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Human Resource Management and Pro-Environmental Behaviour of Young People in the Context of Industry 5.0

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Abstract— *Industry 5.0 shifts the focus of enterprise transformation towards sustainability and human-centricity. This places new demands on human resource management (HRM), which needs to understand the pro-environmental values and behaviour of young people as the future workforce. The aim of the paper is to identify how young people in Slovakia experience climate change, to what extent their pro-environmental attitudes are reflected in their economic decisions and what this implies for HRM. The empirical basis is an online questionnaire survey of 427 young adults aged 18 to 30 in Slovakia in 2026. Climate change experience is measured by the Climate Change Anxiety Scale, and economic decision-making by willingness to pay more for green products and services, saving for green investments and limiting expenditures due to climate change. Descriptive statistics are used. Young people experience climate change mainly through behavioural engagement in everyday sustainable practices, whereas cognitive-emotional and functional impairment are rare. When saving for green investments, economic motives, particularly reducing household costs and gaining energy independence, prevail over environmental ones, and decisions requiring financial resources are made only by a minority. The pro-environmental economic decisions of the future workforce thus follow primarily an economic logic. For HRM, this implies connecting sustainability initiatives with tangible employee benefits, such as support for green investments or sustainable mobility, and bridging individual values and organisational environmental goals through green HRM practices.*

Keywords— *climate change anxiety, human resource management, Industry 5.0, pro-environmental behaviour, young people.*

I. INTRODUCTION

The concept of Industry 5.0, introduced by the European Commission in 2021, does not abandon the technological agenda of Industry 4.0, but it changes the purpose attached to it by placing human-centricity, sustainability and resilience at the centre of industrial transformation [1]. Nahavandi [2] and Xu et al. [3] similarly argue that the key question is no longer only what technology can do, but what it should do for workers and for society. For enterprises, this implies that environmental goals cannot be achieved through technology alone, since they depend to a considerable extent on people, their values and their everyday decisions. This shift has direct implications for human resource management (HRM), as research on green HRM has shown that HRM practices aligned with environmental objectives are associated with employees' environmental behaviour and with the environmental performance of organisations [4]–[6]. Such practices, however, can only be effective if they correspond to what actually drives employees. In Slovakia, the issue also has a demographic dimension, as the working-age population decreased by 9.6% between 2010 and 2024 [7], and employers will increasingly have to compete for a shrinking number of young workers.

Young people are often described as the generation most affected by climate concern. In a survey of 10,000 respondents aged 16 to 25 in ten countries, Hickman et al. [8] found that 59% were very or extremely worried about climate change and that more than 45% reported that these feelings negatively affected their daily life and functioning. Concern, however, does not necessarily translate into action, and this distinction is reflected in the Climate Change Anxiety Scale developed by Clayton and Karazsia [9], which

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separates cognitive-emotional impairment and functional impairment from personal experience of climate change and from behavioural engagement. Research on pro-environmental behaviour has long pointed to a gap between what people believe and what they actually do [10], which Gifford [11] and Stern [12] attribute to habits, perceived costs, structural barriers and limited control over one's circumstances. A similar pattern is evident in green consumption, where ElHaffar et al. [13] document a persistent distance between declared intentions and actual purchases. Among young people, moreover, Ojala [14] showed that environmental engagement is linked to constructive hope rather than to worry.

Despite this growing body of work, green HRM research has concentrated mainly on employees who are already inside organisations [4]–[6], while much less attention has been paid to young people who are about to enter the labour market or have only recently done so, although they are the ones whom HRM will have to attract and retain in the coming decades. At the same time, climate change anxiety has been studied mainly as a psychological and mental health phenomenon [8], [9], and its relationship to everyday economic decisions, such as willingness to pay more for green products, saving for green investments or limiting expenditures, has received considerably less attention. It is therefore unclear whether young people's concern about climate change actually translates into such decisions, or whether these follow a primarily economic logic. The geographical coverage of existing evidence is also uneven, since the international survey by Hickman et al. [8] did not include any country from Central and Eastern Europe, and evidence from Slovakia remains scarce, even though the economic conditions of young people there differ from those in Western Europe. These questions also have direct practical relevance, because if the pro-environmental decisions of young people are driven primarily by economic rather than environmental motives, sustainability initiatives that appeal only to employees' values are unlikely to engage them, and HRM will need to link environmental goals with tangible benefits for employees.

The aim of this paper is to identify how young people in Slovakia experience climate change and how this experience is reflected in their economic decisions. The paper then considers what these findings mean for HRM in the context of Industry 5.0. The analysis is based on a questionnaire survey of young adults aged 18 to 30. The paper builds on the research project VEGA No. 1/0029/25 “Specifics of Human Resource Management in Slovak Enterprises Related to Industry 4.0”, which focuses on HRM in Slovak enterprises undergoing technological transformation, and extends this focus to the human-centric and sustainable dimension introduced by Industry 5.0. The central research question is formulated as follows: *How do young people in Slovakia experience climate change, how is this experience reflected in their economic decisions, what motives underlie these decisions, and what do these findings imply for HRM in the context of Industry 5.0?*

To answer this question, we formulate three hypotheses (H1–H3) derived from the literature outlined above:

H1: *Young people experience climate change more through behavioural engagement than through cognitive-emotional and functional impairment.*

H2: *Low-cost everyday pro-environmental practices are more widespread among young people than pro-environmental economic decisions that require financial resources.*

H3: *Economic motives prevail over environmental motives in saving for green investments.*

By shifting the analytical focus from current employees to young people as the prospective workforce, the paper addresses these open questions. It examines how young people experience climate change across the individual dimensions of climate change anxiety, how this experience is reflected in their pro-environmental economic decisions, and whether these decisions are driven predominantly by environmental or economic motives. The study contributes empirical evidence from Slovakia, a context underrepresented in the existing literature. The findings provide a basis for recommendations on how green HRM practices, notably green recruitment, training and reward systems, can be aligned with the motivational structure of the prospective workforce. The remainder of the paper is organised as follows: Section II outlines the theoretical background, Section III describes the data and methodology, Section IV presents the empirical results,

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Section V discusses their implications for HRM, and the final section concludes the paper.

II. THEORETICAL BACKGROUND

A. Industry 5.0 and the Human-Centric Workforce

The term Industry 5.0 entered European policy discourse through the policy brief of the European Commission, which presented it as a complement to, rather than a replacement of, the Industry 4.0 paradigm [1]. The concept rests on three interconnected pillars: human-centricity places the needs and interests of workers at the centre of production processes, sustainability refers to the efficient use of resources and the reduction of environmental impacts, and resilience denotes the capacity of industrial systems to withstand disruptions. An important change concerns the view of the worker, who is no longer regarded as a cost to be minimised but as an investment that enables the enterprise to develop [1]. Nahavandi [2] emphasised the cooperation between humans and machines, in which technology takes over repetitive tasks while people contribute creativity and critical judgement. Xu et al. [3] described the difference between the two paradigms as a move from a technology-driven to a value-driven approach to industrial development.

In their review of the concept, Leng et al. [15] identify human-centricity, sustainability and resilience as the defining features that distinguish Industry 5.0 from its predecessor. Grabowska et al. [16] interpret Industry 5.0 as a humanisation of Industry 4.0, in which technological progress is closely tied to sustainable development. Ivanov [17] goes a step further and argues that the three pillars should not be pursued as separate goals but integrated within a single framework of system viability. Despite differences in emphasis, these authors share the view that technological progress is justified only to the extent that it serves people and the environment. For HRM, this perspective has two consequences: the wellbeing and development of employees become strategic objectives rather than by-products of business activity, and environmental goals have to be achieved largely through the everyday behaviour of people. This corresponds to the concept of sustainable HRM, which Kramar [18] describes as an approach that extends the outcomes of HRM beyond financial performance to include human, social and ecological outcomes. From this point of view, the values and motives of employees, including their attitudes towards environmental issues, become a legitimate subject of HRM. This is particularly relevant for young people, who will form the core of the workforce in the coming decades. The following subsection therefore examines how HRM practices can be aligned with environmental objectives.

B. Green Human Resource Management

Green human resource management (green HRM) refers to the use of HRM policies and practices to support the environmental objectives of an organisation. Renwick et al. [4] define it as the environmental dimension of HRM and argue that environmental management cannot be effective without the involvement of employees, whose knowledge, attitudes and behaviour determine whether environmental strategies are implemented in practice. Jackson et al. [19] point out that green HRM integrates two previously separate fields of research, environmental management and HRM, and that its development reflects the growing pressure on organisations to demonstrate environmental responsibility not only in their products but also in the way they manage people. The theoretical basis of green HRM is most often derived from the ability-motivation-opportunity (AMO) framework, according to which employee performance depends on the ability to perform a task, the motivation to do so and the opportunity to apply this ability in practice [20]. Renwick et al. [4] applied this framework to environmental management and grouped green HRM practices accordingly. Green recruitment, selection and training develop employees' environmental abilities, green performance appraisal and rewards strengthen their motivation, and employee involvement and empowerment create opportunities for environmentally responsible behaviour (Fig. 1). Although the framework refers to employees, it is also relevant for students as prospective employees, since green recruitment and selection address them even before they enter the organisation, and the remaining practices will shape their behaviour once they are employed. Ren et al. [5] note that research has so far concentrated mainly on the first two groups, while less is known about how the individual practices work together as a system.

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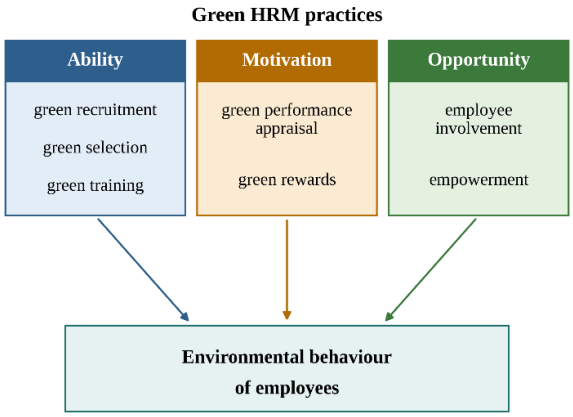


Fig. 1 Green HRM practices within the AMO framework.

Source: Own processing according to Renwick et al. [4] and Appelbaum et al. [20]

Recruitment is particularly relevant in relation to young people, as Greening and Turban [21] showed that organisations with a good record of social and environmental performance are perceived as more attractive employers by job seekers. Gully et al. [22] found that information about an organisation's social and environmental responsibility in recruitment messages increases applicants' interest in the job, especially among those who want their work to make a positive difference. Environmental commitment can thus become part of the employer brand, but only if it corresponds to what potential employees actually value. The effects of green HRM have also been confirmed at the individual level, as Paillé et al. [6] showed that HRM practices supporting environmental goals are related to employees' environmental behaviour at work, which in turn contributes to the environmental performance of the organisation. Dumont et al. [23] found that green HRM practices shape employees' green behaviour partly through the psychological green climate in the organisation, and that the strength of this effect depends on employees' own green values.

The finding of Dumont et al. [23] is important for the present study, as it suggests that green HRM does not act on employees as a neutral instrument but interacts with the values and motives they bring into the organisation. Before HRM practices can be designed for the prospective workforce, it is therefore necessary to understand how young people perceive environmental issues and what drives their decisions. The following subsection focuses on the first of these questions, namely how young people experience climate change.

C. *Climate Change Anxiety among Young People*

Besides being an environmental and economic problem, climate change is increasingly perceived as a source of psychological strain. Clayton [24] describes climate anxiety as anxiety related to climate change and its consequences, and stresses that in most cases it represents a rational response to a real threat rather than a pathological condition. Pihkala [25] adds that eco-anxiety stems from the uncertain, unpredictable and uncontrollable nature of the ecological crisis, and distinguishes paralysing forms of anxiety from a "practical" anxiety that leads people to seek information and reconsider their behavioural options. Climate anxiety is therefore not a uniform phenomenon, and its consequences for behaviour depend on the form it takes.

To capture this complexity, Clayton and Karazsia [9] developed the Climate Change Anxiety Scale, which distinguishes four dimensions. Cognitive-emotional impairment covers rumination about climate change, difficulties with sleep and concentration and emotional reactions such as crying, while functional impairment refers to the extent to which these concerns interfere with work, study and relationships. Together, these two dimensions form the core of climate change anxiety in the narrower sense. Personal experience of climate change captures whether a person has been affected directly or has noticed changes in places that are

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important to them, and behavioural engagement covers sustainable everyday practices and the belief that one's own actions can help to address the problem. The authors found that the impairment dimensions and behavioural engagement form empirically distinct factors, which supports the view that concern about climate change and action to address it are distinct phenomena.

Young people appear to be particularly exposed to climate anxiety, as Hickman et al. [8] documented widespread worry among 16- to 25-year-olds and showed that this distress was associated with the perception that governments are not responding adequately to the climate crisis. The evidence on how such feelings translate into behaviour is, however, mixed. In a study covering 32 countries, Ogunbode et al. [26] found that climate anxiety was positively associated with pro-environmental behaviour in 24 countries, whereas its negative association with mental wellbeing was found in almost all of them. Stanley et al. [27] showed that different climate-related emotions have different consequences, as eco-anger was associated with greater engagement in both personal and collective climate action, while eco-anxiety was related to lower wellbeing and was not related to personal pro-environmental behaviour. This is consistent with the finding of Ojala [14] that the environmental engagement of young people is linked to constructive hope rather than to worry. These studies suggest that the motivating force of climate anxiety is limited and that pro-environmental action is more closely connected with engagement and perceived efficacy than with emotional distress. This assumption underlies hypothesis H1, and the distinction is also relevant for HRM, because Industry 5.0 places the wellbeing of workers at the centre of industrial transformation [1], which makes it important whether climate change represents a source of psychological strain for the prospective workforce or rather a motive for engagement that organisations can build on.

D. ***Pro-Environmental Behaviour and Economic Decision-Making***

Pro-environmental behaviour is generally understood as behaviour that harms the environment as little as possible or even benefits it [28]. Steg and Vlek [28] point out that such behaviour depends not only on values and attitudes but also on contextual factors such as costs, available products and infrastructure, and that the relative importance of these factors differs from one behaviour to another. The value-belief-norm theory of Stern [12] links environmentally significant behaviour to personal values and norms, but also recognises that attitudes have the strongest effect when contextual conditions neither strongly support nor strongly hinder the behaviour. Kollmuss and Agyeman [10] and Gifford [11] describe a range of barriers, including habits, perceived costs and limited behavioural control, which explain why environmental concern often does not result in action.

Economic decisions represent a specific category of pro-environmental behaviour, as they involve direct financial costs or benefits for the individual. Diekmann and Preisendörfer [29] formulated the low-cost hypothesis, according to which environmental attitudes influence behaviour mainly in situations associated with low costs and little inconvenience, whereas in high-cost situations economic incentives tend to prevail over attitudes. Paying a premium for green products, saving for green investments or deliberately limiting expenditures are typically high-cost decisions, particularly for young people with limited incomes. This is in line with the gap between declared intentions and actual purchases in green consumption documented by ElHaffar et al. [13], and hypothesis H2 builds on this argument.

When pro-environmental decisions involve substantial expenditure, they are frequently driven by motives other than environmental concern. In a survey of UK households, Balcombe et al. [30] found that the most important motivations for adopting microgeneration technologies such as solar photovoltaics and heat pumps were earning money from the installation, increasing household energy independence and protecting the household against future high energy costs. Green investments thus combine environmental benefits with economic self-interest, and the economic motives may well be decisive, which is the basis of hypothesis H3. The material situation of individuals plays a role as well, as Moser and Kleinhückelkotten [31] showed that environmental self-identity was the main predictor of self-reported pro-environmental behaviour, whereas the actual environmental impact of individuals was best predicted by their income. Socio-

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economic conditions thus shape environmentally relevant decisions at least as much as motivation does. For young people, the transition from study to employment brings a regular income, greater financial independence and responsibility for household expenditures on energy, transport and consumption, so that economic decisions with environmental consequences become both more frequent and more feasible. The reviewed literature suggests that the pro-environmental economic decisions of the prospective workforce result from an interplay of engagement, economic rationality and material conditions, a perspective that green HRM practices need to take into account.

III. Data and Methodology

A. Data Collection

The study employed a quantitative research design based on an online questionnaire survey. The data were collected through a questionnaire created in Google Forms between January and May 2026 within the EcoCare research programme (ECOCARE – Slovakia survey, Cross-Cultural Experiences of Eco-Anxiety Among Young Adults), which focuses on the experience of climate change anxiety among young adults in the European context. The questionnaire was administered in Slovak and targeted young adults aged 18 to 30 years. In total, 427 young adults were surveyed across four age groups: 18–20, 21–23, 24–26 and 27–30 years.

In addition to a set of environmental-attitude items addressed in a related analysis from the same programme, three parts of the questionnaire were used for the purposes of this paper: i) the Climate Change Anxiety Scale (CCAS); ii) questions on pro-environmental economic decisions; and iii) socio-demographic characteristics of respondents. The CCAS developed by Clayton and Karazsia [9] contains 22 statements rated on a five-point scale from 1 (never) to 5 (almost always), with higher values indicating that the described situation occurs more frequently. In line with the original structure of the scale, the statements were grouped into four dimensions: cognitive-emotional impairment (items 1–8), functional impairment (items 9–13), personal experience of climate change (items 14–16) and behavioural engagement (items 17–22).

Pro-environmental economic decisions were captured by three questions focusing on: i) willingness to pay extra for eco-friendly products and services, rated on a five-point scale from 1 (definitely not) to 5 (definitely yes); ii) saving money for planned eco-friendly investments in the future, such as solar panels, heat pumps or an own source of drinking water, with respondents who save selecting their main reason for saving; and iii) limiting expenditures due to climate change, with the possibility to indicate all areas concerned. The three questions on economic consequences were added at the end of the questionnaire, after the CCAS. Including the CCAS made it possible, for the first time in this population, to examine whether the psychological intensity of climate change anxiety is reflected in the economic behaviour of young adults and to consider the implications for HRM, which will be working with this generation in the coming decades. The socio-demographic part covered gender, age, education, employment status, nationality and place of residence.

Ethical considerations. The Ethics Committee of Matej Bel University in Banská Bystrica reviewed the ethical aspects of the research project and issued Statement No. 43/2026 on 26 January 2026. The approval covered both the implementation of the project and the publication of its findings in accordance with research and publication ethics standards. Responsibility for project supervision was assigned to Assoc. Prof. Miriam Martinkovičová, chair of the UMB Ethics Commission. Data collection adhered to the principles of voluntary participation and informed consent.

B. Sample and Study Setting

The sample consisted of 427 young adults aged 18 to 30 years (Table I). Young people of this age represent the cohort that is currently entering the labour market and that will form the core of the workforce during the transition towards Industry 5.0, which makes them a relevant target group for the design of green HRM practices. Men (49.6%) and women (50.4%) were represented almost equally, and the youngest age group of 18 to 20 years was the largest (32.8%), followed by respondents aged 27 to 30 years (25.3%), 21 to 23 years (23.9%) and 24 to 26 years (18.0%). Almost half of the respondents had completed primary or secondary education (45.9%), while the shares of those with post-

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secondary or Bachelor's education (27.4%) and with Master's or doctoral education (26.7%) were similar. Students formed the majority of the sample (69.8%), 21.8% of respondents were employed and 6.6% self-employed, while nearly all respondents were of Slovak nationality (96.0%). The largest group of respondents lived in villages with fewer than 5,000 inhabitants (38.4%), followed by medium-sized towns (19.2%), small cities (19.0%) and small towns (16.2%), while 7.2% lived in large cities with 250,000 or more inhabitants. For the purposes of the analysis, respondents who were unemployed or on maternity or parental leave were included in the category "other", and the two smallest categories of municipalities were merged into the category of villages with fewer than 5,000 inhabitants. The predominance of students has to be taken into account when interpreting the results. Since the sample is one of convenience with a specific institutional composition, the results are interpreted as indicative trends within the studied group rather than as representative estimates for the entire population of young people in Slovakia.

TABLE DEMOGRAPHIC PROFILE OF RESPONDENTS (N = 427)

Characteristics	**n**	**%**
Gender		
Male	212	49.6
Female	215	50.4
Age		
18 – 20 years	140	32.8
21 – 23 years	102	23.9
24 – 26 years	77	18.0
27 – 30 years	108	25.3
Education		
Primary or secondary	196	45.9
Post-secondary or Bachelor's level	117	27.4
Master's or Doctoral level	114	26.7
Employment status		
Student	298	69.8
Employed	93	21.8
Self-employed	28	6.6
Other	8	1.8
Nationality		
Slovak	410	96.0
Ukrainian	8	1.8
Other	9	2.2
Place of residence		
Village (under 4 999 inhabitants)	164	38.4
Small town (5000 – 19 999)	69	16.2
Medium town (20 000 – 49 999)	82	19.2
Small city (50 000 – 249 999)	81	19.0
Large city (250 000 and more)	31	7.2

Source: Own processing (2026)

C. *Data Analysis*

The study is based on a quantitative descriptive analysis of questionnaire data. This approach was selected to provide empirical insight into the experience of climate change among young adults and its economic implications, and to apply the findings to HRM. At this stage of the research, descriptive analysis is a suitable tool for capturing the basic distributions of responses and comparing them, without aiming to test causal relationships. The data were processed using descriptive statistics, and the results are presented as absolute and relative frequencies in tables and a figure. The CCAS statements were analysed within the four dimensions of the original scale [9], and the economic decisions were described through the shares of

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respondents selecting the individual answers, main reasons for saving and areas of reduced spending. The hypotheses were evaluated on the basis of the response distributions. H1 is considered supported if "never" is the most frequent answer for all statements of both impairment dimensions, while all statements of behavioural engagement are most frequently answered "sometimes", "often" or "almost always". H2 is evaluated by comparing the frequency of everyday practices (Table V) with the numbers of respondents who make the three economic decisions, and H3 by comparing the frequency of economic and environmental main reasons for saving (Table VII). This analytical approach enables examination of both the experience of climate change among young people and its reflection in their everyday economic decisions.

IV. RESULTS

This section presents the findings of the questionnaire survey on the experience of climate change among young people in Slovakia and its reflection in their pro-environmental economic decisions. For clarity, the findings are presented in three complementary sections: i) the experience of climate change across the four dimensions of the CCAS; ii) pro-environmental economic decisions; and iii) motives for saving for green investments.

A. Experience of Climate Change among Young People

The four dimensions of climate change anxiety differed markedly in intensity. Answers indicating cognitive-emotional and functional impairment were concentrated at the lower end of the scale, behavioural engagement was reported frequently, and personal experience of climate change fell in between.

Cognitive-emotional impairment was relatively rare (Table II), as the most frequent answer for all eight statements was "never", reported by 42.4% to 83.8% of respondents. The most common manifestations were difficulty concentrating when thinking about climate change, which 19.4% of respondents experienced sometimes, 8.7% often and 0.9% almost always, and self-critical thoughts about not being able to handle climate change better (19.9% sometimes, 7.0% often and 1.6% almost always). Difficulty sleeping because of thinking about climate change was reported sometimes by 12.4% and often by 4.5% of respondents. More intense emotional reactions were uncommon, as 81.3% of respondents had never had nightmares about climate change and 83.8% had never cried because of it. Reflective coping was also limited, since 66.0% of respondents never went away by themselves to think about their feelings regarding climate change and 80.1% never wrote down and analysed their thoughts about it. These findings correspond to the view of Clayton [24], who stresses that climate anxiety mostly represents a rational response to a real threat rather than a pathological condition.

Functional impairment was also low (Table III), as between 61.1% and 78.3% of respondents stated that their concerns about climate change never interfered with their everyday functioning, and the share of "almost always" answers did not exceed 0.9% for any of the statements. Interference was somewhat more common in private life than at work or school. Problems balancing concerns about sustainability with the needs of the family were reported sometimes by 10.1% and often by 5.4% of respondents, difficulties in having fun with family or friends sometimes by 10.5%, and 10.8% of respondents stated that their friends sometimes said they think about climate change too much. In contrast, 78.3% of respondents had never felt that their concerns interfered with getting work or school assignments done, and 74.9% had never felt that they undermined their ability to work to their potential. Concerns about climate change therefore rarely affect the work or study performance of young people in the sample. This result differs from the findings of Hickman et al. [8], in which more than 45% of young people reported that their feelings about climate change negatively affected their daily life and functioning, although the two studies used different instruments.

Personal experience of climate change was considerably more widespread (Table IV). The most common experience was noticing a change caused by climate change in a place that is important to the respondent, which was reported sometimes by 19.7%, often by 16.2% and almost always by 8.6% of respondents. One fifth of respondents (20.2%) had sometimes been directly affected by climate change themselves and 11.9% often. Knowing someone who had been directly affected was reported often by 11.9% and almost always by 9.7% of respondents, which is the

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highest share of "almost always" answers among the first three dimensions. At the same time, between 35.4% and 45.4% of respondents had never had such experiences, which indicates that personal exposure to climate change varies considerably within the sample. This variability is relevant, since personal experience represents a separate dimension of the scale that captures exposure to climate change rather than emotional reactions to it [9]. Behavioural engagement was clearly the most pronounced dimension (Table V), and everyday habitual practices were almost universal: more than half of the respondents almost always turned off lights (56.4%) and a further 30.9% did so often, while 40.4% of respondents almost always and 37.5% often recycled. Trying to reduce behaviours that contribute to climate change was reported often by 34.0%, sometimes by 32.8% and almost always by 20.3% of respondents. Statements reflecting self-evaluation and perceived efficacy were endorsed somewhat less frequently. The belief that one can do something to help address the problem of climate change was held often by 29.5% and almost always by 18.3% of respondents, 23.7% often and 19.4% almost always wished they behaved more sustainably, and 24.6% often and 17.8% almost always felt guilty when wasting energy. The share of "never" answers in this dimension ranged from only 1.2% to 13.5%. This pattern aligns with Steg and Vlek [28], who point out that pro-environmental behaviour depends to a large extent on its costs and on the opportunities available. Overall, young people in the sample experience climate change mainly through engagement in everyday sustainable practices rather than through emotional or functional impairment. This does not mean that they are indifferent to climate change, since the scale captures the extent to which concerns impair a person's functioning rather than the level of concern as such. These results support hypothesis H1, as "never" was the most frequent answer for all statements on cognitive-emotional and functional impairment, whereas all statements on behavioural engagement were most frequently answered "sometimes", "often" or "almost always".

TABLE I COGNITIVE-EMOTIONAL IMPAIRMENT (N = 427, %)

Statement	Never	Rarely	Some-times	Often	Almost always
Thinking about climate change makes it difficult for me to concentrate.	42.4	28.6	19.4	8.7	0.9
Thinking about climate change makes it difficult for me to sleep.	59.0	23.2	12.4	4.5	0.9
I have nightmares about climate change.	81.3	11.5	3.7	2.3	1.2
I find myself crying because of climate change.	83.8	9.2	3.5	2.6	0.9
I think, "why can't I handle climate change better?"	44.3	27.2	19.9	7.0	1.6
I go away by myself and think about why I feel this way about climate change.	66.0	22.5	7.3	3.3	0.9
I write down my thoughts about climate change and analyze them.	80.1	12.2	5.2	2.1	0.4
I think, "why do I react to climate change this way?"	60.7	24.8	10.1	2.8	1.6

Source: Own processing (2026)

TABLE II FUNCTIONAL IMPAIRMENT (N = 427, %)

Statement	Never	Rarely	Some-times	Often	Almost always
My concerns about climate change make it hard for me to have fun with my family or friends.	61.9	23.9	10.5	2.8	0.9
I have problems balancing my concerns about sustainability with the needs of my family.	61.1	23.0	10.1	5.4	0.4
My concerns about climate change interfere with my ability to get work or school assignments done.	78.3	13.1	4.4	3.3	0.9

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My concerns about climate change undermine my ability to work to my potential.	74.9	16.9	5.2	2.6	0.4
My friends say I think about climate change too much.	70.3	13.1	10.8	4.9	0.9

Source: Own processing (2026)

TABLE III PERSONAL EXPERIENCE OF CLIMATE CHANGE (N = 427, %)

Statement	Never	Rarely	Some-times	Often	Almost always
I have been directly affected by climate change.	40.0	24.4	20.2	11.9	3.5
I know someone who has been directly affected by climate change.	45.4	17.8	15.2	11.9	9.7
I have noticed a change in a place that is important to me due to climate change.	35.4	20.1	19.7	16.2	8.6

Source: Own processing (2026)

TABLE IV BEHAVIOURAL ENGAGEMENT (N = 427, %)

Statement	Never	Rarely	Some-times	Often	Almost always
I wish I behaved more sustainably.	13.5	16.2	27.2	23.7	19.4
I recycle.	2.8	5.2	14.1	37.5	40.4
I turn off lights.	1.2	3.3	8.2	30.9	56.4
I try to reduce my behaviors that contribute to climate change.	5.2	7.7	32.8	34.0	20.3
I feel guilty if I waste energy.	8.9	17.6	31.1	24.6	17.8
I believe I can do something to help address the problem of climate change.	10.5	15.2	26.5	29.5	18.3

Source: Own processing (2026)

*B. **Pro-Environmental Economic Decisions***

The first economic decision examined was the willingness to pay extra for eco-friendly products and services, measured on a five-point scale from "definitely not" to "definitely yes" (Fig. 2). Of the 427 respondents, 42 would definitely and 143 probably be willing to pay more, 143 were neutral, and 74 would probably and 25 definitely not be willing to do so. The most frequent answers were "probably yes" and "neutral", each chosen by 143 respondents, whereas the extreme answers "definitely yes" (42) and "definitely not" (25) were the least frequent. Willingness to pay a premium for eco-friendly products and services is thus present in a substantial part of the sample, but a large group of young people remains undecided.

The second decision concerned limiting expenditures due to climate change, which was reported by 137 of the 427 respondents, while 290 do not limit their spending for this reason. The 137 respondents could indicate all areas that applied to them, so the percentages in Table VI sum to more than 100%. They most often limit spending on energy (115 respondents, 83.9%), transportation (99, 72.3%) and clothing (86, 62.8%), whereas food was mentioned less frequently (58, 42.3%). The most common areas, energy and transportation, are those in which reduced consumption also brings immediate financial savings for the household. From the perspective of HRM, energy and transportation are also areas that employers can directly influence, for example through commuting arrangements or energy use at the workplace.

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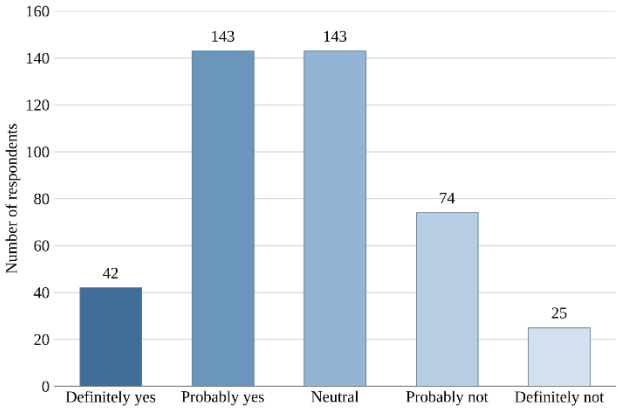


Fig. 2 Willingness to pay extra for eco-friendly products and services (n = 427).

Source: Own processing (2026)

TABLE V AREAS OF REDUCED SPENDING DUE TO CLIMATE CHANGE (N = 137)

Area of reduced spending	**n**	**%**
Transportation	99	72.3
Energy	115	83.9
Clothing	86	62.8
Food	58	42.3
Other	1	0.7

Source: Own processing (2026)

C. Motives for Saving for Green Investments

The third economic decision was saving money for planned eco-friendly investments in the future, such as solar panels, heat pumps or an own source of drinking water. This behaviour was reported by 168 respondents, while 259 do not save for this purpose. Respondents who save were asked to select one main reason, and their answers are presented in Table VII. The most frequent main reason was saving household financial resources (98 respondents, 58.3%), followed by the desire to become independent of public utility suppliers (52, 31.0%). Concern about climate change was the main reason for only 12 respondents (7.1%), and 6 respondents (3.6%) stated another reason. Economic motives thus clearly prevailed over concern about climate change, which supports hypothesis H3. This finding aligns with Balcombe et al. [30], who identified financial returns and energy independence as the key motivations for household investments in microgeneration technologies. For HRM, the dominance of economic motives indicates which types of incentives are likely to be effective in supporting the pro-environmental behaviour of young employees.

TABLE VI MAIN REASON FOR SAVING FOR ECO-FRIENDLY INVESTMENTS (N = 168)

Reason for savings	**n**	**%**
I want to be independent from public distributors	52	31.0
I want to save household financial resources	98	58.3
I am concerned about climate change	12	7.1
Other	6	3.6

Source: Own processing (2026)

Considering all three decisions together, the results support hypothesis H2, because low-cost everyday practices were widespread: more than half of the respondents almost always turned off lights (56.4%) and a further 30.9% did so often, while 40.4% almost always and 37.5% often recycled (Table V). In contrast, pro-environmental economic decisions requiring financial resources were made by a minority of young

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people, as saving for eco-friendly investments was reported by 168 and limiting expenditures due to climate change by 137 of the 427 respondents. Willingness to pay more for eco-friendly products and services was also limited, as only 42 respondents would definitely be willing to pay more, while 143 remained neutral (Fig. 2). Where respondents stated their main reason or the areas concerned, decisions bringing direct financial benefits to the household clearly prevailed.

V. DISCUSSION

The findings describe how young people in Slovakia experience climate change and how this experience is reflected in their pro-environmental economic decisions. The most distinct result is the dominance of behavioural engagement over cognitive-emotional and functional impairment, which supports H1. Young people in the sample thus engage in sustainable everyday practices without experiencing climate change as a significant source of emotional strain. This pattern is consistent with the findings of Stanley et al. [27], according to which eco-anxiety is related to lower wellbeing rather than to personal pro-environmental behaviour, and with Ojala [14], who links the environmental engagement of young people to constructive hope rather than to worry. It also corresponds to the "practical" form of eco-anxiety described by Pihkala [25], which leads people to seek ways of acting rather than paralysing them. As the international survey by Hickman et al. [8] did not include any country from Central and Eastern Europe, these findings also contribute evidence from a context that has so far been underrepresented in research on climate change anxiety. In the context of Industry 5.0, which combines human-centricity with sustainability [1], [15], this is a favourable starting point for organisations, as the prospective workforce brings a willingness to act sustainably without a strong burden of climate-related distress.

The pro-environmental behaviour of young people, however, is selective, which supports H2. Everyday habitual practices, such as turning off lights and recycling, were reported often or almost always by the large majority of respondents, whereas economic decisions requiring financial resources were reported by a minority, as 168 of the 427 respondents save for eco-friendly investments and 137 limit their expenditures due to climate change. Willingness to pay more for eco-friendly products and services was also far from universal, with 143 respondents remaining neutral. This pattern corresponds to the low-cost hypothesis of Diekmann and Preisendörfer [29], according to which environmental attitudes translate into behaviour mainly when the costs of the behaviour are low, and to the gap between intentions and actual behaviour in green consumption described by ElHaffar et al. [13].

The results on saving for eco-friendly investments support H3, since 98 of the 168 respondents who save stated saving household financial resources and 52 independence from public utility suppliers as their main reason, whereas concern about climate change was the main reason for only 12 of them. The areas in which respondents most often limit their expenditures, energy and transportation, point in the same direction. The pro-environmental economic decisions of young people thus follow an economic logic in which environmental benefits accompany rather than drive the decision. This is consistent with the low-cost hypothesis [29] as well as with the motivational structure identified by Balcombe et al. [30], and it suggests that organisations can build on the economic rationality of young people when promoting sustainability instead of regarding it as an obstacle.

From the HRM perspective, it is important that concerns about climate change interfere with private life more often than with work or study (Table III). Only a small share of respondents reported that their concerns affected their work or school assignments or their ability to work to their potential. For employers, this means that climate change anxiety does not represent a significant risk to the work performance of the prospective workforce, while their high level of behavioural engagement can be utilised in the workplace.

A. Implications for Green HRM

The findings can also be interpreted through the AMO framework, which forms the theoretical basis of green HRM [4], [20]. Young people in the sample already bring a considerable degree of motivation in the form of behavioural engagement and the ability to act sustainably in their everyday lives. The results, however, suggest that motivation-enhancing practices

should rely on tangible incentives rather than on appeals to environmental values, and that opportunity-enhancing practices, such as employee involvement, are needed to transfer the engagement of young people from their private lives into the workplace.

The findings suggest several opportunities for aligning green HRM practices with the motivational structure of young people: i) linking environmental goals with tangible benefits for employees, for example through support for sustainable mobility, such as contributions to public transport or cycling to work, or through programmes helping employees invest in energy efficiency and renewable energy in their households; ii) offering concrete and practical opportunities to act on environmental issues at work through green training and employee involvement [4], [6], since young people do not need to be persuaded about the importance of climate change; iii) addressing environmental topics openly in organisations, as concerns about climate change rarely interfere with work and do not represent a source of psychological strain for most young people; and iv) accompanying the environmental commitment communicated in green recruitment with practical benefits, since such commitment increases the attractiveness of employers to job seekers [21], [22], while the decisions of young people follow an economic logic.

These practices correspond to the human-centric approach of Industry 5.0, which places the needs of workers at the centre of industrial transformation [1], and to sustainable HRM, which extends the objectives of HRM beyond financial outcomes [18]. They also illustrate how HRM can act as a link between the technological transformation associated with Industry 4.0 and the human-centric and sustainable objectives of Industry 5.0 [16].

B. Limitations and Future Research

The questionnaire survey provided a broad picture of the experience of climate change and the economic decisions of young people in Slovakia. The study, however, has several limitations, as the data were collected through an online questionnaire and are based on self-reported behaviour, which may be overestimated due to social desirability. Students formed the majority of the sample, so the results have to be generalised with caution. In addition, the hypotheses were evaluated on the basis of descriptive statistics without inferential testing, and the analysis does not examine the relationships between the dimensions of climate change anxiety and economic decisions or the differences between groups of respondents, such as students and employed young people. The survey also covered only three types of economic decisions and only the main reason for saving. Future research would benefit from analysing these relationships and group differences, from comparing young people in Slovakia with their peers in other European countries and from longitudinal designs capturing how the pro-environmental economic decisions of young people change after their entry into the labour market.

VI. CONCLUSIONS

The examination of the experience of climate change and the pro-environmental economic decisions of young people in Slovakia revealed that young people experience climate change mainly through engagement in everyday practices rather than through anxiety, and that their pro-environmental economic decisions follow primarily an economic logic. Based on an online survey of 427 young adults aged 18 to 30 years, the analysis demonstrated that cognitive-emotional and functional impairment due to climate change are rare, whereas sustainable everyday practices such as turning off lights and recycling are widespread, which supports H1. Economic decisions requiring financial resources, namely saving for eco-friendly investments and limiting expenditures due to climate change, were made by a minority of respondents, which supports H2, and saving was motivated primarily by economic reasons, which supports H3.

In the context of Industry 5.0, which shifts the focus of enterprise transformation towards human-centricity and sustainability, HRM connects the values of employees with the environmental goals of organisations. The findings indicate that the pro-environmental behaviour of the prospective workforce represents a resource that organisations can develop, provided that environmental goals are linked with tangible benefits for employees. Organisations should therefore prioritise green reward and benefit systems, practical opportunities for environmental engagement at work and green recruitment that combines

environmental commitment with practical benefits. While focused on Slovakia, the findings may provide insights for green HRM in other Central and Eastern European countries, where the economic conditions of young people differ from those in Western Europe. The research demonstrates that bridging the gap between the individual pro-environmental values of employees and organisational environmental goals requires an approach that respects both the values and the economic rationality of the future workforce, in line with the human-centric vision of Industry 5.0 [1].

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