



CHY-MAX® M

Better cheese at lower cost

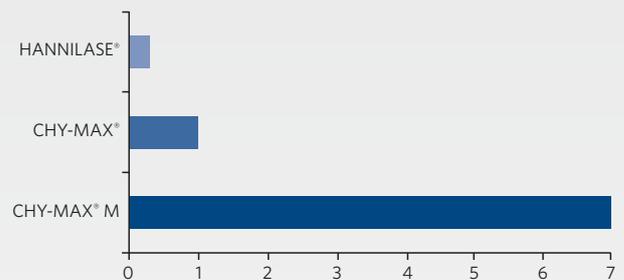
CHY-MAX® M is the 2nd generation of fermentation-produced chymosin (FPC). CHY-MAX® M offers better coagulation with reduced proteolytic activity compared to other coagulants, benefiting cheese production and quality around the globe.

CHY-MAX® M is certified Kosher as well as Halal. And it is suitable for vegetarians.

Chr. Hansen has a long history of innovation in coagulants. For example, Chr. Hansen introduced the 1st generation of FPC, CHY-MAX®, in 1989. CHY-MAX®, offered great benefits compared to already existing products, like animal rennet and microbial coagulants. FPC are highly purified chymosin produced by fermentation.



Specificity makes the difference - C/P-ratio



The graph above shows the C/P-ratio for different types of coagulants. The C/P-ratio represents the relation between relatively clotting activity (C) and the relative proteolytic activity (P) of the coagulant.

CHY-MAX® M is very specific in cutting the k-casein with minimal break-down of any other protein in the casein micelle. This high specificity delivers several benefits to cheese production and cheese characteristics, like yield increase, less bitterness and the option to significantly reduce salt content.

CHY-MAX[®] M – multiple benefits to your cheese business

Salt reduction

Chr. Hansen has introduced SaltLite™, which is a concept focusing on lowering the salt content in cheeses by up to 50%. CHY-MAX[®] M plays a pivotal role in this concept, due to its very positive impact on cheese texture and taste. Complementary starter and adjunct cultures are available for specific cheese segments.

Reduced CO₂ footprint

As milk production has the largest environmental impact on cheese production, yield improvements obtained by CHY-MAX[®] M significantly benefit the environment. Each ton of cheese made with CHY-MAX[®] M saves an estimated 200 kg of CO₂.

Improved texture

CHY-MAX[®] M has a very low proteolytic activity, thus the structure of the cheese is not broken down as rapidly as with traditional coagulants.

Improved sliceability

Improved texture leads to reduced stickiness, making life easier when it comes to slicing and shredding cheese.

Improved taste

The high specificity of CHY-MAX[®] M results in a mild and rounded flavor in the cheese, as well as reduced bitterness.

Longer shelf life

Particularly in soft cheeses like mozzarella, brie and crescenza shelf life is increased significantly, when using CHY-MAX[®] M. This leads to reduced scrap both at the dairy and at the retailer.

Better process control

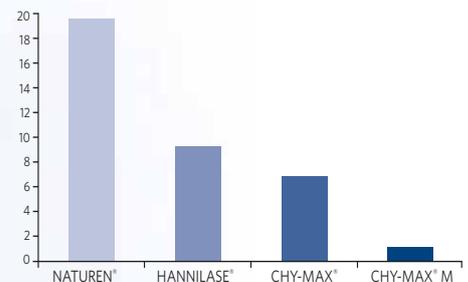
CHY-MAX[®] M is the least sensitive coagulant to pH, temperature, and milk quality variations.

Enhanced whey value

The use of CHY-MAX[®] M reduces the break-down of whey proteins and decreases the amount of unwanted casein fractions in the whey, resulting in cleaner and more valuable whey.

Dosage reduction

The very high specificity of CHY-MAX[®] M permits a dosage reduction of up to 40% when compared to *R. miehei* and 25% when compared to a 1st generation FPC coagulant. This contributes to a lower cost in use.



Total cost in use of coagulation
€/1 ton of cheese

Higher yield

CHY-MAX[®] M increases production yield of at least 0.5% when compared to *R. miehei* and 0.2% when compared to a 1st generation FPC. Using CHY-MAX[®] M in combination with YieldMAX[®] further enhances fat value and improves yield in pizza cheese.

140 years of experience

Since 1874, Chr. Hansen has helped dairies throughout the world produce high quality cheese products.

Today, Chr. Hansen is the preferred supplier of cheese cultures and enzymes for the international dairy industry.

For further information, visit
www.chr-hansen.com

Chr. Hansen A/S -10-12 Boege Allé
DK-2970 Hoersholm, Denmark
Phone: +45 45 74 74 74