

2025 Balzan Prize Subject Areas

Literature, Moral Sciences, and the Arts

Science of Antiquity: Athenian Democracy Revisited

While far from a uniform phenomenon, Western-style democracy has long been regarded –especially since the fall of the Berlin Wall – as an undisputed model of a successful form of government that can best foster the development of each individual and community.

In the face of clear signs of crisis in the world's democracies, there is a growing desire to find historical precedents to better understand current social and cultural upheavals by placing them in broader contexts. The Athenian democracy of the fourth and fifth centuries B.C.E. still remains the main historical and terminological reference, ideally going back to the heyday of the Periclean age, which we in the present day see as an enormous economic recovery and an unparalleled flourishing of literature and art.

However, the more the phenomenon is analyzed scientifically, the more clearly the fault lines that already characterized ancient democracy emerge, thus also making Athens an illuminating case study in today's perspective. Most of the excesses that characterize the precarious democracies of our time – like populism and demagogy on the one hand, and the formation of oligarchies and shameless personal enrichment on the other – can already be seen in the shadow of the Parthenon.

With an eye toward today's world, examining the ancient model both for its origins and for its often highly problematic developments is a challenge that eminent scholars around the world have fruitfully taken up.

History of Contemporary Art

Although contemporary art today surrounds us in our daily lives and enriches our emotional and intellectual lives, it has taken a long time for the scholarly study of the works of contemporary artists to find its place in the university. The Balzan Prize seeks to honor those who pioneered this field of study that encompasses the fine arts from 1945 to the present.

In the second half of the 19th century, art history was established as an academic discipline devoted to Western art of the post-classical age, but it was with the emergence of modernism in the late 19th century that art criticism and theory increasingly contributed to the academic acceptance of the study of the works of living artists. However, after the backlash of World War II, historians and art historians in Europe and the United States had to wait until the 1970s to expand the traditional field of research within universities to include the contemporary era. With its growing contribution to aesthetic discourse, post-World War II art itself promoted the methodological reform of academic art history in the rich context of exhibitions and biennials, museums and galleries, and monographs and journals. Today, the contemporary constitutes the largest sector of art history teaching, involving a multiplicity of actors and institutions within the art system that as a whole contribute to deepening knowledge of the contemporary aesthetic situation.



2024 Balzan Prize Subject Areas

Physical, Mathematical, and Natural Sciences, and Medicine

Atoms and the Ultraprecise Measurement of Time

Measuring is a specific human activity. From a philosophical point of view, one could say that humans created it. In this sense, the more human beings improve their tools and techniques, the more they refine the precision of their measurements: of all the fundamental dimensions of nature, in fact, it is time that can be measured with the greatest precision and accuracy, thanks to the latest generation of atomic clocks that have achieved an incredibly low margin of error.

This is the result of the definition of time itself, which is based on the immutable properties of atoms, and the spectacular advances in atomic physics made possible by the development of lasers. Advances in precision spectroscopy and the increasingly accurate definition of time have since contributed to decisive breakthroughs in the fundamental mechanisms of nature.

One hundred years after the birth of quantum physics, the exceptional levels of quantum control achieved in atomic clocks, in part by cooling atomic gases, are now facilitating exciting new developments in quantum sensing and quantum computing as well.

Moreover, atomic clocks have paved the way for new technologies and applications in a range of disciplines other than physics, for example, in earth sciences, for earth and space navigation, and for the definitive long-distance synchronization of measurements and processes.

Gene or Gene Modified Cell Therapy

Over the past 20 years, basic research in gene therapy has had a significant clinical impact on the treatment of various diseases, particularly in the field of haematology, but at present it is also reasonable to expect positive results in the general field of precision medicine, also known as personalized or targeted therapy, which is aimed at identifying any disease as early as possible and providing the most appropriate means to treat it according to the patient's characteristics.

These advances are based, among other things, on major technological advances, which have come to fruition after decades of trials and failures ranging from viral and nonviral vectors for gene transfer, to gene editing technologies. Part of these techniques include ex vivo (i.e., outside the body) modified cells followed by transfer to the patient, as well as direct in vivo (inside the body) delivery using various vectors. Diseases that have so far been treated with these approaches include genetic deficiencies of haematopoietic cells such as thalassemia, sickle cell anemia, and haematological cancers in adults and children.

Innovative contributions to the development and clinical impact of somatic gene therapy and genetically modified cel therapy can be a mainstay in the prevention and treatment of a variety of current and future diseases.