



# The Effect of Optimistic Attitude on the Predicting Time of Future Plans: Based on the Subjective Memory Loss



186 450 816

Wenchi Wan<sup>1</sup>, Xi Yuan<sup>1</sup>, Yanyao Li<sup>1</sup>, Gege Li<sup>1</sup>, Guochu Rao<sup>1</sup>

<sup>1</sup>Department of Psychology, Sun Yat-sen University, Guangzhou, 510006, China

## Introduction

It is common for people to anticipate that they will be able to complete a task in less time, and it turns out that time and effort required is not as simple as one might think.

## Planning Fallacy

In fact, the concept of **planning fallacy** has been descriptively summarized and introduced by Kahneman and Tversky (Kahneman & Tversky, 1977) to describe people's "tendency to underestimate the time needed to complete a project even though they have had considerable past experience of failing to meet the schedule.

## Subjective Memory Loss

The cause has been theorized in past studies and it has been concluded that **subjective memory loss** is a cause of the planning fallacy, i.e., people have incomplete records of past experiences (Roy, M.M., Christenfeld, N.J.S., 2007)

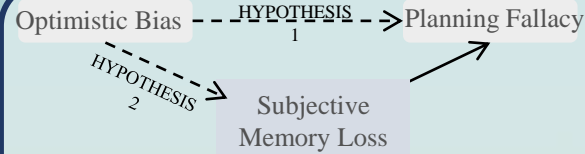
## Optimistic Bias

A common phenomenon that people always tend to think on the good side rather than the bad one that can happen. (Tali Sharot, 2011)

## Hypothesis

H1: **Optimistic bias** lead to a greater tendency to make optimistic predictions about the events one has experienced.

H2: Optimistic bias creates a planning fallacy by influencing people's perceptions of past experiences, making them more likely to make false/incomplete judgments about memory experiences.



## Method & Result

### ●Participants

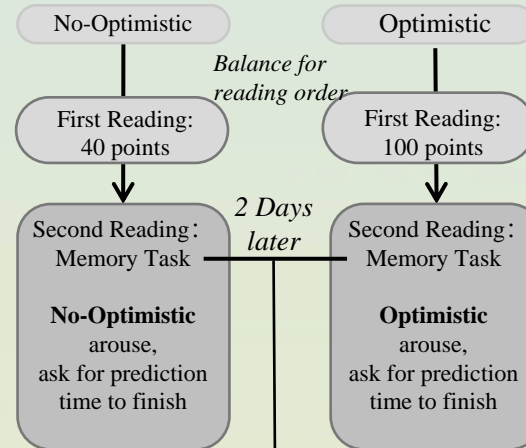
- 19 students
- 8 males, 11 females
- Age range = 18-23 years

### ●Materials

- 2 Passages (A & B)
- Reading comprehensions of CET 6 Part C

Study 1:  $\delta$ Time = Actual completion Time of Reading - Predicted Time of Reading;

Study 2: Path Analysis for 3 variables in Hypothesis Model



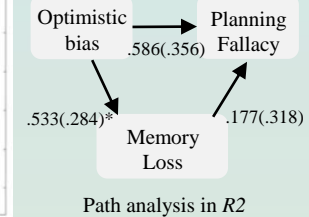
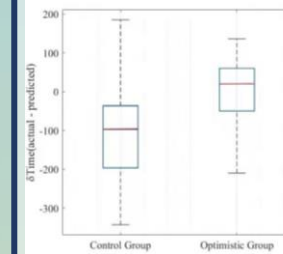
10 words in the former reading & 10 words unfamiliar

## Results

R1: The estimated and actual time differences were significant between the optimistic group and the non-optimistic group ( $t=-2.205$ ,  $df=29$ ,  $p=0.036$ )

R2: The results showed that the path of optimism  $\rightarrow$  memory loss (mediating variable) was significant, but the results of other paths were not significant.

$\rightarrow$ A direct measure of optimism bias was the estimated time to the second task, with the shorter the estimated completion time, the more optimistic it was.



## Discussion

► Chinese cultural background makes Chinese and even Asian people more prominent in modesty and caution, so it is possible to make a long estimate of the prediction time, and it is difficult to get the actual prediction time.

► Cautious and optimistic individuals tended to obscure the effects of experimental interventions when making predictions about time due to personality differences.

## Reference

- [1] Buehler, R., Griffin, D., Peetz, J., Zanna, M. P., and Olson, J. M. Chapter one - the planning fallacy: Cognitive, motivational, and social origins. In *Advances in Experimental Social Psychology*, volume 43, pages 1–62. Academic Press.
- [2] Buehler, R., Griffin, D., and Ross, M. Exploring the "planning fallacy": Why people underestimate their task completion times. *67(3):366–381*.
- [3] Conversano, C., Rotondo, A., Lensi, E., Della Vista, O., Arpone, F., and Reda, M. A. Optimism and its impact on mental and physical well-being. *6(20592964):25–29*.
- [4] Kahneman, D. and Tversky, A. (1982). Intuitive prediction: Biases and corrective procedures.
- [5] Lee, L. O., James, P., Zevon, E. S., Kim, E. S., Trudel-Fitzgerald, C., Spiro, A., Grodstein, F., and Kubzansky, L. D. Optimism is associated with exceptional longevity in 2 epidemiologic cohorts of men and women. *116(37):18357*.
- [6] Roy, M. M. and Christenfeld, N. Bias in memory predicts bias in estimation of future task duration. *35:557–564*.
- [7] Seligman, M. E. P. *Learned optimism* / Martin Seligman. Number Accessed from <https://nla.gov.au/nla.cat-vn7287672>. Random House Australia.
- [8] Sharot, T. The optimism bias. *21(23):R941–R945*.
- [9] Tversky, A. and Kahneman, D. Judgment under uncertainty: Heuristics and biases. *185(4157):1124*.