

## Laminex® Super 3G

We are pleased to announce the regulatory approval of a new Betagluconase for brewing—Laminex® Super 3G.

A low dose added directly into the mash is all you need to degrade the  $\beta$ -glucan and the xylans, reducing wort viscosity, increasing flow through the lauter and making beer filtration faster.

The lautering process can become up to 10% faster due to an increased flow and a reduced need for raking. If lautering is a typical bottleneck in your brewhouse, you will find that Laminex® Super 3G is ideal for increasing brewing capacity.

In beer filtration, significantly longer cycles have been experienced when using Laminex® Super 3G—saving costs due to lower earth consumption and boosting capacity further, due to less down time.

At the end of the line, Laminex® Super 3G gives you high clarity beer, faster, easier, and more cost effective.

### Benefits

- Reduces wort viscosity and  $\beta$ -glucan
- Relieves lautering bottlenecks
- Increases brewing capacity
- Improves beer filtration
- Reduced costs

Contact Rob Lee, our brewing industry manager for more information at [robert@enzymesolutions.com.au](mailto:robert@enzymesolutions.com.au)



## Organic Enzymes

Enzyme Solutions has available a number of enzymes that may be suitable for the production of products that are to be certified as Organic. The types of enzymes that are offered cover a wide range, including lactases for dairy applications, pectinases for wine and fruit juices, proteases for general protein hydrolysis, and cellulases for the treatment of plant derived carbohydrates. They may also be used in combination as digestive aids.

For additional information, contact Tom Mascara at Enzyme Solutions at [tom@enzymesolutions.com.au](mailto:tom@enzymesolutions.com.au)

## Geoff's Column

Welcome to a belated version of the Link.

We responded to our readers' preference for an e-mail format over the hard copy. It's interesting how that has changed around in the space of a few years.

It has been a very interesting year for us all with wildly fluctuating exchange rates and the Global Financial Crisis thrown in for good measure. Despite all that, I am pleased to report we have had a very successful year due largely to the ongoing support and commitment of our customers. Our Principals have been very supportive of our market, and the introduction of new products is always appreciated. See the article on new Cleaning Enzymes, Brewing Enzymes and Fuel Ethanol.

We are delighted to see a new lab and blending facility emerging on our premises as this goes to print. This facility will enable us to continue to supply a high level of technical support to our customers and will enhance our ability to develop new enzyme products to match our customers' needs. If you are visiting Melbourne you will be very welcome to visit us and see what we can do for you.

On a more personal note, Nitty will be returning from maternity leave in February in a part time role.

On behalf of all of us here at Enzyme Solutions, we thank you for your ongoing support and wish you and your families a very Happy Festive Season.

*Geoff Bearzatto*

## Mission Statement

*To deliver unique, innovative biotechnology derived products and technical services which provide environmentally positive solutions to customer needs.*

## Cleaner & Greener

Genencor has launched two exciting new enzymes for the Asia Pacific cleaning market.

**Powerase™** represents the best amylase we have ever worked with for the laundry and automatic dishwashing applications. It is highly stable and very effective at low doses and across a range of temperatures. It shows excellent results in the presence of bleaches so can be very useful in soakers or additive products when oxygen bleaches are used.

**PuraFast™** is effective in low washing temperatures and is formulated in a new, smaller granule suited to Asia Pacific conditions. It is available in 2 strengths (activities) and also in Blue Granules. See <http://www.changetheworldin30mins.com> and [http://www.genencor.com/wps/wcm/connect/genencor/genencor/products\\_and\\_services/news/pressrelease\\_484.en.htm](http://www.genencor.com/wps/wcm/connect/genencor/genencor/products_and_services/news/pressrelease_484.en.htm). Call or e-mail for the Cold Hard Facts book.



### Office closing dates

Closed from Thursday December 24<sup>th</sup>, re-opening 9.00am Monday morning January 4<sup>th</sup>, 2010.

## Fuel Ethanol

Technical Manager, Tom Mascara, was able to attend the Fuel Ethanol Workshop that was recently held in Denver, Colorado.

The corn based, Fuel Ethanol Industry is going through some difficult times at the moment. This is primarily due to high corn feedstock prices and relatively low prices for fuel ethanol on the open market. Therefore, being able to run the ethanol plants as efficiently as possible has become even more critical.

There were a number of good technical sessions, including an update on where the Biomass/Cellulose conversion to ethanol is heading.

Pilot plants have, and are being built now to test the effectiveness and commercial viability of the various processes that have been proven at laboratory scale.

To facilitate this, Genencor (a Danisco division) has formed a \$140 million partnership with Dupont, and also released a new cellulase based enzyme, Accellerase 1500. This enzyme has been shown to degrade cellulose very effectively, after the cellulose has been subjected to a pre-treatment process, as the Accellerase then has free access to the fibres to break them down to glucose for subsequent fermentation.

The supply of Accellerase 1500 is limited, but is available to approved groups.

## Questions & Suggestions

This section focuses on those enzyme questions which we are most commonly asked about. If you have a question you would like us to answer, fax, e-mail or phone and we will be more than happy to answer it. It may even make it into the next issue of **The Link**.

Q. We use Hydrogen Peroxide to Sanitise our Plant and some equipment components, but can not afford to have any residual peroxide in our products. Do you have an enzyme to help?

A. **Catalase** can be used to quickly reduce peroxide to Water and Oxygen. It has a wide pH operating range and operates best at 30°-60°C. Food Grade Catalase is available in 5 litre bottles ex-stock.

“The Link” is available by e-mail. Please let us know if you would like to change the way you are receiving “The Link” now.

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