Client-Advisor Matching in Financial Advice

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Problem

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- increasing complexity of financial products (Célérier & Valée, 2017)
- highlights crucial role of financial advisors to guide inexperienced investors

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- in Germany alone, percentage of individuals consulting a financial advisor for banking transactions as high as **42%**

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- limited degree of following proposed strategies (2/3 of households completely ignore advice; Stolper, 2018)

Problem

Advice is in many cases not tailored to the clients' needs, despite it being ubiquitous and having a huge potential impact on the clients' wealth.

Contribution:

- first test of a matching mechanism between clients and advisors
- online experiment with **relevant subject groups** (general population & financial advisors)
    - potentially different behavior to student subjects (Kirchler et al., 2018)
    - adds external validity

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$\rightarrow$ create an isolated environment where it is possible to test the characteristics of a potentially successful, simple mechanism
$\rightarrow$ also direct elicitation of "what an optimal advisor looks like"

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- **delegation:** important factor for advisory side (payoff!) - but also potentially increases decision making quality of clients (translate clients' risk attitudes in actual portfolio choice)

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- **delegation:** important factor for advisory side (payoff!) - but also potentially increases decision making quality of clients (translate clients' risk attitudes in actual portfolio choice)
- **satisfaction:** if clients are not satisfied, they will choose another advisor

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Important "side note":

- My **measure of the quality** of financial advice is the advisor's willingness and ability to translate their clients' risk attitudes into a portfolio choice.

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- This contrasts the more paternalistic view on financial advice, where the role of an advisor is to "nudge" - or at least direct - the, on average, relatively risk averse client to select a more risky portfolio with potentially higher returns.

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- This contrasts the more paternalistic view on financial advice, where the role of an advisor is to "nudge" - or at least direct - the, on average, relatively risk averse client to select a more risky portfolio with potentially higher returns.
- Eventually, I can infer that this is *desired by clients* from the results to a certain extent.

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2. Homophily is a predictor of whether a client chooses to delegate the investment decision to a financial advisor (Stolper & Walter, 2018) – matching on similarity predicts an increase in delegations.

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2. Homophily is a predictor of whether a client chooses to delegate the investment decision to a financial advisor (Stolper & Walter, 2018) – matching on similarity predicts an increase in delegations.

This is a bit of a sneak preview: As it turns out, these variables are actually also matching criteria that are *desired* by prospective clients.

Method - Experimental Design

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General Population:
Prolific.co

Financial Professionals:
web search, individual e-mails to employees from companies / self-employed advisors

Project consists of

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BACKGROUND INFO SURVEY

- General Population & Financial Professionals (**not** same people as for investment experiment)
- Aim:
  - *Clients:* establish that *closeness* in *risk attitudes* are actually a criterion clients want to be matched upon
  - *Advisors:* baseline measure for reported risk attitudes

Investment Experiment

Participants:
- 191 clients
- 64 advisors

Timeline

Stage I	Clients: Risk Attitude Elicitation & Investment Experiment
Stage II	Advisors: Risk Attitude Elicitation & Matching & Investment Experiment
Stage III	Clients: Delegation Decision (own allocation vs advisor's allocation relevant)

Main body of investment experiment:

- endowment of 1,000 Taler (= experimental currency)

- split endowment between **risk-free** and **risky** investment
    - **risk-free**:   > fixed return of 1.7%

    - **risky**:   > expected return of 3.2%
                         > standard deviation of 12.9%
                         > Beta to the DAX 1.00 during whole time period
                         > skewness of distribution during whole time period 0.166

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Distribution of asset returns based on historical data from the BMW.DE stock in the period between October 1998 and October 2019.

Risk-free return calculated from 3-months quarterly returns of the EURIBOR (FIBOR before 1999) in the 20-year period between October 1998 and October 2019.

Important features of the design:

- simple enough to administer in a short time (constraints for advisors!)
- Beta and skewness as additional information that is potentially only understood by financial advisors (information advantage) – mimics real-life characteristic of advice

CLIENTS:

- investment decision for themselves

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ADVISORS:

- investment decision for themselves

  AND

- for assigned clients - matching on **risk attitudes** depending on treatments

Risk Attitudes as included in the protocol for financial advice

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Lower Risk						Higher Risk
typically lower return						typically higher return
1	2	3	4	5	6	7

2. Risk bearing capacity
   Imagine you had a sum of 1,000 Euro that you want to invest.
   I could bear a loss of the invested sum up to the following percentage:

   (Answers possible on a Scale from 0% = 'no loss at all' to 100% = 'total loss' in 10%-increments)

Two treatments:

1. RANDOM MATCHING
   - **random** allocation of advisors to clients (random in terms of *risk attitudes* – this mimics the majority of real-life cases)
   - 3 clients per advisor

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   - allocation of advisors to clients in terms of **closeness** in stated risk attitudes – the more similar the attitudes, the higher the likelihood of being matched
   - specifically: maximum advisor-client distance in risk bearing capacity are 2 scaling points (as measured by the respective response scale); in risk return scale is 1 scaling point
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Ad 1): Allows to exploit **exogenous distance** in risk attitudes.

Ad 2): When advisors are aware of their (on average) higher risk tolerance than clients, they might want to **misreport** their own characteristics **to be allocated to more clients**.

Client's/Advisor's own decision
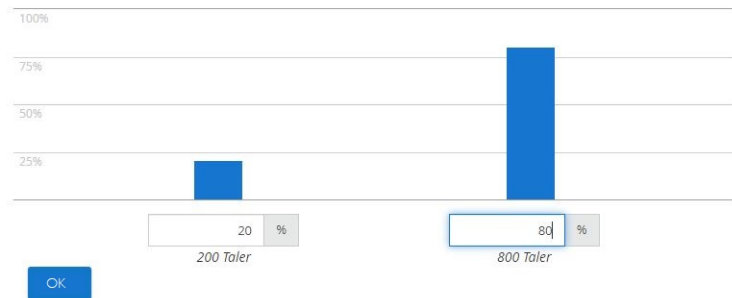
Advisor's decision for client(s)
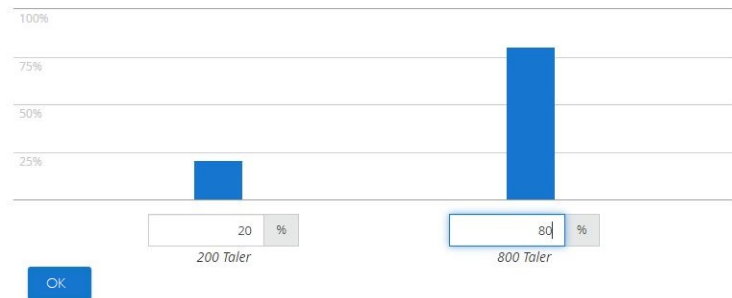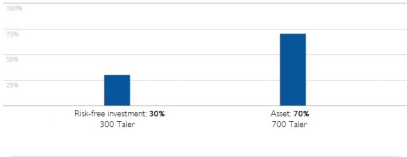
Delegation decision:

- information about own allocation decision
- information about risk attitudes of financial advisor
- decision about own payment / payment based on advisor's decision
- satisfaction with matched advisor (from 0 = 'not satisfied at all' to 10 = 'very satisfied')
- There is NO information given about the actual outcome of the own/advisor's decision

Reminder:
You decided as follows

Risk-free investment: **30%** 300 Taler   Asset: **70%** 700 Taler

Do you want to receive **your own payment** or the payment based on **your advisor's allocation**?

Your financial advisor has the following characteristics:

Your financial advisor could bear a loss of 50%.

Your financial advisor decided like that on the following scale:

Lower risk
typically lower return

Higher risk
typically higher return

1   7

Chosen level **6**

If you decide for the allocation chosen by your financial advisor, you will receive the earnings determined by his/her allocation as a Bonus Payment.
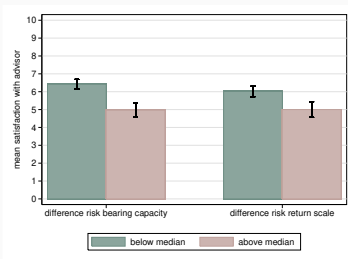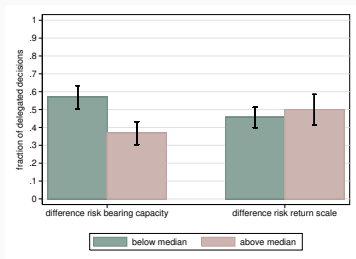
Please indicate your choice:

Please choose..

Results

Results Random Matching

2. Delegation probability and satisfaction with advisor significantly higher for clients close to financial advisor

below median = closer to financial advisor in terms of risk attitudes
above median = further away of financial advisor in terms of risk attitudes

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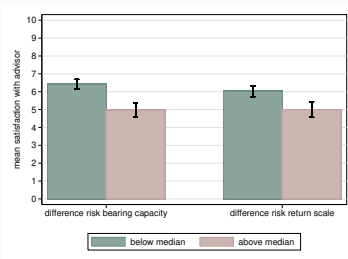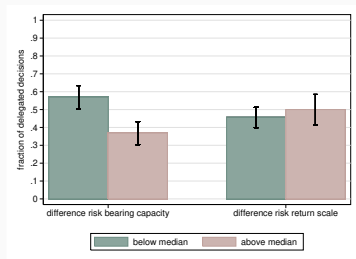
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Delegation:

- *risk bearing capacity: $p = 0.0319$*
- *risk return scale: $p = 0.6603$*

Satisfaction:

- *risk bearing capacity: $p = 0.0071$*
- *risk return scale: $p = 0.0550$*

(Mann-Whitney U tests, N = 155 – 40 prof, 115 general)

3. Clients' risk-return attitudes as well as their risk bearing capacity are a significant and robust predictor for the fraction of endowment invested in the risky asset by advisor

Dependent variable: Percentage of endowment invested in the risky asset			
	advisor for client		
	(1b)	(2b)	(3b)
CLIENT_RISK_BEARING	4.637***	4.370***	3.585***
	(1.027)	(1.082)	(1.214)
CLIENT_RISK_RETURN	6.232***	6.665***	6.992***
	(2.042)	(2.061)	(1.956)
ADVISOR_RISK_BEARING		-2.032**	-2.484**
		(0.901)	(0.931)
ADVISOR_RISK_RETURN		-0.860	1.359
		(1.734)	(2.200)
ADVISOR_RISK_GEN			-2.895
			(2.643)
ADVISOR_NUM_INDEX			4.545
			(2.889)
ADVISOR_FIN_INDEX			0.330
			(4.750)
ADVISOR_AGE			-0.213
			(0.309)
ADVISOR_GENDER			7.729
			(9.952)
ADVISOR_EDUCATION			5.428***
			(1.952)
CONSTANT	15.92**	30.80**	-12.89
	(6.270)	(14.60)	(28.23)
OBSERVATIONS	115	115	115
R-squared	0.361	0.417	0.507

Robust standard errors in parentheses, clustered on the advisor level
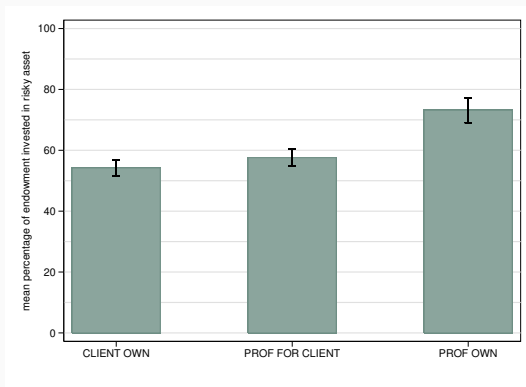*** $p<0.01$, ** $p<0.05$, * $p<0.1$

OLS regressions.

4. Majority of advisors is able to mimic their clients' own investment decision on the basis of the two risk measures
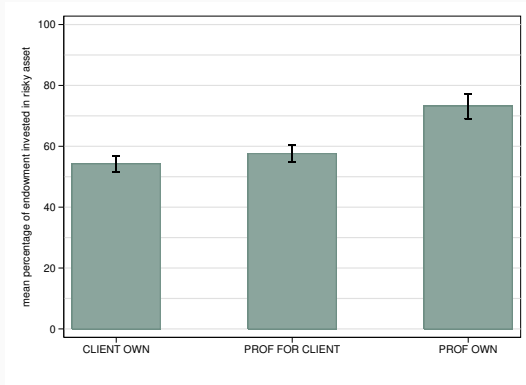
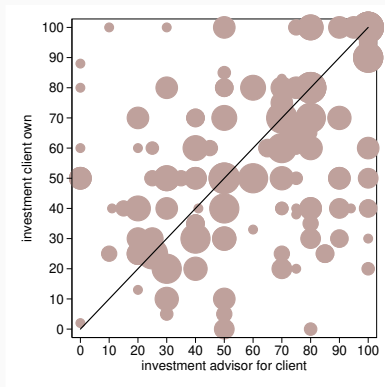4. Majority of advisors is able to mimic their clients' own investment decision on the basis of the two risk measures

- client own *vs* prof for client:
 $p = 0.3312$

- prof own *vs* prof for client:
  $p = 0.0000$

(Mann-Whitney U test / Wilcoxon signed-rank test)

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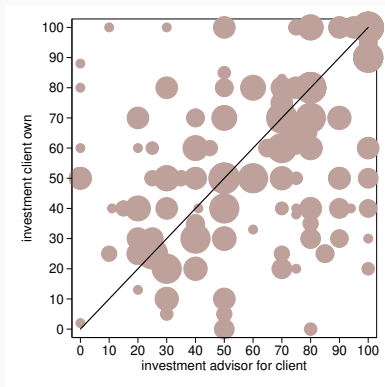

- 60% of advisor-client pairs have an absolute difference of $\leq$ 25 percentage points

Insofar as those are the optimal allocations made by clients, the **advisors' decisions are in the clients' best interest** – despite the incentives of the advisors being aligned with the clients' returns.
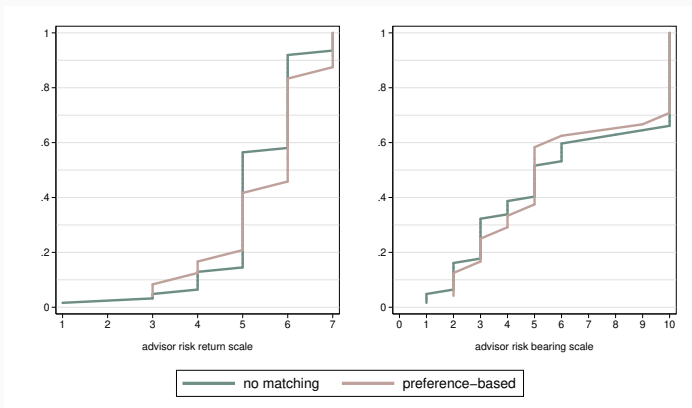
Results Preference-Based Matching

5. Advisors do not misstate their preferences to be paired with more clients
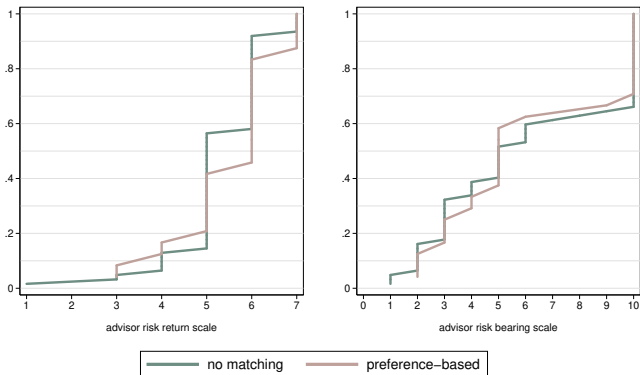
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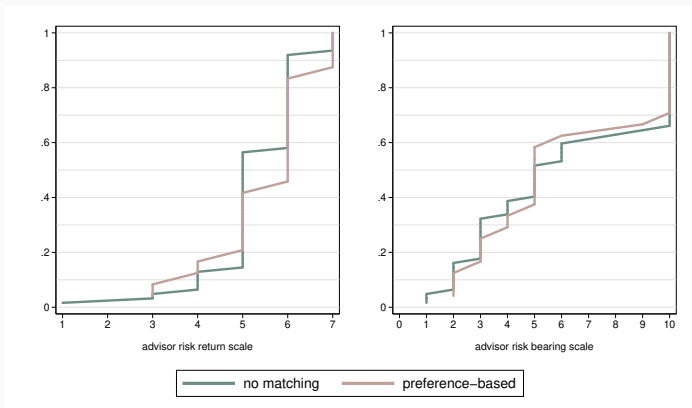- risk return scale: $p = 0.3173$
- risk bearing scale: $p = 0.8860$

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· risk return scale: $p = 0.3173$ · risk bearing scale: $p = 0.8860$

BUT: power – $(1 - \beta) = 0.0515$ and $(1 - \beta) = 0.1118$

(Kruskal-Wallis tests, N = 100 – 24 prof, 76 general)

Takeaway

Main Points

- Matching advisors and clients upon their similarity in risk characteristics can indeed improve the process of financial advice.

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- Improvement in this case is an increase in client satisfaction as well as a higher delegation probability.

- It is a particularly simple mechanism to implement, given that the two simple risk characteristics are already implemented on the client side in the regulated protocol for financial advice.