

# Coal 2003 Contents

## Keynote Addresses

<i>New Regulation for Health, Safety and Subsidence</i>	R Regan	9
<i>Hazard Management in Longwall Installations</i>	B Lyne	14

## Technical Papers

<i>Longwall 'Pore Pressure' Gas Emission Model</i>	D Ashelford	21
<i>The Use of Sonic Velocity Logs to Define Potential Goaf Delamination Horizons</i>	B Ward	30
<i>Tailgate Support Design — An Empirical and Analytical Approach</i>	G Tarrant	40
<i>The Coal Mine Roof Rating in Mining Engineering Practice</i>	C Mark and G M Molinda	50
<i>Roof Support in Gateroads in Multiple Seam Longwalls — Lessons From Ultraclosse Mining at Gibson's Colliery</i>	R Seedsman	63
<i>Study of Load Transfer Capacity of Bolts Using Short Encapsulation Push Test</i>	N Aziz and B Webb	72
<i>The Challenge to Improve the Prediction of Subsidence Impacts</i>	C Harvey	81
<i>Case Studies in the Application of Influence Functions to Visualising Surface Subsidence</i>	R Byrnes	90
<i>The Impacts of Mine Subsidence on Creeks, River Valleys and Gorges Due to Underground Coal Mining Operations</i>	A Waddington and D Kay	101
<i>Potential Management and Rehabilitation Requirements of Environmental Effects From Longwall Subsidence on Streams, Lakes and Groundwater Systems</i>	A Dawkins	117
<i>Investigations Into Premature Rock Bolt Failures in the Australian Coal Mining Industry</i>	B Hebblewhite, M Fabjanczyk and P Gray	125
<i>Laboratory Testing of Rock Bolt Stress Corrosion Cracking</i>	E Gamboa and A Atrens	132
<i>Double Shear Testing of Bolts</i>	N Aziz, D Pratt and R Williams	153
<i>Longwall Roof Control by Calculation of the Shield Support Requirements</i>	U Langosch, U Ruppel and U Wyink	162
<i>Roadway Span Stability in Thick Seam Mining — Field Monitoring and Numerical Investigation at Moranbah North Mine</i>	B Shen, B Poulsen, M Kelly, J Nemcik and C Hanson	173
<i>High Risk Management in Two Longwall Operations</i>	R Kahler and M Slater	185
<i>Respirable Dust Results From NSW Longwall Mines</i>	K Cram	203

<i>The Measurement of Airflow Through Regulators</i>	H Wu, A Gillies and T Mayes	<b>212</b>
<i>Update on Outbursts and In-Seam Drilling in 2002</i>	J Hanes	<b>225</b>
<i>Southern Districts Emergency Escape System</i>	P Baker	<b>230</b>
<i>Controlling and Reducing Heat on Longwall Faces</i>	P Mitchell	<b>234</b>
<i>Application of Bulk Coal Self-Heating Tests to Longwall Operations</i>	B Beamish, J Phillips, M Brown and D Millers	<b>246</b>
<i>Index to Authors</i>		<b>254</b>