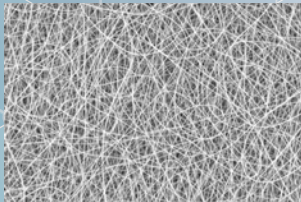
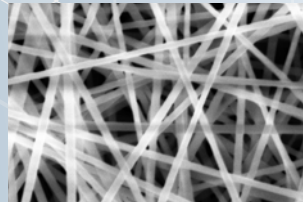


A High-Power Model Born from Researchers' Feedback

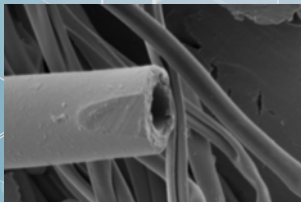
Inheriting high uniformity and high-quality electrospinning technology from “NANON,” our conventional and popular model, the “BIG NANON” delivers enhanced power and practical performance in response to user needs.



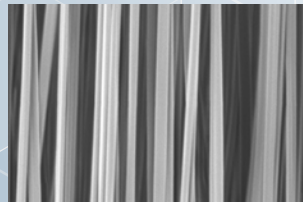
Nonwovens – Ethyl Cellulose



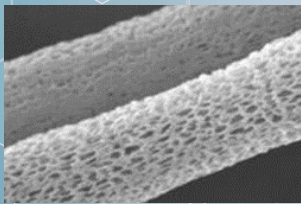
Nonwovens – Gelatin



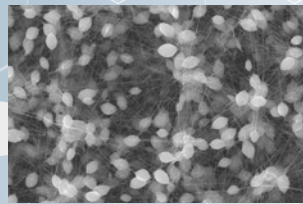
Core/shell - structure nanofiber



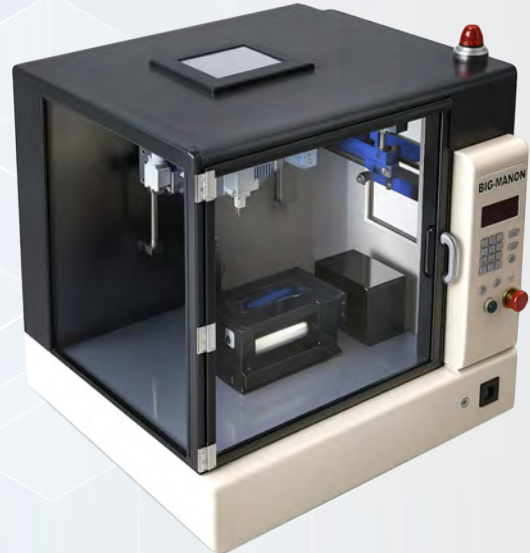
Aligned nanofiber



Porous nanofiber



Beaded nanofiber



Nanofiber Electrospinning System for R&D



BIG NANON

High-Power Features of BIG NANON

Spinning Distance

Extended Spinning Distance: 250 mm

Solves issues caused by short distances and enables high-precision spinning with reduced fiber scattering.

Larger Chamber

Greater fiber collection

Expanded internal space improves fiber collection efficiency.

Syringe Pumps

Two Syringe Pumps Integrated

Allows spinning of two different solutions for core-shell nanofibers.

High Voltage Power Supply

High-Voltage Power Supply up to 40 kV

Upgraded from 30 kV (NANON). Supports a wide range of materials and spinning conditions.

Sterility & Cleanliness

Chamber Made of Stainless Steel

Facilitates cleaning and sterilization.

Production Output

Higher Production Throughput

Use of the 11-nozzle spinneret enables higher nanofiber output.



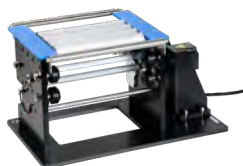
Plate collector
(Standard component)



Drum Collector



Disk collector



Roll to Roll Collector



Mandrel Collector



Y-axis Slide Collector



Clip Spinneret
(Standard component)



Vertical Clip Spinneret



Coaxial Spinneret



Multi-jet spinneret



Tubeless Spinneret



11-syringe Clip Spinneret

BIG NANON Major performance and specifications

Purpose of use	Research and development
Typical nanofibers to spin	Nonwovens of double size of A4 (200mm×600mm) Aligned membrane Core/shell nanofiber Porous fiber
Standard spinneret	Clip
Optional spinneret	Vertical Clip 11-syringe Clip Tubeless Coaxial Multiple jet; 4-holes
Standard collector	Plate
Optional collector	Drum φ200 w200 (up to 3000rpm) Drum φ100 w200 (up to 3000rpm) Drum φ200 w30 (up to 3000rpm) Disk (up to 3000rpm) Mandrel (up to 100rpm) Roll to roll 200mm Y-axis Slide
Syringe Pump	2 sets of syringe pumps (To mount 3 syringes each)
High voltage power supply	Voltage : 0.0 to 40.0kV Current : 0.0 to 100.0μA
Traversing speed	300mm/sec
Rotation speed of collectors	Drum; 100 to 3000rpm Disk; 100 to 3000rpm Mandrel; 50 to 100rpm
Spinning distance	50 to 250mm
Programmable parameter	• High voltage output • Feed rate of solutions from pump • Rotation speed of collector • Up/down moving distance of slider (semi-automatic) • Frequency and interval of cleaning • Traversing speed and distance
Inhaling and exhausting volume of fan	12 m ³ /hr or more
Feed rate	0.1 to 60ml/hr (per pump)
Capacity of syringes	2.0 / 5.0 / 10.0 (ml)
Control	10-key
External dimensions (Except protrusions)	1010W x 900D x 1050H (mm)
Weight	140kg or less
Safety devices	• Safety interlock • Door lock • Emergency stop button • Signal tower • Exhaust purification filter • Immediate shutoff of high-voltage output after POWER OFF • Shutoff of high voltage output when over-current flows



Click here to see nanofiber samples.