AGGREGATE RESOURCES
LE SUEUR COUNTY, MINNESOTA

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The resource of this project is a mineral and basically the aggregate resources sand, gravel, and some stone deposits in Le Sueur County, Minnesota. Having been available for commercial extraction and sale for many years, these deposits are considered to be of significant value for the development of the local community. This project was to develop a large scale, comprehensive inventory and assessment of the aggregate potential of Le Sueur County. The project has created a series of maps and data sets to aid in the identification and extraction of this valuable resource.

There are several factors that impact aggregate resources that affect their availability, quality, and usability. These factors include geology, geohydrology, ownership, zoning, protected waters and wetlands, environmental permitting, distance to markets, and many other factors such as economic, zoning, potential markets, and environmental permitting, and other individual site factors. A combination of these factors determines the value and desirability of an aggregate deposit.

AGGREGATE POTENTIAL: For the purposes of this study, aggregate potential is defined as an assessment of the potential for a sand and gravel deposit to exist given all necessary environmental, political, and sociopolitical factors. The aggregate potential classification system recognizes several potential levels of activity based on the probability, deposit size, and quality. The classification system is not intended to be used as an exploration tool, but to provide an initial determination of aggregate potential.

SAND AND GRAVEL DEPOSITS: Identified features, such as vegetation and superstructure, are used to determine if a deposit of interest exists. The aggregate potential classification system recognizes several potential levels of activity based on the probability, deposit size, and quality. The classification system is not intended to be used as an exploration tool, but to provide an initial determination of aggregate potential.

Table 1. Sand and Gravel Potential

<table>
<thead>
<tr>
<th>Potential Level</th>
<th>Probability</th>
<th>Deposit Size</th>
<th>Quality</th>
</tr>
</thead>
<tbody>
<tr>
<td>HIGHLY DESIRABLE SAND AND GRAVEL DEPOSITS</td>
<td>High</td>
<td>Very high</td>
<td>Very high</td>
</tr>
<tr>
<td>MODERATELY DESIRABLE SAND AND GRAVEL DEPOSITS</td>
<td>Moderate</td>
<td>High</td>
<td>High</td>
</tr>
<tr>
<td>LESS DESIRABLE SAND AND GRAVEL DEPOSITS</td>
<td>Low</td>
<td>Low</td>
<td>Low</td>
</tr>
</tbody>
</table>

Significant Aggregate Resource Deposits

Field Observations, County Well Index, and Rock Piles

The field observations, county well index, and rock piles are used to identify potential aggregate deposits and to determine the quality of these deposits. These deposits are typically high to very high relative to all deposits within the area.

OTHER FEATURES:

- MINES: Recorded during field work and consist of sites where rocks were placed into significant piles that could be used for rip-rap or for crushing.
- ROADWAY: Roads from MN/DOT Basemap 2001 - Roads, Minnesota Department of Transportation, BaseMap Development Group, Surveying and Mapping Section.
- CIVIL TOWNSHIP AND MUNICIPAL BOUNDARIES: From MN/DOT Basemap 2001 - Civiltwp and Muni, Minnesota Department of Transportation, BaseMap Development Group, Surveying and Mapping Section.

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