DEVELOPMENT AND VALIDATION OF THE HUMAN-EQUINE ATTACHMENT SCALE

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Abstract:

Research on human-animal interactions has established that numerous benefits can result from human relationships with diverse companion animal species in the domains of physical, social and psychological outcomes. Therefore, numerous animal-attachment scales have been developed to measure the extent of individual human's attachment to their companion animals. Validated attachment scales exist for humans with dogs and cats. However, to date there has been limited research into the attachment that forms between an owner or keeper and their horse, and few attempts to create an instrument that is capable of capturing its different domains. This study describes the development of the Human-Equine Attachment Scale (HEAS) and investigates its reliability and validity in the context of owner attachment to horses used for casual and competitive riding. The reliability and validity of the HEAS was assessed in a sample of horse owners residing in the United Kingdom (n=3611). A 25-item questionnaire, implementing 4-point Likert responses to items, was designed to measure features of owner attachment to their horses. The items were designed to capture aspects of human-animal bonding that have been established in extant human, and human-companion animal attachment scales (AAS, CFCAS, CPAS, LAPS, MDORS, PAL, PAQ.) Items were chosen from five attachment subdomains and were adapted for an equine context. Additional items specific to horse ownership were also constructed for inclusion. Principle Component Analysis and Cronbach Alpha analyses determined the fit of the HEAS scale. Following Principal Component Analysis, three items were removed due to unacceptable collinearity scores. This resulted in a six-factor solution (which explained 60% of the variance); and Cronbach's Alpha for the scale was acceptable (α = 0.77). The subscales indicated 1) companionship, 2) personal wellbeing, 3) dependence, 4) , status 5) growth and 6) sacrifice were key factors within the scale. The study establishes HEAS as a coherent and psychometrically robust measure of human-equine attachment, with potential for utilisation in social science and health related research, and to support research to improve successful pairings between horses and humans.

Lay Person's Message: Human-animal attachment has been shown to have numerous positive physical, social and psychological benefits for owners. The quality of the human-horse relationship is often cited as the reason for positive horse-human partnerships and underpinning equine relinquishment, where these relationships break down. Despite the importance of horse-human

relationships, limited research has explored these. This study developed and validated a scale that is capable of capturing the attachment that owners form for their horses, which can be used to facilitate further research on the benefits of this attachment and improve successful pairings between horses and humans in the future.