

Strategies to Prevent (STOP) Spillover

Efficient wildlife carcasses disposal through the development of guidelines, training, reporting and the use of biosafety practices in Côte d'Ivoire



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Background

Côte d'Ivoire, with its 255 protected areas covering 22% of its land, represents a significant reservoir of biodiversity. Zoonotic disease outbreaks of various origins have been frequently associated with interactions with the handling of live and dead wildlife for consumption and other human needs. These interactions constitute a risk for zoonotic diseases spillover. As a result, there is a need to assess and monitor the risk related to the interactions, establish multisectoral surveillance targeting wildlife population as well as communities and actors involved. Multisectoral surveillance could be active (event-based) or passive (indicator-based). Further, these interactions require interventions to manage and communicate the related risk to humans, wildlife and the environment. The risk could be managed through biosecurity and biosafety education and practices while appropriate community engagement is needed to build awareness and behavior change.



Figure 1. Map of Côte d'Ivoire showing the District des Montagnes which bordering Liberia and Guinea

STOP Spillover, a project funded by USAID, aims to support countries to identify, assess, and monitor zoonotic virus risks and design interventions at high-risk interfaces to mitigate risk of spillover. To strengthen the animal sector in mitigating risk of spillover at high-risk interfaces, STOP Spillover in Côte d'Ivoire (CDI), in collaboration with the government is working at the wild meat value chain interface to:

- Assess the risk of zoonotic disease stemming from anthropogenic activities,
- Establish multisectoral surveillance for early detection of outbreaks,
- Develop protocols for carcass disposal and reporting,
- Develop training materials on carcass disposal methods,
- Train government personnel in wildlife carcass disposal methods,
- Engage communities in reporting and disposing of wildlife carcasses.

Methods

Development of Guidelines of wildlife Carcass Management

Under the authority of the National One Health Platform, we convened two workshops with experts from the Veterinary Services Directorate, Wildlife Management Directorate, researchers and stakeholders from various sectors of Côte d'Ivoire to develop the guidelines for wildlife carcass management.

Training for Safe wildlife carcass disposal methods

Experts from STOP Spillover adapted existing domestic animal carcass disposal methods training manual to develop wildlife carcass management manual that take into account the guidelines developed for wildlife carcass management.

Engagement of communities in reporting and disposing of wildlife carcasses

In order to communicate risk and change behavior related to wildlife humans interactions, we held community engagement sessions to which the residents, elders and leaders of opinion were convened with support from local government experts.



Figure 2. Guidelines validation session



Figure 3. Field demonstration on composting



Figure 4. Community engagement session

Results

Guidelines of wildlife Carcass Management

While the wildlife disposal methods are similar to those used for domestic animals, we developed specific decision-criteria for wildlife carcass management (Figure 1):

- More than one dead wildlife in a location;
- Carcass of primates and bats;
- Carcass with zoonotic disease symptoms;
- Carcass about 30 meters of a water source;
- Case of mass mortality of any cause.

Train government personnel

We trained 15 government personnel from the 13 departments of the District des Montagnes in safe wildlife carcass disposal methods in September 2023 and 24 in 2024. We further provided Personal Protective Equipment (PPE) to participants (Figure 2).

Engage communities

In collaboration with the local government, we engaged in 2023, the community of Gbêpleu to sensitize the population on the danger for consuming and the importance and procedures for reporting dead wildlife found in the wilderness (Figure 3). A dozen more communities were engaged in 2024.

We observed a heightened understanding of the importance of safe wildlife carcass management and the related health and environmental risks. positive change. We further learned about human consumption of dead wildlife killed by eating crops treated with pesticides. Further, dead wildlife often are injected into the wildlife value-chain.

Conclusions

The community's commitment represents a significant shift in attitudes towards wildlife carcass consumption and demonstrates the effect of community-focused interventions. Moving forward, continued collaboration between stakeholders, ongoing education, and the implementation of evidence-based strategies will be crucial in achieving sustainable solutions to the complex challenges posed by the spillover of zoonotic diseases and wildlife carcass disposal.

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