

Ignorants, therefore anti-scientific (in Covid-19 days)?

Scientists, politicians and the public in the Italian communicative arena

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The recent Sars-Cov19 pandemic is only the last occasion in which the dual public with which the lay public approves scientific knowledge is frequently witnessed: on the one hand, there has been no lack of skepticism towards the latter conveyed by political exponents, journalists or show business personalities, on the other hand, similar expressions of dissent, has been observed proposing the adage that skeptics would like to be ignorant and not inclined to scientific knowledge. Scientists and antiscientists¹ have therefore re-proposed the long-standing debate on the level of scientific knowledge of citizens. To point the finger at the poor level of scientific culture of the citizens are above all representatives of the scientific community² but it is a non-minority position also among authoritative commentators³, as well as in some sectors of public opinion.

This position is based on three assumptions: a) politicians and politicians are facing a serious state of knowledge deficit with respect to science as well as a poor scientific preparation (*scientific illiteracy*); b) this state of disinformation is fueled by an inadequate and sensationalist media coverage of techno-scientific issues; c) greater and more specific media coverage of scientific-technological issues would produce greater scientific literacy of citizens and therefore greater sensitivity to scientific themes.

Technocratic view offers two answers. The first, provides that to decide on complex issues was who has the tools to do it, in short, the experts. Secondly, efforts should be made to increase the level of scientific knowledge of citizens. Greater knowledge, in fact - argue the proponents of this position - would increase public support for science and technological discoveries.

The broad debate on a similar issue has meant that the level of scientific knowledge is one of the most cited indicators in the debates on public attitudes towards science. However, no research has been able to demonstrate that the more science is communicated, the higher the level of awareness of citizens - nor that the orientations towards specific scientific and technological issues consequently become more positive. Furthermore, recent surveys show that in Italy the level of scientific literacy has steadily increased in the last fifteen years (Bucchi and Saracino, 2020).

Trust in scientists and interest in science is in fact deeply rooted among Italian citizens. In the last year, 45% of Italians have visited a museum or a scientific exhibition at least once and 23% have followed a public meeting or debate dedicated to science and technology and, in 2018, as many as 81.6% of citizens considered the public conferences of researchers credible and, on controversial issues such as vaccinations, citizens considered the experts (doctors and pediatricians) the figures to turn to for reliable information. As also noted by international surveys, therefore, the level of scientific literacy of Italians is in line - if not above - with other European countries⁴.

Also on the occasion of the recent Covid19 pandemic, citizens have shown wide confidence in national experts: 72.4% have positively assessed their work. However, the judgment becomes more

1Bucchi, M. (2010) *Scientisti e antiscientisti. Perché scienza e società non si capiscono*. Bologna, Il Mulino.

2Si veda il post su Facebook del gruppo "Biologi per la Scienza" [post del 28.07.2020]

3Achenbach, J. (2015) *Why Do Many Reasonable People Doubt Science?*, «National Geographic», march. Available online at: <https://www.nationalgeographic.com/magazine/2015/03/science-doubters-climate-change-vaccinations-gmos/>

4European Commission (2005), *Eurobarometer 224/Wave 63.1: Europeans, Science and Technology*.

heterogeneous when citizens are asked to express themselves on the role of scientists as communicators: although one citizen out of three evaluates the communication offered by the experts, almost one Italian out of two, however, believes that the diversity of opinions provided by experts in their public interventions has created confusion (48%); to this is added an additional 8% which recognizes the competence of the Italian scientific experts on the merits, but negatively assesses their communication skills. For another 11% of the population, in order to avoid communication confusion, it would be better for the experts to give their opinions confidentially only to the institutions⁵.

This type of confusion perceived by the public can be explained by considering two elements that condition the current public discussion on the Covid-19 theme.

Firstly, the scientific method and validation procedures of possible results require different times from those required by the policy to manage the uncertainty of crisis situations. This puts scientists in a difficult position on the public scene because, in the immediate term, they can offer little information and often they risk an overexposure because they are continually questioned even on issues on which they would not have much to say.

Even in the case of Covid-19 there has been this pressure on scientists with the risk of putting their authoritative discussion into strong discussion since on several occasions the public has obtained different and sometimes even conflicting information.

A second element of interest regards the role of public decision makers in times of emergency such as Covid-19. Faced with the widespread uncertainty of a pandemic, they are called upon to provide answers to try to shift this indefinite risk situation⁶. In fact, contrary to uncertainty, risk is something that can be determined and managed to provide public policy assessments and solutions. This is why politicians consult and involve scientists in order to acquire reliable data and develop appropriate assessments to manage the emergency. In the case of Covid-19 there has been at various times a real exchange of roles between the two where scientists have been asked with questions and exquisitely political questions and, in some cases, they have taken the role of decision makers.

The climate of uncertainty experienced by the Covid-19 pandemic has awakened some old communicative trends and relational dynamics that seemed outdated but are still present in the academic community and among politicians. Although these are always denied by the facts, they return by proposing rhetoric that may seem credible and acceptable. At the same time, however, it is noted that the growing mediatization of scientific communication and the commitment of scientists to involving the public have represented a new phenomenon that also produces undesirable effects on the public. In the next few years, these effects will have to be carefully considered in order to produce effective scientific communication in times of crisis, overcoming old prejudices and correctly interpreting, on the public scene, the roles that civil society expects from politicians and scientists.

5Bucchi M., Saracino B. (2020), Italian Citizens and Covid-19: One Month Later – April 2020, Public Understanding of Science Blog. Available from: <https://sagepus.blogspot.com/>

6Pellegrini G. (2020), Coronavirus and public communication: the role of experts and decision-makers in the view of the public, in AA. VV. Overabounding and Society. The sociology of love. Rome, SocialOne.