

# Lean Process Review and Analysis: Sanitary, Drainage and Construction



Leading Edge Group specializes in providing Lean support to a diverse range of organizations internationally, focusing on transformative results for long-term success and sustainability.

## Objective



This Lean process review project focused on establishing opportunities to optimize processes within the sanitary, drainage and construction business units of a municipality.



## Challenges



Fragmented data across multiple systems and insufficient granularity



Reliance on manual, paper-based workflows and lack of real-time dashboards



Shared budget responsibilities led to unclear roles, overlapping duties and inefficiencies



## Approach



### Voice of the customer and value stream mapping

Established the voice of the customer and facilitated process and value stream mapping workshops to align on improvement goals and define the current state.



### Current state analysis

Applied waste identification (8 wastes) and root cause analysis (5 whys) to pinpoint inefficiencies and underlying issues.



### Data review

Conducted benchmarking and used Pareto analysis to focus on the most critical areas for improvement.



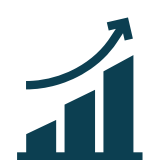
### Lean-based recommendations

Proposed actionable improvements, prioritized using a PICK chart.



### Future state design

Co-designed streamlined processes, incorporating standard work development to ensure sustainability and efficiency.



## Key Recommendations and Impact



Conditional-based cleaning processes in drainage operations:  
**Annual cost avoidance of \$85,000–\$105,000**



Adding trained operators and a relief position improved hydrovac availability:  
**Annual cost avoidance of \$90,000 annually**



Implementation of inspection-based cleaning schedules:  
**Ensured targeted use of resources, reducing re-inspection and travel time**