Person and action perception as a visual reward

Author:
Mel W. Khaw
Postdoctoral Research Fellow, Department of Economics
Art, Humanities, & Neuroscience Fellow, The Italian Academy for Advanced Studies
Columbia University

Abstract

Recent neuroscience research has revealed dedicated brain regions for face, body, and action perception. These neural observations accompany behavioral findings that individuals are remarkably quick in recognizing human stimuli and making social judgments. Here I propose to study person perception as a prioritized visual process that guides automatic attention allocation; as a result, the fast detection of socially-relevant stimuli is predicted to coincide with visual preferences. Socio-biological cues (e.g., faces, bodies, gestures) are hypothesized to be intrinsically rewarding through the reduction of visual uncertainty and the providence of social information. Two levels of behavioral investigation are proposed: (1) measuring statistical differences in visual preferences across human and non-human imagery and (2) examining the roles of face and biological motion perception in influencing visual preferences. The first aim is to describe fundamental differences in how preferences increase in magnitude as well as variability for different visual stimuli; such differences will provide insight into the visual reward value of images featuring different types of content. Secondly, face and body motion percepts are known to be processed implicitly and accurately even under an impoverished level of visual detail. Consistent with theories of mirrored empathy and processing fluency, sensitivity to these visual features are hypothesized to mediate visual preferences at short timescales. These experiments will thus examine early and automatic influences of person perception on visual and aesthetic judgments.