

# CYCLING USAGE AND DETERMINANTS ON UNIVERSITY CAMPUS IN GHANA: THE CASE OF KWAME NKRUMAH UNIVERSITY OF SCIENCE AND TECHNOLOGY

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## Abstract

There is increasing interest among institutions, governments, and international organisations to combat congestion, reduce contribution to green gases and provide sustainable urban transportation. College campuses are a preeminent setting for promoting active commuting to ameliorate a community healthy lifestyle. Cycling is an important physical activity and has a long-term effect on health and it is considered one of the top five interventions to reduce the prevalence of non-communicable diseases. The main objectives of the research were: (i) to identify students' attitudes and behavior toward cycling usage, (ii) to identify barriers and opportunities for cycling on a university campus and (iii) to construct tangible policy recommendations for promoting cycling in the vicinity of the university.

The data used in this study were obtained from a survey conducted among students at the Kwame Nkrumah University of Science and Technology (KNUST) in Kumasi between May 2022 and September 2022. A convenient sampling method was used to recruit and interview 398 participants. Two survey assistants who are former students of the university were engaged to administer the questionnaires randomly to students at the selected locations. Descriptive statistics were employed in the analysis of the data. Out of the 398 questionnaires, bicycle ridership, and ownership among university students were 57% and 39% respectively. Generally, the desire to use a bicycle as a mode of transport on campus was 36%. The desire to use a bicycle on campus was more prevalent among males 41% compared to females 30%. There is a high potential for increasing bicycle use among students. Recommendations include the provision of bicycle lanes, public education on the use of bicycles, and a campus bicycle-sharing program.