Glass Testing Instruments **Model ANS Series**

Annealing & Strain Points (Weighted Fiber Elongation)

Automatic Annealing & Strain Point results in less than 25 minutes.

The annealing and strain points of a glass are widely used production control parameters. Changes in the annealing and strain point temperatures are indications of chemistry changes.

ASTM C-336 - The Annealing point temperature is the temperature at which a uniform fiber of glass (508 mm x 0.65 mm diameter) elongates under an applied weight at a rate of 0.14 millimeters per minute while cooling in a specially designed furnace at the rate of 4°C per minute. The Strain point temperature is determined by extrapolation of the annealing point data and is the temperature at which the elongation rate is 0.0316 times the elongation rate observed at the annealing point. The Orton Model ANS has been designed to automatically monitor the elongation of the sample fiber and calculate the annealing and strain points according to the ASTM C-336 method. In addition the operator can modify the thermal cycle to suit other testing procedures such as rapid sample testing to meet high volume production QC demands.

EASY OPERATION requires little training. After the test fiber is pulled to meet the ASTM specified dimensions, the operator simply places the fiber into the furnace, applies the weight, aligns the LVDT and starts the test from a local computer *(computer not shown)*

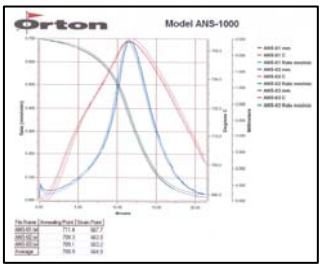
In less than 25 minutes, the Annealing and Strain Point Temperatures are displayed on the computer monitor.

Software prompts the operator to select 1 of 2 modes of operation: the ASTM C-336 Mode, or the User Defined Mode. The User Defined Mode follows the guidelines of the ASTM C-336 Mode, but allows the operator to change the test parameters (the starting temperature for each test, the heating rate, the turnover temperature or elongation rate, the cooling rate for the data collection period, and the target elongation rate) to suit individual testing requirements.

ACCURATE, RELIABLE, and **REPRODUCIBLE:** The LVDT sensor automatically monitors the elongation, the computer calculates the rate of elongation, and the computer determines the annealing and strain point temperatures.

POWERFUL: The data acquisition software displays the test data and conditions in real time. The data analysis software shows the test results and generates reports that automatically calculate the average temperature for a series of fibers.

	Model ANS-800	Model ANS-1000
Max. Temperature	800°C	1,000°C
Thermocouple	Type “S”	Type “S”
Process Controller	Honeywell	Honeywell
Elongation Tracking System	LVDT	LVDT
Power Requirements	120VAC, 10 amp, 50/60 Hz (240 VAC available as an option)	
Computer Requirements	Windows 2000/XP OS, with available PCI slot	
Measuring Unit Dimensions	12” Wide x 12” Deep x 33” Tall (305 x 305 x 840 mm)	
Process Controller Dimensions	18” Wide x 12” Deep x 5” Tall (460 x 305 x 130 mm)	



The Edward Orton Jr. Ceramic Foundation · 6991 Old 3C Highway · Westerville, OH 43082 USA
Web Site: www.OrtonCeramic.com · Phone: (614) 895-2663 · Fax: (614) 895-5610 · E-mail: info@OrtonCeramic.com