

# **Measuring strategy adaptivity**

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## **Abstract**

Adapting ones strategy involves two steps: assessing and then modifying a strategy in a problem-solving environment based on performance. Schunn and Reder demonstrated a positive correlation between working memory and strategy adaptivity measured with the Air Traffic Control Task, though Schunn, Lovett, and Reder found no relationship between working memory and adaptivity measured with the Building Sticks Task (BST). We explored this discrepancy by administering a battery of individual differences measures, including BST adaptivity, fluid intelligence, working memory span, and a new measure of set effects based on the BST, administered to 109 Mississippi State undergraduate participants. Fluid Intelligence and BST adaptivity were positively correlated, though the relationship was weak. Our measure of set-effect adaptivity exhibited internal consistency and obvious individual differences, but was uncorrelated with other tasks. Thus strategy adaptivity may not rely heavily upon working memory and may draw upon distinct cognitive resources, depending on the underlying task.