

# GLUCONO DELTA LACTONE

## Pasta and Rice

The color, texture and yield of pasta and rice can be enhanced when prepared in a solution containing GDL. An ingredient mixture of 48 % GDL, 49% sodium citrate and 3% tricalcium phosphate dissolved in the cooking water at a level of 0.15% has been shown to improve cooked noodle yield by approximately 10%. The noodles also appear to have a smoother surface. Since there is less carbohydrate extracted into the cooking water, it presents a lower BOD to the waste water stream.

GDL can also be added directly to the flour mixture. In the case of Japanese Udon noodles, 0.4% to 1.2% GDL is added based on the weight of the flour to provide a lower pH and extended shelf-life. GDL's slow conversion to acid prevents denaturation of the gluten during the noodle mixing and forming process.

When rice or pasta is cooked in a GDL solution the pH of the food is lowered, which typically improves the product's shelf-life.

