Main Body Size

3189 mm

1280 mm

2669 mm

900 mm

1565 mm

AIMEX IIs

Fuji Flexible Placement Platform

Supported Head

		HX*	V12	H12HS	H08M	H02	H01	OF
Nozzle quantity		12/4/1	12		8	2	1	1 (or 1 claw)
Production capability (cph)		25,000(R12)/ 11,000(R4)/5,000(S1)	26,000	22,500	13,000	5,500	4,200	3,000
Applicable part size (mm)		0402 to 74 x 74(32 x 100) Height：Max. 25.4	0402 to 7.5 x 7.5 Height：Max. 3.0		0603 to 45 x 45 Height：Max 13.0	1608 to 74x 74(32 x 180) Height：Max 25.4		1608 to 74 x 74 (32 x 180) Height：Max38.1
Parts presence check		○(R12 h, parts height up to 3 mm)	○	○(H12HSQ)	○(H08MQ)	○		×
Parts packaging	Tape	○	○		○	○		○
	Stick	○(When R4 or S1)	×		○	○		○
	Tray	○(When R4 or S1)	×		○	○		○

* Currently under developement

Basic Specifications

Applicable panel size (L x W)	48 x 48 mm to 774 x 318 mm (double conveyor and dual transport) 48 x 48 mm to 774 x 586 mm (double conveyor and single transport) 48 x 48 mm to 774 x 686 mm (single conveyor) *Transport of panels up to L = 1,068 mm is possible, but over 774 mm is outside the placement range.
Part types	Up to 130 (when using 8 mm tape)
PCB loading time	Double conveyor: 0 sec for dual transport, 5.0 sec for single transport; Single conveyor: 5.0 sec
Placement accuracy (fiducial mark standard)	HX(R12) / V12 / H12HS ： ± 0.038(±0.050)mm (3σ) cpk≧1.00 ※ HX(R4) / H08M ： ± 0.040 mm (3σ) cpk≧1.00 OF ： ± 0.050 mm (3σ) cpk≧1.00 HX(S1) / H02 / H01 ： ± 0.030 mm (3σ) cpk≧1.00 * ±0.038 mm is for placement of rectangular chips under optimal conditions at Fuji (with high accuracy tuning).
Conveyance height	900 to 950 mm

AIMEX IIs

Flexible platform for all types of production

A Flexible New Production Solution

Wide range of parts supported from small chips to large parts

High speed placing of chip parts and flexible placing for high throughput of medium sized parts. With dynamic tool exchange for optimal support of everything from small chips to large and odd-form parts in addition to the standard head lineup, the AIMEX IIS supports a huge range of parts.

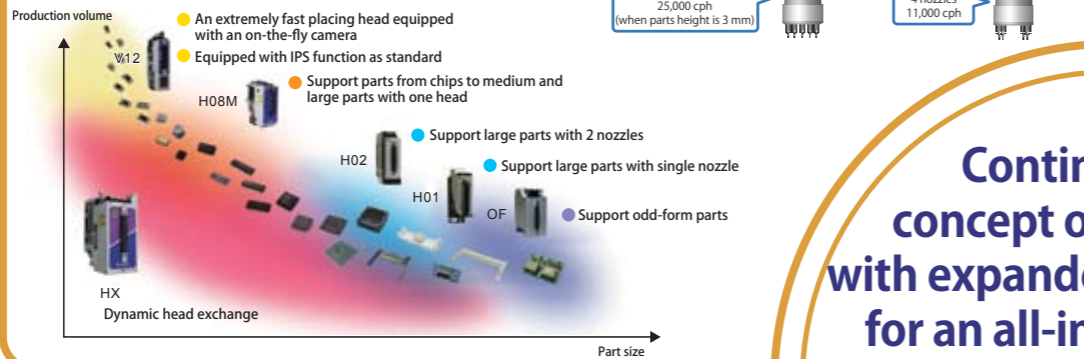**Support for different production types (alternate production, independent production)**

A double conveyor allows dual lane production of different panels at the same time. This production method enables changeover at one lane to be performed while production continues at the other, helping you to reduce lead times for your products.

Convenient functions for trial and low-volume production

A new function enables vision processing data adjustments to be made quickly and at the machine, which speeds up the process of introducing a new job to the line.
This on-machine software can create vision processing data automatically based on the actual image of parts. All the operator needs to do is confirm the image is correct and then production can restart, greatly improving efficiency during New Product Introduction (NPI).

Expanded ability to handle various part types

As well as the ability to load up to 130 parts in tape, using the OF head means support for a wide range of odd-form parts. This allows the machine to place parts up to 38.1 mm (1.5 inches) in height such as the relays and LAN connectors that are commonly used for automotive panels and motherboards.
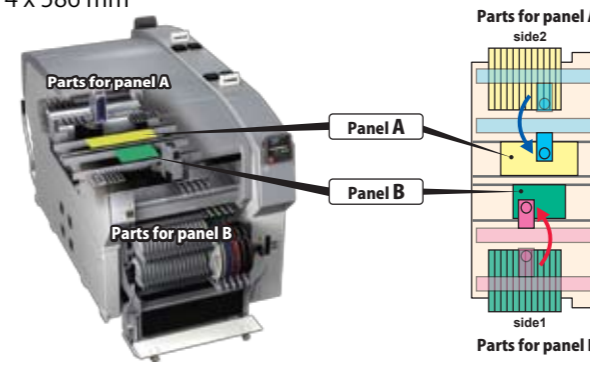

Newly developed DynaHead (HX) added to the lineup

- Dynamic exchange during production to the best tool for the job
- Borderless production is made possible using the DynaHead to dynamically exchange between 12-nozzle, 4-nozzle and single nozzle tools.

* Under development

Single nozzle
5,000 cph

12 nozzles
25,000 cph
(when parts height is 3 mm)

4 nozzles
11,000 cph

Production volume

- An extremely fast placing head equipped with an on-the-fly camera
- Equipped with IPS function as standard
- Support parts from chips to medium and large parts with one head
- Support large parts with 2 nozzles
- Support large parts with single nozzle
- Support odd-form parts

W12
H08M
H02
H01
OF

HX
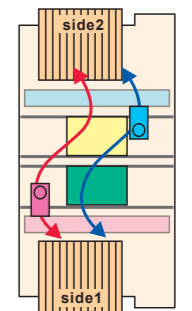Dynamic head exchange

Part size

Independent production at dual lanes

- Multi production (independent production of different panels on double conveyors)
- Changeover at one lane while production continues at the other
- Dual transport on double conveyor supports panels up to 774 x 318 mm; single transport supports panels up to 774 x 586 mm

Parts for panel A
Parts for panel B

Panel A
Panel B

Parts for panel A
side2
side1
Parts for panel B

Pickup from both sides by either head
* Under development

- For twin robot machines, both robots can pick up parts from both sides.

This means there is no need to duplicate supply of parts which are required at both sides, reducing the number of half-used reels.
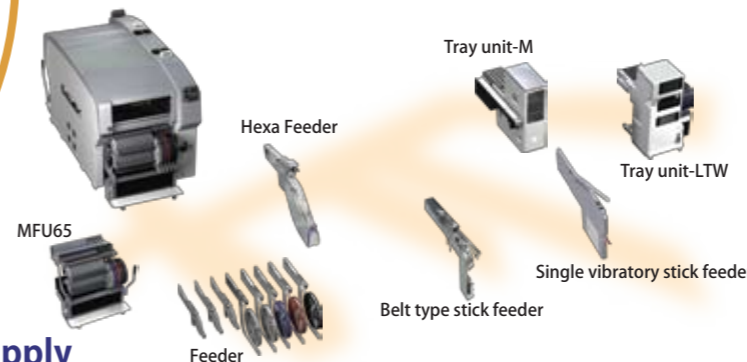
side2
side1

Vision processing error occurs

1. Automatically recreates vision processing data
2. Check results
3. Restart production

Work time has been lowered by **82%** compared to previously (under conditions at Fuji)

Efficient support for New Production Introduction (NPI)

- A faster system for adjusting data and recovering from errors to enable production of new products to be started more efficiently
- A tool for easily adjusting vision processing data
- Machine can recreate vision processing data automatically

NPI: New Product Introduction

Tray unit-M
Hexa Feeder
Tray unit-LTW
MFU65
Single vibratory stick feeder
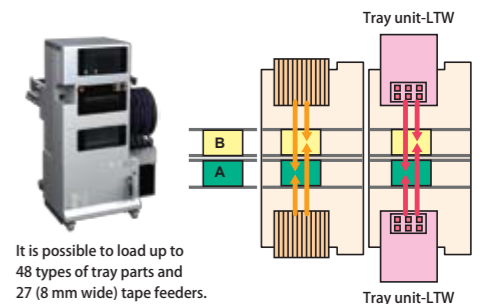Belt type stick feeder
Feeder

Flexible part supply

- As well as standard tape and HexaFeeders (under development), tray units and stick feeders can be loaded to enable flexible support for various production needs.
- HexaFeeders enable six 8 mm feeders to be loaded at just 4 slots on the machine, giving a total of 194 part types that can be loaded.
- Because the AIMEX IIS uses many of the same units as the NXT series, you can make the best use of existing assets.

(*Some units are not compatible)

Better tray unit performance

- The twin magazine design means that tray parts can be supplied non-stop.
- Feeders can also be loaded, ensuring optimal machine balance.
- Tray units can be loaded at both sides.

Tray unit-LTW

B
A

It is possible to load up to 48 types of tray parts and 27 (8 mm wide) tape feeders.

Tray unit-LTW

Continuing the concept of the AIMEX, with expanded functionality for an all-in-one solution for everything from trial runs to volume production, from high density small panels to large panel production.