

## 2021 PAVEMENT MANAGEMENT PROGRAM

There are approximately 100 miles of local City streets in Champlin today. To assist City staff in the maintenance of the streets and to appropriately utilize street maintenance funds, the City of Champlin initiated a Pavement Management Program in 1993 to prioritize maintenance of the City's streets. City streets are rated using a Pavement Management Program that evaluates the condition of the streets utilizing pavement deterioration indicators. The pavement rating (Pavement Condition Index, PCI) is based on the severity of the damage to the street utilizing these indicators:

Longitudinal Cracking	Block Cracking	Polished Aggregate
Transverse Cracking	Patches	Skin Patches
Alligator Cracking	Rutting	Potholes
Depression	Flushing	Shoving
Frost Heave		

Approximately one-third of the City streets are surveyed each year for pavement deterioration indicators, along with other concerns, such as cracked or broken curb and drainage problems.

The streets current rating is then reviewed against previous ratings to determine the rate of deterioration and it is reviewed against the existing pavement structural integrity to determine the best rehabilitative measure as well as its priority.

Pavement cores or soil borings are obtained to provide information on the pavements actual structural integrity to use when determining the street improvement method, such as a mill and overlay or full depth pavement replacement.

The streets' Pavement Condition Index (PCI) is from 100 (excellent condition) to 0 (completely failed) and is used for Capital Planning purposes. The rating system ranks the streets which are then divided into three typical categories:

- Adequate Condition (PCI 91-100)
- Fair to Poor Condition (PCI 36- 90)
- Failed Condition (PCI 0- 35)

The PCI ranges and associated street condition categories noted below can vary significantly.

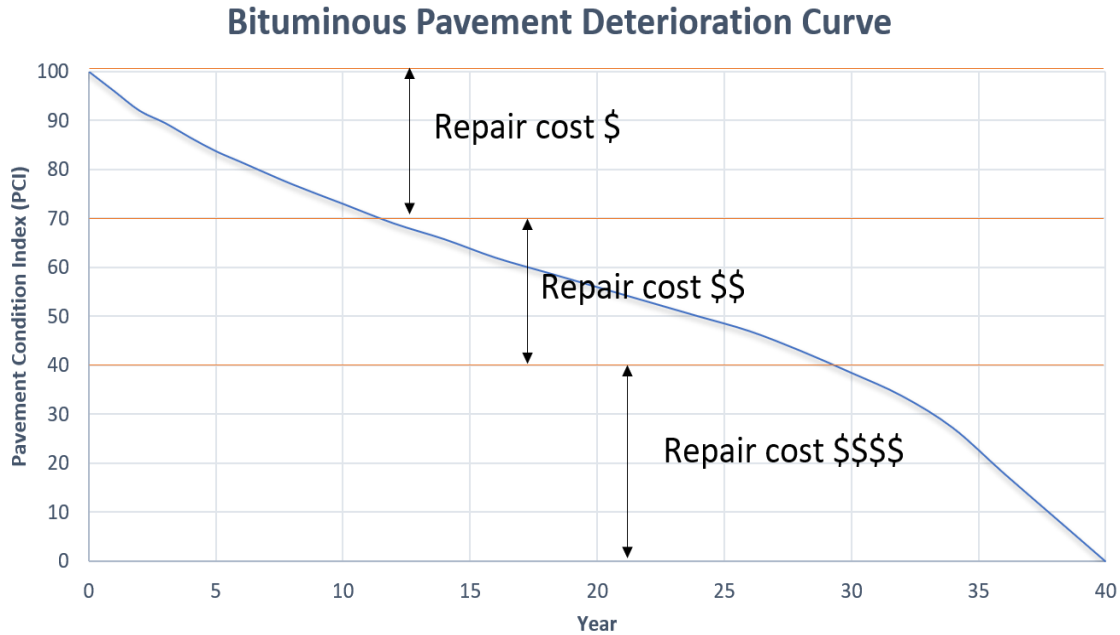
The following are typical street condition categories with the following recommended street maintenance, rehabilitation and reconstruction improvement methods. However, the actual improvement made is dependent on the results of the pavement cores or soil borings obtained:

<b>STREET CONDITION</b>	<b>IMPROVEMENT BASED ON PCI RATING ONLY*</b>
Adequate Street	Crack Sealing Pavement Rejuvenator
Fair to Poor Street	Mill and Overlay or Full Depth Reclamation
Failed Street	Total Street Reconstruction

\*This is used for high level planning of the City's Capital Improvement Program. After pavement cores or soil borings are obtained, the street improvement method will be determined.

Drainage improvements, including the addition of storm sewer catch basins and storm sewer pipes, along with other underground utilities such as sanitary sewer and watermain improvements, are also a factor in addition to the street condition when determining the appropriate street improvement method and priority of completion.

The graph below represents the typical deterioration of a street over time based on PCI rating.



Street maintenance, rehabilitation and reconstruction projects are allocated or paid through the following funding sources:

- Capital Improvement Fund
- Private Development Construction and Funding
- Municipal State Aid Funds
- Special Assessments

The City's Pavement Management Program is an excellent tool to maximize the use of these funds for street preventative maintenance and improvement measures.