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**Objective:** Emotion regulation is generally thought of as the process of overriding one's initial emotional response to personally relevant events. One frequently investigated type of emotion regulation is cognitive reappraisal, which describes one's ability to cognitively alter the meaning of an event. Cognitive reappraisal is associated with better cognitive, social, and health outcomes compared to other emotion regulation strategies. The cognitive building blocks of cognitive reappraisal are related to executive cognitive control processes, which broadly describe one's ability to engage in non-automatic and goal-oriented behaviors. Crucially, executive control processes are also relevant in demanding cognitive tasks such as prospective memory since, similarly to cognitive reappraisal, they involve effortful and purpose driven efforts. However, cognitive reappraisal has thus far not been investigated regarding prospective memory performance despite findings that suggest that emotionally evocative stimuli improve prospective memory performance. The present study investigated whether cognitive reappraisal state and trait measures as well as other types of emotion regulation strategies are associated with prospective memory accuracy of negatively valenced prospective memory targets.

**Participants and Methods:** A total of 45 participants (69% women;  $M = 22.62$  years,  $SD = 5.69$  years) took part in this cross-sectional study. Cognitive reappraisal and prospective memory tasks were administered on the computer. A total of 106 pictures were shown in the prospective memory task, including 12 prospective memory hits. A 2-back paradigm was used as the effortful ongoing task. Dependent measures included accuracy of and reaction times to negative prospective memory hits. A total of 45 pictures were shown in the cognitive reappraisal task. Participants were asked to decrease their negative emotions when looking at previously normed negatively valenced pictures versus merely looking at them (Lang et al., 2001). Dependent measures in the cognitive reappraisal task included success of downregulating negative emotion after the DECREASE versus LOOK instruction. A mood manipulation check and a questionnaire asking about participants' reappraisal strategies was conducted. Trait based measures of emotion regulation included the Emotion Regulation

Questionnaire and the Dysfunction of Emotion Regulation Scale.

**Results:** Participants endorsed significantly higher negative mood after looking at negative versus neutral pictures,  $t(48) = 22.77$ ,  $p < .05$ . Ratings further indicated that participants were able to significantly decrease how negative they felt when reappraising versus looking at negative pictures,  $t(44) = 12.82$ ,  $p < .05$ . Regarding the relationship between prospective memory accuracy of negatively valenced prospective memory targets and cognitive reappraisal ability, no significant bivariate correlation was found ( $p > .05$ ). However, a significant bivariate correlation was found between reaction times to negatively valenced prospective memory targets and cognitive reappraisal ability ( $r_s = -.32$ ,  $p = .03$ ). No significant relationship was observed between prospective memory accuracy of or reaction times to negatively valenced prospective memory targets and trait based measures of emotion regulation (all  $ps > .05$ ).

**Conclusions:** Hypotheses were partly supported. Higher state-based cognitive reappraisal abilities may be associated with lower cognitive costs when asked to remember negatively evocative pictures and/or higher overall cognitive capacity. The importance of assessing emotion regulation when utilizing emotionally evocative stimuli and their clinical significance is discussed.

**Categories:** Emotion Regulation

**Keyword 1:** memory: prospective

**Keyword 2:** computerized neuropsychological testing

**Keyword 3:** emotional processes

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### 30 Changing the Meaning of Emotional Encounters: Cognitive Reappraisal Success is Unrelated to Cognitive Reappraisal Tactic

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**Objective:** Cognitive reappraisal is a frequently researched emotion regulation strategy. It broadly describes one's ability to alter or

reinterpret the meaning of personally relevant events. Cognitive reappraisal is robustly associated with lower self-reported negative affect, lower physiological arousal, and higher positive affect, which is the reason why it is a key component of many psychotherapeutic interventions. However, little research to date has investigated different types of cognitive reappraisal tactics and their association with cognitive reappraisal success. Given that there are an arguably indefinite number of ways to reappraise personally relevant events, it would be clinically informative to identify those tactics that are associated with the greatest decline in negative emotionality. The current study investigated whether one's predominant use of a specific reappraisal strategy is associated with divergent cognitive reappraisal success.

**Participants and Methods:** A total of 42 participants (67% women;  $M = 23.33$  years,  $SD = 6.05$  years) took part in this cross-sectional study. Cognitive reappraisal was administered via a computerized task modeled after McRae et al. (2012). A total of 45 previously normed pictures were shown in the cognitive reappraisal task (Lang et al., 2001). Participants were asked to either decrease how they felt or look at negatively evocative images. The dependent measure was success of downregulating negative emotion after the "decrease" versus "look" instruction (i.e., cognitive reappraisal success). A mood manipulation check, a questionnaire asking about participants' reappraisal strategies, and frequency of each reappraisal tactic was conducted after the task was completed to ensure that participants implemented the task as intended. Reappraisal tactics were rated by 3 independent raters individually according to a previously established rating tactic coding system (McRae et al., 2012). An analysis of variance was conducted comparing reappraisal success across groups of the reappraisal tactic most frequently used for each participant. Additionally, total number of reappraisal strategies used was included as a covariate.

**Results:** Participants endorsed significantly higher negative mood after looking at negative versus neutral pictures,  $t(41) = 22.70$ ,  $p < .05$ . Ratings further indicated that participants were able to significantly decrease how negative they felt when reappraising versus looking at negative pictures,  $t(41) = 11.95$ ,  $p < .05$ . On average, participants' most frequently used reappraisal tactic was used 50.54% ( $SD = 16.32$ ) of the time. Descriptive statistics on

frequency of reappraisal tactics across participants is shown. Regarding the analysis of variance of divergent reappraisal success based on tactic, no significant relationship was found ( $p > .05$ ). The inclusion of number of reappraisal strategies per participant did not impact the results ( $p > .05$ ).

**Conclusions:** The present study did not show a significant difference between reappraisal tactics regarding their cognitive reappraisal success. This replicates past findings and indicates that type of reappraisal tactic used may be not as impactful as using cognitive reappraisal in some fashion. However, reappraisal tactics were not distributed equally across participants. Future studies should include larger samples to attain adequate sample sizes for each reappraisal tactic. Furthermore, participants should be instructed to use a specific reappraisal tactic alongside their self-selected reappraisal preferences to gain insight into the relative success of different reappraisal tactics. Clinical relevance of present findings is discussed.

**Categories:** Emotion Regulation

**Keyword 1:** emotional processes

**Keyword 2:** computerized neuropsychological testing

**Keyword 3:** cognitive processing

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### 31 Sex Differences in Emotion Regulation and Emotional Awareness in Middle Aged and Older Adults

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**Objective:** We measured sex differences in emotion regulation (ER) abilities – relying on exercise of cognitive reappraisal – during an image rating task in adults over 55 years of age with varying degrees of depression symptom severity. We also collected a self-report measure on participants' views of their own ER