

Computer-controlled, Dry-head, High-speed, Single-thread, Chainstitch Button Sewing Machine

MB-1800B (with wiper unit)

MB-1800A/BR10 (with button feeder)

A new button sewing machine that supports many different button sewing specifications independently.



MB-1800B
(Table stand is optionally available.)



MB-1800A/BR10
(The stand leg is optionally available.)

MB-1800B (with wiper unit)

It comes with direct-drive electronic feed driven by a compact AC servomotor to guarantee excellent seam quality and dramatically improve flexibility and maintainability.



MB-1800B (Table stand is optionally available.)

Excellent seam quality and improved flexibility

The machine is able to independently sew various stitching shapes such as U-shaped stitching, X-shaped stitching and Z-shaped stitching

- The machine has 55 different stitching patterns as standard. In addition to the sewing shapes, the buttonhole intervals and number of stitches can also be changed on the operation panel. The machine completely supports many different button specifications to increase its range of applicability, reduce costs associated with changes in specifications, and save the operator from having to adapt the machine to different specifications.
- Custom patterns can be created on the PGM-20 and then used on the sewing machine.



↑ with cross-over stitches ↑ without cross-over stitches



● Easy-to-use operation panel

Shorter lengths of thread remain after thread trimming

- The machine performs thread trimming at the optimal position by correcting the button position with respect to the needle entry of the last stitch. This shortens the thread remaining on the material after thread trimming to approx. 3.5 mm.

The dry-head eliminates oil stains

- The machine head is a non-lubricating type. With this type, the operator never has to add oil, and staining of the sewing product with oil is an impossibility.

The machine sews buttons with beautifully finished seams

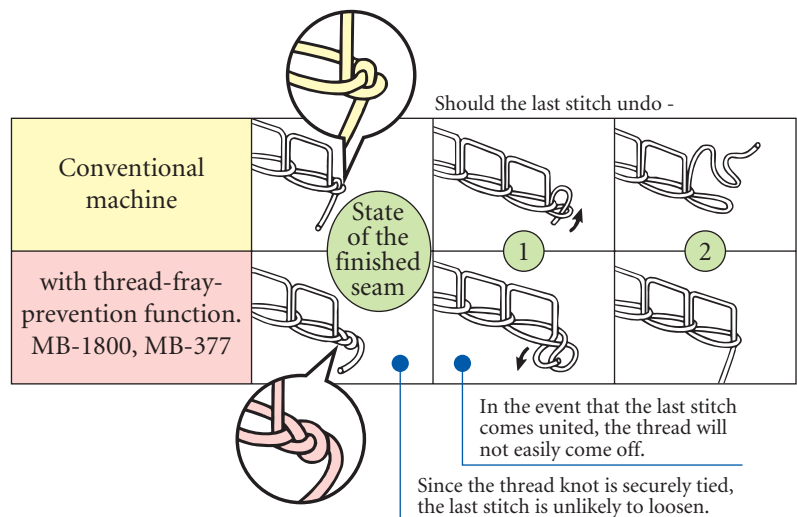
- The machine adopts a stitching pattern with the tying stitch only at the final stitch. This ideal stitching pattern optimizes single thread chainstitching to produce beautiful seams on the wrong side of the material, thereby guaranteeing excellent seam quality.
- Moreover, since the machine uses significantly fewer mechanical parts, troubles caused by excessive play in the feed such as needle breakage and button breakage occur for less often.

The machine is equipped as standard with thread-fray-prevention function

- The machine comes as standard with the solenoid-operated, thread-tension-changeover "thread-fray-prevention function." Since the machine is designed to use a long needle (TQ×7), the "thread-fray-prevention function" can be used for sewing shank buttons.
- The "thread-fray-prevention mechanism" can be rendered ON or OFF as required by setting the solenoid drive ON or OFF.



■ DIFFERENCE IN KNOT-TYING METHOD



The quality of the seams was verified in the laundry test: After 200 repeated machine washings seams came untied 0 (zero) times.

The strength of the seams is doubled, guaranteeing outstanding durability.

(Laundry test was conducted by QTEC* according to JIS L0217 Test Method 103.)

*QTEC= Japan Textile Products Quality and Technology Center.
Japan's first "ISO 9002"-approved testing body for textile products

The machine offers outstanding productivity

- The machine runs at a maximum sewing speed of 1,800 rpm and comes with a direct-drive system supported by a compact AC servomotor that offers excellent stopping accuracy and responsiveness. Working in combination, these features shorten the machine time by 10 % or more compared with our conventional machine. Needless to say, the single-thread, chainstitch, button sewing machine does not need bobbin thread changing.

Excellent maintainability and operability

- Thanks to the elimination of the mechanical structures such as the stop-motion mechanism and feed cam, the machine operates with less vibration and noise and requires no maintenance.
- The foot pedal can be operated with reduced pressure from the operator's foot. This helps reduce operator fatigue by allowing the operator to operate the machine more rhythmically.



- Circuit board, motor, and operation panel integrated into the machine head

The machine responds to many different button sewing specifications



- For sewing shank buttons: The “thread-fray-prevention function” (thread-fray-prevention function) is applicable. (Attachments are optionally available. To use the MB-1800B, remove the wiper unit.)



● Attaching flat buttons (small)



● Space pin (accessory)



● Button neck wrapping, 1st process (Attachments are optionally available)

PATTERN DATA TABLE

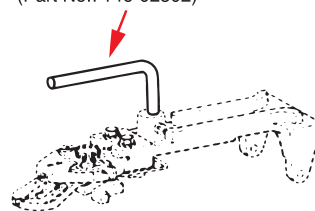
Pattern No.	Shape		Number of stitches	Stitch pitch
	Application	Stitch diagram	Data setting range	Data setting range
1~3	4-holed		15, 19, 23, 27	2.0~6.5mm (in increments of 0.2 mm)
4~6	4-holed		16, 20, 24, 28	
7~9	4-holed		15, 19, 23, 27	
10~12	4-holed		16, 20, 24, 28	
13~15	4-holed		15, 19, 23, 27	
16~18	2-holed		8, 10, 12, 14	
19~21	2-holed			
22~24	4-holed		15, 19, 23, 27	
25~27	4-holed		16, 20, 24, 28	
28~30	3-holed		17, 23	
31~33	3-holed			
34~36	3-holed			
37~39	3-holed			
40~42	Label attachment		5, 7	6.0, 8.0, 10.0mm
43~45	Button neck wrapping, 2nd process Zigzag width: 4 mm		6, 10, 16	Button neck height 0~6.5mm (in increments of 0.2 mm)
46~48	Button neck wrapping, 2nd process Zigzag width: 5 mm			
49~51	Button neck wrapping, 2nd process Zigzag width: 6 mm			

* For all stitch shapes, three different pieces of data can be established by selecting the number of stitches and stitch pitch within the respective data setting ranges.

Existing attachments are applicable

- Attachments for sewing flat buttons, shank buttons, wrapped-around buttons, snaps and bartacking labels are prepared. Note that the attachments for the button clamp jaw lever of your MB-373 or -377 can be used with the MB-1800 only by replacing the lifting hook of the button clamp mechanism with the lifting hook exclusive to the MB-1800 (Part No.: 146-02502).

● Button clamp mechanism, lifting hook (Part No.: 146-02502)



■ ATTACHMENT TABLE

Application		Sketch	For MB-1800	For MB-373	For MB-377	
For flat buttons	Small-to large-buttons thickness 5.0 mm		Left	← Common	← Common	
			Right	←	←	
	Large-buttons thickness 3.5 mm		146-17559	MAZ-031000AA *	MAZ-201010A0 *	
	Medium-buttons thickness 3.5 mm		D2529-373-B00A	←	←	
	Small-buttons thickness 3.5 mm	Button size A: 0~3.5 mm B: 0~3.5 mm C: φ10~φ12 mm	B2529-373-000	←	←	
For shank buttons		Button diameter: 16 mm or less Shank size A: 5~6 mm B: 2.5~3 mm	146-17658	B24013730B0 *	— Not prepared	
		Button diameter: 16 mm or less Responds to slight variations in the button shank.	146-17757	MAZ-040000AA *	—	
		Buttons with round shanks A: φ5 mm Cloth-to-button distance is small.	146-17856	←	—	
For wrapped-around buttons	1st process		Button-to-material distance A: 5.5 mm	B2447-372-0A0	←	—
			Button-to-material distance is adjustable. The machine is capable of sewing flat buttons without neck wraps. A: 3 mm or more B: 12 mm or less	141-34050	←	—
	2nd process			B2440-373-0A0	←	—
			The machine wraps the button neck while moving the attachment back and forth.	MAZ-046010A0	←	—
For flat buttons and wrapped-around buttons (first process of button neck wrapping)			Button-to-material distance A: 5.5 mm Flat button sewing process or the first process of button-neck wrapping is enabled by sliding the neck wrapping foot away from the sewing position.	MAZ-172000A0	←	—
For snaps			Size A: 8 mm	146-17955	B2552-373-BAA *	—
For metal buttons				146-18052	B2420-373-0AA *	—
For stay buttons			To be used in combination with the B2447-372-0A0 or 141-34050. For the 141-34050 A: 3.5 mm or more	MAZ-039010A0	←	—
For label attaching			Zigzag width: Max. 10 mm	146-18151	MAT-64401ZBA *	—

* Applicable by replacing the lifting hook of the button clamp mechanism with that for the MB-1800.

MB-1800A/BR10

(with button feeder)

With its button feeder, the machine increases productivity.

The machine flexibly responds to the small-lot production systems applied for various kinds of products. The outstanding ease in its operation promises higher productivity.



● Horizontal, forced feed mechanism

■ BUTTON CARRIER

Configuration of button carrier							
● For 4-holed buttons				● For 2-holed buttons			
Distance A (mm) : Distance between holes in button	Distance B (mm) : Diameter of set pin	Part No.	Code	Distance A (mm) : Distance between holes in button	Distance B (mm) : Diameter of set pin	Part No.	Code
Standard							
2.6	1.0	165-57902	A	3.2	1.2	165-58009	B
Optional							
2.0	1.0	165-90507	Q	2.0	1.0	165-87305	E
2.2	1.0	165-90606	R	2.2	1.0	165-87404	F
2.4	1.0	165-88501	S	2.4	1.0	165-87503	G
2.4	1.2	165-88600	T	2.4	1.2	165-87909	L
2.6	1.2	165-88709	U	2.6	1.0	165-87602	H
2.8	1.2	165-88808	V	2.6	1.2	165-88006	M
3.0	1.2	165-88907	W	2.8	1.0	165-87701	J
3.0	1.5	165-89806	F1	2.8	1.2	165-88105	N
3.1	1.0	165-87206	D	3.0	1.0	165-87800	K
3.1	1.2	165-89004	X	3.0	1.2	165-88204	P
3.1	1.4	165-89202	Z	3.8	1.2	165-87107	C
3.2	Taper	165-89905	G1				
3.6	1.2	165-90705	H1	2.8*	1.0	182-13603	J1
4.0	1.2	165-89707	E1				

* For vertical 2-hole buttons

■ OPTIONS

Description	Part number of the assembly
Button clamp jaw lever (left) for large-sized buttons	MAZ088220BAA
Button clamp jaw lever (right) for large-sized buttons	MAZ088230BAA

The machine dramatically improves productivity

With its increased button-feeding speed and high-speed machine head capable of a maximum sewing speed of 1,800rpm the machine dramatically increases productivity. Furthermore, its button-discharging mechanism and easy-to-adjust functions make it easy to change the setup when changing the buttons to be sewn, thereby eliminating wasted time at start-up.

Three different operation modes are available, enabling this machine to be employed by a small-lot production system

The three different operation modes available are the automatic button feeding mode in which the machine continuously feeds the buttons in the feeder bowl, the non-feed mode in which the operator manually places the buttons in the sewing position one by one, and the small-lot sewing mode in which the operator sets the buttons in place for one garment (five or six buttons) in advance, upon which the buttons are automatically and continuously fed to the sewing position. As a result the machine can be employed by a small-lot production system by selecting the appropriate operation mode.

The machine ensures remarkable ease in operation

The machine is provided with a wider sewing area to facilitate garment setting, and allows the operator to check the remaining quantity of buttons while remaining seated, thereby enhancing ease of operation. Furthermore, the machine allows the operator to continuously sew buttons with pedal depressed, thereby helping reduce the operator's fatigue.

SPECIFICATIONS

Model name	MB-1800S	MB-1800B	MB-1800A/BR10
Max. sewing speed	1,800rpm		
Amount of feed	Crosswise feed 0~10mm • Lengthwise feed 0~6.5mm		Crosswise feed 0~4.0mm • Lengthwise feed 0~4.0mm
Applicable buttons	Type: Round-shaped flat buttons Size: $\phi 10 \sim \phi 28$ mm Attachment: • For small buttons ($\phi 10 \sim \phi 12$ mm) • For medium buttons ($\phi 12 \sim \phi 20$ mm) • For large buttons ($\phi 20$ mm or more) Thickness: 1.8~5mm • The button clamp jaw lever for thick buttons has to be used for buttons with thicknesses of 3.5 mm or more.		Type: Round-shaped flat buttons Size: $\phi 9 \sim \phi 26$ mm • Machines can be custom ordered for the sewing of button diameters outside the standard range less than $\phi 10$ mm and less, $\phi 19$ mm and over. • For buttons of which diameter is $\phi 16$ mm or more, a button clamp jaw lever for large buttons has to be used. Thickness: 1.8~3.5mm
	Type: Shank buttons, wrapped-around buttons, snaps, metal buttons, stay buttons, labels (exclusive attachments have to be used.)		
Stitching shape			
Wiper unit	Options	Provided as standard	
Lift of the button clamp	Max. 14mm		
Needle bar stroke	48.6mm		
Needle (at the time of delivery)	TQ x 7 (#16) #14 ~ #20		
Feed system	By stepping motor		
Knot-tying mechanism	Provided as standard		
Lubrication	No lubrication		
Discrimination of button to be feed	—	Vibration system	
Button feed	—	By the horizontal, forced feed mechanism	
Button feed mode	—	Automatic feed mode, non-feed mode, and small-lot sewing mode	
Power requirement	Single-phase 220 ~ 240V, 100 ~ 120V (by changing over the PWB connector)		Single-phase 100V, 115V, 200V, 220V, 240V
Power consumption	150W		250W
Weight	Machine head, Circuit board 25kg		Machine head, Circuit board + control box for BR + device + table 56.5kg

WHEN YOU PLACE ORDERS

Please note when placing orders, that the model name should be written as follows:

[Machine head, Circuit board]

MB1800

Specification	Code	Attachments	Code
Without wiper unit	S	For flat buttons (small)	/
With wiper unit	B	For flat buttons (medium)	M

[Machine head, Circuit board: with button feeder]

MB1800A / BR10

Attachments	Code	Power supply	Code	Feed plate	Code
For flat buttons (small)	/	For General Export 100 ~ 240V	A	Standard 16 (for small-buttons)	/
For flat buttons (medium)	M	For CE 220 ~ 240V	C	22 (for medium-buttons)	M

OPTIONS



- Wiper device (For MB-1800S) (Part No.: M8512-630-0A0)

A wiper device and thread pulling wire used in union to sew buttons without cross-over stitches.



- 2-step pedal unit (Part No.: M8513-630-0A0)

A foot pedal unit and accompanying pitman rod. The pedal is operated in two steps, i.e., for lowering the button clamp and starting the sewing machine to facilitate positioning of the button and sewing product.

- 2-pedal unit for standing work PK-51* (Part No.: GPK-510010B0)

- 2-step pedal unit for standing work PK-57* (Part No.: GPK-570010B0)

* For PK-51 or PK-57, pedal switch conversion cable asm. (Part No.: M9013-590-0A0)



JUKI CORPORATION HEAD OFFICE

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- (1) The development of products and engineering processes that are safe to the environment
- (2) Green procurement and green purchasing
- (3) Energy conservation (reduction in carbon-dioxide emissions)
- (4) Resource saving (reduction of papers purchased, etc.)
- (5) Reduction and recycling of waste
- (6) Improvement of logistics efficiency (modal shift and improvement of packaging, packing, etc.)

- To order, please contact your nearest JUKI distributor.

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- * Specifications and appearance are subject to change without prior notice for improvement.
- * Read the instruction manual before putting the machine into service to ensure safety.
- * This catalogue prints with environment-friendly soy ink on recycle paper.