



**EU-Russia Co-operation in
Food, Agriculture and
Biotechnology**

Moscow

22nd February 2007

European Technology Platform “Food for Life”



Aim

The ETP aims to bring together all interested stakeholders, especially from the private sector, to develop a long-term vision for the food and drink sector, create **research and innovation** strategies to achieve that vision, and steer its implementation.

Objective: To help ensure the sector is capable of sustainable economic growth

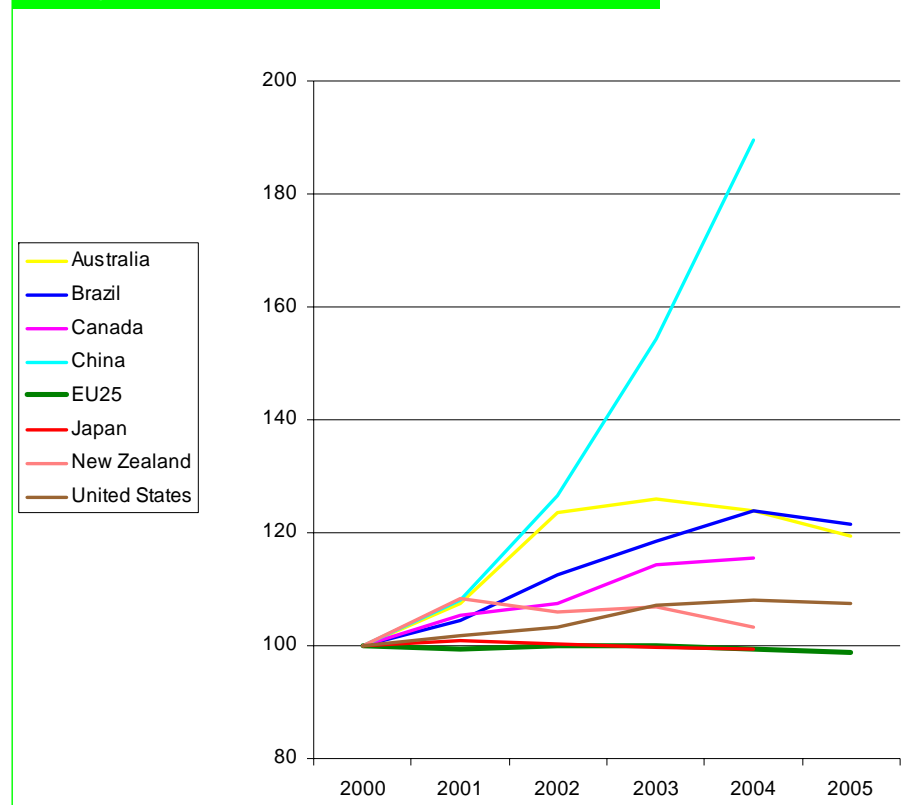
**Why is this necessary?
Market constantly changing**

ECONOMIC FACTS RELATED TO FOOD & DRINK SECTOR



- Largest manufacturing sector in EU (13.6 % in EU15)
- Turnover EU25 was € 840 billion in 2005; growth @ 1.9 %
- Total exports in 2005 amounted € 45 billion
- Positive trade balance of € 5.8 billion
- Major employer with 4.1 million workers
- 61.3 % of workforce in SMEs

Evolution of production value in various food and drink industry (deflated, 2000 = 100)



Global Trends in Food & Beverage Market



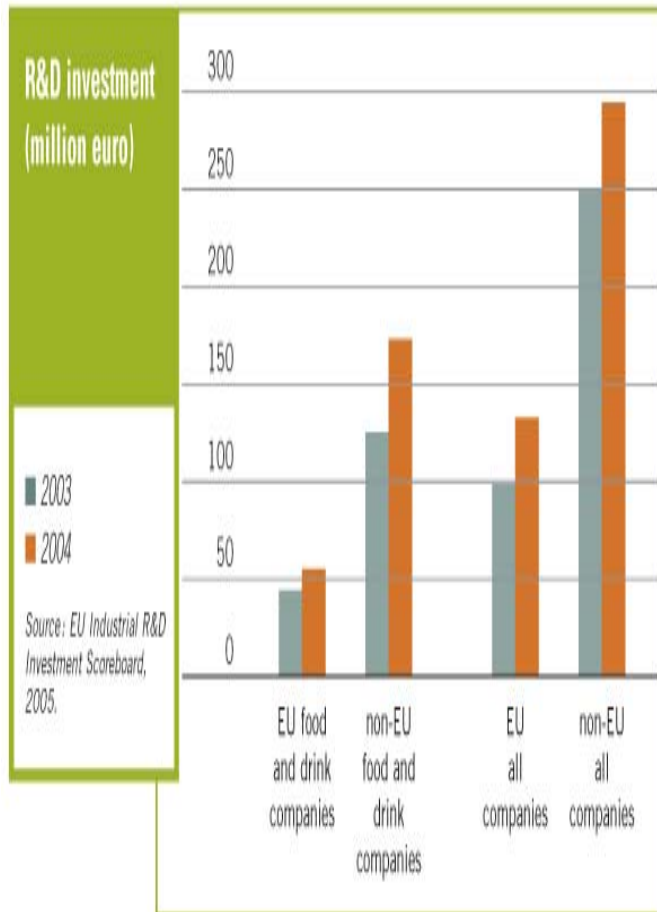
Growing Trends

- Greater internationalisation
- Consolidation of retailers & manufacturers
- Importance of brands
- Growing market segmentation
- Food service sector increasing
- Increasing regulation
- Health enhancement
- Variety of choice

EU Demographics

- Rising incomes
- Sexual equality
- Competitive environment
- Smaller household size
- Ageing population
- Nutrition crisis (physical activity)
- Mass tourism

EU Food & Drink Manufacturing Sector



R & D Investment Low

STRENGTHS OF EUROPEAN R & D IN FOOD & DRINK SECTOR



Major impact on development of functional foods

Strong groups in major institutes and universities

Excellence in food safety

Developing skills in consumer and sensory sciences

State of the art in food processing technologies

WEAKNESSES OF EUROPEAN R & D IN FOOD & DRINK SECTOR



R & D not effectively coupled to innovation

Little impact on SME sector –predominant part of European industry

Uptake limited by policy constraints

Considerable repetition of investment throughout Europe

Many disparate funding sources especially in diet and health

Level of investment insufficient especially in functional food area

KEY R & D CHALLENGES



- Ensuring that the healthy choice is the easy choice for **all consumers**.
- Developing a **healthy diet**.
- Developing value-added **food products** with superior quality, convenience, availability and affordability.
- Assuring **safe food** that **consumers can trust**.
- Achieving **sustainable** food production.
- Managing the **food chain**.
- Optimising **communication, training and technology transfer**.

**CONSUMER NOT
PRODUCER
FOCUS**

SPECIFIC AREAS FOR INTERNATIONAL CO-OPERATION



Food & Health

- to ensure a longer, more active life

- Metabolic effects of diet & bioactive food constituents
- Understanding effect of energy intake/ diet/constituents on ageing and age-related disease (CHD, neurological, cancers)
- Epidemiology of diet and health
- Effects of diet on immune system throughout life
- Social sciences – developing strategies to assist consumers in choice of healthier diet

Underpinning science in nutrigenomics

**Personalise nutrition by better
understanding of gene-nutrient effects and
dose-response**

SPECIFIC AREAS FOR INTERNATIONAL CO-OPERATION



Food Safety

- Predicting and monitoring the behavior and fate of relevant known and emerging biological hazards
- Predicting and monitoring the behavior and fate of relevant known and emerging chemical hazards including toxins of biological origin
- Improving risk assessment and risk-benefit evaluation
- Developing tools to ensure security of the food chain
- Improving the understanding of safety issues and addressing consumer concerns about food

Underpinning science –metabolomics; food intake studies, systems biology

Facilitate the removal of non-tariff trade barriers

SPECIFIC AREAS FOR INTERNATIONAL CO-OPERATION



Development of value-added food products

- Flexibility in food production systems
- Production and process control using sensor technologies
- Understanding of process-structure- property relationships to quality
- Safety and consumer responses to new technology applications in food chain
- Improvement in refrigeration technologies

Underpinning sciences

- Nanotechnology
- Biotechnology
- Material and sensory science
- IT

SPECIFIC AREAS FOR INTERNATIONAL CO-OPERATION



Sustainability of the food chain

- **Greater utilisation of food waste materials**
- **Reduction in water use**
- **Reduction in energy use**
- **Development of technologies to facilitate small scale, localised food production**

Whilst guaranteeing safety and productivity factors

Particular value to the SME sector

ETP FOOD FOR LIFE



**Именно сейчас необходимо работать вместе,
чтобы поддержать действия, направленные на благо экономики и
общества, обеспечивающие оптимальные возможности в будущем
для нашего молодого поколения**

**Now is exactly the right time to work together in support of activities
that will benefit industry and society,
and ensure that the future opportunities of our
young people are optimised.**

**For further information
consult**

<http://etp.ciaa.be>