A researcher is studying how <u>study time</u> (short vs. long) and <u>test type</u> (multiple choice vs. essay) affect <u>test performance</u>.

An experiment looks at whether <u>sleep deprivation</u> (yes vs. no) and <u>caffeine intake</u> (none, 100mg, 200 mg) influence <u>reaction time</u>.

Researchers examine how <u>music</u> (no music vs. classical) and <u>noise level</u> (low, medium, high) affect <u>concentration</u>.

A study investigates whether <u>instructional style</u> (lecture vs. discussion) and <u>class size</u> (small, medium, large) influence <u>student</u> <u>engagement</u>.

A pharmaceutical trial tests different <u>dosages</u> (low, medium, high) across three <u>age groups</u> (child, adolescent, adult) to examine <u>symptom</u> <u>improvement</u>.

Researchers investigate how <u>social media use</u> (low vs. high) and <u>generational group</u> (Gen Z vs. Millennials vs. Gen X) affect feelings of <u>loneliness</u>.

Researchers study how <u>room temperature</u> (75, 70, and 65 degrees) and <u>time of day</u> (morning vs. evening) affect students' <u>mood</u>.

A school-based study examines how <u>teaching</u> method (lecture vs. interactive) and <u>grade level</u> (9th, 10th, 11th, 12th) affect <u>test scores</u>.

A study investigates whether <u>class modality</u> (online, hybrid, or in-person) and <u>class size</u> (small, medium, large) influence <u>student engagement</u>.

A study investigates whether <u>caffeine intake</u> (0mg, 100mg, 200mg) and <u>beverage type</u> (iced, hot) influence <u>mood</u>.

A study investigates whether <u>intervention type</u> (CBT, mindfulness) and <u>session frequency</u> (1x/week, 2x/week) influence <u>stress levels</u>.

A study investigates whether <u>content format</u> (video, podcast), <u>note-taking</u> (notes vs. no notes), and <u>time of day</u> (morning vs. evening) influence <u>information recall</u>.\*

A researcher tests whether <u>personality</u> (introvert vs. extravert), <u>task difficulty</u> (easy vs. hard), and whether <u>feedback</u> is given (yes vs. no) influence <u>performance</u>.\*