Chapter 4

Neuroaesthetics: Perspectives and Reflections

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ABSTRACT

This paper presents some considerations regarding the aesthetic experience from a neuroaesthetic point of view. The approach proposed here can take the discussions beyond the field of art allowing the aesthetic experience to be considered as a key aspect of subjectivity and interactions in the world. A reflection on the roles of emotion and language as fundamental aspects of the aesthetic experience is presented. Based on this reflection, some assumptions that are at the core of culture are made and re-framed here considering the postmodern turn.

INTRODUCTION

The paper presents some considerations regarding the aesthetic experience from a darwinian scenario aiming at providing evidence that reviews important aspects of culture in postmodernity. In this scenario the aesthetic experience is seen as responsible for mediating and structuring forms of knowledge, assisting in organizing the essence of things, allocating attention and categorizing objects (Ramachandran, 2014; Brown & Dissanayake, 2009). The aesthetic experience is therefore considered an essential aspect of environmental and social relations, paving the way for the construction of memories and reality itself.

The text shows how some biological laws, incorporated during the evolutionary process and which are common to all living beings, build the aesthetic experience as well as being responsible for creating sensory categories and patterns that promote selective attention for decision-making and problem solving. Such laws cross cultural barriers and are experienced by living beings to a greater or lesser degree of sophistication. According to neuroscientific findings of recent decades, emotion would be the trigger for these laws to be activated in the brain.

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In the darwinian scenario neuroesthetics appears as an emerging field of knowledge that brings, based on scientific advances arising from the neurosciences, important contributions not only to deepen the understanding of the artistic phenomenon but also of cultural practices in various fields of human activity. The studies in neuroesthetics by Ishizu and Zeki (2011) are given prominence. The theoretical model of the authors inspires the correlation between language and the aesthetics experience, and both are discussed in parallel in this paper because they are deeply interconnected, since it is through language that the aesthetic experience is achieved.

In addition to Ishizu and Zeki’s neuroesthetics model, the one proposed by Brown and Dissanayake (2009) is also considered. These two authors assist in the comprehension of the role of emotion in the aesthetic experience and help to conceptualize it. As defined by Brown and Dissanayake, the aesthetic experience is understood as the emotional appreciation of an object (Brown & Dissanayake., 2009), be it of the physical world, a work of art or something abstract.

This scientific notion of aesthetics, underpinned by a theory of emotion, is not new and dates back to Darwin, who already foresaw the aesthetic experience as a class of emotions whose biological function is to generate the critical evaluation of the object’s properties, and to extract from it important information for survival. Usually, emotional appreciation of an object is discussed by neuroesthetics based on issues in which the artwork is seen as a class of stimulus intentionally designed to induce a variety of affective, emotional, perceptual and cognitive responses in the subject (Seeley, 2011).

The aesthetic experience is presented in its relations with language, thought, conscious experience, attention and subjectivity. Language is emphasized because of its important role in the development of social constructs and cultural practices. Therefore in addition to the evolutionary point of view, cultural and social issues related to taste variations and individual preferences are also considered to be equally important aspects and components of the aesthetic experience.

SCIENTES AND HUMANITIES: A NECESSARY CONVERGENCE, NOT AN INEVITABLE CONFRONTATION

Before initiating the considerations on the aesthetic experience, it is necessary to discuss the importance of the convergence between sciences and humanities to rethink culture.

Placing distinct fields of knowledge side by side may still be surprising to some. This occurs even after the emergence of multi-disciplinary fields of knowledge such as the theories that explore complexity. Nevertheless, ecology, for example, and the integrated vision that it provides, has gained importance.

The distinction between the fields of knowledge is, in Wilson’s view (1999), “artifact of erudition”. The natural sciences provide the epistemological foundations to address a whole variety of issues about the universe around us. One consequence of this approach is the need to consider knowledge as a unique and complex body. The perception that the universe is a fragmented body made up of a compound of autonomous disciplines is illusory (Fogliano, 2002).

“Trust in consilience is the foundation of the natural sciences. For the material world at least, the momentum is overwhelmingly toward conceptual unity. Disciplinary boundaries within the natural sciences are disappearing, to be replaced by shifting hybrid domains in which consilience is implicit. These domains reach across many levels of complexity, from chemical physics and physical chemistry to