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# Disposition effect and herding behavior in the cryptocurrency market

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[Steven Haryanto](#) [orcid.org/0000-0003-4912-8083<sup>1</sup>](https://orcid.org/0000-0003-4912-8083), [Athor Subroto<sup>1</sup>](#) & [Maria Ulpah<sup>1</sup>](#)

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## Abstract

This paper investigates two behavioral biases—the disposition effect and herding—using the Mt. Gox data between 2011–2013 in the bitcoin cryptocurrency market. Using trade round-trip and survival analysis, it shows the market exhibits a reverse disposition effect in bullish periods and the usual positive disposition effect in bearish periods. It finds evidence of herding in bearish as well as bullish periods using a return dispersion model. Additionally, it shows that herding moves along the market trend. Herding increases in both bullish and bearish periods when the bitcoin price increases and decreases, respectively.



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## Notes

1. In Nov 2018, Ohio announced that 23 Ohio taxes, including cigarette and tobacco taxes, and withholding tax, can be paid using bitcoin. Other cryptocurrency options will be considered in the future.

<https://www.wsj.com/articles/pay-taxes-with-bitcoin-ohio-says-sure-1543161720>.

2. Some have criticize the use of the term “cryptocurrency” to refer to J. P. Morgan Chase’s new digital asset JPM coin, because the network does not work quite like bitcoin but fully controlled by the bank. Hence the term “digital coin” instead. <https://www.jpmorgan.com/global/news/digital-coin-payments>.

3. News has been circulating as early as late 2018 that Facebook has been developing cryptocurrency for WhatsApp transfers as well as talking to cryptocurrency exchanges. <https://www.bloomberg.com/news/articles/2018-12-21/facebook-is-said-to-develop-stablecoin-for-whatsapp-transfers>.

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## Author information

## Authors and Affiliations

Steven Haryanto, Athor Subroto & Maria Ulpah

## **Corresponding author**

Correspondence to [Steven Haryanto](#).

## **Ethics declarations**

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### **Conflict of interest**

On behalf of all authors, the corresponding author states that there is no conflict of interest.

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