

# ECO ANXIETY REPORT TÜRKİYE

2023



# Table of Contents

1. Note from IRIS Sustainable Development.....	3
2. Climate change impacts in Türkiye.....	4
3. Survey Results.....	6
4. Key Conclusions.....	16
5. References.....	17

## Note from Iris Sustainable Development

Anxiety relating to a multitude of ecological crises, or eco-anxiety, is a subject of growing research significance. The main idea of the first report series is to establish an international overview of eco-anxiety rates in 20 countries utilizing the HEAS scale and correlate these rates with variables of geographical location (urban, rural), education as well as the type of experiencing climate crisis (indirectly via the media or public discourse).

More precisely, the main objectives of this report series is to:

- create an international overview of eco-anxiety rates in 20 countries
- contribute to the growing body of knowledge around to what extent the climate crisis affects mental health identifying possible differentiation on eco-anxiety determinants
- raise awareness on the impact of climate crisis on mental health

The target group of the Turkish national report are citizens of Türkiye and/or people (ages 18-50) that are/have been experiencing climate change in the country.

# Climate change impacts in Türkiye

Türkiye is situated between the subtropical zone and temperate zone. The climate zones observed in Türkiye are the Mediterranean Climate where summers are hot and dry and the winters are mild and rainy; the Black Sea Climate where summers are cool and winters are warm in the coastal area and snowy and cold at the higher parts; the Terrestrial Climate where temperature differences between summer and winter and day and night are large, and the Marmara Climate showing the characteristics of a climate transition between the Terrestrial, Black Sea and Mediterranean climates. Türkiye receives most of its rainfall in winter and spring. In summer, the amount of precipitation decreases while the temperature and evaporation increases. Annual long-term mean precipitation is 574 mm. Meanwhile, the number of meteorological extreme events has increased particularly since 2000 (World Bank, 2023).

## Greenhouse gas emissions

Türkiye emitted 524 Mt of GHG in 2020, (Turkish Statistical Institute, 2022) which is higher than would be sustainable under a global carbon budget (Dalman, 2020) as well as per-person gross emissions were above the world average at 6.3 t in 2020 (Turkish Statistical Institute, 2022). More precisely, Türkiye's cumulative CO<sub>2</sub> emissions are estimated at around 11 Gt, which is less than 1% of the world's cumulative total which is more surprising while considering that Türkiye's population is about 1% of world population (Ritchie & Roser, 2020) According to the G20 Climate Risk Atlas, Türkiye will experience devastating climate impacts if it follows a high-emissions pathway. Without urgent action, Turkey will see a 37% increase in the frequency of agricultural drought by 2050. Heatwaves will last 4242% longer and the combination of sea level rise, coastal erosion and fiercer weather will cause chaos for Turkey's economy, which stands to lose around 2.26% of GDP by 2050 (CMCC, 2023)

## Extreme weather events

Türkiye is experiencing a range of climate change impacts, including rising temperatures, more frequent and severe heatwaves, increased droughts, and water scarcity issues. As an impact of climate change has been reported the catastrophic flooding struck in Şanlıurfa and Adıyaman Provinces in the south of Türkiye on 15 March 2023, causing fatalities and damage in communities still recovering from the earthquakes of February 2023.

## Climate change impacts in Türkiye

In the crossroads of Asia and Europe, Türkiye has woven a complex tapestry of climate stories over the past decade, showcasing a diverse range of extreme weather events against the backdrop of its rich landscapes. From wildfires scorching mountainous terrains to urban floods reshaping cityscapes, the nation grapples with the tangible impacts of climate change on its historical cities and pristine natural expanses.

One of the most dramatic chapters in Türkiye's recent climate narrative unfolded in 2019 when the country faced a series of wildfires, particularly in regions like Antalya and Muğla. Fueled by high temperatures, dry conditions, and strong winds, the fires swept through forests, rural areas, and even encroached upon urban fringes. The events prompted widespread concern and underscored the increasing risks of wildfires exacerbated by climate change in the Mediterranean region.

Conversely, Türkiye has also experienced intense rainfall events, leading to flash floods and landslides. In 2015, the Black Sea region, including cities like Artvin and Rize, faced devastating floods as heavy rains triggered landslides and inundated towns. The event highlighted the vulnerability of certain regions to changing precipitation patterns and prompted discussions about adaptive strategies to manage flood risks.

Türkiye, a nation with a diverse climate, faced unusual heatwaves in 2020, with temperatures exceeding 40 degrees Celsius (104 degrees Fahrenheit) in cities like Batman and Mardin. The extreme heat not only strained energy infrastructure and posed health risks but also prompted discussions about the resilience of urban areas to rising temperatures.

The country's iconic landscapes, such as the Cappadocia region, have experienced shifts in weather patterns, including reduced snowfall in winter. The delicate balance between preserving cultural heritage and adapting to changing climates becomes a central theme as Türkiye grapples with evolving winter landscapes.

The urban landscapes, including Istanbul, have faced challenges posed by extreme weather events. In 2017, heavy rainfall led to flash floods in parts of the city, impacting transportation and prompting discussions about the vulnerability of urban areas to changing precipitation patterns.

## Survey results

### LOCATION



Urban Area



Rural Area



### EDUCATION

Elementary School Degree  0%

High School's Degree  20%

Bachelor's Degree  60%

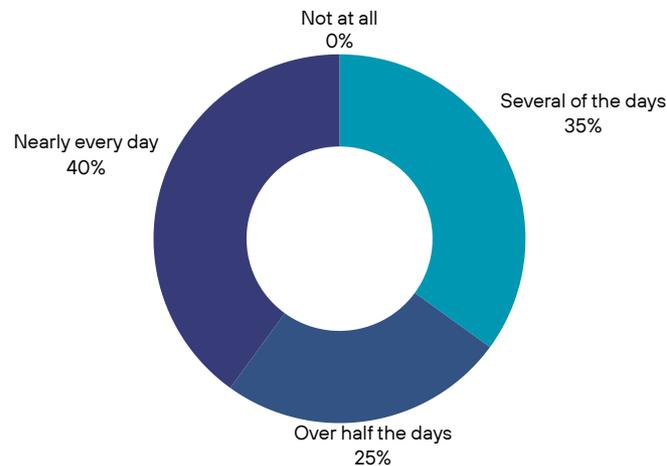
Master's Degree or higher  20%

## Survey results: The Hogg Scale

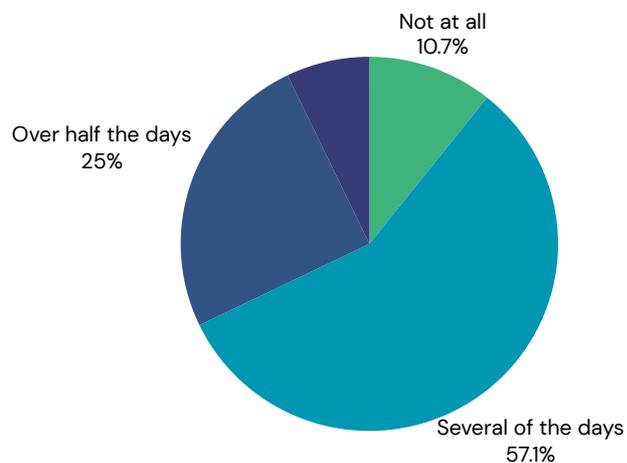
*“Over the last 2 weeks, how often have you been bothered by the following problems, when thinking about climate change and other global environmental conditions (e.g., global warming, ecological degradation, resource depletion, species extinction, ozone hole, pollution of the oceans, deforestation)?*

*Response scale: 0 = not at all, 1 = several of the days, 2 = over half the days, 3 = nearly every day.*

### Feeling nervous, anxious or on edge



### Not being able to stop or control worrying

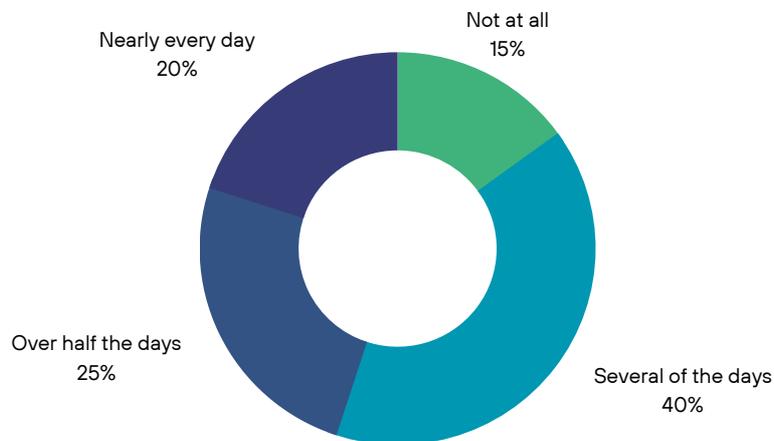


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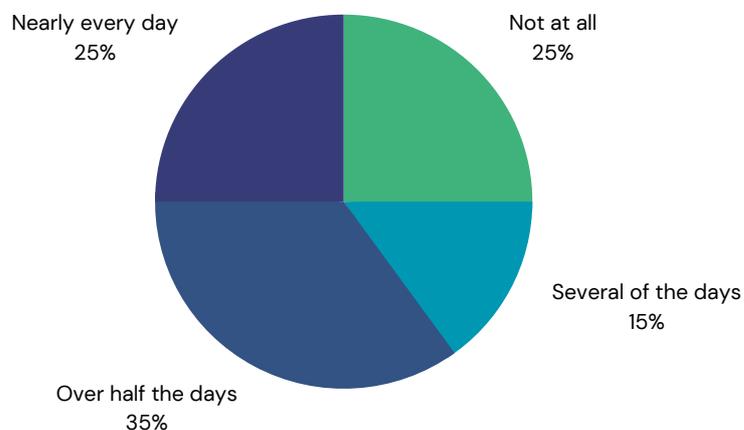
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### Worrying too much



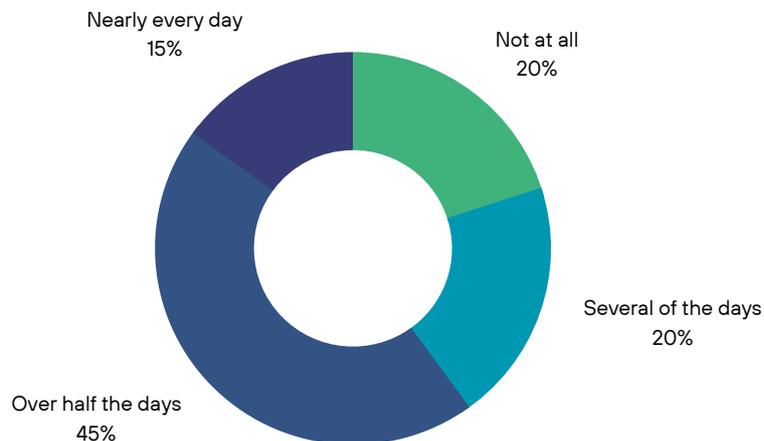
### Feeling afraid



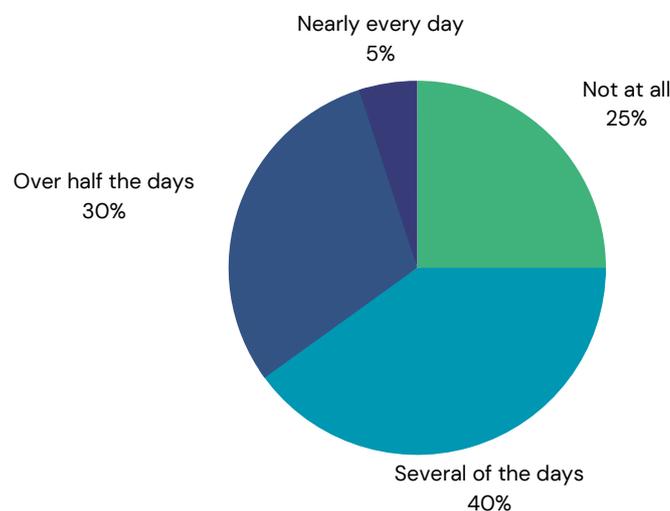
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### Unable to stop thinking about future climate change and other global environmental problems



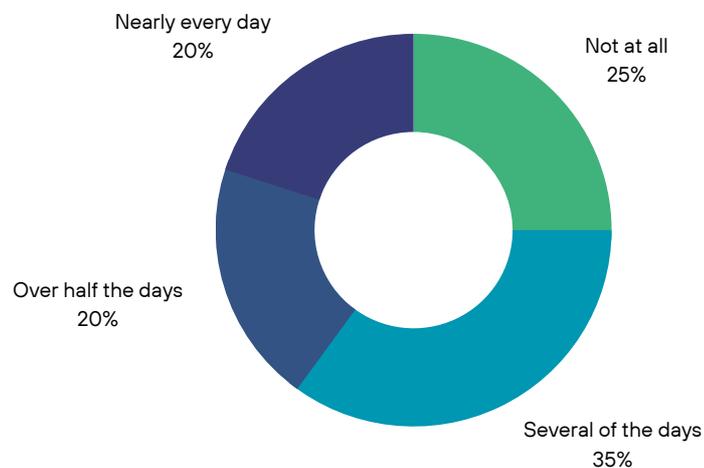
### Unable to stop thinking about past events related to climate change



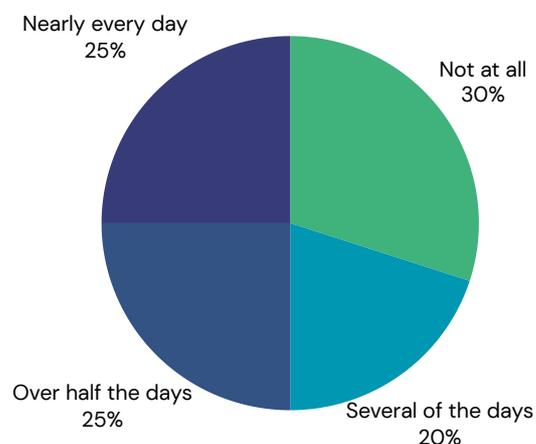
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### Unable to stop thinking about losses to the environment



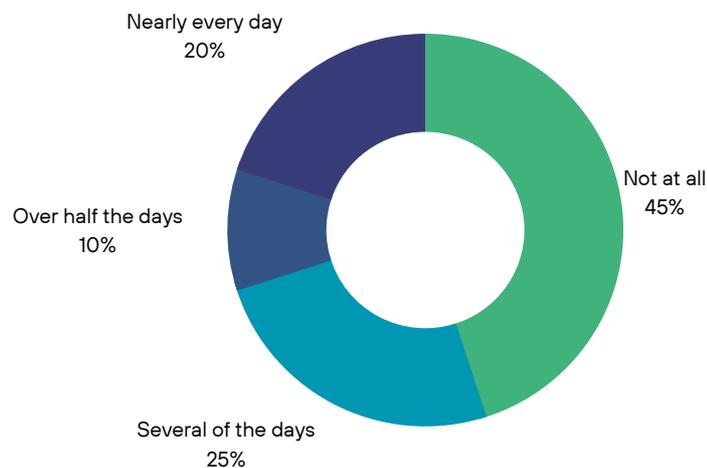
### Difficulty sleeping



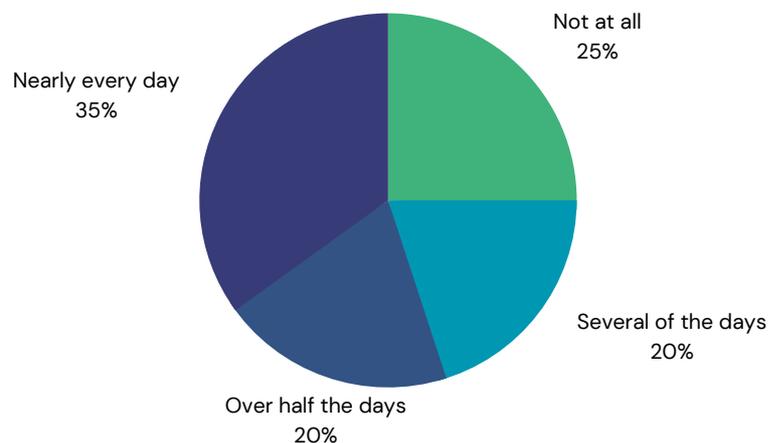
## Survey results: The Hogg Scale

*“Over the last 2 weeks, how often have you been bothered by the following problems, when thinking about climate change and other global environmental conditions (e.g., global warming, ecological degradation, resource depletion, species extinction, ozone hole, pollution of the oceans, deforestation)?”*

### Difficulty enjoying social situations with family and friends



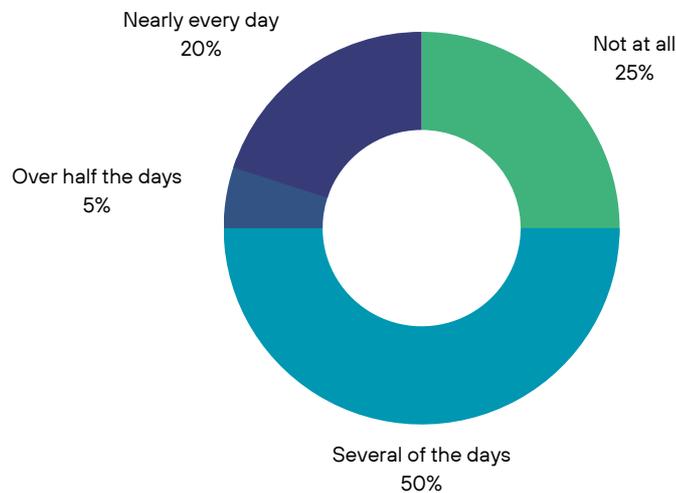
### Difficulty working and/or studying



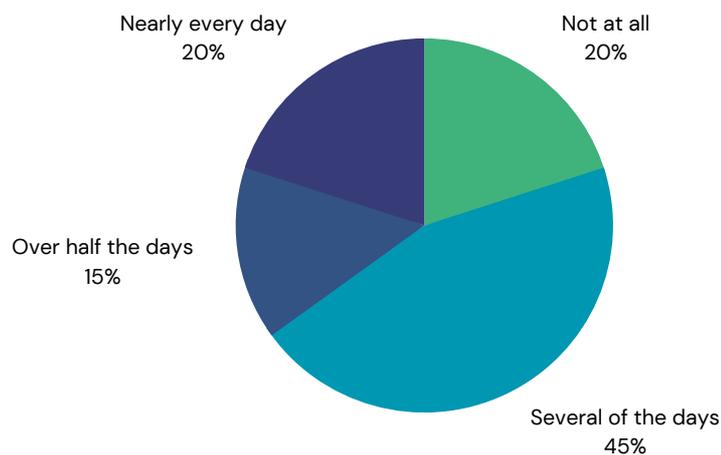
## Survey results: The Hogg Scale

*“Over the last 2 weeks, how often have you been bothered by the following problems, when thinking about climate change and other global environmental conditions (e.g., global warming, ecological degradation, resource depletion, species extinction, ozone hole, pollution of the oceans, deforestation)?”*

Feeling anxious about the impact of your personal behaviours on the earth



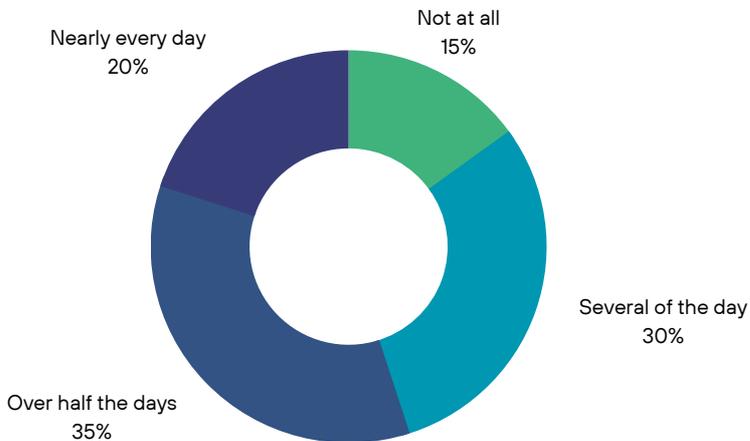
Feeling anxious about your personal responsibility to help address environmental problems



# Survey results: The Hogg Scale and Beliefs about climate change

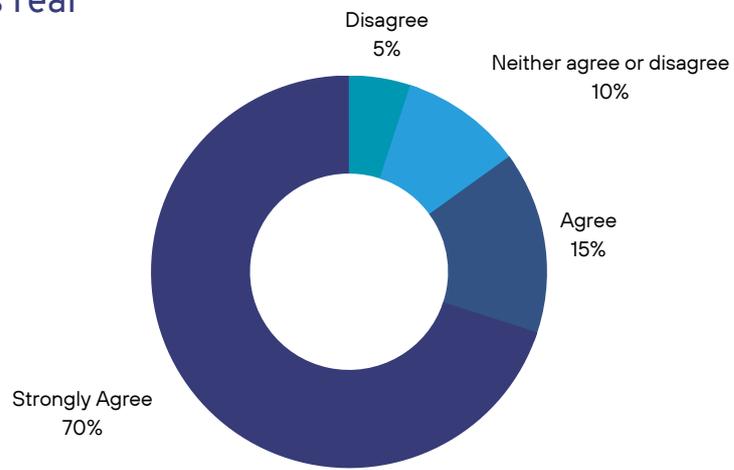
*“Over the last 2 weeks, how often have you been bothered by the following problems, when thinking about climate change and other global environmental conditions (e.g., global warming, ecological degradation, resource depletion, species extinction, ozone hole, pollution of the oceans, deforestation)?”*

Feeling anxious that your personal behaviours will do little to help fix the problem



## Beliefs about Climate Change

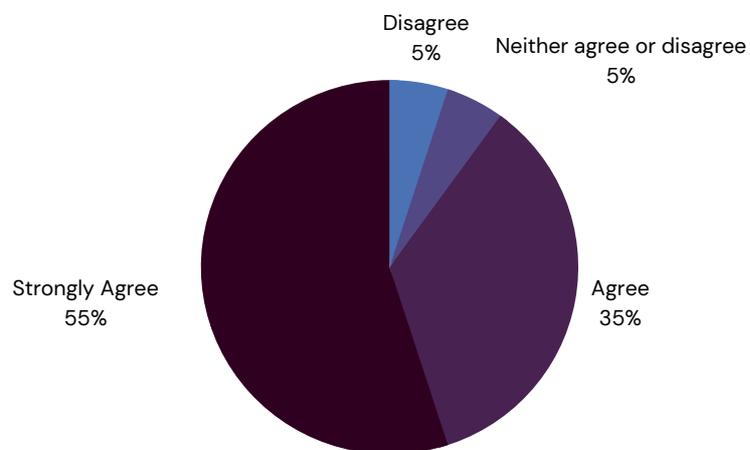
Climate change is real



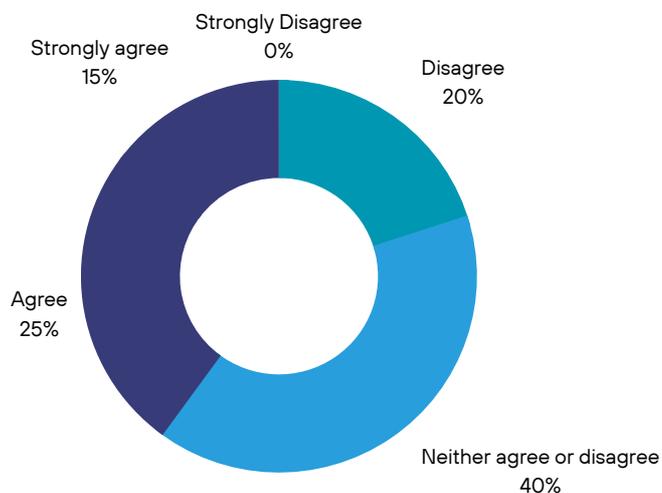
# Survey results: Beliefs about climate change

## Beliefs about Climate Change

### Climate change is caused by humans

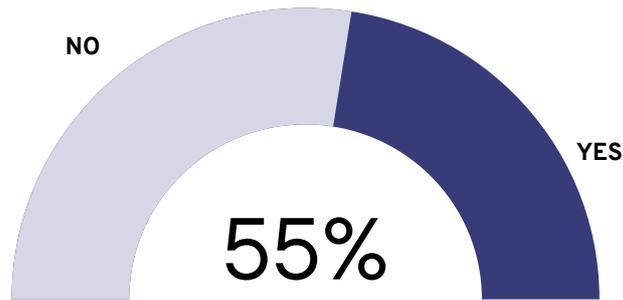


### Climate change is reversible



## Survey results: Beliefs about climate change

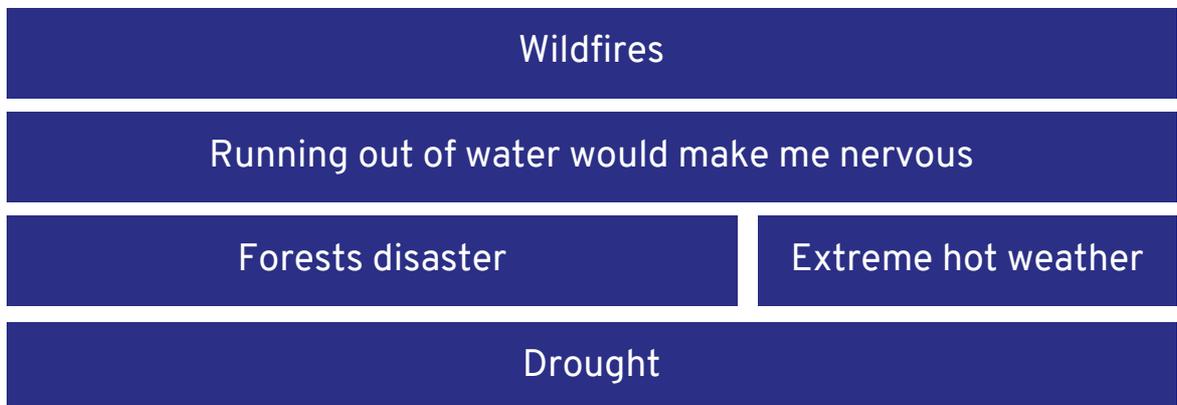
Do you have direct experience of environmental crisis?



I am experiencing climate crisis indirectly via the media or public discourse



Which climate disaster made you feel nervous (in your country or globally), if any



## Key Conclusions

Our research reveals a notable prevalence of eco-anxiety among the Turkish population, reporting varying degrees of eco-anxiety. This underscores the significance of the issue and the need for further investigation and intervention.

In terms of the interplay between eco-anxiety and specific variables, significant differences in eco-anxiety rates were observed across various demographics. Notably, the geographical location of participants was strongly linked with eco-anxiety. It is important that the 95% of the respondents are urban residents and they are exhibited higher levels of eco-anxiety compared to their rural counterparts. Additionally, while a slight interconnection with education was observed, we address that eco-anxiety can be experienced via media and public discourse, since the 75% has expressed that is experiencing eco-anxiety indirectly indicating that the media and information consumption play a substantial role in shaping eco-anxiety levels since participants who reported frequent exposure to alarming environmental news or content experienced higher levels of eco-anxiety. Simultaneously, the study found a strong interplay between eco-anxiety and heightened concerns about environmental issues. Respondents who expressed high levels of eco-anxiety consistently cited factors and events such as wildfires, floodings, and droughts as major sources of distress.

The findings of this research underscore the urgency for policymakers to address eco-anxiety as a public health concern. Developing sustainable environmental policies, educational campaigns, and psychological support services can help mitigate eco-anxiety and its associated mental health issues. This study provides a foundation for future research on eco-anxiety. However, further investigations into the long-term consequences of eco-anxiety, the effectiveness of interventions, and potential policy changes are essential for a comprehensive understanding of this emerging issue.

In conclusion, our research highlights the significant eco-anxiety rates in Türkiye and the need for multidisciplinary efforts to address this concern. Addressing eco-anxiety is not only crucial for the mental well-being of individuals but also for the sustainable future.

## References

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Disclaimer:

This report provides an intention of the eco-anxiety rates in the country and cannot be generalised since the survey is not responded by a representative sample comparing to the country's population.

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