Increasing Annual Yield for Mining Operations through Superior Insights

Challenge
Understand why the mine was falling short of annual yield targets and develop efficiencies to correct this situation.

Solution
Advanced software for modeling reliability and maintainability was used to generate Cost Benefit Analysis showing the most cost-effective solution.

Results
The client saw yields increase by more than 20% to meet the process targets using Prenscia Solutions’ approach to analysis.

Client used software from Prenscia Solutions to perform a Cost Benefit Analysis that highlighted information for optimizing operational efficiencies. As a result, the client benefitted from reduced downtime, increased availability, and increased annual yield.
The Challenge

Our client, a mining operation, was concerned that their mine was not achieving its target yield.

They were looking for ways to configure and operate the plant more efficiently, to increase annual yield.

The Solution

Using Prenscia software, a modeling process was configured to help understand and improve the reliability and maintainability of equipment; based on historical and current data for observed failures and repairs.

Using this information, a baseline performance model of the current plant was created, and alternative scenarios could be evaluated to efficiently improve yield.

The Results

A Cost Benefit Analysis highlighted the optimum solution while minimizing life cycle costs. This enabled the client to reduce downtime, increase availability, and meet yield targets.

By implementing the model results the client realized yield improvements of more than 20%.

About HBM Prenscia Solutions

HBM Prenscia Solutions ensures customer success through value-driven solutions for product and process development, and operational monitoring. We are a multi-disciplinary team with expertise in failure analysis; predictive analytics and modeling for reliability, durability, and deterioration; asset health and usage monitoring; prognostics; development and testing of embedded software to deliver robust solutions to our global clients. Our team of engineers, analysts, software developers, data scientists, and program managers, many holding United States Government security clearance, are readily available to provide technical expertise and deliver value-driven solutions. For more information, please visit www.hbmprenscia.com/solutions