Codebook for MC3-GGUM Estimates of Congressional Ideology

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This dataset provides MC3-GGUM (Duck-Mayr and Montgomery 2022) estimates of ideology for members of Congress. (Please consult Duck-Mayr and Montgomery (2022) for details of the GGUM model and the MC3 estimation algorithm). The models were run using R version 4.2.1 (R Core Team 2022) and the add-on package `bggum` version. 1.0.2 (Duck-Mayr and Montgomery 2020). Estimates for each chamber of each Congress were generated using six parallel chains at the inverse temperature schedule $(1, 0.976, 0.952, 0.93, 0.909, 0.889)$, with 5,000 iterations for tuning proposals, 10,000 burn-in iterations, and 100,000 recorded posterior draws. **Please note** that estimates are not comparable across chambers or Congresses.

Data on members' votes was downloaded from Voteview (Lewis et al. 2022); for ease of merging with other datasets and/or comparison with their estimates, we retained the `icpsr`, `bioname`, `party_code`, `nominate_dim1`, and `nominate_dim2` variables. All variables included in the dataset, including those retained from the Voteview data, are described in Table 1.

Table 1: Variables in the dataset

Variable	Description
congress	Integer giving the Congress for this estimate (e.g., the 116th Congress from January 3, 2019 to January 3, 2021)
chamber	Character detailing whether the member is from the House or the Senate
icpsr	Integer ID for this member of Congress (from Voteview)
bioname	Character giving this member's name (from Voteview)
party_code	Integer code for the member's party; 200 is for Republicans, 100 for Democrats, and 328 for Independents (from Voteview)
post_mean	The mean of the MC3-GGUM posterior draws for this member's ideal point
post_median	The median of the MC3-GGUM posterior draws for this member's ideal point
post_sd	The standard deviation of the MC3-GGUM posterior draws for this member's ideal point
post_025	The 2.5% quantile of the MC3-GGUM posterior draws for this member's ideal point
post_975	The 97.5% quantile of the MC3-GGUM posterior draws for this member's ideal point
nominate_dim1	DW-NOMINATE 1st dimension estimate (from Voteview)
nominate_dim2	DW-NOMINATE 2nd dimension estimate (from Voteview)

References

Duck-Mayr, JBrandon and Jacob Montgomery (2020). *bggum: Bayesian Estimation of Generalized Graded Unfolding Model Parameters*. R package version 1.0.2. URL: https://CRAN.R-project.org/package=bggum.

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R Core Team (2022). *R: A Language and Environment for Statistical Computing*. Version 4.2.1. R Foundation for Statistical Computing. Vienna, Austria. URL: https://www.R-project.org/.