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IDF in 2013

The 12 months since the 2012 World Dairy Summit were a busy and successful time for the IDF, having achieved the following:

- ◆ 4 IDF/ISO analytical standard methods (*details of these can be found on page 13*)
- ◆ Publication of 12 Bulletins (*details of these can be found on pages 14-16*)
- ◆ 5 other publications issued (including peer-review articles)
- ◆ 1 Special Issue
- ◆ 21 submissions to Codex
- ◆ 4 events held
- ◆ 7 factsheets issued on:
 - Dairying and Sustainability of Rural Areas
 - Dairying and the Environment
 - Dairy's Contribution to Food Safety and Food Security
 - Protein Determination
 - Country Reports – April 2013
 - Listeria Monocytogenes
 - The Lactoperoxidase System

Over the course of this year the IDF will be concentrating on five priority items:

- ◆ IDF/FAO/IFCN World Mapping of Animal Feeding Systems in the Dairy Sector
- ◆ IDF LCA Guide for Water Footprint of Dairy and Biodiversity Framework
- ◆ OIE Standard on Animal Welfare and Dairy Production Systems
- ◆ Update of internal IDF/GDP resource guide: "Sustainable Dairy Nutrients are Essential to Human Health"
- ◆ Codex protection of dairy terms and regional standards for milk products

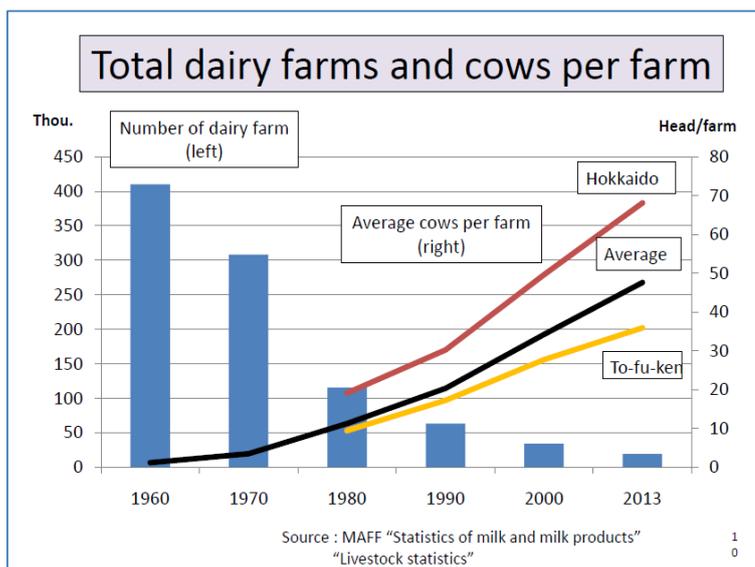
IDF WORLD DAIRY SUMMIT 2013

Conference Overview

Chris James (DairyCo Board Member and member of IDF Standing Committee on Farm Management)

Japan is a series of islands with a total land area the size of Germany. Seventy-five per cent of the nation is wooded and mountainous and only 12.5% of the land area is used for agriculture. In comparison, 71% of the UK is farmed.

Japan's population totals 128 million, 91% of which is classed as urban. It has a dairy consumption per capita of 77kg compared to a figure of 286kgs for the EU27 and 31kgs in China.



It produces 7.5 million tonnes of milk with an average yield per cow of 8,000 litres. The average herd size is 47, but this does not tell the whole story. Half of milk production comes from the northern, less populated island of Hokkaido. Herds here are larger and have a range of systems and herd size comparable with northern Europe. This island produces its own forage, processes most of its milk and exports to the rest of Japan. The remaining production comes from the larger, heavily populated island of Honshu and other parts of the country. Here, most forages are imported from the USA or Australia. All the milk is used for liquid consumption. The farms we visited here were smaller and heavily subsidised and protected.

In general, all the economic factors were more than double world market levels - both milk price and feed prices - therefore Japan has one of the more unfavourable milk:feed price ratios of <1.5 even with a high milk price equivalent to 70ppl.

Another feature of these farms is that they operate on very little land leading to very expensive systems of composting manure and exporting it to rice paddy fields. Without subsidy and market protection, there would not be a dairy industry outside of Hokkaido.

Conference

The conference theme was 'Rediscovering Milk'. There has been a fall in dairy consumption of dairy products in Japan but the native companies such as Meiji are developing innovative products to increase consumption, particularly in the older generation. There was also the underlying theme that the health benefits of dairy have been overlooked and must, therefore, be promoted in the developing world.

Another underlying theme was 'more for less'. Global consumption is growing by 2.5% a year and the countries in the temperate areas can fill this growing demand, but must do it in a sustainable way with a lower carbon and water footprint.

The growth in world demand is predicted to be long and sustained which gives a great outlook for dairy farming. However there will be continued volatility and indeed current prices are judged to have peaked with a downturn in price sometime this year. Feed price : milk price ratio is also currently at historically favourable levels.

A topic that came under the spotlight was that the 'western' trading blocs, such as EU27, USA and Oceania, produce milk at converging market-based prices and with less support, whilst the developing nations are producing milk at prices diverging from market prices with more government intervention.

National perspectives

The USA was confident that it was the only nation that could expand to meet world demand - and they are coming!

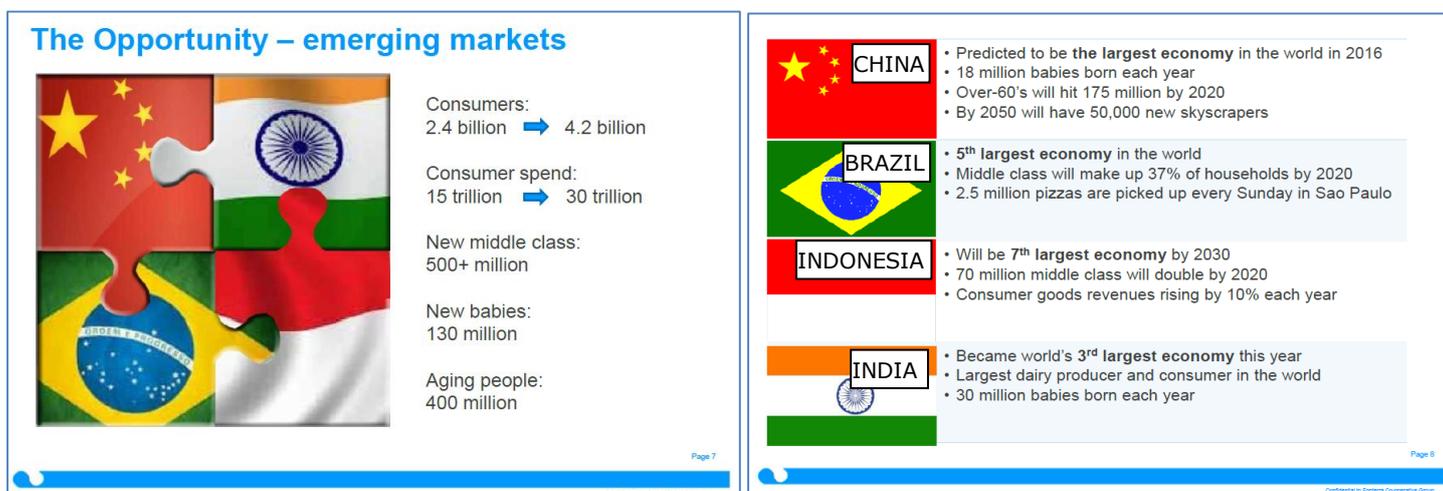
Australia had a torrid decade due to adverse weather, with both drought and flood, and this has stretched the resilience of many dairy businesses. Dairy Australia however has had great success with a campaign named 'Legendairy', part-funded by the levy payer.

Turkey is expanding rapidly - 13% over the last 10 years - and exporting to the Middle East.

New Zealand is still expanding output, but now sees growth in milk produced and processed outside the country.

Of the EU27, Germany and Netherlands are looking beyond 2015 to meet global demand with co-operative's of the scale that we can only envy in the UK, although Arla gave a very strong presentation highlighting that co-operation is in their DNA, highlighting joint ventures underway in China at different levels of the supply chain.

Ireland did not have a presence at this year's event, due in part to a trade mission to the Gulf States coinciding with the conference.



Conclusions

Globally, the future for dairy markets look very promising. The question is whether the signals can reach British dairy farmers, to give them the confidence to invest to expand national production given the price volatility that world markets will bring.

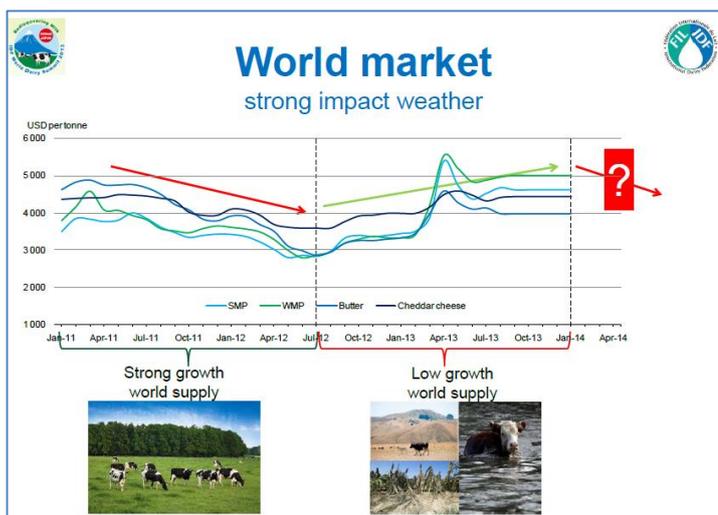
If farm output increases, who will process this milk? We can look with envy at the scale and efficiency of the Northern European co-ops. Maybe our milk could be processed on the Continent or perhaps there will need to be more rationalisation of the processing sector in the UK.

If output of milk is to increase in the UK, the associated growth will all go into processed goods which will either substitute imports or be exported. To do this we will need better supply chain relationships. We will need product innovation and international joint ventures. Our liquid based market has not nurtured any of these since de-regulation in 1994.

We have the climate and scale in the UK to help meet world market demands, but do we have the leadership along the supply chain to ensure that we don't miss this golden opportunity?

Dairy Policies and Economics Conference

Ian Wakeling (UK-IDF Secretary)



With milk production growth far below average (estimated at only 1.5%, compared to 2.8% and 2.3% in the previous two years) and record commodity prices, Adriaan Krijger outlined 2013 as being a year out of line with recent trends during his presentation to launch the 2013 World Dairy Situation Report.

Total global milk production is forecast to increase by 11 million tonnes to 781mt in 2013, compared to growths of 21mt (2.8%) in 2011 and 17mt (2.2%) in 2012. Supplies were badly hit at the start of the year, as a result of bad weather in Oceania, and they will not have recovered by the end of 2013. This will lead to only a 1mt (2.2%)

increase in the exportable surplus to 63mt milk equivalent, again out of step with the increases of 10.3%, 8.8% and 7.9% recorded for 2010-12.

Fears about scarcity of supply, especially during March, led to a sharp spike in commodity prices, with some hitting record highs (comparable to 2007 levels), before they settled down again.

Adriaan believes that 2014 will see the market come down again but a number of drivers, including:

- ◆ The weather,
- ◆ The performance of emerging dairy countries,
- ◆ Currency rates (in light of the US crisis)
- ◆ The steady growth of the world population, and
- ◆ The development of production in China

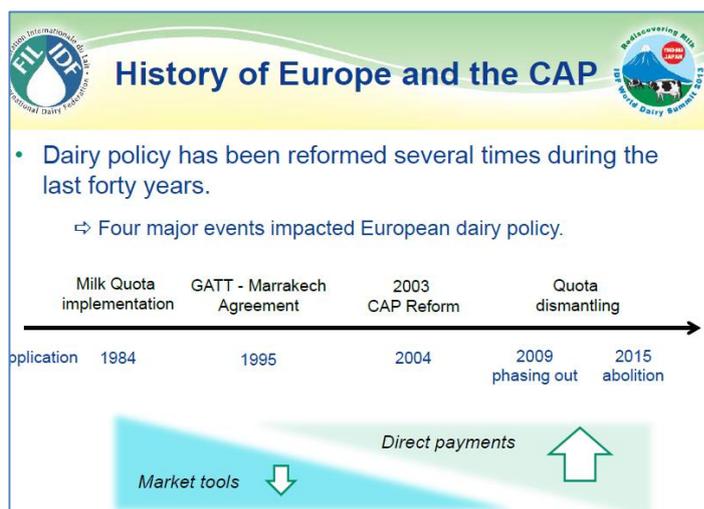
will lead to a certain amount of uncertainty as to when this might happen.

All this follows on from 2012, where production of butter (+3.3%), WMP (+3.5%) and SMP (+5.2%) all showed slower growth than in 2011 - the only exception being cheese (+2.2%), which grew faster. Consumption per head increased by 1.2kg per capita to 109.1, with South America, Asia and Africa leading the way, and most of the investment was made in driers, possibly hinting at players looking to the world market when quotas end in 2015.

After years of debate and negotiations, a political agreement on the reform of the CAP was reached on 26 June 2013 between the European Commission, Parliament and Council of Ministers.

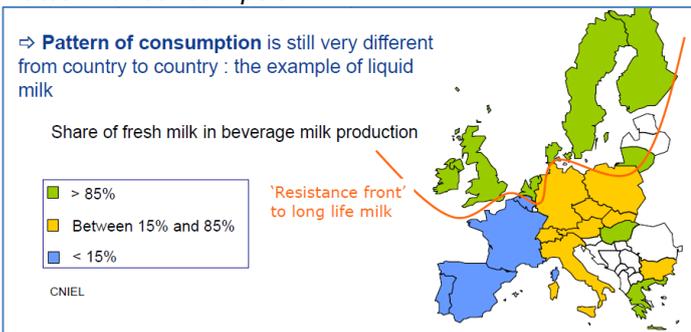
The EU now has 28 Member States, 700,000 dairy farms (with an average herd size of 32 cows), and produces 150 million tonnes of milk each year, almost 10% of which is exported.

The new CAP has been designed as a more effective policy for increasingly competitive and sustainable agriculture, and to develop vibrant rural areas.

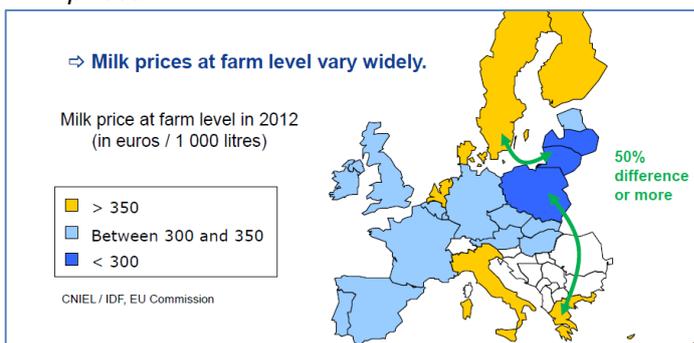


Marcel Denieul, a French dairy farmer, considered how the latest developments would impact on the European dairy industry. As a prelude, he pointed out that the previous 40 years of dairy policy have not led to a standardisation of milk production within Europe, noting that there are a number of differences between countries in terms of:

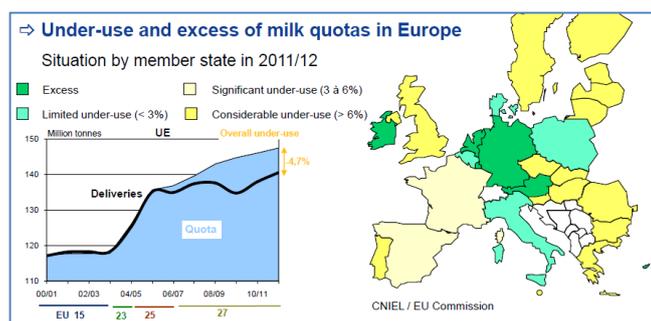
Pattern of consumption



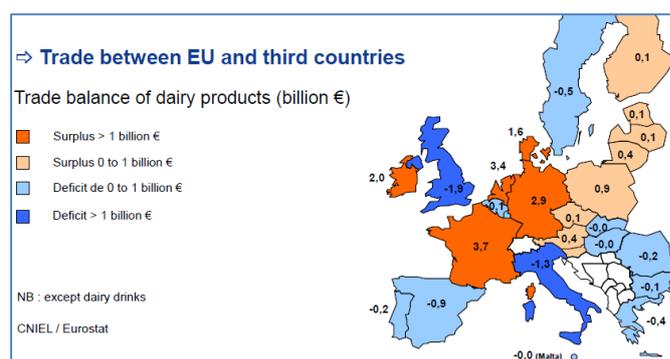
Milk prices



Difference from quota



Trade



The main aspects of the new agreement are:

- ◆ Contractual relations between milk producers and buyers
- ◆ The introduction of Producer Organisations to enhance negotiating power
- ◆ A greener CAP with 30% of subsidies linked with environmental measures
- ◆ More competitiveness to guarantee food security
- ◆ A minor use of market tools (intervention, private storage aid, export refunds)

Marcel explained that a whole, the European Union has a potential for growth after 2015, giving examples such as:

- ◆ Ireland plans to increase production by 50% between 2010 and 2020
- ◆ Germany to raise production by 10 million tonnes within 10-15 years
- ◆ Austria increasing production by 25% after the end of quotas
- ◆ The Netherlands: +1 million tonnes after the end of quotas

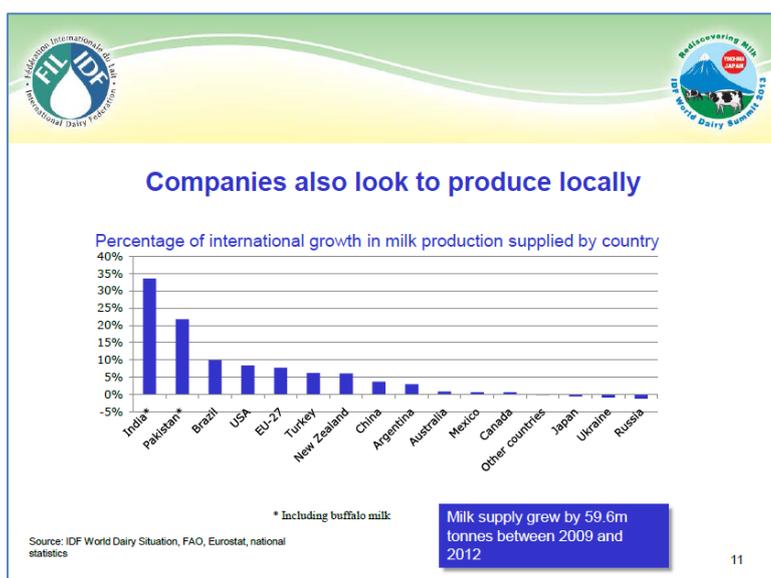
The EU, though, also faces a number of uncertainties, including: volatility of milk and input prices, the end of quotas and the reform of agricultural policies that will all have some differential impact according to the various zones.

Jim Begg talked about sustaining reward in the supply chain and finding the perfect system. He outlined the new legislation that had been introduced in the EU to enhance the market power of dairy farmers and used the UK as a case study, highlighting some of the formula pricing systems that had been introduced as well as aligned milk pricing where prices fixed by supermarkets are linked to the cost of production.

He noted that dairy farmers are limited by the ways they can add value on farm (options would include organic farming), whereas processors and retailers have more opportunity to enhance profitability and he noted that retailers put more money into the supply chain. He also expressed his surprise that there has not been more interest in the concept of the Producer Organisation in the EU, with the exception of France, but his belief is that, if large scale POs did become prevalent, then they would be challenged legally. He also talked about the fact that regulation introduced by the EU in the Dairy Package could cause commercial distortion between co-ops and private dairies which, at some point, would also be subject to legal challenge.

His main conclusion was as pricing systems around the world change at an ever faster rate, the need for transparency is paramount, coupled with the search to find solutions to the pressing problem of price volatility, which works in favour of larger dairy businesses.

There has been much talk over recent months about the part that emerging dairy nations will play in the industry's drive to produce the extra milk that will be required as the global population expands rapidly and the rise in urbanisation and consumer's changing tastes increases the demand for more sophisticated products.



Rabobanks' Kevin Bellamy examined this issue and said that success would depend on three key elements:

- ◆ The identification of local partners to achieve access to existing distribution networks
- ◆ The choice between importing product from regions with existing export surpluses or facing the challenges of developing a safe supply from regions that might be restricted technically or financially
- ◆ The need to develop products to unlock demand growth, which will suit consumers with rising, but low, disposable incomes.

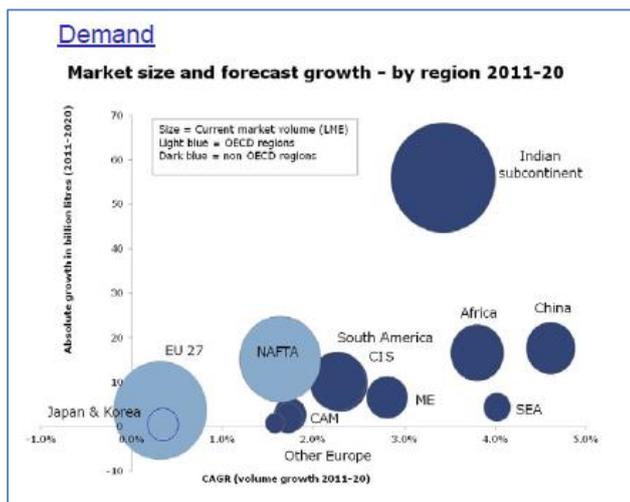
He pointed out that milk supply grew by 59.6 million tonnes between 2009 and 2012, with most of the growth coming from developing countries, despite the need for them to overcome a number of practical issues, such as:

- ◆ Their climate is often unsuitable for dairy farming
- ◆ Poor farm productivity and lack of the appropriate skill-set
- ◆ Poor animal genetics
- ◆ Scarcity of forage
- ◆ Lack of land
- ◆ Small farm structure, denying the opportunity to take advantage of the economies of scale available from large-scale production

These disadvantages, however, are counterbalanced by other characteristics that can offer opportunities for increased sales, such as:

- ◆ High birth rates and young populations
- ◆ Rising disposable incomes, underpinning the emergence of middle class consumers
- ◆ Improving diets and an increased focus on health and well being
- ◆ Government support, education programmes and the development of school milk programmes
- ◆ Growth of modern retailing and food service activities increasing exposure to dairy
- ◆ Urbanisation enabling distribution to reach more consumers
- ◆ Government support for agricultural development

He showed where the growth in dairy might come from, both in terms of demand (e.g. India, Africa, China) and supply but said that the need for increased quality assurance is increasing the cost of milk around the world and, as a result, developing countries will continue to strive to improve self sufficiency levels.



Nutrition overview

Dr Judith Bryans (Chief Executive: Dairy UK, UK-IDF Chair and Member of the IDF Science and Programme Coordination Committee responsible for Nutrition)

Dairy nutrition played a large part in the conference programme at the IDF World Dairy Summit held in Yokohama in 2013.

Alongside the kinds of talks we've come to expect at these events on the evidence about the positive benefits of dairy foods with regard to heart health, gut health and the metabolic syndrome, for the first time there was a full day of the conference dedicated to dairy and children's health. At the other end of the age spectrum, a number of the conferences included information on healthy aging and nutrition for the elderly.

For the purposes of this newsletter, I will be focusing on the day dedicated to children's health. The goal of the day was to provide the audience with scientific reasons to give milk to children.

Professor Lynn Moore from the University of Boston, School of Medicine gave the keynote speech talking to the audience about the role of milk and dairy products in heart health, diabetes, body weight and blood pressure in children and adolescents.

Since heart disease, type-2 diabetes and obesity take a long time to develop, problems often start in childhood but only become evident in adulthood. As a result, understanding how diet and lifestyle affect children's health can help predict whether someone will be a healthy adult.

Lynn's review showed that "Consumption of dairy foods from infancy throughout adolescence as part of a healthy diet and active lifestyle will promote the development of lean, healthy young adults with lower risks of high blood pressure, lipid disorders, diabetes and heart disease."

Speakers from China, Mexico, Poland, Morocco, Thailand and Japan then presented case studies which described either the nutritional contribution that dairy foods make as part of school milk and school lunch programmes or which described how milk processors and local organisations were working together to engage children with drinking milk.

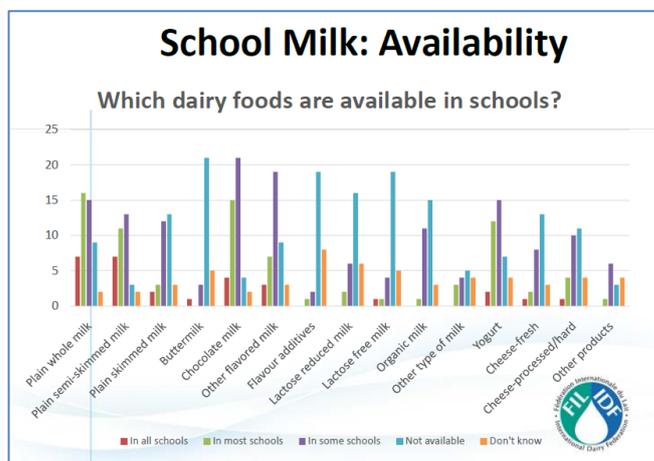
Of note from those case studies were:

- ◆ *Thailand.* Between 1990 when school milk was introduced in Thailand and 2006, malnutrition in school aged children went down from 19% to 5%.
- ◆ *China.* Since 2006, when the then Prime Minister suggested that every child in China should have 500ml of milk, sixty thousand schools in six hundred and sixty cities are involved in the school milk programme. As a result, in 2012, eighteen million students received milk in schools.
- ◆ *Japan.* In Japan cross-curricular initiatives are being developed to connect milk drinking with dairy farming within the minds of children. One of these initiatives championed by J-Milk involved looking at children's attitudes to drinking milk and to dairying before and after taking them onto a dairy farm. After farm visits in which the children were allowed to engage in practical activities such as feeding and cleaning, their attitude to milk improved and they were more likely to report that they would now drink milk provided at school.

And finally, a quick mention of a talk that I had the pleasure of delivering on behalf of the IDF. The IDF's Standing Committees on Nutrition and Health and on Marketing have been collaborating with the FAO School Milk Unit, Tetra Laval and the IDF membership to conduct the largest global review of school milk programmes to be conducted in over a decade.

The review took a comprehensive look at the following areas:

1. Special markets – whether school milk is considered a special market and related issues such as subsidy and payment
2. Availability, location and consumption – the availability of milk and dairy foods, when and where they are available within the school environment and the level of consumption
3. Nutrition and promotion – how and what nutrition information is delivered in schools and how this is done, i.e. by the school itself or by the industry
4. Administration – whether school milk programmes are Government of industry led. Also, who at a school level is responsible for the administration of the programme within the food environment
5. Packaging and waste – typical pack sizes, type of packaging, waste
6. Dairy industry activity in school – initiatives the dairy industry undertakes in schools
7. Competitor activity in schools – availability of competitor products in schools, promotions of competitor products in schools, initiatives that competitors to the dairy industry undertake in schools



Fifty nine countries responded to the survey with the preliminary results being presented in Yokohama. A full comparative analysis is now being undertaken and the full results will be published in a special issue of the IDF Bulletin and on the IDF website in the near future.

Marketing Conference

Ian Wakeling (UK-IDF Secretary)

In line with the "Rediscovering Milk" theme of the Summit, the marketing conference looked at how innovation can be used to renew demand for dairy and how new marketing techniques are being used to communicate its benefits.

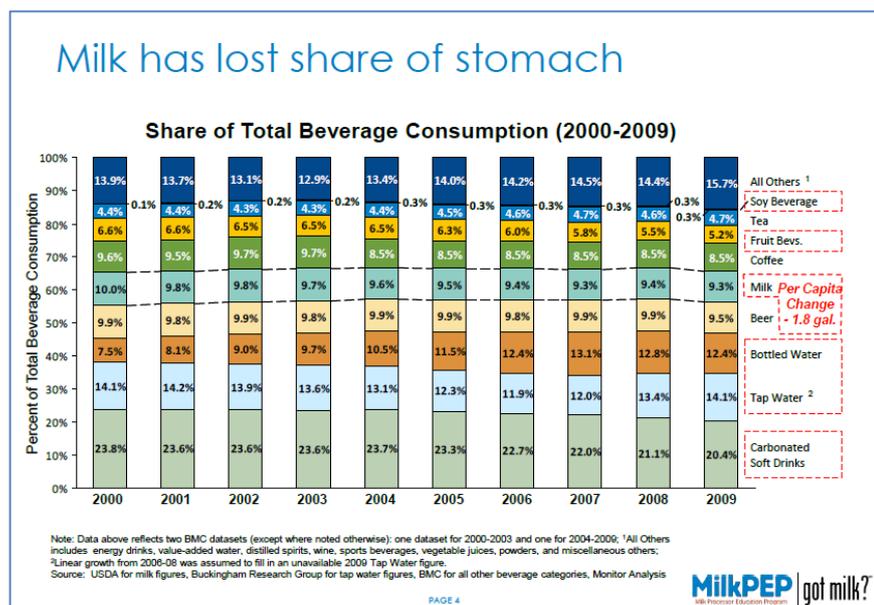
Dominique Poisson from Cniel explained that seven European countries had joined forces under the banner of the European Milk Forum (EMF) in a three step strategy to maintain and reinforce the level of milk and dairy consumption in Europe and improve consumers attitudes. The strategy comprises the establishment of the EMF, a first campaign highlighting nutrient richness entitled "Milk, nutritious by nature" and a second campaign ("Milk, a force of nature") aimed at consumers.

Austria, Belgium, Denmark, France, Ireland, The Netherlands and Northern Ireland founded the EMF in 2011 with the initial phase of the group's work scheduled to take place between 2012-2014. All of these countries are milk consumers but are facing a decrease in both milk image and milk consumption.

The actions that have already taken place include:

- ◆ A one day symposium, "Healthy and balanced diets in the EU: how can milk and dairy help?", held in Brussels
- ◆ Production of a scientific brochure setting out an overview of available data on the concept of the nutrient richness of milk
- ◆ A scientific symposium during the International Union of Nutritional Science (IUNS) International Congress of Nutrition in Granada (Spain).
- ◆ A three-country roadshow, held in Copenhagen, Brussels and The Hague, with the same panel and international experts. A four-country roadshow with a similar set-up will be held in 2014, visiting Austria, France, Ireland and Northern Ireland. The concept of the roadshow, whereby the same format is used everywhere, is replicated throughout the campaign with the same objectives and targets for each country and the same commercial aired simultaneously
- ◆ Establishment of a website dedicated to the campaign <http://www.milknutritiousbynature.eu/>

In order to move this initiative forward, the Forum will be holding the four-country roadshow, extending the second campaign, making a new multi-country application to the EU for further funding and seeking new members.



The United States is also taking steps to halt the long-term decline in consumption and has launched a Long Range Plan.

The first step along this route was a 10-year review of all beverage consumption, looking at where and when the products are consumed, and this revealed that bottled water is the main product that is gaining market share at the expense of milk and that 76.8% of milk is consumed at home (with 30.2% used at breakfast time).

A further survey demonstrated that 75% of adults questioned saw value

in adding protein to their diet in order to build muscle, give a feeling of satiety and to achieve weight loss. MilkPEP (the Milk Processor Education Programme), therefore, decided to focus its efforts on increasing sales for breakfast at home and using lowfat chocolate milk as the chosen drink to refuel after an exercise routine.



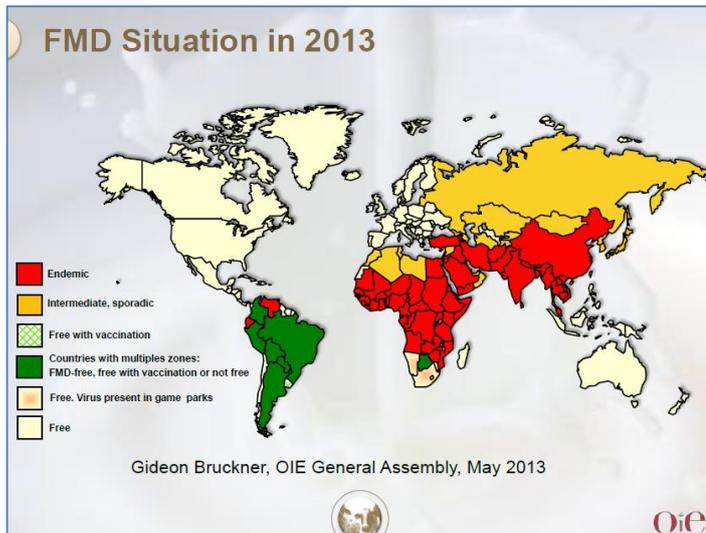
One of the main objectives was to increase the number of athletes who included drinking lowfat chocolate milk as part of their after-workout routine and new packaging was also introduced. It was found that the new packaging had a significant effect on the likelihood to consume and it was also seen as a better fit with the new messaging to such an extent that, when shown a list of various products and brands and asked "which one would you now choose to drink after the next time you exercise", the proportion of people selecting lowfat chocolate milk increased from 3% before the messaging to 48% afterwards and even more (to 57%) after seeing the new packaging.

The success of the campaign was illustrated at the Summit by it being declared the winner of the Yves Boutonnat International Milk Promotion (IMP) Trophy, awarded for best generic campaign submitted by members of the IMP group, triumphing over entries from Canada and South Africa in the final.

Animal Health and Welfare Conference

Dr Elizabeth Berry (Chair of the IDF Standing Committee on Animal Health and Welfare)

Elizabeth Erlicher Vindler from OIE gave the keynote address for the Animal Health and Welfare meeting. OIE is the international reference with regards to disease status and the World Trade Organisation provides the standards for international trade.



Member countries have to submit their disease information and this is used to compile the disease situation around the world with regards animals. Many diseases are considered exotic to the UK but the recent Foot and Mouth outbreaks have focused attention that the UK is not isolated from the rest of the world. Rinderpest has been successfully eradicated from the world and the OIE is using this to begin a control and eradication programme for other diseases. Going back to FMD there are now three official FMD levels – free, free with vaccination and the last control programme in place. This last category is for those countries aiming towards control and eradication of FMD.

Elizabeth Berry gave an update on zoonotic diseases with wildlife hosts. This explained the need for such diseases to be maintained both in the cattle but also within a wildlife reservoir. Cross infection between the wildlife reservoir and cattle then meant that such diseases would still occur in cattle even if the cattle were tested and removed accordingly. *Mycobacterium tuberculosis* was such a disease with a variety of wildlife hosts throughout the world. Different countries took varying approaches to the control and eradication of the disease within a wildlife reservoir and their examples could be copied by others.

The next talk focused on bovine mastitis and gave a Japanese perspective on this subject. Dr Tomahio Hayasaki discussed the common mastitis pathogens, including the increase in *Mycoplasma bovis* which is something being noted in other countries and responds poorly to treatment necessitating culling of affected animals. Detection of mastitis including cowside tests and automation were covered in this talk.

Dr Yamakawa gave an update on Akabana virus. Those in Europe may realise the Schmallenberg is the same family and large amounts of our knowledge on this have been extrapolated using information gained from Akabana. Large outbreaks are seen often causing transient viraemias without clinical symptoms in pregnant cows but resulting in congenital malformations of their calves. There is a strong seasonal prevalence after the rainy season but this is also related to the midge population. Vaccines are used here to protect against the disease and much of our knowledge on the vaccine with regards technology, duration and regimes comes from here.

Vaccine was a theme of Professor Hoo Sang Yoo from Korea in his talk about Foot and Mouth disease. In countries where the disease is almost endemic vaccine is a major control measure and along with appropriate biosecurity. As pigs are often a major excretor of the virus they are the first species to be vaccinated when an outbreak is confirmed.

Dr Yasoo Yuki updated us on the Japanese approach to *Mycobacterium paratuberculosis* or Johne's disease. Japan is working towards eradication of this disease using a mixture of testing and management factors such as removing animals shedding the disease, minimising new infections by management of young animals and buying animals from low risk status herds.

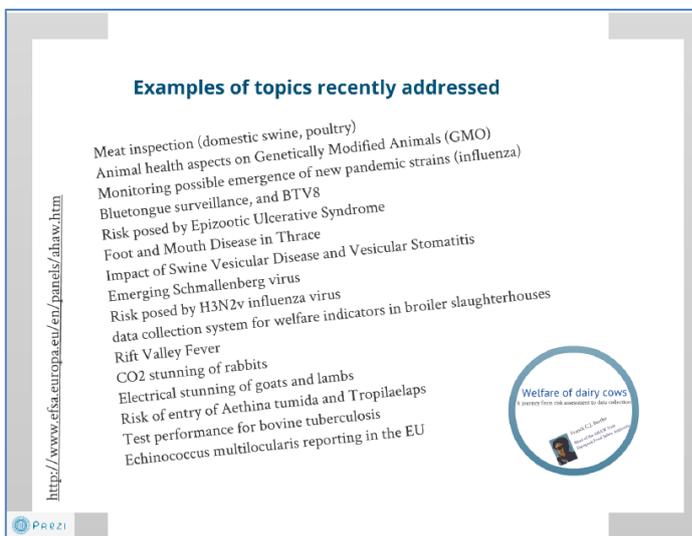
We were given a fascinating insight into the Indian dairy industry by Sira Abdul Rahman, retired dean of Bangalore Veterinary College.

Milk production in India is the highest of any nation in the world, including the USA and EU27 at 143 million tonnes. This has doubled since 1996 largely achieved from increased yield per cow to an average of 1,200 litres/cow/year. Average herd size remains at 2 spread across 76 million farms. There are some larger scale herds however, but the majority of milk is traded on the informal market.

One of the greatest challenges the industry faces is the fact that the cow is sacred in India and once at the end of their productive life, they cannot be slaughtered. They can be sent to government funded shelters called 'Goshalas', but they are often abandoned. There are more goshalas in India than old peoples homes!

Low average yield and unproductive animals not being slaughtered leads to concerns about welfare and also environmental footprint of dairy farming in India with no obvious solution on the horizon because of the religious implications.

Franke Berthe from European Food Safety Executive (EFSA) gave a European perspective on welfare including an update on some of the welfare activities undertaken by EFSA. He concluded that while welfare outcomes may reflect how an animal copes with its environment some of the work done to evaluate this has been time consuming in practice. It is also difficult to compare or value one potentially poor welfare outcome to another – are they all equal or does one carry more weighting than another. This he surmised would probably mean a combination of both inputs (space, feed etc) and outcomes (body condition etc).



Environment Conference

Brian Lindsay (Member of the IDF Science and Programme Coordination Committee responsible for Environment)

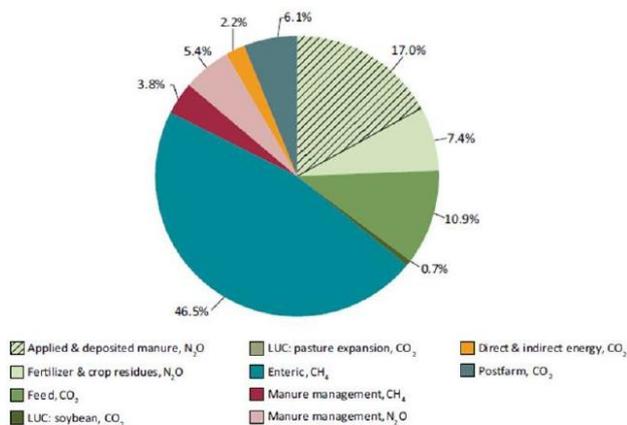
The Environment conference this year saw presentations from a wide range of industry representatives from research to practical activities on farm for community benefit right through to packaging. The following is a snapshot of the variety of presentations from the session. More detail on any of these can be found on the IDF website.

An update from the Chair of the IDF Standing Committee on Environment (SCENV) covered the soon to be released second version of the internationally recognised Common Methodology for the Calculation of GHG Emissions from Milk Production and Processing. The second version will be available in early 2014.

Also available in early 2014 is the IDF Common Approach to Calculating the Water Footprint of Dairy Farming. This is the next in the 'common methodology' series that takes an LCA approach to quantifying the footprint and aligns with the ISO Water Foot Printing Standard.

Another Action Team from the SCENV is tackling the biodiversity quantification challenge and, following the success of a recent multi-stakeholder workshop, is now focusing their efforts on developing a 'framework' for biodiversity to assist individuals/organisations wanting to quantify and address biodiversity.

Global emissions from dairy supply chains, by category of emissions



Several GHG related presentations were also part of the conference. Pierre Gerber from the FAO explained that a 30% reduction of GHG emissions would be possible if producers in a given system or region and climatic zone adopted the technologies and practices currently used by their least emission intensive peers. Takahisa Hinata of the Hokkaido Research Organisation detailed the work that he and colleagues had been undertaking since 2009 using models for large farms (100 cows and 60 ha of grassland) and regular scale farms (40 head and 10ha of grassland). The range in enteric methane from these systems accounted for 41-57%

of total emissions with emissions from manure management realizing 26-43%. Emissions from electricity accounts for less than 10% of total emissions.

So can carbon Neutrality be achieved in livestock agriculture? Rogier Schulte of Teagasc, Ireland shared an Irish study that looked at the feasibility of carbon-neutrality as a conceptual framework for livestock agriculture. The study used a qualitative appraisal of 5 potential pathways to close the emissions gap. These included afforestation, advanced mitigation, bio-energy production, constrained production and acceptance of residual emissions.

In conclusion the study indicated that carbon neutrality for livestock farming is a meaningful horizon point for the livestock sector to proactively reduce its impact on climate change up to 2050, though actually achieving it will be very difficult or impossible for ruminant farming systems.

With the IDF working on the development of a water foot printing guide for the dairy sector, it was refreshing to hear of work being undertaken in New Zealand. Carly Robinson of Fonterra outlined the NZ\$20 million project that will be delivered in collaboration with the NZ Department of Conservation. Both organisations had the common interest in protecting NZ's waterways so the collaborative effort was sensible.

The project selected 5 'sensitive' catchments where dairying has a significant presence and by working with local communities have jointly designed projects that address on-farm practice change and eco-system restoration/enhancement.

The Dairy Sustainability Framework was also introduced at the session. The Framework is the natural evolution of original Global Dairy Agenda for Action (GDAA) which was launched in 2009. With the original GDAA focusing on the single issue of GHG emissions, the Dairy Sustainability Framework takes a more holistic approach by addressing sustainability in its entirety.

Based on the outcomes of an independent study undertaken by a globally recognised consultancy, the dairy sector has developed a Framework that permits continuous improvement as opposed to the predominantly static tick box standard approach. The framework also allows existing sustainability initiatives to be recognised and captured and caters for countries and regions regardless of their progress on the sustainability journey.



The Dairy Sustainability Framework is seeking the registration of organisations along the dairy supply chain to sign up and support this innovative approach to delivering the sustainability agenda. For the next year at least the Framework will be 'measured' by our stakeholders in terms of the critical mass of the globe's milk production/supply who have joined the GDAA – DSF program. The dairy sector is encouraged to engage with this process and be integral to its shaping going forward.

This is an initiative developed by the dairy sector for the dairy sector.

Further information can be obtained from: www.dairysustainabilityframework.org

RECENT IDF PUBLICATIONS

All IDF publications can be ordered from the UK-IDF office.

Newsletter

IDF Animal Health Newsletter – Issue N° 7 (October 2013)

This issue includes contributions ranging from antibiotic reduction campaigns and Schmallenberg virus to animal welfare and mastitis.

This bulletin contains 24 pages, is free of charge and can be downloaded [here](#).

Joint IDF /ISO International Standards

ISO 16297|IDF 161:2013 - Milk - Bacterial count - Protocol for the evaluation of alternative methods (13 pages – paper 65.00€, electronic 65.00€)

This International Standard gives guidelines for the evaluation of instrumental alternative methods for total bacterial count in raw milk from animals of different species.

ISO 11816-1|IDF 155-1:2013 - Milk and milk products - Determination of alkaline phosphatase activity - Part 1: Fluorimetric method for milk and milk-based drinks (13 pages – paper 65.00€, electronic 65.00€)

This part of ISO 11816|IDF 155 specifies a fluorimetric method for the determination of alkaline phosphatase (ALP, EC 3.1.3.1) activity in raw and heat-treated whole milk, semi-skimmed milk, skimmed milk and flavoured milks. This method is applicable to milk and milk-based drinks from cows, sheep and goats. It is also applicable to milk powder after reconstitution.

ISO 9622/ IDF 141:2013 - Milk and liquid milk products – Guidelines for the application of mid-infrared spectrometry (14 pages – paper 65.00€, electronic 65.00€)

This International Standard gives guidelines for the quantitative compositional analysis of milk and liquid milk products, such as raw milk, processed milk, cream and whey, by measurement of the absorption of mid-infrared radiation.

ISO/TS 18083|IDF/RM 51:2013 - Processed cheese products – Calculation of content of added phosphate expressed as phosphorus (replaces IDF 51B:1991) (2 pages – paper 31.00€, electronic 31.00€)

The method in this Technical Specification specifies the calculation of the approximate content of phosphorus from added phosphate salts and phosphorus containing pH-regulating agents in processed cheese products.

Bulletin of the IDF No. 470/2013 - The World Dairy Situation 2013

Annual survey presented at IDF World Dairy Summit, Yokohama (Japan), in October/November 2013. Production, consumption, trade and price figures from dairy sector and other sources. Largest dairy companies by turnover and/or milk intake. Comments and prognoses on the situation in different countries and analysis of the whole, covering all major producing and consuming countries. Review of various forecasts of dairy trade.

Pages: 237 – Paper 125.00€ – Electronic 95.00€

Bulletin of the IDF No. 469/2013 - Requirements for Reference Materials for the Calibration of Automated Somatic Cell Counters

Report produced of an international project focusing on analytical harmonisation in somatic cell counting, managed by the International Dairy Federation (IDF) and the International Committee for Animal Recording (ICAR) and providing guidance for the production of suitable reference materials for somatic cell counting according to ISO 13366-2 | IDF 148-2.

Pages: 34 – Paper 42.00€ – Electronic 38.00€

Bulletin of the IDF No. 468/2013 - Interlaboratory collaborative study of a method for the determination of nitrogenous fractions in cheese-ISO 27871/IDF224

Results of an international collaborative study conducted to establish precision figures for the determination of nitrogenous fractions in cheese.

Pages: 9 – Paper 12.00€ – Electronic 10.00€

Bulletin of the IDF No. 467/2013 - Collaborative study of ISO 26323/IDF 213 on determination of the acidification activity of dairy cultures by continuous pH measurement (CpH)

This report compiles the results of an international collaborative study conducted to establish precision figures for the determination of acidification activity of dairy cultures by continuous pH measurement with the method described in ISO 26323|IDF 213.

Pages: 11 - Paper: 15.00€ - Electronic: 12.00€

Bulletin of the IDF No. 466/2013 - Guidelines for the use and interpretation of bovine milk somatic cell counts (SCC) in the dairy industry

Somatic cell count (SCC) is the most frequently used indicator of udder health in dairy cows. This article looks at the scientific and practical aspects of determining the SCC in milk and how the counts can vary.

Pages: 14 - Paper: 20.00€ - Electronic: 16.00€

Bulletin of the IDF No. 465/2013 - Identification and assessment of emerging issues associated with chemical contaminants in dairy products

The Brazilian Ministry of Agriculture, Livestock and Supply has expanded its monitoring of residue of antibiotics, antiparasitics and other substances in animal products in order to identify whether the levels of such substances are at safe concentrations for human consumption. A new national program (RENARA) for identifying and managing the risks associated with the presence of residues and contaminants in food is outlined.

This bulletin contains 11 pages, is free of charge and can be downloaded [here](#)

Bulletin of the IDF No. 464/2013 - Emerging Dairy Sector Conference, IDF World Dairy Summit 2012 - Cape Town, South Africa - October 2012

This publication comprises two papers presented at the Emerging Dairy Sector Conference during the IDF World Dairy Summit in Cape Town, South Africa in October 2012:

- **Dairy: nutritional value for money for South African consumers**
- **The benefits of animal welfare for farmers and the environment in emerging economies**

This bulletin contains 28 pages, is free of charge and can be downloaded [here](#)

Bulletin of the IDF No. 463/2013 - Proceedings of The Nutrition and Health Conference, IDF World Dairy Summit 2012 - Cape Town, South Africa - October 2012

This publication contains six presentations and one poster presented at the Nutrition and Health Conference during the IDF World Dairy Summit in Cape Town, South Africa in October 2012.

Pages: 64 - Paper: 60.00€ - Electronic: 55.00€

Bulletin of the IDF No. 462/2013 - Identification of probiotics at strain level - Guidance document

Correct assignment of probiotic strains to species or sub-species is indispensable for evaluating the genetic background of the micro-organisms the probiotic properties are imbedded in and strain identification, based on typing methods, is described.

Pages: 12 - Paper: 15.00€ - Electronic: 12.00€

Bulletin of the IDF No. 461/2013 - Collaborative studies on methods to determine enzyme activity in cheese making

The results of three different collaborative studies to determine enzyme activity in cheese making are presented: Microbial Coagulants – Determination of total milk-clotting activity (ISO 15174 | IDF 176), Calf rennet and adult bovine rennet – Determination by chromatography of chymosin and bovine pepsin contents (ISO 15163 | IDF 110) and the draft version of the method Milk and milk products – Determination of the lipase activity of pregastric lipase preparation (ISO 13082 | IDF 218).

Pages: 21 - Paper 28.00€ - Electronic 25.00€

Bulletin of the IDF No. 460/2012 - Proceedings of the 3rd ParaTB Forum

This publication contains fourteen papers written by representatives of national and regional Johne's disease control programmes on the lessons learnt throughout their implementation. The majority were presented at the 3rd ParaTB Forum in Sydney, Australia, on 4 February 2012. Each report provides details of the control programme in question – the resources available, the strategies implemented, and a measure of its success.

Pages: 68 – Paper €80 – Electronic €75

Bulletin of the IDF No. 459/2012 - Collaborative Study on the Kjeldahl Reference Method for Nitrogen Determination of Dried Dairy Products according to ISO 8968-1/2/ IDF 20-1/2

Results of an international collaborative study conducted to establish precision figures for the determination of Kjeldahl nitrogen in milk powders, milk protein concentrate, whey protein concentrate, casein, caseinate and infant formulas in order to extend the scope of ISO 8968-1/2 | IDF 20-1/2. Twenty eight powder samples, with a range of crude protein content, varying between 11.7 and 92.4%(m/m), were prepared and dispatched to the participating laboratories as blind duplicates. The report gives details of the techniques required to optimise digestion procedures to obtain the maximum nitrogen result for each sample type. The statistical analysis of the results gave a repeatability value, r , of 0.7% of the mean result and a reproducibility value, R , of 1.3% of the result obtained.

Pages: 14 – Paper €20 – Electronic €17

IDF EVENTS IN 2014

IDF Symposia on Microstructure of Dairy Products and Science and Technology of Fermented Milk, 3 - 7 March 2014, Melbourne, Australia

Two sequential conferences on dairy product microstructure and fermented dairy products will combine to provide a week of stimulating presentations and discussions covering a broad range of basic and applied topics associated with the development, manufacture and understanding of novel and traditional dairy foods and ingredients.

<http://dairyscienceconf.com/>

IDF/ISO Analytical Week 2014, May 15-20 2014, Berlin, Germany

The IDF/ISO Analytical Week is the annual meeting point for Methods of Analysis and Sampling experts featuring a symposium, workshops, business meetings, a technical tour, and an exhibition of analytical providers.

The ICAR Biannual session will take place from 18 May - 23 May at the same venue.

www.idf-iso-analytical-week.org

IDF World Dairy Summit 2014, 27-31 Oct 2014, Tel Aviv, Israel

The Israeli National Committee of the International Dairy Federation, in proud collaboration with the Food & Agriculture Organization of the United Nations (FAO), will be hosting the 2014 IDF World Dairy Summit in Tel Aviv, Israel on October 27 – 31, 2014. With a theme of "The Future Begins Here", the Israeli Organising Committee is creating an attractive and innovative programme that promises to educate and challenge your thinking on the opportunities and issues faced by the dairy sector.

www.idfwds2014.com