENTS

ART-BDA-ISO 6186

Bulk Density and Pourability Apparatus

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Bulk Density also often called Apparent Density is an extrinsic material property and is defined as the mass or weight of particles per unit volume including the space that they occupy. The measurement is useful for materials that include powders, granules, flakes and other divided materials. Typical examples are moulding powders, resins, granules and mineral components such as soil and gravel and it is very useful in understanding the bulk density of solid materials in industries that handle, process, and transport a variety of materials efficiently, which can change depending on how the material is handled.

The importance of Bulk Density

Handling and Transportation: Bulk density impacts handling and transport including material storage and transportation costs.

Processing Efficiency: Understanding bulk density is essential when it comes to designing efficient processing equipment. This helps to determine appropriate size, capacity, and throughput of the equipment.

Mixing and Blending: Bulk density is crucial for accurately mixing and blending ingredients to ensure consistent product quality crucial for food and pharmaceuticals.

Storage Optimization: Different materials have varying bulk densities. Optimizing storage based on these bulk densities ensures efficient space utilization and minimizes the storage footprint.

The **ISO 6186** Bulk density is the ideal instrument for laboratories testing bulk density and pourability of materials such as powders and granules. The funnel is supplied on a robust stand with material shut off to prevent flow from the funnel prior to testing. The funnel meets the specifications to the ISO 6186 test standard and supplied with three interchangeable nozzles of 10mm, 15mm, and 25mm diameters which makes it ideal for ascertaining the processability and process control of the materials under test. The apparatus is also supplied with a standard measuring cup with a volume of 100cm³ for bulk density testing. An overflow catch tray compliments the apparatus when scraping the excess material from the measuring cup or can be used to catch material during a pourability test which can then be returned to the feedstock for re-use. The funnels are CNC machined and polished internally from aluminium and are then anodised coated to reduce electrostatic discharge.



Specifications

- ISO 6186 Bulk Density and Pourability Funnel
- Manufactured to ISO 6186 International Testing Standard.
- Manufactured from CNC machined Aluminium and anodized
- Polished funnel to $\leq 0.8\text{Ra}$
- 10mm, 15mm & 25mm interchangeable funnel nozzles and locking ring
- Robust stand and sample shut off
- Sample overflow tray
- 100cm³ +/- 0.5cm sample measuring cup supplied
- Ideal for small samples or particles
- Dimensions - 22.5cm x 18cm x 23cm
- Weight (kg) - 5kg
- UKCA/CE Certified
- Certificate of Calibration

Options

- Weighing Balance 0.01g, 1100g capacity.
- Digital Stopwatch 0.1 sec

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-BDA-ISOR60

Bulk Density Apparatus

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Bulk Density also often called Apparent Density is an extrinsic material property and is defined as the mass or weight of particles per unit volume including the space that they occupy. The measurement is useful for materials that include powders, granules, flakes and other divided materials. Typical examples are moulding powders, resins, granules and mineral components such as soil and gravel and it is very useful in understanding the bulk density of solid materials in industries that handle, process, and transport a variety of materials efficiently, which can change depending on how the material is handled.

The importance of Bulk Density

Handling and Transportation: Bulk density impacts handling and transport including material storage and transportation costs. .

Processing Efficiency: Understanding bulk density is essential when it comes to designing efficient processing equipment. This helps to determine appropriate size, capacity, and throughput of the equipment.

Mixing and Blending: Bulk density is crucial for accurately mixing and blending ingredients to ensure consistent product quality crucial for food and pharmaceuticals.

Storage Optimization: Different materials have varying bulk densities. Optimizing storage based on these bulk densities ensures efficient space utilization and minimizes the storage footprint.

The **ISO R60** Bulk density funnel is supplied on a robust stand with material shut off to prevent flow from the funnel prior to testing. The funnel meets the specifications in the ISO and ASTM D1895 (Appendix) test standard. The outlet bore size of the funnel is 3.3cm and is ideal for testing materials that would not typical flow through the ASTM D1895 method A funnel type. These materials would be typically powders, which can cause "caking" at the outlet bore or larger particles including flakes or granules typically bigger than 3mm in size. Also supplied is a standard measuring cup with a volume of 100cm³. An overflow catch tray complements the apparatus when scraping the excess material from the measuring cup which can then be returned to the feedstock for re-use. The funnels are CNC machined and polished internally from aluminium and are then anodised coated to reduce electrostatic discharge.



Specifications

- ISO R60 Bulk Density Funnel
- Manufactured to ISO (ASTM D1895 appendix) International Testing Standard.
- Manufactured from CNC machined Aluminium and anodized
- Polished funnel
- 3.3cm funnel opening
- Robust stand and sample shut off
- Sample overflow tray
- 100cm³ sample measuring cup supplied
- Ideal for small samples that would usually cause "caking" at the bore or larger material sizes typically larger than 3mm in size
- Dimensions - 22.5cm x 18cm x 23cm
- Weight (kg) - 5kg
- CE Certified
- Certificate of Calibration

Options

- Weighing Balance 0.01g, 1100g capacity.

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ART-BDA-ASTM D1895-C Bulk Density Apparatus

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**

Bulk Density also often called Apparent Density is an extrinsic material property and is defined as the mass or weight of particles per unit volume including the space that they occupy. The measurement is useful for materials that include powders, granules, flakes and other divided materials. Typical examples are moulding powders, resins, granules and mineral components such as soil and gravel and it is very useful in understanding the bulk density of solid materials in industries that handle, process, and transport a variety of materials efficiently, which can change depending on how the material is handled.

The importance of Bulk Density

Handling and Transportation: Bulk density impacts handling and transport including material storage and transportation costs. .

Processing Efficiency: Understanding bulk density is essential when it comes to designing efficient processing equipment. This helps to determine appropriate size, capacity, and throughput of the equipment.

Mixing and Blending: Bulk density is crucial for accurately mixing and blending ingredients to ensure consistent product quality crucial for food and pharmaceuticals.

Storage Optimization: Different materials have varying bulk densities. Optimizing storage based on these bulk densities ensures efficient space utilization and minimizes the storage footprint.

The **ASTM D1895 method C** Bulk density funnel meets the specification of the ASTM D1895 test standard. Used for materials such as course flakes, chips, cut fibers and strands that cannot be readily poured through density funnels such as ASTM D1895-A and ASTM D1895-B. The apparatus is ideal for materials which are typically very bulky when poured and which can reduce when compressed.

The apparatus is supplied with a 1000cm³ capacity measuring cylinder and weight plunger, capable of holding 2.5kg of lead ballast. The weight plunger has an integrated metric scale in 1mm graduations for taking measurements and handles for lifting.



Specifications

- ASTM D1895-C Bulk Density
- Manufactured to ASTM D1895-C International Testing Standard.
- Manufactured from CNC machined Aluminium and anodized
- Measuring cylinder 1000cm³
- Weight Plunger cylinder with Metric Scale and lifting handles
- Ideal for larger samples or particles such as course flakes, chips, cut fibers and strands
- Dimensions - 20cm x 13cm x 19cm
- Weight (kg) - 3kg
- UKCA/CE Certified
- Certificate of Calibration

Options

- Lead Ballast 3kg
- Weighing Balance 0.01g, 1100g capacity.

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-BDA-ASTM D1895-B

Bulk Density Apparatus

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

Bulk Density also often called Apparent Density is an extrinsic material property and is defined as the mass or weight of particles per unit volume including the space that they occupy. The measurement is useful for materials that include powders, granules, flakes and other divided materials. Typical examples are moulding powders, resins, granules and mineral components such as soil and gravel and it is very useful in understanding the bulk density of solid materials in industries that handle, process, and transport a variety of materials efficiently, which can change depending on how the material is handled.

The importance of Bulk Density

Handling and Transportation: Bulk density impacts handling and transport including material storage and transportation costs. .

Processing Efficiency: Understanding bulk density is essential when it comes to designing efficient processing equipment. This helps to determine appropriate size, capacity, and throughput of the equipment.

Mixing and Blending: Bulk density is crucial for accurately mixing and blending ingredients to ensure consistent product quality crucial for food and pharmaceuticals.

Storage Optimization: Different materials have varying bulk densities. Optimizing storage based on these bulk densities ensures efficient space utilization and minimizes the storage footprint.

The **ASTM D1895 method B** Bulk density funnel is supplied on a robust stand with material shut off to prevent flow from the funnel prior to testing. The funnel meets the specifications to the ASTM D1895 test standard. The outlet bore size of the funnel is 2.54cm and is ideal for testing materials that would not normally flow through the method A funnel type. These materials are typically powders that normally "cake" or "bridge" the funnel bore or granules usually larger than 3mm in size. Also supplied is a standard measuring cup with a volume of 400cm³. An overflow catch tray compliments the apparatus when scraping the excess material from the measuring cup which can then be returned to the feedstock for re-use. The funnels are CNC machined and polished internally from aluminium and are then anodised coated to reduce electrostatic discharge.



Specifications

- ASTM D1895-B Bulk Density Funnel
- Manufactured to ASTM D1895-B International Testing Standard.
- Manufactured from CNC machined Aluminium and anodized
- Polished funnel
- 2.54 +/- 0.16cm funnel opening
- Robust stand and sample shut off
- Sample overflow tray
- 400cm³ sample measuring cup supplied
- Ideal for larger samples or particles
- Dimensions - 22.5cm x 18cm x 50cm
- Weight (kg) - 7kg
- CE Certified
- Certificate of Calibration

Options

- Weighing Balance 0.01g, 1100g capacity.

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ART-BDA-ASTM D1895-A

Bulk Density Apparatus

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**

Bulk Density also often called Apparent Density is an extrinsic material property and is defined as the mass or weight of particles per unit volume including the space that they occupy. The measurement is useful for materials that include powders, granules, flakes and other divided materials. Typical examples are moulding powders, resins, granules and mineral components such as soil and gravel and it is very useful in understanding the bulk density of solid materials in industries that handle, process, and transport a variety of materials efficiently, which can change depending on how the material is handled.

The importance of Bulk Density

Handling and Transportation: Bulk density impacts handling and transport including material storage and transportation costs. .

Processing Efficiency: Understanding bulk density is essential when it comes to designing efficient processing equipment. This helps to determine appropriate size, capacity, and throughput of the equipment.

Mixing and Blending: Bulk density is crucial for accurately mixing and blending ingredients to ensure consistent product quality crucial for food and pharmaceuticals.

Storage Optimization: Different materials have varying bulk densities. Optimizing storage based on these bulk densities ensures efficient space utilization and minimizes the storage footprint.

The **ASTM D1895 method A** Bulk density funnel is supplied on a robust stand with material shut off to prevent flow from the funnel prior to testing. The funnel meets the specifications to the ASTM D1895 test standard. The outlet bore size of the funnel is 0.95cm +/- 0.08 cm and is ideal for testing materials that would flow through the method A funnel type. These materials are typically powders or granules typically no bigger than 2mm in size. Also supplied is a standard measuring cup with a volume of 100cm³. An overflow catch tray complements the apparatus when scraping the excess material from the measuring cup which can then be returned to the feedstock for re-use. The funnels are CNC machined and polished internally from aluminium and are then anodised coated to reduce electrostatic discharge.



Specifications

- ASTM D1895-A Bulk Density Funnel
- Manufactured to ASTM D1895-A International Testing Standard.
- Manufactured from CNC machined Aluminium and anodized
- Polished funnel
- 0.95 +/- 0.08cm funnel opening
- Robust stand and sample shut off
- Sample overflow tray
- 100cm³ +/- 0.5cm sample measuring cup supplied
- Ideal for small samples or particles
- Dimensions - 22.5cm x 18cm x 23cm
- Weight (kg) - 5kg
- CE Certified
- Certificate of Calibration

Options

- Weighing Balance 0.01g, 1100g capacity.

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ARTEMIS
TESTING INSTRUMENTS

ARTEMIS Shore Hardness Solutions: Precision Without Compromise

In material science, the difference between a high-performing polymer and a failed component often comes down to precise hardness measurement. **ARTEMIS Testing Instruments** offers a complete ecosystem of Shore hardness equipment designed to eliminate user error and provide laboratory-grade accuracy for every test.

Our Integrated Hardness Ecosystem

- **Digital Shore A & D Durometers:** Whether testing soft elastomers (Shore A) or hard plastics (Shore D), our digital durometers feature a large, easy-to-read LCD display with hold and zero functions for fast, accurate results. Each unit is supplied with a calibration certificate and a 12-month warranty.
- **Lever-Operated Test Stands (ART-DTS):** Take the "human factor" out of your testing. Our test stands ensure a constant, vertical loading force and perfect alignment every time, providing the repeatability that handheld methods simply cannot match.
- **Rubber Reference Blocks:** Maintain absolute confidence in your readings. We provide colour-coded reference sets for both Shore A (7 blocks) and Shore D (3 blocks), allowing for quick, daily accuracy checks against known standards.
- **International Compliance:** All ARTEMIS hardness equipment is manufactured to meet rigorous international standards, including **ASTM D2240** and **ISO 7619**, ensuring your data is ready for global quality audits.

The ARTEMIS Advantage

- **Standardized Accuracy:** By combining our precision durometers with the ART-DTS test stand, you reduce operator bias and increase result reliability.
- **Complete Traceability:** Every instrument is supplied with a certificate of calibration and conformity, providing the paper trail required for \$GLP/GMP\$ environments.
- **Versatility:** From handheld field inspections to benchtop research, our hardware is designed for simplicity, durability, and professional-grade performance.

Build your quality control on a foundation of precision. Choose ARTEMIS for Shore hardness testing that sets the standard for your industry.

ARTEMIS. Precision. Efficiency. Consistency.



ART-SH-D

Shore D Durometer

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**

For simplicity, and accurately checking the shore hardness to International Test Standards such as ASTM D2240 and ISO 7619 the **Artemis** range of Durometers are simply hard to beat. Ideal for testing materials such as thermoplastic elastomers, vulcanized rubbers and many more elastomeric materials it is beneficial to be able to accurately measure the material hardness of a supplied product making them ideal for product design, Quality Assurance and quality control inspection.

Offered in a digital scale the Shore D durometer can be used hand held or fitted to a lever operated bench stand offered by **Artemis**.

The durometer available utilizes the Shore D method of hardness measurement and features a spring-loaded Shore D indenter module, easy to read large LCD display, hold and zero function.

Each durometer comes with its own calibration certificate tested to the relevant module, protective carry case, product user manual and 12 month return to base warranty.



Specifications

- Hand held and simple to use
- Module Manufactured to International Testing Standards ASTM D2240 and ISO 7619
- Ideal for testing thermoplastic elastomers, rubbers and plastics
- Large LCD Display
- Measuring Range 0-100
- Accuracy 0.1
- Shore D Module
- Hold and Zero Function
- Supplied in protective case
- Certificate of conformity supplied
- UKCA/CE Certified
- Certificate of calibration
- Product user manual
- 12 month warranty
- Dimensions (cm) - 5.6 x 8.5 x 2.5

Options

- Shore Hardness reference blocks
- Lever Operated Bench Stand

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



OR-SH-A

Shore A Durometer

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

For simplicity, and accurately checking the shore hardness to International Test Standards such as ASTM D2240 and ISO 7619 the **Artemis** range of Durometers are simply hard to beat. Ideal for testing materials such as thermoplastic elastomers, vulcanized rubbers and many more elastomeric materials it is beneficial to be able to accurately measure the material hardness of a supplied product making them ideal for product design, Quality Assurance and quality control inspection.

Offered in a digital scale the Shore A durometer can be used hand held or fitted to a lever operated bench stand offered by **Artemis**.

The durometer available utilizes the Shore A method of hardness measurement and features a spring-loaded Shore A indenter module, easy to read large LCD display, hold and zero function.

Each durometer comes with its own calibration certificate tested to the relevant module, protective carry case, product user manual and 12 month return to base warranty.



Specifications

- Hand held and simple to use
- Module Manufactured to International Testing Standards ASTM D2240 and ISO 7619
- Ideal for testing thermoplastic elastomers, rubbers and plastics
- Large LCD Display
- Measuring Range 0-100°
- Accuracy 0.1°
- Shore A Module
- Hold and Zero Function
- Supplied in protective case
- Certificate of conformity supplied
- UKCA/CE Certified
- Certificate of calibration
- Product user manual
- 12 month warranty
- Dimensions (cm) - 5.6 x 8.5 x 2.5

Options

- Shore Hardness reference blocks
- Lever Operated Bench Stand

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-SHRB-A

Shore A Reference Blocks

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

For simplicity, and accurately checking the values of your shore hardness tester look no further than the range of Rubber reference block supplied by Artemis.

Supplied in a box of 7 reference blocks, Each supplied set has a reference between 30 HSA and 90 HSA. Each individual block is colour coded for identification and has a known Shore A reference to make cross checking values easy against your Durometer a simple task ensuring confidence in your measurements. Accuracy for each block is +/- 2 HSA and each set is manufactured to International Test Standards.



Specifications

- Shore A rubber reference block
- Simple to use with Shore A Durometers
- Ideal quick reference to check the accuracy of your Durometer
- 7 Reference blocks supplied
- Shore A values include 29, 37, 49, 61, 72, 79, 89
- Supplied in protective case
- Certificate of conformity supplied
- Dimensions of each block (cm) 5 x 5 x 0.8

Options

- UKAS Calibration
- Shore A and Shore D Durometers
- Lever Operated Bench Stand

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-SHRB-D

Shore D Reference Blocks

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**.

For simplicity, and accurately checking the values of your shore hardness tester look no further than the range of rubber reference blocks supplied by Artemis.

Supplied in a box of 3 reference blocks, each supplied set has a reference between 20 HSD and 90 HSD. Each individual block is colour coded for identification and has a known Shore D reference to make cross checking values easy against your Durometer a simple task ensuring confidence in your measurements. Accuracy for each block is +/- 2 HSD and each set is manufactured to International Test Standards.



Specifications

- Shore D rubber reference block
- Simple to use with Shore D Durometers
- Ideal quick reference to check the accuracy of your Durometer
- 3 Reference blocks supplied
- Shore A values include 20 - 90 HSD
- Supplied in protective case
- Certificate of conformity supplied
- Dimensions of each block (cm)
5 x 5 x 0.8

Options

- UKAS Calibration
- Shore A and Shore D Durometers
- Lever Operated Bench Stand

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com



ART-DTS

Durometer Test Stand

V1.01

Introducing a brand new range of materials testing equipment from **Artemis Instruments**

The Durometer Test Stand designed and manufactured by **Artemis** to comply with ASTM D2240 enables hardness testing of plastics, soft polymers and rubbers to be conducted with repeatability and accuracy that otherwise may not be possible using the hand held method due to user inconsistencies by the way the Durometer is offered against the material under test.

Simple mounting of the durometer to the test stand and applied weights to ASTM D2240, amongst others, enable known constant loading forces to be applied to the sample under test.

Extremely simple to operate the lever operated test sample bed which the sample is placed on, is simply raised into the Durometer indenter in a vertical direction lifting the durometer and applied weight giving the constant loading force increasing operator control, reducing operator hand held effects on the sample and increasing results accuracy and repeat ability of test results.

The bench stand is compatible with both Shore A and Shore D Durometers offered by Artemis. Test Loads are available to compliment the instrument depending on the durometer being used on the stand. Also available is an option "V" block for testing cylinders or tube type samples.



Specifications

- Lever operated type test stand
- Manufactured to ASTM D2240 International Testing Standard.
- Simple durometer mounting
- Adjustable height
- 90mm Ø test sample bed
- Dimensions - 22.5cm x 18cm x 50cm
- Weight (kg) - 7kg
- Product user manual
- UKCA/CE Declaration

Options

- Test Load - 1kg (Shore "A" testing)
- Test Load - 5kg (Shore "D" testing)
- "V" block
- Durometer Shore A scale
- Durometer Shore D scale
- Rubber reference blocks (Shore A)
- Rubber reference blocks (Shore D)

Artemis Instruments

A Microtrol Brand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com

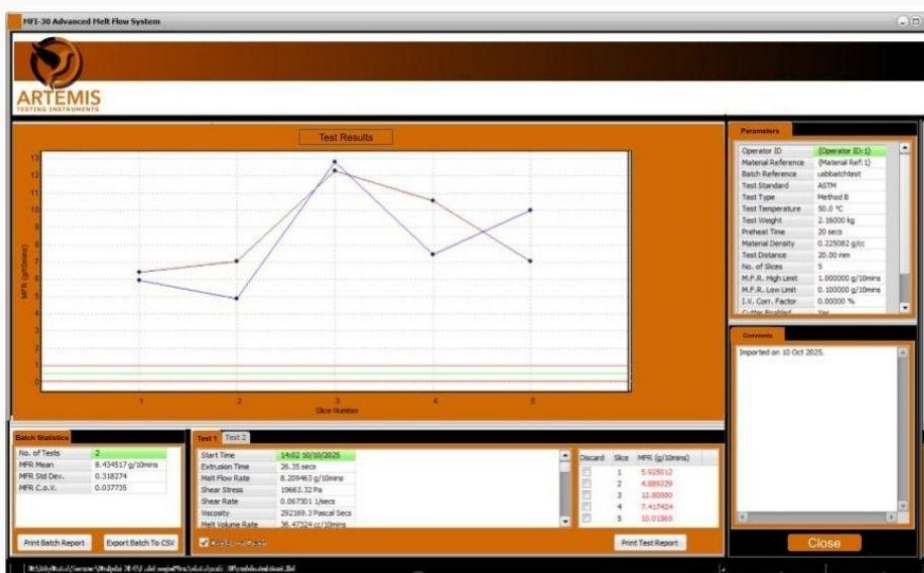


LABlogic+

InstrumentSoftwarePlatform

V1.02

Turn test data into confident decisions with LABlogic+



Example of LABlogic+ test screen

LABlogic+ is an intuitive Windows based software platform supplied with the Artemis range of microprocessor-driven instruments. It brings instruments and test-result data together in one place so operators can work faster, reduce manual effort, and analyse material performance with confidence.

Designed for use across multiple instruments, LABlogic+ automatically recognises the connected system and presents the right result set and analysis options immediately. For operators, that means less set-up time, fewer selection errors, and consistent results review, shift after shift, instrument after instrument.

Results are displayed in cleartables and instrument-dependent graphs to support quick interpretation. Operators can overlay multiple tests within a batch on a single chart for instant comparison, with each run highlighted in distinct colours. Live batch statistics such as **Mean** and **Coefficient of Variation (COV)**—update automatically as each result is downloaded, helping teams spot drift, variability, or emerging issues early. When testing is complete, reports can be printed directly from the main screen. Depending on the instrument connected, operators can set high and low limits and see them clearly on the graph making it immediately obvious whether the material meets specification, without manual calculations or time-consuming checks.

In **Test Results Replay** mode, users can reload saved results for material comparison, deeper analysis, data manipulation, or file export. Abnormal results are clearly flagged, enabling operators to investigate and where appropriate, remove outliers from the results file to bring batch statistics back into a representative range. Results can be exported simply in **.CSV** format for use in Microsoft Excel and straightforward import into third-party systems supporting wider trending, archiving, and quality workflows.

Artemis Instruments

AMicrotrolBrand

16 Elgar Business Centre, Moseley Road, Hallow, Worcester, WR2 6NJ

Email: info@artemisinstruments.com - sales@artemisinstruments.com

www.artemisinstruments.com

Contact us

ARTEMIS TEST INSTRUMENTS

Elgar Business Centre,
Hallow, Worcester, UK.
WR2 6NJ.

Head Office: +44(0) 1905 641 910

Sales: +44 (0)7983 834 088

+44 (0)7946 575 837

Email sales@artemisinstruments.com

Email: info@artemisinstruments.com





ARTEMIS

TEST INSTRUMENTS