

NanoZeolites – Porous Nanomaterials for CleanTech and Encapsulation Applications

Increased Stability – Enhanced Flexibility

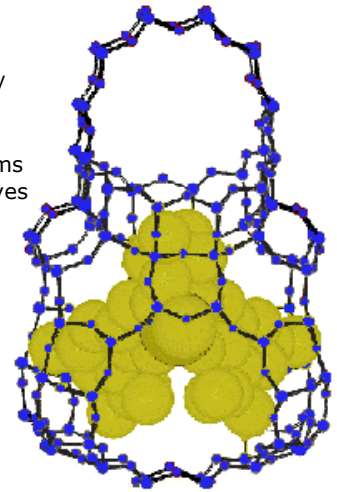
NanoZeolite-encapsulated molecules

Advantages:

- Stabilize sensitive structures / complexes
- Chemical / mechanical protective environment
- Diffusional selectivity
- Dispersion in aqueous media and polymers

Applications:

- Enhanced longevity organic dyes
- Dye-carriers for print media
- Dye-carriers for polymer coatings
- Immobilized homogenous catalysts / enzymes
- Chemical sensors
- Controlled / triggered release systems for dyes / pharmaceuticals / adhesives



Triggered Release

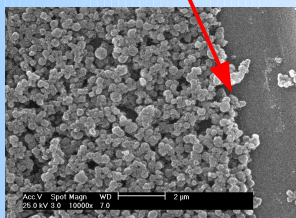
Encapsulated dye in water



UV Lamp Sunlight UV Lamp Sunlight Heat

ZeoCoat – for a cleaner Environment

Powders and Coatings for CleanTech Applications



Advantages:

- Moisture adsorption
- Large surface area
- Good adhesion on metal surfaces
- Rapid sorption/desorption kinetics
- Rapid regeneration
- Variable porosity
- Tunable surface chemistry

Applications:

- Molecular sieves
- Rotary heat exchangers
- High-duty desiccant rotors
- Water adsorbing coatings
- Water adsorbing polymer additives
- Ceramic filters / membranes
- Polymer-composite membranes
- Packaging materials
- Catalysts
- Air filters

