HEALTH CARE & PHARMACEUTICALS

January 9, 2013

## End of the recovery chapter? Over-expansion amid swelling costs and unstable economy – a 2007/08 replay?

#### Weakening pricing power from a likely over-expansion misstep

High demand for nitrile gloves in 2011 prompted Malaysian rubber glovemakers to expand aggressively, with a focus on the synthetic material. We estimate total capacity for all rubber glove types of the four local market leaders will expand at a CAGR of 13.9% in 2012-15F (c.26.0% for nitrile). Such anticipated expansion is well ahead of the historical global rubber glove demand CAGR of 8.4% over 2000-11. While we do not envisage shrinking rubber glove demand, we expect potentially lower utilisation and pricing power, limiting top-line growth prospects. We expect some margin erosion for glove-makers as we see supply outpacing demand in the nitrile market – the main issue underpinning our Bearish view on the sector.

#### Cost structure makeover: Likely unfavourable in the short term

Ventures into the nitrile segment should reduce manufacturers' exposure to latex prices, thus earnings could be increasingly sensitive to nitrile raw material prices, particularly to up-trends given that pass-on rates will likely be trimmed as expansion accelerates. While we expect latex prices to remain soft in the year ahead, we foresee more volatile nitrile raw material prices as a result of an anticipated butadiene supply shortage.

#### Uncertainties globally; limited near-term growth opportunities

While economic growth in the US and Europe remains shaky, emerging economies are widely expected by the market to cool off. Much of the anticipated industry growth stems from the highly populated China and India, but we think healthcare reforms in these regions remain as longerterm catalysts. Malaysian glove-makers should thus see only limited upside surprises at the revenue level in the year ahead, in our view.

#### Divergence from bullish Street; initiate with Bearish sector view

Consensus (Bloomberg) is optimistic, with average FY13F/ FY14F EPS forecast growth at 12.2%/12.9% for the four listed Malaysian glovemakers, on expectations of volume growth and low raw material costs, we believe. We are less upbeat considering the weak macro outlook, with forecasts of 9.5%/9.0%. Whilst bottom lines could see a boost from low latex prices, we think mounting pricing pressure and potential increases in nitrile raw material prices are not fully priced in. Our projections of a weakening USD against MYR spell slowing top-line growth, too.

#### Fig. 1: Stocks For Action

		Price (4 Jan)	TP	Potential
Stock	Rating	(local)	(local)	up/downside (%)
HART MK	Reduce	4.84	4.15	-14.3%
KRI MK	Neutral	3.36	3.80	13.1%
SUCB MK	Reduce	2.00	1.90	-5.0%
TOPG MK	Neutral	5.64	5.65	0.2%

Source: Nomura research, Bloomberg; Note: Pricing as of Jan.4,2013

#### Anchor themes

With competition set to increase significantly in the year ahead particularly in the NBR segment - we foresee lower pricing power for glovemakers. We expect lower margins for NBRfocused manufacturers as a result of ASP downward revisions.

#### Nomura vs consensus

We initiate on the sector with a Bearish view as we think mounting pricing pressure and potentially higher nitrile raw material prices are not fully priced in.

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See Appendix A-1 for analyst certification, important disclosures and the status of non-US analysts.

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### **Executive summary**

## Over-expansion amid swelling costs and unstable economy – a 2007/08 replay?

Rubber glove stocks in Malaysia have largely recovered from their previously depressed levels with a 47.7% rally on average from their September 2011 lows – compared to the KLCI's 22.5% gain over the same period (Oct.1<sup>st</sup>, 2011 to Jan.2<sup>nd</sup>, 2013). We believe that this took place on the back of recuperating demand and easing raw material costs, as latex prices fell by 25.0% over the same time horizon. In this context, we assess the sector outlook by taking into account the timing of rapid expansions in the midst of a shaky global economy, together with the impact of an altered cost structure arising from the switch into nitrile. Based on this, we initiate coverage of Hartalega and Supermax with Reduce ratings, while Kossan and Top Glove with Neutral ratings.

#### Weakening pricing power from a likely over-expansion misstep

While we agree with the general Street view that development of the nitrile segment still has a long way to go, we think that the pace of the planned capacity expansion will invite a margin squeeze from downward pricing pressure. The manufacturers we have spoken with acknowledge this apparent challenge, but continue to forge ahead with their respective expansion plans on ambitions to gain or maintain market share.

We see pass-on rates trending downward amid cost inflation as producers are likely to lower selling prices to prevent production lines from lying idle. On average, we forecast net margin to drop in FY13F/FY14F by 0.24pp/0.36pp from the previous years' averages. We note that our margin forecasts for FY13-14F are about 1pp above those achieved over the 2007/08 period, on average, despite the industry facing similar challenges in both periods. This, in our view, owes mainly to improved operating efficiencies – primarily the result of automated production lines.

## Cost structure makeover: Likely unfavourable in the short term

Haunted by surging natural rubber (NR) latex prices in 2011, glove makers are making forays into the nitrile segment to tap the fast-growing market and to diversify cost exposures. Averaged across our four companies under coverage, NR latex comprises 28% of total production cost, while nitrile butadiene rubber (NBR) makes up 25% as of latest available quarterly figures; this should change to 22% and 28%, respectively, once the companies in our coverage universe achieve their respective target product mix, based on our estimates.

As the companies build increasingly balanced portfolio mixes over the next few years, we expect a lower risk from price fluctuations of any one type of raw material. That said, we see less stability from NBR raw material prices due to an expected shortage of butadiene. Hence, industry players' costs are likely to remain volatile. NR latex prices, on the other hand, should remain low due to the upcoming supply boost, we think. We believe that the move into the NBR segment could have a negative impact on glove manufacturers' costs in the near term – thus it could be a hard but necessary pill to swallow for the glove-makers to meet consumer demand.

A highly likely increase in natural gas prices sparks more worries regarding industry players' costs, although automation advancements should largely be sufficient to neutralise the impact from minimum wage regulations, we think. Manufacturers generally pass on all cost inflation, but we see them absorbing at least part of the cost pressure in the future, as pricing power weakens with increased competition.

#### Uncertainties globally; limited near-term growth opportunities

The US and Europe together comprise 65-85% of total revenue for the Malaysian glovemakers, thus we see limited growth prospects in the near future for these markets due to the already-high glove consumption per capita in these regions, alongside their unstable economic outlooks. We recognise the wealth of latent demand from emerging markets, but with healthcare awareness still far behind levels seen in developed markets, we do not expect a significant impact from emerging markets in the near term – particularly with their less sanguine economic outlooks. Thus, the increase in demand we expect from these emerging markets is likely to be insufficient to offset the possible slowdown in developed market demand. While we do not foresee shrinking glove usage, we believe that demand visibility is limited. We estimate the Malaysia glove-makers will see combined volumes grow at 14.0%/12.8% in FY13F/FY14F – slower than the combined expansion rate of 16.2%/13.4% for the same periods, with 90%/76% of the expansion focusing on the NBR segment.

#### Stock recommendations

While costs have tapered off from 2011's elevated levels, we believe that lower ASPs going forward will limit profit upside. With no immediate growth catalysts in view, we see little buying impetus for the sector – especially when stocks have largely recovered from their respective low levels experienced over high latex prices.

#### Hartalega Holdings

As competition heats up, not even the NBR market leader will be spared from a margin squeeze, we think. We see Hartalega's growth tapering off and look for ROE to decline from 36.2% in FY12 to 26.1% in FY15F owing to shrinking EBIT margin and lower asset turnover. Major competitors' expansions into nitrile will slightly erode the group's profits via lower ASPs, in our view. We forecast a 3-year EPS CAGR of 7.9% (consensus: 12.1%) largely on expectations of downward ASP revisions and lower margins. While we think Hartalega deserves a premium for its NBR market leadership and efficient operations, we think the stock will correct as the industry sees capacity ramp-ups taking place. We value the stock using a target P/E of 12.8x FY14F EPS of 32.29sen, +1SD above its 3-year mean.

#### **Kossan Rubber Industries**

Kossan is the underperformer in the sector with a mere 3.4% gain in year 2012, below the KLCI's 10.3%. Its flattish share price over the year lags its peers' 2012 run-up of 25.4%, averaged across the other three names in our universe. Even after taking into account downward revision in ASPs owing to increased competition, our three-year forecast EPS CAGR of 12.7%, driven by capacity growth, is still the highest across locally listed rubber gloves companies. We see potential upside for the name – particularly as the stock currently trades at what we believe to be an undemanding 8.9x one-year forward P/E with dividend yields of 2.7-4.2%. With our FY13F EPS at 37.78sen, we arrive at our TP of MYR3.80 with a target one-year forward P/E of 10.0x – the sector average since 2007.

#### Supermax Corp Bhd

With latex prices easing and demand growing, Supermax's share price is up 23% since May 2012 lows. Nevertheless, we see limited near-term upside potential remaining for the name given our expectation of an uptrend in latex prices going into 1H13F, before trending downwards again in 2H13F. Although aggressive capacity expansions moving forward should support the group's plan to strengthen its foothold in the dental NBR gloves market, we think bottom-line growth is restricted by a potentially imminent margin compression. On the back of this, we have a 3-year forecast EPS CAGR of 11.6%, below consensus' 17.0%. We arrive at our TP of MYR1.90 by pegging its earnings to a 10.0x target P/E multiple, which is the sector average since 2007, on FY13F EPS expectation of 19.17sen.

#### **Top Glove Corp**

Top Glove shares outperformed the market in 2012, up 12.6% (vs KLCI, up 10.3%), largely reflecting easing raw material costs and recovering demand. As we expect latex prices to gradually trend up from current levels in 1H13F, upside surprises for the group are likely capped. We expect glove-makers to lower ASPs to stay competitive, but think that margins will be sustainable for Top Glove as its goods are currently priced at the lower end of the spectrum. Its leading market share in the NR market is also likely to benefit the group, following all major manufacturers' rush into the NBR segment. We forecast a three-year EPS CAGR of 8.6% for the company (vs. consensus of 10.9%). We peg our FY13F EPS estimate of 36.99sen to a forward P/E of 15.2x – its three-year average which implies a premium vs. smaller peers, reflecting Top Glove's unrivalled capacity in the industry – arriving at a TP of MYR5.65.

#### Fig. 2: Summary of key metrics

Revenue (MYR mn)	HART MK	KRI MK	SUCB MK	TOPG MK
FY11	931	1,090	1,021	2,314
FY12F	1,025	1,215	1,108	2,495
FY13F	1,165	1,343	1,200	2,809
FY14F	1,376	1,449	1,291	3,041
Net Profit (MYR mn)	HART MK	KRI MK	SUCB MK	TOPG MK
FY11	201	90	104	202
FY12F	222	107	127	229
FY13F	236	120	130	255
FY14F	254	129	145	260
Net Margins (%)	HART MK	KRI MK	SUCB MK	TOPG MK
FY11	21.63	8.23	10.20	8.74
FY12F	21.64	8.83	11.42	9.18
FY13F	20.28	8.96	10.87	9.09
FY14F	18.46	8.87	11.22	8.53
ROE (%)	HART MK	KRI MK	SUCB MK	TOPG MK
FY11	36.16	19.09	14.26	17.01
FY12F	32.70	19.99	15.56	17.42
FY13F	28.79	19.49	14.43	17.73
FY14F	26.10	18.32	14.49	16.50
Total capacity (mn pcs)	HART MK	KRI MK	SUCB MK	TOPG MK
Total capacity (m n pcs) FY11	HART MK 9,778	KRI MK 10,000	SUCB MK 17,588	TOPG MK 40,000
FY11 FY12F				
FY 11 FY 12F FY 13F	9,778 12,111 14,638	10,000 11,400 12,060	17,588 17,762 23,132	40,000 44,800 49,380
FY11 FY12F FY13F FY14F	9,778 12,111 14,638 19,304	10,000 11,400 12,060 13,860	17,588 17,762 23,132 25,202	40,000 44,800 49,380 53,959
FY 11 FY 12F FY 13F	9,778 12,111 14,638	10,000 11,400 12,060 13,860 KRI MK	17,588 17,762 23,132 25,202 SUCB MK	40,000 44,800 49,380 53,959 TOPG MK
FY11 FY12F FY13F FY14F <b>Sales volume (NR*)</b> FY11	9,778 12,111 14,638 19,304 HART MK 488	10,000 11,400 12,060 13,860 KRI MK 4,856	17,588 17,762 23,132 25,202 SUCB MK 7,361	40,000 44,800 49,380 53,959 TOPG MK 21,560
FY11 FY12F FY13F FY14F Sales volume (NR*) FY11 FY12F	9,778 12,111 14,638 19,304 HART MK 488 336	10,000 11,400 12,060 13,860 KRI MK 4,856 5,087	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939	40,000 44,800 49,380 53,959 TOPG MK 21,560 23,256
FY11 FY12F FY13F FY14F <b>Sales volume (NR*)</b> FY11 FY12F FY13F	9,778 12,111 14,638 19,304 HART MK 488 336 337	10,000 11,400 12,060 13,860 KRI MK 4,856 5,087 4,478	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298
FY11 FY12F FY13F FY14F <b>Sales volume (NR*)</b> FY11 FY12F FY13F FY14F	9,778 12,111 14,638 19,304 HART MK 488 336 337 900	10,000 11,400 12,060 13,860 KRIMK 4,856 5,087 4,478 4,233	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372
FY11 FY12F FY13F FY14F Sales volume (NR*) FY11 FY12F FY13F FY14F Sales volume (NBR)	9,778 12,111 14,638 19,304 HART MK 488 336 337 900 HART MK	10,000 11,400 12,060 13,860 KRI MK 4,856 5,087 4,478 4,233 KRI MK	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK	40,000 44,800 49,380 53,959 TOPG MK 21,560 23,256 25,298 26,372 TOPG MK
FY11         FY12F         FY13F         FY14F         Sales volume (NR*)         FY11         FY12F         FY13F         FY14F         Sales volume (NBR)         FY11	9,778 12,111 14,638 19,304 HART MK 488 336 337 900 HART MK 7,752	10,000 11,400 12,060 13,860 KRI MK 4,856 5,087 4,478 4,233 KRI MK 3,445	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115	40,000 44,800 49,380 53,959 TOPG MK 21,560 23,256 25,298 26,372 TOPG MK 3,920
FY11 FY12F FY13F FY14F Sales volume (NR*) FY11 FY12F FY13F FY14F Sales volume (NBR) FY11 FY12F	9,778 12,111 14,638 19,304 HART MK 488 336 337 900 HART MK 7,752 9,182	10,000 11,400 12,060 13,860 KRI MK 4,856 5,087 4,478 4,233 KRI MK 3,445 4,239	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115 4,481	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408
FY11 FY12F FY13F FY14F Sales volume (NR*) FY11 FY12F FY13F FY14F Sales volume (NBR) FY11 FY12F FY11 FY12F FY13F	9,778 12,111 14,638 19,304 HART MK 488 336 337 900 HART MK 7,752 9,182 11,217	10,000 11,400 12,060 13,860 <b>KRI MK</b> 4,856 5,087 4,478 4,233 <b>KRI MK</b> 3,445 4,239 5,531	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115 4,481 7,624	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408 9,036
FY11 FY12F FY13F FY14F Sales volume (NR*) FY11 FY12F FY13F FY14F Sales volume (NBR) FY11 FY12F FY11 FY12F FY13F FY14F	9,778 12,111 14,638 19,304 <b>HART MK</b> 488 336 337 900 <b>HART MK</b> 7,752 9,182 11,217 13,520	10,000 11,400 12,060 13,860 <b>KRI MK</b> 4,856 5,087 4,478 4,233 <b>KRI MK</b> 3,445 4,239 5,531 6,333	17,588 17,762 23,132 25,202 <b>SUCB MK</b> 7,361 7,939 7,213 7,749 <b>SUCB MK</b> 4,115 4,481 7,624 8,911	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408 9,036 11,398
FY11         FY12F         FY13F         FY14F         Sales volume (NR*)         FY11         FY12F         FY13F         FY14F         Sales volume (NBR)         FY11         FY12F         FY13F         FY11         FY12F         FY13F         FY13F         FY13F         FY14F         Sales volume (Surgical)	9,778 12,111 14,638 19,304 HART MK 488 336 337 900 HART MK 7,752 9,182 11,217	10,000 11,400 12,060 13,860 <b>KRI MK</b> 4,856 5,087 4,478 4,233 <b>KRI MK</b> 3,445 4,239 5,531	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115 4,481 7,624 8,911 SUCB MK	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408 9,036 11,398 <b>TOPG MK</b>
FY11         FY12F         FY13F         FY14F         Sales volume (NR*)         FY11         FY12F         FY14F         Sales volume (NBR)         FY11         FY12F         FY11         FY12F         FY13F         FY13F         FY13F         FY14F         Sales volume (Surgical)         FY11	9,778 12,111 14,638 19,304 <b>HART MK</b> 488 336 337 900 <b>HART MK</b> 7,752 9,182 11,217 13,520	10,000 11,400 12,060 13,860 <b>KRI MK</b> 4,856 5,087 4,478 4,233 <b>KRI MK</b> 5,531 6,333 <b>KRI MK</b>	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115 4,481 7,624 8,911 SUCB MK 356	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408 9,036 11,398 <b>TOPG MK</b> 840
FY11         FY12F         FY13F         FY14F         Sales volume (NR*)         FY11         FY12F         FY13F         FY14F         Sales volume (NBR)         FY11         FY12F         FY11         FY12F         FY13F         FY13F         FY14F         Sales volume (Surgical)         FY11         FY12F	9,778 12,111 14,638 19,304 <b>HART MK</b> 488 336 337 900 <b>HART MK</b> 7,752 9,182 11,217 13,520	10,000 11,400 12,060 13,860 <b>KRI MK</b> 4,856 5,087 4,478 4,233 <b>KRI MK</b> 5,531 6,333 <b>KRI MK</b>	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115 4,481 7,624 8,911 SUCB MK 356 511	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408 9,036 11,398 <b>TOPG MK</b> 840 864
FY11         FY12F         FY13F         FY14F         Sales volume (NR*)         FY11         FY12F         FY14F         Sales volume (NBR)         FY11         FY12F         FY11         FY12F         FY13F         FY13F         FY13F         FY14F         Sales volume (Surgical)         FY11	9,778 12,111 14,638 19,304 <b>HART MK</b> 488 336 337 900 <b>HART MK</b> 7,752 9,182 11,217 13,520	10,000 11,400 12,060 13,860 <b>KRI MK</b> 4,856 5,087 4,478 4,233 <b>KRI MK</b> 5,531 6,333 <b>KRI MK</b>	17,588 17,762 23,132 25,202 SUCB MK 7,361 7,939 7,213 7,749 SUCB MK 4,115 4,481 7,624 8,911 SUCB MK 356	40,000 44,800 49,380 53,959 <b>TOPG MK</b> 21,560 23,256 25,298 26,372 <b>TOPG MK</b> 3,920 6,408 9,036 11,398 <b>TOPG MK</b> 840

Note: FY11 shows latest reported figures. Thus FY11 implies FY12 numbers for Top Glove (August) and Hartalega (March) due to different financial year ends. Top Glove also has c.5-7% exposure to Vinyl gloves.

\* NR includes powdered and powder-free NR examination gloves

Source: Companies data, Nomura research

#### Fig. 3: Local and regional comparables

		Mkt cap	Listed	Share Price	Target Price		50	0	(0/ )		D/E ()			D/D ()			Mi-1-1 (0/)	
0	The lase	(USDmn)	Curr.			Define	CY12	<u>S growth</u> CY13F	(%) CY14F	0)/40	P/E (x) CY13F	CY14F	CY12	P/B (x) CY13F	CY14F	CY12	<u>Yield (%)</u> CY13F	CY14F
Companies	Ticker	(USDIIII)	Guil.	(Local)	(Local)	Rating	CYIZ	CYIJF	CY14F	CY12	CTISF	CY14F	GYIZ	CYIJF	CY14F	GYIZ	Crise	CY14F
Malaysian glove-makers																		
Hartalega Holdings	HART MK	1,164	MYR	4.84	4.15	REDUCE	10.2	6.5	7.6	16.4	15.2	14.2	5.0	4.1	3.5	2.9	3.0	3.2
Kossan Rubber Industries	KRI MK	351	MYR	3.36	3.80	NEUTRAL	19.6	12.3	6.8	10.0	8.9	8.3	1.9	1.6	1.4	2.7	3.6	4.2
Supermax Corp	SUCB MK	446	MYR	2.00	1.90	REDUCE	21.5	3.0	11.1	10.7	10.4	9.4	1.6	1.4	1.3	2.8	2.9	3.2
Top Glove Corp	TOPG MK	1,146	MYR	5.64	5.65	NEUTRAL	13.3	11.6	1.5	16.5	14.7	13.6	2.7	2.5	2.3	3.0	3.4	3.7
International glove-makers																		
Ansell	ANN AU	1,948	AUD	15.50	16.15	NEUTRAL	10.5	19.7	5.7	14.5	12.6	11.2	2.7	2.3	2.1	2.4	2.6	2.9
Cardinal Health	CAHUS	14,199	USD	41.79	NA	N.R.	10.9	7.4	8.7	12.6	11.5	10.7	2.2	2.0	1.8	2.3	2.6	2.9
Kimberly-Clark Corp	KMB US	33,654	USD	86.01	NA	N.R.	23.7	7.9	NA	17.1	15.9	NA	6.4	6.1	NA	3.4	3.6	NA
Semperit AG	SEM AV	482	EUR	30.50	NA	N.R.	(13.1)	10.7	NA	13.4	12.1	NA	1.6	1.4	NA	2.4	2.6	NA
Sri-Trang Agro	STA TB	789	THB	18.80	NA	N.R.	18.7	37.5	NA	15.5	11.3	NA	1.3	1.2	NA	1.8	2.5	NA
3M Co	MMM US	65,505	USD	94.67	NA	N.R.	3.7	7.7	NA	14.7	13.7	NA	3.8	3.4	NA	2.5	2.6	NA
Other health-related																		
Mani Inc	7730 JP	460	JPY	3,420	NA	N.R.	6.2	6.3	2.7	18.3	17.2	16.4	2.0	1.8	1.7	1.8	1.9	1.9
Nipro Corp	8086 JP	1,195	JPY	615	450.00	NEUTRAL	41.8	9.2	8.5	17.5	15.2	14.0	0.9	0.9	0.8	3.3	3.2	3.5
Shandong Weigao	1066 HK	4,389	HKD	7.60	8.00	NEUTRAL	(68.9)	20.4	NA	25.4	21.1	NA	3.1	2.8	NA	1.1	1.5	NA
Microport Scientific Corp	853 HK	787	HKD	4.32	4.45	BUY	4.5	NA	NA	13.2	NA	NA	1.9	NA	NA	1.7	NA	NA
Mindray Medical Intl Ltd-Adr	MR US	3,622	USD	31.30	32.50	NEUTRAL	8.4	21.5	NA	20.0	16.5	NA	2.8	2.5	NA	1.4	1.7	NA

Note: Pricing as of 4 Jan 2013

Source: Bloomberg for Not rated stocks, Nomura estimates

# Over-expansion amid swelling costs and unstable economy – a 2007/08 replay?

The Malaysia glove sector was hit hard in the global financial crisis-led recession over 2008-09, only to be revived by the H1N1 outbreak in early 2009. Compounding the negative effect of the economic downturn was the impact of overcapacity on ASPs and ballooning costs, with natural gas prices rising by 71% over the period.

This sounds all too similar to the current scenario, in our view, with large capacity rampups in the pipeline, potential removal of gas subsidies and the minimum wage policy coming into play. Such factors – alongside the ongoing debate over the global economic outlook amid the lingering European crisis, the US economic recovery and the move away from the edge of the fiscal cliff, and the degree of China's slowdown – have prompted us to access the outlook of the rubber glove sector. We do so by taking into account also the timing of rapid expansion plans into the nitrile segment by major glovemakers, as well as the impact of a changing cost structure as a result of the switch from NR gloves to the NBR counterpart.

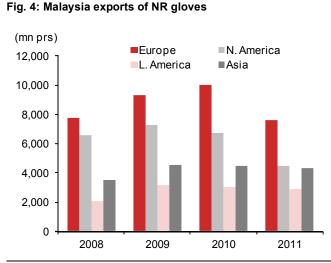
#### Weakening pricing power from a likely over-expansion mis-step

We think that demand for nitrile gloves will continue to be resilient, taking more market share from their natural rubber equivalents. However, we note that total planned capacity of Hartalega, Kossan, Supermax and Top Glove – the four leading rubber glove manufacturers in Malaysia – will increase at a 3-year CAGR of 13.9% over 2012-2015F, based on guidance from management teams. This is already above the historical 11year glove demand CAGR of 8.4% over 2000-11, before taking into account expansion by other players across the region, thus pointing at a potential over-capacity situation. We expect low average utilisation rates of 72-73% in the next three years, alongside lower ASPs resulting from a significant increase in competition.

#### Nitrile wave is yet to ebb...

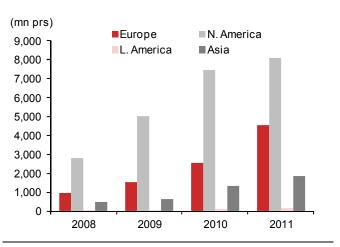
Growth in synthetic rubber glove exports has been encouraging in the recent past. While total glove exports to Europe and the US (the main consumers) contracted by 1.7% y-y and 11.1% y-y, respectively, in 2011, accelerating nitrile (note: NBR makes up 99% of synthetic rubber gloves) exports to these regions surged at 41.1% y-y and 67.7% y-y, respectively. There is an obvious switching trend from NR to NBR usage over time in the developed nations. Emerging markets, on the other hand, demonstrated organic growth in glove usage as growing NBR figures are coupled with flat NR exports (see following figures). The three-year total glove exports CAGR over 2008-11 for the US and Europe combined was 10.3%, while that for the rest of the world was higher at 14.9%.

We expect nitrile gloves to become the preferred choice for users and manufacturers alike



Source: Malaysian Rubber Export Promotion Council (MREPC)

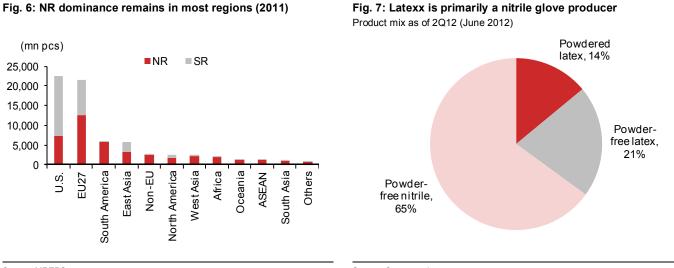
#### Fig. 5: Malaysia exports of SR gloves



Source: MREPC

As of 2011, the US was the only region to which Malaysia exported more SR gloves than NR gloves (see below left); EU27 and East Asia were regions with a rather balanced mix. The remaining regions, in our view, present vast potential for the NBR segment as they play catch-up with the NBR-switching trend. However, given the low glove consumption volumes in these regions, we do not expect much impact from such phenomenon. We also note that consumers in emerging countries appear to be generally more price conscious than the developed world; hence they are more likely to opt for products priced at lower levels. NBR gloves are currently cheaper than powder-free NR gloves, but powdered NR gloves are still the cheapest option for now.

However, Semperit's (SEM AV, Not rated) recent (November 23) takeover offer of Latexx Partners (LTX MK, Not rated) at an attractive 81% premium over net tangible asset (NTA) suggests that potential remains in the nitrile segment, given Latexx's nitrile-dominated product mix (see RHS chart below). According to Semperit's press release, it currently owns more than 83% of Latexx shares on a diluted basis, and intends to delist Latexx.



Source: MREPC

Source: Company data

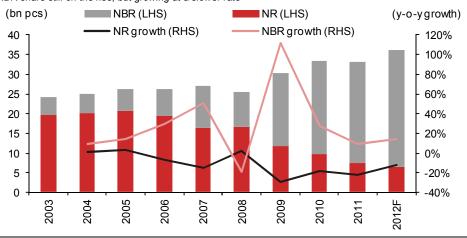
Resilient demand for NBR gloves should come from both the organic increase in glove consumption as well as the switching pattern from the NR counterpart. We also believe it would be unlikely that customers who have switched to NBR gloves would return to the NR option, as NBR is regarded as the higher-quality product and is widely promoted by western governments (see "Appendix" for NBR-switch catalysts).

Thus, NBR's slice of the pie should continue to expand, albeit at a slower rate, as much of the switch would have already occurred in the west, we think – this is particularly apparent in the US, where we see a steady downtrend in NBR export growth to the country, ignoring the dip in 2011, post the spike in 2009 (refer chart below). Its import mix, which currently sees NBR gloves take up 81.7% of the total volumes (based on 9M2012 figures), further suggests that there is limited room left for glove users in the country to switch away from natural rubber.

In our view, customers are unlikely to switch back to NR gloves once they have made the initial move away from such products

#### Fig. 8: Imports of rubber gloves by the U.S.

NBR share still on the rise, but growing at a slower rate



Note: 2012E figures are annualised based on 9M2012 data Source: MREPC, Nomura research

NBR volumes have grown at 30-40% p.a. in the past three years, using Malaysia's export numbers as a benchmark (there are no official statistics of the exact size and mix of the global glove market). We expect global NBR glove volumes to increase at a slower pace of 15-20% p.a. in the next three years, in line with Malaysian Rubber Export Promotion Council (MREPC) projections of 20% growth in Malaysia's NBR exports for 2012E. Assuming such growth rates, we should see a balanced ratio of NR and NBR gloves by early/mid-2014F. 9M2012 MREPC estimates show that the current ratio of Malaysian rubber gloves exports stands close to 55:45 in quantity terms – where NR is still the more popular option.

Fig. 9: SR proportion increasing in developed markets Composition of Malaysian rubber glove exports

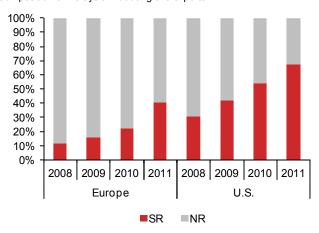
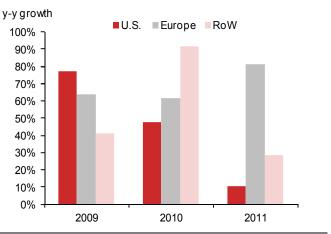


Fig. 10: Growth in NBR exports to different regions We note the obvious slowing trend in the U.S.



Source: MREPC



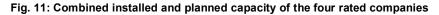
#### $\ldots$ but it is not the right time to be expanding rigorously

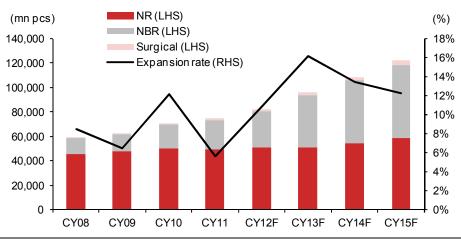
Expansion plans were rather muted in 2011 – a year where glove players were grappling with latex prices which reached an all-time high – with total capacity of the four companies that we initiate coverage of growing at a modest 5.6% y-y, and Supermax and Kossan not adding any capacity at all. In 2012, however, capacity of the same four companies combined grew at 10.9% y-y, with expansions concentrated in the nitrile segment by large – the spotlight of the industry where most manufacturers across the region are moving into – and we expect this trend to continue at least into the next four years.

In the next three years, planned additional capacity of the four local players under our coverage will increase at 12-16% each year. Most newly deployed machines have been earmarked to produce NBR gloves, but we note that these equipment have flexible production lines which are capable of churning out both NR and NBR gloves.

Flexible production lines to churn out NR and NBR gloves; but planned capacity expansions exceed historical growth in global glove demand

January 9, 2013





Source: Company data, Nomura estimates

Fig. 12: Details on combined expansion plans of companies under coverage

(bn pieces)	2012F	2013F	2014F	2015F
Add'I NR capacity	1.4	-	3.2	4.7
Add'I NBR capacity	5.9	12.7	9.0	8.1
Add'l Surgical capacity	0.7	0.7	0.5	0.5
Total add'l capacity	8.1	13.4	12.7	13.3
Expansion in NR	3.0%	0.0%	6.4%	8.7%
Expansion in NBR	24.6%	42.5%	21.1%	15.8%
Expansion in Surgical	63.0%	34.7%	18.3%	15.5%
Total expansion	10.9%	16.2%	13.3%	12.3%
% Expansion in NBR	73%	95%	71%	61%

Source: Company data, Nomura estimates

#### Possible glut ahead

Malaysia manufacturers have been taking away global market share from other competitors in the past (see "Appendix"). Under Entry Point Project 3 (EPP-3,) the government's targets to have Malaysia take up 65% of the global glove market by 2020F, from 62% currently, implying an 8-year volume CAGR of 10.1% for the country as a whole over such period, assuming an 8-year global volume CAGR of 9.0% (higher than the historical 8.4% on increased healthcare awareness in developing countries). We note that the planned capacity ramp-up by just the four rated Malaysia players will register a CAGR of 13.9% in the next three years, highly exceeding the 11-year historical global glove demand CAGR of 8.4% recorded over 2000-11, in the midst of an unstable economy worldwide (see "Earnings Forecasts" section for more details).

With the global consumption of rubber gloves estimated by MREPC to be around 167bn pieces in 2012, we estimate consumption of NBR gloves in 2012 to be at around 74bn pieces – based on the NR:NBR ratio of 56:44 recorded in 1Q12. Should the global NBR market grow at the same rate as MREPC's projected 20% for Malaysia's NBR glove exports in the next year, this translates into a further 15bn pieces of gloves demanded worldwide. We understand from meetings with management teams that Malaysia glove manufacturers, listed and unlisted, together command slightly more than 50% of the global NBR glove market. Nonetheless, the four listed companies alone plan to expand their combined NBR capacities by 5.9bn in 2012 and 11.9bn in 2013. Unless competitors

outside of Malaysia are not expanding, such expansion into the NBR market will exceed greatly the expected consumption growth, ceteris paribus. In this context, we understand that smaller players across the region are also shifting into the NBR segment. Instead of expanding capacities aggressively, these glove-makers are converting NR-producing lines into NBR – implying more upcoming NBR supply to the global market.

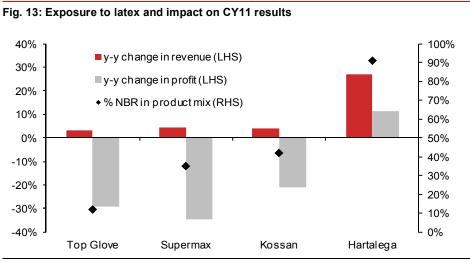
We are thus unconvinced that the NBR market and the glove industry as a whole can support the inundation of goods from the excessive additional capacity. Moreover, the emerging nations' growth story stemming from any newly imposed healthcare regulations remains a long-term catalyst and is unlikely to weigh in on a shorter time horizon. We believe that the challenge from increased competition will ultimately result in weakening pricing power and lower utilisation rates.

## Cost structure makeover: Likely unfavourable in the short term

With all major glove manufacturers across the region jumping on the nitrile bandwagon, we expect to see a marked alteration in their cost structures. Upon achieving their respective target product mixes, NR latex as a percentage of total production cost will fall to 22%, from 28% currently, while that of nitrile will increase to 28%, from 25% now, averaged across all rated companies on our estimates. In the year ahead, we expect NR latex prices to average around the 600-650sen/kg region as increased planting in the ASEAN region provides sufficient supply to the market. On the other hand, nitrile prices could be on a slight uptrend due to a potential butadiene shortage. Hence, we think that costs of glove-makers will continue to be volatile despite the switch into nitrile, which has seen stable raw material prices in the past.

#### Less severe impact from any latex price surge moving forth

2011 was a tough year for glove manufacturers; Top Glove, Supermax and Kossan all recorded contractions in bottom lines, with their product mixes all skewed towards NR which made up 82%, 65% and 58% of their respective sales revenues. The only exception – Hartalega – was saved by its c.93% exposure to NBR gloves. With these companies' product mixes likely to sport new looks in two to three years' time, we believe NBR gloves will become far more significant for each name compared with 2011 levels – apart from Hartalega (see sections for each company for more details on expansion plans and product mixes for separate names).



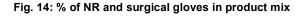
Note: Figures of Top Glove and Hartalega are adjusted for year-end differences Source: Company data, Nomura

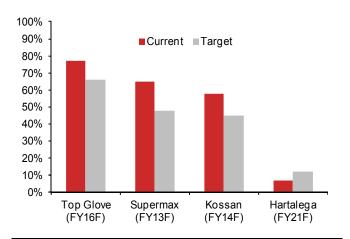
We think that the demand for gloves will not be able to keep up with the rates at which Malaysian players are planning to expand

Future surges in latex prices, if any, should have far less impact on glove manufacturers; effect from nitrile prices to be more pronounced Based on our estimates, latex raw material costs as a percentage of total cost will decrease to 22%, from the current 28%, as companies achieve their respective target product mixes (see following figures). That of nitrile, on the other hand, will increase to 28%, from 25%, averaged across the rated companies on our estimates. We see these manufacturers realising their individual targets in the next one to three years – apart from Hartalega where the long-term plan will only complete in 2021F (see sections for each company for details).

We thus believe that companies will suffer less should latex prices increase the way they did last year, as they boost their respective NBR capacities – although they will also become more susceptible to nitrile prices. Moreover, we do not think that the 2011 situation will repeat itself as it was largely affected by an untimely combination of tight supply/demand due to the booming China and India automotive industries, prolonged wintering period of rubber trees, rubber tree bark disease outbreak in Vietnam, severe drought and unusually heavy rainfall in Thailand; on top of it all, glove inventory levels were elevated during the 2009/10 H1N1 outbreak.

We also note that nitrile raw material prices are quoted in USD while those of NR are in MYR. Higher exposure to NBR thus gives manufacturers more natural hedge as selling prices are also quoted on the greenback.





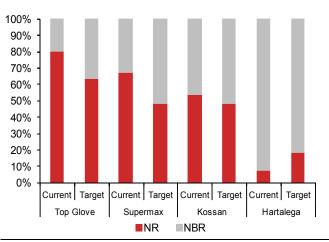
Note: Surgical gloves are also NR-based, hence are included in the analyses. Years in brackets indicate when each company is estimated to be able to achieve respective target product mixes.

Source: Company data, Nomura estimates

#### Nitrile prices has been less volatile in the past

Nitrile butadiene rubber, or more commonly known as just "nitrile", is a type of synthetic rubber produced from two materials – acrylonitrile and butadiene. With absolutely no NR latex in it, latex price changes have no direct impact on producers of gloves made of NBR. That said, prices of nitrile and NR latex are correlated to some extent, with the former typically tracking changes of the latter with a lag. Nitrile price fluctuations have, however, not been as vast as what we have witnessed for latex, hovering within a much narrower range. NBR is purely chemical thus is not exposed to environmental factors like weather. Instead, its supply depends on the demand for plastic parts, as NBR is a byproduct of crude oil via the extraction of ethylene – a major ingredient in plastic-making. Moreover, unlike NR latex, which is a tradable commodity, nitrile is not subject to speculation.

Fig. 15: NR as % of raw material cost to fall

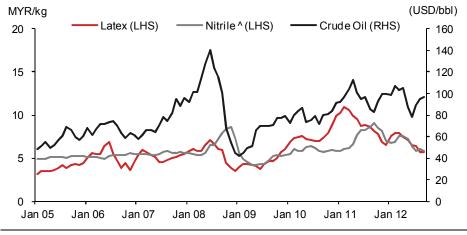


Note: Companies expected to achieve respective target product mixes as of years indicated in LHS chart.

Source: Company data, Nomura estimates

Nitrile prices are less volatile, despite being correlated to those of NR latex

#### Fig. 16: Prices of Latex, Nitrile and Crude Oil

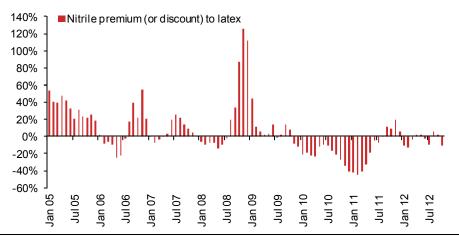


<sup>^</sup> Nitrile prices grossed up to 60% total solid content from 44% Source: Company data, Bloomberg, Nomura research

Nitrile raw material cost has generally been at a premium to latex in the past (see following chart). This trend sustained until latex prices jumped to the peak of MYR10.93/kg in April 2011 – a rise which marked a 3.5x increase from MYR3.10/kg in December 2008. Manufacturers focused on the NR market saw a substantial rise in their costs, and ASPs were adjusted upwards to preserve margins. NR gloves have thus lost their cost advantage over NBR gloves, which were traditionally priced at a premium to the NR equivalents. This situation for NR glove producers was exacerbated with the high inventory levels held by distributors and end users who stock-piled during the H1N1 outbreak in 2009/10. Purchase of gloves has therefore been delayed as they wait for prices to ease to a more comfortable level.

#### Prices of NR gloves increased in tandem with surging latex prices; purchasing of gloves was thus halted as inventories piled up over the H1N1 period are cleared off until prices eased to a more comfortable level

#### Fig. 17: Nitrile was the more expensive raw material until latex prices headed north



Note: Prices are adjusted to account for different solid contents of the raw materials Source: Company data, Bloomberg, Nomura research

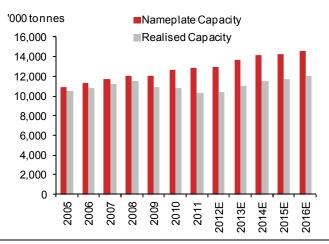
#### Raw material suppliers also surfing the nitrile wave ...

Nitrile suppliers are making the most of the fast-growing nitrile market, too. Synthomer (non-listed), the world's largest supplier of nitrile latex, is leading the expansion with its EUR50mn investment in two plants in Malaysia. Other major nitrile suppliers including Taiwan's Nantex Industry (2108 TT, N.R.), Germany's Lanxess AG (LNXSF US, Buy) and Korea's Kumho Petrochemical (011780 KS, Neutral) are also on the same path, each announcing various expansion plans. Majority of the expansions are happening in Asia where operating costs are relatively lower.

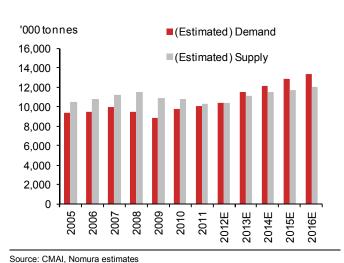
Butadiene is produced through hydrocarbon (i.e., natural gas or naphtha) steam-cracking. Ethane-based crackers produce a very large proportion of ethylene and less propylene or butadiene, while naphtha-based crackers have a more balanced mix. As ethane is much cheaper in regions like the Middle East, Russia and North America, many crackers have switched to using it as a feedstock. Availability of butadiene has declined owing to reduced dehydrogenation butadiene capacity and a switch to ethane feedstock by flexible crackers. Such situation is aggravated by the petrochemical industry heading towards shale gas usage, which produces even less butadiene. Our European Chemicals Team opines that the shortage of butadiene implies that some plants will not be able to run at capacity, thus resulting in a deficit situation in the future (see Nomura Equity Research report, *Attractive growth remains undervalued*, dated 10 September 2012). We thus expect tightness in the market and higher butadiene prices in the future.

Tightness in the butadiene market expected as crackers shift to ethane – a lighter feedstock which produces far less butadiene

#### Fig. 18: Global butadiene capacity



#### Fig. 19: Global butadiene demand/supply



Source: CMAI, Nomura estimates

Following this, we think that nitrile's discount to the NR counterpart will shrink, potentially reverting to the premium raw material. Such is due to the budding deficit situation in the butadiene market, particularly as demand for the nitrile synthetic material is swiftly picking up. Note that butadiene has always been in a surplus in the past, and that butadiene makes up the largest portion (c.60-65%) of NBR production.

#### NR latex prices - same old (unpredictable) story

#### Ample upcoming rubber supply...

NR latex prices have been largely driven by supply and demand, as we saw with the tight supply/demand condition in 2010 and 2011, which forced NR latex prices up. Rubber trees have a gestation period of about 7 years, thus we expect the significantly increased planting of rubber trees by member countries of The Association of Natural Rubber Producing Countries (ANRPC) \* (both newly-planted and re-planted areas) from 2005-08 to provide sufficient supply of NR latex in the next few years.

\* ANRPC countries together produce c.94% of the world's NR, based on our estimates from IRSG and ANRPC 2011 data.

We expect an increase in cost of nitrile raw material as a result

Planting from 2005-08 to mature within the next few years, making supply shortage a nonissue

#### Fig. 20: NR latex prices driven by supply/demand

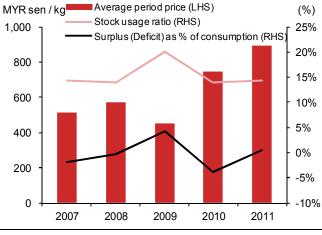
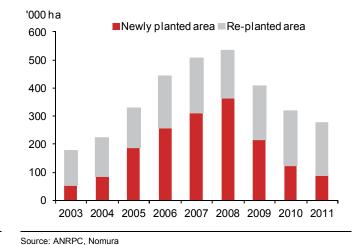


Fig. 21: Increased new and re-planting by ANRPC countries



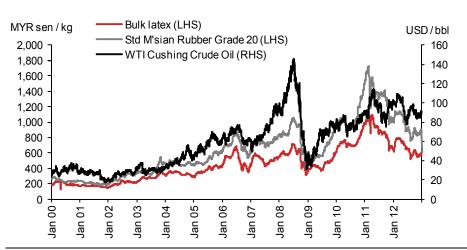
Source: IRSG, Bloomberg, Nomura

#### ... to be regulated by the main producing countries

The three members of the International Tripartite Rubber Council (ITRC; made up of Thailand, Indonesia and Malaysia), who together produce c.70% of the world's natural rubber, have agreed to cut exports by 180,000 tonnes in 4Q12 and another 120,000 tonnes in 1Q13 – amounting to c.3% of global NR production. Besides, they have also agreed to cut down 100,000 hectares of aging trees beginning February 2013 – a move which will further remove 150,000 tonnes of natural rubber from the market.

The high correlation between rubber and NR latex prices implies that the reduction in rubber supply will lead to an increase in the price of NR latex – an effect the market has already witnessed since the announcement was made, when both rubber and NR latex prices recovered from declines since the February highs.

#### Fig. 22: Correlation between bulk latex, rubber and crude oil



Source: Bloomberg, Nomura research

Despite efforts by the ITRC to support rubber prices, we do not expect large, sustainable effects from such moves given that bulk latex cannot be stored for an extended period for its quality would be compromised. Further, the current high inventory of rubber being held by such countries suggests that interventions are unable to sustain for long. Indeed, the short-lived price rebounds have already been faced with a steady decline in both rubber and latex prices. Related associations which are constantly looking for ways to come up with higher quality clones of shorter gestation period and higher productivity via constant R&D efforts are likely to provide the market with increased NR supply, too.

#### ITRC to (temporarily) support rubber prices by cutting exports

As the automotive industry consumes 70-75% of rubber supply - natural and synthetic rubber alike - the performance of such business has a heavy influence on rubber prices. Our analysis shows a high correlation of 95% between motor vehicle production volumes and period average SMR rubber prices. Nomura's Automotive Team sees demand for automobiles improving, albeit slightly, on a global scene, with recovery in the US and rising affluence in emerging markets being the main growth drivers (see Nomura Equity Research report, Nomura Global Picks: Kia, Honda, Astra Int'l, dated 14 September 2012).

Years 2010 and 2011 saw a recovery of the automotive industry from the contractions in the previous two years, with increases in global automobile demand of 8.6% and 9.8% for each of these years (see following figure) - such was one of the key drivers of record high NR latex prices. As we expect automobile volumes to continue growing, albeit at a slower pace than in the past two years, we foresee rubber prices creeping upwards in the first few months of 2013 - but at a slower rate than that of the previous two years due to the forthcoming supply boost.

#### Fig. 23: Global automobile demand forecasts

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We expect the U.S. to remain of	one of the prime gro	wth drivers of	over the next	few years					
(mn units)	2006	2007	2008	2009	2010	2011	2012E	2013F	2014F
U.S.	16.56	16.15	13.24	10.43	11.59	12.78	14.37	15.42	16.35
y-o-y change	-2.6%	-2.5%	-18.0%	-21.2%	11.1%	10.3%	12.4%	7.3%	6.0%
Europe	17.92	18.25	16.75	15.94	15.32	15.21	14.21	14.37	14.84
y-o-y change	1.8%	1.8%	-8.2%	-4.8%	-3.9%	-0.7%	-6.6%	1.1%	3.3%
Japan	5.74	5.35	5.08	4.61	0.96	4.21	5.18	4.78	4.81
y-o-y change	-1.9%	-6.8%	-5.0%	-9.3%	-79.2%	338.5%	23.0%	-7.7%	0.6%
Korea *	1.16	1.22	1.15	1.39	1.46	1.47	1.45	1.49	1.52
y-o-y change	1.9%	5.2%	-5.7%	20.9%	5.0%	0.7%	-1.4%	2.8%	2.0%
Emerging markets	14.02	17.07	18.51	21.94	28.37	30.02	32.08	35.56	38.22
y-o-y change	16.6%	21.8%	8.4%	18.5%	29.3%	5.8%	6.9%	10.8%	7.5%
- China	7.18	8.78	9.36	13.62	18.04	18.53	19.20	21.71	23.01
y-o-y change	24.8%	22.3%	6.6%	45.5%	32.5%	2.7%	3.6%	13.1%	6.0%
- India ^	1.57	1.76	1.75	2.24	2.87	3.07	3.41	3.94	4.53
y-o-y change	22.1%	12.1%	-0.6%	28.0%	28.1%	7.0%	11.1%	15.5%	15.0%
Others	12.35	13.52	13.44	10.43	12.62	13.50	14.43	15.38	16.31
y-o-y change	5.9%	9.5%	-0.6%	-22.4%	21.0%	7.0%	6.9%	6.6%	6.0%
Global	67.75	71.56	68.17	64.74	70.32	77.19	81.72	87.00	92.05
y-o-y change	3.8%	5.6%	-4.7%	-5.0%	8.6%	9.8%	5.9%	6.5%	5.8%

Note: Numbers include both Passenger Cars (PC) and Light Commercial Vehicles (LCV)

\* Korean registrations exclude imported cars (c.5% of total auto market in Korea)

^ Indian registrations refer to FY (e.g. 2012E refers to FY ending Mar.31st, 2013)

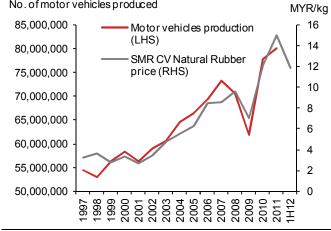
Source: Autodata, WARD's, CAAM, SIAM, ACEA, Fourin, Nomura estimates

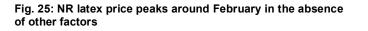
Auto segment expected to hold up, which provides support to rubber and latex prices

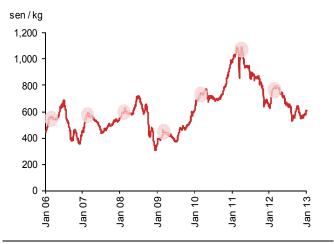
January 9, 2013

#### Fig. 24: Automotive industry as a main driver of natural rubber prices

No. of motor vehicles produced







Source: OICA, CEIC, Nomura research

Note: Pink highlights mark the end of February for each year Source: Bloomberg, Nomura research

Latex prices expected to peak around February and average around 600-650sen/kg We note that the wintering period, which occurs around February each year, lasts for about 4-6 weeks, resulting in steady increases in rubber prices in the preceding months before typically peaking in the end of February. We think that NR latex prices will break the declining pattern as a combined effect of reduced exports, chopped-off trees and the wintering period, before easing gradually from a February peak - largely due to the heightened supply coming from the ANRPC countries. We expect rubber prices to remain soft, averaging around the 600-650sen/kg region in the year ahead, although it could breach the 700sen/kg mark around February.

All the same, we highlight that steady increases in raw material costs do not impact glove-makers to the same extent as sharp, unexpected price surges, as they are generally able to pass on such cost inflations via higher ASPs. On this front, we think that declining pass-on rates are imminent as manufacturers lower selling prices in the face of weaker pricing power going forward.

#### Uncertainties globally; limited near-term growth opportunities

The rubber glove sector has always been considered as a "recession-proof" industry. There is some support to this, but we flag that growth could be limited in the midst of an unstable economy, as we have seen global glove imports grow at the lowest rate from 2000-11 in 2008. Further, we think that demand from the emerging markets will not have significant contribution to the sector soon enough, given that healthcare awareness in these markets still appears very low in comparison to the developed markets.

#### Gloomy outlook for US and Europe - the main export destinations

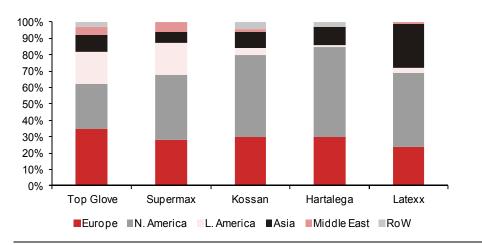
The US has always been the largest importer of gloves, alone accounting for more than a third of total glove imports worldwide. Taken together, North America and Europe account for 65-85% of revenue for five of the listed Malaysian glove manufacturers - a rather stable trend over the years, although Asian consumption did pick up in recent years. These two regions together make up roughly two-thirds of Malaysia's total glove exports, implying that these listed players have higher exposures to such regions, as compared to the smaller unlisted competitors.

We see NR latex prices to be on a steady uptrend before tapering off from a February peak

Cost increase will be passed on, although declining pass-on rates are imminent as pricing pressure mounts, in our opinion

Large chunk of revenue coming from US and Europe, where economic concerns are concentrated





Source: Company data

#### Industry lacks sources of growth

Nomura's Economics Team does not see improvements in the lack-of-growth situations in Europe, the Americas and Asia in recent years, but expects further GDP contraction in the euro-area instead (see Nomura Economics Research reports, *Tick tock*, dated 21 December 2012, and, *Asia Insights: China*, dated 4 January 2013).

#### Fig. 27: Nomura's in-house global growth forecasts

GDP forecast (% y-o-y)	2012F	2013F	2014F
Global	3.0%	2.9%	3.7%
U.S.	2.2%	1.4%	2.9%
Euro area	-0.5%	-0.8%	0.0%
Asia Pacific	5.4%	5.3%	5.6%
Latin America	2.7%	3.5%	3.6%
China forecasts	2012	2013	2014
Real GDP (% y-y)	7.8%	7.7%	7.5%
Consumer prices (% y-y)	2.6%	3.5%	4.0%
Policy rate (% end period)	6.0%	6.5%	6.5%

Source: Nomura Global Economics

A dim economic outlook in the developed world got producers making forays into new green fields like Latin America and Asia. However, we do not think that the emerging markets will be singing the same upbeat tune as they have been in the recent past where their economies are concern. We also believe that these regions will take a long time to get up to par with countries like the US in terms of healthcare awareness, thus making them more of a long-term story for the rubber glove industry.

**The China story may not be all that attractive to Malaysian glove-makers** The industry has been expecting improvements of healthcare standards in the highly populated China, which would potentially lead to a marked increase in global glove consumption. Nonetheless, China has glove manufacturing facilities to partly support its own consumption, although much of it is concentrated in PVC and vinyl gloves. The world's fourth largest glove exporting country, which produces c.6% of the world's gloves (a figure on the rise), accounts for a mere 1-2% of global gloves imports. Hence we think that any demand uptick from China will likely be picked up by the local operations, before spilling over to manufacturers overseas.

PVC and vinyl gloves are currently the most widely used in China, although we understand from management teams that demand for NR, NBR and surgical gloves from China are picking up. As demand shifts towards these glove types, we think that China players are likely to expand into these segments as well, possibly at the expense of plastic gloves. The availability of both NR and NBR raw materials in the country makes it Weak economic outlook for developed countries; emerging markets unlikely to provide much growth opportunities soon enough

China manufacturers likely to capitalise on domestic demand upticks, before benefiting Malaysian glove-makers

Higher electricity costs in China, but obvious savings in transportation costs to buy from suppliers within the country possible for such to happen. China manufacturers may lose out to Malaysian counterparts where energy cost is concern, as more heat is required during winter; per Top Glove guidance, its China plant incurs 20% more energy cost per thousand gloves during that season. Nonetheless, there is obvious transportation cost-saving should the China glove-makers supply goods to users within its own country.

We note, however, that the glove industry in China is rather fragmented where most players have relatively small capacity; only a few are large enough to be comparable with the Malaysian peers. To put things into perspective, one of China's largest glove-makers, Shijiazhuang Hongray Group (non-listed), has a capacity of 14bn pieces pa (cf. Top Glove 40bn, Supermax 17.7bn, Kossan 12bn, and Hartalega 11.5bn), of which 4.2bn are dedicated to NBR gloves – a rather small figure compared to the rated companies' NBR capacity that ranges from 5.5bn to 11bn by the end of 2012.

#### Fig. 28: Nomura forecast – China outlook

% y-o-y growth unless otherwise stated	1Q12	2Q12	3Q12	4Q12	1Q13	2Q13	3Q13	4Q13	2012	2013	2014
Real GDP	8.1	7.6	7.4	8.4	8.4	8.0	7.4	7.0	7.9	7.7	7.5
Consumer prices Core CPI	3.8 1.5	2.9 1.3	1.9 1.5	2.0 1.8	2.8 2.0	3.7 2.1	4.6 2.4	5.6 2.1	2.6 1.5	4.2 2.2	4.0 2.0
Retail sales (nominal) Fixed-asset investment (nominal, ytd) Industrial production (real)	14.9 20.9 11.6	13.9 20.4 9.5	13.5 20.5 9.1	15.0 21.0 10.5	16.2 20.8 11.0	15.9 21.2 10.5	15.5 21.3 9.6	15.6 22.0 9.2	14.3 21.0 10.2	15.8 22.0 10.1	16.0 20.0 9.7
Exports (value) Imports (value) Trade surplus (USDbn) Current account (% of GDP) Fiscal balance (% of GDP)	7.6 6.9 1.1	10.5 6.5 68.8	4.5 1.4 79.5	4.6 0.7 68.2	3.0 7.0 (16.0)	4.0 8.0 53.4	6.0 9.0 70.4	6.0 9.0 58.4	6.6 3.9 217.6 1.7 (1.5)	4.8 8.3 166.2 1.0 (1.5)	6.0 10.0 106.0 (0.4) (1.6)

Note: Numbers in bold are actual values; others forecast. Measures are period average. All forecasts are modal forecasts (i.e., the single most likely outcome). Table reflects data available as of 4 January 2013.

Source: Nomura Global Economics, CEIC

#### Glove usage unlikely to be slashed...

Slumps in regions where glove consumption is concentrated remain as a major concern, but regulations in place mean that gloves are must-haves for all healthcare workers. The U.S. Centers for Disease Control and Prevention (CDC) estimates that 5.6mn workers in the healthcare industry are exposed to blood-borne pathogens (Hepatitis B, C and HIV) every year; that alongside a higher cancer diagnosis rate translate into heightened risks facing these employees. To not put healthcare workers at risk, the requirement for more and/or better barrier protection will remain.

Further, we note that gloves make up a mere 2-3% of total expenditure by these healthrelated institutions. Thus spending cuts, if needed, will be targeted at other areas like machinery and equipment which costs are typically multiples of disposable gloves, we think.

#### ... but lofty growth rates are not in the offing

We do not see the glove industry contracting in the near future, notwithstanding our view that high growth rates will be a challenge. We flag that growth in demand dipped sharply in 2008 on a global scale during the global financial crisis, despite seeing the year coincide with low average latex prices following the plunge of crude oil prices – suggesting that the industry might not be truly recession-proof after all.

We expect sales volume growth of the rated companies to come off from CY12F's high of 15.2%, made possible by glove users re-stocking after the 2011 stagnation year. Our forecast of 12.8-14.1% volume growth p.a. over the next three years for the rated companies is slightly higher than the historical 5-year CAGR of 9.1%, as we expect the big players to gain market share with their stepped-up production levels. With volumes holding up, we think that the challenge glove-makers face comes from reduced margins, as a result of supply growth outpacing demand growth.

Gloves are required by healthcare regulations in developed nations

Expenditure on gloves by healthcare institutions is relatively small, thus is more likely to survive spending cuts

Global demand for gloves was flat in 2008 despite coinciding with low average latex prices

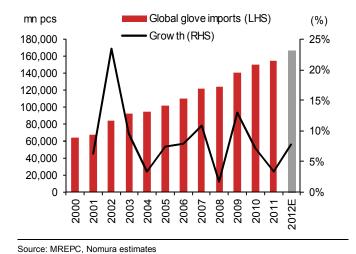
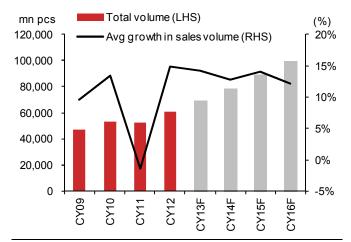


Fig. 30: Total sales volume across rated companies



Source: Company data, Nomura estimates

### **Earnings forecasts**

We think that top-line growth for glove-makers will be relatively limited on the back of our expectations of: 1) low utilisation rates; 2) ASPs being revised downwards; and 3) a weakening USD. Margin compression will likely be further spurred by: 1) an expected increase in natural gas prices; 2) implementation of the minimum wage policy; and 3) possible increase in nitrile raw material prices.

#### Subdued top-line growth

The top-line contribution for glove-makers depends mainly on available capacity, utilisation rate, ASPs and MYR/USD rates. Among these factors, we believe that capacity is a non-issue for each company given their upcoming expansion plans. However, with limited demand visibility in the short term, we think utilisation rates will drop below the previous average of 74% recorded over 2007-2012 by the four companies under coverage, even with our rather optimistic growth estimations (see following figure).

#### Fig. 31: Volumes, market share and utilisation rates

	2012F	2013F	2014F	2015F	2020F	8y CAGR
Global glove demand (bn pcs) ^	167.0	182.0	198.4	216.3	332.8	9.0%
M'sia global market share *	62.0%	62.4%	62.7%	63.1%	65.0%	0.6%
Implied volumes - M'sia (bn pcs)	103.5	113.5	124.5	136.5	216.3	9.6%
Capacity - Rated cos. (bn pcs) #	82.3	95.6	108.3	121.6	176.4	10.0%
Rated cos.' M'sia market share `	60.1%	60.5%	60.8%	61.2%	63.0%	0.6%
Implied volumes for rated cos. (bn pcs)	62.2	68.6	75.7	83.5	136.4	10.3%
Implied utilisation rate	75.6%	71.8%	69.9%	68.7%	77.3%	
Rated cos global market share	37.3%	37.7%	38.2%	38.6%	41.0%	1.2%

<sup>^</sup> Size of global glove market is estimated based on 9.0% 8-year CAGR – higher than historical 8.4% due to increasing healthcare awareness in developing nations.

\* Malaysia market share of 65% in 2020 is the government's target under EPP-3.

# Assume 10% 8-year CAGR for capacity expansions – above 5-year CAGR over 2007-2011 of 9.1%. Figures do not account for potential delays in expansion plans.

`Market share of rated companies as a whole is assumed to increase by 0.6% 8-year CAGR – slightly higher than previous 5-year CAGR of 0.5% largely due to rapid expansions and possible consolidations.

Source: MREPC, Company data, Nomura estimates

Different utilisation rates from the base-case assumptions in our models have similar effects on each rated company, where a 5% increase or decrease leads to a change in EPS of 6.2-7.7% in the same direction. We have applied a discount to each company's target utilisation rate to account for: 1) new lines which are scheduled to come online progressively throughout the years; 2) short-term shutdowns for automation upgrades; 3) possible delays to expansion plans; and 4) potential idle production lines due to a probable overcapacity scenario. We also understand from management teams that each company is in oversold position of 40-60 days. Considering the above-mentioned factors, we arrive at effective utilisation rates between 70% and 83% for these players – slightly above the implied utilisation rate per our calculations in the above figure.

#### Fig. 32: EPS sensitivity to utilisation rates

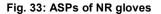
Change in utilisation rate	Top Glove	Supermax	Kossan	Hartalega
-5.0%	-6.9%	-6.2%	-7.7%	-6.4%
-2.5%	-3.5%	-3.1%	-3.8%	-3.2%
0.0% (Base case assumption)	0.0%	0.0%	0.0%	0.0%
2.5%	3.5%	3.1%	3.8%	3.2%
5.0%	6.9%	6.2%	7.7%	6.4%

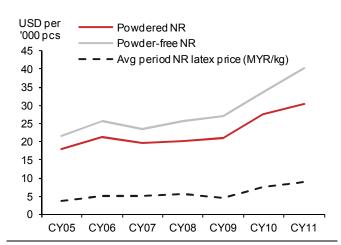
Source: Nomura estimates

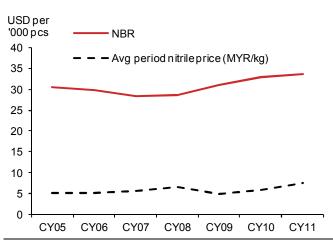
#### Imminent pressure on ASPs: to dump prices, or to enjoy the spoils

As mutually agreed between manufacturers and their customers, ASPs are adjusted in tandem with production costs – additional costs incurred are passed on via higher prices, while cost savings are also shared. Manufacturers have not raised prices in times of pandemics, as the higher volumes were more than sufficient to provide them with better earnings. Profit margins also are inversely related to the prices of raw materials – which constitute the largest proportion of production costs for all our covered companies.

ASP adjustments entail changes in raw material prices to preserve margins





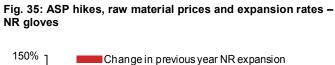


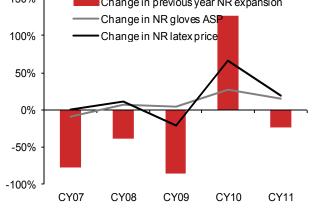
Source: Company data, Bloomberg, Nomura

Fig. 34: ASPs of NBR gloves

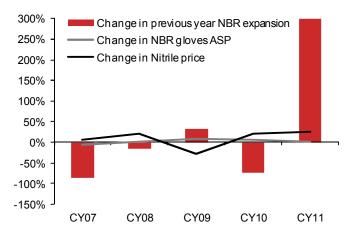
We note, however, that capacity expansions of the four players we cover have, in the past, to some extent affected the pass-on rates of raw material input prices to customers. ASP hikes have been more subtle than increases in NR latex and nitrile prices when manufacturers expanded at faster rates, and vice versa.

Capacity expansions have led to reduced pass-on rates in light of rising raw material costs





## Fig. 36: ASP hikes, raw material prices and expansion rates – NBR gloves



Source: Company data, Bloomberg, Nomura research

Note: Pre-2010 data were largely driven by Hartalega alone Source: Company data, Bloomberg, Nomura research

In light of intensifying competition in the rubber glove sector, we expect ASPs of all key players to be revised downwards as soon as early/mid-2013F. Our forecasts assume the largest price cut by Hartalega and Kossan, whose gloves are priced at the higher end of the spectrum. We expect ASPs of Top Glove to face the slightest downward revision as its products are currently the most economical amongst its peers. Nonetheless, we think that Top Glove will look to match competitors' prices as management indicated that it will be contented to be a price follower in the NBR segment given its relatively smaller size.

Source: Company data, Bloomberg, Nomura

#### Fig. 37: Sensitivity analysis of EPS impact from ASP changes

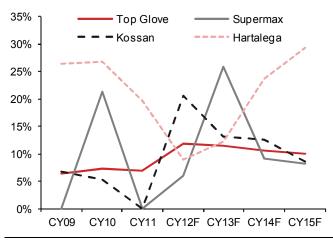
Change in ASPs across all products	Top Glove	Supermax	Kossan	Hartalega
-1%	-16.4%	-13.7%	-14.1%	-6.8%
-2%	-8.2%	-6.8%	-7.0%	-3.4%
0% (Base case assumption)	0.0%	0.0%	0.0%	0.0%
1%	8.2%	6.8%	7.0%	3.4%
2%	16.4%	13.7%	14.1%	6.8%

Note: Analysis done on FY13F EPS except for Hartalega, which is based on FY14F EPS and relative to our base-case assumptions

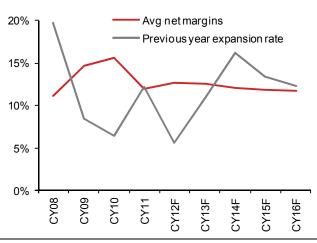
assumptions

Source: Nomura estimates

#### Fig. 38: Past and planned capacity expansions



#### Fig. 39: Margins partly affected by expansion rates, with a lag



Note: Margins are average of all four rated companies, expansions are total Source: Company data. Nomura estimates

Source: Company data, Nomura estimates

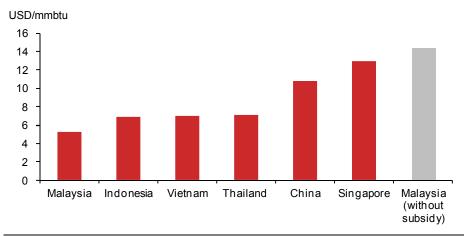
#### Squeeze from the cost side, too

#### Fuel cost concerns

Talk of cutting or abolishing gas subsidies has been ongoing as PETRONAS spends c.MYR19bn p.a. subsidising gas prices in Malaysia. As the country began importing LNG (liquefied natural gas) in September 2012, we believe that the national gas company is likely to lighten its subsidy burden. Announcements on this front are widely expected to be made post the 13<sup>th</sup> General Election, which must take place by June 2013 (official date not yet set).

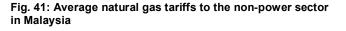
Fuel makes up 7-11% of total costs for each of the companies we cover; current price incurred by the non-power sector is MYR16.07/mmbtu, a significant 64% discount to the market price of c.MYR44/mmbtu. Malaysia's Economic Planning Unit (EPU) proposed a MYR3 rise in gas prices every six months to eventually achieve the market rate. Such a move would will add some volatility to the manufacturers' costs, we expect, as Malaysian manufacturers would lose their fuel cost advantage over competitors in Thailand (see the following chart); however, we do not think Thai players pose too large a threat to local players' market share in the short term, as they do not currently have the capacity to digest the huge demand quantities handled by the Malaysian names. (Malaysia produces c.62% of gloves worldwide; see "Appendix"). Should Malaysian manufacturers' costs be permanently and significantly above those of their Thai competitors, however, we could see glove-makers in Thailand gradually erode Malaysians' market share in the longer term, in our view.

Fuel makes up 7-11% of total cost of production; a major hike in prices could see Malaysian players lose their cost advantage to rival countries



Source: Gas Malaysia, Petronas 2012, PGN, PV Gas, EPPO, China Gas Holdings, Platts LNG, Nomura

When natural gas tariffs were raised back in 2008, glove-makers saw profit margins contract albeit revenue rose. We, thus, believe that despite management teams' intentions to pass on cost inflations, margins would not be entirely preserved.



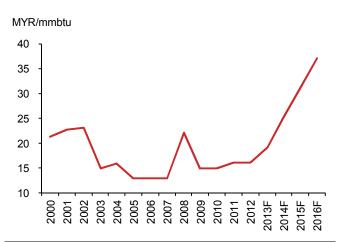
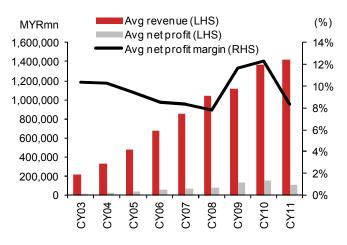


Fig. 42: Low profit margins in 2008 partly due to higher fuel costs



Note: Forecast assumes that price hikes commence in June 2013 Source: Gas Malaysia Bhd, Federation of Malaysian Manufacturers, Nomura Source: Company data, Nomura

#### Heading into biomass

Glove manufacturers have begun to shift into biomass-powered plants, which are marginally cheaper to run at current prices; such a move, however, will likely depend on the supply/demand of the main raw materials used, such as palm kernel and woodchips. With plantation-related authorities' R&D efforts aiming to come up with new uses for palm kernel, we think that the cost of biomass fuel could be on an increasing trend moving forward.

We understand that gas remains the preferred type of fuel for glove-makers as it is more efficient, cleaner and requires less space to operate. Furthermore, these producers are determined in passing on any cost increases to their customers. Thus, although most new plants are dual-fuelled (i.e., gas and biomass), we do not think that use of biomass plants will jump; moving into biomass is more of a diversification strategy rather than a cost-saving one, in our view.

Our estimates show a negative impact to varying degrees on companies' EPS following an increase in production cost (see the following chart), assuming that the cost increase is not wholly passed through to customers and with some lag (see "Company Views" section for more detailed figures). Diversifying into biomass; manufacturers to pass on cost increases to customers

#### Fig. 43: Impact on EPS from natural gas price increase (assuming 80% cost pass-on)

% increase in natural gas price	Top Glove	Supermax	Kossan	Hartalega
0% (base case)	0.0%	0.0%	0.0%	0.0%
5%	-0.9%	-1.4%	-1.3%	-0.5%
10%	-1.7%	-2.9%	-2.6%	-0.9%
15%	-2.6%	-4.3%	-3.8%	-1.4%

Note: Analysis assume that price hikes begin in June 2013. All figures are estimates for FY13F, except Hartalega which shows FY14F estimates. Actual impact on each company will differ due to different FYE, depending on when subsidies are removed (see "Company Views").

Source: Nomura estimates

Based on our estimates, Hartalega is the least sensitive to gas price hikes due to its efficient operations and higher reliance on biomass; Supermax and Kossan are poised to be the most affected as the proportion of fuel in their overall costs structure is the highest across our coverage universe.

#### Automation to overcome labour issues

Glove manufacturing has, traditionally, been a labour-intensive industry; labour costs make up 7-11% of total cost of sales for the companies we cover. MARGMA estimates that Malaysian glove-makers as a whole employ c.60,000 workers – half of them foreign labour. The Malaysian government implemented laws in January 2009, where companies in the manufacturing and services sectors where banned from hiring foreign workers. This was Malaysia's move to combat the country's unemployment problem, but at the same time presented glove manufacturers with fresh problems when demand surged as a result of the swine flu outbreak. Players in the industry have since been stepping up efforts to automate production lines to dampen any effect of labour policies.

#### Minimal impact expected from new minimum wage policy...

The government's latest move to benefit general workers will take effect from the start of 2013. Considering both local and foreign labours, current average monthly pay of employees of the four covered companies ranges from MYR600 to MYR900, excluding overtime compensation and other bonuses – around or above MARGMA's estimate of MYR598 average. The new guidelines will see wages rise to MYR900 per month in Peninsular Malaysia, where all the local glove manufacturing takes place.

We do not expect a significant negative impact on glove companies; the policy was gazetted on July 1, 2012, thus employers have had ample time to revisit cost-saving strategies – including the halting of foreign labour hires. Studies done by the National Wages Consultative Council (NWCC) and Ministry of Human Resource (MOHR) show that demand for migrant workers is expected to decrease by 0.4-6.1% over 2012-2015 with the new minimum wage policy. Based on our discussions with managements, companies do not plan to make employees redundant before the agreed duration, as they can be re-deployed in upcoming plants in Malaysia. Nevertheless, we believe foreign workers are unlikely to see their contracts being renewed upon expiration. Manufacturers are also putting more emphasis on skilled labour, each with plans to increase their skilled/unskilled labour ratio.

 $\ldots$  as manufacturers prep themselves by stepping up automation efforts

Spurred by the increase in labour costs, companies have sped up adoption of the latest technology where significantly fewer workers are required for each production line. For a start, companies are automating the glove-stripping and stacking processes, with aims to further extend this to packaging of gloves, which currently has the greatest reliance on workers. Not only should efficiency be improved from faster line speed, human error will also be reduced. Generally, we believe manufacturers are looking to reduce headcount by 15-45% from automation (see sections for each company).

We think that negative impact from the minimum wage policy will be neutralised by the reduced headcount. Moreover, management teams have indicated that cost increases will simply be passed on to the buyers, which should help to protect margins somewhat.

7-11% of total cost is attributed to labour, but we do not see significant impact to glove makers upon the implementation of the minimum wage policy

Automation of traditionally labour-intensive production lines to bring about sufficient savings should neutralise negatives from the new regulation

#### Competition heats up

We acknowledge the technical know-how that local manufacturers possess after decades in the business, but we note that Malaysian players will lose the inherent advantage of proximity to raw material when it comes to NBR gloves. Malaysia's global NBR share of c.50% stands well below that of the NR, which is estimated to be c.75%; thus, we think that competition in this segment will arise not just among the local players, but also glove-makers in other countries which are not big in NR glove production (e.g., China) as well. Furthermore, Malaysian players are not the only ones realising the potential in this market, evident by the Latexx takeover offer by Austrian-based Semperit AG. Many of the smaller players across the region are also abandoning the NR market, converting NR-producing lines into NBR to ride on this wave, thus creating a more crowded NBR gloves supplier market.

We understand from management teams that they work on absolute profit per glove to preserve margins, but we think that manufacturers will have to make do with lower profits going forward – especially when selling prices come down as a result of intensifying competition. The oversupply situation which plagued the industry back in 2001 resulted in severe price competition, resulting in margin compression even when demand for gloves held up – a less severe version of such is highly likely to repeat in the near future, in our opinion.

#### Margins expected to stay low despite improved efficiencies

Considering the potential influx of glove supply from all the major players, we foresee competitive pricing and deteriorating pricing power as producers compete for business in the NBR division. Hartalega is currently the market leader in this segment with its large capacity (in nitrile gloves) as well as high margins; it dictates prices as others are incapable of producing NBR gloves by the same volume and quality. Nevertheless, as all players step up their productions in this division, glove-makers will, in our view, be tempted to lower ASPs in order to lure customers, regardless of it being in the companies' best interests to allow prices to stay high and reap maximum profits – as demonstrated in the Prisoners' dilemma. Indeed, our on-the-ground survey suggests that various companies already foresee themselves producing NBR gloves at less profitable levels, and are generally content with margins similar to that of NR gloves.

We thus expect to see shrinking margins in NBR gloves which have always been more attractive than the NR equivalents, losing its status as the higher-yielding product. We think margins will be low or slightly above levels experienced in the 2008 recession and 2011 raw material price surge. We do not expect margins to decline much further as automation increases operating efficiencies; expectations of soft latex prices also support bottom-lines. We see margin recoveries from 2015F/16F as expansions begin to tame.

Fiercer competition in the NBR segment due to more easily available nitrile raw materials

End users to gain from NBR expansions as it is unlikely for manufacturers to co-operate and keep NBR as a high-margin product

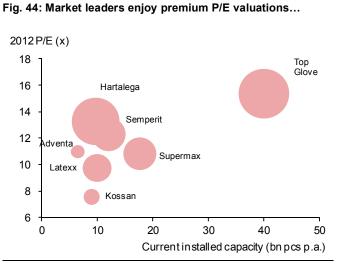
### Valuation

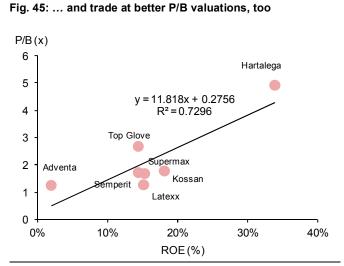
Top Glove has enjoyed premium valuations over its peers for its market leader status – particularly in challenging operating environments; Hartalega which spearheads the NBR segment is also making its way up the valuation chain, trading at a mere 1.3% discount to Top Glove's. Supermax and Kossan's discounts are at 31.6% and 41.4% respectively, as of current figures. We note that the P/E multiples of the rated companies have been creeping upwards, and are now around or above the +1SD levels, except for Kossan.

#### No P/E re-rating from switch into nitrile, in our view

In our opinion, costs of glove manufacturers lack predictability as NR latex prices are highly volatile; nitrile raw material costs, on the other hand, have been more stable in the past. Recall, however, our argument for this trend not continuing into the future as supply of butadiene is likely to be constrained. We therefore do not think that glove makers deserve to be valued at higher P/Es going forward for stepping into the nitrile segment.

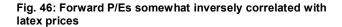
Following the significant increase in latex prices towards the end of 2010, the discount between Hartalega and Top Glove's forward P/Es has widened despite the former almost being a NBR pure-play, although the gap has been closing up gradually while those of Supermax and Kossan have barely moved as much. We thus attribute Hartalega's narrowing discount to its market-leader status in the NBR segment, in lieu of the blend of its portfolio. Unpredictable costs for glove producers – something which will continue into the future in spite of switch to nitrile, in our view

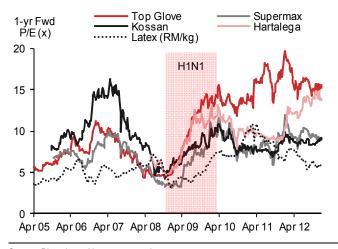


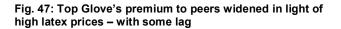


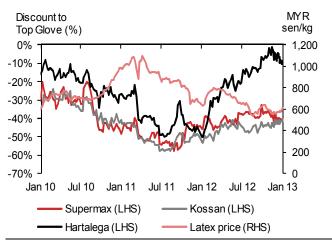
Note: Size of bubble shows the market cap of each company Source: Bloomberg, Company data, Nomura research

Source: Bloomberg, Nomura research





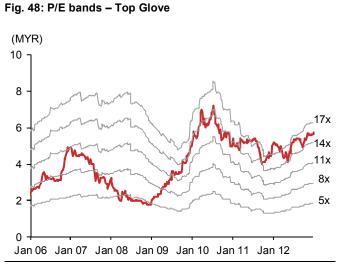




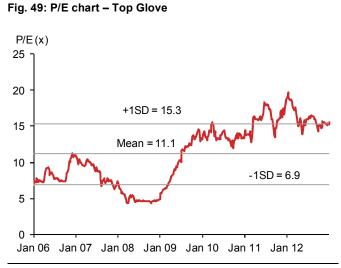
Source: Bloomberg, Nomura research

Source: Bloomberg, Nomura research

Glove players are currently trading at 8.9-15.2x one-year forward P/E (Bloomberg consensus), compared to market one-year forward P/E of 14.7x. These forward P/Es are generally above their historical mean levels, with the exception of Kossan which currently trades marginally lower than its 6-year average of 9.1x. P/Es have increased since latex prices began to ease – we thus think that the positives from cost-savings on this front have been priced in. We see potential upsides to Kossan's valuations, as the shares are currently trading at undemanding multiple of 8.9x one-year forward P/E. Both groups have plans to increase capacity at a faster pace, providing positive growth profile for the names. The Malaysian rubber glove companies have, as a whole, traded at a 10x one-year forward P/E multiple since 2007, on average. Besides, Semperit has also valued Latexx Partners at a 10x one-year forward P/E multiple in its recent takeover offer, suggesting that such multiple is reasonable and still applicable.

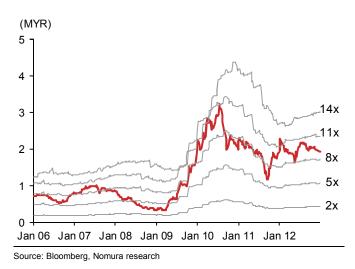


Source: Bloomberg, Nomura research



Source: Bloomberg, Nomura research

#### Fig. 50: P/E bands – Supermax





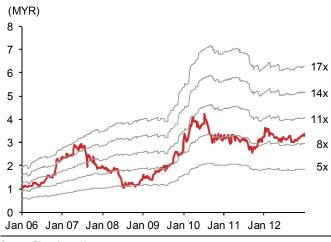
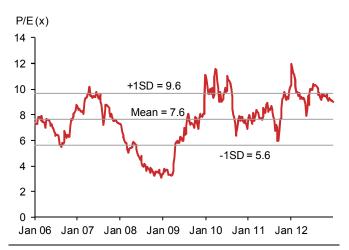
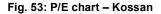
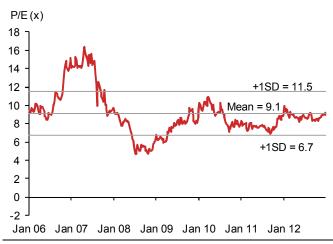


Fig. 51: P/E chart – Supermax



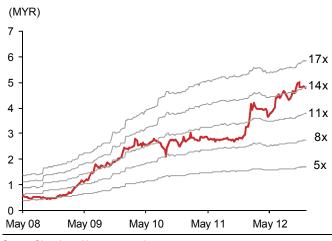
Source: Bloomberg, Nomura research





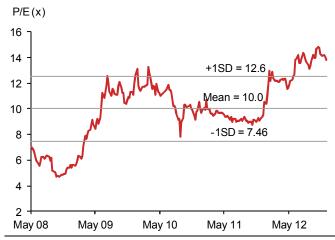
Source: Bloomberg, Nomura

#### Fig. 54: P/E bands - Hartalega



Source: Bloomberg, Nomura





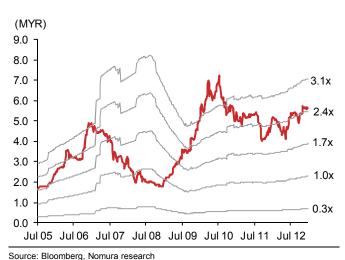
Source: Bloomberg, Nomura research

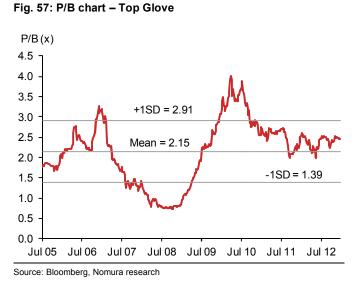
#### **P/B multiples**

Malaysian rubber glove stocks are generally trading around or above historical P/B multiple levels, with the exception of Kossan – as explained in our previous section which highlights Kossan as the "cheapest" stock currently in the context of P/E multiples.

Source: Bloomberg, Nomura research









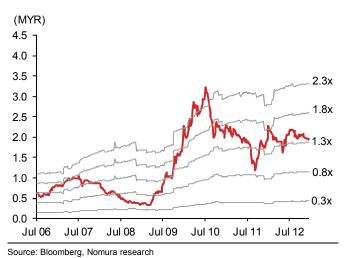
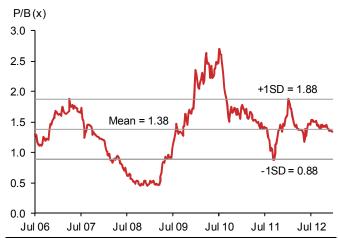


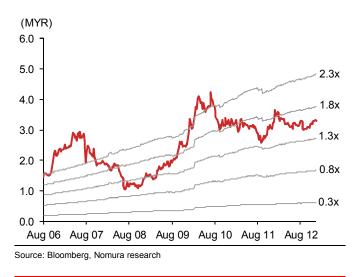
Fig. 59: P/B chart – Supermax

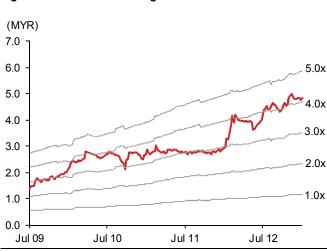


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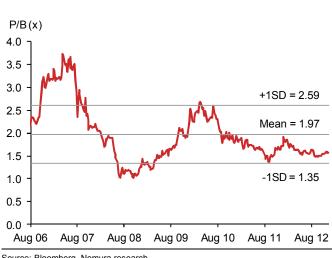
Source: Bloomberg, Nomura research





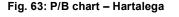


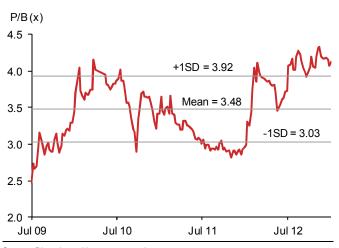




Source: Bloomberg, Nomura research

Fig. 61: P/B chart - Kossan





Source: Bloomberg, Nomura research

#### Previous share price performances

Despite the market labelling the Healthcare sector as "defensive", the share prices of these companies have fallen in tandem with the market over the 2008 global financial crisis – indeed, they have shed more value than the FBMKLCI in percentage terms. From the peak to trough over the calendar year, the market suffered a 45.3% decline, while glove players Top Glove, Supermax and Kossan were down 46.2%, 63.7% and 47.2% respectively. We attribute manufacturers' lacklustre performances relative to other stocks of traditionally defensive sectors (see LHS chart below) to increased latex prices; the share prices gradually stabilised in the wake of easing raw material prices in the second half of the year, following the collapse of crude oil prices.

Source: Bloomberg, Nomura research

Share prices have fallen more than the FBMKLCI in 2008, but were saved from further misery thanks to falling latex prices

Dec 08

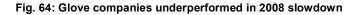
Supermax

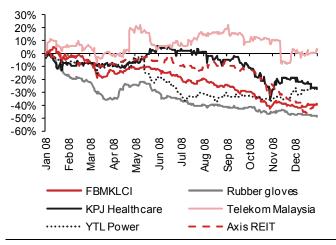
Nov 08

Sep 08

Top Glove

Oct 08





Note: "Rubber gloves" is a market cap-weighted index of Top Glove, Supermax, Kossan, Latexx and Adventa

Source: Bloomberg, Nomura research

Note: Hartalega was listed on Apr.16th, 2008 – share price performance indexed to that of FBMKLCI on its debut day Source: Bloomberg, Nomura research

······ Hartalega

Jun 08 Jul 08 Aug 08

day Jun

Fig. 65: Zoom-in of each rated company

80

Apr

FBMKLCI

Kossan

80

10%

0%

-10%

-20%

-30%

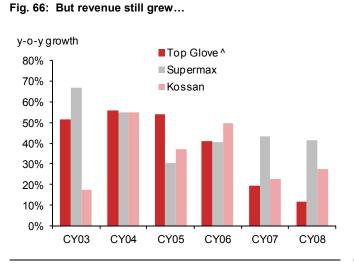
-40%

-50%

-60%

-70%

Nonetheless, Top Glove, Supermax and Kossan recorded positive growth in both revenue and profits albeit at a slower rate than the average of the six preceding years; their margins have also contracted, generally, over CY08.

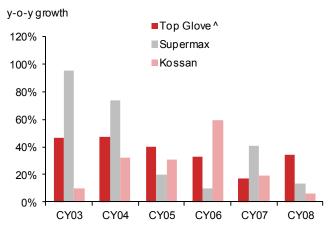


#### Fig. 67: ... and so did profits

Feb 08 Mar 08

80

Jan



<sup>^</sup> Top Glove figures adjusted for different financial year end Source: Company data, Nomura research ^ Top Glove figures adjusted for different financial year end Source: Company data, Nomura research

### Risks

#### **Pandemic outbreaks**

Since their public listing, glove manufacturing companies have seen their share prices rally significantly in 2003-05 and 2009-10, when they were cashing in on the Severe Acute Respiratory Syndrome (SARS) and Swine Flu (H1N1) pandemics respectively. Top Glove performed the best both times, which we attribute to its large capacity and low utilisation rate that enable it to ramp up production to capture the unforeseen surge in demand. The emergence of H1N1 had more than offset the negatives of the global financial crisis in 2008, with profits growing alongside much improved margins. Rising latex prices were unable to wither demand for gloves either.

Ex the periods where pandemic outbreaks have led to share price run-ups, the rest of the share price movements can somewhat be explained by latex prices, although this is not the case for Hartalega which is close to being a NBR pure play. We note that there is still a weak correlation between the two factors where Hartalega is concern as nitrile and NR latex price movements are related.

Share prices generally move in

Pandemics are the main drivers

of share prices

opposite direction with latex prices in the absence of other catalysts

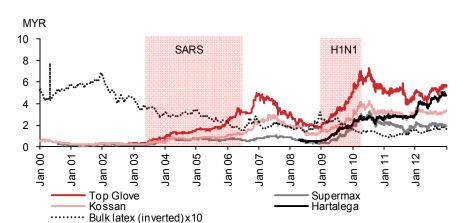
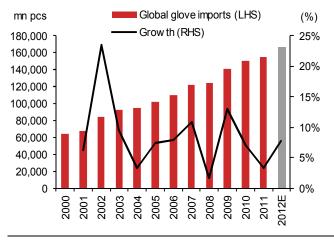


Fig. 68: Previous share-price run-ups both catalysed by pandemics

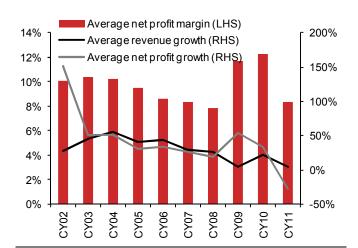
The industry has seen large demand upticks in times of diseases outbreaks – SARS in 2002/03 and H1N1 in 2009/10. Demand growth dwindles rapidly post pandemics seeing that distributors and end users of gloves typically stock-pile during the period, thus delay purchases when diseases are contained as they clear off inventories.

Source: Bloomberg, Nomura research





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Source: MREPC, Nomura research

Source: Company data, Nomura research

Note: Average numbers are those of Top Glove, Supermax and Kossan

#### **Exchange rates**

Being an export-driven industry, revenues of glove manufacturers can be affected by exchange rates on two fronts – 1) a weakening USD relative to MYR results in lower reported revenue (ASPs quoted in USD but MYR is the reporting currency); and 2) a strengthening MYR relative to THB (currency of Malaysia's main rival in the industry) makes Malaysian products appear more expensive in comparison. In this context, Nomura forecasts strengthening of both MYR and THB against USD alongside a strong MYR relative to THB from 2012 through 2014 (see Nomura Economics Research report "2013 outlook: Asia's overheating risks" dated Nov. 28<sup>th</sup>, 2012).

#### Fig. 71: Nomura's in-house currency forecast

	1Q12	2Q12	3Q12	4Q12	1Q13	2Q13	3Q13	4Q13	2012	2013	2014
MYR/USD	3.06	3.18	3.06	3.00	2.97	2.95	2.93	2.92	3.02	2.92	2.84
THB/USD	30.8	31.8	30.8	30.5	30.3	30.1	30.0	29.9	30.5	29.9	29.2
THB/MYR	10.065	10.000	10.065	10.167	10.202	10.203	10.239	10.240	10.099	10.240	10.282

Note: Numbers in bold are actual values; others forecast. Forecasts are end of period and modal (i.e., the single most likely outcome). Table reflects data available as of Nov.28th, 2012.

Source: CEIC, Nomura Global Economics

MYR/USD rate fluctuations will largely put local players on a level-playing field and, thus will have similar impact on all companies (see sections for each company for trend of quarterly EBITDA and MYR/USD rates for each name). Generally, exchange rate impacts earnings rather heavily given the companies' high operating leverage. We expect a lesser impact on EPS from relative strength of these currencies with glove-makers focusing more on the NBR segment. This is because nitrile raw material costs are quoted in the USD, as opposed to NR which is quoted in the local currency.

#### Fig. 72: Sensitivity analysis of exchange rate impact on EPS

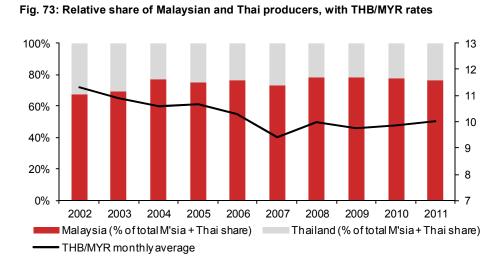
EPS sensitivity to MYR/USD rates	Top Glove	Supermax	Kossan	Hartalega
-2%	-16.4%	-14.0%	-13.6%	-7.3%
-1%	-8.2%	-7.0%	-6.8%	-3.6%
0% (Base case)	0.0%	0.0%	0.0%	0.0%
1%	8.2%	7.0%	6.8%	3.6%
2%	16.4%	14.0%	13.5%	7.3%

Note: EPS are based on FY13F estimates, with the exception of Hartalega which uses FY14F EPS Source: Nomura estimates

## MYD/USD change affects reported revenue in domestic currency

A significantly weaker THB in comparison to MYR will also spark worries of Thai competitors taking away market share of Malaysian manufacturers. There has been, in the past, some correlation between the relative strength of these two currencies and the countries' market share (of Malaysia and Thailand combined).

Strengthening MYR relative to THB could see local players lose market share to Thai contenders



Source: MREPC, Bloomberg, Nomura research

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## Appendix

## Brief history of the industry

The rubber gloves' story started off in the early '90s thanks to the HIV scare, where the US Food and Drug Association (FDA) specified that the use of rubber glove can effectively prevent the spread of the virus. At that point in time, before the local players came into the scene, the industry was largely dominated by MNCs such as Ansell (ANN AU, Buy) and Kimberly Clark (KMB US, N.R.). The Malaysian companies, however, quickly took away market share, owing largely to the "culture" of these companies which brought about higher efficiency and significant cost savings. Thailand became the new investment spot for these MNCs after incentives by the Malaysian government have been exhausted, leaving behind the locally-groomed players.

As of today, the Malaysian companies have grown so much in size that new entrants find it hard to break into the local market. Indeed, consolidations have been an on-going trend in the past twenty years or so, particularly in the wake of high latex prices – where the smaller and inefficient players are weeded out. Malaysia's two largest players by capacity, Top Glove and Supermax, have both expressed their views that further consolidation is likely in the near future – largely due to the increased competition.

Rather high profile consolidations have been featured in recent months, where Adventa was offered a buyout by its major shareholders in July, and Austrian-based Semperit AG (SEM AV, N.R.) has been approved to takeover Latexx Partners (LTX MK, N.R.) – according to Semperit's press release. With Semperit's existing operations in Thailand (Sempermed and 50:50 Sempermed-Sri Trang JV), we believe the group would inch ahead of Supermax and become the second largest glove manufacturer in the world by capacity, should the deal go through. Besides that, a 30% stake in YTY Industries Sdn Bhd\* (non-listed; similar to Hartalega in most aspects) was sold to Thai petrochemical group Indorama Ventures (IVL TB, N.R.) at an undisclosed price.

\* YTY is the second-largest NBR glove producer in the world with capacity expected to reach 10.5bn pcs p.a. (according to YTY website). It has similar operations to Hartalega with FY11 EBITDA margin of 30.6%, PAT margin of 20.8%. 92% of its revenue come from quality-demanding U.S. (78%), Europe (8%) and Japan (6%).

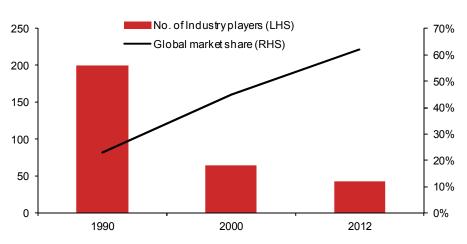


Fig. 74: Consolidation of the rubber glove industry

Source: MREPC, Nomura research

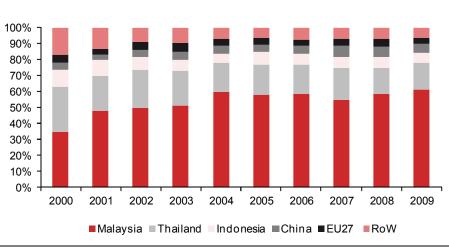
On-going consolidation to see only the most efficient players remaining in the game

## A "Made in Malaysia" label to be truly proud of

Fig. 75: Malaysia has the largest global market share, by far

#### Government targets to grow Malaysia's already-large market share

Glove manufacturers based in Malaysia enjoy a huge chunk of the world's rubber glove market, with a share of more than half since 2002, according to MREPC. This has increased further slightly, and stabilised at around the 60% level. Save for Malaysia which currently makes c.62% of the gloves consumed globally, Thai manufacturers are the second largest with c.18% market share; Indonesia clinches third place with c.12% share. The Malaysian government has expressed its intention to see market share grow to 65% by 2020 under its third Entry Point Project (EPP-3). This unparalleled success story results from various factors, which will continue to help the pioneer retain its top perch in this industry, in our view.



Source: MREPC

#### Domination partly due to proximity to raw material...

Malaysia has been blessed with rich soils which are suitable for a wide variety of plantations – including rubber trees. This has ensured an abundant supply of NR latex, which brings about an inherent advantage of easy access to sources of raw materials.

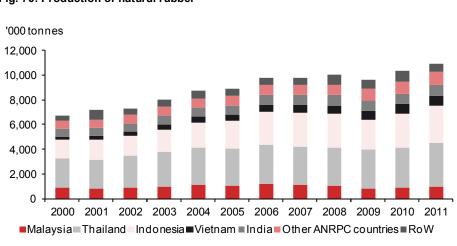


Fig. 76: Production of natural rubber

Source: ANRPC

#### ... but that is just one piece of the puzzle

The Malaysian share of global natural rubber production has been gradually decreasing, while the proportion of the raw material coming from India and Vietnam has been consistently rising. In fact, Vietnam is on track to surpassing Malaysia as the world's third largest NR producer with its 955,000 tonnes output in 2012, according to The

Association of Natural Rubber Producing Countries (ANRPC). Thailand and Indonesia produce thrice and twice the amount of natural rubber compared to Malaysia respectively, but their glove manufacturers play second fiddle to local players despite sharing the same advantage.

#### Location, as well as infrastructure

In our opinion, Malaysia offers the benefit of competitive transportation cost due to the strategic location of Port Klang, where shipments to the west of the region can be carried out more effectively. In Thailand, most of the rubber plantations are in the South (Hat Yai region) whilst the main ports are located in Bangkok and Laem Chabang, which are more than 700km away – gloves need to be trucked to these ports before being shipped to the intended destinations. For Indonesia, transportation costs are still higher for exporters despite the country having around 300 ports, as it is rather impossible for most of the ports to handle bulk shipments due to their smaller sizes, in our view. Under-developed roads pose further problems, especially as latex has to be transported in liquid form prior to being made into gloves.

#### Leader in technology and R&D

It is hard to dismiss the achievements of Malaysian companies in the glove industry in innovation. Hartalega alone has a number of "first" in the world – first to develop polymer-coated powder-free gloves, first successful double-former production line, among many others. The quality of Malaysian gloves is also one of the best in the world, as products are constantly improved to keep up with the US, FDA, EU CEN and Brazilian ANVISA's stringent standards. Malaysian Rubber Board (MRB) and Malaysian Rubber Glove Manufacturers' Association (MARGMA) have also formulated a product certification scheme, Standard Malaysian Glove, to provide assurance for quality products.

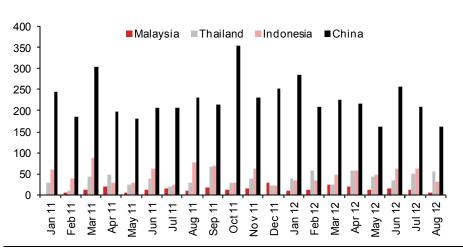


Fig. 77: U.S. FDA monthly refusal data for the four largest supplying countries

Malaysia has the lowest number of refusals by the U.S. FDA among major glove suppliers, despite supplying c.63% of the country's total glove imports

Source: U.S. FDA

#### Strong supporting industries and organisations

Many of the larger manufacturers of machineries like glove formers and dipping lines, e.g. HT Ceramics (M) Sdn Bhd (non-listed) and Ecotherm Sdn Bhd (non-listed), are Malaysian-based. According to MARGMA Vice President Dennis Low, Malaysian engineering companies develop and produce more than 80% of the new machinery and technology used in the industry. We also understand from managements that these local manufacturers are being consulted by foreign players due to their technology advancement and vast experience in the field.

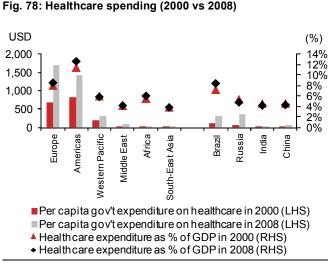
Government and professional bodies like the MRB, MARGMA, Malaysian Rubber Export Promotion Council (MREPC), and Rubber Research Institute of Malaysia (RRI) play a further role in improving the rubber and rubber gloves industries, consistently supporting the developments and promotions of Malaysian products to the rest of the world.

#### Labour productivity

Labour productivity further benefits local manufacturers, where an analysis done by Research and Markets (Global Rubber Glove Market: An Analysis, March 2009) suggests that workers in Malaysia are nearly thrice more productive than Thai counterparts and twice more efficient than Indonesian workers. Per our understanding from meetings with management, a motion study carried out by Kossan also produced similar results, where Malaysian workers were found to be more productive than their peers in countries like Thailand, Indonesia, China and Vietnam.

## Asia's rising healthcare awareness – a potential driver

Compared to the West, spending on healthcare in the East remains low, particularly in terms of per capita spending. Nevertheless, it is noteworthy that growth in healthcare expenditure in developing regions (Africa, South East Asia as well as all the BRIC nations) outpaced the global average - an encouraging sign that rising affluence in these regions may continue to propel spending in this segment upwards, which we believe should lift the usage of rubber gloves.



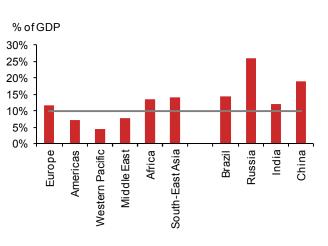


Fig. 79: Healthcare spending 8-year CAGR

Source: WHO, Nomura research

#### New potentials

• Emerging markets / BRIC nations – Among the BRIC nations, Brazil, which spends 8.4% of its GDP on healthcare (only 0.1% lower than Europe), appears to have to highest awareness on this front - not forgetting that it has the stringent quality standards for gloves, even when compared to the US. (refer figure below).

#### Fig. 80: Requirements of gloves' qualities

Glove types	U.S.	Brazil
Examination gloves	AQL 2.5	AQL 1.5
Surgical gloves	AQL 1.5	AQL 0.65

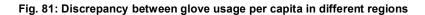
Note: Lower Acceptable Quality Level (AQL) implies lower defect rates

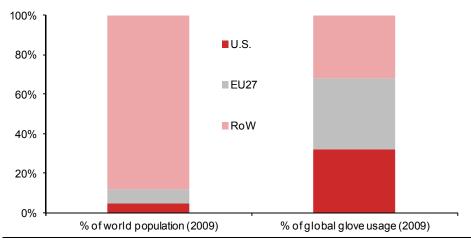
Source: U.S. FDA, Company slides

As of 2009 figures, the US and EU27 accounted for 5% and 7% of the world's population respectively, but together consumed 68% of the global gloves supply. The wide gap suggests that sufficient room exists for increased glove usage in countries outside of these regions. Such countries, China and India in particular, present a wealth of untapped demand in the glove market with their high population growth rates and low penetration thus far. The growing middle-income segment points to significant latent demand from China and India, given the correlation between wealth and healthcare awareness. Together accounting for 37% of the world's population, any

#### Source: WHO, Nomura research

glove-related regulations put in place in these two countries will paint a rosier outlook for the industry, in our view.





Source: MREPC, World Bank, Nomura research

While we appreciate the sizeable potential in these relatively untapped markets, we note that regulations are yet to put in place regarding glove usage in both China and India. China's 12th Five-Year Plan (2011-2015) depicts the government's intention to improve the country's healthcare standards, including the prevention and control of major diseases outbreaks and communicable diseases – a first step forward by the world's second-largest economy. Nevertheless, we note that this change is unlikely to come in the near term and, thus it remains as a longer-term source of growth for the industry.

• **Households** – Managements of companies also see potentials in western households, where gloves are gradually becoming a regular feature in homes and are readily available in supermarkets. Increasing focus on hygiene will set this trend running fast, in our view, presenting yet another potential driver for the glove manufacturers.

## Catalysts for NBR switch

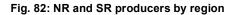
- Stable nitrile pricing The US has started moving towards the NBR glove types prior to the NR latex price surge, as nitrile raw material prices are less volatile than that of natural material, which is preferred by medical distributors and hospitals that work on long-term contracts.
- Surging latex prices As discussed in previous section regarding the glove-makers' changing cost structures, NR latex prices, which went to an all-time high of MYR10.93/kg in April 2011, made NR gloves (previously the more economical option) more expensive than the NBR counterpart. Given the higher quality of the NBR gloves, it is no surprise that they have overtaken NR gloves as the preferred choice.
- **Technological constraints** Current available technology allows NR gloves weighing around 5g to satisfy the authorities' safety requirements. NBR gloves on the other hand can be as thin as 3g, which translates into significant cost savings for manufacturers as raw materials make up the bulk of production cost.
- Latex allergy issues The Australasian Society of Clinical Immunology and Allergy (ASCIA) estimated that prevalence of latex allergy is less than 1% of the general population, but increases to 5-15% when it concerns healthcare workers the main users of gloves. Symptoms of such allergy include itching and swelling, but in extreme (and unusual) cases it could be life-threatening. Governments in the developed countries have introduced regulations to prevent these issues Germany has banned powdered NR gloves since 1998; The UK set out a RCP/NHS Plus guideline to control allergy problems in 2008; while some states in the US like Oregon and Massachusetts

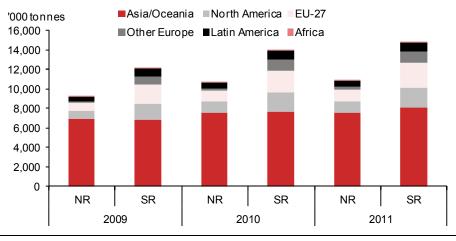
Spending on healthcare increasing, but emerging markets need more time before healthcare awareness match those of the developed nations have banned all NR gloves altogether in food-service facilities. Johns Hopkins Hospital has also gone latex-free and ended the use of all NR gloves in 2008.

• **Promotional efforts by western government** – As depicted in the following chart, NR production is concentrated in Asia (Africa and Latin America are the other smaller producers), but North America and Europe produce a substantial share of the world's synthetic rubber. It is thus unsurprising for the countries to endorse NBR gloves. An example of an extract obtained from the U.S. Environmental Protection Agency:

"Nitrile gloves, in contrast, provide a better barrier to paints and organic solvents — the chemicals that are some of the toughest on gloves. Because they protect well and are durable, nitrile gloves (which cost about USD10.00 for a box of 100 pairs) offer good value for your safety dollar."

The irony is that NBR gloves are non-biodegradable.





North America and Europe do not produce natural rubber, but have ~45% global share of synthetic rubber production

Source: IRSG

#### Fig. 83: Comparison between properties of NR and NBR gloves

Properties	NR Gloves	NBR Gloves
Elongation (Range %)	Up to 900%	Up to 650%
Tensile strength range	500 – 3,500 PSI	200 – 3,500 PSI
Durometer or hardness range	30 – 95 Shore A	20 – 95 Shore A
Barrier against viral transmission	High	Moderate
Tear resistance	High	Moderate
Comfort and finger dexterity	High	Moderate
Water resistance	High	Moderate
Abrasion resistance	High	High
Tactile sensitivity for better feel	Moderate	High
Puncture resistance	Low	High
Oil resistance	Low	High
Resistance against chemicals	Low	High
Food contact safety	Low	High
Protein content	Present	None
Biodegradable and environmental friendly	High	Low
Price	High	Low
Price fluctuations	High	Low

Source: Robinson Rubber Products, Top Glove, Nomura research

## Natural rubber latex – from seeds to gloves

#### Extracting the latex

The rubber tree loses all of its leaves in January during a hot dry spell. With the new leaves come the flowers, and then the fruit. The green fruit slowly turns brown. Because seeds rapidly lose their viability if exposed to sun and rain, the seeds are collected and put into a cold store or a germination bed. The life cycle of a rubber tree is as follows:

- Latex seed germination Seed germination takes 7-10 days, after which the seed is moved to a poly bag. The green bud is grafted at 600mm. The seed provides the root stock and the graft provides the tree. Green buds for grafting come from bush nursery.
- **Grafting the rubber tree** When the seedling is 3 months old, a small patch is removed from the seedling and a green bud is grafted on and bandaged; the graft is left for one month. The polythene bandage is removed and the tree is cut back. The seedling remains in the nursery for 2 stages of leaf and then planted out (c.6 months). A general rule is that there is rate of 400 trees planted per hectare.
- Extraction of latex from trees This starts when the tree is 4-5 years old. A tapping panel is a half spiral, starting c.150cm from the ground; each incision is 1-2mm deep.

Tapping is done early in the morning as long as it is not raining or the trees are not wet. In tropical areas, this is likely to occur approximately 100 days a year. A tapper can tap c.500 trees in 3 hours, and then collects the latex 4-5 hours after tapping. By then, the latex vessels would become blocked and the latex coagulates, leaving a white strip of latex on the tree known as "tree lace". Latex vessels run down from right to left and tapping is down from left to right to maximise production, which is usually about 125mL of latex per tap. Trees produce their best yields in the first 5 years.

#### Processing the rubber

When processing latex, the aim is to extract the rubber and leave the water and nonrubber components behind. Fresh latex coagulates fairly quickly.

Latex is generally either 1) processed into latex concentrate for manufacture of dipped goods or, 2) can be coagulated under controlled conditions using formic acid. Concentration is most commonly achieved via centrifugation, where content of non-rubber components, including proteins, is reduced in both processes as the water is removed. Creaming and evaporation are other alternatives but are not as popular. The stabilized latex is concentrated to yield approximately 60% dry matter. Coagulation can be prevented by adding a stabilizer, generally ammonia. The latex kept in a liquid state can thus be processed at a later time.

#### Making of gloves

Gloves are generally produced in very large numbers on highly automated production lines. Historically, this industry has always made use of natural rubber latex as the raw material, since its ability to form smooth, continuous films on drying is advantageous, and its vulcanizates have high strength and elasticity; nitrile has gradually gained prominence in the industry following the volatile (and high) prices of NR latex.

#### Latex storage

Generally, NR latex concentrate is delivered to the consuming factory in bulk, i.e. 9,000-14,000 litre tanker loads. Storage is important as NR latex has the tendency to cream.

#### Preparation and mixing of compounding ingredients

To ensure uniform mixing of compounding ingredients, and to avoid subsequent settling out, water-soluble ingredients are added to latex as aqueous solutions and waterinsoluble ingredients are added as aqueous dispersions or emulsions. Latex mixing is needed after adding the dispersions to the latex. The ingredients are added to the latex under slowly stirring in order to become a base compound.

#### Maturation

After mixing, the vulcanizable latex mix is matured, i.e. stored before use. Typical storage times of 12-16 hours at 25-30°C is sufficient to ensure adequate dispersion of the compounding ingredients. Maturation allows any air bubbles in the mix to rise to the surface, after which the mix is cooled to 16-20°C and strained through a mesh nylon or stainless steel gauze. The sieved mix is then fed into the dipping tanks.

#### Formers

Gloves are produced on hollow ceramic formers which are rapidly heated and cooled, facilitating high-speed production. A chain moves around continuously around the top and bottom levels of the dipping line; turning movable formers are connected to both sides of the chain. The formers can turn and also move up and downwards on the chain.

- **Coagulant and latex dipping** Clean formers are dipped into a coagulant bath so that latex mixture will adhere to the formers. The thickness of the gloves will be determined by the length of time in which the formers spend in the tank. Coagulant-coated formers are then dipped into another tank of latex (NR or NBR).
- Leaching When the latex mixture dries, the coagulant-coated formers will then pass through a hot water bath containing suitable de-tacking agent where excess additives are removed. Water of a high temperature which is constantly replaced, together with a longer duration for such process, will remove latex proteins more effectively a crucial step in tackling latex allergy issues.
- **Beading** Gloves are produced with a rolled bead or rim at the open end. The bead is made by rolling down the topmost portion of the deposit on the former a process generally performed by means of rotating brushes, although it used to be done manually. The rolling is carried out when the deposit is substantially dry but not fully vulcanised; the natural tack of the rubber holds the bead in position during the completion of vulcanisation.
- Vulcanising Final drying and vulcanisation is normally carried out at temperatures of 110- 120°C in a cure oven, with its main aim being to strengthen physical properties of rubber. After curing, the products are cooled down by jets of cold air and a pneumatic blow-down system loosens the product sufficiently to strip off the products with ease.
- **Slurry dipping** Gloves will then travel through a dipping tank consisting of corn starch solutions, which will prevent the gloves from sticking inside.
- **Stripping –** The final operation on the production line is cooling down and stripping, i.e. removal of the products from the formers. This traditionally labour-intensive process is mostly carried out by automated systems in recent days.
- **Tumbling** After being removed from the formers, the gloves are put into commercial dryers to remove excessive powder and to ensure that the remaining portion is more evenly distributed.
- Quality control For quality assurance, the products will be inspected by lot when are they are stripped. They will be classified by size, weight and batch number; random samples will be taken from each lot. The gloves will be inflated, and a visual inspection performed for major/minor defects and cosmetic faults, ensuring that goods meet the AQL (acceptable quality level) standards. Water tight tests, where each glove is filled with 1,000mL of water for 2 minutes and examined for leaks, are run to detect pinholes.
- Former cleaning At the end of the cycle after passing through all the designated stations, the formers are lowered into a week acid solution, conveyed through and then withdrawn. The acid dissolves any deposits remaining on the formers. After acid treatment, the formers are lowered into circulating hot water to wash away the acid and remove any loosened deposits remaining. The formers are dried then in an oven, which is maintained at a constant temperature by re-circulating hot air.

## Nitrile Butadiene Rubber - background

Nitrile Butadiene Rubber (NBR) is a co-polymer of two materials – butadiene (CH2=CH-CH=CH2) and acrylonitrile (CH2=CHCN). In the production of it, these two components are emulsified in water, and will then undergo either hot- or cold-polymerization through the action of free-radical initiators. Acrylonitrile typically makes up 15-50% of the final copolymer, with higher acrylonitrile content resulting in more preferable properties in terms of strength, resistance to swelling by hydrocarbon oils and permeability to gases, but at the same time becomes less flexible at lower temperatures.

Acrylonitrile is made from acetylene or ethylene-oxide and hydrogen-cyanide; butadiene is often produced from acetylene or ethyl-alcohol via steam-cracking. A by-product of crude oil, the supply of butadiene generally depends on the demand for plastics, plasticizers, electronics and electrical parts, whereby a demand surge leads to the requirement of more ethylene, polyethylene and propylene, which are all key ingredients to make plastic parts. In the process of producing these hydrocarbons, butadiene will be formed; when C4 gas is steam-cracked from crude oil, ethylene makes up c.50% of the output while butadiene makes up c.20% of it.

Ethane-based crackers produce a very large proportion of ethylene and less propylene or butadiene; naphtha-based crackers have a more balanced mix. With ethane being much cheaper in some regions (Middle East, Russia, North America), many crackers have switched to ethane as a feedstock and therefore the realistic capacity of butadiene has declined. Going forward, most new crackers will be ethane based. Only a few naphtha crackers will come on line – mainly in China, Brazil and India.

## Hartalega Holdings HTHB.KL HART MK

HEALTH CARE & PHARMACEUTICALS



## Break from a long, hard run Unrivalled efficiencies, but valuation unattractive amid intensifying competition

## Action: Initiate with a Reduce rating and TP of MYR4.15

As competition heats up, not even the NBR market leader will be spared from a margin squeeze, we think. We see Hartalega's growth tapering off and look for ROE to decline from 36.2% in FY12 to 26.1% in FY15F owing to shrinking EBIT margin and lower asset turnover. Major competitors' expansions into nitrile will slightly erode the group's profits via lower ASPs, in our view. We forecast a 3-year EPS CAGR of 7.9% (consensus: 12.1%) largely on expectations of downward ASP revisions and lower margins.

## Catalysts: Rising competition, weaker pricing power

Before the latex price surge in 2010/11, Hartalega was the dominant local NBR player; in 2009, Hartalega's NBR gloves contributed 82% of its mix and were equivalent to 36.5% of the major players' total nitrile capacity. Since 2011, however, glove manufacturers of all sizes region-wide have begun skewing their NR-focused product mix towards nitrile. We see increased pricing pressure for the group forcing ASPs down. Hartalega's high margins and returns relative to its peers remain a plus, but we think were priced in during the stock's strong 60% rally over CY2012 – well above the 5.6% average increase for the other three companies we cover.

### Valuations: Expensive, and with challenges ahead

High latex price drove the stock up to unprecedented levels on favourable cost dynamics in end-2011/early-2012. Valuation improved with the rally; the current one-year forward P/E of 15.0x is above the sector average of 10.0x. While we think Hartalega deserves a premium for its NBR market leadership and efficient operations, we think the stock will correct as the industry sees capacity ramp-ups taking place. We value the stock using a target P/E of 12.8x FY14F EPS of 32.29sen, +1SD above its 3-year mean.

31 Mar	FY12		FY13F		FY14F		FY15F
Currency (MYR)	Actual	Old	New	Old	New	Old	New
Revenue (mn)	931		1,025		1,165		1,376
Reported net profit (mn)	201		222		236		254
Normalised net profit (mn)	201		222		236		254
FD normalised EPS	27.53c		30.32c		32.29c		34.73c
FD norm. EPS growth (%)	5.4		10.2		6.5		7.6
FD normalised P/E (x)	17.6	N/A	16.0	N/A	15.0	N/A	14.0
EV/EBITDA (x)	11.8	N/A	10.5	N/A	9.6	N/A	8.9
Price/book (x)	5.7	N/A	4.8	N/A	3.9	N/A	3.4
Dividend yield (%)	2.6	N/A	2.9	N/A	3.0	N/A	3.2
ROE (%)	36.2		32.7		28.8		26.1
Net debt/equity (%)	net cash		net cash		net cash		1.7

Source: Company data, Nomura estimates

Key company data: See page 2 for company data and detailed price/index chart.

January 9, 2013	
Rating Starts at	Reduce
Target price Starts at	MYR 4.15
Closing price January 4, 2013	MYR 4.84
Potential downside	-14.3%

## Anchor themes

With competition set to increase significantly in the year ahead – particularly in the NBR segment – we see lower pricing power for glovemakers. We expect lower margins for NBR-focused manufacturers as a result of downward ASP revisions.

## Nomura vs consensus

Our TP is 15% below consensus on expectations of lower margins and TP being pegged to a lower P/E multiple; we think the stock is expensive at current levels.

**Research analysts** 

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See Appendix A-1 for analyst certification, important disclosures and the status of non-US analysts.

## Key data on Hartalega Holdings

### Income statement (MYRmn)

Income statement (MYRmn)					
Year-end 31 Mar	FY11	FY12	FY13F	FY14F	FY15F
Revenue	735	931	1,025	1,165	1,376
Cost of goods sold	-462	-634	-687	-802	-980
Gross profit	273	297	338	362	397
SG&A	-28	-36	-52	-57	-68
Employee share expense					
Operating profit	245	260	286	305	329
EBITDA	270	289	324	361	403
Depreciation	-25	-29	-38	-56	-74
Amortisation					
EBIT	245	260	286	305	329
Net interest expense	-2	-2	-1	-1	-1
Associates & JCEs					
Other income					
Earnings before tax	243	258	285	304	328
ncome tax	-53	-57	-63	-68	-74
Net profit after tax	190	201	222	236	254
Minority interests	0	0	0	0	0
Other items					
Preferred dividends					
Normalised NPAT	190	201	222	236	254
Extraordinary items					
Reported NPAT	190	201	222	236	254
Dividends	-76	-91	-104	-106	-114
Transfer to reserves	114	110	118	130	140
Valuation and ratio analysis					
Reported P/E (x)	18.5	17.5	16.0	15.0	14.0
Normalised P/E (x)	18.5	17.5	16.0	15.0	14.0
FD normalised P/E (x)	18.6	17.6	16.0	15.0	14.0
FD normalised P/E at price target (x)	15.9	15.1	13.7	12.9	11.9
Dividend yield (%)	4.3	2.6	2.9	3.0	3.2
Price/cashflow (x)	19.1	17.7	13.0	13.6	11.9
Price/book (x)	3.6	5.7	4.8	3.9	3.4
EV/EBITDA (x)	12.8	11.8	10.5	9.6	8.9
EV/EBIT (x)	14.2	13.1	11.9	11.4	10.8
Gross margin (%)	37.2	31.9	33.0	31.1	28.8
EBITDA margin (%)	36.8	31.1	31.6	31.0	29.3
EBIT margin (%)	33.4	27.9	27.9	26.2	23.9
Net margin (%)	25.9	21.6	21.6	20.3	18.5
Effective tax rate (%)	21.6	22.0	22.0	22.3	22.5
Dividend payout (%)	40.1	45.3	47.0	45.0	45.0
Capex to sales (%)	2.9	3.8	14.3	23.8	20.0
Capex to depreciation (x)	0.9	1.2	3.8	5.0	3.7
ROE (%)	44.9	36.2	32.7	28.8	26.1
ROA (pretax %)	53.2	46.7	43.9	36.3	30.0
Growth (%)					
Revenue	28.5	26.7	10.1	13.6	18.2
EBITDA	34.5	7.0	12.0	11.5	11.6
EBIT	35.4	6.0	9.9	6.7	7.9
Normalised EPS	33.2	5.6	9.7	6.5	7.6
Normalised FDEPS	32.8	5.4	10.2	6.5	7.6
Per share					
Reported EPS (MYR)	26.18c	27.65c	30.32c	32.29c	34.73c
Norm EPS (MYR)	26.18c	27.65c	30.32c	32.29c	34.73c
Fully diluted norm EPS (MYR)	26.12c	27.53c	30.32c	32.29c	34.73c
Book value per share (MYR)	1.36	0.85	1.01	1.24	1.43
DPS (MYR)	0.21	0.00	0.14	0.15	0.16
Source: Company data, Nomura estimatos	0.21	0.12	0.14	0.10	0.10

Source: Company data, Nomura estimates

### Relative performance chart (one year)



Source: ThomsonReuters, Nomura research

(%)	1M	3M	12M
Absolute (MYR)	0.2	7.3	71.7
Absolute (USD)	0.6	9.8	76.2
Relative to index	3.0	10.2	67.1
Market cap (USDmn)	1,167.1		
Estimated free float (%)	44.0		
52-week range (MYR)	5.06/2.76		
3-mth avg daily turnover (USDmn)	0.40		
Major shareholders (%)			
Hartalega Industries Sdn Bhd	51.0		
Budi Tenggara Sdn Bhd	5.0		

Source: Thomson Reuters, Nomura research

#### Notes

Margins and returns above industry average; dividend payout target of more than 45%

### Cashflow (MYRmn)

FY11	FY12	FY13F	FY14F	FY15F
270	289	324	361	403
-49	-37	12	-31	-31
-37	-52	-64	-69	-75
185	200	272	261	297
-22	-35	-146	-278	-275
163	165	126	-16	22
0	0	0	0	0
8	-9	0	0	0
9	4	0	0	0
-77	-19	0	0	0
104	140	126	-16	22
-57	-87	-104	-106	-114
0	7	0	37	0
14	0	0	0	0
-18	-14	-3	-1	0
-18 <b>-61</b>	-14 <b>-94</b>	-3 <b>-107</b>	-1 <b>-71</b>	0 -114
		-	•	
-61	-94	-107	-71	-114
-61 42	-94 46	-107 19	-71 -87	-114 -92
-61 42 75	-94 46 117	-107 19 163	-71 -87 182	-114 -92 95
	270 -49 -37 185 -22 163 0 -22 163 0 -22 163 -77 104 -57 0	270         289           -49         -37           -37         -52           185         200           -22         -35           163         165           0         0           8         -9           9         4           -77         -19           104         140           -57         -87           0         7	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$

#### Notes

Significantly higher capex for large, long-term capacity expansion plans which should see capacity more than triple upon completion (estimated completion in FY21F)

## Balance sheet (MYRmn)

As at 31 Mar	FY11	FY12	FY13F	FY14F	FY15F
Cash & equivalents	117	163	182	95	3
Marketable securities					
Accounts receivable	101	117	135	150	179
Inventories	65	98	85	114	132
Other current assets	3	0	0	0	0
Total current assets	286	378	403	359	314
LT investments	0	0	0	0	0
Fixed assets	349	370	478	700	901
Goodwill	0	0	0	0	0
Other intangible assets					
Other LT assets	0	10	10	10	10
Total assets	635	758	891	1,068	1,225
Short-term debt	15	13	13	13	13
Accounts payable	57	60	78	91	107
Other current liabilities	7	12	12	12	12
Total current liabilities	79	85	103	116	132
Long-term debt	24	12	9	8	8
Convertible debt	0	0	0	0	0
Other LT liabilities	37	41	41	41	41
Total liabilities	140	138	153	164	180
Minority interest	0	1	1	1	1
Preferred stock	0	0	0	0	0
Common stock	182	183	183	219	219
Retained earnings	313	437	555	685	824
Proposed dividends					
Other equity and reserves					
Total shareholders' equity	494	620	737	904	1,044
Total equity & liabilities	635	758	891	1,068	1,225
Liquidity (x)					
Current ratio	3.63	4.42	3.89	3.10	2.37
Interest cover	99.3	149.8	219.9	255.1	277.9
Leverage					
Net debt/EBITDA (x)	net cash	net cash	net cash	net cash	0.04
Net debt/equity (%)	net cash	net cash	net cash	net cash	1.7
Activity (days)					
Days receivable	45.7	42.9	44.9	44.6	43.6
Days inventory	36.7	46.8	48.6	45.2	45.7
Days payable	40.1	33.9	36.9	38.4	36.8
Cash cycle	42.2	55.7	56.6	51.4	52.5
Source: Company data, Nomura estimates	12.2	00.1	00.0	01.1	02.0
oource. Company uata, Nomura estimates					

### Notes

Reducing cash pile in line with high capex; expected higher earnings should move Hartalega back to net cash position by FY16F

## Break from a long, hard run

Hartalega shares had a stellar performance in 2012, with a significant 60% gain for the year. While we like the unrivalled operational efficiency of the world's largest nitrile glove manufacturer, we think that valuations are expensive for the name – particularly as the year ahead appears to be full of challenges for the NBR-focused glove-maker. Competitors region-wide are crowding into the fast-growing nitrile market, and we expect ASPs to be revised downwards as a result. Nitrile raw material prices, on the other hand, are expected to become more volatile, while that of natural rubber latex is likely to remain soft, reflecting the upcoming NR latex supply boost.

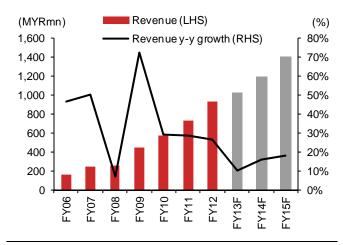
We think that Hartalega will remain profitable, but a downward margin trend is likely to persist in the next three years – until its NGC project comes on-stream, further improving productivity of the group's resources. We thus expect the share price to correct post the run-up over 2012, on a less favourable operating environment in the nitrile space.

## A (slowing) growth story

Hartalega's plan to be a leader in the nitrile market has been many years in the making; the company began with a product mix dominated by natural rubber (NR) gloves – as did many of its competitors. It expanded more aggressively into the nitrile butadiene rubber (NBR) segment, and eventually saw its primary product overtake NR gloves in terms of quantity sold in FY08. In this process, Hartalega's nitrile glove sales volume marked a 6-year CAGR of 68% over FY05-FY12. It currently commands c.13% of the world's nitrile glove market based on our estimates. By the end of 2013F, the company's six plants, which are all located in Bestari Jaya, will house production lines with annual capacity of 14bn pieces (current capacity is c.11.5bn)<sup>1</sup>.

We think Hartalega was able to achieve such impressive growth figures as no major competitor committed to the NBR business as seriously as Hartalega did. However, the market has changed with increasing competition lying ahead, in our view; we understand from management teams that there is an industry-wide expansion into this segment across the region, where large players Top Glove and Supermax are adding new capacities, while smaller players, in Thailand for instance, are converting their NR-producing lines into NBR counterparts instead. Hence, we expect revenue and profit growth will moderate to just slightly ahead of the rest of the industry, in lieu of the exponential growth previously experienced.

## Fig. 84: Hartalega – Revenue and net profit had 6-year CAGRs of 36% and 48% respectively (up to FY12)...



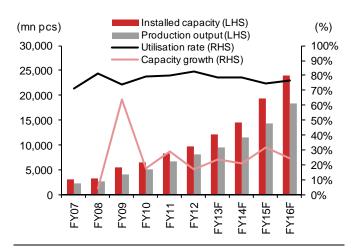
Source: Company data, Nomura estimates



Exponential growth rates are

likely a thing of the past, although the business is far from

stagnating



Source: Company data, Nomura estimates

1 Hartalega's sixth factory is being commissioned in stages, and is expected to be fully operational by July 2013.

#### NGC to "unlock potential"

Hartalega found it difficult to keep pace with the speed at which consumers in the developed world were switching to nitrile gloves; even the company's capacity of close to 10bn pieces was unable to meet US demand in 2011. This, coupled with intense competition as peers begin looking to expand their own nitrile capacities, prompted Hartalega to develop a plan for more aggressive expansion – the result was the Next Generation Integrated Glove Manufacturing Complex (NGC).

Management is aware that lofty growth rates in the global NBR market are not without limits; indeed, Hartalega expects high growth to sustain only for another four years, according to management. It has thus divided its eight-year NGC project into two phases, where expansion will halt for 15 months from June 2017, enabling the market to digest new capacity from various manufacturers. The company will also take this time to decide on its future growth strategy, which management believes is likely to come from the less penetrated emerging markets. The management team has indicated that it aims to introduce product and pricing niches in Asia, and will dedicate one or two lines per plant to this market. As of current figures, emerging markets contribute to c.5% of Hartalega's revenue, and management aims to grow this to at least 20% in the next six years – with attention being centred on India and China.

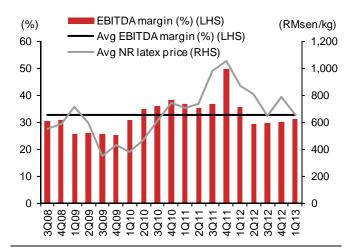
With Semperit AG taking over Latexx Partners (an NBR-focused manufacturer) in November 2012, we believe Hartalega's lead in the NBR space could be narrowed. We think there is a possibility for management to bring forward expansion plans in order for Hartalega to retain its crown, putting more gloves onto the NBR market.

#### Love/hate NBR exposure

Nitrile currently makes up nearly all (c.94%) of Hartalega's largely undiversified portfolio, allowing it to reap higher margins and outperform peers in times such as 2011 when latex prices escalated. Should the opposite occur – i.e., if NR raw material prices head south or the NBR counterpart moves the other way – we think Hartalega could potentially be the most badly hit of our sector coverage universe, given its NBR-heavy product mix.

Low exposure to NR gloves means that Hartalega's earnings are not as severely threatened by high NR latex prices as some of its peers; in fact, Hartalega sees its performance improve in such an environment, as customers tend to switch to a less expensive option. The company quotes final ASPs to its customers a week before the actual sale takes place in order to maintain profit margins despite raw material cost inflation; however, we flag that margins have been affected by nitrile raw material prices in recent months, in particular, as more players have moved into this market, putting pressure on ASPs (refer RHS chart below).

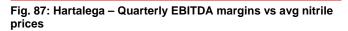
## Fig. 86: Hartalega – Quarterly EBITDA margins vs avg latex prices

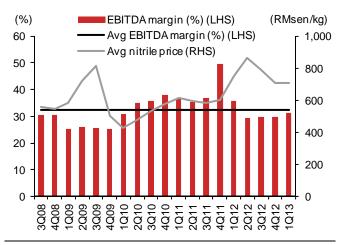


Source: Company data, Bloomberg, Nomura research

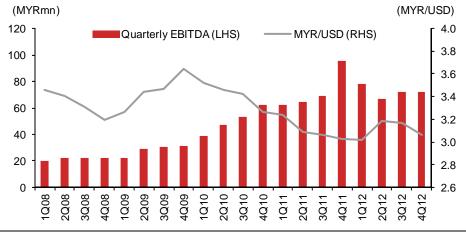
Growing capacity, but pulling back slightly at the same time; focusing growth in emerging markets

Semperit-Latexx deal could speed up Hartalega's expansion plans





Source: Company data, Bloomberg, Nomura research

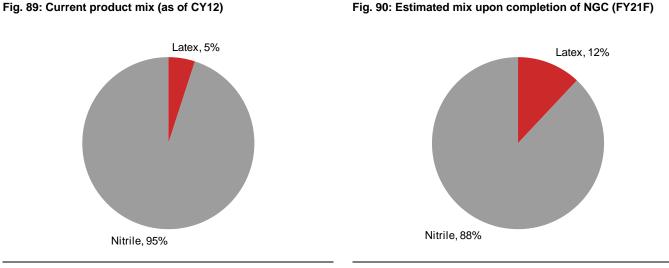


Source: Company data, Bloomberg, Nomura research

#### NR exposure still low, but on the rise

Although Hartalega will remain an NBR-focused manufacturer, the proportion of NR gloves should rise steadily, we expect, reducing the group's high exposure to nitrile. Management guides that going forward, two of the 12 production lines housed in each of the six new NGC factories will be committed to the NR segment, which should see increasing importance of NR gloves to the group. As for its running plants, emphasis should remain with NBR gloves, unless there are specific requests from existing customers.

Putting some attention back into the NR segment



Source: Company data

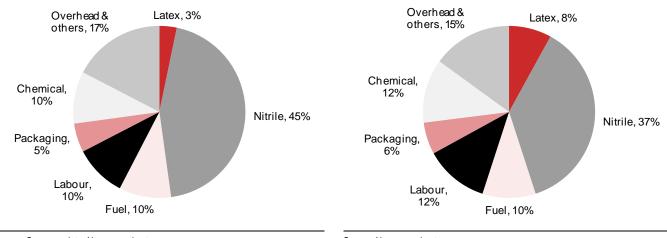
Source: Nomura estimates

With Hartalega stepping up its presence in the NR market, we expect its exposure to NR latex to increase to 8% of total production cost (from 3% currently), upon full commissioning of its NGC plants. That of nitrile should decrease to 37% from 45% as of current figures, based on our estimates. The new factories are planned to be completed in a two-step process by February 2021, although we think the possibility exists that management accelerate the time frame in order to defend its lead in the NBR market. Following completion of NGC, the company's cost exposure to the two raw material types will still far from balanced, but it should be less concentrated in just nitrile.

January 9, 2013

#### Fig. 91: Current cost breakdown (as of 2QFY13)

#### Fig. 92: Cost breakdown upon completion of NGC (FY21F)



Source: Company data, Nomura estimates

Source: Nomura estimates

Note: Current figures adjusted from 2QFY13 data for comparison by removing maintenance capex and factory depreciation from Overhead.

## To weather ASP downward pressure with thick margins

Hartalega has a small customer base of 137 names (compared with Top Glove >1,000; Supermax ~740; and Kossan ~200); its top two customers – Medline and Hartmann – account for over 40% of its total sales. Hartalega's customers, however, do not appear to be price sensitive, as the five largest clients (accounting for c.55% of revenue) have remained loyal to the group since its listing, despite being charged a premium over gloves from other suppliers throughout the time frame, according to management. In Asia-ex-Japan, where management notes that the company has a more price-conscious customer base, it adopts a different pricing strategy to maximize returns.

Per management info, current customer demand remains resilient, whereby a major buyer recently requested triple the volume of its usual orders. Hartalega also has a demand backorder of 1-2 months at present. We thus think that volumes are not a major concern for Hartalega; our dampened outlook comes instead from expected less lucrative ASPs, as increased competition in the NBR market potentially gives customers more bargaining power.

#### In a class of its own...

During calendar 2011, Hartalega saw profits increase 11.3%, while other players suffered profit declines across the board. Hartalega was in the right place at the right time with its large exposure to the NBR segment; however, we also believe its success is the result of other factors as well, and its R&D expenditure is evidence of that. Based on our analysis, Hartalega's annual spending of MYR15mn is by far the largest sum across the industry, enabling it in our view to become the most advanced and efficient manufacturer. Its goods are priced at a 1-5% premium to the some other manufacturers' second-tier products, based on our findings<sup>2</sup>.

On efficiency, none of Hartalega's listed peers that we cover comes close to Hartalega's measures. With highly automated production lines and the highest skilled/unskilled workers ratio among its peers under our coverage, the group has been able to achieve impressive margins and per-employee measures. The economies of scale it enjoys from its large slice of the NBR pie further helps keep the cost of production low. On-going R&D efforts in line with the group's *kaizen* culture have resulted in ever-increasing production line speeds; such improvements, which have consistently broken new ground, have led to even higher productivity and efficiency. The company also has the highest production speed, where lines are capable of churning out 45,300 pieces of gloves each hour (double former lines); its average line speed is 28,000, vis-à-vis the

High reliance on small, nonprice-sensitive customer base

Volumes not a major problem; lower ASPs expected to slow top-line growth

Hartalega is reaping the harvest of its hard work over the years mainly dedicated to efficiency improvements

The most efficient glovemaker with impressive margins and per-employee measures

<sup>2</sup> Top Glove spends 2-3% of profit on R&D (c.MYR5-6mn); Supermax allocates 1% of sales revenue to R&D (c.MYR10mn); Kossan spent MYR5-6mn in FY12, to increase to MYR8-10mn in FY13F

## industry's 18,000-22,000 pieces per hour according to management info. It currently is prototype-testing a 47,000-pieces-per-hour line speed.

## Fig. 93: Net profit margin more than double the average of the other three players we cover since CY07

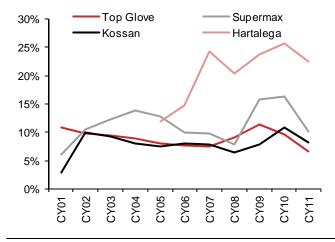
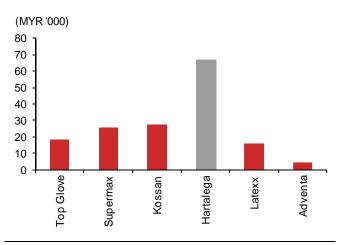


Fig. 94: Highest profit per employee (based on latest full FY results)

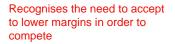


Source: Companies data, Nomura research

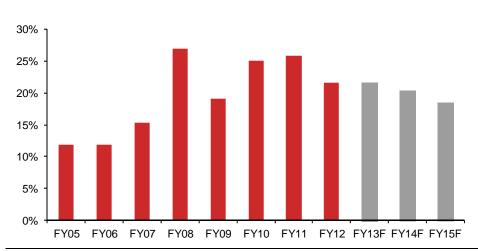
Source: Companies data, Nomura research Note: Kossan figures adjusted to reflect only the glove division

#### ... although margins unlikely to remain at elevated level

Management is confident that its sales volumes will not be affected by the additional nitrile capacity coming from other players, as Hartalega's small customer base has proven itself to be loyal to the company and its products. Nonetheless, Hartalega's product price premiums are likely to shrink, in our view, when NBR supply from competitors comes to the market and affords buyers more bargaining power. Management acknowledges that the company is not likely to enjoy the same mid-20s margins as it has previously, and instead will aim for a net profit margin floor of 18% (c.5ppt lower than the 22.97% recorded in its latest 2Q13 quarter). Such figures are still high by industry standards, but possible in our view due to Hartalega's highly efficient operations which the company is constantly improving. We forecast net margins of 21.6%, 20.3% and 18.5% for FY13F, FY14F and FY15F, respectively, and expect they will eventually pick up again owing to further automated production lines which are due to come in with the NGC project.







Source: Company data, Nomura estimates

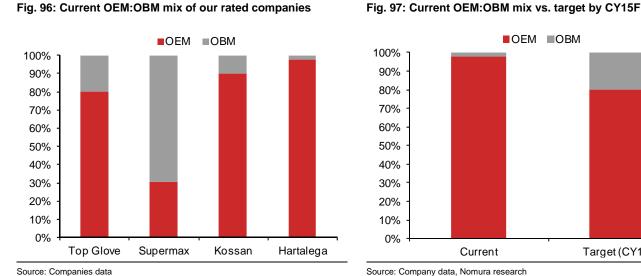
We highlight that the company's main target markets are quality-conscious developed nations – it has the greatest exposure to the European and North American regions among companies under our coverage, and also has significant volumes flowing to

Japan. Hence, given the profile of its primary markets, as long as Hartalega continues to deliver top-quality products, we think it will be able to sell its products at a slight premium and not lose customers to competitors.

### Building up its OBM business

Within our coverage universe, Hartalega is the manufacturer whose own brand manufacturer (OBM) arm makes the smallest contribution to revenue; it currently operates in four countries – U.S., Australia, China and India. Hartalega is highly successful in Australia and commands c.20% share of the Australian medical glove market, as per management data. Nonetheless, it is content with c.MYR10mn from this market due to the small potential in such country. Its U.S. distribution centre, however, is much less successful with negligible market share - as Hartalega is careful not to compete with its original equipment manufacturer (OEM) customers in the country. The company is still waiting for distribution approval in the Chinese market, but already started operating in Bombay in October 2012. Footprints in these markets should give Hartalega an advantage, in our view, when glove usage in such regions begins to pick up, which we expect to happen longer term. It aims to increase OBM revenue contribution to 20% of group revenue by CY15F, from only 2% as of CY12.

Hartalega is also putting more emphasis on corporate and product branding -"Hartalega" is branded as a quality rubber glove manufacturer with growth prospects; management intends to have "Pharmatex" remaining as its healthcare distributor; while all its OBM products will carry the brand name "GloveOn" to avoid direct competition with its OEM customers. We understand from discussions with management team that Hartalega is looking to list Pharmatex on the Bursa Malaysia once it has built a six-year track record (expected around 2019F). Once Pharmatex is listed as a separate entity, some proportion of the earnings from the Hartalega group would be removed. In this context, the quantum of such amount is unclear - per management information, Hartalega (the major shareholder of Pharmatex with c.70% holding) may exercise its rights to increase or decrease shareholding in Pharmatex. We note that profit contribution from Pharmatex was small at c.1% of FY12's net profits; we estimate for this to rise to c.12% by CY15F, assuming 11% net margins for OBM (management guides that OBM net margins are expected to be around half to two-thirds of Hartalega's net margin of 22%), alongside management's plans to increase its OBM revenue contribution to 20% revenue by CY15F.



OEM ■OBM 100% 90% 80% 70% 60% 50% 40% 30% 20% 10% 0% Target (CY15) Current

Source: Company data, Nomura research

## Minimum wage and automation

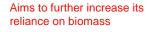
Currently, c.2,620 of Hartalega's employees (c.87% of its workforce) is paid less than MYR900/month, at an average of MYR622/month. Taking into account EPF contribution for employees, implementation of the minimum wage policy by the country from the start of 2013 will translate into an additional MYR9.4mn (c.1.5% of total cost of production) to be incurred per year according to our calculations. Hartalega aims to soften the negative

Building an OBM footprint in China and India to help Hartalega achieve in profits from such markets

Aiming to list Pharmatex - which is branded the group's "reliable and reputable" healthcare distributor

#### **Fuel costs**

On an adjusted basis, fuel currently makes up 10% of total costs; 90% of its fuel is generated from gas and the remainder from biomass. Management sees potential energy cost-saving of 17% from moving into renewable energy, and thus targets a 78:22 ratio between natural gas and biomass when the NGC is fully up and running. With an assumed 80% pass-on rate, we would see a 2.1% decline in FY14F EPS should natural gas prices increases begin in June 2013, which would imply a 19% increase in energy costs for FY14F. With the same assumptions, we would expect a 7.6% reduction from FY15F EPS on our estimates due to the 56% increase in natural gas prices for that financial year, from MYR16.07/mmbtu currently.



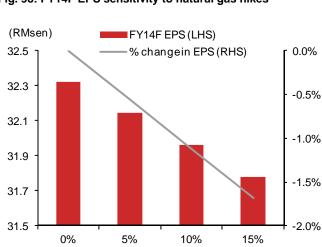
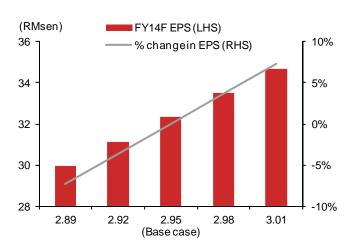


Fig. 98: FY14F EPS sensitivity to natural gas hikes Fig. 99: FY14F EPS sensitivity to MYR/USD rates



Source: Nomura estimates

Source: Nomura estimates

## Initiating with a Reduce rating and a target price of MYR4.15

Hartalega has seen a structural break in both its share price and P/E valuation multiple from the start of 2012, thanks to rising latex prices – for the second time since 2010. After rapidly closing the gap between itself and Top Glove in terms of P/E multiple over the course of 2012 (see LHS chart below), Hartalega currently trades at 15.0x one-year forward P/E – nearly +2SDs above its 3-year historical mean of 11.0x. Nonetheless, we believe that the group's valuations in the past are not fully reflective of its operations as its business model has changed over the years, transforming from a mainly NR-based manufacturer to one with an NBR-dominated product mix; margins have also jumped in the process. Nonetheless, the current P/E is elevated in our view – particularly as the company sees its dominant NBR market faces an increase in competition ahead.

We thus peg its FY14F EPS of 32.29sen to a one-year forward P/E of 12.8x – 1SD above its 3-year mean – reflecting the change in business model of the group, as well as

We expect to see a correction of Hartalega's P/E multiple, as the stock appears to be expensive given the low spread between its earnings yield and returns on MGS

<sup>3</sup> Hartalega has c.3,000 employees; Top Glove c.11,000; Supermax c.4,000; Kossan c.5,000.

<sup>4</sup> Cost breakdown is adjusted for comparison by removing maintenance capex and factory depreciation from Overhead Cost.

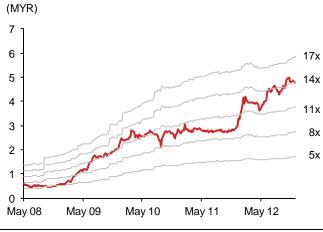
the shift of market preference towards NBR gloves from NR. We opt to be conservative and consider current P/E levels elevated; such is backed by the premium of Hartalega's earnings yields to returns on Malaysian Government Securities (MGS) which has contracted to 3.7% (see RHS chart below) – close to the levels experienced over the H1N1 period – suggesting that the stock is expensive at current levels. The spread is only slightly above Top Glove's 3.0%, but is significantly lower than Supermax's 7.4% and Kossan's 7.5%.

## Fig. 100: Hartalega's discount to Top Glove's one-year forward P/E multiple

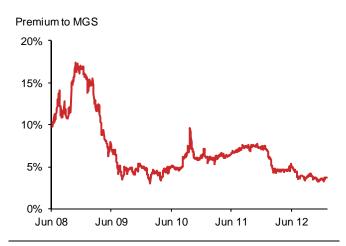


Source: Bloomberg, Nomura research

### Fig. 102: Historical P/E band chart

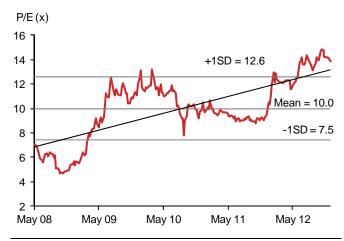


## Fig. 101: Spread between Hartalega's earnings yields and returns on MGS



Source: Bloomberg, Nomura research

#### Fig. 103: Historical one-year forward P/E



Source: Bloomberg, Nomura research

Source: Bloomberg, Nomura research

Our FY14F EPS assumes 1) easing NR and NBR raw material prices to be passed on via lower ASPs; 2) NBR-dominated product mix; and 3) below-target utilisation of 79% due to a discount applied to new capacity coming online.

Our target price is derived using a P/E valuation methodology, which we compare to the intrinsic value of MYR4.07 per share obtained from our 10-year DCF valuation. Assumptions for our DCF are capex at c.6% of revenue and a gradually increasing tax rate to stable at 25%; WACC of 7.6% and terminal growth of 2%. Cashflows are discounted back to January 2013.

#### Fig. 104: Key model assumptions

Valuation assumptions	FY13F	FY14F	FY15F
MYR/USD	3.05	2.95	2.89
Capex (MYRmn)	146.25	277.50	275.00
Utilisation rate	79%	79%	75%
Depreciation rate	5.8%	6.0%	6.1%
Inflation rate	2.50%	2.50%	2.50%
ASP (USD per '000 pcs)			
- Latex	44.00	43.96	44.13
- Nitrile	35.00	33.87	32.29
Avg latex price (RMsen/kg)	653	620	623
Avg grossed-up nitrile price (RMsen/kg)	616	610	613
Beta	0.84		
Risk-free rate	3.47%		
Risk premium	5.00%		
Terminal growth rate	2.00%		
Discount rate (WACC)	7.55%		
DCF value per share (MYR)	4.07		

Source: Nomura estimates

#### Fig. 105: Intrinsic value sensitivity analysis

			Share Price S	Sensitivity Analy	sis	
	_			WACC		
		6.5%	7.0%	7.5%	8.0%	8.5%
<del>_</del> 0	1%	4.69	4.31	3.98	3.69	3.45
etual rate	2%	5.32	4.80	4.37	4.02	3.72
Perpetual growth rate	3%	6.30	5.54	4.95	4.47	4.08
gro p	4%	8.06	6.77	5.85	5.15	4.60
	5%	12.18	9.24	7.46	6.28	5.43

Source: Nomura estimates

#### Risks to our view

Upside risks to our view include 1) achievements of higher production line speed which boosts productivity alongside reduced costs; 2) sped-up NGC expansion plans, adding more capacity for the group; 3) higher-than-expected pass-on rates, as we assume ASP downward adjustment to its premium-priced products; and 4) lower-than-expected nitrile raw material prices.

## Kossan Rubber Industries KRIB.KL KRI MK

HEALTH CARE & PHARMACEUTICALS

## Inching up the hierarchy Improved growth profile from stepped-up capacity expansion plans, special purpose gloves

## Action: Initiate with a Neutral and TP of MYR3.80

Kossan is the underperformer in the sector with a mere 3.4% gain in year 2012, below the KLCI's 10.3%. Its flattish share price over the year lags its peers' 2012 run-up of 25.4%, averaged across the other three names in our universe. Even after taking into account downward revision in ASPs owing to increased competition, our three-year forecast EPS CAGR of 12.7%, driven by capacity growth, is still the highest across locally listed rubber gloves companies. We see potential upside for the name – particularly as the stock currently trades at what we believe to be an undemanding 8.9x one-year forward P/E with dividend yields of 2.7-4.2%.

**Catalysts: Expansion plans in the pipeline, niche products ventures** As Kossan ups the ante in its capacity expansions which were low-key in the past, we expect top-line expansion by 3-year CAGR of 9.9% through to FY15F. Strategies to dominate niche markets should provide room for improved and more stable margins to the group, warranting better valuations going forward. Increasing healthcare awareness could also see the group capturing market share in the higher end surgical segments. R&D efforts to product thinner gloves will help with cost-saving for the group, apart from making its products more attractive to the market.

## Valuations: Somewhat attractive on positive growth profile

Kossan's currently trades at its long-term one-year forward P/E mean of 8.9x, which is at the lower end of the industry. We think valuations are somewhat attractive with potential upside; its P/B of 1.6x is also lower than its 1.9x mean levels. With our FY13F EPS at 37.78sen, we arrive at our TP of MYR3.80 with a target one-year forward P/E of 10.0x – the sector average since 2007.

FY11		FY12F		FY13F		FY14F
Actual	Old	New	Old	New	Old	New
1,090	N/A	1,215	N/A	1,343	N/A	1,449
90	N/A	107	N/A	120	N/A	129
90	N/A	107	N/A	120	N/A	129
28.15c	N/A	33.65c	N/A	37.78c	N/A	40.33c
-20.6	N/A	19.6	N/A	12.3	N/A	6.8
11.9	N/A	10.0	N/A	8.9	N/A	8.3
7.9	N/A	6.1	N/A	5.3	N/A	4.7
2.2	N/A	1.9	N/A	1.6	N/A	1.4
2.1	N/A	2.7	N/A	3.6	N/A	4.2
19.1	N/A	20.0	N/A	19.5	N/A	18.3
21.8	N/A	3.9	N/A	net cash	N/A	net cash
	Actual 1,090 90 28.15c -20.6 11.9 7.9 2.2 2.1 19.1	Actual         Old           1,090         N/A           90         N/A           90         N/A           28.15c         N/A           -20.6         N/A           11.9         N/A           7.9         N/A           2.2         N/A           2.1         N/A           19.1         N/A	Actual         Old         New           1,090         N/A         1,215           90         N/A         107           90         N/A         107           90         N/A         107           28.15c         N/A         33.65c           -20.6         N/A         19.6           11.9         N/A         6.1           2.2         N/A         1.9           2.1         N/A         2.7           19.1         N/A         20.0	Actual         Old         New         Old           1,090         N/A         1,215         N/A           90         N/A         107         N/A           90         N/A         107         N/A           90         N/A         33.65c         N/A           28.15c         N/A         33.65c         N/A           -20.6         N/A         19.6         N/A           11.9         N/A         10.0         N/A           7.9         N/A         6.1         N/A           2.2         N/A         1.9         N/A           2.1         N/A         2.7         N/A           19.1         N/A         20.0         N/A	Actual         Old         New           1,090         N/A         1,215         N/A         1,343           90         N/A         107         N/A         120           90         N/A         107         N/A         120           90         N/A         107         N/A         120           28.15c         N/A         33.65c         N/A         37.78c           -20.6         N/A         19.6         N/A         12.3           11.9         N/A         10.0         N/A         8.9           7.9         N/A         6.1         N/A         5.3           2.2         N/A         1.9         N/A         1.6           2.1         N/A         2.7         N/A         3.6           19.1         N/A         20.0         N/A         19.5	Actual         Old         New         Old         New         Old           1,090         N/A         1,215         N/A         1,343         N/A           90         N/A         107         N/A         120         N/A           90         N/A         107         N/A         120         N/A           90         N/A         107         N/A         120         N/A           28.15c         N/A         33.65c         N/A         37.78c         N/A           -20.6         N/A         19.6         N/A         12.3         N/A           11.9         N/A         10.0         N/A         8.9         N/A           7.9         N/A         6.1         N/A         5.3         N/A           2.2         N/A         1.9         N/A         1.6         N/A           2.1         N/A         2.7         N/A         3.6         N/A           11.9         N/A         1.9         N/A         5.3         N/A           12.1         N/A         2.7         N/A         3.6         N/A           19.1         N/A         20.0         N/A         19.5         N/A

Source: Company data, Nomura estimates

Key company data: See page 2 for company data and detailed price/index chart.

NO/	MURA
EQUITY	RESEARCH

January 9, 2013	
Rating Starts at	Neutral
Target price Starts at	MYR 3.80
Closing price January 4, 2013	MYR 3.36
Potential upside	+13.1%

## Anchor themes

With competition set to increase significantly in the year ahead – particularly in the NBR segment – we see lower pricing power for glovemakers. We expect lower margins for NBR-focused manufacturers as a result of downward ASP revisions.

## Nomura vs consensus

Our TP and FY13F earnings forecast are in line with consensus.

Research analysts

Malaysia Health Care & Pharmaceuticals

Celeste Yap - NSM celeste.yap@nomura.com +603 2027 6894

See Appendix A-1 for analyst certification, important disclosures and the status of non-US analysts.

## Key data on Kossan Rubber Industries

### Income statement (MYRmn)

Year-end 31 Dec	FY10	FY11	FY12F	FY13F	FY14F
Revenue	1,047	1,090	1,215	1,343	1,449
Cost of goods sold	-693	-764	-823	-913	-988
Gross profit	353	326	392	430	461
SG&A	-209	-216	-255	-275	-294
Employee share expense	0	0	0	0	0
Operating profit	144	110	137	155	167
EBITDA	179	150	180	203	220
Depreciation	-34	-40	-43	-48	-53
Amortisation					
EBIT	144	110	137	155	167
Net interest expense	-8	-7	-8	-11	-14
Associates & JCEs	0	0	0	0	0
Other income	4	10	6	7	9
Earnings before tax	141	113	135	152	161
Income tax	-27	-22	-27	-30	-31
Net profit after tax	114	91	108	122	130
Minority interests	0	-1	-1	-1	-1
Other items	0	0	0	0	0
Preferred dividends	0	0	0	0	0
Normalised NPAT	113	90	107	120	129
Extraordinary items	0	0	0	0	0
Reported NPAT	113	90	107	120	129
Dividends	-26	-22	-29	-39	-45
Transfer to reserves	88	67	78	82	84
Valuation and ratio analysis					
Reported P/E (x)	9.5	11.9	10.0	8.9	8.3
Normalised P/E (x)	9.5	11.9	10.0	8.9	8.3
FD normalised P/E (x)	9.5	11.9	10.0	8.9	8.3
FD normalised P/E at price target (x)	10.9	13.7	11.4	10.2	9.5
Dividend yield (%)	2.4	2.1	2.7	3.6	4.2
Price/cashflow (x)	7.1	13.2	5.8	6.4	5.6
Price/book (x)	2.4	2.2	1.9	1.6	1.4
EV/EBITDA (x)	6.5	7.9	6.1	5.3	4.7
EV/EBIT (x)	8.0	10.8	8.0	6.9	6.2
Gross margin (%)	33.8	29.9	32.3	32.0	31.8
EBITDA margin (%)	17.1	13.8	14.8	15.1	15.2
EBIT margin (%) Net margin (%)	13.8	10.1	11.3	11.6	11.5
Effective tax rate (%)	10.8 19.1	8.2 19.3	8.8	9.0 19.9	8.9 19.5
Dividend payout (%)	22.6	24.9	27.0	32.0	35.0
Capex to sales (%)	8.1	3.7	4.1	6.0	5.5
Capex to depreciation (x)	2.5	1.0	1.2	1.7	1.5
ROE (%)	28.3	19.1	20.0	19.5	18.3
ROA (pretax %)	20.3	15.2	17.8	19.3	10.5
Growth (%)	04.0		44 5	40.5	7.0
Revenue	24.3	4.1	11.5	10.5	7.9
	41.5	-15.8	20.1	12.8	8.1
EBIT	56.0	-23.8	24.8	13.2	7.4
Normalised EPS Normalised FDEPS	70.0	-20.6 -20.6	19.6 19.6	12.3 12.3	6.8 6.8
Per share Reported EPS (MYR)	35 460	29 15 -	33 650	37 700	40.000
,	35.46c	28.15c	33.65c	37.78c	40.330
Norm EPS (MYR)	35.46c	28.15c	33.65c	37.78c	40.330
Fully diluted norm EPS (MYR)	35.46c	28.15c	33.65c	37.78c	40.33c
Book value per share (MYR)	1.38	1.56	1.81	2.07	2.33
DPS (MYR)	0.08	0.07	0.09	0.12	0.14

Source: Company data, Nomura estimates

### Relative performance chart (one year)



Source: ThomsonReuters, Nomura research

(%)	1M	ЗM	12M	
Absolute (MYR)	2.1	10.9	4.0	
Absolute (USD)	2.0	11.1	7.1	
Relative to index	-1.7	10.4	-3.2	
Market cap (USDmn)	352.6			
Estimated free float (%)	49.1			
52-week range (MYR)	3.67/2.97			
3-mth avg daily turnover (USDmn)	0.27			
Major shareholders (%)				
Kossan Holdings Sdn Bhd	50.9			
Kumpulan Wang Persaraan	7.6			
Courses Thomson Doutons Nom				

Source: Thomson Reuters, Nomura research

#### Notes

Management aims to increase the dividend payout from its current 25% target to 35-40% in the next two years, translating into dividend yields of 2.7-4.2%

### Cashflow (MYRmn)

Year-end 31 Dec	FY10	FY11	FY12F	FY13F	FY14F
EBITDA	179	150	180	203	220
Change in working capital	50	-58	13	-27	-27
Other operating cashflow	-77	-11	-9	-10	-2
Cashflow from operations	152	81	183	166	190
Capital expenditure	-85	-40	-50	-80	-80
Free cashflow	67	41	133	86	110
Reduction in investments	46	0	0	0	0
Net acquisitions	0	-9	0	0	0
Reduction in other LT assets	0	1	0	0	0
Addition in other LT liabilities					
Adjustments	0	0	1	1	1
Cashflow after investing acts	113	34	134	87	112
Cash dividends	-14	-35	-29	-39	-45
Equity issue	0	0	0	0	0
Debt issue	-11	-12	8	17	25
Convertible debt issue	0	0	0	0	0
Others	-19	-26	-4	0	0
Cashflow from financial acts	-45	-73	-25	-22	-20
Net cashflow	68	-40	109	66	92
Beginning cash	24	92	52	161	227
Ending cash	92	52	161	227	319
Ending net debt	86	108	22	-3	-35
Source: Company data, Nomura estimates					

#### Notes

Management has MYR200mn allocated for capex in the next two to three years

## Balance sheet (MYRmn)

As at 31 Dec	FY10	FY11	FY12F	FY13F	FY14F
Cash & equivalents	92	52	161	227	319
Marketable securities	0	0	0	0	0
Accounts receivable	148	156	173	192	207
Inventories	124	164	157	172	192
Other current assets	3	3	3	3	3
Total current assets	367	374	494	594	721
LT investments	0	0	0	0	0
Fixed assets	410	433	440	472	499
Goodwill	1	5	5	5	5
Other intangible assets	0	0	0	0	0
Other LT assets	0	0	0	0	0
Total assets	777	812	939	1,071	1,225
Short-term debt	150	134	150	173	208
Accounts payable	113	103	126	134	141
Other current liabilities	10	8	8	8	8
Total current liabilities	273	246	284	315	358
Long-term debt	28	26	34	51	76
Convertible debt	0	0	0	0	0
Other LT liabilities	32	34	34	34	34
Total liabilities	333	306	352	400	468
Minority interest	2	9	10	12	13
Preferred stock	0	0	0	0	0
Common stock	160	160	160	160	160
Retained earnings	285	339	419	502	586
Proposed dividends					
Other equity and reserves	-2	-2	-2	-2	-2
Total shareholders' equity	443	497	576	659	744
Total equity & liabilities	777	812	939	1,071	1,225
Liquidity (x)	1.24	1.52	4 74	1.00	2.01
Current ratio	<u> </u>	1.52	1.74 16.2	1.89 14.3	2.01
Interest cover	10.1	14.7	10.2	14.3	11.5
Leverage					
Net debt/EBITDA (x)	0.48	0.72	0.12	net cash	net cash
Net debt/equity (%)	19.5	21.8	3.9	net cash	net cash
Activity (days)					
Days receivable	59.6	51.0	49.6	49.6	50.2
Days inventory	61.5	68.6	71.3	65.8	67.3
Days payable	55.4	51.7	51.1	51.9	50.8
Cash cycle	65.6	67.9	69.8	63.5	66.8
Source: Company data, Nomura estimates					
course. company data, nomina countates					

#### Notes

We expect short-term debt to increase as Kossan is likely to require more working capital in light of its expansion plans

## Inching up the hierarchy

Indeed, since 2007, Kossan's net profit is the lowest among our four companies under coverage, but management seems to be constantly at the drawing board, making plans to maintain growth and profitability, as evidenced by its strong six-year net profit CAGR of 20.7% – above the average six-year CAGR of 18.3% for all locally listed players ex-Hartalega\*. While Kossan's humble capacity expansions in previous years lagged far behind that of its peers, it started gearing its product mix notably towards the nitrile segment from 2008, ahead of competitors such as Top Glove and Supermax. Kossan's early move into the NBR segment has protected its bottom line to some extent, in our view, when latex prices rose significantly, while players such as Top Glove and Supermax with more exposure to NR gloves saw bigger declines.

\* Hartalega's six-year net profit CAGR was 49.8%. We have excluded the outlier as we think that growth rates of more than double the industry average was possible for Hartalega as the company was still in its growth phase. We have also seen net profit growth taper off from its FY10 high.

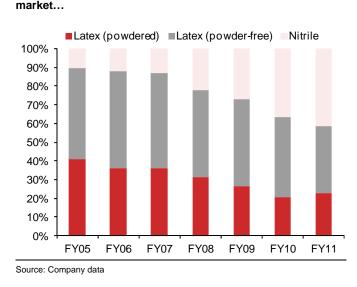
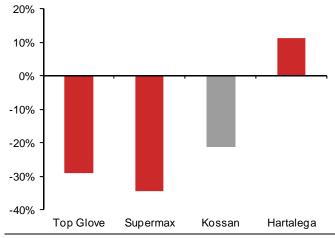


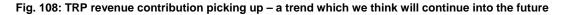
Fig. 106: Kossan made an early venture into the NBR

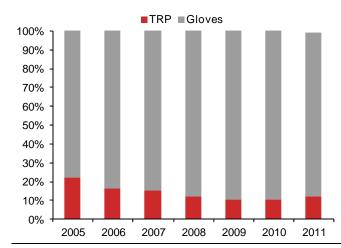
Fig. 107: ... which helped limit y-y profit contraction in CY11



Source: Companies data, Nomura estimates

Note: Figures for Top Glove and Hartalega adjusted for different FYE





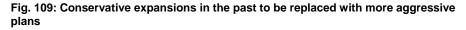
The group's starting point –Technical Rubber Products (TRP) – serves as another source of income. Such products are mainly used in the automotive and construction industries. This arm contributed 12% of group revenue in FY11 – up from 10% and 11% in FY09 and FY10, respectively, largely owing to the outsourcing trend and the slight rebound in the global economy.

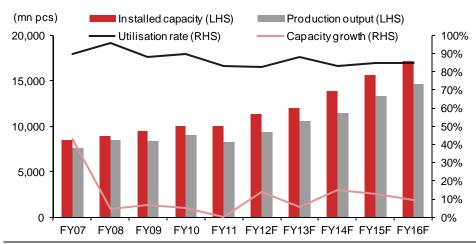
Consistent with our automotive team's view that the sector will continue to hold up, alongside the outsourcing trend globally, we believe the group could see some increased contribution from this sub-division in the years to come.

Source: Company data, Nomura research

## **Going niche**

Expansions were modest in the past, as Kossan ensured that its plants were running at high utilisation rates before adding capacity. Going forward, we expect Kossan to join the industry-wide expansion trend as it aims to increase its examination gloves production capacity by 8-9bn pieces by 2020F. The long-term project, which consists of 80 new production lines, will be spread over two phases (2014-16 and 2017-20). Our checks with management reveal that landbank for the first part of the expansion has already been secured, and will be located near its existing plants; it is actively acquiring land for its subsequent expansions. As per management, its existing growth plans for surgical gloves should see the manufacturer put c.600mn pairs of such gloves in the market by 2015F.





Management is stepping up its previously subdued expansion plans, with special purpose gloves as the new focus

Source: Company data, Nomura estimates

Kossan targets to work towards being the industry leader and a key manufacturer in the special purpose gloves (surgical & clean-room) segment. Although these gloves account for a mere 10% of total gloves consumption in Malaysia, on our estimates, high entry barriers from such quality-driven segments are attractive to Kossan as well as investors, and should warrant better margins. However, although the bottom-line contribution from this segment is unlikely to be substantial given its size, management seems confident that this segment will result in stable earnings and pricing.

#### **Balanced product mix**

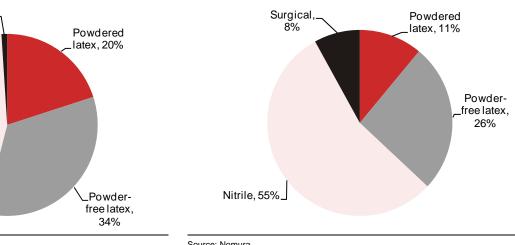
Kossan's acquisition of Cleanera HK Ltd in March 2011 has enabled it to penetrate the surgical and clean-room gloves, wipes as well as face mask segments. Its new surgical gloves production line with 330mn pairs' capacity is expected to start its trial run any time now (January 2013), per management information. Management targets for a much larger share of special purpose gloves, where its desired product mix will consist of 35% NR, 50% NBR and 15% Surgical/Clean-room by revenue contribution – a well-balanced 50:50 exposure to NR latex and nitrile raw material. Based on our estimates, this translates into a quantity breakdown of 37% NR, 55% NBR and 8% Surgical/Clean-room. We expect the group to be able to achieve such a mix by FY14F.

Profits are unlikely to receive a major boost owing to the small size of the special purpose gloves segment

#### Fig. 110: Current product mix (as of 3QFY12)

## Surgical, 1% Powdered latex, 20% Nitrile, 45% Powderfree latex, 34%

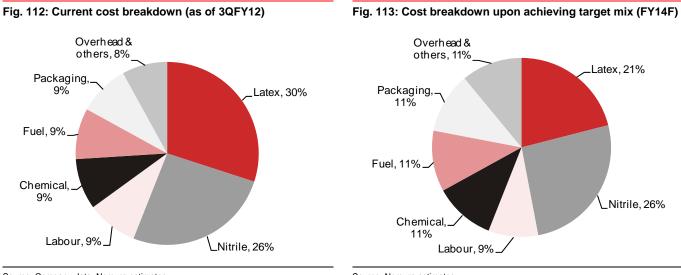
Fig. 111: Target product mix (FY14F)



Source: Company data

Source: Nomura

We expect both NR latex and nitrile raw materials together to account for a smaller portion of total production costs, as Kossan is working on developing thinner products which will consume less raw materials. In our view, such balance in product mix should not only protect Kossan from any surge in the cost of any raw material type, but should also enable it to tap into potential demand stemming from both the segments with ease. Further, its versatile production lines enable it to switch from NR to NBR, and vice versa, with minimal downtime. Consequently, customers' preferences for different glove types are likely to be less of a concern for the group.



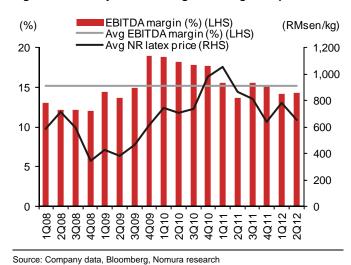
Source: Company data, Nomura estimates

Source: Nomura estimates

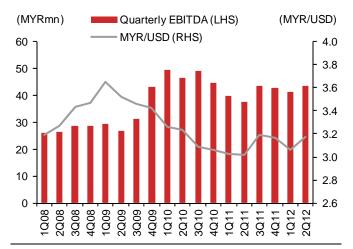
We like the company's even-handed product mix for such reasons, apart from a lower business risk, in our opinion. This has also resulted in the group's earnings being less affected by latex raw material prices with stable margins, regardless of raw material prices, as shown below.

Balanced mix should bring about lower business risk

#### Fig. 114: Quarterly EBITDA margins vs. avg latex prices



#### Fig. 115: Quarterly EBITDA vs. avg exchange rates



Source: Company data, Bloomberg, Nomura research

### High ASPs hinder; niche products help

Kossan targets to have Surgical gloves contribute 10-12% of group revenue in FY13F. Higher exposure to special purpose gloves (e.g., surgical) in the future should help preserve margins to some extent, as demand for such niche products is not mainly driven by prices. Nonetheless, we note that Kossan's NBR gloves are currently priced at rather high levels, compared with the products of the other main Malaysian glove manufacturers, suggesting that ASPs could face much downward revision as manufacturers move towards competitive pricing. We see lower ASPs bringing margins downward, but automation and raw material cost-savings from thinner products should help the group maintain profits to some extent. As special purpose gloves start to weigh in more on Kossan's product mix alongside easing pricing pressure, we expect margins to start progressing upward again.

#### **Increased OBM focus**

Promotional efforts on Kossan's new in-house iNtouch series of surgical gloves should see growth in its OBM segment; management targets an OBM:OEM mix of 20:80 in the near term, from 10:90 currently. Kossan's own products, iNtouch and CheMax 7<sup>th</sup> Sense (launched in 2009), are both an outcome of its R&D efforts – an area where the company plans to allocate more capital.

#### Minimum wages and automation

The company's 5,000 workers are paid an average of MYR600-650/month; we estimate extra costs owing to the minimum wage implementation to sum to c.MYR17mn per year, or c.2.6% of total cost of production, including EPF contributions made by the employer. Labour costs currently account for 9% of Kossan's total cost. Headcount reduction made possible by automation, on which Kossan plans to spend c.MYR6-7mn per annum, should help reduce labour cost by c.MYR8mn p.a. on full automation, according to our estimates. Our calculations suggest a 3.0% reduction in total production costs on full automation, also taking into account the impact of the minimum wage policy.

We note that the TRP division is more labour-intensive as it hires c.1,500 workers (cf. gloves division which has c.3,500 workers) but contributes to just 12% of the group's revenue. While labour cost comprises 8-9% of production cost in glove manufacturing, such a figure is nearly double for the TRP division at 15-16%. This division cannot be automated due to existing technology limitation; thus the company is exploring options to expand its TRP business in Indonesia. This should see savings in labour costs due to the availability of cheaper labour in that country as well as lower energy costs. Indonesia's automotive sector, which has high demand for engine parts, would provide another justifiable reason for Kossan to venture into the country.

High current prices of NBR gloves suggest ASP downward adjustments as pricing pressure mounts; new niche products to help protect margins

Exploring options of further expanding its TRP arm in Indonesia, in interest of cost

Fig. 116: FY13F EPS sensitivity to natural gas hikes

5%

FY13F EPS (LHS)

% changein EPS (RHS)

#### **Fuel costs**

(RMsen)

37.5

37.0

36.5

36.0

35.5

Currently, 9% of total production cost is attributed to fuel. At present, Kossan has just one biomass plant in operation. Natural gas remains the preferred energy source given a choice, and as per management, it will only move to biomass for its new plant locations which have no gas pipe connections. Should a RM3-per-six-months hike begin in June 2013, we estimate our FY13F EPS will see a -2.6% impact, assuming an 80% cost passon. The same assumption suggests that our FY14F EPS estimate will see a -13.0% impact upon a natural gas price increase of 47%, based on the current price of MYR16.07/mmbtu.

0%

-1%

-2%

-3%

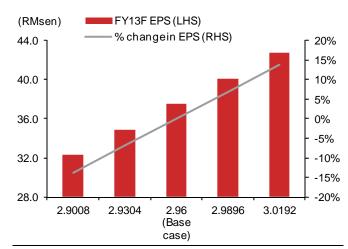
-4%

-5%

15%

High fuel cost and expected low pass-on rates would result in large EPS impact from fuel cost hikes





Source: Nomura estimates

0%

Source: Nomura estimates

## Initiate with a Neutral rating and TP of MYR3.80

10%

Kossan currently trades at an attractive 8.9x one-year forward P/E – the lowest across our four Malaysian glove manufacturers under coverage, at a 39% discount to the market's three-year average one-year forward P/E of 14.5x. We peg Kossan's FY13F EPS of 37.78sen to the sector average forward P/E of 10.0x; we think such valuations are undemanding as we saw Latexx and Adventa being valued at 10x and 12x one-year forward P/E respectively in recent M&A exercises, despite being smaller in size and providing lower ROEs.

Kossan has traded at a 43% discount to Top Glove's multiple over the last three years, but we see a narrowing gap between it and the market leader (Top Glove) owing to its stepped-up capacity expansions which were muted in the past, as well as its venture into the higher-margin special purpose glove segment. Kossan's current earnings yield of 10.9% is 7.5% above the returns from Malaysian Government Securities (MGS; see LHS chart below) – suggesting potential upside to its share price. This spread is also the largest among peers under our coverage; Hartalega's spread is 3.7%, Supermax's is 7.4%, and Top Glove's is 3.0%.

Kossan intends to increase its dividend payout to 35-40% over the next two years from its current target of 20-25%. This, we estimate, should result in dividend yields of 2.7-4.2% over the next three years – among the highest across regional comparables.

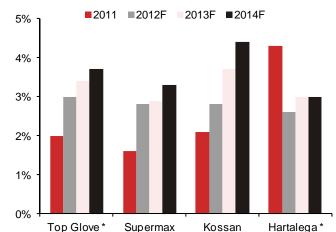
## Fig. 118: Spread between Kossan's earnings yields and returns on MGS



Fig. 120: Expected dividend yields of regional comparables

Fig. 119: We expect Kossan to have the highest dividend

January 9, 2013



Source: Company data, Nomura estimates

yield in coming years

\* Top Glove and Hartalega 2012 numbers are actual

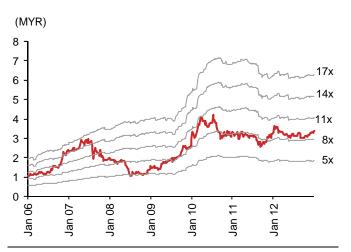
		P/E (x)		•	Yield (%)	
Companies	CY12	CY13F	CY14F	CY12	CY13F	CY14F
Malaysian glove-makers						
Top Glove Corp	16.5	14.7	13.6	3.0	3.4	3.7
Supermax Corp	10.7	10.4	9.4	2.8	2.9	3.2
Kossan Rubber Industries	10.0	8.9	8.3	2.7	3.6	4.2
Hartalega Holdings	16.4	15.2	14.2	2.9	3.0	3.2
International glove-makers						
Ansell	14.5	12.6	11.2	2.4	2.6	2.9
Cardinal Health *	12.6	11.5	10.7	2.3	2.6	2.9
Kimberly-Clark Corp *	17.1	15.9	NA	3.4	3.6	NA
Semperit AG *	13.4	12.1	NA	2.4	2.6	NA
Sri-Trang Agro *	15.5	11.3	NA	1.8	2.5	NA
3M Co *	14.7	13.7	NA	2.5	2.6	NA
Other health-related						
Mani Inc *	18.3	17.2	16.4	1.8	1.9	1.9
Nipro Corp *	17.5	15.2	14.0	3.3	3.2	3.5
Shandong Weigao	25.4	21.1	NA	1.1	1.5	NA
Microport Scientific Corp *	13.2	NA	NA	1.7	NA	NA
Mindray Medical Intl Ltd-Adr *	20.0	16.5	NA	1.4	1.7	NA

Source: Nomura estimates, Bloomberg (for non-rated stocks; marked with \*). Pricing as of 4 Jan 2013.

We highlight that while peers have seen share prices rally from their respective lows in May, Kossan's share price has hovered at around the same level over the same time horizon. It has also underperformed the market with a mere 3.4% increase over the course of 2012, while the KLCI has gained 10.3% – despite decreasing raw material input costs over the same period. Thus, we see upside potential to this laggard as the market begins to recognise the potential of this group.

We estimate FY13F EPS at 37.78sen, on our assumptions of: 1) easing latex and nitrile prices leading to lower ASPs; 2) switch in product mix toward NBR and special purpose gloves, and; 3) utilisation rate of 90% (slightly below full capacity) due to a slight discount applied to new capacities coming online.

#### Fig. 121: Historical P/E band chart





Source: Bloomberg, Nomura research

Source: Bloomberg, Nomura research

Fig. 122: Historical one-year forward P/E

Apart from our P/E methodology, we also ran a 10-year DCF valuation with cashflows discounted back to January 2013 to arrive at an intrinsic value of MYR4.06 per share. The assumptions built into our DCF are capex spending of 4% revenue, with a gradually increasing tax rate stabilising at 25%.

### Fig. 123: Key model assumptions

Valuation assumptions	FY13F	FY14F	FY15F
MYR/USD	2.96	2.90	2.88
Capex (MYRmn)	80.00	80.00	80.00
Utilisation rate	88%	83%	85%
Depreciation rate	6.1%	6.1%	6.1%
Inflation rate	2.50%	2.50%	3.00%
ASP (USD per '000 pcs)			
- Latex (powdered)	28.24	28.67	29.45
- Latex (powder-free)	39.91	40.51	41.61
- Nitrile	34.74	32.90	33.51
- Surgical	75.00	75.00	76.13
Avg latex price (RMsen/kg)	620	622	631
Avg grossed-up nitrile price (RMsen/kg)	608	611	625
Beta	0.93		
Risk-free rate	3.47%		
Risk premium	5.00%		
Terminal growth rate	2.00%		
Discount rate (WACC)	7.01%		
DCF value per share (MYR)	4.06		

Source: Nomura estimates

67

#### Fig. 124: Intrinsic value sensitivity analysis

			Share Price	Sensitivity Analy	/sis	
				WACC		
		6.5%	7.0%	7.5%	8.0%	8.5%
	1%	3.99	3.69	3.43	3.21	3.02
lal ate	2%	4.47	4.07	3.74	3.46	3.23
Perpetual growth rate	3%	5.23	4.65	4.19	3.82	3.51
Pel	4%	6.61	5.61	4.89	4.35	3.93
	5%	9.82	7.53	6.15	5.23	4.57

Source: Nomura estimates

#### Risks to our view

Upside risks to our view include: 1) higher-than-expected pass-on rates, as we assume ASPs will be revised downwards amid increased competition; and 2) higher-than-expected earnings contribution from TRP segment from an improved automotive outlook or Indonesian venture which would lower labour costs.

Downside risks to our view include: 1) the market not assigning a more attractive P/E valuation to the group despite potential higher top-line growth from its capacity expansions which were low-key in the past, as well as its strategy to dominate niche product segments; 2) an unexpected surge in latex prices, and; 3) expansion hiccups which would affect its penetration into higher-end segments.

## Supermax Corp Bhd SUPM.KL SUCB MK

HEALTH CARE & PHARMACEUTICALS

## Distribution arm a double-edged sword **Pricing pressure from both income streams; additional capacity provides support**

## Action: Initiate with Reduce rating and TP of MYR1.90

With latex prices easing and demand growing, Supermax's share price is up 23% since May 2012 lows. Nevertheless, we see limited near-term upside potential remaining for the name given our expectation of an uptrend in latex prices going into 1H13F, before trending downwards again in 2H13F. Although aggressive capacity expansions moving forward should support the group's plan to strengthen its foothold in the dental NBR gloves market, we think bottom-line growth is restricted by a potentially imminent margin compression. On the back of this, we have a 3-year forecast EPS CAGR of 11.6%, below consensus' 17.0%.

### Catalysts: Margin squeeze, potentially higher energy costs

With the business model of a streamlined supply chain, Supermax will likely have to shoulder most of the margin squeeze via both manufacturing and distribution arms to remain competitive, in light of mounting pricing pressure. Its large exposure to energy costs also means that Supermax would be rather badly hit should natural gas price subsidies be removed. Moreover, the government's unwillingness to extend Reinvestment Allowance for glove-makers is likely to hurt Supermax the most, as its current tax rate is the lowest among our companies under coverage.

### Valuations: Rather expensive; weak industry outlook restricts upside

We think Supermax's current valuations are rather expensive – 10.4x oneyear forward P/E is above its 3-year average of 8.9x; it however trades at its long-term average of 1.4x P/B. We arrive at our TP of MYR1.90 by pegging its earnings to a 10.0x target P/E multiple, which is the sector average since 2007, on FY13F EPS expectation of 19.17sen.

31 Dec	FY11		FY12F		FY13F		FY14F
Currency (MYR)	Actual	Old	New	Old	New	Old	New
Revenue (mn)	1,021	N/A	1,108	N/A	1,200	N/A	1,291
Reported net profit (mn)	104	N/A	127	N/A	130	N/A	145
Normalised net profit (mn)	104	N/A	127	N/A	130	N/A	145
FD normalised EPS	15.31c	N/A	18.61c	N/A	19.17c	N/A	21.30c
FD norm. EPS growth (%)	-41.8	N/A	21.5	N/A	3.0	N/A	11.1
FD normalised P/E (x)	13.0	N/A	10.7	N/A	10.4	N/A	9.3
EV/EBITDA (x)	10.6	N/A	8.2	N/A	8.1	N/A	7.4
Price/book (x)	1.8	N/A	1.6	N/A	1.4	N/A	1.3
Dividend yield (%)	1.6	N/A	2.8	N/A	2.9	N/A	3.2
ROE (%)	14.3	N/A	15.6	N/A	14.4	N/A	14.5
Net debt/equity (%)	29.4	N/A	20.2	N/A	22.9	N/A	20.4

Source: Company data, Nomura estimates

Key company data: See page 2 for company data and detailed price/index chart.



January 9, 2013	
Rating Starts at	Reduce
Target price Starts at	MYR 1.90
Closing price January 4, 2013	MYR 2.00
Potential downside	-5%

## Anchor themes

With competition set to increase significantly in the year ahead – particularly in the NBR segment – we see lower pricing power for glovemakers. We expect lower margins for NBR-focused manufacturers as a result of downward ASP revisions.

### Nomura vs consensus

Our TP is 23% below consensus on expectation of compressed margins. We do not foresee significant downside as valuations seem undemanding for Supermax's size.

**Research analysts** 

#### Malaysia Health Care & Pharmaceuticals

Celeste Yap - NSM celeste.yap@nomura.com +603 2027 6894

See Appendix A-1 for analyst certification, important disclosures and the status of non-US analysts.

## Key data on Supermax Corp Bhd

### Income statement (MYRmn)

Income statement (MYRmn) Year-end 31 Dec	FY10	FY11	FY12F	FY13F	FY14F
Revenue	977	1,021	1,108	1,200	1,291
Cost of goods sold	-693	-819	-846	-929	-999
Gross profit	284	202	262	271	292
SG&A	-129	-113	-133	-147	-149
Employee share expense	-123	-115	-100	-147	-143
Operating profit	155	90	129	124	143
	135	30	123	124	143
EBITDA	181	114	161	157	178
Depreciation	-26	-24	-32	-33	-35
Amortisation					
EBIT	155	90	129	124	143
Net interest expense	-14	-13	-13	-13	-13
Associates & JCEs	42	35	26	36	35
Other income					
Earnings before tax	184	112	142	147	165
Income tax	-25	-8	-16	-17	-20
Net profit after tax	159	104	127	130	145
Minority interests	0	0	0	0	0
Other items					
Preferred dividends					
Normalised NPAT	159	104	127	130	145
Extraordinary items	0	0	0	0	0
Reported NPAT	159	104	127	130	145
Dividends	-25	-22	-38	-39	-43
Transfer to reserves	133	82	89	91	101
Valuation and ratio analysis					
Reported P/E (x)	7.6	13.0	10.7	10.4	9.3
Normalised P/E (x)	7.6	13.0	10.7	10.4	9.3
FD normalised P/E (x)	7.6	13.0	10.7	10.4	9.3
FD normalised P/E at price target (x)	7.2	12.4	10.2	9.9	8.9
Dividend yield (%)	3.8	1.6	2.8	2.9	3.2
Price/cashflow (x)	19.3	24.0	8.7	13.0	11.3
Price/book (x)	1.0	1.8	1.6	1.4	1.3
EV/EBITDA (x)	6.9	10.6	8.2	8.1	7.4
EV/EBIT (x)	7.9	12.7	9.8	9.8	8.8
Gross margin (%)	29.1	19.8	23.7	22.6	22.6
EBITDA margin (%)	18.6	11.2	14.5	13.1	13.8
EBIT margin (%)	15.9	8.8	11.7	10.3	11.0
Net margin (%)	16.3	10.2	11.4	10.9	11.2
Effective tax rate (%)	13.5	7.2	11.1	11.5	12.0
Dividend payout (%)	16.0	21.2	30.0	30.0	30.0
Capex to sales (%)	4.8	3.7	4.7	8.0	4.6
Capex to depreciation (x)	1.8	1.6	1.6	2.9	1.7
ROE (%)	25.4	14.3	15.6	14.4	14.5
ROA (pretax %)	22.0	12.0	13.9	13.3	13.3
Growth (%)	~ ~ ~		~ -		
Revenue	21.6	4.5	8.5	8.3	7.6
EBITDA	10.9	-37.2	41.3	-2.4	13.3
EBIT	18.0	-42.2	43.8	-4.0	15.1
Normalised EPS	24.9	-41.8	21.5	3.0	11.1
Normalised FDEPS	24.9	-41.8	21.5	3.0	11.1
Per share					
Reported EPS (MYR)	26.31c	15.31c	18.61c	19.17c	21.300
Norm EPS (MYR)	26.31c	15.31c	18.61c	19.17c	21.300
Fully diluted norm EPS (MYR)	26.31c	15.31c	18.61c	19.17c	21.300
Book value per share (MYR)	2.03	1.13	1.26	1.40	1.54
DPS (MYR)	0.07	0.03	0.06	0.06	0.06
Source: Company data, Nomura estimates					

Source: Company data, Nomura estimates

### Relative performance chart (one year)



Source: ThomsonReuters, Nomura research

(%)	1M	ЗM	12M	
Absolute (MYR)	0.5	-1.0	0.5	
Absolute (USD)	0.9	-0.1	4.1	
Relative to index	-3.0	-2.2	-6.1	
Market cap (USDmn)	446.7			
Estimated free float (%)	64.4			
52-week range (MYR)	2.38/1.63			
3-mth avg daily turnover (USDmn)	0.76			
Major shareholders (%)				
Dato' Seri Stanley Thai	20.4			
Datin Seri Cheryl Tan	15.1			

Source: Thomson Reuters, Nomura research

#### Notes

Dividend payout revised by management to 30% from FY12F onwards; 20% previously

### Cashflow (MYRmn)

Year-end 31 Dec	FY10	FY11	FY12F	FY13F	FY14F
EBITDA	181	114	161	157	178
Change in working capital	-105	-66	11	-36	-39
Other operating cashflow	-14	9	-16	-17	-20
Cashflow from operations	62	56	156	104	120
Capital expenditure	-47	-38	-52	-96	-60
Free cashflow	16	18	104	8	60
Reduction in investments		-31	-26	-36	-35
Net acquisitions					
Reduction in other LT assets		1	0	0	0
Addition in other LT liabilities		5	0	0	0
Adjustments	1	25	26	36	35
Cashflow after investing acts	16	18	104	8	60
Cash dividends	-32	-27	-38	-39	-43
Equity issue	6	0	0	0	0
Debt issue	-20	-22	-1	-1	-1
Convertible debt issue					
Others	8	38	-13	-13	-13
Cashflow from financial acts	-38	-11	-52	-53	-57
Net cashflow	-22	7	52	-45	2
Beginning cash	119	97	104	157	112
Ending cash	97	104	157	112	115
Ending net debt	198	226	173	217	214
Source: Company data, Nomura estimates					

## Notes

Significant increase in FY13F capex for the additional 40 production lines should increase NBR capacity by 5.4bn pcs p.a.

## Balance sheet (MYRmn)

Bulance sheet (in thinking					
As at 31 Dec	FY10	FY11	FY12F	FY13F	FY14F
Cash & equivalents	97	104	157	112	115
Marketable securities	0	0	0	0	0
Accounts receivable	213	206	232	247	268
Inventories	133	223	188	213	242
Other current assets	2	8	8	8	8
Total current assets	445	541	585	580	632
LT investments	198	229	255	291	326
Fixed assets	388	402	423	485	510
Goodwill	29	29	29	29	29
Other intangible assets	0	0	0	0	0
Other LT assets	6	5	5	5	5
Total assets	1,065	1,205	1,296	1,389	1,501
Short-term debt	155	190	190	190	190
Accounts payable	60	87	90	93	105
Other current liabilities	4	0	0	0	0
Total current liabilities	220	278	281	283	295
Long-term debt	141	140	140	139	138
Convertible debt					
Other LT liabilities	14	18	18	18	18
Total liabilities	374	436	439	441	451
Minority interest	0	0	0	0	0
Preferred stock	0	0	0	0	0
Common stock	170	170	170	170	170
Retained earnings	521	599	688	779	880
Proposed dividends	0	0	0	0	0
Other equity and reserves	0	0	0	0	0
Total shareholders' equity	691	769	858	949	1,050
Total equity & liabilities	1,065	1,205	1,296	1,389	1,501
Liquidity (x)					
Current ratio	2.03	1.95	2.09	2.04	2.14
Interest cover	11.5	7.2	10.0	9.6	11.1
1					
	1.00	1.00	1.00	1.38	1.20
Net debt/EBITDA (x)	1.09 28.7	1.99 29.4	1.08	22.9	20.4
Net debt/equity (%)	20.7	29.4	20.2	22.9	20.4
Activity (days)					
Days receivable	66.8	74.9	72.4	72.9	72.8
Days inventory	65.6	79.4	89.0	78.8	83.0
Days payable	34.9	32.9	38.4	36.0	36.1
Cash cycle	97.5	121.4	123.0	115.8	119.8
Source: Company data, Nomura estimates					

#### Notes

Management is comfortable with ~27% gearing

Receivable, inventory and payable days include both manufacturing and distribution arms

## Distribution arm a double-edged sword

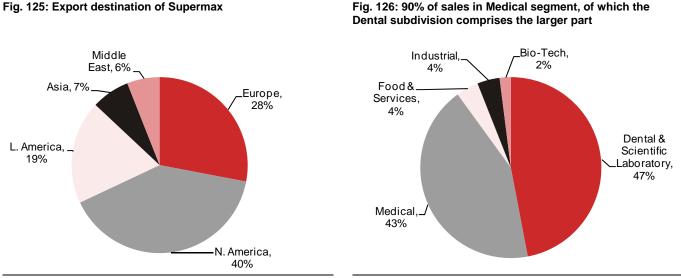
Market leader Top Glove's upstream movement has not lured Supermax to venture into something in which it has no experience. Instead, it will be going downstream and has re-stated its intention to dedicate attention to "what we can do best" – manufacturing, distributing and marketing. Supermax currently has six overseas distribution centers namely in the US, Germany, Brazil, Canada, Belgium and the UK, which together provide the group with another source of income. The incorporation of Supermax Global Ltd in Bermuda further diversifies the group's income stream – from the trading and marketing of gloves which are not in-house products (cf. marketing of only its own products).

Currently, 40% of the gloves manufactured by the group are distributed by its own channels. Per management information, margins for the distribution arm average mostly around the 30% level, although this does vary from 19-38%. While we like the extra stream of income this division provides, we opine that it could be a liability to the group in light of an expected margin compression across the industry. The group could feel a squeeze in both arms as lower ASP becomes a common feature for both manufacturers and distributors. Thus we believe that potential upsides for Supermax's bottom line are restricted, as it could be heavily affected with no intermediaries between itself and the end users to share the burden of lower profit margins.

## Focuses on NBR and Surgical gloves; remains market-driven

Currently, 68% of Supermax's goods are sold in North America and Europe, but the company recognises growth potential stemming from Africa, BRIC nations and Eastern Europe – areas which it is eyeing for more market share. In fact, management aims to expand the company's distribution arm by having distribution centers in both China and India in the future.

Reinforcing its distribution arm; aiming for more revenue from it



Source: Company data

Source: Company data

Going forward, management's attention will be centred on the Dental market, of which Supermax has gradually moved up the ranks and already is the leader in the US Natural Rubber (NR) segment (as of 2011 figures, according to the company). Per management information, it is currently the fifth largest NBR glove vendor in the US dental market with a 4.4% share. The group is upping its expansion efforts into this area with aims to have its own brand control 10% of the market in three years' time, as being spelled out in its corporate presentations.

Supermax's Glove City project, encompassing 6 new factories on 36 acres of land, has a projected capacity of 18bn pieces of gloves, per management guidance. It requires a

Focusing on the Dental market – nitrile gloves in particular

# the

capex of MYR350-400mn, which the group intends to spread over a three-year period. While this project should increase the group's surgical gloves output, capacity additions would mainly contribute to the Nitrile Butadiene Rubber (NBR) segment, in line with management's target to increase the company's share of the Dental NBR gloves pie.

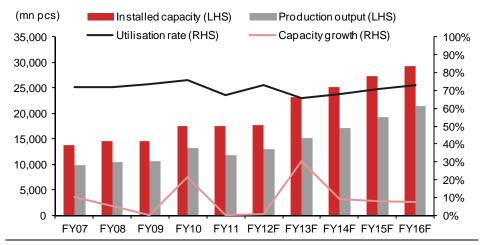
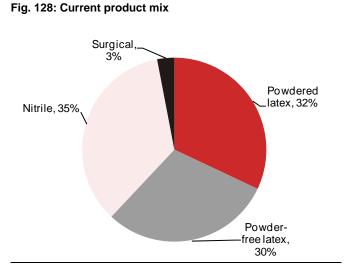


Fig. 127: Accelerating capacity expansions which were rather muted in the past

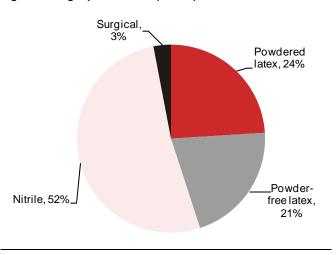
Source: Company data, Nomura estimates

Supermax's ten-fold increase in its surgical gloves production comes with the stagedcommissioning of its seven new lines, which began coming online in May 2012. All lines are ready but only four of them are running currently; Supermax is still pending the delivery of packing machines and awaiting confirmation from the government with regards to the sterilisation capacity expansion. Management expects the remaining lines to begin operation in May or June 2013.

The other two near-term projects of its Glove City expansion are dedicated towards NBR gloves, although management is determined to be market-driven; such is possible, in our view, as all new lines are flexible and are able to produce both NR and NBR gloves. This will see the group's product mix alter, with more weight given to NBR gloves, and the surgical segment taking up a slightly larger slice. Management's target is to have, by FY13F, a mix of 52% NBR, and 48% of NR and surgical gloves combined. Surgical gloves enjoy higher margins than other products, but we note that the market is small at only c.8% of global glove market.



#### Fig. 129: Target product mix (FY13F)

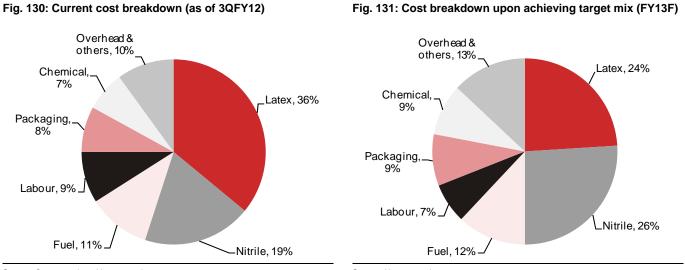


Source: Company data

Source: Nomura research

Keeping a close eye on the surgical gloves space

Following expansions into nitrile and surgical gloves, we estimate that by FY13F the group's cost exposure to NR latex will decrease to 24% from the current 38%, while that of NBR will rise to 26% from 18% currently, assuming that planned capacities go forging ahead into the NBR segment.

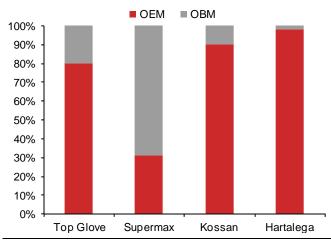


Source: Company data, Nomura estimates

Source: Nomura estimates

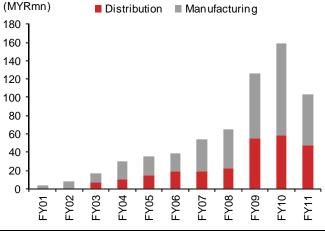
The group sets aside 1% of sales revenue to support its R&D development every year. We should begin to see Supermax push out its new patented glove products in 4Q12 – the achievement of two teams of laboratory scientists and dermatologists who were collaborating since 2011. Products under its own brand names (Supermax, Aurelia and Maxter) are all competitively priced, which allows Supermax to battle for market share with peers. Thus, higher income contribution originates not from improved margins, but earnings from glove-distributing, on our observations.

Fig. 132: Only covered company with OBM contribution exceeding OEM



Source: Company data

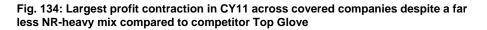
Fig. 133: Manufacturing dominated, but profits contribution from distribution appears gradually on the rise

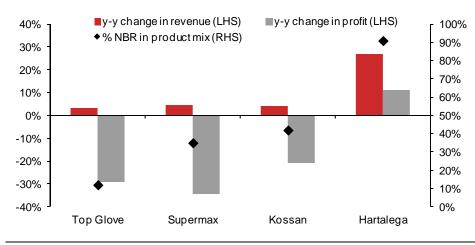


Source: Company data

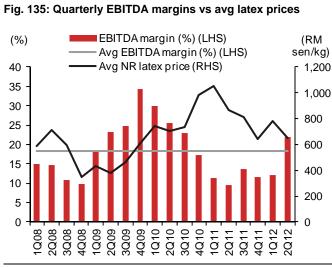
#### On the losing end of squeezed margins

Given Supermax's business model with much attention dedicated to its distribution arm, we think that management will have to absorb much of the margin compressions as a result of weaker pricing powers – similar to the case of a latex price surge. We saw this taking place in CY11 when growth in Supermax's revenue was slightly above that for Top Glove and Kossan, but it suffered a greater decline at the net profit level instead – despite having a much less NR-heavy product mix (refer chart below). In the cases of most glove-makers, distributors and agents stand in between manufacturers and end users. When prices are cut, each intermediary takes a hit, minimising the impact on any one party; Supermax with a streamlined distribution channel, on the other hand, does not have much room to meddle with prices, and is likely to be the most negatively affected compared to other listed peers when downward revisions of ASPs take place, in our view.



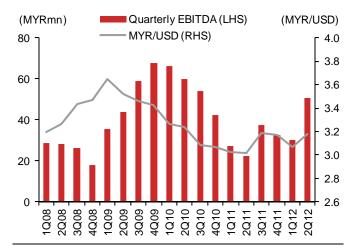


Source: Companies data, Nomura research



Absence of intermediaries leaves Supermax suffering with margin compressions

Fig. 136: Quarterly EBITDA vs avg exchange rates



Source: Company data, Bloomberg, Nomura research

We would note that Supermax has, in the past, had the highest share price volatility in comparison to locally listed competitors. In addition, it has the lowest effective tax rate among the companies in our universe, and management is confident that such will sustain, mainly due to its operations in the tax-haven, Bermuda, which guarantees tax-free status for 25 years.

Source: Company data, Bloomberg, Nomura research

#### Minimum wage and automation

Labour costs currently comprise 9% of total cost. 4,200 of the group's employees are paid between MYR780 and MYR1,100 each month, translating into an extra MYR12mn cost (c.1.5% of total production cost) with the implementation of the minimum wage policy, including extra EPF contribution by the employer. Supermax has allocated MYR65.8mn into a comprehensive next-generation automation programme; production lines are being shut down temporarily, line by line, to have new automated lines installed in place of the old ones – resulting in lower utilisation rates. With traditionally labour-intensive production stages like stripping, stacking, counting and packing of gloves no longer in the picture, we estimate that c.45% of existing employees can be laid off, resulting in savings of c.MYR25mn per year upon full automation. Taking into account both factors, we estimate a 3.7% reduction in Supermax's total cost of production.

#### **Fuel costs**

Of the company's nine running plants, one is biomass-powered and two are dual-fuelled. Its new expansions will also have a choice between natural gas and biomass as the energy source. Should management find gas price hikes too challenging, it will be able to switch into renewable energy without much trouble. Nonetheless, we note that Supermax's total cost has the largest exposure to fuel as compared to the other glove-makers under our coverage, with energy cost comprising 11% of the total cost pie. Should the first natural gas price hike occur in June 2013, we estimate a 9% increase in fuel costs for the financial year, resulting in a -2.9% impact on our FY13F EPS of 19.18sen, assuming an 80% pass-on rate. Assuming the same scenario, the natural gas price would have increased by 47% for FY14F, knocking 12.8% off FY14F's EPS of 21.54sen, on our estimates.

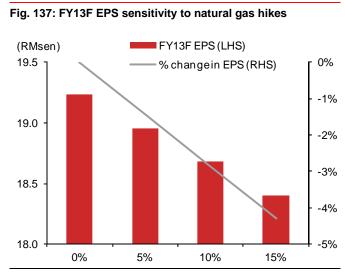


Fig. 138: FY13F EPS sensitivity to MYR/USD rates

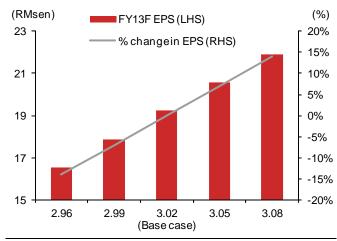
Energy cost comprise the

listed peers, thus will likely be

heavily affected by natural gas

largest portion of total production cost among locally

price hikes



Source: Nomura estimates

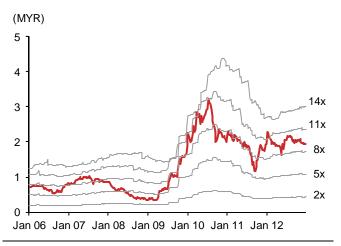
#### Initiating with a Reduce rating and a TP of MYR1.90

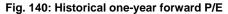
Currently trading at 10.4x one-year forward P/E, Supermax is valued by the market at a 28% discount to the market's 3-year average one-year forward P/E of 14.5x. We peg its FY13F EPS to a forward P/E of 10.0x, which is the sector average since 2007, and also the multiple which Semperit valued Latexx at. We think that the gap between Supermax and Top Glove should narrow following Supermax's Glove City expansion plans to boost capacity, as well as the extra income stream it obtains from its distribution and marketing arms.

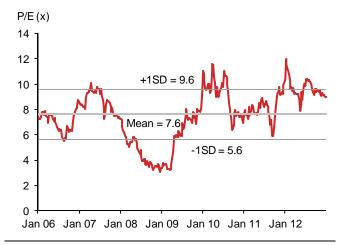
We expect FY13F EPS to come in at 19.17sen, with assumptions of: 1) steadily easing latex and nitrile prices – translating into lower ASPs; 2) product mix quickly switching to a NBR-focused one; and 3) low utilisation rate of 66% due to discount applied to temporary shut downs for automation upgrades as well as new production lines which will gradually come online to boost capacity by a good 30% over the financial year.

Source: Nomura estimates

#### Fig. 139: Historical P/E band chart







Source: Bloomberg, Nomura research

Source: Bloomberg, Nomura research

Our DCF-based valuation which has ten years' cashflows discounted back to January 2013 provides an intrinsic value of MYR1.77 per share – arrived at by assuming capex at 3% of sales with a progressively higher tax rate stabilising at 23% as tax incentives run out. We have a lower effective tax rate built in for Supermax mainly due to its operations in Bermuda, which Tax Assurance in place allows lower income tax paid. Management is in negotiation with Bermuda authorities for an extension of its Tax Assurance, which was to be in effect until March 31, 2035.

#### Fig. 141: Key model assumptions

Valuation assumptions	FY13F	FY14F	FY15F
MYR/USD	2.96	2.90	2.88
Capex (MYRmn)	95.80	60.00	60.00
Utilisation rate	66%	68%	71%
Depreciation rate	4.2%	4.2%	4.3%
Inflation rate	2.50%	2.50%	3.00%
ASP (USD per '000 pcs)			
- Latex (powdered)	22.33	22.39	22.66
- Latex (powder-free)	25.98	26.05	26.36
- Nitrile (powdered)	21.78	20.76	20.93
- Nitrile (powder-free)	25.85	24.95	25.53
- Surgical	75.00	75.00	75.00
Avg latex price (RMsen/kg)	620	622	631
Avg grossed-up nitrile price (RMsen/kg)	608	611	625
Beta	1.56		
Risk-free rate	3.47%		
Risk premium	5.00%		
Terminal growth rate	2.00%		
Discount rate (WACC)	8.99%		
DCF value per share (MYR)	1.77		

Source: Nomura estimates

#### Fig. 142: DCF intrinsic value sensitivity analysis

		0.1	are Price Sensiti	WACC		
		7.5%	8.0%	8.5%	9.0%	9.5%
	1%	2.05	1.89	1.74	1.62	1.51
Perpetual growth rate	2%	2.31	2.10	1.92	1.77	1.64
vthi	3%	2.68	2.40	2.17	1.97	1.80
Pel	4%	3.27	2.85	2.52	2.25	2.03
0)	5%	4.33	3.60	3.07	2.67	2.36

Source: Nomura estimates

#### Risks to our view

Positive surprises to our view include 1) higher-than-expected pass-on rates from cost increases; 2) lower-than-expected NR latex prices; and 3) faster-than-expected completion of new NBR lines which would see higher volumes in FY13F.

Size matters

## NR volumes to help weather mounting pricing pressure; limited upside potential

#### Action: Initiate with Neutral rating and TP of MYR5.65

Top Glove shares outperformed the market in 2012, up 12.6% (vs KLCI, up 10.3%), largely reflecting easing raw material costs and recovering demand. As we expect latex prices to gradually trend up from current levels in 1H13F, upside surprises for the group are likely capped. We expect glove-makers to lower ASPs to stay competitive, but think that margins will be sustainable for Top Glove as its goods are currently priced at the lower end of the spectrum. Its leading market share in the NR market is also likely to benefit the group, following all major manufacturers' rush into the NBR segment. We forecast a three-year EPS CAGR of 8.6% for the company (vs. consensus of 10.9%).

#### Catalysts: Weak USD and low ASPs to weigh on volume growth

We expect volume to remain strong for Top Glove, albeit growing at a slower rate than in FY12 as much of the re-stocking has already been carried out. Subdued top-line growth due to an expected weakening USD relative to the MYR as well as expected ASP cuts make the stock unattractive at current prices, in our view.

#### Valuations: Rather fair; no visible near-term catalysts

Top Glove is currently trading at 15.2x one-year forward P/E, in line with its three-year mean of 15.2x; its P/B of 2.5x is above the long-term average of 2.1x. We thus think soft latex prices have already been priced into Top Glove's valuations. We peg our FY13F EPS estimate of 36.99sen to a forward P/E of 15.2x - its three-year average which implies a premium vs. smaller peers, reflecting Top Glove's unrivalled capacity in the industry – arriving at a TP of MYR5.65.

31 Aug	FY12		FY13F		FY14F		FY15F
Currency (MYR)	Actual	Old	New	Old	New	Old	New
Revenue (mn)	2,314	N/A	2,495	N/A	2,809	N/A	3,041
Reported net profit (mn)	202	N/A	229	N/A	255	N/A	260
Normalised net profit (mn)	202	N/A	229	N/A	255	N/A	260
FD normalised EPS	32.69c	N/A	36.99c	N/A	41.22c	N/A	41.90c
FD norm. EPS growth (%)	78.7	N/A	13.2	N/A	11.4	N/A	1.7
FD normalised P/E (x)	17.3	N/A	15.2	N/A	13.7	N/A	13.5
EV/EBITDA (x)	11.0	N/A	9.3	N/A	8.4	N/A	8.0
Price/book (x)	2.8	N/A	2.5	N/A	2.3	N/A	2.1
Dividend yield (%)	2.8	N/A	3.3	N/A	3.7	N/A	3.7
ROE (%)	17.0	N/A	17.4	N/A	17.7	N/A	16.5
Net debt/equity (%)	net cash	N/A	net cash	N/A	net cash	N/A	net cash

Source: Company data, Nomura estimates

Key company data: See page 2 for company data and detailed price/index chart.



January 9, 2013	
Rating Starts at	Neutral
Target price Starts at	MYR 5.65
Closing price January 4, 2013	MYR 5.64
Potential upside	+0.2%

#### Anchor themes

With competition set to increase significantly in the year ahead – particularly in the NBR segment – we see lower pricing power for glovemakers. We expect lower margins for NBR-focused manufacturers as a result of downward ASP revisions.

#### Nomura vs consensus

Our TP is 4% below consensus largely on the back of weak macro conditions. We see little buying impetus at current levels with no immediate positive catalysts.

**Research analysts** 

Malaysia Health Care & Pharmaceuticals

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See Appendix A-1 for analyst certification, important disclosures and the status of non-US analysts.

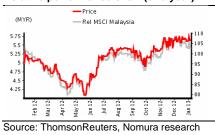
## Key data on Top Glove Corp

#### Income statement (MYRmn)

Income statement (MYRmn)					
Year-end 31 Aug	FY11	FY12	FY13F	FY14F	FY15F
Revenue	2,054	2,314	2,495	2,809	3,041
Cost of goods sold	-1,819	-1,938	-2,072	-2,346	-2,557
Gross profit	235	377	423	463	485
SG&A	-101	-144	-143	-155	-171
Employee share expense					
Operating profit	134	233	280	308	314
EBITDA	196	302	364	406	421
Depreciation	-61	-69	-84	-97	-107
Amortisation					
EBIT	134	233	280	308	314
Net interest expense	10	8	8	9	8
Associates & JCEs	1	0	0	0	0
Other income					
Earnings before tax	145	241	288	317	322
Income tax	-30	-34	-56	-57	-58
Net profit after tax	115	207	232	260	264
Minority interests	-2	-5	-3	-5	-4
Other items					
Preferred dividends					
Normalised NPAT	113	202	229	255	260
Extraordinary items					
Reported NPAT	113	202	229	255	260
Dividends	-68	-99	-115	-128	-130
Transfer to reserves	45	103	115	128	130
Valuation and ratio analysis					
Reported P/E (x)	30.8	17.3	15.2	13.7	13.5
Normalised P/E (x)	30.8	17.3	15.2	13.7	13.5
FD normalised P/E (x)	30.8	17.3	15.2	13.7	13.5
FD normalised P/E at price target (x)	30.9	17.3	15.3	13.7	13.5
Dividend yield (%)	1.9	2.8	3.3	3.7	3.7
Price/cashflow (x)	20.3	12.6	12.3	11.1	10.4
Price/book (x)	3.1	2.8	2.5	2.3	2.1
EV/EBITDA (x)	17.0	11.0	9.3	8.4	8.0
EV/EBIT (x)	24.8	14.3	12.0	11.0	10.7
Gross margin (%)	11.4	16.3	17.0	16.5	15.9
EBITDA margin (%)	9.5	13.0	14.6	14.4	13.8
EBIT margin (%)	6.5	10.1	11.2	11.0	10.3
Net margin (%)	5.5	8.7	9.2	9.1	8.5
Effective tax rate (%)	20.9	14.3	19.3	18.1	18.1
Dividend payout (%)	60.1	48.9	50.0	50.0	50.0
Capex to sales (%)	6.9	6.1	9.1	8.1	5.5
Capex to depreciation (x)	2.3	2.0	2.7	2.3	1.6
ROE (%)	10.2	17.0	17.4	17.7	16.5
ROA (pretax %)	11.3	17.2	18.4	18.0	16.8
Growth (%)					
Revenue	-1.2	12.7	7.8	12.6	8.3
EBITDA	-45.8	54.4	20.6	11.5	3.8
EBIT	-55.6	73.4	20.4	10.0	1.7
Normalised EPS	-54.1	78.7	13.2	11.4	1.7
Normalised FDEPS	-54.1	78.7	13.2	11.4	1.7
Per share					
Reported EPS (MYR)	18.29c	32.69c	36.99c	41.22c	41.90c
Norm EPS (MYR)	18.29c	32.69c	36.99c	41.22c	41.90c
Fully diluted norm EPS (MYR)	18.29c	32.69c	36.99c	41.22c	41.90c
Book value per share (MYR)	1.81	2.03	2.22	2.43	2.65
DPS (MYR)	0.11	0.16	0.18	0.21	0.21

Source: Company data, Nomura estimates

#### Relative performance chart (one year)



(%)	1M	ЗM	12M	
Absolute (MYR)	-0.7	9.3	10.4	
Absolute (USD)	-0.9	9.5	13.6	
Relative to index	-5.7	7.6	1.9	
Market cap (USDmn)	1,145.7			
Estimated free float (%)	71.1			
52-week range (MYR)	5.78/4.06			
3-mth avg daily turnover (USDmn)	1.68			
Major shareholders (%)				
Tan Sri Lim Wee Chai	28.9			
KWAP	6.0			

Source: Thomson Reuters, Nomura research

#### Notes

The 50% dividend payout policy is the highest among peers, translating into dividend yields of 3.3-3.7%

#### Cashflow (MYRmn)

Year-end 31 Aug	FY11	FY12	FY13F	FY14F	FY15F
EBITDA	196	302	364	406	421
Change in working capital	-74	-30	-24	-35	-28
Other operating cashflow	51	5	-56	-58	-59
Cashflow from operations	172	276	284	313	335
Capital expenditure	-141	-141	-227	-227	-167
Free cashflow	31	135	57	87	168
Reduction in investments	-2	0	0	0	0
Net acquisitions					
Reduction in other LT assets	2	2	0	0	0
Addition in other LT liabilities	10	-7	0	0	0
Adjustments	-66	-27	11	14	13
Cashflow after investing acts	-25	104	68	100	180
Cash dividends	-88	-85	-115	-128	-130
Equity issue	1	1	0	0	0
Debt issue	-1	0	0	0	0
Convertible debt issue					
Others	-2	-1	0	0	0
Cashflow from financial acts	-89	-86	-115	-128	-130
Net cashflow	-114	18	-47	-27	51
Beginning cash	263	149	167	120	93
Ending cash	149	167	120	93	144
Ending net debt	-146	-164	-118	-90	-141
Source: Company data, Nomura estimates					

#### Notes

Large capex going forward to account for rubber plantation and long-term capacity expansion plans

#### Balance sheet (MYRmn)

As at 31 Aug	FY11	FY12	FY13F	FY14F	FY15F
Cash & equivalents	149	167	120	93	144
Marketable securities					
Accounts receivable	262	325	335	386	413
Inventories	176	179	197	221	242
Other current assets	129	148	148	148	148
Total current assets	715	820	800	847	946
LT investments	7	7	7	7	7
Fixed assets	661	741	884	1,013	1,073
Goodwill	20	20	20	20	20
Other intangible assets	0	0	0	0	0
Other LT assets	20	17	17	17	17
Total assets	1,423	1,605	1,728	1,905	2,064
Short-term debt	0	0	0	0	0
Accounts payable	195	236	238	278	299
Other current liabilities	35	49	49	49	49
Total current liabilities	229	285	287	327	348
Long-term debt	3	3	3	3	2
Convertible debt	0	0	0	0	0
Other LT liabilities	44	37	37	37	37
Total liabilities	277	325	327	367	388
Minority interest	25	24	28	32	36
Preferred stock	0	0	0	0	0
Common stock	481	484	484	484	484
Retained earnings	626	747	865	997	1,131
Proposed dividends					
Other equity and reserves	15	25	25	25	25
Total shareholders' equity	1,122	1,256	1,374	1,506	1,640
Total equity & liabilities	1,423	1,605	1,728	1,905	2,064
Liquidity (x)					
Current ratio	3.12	2.88	2.78	2.59	2.72
Interest cover	na	na	na	na	na
Leverage					
Net debt/EBITDA (x)	net cash				
Net debt/equity (%)	net cash				
Activity (days)					
Days receivable	46.6	46.4	48.3	46.8	47.9
Days inventory	34.4	33.5	33.2	32.5	33.0
Days payable	39.8	40.6	41.7	40.2	41.2
Cash cycle	41.3	39.3	39.7	39.1	39.7
Source: Company data, Nomura estimates					

#### Notes

Strong net cash position to support potential upcoming M&A deals

Top Glove's 40bn-piece capacity

is double than that of its closest

The company already has a presence in China, putting Top

Glove ahead in the market

The company maintains a low

utilisation rate to capitalise on demand upticks during

pandemic outbreaks

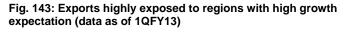
competitor

### Size matters

With annual production capacity of 40bn pieces, Top Glove is a global market leader in the glove manufacturing sector, with an aim, according to management, to further increase its 23% global market share to 30% by December 2015. To support its production levels, the company runs 22 glove factories (in Malaysia, Thailand and China) and two latex concentration plants in Thailand. Top Glove has a diversified customer base as it sells to more than 1,000 buyers from 185 countries, none of which contributes more than 4% of its revenue.

Top Glove has significant exposure to regions where we expect the highest growth – Asia and Latin America – which should enable it to gain the most from demand upticks in those regions, in our opinion. This is further supported by its product mix, with the most emphasis on lower-end powdered NR gloves, which given their inexpensive prices, we think will be most attractive for these developing markets. It has manufacturing facilities in China, with two plants producing vinyl and polyethylene gloves; these operations have been largely loss-making in the past due to their lack of economies of scale, but should give the company an edge in entering these markets with vast potential, in our view.

Stable capacity expansions over the years have allowed Top Glove to retain its number one spot in the market; management shows intent to defend its top position as it plans to spend MYR3bn in the next 15 years to construct another 30 factories across Malaysia, Thailand and Indonesia which will triple its current annual capacity to c.120bn gloves. Management expects the utilisation rate to remain low by industry standards at c.75%, so the company can benefit from any sudden surge in demand, which usually happens during pandemic outbreaks.



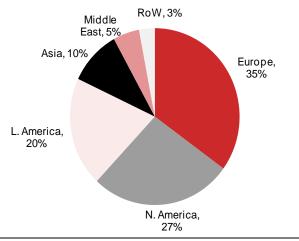
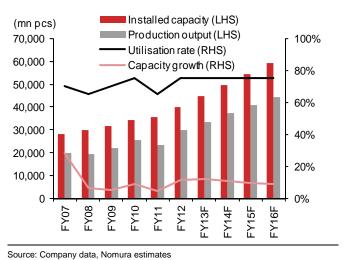


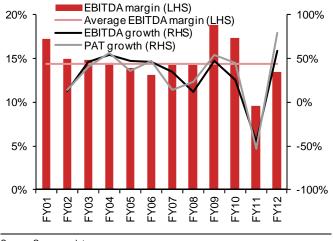
Fig. 144: Disciplined expansion plans over the years with low utilisation rates



#### A volume play

Management claims to have a number of "most's" – market share, capacity, number of customers and export destinations, among others. Revenue has been around double than that of its closest rival, Kossan, for the past couple of years, while it was also on top in terms of net profit, except for CY11 when Hartalega ranked higher than Top Glove due to elevated natural rubber (NR) latex prices. However, Top Glove's net profit margins have remained around 9% since it was listed in March 2001, which is at the lower end of the industry; we note that it has produced its goods at the lowest net margins for the past two years among main listed glove-makers we cover, largely due to high latex prices coupled with a NR-heavy product mix.

Source: Company data



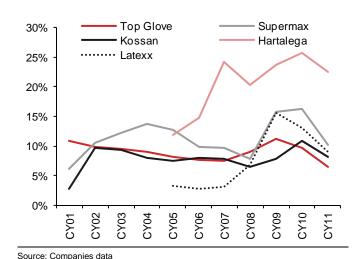


Fig. 146: Net profit margins on the lower end

Source: Company data

#### Partly shielded from price wars

We note that the group has been pricing its goods at a discount to its peers – mostly by 5-10%, based on our estimates. We attribute this to its significantly larger capacity which provides it economies of scales, as well as a willingness to produce at lower margins. Being the leader in the NR market, Top Glove is also typically the first one to raise or lower ASPs. The company's earnings are highly reliant on latex prices, where high raw material costs are almost instantly reflected in margin contractions, and vice versa.

#### A price-maker in the NR market; earnings highly affected by latex

earnings highly affected by latex prices

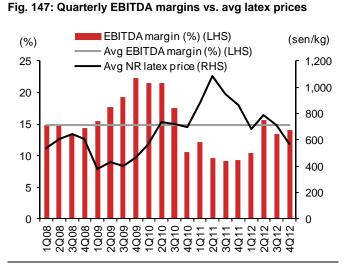
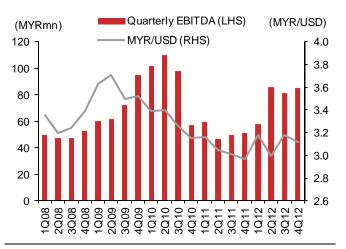


Fig. 148: Quarterly EBITDA vs. avg exchange rates



Source: Company data, Bloomberg, Nomura research

Source: Company data, Bloomberg, Nomura research

As industry-wide expansion unfolds, we believe that Top Glove will emerge as a less affected name as it already prices its products at the low end, implying that its goods should remain competitive without ASPs facing significant downward revision. Its product mix, which NR gloves still dominate, should also be advantageous to the group as competition in the nitrile (NBR) segment intensifies.

Top Glove's track record of relatively maintainable profits even in challenging operating conditions further prompts us to believe that the company should be able to manage the intense competition with its volumes, as well as product and customer diversity; in fact, when the industry was faced with an oversupply situation in 2001, Top Glove managed a 10.9% net profit margin, while Supermax and Kossan achieved only in the low/mid single-digit range.

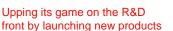
We believe that Top Glove will be less affected as competition intensifies given its low ASP, NR exposure, and track record in previous oversupply situations Top Glove's new strategy, according to management, is to co-operate with MNCs by allowing them to reserve production lines. Spending on R&D is also beginning to pay dividends, in our view, as the group sees itself closing the gap with peers on the technology front. It is also stepping up on product development, cost reduction and engineering efforts. Top Glove launched various new products at the MEDICA fair in Germany in November 2012; those products included chemotherapy nitrile gloves and hybrid gloves, among others. According to our Australian Healthcare Team, distributors such as Ansell like a wide product range, thus suggesting to us that Top Glove should benefit from these additional new products.

Recently, Top Glove has inked an investment deal with SAP Malaysia Sdn Bhd (not listed) and Brightree Solutions Sdn Bhd (not listed) which would enhance the company's competitive edge via enterprise-wide IT transformation. Management is confident that margins will improve in the long term; it expects that this move will also result in higher productivity and fewer errors.

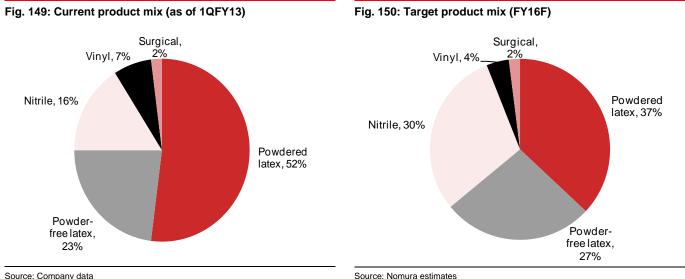
Going forward, it will continue focusing on its high-volume, low-margin strategy, which is in line with its long-term expansion plans which would see installed capacity triple in 15 years (as previously discussed).

#### Shedding some NR weight

Top Glove's leadership in the powdered and powder-free NR glove segments has worked well in the past, with the group being the world's single-largest glove manufacturer. It has seen ever-increasing revenue and profit since its 2001 listing - until NR latex prices shot up in 2010/11 and the company's revenue and profit slipped by 1.23% and 53.88% y-y respectively in FY11. Recognising the potential in the nitrile segment, all three factories in its one-year expansion pipeline will be dedicated to NBR gloves, according to management. Its target mix will be a somewhat more balanced 70:30, with its dominant NR products naturally taking the larger chunk. We estimate that Top Glove will be able to achieve its target mix by FY16F, assuming that 70% of its expansion contributes to the NBR segment. New production lines are, however, inter-changeable between different glove types, and the group intends to adjust its product mix according to market demand.



Product mix was largely skewed towards NR, thus has sufficient room to alter its exposure to different glove types



Source: Company data

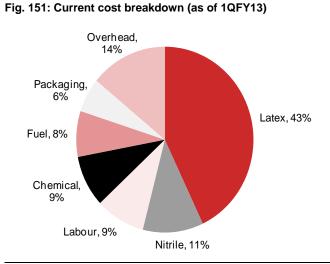
#### Significantly reduced exposure to latex prices

Expansion into the nitrile segment will see NBR's share in the product mix double. Top Glove's reduction in exposure to NR latex price fluctuations should also be the highest among the major players, we expect. As shown in the figures below, latex costs currently make up c.43% of the company's total costs, while nitrile's share is c.11%; this will

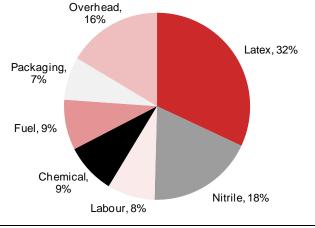
Not as susceptible to volatile latex prices moving forward

change substantially to 32% and 18% for NR latex and nitrile, respectively, upon achieving its target mix – according to our estimates.

With its current large exposure to NR raw material, Top Glove is set to be the main beneficiary of expected soft NR latex prices; we expect prices to remain low in the year ahead due to sufficient upcoming supply and the absence of short-term drivers to significantly boost the automotive industry.



#### Fig. 152: Cost breakdown upon achieving target mix (FY16F)



Source: Company data, Nomura estimates

Source: Nomura estimates

#### Upstream movement should help out (in the future)

The group is preparing itself to withstand any repeat of a latex price surge by acquiring 30,773 hectares of rubber plantation land in Indonesia; such should provide further support to its bottom line, we think. The company will have to clear the existing forest before the planting process, staged over 8 years, can begin; the first phase of the process is targeted to commence in October 2013. Upon full-tapping, contribution from its MYR450mn investment (including land, planting, facilities and maintenance cost) will supply 40% of its internal latex usage, on our estimates, providing the group with a more consistent supply of raw material. We appreciate that this vertical expansion hedges fluctuations in latex prices, but note that earnings contribution will not likely arrive before 2020F, we expect, as rubber trees typically take 6-7 years to mature.

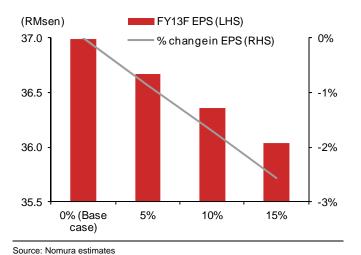
#### Minimum wage and automation

Labour makes up 9% of total costs; 6,500 of its 11,000 employees are paid below MYR900/month. With these workers being paid an average of c.MYR600/month, we estimate for an additional MYR23mn (c.1.2% of total cost) to be incurred per year, purely taking into consideration the country's implementation of a minimum wage policy. Nonetheless, less labour-intensive production will be achieved by installing robotic arms in the stripping and stacking processes. Management expects 40-50% lower reliance on human labour in these segments as a result. This will cost Top Glove up to MYR50mn over FY12 and FY13F, on our estimates, and should be offset by its savings from wages, which we estimate to be c.MYR33mn per year upon full automation, based on management guidance to reduce headcount by 20%. Combining the effects of the minimum wage policy and lesser reliance on labour, we expect total production cost savings of c.1.7%.

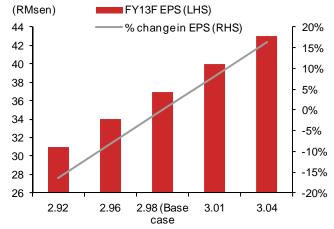
#### **Fuel costs**

As of current prices, it costs Top Glove roughly the same amount to run its natural gasand biomass-powered production facilities. Nonetheless, it has started to make use of biomass fuel since 2005, and new factories will rely on this energy source to a greater degree than natural gas. As of now, fuel makes up 8% of total costs, and 35% of this is attributed to the renewable energy source. Assuming an increase of MYR3/mmbtu every six months commences in July 2013, we estimate with an 80% pass-on rate, a 0.5% reduction in Top Glove's FY13F EPS as a result of a 3% increase in fuel cost for the Vertical integration to deal with latex price fluctuations; expect initial contribution to arrive only in 2020F financial year. Similarly, the same situation should see a 34% increase in fuel costs, translating into a 5.7% reduction in our estimates for FY14F EPS.

#### Fig. 153: FY13F EPS sensitivity to natural gas hikes



#### Fig. 154: FY13F EPS sensitivity to MYR/USD rates



Source: Nomura estimates

Note: Top Glove only hedges its Receivables

### Not dismissing M&A opportunities

Following its recent acquisition of GMP Medicare Sdn Bhd via internal funds, Top Glove is not discounting the possibility of more M&A deals in the future, which we believe could be easily supported with its strong net cash position. Management's view is that consolidation will be an industry-wide phenomenon as manufacturers begin to realise the potential synergistic benefits from such activities. Should Top Glove decide to acquire another company, such funds would be part of its planned MYR3bn capex, which is to be spread across 15 years, according to management.

We note Top Glove's acquisition track record, which saw the turnaround in its 2007 investment, Medi-Flex Limited. This previously loss-making business provides Top Glove with MYR22.5mn in remaining tax benefits, after recognition of MYR3.7mn in FY12 – an asset which should grant the group a lower effective tax rate for the upcoming years.

#### Initiating with a Neutral rating and a target price of MYR5.65

Top Glove is currently trading at 15.2x one-year forward P/E, in line with its long-term mean of 15.2x. We peg our FY13F EPS of 36.99sen to 15.2x P/E – above the market's three-year average forward P/E of 14.5x. We justify its premium P/E multiple relative to the KLCI as well as other peers by its high correlation with the market and historical P/Es which were generally similar to market levels, as well as its slightly higher valuations compared to peers in challenging operating environments. Its 50% dividend payout policy translates into yields of 3.3-3.7% in the three years ahead on our estimates – one of the highest across regional comparables (refer table below). In the past three years, the stock has traded at a 3% premium to the market's one-year forward P/E, on average. Other health-related companies in the region, which trade around the mid-teen level (refer table below), also make such P/E levels not unreasonable, in our view.

Strong net cash position to fund any upcoming M&A deals

Lower effective tax rate going forward from Medi-Flex tax benefits

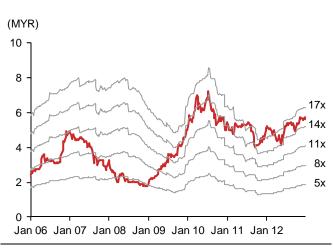
#### Fig. 155: P/Es and dividend yields of regional comparables

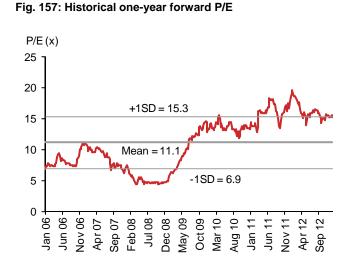
		P/E (x)		<u> </u>	Yield (%)	
Companies	CY12	CY13F	CY14F	CY12	CY13F	CY14F
Malaysian glove-makers						
Top Glove Corp	16.5	14.7	13.6	3.0	3.4	3.7
Supermax Corp	10.7	10.4	9.4	2.8	2.9	3.2
Kossan Rubber Industries	10.0	8.9	8.3	2.7	3.6	4.2
Hartalega Holdings	16.4	15.2	14.2	2.9	3.0	3.2
International glove-makers						
Ansell	14.5	12.6	11.2	2.4	2.6	2.9
Cardinal Health *	12.6	11.5	10.7	2.3	2.6	2.9
Kimberly-Clark Corp *	17.1	15.9	NA	3.4	3.6	NA
Semperit AG *	13.4	12.1	NA	2.4	2.6	NA
Sri-Trang Agro *	15.5	11.3	NA	1.8	2.5	NA
3M Co *	14.7	13.7	NA	2.5	2.6	NA
Other health-related						
Mani Inc *	18.3	17.2	16.4	1.8	1.9	1.9
Nipro Corp *	17.5	15.2	14.0	3.3	3.2	3.5
Shandong Weigao	25.4	21.1	NA	1.1	1.5	NA
Microport Scientific Corp *	13.2	NA	NA	1.7	NA	NA
Mindray Medical Intl Ltd-Adr *	20.0	16.5	NA	1.4	1.7	NA

Source: Nomura estimates, Bloomberg (for non-rated stocks; marked with \*), pricing as of 4 Jan 2013

We expect FY13F EPS to come in at 36.99sen, with assumptions of 1) steadily declining latex and nitrile prices – to be shared via lower ASPs of both glove types; 2) product mix skewing towards the NBR space; 3) improved margins on soft latex prices; and 4) utilisation improving from 72% to 75%.

Fig. 156: Historical P/E band chart





Source: Bloomberg, Nomura research

Source: Bloomberg, Nomura research

Our DCF-based intrinsic value of MYR5.71 per share serves as a cross-check for our P/E-derived target price. Our 10-year DCF assumes capex around MYR200mn, per management's intention of investing MYR3bn across fifteen years. We also assume a gradually increasing tax rate up to 25% as tax benefits run out. Our 10-year DCF valuation assumes a WACC of 8.8% and terminal growth of 2%, with cash flows discounted back to January 2013.

#### Fig. 158: Key model assumptions

Valuation assumptions	FY13F	FY14F	FY15F
MY R/USD	2.98	2.92	2.88
Capex (MYRmn)	226.67	226.67	166.67
Utilisation rate	72%	75%	75%
Depreciation rate	6.0%	6.0%	6.0%
Inflation rate	2.50%	2.50%	2.50%
ASP (USD per '000 pcs)			
- Latex (pow dered)	22.14	22.28	22.50
- Latex (pow der-free)	27.31	27.47	27.75
- Nitrile	27.24	26.39	26.04
- Vinyl	20.00	20.00	20.00
- Surgical	85.00	85.00	85.00
Avg latex price (RMsen/kg)	630	620	628
Avg grossed-up nitrile price (RMsen/kg)	614	609	615
Beta	1.06		
Risk-free rate	3.47%		
Risk premium	5.00%		
Terminal grow th rate	2.00%		
Discount rate (WACC)	8.76%		
DCF value per share (MYR)	5.71		

Source: Nomura estimates

#### Fig. 159: DCF intrinsic value sensitivity analysis

			Share Price S	Sensitivity Ana	lysis	
				WACC		
		7.5%	8.0%	8.5%	9.0%	9.5%
0	1%	6.49	5.98	5.54	5.16	4.82
rate	2%	7.22	6.58	6.03	5.57	5.17
vth	3%	8.28	7.41	6.70	6.11	5.61
Perpetual growth rate	4%	9.94	8.66	7.67	6.87	6.22
0,	5%	12.92	10.74	9.18	8.01	7.11

Source: Nomura estimates

#### Risks to our view

Upside risks to our view include: 1) stronger-than-expected demand from the Latin American and Asian markets, to which Top Glove has large exposure; and 2) synergistic acquisitions undertaken to contribute to cost-saving measures.

Downside risks include: 1) lower-than-expected ASPs as a result of pricing pressure from peers; 2) higher-than-expected NR latex prices; and 3) expansion coming in at a slower pace than the projected c.4.8bn pieces per year, limiting volume growth.

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## Appendix A-1

#### **Analyst Certification**

I, Celeste Yap, hereby certify (1) that the views expressed in this Research report accurately reflect my personal views about any or all of the subject securities or issuers referred to in this Research report, (2) no part of my compensation was, is or will be directly or indirectly related to the specific recommendations or views expressed in this Research report and (3) no part of my compensation is tied to any specific investment banking transactions performed by Nomura Securities International, Inc., Nomura International plc or any other Nomura Group company.

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#### Materially mentioned issuers

Issuer	Ticker	Price	Price date	Stock rating	Sector rating	Disclosures
Hartalega Holdings	HART MK	MYR 4.84	07-Jan-2013	Reduce	Not rated	
Kossan Rubber Industries	KRI MK	MYR 3.40	07-Jan-2013	Neutral	Not rated	
Supermax Corp Bhd	SUCB MK	MYR 2.04	07-Jan-2013	Reduce	Not rated	
Top Glove Corp	TOPG MK	MYR 5.67	07-Jan-2013	Neutral	Not rated	

#### **Top Glove Corp (TOPG MK)**

Rating and target price chart (three year history)

MYR 5.67 (07-Jan-2013) Neutral (Sector rating: Not rated)

Rating

Reduce

Neutral

Buy

Suspended

Target price Closing price

3.42

5.00

5.80

6.82

7.71

15.42

15.16

4.10

5.07

4.07

4.07

4.89

5.56

5.56

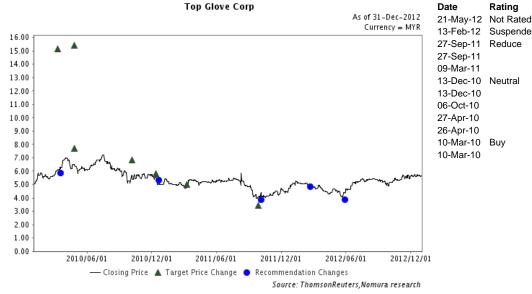
5.69

648

6.49

6.07

6 07



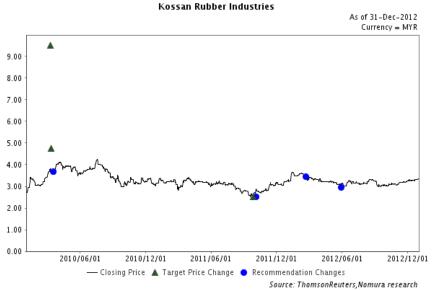
For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology We peg our FY13F EPS of 36.99sen to a 15.2x target multiple, its 3-year average, to arrive at our target price of MYR5.65. Our 10-year DCF valuation discounted back to January 2013 is based on a WACC of 8.8% and terminal growth of 2% and implies a fair value of MYR5.71.

Risks that may impede the achievement of the target price Upside risks to our view include 1) stronger-than-expected demand from the Latin American and Asian markets, to which Top Glove has large exposure; and 2) synergistic acquisitions undertaken to contribute to cost-saving measures. Downside risks include 1) lower-than-expected ASPs as a result of pricing pressure from peers; 2) higher-than-expected NR latex prices; and 3) expansion coming in at a slower pace than the projected c.4.8bn pieces per year, limiting volume growth.

#### Kossan Rubber Industries (KRI MK)

Rating and target price chart (three year history)



#### MYR 3.40 (07-Jan-2013) Neutral (Sector rating: Not rated)

Date	Rating	Target price	<b>Closing price</b>
21-May-12	Not Rated		3.09
13-Feb-12	Suspended		3.57
27-Sep-11	Neutral		2.65
27-Sep-11		2.51	2.65
12-Mar-10		4.76	3.74
10-Mar-10	Buy		3.80
10-Mar-10		9.51	3.80

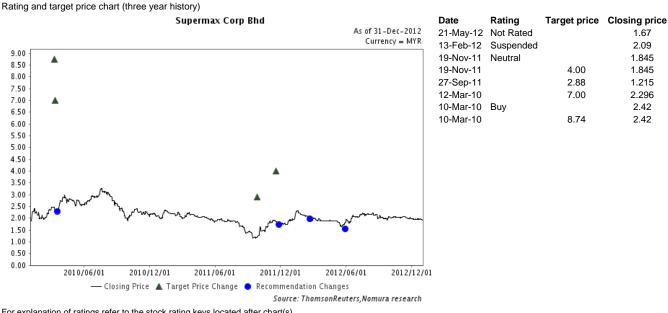
For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology We peg Kossan's FY13F EPS of 37.78sen to target one-year forward P/E of 10.0x, which is the sector average since 2007, arriving at target price of MYR3.80. Our 10-year DCF valuation discounted back to January 2013, using WACC of 7.0% and terminal growth of 2%, gives us a fair value of MYR4.06.

Risks that may impede the achievement of the target price Upside risks to our view include: 1) higher-than-expected passon rates, as we assume ASPs will be revised downwards amid increased competition; and 2) higher-than-expected earnings contribution from TRP segment from an improved automotive outlook or Indonesian venture which would lower labour costs. Downside risks to our view include: 1) the market not assigning a more attractive P/E valuation to the group despite potential higher top-line growth from its capacity expansions which were low-key in the past, as well as its strategy to dominate niche product segments; 2) an unexpected surge in latex prices, and; 3) expansion hiccups which would affect its penetration into higher-end segments.

#### Supermax Corp Bhd (SUCB MK)

MYR 2.04 (07-Jan-2013) Reduce (Sector rating: Not rated)



For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology We arrive at our target price of MYR1.90 by pegging FY13F EPS of 19.17sen to one-year forward P/E of 10.0x, which is the sector average since 2007. With a WACC of 9.0% and terminal growth of 2%, our 10-year DCF valuation discounted back to January 2013 provides a fair value of MYR1.77.

**Risks that may impede the achievement of the target price** Positive surprises to our view include 1) higher-than-expected pass-on rates from cost increases; and 2) faster-than-expected completion of new NBR lines which would see higher volumes in FY13F.

#### Hartalega Holdings (HART MK)

MYR 4.84 (07-Jan-2013) Reduce (Sector rating: Not rated)

Chart Not Available

**Valuation Methodology** Our target price of MYR4.15 is pegged to a one-year forward P/E of 12.8x, +1SD above its 3-year average, on FY14F EPS of 32.29sen. Our 10-year DCF valuation discounted back to January 2013 on a WACC of 7.6% and terminal growth of 2% provides fair value of MYR4.07.

**Risks that may impede the achievement of the target price** Upside risks to our view include 1) achievements of higher production line speed which boosts productivity alongside reduced costs; 2) sped-up NGC expansion plans, adding more capacity for the group; 3) higher-than-expected pass-on rates, as we assume ASP downward adjustment to its premium-priced products; and 4) lower-than-expected nitrile raw material prices.

#### Rating and target price changes

lssuer	Ticker	Old stock rating	New stock rating	Old target price	New target price
Hartalega Holdings	HART MK	Not rated	Reduce	N/A	MYR 4.15
Kossan Rubber Industries	KRI MK	Not rated	Neutral	N/A	MYR 3.80
Supermax Corp Bhd	SUCB MK	Not rated	Reduce	N/A	MYR 1.90
Top Glove Corp	TOPG MK	Not rated	Neutral	N/A	MYR 5.65

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### Explanation of Nomura's equity research rating system in Japan and Asia ex-Japan STOCKS

Stock recommendations are based on absolute valuation upside (downside), which is defined as (Target Price - Current Price) / Current Price, subject to limited management discretion. In most cases, the Target Price will equal the analyst's 12-month intrinsic valuation of the stock, based on an appropriate valuation methodology such as discounted cash flow, multiple analysis, etc. A '**Buy'** recommendation indicates that potential upside is 15% or more. A '**Neutral'** recommendation indicates that potential upside is less than 15% or downside is less than 5%. A '**Reduce'** recommendation indicates that potential downside is 5% or more. A rating of '**Suspended'** indicates that the rating and target price have been suspended temporarily to comply with applicable regulations and/or firm policies in certain circumstances including when Nomura is acting in an advisory capacity in a merger or strategic transaction involving the subject company. Securities and/or companies that are labelled as '**Not rated'** or shown as '**No rating'** are not in regular research coverage of the Nomura entity identified in the top banner. Investors should not expect continuing or additional information from Nomura relating to such securities and/or companies.

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