Automated anomaly detection and plant-scale monitoring

**Early warnings**
Discover actionable anomalies with minimal analysis effort

**Proactive actions**
Diagnose and act on anomalies before they impact the production

**Fully automated**
No set-up and training required. Scale the AI for plant-wide monitoring

Metal makers using Falkonry throughout plants

**Continuous Caster**
Lost revenue due to unplanned downtime from unanticipated equipment failures.

**Solution:**
Get advance warnings of possible failures. Time series AI can detect patterns in caster operating parameters that precede failures.

**Benefit:**
Weave inspections or repairs into the production schedule thus avoiding unscheduled production downtime and revenue losses.

**Hot Run Tables**
Unidentified motor failures or jammed rollers cause surface defects on passing strips/plates

**Solution:**
Monitor hundreds of motors and couplers simultaneously, in real time, to detect the emergence of precursor conditions to failure.

**Benefit:**
Early diagnosis of precursor conditions helps avoid quality defects in the steel surfaces.

**Rolling mills**
Variability in rolled metal requires identifying factors that contribute to surface defects or strip breakage

**Solution:**
Monitor parametric data from multiple sources to identify signal conditions that introduce surface defects.

**Benefit:**
Gain deeper insights on gradual and unnoticeable deviations in equipment performance. Minimize equipment failures & surface defects.

"With our asset performance management solution, powered by Falkonry’s Time Series AI, Ternium operations teams receive actionable warnings before an event could impact the business."

Roberto Demidchuk
CIO at Ternium
A leading North American steel manufacturer deployed Falkonry Time Series AI to continuously monitor the operations in the melt shop, hot mill and finishing mill for early detection and diagnosis of real-time operational anomalies that impact productivity.

Within a period of one month, the line personnel developed trust in Falkonry’s findings and took proactive interventions to prevent unplanned downtimes and surface quality issues.

**BENEFITS:**

- Fully Automated AI, no setup required
- Actionable detection of operational inconsistencies
- Time to value within weeks of deployment
- Scalable approach that applies to entire plant and multiple sites

**RESULTS:**

Prevented production losses worth $285,750 per incident

Productivity increase ~ $4.5 mn / yr