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THE ELITE AMONG USERS: IDENTITY FORMATION OF VENDORS AND CUSTOMERS ON DARKNET DRUG TRADE SITES

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Introduction

Darknet markets, also known as cryptomarkets, emerged as significant conduits for illicit drug sales throughout the 2010s and expanded to over a hundred platforms (e.g., Aldridge & Décary-Hétu, 2016; Dolliver & Kuhns, 2016; Gehl, 2018). Nowadays, a plethora of new sites have surfaced across various countries, engaging in the sale of illegal substances.

Recently, we have seen a burgeoning interest in studying online drug trade and cryptomarkets. Most scholarly efforts have been directed toward various aspects, including the substances sold and the scale of this trade (Morelato et al., 2020; Sudan et al., 2023). Additionally, user knowledge of these substances, secrecy and anonymity strategies, and building trust among participants have been studied (Bancroft, 2017; Grimani et al., 2020; Holt et al., 2016; Nurmi et al., 2017; Tzanetakis & South, 2023).

While these studies have significantly expanded our understanding of the scope of drug sales on the dark web, a comprehensive grasp of how these sites serve as spaces for individuals to construct and negotiate their identities, hence engaging with others, continues to elude the researchers (Harviainen et al., 2020). Additionally, the connection between these online identities and the broader identities prevalent within the so-called drug subculture or the social worlds of drug users (Sandberg, 2013; Wanke et al., 2022) still needs to be better understood.

The article aims to understand how users of darknet cryptomarkets curate their online personas, examining the formation of their identities and how these identities correspond with their self-perceptions and the images they wish to project. This inquiry centers on a case study of Cebulka, the largest Polish-language cryptomarket which hosts a variety of threads initiated by vendors. Each thread includes an opening post that contains advertisements, followed by subsequent posts featuring user comments.

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Although the study focuses specifically on one site, its findings have broader implications for several fields, as discussed in the concluding section.

Methods

The methodology employed in this study involved a dual-stage approach, integrating conventional content analysis (CCA) grounded in meticulous close-reading techniques (Hsieh & Shannon, 2005) with in-depth interviews of both vendors and buyers active on Cebulka. The first phase involved a comprehensive CCA based on the whole site's content scrapped in three waves, i.e.: January 2023; June 2023, and January 2024. 8,170 sampled posts have been analyzed, encompassing both sales offers and the comments that followed these offers. This stage was dedicated to a detailed examination of how vendors formulate their advertisements and how they convey their identities, leveraging text and imagery. Furthermore, the feedback provided by customers was analyzed with a focus on their satisfaction levels with the transactions and perceptions of the drug's qualities. This comprehensive analysis aimed to uncover the nuanced strategies of vendors' and buyers' presentation within the cryptomarket's ecosystem.

The insights from the CCA informed the second stage, which leveraged in-depth interviews (n=10) carried out in in-person and encrypted online communication channels from June 2023 to January 2024. This phase was about shedding more light on the self-conscious nature of online identity activities (Wessels, 2012) identified during the first stage. Additionally, interviews emphasized how Cebulka's users manage their online impressions (Berkelaar, 2017). The semi-structured interviews spanned a range of topics, including the behaviors and practices of both vendors and buyers, how these individuals choose to present themselves within the community, and the distinctive patterns of communication that emerge among users. Furthermore, perceived differences between drug users involved in darknet and traditional trading were investigated.

Results

Traditionally, some drug dealers attract customers by offering high-quality products and services, relying on word-of-mouth to enhance their credibility and, consequently, their profits (Coomber, 2003; Tzvetkova et al., 2016). This principle holds significant relevance and is a hallmark for vendors operating in Cebulka, where customer feedback in the form of positive comments plays a crucial role in informing others about the transaction experience. The CCA reveals that Cebulka's vendors engage in extensive promotional campaigns, highlighting the quality and variety of their offerings. These sellers construct their brand identities through pricing and diverse marketing strategies that include consistent and vivid visualizations, detailed descriptions, and product validations through laboratory testing. Meanwhile, consumers contribute to this ecosystem by sharing detailed feedback.

The interviews revealed an even more nuanced landscape, with statements organized into several subcategories and six primary categories, each denoted by the letter 'C' followed by a corresponding number (e.g., C1). A key finding is the universal distinction

made by respondents between themselves and clear web trading and street trading (C1). This distinction holds for both vendors and consumers who perceive their activities as superior to traditional street-level trading, often associated with shadowy figures in back alleys or with organized crime and non-safe social media trading. Moreover, a unanimous emphasis was placed on the enhanced knowledge possessed by those who operate in the Cebulka, compared to the traditional street market (C2). The interviewees pointed out the inferior quality and limited selection of drugs available outside the darknet (C3). This self-perception of heightened awareness regarding the substances they handle-encompassing their types, effects, and dosages-positions them as quasi-experts or connoisseurs (C4). The respondents also shared a belief that the darknet attracts individuals of higher social status (C5), defined not just in conventional terms like education but also through a distinctive 'approach' to drugs or the technical savvy required for safely navigating the darknet. Moreover, the interviewees underscored the clear separation between a person's darknet persona and their 'reallife' identity, encompassing the various roles and duties they assume in their family and professional lives (C6).

Discussion

Cebulka's users craft their identities based on the distinctions outlined, viewing themselves as an elite cohort within the drug user community. This perception manifests in their communication regarding product quality and brand development and in a subjective feeling of superiority and distinction from the average drug user.

This observation has significant implications for various interconnected areas. The article illustrates that the identities of individuals engaged in trade on the darknet are shaped collectively. Hence, social identity theory is pivotal in understanding the behavior and interactions of individuals on platforms like Cebulka (Flanagin et al., 2014). Additionally, theories of performance play a crucial role in explaining the formation of these identities (Talbot et al., 2022), emphasizing how users of these specific sites construct their digital personas. Unlike many studies that suggest a direct translation of offline identities to online (Hatef, 2022; Huynh et al., 2013), this research indicates a complex interaction between digital and 'real-life' personas or even a separation, rather than a straightforward connection.

This study aims to bridge the research gap highlighted in the Introduction. As such, it endeavors to unravel the complexities of drug trading within the darknet context, contrasting it with conventional trading methods and more accessible platforms on the clear web. This investigation is also crucial for understanding the broader subculture of drug users, suggesting that individuals active on the dark web might forge distinct identifications and identities. This paper sheds new light on symbolic boundaries among drug users (Copes, 2016), and also disrupts the traditional view of drug traders class background (Berger et al., 2023). Such insights could significantly influence efforts in harm reduction and the development of prevention policies.

Data Availability

The data underlying this article are available on Zenodo under the following DOIs:

https://doi.org/10.5281/zenodo.10810939, https://doi.org/10.6084/m9.figshare.25398268.v1.

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References

Aldridge, J., & Décary-Hétu, D. (2016). Cryptomarkets and the future of illicit drug markets. In *The Internet and drug markets* (pp. 23–32). http://daviddhetu.openum.ca/files/sites/39/2018/12/Future.pdf

Bancroft, A. (2017). Responsible use to responsible harm: Illicit drug use and peer harm reduction in a darknet cryptomarket. *Health, Risk & Society*, *19*(7–8), 336–350. https://doi.org/10.1080/13698575.2017.1415304

Berger, E. J., Pedersen, W., & Sandberg, S. (2023). Pathways to Drug Dealing in the Middle and Upper Classes: Early Marginalization, Relative Disadvantage and Countercultural Opposition. *The British Journal of Criminology*, *63*(4), 889–905. https://doi.org/10.1093/bjc/azac063

Berkelaar, B. L. (2017). How implicit theories help differentiate approaches to online impression management: A preliminary typology. *New Media & Society*, *19*(12), 2039–2058. https://doi.org/10.1177/1461444816654136

Coomber, R. (2003). There's No Such Thing as a Free Lunch: How "Freebies" and "Credit" Operate as Part of Rational Drug Market Activity. *Journal of Drug Issues*, *33*(4), 939–962. https://doi.org/10.1177/002204260303300408

Copes, H. (2016). A narrative approach to studying symbolic boundaries among drug users: A qualitative meta-synthesis. *Crime, Media, Culture, 12*(2), 193–213. https://doi.org/10.1177/1741659016641720

Dolliver, D. S., & Kuhns, J. B. (2016). The Presence of New Psychoactive Substances in a Tor Network Marketplace Environment. *Journal of Psychoactive Drugs*, *48*(5), 321–329. https://doi.org/10.1080/02791072.2016.1229877

Flanagin, A. J., Hocevar, K. P., & Samahito, S. N. (2014). Connecting with the usergenerated Web: How group identification impacts online information sharing and evaluation. *Information, Communication & Society*, *17*(6), 683–694. https://doi.org/10.1080/1369118X.2013.808361

Gehl, R. W. (2018). *Weaving the Dark Web: Legitimacy on Freenet, Tor, and I2P*. MIT Press.

Grimani, A., Gavine, A., & Moncur, W. (2020). An evidence synthesis of strategies, enablers and barriers for keeping secrets online regarding the procurement and supply of illicit drugs. *International Journal of Drug Policy*, 75, 102621. https://doi.org/10.1016/j.drugpo.2019.102621

Harviainen, J. T., Haasio, A., & Hämäläinen, L. (2020). Drug traders on a local dark web marketplace. *Proceedings of the 23rd International Conference on Academic Mindtrek*, 20–26. https://doi.org/10.1145/3377290.3377293

Hatef, A. (2022). "The Facebook is a state of Roma": Negotiating identities, building communities, and belongingness online among Roma in the Czech Republic. *New Media & Society*, *24*(2), 328–344. https://doi.org/10.1177/14614448211063174

Holt, T. J., Smirnova, O., & Hutchings, A. (2016). Examining signals of trust in criminal markets online. *Journal of Cybersecurity*, *2*(2), 137–145. https://doi.org/10.1093/cybsec/tyw007

Hsieh, H.-F., & Shannon, S. E. (2005). Three Approaches to Qualitative Content Analysis. *Qualitative Health Research*, *15*(9), 1277–1288. https://doi.org/10.1177/1049732305276687

Huynh, K.-P., Lim, S.-W., & Skoric, M. M. (2013). Stepping out of the Magic Circle: Regulation of Play/Life Boundary in MMO-Mediated Romantic Relationship. *Journal of Computer-Mediated Communication*, *18*(3), 251–264. https://doi.org/10.1111/jcc4.12011

Morelato, M., Medeiros Bozic, S., Rhumorbarbe, D., Broséus, J., Staehli, L., Esseiva, P., Roux, C., & Rossy, Q. (2020). An insight into the sale of prescription drugs and medicine on the AlphaBay cryptomarket. *Journal of Drug Issues*, *50*(1), 15–34. https://doi.org/10.1177/0022042619872955

Nurmi, J., Kaskela, T., Perälä, J., & Oksanen, A. (2017). Seller's reputation and capacity on the illicit drug markets: 11-month study on the Finnish version of the Silk Road. *Drug and Alcohol Dependence*, *178*, 201–207. https://doi.org/10.1016/j.drugalcdep.2017.05.018

Sandberg, S. (2013). Cannabis culture: A stable subculture in a changing world. *Criminology & Criminal Justice*, *13*(1), 63–79. https://doi.org/10.1177/1748895812445620

Sudan, H. K., Tai, A. M. Y., Kim, J., & Krausz, R. M. (2023). Decrypting the cryptomarkets: Trends over a decade of the Dark Web drug trade. *Drug Science, Policy and Law*, *9*, 20503245231215668. https://doi.org/10.1177/20503245231215668

Talbot, C. V., Talbot, A., Roe, D. J., & Briggs, P. (2022). The management of LGBTQ+ identities on social media: A student perspective. *New Media & Society*, *24*(8), 1729–1750. https://doi.org/10.1177/1461444820981009

Tzanetakis, M., & South, N. (2023). Introduction: The Digital Transformations of Illicit Drug Markets as a Process of Reconfiguration and Continuity. In M. Tzanetakis & N. South (Eds.), *Digital Transformations of Illicit Drug Markets: Reconfiguration and Continuity* (pp. 1–12). Emerald Publishing Limited. https://doi.org/10.1108/978-1-80043-866-820231001

Tzvetkova, M., Pardal, M., Disley, E., Rena, A., Talic, S., & Forberger, S. (2016). Strategies for a risky business: How drug dealers manage customers, suppliers and competitors in Italy, Slovenia and Germany. *International Journal of Drug Policy*, *31*, 90–98. https://doi.org/10.1016/j.drugpo.2016.04.012

Wanke, M., Piejko-Płonka, M., & Deutschmann, M. (2022). Social worlds and symbolic boundaries of cannabis users in Poland. *Drugs: Education, Prevention and Policy*, *0*(0), 1–11. https://doi.org/10.1080/09687637.2022.2046706

Wessels, B. (2012). Identification and the practices of identity and privacy in everyday digital communication. *New Media & Society*, *14*(8), 1251–1268. https://doi.org/10.1177/1461444812450679