

Long-term Stewards Together



Metropolitan Council Environmental Services (MCES), operator of the metro-area wastewater collection and treatment system, strives to be a valued leader and partner in water sustainability. To do this, MCES partners with industries, watersheds, and communities to reduce pollutants in the most efficient and effective way possible. This often means reducing pollutants at the source.

How we reduce pollutants at the source



1
MCES identifies new industrial customers. Industrial customers complete a questionnaire about the waste being discharged into the MCES system.



2
MCES issues permits, as needed, and monitors the regional wastewater system to confirm requirements are met.



3
MCES works with industrial customers to reduce impacts to wastewater treatment plants.

MCES has worked to successfully reduce contaminants at the source in the past.

INFLOW/INFILTRATION (I/I)



I/I is clear water – stormwater and groundwater – that enters the wastewater system.

Reducing I/I at the source is important so it doesn't overload the wastewater system and cause costly sewer backups into homes and buildings.

Since 2004, MCES and its customers have actively investigated the sources of I/I and invested significantly in their systems to mitigate I/I. I/I mitigation protects public and environmental health by preventing sewer overflows to basements and waterways, allows our economy to grow and prosper without the cost of building larger infrastructure and saves money by reducing the amount of water that needs to be transported and treated.

PHOSPHOROUS

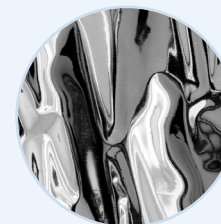


Phosphorus is a mineral that enters the wastewater system through human waste and household products.

Reducing phosphorus at the source is important to protect our lakes and rivers.

The phosphorus reduction program achieved an 88% reduction in the total phosphorus load discharged by eight MCES wastewater treatment plants through a combination of source reduction and treatment technology improvements.

MERCURY



Mercury is an element that enters the wastewater system from dental offices and other sources.

Reducing mercury at the source is important to protect our rivers and wildlife because it is not removed as part of the wastewater treatment process.

Beginning in 1998, MCES and the Minnesota Dental Association partnered to reduce mercury in wastewater effluent.

The partnership led to installation of amalgam separators and adoption of best practices in Metro area dentist offices.

Working with partners on source control has reduced daily mercury loading to our largest treatment plant by 67% and saved rate payers an estimated \$100 million in capital improvements.

For more information:

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