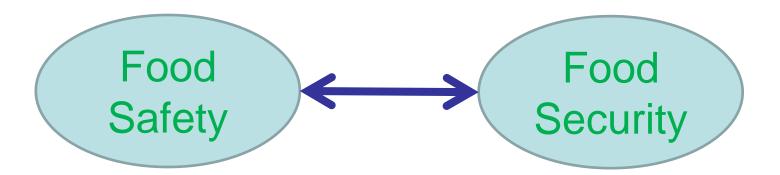
# Feeding the Planet – Energy for Life

#### Regione Lombardia towards EXPO 2015



## Feeding the planet

What are we looking for?



Different situations, cultures, feelings lead to different objectives, approaches and policies



## Food Safety and Food Security

Two sides of the same coin Ensuring food safety leads to improve food security, on the other hand, food security cannot be pursued regardless food safety. The main Objective (and challenge): to

The main Objective (and challenge): to guarantee proper food access all over the world



## **Proper Food Access**

- uncontaminated food (to prevent food poisoning)
- proper food (to meet nutritional requirements and to prevent disnutrition)
- sufficient food (to prevent malnutrition)



## "Disnutrition" a Main Problem in Western Countries

A balanced diet and regular physical activity can help to prevent (cardiovascular) diseases (in Europe) This goal may be achieved by mean of health promotion strategies as well as ensuring better & safer foods



## A Different Approach to Food and Nutrition

Can be hardly part of a food safety and security program. Nonetheless we can't forget that "disnutrition", as well as malnutrition, should be considered as part of a common problem



## The EXPO Main Challenge

To approach food safety and food security by mean of a common (holistic) approach, meeting the needs and the expectations expressed by Countries and world regions where food safety and food security may have different meanings and priorities



## A Unique Approach

A uniform application of an exclusive prescription to be equally adopted in any situation (by all the Countries), could lead to greater problems, depending on the different objectives and priorities that, in their turn, descend from dissimilar epidemiological, cultural and economic situations



#### Moreover

Focusing on a single aspect, e.g. "disnutrition", could lead to underestimate other problems, e.g. those connected to food poisoning risk. A generalized (dogmatic) substitution of saturated fats with unsaturated in foods could lead to higher spoilage rate and even to problems connected to toxic substances (e.g. aldehyds) assumption



## Feed the planet – the challenge

A shared approach to give proper answers to different problems, situations and priorities using appropriate instruments and methods accordingly to the different (local) situations.



## A Shared Approach to Food Safety & Security

Can only be based on an enhanced knowledge of all the involved aspect, those relevant to human health as well as those connected to food processing and to the intrinsic and extrinsic characteristics of foods, their impact and interactions



A four steps program aiming: 1. To improve food safety & food security through better food's intrinsic characteristic comprehension implementing a multifactorial analysis to examine the impact of changes in food processing on food overall safety



2. To enhance food safety & food security exploiting competition among microbiological consortia, that is modulating microorganism growth in such a way to manage risks connected to foods by mean of natural mechanisms



3. To investigate mechanisms regulating microbiological interactions, aiming to recognize and isolate the effector molecule(s) responsible for microbial modulation ...



... with a view to reproduce the 4. same activity even in case of foods and processes different from those under study, leaving the original microorganisms aside, and preventing possible undesired effects that could be related to these germs.



# Thank you for your kind attention

We hope there will be chance to collaborate with a view to achieve such an ambitious objective!

