

Common exposure, rare disease: How clinicians communicate rabies risk and support vaccination decisions for travellers

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Background:

Rabies vaccination discussions with travellers are complex: the disease is rare but catastrophic, exposures are common but unpredictable, and post-exposure prophylaxis may be difficult to access. Prior research highlights gaps in traveller knowledge and variable PEP uptake. This study explored how clinicians communicate rabies risk, support vaccination decisions, and navigate barriers to pre-exposure prophylaxis (PrEP), to inform decision support tool development.

Methods:

We conducted semi-structured interviews with clinicians providing pre-travel and/or post exposure rabies care across diverse settings. Data were analysed thematically, with the COM-B model and Ottawa Decision Support Framework used to help interpret behavioural and decisional influences. Member checking supported credibility.

Results:

We interviewed 20 clinicians (median duration 47 minutes) across all WHO regions. Clinicians used vivid communication strategies—including stories, media cases, metaphors, and hypothetical scenarios—to convey the unpredictability and potential consequences of rabies risk exposures. They commonly discussed bite-avoidance strategies, clarified what constitutes an exposure, and emphasised immediate wound washing and need for medical assessment regardless of vaccination status. PrEP was widely framed as simplifying post exposure care by avoiding the need for rabies immunoglobulin and reducing anxiety and travel disruption. Barriers to uptake included cost, competing priorities, time limited consultations, misconceptions and low perceived relevance among some traveller groups.

Conclusion:

Clinicians employ narrative and scenario based-communication to motivate rabies vaccination decisions, yet persistent knowledge gaps and logistical barriers continue to limit uptake. Findings highlight opportunities to develop decision support tools that strengthen risk framing, correct misconceptions, and support practical action planning for travellers and clinicians.