A secondary task leads to poorer selection of attentional control strategies

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**BACKGROUND**

- Optimal search strategy depends on the particular features of current environment.
- Most people are not optimal.
  - Variation in drive to maximize performance
  - Variation in use of monitoring mechanism

**GOAL**

- Demonstrate the role of monitoring in strategy choice

**METHODS**


Condition 1: Baseline (no line task)
Condition 2: Line task before display
Condition 3: Line task during display

**PROCEDURE**

- Search Reaction Time by Condition
- Optimality by Condition

**RESULTS**

- Experiment 1: Will disrupting the monitoring period lead to suboptimal strategies?
  - Main effect of condition: \( p < 0.003 \)
  - Tying up attentional resources for more time may lead to lower optimality

- Experiment 2: Do strategies change when disruptions occur unpredictably?
  - Main effect of condition: \( p < 0.001 \)
  - Attentional control strategies were not driven by predictability or more exposure to one condition

**DISCUSSION**

- Disrupting the monitoring period leads to less optimal choices
  - At least some amount of monitoring must be necessary to appraise environmental features and choose a strategy
  - The longer that attentional resources are tied up during the monitoring period, the less optimal people are

**REFERENCES**

- Leber, E., Clark, K., & Irons, J.L. (2016). Does driving off-road after a previous experience predict current off-road behavior? Accident Analysis & Prevention, 90, 104-111.
- Tying up attentional resources for more time may lead to lower optimality.