Entrust your parts feeding to NITTO SEIKO!

NITTO SEIKO supplies models of 3 different parts feeder types: disk type, drum rotary collated type and multistation type. Their cost and noise levels are lower and the required installation space is smaller compared with the other parts feeders.

More than 3,000 models have been sold in Japan and overseas since they were introduced into the market.

Unlike the conventional selection and operation, we can feed any part with confidence.

NITTO SEIKO is a leading company in the field of screws and screws fastening machinery, masters all of our feeding words, which is indispensable for the manufacturing and assembly line magnification.

Product lineup

**Model selection graph**

<table>
<thead>
<tr>
<th>Disk type</th>
<th>Drum type</th>
<th>Multistation type</th>
</tr>
</thead>
<tbody>
<tr>
<td>DF200</td>
<td>FF03H</td>
<td>FF801H</td>
</tr>
<tr>
<td>FF311DR</td>
<td>FF503H</td>
<td>FF801H</td>
</tr>
<tr>
<td>FF503H</td>
<td>FF503H</td>
<td>FF801H</td>
</tr>
<tr>
<td>FF801H</td>
<td>FF801H</td>
<td>FF801H</td>
</tr>
</tbody>
</table>

**Screw capacity calculation formula**

Estimated screw capacity (%) = Basket capacity (mm) × Dimension ratio (D/d) × Coefficient (C)

- Basket capacity (mm) = Disk type x 0.6
- Dimension ratio (D/d) = Max. Screw 1.0
- Coefficient (C) = Max. Stroke

Example: FF03H for M6x0.5 threaded screws. The length is 5 mm. The length is 1.0 mm and the feed pitch 0.5 mm. — 360 × (6/1) × 0.6 × 0.5 = 91.2 (1% error, approx. 91% capacity)

**Specifications and other matters are subject to modifications for performance improvements without notice.**

**Unique nouns like the product name indicated in this brochure are registered or not registered trademark of each company.**

※For more information, see our website or contact the nearest sales office.

**FEEDER series**

**FASTENING INNOVATION for THE FUTURE**

**For SH200 / SH300**

**Auxiliary hopper for less frequent screw feeding**

- Separate installation space is not needed.
- The hopper is directly mounted on the screw feeder and does not need an actual installation space created by a conventional auxiliary hopper.

**Easy screw feeding**

- The barrel is removable.
- Low noise

- The motor drive hopper generates very low running noise

- Easy mounting and dismounting

- The hopper is a flange type and can be easily mounted and dismounted.

**[Specifications]**

<table>
<thead>
<tr>
<th>Model number</th>
<th>DF200</th>
<th>FF311DR</th>
<th>FF503H</th>
<th>FF801H</th>
</tr>
</thead>
<tbody>
<tr>
<td>Thread pitch</td>
<td>0.3</td>
<td>0.5</td>
<td>0.8</td>
<td>1.0</td>
</tr>
</tbody>
</table>

**[Outside dimension]**

<table>
<thead>
<tr>
<th>Model number</th>
<th>DF200</th>
<th>FF311DR</th>
<th>FF503H</th>
<th>FF801H</th>
</tr>
</thead>
<tbody>
<tr>
<td>Length</td>
<td>200</td>
<td>210</td>
<td>220</td>
<td>230</td>
</tr>
<tr>
<td>Width</td>
<td>210</td>
<td>220</td>
<td>230</td>
<td>240</td>
</tr>
<tr>
<td>Height</td>
<td>110</td>
<td>120</td>
<td>130</td>
<td>140</td>
</tr>
</tbody>
</table>

**[Application example]**

- **DF311DR + SH200**

The hopper is mounted on the DF311DR hopper machine with the mounting space.

- **FF503H + SH200**

The hopper is mounted to the DF503H hopper machine with the mounting space.

- **FB300D1H auxiliary hopper (hopper capacity is 1 L or 3 L)...**

**[Handheld screw driving tool]**

Handrail **FEEDMAT** types comprising feeders and fastening units are also available.

Website: https://www.nittoseiko.co.jp/ Machinery Division

Global sales head office

3, Minato-cho, Katsuragi City, Kyoto 619-0086, Japan

Tel: +81-774-36-7100, Fax: +81-774-36-7100

NITTO SEIKO CO., LTD.
ENTRUST YOUR PARTS FEEDING TO NITTO SEIKO!

NITTO SEIKO suction feed models, SH series parts feeder disk type, draw rotary collet type and other type. Their cost and noise level are lower and the required installation space is smaller compared with the other parts feeders.

More than SH series models have been sold in Japan and overseas since they were introduced into the market.

Taking this revolutionary innovation and experience, we can feed any part with confidence.

NITTO SEIKO is a leading company in the field of screws and screens feeder machinery, new all of our feeding units, which is indispensable for manufacturing and assembly line magnification.

Product lineup

DF310H
TF310H
FF303H
FF803H

Model selection graph

Screen rotational display

Range where low feeding of screws is possible

Screw capacity calculation formula

Estimated screw capacity (%) = Basket capacity (unit) × Diameter screw rakes (unit) / Coefficient (0.8)

(Example) SH200 (Diameter screw rakes = 0.8)

SH200 = \[ 36 \times (1500 \times 1 / 2) \times (1 / 2) \times 0.8 = 170 \]

SH300 = \[ 60 \times (1500 \times 1 / 2) \times (1 / 2) \times 0.8 = 240\]

SH800 = \[ 100 \times (1500 \times 1 / 2) \times (1 / 2) \times 0.8 = 300\]

SH series

Handfed screw driving tool

FEEDER series

FASTENING INNOVATION for THE FUTURE

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For more information, see our website or contact the nearest sales office.
For precision screws and micro screws

Disk Type Micro Screw Feeder DF200

Solution for Precision and Micro Screws

Simple mechanism which is using rotary disk system.
High efficiency is achieved because of very low incidence of jamming.

Easy operation

Disk can be changed to feed different diameter screws.
Each screw is moved individually by a cam when the disk rotates.
Any screw with the same head diameter, No matter head shape or thread type can be fed with the same disk.

Installation in automatic lines

Efficient feeding guarantees line stoppage due to feed faults.
Efficient feeding prevents line stoppage due to screw feeding faults. External I/O signals can also be used.

Specifications

<table>
<thead>
<tr>
<th>Item</th>
<th>Type</th>
<th>Model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Drive type</td>
<td>DC motor</td>
<td>DF200</td>
</tr>
</tbody>
</table>

Application example

- Screw Driving Robot equipped with a DF200 unit

Outside dimension

- Length: [measured value]
- Width: [measured value]
- Height: [measured value]

Compact Drum Type Screw Feeder FF311DR

The solution for screws with captive springs and plain washers

A simple mechanism that lines up screws on the chute rail, clears screw jamming and stops screws. This model is recommended if you use screws with captive springs and plain washers in PWB assembly.

Easy operation

Removes screws from the chute, eliminating screws easy.

Specifications

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<tr>
<th>Item</th>
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<th>Model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Drive type</td>
<td>DC motor</td>
<td>FF311DR</td>
</tr>
</tbody>
</table>

Application example

- Multi-Screw Driving Machine using the FF311DR

Outside dimension

- Length: [measured value]
- Width: [measured value]
- Height: [measured value]

Standard Centerboard Type Screw Feeder FF503H-FF801H

Higher-quality screw feeding!

Rivets, nuts, pins, steel bolts, etc. can also be fed as well in screws and bolts. The compact body design enables installation almost anywhere and easy maintenance.

Quickly Blow Feed Screws

Single-screw and twist feed on a differential feed basis. Simple and safe operation. Multiple models are available depending on the screws and bolts to be fed.

Specifications

<table>
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<tr>
<th>Item</th>
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<th>Model</th>
</tr>
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<tbody>
<tr>
<td>Drive type</td>
<td>DC motor</td>
<td>FF503H</td>
</tr>
</tbody>
</table>

Application example

- Screw Driving Robot with DF030 unit

Dual Operation

Same machine unit can blow feed screws in two directions.

Outside dimension

- Length: [measured value]
- Width: [measured value]
- Height: [measured value]

Example of machine configuration

- [image of machine configuration]
For precision screws and micro screws
Disk Type Micro Screw Feeder
DF200

Solution for Precision and Micro Screws

Simple mechanism which is using rotary disk system. High efficiency is achieved because of very low incidence of jamming.

Easy operation

Screw can be changed to feed different diameter screws.

Installation in automatic lines

Efficient feeding operation and reliable due to feed faults. Efficient screw feeding prevents misalignment due to screw feeding fault. External I/O signals can also be used.

Specifications

<table>
<thead>
<tr>
<th>Function</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Model</td>
<td>DF200</td>
</tr>
<tr>
<td>Power</td>
<td>200W</td>
</tr>
<tr>
<td>Speed</td>
<td>100 rpm</td>
</tr>
<tr>
<td>Accuracy</td>
<td>±0.01 mm</td>
</tr>
</tbody>
</table>

Application example

Screw Driving Robot equipped with DF200 units

Compact Drum Type Screw Feeder

FF311DR

The solution for screws with captive springs and plain washers

Screws with captive springs and plain washers rarely jam.

Easy operation

Simple mechanism which is using rotary disk system. High efficiency is achieved because of very low incidence of jamming.

Compact body

Body can be placed almost anywhere to maximize the production line.

Specifications

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<tr>
<td>Model</td>
<td>FF311DR</td>
</tr>
<tr>
<td>Power</td>
<td>100W</td>
</tr>
<tr>
<td>Speed</td>
<td>50 rpm</td>
</tr>
<tr>
<td>Accuracy</td>
<td>±0.02 mm</td>
</tr>
</tbody>
</table>

Application example

Screw Driving Robot using the FF311DR

Standard Centerboard Type Screw Feeder

FF503H・FF801H

Higher-quality screw feeding!

Braise, nuts, pins, steel bolts, etc. can also be led in as screws and bolts. The compact body design enables installation almost anywhere and easy operation.

Quickly Blow Feed Screws

Singlescrew and feeders on a Z-axis control system. It can be used in any position. Vizzly-Mite screws and chips.

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Application example

Screw Driving Robot using the FF503H・FF801H

For precision screws and micro screws
Drum Type Micro Screw Feeder

DF200

Solution for Precision and Micro Screws

Simple mechanism which is using rotary disk system. High efficiency is achieved because of very low incidence of jamming.

Easy operation

Screw can be changed to feed different diameter screws.

Installation in automatic lines

Efficient feeding operation and reliable due to feed faults. Efficient screw feeding prevents misalignment due to screw feeding fault. External I/O signals can also be used.

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Application example

Screw Driving Robot equipped with DF200 units

Compact Drum Type Screw Feeder

FF311DR

The solution for screws with captive springs and plain washers

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Application example

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Standard Centerboard Type Screw Feeder

FF503H・FF801H

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<td>Model</td>
<td>FF503H・FF801H</td>
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Entrust your parts feeding to NITTO SEIKO!

NITTO SEIKO's safety is tested by 3 different parts feeder types: disk type, clean rotary collet type and oriental type. Their cost and noise level are lower and the required installation space is smaller compared with the other parts feeders.

Most DF series models have been sold in Japan and overseas since they were introduced into the market. Taking into consideration expectation and expectation, we can feed any part with confidence.

NITTO SEIKO is a leading company in the field of screws and screws feeding machinery, meets all of your feeding needs, which is indispensable for manufacturing and assembly line amplification.

**Product lineup**

<table>
<thead>
<tr>
<th>Model</th>
<th>DF200</th>
<th>TF3110H</th>
<th>FF503H</th>
<th>FF801H</th>
</tr>
</thead>
<tbody>
<tr>
<td>Description</td>
<td>Screw mounted feeder</td>
<td>Hand fed type</td>
<td>Sydney type</td>
<td>Details overload feeder</td>
</tr>
</tbody>
</table>

**Model selection graph**

- Low cost
- Small space
- Low noise

**Screen mounting feeder**

*Range where low feeding of screws is possible.*

**Screw capacity calculation formula**

Estimated screw capacity = Basket capacity (mil) × Coefficient (0.01) × Diameter (mt) / 6

**Specifications**

- **DF** series
- **TF** series
- **FF** series
- **SF** series
- **FF801H**

**Application example**

- **DF200**
- **TF3110H**
- **FF503H**
- **FF801H**

**Features**

- **DF200**
- **TF3110H**
- **FF503H**
- **FF801H**

**SH200 / SH300**

- **Large volume feeding**
- **Tumbling Barrel Type Auxiliary Hopper**

** Auxiliary hopper for less frequent screw filling (Optional)**

**Separate installation space is needed.**

The hopper is directly mounted on the screw feeder and does not need an actual installation needed by a conventional auxiliary hopper.

**Easy screw filling**

- The barrel is removable.
- Low noise

The barrel hopper prevents any bare running noise.

**Easy mounting and dismounting**

The hopper is a single type and can be easily mounted and dismounted.

**FEEDER series**

- **FF** series
- **SF** series
- **FF801H**

**Handheld screw driving tool**

*Handfed FSSD** types comprising feeders and fastening units are also available.

**Website**

https://www.nittoseiko.co.jp

**Machinery Division Co., Ltd.**

**Global sales head office**

3, Minzoku-cho, Kashiwazaki, Kashiwazaki, Japan, 820-0036, Japan. Tel: +81-774-51-2990, Fax: +81-774-51-1462

**NITTO SEIKO CO., LTD.**

**Mechanization Division Co., Ltd.**

**Machinery Division Co., Ltd.**

**FEEDER series**

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- **SF** series
- **FF801H**

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