CODECHECK certificate 2020-024

https://doi.org/10.5281/zenodo.4310025

Item	Value
Title	Driftage: a multi-agent system framework for concept drift detection
Authors	Diogo Munaro Vieira, Chrystinne Fernandes, Carlos Lucena, Sérgio Lifschitz ⬤
Reference	https://doi.org/10.1093/gigascience/giab030
Codechecker	Stephen J. Eglen ⬤
Date of check	2020-12-07 15:00:00
Summary	Reproduction from mybinder
Repository	https://github.com/codecheckers/driftage

Table 1: CODECHECK summary

Output	Comment	Size (b)
driftage_download.png	manuscript Figure 5 (bottom two rows only)	489816

Table 2: Summary of output files generated

Summary

Thanks to the authors for providing a mybinder instance. This made the work trivial to reproduce.

The mybinder instance is located at: https://mybinder.org/v2/gh/dmvieira/driftage/HEAD?filepath=examples%2Fhealth_monitor%2FData%20Analysis.ipynb(see bottom of page 1 of this certificate), making it simple to reproduce their work. Although the paper contains five figures, only one figure (5) contained scientific results, which is reproduced here.

After starting mybinder and re-running the notebook, the final figure was downloaded and saved locally. This contained several time series plots, the final two of which matched Figure 5 of the manuscript.

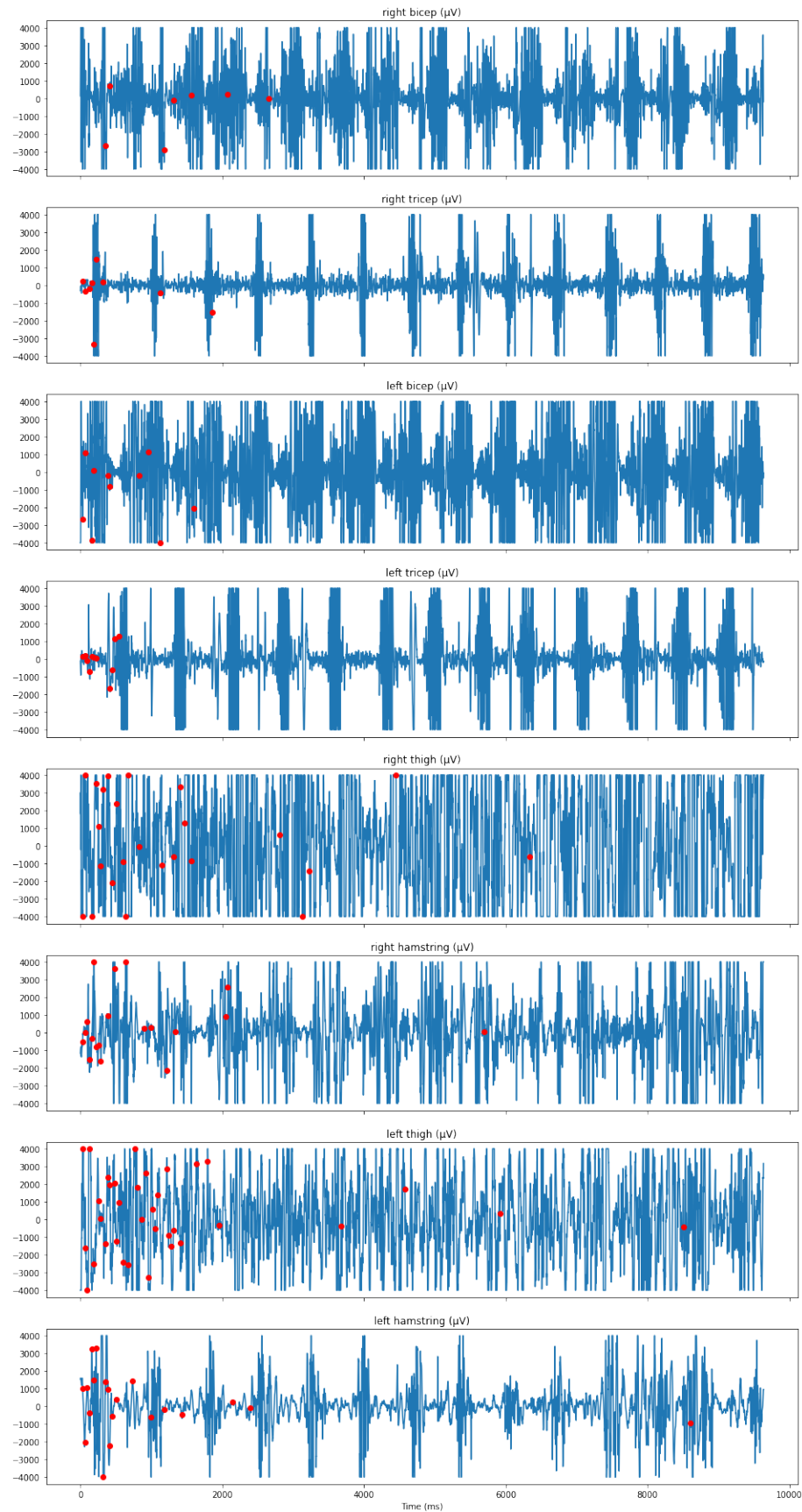This took just a few minutes to re-run.

Figure C1: manuscript Figure 5 (bottom two rows only)

Acknowledgements

I would like to thank the authors for kindly preparing a video and mybinder instance to make this reproduction almost effortless. CODECHECK was financially supported by the Mozilla foundation.

Citing this document

Stephen J. Eglen (2020). CODECHECK Certificate 2020-024. Zenodo. https://doi.org/10.5281/zenodo.43100 25

About CODECHECK

This certificate confirms that the codechecker could independently reproduce the results of a computational analysis given the data and code from a third party. A CODECHECK does not check whether the original computation analysis is correct. However, as all materials required for the reproduction are freely available by following the links in this document, the reader can then study for themselves the code and data.

About this document

This document was created using R Markdown using the `codecheck` R package. `make codecheck.pdf` will regenerate the report file.

```
sessionInfo()
```

```
## R version 4.0.5 (2021-03-31)
## Platform: x86_64-pc-linux-gnu (64-bit)
## Running under: Manjaro Linux
##
## Matrix products: default
## BLAS:   /usr/lib/libopenblasp-r0.3.14.so
## LAPACK: /usr/lib/liblapack.so.3.9.1
##
## locale:
##  [1] LC_CTYPE=en_GB.UTF-8       LC_NUMERIC=C
##  [3] LC_TIME=en_GB.UTF-8        LC_COLLATE=en_GB.UTF-8
##  [5] LC_MONETARY=en_GB.UTF-8    LC_MESSAGES=en_GB.UTF-8
##  [7] LC_PAPER=en_GB.UTF-8       LC_NAME=C
##  [9] LC_ADDRESS=C               LC_TELEPHONE=C
## [11] LC_MEASUREMENT=en_GB.UTF-8 LC_IDENTIFICATION=C
##
## attached base packages:
## [1] stats     graphics  grDevices utils     datasets
## [6] methods   base
##
## other attached packages:
##  [1] readr_1.4.0          tibble_3.1.2
##  [3] xtable_1.8-4         yaml_2.2.1
##  [5] rprojroot_2.0.2      knitr_1.33
##  [7] codecheck_0.0.0.9005 parsedate_1.2.1
##  [9] R.cache_0.15.0       gh_1.3.0
##
## loaded via a namespace (and not attached):
##  [1] magrittr_2.0.1    hms_1.1.0         R6_2.5.0
```

```
##  [4] rlang_0.4.11      fansi_0.4.2       stringr_1.4.0
##  [7] httr_1.4.2        tools_4.0.5       xfun_0.23
## [10] png_0.1-7         R.oo_1.24.0       utf8_1.2.1
## [13] cli_2.5.0         htmltools_0.5.1.1 ellipsis_0.3.2
## [16] digest_0.6.27     lifecycle_1.0.0   crayon_1.4.1
## [19] vctrs_0.3.8       R.utils_2.10.1    evaluate_0.14
## [22] rmarkdown_2.8     stringi_1.6.2     pillar_1.6.1
## [25] compiler_4.0.5    R.methodsS3_1.8.1 jsonlite_1.7.2
## [28] pkgconfig_2.0.3
```