

Reproducing the Mehr, Song & Spelke (2016)

Zoren Degtyarev<sup>1</sup> & Ernst-August Doelle<sup>1,2</sup>

<sup>1</sup> Brooklyn College of the City University of New York

<sup>2</sup> Konstanz Business School

#### Author Note

Add complete departmental affiliations for each author here. Each new line herein must be indented, like this line.

Enter author note here.

Correspondence concerning this article should be addressed to Zoren Degtyarev, Postal address. E-mail: zoren@gmail.com

## Abstract

A reproduction of the analysis for Experiment 1 from Mehr, Song & Spelke (2016). Five month old infants were exposed to one of two novel songs containing different melodies with lyrics and rhythms being the same. Infants either heard the songs through a toy in which their parent's voice was recorded or was sung live by a friendly unfamiliar person initially and later through video recording. Infant's selective attention was tested by having them listen to two presentations of either familiar or unfamiliar songs. Infants payed attention to the familiar song, sung by their parent in the past. No infant preference was observed between the toy onto which parent's voice was recorded or a video recording of an unfamiliar person, briefly met by an infant initially. Infants in the later two conditions retained the memory of the melody for longer than 8 months. These findings suggest that songs performed by parents at home convey social meaning to a child. One or two sentences providing a **basic introduction** to the field, comprehensible to a scientist in any discipline.

Two to three sentences of **more detailed background**, comprehensible to scientists in related disciplines.

One sentence clearly stating the **general problem** being addressed by this particular study.

One sentence summarizing the main result (with the words "**here we show**" or their equivalent).

Two or three sentences explaining what the **main result** reveals in direct comparison to what was thought to be the case previously, or how the main result adds to previous knowledge.

One or two sentences to put the results into a more **general context**.

Two or three sentences to provide a **broader perspective**, readily comprehensible to

35 a scientist in any discipline.

36 *Keywords:* music, social cognition, memory, infant development, open data, open

37 materials

38 Word count: X

## Reproducing the Mehr, Song & Spelke (2016)

This is an example of creating an APA manuscript using papaja, and also an example for part 2 (APA paper in R markdown) of the midterm assignment. This will enable to APA style manuscripts using R markdown.

This report re-produces the analysis of Experiment 1 reported in Mehr, Song & Spelke (2016) (???). The data were downloaded from <https://github.com/693284/papajaTest/blob/master/MehrSongSpelke2016.csv>

(???) had participants perform a Stroop task in one of two posture conditions.

Participants

## Methods

We report how we determined our sample size, all data exclusions (if any), all manipulations, and all measures in the study.

### Participants

There were 32 participants

### Material

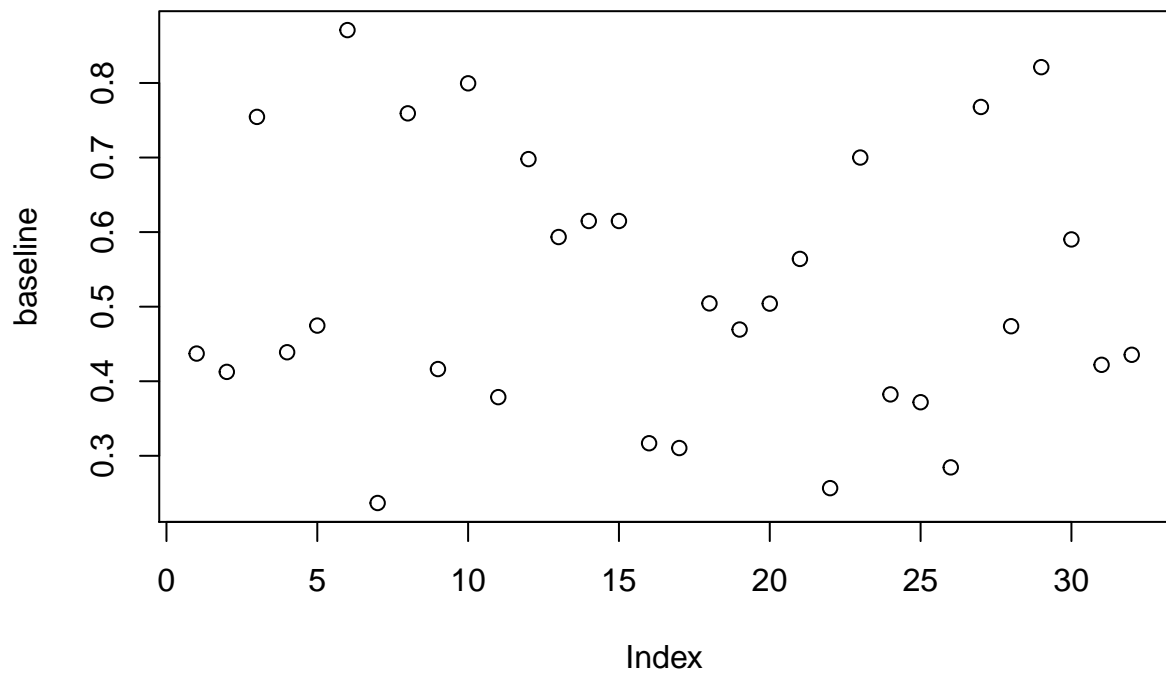
The details of the Melodies are Social for Infants experiment are reported in Mehr et.al, (2016)

### Procedure

### Data analysis

We used R (Version 3.5.2; R Core Team, 2018) and the R-packages *data.table* (Version 1.12.0; Dowle & Srinivasan, 2019), *dplyr* (Version 0.8.0.1; Wickham, François, Henry, &

60 Müller, 2019), *papaja* (Version 0.1.0.9842; Aust & Barth, 2018), *pwr* (Version 1.2.2;  
 61 Champely, 2018), and *summarytools* (Version 0.9.2; Comtois, 2019) for all our analyses.



62

63 `# Results`

64 `## [1] 0.5210967`

65 `## [1] 0.1769651`

66 `##`

67 `## One Sample t-test`

68 `##`

69 `## data: baseline`

70 `## t = 0.67438, df = 31, p-value = 0.5051`

71 `## alternative hypothesis: true mean is not equal to 0.5`

72 ## 95 percent confidence interval:

73 ## 0.4572940 0.5848994

74 ## sample estimates:

75 ## mean of x

76 ## 0.5210967

77 ## [1] 0.5210967

78

## Discussion

## References

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