

## Executive Summary – Data Center Expansion

Yellowstone County’s current technology infrastructure lacks the redundancy required to ensure continuity of operations during a major outage. The County operates a single primary data center, and if that facility becomes unavailable, critical systems—including public safety, justice, finance, and administrative services—would be at risk of prolonged disruption. Strengthening the County’s technological survivability is essential to maintaining reliable public services.

This proposal establishes a secondary data center at Metra Park, utilizing an existing facility (closet #3) that already meets the physical requirements for hosting County infrastructure. No construction, remodeling, or additional operational costs are required at the site. The County’s current hardware, which remains fully capable, would be repurposed for the secondary data center, while new hardware would be installed in the primary data center. This rotation ensures that the newest equipment supports active workloads, while the previous generation provides a reliable failover environment.

To implement this strategy, it is recommended that the County enter a 5-year agreement with Dell Technologies through their APEX Data-Center-as-a-Service (DCaaS) program. Compared to a traditional capital purchase, the APEX model reduces upfront cost, provides predictable monthly budgeting, and includes full hardware lifecycle management and support.

- **Traditional Capital Purchase:** \$1,310,000 upfront for hardware and 5 years of maintenance
- **APEX DCaaS:** \$19,103 per month, totaling \$1,146,180 over 5 years
- **Cost Offset:** The County currently spends an average of \$17,893.65 per month on Azure backup storage. This cost has increased 17% over the past 12 months. This storage provides no operational survivability and could incur more than \$30,000 in egress fees during a full system restore.

Implementing this expansion will significantly improve the County’s resilience, reduce operational risk, and modernize the technology environment while maintaining fiscal responsibility. This approach ensures that essential County services remain available to the public—even in the event of a primary data center failure.