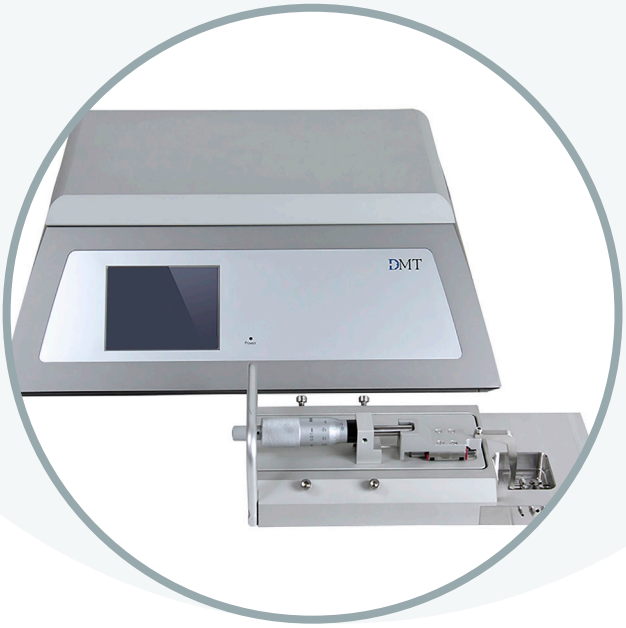
# SINGLE WIRE MYOGRAPH SYSTEM - 320A

- Manually operated micropositioner for accurate tension control
- Can be easily combined with microelectrodes for membrane potential measurements
- Easily integrated into an imaging system for simultaneous force measurements and vessel wall fluorescence
- Digital output. Data directly piped into Labchart Pro




The Single Wire Myograph System - 320A is ideal for studying a single vessel with a diameter of 30 µm - 3 mm. The vessel is mounted as a ring preparation by threading it over two parallel stainless steel wires and securing the wires to two supports or "jaws". One support is attached to a precision micrometer, allowing manual control of vessel circumference and stretch. The other support is attached to a force transducer for measurements of force/tension development.

The preparation is mounted in a heated 10 ml acid-resistant, stainless steel chamber, which can be covered with a lid featuring ports for rapid suction/draining, refilling and bubbling of oxygen. The base of the chamber contains a window allowing morphological observation or fluorescence measurements on an inverted microscope.

Typically, the preparation is kept in the heated vessel chamber in a physiological salt solution at 37°C, bubbled with oxygen where the vessels remain viable for up to 12 hours.

Following mounting and equilibration, the passive length-tension relationship of the vessel is determined. During the actual experiment, the circumference of the vessel is kept constant. Compounds can be added directly to the chamber, and the vessels contractility and reactivity are measured under isometric conditions.

As an option, an electronic valve can be added to the system for easy control and emptying of the chamber.

The Wire Interface with touch screen makes it easy to set up and use. Furthermore, the Wire Interface is compatible with the DMT Device Enabler allowing automatic recognition of supported devices by LabChart, use of multiple devices simultaneously, correct units and ranges in LabChart channels and simultaneous recording of data into LabChart alongside a PowerLab. The DMT Device Enabler allows the Wire Myograph System - 320A to stream data directly into LabChart.

# SINGLE WIRE MYOGRAPH SYSTEM - 320A

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|---|---|
| **CHAMBER:** | |
| Chamber volume (min) | 4.2 ml |
| Chamber(s) | 1 |
| Chamber material | Acid resistant stainless steel |
| Vessel size | >30 µm |
| Vessel normalization | Manually |
| Micrometer resolution | 0.01 mm |
| Mounting type | Jaws |
| **TEMPERATURE:** | |
| Range | 15.0 to 50.0 °C |
| Resolution | 0.1 °C |
| Stability | ±0.2 °C |
| Heating | Yes |
| **TRANSDUCER:** | |
| Output reading | mN |
| Range | ±200 mN |
| Resolution | 0.01 mN |
| Force calibration | Yes |
| **OUTPUT:** | |
| Data communication | USB 2.0 |
| Analogue output channels | 4 |
| Analogue output range | ±2.5 V |

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