Drug name confusion: evaluating the effectiveness of capital (“Tall Man”) letters using eye movement data
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Participants were instructed to respond as quickly and accurately as possible. The experiment took between 30 and 60 minutes, after which participants were debriefed.

The independent variable was whether or not the names contained “Tall Man” letters. There were four dependent variables:
1. The number of errors (e.g., participants indicating that a pack was present in the array when it was not)
2. Search time (time taken to make this decision)
3. Total time spent fixating the distractor pack in the array
4. Total number of eye fixations on the distractor

RESULTS
Participants made more errors if the name was in lowercase 7.75% vs 3.00% (P < 0.005) than if it contained “Tall Man” letters. There was no difference in search time across the lowercase vs “Tall Man” letters, 9.82 s vs 10.11 s. The total time spent fixating the distractor pack was longer for packs with lowercase names than with “Tall Man” letters 1.90 vs 1.42 s (P < 0.005). Participants also made a greater number of fixations on the distractor pack when the name was in lowercase letters than “Tall Man” containing letters, 5.6 fixations vs 4.6 fixations (P< 0.05).

CONCLUSION
This study has demonstrated the utility of the use of “Tall Man” letters as a possible systems change that could be made by both pharmacies (on medication labels, shelf labels) and manufacturers (on medication packages and labels, computer software) in an effort to reduce error caused by drug name confusion.