

Sunny Optical (2382 HK)

Shipment guidance lowered as expected; Awaiting market recovery

We maintain HOLD on the stock after its 1H22 earnings call. While we believe HLS/HCM shipment guidance cut is well anticipated, the implied 2H22 guidance suggested 1) 2H HLS shipment decline to worsen (-21% in 2H, vs -9% in 1H) and 2) 2H HCM GPM to deteriorate (9% in 2H, vs 11.6% in 1H). However, we also see potential upside in iPhone HLS, AR/VR and auto modules in 2H22E: 1) HLS share gain on iPhone 14 launch; 2) auto lens/module to accelerate in 2H22E; and 3) AR/VR to post 50% YoY revenue growth in 2022. We trimmed FY22-24E EPS by 11-22% to reflect lower ASP/shipment and GPM in 2H22E. Our new EPS are 27-35% below consensus. Trading at 41.6x/28.2x FY22/23E P/E, we think the stock is fairly valued. Maintain HOLD with lowered SOTP-based TP of HK\$102.3.

- 2022 shipment guidance lowered as expected.** Mgmt. guided 1) 2022 HLS down 15% YoY (vs. +5-10% YoY prior), implying decline to worsen in 2H22E; 2) 2022 HCM down 20% YoY (vs. +10-15% YoY prior), implying YoY decline to stabilise in 2H22E; 3) VLS up 10-15% YoY, (vs. +20-30% YoY prior), implying accelerated growth in 2H22E. Overall, we expect Android's ongoing destocking will continue to drag HCM/HLS shipment in 2H22E, while iPhone 14 order pull-in will partly offset HLS weakness in 2H22E.
- Robust outlook for AR/VR and auto lens/cam module.** Mgmt. guided for RMB3bn capex, with RMB1bn for AR/VR/Auto lens/LiDAR and RMB0.3bn for auto lens capacity expansion. For AR/VR, mgmt. expected more potential in VR products in the short term as AR products remain non-commercialised. Mgmt. maintained 50% YoY revenue growth for VR/AR segment in 2022. For auto business, mgmt. is positive on auto lens ASP upside given pixel upgrade, and also guided for RMB10bn revenue for auto camera module thanks to increasing order wins of LiDAR/AU-HUD products.
- Valuation/Key risks.** While we are positive on Sunny's product roadmap and technology leadership, Sunny's high exposure to handset segment (79% of sales, vs 8% for auto-related) will continue to weigh on earnings amid smartphone slowdown and macro uncertainties in 2H22E. Trading at 41.6x/28.2x FY22/23E P/E, we think the stock is fairly valued. Maintain HOLD with new SOTP-based TP of HK\$102.3 (23.0x FY23E P/E).

Earnings Summary

(YE 31 Dec)	FY20A	FY21A	FY22E	FY23E	FY24E
Revenue (RMB mn)	38,001.8	37,496.9	34,253.3	39,141.3	44,853.4
YoY growth (%)	0.4%	(1.3%)	(8.7%)	14.3%	14.6%
Net profit (RMB mn)	4,950.3	5,061.1	2,781.6	4,109.3	4,925.0
YoY growth (%)	23.2%	2.2%	(45.0%)	47.7%	19.9%
EPS (Reported)(RMB)	4.5	4.6	2.5	3.7	4.4
Consensus EPS (RMB)	0.0	4.6	3.9	5.1	6.1
P/E (x)	25.5	38.3	41.6	28.2	23.5
P/B (x)	7.4	9.2	4.9	4.3	3.7
Yield (%)	0.6%	0.5%	0.5%	0.7%	0.8%
ROE (%)	29.0%	23.9%	11.8%	15.2%	15.9%
Net gearing (%)	(4.6%)	(19.5%)	(20.0%)	(21.8%)	(30.4%)

Source: Company data, Bloomberg, CMBIGM estimates

HOLD (Maintain)

Target Price **HK\$102.30**
 (Previous TP) HK\$108.6
Up/Downside **(15.1%)**
Current Price **HK\$120.50**

China Technology

Alex NG

(852) 3900 0881
alexng@cmbi.com.hk

Lily YANG, Ph.D

(852) 3916 3716
lilyyang@cmbi.com.hk

Hanqing LI

lihanqing@cmbi.com.hk

Stock Data

Mkt Cap (HK\$ mn)	132,188.5
Avg 3 mths t/o (HK\$ mn)	115.0
52w High/Low (HK\$)	252.60/95.30
Total Issued Shares (mn)	1097.0

Source: FactSet

Shareholding Structure

Sun Xu Ltd	35.5%
JP Morgan Chase & Co	4.9%

Source: HKEx

Share Performance

	Absolute	Relative
1-mth	11.3%	13.9%
3-mth	21.5%	22.2%
6-mth	-37.4%	-22.0%

Source: FactSet

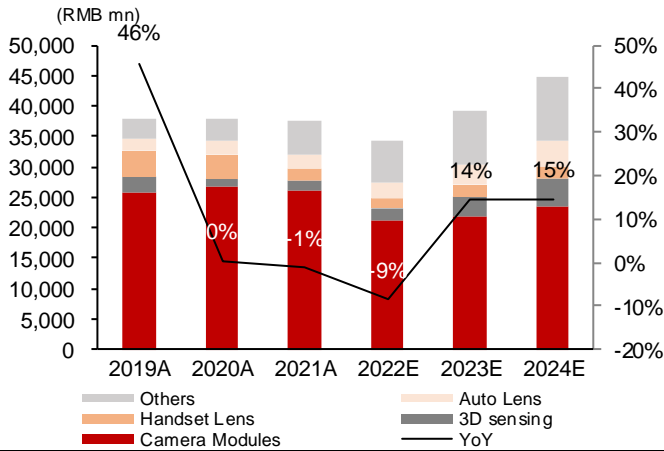
12-mth Price Performance



Source: FactSet

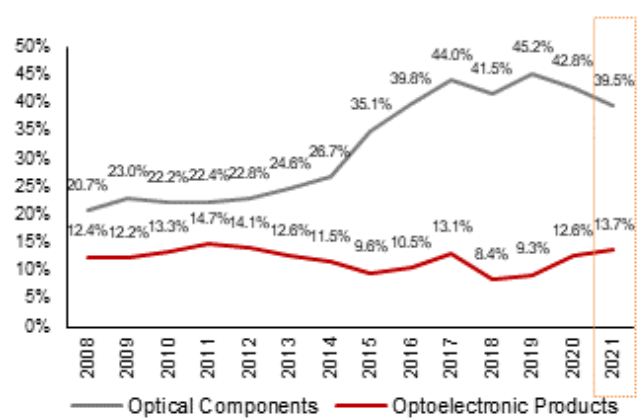
Focus Charts

Figure 1: Sunny Optical revenue trend



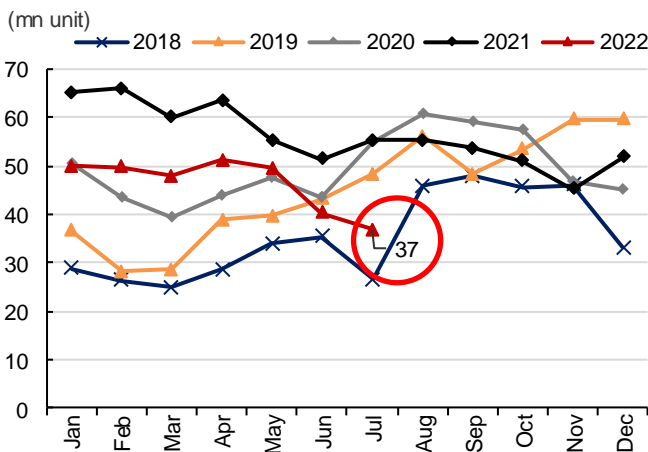
Source: Company data, CMBIGM estimates

Figure 2: Sunny Optical GPM trend



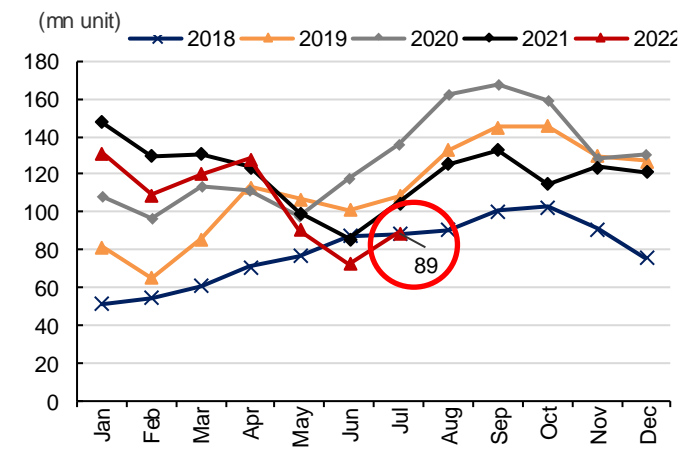
Source: Company data, CMBIGM estimates

Figure 3: Sunny HCM shipment trend



Source: Company data, CMBIGM estimates

Figure 4: Sunny HLS shipment trend



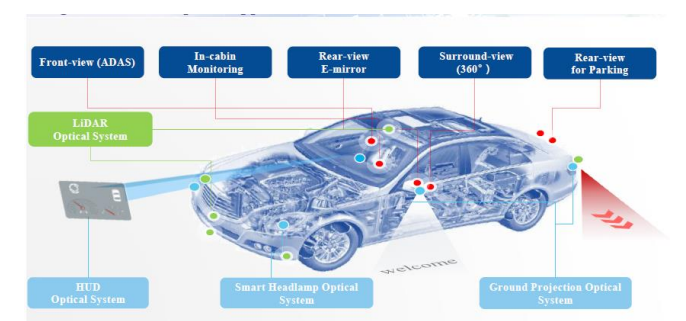
Source: Company data, CMBIGM estimates

Figure 5: Sunny next-gen handset camera products



Source: Company data, CMBIGM estimates

Figure 6: Sunny opportunities in vehicle cameras



Source: Counterpoint, CMBIGM estimates

1H22 Review:

Figure 7: 1H22 Result Review

RMB mn	2H20	1H21	2H21	1H22	YoY	CMBI		Consensus	
						1H22E	Diff (%)	1H22E	Diff (%)
Revenue	19,138	19,833	17,663	16,972	-14%	15,435	10%	17,620	-4%
Gross profit	5,022	4,946	3,790	3,522	-29%	3,351	5%	3,642	-3%
Operating profit	3,630	3,345	2,506	1,798	-46%	1,865	-4%	1,948	-8%
Net profit	3,133	2,688	2,305	1,358	-49%	1,466	-7%	1,612	-16%
EPS (RMB)	2.86	2.46	2.11	1.24	-50%	1.34	-7%	1.58	-21%
Gross margin	26.2%	24.9%	21.5%	20.8%	-4.2 ppt	21.7%	-1 ppt	20.7%	0.1 ppt
Operating margin	19.0%	16.9%	14.2%	10.6%	-6.3 ppt	12.1%	-1.5 ppt	11.1%	-0.5 ppt
Net margin	16.4%	13.6%	13.1%	8.0%	-5.6 ppt	9.5%	-1.5 ppt	9.2%	-1.1 ppt

Source: Company data, CMBIGM estimates

Figure 8: P&L breakdown

RMB mn	2H20	1H21	2H21	1H22	CMBI		Consensus	
					1H22E	Diff	1H22E	Diff
Revenue	19,138	19,833	17,663	16,972	15,435	10.0%	17,620	-3.7%
...YoY	-14.1%	5.1%	-7.7%	-14.4%	-22.2%		-11.2%	
Cost of sales	(14,116)	(14,887)	(13,874)	(13,449)	(12,084)			
Gross profit	5,022	4,946	3,790	3,522	3,351	5.1%	3,642	-3.3%
GPM (%)	26.2%	24.9%	21.5%	20.8%	21.7%		20.7%	
...YoY	2.8%	34.5%	-24.5%	-28.8%	-32.3%		-26.4%	
SG&A	(563)	(533)	(499)	(601)	(420)			
...% of rev	-2.9%	-2.7%	-2.8%	-3.5%	(0)			
R&D	(1,431)	(1,321)	(1,321)	(1,468)	(1,019)			
...% of rev	-7.5%	-6.7%	-7.5%	-8.7%	(0)			
Other Gain&Loss	590	252	537	353	(47)			
Operating profit	3,630	3,345	2,506	1,798	1,865	-3.6%	1,948	-7.7%
OPM (%)	19.0%	16.9%	14.2%	10.6%	12.1%		11.1%	
...YoY	20.3%	48.9%	-31.0%	-46.3%	-44.3%		-41.8%	
Net profit	3,133	2,688	2,305	1,358	1,466	-7.4%	1,612	-15.8%
NPM (%)	16.4%	13.6%	13.1%	8.0%	9.5%		9.2%	
...YoY	22.4%	53.7%	-26.4%	-49.5%	-45.5%		-40.0%	

Source: Company data, CMBIGM estimates

Earnings Revision

Figure 9: CMBIGM earnings revisions

RMB mn	New			Old			Change (%)		
	FY22E	FY23E	FY24E	FY22E	FY23E	FY24E	FY22E	FY23E	FY24E
Revenue	34,253	39,141	44,853	31,850	35,449	42,940	8%	10%	4%
Gross profit	6,777	8,191	9,622	7,003	8,038	10,059	-3%	2%	-4%
Operating profit	3,463	4,903	5,855	4,275	5,156	6,568	-19%	-5%	-11%
Net profit	2,731	4,035	4,836	3,496	4,244	5,444	-22%	-5%	-11%
EPS (RMB)	2.50	3.69	4.43	3.20	3.88	4.98	-22%	-5%	-11%
Gross margin	19.8%	20.9%	21.5%	22.0%	22.7%	23.4%	-2.2 ppt	-1.8 ppt	-1.9 ppt
Operating margin	10.1%	12.5%	13.1%	13.4%	14.5%	15.3%	-3.3 ppt	-2 ppt	-2.2 ppt
Net margin	8.0%	10.3%	10.8%	11.0%	12.0%	12.7%	-3 ppt	-1.7 ppt	-1.9 ppt

Source: Company data, CMBIGM estimates

Figure 10: CMBIGM estimates vs consensus

RMB mn	CMBIGM			Consensus			Diff (%)		
	FY22E	FY23E	FY24E	FY22E	FY23E	FY24E	FY22E	FY23E	FY24E
Revenue	34,253	39,141	44,853	37,649	43,882	49,928	-9%	-11%	-10%
Gross profit	6,777	8,191	9,622	8,233	10,087	12,037	-18%	-19%	-20%
Operating profit	3,463	4,903	5,855	4,588	5,936	7,469	-25%	-17%	-22%
Net profit	2,731	4,035	4,836	4,308	5,576	6,694	-37%	-28%	-28%
EPS (RMB)	2.50	3.69	4.43	3.87	5.09	6.14	-35%	-27%	-28%
Gross margin	19.8%	20.9%	21.5%	21.9%	23.0%	24.1%	-2.1 ppt	-2.1 ppt	-2.7 ppt
Operating margin	10.1%	12.5%	13.1%	12.2%	13.5%	15.0%	-2.1 ppt	-1 ppt	-1.9 ppt
Net margin	8.0%	10.3%	10.8%	11.4%	12.7%	13.4%	-3.5 ppt	-2.4 ppt	-2.6 ppt

Source: Bloomberg, CMBIGM estimates

Figure 11: P&L forecast

RMB mn	FY20	FY21	1H22	2H22E	FY22E	FY23E	FY24E
Revenue	38,002	37,497	16,972	17,282	34,253	39,141	44,853
...YoY	0.4%	-1.3%	-14.4%	-2.2%	-8.7%	14.3%	14.6%
Cost of sales	(29,304)	(28,761)	(13,449)	(14,027)	(27,476)	(30,950)	(35,231)
Gross profit	8,698	8,736	3,522	3,255	6,777	8,191	9,622
GPM (%)	22.9%	23.3%	20.8%	18.8%	19.7%	20.9%	21.5%
...YoY	12.2%	0.4%	-28.8%	-14.1%	-22.4%	20.9%	17.5%
SG&A	(1,032)	(1,032)	(601)	(570)	(1,172)	(1,096)	(1,256)
...% of rev	-2.7%	-2.8%	-3.5%	-3.3%	-3.4%	-2.8%	-2.8%
R&D	(2,499)	(2,642)	(1,468)	(1,469)	(2,937)	(2,857)	(3,274)
...% of rev	-6.6%	-7.0%	-8.7%	-8.5%	-8.6%	-7.3%	-7.3%
Other gain & loss	698	252	698	252	537	449	-
Operating profit	5,877	5,851	1,798	1,665	3,463	4,903	5,855
OPM (%)	15.5%	15.6%	10.6%	9.6%	10.1%	12.5%	13.1%
...YoY	22.3%	-0.4%	-46.3%	-33.6%	-40.8%	41.6%	19.4%
Net profit	4,882	4,993	1,358	1,373	2,731	4,035	4,836
NPM (%)	12.8%	13.3%	8.0%	7.9%	8.0%	10.3%	10.8%
...YoY	22.3%	2.3%	-49.5%	-40.4%	-45.3%	47.7%	19.9%

Source: Company data, CMBIGM estimates

Figure 12: Major assumptions

	FY20	FY21	FY22E	FY23E	FY24E
Shipment volume (mn unit)					
Optical Components					
Handset lens sets	1,530	1,440	1,222	1,345	1,479
...YoY(%)	14%	-6%	-15%	10%	10%
Vehicle lens sets	56	68	77	92	111
...YoY(%)	12%	21%	13%	20%	20%
Optoelectronic Products					
Handset camera modules	593	674	539	578	636
...YoY(%)	10%	14%	-20%	7%	10%
Other optoelectronic (3D sensing)	41	59	70	101	146
...YoY(%)	-18%	45%	18%	45%	45%
Optical Instruments					
Microscopic instruments	195	258	287	316	348
...YoY(%)	-1%	32%	11%	10%	10%
Revenue (RMB mn)					
Optical Components	9,181	8,776	9,788	12,154	14,186
Optoelectronic Products	28,494	28,334	24,135	26,678	30,327
Optical instruments	326	387	330	310	341
Total Revenue	38,002	37,497	34,253	39,141	44,853
...YoY(%)	0.4%	-1.3%	-8.7%	14.3%	14.6%
Gross Margin					
Optical Components	42.8%	39.5%	34.7%	35.0%	35.0%
Optoelectronic products	12.6%	13.7%	10.3%	11.2%	11.9%
Optical instruments	39.2%	45.1%	45.1%	45.5%	45.5%

Source: Company data, CMBIGM estimates

Valuation

Maintain HOLD with new TP of HK\$102.3

We maintain HOLD with lowered TP of HK\$102.3. We derived our 12-month TP from SOTP valuation methodology and our TP is based on weighted-average target P/E multiple of 23.0x FY23E EPS, in order to reflect 1) Sunny's diversification in multiple businesses with different growth profiles, and 2) visibility of product upcycles across different segments.

We assign 15x P/E to its CCM business to reflect its China No.1 position, product upcycle and advanced technology capacity. We assign 35x P/E for its vehicle lens business to reflect the high-margin and high-growth industry nature of vehicle lens (25% CAGR FY20-23E) and Sunny's No.1 global market share. We apply a 25x P/E to its handset lens segment given secular upgrade trend and continued share gains from peers.

Figure 13: Sunny Optical – SOTP valuation

Business segment	% of FY23E Profit	FY23E EPS (RMB)	Target P/E
Camera modules	36.6%	1.35	15x
Handset lenses	45.3%	1.67	25x
Vehicle lenses	16.5%	0.61	35x
Others	1.6%	0.06	25x
Total (RMB) /Implied P/E		3.69	23.0x
TP (HK\$)			102.3

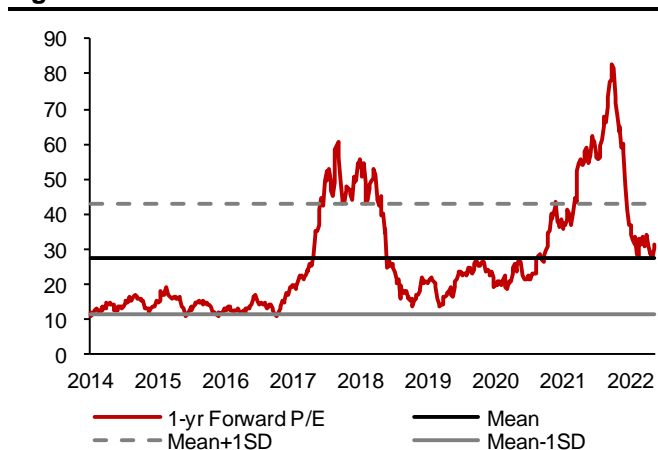
Sources: Company data, CMBIGM estimates

Figure 14: Peers' valuation

Company	Ticker	Rating	Market Cap (US\$ mn)	Price (LC)	TP (LC)	Up/Down -side	P/E (x)		P/B (x)		ROE (%)	
							FY22E	FY23E	FY22E	FY23E	FY22E	FY23E
Sunny Optical	2382 HK	HOLD	16,856	120.5	102.3	-15%	43.2	29.3	5.1	4.5	11.8	15.3
Q tech	1478 HK	BUY	775	5.1	5.6	9%	20.0	9.8	1.1	1.0	5.5	10.3
Cowell	1415 HK	NR	1,876	17.60	NA	NA	25.2	18.7	4.5	3.7	20.3	23.2
Truly	732 HK	NR	715	1.71	NA	NA	4.3	3.5	0.5	0.4	10.6	12.4
Catcher	2474 TT	NR	4,319	177.50	NA	NA	14.9	16.6	0.8	0.8	5.6	4.8
Largan	3008 TT	NR	9,368	2105.00	NA	NA	14.3	16.0	1.8	1.7	13.3	11.5
Lite-on	2301 TT	NR	5,268	67.20	NA	NA	11.1	10.0	2.1	2.0	18.4	19.4
Primax	4915 TT	NR	1,041	68.60	NA	NA	11.0	9.8	1.9	1.7	17.4	17.6
O-film	002456 CH	NR	2,999	6.25	NA	NA	-	520.8	2.6	2.5	(11.4)	(1.6)
Average							18.0	70.5	2.3	2.1	10.2	12.5

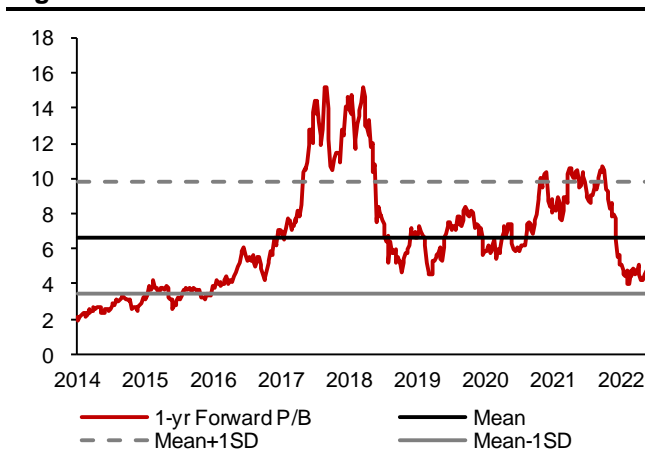
Source: Bloomberg, CMBIGM estimates

Figure 15: 12M forward P/E band



Source: Bloomberg, CMBIGM estimates

Figure 16: 12M forward P/B band



Source: Bloomberg, CMBIGM estimates

Financial Summary

INCOME STATEMENT	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec (RMB mn)						
Revenue	37,849	38,002	37,497	34,253	39,141	44,853
Cost of goods sold	(30,098)	(29,304)	(28,761)	(27,476)	(30,950)	(35,231)
Gross profit	7,751	8,698	8,736	6,777	8,191	9,622
Selling expense	(279)	(313)	(274)	(302)	(313)	(359)
Admin expense	(650)	(719)	(758)	(870)	(783)	(897)
R&D expense	(2,209)	(2,499)	(2,642)	(2,937)	(2,857)	(3,274)
Others	205	698	789	802	665	763
Operating profit	4,806	5,877	5,851	3,463	4,903	5,855
Share of (losses)/profits of associates	(6)	0	19	20	20	20
Net Interest income/(Expense)	(250)	(224)	(230)	(240)	(264)	(291)
Pre-tax profit	4,550	5,653	5,640	3,242	4,659	5,584
Income tax	(531)	(703)	(579)	(461)	(550)	(659)
Net profit	4,019	4,950	5,061	2,782	4,109	4,925
Minority interest	28	68	68	50	74	89
Net profit to shareholders	3,991	4,882	4,993	2,731	4,035	4,836
Net dividends	623	799	974	533	787	943
BALANCE SHEET	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec (RMB mn)						
Current assets	22,446	25,630	27,989	26,724	33,572	35,136
Cash & equivalents	1,917	2,842	5,605	6,861	8,004	11,480
Account receivables	9,630	8,212	7,448	6,857	9,490	9,243
Inventories	5,146	5,783	5,482	3,551	6,624	4,959
ST bank deposits	21	238	1,112	1,112	1,112	1,112
Financial assets at FVTPL	5,663	8,480	8,314	8,314	8,314	8,314
Other current assets	69	74	28	28	28	28
Non-current assets	8,247	9,809	10,785	12,009	12,990	13,675
PP&E	6,567	7,513	8,303	9,550	10,497	11,144
Other non-current assets	1,680	2,295	2,481	2,459	2,492	2,531
Total assets	30,693	35,438	38,774	38,733	46,561	48,811
Current liabilities	12,630	13,411	11,873	9,584	14,090	12,358
Short-term borrowings	1,119	2,071	1,539	1,539	1,539	1,539
Account payables	11,322	10,733	9,869	7,596	12,077	10,317
Other current liabilities	5,622	9,223	15,493	20,015	18,856	24,598
Non-current liabilities	5,336	5,201	6,005	6,005	6,005	6,005
Long-term borrowings	0	0	700	700	700	700
Other non-current liabilities	5,336	5,201	5,305	5,305	5,305	5,305
Total liabilities	17,967	18,612	17,879	15,589	20,095	18,363
Share capital	105	105	105	105	105	105
Other reserves	12,448	16,492	20,483	22,681	25,929	29,822
Total shareholders equity	12,726	16,826	20,895	23,144	26,466	30,448
Minority interest	173	229	307	357	432	521
Total equity and liabilities	30,693	35,438	38,774	38,733	46,561	48,811
CASH FLOW	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec (RMB mn)						
Operating						
Profit before taxation	4,550	5,643	5,640	3,242	4,659	5,584
Depreciation & amortization	1,227	1,570	1,638	1,753	2,053	2,353
Change in working capital	(1,477)	115	200	248	(1,224)	152
Others	361	(168)	(499)	(215)	(294)	(379)
Net cash from operations	4,662	7,160	6,979	5,029	5,194	7,710

Investing						
Capital expenditure	(2,760)	(2,271)	(2,498)	(3,000)	(3,000)	(3,000)
Others	(796)	(3,705)	5,400	0	0	0
Net cash from investing	(3,556)	(5,976)	2,902	(3,000)	(3,000)	(3,000)
Financing						
Dividend paid	(623)	(796)	(974)	(533)	(787)	(943)
Net borrowings	(382)	1,017	0	0	0	0
Share repurchases	(170)	(151)	0	0	0	0
Others	(266)	(291)	2,215	(240)	(264)	(291)
Net cash from financing	(1,441)	(222)	1,241	(773)	(1,051)	(1,234)
Net change in cash						
Cash at the beginning of the year	2,254	1,917	2,842	5,605	6,861	8,004
Exchange difference	(2)	(37)	(8,358)	0	0	0
Cash at the end of the year	1,917	2,842	5,605	6,861	8,004	11,480
GROWTH	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec						
Revenue	46.0%	0.4%	(1.3%)	(8.7%)	14.3%	14.6%
Gross profit	57.8%	12.2%	0.4%	(22.4%)	20.9%	17.5%
Operating profit	56.2%	22.3%	(0.4%)	(40.8%)	41.6%	19.4%
Net profit	60.0%	23.2%	2.2%	(45.0%)	47.7%	19.9%
PROFITABILITY	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec						
Gross profit margin	20.5%	22.9%	23.3%	19.8%	20.9%	21.5%
Operating margin	12.7%	15.5%	15.6%	10.1%	12.5%	13.1%
Net profit margin	10.5%	12.8%	13.3%	8.0%	10.3%	10.8%
Return on assets (ROA)	13.0%	13.8%	12.9%	7.1%	8.7%	9.9%
Return on equity (ROE)	31.4%	29.0%	23.9%	11.8%	15.2%	15.9%
GEARING/LIQUIDITY/ACTIVITIES	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec						
Net debt to equity (x)	(0.1)	(0.0)	(0.2)	(0.2)	(0.2)	(0.3)
Current ratio (x)	1.8	1.9	2.4	2.8	2.4	2.8
Receivable turnover days	76.5	85.7	76.2	76.2	76.2	76.2
Inventory turnover days	49.8	68.1	68.1	60.0	60.0	60.0
Payable turnover days	111.5	137.4	137.4	116.0	116.0	116.0
VALUATION	2019A	2020A	2021A	2022E	2023E	2024E
YE 31 Dec						
P/E	24.0	25.5	38.3	41.6	28.2	23.5
P/B	7.4	7.4	9.2	4.9	4.3	3.7
Div yield (%)	0.6%	0.6%	0.5%	0.5%	0.7%	0.8%
EV	12,726.2	16,826.1	20,895.3	23,144.1	26,466.3	30,448.0
EV/Sales	0.3	0.4	0.6	0.7	0.7	0.7

Note: The calculation of net cash includes financial assets. Source: Company data, CMBIGM estimates

Disclosures & Disclaimers

Analyst Certification

The research analyst who is primary responsible for the content of this research report, in whole or in part, certifies that with respect to the securities or issuer that the analyst covered in this report: (1) all of the views expressed accurately reflect his or her personal views about the subject securities or issuer; and (2) no part of his or her compensation was, is, or will be, directly or indirectly, related to the specific views expressed by that analyst in this report.

Besides, the analyst confirms that neither the analyst nor his/her associates (as defined in the code of conduct issued by The Hong Kong Securities and Futures Commission) (1) have dealt in or traded in the stock(s) covered in this research report within 30 calendar days prior to the date of issue of this report; (2) will deal in or trade in the stock(s) covered in this research report 3 business days after the date of issue of this report; (3) serve as an officer of any of the Hong Kong listed companies covered in this report; and (4) have any financial interests in the Hong Kong listed companies covered in this report.

CMBIGM Ratings

BUY : Stock with potential return of over 15% over next 12 months
HOLD : Stock with potential return of +15% to -10% over next 12 months
SELL : Stock with potential loss of over 10% over next 12 months
NOT RATED : Stock is not rated by CMBIGM

OUTPERFORM : Industry expected to outperform the relevant broad market benchmark over next 12 months
MARKET-PERFORM : Industry expected to perform in-line with the relevant broad market benchmark over next 12 months
UNDERPERFORM : Industry expected to underperform the relevant broad market benchmark over next 12 months

CMB International Global Markets Limited

Address: 45/F, Champion Tower, 3 Garden Road, Hong Kong, Tel: (852) 3900 0888 Fax: (852) 3900 0800

CMB International Global Markets Limited ("CMBIGM") is a wholly owned subsidiary of CMB International Capital Corporation Limited (a wholly owned subsidiary of China Merchants Bank)

Important Disclosures

There are risks involved in transacting in any securities. The information contained in this report may not be suitable for the purposes of all investors. CMBIGM does not provide individually tailored investment advice. This report has been prepared without regard to the individual investment objectives, financial position or special requirements. Past performance has no indication of future performance, and actual events may differ materially from that which is contained in the report. The value of, and returns from, any investments are uncertain and are not guaranteed and may fluctuate as a result of their dependence on the performance of underlying assets or other variable market factors. CMBIGM recommends that investors should independently evaluate particular investments and strategies, and encourages investors to consult with a professional financial advisor in order to make their own investment decisions.

This report or any information contained herein, have been prepared by the CMBIGM, solely for the purpose of supplying information to the clients of CMBIGM or its affiliate(s) to whom it is distributed. This report is not and should not be construed as an offer or solicitation to buy or sell any security or any interest in securities or enter into any transaction. Neither CMBIGM nor any of its affiliates, shareholders, agents, consultants, directors, officers or employees shall be liable for any loss, damage or expense whatsoever, whether direct or consequential, incurred in relying on the information contained in this report. Anyone making use of the information contained in this report does so entirely at their own risk.

The information and contents contained in this report are based on the analyses and interpretations of information believed to be publicly available and reliable. CMBIGM has exerted every effort in its capacity to ensure, but not to guarantee, their accuracy, completeness, timeliness or correctness. CMBIGM provides the information, advices and forecasts on an "AS IS" basis. The information and contents are subject to change without notice. CMBIGM may issue other publications having information and/ or conclusions different from this report. These publications reflect different assumption, point-of-view and analytical methods when compiling. CMBIGM may make investment decisions or take proprietary positions that are inconsistent with the recommendations or views in this report.

CMBIGM may have a position, make markets or act as principal or engage in transactions in securities of companies referred to in this report for itself and/or on behalf of its clients from time to time. Investors should assume that CMBIGM does or seeks to have investment banking or other business relationships with the companies in this report. As a result, recipients should be aware that CMBIGM may have a conflict of interest that could affect the objectivity of this report and CMBIS will not assume any responsibility in respect thereof. This report is for the use of intended recipients only and this publication, may not be reproduced, reprinted, sold, redistributed or published in whole or in part for any purpose without prior written consent of CMBIGM.

Additional information on recommended securities is available upon request.

For recipients of this document in the United Kingdom

This report has been provided only to persons (I) falling within Article 19(5) of the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005 (as amended from time to time) ("The Order") or (II) are persons falling within Article 49(2) (a) to (d) ("High Net Worth Companies, Unincorporated Associations, etc.") of the Order, and may not be provided to any other person without the prior written consent of CMBIGM.

For recipients of this document in the United States

CMBIGM is not a registered broker-dealer in the United States. As a result, CMBIGM is not subject to U.S. rules regarding the preparation of research reports and the independence of research analysts. The research analyst who is primary responsible for the content of this research report is not registered or qualified as a research analyst with the Financial Industry Regulatory Authority ("FINRA"). The analyst is not subject to applicable restrictions under FINRA Rules intended to ensure that the analyst is not affected by potential conflicts of interest that could bear upon the reliability of the research report. This report is intended for distribution in the United States solely to "major US institutional investors", as defined in Rule 15a-6 under the US, Securities Exchange Act of 1934, as amended, and may not be furnished to any other person in the United States. Each major US institutional investor that receives a copy of this report by its acceptance hereof represents and agrees that it shall not distribute or provide this report to any other person. Any U.S. recipient of this report wishing to effect any transaction to buy or sell securities based on the information provided in this report should do so only through a U.S.-registered broker-dealer.

For recipients of this document in Singapore

This report is distributed in Singapore by CMBI (Singapore) Pte. Limited (CMBISG) (Company Regn. No. 201731928D), an Exempt Financial Adviser as defined in the Financial Advisers Act (Cap. 110) of Singapore and regulated by the Monetary Authority of Singapore. CMBISG may distribute reports produced by its respective foreign entities, affiliates or other foreign research houses pursuant to an arrangement under Regulation 32C of the Financial Advisers Regulations. Where the report is distributed in Singapore to a person who is not an Accredited Investor, Expert Investor or an Institutional Investor, as defined in the Securities and Futures Act (Cap. 289) of Singapore, CMBISG accepts legal responsibility for the contents of the report to such persons only to the extent required by law. Singapore recipients should contact CMBISG at +65 6350 4400 for matters arising from, or in connection with the report.