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Power

Cleaning up its act

May 2021

Tarun Bhatnagar

research@bobcaps.in

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POWER

18 May 2021

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India’s +5% p.a. power demand growth will be met by renewable capacity adds, which we expect will outpace coal by 2:1 in FY21-FY25, led by falling costs and rising green capital. Private sector share at 7% in T&D is set to grow as regulatory and financial pressures single state-owned players. TPWR, our top BUY, is aligned to the growing renewable and T&D segments, as is ADD-rated PWGR albeit with flattish asset addition. TPW and CESC (both ADD) lag in pivoting to new growth areas. NTPC’s (REDUCE) high coal exposure will see waning interest in an ESG world.

Tarun Bhatnagar
research@bobcaps.in

Sun shining on India’s power sector: We estimate that India’s power consumption can continue to increase at more than 5% per year over the next decade given expected GDP growth of over 5% and low per capita electricity consumption at just 30% of the global average, ~40% of that in Vietnam and 20% of that in China. The generation mix is already shifting towards renewables, primarily solar power given reduced prices (Rs 2-3/unit vs. >Rs 4 for coal) and environment concerns.

We estimate >15GW of renewable capacity additions and no new coal plants after the current pipeline of 33GW is completed by FY25. Until batteries become viable, the intermittency of renewable power generation can be managed by new coal/nuclear/hydro capacity and better forecasting of renewable supply.

Distribution presents a challenge and a Rs 6tn opportunity: State distribution company (discom) losses hit Rs 3.1tn over FY15-FY19 – 2.2% of India’s FY20 GDP – as subsidised tariffs, poor collections and weak infrastructure remain obstacles, resulting in average AT&C losses of >20%, double the global median.

Draft proposals in the Electricity Act 2020 – delicensing, financial aid subject to stiff conditions and penalties for bad services – would put pressure on states to accelerate privatisation, opening up a Rs 6tn market. The private sector’s share is just ~7% but operations are profitable with AT&C losses of <10%. Transmission, the best risk profile in the sector, will also need more private investments to manage growing demand, link new generation plants and curb volatility.

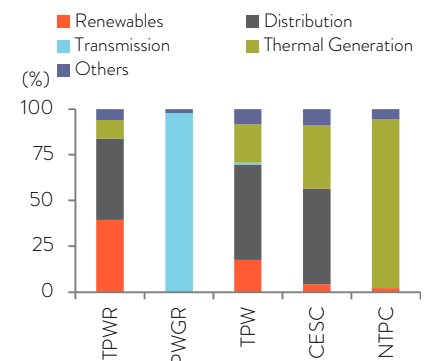
Prefer Tata Power: We initiate on Tata Power (TPWR) with BUY as the company has nimbly aligned to the growing renewable and distribution businesses, even as ongoing restructuring will save costs. PWGR (ADD) has pivoted to the growing transmission segment, but asset addition is likely to be sedate given a thin order backlog. CESC and Torrent Power (TPW) are rated ADD as they lag in shifting to new growth areas, while NTPC’s coal exposure warrants a REDUCE rating.

RECOMMENDATION SNAPSHOT

Ticker	Price	Target	Rating
TPWR IN	102	131	BUY
PWGR IN	229	261	ADD
TPW IN	428	461	ADD
CESC IN	674	721	ADD
NTPC IN	111	111	REDUCE

Price & Target in Rupees | Price as of 14 May 2021

FY22E EBITDA MIX



Source: Company, BOBCAPS Research

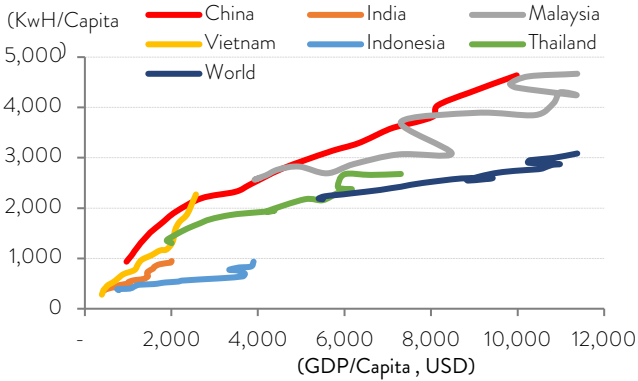


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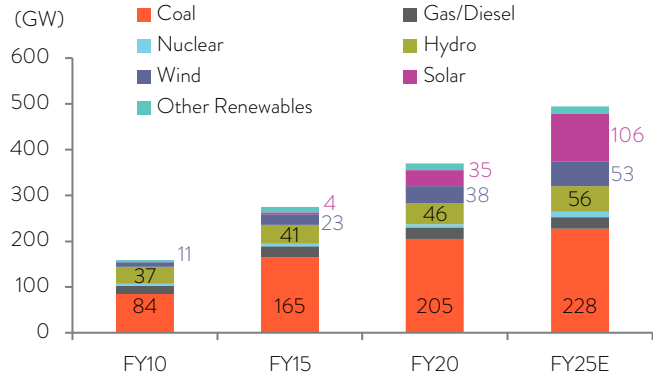
Focus charts

FIG 1 – GLOBAL POWER CONSUMPTION DRIVEN BY GDP GROWTH, 2000-18



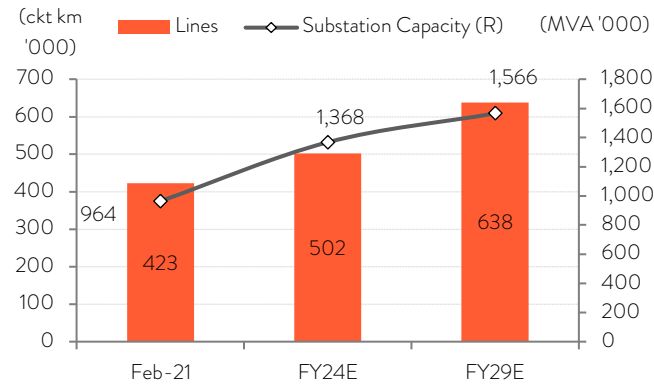
Source: World Bank, BOBCAPS Research

FIG 2 – INDIA'S GENERATION MIX SHIFTING TO RENEWABLES (WIND AND SOLAR)



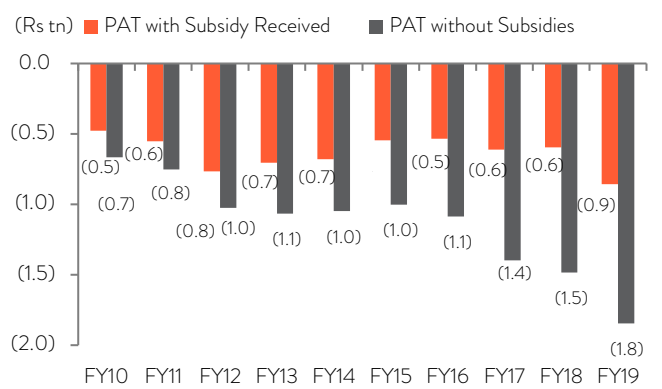
Source: CEA, BOBCAPS Research

FIG 3 – INDIA'S TRANSMISSION CAPEX TO GROW AT >5% DURING FY21E-FY29E



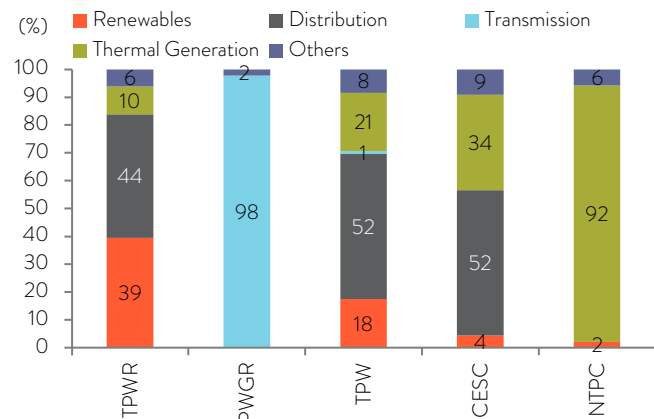
Source: Adani Transmission, CEA

FIG 4 – DISCOM LOSSES ON THE RISE; TOUGH NORMS COULD FUEL PRIVATE GROWTH



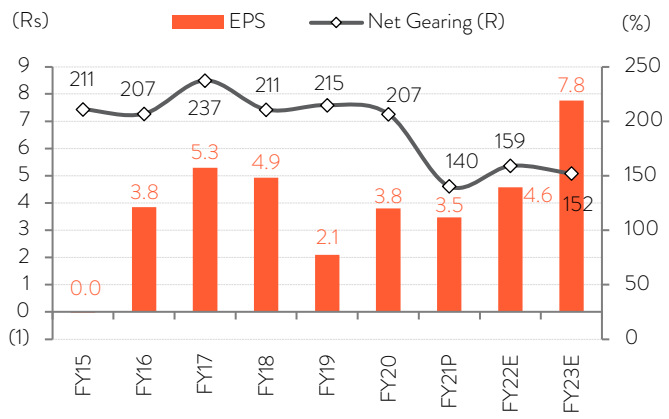
Source: Power Finance Corporation

FIG 5 – TPWR AND PWGR HAVE LARGEST EBITDA CONTRIBUTION FROM GROWING SEGMENTS



Source: Company, BOBCAPS Research

FIG 6 – TPWR OUR TOP PICK – EPS MOVING UP, GEARING DECLINING



Source: Company, BOBCAPS Research

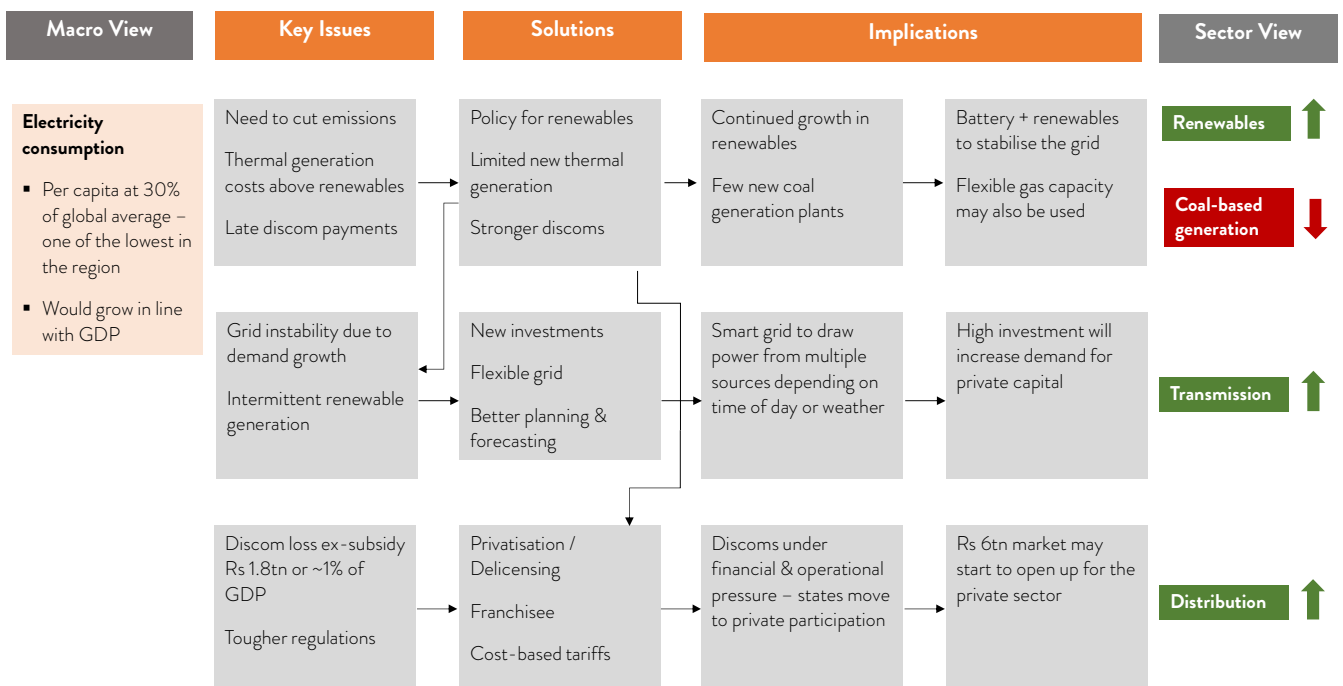
Investment summary

India’s growing electricity consumption (up 1.9x over FY11-FY21) should have translated into a good performance by utility stocks, but instead the sector has underperformed the market in seven of the last ten years due to over-investment in thermal generation and the perennially poor financial health of state-owned power distribution companies (discoms).

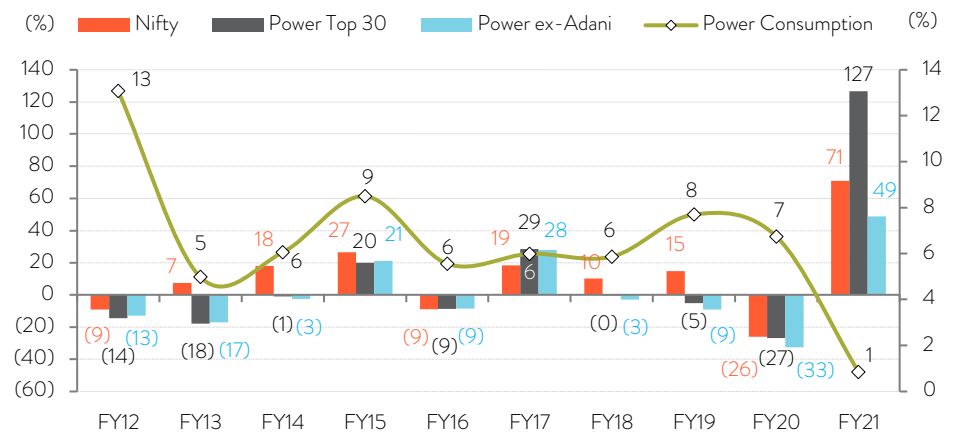
Over FY21-FY30, we expect steady growth in electricity consumption alongside stronger capex discipline, distribution sector reform, sustained growth in renewable energy generation, and rising private sector participation in the transmission space. We, therefore, prefer companies with higher exposure to the renewable, distribution and transmission segments.

TPWR, which has been the fastest to align to these growth areas, is our top pick in the sector. CESC and TPW, on which we have ADD ratings, are behind TPWR in recalibrating their models, while NTPC continues to have considerable exposure to thermal generation and hence carries a REDUCE rating.

FIG 7 – INDIA’S POWER SECTOR: ISSUES – SOLUTIONS – IMPLICATIONS



Source: BOBCAPS Research

FIG 8 – YOY SECTOR RETURNS WEAK DESPITE CONSISTENT GROWTH IN POWER CONSUMPTION


Source: Bloomberg, BOBCAPS Research

Tata Power our top pick

We have evaluated utility stocks based on subsegment exposure, earnings outlook (derived from residual tenure of the concession), balance sheet health, valuation and stock catalysts. TPWR is our top pick in the sector as the company has nimbly aligned to the growing renewables and distribution businesses, even as ongoing business restructuring will save costs.

- **Tata Power (TPWR, BUY):** We expect TPWR to derive >80% of forecast FY22 EBITDA and 55% of valuations from fast-growing segments such as power distribution (#1 player), renewable generation (among top 10), solar EPC (#1) and rooftop solar solutions (#1).

The company has made good progress on debt reduction in FY21 and we believe deleveraging will continue in FY22 as fresh investments flow into the renewables business. These investments are also likely to come in at a significant premium to TPWR's current valuation, given the higher value ascribed to listed pure-play Indian renewable peers. We expect deleveraging and EBITDA growth to spur an FY21-FY23 EPS CAGR of 49%, even as merger of the lossmaking CGPL plant into the parent is likely to save taxes. Initiate with BUY, Mar'22 TP Rs 131.

- **Power Grid (PWGR, ADD):** Power Grid (PWGR) owns 40% of India's transmission assets – the lowest-risk segment in the power sector due to a secure payments system and high dependence of discoms and generators on the transmission network. Private sector participation in transmission may increase but inherent entry barriers are likely to keep competition in check. Further, a majority of the company's assets will remain under the protected cost-plus-regulated return model. Valuations are also attractive at 7.2x FY22E EV/EBITDA.

However, the decline in order backlog and asset addition since FY16 is unlikely to reverse in the medium term. In addition, with the InvIT listed, we do not see any emerging stock price catalysts. Initiate with ADD, Mar'22 TP Rs 261.

- **Torrent Power (TPW, ADD):** TPW's two decades of experience in distribution puts the company in a good position to win more circles as the power distribution sector opens up. But renewal of the flagship Ahmedabad contract in 2025 and tariff renewal this year are concerns. Meanwhile, the company's stranded gas plant DGen will continue to struggle for PPAs as demand for gas-based power remains weak. TPW is trading at its peak FY22E EV/EBITDA of 7.2x. Initiate with ADD, Mar'22 TP Rs 461.
- **CESC (CESC, ADD):** CESC has decades of power distribution experience in Kolkata and Greater Noida, besides running a franchisee model. However, the company has no ongoing growth initiatives and hence we expect flattish EPS for FY21-FY23. Distribution is its only focus area – any new contract wins will be a stock trigger, but opportunities are limited and at least three other peers have similar experience with stronger financial muscle. Current low valuations at 5.6x FY22E EV/EBITDA – one standard deviation below the mean – should provide downward support. Initiate with ADD, Mar'22 TP Rs 721.
- **NTPC (NTPC, REDUCE):** NTPC's 62GW generation capacity as at end-FY20 is 17% of India's total and 22% of coal-based capacity. The company offers low-risk earnings visibility as >90% of its current portfolio earns regulated returns protected from cost increases. We expect assured earnings share to remain high at 90% even in FY25 despite a focus on renewables.

ESG (environment, social and governance) concerns will, however, deter global investors due to NTPC's large coal exposure. The stock's current valuation of 7.2x FY22E EV/EBITDA is below the median – initiate with REDUCE, Mar'22 TP Rs 111.

FIG 9 – STOCK SELECTION – DARKER THE SHADING HIGHER THE POSITIVE FACTOR

Factor	TPWR	PWGR	TPW	CESC	NTPC
EBITDA Exposure FY22E (%)					
Generation - Renewables	39		18	4	2
Distribution	44		52	52	-
Transmission	-	98	1	-	-
Generation - Thermal	10		21	34	92
Others	6	2	8	9	6
Earnings Visibility (years)	19	25	8	16	17
FY21E-23E Growth CAGR (%)					
EPS	49.3	7.4	15.4	1.9	12.5
EBITDA	11.4	3.9	9.9	4.6	9.2
Valuation Multiples					
FY22E P/E (x)	22.2	9.9	13.6	6.8	6.6
FY22E EV/EBITDA (x)	7.9	7.1	6.8	5.6	7.5
FY22E Dividend Yield (%)	1.9	5.1	2.2	6.8	4.6
Balance Sheet					
FY22E Net Debt/EBITDA (x)	5.2	3.7	1.3	3.1	4.9
Catalysts					
Positive	Renewable stake sale	Project Wins	Distribution wins	Distribution wins	Growing renewables
	Restructuring for tax saving		DNH & DD privatisation goes ahead		New plant completions
	Distribution wins				
Negative	Higher coal prices leading to losses at CGPL	More projects are opened up for the private sector	Continued higher gas prices		Strict policies related to coal

Source: Company, BOBCAPS Research

Coverage snapshot and Peer comparison

FIG 10 – COVERAGE SNAPSHOT

Company	Ticker	MCap (US\$ bn)	CMP (Rs)	TP (Rs)	Rating	Upside (%)
Tata Power	TPWR IN	4.4	102	131	BUY	29.0
Power Grid	PWGR IN	16.3	229	261	ADD	14.0
Torrent Power	TPW IN	2.8	428	461	ADD	8.0
CESC	CESC IN	1.2	674	721	ADD	7.0
NTPC	NTPC IN	14.7	111	111	REDUCE	0.0

Source: Bloomberg, BOBCAPS Research

FIG 11 – PEER COMPARISON

Company	Bloomberg Ticker	MCAp (US\$ bn)	Rating	Price Currency	CMP	Cons. Mean TP	Upside (%)	Daily Tr. Vol. 3M Avg (US\$ mn)	EPS Growth (%)		P/E (x)		P/B (x)		EV/ EBITDA (x)		Dividend Yield (%)	Net Debt/ EBITDA (x)
									FY21E	FY22E	FY21E	FY22E	FY21E	FY22E	FY21E	FY22E	FY22E	FY22E
Adani Green	ADANIGR IN	23.2	NR	INR	1,088	NA	NA	17.5	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Adani Transmission	ADANIT IN	17.2	NR	INR	1,143	245	(78.6)	18.1	30.7	NA	86.6	NA	NA	NA	NA	NA	NA	NA
Power Grid	PWGR IN	16.3	ADD	INR	229	246	7.6	41.9	10.8	5.2	9.3	8.8	1.6	1.5	6.7	6.2	5.8	3.5
NTPC	NTPC IN	14.7	REDUCE	INR	111	144	29.0	38.4	7.5	19.5	7.2	6.0	0.8	0.8	7.6	6.5	5.7	4.7
Adani Power	ADANI IN	5.0	NR	INR	96	64	(33.5)	28.8	114.3	NA	63.9	NA	NA	NA	NA	NA	NA	NA
Tata Power*	TPWR IN	4.4	BUY	INR	102	120	18.0	85.6	15.7	12.7	14.3	12.7	1.4	1.3	8.1	NA	1.6	4.1
Torrent Power	TPW IN	2.8	ADD	INR	428	422	(1.5)	10.7	18.3	9.3	14.7	13.4	1.9	1.7	7.2	6.6	2.0	1.7
JSW Energy	JSW IN	2.6	NR	INR	114	89	(21.8)	12.6	16.1	14.4	19.3	16.8	1.4	1.4	8.2	7.5	1.4	1.9
SJVN	SJVN IN	1.4	NR	INR	27	29	6.3	1.3	NA	NA	NA	NA	NA	NA	NA	NA	7.8	NA
CESC	CESC IN	1.2	ADD	INR	674	811	20.2	3.9	7.3	9.4	6.6	6.0	0.8	0.8	5.8	5.3	5.7	3.1
Aggregate		81.9					(10.3)	28.8	24.3	12.0	34.6	9.0	1.3	1.2	7.3	6.4	4.9	3.7

*Estimates for Tata Power under FY21 are for FY22 and under FY22 are for FY23

Company	Bloomberg Ticker	MCAp (US\$ bn)	Rating	Price Currency	CMP	Cons. Mean TP	Upside (%)	Daily Tr. Vol. 3M Avg (US\$ mn)	EPS Growth (%)		P/E (x)		P/B (x)		EV/ EBITDA (x)		Dividend Yield (%)	Net Debt/ EBITDA (x)
									2021E	2022E	2021E	2022E	2021E	2022E	2021E	2022E	2021E	2021E
China Yangtze Power	600900 CH	69.4	NR	CNY	19.7	24.2	23.0	186.8	(6.1)	3.5	17.7	17.1	2.5	2.4	12.3	11.5	3.7	2.0
CLP Holdings	2 HK	25.9	NR	HKD	79.5	88.0	10.7	35.9	6.0	4.2	16.6	15.9	1.7	1.6	10.8	10.1	4.0	1.7
CGN Power	1816 HK	19.5	NR	HKD	1.8	2.4	30.2	8.2	4.5	6.6	7.7	7.2	0.8	0.7	10.7	10.1	5.6	5.4
China National Nuclear Power	601985 CH	14.5	NR	CNY	5.4	6.3	17.0	59.1	9.8	12.0	12.9	11.5	1.3	1.2	10.7	9.7	3.0	7.6
Power Assets	6 HK	13.7	NR	HKD	49.8	50.6	1.6	20.2	6.9	1.9	16.2	15.9	1.2	1.2	81.9	82.8	5.7	0.6
SDIC Power Holdings	600886 CH	10.7	NR	CNY	9.9	11.2	13.8	44.3	4.9	11.3	12.1	10.9	1.4	1.3	8.5	7.8	2.7	5.0
China Longyuan Power	916 HK	10.2	NR	HKD	9.9	13.8	39.4	54.3	21.5	15.2	11.8	10.3	1.1	1.0	8.7	8.0	1.7	4.7
HK Electric	2638 HK	8.9	NR	HKD	7.8	8.5	8.1	4.3	0.1	4.0	24.3	23.4	1.5	1.5	15.6	15.1	4.2	6.6
Huaneng Power	902 HK	8.9	NR	HKD	2.8	4.1	46.7	8.1	982.5	17.3	5.3	4.5	0.3	0.3	7.4	7.2	8.9	5.9
China Resources Power	836 HK	6.2	NR	HKD	10.1	13.1	29.8	14.1	(0.9)	12.9	5.0	4.4	0.5	0.5	5.7	5.6	7.9	3.8
Aggregate		187.9					21.0	87.3	80.9	6.5	14.7	13.9	1.7	1.6	16.2	15.6	4.3	3.3

Company	Bloomberg Ticker	MCap (US\$ bn)	Rating	Price Currency	CMP	Cons. Mean TP	Upside (%)	Daily Tr. Vol. 3M Avg (US\$ mn)	EPS Growth (%)		P/E (x)		P/B (x)		EV/ EBITDA (x)		Dividend Yield (%)	Net Debt/ EBITDA (x)
									2021E	2022E	2021E	2022E	2021E	2022E	2021E	2022E	2021E	2021E
Tenaga Nasional	TNB MK	13.7	NR	MYR	9.9	12.6	28.0	10.8	33.8	4.1	11.7	11.2	1.0	1.0	5.6	5.4	5.4	2.2
Gulf Energy	GULF TB	12.3	NR	THB	32.8	38.9	18.9	21.7	76.3	39.7	47.7	34.2	5.2	4.7	31.1	23.9	1.2	9.0
Energy Absolute	EA TB	7.1	NR	THB	59.8	64.4	7.8	37.3	25.2	19.4	34.2	28.6	6.6	5.5	22.6	20.5	0.6	3.8
Manila Electric	MER PM	6.5	NR	PHP	274.0	317.9	16.0	1.2	6.6	(2.5)	13.3	13.7	3.3	3.1	8.9	8.8	5.0	0.1
Global Power Synergy	GPSC TB	6.2	NR	THB	69.5	86.3	24.2	29.9	16.1	5.5	22.4	21.3	1.8	1.7	12.6	12.1	2.3	3.1
Aboitiz Power	AP PM	3.4	NR	PHP	22.1	31.7	43.8	1.1	24.4	26.5	10.4	8.2	1.2	1.1	8.3	7.2	3.6	4.0
Electricity Generating Co.	EGCO TB	2.9	NR	THB	171.5	252.5	47.2	11.3	22.1	13.1	8.4	7.4	0.8	0.8	14.3	12.6	4.1	5.1
Ratch Group	RATCH TB	2.3	NR	THB	50.3	69.4	38.1	7.8	10.6	9.5	10.5	9.6	1.1	1.1	14.4	12.6	5.2	4.6
Banpu Power	BPP TB	1.7	NR	THB	17.4	20.4	17.0	6.5	9.2	13.9	13.1	11.5	1.2	1.2	65.2	58.9	3.9	4.8
Cikarang Listrindo	POWR IJ	0.8	NR	IDR	690.0	938.5	36.0	0.3	69.7	-	6.0	6.0	1.2	1.0	4.2	3.9	8.3	0.5
Aggregate		56.8					23.8	16.5	34.5	17.6	23.3	19.2	3.0	2.7	17.1	14.7	3.3	4.1

Source: Bloomberg, BOBCAPS Research | NR – Not Rated

Generation: A green future

India’s estimated annual electricity demand growth of over 5% per annum will be met largely by renewable energy sources as the cost differential to coal continues to widen, cheap global capital flows continue and emission control becomes a key objective. However, the sharp decline in renewable tariffs will limit the industry to developers with a low cost of funds and/or high technical expertise and scale. Intermittency from renewables will need to be managed by the ~9% rise in net capacity from under-construction baseload thermal, nuclear and hydro projects coming up over FY22-FY25E, till energy storage becomes financially viable.

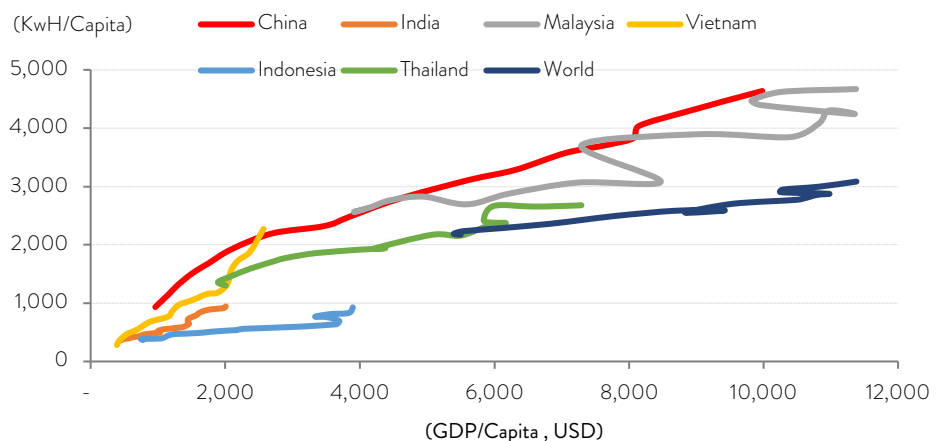
Low base, economic growth to fuel power demand

India’s electricity consumption can continue to grow at >5% on a low base

Electricity demand in India is growing at an average annual rate of 6.4% (FY16-FY20), in line with the average 6.3% GDP growth achieved during the same period. Electricity consumption per capita is among the lowest in the world at just 30% of the global average, ~40% of that in Vietnam and 20% of that in China.

India’s electricity consumption can accelerate as GDP climbs – evidenced by past trends in many countries. At a conservative average GDP growth rate of 5% over FY20-FY30, we could see power demand rising by 1.6x, which would still be just 50% of the current global mean. A fillip to manufacturing could spur even stronger growth in consumption – Vietnam is a case in point where electricity demand has increased at 2x GDP growth over the last decade alongside an 11% annual average growth rate in manufacturing, as measured by YoY growth in its manufacturing production index.

FIG 12 – ELECTRICITY CONSUMPTION AND GDP PER CAPITA, 2000-18



Source: World Bank, BOBCAPS Research

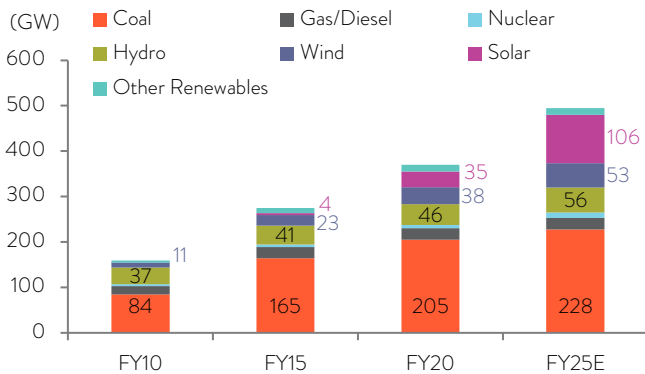
Solar leading the way

Renewables led by solar will continue to dominate capacity additions

India had ~380GW of installed power capacity as of FY21 – the third largest globally after China (~2,200GW) and the US (~1,100GW). Thermal power forms ~55% share but incremental capacity additions will be dominated by renewable energy for the following reasons:

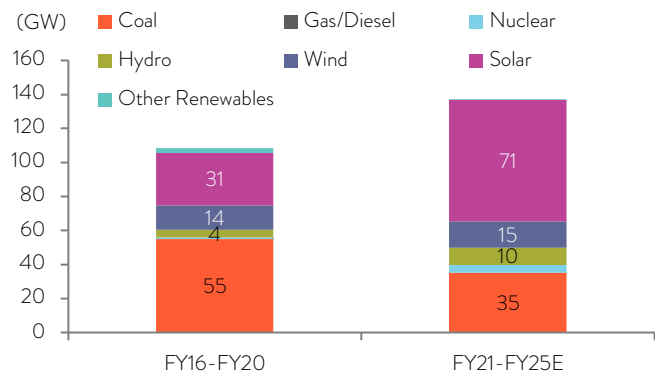
- a steady fall in prices of solar equipment due to continued scientific innovation and research whereas costs for coal and gas power plants have barely moved;
- strong competition from domestic and international private equity (driven by sustained growth in green funds), energy companies (to improve their ESG ratings) and utility companies; and
- considerable appeal for international investors as Indian renewable energy offers power purchase agreements (PPA) spanning 25 years with predictable cash flows, which is attractive in a low interest rate environment.

FIG 13 – INSTALLED CAPACITY



Source: CEA, BOBCAPS Research

FIG 14 – GROSS CAPACITY ADDITIONS

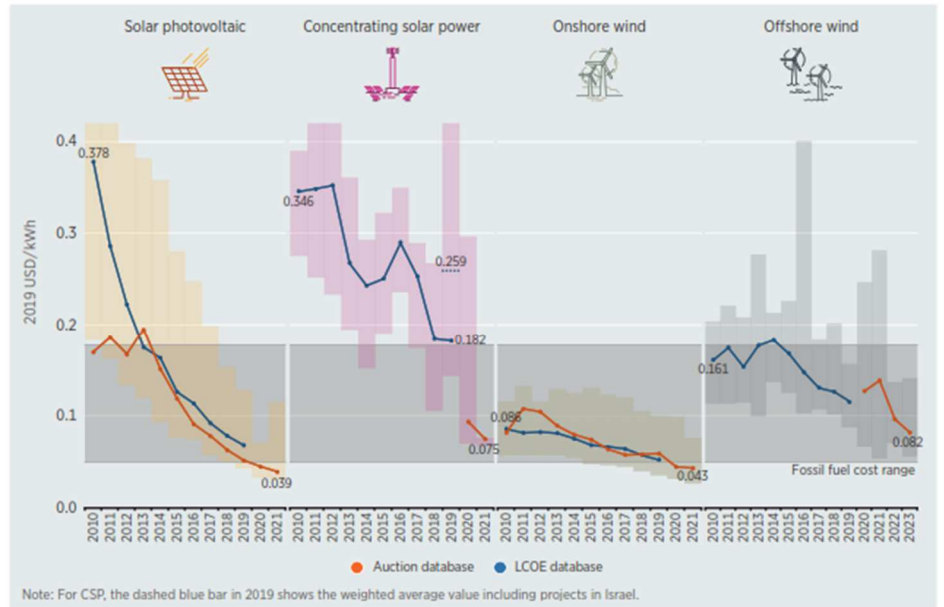


Source: CEA, BOBCAPS Research

Renewable costs fast reducing

While solar generation costs have reduced 90% in the last decade, prices of conventional thermal energy have barely shifted at all. Many global power technology suppliers such as GE and Siemens have moved away from coal generation, which has stalled efficiency gains. Also, the focus on climate change has shifted research dollars towards renewables.

FIG 15 – SOLAR COSTS HAVE FALLEN BY 90% IN THE LAST DECADE

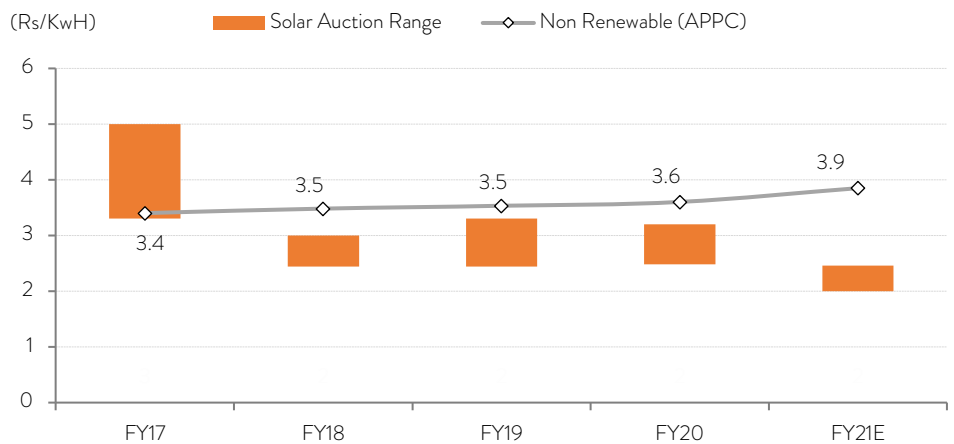


Note: For CSP, the dashed blue bar in 2019 shows the weighted average value including projects in Israel. The thick lines are the global weighted average LCOE, or auction values, by year. The grey bands that vary by year are cost/price range for the 5th and 95th percentiles of projects. For the LCOE data, the real WACC is 7.5% for OECD countries and China, and 10% for the rest of the world. The band that crosses the entire chart represents the fossil fuel-fired power generation cost range.

Source: IRENA

No price drop in thermal generation technology as tech leaders are no longer investing in these areas

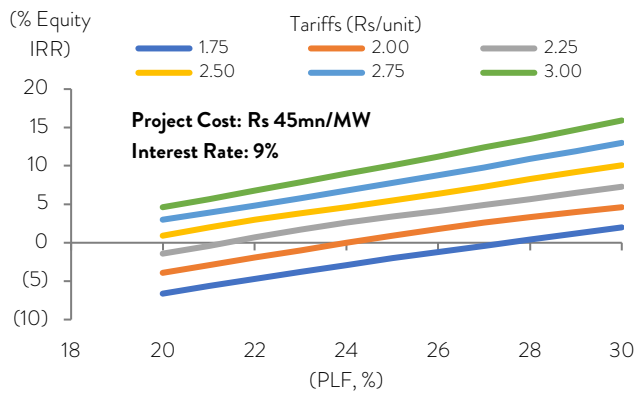
FIG 16 – POWER SALE PRICE BY GENERATOR



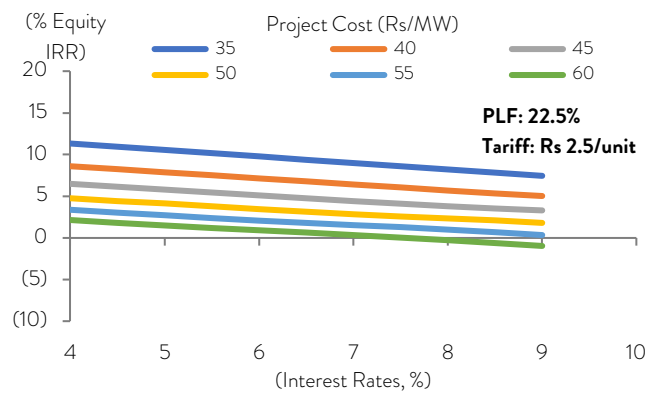
Source: CERC, BOBCAPS Research

Falling bid prices – room only for technically or financially savvy

Returns on solar projects are a function of tariff, project cost, plant load factor (PLF) and interest expense, in addition to operation and maintenance cost. An investor must have either the financial strength to ensure lower financing costs and/or bargaining power with suppliers/EPC players to reduce project costs. Alternatively, a technically strong developer with scale can also generate superior returns. This, in turn, means that a sub-scale player who has neither the technical skills nor the financial muscle could fail to generate returns.

FIG 17 – RETURN SENSITIVITY TO PLF & TARIFFS...

Source: BOBCAPS Research

FIG 18 – ...AND TO PROJECT COSTS & RATES

Source: BOBCAPS Research

Utility scale batteries should be viable before 2030

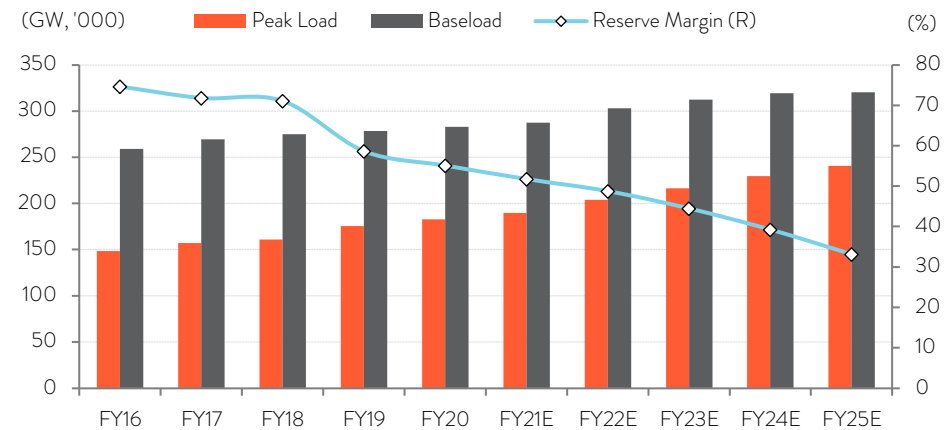
Thermal/hydro pipeline can help balance grid till batteries turn feasible

The sector's thermal and hydro pipeline will add an estimated 9% to capacity over FY22-FY25, net of plant retirements. Renewable power generation is volatile as solar units cannot generate energy in the night and wind power is difficult to predict. Therefore, controllable sources of power such as coal, nuclear and gas will continue to be in demand to provide reliable baseload supply.

India's peak-load power demand currently totals ~190GW versus a baseload capacity of 300GW. Assuming annual growth of 5%, demand will still be below this capacity till FY25, by when 33GW of additional baseload capacity under NTPC and state utilities is largely scheduled for completion (net of plant closures; equivalent to ~9% of FY21 installed capacity).

Renewable energy may also cross 15% of total power generation by FY25 and will require more robust grid management through (1) better forecast of renewable energy generation so that grid managers can design appropriate generation schedules, (2) availability of batteries for storage of power when demand is low, and (3) a large spot market which can be used to buy power to balance demand if needed.

Gas plants which can be quickly turned on/off can also be used to manage the grid, but this may require government support as gas-based plants have remained historically underutilised or shut due to volatile gas prices and import dependence.

FIG 19 – GENERATION CAPACITY AND PEAK LOAD

Source: BOBCAPS Research, CEA | Reserve Margin = (Baseload – Peak load) / Peak load

Green hydrogen proposed to be sold to refining, fertiliser and steel industries

Emerging renewable technologies: Hydrogen

Hydrogen is a key emerging technology that can also be useful for grid load management. Electricity from green sources can be used to produce hydrogen through the electrolysis process (called green hydrogen), which can then be supplied as a fuel for transportation or in chemical and refining units. In South Korea, Hanwha Energy has successfully completed a 50MW grey hydrogen fuel cell project that uses hydrogen from a petrochemical plant to produce electricity.

In India, the government has announced the National Hydrogen Mission which aims to increase the use of green hydrogen in process industries such as refining, fertilisers and steel. US-listed Fusion Green Fuel has signed a contract with BGR Energy Systems to develop green hydrogen projects in India, starting with a demonstration facility in Cuddalore, Tamil Nadu.

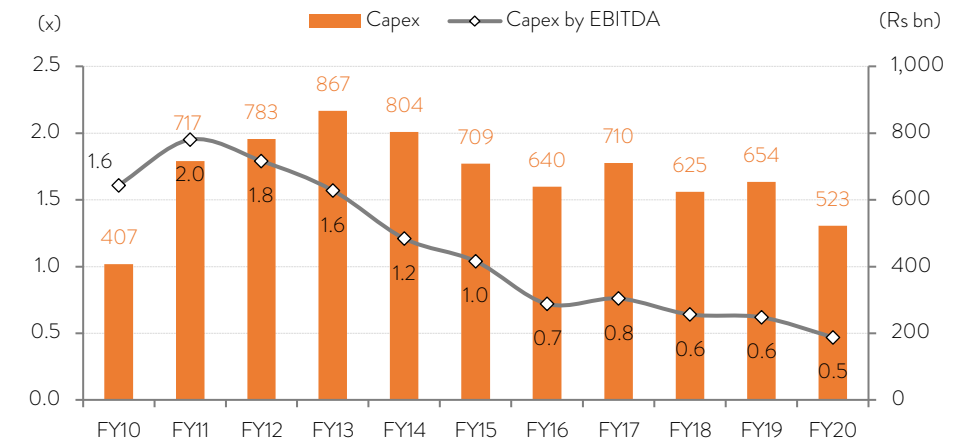
No risk of over-investment – listed capex at 10-year low

New foreign and domestic investors have taken the lead by investing in renewables

India's power sector has been guilty of over-investing in the past, particularly in the generation sector. However, capex intensity as measured by the capex/EBITDA ratio of the 30 largest companies in the sector is currently at its lowest in the past decade. Absolute capex in FY20 was also at just 60% of the FY13 peak.

The slack in capex has been picked by overseas and new, unlisted Indian companies focused on renewable energy projects. Per the Ministry of New & Renewable Energy, an estimated US\$ 75bn was spent on renewable energy projects during FY14-FY19, which implies an annual Rs 800bn per year incurred mostly by overseas and unlisted Indian companies.

FIG 20 – CAPEX INTENSITY OF LISTED POWER COMPANIES AT A TROUGH



Source: Bloomberg, BOBCAPS Research

Distribution: Discom crisis could unlock Rs 6tn opportunity

Discoms continue to report massive losses despite several rounds of financing by the central government, as the inherent problems of subsidised tariffs, poor infrastructure and weak collections remain unaddressed. Tougher service norms, conditional financial support, possible delicensing and improving legal structures – all proposed in the draft Electricity Act 2021 – could put pressure on discoms to embrace privatisation. This will open up a Rs 6tn opportunity for the private sector, which has a market share of just 7% but a good record of running profitable distribution operations.

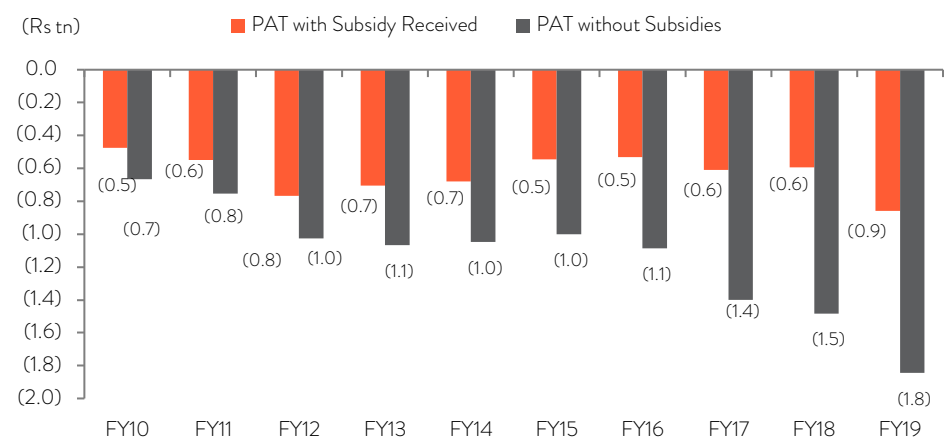
Carrot approach has failed

Over the past two decades, the central government has repeatedly infused funds into the beleaguered state-owned discoms – the most recent allocations being the UDAY scheme, the Rs 1.2tn Aatmanirbhar Bharat package to address Covid-19 related liquidity issues, and the Rs 3tn scheme for improving infrastructure. But results have been modest and discoms have reverted to a widening deficit trajectory after the UDAY scheme temporarily helped reduce the gap over FY15-FY18. As a result, distribution remains the main bottleneck in the entire chain, causing delayed payments to generators and grid services.

The root of the problem lies in subsidised tariffs which do not reflect discom costs. In addition, collection efficiency and last mile infrastructure remain poor, leading to AT&C (aggregate technical & commercial) losses of ~20% – still at least 2x the global average.

Frequent rescues by the central government have failed as core issues persist

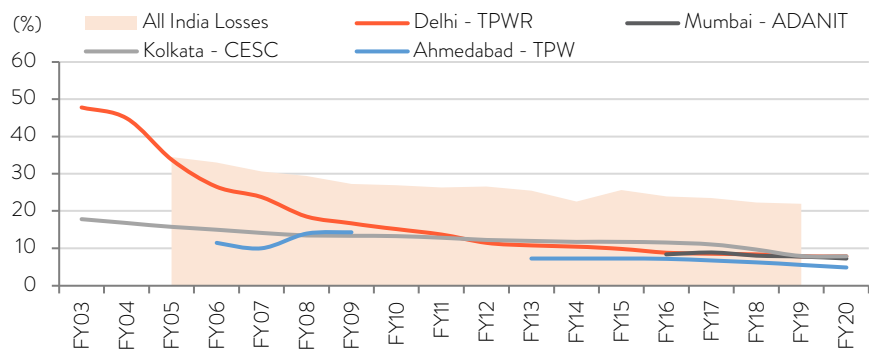
FIG 21 – DISCOMS – ANNUAL DEFICIT



Source: PFC

In contrast, the performance of privately owned distribution players has been particularly impressive, with AT&C losses brought down significantly. But private sector participation is just ~7% (based on electricity sales of the top 5 players) compared to its ~47% share in installed generation capacity. Returns from distribution projects are safe as earnings in the privatised distribution business are based on a regulated returns model (14-16% return on the equity portion of capex), in addition to incentives if AT&C targets are met.

FIG 22 – AT&C LOSS MANAGEMENT – PRIVATE SECTOR HAS DONE WELL



Source: Company

Tougher norms in proposed Electricity Act may compel states to consider privatisation

Rs 6tn opportunity for corporate sector

Privatisation of power distribution in India started off well with Delhi in 2002 but has slowed over the past decade. We believe the process will receive an impetus if the stringent regulations proposed under the Electricity (Amendment) Bill 2020 are implemented in letter and spirit. Key pressure points for discoms under the draft act include:

- condition-based financial support from the central government that may force some discoms to opt for privatisation as operations become unsustainable;
- tough legislation on cost-based tariff setting, payment of subsidies through direct benefit transfer (DBT), penalties based on power supply norms and adherence to renewable portfolio obligations (RPO); and
- proposed delicensing of electricity distribution which will make it easier for the private sector to target the larger, more profitable industrial and commercial customers.

With the Electricity (Amendment) Bill 2020 expected to be enacted in FY22, the private sector could see the opening up of a potential Rs 6tn opportunity – ~40% of the total income of the Indian banking sector and 1.5x India’s FMCG market. The main focus over the next few quarters will be on bidding rounds for privatisation of distribution in the union territories of Chandigarh followed by Puducherry, Jammu & Kashmir, Ladakh, Lakshadweep and Andaman & Nicobar.

Transmission: In need of market-based competition

Transmission privatisation is gaining traction but private sector participation can increase significantly from just ~7% currently only if more projects are opened up for competitive bidding. The sector will continue to need investments in order to keep pace with generation capacity additions, to connect with new renewable plants in remote locations, and to manage flexible transfer of electricity across different routes.

Transmission privatisation picking up

Transmission privatisation has gathered pace, garnering interest from investors due to (1) a predictable 35-year revenue stream, (2) low probability of default by discoms owing to the central pooling system of payments, and (3) relatively low cost of operating the assets for a technically sound operator.

To attract investment into the transmission sector, more interstate projects need to be opened for tariff-based competitive bidding (TBCB). The allocation of interstate transmission system (ISTS) projects to the public sector or for competitive bidding (open to all public and private sector companies) is decided by the National Committee of Transmission (NCT).

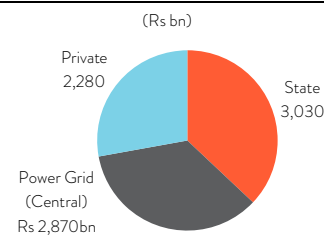
The projects allocated to PowerGrid provide a cost plus 15.5% return on regulated equity while TBCB bids are based on a fixed tariff with some incentives for providing line availability above the norms. The market could open up further for the private sector should all projects be awarded on TBCB basis.

Load management a key challenge

India’s transmission grid requires sustained investment, both in terms of building capacity as well as connectivity to new areas where renewable energy is generated. In addition, the volatility introduced by renewables necessitates that the grid be able to quickly connect with different generation plants.

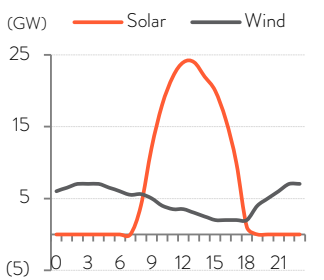
Besides load management, another challenge faced by the transmission sector is the lack of information on generation project development, leading to a mismatch in transmission line versus generation capacity. For renewables in particular, transmission lines may not be available given the ~1.5-year project construction period for solar generation plants compared to three years for transmission.

TRANSMISSION – ~RS 9TN PROJECTS OVER NEXT 10Y



Source: Adani Transmission

RENEWABLE LOAD PATTERN IN INDIA ACROSS 24 HOURS



Source: POSOCO



Companies

BUY

TP: Rs 131 | ▲ 29%

TATA POWER

Power

18 May 2021

Pressing all the right levers; initiate with BUY

We expect Tata Power (TPWR) to derive ~80% of forecast FY22 EBITDA and 55% of its valuation from the fast-growing segments of power distribution (#1 player), renewables (among top 10), solar EPC (#1) and rooftop solar solutions (#1). The company has made good progress on debt reduction in FY21 and we expect deleveraging to continue in FY22 as fresh investments flow into the renewables business. Merger of the lossmaking CGPL plant into the parent company is likely to save costs. Initiate with BUY, Mar'22 TP Rs 131.

Tarun Bhatnagar

research@bobcaps.in

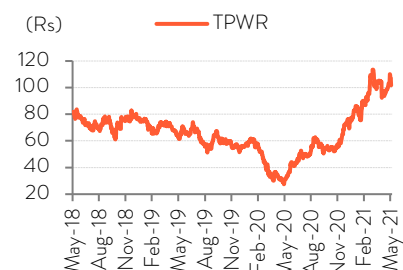
Aligning to growing segments: TPWR is a leader in the fast-growing segments of power distribution, solar EPC and rooftop solar solutions, besides being among the top 10 ranked renewable developers in India. We estimate that these growth segments will contribute ~55% to group valuation and 80% to FY22 EBITDA (vs. 50% in FY16) – a sharp departure from the last decade when coal mining and coal-based generation dominated the earnings mix. Over FY21-FY23, we model for a robust 12%/37% EBITDA CAGR in the distribution/renewable segments.

Ticker/Price	TPWR IN/Rs 102
Market cap	US\$ 4.4bn
Shares o/s	3,195mn
3M ADV	US\$ 79.7mn
52wk high/low	Rs 115/Rs 30
Promoter/FPI/DII	47%/12%/21%

Source: NSE

Debt reduction to continue: A combination of asset sales and equity injection totalling Rs 73bn by the parent company in FY21 has cut TPWR's net debt by ~22% to Rs 354bn in FY21. Management aims to reduce net gearing further to 1x in FY22 by bringing in new investors or listing the renewables business. This business is also likely to attract a higher multiple, similar to listed peers. Plans to merge the lossmaking CGPL plant into the parent will help cut costs as well.

STOCK PERFORMANCE



Source: NSE

Initiate with BUY: Our Mar'22 SOTP-based TP of Rs 131 implies 10.7x FY22E EV/EBITDA, a ~35% premium to mean – justified by our 49% EPS CAGR forecast for FY21-FY23, aided by growth in the renewables and distribution segments. Key stock price drivers include fresh investments in renewables, parent company restructuring, and new renewable and distribution contracts.

KEY FINANCIALS

Y/E 31 Mar	FY19A	FY20A	FY21P	FY22E	FY23E
Total revenue (Rs mn)	2,98,811	2,91,364	3,24,681	4,49,889	5,05,017
EBITDA (Rs mn)	68,484	77,541	75,387	76,270	93,558
Adj. net profit (Rs mn)	5,652	10,305	11,119	14,623	24,794
Adj. EPS (Rs)	2.1	3.8	3.5	4.6	7.8
Adj. EPS growth (%)	(57.6)	82.3	(8.6)	31.5	69.6
Adj. ROAE (%)	0.7	1.2	1.2	1.5	2.4
Adj. P/E (x)	48.6	26.7	29.2	22.2	13.1
EV/EBITDA (x)	10.5	9.6	10.2	9.5	7.5

Source: Company, BOBCAPS Research | P – Provisional

Investment rationale

Mix shift to renewables and distribution to spur earnings

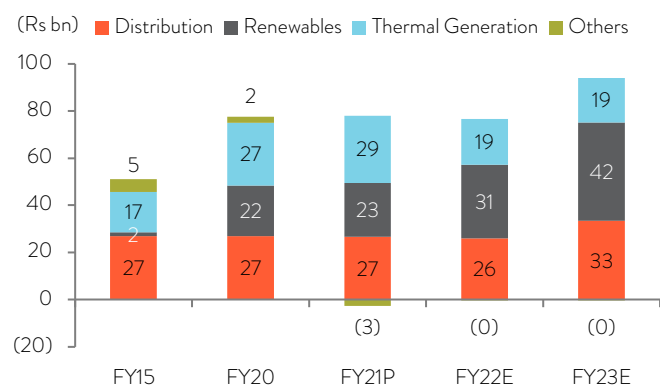
#1 in private electricity distribution, #1 in solar EPC, #1 in rooftop solar, and top 10 renewable generator

TPWR is India’s largest private sector power distribution company with decades of experience in providing electricity to Mumbai and Delhi. In addition, the company acquired distribution rights for the state of Odisha in FY21, which is now the largest private distribution business by area and power sales.

TPWR also has a presence across the solar value chain consisting of solar module production, solar EPC (#1 player) and rooftop solutions (#1), in addition to being among the top 10 solar power generators with a target to increase its capacity six-fold over FY21-FY25. We expect the ongoing business shift towards renewables and distribution from thermal generation and coal to spur earnings growth, with the two focus businesses forecast to contribute >80% of EBITDA (vs. 50% in FY16) and 55% of valuations by FY22.

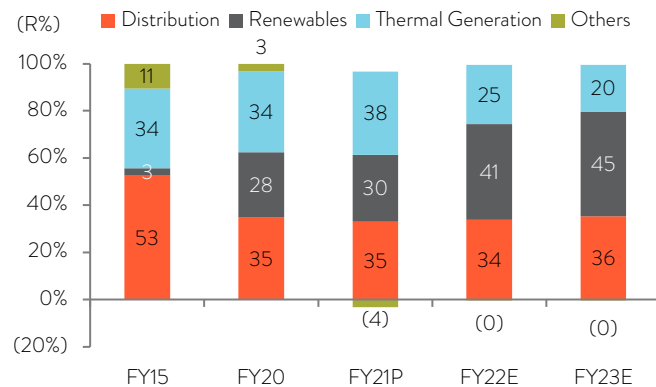
Our FY21-FY23 EBITDA CAGR forecasts for the distribution/renewable businesses stand at a robust 12%/37% despite flattish group EBITDA for FY22E as higher coal prices weigh on CGPL’s profits.

FIG 1 – EBITDA MIX TRANSITIONING AWAY FROM COAL...



Source: Company, BOBCAPS Research

FIG 2 – ...WITH SHARE OF DISTRIBUTION AND RENEWABLE SEGMENTS SET TO RISE



Source: Company, BOBCAPS Research

Profitable distribution franchise

Delhi, Mumbai and Odisha operate under a regulated returns model where the company earns a return on regulated equity that increases with capex. Incentives can be earned by improving AT&C losses at a faster rate than the past trajectory. TPWR also owns distribution franchisees in Ajmer (Rajasthan) where its earnings depend on reduction in AT&C losses.

Leader in solar space and among the top renewable generators

TPWR runs a 2.1GW solar and wind generation capacity which management expects to continue investing in. The company is the largest solar EPC player in India with a Rs 87bn order backlog as of Mar'21 and has 1,100MW of solar module and cell capacity. It is also a market leader in the solar rooftop business as well as a producer of solar electricity-based groundwater pumps.

7GW of thermal capacity, stakes in Indonesian coal mines

The company operates 7GW of mostly thermal generation capacity with all of its plants tied to PPAs. However, its largest generation asset – Coastal Gujarat Power (CGPL) – is unable to fully recover its cost of imported coal. This apart, TPWR owns a 26-30% stake in Indonesian mining assets that also serve as its suppliers. The company plans to progressively move out of coal mining and avoid further thermal plant addition.

FIG 3 – TPWR'S POWER ASSETS

Generation				Transmission		Distribution		
Plant	Capacity (MW)	Remaining Life (years)	PPA (%)	Project	Circuit km	Area	Consumption (mn units)	Remaining Life (years)
Coastal Gujarat Power	4,150	17	100	Power Links	1,166	Distribution PPA (Regulated Return)		
Maithon Power (MPL)	1,050	16	100	Mumbai Transmission	1,200	North & North East Delhi	9,051	8
Tromba Power	930	16	100			Mumbai	4,573	19
Jojobera Power	240	16	100			Odisha	19,584	25
Industrial Energy / Jojobera Power Unit 1&4	375	16	100			Distribution Franchisee		
Haldia Power	120	16	100			Ajmer	465	16
Tata Power Hydro	447	16	100			Coal Business (26-30% stake)		
Solar	1,641	21	100			Indonesian Coal Mines		
Wind	504	19	100			- Production (mn tonnes)	72.9	
Under Development	1,247	25	100			Shipping Business	Bulk Transport	
Adjaristsqali Georgia LLC	187	NA	100					
New Growth Segments								
Solar EPC (Rs bn)	120							
Solar module capacity (MW)	1,100							
Solar cell capacity (MW)	1,100							
Rooftop solar annual installations (MW)	66							
Source: Company, BOBCAPS Research						Traditional	Green Energy	Distribution

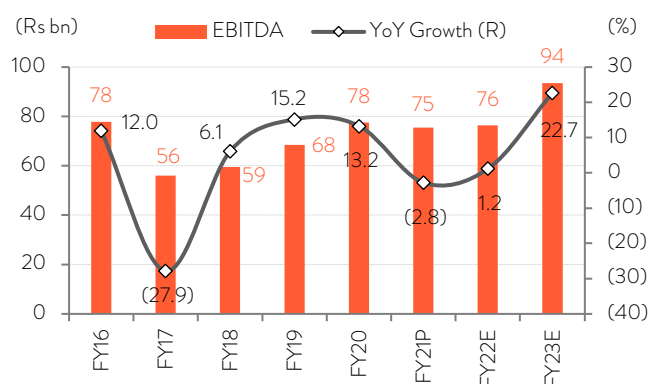
Growth expected to revive as renewables share grows

TPWR had a relatively weak performance over FY16-FY21P marked by flat EBITDA growth (~-1% CAGR), arising from a combination of stable distribution income, volatile generation revenue and growing renewables income. The CGPL plant has been the biggest source of volatility due to fluctuations in Indonesian coal prices.

In renewables, organic expansion and acquisition resulted in 7.4x growth in segment EBITDA during FY16-FY21P, climbing from a low base of ~4% of group EBITDA to over 30% share in FY21P. We expect an increasing contribution from the distribution and renewables segments along with deleveraging (from asset sales and new investments in renewables) to drive a strong earnings recovery.

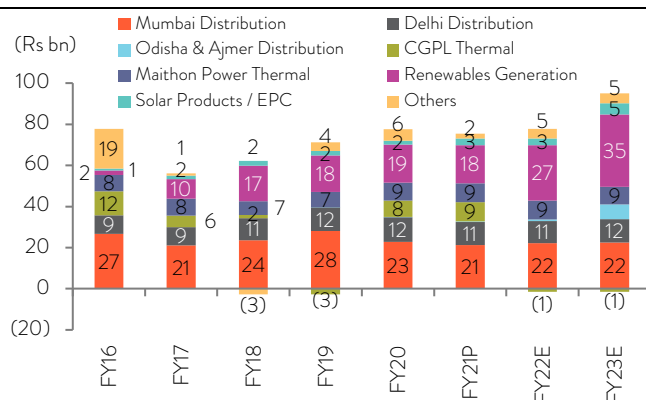
Apart from capacity expansion in renewables, we expect the Odisha discom to be another growth catalyst, particularly from FY23 onward as AT&C losses should decline meaningfully in the four distribution areas. We model for a sharp drop in CGPL EBITDA from Rs 9.2bn in FY21P to an EBITDA loss of Rs 1.4bn in FY22E due to our estimates of higher average coal prices in the forecast period versus FY21. However, the drag on TPWR's net income from CGPL should ease as the latter's debt has reduced, implying lower interest costs.

FIG 4 – TPWR'S EBITDA IMPROVING SINCE FY17...



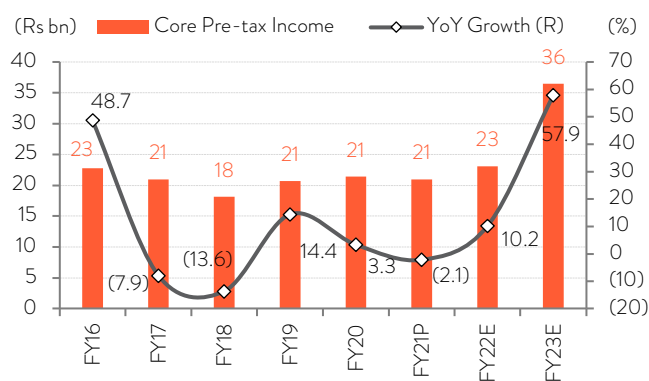
Source: Company, BOBCAPS Research

FIG 5 – ...LED BY RENEWABLES



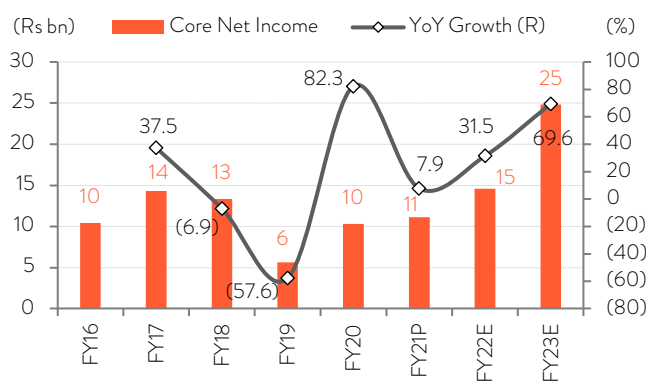
Source: Company, BOBCAPS Research

FIG 6 – PRE-TAX INCOME PICKING UP



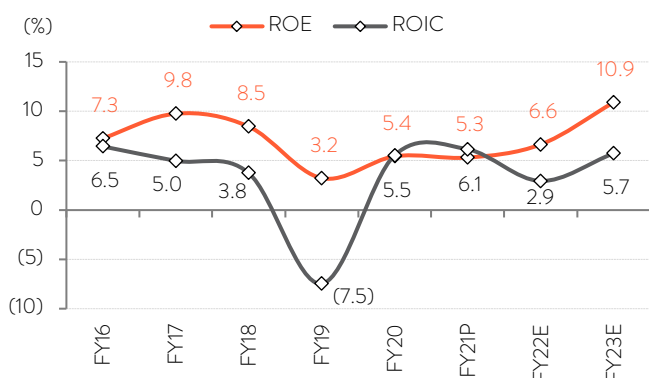
Source: Company, BOBCAPS Research

FIG 7 – NET INCOME VOLATILE DUE TO TAX SHIFTS



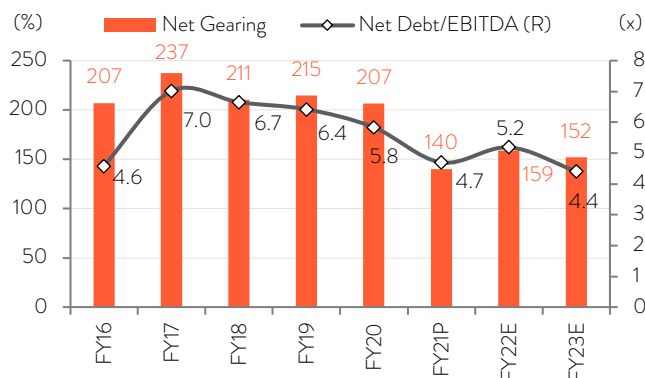
Source: Company, BOBCAPS Research

FIG 8 – ROE SHOULD CONTINUE TO MOVE UP



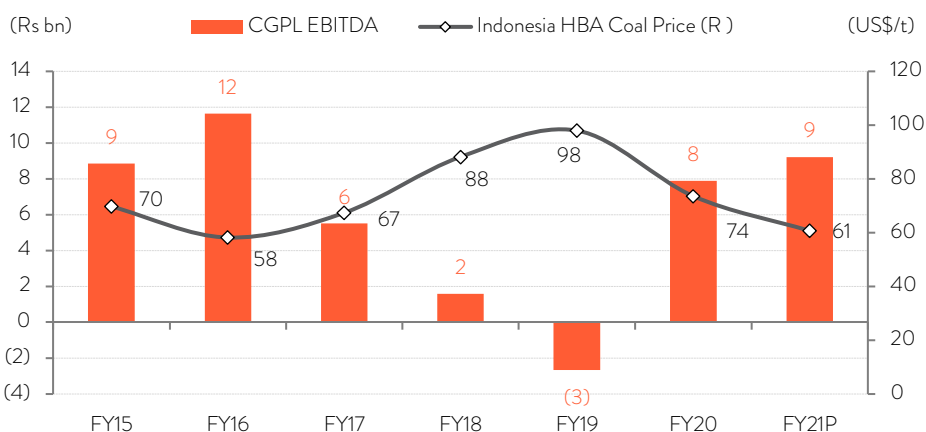
Source: Company, BOBCAPS Research

FIG 9 – NET GEARING ALSO IMPROVING



Source: Company, BOBCAPS Research

FIG 10 – CGPL EBITDA VS. COAL PRICE



Source: Company, BOBCAPS Research

FIG 11 – TPWR – EBITDA ESTIMATES

(Rs bn)	FY20	FY21E	FY22E	FY23E
By Entity				
Mumbai Distribution + Others (Standalone)	22.7	21.2	22.1	22.4
Coastal Gujarat Power Limited (CGPL)	7.9	9.2	(1.4)	(1.5)
Maithon Power (MPL)	8.7	9.2	9.1	8.6
Delhi Discom (TPDDL)	12.2	11.4	10.9	11.5
Power Trading (TPTCL)	0.6	0.5	0.5	0.5
Tata Power Solar (TPSL)	1.9	3.3	3.2	5.5
Tata Power Renewable (TPREL)	7.8	8.0	15.5	23.8
Walwhan Renewables Energy Limited	10.7	10.5	11.4	11.4
TERPL (Shipping Company)	4.0	4.1	4.2	4.2
Odisha Discoms	-	(0.1)	0.3	6.5
Ajmer Distribution	0.1	0.4	0.5	0.5
Others	1.0	(2.4)	-	-
Total	77.5	75.4	76.3	93.6
By Business				
Distribution	26.9	26.6	26.0	33.4
Renewables	21.6	22.9	31.2	41.8
Generation	26.6	28.5	19.4	18.8
Others	2.5	(2.7)	(0.3)	(0.4)
Total	77.5	75.4	76.3	93.6

Source: Company, BOBCAPS Research

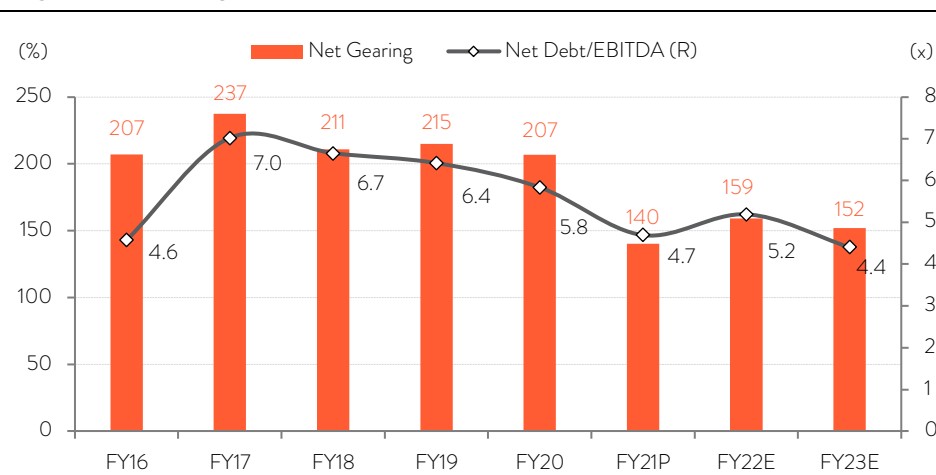
Debt reduction to continue; restructuring will save costs

Net gearing ratio targeted to halve to ~1x from over 2x, spurring change in risk profile

TPWR’s net gearing has come down appreciably following the sale of Rs 47bn in non-core assets and a Rs 26bn equity injection from the parent group in FY21. In addition, management is working on options to bring in new investors or list its renewables business – we believe this will help the company reach its targeted net gearing ratio of ~1x from 1.4x as of FY21P. Note that our estimates for FY22-FY23 do not include any external investments.

Lower leverage would materially change TPWR’s risk profile and bolster its investments to expand the renewables and distribution segments. The company is also seeking regulatory approval to merge the lossmaking CGPL plant with the parent which will help reduce its own tax liability via set-off against accumulated losses.

FIG 12 – DEBT PROFILE



Source: Company, BOBCAPS Research

Valuation methodology

Expect 49% EPS CAGR

We estimate an EPS CAGR of 49% for TPWR over FY21-FY23 driven by growth in the renewables and distribution businesses. Group EBITDA is likely to be flat in FY22E as higher coal prices compared to FY21 would raise losses at CGPL. Pre-tax income will still grow as interest cost declines due to deleveraging. In FY23E, we expect a significant 23% increase in EBITDA from stronger renewable energy capacity additions and a drop in Odisha discom AT&C losses.

FIG 13 – TPWR – EARNINGS ESTIMATES

(Rs bn)	FY15	FY16	FY17	FY18	FY19	FY20	FY21P	FY22E	FY23E
Revenue	337.3	374.8	275.9	293.3	298.8	291.4	324.7	449.9	505.0
Gross Profit	121.9	151.0	93.9	101.1	103.4	117.3	119.0	139.0	164.7
EBITDA	69.4	77.7	56.1	59.5	68.5	77.5	75.4	76.3	93.6
EBIT	47.7	54.0	36.5	35.5	44.6	51.2	47.9	44.7	58.8
Core Pre-tax Income	15.3	22.8	21.0	18.1	20.7	21.4	21.0	23.1	36.5
Reported Net Income	1.7	8.7	9.0	24.8	23.6	10.2	11.3	15.1	24.8
Perpetual Securities Annual Pay-out*	(1.1)	(1.1)	(1.1)	(1.1)	(1.7)	(1.7)	(1.7)	(0.4)	-
Core Net Income	(0.1)	10.4	14.3	13.3	5.7	10.3	11.1	14.6	24.8
Average Number of Shares (bn)	2.7	2.7	2.7	2.7	2.7	2.7	3.2	3.2	3.2
EPS (Rs/sh)	(0.0)	3.8	5.3	4.9	2.1	3.8	3.5	4.6	7.8
Growth YoY (%)									
Revenue	-	11.1	(26.4)	6.3	1.9	(2.5)	11.4	38.6	12.3
Gross Profit	-	23.9	(37.8)	7.7	2.3	13.4	1.5	16.8	18.5
EBITDA	-	12.0	(27.9)	6.1	15.2	13.2	(2.8)	1.2	22.7
EBIT	-	13.2	(32.3)	(2.8)	25.5	14.9	(6.4)	(6.8)	31.5
Core Pre-tax Income	-	48.7	(7.9)	(13.6)	14.4	3.3	(2.1)	10.2	57.9
Reported Net Income	-	420.4	2.7	176.2	(4.9)	(56.8)	10.8	33.5	64.7
Core Net Income	-	(11,103.6)	37.5	(6.9)	(57.6)	82.3	7.9	31.5	69.6
EPS	-	(11,103.6)	37.5	(6.9)	(57.6)	82.3	(8.6)	31.5	69.6

Source: Company, BOBCAPS Research | *Company has announced that it is paying back the Rs 15bn perpetual security in FY21P

Our earnings forecast factors in the plant load factor for generation/renewables, AT&C losses for the distribution business and growth in the renewable energy portfolio. We have not assumed any cash injection from the anticipated renewables deal or tax savings from the planned CGPL restructuring.

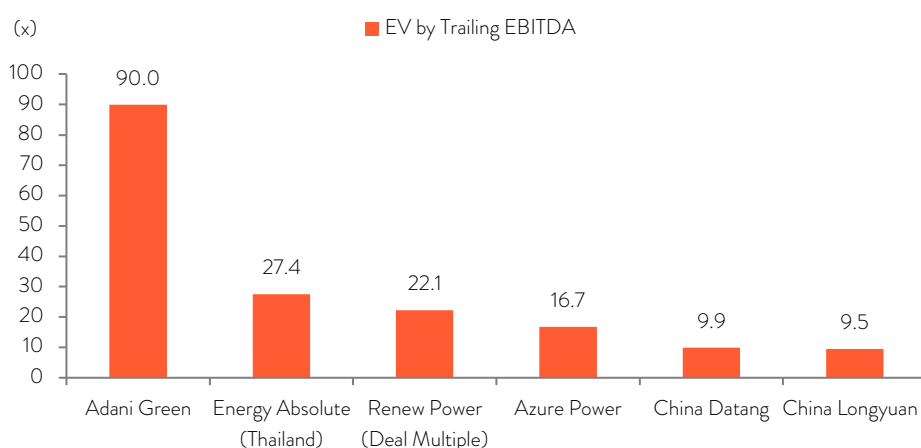
Premium valuations justified

TPWR currently trades at 9.5x FY22E EV/EBITDA, one standard deviation above its 10-year mean. In our view, the stock merits premium valuations given:

Deleveraging, distribution growth and new renewable plants to spur earnings

- **Robust earnings growth:** Our 49% EPS CAGR forecast for TPWR over FY21-FY23E is premised on deleveraging, capex-fuelled growth in the distribution business (leading to higher regulated income), a drop in AT&C losses and commercial operations of new renewables plants.
- **New investments in renewables:** The anticipated deal in renewables will bring new investors into the business and is likely to be at a premium to group valuations considering the value being accorded to pure-play renewable energy companies in India. There are only three pure-play listed Indian companies in the segment, of which one is listed in India and the other two in the US (Azure Power and Renew Power listed after being acquired by a US-based special purpose acquisition company or SPAC).

FIG 14 – REGIONAL RENEWABLE COMPANY MULTIPLES

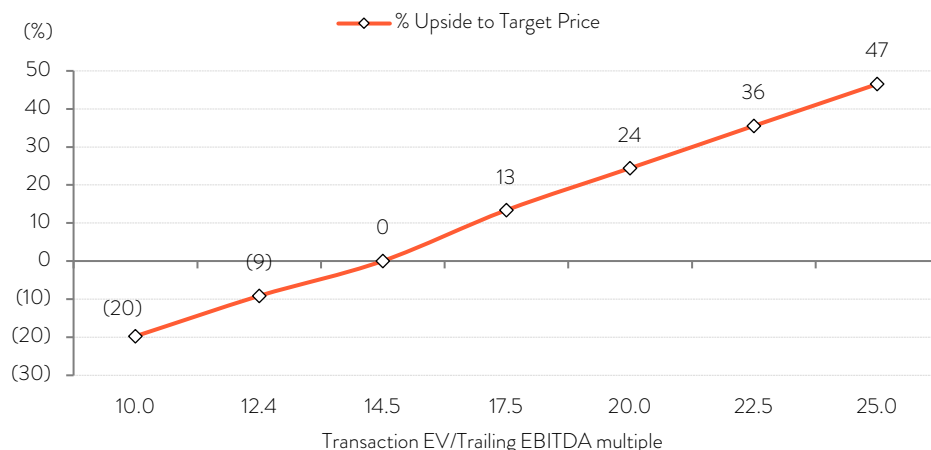


Source: Bloomberg | Note: Renew Power's multiple is based on the transaction multiple converted for trailing EBITDA

FIG 15 – ILLUSTRATIVE UPSIDE AT HIGHER MULTIPLES*

Renewable Business (Rs bn)	EV	Net Debt FY21E	Equity Value	FY21E EBITDA	EV/Trailing EBITDA (x)
Tata Power Renewables	184	60	124	8	23.0
Walwhan Renewables Energy	84	44	39	10	8.0
Total	267	104	163	18	14.5
Valuation Sensitivity to deal multiples					
Updated Value	369	104	265	18	20.0
% Change			102		
% Upside to target price			24.4		

Source: BOBCAPS Research | *Based only on the renewable generation business. IPO or deal with potential investors may include solar EPC, solar pumps and solar module manufacturing

FIG 16 – UPSIDE TO TARGET PRICE FROM DEAL MULTIPLES

Source: BOBCAPS Research

- Historical multiples not comparable:** TPWR's past multiples are not comparable as the business mix has shifted towards growing segments. Also, for a large part of the last decade, the market was concerned about the large losses made by CGPL. Apart from the proposed reorganisation, we expect CGPL's losses to reduce with the restructuring of debt, helping it achieve cash breakeven.

Stock trades at premium to 10Y mean – justified by expected earnings growth, deleveraging, renewable deal and restructuring

Also, emerging business mix geared for higher growth

FIG 17 – TPWR – KEY EARNINGS DRIVERS

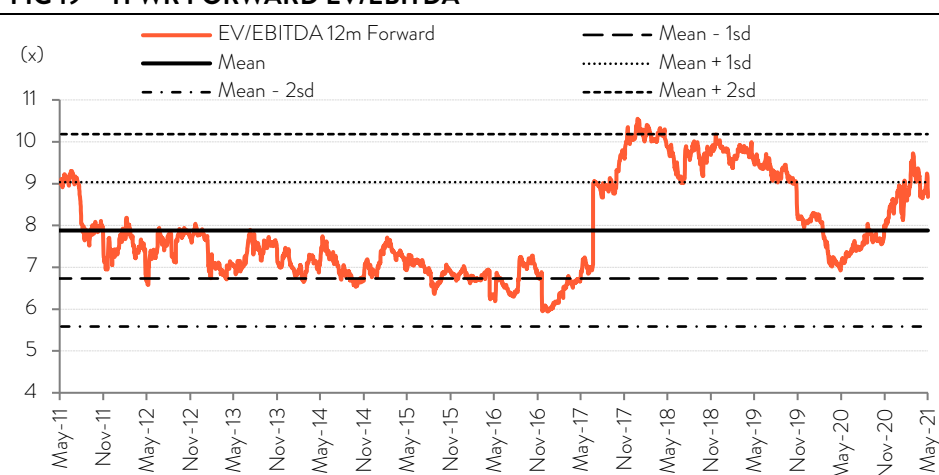
Drivers	FY20	FY21E	FY22E	FY23E
AT&C Losses (%)				
Delhi Discom	7.9	7.9	7.5	7.3
Tata Power Mumbai	0.4	0.4	0.4	0.4
Odisha WESCO	28.6	28.6	26.0	24.5
Odisha Southco	36.3	36.3	35.0	34.0
Odisha CESU	30.4	30.4	28.0	26.0
Odisha NESCO	25.3	25.3	25.0	23.0
Ajmer	10.0	10.0	9.0	8.0
Renewables – New capacity (MW)	404	3	1,247	1,500
Renewables tariff for new projects (Rs/unit)	3.0	2.5	2.5	2.4
Renewables PLF for new projects (%)	22.0	22.0	24.0	25.0
Tata Power solar new EPC external order (MW)	NA	NA	750	1,000
Rooftop installations completed during the year (MW)	66.0	50.0	100.0	150.0
Tata Power solar product sales revenue (% YoY)	32.0	NA	10.0	10.0
USDINR Average Conversion Rate	70.9	74.2	75.0	75.0
Imported Coal Price - Indonesia HBA (US\$/t)	73.6	60.7	75.0	75.0

Source: Company, BOBCAPS Research

FIG 18 – TPWR – BOBCAPS ESTIMATES VS. CONSENSUS

(Rs bn)	BOBCAPS		Consensus		BOBCAPS vs. Consensus (%)	
	FY22E	FY23E	FY22E	FY23E	FY22E	FY23E
Revenue	450	505	378	405	19.1	24.5
EBITDA	76	94	82	88	(7.2)	6.1
EBIT	45	59	59	62	(24.7)	(4.6)
Pretax Income	23	36	22	27	5.0	35.2
Net Income	15	25	19	22	(21.2)	13.8
EPS (Rs)	4.6	7.8	6.1	7.1	(24.8)	9.5

Source: Bloomberg, BOBCAPS Research

FIG 19 – TPWR FORWARD EV/EBITDA

Source: Bloomberg

**Target price of Rs 131 carries
29% upside**

Initiate with BUY, TP Rs 131

Our Mar'22 target price of Rs 131 for TPWR is based on an SOTP valuation, arrived at via a DCF assessment of various assets. Our valuation model discounts cash flows from the company's projects till the end of respective PPAs, assuming no extension only for generation plants. For distribution assets under the regulated return model, we have assumed extension of the concession period by 25 years post-expiry.

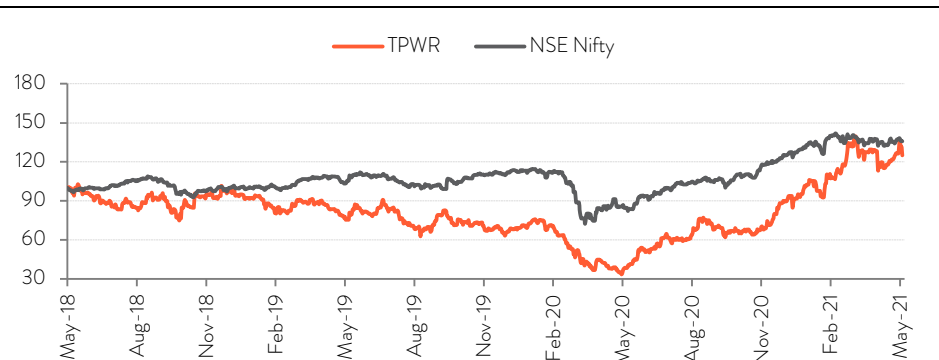
Key DCF assumptions include (1) cost of equity of 15.2% based on a risk-free rate of 6.12% as per the 10-year India bond yield as of end-Mar'21, (2) beta of 1.32 based on the last two-year weekly returns as of end-Mar'21, and (3) cost of debt of 8.5% factoring in the company's current debt cost. Our TP of Rs 131 implies 10.7x EV/EBITDA on FY22E, a ~24% premium to mean which is justified by a robust earnings outlook and expected project wins in growth segments. Initiate with BUY. Key stock price drivers include fresh investments in renewables, parent company restructuring, and new renewable and distribution contracts.

FIG 20 – SOTP VALUATION

Segment (Rs mn)	EV	Net Debt FY22E	Equity Value	% Share	Contribution to Group Equity Value	EBITDA FY22E	EV/EBITDA (x)
Standalone	1,06,625	1,78,995	(72,370)	100	(72,370)	22,111	4.8
Coastal Gujarat Power (CGPL)	78,154	56,404	21,749	100	21,749	(1,446)	(54.1)
Maithon Power (MPL)	46,062	13,243	32,819	74	24,286	9,108	5.1
Delhi Discom (TPDDL)	88,539	30,341	58,198	51	29,681	10,907	8.1
Power Trading (TPTCL)	5,300	0	5,300	100	5,300	530	7.0
Tata Power Solar	39,220	(1,321)	40,541	100	40,541	3,184	12.3
Tata Power Renewables	1,83,846	97,108	86,738	100	86,738	15,475	11.9
Walwhan Renewables Energy	83,611	42,481	41,130	100	41,130	11,441	7.3
TERPL (Shipping Company)	36,096	7,398	28,698	100	28,698	4,173	8.7
Odisha Distribution	91,954	32,855	59,099	51	30,141	330	278.4
Ajmer	3,058	615	2,443	100	2,443	457	6.7
Sub-Total (A)	7,62,465	4,58,119	3,04,346		2,38,337	76,270	10.0
Elimination (B)	0	(62,037)	62,037	100	62,037	0	10.0
Majority Owned (C = A+B)	7,62,465	3,96,082	3,66,382		3,00,374	76,270	10.0
Associates & JVz							
KPC			1,47,478	30	44,243		
PT Baramulti Suksessarana & PT Antang			29,496	26	7,669		
PT Nusa Tambang Pratama, Indonesia (Coal Infrastructure)			6,390	30	1,917		
Power Link (not consolidated)	4,659	(90)	4,749	51	2,422		
Industrial Energy (not consolidated)	9,718	6,293	3,425	74	2,535		
Tata Projects				48	17,458		
Adjaristsqali Georgia LLC				40	1,383		
Other associates					39,672		
Associates Valuation (D)					1,17,299		
Consolidated Total (E = C+D)					4,17,673		
Number of shares (F)					3,195		
Value per Share (G = F/E)					131		
Target Price (Rs) (H= G rounded to nearest 1)					131		

Source: BOBCAPS Research | *Repayment only in FY22E so not reflected in FY21E Net Debt

FIG 21 – RELATIVE STOCK PERFORMANCE



Source: NSE

Key risks

- Intense competition could lead to deterioration in the outlook for renewables and drive a sharp drop in tariffs. The possibility of discoms reneging on contracts and delaying payments can also impact generation returns.
- The distribution business could see fewer opportunities if power sector reforms are sluggish or new regulations make business unviable. In addition, a drop in regulatory returns due to lower interest rates would be a negative.
- A sharp rise in coal prices could fuel a steep increase in losses for CGPL, albeit partly compensated for by higher contribution from coal mining operations.

FINANCIALS

Income Statement

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21P	FY22E	FY23E
Total revenue	2,98,811	2,91,364	3,24,681	4,49,889	5,05,017
EBITDA	68,484	77,541	75,387	76,270	93,558
Depreciation	(23,931)	(26,336)	(27,449)	(31,588)	(34,785)
EBIT	44,553	51,206	47,938	44,682	58,773
Net interest income/(expenses)	(40,937)	(43,557)	(38,390)	(36,891)	(37,624)
Other income/(expenses)	3,099	4,246	2,678	2,678	2,678
Exceptional items	16,200	(1,841)	(1,555)	0	0
EBT	36,932	19,579	19,405	23,099	36,480
Income taxes	(10,876)	(6,415)	(5,019)	(6,119)	(8,209)
Extraordinary items	0	0	0	0	0
Min. int./Inc. from associates	11,524	6,535	5,621	10,701	9,176
Reported net profit	23,562	10,174	11,274	15,051	24,794
Adjustments	(17,910)	131	(155)	(428)	0
Adjusted net profit	5,652	10,305	11,119	14,623	24,794

Balance Sheet

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21P	FY22E	FY23E
Accounts payables	54,815	50,954	71,201	98,658	1,10,747
Other current liabilities	54,815	50,954	73,902	1,01,359	1,13,449
Provisions	3,336	4,074	8,396	8,396	8,396
Debt funds	4,50,146	4,80,997	4,20,185	4,18,577	4,37,539
Other liabilities	61,446	67,226	1,25,734	1,27,663	1,31,140
Equity capital	2,705	2,705	3,196	3,196	3,196
Reserves & surplus	1,80,350	1,92,955	2,20,027	2,14,697	2,33,471
Shareholders' fund	1,83,055	1,95,660	2,23,223	2,17,893	2,36,666
Total liabilities and equities	8,41,629	8,97,482	9,88,512	10,10,960	10,64,263
Cash and cash eq.	10,416	28,267	66,122	22,494	25,251
Accounts receivables	44,453	44,259	50,010	69,295	77,786
Inventories	17,064	17,524	18,848	26,116	29,317
Other current assets	30,019	30,165	28,731	28,731	28,731
Investments	15,176	13,025	23,059	23,059	23,059
Net fixed assets	4,11,015	4,46,626	4,87,489	5,31,307	5,81,985
CWIP	37,865	37,865	0	0	0
Intangible assets	32,034	30,038	31,404	31,404	31,404
Deferred tax assets, net	3,275	4,162	1,840	1,840	1,840
Other assets	2,40,313	2,45,551	2,81,009	2,76,713	2,64,889
Total assets	8,41,629	8,97,482	9,88,512	10,10,960	10,64,263

Source: Company, BOBCAPS Research

Cash Flows

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21P	FY22E	FY23E
Net income + Depreciation	47,493	36,509	38,723	46,639	59,579
Interest expenses	39,761	40,025	37,314	36,943	37,681
Non-cash adjustments	(23,366)	(9,524)	(4,001)	(13,431)	(11,910)
Changes in working capital	63,888	67,011	72,036	70,151	85,349
Other operating cash flows	(82,038)	(60,268)	(59,493)	(69,247)	(84,951)
Cash flow from operations	45,738	73,753	84,580	71,054	85,747
Capital expenditures	(35,762)	(22,258)	(33,358)	(75,407)	(85,463)
Change in investments	0	0	12,652	0	0
Other investing cash flows	28,090	(3,766)	7,310	0	0
Cash flow from investing	(7,672)	(26,024)	(13,396)	(75,407)	(85,463)
Equities issued/Others	0	201	29,961	(15,000)	0
Debt raised/repaid	(6,177)	(1,070)	(63,252)	(1,609)	18,962
Interest expenses	(39,761)	(40,025)	(37,314)	(36,943)	(37,681)
Dividends paid	(4,927)	(5,992)	(5,263)	(4,953)	(6,020)
Other financing cash flows	49,887	42,677	77,420	58,505	24,739
Cash flow from financing	(979)	(4,209)	1,552	0	0
Changes in cash and cash eq.	(9,299)	17,228	15,227	(43,628)	2,756
Closing cash and cash eq.	10,416	28,267	66,122	22,494	25,251

Per Share

Y/E 31 Mar (Rs)	FY19A	FY20A	FY21P	FY22E	FY23E
Reported EPS	8.7	3.8	3.5	4.7	7.8
Adjusted EPS	2.1	3.8	3.5	4.6	7.8
Dividend per share	1.3	1.6	1.6	1.9	3.1
Book value per share	67.6	72.3	69.9	68.2	74.1

Valuations Ratios

Y/E 31 Mar (x)	FY19A	FY20A	FY21P	FY22E	FY23E
EV/Sales	2.4	2.5	2.4	1.6	1.4
EV/EBITDA	10.5	9.6	10.2	9.5	7.5
Adjusted P/E	48.6	26.7	29.2	22.2	13.1
P/BV	1.5	1.4	1.5	1.5	1.4

DuPont Analysis

Y/E 31 Mar (%)	FY19A	FY20A	FY21P	FY22E	FY23E
Tax burden (Net profit/PBT)	27.3	48.1	53.0	63.3	68.0
Interest burden (PBT/EBIT)	46.5	41.8	43.7	51.7	62.1
EBIT margin (EBIT/Revenue)	14.9	17.6	14.8	9.9	11.6
Asset turnover (Revenue/Avg TA)	35.6	33.5	34.4	45.0	48.7
Leverage (Avg TA/Avg Equity)	4.8	4.6	4.5	4.5	4.6
Adjusted ROAE	3.2	5.4	5.3	6.6	10.9

Source: Company, BOBCAPS Research | Note: TA = Total Assets

Ratio Analysis

Y/E 31 Mar	FY19A	FY20A	FY21P	FY22E	FY23E
YoY growth (%)					
Revenue	1.9	(2.5)	11.4	38.6	12.3
EBITDA	15.2	13.2	(2.8)	1.2	22.7
Adjusted EPS	(57.6)	82.3	(8.6)	31.5	69.6
Profitability & Return ratios (%)					
EBITDA margin	22.9	26.6	23.2	17.0	18.5
EBIT margin	14.9	17.6	14.8	9.9	11.6
Adjusted profit margin	1.9	3.5	3.4	3.3	4.9
Adjusted ROAE	0.7	1.2	1.2	1.5	2.4
ROCE	8.7	8.7	7.4	6.6	8.5
Working capital days (days)					
Receivables	54	55	56	56	56
Inventory	21	22	21	21	21
Payables	67	64	80	80	80
Ratios (x)					
Gross asset turnover		0.5	0.5	0.6	0.6
Current ratio	0.4	0.4	0.5	0.4	0.5
Net interest coverage ratio	1.1	1.2	1.2	1.2	1.6
Adjusted debt/equity	2.5	2.5	1.9	1.9	1.8

Source: Company, BOBCAPS Research

ADD

TP: Rs 261 | ▲ 14%

POWER GRID CORP

Power

18 May 2021

Attractive business but lacks medium-term catalysts

Power Grid (PWGR) owns 40% of India's transmission assets – the lowest-risk segment in the power sector. Private sector participation in transmission may increase but inherent entry barriers are likely to keep competition in check. Further, a majority of the company's assets will remain under the protected cost-plus-regulated return model. Valuations are also attractive at 7.2x FY22E EV/EBITDA. On the flip side, the decline in order backlog and asset addition is unlikely to reverse in the medium term. Initiate with ADD, Mar'22 TP Rs 261.

Tarun Bhatnagar

research@bobcaps.in

Growth at low risk: PWGR owns 40% of India's transmission lines.

Transmission is the least risky segment in the power sector due to a secure payment system and low scope for default given discoms' high dependence on the transmission grid. We expect a steady 6% CAGR in India's transmission network over FY22-FY25, in line with the growth in generation capacity.

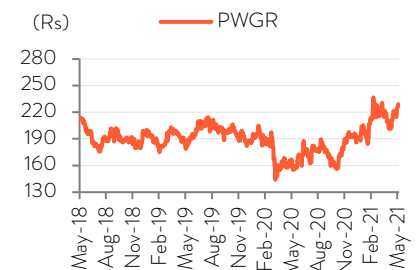
Ready for competition; regulated asset share to remain high: In our view, PWGR can maintain market share in the open market under tariff-based competitive bidding (TBCB), as inherent entry barriers such as scale, execution and balance sheet strength will curb competition. Over 90% of its business mix will remain dominated by projects under the regulatory tariff mechanism (RTM) where returns (currently at 15.5% till FY24) are higher than TBCB projects.

Valuations low but modest network scale-up a negative: Valuations are attractive at 7.2x FY22E EV/EBITDA and a special dividend from the company's InvIT listing is likely, but we believe asset addition is unlikely to rise sharply in the medium run as the order backlog is at its lowest in five years. We initiate on PWGR with ADD and an SOTP-based TP of Rs 261, which implies 7.6x FY22E EV/EBITDA. Key positive drivers are special dividends and order wins. A negative driver will be swift opening of the sector to private investment.

Ticker/Price	PWGR IN/Rs 229
Market cap	US\$ 16.3bn
Shares o/s	5,232mn
3M ADV	US\$ 40.2mn
52wk high/low	Rs 238/Rs 153
Promoter/FPI/DII	51%/28%/14%

Source: NSE

STOCK PERFORMANCE



Source: NSE

KEY FINANCIALS

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue (Rs mn)	3,50,591	3,77,435	3,74,591	3,83,673	4,08,590
EBITDA (Rs mn)	2,76,937	3,46,236	3,41,797	3,48,602	3,69,133
Adj. net profit (Rs mn)	1,00,335	1,24,034	1,10,941	1,20,975	1,28,023
Adj. EPS (Rs)	19.2	23.7	21.2	23.1	24.5
Adj. EPS growth (%)	22.3	23.6	(10.6)	9.0	5.8
Adj. ROAE (%)	4.0	4.6	4.0	4.3	4.5
Adj. P/E (x)	11.9	9.7	10.8	9.9	9.4
EV/EBITDA (x)	8.4	7.0	7.3	7.2	6.8

Source: Company, BOBCAPS Research

Investment thesis

Largest transmission player in India

PWGR, 51% owned by the Indian government, operates the key interstate transmission (ISTS) and interregional transmission networks in the country. With a network of 163,282 circuit kilometres (ckm) as at end-FY20, the company owns 40% of India’s transmission lines and has 85% share in ISTS and interregional markets.

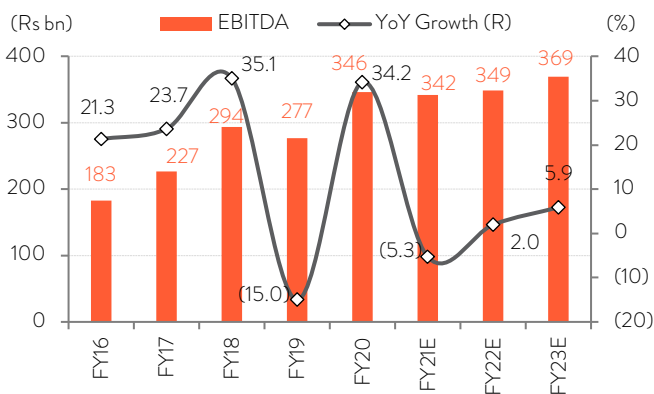
Most of PWGR’s assets are under the RTM model which is based on cost-plus-return on regulated equity and currently earn an IRR of 15.5% based on CERC guidelines. These guidelines are reviewed every five years (next change will be effective in FY24). Increasingly, new projects both at the central and state level are being bid out under the TBCB model, wherein contracts are awarded based on bidding rounds that are also open to private companies.

Besides its core transmission business, PWGR leverages its large network to offer telecom services such as leasing of lines, internet and VPN (virtual private network) services. It also has a small transmission sector-related consulting business. Both these businesses together contribute less than 5% to group operating profit.

Good performance record

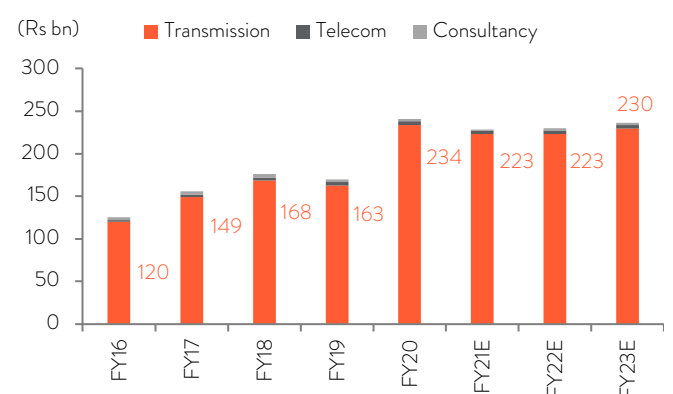
Driven by strong asset addition and a relatively safe business model, PWGR has posted reasonable earnings growth in the last five years and especially during FY16-FY18. Its ROE at 17.5% on average since FY16 is also among the highest in the sector. We expect a 7.3% EPSCAGR over FY21-FY23 driven by growing asset base.

FIG 1 – STRONG EBITDA GROWTH OVER FY16-FY18



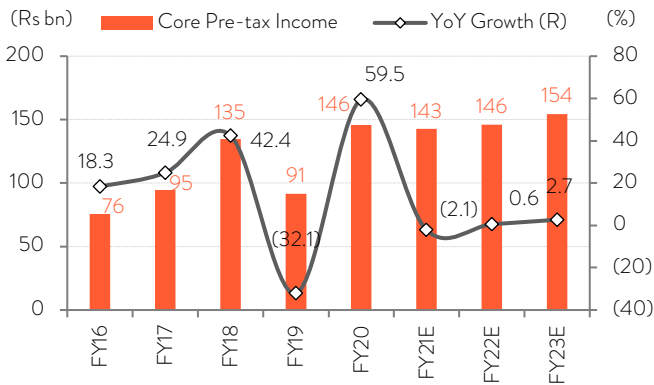
Source: Company, BOBCAPS Research

FIG 2 – TRANSMISSION BUSINESS EARNS HIGHEST EBIT



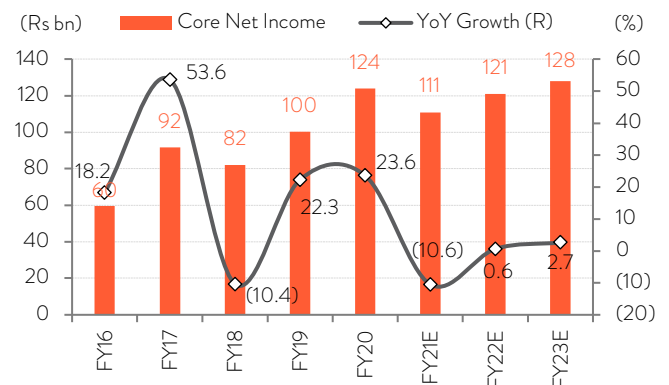
Source: Company, BOBCAPS Research

FIG 3 – ROBUST GROWTH IN PBT OVER FY16-FY18



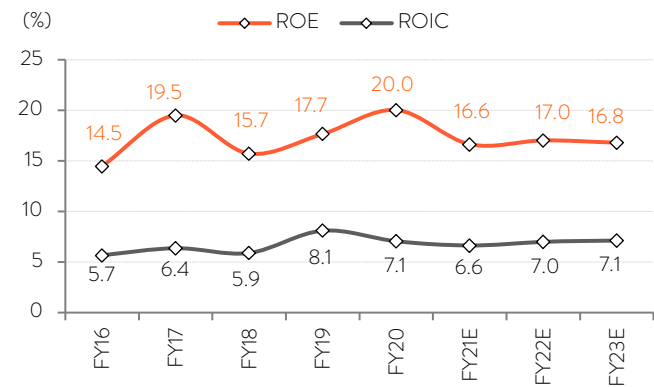
Source: Company, BOBCAPS Research

FIG 4 – CORE NET INCOME SET TO GROW STEADILY



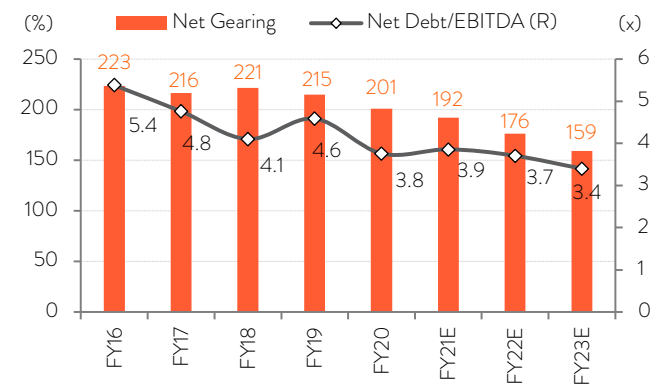
Source: Company, BOBCAPS Research

FIG 5 – ROE TO REMAIN ROBUST



Source: Company, BOBCAPS Research

FIG 6 – BALANCE SHEET IN GOOD SHAPE



Source: Company, BOBCAPS Research

Leadership in low-risk transmission sector sustainable

Among central government-owned entities, PWGR has maintained strong market share in annual transmission capacity addition (DVC or Damodar Valley Corp, the other central government owned entity in this space, has a very small share). The share of the private sector has remained volatile and below 20% in transmission lines and largely below 10% in substations.

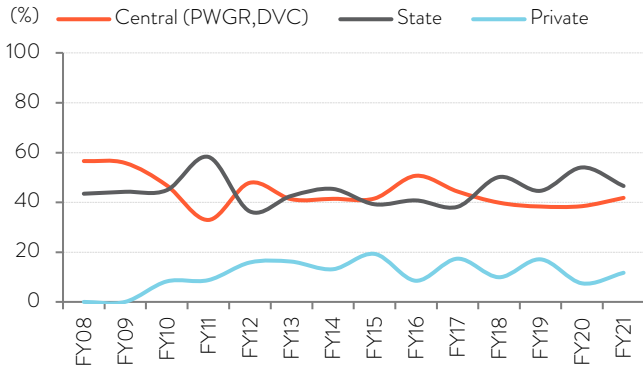
This is because PWGR continues to be nominated by the National Committee on Transmission (NCT) for a majority of the ISTS projects in RTM mode. In addition, the company has won several TCB projects under competitive bidding by virtue of its expertise and dominance in the sector.

We expect PWGR to maintain its leadership in the sector over the medium term, with only a minimal decline in market share even if private sector participation rises, for the following reasons:

- For strategic projects which will be a backbone of the network, government authorities may continue to favour PWGR, implying sustained RTM project flow.

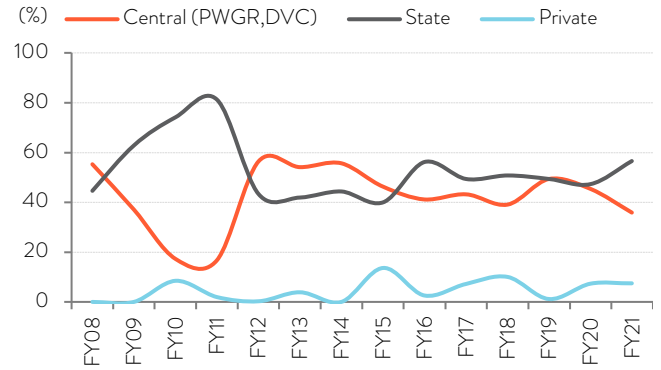
- Even if private participation increases, competition may not intensify as the industry has considerable entry barriers – scale to manage operations and construct large projects, financial muscle, and ability to manage right-of-way.

FIG 7 – TRANSMISSION LINE ADDITION SHARE



Source: CEA

FIG 8 – SUBSTATION ADDITION SHARE

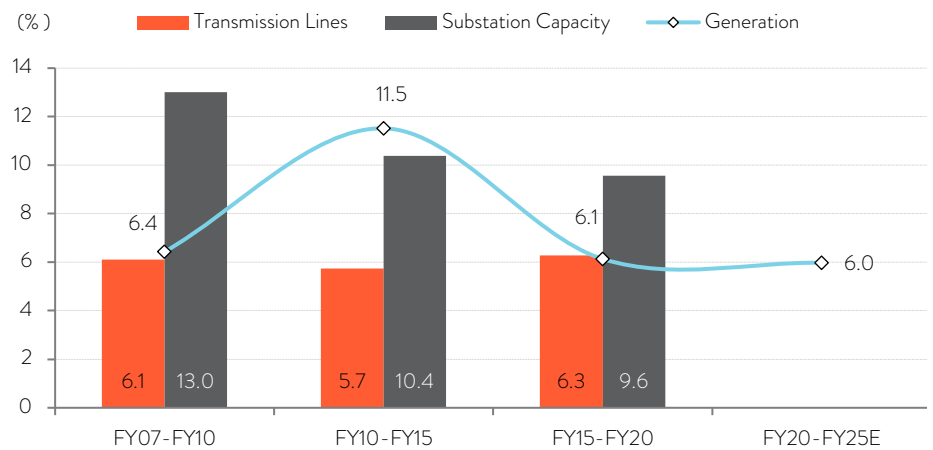


Source: CEA

Growth in generation to fuel transmission sector

Transmission segment growth will continue to be powered by the generation sector as new plants have to be connected to the grid. In addition, higher power generation requires grid capacity to keep pace. We expect a steady 6% CAGR in India’s transmission network over FY22-FY25, in line with the estimated increase in generation capacity.

FIG 9 – TRANSMISSION SECTOR GROWTH (CAGR)



Source: Central Electricity Authority, BOBCAPS Research

Safe payment over 35 years

Transmission projects are offered as a 35-year concession which is a longer duration than generation power purchase agreements (PPA) of 25 years. The transmission business is the safest haven in the power sector as payments are provided under the Point of Connection (PoC) method, where the monies from users including discoms, generation companies and traders are pooled by the Central Transmission Unit (CTU) as payment for the entire network. The CTU then disburses the transmission payments to various owners of the grid, based on their tariff agreement.

PWGR CTU separation would not impact TBCB business

So far, the CTU has been a 100% independent subsidiary of PWGR. However, in Mar'21, the Indian government announced that it would take ownership of the CTU, as required under the Electricity Act 2003, so that it can function as an independent body. There have been allegations of PWGR having an unfair advantage over peers due to its ownership of CTU.

In our view, the impact of this separation will be limited as PWGR already has vast expertise in the transmission business along with a deep understanding of competition and project requirements versus other parties. Overall, we believe the company will be able to maintain a decent share in the TBCB market due to its size, scale and knowledge of the sector.

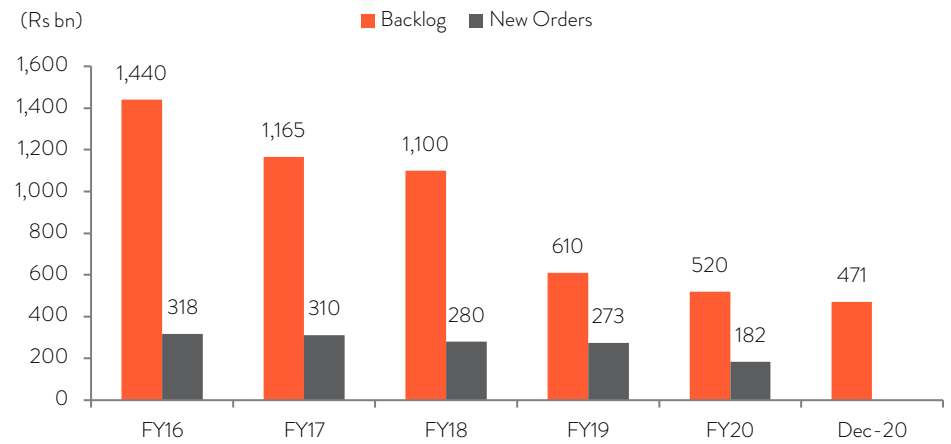
InvIT listing offers higher dividend, asset monetisation option

PWGR's InvIT listing on 14 May 2021 will raise Rs 27.5bn, which if 50% paid would lead to Rs 2.6/sh in dividend or 1.2% of the current price. In future, this vehicle could be used to divest other TBCB assets, helping the company raise funds through asset monetisation.

New orders and backlog moderating

PWGR's transmission backlog peaked at Rs 1.4tn in FY16 and has been falling ever since, with a print one-third the size at Rs 471bn in 9MFY21. While the outlook for transmission remains strong, we expect a steady – but not sharp – rise in new orders. This stems from our belief that power generation growth would remain at ~6% vs. the double-digit run seen over FY10-FY15. We, therefore, do not expect the company's order backlog to touch the highs of FY16 any time soon.

FIG 10 – ORDER BACKLOG AND NEW WINS AT A 5Y LOW



Source: Company

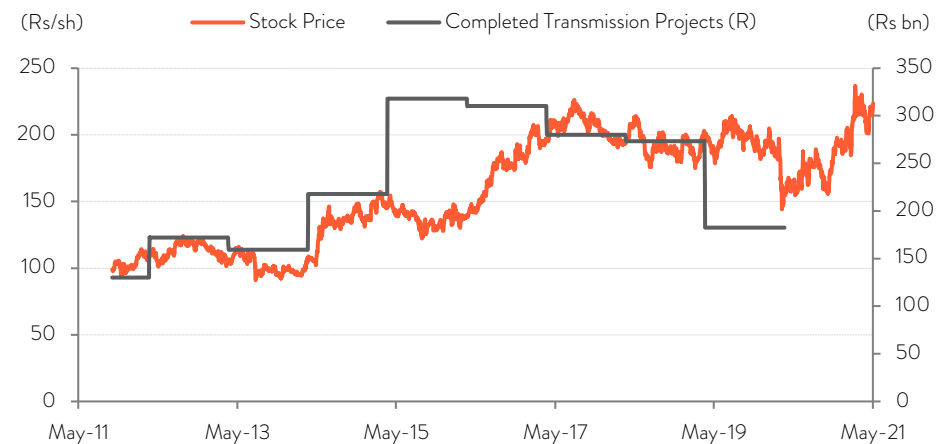
Fall in backlog unlikely to reverse in the medium term, capping the stock price

Sharp increase in new additions needed to drive stock price

PWGR’s stock price rallied strongly during FY15-FY17 when new project completions last peaked. Since then, the annual capitalisation or addition of new capacities has flattened out, falling to a five-year low in FY20. The outlook on capitalisation can only improve if there is a rush of projects. As mentioned, we expect a steady but not sharp increase in transmission investment for the next few years. Upsides to our estimates could only come from the following:

- a dramatic increase in new orders for generation plants, especially renewables, which is necessary to meet the government’s targeted renewable energy capacity of 450GW by 2030, and
- more states opting for the TBCB route given the weak financial position of discoms, fuelling an increase in new orders.

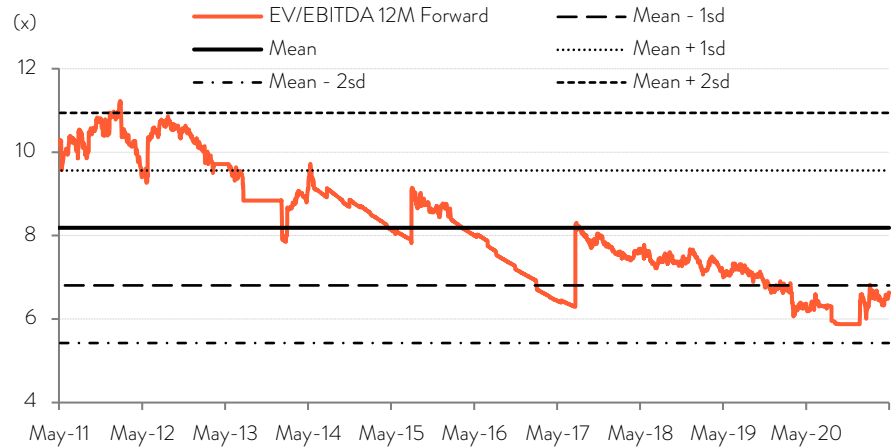
FIG 11 – PWGR STOCK PRICE VS. PROJECT COMPLETIONS



Source: Company, Bloomberg, BOBCAPS Research

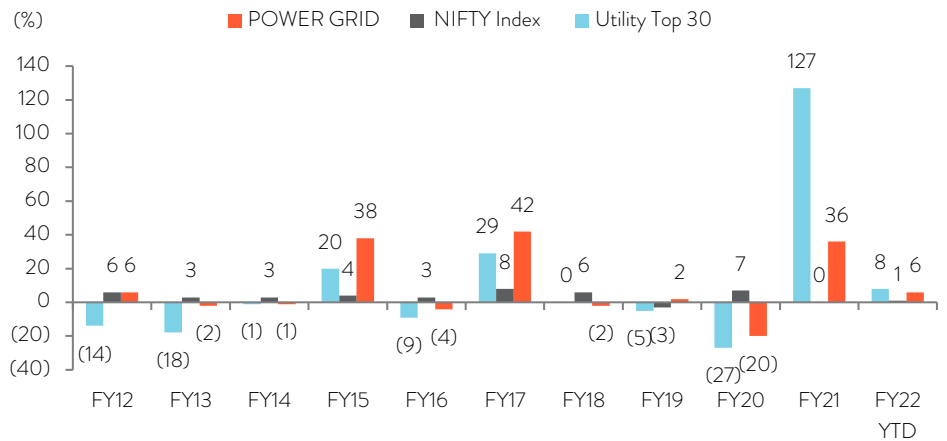
The company’s valuations have also declined steadily over the last 10 years, moving from 11x to 7x one-year forward EV/EBITDA currently. The stock is relatively sedate and has moved by +/-10% in only 4 of the last 10 years.

FIG 12 – VALUATIONS HAVE CONTINUED TO FALL SINCE LISTING



Source: Bloomberg

FIG 13 – STOCK HAS MOVED BY +/-10% ONLY IN 4 OF LAST 10 YEARS



Source: Bloomberg, BOBCAPS Research

Valuation methodology

Steady income growth in FY21-FY23E

We estimate a steady 7.3% CAGR in net income for PWGR over FY21-FY23 spurred by existing assets and assumptions of Rs 100bn worth of new RTM-based orders per year for the next five years, in addition to the current backlog of projects. We are close to consensus in terms of our EPS estimates.

FIG 14 – PWGR – BOBCAPS ESTIMATES VS. CONSENSUS

(Rs bn)	BOBCAPS			Consensus			BOBCAPS vs. Consensus (%)		
	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E
Revenue	375	384	409	398	417	435	(5.9)	(8.0)	(6.1)
EBITDA	342	349	369	352	370	385	(3.0)	(5.9)	(4.1)
EBIT	218	219	225	231	247	255	(5.6)	(11.1)	(11.8)
Pretax Income	154	146	154	154	169	177	(0.1)	(13.6)	(12.5)
Net Income	111	121	128	120	131	137	(7.4)	(7.5)	(6.6)
EPS (Rs)	21.2	23.1	24.5	22.3	24.7	26.0	(4.9)	(6.4)	(5.8)

Source: BOBCAPS Research, Bloomberg

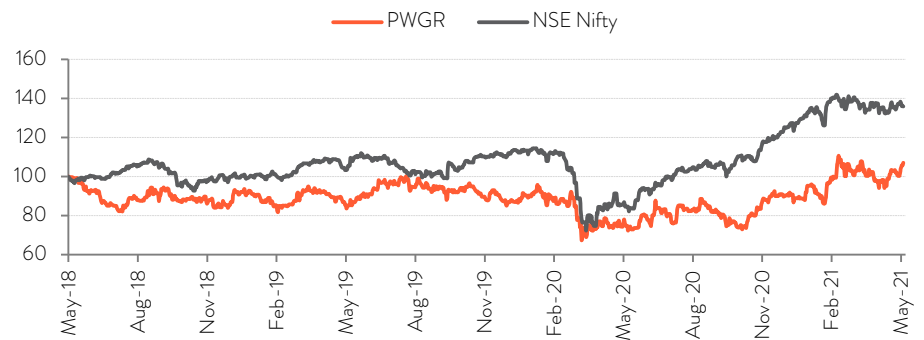
Initiate with ADD, TP Rs 261

Valuations are attractive at 7.2x FY22E EV/EBITDA and a special dividend from the recent InvIT listing is likely, but we believe new asset addition is unlikely to rise dramatically as the company's order backlog is at a five-year low. We initiate coverage with a Mar'22 SOTP-based target price of Rs 261, which implies an EV/EBITDA of 7.6x on FY23E – 7% below the 10-year mean. Given the company's steady but unexceptional growth outlook, we believe this multiple is justified and initiate coverage with an ADD rating.

FIG 15 – SOTP VALUATION SUMMARY

Business (Rs mn)	EV	Net Debt FY22E	Equity Value	% Stake	Value of Stake	EV/EBITDA FY22E (x)	EBITDA FY22E
Standalone	23,44,777	11,96,874	11,47,903	100	11,47,903	7.1	3,30,381
Subsidiaries	2,04,873	81,437	1,23,436	100	1,23,436	11.2	18,221
Future TBCB Projects	73,438	0	73,438	100	73,438		
Elimination	0	13,924	-13,924	100	-13,924	7.3	0
Majority Owned	26,23,088	12,92,235	13,30,853		13,30,853	7.5	3,48,602
Joint Ventures							
InvIT			1,00,000	26	26,000		
Other JVs					15,781		
Total					13,72,635	7.6	
Number of Shares (mn)					5,232		
Target Price (Rs)					262		
Target Price (Rs) – rounded to the nearest 1					261		

Source: BOBCAPS Research

FIG 16 – RELATIVE STOCK PERFORMANCE

Source: NSE

Key risks

- Upside risks to our estimates include faster-than-estimated growth in new transmission orders.
- Downside risks include slow order flows and a rapid opening up of the sector to private players, leading to more projects bid out under the TBCB model.

FINANCIALS

Income Statement

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue	3,50,591	3,77,435	3,74,591	3,83,673	4,08,590
EBITDA	2,76,937	3,46,236	3,41,797	3,48,602	3,69,133
Depreciation	(1,05,409)	(1,16,070)	(1,23,843)	(1,29,434)	(1,44,141)
EBIT	1,71,527	2,30,166	2,17,955	2,19,168	2,24,992
Net interest income/(expenses)	(96,196)	(95,484)	(99,791)	(99,225)	(96,868)
Other income/(expenses)	14,852	9,668	23,108	23,108	23,108
Exceptional items	0	0	10,786	0	0
EBT	91,471	1,45,902	1,53,581	1,45,968	1,54,446
Income taxes	8,864	(35,308)	(31,854)	(24,994)	(26,423)
Extraordinary items	0	0	0	0	0
Min. int./Inc. from associates	1,288	1,551	1,524	2,918	3,215
Reported net profit	1,00,335	1,10,594	1,21,727	1,20,975	1,28,023
Adjustments	0	13,440	(10,786)	0	0
Adjusted net profit	1,00,335	1,24,034	1,10,941	1,20,975	1,28,023

Balance Sheet

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Accounts payables	3,651	2,265	2,248	4,205	4,478
Other current liabilities	10,663	9,686	9,669	11,625	11,898
Provisions	0	0	0	0	0
Debt funds	13,13,295	13,54,211	13,55,874	13,30,602	12,94,864
Other liabilities	5,69,397	5,65,368	5,65,368	5,65,368	5,65,368
Equity capital	52,316	52,316	52,316	52,316	52,316
Reserves & surplus	5,38,568	5,94,638	6,33,994	6,81,480	7,36,469
Shareholders' fund	5,90,884	6,46,954	6,86,310	7,33,796	7,88,785
Total liabilities and equities	26,50,195	27,47,652	27,88,654	28,12,824	28,32,348
Cash and cash eq.	43,367	54,390	37,459	38,367	40,859
Accounts receivables	47,281	50,407	71,839	63,069	55,971
Inventories	12,473	14,335	14,227	21,023	22,388
Other current assets	73,499	61,988	61,988	61,988	61,988
Investments	1,298	989	989	989	989
Net fixed assets	17,10,580	17,94,498	18,26,902	18,80,086	19,02,938
CWIP	0	19,353	0	0	0
Intangible assets	0	19,353	19,353	19,353	19,353
Deferred tax assets, net	0	0	0	0	0
Other assets	7,61,698	7,32,339	7,55,897	7,27,949	7,27,862
Total assets	26,50,195	27,47,652	27,88,654	28,12,824	28,32,348

Source: Company, BOBCAPS Research

Cash Flows

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Net income + Depreciation	2,05,744	2,26,664	2,45,570	2,50,409	2,72,164
Interest expenses	87,366	95,090	78,574	77,688	75,399
Non-cash adjustments	18,122	10,066	(3,414)	(4,488)	(4,853)
Changes in working capital	3,11,233	3,31,821	3,20,729	3,23,608	3,42,710
Other operating cash flows	(3,65,851)	(3,27,550)	(3,42,071)	(3,19,679)	(3,36,704)
Cash flow from operations	2,56,614	3,36,092	2,99,388	3,27,538	3,48,716
Capital expenditures	(2,24,507)	(1,13,671)	(1,56,247)	(1,82,618)	(1,66,993)
Change in investments	35,232	1,016	(3,516)	27,415	0
Other investing cash flows	518	(124)	0	0	0
Cash flow from investing	(1,88,756)	(1,12,780)	(1,59,763)	(1,55,203)	(1,66,993)
Equities issued/Others	0	0	0	0	0
Debt raised/repaid	86,192	(17,397)	1,663	(25,272)	(35,738)
Interest expenses	(87,366)	(95,090)	(78,574)	(77,688)	(75,399)
Dividends paid	(54,554)	(53,440)	(82,371)	(73,488)	(73,034)
Other financing cash flows	87,147	1,43,795	1,59,282	1,76,448	1,84,172
Cash flow from financing	31,420	(22,132)	0	0	0
Changes in cash and cash eq.	45,032	37,611	(16,931)	908	2,492
Closing cash and cash eq.	43,367	54,390	37,459	38,367	40,859

Per Share

Y/E 31 Mar (Rs)	FY19A	FY20A	FY21E	FY22E	FY23E
Reported EPS	19.2	21.1	23.3	23.1	24.5
Adjusted EPS	19.2	23.7	21.2	23.1	24.5
Dividend per share	8.3	10.0	11.6	11.6	12.2
Book value per share	112.9	123.7	131.2	140.3	150.8

Valuations Ratios

Y/E 31 Mar (x)	FY19A	FY20A	FY21E	FY22E	FY23E
EV/Sales	6.7	6.5	6.6	6.5	6.1
EV/EBITDA	8.4	7.0	7.3	7.2	6.8
Adjusted P/E	11.9	9.7	10.8	9.9	9.4
P/BV	2.0	1.9	1.7	1.6	1.5

DuPont Analysis

Y/E 31 Mar (%)	FY19A	FY20A	FY21E	FY22E	FY23E
Tax burden (Net profit/PBT)	109.7	85.0	77.7	82.9	82.9
Interest burden (PBT/EBIT)	53.3	63.4	65.5	66.6	68.6
EBIT margin (EBIT/Revenue)	48.9	61.0	58.2	57.1	55.1
Asset turnover (Revenue/Avg TA)	14.0	14.0	13.5	13.7	14.5
Leverage (Avg TA/Avg Equity)	4.4	4.4	4.2	3.9	3.7
Adjusted ROAE	17.7	20.0	16.6	17.0	16.8

Source: Company, BOBCAPS Research | Note: TA = Total Assets

Ratio Analysis

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
YoY growth (%)					
Revenue	17.0	7.7	(0.8)	2.4	6.5
EBITDA	(5.8)	25.0	(1.3)	2.0	5.9
Adjusted EPS	22.3	23.6	(10.6)	9.0	5.8
Profitability & Return ratios (%)					
EBITDA margin	79.0	91.7	91.2	90.9	90.3
EBIT margin	48.9	61.0	58.2	57.1	55.1
Adjusted profit margin	28.6	32.9	29.6	31.5	31.3
Adjusted ROAE	4.0	4.6	4.0	4.3	4.5
ROCE	7.3	9.1	8.4	8.4	8.5
Working capital days (days)					
Receivables	49	49	70	60	50
Inventory	13	14	14	20	20
Payables	4	2	2	4	4
Ratios (x)					
Gross asset turnover		0.3	0.2	0.2	0.2
Current ratio	1.0	1.0	1.0	1.0	1.0
Net interest coverage ratio	1.8	2.4	2.2	2.2	2.3
Adjusted debt/equity	2.2	2.1	2.0	1.8	1.6

Source: Company, BOBCAPS Research

ADD

TP: Rs 461 | ▲ 8%

TORRENT POWER

Power

18 May 2021

Distribution strong but gas generation a drag; initiate with ADD

Torrent Power's (TPW) two decades of experience in distribution puts the company in a good position to win more circles as the sector opens up. But renewal of the flagship Ahmedabad contract in 2025 and tariff renewal this year are concerns. Meanwhile, the company's stranded DGen gas plant will continue to struggle for PPAs as demand for gas-based power remains weak. TPW is trading close to its peak consensus FY22E EV/EBITDA of 7.2x. Initiate with ADD and a Mar'22 TP of Rs 461.

Tarun Bhatnagar

research@bobcaps.in

Major player in growing distribution market: TPW has a two-decade-long record in electricity distribution to ~4mn customers in three states. As the distribution sector opens up, the company is likely to bag new concessions akin to the recently won Dadra & Nagar Haveli and Daman & Diu contracts (albeit stuck in courts). TPW's strong balance sheet also supports further investments.

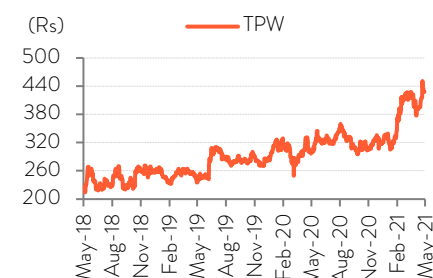
Concession expiry and unused gas capacity key concerns: TPW's flagship distribution concession in Ahmedabad comes up for tariff renewal in FY22 and will complete the 25 years allowed under the current contract on 31 Mar 2025. About 40% of TPW's 3.1GW capacity at the DGen plant has not been tied to a PPA ever since it was completed in 2014, forcing the company to write off Rs 10bn in FY20. Selling in the spot market is not feasible at current electricity and LNG prices, and the use of gas plants to balance the grid will depend on incentives and gas prices.

Initiate with ADD: At 7.2x FY22E, the stock's current EV/EBITDA is at a 70% premium to the 10Y mean. Our SOTP-based Mar'22 TP of Rs 461 is set at an implied 7.2x FY22E EV/EBITDA, translating to an upside of 8%. Key negative drivers for the stock are further write-downs and higher gas prices. Key positives are new distribution concession wins and PPAs for the DGen plant.

Ticker/Price	TPW IN/Rs 428
Market cap	US\$ 2.8bn
Shares o/s	481mn
3M ADV	US\$ 9.6mn
52wk high/low	Rs 457/Rs 291
Promoter/FPI/DII	54%/8%/20%

Source: NSE

STOCK PERFORMANCE



Source: NSE

KEY FINANCIALS

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue (Rs mn)	1,31,510	1,36,406	1,31,604	1,35,773	1,39,616
EBITDA (Rs mn)	31,995	35,561	34,224	37,343	41,334
Adj. net profit (Rs mn)	8,989	21,742	12,150	15,097	16,187
Adj. EPS (Rs)	18.7	45.2	25.3	31.4	33.7
Adj. EPS growth (%)	(4.6)	141.9	(44.1)	24.3	7.2
Adj. ROAE (%)	3.8	9.0	5.2	6.5	6.6
Adj. P/E (x)	22.9	9.5	16.9	13.6	12.7
EV/EBITDA (x)	8.8	8.0	8.2	7.2	6.3

Source: Company, BOBCAPS Research

Investment rationale

Major player in growing distribution market

TPW is ~54% owned by the promoter family with the balance held by institutional and individual investors. The company owns 3.9GW of generation capacity, of which 2.7GW is gas-based (11% of India’s gas generation capacity), sells 17.5bn units and has 1.4% share in India’s 1.29tn unit power distribution market.

FIG 1 – TPW’S POWER ASSETS

Generation				Distribution		
Plant	Capacity (MW)	Remaining life (years)	PPA (%)	Area	Consumption (mn units)	Remaining life (years)
DGen	1,200	19	0	Distribution PPA (regulated return)		
Sugen	1,148	13	79	Ahmedabad	7,822	4
Unosugen	383	17	73	Surat	3,400	7
Amgen	362	1	100	Dahej	481	13
				Dholera	27	24
Solar	138	20	100	Distribution franchisee		
Wind	649	22	100	Bhiwandi	3,243	6
				Agra	1,801	9
Under development	515	25	100	SMK	400	19

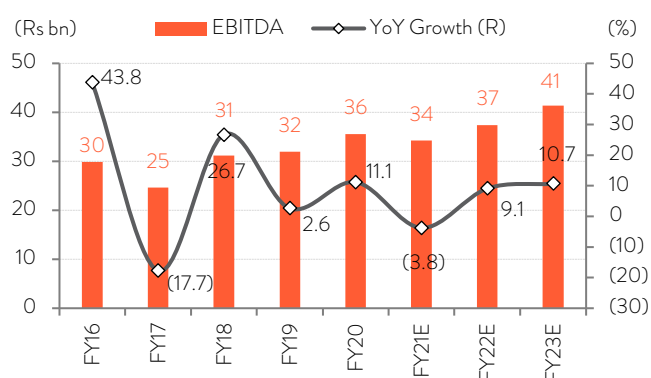
Source: Company

Traditional
Green Energy
Distribution

TPW one of the largest private sector distributors; well placed to win bids for privatisation

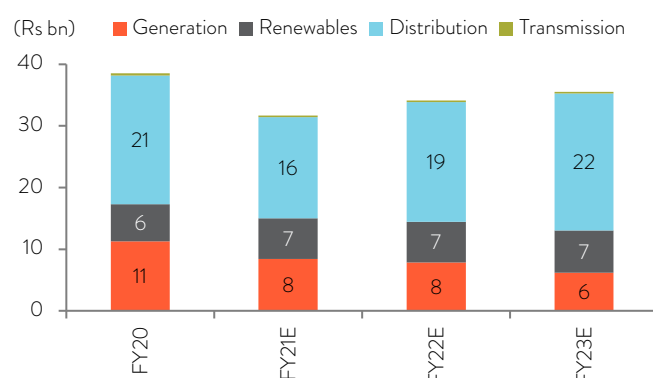
TPW has a reasonably good growth record, reporting an 11% CAGR in EBITDA and 14% CAGR in core pre-tax income over FY15-FY20. Growth has been driven by the distribution business as well as new renewable plants which generally have a higher tariff. About 54% of FY20 EBITDA was contributed by distribution, 30% by thermal generation, and 17% by renewables. We expect the share of distribution to rise to 62% in FY23 with renewables moving up to 19% and thermal generation declining to 18%.

FIG 2 – EBITDA TO RECOVER IN FY22E-FY23E



Source: Company, BOBCAPS Research

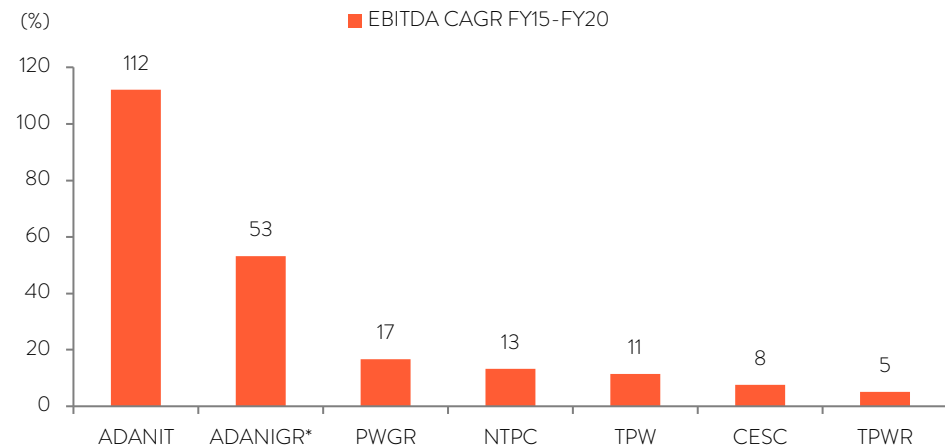
FIG 3 – EBITDA MIX LED BY DISTRIBUTION



Source: Company, BOBCAPS Research

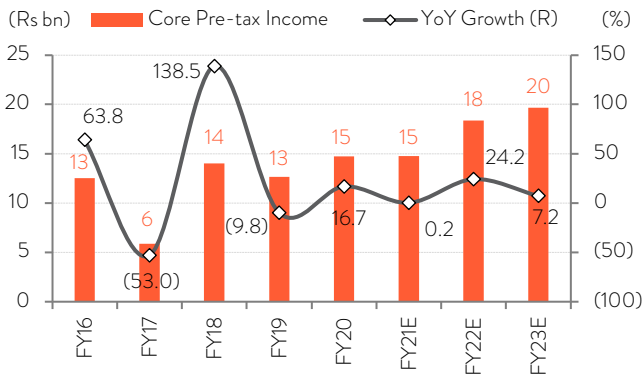
FIG 4 – EBITDA GROWTH HAS BEEN LOWER THAN PEERS

Decent EBITDA growth over the last five years but low compared to some peers



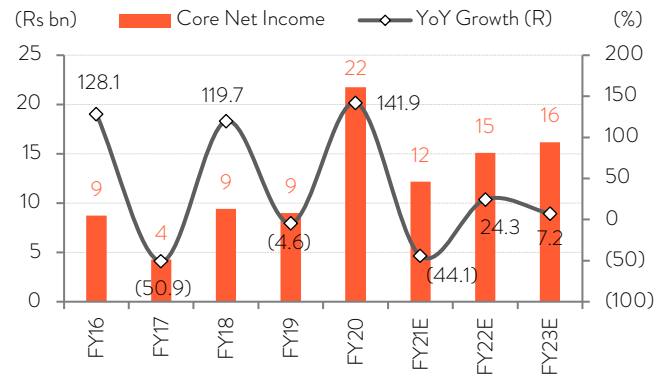
Source: Bloomberg | *ADANIGR's growth based on FY17-FY20 data

FIG 5 – PRE-TAX INCOME TO RISE IN FY22E-FY23E



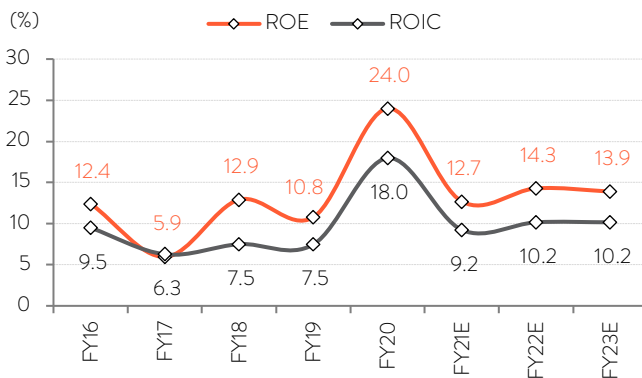
Source: Company, BOBCAPS Research

FIG 6 – FY20 NET INCOME HIGH DUE TO TAX CREDIT



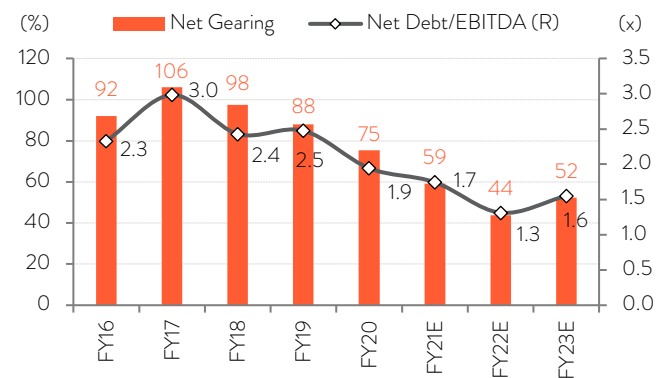
Source: Company, BOBCAPS Research

FIG 7 – RETURNS DECENT BUT VOLATILE



Source: Company, BOBCAPS Research

FIG 8 – BALANCE SHEET STRONG



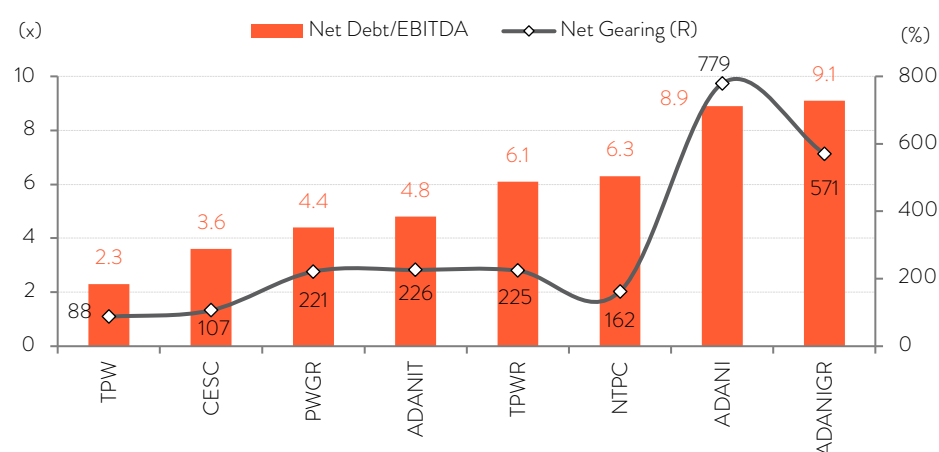
Source: Company, BOBCAPS Research

Recent distribution wins

In Feb'21, TPW won the bids for power distribution concessions in the union territories of Dadra & Nagar Haveli and Daman & Diu, overcoming competitors such as Tata Power (TPWR) and Adani Transmission (ADANITR). The process has, however, been held up following the admission of a public interest litigation against privatisation in court.

Bidding for Chandigarh is under process while other union territories such as Puducherry and Jammu & Kashmir are expected to invite bids in coming quarters. TPW has one of the strongest balance sheets in the sector, which will enable it to fund growth.

FIG 9 – TPW HAS ONE OF THE STRONGEST BALANCE SHEETS IN THE SECTOR



Source: Bloomberg | ADANI – Adani Power

Overhang from contract expiry and tariff resetting

Ahmedabad concession expiring in Mar'25

TPW's five-year distribution tariff in Ahmedabad is due for a reset by the Gujarat Electricity Regulatory Commission (GERC) in FY22, besides which the company will complete the 25 years allowed under the current contract on 31 Mar 2025. The key variable driving distribution company earnings is the return on regulated equity, which is currently set at 14%. Given that the CERC's regulated equity return norms for generation and transmission were kept flat at 15.5% for FY19-FY23 (decided before GERC's last tariff setting for Ahmedabad), it is less likely that GERC will reduce the returns.

Apart from the tariff reset overhang, TPW's 33-year-old coal generation plant Amgen may not be able to meet sulphur dioxide (SO_x) emission norms due to a dearth of space to set up the prescribed flue gas desulfurisation (FGD) plant.

Gas plant earnings will depend on incentives and gas prices

Gas plant operations face challenges

In 2019, TPW's UnoSugen gas plant signed PPAs with discom customers for 72% of its generation capacity. This contract is subject to a total tariff ceiling of Rs 5.61/unit and a variable tariff ceiling of Rs 4.416/unit. Therefore, at higher gas prices, the plant's profitability will decline. TPW procures ~75% of its gas requirements through LNG imports, has an agreement with IOCL for 20% and procures the balance 5% from Reliance Industries.

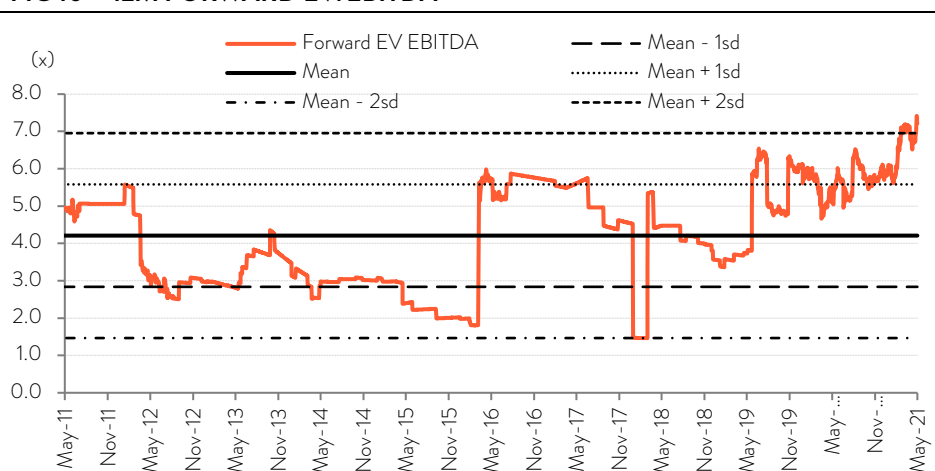
The DGen plant has not been able to sign a PPA since it was completed in 2014. As a result, the company had to write off Rs 10bn of the plant cost in FY20.

Valuation methodology

Valuation elevated relative to history

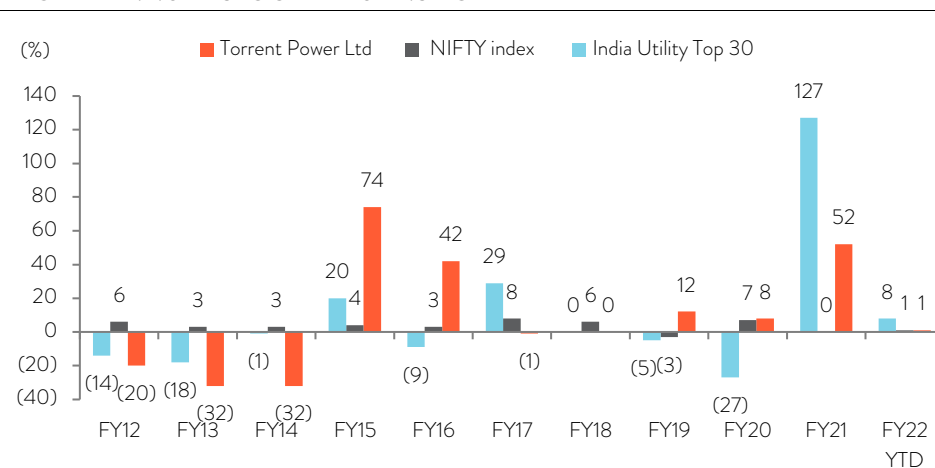
The stock is trading at a 70% premium to its 10-year mean forward EV/EBITDA and at 30% premium to its 10-year mean forward P/BV. TPW posted a stable stock performance over FY15-FY20 but rallied sharply in FY21 largely due to new renewable order wins and its recent winning bids for Dadra & Nagar Haveli and Daman & Diu.

FIG 10 – 12M FORWARD EV/EBITDA



Source: Bloomberg

FIG 11 – ANNUAL STOCK RETURNS YOY



Source: Bloomberg

Initiate with ADD, TP Rs 461

Expect 15% EPS CAGR for FY21-FY23 led by lower AT&C losses and new plants

We estimate a 15% EPS CAGR for TPW over FY21-FY23 as AT&C losses normalise from the higher levels seen in FY21 due to Covid-19 and as commercial operations begin at new renewable plants. Our estimates are in line with consensus and are based on the plant load factor for generation, AT&C losses for the distribution business and growth in the renewables portfolio.

FIG 12 – KEY EARNINGS DRIVERS

(%)	FY16	FY17	FY18	FY19	FY20	FY21E	FY22E	FY23E
PLF (%)								
Sugen	35.8	47.5	65.3	62.3	59.9	63.3	63.3	63.3
Unsugen	34.6	27.3	33.3	33.4	40.7	54.4	54.4	54.4
Amgen	65.0	74.6	71.4	87.8	72.9	36.9	65.0	65.0
Dgen	25.7	-	-	-	6.5	6.0	-	-
Solar	19.0	17.9	17.3	17.6	17.1	17.5	17.5	17.5
Wind	21.6	22.2	27.3	30.1	29.0	25.8	29.0	29.0
AT&C Losses (%)								
Ahmedabad -	7.2	6.8	6.3	5.6	5.0	5.3	4.5	4.5
Surat	3.9	3.9	3.6	3.4	3.4	3.6	3.4	3.4
Dahej	0.8	0.5	0.4	0.4	0.3	0.3	0.3	0.3
Bhiwandi	22.4	21.7	17.6	15.1	11.9	14.2	12.0	10.0
Agra	29.3	24.7	19.2	14.2	12.5	13.0	12.5	10.0
SMK	-	-	-	-	47.0	47.0	40.0	35.0

Source: BOBCAPS Research, Company

FIG 13 – TPW – BOBCAPS ESTIMATES VS. CONSENSUS

(Rs bn)	BOBCAPS			Consensus			BOBCAPS vs. Consensus (%)		
	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E
Revenue	132	136	140	134	145	151	(2.0)	(6.2)	(7.7)
EBITDA	34	37	41	34	38	40	0.3	(0.7)	4.5
EBIT	20	22	24	22	24	25	(6.8)	(8.8)	(6.6)
Pretax Income	15	18	20	15	18	20	(0.7)	2.7	0.2
Net Income	12	15	16	12	14	15	3.0	9.6	8.2
EPS (Rs)	25.3	31.4	33.7	24.7	29.2	31.9	2.5	7.6	5.6

Source: BOBCAPS Research, Bloomberg

We have a Mar'22 target price of Rs 461 for TPW based on an SOTP valuation, arrived at via a DCF assessment of various assets. Our model discounts the cash flows of the company's projects till the current PPA lasts, assuming no extension only for generation plants. For distribution assets under the regulated return model, we have assumed extension of the concession period by another 25 years post-expiry.

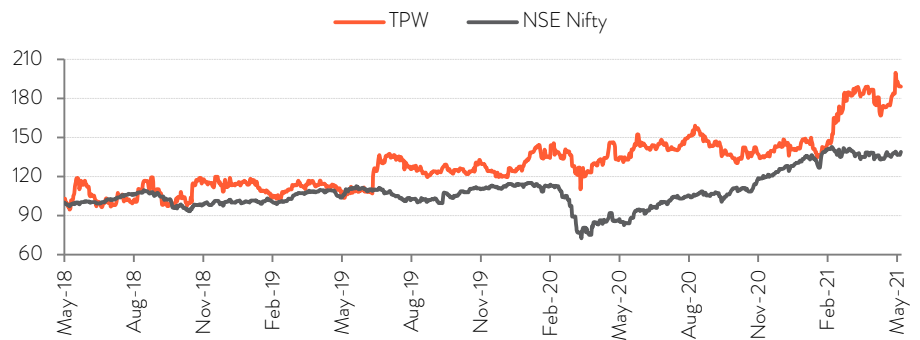
Key DCF assumptions include (1) cost of equity of 9.4% based on a risk-free rate of 6.12% as per the 10-year India bond yield as of end-Mar'21, (2) market risk premium of 6.85% based on NYU Stern estimates, (3) beta of 0.48 as per the last two-year weekly returns as of end-Mar'21, and (4) cost of debt of 8.5% factoring in the company's current debt cost.

Our Mar'22 TP of Rs 461 implies 7.2x FY22E EV/EBITDA and translates to an upside of 8%. We initiate coverage with an ADD rating.

FIG 14 – SOTP VALUATION

Segment (Rs mn)	EV	Net Debt FY22E	Equity Value	% Share	Contribution to Group Equity Value	EBITDA FY22E	EV/EBITDA (x)
Generation							
Sugen	18,978	5,914	13,064	100	13,064	3,253	5.8
Amgen	592	4,145	(3,553)	100	(3,553)	2,263	0.3
Unosugen	19,079	6,074	13,005	100	13,005	2,597	7.3
Dgen	(2,899)	37,904	(40,803)	100	(40,803)	(300)	9.7
Merchant Market	630	-	630	100	630	72	8.7
Sub-Total	36,380	54,038	(18,287)		(18,287)	7,812	4.7
Renewables	57,640	22,976	34,665	100	34,665	6,542	8.8
Distribution							
Ahmedabad / Gandhinagar	88,459	33,190	55,269	100	55,269	9,256	9.6
Surat	24,508	2,778	21,730	100	21,730	2,278	10.8
Dahej	1,557	343	1,215	100	1,215	187	8.3
Bhiwandi	25,459	1,494	23,965	100	23,965	6,909	3.7
Agra	8,654	7,423	1,230	100	1,230	1,489	5.8
Dholera	1,693	1,892	(198)	100	(198)	231	7.3
Shil, Mumbra and Kalwa (SMK)	309	3,326	(3,017)	100	(3,017)	(913)	(0.3)
Sub-Total	1,50,640	50,446	1,00,194		1,00,194	19,438	7.7
Transmission	2,684	252	2,432	67	1,620	400	6.7
Elimination / Corporate Costs	22,797	(78,779)	1,01,576	100	1,01,576	3,151	7.2
Consolidated	2,67,457	48,933	2,18,147		2,19,767	37,343	7.2
Number of Share (mn)					481		
Price (Rs/sh)					457		
Target Price (Rs/sh) – rounded to nearest 1					461		

Source: BOBCAPS Research

FIG 15 – RELATIVE STOCK PERFORMANCE

Source: NSE

Key risks

- Upside risks include new distribution or renewable project wins, PPAs for the DGen plant and government incentives for gas power plants.
- Downside risks include negative news flow on tariff resetting for Ahmedabad and a sharp rise in gas price which could impact earnings of the UnoSugen plant as it has a ceiling beyond which passthrough on gas cost is disallowed.

FINANCIALS

Income Statement

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue	1,31,510	1,36,406	1,31,604	1,35,773	1,39,616
EBITDA	31,995	35,561	34,224	37,343	41,334
Depreciation	(12,265)	(13,043)	(14,062)	(15,177)	(17,583)
EBIT	19,730	22,518	20,162	22,166	23,750
Net interest income/(expenses)	(8,230)	(8,726)	(6,032)	(4,465)	(4,729)
Other income/(expenses)	1,137	956	650	650	650
Exceptional items	0	(10,000)	0	0	0
EBT	12,636	4,748	14,780	18,351	19,671
Income taxes	(3,598)	7,040	(2,582)	(3,206)	(3,437)
Extraordinary items	0	0	0	0	0
Min. int./Inc. from associates	(49)	(47)	(47)	(47)	(47)
Reported net profit	8,989	11,742	12,150	15,097	16,187
Adjustments	0	10,000	0	0	0
Adjusted net profit	8,989	21,742	12,150	15,097	16,187

Balance Sheet

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Accounts payables	8,098	10,379	10,014	11,159	11,475
Other current liabilities	8,522	13,078	12,713	13,858	14,174
Provisions	832	1,030	1,030	1,030	1,030
Debt funds	88,765	77,996	63,069	54,107	69,262
Other liabilities	28,203	19,668	19,716	19,763	19,810
Equity capital	4,806	4,806	4,806	4,806	4,806
Reserves & surplus	84,896	86,729	95,671	1,06,345	1,17,034
Shareholders' fund	89,702	91,535	1,00,477	1,11,151	1,21,840
Total liabilities and equities	2,45,540	2,36,230	2,29,928	2,32,832	2,59,040
Cash and cash eq.	9,549	8,879	3,367	5,174	5,180
Accounts receivables	12,297	12,798	16,225	12,647	13,005
Inventories	6,270	5,982	5,772	5,580	5,738
Other current assets	17,735	20,578	20,578	20,578	20,578
Investments	2,876	1,160	1,160	1,160	1,160
Net fixed assets	1,79,666	1,75,543	1,71,616	1,76,564	2,02,332
CWIP	35,927	5,674	0	0	0
Intangible assets	173	150	150	150	150
Deferred tax assets, net	36	199	199	199	199
Other assets	(18,987)	5,269	10,862	10,780	10,699
Total assets	2,45,540	2,36,230	2,29,928	2,32,832	2,59,040

Source: Company, BOBCAPS Research

Cash Flows

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Net income + Depreciation	21,255	24,784	26,212	30,274	33,770
Interest expenses	9,076	8,643	5,845	4,330	4,593
Non-cash adjustments	(1,355)	1,669	(416)	(467)	(467)
Changes in working capital	28,975	35,096	31,642	34,137	37,897
Other operating cash flows	(33,704)	(33,839)	(35,224)	(29,221)	(38,097)
Cash flow from operations	24,246	36,354	28,059	39,052	37,697
Capital expenditures	(19,887)	(13,337)	(10,053)	(20,043)	(43,270)
Change in investments	0	0	0	0	0
Other investing cash flows	834	1,100	0	0	0
Cash flow from investing	(19,053)	(12,237)	(10,053)	(20,043)	(43,270)
Equities issued/Others	0	0	0	0	0
Debt raised/repaid	4,185	(8,535)	(14,927)	(8,962)	15,156
Interest expenses	(9,076)	(8,643)	(5,845)	(4,330)	(4,593)
Dividends paid	(2,925)	(9,683)	(3,208)	(4,424)	(5,497)
Other financing cash flows	9,466	28,662	23,980	17,716	(5,065)
Cash flow from financing	1,650	1,800	0	0	0
Changes in cash and cash eq.	(204)	(249)	(5,511)	1,807	6
Closing cash and cash eq.	9,549	8,879	3,367	5,174	5,180

Per Share

Y/E 31 Mar (Rs)	FY19A	FY20A	FY21E	FY22E	FY23E
Reported EPS	18.7	24.4	25.3	31.4	33.7
Adjusted EPS	18.7	45.2	25.3	31.4	33.7
Dividend per share	5.0	11.6	7.6	9.4	10.1
Book value per share	186.6	190.5	209.1	231.3	253.5

Valuations Ratios

Y/E 31 Mar (x)	FY19A	FY20A	FY21E	FY22E	FY23E
EV/Sales	2.1	2.1	2.1	2.0	1.9
EV/EBITDA	8.8	8.0	8.2	7.2	6.3
Adjusted P/E	22.9	9.5	16.9	13.6	12.7
P/BV	2.3	2.2	2.0	1.9	1.7

DuPont Analysis

Y/E 31 Mar (%)	FY19A	FY20A	FY21E	FY22E	FY23E
Tax burden (Net profit/PBT)	71.1	147.4	82.2	82.3	82.3
Interest burden (PBT/EBIT)	64.0	65.5	73.3	82.8	82.8
EBIT margin (EBIT/Revenue)	15.0	16.5	15.3	16.3	17.0
Asset turnover (Revenue/Avg TA)	55.8	56.6	56.5	58.7	56.8
Leverage (Avg TA/Avg Equity)	2.8	2.7	2.4	2.2	2.1
Adjusted ROAE	10.8	24.0	12.7	14.3	13.9

Source: Company, BOBCAPS Research | Note: TA = Total Assets

Ratio Analysis

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
YoY growth (%)					
Revenue	14.2	3.7	(3.5)	3.2	2.8
EBITDA	2.6	11.1	(3.8)	9.1	10.7
Adjusted EPS	(4.6)	141.9	(44.1)	24.3	7.2
Profitability & Return ratios (%)					
EBITDA margin	24.3	26.1	26.0	27.5	29.6
EBIT margin	15.0	16.5	15.3	16.3	17.0
Adjusted profit margin	6.8	15.9	9.2	11.1	11.6
Adjusted ROAE	3.8	9.0	5.2	6.5	6.6
ROCE	9.8	11.5	10.8	12.0	12.0
Working capital days (days)					
Receivables	34	34	45	34	34
Inventory	17	16	16	15	15
Payables	22	28	28	30	30
Ratios (x)					
Gross asset turnover	0.6	0.6	0.5	0.5	0.5
Current ratio	1.1	1.0	1.0	0.9	0.9
Net interest coverage ratio	2.4	2.6	3.3	5.0	5.0
Adjusted debt/equity	1.0	0.9	0.6	0.5	0.6

Source: Company, BOBCAPS Research

ADD

TP: Rs 721 | ▲ 7%

CESC

Power

18 May 2021

Steady business but limited avenues for growth; initiate with ADD

CESC has decades of power distribution experience in Kolkata and Greater Noida and also operates four small franchises. However, it has no ongoing growth initiatives and hence we expect flat EPS for FY21-FY23. Distribution is its only focus area – any new contract wins will be a stock trigger, but opportunities are limited and at least three other peers have similar experience with stronger financial muscle. Current low valuations at 5.7x FY22E EV/EBITDA and dividend yield of 6.8% should provide downward support. Initiate with ADD, Mar'22 TP Rs 721.

Tarun Bhatnagar

research@bobcaps.in

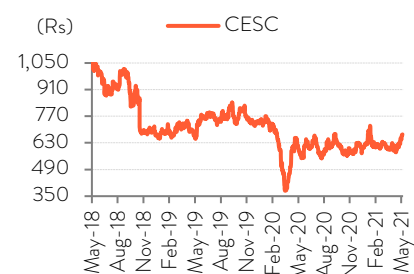
Among India's top private electricity distributors: CESC is India's fourth largest private electricity distributor with 1% volume share as of FY20. The company supplies electricity to the city of Kolkata under the regulated return model and has low AT&C losses at 7.9%. It owns 73% stake in Greater Noida distribution, also under regulated returns, with relatively low AT&C of 8.2% and a strong growth profile, besides franchisee assets. Its 600MW Haldia generation asset provides good earnings support, but the Dhariwal Infrastructure plant has only 50% capacity under PPA. CESC has no plans to build new generation plants.

Ticker/Price	CESC IN/Rs 674
Market cap	US\$ 1.2bn
Shares o/s	133mn
3M ADV	US\$ 3.6mn
52wk high/low	Rs 731/Rs 534
Promoter/FPI/DII	50%/15%/24%

Source: NSE

Distribution opportunities few and far between: Barring the upcoming Chandigarh privatisation, fresh opportunities for growth look limited over the near term and may improve only with passage of the Electricity (Amendment) Bill 2020. In addition, ADANIT, TPWR and TPW pose stiff competition for new privatisation bids. We note that CESC has not had much success winning distribution bids since it bagged the Malegaon franchise in 2019.

STOCK PERFORMANCE



Source: NSE

Initiate with ADD: At 5.7x FY22E EV/EBITDA, the stock is trading at 17% discount to the 10Y mean. Our Mar'22 TP of Rs 721 implies an FY22E EV/EBITDA of 5.9x – 15% discount to the 10Y mean. Key positive stock drivers include new distribution wins and passage of the Electricity Act.

KEY FINANCIALS

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue (Rs mn)	1,06,641	1,10,146	1,08,682	1,33,427	1,36,885
EBITDA (Rs mn)	37,080	35,355	34,163	36,634	37,382
Adj. net profit (Rs mn)	11,840	13,021	13,616	13,104	14,108
Adj. EPS (Rs)	89.3	98.2	102.7	98.9	106.4
Adj. EPS growth (%)	43.1	10.0	4.6	(3.8)	7.7
Adj. ROAE (%)	3.6	3.8	3.9	3.6	3.9
Adj. P/E (x)	7.5	6.9	6.6	6.8	6.3
EV/EBITDA (x)	5.7	5.9	6.0	5.6	5.6

Source: Company, BOBCAPS Research

Investment rationale

Among India's top electricity distributors

CESC is India's fourth largest private electricity distributor and has 1% share in the Indian distribution market by volume of power sold (~3bn units as of FY20). The company has been providing power to the city of Kolkata for over three decades (under the present management group) and has ~16 years of experience supplying power to Greater Noida, with a strong record of reducing AT&C losses in all its circles. In CY16, it began supplying electricity under a franchisee model to three cities of Rajasthan and from CY19 to Malegaon, Maharashtra.

Distribution in both Kolkata and Greater Noida is under the regulated model where the company earns a return on regulated equity – currently 16.5% and 15.0% respectively – that increases with capex. Incentives can be earned by improving AT&C losses at a faster rate than the past trajectory. CESC's distribution franchisees earn income solely on the basis of reduction in losses, which currently range between 17% and 40%.

The company also owns 2.4GW of generation capacity (less than 1% of India's total) across six plants – three of which are part of the Kolkata distribution circle with 14-20 years of remaining PPA life. Of the remaining three, Haldia Power has a PPA for 100% capacity and earns a return on regulated equity, currently set at 15.5%, and the Chandrapur plant has agreements for ~50% of its capacity. Crescent Power is a merchant plant that trades power on the electricity exchanges.

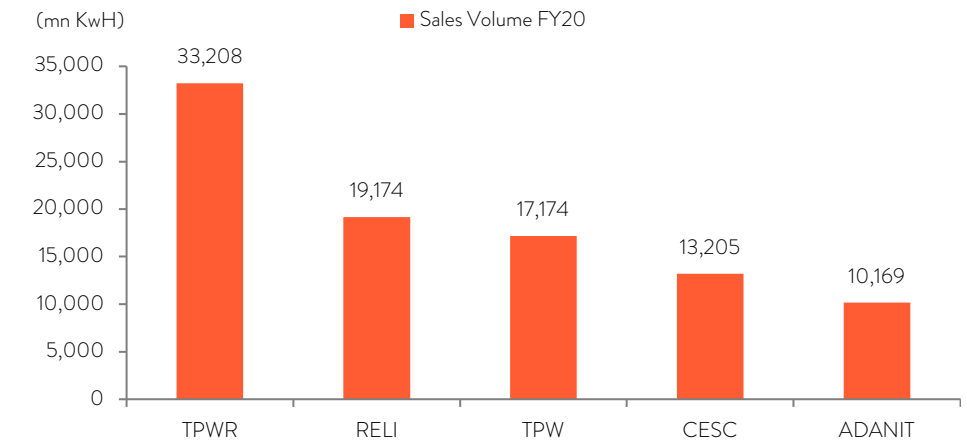
FIG 1 – CESC'S POWER ASSETS

Generation				Distribution		
Plant	Capacity (MW)	Remaining life (years)	PPA (%)	Area	Consumption (mn units)	Remaining life (years)
Budge Budge	750	16	100	Distribution PPA (regulated return)		
Southern Thermal Power Station	135	16	100	Kolkata	9,700	17
Titagarh Thermal Power Station	240	16	100	Noida Power Company	1,850	8
Haldia Power	600	19	100	Distribution franchisee		
Chandrapur TPP	600	18	50	Kota	1,016	15
Crescent Power	40	14	0	Bikaner	639	16
Solar	18	20	100	Malegaon	497	18
Wind	156	20	100	Bharatpur	220	16

Source: Company

Traditional Green Energy Distribution

FIG 2 – PRIVATE DISTRIBUTION PLAYERS IN INDIA



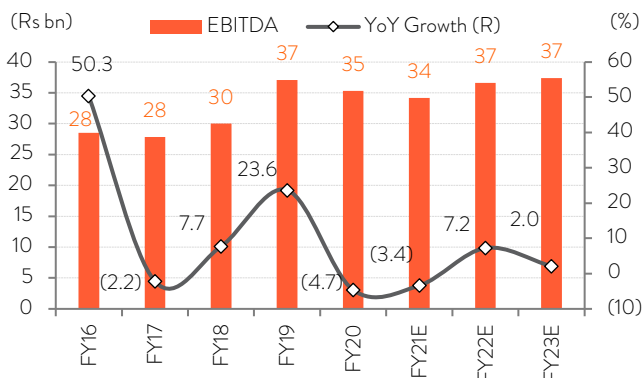
Source: Company | RELI – Reliance Infrastructure | Note: For TPWR, volumes include pre-acquisition volumes of the four Odisha circles

Decent EBITDA CAGR of 13% over FY15-FY20

CESC’s EBITDA has increased at a healthy 13.3% over FY15-FY20. Note that financials also include the loss-making retail division till FY18 after which it was hived off into a separate company, leading to an improvement in ROE.

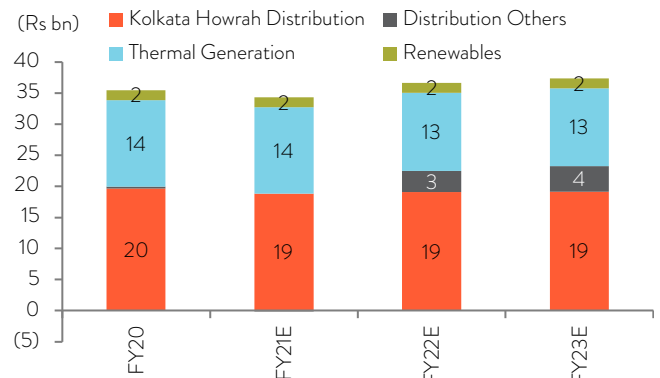
Distribution makes up 57% of consolidated EBITDA (FY20), generation 39% and renewables 5%. We expect the share of distribution to rise to 62% by FY23 as generation falls to 34%, due to growth in business as well as consolidation of Noida Power Company following the company gaining a minority share.

FIG 3 – EBITDA HAS FLATTENED OUT SINCE FY19



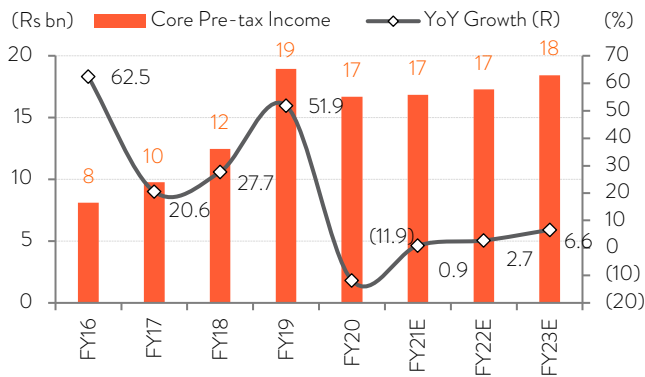
Source: Company, BOBCAPS Research

FIG 4 – EBITDA MIX SHIFTING TO DISTRIBUTION



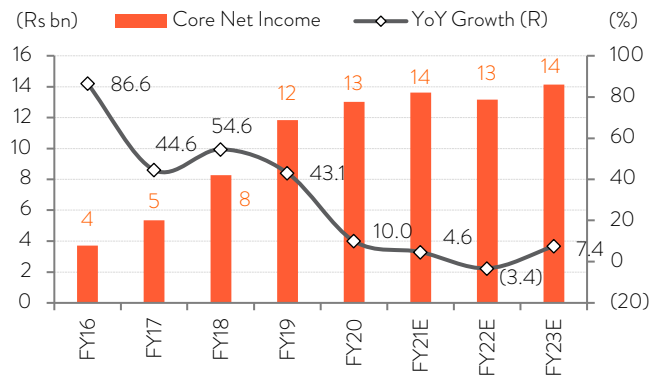
Source: Company, BOBCAPS Research

FIG 5 – PRE-TAX INCOME



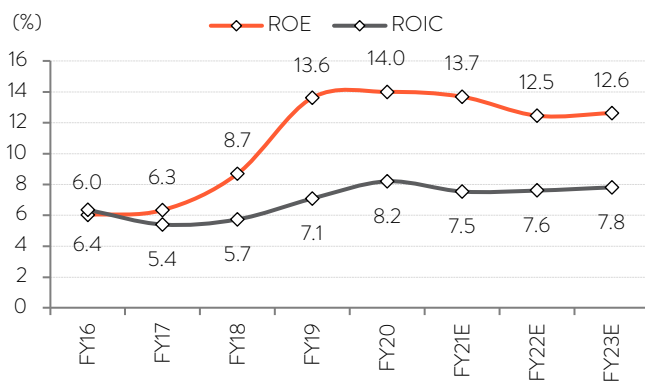
Source: Company, BOBCAPS Research

FIG 6 – NET INCOME EXPECTED TO BE FLAT



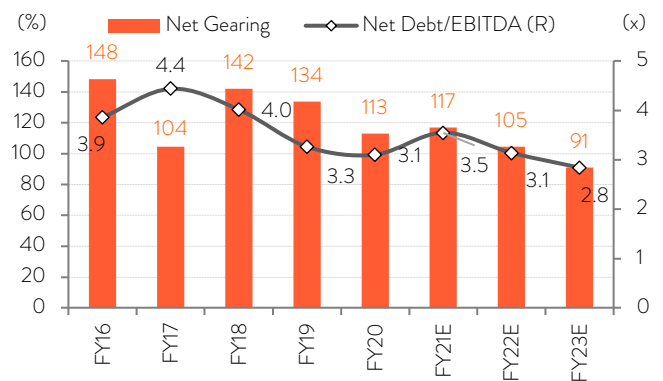
Source: Company, BOBCAPS Research

FIG 7 – RETURN RATIOS HAVE BEEN MODEST



Source: Company, BOBCAPS Research

FIG 8 – BALANCE SHEET STRONG



Source: Company, BOBCAPS Research

Distribution opportunities few and far between

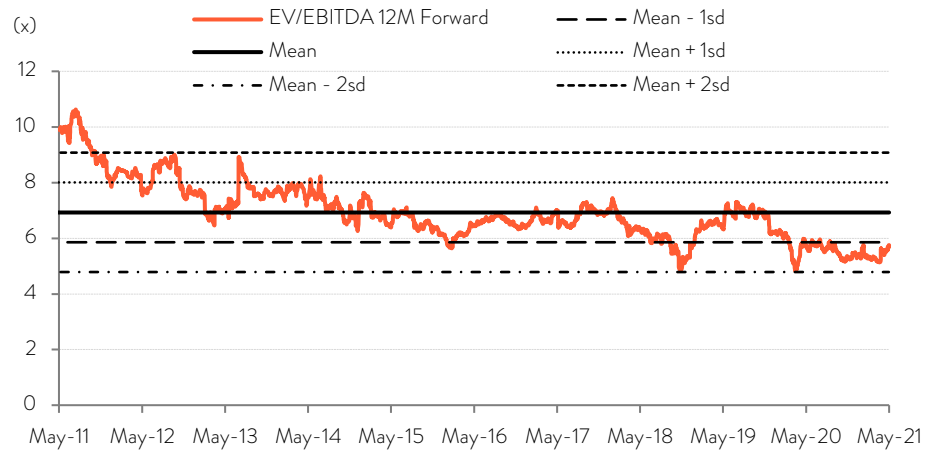
Competition in power distribution is intense and at least three major rivals – Tata Power (TPWR), Adani Transmission (ADANIT) and Torrent Power (TPW) – have comparable experience in running large distribution businesses and curbing AT&C losses. CESC has not had much success in winning distribution bids since it secured the Malegaon franchise in 2019 given that the opportunities available have been limited and these are primarily in the larger privatisation space. The union territories of Chandigarh, Puducherry and Jammu & Kashmir could be next on the anvil for privatisation.

The company’s power generation division is steady with over 15 years of asset life still remaining. The primary upside in this business hinges on its ability to address the 300MW of idle capacity (12.5% of total) at its generation plants through PPAs. In our view, signing long-term agreements is likely to be difficult given the cheaper power available from renewables and low utilisation of existing coal plants.

Trading at trough valuation due to meagre growth initiatives

At 5.7x FY22E EV/EBITDA, CESC is trading at a 17% discount to 10-year mean valuation multiples. In our view, this underperformance is largely due to a lack of major growth initiatives undertaken by the company. We believe prospects will improve only if India’s distribution segment is opened up rapidly, affording CESC the opportunity to win new concessions. Without new wins, CESC will find it increasingly difficult to compete against larger peers.

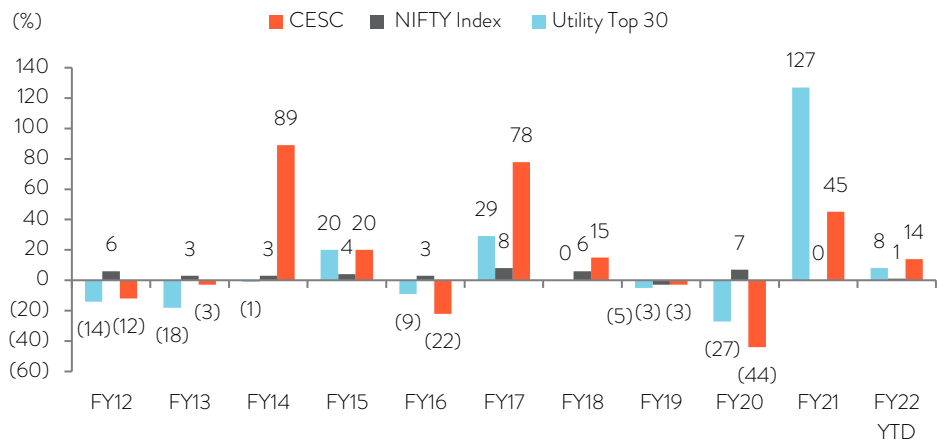
FIG 9 – EV/EBITDA 12M FORWARD



Source: BOBCAPS Research, Bloomberg

Stock returns have been modest since FY19 with a selloff in FY20

FIG 10 – ANNUAL STOCK RETURNS YOY



Source: BOBCAPS Research, Bloomberg

Valuation methodology

Expect EPS to remain flattish

We estimate flat EPS over FY21-FY23 driven by a fall in Dhariwal Infrastructure plant earnings after the temporary PPA ends in Jan'21, which should be offset by growth in distribution franchisee earnings. We are lower than consensus on net income primarily due to differing tax rate assumptions (our estimate at ~25%). In addition, our revenue assumptions could be higher as we have consolidated Greater Noida's financials after the company's announcement of taking a majority stake in the business at 73% from less than 50%.

FIG 11 – CESC – KEY EARNINGS DRIVERS

Drivers	FY20	FY21E	FY22E	FY23E
AT&C Losses (%)				
Kolkata	7.9	7.5	7.5	7.5
Noida Power Company	8.2	8.2	7.5	7.5
Kota	20.4	20.0	19.0	18.0
Bharatpur	17.0	16.0	15.0	14.0
Bikaner	18.0	17.0	16.0	15.0
Malegaon	44.8	44.8	40.0	35.0
Consumption (% YoY)				
Kolkata	2.0	(5.0)	10.0	2.0
Noida Power Company	2.0	(5.0)	10.0	5.0
Kota	2.0	-	5.0	2.0
Bharatpur	1.0	-	5.0	2.0
Bikaner	1.0	-	5.0	2.0
Malegaon	1.0	-	5.0	2.0
Availability Factor (%)				
Haldia Power	96.9	90.0	90.0	90.0
Dhariwal Infrastructure	70.0	80.0	60.0	60.0
Crescent Power	67.0	70.0	70.0	70.0

Source: BOBCAPS Research, Company

FIG 12 – CESC – BOBCAPS ESTIMATES VS. CONSENSUS

(Rs bn)	BOBCAPS			Consensus			BOBCAPS vs. Consensus (%)		
	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E
Revenue	109	133	137	113	119	125	(4.1)	12.2	9.9
EBITDA	34	37	37	32	33	34	7.2	12.7	10.2
EBIT	26	27	28	23	25	26	11.7	10.7	7.9
Pretax Income	17	17	18	15	17	18	12.4	3.0	(0.0)
Net Income	14	13	14	13	14	15	6.6	(4.0)	(6.2)
EPS (Rs)	102.7	99.3	106.7	95.9	102.9	112.5	7.1	(3.5)	(5.2)

Source: BOBCAPS Research, Bloomberg

Initiate with ADD, TP Rs 721

We value CESC at a Mar'22 target price of Rs 721 based on an SOTP valuation, arrived at via a DCF assessment of various assets. Our valuation model discounts cash flows from the company's generation projects till the end of respective PPAs, assuming no extension. For distribution licenses in Kolkata and Greater Noida, we have assumed extension for another 25 years after the current concessions end. For renewable projects, we have factored in the remaining life based on the standard 25-year PPAs.

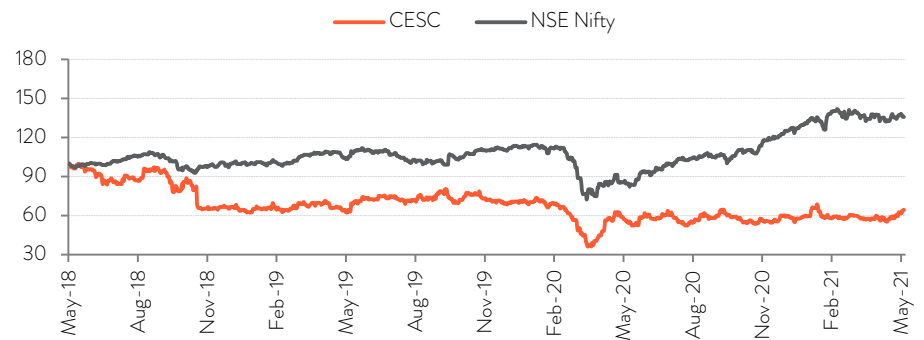
Key DCF assumptions include (1) cost of equity of 11.9% based on a risk-free rate of 6.12% as per the 10-year India bond yield as of end-Mar'21, (2) beta of 0.84 based on the last two-year weekly returns as of end-Mar'21, and (3) cost of debt of 9% factoring in the company's current debt cost.

The stock is currently trading at 5.7x FY22E EV/EBITDA, a 17% discount to the 10-year mean. Our Mar'22 TP of Rs 721 implies 5.9x FY22E EV/EBITDA or a 15% discount to the mean. Initiate coverage with ADD.

FIG 13 – SOTP VALUATION

Segment (Rs mn)	EV	Net Debt FY22E	Equity Value	% Share	Contribution to Group Equity Value	EBITDA FY22E	EV/EBITDA (x)
Distribution							
Kolkata & Howrah	82,467	32,172	50,295	100	50,295	18,767	4.4
Noida	20,269	2,348	17,921	73	13,034	2,998	6.8
Kota	1,319	2,125	(807)	100	(807)	(199)	(6.6)
Bikaner	314	587	(273)	100	(273)	0	2,016.6
Bharatpur	1,598	224	1,374	100	1,374	181	8.8
Malegaon	325	8,768	(8,443)	100	(8,443)	388	0.8
Subtotal (A)	1,06,291	46,224	60,067		55,180	19,138	5.6
Renewables (B)	12,927	6,312	6,615	100	6,615	1,593	8.1
Generation							
Haldia Power	56,096	25,340	30,756	100	30,756	8,759	6.4
Dhariwal Infrastructure	20,494	26,913	(6,418)	100	(6,418)	3,589	5.7
Crescent Power	147	1,292	(1,145)	68	(777)	230	0.6
Subtotal (C)	76,737	53,545	23,192		23,561	12,578	6.1
Others (D)	19,565	8,873	10,692	100	10,692	3,326	5.9
Consolidated (E= A+B+C+D)	2,15,520	1,14,954	1,00,566		96,047	36,634	5.9
Number of shares (mn) (F)					133		
Value (Rs/sh) (G = E divided by F)					725		
Target Price (Rs) (H= F – rounded to nearest 1)					721		

Source: BOBCAPS Research

FIG 14 – RELATIVE STOCK PERFORMANCE

Source: NSE

Key risks

- Upside risks include the company winning new distribution concessions and Dhariwal Infrastructure winning a long-term PPA.
- Downside risks include regulatory changes such as a reduction in rate of regulatory returns and delays in proposed regulatory changes including the Electricity Act 2021.

FINANCIALS

Income Statement

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue	1,06,641	1,10,146	1,08,682	1,33,427	1,36,885
EBITDA	37,080	35,355	34,163	36,634	37,382
Depreciation	(7,638)	(7,814)	(8,258)	(9,197)	(9,402)
EBIT	29,442	27,541	25,905	27,436	27,980
Net interest income/(expenses)	(12,757)	(13,194)	(11,400)	(11,822)	(11,206)
Other income/(expenses)	1,553	1,645	1,626	1,626	1,626
Exceptional items	0	0	0	0	0
EBT	18,931	16,686	16,835	17,240	18,400
Income taxes	(6,950)	(3,627)	(3,235)	(3,717)	(3,851)
Extraordinary items	0	0	0	0	0
Min. int./Inc. from associates	552	655	720	(419)	(441)
Reported net profit	11,840	13,021	13,616	13,104	14,108
Adjustments	0	0	0	0	0
Adjusted net profit	11,840	13,021	13,616	13,104	14,108

Balance Sheet

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Accounts payables	16,350	6,568	6,481	7,957	8,163
Other current liabilities	16,350	6,568	6,481	7,957	8,163
Provisions	3,443	4,247	4,247	4,247	4,247
Debt funds	1,26,123	1,21,816	1,32,082	1,29,534	1,19,326
Other liabilities	79,174	84,963	84,947	85,366	85,807
Equity capital	1,332	1,332	1,332	1,332	1,332
Reserves & surplus	88,406	94,942	1,01,385	1,07,229	1,13,772
Shareholders' fund	89,738	96,274	1,02,718	1,08,562	1,15,104
Total liabilities and equities	3,34,697	3,43,721	3,60,327	3,65,517	3,62,499
Cash and cash eq.	5,026	12,129	10,868	13,343	13,689
Accounts receivables	17,389	18,818	29,776	29,244	22,502
Inventories	5,130	150	148	182	187
Other current assets	19,679	18,934	18,934	18,934	18,934
Investments	1,985	1,631	1,631	1,631	1,631
Net fixed assets	2,34,346	2,33,767	2,35,721	2,39,185	2,42,680
CWIP	0	0	0	0	0
Intangible assets	1,579	1,472	1,472	1,472	1,472
Deferred tax assets, net	1,579	1,472	1,472	1,472	1,472
Other assets	47,984	55,347	60,303	60,054	59,932
Total assets	3,34,697	3,43,721	3,60,327	3,65,517	3,62,499

Source: Company, BOBCAPS Research

Cash Flows

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Net income + Depreciation	19,478	20,835	21,874	22,302	23,510
Interest expenses	13,336	13,306	10,360	10,806	10,246
Non-cash adjustments	3,117	939	(1,306)	(191)	(225)
Changes in working capital	35,930	35,079	30,929	32,917	33,531
Other operating cash flows	(48,921)	(40,125)	(41,972)	(30,944)	(26,587)
Cash flow from operations	22,939	30,033	19,886	34,891	40,476
Capital expenditures	(8,378)	(7,464)	(10,090)	(12,539)	(12,776)
Change in investments	0	0	(4,500)	0	0
Other investing cash flows	998	5,393	0	0	0
Cash flow from investing	(7,381)	(2,072)	(14,590)	(12,539)	(12,776)
Equities issued/Others	0	0	0	0	0
Debt raised/repaid	(3,111)	(4,892)	10,266	(2,548)	(10,208)
Interest expenses	(13,336)	(13,306)	(10,360)	(10,806)	(10,246)
Dividends paid	(2,790)	(3,188)	(7,173)	(7,260)	(7,565)
Other financing cash flows	21,101	21,471	7,267	20,615	28,020
Cash flow from financing	1,865	86	0	0	0
Changes in cash and cash eq.	(1,303)	7,103	(1,260)	2,474	346
Closing cash and cash eq.	5,026	12,129	10,868	13,343	13,689

Per Share

Y/E 31 Mar (Rs)	FY19A	FY20A	FY21E	FY22E	FY23E
Reported EPS	89.3	98.2	102.7	98.9	106.4
Adjusted EPS	89.3	98.2	102.7	98.9	106.4
Dividend per share	17.5	20.0	45.0	45.5	47.5
Book value per share	677.0	726.3	774.9	819.0	868.3

Valuations Ratios

Y/E 31 Mar (x)	FY19A	FY20A	FY21E	FY22E	FY23E
EV/Sales	2.0	1.9	1.9	1.5	1.5
EV/EBITDA	5.7	5.9	6.0	5.6	5.6
Adjusted P/E	7.5	6.9	6.6	6.8	6.3
P/BV	1.0	0.9	0.9	0.8	0.8

DuPont Analysis

Y/E 31 Mar (%)	FY19A	FY20A	FY21E	FY22E	FY23E
Tax burden (Net profit/PBT)	62.5	78.0	80.9	76.0	76.7
Interest burden (PBT/EBIT)	64.3	60.6	65.0	62.8	65.8
EBIT margin (EBIT/Revenue)	27.6	25.0	23.8	20.6	20.4
Asset turnover (Revenue/Avg TA)	32.1	32.5	30.9	36.8	37.6
Leverage (Avg TA/Avg Equity)	3.8	3.6	3.5	3.4	3.3
Adjusted ROAE	13.6	14.0	13.7	12.4	12.6

Source: Company, BOBCAPS Research | Note: TA = Total Assets

Ratio Analysis

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
YoY growth (%)					
Revenue	3.8	3.3	(1.3)	22.8	2.6
EBITDA	23.6	(4.7)	(3.4)	7.2	2.0
Adjusted EPS	43.1	10.0	4.6	(3.8)	7.7
Profitability & Return ratios (%)					
EBITDA margin	34.8	32.1	31.4	27.5	27.3
EBIT margin	27.6	25.0	23.8	20.6	20.4
Adjusted profit margin	11.1	11.8	12.5	9.8	10.3
Adjusted ROAE	3.6	3.8	3.9	3.6	3.9
ROCE	10.8	10.0	9.1	9.3	9.4
Working capital days (days)					
Receivables	60	62	100	80	60
Inventory	18	0	0	0	0
Payables	56	22	22	22	22
Ratios (x)					
Gross asset turnover			10.8	8.2	4.7
Current ratio	0.7	0.8	0.9	0.9	0.8
Net interest coverage ratio	2.3	2.1	2.3	2.3	2.5
Adjusted debt/equity	1.4	1.3	1.3	1.2	1.0

Source: Company, BOBCAPS Research

REDUCE

TP: Rs 111 | ▼ 0%

NTPC

Power

18 May 2021

Earnings visibility at low valuation but coal exposure a concern

NTPC's 62GW generation capacity as at end-FY20 is 17% of India's total and 22% of coal-based capacity. The company offers low-risk earnings visibility as >90% of its portfolio earns regulated returns that are protected from cost increases. We expect earnings share from renewables to remain below 10% till FY25 despite a focus on green energy. ESG concerns will, however, deter global investors due to NTPC's large coal exposure. Its current valuation of 7.2x FY22E EV/EBITDA is below the median – initiate with REDUCE, Mar'22 TP Rs 111.

Tarun Bhatnagar

research@bobcaps.in

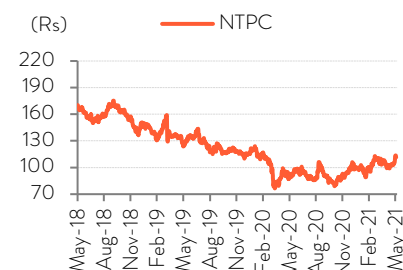
Safe and growing earnings profile: We expect NTPC's installed base of thermal and hydro plants to increase ~20% over FY20-FY25 and to continue earning fixed returns (currently 15.5%) on regulated equity – this is based on a 70:30 debt/equity ratio applied to project cost. All costs including fuels are pass-through so long as plants function under norms laid out by regulator CERC. With a one-third capacity increase through to FY25, earnings will also ramp up. At the same time, the risk of payment delays from discoms could persist.

Ticker/Price	NTPC IN/Rs 111
Market cap	US\$ 15.0bn
Shares o/s	9,895mn
3M ADV	US\$ 36.7mn
52wk high/low	Rs 117/Rs 78
Promoter/FPI/DII	51%/12%/32%

Source: NSE

Renewables focus unlikely to dent returns but ESG pressures to rise: NTPC aims to expand renewable capacity from ~1GW in FY20 to 30GW by FY32. But transition is likely to be slow and we estimate that over 90% of its capacity will continue to enjoy regulated returns till FY25. NTPC's low debt cost and large scale should also help it earn ~10% equity returns on renewables, in line with historical levels. That said, falling cost of renewables and high coal exposure could prevent the stock from rallying as global funds aim to reduce their AUM carbon footprint.

STOCK PERFORMANCE



Source: NSE

Initiate with REDUCE: Our Mar'22 TP of Rs 111 implies FY22E EV/EBITDA of 7.5x, in line with recent history but 24% below the 10Y mean. Negative drivers include weak results, news flow related to policy support to renewables and ESG concerns. Positive stock drivers include renewable project wins.

KEY FINANCIALS

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue (Rs mn)	10,02,865	10,94,640	12,46,177	14,16,584	14,95,273
EBITDA (Rs mn)	2,26,096	3,64,086	3,89,792	4,19,634	4,64,555
Adj. net profit (Rs mn)	1,37,367	1,16,002	1,50,259	1,68,262	1,90,111
Adj. EPS (Rs)	13.9	11.7	15.2	17.0	19.2
Adj. EPS growth (%)	8.6	(15.6)	29.5	12.0	13.0
Adj. ROAE (%)	4.4	3.2	3.9	4.1	4.5
Adj. P/E (x)	8.0	9.5	7.3	6.6	5.8
EV/EBITDA (x)	9.8	6.9	7.3	7.2	6.7

Source: Company, BOBCAPS Research

Investment thesis

Stable earnings profile

NTPC is 51% owned by the government and runs 62.1GW of generation assets spread across the country, contributing ~17% of India's generation capacity (as of end-FY20). Most of its projects are coal-based but the company is increasingly focusing on solar energy.

NTPC signed PPAs for 40.8GW of its coal-generation capacity before the Jan'11 deadline that marked a shift to the competitive bidding route. All this capacity coupled with its older generation plants – together forming >90% of the current portfolio – are under a regulated tariff system where the returns are fixed. Returns for these plants are generally higher than those that came up later for competitive bidding, with the current rate set at 15.5% till end-FY23.

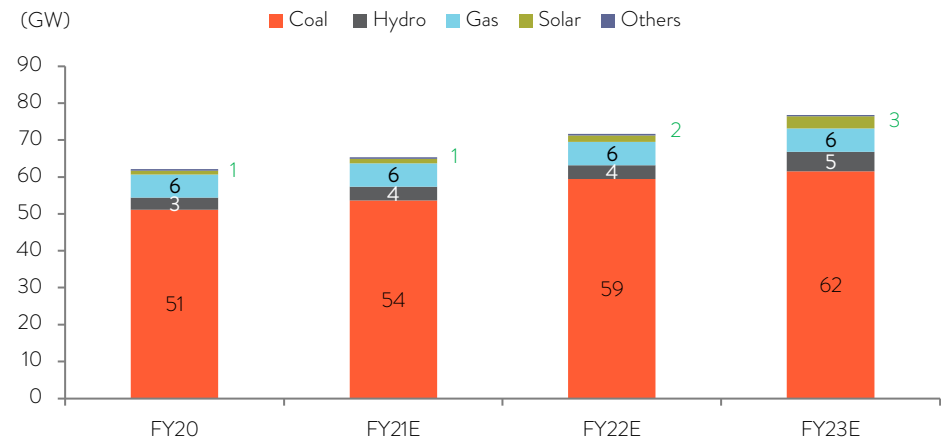
Key features of the regulatory return tariff system:

- Returns are evaluated every five years and are currently at 15.5%. The next rate review will apply from Apr'24.
- Regulated equity is estimated based on project cost and a mandated debt/equity ratio, currently set at 70:30.
- All major costs such as fuel, operating and interest costs as well as taxation, are pass-through provided they are within the norms recommended by the Central Electricity Regulatory Commission (CERC). These norms are also evaluated in a review every five years.
- The company can earn incentives for capacity utilisation above 85% and other services and also earns a surcharge on late payments by discoms.
- If the company is unable to meet the availability requirements due to technical issues and/or shortage of key materials such as coal, it forfeits the capacity charges for that period. NTPC's flattish EBITDA during FY17-FY19 was on account of these and other coal supply-related issues.

We estimate that NTPC's installed base of regulated thermal and hydro plants will grow by ~20% over FY20-FY25. This implies an increase in regulated equity as newer project costs will be higher than those of older plants.

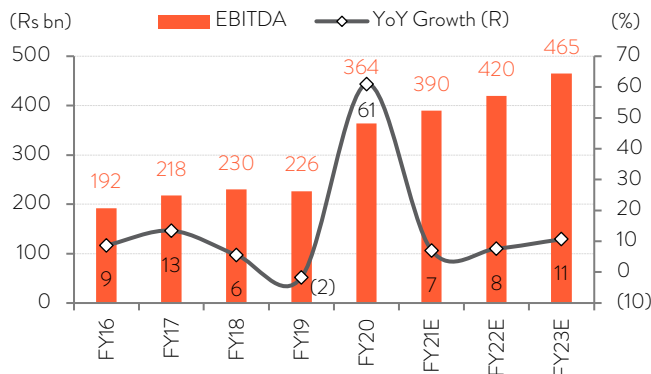
FIG 1 – NTPC – CAPACITY EXPANSION

Renewables capacity will start increasing but will still be a fraction of total



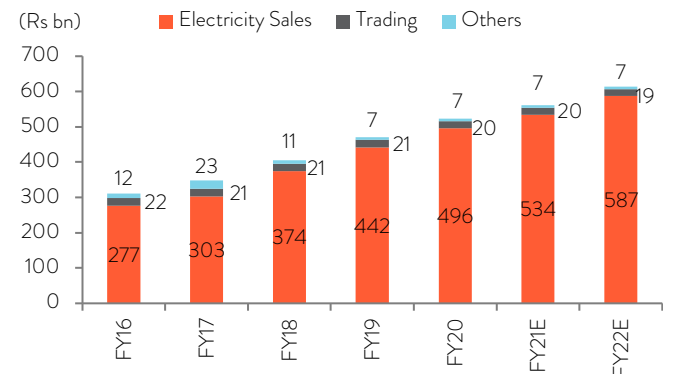
Source: BOBCAPS Research, Company

FIG 2 – EBITDA HAS IMPROVED ONLY FROM FY20



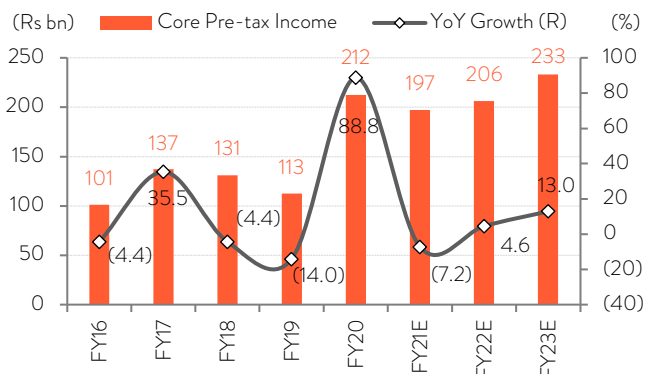
Source: Company, BOBCAPS Research

FIG 3 – EBITDA MIX DOMINATED BY ELECTRICITY SALES



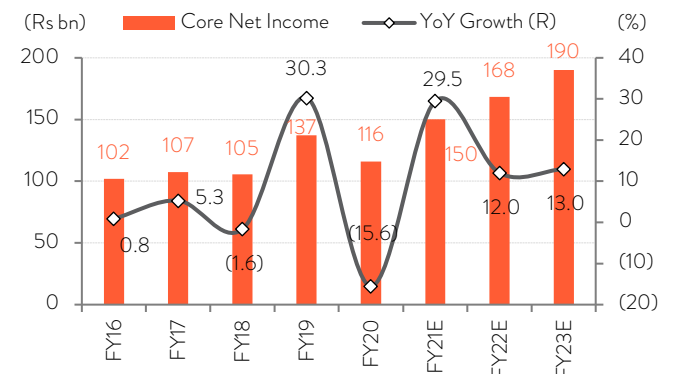
Source: Company, BOBCAPS Research

FIG 4 – CORE PRE-TAX EARNINGS



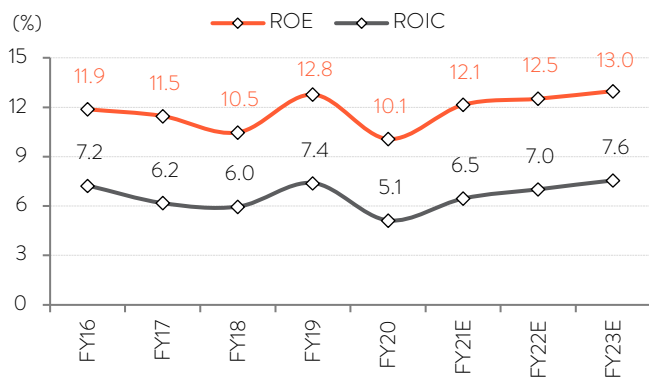
Source: Company, BOBCAPS Research

FIG 5 – CORE NET INCOME VOLATILE DUE TO FLUCTUATIONS IN EFFECTIVE TAX RATE



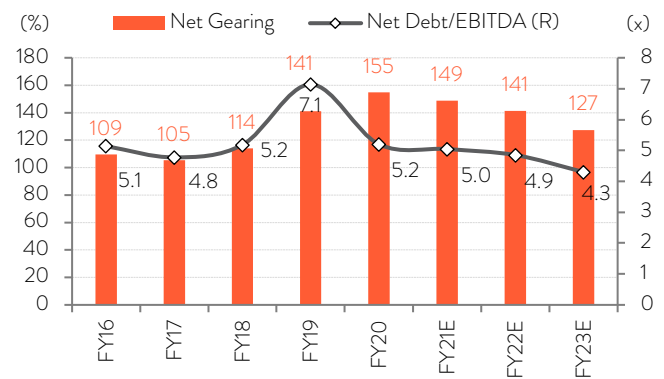
Source: Company, BOBCAPS Research

FIG 6 – ROE TO HOLD ABOVE 10%



Source: Company, BOBCAPS Research

FIG 7 – BALANCE SHEET HEALTHY



Source: Company, BOBCAPS Research

Focus on renewables unlikely to unduly affect returns

NTPC aims to raise the mix of renewable power sources in its generation portfolio to ~25% (30GW) by FY32 from less than 2% at the end of FY20. In our view, this transition will be gradual and we estimate that regulated business will still form 90% of capacity till FY25 while non-hydro renewable capacity will be sub-10%. This implies that the company will continue to enjoy assured returns on projects.

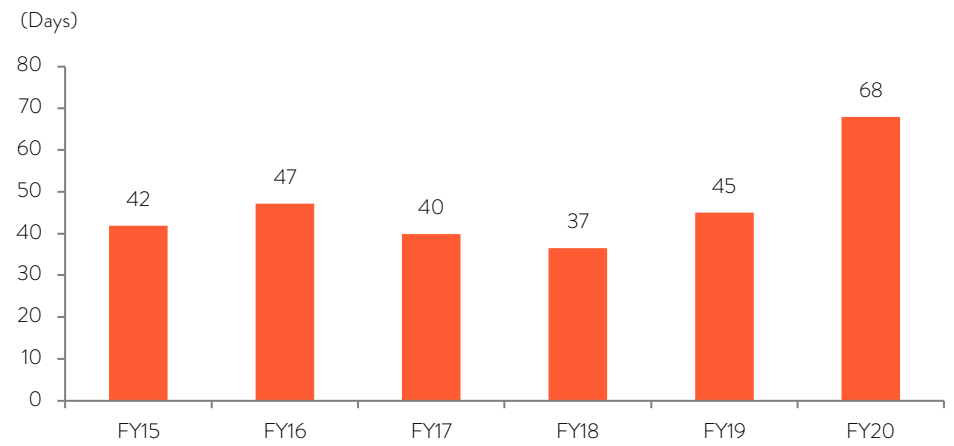
Although there are concerns that renewable projects will provide lower returns due to falling tariffs, we highlight that NTPC enjoys amongst the lowest interest costs in India’s power sector. In addition, being one of the bigger players, it has better bargaining power and should be able to earn a higher equity IRR than peers – at an estimated ~10%, in line with historical levels.

Discom payment delays a problem with no quick fix

NTPC’s customers are mostly state government-owned power distribution companies that remain in poor financial health. These discoms continue to incur massive operating losses and debts, leading to a persistent problem of non-payment to generators. NTPC is relatively better protected due to tripartite agreements with state governments and the RBI which gives it recourse to set off outstanding dues from state government balances with the central bank.

The challenges facing discoms may be addressed if tough measures announced in the proposed Electricity Act 2021 are implemented. Even so, there is no quick fix and resolution of these deep-rooted issues remains several years away.

FIG 8 – NTPC – CONSOLIDATED RECEIVABLES

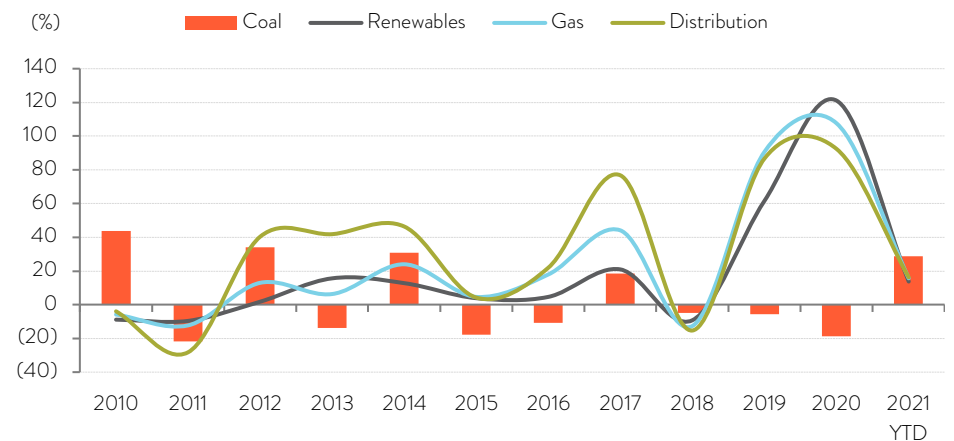


Source: Company

ESG concerns may put off international investors

With a predominantly coal-based portfolio, NTPC’s stock will face increasing aversion from a growing number of international equity and debt professionals. Research by independent energy thinktank IEEFA indicates that over 131 global institutions have already committed to reduce the carbon footprint of their investment portfolios. Most US and European asset managers have started to disclose the carbon footprint of their assets. Over 630 global institutions with US\$ 37tn in assets have urged governments not to build any new coal plants.

FIG 9 – SINCE 2015, YOY STOCK RETURNS OF COAL GENERATORS IN INDIA, CHINA AND ASEAN HAVE UNDERPERFORMED OTHER SUB-SEGMENTS

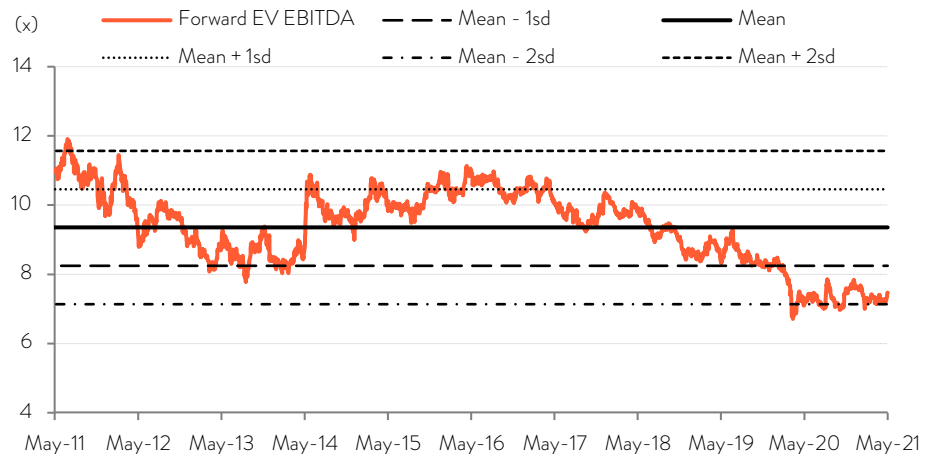


Source: Bloomberg, BOBCAPS Research

Valuations at lows relative to history

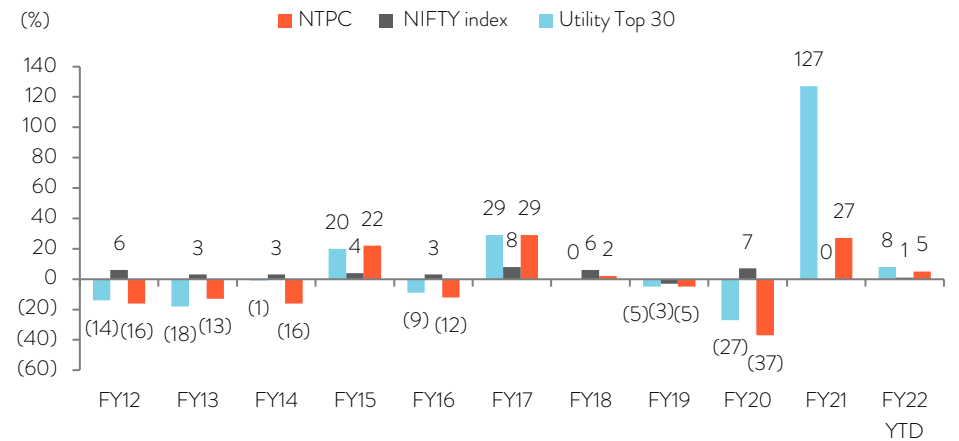
NTPC is currently trading at a multi-year low of 7.2x FY22E EV/EBITDA. In our view, one of the reasons for the valuation decline stems from investors’ ESG concerns. In addition, the sharp drop in renewable energy prices over the past few years versus coal indicates an irreversible march towards green energy. In 2020, NTPC itself endorsed that renewables are the future and declared a shift in focus towards renewables alongside its intent to stop developing new coal plants after its current set of projects adding 14GW of thermal capacity is completed.

FIG 10 – 12M FORWARD EV/EBITDA



Source: Bloomberg

FIG 11 – ANNUAL PRICE CHANGES YOY – NTPC UNDERPERFORMED NIFTY 7 OF 10 TIMES DURING FY12-FY21



Source: Bloomberg

Valuation methodology

Healthy earnings outlook

We estimate a ~13% pretax income CAGR for NTPC over FY21-FY23 driven by growing capacity. Our FY22 EPS growth forecast is higher at 10% primarily because of normal taxation in FY22-FY23 compared to a spike in deferred tax in FY21. Note that the company's taxation is highly volatile.

As such, our earnings estimates are based on NTPC's installed capacity and assumptions for losses on under-recovery of fixed charges and incentives earned. For renewables, we have used PLF and capacity expansion assumptions.

FIG 12 – NTPC – BOBCAPS ESTIMATES VS. CONSENSUS

(Rs bn)	BOBCAPS			Consensus			BOBCAPS vs. Consensus (%)		
	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E	FY21E	FY22E	FY23E
Revenue	1,246	1,417	1,495	1,132	1,245	1,386	10.1	13.8	7.9
EBITDA	390	420	465	353	385	443	10.6	9.1	4.8
EBIT	267	286	321	244	275	301	9.2	4.2	6.7
Pretax Income	184	206	233	181	207	225	1.2	(0.2)	3.6
Net Income	150	168	190	138	152	183	9.1	10.5	4.0
EPS (Rs)	15.2	17.0	19.2	14.4	15.5	18.5	5.4	9.8	3.8

Source: BOBCAPS Research, Bloomberg

Initiate with REDUCE, TP Rs 111

We have a Mar'22 target price of Rs 111 for NTPC based on an SOTP valuation, arrived at via a DCF assessment of various assets. Our valuation model discounts cash flows from the company's projects till the end of respective PPAs and assumes 25-year PPAs for both renewable and generation plants. In the case of plants operating for more than 25 years, we have assumed a life of 40 years.

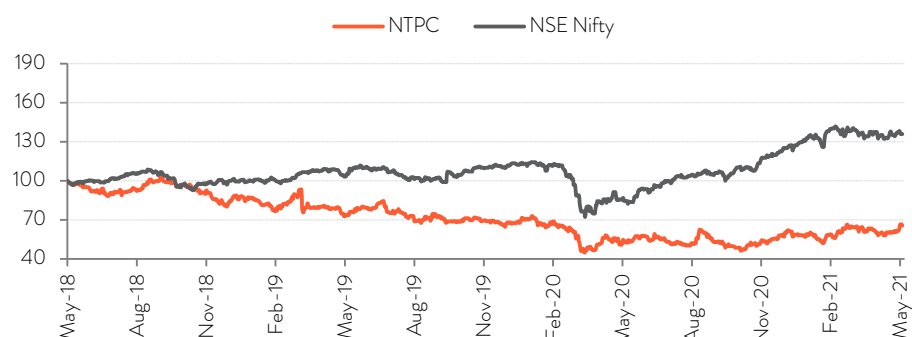
Key DCF assumptions include (1) cost of equity of 11.7% based on a risk-free rate of 6.12% as per the 10-year India bond yield as of end-Mar'21, (2) beta of 0.82 based on the last two-year weekly returns as of end-Mar'21, and (3) cost of debt of 7.5%. NTPC is at current valuations of 7.2x FY22E EV/EBITDA. Our TP of Rs 111 implies an FY22E EV/EBITDA of ~7.5x, in line with recent history but 24% below the 10-year mean. We initiate coverage with REDUCE.

FIG 13 – SOTP VALUATION

Business (Rs mn)	EV	Net Debt FY22E	Equity Value	Share (%)	Contribution to Group Equity Value	EBITDA FY22E	EV/EBITDA (x)
Standalone Business (A)	22,96,512	17,47,424	5,49,088	100	5,49,088	3,42,056	6.7
Subsidiaries							
THDC	2,42,663	53,843	1,88,820	100	1,88,820	15,646	15.5
NEEPCO	71,561	64,124	7,437	100	7,437	11,379	6.3
Nabinagar Power Generating Company	1,19,099	1,26,427	(7,328)	74	(5,423)	17,270	6.9
Patratu Vidyut	1,17,672	0	1,17,672	74	87,077	NA	
Bhartiya Rail Bijlee	81,255	64,677	16,579	100	16,579	9,026	7.1
Other Renewables	5,876	4,563	1,313	100	1,313	593	9.9
Others	63,521	26,950	36,571	100	36,571	8,929	7.1
Sub-Total (B)	7,01,647	3,40,585	3,61,063		3,32,373	62,844	11.2
Elimination / Corporate Costs (C)	1,04,821	(52,036)	1,56,857	100	1,56,857	14,734	7.1
Majority Owned (D = A+B+C)	31,02,980	20,35,973	10,67,007		10,38,318	4,19,634	7.4
Joint Ventures (E)					82,776		
Total (F = D + E)					11,21,084		7.5
Number of shares (mn) (G)					9,895		
Price per Share (Rs/sh) (H = F / G)					113		
Target Price (Rs) (I = H rounded to nearest 1)					111		

Source: BOBCAPS Research

FIG 14 – RELATIVE STOCK PERFORMANCE



Source: NSE

Key risks

- Upside risks to our estimates include new renewable plant completions and updates on the company's plans for the green energy business.
- Downside risks include adverse news flow related to coal-based generation, either from the government or increasingly ESG-conscious investors.

FINANCIALS

Income Statement

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Total revenue	10,02,865	10,94,640	12,46,177	14,16,584	14,95,273
EBITDA	2,26,096	3,64,086	3,89,792	4,19,634	4,64,555
Depreciation	(86,690)	(1,03,562)	(1,23,016)	(1,33,205)	(1,43,203)
EBIT	1,39,405	2,60,524	2,66,776	2,86,430	3,21,351
Net interest income/(expenses)	(54,311)	(78,488)	(96,403)	(1,13,319)	(1,18,696)
Other income/(expenses)	20,730	26,405	22,711	28,481	24,257
Exceptional items	0	0	(13,630)	0	0
EBT	1,12,546	2,12,495	1,83,609	2,06,247	2,33,058
Income taxes	27,799	(93,475)	(44,236)	(35,222)	(39,646)
Extraordinary items	0	0	0	0	0
Min. int./Inc. from associates	3,744	1,037	1,411	1,892	2,845
Reported net profit	1,37,367	1,16,002	1,36,629	1,68,262	1,90,111
Adjustments	0	0	13,630	0	0
Adjusted net profit	1,37,367	1,16,002	1,50,259	1,68,262	1,90,111

Balance Sheet

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Accounts payables	86,143	1,01,086	1,15,080	1,30,816	1,38,083
Other current liabilities	1,59,227	1,73,965	1,87,959	2,03,695	2,10,962
Provisions	11,417	11,692	11,692	11,692	11,692
Debt funds	16,44,326	19,25,762	20,04,158	20,78,470	20,44,818
Other liabilities	1,35,887	1,81,898	1,84,643	1,87,406	1,90,706
Equity capital	98,946	98,946	98,946	98,946	98,946
Reserves & surplus	10,14,617	10,89,446	11,86,436	13,02,570	14,28,484
Shareholders' fund	11,13,562	11,88,392	12,85,382	14,01,516	15,27,429
Total liabilities and equities	34,66,612	37,73,871	39,65,995	41,74,941	42,77,769
Cash and cash eq.	29,334	32,143	37,385	42,498	44,858
Accounts receivables	1,23,635	2,03,708	2,56,064	2,91,079	2,45,798
Inventories	82,516	1,11,385	1,26,805	1,44,145	1,52,152
Other current assets	2,46,978	2,21,822	2,21,822	2,21,822	2,21,822
Investments	919	503	503	503	503
Net fixed assets	15,05,554	18,71,765	20,00,90	21,48,289	22,80,450
CWIP	11,79,982	9,82,109	10,27,445	11,43,540	11,22,206
Intangible assets	4,291	6,263	6,263	6,263	6,263
Deferred tax assets, net	0	0	0	0	0
Other assets	2,93,401	3,44,172	3,02,432	1,90,432	2,17,346
Total assets	34,66,612	37,73,871	39,79,625	41,88,571	42,91,399

Source: Company, BOBCAPS Research

Cash Flows

Y/E 31 Mar (Rs mn)	FY19A	FY20A	FY21E	FY22E	FY23E
Net income + Depreciation	2,24,057	2,19,564	2,59,644	3,01,467	3,33,314
Interest expenses	1,14,916	1,33,991	1,37,314	1,55,018	1,63,457
Non-cash adjustments	(77,235)	(44,525)	(51,402)	(72,073)	(71,862)
Changes in working capital	2,61,738	3,09,030	3,45,556	3,84,412	4,24,909
Other operating cash flows	(3,36,619)	(3,72,228)	(3,99,338)	(4,21,030)	(3,80,368)
Cash flow from operations	1,86,856	2,45,832	2,91,774	3,47,793	4,69,449
Capital expenditures	(2,16,069)	(1,82,304)	(1,90,720)	(2,12,270)	(2,08,310)
Change in investments	(39,580)	(1,22,650)	0	0	0
Other investing cash flows	14,453	1,031	0	0	0
Cash flow from investing	(2,41,196)	(3,03,924)	(1,90,720)	(2,12,270)	(2,08,310)
Equities issued/Others	0	0	0	0	0
Debt raised/repaid	2,30,740	2,31,785	78,395	74,312	(33,652)
Interest expenses	(1,14,916)	(1,33,991)	(1,37,314)	(1,55,018)	(1,63,457)
Dividends paid	(65,759)	(37,751)	(39,638)	(52,128)	(64,197)
Other financing cash flows	(50,863)	(60,043)	98,557	1,32,834	2,61,306
Cash flow from financing	(798)	0	0	0	0
Changes in cash and cash eq.	(4,509)	2,658	5,242	5,112	2,361
Closing cash and cash eq.	29,334	32,143	37,385	42,498	44,858

Per Share

Y/E 31 Mar (Rs)	FY19A	FY20A	FY21E	FY22E	FY23E
Reported EPS	13.9	11.7	13.8	17.0	19.2
Adjusted EPS	13.9	11.7	15.2	17.0	19.2
Dividend per share	6.1	3.2	4.1	5.1	5.8
Book value per share	112.5	120.1	129.9	141.6	154.4

Valuations Ratios

Y/E 31 Mar (x)	FY19A	FY20A	FY21E	FY22E	FY23E
EV/Sales	2.2	2.3	2.3	2.1	2.1
EV/EBITDA	9.8	6.9	7.3	7.2	6.7
Adjusted P/E	8.0	9.5	7.3	6.6	5.8
P/BV	1.0	0.9	0.9	0.8	0.7

DuPont Analysis

Y/E 31 Mar (%)	FY19A	FY20A	FY21E	FY22E	FY23E
Tax burden (Net profit/PBT)	122.1	54.6	76.2	81.6	81.6
Interest burden (PBT/EBIT)	80.7	81.6	73.9	72.0	72.5
EBIT margin (EBIT/Revenue)	13.9	23.8	21.4	20.2	21.5
Asset turnover (Revenue/Avg TA)	32.3	30.2	32.1	34.7	35.3
Leverage (Avg TA/Avg Equity)	2.9	3.1	3.1	3.0	2.9
Adjusted ROAE	12.8	10.1	12.1	12.5	13.0

Source: Company, BOBCAPS Research | Note: TA = Total Assets

Ratio Analysis

Y/E 31 Mar	FY19A	FY20A	FY21E	FY22E	FY23E
YoY growth (%)					
Revenue	13.9	9.2	13.8	13.7	5.6
EBITDA	(1.6)	61.0	7.1	7.7	10.7
Adjusted EPS	8.6	(15.6)	29.5	12.0	13.0
Profitability & Return ratios (%)					
EBITDA margin	22.5	33.3	31.3	29.6	31.1
EBIT margin	13.9	23.8	21.4	20.2	21.5
Adjusted profit margin	13.7	10.6	12.1	11.9	12.7
Adjusted ROAE	4.4	3.2	3.9	4.1	4.5
ROCE	5.6	8.9	8.3	8.4	9.1
Working capital days (days)					
Receivables	45	68	75	75	60
Inventory	30	37	37	37	37
Payables	31	34	34	34	34
Ratios (x)					
Gross asset turnover	0.6	0.5	0.5	0.5	0.5
Current ratio	0.6	0.9	1.0	1.0	1.0
Net interest coverage ratio	2.6	3.3	2.8	2.5	2.7
Adjusted debt/equity	1.5	1.6	1.6	1.5	1.3

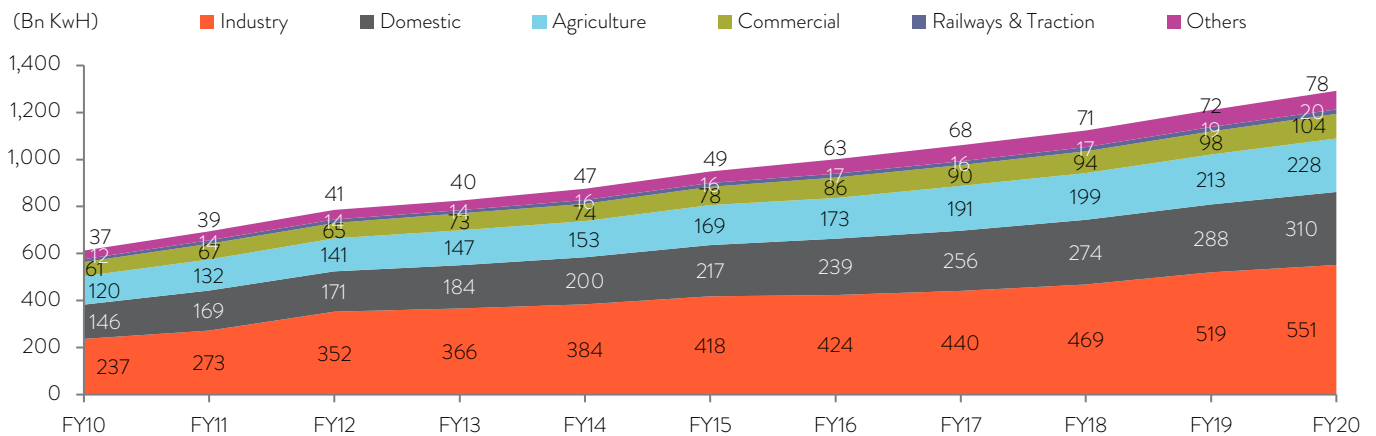
Source: Company, BOBCAPS Research

Appendix 1: Electricity generation

Consumption overview

- The residential segment formed 24% of India's electricity demand in FY20, followed by the agriculture sector at 18%.
- Growth in industrial demand (43% share) has fallen from a 15% CAGR over FY10-FY15 to 5.7% over FY15-FY20.

FIG 1 – POWER CONSUMPTION BY SECTOR



Source: CEA

FIG 2 – ELECTRICITY CONSUMPTION GROWTH BY SECTOR

(bn units)	FY10	FY11	FY12	FY13	FY14	FY15	FY16	FY17	FY18	FY19	FY20	% FY10-20 CAGR
Industry	13.0	15.1	29.2	3.9	5.0	8.8	1.2	3.9	6.5	10.8	6.2	8.8
Domestic	10.9	15.9	1.1	7.4	8.8	8.8	9.9	7.1	6.9	5.4	7.6	7.8
Agriculture	9.7	9.8	6.8	4.6	3.6	10.6	2.5	10.4	4.2	7.1	6.9	6.6
Commercial	11.8	11.0	(2.8)	11.3	2.0	5.6	9.8	4.4	4.4	4.8	5.8	5.5
Railways & Traction	8.6	12.9	1.4	(0.7)	10.2	4.1	2.6	(5.5)	11.2	8.1	3.9	4.7
Others	(2.6)	7.2	5.2	(2.4)	17.8	3.9	27.8	8.8	3.4	1.7	8.7	7.9
Total	10.6	13.3	13.1	5.0	6.1	8.5	5.6	6.0	5.9	7.7	6.7	7.7

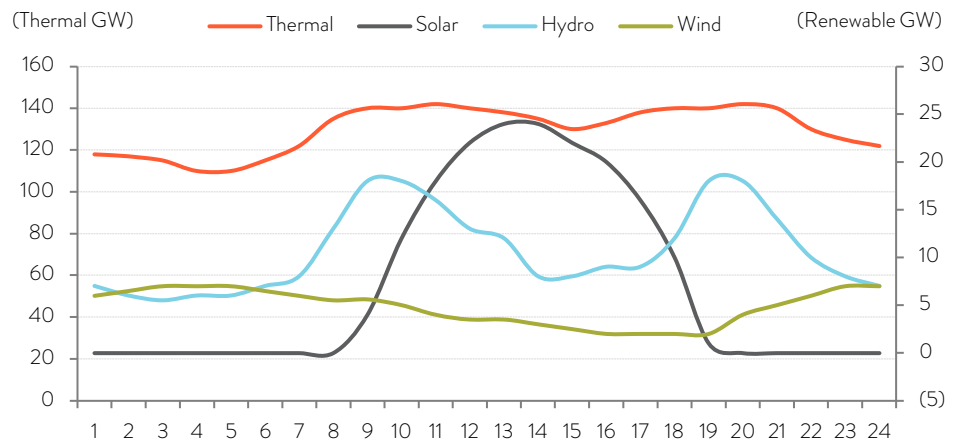
Source: CEA

Generation technologies and outlook

FIG 3 – GENERATION TECHNOLOGIES

	Coal	Gas	Nuclear	Hydro	Renewables
Advantages	Baseload	Baseload Flexiload	Baseload	Long construction time Resettling costs	Clean Falling prices High investor interest Environment friendly
Disadvantages	Financing challenges Cannot be shut off/on quickly	Poor availability of gas Volatile gas prices	Cannot be shut off/on quickly Highly regulated Risks from accidents	Seasonal	Seasonal Volatile during the day

Source: BOBCAPS Research

FIG 4 – GENERATION LOAD PATTERN OVER 24 HOURS

Source: POSOCO, BOBCAPS Research

Coal generation

Overview

- Coal-based generation forms 55% of India's installed base capacity and 72% of electricity generation (FY20).
- This segment is facing pressure from cheaper and cleaner renewable energy.

Challenges

- Under CERC regulations, older plants will need to invest up to Rs 4.5mn per MW (~5% of present project costs) on a flue gas desulphurisation (FGD) plant to control SO_x emissions by Dec'24.
- About 16.8GW or 5% of installed capacity does not have enough space to set up FGDs.
- As much as 5.9GW of capacity is crossing the 25-year mark. Another 25.3GW will be completing 25 years in 2022-27.

Strengths

- Many older plants have very low tariffs, often even lower than the current average renewable energy costs.
- Past trends in India and other countries show that these plants can continue to operate for over 40 years.

Renewables

Overview

- Renewables share in installed capacity grew from 15.5GW (10% of capacity) in FY10 to 87GW (24% of capacity) in FY20.
- India's renewable targets: 175GW by FY22 (solar at 100GW followed by wind 60GW, biomass: 10GW, small hydro: 5GW) and further to 450GW by 2030.
- Solar power has emerged as the cheapest source of electricity helped by technology, better predictability than wind power, and favourable renewable policy such as waiver of interstate transmission (ISTS) charges till Jun'23.

Non-utility applications

Pradhan Mantri Kisan Urja Surakshaeavm Utthan Mahabhiyan (PM-KUSUM)

- Government scheme PM-KUSUM encourages the use of solar energy for running water pumps used for irrigation (agriculture use makes up 18% of India's electricity consumption).
- The central government pays a 30% subsidy while 70% of the remaining amount has to be repaid by the user in 3-4 years. Some state governments also contribute to reduce the load on the users.
- Plants will be segregated from the main grid and could help reduce losses of state-owned power distribution companies (discoms) who in many states offer such connections at very low charges.

Rooftop solar

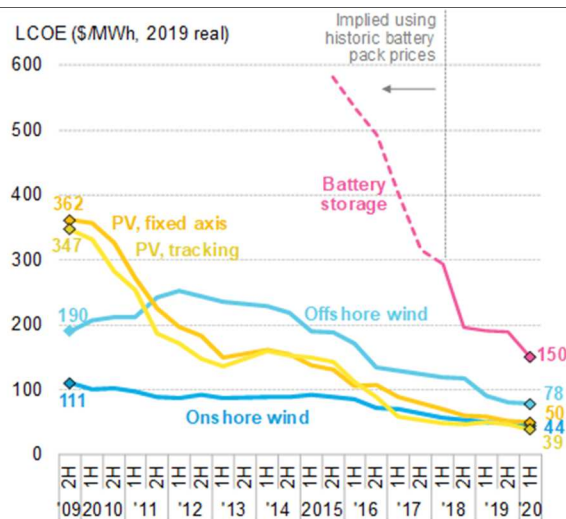
- TPWR estimates that India has the potential to have a 210GW rooftop solar capacity, which is ~57% of India's utility scale installed capacity across sources as of FY21.
- Capacity has reached just 6GW, per independent energy research company IEEFA, versus a target of 40GW by 2022 (a smaller country like Vietnam has 9GW of rooftop solar installations).
- Most discoms have set up rooftop schemes but are apprehensive of losing sale volumes from the highest paying commercial and industrial customers should rooftop solar take off.

- Net metering allows for the sale of net surplus produced by rooftop solar players at the rate set by discoms (usually the average power purchase cost (APPC) decided by the CERC).
- Under the gross metering system, rooftop solar generation players are deemed to have bought their entire consumption at the grid rate and all the power generated is deemed to be sold at the selling rate decided by discoms.
- The central government has recently proposed eligibility of net metering till 500kW but state governments will set up the final rules. Some states do not allow industries to set up rooftop solar systems while others don't pay for any surplus generation.

Energy storage – usage will depend on drop in costs

- Energy storage can improve the appeal of renewable sources through the supply of predictable power, thereby challenging thermal plants as a supplier of baseload power.
- The cost of batteries for storage of surplus renewable energy has fallen by roughly 50% every two years over the past decade. Financial feasibility is expected to improve if costs continue to decline at this pace.
- Bloomberg NEF research estimates that the cost of battery storage technologies has fallen to US\$ 150/MWh or Rs 11.25/unit. This is still very high and has to reduce by over 80% to become a viable alternative to baseload power in India (sold by generator at over Rs4/unit). If we assume that costs halve every two years, we may be able to reach these prices by 2026.

FIG 5 – LEVERAGED COST OF ELECTRICITY (LCOE) OF VARIOUS TECHNOLOGY



Source: Bloomberg NEF

Power purchase agreements (PPA)

Private participation in India's generation market was allowed in 1991. The legal framework was strengthened with the formation of Central and State Electricity Regulatory Commissions.

Thermal generation PPAs

- Generators typically sign a ~25-year contract called power purchase agreements with discoms after approval from the Central Electricity Regulatory Council (CERC) for interstate contracts and also the State Electricity Regulatory Council (SERC).
- Thermal generation tariffs reflect (a) recovery of the capital cost, a return on capital and fixed costs, and (b) a variable portion to recover fuel and operating costs.
- NTPC's plants currently operate on a regulated return model, where returns are set at 15.5%, revised every five years by the CERC. The next revision will be effective from Apr'24.
- Private sector tariffs are based on competitive bidding which is generally decided based on a levelised cost of electricity.

Renewables PPAs

- Tariffs determined through competitive bidding under the feed-in tariff (FiT) system oblige the offtaker to procure all the power generated at a fixed tariff, usually for 25 years.

Other sources of revenue for generation plants

- Ancillary operations include frequency control, spinning reserves and operating reserves.
- Reactive power operators manage voltages and are located closer to the load centres.

Appendix 2: Power transmission

Overview

- India's power transmission grid covers ~420,000 circuit km and ~960,000mva of substation capacity.
- The grid has been virtually fully integrated (called One India-One Grid) since Dec'13.

Operational structure

- The central grid is managed by the government-owned Power Systems Operations Corp (POSOCO) through the National Load Dispatch Centre (NLDC) and Regional Load Dispatch Centres (RLDC) which schedule dispatches over inter-regional links.
- States also have State Load Dispatch Centres (SLDC) for the above purpose within the state.

Planning and fund flow

- Central Transmission Utility (CTU) is responsible for planning and development of the National Grid.
- CTU also collects fees from all discoms for use of the grid and then distributes the same (under a central pooling system) to individual transmission asset owners based on long-term agreements.
- CTU and its five regional arms, using inputs from the state governments, decide on a merit-based economic dispatch (MBED) for thermal plants, giving them a daily schedule of the amount of power they need to generate on that particular day.
- States have to pay unscheduled interchange (UI) charges under the availability-based tariff (ABT) regime for central generation if they draw more than their quota from the grid.

Transmission owners

- Power Grid owns most interstate lines – these are awarded on a nomination basis to Power Grid or have been opened up to private players as well as Power Grid for bidding under the tariff-based competitive bidding (TBCB) scheme.
- The National Committee of Transmission (NCT) headed by the CEA, Chairman, representatives from the Union Ministry, NITI Aayog and Power Grid decide on whether the nomination or TBCB route is to be taken.
- CTU was recently separated from Power Grid which will remove the “perceived” advantage Power Grid had on bidding for TBCB projects. It remains to be seen whether the private sector’s share in new projects will increase from the current 7.5% of installed base capacity.
- State grids are developed by transmission companies and increasingly by the private sector as well.

Future investment

- Grid investments have to keep pace with the growing generation capacity. Sustained investments are also required to connect the grid to renewable energy plants which are coming up in newer areas.
- Renewable supply increases the volatility in power generation; therefore, good connectivity has to be established to ensure that any deficit in electricity generation can be managed.

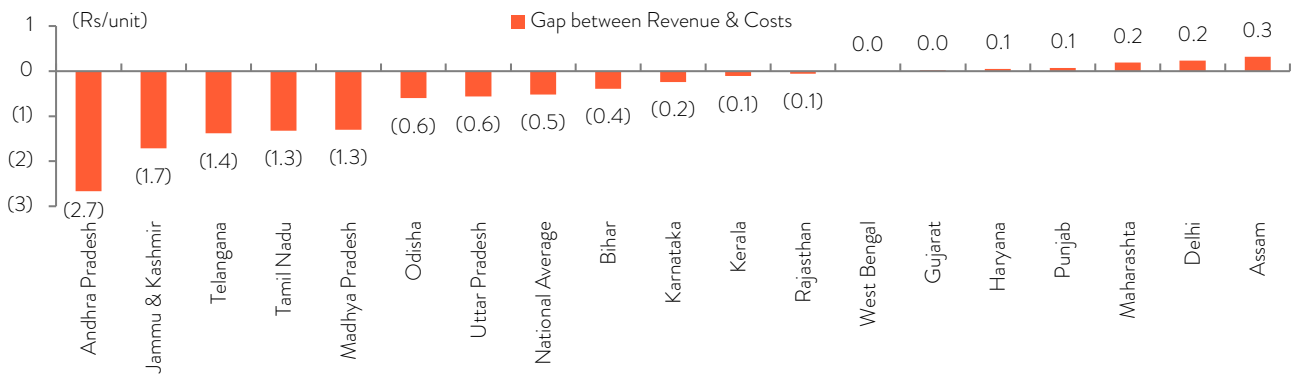
Challenges

- Renewable projects have a fast turnaround time of 1.5 years from project bidding to signing PPA to completion, while transmission plants can take three years to complete. Thus, transmission networks need to be planned well in advance.

Appendix 3: Electricity distribution

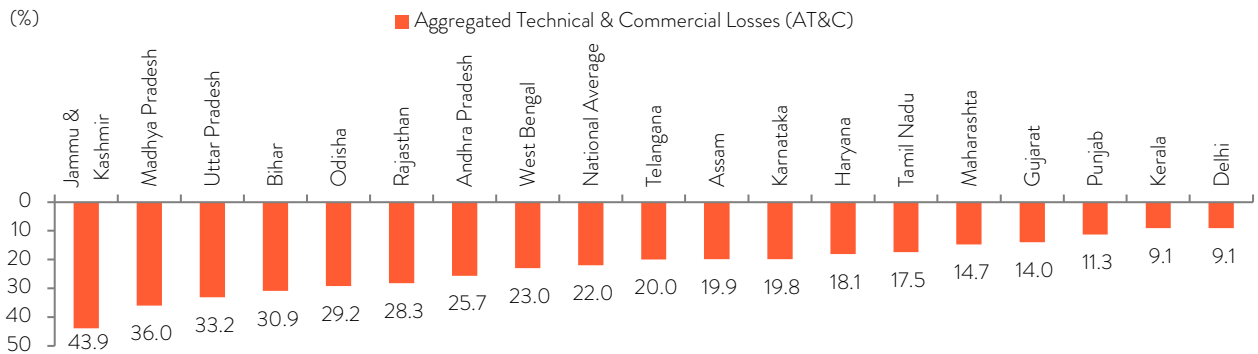
- Discoms face several challenges to their financial health despite frequent fund infusions by the central government, as highlighted in the charts below.
- Discoms arrears to generators beyond the stipulated 45 days had crossed Rs 1tn earlier this year but have come down to Rs 750bn as on Mar'21 (still ~5% above Mar'20 levels). Another problem is that some discoms are renegeing on contracts.

FIG 6 – DISCOMS FACE AN INCOME-COST GAP (FY19)



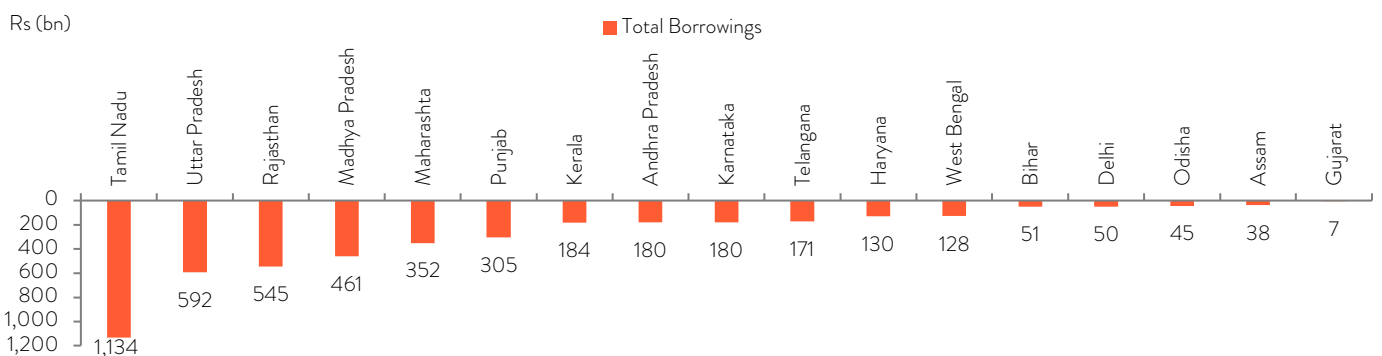
Source: Power Finance Corporation

FIG 7 – AT&C LOSSES IN FY19 WERE DOUBLE THE GLOBAL AVERAGE



Source: Power Finance Corporation

FIG 8 – BORROWINGS REMAIN HIGH (FY19)



Source: Power Finance Corporation

Appendix 4: Electricity Act 2020 (Draft)

The Electricity (Amendment) Act 2020 is expected to be enacted into within FY22E. It proposes the following:

Viability of discoms

- Retail tariff will be determined without accounting for government subsidy.
- State governments (not the discom) must provide subsidy directly to the consumer in their bill through direct benefit transfer (DBT).

Distribution sub-licensing

- In addition to the franchisee model outlined in the Electricity Act 2003, a new category of sub-licensee will be introduced, who can be appointed by the licensee discom to supply power on its behalf subject to clearance from the state regulatory commission.

Improving regulatory oversight

- A single selection committee will be set up headed by a Supreme Court judge for selection of members to central and state regulatory commissions.
- Other state commissions can step in if the state regulatory commission is not functional.
- An Electricity Contract Enforcement Authority (ECEA) will be set up to ensure faster resolution of disputes and to separate legislative and judicial functions which are currently under the CERC and SERCs.
- Appellate Tribunal for Electricity (APTEL) will have a Chairman and at least seven members, with authority equivalent to a High Court and the power to issue orders to CERC and SERCs.
- There will be time-bound filling of positions in regulatory bodies in case of resignations or retirements.

Promoting renewables

- Penalties will be imposed for non-fulfilment of obligations to buy renewable energy under the National Renewable Energy Policy.
- There will be separate purchase obligations for hydro power.
- Tariff determination and subsidies will be made more transparent.

Payment security mechanism

- Load dispatch centers will oversee payment security mechanisms before scheduling dispatch of electricity.

Disclaimer

Recommendation scale: Recommendations and Absolute returns (%) over 12 months

BUY – Expected return >+15%

ADD – Expected return from >+5% to +15%

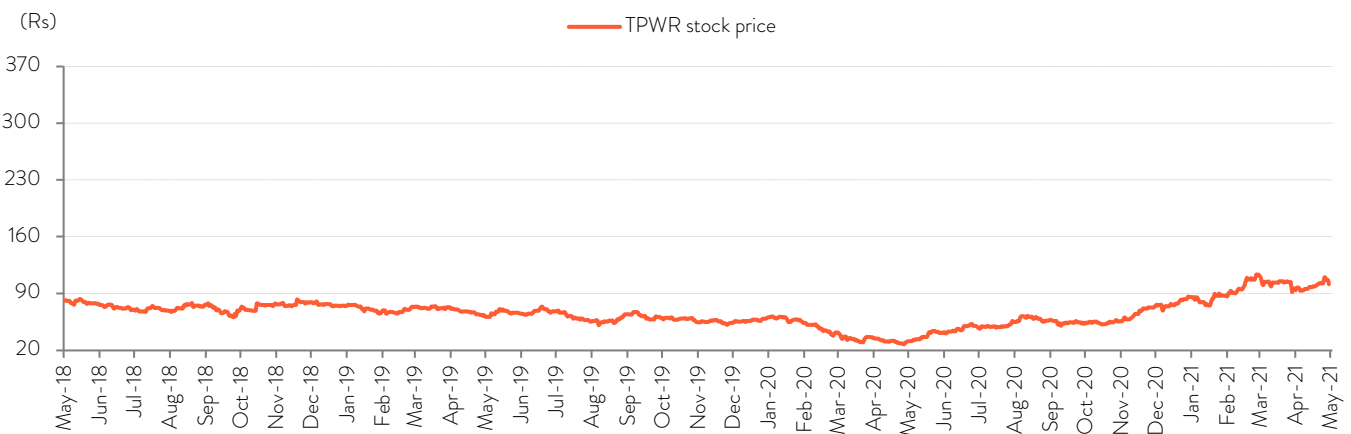
REDUCE – Expected return from -5% to +5%

SELL – Expected return <-5%

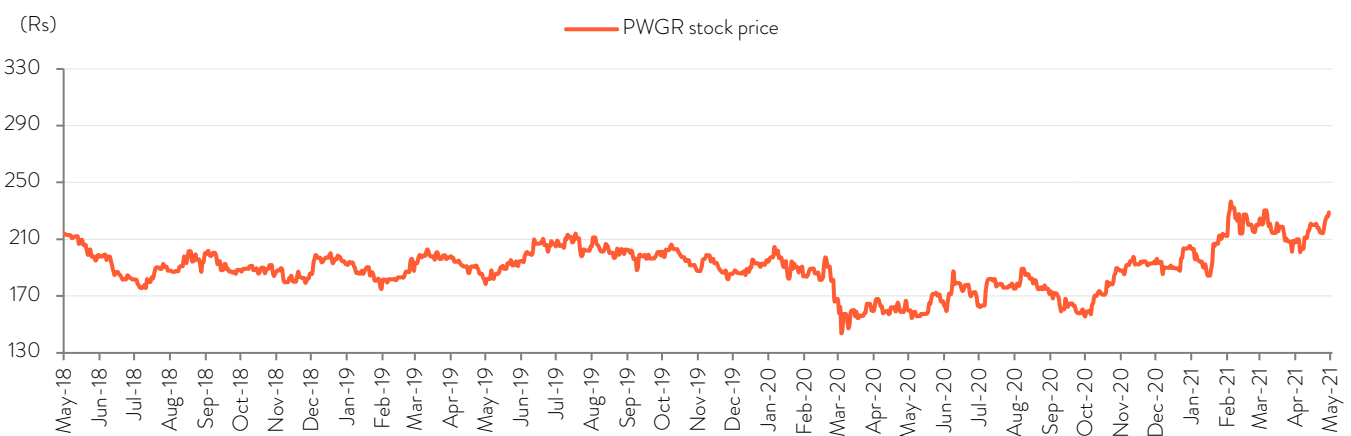
Note: Recommendation structure changed with effect from 1 January 2018 (Hold rating discontinued and replaced by Add / Reduce)

Our recommendation scale does not factor in short-term stock price volatility related to market fluctuations. Thus, our recommendations may not always be strictly in line with the recommendation scale as shown above.

RATINGS AND TARGET PRICE (3-YEAR HISTORY): TATA POWER (TPWR IN)



RATINGS AND TARGET PRICE (3-YEAR HISTORY): POWER GRID CORP (PWGR IN)



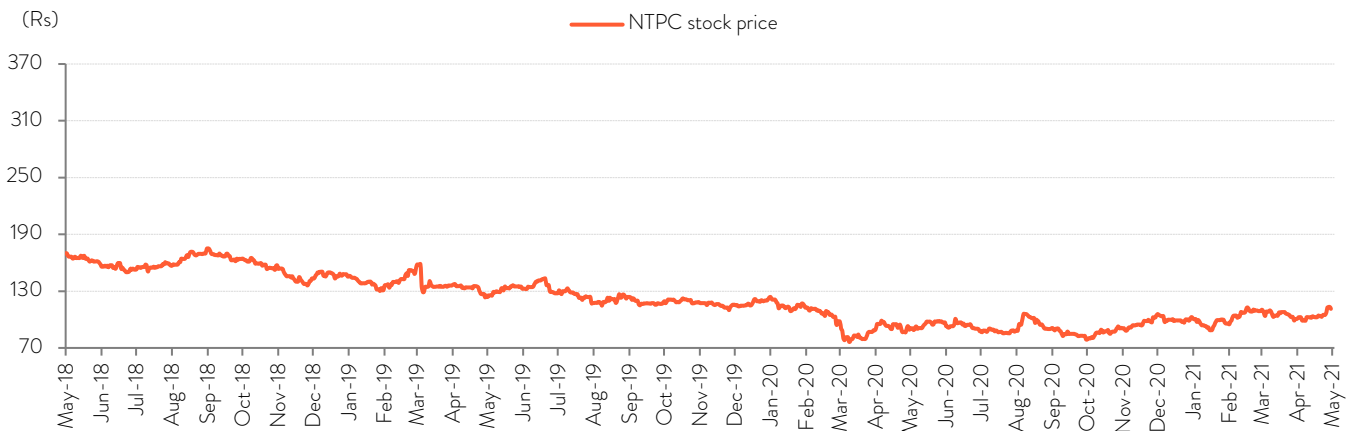
RATINGS AND TARGET PRICE (3-YEAR HISTORY): TORRENT POWER (TPW IN)



RATINGS AND TARGET PRICE (3-YEAR HISTORY): CESC (CESC IN)



RATINGS AND TARGET PRICE (3-YEAR HISTORY): NTPC (NTPC IN)



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