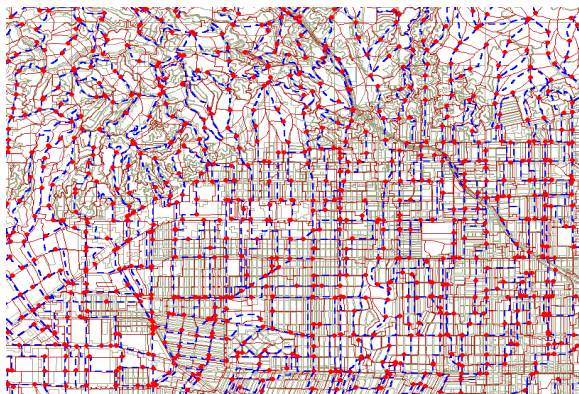


Los Angeles Master Plan of Drainage – Los Angeles, California

Project Description

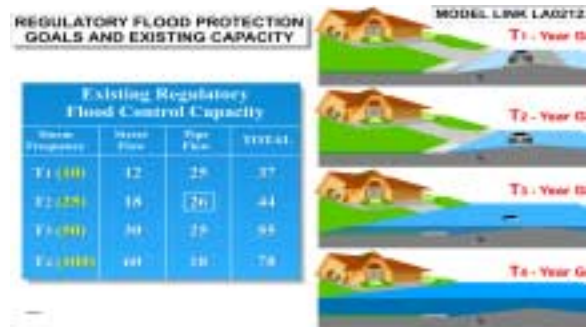
Hromadka & Associates is currently preparing a Master Plan of Drainage (MPD) for the City of Los Angeles, California. The City of Los Angeles Storm Water Management Division contains one of the largest municipal storm drain networks in the country. The MPD encompasses some 500 square miles of mountainous, foothill and valley terrain that are tributary to, or originating in, the City of Los Angeles. The MPD is part of a Utility Infrastructure Geographic Information System (GIS) project being completed for the City. The Utility Infrastructure GIS will assist the City in more efficiently carrying out business functions related to requirements mandated through the National Pollutant Discharge Elimination System (NPDES). The data collected for this MPD, and the associated results, will be incorporated into the GIS as a portion of that overall project.



Project Scope

The MPD itself will determine watershed boundaries, peak flow rates, and drainage improvements necessary to convey flows to their outlets into either major drainage features such as the Los Angeles River and Ballona Creek or the Pacific Ocean. A

hydrologic model will be prepared for the entire 500 square mile area using the Advanced Engineering Software (AES) Stormwater Information Management System (SIMS) computer package, which allows for hydrologic analysis to be evaluated using the Los Angeles County F0601 (Modified Rational Method) program. It is anticipated that the hydrologic analysis will be prepared for 10-, 25- and 50-year return events.



In general, the F0601 hydrologic model requires the subdivision of watersheds into approximate 40 acre subareas, which would imply the need for 8,000 drainage subareas. However, due to modeling intricacies, the entire drainage model is actually represented by approximately 12,000 drainage subareas. The magnitude of this project precludes detailed data acquisition for all drainage facilities within the watershed. Instead, the location and type (underground conduit or open channel) of existing drainage facilities were identified on the base maps for this project and incorporated into the drainage model. Therefore, the final MPD recommendations reflect all drainage facilities required to convey storm flows, regardless of whether or not a facility currently exists and is adequate.

Project Components

Owner – City of Los Angeles
Date of Project – 1996 – Present