



煤氣
Towngas



The Hong Kong & China Gas Co. Ltd. (3 HK)

incorporated

Towngas China Co. Ltd. (1083 HK)

2020 Interim Results

17 August 2020



Disclaimer

This presentation and subsequent discussion may contain certain forward-looking statements. These forward-looking statements reflect the company's view on some future events and involve known and unknown risks and uncertainties and other factors which may cause actual performance and development differ materially. Past performance cannot be relied on as a guide for future performance.



Group Financial

1H2020 Operating Profit After Tax



Hong Kong (HC)

Mainland Utilities (MU)

New Energy (NE)

HK\$1,695Mn

HK\$1,755Mn

HK\$67Mn

+ 1%

- 17%

- 25%

Gas volume -3.9%
Effective cost savings

City-gas volume -4%
Rmb depreciated 4.5%
New Connection -31% due to lockdown

Depressed commodity price
Sino-US Trade Relation

OPAT HK\$3,517Mn -9%

2020 Interim Results

The Hong Kong & China Gas (3 HK)



(HK\$ Mn)	1H 2020	1H 2019	Change
Revenue	18,235	20,352	-10%
Operating Profit	3,517	3,883	-9%
Provisions for Assets	(547)	(131)	
IFC Revaluation Gain/(Loss)	(303)	137	N/A
	(850)	6	
Profit Attributable to Shareholders	2,667	3,889	-31%
Earnings per Share	HK 15.0 cents	HK 21.9 cents	-31%
Interim dividends per Share	HK 12 cents	HK 12 cents	-

2020 Interim Results

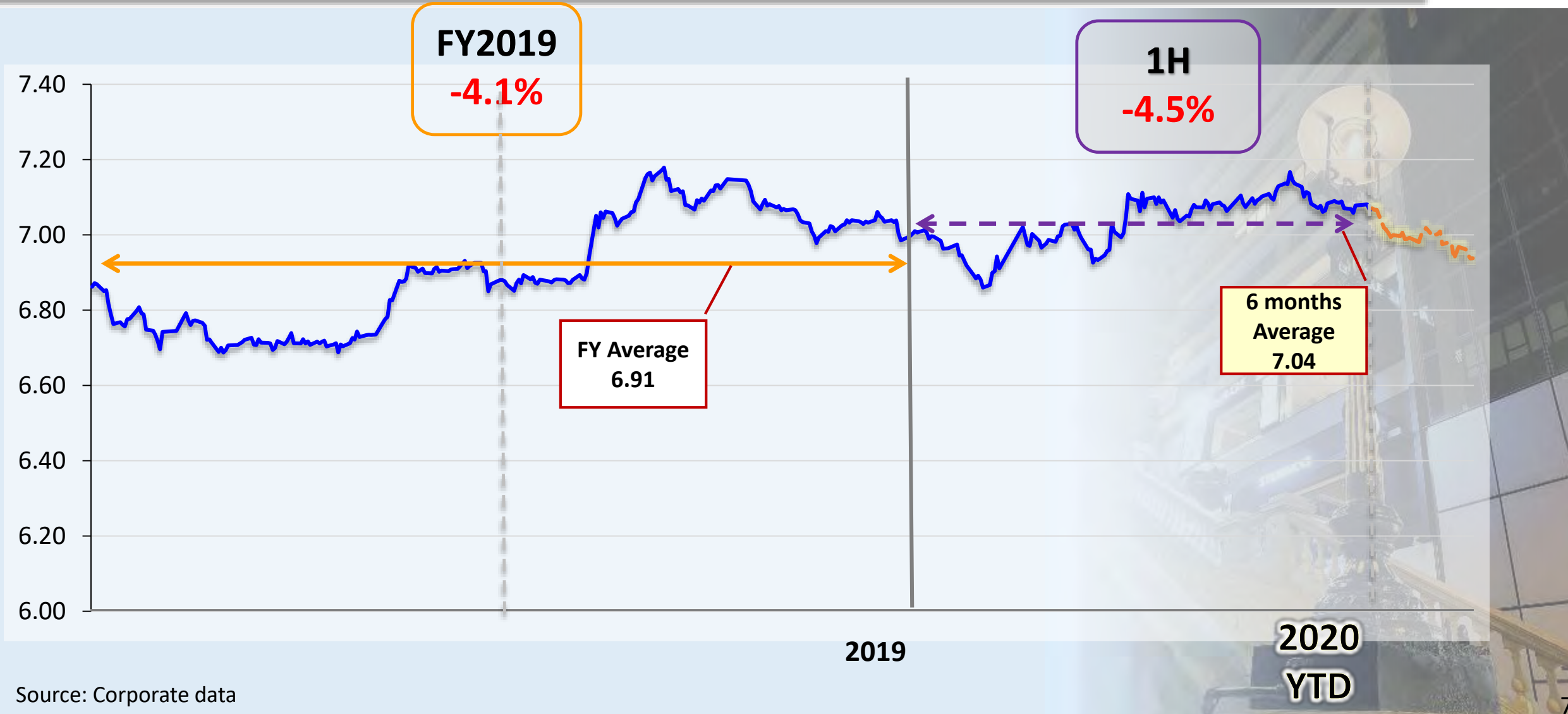
Towngas China (1083 HK)



(HK\$ Mn)	1H 2020	1H 2019	Change
Turnover			
Gas Sales	4,810	5,619	-14%
Connection Fees	753	893	-16%
	5,563	6,512	-15%
Operating Profit	824	1,003	-18%
Corporate Overheads & Finance Costs	(243)	(247)	
Profit Attributable to Shareholders	581	756	-23%
Earnings per Share	HK 20.23 cents	HK 26.89 cents	-25%

RMB/USD Average Exchange Rate



Rmb Depreciation in 2020









HKCG Group



Strong Financial Position



HKCG (3 HK)	30 Jun 2020	31 Dec 2019	Change		30 Jun 2020	31 Dec 2019	Change
	HK\$ Bn	HK\$ Bn					
Total assets	139.1	140.5	-1%	Share price (HK\$)	12.00	14.50	-17%
Net asset value	72.6	75.4	-4%	Market cap. (HK\$ Bn)	213.3	257.6	-17%
Cash and Bank	8.4	8.0	+5%	P/E Ratio	31x	37x	
Total borrowings	40.5	37.9	+7%	P/B Ratio	3.5x	3.8x	
Interest Coverage	8.4x	10.0x		Credit Ratings:	 	A	
Gearing (Net)	33%	31%				A1	

Medium Term Notes Issued in 2020

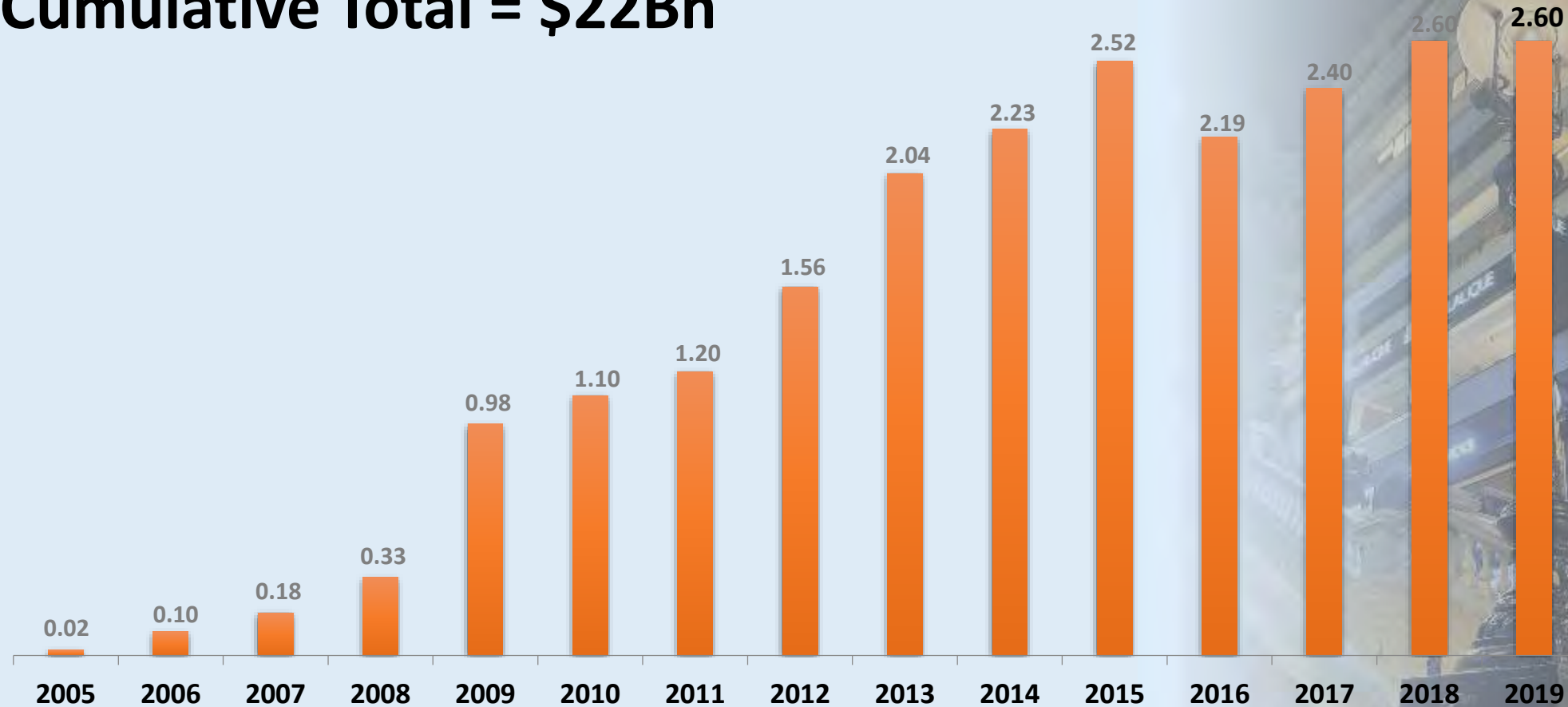
Dealer						
Issue Date	Feb	Feb	Mar	May	Jun	Aug
Amount (HKD Mn)	400	700	213.5	1,512	414	215
Term (Years)	10	10	10	30	30	10
Coupon	2.70%	2.69%	2.30%	2.57%	2.57%	1.98%

TCCL (1083 HK)	30 Jun 2020	31 Dec 2019	Change		30 Jun 2020	31 Dec 2019	Change
	HK\$ Bn	HK\$ Bn					
Total assets	38.2	38.2	0%	Share price (HK\$)	3.50	5.40	-35%
Net asset value	19.8	20.3	-3%	Market cap. (HK\$ Bn)	10.0	15.5	-35%
Cash and Bank	2.4	2.0	+22%	No. of Shares (Bn)	2.87	2.87	-
Total borrowings	10.5	10.2	+2%	P/E Ratio	8.9x	11.7x	
Interest Coverage	7.3x	7.7x		P/B Ratio	0.6x	0.8x	
Gearing (Net)	31%	31%		<div> Credit Ratings: <div>  BBB+ </div> <div>  Baa1 </div> </div>			

Strong Dividend from Joint Ventures


(HK\$Bn)

Cumulative Total = \$22Bn



Rolling 3-Year Cashflow Projection

Healthy Position

		(HK\$ Bn)
Inflow 	HK Operations	14
	PRC Dividends Distribution	8
		22
Outflow 	Cash on Hand	8
	Fund available	30
	Dividend	20
	HK Capex	2
	PRC Investments	8
		30



Hong Kong Business

Hong Kong Business 1H2020

Stable & Resilient Business



Gas Sales **15,165TJ**
-3.9%

Basic tariff increase 1.1¢/MJ
(4.4%) effective 1 August 2019



Customers **1.93Mn**
+ 2k

**Operating
Profit After Tax**
HK\$1.7Bn
(+1.4%)

COVID-19

Austerity measures

Fuel Cost Variation pass-through mechanism

Hong Kong Gas Sales

Resilient Business

Town Gas Sales	Change	1H 2020 (TJ)
Residential (Average Temperature: -0.05°C)	+8.8%	9,238
Commercial & Industrial (COVID-19)	-18.7%	5,927
Total	-3.9%	15,165

- **Challenges due to Pandemic :**
 - Tourism (visitor arrivals) : **-90%**
 - Restaurant receipt (volume) : **-30%**
 - ✚ More home cooking & water heating : **+9%**

Business Opportunities

- New C&I gas applications (cooling & dehumidification)
- Increasing housing supply
- Smart residential gas appliances (IoT, safety features)
- Mia Cucina kitchen solution
- Productivity improvement

Commercial & Industrial Market Expected in 2023

	Target Customers	Additional Annual Gas Volume
New Projects	Hotel Development, New Hospital and Extension, HK Airport New Terminal 3, Crematorium Expansion, New Food Factory	320 TJ
Diesel Conversion Projects	Hospitals, Food Factories, Laundries	540 TJ
Gas Cooling, Heating & Dehumidification	Disneyland, Ocean Park, Asia World Expo, Hospitals, Hotels	370 TJ

More Housing Units

Housing supply in coming 5 years

Public

100,400

Private

98,000

Total

198,400 units

(Source: 2020-21 HK Government Budget)

Residential Market

- Smart Appliances : Internet of Things (leave home alert, timer function, remote turn off)
- Mia Cucina : Kitchen cabinets, gas appliances & white goods



MA Mainland Utilities RT



Mainland Utilities

From City-gas into Smart Energy



Total **197** projects in **24** provincial regions

	Total Projects	
City-gas	132	
Midstream	9	
LNG Terminal & Storage	6	+ Hebei Tangshan LNG Terminal, Sichuan Weiyuan LNG Storage
Distributed Energy System	17	+ Eastern Park of Tongling Economic & Technological Development Zone, Anhui
Electricity Trading	1	
Solar	5	New projects in Jiangsu, Xian and Haerbin
Water & Waste Treatment	11	New projects in Tongling and Changzhou
Others	16	Engineering companies, cooking centre, extended business, kitchen cabinet

Mainland City-gas Volume(All JVs)

Expected Resilient Volume Growth in Coming Months

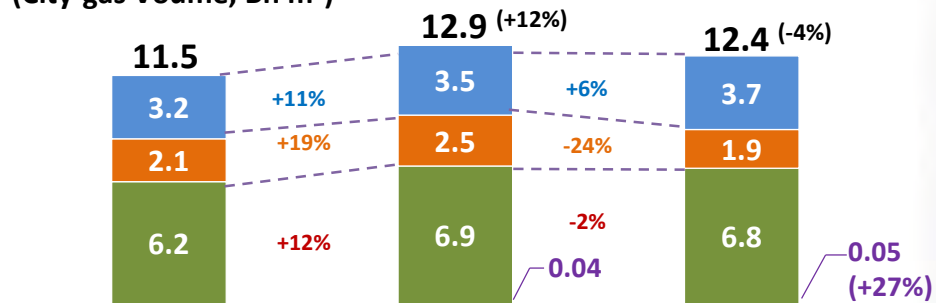
- “Dual circulation” economy with priority on domestic circulation boosts domestic consumption
- Lower interest rate to stimulate economy
- Monetary Easing: faster growth of M2

HKCG Group

(Bn m³)

	1H19	1H20	
City-gas	12.9	12.4	-4%
Midstream	3.5	3.8	+9%
Total Volume	16.4	16.2	-1%

(City-gas Volume, Bn m³)

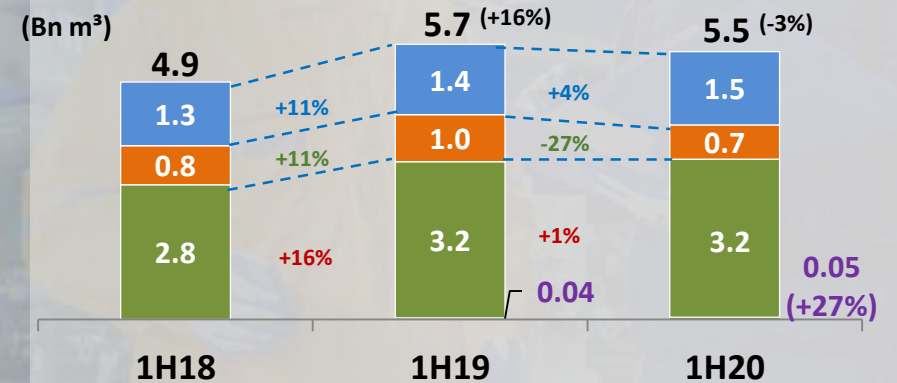


City-gas Volume Mix

	1H18	1H19	1H20
Residential	27%	27%	30%
Commercial	19%	20%	16%
Industrial	54%	53%	54%
Distributed Energy System	-	0.3%	0.4%

TCCL

(Bn m³)



Volume Mix

	1H18	1H19	1H20
Residential	26%	26%	27%
Commercial	18%	17%	13%
Industrial	56%	57%	59%
Distributed Energy System	-	0.6%	1%

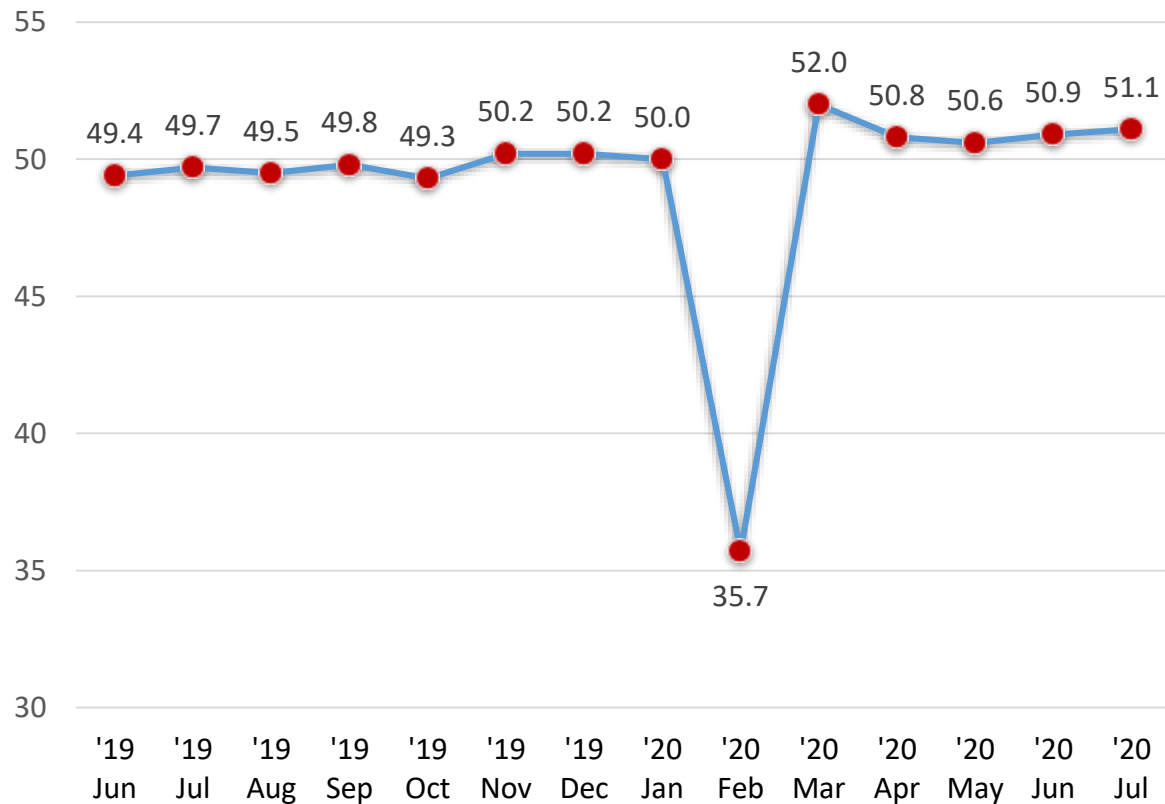
Mainland City-gas

Steady Customer Gains

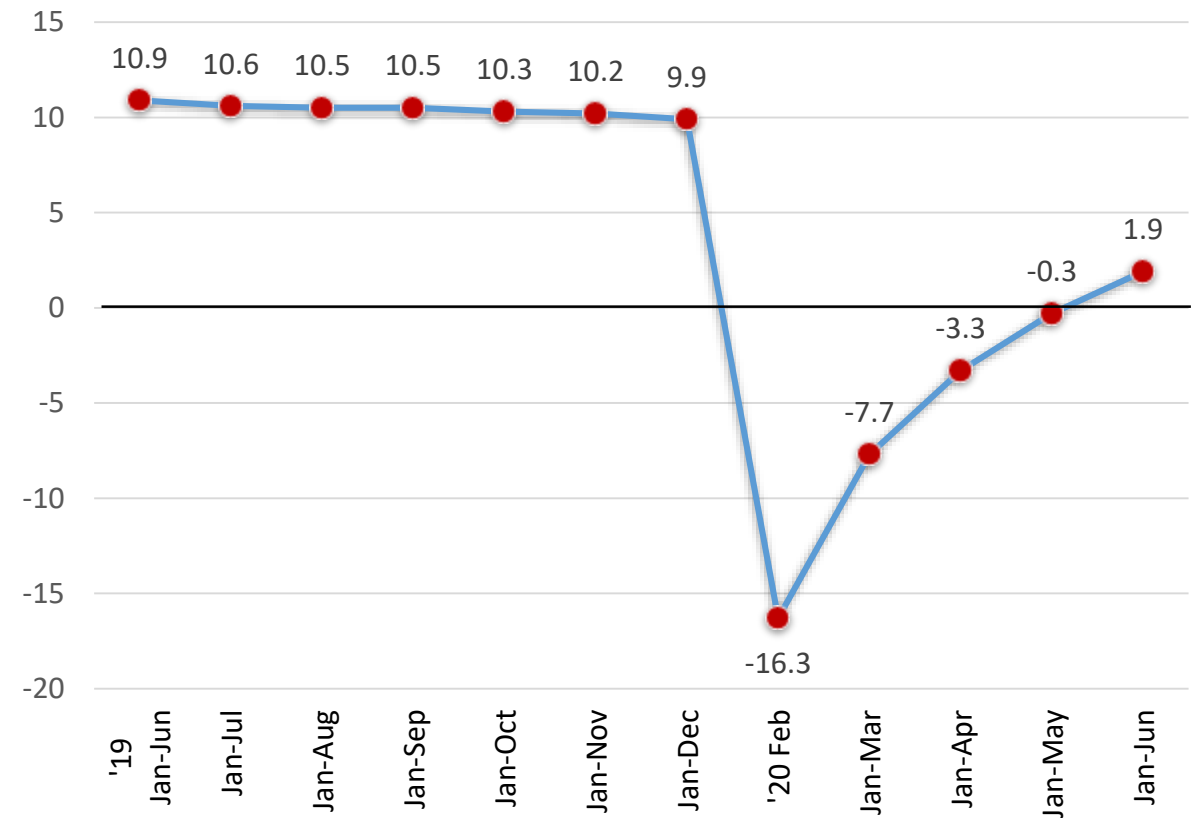
1H2020	HKCG Group	TCCL
New Customers	0.8 Mn	0.3 Mn
Total	30.6 Mn	13.7 Mn

Mainland City-gas Opportunities & Strategies (1)

Manufacturing PMI

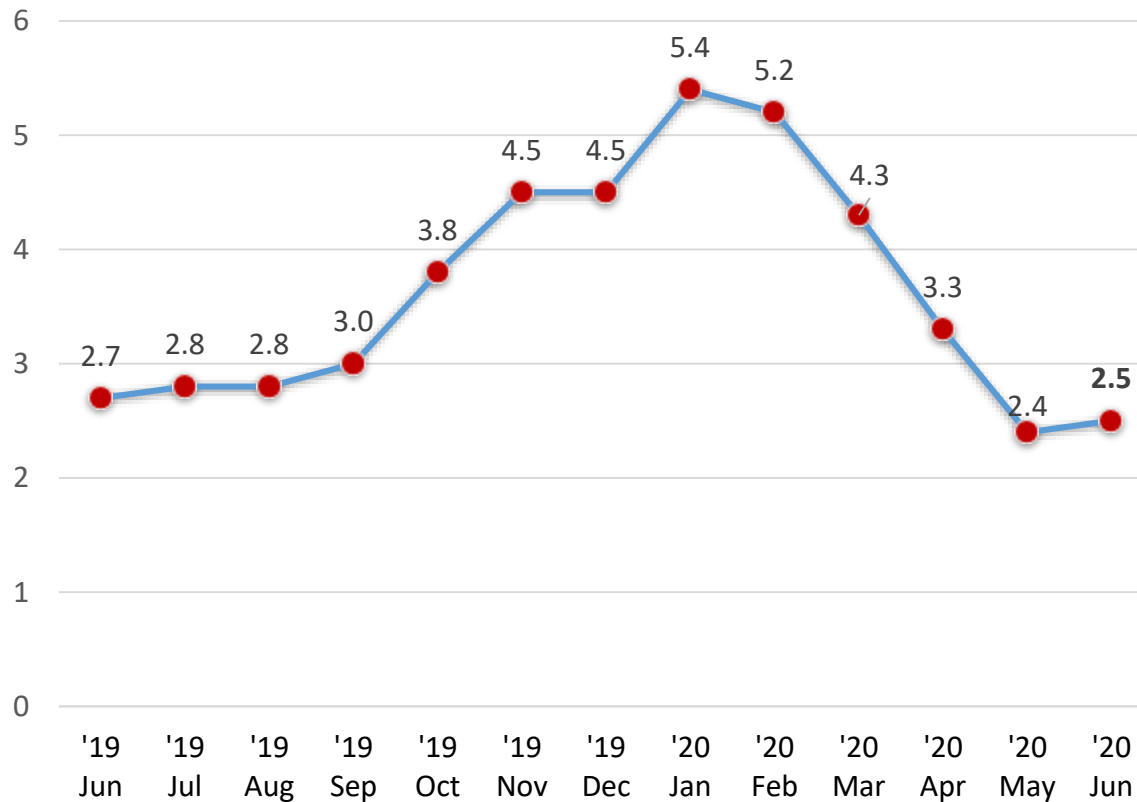


Investment of Real Estate , Accumulated Growth Rate(%)

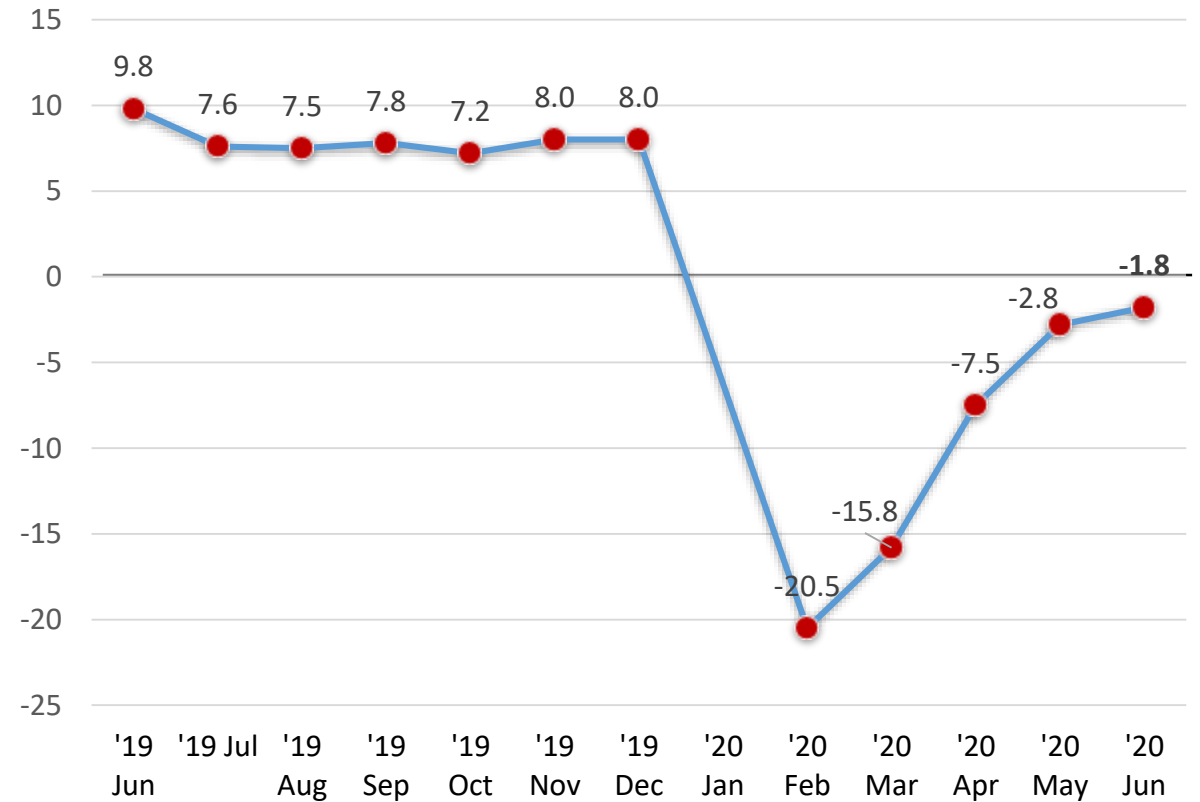


Mainland City-gas Opportunities & Strategies (2)

Consumer Price Index(%)



Total Retail Sales of Consumer Goods, Growth Rate(%)

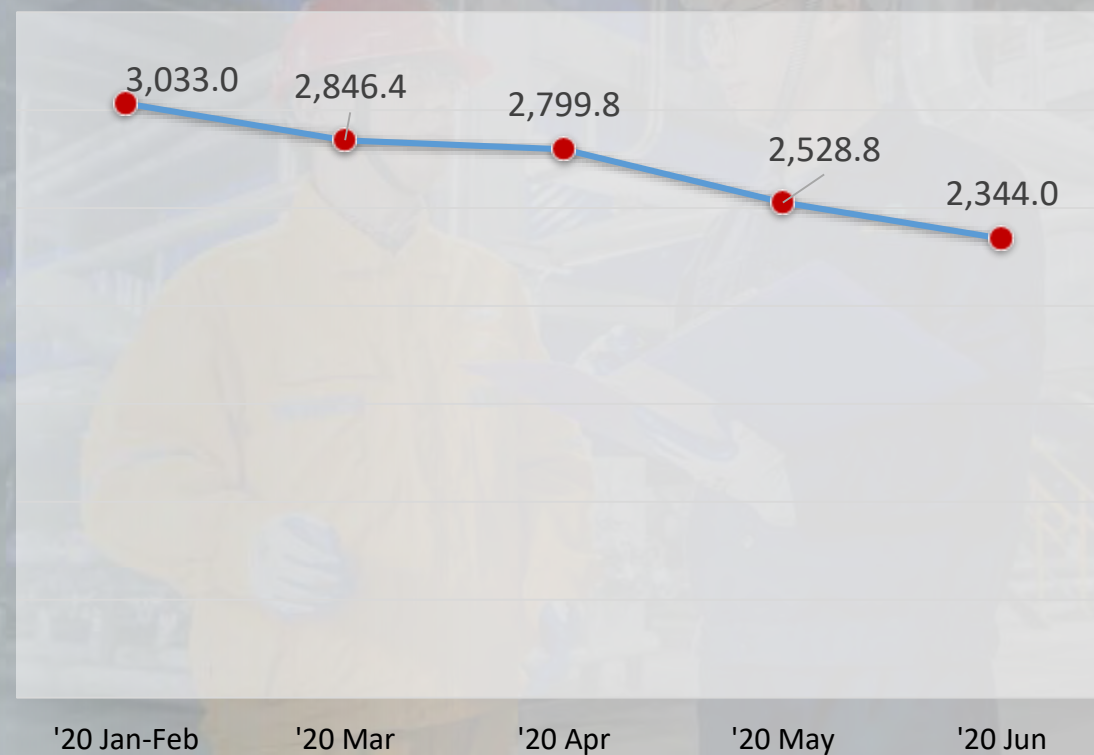


Mainland City-gas Opportunities & Strategies (3)

Better unit gas margin

- Warmer winter
- Winter city-gate price hike ended on 20 Feb, earlier than before
- Average city-gate price increment is less than corresponding period last year

LNG Import Price (Rmb/ton)



Mainland City-gas Opportunities & Strategies (4)

City-gas business fully open up for foreign investors

- Lifted the restriction on majority foreign ownership for cities with population >500,000
- Eliminate the risk of taking away majority shareholding status when the city expands
- City gas business will be more market oriented

Setting up National Oil and Gas Pipeline Company

- To acquire Rmb 400 Billion assets from CNPC, Sinopec and CNOOC
- Open access to pipelines and LNG importation
- Free flow of NG nationwide
- Lower procurement costs
- Gas shortage in certain regions can be reduced

Mainland City-gas Opportunities & Strategies (5)

7% ROA on city gas profits

- Apply to city-gas operation only
- Most JVs have not reached that level
- This policy is difficult to apply nationwide, in particular rapid changes in business environment

10% margin on connection fee

- The latest general guideline issued by NDRC is quite liberal
- Provincial and municipal authorities had been discussing with gas operators considering local market situations
- A few exceptionally high connection fees scaled back already
- New connection fees have been agreed without applying 10% margin

Mainland City-gas Opportunities & Strategies (6)



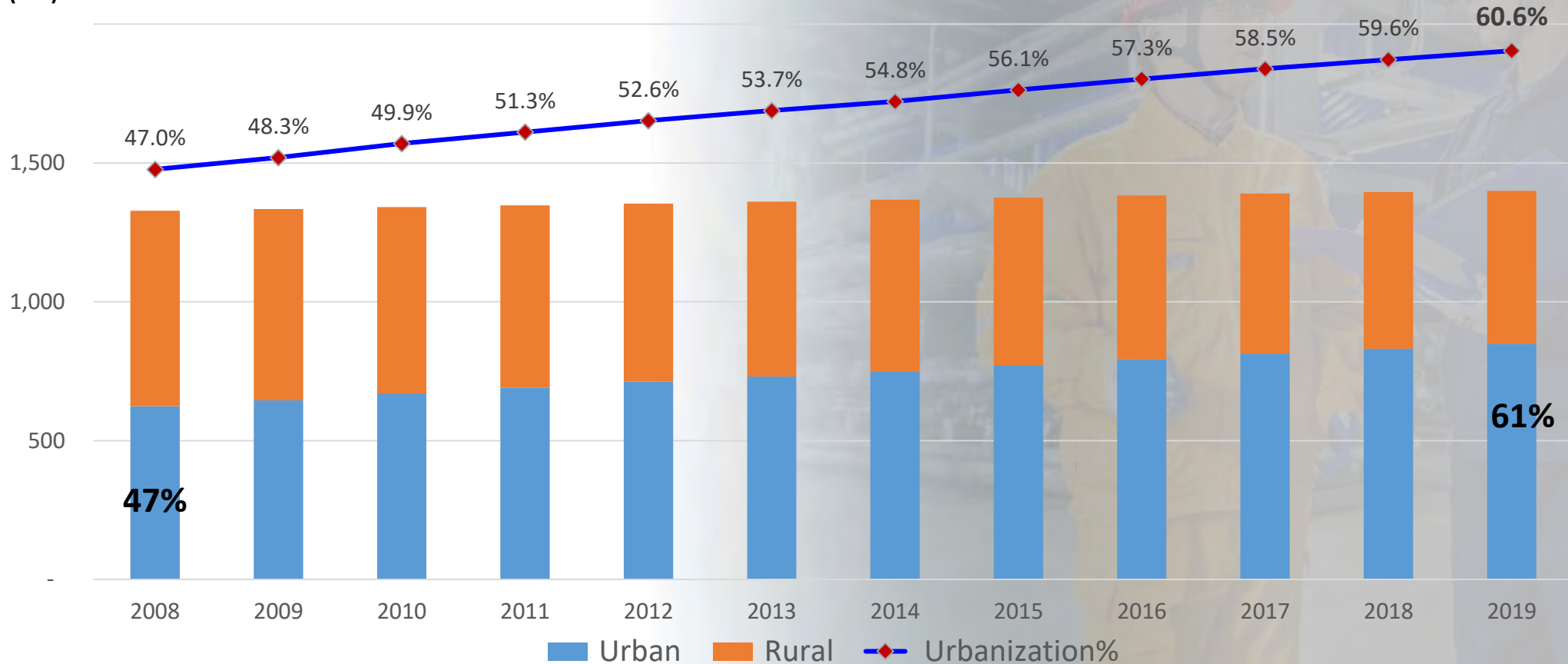
Russian NG supply started in Dec 2019 with volume of 38 Bn m³ p.a. by 2024

North-Eastern	2019	2024F
Number of projects	22	>25
Volume (Bn m ³)	1.8	4.8
Volume Growth	CAGR: 22%	
Northern	2019	2024F
Number of projects	28	>30
Volume (Bn m ³)	3.1	6.0
Volume Growth	CAGR: 14%	

Mainland City-gas Opportunities & Strategies (7)

Urbanization of 1% point per year keeps property market momentum and gas consumption

Population
(Mn)

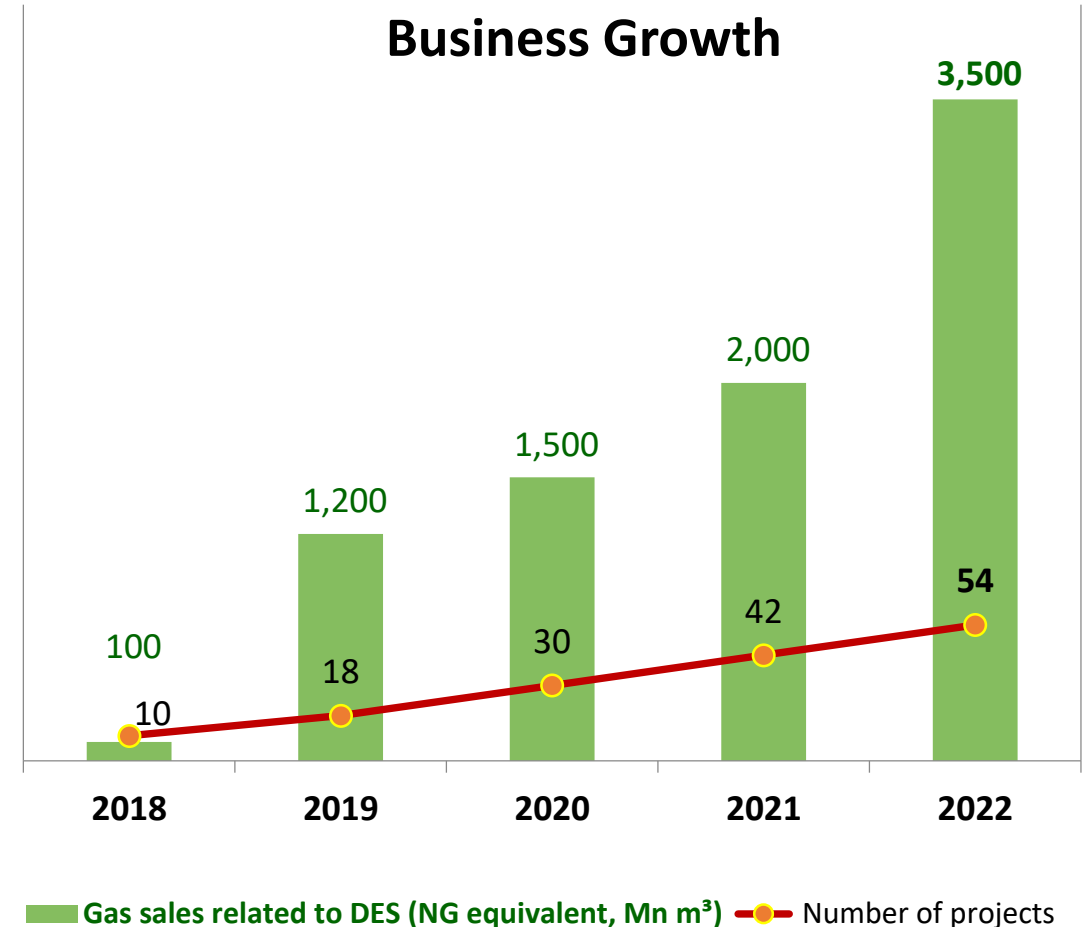


Distributed Energy System (DES) Strategies

Huge Growth Opportunities

- **Green Energy Integrated Services**
- **Enhance energy efficiency with more gas sales**
- **Projects**
 - Central space heating
 - Central steam supply for industrial parks
 - Air-conditioning
 - Electricity
 - Pipelines for steam supply from power plants
 - Photovoltaics solar energy
- **Target: 54 projects by 2022 (Towngas Energy)**
- **Number of projects under City-gas JVs**
 - HKCG: 15 ; TCCL: 23

**Green Energy Integrated Services
Business Growth**



Power System Reform

Key Reforms in the following areas:

- ❑ Sales
- ❑ Supply
- ❑ Technology
- ❑ System

管住中間、放開兩頭

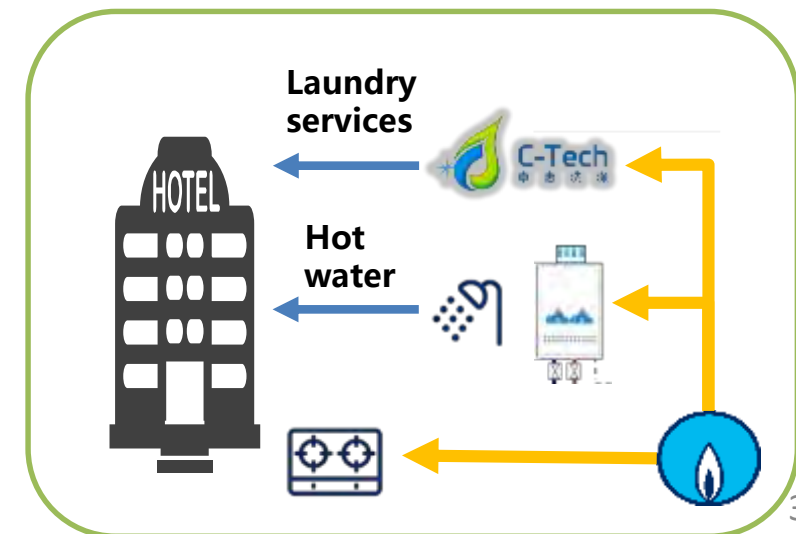
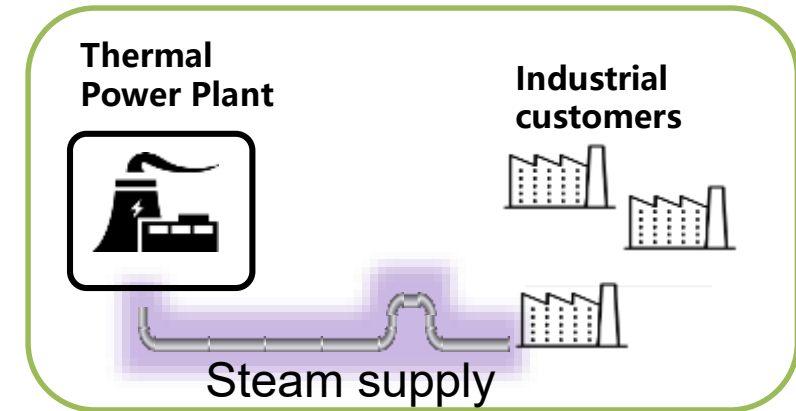
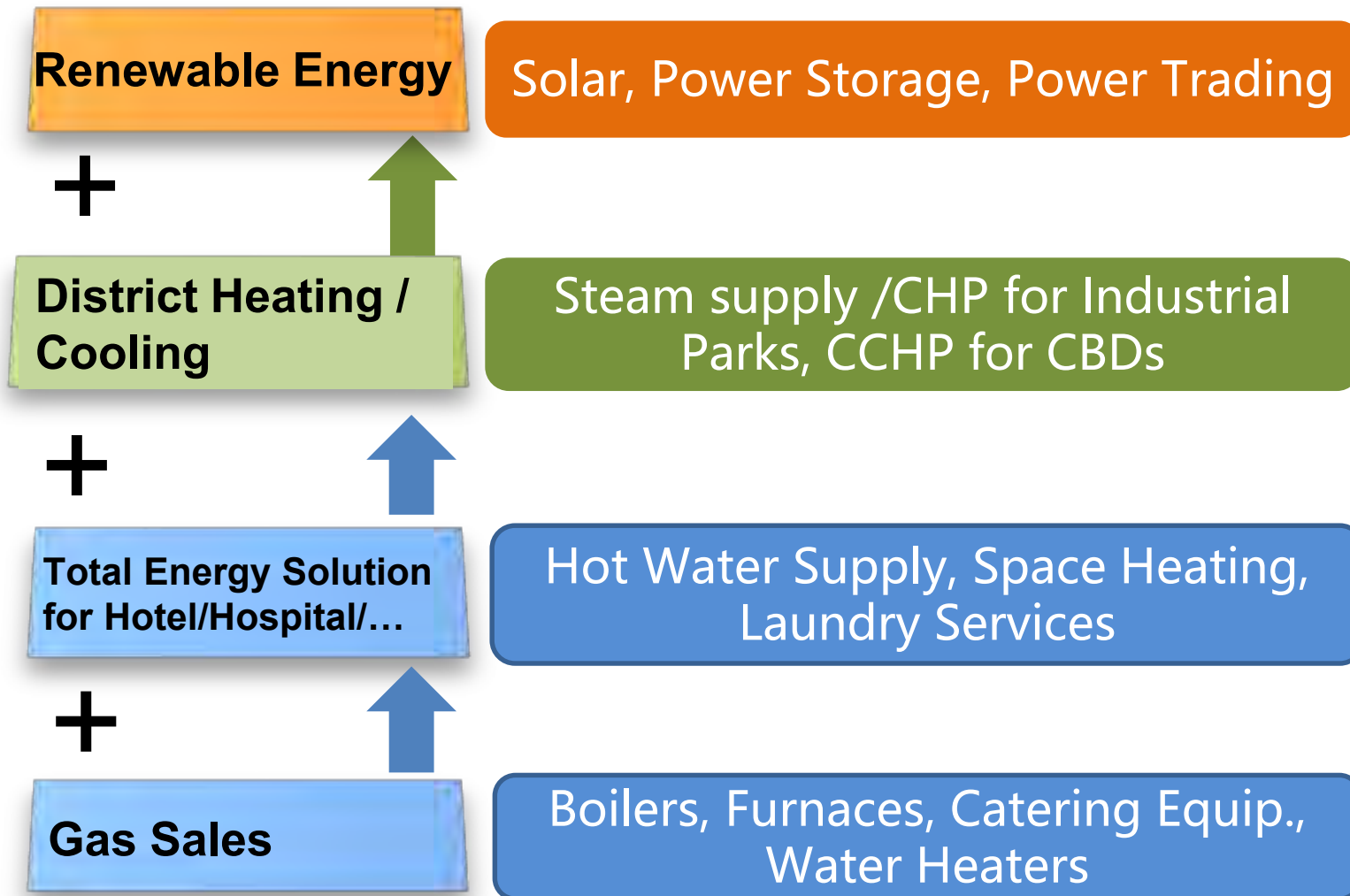
- Establish national and provincial independent power trading centres
- Progressive opening up power generation market
- Allow public investment on power distribution business
- Open up downstream distribution market

More Opportunities for

- ✓ Wind Power and Solar Power Generation
- ✓ Renewable Energy
- ✓ Decentralized Energy Systems
- ✓ Micro-Grid
- ✓ Power Distribution Business

Building First Mover Smart Energy Strategy

From Gas Supplier to Integrated Energy Service Provider



Building First Mover Smart Energy Strategy

Collaboration with Power Giants and Key Players

Top Power Generation Groups

- Renewable energy (Wind & Solar)
- Steam

Power Grid Corporations

- Distribution Grid
- Micro-Grid
- Power Storage

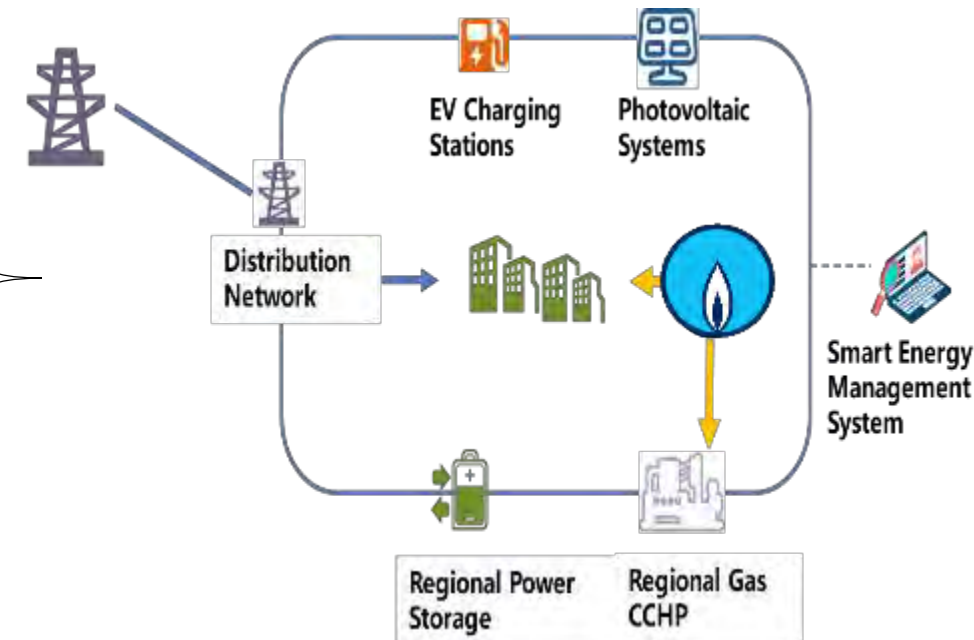
Solar and Power Cell Suppliers/System Integrators

- Partnership for Project Investment
- Advance Technology



Tsinghua University

- Smart Energy Management Systems



Underground Gas Storage

Presenting Business Opportunities



Jintan Underground NG Storage

Project Information

- Phase 1-1 capacity: (3 caverns)

140Mn m³

- Completion:

Jan 2018

- Phase 1-2 capacity: (+7 caverns)

460Mn m³

- Construction Completion:

2022

- Phase 2 capacity: (+15 caverns)

> 1,100Mn m³

Cumulative

Gas storage in Jintan, Jiangsu

- 4 caverns in operation
- Dual sources of supply: CNPC and Sinopec
- To meet peak demand in winter
- Sharing investment cost among JVs
- National pipelines facilitate free flow of NG
- NG and LNG trading opportunities
- 10Mn m³ has been traded on Shanghai Petroleum & Natural Gas Exchange
- Shanghai Gas is a partner of Phase 1 with 25% shareholding
- Total investment Rmb1.2Bn (25 caverns)

LNG Receiving Terminals Investment

Presenting Business Opportunities

Tangshan Caofeidian LNG terminal, Hebei (河北唐山曹妃甸)

- **2 x 200,000 ton storage tanks**
- **1 million ton LNG per annum import rights**
- **50-year operating period, to be operated in 2024**
- **Substantially reduce JVs' investment in meeting gas storage requirement**
- **LNG trading opportunities**

Water & Waste Treatment Business

Stable Growth

1. Total 8 projects serving 2.4Mn customers

	Water Supply	Sewage	Food & Organic Waste	Heavy Metals Sewage Treatment
1H2020 Mn ton	411	189	0.03	2.2

2. 1H2020 profit = HK\$164Mn



Food Waste Treatment Businesses

New Business Strategy with Expansion Opportunity (1)

- First food waste project located in Suzhou Industrial Park
- Investment: Rmb300Mn
- Capacity: 500 tons/day
- By-products:
 - Natural Gas
 - Gutter oil
 - Biomass solid fuel
 - Fertilizer
- Expanding to Phase 2
 - Investment: Rmb120Mn
 - Capacity: 300 tons/day
 - Expected commissioning: 2Q 2021
- Project IRR: 10-12%
- 2021FY volume: 180K ton ; Net profit: Rmb10Mn



Food Waste Treatment Businesses

New Business Strategy with Expansion Opportunity (2)

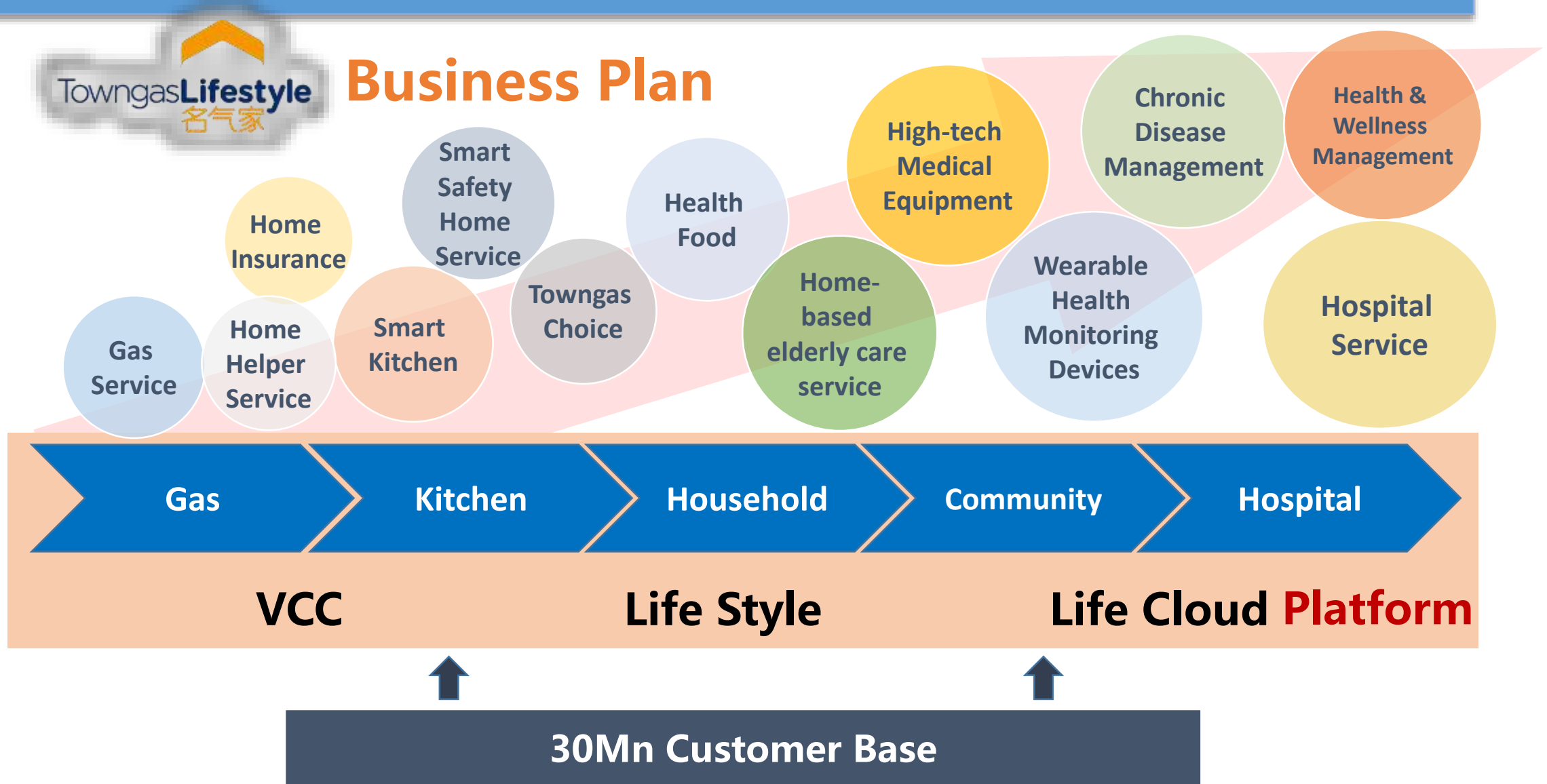
- Three new waste treatment projects

	Tongling city, Anhui province (安徽省銅陵市)	Wujin district, Changzhou city (常州市武進區)	Jiashan Recycle Economic Park (常州市夾山)
Shareholding:	100%	36.75%	56.65%
Investment Amount:	Rmb 110 million	Rmb 257 million	Rmb 272 million
Daily Capacity:	200 ton	500,000 ton	2,000 ton
By Products:	Natural gas ; Grease & Fertilizer	-	-
Business Nature:	Food waste treatment	Sewage treatment	Waste incineration + power generation

- Strategy to focus on food waste, waste incineration and sewage projects
- Expect to add 6 projects in the coming 3 years

Expanding Extended Businesses

More Services to and Income from 30Mn+ Household Customers



Expanding Extended Businesses

More Services to and Income from 30Mn+ Household Customers

1H 2020 Operating Figures

Kitchen Solution



2,200
Sets

Towngas Lifestyle
O2O platform



8 Mn
Members

Gas Related
Insurance



Revenue
HK\$100Mn

Gas Appliances
Sales



300,000
Units


Extended Business – Laundry Business (1)

- 4 projects start operation in 2020, 6 projects in progress
- Scale: 24 tunnel washers, 480 tons/day in laundry capacity, serving over 3,000 hotels

Projects in Operation:

 Guilin (100%) 1 tunnel

 Shaoguan (100%) 1/2 tunnels

 Xindu (25%) 2/4 tunnels

 Hangzhou (40%) 1/2 tunnels



Projects in Development:

Danyang 4 tunnels

Nanjing 1 tunnel

Tangshan 2 tunnels

Miluo 2 tunnels

Xian 4 tunnels

Qingyuan 2 tunnels



Extended Business – Laundry Business (2)

Hotel laundry investment in 5 years: 200 tunnel washers (Rmb 3Bn)

4,000 tons linen/day, 200Mn m³ in gas volume & Rmb400Mn in net profit p.a.



✓ Pilot projects

✓ Expansion by plant replication and M&A



Establishment
of C-Tech (卓惠)

Profitable
Business Model

Industry Leader

—
GR

EE

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New Energy



New Energy

- **STRATEGY :**
 - SUSTAINABILITY (ESG)
 - TECHNOLOGY (Proprietary know-hows)
- **FOCUSES :**
 - Reduce GHG Emission
 - Waste Utilization (Recycling)
 - Advanced Bio-fuels
 - Bio-materials

–ZhangJiaGang, Jiangsu Bio-grease → HVO* (Advanced Biofuel)

–Luanzhou, Hebei	Corn Cob/ Stalk → Furfural, Paper Pulp
–Cangzhou, Hebei	Corn Cob → Furfural, Cellulosic Ethanol (Advanced Biofuel)

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Zhang Jia Gang Bio-grease → HVO Project

Selling Advanced Biofuel to Europe

Hydrotreated Vegetable Oil (HVO) – Advanced Biofuel

- **Key Market** : European countries
- **Schedule** : 3Q 2020 commission,
40k tons produced in pilot run
- **Feedstock** : Palm Oil Mill Effluent, Used Cooking Oil
- **Total Capacity** : 250k tons HVO/year
- **Investment** : RMB 1.0Bn
- **Revenue** : RMB 2.6Bn/year

Luanzhou Agricultural Waste Utilization Project

Biomass Business Strategy

- **Schedule** : 4Q 2020 commission
- **Feedstock** : Corn stalk/corn cob, 240k tons/year
- **Total Capacity** : 25k tons furfural/year
80k tons paper pulp/year
- **Investment** : RMB 350Mn
- **Revenue** : RMB 400Mn/year

Cangzhou Agricultural Waste Utilization Project


















Biomass Business Strategy

- 
- **Schedule** : 1Q 2021 commission
 - **Feedstock** : Corn cob, 240k tons/year
 - **Total Capacity** : 25k tons furfural/year
25k tons cellulosic ethanol/year
 - **Investment** : RMB 400Mn
 - **Revenue** : RMB 430Mn/year

Diversified Group Project Coverage



Total **267** projects in PRC
26 provincial regions

City-gas	 
Midstream	   
Distributed Energy	
Water, Sewage & Waste Treatment	
Refilling Stations	 
Gas-based	
Coal-based	 
Biomass	
Oil E&P	
Telecommunications	
Others	



Up to 21 July 2020



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Towngas



Outlook

2020: An Extremely Challenging Year

Hong Kong

- COVID-19
- Tourism Slump
- Dine-in Ban
- Sino-US Conflict
- Another Hot Year

Mainland China

- Slower GDP Growth
- Sino-US Conflict
- Export ↓
- Commodity Prices ↓
- Weak RMB Ex-Rates
- Housing Market Affected

Standing Strong through Adversity (Hong Kong Utilities)

- **Resilient Town Gas Business**

- **Gas Sales: -3.9% (1H)**
 - C&I ↓
 - Residential ↑
- **Estimated FY gas sales drop remain at single digit**
- **Proactive austerity measures**
- **Long term growth**
 - Housing supply ↑ (+200,000 thru 2025)
 - Hospital beds ↑ (+9,000 thru 2030)
- **Established appliance and kitchen solution businesses**

Growing Business in Mainland China Utilities

- **Resilient city gas business**
 - Gas sales: 4.1% ↓ (1H)
- **Recovering from COVID-19, economy rebounded**
- **Housing market recovering**
- **Government environmental drive continues**
- **Proactive austerity measures**
- **Expecting government stimulus programme**
- **Abundant upstream gas supply; prices ↓**
- **Reform of mid-stream pipelines**
- **Secured LNG infrastructure and gas storage capacities**

Broader Future for New Energy Business

- **Stable income from Aviation Fuel Facility in Hong Kong (→ 2047)**
- **Capitalizing high return on R&D achievements**
 - **Advanced bio-fuels (rising market)**
 - **Agricultural waste utilization (sustainability)**

Pioneering in New Businesses

- **Smart Energy (Distributed Energy System)**
- **Renewables + Power Storage**
- **Municipal Waste Treatment**
- **Laundry (For Hotels/ Hospitals)**
- **Capitalizing 30Mn Customer Base**

Conclusion

**Resilient Utility Business
Plus
New Opportunities**



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Thank You