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## Identification and regulation of highly hazardous pesticides in Nepal

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Intentional pesticide poisoning is a major clinical and public health problem in agricultural communities in low- and middle-income countries like Nepal. Pesticide self-poisoning kills around 150,000 people every year. Deaths from pesticide self-poisoning is preventable and requires the involvement of multiple stakeholder and multi-level. Early identification of pesticide involved, improved poisoning recording and reporting for better medical treatment and removing the most toxic pesticides from agriculture use will prevent deaths due to pesticide self-poisoning. In Nepal, the second most common mode of suicide is poisoning of which more than 90% cases are due to pesticides. In 2017-2019, Centre for Pesticide Suicide Prevention at the University of Edinburgh together with the Nepali partners carried out a study of pesticides responsible for poisonings. Data were collected from ten referral hospitals and the Nepal's two forensic toxicology laboratories, Central Police Forensic Science Laboratory (CPFSL) and the National Forensic Science Laboratory (NFSL), which identifies the individual pesticide compounds. With the help of the study, the Plant Quarantine and Pesticide Management Centre (PQPMC) within the Ministry of Agriculture and Livestock Development, Nepal regulated eight HHPs that were banned in Nepal in 2019 (including dichlorvos) while aluminium phosphide was reformulated. As a follow up to that project, CPSP and the Nepali partners continue identification of HHPs responsible for suicide deaths and monitors changes in the pesticide suicide rates in Nepal. The preliminary results indicate that in 2022-2023, there were fewer pesticide suicides, and considerably fewer deaths from dichlorvos and aluminum phosphide. This talk will discuss the identification of HHPs and advocacy with policymakers for the regulation and implementation of HHPs ban to prevent pesticide suicides and what evidence there is that this has impacted on pesticide suicides and agriculture yield- study is ongoing.