Foreword

The COVID-19 pandemic demonstrated that infectious diseases could have far-reaching social and economic consequences. Today, a much older and a more silent pandemic is threatening the effectiveness of the many medical advances made in the 20th century. Antimicrobial resistance (AMR) – the ability of microbes to resist antimicrobial agents – is among the most pressing public health challenges facing the global community.

Tackling AMR demands urgent attention and co-ordinated action. It has been eight years since 194 countries endorsed the Global Action Plan on AMR. Since then, OECD, EU/EEA and G20 countries have made important strides in developing and implementing their own action plans on AMR. The One Health framework – a multi-sectoral approach that promotes co-ordinated action across human and animal health, agrifood systems and the environment – has underpinned these efforts. But more needs to be done.

This report follows on from the 2018 OECD report *Stemming the Superbug Tide: Just a Few Dollars More* to produce new evidence covering all the key One Health sectors. National data and evidence gathered from OECD, EU/EEA and G20 countries were fed to the OECD Strategic Public Health Planning for AMR microsimulation model and to machine learning tools to gauge the unacceptably high health and economic cost of inaction.

The report shows that today, one in five bacterial infections are resistant to antibiotic treatment in OECD countries. Resistant infections claim the lives of around 79 000 people every year across OECD and EU/EEA countries. Healthcare acquired resistant infections account for more than 60% of AMR-related deaths. The report also considers the impact of the COVID-19 pandemic. It shows that the COVID-19 pandemic severely disrupted the implementation of policies that aim to optimise antimicrobial use in humans. At the same time, it placed a spotlight on infection prevention and control policies. The report underscores that investments in line with the One Health framework offer a cost-effective means to limit the harmful effects of AMR, with stewardship programmes to optimise the use of antimicrobials in humans and better environmental and hand-hygiene practices in healthcare facilities identified as the most effective actions.

The global response to the COVID-19 pandemic is a silver lining. The pandemic highlighted that the health of humans is closely connected to the health of animals and the environment. The time to strengthen efforts to tackle the AMR pandemic is now.

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