



# Staff shortfall at the coalface

Programs highlighting the benefits of a career in mining aim to tackle a shortage of engineers, writes **Clive Hopkins**.

**T**he mining industry in Australia needs 450 new mining engineering graduates a year. Unfortunately, universities will produce only about 220 this year, according to a senior lecturer from the school of mining engineering at the University of NSW.

"There's a lack of awareness in the public about what the mining industry does," Dr Paul Hagan says. "We don't have a *CSI* for mining on TV."

Mining engineering students graduate with a broad knowledge of the industry and then typically join a graduate trainee scheme for two to three years before moving into specialist technical roles.

"The focus of the industry over the past 10 years has been on improving the quality and sustainability of mining schools," Hagan says. "Previously, schools in Australia were closing and there are now no mining schools in New Zealand."

Student numbers have increased slightly in recent years, although not nearly enough to close the gap. Hagan argues that the number of work-experience placements offered by mining companies – crucial to a degree in mining engineering – have failed to keep pace with even this small increase in graduates, and that more needs to be done.

Naj Aziz, an associate professor from the school of civil mining and environmental engineering at the University of Wollongong, says the benefits of a career in mining engineering include good pay, good

promotional prospects and the opportunity to work in what he describes as "a fraternal profession". The downsides, though, are that it's a boom-and-bust industry that can be located in remote areas.

"Some people considering a career in mining worry about major disasters, even though the industry is very safety-conscious," Aziz says. With only 13 coalmining deaths in this country during the past 10 years, mining compares very favourably

with industries such as construction or manufacturing.

"It's very difficult for students to visit mines," Aziz says. "This is one of the biggest challenges for the industry."

Aziz would like to see the mining industry create a fund for scholarships, schools programs and mine visits to help allay such concerns among those who may wish to study mining.

A director of industry employer group the Australian Mines and Metals Association (AMMA), Minna Knight, says recruitment is a significant problem, "but the industry is working hard to address the issues".

Knight points to a Queensland government-sponsored program aimed at familiarising 13- and 14-year-old students with what's involved in working in the industry. Similar programs, as well as initiatives to encourage more women into the industry, are emerging in other states.

AMMA recently launched the Australian Women in Resources Alliance, which aims to increase female participation in the industry from the current 17 per cent to 25 per cent by 2020.