Community adaptation for frequent urban flood the case from Keravalapitiya GN Division

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Abstract

This study investigates the community adaptation for a frequent urban flood. In tropical climates, urban flash floods have been increased and the vulnerability is also increased due to climate changes. According to the international rankings, Sri Lanka has been ranked second among the countries most affected by extreme weather events in 20 years since 1998. The 2019 Long-Term Climate Risk Index, published by Germanwatch, has listed Puerto Rico, Sri Lanka, and Dominica as the top three affected countries. The study has selected the Keravalapitiya G.N division in the Wattala urban council area of the Gampaha District in the Western Province of Sri Lanka because this urban area faces frequent floods due to the geographic location on the coastal belt of the This study was done under mixed-methods and the primary data were collected from 50 households using a questionnaire. Maps, satellite images, aerial photos have been used for the secondary data. The study reveals that community adaptation is not satisfactory because each time the victims are suffered from the flood. Anyway, this community does not migrate to a safer area because they are lower-income families and they have no other alternative. The study points out that, all the victims of the flood are an economically and socially marginal community. According to the low gradient of the slope, drainage pattern, climate pattern, and frequency of floods, the most sustainable solution is to relocate the community into a new housing scheme.

Keywords: flood; adaptation; strategies; community; people ;perception; calamities.

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