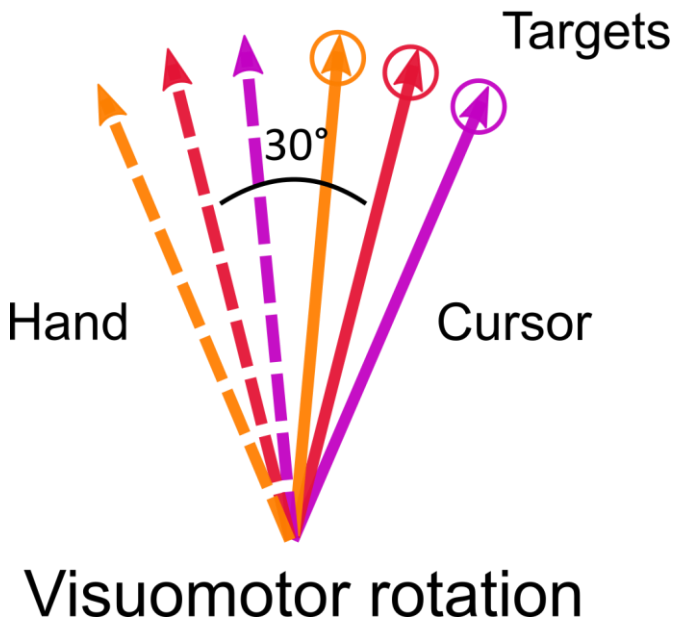
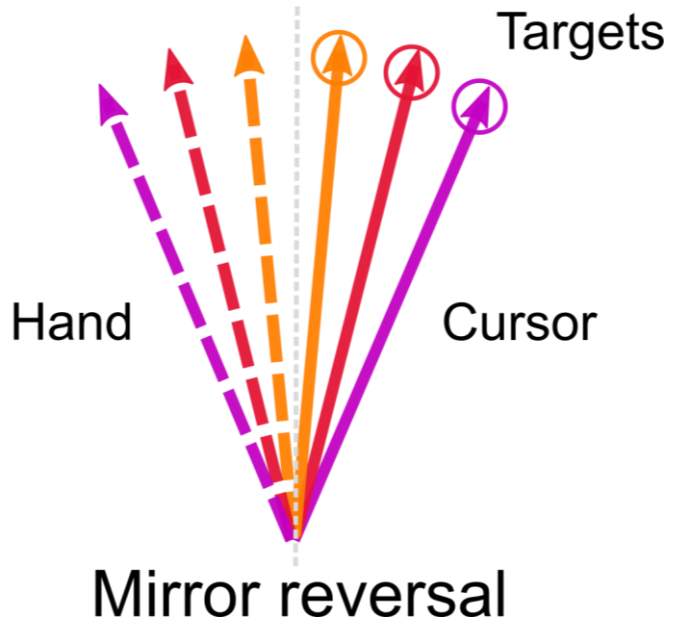
Skill acquisition and adaptation are both quick but rely on distinct mechanisms

Raphael Q. Gastrock, Bernard Marius ’t Hart, & Denise Y. P. Henriques

Centre for Vision Research, York University, Toronto, Canada

- 2 types of motor learning:
  - *De novo* learning
  - Motor adaptation
- Counterbalanced for perturbation order, axis, and target locations
  - No effects observed: Learning one perturbation does not affect the other



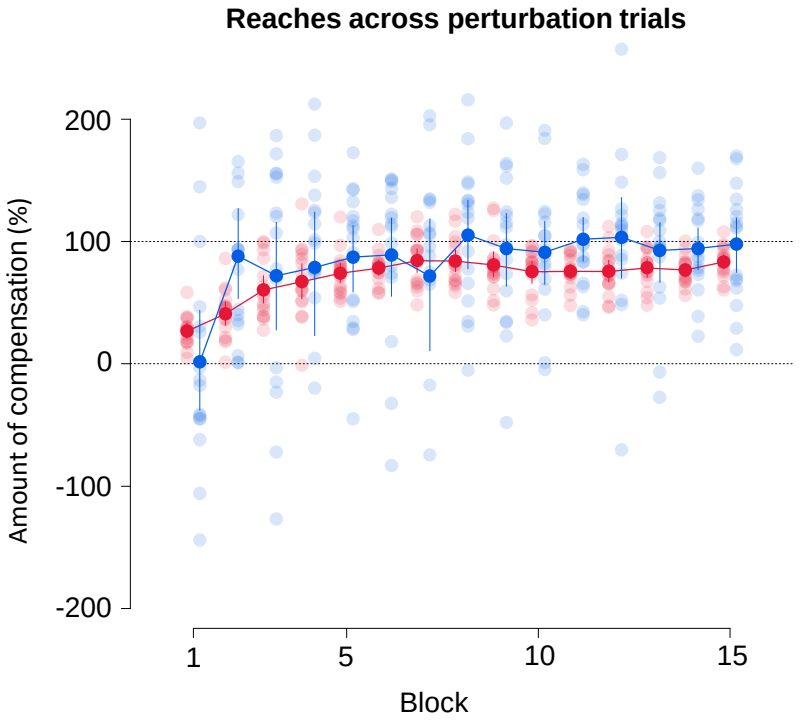


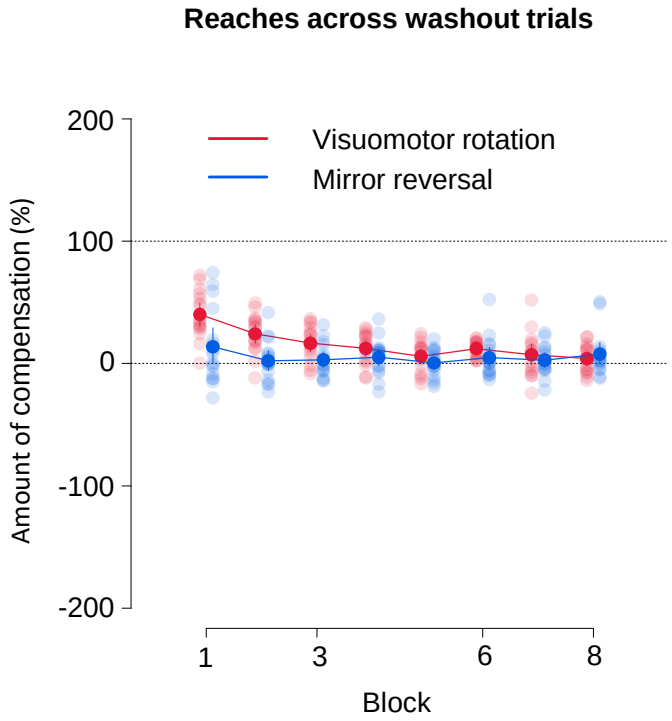
Skill acquisition and adaptation are both quick but rely on distinct mechanisms

Raphael Q. Gastrock, Bernard Marius ’t Hart, & Denise Y. P. Henriques

Centre for Vision Research, York University, Toronto, Canada

- Learning progressed quickly for both perturbations (within 90 trials)
- Reach aftereffects were observed following visuomotor rotation training only



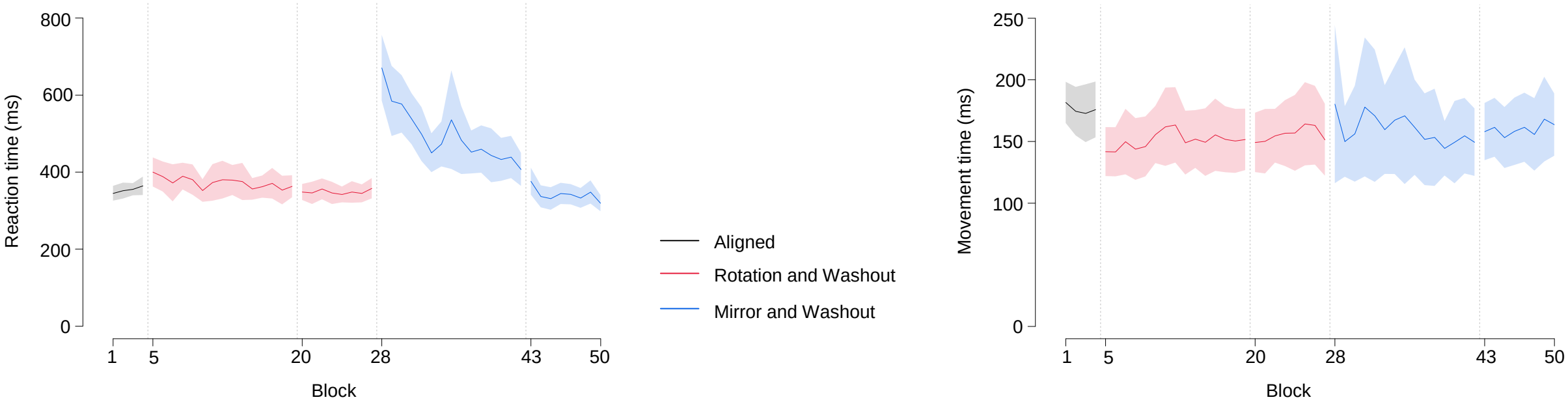


Skill acquisition and adaptation are both quick but rely on distinct mechanisms

Raphael Q. Gastrock, Bernard Marius ’t Hart, & Denise Y. P. Henriques

Centre for Vision Research, York University, Toronto, Canada

- Reaction and movement times were slower for the mirror reversal, than the rotation task



- This paradigm will be useful for investigating the neural processes underlying *de novo* learning and motor adaptation.

Skill acquisition and adaptation are both quick but rely on distinct mechanisms

Raphael Q. Gastrock, Bernard Marius ’t Hart, & Denise Y. P. Henriques

Centre for Vision Research, York University, Toronto, Canada

Thank you for your attention!

Contact:
Email: raphaelgastrock@gmail.com
Twitter: @rqgastrock