Self-Presentation

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What Is Self-Presentation and Why Does It Matter?

- **Self-presentation** involves:
  - how people evaluate themselves
  - the strategies they use to communicate their confidence and shape how others perceive them

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- **Self-presentation** involves:
  - how people evaluate themselves
  - the strategies they use to communicate their confidence and shape how others perceive them
- Self-presentation may influence labor market outcomes through:
  - job applications
  - salary and promotion reviews
  - how we communicate more generally

Background

A range of individual traits has been linked to labor market and social outcomes and can influence *educational and occupational choices, earnings and how others perceive and respond to them*:

- IQ: Heckman et al. 2006, Lindqvist and Vestman 2011
- Communication skills: Deming 2017, Kuhn and Weinberger 2005
- Creativity: Gill and Prowse 2021
- Physical strength: Persico et al. 2004
- Attractiveness: Mobius and Rosenblat 2006, Bóo et al. 2013, Ruffle and Shtudiner 2015, Doorley and Sierminska 2015, Scholz and Sicinski 2015, Deryugina and Shurchkov 2015, Hale et al. 2023

Background

- Beliefs are important, yet individuals often hold biased beliefs about their own abilities Barber and Odean 2001; Darwin 2005; Koellinger et al. 2007; Eil and Rao 2011; Benjamin 2019; Coutts 2019; Thaler 2021; Drobner 2022; Esponda et al. 2024; Agranov and Reshidi 2024

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- The confidence individuals choose to display can significantly influence others, sometimes more than actual ability (Schneider et al. 2024)

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- The confidence individuals choose to display can significantly influence others, sometimes more than actual ability (Schneider et al. 2024)
  - Candidates displaying higher self-confidence are more likely to be hired, perceived as suitable, and invited to subsequent interviews (Dimopoulos 2020)

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- The confidence individuals choose to display can significantly influence others, sometimes more than actual ability (Schneider et al. 2024)
  - Candidates displaying higher self-confidence are more likely to be hired, perceived as suitable, and invited to subsequent interviews (Dimopoulos 2020)
  - But displaying too much confidence can raise credibility concerns (Soldà et al. 2021)

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- Beliefs about one's own abilities and traits
- Self-presentation strategies

Gap in the Literature

- Studies on (biased) beliefs (e.g., Eil and Rao 2011; Benjamin 2019)
- Studies on displayed confidence (e.g., Dimopoulos 2020; Soldà et al. 2021)

These two strands have been studied separately — not jointly.

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This Paper

- We design experiments that separately elicit:
  - Private confidence (reported only to the experimenters)
  - Shared confidence (reported to other participants and experimenters)
- This allows us to:
  - Identify the types of self-presentation strategies that people follow

This Paper

- Document the self-presentation strategies individuals adopt

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- Document heterogeneity based on individual characteristics
- Quantify the impact of self-presentation strategies on the informativeness of shared confidence

Experimental Design

- 120 sessions (3–5 participants per session)
- 484 subjects from Washington University in St. Louis

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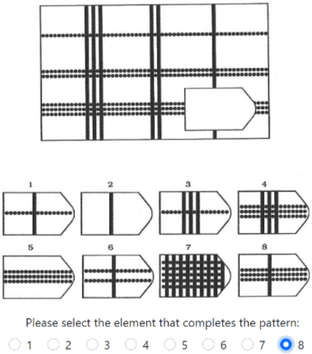
- Introduction: name and one hobby
- Three main tasks:
  - Two ego-relevant tasks
  - One ego-irrelevant task
- Final questionnaire (demographics + open-ended questions)
- Comprehension checks at various points

IQ Task

- 30 multiple choice questions
- 5 minutes to answer as many as they can
- Score: # of correct answers - # of incorrect answers
- Earnings: $0.2 * Score

- Report their confidence in being in the top half (raven score above or equal to the median score)
  - Privately
  - Share with other participants



Beauty Task

- Participants ranked others by attractiveness
  (1 = most attractive, 2 = second most attractive, etc.)

- Report their confidence in being in the top half (attractiveness score below or equal to the median score)
  - Privately
  - Share with other participants

Suitcases Task

- Report their confidence that the first suitcase is more expensive than the second
  - Privately
  - Share with other participants

Experimental Design

- **Tasks:**
  - Ego-Relevant Tasks: Report confidence in being in the top half
    - IQ
    - Beauty
  - Ego-Irrelevant Task: Report confidence that one suitcase is more expensive than the other
    - Suitcases
- **Treatments:**
  - Individual Feedback: At the end of the task, subjects learn only their own outcome.
  - Public Feedback: At the end of the task, each subject learns everyone's outcomes.
- Each subject completed all tasks within one of the two treatments
- Half the sessions started with the IQ task; the other half with the Beauty task

Details

Individual vs Public Feedback

Confidence Revelation Results

Below is the list of participants, their hobby, and the confidence level they chose to reveal.

Name	Hobby	Confidence: Top Half (%)
Stella	Table Tennis	80.0%
Leah	Listening to music	60.0%
Michael	Cooking	30.0%

Continue

Confidence Revelation Results

Below is the list of participants, their hobby, the confidence level they chose to reveal, and whether they rank in the top half.

Name	Hobby	Confidence: Top Half (%)	Performance (top/bottom half)
Stella	Table Tennis	80.0%	bottom
Leah	Listening to music	60.0%	top
Michael	Cooking	30.0%	top

Continue

Key Terms

- **Private Confidence**: Confidence shared only with the experimenters
- **Shared Confidence**: Confidence shared with other participants
- **Discrepancy**: Shared Confidence - Private Confidence
  - Over-reporting: Shared Confidence > Private Confidence
  - Under-reporting: Shared Confidence < Private Confidence
- **Treatments**
  - Individual Feedback: Subjects learn only their own outcome
  - Public Feedback: Each subject learns everyone's outcomes

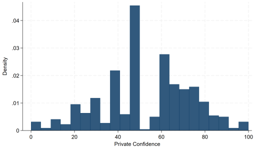
Data Collection

	Individual	Public
Sessions	60	60
Participants	237	247

- Preregistered on Jan 26, 2025
- Ran from Jan 27 to March 3, 2025
- Each session lasted around 30 minutes with 3–5 participants
- 484 subjects recruited (267 females, 210 males)

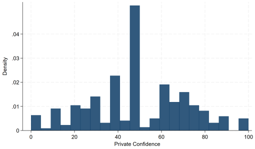
Private Confidence

IQ



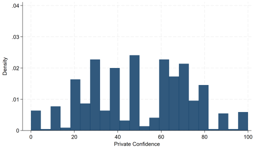
Avg = 53

Beauty



Avg = 50

Suitcases



Avg = 50

Confidence Adjustment

- IQ: 39%
- Beauty: 46%
- Suitcases: 26%

Results

- How do individuals form self-presentation strategies when sharing their confidence with others?

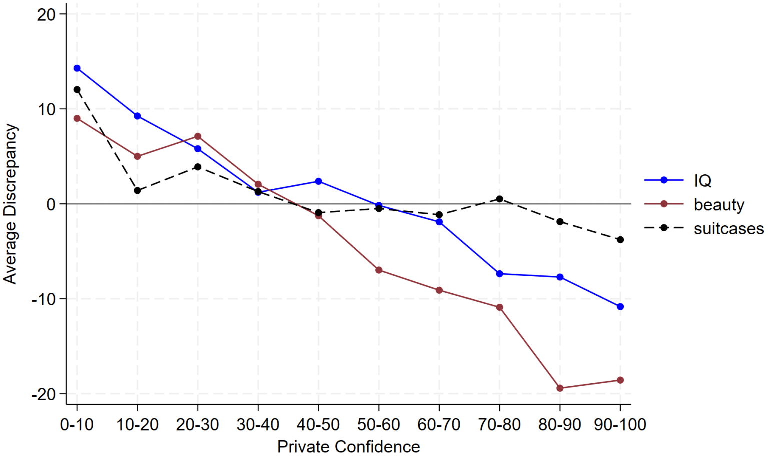
Bias Towards the Middle

Subjects adjust the confidence they share so that:

- When their private confidence is **low**, they share a **higher** level with other participants than their private confidence.
- When their private confidence is **high**, they share a **lower** level with other participants than their private confidence.

This effect is stronger for ego-relevant tasks.

Bias Towards the Middle



Bias Towards the Middle

Dependent Variable: Discrepancy	IQ	Beauty	Suitcases
Private-confidence	-0.251^{***}	-0.328^{***}	-0.113^{***}
	(0.044)	(0.033)	(0.032)
Constant	13.90^{***}	13.84^{***}	6.71^{***}
	(2.61)	(1.72)	(1.93)
F-tests of slope differences:			
IQ = Suitcases	p-value = 0.011		
Beauty = Suitcases	p-value = 0.000		
IQ = Beauty	p-value = 0.161		

- Adjustment is stronger in ego-relevant tasks

Details

Ego-Relevance Increases Under-reporting

- Subjects under-report significantly more often in ego-relevant tasks compared to ego-irrelevant tasks, but no difference in over-reporting.

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- Subjects under-report significantly more often in ego-relevant tasks compared to ego-irrelevant tasks, but no difference in over-reporting.
- The downward adjustment of high confidence is driven by ego-related motives, whereas the upward adjustment of low confidence reflects a broader confidence reporting strategy not influenced by the nature of the task.

Ego-Relevance Increases Under-reporting

	Over	Under	*p*-value (Over vs Under)	Total
IQ	18%	21%	0.354	39%
Beauty	17%	29%	0.001	46%
Suitcases	15%	11%	0.149	26%
p-value				
IQ vs Suitcases	0.270	0.000		0.000
Beauty vs Suitcases	0.477	0.000		0.000
IQ vs Beauty	0.695	0.010		0.051

Robustness Checks: Strategic Under-reporting

Main Claim

Subjects under-report significantly more in ego-relevant tasks.

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Main Claim

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Interpretation: Avoiding high confidence is a strategic choice aimed at shaping how others perceive them—possibly to avoid appearing arrogant.

We rule out two alternative explanations:

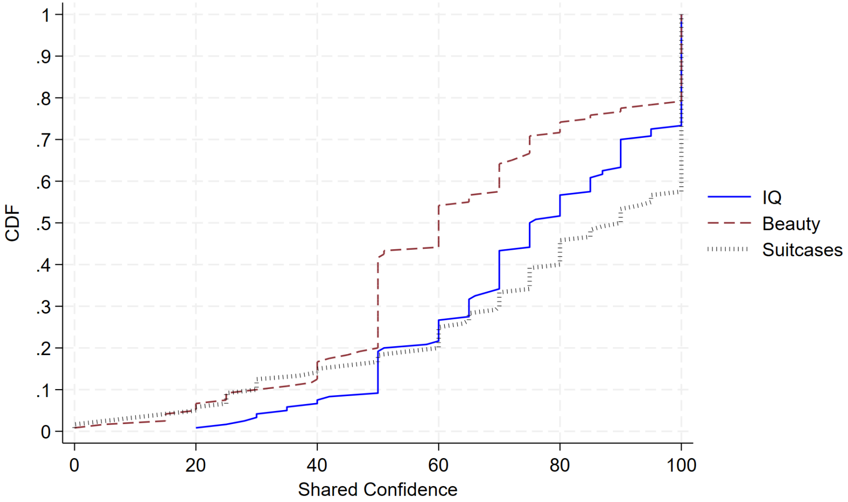
- **Belief revision:** Lower confidence reflects discomfort with public disclosure rather than impression management.

Do highly confident people under-report because they don't trust their own beliefs?

No Uncertainty

You have been randomly selected to receive this exclusive information. Your raven test score places you in the top half. Therefore, the correct confidence percentage that you are in the top half is **100%**. You are the only one in this session to receive this information, and no one else will find out you got it!

Underreporting Is Not Driven by Doubt in One's Own Beliefs



- IQ - Suitcases: p-value = 0.071
- Beauty - Suitcases: p-value = 0.000
- IQ - Beauty: p-value = 0.000

Robustness Checks: Strategic Under-reporting

Main Claim

Subjects under-report significantly more in ego-relevant tasks.

Interpretation: Avoiding high confidence is a strategic choice aimed at shaping how others perceive them—possibly to avoid appearing arrogant.

We rule out two alternative explanations:

- **Belief revision:** Lower confidence reflects discomfort with public disclosure rather than impression management.
- **Fear of exposure:** Subjects avoid high confidence due to fear of being proven wrong in front of others.

Do highly confident individuals under-report their confidence out of fear of being proven wrong?

Under-reporting Is Not Driven by Fear of Being Proven Wrong

- Treatment observability does not affect confidence revelation strategies.

Under-reporting Is Not Driven by Fear of Being Proven Wrong

Dependent Variable:	Over-reporting		Under-reporting	
	IQ	Beauty	IQ	Beauty
Public	-0.300	-0.267	-0.153	-0.163
	(0.273)	(0.303)	(0.317)	(0.265)
Private Confidence	-0.035^{***}	-0.047^{***}	0.047^{***}	0.071^{***}
	(0.007)	(0.007)	(0.010)	(0.011)
Constant	0.265	0.461	-3.946^{***}	-4.597^{***}
	(0.366)	(0.331)	(0.673)	(0.636)
Observations	364	364	364	364

Notes: Logit regressions. Standard errors clustered at the session level in parentheses. $^{***}p < 0.01$, $^{**}p < 0.05$, $^{*}p < 0.10$.

Heterogeneity Analysis

Heterogeneity Analysis

Gender Heterogeneity

- Female participants under-report significantly more than male participants in the IQ task.
- This gender gap disappears once participants receive information about their relative performance.

Interpretation: Women are not less strategic, but may place less trust in their private beliefs about cognitive ability.

Socioeconomic Heterogeneity

- Participants from more educated families over-report less in the IQ task.

Interpretation: They may feel more secure in their abilities and less pressure to signal competence.

- How do self-presentation strategies affect the informativeness of shared confidence levels?

Self-presentation strategies reduce the informativeness of signals

Strategic self-presentation leads shared confidence to be less informative than private confidence.

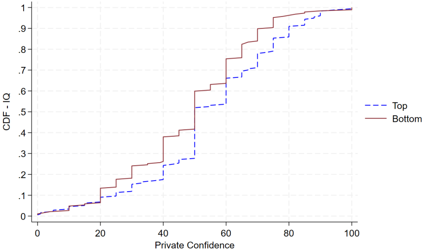
High performers under-report more, and low performers over-report more.

As a result, shared confidence reflects actual performance and traits less accurately than private confidence.

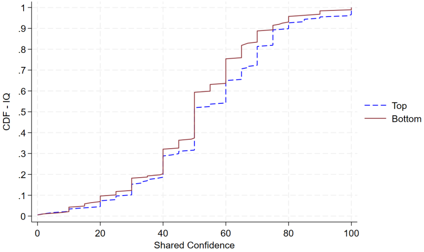
Self-presentation strategies reduce the informativeness of signals

- Individuals in the top half tend to be more confident than those in the bottom half.
- Bias toward the middle:
  - High performers under-report more
  - Low performers over-report more
- As a result, the shared-confidence distributions for top versus bottom performers overlap more than the private-belief distributions.
- Harder to distinguish ability from shared confidence alone.
- And as a result, shared confidence reflects less accurately true characteristics than private confidence

IQ



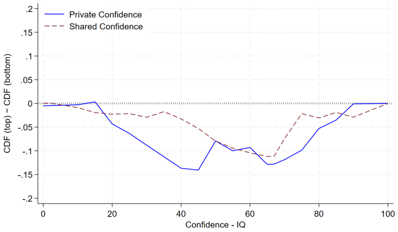
p-value = 0.055



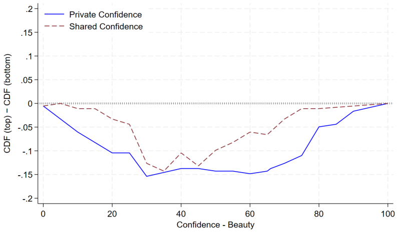
p = 0.164

Beauty

CDF Differences by Task



IQ



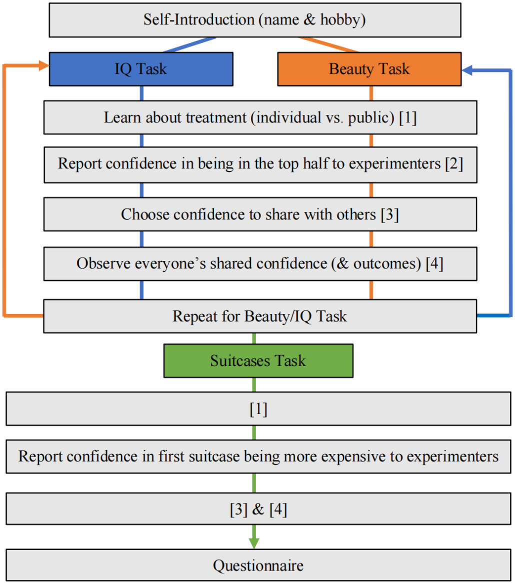
Beauty

Conclusion

- Previous work has studied beliefs and displayed confidence separately, but **not jointly**. Studying them jointly allows us to examine self-presentation strategies.
- Bias towards the middle.
- Subjects significantly under-report in ego-relevant tasks, likely to avoid appearing arrogant.
- Heterogeneity based on gender and socioeconomic background.
- These adjustments make shared confidence further from actual outcomes than private beliefs.
- Evaluators should rely on structured performance assessments rather than expressed confidence.

Appendix

Sequence of tasks



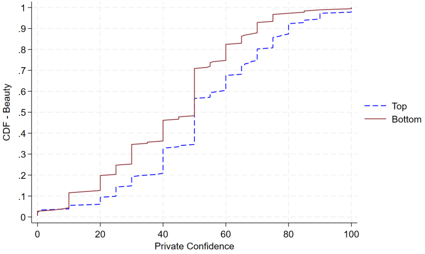
Back

Robustness Checks

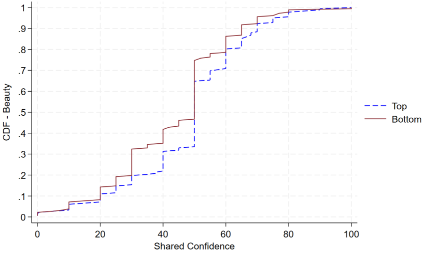
1. The data do not fit the white noise model.
2. Different behavior in ego-relevant and ego-irrelevant tasks.
3. We observe asymmetries between over- and under-reporting.
4. Subjects explained their adjustments in open-ended responses:
    - Over-reporting: to avoid looking weak or unconfident (e.g., "I didn't want to seem unconfident")
    - Under-reporting: to avoid appearing arrogant or overly competitive (e.g., "I didn't want to look arrogant")

Back

Beauty



p-value = 0.020



p-value = 0.049

Back: IQ