

Positive and negative emotional spirals in eWOM of new recreational sports: A case study on Nordic Walking

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Abstract

Practising physical activities in public spaces may evoke a variety of emotional expressions, particularly when an activity is considered novel and embarrassing. To date, there is limited knowledge on emotional sharing concerning novel recreational activities in online context via electronic word-of-mouth (eWOM). We approach this knowledge gap by exploring online discussions on Nordic walking, the purpose being to investigate emotional sharing in online discussions concerning the activity. In our netnographic study, we analyse what kinds of discrete emotions related to Nordic walking are shared online in different countries, what the triggers of online emotional sharing are and what the outcomes expressed online by Nordic-walking practitioners are. We collected data from countries with various levels of Nordic-walking popularity and discovered four types of dynamics – negative spiral, positive spiral, positive change and negative change – that add to the research concerning emotional sharing.

Keywords: sharing of emotions; positive emotions; negative emotions; eWOM; online discussions; discussion forums; netnography; recreational sports; Nordic walking; novel physical activity

Introduction

The connection between physical activity and emotions is widely acknowledged, as exercise provides opportunities to escape from negative emotions and promotes positive emotions and experiences (e.g., Bergland et al., 2010; Hutchinson et al., 2008; Iwasaki and Mannell, 2000; Landers and Petruzzello, 1994). However, exercising can also evoke emotions, which may elicit or hinder individuals undertaking regular workouts (e.g., Ábrahám et al., 2012; Mohiyeddini et al., 2009). Recreational activities practised outdoors in public spaces may evoke a variety of emotions in practitioners ranging from pride to embarrassment (Heywood, 2002; Shores et al., 2007). Emotional ambivalence may be particularly strong in cases when the physical activity being undertaken is considered novel and embarrassing (e.g., Soscia, 2013).

Basic emotions are considered as universal and are similarly shared in different European and North American countries (Rimé et al., 1998; Singh-Manoux and Finkenauer, 2001). Individuals tend to share their emotions in a discourse when communicating openly about events-raising emotions (Bartel and Saavedra, 2000; Rimé, 2009; Rimé et al., 1998).

The positive emotions expressed by one individual tend to spread by triggering more positive emotions in others, whereas expressed negative emotions may lead to more diverse emotional responses in others (Chmiel et al., 2011). Emotions are eagerly expressed and shared online and through social media in particular (e.g., Stieglitz and Dang-Xuan, 2013). In addition, existing studies show that online discussion forums play an increasing role in the adoption of products and services (e.g., Barnes, 2014; Parry et al., 2012). It is further acknowledged that emotions often play a central role in the adoption of a new sport or activity (Thorpe, 2009). However, there is limited knowledge on the connections between emotional sharing in the online context via word-of-mouth (WOM) as a channel for sharing emotions concerning novel recreational activities. It is also recognised that organisations and business actors involved in promoting recreational activities are increasingly interested in following online discussions on new activities, and even participating in them (Teichmann et al., 2015).

We approach this knowledge gap by exploring emotional sharing in online discussion forums concerning a new recreational sport. The purpose of the study is to investigate triggers and behavioural intentions of online sharing of emotions and to analyse how emotional contagion takes place in online discussions on a novel recreational sport. The empirical study is conducted by analysing the online discussions on Nordic walking, a novel physical activity that has been expanding internationally in recent decades but is still often considered as ‘strange-looking’ (e.g., Nykänen, 2014; Shove and Pantzar, 2005).

Nordic walking, also known as walking with poles, combines a classic cross-country skiing and marching technique with the active use of specially designed poles (e.g., Song et al., 2013; Zajac-Kowalska et al., 2011). It is practised outdoors along trails and on pavements, and individuals around the world seem to face ‘image barriers’ when undertaking this form of exercise; many practitioners feel that it is embarrassing to walk with poles in public spaces. Moreover, they often face unpleasant remarks or even verbal abuse from others (Sandberg, 2008). This suggests that Nordic walking fulfils the criteria of being both a novel and publicly visible activity that raises emotions and thus, one that could elicit much online attention (e.g., Berger and Schwartz, 2011).

Social sharing of emotions in an online context

Emotions can be defined as short-term feelings that arise by various triggers. Emotions vary in intensity and get expressed – sometimes minimally – in behaviour (e.g., Larsen et al., 2009; Rank and Frese, 2008; Solomon, 2008). According to cognitive appraisal theory, emotions derive from individual evaluations of triggering events and have a cognitive origin (Lazarus, 1991; Soscia, 2013). Emotions are often divided into positive and negative categories: positive emotions are experienced as pleasant sensations and negative emotions are experienced as unpleasant ones (MacLean, 1975). There are numerous categorisations of basic emotions, but in the studies of individuals’ consumption behaviour, they are often divided into four positive emotions and four negative emotions (see Table 1).

These eight emotions can be further divided into sub-categories (Laros and Steenkamp, 2005).

[INSERT HERE]

Table 1. Positive and negative basic emotions and their sub-categories (modified from Laros and Steenkamp, 2005, 1441)

Emotions and their expression are embedded within social interactions (e.g., Filipowicz et al., 2011; Keltner and Haidt, 1999; Keltner and Kring, 1998). The social sharing of emotions occurs in discourse when individuals communicate openly about the circumstances of emotional events and emotional reactions (Rimé, 2009; Rimé et al., 1998). Fear, sadness and anger are shared as often as happiness and love are (Rimé, 2009). However, positive and negative emotions stimulate social interactions, yet for very different reasons. Langston (1994) proposes that experiencing positive emotions encourages social contact in order to share and savour positive practices. This results in opportunities for enhancing positive emotions and social bonds. On the other hand, experiencing negative emotions causes a state of cognitive dissonance (Festinger, 1957), which fuels social exchange and comparison. Schachter (1959) suggests that an individual's negative emotions elicit the motivation to seek social contact in order to compare and evaluate one's own emotions against others and receive comfort and social support. The fore-mentioned studies discussed emotional sharing in face-to-face interaction. However, social sharing in online context is different due to various reasons (McFarland & Ployhart, 2015).

First, interpersonal online media, such as blogs, forums and chats, provide wider access for social sharing (Choi and Toma, 2014; Hidalgo et al., 2015; Lambert et al., 2013), since the anonymity in the online environment encourages individuals to share their emotions rather openly (Coffey and Woolworth, 2004).

Secondly, computer-mediated communication offers the opportunity to find people with similar interests and emotional needs with whom to share emotions, resulting in the development of new close and intimate relationships (Derks et al., 2008).

Thirdly, some authors claim (e.g., Derks et al. 2008) claim that online expressions of emotions are reduced in spontaneity as individuals have more control over the intensity of the emotional expressions they want to reveal during online communication. This could be due to the fact that online emotional expressions can have long-lasting effects, even though by definition emotions are temporal (Larsen et al., 2009; Solomon, 2008). Fourthly, emotional outbursts expressed online remain for everyone to see for a long time after the emotion itself has vanished. However, the possibility of people being able to express their opinions anonymously in online discussion forums may provoke extreme emotional reactions (cf. Coffey and Woolforth, 2004).

Bartel and Saavedra (2000) emphasise that emotions are contagious and emotions expressed in online discussions tend to depend on the previous posts. Hence, participants in online discussions automatically tend to become emotionally in tune with others. Individuals in social interactions often mimic the behaviour of others and the emotions they express (Duclos et al., 1989; Sullins, 1991). Therefore, stronger emotional expressions can lead to longer discussion threads, whereas discussions starting at a lower emotional level tend to be shorter (Chmiel et al., 2011). In addition, positive emotions expressed by one participant often fuel more positive emotions in others, whereas negative emotions can lead to a greater variety of emotional expressions in others (Chmiel et al., 2011), including antagonistic emotions in the form of insults, swearing or offensive comments (Siegel et al., 1986). Moreover, Coffey and Woolworth (2004) suggest that predominantly negative emotions on

sensitive topics may be expressed openly in online communities where participants do not know each other.

Word-of-mouth communication in online communities

Emotions spread through social ties as people are embedded in social networks, where ideas, opinions, experiences and behaviours are constantly shared (Christakis and Fowler, 2007; Smith and Christakis, 2008). In fact, people have always willingly sought out others for sharing or for assistance, but with the emergence of the internet and mobile phones, consumers can now connect virtually with anyone, anywhere and at any time (Kimmel, 2010). Interpersonal WOM communication increasingly takes place online, which enables consumers to share their experiences and emotions easily and openly, thereby creating a social web (Godes and Mayzlin, 2004; Libai et al., 2010). According to Weber (2007), the social web is the online place where people with a common interest gather to exchange ideas, thoughts, comments and opinions. The interpersonal exchange typically involves multithreaded conversations, creating non-geographically determined online communities where emotions and like-mindedness form the basis for the connections. These conversations – what we call eWOM or electronic word of mouth – have the capacity to affect the community members' attitudes and behaviours, both positively and negatively (Kimmel, 2010).

De Bruyn and Lilien (2008) have identified three streams of research that have emerged to explain the antecedents of WOM and electronic WOM (eWOM). First, extreme satisfaction or dissatisfaction are essential catalysts of WOM; particularly highly dissatisfied people are considered to engage more in WOM. According to Kimmel (2010), this holds true online, not off-line. When eWOM is negative in nature and widespread, its influence on how people think and feel can be severe. Secondly, the novelty of the matter in question has been pointed out as an important element in stimulating WOM. Thirdly, commitment and passion towards the topic stimulate WOM.

Moreover, according to East et al. (2008), the transmission of WOM stems from motivation, opportunity and ability (MOA factors); that is, spreading the word becomes more likely when people have the desire to engage in the matter or topic and when they have the relevant skills and opportunity to do so.

It is widely acknowledged that social contagion and WOM communication about new behaviours and products drive their adoption (e.g., Machanda et al., 2008). Traditionally, studies on eWOM have focused on counts and volume, and they have measured how much and how often people talk about certain issues online (Godes and Mayzlin, 2004). However, it is also important to understand how different individuals participate in the online discussions (Godes and Mayzlin, 2004), how the discussion threads (in which several people participate) evolve and what kinds of outcomes these discussions seem to have (Libai et al., 2010). Furthermore, in WOM, emotional aspects play a key role; emotional experiences are easily shared with others and expressions of extreme emotions are inclined to generate more WOM (Berger and Milkman, 2013).

Methodology

In order to understand the social sharing of emotions related to recreational sports in online communities, we applied netnography as a method. Netnography is ethnography in the internet: a qualitative, interpretive observational research method which adapts traditional ethnographic techniques to the study of social media. Narrowing data, handling large digital datasets, analyzing digitally contextualized data, and navigating difficult online ethical matters and research procedures as well as locating communities and topics are areas where netnography is at its best. The method has gained wide acceptance within social sciences over the last fifteen years. (Kozinets 2010; Belk et al. 2013)

Nordic Walking as a case

Nordic walking is a recreational sport that bridges leisure and physical activity. The main goal is to engage muscles that are not used during standard walking activities. The active use of the walking poles while exercising results in the increased use of the upper body and greater shoulder movement (Breyer et al., 2010; Schiffer et al., 2006). Nordic walking is easy to learn; however, to achieve the full benefits and the desired effect, the technique must first be learned.

The origins of the activity date back to the 1930s when, in the summertime, Finnish cross-country skiers used ski poles during their training to prepare for the winter season. In the mid-1990s, Finnish sports equipment company Exel, the Finnish Institute of Sport in Vierumäki and the Finnish Central Association for Recreational Sports and Activities reinvented walking with poles and first promoted the activity to the Finnish general public (Sandberg, 2008). It rapidly gained in popularity in Finland, and after its commercial success in Finland, Nordic walking was introduced to the rest of Scandinavia, Europe and then the rest of the world (Antosiewicz, 2010; Church et al., 2002; Hansen and Smith, 2009).

Since the activity is radical in many regards, its international market entry has required the building of awareness, customer education and the setting up of new commercialisation networks in each market (Aarikka-Stenroos and Sandberg, 2012). The number of people practising Nordic walking regularly has increased gradually, reaching 10 million thus far (email conversation with Aki Karihtala, the President of International Nordic Walking Association, 20. February 2017). Nowadays, Nordic walking can be characterised as an established activity in Nordic and in German-speaking European countries, as a steadily growing activity in the United Kingdom, Poland, France and the Netherlands, as having niche activity in Southern Europe, the USA and Australia, as a fast-growing activity in China, Japan, Estonia, Latvia and Russia, and as an emerging yet fast-growing activity in South Korea (email conversation with Aki Karihtala, the President of International Nordic Walking Association, 20. February 2017).

Data collection

Data collection in netnography means learning from members of an online community. In netnography, the researcher observes, notes and interprets the way that people and their comments influence each other (Belk et al., 2013). Herein, the data was collected from online discussion forums from four countries. These countries represent different levels of Nordic-walking adaptation and popularity: 1) Finland, the home country of Nordic walking; 2) Poland, where Nordic walking is growing steadily; 3) the United Kingdom, where Nordic walking is gaining attention; and 4) the USA, the country where Nordic walking is still quite unknown to the general population. Furthermore, the native language skills of the research team and their understanding of their own culture made it possible to analyse authentic emotional expressions in each country (see Belk et al., 2013). From every country, we chose the online forums where there was active discussion on Nordic walking (see Table 2).

[INSERT HERE]

Table 2. Discussion forums in the four selected countries

In total, thirty-one Nordic-walking discussions were observed. However, some of the online discussions were short, comprising less than five comments and including only a few words, and they lacked emotional expressions. Therefore, we chose the five longest online discussions from each country for further analysis (resulting in 20 in all). The decision was supported by the findings of Chmiel and colleagues (2011) suggesting that the longer the discussion threads are, the stronger the emotional expressions tend to be. Data collection took place from March 2013 to May 2013.

Data analysis

The selected online discussions were content-analysed using QSR NVivo 11 software. Content analysis is a popular method for textual investigation. It offers convenience in simplifying and reducing large amounts of data into organised segments (Marvasti, 2004). It is a valid and reliable method as it allows for different coders to arrive at the same results when investigating the same body of material using the same set of precise categories (Silverman, 2006).

The analysis proceeded in three steps as illustrated in Figure 1.

[INSERT HERE]

Figure 1. Data-analysis process

Step 1: Deductive coding of emotions shared online

The key task in the analysis was to identify emotions within the qualitative freely produced narrative text. After reading the online discussions various times it became clear that we were able to utilise the existing and widely-adopted typology by Laros and Steenkamp (2005) of four positive (love, contentment, happiness and pride) and four negative (anger, fear, sadness and shame) emotions and their sub-emotions (Table 1). Thus, the emotions were first coded deductively according to these categories.

Step 2: Inductive coding of the triggers for and outcomes of emotions

The triggers for and the outcomes of the emotions were coded inductively as we were not seeking predefined triggers or outcomes. Instead, through inductive analysis, we identified divergent matters, coding them into first-order codes that were elaborated into second-order codes, and finally into aggregate themes. The coding process (steps 1 and 2) resulted in 3137 coded passages (Table 2).

After two researchers had coded the texts, the codes were evaluated and synthesised together through discussion. Next, the codes were presented and illustrated in the form of quotations. The analysis involved continuous discussion among all three authors, thus ensuring researcher triangulation.

Step 3. Identification of the dynamics of the emotions shared online

After conducting steps 1 and 2, it was possible to recognise the dynamics of the emotions shared online. From the discussion threads, we distinguished four types of dynamics in the sharing of emotions: negative spiral, positive spiral, positive change and negative change. In the following, we will go through the results according to these steps.

Results

The emotions shared online

Positive emotions clearly dominated in Polish, British and US discussions, with over 70% of the observed emotions being positive. However, in Finland, over 50% of emotional expressions were negative and were mostly related to anger. In all online forums, the most common positive emotions were contentment and happiness (Figure 2).

A closer look at specific types of emotion showed that contentment was often linked to a sense of fulfilment, whereas happiness could be further characterised as either enthusiasm or joy (see Laros and Steenkamp, 2005). Pride and love for the activity were somewhat accentuated in the Polish and British discussions. Table 3 presents examples of comments related to the positive emotions shared in discussions.

[INSERT HERE]

Figure 2. Positive emotions

[INSERT HERE]

Table 3. Positive emotions shared online: Data supporting interpretations

The most prevalent negative emotion in all countries was anger, which was mostly only mildly manifested, such as via irritation or discontent (Figure 3). However, Finnish discussions, in a few instances, were filled with extremely aggressive language. Fear was noted in the Polish, US and British online discussions, and expressions of shame were apparent in the Finnish, Polish and British discussions. Table 4 presents the examples of comments related to the negative emotions that were shared.

[INSERT HERE]

Figure 3. Negative emotions

[INSERT HERE]

Table 4. Negative emotions shared online: Data supporting interpretations

The triggers for emotions

Commonly shared positive emotions (contentment and happiness) were usually related to the activity itself, the benefits of using Nordic-walking poles, positive influences of Nordic walking on health and social bonds with other practitioners, especially those trying Nordic walking for the first time. On the other hand, the expressions of anger were related to using the incorrect Nordic-walking technique, problems with using Nordic-walking poles and disputes and disagreements with other Nordic-walking practitioners. The majority of positive and negative emotions in all four countries referring to Nordic-walking activity are presented in Appendix 1.

Table 5 presents selected comments from online discussion forums related to the triggers for the most common positive and negative emotions about various aspects of Nordic walking.

[INSERT HERE]

Table 5. The triggers for the most common positive and negative common emotions: Data supporting interpretations

The novelty and the fact that Nordic walking is practised publicly outdoors and that it resembles skiing without skis makes it subject to emotional expressions. Fear and shame were often related to Nordic walking being a ‘strange-looking activity’. Especially the Polish, British and Finnish participants discussed the negative experiences of being laughed at by other people while exercising. Furthermore, anger was also strongly emphasised, especially in Finnish discussions, where more experienced practitioners expressed frustration with the beginners who were learning the Nordic-walking technique. Finnish discussions also mentioned friends not liking the activity and violent incidents such as attacks by angry skiers who considered their skiing tracks to be destroyed by Nordic walkers. It is noteworthy that negative public attention created emotional ambivalence and negative emotions.

Nevertheless, the social aspect of Nordic walking also evoked various positive emotions. For instance, US and Polish discussants chatted about positive feelings when Nordic walking with friends. Happiness, more specifically encouragement, had a strong connection towards novice practitioners of Nordic walking (especially those trying Nordic walking for the first time). Furthermore, some emotional comments in the Finnish, Polish and British online forums were also related to non-practitioners of Nordic walking, practitioners of other sports or directly to previous discussants.

The outcomes of emotions

We also explored the behavioural intentions, i.e., the outcomes of emotions shared online. Appendix 2 shows the most common intentions expressed online related to sharing distinct emotions. Contentment and happiness were related to the intention to increase Nordic-walking practice. Sharing positive experiences in Nordic walking related to fitness and health benefits, relaxation and social support led to expressing positive emotions, which in turn was often used to encourage other discussants to practise Nordic walking. For instance, the expressed intentions to practise Nordic walking produced more positive comments and words of encouragement to exercise without taking offense at the public comments.

On the other hand, the negative emotions, in particular anger, were linked to the intention to cease Nordic walking and increase participation in other activities. For instance, the expressions of anger, in Finnish forums, were used to discourage others from practising Nordic walking and consider practising other outdoor activities instead. It is worth noting that the negative emotion of shame did not seem to prevent discussants from practising Nordic walking, but instead, it led to modifications in the way of practising it: *'I walk on quiet paths, late or with company'* (Finnish discussion). Furthermore, in some cases, negative attention also created positive emotions: the negatively charged comments were received and answered with amusing replies from several discussants.

Table 6 presents examples of quotations showing the relationships between shared emotions and expressed behavioural intentions online.

[INSERT HERE]

Table 6. Shared emotions and expressed behavioural intentions: Data supporting interpretations

Dynamics of emotions shared online

Our analysis produced four types of dynamics in the sharing of emotions: negative spiral, positive spiral, positive change and negative change (see Figure 4). In a negative spiral, the negative exchange was triggered when the activity did not satisfy the needs or expectations of the discussants, which resulted in negative online feedback. Comments that started with an unkind sentence referring to the equipment or walking technique, which triggered more negative comments, were not always associated with the topic of the conversation.

A: It looks silly when people do not know the right walking technique.

B: 'Where have they lost the skis' my husband sings whenever he sees Nordic walkers.

C: Your husband may not be the sharpest pencil in the box.

D: What a stupid man!

B: Luckily my husband is not so stupid. We have quite a lot of Nordic walkers here. He would be singing all the time.

F: But you must admit that it is not a very sexy sport! The people practising it do not look good.

(Example discussion from the Finnish forum)

For a negative spiral, provocation was clearly noticeable in online communications. The sharing of negative emotions triggered a variety of emotional expressions in others, where comments very quickly progressed into an exchange of insults and offensive remarks.

[INSERT HERE]

Figure 4. Four types of dynamics in the sharing of emotions online

A positive spiral in online social exchanges started with comments filled with positive emotions, such as happiness and contentment, focusing on sharing and comparing positive experiences of Nordic walking with peers, which triggered more positive emotional comments from others.

A: Hi all, I'm a newbie here. I just started Nordic walking 2 weeks ago. I usually do it early in the morning, how about you? What do you think is the best time to Nordic walk?

B: Hey, welcome to the Nordic-walking community! Well I personally like to Nordic walk in the morning, it somehow conditions my body for the rest of the day, it gives me more energy to work for the next hours.

C: Same here, I prefer walking in the morning ... I just love catching some fresh air, I feel like I'm starting my day just right.

D: I normally do it in the afternoon around 4pm and I try to invite my friends to walk with me so it will be more fun.

B: Love to do it in the morning because I feel more relaxed during those times. Choose a time that suits your schedule and your system because it varies from person to person but anytime would do as long as you are up to it.

E. I do it before the sun rises. It makes me feel relaxed all day long. You'll feel very rejuvenated and ready to do anything for the rest of the day!

(Example discussion from the US forum)

Sharing positive comments encouraged further positive exchanges, adding supportive and inspiring comments to the chat. The positive sharing of emotions supported the motivation to become more involved in the activity. The positive spiral of social sharing created an affective bond between the peers, which led to the creation of a sense of belonging to a special community and often resulted in participants expressing their intentions to further their Nordic-walking practice.

In the third type of online discussion, a negative change in emotional sharing was recorded. We noticed that several chats started with positive comments, often on the Nordic-walking poles or practitioners, and soon developed into a negatively loaded exchange.

A: I am 46 and have been using a pair for the last year. No gimmick about them at all. Really help going uphill. Help going downhill. They are a godsend.

B: I'm 44 and I've used them for the last couple of years (is 44 old?) and my knees notice the difference.

C: I love the way this forum throws up the occasional 'know-it-all-authority-on-everything' every now and then.

A: Now let's not get carried away. I know very little about the economic policies of Vanuatu ... but on most other things? ... yep, I guess you're about right on that...

C: Yes 44 is old and no, you shouldn't be using them, you buy your walking poles when you apply for your bus pass....

A: Walking poles are a Godsend for the knees. End of.

B: I think 'C' is merely giving his opinion on your thread, which I have to say has the distinct smell of troll about it. I may be wrong. I usually am.

A: I would keep your coat handy though if you continue in this manner.

D: Any mods consider locking this before it degenerates into a slanging match?

C: Well no, I haven't become personal, I haven't said anyone is full of [censored] and I haven't called anyone a know all, I haven't engaged in a slanging match and yet I'm the Troll ... odd that.

A: ...and an irritating one at that.

(Example discussion from the British forum)

For the negative change, similarly to the negative spiral, provocation was noticeable. Often, positive comments on equipment or the activity triggered a negative response in others. Even though many discussants tried to ignore the negative comments, the negative attention in the discussion resulted in diverting from the topic and focusing on personal insults.

In the fourth type of online exchange, a positive change in emotional sharing was observed. The discussions started with comments filled with negative emotions describing bad experiences in Nordic-walking practice. However, with time, the exchange changed from negative into positive, emphasising the benefits of Nordic walking and sharing the positive experiences of the activity. The online social support offered by peers was an important factor that helped some disputants to overcome the psychological barriers to Nordic-walking practice.

A: For me the biggest problem is people who know me and laugh openly. Annoying! Once somebody mocked me and I tried to explain what Nordic walking was and he sniggered and walked away. Also, vulgar insults, such as '[censored], what a jerk, lost his skis!' always make me very upset.

B. I am not aware if somebody insults me when I go Nordic walking, because I am wearing headphones, but unfortunately, I can see the dirty looks people give me.

A: People give dirty looks, just like you say, but they also look surprised.

C: During my walks, I notice people look at me with surprise, dislike and nastiness, but I try not to pay attention to those people and focus on walking.

D: The most important thing is not to worry about those people. Nordic walking is a good activity, and people who don't practise it are losers.

E: Hi everyone, it's my first post. I've been walking since February and reading your comments made me think about a funny story that happened a few days ago, when I was jogging in the park. I saw a group of people with the poles, when I was running past, one lady said in a friendly manner 'oh you lost your walking poles!' I smiled and said to her 'and you'd seem to have lost your skies', and everyone started to laugh.

(Example discussion from the Polish forum)

When there was a positive change, the online chat created a sense of intimacy through sharing negative experiences, which provided a context for social support and social bonding. Social support in online discussions offered emotional closeness and instrumental assistance in motivating and encouraging peers to practise Nordic walking when facing the psychological barrier of an unattractive image when walking with poles. The discussants

provided positive feedback, which aimed to diminish the mental barrier to practice Nordic walking and provide a feeling of satisfaction from the activity.

Discussion

To explore the social sharing of emotions in online discussions related to a novel recreational sport, Nordic walking, our article examined and compared online discussions from the United States, the United Kingdom, Finland and Poland. Our study shows that a variety of emotions can be detected in online discussions and that the categorisation of basic consumer emotions proposed by Laros and Steenkamp (2005) worked well with the online data.

Adding to the existing knowledge on the social sharing of emotions in online contexts (e.g., Hidalgo et al., 2015; Lambert et al., 2013), this study answered to the calls to study discrete emotions (e.g., Gooty et al., 2009). In this instance, it meant identifying the most commonly expressed emotions related to Nordic walking in the international online context. The most common emotions reported in this study (i.e. happiness, contentment and anger) were predominant in the discussions in all four countries, even though the adoption of the activity was in different stages in each country.

The results show that both negative and positive emotions were openly expressed. It is not surprising that a novel activity evoked mixed emotions. Positive emotions were related to the experiences of being outdoors in aesthetically pleasing environments and the opportunity to practice the new sport with friends (Zurawik et al., 2019) . The beneficial effects of attractive environments in diverting attention from negative emotions and thoughts have been noted earlier by, for example, Ulrich (1981) and Stigsdotter et al. (2010).

However, the shared emotions were not always positive. The common negative emotion shared online was anger related to using the incorrect technique when practicing, which caused a major decrease in the quality of the experience. Mohiyeddini et al. (2009) proposed that barriers such as a lack of skills or contradictory intentions can lead to negative emotional responses such as frustration (a sub-emotion of anger) or sadness, which consequently lead to a decrease in the frequency and duration of exercising.

The social sharing of emotions in the online context occurs in a discourse in which peers influence the development and tone of the communication. Several studies found that social support was the strongest influence on participation in physical activity (e.g., Fletcher et al., 2008; Mathews et al., 2010; Ståhl et al., 2001). We explored four types of dynamics in the online discussions.

The dynamics of emotional sharing characterised as a 'positive spiral' encouraged social contact and triggered more positive emotions in others. The expressions of contentment and happiness were linked to communicating a willingness to increase the levels of engagement in the activity and supporting others to become more involved. The positive spiral that we detected in online discussions is in line with Langston's (1994) studies on positive emotions encouraging sharing of positive emotions in face-to-face contacts.

The emotional ambivalence felt by the practitioners of the new recreational sport was related to the uniqueness and public practice of the activity. The negative emotions of fear and shame were often related to the activity as being 'strange-looking'. McEachan and colleagues (2010) claim that emotional attitudes are more important predictors of an intention to be active and that a lack of enjoyment may prevent engaging in the activity. According to Averill (1983), anger has a moral connotation and, more so than with other emotions, demands expression. The angry discussants tended to be committed practitioners who sought confrontation and emotional release. The individuals who got angry, frustrated or annoyed by the novel activity not only wanted to cease their own activity but they also put considerable effort into discussions to discourage others. In our study, we identified these dynamics of the social sharing of emotions as a 'negative spiral'. This type of dynamic led to diverse negative responses and even stronger emotional expressions in others, including swearing, insults and offensive comments (Chmiel et al., 2011; Siegel et al., 1986). Hence, contrary to Schachter's (1959) research in face-to-face context, negative emotions in discussion forums did not lead to social support and comfort but often provoked outbursts of anger.

However, we also recorded an upward change when sharing negative emotions. In the ‘positive-change dynamic’, the online sharing of negative emotions motivated individuals to seek social contact in order to evaluate their emotional state and responses, and receive comfort and support from their peers. The online social support for a novel activity may have been an important factor that helped disputants to overcome the unattractive image of the activity. This form of supportive online community helped to combat the initial expressions and sharing of negative emotions, and led to a more positive tone in the online conversations. Additionally, as to the dynamics of ‘negative change’, the initial social sharing of positive emotions from one person changed the online conversations into an exchange of negative comments about the activity and its practitioners. Understanding the dynamics of the spirals can help alter the tone of the discussions and even in some cases prevent the negative emotions arising.

Conclusions

Theoretical and managerial contribution

The social media encourage voicing personal opinions and expressing emotions related to various experiences, activities and products. Herein, we have investigated emotional sharing in online discussion forums concerning a novel activity, Nordic walking. Peer influence is a complex process and depends on the motives for social contact and emotional sharing, personal attitudes towards the activity and individual levels of emotional expression. Our study contributes to the theoretical knowledge by proposing four kinds of virtual behavioural dynamics, depending on peer influences and as discussed above. We identified that sharing emotions in online discussions follows the dynamics of ‘a negative spiral’, ‘a positive spiral’, ‘a positive change’ and ‘a negative change’. This finding raises important managerial questions: How to stop the negative spiral or change the course of the discussions? In what instances is it ethically permissible to participate in the discussions? Overall, to what extent can organisations and companies interrupt discussion threads?

The practical implication of this study is in acknowledging that social media and WOM play an important role in the promotion of a novel activity. Through online communication, the newcomers may share their emotions and experiences with more experienced practitioners and get not only practical advice, but also emotional support and encouragement. However, organisations and companies should be attentive and discussion-savvy on their behalf. Our recommendation is that organisations promoting a novel sport activity should participate in the online discussions and thereby alter false conceptions to prevent negative spirals.

Limitations and future research

Our study must be considered in the light of its limitations, which again can lead to several interesting avenues for future research. First, we analysed *shared* emotional triggers and outcomes, which however may be different from the *actual* experienced emotions, triggers and behavioural intentions. Secondly, as we only analysed written comments we may have missed important nonverbal clues of emotions (see e.g. Matsumoto et al., 2008). Thirdly, the data analysis relied on the operationalisation of the basic emotions and sub-emotions identified by Laros and Steenkamp (2005), therefore the challenges in the measurement of emotions must be noted and should be evaluated in further studies. An interesting avenue for further research is the cultural factor, e.g. why in Finland – the home country of Nordic Walking – the comments were mostly negative and anger-based? Finally, the data was (in time and in volume) limited to the emotional discussions in selected online forums in four countries. Subsequent studies could focus, for instance, on online communication regarding other physical activities and cross-cultural analysis on the relationship between emotions and physical activities.

Our understanding on the contagion of emotions in social encounters is limited and the effect of discrete emotions on changes in physical activity behaviour remains largely unexplored. Therefore, for a better understanding, additional research is required to evaluate and supplement the findings from this study. Our article can be seen as the beginning of a journey

to explore the social sharing of emotions and the role of social media in sharing opinions and experiences on engagement in novel physical activities.

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Appendix 1. Most commonly expressed triggers of distinct emotions

	Contentment	Happiness	Love	Pride	Anger	Fear	Sadness	Shame
Nordic walking	83	37	2	8	14	3	1	3
- Nordic-walking activity	52	21	2	8	9	2	0	3
- Nordic-walking poles	22	16	0	0	6	1	1	0
Well-being	25	6	0	2	8	0	0	0
- Improved health	14	2	0	1	0	0	0	0
Environmental aspects of Nordic walking	20	21	0	2	14	2	0	0
- Nordic walking in the morning	3	9	0	0	0	0	0	0
- Combining Nordic walking with dog walking	1	2	0	0	11	2	0	0
Social aspects of Nordic walking	9	13	0	1	4	1	0	2
- Strengthening social contacts	2	7	0	0	0	0	0	0
- Negative public attention	1	3	0	0	3	1	0	2
- Courage to practise Nordic walking	4	3	0	1	0	0	0	0
Nordic-walking practitioners	6	10	0	1	23	1	0	2
- First-time practitioners	2	6	0	1	0	1	0	1
- Wrong technique	2	3	0	0	16	0	0	1
Nordic-walking non-practitioners	0	0	0	1	8	0	0	0
Sports in general	3	2	0	0	7	0	0	0
Discussion-related	2	4	0	0	29	1	0	1

Appendix 2. The most common behavioural intentions of distinct emotions

	Contentment	Happiness	Love	Pride	Anger	Fear	Sadness	Shame
Increase in Nordic walking	64	38	2	7	9	1	0	4
Decrease in Nordic walking	0	0	0	0	15	0	0	1
Increase in other sports	8	2	0	1	14	2	0	0

Table 1. Positive and negative basic emotions and their sub-categories (modified from Laros and Steenkamp, 2005, 1441)

<i>Positive emotions</i>				<i>Negative emotions</i>			
Contentment	Happiness	Love	Pride	Anger	Fear	Sadness	Shame
Contented	Encouraged	Loving		Angry	Afraid	Depressed	Ashamed
Fulfilled	Enthusiastic	Passionate		Discontented	Nervous	Guilty	Embarrassed
Peaceful	Happy	Romantic		Envious	Panicky	Helpless	Humiliated
	Hopeful	Sentimental		Frustrated	Scared	Miserable	
	Joyful	Sexy		Irritated	Tense	Nostalgia	
	Optimistic	Warm-hearted		Jealous	Worried	Sad	
	Pleased			Unfulfilled			
	Relieved						
	Thrilled						

Table 2. Discussion forums in the four selected countries

	Finland	Poland	UK	USA	Total
Discussion forums on Nordic walking	suomi24.fi plaza.fi keho.net vauva.fi	nordicos.fora.pl, forumnordicwalki ng.pl, chodzezkijami.pl	walkingforum.c o.uk, nordicwalking.c o.uk	abc-of- nordicwalking.c om, outdoorsmagic.c om	
Comments in the selected discussions	182	222	193	64	661
Coded passages	1402	823	696	216	3137

Table 3. Positive emotions shared online: Data supporting interpretations

Emotion	Representative quotations
Contentment	<p>‘You can laugh at me if you want to. It’s nice to make other people happy!’ (Finland)</p> <p>‘I like Nordic walking because it encourages me to be active and lose weight. It is cheap (...), eco-friendly (...) and a lot of fun (...). You can talk while walking. It's nice :). It has become my second hobby, after cooking.’ (Poland)</p>
Happiness	<p>‘A long enough walk, lots of happy thoughts.’ (Finland)</p> <p>‘Nordic walking is a great sport. I am happy I tried it.’ (Poland)</p> <p>‘(...) after I tried it, I really liked it!’ (USA)</p>
Pride	<p>‘Enjoy the feeling of superiority over those walkers who stumble along using poles as props.’ (UK)</p>
Love	<p>‘By the end of that very long 60+ mile second section, I was in love. They helped tremendously to keep on pace when the legs were getting weary and helped power up the ascents.’ (UK)</p>

Table 4. Negative emotions shared online: Data supporting interpretations

Emotion	Representative quotations
Anger	<p>‘Go, [censored] off from the skiing track! They are not meant for walkers (...) You, morons!’ (Finland)</p> <p>‘I live in a small town so I never walk on the streets but —escape! into the woods. Every encountered person looks at me like I was an alien, and to be honest, it annoys me terribly.’ (Poland)</p> <p>‘[Nordic walkers] click-clacking their way around even on the flat, walking poles in full swing like some giant arachnid. Just something else to carry when one gets bored with them - what a complete waste of time. A fad.’ (UK)</p>
Fear	<p>‘It is difficult to start walking with the poles; I don’t dare to.’ (Finland)</p> <p>‘I’m worried that they [friends] might have a hard time in coping.’ (USA)</p>
Shame	<p>‘I walked passed a group of guys of 20 years of age (...) as soon as they saw me they pointed at me and started to laugh hard. They laughed at me so bad that I wanted to approach them and punch them (...) I did not react, but I felt terrible (...). Because of that I do not know if I will walk with poles (...). I have started to feel ashamed of walking with these poles. I am trying not to react but (...) I feel worse and worse / Why are people like that? Eh, today's walk was the worst in my life :/’ (Poland)</p>

Table 5. The triggers for the most common positive and negative common emotions:

Data supporting interpretations

	Contentment	Happiness	Anger
Nordic-walking activity	'I really enjoy Nordic walking.' (British discussion)	'I am full of enthusiasm and energy. I have discovered a new passion.' (Polish discussion)	'I tried Nordic walking with my pet one time, I'm tellin' you, it's quite stressful.' (US discussion)
Equipment	'(...) today, for the first time, I walked with my new Nordic-walking poles (...).Nordic walking with new poles is GREAT!!!!' (Polish discussion)	'I feel it was money well spent.' (British discussion)	'It's horrible to see people walking with too tall poles.' (Finnish discussion)
Environmental aspects of Nordic walking	'[Nordic walking] about 5 am is awesome: silence, peace, and especially now (...) whole bunch of birds (...) it's really cool.' (Polish discussion)	'If you are walking in a very nice place with pleasant sights and fresh air, your walk will be a much easier one and less tiring.' (US discussion)	'I haven't figured out how I could practice Nordic walking effectively and at the same time enjoy walking outdoors with my dog.' (Finnish discussion)
Social aspects of Nordic walking	'I met totally unknown people and we talked about beautiful weather. Could one have a nicer start to the day?' (Finnish discussion)	'Well, I found [a walking partner]. We walked 5 km, talking for the whole hour. In general I felt no fatigue, and yet I felt sweat running down my neck :) So we liked it and have walked five times already.' (Polish discussion)	'For me, the biggest let down are the people who know me and laugh openly. Annoying...' (Polish discussion)
Well-being	'I think that through Nordic walking I gain freedom, health, higher self-esteem, closeness to nature, efficiency and a beautiful silhouette.' (Polish discussion)	'Believe it or not it will lessen those flabs! before I had a bulging belly but after some weeks I notice it's slowly becoming firm, it made me feel good!' (US discussion)	'I have never felt it to be good. On the contrary, my elbows and fingers have become really sore after practising it.' (Finnish discussion)

Table 6. Shared emotions and expressed behavioural intentions: Data supporting

interpretations

	Contentment	Happiness	Anger
Increase in Nordic walking practice	<p>‘I walk in the woods and I'm very happy about it. I would recommend it to others!’ (Polish discussion)</p> <p>‘I've introduced many clients to the joys of poles and most seem to be converted to their benefit.’ (British discussion)</p>	<p>‘Well as long as you are fit you can do Nordic walking, believe me, it's awesome! At first, I was sceptical trying this Nordic walking, but actually after I tried it, I really liked it! But, consult first [with] your physician.’ (US discussion)</p> <p>‘I walk in the woods and I'm very happy about it. I would recommend it to others!’ (Polish discussion)</p>	<p>‘I think it would be annoying for you to concentrate on walking if you have a pet to tug along with, I mean you can't do two things at the same time right?’ (British discussion)</p>
Decrease in Nordic walking practice			<p>‘Nordic walkers, keep away from malls and other places where there are people. You're dangerous, your poles are often kept horizontally in the middle of the crowd. There's something wrong in you and that's not only your motorical abilities.’ (Finnish discussion)</p> <p>‘Personally, I have tried [Nordic walking] but never got on ... much prefer to have my hands free.’ (British discussion)</p>
Increase in other activities	<p>‘It [Nordic walking] suits for me and it's effective, and now mamas, sit tight, cause I'll tell you my other silly and unsexy hobby: water running! It's also effective and fits for me.’ (Finnish discussion)</p>	<p>‘Why do you want to buy Nordic-walking poles? You should go trekking! I have a set of trekking poles and I am very satisfied with them. The grip is better and walking with them is easier.’ (Polish discussion)</p>	<p>‘No poles, thank you! I can walk on my own and move my hands and legs without poles. I'm 60+ and swim and do Hydro running weekly.’ (Finnish discussion)</p>

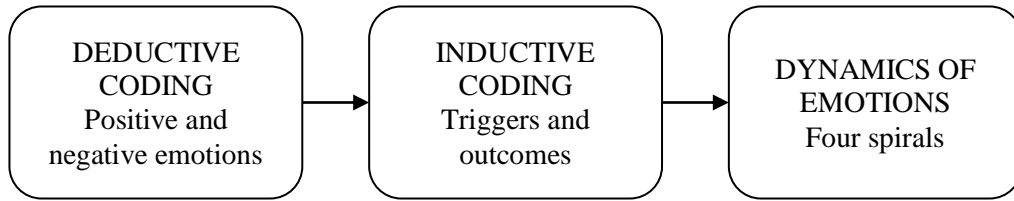


Figure 1. Data-analysis process

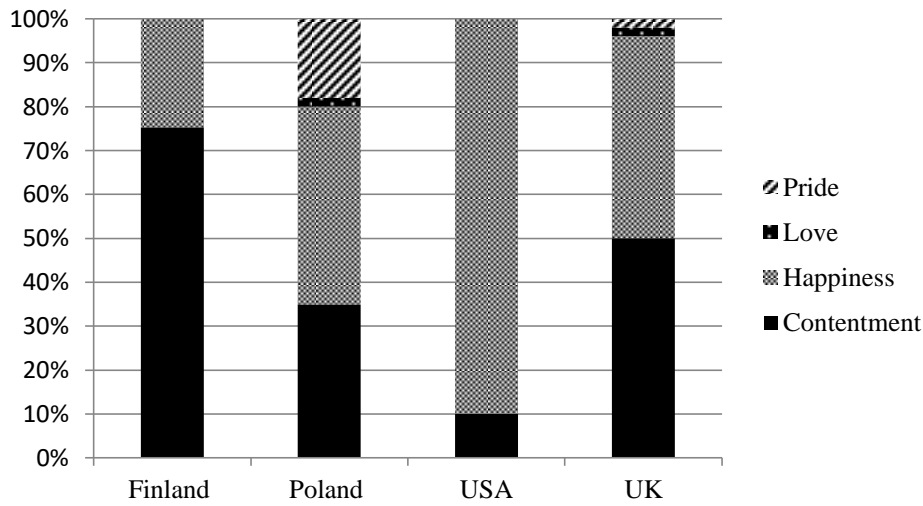


Figure 2. Positive emotions

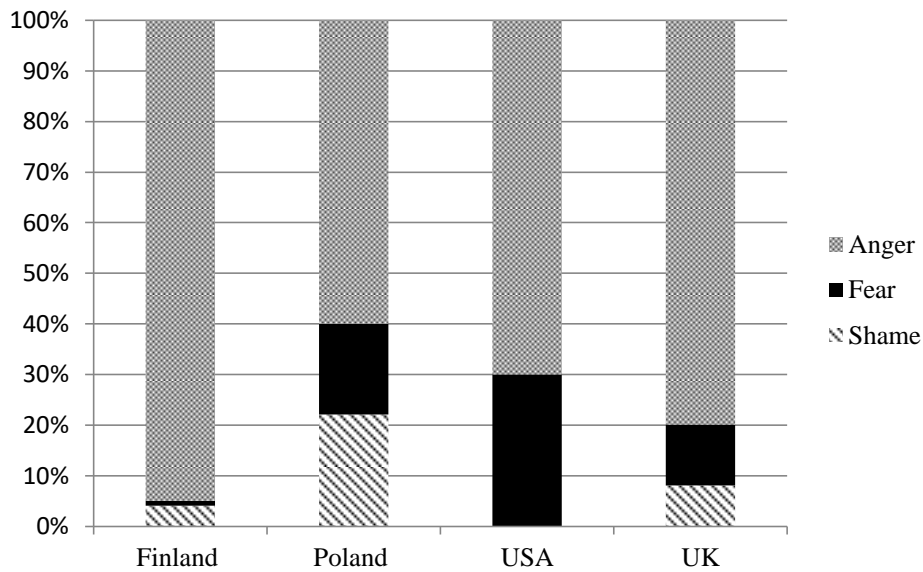


Figure 3. Negative emotions

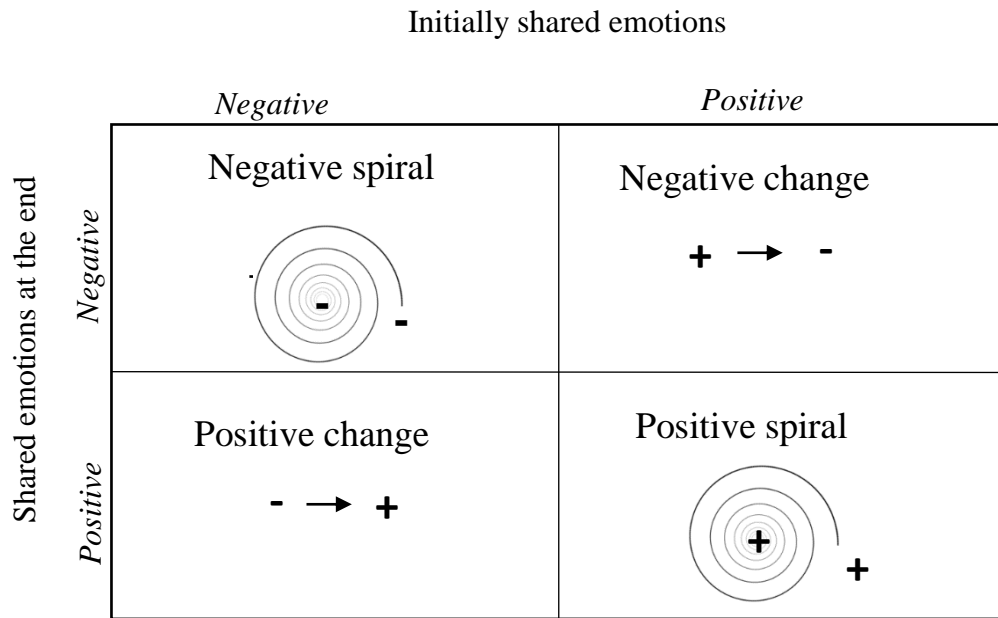


Figure 4. Four types of dynamics in the sharing of emotions online