

## Is Zoom Dysmorphia a new disorder?



*Olimpia Pino*

Department of Medicine and Surgery, University of Parma, Parma (Italy)

The coronavirus (Covid-19) pandemic has created a situation of severe uncertainty and isolation, disruptions in finance, politics, social life, and healthcare with detrimental effects on the population's wellbeing. Most studies reported negative psychological effects including post-traumatic stress symptoms, confusion, and anger (1). The increased popularity of videoconferencing during the pandemic had many advantages for maintaining social connection, and workplace functioning but has seen a massive shift toward virtual living where individuals found themselves staring at their own video reflection, often for many hours a day, scrutinizing their appearance and developing a negative self-perception. Online platforms have affected the way people view themselves (2). Social context and interpersonal relationships can largely be affected by facial attractiveness. It plays a central role in forming impressions and can influence the general consideration of someone or, maybe, the choice of a mate. In these cases, from a neuroscientific perspective, the reward neural system results to be activated (3), including at least five specific brain regions tied to the stimuli perception. Impressions of faces can vary over time and can be influenced by repetitive exposure to the same face traits: in fact, facial attractiveness can be conceptualized as an evolutionary construct that can entail the influence of cultural aspects in the judgement of what is beauty and what is unpleasantness (4).

The letter to the Editor by Kamleshun Ramphul (5) in the current issue of Acta Biomed (page e2021348) raised the issue about the “dysmorphic

concern”, a preoccupation with a perceived imperfection in physical appearance that usually occurs in body image disorders, such as eating disorders and body dysmorphic disorder (BDD), where individuals may overestimate their body weight or size, or the extent of a flaw in their appearance. Research (6) have evidenced that individuals with high dysmorphic concern exhibited more appearance-focused behaviors (e.g., mirror-checking, appearance comparisons) and greater distress over beauty service closing, especially individuals who were living alone and younger. A second study (7) assessed the video-usage behaviors in the general population during Covid-19 pandemic in their relationship with appearance dissatisfaction and interest in beauty. Multiple aspects of video usage were noted, including engagement in video-manipulation techniques (e.g.: placing their camera or themselves to show off their best angles on video) to enhance appearance and the focus of visual attention during video-calls, but video-based appearance concerns did not predict greater interest in invasive cosmetic surgeries. This finding is consistent with the literature on facial processing in BDD, where looking at an image of their own face and another face, individuals with BDD disproportionately concentrated on themselves and their perceived unpleasant features. The selective attention towards disliked aspects of appearance seems to contribute to the development of a distorted body image. These modulations of self-perception can influence the general sense of self-worth, provoking emotional reactions (8).

The letter alludes to a larger, more provocative look at the conceivable similarity between obsession problems and addictions. Before cataloguing Zoom Dysmorphia as an addiction, we might explore the idea that obsessions about body image might reflect a heterogeneous pathophysiology. Some individuals with dysmorphic concern might be more like those with addictions, while others might be more like those with obsessive compulsive disorder or body dysmorphic disorder.

The notion of zoom dysmorphia as an addiction, although heuristically appealing, rests speculative and needs supplementary studies to explore its validity and pertinence. More wide-ranging information, such as that which could be gathered from neurobiological studies, has important potential in evolving prevention and treatment strategies for disorders characterized by body image concerns or obsessions. Studies with event-related potentials (ERPs) pointed out the dynamic movement of brain activity in these situations. Results have shown that high and middle attractive faces were considered as more pleasant after repeated exposure, while low attractive ones were not. Predicting future evaluation of a certain face is positively correlated to the level of attractiveness of each face and repeated exposure has been demonstrated to be connected to the supramarginal gyrus - the main component of the ventral attention network - and to the superior temporal gyrus. Stable selective and durable attention are crucial for judging high attractive faces, maybe for the way in which observers focus themselves on details and specific aspects of each face.

The letter also asks whether understanding the heterogeneity within disorders may be a useful tactic to develop more targeted treatment approaches. The current shift to online and remote psychological treatments during the Covid-19 pandemic may also offer an opportunity to engage clients with dysmorphic concern in treatment. What else can be done? A perspective can improve the attempt to help people in building a "true sense" of self-esteem and self-looking. This can be accomplished by working, since early childhood, on the improvement of personal characteristics; facets in cognitive therapy involve challenging in certain contingencies of daily life that include self-worth (9). Another possibility is to suggest subjects to not focus only on themselves, but to try to connect

their self-perception to what is around them. Viewing the world from an altruistic way could help them to develop safe and authentic relationships, but also to take care of their personality traits, social-self and psychological vulnerabilities.

Moreover, self-help tasks can be completed independently or guided by a facilitator who helps program's participants to implement and adapt the curriculum to their lives. Intervention on self-worth would modulate the self-esteem level and modify responses to a specific acceptance or rejection event. Health-based applications (apps) may be useful both as a tool within a formal intervention plan as well as a stand-alone tool for self-monitoring. Psychoeducation about topics such as the body ideal, advertising strategies usually employed to sell products, and photo editing tactics that maintain unrealistic ideals may reduce the risk associated with media consumption. Finally, positive psychology may provide additional insights for buffering the effects of stress promoting coping and (re-) appraisal strategies and an increased life's meaning.

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Correspondence:  
Olimpia Pino, PhD  
Neuroscience Unit,  
Department of Medicine and Surgery,  
Via Volturno, 39  
43125 Parma (Italy)  
Phone: 0521904831  
E-mail: [olimpia.pino@unipr.it](mailto:olimpia.pino@unipr.it)