From self to planet: Exploring the link between well-being and sustainability in online conversations[1][2]

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Abstract

Frame of the research: *In light of growing concern for environmental conservation and rising awareness of the significance of both physical and psychological well-being, the literature has shown a link between individual well-being and environmental sustainability. Nevertheless, none of these studies has analyzed the bidirectional relationship between these two domains and the influences that one has on the other.*

Purpose of the paper: *The paper aims to explore online conversation involving well-being and sustainability, to understand how users perceive, relate to, and emotionally respond to these topics. The objective of this study is to identify emergent themes, attitudes, and communicative patterns within the domain of user-generated content (UGC).*

Methodology*: A web-listening methodology was employed to collect a dataset comprising over 75,000 Italian-language public posts. These were sourced from a variety of social media platforms, blogs, forums and review sites, and were collected over a period of 12 months. The present study employed a mixed-methods design, integrating quantitative metrics (e.g. mentions, engagement, sentiment) with qualitative content analysis of a selection of posts.*

Results*: The findings indicate that well-being and sustainability are progressively perceived as integral lifestyle choices. The overarching themes that emerged included aesthetic care, nutrition, nature, and physical activity. A thorough investigation into the sentiment expressed by users in their online conversations pertaining to the subjects was conducted. The investigation revealed a predominantly positive attitude among users.*

Research limitations: *The study is limited by the temporal scope (12 months). Furthermore, the emphasis on Italian-language content may constrain the generalizability of findings to other cultural contexts.*

Practical implications: *Businesses should align their communication strategies with seasonal dynamics and platform-specific engagement. In addition, emphasis on optimistic yet realistic messages may prove more effective in promoting sustainable behaviours.*

Originality of the paper: *This study presents a new application of web listening to examine the intersection of sustainability and well-being. It offers an authentic,*

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data-driven perspective on how digital communities connect personal health with the health of the planet.

Keywords: *environmental sustainability; individual well-being; user generated content; web listening; sentiment analysis*

1. Introduction

In recent years, increasing attention has been paid to the relationship between individual well-being and environmental sustainability (Ericson *et al.*, 2014; Liu *et al.*, 2022; Minor *et al.*, 2023). The literature suggests that well-being can function as both a driver and a barrier for pro-environmental behaviours (Innocenti *et al.*, 2023; Binder and Blankenberg, 2016). It has been shown that individuals who experience a state of well-being show greater sensitivity to environmental issues and are more likely to adopt sustainable behaviours, such as recycling and using environmentally friendly means of transportation. Consequently, this results in an increase in their sense of accomplishment and purpose (Ericson *et al.*, 2014; Innocenti *et al.*, 2023). Conversely, individuals who experience lower levels of well-being may lack the emotional resources or energy to prioritize sustainability (Binder and Blankenberg, 2016; Innocenti *et al.*, 2023). At the same time, environmental conditions, such as access to clean air, green spaces, and biodiversity have a proven impact on physical and psychological health, contributing to improved quality of life (Kjell, 2011; Lehberger *et al.*, 2021; Martin *et al.*, 2020; Minor *et al.*, 2023). Yet, the effects of climate change are increasingly threatening this delicate balance. The growing frequency of extreme weather events and ecological degradation exacerbates physical risks and mental distress, triggering cycles of disconnection and disengagement (Curll *et al.*, 2022; Lawrance *et al.*, 2022; Ogunbode *et al.*, 2022). These dynamics suggest that sustainability is not only a planetary issue but also a question of public health and personal well-being.

From a marketing and management perspective, the relationship between sustainability and well-being has long been debated. Traditional marketing paradigms have often emphasized the association between consumers' well-being and material possessions (García-Rodríguez *et al.*, 2025), promoting the idea that happiness stems from acquisition and consumption. Unfortunately, this consumption-driven pursuit of well-being has contributed to unsustainable production and consumption system, pushing the planet to its ecological limits (Lin *et al.*, 2021). For decades, it was assumed that reducing consumption would necessarily reduce individual happiness, implying that sustainability goals would conflict with well-being (García-Rodríguez *et al.*, 2025).

Recent research has challenged this view, demonstrating that sustainable and conscious consumption can actually improve personal well-being (Bahl et al, 2016; Elo *et al.*, 2024; Dhandra, 2020). Sustainable behaviours, such as purchasing green products, reducing waste or engaging in pro-environmental conducts, are increasingly associated with feeling of

coherence and higher well-being (Jägel *et al.*, 2012; Capstick *et al.*, 2022; Mao *et al.*, 2025). Furthermore, current unsustainable consumption patterns are not only harmful to the environment, but also to individual and collective health (Dhandra, 2019; Duguleană and Croitoru, 2021). This emerging perspective reframes sustainability as a path to well-being rather than a constraint on consumption, marking a paradigm shift from materialistic to conscious and purpose-driven consumption.

The link between sustainability and well-being has been explored in various fields with different methods (see García-Rodríguez *et al.*, 2025). However, despite this growing attention in consumer and marketing literature, little is known about how the relationship between well-being and sustainability is perceived, interpreted, and communicated in everyday life. To fill this gap, this study investigates the relationship between well-being and sustainability through the lens of social media conversation, examining what and how is discussed on these channels regarding these topics. Research has yet to examine how marketers leverage this connection in brand communications and how users express it in a spontaneous and unbiased context. Therefore, drawing on a web listening methodology, the study explores online conversations to uncover the attitudes, emotions, and representations associated with these two interconnected concepts. User-generated content (UGC), as a spontaneous and unfiltered form of public expression, provides a valuable resource for capturing authentic insights into how these themes are discussed and connected in everyday digital conversations. From a managerial perspective, these insights can inform sustainable branding, communication, and consumer engagement strategies, thus helping organizations to understand when and how to communicate the two domains effectively, whether jointly or by leveraging one to reinforce the other.

The paper is structured as follows: next section provides a theoretical perspective of the research; the methodology section describes the research techniques used, the data collection procedure and analysis methods; the last sections discuss the results, managerial and theoretical implication and future research avenues.

2. Literature review

The concepts of well-being and environmental sustainability are central to this study and require a clear theoretical foundation. Well-being has been widely recognized as a multidimensional and dynamic construct, shaped by philosophical, psychological, and social paradigms (Ryff, 2021). The World Health Organization (WHO) has defined it as "a state of emotional, mental, physical, social, and spiritual well-being that enables individuals to achieve and maintain their full potential within society". This holistic definition reflects the interaction of various aspects of the human experience, emphasizing the importance of balance and integration between the physical and emotional spheres. In contrast, environmental sustainability implies the conscientious and fair use of natural resources, to safeguard ecosystems and avoid use that exceeds the regenerative capacity of the planet (Goodland and Daly, 1996). Climate change, caused

primarily by anthropogenic activities, poses a significant challenge to environmental sustainability. This challenge is evidenced by phenomena such as global warming, sea level rise, and biodiversity loss (OECD, 2024). The adverse effects of climate change extend beyond ecological systems and have significant consequences for individual well-being (OECD, 2024). Extreme weather events, including floods, droughts, heatwaves, and hurricanes, have been shown to affect both physical and psychological health. On a physical level, they increase the risk of illness, injury, and mortality (Harlan and Ruddell, 2011; Kovats and Hajat, 2008; Lieber *et al.*, 2022). Concurrently, these events precipitate emotional and psychological distress, encompassing stress, anxiety, and depression (Barchielli *et al.*, 2022; Clayton, 2020; Gifford and Gifford, 2016).

Importantly, mental health impacts of climate change can result from both direct and indirect exposure. Direct exposure is defined as the experience of the physical consequences of climate events firsthand, which often results in post-traumatic stress disorder (PTSD), anxiety, and depression (Doherty and Clayton, 2011; Gifford and Gifford, 2016). Indirect exposure, by contrast, occurs through observation or awareness of climate change, often via media content, without personal involvement. This form of exposure can elicit intense emotional responses, such as fear, guilt, sadness, and helplessness, and may contribute to broader declines in subjective well-being and even the onset of mental disorders (Clayton, 2020; Kurth and Pihkala, 2022; Cunsolo and Ellis, 2018).

These emotional responses align with well-documented anxiety-related states in the literature, including eco-anxiety (Kurth and Pihkala, 2022), climate anxiety (Clayton, 2020), and ecological grief (Cunsolo and Ellis, 2018). When experienced at moderate levels, such emotions may foster adaptive responses, motivate pro-environmental behaviours, and support psychological well-being. Environmental actions, in this context, serve as a mechanism for transforming anxiety and grief into tangible forms of engagement, thereby mitigating feelings of helplessness (Bouman *et al.*, 2020; Berglund, 2019). From this perspective sustainable behaviours can enhance individuals' sense of well-being, promoting a sense of empowerment and coherence (Binder and Blankenberg, 2016). This dynamic gives rise to a virtuous cycle in which emotional discomfort becomes a catalyst for engagement and environmental commitment, providing motivation and psychological resilience.

Conversely, the same emotional responses may also evolve in a maladaptive direction. The complex, large-scale, and urgent nature of ecological crises may generate psychological overwhelm, particularly when individuals perceive the challenges as too vast or intractable (Haltinner *et al.*, 2021). In these cases, intense states of eco-anxiety, climate anxiety, and ecological grief are generated, which can culminate in a condition described as eco-paralysis: a state of emotional immobilization and behavioural inaction driven by psychological overload and the perceived lack of individual efficacy in dealing with the crisis (Albrecht, 2011). This condition compromises both mental health and the ability to engage proactively with the environment (Wullenkord *et al.*, 2021; Hart and Nisbet, 2012).

Two factors that can shape the intensity and direction of these emotional responses are the way and the context in which sustainability issues are communicated. Given that individuals increasingly engage with sustainability content through social media, the framing of such messages can indirectly shape climate-related emotional responses (Liu and Kuang, 2024). The immediacy and intensity of digital communication may heighten anxiety when issues are presented pessimistically, or conversely, support constructive engagement when framed around solution and effectiveness (Sanford *et al.*, 2023). Recent studies show that positively framed messages, focused on achievable solutions, benefits, and hope, tend to foster longer-lasting engagement with sustainable actions (König and Maier, 2024; Olbermann *et al.*, 2024). In contrast, negatively framed messages may be effective in the short term but often elicit feelings of helplessness or paralysis (Sanford *et al.*, 2023). While messages emphasizing the negative consequences of environmental degradation can raise awareness, their excessive use may provoke avoidance rather than proactive behaviour (Carlson *et al.*, 2020; Olbermann *et al.*, 2024). In this sense, communication strategies that emphasize gains, opportunities, and collective effectiveness appear more effective in promoting sustained engagement, as positive emotions are generally more conducive to constructive action.

Beyond emotional and psychological response, prior research has also highlighted that the relationship between well-being and sustainability can manifest through everyday practices and lifestyle choices, including consumption. Marketing studies indicate that engaging in sustainable behaviours can simultaneously enhance individuals' well-being (García-Rodríguez *et al.*, 2025). In particular, several sectors have been examined where environmental sustainability and individual well-being intersect, including food consumption (Xie *et al.* 2022; Alotaibi and Abbas 2023), access to green space (Stoltz and Schaffer, 2018), sport participation (Wicker and Thormann, 2022), sustainable fashion consumption (Bardey *et al.*, 2022), and sustainable lifestyle practices more broadly (Binder and Blankenberg, 2017; Daniels and Gupta, 2025). These studies demonstrate that more sustainable choices in these domains can enhance individual well-being, while higher levels of well-being are also associated with greater engagement in pro-environmental behaviours and responsible lifestyles (Nhung Thang and Nguyen, 2025; García-Rodríguez *et al.*, 2025).

These findings suggest that well-being and sustainability may reinforce each other through everyday practices, including communication through online platforms and social media content that users engage with (García-Rodríguez *et al.*, 2025; Binder and Blankenberg, 2016; König and Maier, 2024). Despite the existence of scientific contributions highlighting the interconnection of well-being and sustainability across psychological, sociological, managerial, and marketing perspectives (García-Rodríguez *et al.*, 2025), no study to date has examined how these topics are actually expressed in public online conversation, or how they are communicated, including the use of positive and negative framing and associated themes. Understanding these aspects is important to grasp how well-being and sustainability are approached in everyday life, and how they might be promoted simultaneously in ways that reinforce each other rather than creating conflicting or adverse effects.

To begin addressing this gap, this study proposes an exploration of online conversations on these themes through digital platforms. These environments provide access to vast volumes of spontaneous and unfiltered conversations in which users express emotions, opinions, and concerns related to both well-being and sustainability. This type of data, commonly referred to as user-generated content (UGC), has been successfully employed to investigate diverse phenomena, including healthcare (Abirami and Askarunisa, 2017; Marchetti *et al.*, 2022; Wong *et al.*, 2015), tourism (Lee *et al.*, 2020; Marcolin *et al.*, 2021), political behaviour (Wu *et al.*, 2020), and sustainable consumption (Bellini *et al.*, 2024).

Building on this approach, the present study adopts a web listening methodology to examine how people discuss and connect the concepts of well-being and sustainability in online context. This method offers a richer and more authentic understanding of public conversation than traditional research approaches, enabling the detection of subtle patterns of meaning, sentiment, and engagement that might remain hidden in traditional research settings.

3. Methodology

To achieve a more comprehensive and nuanced understanding of the observed phenomena (Andreotta *et al.*, 2019), the research adopted a mixed-methods approach, integrating the quantitative analysis of data with an in-depth qualitative assessment. the data were collected using the Blogmeter Suite, a web and social intelligence platform that provides tools for the aggregation, monitoring, and analysis of data from a plethora of online sources. The Blogmeter Suite collects data exclusively from publicly available online sources, integrating information retrieved through official platform APIs where accessible. Data collection fully complies with the terms of service of each platform, and no private or restricted content was included in the analysis. All data were analysed in anonymized form, as provided by the platform, in full compliance with the General Data Protection Regulation (GDPR).

The platform facilitates access to an extensive database comprising over 2 billion documents, thereby enabling the monitoring and analysis of user conversations across various digital platforms, including social media such as Facebook, X (formerly Twitter), Instagram, YouTube, TikTok, Twitch, as well as forums, blogs, news sites, and app review platforms. The comprehensive data extraction and analysis capabilities of the platform facilitated the aggregation of a substantial and diversified array of information, thereby offering a representative overview of the subjects discussed in online conversations.

This methodological choice aligns with the aim of exploring how the concepts of well-being and sustainability are spontaneously connected in everyday digital conversations, as it captures a large number of unfiltered narratives that reflect how people perceive, interpret, and relate these two domains without researcher intervention. The web listening approach enables the continuous and systematic monitoring of public online conversations, and thus the identification of themes, emotions, and

discursive patterns emerging from spontaneous interactions among users. The analysis focuses on user generated content (UGC) produced by a variety of actors (consumers, brands, organizations, and influencers) who collectively contribute to shaping public discourse around these topics. While differences in coverage across platforms may occur due to data access and API restrictions, which can favour verified or business accounts, the dataset captures a heterogeneous mix of contributors, ensuring a rich and diversified representation of spontaneous online conversations. The study is exploratory in nature and does not aim for statistical representativeness, but rather for a qualitative and interpretive understanding of how users discuss and relate well-being and sustainability.

The analysis was restricted to the Italian context for reasons pertaining to the interpretation and reliability of the output, as well as to the cultural divergences that may manifest in users' interest in and approach to the subjects under consideration. With regard to the initial point, the incorporation of content from disparate nationalities has the potential to complicate matters. The presence of differing cultural and linguistic backgrounds may give rise to variations in expression patterns and the subjects discussed, which could, in turn, lead to analytical confusion. Furthermore, the employment of particular keywords may result in the inclusion of irrelevant content or, conversely, the exclusion of relevant material if the keywords do not precisely align with searches conducted in languages other than Italian.

The keywords employed to guide the analysis focused on central themes related to well-being and sustainability, with the aim of identifying the main discourses and trends in these areas. All keywords were originally entered in Italian, consistently with the scope of the analysis, and are translated into English in this paper for international readably. Specifically, the search query was designed to identify all discussions in natural language that referred to the concepts of well-being and health. Key terms included expressions such as "well-being," "health," "mental health," "self-care," and "personal care," along with various hashtags related to these themes, such as #well-being, #wellness, #health, and #selfcare. Concurrently, to explore discussions related to sustainability, terms such as "sustainability," "environmental sustainability," and "green" were used, along with hashtags #sustainability, #sustainable, and #green.

The time frame for the data analysis spanned from June 2023 to May 2024, providing a sufficiently broad window to observe trends, developments, and changes in online conversations about these topics. Following the extraction of the raw data, a meticulous manual cleaning process was conducted to ensure that only relevant content was included in the final analysis. Specifically, only instances of the keywords that addressed the themes of well-being and sustainability were selected, thus excluding irrelevant or off-topic data.

With regard to the quantitative analysis, a number of metrics were adopted in order to provide a comprehensive overview of online activity related to these subjects. The metrics included the total number of messages related to well-being and sustainability, the level of engagement generated by each post (i.e., the level of interaction generated by the posts,

such as comments, likes, and shares), and the sentiment associated with the content, which was divided into positive and negative. The sentiment analysis was conducted using Blogmeter's proprietary opinion mining system, which applies Natural Language Processing (NLP) models specifically trained on Italian-language data.

These measurements enabled the quantification and analysis of the intensity and direction of public discourse on well-being and sustainability, offering useful insights into how these topics are treated and discussed on social media platforms and online media.

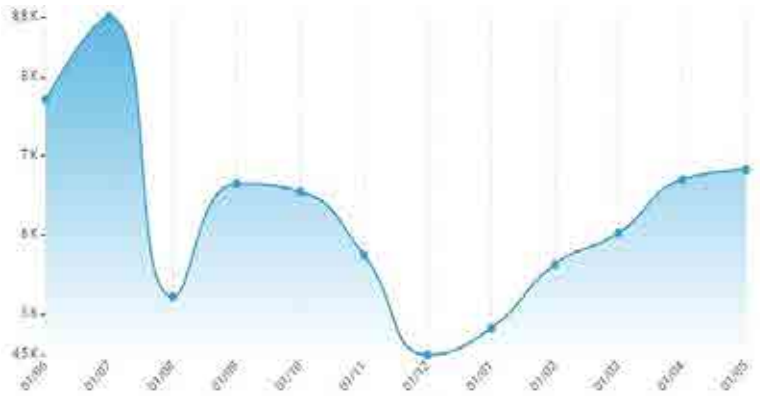
4. Results

4.1 Descriptive analysis

Well-being and sustainability are widely discussed topics online, as evidenced by the results they collect a substantial volume of content embodying these themes with mentions amounting to 75.08k and a significant level of engagement (6.63M). This phenomenon indicates a high interest in self-care and environmental care in online conversations.

Mentions refer to the number of original documents that include at least one of the keywords set as the search criteria while its temporal evolution is examined through the history, over the considered time period (12 months) of the number of original documents that match the search criteria (see Figure 1). The chart illustrates a decrease in the discussion of the topics analysed during summer vacation and holiday periods, followed by an increase in the months typically associated with the resumption of daily activities, such as September and January.

Fig. 1: Time evolution of mentions (total mentions over the period: 75.08K)

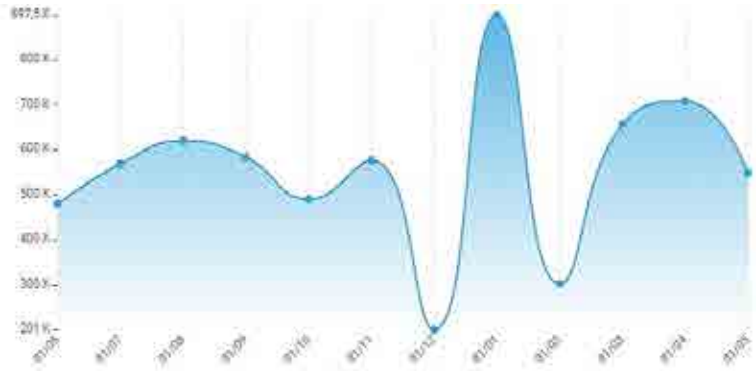


Source: Blogmeter Suite

The engagement (6.63M) represents the total number of user interactions with individual posts, including comments. These interactions originate from platforms such as Facebook, Twitter, Instagram, YouTube,

Twitch, and blogs. Overall, 6,630,000 interactions were recorded on posts and comments related to sustainability and well-being. It is also relevant to examine the temporal evolution of user engagement (see Figure 2). An analysis of the twelve-month timeline reveals a peak in engagement during the Christmas period, followed by a decline immediately after the holidays. Subsequently, a recovery is observed from February through April, with a new decrease in May. This trend is in contrast with the one observed in Figure 1. It seems that, during the holiday period, users are less inclined to take active action online to express their opinions and experiences but appear more attentive to the contents of other users, towards whom they show greater engagement.

Fig. 2: Time evolution of engagement (total engagement over the period: 6.63M)



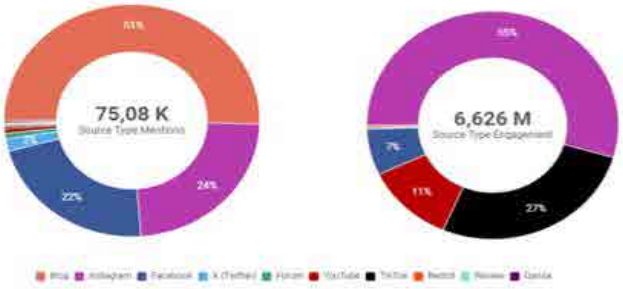
Source: Blogmeter Suite

The graphs in Figure 3 illustrate the distribution of mentions and engagement across sources under analysis, highlighting which platform leads the discourse under analysis. Newspaper articles were excluded from the graph for two reasons: first, because these articles are often sponsored or remunerated, which can result in a biased representation of public opinion and, consequently, a distortion of the data; second, including media content produced by professional journalists would have altered the nature of the dataset, shifting the focus from user-generated content to institutionally mediated narrative.

In terms of mentions, blogs (51%) rank first, followed by Instagram (24%) and Facebook (22%), while other platforms remain marginal. While in terms of engagement, a completely different situation emerges. Instagram (55%) and TikTok (27%) show a high level of engagement, revealing that the few posts on the topics on the two platforms generate a lot of interest and engagement. In contrast, blogs are not represented in the engagement graph, suggesting that despite the high volume of content production on the analysed topics, they do not generate significant interactions. This is likely due to the nature of blogs, which are primarily designed for reading and offer limited interactive features, usually restricted to comments. However, such interactions are not comparable to those enabled by social

media platforms such as Instagram and TikTok, which provide a far more dynamic and interactive user experience.

Fig. 3: Number of mentions and level of engagement by source type



Source: Blogmeter Suite

4.2 Most used terms

A general overview of the connection between these two overarching topics is provided by the terms cloud in Figure 4, which highlights the most frequently discussed themes and recurring concepts related to well-being and sustainability. Users describe well-being and sustainability as a lifestyle to be embraced in the pursuit of a healthy life, not only for oneself but also for the planet. The terms most frequently associated with these concepts relate to four main areas: aesthetic care (aesthetics, skincare, beauty, haircare, makeup, cosmetics, natural cosmetics, plant-based cosmetics); nutrition (nutrition, diet, food, healthy eating, organic, vegan, nutritionist); nature (nature, natural, green); and physical activity (sports, coach, fitness).

Fig. 4: Terms cloud

Source: Blogmeter Suite

Aesthetic care and individual well-being. According to users, taking care of self-appearance is not just an act of beauty, but a self-care ritual that helps to improve physical and psychological health. Online posts often promote products that use natural, environmentally friendly ingredients, enabling people to take care of themselves while maintaining ecological awareness. Emphasis is placed on cosmetics such as natural skincare and plant-based products, which not only enhance external appearance but are also safer for the environment due to recyclable or biodegradable packaging and the use of ingredients from sustainable agriculture. The adoption of such products is promoted as a way of living in harmony with nature without compromising personal care.

Healthy and Sustainable Nutrition. Nutrition is the second most discussed topic. Online posts regarding diet promote healthy eating habits, often favouring plant-based foods without necessarily excluding other types of products. Many users emphasize the importance of buying organic, locally sourced and seasonal foods: choices that not only promote physical well-being, but also reduce the environmental impact associated with transportation and food production. A post by @sinu_italia (Italian Society of Human Nutrition) illustrates how individual food choices can have a significant effect on the health of the planet by encouraging conscious practices that reduce one's ecological impact, such as plant-based diets.

"[…] Nutrition not only affects our well-being but also has a profound impact on the environment! Every food choice can either support the health of our planet or contribute to its degradation. […] Choose local and seasonal products […]. Reduce food waste […]. Embrace environmentally low-impact diets […]. Plant-based diets require fewer natural resources and produce lower greenhouse gas emissions than meat-heavy diets".

Some posts adopt a more radical stance, outright condemning the consumption of animal-based products and advocating for a vegan diet, which is seen by users as the most environmentally sustainable choice. The vegan diet is frequently praised not only for its health benefits (such as reduced risks of cardiovascular diseases and diabetes), but also for its lower ecological impact given its reduced reliance on natural resources and lower greenhouse gas emissions. The awareness of how one's diet can affect global climate change is increasingly widespread, with users perceiving dietary changes as an opportunity for both personal and collective improvement. A representative example of this perspective is a post by @attivismo_vegano, which frames veganism as a responsible choice for both personal health and environmental sustainability.

"Veganism is much more than just a dietary choice; it is a philosophy that embraces compassion, ethics, and sustainability in a deep and integrated way. […] The ethics of veganism are based on the belief that animals are not resources to be exploited but sentient beings with the right to life and freedom. […] Moreover, veganism is closely tied to environmental philosophy. The devastating impact of intensive livestock farming on our planet is well documented: deforestation, excessive water use, and greenhouse gas emissions.

Adopting a vegan diet is an act of responsibility towards our planet, a concrete step to preserve natural resources for future generations. […] *Reducing the consumption of animal products can prevent chronic diseases and promote a long and healthy life. […] Veganism is not just a diet; it is an ethical and sustainable revolution for a better world".*

Although radical, this approach underscores how individual choices can have a significant and positive impact on the future, both for human health and for the sustainability of the planet.

Another widely addressed topic concerns achieving and maintaining an optimal weight, which is regarded both as a health-promoting behaviour and as a means of lowering the demand on natural resources. A clear example of this perspective is reflected in the Spreco Zero (Zero Waste) campaign driven by Andrea Segrè, an Italian agronomist and economist known for his work in promoting sustainable development models and combating food waste. In one of his social media reels, Segrè highlights how food choices directly affect both health and the environment. Specifically, the concept of "junk food" is presented as doubly wasteful: on the one hand, it contributes to increased food waste and CO_2 emissions, exacerbating climate change; on the other hand, it increases the risk of metabolic diseases, such as diabetes, thus increasing health care costs.

"[…] Did you know that junk food causes double damage—or rather, double waste? Food and Environmental Waste: If these foods end up in the trash, they increase the volume of food waste, raising CO_2 emissions and contributing to climate change. Health Waste: If they end up in your stomach, they increase body weight, leading to obesity and metabolic diseases like diabetes, and thus increase healthcare costs. […]"

Nature and Outdoor Physical Activity. The other two significant topics emerging from online discussions are nature and physical activity, which are often perceived as closely interconnected. Users argue that engaging in outdoor sports in natural environments not only enhances physical well-being but also has a positive effect on mental health. The relationship between physical activity and nature is particularly valued, as it provides a means to connect with the environment, reduce stress and improve mood. An article exemplifying this type of wellness highlights the benefits of cycling, an activity that not only helps to keep fit but also promotes a healthy and sustainable lifestyle.

"Why choose cycling? It's a fun and healthy activity! Here's why kids should start pedaling: Healthy heart: Strengthens the heart and improves circulation. Toned muscles: Increase muscular strength and endurance. Burns calories: Helps lose weight and stay fit. Peaceful mind: Boosts happiness and well-being. Eco-friendly: Saves money and respects the environment. Social: Join events and meet new people. Pedal hard, smile at the challenge, and never stop!"

Finally, the importance of green spaces in urban areas also appears to be a relevant issue in this context. Users point out that green areas in cities both improve individual well-being and encourage more sustainable lifestyles. Users report that the creation of urban parks and gardens helps reduce air pollution and provides space for outdoor physical activity, motivating people to get around without relying on polluting means of transportation.

The interconnection between well-being and nature is also reflected in the growing demand for green mobility. The promotion of sustainable means of transportation (such as bicycles and electric scooters) is considered essential to reduce CO_2 emissions and encourage an outdoor lifestyle that benefits both health and the environment.

4.3 Sentiment analysis

Online conversations about well-being and sustainability reveal positive acceptance, with most users expressing favourable opinions (71%), focusing on the benefits of a healthy and environmentally friendly lifestyle (Figure 5). However, a non-negligible portion of the content (22%) is characterized by criticism and complaints. Thus, two contrasting views emerge from the online posts: a positive attitude, oriented toward change and optimism, and a negative one, highlighting critical issues and inviting deeper reflection. The latter approach reflects the urgency for radical change and awareness of the serious environmental challenges facing society.

Fig. 5: Sentiment Map

Source: Blogmeter Suite

Positive posts highlight changes resulting from adopting beneficial behaviours that not only improve individual well-being but also contribute to environmental conservation. In particular, many users celebrate the importance of conscious food choices (such as buying organic, locally sourced, and seasonal produce), emphasizing how these decisions can have a positive impact on both personal well-being and the planet. Users share experiences that illustrate, for example, how a commitment to healthy, sustainable eating can significantly reduce environmental impact by minimizing emissions associated with food production and transportation. Adopting a diet that favours local and seasonal foods is seen as an act of responsibility, as it promotes conservation of natural resources and reduces food waste. Many users also choose to share visual content, such as reels and video tutorials, in which they show, for example, how to grocery shop in a healthy and environmentally friendly way. These materials provide practical advice on how to prepare meals that are not only nutritious and inexpensive but, more importantly, environmentally sustainable. A concrete example of this approach is a video by TikTok that presents *"4 solutions for ethical and sustainable food shopping! [...]"*

While posts with negative sentiment (22%) focus on the negative consequences of unsustainable behaviours and the urgent need for radical change. These posts aim to raise awareness of the serious impact of human actions on the environment and biodiversity. In particular, many users point out how human activity has profoundly altered natural ecosystems, causing irreversible losses of habitats and species. Issues such as deforestation, pollution, and climate change are addressed in these messages using dramatic language to convey the gravity of the current situation. A particularly significant example in this regard is the following post, which denounces the pressure human activity exerts on natural balances:

"We are an intrusive species. Through our activities, we have significantly altered three-quarters of the Earth's land and more than 60% of the marine environment […]".

The frustration conveyed in these messages is fuelled by the fear that, without profound and immediate change, the issues related to sustainability will continue to worsen. The tone is often urgent and reflective. The need for a radical shift in human behaviours is emphasized, with a call for both individual and collective responsibility. These contents push users to critically assess their behaviours, urging concrete action to prevent the situation from becoming irreversible.

In conclusion, the online debate on well-being and sustainability is characterized by two opposing polarities: the positive, which highlights the benefits of sustainable dietary and behavioural choices, and the negative, which denounces environmental issues and calls for radical change. While many users choose to focus on messages of optimism and empowerment, other voices criticize the current consumption model and call for a deep and urgent reflection on the damage caused by human actions. This contrast between positivity and denunciation creates a vibrant and complex debate, encouraging people to engage with the reality of global challenges.

5. Discussion and managerial implication

This web listening research confirms the growing online interest in individual well-being and environmental sustainability and highlights the strong interconnection between these two dimensions.

This synergy between well-being and sustainability represents an important strategic lever. Topics such as healthy eating, physical activity, self-care, and contact with nature intertwine in a balanced lifestyle that meets both individual and environmental needs. The increasing attention to natural cosmetics, organic foods, and outdoor activities demonstrates how daily choices can promote both personal and planetary health. These insights are consistent with prior research demonstrating the close interconnection between well-being and sustainability in everyday consumption practices (García-Rodríguez *et al.*, 2025). In line with this literature, several domains, such as food consumption, sport participation, self-care routines, and access to green spaces, emerge as key contexts in

which individual well-being and environmental sustainability mutually reinforce one another (Xie *et al.* 2022; Alotaibi and Abbas 2023; Stoltz and Schaffer, 2018; Wicker and Thormann, 2022). At the same time, some patterns that have been documented in earlier studies, such as sustainable fashion consumption (Bardey *et al.*, 2022), appear less prominent in the present analysis. This likely reflects the relatively early stage of diffusion of this sector within the Italian market compared to other national contexts (Il Sole 24 ORE, 2025).

Taken together, these findings not only corroborate evidence that specific consumption sectors can simultaneously foster individual well-being and environmental sustainability (Nhung Thang and Nguyen, 2025; García-Rodríguez *et al.*, 2025) but also show that such synergies are mirrored in public online conversations. This alignment between scholarly evidence and everyday conversation highlights a strategic opportunity for organizations. By integrating these values into their communication strategies and market offerings, firms can better engage growing segment of consumers who view sustainable and well-being-oriented practices as complementary rather than competing priorities.

The research shows platform-based differences: blogs, despite extensively addressing these topics, generate little engagement, likely due to their less interactive nature. In contrast, social network shows high levels of engagement. This suggests the opportunity to differentiate the communication strategies, focusing on more dynamic platforms to stimulate active conversations and reserving blogs for more in-depth content.

Results also suggest that users tend to reflect more on well-being and sustainability during the vacation periods. These data provide strategic insights for brands and influencers: during periods of high engagement, although with fewer mentions, interactive content (such as challenges and experience sharing) can be proposed, while in moments of higher activity, it is useful to focus on reflective content that promotes long-term sustainable choices. In this way, online activities can align with the seasonal cycles of user interest.

Another key point concerns the communication methods used on the web. Based on sentiment analysis, two main approaches are observed: positive-positive and negative-positive. The first promotes positive changes by leveraging hope and concrete solutions and being more effective in the long term, as it stimulates self-efficacy and proactive engagement. The second approach, which is based on fear and guilt, may attract attention and induce quick actions, but it risks causing disengagement if it is perceived as too alarming.

Although the literature highlights that gain-framed, positively valenced messages tend to foster intentions to act pro-environmentally (König and Maier, 2024; Olbermann *et al.*, 2024), whereas loss-framed and pessimistic messages may elicit helplessness or paralysis (Sanford *et al.*, 2023). Our findings show that a considerable share of users (22%) still adopts loss-based framing. This tendency may expose individuals to psychological risks and increase the likelihood of eco-paralysis, especially when negative emotions are repeatedly emphasized.

From a practical perspective, sustainable nudging emerges as a valuable tool for translating communication strategies into tangible behavioural outcomes (Thaler and Sunstein, 2021). Nudging refers to subtle adjustments in the decision-making environment that guide individuals toward more sustainable choices without limiting freedom (Thaler and Sunstein, 2008). In the context of environmental and health communication, such interventions can support the adoption of responsible behaviours by making them more intuitive, accessible, and emotionally rewarding. For instance, highlighting the number of people who engage in sustainable actions or showcasing the progress they achieve can foster a sense of collective efficacy and positive momentum. Rather than focusing exclusively on environmental catastrophes, this approach may help prevent eco-paralysis and instead encourage constructive and hopeful engagement.

However, both communicative approaches appear to be "approved" and leveraged by users and can therefore guide communication choices depending on the objectives and target audience. Each mode of expression has different persuasive potential depending on the context. The positive-positive approach, for example, is particularly useful for stimulating engagement and promoting gradual behaviour changes in the medium-long term. In contrast, the negative-positive approach proves effective for raising awareness of the negative consequences of certain actions and encouraging the adoption of immediate, concrete behaviours.

6. Limitations and future agenda

The study represents an exploratory phase of a larger project aimed to investigate the relationship between well-being and sustainability.

The limitations of the study mainly concern the methodology adopted. First, the maximum time coverage of 12 months may have limited the observation of long-term dynamics. In the future, it will be necessary to implement a longitudinal approach to identify recurrent patterns of engagement more precisely and assess their repeatability.

A further limitation concerns the lack of demographic data, which the platform does not provide, thus preventing any segmentation based on sociodemographic variables. This represents a critical issue, particularly in light of existing literature showing that younger people tend to be more sensitive to environmental issues (Rousell and Cutter-Mackenzie-Knowles, 2020). In this regard, it would be especially relevant to analyse the sample composition to identify which user groups are most actively engaged in online conversations.

Moreover, an in-depth analysis on the communicative tone is also proposed, with a focus on the use of negative-positive or positive-positive approaches. A qualitative investigation, through targeted interviews, could be useful to explore the underlying dynamics of these communicative choices. Finally, results suggest that the literature be expanded on the role of social networks like TikTok in disseminating content related to wellness and sustainability, considering its potential for engagement and impact on consumer behaviour.

References

ABIRAMI A.M., ASKARUNISA A. (2017), "Sentiment Analysis Model to Emphasize the Impact of Online Reviews in Healthcare Industry", *Online Information Review*, vol. 41, n. 4, pp. 471-486.

ALBRECHT G. (2011), "Chronic environmental change: Emerging 'psychoterratic'syndromes", In *Climate change and human well-being: Global Challenges and Opportunities* (pp. 43-56), Springer, New York.

ALOTAIBI A., ABBAS A. (2023), "Islamic religiosity and green purchase intention: a perspective of food selection in millennials", *Journal of Islamic Marketing*, vol. 14, n. 9, pp. 2323-2342.

ANDREOTTA M., NUGROHO R., HURSTONE M.J., BOSCHETTI F., FARRELL S., WALKER I., PARIS C. (2019), "Analyzing Social Media Data: A Mixed-Methods Framework Combining Computational and Qualitative Text Analysis", *Behavior Research Methods*, vol. 51, pp. 1766-1781.

BAHL S., MILNE G.R., ROSS S.M., MICK D.G., GRIER S.A., CHUGANI S.K., BOESEN-MARIANI S. (2016), "Mindfulness: Its transformative potential for consumer, societal, and environmental well-being", *Journal of Public Policy and Marketing*, vol. 35, n. 2, pp. 198-210.

BARCHIELLI B., CRICENTI C., GALLÈ F., SABELLA E.A., LIGUORI F., DA MOLIN G., NAPOLI C. (2022), "Climate changes, natural resources depletion, COVID-19 pandemic, and Russian-Ukrainian war: What is the impact on habits change and mental health?", *International Journal of Environmental Research and Public Health*, vol. 19, n. 19, pp. 11929.

BARDEY A., BOOTH M., HEGER G., LARSSON J. (2022), "Finding yourself in your wardrobe: An exploratory study of lived experiences with a capsule wardrobe", *International Journal of Market Research*, vol. 64, n. 1, pp. 113-131.

BELLINI S., ZERBINI C., VERGURA D.T., CECCOLI B. (2024), ""Le App di food sharing tra benefici individuali e ambientali: ascolto delle conversazioni online degli utenti su Too Good To Go", In Convegno Sinergie-Sima 2024 *"Management of Sustainability and Well-Being for Individuals and Society"*. 13-14 June 2024, Parma.

BERGLUND K. (2019), There Is No Alternative: A Symbolic Interactionist Account of Swedish Climate Activists.

BINDER M., BLANKENBERG A.K. (2017), "Green lifestyles and subjective well-being: More about self-image than actual behavior?", *Journal of Economic Behavior and Organization*, vol. 137, pp. 304-323.

BINDER M., BLANKENBERG A.K. (2016), ""Environmental concerns, volunteering and subjective well-being: Antecedents and outcomes of environmental activism in Germany", *Ecological Economics,* vol. 124, pp. 1-16.

BOUMAN T., VERSCHOOR M., ALBERS C.J., BÖHM G., FISHER S.D., POORTINGA W., STEG L. (2020), "When worry about climate change leads to climate action: How values, worry and personal responsibility relate to various climate actions", *Global Environmental Change,* vol. 62, 102061.

CAPSTICK S., NASH N., WHITMARSH L., POORTINGA W., HAGGAR P., BRÜGGER A. (2022), "The connection between subjective wellbeing and pro-environmental behaviour: Individual and cross-national characteristics in a seven-country study", *Environmental Science and Policy*, vol. 133, pp. 63-73.

CARLSON J.M., KAULL H., STEINHAUER M., ZIGARAC A., CAMMARATA J. (2020), "Paying Attention to Climate Change: Positive Images of Climate Change Solutions Capture Attention", *Journal of Environmental Psychology,* vol. 71, 101477.

CLAYTON S. (2020), "Climate anxiety: Psychological responses to climate change", *Journal of Anxiety Disorders*, vol. 74, 102263.

CUNSOLO A., ELLIS N.R. (2018), "Ecological grief as a mental health response to climate change-related loss", *Nature Climate Change*, vol. 8, n. 4, pp. 275-281.

CURLL S., STANLEY S., BROWN P., O'BRIEN L. (2022), "Nature Connectedness in the Climate Change Context: Implications for Climate Action and Mental Health", *Translational Issues in Psychological Science*, vol. 8, n. 4, p. 448.

DANIELS G., GUPTA S. (2025), "Responsible and Sustainable Beauty Consumption for Wellbeing of Older Adults", *Journal of Macromarketing*, 02761467251331440.

DHANDRA T.K. (2019), "Achieving triple dividend through mindfulness: More sustainable consumption, less unsustainable consumption and more life satisfaction", *Ecological Economics*, vol. 161, pp. 83-90.

DHANDRA T.K. (2020), "Does self-esteem matter? A framework depicting role of self-esteem between dispositional mindfulness and impulsive buying", *Journal of Retailing and Consumer Services*, vol. 55, 102135.

DOHERTY T.J., CLAYTON S. (2011), "The psychological impacts of global climate change", *American Psychologist*, vol. 66, n. 4, p. 265.

DUGULEANĂ A.R., CROITORU D.M. (2021), "Obesity: a new paradigm of sustainable consumption?", *Revista Economică*, vol. 73, p. 154.

ELO M., HYTÖNEN J., KARKULEHTO S., KORTETMÄKI T., KOTIAHO J.S., PUURTINEN M., SALO M. (2024), *Interdisciplinary perspectives on planetary well-being* (p. 291), Taylor & Francis, London.

ERICSON T., KJØNSTAD B.G., BARSTAD A. (2014), "Mindfulness and Sustainability", *Ecological Economics*, vol. 104, pp. 73-79.

GARCÍA-RODRÍGUEZ N., CACHERO-MARTÍNEZ S., GONZÁLEZ-FIDALGO E. (2025), "Sustainable Consumption for a Better Life: Consumer Well-Being—A Review and Research Agenda", *International Journal of Consumer Studies*, vol. 49, n. 5, e70109.

GIFFORD E., GIFFORD R. (2016), "The largely unacknowledged impact of climate change on mental health", *Bulletin of the Atomic Scientists*, vol. 72, n. 5, pp. 292-297.

GOODLAND R., DALY H. (1996), "Environmental sustainability: universal and non-negotiable", *Ecological Applications,* vol. 6, n. 4, pp. 1002-1017.

HALTINNER K., SARATHCHANDRA D. (2021), "Considering attitudinal uncertainty in the climate change skepticism continuum", *Global Environmental Change*, vol. 68, 102243.

HARLAN S.L., RUDDELL D.M. (2011), "Climate change and health in cities: impacts of heat and air pollution and potential co-benefits from mitigation and adaptation", *Current Opinion in Environmental Sustainability,* vol. 3, n. 3, pp. 126-134.

HART P.S., NISBET E.C. (2012), "Boomerang effects in science communication: How motivated reasoning and identity cues amplify opinion polarization about climate mitigation policies", *Communication Research*, vol. 39, n. 6, pp. 701-723.

INNOCENTI M., SANTARELLI G., LOMBARDI G.S., CIABINI L., ZJALIC D., DI RUSSO M., CADEDDU C. (2023), "How can climate change anxiety induce both pro-environmental behaviours and eco-paralysis? The mediating role of general self-efficacy", *International Journal of Environmental Research and Public Health*, vol. 20, n. 4, pp. 3085.

JÄGEL T., KEELING K., REPPEL A., GRUBER T. (2012), "Individual values and motivational complexities in ethical clothing consumption: A means-end approach", *Journal of Marketing Management*, vol. 28, n. 3-4, pp. 373-396.

KJELL O.N.E. (2011), "Sustainable Well-Being: A Potential Synergy Between Sustainability and Well-Being Research", *Review of General Psychology*, vol. 15, n. 3, pp. 255-266.

KÖNIG S., MAIER E. (2024), "The Effect of Green Influencer Message Characteristics: Framing, Construal, and Timing", *Psychology and Marketing*, vol. 41, n. 9, pp. 1915-2151.

KOVATS R.S., HAJAT S. (2008), "Heat stress and public health: a critical review", *Annual Review of Public Health*, vol. 29, n. 2008, pp. 41-55.

KURTH C., PIHKALA P. (2022), "Eco-anxiety: What it is and why it matters", *Frontiers in Psychology*, vol. 13, 981814.

LEE C.K.H., TSE Y.K., ZHANG M., MA J. (2020), "Analysing Online Reviews to Investigate Customer Behaviour in the Sharing Economy: The Case of Airbnb", *Information Technology and People,* vol. 33, n. 3, pp. 945-961.

LEHBERGER M., KLEIH A.K., SPARKE K. (2021), "Self-Reported Well-Being and the Importance of Green Spaces - A Comparison of Garden Owners and Non-Garden Owners in Times of COVID-19", *Landscape and Urban Planning*, vol. 212, 104108.

LIEBER M., CHIN-HONG P., KELLY K., DANDU M., WEISER S.D. (2022), "A systematic review and meta-analysis assessing the impact of droughts, flooding, and climate variability on malnutrition", *Global Public Health*, vol. 17, n. 1, pp. 68-82.

LIN D., WAMBERSIE L., WACKERNAGEL M. (2021), "Estimating the date of Earth Overshoot Day 2021", Nowcasting the World's Footprint and Biocapacity, pp. 1-8.

LIU S., KUANG K. (2024), "The role of emotions in climate change communication: Examining the effects of strategy and issue framing on emotional responses and online climate action intentions", *Current Psychology*, vol. 43, n. 33, pp. 27070-27083.

LIU Y., CLEARY A., FIELDING K.S., MURRAY Z., ROIKO A. (2022), "Nature Connection, Pro-environmental Behaviours and Well-being: Understanding the Mediating Role of Nature Contact", *Landscape and Urban Planning*, vol. 228, 104550.

MAO Z., HAN B., ZHOU C., LIU P. (2025), "How to encourage well-being with reminders interventions: A field experiment on food waste separation and composting behaviors", *Waste Management,* vol. 194, pp. 104-114.

MARCHETTI F., VERAZZA S., BRAMBILLA M., RESTIVO V. (2022), "Rotavirus and the Web: Analysis of Online Conversations in Italy During 2020", *Human Vaccines and Immunotherapeutics*, vol. 18, n. 1, 2002087.

MARCOLIN C.B., BECKER J.L., WILD F., BEHR A., SCHIAVI G. (2021), "Listening to the Voice of the Guest: A Framework to Improve Decision-Making Processes with Text Data", *International Journal of Hospitality Management*, vol. 94, 102853.

MARTIN L., WHITE M.P., HUNT A., RICHARDSON M., PAHL S., BURT J. (2020), "Nature Contact, Nature Connectedness and Associations with Health, Well-being and Pro-environmental Behaviours", *Journal of Environmental Psychology,* vol. 68, 101389.

MINOR K., GLAVIND K.L., SCHWARTZ A.J., DANFORTH C.M., LEHMANN S., BJERRE-NIELSEN A. (2023), "Nature Exposure Is Associated with Reduced Smartphone Use", *Environment and Behavior*, vol. 55, n. 3, pp. 103-139.

NHUNG THANG T.H., NGUYEN C.H. (2025), "Does customers' well-being lead to their sustainable consumption? Exploring the mediating role of online shopping", *Journal of Global Marketing*, vol. 38, n. 2, pp. 133-155.

OGUNBODE C.A., DORAN R., HANSS D., OJALA M., SALMELA-ARO K., VAN DEN BROEK K.L., BHULLAR N., AQUINO S.D., MAROT T., SCHERMER J.A., WLODARCZYK A., LU S., JIANG F., MARAN D.A., YADAV R., ARDI R., CHEGENI R., GHANBARIAN E., ZAND S., KARASU M. (2022), "Climate Anxiety, Well-being and Pro-environmental Action: Correlates of Negative Emotional Responses to Climate Change in 32 Countries", *Journal of Environmental Psychology*, vol. 84, 101887.

OLBERMANN Z., MAYER F., SCHRAMM H. (2024), "Greenfluencing Through the Power of Emotions? Impact of Message Frames and Emotionally Matching Background Music on the Effectiveness of Influencers' Environmental Communication", *Social Media+ Society*, vol. 10, n. 2, 20563051241254381.

ROUSELL D., CUTTER-MACKENZIE-KNOWLES A. (2020), "A systematic review of climate change education: Giving children and young people a 'voice' and a 'hand' in redressing climate change", *Children's Geographies,* vol. 18, n. 2, pp. 191-208.

RYFF C.D., BOYLAN J.M., KIRSCH J.A. (2021), "Eudaimonic and hedonic well-being", *Measuring well-being,* pp. 92-135.

SANFORD M., WITKOWSKA M., GIFFORD R., FORMANOWICZ M. (2023), "Emotional framing in online environmental activism: Pairing a Twitter study with an offline experiment", *Frontiers in Psychology*, vol. 13, 1099331.

STOLTZ J., SCHAFFER C. (2018), "Salutogenic affordances and sustainability: multiple benefits with edible forest gardens in urban green spaces", *Front Psychol*, vol. 9, 2344.

THALER R.H., SUNSTEIN C.R. (2008), *Nudge: Improving decisions about health, wealth, and happiness*, Yale University Press, London.

THALER R.H., SUNSTEIN C.R. (2021), *Nudge: The final edition*, Penguin, London.

WICKER P., THORMANN T.F. (2022), "Well-being of sport club members: The role of pro-environmental behavior in sport and clubs' environmental quality", *Sport Management Review,* vol. 25, n. 4, pp. 567-588.

WONG C.A., SAP M., SCHWARTZ A., TOWN R., BAKER T., UNGAR L., MERCHANT R.M. (2015), "Twitter Sentiment Predicts Affordable Care Act Marketplace Enrollment", *Journal of Medical Internet Research*, vol. 17, n. 2, pp. 51.

WU P., LI X., SHEN S., HE D. (2020), "Social Media Opinion Summarization Using Emotion Cognition and Convolutional Neural Networks", *International Journal of Information Management*, vol. 51, 101978.

WULLENKORD M.C., TRÖGER J., HAMANN K.R., LOY L.S., REESE G. (2021), "Anxiety and climate change: A validation of the Climate Anxiety Scale in a German-speaking quota sample and an investigation of psychological correlates", *Climatic Change*, vol. 168, n. 3, pp. 20.

XIE L., SHAHZAD M.F., WAHEED A., AIN Q.U., SALEEM Z., ALI M.A. (2022), "Do meat anti-consumption opinions influence consumers' wellbeing?-The moderating role of religiosity", *Frontiers in Psychology*, vol. 13, 957970.

Internet websites

Il Sole 24 ORE. (2025, November 21). Seconda mano online, in Italia vale 2,5 miliardi. A incidere è il carovita. Il Sole 24 ORE. Retrieved November 21, 2025, from Seconda mano online, in Italia vale 2,5 miliardi. A incidere è il carovita - Il Sole 24 ORE

OECD. (2024). How's Life? 2024: Well being and resilience in times of crisis. OECD Publishing. Retrieved July 14, 2025, from https://doi.org/10.1787/90ba854a-en

WHO (2023). Health and Well-Being. World Health Organization. Retrieved July 23, 2025, from Health and Well-Being

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