

## **ISSUE 2 | JULY 2012**

### **NEWS AND MARKET TRENDS**

An interactive round-up of the latest news and essential industry updates.

### **COVER STORY: SAFETY**

#### **Safety First: Tech for Prevention and Response**

Mines are filled with danger, but a new generation of safety technology is helping protect the lives of workers. We don our hard-hat to check out some of the best safety measures the industry has to offer.

#### **The Changing Face of Gas Testing**

Could the world's most advanced portable gas lab have helped the rescue mission at New Zealand's Pike River Mine? We explore the technology behind the mobile gas lab and find out how reducing time taken to analyse and test dangerous gas could play a major role in helping future rescue efforts at mining disasters worldwide.

### **FEATURES**

#### **Cutting Wires**

In mining accidents, quick contact with trapped miners is key, but all too often wired communication systems fail. We ask Lockheed Martin's programme manager Warren Gross about the technology behind the first regulatory-approved post-accident wireless communication system.

#### **3D Modelling to the Rescue**

An underground earthquake and its aftershocks devastated the 4km shaft of AngloGold Ashanti's Savuka mine in 2009. We find out how the company used 3D modelling software in its \$30m effort to pick up the pieces.

#### **The Future Rocks**

Minerals used to produce metals and non-metallic mineral raw materials could hold the key to mankind's survival. We talk to experts on both sides of the Atlantic about mining the minerals of the distant and not so distant future.

#### **Re-Greening Operations**

Soil restoration has the potential to regenerate mined land once operations have ceased, with a major recent advance being the development of biopolymers to breathe new life into post-mining wastelands. We look at work being conducted with biopolymers in Alaska to see if barren land can really be returned to its original state.