

A high-quality placing machine capable of versatile, high-speed production.

**XPF-L**  
**XPF-S**

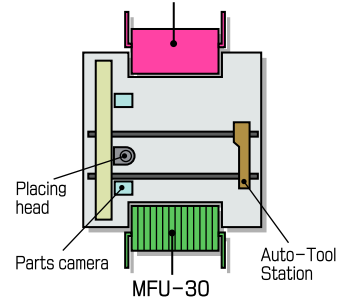
**FUJI**

■ Machine Configuration

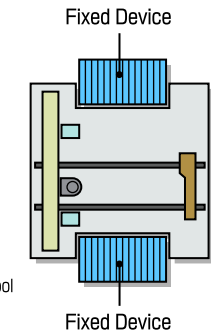
**XPF-L** (Versatility)

● Specification 1  
Dual Clamp

- Device selection
  - MFU-30 (Multi-Feeder Unit)
  - BTU-A (Board Tray Unit)
  - MTU-A (Multi-Tray Unit)
  - Clamp Type Cover (Option)

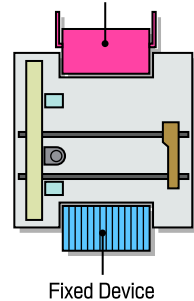


● Specification 2  
Dual Fixed



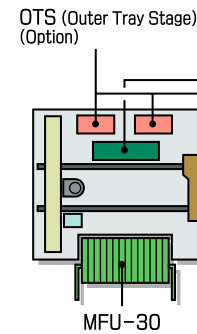
● Specification 3  
Fixed-Clamp

- Device selection
  - MFU-30 (Multi-Feeder Unit)
  - BTU-A (Board Tray Unit)
  - MTU-A (Multi-Tray Unit)
  - Clamp Type Cover (Option)

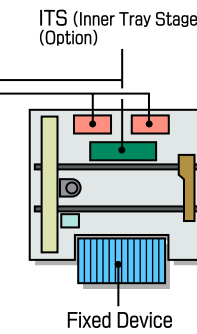


**XPF-S** (Compact Functionality)

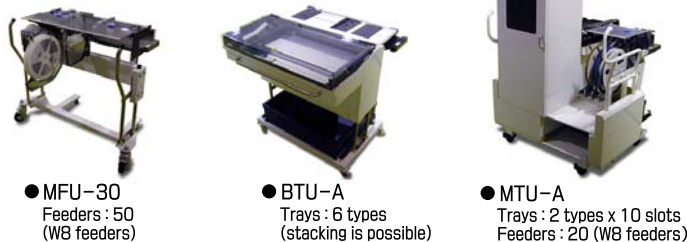
● Specification 4  
Single Clamp



● Specification 5  
Single Fixed



Parts Supply Units



- MFU-30  
Feeders : 50 (WB feeders)
- BTU-A  
Trays : 6 types (stacking is possible)
- MTU-A  
Trays : 2 types x 10 slots  
Feeders : 20 (WB feeders)  
Single Nozzles : 7

Auto-Tools



- Revolver Auto-Tool
- Single Nozzles
- Glue Auto-Tool

Machine Specifications	Revolver Auto-Tool	Single Nozzle	Glue Auto-Tool
Number of nozzles	12	1	Number of syringes loaded : 1 syringe per glue station
Number of auto-tools held in auto-tool station	2	6 (One Tray Height Measurement Auto-Tool is held when using trays)	Number of feeder slots occupied : 6 slots (Fixed loading position - up to 4 glue auto-tools can be loaded)
Supported parts	0402 (01005) to 20 x 20 mm Maximum height : 3.0 mm	1005 (0402) to 45 x 150 (45 x 45) mm Maximum height : 25.4 mm	Loading side : Side 1 (MFU-30 or fixed device)
Machine tact	0.144 sec/component 25,000 cph	0.40 sec/component 9,000 cph	Dispense tact : 0.2 sec/shot
Placing accuracy	Small chip parts ±0.050 mm cpk≥1.00, ±0.066 mm cpk≥1.33 QFP parts ±0.040 mm cpk≥1.00, ±0.053 mm cpk≥1.33	±0.040 mm cpk≥1.00, ±0.053 mm cpk≥1.33 ±0.030 mm cpk≥1.00, ±0.040 mm cpk≥1.33	Dispense position accuracy : ±0.1 mm cpk≥1.00
PCB size (L x W)	Max. 457 mm x 356 mm, Min. 50mm x 50mm, Thickness 0.4(0.3) to 5.0 mm		
PCB loading time	1.8 seconds		
Machine dimensions	L : 1,500 mm W : 1,607.5 mm (XPF-S W : 1,240 mm) H : 1,419.5 mm (Conveyance height : 900 mm H : excludes signal tower)		
Machine weight	Machine body XPF-L : 1,500 kg, XPF-S : 1,500 kg MFU-30 : 260 kg (with W8 feeders loaded) BTU-A : Approx. 120 kg MTU-A : Approx. 615 kg (with trays/feeders loaded)		

Parts Packaging

- Tape parts (JIS standard, JEITA), stick parts, tray parts

Options

- Glue application unit
- Wide fiducial camera
- Board Tray Unit (BTU-B, BTU-C)
- Backup pin setter
- Lead linearity check
- Custom Nozzles and Mechanical Chucks
- Reel Set Stand (within the main machine)
- Fujitrax

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Always consult Fuji prior to selling any Fuji equipment to a third party.  
The contents of this catalog are subject to change without notice.  
The information in this catalog is current as of September, 2007  
Cat.No.XPF/07.Sep/E

High-Speed  
Multi-Purpose Mounter

**XPF**

Versatility **XPF-L**

Compact Functionality **XPF-S**

The XPF is the first machine in the world to realize "dynamic head exchange" and achieve "borderless optimization".  
Line throughput is improved dramatically.



High-Speed Multi-Purpose Mounter

# The XPF eliminates the trouble of dividing a line between chip placers and multi-purpose mounters!

- Dynamic head exchange
- Borderless optimization
- Easily removable tray units
- Uses Fuji Intelligent Feeders

XPF-L  
XPF-S

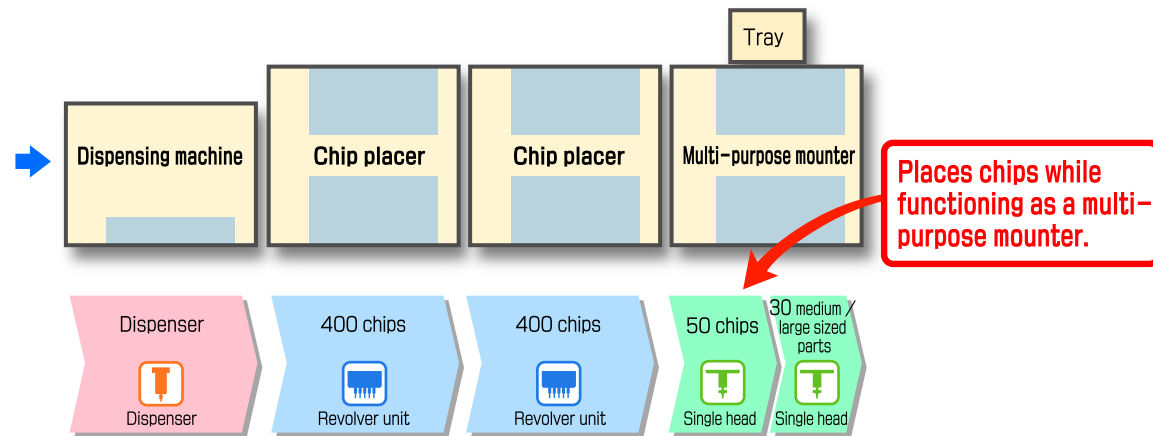


## Borderless Line Optimization

- Borderless line optimization is achieved by the XPF because all XPF machines share the same production capabilities.

### Conventional lines

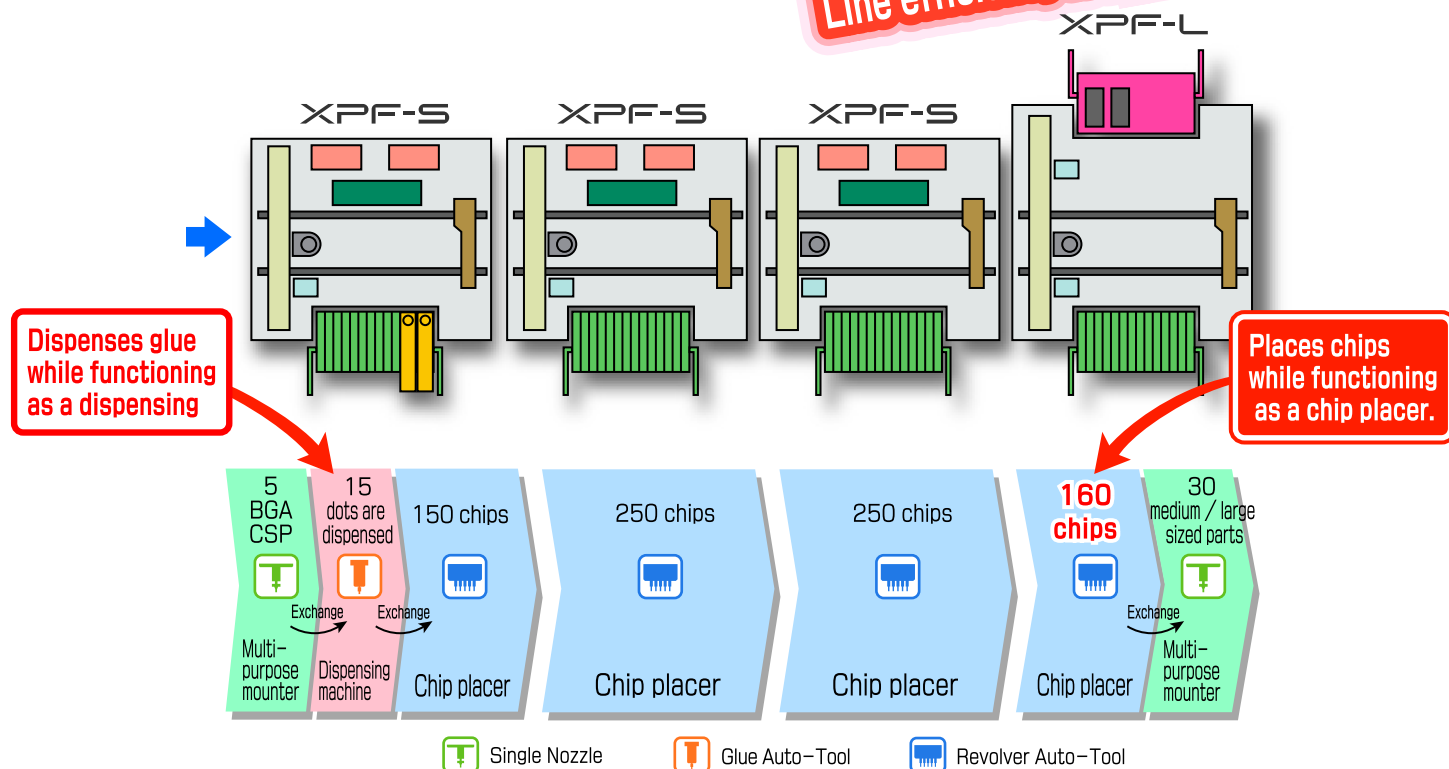
A conventional line is composed of machines specializing in a certain kind of production.



### XPF line

The efficiency of the line is vastly improved by breaking down the borders between machines to eliminate wasteful operation.

**Line efficiency is improved by %160!**※

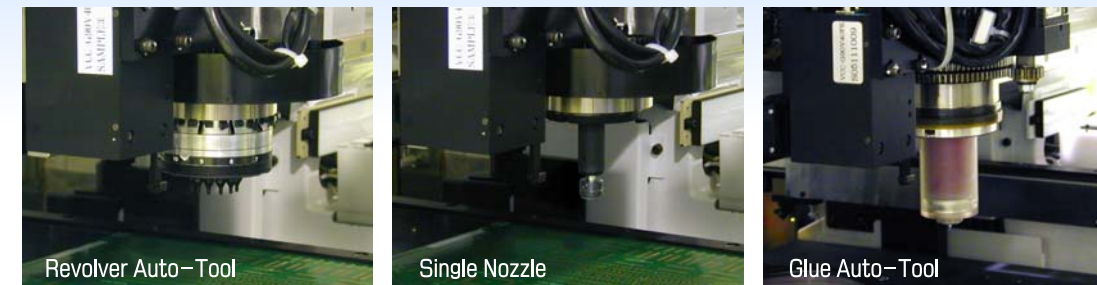


**A XPF line eliminates wasteful machine operation**

※This figure is the result of a simulation. The line efficiency will vary depending on the number of placements.

## Dynamic Head Exchange

Thanks to the dynamic head exchange function, each head can be used to the maximum potential, preventing drops in operating efficiency. Auto-tools are exchanged in less than one second. (Revolver Auto-Tool, Single Nozzle)



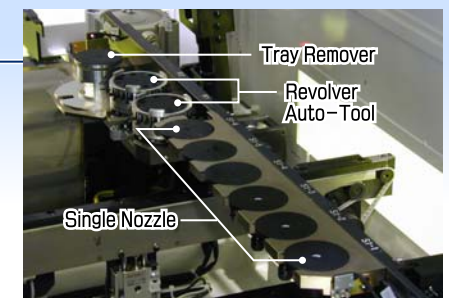
### Glue Auto-Tool

- The glue auto-tool is used for occasional dispensing of glue, preventing increases in the length and cost of the line incurred by the acquisition of a dedicated dispensing machine.
- Glue dispensing is used to secure parts or for marking the panel, without having to worry about drops in operating efficiency.
- A glue station (for maintaining glue temperature) and a glue check unit (for applying glue) are required when dispensing glue.

## Auto-Tool Station

The auto-tool station supports automatic exchange of the various auto-tools listed below.

- Revolver Auto-Tool: 2 tools
- Single Nozzle, Mechanical Chuck, Backup pin setter, Tray Height Measurement Auto Tool: 6 tools
- Tray Remover: 1 tool



## Board Tray Unit (BTU-A)

A tray unit offering superb cost performance. Status of tray parts can be checked a single glance from outside the machine, and the tray unit can be removed from the machine in order to resupply trays—all while the machine is operating.

- Up to six tray types can be loaded (up to five types for JEDEC standard trays)
- Stacking of trays is possible up to 32 mm
- Offers a capacity rivaling that of a small magazine-type tray unit



## Tray Stage

A fixed platform is installed at side 2 of the machine so that tray parts can be placed by compact XPF-S.

- ITS (Inner Tray Stage)
- OTS (Outer Tray Stage)



## Fuji Intelligent Feeder

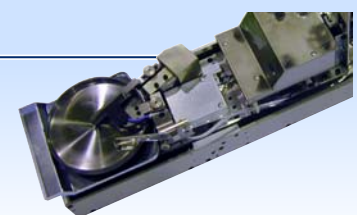
Fuji Intelligent Feeders provide an unparalleled combination of high-speed parts supply and versatility.

- Feeders can be inserted and removed while the machine is operating (side1 only)
- A variety of advanced functions made possible by a feeder ID system
- Easy tape splicing
- Adjusts to support paper and emboss parts tape of any thickness or pitch
- Compatible with NXT and AIM machines
- Each feeder is independent and contains one part type for easy exchange
- The following tape thicknesses are supported: 8, 12, 16, 24, 32, 44, 56, 72, and 88 mm



## Dip Flux Unit

When placing bump parts such as BGAs and CSPs, parts are dipped in flux and a uniform amount of flux is applied to each bump.



## Stick Feeder

A stick feeder that can be used on both the NXT and AIM machines.