

## عنوان مقاله:

(Determine the Optimal Arrangement of Pavement Condition Surveyed Inspection Units using Genetic Algorithm (GA

## محل انتشار:

هشتمین کنگره ملی مهندسی عمران (سال: 1393)

تعداد صفحات اصل مقاله: 6

## نویسندگان:

Fereidoon Moghadas Nejad - Associate Professor, Dept. of Civil and Environmental Engineering, Amirkabir University, Tehran, Iran

Ashkan Allahyari Nik - M.Sc. Student, Highway and Transportation Engineering, Dept. of Technical and Engineering, Science and Research Branch, Islamic Azad University, Tehran, Iran

H. Zakeri - PhD Candidate, Dept. of Civil and Environmental Engineering, Amirkabir University, Tehran, Iran

## خلاصه مقاله:

Pavement condition index (PCI) is an important index in pavement management that is required to inspection process for estimating it. First step in this process is dividing pavement sections into smaller units as inspection units. Inspecting all of the units is needed to high cost and time, therefore sampling plan must be somehow inspecting specific number of the inspection units as surveyed inspection units can estimate with the lowest error in PCI. The main purpose of this paper is to use and develop GA for estimating PCI with optimal arrangement of surveyed inspection units. A pavement network as a case study was applied for demonstrating the effect of proposed GA. Results of this research can help managers and inspectors for better decision making in inspection process

## کلمات کلیدی:

Pavement Management, Pavement Condition Index, Genetic Algorithm, Surveyed Inspection Units, Optimal arrangement

## لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/295456>

