

ME for You

Kleiberit's newly launched Micro Emissions PUR will have you breathing easily.

If your operation involves flat lamination, profile wrapping or edgebanding and you've been considering a change to PUR adhesive but have been dissuaded by the cost of training, concerns over the potential risks from mishandling, or even the investment you might need in extraction to protect your operators, Kleiberit's new Micro Emission polyurethane technology could provide the breath of fresh air you've been waiting for. And even for those of you who may already be using PUR, Kleiberit's new ME product group, launched at Ligna 2019, has tangible advantages.

The advantages of PUR have been well documented in Furniture Journal over the last couple of years and, in situations where your finished product is likely to be subjected to moisture ingress or heat – bathrooms and kitchens, for example – there is nothing currently on the market to rival the completely sealed finish a PUR adhesive

provides. However, like any chemical product, it needs to be handled properly with due attention to instructions on the label.

Typically, PUR hotmelts has a monomeric content of 2-2.5% and with the formulations of some adhesive manufacturers, it can even be as high as 5%. When heat is applied during the bonding process, the monomers in these PUR formulations start to evaporate, giving off fumes. This risk is well known, products are carefully labelled, training is mandatory and manufacturers who use PUR have systems to catch the fumes at source so operators are not exposed. It's perfectly safe if you have the correct exhaust systems in place. But for those of you who haven't yet switched from EVA to PUR and want a simpler life without the investment in PUR-specific protection and extraction, or even if you are using current PUR formulations and want to provide your operators with a zero risk operating environment, there is now an

alternative that's every bit as powerful as standard PUR but no longer needs the H351 warning on the packaging.

Using some very clever technology, the PUR adhesive specialist, Kleiberit, has reduced the monomer content in its Micro Emissions (ME) formulations below 0.1%. What's remarkable is they've managed to do this without any loss of performance, making the latest product range quite possibly the safest, most operator-friendly PUR currently on the market.

"For a number of years, operators using hotmelt adhesives have been asking for a product that's as easy to handle as the non-reactive EVA- or PO-hotmelt products they know but as powerful as normal reactive hotmelts," Holger Scherrenbacher, the Head of Kleiberit's Technology Centre in Weingarten, told Furniture Journal. "There is no chemical need for monomers in a PUR hotmelt - we need polymer bound NCO, not monomers -

but there remains a residual amount below 0.1%. The ME product is as easy to use and as safe as non-reactive hot melts."

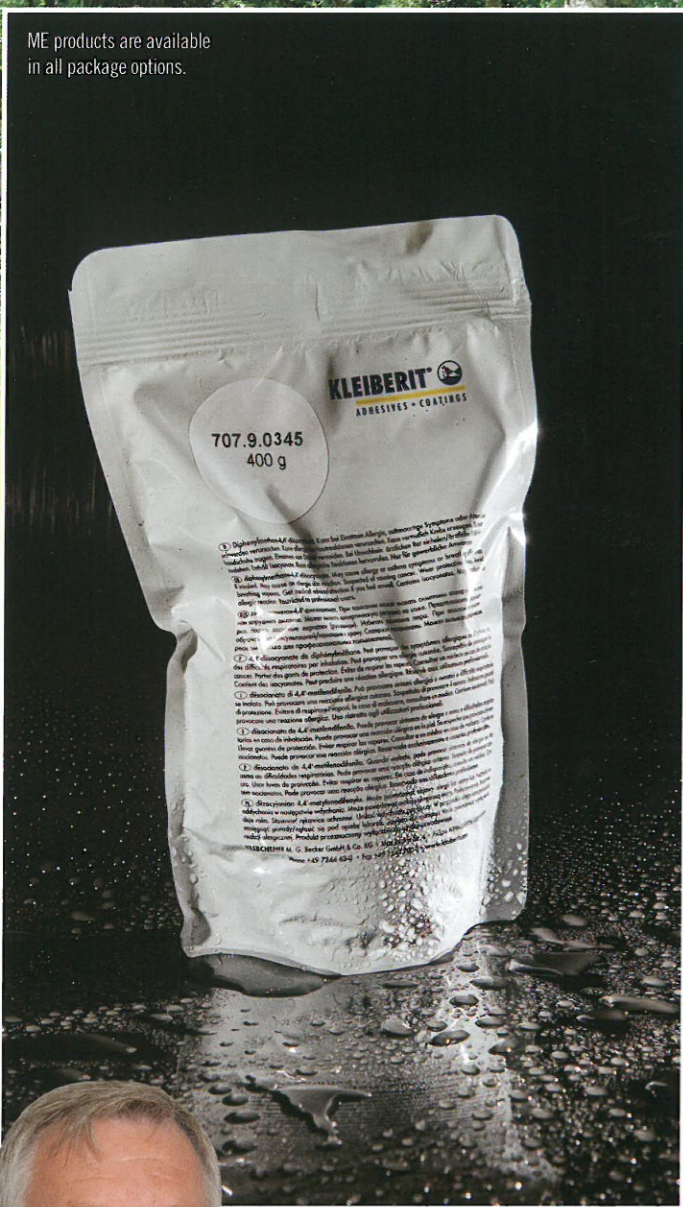
Kleiberit has identified three key target groups that will benefit most from the new Micro Emissions PUR product group: laminators with flat lamination systems, edgebander users and profile wrappers. Flat lamination systems with rollers and open reservoirs are well protected from evaporation of fumes to the workspace during operation. Indeed, Holger confirms, "Many people will not change over if their lines are 100% safe because you can't even measure the level with an isocyanate measuring unit close to the line when using any of Kleiberit PUR hotmelts. Also, if you apply our regular grades with a flat lamination unit and you open the hood, the measuring unit will show nothing because we've already reduced our levels to a very low rate anyway. But when you open it to clean, there could be some limited exposure



Holger Scherrenbacher



ME products are available in all package options.



Bradly Larkan

to fumes and that's where changing to the ME product will eliminate any possible risk." Edgebanders have a small, open application unit that's generally protected with an extraction hood and profile wrapping lines are invariably fully enclosed right up to the slot nozzle application, so pose little risk during application. Where the ME product scores is it eliminates any possible risk when the machine has to be opened, or the drum has to be changed – or, indeed, if the fan in your extraction system fails.

So, what does it take to make the switch to Kleiberit's Micro emissions PUR?

Surprisingly, very little. "Principally, if you are already using PUR, you can use the same unit as you're using now but just change the adhesive," affirmed Bradly Larkan. "This is a big plus. If you are not currently running PUR on your existing line, drop in a new glue unit that is moisture protected and run."

"The ME product range is available in all our familiar packaging formats from blister

packs that consist of one tray of three 32g tablets that can be used in the smallest of edgebanding machines upwards: We have 2kg fibre drums, our 2kg tin offer, our 20kg pail offer and 200kg drums. ME can be packaged in any of those formats and the only difference you'll see is there, are no risk factors highlighted on the label. ME products come with the benefit of high performance bonding – the same performance as our other PUR products, safe handling, no labelling requirement and they are environmentally friendly. For any application that currently uses PUR, we have a Micro Emissions product to meet that application."

To find out more about Kleiberit's new Micro Emission PUR offer, or if you need technical assistance with an adhesion issue, contact Kleiberit UK on 01530 836699. Alternatively, if you are reading the free, interactive online App edition of Furniture Journal, touch here www.kleiberit.com for an immediate link to Kleiberit's website.

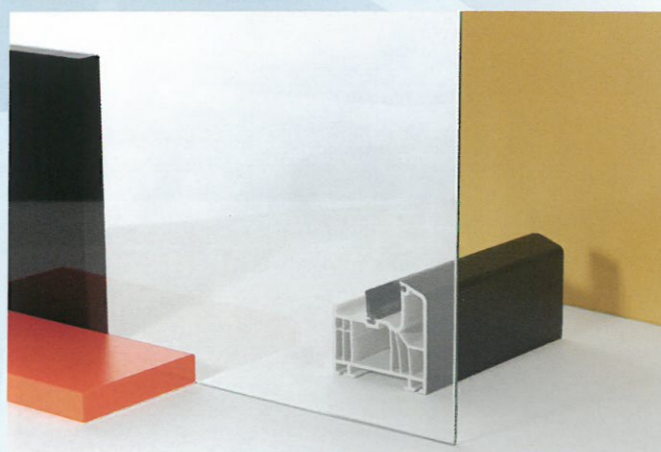
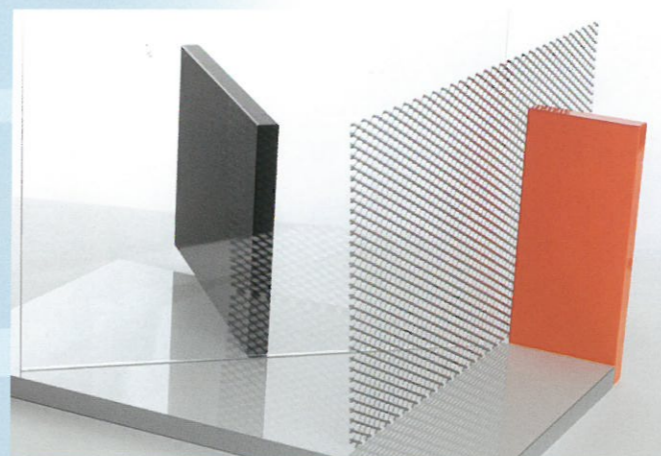
Competence PUR

KLEIBERIT®
ADHESIVES • COATINGS



Micro Emission (ME) PUR Adhesives

Solutions for Surface Finishing, Profile Wrapping and Edge Banding



The Future is now!
With ME Adhesives from KLEIBERIT

- High performance bonding
- Simple and safe handling
- No labeling requirements
- Environmentally friendly