

Co-infection of *Schistosoma haematobium* and *Plasmodium falciparum* malaria in Ijaka-Isale community of Ogun State, Nigeria

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The study evaluates co-infection of *Schistosoma haematobium* and *Plasmodium falciparum* in Ijaka-Isale community of Ogun State, Nigeria. Participants were recruited randomly from the public primary school in the study community. Freshly passed mid-day urine samples were collected and blood was drawn from the participants who were qualified for the study according to the inclusion and exclusion criteria used. The blood and urine samples were then transferred to the laboratory for examination of parasites. Questionnaires were also administered to the head of each household in the study community to assess knowledge, attitudes and practices in the management of schistosomiasis and malaria in the study area. Study participants were grouped into three age groups; 6-9 years, 10-13 years and ≥ 14 years old. Overall prevalence of *S. haematobium* was 75.1% and overall prevalence for malaria was 78.2%. Infection was more prevalent in the 6-9 years age group; the percentage of prevalence and intensity of infection were higher in females than males. The prevalence of malaria and schistosomiasis co-infection was 57.1% and a significant linear relationship ($P < 0.05$) exist between the gradients of urine biochemical and infection status of the participants, although with a poor fit. Questionnaire results show a significant relationship ($P < 0.05$), among the participant's knowledge, hygiene and behavioral practices with the acquisition and successful transmission of schistosomiasis and malaria in the study area. There is need for integrated control efforts which consider multiple infections and which are targeted at school-aged children in the study community. This should maximize disease reduction under resource-limited conditions.

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Malaria and intestinal parasites in pregnant woman at Abobo district (Abidjan, Côte d'Ivoire)

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A prospective study was carried out from 2010 to 2012 at the Hôpital Général d'Abobo (HGA) in Abidjan, in order to determine the impact of infectious and parasitic diseases on child cognitive development. Blood samples were examined by means of thick drop and blood smear; as for stool by direct examination and concentration by formalin-ether method. We evaluated the prevalence, the parasite load of malaria and gastrointestinal parasites; then we investigated the risk factors for these disorders. Overall, 331 pregnant women in the last trimester of their pregnancy were enrolled. The plasmodic index was 3.9% with infestation specific rates of *P. falciparum* from 100%. Concerning digestive protozoa, it has been observed 71.3% of nonpathogenic, against 9.7% of pathogens, either an overall prevalence of 51.4% of digestive parasites. The calculated average parasitic loads revealed 3089.2 t_pz/ μ l of blood (95% CI: 591.1-5587.3) for malaria, 6.5 eggs per gram of stool (95% CI: 0.4-13.4) for intestinal helminths and one parasite by microscopic field for protozoa (common infestation). It has been shown that the occurrence of malaria has been linked to the non-use of impregnated mosquito nets ($\chi^2 = 0.012$; $p = 0.018$), not to age. No link could be established between the presence of digestive parasites and the age of pregnant women or socioeconomic conditions (level of education, profession, type of toilet). Malaria is less common in pregnant women while the rate of digestive parasites remains high.

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