

## Behavioural risk characterization for emerging zoonotic disease threats in high-risk communities

### *Profil du risque comportemental pour les nouvelles menaces zoonotiques dans les communautés à risque*

Mulembakani P<sup>1</sup>, Jean de Dieu Kamenga<sup>2</sup>, Tshimanga Erby Obel, Saleh<sup>3</sup>, Okitolonda E<sup>3</sup>, Karen Saylors<sup>1</sup>, Ashley Lucas<sup>1</sup>, Makuwa M<sup>1</sup>, Muyembe JJT<sup>4</sup>  
pmbala@metabiota.com

#### Summary

**Introduction.** Building on surveillance activities to date, the PREDICT-2 project is focusing surveillance in locations where environments and market systems are changing in ways that are conducive to the spillover of viruses from wild and/or domestic animals to people. From August 2015 to May 2016, the PREDICT-2 team conducted a Pilot behavioural study on selected sites according to ecological and epidemiological conditions associated with a high risk for zoonotic disease emergence.

**Objective.** To conduct ethnographic interviews and focus group discussions and to analyze the data obtained in order to prepare for more in-depth behavioural risk characterization surveillance activities and prepare mitigation solutions for spill over of zoonotic pathogens from animals to humans.

**Methods.** This Pilot study was conducted in three provinces: Kinshasa Sanctuary Lola ya Bonobo and Kinshasa Markets (Central, Liberte, Cinquantenaire, Makazu, Ndolo and Bumbu), Kongo Central Province (Kinzaumuete, Lukula, Mangala and Inga), Mai-Ndombe Province (Inongo and Ngon'Iyembe). A total of 169 persons were interviewed, including 100 ethnographic interviews and 9 Focus group discussions. The interviews were conducted in local language (Lingala) and audio-recorded, then transcribed in French for analysis. The analysis was performed using Dedoose™ Program V6.1.18 (2015).

**Results and conclusion.** The experience and the preliminary results of the Pilot study will help us improve surveillance of circulating pathogens within the human population in close contact with wild and/or domestic animals and better understand the importance of human behaviours and practices which could increase the risk of spillover of zoonotic viruses.

1 Metabiota, DRC

2 5<sup>th</sup> Direction, Ministry of Health

3 Kinshasa School of Public Health

4 Institut National de Recherche Biomedicale