



**MEASURED
GROUP**
MORE FROM YOUR MINE

MORE
FROM
YOUR
MINE



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AT MEASURED GROUP WE DIG DEEP

harnessing and
generously sharing
our vast collective
knowledge
and experience
in resource
development,
mining, and
tenement
management to
**ensure our clients
get more from
their mine.**



ABOUT US

Measured Group is a multidisciplinary mining and resources consultancy offering independent, unbiased, reliable reporting, advice and technical geological services. Trusted by major banks, mining companies, government agencies, accounting firms and investors, we have more than 130 clients across over 600 projects in 40 countries around the world.

When you work with Measured Group, you're supported by a company with extensive global experience across the entire mining value chain, from greenfield exploration to mining optimisation studies.

Our clients benefit from our impartial, expert advice because we are an innovative, flexible and independent company with no commercial affiliations.

COMMODITIES

We have a wealth of experience in minerals and coal in Australia and overseas across more than 34 commodities including:

COAL

GOLD

IRON ORE

GRAPHITE

LITHIUM

SCANDIUM

COBALT

NICKEL

COPPER

SILVER

TIN

LEAD

OIL SHALE

DIAMOND

IRON SANDS

BENTONITE

TITANIUM

ZINC



THE MEASURED DIFFERENCE

MORE VALUE

Our technical expertise and specialist services add value, increase productivity and de-risk your operations to ensure you unearth more from your data and more from the ground, which is why 100% of our clients have become repeat clients. With hands-on experience and knowhow across the entire mining cycle, every solution we offer is practical and effective, designed to meet not only external obligations but also your internal production requirements.

MORE FROM OUR EXPERTS

When you work with Measured Group, you'll be supported by specialists with extensive global experience across the entire mining value chain: from greenfield exploration to mining optimisation studies, tenement management to corporate advisory. We assemble specialist teams of experts from various disciplines customised to meet your unique needs and comprehensively solve the challenges you face.

Our geological and engineering consultants are members of recognised professional organisations for the purpose of preparing reports on exploration results, mineral resources and ore reserves for submission to ASX. And we're experts in international reporting standards – including the JORC Code, KAZRC, NI 43-101 and the SAMREC Code.

MORE COMPREHENSIVE SUPPORT

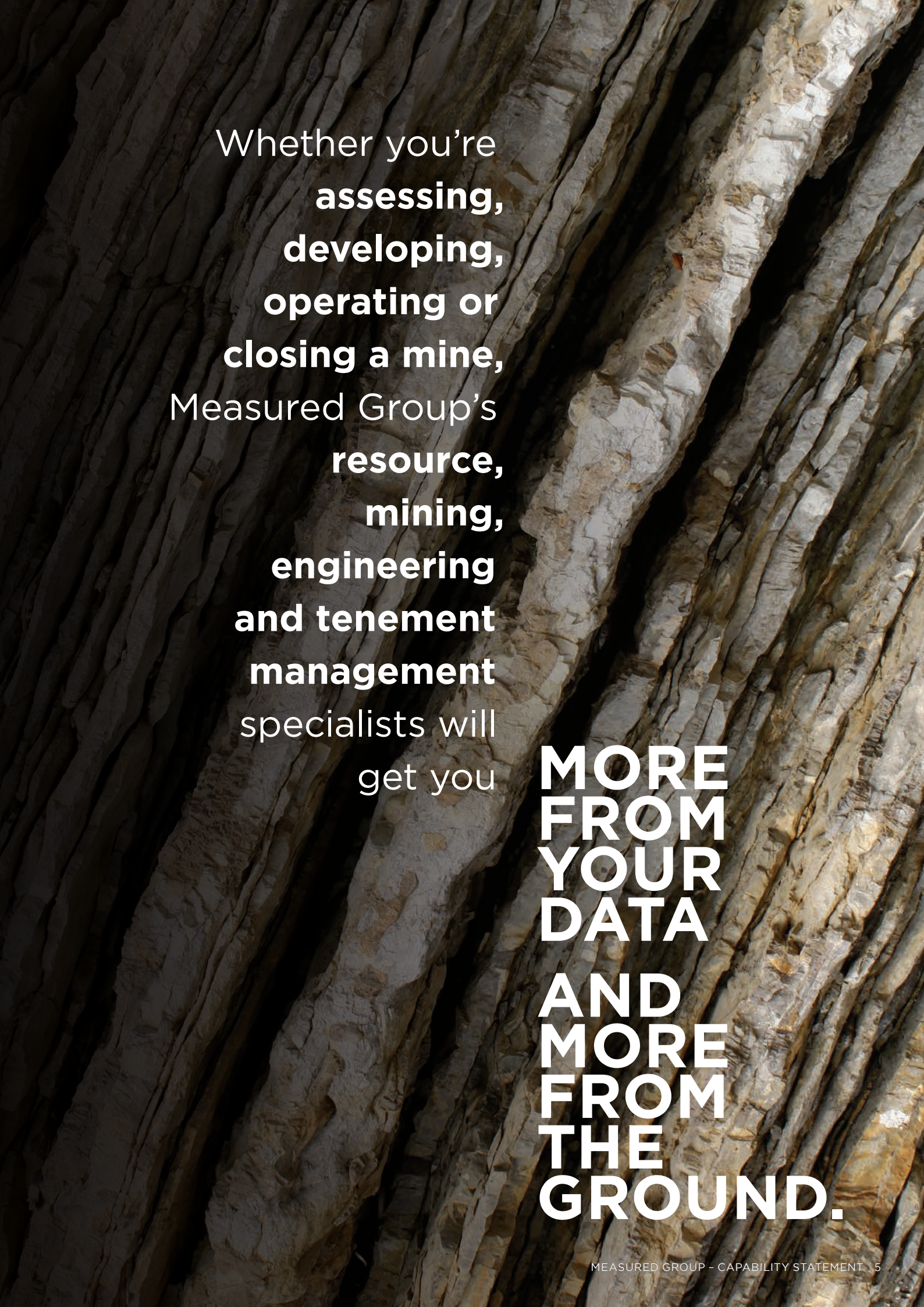
Measured Group works with every level of your business to ensure you get more from your operation. We tailor our approach to your unique needs and leverage our expertise to identify new ideas and new opportunities for you. We achieve this by challenging conventions – in a collaborative, positive way – and innovating new approaches to ensure you get a more efficient outcome that maximises your productivity and minimises your risk.

MORE FROM YOUR DATA

We produce accurate and timely reports that ensure you get more from your data, generating estimates and audits you can have the highest level of confidence in. As industry leaders in computer geological modelling and mine planning, data manipulation and interpretation methodologies, we offer multiple modelling packages and approaches tailored to your needs.

MORE FROM YOUR MINE

In every service we offer, we create innovative, tailored solutions to the challenges you face. We approach every project, large or small, with the same goal: getting you more from your mine.



Whether you're
assessing,
developing,
operating or
closing a mine,
Measured Group's
resource,
mining,
engineering
and tenement
management
specialists will
get you

**MORE
FROM
YOUR
DATA
AND
MORE
FROM
THE
GROUND.**



OUR SERVICES

At Measured Group, we provide a comprehensive range of services to **help our clients** – big and small – **make more informed business decisions, unearth more value, de-risk operations and improve productivity.**

OUR SERVICES AT A GLANCE

We offer comprehensive support across a vast range of services, from robust resource and reserve evaluations to advanced 3D geological modelling, tenement management services to corporate advice.

Feasibility reports, due diligence & technical audits

Corporate advisory & strategy

Tenement management, environmental approvals & compliance

Exploration services

Mine planning

Operational support

Resource & reserve estimations

Technical reporting & optimisation studies

Advanced geological modelling solutions

Data management, assessment & correction

Geostatistical analysis

GIS & Cartography

FEASIBILITY REPORTS, DUE DILIGENCE & TECHNICAL AUDITS

Measured Group's skilled geologists and engineers - highly experienced across the entire mining value chain - ensure the best outcomes for all our clients, determining the real value of a deposit and revealing any fatal flaws.

We provide reliable, timely reports and studies to ensure our clients get more from the ground, including:

- Bankable feasibility studies
- Valuations
- Due Diligence reporting
- Peer review of mineral resource and reserves estimates
- Independent geological reports
- Independent peer reviews
- Geological model audits
- Mine planning reviews
- Expert witness statements and representation
- Data and database audits
- Quality Assurance/Quality Control (QA/QC) checks and analyses
- Correlation reviews and validation
- Identification of key value drivers
- Financial modelling and valuation assessments, and
- Suitability of information to support business plans.

CORPORATE ADVISORY & STRATEGY

Our range of corporate advisory and strategy services – from preparing independent, robust reports, assessments, estimations and reviews to strategic advice – includes:

- High-level advice to board of directors and senior leadership teams
- Asset evaluation and technical reviews
- Independent strategic advice
- Bankable feasibility studies
- Due diligence and technical studies
- Mergers and acquisitions support
- Risk analysis and financial evaluation
- Independent specialist reports
- JORC resource and reserve audits, and
- Expert witness reports and legal support.

TENEMENT MANAGEMENT, ENVIRONMENTAL APPROVALS & COMPLIANCE

Measured Group's proprietary software and experienced tenement management team ensure your planning, approvals and compliance requirements are met on time, every time, saving you money and ensuring the security of your tenures while removing the risk of delays to your projects.

We have decades of experience in tenement management and offer a competitive schedule of rates – including a yearly rate for monitoring of tenements that includes monitoring of all statutory obligations, rent, rates, royalty and statistical

returns, government liaison, lodgement of activity and expenditure reports, plus all associated administration.

We can support you in handling:

- tenement management
- environmental compliance
- native title & cultural heritage
- land access, and
- reporting administrative & other support.

For a full list of services covered under each of the above topics, please visit our website: measuredgroup.com.au/tenement-management-environmental-approvals-and-compliance

Our tenement management team can:

- Save you money by ensuring your rents are paid on time and exploration and work commitments are pitched at industry standards and not beyond
- Ensure security of your tenures
- De-risk and speed up your application and approval processes
- Advise you in advance of data requirements expected by government
- Keep you compliant, ensuring you meet all your reporting and renewal obligations
- Work with your systems and people or implement our MTen tenement management software – a customisable, cloud-based comprehensive tenement management system, and
- Support you with a comprehensive range of tenement management, environmental compliance, native title and cultural heritage, and land access services.

MTEN - TENEMENT MANAGEMENT SOFTWARE

Mten is a comprehensive, cost-effective tenement management system that simplifies the task of handling the complex array of reporting, renewal, payment and relinquishment obligations to ensure your tenements meet all their deadlines.

Developed for the Australian mining industry, Mten is highly adaptable – able to be customised to meet the unique requirements of any size mining company – and incorporates all the latest obligation requirements for each Australian state and territory. Mten tracks all your compliance actions and

obligations and alerts you of upcoming tenement tasks via an early warning system.

The user-friendly Mten database is incredibly simple to use and yet it keeps on top of a mountain of information, tracking all your tenement-related tasks and obligations to safeguard against loss of tenure, fines, or landholder and native title issues.

To find out more or sign up for a free 60-day trial of Mten for your organisation, head to measuredgroup.com.au/software



EXPLORATION SERVICES

Our team of mining, resource and geological professionals provide expert exploration and planning services for any size program – from organising the drill rig for the first chip hole to handling complete full-site, SSE-supported operations.

Specialising in both surface and underground mining across a range of commodities – from precious metals to coal, diamonds to iron ore – Measured Group will ensure you get more from your mine and more for your bottom line.

We offer exploration planning, execution and management services, including support with:

- Comprehensive and complete exploration management including SSE and turnkey solutions
- Strategic exploration planning and design
- Budgeting and scheduling of exploration programs
- Tender preparation, evaluation and contractor management
- Exploration and drill rig supervision
- Experienced field staff and geologists
- Ensuring Workplace Health and environmental compliance
- Field mapping and remote sensing studies
- Supervision of geophysical and hydrogeological programs
- Core and chip logging and sampling
- Interpretation of downhole geophysical data
- Seam gas desorption testing
- Geological data management and correction
- Land access negotiation
- Landholder and cultural heritage negotiation
- Contractor management, and
- Use of all current geological database software.

MINE PLANNING

Our global experience in detailed mine planning and scheduling, risk identification and management, and productivity optimisation means we can help you unearth more value.

We offer mine planning, scheduling and closure planning support, including:

- Mine design using the latest mine planning software packages – including Xpac, Deswik, Spry and more
- Open-cut operations – including pit, dump and ramp design elements, dig and dump scheduling and design, drill and blast planning, haulage analysis, and stockpile blending
- Underground operations – including mine design, planning and scheduling, risk management, operational support, project evaluation and development
- Risk identification, assessment and management
- Cost reduction and productivity optimisation
- Mining method analysis and equipment selection
- Operational reviews
- Customised simulations for productivity estimations and capital justifications
- Environmental rehabilitation and closure planning, and
- Financial Assurance and rehabilitation liability assessment.



OPERATIONAL SUPPORT

At Measured Group, our operational staff, resource geologists, field geologists and mining engineers provide comprehensive support to your operation.

We have global experience in all facets of mine operations – from production drilling mapping supervision and execution to pit mapping, underground mapping for both coal and minerals to mine design, scheduling and rehabilitation. Our skilled staff can execute your program from start to finish with as much or as little input from you as you desire.

Our services include:

OPERATIONAL GEOLOGY SUPPORT

- Data analysis
- Supervision of pre-development exploration
- Underground mine mapping
- Monitoring for open-cut and underground operations
- Audits and reviews for statutory and internal compliance
- Mine design inputs
- Tailored solutions for PHMP/GHMP and supporting systems
- Longwall and gate road geological hazard management
- Optimisation of mining and resource extraction
- Grade control and pit mark-ups, and
- Geological hazard and mining plans.
- Our geotechnical experts are specialist users of Rocscience Suite, Galena, GoCad, Surfer, Vulcan and more.

GEOTECHNICAL ENGINEERING

- Developing, planning and executing exploration programmes for geology and geotech data acquisition

- Data analysis and hazard mapping, assessment, and monitoring for open-cut and underground operations
- Audits and reviews for statutory and internal compliance
- Mine design inputs, coordination of design and options analysis to achieve stable economic design
- Failure and remediation options analysis, planning and operational support
- Optimisation of mining and resource extraction, implementation and mine geology and geotech support, and
- Operational support.

RESOURCE & RESERVE ESTIMATIONS

We draw on our global experience across a wide range of commodities – from precious metals to coal, diamonds to iron ore – to offer:

- Mineral Resource and Reserve classification and estimation
- Competent Person Reporting in accordance with international reporting codes (JORC, KAZRC, NI 43-101, and SAMREC)
- Auditable, reliable mineral resource models
- Comprehensive geostatistical analysis
- Expert review of geological data and models
- Data and database integrity audits
- Geological interpretations and geostatistics
- The creation of systems for corporate governance of public resource and reserves reporting
- Peer review and auditing of Mineral Resource and Reserve estimates
- Quality Assurance/Quality Control (QA/QC) methods, and
- Training, mentoring and support for your staff.



TECHNICAL REPORTING & OPTIMISATION STUDIES

Measured Group's resource specialists are relied upon to provide independent, expert advice and support to the coal and minerals industry, banks and government agencies, financial institutions, investors and more, offering:

- Independent Geological Reports
- Independent Peer Reviews, and
- Mine Planning and Optimisation studies.

ADVANCED GEOLOGICAL MODELLING SOLUTIONS

As industry leaders in geological modelling, data manipulation and interpretation methodologies, we offer multiple modelling packages and approaches tailored to your needs, providing:

- Robust 3D models, including grid and block models for open-cut and underground deposits
- Short-term modelling
- Advanced seam, ply and working section coal modelling
- Structural interpretation and detailed fault modelling
- Quality grade and estimation models for open-cut and underground deposits
- Independent model reviews and audits
- Cross-platform transfer of models and data, and
- Geostatistical modelling and analysis.

We can use your software or our own: our team are specialist users of all relevant software, including MineScape, Minex, Vulcan, Datamine, Strat 3D, Mapinfo, Leapfrog, GOCAD, and more.

DATA MANAGEMENT, ASSESSMENT & CORRECTION

Geoscience data is critical to resource discovery and your operational success. At Measured Group, we help you get more from your data by providing comprehensive data support: we can create custom databases so you can better access, analyse and utilise your geoscience data to lower your operational risk and get more from your mine.

We're experienced in most major database applications and our data scientists are skilled in SQL, Oracle and programming and scripting languages (including Python and PERL).

Our geoscience data services include:

- Developing, implementing and maintaining custom database solutions
- Maintaining secure geological data, including audits and assessments
- Strategic advice on database packages and implementation
- Data workflow optimisation, ensuring efficient access to all geoscience data
- Data analysis, including comprehensive geostatistical studies
- Scripting and process automation
- Robust and reliable data conversions (including using Coallog v3)
- Cost-effective paper-to-digital data conversion including geophysical to English language log
- Supporting our clients to develop the skills and resources to better access and manage their data
- Data and database validation checks
- Correlation reviews and validation
- Review of mineral resource and reserve estimates, and
- Independent technical and geological reports.



GEOSTATISTICAL ANALYSIS

Measured Group will help you dive deep into your data, driving efficiencies across your business by helping you gain confidence in your deposit and realising its true value.

Measured Group are experts in the most relevant and effective geostatistical methods. Specialist users of Isatis and Vulcan data analysis software, we provide the following services:

- Drillhole Spacing Analysis
- Variography
- Kriging
- Block Kriging
- Indicator Kriging
- Co-Kriging
- Conditional Simulation
- Gaussian Simulation
- LU Simulation
- Turning Bands Simulation
- Categorical Simulation
- General data analysis, and
- Scripting and process automation.

GIS & CARTOGRAPHY

Mineral exploration, development and production – as well as mine closure and rehabilitation – is a business that requires vast amounts of location-based information. At Measured Group, we offer a range of GIS (Geographic Information Systems) and cartographic services to convert the spatial components of your information into maps and other visual formats, so you can benefit from greater access to and context for your data.

We create reliable, robust maps, plans and technical report figures to present your data sets in high quality visual formats, saving you time and money and helping you make more informed business and investment decisions.

As specialist users of MapInfo, ArcMap, GIS Software and a variety of CAD/Graphics packages, our team:

- Produces high quality maps, plans, sections and technical report figures
- Develops GIS (Geographic Information Systems) databases, and
- Captures and manipulates data for geological model inputs.



AT MEASURED GROUP

we will never
give you one-
size-fits-all,
cookie-cutter
approaches:
you get more.

**We design
custom
solutions**
to our clients'
challenges,
ensuring they
get more
from their
operations.

OUR VALUES

WE ARE COLLABORATORS

We know we are stronger together. We are part of a group that has a larger purpose than the individual, and we generously share our knowledge and skills with our teammates and our clients.

WE ARE LEADERS

In house, we motivate and energise our team and choose to work with and employ those who live our values. In the field, we are reliable experts, trusted by mining companies, major banks, accounting firms and hundreds of clients across the globe.

WE DIG DEEP

We are skilled, dedicated and diverse experts who work together to ensure our clients get more comprehensive, more reliable and more relevant estimates, advice, support and knowledge from their data.

WE GO ABOVE AND BEYOND

We take on even the most challenging projects and support our clients no matter what the data reveals. We are a full-service firm who can assemble a tailored team of experts to help with all or any aspect of projects, big or small.

WE ARE INNOVATORS

We reject one-size-fits-all, cookie-cutter approaches: we are an agile company that adapts and responds to change, designing custom solutions to tricky problems and ensuring our clients always get more from their operations.

WE HAVE INTEGRITY

We are an independent and trusted company. Our reputation is built upon the reliability and expertise of our team.

WE INVEST IN OUR PEOPLE

Our people are important to us. We take pride in their work and create opportunities for their professional growth. We take clear and decisive action to ensure the wellbeing of our people, and we encourage a balance between work and other life commitments.



OUR HISTORY

At Measured Group, we've been operating for over 13 years, supporting more than 130 clients and more than 600 projects in this time across 40 countries around the globe. We are proud of our people, recognising that our excellent reputation is built upon the reliability and expertise of our team.

Relationships are important to us, and we will support our clients and their operations now and into the future regardless of their data outcomes or the challenges they face.

OUR COMMITMENT

SAFETY, HEALTH, ENVIRONMENT & QUALITY MANAGEMENT

At Measured, our goal is zero harm. We value a safe and healthy workplace and we are committed to looking after, and are respectful of, the environment and the communities in which we work.

We believe in Quality Management and strive toward continuous improvement in the quality of work we undertake and the services we deliver. Our management systems have been developed to ensure we meet our obligations to our people, our clients and our stakeholders.



Measured
Group is
here to
**support
your
operation.**

Get in touch
to find out
how we can
help you get

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