Writing Project 1: Misconceptions Regarding Nonverbal Communication and its Role in Deception Detection

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Introduction

Mehrabian & Wiener (1967) estimated that approximately 90 percent of communication can be classified as nonverbal in nature. "Nonverbal communication" is defined as any part of a message that conveys information other than the verbal components of the message itself. This can encompass a wide variety of factors such as vocal inflection, personal appearance, and even environmental details. However, the exact definition of "nonverbal communication" is often simplified to refer to body language, or the physiological behaviors one demonstrates—either consciously or subconsciously—that affects the meaning of a message. It follows, then, that the ability to interpret body language cues is a vital skill for effective communication.

This reliance on "reading" nonverbal cues is particularly apparent when it comes to detecting deception, which often proves to be a difficult task. Deception is highly associated with feelings of guilt and stress (Vrij, 2008), which are known to trigger physiological cues such as rapid eye muscle activity and increased head movements (Giannakakis et al., 2017).

Contemporary media depictions of deception frequently emphasize nonverbal signals associated with nervousness and evasiveness, specifically those concentrated around the facial muscles (Psych2GoTV, 2018; WIRED, 2019). As a result, popular media has cultivated a widespread overreliance on body language cues in deception detection. This misconception has been widely accepted and proliferated by self-proclaimed "experts" in body language and lie detection (Bogaard et al., 2016; WIRED, 2019).

Current research on communication poses a different consensus. As of today, there is a lack of conclusive evidence regarding any meaningful association between body language cues and deception. Because such a wide range of variety exists in nonverbal communication patterns between individuals, being able to "read" someone effectively via physiological cues requires a

thorough understanding of their nonverbal communication habits. Although it is certainly possible (albeit difficult) to detect deception by reading nonverbal cues on a case-by-case basis, research suggests that there is no singular universal cue that can reveal whether or not someone is lying (Vrij, 2008). This conclusion significantly deviates from what has already been established about the link between nonverbal cues and deception in popular media. The present analysis aims to summarize and address the discrepancy between public consensus and scientific consensus regarding nonverbal deception communication, as well as to provide potential explanations for these widely accepted misconceptions.

I. Nonverbal Expressions of Aversion and Evasiveness

Strong emphasis is often misplaced on the role of nonverbal communication in detecting deception. This misconception is likely due to the widely held belief that body language is controlled subconsciously and therefore difficult to manipulate, which serves as the core principle behind many common myths regarding how liars tend to behave (Vrij, 2008). One relevant example of this is expressed in Psych2GoTV's video "10 Signs Someone is Lying" (2019). The video discusses how body language is supposedly affected when someone is lying, such as through decreased eye contact: "[...] multiple studies have linked lying with the inability to look someone in the eye. Although this has been explored by research, it only takes a little bit of common sense to see why this is true." (3:06) Meta-analyses on existing research have refuted this claim specifically, concluding that eye contact has been only weakly associated with deception. However, it still stands that the ability to maintain eye contact (or lack thereof) significantly influences whether or not someone is perceived as a liar (Hartwig & Bond, 2011).

Popular media is especially responsible for perpetuating the misunderstanding that liars cannot control their own body language, especially regarding adaptive gestures associated with

guilt and anxiety. In reality, nonverbal communication is highly context-sensitive and should be analyzed on a case-by-case basis. Body language cues that are commonly associated with deception could be attributed to factors such as situational stress and anxiety (Giannakakis et al., 2017). These sources often fail to provide sufficient peer-reviewed evidence to support their claims, instead citing "experts" in seemingly related fields (e.g., law and psychology) to create the illusion of source credibility (Morris, 2018; WIRED, 2019). In some cases, no sources are cited at all, leaving the audience to take the author at their word (Psych2GoTV, 2019). This false credibility is often reinforced by a self-proclaimed lack of expertise on the topic presented in a tone that conveys authority and absolute credibility (Psych2Go, 2019).

II. Microexpressions

Another misconception is that liars tend to give themselves away with involuntary "leakages" of the face muscles. A 2018 article in Forbes Magazine claims that even the most experienced liars experience brief "leakages", or "microexpressions", during which they briefly lose control of their simulated facial expression. According to the article, this creates an unusual, asymmetrical facial expression that can last for as briefly as a fraction of a second: "[...] two groups of facial muscles duke it out on the face, producing noticeable asymmetry" (Morris, 2018). The article concludes that reading microexpressions is an expert-level skill that can be easily learned "[...] with a little bit of training and watching someone's face in a video while riding the pause button" (Morris, 2018).

Although the existence of microexpressions has been widely validated by contemporary research, studies often fail to find a significant correlation between microexpressions and deception (Jordan et al., 2019; Porter et al., 2011). A literature review by Burgoon (2018) discusses in detail why microexpressions are unreliable cues for spotting a liar: certain

"microexpressions" (e.g. an eyebrow raise, brief shows of contempt, etc.) are context-sensitive, highly voluntary social signals that can be controlled and expressed to convey subtle messages, even when deception is not taking place.

The implication that these cues are practically invisible to all but trained experts (Morris, 2018; Psych2GoTV, 2019) further implies that training someone to spot microexpressions can, in fact, increase their accuracy when detecting lies. A study by Jordan et al. (2019) put this theory into practice as follows: participants were trained to spot microexpressions using a microexpression training tool, or METT, before analyzing short recordings of people making either truthful or deceptive statements. Participants who received METT training did not exhibit any significant improvement in accuracy compared to the control group, with accuracy ratings slightly below chance. Another study by Porter et al. (2011) found that microexpressions may be associated with displays of intense emotion rather than deception; however, microexpressions were found to occur slightly more frequently in attempts to simulate facial expressions of high emotional intensity.

The concept of microexpressions as an accurate "tell" for spotting liars has gained a surge of popularity in recent years. To the average person, learning how to read microexpressions may seem like an effective and accurate way to detect a liar without knowing them or their body language patterns very well. The idea that there exists a foolproof way to spot the true intentions of a liar may inspire false confidence in those who believe they are able to do so; in a world where any form of interpersonal communication is likely to involve some measure of deception, it may be tempting for members of the general public to believe that they are good at "reading people" in order to protect themselves from liars.

III. Potential Explanations for Public Misconceptions

There are a number of possible reasons why myths about nonverbal communication and deception continue to proliferate in popular culture. One such explanation is that there is no foolproof method of detecting deception. Catching a liar is notoriously difficult in both research and real-life contexts. A meta-analysis by Hartwig & Bond (2011) found that average deception detection rates among participants in lie detection studies were slightly less accurate than chance (approx. 47%). Psychological constructs such as truth bias (i.e., the tendency to believe that people are generally truthful) may also hinder our ability to detect lies (Burgoon, 2015; Vrij, 2008). Another possible explanation is that people are more likely to adopt these beliefs when they already believe they are being lied to. The inclination towards information that reaffirms pre-existing beliefs is known as confirmation bias (Vrij et. al., 2008). If someone has reason to believe that they are being deceived, they may be more likely to seek out information that helps to confirm their suspicions and ignore that which might prove them wrong. Deception is often wrongly correlated with vague and easily misattributed cues such as the placement of one's hands, a tendency to maintain or avoid eye contact, and the direction in which they position their feet (Morris, 2018; WIRED, 2019). These claims may not serve to provide accurate information, but to draw the attention of readers who wish to prove that someone is lying to them. People who seek out this information with the intent of internalizing it are more likely to accuse others of lying on the basis of otherwise-innocuous behaviors, thereby confirming to themselves that their view of the situation is correct.

Conclusion

Behavioral cues of all kinds, specifically those associated with deception, play a significant role in determining how people choose what to believe and who to trust. A survey conducted by Bogaart et al. (2016) showed that a significant portion of participants—a sample consisting of both lay-people and trained police officers—strongly believed that commonly misattributed nonverbal behaviors (e.g., gaze aversion) are accurate indicators of deception. This may provide a potential explanation as to why the tendency to overestimate one's own ability to accurately detect lies can inhibit their ability to do so effectively (Vrij, 2008). If people believe themselves to be good at detecting lies on the basis of widely held misconceptions, they are more likely to be influenced by perceived attempts at deception from people who may be telling them the truth. The ensuing mistrust and lack of communication could be disastrous for those who rely on their ability to "read" others, rather than thinking critically for themselves.

Further research should focus on the practical application of the relationship between verbal cues (word choice, inconsistencies, etc.) and deception. Being able to think critically about how one communicates with others is crucial to being an effective and healthy communicator. The belief that lies can be detected by paying attention solely to nonverbal cues can lead to severe miscommunications with long-lasting effects.

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