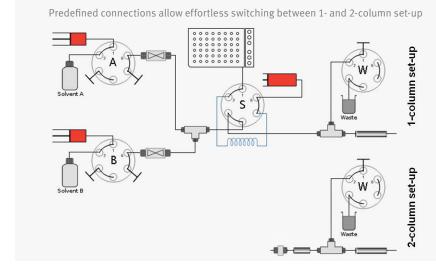
## EASY-nLC 1200 System

Best-in-class nano LC, preconfigured for straightforward state-of-the-art separations

The Thermo Scientific™ EASY-nLC™ 1200 system provides effortless peak performance for nanoflow applications up to 1200 bar. Dual in-line flow sensors before solvent mixing give excellent gradient precision. Its intuitive software facilitates rapid method setup and immediate system control.





# **Increased System Robustness** and Servicability

- New maintenance-free ceramic valves result in extraordinary dependability and lower cost of ownership
- Thermo Scientific™ nanoViper™ connections for tool-free, reliable and fast connections
- Easy access to all serviceable parts

### **Intelligent Maintenance**

- Automated, built-in maintenance routines
- User-friendly leak tests pinpoint position of leaks
- Advanced pressue test quickly diagnoses blocked capillaries
- Detailed event log for troubleshooting
- Remote access capability for system interrogation and technical support

# Improved Performance and Throughput at up to 1200 bar

- Faster sample loading and column equilibration increase sample throughput without sacrificing performance
- Use of longer analytical columns for higher peak capacity

#### **Advanced Flow Control**

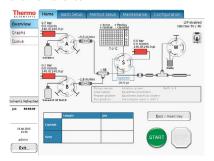
- Intelligent Flow Control (IFC™) during loading and equilibration steps provides robust performance while increasing throughput
- Automatic Flow Control (AFC<sup>™</sup>) during gradient delivery provides outstanding reproducibility throughout injection sequence



### **Product Specification**

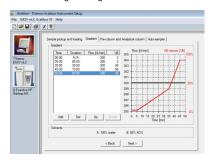
## Integrated EASY-nLC Software and Touch Screen

Direct system control of the EASY-nLC system via touch screen interface allows for fast system set up, method configuration, and maintenance.



### **Xcalibur Data System**

Thermo Scientific™ Xcalibur™ software is the state-of-the-art solution for controlling Thermo Scientific mass spectrometers. The EASY-nLC software is fully integrated with Xcalibur software, allowing full LC-MS control through a single software solution.



#### **MS Interfaces**

The EASY-nLC 1200 system was designed to work together with Thermo Scientific™ EASY-Spray™ Ion Sources and Nanospray Flex™ Ion Sources, making it compatible with EASY-Spray columns and all other nano LC columns.

### **Easy MS Connection**

EASY-nLC instruments integrate seamlessly with Thermo Scientific mass spectrometers, including:

- Thermo Scientific<sup>™</sup> Q Exactive<sup>™</sup> series instruments
- Thermo Scientific<sup>™</sup> LTQ Orbitrap<sup>™</sup> series instruments
- Thermo Scientific<sup>™</sup> Orbitrap Fusion<sup>™</sup> Tribrid<sup>™</sup> instruments
- Thermo Scientific<sup>™</sup> TSQ<sup>™</sup> Triple Quad instruments

| PRODUCT SPECIFICATIONS                               |  |  |
|--|--|--|
| Specification  | Value  |  |
| Pressure Range                                       | 0–1200 bar   |  |
| Flow Range (Gradient)                                | 20–2000 nL/min<br>Recommended: 100–1000 nL/min   |  |
| Flow Range (Loading & Equilibration)                 | ≤25 µL/min   |  |
| Retention Time Reproducibility                       | 0.1-0.4% RSD within recommended flow range   |  |
| Pick-up Volume Range                                 | 0.10–18.00 μL (20 μL loop)   |  |
| Injection Reproducibility                            | ≤0.2% RSD at 5 µL pick-up<br>≤3.0% RSD at 0.1 µL pick-up   |  |
| Injection Linearity                                  | $R \ge 0.9985$ for 0.5–10 μL injection volume $R \ge 0.9995$ for 0.3–1.6 μL injection volume   |  |
| Carry-over   | <0.05% (caffeine)<br><0.1% for m/z 722.3 and <1.00% in general (100 fmol<br>BSA digest, YIC*DNQDTISSK)   |  |
| Gradient Delay Volume<br>(Mixing tee to venting tee) | <1 μL  |  |
| Injection Loops                                      | 20 μL default (5 μL and 50 μL optional)  |  |
| Gradient and Injection Pumps                         | Single action syringe pumps (sapphire piston),<br>140 µL volume<br>Gradient pumps: 100 µL/min refill speed<br>Injection pump: 40 µL/min refill speed |  |
| Valves   | 4 identical 6-port, 3-position proprietary valves from Thermo Fisher Scientific  |  |
| Solvent Compatibility                                | ≤95% acetonitrile in water. Wetted parts: Fused silica, PEEK™, 316 stainless steel, zirconium dioxide  |  |
| Sample Tray Formats                                  | $6 \times 8$ HPLC vials<br>$1 \times 96$ or $1 \times 384$ MTP and $6$ vials<br>$2 \times 48$ or $4 \times 96$ PCR strips and $6$ vials              |  |
| Autosampler Cooling Range                            | Minimum of 5 °C<br>Maximum of 20 °C below ambient  |  |
| MS Drivers   | LC Devices 3.0 for XCalibur 3.0 and later  |  |
| Remote Support                                       | Direct internet access for online diagnosis by EASY-nLC technical experts  |  |
| Operating Conditions                                 | 5–30 °C ambient temperature<br>20–80% relative humidity  |  |
| Dimensions (H x W x D)                               | 45 cm × 36 cm × 38 cm (18" × 14" × 15")  |  |
| Weight   | 37 kg (82 lb)  |  |
| Main Power Supply                                    | 100–240 V, 50–60 Hz, 250 W   |  |

### **Ordering Information**

| Description                    | Part Number   |
|--------------------------------|---------------|
| EASY-nLC 1200                  | LC140         |
| Nanospray Flex Ion Source (NG) | ES071 (ES072) |
| EASY-Spray Ion Source (NG)     | ES081 (ES082) |

For more information, visit: thermofisher.com/nanoLCMS

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