



## Mooneyline Viscometer



### A Trusted Name in Material Testing

- Prescott Instruments is a **U.K. company** with **over 30 years' experience** in material testing.
- We manufacture all instruments **onsite in the U.K.** under **ISO 9001** and our in-house laboratory team perform all **instrument calibrations** under **ISO 17025**.
- Our **Mooneyline Viscometer** is the **perfect choice** for modern laboratories at all stages of the rubber production process.
- Its **precision, reliability and durability** make it an indispensable instrument for laboratory professionals worldwide.

### Built to Last

- **Durability:** The high-stiffness steel frame is **robust enough to withstand the demands** of a busy production environment with the high precision performance to match.
- **Reliability:** Expertly-crafted construction provides **stability and reliability** even when testing the hardest of materials.
- **Unique:** Our bespoke **high-end electronics** ensure the highest data sampling rates available.

### Repeatability and Connectivity

- Our **Mooneyline Viscometer** is **simple and easy to use** and is operated through an **intuitive Windows-based** software system.
- **Simplicity of design** means you can replace components **easily and affordably**.
- Equipped with **advanced programming capabilities** for assessing the **Stress Relaxation** index of material samples.
- Utilising a microprocessor-based PID control system, we ensure **precise temperature regulation** of the dies and the sample.
- Utilising a **highly accurate transducer system** situated beneath the die assembly, the **torque applied to the rotor head** is accurately measured and documented in the system's data files.
- All our instruments are accredited to **ASTM D1646** and can perform **international standard tests**.



# Mooneyline Viscometer

## Technical Specification

Standards	ISO No. 289 / ASTM D1646	Test Points	
Die Configuration	Standard	Initial	MX
Rotor	Large or Small	Minimum (ML)	TX
Rotation Speed	2 RPM (0.21 Radians/Sec)	Maximum (MH)	TY
Calibration	Fully Automatic	Final	X
Temperature Range	Ambient to 225°C	Time Gate	Delta Mooney A
Units of Measurement	Torque in Mooney units. Temperature in Fahrenheit or degrees Centigrade. Time, min/sec, min/decimal, seconds.	Cure Index	Delta Mooney B
Types of Test	Real Time display of: - Mooney Torque - Temperature of upper and lower dies - Calculation of Viscosity (MI1+4) - Scorch, Delta Mooney, Stress Relaxation index	Slope (a)	Stress Relaxation Percentage (SR%)
Temperature Control	3 Term PID – Control Accuracy $\pm 0.03$ °C	Correlation (r)	Stress Relaxation Time (SRsec)
Electrical	Single Phase 220/240V 50Hz   110V 60Hz   350 VA	Intercept (k)	SR Area (A@%s)
Pneumatics	Filtered Air, Min: 0.41 Mpa   60 psi   4.14 Bar   4.2 kg/cm		
Weight	180 kg		
Dimensions	575 mm x 570 mm x 1280 mm (W x D x H)		
PC Specification	Windows PC		
Optional Extras	Variable Speed Rotor (0.1 to 20 RPM) Mooneyline Volumetric Sample Cutter		

**NOTICE:** Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof. Prescott Instruments Ltd. Make no representation or warranties as to the completeness or accuracy thereof. Information is supplied upon the conditions that the persons receiving same will make their own determination as to the suitability for their purposes prior to use. In no event will Prescott Instruments Ltd. Be responsible for damages of any nature whatsoever resulting from the use or reliance upon information for the product, equipment or system to which information refers. Nothing contained herein is to be construed as recommendation to use any product, equipment, system, process or formulation in conflict with any patent, and Prescott Instruments Ltd. makes no representation or warranty, express or implied, that the us thereof will not infringe any patent, except for the limited warranty set forth in Prescott Instruments Ltd. standard sales contracts for its equipment and services.

**PRESCOTT INSTRUMENTS LTD. MAKES NO REPRESENTATIONS OR WARRANTIES WHETHER STATUTORY, EXPRESS OR IMPLIED, OF MERCHANTABILITY FITNESS FOR A PARTICULAR PURPOSE, OR OF ANY OTHER NATURE WITH RESPECT TO THE INFORMATION OR PRODUCT, EQUIPMENT OR SYSTEM TO WHICH INFORMATION REFERS.**

© 2016 Prescott Instruments Ltd.

Prescott Instruments Ltd. Unit F, Northway Trading Est, Northway Lane, Tewkesbury, Gloucestershire, GL20 8JH UK  
Tel: +44 (0) 1684 274300 ; sales@prescott-instruments.com ; www.prescott-instruments.com

