

## Abstract

The present study examines how group member familiarity influences group processes and creativity in computer-mediated-communication (CMC). 120 participants from CUHK were recruited randomly and assigned into 40 same-sex three-person groups. Half of the groups consisted of 2 friends and 1 stranger (Mixed-group condition), another half consisted of 3 strangers (Stranger-group condition). Each group used online chatroom to discuss how to promote a weight-gain milk powder. Discussion content was coded to measure creativity and prevalence of critical evaluation. Background diversity and metaknowledge in each group were measured by pre-discussion questionnaire; group cohesiveness, performance anxiety, social support and need for social approval were measured by post-discussion questionnaires. Results indicated that Stranger-groups were generally more creative than Mixed-group. At the individual-level, strangers in Stranger-groups were more creative than those in Mixed-groups. Neither background diversity nor metaknowledge was associated with creativity, while group cohesiveness and critical evaluations were both positively related to creativity. Besides, effect of group composition on creativity was moderated by member's need for social approval and anxiety level. Implications of present findings on team personnel management to enhance creativity were discussed.