The Application of Response Surface Analysis in Similarity Research: A Study on Personality and Personal Values among Dating Couples

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Past research on the effect of couple similarity was often based on difference score or profile similarity, which have been criticized for their limitations in identifying the similarity patterns that are of interest to the researchers. As a new tool, response surface analysis (RSA) has been found superior to those traditional approaches in examining couple similarity. As an application of RSA method, this study examined the roles of similarity in personality and values in relationship satisfaction among 189 young dating couples in Hong Kong. Results from RSA showed that Conscientiousness, Agreeableness, and Neuroticism had significant main effects on relationship satisfaction for both sexes. A significant similarity effect of Conscientiousness was found on females' relationship satisfaction. Although the similarity effects in personal values were not significant, the actor effect of the value dimension of Self-transcendence versus Self-enhancement on females' relationship satisfaction was significant. Collectively, this study provides new evidence regarding the relative importance of couple similarity across different personality traits and values at an early stage of romantic relationship.