Review of: "Misdiagnosis of Dengue Fever as Malaria and Typhoid Fever and Their Co-infection in Rural Areas of Southwest Nigeria"

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Potential competing interests: No potential competing interests to declare.

Title: Misdiagnosis of Dengue Fever as Malaria and Typhoid Fever and Their Co-infection in Rural Areas of Southwest Nigeria

The rural areas of Southwest Nigeria are a predominant area for Dengue fever infection, so it is important for DENV to be routinely diagnosed. It's good to note that the three diseases' symptoms are almost identical, which makes clinical diagnosis complicated. Physicians depend on empirical treatment, which may compromise patients' health in some areas.

Abstract;

Results: The percentage is not clear; it would be better to add up the total number of each ratio, for example, from this, 315/Total (29.4%), and the same for all the percentages.

Conclusion: …especially in cases of malaria and typhoid negative by rapid diagnostic testing. In your study, you say*that only malaria- and typhoid-positive samples were tested for DENV NS1 protein, DENV IgM, DENV IgG, and RT-PCR,* if this is true, I think the last part of the conclusion should be changed.

Elements	Limits
Co-occurrence infections	• The trio of coinfection symptoms is almost identical, which can lead to misdiagnosis. • Once one of the trio of coinfections infects a human, it propagates in the blood system, where we have fever.
Clinical Diagnosis	Not all the hospitals officially screen for DENV, and the differential diagnosis of DENV, malaria, and typhoid, despite similar clinical presentations, makes misdiagnosis not unusual,
Laboratory analysis	• Misdiagnosis 54 DENV-positive samples were wrongly diagnosed as malaria parasites, while 14 samples positive for DENV were misdiagnosed as typhoid fever, showing an association between all misdiagnosed samples, which is a confirmation that some samples were diagnosed as typhoid and malaria but were actually positive for dengue alone.
Treatments	• The treatment regimens for these coinfections are not the same as those for mono-infections. • Co-infections may give rise to wrong diagnoses, especially in areas where clinicians depend on empirical treatment. • The development of antimicrobial resistance