

this manual to maintain adequate traffic service and safety for the road user during installation, maintenance and operation of their facilities.

This manual is developed to be a live document that allows changes and revisions subject to the variations required by the DoT due to any reason. It is the responsibility of the user to have access to the latest version of this document for reference and usage. In case of any ambiguity or discrepancy related to the design standards and policies detailed within this manual the user is required to clarify the issue with the DoT. However, in case of variation/deviation from the design standards and policies detailed in this manual, the user is required to both revise the design details and show compliance with the design standards and policies or to obtain NOC from each SAUP that has been affected by the non compliance act. It is the responsibility of the user and not of the DoT to take the contractual obligations on behalf of the user based on the design procedures and policies drafted/detailed in here.

1.4 Content and Format

The manual is divided into two sections, such that there are six chapters in the first section and two annexures in the second section. The details are as follows:

- 1. Chapter one provides the general overview of the manual.
- Chapter two provides the procedural details and requirements to obtain the NOC from the SAUP including DoT are discussed. The procedural details focus on the methods of submitting the NOC applications, whereas, the requirements provide the details regarding the technical documentation that is to be submitted/provided along with the NOC application(s).
- 3. Chapter three gives the reader knowledge about the requirements and procedures to obtain completion and clearance certificates from respective SAUP are presented.
- 4. Chapter four is focused around the design standard for the placement and arrangement of different utilities within the ROW based on the road hierarchy.
- Chapter five provides special design consideration for the crossing of utilities. High level
 conceptual design details have been discussed in this chapter to facilitate the special
 designs, where utilities are crossing due to the nature of the arrangement of their respective
 ROW.
- 6. Chapter six details the utility trench excavation protection and road safety buffers detailing minimum safety requirements.
- 7. In Annexure one, the designs of typical Main roads cross sections showing different types of Main roads along with their respective ROW and associated utilities are presented.
- 8. In Annexure two, the design drawings, standards and details provided by the SAUP are provided for review and reference.