

INDIA

National Aluminium

26 April 2007

NACL IN Underperform

Stock price as of 25 Apr 07	Rs	250.95
12-month target	Rs	188.00
Upside/downside	%	-25.1
Valuation	Rs	188.00
- PER		

GICS sector		materials
Market cap	Rs m	161,690
30-day avg turnover	Rs m	16.9
Market cap	US\$m	3,967
Number shares on issue	m	644.3

Investment fundamentals

Year end 31 Mar		2006A	2007E	2008E	2009E
Total revenue	m	48,888	61,002	52,122	53,734
EBITDA	m	25,990	36,092	25,936	23,441
EBITDA growth	%	20.5	38.9	-28.1	-9.6
Reported profit	m	15,765	22,168	15,474	13,596
EPS rep	Rs	24.47	34.41	24.02	21.10
EPS rep growth	%	27.7	40.6	-30.2	-12.1
PE rep	x	10.3	7.3	10.4	11.9
Total DPS	Rs	5.00	6.00	7.00	8.00
Total div yield	%	2.0	2.4	2.8	3.2
ROA	%	32.6	38.5	22.5	17.7
ROE	%	29.8	32.7	18.9	14.9
Net debt/equity	%	-37.2	-35.9	-3.6	-3.4
Price/book	x	2.7	2.1	1.9	1.7

NACL IN rel SENSEX performance, & rec history



Source: Datastream, Macquarie Research, April 2007 (all figures in INR unless noted)

Analyst

Rakesh Arora, CFA
91 22 6653 3054 rakesh.arora@macquarie.com
Arijay Prasad
91 22 6653 3052 arijay.prasad@macquarie.com

Catch the peak

Event

- **Strong results but may not last:** Nalco has declared strong and in line 4Q F3/07 results. However, we believe that the best is already past, at least for the next 18 months, and view the current buoyancy in the stock as a good opportunity to exit.

Impact

- **Strong 4Q FY3/07 results:** Net sales of Rs15.7bn grew 2% YoY. EBITDA of Rs8.8bn declined by 9% YoY. Net profit of Rs5.9bn declined by 3% YoY.
- **Aluminium division – strong despite odds:** The aluminium division, driven by 15% realisation gains YoY, was the strongest contributor, with a 177% increase in PBIT. Aluminium prices on the LME are 17% higher than our assumption of US\$2,425 per tonne for FY3/08, but we expect them to weaken as Chinese aluminium production grows by about 34% in CY2007.
- **Alumina division – to remain under pressure:** The alumina division's PBIT fell by 67% YoY. We expect this low profitability to continue and view today's spot alumina tender of US\$423 /t as an aberration since most bids were in the range of US\$340–370/t. Even the attempts to form a cartel in China to tackle large growth in alumina production, with a base price of US\$504/t, translates to an fob price of \$380/t. The strengthening rupee is also expected to contribute to lower export realisations.
- **Power division – shining bright:** Nalco started reporting the power segment separately from the aluminium division three quarters ago, and this has continued to surprise on the upside. The realisation jumped 34% QoQ from Rs1.45/unit to Rs1.94/unit. PBIT jumped by 92% QoQ.

Earnings revision

- No change.

Price catalyst

- 12-month price target: Rs188.00 based on a PER methodology.
- Catalyst: Weakening alumina prices and no volume growth for the next few years.

Action and recommendation

- **Maintain Underperform:** Based on flat volumes and an expected fall in aluminium and alumina realisations, we believe that Nalco is at the peak of its earning potential until its 30% capacity expansion comes on-stream in FY09. We strongly reaffirm our Underperform recommendation.
- **Valuations rich:** Based on FY3/08E, the stock is trading at a 10.5x PER, which we believe is quite high on both a standalone basis and in relation to Nalco's peers.

Please refer to the important disclosures on inside back cover of this document, or on our website www.macquarie.com.au/research/disclosures.

Analysis

Fig 1 Nalco 4QFY3/07 results summary

	4Q07	4Q06	YoY%	3Q07	QoQ%
Net Sales	15,668	15,380	2%	14,486	8%
EBITDA	8,798	9,705	-9%	8,449	4%
EBITDA Margin %	56%	63%		58%	
Depreciation	819	894	-8%	744	10%
Interest	-	-		-	
PBT (Operations)	7,980	8,811	-9%	7,705	4%
Other income	1,199	851	41%	978	23%
PBT (recurring)	9,178	9,663	-5%	8,684	6%
Non recurring income					
PBT (Total)	9,178	9,663	-5%	8,684	6%
Tax - recurring	3,270	3,582	-9%	2,958	11%
PAT	5,908	6,080	-3%	5,726	3%
EPS (Rs)	9.17	9.44	-3%	8.89	3%

	4Q07	4Q06	YoY%	3Q07	QoQ%
Alumina (tonnes)	395,700	403,400	-2%	382,200	4%
Aluminium (tonnes)	88,820	89,873	-1%	89,827	-1%
Electricity (MW)	1,537	1,549	-1%	1,483	4%
Alumina realisation (Rs/t)	13,561	25,076	-46%	15,108	-10%
Aluminium realisation (Rs/t)	126,643	109,832	15%	129,893	-3%
Electricity (Rs/kWh)	1.94	-	NA	1.45	34%
PBIT (Rs m)					
Alumina	2,535	7,760	-67%	3,615	-30%
Aluminium	4,487	1,617	177%	3,618	24%
Electricity	1,577	-	NA	820	92%

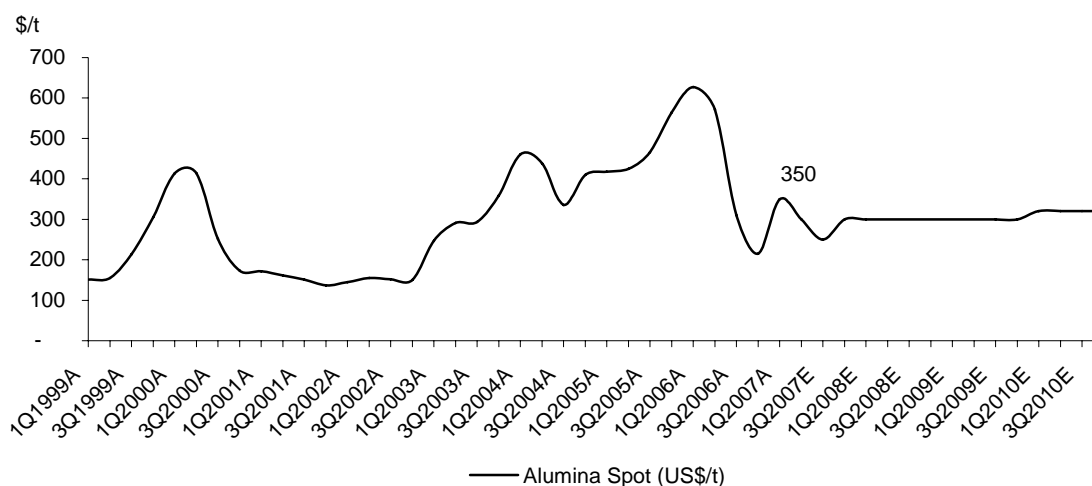
Source: Macquarie Research, April 2007

Nalco's alumina division represents 47% of total revenues and 28% of total EBIT.

Alumina to remain weak

Huge growth in Chinese alumina production pushed the alumina market into surplus in early 2006. Spot prices collapsed from US\$650 per tonne to US\$200 per tonne, but bounced back after that. Nalco itself executed tenders at US\$350 per tonne. Our global commodities team does not expect this rebound to continue and expects alumina prices to hover around US\$300 per tonne for the next few years.

Fig 2 Alumina expected to remain weak going forward



Source: Macquarie Research, April 2007

National Aluminium Company (NACL IN, Underperform, Target price: Rs188.00)

Quarterly Results					Profit & Loss						
		3Q/07A	4Q/07E	1Q/08E	2Q/08E		2006A	2007E	2008E	2009E	
Revenue	m	15,250	15,250	13,030	13,030	Revenue	m	48,888	61,002	52,122	53,734
Gross Profit	m	9,725	9,725	7,219	7,219	Gross Profit	m	28,356	38,900	28,877	26,741
Cost of Goods Sold	m	5,525	5,525	5,811	5,811	Cost of Goods Sold	m	20,532	22,102	23,245	26,993
EBITDA	m	9,023	9,023	6,484	6,484	EBITDA	m	25,990	36,092	25,936	23,441
Depreciation	m	958	958	968	968	Depreciation	m	3,772	3,830	3,873	4,423
Amortisation of Goodwill	m	0	0	0	0	Amortisation of Goodwill	m	0	0	0	0
Other Amortisation	m	0	0	0	0	Other Amortisation	m	0	0	0	0
EBIT	m	8,065	8,065	5,516	5,516	EBIT	m	22,217	32,262	22,063	19,018
Net Interest Income	m	0	0	0	0	Net Interest Income	m	0	0	0	0
Associates	m	0	0	0	0	Associates	m	0	0	0	0
Exceptionals	m	0	0	0	0	Exceptionals	m	0	0	0	0
Forex Gains / Losses	m	0	0	0	0	Forex Gains / Losses	m	0	0	0	0
Other Pre-Tax Income	m	544	544	494	494	Other Pre-Tax Income	m	2,222	2,175	1,974	2,103
Pre-Tax Profit	m	8,609	8,609	6,009	6,009	Pre-Tax Profit	m	24,439	34,437	24,037	21,121
Tax Expense	m	-3,067	-3,067	-2,141	-2,141	Tax Expense	m	-8,674	-12,269	-8,564	-7,525
Net Profit	m	5,542	5,542	3,868	3,868	Net Profit	m	15,765	22,168	15,474	13,596
Minority Interests	m	0	0	0	0	Minority Interests	m	0	0	0	0
Reported Earnings	m	5,542	5,542	3,868	3,868	Reported Earnings	m	15,765	22,168	15,474	13,596
Adjusted Earnings	m	5,542	5,542	3,868	3,868	Adjusted Earnings	m	15,765	22,168	15,474	13,596
EPS (rep)		8.60	8.60	6.00	6.00	EPS (rep)		24.47	34.41	24.02	21.10
EPS (adj)		8.60	8.60	6.00	6.00	EPS (adj)		24.47	34.41	24.02	21.10
EPS Growth yoy (adj)	%	41.0	-10.6	-30.2	-30.2	EPS Growth (adj)	%	27.7	40.6	-30.2	-12.1
						PE (rep)	x	10.3	7.3	10.4	11.9
						PE (adj)	x	10.3	7.3	10.4	11.9
EBITDA Margin	%	59.2	59.2	49.8	49.8	Total DPS		5.00	6.00	7.00	8.00
EBIT Margin	%	52.9	52.9	42.3	42.3	Total Div Yield	%	2.0	2.4	2.8	3.2
Earnings Split	%	25.0	25.0	25.0	25.0	Weighted Average Shares	m	644	644	644	644
Revenue Growth	%	15.1	-0.9	-14.6	-14.6	Period End Shares	m	644	644	644	644
EBIT Growth	%	40.8	-10.2	-31.6	-31.6						
Profit and Loss Ratios					Cashflow Analysis						
		2006A	2007E	2008E	2009E		2006A	2007E	2008E	2009E	
Revenue Growth	%	18.5	24.8	-14.6	3.1	EBITDA	m	25,550	36,092	25,936	23,441
EBITDA Growth	%	20.5	38.9	-28.1	-9.6	Tax Paid	m	-8,228	-12,269	-8,564	-7,525
EBIT Growth	%	31.1	45.2	-31.6	-13.8	Chgs in Working Cap	m	-378	-7,453	25,902	-247
Gross Profit Margin	%	58.0	63.8	55.4	49.8	Net Interest Paid	m	0	0	0	0
EBITDA Margin	%	53.2	59.2	49.8	43.6	Other	m	2,425	2,175	1,974	2,103
EBIT Margin	%	45.4	52.9	42.3	35.4	Operating Cashflow	m	19,370	18,545	45,248	17,772
Net Profit Margin	%	32.2	36.3	29.7	25.3	Acquisitions	m	0	0	0	0
Payout Ratio	%	20.4	17.4	29.1	37.9	Capex	m	-2,331	-13,638	-13,638	-13,638
EV/EBITDA	x	5.2	3.7	5.2	5.7	Asset Sales	m	0	0	0	0
EV/EBIT	x	6.0	4.2	6.1	7.1	Other	m	0	0	0	0
Balance Sheet Ratios						Investing Cashflow	m	-2,331	-13,638	-13,638	-13,638
ROE	%	29.8	32.7	18.9	14.9	Dividend (Ordinary)	m	-2,939	-4,318	-4,962	-5,606
ROA	%	32.6	38.5	22.5	17.7	Equity Raised	m	0	0	0	0
ROIC	%	36.3	56.1	28.9	14.5	Debt Movements	m	0	0	0	0
Net Debt/Equity	%	-37.2	-35.9	-3.6	-3.4	Other	m	0	0	0	0
Interest Cover	x	nmf	nmf	nmf	nmf	Financing Cashflow	m	-2,939	-4,318	-4,962	-5,606
Price/Book	x	2.7	2.1	1.9	1.7	Net Chg in Cash/Debt	m	14,101	589	26,648	-1,472
Book Value per Share		91.5	119.2	135.5	147.9						
					Balance Sheet						
		2006A	2007E	2008E	2009E		2006A	2007E	2008E	2009E	
Cash	m	21,937	27,581	3,127	3,224	Cash	m	21,937	27,581	3,127	3,224
Receivables	m	294	370	316	326	Receivables	m	294	370	316	326
Inventories	m	5,916	7,438	6,355	6,552	Inventories	m	5,916	7,438	6,355	6,552
Investments	m	0	589	27,237	25,765	Investments	m	0	589	27,237	25,765
Fixed Assets	m	41,767	51,575	61,341	70,556	Fixed Assets	m	41,767	51,575	61,341	70,556
Intangibles	m	0	0	0	0	Intangibles	m	0	0	0	0
Other Assets	m	4,832	5,137	4,920	4,959	Other Assets	m	4,832	5,137	4,920	4,959
Total Assets	m	74,746	92,690	103,296	111,382	Total Assets	m	74,746	92,690	103,296	111,382
Payables	m	6,073	6,134	6,195	6,257	Payables	m	6,073	6,134	6,195	6,257
Short Term Debt	m	0	0	0	0	Short Term Debt	m	0	0	0	0
Long Term Debt	m	0	0	0	0	Long Term Debt	m	0	0	0	0
Provisions	m	3,328	3,361	3,395	3,429	Provisions	m	3,328	3,361	3,395	3,429
Other Liabilities	m	6,417	6,417	6,417	6,417	Other Liabilities	m	6,417	6,417	6,417	6,417
Total Liabilities	m	15,819	15,913	16,008	16,104	Total Liabilities	m	15,819	15,913	16,008	16,104
Shareholders' Funds	m	58,927	76,777	87,288	95,278	Shareholders' Funds	m	58,927	76,777	87,288	95,278
Minority Interests	m	0	0	0	0	Minority Interests	m	0	0	0	0
Other	m	0	0	0	0	Other	m	0	0	0	0
Total S/H Equity	m	58,927	76,777	87,288	95,278	Total S/H Equity	m	58,927	76,777	87,288	95,278
Total Liab & S/H Funds	m	74,746	92,690	103,296	111,382	Total Liab & S/H Funds	m	74,746	92,690	103,296	111,382

All figures in INR unless noted.

Source: Macquarie Research, April 2007

Important disclosures:

Recommendation definitions

Macquarie Australia/New Zealand

Outperform – return >5% in excess of benchmark return (>2.5% in excess for listed property trusts)
 Neutral – return within 5% of benchmark return (within 2.5% for listed property trusts)
 Underperform – return >5% below benchmark return (>2.5% below for listed property trusts)

Macquarie Asia

Outperform – expected return >+10%
 Neutral – expected return from -10% to +10%
 Underperform – expected return <-10%

Macquarie First South Securities (South Africa)

Outperform – expected return >+5%
 Neutral – expected return from -5% to +5%
 Underperform – expected return <-5%

Recommendations – 12 months

Note: Quant recommendations may differ from Fundamental Analyst recommendations

Recommendation proportions

	AU/NZ	Asia	RSA
Outperform	44.37%	58.37%	42.60%
Neutral	44.01%	21.30%	46.80%
Underperform	11.62%	20.33%	10.60%

For quarter ending 31 March 2007

Volatility index definition*

This is calculated from the volatility of historic price movements.

Very high–highest risk – Stock should be expected to move up or down 60–100% in a year – investors should be aware this stock is highly speculative.

High – stock should be expected to move up or down at least 40–60% in a year – investors should be aware this stock could be speculative.

Medium – stock should be expected to move up or down at least 30–40% in a year.

Low–medium – stock should be expected to move up or down at least 25–30% in a year.

Low – stock should be expected to move up or down at least 15–25% in a year.

* Applicable to Australian/NZ stocks only

Financial definitions

All "Adjusted" data items have had the following adjustments made:
 Added back: goodwill amortisation, provision for catastrophe reserves, IFRS derivatives & hedging, IFRS impairments & IFRS interest expense
 Excluded: non recurring items, asset revals, property revals, appraisal value uplift, preference dividends & minority interests

EPS = adjusted net profit / efpowa*

ROA = adjusted ebit / average total assets

ROA Banks/Insurance = adjusted net profit / average total assets

ROE = adjusted net profit / average shareholders funds

Gross cashflow = adjusted net profit + depreciation

*equivalent fully paid ordinary weighted average number of shares

All Reported numbers for Australian/NZ listed stocks are modelled under IFRS (International Financial Reporting Standards).

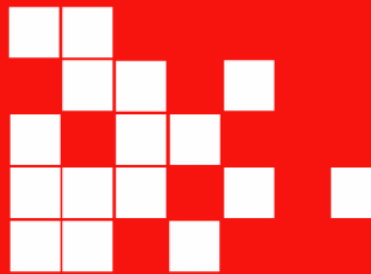
Analyst Certification: The views expressed in this research accurately reflect the personal views of the analyst(s) about the subject securities or issuers and no part of the compensation of the analyst(s) was, is, or will be directly or indirectly related to the inclusion of specific recommendations or views in this research. The analyst principally responsible for the preparation of this research receives compensation based on overall revenues, including investment banking revenues, of Macquarie Bank Ltd ABN 46 008 583 542 (AFSL No.237502)("Macquarie") and its related entities ("the Macquarie group") and has taken reasonable care to achieve and maintain independence and objectivity in making any recommendations.

Disclaimers: Macquarie Securities (Australia) Ltd; Macquarie Europe Ltd; Macquarie Securities (USA) Inc; Macquarie Securities Ltd; Macquarie Securities (Singapore) Pte Ltd; and Macquarie Securities (New Zealand) Ltd are not authorised deposit-taking institutions for the purposes of the Banking Act 1959 (Commonwealth of Australia), and their obligations do not represent deposits or other liabilities of Macquarie. Macquarie provides a guarantee to the Monetary Authority of Singapore in respect of Macquarie Securities (Singapore) Pte Ltd for up to SGD25m under the Securities and Futures Act (Chapter 289). Macquarie does not otherwise guarantee or provide assurance in respect of the obligations of any of the above mentioned entities. This research has been prepared for the general use of the wholesale clients of the Macquarie group and must not be copied, either in whole or in part, or distributed to any other person. If you are not the intended recipient you must not use or disclose the information in this research in any way. Nothing in this research shall be construed as a solicitation to buy or sell any security or product, or to engage in or refrain from engaging in any transaction. In preparing this research, we did not take into account the investment objectives, financial situation and particular needs of the reader. Before making an investment decision on the basis of this research, the reader needs to consider, with or without the assistance of an adviser, whether the advice is appropriate in light of their particular investment needs, objectives and financial circumstances. There are risks involved in securities trading. The price of securities can and does fluctuate, and an individual security may even become valueless. International investors are reminded of the additional risks inherent in international investments, such as currency fluctuations and international stock market or economic conditions, which may adversely affect the value of the investment. This research is based on information obtained from sources believed to be reliable but we do not make any representation or warranty that it is accurate, complete or up to date. We accept no obligation to correct or update the information or opinions in it. Opinions expressed are subject to change without notice. No member of the Macquarie group accepts any liability whatsoever for any direct, indirect, consequential or other loss arising from any use of this research and/or further communication in relation to this research.

Other Disclaimers: Securities research is issued and distributed by Macquarie Securities (Australia) Ltd (AFSL No. 238947) in Australia, a participating organisation of the Australian Stock Exchange; Macquarie Securities (New Zealand) Ltd in New Zealand, a licensed sharebroker and New Zealand Exchange Firm; Macquarie Europe Ltd in the United Kingdom, which is authorised and regulated by the Financial Services Authority (No. 193905); Macquarie Securities Ltd in Hong Kong, which is licensed and regulated by the Securities and Futures Commission; Macquarie Securities (Japan) Limited in Japan, a member of the Tokyo Stock Exchange, Inc. and Osaka Securities Exchange Co., Ltd and in Singapore, Macquarie Securities (Singapore) Pte Ltd (Company Registration Number: 198702912C), a Capital Markets Services licence holder under the Securities and Futures Act to deal in securities and provide custodial services in Singapore. Pursuant to the Financial Advisers (Amendment) Regulations 2005, Macquarie Securities (Singapore) Pte Ltd is exempt from complying with sections 25, 27 and 36 of the Financial Advisers Act. Economic research is issued and distributed in Australia by Macquarie; in New Zealand by Macquarie Securities (New Zealand) Ltd and in the United Kingdom by Macquarie Europe Ltd. Clients should contact analysts at, and execute transactions through, a Macquarie group entity in their home jurisdiction unless governing law permits otherwise. This research may be distributed in the United States only to major institutional investors and may not be circulated to any other person in the United States. Macquarie Securities (USA) Inc., which is a registered broker-dealer and member of the NASD, accepts responsibility for the content of each research report prepared by one of its non-US affiliates when the research report is distributed in the United States by Macquarie Securities (USA) Inc. All transactions by US investors involving securities discussed in this report must be effected through Macquarie Securities (USA) Inc. The information contained in this email is confidential. If you are not the intended recipient, you must not disclose or use the information in this email in any way. If you received it in error, please tell us immediately by return e-mail and delete the document. We do not guarantee the integrity of any e-mails or attached files and are not responsible for any changes made to them by any other person. Disclosures with respect to the issuers, if any, mentioned in this research are available at www.macquarie.com/research/disclosures. © Macquarie Group

Auckland Tel: (649) 377 6433	Bangkok Tel: (662) 694 7999	Hong Kong Tel: (852) 2823 3588	Jakarta Tel: (62 21) 515 1818	Johannesburg Tel: (27 11) 343 2258	Kuala Lumpur Tel: (60 3) 2059 8833
London Tel: (44 20) 7065 2000	Manila Tel: (63 2) 857 0888	Melbourne Tel: (613) 9635 8139	Mumbai Tel: (91 22) 6653 3000	New York Tel: (1 212) 231 2500	Perth Tel: (618) 9224 0888
Seoul Tel: (82 2) 3705 8500	Shanghai Tel: (86 21) 6841 3355	Singapore Tel: (65) 6231 1111	Sydney Tel: (612) 8232 9555	Taipei Tel: (886 2) 2734 7500	Tokyo Tel: (81 3) 3512 7900

Available to clients on the world wide web at www.macquarie.com/research and through Thomson Financial, Reuters and Bloomberg.



Research

Automobiles/Auto Parts

Kurt Sanger (Japan, Asia)	(813) 3512 7859
Deepak Jain (India)	(9122) 6653 3157
Liny Halim (Indonesia)	(6221) 515 7343
Toshisuke Hayami (Japan)	(813) 3512 7873
Eunsook Kwak (Korea)	(822) 3705 8644

Banks and Non-Bank Financials

Ismael Pili (Asia)	(65) 6231 2840
Nick Lord (Asia)	(852) 2823 4774
Christina Fok (China)	(852) 2823 3584
Chris Esson (Hong Kong)	(852) 2823 3567
Seshadri Sen (India)	(9122) 6653 3053
Liny Halim (Indonesia)	(6221) 515 7343
Kentaro Kogi (Japan)	(813) 3512 7865
Hwashin Lee (Korea)	(822) 3705 4994
Mark Barclay (Korea)	(822) 3705 8658
Young Chung Mok (Korea)	(822) 3705 8668
Chin Seng Tay (Malaysia, S'pore)	(65) 6231 2837
Gilbert Lopez (Philippines)	(632) 857 0898
Chris Hunt (Taiwan)	(8862) 2734 7526
Matthew Smith (Taiwan)	(8862) 2734 7514
Alastair Macdonald (Thailand)	(662) 694 7741

Chemicals/Textiles

Scott Weaver (China, Taiwan)	(8862) 2734 7512
Jal Irani (India)	(9122) 6653 3040
Kitti Nathisuwan (Thailand)	(662) 694 7724

Conglomerates

Gary Pinge (Asia)	(852) 2823 3557
Gilbert Lopez (Philippines)	(632) 857 0898

Consumer

Ramiz Chelat (Asia)	(852) 2823 3587
Xiaopo Wei (China)	(852) 2823 4741
Nicolas Wang (Hong Kong)	(852) 2823 4625
Unmesh Sharma (India)	(9122) 6653 3042
Sarina Lesmina (Indonesia)	(6221) 515 7339
Duane Sandberg (Japan)	(813) 3512 7867
Christina Lee (Korea)	(822) 3705 8670
Paul Hwang (Korea)	(822) 3705 8678
Woochang Chung (Korea)	(822) 3705 8667
Edward Ong (Malaysia)	(603) 2059 8982
Nadine Javellana (Philippines)	(632) 857 0890

Emerging Leaders

Paul Quah (Hong Kong)	(852) 2823 4627
Saurabh Jain (India)	(9122) 6653 3046
Oliver Cox (Japan)	(813) 3512 7871
Robert Burghart (Japan)	(813) 3512 7853
Paul Hwang (Korea)	(822) 3705 8678
Woochang Chung (Korea)	(822) 3705 8667
Nadine Javellana (Philippines)	(632) 857 0890
Jeremy Chen (Taiwan)	(8862) 2734 7521
Scott Weaver (Taiwan)	(8862) 2734 7512

Insurance

Chris Esson (China, Taiwan)	(852) 2823 3567
-----------------------------	-----------------

Sales

Regional Heads of Sales

Greg Gordon (Asia)	(852) 2823 3509
Peter Slater (Boston)	(1 617) 217 2103
Michelle Paisley (China, Hong Kong)	(852) 2823 3516
Ulrike Pollak-Tsutsumi (Frankfurt)	(49) 69 7593 8747
Daniel Fust (Geneva)	(41) 22 818 7710
Thomas Renz (Geneva)	(41) 22 818 7712
Ajay Bhatia (India)	(9122) 6653 3200
Stuart Smythe (India)	(9122) 6653 3200
Eugene Ha (Korea)	(822) 3705 8643
K.Y. Nam (Korea)	(822) 3705 8607
Derek Wilson (London)(N Asia)	(44) 20 7065 5856
Julien Roux (London)	(44) 20 7065 5887
Lena Yong (Malaysia)	(603) 2059 8888
Ismael Pili (Philippines)	(65) 6231 2840
Greg Norton-Kidd (New York)	(1 212) 231 2527

Media

Ramiz Chelat (Asia)	(852) 2823 3587
Prem Jearajasingam (Malaysia)	(603) 2059 8989

Metals and Mining

Simon Francis (Asia)	(852) 2823 3590
Rakesh Arora (India)	(9122) 6653 3054
Adam Worthington (Indonesia)	(6221) 515 7338
Christina Lee (Korea)	(822) 3705 8670
Amornrat Cheevavichawalkul (Thai)	(662) 694 7829

Oil and Gas

David Johnson (Asia)	(852) 2823 4691
Scott Weaver (China, Taiwan)	(8862) 2734 7512
Jal Irani (India)	(9122) 6653 3040
Mark Barclay (Korea)	(822) 3705 8658
Edward Ong (Malaysia)	(603) 2059 8982
Kitti Nathisuwan (Thailand)	(662) 694 7724

Pharmaceuticals

Shubham Majumder (India)	(9122) 6653 3049
--------------------------	------------------

Property

Matt Nacard (Asia)	(852) 2823 4731
Eva Lee (Hong Kong, China)	(852) 2823 3573
Siddhartha Gupta (India)	(9122) 6653 3048
Chang Han Joo (Japan)	(813) 3512 7885
Gilbert Lopez (Philippines)	(632) 857 0898
Tuck Yin Soong (Singapore)	(65) 6231 2838
Corinne Jian (Taiwan)	(8862) 2734 7529
Monchai Jaturanpinyo (Thailand)	(662) 694 7727

Technology

Warren Lau (Asia)	(852) 2823 3592
Suveer Chainani (India)	(9122) 6653 3045
Damian Thong (Japan)	(813) 3512 7877
David Gibson (Japan)	(813) 3512 7880
George Chang (Japan)	(813) 3512 7854
Yoshihiro Shimada (Japan)	(813) 3512 7862
Do Hoon Lee (Korea)	(822) 3705 8641
Michael Bang (Korea)	(822) 3705 8659
Patrick Yau (Singapore)	(65) 6231 2835
Cheryl Hsu (Taiwan)	(8862) 2734 7522
Daniel Chang (Taiwan)	(8862) 2734 7516
Dominic Grant (Taiwan)	(8862) 2734 7528
Jessica Chang (Taiwan)	(8862) 2734 7518
Nicholas Teo (Taiwan)	(8862) 2734 7523

Telecoms

Tim Smart (Asia)	(852) 2823 3565
Jake Lynch (China, Hong Kong)	(852) 2823 3583
Shubham Majumder (India)	(9122) 6653 3049
Richard Moe (Indonesia)	(662) 694 7753
Nathan Ramler (Japan)	(813) 3512 7875
Joel Kim (Korea)	(822) 3705 8677
Prem Jearajasingam (Malaysia)	(603) 2059 8989
Ramakrishna Maruvada (Philippines, Singapore)	(65) 6231 2842
Dominic Grant (Taiwan)	(8862) 2734 7528
Richard Moe (Thailand)	(662) 694 7753

Regional Heads of Sales cont'd

Luke Sullivan (New York)	(1 212) 231 2507
Mark Lawrence (New York)	(1 212) 231 2516
Sheila Schroeder (San Francisco)	(1 415) 835 1235
Giles Heyring (Singapore)	(65) 6231 2888
Mark Duncan (Taiwan)	(8862) 2734 7510
Angus Kent (Thailand)	(662) 694 7601
Dominic Henderson (Tokyo)	(813) 3512 7820
Nick Cant (Tokyo)	(813) 3512 7821
Charles Nelson (UK/Europe)	(44) 20 7065 2032
Rob Fabbro (UK/Europe)	(44) 20 7065 2031

Sales Trading

Anthony Wilson (Asia)	(852) 2823 3511
Mona Lee (Hong Kong)	(852) 2823 3519
Stuart Goddard (Europe)	(44) 20 7065 2033
Brendan Rake (India)	(9122) 6653 3204

Transport & Logistics

Paul Huxford (Asia)	(65) 6231 2841
Michael Chan (Asia)	(852) 2823 3595
Anderson Chow (China, Hong Kong)	(852) 2823 4773
Bin Liu (China)	(852) 2823 4761
Eunsook Kwak (Korea)	(822) 3705 8644

Utilities

Sylvia Chan (Asia)	(852) 2823 3579
Gopal Ritolia (India)	(9122) 6653 3055
Adam Worthington (Indonesia)	(6221) 515 7338
Prem Jearajasingam (Malaysia)	(603) 2059 8989
Dante Tinga (Philippines)	(632) 857 0815

Commodities

Jim Lennon	(4420) 7065 2014
Adam Rowley	(4420) 7065 2013
Max Layton	(4420) 7065 2000
Bonnie Liu	(4420) 7065 2014
Henry Liu	(4420) 7065 2014

Data Services

Liz Dinh (Asia)	(852) 2823 4762
Brent Borger (Japan)	(813) 3512 7852

Economics

Roland Randall (Asean)	(852) 2823 3572
Bill Belchere (Asia)	(852) 2823 4636
Eli Polatinsky (Asia)	(852) 2823 4074
Richard Gibbs (Australia)	(612) 8232 3935
Paul Cavey (China)	(852) 2823 3570
Richard Jerram (Japan)	(813) 3512 7855

Quantitative

Martin Emery (Asia)	(852) 2823 3582
Viking Kwok (Asia)	(852) 2823 4735
George Platt (Australia)	(612) 8232 6539

Strategy/Country

Tim Rocks (Asia)	(852) 2823 3585
Daniel McCormack (Asia)	(852) 2823 4073
Desh Peramunetilleke (Asia)	(852) 2823 3564
Jake Lynch (China)	(852) 2823 3583
Seshadri Sen (India)	(9122) 6653 3053
Peter Eadon-Clarke (Japan)	(813) 3512 7850
Eugene Ha (Korea)	(822) 3705 8643
Uday Jayaram (Malaysia)	(603) 2059 8988
Gilbert Lopez (Philippines)	(632) 857 0898
Tuck Yin Soong (Singapore)	(65) 6231 2838
Chris Hunt (Taiwan)	(8862) 2734 7526
Kitti Nathisuwan (Thailand)	(662) 694 7724

Find our research at

Macquarie:	www.macquarie.com.au/research
Thomson:	www.thomson.com/financial
Reuters:	www.rbr.reuters.com
Bloomberg:	MAC GO
Email	macresearch@macquarie.com for access

Sales Trading cont'd

Howard Yoon (Korea)	(822) 3705 8601
Ed Robinson (London)	(44) 20 7065 5883
Robert Risman (New York)	(1 212) 231 2555
Isaac Huang (Taiwan)	(8862) 2734 7582
Kenichi Ohtaka (Tokyo)	(813) 3512 7830

Index Sales

Margaret Hartmann	(612) 8232 9834
-------------------	-----------------

Alternative Strategies

Convertibles - Roland Sharman	(852) 2823 4628
Depository Receipts - Robert Ansell	(852) 2823 4688
Derivatives - Vipul Shah	(852) 2823 3523
Futures - Tim Smith	(852) 2823 4637
Hedge Fund Sales - Darin Lester	(852) 2823 4736
Structured Products - Andrew Terlich	(852) 2249 3225