Task Load

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Synonyms

[Task allocation](#); [Task demand](#); [Workload](#)

Definition

Task load is a measurement of human performance that broadly refers to the levels of difficulty an individual encounters when executing a task.

Current Knowledge

Cognitive task load, task demands, task allocation, and workload are similar terms frequently used in the disciplines of human factors or organizational psychology to model human behavior. According to Neerincx (2003), cognitive task load can be operationally defined as a function of three factors: time taken to perform a task, level of information processing, and number of task

switches that occur in the context of task performance. Time denotes the amount of time that is allocated for task completion. Level of information processing comprises automatic processes (skills), routine problem-solving (rules), and the more complex analysis of information to generate strategies (knowledge). Task switching occurs when components of a task have competing goals. Task load analyses are common in studies of situation assessment and decision-making such as examinations of individuals working in air traffic control or teaching environments.

In clinical neuropsychology, the task load of a test item or procedure should be considered when making interpretations regarding a patient's performance on that item or procedure. For example, memory is most often evaluated in the clinician's office, typically a distraction-free environment. Memory processes in real-world environment often have a much greater task load because distractions are often present.

References and Readings

- Neerincx, M. A. (2003). Cognitive task load analysis: Allocating tasks and designing support. In E. Hollnagel (Ed.), *Handbook of cognitive task design* (pp. 283–306). Hillsdale: Lawrence Erlbaum.