

# Locational Characteristics of Bicycles Parking in Tsukuba

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## 1. Purpose

The purpose of this research is to examine locational characteristics of Bicycles parking in Tsukuba city by using GPS and GIS software.

## 2. Research area and method

My research areas were near Tsukuba center, Takezono 1 chome and 2 chome. These areas are residential, commercial and some of the most popular areas in the Tsukuba city and according to the culture of using bicycle in Japan it seem that bicycles parking must be important objects in city and traffic discipline. The term of gathering data was November 28~30 and method was a field survey with a GPS was conducted to modified characteristically locations of the bicycles parking in research area. In this research apartment and house ignored in field survey because their fewer effects on traffic and city discipline.

## 3. Data

To analyze locational characteristics of bicycles parking in research area points data which got by GPS facilities and GIS software

Used as the main methodologies. These points, which show the bicycles parking, were characterized using attributes recorded during the field survey like type (with *locker or without locker*), capacity and the type of building that parking belongs to it.

## 4. Results

figure1, 2 and 3 represent the spatial distribution of bicycles parking; capacity and building that parking belong to it.

Generally bicycles parking in the research area are belong to the specific building and related to the different buildings, offices, companies and so on and there are no public bicycles parking that everybody use them. The majority of bicycles parking are conducted on parking without locker and without charge. The biggest of bicycles parking are related to the super markets.

## 5. Conclusion

According to the role of bicycles in city's transportation, bicycles parking are necessary for access to different offices, companies, super markets, etc. through correlation.

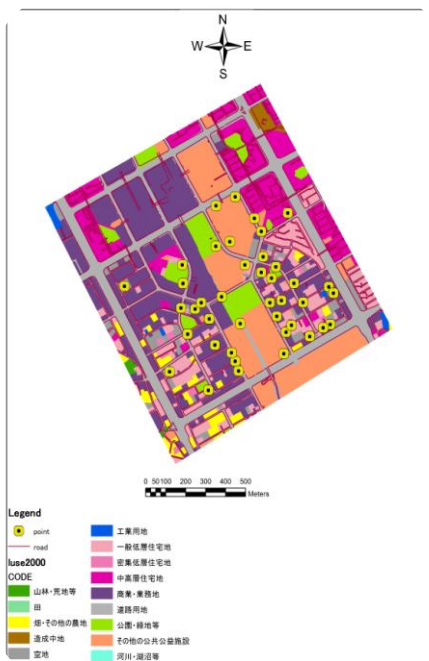


figure1: spatial distribution of bicycles parking

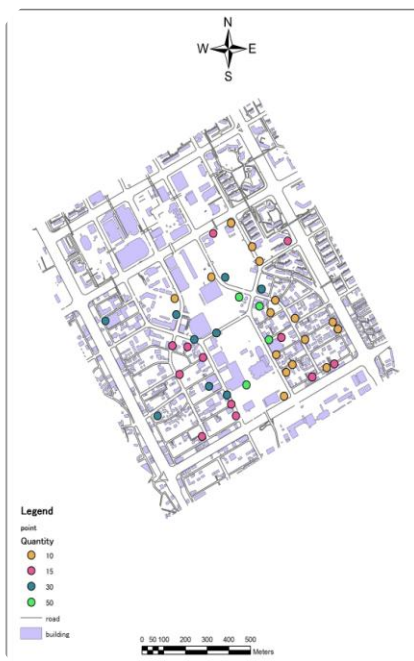


figure2: spatial distribution of bicycle parking and capacity

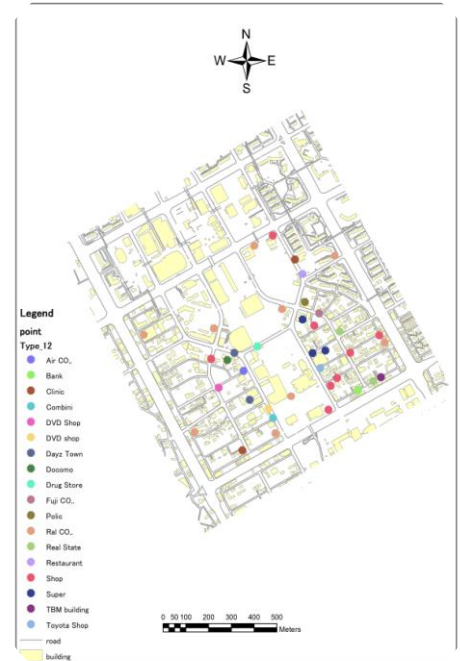


figure3: spatial distribution of bicycle parking and building