Food and Universities for Sustainable Development

The 2015 United Nations Agenda 2030 for Sustainable Development brought sound innovation in the conception of sustainable development. On the one hand, it portrayed the extreme complexity of the problem due to interconnection of different aspects; on the other hand, it claims the necessity of a collective mobilization of all actors and institutions to respond to the challenge in an integrated way. This is a substantial change of perspective, as rather than focusing on the environment as a separate subject, Agenda 2030 recognises that future chances of success for sustainable development models are based on the capacity to provide real behavioural alternatives. Understanding the social dimension of sustainability is therefore crucial. A profound transformation of lifestyles and ways to act and think is consequently required.

In this context, University, which is historically recognised as the place for knowledge development and knowledge conservation, has the responsibility to transform itself, and to become a visionary driver of innovation, to become incubator of change and experimental lab at the service of the broader territory.

Universities can also embody an example for other sections of the public administration.

In Italy, the exploration of the dimensions of sustainability in the context of universities and academia found a stepping stone with the constitution, in 2015, of the Italian University Network for Sustainable Development (RUS, Rete delle Università per lo Sviluppo sostenibile). The aim of the Italian University Network for sustainable development (RUS) has, as main scope, the diffusion of culture and good practices for sustainability, both within and outside universities, in order to multiplicate positive impacts.

Among the 17 Sustainable Development Goals launched by Agenda 2030, one (SDG 2) directly targets food. It is with the intention of exploring the sustainability of food-related aspects in the context of Universities that the thematic working-group on Food and Universities was constituted. The idea of opening up a dialogue on Food and Universities stemmed from two events in 2018, a symposium held in Pisa on sustainable food systems in universities, and a meeting held during the Terra Madre festival in Turin.

The objective of the thematic working group on food was to unfold the dimensions of food sustainability in the life and goals of Italian universities, by collecting, analysing and sharing practices, projects, and policies regarding university and food.

In addition to their involvement in research, education, sensitization on sustainable development themes, Universities can be living labs of good practices for the promotion of a healthy, ethical and sustainable diet.

For instance, by intervening on public procurement for canteens and University cafes, on vending machines or on the production of food within university experimental farms,

Universities can be drivers of culture awareness and innovation with regard to the different components of food sustainability. Universities can enact a number of initiatives, by integrating education, research, third mission, and being a model which influence the different stakeholders who interact with them.

Firstly, Universities have the possibility to directly influence the well-being of its communities, by entering in the daily life of more than 100 000 individuals, between teachers, researchers, officers & staff, and more that 1,5 million students.

In addition to this direct effect, they can promote actions having rebounding effects on the daily lives of the families of those who work and study in the university, and can stimulate the diffusion of lifestyles with minor environmental impact and more socially sustainable and healthy lifestyles.

The RUS allows to spread information about projects and initiatives, address and systematize good practices, to promote proposals for innovation, and to clarify and convey deeper and brother messages, by building on the many local initiatives and trigger a paradigm change.

Food and universities is a theme of profound importance which involves actors and policies inside and outside universities, both at local, national and international level. In these complex contests foreign and national experiences demonstrate how universities can become a fundamental factor in the food chain.

Beyond its core business, by acting on itself, by exchanging good practices and seeking dialogue with the market and the food grassroots movements, University can activate a progressive raising of awareness and assumption of responsibility in orienting the food system and its community of reference towards sustainability.

The many themes on stake can be grouped in three areas: the first is the analysis of production and consumption in the context of university; the second is the legal instruments that University has, such as green public procurement; the third is intervention and good practices.

For instance, students' food preferences are crucial to know what are the consumption models and food opportunities for university students because it is instrumental to understand where and who to ask for improving the quality and sustainability of food.

Among the RUS objectives, education is one of the most important. In fact, educating does not only mean transferring knowledge, but rather operating in an organic way for the growth of the person and the formation of citizens of today, but above all of tomorrow; this is particularly important when dealing with complex and highly transdisciplinary issues, such as that of sustainability, having the ambition to significantly contribute to the change of lifestyles.

For university to effectively educate to sustainability, two steps are needed: the first is a self assessment to foster internal sustainability, secondly, to engage in actions and projects with the stakeholders; lastly, it is possible to activate project which operate in the area of sustainability, which can stimulate the spread of additional sustainable activities.

There are two approaches: the top-down and the bottom up. The first makes reference to the instruments adopted by government bodies and institutions and which regard mainly structures and infrastructures. The second is an approach based on participation, in which the making of the project is in itself an objective of inclusion in this case stakeholders involvement starts at the beginning in the first case take orders stakeholders are passive recipients of decisions taken by someone else.

A University that intends to place sustainability at the center of its action must necessarily 'deal' with food, in all its many forms (from production to consumption, from transformation to impacts and so on).

Beyond the research aspects, the element that makes the combination of food and universities crucial is the possibility that universities have to become real experiential laboratories, where practices can be tested and then extended to the surrounding area and to other public and private institutions.

Food, for the university, embraces many areas, mostly related to administration to staff and students, involving vending machines and canteens, but also catering activities, following the various events organized within the university.

The question is therefore how to transform these services, provided more or less directly by the universities, into opportunities to test new practices and involve staff and students in virtuous pathways, which increase attention and awareness, but also experiment approaches that can then be applied in other contexts (such as homes, student residences and more).

Egidio Dansero, Franco Fassio, Eleonora Sirsi, Nadia Tecco ,L'Università e il cibo: introduzione a un tavolo di lavoro

e

Fabio Pranovi, L'Università e il cibo: il ruolo della RUS,

in Egidio Dansero, Franco Fassio, Eleonora Sirsi, Nadia Tecco, Le università e il cibo, Buone pratiche verso un'alimentazione sostenibile negli atenei, Celid 2019

The following abstracts describe the chapters of the volume

Egidio Dansero, Franco Fassio, Eleonora Sirsi, Nadia Tecco, Le università e il cibo, Buone pratiche verso un'alimentazione sostenibile negli atenei, Celid 2019 (available at this link)

THE UNIVERSITY AND FOOD: THE ITALIAN UNIVERSITIES NETWORK FOR SUSTAINABLE DEVELOPMENT

Fabio Pranovi

Sustainability represents the main challenge for the human society and for the entire Planet, as highlighted also by the Agenda 2030, which put the sustainable development as the target of actions at the global scale for the next 15 years. Analyzing the 17 Goals (SDGs) of the Agenda, it is clear the effort to move towards an integrated sustainability perspective. With these aims, in 2015 it was started the Italian Universities Network for Sustainable Development ("Rete delle Università per lo Sviluppo sostenibile" - RUS). Among the other, the Network focalized the attention on the 'food' issue, as a paradigmatic example of integrated sustainability, and deciding to activate a working group for valuing best practices experienced in different Italian Campus, but also for creating experiential pathways for students and staff, in order to modify the life styles and improve awareness about the importance of a responsible consume.

THE FOOD CONSUMPTION STYLES OF UNIVERSITY STUDENTS. THE RESULTS OF A SURVEY IN MILAN UNIVERSITIES

Matteo Colleoni, Monica Gilli

The present work aims to identify some eating sty-les of the students of the University of Milan. The re-search, conducted through an online questionnaire, involved a sample of 7,607 students representing ap-proximately 7% of those enrolled at the Universities of Milan-Bicocca, Statale, Bocconi, San Raffaele and the Milan Higher Education Civic Schools. After reporting the main results regarding meal times and locations, food choices and the health status of students, the research, through a cluster analysis, identifies four main groups of students: the heal-th-conscious, the pragmatists, the experientials and the traditionalists, each characterized by specific ea-ting styles.

THE EATING HABITS OF STUDENTS OF THE SCHOOL OF ECONOMICS AND MANAGEMENT OF THE UNIVERSITY OF TURIN

Maria Cristina Martinengo, Monica Gilli

This work is the result of one of the initiatives car-ried out in the context of Unito Green Office project (UnitoGo) and presents the results of a pilot research on the eating habits of the students of the School of Economics and Management (SME) of the University of Turin.

The project is part of the theme of environmental su-stainability and has included research activities and interventions aimed at learning about the practices of students, teaching and administrative staff in va-rious fields, and directing them towards sustainabi-lity. Among the various fields invested by the project there are also eating habits and their improvement in terms of quality and sustainability. For this reason a research activity has been started to explore the food practices of students inside and outside the University in order to improve the food supply inside the University and to develop food education initiatives.

UNIVERSITY CANTEENS AND FOOD WASTE: SOME REFLECTIONS AND POSSIBLE SOLUTIONS TO THE PROBLEM

Veronica Novelli, Federico Nassivera, Marcela A. Martinez Pretelt

It is well known nowadays that food waste emerges as one of the rare problems that crosses multiple social issues, from food security and environmental degrada- tion to economic efficiency. Wasted food, according to several reports, has to be related with the number of people in the world affected by chronic food depriva- tion. On the other side, FAO reported that one-third of the edible parts of food produced for human consump- tion is wasted globally. These high figures give us a ge- neral overview of a paradoxical problem that has a tre- mendous impact worldwide. Numerous studies shed some lights on food waste as a behavioral problem and measured the effectiveness of different initiatives on food waste prevention at school, but, there is limited re- search about how university canteen customers' habits affect the level of food waste produced. Starting from these premises this study proposed an overview on a theoretical model, with the aim to explain how the sa- lient values, with regard to eating interplay, affect food consumption behavior and customers' perceived food waste generation at a university canteen.

FOOD PRODUCTION IN EXPERIMENTAL FARMS OF ITALIAN UNIVERSITIES Francesco Marangon, Ivana Bassi, Raffaele Testolin, Lucia Piani

Italian university farms provide a crucial support for teaching, research and innovation transfer in the agro-food, forestry, environmental and even social sectors. In order to point out their current values and weaknes- ses, and to start reflecting on possible development strategies, a survey was realised. The main weaknes- ses emerged concern the availability of the required data, in particular economic data, and the economic sustainability of these farms, especially with regard to staff costs. Moreover, the survey made it possible to outline for the first time a cognitive framework of the Italian university farms, thus creating a useful database for future updates and insights. The chapter offers also a description of a recent experience of "urban farming" in Udine, the so called "University Vegetable Garden" for for self-production of organic vegetables.

LEGAL INSTRUMENTS FOR SUSTAINABLE FOOD IN THE UNIVERSITY Eleonora Sirsi

Recent data on institutional catering in Italy stren- gthen the role of GPP as an economic policy tool be- cause it is able to reduce the direct environmental im- pact of public activities and to represent an example of environmental awareness, and also because of the possibility of encouraging the integration of environ- mental considerations into other policies (transport, energy, etc..) and to exert pressure on the market to offer goods, services and works with low environmen- tal impact, promoting the development of technolo- gies and production chains, the growth of businesses and green jobs. In the case of the use by universities of GPP for the purchase of food, intended mainly for student canteens, there is also the additional purpo- se of encouraging the student population to adopt conscious choices and lifestyles consistent with the principle of sustainability. The paper focuses on the progressive refinement of European and national le- gislation and on the prospects for the development of regulation.

THE VENDING MACHINE: AN ECO-INNOVATIVE SPECIFICATION FOR THE UNIVERSITY OF TURIN

Nadia Tecco, Egidio Dansero

UniToGO, the Green Office of the University of Turin, has contributed to the reorganization of the University's au-tomatic food and drink distribution service. To this pur- pose, an eco- innovative tender has been realized. It has allowed us to improve the service in terms of quality and environmental sustainability. By sharing the RUS's purpose to spread the culture and good best practices about sustainability, both inside and outside the uni- versities in order to increase the positive impacts of the actions implemented by the single universities, the chapter presents the methodological (mobilized skills and process) and content (criteria) features that have characterized this process carried out at our University. The aim is of making available the wealth of experience gained for other universities and public or private or- ganizations that are going to redefine the methods of selection of the automatic distribution service in terms of environmental sustainability.

FOOD AS A BASIC UNIT OF CONNECTION FOR SUSTAINABILITY OF THE UNIVERSITY OF GASTRONOMIC SCIENCES OF POLLENZO Franco Fassio

Food is the base unit of connection of all the scientific disciplines that contribute to the definition of the Ga- stronomic Sciences and through it, projects and poli- cies are implemented in Pollenzo for the sustainability of the entire University. Initiatives such as the Acade- mic Tables, the productive and didactic Gardens, the Local Food Shop, are virtuous examples of a continuo- us applied research aimed at raising the awareness of the community that revolves around the university. The goal of every single action is a daily implemen- tation of services with a lower environmental impact and high social influence, to share responsibilities and visions on the evolution of the food system and of this one within the university.

FOOD AS A SPACE OF ACTION FOR A UNIVERSITY GREEN TEAM Debora Fino, Barbara Stabellini, Paolo Tamborrini

Attention to food is an expression of the social and environmental responsibility entrusted to the Univer- sity as a public institution, and therefore the interest in not only nutrition but also well-being is very high on the part of the universities. In fact, they can become laboratories of good practices by

promoting sustai- nable actions through projects and concrete actions, showing them as conscious actors in local food poli- cies. Awareness of the raw ingredients, valorisation of food waste, awareness of the correct and sustainable use of resources, active involvement in the social dynamics of the Campus. These are some of the directions that the Green Team of the Politecnico di Torino follows daily