

Editorial

Creativity Today

Current Work From European Psychology

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Creativity is a contemporary topic in psychology, but it has a long history. Humankind can trace the first evidence of its creative nature to evidence of stone-carved tools, notably for hunting, that Neanderthals and early *Homo sapiens* developed. Europe, since its origin, has been the crossroads for exchanges from different regions, including Africa and Asia, and different groups, such as Neanderthals and *Homo sapiens*. These paleolithic exchanges are illustrated, for example, thanks to archeological research at the Mandril cave site in the French Alps. This site, which has a strategic view over the Rhone river valley, seems to have been used regularly since 300,000 years ago by Neanderthals. However, small stone arrowheads that appeared to have been brought by *Homo sapiens* from the middle east (near today's Beirut region) were found at the Mandril site, dating from approximately 48,000 years ago (Slimak et al., 2022), then followed by evidence of Neanderthals. In Bulgaria, the Bacho Kiro Cave shows evidence of *Homo sapiens* bone fragments from a similar period, some 45,000 years ago (Hublin et al., 2020). There were many bone-carved items, including pendants made from bear teeth, which apparently were artifacts that both *Homo sapiens* and Neanderthals produced.

Needless to say, the creative fiber has been a continuing source of societal development that nourished over time our contemporary world, with the invention of tools and technical inventions, agricultural methods, shelter designs, clothing, customs and traditions, philosophical concepts, artistic goods, and performances, to name only a few major areas of creative endeavor. We describe this creative side of human nature through the term *Homo creativus* (Lubart et al., 2022). Creativity refers to the ability to produce novel, original work that is meaningful and valuable in its context (Runco & Jaeger, 2012). One of the well-known European-based cases of creativity was Johann Gutenberg's transformative invention of the printing press, thanks to a selective-combination insight (Koestler, 1964). Of course, creativity has not always been devoted to the greater good of society and sometimes has resulted in destructive

inventions that intentionally or unintentionally served for criminal or "other dark-side" activities (Cropley et al., 2010).

Today, creativity continues to find itself at the forefront of recent societal discussions to promote success and progress in the 21st century. Notably, creativity is considered one of the main 21st century skills to be promoted in education, together with critical thinking, collaboration, and communication (see <https://www.battelleforkids.org/networks/p21>). The Organization for Economic Cooperation and Development (OECD) has included creativity in its framework of skills and conducted research on the impact of training creativity in elementary school across more than 10 countries, finding positive effects on children's creative skills and self-efficacy (Vincent-Lancrin et al., 2019). The international PISA testing program included creativity as a special competency in 2022. The World Economic Forum has consistently listed creativity as one of the top 10 skills to develop for employability, placing creativity in the top 3 skills to foster for 2030 and beyond.

In 2009, the European Union organized the European year of creativity and innovation (<https://eur-lex.europa.eu/EN/legal-content/summary/european-year-of-creativity-and-innovation-2009.html>). In addition to special events that fostered awareness of the topic, the initiative resulted in a manifesto for creativity and innovation to shape EU strategy, with recommendations concerning teacher training, unemployed people's skill upgrading, and creative action to facilitate growth facing the economic crisis (<http://pr.euractiv.com/pr/manifesto-creativity-and-innovation-europe-89387>). More recently, numerous European cities have begun to participate actively in the yearly United Nations-sponsored World Creativity and Innovation Day (<https://www.un.org/en/observances/creativity-and-innovation-day>).

Historically European scholars have been interested in the topic of creativity. For example, in Glaveanu's (2019) *Creativity Reader*, there are excerpts of seminal texts from Alfred Binet (assessment of creativity and literary

creativity), Karl Duncker (mental fixedness and insight), Sigmund Freud (motivation of creative writers, psychodynamics of creativity), Sir Francis Galton (cognition including mental imagery, creativity, and genius), Graham Wallas (the stages of the creative process), Henri Poincaré (theorization of the creative process), and Max Wertheimer (productive thinking from a gestalt and systemic perspective).

Research on creativity from a psychological perspective during the past century has been largely dominated by contributions from the US, catalyzed in part by Guilford's (1950) presidential address to the American Psychological Association calling for more research on creativity. Several major creativity journals are US-based, such as the *Journal of Creative Behavior*, *Creativity Research Journal*, *Psychology of Aesthetics, Creativity and the Arts*. However, it is important to note that there are several European-based journals focusing on creativity: *Creativity and Innovation Management*, *Thinking Skills and Creativity*, and *Creativity: Theories – Research Applications*. There are, as well, several regularly-held scientific congresses on creativity, such as the European Association for Creativity and Innovation Conference (<https://eaci.mystrikingly.com/>) and the Marconi Institute for Creativity conference (<https://www.mic-conference.org/>) and more practice-oriented events like the CREA conference (<https://creaconference.com>).

The contributions in this special issue illustrate the diversity of research on creativity. This diversity is expressed in three ways.

First, the field of creativity research can be organized around seven main topics: Creators, Creating, Collaborations, Context, Creations, Consumption, and Curricula. These 7 topics, called the 7 Cs, were derived from an analysis of the scientific literature based on contributions to the first and longest-running scientific review on creativity, the *Journal of Creative Behavior* (Lubart, 2017). The term *Creators* refers to research on the diverse characteristics of creative people, such as their cognitive abilities and personality traits. The term *Creating* is used to describe work in the creative process, the events that unfold during the act of producing new ideas. *Collaboration* concerns the significant others, which may be teammates, co-creators, or those who participate closely in other ways in the creative action. *Context* is the term that codes the physical and social world that surrounds and interacts with creators engaged in the creative act. *Creations* are the productions that result from generative activity, the study of their nature and the way they are evaluated fall under this term. *Consumption* refers to the uptake of creative productions by the public, including the process of idea diffusion and the characteristics of early adopters of new ideas. Finally, *Curricula* is the term used to describe studies about the development of creativity, either in formal educational

contexts like school or informal contexts for both children and adults.

Second, the contributions illustrate how multiple sub-disciplines of psychology offer insights into creativity. The main disciplines represented in the current set of articles are cognitive psychology, social psychology, individual differences psychology, and educational psychology. However, the articles in this special issue also go beyond the specific field of psychology, notably in relation to technological issues and interdisciplinary studies. There is also a variety of research modalities, with contributions including theoretical models, reviews of empirical work, qualitative and quantitative research, correlational and experimental studies.

Third, the papers in this issue represent geographical diversity with contributions from researchers in Austria, Belgium, France, Greece, Italy, Poland, Switzerland, and the UK. Of course, there are many European researchers who work on creativity, and in reality, there is work being conducted in essentially all the different countries in Europe. A sample of this broader contemporary corpus of research on creativity is represented here.

This special issue seeks to showcase current work from European scholars and invite European psychologists to invest further in the topic of creativity in future work. The first two articles focus mainly on the characteristics of “Creators”, with a first contribution entitled “Intra-individual Variability in creativity: Nature, measurement, and prospects” by Barbot (2022), a second contribution entitled “Dynamic assessment of creativity for diagnostic purposes: Combining the sociocultural approach to creativity and creative cognition in practice” by Zbainos and Sagia (2022) focuses on measuring creative potential in a dynamic way. Then, several articles address the topic of “Creating”, making clear interconnections with several other “Cs”. These articles include “Ecological momentary assessment of creative ideation: Measuring creative potential in an everyday life context” by Rominger and colleagues (2022), “The Dynamic Creativity Framework: Theoretical and empirical investigations” by Corazza and colleagues (2022), and “Creativity and interdisciplinarity: Encounter of two fields of study and foundations for a happy marriage” by Darbellay (2022). Following these papers, there are three papers that focus more on the “Contexts” for creativity, with “Creativity in an affective context: Reappraisal inventiveness and malevolent creativity as extensions of creativity research towards more real-world creative behavior” by Perchtold-Stefan and colleagues (2022), “Connected creativity: The impact of web search on everyday creative thinking” by Martin and colleagues (2022), and “Immersive virtual environments’ impact on individual and collective creativity: A review of recent research” by Bourgeois-Bougrine and colleagues (2022). Two further contributions

complete the special issue, with “Social Representations Theory in creativity research: Under-exploited perspectives” by Bonetto and colleagues (2022), which is oriented toward “Creations”, and “School does not kill creativity” by Karwowski (2022) which provides a clear focus on “Curricula.”

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