




# **MENTAL HEALTH AND THE ENVIRONMENT**

Bringing nature back into  
people's lives



Institute for  
European  
Environmental  
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**ISGlobal**



## **HOW CAN EUROPEAN POLICIES AND THE COVID-19 RECOVERY EFFORTS BETTER REFLECT THE IMPACT OF THE NATURAL ENVIRONMENT ON PEOPLE'S MENTAL HEALTH?**

Access to nature can have immensely positive effects on people's mental health, according to a growing body of evidence. Likewise, environmental degradation, including climate change and pollution, poses a serious threat to our emotional state and well-being.

On the basis of a background paper by the Institute for European Environmental Policy (IEEP) and the Barcelona Institute for Global Health (ISGlobal), this briefing provides decision-makers with recommendations for how to reflect the links between mental health and the state of the natural environment in policies, particularly in the context of the COVID-19 crisis.





**84+ million**

of EU citizens suffer from mental disorders like anxiety and depression

**84,000**

deaths in the EU were attributed to mental illness or suicide in 2015

**€600 billion**

is lost annually due to poor mental health across EU Member-States. That's 4% of the EU's GDP

Source: OECD/EU 2018

## ACCESS TO NATURE

Spending time in nature helps reduce anxiety, depression, and loneliness, while a lack of green space is associated with increased symptoms (Maas et al., cited in Ganzleben and Marnane 2020).



## CLIMATE-RELATED DISASTERS

The consequences of climate change and related adverse weather events can have a profound impact on mental health (Berry et al 2010). Up to three quarters of people affected by floods have experienced mental health problems, and older people, in particular, experience higher severe levels of stress (Menne and Murray, cited in Ganzleben and Marnane 2020).



**KEY  
FIND**

## AIR POLLUTION

Scientific evidence shows an emerging association between certain air pollutants and a range of mental health outcomes including depression, anxiety, psychosis, dementia, childhood cognitive development (King 2018).





## CHEMICAL POLLUTION

There is a positive association between environmental chemicals and child behaviour disorders (Philippat et al 2017).



## NOISE POLLUTION

High levels of environmental noise are associated with mental health symptoms such as anxiety, stress, nervousness, nausea, headache, emotional instability, argumentativeness, sexual impotence, changes in mood, increase in social conflicts, neurosis, hysteria, psychosis (Goines and Hagler 2007), and suicide (King 2018).



## INEQUALITIES

Living in areas with green spaces significantly reduces income-related health inequalities, counteracting the effect of deprivation (Mitchell and Popham, cited in Ganzleben and Marnane 2020), but minorities and people living in deprived communities are less likely to have access to such spaces (ten Brink et al 2017).

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AT THE  
FOREFRONT

## NATURE CONSERVATION FOR CLEAN AIR

Due to its location in a basin, the German city of Stuttgart suffers from poor air quality and is expected to experience increased average and extreme temperatures because of climate change. In response, the municipality adopted a strategy to use vegetation to alter the cities microclimate, change airflows and improve the cities air quality.

In 2008, a strategy was developed to prevent new developments on slopes surrounding the city. In addition, a climate atlas was developed which mapped urban climatic elements, such as local climate, the distribution of air temperature, airflows, and air pollution concentrations for the city.

Additional benefits from the project include noise abatement, providing space for recreation, aesthetics, and employment (Schweitzer J-P et al 2016).



## TOWARDS RESILIENCE A KEY CHALLENGE FOR EUROPE

The **ongoing COVID-19 crisis** and its socio-economic implications will have significant consequences and only increase the already profound human and economic costs of mental health for years to come. The pandemic's impact on mental health is already evident across Europe today.

The coronavirus pandemic has led to increased calls for Europe to strengthen its economic, health, social, and ecological resilience.

Given the evidence on nature's influence on wellbeing, addressing environmental degradation can be a win-win solution for

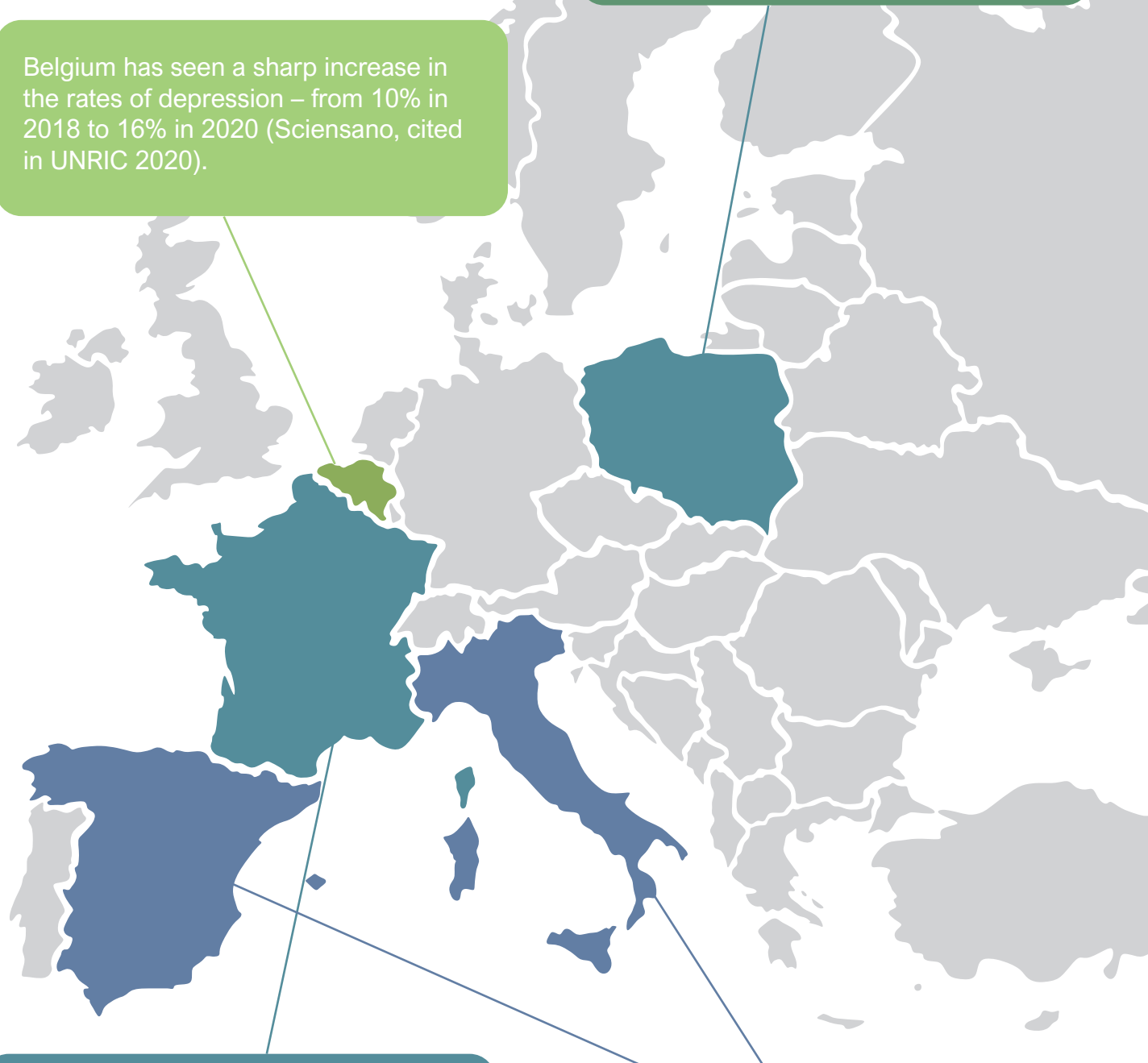
improving mental health and aiding the COVID-19 economic recovery, not least because as much as half of global GDP rests on ecosystem services (World Economic Forum 2020).

Adopting the 'Planetary Health' concept, which recognises the interlinkages between various Sustainable Development Goals, would be a major step in the right direction.

# COVID-19 AND MENTAL HEALTH

Around 60% of respondents to a survey in Poland have experienced increased general anxiety as a result of the pandemic that has affected their daily functioning (Dragan 2020).

Belgium has seen a sharp increase in the rates of depression – from 10% in 2018 to 16% in 2020 (Sciensano, cited in UNRIC 2020).



In France, 18% of teleworkers showed symptoms of severe anxiety, depression, and other mental disorders (UNRIC 2020).

Parents in Italy and Spain are reporting that their children have difficulties concentrating, in addition to showing irritability, restlessness and nervousness (WHO 2020).



Protected areas have been estimated to provide mental health benefits worth **EUR 5.55 trillion** globally (Buckley et al 2019).



Covering the investment needs of the Natura 2000 network of protected areas could create up to **half a million additional jobs** (ten Brink et al 2016).



**Natural capital investment**, including restoration of carbon-rich habitats and climate friendly agriculture, is recognised to be among the five most important fiscal recovery policies, offering high economic multipliers (World Economic Forum 2020).



**CITIES AT THE FOREFRONT**

## PRESCRIBING NATURE

An upcoming Horizon 2020 project by ISGlobal will explore the potential of nature-based solutions as an alternative to pharmaceutical prescriptions. RECETAS will test a novel intervention – nature-based social prescribing – that focuses on using existing green infrastructure, like parks, rooftops, and gardens, to promote social cohesion and address loneliness and health-related quality of life. One of its main goals will be to connect vulnerable populations with the broader community.

Select participants in six cities – Barcelona, Helsinki, Marseille, Prague, Melbourne (Australia) and Cuenca (Ecuador) – will be ‘prescribed’ activities such as walking in parks, running community gardens, and redeeming vouchers at farmers’ markets. The interventions will be rigorously evaluated, including with the use of randomised controlled trials and cost effectiveness studies, to measure impact. The project is expected to run from 2021 to 2026.





# A UNIQUE WINDOW OF OPPORTUNITY FOR EUROPE

According to a recent public opinion survey, around two-thirds of Europeans (69%) want the EU to have more competences to deal with crises such as the coronavirus pandemic (European Parliament 2020).

There is a risk that a misguided response to the growing mental health crisis in Europe could lead to an overreliance on medication rather than prevention, an issue flagged by the Mental Health Europe coalition in a recent report (Rodzinka et al 2019).

As our mental health is suffering, so are our ecosystems. According to the latest 'State of nature in the EU' report, urbanisation, forestry, and pollution are among the main pressures responsible for the drastic decline in Europe's biodiversity, threatening the survival of thousands of animal species and habitats. Most protected habitats and species are not in good conservation status and much more needs to be done to reverse the situation (EEA 2020).

The new EU Biodiversity Strategy for 2030 aims at establishing a larger EU-wide network of protected areas on land and at sea, implementing an EU Nature Restoration Plan as well as Urban Greening Plans. However, according to the European Commission, there is currently a funding gap of at least €20 billion a year and many member states are failing to implement the current strategy.

The implementation of the Green Deal as well as the new competencies of the EU on health provide a unique opportunity to put the links between mental health and the environment higher on the political agenda.

Some of the opportunities include:

The recently approved EU Biodiversity Strategy for 2030

The proposal for the 8th Environment Action Programme

The upcoming EU4Health programme

The forthcoming zero-pollution action plan expected in 2021

A potential successor to the WHO Mental Health Action Plan 2013-2020

Follow through on the 2019 European Council conclusions on the economy of well-being

The right to health is enshrined in Article 35 of the EU Charter of Fundamental Rights and European citizens have a right to live in a healthy environment and according to the Arrhenius Convention, European citizens have a right to live in a healthy environment.

The upcoming EU4Health programme, worth €9,4 billion, includes focus on “strengthening health systems through health promotion and disease prevention”, addressing the “burden from non-communicable diseases, in particular (...) mental health”, and

“growing health burden from environmental degradation and pollution, in particular air, water and soil quality, and from demographic changes”.

Much, however, remains to be done. The EU member states spend on average only 3% of their health budgets on prevention (European Commission 2019) and there is clear evidence that this spending was negatively affected by the previous economic crisis of 2007-2008 (Gmeinder et al 2017).



# KEY POLICY RECOMMENDATIONS

This policy briefing builds on a background paper produced by IEEP and ISGLOBAL looking at the impact of environmental degradation on people's mental health and well-being.

<https://bit.ly/mheieep>



Develop a **dedicated EU mental health and well-being strategy**, with a strong focus on environmental determinants and on prevention, as well as earmark investments for such measures within the EU4Health programme.

Ensure **mainstreaming of health and well-being** considerations in the implementation of the European Green Deal, in particular through encouraging nature-based solutions in local adaptation strategies and urban greening plans, and starting with an analysis of health co-benefits as part of forthcoming impact assessments linked with the EU's restoration plan.



Address the **funding gap for implementing the EU Biodiversity Strategy** for 2030, for instance by ensuring at EU level that adequate cohesion funding, including through the European Regional Development Fund, is allocated to biodiversity protection and ecosystem restoration projects, and that nature-based solutions are promoted within the Recovery and Resilience Facility guidelines for Member States.

Integrate **resilience indicators**, which consider inter-linkages between mental health and the environment, into the European Semester, the forthcoming 8th Environment Action Programme, and the future communication on the “economy of well-being”.



As part of Europe's forthcoming zero-pollution action plan, **ensure that those furthest behind benefit the most**, by prioritising investments which increase access to nature and reduce exposure to pollution in low-income and marginalised communities throughout Europe.



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## **DISCLAIMER**

The arguments expressed in this report are solely those of the authors, and do not reflect the opinion of any other party.

## **THE BRIEFING SHOULD BE CITED AS FOLLOWS**

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# ISGlobal

The Barcelona Institute for Global Health, ISGlobal, is the fruit of an innovative alliance between the "la Caixa" Foundation and academic and government institutions to contribute to the efforts undertaken by the international community to address the challenges in global health.

The Institute for European Environmental Policy (IEEP) is a sustainability think tank with offices in Brussels and London. As a not-for-profit research organisation with over 40 years of experience, we are committed to advancing evidence-based and impact-driven sustainability policy across the EU and the world.



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