Submission to the High Power Committee set-up by the Government of Gujarat

by Prayas (Energy Group), Pune 25th July 2018

The Government of Gujarat vide its resolution no CGP-12-18-166-K dated 3rd July 2018 has set up a committee to review financial viability related issues faced by a few thermal power projects in the state. As per the terms of reference issued by the government, the committee is expected to review and establish financial hardship, if any, faced by the concerned projects, especially in light of promulgation of the Indonesian regulation dated September 2010. The committee is also required to undertake stakeholder consultation for this purpose and in this regard it has requested Prayas (Energy Group) to submit its comments and suggestions. This submission is in response to such a request of the committee through email dated 16th July 2018.

Background and context

- The projects being reviewed by the committee have all participated in bidding processes conducted by respective state agencies in accordance with Section 63 of the Electricity Act, 2003 and have signed power purchase agreements (PPAs) that are legally binding. The essence of the process has been the quoted tariff without going into the individual elements and the judgement on the quoted tariff is entirely a business decision of the bidders. The bidders take the risk and reward of the decision made on the quoted tariff and the Procurers are to be insulated from all such risks to the extent specifically provided for in the bidding documents.
- 2. Some of these projects had approached the Central Electricity Regulatory Commission (CERC) seeking revision of tariff quoted largely on the grounds of increase in the price of Indonesian coal along with other issues such as shortfall in domestic coal supply, rupee depreciation, etc. These matters were litigated right up to the Hon'ble Supreme Court of India, which with an elaborate reasoning has ruled that laws referred to in the PPA and the bidding guidelines can only be applied to Indian laws, and hence the promulgation of the Indonesian regulation cannot be treated as a change in law. It has also been held that the Indonesian Regulation is not force majeure event under the respective PPAs.
- 3. Thus, contractually and legally no tariff increase can be granted to the projects on account of the change in Indonesian regulations. The Hon'ble Supreme Court also ruled that the amendment to the New Coal Distribution policy (July 2013) be considered as change in law event. To this extent, relief as per change in law provisions of the PPA are applicable to projects that are based on and/or are running on Indian coal. The legal position therefore stands settled with law laid down by the Hon'ble Supreme Court.

4. Prayas (Energy Group) has been a party to the various proceedings before the different fora in matters concerning some of the projects being reviewed by the present committee. This submission is without prejudice to Prayas (Energy Group)'s right to participate in any regulatory or legal proceedings in this regard.

Principles to be followed while considering any relief beyond the PPA terms and conditions

- 5. Given the above background and considering the terms of reference issued by the government of Gujarat, we feel that it is obligatory to abide by the following principles while considering relief measures for such projects, if any:
 - a. **Safeguarding sanctity of contracts**: As highlighted above, these matters have been litigated right up to the highest forum and the Hon'ble Supreme Court has upheld the sanctity of the contract. Therefore, it is of utmost importance to ensure the procurers' right to get power supply at PPA agreed tariff, and terms and conditions throughout the term of the PPA. This is also crucial to safeguard the basic tenets of competition and bidding process. Any scheme considered for bailing out the Power projects should not place the procurers and consumers in an adverse position of making higher tariff with no benefit to them.
 - b. Applicability of the committee recommendations: As per the terms of reference of the committee, only projects that are exclusively based on imported coal and are impacted by the Indonesian regulation can be considered for relief, if any. Therefore, projects / units that have been either granted letter of assurance for domestic coal supply or have signed fuel supply agreement with any Indian coal company, or are presently running on domestic coal, or are claiming relief under domestic coal related change in law events, cannot be considered for any relief. Similarly, any project / unit for which procurers have not specified imported coal as the primary fuel at the time of bidding cannot be considered for any relief.
 - c. Fair and equitable solution: Since legally and contractually no relief is available to imported coal based projects, any bailout scheme devised for such projects must ensure fair and equitable sharing of the cost burden, if any, amongst all concerned stakeholders namely, lenders, project developers, and consumers. Allowing any relief beyond the PPA terms and conditions would imply passing on to the consumers, commercial risks that were voluntarily assumed by the project developer to win the contract. These project developers would not have obviously passed on any reduction in the prices of imported coal had the position had been reverse namely fall in prices of imported coal. Accordingly and

consistent with section 61 (d) of the Electricity Act, 2003, the consumers should be adequately compensated for supporting and sustaining such stressed assets. The safeguarding of the consumer interest should be the touchstone in considering any bailout to the projects.

- d. Exploring all possible avenues for mitigating hardship before deviating from terms of the PPA: Since the primary responsibility of managing the risks on account of fuel price variation rests with the project developer, every effort should be made by it to mitigate this risk before deviating from PPA terms and putting additional burden on the consumers. In this regard, avenues such as blending of lower cost coal, ploughing back of mining profits to the maximum possible extent, exploring alternate cheaper sources for coal procurement, financial restructuring, debt write-off etc. should be thoroughly explored and fully utilized before any other relief is granted. The project developers have also proceeded with the projects with Special Purpose Vehicle established for the purpose after having participated in the bidding through their holding company or based on the technical and financial qualification of the parent/group Companies. The project company's should not therefore be considered separately. There has to be sacrifices from the holding company/parent company also.
- e. Relief, if any should only be prospective in nature: No retrospective applicability and no pass through of past liabilities or losses should be considered while devising any relief or mitigation plan. Any such consideration would be highly inappropriate and fundamentally against the Hon'ble Supreme Court judgement in these matters. Further the purpose of considering bail out is that procures /consumers to get the electricity in future and not that any extra amount to be paid for the past. The consideration for the generation and supply of electricity in the past as per the contractual obligations should be as per the amount admissible by law as laid down by the Hon'ble Supreme Court and not something over and above the same. If any such compensation is considered for the past it would amount to rewriting the law laid down.
- f. **Transparent process with adequate time and opportunity for public consultation**: As highlighted by Prayas from time to time, any decision in such matters needs to be undertaken based on a thoroughly transparent process and after undertaking a much wider consultation with consumers as well as the public at large. Given the extent of stressed assets in the power sector, it is of

utmost importance to set highest governance standards for any bailout processes. This is also extremely important from the point of view of avoiding such incidents in the future. In fact in the past the Committee appointed by the CERC did not follow such transparent process and did not have the benefit of the consultation with the consumer group.

Suggested Approach

- 6. Past submissions by Prayas (Energy Group) in the proceedings before the CERC and the Appellate Tribunal for Electricity (ATE) have made certain suggestions for addressing hardship on account of increase in the price of imported coal. The same are attached herewith for ready reference. The present submission is in line with these suggestions.
- Given this context, we propose the following approach that can be considered for addressing the hardship, if any, faced by the projects that are mandated to use imported coal.
 - a. The generator has to ensure that all the procurers get their due share, i.e. full generation up to normative availability of 80% at tariff as per the PPA terms and conditions. At the outset they need to unequivocally undertake to the Committee that they will generate and supply electricity against the contracted capacity on regular basis and will not adopt to shutting down the generating units. There has been instances in the past where at crucial juncture the generation of electricity has been shut down during peak season causing prejudice to the consumer at large.
 - b. As per the PPA, the procurers cannot mandate the project developer to generate beyond the normative limit of availability of 80%. However, if the project manages to generate beyond this limit, the procurers have the first right of refusal. This provision of the PPA can be used to provide some relief to the project, provided that all the procurers agree to such an arrangement, and the following additional conditions are also met:
 - i. The project should ensure 80% availability during three-month peak season duration, as may be specified by the procurers.
 - ii. The term of PPA should be extended by 15 years beyond the present term of the contract. The renovation expenditure for such extension should be to the account of the project developer and not passed on to the Procurers. For these additional fifteen years, the capacity charge

should be kept constant at the last year capacity charge quoted in the PPA. The fuel cost and any operation and maintenance related charges for the extended PPA duration should be decided by the appropriate commission, subject to prudence check. This would ensure benefit to the procurers in terms of continued availability of generation from depreciated asset that was supported and sustained based on their contribution. This would also negate need for any new projects in lieu of this capacity.

c. In exchange of the above terms, the procurers may forgo their right over generation beyond normative availability (80%) and allow the project developer to sell such power to interested parties at market determined rates. All the additional revenue (after deducting the actual fuel cost) from the sale of such additional power should be used to mitigate the hardship, if any, in supplying power to procurers as per PPA tariff up to 80% of availability. The Table 1 below shows that such sale of additional generation is substantially sufficient to mitigate hardship, if any, on account of increase in the price of Indonesian coal. The merchant power tariff analysis presented in the working group report for CGPL that was shared by the committee also suggests that the rate of sale of power in the bilateral market is quite lucrative. Therefore, it should be possible for the project developers to earn additional revenue from sale of surplus generation as considered in below table. The indicative calculation done in Table 1 considers different scenarios for coal price increase. As can be seen, even in a scenarios in which the coal price remains consistently high at 80 USD/ton (Melawan grade) for a year, with sale of additional generation at Rs. 4 per unit, the project can still have revenue of about Rs. 600 Cr for debt servicing. In this regard, it is important to note than in the absence of any increase in coal price, the project would have been able to manage all its debt payments and even earn some return on equity using revenue of around Rs. 1850 Cr that it would have received via capacity charge payments. Thus, with the additional revenue from sale of surplus generation, the project can manage its debt payments even when coal prices increases and when the coal price drops, the project can create a surplus that can be used to mitigate past or future losses, if any. Since this is indicative calculation, it does not consider finer sensitivity and parameters such coal import duty, but assumes indicative coal price to be constant for entire year, which is unlikely, higher reduction in coal price due to blending, generation beyond 90% etc.

 Table 1: Indicative calculation

Details	Unit	Scenario 1	Scenario 2	Scenario 3	Scenario 4
Price of Melawan Coal (GCV 5400		-	2	5	7
kcal/kg)	USD / Ton	80	75	65	55
Gross calorific value of Melawan coal	kcal/kg	5400	5400	5400	5400
Assumed price of blended Coal	USD / Ton	75	70	60	50
Assumed GCV of blended coal	kcal/kg	5250	5250	5250	5250
Exchange rate assumed	Rs./ USD	69	69	69	69
Station heat rate	Kcal/ Unit	2050	2050	2050	2050
Fuel Cost	Rs./ Unit	2.02	1.89	1.62	1.35
Fuel Cost as per PPA	Rs./ Unit	1.3	1.3	1.3	1.3
Hardship per unit	Rs./ Unit	0.72	0.59	0.32	0.05
Generation upto 80 % PLF	MU	26630	26630	26630	26630
Total hardship on account of coal cost	De Cr /Vr	1919	1561	040	126
variation [A]	Rs. Cr./ Yr	1919	1561	843	120
Sale rate of Additional power	Rs./ Unit	4	4	4	4
Surplus from sale of additional power	Rs./ Unit	1.98	2.11	2.38	2.65
Additional sale 10 % PLF	MU	3329	3329	3329	3329
Additional revenue from sale of					
power beyond normative availability	Rs Cr	659	704	793	883
[B]					
Net hardship after accounting					
revenue from sale of additional	Rs Cr	1260	857	50	-758
generation [C] = [A] - [B]					
Capacity Charge per PPA for FY 17-18	Rs./ Unit	0.9	0.9	0.9	0.9
O&M expenses assumed for this	Rs./ Unit	0.2	0.2	0.2	0.2
calculation	13.7 0111	0.2	0.2	0.2	0.2
Revenue available from Cap. Charge	Rs./ Unit	0.7	0.7	0.7	0.7
for debt repayment	1.3.7 Offic	0.7	0.7	0.7	0.7
Revenue from capacity charge after	Rs. Cr.	1864	1864	1864	1864
accounting for O&M expenses [D]	NJ: CI.	1004	1004	1004	1004
Net revenue available for debt	Rs. Cr.	604	1007	1814	2622
repayment [E] = [D] - [C]			2007	1011	1011

d. Further, a quick review of Indonesian coal price index data shows that in the last few years, price of Melawan coal has rarely gone beyond 75 USD/ton. The Table 2 below shows the declared price of Melawan coal from January 2012 to September 2017. During this period, the months in which the price has gone beyond 75 USD/ton are marked in red whereas the months for which it has been lower than 50 USD/ton are marked green. As can be seen, the price has crossed the 75 USD/ton mark for just 7 months out of 69. It is important to note that when the coal price goes below 50 USD/ton, there is no hardship in supplying power at PPA rates, and as noted above, during such periods, the additional revenue generated by selling generation beyond normative availability can be used to off-set past hardships or to create fund to address future coal price risk.

Month	2012	2013	2014	2015	2016	2017
January	84	69	65	52	44	68
February	86	69	63	51	42	66
March	87	70	61	54	43	65
April	82	69	59	52	43	65
May	79	67	59	50	42	66
June	75	67	59	48	43	60
July	69	64	58	48	44	62
August	67	61	56	48	48	66
September	68	61	56	47	52	72
October	68	61	54	47	55	
November	64	62	53	45	67	
December	64	63	52	44	79	
Average	74	65	58	49	50	65

Table 2: HBA (FOB) price of Indonesian Melawan Coal (5400 kcal/kg) in USD/ton

Source: https://www.minerba.esdm.go.id/library/content/file/28935-

HBA%20September%202017/64f0489bddbdc960badcbd5f364a50de2017-09-06-20-03-59.pdf

e. Need for financial restructuring: Along with the above measures, it is essential to undertake debt restructuring of the project to make it financially viable. Based on the assumptions regarding coal price, and rate of sale of additional power, debt that can be serviced under various scenarios should be worked out. Indicative calculations shown above suggest that different scenarios of coal prices and rate of sale of additional generation, would allow debt servicing in the range of Rs. 5,000 Cr to Rs. 10,000 Cr. during the remaining term of the PPA.

- f. Both, lenders and developers need to work towards bringing down the debt to a manageable level. For this purpose, different measures such as debt write-off, conversion of debt into equity, refinancing of loans, extending debt tenure, reducing interest rates, etc. need to be explored. Developers can earn return on equity or repay any additional capital infusion, when coal prices reduce to such a level that would create surplus revenue beyond debt repayment.
- g. Additionally, the following options are available for the developer and the lenders to meet the contractual obligations under the PPA, i.e. supplying power at PPA agreed tariff for generation up to 80% availability:
 - The project developer should explore ways to reduce fuel cost by blending lower cost coal such as Enviro coal and Eco coal, which can reduce fuel cost by 10 – 15 USD / ton.
 - The actual profit of Indonesian Mine on account of enactment of Indonesian Regulations need to be ploughed back to reduce the claimed hardship.
 - iii. Sourcing of coal from different locations to optimize costs
 - Supply from alternative sources, which is allowed under the PPA.
 Additionally, avenues such as those provided under the recent MoP guidelines dated 5th April 2018 regarding flexibility in generation and scheduling of thermal power stations to reduce emissions, could also be explored for this purpose.

To summarize, the approach suggested above is aimed at achieving the following goals:

- Ensuring that the procurers continue to get supply of power up to 80% PLF / availability as per the PPA terms and condition, and the project does not turn into a non-performing asset.
- The procurers forgo their first right of refusal on any additional / optional generation beyond the normative availability of 80%. In lieu of this, the PPA term should be extended by 15 years at tariff as per PPA's last year capacity charge and variable charge to be determined by regulatory commission subject to prudence. This will ensure that procurers get benefit of low fixed charge generation capacity beyond existing term of the PPA.
- The developers are allowed to sell the additional generation beyond the normative availability at market rates to offset hardship, if any. The developers also forgo return on equity depending on prevailing coal price and rate of sale of additional power.

• The lenders agree to restructure loans and/or take the necessary haircut to ensure that project can sustain operations and debt repayment within the revenue that can be generated based on the above measures.

As shown in the above analysis, if these measures are appropriately implemented the projects can become viable even for peak fuel cost of up to 80 USD / ton (for Melawan grade coal). As highlighted before, fuel prices have been at this high level only for a few months in the last 5 years.

Need for due process and wider public consultation

- 8. Keeping in mind the various technical, legal and regulatory issues involved in these matters, it is absolutely essential to undertake due public process before arriving at any decision in this regard. To ensure such appropriate process, we feel that the following steps should be taken:
 - a. The committee should come out with a draft report with clear recommendations along with detailed analysis and justification for the same. The draft report should include details of all consultations undertaken by the committee, data relied up on by it and the submissions and presentations made by all the consultants and other stakeholders.
 - b. The draft report should be made public and a notice of at least two weeks should be given to the public to comment on the same. The committee should finalize the report based on the public feedback.
 - c. The final report along with all the relevant documents and data should be available in the public domain as soon as it is finalized and submitted to the government.
 - d. Recommendations of the committee, if any, can be implemented only after due regulatory approval. For this purpose, the project developer and the procurers should file a joint petition before the appropriate commission to implement the recommendations, if any. Such a petition should also include draft agreements, if any, to give effect to any resolution plan, as may be agreed upon by the concerned parties.
 - e. The concerned Commission should issue a reasoned order based on due public process after giving adequate time and opportunity to all the concerned stakeholders to make their submissions.

ANNEXURE 1

Submission related to Order(s) issued by the Commission regarding the petition No.159/MP/2012 (Tata / CGPL Mundra UMPP)and the committee report in this regard

By Prayas (Energy Group), Pune Consumer Representative u/s E. Act 2003

1 November 2013

Prayas Energy Group, India

Outline

- Background and context
- Process shortcomings
- Committee Recommendations: Winners & losers
- Methodological and Analytical Shortcomings in the Committee Report
- Way forward

Background & Context

Prayas Energy Group, India

Main contentions raised by the petitioner

- Petitioner has sought relief under:
 - Article 13 of the PPA dealing with 'Change of Law'
 - Article 12 of the PPA dealing with 'Force Majeure' events
 - Section 79 of the Electricity Act 2003 urging commission to intervene and help the petitioner to achieve a tariff that will be financially viable

Gist of the majority order

- Para 69: "We have considered the submissions of the parties. <u>For</u> <u>the reasons already recorded, the case of the petitioner does not</u> <u>fall under either Change in Law or Force Majeure.</u>"
- Para 86, the commission notes as follows: "The Electricity Act, 2003 vests in the Commission the responsibility to balance the interest of the consumers with the interest of the project developers while regulating the tariff of the generating companies and transmission licensees....In our view, under the peculiarity of the facts of the present case and also keeping in view the interest of both project developer and consumers, we consider it appropriate to direct the parties to set down to a consultative process to find out an acceptable solution in the form of compensatory tariff over and above the tariff decided under the PPA to mitigate the hardship arising out of the need to import coal at benchmark price on account of Indonesian Regulations." (emphasis added)

Committee Recommendations: Winners & losers

Prayas Energy Group, India

Recommended formula for gross compensatory tariff

- Gross Compensatory Tariff (GCT) = Normative Fuel Energy charges - Tariff recovered from Fuel Energy components of PPA
 - Adjustments for Profits accruing to the Promoters from the Indonesian mines
 - Adjustment for profit from third party sale of power beyond Normative Availability

Committee's calculation of compensatory tariff for FY 2014 (page no 37)

The compensatory tariff calculation for FY 2014 is shown below:

ltem	Ref	Unit	Value
Units sold	(18)22	mil kWh	26630
Fuel charges (only FOB) as per tariff	(1 9) ²³	USD/kWh	0.01856
Fuel charges recovered	(20) ²⁴	mil USD	494.27
FOB cost of imported coal	(21) ²⁵	USD/ton	63.78
FOB cost of imported coal – adjusted for taxes	(22) ²⁶	USD/ton	67.82
Normative Quantity of coal imported	(23) ²⁷	mil ton	11.15
Normative Cost of coal imported	(24) ²⁸	mil USD	756.25
Gross Compensation	(25) ²⁹	mil USD	261.99
Gross Compensation	(26) ³⁰	mil INR	15640.53
Gross Compensation per unit	(27) ³¹	INR/kWh	0.59

Implications of committee recommendation: Impact on different stakeholders

- Increase in tariff beyond PPA tariff : <u>Rs. 1,564 Cr</u> per year
 - Loss in profitability of developer / equity holder: Rs. 0.00 Cr. (as compared to coal prices at the time of bidding)
 - Loss to lenders : Rs. 0.00 Cr.
 - Loss to procurer : Rs. 0.00 Cr. (As the entire cost can be passed through to consumers, based on regulatory approval)
 - Loss to consumers : <u>Rs. 1,564 Cr</u>
- → Takes away all the commercial risk on account of fuel price variation, which the developer had taken willingly at the time of bidding.
- Committee recommendations imply CGPL as well as mining operations not sharing any burden on account coal price increase

Methodological Shortcomings Issue 1: Profits from shareholding in the Indonesian mines

Possible approaches

- Approach 1: Based on audited financial statements, calculate Generator's proportionate share in mining profits and deduct the same
- Approach 2: Calculate increased revenue based on incremental rise in price of coal over and above the price CGPL could have contracted in absence of the Indonesian Regulation, after accounting for taxes and duties. Use this revenue to offset the impact on tariff

Committee recommended Approach for calculating impact on tariff for FY 13 (page 44)

Particular	Reference	Unit	Value
Tata Power share of net PAT from KPC	(1)	mil USD	1.022
Tata Power share of net PAT from Arutmin	(2)	mil USD	0.964
Total Tata Power share of Profit from KPC & Arutmin	(3)=(1)+(2)	mil USD	1.986
Exchange Rate	(4)	INR/USD	59.7
Total Tata Power share of Profit from KPC & Arutmin	<mark>(</mark> 5)=(3)*(4)	Mil INR	118.564
Units supplied by CGPL to procurers in FY 2013	(6)	mil units	11565
Impact on Compensatory tariff	(7)=(5)/(6)	INR/kWh	0.01

Alternate approach (not recommended by committee)

Particular	Reference	Unit	FY 13
FOB selling price of the Indonesian mining company as per invoice	[A]	\$/ton	
Contracted Price as per FSA	[B]	\$/ton	
Incremental revenue to Indonesian mining company per ton	[C] = [A] – [B]	\$/ton	
Less: Royalty @ 13.5%	[D]= [C*13.5%]	\$/ton	
Revenue net of Royalty per ton	[E] = [C] – [D]	\$/ton	
Less: Income tax at marginal rate @ 45%	[F] = [E * 45%]	\$/ton	
Incremental Profit to Indonesian mining company per ton	[G] = [E] – [F]	\$/ton	
Quantity supplied to CGPL by the mining company	[H]	Mil Ton	
Net incremental PAT to Indonesian mining company	[I] = [G] * [H]	Mil \$	
Tata Power share of net incremental PAT of mining company	[J] = [I * 30%]	Mil \$	1.053
Dollar-rupee conversion rate	[K]	Rs	59.7
Tata Power share of net incremental PAT of mining company	[L]= [J]* K] /10	Rs Cr	6.28641
Units sold		Mil kWh	11565
Relief on this account		Rs/unit	0.005

Impact as per the Alternate approach

Particular	Reference	Unit	FY 13	CGPL Petition	Prayas suggestion
				FY 14	FY 14
FOB selling price of the Indonesia mining company as per invoice	[A]	\$/Ton		63.67	63.67
Landed cost of coal as per PPA quoted tariff at which the petitioner is revenue neutral	[B]	\$/Ton		50.92	41.68
Incremental revenue to the mining company per ton	[C] = [A] - [B]	\$/Ton		12.75	21.99
Less: Royalty @ 13.5%	[D] = [C*13.5%]	\$/Ton		1.72	2.97
Revenue net of Royality per ton	[E] = [C] - [D]	\$/Ton		11.03	19.02
Less: Income tax at marginal rate @ 45%	[F] = [E*45%]	\$/Ton		4.96	8.56
Incremental Profit to Indonesia mining company per ton	[G] = [E] - [F]	\$/Ton		6.07	10.46
Quantity supplied to CGPL by the mining company	[H]	Million Ton		11.15	11.15
Net incremental PAT to Indonesia mining company	[I] = [G] * [H]	Million \$		67.63	116.65
Tata Power share of net incremental PAT of mining company	[J] = [I * 30%]	Million \$	1.053	20.29	34.99
Less: Indian Tax (on dividend received)@15% for FY-14	[K] = [J * 15%]	Million \$		3.04	5.25
Dollar-rupee conversion rate	[L]	Rs	59.7	59.7	59.7
TPC share of net incremental PAT of mining company	[M] = [L]*[J- K]/10	Rs Cr	6.286	102.96	177.58
Total Units to be sold	[N]	Mil kWh	11565	26630	26630
Relief on this account factor	[O]=[M]*[N]	Rs/unit	0.005	0.04	0.07

Methodological Shortcomings

Issue 2: Sell of generation beyond normative availability to third parties

Prayas Energy Group, India

Committee approach (page 46)

		Scenario 1	Scenario 2	Scenario 3	
Normative Availability	%	80%	80%	80%	As per PPA
Third party Sale	%	5%	10%	20%	If allowed sale to third party
Third party sale Price	INR/kWh	4	4	4	
Energy Charges	INR/kWh	2.24	2.24	2.24	
Per Unit Surplus	INR/kWh	1.76	1.76	L L/b	Sale price – Energy charges
Incentive to generator	INR/kWh	0	0.13	0.19	Incentive beyond 85% apportioned on entire quantum of 3 rd party sale
Share of Procurers @50% of balance surplus	INR/kWh	0.88	0.82	0.79	50% share
Reduction in Gross Compensatory tariff	INR/kWh	0.055	0.1022	()1965	Procurer share apportioned on 80%

 \rightarrow Seller can keep the share of incentives over and above the compensation

Actual sharing of revenue from sale of power beyond the target availability

		Scenario 1	Scenario 2	Scenario 3
Normative Availability	%	80%	80%	80%
Third party Sale	%	5%	10%	20%
Third party sale Price	INR/kWh	4	4	4
Energy Charges	INR/kWh	2.24	2.24	2.24
Per Unit Surplus	INR/kWh	1.76	1.76	1.76
Surplus Mus	MU	1664	3329	6658
Additional revenue	Rs Cr	293	586	1172
Impact on compensatory tariff	Rs/unit	0.11	0.22	0.44

Similar approach has also been proposed by one of the procurers

Salient observations...1

- Combination of following options will significantly offset impact on tariff due to Indonesian Regulations
 - Plough back of incremental revenue (net of tax and royalty) from coal mines
 - Sale of generation beyond normative availability and entire surplus used to offset impact on tariff
 - Reduction in costs due to measures such as low GCV coal, low transportation costs, other sources of coal etc.

Salient observations...2

- Analysis highlights serious lacunae in both methodology and analysis of the committee
- Hence commission cannot rely on committee recommendations for deciding either methodology or impact on tariff
- Need for independent evaluation on part of commission in this regard

Prayas Submission...1

- Independently establish the need and extent of compensation:
 - CERC must establish beyond doubt the need for compensatory tariff
 - All analysis, documents and assumptions used by the Commission in this regard should be made public
- Define principles for awarding any compensation
 - CERC should ensure that its order does not set any wrong precedent for revising competitively discovered tariffs.
 - Specially crucial considering number of such cases before CERC and other state commissions.
 - Therefore, if need for compensation is established, then any proposed solution must adhere to following criteria:
 - Not fundamentally alter risk allocation in the bidding process and PPA
 - Procurers maximum entitlement should be protected (i.e. normative generation at PPA tariff)
 - Equitable sharing of incremental burden by all stakeholders (developer, lenders and consumers)

Prayas Submission...2

 Undertake due public process, including public hearing, which is an established practice for any tariff revision and also mandatory as per law

Prayas Submission...3

- Return the generation assets at the end of PPA:
 - Allowing compensation would imply pass through of the commercial risks, voluntarily assumed by the project developer to win the contract, to consumers.
 - Asset supported and sustained in this manner should ultimately belong to the consumers.
 - Hence, entire generation asset supported by such mechanism should be returned to the consumers at the end of term, at an appropriate transfer price.
 - Actual mechanism to be adopted for transferring these assets should be decided based on public consultation.

Thank you

Prayas (Energy Group) www.prayaspune.org/peg

ANNEXURE 2

Before the Appellate Tribunal for Electricity

In the matter of Appeal no 133 of 2014 against the CERC order dated 21st Feb 2014 in petition no 159/MP/2012

> Prayas (Energy Group), Pune 7 December 2015

Brief background

- Petition in 159/MP/2012 filed by CGPL before the CERC around July 2012
- Knowing this through media reports, the Appellant (i.e. Prayas) wrote to the CERC to implead itself as an intervener in capacity of consumer representative appointed by the Commission under section 94(3) of the Electricity Act 2003
- Appellant participated in the proceedings and made detail submissions challenging the need and/or appropriateness of granting any compensation, which are recorded in the impugned orders

Main contentions raised by the project developer before the CERC

- Project developer has sought relief under:
 - Article 13 of the PPA dealing with 'Change of Law'
 - Article 12 of the PPA dealing with 'Force Majeure' events
 - Section 79 of the Electricity Act 2003 urging the Central Commission to intervene and help the project to achieve a tariff that will be financially viable

Gist of the majority (interim) order dated 15th April 2013

- Para 69: "We have considered the submissions of the parties. For the reasons already recorded, the case of the petitioner does not fall under either Change in Law or Force Majeure."
- Para 86, the commission notes as follows: "The Electricity Act, 2003 vests in the Commission the responsibility to <u>balance the interest of the consumers with the interest of the project developers</u> while regulating the tariff of the generating companies and transmission licensees....In our view, under the peculiarity of the facts of the present case and also keeping in view the interest of both project developer and consumers, we consider it appropriate to direct the parties to set down to a <u>consultative process to find out an</u> <u>acceptable solution</u> in the form of compensatory tariff over and above the tariff decided under the PPA to <u>mitigate the hardship</u> <u>arising out of the need to import coal at benchmark price on</u> <u>account of Indonesian Regulations</u>." (emphasis added)

Implications of the final order dated 21-02-2014: Impact on different stakeholders

- Increase in tariff beyond PPA agreed rate : <u>Rs. 1160 Cr</u> per year (indicative figure for FY 13-14 as per the impugned order)
 - Loss to developer / equity holder on account of fuel price variation/risk: Rs. 0.00 Cr (as compared to coal prices at the time of bidding)
 - Loss to lenders : Rs. 0.00 Cr.
 - Loss to procurer : Rs. 0.00 Cr. (As the entire cost can be passed through to consumers, based on regulatory approval)
 - Loss to consumers : <u>Rs. 1160 Cr</u>
- → Takes away all the commercial risk on account of fuel price variation, which the developer had knowingly and willingly taken at the time of bidding

Key issues and lacunae in the impugned orders

Non-compliance with due process

- Tariff revision under the Electricity Act 2003 is only possible under section:
 - Section 62: after following due process as per section 64
 - Section 63: in accordance with the provision of bidding guidelines and the PPA
- Grant of compensatory tariff would impose tariff impact on consumers of five states
- In spite of repeated submissions for undertaking due public process in a matter so crucial and peculiar, the Commission refused to allow public consultation, which is otherwise mandatorily undertaken for any tariff revision matter

Inadequate and improper reasoning for not undertaking due public process

• Para 49 of the impugned order:

"...The Commission's Conduct of Business Regulations permits any consumer to participate in the proceedings before the Commission. Prayas Energy Group and the applicant, Shri Puspendra Surana have participated in the proceedings in the present petition. <u>In our</u> view, adequate opportunity was available to the interested parties to participate in the proceeding and in fact, some consumers including the applicant have participated in the proceeding and filed their submissions.." (<u>Emphasis added</u>)

- → There was no public notice regarding the date of the hearings
- \rightarrow Petition was not available in the public domain
- → Data and information relied up on by the committee was not made public

Setting bad precedent for overall sector policy and competition

- Using regulatory powers to ensure financial viability of individual projects, which have knowingly and willingly taken certain risks to win contracts, is becoming a routine practice
- State commissions are following CERC's approach of allowing a *compensatory tariff* over and above PPA agreed rate while ruling out any relief as per the provisions of the PPA
 - Such tariff is usually based on a Committee's recommendations, which often are not acceptable to the procurers
 - Financial analyst and/or banking sector expert are often the only independent members of such committee.
 - No opportunity is given to consumers to comment on this arrangement
- Such regulatory practice can be detrimental to the broader sector policy, distribution viability and overall competition

List of matters where '*compensatory tariff*' has been granted or being considered

Parties	Commission & case no	MW	Compensatory charge sought / allowed	Annual tariff Impact in Rs Cr
Adani Power Ltd Vs Uttar Haryana Bijli Vitran Nigam Ltd	CERC case no 155/MP/2012	1425	0.3255	325
Adani Power Ltd Vs Uttar Haryana Bijli Vitran Nigam Ltd	CERC case no 155/MP/2012	1000	0.8508	596
Coastal Gujarat Power Ltd –v- Gujarat Urja Vikas Nigam Ltd	CERC case no 159/MP/2012	4000	0.4357	1160
Adani Power Maharashtra Ltd Vs MSEDCL	MERC case no 68 of 2012 and 63 of 2014	1320	1.01	566
Adani Power Maharashtra Ltd Vs MSEDCL	MERC case no 189 of 2013 and 140 of 2014	2285	1.95	1374
Indiabulls Power Limited Vs MSEDCL	MERC case no 154 of 2013 and 147 of 2014	1200	1.55	391
Lanco Anpara Power Ltd –v- Uttar Pradesh Power Corporation Ltd	UPERC case no 871 & 891 of 2013		Compensatory tariff granted	Not known
Sasan Power Ltd –v- MP Power Management Co Ltd and others	CERC case no 14/MP/2013	4000	CERC deems it to be a fit case for grant of compensatory tariff	Not known
EMCO Energy Ltd Vs MSEDCL	CERC Petition No. 8/MP/2014	300	Though MERC has adopted the tariff, CERC has admitted petition seeking tariff revision on account of change in law	Not known
M/s Adani Power Rajasthan Ltd. vs Jaipur Vidyut Vitran Nigam Ltd & others	Petition No. RERC- 534/15	1320	RERC has granted interim relief of Rs. 0.25 per unit. Further details are being worked out based on a committee process.	Not known

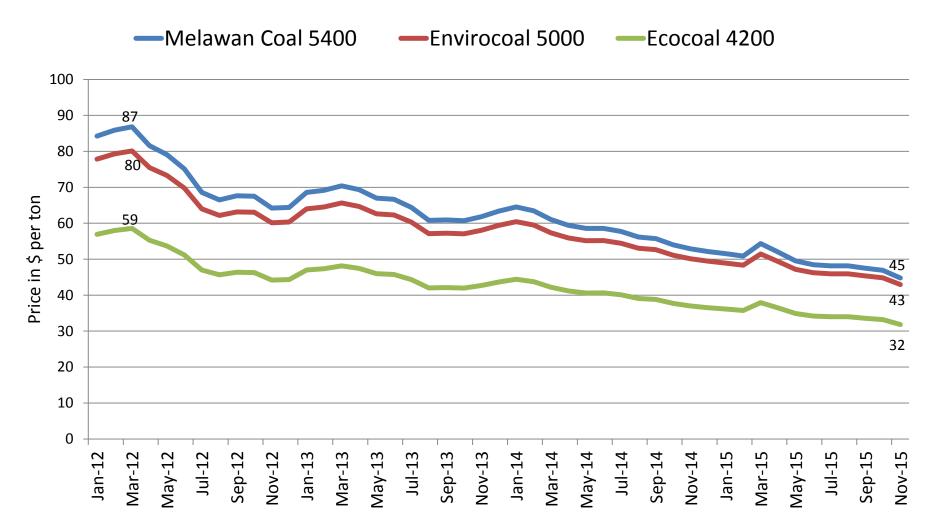
Sector level challenges: Constraints for tariff increase and demand risk

- Distribution sector is already under severe distress in most states
 - Potential tariff increase on account of debt restructuring and accumulated losses
- With increase in open access, and carriage and content separation being proposed through the electricity act amendment, solar PV tariff will effectively act as ceiling for tariff increase for high paying consumers
- Policy commitment to have 175 GW of renewable energy based capacity by 2022
- As per India's Intended Nationally Determined Contributions, 40% of India's installed capacity in 2030 will be from fossil fuel free sources.

Fuel price variation- a transient phenomenon

- Prices of Indonesian coal have been decreasing since the last two years
- Benchmark price of Indonesian Melawan coal (GCV 5400) at the time of :
 - Petitions being filed before CERC in July 2012 ~\$ 70 per ton
 - Impugned order being passed \$63.78 per ton
 - Price declared for Feb 2015 \$ 50.87
 - Price declared for Nov 2015 \$45 per ton
- Benchmark prices for Envirocoal and Ecocoal which were at more than \$50-55 per ton at the time of petition being filed, are down to \$32 per ton, which is close to the fixed price contracts signed before the promulgation of the 2010 regulation.
- Thus, the so-called hardship is a transient phenomenon which will keep changing based on market price
- Blending coal sourced from different sources can be hence be an effective tool for mitigating such transient variations in fuel price

Variation in bench mark price (\$/ton) of Indonesian coal since January 2012



Proportionate reduction in CERC determined compensatory tariff (indicative calculation)

			Indicative calculation as per	Calculation as per Feb 2015 coal	Calculation as per Nov 2015
Sr No	Item	Unit	impugned order	prices	coal prices
1	Units sold	mil kwh	26630	26630	26630
2	Fuel Charges as per tariff (FOB only)				
2a	QNEFEC	US\$/kwh	0.00707	0.00707	0.00707
2b	QEFEC	US\$/kwh	0.00585	0.00585	0.00585
3	CERC escalation index		196.41	196.41	196.41
4	QEFEC (2b) after indexation	US\$/kwh	0.01149	0.01149	0.01149
5	Fuel Energy tariff component (2a+4)	US\$/kwh	0.01856	0.01856	0.01856
6	Fuel charges recovered (1*5)	mil US\$	494.26	494.25	494.25
7	FOB cost of imported coal	US\$/ton	63.78	50.87	45
8	effective import duty		6.33%	6.33%	6.33%
Y Y	FOB cost of imported coal-adjusted for duties	US\$/ton	67.82	54.09	47.85
	Qty of imported coal for stated generation	mil ton	10.73	10.73	10.73
	cost of imported coal tonnage as above (9*10)	mil US\$	727.98	580.39	513.41
12	gross compensation (11-6)	mil US\$	233.73	86.13	19.16
13	gross compensation per unit (12/1)	US\$/kwh	0.0088	0.003234	0.000720
14	Exchange rate		59.7	66.65	66.65
15	Gross compensation per unit in INR	INR/kwh	0.5254	0.22	0.05

Revenue from sale of power beyond the target availability (indicative calculation)

Item	Unit	Scenario 1	Scenario 2	Scenario 3
Normative Availability	%	80%	80%	80%
Third party Sale	%	5%	10%	15%
Third party sale Price	INR/kWh	3.5	3.5	3.5
Energy Charges	INR/kWh	2.24	2.24	2.24
Per Unit Surplus	INR/kWh	1.26	1.26	1.26
Surplus Mus	MU	1664	3329	4993
Additional revenue	Rs Cr	210	419	629
Impact on compensatory tariff	Rs/unit	0.08	0.16	0.24

Lopsided approach

- Para 84 and 85 of the impugned order:
 - "...Therefore, <u>forcing the generator to generate additional electricity</u> without appropriate incentive will be fundamentally against the spirit of the order dated 15.4.2013, and would cause further hardship to the petitioner."
 - "...As regards the sharing, we are of the view <u>that the profit may be</u> <u>shared between the procurers and the petitioner in the ratio of 60:40</u> <u>with incentive</u>, subject to the procurers' written consent for third party sale above 80% target availability." (<u>Emphasis added</u>)
- → Sale of generation beyond normative availability can almost entirely mitigate the so-called hardship while ensuring that the procurers (and hence consumers) get their entire share of contracted capacity at PPA agreed tariff.
- → However, the impugned order does not mandate the developer to mitigate the purported hardship using this method, but instead imposes a compensatory tariff on consumers while allowing the developer to retain certain share (40%) of profit from such sale beyond the normative availability

Fundamental alternation in fuel price risk allocation

- Bidding framework allowed bidders to transparently pass through the entire fuel price risk at the time of bidding itself
- Risks were knowingly and willingly taken by project developers to win contracts
- By passing on the entire fuel price risk to consumers post bidding, the impugned order has fundamentally altered the risk allocation embedded in the PPA and the bidding framework
- Impugned order seeks to mitigate entire hardship of the project developer on account of fuel price variation by simply passing it through to consumers
 - Without giving the consumers any incentive for bearing this undue burden

Lopsided approach

- Return the generation assets at the end of PPA:
 - Allowing compensation implies pass through of the entire fuel risk, voluntarily assumed by the project developer to win the contract.
 - Asset supported and sustained in this manner should ultimately belong to the consumers.
 - Hence, a generation asset made viable by such mechanism should be returned to the consumers at the end of term, at an appropriate transfer price
- Para 51 of the impugned order:
 - "...As regards the suggestion of Prayas for return of the generation assets at the end of the useful life, <u>we are of the view that this aspect will be</u> <u>governed as per the terms and conditions of the PPA and is beyond the</u> <u>scope of the present proceedings</u> which is confined to compensating the petitioner for the hardship suffered by it on account of Indonesian Regulations." (<u>Emphasis added</u>)
- → While deciding the compensatory tariff the Commission feels it important to go beyond the terms and conditions of the PPA, but to provide similar consideration to the consumers, it feels constrained by the contract provisions

Prayas Submission

- Compensatory tariff should not be allowed on following grounds:
 - Flawed process: Due public process necessary as per law was not followed Fundamental reallocation of risk: Entire burden arising out of fuel price variation is passed on to the consumers, thus totally de-risking the developer. Such reallocation of risk post bidding, is unfair, unjust and legally untenable as it goes against the basic tenets of competition
 - Sanctity of contracts: In absence of contractual provisions, using regulatory powers to restore financial viability of projects by post facto altering risks that were knowingly and willing taken to win contracts, sets a bad regulatory precedence for sector policy and competition
- Procurers have a right to get the entire share of power at the rates they have contracted as per the PPA agreed terms and conditions
- If need be, combination of following measures can be used to mitigate the so-called hardship, if any, on account of fuel price variation:
 - Sale of generation beyond normative availability and using the entire surplus to offset impact on tariff
 - In case such revenue is more than the so-called loss, gain sharing as per PPA terms and conditions should apply
 - Reduction in overall fuel costs by adopting measures such as blending low GCV coal, exploring other cheaper sources of coal etc.
 - Plough back of incremental revenue (net of tax and royalty) from coal mines owned by developer

Thank you

Prayas (Energy Group) www.prayaspune.org/peg