

## EAST WEST UNIVERSITY

Department of Computer Science & Engineering B.Sc. in Computer Science and Engineering Program Quiz II, Fall 2021 Semester

Course: CSE347 Information System Analysis and Design, Section-1 Instructor: Md. Mohsin Uddin, Senior Lecturer, Department of CSE

Total Marks: 20 (10 will be counted for final grading)

Time: 40 Minutes

1. Based on your analysis of the following system description, **construct** an appropriate use case diagram for the system. In your diagram use appropriate notations and Marks:20] symbols to illustrate <u>Generalization</u>, <u>Included</u>, and <u>Extended</u> use cases.

"The department of public works for a large city has decided to develop a Web-based pothole tracking and repair system (PHTRS). Citizens can log onto a website and report the location and severity of potholes. As potholes are reported they are logged within a "public works department repair system" and are assigned an identifying number, stored by street address, size (on a scale of 1 to 10), location (middle, curb, etc.), district (determined from street address), and repair priority (determined from the size of the pothole). Work order data are associated with each pothole and include pothole location and size, repair crew identifying number, number of people on crew, equipment assigned, hours applied to repair, hole status (work in progress, repaired, temporary repair, not repaired), amount of filler material used, and cost of repair (computed from hours applied, number of people, material and equipment used). Finally, a damage file is created to hold information about reported damage due to the pothole and includes citizen's name, address, phone number, type of damage, and dollar amount of damage. PHTRS is an online system; all queries are to be made interactively."