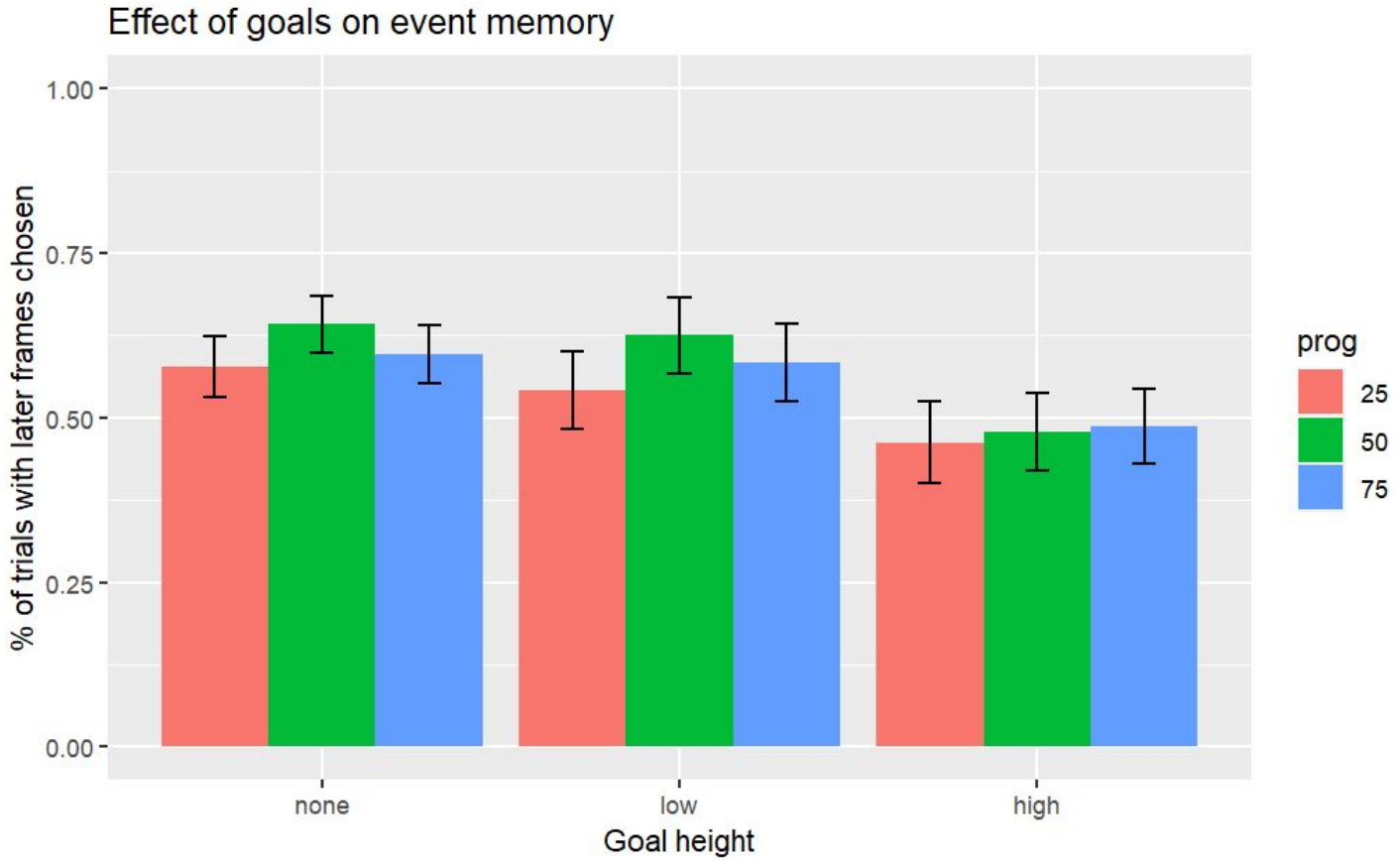
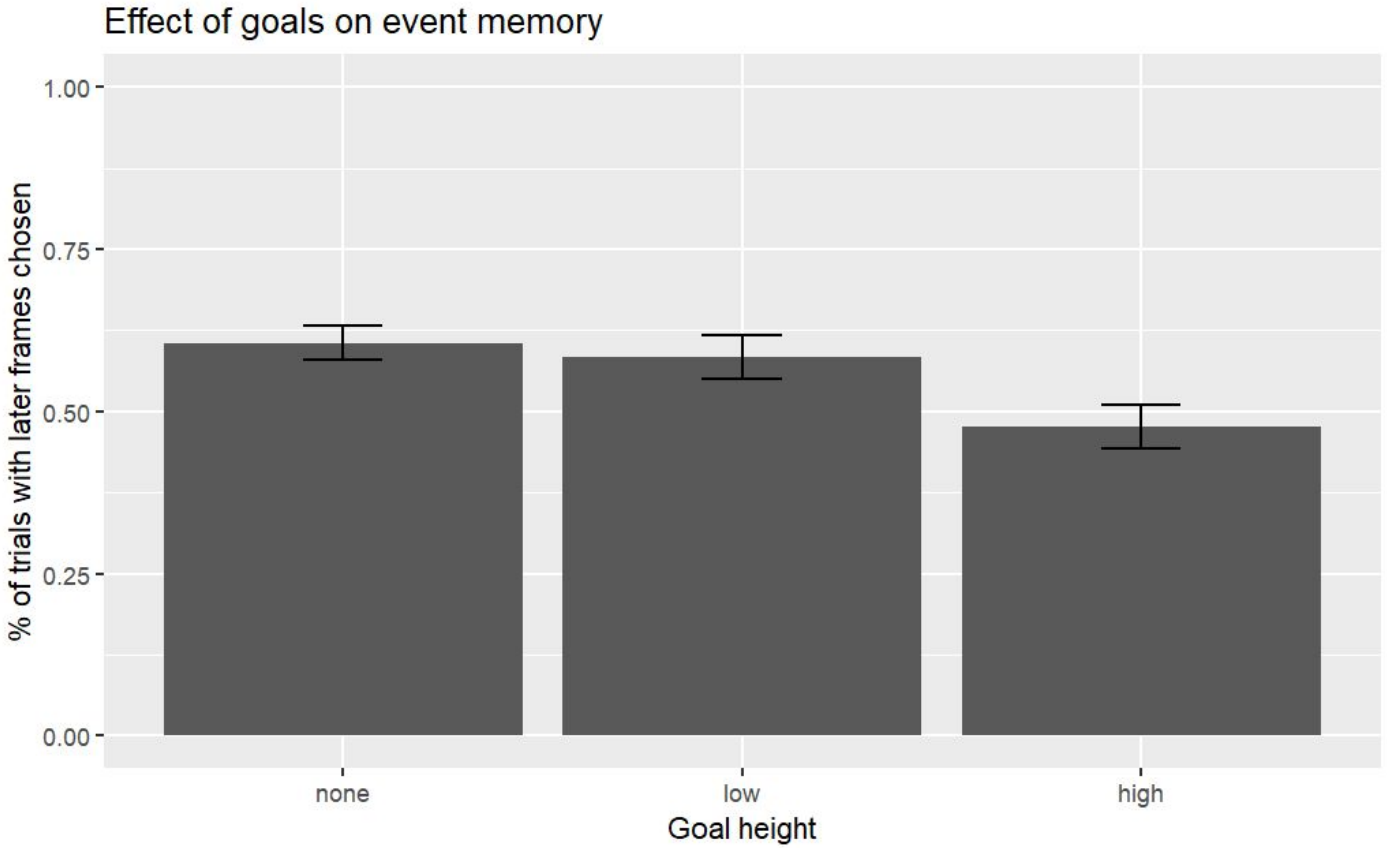
Event Memory Experiment

5/11/23

Broken down by progression



Results are in: No goal condition (N = 24), Goal (N = 29)



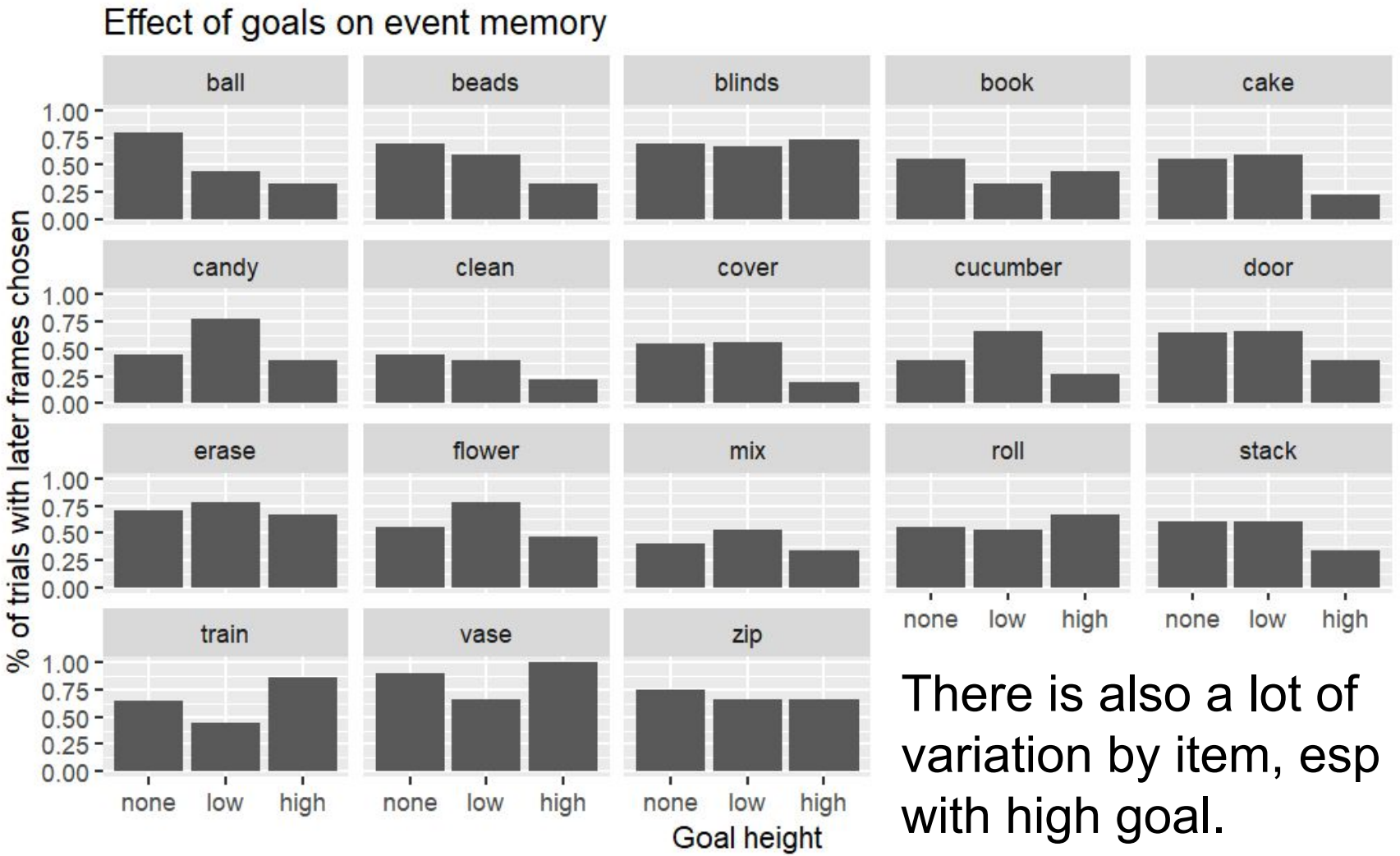
Stats:

For the most part, this is not significant data

```
exp1mod <- glmer(Value ~ goal*prog+(1|IP) + (1|item), Exp1Goals, family = "binomial")
```

```
Fixed effects:
             Estimate Std. Error z value Pr(>|z|)
(Intercept)  0.12850    0.14538   0.884    0.377
goal1       -0.48197    0.20367  -2.366    0.018 *
prog1        0.21032    0.21735   0.968    0.333
prog2       -0.06116    0.24447  -0.250    0.802
goal1:prog1 -0.30396    0.43624  -0.697    0.486
goal1:prog2  0.20480    0.48868   0.419    0.675
```

t-test p-values: none = 0.005761, low = 0.04418, high = 0.5156



There is also a lot of variation by item, esp with high goal.

Next experiments

- Focus on accuracy-- make sure participants are choosing intelligently, rather than blindly
- Find representational momentum threshold

Experiment 2: Forced choice where one option is correct

Experiment 3: Slider option where participant can choose from any of the frames

Experiment 2: Forced choice with one correct option

3 x 3 x 2 design

- none/low/high goals (3) x low/medium/high progression (3) x before/after pic (2)
- 18 conditions
- Demo link: **https://upenn.pcibex.net/r/dJvtba/**

This experiment keeps the forced choice input method from Experiment 1, but instead of the before and after picture, one of the options is correct. I have counterbalanced which option is still available, but this results in 18 conditions, which is kind of a lot.

All of these factors are counterbalanced within subjects, except for the none goals. Those are separate conditions to avoid linguistic influence.

Experiment 3: Slider input

3 x 2 design

- none/low/high goals (3) x low/medium/high progression (3)
- 9 conditions
- Demo link: **https://upenn.pcibex.net/r/LgMkTc/**

This experiment allows us to test both direction and magnitude of error. Using the slider, the participants identify the last frame they saw and submit it. This is similar to Exp 1 of Alon's study.

The no goal conditions have once again been separated from the conditions with goals.