

SEWER SYSTEM AND ITS DESIGN

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ABSTRACT

People usually look upon the obvious or the noticeable physical features of a product constructed by civil engineers; they hardly know what engineers have done under the soil. For example, people will notice the architecture design of a building and do not even know what foundation is. Similarly, people seldom think what engineers have done to eliminate their fluid waste underground. They only know it has been flushed away.

In fact, people should be aware of what a sewer system is. Consequently, "Sewer System and its Design" is brought into this project title. What is a sewer actually? Well, a sewer is a large underground channel or pipe that carries household and industrial waste matter, as well as rain water that drains from roads and buildings, to a place where it can be treated and made harmless. This is what the project body begins with. It introduces readers to the definitions of the relevant terms used in sewer system.

Next, the procedure of designing a sewer system is brought in. Design procedure is outlined briefly in the following section just to let readers to overview it instead of fully understanding the concept behind. Criteria of design are posed. For example, how large should the slope be in order to carry the amount of wastewater produced, what should be the slope be in order for the waste to flow from the source to the treatment plant without suspending on the pipes. Therefore, design equations and diagrams are brought in to determine the unknowns, especially the pipe diameter and the slope of the sewer lines.