

Caught in a net: Opportunities and Challenges of a Netnographic Study

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Abstract: This paper reports on the opportunities and challenges associated with the use of the qualitative methodology of netnography, an interpretative method which represents a written description of fieldwork emerging from on-line or computer mediated data. Specifically, a humanist netnography which focussed on answering research questions connected with deep social values with the aim to influence social change within the context of business and management research was applied. Over the course of 26 months, a total of 2033 comments from a bespoke, in-house social media monitoring tool were analysed and ratified through triangulation with 107 posts from an engagement survey. The data was captured within an automation and engineering organisation in the private sector in England. The context of the study was to use netnographic research to explore the impact on employees subjected to the implementation of multiple, consecutive redundancy programmes. The aim was to understand areas of concern for employee wellbeing and identify opportunities to improve the redundancy implementation strategy. Humanist netnography was applied to allow a specific focus on the culture of the community within the organisational setting, and the emotions experienced amongst employees within this community. The findings highlight that netnographic research can offer rich and meaningful data when used in a controlled, digital environment for organisations as well as for academic research. This study discusses the opportunities associated with netnography and how the use of in-house bespoke social media monitoring tools can help drive and improve organisational effectiveness. In addition, this paper identifies challenges associated with the use of netnography such as the little perceived value of emoticons defined as symbolic netnography, as real meaning were found in the expressed words. Concerns with respect to ethical considerations and protecting individual participants when using netnographic data are discussed.

Keywords: Netnographic study, digital research, online communities

1. Introduction

This paper presents new evidence with respect to analysing large data sets using triangulation and builds on the work of Baron and Russell-Bennett (2016) who illuminated that one of the fundamental challenges, and potential opportunities, faced for both academic researchers and practitioners is how to approach, collect and analyse the vast array of data (including images, videos, texts, audio and their integration) available from digital platforms and social media monitoring tools. Findings are based on a longitudinal study set within an automation engineering organisation in the private sector in England.

Anonymous employee comments were sought to help the organisation understand the feelings and emotions of employees whilst undergoing four consecutive redundancy programmes. Data captured was reviewed and analysed throughout the redundancy programmes with the aim to identify areas of concerns for employee wellbeing, and to improve the organisation's strategy for redundancy implementation. Further data analysis took place after the completion of the redundancy programmes to identify the success of initiatives implemented throughout each redundancy programme. The data was collected through an in-house bespoke social media monitoring tool, named the 'mood indicator' which invited random feedback from all employees during the successive redundancy programmes. Triangulation (Cohen, Manion and Morrison, 2011) supported thematic data analysis by ratifying employee participant comments through the use of qualitative data captured by the organisation's in-house digital engagement survey, which was deployed once, after the completion of the last redundancy programme. The use of triangulation of social media with other sources has been argued to allow for more rounded data that offers detailed perspective (Reid and Duffy, 2018).

This paper is structured as follows. We commence with a brief overview of netnography and the study of online communities. This is followed by positioning the relationship of netnography in the context of the specific organisational setting and the particular approach of how our data was collected. We then present the main contribution and critically discuss the potential opportunities and fundamental challenges of netnography as

observed in this study. We conclude with the main argument that netnographic studies present tremendous opportunities for academic researchers as well as practitioners despite the challenges faced.

2. Review of netnography as a study of online communities

Internet research is defined as a “tool and also a field site for research” (Markham and Buchanan, pg. 3, 2012). Netnography (Kozinets, 2002) presents a relatively new approach to digital, qualitative data collection which is evolving at pace as access to online data and technologies develop continuously (Reid and Duffy, 2018). Escobar (1994) challenged the integration of using new technologies and community and fieldwork research at a time when the digital domain was regarded as a subculture and an isolated place. More recently, digital ethnography is used for studying everyday digital practices as well as studying unfamiliar occurrences, whilst approaches to netnography are seen as arguably a digital domain that is more familiar (Zaród, 2021).

Netnography originated from a merger of the words ‘internet’ or ‘network’, with ‘ethnography’ (Kozinets, 2010). Also popular in netnography lexicon is the use of ‘cyberethnography’ (Ward, 1999), ‘online ethnography’ (Wiles, Bengry-Howell, Crow and Nind, 2013) and ‘virtual ethnography’ (Hine, 2000). The basic premise remains that research is collected through online communities and user interaction (Kozinets, 2010, 2019; Jong, 2019). The concept relies on a virtual platform where researchers can gain valuable insights on contemporary issues and global phenomena (Jeacle, 2020). Netnography studies are popular in the search of consumer behaviour (Ewing, Owens and Cassidy, 2016; Healy and McDonagh, 2013; Hofacker, Malthouse and Sultan, 2016), but are now being used in diverse online communities, such as accounting research (Jeacle, 2020), older communities in China (Zhao, Zhang and Ma, 2019), e-sport research (Zaród, 2021), sport (Gilchrist and Ravenscroft, 2011), marketing (Hardey, 2014), education (Janta, Lugosi and Brown, 2014) to name a few.

3. Organisational context

The research setting consisted of a private sector organisation, based close to London, UK specialising in automation and engineering within the construction industry. The economic crises that began in 2008 impacted numerous companies that faced tough trading circumstances, posing a direct threat to their survival (Schoenberg, Collier and Bowman, 2013). The market crash impacted the organisation within this study in 2012, which led to the exploration of business turnaround and recovery strategies. The UK market in 2012 reflected high levels of unemployment and low investment. Subsequently, due to external factors and influences beyond the control of the organisation, several redundancy programmes were implemented to mainly drive cost savings. Figure 1 demonstrates the timelines of the four redundancy programmes and the respective reasons for the redundancies. Redundancies were implemented on a smaller scale with the intention to not overreact and unnecessarily remove surplus headcount. Unfortunately, strategies to gain new business did not come to fruition and subsequently more redundancies were mandated.

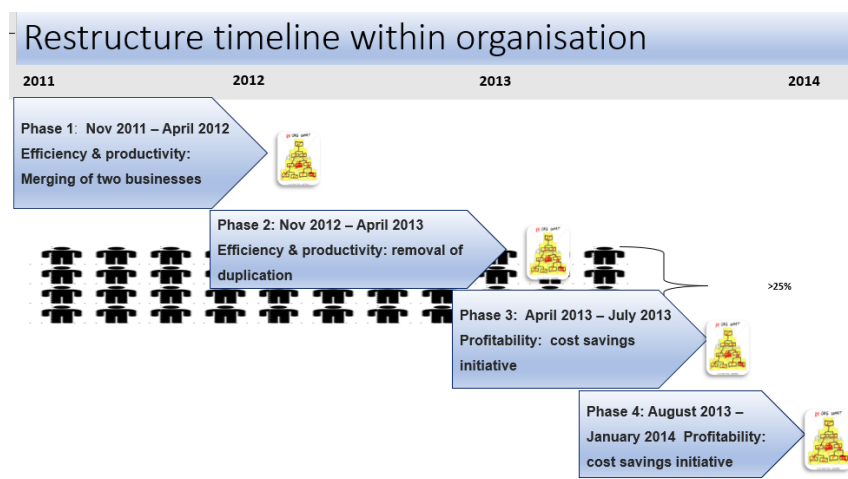


Figure 1: Redundancy timeline with reasons for redundancy

4. Data collection

Data was captured through two inhouse community tools; the 'mood indicator' and an engagement survey, with the aim to monitor and understand the impact on employee morale, levels of redundancy fatigue, and overall wellbeing. The comments were also used to identify themes to improve redundancy implementation strategy and to minimise the negative impact on employees.

Research was captured and analysed through the lead researcher, who was embedded within the organisation, fulfilling a dual role of netnographer and Human Resource Business Partner.

Netnography presented itself as an appropriate method to focus on the symbiosis of the two specific community-tools, and how these individual digital messages shaped the different relations between the individuals and communities within the organisation (Zaród, 2021).

4.1 Mood indicator

The mood indicator platform was used to capture employee perceptions during the redundancy programmes, and over the two-year period post redundancy implementation. By using a digital platform, employees had the opportunity to provide anonymous, qualitative feedback on how the redundancy programmes impacted their mood and morale. To validate reliability, the data was ratified through the comments obtained from an engagement survey, which was released approximately a year after the completion of the redundancy programmes.

Over the course of the study, a total of 2033 comments were captured and subsequently analysed. Sixty-six employees out of approximately four hundred employees were invited on a weekly basis to post feedback. During each iteration, a different sixty-six employees were invited to post feedback, essentially inviting all employees at different intervals and naturally, over the duration of twenty-six months all employees were invited to post feedback several times. As redundancies were finalised and the headcount reduced, the sample size of employees invited to participate reduced accordingly. The average response rate was around 50%, indicating that nominally there was a response from approximately thirty-three employees per week. Employees mostly chose to post comments as a stand-alone post instead of forming a discussion board.

We gained a significant amount of knowledge from comments posted on the company's mood indicator, especially on the area of improving organisational effectiveness that can be seen below:

'Still much to be done to consolidate IT and processes and finally remove all the barriers which are complicating the merger into one business.'

'Things need to be improved from a process point of view. As an example, expenses! Engineers in the field don't have access to printers, scanners and in most cases the internet.'

'Processes are hard to find with being new.'

'Processes remain disjointed...'

'Not enough discussion on projects between departments pre the delivery phase, get it right before you take it to site, Sales Projects Engineering and Service need to be around the same table discussing new projects...'

Employees had the opportunity to respond with an emoticon and/or leave a specific comment in an open text box. Members of the senior team provided a management response to the views expressed or issues raised. Figure 2 demonstrates an example of top-level results, and the emoticons used in the tool to represent the following options: 'excellent', 'good', 'ok', 'not good' or 'don't ask'. This is the method that Kozinets describes as Symbolic Netnography (2011:248).

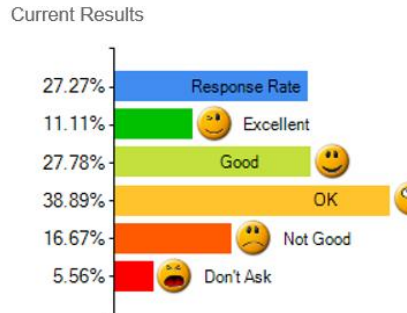


Figure 2: High level example of mood indicator tool results.

Any employee could respond to an individual's post with a thumbs-up or thumbs-down response to indicate whether they agree or disagree with the post. After management's feedback was posted, any employee in the company could also rate management's response with a thumbs-up or thumbs-down response, as can be seen in figure 3 which shows an example post.

Feedback	Date	Response from Management	Agree With
It's a good feeling to witness some progress in business improvement. By which I mean orders - not huge wins but orders all the same, and good ones (target customers, in defined markets) ... Dare I say it, I think maybe a few less decision makers will see fewer instances of de-railing which I know has hampered progress for far too long, leaving us in the situation we are now in.	01 October 2013	You're right, we really are seeing some improvements in business wins, small but targeted business wins. Our new structure needs time to bed in but it has been carefully thought out to best support our business and performance plans moving forward. As we work through things, we will be able to see where we may need to tweak and makes changes. The important thing is we are moving in a more positive direction.	Feedback 1 👍 0 👎 Response 1 👍 0 👎

Figure 3: Example mood indicator post from 11 June 2015.

4.2 Engagement survey

To support making sense of data, triangulation was used by utilizing qualitative comments from the company's inhouse engagement survey. Employees had the opportunity to participate anonymously by completing feedback on a rating scale, as well as free text boxes. The engagement survey provided valuable, insightful data on how employees perceived the organisation, the changes being made, and the challenges and successes of the redundancy programmes. The survey data was helpful in complementing the data collected from the mood indicator.

5. Data analysis

Data was analysed through thematic analysis (Braun and Clarke, 2006) which consisted of various stages such as data familiarisation, code generation, and identification and formation of themes (Östlund et al., 2011, Baran, 2016). The use of thematic, or content, analysis is supported by Reid and Duffy (2018) as a sensible approach to the categorising of netnographic data. While other popular methods of analysing online conversations often take data-centric approaches (Gandomi and Haider, 2015), where the number of likes and followers are used to analyse the data, this approach offered little benefit to data interpretation in the current study and no real meaning was gained by reviewing the number of 'likes' or 'dislikes' – partially in this case due to the low response rate and interaction elicited from this method. Due to the lead researcher being active and participative to understand the context of the research communities, the thematic analyses was undertaken by identifying key words and searching for specific phrases. Our approach is aligned with the thinking of Reid and Duffy (2018) who posit that having an overview of the data collectively with an understanding of the community and context that is being studied, allows data to be analysed with more confidence. Employee posts were reviewed every two weeks as they were received, which allowed the process of identifying themes to be continuous.

In this study, the lead netnographer adopted the role of a participant observer, instead of a passive observer as having clear knowledge of the organisational context e.g., reason for redundancies, redundancy programmes, and the related communities were critical to understand the comments. Belk and Kozinets (2017) argue that passive observers do not have the same opportunities as participative observers, as participative observers have the prospects to experience a deeper understanding of the embedded culture.

6. Opportunities and challenges of netnography

As in most cases, opportunities can equally offer challenges, just as challenges can lead to opportunities. The following section considers both factors in the discussion.

6.1 Opportunities

6.1.1 Rich meaning of data

The effectiveness of netnography as a qualitative methodology is dependent on the requirement for “human presence and personal connections online” (Costello, McDermott and Wallace, 2017:1) which is supported by Kozinets (2015) and Reid and Duffy (2018) who posit that effective narratives can only be formed when data is read, compared, and understood within the community, culture, and context of the conversations. Based on this human factor of participative research, our study fully supports the notions of Costello, McDermott and Wallace (2017), Reid and Duffy (2018) and Zaród (2021) that applied humanist netnography provides an opportunity to make sense of the real meaning of the data. The profound knowledge and experience of the cultural context supports better interpretation of the data set (Kozinets, 2010).

Online discussion forums (ODF) are forums where individuals can post messages which become threads, as defined by Veyreda and Antaki (2009). Goodlad (2013) found in her study that ODF led to a more accurate account of the chosen research topic, and subsequently a richer dataset in comparison with interviews.

6.1.2 Unobtrusive

One of the key benefits we found, and supported by Kozinets (2002) and Pollok, Luttgens and Piller (2014), is the unobtrusive and non influencing approach to collecting data. In agreement with Costello, McDermott and Wallace (2017), netnography worked well to capture personal or sensitive topics, allowing participants to share emotions anonymously without fear of retribution from management. Marcell and Falls (2001) support our views that potentially, the reason for valuable and rich data is due to participants not being influenced by external factors such as fear of being judged.

6.1.3 Speediness

Data collection can be speedy as argued by De Valck, van Bruggen and Wierenga (2009), which we found in our study. The data was readily available for immediate interpretation and themes could be deduced every two weeks when data were collected via the online tool. The business requirement was to respond proactively and in a timely manner to employee concerns and as such, the speed of the process was imperative to meet its intended objectives, i.e. identify concerns with employee morale and wellbeing for example.

On the contrary, when it came to analysing the overall combined impact on employees over the consecutive redundancies – data interpretation was time consuming. This was however, not due to the methodology of netnography, but rather the specific nature of the narrative research design adopted. The pace of interpreting and analysing data using netnographic methods therefore depends on how it is used and analysed. The speed of downloading reports with typed content in contrast with the more traditional qualitative research methods such as interviews or focus groups where transcripts are required, was also a notable advantage.

6.1.4 Quality of data

Social media monitoring tools, defined as ‘the continuous systematic observation and analysis of social media networks and social communities’ (Fensel, Leiter, and Stavrakantonakis, 2012, p. 16) can have a significant influence on the effectiveness and quality of data collected. In our case, by using an in-house bespoke tool, the organisation had the opportunity to stipulate privacy settings and limit data analysis complications such as, having to incorporate the analysis of hashtags or focussing on interactive exchanges or debates (Arvidsson and Caliendo, 2016). Specifically, in this study, where the digital tool used was bespoke and used within a controlled environment, data collection allowed for rich and informative data.

6.1.5 Organisational effectiveness

A significant benefit of our netnographic research was the ability to elicit new ideas and recommendations for improvement from the data, which was immediately identified and acted on by the lead researcher as an active, participative netnographer. This allowed for innovation and collaboration to emerge (Cherif and Miled, 2013) which stimulated further comments for areas of improvement. To promote employee participant engagement and encourage feedback, management acknowledgement is key, and as such, in a similar approach than Gurrieri and Cherrier (2013) who employed a lead blogger to help ensure community views were incorporated in their understanding of data, we had the benefit of a dedicated management respondent. The role helped to understand comments, respond to employee voice and interpret data correctly which in turn, led to improved organisational effectiveness when it came to management interventions. Correspondingly, sharing results, feedback, and acknowledgements with the community promoted valuable feedback as previously found by Cherif and Miled (2013).

6.2 Challenges

6.2.1 Protracted data analysis

Data analysis and triangulation was completed using Braun and Clarke’s (2006) 6-step framework for thematic analysis. Due to the lead researcher adopting the role of an active, real-time, participatory netnographer with the aim to contribute value and a continuity to the narrative journey (Costello, McDermott and Wallace, 2017), analysis took place through manual methods using Excel to identify themes. The main challenge identified here was associated with the costly time consuming process required to analyse the data collectively after the redundancy programmes were complete, and to ensure validity and reliability through triangulation. Triangulation clearly has its benefit in improving data quality (Cohen, Manion and Morrison, 2011) and is endorsed by views that the use of social media data alone is not encouraged (Ewing, Owens and Cassidy, 2016). The combined process of data analysis with triangulation was however, timely and took the lead author 64 hours of analysis. This process could be a challenge however, it is recommended that large volumes of data can be analysed more effectively through computer-supported software (Pollak, Luttgens, and Piller, 2014). Reid and Duffy (2018) support the notion that while the use of automation to categorise data is useful, and may help overcome such challenges, there is still a requirement for human insight to make sense of the distinctions in hidden behaviours.

6.2.2 Requirement for active, participative netnographer

As discussed in the section on opportunities, the requirement for an active, participative researcher is really important to allow for the interpretation and understanding of the data within the organisational setting. This in itself can present a challenge, as realistically this opportunity may not be afforded to researchers or vice versa; as it may not be realistic to expect practitioners to be academic researchers. In our study, we were fortunate to be able to provide context and meaning when analysing our large data set as we had the benefit of an active, participative researcher.

6.2.3 Limitations of symbolic netnography

We recognised early on that the use of emoticons alone, or symbolic netnography (Kozinets, 2011), and the absence of text to provide context, provided little insight as the 'why' was missing from the analysis and thus the meaning often lost. Our findings were supported by Zaltman and Leichliter (2011) who argue that symbolic netnography without text can cause significant challenges from a data analysis perspective, as it is subject to much interpretation.

6.2.4 Ethics

Ethics in the use of social media is contentious, with contradictory views on what is regarded as private and public information. The basic principles of ethics whilst conducting internet research, 'include the fundamental rights of human dignity, autonomy, protection, safety, maximization of benefits and minimization of harms, or, in the most recent accepted phrasing, respect for persons, justice, and beneficence' (Markham and Buchanan, 2012, pg. 4.). Concerns around ethics and privacy guidelines pertaining to digital tools have been highlighted, maintaining that social media platforms are often used as a research methodology with a key focus on the technical possibilities of data collection, but less concern for ethical appropriateness (Evans, Ginnis and Bartlett, 2015). Ethical principles posit that the greater the vulnerability of the participants, the greater the obligation of the researcher to protect the participants (Markham and Buchanan, 2012).

A challenge could thus be getting the ethical considerations right, with Reid and Duffy (2018) contending that it is the researcher's responsibility to raise ethical concerns. On the contrary, the use of an in-house social media monitoring tool, could prevent ethical dilemmas when being set up. Anonymous posts helps to address some of the challenges associated with ethics, although anonymity cannot always be guaranteed and depends on the individual circumstances.

6.2.5 Supporting vulnerable participants

One of the challenges to consider when participants leave feedback anonymously, is identifying and supporting employees that appear fragile, or that could be considered harmful to themselves. This can present a real and present challenge for the organisation as well as the researcher. Posts that were deemed to cause alert of the employee's own wellbeing were responded to by offering various steps or support, including a contact name, number and email address of a specific individual in HR for support, instead of generic contact details. Management feedback also encouraged the employee to speak to their line manager in the first instance or to contact a member of management as a priority. Ironically, we found that in most such cases, where organisational support was of immediate need, and where employees started to suffer very low levels of morale, they willingly left their name and contact details in the posts. Thus, despite the posts being anonymous, the organisation could not prevent an individual from willingly disclosing their identity.

7. Conclusion

In summary, our own experience of conducting a humanistic netnographic study highlighted new perspectives on the opportunities and challenges associated with netnography as a qualitative research method. We discussed 5 opportunities and 5 challenges that we experienced and positioned this within the context of available literature. Despite the challenges faced, we believe that with the necessary awareness, the challenges identified can be overcome and proactively addressed when conducting netnography. We posit that the use of in-house social media monitoring tools give researchers and organisations the opportunity to address many of these challenges, and also afford the benefit of harnessing the opportunities. Our research indicates that the biggest challenge is to ensure and allow for human presence (Kozinets, 2015), and an active and participative netnographer is necessary to understand and interpret personal connections online (Costello, McDermott and Wallace, 2017; Reid and Duffy, 2018). We conclude with the main argument that netnographic studies present tremendous opportunities for academic researchers as well as practitioners despite the challenges faced.

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