

Dr Tedros Adhanom Ghebreyesus Director General World Health Organisation Avenue Appia 20 1211 Geneva Switzerland	Dr Zhang Qi Co-ordinator of Traditional and Complementary Medicine Unit (TCM) Department of Service Delivery and Safety World Health Organisation Avenue Appia 20 1211 Geneva Switzerland
---	--

7 April 2020

Dear Dr Tedros Adhanom Ghebreyesus and Dr Zhang Qi

Covid-19: Health risks and wildlife¹ markets – the need for a permanent global ban on wildlife markets and a highly precautionary approach to wildlife trade.

The undersigned organisations acknowledge and commend the World Health Organisation’s current efforts to contain the pandemic spread of the coronavirus disease (COVID-19).

On the occasion of World Health Day, in the midst of a global pandemic believed to have originated in a live wildlife market, we call upon the WHO to publicly and unequivocally state the proven link between these markets and serious threats to human health. In line with its stated mission to serve public health at all times, we urge the WHO to recommend that governments worldwide permanently ban live wildlife markets and the use of wildlife in traditional medicine. This decisive action, well within the WHO’s mandate, would be an impactful first step in adopting a highly precautionary approach to wildlife trade that poses a risk to human health.

While a robust global response is critical in detecting, treating and reducing transmission, it is equally necessary to take vital measures to prevent similar emerging infectious diseases developing into pandemics with the associated threats to human life, and social and economic well-being.

The COVID-19 outbreak is believed to have originated at wildlife markets in China, and transmitted to humans as a result of close proximity between wildlife and people.² Further research suggests that bats and pangolins may have been involved in the transmission of the virus to people³. But let us stress that it was the actions of people that created the environment in which this transmission was possible.

This is not the first time that infectious diseases have been linked to wild animals in recent years. Between 2002 and 2003, Severe Acute Respiratory Syndrome (SARS), inflicted by a coronavirus which is also believed to have emerged from wildlife markets in China, resulted in more than 8,000 human cases across 29 countries, and 774 deaths⁴. Failure to enforce permanent bans on all wildlife markets then allowed for a similar, but more severe, disease to emerge. Other significant zoonotic diseases, the transmission of which has been associated with wildlife, include Ebola, MERS, HIV, bovine tuberculosis, rabies, and leptospirosis.⁵

¹ In this document the term ‘wildlife’ refers to fauna in the wild or bred in captivity.

² Shereen, M.A., Khan, S., Kazmi, A., Bashir, N. and Siddique, R., 2020. COVID-19 infection: origin, transmission, and characteristics of human coronaviruses. Journal of Advanced Research.

³ Andersen, G.A., Rambaut, A., Lipkin, W.I. et al. The proximal origin of SARS-CoV-2. Nat Med (2020)

⁴ World Health Organisation. Summary of probable SARS cases with onset of illness from 1 November 2002 to 31 July 2003. https://www.who.int/csr/sars/country/table2004_04_21/en/

Zoonotic diseases are responsible for over two billion cases of human illness and over two million human deaths each year.⁵ How many of these cases directly or indirectly originate from wildlife is hard to calculate, due to overlapping reservoirs in livestock and wild animal populations. However, considering the significance of wildlife as a reservoir of emerging infectious diseases, wildlife origins of zoonoses must be of primary concern. Sixty percent (60%) of emerging infectious diseases are zoonotic and 70% of these are thought to originate from wildlife.⁶

The risk of zoonotic disease transmission is heightened further by the unregulated and unhygienic conditions associated with wildlife markets, where close proximity between humans and animals provide the perfect opportunity for pathogens to spread. This risk is further exacerbated by the conditions in which animals are typically farmed or collected from the wild, transported to and held at such markets, which inevitably result in large numbers of animals of different species being held in crowded conditions in close proximity, causing immense stress and weakening their immune systems. Such conditions, coupled with close proximity to people at wildlife markets, provide the ideal situation for pathogens to replicate, spread, and potentially infect people.

Pangolins, which are considered likely by some researchers to be involved in the transmission of COVID-19, are commonly used as ingredients for Traditional Medicine, as are many other wildlife species such as turtles, leopards, tigers, lions and bears, with bear bile injections being officially recommended as a treatment for COVID-19.⁷ These animals are either farmed or poached from the wild to supply the demand - a practice that is entirely unnecessary given the viable plant- or non-wildlife based alternatives recognized by Traditional Medicine. Risk of disease transmission is prevalent across all aspects of wildlife trade, which supplies products to the traditional medicine industry. For example, bovine tuberculosis has been documented among wild and captive-bred lions, posing a substantial risk of zoonosis to consumers and people involved in the lion bone trade, particularly those who work in breeding farms, slaughter and processing facilities in South Africa. Reptiles such as snakes and geckos, which are also used in Traditional Medicine, are frequent sources of Salmonellosis infections in people.⁸

While Traditional Medicine is a recognized medicinal system in many countries and cultures, and can play an important health role, the vast majority of ingredients are plant or mineral based, with hundreds of recognized alternatives to ingredients derived from wildlife. The trade in wildlife and parts and products derived from them for Traditional Medicine is unnecessary and indefensible, as it poses a risk to global health. Studies have highlighted that over 80% of Traditional Medicine consumers would consider herbal or synthetic alternatives to wild animal products.^{9,10} In China, academics recognized that a ban on wildlife consumption is not enough to protect public health from wildlife-associated diseases. They called on the government to support transitioning the wildlife farming industry away from the production of Traditional Medicine.¹¹

⁵ Grace, D., Mutua, F., Ochungo, P., et al. Mapping of poverty and likely zoonoses hotspots. Zoonoses Project 4. Report to the UK Department for International Development. 2012

⁶ Jones, K.E., Patel, N.G., et al. Global trends in emerging infectious diseases. *Nature*. 2008

⁷ Office of the Chinese Medicine Bureau, General Office of the Health and Health Commission. Notice on Issuing a New Coronary Virus Pneumonia Diagnosis and Treatment Plan (Trial Version 7). issued March 03 2020. Available as PDF on http://www.gov.cn/zhengce/zhengceku/2020-03/04/content_5486705.htm

⁸ Mermin, J., Hutwagner, L., Vugia, D., et al. Reptiles, Amphibians, and Human Salmonella Infection: A Population-Based, Case-Control Study. *Clinical Infectious Diseases* 38 (Supp 3). 2004

⁹ World Animal Protection. Cruel Cures – The industry behind bear bile production and how to end it. 2020

¹⁰ Moorhouse, T.P., Coals, P.G.R., D’Cruze, N., Macdonald, D.W. Reduce or redirect? Which social marketing interventions could influence demand for traditional medicines? *Biological Conservation* 242.2020

¹¹ Wang, H., Shao, J., Chuai, Z., et al. Wildlife consumption ban is insufficient. *Science*. Vol 367, Issue 6485. 2020

Any policies and practices that sustain the wildlife trade carry a huge and unpredictable public health risk that could lead to future outbreaks and pandemics of zoonotic diseases among human populations.

The impact of COVID-19 in terms of loss of human life, physical and mental health, the global economy, livelihoods and the quality of public life has been utterly devastating and cannot be underestimated. At the time of writing, COVID-19 has led to 783,360 confirmed cases and 37,203 deaths across 206 countries. According to calculations by the UN and others, the COVID-19 pandemic could cost the global economy between US\$1 - 2.7 trillion and is triggering a global recession forcing states to introduce costly stimulus packages.^{12,13} The costs to the international community of fighting a global pandemic are vastly higher than the costs of preventing it in the first place, including eliminating live wildlife markets and funding the coordinated global response needed to bring an end to the wildlife trade.

In conclusion, the demand for wildlife and wildlife products is a primary cause of the emergence and spread of zoonotic diseases and a severe risk to global health. We call on the World Health Organisation to recognise that it has a significant role to play to mitigate such global health risks.

We therefore strongly urge the World Health Organisation to:

- Recommend to governments worldwide that they institute a permanent ban on live wildlife markets, drawing an unequivocal link between these markets and their proven threats to human health.
- Recommend to governments that they address the potential risks to human health from the trade in wildlife - including collection from the wild, ranching, farming, transport, and trade through physical or online markets for any purpose – and act to close down or limit such trade in order to mitigate those risks.
- Unequivocally exclude the use of wildlife, including from captive bred specimens, in the WHO's definition and endorsement of Traditional Medicine and revise WHO's 2014-2023 Traditional Medicine Strategy accordingly to reflect this change.
- Assist governments and lead a coordinated response among the World Trade Organisation, OIE and other multilateral organisations worldwide in awareness-raising activities to clearly inform of the risks of wildlife trade to public health, social cohesion, economic stability, law and order, and individual health.
- Support and encourage initiatives that deliver alternative sources of protein to subsistence consumers of wild animals, in order to further reduce the risk to human health.

We welcome your consideration of this important matter and stand ready to assist.

Yours sincerely

¹² United Nations Conference on Trade and Development. Coronavirus: Can policymakers avert a trillion-dollar crisis? 9 March 2020: <https://unctad.org/en/pages/newsdetails.aspx?OriginalVersionID=2300>

¹³ Bloomberg. Coronavirus Could Cost the Global Economy \$2.7 Trillion. 6 March 2020: <https://www.bloomberg.com/graphics/2020-coronavirus-pandemic-global-economic-risk/>