# TER - Résultats - rspan

```
library(tidyverse)
```

```
## -- Attaching packages --------------------------------------- tidyverse 1.3.1 --
```

```
## v ggplot2 3.3.3     v purrr   0.3.4
## v tibble  3.1.2     v dplyr   1.0.6
## v tidyr   1.1.3     v stringr 1.4.0
## v readr   1.4.0     v forcats 0.5.1
```

```
## -- Conflicts ------------------------------------------ tidyverse_conflicts() --
## x dplyr::filter() masks stats::filter()
## x dplyr::lag()    masks stats::lag()
```

```
library(ggpubr)
library(rstatix)
```

```
##
## Attachement du package : 'rstatix'
```

```
## L'objet suivant est masqué depuis 'package:stats':
##
##     filter
```

## RSPAN

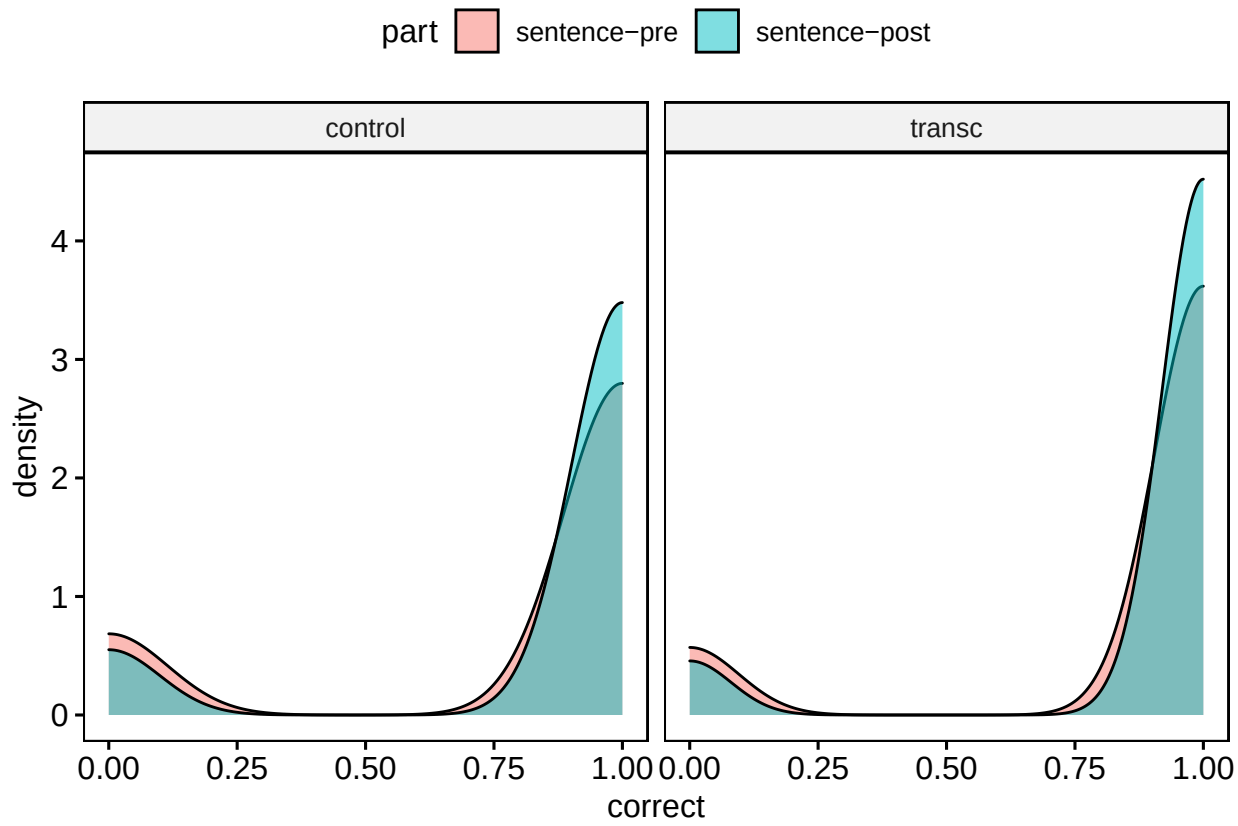
### Phrases

```
rspan <- read.csv2("data/rspan_dist.csv", sep = ",", fileEncoding="UTF-8-BOM")
rspan$part <- factor(rspan$part, levels = c("sentence-pre", "sentence-post", "recall-pre", "recall-post
rspan$size <- factor(rspan$size, levels = c("4.0", "5.0", "6.0"))
rspan$sim <- as.numeric(rspan$sim)
rspan$dsit <- as.numeric(rspan$dist)

recall <- rspan %>%
  filter(part != 'sentence-pre') %>%
  filter(part != 'sentence-post')

sent <- rspan %>%
  filter(part != 'recall-pre') %>%
  filter(part != 'recall-post')

sent %>%
  group_by(groupe, part) %>%
  get_summary_stats(correct)
```

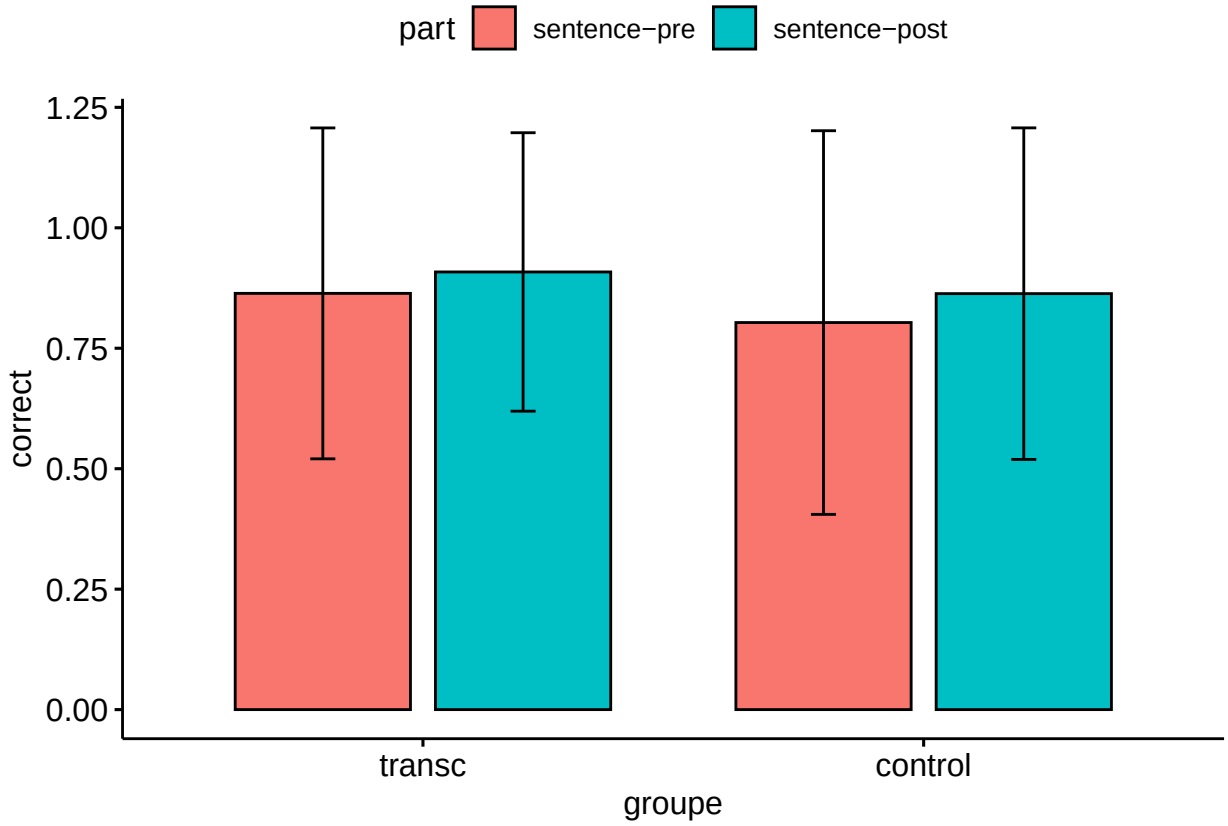
```
## # A tibble: 4 x 15
##   groupe  part   variable     n   min   max median    q1    q3   iqr   mad  mean
##   <chr>   <fct>  <chr>    <dbl> <dbl> <dbl>  <dbl> <dbl> <dbl> <dbl> <dbl> <dbl>
```

```
## 1 control sente~ correct    300     0     1      1     1     1     0     0 0.803
## 2 control sente~ correct    300     0     1      1     1     1     0     0 0.863
## 3 transc  sente~ correct    360     0     1      1     1     1     0     0 0.864
## 4 transc  sente~ correct    360     0     1      1     1     1     0     0 0.908
## # ... with 3 more variables: sd <dbl>, se <dbl>, ci <dbl>
```

```
ggdensity(sent, x = "correct", fill = "part", facet.by = "groupe")
```

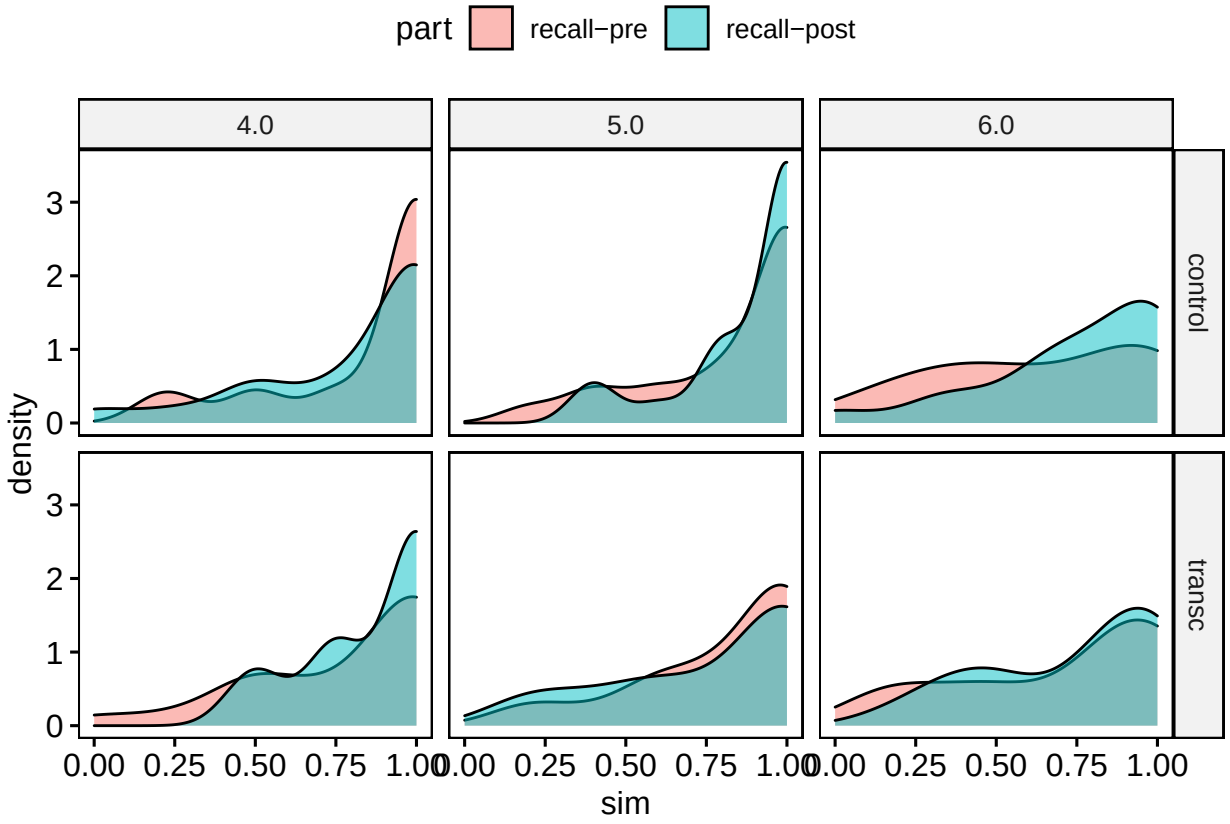



```
ggbarplot(sent, x = "groupe", y = "correct", fill = "part", add = "mean_sd", position = position_dodge(
```

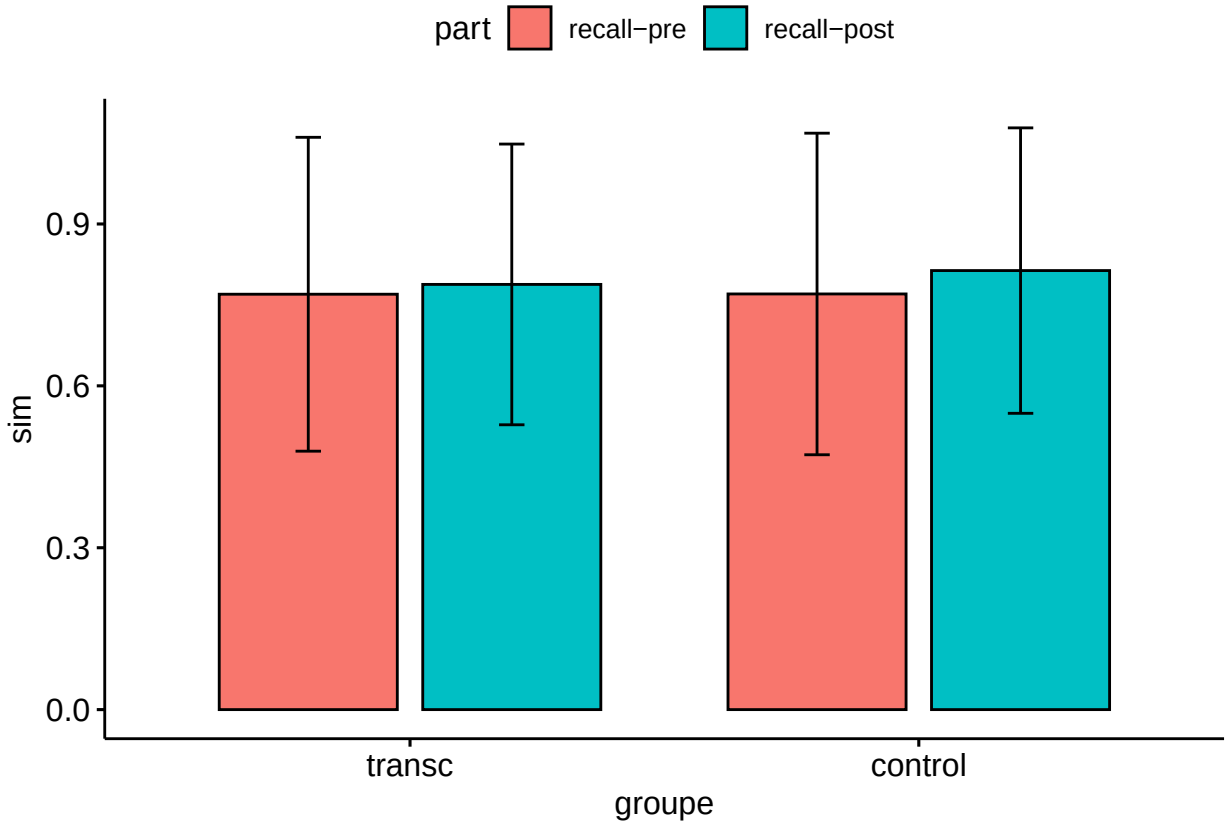



### Rappel

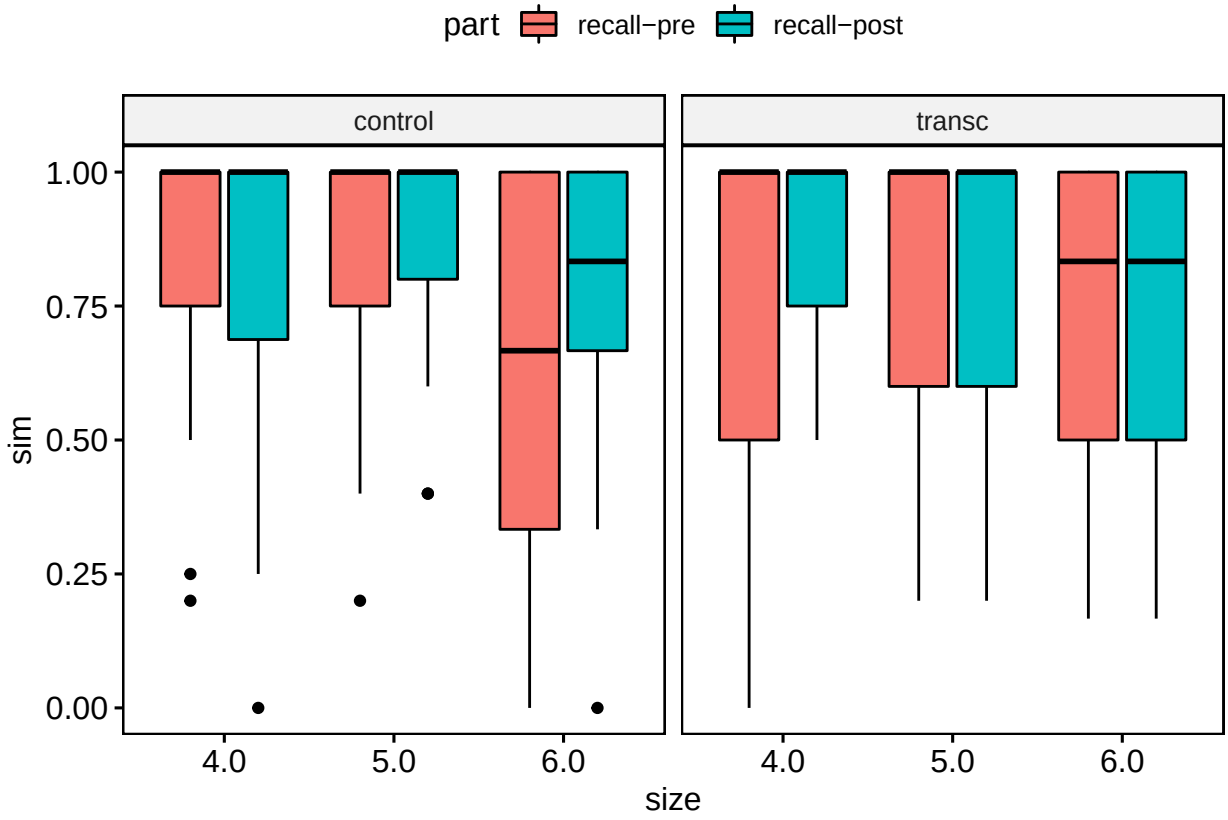
```
ggdensity(recall, x = "sim", fill = "part", facet.by = c("groupe", "size"))
```



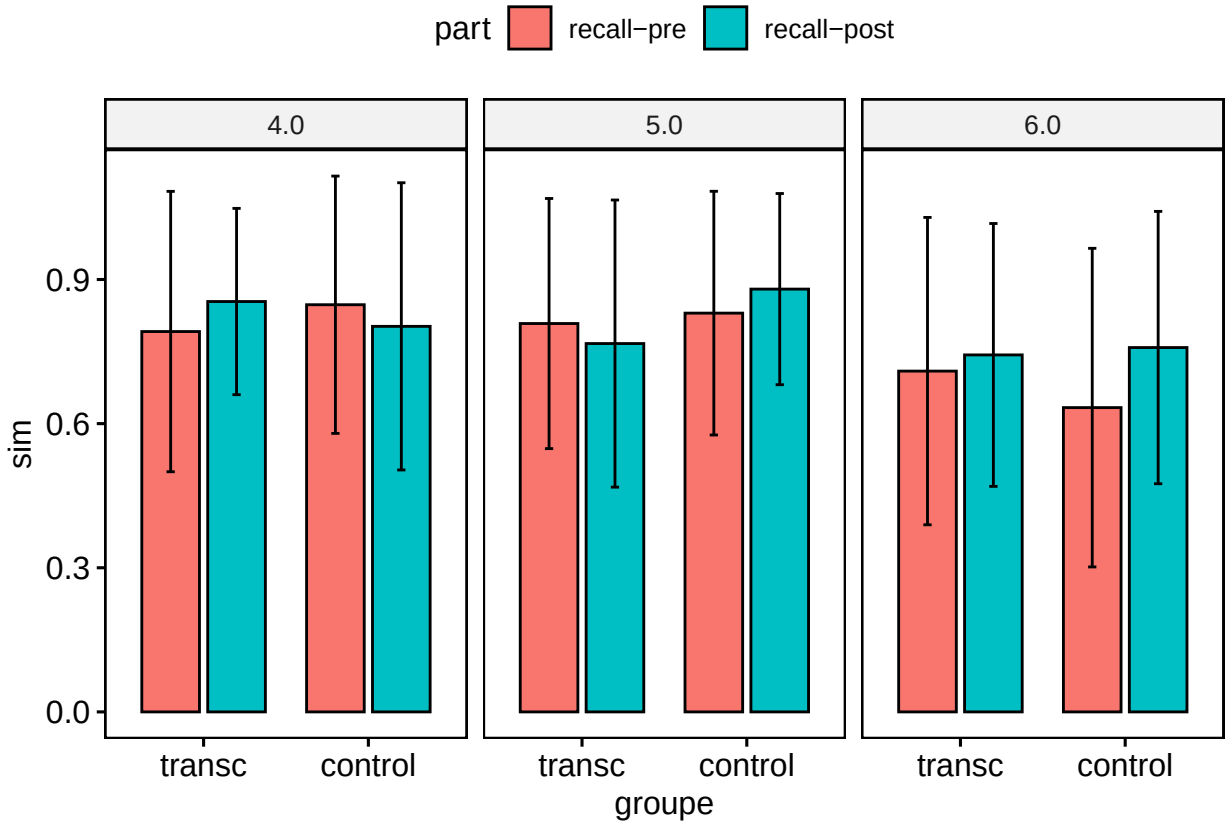

```
ggbarplot(recall, x = "groupe", y = "sim", fill = "part", add = "mean_sd", position = position_dodge(0.8
```




```
ggboxplot(recall, x = "size", y = "sim", fill = "part", facet.by = "groupe")
```




```
ggbarplot(recall, x = "groupe", y = "sim", fill = "part", add = "mean_sd", position = position_dodge(0.8
```




```
recall %>%
  group_by(groupe) %>%
  wilcox_test(sim ~ part, paired = T)
```

```
## # A tibble: 2 x 8
##   groupe  .y.   group1     group2         n1    n2 statistic     p
## * <chr>   <chr> <chr>      <chr>       <int> <int>     <dbl> <dbl>
## 1 control sim   recall-pre recall-post    60    60       234 0.281
## 2 transc  sim   recall-pre recall-post    72    72       518 0.63
```

```
recall %>%
  group_by(groupe, size) %>%
  wilcox_test(sim ~ part, paired = T)
```

```
## # A tibble: 6 x 9
##   groupe  size  .y.   group1     group2         n1    n2 statistic     p
## * <chr>   <fct> <chr> <chr>      <chr>       <int> <int>     <dbl> <dbl>
## 1 control 4.0   sim   recall-pre recall-post    20    20      22   0.622
## 2 control 5.0   sim   recall-pre recall-post    20    20       5   0.143
## 3 control 6.0   sim   recall-pre recall-post    20    20      31.5 0.11
## 4 transc  4.0   sim   recall-pre recall-post    24    24      44   0.365
## 5 transc  5.0   sim   recall-pre recall-post    24    24      41   0.503
## 6 transc  6.0   sim   recall-pre recall-post    24    24      80.5 0.571
```