

Hazard mapping on school road and its spatial characteristics -A case study of elementary school in Tsukuba city-

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The interest of safety and security of the region grow rapidly in Japan, such as crime prevention map, and disaster prevention map has been created with a lot of elementary school. We have held a workshop to consider the safety of school routes with school children and their parents together while walking the school route in elementary school area in Tsukuba, Ibaraki Prefecture. The purpose of this study is to clarify the spatial characteristics of hazardous locations that have been selected by their parents in this workshop. At the workshop, We got a map of 108 sheets filled out the dangerous place related to traffic, crime, and disasters, and the reason for its selection. In traffic hazard, we had the characteristics, such as the large amount of traffic and narrow road with no sidewalk. There were also the characteristics, no buildings around and the presence of forest and bushes, such as dark in crime hazard, and the collapse of the walls of the house in disaster hazard. In particular, crime and disaster hazard, had been influenced by the distance from buildings and building density.

Keywords: hazard mapping, elementary school, Tsukuba city, spatial characteristics, school road, density surface