

# SCED

## Vignette

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```
# dependencies
library(SCED)
library(knitr)
library(tidyverse)

# dependencies required by SCED
library(broom)
library(coin)
library(survival)
library(effsize)
library(bootES)
library(boot)
library(stringr)
library(timesavers) # from github/ianhussey
```

## Simulate two participants

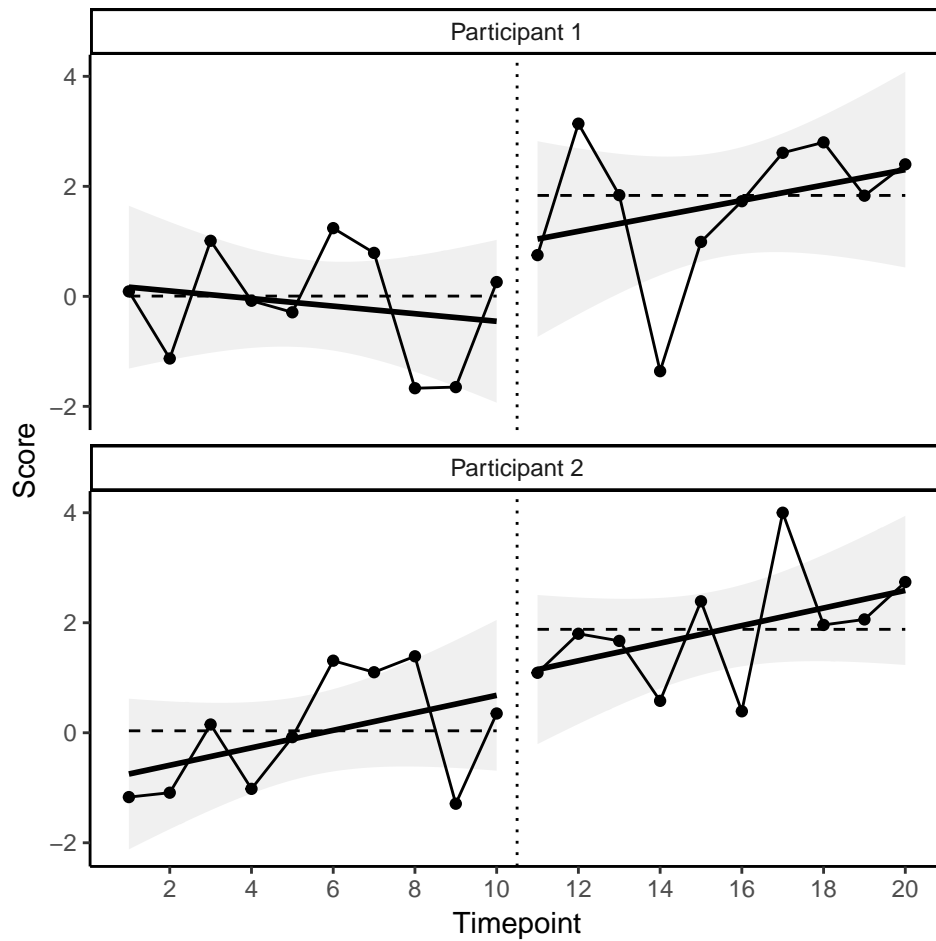
```
# simulate data
data <- simulate_data(participants = 2, # two participants
                      timepoints_a = 10, # 10 timepoints pre
                      timepoints_b = 10, # 10 post intervention
                      cohens_d = 1.5) %>% # Cohen's d = 1.5
  mutate(Participant = paste("Participant", Participant))

# analyse
results <- sced_analysis(data = data)

# summarise results in a table
sced_summary(results = results) %>%
  kable()
```

Participant	Median difference	Ruscio's A	Hedges' g	p
Participant 1	1.830	0.88 [0.667, 1]	1.47 [0.29, 2.68]	0.00370
Participant 2	1.845	0.919 [0.75, 1]	1.71 [0.84, 2.63]	0.00115

```
# plot
sced_plot(data = data)
```



Use in-built dataset that's a little more complex

```
# analyse
results <- sced_analysis(data = simulated_data)

# summarise results in a table
sced_summary(results = results) %>%
  kable()
```

Participant	Median difference	Ruscio's A	Hedges' g	p
1	1.81	0.81 [0.568, 0.972]	1.04 [-0.06, 2.09]	0.01043
2	2.42	0.895 [0.682, 1]	1.89 [0.67, 3.25]	6e-05
3	1.59	0.923 [0.801, 0.991]	1.71 [0.98, 2.35]	7e-05
4	1.67	0.844 [0.667, 0.967]	1.16 [0.18, 2.01]	0.00238
5	2.75	0.966 [0.875, 1]	2.17 [1.37, 2.94]	1e-05
6	2.15	0.952 [0.847, 1]	2.17 [1.23, 3.2]	< .00001

```
# plot
sced_plot(data = simulated_data)
```

