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THE CONCEPT OF PRO-ENVIRONMENTAL ORGANISATION VS. ENVIRONMENTAL VIRTUE THEORY

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ABSTRACT: Global climate threats require changes in behaviour and lifestyles to promote sustainable consumption and production. This is particularly true for business organisations and may involve the adoption of practices based on environmental virtues. While the literature on environmental virtues is extensive, there is a general lack of studies on the application of virtues in management and business. One of the main objectives of this article is to identify environmental virtues that can be linked to the activities of organisations. The main research methods were diagnostic and comparative analysis, as well as a review of relevant literature. The reviewed studies show that the main virtues that define a person's emotional attitude towards the natural environment are an open-ended curiosity that generates intellectual capital (knowledge), persistence and perseverance, courage, humility, friendship, respect, justice, care, gratitude, compassion and mercy, and trust and confidence. These virtues should constitute the organisational values of sustainable organisations, serve as the axiological basis of their flourishing and functional strategies (e.g. ESG), and be evident in systems, methods and processes, as well as in management tools such as codes of ethics.

KEYWORDS: environmental virtues, sustainable consumption, axiology, ethics, morality, organisation

Introduction

The dangers of climate change make it necessary to modify individual behaviour and individual and collective lifestyles through actions related to sustainable consumption, mainly through reduction and rationalisation (Jena & Kar, 2023; Kirkham & Letheby, 2024). It is important that certain areas of our lives are not subject to excessive and rapid consumption. Departing from the peculiar cult of overconsumption, or at least starting the process of significantly slowing down its magnitude, using a complementary arsenal of economic-market, legal, managerial, but also psychological, social and axiological instruments, requires an appreciation of the category of environmental virtue (Manthiou & Kuppelwieser, 2023).

Pro-environmental behaviours are influenced not only by education, knowledge, and environmental attitudes but also by moral virtues (Alipour et al., 2021), especially a particular type of virtue called environmental virtues (Manthiou & Kuppelwieser, 2023).

Environmental degradation and the deterioration of human moral values have been linked (Jena & Kar, 2023). Ethicists agree that there is an urgent need to instill in individuals environmental virtues – virtues of character that relate to our place in the world within the natural environment (Kirkham & Letheby, 2024). Thus, the pursuit of ecosystem sustainability is not the subject of a serious ethical dispute. After all, it is about the preservation of our existence (Dzwonkowska, 2018a).

The concept of environmental virtues has been addressed in special issues of some journals, such as *Environmental Virtue Ethics Special Issue* (Cafaro, 2010), and various literature reviews have also been published, such as in 2006 in *Environmental Ethics no. 19* (Holly, 2006). There is a rich literature, mainly philosophical, dealing with the characteristics and description of environmental virtues (Frasz, 2001; Sandler, 2013; Clowney, 2013; Clowney, 2014; Sandler, 2006; Kallhoff & Schörgenhumer, 2017; Dzwonkowska, 2018a; Rosenberg, 2023), virtue ethics theory (Cafaro, 2001; Sandler, 2003; Hull, 2005; Cafaro & Sandler, 2010; Treanor, 2014; Jordan & Kristjánsson, 2017; Dzwonkowska, 2018b; Jena & Kar, 2023; Beau, 2023), or their development (Treanor, 2008; Treanor, 2010; Moyano-Fernández, 2023; Hall & Brady, 2023). However, there are no studies that demonstrate the application of environmental virtues in management sciences and in sub-disciplines of economics, such as environmental economics and ecological economics. Therefore, the aim of this article is to try to answer the following key research questions:

- 1. What is the subject of the axiology of environmental virtues?
- 2. What are the main environmental virtues that can be associated with the activities of business organisations?
- 3. To what extent can environmental virtues be used in the management practices of organisations?
- 4. To what extent do organisations' pro-environmental practices exhibit the characteristics of true environmental virtues, and to what extent are they merely profit- or image-driven?

Research background

As ethicist Louke van Wensveen observes: "I imagine that appealing to a chemical company's love of nature in a court of law would be as effective as appealing to an ex-spouse's love of his or her children in a child custody case" (Freiman, 2006). There is a great deal of truth in this statement. It is important to remember that the belief that greed and avarice are good has a long history in business.

This apparent deregulation of the value system has its origins in economic theory, as well as in some sub-disciplines of management science, especially marketing. This deregulation manifests itself in tendencies to relativise truth, freedom, honesty and other axiological foundations, as well as in narrowing or widening the view of the human being, obscuring or revealing the axiological premise of the adopted value system, and the unstable theory of needs, manifested primarily in contradictory tendencies such as the multiplication of illusory (artificial) needs, i.e. those that people do not really have or those that do not serve human development, while advocating restraint, i.e. moderation in consumption and needs.

The typical assumption in classical and neoclassical economics that greed is good goes back to the late 16th and early 17th centuries (Hobbes, 1954) and the 17th and 18th centuries (Bernard Mandeville's ethical and moral provocation, 1957). This created the rationale for the view of man as

Homo economicus, which in the late 18th and early 19th centuries was grounded in the works of Adam Smith (Stankiewicz, 2000). The concept of man as "constrained" to economic dimensions was also developed by John Stuart Mill in the 1830s. This model of man as a consumer has become one of the most popular and effective ideas, in its original version or after its cosmetic adjustments, in modern economics.

In ethics, we also find concepts that assume that selfishness is a natural human trait, as well as the growing influence of economic psychology on the image of economics as a whole and the strengthening of the role of behavioural economics. A similar trend can be observed in the management sciences, especially in behavioural management concepts with a more holistic view of man. This was pointed out by Adam Smith in his later works when he recognised the duality of human nature, that is, the existence in it of both egoistic and empathic-altruistic elements (Stankiewicz, 2000).

One of the characteristics of the modern world is the observed increasing polarisation of value systems. In addition to the egocentric concepts and behaviours (selfishness, greed, etc.) that dominate social and economic life, supra-centric concepts and behaviours are also emerging and slowly becoming established, most notably the concept of sustainable development and its sectoral implementations. Examples of these implementations include sustainable consumption and, at the organisational level, the concept of corporate social responsibility, most often realised in the form of integrated responsibility: economic-financial, legal, environmental and social (Borys & Borys, 2011). A positive aspect of this process is the increasing integration of management approaches (management sciences) with sub-disciplines of economics, such as environmental economics and ecological economics.

Organisations are also implementing various pro-environmental solutions, including environmental management systems in accordance with ISO 14001, and are committed to implementing the 17 Sustainable Development Goals of Agenda 2030 and Environmental, Social and Governance (ESG) programs¹, to ensure that all processes within the organisation, including external processes, have sustainable characteristics.

In recent years, however, there have been reports in the scientific literature and in the media of the introduction of practices that have a clear ethical and moral character and draw on intrinsic motivation that leads to pro-environmental behaviour, i.e., individual and collective implementation of qualities referred to as environmental virtues.

Methods

In the present study, we mainly used the method of diagnosis and comparative analysis, which allowed the integration of different approaches to the topic of environmental virtues in the social sciences, especially in the management sciences, economics and philosophical sciences, as well as a review of the literature.

First, we reviewed 45 articles or abstracts containing the phrase "environmental virtue" in the following databases: Academic Search Ultimate, Agricola, Business Source Ultimate, eBook Academic Collection (EBSCOhost), eBook Collection (EBSCOhost), eBook Open Access (OA) Collection (EBSCOhost), Belt and Road Initiative Reference Source, ERIC, GreenFILE, Health Source – Consumer Edition, Health Source: Nursing/Academic Edition, Legal Source Library, Information Science & Technology Abstracts, MasterFILE Premier, MasterFILE Reference eBook Collection, MLA International Bibliography, Newspaper Source, OpenDissertations, Regional Business News, and Teacher Reference Center. The review then included 60 articles from Google Scholar, some of which overlapped with the above databases.

All the collected material was organised by identifying the characteristics of environmental virtue and describing the ethics of these virtues. The main task was to identify and list the virtues described in philosophy in order to relate them to organisational and management theory. The next stage of the research was an analysis of articles on the various environmental virtues identified ear-

Environmental, Social and Governance (ESG) programs are the non-financial aspects of doing business. They encompass the risks and opportunities created by the environmental, social and regulatory framework in which a company operates, such as the ability to expand market opportunities, reduce negative impacts and gain competitive advantage through sustainable products and services.

lier. A noticeable problem in this literature review was that a significant number of publications used terms that, while they were an explanation of "environmental virtue," were vague or arbitrary. This is particularly true of terms such as "friendship", "responsibility", or "respect".

The review of the literature made it possible to answer the research questions regarding the link between the theory of environmental virtues and the managerial context of business activities.

Environmental virtue theory and its various axiological associations

The term *virtue* comes from the Greek philosophers. According to Aristotle, virtue is an enduring character trait, perfection (Rosenberg, 2023). Thus, it is a value that, as suggested by the Stoics and Immanuel Kant, includes the intention to do good. On the other hand, the Epicureans, as well as the utilitarians and pragmatists, equated virtue with only one value (feeling), namely, happiness, because a happy person thereby confirms his moral qualities. It is noteworthy that historically, the word "virtue" has often been used in the vernacular narrowly to mean sexual morality and somewhat more broadly in reference to women as " womanly virtue". Similarly, in narrow political terms, "virtue"-according to Montesquieu -means a preference for the public good over individual interests.

The explication of the virtues, which seem to be intrinsically related, has a very rich history, although the formulation of the European concept of "virtue" has certainly been most influenced by the concepts of Plato's four primary virtues (courage, temperance, wisdom, justice); Aristotle's six virtues, including four cardinal ones (courage, temperance, justice, prudence); three Christian theological virtues: faith, hope and love, mentioned in St. Paul's First Letter to the Corinthians, more specifically in the Hymn to Charity (Borys, 2021), as well as Thomas Aquinas' four cardinal Christian virtues (justice, prudence, temperance, fortitude) proposed in the Middle Ages. Two virtues considered cardinal by Confucius (humanity and truthfulness) and four cardinal virtues by Cicero (wisdom, justice, courage, temperance) should also be mentioned.

There are also proposals that include broader sets of virtues, e.g., feelings that represent the spiritual realm of humanity, such as love, friendship, honesty, compassion, empathy, courage, happiness, sensitivity, respect, kindness, will, faith, care, patience, or hope (Borys, 2021). Following Bańka (1986), they can be called "warm values". This set of virtues is supplemented by values that are positive derivatives of emotions. They include, for example, responsibility, beauty, attentiveness, simplicity, patriotism, or temperance. They form an axiological opposition to the egocentric world of values (more precisely, anti-values) such as selfishness, greed, avarice, hypocrisy, etc.

Both sets of virtues are personality traits that determine the quality of a person's choices and decisions in various areas of life, in relationships with oneself and others, as well as with the natural environment. They, therefore, apply not only to the protection of the social environment at various levels but also to the protection of the natural environment.

Reflections on personality and character and the virtues within them can also be found in the works of well-known environmental thinkers. For example, Henry David Thoreau said: "Simplicity is conducive to happiness because it leads to an uncluttered life and mind, which can focus more easily on those things that have real and lasting value, such as beauty, nature, justice, and friendship" (Sandler, 2013). This has given rise to a particular set of virtues called environmental virtues, also interchangeably called ecological virtues.

These virtues not only contribute to environmental protection in various ways but also, and perhaps most importantly, reflect the development and level of human consciousness. "Environmental virtues are appropriate attitudes in dealing with and benefiting from nature" (Kallhoff & Schörgenhumer, 2017). Dzwonkowska's (2018a) suggestion that an important criterion for a true environmental virtue could be ecosystem sustainability can be justified. The various environmental virtues thus share a common goal, namely concern for living in nature, including the preservation of biodiversity (Clowney, 2013).

The concept of collective virtues is derived from individual environmental virtues as qualities of the pro-environmental behaviour of individuals. It facilitates the understanding of one of the most important problems of the modern world, namely the environmental damage resulting from collective actions and the moral context of these actions (Clowney, 2014).

The subject of virtues, including environmental virtues, clearly falls within the scope of axiology (from Greek $\dot{\alpha}\xi(\alpha$ "value, worth" + $\lambda o\gamma(\alpha$ "study of"), broadly interpreted as a philosophical discipline that constitutes a general theory of values. Axiology also has its closest "cousins": ethics and morality,

forming an increasingly recognised axiological quadrangle. This raises an important question: does the concept of environmental axiology function in scientific and colloquial discourse? According to our understanding, such a concept is not used, although there are logical reasons to introduce it along the lines of other "specialised" axiologies.

We note here that axiology continues to be part of individual, extra-philosophical scientific disciplines (economics, sociology, and others), as a rule, informally and in a way that is considered selfproclaimed by philosophers. However, in addition to the achievements of general axiology, the contributions of such axiologies as, for example, social axiology, cultural axiology, axiology of technology (Todorow, 2014) and axiology of economics (Borys, 2020) are emphasized.

A quadrangle of environmental (ecological) axiology (environmental virtue axiology) is presented in Figure 1.





The axiology of environmental virtues (environmental/ecological axiology) is a sub-discipline of axiology concerned with the human relationship with the natural environment, based on a specific value system represented by a specific set of environmental virtues. Environmental virtue axiology has two closely related parts: the normative and the practical (applicative) part.

The first part is environmental ethics (ecological ethics/ecoethics), which deals with the values, principles, imperatives, and norms that regulate or could regulate the relationship of human beings with the natural environment. If these values are called virtues, it is reasonable to equate environmental virtue ethics with the more commonly used – especially in the literature – concept of environmental ethics and to consider environmental virtue ethics a new, improved generation of environmental ethics (Brennan & Lo, 2015).

The other part, i.e. environmental morality (environmental virtue morality), is the environmental virtues that actually function in society and have their counterpart in people's behaviours and attitudes toward the natural environment. People and the moral (virtuous) organisations they create are the virtues that are practically implemented in people's relations with the natural environment. Without this applicable aspect, environmental ethics itself and the codes of these ethics developed on its basis in organisations are only an apparent declaration without any real meaning in pro-environmental practices (actions). Both parts are the subject of this article, and the relationship between environmental ethics and morality is presented in Figure 2.

A review of the literature, however, testifies to the presence of a certain asymmetry in the interests of researchers studying the problems of environmental ethics and morality in favor of the former. Proposed definitions of environmental virtue ethics include approaches that emphasise one selected virtue, as well as those that take into account several such virtues. For example, according to Philip Cafaro, "virtue ethics is one which incorporates a respect for nature, conceives 'human interests' broadly, and presents environmental protection as being in our enlightened self-interest (Cafaro, 2001). This ethics "provides a model of living well in which an understanding of and a concern for the environment is constitutive of human flourishing. As a praxis this environmental virtue ethic articulates an account of human flourishing with a view to suggesting how a person can improve his/her own life by working to preserve wild nature" (Hull, 2005). As Cafaro points out, the ethics of environmental virtues explains our choices, duties and responsibilities related to environmental protection (Cafaro & Sandler, 2010).



Figure 2. Environmental ethics and environmental morality – two complementary parts of environmental axiology (axiology of environmental virtues)

Virtue ethics, which is essentially based on Aristotle's *Nichomachean Ethics* and emphasizes the role of happiness in the life of a virtuous person, helps promote a more ecological perspective, facilitates a more holistic view of sustainability, and explores questions of how to live and thrive in a more sustainable world (Jordan & Kristjánsson, 2017). "Fundamental to virtue ethics is an acknowledgment that neither good ethical rules nor good intentions are effective absent the character required to bring them to fulfillment", that is, they do not translate into morality (Treanor, 2014).

As Sandler (2013) argues, environmental virtue ethics can also be seen as a reorientation of approaches to traditionally practised environmental ethics and should be seen in the context of other, better-known and longer-established approaches, such as deontology or consequentialism, since a more serious interest in environmental virtue ethics has only been noted since the beginning of the 21st century (Frasz, 2001).

Virtue ethics also serves as an axiological model because it is "primarily concerned with what kind of people we should be, what kind of characters we should have, and how we should act. Virtue ethics was built to bridge the gap between human behaviour and the needs of the environment (Jena & Kar, 2023). Environmental virtue ethics also has another important context. Since its emergence in the 1980s, environmental virtue ethics has aimed to provide an alternative to deontological and consequentialist approaches for guiding ecological action in the context of the global environmental crisis (Beau, 2023).

According to Cafaro (2001), environmental virtue ethics is useful for two main reasons, in addition to the above-mentioned benefits of its implementation. First, in the absence of environmental virtue ethics, the concept of traditional environmental ethics is itself incomplete and unbalanced. Any comprehensive environmental ethic must include the identification of environmental virtues. Second, there is a practical need to develop positive arguments for environmental protection, and environmental virtues are an important part of the argument (Cafaro, 2001). A third aspect of the usefulness of this ethic can also be mentioned. According to Sandler (2003), "environmental ethics provides a theoretical platform for a consistent and justified critique of environmentally unsustainable practices and policies".

In summary, the development of the axiology of environmental virtues marks man's departure from egocentrism to moderate anthropocentrism as the axiological minimum of the new development paradigms, based on the principle of intergenerational justice in the access of present and future generations to the natural environment.

Environmental virtues and their role in organisational management

The identification of environmental virtues serves to highlight the constitutive characteristics of an organisation that could be described as environmentally virtuous while at the same time identifying the main barriers that may arise in the practice of particular environmental virtues. It should be remembered that the organisation is made up of people and that their personalities and characters determine whether the metaphor in the term "environmentally virtuous organisation" is adequate in its ethical and moral multidimensionality.

Much of the literature on environmental virtue focuses on what, following Treanor (2010), might be called "personal virtue"-individual actions, traits, or dispositions that benefit the individual and are part of a person's collective feelings. It is the feelings that define the personality and, together with the emotional sphere, contribute to the character of a person. A review of the literature shows that the main virtues that define a person's emotional relationship with the natural environment include open-ended curiosity generating knowledge, i.e. intellectual capital (Despret & Simpson, 2023), consistency and perseverance (Pianalto, 2013), courage (Fredericks, 2014; Kawall, 2017), humility (Pianalto, 2013), friendship (Frasz, 2001), respect (Patterson, 1994; Kawall, 2003; Le Duc, 2023), justice (Hall & Brady, 2023), care (Cafaro, 2010), gratitude (Despret & Simpson, 2023), compassion and mercy (Sandler, 2013; Ferkany, 2011), and trust and confidence (Borys, 2021).

What is the content and role of environmental virtues in organisational management? The first inseparable pair of virtues are curiosity and openness, which give rise to another set of environmental virtues. These are intellectual virtues, i.e. character traits that regulate cognitive activity in support of the acquisition and application of knowledge. "They are virtues because they further the human quest for knowledge and true belief" (Stafford, 2010). According to Stafford (2010) five intellectual virtues illustrate the nature and relevance of intellectual virtues to environmental ethics: thoroughness, temporal/structural sensitivity, flexibility, intellectual trust, and humility.

One of these intellectual virtues that plays a special role in organisational management is green intellectual capital, which is essential for the implementation of sustainable development principles (Mohua & Yusoff, 2023; Asiaei et al., 2023). Green capital is the total stock of all kinds of intangible assets, knowledge, capabilities, relationships, etc., related to environmental protection or green innovation at both the individual and organisational levels (Chang & Chen, 2012). It can be used in the value-creation process in an organisation (Asiaei et al., 2023). Yu-Shan Chen identifies three types of green capital: green human capital, green structural capital, and green relational capital (Chen, 2008).

It should be noted that the measurement and use of green intellectual capital plays an important role in the concept of an environmentally "virtuous" organisation, but it can also be an obstacle. All types of green capital are positively influenced by corporate social responsibility and a high level of environmental awareness, which also determine their quality. The higher the level of environmental morality (awareness) of the organisation's employees, the more useful is this capital as a whole (Chang & Chen, 2012).

Curiosity and openness (so-called "open-ended curiosity"), in their role as environmental virtues, generate a whole set of intellectual virtues, including green capital, which promotes environmentally friendly business growth (Jeraj et al., 2015). In management practice, it is also important to combine curiosity with reliable environmental information, which requires modern environmental education, appropriate benchmarking, and openness to using the knowledge of others. It is also important to provide safe spaces where managers can discuss their ethical dilemmas (Sekerka et al., 2014).

Open-ended curiosity as an environmental virtue is also related to reciprocity. As Despret and Simpson notes (2023), humans receive various gifts from nature from non-humans in order to know how best to reciprocate these gifts. In the literature, however, there are attempts to relativise "open curiosity," which contradicts the very nature of curiosity as a feeling. For example, Filip Lievens argues that the curiosity that is so necessary for innovation, new product development, and respect for the environment can be good or bad, e.g., it is bad to pry annoyingly into someone's work, which can delay the implementation of various pro-environmental programs (Lievens et al., 2022). It is apparent here that Lievens is confusing the feeling of curiosity with prying, which is a negative emotion.

Another pair of emotions, persistence and perseverance, are virtues much needed to achieve goals, not just environmental ones. Results indicate that persistent leaders were rated higher and

attributed more leadership and responsibility than nonpersistent leaders, regardless of the level of environmental complexity (Graves, 1985). Thus, persistence and perseverance, enhanced by empathy, are typical leadership skills that facilitate problem-solving and the achievement of environmental goals (Greenberg & Sweeney, 2011). These goals must be linked to strategic objectives, and for motivational purposes, all organisational stakeholders should be informed of the status of the goals and their ongoing measurement and adjustment, if necessary. It is important that environmental goals are not only linked to legal requirements but also that their setting stems from a genuine concern for the environment (Al-Kahloot et al., 2019).

Courage, another environmental virtue (Fredericks, 2014), has been considered a cardinal virtue since at least the times of Plato and Confucius (Harris, 1999). Courage is strongest in action when we bravely face challenges, whatever they may be. In this way, we build courage and strengthen good competence in environmental protection. Courage as a feeling has an individual dimension, which is why Harris's (1999) categorisation of three types of courage is controversial: organisational courage, moral courage, and collective courage.

It is clear that courage in organisations has both an ethical dimension (as part of a virtue resource, code of ethics, etc.) and a moral dimension, e.g., "to be a positive and ethical response to a risky or difficult situation in which there is an interplay between organisational and personal interests" (Harbour & Kisfalvi, 2014). It is essential to the achievement of an organisation's strategic vision, but it is also a way to stimulate employee activism (Snyder, 2010).

Courage is, therefore, "a psychological predictor of moral action" (Sultana et al., 2023), and studies show that individuals who demonstrate character strengths are more likely to report engaging in pro-environmental behaviours or holding pro-environmental attitudes in the long term (Warren & Coghlan, 2016). Courage should be demonstrated by leaders and other employees (followers) who, while helping their leaders, take responsibility for their own work rather than blindly following leaders (Javaid et al., 2023).

Courage is essential for ethical decision-making in an organisation (Harris, 2001), and it enables the avoidance of "rash or unproductive behaviour" (Reardon, 2007). It should, therefore, be encouraged and strengthened, but at the same time protected from excessive risk. Courage in business can be cultivated, and that means calculating risks. The ability to respond to emergencies or sudden crises is important (Mahoney, 1998), and the crisis and emergency procedures in environmental management systems are helpful in this regard.

Courage is an essential environmental virtue, but there is always an important question in organisational management – how to shape it, how to "awaken" and activate this potential of courage inherent in human beings? This is a real concern because even if employees have the knowledge of how to act morally toward the environment, in Ovid's words: "We see and approve the better things, yet we follow the worse" (Mahoney, 1998). Since these are images and counter-images, if there are virtues (feelings), then logically, their emotional veils must also exist, and the veils of courage are cowardice, over-assertiveness, or arrogance (Kawall, 2017).

Humility was first identified as an environmental virtue by Pianalto (2013). Humility is said to promote a non-anthropocentric or moderately anthropocentric orientation toward the natural world. It is also considered a foundational virtue, necessary (though not sufficient) for the full development of other virtues (Wright et al., 2017). Thus, humility can simply mean meekness or modesty but is the opposite of emotional hubris or conceit (Wright et al., 2017). Humility is "a realistic assessment of one's own contribution and the recognition of the contribution of others" (Vera & Rodriguez-Lopez, 2004).

The virtue of humility is often seen as being at odds with common business practice. However, such a view may be flawed, especially when it refers to resource dependence theory (Frostenson, 2016). There is a clear trace of egocentrism in this view, i.e. a value system (or rather an anti-value system) biased towards environmentally unethical actions, which has nothing to do with the concept of an environmentally "virtuous" organisation.

As Eugene Sadler-Smith argues, "the environmental ethic of humility is a benchmark against which stakeholders could be held accountable for the environmental impacts of their actions" (Sadler-Smith & Akstinaite, 2022) because environmental humility pays special attention to ecosystems, not just our own expectations and perceptions, and provides us with the restraint that curbs our ambitions and selfishness (Sadler-Smith & Akstinaite, 2022).

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The virtue of humility is unfortunately not considered one of the main virtues in the business world and is often underestimated, which can be a certain obstacle to building a truly environmentally "virtuous" organisation. However, humility contributes significantly to the moral and professional quality of managers and to the development of the company's human team (Argandona, 2015). When an organisation is humble, it means that it is not driven by hubris and arrogance (Wright et al., 2017). This means that it is not driven solely by marketing motives when implementing CSR principles or setting ESG goals. Such organisations consider ecosystems, not just their own expectations and narrowly defined business needs (Sadler-Smith & Akstinaite, 2022). Implementing the concept of the humble organisation, therefore, requires the implementation of the principles of a learning, customer-oriented organisation, as well as flexibility in action that takes into account the needs of the natural environment and its protection. This is where a management barrier can arise, related to a humble acceptance of mistakes or an inability to ask others for advice, as well as a lack of openness to new pro-environmental management paradigms (Vera & Rodriguez-Lopez, 2004).

Friendship, another environmental virtue, is a practical form of love, and while it has many meanings, it is not difficult to understand the core of this feeling. When it comes to managing an organisation, we are referring to those activities that are environmentally friendly. These usually include the introduction of new products, processes, management methods, components, and technologies (Azubuike et al., 2020) and are manifested in relevant pro-environmental behaviours (Rehman et al., 2023). It can also be noted that the term "environmentally friendly approach" is used in the literature, for example, in the selection of suppliers (Kumar et al., 2014), but it is mainly manifested in the construction and implementation of environmentally friendly business strategies (Majid et al., 2020). Such strategies and products are oriented towards environmentally friendly customers.

Empirical studies now recognise that environmentally friendly consumer attitudes also include environmental knowledge, perceived seriousness of environmental threats, interpersonal influence, long-term orientation, collectivism and individualism, and value orientation (Abdul-Muhmin, 2007). Thus, it is not only the processes that should be environmentally friendly that can be achieved through environmental management systems but also the corporate strategies, and this already requires a very thorough analysis of the external and internal context of the organisation's operations.

The development of the knowledge of environmental virtues also includes justice, sometimes in conjunction with issues of aesthetics. Moyano-Fernández (2023), referring to the concept of ecological justice, recognises that by adopting this virtue, it is possible to avoid possible moral conflicts that may arise between human and ecosystem autonomy (Moyano-Fernández, 2023). On the other hand, Hall and Brady (2023), in their characterisation of the interaction between moral and aesthetic values in the context of environmental aesthetics, developed a model of environmental virtue aesthetics that offers a promising alternative to current theories in environmental aesthetics regarding the relationship between aesthetics and ethics.

The literature review also shows that respect is recognised as another fundamental environmental virtue. According to Kawall (2003), the basis of our relationship with the natural environment should be reverence for life, and humans should strive to free all creatures from suffering. A virtue-based approach allows us to avoid common objections to biocentric individualism based on its supposed impracticability. Thus, the concept of an environmentally "virtuous" organisation must include conducting business with respect for the environment, and this means respect for all beings, human and non-human.

Thus, in the practice of management, respect should be given to all stakeholders, both external and internal. It is also important that the managers of the organisation should enjoy the respect of the employees, but they must earn it with their references to subordinates as well as with their sensitivity to the needs of the environment (Whitehurst, 2015). Thus, respect for stakeholders must include respect for the environment. This is also emphasised by Ioan Ianos, who claims that respect for the environment can be considered a priority axis in the process of sustainable development, as it leads decision-makers, professionals and the public to behave carefully and prudently (Ianos et al., 2009). In order to implement an organisation's pro-environmental programs, its leaders must be respected and learn to express that respect. Such a premise requires a number of interventions, such as appropriate hiring, promotion, and behavioural monitoring policies.

Respect for the environment, in accordance with the basic principle of the new development paradigm, is addressed not only to the current generation but also to future generations, which should be manifested in respect for biodiversity and in taking appropriate actions to serve the environment (Ianos et al., 2009). In practice, however, there is a certain obstacle that stems from egocentrism and manifests itself in the tendency of organisations to create an artificial image. This is because some companies present themselves as being environmentally friendly but are in fact, driven by an "ethic of self-interest" (Cambra-Fierro et al., 2008). There are a number of reasons for this, including a sense of transience, greed, self-centred business models and related executive compensation systems.

The virtue of respect should always be accompanied by care for the environment, another component of the concept of an environmentally "virtuous" organisation. This care consists of specific pro-environmental actions combined with knowledge of specific places and people who, while working in the organisation, live in a particular bioregion whose natural qualities need to be protected (Cafaro, 2010). Caring for the quality of the natural environment means being active, not passive and expectant. Care for the environment should also be expressed in the virtue of gratitude since, according to Kimmerer's environmental ethic of gratitude and reciprocity, each person has a responsibility to share his or her unique gifts with the world in return for the gifts received from nature (Despret & Simpson, 2023).

Different virtues have different domains or spheres of action. Another example of an environmental virtue is the feeling of compassion, the essence of which is related to us and/or others, or emanating from others to us, reflective recognition and understanding of negative emotions, as well as compassionate action to restore well-being or, in other words, to reduce discomfort – to alleviate our own or other beings' suffering (Borys, 2021). In this case, the field and sphere of action of compassion is to address the suffering of others. According to Sandler (2013), care for living beings, appreciation of natural beauty, and moderation in the use of natural resources are examples of environmentally justified virtues.

One of the most common expressions of compassion is the virtue of mercy for all living beings (Ferkany, 2011). Mercy, a word of Arabic origin, is defined as "sadness, pity felt because of the bad situation of a person or another living being" (Avşaroğlu & Hudaynazarova, 2022). An obvious logical error in this definition is to equate mercy with the emotion of pity. The concept of mercy is deeply rooted in religious traditions. For example, the papal encyclical *Care for Our Common Home* fore-grounds the teachings of St. Francis about our responsibility to honour and care for all the creatures and wonders of God's creation (Wiseman & Wiseman, 2021).

According to Mai Hoàng Thach, in management practice, we should talk about creating an environmental culture that should be guided by the virtue of merciful compassion (Thạch, 2024), the application of which consists of providing compassionate support, both organisational and managerial, and using positive discipline models.

In the case of compassion, we can conclude that it is a decent virtue, but the moral question arises as to who has the right to manifest compassionate behaviour and from what this right derives (Statman, 1994). And again, raising such a doubt seems to be an obstacle derived from a different, self-centered value system, alien to the essence of compassion. In the case of a supra-centric value system, such a doubt automatically disappears.

The environmental virtues also include trust and confidence. Trust is a feeling, the essence of which is confidence in one's own and/or other people's good (ethical) intentions based on a wise recognition and appreciation of one's own (confidence in oneself) and/or other people's (confidence in others) trustworthiness, i.e. one's own or other people's competencies – knowledge, skills and social (emotional) competencies, i.e. reliability, honesty, integrity (Borys, 2021).

Confidence, as a constitutive trait of trust, is a virtue based on the ability of an interaction partner to keep promises and takes into account the predictability of a person's behaviour and dependability (Ganesan & Hess, 1997). Individuals are trustworthy when they perform according to their promises, even when doing so does not maximise their payoffs (Zabojnik & Zabojnik, 2005). Trustworthy individuals must also put the public good ahead of their own interests.

The credibility of data and its exchange between different entities (Pullin & Knight, 2009) and the credibility of certification, which can be enhanced by the publication of audit reports (Nowicki et al., 2021), are crucial for the management of an organisation's environmental aspects.

An environmentally "virtuous" organisation should be credible and enjoy public trust. The environmental programs must be credible, the data provided, and the organisation's activities should be transparent. In view of the above, a good way to increase credibility is to implement the Eco-Management and Audit Scheme (EMAS). In doing so, we should consider the time and cost of this undertaking. For example, the preparation of an environmental statement requires laborious data collection, which can take up to three years (Chiarini, 2018).

As mentioned earlier, the set of virtues-feelings described is complemented by values that are their positive derivatives. These are those addressed by Treanor (2010) when he writes that political and public virtues, more generally social virtues, should also be kept in mind, as they are necessary, though insufficiently emphasised, manifestations of human development and are important complements to the more traditional environmental virtues. Based on a review of the literature, these are virtues such as farsightedness (Sandler, 2013), loyalty (Pianalto, 2013), responsibility (Patterson, 1994; Kawall, 2003; Le Duc, 2023), patriotism (Cafaro, 2010), cooperation (Huang et al., 2023), temperance – reduction of consumption (Sandler, 2006; Pianalto, 2013), and reciprocity (Geiser, 2021). The aforementioned environmental virtues are qualities that make more effective environmental managers and advocates and are also qualities that are present in our daily lives and facilitate the promotion of environmental sustainability (Sandler, 2013).

The first virtue is farsightedness, which is essential for taking pro-environmental actions (Cooper & Palmer, 1992). It is the ability to anticipate what will happen in the future. Its absence does not serve the stability and development of an organisation (Bhaskaran, 2021). Leaders who have this skill and the ability to persuade, compromise, and negotiate to unite people are more likely to succeed and see the organisation's prospects more broadly (Hader, 2013).

The virtue of farsightedness also facilitates risk management, but the central task of the entrepreneur is to take moderate risks. To do so, the entrepreneur must have the foresight to recognise an opportunity and take advantage of it in a timely manner (Grinciuc & Litvin, 2013), as short-sightedness is the opposite of the virtue of foresight. A short-sighted strategist fails to see long-term social problems progressive and long-term climate and environmental changes (Czakon, 2020).

However, farsightedness requires, among other things, overcoming certain barriers, especially analytical limitations (Ascher, 2006). In practice, an organisation should have reliable data, but relying on project methods or historical data does not always succeed in predicting what will happen in the future. An important but underestimated tool for long-term thinking is to go beyond narrow economic calculation and conduct a socio-economic analysis that also takes into account the environmental short- and long-term externalities of the organisation's activities.

Another virtue, loyalty, is a virtue that inherently works only in interpersonal relationships. Loyalty is already well-established in management science, emphasising loyalty-based management's importance (Reichheld, 1993). This type of management applies to both customers and employees, but, as is increasingly recognised in the literature, organisations must be loyal to all of their stakeholders.

Thus, the virtue of loyalty is fully applicable to the organisation's pro-environmental activities, and through such activities, the organisation can influence customer loyalty (Chen, 2015). On the other hand, if the organisation wants to fully implement a circular economy model, for example, it needs loyal customers, and this customer loyalty to the organisation is very important (Avraamidou et al., 2020). Therefore, an essential task in a pro-environmental organisation is, first, to study the needs and expectations of customers and, second, to transform these needs into requirements that the organisation commits to meet. This is one of the cornerstones of standard environmental management systems, where requirements must be periodically reviewed and updated.

Maintaining loyalty on such a broad scale, i.e. not just that of the customer, is a very difficult task. In the case of a loyalty-based environmental organisation, external factors may come to the fore, such as a changing investment structure, higher environmental fees, and difficulties in guaranteeing a satisfactory price.

An organisation's responsibility for its environmental impacts is one of the key responsibilities in managing an organisation, along with economic-financial, legal, and social responsibilities (Borys & Borys, 2011). This responsibility always means making informed decisions about, for example, new investments or products, taking into account all relevant environmental aspects. It should be emphasised that responsibility is one of the most important criteria of most management systems, not only environmental management systems.

Environmental responsibility is also considered an environmental virtue in various religions and religious-philosophical systems (Huang, 2016), which place great emphasis on nature and environmental issues (Taylor, 2019). In some religions, responsibility is considered a primary environmental virtue because of its essential role in guiding religious adherents' attitudes and behaviours toward God, self, society, and the natural world (Le Duc, 2023).

Assigning responsibility to organisations for the state of the environment and the proper use of its resources and awareness of the consequences of violating this use, in addition to personal ethical and moral norms, plays a key role in environmental management and has a strategic dimension (Papagiannakis & Lioukas, 2018; Babiak & Trendafilova, 2011). It should be emphasised that environmental responsibility, as an environmental virtue, includes practices that benefit the environment and go beyond what companies are legally obliged to do (Holtbrügge & Dögl, 2012). This means that, for example, the voluntary implementation of environmental management systems can be considered a manifestation of the virtue of environmental responsibility.

Thus, responsibility as an environmental virtue reveals the need to formulate such responsibilities towards all stakeholders and to define activities to fully demonstrate that the organisation undertakes these activities voluntarily and not under coercion. In this case, normative requirements can be helpful, as ISO 14001:2015 indicates the need to define responsibilities, roles and authorisations. For example, it is top management that takes responsibility for the effectiveness of the environmental management system, ensuring that environmental policies and objectives are established and consistent with the strategic direction and context of the organisation. Voluntary pro-environmental activities can be both programmed and ad hoc. For example, they may consist of providing financial support to pro-environmental organisations and implementing various programs to encourage pro-environmental behaviour.

Here, as with other virtues, there is a certain self-centred barrier. Environmental responsibility, even when assigned to people and organisations, does not automatically imply that people or organisations will act morally. For example, many consumers consider themselves to be responsible, although in their consumer behaviour, they do not always act in accordance with their stated pro-environmental values (Schlaile et al., 2018).

Patriotism (from Latin *patria* – fatherland) is an attitude of respect, love, and devotion to one's homeland. Patriotism as an environmental virtue (Cafaro, 2010) is mainly local patriotism, i.e. love for the place where one lives, grows up and works, and also, although to a lesser extent, regional and national patriotism, i.e. attachment to one's region and country. The authors distinguish between good and blind patriotism. Only the former has a positive impact on individual attitudes and pro-environmental behaviour since blind patriotism is characterised by absolute and uncritical commitment to the country, region, etc., which is expressed in one-sided positive evaluations and intolerance of criticism of one's own social group (Hamada et al., 2021).

When an organisation buys from local suppliers, it reduces its costs and its water and carbon footprints. Delivering products to nearby markets also reduces negative environmental impacts. Patriotism, however, involves the behaviour of customers themselves. Research confirms that although patriotism does not always influence specific purchasing decisions, people with high levels of patriotism demonstrate environmental concern and pro-environmental beliefs toward the natural environment of the country, the region in which they live, and local nature – in their immediate or distant surroundings (Wang et al., 2020).

Good patriotism requires considering local suppliers when possible and targeting offerings to nearby national or regional markets. It also has its limits. It is difficult to imagine business operations without the ability to source raw materials, even from distant markets; for example, it is impossible to produce cathode blocks without anthracite. A barrier, in this case, is the technology used.

It is impossible to carry out pro-social or pro-environmental activities without cooperation, which can be considered another important environmental virtue. However, employees must not only have intrinsic motivation (pro-environmental awareness) to cooperate but also extrinsic motivation (Huang et al., 2023). Studies have shown that instrumental values are particularly relevant in this process (Molm et al., 2007). Therefore, it is important to show the benefits that can be received as a result of pro-environmental programs (Yucedag et al., 2018). Employees should be rewarded as a form of their cooperation in enjoying the benefits the organisation receives from reduced environ-

mental fees or not paying environmental fines for non-compliance with environmental conditions of use.

Temperance is another environmental virtue, which, according to Ryan Fehr, means "a shared belief in the importance of exercising restraint in the face of temptation and provocation," and one such temptation can be the overuse of environmental resources (Fehr & Gelfand, 2012). Temperance is also one of the five core leadership virtues, along with prudence, justice, courage, and humanity.

Study results indicate that a direct supervisor's virtuous leadership, as rated by the subordinate, positively influences all three dimensions of work-related well-being considered: job satisfaction, work-related affect, and work engagement. Subordinates' greater trust in the supervisor fully mediates this positive influence of virtuous leadership (Hendriks et al., 2020). According to Karl Tangen, "Temperance may also nurture focused visionary leadership that accepts ethical limits and has an eye to the common good" (Tangen, 2015).

Temperance in social and economic practice manifests itself in the form of limiting consumption, which Ronald Sandler also considers an environmental virtue. He states that it is important not to treat economic life as an engine of consumption. It is also important to take a scientific approach to understand the necessary limits of consumption and to go beyond egoism and anthropocentrism, i.e. to assume that life, both human and non-human, is good (Sandler, 2006).

Reducing consumption can be divided into two dimensions: first, reducing the amount of environmental resources used in production and service activities, and second, applying business and marketing strategies aimed at reducing customers' consumption patterns. In the first case, there are management methods such as Green Lean (Birgün & Kulakli, 2022), but in addition to optimising processes and fighting waste, organisations buy, for example, fewer parts but in larger quantities. In the latter case, it is necessary to change the business model from a linear one (buying raw materials, processing, selling, disposing of) to a circular one, in which material resources belong to the organisation, and it generates profits from maintenance services. Such business models are then based on R-principles (reuse, remanufacture, recycle), i.e. end-of-life strategies, which are seen as operationalisation principles of the circular economy (Uçar et al., 2020).

Accordingly, consumption can be reduced incrementally through lean green practices or radically by redesigning the entire organisation according to green reengineering principles. Both methods involve analysing and optimising processes, but reengineering is more fundamental and radical. To develop green programs, one should examine business processes with green process characteristics, integrate business processes with environmental standards, redesign green business processes, develop training programs and change management, and monitor performance and process improvement (Lan, 2011). The transition to a circular economy model can also be done gradually, as existing market players are doing, or by creating organisations whose business models immediately assume the implementation of the R- principles (Fleming & Zils, 2014).

Temperance and the related virtue of limiting consumption should be part of the so-called virtuous leadership, as already emphasised. According to Hendriks et al. (2020), this is essential for achieving environmental goals and the necessary level of employee engagement and satisfaction. However, it may not have a sufficient impact on the implementation of pro-environmental management principles if it is not supported by other virtues such as prudence, temperance, justice, courage and humanity.

Finally, according to Geiser (2021), despite the association of environmental ethics with self-interest, it is fully justified to consider reciprocity as an environmental virtue. "As an environmental virtue, reciprocity's example demonstrates that environmental virtue ethics need not give up psychological realism or concern with collective action." Following Kimmerer's environmental ethic of reciprocity, each person has a responsibility to share their unique gifts with the world in return for the gifts they have received from nature (Despret & Simpson, 2023).

It should be noted that reciprocity is a fundamental principle for the implementation of the concept of the sharing economy (Huang et al., 2023), without which the achievement of climate protection goals is impossible (George-Duckworth, 2011). It also plays an important role in reinforcing pro-environmental behaviour (Ekelund & Bergquist, 2023). According to Francis, reciprocity is "the idea of actions in return that are not founded on voluntary agreements or contracts" (Francis, 2008).

In psychology, unfortunately, reciprocity is often viewed as an emotional normative expectation that evokes a sense of indebtedness that includes an obligation to return benefits received (Adams &

Miller, 2022). Of course, it does not necessarily imply an exchange that takes place only between two workers. When workers plant trees and contribute to the production of a common good, reciprocity in such a case involves cooperation (Francis, 2008). For people to act responsibly, there must be cooperation, but it is the intrinsic motivation of reciprocity that can play a key role in this process (Huang et al., 2023).

The value of reciprocity in social exchange includes instrumental, communicative, and symbolic values. Research shows that behavioural preferences are primarily determined by the instrumental value of exchange (Molm et al., 2007). Reciprocity as a virtue is at a higher level of morality with a certain degree of selflessness, which can be a great challenge for people in today's civilisation.

It is also difficult to develop the instrumental values that are so important for reciprocity motivation. After all, there are organisational, ethical, material, immaterial, and autotelic values. In practice, they are interdependent. For example, if we destroy justice, we also destroy trust (Bugdol, 2006). The existing reciprocity norms in organisations can force employees to support an ethically questionable or even unacceptable practice demanded by the other party, that is, a relationship in the form of coercive reciprocity (Tangpong & Hung, 2016).

Discussion

The literature review shows that the main virtues that define a person's affectionate relationship with the natural environment are open-ended curiosity, persistence and perseverance, courage, humility, friendship, respect, justice, care, gratitude, compassion and mercy, trust and confidence.

However, when writing about virtues, one cannot deny certain problems related to the possibility of applying virtues in business practice due, among other things, to the complexity of organisations. There is also the question of how much we as individuals are able to reduce our negative impact on the environment and whether the knowledge we have helps us to change our behaviour. Finally, there are serious epistemic concerns about the ability to identify environmental virtues and patterns (Kawall, 2017). Thus, the relationship between knowledge and behaviour certainly warrants further research especially since the results of previous research on the usefulness of behavioural modelling training (BMT) have been inconclusive.

While we are on the subject of environmental virtue, let us not forget about technology, which currently poses serious ethical challenges. If we want our business to be thoroughly fair and humane, the business technologies designed and applied must be free of negative environmental aspects (Anthony, 2012). However, modern technology can be used to achieve better results and operate more efficiently. This raises the question of the motivation for organisations to cultivate environmental virtues.

While there are tools for assessing environmental virtues (Martin et al., 2009), one may question the validity of constructing such tools for manufacturing and service organisations. Today, environmental performance is assessed, and environmental aspects are measured. However, the question is how acceptable it is to continuously monitor our behaviour. After all, there is a danger that it could turn into permanent surveillance and pose a threat to our freedom.

An analysis of press publications further shows that we may be dealing with a myth of environmental virtue. This occurs when organisations declare their eco-friendliness and are recognised as eco-friendly but still engage in various unethical and socially unacceptable acts (Monbiot, 2012; Oi, 2024). In light of the above, further research should address both unethical and unethical pro-organisational activities.

When we attribute certain virtues to leaders, those who motivate us to act for the environment, it is important to remember that these virtues are interrelated. Six virtues, including four considered cardinal by Aristotle (courage, temperance, justice, prudence) and two by Confucius (humanity and truthfulness), are common to all leadership styles, i.e., moral, ethical, spiritual, servant, transformational, charismatic, and visionary (Hackett & Wang, 2012). Also, the cardinal virtues, according to Cicero, i.e., wisdom, justice, courage, and temperance, are important in business practice and occupy an important place in shaping the moral behaviour, not only of leaders (Small, 2013). Thus, an important research task is to determine the possible interactions that occur in the ethical subsystem of an organisation.

It is also imperative to link pro-environmental activity at both the individual and collective levels with sociodemographic categories, as these categories may be important modifiers of it. For example, one study found that female leaders outperformed male leaders in leading the COVID-19 pandemic precisely because they were guided by virtue. Wilson and Newstead (2022) identified humanity, justice, prudence, courage, and temperance as the core virtues of crisis leadership. In addition, leaders' ethical virtues and attitudes can be inspired by their religion (Chan & Ananthram, 2019). Some virtues, such as self-restraint, may also be conditioned by the age of leaders (Arici, 2002).

Sustainable development, including sustainable consumption, requires a balance not only between the social, economic and environmental orders but also between competing needs, which imposes certain choices. What is needed in practice, therefore, is not only research into the external context benchmarking analyses but, above all, reliability for the future and the incorporation of environmental virtues into management. They should constitute core organisational values, be the axiological underpinning of general and functional strategies (e.g. ESG), and be included in management systems, processes and tools, i.e. codes of ethics (Bugdol & Puciato, 2024).

However, environmental goals are difficult to achieve, and including financial incentives in the process of achieving them may lead to underestimation. Excessive compensation of executives may make them more interested in pursuing policyholder goals rather than ambitious ones (Bugdol & Wontorczyk, 2021). It is also important to remember that companies with ESG programs do not always generate higher shareholder returns (Betsholtz et al., 2020). Indeed, the results of studies attempting to link social and financial performance are inconclusive. Socially responsible mutual funds do not always outperform non-socially screened funds, and many relatively responsible companies have not been financially successful (Vogel, 2005). Moreover, corporate managers often fear that customers will not appreciate their efforts because sustainable consumption must cost more. As a result, even companies that have significantly reduced their resource use do not always communicate this directly. This phenomenon has even been termed "secret sustainability" (Bugdol & Puciato, 2022).

It should be remembered that the use of environmentally friendly products, processes, methods or strategies is not always economically and financially viable, at least in the prevailing short-term business perspective (Betsholtz et al., 2020). These problems are exacerbated by the high turnover in executive hiring and the focus on financial results reflected in the management objectives of board members. While there is no doubt that pro-ecological initiatives cannot be overlooked in the development of modern companies, the results of some studies indicate that pro-ecological initiatives undertaken have not contributed to net profit growth in about 50-60% of the surveyed companies (Wysocki & Dec, 2021).

Lean Green or Green Lean Six Sigma approaches require cultural changes, implementation of appropriate standardised procedures, training, support, environmental knowledge, etc. (Kaswan et al., 2021). Green reengineering, on the other hand, requires radical changes, and, as a result, resistance can be high. The time required to develop new skills for employees responsible for the entire process can also be an issue. The circular economy requires a strong system of communication and returns between manufacturers and customers (Lewandowski, 2016).

Measuring green intellectual capital is also difficult because there is often a lack of relevant data, and some studies suggest that elements of green intellectual capital are not directly related to environmental performance (Asiaei et al., 2023).

In the case of many companies, not only the problem of greed or self-indulgence, but also short-sightedness comes to the fore (Czakon, 2020; Hursthouse, 2023), and the consumer culture shaped by marketing efforts reassures us that individual (private) acts of environmental virtue are quite sufficient (Taylor, 2019). Thus, greed, short-sightedness, but also self-indulgence (Hursthouse, 2023) are not conducive to the realisation of various pro-environmental ideas. An interesting intellectual challenge was posed by Vogel (2005), who asked: "Is there a market for virtue?" In fact, it has been reported that companies embrace the idea of environmental virtue for a variety of reasons. One may be a long-term marketing strategy, and another may be a desire to reduce production costs. For example, outdoor clothing retailer Patagonia uses the marketing slogan "Buy less, buy smart." Patagonia executives are trying to show that they are willing to have lower profitability at the beginning of a larger project in order to scale up over the long term. The company has invested in an initiative called Footprint Chronicles to track the impact of each of its products throughout its lifecycle, from

raw materials to design, manufacturing, transportation, and disposal- or preferably remanufacture (Monbiot, 2012). In part, product labelling and eco-branding is an effective ways to incorporate the environmental costs of producing a product into its market price (The Economist, 2008).

There are other examples of such practices. In the automotive industry, during periods of high inflation, companies reduce the number of components needed to make a given product in cheaper models, which means they put more pressure on suppliers to buy fewer parts but in larger batches. Snack manufacturers reduce the package size of low-cost products, not only to cut costs but also to reduce waste. Coca-Cola sells drinks in full cups and is expanding the use of reusable bottles in India and Latin America. The Economist columnist suggests that such moves are reminiscent of hotel strategies that ask people to use fewer towels, which is extremely beneficial to the hotel company itself (Schumpeter, 2023).

The concept of virtues, like any other, is not exempt from certain limitations. For example, according to Treanor (2008), "virtue ethics depends on some conception of the good life, but today there is no clear, easily agreed-upon account of the good life. Rather, we are presented with a bewildering variety of conflicting accounts of the good life" from egocentric and supra-egocentric perspectives.

Milton Friedman observed that there is only one social responsibility of a business: to use its resources and engage in activities designed to increase its profits (The Economist, 2000). Profits can be made both ethically and unethically, for example, by deceiving investors, manipulating employees, or cheating customers. However, if an organisation wants to act ethically and environmentally, it should not only implement pro-environmental management systems or policies but also strive to develop environmental virtues. Process solutions (green supply chain management, lean green, green reengineering) are important, as are system solutions (studying the context, stakeholder needs and expectations, transparency of audit reports, transparency of data processing, etc.), but these activities must be undertaken on a solid ethical foundation. Therefore, management practice must not overlook virtues such as respect and responsibility, friendship, reduced consumption, intellectual virtues, patriotism, mercy, trust, loyalty, persistence and perseverance, humility, far-sightedness, courage, reciprocity, and open-ended curiosity.

Conclusion

It is the duty of every person at a certain stage of personal or professional development, and especially of a scientist (academic), to become an axiologist, regardless of whether one is an engineer, psychologist, economist, manager, or natural scientist. Thus, axiological reference is precisely our fundamental human duty, which should include not only our personal life but also social, economic and environmental phenomena.

The results of the present research confirm not only the possibility but even the necessity of using the idea of environmental virtues in economic practice. Only on the basis of identified values can organisations develop responsible strategies and implement them with systems, processes, methods or tools, thus contributing to their sustainable development. If these activities are not based on a solid axiological foundation, they will mostly be mere greenwashing.

The contribution of the authors

Conception, M.B., T.B. and D.P.; methodology, M.B. and T.B.; interpretation, M.B. and T.B.; writing and correction, M.B., T.B. and D.P.; literature review, M.B. and T.B.; text edition, D.P.

References

Abdul Muhmin, A. (2007). Explaining consumers' willingness to be environmentally friendly. International Journal of Consumer Studies, 31(3), 237-247. https://doi.org/10.1111/j.1470-6431.2006.00528.x

Adams, M. M., & Miller, J. G. (2022). The flexible nature of everyday reciprocity: reciprocity, helping, and relationship closeness. Motivation & Emotion, 46(4), 461-475. https://doi.org/10.1007/s11031-022-09949-y

Alipour Amir, N., Abbasi, E., & Bijani, M. (2021). Paddy Farmers' Pro-Environmental Behaviour Based on Virtue-Ethical Perspective. Agricultural Research, 10, 483-496. https://doi.org/10.1007/s40003-020-00512-0

- Al-Kahloot, E., Al-Yaqout, A., & Khan, P. (2019). The impact of ISO 14001 standards certification on firms' performance in the state of Kuwait. Journal of Engineering Research, 7(3), 286-303. https://kuwaitjournals.org/jer/index.php/JER/article/view/7683
- Anthony, R. (2012). Building a sustainable future for animal agriculture: An environmental virtue ethic of care approach within the philosophy of technology. Journal of Agricultural and Environmental Ethics, 25, 123-144. https://doi.org/10.1007/s10806-010-9285-z
- Argandona, A. (2015). Humility in management. Journal of Business Ethics, 132(1), 63-71. http://dx.doi.org/10. 1007/s10551-014-2311-8
- Arici, A. E. D. (2002). Yönetici Yaşinin Liderlik Davranişlari Üzerindeki Etkileri: Bankacilik Sektöründen Bir Grup Yönetici Üzerine Bir Araştirma. Akdeniz University Faculty of Economics & Administrative Sciences Faculty Journal, 2(3), 1-20.
- Ascher, W. (2006). Long-term strategy for sustainable development: strategies to promote far-sighted action. Sustainability Science, 1, 15-22. http://dx.doi.org/10.1007/s11625-006-0001-x
- Asiaei, K., O'Connor, N. G., Barani, O., & Joshi, M. (2023). Green intellectual capital and ambidextrous green innovation: The impact on environmental performance. Business Strategy and the Environment, 32(1), 369-386. https://doi.org/10.1002/bse.3136
- Avraamidou, S., Baratsas, S. G., Tian, Y., & Pistikopoulos, E. N. (2020). Circular Economy-A challenge and an opportunity for Process Systems Engineering. Computers & Chemical Engineering, 133, 106629. https:// doi.org/10.1016/j.compchemeng.2019.106629
- Avşaroğlu, S., & Hudaynazarova, A. (2022). Examining University Students' Perceptions of Mercy and Compassion. Proceedings of International Conference on Social and Education Sciences, San Antonio, 188-198. https: //eric.ed.gov/?id=ED631212
- Azubuike, C. C., Chikere, C. B., & Okpokwasili, G. C. (2020). Bioremediation: An eco-friendly sustainable technology for environmental management. In G. Saxena & R.N. Bhatagava (Eds.), *Bioremediation of Industrial Waste for Environmental Safety: Volume I: Industrial Waste and Its Management* (pp. 19-39). Singapore: Springer. http://dx.doi.org/10.1007/978-981-13-1891-7_2
- Babiak, K., & Trendafilova, S. (2011). CSR and environmental responsibility: Motives and pressures to adopt green management practices. Corporate Social Responsibility and Environmental Management, 18(1), 11-24. https://doi.org/10.1002/csr.229
- Bańka, J. (1986). Etyka prostoliniowości. Katowiece: Uniwersytet Śląski. (in Polish).
- Beau, R. (2023). The Ecological Community: The Blind Spot of Environmental Virtue Ethics. Philosophies, 8(6), 112. https://doi.org/10.3390/philosophies8060112
- Betsholtz, N., Lindström, A., & Wennerberg, E. (2020). *Is Sustainability Profitable?* [Bachelor Thesis]. Lund University.
- Bhaskaran, P. B. (2021). Mindtree: Tryst with the Corporate Control Market. South Asian Journal of Business & Management Cases, 10(1), 88-100. https://doi.org/10.1177/2277977921991900
- Birgün, S., & Kulaklı, A. (2022). Eliminating the barriers of green lean practices with thinking processes. In N.M. Durakbasa & M.G. Gençyılmaz (Eds.), *Digitizing Production Systems. Lecture Notes in Mechanical Engineering* (pp. 372-383). Cham: Springer International Publishing. https://doi.org/10.1007/978-3-030-90421-0_31
- Borys, G., & Borys, T. (2011). Zintegrowana odpowiedzialność biznesu. In J. Famielec (Ed.), *Ekologiczne uwarunko-wania rozwoju gospodarki oraz przedsiębiorstw* (pp. 65-80). Kraków: Uniwersytet Ekonomiczny. (in Polish).
- Borys, T. (2020). Współczesna aksjologia ekonomii. In B. Poskrobko, T. Borys, S. Czaja & T. Poskrobko (Eds.), *Warsztat naukowy ekonomisty* (pp. 73-130). Białystok: Wydawnictwo Ekonomia i Środowisko. (in Polish).
- Borys, T. (2021). The decomposition of the feelings module of the quality of life the third and the fourth components "empathy" and "compassion". Problems of Quality, 11-12, 2-11. (in Polish).
- Borys, T. (2022). The decomposition of the feelings module of the quality of life the sixth and seventh components of "trust" and "confidence". Problems of Quality, 54(4), 2-13. http://dx.doi.org/10.15199/46.2022.4.1 (in Polish).
- Brennan, A., & Lo, , S. (2015). *Environmental Ethics*. Stanford Encyclopedia of Philosophy Archive. https://plato. stanford.edu/archives/sum2024/entries/ethics-environmental
- Bugdol, M. (2006). Wartości organizacyjne. Szkice z teorii organizacji i zarządzania. Kraków: Wydawnictwo Uniwersytetu Jagiellońskiego. (in Polish).
- Bugdol, M., & Puciato, D. (2022). *Praktyczne zastosowanie systemów i koncepcji zarządzania środowiskowego.* Kraków: Wydawnictwo Uniwersytetu Jagiellońskiego. (in Polish).
- Bugdol, M., & Puciato, D. (2024). Zarządzanie zielonymi hotelami. Teoria i praktyka. Kraków: Wydawnictwo Uniwersytetu Jagiellońskiego. (in Polish).
- Bugdol, M., & Wontorczyk, A. (2021). Factors moderating the process of managing environmental objectives and identification of possible behavioural scenarios results of a literature review. Management of Environmental Quality: An International Journal, 32(6), 1334-1351. https://doi.org/10.1108/MEQ-02-2021-0023
- Cafaro, P. (2001). Thoreau, Leopold, and Carson: Toward an environmental virtue ethics. Environmental Ethics, 23(1), 3-17. http://dx.doi.org/10.5840/enviroethics200123135

- Cafaro, P. (2010). Environmental Virtue Ethics Special Issue: Introduction. Journal of Agricultural and Environmental Ethics, 23, 3-7. https://doi.org/10.1007/s10806-009-9204-3
- Cafaro, P. (2010). Patriotism as an environmental virtue. Journal of Agricultural and Environmental Ethics, 23(1), 185-206. http://dx.doi.org/10.1007/s10806-009-9189-y

Cafaro, P., & Sandler, R. D. (2010). Virtue ethics and the environment. Dordrecht: Springer.

- Cambra-Fierro, J., Hart, S., & Polo-Redondo, Y. (2008). Environmental Respect: Ethics or Simply Business? A Study in the Small and Medium Enterprise (SME) Context. Journal of Business Ethics, 82, 645-656. https://doi.org /10.1007/s10551-007-9583-1
- Chan, C., & Ananthram, S. (2019). Religion-Based Decision Making in Indian Multinationals: A Multi-Faith Study of Ethical Virtues and Mindsets. Journal of Business Ethics, 156(3), 651-677. https://doi.org/10.1007/ s10551-017-3558-7
- Chang, C., & Chen, Y. (2012). The determinants of green intellectual capital. Management Decision, 50(1), 74-94. https://doi.org/10.1108/00251741211194886
- Chen, R. J. (2015). From sustainability to customer loyalty: A case of full-service hotels' guests. Journal of Retailing and Consumer Services, 22, 261-265. https://doi.org/10.1016/j.jretconser.2014.08.007
- Chen, Y. S. (2008). The positive effect of green intellectual capital on competitive advantages of firms. Journal of Business Ethics, 77, 271-286. https://doi.org/10.1007/s10551-006-9349-1
- Chiarini, A. (2018). Why Service Companies are not Implementing EMAS as They Are with ISO 14001. An Exploratory Research based on Italian Service Companies. https://sites.les.univr.it/eisic/wp-content/uploads/2018 /11/12-Chiarini
- Clowney, D. (2013). Biophilia as an environmental virtue. Journal of Agricultural and Environmental Ethics, 26, 999-1014. http://dx.doi.org/10.1007/s10806-013-9437-z
- Clowney, D. (2014). Collective environmental virtue. Environmental Values, 23(3), 315-333. https://www.jstor. org/stable/43695151
- Cooper, D. E., & Palmer, J. A. (1992). Environment In Question. London: Routledge.
- Czakon, W. (2020). Krótkowzroczność strategiczna menedżerów. Kraków: Wydawnictwo Uniwersytetu Jagiellońskiego. (in Polish).
- Despret, V., & Simpson, J. (2023). Toward a Joyful Environmental Ethic: Open-Ended Curiosity as an Environmental Virtue. Journal of Ethnobiology, 43(3), 228-238. https://doi.org/10.1177/027807712311947
- Dzwonkowska, D. (2017). Normatywność etyki cnót środowiskowych na przykładzie etyki Ronalda Sandlera. Avant, 8(3), 99-108. https://doi.org/10.26913/80302017.0112.0005 (in Polish).
- Dzwonkowska, D. (2018a). Is Environmental Virtue Ethics Anthropocentric? Journal of Agricultural & Environmental Ethics, 31(6), 723-738. https://doi.org/10.1007/s10806-018-9751-6
- Dzwonkowska, D. (2018b). Environmental Virtue Ethics and Sustainability. Problems of Sustainable Development, 13(2), 139-146. https://ph.pollub.pl/index.php/preko/article/view/5022
- Ekelund, M., & Bergquist, M. (2023). Hotels re-explored: Experience and influence of reciprocity and social normative appeals. PLoS ONE, 18(12), 1-23. https://doi.org/10.1371/journal.pone.0289602
- Fehr, R., & Gelfand, M. J. (2012). The Forgiving Organisation: A Multilevel Model of Forgiveness at Work. Academy of Management Review, 37(4), 664-688. https://doi.org/10.5465/amr.2010.0497
- Ferkany, M. (2011). Mercy as an environmental virtue. Environmental Values, 20(2), 265-283. https://www.jstor.org/stable/23048442
- Fleming, T., & Zils, M. (2014). *Toward a circular economy: Philips CEO Frans van Houten*. https://www.mckinsey. com/capabilities/sustainability/our-insights/toward-a-circular-economy-philips-ceo-frans-van-houten
- Francis, L. P. (2008). Reciprocity and Environmental Obligations. Hofstra Law Review, 37, 1007-1014. https://scholarlycommons.law.hofstra.edu/hlr/vol37/iss4/6/
- Frasz, G. B. (2001). What is environmental virtue ethics that we should be mindful of it? Philosophy in the Contemporary World, 8(2), 5-14. https://doi.org/10.5840/pcw20018221
- Fredericks, R. (2014). Courage as an environmental virtue. Environmental Ethics, 36(3), 339-355. https://doi. org/10.5840/enviroethics201436334
- Freiman, C. (2006). Environmental virtue ethics. Ethics & the Environment, 11(1), 133-138. http://dx.doi.org/ 10.1353/een.2006.0003
- Frostenson, M. (2016). Humility in business: A contextual approach. Journal of Business Ethics, 138, 91-102. https://www.jstor.org/stable/24755817
- Ganesan, S., & Hess, R. (1997). Dimensions and Levels of Trust: Implications for Commitment to a Relationship. Marketing Letters, 8(4), 439-448. https://doi.org/10.1023/A:1007955514781
- Geiser, N. (2021). Reciprocity as an Environmental Virtue. Environmental Ethics, 43(3), 195-217. https://doi. org/10.5840/enviroethics20215421
- George-Duckworth, A. (2011). The Collective Goods Problem in Managing Environmental Issues. Peace Review, 23(2), 214-220. https://doi.org/10.1080/10402659.2011.571614

- Graves, L. M. (1985). Effects of Leader Persistence and Environmental Complexity on Leadership Perceptions: Do Implicit Beliefs Discourage Adaptation to Complex Environments? Group & Organisation Studies, 10(1), 19-36. https://doi.org/10.1177/105960118501000102
- Greenberg, H., & Sweeney, P. (2011). Managing or Leading? Chief Learning Officer, 10(8), 26-29.
- Grinciuc, L., & Litvin, A. (2013). Entrepreneurship a Major Factor in the Development of Moldovian Economy. Scientific Papers Series Management, Economic Engineering in Agriculture & Rural Development, 13(2), 175-180.
- Hackett, R. D., & Wang, G. (2012). Virtues and leadership. An integrating conceptual framework founded in Aristotelian and Confucian perspectives on virtues. Management Decision, 50(5), 868-899. https://doi.org/10. 1108/00251741211227564
- Hader, R. (2013). Leadership lessons learned from politics. Nursing Management, 44(1), 6. https://doi.org/10. 1097/01.NUMA.0000424021.68045.c9
- Hall, N., & Brady, E. (2023). Environmental Virtue Aesthetics. British Journal of Aesthetics, 63(1), 109-126. https://doi.org/10.1093/aesthj/ayac048
- Hamada, T., Shimizu, M., & Ebihara, T. (2021). Good patriotism, social consideration, environmental problem cognition, and pro-environmental attitudes and behaviours: A cross-sectional study of Chinese attitudes. SN Applied Sciences, 3, 1-16. https://doi.org/10.1007/s42452-021-04358-1
- Harbour, M., & Kisfalvi, V. (2014). In the eye of the beholder: An exploration of managerial courage. Journal of Business Ethics, 119, 493-515. http://dx.doi.org/10.1007/s10551-013-1835-7
- Harris, H. (1999). Courage as a management virtue. Business & Professional Ethics Journal, 18(3/4), 27-46. https://doi.org/10.5840/bpej1999183/416
- Harris, H. (2001). Content analysis of secondary data: A study of courage in managerial decision making. Journal of Business Ethics, 34, 191-208. https://doi.org/10.1023/A:1012534014727
- Hendriks, M., Burger, M., Rijsenbilt, A., Pleeging, E., & Commandeur, H. (2020). Virtuous leadership: a source of employee well-being and trust. Management Research Review, 43(8), 951-970. https://doi.org/10.1108/ MRR-07-2019-0326
- Hobbes, T. (1954). Lewiatan. Warszawa: PWN. (in Polish).
- Holly, M. (2006). Environmental Virtue Ethics A Review of some Current Work. Journal of Agricultural and Environmental Ethics, 19, 391-424. https://doi.org/10.1007/s10806-006-9002-0
- Holtbrügge, D., & Dögl, C. (2012). How international is corporate environmental responsibility? A literature reviews. Journal of International Management, 18(2), 180-195. https://doi.org/10.1016/j.intman.2012.02. 001
- Huang, L., Yuan, H., Dong, X., Chen, Z., & Zhou, L. (2023). Social norms and socially responsible consumption behaviour in the sharing economy: The mediation role of reciprocity motivation. Journal of Cleaner Production, 414, 137750. https://doi.org/10.1016/j.jclepro.2023.137750
- Huang, Y. (2016). Confucianism: Confucian environmental virtue ethics. In W. Jenkins, M.E. Tucker & J. Grim (Eds.), *Routledge handbook of religion and ecology* (pp. 52-59). London: Routledge.
- Hull, R. (2005). All about EVE: A report on environmental virtue ethics today. Ethics and The Environment, 10(1), 89-110. http://dx.doi.org/10.1353/een.2005.0014
- Hursthouse, R. (2023). Environmental Virtue Ethics. In J. Annas & J. Reid (Eds.), *Virtue and Action: Selected Papers* (pp. 210-230). Oxford: Oxford University Press. https://doi.org/10.1093/oso/9780192895844.003.0012
- Ianos, I., Peptenatu, D., & Zamfir, D. (2009). Respect for environment and sustainable development. Carpathian Journal of Earth and Environmental Sciences, 4(1), 81-93. https://scholar.google.pl/scholar?oi=bibs&clust er=13511904336590889096&btnI=1&hl=pl
- Javaid, M., Kumari, K., Khan, S. N., Jaaron, A. A., & Shaikh, Z. (2023). Leader green behaviour as an outcome of followers' critical thinking and active engagement: the moderating role of pro-environmental behaviour. Leadership & Organisation Development Journal, 44(2), 218-239. http://dx.doi.org/10.1108/LODJ-07-2021-0361
- Jena, A., & Kar, S. (2023). Human and Nature: Developing Virtues for Environmental Responsive Behaviour. Problems of Sustainable Development, 18(1), 177-182. https://doi.org/10.35784/pe.2023.1.18
- Jeraj, M., Marič, M., Todorović, I., Čudanov, M., & Komazec, S. (2015). The role of openness and entrepreneurial curiosity in company's growth. Amfiteatru Economic Journal, 17(38), 371-389. https://www.econstor.eu/bitstream/10419/168922/1/aej-v17-i38-p0371.pdf
- Jordan, K., & Kristjánsson, K. (2017). Sustainability, virtue ethics, and the virtue of harmony with nature. Environmental Education Research, 23(9), 1205-1229. https://psycnet.apa.org/doi/10.1080/13504622.2016. 1157681
- Kallhoff, A., & Schörgenhumer, M. (2017). The virtues of gardening: a relational account of environmental virtues. Environmental Ethics, 39(2), 193-210. https://doi.org/10.5840/enviroethics2017121410
- Kaswan, M. S., Rathi, R., Reyes, J. A. G., & Antony, J. (2021). Exploration and investigation of green lean six sigma adoption barriers for manufacturing sustainability. IEEE Transactions on Engineering Management, 70(12), 4079-4093. http://dx.doi.org/10.1109/TEM.2021.3108171

- Kawall, J. (2003). Reverence for life as a viable environmental virtue. Environmental Ethics, 25(4), 339-358. http://dx.doi.org/10.5840/enviroethics20032542
- Kawall, J. (2017). The Oxford Handbook of Environmental Ethics. Oxford: Oxford University Press.
- Kirkham, N., & Letheby, C. (2024). Psychedelics and environmental virtues. Philosophical Psychology, 37(2), 371-395. https://doi.org/10.1080/09515089.2022.2057290
- Kumar, A., Jain, V., & Kumar, S. (2014). A comprehensive environment friendly approach for supplier selection. Omega, 42(1), 109-123. https://doi.org/10.1016/j.omega.2013.04.003
- Lan, Y. C. (2011). Reengineering a green business. International Journal of Green Computing, 2(1), 1-11. https://doi.org/10.4018/jgc.2011010101
- Le Duc, A. (2023). Responsibility as a primary environmental virtue in Islam. Asian Journal of Philosophy and Religion, 2(1), 187-206. https://doi.org/10.55927/ajpr.v2i1.4821
- Lewandowski, M. (2016). Designing the business models for circular economy Towards the conceptual framework. Sustainability, 8(1), 43. https://doi.org/10.3390/su8010043
- Lievens, F., Harrison, S. H., Mussel, P., & Litman, J. A. (2022). Killing the cat? A review of curiosity at work. Academy of Management Annals, 16(1), 179-216. https://doi.org/10.5465/annals.2020.0203
- Mahoney, J. (1998). Editorial adieu: Cultivating moral courage in business. Business Ethics: A European Review, 7(4), 187-192. https://doi.org/10.1111/1467-8608.00106
- Majid, A., Yasir, M., Yasir, M., & Javed, A. (2020). Nexus of institutional pressures, environmentally friendly business strategies, and environmental performance. Corporate Social Responsibility and Environmental Management, 27(2), 706-716. https://doi.org/10.1002/csr.1837
- Mandeville, B. (1957). Bajka o pszczołach. Warszawa: PWN. (in Polish).
- Manthiou, A., & Kuppelwieser, V. G. (2023). Consumer Reaction to Decelerated Tourism: Pace, Inherent Virtue, andEnvironmentalConcern.JournalofTravelResearch,62(7),1510-1529.https://doi.org/10.1177/0047287 5221130293
- Martin, B., Bright, A., Cafaro, P., Mittelstaedt, R., & Bruyere, B. (2009). Assessing the development of environmental virtue in 7th and 8th grade students in an expeditionary learning outward bound school. Journal of Experiential Education, 31(3), 341-358. http://dx.doi.org/10.1177/105382590803100303
- Mohua, M. J., & Yusoff, W. F. W. (2023). Do Performance Measurement Systems Matter to Vitalize Green Intellectual Capital and Sustainable Performance? A Conceptual Framework. International Journal of Professional Business Review, 8(7), 123. https://doi.org/10.26668/businessreview/2023.v8i7.3233
- Molm, L. D., Schaefer, D. R., & Collett, J. L. (2007). The value of reciprocity. Social Psychology Quarterly, 70(2), 199-217. https://doi.org/10.1177/019027250707000208
- Monbiot, G. (2012, November 20). Norway's plan to kill wolves explodes myth of environmental virtue. https://www.theguardian.com/environment/georgemonbiot/2012/nov/20/norway-predators-wolves
- Moyano-Fernández, C. (2023). Rethinking the Environmental Virtue of Ecological Justice from the Interdependencies of Non-Human Capabilities and Synergetic Flourishing. Philosophies, 8(6), 103. https://doi.org/ 10.3390/philosophies8060103
- Nowicki, P., Ćwiklicki, M., Kafel, P., & Wojnarowska, M. (2021). Credibility of certified environmental management systems: Results from focus group interviews. Environmental Impact Assessment Review, 88, 106556. https://doi.org/10.1016/j.eiar.2021.106556
- Oi, M. (2024, January 30). Toyota repeats recall of 50,000 vehicles in US over airbag 'injury or death' fears. https://www.bbc.com/news/business-68137266
- Papagiannakis, G., & Lioukas, S. (2018). Corporate environmental management: Individual level drivers and the moderating role of charismatic leadership. European Management Review, 15(4), 475-489. https://doi.org/ 10.1111/emre.12134
- Patterson, J. (1994). Maori environmental virtues. Environmental Ethics, 16(4), 397-409. https://doi.org/10. 5840/enviroethics19941645
- Pianalto, M. (2013). Humility and environmental virtue ethics. In M.W. Austin (Ed.), *Virtues in Action: New Essays in Applied Virtue Ethics* (pp.132-149). London: Palgrave Macmillan UK.
- Pullin, A. S., & Knight, T. M. (2009). Data credibility: A perspective from systematic reviews in environmental management. Environmental program and policy evaluation: Addressing methodological challenges, 122, 65-74. https://doi.org/10.1002/ev.296
- Reardon, K. K. (2007). Courage as a skill. Harvard Business Review, 85(1), 58-64. https://hbr.org/2007/01/ courage-as-a-skill
- Rehman, S. U., Elrehail, H., Alshwayat, D., Ibrahim, B., & Alami, R. (2023). Linking hotel environmental management initiatives and sustainable hotel performance through employees' eco-friendly behaviour and environmental strategies: a moderated-mediated model. European Business Review, 35(2), 184-201. http://dx. doi.org/10.1108/EBR-05-2022-0094
- Reichheld, F. F. (1993). Loyalty-based management. Harvard Business Review, 71(2), 64-73.
- Rosenberg, J. (2023). Stewardship and Resilience: The Environmental Virtues. In J.R. Lupton & D. Sherman (Eds.), *Shakespeare and Virtue: A Handbook* (pp. 230-243). Cambridge: Cambridge University Press.

- Sadler-Smith, E., & Akstinaite, V. (2022). Human Hubris, Anthropogenic Climate Change, and Environmental Ethic of Humility. Organisation & Environment, 35(3), 446-467. https://doi.org/10.1177/108602662110 39000
- Sandler, R. (2003). The external goods approach to environmental virtue ethics. Environmental Ethics, 25(3), 279-293. https://doi.org/10.5840/enviroethics200325319
- Sandler, R. (2006). A theory of environmental virtue. Environmental Ethics, 28(3), 224-264. http://dx.doi.org/ 10.5840/enviroethics200628316
- Sandler, R. (2013). *Environmental virtue ethics*. International Encyclopedia of Ethics. https://doi.org/10.1002/ 9781444367072.wbiee090
- Sandler, R., & Cafaro, P. (2009, May 1). A Short Course in Environmental Ethics: Lesson Six. https://www.scu.edu/ environmental-ethics/short-course-in-environmental-ethics/lesson-six/
- Schlaile, M. P., Klein, K., & Böck, W. (2018). From bounded morality to consumer social responsibility: A transdisciplinary approach to socially responsible consumption and its obstacles. Journal of Business Ethics, 149, 561-588. https://doi.org/10.1007/s10551-016-3096-8
- Schumpeter, J. (2023). Top dogs and babies' bottoms. How companies are coping with inflation. The Economist, 56.
- Sekerka, L. E., Godwin, L. N., & Charnigo, R. (2014). Motivating managers to develop their moral curiosity. Journal of Management Development, 33(7), 709-722. https://doi.org/10.1108/JMD-03-2013-0039
- Small, M. (2013). Business Practice, Ethics and the Philosophy of Morals in the Rome of Marcus Tullius Cicero. Journal of Business Ethics, 115(2), 341-350. https://doi:10.1007/s10551-012-1401-8
- Snyder, N. (2010). Vision, values, and courage: Leadership for quality management. New York: Simon and Schuster.
- Stafford, S. P. (2010). Intellectual virtues in environmental virtue ethics. Environmental Ethics, 32(4), 339-352. https://doi.org/10.5840/enviroethics201032439
- Stankiewicz, W. (2000). Historia myśli ekonomicznej. Warszawa: Polskie Wydawnictwo Ekonomiczne. (in Polish).
- Statman, D. (1994). Doing Without Mercy. The Southern Journal of Philosophy, 32(3), 331. https://doi.org/10. 1111/j.2041-6962.1994.tb00719.x
- Sultana, K., Kitchlew, N., & Ali, S. A. (2023). Perceived Ethical Leadership and Moral Voice: Mediating Role of Moral Courage. International Journal of Business & Economic Affairs, 8(1), 26-43. https://doi.org/10.24088/ IJBEA-2023-81004
- Tangen, K. I. (2015). The Need for Temperance: On Organisational Leadership and Temperance. Scandinavian Journal for Leadership and Theology, 2. https://doi.org/10.53311/sjlt.v2i.8
- Tangpong, C., Li, J., & Hung, K. T. (2016). Dark side of reciprocity norm: Ethical compromise in business exchanges. Industrial Marketing Management, 55, 83-96. https://doi.org/10.1016/j.indmarman.2016.02.015
- Taylor, S. M. (2019). *Ecopiety: Green Media and the Dilemma of Environmental Virtue*. New York: New York University Press.
- Thạch, M. H. (2024). Animal Mercy Release, Environmental Conservation, and the Media in Vietnam. In U.K. Heise & C.P. Pham (Eds.), *Environment and Narrative in Vietnam* (pp. 109-139). Cham: Springer Nature Switzerland.
- The Economist. (2000, April 20). *Doing well by doing good*. https://www.economist.com/business-special/2000/04/20/doing-well-by-doing-good
- The Economist. (2008, January 28). *On the mark*. https://www.economist.com/international/2008/01/28/on-the -mark
- Todorow, K. G. (2014). Axiology of the technical artifact. European Science Review, 3, 63-67. https://cyberleninka.ru/article/n/axiology-of-the-technical-artifact
- Treanor, B. (2008). Narrative environmental virtue ethics: Phronesis without a phronimos. Environmental Ethics, 30(4), 361-379. https://doi.org/10.5840/enviroethics200830440
- Treanor, B. (2010). Environmentalism and public virtue. Journal of Agricultural and Environmental Ethics, 23, 9-28. https://doi.org/10.1007/s10806-009-9184-3
- Treanor, B. (2014). Emplotting virtue: a narrative approach to environmental virtue ethics. Suny Press.
- Uçar, E., Le Dain, M. A., & Joly, I. (2020). Digital technologies in circular economy transition: evidence from case studies. Procedia Cirp, 90, 133-136. https://doi.org/10.1016/j.procir.2020.01.058
- Vera, D., & Rodriguez-Lopez, A. (2004). Strategic virtues: humility as a source of competitive advantage. Organisational Dynamics, 33(4), 393-408. https://doi.org/10.1016/j.orgdyn.2004.09.006
- Vogel, D. J. (2005). Is there a market for virtue? The business case for corporate social responsibility. California Management Review, 47(4), 19-45. https://doi.org/10.1177/000812560504700401
- Wang, M., Matthews, D., & Rothenberg, L. (2020). Patriotism, Environmentalism, and the Purchase of Organic Apparel. The International Journal of Social Sustainability in Economic, Social, and Cultural Context, 17(1), 7-8. http://dx.doi.org/10.18848/2325-1115/CGP/v17i01/1-12
- Warren, C., & Coghlan, A. (2016). Using character strength-based activities to design pro-environmental behaviours into the tourist experience. Anatolia, 27(4), 480-492. http://dx.doi.org/10.1080/13032917.2016.121 7893

- Whitehurst, J. (2015, May 20). *How to Earn Respect as a Leader*. https://hbr.org/2015/05/how-to-earn-respect-as-a-leader
- Wilson, S., & Newstead, T. (2022). The virtues of effective crisis leadership: What managers can learn from how women heads of state led in the first wave of COVID-19. Organisational Dynamics, 51(2), 100910. https://doi.org/10.1016/j.orgdyn.2022.100910
- Wiseman, J., & Wiseman, J. (2021). Mercy to All Beings: Learning from Christian, Jewish and Islamic Traditions About Thankfulness, Love and Care. In J. Wiseman (Ed.), *Hope and Courage in the Climate* Crisis (pp. 123-144). Cham: Macmillian.
- Wright, J. C., Nadelhoffer, T., Perini, T., Langville, A., Echols, M., & Venezia, K. (2017). The psychological significance of humility. The Journal of Positive Psychology, 12(1), 3-12. https://doi.org/10.1080/17439760.201 6.1167940
- Wright, M. (2011, November 7). Success means telling people to buy less. https://www.theguardian.com/sustainable-business/blog/patagonia-closed-loop-green-technology
- Wysocki, J., & Dec, P. (2021). Pro-Ecological Initiatives and Profitability of Manufacturing Enterprises. European Research Studies Journal, 24(4), 57-74. https://doi.org/10.35808/ersj/2562
- Yucedag, C., Kaya, L. G., & Cetin, M. (2018). Identifying and assessing environmental awareness of hotel and restaurant employees' attitudes in the Amasra District of Bartin. Environmental Monitoring & Assessment, 190(2), 1. https://doi.org/10.1007/s10661-017-6456-7
- Zabojnik, F., & Zabojnik, J. (2005). Trust, Social Capital, and Economics Development. Journal of the European Economic Association, 3(1), 51-94. https://ideas.repec.org/a/tpr/jeurec/v3y2005i1p51-94.html

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KONCEPCJA ORGANIZACJI PROEKOLOGICZNEJ A TEORIA CNOTY ŚRODOWISKOWEJ

STRESZCZENIE: Zagrożenia klimatyczne sprawiają, że niezbędne są zmiany zachowań i stylów życia, zmierzające do kształtowania zrównoważonej konsumpcji i produkcji. W sposób szczególny dotyczy to organizacji i może polegać na wprowadzaniu praktyk opartych na cnotach środowiskowych. Choć w literaturze są doniesienia dotyczące cnót środowiskowych, to brakuje opracowań wskazujących na ich wykorzystywaniu w zarządzaniu oraz ekonomii. Dlatego jednym z ważniejszych celów artykułu jest identyfikacja cnót środowiskowych, które można powiązać z działalnością organizacji. Głównymi metodami badawczymi były: diagnoza i analiza porównawcza oraz an overview of the literature. Z dokonanego przeglądu literatury wynika, że głównymi cnotami, które określają uczuciowy stosunek człowieka do środowiska przyrodniczego są: ciekawość i otwartość generujące wiedzę – kapitał intelektualny, konsekwencja i wytrwałość, odwaga, pokora, przyjaźń, szacunek, sprawiedliwość, troska, wdzięczność, współczucie i miłosierdzie oraz zaufanie i wiarygodność. Cnoty te powinny stanowić wartości organizacyjne zrównoważonych organizacji, stanowić podstawę aksjologiczną ich strategii rozwoju i funkcjonalnych (np. ESG), a także uwidaczniać się w systemach, metodach i procesach, a także w narzędziach zarządzania, np. w kodeksach etycznych.

SŁOWA KLUCZOWE: cnoty środowiskowe, konsumpcja zrównoważona, aksjologia, etyka, moralność, organizacja