



Multi Year Tariff (MYT) Application by Reliance Energy Ltd for FY 2008 - 2010

Comments / Suggestions

By

Prayas Energy Group, Pune

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Public Hearing, Mumbai

Principles for the MYT framework

- I Principles for the MYT framework
 - First exercise of implementing MYT
 - Significant uncertainties (fuel prices, availability and cost of short-term power)
 - Very weak data collection and performance monitoring systems
 - è Need very cautious approach to prevent excessive burden on consumers and to minimize the possibilities of “Gaming”
 - è Need emphasis on benchmarking the productivity and improving performance monitoring systems

Key Issues

- | Capital Expenditure
- | Fuel Cost and Power Purchase
- | O&M Expenses
 - Employee Cost
 - R & M Cost
 - A & G Cost
- | Quality of Supply and Service

Capital Expenditure

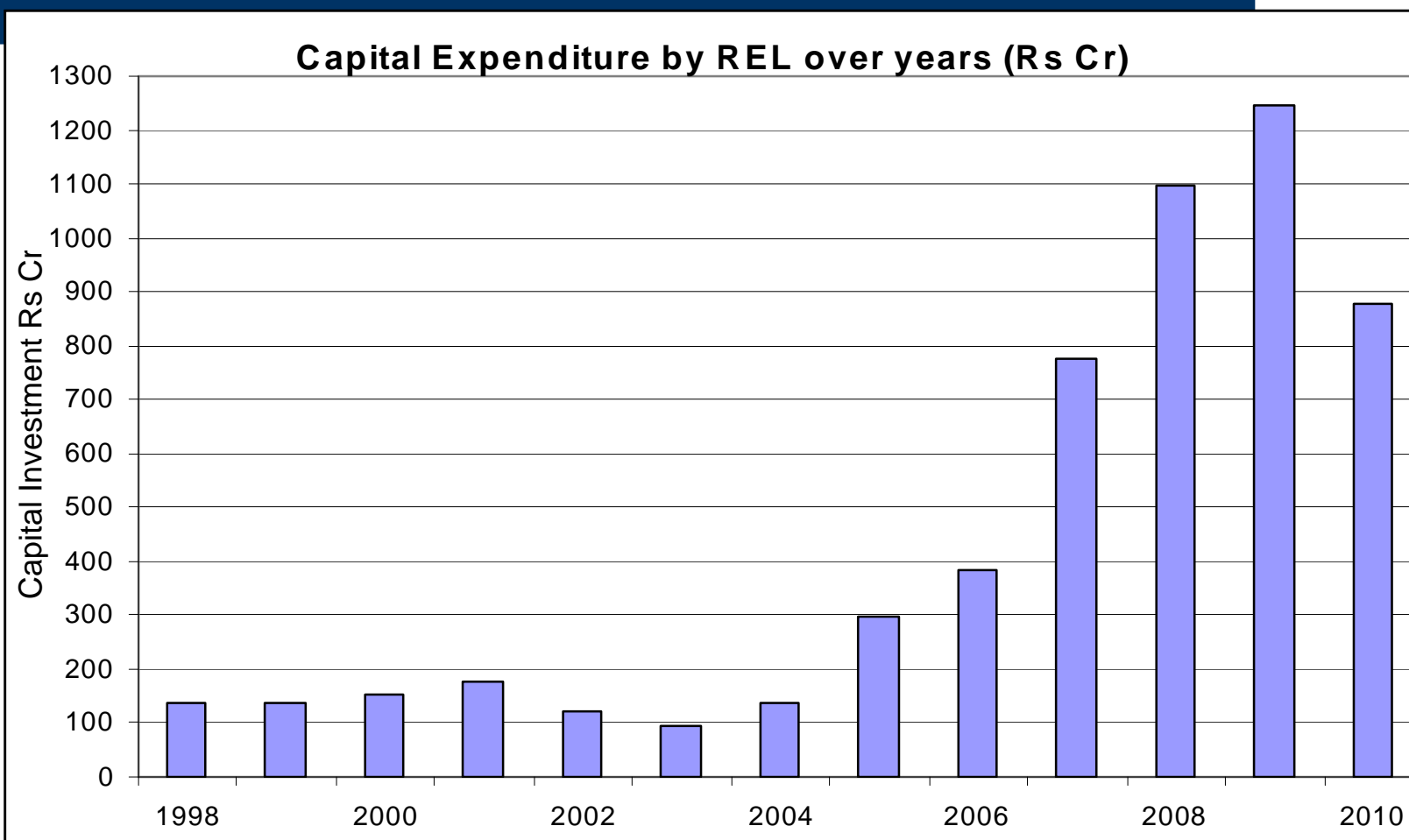
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- | One of the most crucial parameters that needs be monitored in the control period
 - Has long term bearing on the consumer tariff
 - Thorough data and information should be collected

- | REL has proposed total Capital Investment of 3,218 Cr in next 3 years (FY 2008 to 2010)
 - Current (2006) GFA of REL = 3556 Cr
 - Current (2006) NFA of REL = 1483 Cr

Capital Expenditure

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Prayas Presentation on REL MTP FY 2006-2010

21 March 2007

Capital Expenditure

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	FY 03	FY 04	FY 05	FY 06	FY 07	FY 08
Capital investment in the year Rs Cr	92	137	299	384	774	1096
Total energy input to REL system MU		7156	7457	7923	8796	9279
Maximum Demand MVA (REL Projection)	1226	1274	1272	1331	1497	1617
CapEx Rs /input kWh		0.19	0.40	0.48	0.88	1.18
CapEx Rs Cr/max MVA	0.08	0.11	0.23	0.29	0.52	0.68

è Growth in CapEx is exorbitantly higher than system demand growth

Capital Expenditure: Highly Questionable Prudence

CapEx Head	Addition in Infrastructure	Existing Infrastructure (2006)
11 kV Line	8,000 ckt km	2,444 ckt km
LT Line	3,500 ckt km	3,116 ckt km
Distribution Transformers	19,000 No.s	4,002 No.s

è Need and cost should be re-evaluated (against present assets)

Present Asset Data Formats suggested by Prayas

Sr. No.	Particulars	<Financial Year>			
		Balance at the beginning of the year	Additions during the year	Retirement of assets during the year	Balance at the end of the year
	Distribution				
1	Voltage Level - 11 kV				
1.1	Lines
1.2	Distribution Transformers (11kV/0.4kV)
1.3	Meters and instruments (excluding consumer meters)
1.4	HT Capacitors
1.5	Poles				
1.6	etc				

Capital Expenditure

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- | No project could be considered without in-principle clearance by the MERC
 - Detailed evaluation by MERC on conditions in “in-principle” clearance
- | MERC should specify the CapEx data submission formats in this order
 - è REL can maintain the data in the same format during the next year
 - è Data formats suggested by Prayas during last year’s ARR process

CapEx formats suggested by Prayas ..1

Sr No	CAPEX scheme	Proposal			MERC in-principle clearance				
		Date of submission	Amount	Phasing of expenditure	Date of clearance	Amount	Phasing of expenditure	Details of physical assets to be created*	Remarks / Conditions, if any

* These details should indicate type, number and cost of the physical assets.

CapEx formats suggested by Prayas ..2

Present Status of the Scheme									Other Remarks, if any
Status in FY05			Status in FY06			Status in FY07			
Expenditure in FY05	Capitalisation in FY05	Details of the physical assets created *	Expenditure in FY06	Capitalisation in FY06	Details of the physical assets created *	Expenditure in FY06	Capitalisation in FY06	Details of the physical assets created *	

Capital Expenditure

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- I No project could be considered without in-principle clearance by the MERC
 - Detailed evaluation by MERC on conditions in “in-principle” clearance
- I MERC should specify the CapEx data submission formats in this order
 - è REL can maintain the data in the same format during the next year
 - è Data formats suggested by Prayas during last year’s ARR process
 - è A thorough third party audit of the CapEx data should be carried out by MERC

Coal Cost

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- | REL should blend Indian raw coal with imported coal
 - Lower Coal Cost (in Rs/kCal)
 - | Washed Coal = 528 Rs/Million kCal
 - | Imported Coal = 459 Rs/Million kCal
 - | Raw Coal = 410 Rs/ Million kCal
 - Calorific value of washed coal is marginally higher than raw coal
 - Environmental risk of using raw coal will reduce due to FGD
- è Saving of about 40 Cr every year
- è Need for revising coal costs and calorific values by MERC

Coal Cost

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- | Use of normative heat rate (2500 kCal/kWh)
 - MERC approved norm = 2350 kCal/kWh

- | MERC Tariff Regulations, 2005 (Section 26.2)
 - “ *In case of an existing generation station, the Commission shall determine the tariffs having regard to the historical performance of such generating station* ”

- è Increase of ~ 50 Cr per yr (Effective RoE of REL ~ 19%)

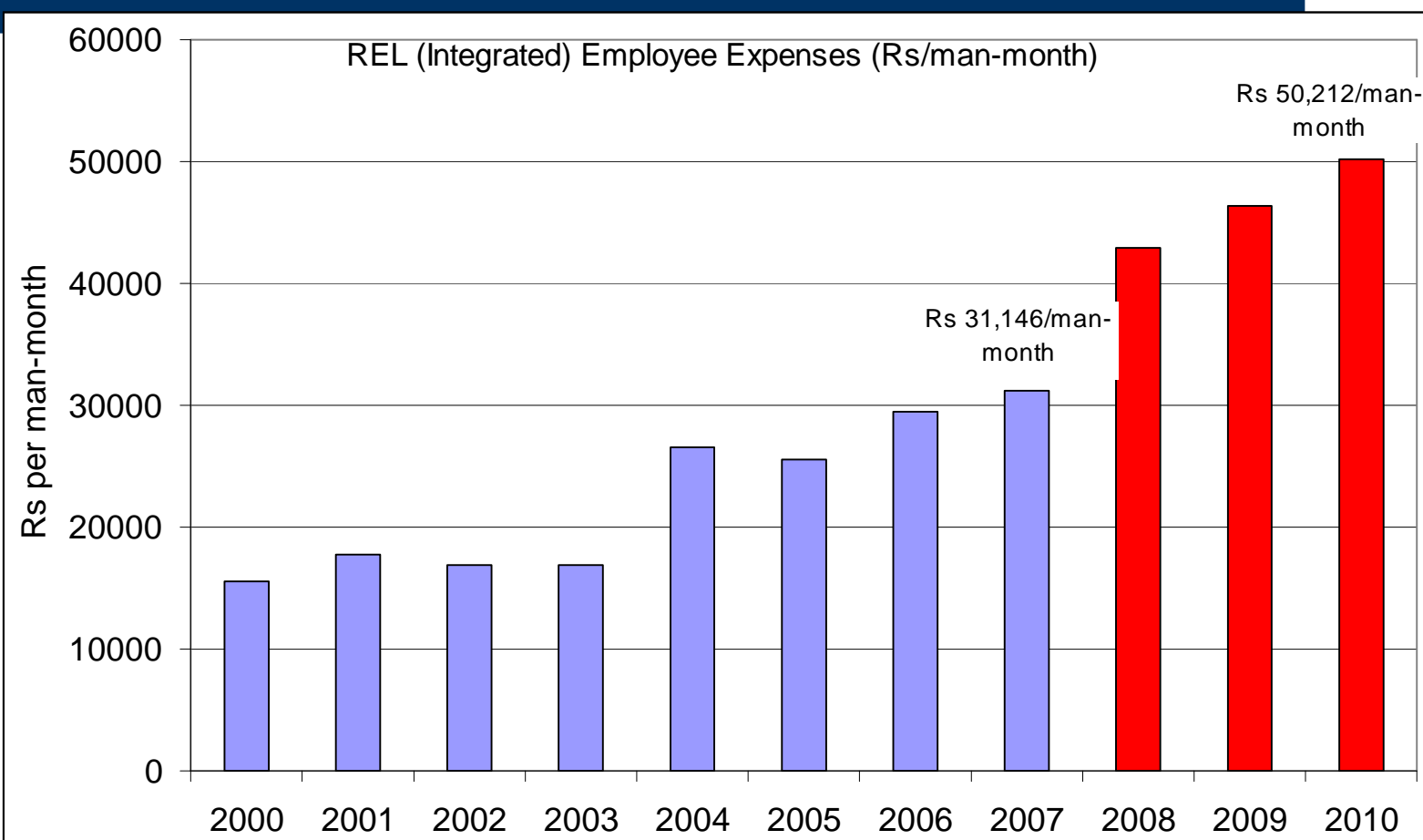
O & M Expenses

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O&M Expenses of REL-D	FY 2007 (MERC)	FY 2008	FY 2009	FY 2010
Employee Expenses Rs Cr	162	220	237	255
A&G Expenses Rs Cr	63	90	97	104
R&M Expenses Rs Cr	70	143	164	187
Total O&M Expenses Rs Cr	295	454	497	546

- Increase of 54% over MERC approved values for FY 2007

Employee Expenses



Prayas Presentation on REL MYT FY 2008-2010

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O & M Expenses

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- | O & M Expenses
 - Highly controllable expenses
 - Controlling such expenses is the very basic rationale for the MYT framework

- | No increase in O&M Expenses should be allowed over and above FY 2007 values approved by MERC
 - è Reduction of more than 150 Cr every year
 - è REL should achieve this through efficiency gain

Quality of Supply and Service

- | Ensuring Quality of Supply and Service and implementing SoP and Supply Code Regulations is at the very heart of the MYT process
- è Very stringent data monitoring processes required
 - è Improvement in metering and billing
- | Need to publish Quality of Supply/Service reports regularly
 - è New and reliable data collection processes need be devised

In the Nutshell

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1. Capital Expenditure

- i. Consider only those schemes which have received MERC in-principle clearance and scrutinize with reference to conditions in the clearance
- ii. Specify thorough formats for submitting CapEx data
- iii. Conduct third party audit of the CapEx data submitted by REL

2. Fuel Cost

- i. Revise coal costs, calorific values and blending ratios
- ii. Use MERC heat rate norm of 2350 kCal/kWh

In the Nutshell

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3. O & M Expenses

- i. No increase in O&M Expenses should be allowed over and above FY 2007 values approved by MERC

4. Quality of Supply and Service

- i. Very stringent data monitoring processes required
- ii. Need to publish Quality of Supply/Service reports regularly