

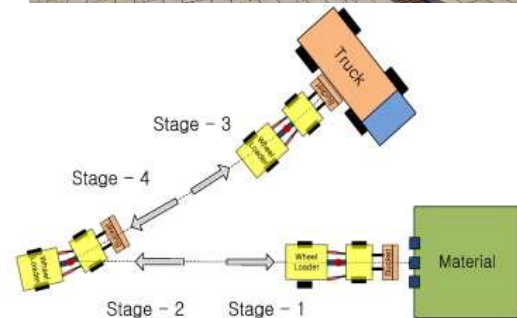
Bachelor- /Masterarbeit

Drive/Working Cycle Generation for Mobile Working Machine using Machine Learning Methods

To understand the behavior and analyse the performance of the mobile working machine huge amount of measurement data need to be acquired. However, for the simulation and design optimization of the machine it only need several drive/working cycles. So how to generate the drive/working cycles out of these data remains a problem, which need be solved and further developed in this thesis.

In the previous work it has been found that with some classification methods like K-Means (unsupervised) and SVM (supervised) we can already deal with the data with clear differences in each stage, a typical example: y-Cycle, see the second picture. While for the other activities of the machine (transport, stack etc.) it still has some difficulties. How to improve the performance of the algorithm and whether there are any other suitable algorithms for the application will be the focus of the thesis.

If interested, please send your application documents (short cover letter, resume, transcript of records) to the email address below.



Aufgabengebiete:

- Datenerfassung & -auswertung
- Mustererkennung
- Machine Learning

Beginn:

- Ab sofort

Voraussetzungen:

- Interesse an mobilen Arbeitsmaschinen
- Bereitschaft sich in neue Themen einzuarbeiten
- EDV-Kenntnisse (z.B. Word, Excel, Power Point, Matlab / Simulink, Python)
- Freude am selbstständigen Arbeiten

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