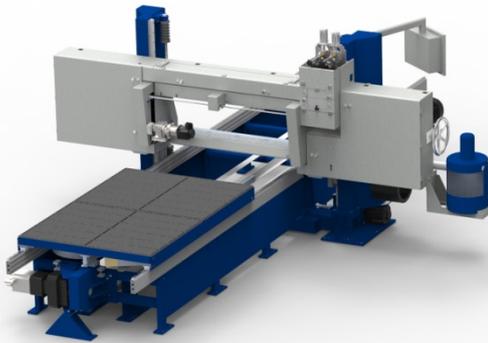


Albrecht Bäumer presents product innovations at the K2016

From 19 – 26 October, Bäumer will be presenting pioneering solutions in the processing of foam and flexible materials at its exhibition stand in Hall 3 / B71.

Besides the new Split-H Endless 500 splitting machine with many innovative features, Bäumer will be showing the Lamit-HRB-PUR bonding machine for processing polyurethane hot-melt adhesives as well as new products in the retrofit sector.

New Split-H Endless 500 splitting machine: faster, more accurate and more versatile



The successor to the BSR-1 allows utmost precision in splitting sheets and block material with densities of up to 450 kg/m³ depending on the material and cutting thickness. It is the perfect splitting machine for the packaging and automobile industries, as well as other technical applications.

This all-purpose horizontal splitting machine for splitting flexible materials and materials that are difficult to split offers new features:

At the top of the list of new advantages are versatility in use, greater cutting accuracy, extremely clean cutting surfaces, less waste and shorter cycle times.

Variety of applications

The new splitting machine has pushed the limits of hard splitting much further, and can now split significantly harder materials with high densities and hardness levels of over 40 shore A.

It can split a wide variety of materials such as PU and PU rebond, polyethylene (PE, XPE), cellular rubber, Basotect®, Baynat®, rubber and rubber rebond, cork, foam rubber, neoprene and comparable materials, reticulated foams, EVA and latex.

Particularly with PE, we were able to split densities of over 100 kg/m³ in the course of comprehensive tests.

More stability and greater holding forces

With respect to ever-growing demands concerning the materials to be split, an innovative knife guide system was developed in cooperation with major PE producers and manufacturers. The result is a knife bar with a new geometrical shape, which combines the properties of greater stability but also reduced friction with an exact cutting guide!

The more stable suspension of the press roller and the resulting rigidity of the guide, as well as the significantly more stable press roller with an increased diameter, result in very good cutting tolerances. The more sturdy material support bench also has a supporting effect. The optimized bench width and a new vacuum system that provides 40 % more power underline the convincing cutting result. The foam block does not lift, and the cut is guided absolutely precisely.

And that is not all. Bäumler has developed some new technical improvements that will impress the foam processing industry:

Improved knife technology for more power and accuracy

Compared to its predecessor, the knife tension of the Split-H Endless 500 has been increased, thus offering greater resistance to the cutting forces. The knife glides more firmly and more cleanly through the material. Even with very abrasive materials and materials with high compression hardness, for example rubber rebond materials, the results are impressive. Maximum cutting quality and limit of accuracy are achieved.

A further innovative feature of the new machine is the maintenance of the position of the knife tip in relation to the material thanks to optimized automatic knife readjustment. In the event of changes in cutting thickness and the associated automatic angle adjustment of the cutting unit, the press roller is also automatically adjusted. The result is a very good limit of accuracy of the cut sheets, low strain and thus extended knife durability.

Two knife drive systems, one for each knife track wheel, provide more power for cutting. Difficult materials can easily be split.

Less waste

The reduction of the remaining sheet thickness to 2 mm reduces the volume of waste to a minimum. This is made possible by the new height adjustment measuring system.

Shorter set-up times

The travel speed of the vertical axle is very high. This leads to short set-up times, for the loading position is reached very quickly. This allows you to produce faster and more efficiently, thus increasing your throughput.

Effective grinding

In the very sturdy and powerful grinding unit, large grinding wheels with diameters of 150 mm are used. The knife is thus sharpened extremely quickly, which means a great improvement in effectiveness and also meets the constantly increasing demands on the precise splitting of difficult materials.

Quality assurance through automatic grinding

Traditionally, the grinding stone must be adjusted by hand. This is a purely manual job, which requires a lot of experience and competent know-how on the part of the operator in order to adjust the grinding stone optimally. Good cutting results depend on this to a significant extent. The new, camera-monitored system of the Split-H Endless 500 automatically detects dimensional deviations on the knife edge, and corrects them immediately. Manual intervention is not necessary. High constant quality is achieved, independent of the operator.

Easy operation

Usability is rounded off by the intuitive touch system.

Lamit-HRB-PUR



In 2015, Bäumer included the product range of Lamit GmbH, manufacturer of bonding machines and production lines, in its product portfolio. At the K 2016, a bonding machine for processing polyurethane hot-melt adhesives (Lamit-HRB-PUR) for the foam industry will be presented, together with an installation and press section. In this rapidly evolving branch of industry, the Lamit-HRB-PUR sets new standards through its usability for a large number of materials and applications in the flexible foam sector, through extremely good bonding with minimum bonding agent application, as well as perfect full-surface adhesion.

Flexible for changing products in the foam processing industry

This machine meets the need for flexible production with changing materials and different applications. It is intended for all manufacturers who require the full-surface adhesion of foam materials, either with each other or with a different substrate, for their end product. Through the great strength of the bond and the high heat resistance of the PUR hot-melt process, it is ideal for insulation sandwiches, sponges of all kinds, packaging materials etc.

This machine is also being used in different production line concepts in the production of sandwich mattresses, since the process allows not only the above-mentioned properties but also a soft and permanent bond seam as well as highly economical application quantities (from approx. 40 g/m²).

High level of automation

Through the adjustable roller gap, the quantity of adhesive applied can be adjusted product-specifically and very precisely. The automatic thickness detection system with almost simultaneous set-up of the roller application system as well as an adhesive level monitor with automatic adhesive filling, programmable transportation and application speeds, simple width adjustment, programmable penetration depth as well as automatic length detection, are further features of the standard unit.

Comfortable cleaning

Bonding machines are not easy to clean. The procedure is time-consuming. The Lamit-HRB-PUR has a comfortable, large opening door. A new feature is that the complete bonding unit can also be moved laterally out of the bonding line, so that it is accessible from all sides.

Further bonding processes and production lines

Besides the above-mentioned production line, comprehensive information and product examples of other Bäumer bonding machines and processes will be available. This applies particularly to the roller bonding

system as well as the hot-melt caterpillar and spray application system for various applications in foam tailoring. In the field of automatic mattress production for medium and high capacities, Bäumers production lines, consisting of the bonding machines in conjunction with installation and press stations as well as diverse handling systems for the automatic infeed and stacking of finished products etc. have set new standards in the industry.

Retrofit – much is available as a standard conversion!

At the K2016, Bäumers will also be showing an option for modernization when Bäumers machines start getting on in years. Technology, in particular control technology, is progressing at an ever-increasing pace. Yesterday's computer is old today, and tomorrow it is already out of date. After a certain time, spare parts are no longer available, dramatically jeopardizing production reliability. Control engineering and mechanical systems are improving from generation to generation, offering new opportunities for improving efficiency and quality.

Retrofit is possible as a standard conversion for older machines

Standard conversions, for example a partial conversion to replace the direct current cutting unit motor of a vertical IS-M cutting machine with a new frequency-regulated, maintenance-free three-phase motor, are now possible as standard conversions. Customers can carry out such a conversion themselves. This is just one example from the extensive retrofit range. Complete conversions can also be supplied from stock now, for example for an OFS contour cutting machine from the year 1985.

Retrofit solutions make sure that your machine is up to date again, and make your units even more powerful. The investment pays off within a short period of time, for retrofits improve the productivity and operational reliability of the machines.

Benefits at a glance:

- Improvement in productivity while maintaining quality standards through guaranteed state-of-the-art solutions.
- Prevention of downtimes on account of outdated machines, for the availability of spare parts is guaranteed.
- Suitable solutions for many requirements and budgets, from partial conversions to complete conversion solutions.
- Very short delivery times for standard conversion solutions, since many conversions are available from stock.