

Electoral Risk and Vote Buying, Introducing Prospect Theory in the Experimental Study of Clientelism

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Vote buying: distribution of private rewards to individuals during elections in exchange for electoral support (Nichter, 2014).



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- We contest these answers. Explain: traditional clientelism research has failed to answer these questions because it has a wrong understanding about the party's decision-making process under risk.

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- **Feedback wanted!**

Argument

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- ✓ **Are probable winners**—risk-averse in the domain of gains.
 - ✓ **Have experienced losses in the past (sunk costs)**—risk-seeking in the domain of losses.

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 1. Clientelist Targeting.
 2. Political Contestation.

Not Clear Who Clientelist Parties Target

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- We contend that this is a *very* important question, yet one that the literature has *failed* to answer.

Not Clear The Role of Political Contestation on Vote Buying

- The more contested an election, the more risks of losing the election, the more vote buying.

Scott (1972), Shefter (1977), Diaz-Cayeros (2008), Corstange (2018).

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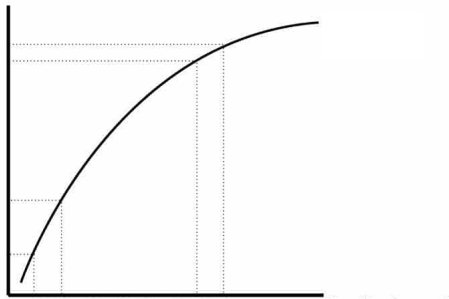
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- Why would a party buy such a massive amount of votes in a safe and uncontested election?

Wrong Understanding of Decision-Making Process under Risk

Change from traditional focus (EUT):

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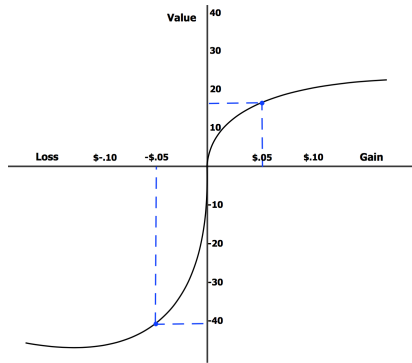
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To one based on Prospect Theory

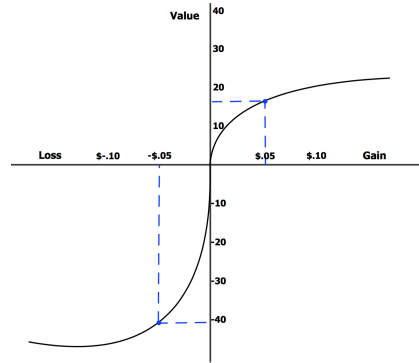
(Kahneman and Tversky, 1979):

1. **Reference dependence.**
2. **Likelihood dependence.**



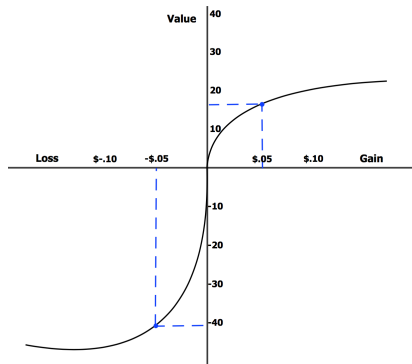
Prospect Theory

1. **Reference dependence.** Elements that influence decisions,



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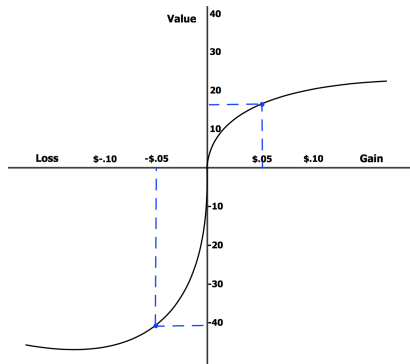
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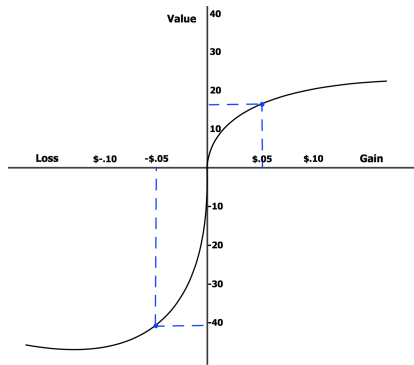
- ✓ **context** in which the decision-making processes take place.
- ✓ **changes of wealth**, rather than final asset positions.



Prospect Theory

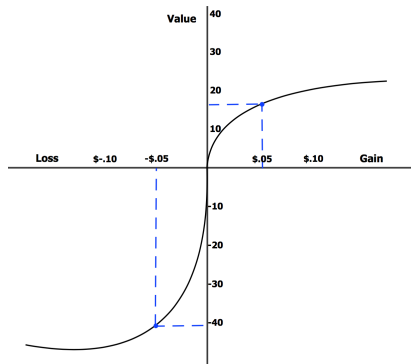
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- ✓ context in which the decision-making processes take place.
- ✓ changes of wealth, rather than final asset positions.
- ✓ sunk costs do matter.



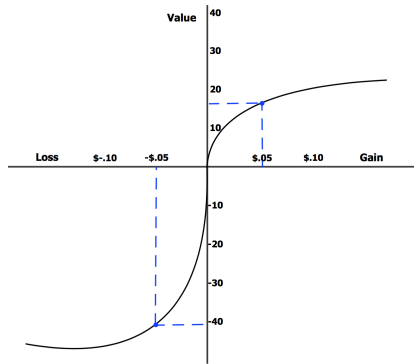
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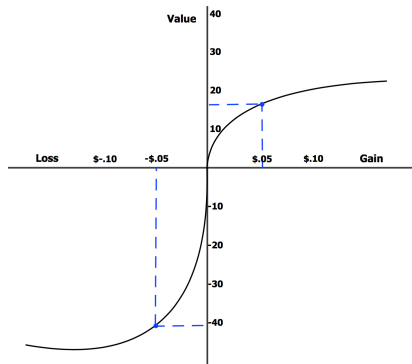
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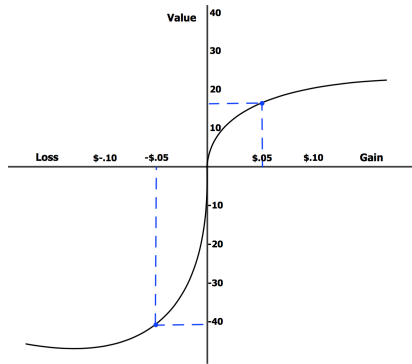
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- ✓ Individuals are **risk-acceptant** in the domain of **losses**.



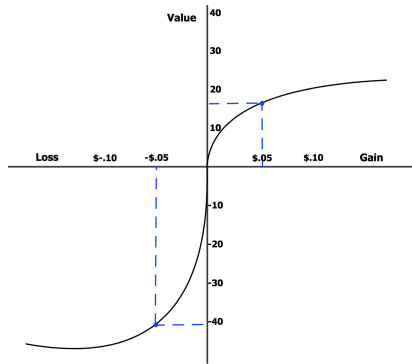
Prospect Theory: Implications for Decision-Making

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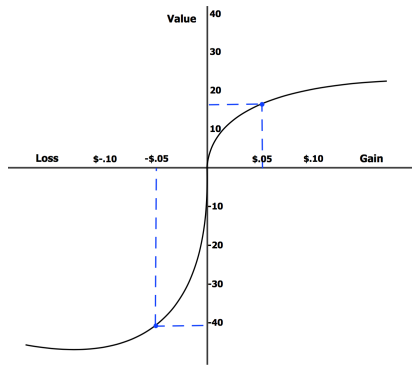
- **Overweighting:** in the domain of **losses**, the convexity of the function encourages **risk-seeking** behaviors by **exaggerating the probabilities of unlikely losses**.
- **Underweighting:** in the domain of **gains**, the concavity of the function encourages **risk aversion** by **undervaluing the probability of success**.



Prospect Theory: Implications for Vote-Buying

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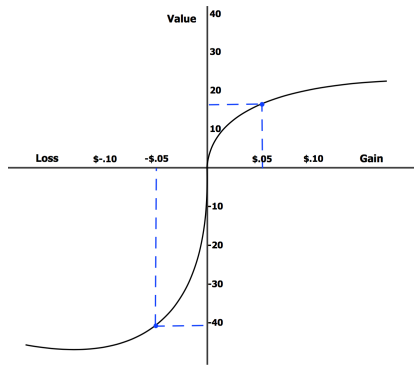
1. **Are probable winners:** parties will exaggerate the small probability of losing the election (**risk aversion**).



Prospect Theory: Implications for Vote-Buying

Vote-buying will be higher when parties,

1. **Are probable winners:** parties will exaggerate the small probability of losing the election (**risk aversion**).
2. **Have experienced losses in the past** (sunk costs): alter the reference point, making vote-buying an attractive strategy (**risk-seeking**).



A Formal Model of Vote-Buying

- Formal models can help experimentalists determine which theoretical settings and equilibria are most relevant to a particular causal hypothesis.

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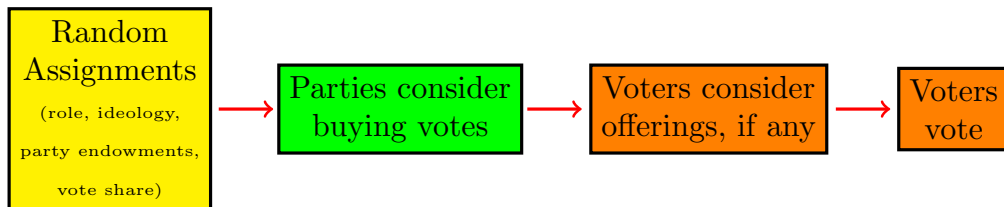
Downs (1957), Enelow and Hinich (1990), Plott (1991).

- The idea is to test the descriptive accuracy of the game-theory model in an experimental setting.

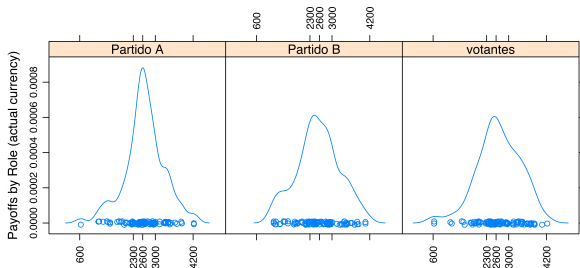
Lupia and McCubbins (1998), Bassi, Morton, and Williams (2011), Dickson (2011), Tyszler and Schram (2016), Vieider and Vis (2019).

- The experiment was conducted in Chile (April/May 2021).
- 0-tree (Z-tree). Fischbacher 2007.
- All participants were required to successfully complete two practice rounds.
- Show-up fee of \$2,000 CLP ($\approx 2.1\text{€}$).
- Every game was played between three people: two parties and one voter.
- All transactions were performed exchanging experimental “points.”
(1 point = \$0.42).
- 102 subjects were recruited.
- Each subject played the game three times ($N = 306$).
- In-between subjects experimental design.

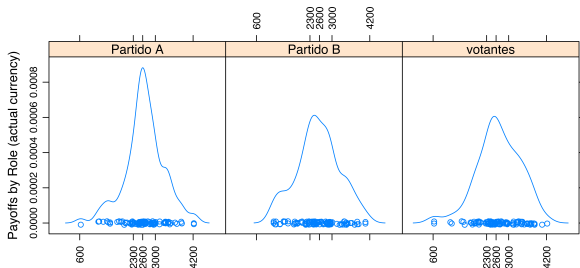
1. **Role:** *party A, party B* or *voter*.
2. **Voters:** “ideological position” (points depending on whether party A or B won election). Points reflect “spatial” distance between the voter and both parties (continuum 1–100).
3. **Parties:** endowments (points to buy votes, if any).
But both parties receive the same endowment in the same game.
4. **Parties:** vote shares (number of votes each party *will* receive—excluding the “voter” participant).
 - Every randomization was common knowledge.



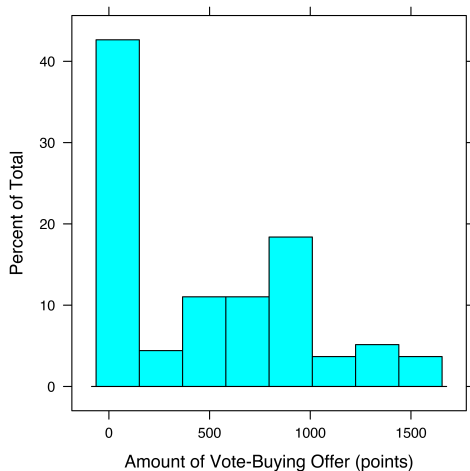
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- **Voters:** payoffs depend on whether their party is elected, and on whether they sell their vote. **Can't defect:** if they accept an offer, they vote for that party.



- Focus is vote buying (parties).
Voter data discarded.
- **Dependent variable:** the amount of the vote-buying offer made by parties (if any).
- If predictions of formal model are accurate, we should see that offers go up when the risk of losing the election is higher.



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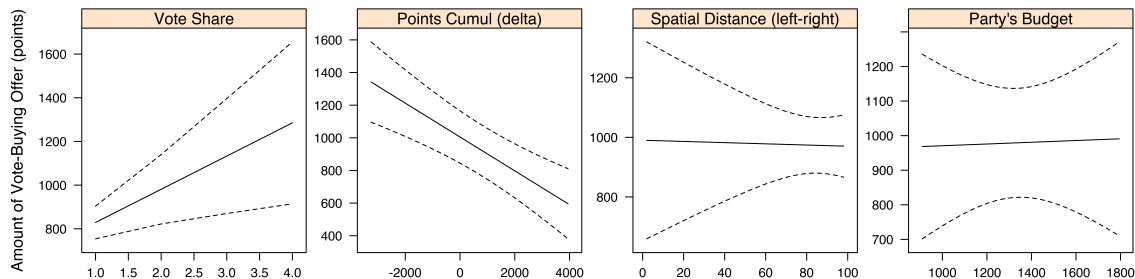
- Distance from the voter (points).

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- Party's budget (points).

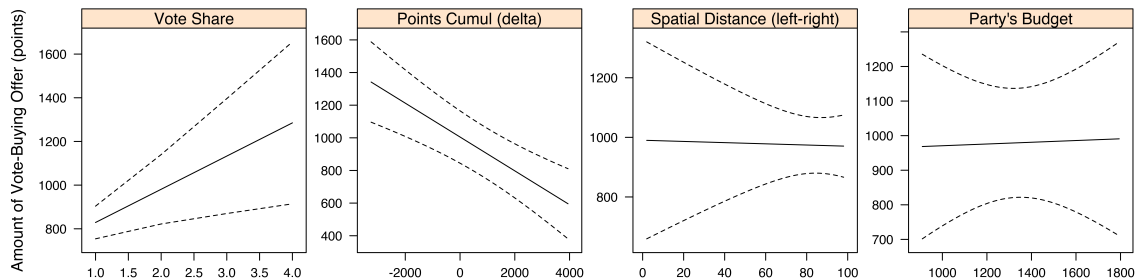
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- Participant fixed effects.

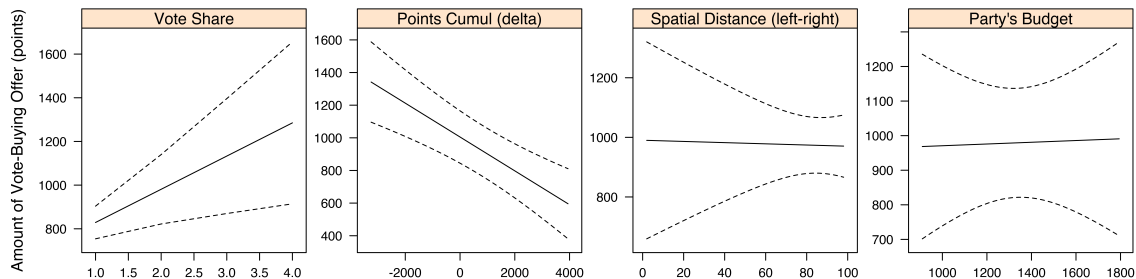


Overall, results conform with Prospect Theory's predictions.

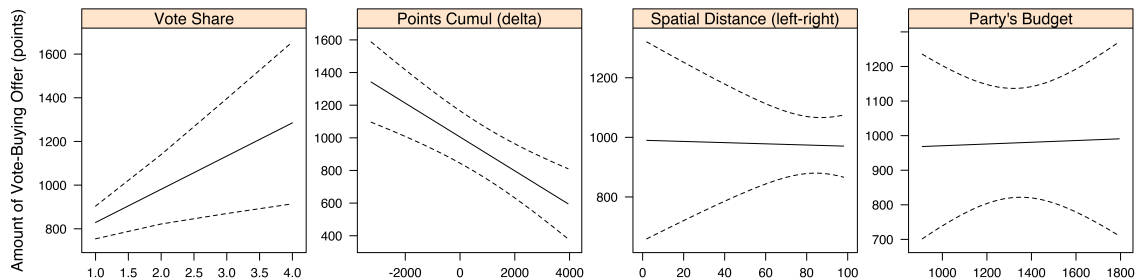
Robust std. errors used to construct confidence intervals.



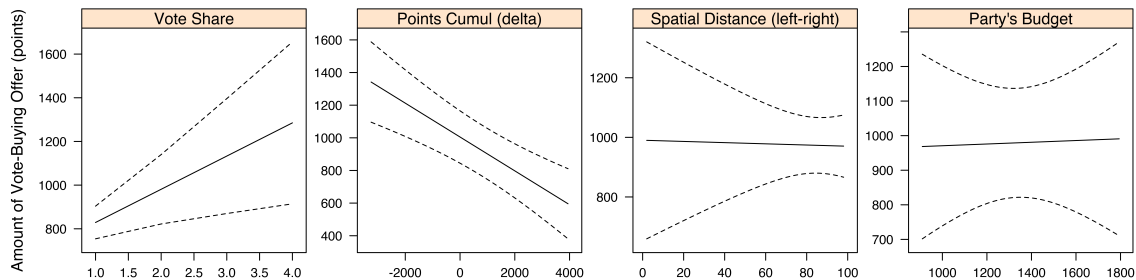
1. Parties buy more votes when are likely winners (not losers).



2. Decision-makers buy more votes when sunk costs are higher.



3. Spatial distances (core/swing) do not matter.



4. Party budget does not matter.

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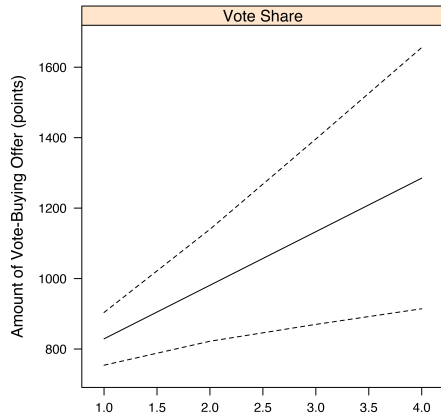
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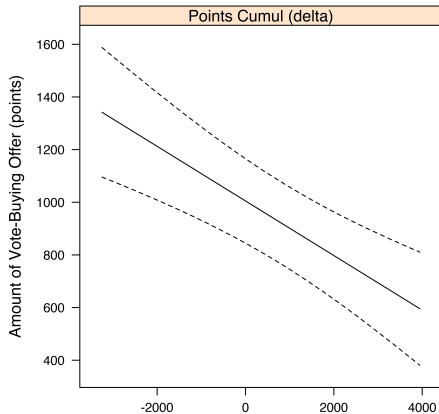
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- We introduced **Prospect Theory** in the vote-buying literature as an **alternative way to understand decision-making under risk**.
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- Results widely conform with Prospect Theory.

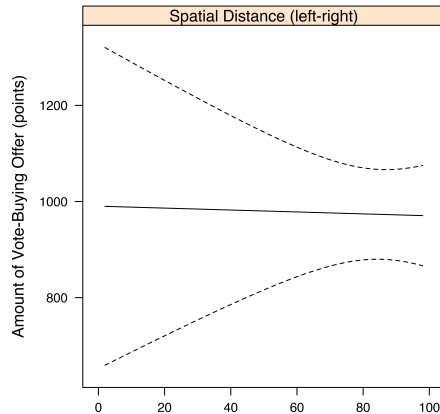
- Parties are risk-averse in the domain of gains: decision-makers exaggerate the probability of unlikely losses, so they buy more votes when are likely winners (not losers).



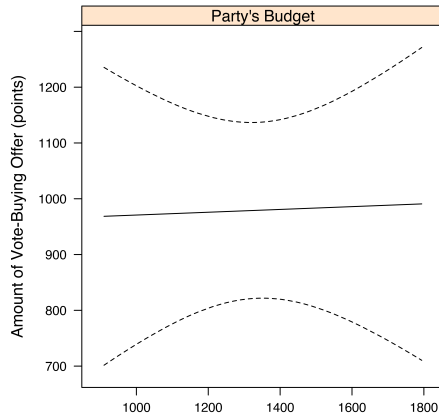
- **Parties are risk-seeking in the domain of losses:** unlike EUT theories predict, parties do consider sunk costs, buying more votes to compensate for past losses.



- **Core/swing voters:** voter types are not relevant for vote buying.



- **Party budgets:** unlike traditional theories, wealthier parties don't necessarily buy more votes.



Thank you



- Paper (draft) available at www.HectorBahamonde.com.
- All feedback is welcomed!

	role	variable	n	min	max	median	iqr	mean	sd	se	ci
1	Partido A	left.right	66	1	10	3	4	4	2	0	1
2	Partido B	left.right	66	1	10	4	3	4	2	0	1
3	votantes	left.right	68	1	10	3	3	4	2	0	1
4	Partido A	male	66	0	1	0	1	0	0	0	0
5	Partido B	male	66	0	1	0	1	0	0	0	0
6	votantes	male	68	0	1	0	1	0	0	0	0
7	Partido A	party.id	66	2	9	9	0	8	2	0	0
8	Partido B	party.id	66	1	9	9	0	9	1	0	0
9	votantes	party.id	68	1	9	9	0	8	2	0	0
10	Partido A	party.like	66	0	1	0	1	0	0	0	0
11	Partido B	party.like	66	0	1	0	0	0	0	0	0
12	votantes	party.like	68	0	1	0	0	0	0	0	0
13	Partido A	payoff	73	633	4224	2630	674	2621	670	78	156
14	Partido B	payoff	72	1148	4062	2592	710	2607	665	78	156
15	votantes	payoff	75	633	4224	2674	836	2664	697	80	160
16	Partido A	salary.enough	66	1	4	2	0	2	1	0	0
17	Partido B	salary.enough	66	1	4	2	1	2	1	0	0
18	votantes	salary.enough	68	1	3	2	0	2	1	0	0
19	Partido A	vote.last.election	66	0	1	1	0	1	0	0	0
20	Partido B	vote.last.election	66	0	1	1	0	1	0	0	0
21	votantes	vote.last.election	68	0	1	1	0	1	0	0	0
22	Partido A	vote.next.election	66	0	1	1	0	1	0	0	0
23	Partido B	vote.next.election	66	0	1	1	0	1	0	0	0
24	votantes	vote.next.election	68	0	1	1	0	1	0	0	0

Table: Summary Statistics

	OLS
	Amount of Vote-Buying Offer
Intercept	678.24 (492.02)
Vote Share	152.03 [*] (79.94)
Points Accumulated (delta)	−0.10 ^{**} (0.03)
Spatial Distance	−0.20 (2.75)
Party Budget	0.03 (0.37)
R ²	0.71
Adj. R ²	−0.05
Num. obs.	136

*** $p < 0.001$; ** $p < 0.01$; * $p < 0.05$; ^{cdot} $p < 0.1$.

Robust standard errors in parentheses.

Fixed effects parameteres omitted in table.

Table: Statistical Model (OLS): Amount of Vote-Buying Offer