



## ***Erfassung, Analyse und Weiterentwicklung von Fahrradabstellanlagen im Stadtbezirk Köln-Porz***

*Faisal Hamood Bashar*

### **Abstract**

Promoting sustainable transportation, especially cycling, is an important part of the German government's efforts to achieve its climate target by 2050. Every year, bike lanes and traffic signals are being built nationwide to make cycling more attractive and encourage the use of bicycles.

The city of Cologne has also taken important steps to improve bike-friendliness and increase the share of cycling. Many streets, especially in the city center, have been redesigned or rebuilt as bike lanes to reduce the share of car traffic and thus reduce emissions and noise. Bike parking facilities are also a significant component of cycling infrastructure, but they still have shortcomings and issues that can affect the attractiveness of cycling. Therefore, this master's thesis focuses on bike parking facilities at public transport stops in the Cologne-Porz district.

Different chapters of this thesis address questions about the attractiveness and usage of cycling, types of bike parking facilities, inventory and occupancy survey methods, as well as analysis of results and recommendations. The goal is to identify existing shortcomings and issues and address them through specific improvement measures, making the bike parking facilities in the study area more attractive and increasing the use of cycling.

According to the inventory and occupancy survey, most selected public transport stops have sufficient bike parking spaces, but they are sometimes hidden and lack signs or directions. Additionally, some bike parking facilities have poor quality due to a lack of regular maintenance. Overall, the quality of bike parking facilities should be continuously assessed.

By implementing improvement suggestions such as installing shelters, modernizing old bike parking facilities, improving the parking area, increasing safety measures, and installing charging stations for e-bikes at public transport stops, the bike parking facilities in the Cologne-Porz district will become more attractive and user-friendly.

### **Supervisors**

Univ.-Prof. Dr. Heather Kathis  
Dipl.-Ing. Leonard Arning

### **Study Programme**

M.Sc. Verkehrswirtschaftsingenieurwesen