Inauguration day

Kevin L. Enfinger and Patrick L. Stevens

sew´·ẽr sō·ci·ol´ō·gy, *the science of society, social institutions, and social relationships viewed through the eyes of a sewer; specifically, the systematic study of the development, structure, interaction, and collective sewer use of organized groups of human beings.*

Most sewer flows are characterized by repeatable diurnal patterns that vary across weekdays, weekends, and holidays. Differences in land use also are apparent, and distractions and disruptions of daily life often can be observed.

This month, we take a look at the inauguration of a U.S. president through the eyes of a sewer.

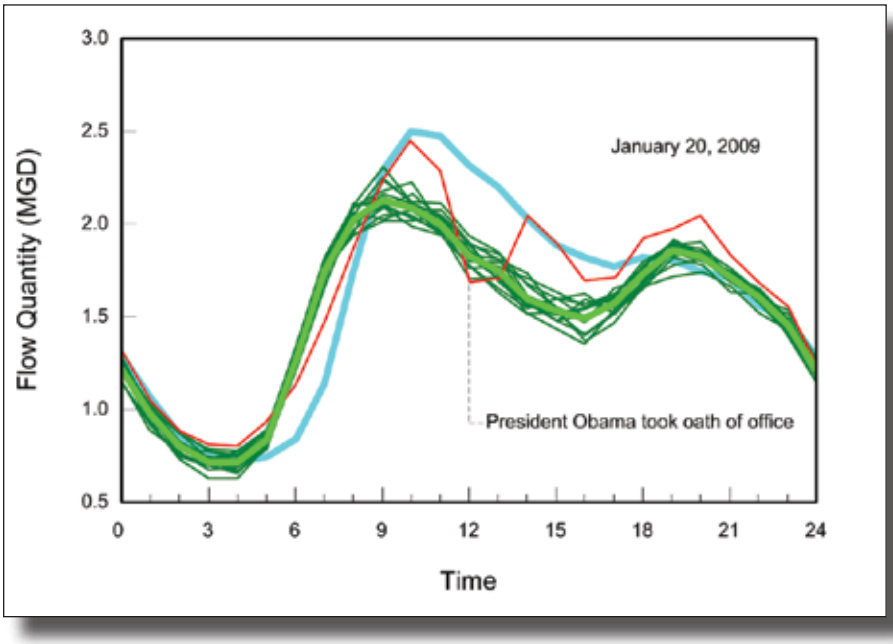
The last Inauguration Day – Jan. 20, 2009 – had a heightened level of public interest as Barack Obama was sworn in as the 44th president of the United States and became the first African–American to become commander in chief. Historic events such as this capture the interest of a nation, and these moments are often reflected by changes in sewer use patterns.

A composite hydrograph of sewer use in a residential area near Washington, D.C., is shown in the figure. Weekdays are shown in green. Weekends are shown in blue, and Inauguration Day is shown in red.

This inauguration occurred on a Tuesday, which was designated as a federal holiday in D.C. and the surrounding area. Therefore, the effect of Inauguration Day on sewer use is determined by comparing Inauguration Day (red curve) to a typical weekend (blue curve).

Note that during the morning, sewer flows fall "in between" a weekday and a weekend. Most government employees and students had the day off, while most private-sector employees went to work as usual. Therefore, morning sewer use is a blended variation of weekday and weekend patterns. Note also that sewer flows began to decrease around 10 a.m., as many residents discontinued their normal routine and tuned in to television or other media coverage to watch the president take the oath of office at noon.

Sewer use during the presidential inauguration



Kevin L. Enfinger *is a region engineer, and* ***Patrick L. Stevens*** *is vice president of engineering at ADS Environmental Services, a division of ADS LLC (Huntsville, Ala.).*

© 2013 Water Environment & Technology. All rights reserved.