

Construction Inspection Manual

Lexington-Fayette Urban County Government Lexington, Kentucky

January 1, 2005

CHAPTER 1 GENERAL INFORMATION

TABLE OF CONTENTS

1.1	1 Introduction	1
1	1.1.1 General	
	2 Purpose of Inspection	
	3 Qualifications of Inspector	
	4 Inspector Authority	
	5 References	
	1.5.1 Publications	

1.1 Introduction

1.1.1 General

The Inspector is also known as the Engineer's Resident Project Representative. The Inspector's job is vital to achieving high quality construction on every infrastructure project. It is one of verifying that construction operations produce the results called for by the Plans and Specifications. This role is one of the toughest jobs in the construction industry and demands knowledge, awareness, keen observational skills, and diplomacy. The Inspector has the responsibility to identify deviations from project Plans and Specifications and to bring them to the attention of the Contractor and the Engineer. This manual provides the Inspector with the knowledge of practice and policy required during the construction of infrastructure in Fayette County.

1.2 Purpose of Inspection

The purpose of inspection on construction projects is to ensure the quality of the work, and to verify that the finished construction meets project requirements. To accomplish this, the Inspector must be familiar with the Plans and Specifications. Together the Plans and Specifications explain requirements that the Contractor must observe to build a satisfactory project and receive payment in full for his work.

Plans are the Contract Documents that show the location, physical aspects, and dimensions of the work. The Plans include layouts, profiles, cross-sections, and other details. The Specifications are the written technical directions and requirements for the work. In addition, the Specifications complement the Plans by providing instructions that are not specifically indicated on the drawings. Specifications are the means of communication among the Engineer, the Contractor, and the Inspector, and are particularly important to the Inspector's job. The Plans and Specifications are dynamic documents, subject to revisions as unknown conditions and requested design changes are encountered on the project. Therefore, it is imperative that the Inspector maintain a current awareness of these documents.

1.3 Qualifications of Inspector

The personal attributes of the Inspector extend beyond those expected by an ordinary workman or technician. The Inspector must be:

- honest and able to conduct himself/herself in a fair, straight-forward manner;
- able to maintain his/her composure and make good decisions; and
- a skilled diplomat, able to handle tough situations without causing hostility.

In addition to these positive personal attributes, the Inspector must have the organizational and technical ability to perform his/her job. The Inspector shall have a high school diploma and a technical background, preferably with additional technical study or previous construction experience. The Inspector must:

- know how to read and interpret Plans, Specifications, and other documents to understand the requirements of the work;
- be able to observe ongoing construction progress, and identify existing or potential construction operations that are not according to the Plans and Specifications;
- have the verbal communication skills to notify the Contractor in a courteous manner that unsatisfactory conditions exist, or that the Specifications are not being met;
- have the writing skills to properly document and record the daily work progression and any factors affecting the progress or quality of the work;
- be able to perform accurate mathematical calculations;
- be knowledgeable of the physical characteristics of the materials involved in construction projects; and
- understand the principles of materials testing, including the interpretation of test results.

1.4 Inspector Authority

The Inspector is responsible for determining that the work being done and the materials being used meet the requirements of the Plans and Specifications. The Inspector has the authority to reject defective material or work that is being done improperly. The Inspector also has the authority and obligation to notify the Contractor when unusual conditions have been created or encountered during construction. The Inspector should realize that implementation of this authority should be regularly supplemented with advice and assistance from the Engineer.

The Inspector should realize that he/she is not authorized to revoke, alter, or relax any requirements of the Contract; or to issue a Stop Work Order to the Contractor. These actions are among the responsibilities of the LFUCG.

1.5 References

1.5.1 Publications

(1) "Construction Inspection Guidance Manual," Louisville and Jefferson County Metropolitan Sewer District (MSD), Revised Edition, May 1993.