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A chance to implement One Health in the Middle East and north Africa

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Since 2016, November 3, has been One Health day, aimed at deepening comprehension of the holistic nature and necessity of a transdisciplinary approach to solving problems of global health.[1] Over the 3 years in which One Health day has been celebrated internationally, the lowest number of educational and awareness-raising events were registered by participants from the Middle East and north Africa, with only two events in Turkey (2016 and 2018) and one in Qatar (2017).[1] The term One Health was invented in 2003, to describe the interconnectedness of health of the ecosystem, animal, and human.[2] Today, with the financial and political backing of international organisations such as the World Organisation for Animal Health, Food and Agriculture Organization of the UN, WHO, UN, and World Bank, One Health is transforming from an interdisciplinary collaboration to global health governance. Other concepts, such as eco health, planetary health, future earth, and future health, although different all refer to a similar policy, encouraging different audiences to reach a global consensus on health.[2] Epidemic intelligence and the ability to identify an outbreak early can provide a crucial advantage in the eradication of infectious diseases, prompting response to prevent epidemics and the implementation of biological countermeasures.[3] In 1851, when the World Health Assembly, WHO, and the International Health Regulations (IHR) were not yet established, after epidemics of cholera, plague, and yellow fever, the first International Sanitary Conference was held. 14 conferences and many years later, WHO was established.[4] The aims of the International Sanitary Conference were legislation, enforcement of the reporting of the status of contagious diseases, and encouragement of international cooperation in controlling infectious diseases. The concerns of the 19th century are still concerns of today, giving rise to an urgent need to deal with these issues.[4] Although the IHR came into effect in June, 2007, in practice, at that time there was little incentive to allow external investigation of a country's progress in dealing with epidemics. After the establishment of the Joint External Evaluation (JEE), political will increased and integrated logistical support for the Global Health Security was provided by national institutes and agencies, international organisations, and donors, resulting in more than 40 countries allowing external evaluation of their One Health infrastructure within 3 years.[5] The effects of the IHR JEE on the evaluation of One Health performance in the Middle East and north Africa, with the participation of 14 countries, revealed that more than 90% had an established surveillance system; however, only half had the capacity to monitor one to four zoonotic diseases. More than 80% of the countries had fundamental problems with the national stewardship plan for antimicrobial resistance.[6] The effects of non-human epidemics are not limited to zoonotic diseases; the economic effect of mass depopulation and biodiversity loss ignites social inequity and unrest because of the complexity of social determinants of health. Additionally, financial instability will result from focusing solely on the human sector, at the cost of the animal kingdom and ecosystem. The political, economic, and societal consequences of epidemics of animal and zoonotic diseases (including, but not limited to, Middle East respiratory syndrome coronavirus, highly pathogenic avian influenza, and foot-and-mouth disease) in the Middle East and north Africa over the past decade indicates that it is time to direct more attention to the animal kingdom and the environment. The implementation of any policy and practice under the One Health and planetary health umbrellas will guarantee sustained success.[2,7]

If we look at the status of the countries of the Middle East and north Africa in controlling the outbreaks of animal and zoonotic diseases, as well as overcoming environmental challenges such as environmental damage, air pollution, drought and scarce fresh water, and a paucity of arable land, the most important initial step should be the establishment of a governing body to oversee an integrated One Health surveillance system for the early detection of threats at the animal–human–ecosystems interfaces.[3,6] The challenges of the implementation of such a system should be carefully investigated. It might be that the experience of a public–private partnership such as the Middle East Consortium on Infectious Disease Surveillance (MECIDS) in a region,

which has a history of decades of challenges, could be extended to other countries in the Middle East and north Africa.[8,9] The most serious challenge is developing the political will to support not just the establishment of an integrated surveillance system, but also intersectoral partnerships to help prevent and control diseases.[3,5] Considering decades of conflict, war, and unrest, the main question remains whether leaders in the Middle East and north Africa are willing to collaborate to implement the One Health surveillance system.

The Seventh World Health Summit Regional Meeting to be held in Iran offers an exceptional opportunity to promote One Health and planetary health in the region. Topics such as health in uncertain situations, non-communicable diseases and mental health, global health in a transitional world, planetary health, and medical education are all emerging fields that stakeholders and decision makers from all around the globe can produce an operational plan for achieving their goals. Without a doubt, this will only be possible with the support of domestic policy makers and upstream policies.

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