



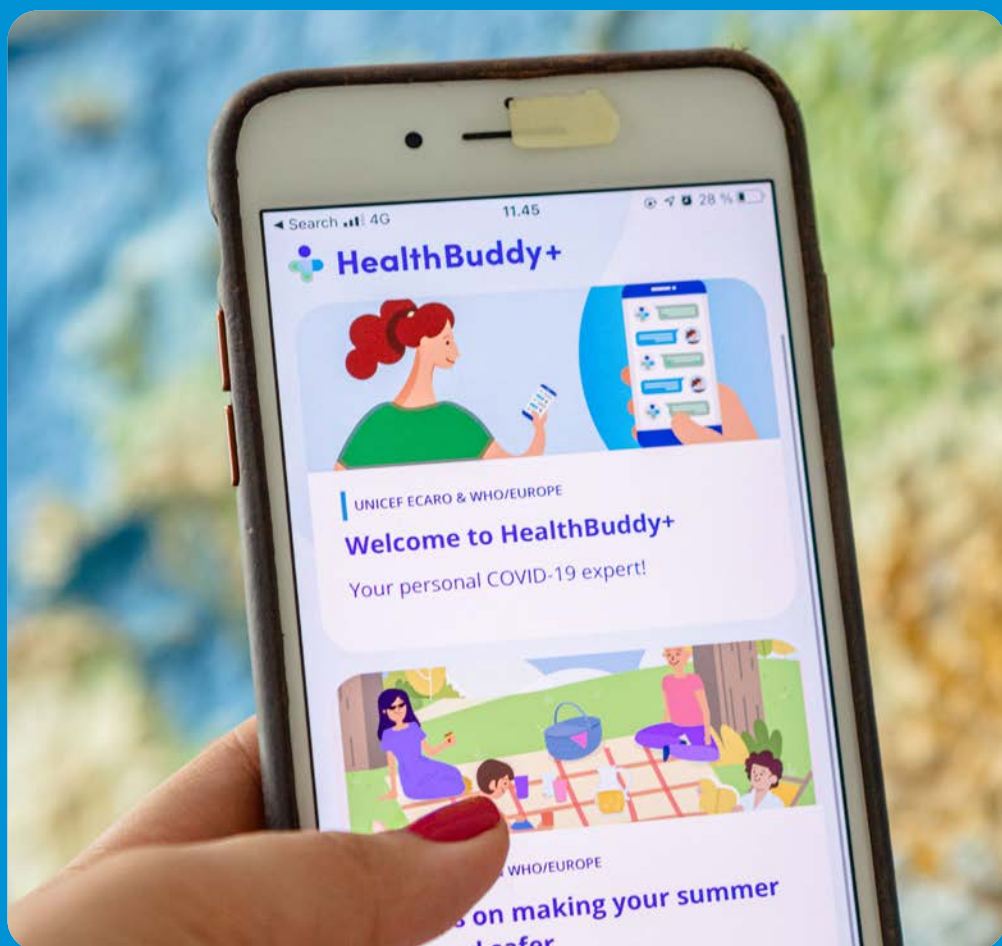
World Health  
Organization

REGIONAL OFFICE FOR **Europe**

Synthesis Report

# Digital solutions to health risks raised by the COVID-19 infodemic

Policy brief



# Executive summary

The COVID-19 pandemic has been accompanied by feelings of uncertainty, worry and fear, which nourished a lack of trust towards health authorities, scientific communities and mass media, enhanced by false information spread on the Internet (1). This phenomenon associated with the pandemic has been called an information epidemic or "infodemic" and defined as "an overabundance of information including false or misleading information in digital and physical environments during a disease outbreak" (2).

Due to the spread of false and misleading health-related content, the COVID-19 outbreak response has in some cases become less timely and effective, negatively impacting the livelihoods and emotional well-being of populations (3). The exposure to false information – both online and offline – has been linked to increased health risks (4), having harmful or even deadly effects (5). Examples of negative behaviours include use of wrong or harmful treatments, lower uptake of protective measures including vaccinations (6), impaired mental health and emotional well-being (7), and lower trust in health-care providers (8).

In this scenario, the WHO Regional Office for Europe sought to answer the question of how digital solutions can be used to address the infodemic. A rapid review of the evidence revealed that digital solutions that aim to leverage technological innovations are best positioned to respond to the infodemic.

It is important to emphasize that online and offline environments are intertwined and the underlying factors of the COVID-19 infodemic are not purely digital, but they are rooted in complex historical and sociocultural contexts. Therefore, approaching the infodemic through digital interventions alone may not be sufficient. The below-illustrated digital solutions need to be combined with already tested offline approaches to outbreak response. Risk communication and community engagement interventions are one of the main examples of best practices to be dovetailed with digital perspectives (9).

The identified digital interventions designed to tackle infodemics include:

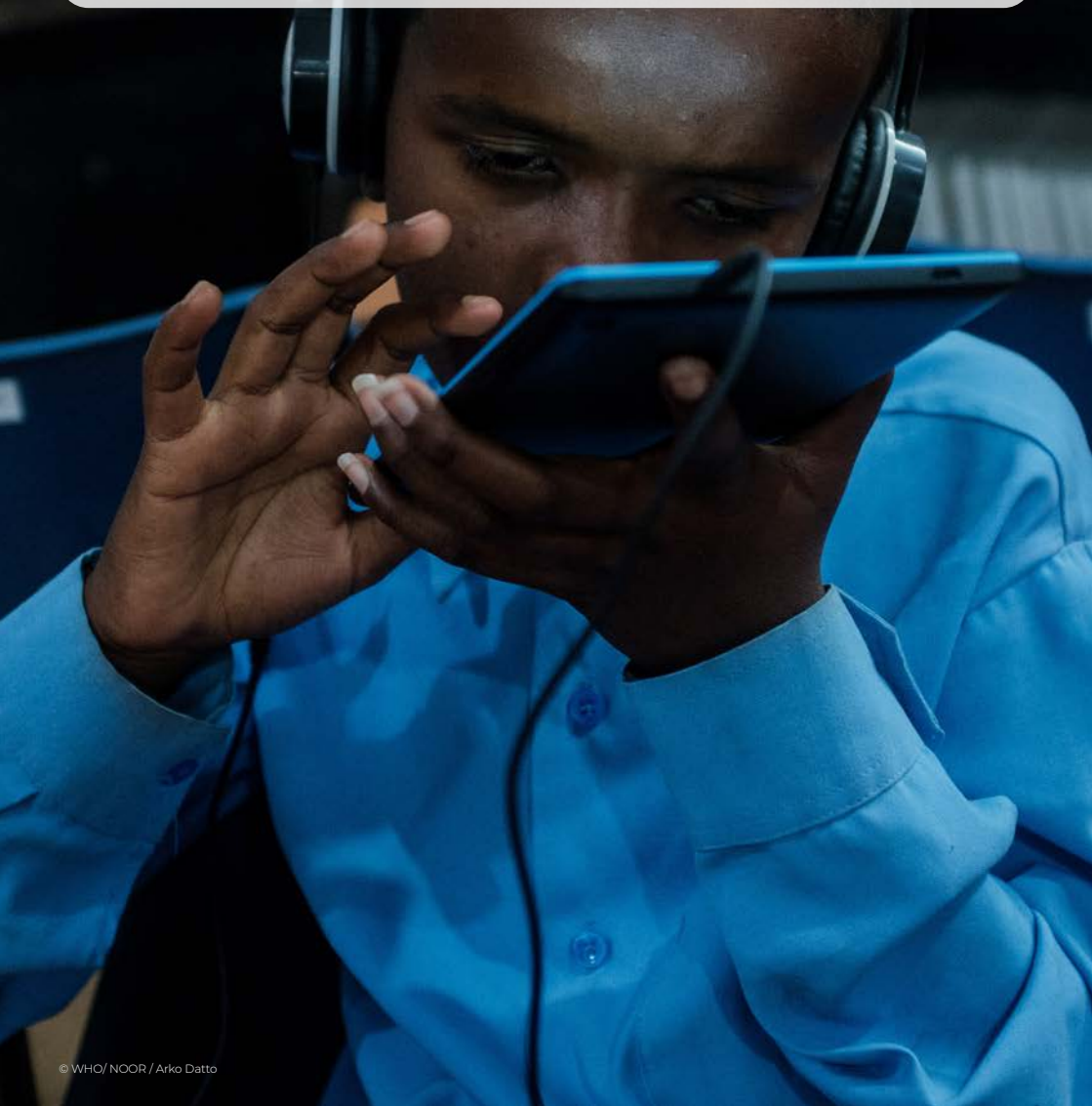
- implementing fact-checking (10) and false information reporting mechanisms (11);
- adopting social listening tools augmented by artificial intelligence, which can help analyse the large-scale fast-flowing data, assess risks and identify infodemic signals (12);
- creating monitoring programmes (13), multi-stakeholders' coordination initiatives (14) and national regulatory frameworks which respect the principles of freedom of expression (15);
- promoting digital health literacy (16) and inoculation interventions that improve people's ability to spot misinformation (17).

Adopting these digital solutions calls for a whole-of-society approach to infodemic response. National health authorities, journalists, fact-checkers, civil society organizations, empowered citizens and other relevant parties all play an important role in building trust and tackling the spread of harmful health-related information (18).



## What WHO is doing to address the infodemic in the European Region and globally

- Digital communication strategies for infodemic management
- Mobile apps disseminating accurate health information
- AI-based innovations for rumour tracking, community feedback and social listening
- Training, events and conferences to promote infodemic management
- Behavioural insights surveys, better rumour tracking mechanisms, multi-language fact-checking
- Partnering with social media and web companies



# Policy considerations

This policy brief highlights the need for specific improvements and developments that call upon stakeholders in the European Region to cooperate in infodemic management. To this end, the Regional Office highlights the six policy considerations described here below.

**1. Reinforcing multistakeholder networks for infodemic management.**

Infodemic management networks can contribute to building bi-directional trust between people and institutions, through the amplification of positive health messages by trusted influencers.

**2. Strengthening overall risk communication and community engagement.**

RCCE is a public health intervention essential to emergency response and critical to risk management. Political and financial commitment are vital to develop RCCE capacity at the level needed to support infodemic response.

**3. Implementing continuous monitoring of online harmful and false content.**

Member States can create a process for routinely examining infodemic signals (information voids, overabundant or false information, and rumours) in the main social media channels and other digital and online forums in their country.

**4. Improving digital literacy approaches and organizing infodemic management trainings.**

Infodemics can be prevented or mitigated by redesigning, enhancing and organizing initiatives to improve digital health literacy, critical thinking and infodemic management, with the purpose of increasing resilience to false information.

**5. Advocating for infodemic management through communication campaigns.**

Social mobilization can help empower citizens and engage them to contribute to building a safer online public sphere, for example by flagging and reporting false information.

**6. Ensuring safe online platforms, which protect people from harmful content.**

Infodemic management may involve policy changes that nudge digital platforms to stop the spread of misinformation through regional or national regulatory frameworks which promote transparency and external oversight of data and algorithms, with the aim of ensuring users' safety, health and well-being, while respecting freedom of expression.



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# Conclusions

The implementation of the digital solutions and policy considerations above calls for a whole-of-society approach with the collaboration of all stakeholders involved in infodemic management, ranging from users themselves to social media platforms, the information technology sector, health policy-makers, and fact-checking and civil society organizations, among others – with a shared objective of improving the Region's public health response to the COVID-19 infodemic and enhancing preparedness for future health emergencies. It also contributes to the European Programme of Work 2020–2025 – “United Action for Better Health in Europe”, and the call to action in World Health Assembly Resolution 73.1 for WHO and its Member States to address the proliferation of disinformation and misinformation.

Although this policy brief focuses on digital solutions to infodemics, it also underscores the importance of complementing online approaches with offline measures. This is especially true for further implementation and improvement of already known and tested risk communication and community engagement best practices.

World Health Organization  
Regional Office for Europe  
UN City, Marmorvej 51,  
DK-2100 Copenhagen Ø,  
Denmark

TEL +45 45 33 70 00  
FAX +45 45 33 70 01  
EMAIL [eurocontact@who.int](mailto:eurocontact@who.int)  
WEB [www.euro.who.int](http://www.euro.who.int)

