OPERA PREVENTION PROJECT

Premises

Walter Whitman, poet, writer and journalist from USA, said “I’m large, I contain multitudes” to highlight his overweight state and the consequent richness of experiences and ideas. Obesity is one of the main problems of public health, caused in most cases by an unhealthy lifestyle and so it’s preventable.

Obesity is a condition characterized by an excessive accumulation of fat in the body, which determines serious damage to health, being an important risk factor for chronic disease, such as type 2 diabetes mellitus, respiratory dysfunction, cardiovascular disease and tumors.

It is estimated that 44% of type 2 diabetes, 23% of ischemic heart disease and 41% of tumors are related to overweight/obesity: they represent together the fifth risk factor for mortality and there are 2.8 million deaths per year in the world.

BMI (body mass index) is the value used to define the overweight/obesity condition. These are the WHO criteria:

<table>
<thead>
<tr>
<th>Condition</th>
<th>BMI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Underweight</td>
<td>&lt; 18</td>
</tr>
<tr>
<td>Normal weight</td>
<td>18 – 25</td>
</tr>
<tr>
<td>Overweight</td>
<td>25.1 – 30</td>
</tr>
<tr>
<td>Obese class I (moderately obese)</td>
<td>30.1 – 35</td>
</tr>
<tr>
<td>Obese class II (severely obese)</td>
<td>35.1 – 40</td>
</tr>
<tr>
<td>Obese class III (very severely obese)</td>
<td>&gt; 40</td>
</tr>
</tbody>
</table>

According to WHO, on a global level the obesity prevalence doubled since 1980; there were 1.4 billion of overweight adults in 2008 (35% of world population); among them, more than 200 million men and 300 million women were obese (11% of world population). The problem is common also between children: more than 40 million <5yo were overweight in 2011. In Italy, the monitoring system “Okkio alla salute” of the National Centre for Disease Prevention and Control of the Ministry of Health reported that 22.9% of 8-9yo children are overweight and 11.1% are obese (data of 2010). According to the monitoring system “Passi” in 2010, 32% of adults are overweight and 11% are obese in Italy. In total, over four adults out of ten (42%) are overweight in Italy. Finally, the research "Passi d'argento" indicates that 60% of individuals in the population between 65 and 75 years of age are overweight/obese; between 75 and 84 years overweight/obese are 53% and over 85s are 42%.

How much obesity is associated with serious illnesses? According to a “Quotidiano Sanità” article in May 2017, one person dies every 10 minutes in Italy due to causes and complications related to obesity: 57 thousand deaths per year and more than one thousand deaths per week. In addition, obese people, who in Italy are 6 million, they costs EUR 4.5 billion. It is therefore essential to focus on the fight against obesity both by improving the knowledge and awareness in the population and offering a complete clinical evaluation with a care that allows patients to receive a correct diagnostic approach and treatment.

Opera prevention Project fits into the big event Campus 3S, that moves throughout Italy since 2010 (www.campussalute.it for further details). This project provides an innovative free path by which overweight/obese women and men will be visited and will receive the right instruments to start a weight loss program.
 Targets

The project is based on the organization of a medical, athletic, tasting and psychological path with the following objectives:

1) Providing a free medical examination to overweight/obese patients, including the calculation of BMI and waist circumference, bio-electrical impedance analysis to evaluate body composition, electrocardiogram and blood pressure measurement for cardiovascular assessment, spirometry for respiratory assessment, blood glucose measurement, ocular fundus examination, eating habits evaluation (step 1);
2) Providing athletic tests to evaluate muscle reserves (step 2);
3) Providing a gustatory and olfactory sensitivity test to evaluate their capacity to recognize food and cooking healthy food to make them taste it (step 3);
4) Providing a psychological examination through questionnaires to evaluate obstacles to start a weight loss program. The innovation is the software, developed by Apple Academy of Federico II University, that shows how the body figure can get slimmer to motivate patients (step 4).

 Methods

1) Free medical examinations thanks to “Campus Salute Onlus” collaboration, which promotes health and prevention with events throughout Italy for 10 years (www.campussalute.it). The field hospital will be set up on Lungomare Caracciolo, headquarter for medical and athletic part of the event;
2) The sport performance will be curated by professors of Department of Kinesiology of Parthenope University in Naples. Tests used are scientifically verified for this purpose;
3) The gustatory sensitivity test has been licensed by the project coordinator, Giotti Company in Florence and dr. Luigi Maione.
4) The psychological evaluation will be curated by the staff of Clinical Psychology Department of AOU Federico II;
5) The reshaping software has been created by Apple Academy of Federico II graduates.

 Location and date

The first edition of Opera prevention Project is scheduled for 11-13 October 2019 on Lungomare Caracciolo – Rotonda Diaz, during the Campus 3S event. The project will move throughout Italy together with Campus 3S events in 2020-2021.

 Stakeholders

City, region, province, research facilities, public and private sanitary facilities, pharmaceutical and nutrition companies.