

本期目录 | 下期目录 | 过刊浏览 | 高级检索

[打印本

页] [关闭]

论文

预排水动力固结法处理吹填粉土地基的试验研究

聂庆科^{①②}, 王国辉^{①②}, 李友东^①, 陈军红^{①②}

(^①河北建设勘察研究院有限公司 ■ 石家庄 ■ 050031)

(^②河北省岩土工程技术研究中心 ■ 石家庄 ■ 050031)

摘要:

为加固新近吹填的处于流塑状态的粉土地基,首先采用轻型井点降水和动力碾压的方法使地基具有一定的初始承载力。然后,施加较大的强夯动力荷载,从而使地基承载力得到显著提高。这一新的综合加固技术称之为“预排水动力固结法”。通过现场测试,研究了施工过程中诸如井点降水的影响范围、强夯时孔隙水压力的变化范围、深层沉降的变化等问题。同时,对强夯夯击遍数、每点夯击次数、遍与遍之间的间隙时间等有关问题进行讨论。研究表明,预排水动力固结法可显著提高吹填粉土地基的承载力。

关键词: 轻型井点 ■ 预排水动力固结法 ■ 孔隙水压力 ■ 现场测试

IN SITU TESTS ON TREATMENT OF SOFT HYDRAULIC FILL GROUND USING DYNAMIC CONSOLIDATION WITH PRE DEWATERING

NIE Qingke^{①②}, WANG Guohui^{①②}, LI Youdong^①, CHEN Junhong^{①②}

(^①Hebei Research Institute of Construction and Geotechnical Investigation Co. | Shijiazhuang ■ 050031)

(^②Hebei Research Center of Geotechnical Technology, Shijiazhuang ■ 050031)

Abstract:

扩展功能

本文信息

Supporting info

PDF (1653KB)

[HTML全文]

参考文献

[PDF]

参考文献

服务与反馈

把本文推荐给朋友

加入我的书架

加入引用管理器

引用本文

Email Alert

文章反馈

浏览反馈信息

本文关键词相关文章

轻型井点 ■ 预排水动力固结法 ■ 孔隙水压力 ■ 现场测试

本文作者相关文章

PubMed

This paper presents the in situ tests for improving saturated soft soil ground formed by hydraulic fill method. The well point dewatering method and roller compaction method are used firstly in order to obtain initial bearing capacity. After this, the bearing capacity can be advanced obviously by dynamic compaction method. This new method is named as "dynamic compaction method with pre dewatering" in this paper. According to a large number of in situ test results, this paper studies the problems such as the affecting scopes of well point dewatering, pore water pressure induced by dynamic compaction, deep settlements of soil layers. In the meantime, number of passes, number of drops per pass, duration time between various passes, and other factors are also discussed. The studies show that the bearing capacity of soft soil ground can be greatly increased using dynamic consolidation with pre dewatering method.

Keywords: Dewatering Dynamic consolidation Pore water pressure In situ tests, Hydraulic fill, Ground treatment

收稿日期 修回日期 网络版发布日期

DOI: