

## Description of Task Files for “CardTask\_Speer2014”

### Used in publications:

Speer, M.E., Bhanji, J.P., & Delgado, M.R. (2014). Savoring the past: Positive memories evoke value representations in the striatum. *Neuron*, 84: 1-10. doi: 10.1016/j.neuron.2014.09.028

### Important Filenames:

*CardTaskRP\_Speer2014\_displayupdatedA.es2* - e-prime, randomized order used for half of participants

*CardTaskRP\_Speer2014\_displayupdatedB.es2* - e-prime, randomized order used for half of participants

*\*.png* - images needed for the e-prime presentation

### File Descriptions

#### ***CardTaskRP\_Speer2014\_displayupdatedA and CardTaskRP\_Speer2014\_displayupdatedB:***

*Experimental Design:* 2 conditions (Reward, Punishment) within subjects

#### *Timing Information:*

Structured for one 9min 20s scan (does not include practice trials)

Event Timing (each trial) -

1. Input guess: 2s
2. Inter-stimulus-interval: 2/4s (50%/50%)
3. Outcome: Reward/Punishment (50%/50%), or “no response” on missed response trials
4. Inter-trial interval: 6/8s (50%/50%)

#### *Trial Counts and other details:*

3 practice trials at beginning (skip by setting weight to zero in “practice” list)

40 experimental trials, 2 pseudorandom orders (\*\_displayupdatedA and \*\_displayupdatedB)

Keyboard input: accepts “1” or “b” for “lower” guess, “2” or “y” for “higher” guess. Initial screens accept “t” to advance. “trigger” expects “t” to begin experiment.

#### *How to interpret fields in output files:*

“wait8.OnsetTime” stores clocktime of experiment start time (8s blank screen starts at this time)

“input.Resp” stores response for each experimental trial (low=“1” or “b”, high=“2” or “y”). Empty if no response

“input.RT” stores response time for each trial. 0 if no response.

“procedure” stores trial condition (reward/punishment)

### **Also see (e.g., similar tasks described elsewhere):**

Delgado, M.R., Nystrom, L.E., Fissell, C., Noll, D.C., & Fiez, J.A. (2000). Tracking the hemodynamic responses to reward and punishment in the striatum. *Journal of Neurophysiology*, 84(6): 3072-77. doi: 10.1152/jn.2000.84.6.3072