# General Precautions when Handling Zeomic

# (1) Keep Zeomic powder from moisture: Zeomic can absorb moisture.

Zeomic is a porous material. Its porous properties can absorb moisture easily. Take the following precautions in order to keep Zeomic from absorbing moisture after taking delivery.

- 1) Store in sealed containers, avoiding areas with high temperature and high humidity.
- 2) Do not open the containers unless necessary.
- 3) Keep Zeomic from direct exposure to air for long periods, even in the processing phase.

## (2) Be sure to add Zeomic evenly.

The antimicrobial effect in Zeomic comes from the antimicrobial action caused by direct contact between the Zeomic particles and bacteria. Thus, Zeomic particles must be evenly distributed over the surface of products. Even distribution of Zeomic can result in a good antimicrobial effect as well as cost reduction.

# (3) When adding Zeomic to a low-viscosity fluid,

#### be aware of its sedimentation over time.

With a specific gravity of 2, when adding Zeomic to fluids with low viscosity, the particles may settle to the bottom when stored undisturbed.

#### (4) Depending on the type of liquid, it may be difficult to blend Zeomic into a fluid.

Depending on the type of liquid, it may be difficult to blend Zeomic particles into the fluid, or they may be unevenly distributed due to clumping.

### (5) Zeomic may discolor overtime

Zeomic contains silver as an antimicrobial substance. Generally, silver based antimicrobial agents may discolor over time. This is because the silver reacts with the sulfur or phosphate to become a colored silver alloy. This discoloration can be avoided by abstaining from the use of resin treatment materials that contain sulfur or phosphate as additives. There are various grades of Zeomic available that suppress discoloration properties. Please feel free to consult with a sales specialist regarding these products.

