

Capital Improvement Plan

City of Shakopee, Minnesota

2023 *thru* 2027

Project # Equip-23-424
Project Name Public Works Street: Plow Truck Prewetting System

Type Equipment Department Equipment Internal Serv. Fund
Useful Life 15 Contact Public Works Director
Category Public Works Priority 2 Important-Provide Efficiencies/
Accounting Code 7800.1740 100042
Fund Capital Equipment Internal Serv
Status Active



Description Total Project Cost: \$155,000

Retrofit eight plow trucks with brine prewetting tanks and controls: SK1106, SK1107, SK1108, SK1109, SK1110, SK1165, SK1290, SK1291.

Purchase anti-icing tank attachment with spray bar and controls for the hook truck.

Justification

Replacement Schedule: 15 years

Pretreating the driving surface with anti-icing brine before a snow event keeps it free of bonded ice, which is safer and more cost-effective than trying to remove bonded ice/hard pack after it has formed. Preventive anti-icing utilizes as little as one-fourth of the material and one-tenth of the overall cost (labor, equipment and material) of traditional deicing with dry rock salt.

Use of salt brine to pre-wet the rock salt can decrease overall salt consumption up to 30% by keeping more salt on the intended surface.

Expenditures	2023	2024	2025	2026	2027	Total
Equip/Vehicles/Furnishings	155,000					155,000
Total	155,000					155,000

Funding Sources	2023	2024	2025	2026	2027	Total
Equipment Internal Service Fund	155,000					155,000
Total	155,000					155,000

Budget Impact/Other