# BFT HIGH DYNAMICS



# DYNAMISM, TOP RESULTS, PRODUCTIVITY: THE NEW AGE OF NESTING



WITH THE ARRIVAL OF HIGH DYNAMICS TECHNOLOGY.
OUTSTANDING PERFORMANCE GUARANTEED THANKS
TO HIGH SPEEDS AND OPTIMUM ACCELERATION LEVELS.

ROVER B FT HD is the new Biesse high performance machining centre dedicated to nesting operations. Designed for high speeds and optimum acceleration, it takes its position as most productive machine on the market. Rover B FT HD is one of a kind, aimed at companies wanting to evolve their production and enhance performance, bringing levels of productivity, efficiency and optimisation to their maximum whilst ensuring total safety.



### **ROVER** B FT HIGH DYNAMICS

- **EXTREMELY RIGID STRUCTURE FOR UNPRECEDENTED RESULTS**
- **HIGHER PRODUCTION YIELD AND FLEXIBILITY**
- **PROTECTION AND SAFETY FOR ALL MACHINING OPERATIONS**
- NEW SYSTEM LAYOUTS THAT ARE MORE COMPACT AND PRODUCTIVE

+40%
INCREASE
IN PRODUCTIVITY

+40% INCREASE IN SPEED

+100%
INCREASE
IN ACCELERATION

# EXTREMELY RIGID STRUCTURE FOR UNPRECEDENTED RESULTS



#### BOOSTED TWIN DRIVE AND ABSOLUTE SYNCHRONICITY

Vectorial speed of over 170 m/min and the maximum acceleration of the sector, thanks to boosted motors, drives and transmissions that reduce waiting times in corners or during reversals, drastically cutting cycle times.

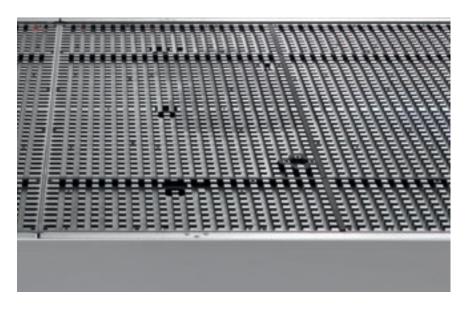
Oversized rack guides and pinions for movements on the X and Y axes, to obtain the maximum speed and acceleration in this category. Machine stability during movements is enhanced, thereby increasing the level of machining precision and quality.

Total absence of vibrations, even during machining operations at high speed or on small pieces, thanks to the solidity of the base structure which is designed to withstand higher machining stress without compromising the quality of the product.

## **EXCELLENT WORK TABLE SUPPORTING CAPACITY**

All Biesse FT work tables use multi-zone technology, with areas of concentrated vacuum specifically designed to support the world's most widely-used panel sub-formats.





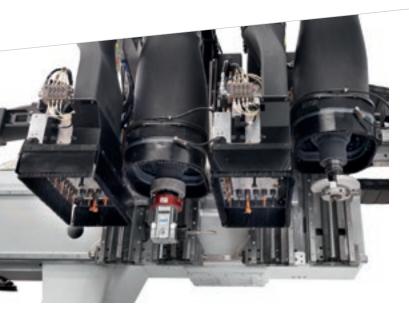
#### **HIGH FLOW TABLE**

New continuous work table in phenolic material, with a high-flow vacuum distribution

**VACUUM FLOW SECTIONS ENHANCED BY 300%.** 

Reliability linked to the traditional Biesse experience and technological innovation.

# WORKING UNITS WITH OPTIMUM RIGIDITY AND FLEXIBILITY

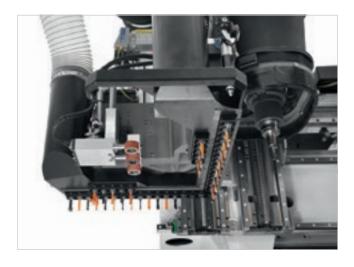


Excellent results, thanks to the possibility to equip the machine with a twin configuration to maximise production and boost machine performance.



 $\angle$ 

BHZ22 boring head for maximum nesting boring capacity with twin configuration. The best productivity levels in its category.



1/

BHC42 boring head with automatic lubrication, liquid cooling and dedicated suction on the spindles. The top in boring technology on a Biesse CNC.

WIDE RANGE OF TOOLS READY TO USE ON THE MACHINE, WITH MAXIMUM EASE OF TOOLING



The ROVER B FT HD solution offers advantages in terms of:

- PRODUCTIVITY
- ' INTEGRATION IN PRODUCTION FLOW
- **FLEXIBILITY**
- **SAFETY**
- ERGONOMICS





Revolver magazine with 12 overhead positions and 12 on the X carriage, reducing cycle times to the minimum.

# DESIGNED FOR SPEED

Top speed and acceleration are what characterise the Rover B FT HD, the nesting machining centre designed to guarantee outstanding results and unprecedented productivity levels.

With Rover B FT HD, new performance levels can be reached in nesting applications and new system layouts, more compact and productive, are made possible. Extremely rigid structure, boosted drives and absolute synchronicity, highly robust working units, optimum work table supporting efficiency, powerful suction, guards and optimum safety: Rover B FT HD, the new «state of the art» of nesting CNCs.



# PROTECTION AND SAFETY FOR ALL MACHINING OPERATIONS





#### RELIABLE TECHNOLOGY

Additional alignment rollers ensure the utmost precision on customised sheets and for nesting applications with zero waste.

#### **ROVER** B FT HIGH DYNAMICS

The cab that surrounds the machine is fitted with doors that can be fully opened from the front, to facilitate manual operations. The large inspection windows guarantee immediate visibility for direct machine-operator contact.





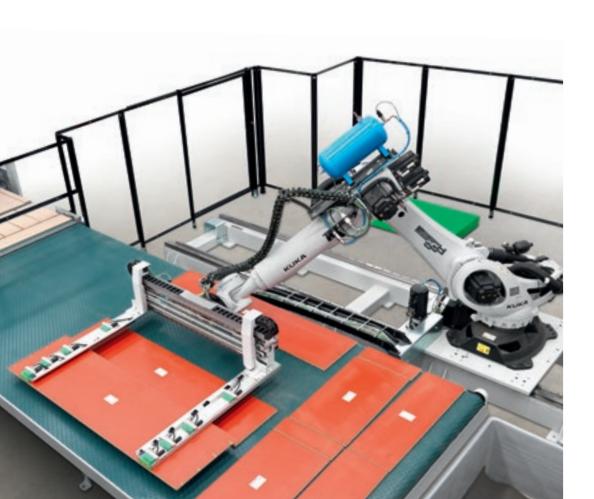
#### EXCELLENT CLEANING OF THE PRODUCT AND THE WORK AREA

Rover B FT HD has a new suction system on the working units; it's extremely effective and reliable over time, to ensure optimum cleaning of both the product and the surrounding area.

# LEAN, EFFICIENT PRODUCTION FLOW

Rover B FT HD integrates perfectly with the range of automatic magazines, automatic loading/unloading systems and robots, guaranteeing optimum flexibility, top performance and easy use to meet every type of need.

Biesse technologies are increasingly sophisticated but always user-friendly, able to maximise the competitiveness of customers wanting to boost their productivity but with reduced times and costs. The new Rover B FT HD technology offers the possibility of new system layouts that are more compact and productive, revolutionising the entire production process.









SOLUTIONS THAT MAKE THE USE
OF OUR MACHINES SIMPLER,
MORE ERGONOMIC AND MORE EFFICIENT



#### SINGLE CONTROL STATION WITH TWIN MONITORS AND LABELLING MACHINE

The machine can be controlled and labels printed (for piece identification) from a single command point. Solution that greatly enhances the machine ergonomics.

#### PRINTER ON THE MOBILE CONSOLE

The printer is connected directly to the machine PC, and positioned so that everything needed for labelling is close to hand.



Biesse has developed a series of solutions that help the operator in the various work phases, making daily tasks easier. myVA is a virtual assistant for every operator.

#### WEARABLE BAR CODE AND QR SCANNER

Used to upload programs in the work list, reading the information given on the label and activating the subsequent machining phases.

QR codes or bar codes are read quickly and accurately, leaving the operator's hands free (unlike the classic scanner).

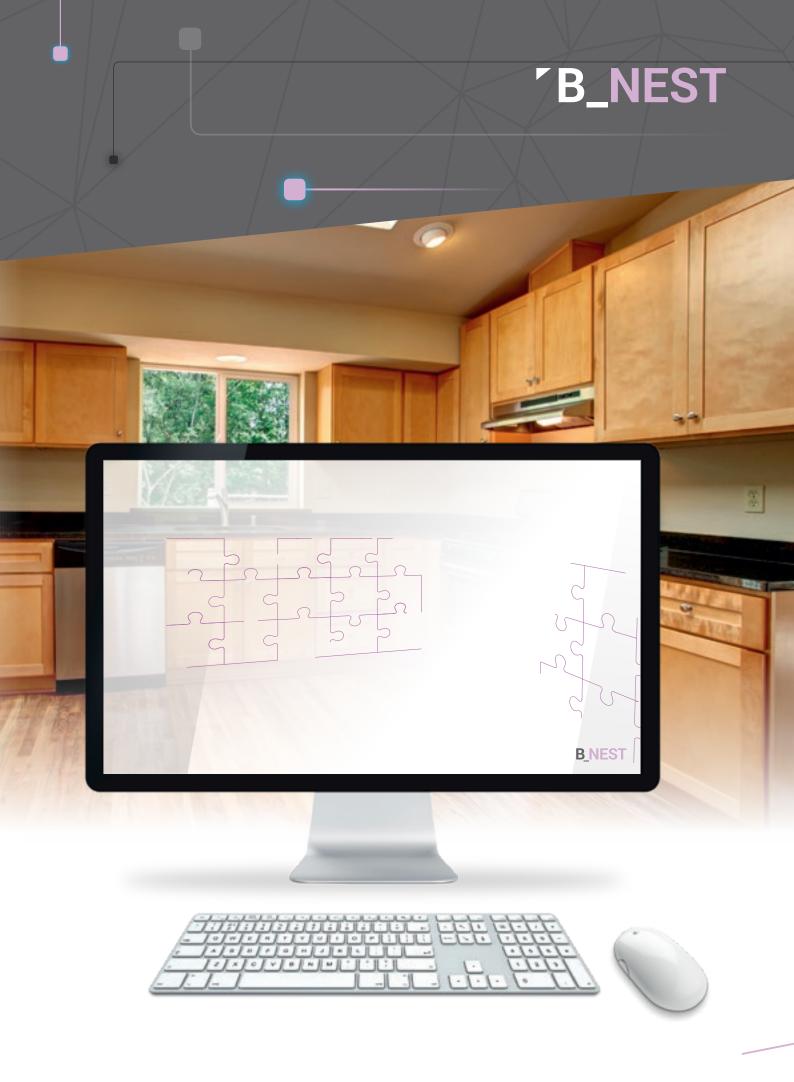


### REDUCED TIME AND WASTE



B\_NEST IS THE B\_SUITE PLUGIN SPECIFICALLY FOR NESTING OPERATIONS. IT ALLOWS YOU TO ORGANISE YOUR NESTING PROJECTS IN A SIMPLE WAY, REDUCING THE MATERIAL WASTE AND MACHINING TIMES.

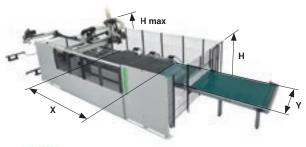
- Flexibility with reduced production times and costs.
- Optimisation for every type of product.
- Management of articles, sheets and labels.
- Integration with company software.



### TECHNICAL SPECIFICATIONS

#### **WORKING FIELDS AND Z HEIGHT**

		Х	Υ	Z	Н	H max
Rover B FT 1531	inch/mm	122/3100	61/1560	10/250	78/1980	113/2870
Rover B FT 1536	inch/mm	148/3765	61/1560	10/250	78/1980	113/2870
Rover B FT 1836	inch/mm	148/3765	74/1875	10/250	78/1980	113/2870
Rover B FT 2231	inch/mm	122/3100	87/2205	10/250	78/1980	113/2870
Rover B FT 2243	inch/mm	169/4300	87/2205	10/250	78/1980	113/2870



#### **SPEED**

	Х	Z	Vector
ft/min - m/min	420/128	115/35	564/172

#### **OVERALL DIMENSIONS - HIGH DYNAMICS**

		I	L	W		
STANDALONE		Single carriage configuration	Twin carriage configuration *	Single carriage configuration	Twin carriage configuration *	
Rover B FT 1531	inch/mm	293/7430	-	177/4490	-	
Rover B FT 1536	inch/mm	319/8090	319/8100	177/4490	205/5200	
Rover B FT 1836	inch/mm	319/8090	-	189/4790	-	
Rover B FT 2231	inch/mm	293/7430	292/7420	203/5150	231/5860	
Rover B FT 2243	inch/mm	340/8640	339/8610	203/5150	231/5860	

<sup>\*</sup> Twin carriage configurations require an extended machine beam.

#### **OVERALL DIMENSIONS - HIGH DYNAMICS**

		Li	**	W		
UNLOADING ONLY		Single carriage configuration	Twin carriage configuration *	Single carriage configuration	Twin carriage configuration *	
Rover B FT 1531	inch/mm	369/9380	-	177/4490	-	
Rover B FT 1536	inch/mm	422/10710	422/10710	177/4490	205/5200	
Rover B FT 1836	inch/mm	422/10710	-	189/4790	-	
Rover B FT 2231	inch/mm	369/9370	369/9360	203/5150	231/5860	
Rover B FT 2243	inch/mm	463/11770	463/11750	203/5150	231/5860	

- \* Twin carriage configurations require an extended machine beam.
- \*\* The overall dimensions increase by 460 mm when the suction system is installed at the base of the unloading mat with removable grille for overlapping panels.

#### **OVERALL DIMENSIONS - HIGH DYNAMICS**

NECTING OF L		L	**	W		
NESTING CELL TYPE B		Single carriage configuration	Twin carriage configuration *	Single carriage configuration	Twin carriage configuration *	
Rover B FT 1531	inch/mm	580/14740	-	199/5050	-	
Rover B FT 1536	inch/mm	656/16660	654/16610	199/5050	228/5785	
Rover B FT 1836	inch/mm	657/16680	-	210/5340	-	
Rover B FT 2231	inch/mm	580/14740	578/14690	224/5700	252/6410	
Rover B FT 2243	inch/mm	721/18320	719/18270	224/5700	254/6440	

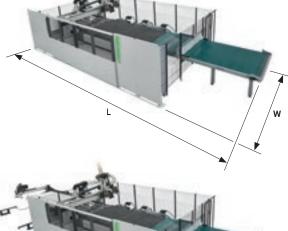
- \* Twin carriage configurations require an extended machine beam.
  \*\* The overall dimensions increase by 460 mm when the suction system is installed at the base
- \* The overall dimensions increase by 460 mm when the suction system is installed at the base of the unloading mat with removable grille for overlapping panels.

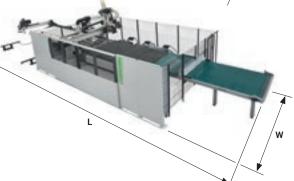


Weighted sound pressure level A in: Operator workstation LpfA 78,5 dB (A). Loading unloading position LpfA 78 dB (A). Uncertainty factor K = 4 dB (A).

Operating conditions: boring or milling. The measurement was carried out in compliance with UNI EN ISO 3746, UNI EN ISO 11202, UNI EN 848-3 and subsequent modifications. The noise levels shown are emission levels and do not necessarily correspond to safe operation levels. Even though there is a relation between emission levels and exposure levels, this cannot be used reliably to establish whether further precautions are necessary. The factors determining the noise levels to which the operative personnel are exposed include the length of exposure, the characteristics of the work area, as well as other sources of dust and noise, etc. (i.e. the number of machines and processes concurrently operating in the vicinity). In any case, the information supplied will help the user of the machine to better assess the danger and risks involved.









Interconnected technologies and advanced services that maximise efficiency and productivity, generating new skills to serve better our customer.

LIVE THE BIESSE GROUP EXPERIENCE AT OUR CAMPUSES ACROSS THE WORLD

**BIESSE**GROUP