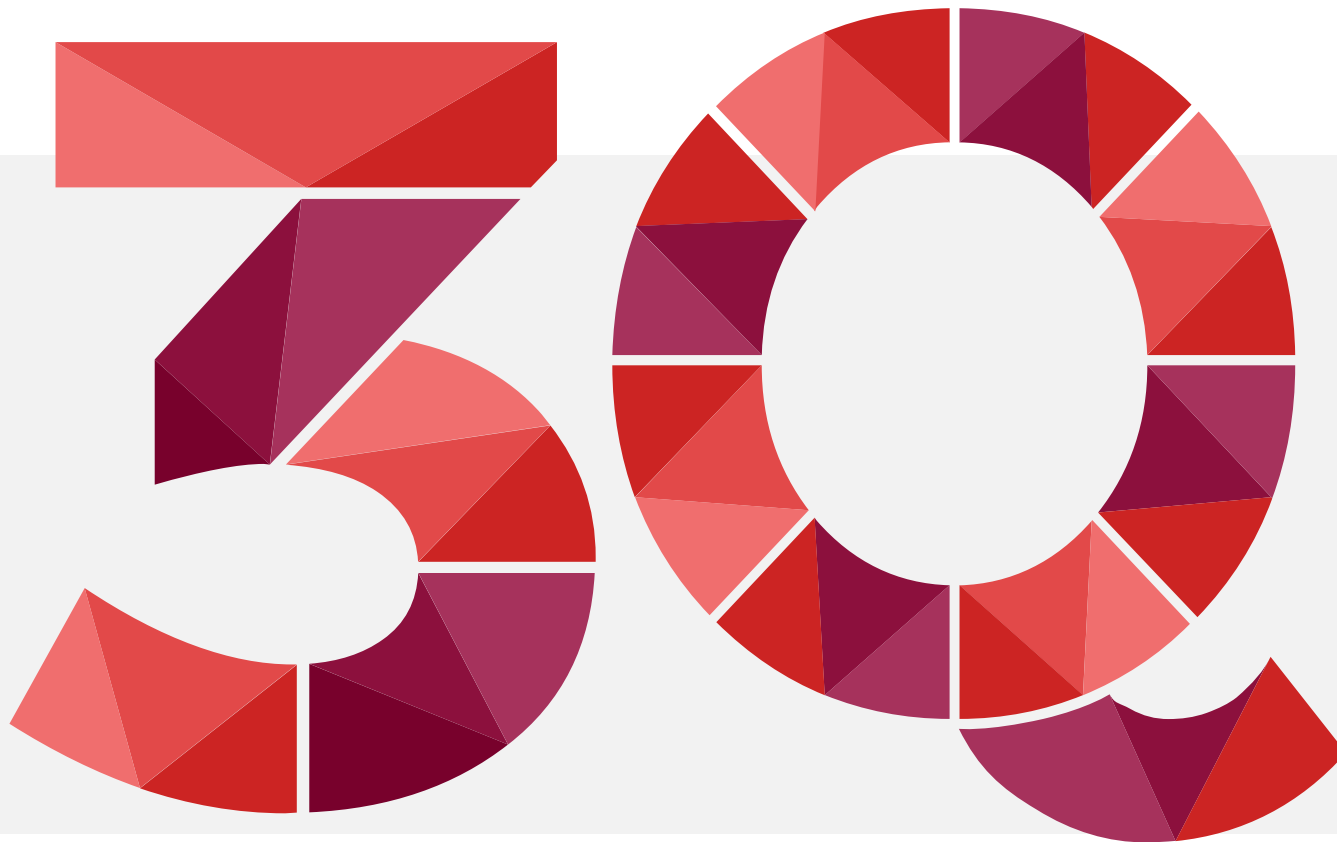


# Unaudited Consolidated Result for the 3<sup>rd</sup> Quarter FY2019 Ended 30<sup>th</sup> September 2019



## Presentation to Analyst

27<sup>th</sup> November 2019





01 KEY HIGHLIGHTS



FINANCIAL DETAILS

02

03 APPENDIX



# Resilient Y-o-Y Performance Backed by 3.2% Peninsula Demand Growth



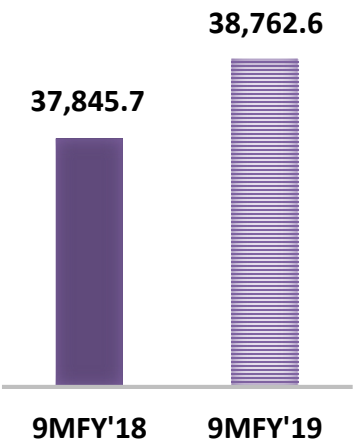
KEY HIGHLIGHTS

OVERVIEW

## REVENUE

RM 38,762.6mil

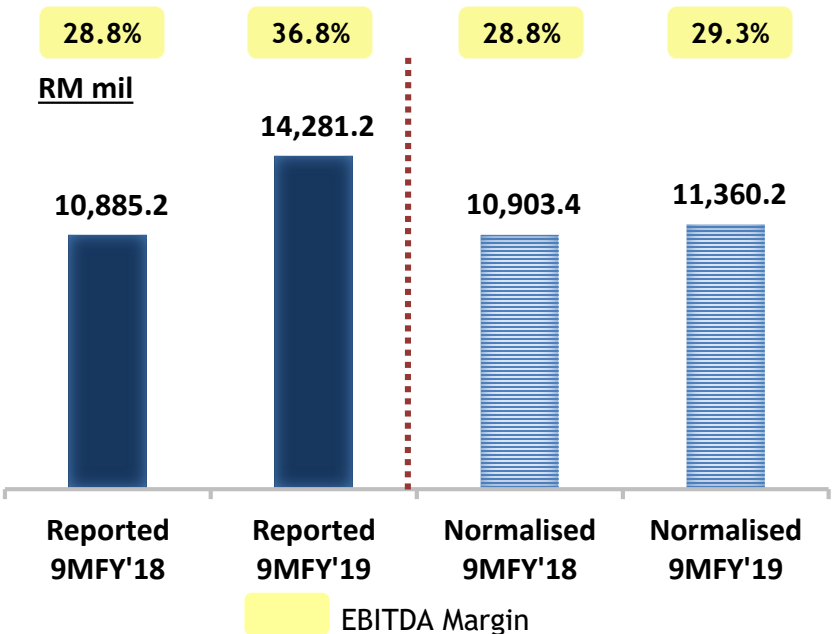
RM mil



## EBITDA

RM 14,281.2mil

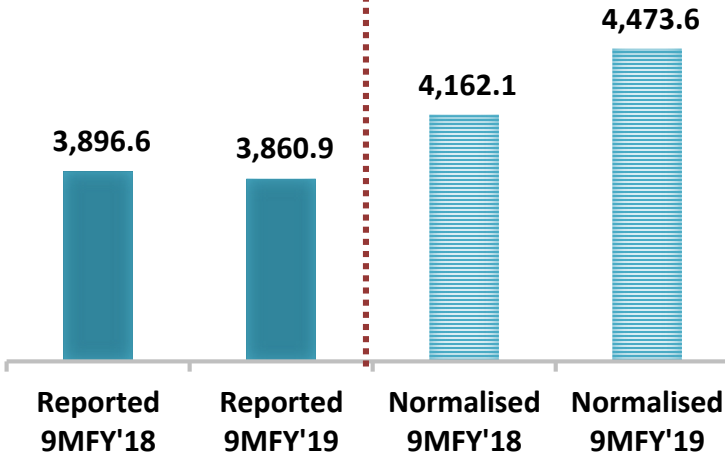
RM mil



## PAT

RM 3,860.9mil

RM mil



Higher revenue due to :

- i. Increase in Peninsula Sales of Electricity on the back of 3.2% Demand Growth

Reported EBITDA for 9MFY'19 includes:

- i. MFRS 16 adjustment (Capacity Payment) of RM3,255.0mil
- ii. Recognition of liquidated damages received by Jimah East Power (JEP) of RM145.4mil
- iii. Impairment of GMR of RM198.3mil in 1QFY'19
- iv. Impairment of financial guarantee for GAMA of RM135.7mil in 1QFY'19

(please refer Normalised EBITDA slide)

Reported PAT in 9MFY'19 includes:

- i. Other Regulatory Adjustments (ORA) of RM1,092.5mil
- ii. Negative net MFRS 16 impact of RM202.7mil

(please refer Normalised PAT slide)

# Improved Normalised EBITDA Backed by Higher Sales of Electricity & Other Operating Income



## KEY HIGHLIGHTS

## Normalised EBITDA

### 9M FY'18

Normalised EBITDA RM10,903.4mil

Components	RM mil
Reported EBITDA 9MFY'18	10,885.2
Other Regulatory Adjustment	-479.8 <sup>1</sup>
Impairment	+498.0 <sup>2</sup>
Normalised EBITDA	10,903.4

<sup>1</sup> FY'18 Other Regulatory Adjustments of RM639.8mil is equally divided quarterly

<sup>2</sup> Impairment made for GAMA of RM498.0mil

### 9M FY'19

Normalised EBITDA RM11,360.2mil

Components	RM mil
Reported EBITDA 9MFY'19	14,281.2
MFRS 16 – Capacity Payment	-3,255.0 <sup>1</sup>
Impairments	+334.0 <sup>2</sup>
Normalised EBITDA	11,360.2 <sup>3</sup>

<sup>1</sup> Please refer to MFRS 16 slide

<sup>2</sup> Breakdown of the impairments in 1QFY'19 :  
• Impairment for GMR RM198.3mil  
• Impairment of Financial Guarantee for GAMA RM135.7mil

<sup>3</sup> Higher Y-o-Y Normalized EBITDA due to :  
a) Increase in Sales of Electricity (Net of ORA) of RM404.1mil  
b) Increase in Other Operating Income mainly due to recognition of liquidated damages received by JEP of RM145.4mil

# Increased Normalised Earnings Contributed by Improvement in Share of Associates



## KEY HIGHLIGHTS

## Normalised PAT

### 9M FY'18

Normalised PAT RM4,162.1mil

Components	RM mil
Reported PAT 9MFY'18	3,896.6
Other Regulatory Adjustment for FY'18	-479.8 <sup>1</sup>
Forex translation loss	+247.3
Impairment	+498.0 <sup>2</sup>
Normalised PAT	4,162.1

<sup>1</sup> FY'18 Other Regulatory Adjustments of RM639.8mil (reflected in full in 4QFY'18) is equally divided quarterly

<sup>2</sup> Impairment made for GAMA of RM498.0mil

### 9M FY'19

Normalised PAT RM4,473.6mil

Components	RM mil
Reported PAT 9MFY'19	3,860.9
Net impact of MFRS 16	+202.7 <sup>1</sup>
Forex translation loss	+76.0
Impairments	+334.0 <sup>2</sup>
Normalised PAT	4,473.6 <sup>3</sup>

<sup>1</sup> Please refer to MFRS16 slide

<sup>2</sup> Breakdown of the impairments in 1QFY'19 :  
 • GMR RM198.3mil  
 • Financial Guarantee for GAMA RM135.7mil

<sup>3</sup> Higher mainly due to improvement in Share of Associates by RM277.0mil

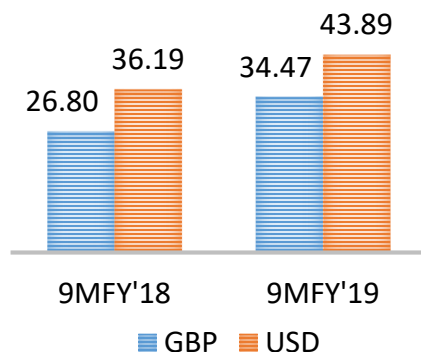


## KEY HIGHLIGHTS

## OVERSEAS ASSETS

### Vortex (Solar)

#### EBITDA (mil)



Higher EBITDA in 9MFY'19 due to higher generation driven by :

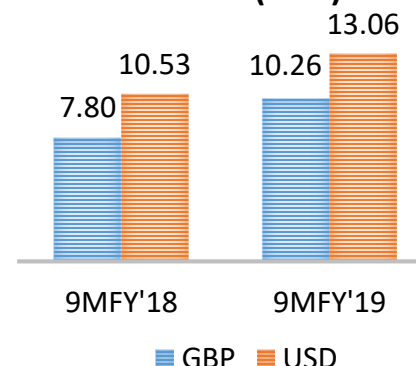
- better performance ratio
- increase in PPA price
- higher irradiance in UK



United Kingdom

### Wind Ventures (Wind)

#### EBITDA (mil)



- Performance has surpassed the financial hurdle threshold and expectation.
- There is potential upside in 2020 due to technology enhancement.

### Outlook

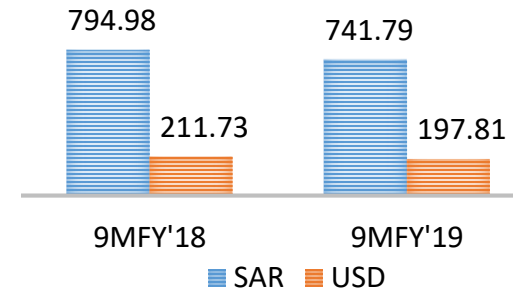
TNB will leverage on existing UK assets and market experience to build up a sizeable renewable energy portfolio by 2021 through acquisition of both brown and green field.



Saudi Arabia

### Malaysian Shoaiba Consortium

#### EBITDA (mil)



Shoaiba has declared accumulated dividend of c.USD35.20mil (110% of our cost of investment) since 2010. It is our best performing investment return and dividend yield.

### Outlook

The performance is expected to remain positive with a steady dividend distribution to shareholders.

# Positive Signs of Recovery for GAMA



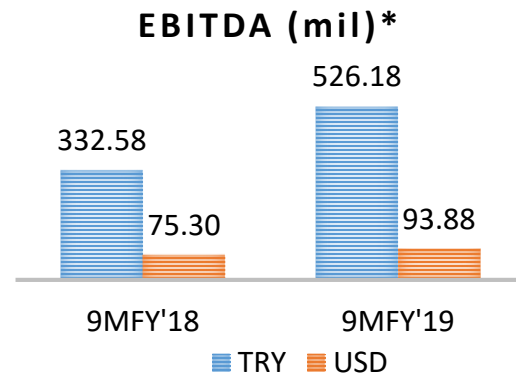
## KEY HIGHLIGHTS

## OVERSEAS ASSETS



Turkey

**GAMA  
Enerji A.S.**



Higher EBITDA in 9MFY'19 due to improved performance of gas plant (99% availability), higher hydrology and better wind seasonality as compared to the previous period.

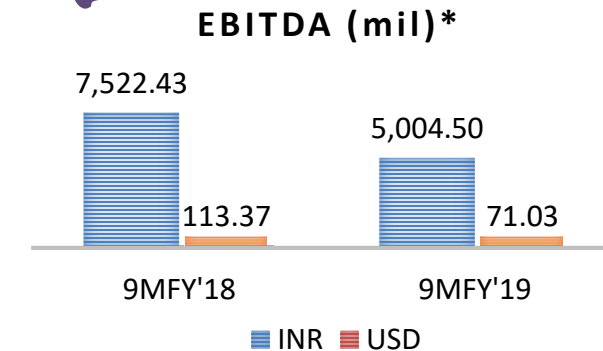
### Outlook for GAMA:

- Operational performance has improved.
- Lenders in Turkey are more positive based on the recent success of debt restructuring of ACWA's Combined Cycle Gas Turbine (CCGT) and other infrastructure projects.
- GAMA Enerji's CCGT debt restructuring is progressing well and it is expected to complete by 1QFY'20.



India

**GMR  
Energy Limited**



Lower EBITDA in 9MFY'19 due to :

- pending regulatory coal pass-through which affects the recognition of revenue

### Outlook for GMR:

- The management of GMR are now are working on a strategy which will benefit shareholders.
- TNB is considering all options, including management-led restructuring of GMR to ensure sustainable operations. Part of the restructuring outcome is through asset sale such as sale of hydro project in Nepal with a net proceed of around USD 20.0mn (recognized in 1QFY'19).

Note:

\* Reported 3 months lagging

YTD EBITDA at 100% shareholdings

# Well Managed CAPEX and Major Projects are on Track



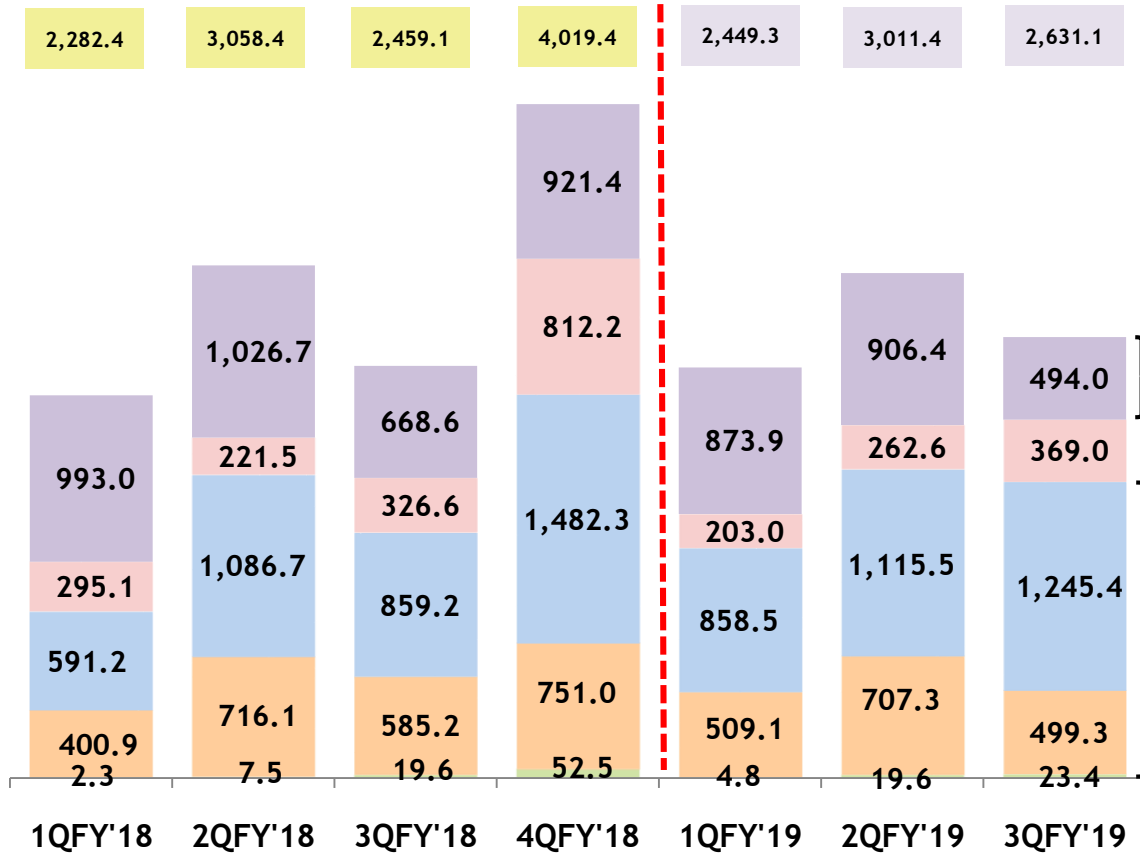
## KEY HIGHLIGHTS

## CAPEX

RM mil

YTD FY'18 : RM11,819.3

YTD FY'19 : RM8,091.8



YTD New Generation Capacity

28.1%

RM2,274.3mil

YTD Recurring CAPEX

61.6%

RM4,982.9mil

## Major Generation Projects Physical progress as at Sep'19

99%

Plan : 99%

**Jimah East Power  
(Coal)**

2,000MW

COD:

U1: Commissioned on 22<sup>nd</sup> Aug'19

U2: 15<sup>th</sup> Dec'19

93%

Plan : 93%

**Southern Power  
Generation (Gas)**

1,440MW

COD : 1<sup>st</sup> Jul'20

72%

Plan : 72%

**TNB Bukit Selambau  
(Solar)**

30MW

COD : 31<sup>st</sup> Dec'20

Major Generation Projects  
Corporate & Subsidiaries  
Recurring Distribution

Recurring Transmission  
Recurring Generation





01 KEY HIGHLIGHTS 

\$ FINANCIAL DETAILS 02

03 APPENDIX 

# Higher Sales of Electricity Rallied Y-o-Y Revenue



## FINANCIAL DETAILS

## REVENUE

	1QFY'19		2QFY'19 Restated		3QFY'19		9MFY'19		9MFY'18		Variance (9MFY'19 vs 9MFY'18)	
UNITS SOLD	GWh		GWh		GWh		GWh		GWh		GWh	%
Sales of Electricity (GWh)												
- TNB	28,471.1		30,050.0		29,230.4		87,751.5		84,991.0		2,760.5	3.2
- EGAT (Export)	-		-		0.3		0.3		3.8		(3.5)	(92.1)
- SESB	1,354.5		1,449.4		1,382.1		4,186.0		3,993.8		192.2	4.8
- LPL	148.1		368.6		320.3		837.0		710.8		126.2	17.8
- UK WIND (TNBI)	24.1		16.2		17.3		57.6		39.9		17.7	44.4
Total Units Sold (GWh)	29,997.8		31,884.2		30,950.4		92,832.4		89,739.3		3,093.1	3.4
REVENUE	RM mil	Sen/ KWh	RM mil	Sen/ KWh	RM mil	Sen/ KWh	RM mil	Sen/ KWh	RM mil	Sen/ KWh	(RM mil)	Sen/KWh
Sales of Electricity (RM)												
- TNB *	11,331.3	39.8	11,990.2	39.9	11,711.2	40.1	35,032.7	39.9	33,756.3	39.7	1,276.4	3.8
- EGAT (Export)	0.1	-	-	-	-	-	0.1	33.3	1.7	44.7	(1.6)	(94.1)
- SESB	461.8	34.1	498.6	34.4	476.1	34.4	1,436.5	34.3	1,368.1	34.3	68.4	5.0
- LPL	88.3	59.6	157.6	42.8	140.2	43.8	386.1	46.1	257.3	36.2	128.8	50.1
- UK WIND (TNBI)	31.3	129.9	20.9	129.0	22.1	127.7	74.3	129.0	49.7	124.6	24.6	49.5
Sales of Electricity	11,912.8	39.7	12,667.3	39.7	12,349.6	39.9	36,929.7	39.8	35,433.1	39.5	1,496.6	4.2
LPL Operating Lease (MFRS16)	9.3		(9.3)		-		-		27.9		(27.9)	(100.0)
Unbilled Revenue	117.0		(221.2)		102.7		(1.5)		43.0		(44.5)	>(100.0)
Imbalance Cost Pass-Through	1,369.1		425.8		203.8		1,998.7		1,358.9		639.8	47.1
Other Regulatory Adjustment	(523.9)		(285.6)		(283.0)		(1,092.5)		-		(1,092.5)	>(100.0)
SESB Tariff Support Subsidy	125.3		91.5		87.2		304.0		351.9		(47.9)	(13.6)
Total Sales of Electricity	13,009.6		12,668.5		12,460.3		38,138.4		37,214.8		923.6	2.5
Goods & Services	170.5		130.5		92.8		393.8		402.6		(8.8)	(2.2)
Construction contracts	1.6		15.3		13.6		30.5		31.2		(0.7)	(2.2)
Customers' Contribution	63.1		61.7		75.1		199.9		197.1		2.8	1.4
Total Revenue	13,244.8		12,876.0		12,641.8		38,762.6		37,845.7		916.9	2.4

\* Without ICPT

- 1 Lower Q-o-Q Sales of Electricity mainly contributed by industrial sector
- 2 Lower performance due to low demand in 3QFY'19
- 3
  - i. Y-o-Y higher because units sold in 9MFY'18 consisted of the units sold within the 7 months period since its acquisition (Mar'18)
  - ii. Q-o-Q higher due to seasonal revenue cycle (approaching winter seasons)
- 4
  - i. Y-o-Y higher due to increased in generation cost and units generated (Refer Y-o-Y Fuel Cost slide)
  - ii. Q-o-Q lower due to reduction in generation cost and units generated.
- 5 Refer Appendix :  
Other Regulatory Adjustment Part 1 & 2

**TNB Sepang Solar units generated as at Sept'19 : 84.1 GWh**  
Expected UG as at Sept'19 : 80.5 GWh

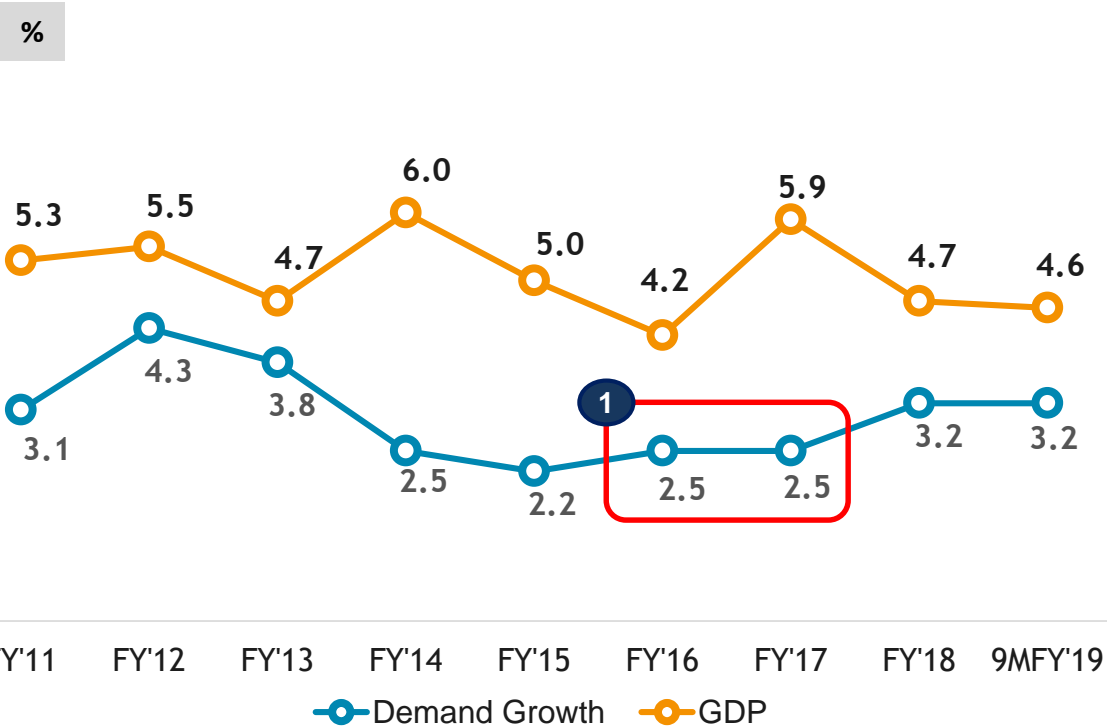
# Steady Electricity Demand in line with GDP Growth



FINANCIAL DETAILS

DEMAND GROWTH

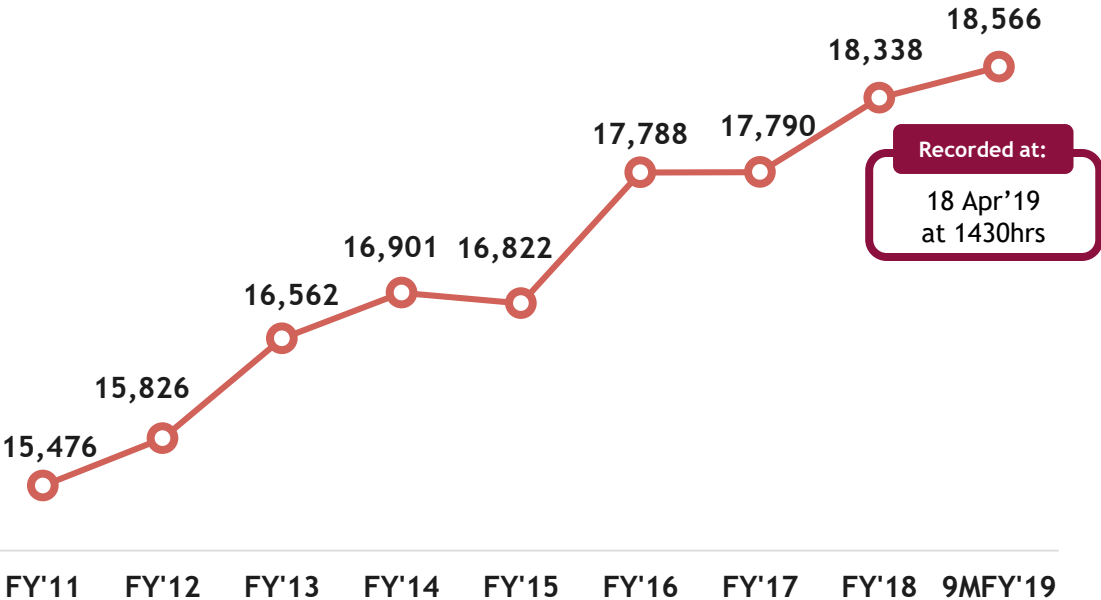
GDP & TNB (Peninsula) Demand Growth by Financial Year



1 Average demand growth for FY2016 & FY2017. This is to eliminate the one-off El-Nino phenomenon during 3QFY'16

TNB (Peninsula) Yearly Peak Demand

MW



# Stable Y-o-Y Growth for All Sectors (GWh)



## FINANCIAL DETAILS

## SECTORAL GROWTH (PENINSULA)

### Industrial

Y-o-Y 0.6%

2.2%

2.6%

(2.8%)

11,118

11,359

11,736

12,037

11,786

11,458

11,800

1Q

2Q

3Q

4Q

3Q main contributors for the drop :

- Iron & steel
- Electric & Electronic
- Utility Electrical

(consistent with the drop in IPI Manufacturing )

Unit Sales

2018

2019

Growth

Y-o-Y

Q-o-Q

### Commercial

Y-o-Y 3.2%

4.2%

2.9%

2.4%

9,373

9,769

10,078

10,375

9,963

10,200

9,851

1Q

2Q

3Q

4Q

### Domestic

Y-o-Y 7.6%

11.1%

6.5%

5.6%

6,036

6,707

6,632

7,060

6,602

6,973

6,253

1Q

2Q

3Q

4Q

### Others\*

\*includes Agriculture, Mining & Public Lighting

Y-o-Y 8.8%

17.1%

3.4%

6.1%

543

636

559

578

565

600

575

1Q

2Q

3Q

4Q

# Lower Non-Generation Costs Recorded



## FINANCIAL DETAILS

## OPEX without MFRS 16

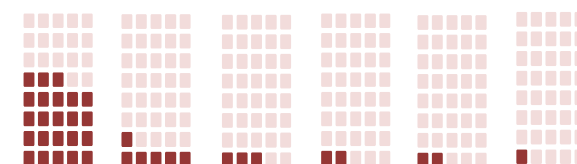
	1QFY'19 (RM mil) Restated	2QFY'19 (RM mil)	3QFY'19 (RM mil)	9MFY'19 (RM mil)	9MFY'18 (RM mil)	Variance (9MFY'19 vs 9MFY'18)	
						RM mil	%
<b>Non-TNB IPPs Costs</b>	<b>4,835.5</b>	<b>4,496.5</b>	<b>4,746.0</b>	<b>14,078.0</b>	<b>11,809.4</b>	<b>2,268.6</b>	<b>19.2</b>
Capacity Payment	1,313.9	1,329.9	1,321.2	3,965.0	3,113.4	851.6	27.4
Energy Payment	3,521.6	3,166.6	3,424.8	10,113.0	8,696.0	1,417.0	16.3
<b>TNB Fuel Costs</b>	<b>2,511.3</b>	<b>3,092.4</b>	<b>2,367.5</b>	<b>7,971.2</b>	<b>8,493.8</b>	<b>(522.6)</b>	<b>(6.2)</b>
Fuel Costs	3,164.7	3,232.1	2,765.5	9,162.3	8,431.3	731.0	8.7
Fuel Price Adjustment	(592.0)	(64.8)	(311.6)	(968.4)	231.8	(1,200.2)	>100.0
Fuel Subsidy - SESB	(61.4)	(74.9)	(86.4)	(222.7)	(169.3)	(53.4)	31.5
<b>Total Cost of Generation</b>	<b>7,346.8</b>	<b>7,588.9</b>	<b>7,113.5</b>	<b>22,049.2</b>	<b>20,303.2</b>	<b>1,746.0</b>	<b>8.6</b>
<b>Staff Costs</b>	<b>729.2</b>	<b>1,014.0</b>	<b>996.1</b>	<b>2,739.3</b>	<b>2,899.3</b>	<b>(160.0)</b>	<b>(5.5)</b>
Repair & Maintenance	460.7	489.4	530.6	1,480.7	1,466.2	14.5	1.0
TNB General Expenses	494.7	512.3	503.1	1,510.1	1,325.8	184.3	13.9
Subs. Cost of Sales & Opex □	446.3	180.8	188.7	815.8	1,339.1	(523.3)	(39.1)
<b>Total Non-Generation Costs</b>	<b>2,130.9</b>	<b>2,196.5</b>	<b>2,218.5</b>	<b>6,545.9</b>	<b>7,030.4</b>	<b>(484.5)</b>	<b>(6.9)</b>
<b>Total Operating Expenses</b>	<b>9,477.7</b>	<b>9,785.4</b>	<b>9,332.0</b>	<b>28,595.1</b>	<b>27,333.6</b>	<b>1,261.5</b>	<b>4.6</b>
Depreciation & Amortisation	1,632.8	1,670.5	1,718.8	5,022.1	4,706.6	315.5	6.7
<b>Total Operating Expenses</b>	<b>11,110.5</b>	<b>11,455.9</b>	<b>11,050.8</b>	<b>33,617.2</b>	<b>32,040.2</b>	<b>1,577.0</b>	<b>4.9</b>

- Restatement of 1QFY'19 previously reported as capacity payment of RM1,149.5mil
- Reduction mainly due to reversal of LTIP provision in 1QFY'19
- Reduction mainly due to:
  - Lower impairment as follows
 

9MFY'19	9MFY'18
RM198.3mil GMR in 1QFY19	RM498.0mil GAMA in 2Q & 3QFY18
  - Lower Cost of Sales & OPEX of subsidiaries

## OPEX (without MFRS 16) against Revenue

57% 13% 7% 4% 4% 2%



Gen Cost Depn Staff Cost Gen Exp R & M Subs COS & OPEX

# Increase Y-o-Y Generation Costs due to Higher Gas Price & Consumption



## FINANCIAL DETAILS

## Y-o-Y FUEL COST

**Table A**

TNB & IPP Fuel Costs for Peninsula (RM mn)				
Fuel Type	9MFY'19	9MFY'18	Variance	
			RM mil	%
Coal	7,790.3	8,585.6	(795.3)	(9.3)
Gas	8,364.6	7,173.7	1,190.9	16.6
LNG	215.0	97.3	117.7	>100
Dist.	29.4	35.7	(6.3)	(17.6)
Oil	17.1	14.9	2.2	14.8
Solar	125.8	0.0	125.8	>100
Total*	16,542.2	15,907.2	635.0	4.0

\* Comprise TNB Fuel Costs & fuel payment to IPPs (part of Energy Payment)

**Table B**

TNB & IPP Units Generated for Peninsula (Gwh)				
Fuel Type	9MFY'19	9MFY'18	Variance	
			Gwh	%
Coal	51,289.3	52,372.8	(1,083.5)	(2.1)
Gas & LNG	40,366.2	38,557.0	1,809.2	4.7
Dist.	21.0	26.3	(5.3)	(20.2)
Oil	41.6	38.0	3.6	9.5
Hydro	2,458.7	3,671.1	(1,212.4)	(33.0)
Solar	503.9	0.0	503.9	>100
Total	94,680.7	94,665.2	15.5	0.0

**Table C**

Fuel Cost Related Data	9MFY'19	9MFY'18
Daily Average Gas Volume (mmscfd)	1,030	963
LNG Consumption (Days)	157	113
Average LNG Price (RM/mmbtu)	35.03	30.89
Average Piped Gas Price (RM/mmbtu)	28.70	24.70
Average Coal Price Delivered (USD/MT)(CIF)	81.7	94.8
Average Coal Price Delivered (RM/MT)(CIF)	337.6	379.9
Coal Consumption (mn MT)	22.0	22.8
Generation cost per unit (sen/kWh)	17.5	16.8

**Table D**

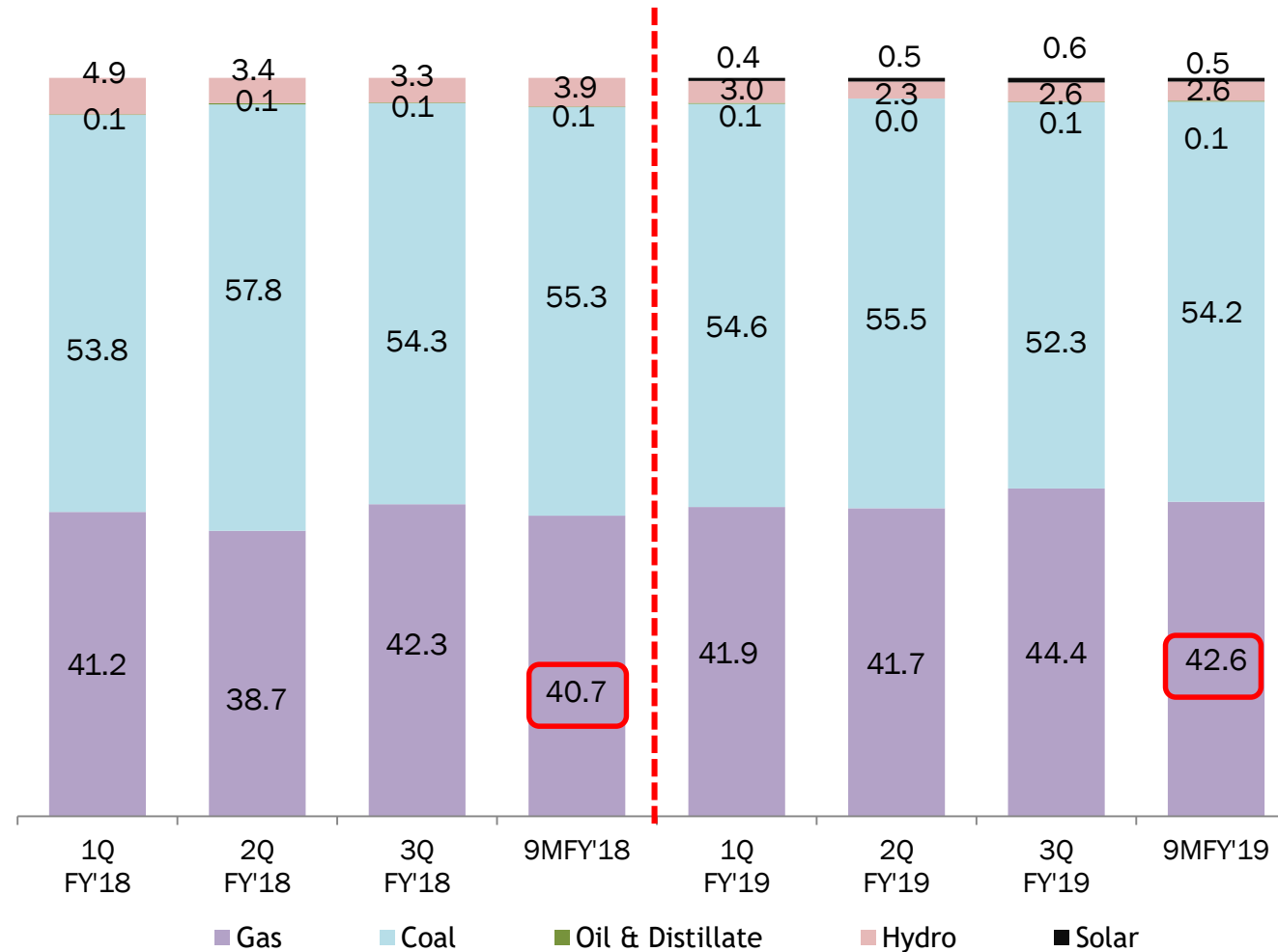
Average Coal Price Delivered (USD/MT)				
	9MFY'19	9MFY'18	Variance	
			USD	%
FOB	73.8	87.1	(13.3)	(15.3)
Freight	7.4	7.2	0.2	2.8
Others	0.5	0.5	0.0	0.0
CIF	81.7	94.8	(13.1)	(13.8)

# Higher Units Generated from Gas in 9MFY'19 Due to Coal Plant Outages



FINANCIAL DETAILS

GENERATION MIX



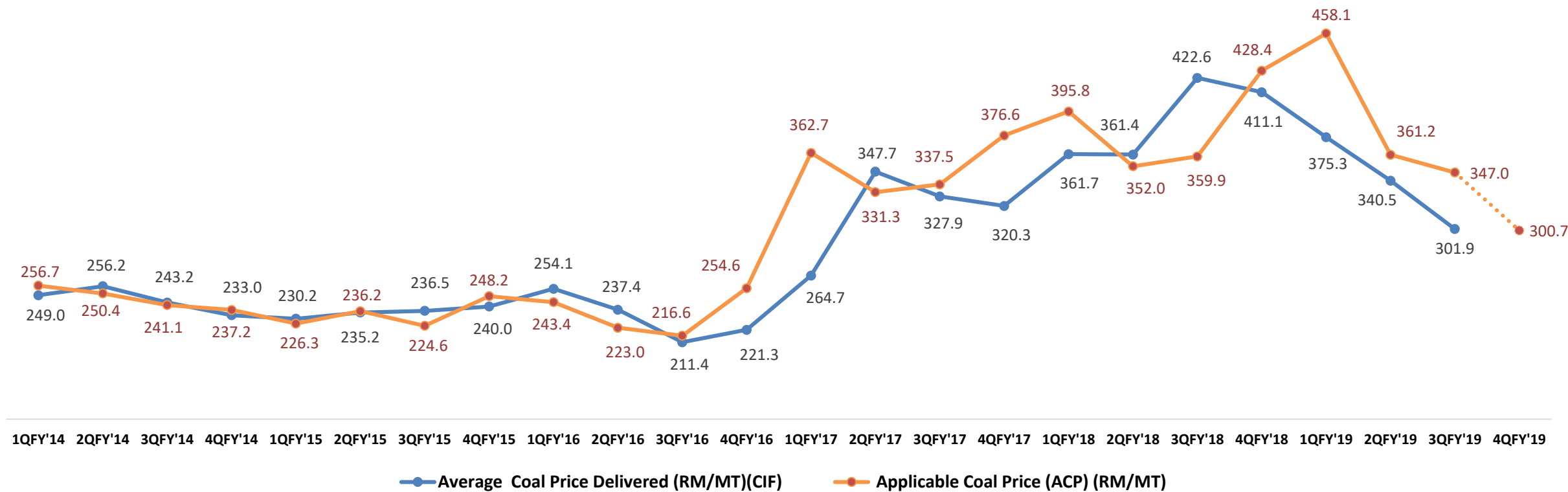
# Continuous Downward Trending of Coal Price will Relieve Pressure on Future ICPT



FINANCIAL DETAILS

COAL PRICE

Coal Price Trending





# Continuous Effective ICPT Implementation



## FINANCIAL DETAILS

## ICPT

	1QFY'18 (RM mil)	2QFY'18 (RM mil)	3QFY'18 (RM mil)	9MFY'18 (RM mil)	1QFY'19 (RM mil)	2QFY'19 (RM mil)	3QFY'19 (RM mil)	9MFY'19 (RM mil)
Reported Total Cost of Generation (with MFRS16)	6,146.9	6,625.8	7,530.5	20,303.2	6,092.3	6,302.6	5,903.4	18,298.3
Adjustment not related to IBR:	293.7	58.5	(464.6)	(112.4)	1,671.6	1,107.7	1,263.1	4,042.4
Fuel Price Adjustment	212.6	(22.0)	(422.4)	(231.8)	592.0	64.8	311.6	968.4
MFRS117/16 (Capacity payment)	262.8	315.3	264.4	842.5	1,254.5	1,286.3	1,210.1	3,750.9
SESB Net Generation Cost	(181.5)	(159.5)	(184.6)	(525.6)	(122.8)	(118.8)	(154.4)	(396.0)
LPL Fuel Cost	(0.2)	(75.3)	(122.0)	(197.5)	(52.1)	(124.6)	(104.2)	(280.9)
TNB Capacity and VOR: SLA & SPV	1,458.5	1,406.2	1,234.2	4,098.9	1,306.1	1,143.5	943.5	3,393.1
<b>Total Generation Costs (Related to IBR)</b>	<b>7,899.1</b>	<b>8,090.5</b>	<b>8,300.1</b>	<b>24,289.7</b>	<b>9,070.0</b>	<b>8,553.8</b>	<b>8,110.0</b>	<b>25,733.8</b>

	1QFY'18 (RM mil)	2QFY'18 (RM mil)	3QFY'18 (RM mil)	9MFY'18 (RM mil)	1QFY'19 (RM mil)	2QFY'19 (RM mil)	3QFY'19 (RM mil)	9MFY'19 (RM mil)
Single Buyer Actual Generation Costs: (A)	7,899.1	8,090.5	8,300.1	24,289.7	9,070.0	8,553.8	8,110.0	25,733.8
Actual Sales (Gwh)	27,069.5	29,001.1	28,920.4	84,991.0	28,471.1	30,050.0	29,230.4	87,751.5
Single Buyer Tariff (RM/kwh)	0.2705	0.2705	0.2705	0.2705	0.2705	0.2705	0.2705	0.2705
Actual Gen Cost Recovered (RM mn) (B)	7,322.3	7,844.8	7,821.4	22,988.5	7,701.4	8,127.4	7,906.3	23,735.1
<b>ICPT Surcharge (C)</b> <b>(C = A - B)</b>	<b>576.8</b>	<b>245.7</b>	<b>478.8</b>	<b>1,301.3</b>	<b>1,368.6</b>	<b>426.3</b>	<b>203.8</b>	<b>1,998.7</b>
(+) Prior Year Accounting Adjustment	57.3	(0.5)	0.8	57.6	0.5	(0.5)	0.0	0.0
<b>ICPT</b>	<b>634.1</b>	<b>245.2</b>	<b>479.6</b>	<b>1,358.9</b>	<b>1,369.1</b>	<b>425.8</b>	<b>203.8</b>	<b>1,998.7</b>

1

### Coal price & Applicable Coal Price (ACP) comparison

	1QFY19	2QFY19	3QFY19
Average Coal Price Delivered (RM/MT)	375.30	340.50	301.88
Average Coal Price Delivered (RM/mmBtu) *	17.16	15.56	13.90
ACP (RM/mmBtu) **	20.99	16.55	15.90

\* Based on internal conversion

\*\*Source : Energy Commission Website

In 3QFY'19, the base ACP (RM15.90/mmBtu) used for billing the generators is higher than the coal price paid to supplier (RM13.90/mmBtu). Hence, TNB Fuel over-recovered the differential amount from the generators. Any movement in FPA will be reconciled in the following quarters.

2

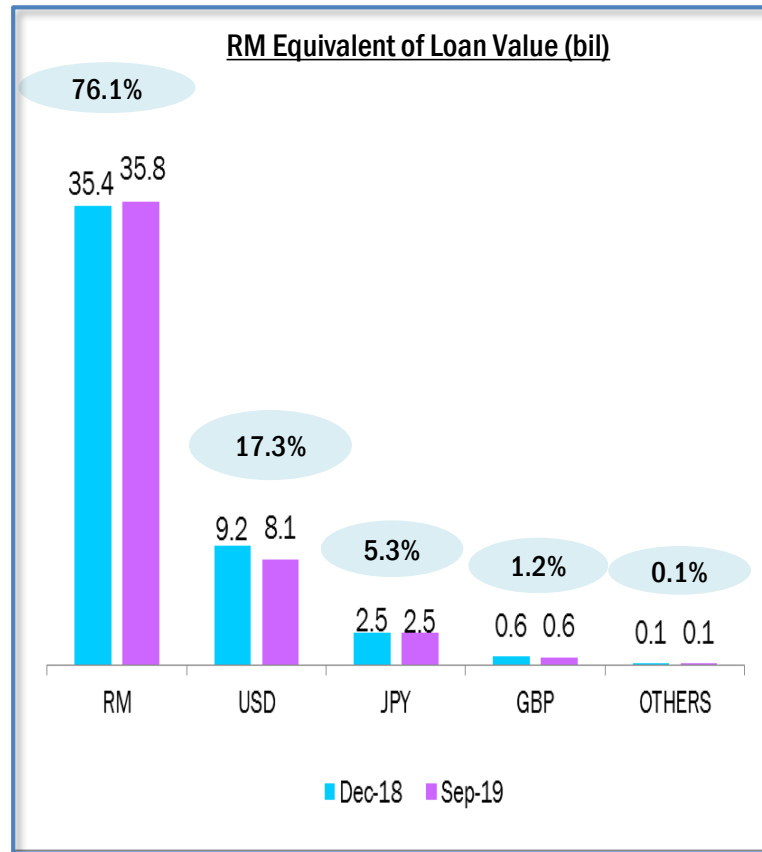
Higher due to MFRS 16 implementation effective 1<sup>st</sup> January 2019

# Gearing Level Registered at 44.4%



## FINANCIAL DETAILS

## GEARING



Note:  
Debt consists of Principal + Accrued Interest + Accounting Treatment (FRS139)

Statistics	30 <sup>th</sup> Sept'19	31 <sup>st</sup> Dec'18
Total Debt (RM' Bil)	1 47.0	47.8
Net Debt (RM' Bil)	30.3	29.6
Gearing (%)	44.4	44.8
Net Gearing (%)	28.6	27.7
Fixed : Floating	98:2	95:5
Final Exposure	98:2	95:5
Weighted Average Cost of Borrowing	2 5.04	4.98
Final Exposure	5.05	4.99

\* Net Debt excludes deposits, bank and cash balances & investment in UTF

\*\* Inclusive of interest rate swap

Closing FOREX	30 <sup>th</sup> Sept'19	31 <sup>st</sup> Dec'18
USD/RM	4.19	4.14
100YEN/RM	3.88	3.75
GBP/RM	5.15	5.27
USD/YEN	107.99	110.28

1 Lower mainly due to repayment of Mizuho Loan (USD300mil) amounting of RM1,242.5mil

2 Increase due to repayment of Mizuho Loan with lower interest rate

# Net MFRS16 Impact of RM202.7 million to the Group PAT



FINANCIAL DETAILS

MFRS16

As of 9MFY'19, the net impact of MFRS 16 is negative to the PAT by RM202.7mil

Profit & Loss Items (9MFY'19)			
RM mil	With MFRS 16	Without MFRS 16	Variance
Revenue	38,762.6	38,762.6	0.0
Capacity Payment	(214.1)	(3,469.1)	3,255.0
EBITDA	14,281.2	11,026.2	3,255.0
Depreciation	(7,424.2)	(5,022.1)	(2,402.1)
Finance Cost	(2,426.3)	(1,370.7)	(1,055.6)
Profit After Tax	3,860.9	4,063.6	(202.7)



01 KEY HIGHLIGHTS 

\$ FINANCIAL DETAILS 02

03 APPENDIX 

# Year-on-Year (Y-o-Y) Analysis



## APPENDIX 1

## P&L WITH MFRS 16

RM mil	9MFY'19	9MFY'18	Variance	
			RM mil	%
Revenue	38,762.6	37,845.7	916.9	2.4
Operating expenses (without depreciation)	(24,844.2)	(27,333.6)	2,489.4	(9.1)
Net loss on impairment of financial instruments	(413.9)	(200.9)	(213.0)	>100.0
Other operating income	776.7	574.0	202.7	35.3
<b>EBITDA</b>	<b>14,281.2</b>	<b>10,885.2</b>	<b>3,396.0</b>	<b>31.2</b>
EBITDA Margin (%)	36.8%	28.8%		
Depreciation	(7,424.2)	(4,706.6)	(2,717.6)	57.7
<b>EBIT</b>	<b>6,857.0</b>	<b>6,178.6</b>	<b>678.4</b>	<b>11.0</b>
<b>Foreign exchange:</b>				
- Transaction gain / (loss)	(81.5)	(13.6)	(67.9)	>100.0
- Translation gain / (loss)	(76.0)	(247.3)	171.3	(69.3)
Share of results of joint ventures	18.7	20.1	(1.4)	(7.0)
Share of results of associates	93.1	(183.9)	277.0	>(100.0)
<b>Profit before finance cost</b>	<b>6,811.3</b>	<b>5,753.9</b>	<b>1,057.4</b>	<b>18.4</b>
Fair value of financial instrument	(84.6)	8.8	(93.4)	>(100.0)
Finance income	402.5	282.9	119.6	42.3
Finance cost	(2,426.3)	(1,201.7)	(1,224.6)	>100.0
<b>Profit from ordinary activities before taxation</b>	<b>4,702.9</b>	<b>4,843.9</b>	<b>(141.0)</b>	<b>(2.9)</b>
<b>Taxation and Zakat:</b>				
- Company and subsidiaries	(945.5)	(900.5)	(45.0)	5.0
- Deferred taxation	103.5	(46.8)	150.3	>(100.0)
<b>Profit for the period</b>	<b>3,860.9</b>	<b>3,896.6</b>	<b>(35.7)</b>	<b>(0.9)</b>
<b>Attributable to:</b>				
- Owners of the Company	3,875.9	3,858.0	17.9	0.5
- Non-controlling interests	(15.0)	38.6	(53.6)	>100.0
<b>Profit for the period</b>	<b>3,860.9</b>	<b>3,896.6</b>	<b>(35.7)</b>	<b>(0.9)</b>

# Year-on-Year (Y-o-Y) Analysis without MFRS 16



## APPENDIX 2

## PROFIT & LOSS

RM mil	9MFY'19	9MFY'18	Variance	
			RM mil	%
Revenue	38,762.6	37,845.7	916.9	2.4
Operating expenses (without depreciation)	(28,099.2)	(27,333.6)	(765.6)	2.8
Net loss on impairment of financial instruments	(413.9)	(200.9)	(213.0)	>(100.0)
Other operating income	776.7	574.0	202.7	35.3
<b>EBITDA</b>	<b>11,026.2</b>	<b>10,885.2</b>	<b>141.0</b>	<b>1.3</b>
EBITDA Margin (%)	28.4%	28.8%		
Depreciation	(5,022.1)	(4,706.6)	(315.5)	6.7
<b>EBIT</b>	<b>6,004.1</b>	<b>6,178.6</b>	<b>(174.5)</b>	<b>(2.8)</b>
<b>Foreign exchange:</b>				
- Transaction gain / (loss)	(81.5)	(13.6)	(67.9)	>100.0
- Translation gain / (loss)	(76.0)	(247.3)	171.3	(69.3)
Share of results of joint ventures	18.7	20.1	(1.4)	(7.0)
Share of results of associates	93.1	(183.9)	277.0	>100.0
<b>Profit before finance cost</b>	<b>5,958.4</b>	<b>5,753.9</b>	<b>204.5</b>	<b>3.6</b>
Fair value of financial instrument	(84.6)	8.8	(93.4)	>(100.0)
Finance income	402.5	282.9	119.6	42.3
Finance cost	(1,370.7)	(1,201.7)	(169.0)	>100.0
<b>Profit from ordinary activities before taxation</b>	<b>4,905.6</b>	<b>4,843.9</b>	<b>61.7</b>	<b>1.3</b>
<b>Taxation and Zakat:</b>				
- Company and subsidiaries	(945.5)	(900.5)	(45.0)	5.0
- Deferred taxation	103.5	(46.8)	150.3	>100.0
<b>Profit for the period</b>	<b>4,063.6</b>	<b>3,896.6</b>	<b>167.0</b>	<b>4.3</b>
<b>Attributable to:</b>				
- Owners of the Company	4,078.6	3,858.0	220.6	5.7
- Non-controlling interests	(15.0)	38.6	(53.6)	>(100.0)
<b>Profit for the period</b>	<b>4,063.6</b>	<b>3,896.6</b>	<b>167.0</b>	<b>4.3</b>

# Quarter-on-Quarter (Q-o-Q) Analysis



## APPENDIX 3

## P&L WITH MFRS 16

RM mil	3QFY'19	2QFY'19	1QFY'19	Variance (3Q vs 2Q)	
				RM mil	%
Revenue	12,641.8	12,876.0	13,244.8	(234.2)	(1.8)
Operating expenses (without depreciation)	(8,121.9)	(8,499.1)	(8,223.2)	377.2	(4.4)
Net loss on impairment of financial instruments	(44.3)	(89.9)	(279.7)	45.6	(50.7)
Other operating income	328.3	226.9	221.5	101.4	44.7
<b>EBITDA</b>	<b>4,803.9</b>	<b>4,513.9</b>	<b>4,963.4</b>	<b>290.0</b>	<b>6.4</b>
EBITDA Margin (%)	38.0%	35.1%	37.5%		
Depreciation	(2,525.3)	(2,441.4)	(2,457.5)	(83.9)	3.4
<b>EBIT</b>	<b>2,278.6</b>	<b>2,072.5</b>	<b>2,505.9</b>	<b>206.1</b>	<b>9.9</b>
<b>Foreign exchange:</b>					
- Transaction gain / (loss)	(18.8)	(6.7)	(56.0)	(12.1)	>100.0
- Translation gain / (loss)	(67.3)	(272.2)	263.5	204.9	(75.3)
Share of results of joint ventures	6.6	6.3	5.8	0.3	4.8
Share of results of associates	23.1	81.9	(11.9)	(58.8)	(71.8)
<b>Profit before finance cost</b>	<b>2,222.2</b>	<b>1,881.8</b>	<b>2,707.3</b>	<b>340.4</b>	<b>18.1</b>
Fair value of financial instrument	(34.7)	7.6	(57.5)	(42.3)	>(100.0)
Finance income	140.7	133.5	128.3	7.2	5.4
Finance cost	(781.7)	(940.1)	(704.5)	158.4	(16.8)
<b>Profit from ordinary activities before taxation</b>	<b>1,546.5</b>	<b>1,082.8</b>	<b>2,073.6</b>	<b>463.7</b>	<b>42.8</b>
<b>Taxation and Zakat:</b>					
- Company and subsidiaries	(314.9)	(116.8)	(513.8)	(198.1)	>100.0
- Deferred taxation	(22.0)	164.1	(38.6)	(186.1)	>(100.0)
<b>Profit for the period</b>	<b>1,209.6</b>	<b>1,130.1</b>	<b>1,521.2</b>	<b>79.5</b>	<b>7.0</b>
<b>Attributable to:</b>					
- Owners of the Company	1,202.9	1,116.2	1,556.8	86.7	7.8
- Non-controlling interests	6.7	13.9	(35.6)	(7.2)	(51.8)
<b>Profit for the period</b>	<b>1,209.6</b>	<b>1,130.1</b>	<b>1,521.2</b>	<b>79.5</b>	<b>7.0</b>

### Notes:

- Q-o-Q EBITDA is higher due to:
  - Lower OPEX mainly due to lower generation costs.
  - Increase in other operating income mainly due to recognition of liquidated damages received by JEP of RM145.4mil.

# Quarter-on-Quarter (Q-o-Q) Analysis without MFRS 16



## APPENDIX 4

## PROFIT & LOSS

RM mil	3QFY'19	2QFY'19	1QFY'19	Variance (3Q vs 2Q)	
				RM mil	%
Revenue	12,641.8	12,876.0	13,244.8	(234.2)	(1.8)
Operating expenses (without depreciation)	(9,184.0)	(9,601.9)	(9,313.3)	417.9	(4.4)
Net loss on impairment of financial instruments	(44.3)	(89.9)	(279.7)	45.6	(50.7)
Other operating income	328.3	226.9	221.5	101.4	44.7
<b>EBITDA</b>	<b>3,741.8</b>	<b>3,411.1</b>	<b>3,873.3</b>	<b>330.7</b>	<b>9.7</b>
EBITDA Margin (%)	29.6%	26.5%	29.2%		
Depreciation	(1,718.8)	(1,670.5)	(1,632.8)	(48.3)	2.9
<b>EBIT</b>	<b>2,023.0</b>	<b>1,740.6</b>	<b>2,240.5</b>	<b>282.4</b>	<b>16.2</b>
<b>Foreign exchange:</b>					
- Transaction gain / (loss)	(18.8)	(6.7)	(56.0)	(12.1)	>100.0
- Translation gain / (loss)	(67.3)	(272.2)	263.5	204.9	(75.3)
Share of results of joint ventures	6.6	6.3	5.8	0.3	4.8
Share of results of associates	23.1	81.9	(11.9)	(58.8)	(71.8)
<b>Profit before finance cost</b>	<b>1,966.6</b>	<b>1,549.9</b>	<b>2,441.9</b>	<b>416.7</b>	<b>26.9</b>
Fair value of financial instrument	(34.7)	7.6	(57.5)	(42.3)	>(100.0)
Finance income	140.7	133.5	128.3	7.2	5.4
Finance cost	(435.6)	(473.2)	(461.9)	37.6	(7.9)
<b>Profit from ordinary activities before taxation</b>	<b>1,637.0</b>	<b>1,217.8</b>	<b>2,050.8</b>	<b>419.2</b>	<b>34.4</b>
<b>Taxation and Zakat:</b>					
- Company and subsidiaries	(314.9)	(116.8)	(513.8)	(198.1)	>100.0
- Deferred taxation	(22.0)	164.1	(38.6)	(186.1)	>(100.0)
<b>Profit for the period</b>	<b>1,300.1</b>	<b>1,265.1</b>	<b>1,498.4</b>	<b>35.0</b>	<b>2.8</b>
<b>Attributable to:</b>					
- Owners of the Company	1,293.4	1,251.2	1,534.0	42.2	3.4
- Non-controlling interests	6.7	13.9	(35.6)	(7.2)	(51.8)
<b>Profit for the period</b>	<b>1,300.1</b>	<b>1,265.1</b>	<b>1,498.4</b>	<b>35.0</b>	<b>2.8</b>



# Other Regulatory Adjustment (Part 1)



## APPENDIX 5

## REGULATORY ADJ.

Components of Other Regulatory Adjustment	1QFY'19 (RM mil)	2QFY'19 (RM mil)	3QFY'19 (RM mil)	YTD 9MFY'19 (RM mil)
Excess Revenue for Revenue Cap & Price Cap	218.7	223.9	198.6	641.2
Refund of Excess Single Buyer Working Capital	15.9	15.9	15.9	47.7
Refund of Interests on Customer Deposits	15.5	15.5	15.5	46.5
Refund of Other Income Related to Regulated Business <sup>1</sup>	93.5	30.3	53.0	176.8
CAPEX ECS (Efficiency Carryover Scheme) <sup>2</sup>	51.1	0.0	0.0	51.1
OPEX ECS (Efficiency Carryover Scheme)	129.2	0.0	0.0	129.2
	523.9	285.6	283.0	1,092.5

1

- Refund of Other Income Related to Regulated Business for 1QFY'19 (Jan-Mar'19) is RM93.5mil, which includes the actual amount of Oct'18 – Dec'18 of RM74.2mil.

- The major components of the Refund of Other Income Related to Regulated Business are sales of scrap and Minimum Monthly Charge. Minimum Monthly Charge is referred to the minimum amount charged to consumers with zero consumption. The amount collected however formed part of Other Regulatory Adjustment as the regulated entities already earned from the regulated asset base derived from the CAPEX spent on building up the electricity infrastructure regardless of consumption.

2

- The **CAPEX Efficiency Carry-Over Scheme (ECS)** adjustment shares the savings where actual CAPEX are lower than the approved levels included in Annual Revenue Requirements between the regulated business entities (RBE) and electricity customers. The balance of the **one-off** financing benefits to be returned from the unspent CAPEX in RP1 was recorded in this quarter at RM51.1mil.
- The **OPEX Efficiency Carry-Over Scheme (ECS)** adjustment is intended to ensure that each RBE retains the same benefit or incurs the same cost of outperforming or underperforming, respectively, against forecast operating expenditures in any given year of the Regulatory Period. This ensures that the RBE is indifferent as to the timing of making improvements in the efficiency of operating expenditures. The **one-off** net penalty for RP1 to be returned is RM129.2mil

# Other Regulatory Adjustment (Part 2)



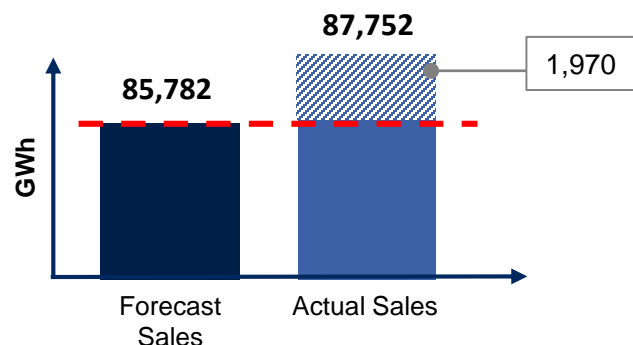
## APPENDIX 6

## REGULATORY ADJ.

### Revenue Cap (Transmission, Dist. Net, GSO & SBO)

- Revenue cap entities are not allowed to earn a revenue higher than their allowed annual revenue. Any excess must be passed-through to the customers via cost and revenue adjustment mechanism
- For 9MFY'19, higher actual sales leads to higher revenue earned by the revenue cap entities

9MFY'19 Variations in Sales  
(in GWh)

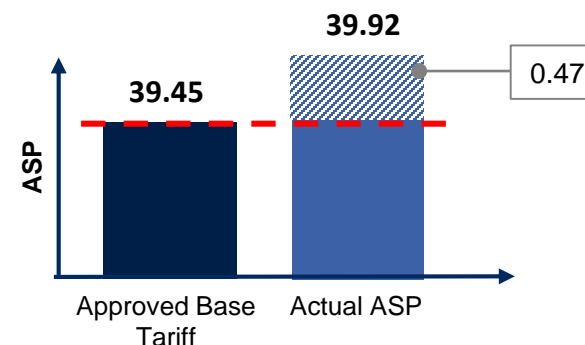


Business Entities	Allowed Tariff (sen/kWh)	Variations in Sales (GWh)	Adjustment (RM mil)
Revenue Cap Entities	11.36	+ 1,970	223.8

### Price Cap (Customer Service/Retail)

- Any excess revenue earned due to higher Average Selling Price (ASP) compared to Base Tariff must be passed-through to the customers via cost and revenue adjustment mechanism
- For 9MFY'19, the ASP is recorded to be higher than the Base Tariff

9MFY'19 Variations in ASP  
(sen/kWh)



Business Entities	Actual Sales (GWh)	Variations in ASP (sen/kWh)	Adjustment (RM mil)
Price Cap Entity	87,752	+ 0.47	417.4 *

\* Numbers manually computed will not match due to decimal variance

# Operating Expenses



## APPENDIX 7

## OPEX WITH MFRS 16

	1QFY'19 (RM mil)	2QFY'19 (RM mil)	3QFY'19 (RM mil)	9MFY'19 (RM mil)	9MFY'18 (RM mil)	Variance (9MFY'19 vs 9MFY'18)	
						RM mil	%
Non-TNB IPPs Costs	3,581.0	3,210.2	3,535.9	10,327.1	11,809.4	(1,482.3)	(12.6)
Capacity Payment	59.4	43.6	111.1	214.1	3,113.4	(2,899.3)	(93.1)
Energy Payment	3,521.6	3,166.6	3,424.8	10,113.0	8,696.0	1,417.0	16.3
TNB Fuel Costs	2,511.3	3,092.4	2,367.5	7,971.2	8,493.8	(522.6)	(6.2)
Fuel Costs	3,164.7	3,232.1	2,765.5	9,162.3	8,431.3	731.0	8.7
Fuel Price Adjustment	(592.0)	(64.8)	(311.6)	(968.4)	231.8	(1,200.2)	(517.8)
Fuel Subsidy - SESB	(61.4)	(74.9)	(86.4)	(222.7)	(169.3)	(53.4)	31.5
Total Cost of Generation	6,092.3	6,302.6	5,903.4	18,298.3	20,303.2	(2,004.9)	(9.9)
Staff Costs	729.2	1,014.0	996.1	2,739.3	2,899.3	(160.0)	(5.5)
Repair & Maintenance	460.7	489.4	530.6	1,480.7	1,466.2	14.5	1.0
TNB General Expenses	494.7	512.3	503.1	1,510.1	1,325.8	184.3	13.9
Subs. Cost of Sales & Opex	446.3	180.8	188.7	815.8	1,339.1	(523.3)	(39.1)
Total Non-Generation Costs	2,130.9	2,196.5	2,218.5	6,545.9	7,030.4	(484.5)	(6.9)
Total Operating Expenses	8,223.2	8,499.1	8,121.9	24,844.2	27,333.6	(2,489.4)	(9.1)
Depreciation & Amortisation	2,457.5	2,441.4	2,525.3	7,424.2	4,706.6	2,717.6	57.7
Total Operating Expenses	10,680.7	10,940.5	10,647.2	32,268.4	32,040.2	228.2	0.7

- 1 MFRS 16 adjustments :  
1. Exclusion of capacity payment RM1,062.1mil  
2. Inclusion of depreciation RM806.5mil
- 2 Details of FPA can be cross-referenced in ICPT slide
- 3 Lower in 1QFY'19 due to reversal of LTIP provision
- 4 Higher in 1QFY'19 mainly due to impairment for GMR of RM198.3mil

# Lower Fuel Costs for Peninsula in 3QFY'19 due Lower Coal Price & Consumption



## APPENDIX 8

### Q-o-Q FUEL COST

**Table A**

TNB & IPP Fuel Costs Peninsula (RM mil)					
Fuel Type	3QFY'19	2QFY'19	1QFY'19	Variance 3Q VS 2Q	
				RM mil	%
Gas	2,948.7	2,727.7	2,688.2	221.0	8.2
Coal	2,163.1	2,841.1	2,786.1	(678.0)	(24.3)
LNG	31.3	139.6	44.1	(108.3)	>100
Dist.	13.5	1.9	14.0	11.6	82.9
Oil	4.8	3.0	9.3	1.8	19.4
Solar	45.7	42.2	37.9	3.5	9.2
Total*	5,207.1	5,755.5	5,579.6	(548.4)	(9.8)

\* Comprise TNB Fuel Costs & fuel payment to IPPs (part of Energy Payment)

**Table B**

TNB & IPP Units Generated Peninsula (Gwh)					
Fuel Type	3QFY'19	2QFY'19	1QFY'19	Variance 3Q VS 2Q	
				Gwh	%
Gas & LNG	13,899.8	13,298.7	13,167.7	601.1	4.6
Coal	16,391.3	17,721.2	17,176.8	(1,329.9)	(7.7)
Dist.	0.30	-	20.7	0.3	>100
Oil	15.7	2.0	23.9	13.7	57.3
Hydro	809.9	734.1	914.7	75.8	8.3
Solar	200.8	162.8	140.3	38.0	27.1
Total	31,317.8	31,918.8	31,444.1	(601.0)	(1.9)

**Table C**

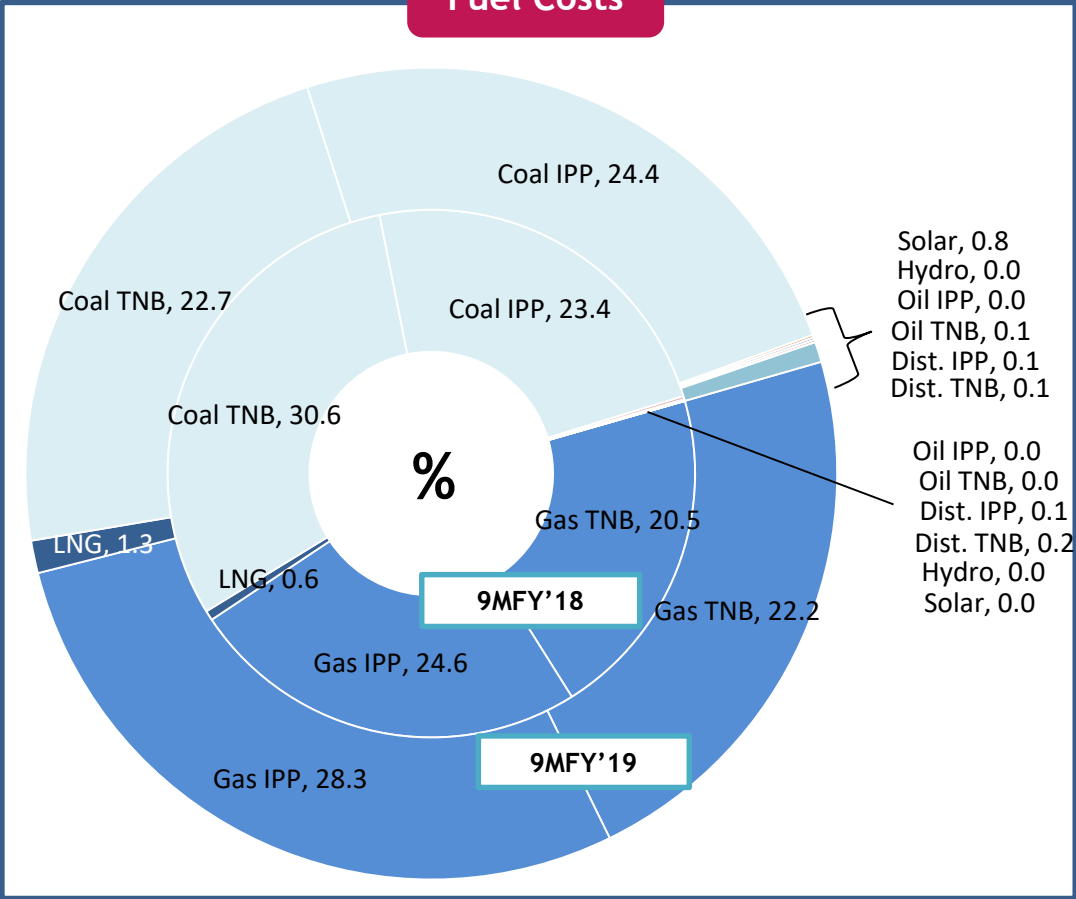
Fuel Cost Related Data	3QFY'19	2QFY'19	1QFY'19
Daily Average Gas Volume (mmscfd)	1,057	1,059	973
LNG Consumption (Days)	57	60	40
Average LNG Price (RM/mmbtu)	32.75	35.73	36.59
Average Piped Gas Price (RM/mmbtu)	28.70	27.20	27.20
Average Coal Price Delivered (USD/MT)(CIF)	72.4	82.1	91.8
Average Coal Price Delivered (RM/MT)(CIF)	301.9	340.5	375.3
Coal Consumption (mn MT)	7.1	7.6	7.3
Generation cost per unit (sen/kWh)	16.6	18.0	17.7

**Table D**

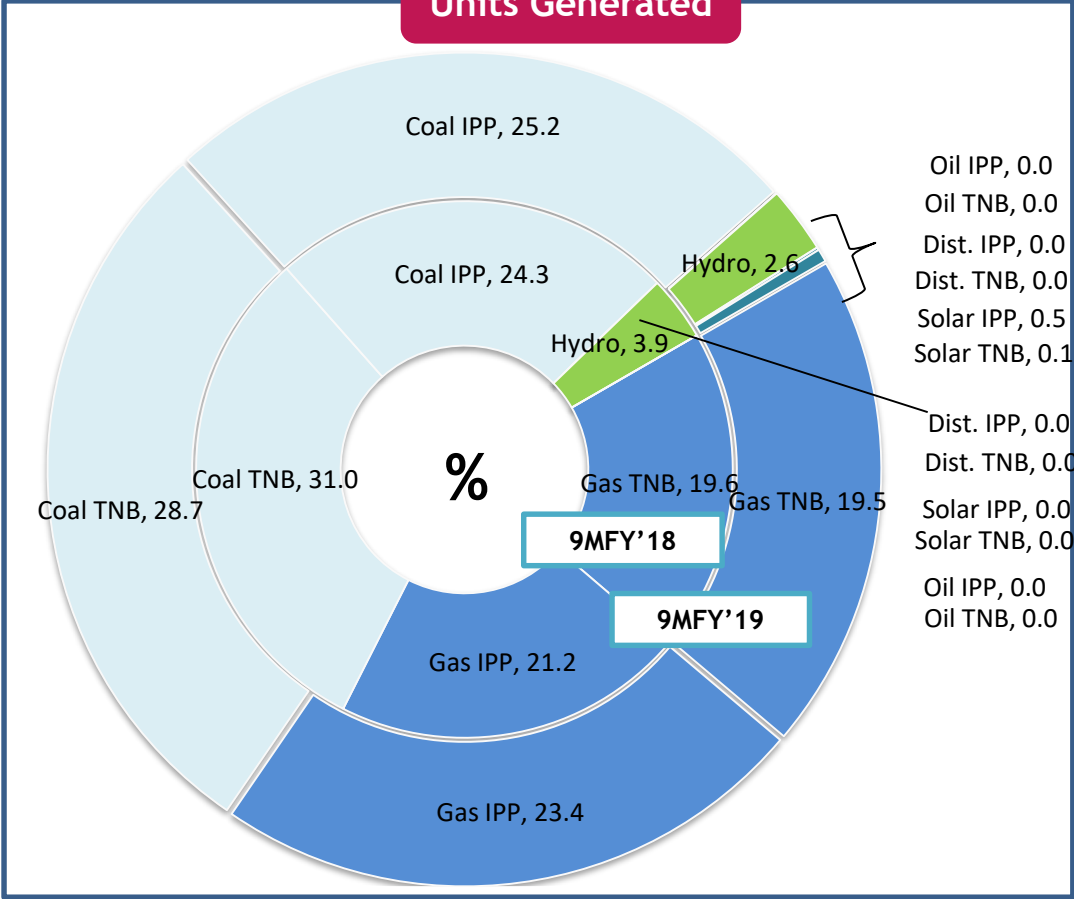
Average Coal Price Delivered (USD/MT)					
	3QFY'19	2QFY'19	1QFY'19	Variance 3Q v 2Q	
				USD	%
FOB	64.7	74.5	83.7	(9.2)	(11.0)
Freight	7.3	7.2	7.6	(0.4)	(5.5)
Others	0.4	0.4	0.5	(0.1)	(13.0)
CIF	72.4	82.1	91.8	(9.7)	(10.6)



Fuel Costs



Units Generated



% indicates generation market share

# 2019 Coal Requirement within Expectation

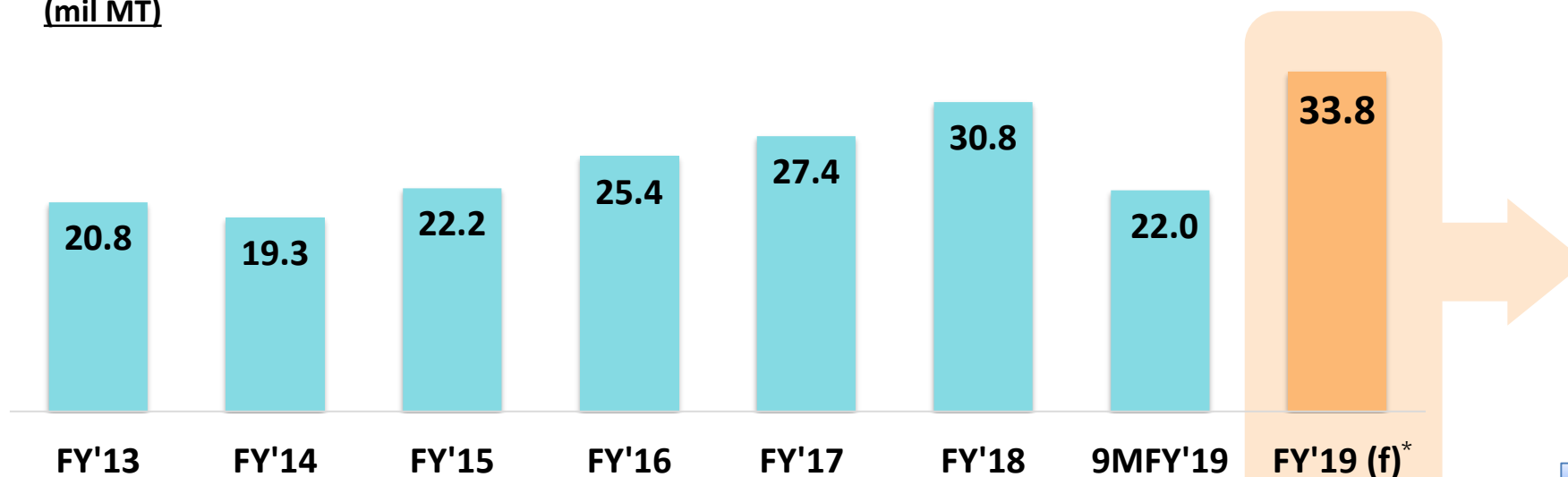


## APPENDIX 10

## COAL FORECAST

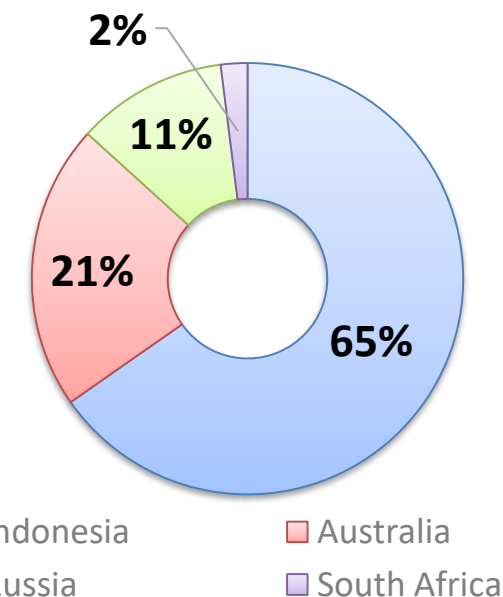
Average Coal Price (CIF)	FY'13	FY'14	FY'15	FY'16	FY'17	FY'18	9MFY'19
USD/metric tonne (MT)	83.6	75.4	66.0	55.7	72.7	95.9	81.7
RM/metric tonne (MT)	259.5	244.6	236.0	231.1	314.7	388.1	337.6

### Coal Consumption (mil MT)



\* Based on tonnage planned for delivery in FY'19

### Country Mix





Equivalent  
Plant Availability  
Factor (EAF)

**87.7%\***  
9MFY'18: 91.3%\*

*\*The figure is for all TNB plants*



System Minutes

**0.27 mins**  
9MFY'18 : 0.33 mins



SAIDI

**39.2 mins\***  
9MFY'18 : 35.3 mins\*

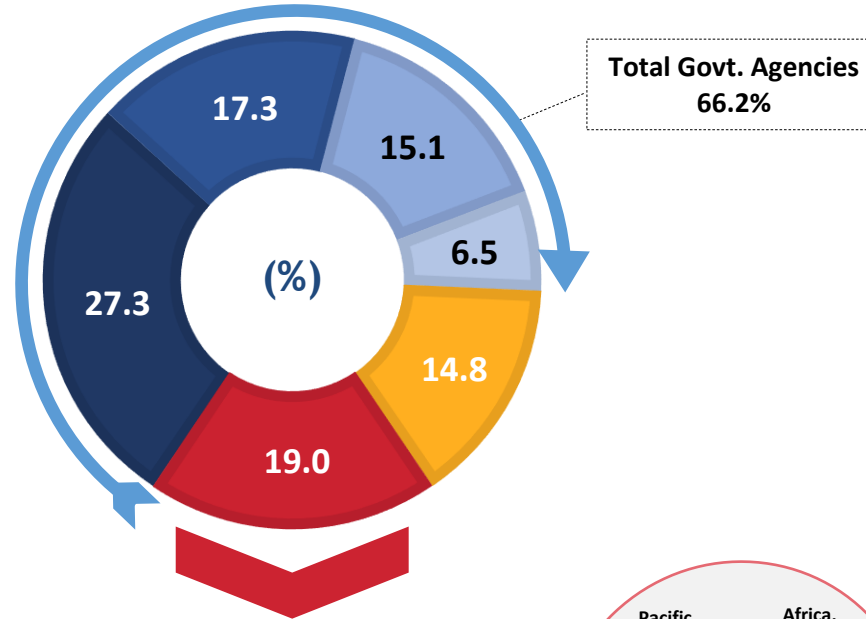
*\*The figure is for TNB SAIDI*



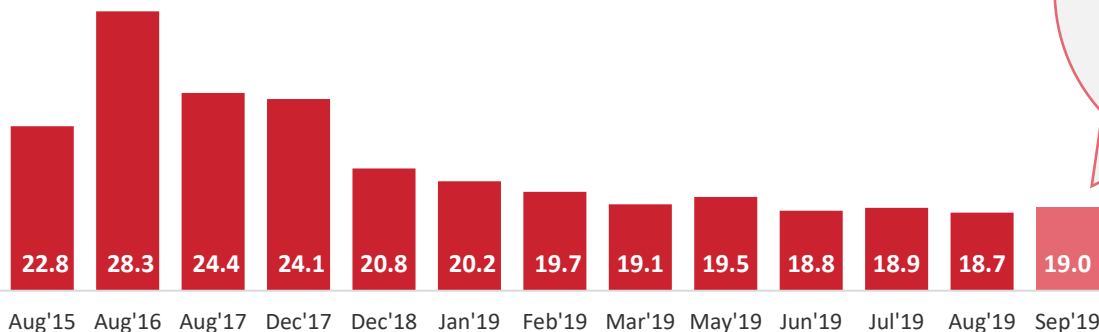
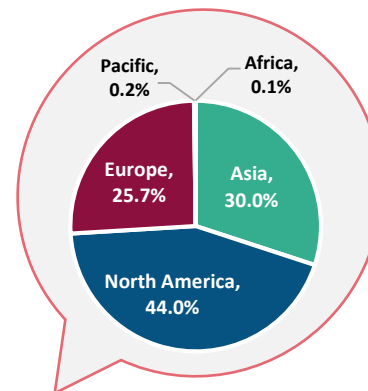


Shareholding as at Sep'19

- Khazanah Nasional Berhad
- Permodalan Nasional Berhad
- Employees Provident Fund Board
- Other Government Agencies
- Local Corporation & Retail
- Foreign Shareholding

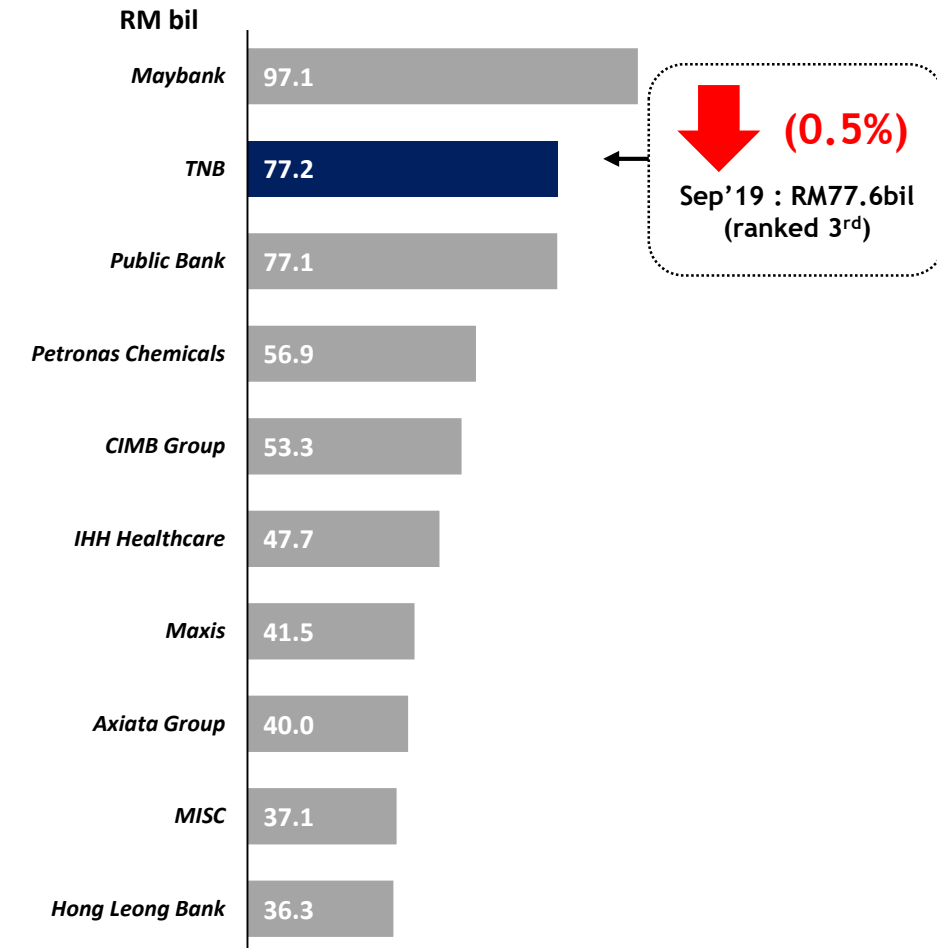


Foreign Shareholding (%)



Institutional: 18.95%  
Individual: 0.02%

Top 10 KLCI Stocks by Market Capitalization as at 25 Nov'19





An aerial photograph of several modern, multi-story office buildings. The buildings have a distinctive design with white, tiered facades and large, flat green roofs. They are situated in an urban environment with trees and other buildings visible in the background.

# THANK YOU

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