ExpEcon Methods: Why Incentivize??

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Why Pay?

Is there *really* a reason to pay subjects?

- I *still* get asked this pretty frequently.
- Ned Augenblick: “Why are we fetishizing incentives?”
- Danz Vesterlund Wilson (2022): Pay but don’t explain
- Enke-Graeber: Unincentivized measure of decision confidence

What do the data say?? This should be an empirical question...

The Effect of Incentives

Camerer and Hogarth [1999] remains the classic reference
They compare hypothetical, low, high payments.

1. Modal results don't change
2. ↑ payments reduce noise
3. ↑ payments induce more effort, performance
4. ↑ payments reduce desirability bias (generosity, risk-seeking)
5. Cognitive capital and costs are important, too
6. Rationality violations still persist with ↑ payments

The Effect of Incentives

Gneezy and Rustichini [2000] test various payment levels

1. IQ task
    - U-shaped performance. “Pay enough or not at all”
2. Hire HS students to soliciting money for charity
    - U-shaped performance
    - No pay > high pay > low pay

Are these tasks similar to typical experiment tasks?

The Effect of Incentives

Brañas-Garza et al. [2021]: donate x% of your lottery winnings.
High stakes $\uparrow$ total giving, but $\downarrow$ fraction, $\downarrow$ 100% giving

Ultimatum game:

- Slonim and Roth [1998]
- Andersen et al. [2011]

Hypothetical Incentives & Beliefs

Why pay for beliefs? The mechanisms are complex Danz et al. [2022]
Arguments in favor:

1. Induces subjects to take time to report truthfully
2. Might improve beliefs if belief formation is costly
    - But do we want that?? Discuss.
3. Smith's dominance [Wilde, 1981, Smith, 1982]
    - Stated beliefs used to justify selfish behavior [Blanco et al., 2010]
    - Wanting to appear more confident than they are
    - Example: salesperson

Hypothetical Incentives & Beliefs

Arguments against paying:

1. Not needed; people don't like to lie [Gneezy, 2005, Fischbacher and Föllmi-Heusi, 2013]
2. Mechanism not IC for actual people
    - Complex mechanism w/ flat maximum can crowd out intrinsic motive to report truthfully.
    - Danz et al. [2022]: calculator screws up responses

Hypothetical Incentives & Beliefs

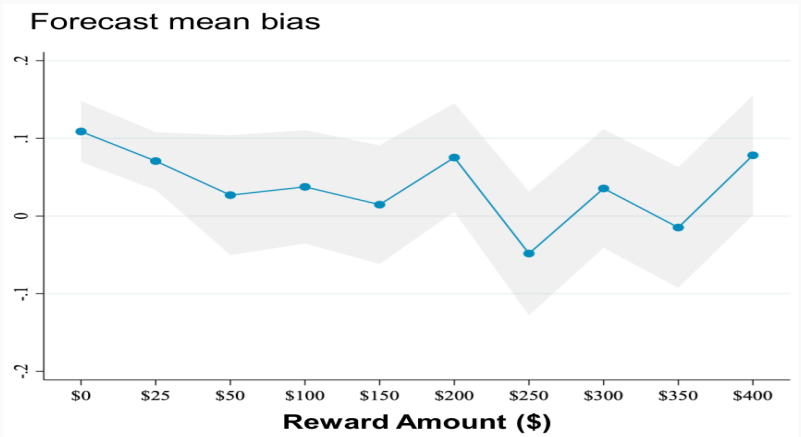
OK but what do the data say? This is a science...
Studies that show incentives improve beliefs:

- Posteriors closer to Bayes [Phillips and Edwards, 1966, Grether, 1980, Wright and Anderson, 1989]
- Burfurd and Wilkening [2022]:
  - People w/ basic grasp of Bayes's Rule: ↓ errors
  - People w/out grasp of Bayes: Update required: no difference
    No update required (uninformative signal): incentives are worse!
- Wright and Aboul-Ezz [1988]: beliefs closer to truth (eg, average GMAT scores)
- More accurate beliefs in games [Gächter and Renner, 2010, Wang, 2011]
- Harrison [2014] complex patterns of hypothetical bias
  - Paying a flat fee largely fixes it!!

Hypothetical Incentives & Beliefs

Studies that show incentives improve beliefs:

- Incentives improve belief formation
  - No incentives $\Rightarrow$ default/focal values (50% or 100% [Massoni et al., 2014, Burfurd and Wilkening, 2022]
  - And $E \succ E^C$ yet $p(E) < 1/2$ [Grether, 1992]
- Incentives reduce noise
  - Camerer and Hogarth [1999], Gächter and Renner [2010], and Trautmann and van de Kuilen [2015]. Paying for power!
- Higher incentives reduce overconfidence
  - Bloom et al. [2025]: firms guess future revenue
  - Paid $\$x$ if guess is within $\pm 10\%$ (what does that elicit?)



Hypothetical Incentives & Beliefs

Studies that show no or even negative effect of incentives:

- Sonnemans and Offerman [2001] and Trautmann and van de Kuilen [2015]
- BDM vs. Unincentivized
  - Massoni et al. [2014]: tie
  - Hollard et al. [2016]: BDM $\succ$ no pay
- Armantier and Treich [2013] incentives are worse, but could be due to risk aversion
- Trautmann and van de Kuilen [2015]: look at $p(E) + p(E^C) = 1$
  More often true *without* incentives.

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