Dataset Requirements: We are looking for datasets wherein participants see multiple cognitive or social stimuli (loosely defined), and the data is preserved with each original item-answer. For example, you may have participants rate 25 items on their pleasantness. If the data contains each rated item for each participant (i.e., not averaged across items), this data would be an appropriate dataset for our project. Note that it does not have to be your data, but you may know an appropriate dataset that is open source that we can use.

**Project/Data Title:**   
Seeing Is Believing: How Media Type Effects Truth Judgements

Researchers: Kaitlin Moat, Jason Tangen, Eryn Newman

**Project/Data Description: (200-500 words brief description of the theory/background for the data)**

People have been duly concerned about how fake news influences the minds of the populous since the rise of propaganda in World War One (Lasswell, 1927). Experts are increasingly worried about the effects of false information being spread over the medium of video. Members of the deep trust alliance, a global network of scholars researching deepfakes and doctored videos, state that “a fundamental erosion of trust is already underway” (Harrison, 2020). Newman et al (2015) discovered that the media type through which information is presented does indeed affect how true the information feels. Newman speculated that this truthiness effect could be because images provide participants with more information than text alone, thus making the source feel more informationally rich.

In this experiment, we aim to test the generalisability of Newman’s truthiness effect in two ways: firstly, to see if it extends to other media types beside images, and secondly, to test if it applies to other domains. In this study, we will present individuals with both true and false claims presented through three different media types: (1) text, (2) text alongside a photo, and (3) text alongside a video. This is a direct replication of Newman’s experiment, just with the addition of the video condition. Similarly, participants will also be asked to make truth judgements about trivia claims and claims about COVID-19, to see if the truthiness effect extends to other domains besides trivia.

In this within-subjects design, participants will be presented with true and false claims about trivia and COVID-19 in a counterbalanced order. These claims will be randomly assigned to appear either as text alone, text alongside an image and text alongside a video. Participants will be asked to rate how true they believe each claim is.

**Methods Description: (brief description of how the data was collected)**

Participants were largely sourced from the first-year participant pool at The University of Queensland. Participation was completely voluntary, and participants can choose to withdraw at any time.  
  
Thirty matched trivia claims were generated directly from Newman’s materials. These claims were selected, and a true and false version of each claim was created. Newman’s original claims are available at the following link: <https://data.mendeley.com/datasets/r68dcdjrpc/1>

The second set of materials comprising of matched true and false claims was generated through information resources from the World Health Organisation, and various conspiracy websites. These claims were then fact-checked by Kirsty Short, an epidemiologist and Senior Lecturer in the School of Chemistry and Molecular Sciences at The University of Queensland.

The claims were also pilot tested to ensure none of them were performing at floor or ceiling. This pilot test comprised of 56 participants, and subsequently, four claims were dropped. The data from this pilot test was also used to accurately conduct a power analysis. After generating the means from the pilot test, we found that to acquire power of 0.8 or greater, a mean difference of 0.4 must exist between each media type. This mean difference is quite conservative, as we are planning on measuring truth ratings on a six-point scale and is easily achievable with 100 participants.

Videos were largely sourced from the stock image website Envato Elements and Screenflow's Royalty Free Stock Media Library.

**Data Location: (URL or upload on Canvas)**

<https://osf.io/zu9pg/>

**Date Published: (YYYY-MM-DD)**

2021-10-07

**Dataset Citation: (please include author information)**

Moat, K., Tangen, J., & Newman, E. (2021). Seeing Is Believing: How Media Type Effects Truth Judgements.

**Keywords:**

**Use License:** Unsure, but available on OSF.

**Geographic Description - City/State/Country of Participants:**

Brisbane, Queensland, Australia

**Column Metadata: Fill in the chart below for each column of data in the dataset. Please note you can filter out columns that are not useful for this project.**

These are the relevant columns in the dataset:

|  |  |  |
| --- | --- | --- |
| Variable Name | Variable Description | Type (numeric, character, logical, etc.) |
| Id | Participant ID | numeric |
| Domain | Whether the trial is a claim about COVID (“covid”) or TRIVIA (“trivia) | character |
| Medium | Whether the trial appears as text alone (“claim”), text alongside an image (“photo”), or text alongside a video (“video”) | character |
| Trial\_type | Whether the trial presents a claim that is TRUE (“target”) or FALSE (“distractor”) | character |
| Rating | Paritcipant’s truth rating of the claim ranging from 1 (definitely false) to 6 (definitely tue) | numeric |

**What columns should we use to simulate the data?**

As above.

* Item labels are found:
* Variable(s) of interest are found:

Goals: we will use this data to provide examples of our simulation process on how to determine sample size for a project based on item rather than participant. You can read about this idea here: <https://github.com/SemanticPriming/SPAML/blob/master/02_Power/power_aipe.pdf> We will use the example provided in this link as the main portion of the paper and then add your data as a vignette example to supplement the paper. You will be considered an author for completing this template worksheet (no coding skills necessary, we will do that part), and reviewing/commenting on the draft of the paper. Please email [007spaml@gmail.com](mailto:007spaml@gmail.com) if you have questions.