



How to increase predictability, **REDUCE LOSSES, AND CONTROL ORE QUALITY IN REAL TIME** with Grade Control.

*Operational traceability, grade management,
and intelligence applied to the ore journey.*





THE CHALLENGE OF GRADE CONTROL IN MINING

Modern mining requires much more than productivity. Today, mining operations must ensure predictability, quality, and traceability at every stage of the ore journey.

However, many mines still face challenges related to the lack of control over ore grades throughout the operation.

WITHOUT PROPER TRACEABILITY, SEVERAL PROBLEMS BEGIN TO EMERGE SILENTLY:

- Poor blending between materials
- Ore quality deviations
- Low adherence to planning
- Decentralized information
- Difficulty in decision-making
- Financial losses that are difficult to

Without real-time operational visibility, grade control becomes dependent on estimates, decentralized spreadsheets, and reactive analysis.

In many operations, the problem is not only at the plant, but throughout the entire ore journey: from the mining face to stockpiles and final destinations.

The result is a less predictable operation, more susceptible to losses and with lower operational response capacity.

THE OPERATIONAL IMPACT OF LACK OF CONTROL

The absence of proper grade control directly impacts mining operational efficiency and financial performance.

In many cases, these losses happen gradually and silently, making the problem difficult to identify quickly

AMONG THE MAIN OPERATIONAL IMPACTS ARE:



REVENUE LOSS

Poor blending can reduce final product quality, generate commercial penalties, and compromise ore value.



OPERATIONAL REWORK

The lack of control over moved materials increases the need for operational corrections, rework, and reprocessing.



UNBALANCED STOCKPILES

Without proper traceability, controlling stockpile composition, quality, and availability becomes more difficult.



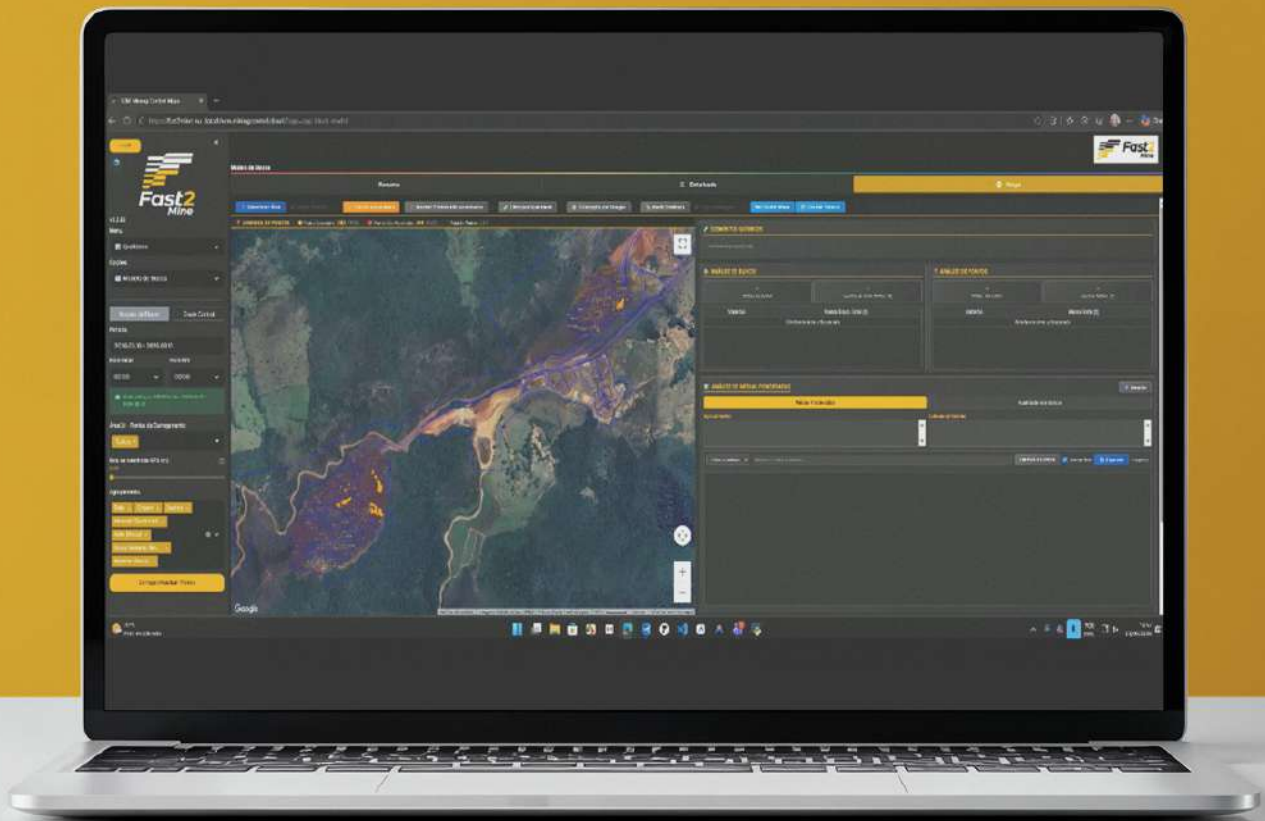
LACK OF PREDICTABILITY

Decisions begin to rely on incomplete or outdated information, reducing adherence to operational planning.



REACTIVE DECISIONS

Without reliable real-time data, operations become corrective rather than preventive. More than a technical issue, poor ore control becomes a strategic operational challenge.



WHAT IS GRADE CONTROL

Grade Control is an operational strategy focused on managing ore quality and grades throughout the entire mining operation.

Its goal is to ensure greater operational predictability, material traceability, and adherence to mine and plant planning.

IN PRACTICE, GRADE CONTROL ENABLES:

- Real-time grade management
- Control by origin, stockpile, and destination
- Blending monitoring
- Complete operational traceability
- Continuous visibility of ore quality

With an integrated structure between operations, planning, and quality control, mining operations gain more reliable data and more assertive decision-making.

Grade Control does not operate only at the plant. It follows the entire ore journey.



ORE JOURNEY

Grade control must follow every stage of ore movement.
Each operational deviation throughout

this process can directly impact final product quality and operational performance.

**MINING FACE -> TRANSPORTATION
-> STOCKPILE -> PLANT**



MINING FACE

- Planned vs. actual grade control
- Correct material identification
- Monitoring by operational face



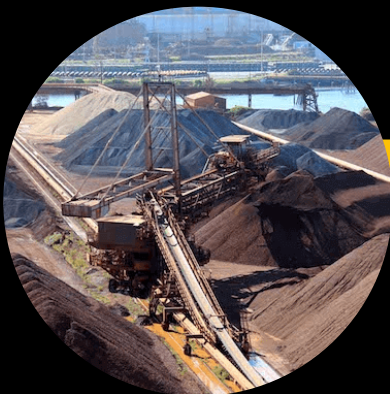
TRANSPORTATION

- Traceability of transported material
- Origin and destination control
- Real-time operational visibility



STOCKPILES

- Inventory control by material
- Composition and blending monitoring
- Stockpile quality management



PLANT

- Feed quality control
- Adherence to planning parameters
- Greater operational predictability

**WHEN ALL THESE STAGES ARE CONNECTED, THE OPERATION
GAINS COMPLETE CONTROL OVER THE ORE JOURNEY.**

HOW FAST2MINE GRADE CONTROL WORKS

Fast2Mine's Grade Control was developed to transform operational data into intelligence for decision-making.

The platform connects operational, planning, and quality control information into a single environment.



DATA COLLECTION

Operational and laboratory data are recorded directly in the field, including grade, material, mining face, and stockpile information



OPERATIONAL INTEGRATION

The platform integrates different areas of the mining operation, enabling greater synchronization between mine, transportation, stockpiles, and plant.



INFORMATION CONSOLIDATION

All data is structured and organized into a centralized database, ensuring operational reliability and traceability.



EXECUTIVE DASHBOARDS

Indicators and dashboards provide fast analysis of ore quality, blending, and operational adherence.



ONLINE AND OFFLINE OPERATION

The system operates even in low-connectivity environments, automatically synchronizing information once the signal is restored. This gives the operation continuous visibility over moved materials and greater control over ore quality.

MAIN BENEFITS



INCREASED REVENUE

Greater ore quality control reduces deviations and improves adherence to commercial parameters.



LOSS REDUCTION

Avoids poor blending, reduces operational rework, and preserves ore value.



MORE ASSERTIVE DECISION-MAKING

Reliable real-time data enables faster and more strategic responses.



COMPLETE TRACEABILITY

Full control over ore movement from the mining face to the plant.



OPERATIONAL EFFICIENCY

Greater integration between operations, planning, and quality, reducing operational deviations.



**QUALITY CONTROL
SHOULD NOT HAPPEN
ONLY AT THE PLANT.**

**IT MUST FOLLOW
THE ENTIRE ORE JOURNEY.**

Operations with operational visibility, traceability, and grade control can reduce losses, increase predictability, and make faster and more strategic decisions.

Fast2Mine's Grade Control was developed precisely to connect operational data,

quality, and planning into a single platform

More control.

More predictability.

More operational efficiency.



Contact Us For:

To learn more about our solutions

To schedule a live demonstration

To schedule a technical visit to see the system in action

contact@fast2mine.com