

## SPEC BUY

Current Price \$0.67  
Target Price \$1.30

Ticker: RTG  
Sector: Materials

Shares on Issue (m): 112.0  
Market Cap (\$m): 75.0  
Cash (\$m): 5.3  
Enterprise Value (\$m): 69.8

52 wk High/Low: \$1.37 \$0.57  
12m Av Daily Vol (m): 0.18

### Mineral Inventory (100% basis)

	Mt	Au g/t Eq	Au Moz Eq
Reserves	-	-	-
Resources	11.4	5.6	2.0

	\$/oz Eq
EV / Reserve	-
EV / Resource	34

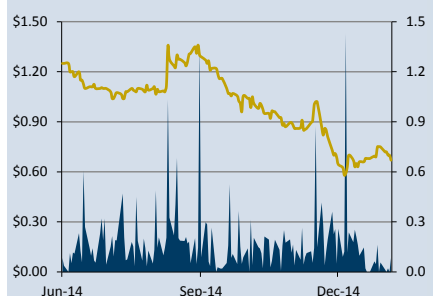
### Directors:

Michael J Carrick	Chairman
Justine A Magee	President and CEO
David A T Cruse	Non-Executive Director
Phillip C Lockyer	Non-Executive Director
Robert N Scott	Non-Executive Director

### Substantial Shareholders:

B2Gold	11.4%
Hains Family	5.8%

### Share Price Graph



Friday, 9 January 2015

## RTG Mining

### Made in the ring of fire

Analysts | Patrick Chang | Matthew Keane

### Quick Read

Copper / Gold developer RTG Mining (RTG) is rapidly advancing its Mabilo project located in Luzon, Philippines. The Company has delineated an impressive open-pittable Resource of 2.0Moz @ 5.6g/t Au Eq (see page 4, Table 2). Mabilo has a high probability of becoming a ~150koz Eq pa mine given the high grades. Argonaut regards it as one of the most promising undeveloped projects on the ASX. Although Philippines sovereign risks are acknowledged, the management team, chaired by Michael Carrick, has a track record in country with CGA Mining which undertook a US\$1.1b merger with B2 Gold (CN:BTO) in early 2013. The Company also owns the Bunawan Project, a highly prospective tenement package located adjacent to Medusa Mining's (MML) Co-O Mine. Given sufficient scale, the Company could offer corporate appeal.

### Event & Impact | Positive

**Mabilo could be a significant producer:** Mabilo could support a ~150-200koz Au Eq production profile. The development of the project will likely to be staged, incorporating a low capex, start-up DSO operation featuring a very high grade copper 'pod' of 101kt @ 24% Cu. This will significantly enhance project IRR by reducing upfront capex. Stage II development will likely comprise a sulphide operation (~1-1.5Mtpa plant), producing Cu/Au and magnetite concentrates.

**Infrastructure advantage:** Mabilo benefits from extensive infrastructure including an existing port (40km from site, capable of handling 50-100kt ships), grid power and water. Permitting documents for the proposed DSO have been lodged.

**Exploration upside:** To date the Company has only targeted highly magnetic features within the tenements, associated with a magnetite skarn. However, there are known mineral occurrences in the region that are unrelated to skarns. Argonaut anticipates systematic exploration for other styles (e.g. epithermal or porphyry) could yield further discoveries. Given the management's commercial acumen, Argonaut anticipates further tenement consolidation.

**Track record in the Philippines:** Whilst considered a high risk jurisdiction, the Mabilo Project is located in a low density, pro-mining area in Luzon. The management's track record of developing seven mines in five different countries (including the Philippines, Mongolia and Tanzania), in particularly the 200koz pa Masbate Mine in the Philippines, largely mitigates the jurisdictional risk. The project structure, being a JV with a well-known local partner (~58:42) also acts as a mitigant.

### Recommendation

Argonaut assigns a Speculative Buy rating with a valuation of A\$1.30.

## Made in the ring of fire

### Overview

RTG's flagship project is the high grade Mabilo Cu-Au-Fe project...

RTG's flagship project is the Mabilo Cu-Au-Fe project located in Luzon, northern Philippines (see Figure 1). The Company recently delineated a high grade Resource of 2.0Moz @ 5.6g/t Au Eq (see page 4, Table 2).

The Company's second asset is the Bunawan project, with exploration licenses adjacent to MML's Co-O mine. RTG recently received a partial grant of the licence and has commenced drilling.

Figure 1: RTG project locations

...located in Luzon, Philippines



Source: RTG

The Company recently delineated a 2.0Moz @ 5.6g/t Au Eq maiden Resource at Mabilo

Given existing infrastructure and management's track record...

Mabilo has a high probability of becoming a mine given the high grades, modest strip (see page 3), existing infrastructure, low capex requirement for Stage I and management's track record. A BFS on the primary ore (Stage II) is anticipated in Q3 2015.



...development of the asset is expected to be expedited

Although generally perceived as a challenging jurisdiction, the country's prospective geology has attracted a number of TSX / ASX companies. Successful operators in the Philippines include:

- B2Gold (Market Cap C\$2.1b) – Masbate, CY15 guidance 190koz
- Oceana (Market Cap C\$687m) – Didipio, CY15 guidance ~200koz Au Eq
- Medusa (Market Cap A\$165m) – Co-O, FY15 guidance 95-100koz

## Valuation and peer comp

Argonaut values RTG at A\$1.30 on a fully funded basis...

Argonaut's sum of parts valuation on RTG is A\$1.30 (funded with a debt/equity ratio of 60:40), assumes a 1.5Mtpa operation producing ~150koz Au Eq pa. Key project parameters are presented in Table 1.

Table 1: RTG valuation and key project assumptions

Valuation Summary	A\$m	A\$/sh
Mabilo	160.2	1.20
Exploration	30.0	0.22
Investments	0.0	0.00
Forwards	0.0	0.00
Corporate	-19.8	-0.15
Unpaid Capital	0.0	0.00
Cash estimate	3.0	0.02
<b>Total @15% discount rate</b>	<b>173.4</b>	<b>1.30</b>
Key project assumptions		
<b>Mabilo</b>		
Ownership	%	58
Ore milled	Mtpa	1.5
Head grade	Au g/t Eq	5.0
Overall Recovery / Payability	%	80
Production	koz Eq pa	170
Mine Life	yrs	9.0
Strip ratio (post pre-strip)	:	8.0
Stage I Capex	A\$m	20
Stage II Capex	A\$m	130
Sustaining Capex	A\$m pa	6
<b>Long term Pricing</b>		
Gold price	US\$/oz	1350
Exchange rate	:	0.85
<b>Fiscal</b>		
Government royalty	%	5
Tax Rate	%	30
Discount Rate	%	15
Debt / Equity	:	60:40

Source: Argonaut

...assuming a production profile of ~170koz Au Eq...

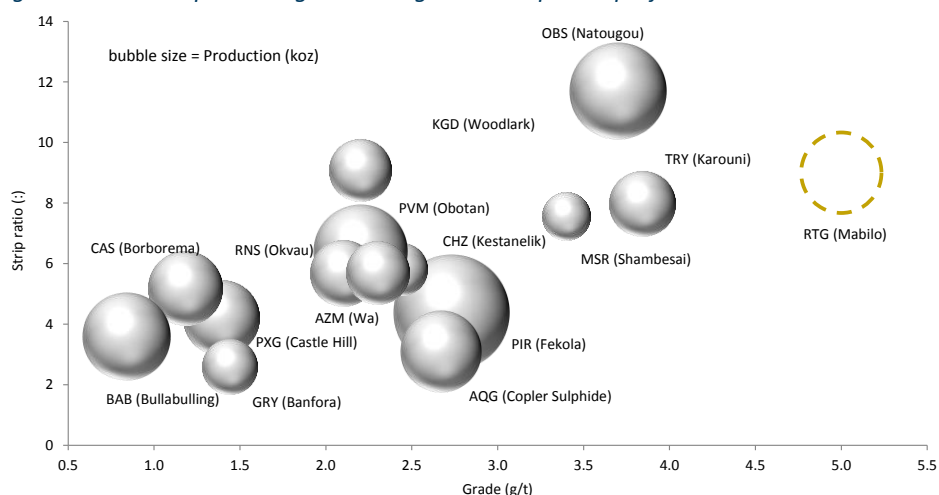
...utilising a 1.5Mtpa plant

The asset compares very competitively against peer ASX gold development asset...

## Standout asset

Given the high grades and the ability to open pit, the project compares competitively against peer ASX gold developers on strip / grade / production profile. Argonaut has assumed a head grade of 5.0g/t Au Eq (accounting for payabilities / recoveries) and a strip ratio of 9.0:1 in this comparison.

Figure 2: Peer comparison against ASX gold development projects



Source: Argonaut

...given very high grades and modest strip ratio

## Mabilo (diluting to 58% economic interest)

### Project location

**Mabilo is located within the Paracale mineral district...**

The project is located within the Paracale mineral district, ~300km southeast of Manila. Paracale is a historic gold province with total gold production estimated at ~5Moz. Government records show an estimated production of ~250koz pa prior to the Second World War from 12 gold mines, predominantly from narrow quartz-sulphide veins.

Figure 3: Mabilo project location and known mineralisation



Source: RTG

**...a historic gold province with ~5Moz produced...**

**...mostly from high grade quartz-sulphide veins**

### Maiden Resource

**Maiden Resource stands 2.0Moz @ 5.6g/t Au Eq**

The Company had rapidly delineated a maiden Resource of 2.0Moz Au Eq @ 5.6g/t Au Eq. The Resource was independently estimated by CSA Global.

Table 2: Mabilo Resource estimate

Mabilo Maiden Resource							
	Mt	Cu%	Au g/t	Ag g/t	Fe%	Au Eq g/t	Au Eq (koz)
Oxide	0.9	4.2	2.8	9.7	41.5	10.1	280
Fresh	10.5	1.6	1.9	10.7	44.4	5.2	1,749
<b>Total</b>	<b>11.4</b>	<b>1.8</b>	<b>2.0</b>	<b>10.6</b>	<b>44.2</b>	<b>5.6</b>	<b>2,028</b>

Source: RTG

### Geology

**The mineralisation is hosted in magnetite skarns as replacement of garnet skarn**

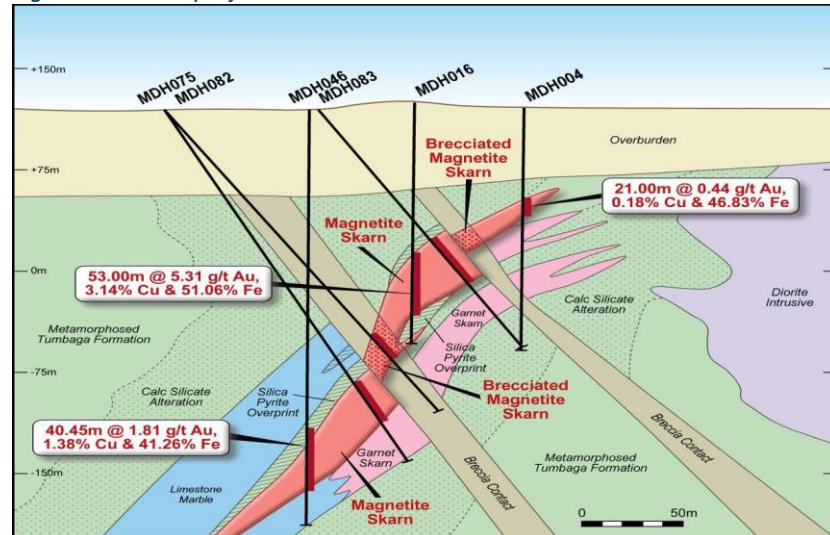
The mineralisation at Mabilo is hosted in magnetite skarns, which formed as replacement to garnet skarns. The predominant copper mineral is chalcopyrite and the gold is believed to be associated with the sulphide (metallurgical work progressing). The skarns are overlain with ~20-60m of younger volcanic rocks.



A supergene “blanket” developed at the paleo water table...

A supergene “blanket” has developed along the paleo water table (see Figure 6, page 6), which features a very high grade copper pod of 101kt @ 24% Cu.

Figure 4: Mabilo project location



Source: RTG

...features a very high grade copper component of 101kt @ 24% Cu

### Exploration Upside

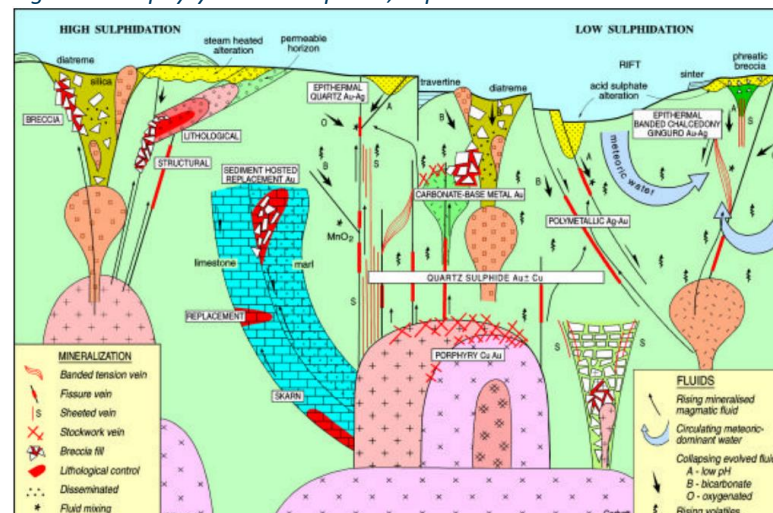
Exploration upside is tangible given district endowment and limited testing...

To date exploration efforts have been focused on magnetic targets, including the north and south ore bodies. They are not closed off down dip / strike and could offer further upside. Several other magnetics targets in the district remain to be tested. Given the district's endowment, Argonaut believes opportunities exist to define other types of mineralisation within the district. For instance, the intensive alteration and abundance of garnet could indicate proximity to an underlying, mineralised porphyry. RTG also has an Exploration Application over the eastern side of the intrusion.

In addition, there is known gold occurrences within the district to the north, currently being exploited by artisanal miners. Given the management's commercial acumen, Argonaut also anticipates further tenement consolidation in due course.

...particularly from other styles of mineralisation including epithermal gold and porphyry

Figure 5: Porphyry related deposits, exploration model



Source: Corbett, 2009, Anatomy of porphyry-related Au-Cu-Ag-Mo mineralised systems: Some exploration implications

**Infrastructure includes port (40km away)...**

### Infrastructure

Mabito benefits from extensive infrastructure including:

- The port of Jose Panganiban (~40km from site, capable of handling 50-100kt ships)
- Grid power (66kV line ~10km from project)
- Abundant rainfall / water supply
- Proximity to local towns which can provide labour

**...grid power, water and unskilled labour**

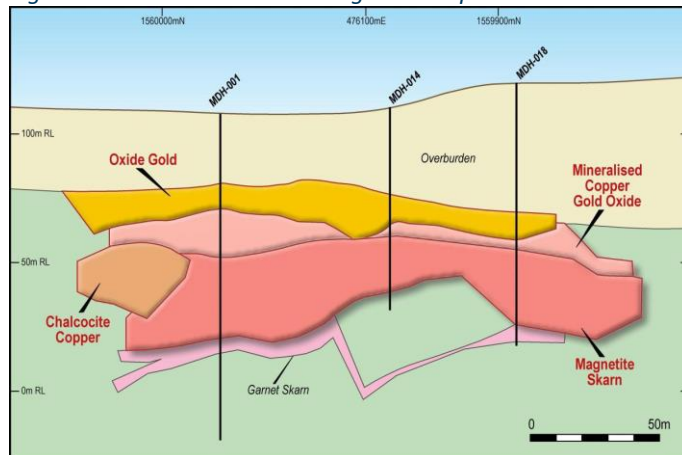
### Staged development / Mining

Given the presence of high grade supergene blanket, mining is envisaged to take place in two stages.

In the first stage, Argonaut envisages a DSO operation featuring a very high grade copper pod of 100kt @ 24% Cu, 2.3g/t Au and a separate gold rich component of 340k @ 3.2g/t Au. A Stage I DSO operation reduces upfront capex and hence significantly improves project IRR. On Argonaut's estimate the DSO operation generates ~A\$80-100m FCF.

**Development will likely be in two stages...**

*Figure 6: Mabito section showing oxide cap*



Source: Argonaut

**...with the first stage DSO component generating significant FCF to fund a processing plant**

Stage II will likely comprise a 1.0-1.5Mtpa flotation / magnetic separation plant. Initial metallurgical studies demonstrate high Cu (>90%) and Au recoveries, as well as the ability to produce a 23-25% Cu concentrate and a separate 69% Fe concentrate.

**Although the JV with Galeo somewhat reduces RTG's takeover appeal...**

### JV structure

The Mabito property is subject to a farm-in by a local partner, Galeo Equipment and Mining. Galeo is an established local mining services Company who services numerous Philippine operations including Masbate. Galeo can earn 36% economic interest by funding 14,000m of drilling. In addition, subject to certain conditions including shareholder approval, it can earn an additional 6% through mining of waste material.

**...benefits include local expertise and reduced upfront capital expenditure**

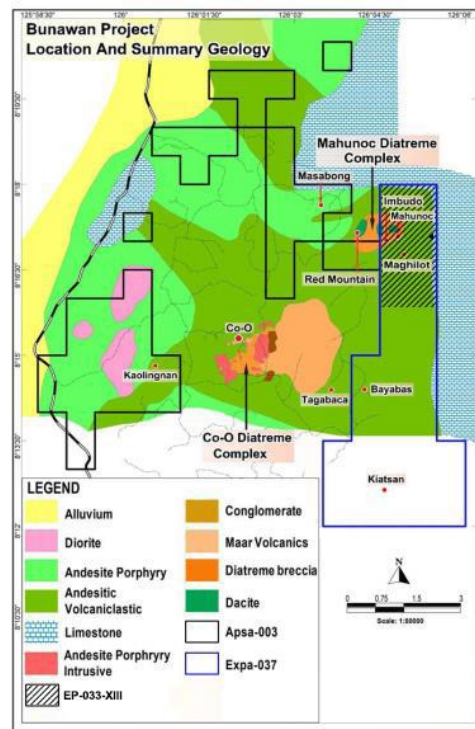
Although the JV somewhat suppresses RTG's appeal as a takeover target, significant benefits include the reduction of upfront capital requirement and additional Philippines expertise / support.

## Bunawan

The Bunawan property is located adjacent to MML's Co-O mine...

The Bunawan property consist of two tenements (partially granted) covering ~5,600ha, located 190km NNW of Davao in Mindanao and adjacent to MML's Co-O mine.

Figure 7: Bunawan location / geology map



Source: RTG

...in northern Mindanao, covering ~5,600ha...

...with geological setting being very similar to the neighbouring Co-O mine...

The geological setting is very similar to the operating Co-O, featuring a diatreme (volcanic pipe) believed to be similar to the one hosting the high grades at Co-O. The tenements cover multiple known high grade gold occurrences with significant artisanal mining activity in the Red Mountain to Muhunoc districts around the Mahunoc diatreme. This setting is considered very prospective for epithermal gold deposit.

Figure 8: Artisanal operations at Bunawan



Source: RTG

...previous work included mapping, rock chip sampling, a ground magnetic survey...

...drilling is currently underway

The Company has previously completed detailed exploration programs incorporating geological mapping, rock chip sampling, a ground magnetic survey and stream sediments sampling. A diamond drilling program has commenced.



## Management

**The board and management have an enviable track record...**

The Management team has an enviable track record, having developed seven gold mines in five jurisdictions, including the Philippines, Mongolia and Tanzania. Most recently, this team saw the successful US\$1.1b merger of CGA mining with BTO.

**...having developed 7 gold mines in 5 countries...**

### *Michael J Carrick – Non-Executive Chairman*

Michael is a Chartered Accountant with over 30 years of experience in the resources sector. He was previously Chairman and CEO of CGA Mining, Chairman of AGR and CEO of Resolute. Prior to joining Resolute, Michael was a senior international partner of Arthur Andersen. He has been responsible for the development of seven major gold mines in five countries, including the development of the first major gold mines in Tanzania and Mongolia, and most recently the largest gold mine in the Philippines.

**...and saw the US\$1.1b merger between CGA mining and BTO**

### *Justine A Magee - Executive Director and Chief Executive Officer*

Justine is a Chartered Accountant with extensive experience in the resource sector having headed the corporate and finance areas for Resolute Limited for 6 years. She was formerly with Arthur Andersen and a director of AGR Limited and director and CFO of CGA Mining. Ms Magee holds a Commerce Degree from the University of Western Australia.

**This experience should assist with the development...**

### *Mark Turner - Chief Operating Officer*

Mark is a Mining Engineer with 30 years' experience in the resources sector. Mark holds a degree in Mining Engineering from the University of New South Wales and is an AUSIMM Chartered Professional in Management. He has been responsible for the start-up and operation of mines in Australia, East and West Africa and Asia. He was previously General Manager Operations of Resolute Mining Ltd. He has also worked for Newcrest Mining Ltd and Hamersley Iron.

**...and the future operation at Mabilo**

### *Robert N Scott - Non Executive Director*

Robert is a Fellow of the Institute of Chartered Accountants in Australia with over 35 years' experience as a corporate advisor. Robert is a former senior partner of the KPMG and Arthur Andersen. Robert currently holds directorships on Sandfire Resources NL, Amadeus Energy Limited and Homeloans Limited.

### *Phil C Lockyer - Non Executive Director*

Phil is a Mining Engineer and Metallurgist with more than 40 years' experience in the mining industry, with an emphasis on gold and nickel, in both underground and open pit mining operations. Phil was employed by WMC Resources for 20 years reaching the position of General Manager of Western Australia responsible for that company's gold and nickel divisions. Mr Lockyer holds a directorship on Swick Mining Services Limited.

### *David A Cruse - Non Executive Director*

David has had a long career in commerce and finance. He was a stockbroker for over 20 years, where he held senior management positions and directorships in the stockbroking industry. Recently, Mr Cruse has been involved in the identification and commercialisation of a number of resource (including oil and gas) projects.

Management profiles adapted from [RTG's website](#).



## Risks

### Country risk

**Although Philippine is perceived as a high risk jurisdiction...**

Despite some recent progress in the Philippines, corruption continues to undermine prospects for long-term economic development. President Benigno Aquino took office in 2010 under a strong public mandate to implement economic and political reforms. Domestic insurgencies, terrorism and security issues in parts of Philippines (e.g. Western Mindanao) continue to negatively impact the Country's ability to attract investment. RTG's tenements are considered relatively low risk. The Fraser Institute ranks the investment climate (Policy Perception Index) in Philippines the second lowest in Oceania / Asia. Permitting time could also be uncertain.

**...a number of ASX / TSX companies operate successfully in country**

However, risks vary dramatically within the different Philippines Islands and is considered lower in Luzon, where Mabilo is located. Despite the risk, the prospectivity of the Country has attracted producers such as BTO, CGX and MML, some with operations situated in arguably more challenging locations than RTG's. The next presidential election is in May 2016.

**Recently proposed DSO ban is unlikely to affect RTG's Stage I operation**

### Proposed DSO ban

The country is prone to legislative changes. In particular, one senator recently proposed the consideration to ban direct shipment of ores. Argonaut's assessment demonstrated limited impact of this proposal on RTG, given the previous lack of support for such proposals (e.g. DSO bans were considered in EO79 but not enacted), considerable time required on law implementation and RTG's ability to rapidly develop a modest scale DSO operation.

**Operation is anticipated to be at a reduced rate during wet seasons**

### Typhoon belt

Mabilo is located within a typhoon belt. Although the topography, being relative flat, could support a year around operation, during typhoon seasons mining activities will likely be impacted.

**Project funding, exploration and development expenditures required in the near / medium term**

### Funding

The Company had a cash position of \$5.3m at 30<sup>th</sup> September. Although the Galeo farm-in alleviates some of the short term funding pressure, RTG will require capital to fund exploration (if RTG elects to commit to additional drilling at Bunawan) and future development activities. However, given asset quality and management's track record, Mabilo should attract project funding.

**RESEARCH:**

**Ian Christie** | Director, Industrial Research  
+61 8 9224 6872 [ichristie@argonaut.com](mailto:ichristie@argonaut.com)

**Philipp Kin** | Analyst, Oil & Gas Research  
+61 8 9224 6864 [pkinn@argonaut.com](mailto:pkinn@argonaut.com)

**Patrick Chang** | Analyst, Metals & Mining Research  
+61 8 9224 6835 [pchang@argonaut.com](mailto:pchang@argonaut.com)

**Emily Reilly** | Analyst, Industrial Research  
+61 8 9224 6809 [ereilly@argonaut.com](mailto:ereilly@argonaut.com)

**Matthew Keane** | Analyst, Metals & Mining Research  
+61 8 9224 6869 [mkeane@argonaut.com](mailto:mkeane@argonaut.com)

**INSTITUTIONAL SALES - PERTH:**

**Chris Wippl** | Executive Director, Head of Sales & Research  
+61 8 9224 6875 [cwippl@argonaut.com](mailto:cwippl@argonaut.com)

**John Santul** | Consultant, Sales & Research  
+61 8 9224 6859 [jsantul@argonaut.com](mailto:jsantul@argonaut.com)

**Troy Irvin** | Director, Institutional Research Sales  
+61 8 9224 6871 [tirvin@argonaut.com](mailto:tirvin@argonaut.com)

**Bryan Johnson** | Director, Institutional Research Sales  
+61 8 9224 6834 [bjohnson@argonaut.com](mailto:bjohnson@argonaut.com)

**Damian Rooney** | Senior Institutional Dealer  
+61 8 9224 6862 [drooney@argonaut.com](mailto:drooney@argonaut.com)

**Ben Willoughby** | Institutional Dealer  
+61 8 9224 6876 [bwiloughby@argonaut.com](mailto:bwiloughby@argonaut.com)

**INSTITUTIONAL SALES - HONG KONG:**

**Travis Smithson** | Managing Director - Asia  
+852 9832 0852 [tsmithson@argonaut.com](mailto:tsmithson@argonaut.com)

**Glen Gordon** | Institutional Research Sales  
+852 3557 4874 [ggordon@argonaut.com](mailto:ggordon@argonaut.com)

**CORPORATE AND PRIVATE CLIENT SALES:**

**Glen Colgan** | Executive Director, Desk Manager  
+61 8 9224 6874 [gcolgan@argonaut.com](mailto:gcolgan@argonaut.com)

**Kevin Johnson** | Executive Director, Corporate Stockbroking  
+61 8 9224 6880 [kjohnson@argonaut.com](mailto:kjohnson@argonaut.com)

**James McGlew** | Executive Director, Corporate Stockbroking  
+61 8 9224 6866 [jmcglew@argonaut.com](mailto:jmcglew@argonaut.com)

**Geoff Barnesby-Johnson** | Senior Dealer, Corporate Stockbroking  
+61 8 9224 6854 [gjb@argonaut.com](mailto:gjb@argonaut.com)

**Rob Healy** | Dealer, Private Clients  
+61 8 9224 6873, [rhealy@argonaut.com](mailto:rhealy@argonaut.com)

**Cameron Prunster** | Dealer, Private Clients  
+61 8 9224 6853 [cprunster@argonaut.com](mailto:cprunster@argonaut.com)

**James Massey** | Dealer, Private Clients  
+61 8 9224 6849 [jmassey@argonaut.com](mailto:jmassey@argonaut.com)

**Mark Sandford** | Dealer, Private Clients  
+61 8 9224 6868 [msandford@argonaut.com](mailto:msandford@argonaut.com)

**Charles Veall** | Dealer, Private Clients  
+61 8 9224 6840 [cveall@argonaut.com](mailto:cveall@argonaut.com)

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