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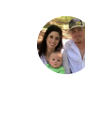
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Selective Exposure and Critical Thinking: The Dark Side of Critical Openness

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Background

Selective exposure is when individuals show a preference for information consistent with their current attitudes, beliefs, and behavioral patterns (Hart et al., 2009). The preference for congenial information has captured the attention of researchers because of evidence suggesting selective exposure to information interferes with optimal decision-making (Kray & Galinsky, 2003).

Explorations in the educational domain have suggested that individuals high in dispositional dimensions of critical thinking often demonstrate an increased willingness to engage with evidence that conflicts with their existing belief structure (Sosu, 2013). Therefore, increased critical thinking should decrease the preference for pro-attitudinal information.

However, very few studies have directly tested the association between critical thinking and selective exposure to information. Therefore, the current study was designed to determine if critical thinking dispositions reduce biased information search preferences.

Method

Individuals (N = 453, 70% Female, 83% Caucasian) recruited from popular social media sites completed the following:

Attitude Position:

- 7-point semantic differential scales assessing students' opinions toward allowing "abortion on demand"

Selective Exposure Paradigm:

- Four vignettes describing articles supporting and opposing "abortion on demand." Participants indicated if they would like to read each article in more detail (yes/no; adapted from Thomas et al., 2018).

Critical Thinking Measure:

- 11 items assessing the extent to which individuals are open to new ideas, critically evaluate new ideas, and their overall willingness to modifying beliefs (i.e., critical openness) and their tendency to question the validity of evidence (i.e., reflective skepticism; Sosu, 2013).

Defensive Confidence Scale:

- 12 items designed to assess how confident individuals are in their ability to defend their feelings and opinions (Albarracín & Mitchell, 2004).

Results

One Sample T Test

We created an index of selective exposure by computing the difference between the number of attitude consistent and attitude inconsistent articles participants identified as wanting to read more in-depth. The difference scores are interpreted such that positive values indicate an overall preference for attitude consistent information, zero indicates an equal selection of attitude consistent and inconsistent information, and negative values indicate a preference for attitude inconsistent information. A one-sample t-test was conducted to determine if participants demonstrated a statistically significant preference for congenial information (i.e., selective exposure scores significantly differed from zero). As expected, participants exhibited a small preference for attitude consistent information, $t(436) = 4.01$. $p < 0.05$. $d = 0.19$.

Multiple Regression Analysis

A multiple regression analysis was conducted predicting selective exposure scores from attitude strength, attitude extremity, defensive confidence, reflective skepticism, and critical openness. Our decision to include attitude strength, attitude extremity, and defensive confidence in the regression model was guided by past investigation noting these constructs are important moderators of selective exposure (Albarracín & Mitchell, 2004; Brannon et al., 2007). Results indicated the independent variables accounted for a significant amount of variance in selective exposure scores, $F(5, 424) = 2.63$, $p < .05$, $R^2 = .03$. Examination of standardized regression coefficients indicated reflective skepticism and critical openness were significant predictors of selective exposure. Interestingly, attitude strength, attitude extremity, and defensive confidence were not significant predictors of selective exposure.

Results of Multiple Regression Analysis Predicting Selective Exposure Scores from Attitude Strength, Attitude Extremity, Defensive Confidence, Critical Openness, and Reflective Skepticism

Variable	b	SE	β
Attitude Strength	.03	.07	.03
Attitude Extremity	-.11	.07	-.08
Defensive Confidence	-.11	.08	-.07
Critical Openness	.31*	.12	.16*
Reflective Skepticism	-.20*	.09	-.16*

Note: * $p < .05$

Conclusion

Results of the current study call into question past research suggesting that attitude strength, attitude extremity, and defensive confidence are important moderators of selective exposure (Albarracín & Mitchell, 2004; Brannon et al., 2007).

Most notably, our results indicated that an increased willingness to engage with information from diverse viewpoints and the ability to evaluate presented information critically increases selective exposure. Recent work has suggested that critical thinkers who are better able to analyze the content of uncongenial arguments are more susceptible to information processing bias (Kahan, 2012).

We believe individuals high in certain components of critical thinking may be better able to identify discrepancies between existing beliefs and anomalous information, thereby triggering the experience of cognitive dissonance. This should then motivate the individual to seek out congenial information to bolster confidence in their existing viewpoints and reduce dissonance.(Festinger, 1964).

References

- Albarracín, D., & Mitchell, A. L. (2004). The role of defensive confidence in preference for proattitudinal information: How believing that one is strong can sometimes be a defensive weakness. *Personality and Social Psychology Bulletin*, 30(12), 1565-1584.
- Brannon, L. A., Tagler, M. J., & Eagly, A. H. (2007). The moderating role of attitude strength in selective exposure to information. *Journal of Experimental Social Psychology*, 43(4), 611-617.
- Festinger, L. (1964). *Conflict, decision, and dissonance*. Stanford, CA: Stanford University Press
- Hart, W., Albarracín, D., Eagly, A. H., Brechan, I., Lindberg, M. J., & Merrill, L. (2009). Feeling validated versus being correct: A meta-analysis of selective exposure to information. *Psychological Bulletin*, 135, 555-588.
- Kahan, D. M. (2012). Ideology, motivated reasoning, and cognitive reflection: An experimental study. *Judgement and Decision Making*, 8, 407-424
- Kray, L. J., & Galinsky, A. D. (2003). The debiasing effect of counterfactual mind-sets: Increasing the search for disconfirmatory information in group decisions. *Organizational Behavior and Human Decision Processes*, 91(1), 69-81
- Sosu, E. M. (2013). The development and psychometric validation of a Critical Thinking Disposition Scale. *Thinking skills and creativity*, 9, 107-119.
- Thomas, C. L., Bourdeau, A. M., & Tagler, M. J. (2019). Interhemispheric communication and the preference for attitude consistent information. *Laterality: Asymmetries of Body, Brain and Cognition*, 24(3), 342-354.

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