



Edge Banding Machine with Double Gluing Units for Narrow Edge NB671EMN (NB7CJMN)

Nanxing Machinery
Guangdong China



Find more: www.nanxingmac.com
Follow us: Nanxing Machinery



Description

Compact press rollers cooperate with additional assistance rollers on front and in between make it possible to do narrow edge banding work.

One set Pre-melt glue pot for EVA, One set Two-colors cleaning-free PUR glue pot, End cutting, Rough trimming and fine trimming, Two motors corner rounding unit, 2sets scraping and 2 sets buffing make it easy and fast to switch different color glue and tapes which meet flexible edge banding requirements. Cutters of two sets of scraping unit are able to move backwards automatically if changing to the other color glue, set-up time tends to zero. Low investment, big benefits.

封边方向 →
Edge banding direction





Details

1. Machine body

- Heavy duty machine body is welded with thick laser-cut steel plates, then through processing of advanced CNC machine for metal work, hence enhance the stability and strength, reduce the vibration in the process; Machine net weight up to **very heavy duty**;
- Frame body pass the **heat treatment** and **vibration aging treatment** to guarantees the whole service life without deforming.
- After **sandblasting** and **painting**, the top-grade CNC metal processing machines are used to process the body and components to make sure perfect quality and detail.



2. Professional assembly line

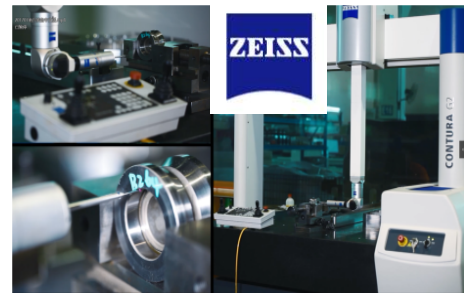
- Nanxing follow the SOP and set up the professional assembly lines. All the assembling is worked out by the experienced technicians that guarantee machine standardization and performance.





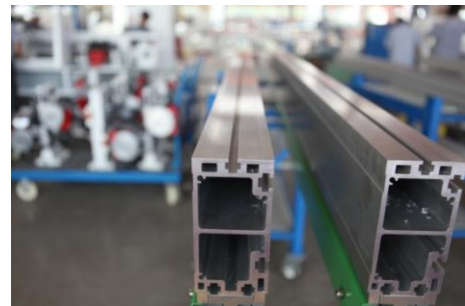
3. Quality control

- Advanced measuring equipment and strict QC system help to make sure the machines and parts are checked and certificated by very high standard.
- All the machines are delivered with Quality Certificate signed by QC specialist.
-



4. Top presser

- Aluminum pressure beam provides excellent stiffness and long service life.
- The height of presser beam adjusted automatically based on work piece's thickness just by inputting the work piece information on touch screen which saves a lot of time.
- Smaller rubber rollers connected compactly in 2 rows press work pieces plus inner side small roller assistance to ensure smooth conveying of narrow workpieces.
- Main processing units such as pre-milling, fine trimming and scraping units are specially configured additional rollers outside.





5. Conveyor

- Long straight semicircle guide rail is through hard treatment before installation, conveyor piece can perfectly contact with the guide rail, almost no gap.
- Two steel rods of high rigidity connect the “stretched support conveyor” to the machine body to ensure the stable conveying of the wide work pieces. Max stretching width is 600mm.
- Long steel guiding plate of high thickness and rigidity for longer service life. Position is easy to adjust.
- The conveyor motor makes variable frequency starting possible, very stable and equipped with braking system. Easy to install or uninstall. With cover.



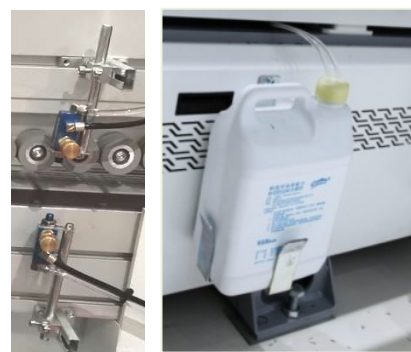
6. Feeding assistance for narrow edge

- Machine is standard with sliding infeed device helps the infeed of narrow edge like min 45mm short end or 40min-width long edge, make sure parts are fed properly.



7. Sprayer unit-Cleaning agent

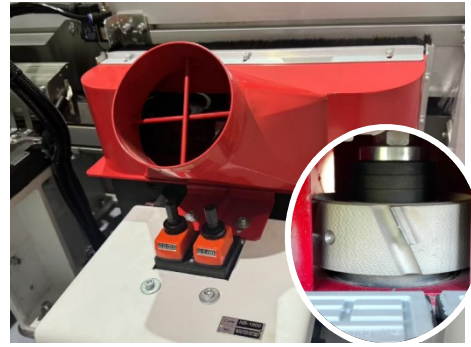
- Release Agent before pre-milling;





8. Pre-milling

- Pre-milling with 2 **diamond cutters** 125×43×30
DKN8×3.3 Z3+3L/125×43×30 DKN8×3.3 Z3+3R
- Two motors controlled pneumatically, milling panel edge intermittent. 2× 3.7kW motors; 200Hz
Rotating speed: 12,000 rpm.



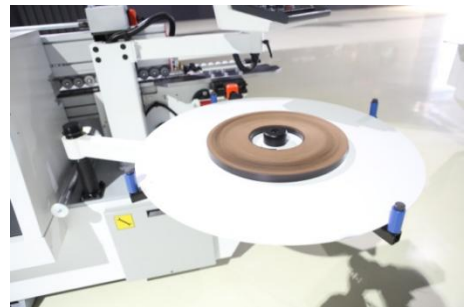
9. 2 sets of pre-heating

- Warm the work piece edge, the glue could well melt during gluing, especially suitable for wet or cold zones.



10. Coil tape bracket*2

- Big edge tape bracket is in proper height for smooth edge tape feeding and longer service life. Machine screen will appear alarm when edge tape is used up. Save waiting time.



11. Tape Snipping*2

- Snipping air cylinder with electric controlled switch to cut the edge tape properly.



12. Pre-melter gluing system

- Pre-melt gluing system has a glue tank on top to offer proper glue volume according to processing, save heating-up time, and a small glue pot on bottom, thus reducing the carbonization and vulcanization from burning up of glue resins, keep glue always fresh.
- Liquid level sensor detection device controls the glue amount accurately so as to prevent overflow.
- Just one screw to release and install glue pot, 60mm high gluing roller, 50mm diameter gluing roller, more glue supplying suitable for mass production, long parts and least glue line.
- Sliding seat, easy to switch between pre-melter and PUR device. (PUR device is option)
- Separate glue temperature control



Temperature control parameters							
No.1 heating system				No.2 heating system			
Glue adding setting (°C)	Lower gluing setting (°C)	Glue adding setting (°C)	Lower gluing setting (°C)	Glue adding setting (°C)	Lower gluing setting (°C)	Glue adding setting (°C)	Lower gluing setting (°C)
Upper detection limit: 250.0	Upper detection limit: 250.0	Upper detection limit: 250.0	Upper detection limit: 250.0	Upper detection limit: 250.0	Upper detection limit: 250.0	Upper detection limit: 250.0	Upper detection limit: 250.0
Lower detection limit: -20.0	Lower detection limit: -20.0	Lower detection limit: -20.0	Lower detection limit: -20.0	Lower detection limit: -20.0	Lower detection limit: -20.0	Lower detection limit: -20.0	Lower detection limit: -20.0
Minimum starting temperature: 120.0 °C		Standby temperature: 135.0 °C		Energy saving standby time: 0 min			
Speed frequency	Temperature auto parameters	Feedforward length	Positioning parameters	Auto parameter adjustment	Parameter tuning	Parameter monitoring	Function menu

13. Auto glue pumping + 25kg glue basin

- Max 25kg capacity basin, glue would be pumped to pre-melt system's upper pot automatically as soon as lower than level sensor.



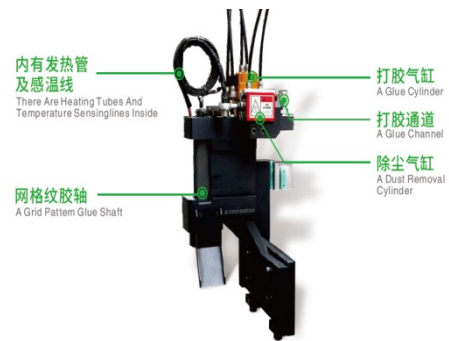
14. Tape Snipping

- Snipping air cylinder with electric controlled switch to cut the edge tape properly.



15. PUR gluing applicator

- The unique glue gate structure utilizes a diverting scraper principle, preventing wood chips from clogging the glue shaft and eliminating stroke limitations, resulting in even and stable adhesive application. The upper cover is made from a single piece of ductile iron, ensuring high precision with a multi-seal design to prevent glue leakage during high-temperature use.



16. 2-color PUR heater

- It allows for quick switching between two types of PUR adhesives, enhancing processing efficiency.
- The intelligent control touchscreen makes operation simple and convenient.
- The integrated aluminum alloy pressure plate ensures uniform heating, high-temperature durability, and resistance to deformation.
- It uses imported Teflon heating glue tubes, which are durable, flexible, and have better non-stick properties.



17. 2 sets of pressure rollers

- Each set of rollers for one set of gluing unit. One pre-pressure roller of 100mm diameter coordinates well with four post rollers make edge tape pressed on edge surface firmly.
- First and second roller is equipped with glue scraper to remove excessive glue stuck on rollers;



18. Lubrication system

- Lubrication pump for daily maintenance, greasing work of guiding rail just by pulling the handle. Easy and save time.



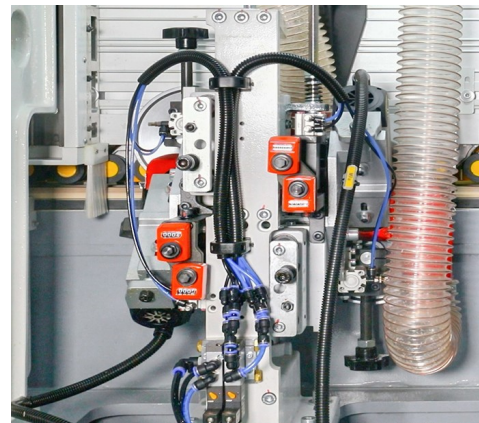
19. End cutting

- Linear guide way structure at an angle of 45 degrees with 2 motors 0.35kw 200hz 12000rpm/min to remove the extra edge tape on front and back.
- High precision linear guides – for very high repeatability.
- 2pcs of saw blades ($\varnothing 104 \times 3 \times 30T \times 22AB$) with independent cover.
- Dust collector



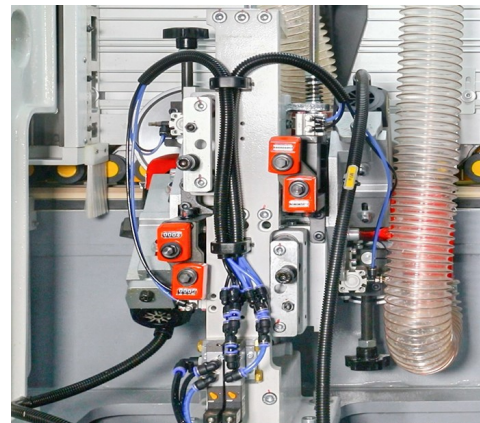
20. Fine trimming units

- 2 motors (power: 0.55kw; frequency: 200hz, rotating speed: 12000rpm/min). 2 fine trimming milling cutters (Standard: R1.5);



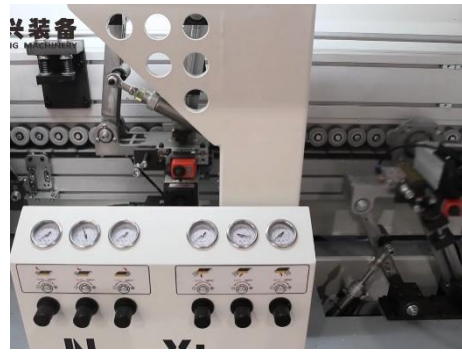
21. Fine trimming units

- 2 motors (power: 0.55kw; frequency: 200hz, rotating speed: 12000rpm/min). 2 fine trimming milling cutters (Standard: R1.5);
- 2x Fine trimming units with auto. Move-out function, to meet the flexible edge thickness banding requirements



22. Corner trimming unit

- Designed to trim sharp corner on front, back and two straight edges so as to achieve R circular arc radius.
- Driven by 2 motors (power: 0.3kw; frequency: 200 Hz, rotating speed: 12000rpm/min).
- Planar linkage with 4 corner trimming tools
- Diamond cutter 70x10x16 Z6 KN5x18.5 R1.5
- Rotating angle is adjusted automatic with an electric sensor.



23. 2 sets of scraping units with pneumatic moving back function

- Two sets scraping units with scraping cutter in different circular arc radius. (standard with R1.5), making edge banding more beautiful.
- One set of scraping cutters move backwards by cylinder if changing to the other tape thickness, set-up time tends to zero.
- Air blowing device blowing toward the scraping cutters on upside and underside for cleaning the scraps on cutter surface and cooling.



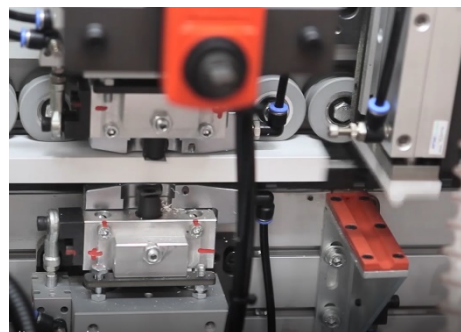
24. Dust collector

- Independent suction hood ($\phi 125\text{mm}$) fully covered on processing units, totally 6 pcs dust collectors provides excellent working condition, prevent any influence caused by scraps for longer service life.



25. Off cut device and flat scraping

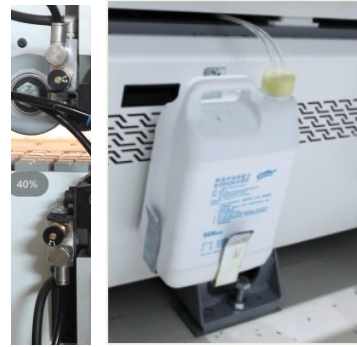
- Off cut device cleaning tape threads from scrapping, as to prevent any problem later during flat scraping and buffing, then flat scraping to remove possible extra glue of top and bottom.





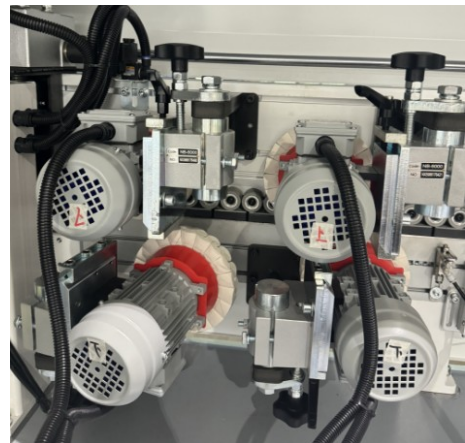
26. Clean agent sprayer

- Clean Agent to clean edge before buffing.



27. 2 sets of buffing units

- 2 sets of buffing units to match 2 glue color, one is for dark glue, the other is for light color glue, avoid dirty.
- Buffing by dual screen cloth structure is the last step to make perfect edge banding to make the edge shining, more stable.



28. Safety device

Feeding protector and thickness detection

- Protector prevents any possible accidents and ensures safety of operators, automatic monitoring abnormal operation.
- Work piece thickness detection, if work piece thickness over the limited position, conveyor will stop at once to reduce machine damage.

Interval feeding detection system

- Keep work pieces in proper distance for max edge banding performance.

E-STOP

- To stop running at once, guarantee operator life safety.



29. Cover door and dust collector

- Machine is fully covered and fits sound-absorbing cotton to reduce noise.



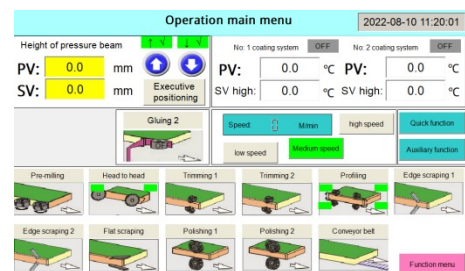
30. Control system

- 10" touch screen. Operation interface is intuitive and simple, available to control each component independently easy for testing and commission work.
- System languages: English, simplified Chinese, and traditional Chinese.



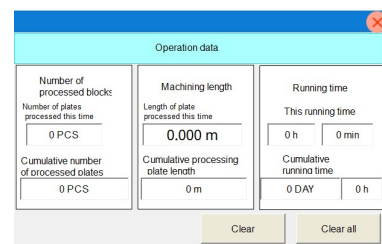
31. Operation interface

- Stand-by mode automatically turned on when machine stops working for a certain period (according to setting time) in order to save energy. Only one click to re-start production.
- One-click Selection, quick start/stop.



32. Production report

- Daily production included workpieces number and length is available at a glance



33. Electric equipment

- PLC control, input voltage 380v, 50Hz (Standard). .
Country specification according to the order.
- The position can be calculated precisely by encoder
- Each processing unit is controlled and protected by independent frequency converter with motor braking function.
- Most of electric components of the machine adopted international brands for high quality and generality.
- Good documentation, each wire has a unique code label which offers max convenience for





troubleshooting and online support.

34. Narrow workpiece solution

- 120x120mm(4 sides)
200x40mm (long edge)
40x200 (short edge)



Technical Data

Model	NB671EMN (NB7CJMN)
Panel length	≥120mm
Panel width	≥40mm
Mini panel thickness	120x120mm(4 sides) 200x40mm (long edge) 40x200 (short edge)
Panel thickness (narrow edge Corner trim on)	≤25mm
Panel thickness	9-60mm
Edge tape thickness	0.4-3mm
Feed speed	16/20/24m/min
Feed speed(narrow edge Corner trim on)	16m/min
Dust extraction	φ125mm×6
Total power	33.7kw
Overall dimension	10400×1050×1850mm
Net weight	3950kg

**Thanks for the attention!*

The company continuous to improve the product specifications and design details, the specifications are subject to change without notice. 25-6-27

All the photo in the specification is for reference only!!!