



# **OX-TRAN® 2/40 SERIES** **OXYGEN PERMEATION ANALYZER**

Accurate and Reliable Oxygen Permeation  
Testing for Finished Packages

## Whole Package OTR Barrier Measurements... Done Right.



### All-in-One Whole Package Permeation Analyzer

The OX-TRAN 2/40 Series of Oxygen Permeation Analyzers is the first permeation instrument custom-designed to test whole packages. The OX-TRAN 2/40 integrates a large environmental chamber with Oxygen Transmission Rate (OTR) testing into one instrument to ensure precise test gas conditions and accommodations for a wide variety of packages and containers. Using AMETEK MOCON's unique and innovative Test Cartridges, the OX-TRAN 2/40 is a complete, all-in-one package OTR testing system.

### Whole Package Testing — Made Easy

The precisely controlled environmental chamber eliminates the need for cumbersome set-up of independent test gas environments and ensures accurate test results for real-world conditions. The new controlled chamber instrument has four independent test cells allowing multiple analyses to be run at the same time, while the easy to use Package Test Cartridges make mounting and testing of packages simple and repeatable.

### Simplified Test Set-up and Monitoring

The simple user interface with automated controls makes testing easy with little training. In certain applications, starting a new test may be as simple as a single press of a button. Your operators can now pre-program a variety of tests at different conditions and run them sequentially without operator intervention, resulting in less instrument idle time.

### Coulox Sensor Technology

Using a patented coulometric sensor, the OX-TRAN provides the most precise and repeatable oxygen permeation data available on the market today. It is the basis for the ASTM standard D3985, requires no calibration, and is the only sensor proven to meet its precision and bias requirements through independent third-party testing.

### Improve your bottom line and get peace of mind.

The OX-TRAN 2/40 was designed to help maintain the **integrity** of your package by giving you the capability to test it in real world conditions.

This arms you with **precise data** to select the most appropriate packaging for your product — no over or under packaging, saving costs and reducing package waste.



## Application Solutions

The OX-TRAN 2/40 is capable of testing a wide range of package types through the use of our innovative Test Cartridges.

**A variety of package Test Cartridges are available to easily and accurately test:**

- Trays
- Bottles
- Flexible containers or pouches
- Cups, Packs or Pods
- Caps or Corks
- Films
- Complete packages or tubing via Package Adapter Cartridge

Package Test Cartridges use pneumatic clamp mounting in the chamber for quick and tool-less installation and removal.

Low cost, single-use Package Test Foils eliminate the need to heat and scrape the epoxy from reusable plates, while also providing high-confidence mounting with the integrated TruSeal® design that utilizes gas flushing between two (2) seals to prevent ingress into the test area. This eliminates the need to run absolute zero tests on samples, thus saving time.

Custom test cartridges and fixtures are available to greater improve test accuracy and reduce setup time. Contact one of our application experts to ask about your custom package application needs.

*Our universal Test Cartridge will allow you to test a wide variety of packages, cups, corks, enclosures and more. Test up to 4 large packages or bottles at a time. Order extra cartridges to allow staging of samples to increase productivity.*



*No more messy sample prep! Using our disposable foils, just epoxy your sample to the foil, put it on the cartridge, tighten the 4 fasteners and you are ready to go. When testing is complete just dispose of the foil. No more scraping & cleaning to reuse.*



*Test just about any pouch, bag, tray, or package using one of the two Vertical Test Cartridges pictured here. The vertical tray test cartridge has economical fasteners for easy sample prep. No special tools required, just tighten and test.*



*The Package Adapter Cartridge is designed for testing complete containers including closures and seals allowing you to verify that your entire package meets your permeation performance goals.*



## Absolute Precision

- Temperature and humidity-controlled chamber allows testing in real-world conditions for precise results
- No sensor calibration required
- Conforms to ASTM Test Standards

## Optimized Productivity

- Save on labor hours with easy set-up and less in-test monitoring
- Removable test cartridges, prepare additional samples while testing
- Perform simultaneous tests with up to 4 large packages

## User Friendly

- Various test cell cartridges available to accommodate a variety of package types and barrier films
- Simplified sample preparation
- Touch screen interface, with accelerated test options

# OX-TRAN 2/40 SERIES SPECIFICATIONS

## Industry Standards

- ASTM D3985 films
- JIS 7126-B films
- ASTM F1927 films (with RH)
- DIN 53380-3 films
- ASTM F2622 films
- ASTM F1307 packages
- ISO 15105-2

## Dimensions & Weight

### Interior Dimensions & Volume

Depth: 12" or 30,5 cm  
 Width: 25.5" or 64,8 cm  
 Height: 17" or 43,2 cm  
 Volume: 3 cubic ft or 85 litres

### Exterior Dimensions

Depth: 29.75" or 75,6 cm  
 Width: 33" or 83,8 cm  
 Height: 35" or 88,9 cm  
 Weight: 225 lb. or 102Kg

## Conformance Standards

- CE, UL, CSA Safety Compliance

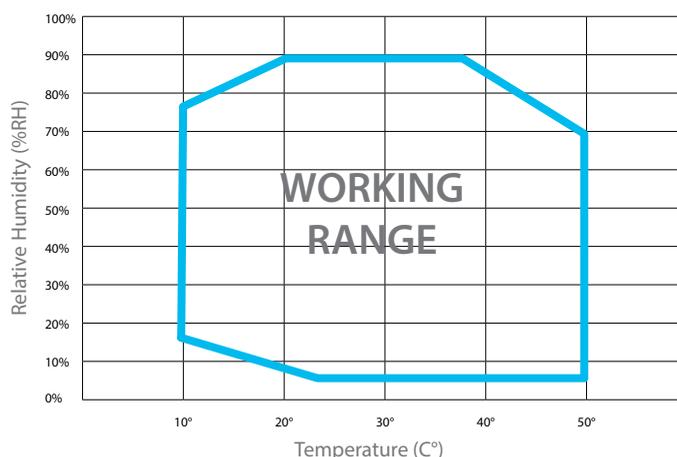
## Connectivity

- Ethernet Port
- 2 USB Ports
- Optional PERM-NET Lite™ for remote monitoring

## Technical Specifications

Models	Test Ranges		Resolution	Repeatability	Min Exam Time	
	cc/(pkg · day)	cc/(m <sup>2</sup> · day)	cc/(pkg · day)	cc/(pkg · day)	Minutes	
<b>10X</b>	Atmospheric Tested (20.9% O <sub>2</sub> )	0.0000025 to 1	0.0005 to 200	0.000001	± 0.0000025	60
	Software compensated to 100% O <sub>2</sub>	0.0000125 to 5	0.0025 to 1,000	N/A		
<b>Model L</b>	Atmospheric Tested (20.9% O <sub>2</sub> )	0.000025 to 1	0.005 to 200	0.00001	± 0.00001	45
	Software compensated to 100% O <sub>2</sub>	0.000125 to 5	0.025 to 1,000	N/A		
<b>Model H</b>	Atmospheric Tested (20.9% O <sub>2</sub> )	0.00025 to 1	0.05 to 200	0.0001	± 0.0001	30
	Software compensated to 100% O <sub>2</sub>	0.00125 to 5	0.25 to 1,000	N/A		

## RH and Temperature Range



## Test Conditions

Test Temperature Range	10°C to 50°C ± 0.5°C
Chamber RH Testing Ranges*	5% to 90% ± 5%
Carrier Gas RH Testing Ranges*	0% to 90% ± 4%

All Models – 10X, L and H  
 \*See RH and Temperature Range above