

PRESS RELEASE

Number 4

China Adhesive 2020: WACKER Presents Modified VAE Dispersion for High Performance EPI Wood Glue

Shanghai, September 18, 2020 — At this year's China Adhesive show, WACKER will present novel vinyl acetate-ethylene copolymer VINNAPAS® EP 736. The product can be used solely as binder in EPI wood glue and meet D4 requirements without adding other ingredients. Fast setting and low film forming temperature, it is ideal for use under cold conditions. Other WACKER product highlights during the show include VAE dispersion VINNAPAS® EP 701K for difficult-to-bind substrates in paper packaging, dispersible polymer powder NEXIVA® PA 210 for the formulation of EPI wood glue in powder form, VAE dispersion VINNAPAS® CA 5691 for High tufted bind carpet backing adhesives and Pyrogenic silica HDK® H21 for high-strength industrial adhesives. CHINA ADHESIVE 2020 takes place in Shanghai from September 16 to 18.

With a solid content of 60%, VINNAPAS® EP 736 is a VAE dispersion specially developed for EPI wood glue. When conventional VAE dispersion are used as auxiliary binder in water-resistant EPI wood glue, ingredients, such as polyvinyl chloride and butylbenzene are usually incorporated into formulations. However, VINNAPAS® EP 736, as a high-performance VAE dispersion, can be used solely as binder in EPI wood glue formulation and meet with rigorous D4 requirements (EN-204).

VINNAPAS® EP 736 is fast setting and therefore suitable for high-efficient machine processing. It can also compound with other WACKER universal adhesive product, such as VINNAPAS® EP 706K, to prolong the pot life. In addition, VINNAPAS® EP 736 has a low minimum film forming temperature of 2 °C, which makes it ideal for use in winter.

During China Adhesive 2020, WACKER will also showcase the following products:

VINNAPAS® EP 701K: Dispersion for Difficult-to-Bond Substrates in Paper Packaging

The VAE Dispersion VINNAPAS® EP 701K is a polymer binder for adhesives used to bond difficult-to-bond surfaces. It has a low Tg (-10 °C) as well as excellent adhesion and cohesion strength. With higher ethylene content, VINNAPAS® EP 701K is ideal for overlay laminating of polyvinyl chloride (PVC), polyethylene terephthalate (PET) and biaxially oriented polypropylene (BOPP) with coated or non-coated paper.

NEXIVA® PA 210: Dispersible Polymer Powder for the Formulation of EPI Wood Glue in Powder Form

NEXIVA® PA 210 dispersible polymer powder can be used for the formulation of EPI wood glue in powder form. Manufacturers only have to add water to the powder before applying the glue. The same applies to users if they want to mix the glue formulation with water, filler powder and curing agent directly on site. With NEXIVA® PA 210, transportation and storage issues of EPI wood glues in China's northerly regions are resolved. Formulations based on the new

product do not require special insulation which makes packaging and packaging disposal significantly less costly. Compared to conventional water-based binders, NEXIVA® PA 210 also provides better adhesion.

VINNAPAS® CA 5691: Dispersion for High Tufted Bind Carpet Backing Adhesives

VINNAPAS® CA 5691 is a high-performance VAE dispersion developed for carpet tiles and woven carpets. Featuring a high permeability and a higher Tg (Tg=12°C), it can easily penetrate to the root of the carpet yarn and shows a better binding power which is about 20% higher than that of normal dispersion for carpet backing adhesives, providing higher tuft bind and better hand feeling even in hot and humid summer. Furthermore, VINNAPAS® CA 5691 also features good foamability and powder loading. Highly compatible with other dispersions, it improves the efficiency of production switchover.

HDK® H21: Pyrogenic silica for High-Strength Industrial Adhesives

HDK® H21 pyrogenic silica is an additive developed to control rheological properties of polar systems. The product features a large specific particle surface area. Although it is highly hydrophobic and non-polar, it can be readily incorporated into polar liquids compared to other hydrophobic products. As the rheological activity of HDK® H21 is extraordinarily high in epoxy, vinyl ester and polyurethane based adhesives, it allows customers to produce non-sag formulations for use in structural bonds for a number of industries. A rheological additive in high-strength industrial adhesives, HDK® H21

is perfect for use in automotive industry bonding applications, in chemical dowels for the construction industry, and in bonds between the half shells of wind turbine rotor blades.

Visit WACKER at China Adhesive 2020, Booth E7A502.



VINNAPAS® EP 736 dispersion can be used solely as binder in EPI wood glue and meet D4 requirements without adding other

ingredients. With low film forming temperature, it is ideal for use in winter. (Photo: WACKER)



VINNAPAS® EP 701K features a low glass transition temperature as well as excellent adhesion and cohesion strength. The VAE dispersion is an ideal binder for overlay laminating of PVC, PET and BOPP with coated or non-coated paper. (Photo: WACKER)



NEXIVA® PA 210 dispersible polymer powder can be used to formulate EPI wood glue in powder form. Compared to conventional water-based dispersion, wood glues based on this product are much easier to store and transport in Northern China's winter. (picture: WACKER)



VINNAPAS® CA 5691 is a high performance VAE dispersion developed for carpet tiles and woven carpets. With high permeability and high Tg, it provides high tuft bind and good hand feeling even in hot and humid summer. (Photo: WACKER)



Industrial adhesives formulated with WACKER's HDK[®] H21 pyrogenic silica are extremely resistant to sagging and do not run on sloping or curved bonding surfaces. (Photo: WACKER Chemie AG)

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The company in brief:

WACKER is a globally-active chemical company with some 14,700 employees and annual sales of around €4.93 billion (2019). WACKER has a global network of 24 production sites, 23 technical competence centers and 51 sales offices.

WACKER SILICONES

Silicone fluids, emulsions, rubber and resins; silanes; pyrogenic silicas; thermoplastic silicone elastomers

WACKER POLYMERS

Polyvinyl acetate and vinyl acetate copolymers and terpolymers in the form of dispersible polymer powders, dispersions, solid resins and solutions

WACKER BIOSOLUTIONS

Biotech products such as cyclodextrins, cysteine and biologics, as well as fine chemicals and PVAc solid resins

WACKER POLYSILICON

Polysilicon for the semiconductor and photovoltaics industries