# **REQUEST FOR SUBMISSION OF**

# **EXPRESSION OF INTEREST FOR**

# THE SIXTH ROUND OF AUCTION OF COAL LINKAGES

# UNDER PARAGRAPH B (ii) OF THE SHAKTI POLICY

# **FOR**

# IPPs/CPPs HAVING ALREADY CONCLUDED LONG TERM PPAs

# **ISSUED BY**



(A Wholly owned Subsidiary of Power Finance Corporation Ltd. – A Govt. of India Undertaking)

**Corporate Office**: 9<sup>th</sup> Floor (A Wing) Statesman House, Connaught Place, New Delhi – 110001

Issued on August 14, 2023

#### **DISCLAIMER**:

The information contained in this request for submission of expression of interest ("EOI") for sixth round of auction (the "Auction") of coal linkages for IPPs/CPPs, each as defined below and each having valid concluded long term power purchase agreements ("PPAs") in accordance with paragraph B (ii) of the New More Transparent Coal Allocation Policy for Power Sector, 2017 – SHAKTI (Scheme for Harnessing and Allocating Koyala (Coal) Transparently in India) ("SHAKTI Policy") ("Request for Submission of EOI"), or information subsequently provided to any IPP/CPP (each as defined below), prospective bidder, bidder (as defined below), person, party, participant, applicant or interested party ("Prospective Bidder"), whether verbally or in documentary or any other form by or on behalf of PFC Consulting Limited ("PFCCL" or the "Authorised Representative") and/or any of its employees or advisors, is provided to the Prospective Bidder(s) on the terms and conditions set out in this Request for Submission of EOI.

This Request for Submission of EOI is issued after vetting of the same by Central Electricity Authority (CEA) and (Coal India Limited (CIL). This Request for Submission of EOI is neither an agreement nor an offer by PFCCL to the Prospective Bidders or any other person. The purpose of this Request for Submission of EOI is to provide the Prospective Bidders with information that may be useful to them in making their EOI. This Request for Submission of EOI includes statements which reflect various assumptions and assessments arrived at by PFCCL in relation to the power sector. Such assumptions, assessments and statements do not purport to contain all the information that each Prospective Bidder may require. This Request for Submission of EOI may not be exhaustive or appropriate for all persons and it is not possible for PFCCL / CIL / CEA, its employees or advisors to consider the investment objectives, financial situation and particular needs of each Prospective Bidder who refers to, reads or uses this Request for Submission of EOI. The assumptions, assessments, statements and information contained in this Request for Submission of EOI may not be complete, accurate, adequate or correct. Each Prospective Bidder should, therefore, conduct its own investigations and analysis and should check the accuracy, adequacy, correctness, reliability and completeness of the statements and information contained in this Request for Submission of EOI and obtain independent advice from appropriate sources before submitting its EOI.

Information provided in this Request for Submission of EOI to the Prospective Bidder(s) has been collated from several sources, some of which is subject to interpretation of the applicable law. The information given is not intended to be an exhaustive account of statutory requirements and should be used as or for reference only. PFCCL / CIL/ CEA does not accept any responsibility for the accuracy or otherwise for any statement contained in this Request for Submission of EOI.

PFCCL / CIL / CEA, its employees and advisors make no representation or warranty and shall have no liability to any person, including any Prospective Bidder under any law, statute, rules or regulations or tort, principles of restitution or unjust enrichment or otherwise for any loss, damages, cost or expense which may arise from or be incurred or suffered on account of anything contained in this Request for Submission of EOI or otherwise, including the accuracy, adequacy, correctness, completeness or reliability of this Request for Submission of EOI and any assessment, assumption, statement or information contained therein or deemed to form part of this Request for Submission of EOI or arising in any way from participation in the Auction.

PFCCL / CIL also accepts no liability of any nature whether resulting from negligence or otherwise howsoever caused, arising from reliance by any Prospective Bidder upon the statements contained in this Request for Submission of EOI.

Notwithstanding anything contained in this Request for Submission of EOI, PFCCL may, in its absolute discretion, but without being under any obligation to do so, update, amend or supplement the information, assessment, process or assumptions contained in this Request for Submission of EOI.

The issuance of this Request for Submission of EOI does not imply that PFCCL is bound to select or shortlist any Prospective Bidder and PFCCL reserves the right (without incurring any liability) to reject all or any of the Prospective Bidders, as the case may be, without assigning any reason whatsoever.

Each Prospective Bidder shall bear all its costs associated with or relating to preparation and submission of its EOI or relating to its EOI. Nothing contained in this Request for Submission of EOI shall be binding on PFCCL or confer any right on the Prospective Bidders.

Pursuant to this Request for Submission of EOI, PFCCL will be uploading the scheme document setting out the mechanism for conduct of the Auction ("Scheme Document") and the definitive document(s). In case of any inconsistency between this Request for Submission of EOI and the Scheme Document and the definitive document(s), the Scheme Document and the definitive document(s) shall be final and shall prevail, in the manner specified under the relevant document.

*In this Request for Submission of EOI:* 

"IPPs" shall mean independent power producers, that is generating companies not owned/controlled by the Central/State Government; and

"CPPs" shall mean a power plant which qualifies as a captive generating plant in terms of Rule 3 of the Electricity Rules, 2005.

## **REQUEST FOR SUBMISSION OF EOI**

#### 1. Registration

- 1.1. Ministry of Coal ("MoC") has *vide* its letter dated May 22, 2017 dealt with matters concerning "Signing of Fuel Supply Agreement (FSA) with Letter of Assurance (LoA) holders of Thermal Power Plants Fading Away of the existing LoA-FSA Regime and Introduction of a New More Transparent Coal Allocation Policy for Power Sector, 2017
  - SHAKTI (Scheme for Harnessing and Allocating Koyala (Coal) Transparently in India)" and issued the amendment to the SHAKTI Policy dated March 25, 2019 ("Amendment").
- 1.2. Paragraph B (ii) of the SHAKTI Policy *inter alia* provides that CIL/SCCL may grant coal linkages on notified price on auction basis for IPPs/Power Producers having already Concluded PPAs. Accordingly, five rounds of auction have been successfully conducted under paragraph B (ii) of the SHAKTI Policy.
- 1.3. Subsequently, a Notice Inviting for Submission of EOI (the "Notice") for sixth round of Auction of Coal Linkages under paragraph B (ii) of the SHAKTI Policy has been issued on August 14, 2023. Pursuant to the Notice, IPPs/CPPs, meeting the Eligibility Criteria (as set out in Clause 3 below) can participate in the Auction through their Specified End Use Plant(s) (as defined below).
- 1.4. Each Bidder's participation shall be linked to a Specified End Use Plant and each Specified End Use Plant may be used to participate only once.

In this context, "**Specified End Use Plant**" shall mean one or more power generating units (including a plant which qualifies as a CPP to the extent of its capacity to be delivered under a PPA executed on or before May 17, 2017) situated in a single location within the same boundary located in India and owned by the Bidder.

## 2. Submission of Expression of Interest

- 2.1. Each Bidder is required to submit the duly executed and stamped EOI in the format set out in **Annexure I**, no later than the timeline as may be prescribed. Bidders are requested to submit the document by August 31, 2023 at 17:00 hrs.
- 2.2. Additionally, the documents set out in Paragraph 1(iv)-(ix) of **Annexure I** are also required to be submitted in original in sealed envelopes, setting out on the covering envelope "Original Documents for SHAKTI Scheme Auction Round 6", no later than the timeline as may be prescribed. The Bidders must also mention the name of the Bidder submitting the documents on the envelope. The sealed envelope(s) shall be submitted at the following address:

Chief General Manager, PFC Consulting Limited, 9th Floor, A Wing, Statesman House, Barakhamba Road, Connaught Place, New Delhi – 110001.

2.3. The information submitted by the Bidder as part of the EOI shall be verified by the

- Central Electricity Authority, on the basis of the documentation/ information submitted by each Bidder.
- 2.4. In case any additional information is required, the same shall be provided by the Bidder within the specified timeframe.
- 2.5. The maximum quantity of coal that can be allocated to a Specified End Use Plant will be corresponding to 100% quantity at 85% PLF as per CEA Norms of ACQ.
- 2.6. Norms for Annual Contracted Quantity (ACQ) issued by CEA have been provided for information in **Annexure II** hereto.

# 3. Eligibility Criteria

The Bidder would be required to comply with the following basic and additional eligibility criteria to be able to submit the EOI:

# 3.1. Basic Eligibility Criteria

- 3.1.1. The Bidder having valid already Concluded PPAs in respect of the Specified End Use Plant(s) that is used for participation under Clause 1 above. In this regard, "Concluded PPA" shall mean a valid long term PPA (both under section 62 and section 63 of the Electricity Act, 2003), based on domestic coal, executed on or before May 17, 2017.
- 3.1.2. The Bidder shall be required to submit the Verification Certificate, as per the format specified in Appendix II of Annexure I.

# 3.2. <u>Additional Eligibility Criteria</u>

- 3.2.1. A Bidder having valid already Concluded PPA(s) in respect of the Specified End Use Plant(s) and not having, in respect of such Specified End Use Plant(s), as on the last date of submission of EOI, the following:
  - (a) any coal linkage at all or having coal linkage for quantity which is less than 100% of their coal requirement, computed as per the Norms for Annual Contracted Quantity prescribed in **Annexure II**; and/or
  - (b) any coal mine/coal block or having coal mine/coal block for quantity which is less than 100% of their coal requirement, computed as per the Norms for Annual Contracted Quantity prescribed in **Annexure II**.

For the purposes hereof, (a) and/or (b) in respect of a Specified End Use Plant shall be referred to as the "Allocated Coal Block/ Letter of Assurance (LoA)/ Linkage" and the Bidder may bid for the balance quantity of coal.

It is hereby clarified that with respect to such Specified End Use Plant, the Bidder whose:

- (i) coal block(s) has(ve) been de-allocated and the Bidder furnishes clearance of MoC to this effect, on or before the last date for submission of EOI; and/or
- (ii) letter of assurance ("LoA(s)") / linkage(s) has(ve) been cancelled by the MoC / Standing Linkage Committee (Long Term) ("SLC(LT)"),

may also participate in the Auction, if such Bidder does not, as on the last date of submission of EOI, hold any Allocated Coal Block/ Letter of Assurance (LoA)/ Linkage in respect of such Specified End Use Plant.

Provided, however that, with respect to the Specified End Use Plant, if a Bidder meets the Eligibility Criteria specified in this Clause 3 and has a letter of assurance / linkage / fuel supply agreement awarded under paragraph B (iii) of the SHAKTI Policy in respect of such Specified End Use Plant(s), the same shall not be considered as the Allocated Coal Block/ Letter of Assurance (LoA) / Linkage under this Clause 3.2.1. In that case, once FSA for B (ii) linkage is signed, Letter of Assurance (LoA)/ Linkage/ FSA for B (iii) will automatically be terminated as per the letter of assurance / linkage / fuel supply agreement awarded under Paragraph B (iii) of the Policy in respect of such Specified End Use Plant(s).

- 3.2.2. The Verification Certificate to be provided and certified by DISCOM, as per the format specified in **Appendix II**, should not be dated and issued prior to the date of issuance of this Request for Submission of EOI.
- 3.2.3. The Bidder should be the owner of the Specified End Use Plant(s) that is used for participation under Clause 1.
- 3.2.4. The participating Specified End Use Plant should have been commissioned as on March 31, 2022 and should have achieved COD as on August 14, 2023.
- 3.2.5. The Bidder shall not have been convicted for wrongful utilization of coal by the Central Bureau of Investigation or any other governmental authority or statutory or judicial body.
- 3.2.6. Existing linkage holders are not allowed to surrender their LoA/ fuel supply agreement to participate in this Auction.

## **ANNEXURE I**

# FORMAT OF EXPRESSION OF INTEREST

(On the letterhead of the Bidder)

Date:

**Sub: Expression of Interest ("EOI")** 

[Insert name and Service Provider Registration No. of the Specified End Use Plant]

Dear Sir.

With reference to the request for submission of expression of interest dated [insert] for the sixth round of auction of coal linkages for IPPs/CPPs (as defined in the EOI) each having valid already concluded long term PPAs ("Request for Submission"), we hereby express our interest to participate in the Auction and submit the following documents and information for your consideration:

# 1. Documents and Information

- (i) Name of the Bidder:
- (ii) Details of the Specified End Use Plant:\*

Sr. No	Particulars	Unit
1.	Name of the Specified End Use Plant	
2.	Type of Power Plant (IPP /CPP)	
3.	Location of the Specified End Use Plant	
4.	Type of Fuel (Coal/ Washery Reject based)	
5.	Date of Commissioning of the Specified End Use Plant	
6.	Gross Capacity of the Specified End Use Plant	MW
7.	Gross Capacity of the Specified End Use Plant against which there is a Concluded PPA based on domestic coal	MW
8.	Number of Concluded PPAs and details of each such PPA (including expiry date of the PPA) (Provide gross capacity of PPAs)	
9.	In case of CPP, Gross Capacity of the Specified End Used Plant used for Captive Purpose	MW
10.	Station Heat Rate***	kCal/kWh
11.	Technology (sub-critical, super critical etc.)	

Sr. No	Particulars	Unit
12.	Main Steam Pressure	Ata
13.	Whether Motor Driven Boiler Feed Pump (MDBFP) is being used during normal operation	Yes/No
14.	Details of existing linkage (if any)	TPA
15.	Details of the LoA/ linkage cancelled by MoC/ SLC(LT)  1. Quantity for which the linkage was awarded	
	2. Grade of coal Date of Cancellation	
16.	Name of the captive coal mine, if any	
17.	Peak-rated capacity of the captive coal mine	TPA
18.	Grade of coal of the captive coal mine	
19.	Percentage of power sold on merchant basis (of generation capacity of the Specified End Use Plant linked to coal mine)	%
20.	Details of the coal block de-allocated (if any)	
	1. Name of the coal block(s)	
	2. Capacity of the coal block(s) including the peak rated capacity	
	3. Grade of coal	
	4. Details of the plant linked to the coal block along with the respective quantities	
	Date of De-allocation	
21.	Details of Coal Linkage secured under SHAKTI B(iii), if any, for the said PPA along with DISCOM Certificate	

<sup>\*</sup>In case two or more units are combined and used to participate as a Specified End Use Plant, the Bidder has to provide the above details for each such unit.

- (iii) With respect of each participating Specified End Use Plant, copy(ies) of all executed PPAs which have been executed on or before May 17, 2017.
- (iv) Relevant corporate authorizations of the Bidder for executing this EOI viz. notarised Power of Attorney in the format set out in <u>Appendix I</u> and certified true copy of board resolution and/or certified true copy of shareholders resolution etc. The said documents are to be submitted in original in the manner prescribed in the Request for Submission.
- (v) Letter/Certificate from the respective DISCOM for each Specified End Use

<sup>\*\*\*</sup>In case the Regulator has approved a higher SHR, the Bidder should specify the same along with supporting documents. However, in all such cases, quantity of Coal will be calculated on SHR with upper ceiling of 2,600 kCal/kWh.

Plant in the format set out in **Appendix II**.

- (vi) Documents evidencing existing linkage(s), if applicable (e.g. current and existing fuel supply agreements, copy of LoA/ LoI issued by CIL or its subsidiary etc.) and/or captive coal mine(s), if applicable (e.g. copy of vesting order, mining plan or any other document evidencing the ownership, peak-rated capacity etc. of the captive coal mine).
- (vii) Relevant documents for cancellation of LoA or coal linkage by MoC/ SLC (LT), if applicable.
- (viii) Copy of letter of clearance issued by MoC with respect to de-allocation of the coal block(s), if applicable.
- (ix) Self-Certification/Relevant Documents regarding Captive Use of the Specified End Use of Plant in accordance with Rule 3 of the Electricity Rules 2005 (regarding minimum 26% of the ownership and minimum 51% of electricity generated for captive use)
- 2. We, the undersigned, are duly authorized to represent and act on behalf of [insert name of the Bidder] and having reviewed and fully understood all information provided in the Request for Submission and having considered all relevant information, wish to hereby express our continued interest in the auction.
- 3. We hereby submit our EOI and we further confirm that we meet the Eligibility Criteria as per Clause 3 of the Request for Submission.
- 4. We hereby agree, undertake, understand and declare as under:
  - a. Without prejudice to the foregoing, notwithstanding any qualifications or conditions, whether implied or otherwise, contained in our EOI, we hereby represent and confirm that our EOI is unqualified and unconditional and is without any deviations, conditions or any assumptions in all respects;
  - b. We declare that in the event PFC Consulting Limited ("**PFCCL**") discovers anything contrary to the above declarations, it is empowered to forthwith disqualify us and our EOI from further participation in the auction;
  - c. We undertake that in case due to any change in facts or circumstances or the applicable laws during the auction, we are attracted by the provisions of disqualification, we shall intimate PFCCL of the same immediately; and
  - d. PFCCL may, in its sole, absolute and unfettered discretion, reject or accept any EOI and/or cancel/modify the auction.
- 5. We undertake to provide any additional documents/information as may be required in this regard. We shall make available to PFCCL any additional documents/information it may find necessary or require to supplement or authenticate this EOI.
- 6. We hereby undertake and confirm that the documents provided and information given herein is true, complete, accurate and correct and is not false, misleading and/or incorrect, in any manner whatsoever. If the information provided is discovered to be false, misleading and/or incorrect, we shall be liable under applicable laws for the time being in force and subject to the consequences envisaged in the Scheme Document and the definitive document(s).

- 7. We have not surrendered our letter of assurance(s)/fuel supply agreement(s) for the purpose of participating in this auction.
- 8. This EOI shall be governed by and construed in all respects according to the applicable laws being in force in India.
- 9. All the terms used herein but not defined, shall have the meanings as ascribed thereto under the Request for Submission.

Signature of the Authorised Signatory

Name and designation of the Authorised Signatory:

Name of the Bidder:

Stamp of the Bidder:

Date:

Place:

#### Appendix I

# **Format of Power of Attorney**

[To be stamped in accordance with the relevant Stamp Act and notarized]

Know all men by these presents, that we, [name and registered office address of Bidder] do hereby irrevocably constitute, nominate, appoint and authorise Mr./ Ms [name of Attorney], son/daughter/wife of [name of father/spouse of Attorney] and presently residing at [address of Attorney], who is presently employed with us and holding the position of [designation or relation with the Bidder], as our true and lawful attorney (hereinafter referred to as the "Attorney") to do in our name and on our behalf, all such acts, deeds and things as are necessary or required in connection with or incidental to participation in auction process, in response to documents, including but not limited to, the Notice Inviting Registration dated [] the Request for Submission of EOI for auction of coal linkages for IPPs/CPPs each having valid already concluded long term PPAs dated [] ("Request for Submission") and any other document(s) issued by PFC Consulting Limited ("PFCCL") in this regard (collectively referred to as the "Documents") including but not limited to signing (including through affixation of digital signatures) and submission of all applications, affidavits, bids and other documents and writings, participate in bidders' and other conferences and providing information/responses to PFCCL, representing us in all matters before PFCCL, and generally dealing with PFCCL in all matters in connection with or relating to or arising out of our bid for the coal linkages and/or upon award thereof to us and/or till the entering into of the fuel supply agreement with the relevant subsidiary.

AND we hereby agree to ratify and confirm and do hereby ratify and confirm all acts, deeds and things done or caused to be done by our said Attorney pursuant to and in exercise of the powers conferred by this power of attorney and that all acts, deeds and things done by our said Attorney in exercise of the powers hereby conferred shall and shall always be deemed to have been done by us.

All capitalized terms used but not defined herein shall have the meanings ascribed to them in the Documents.

IN WITNESS WHEREOF WE, [name of the Bidder], THE ABOVE NAMED PRINCIPAL HAVE EXECUTED THIS POWER OF ATTORNEY ON THIS [date] DAY OF [month], [year].

For [name of the Bidder	•]	
-------------------------	----	--

(Signature, name, designation and address)

Witnesses:

1.

2.

## Accepted Notarised

(Signature, name, designation and address of the Attorney)

#### Notes:

- i. The power of attorney to be submitted by the Bidder shall substantially be in the format set out above.
- ii. The mode of execution of the power of attorney should be in accordance with the procedure, if any, laid down under the applicable law and the charter documents of the executant(s), and when it is so required, the same should be under common seal affixed in accordance with the required procedure.
- iii. Wherever required, the Bidder should submit for verification the extract of the charter documents and documents such as a board or shareholders' resolution authorizing the execution of this power of attorney.
- iv. For a power of attorney executed and issued overseas, the document will also have to be legalised by the Indian Embassy and appropriately notarised in the relevant jurisdiction. However, the power of attorney provided by Bidders from countries that have signed the Hague Legislation Convention, 1961 are not required to be legalised by the Indian Embassy if it carries a conforming apostille certificate.

#### ANNEXURE I

#### Appendix II

#### **Format of Certification from DISCOM**

Sub: Verification Certificate

Pursuant to paragraph B (ii) of the Scheme for Harnessing and Allocating Koyala (Coal) Transparently in India dated May 22, 2017 issued by the Ministry of Coal ("SHAKTI Policy") and the Amendment, we have verified the validity and enforceability of the following concluded long term power purchase agreement(s) ("PPA(s)") set out in Schedule 1 below.

We hereby certify that, having regard to the provisions of the SHAKTI Policy, each of the abovementioned executed long term PPA(s) has been executed on or before May 17, 2017 and the Bidder meets the Basic Eligibility Criteria specified in the Request for Submission of EOI dated [date of Request for Submission] ("Request for Submission").

		(Signatory)

# Schedule 1 to Appendix II

Sr. No	Item	Description	Remarks
1.	Name of project/Specified End Use Plant		
2.	Capacity (MW) and unit configuration		
3.	Name of Developer as per Co. registration / Registration No.		
4.	COD (Actual / Anticipated)		
5.	Status of PPA  Name of DISCOM / Lead Procurer  (in case of more than one PPA details may be furnished separately for each PPA)		
6.	If the PPA has been signed as Back to Back with Trader the following details may be furnished.		
	i. Name of the Trader		
	ii. PPA capacity (MW)		
	iii. Date of signing of PPA with Trader		
	iv. Tenure		
7.	Capacity (MW) for which PPA has been signed either directly with DISCOM / Lead Procurer or through Trader as back to back (specify Gross capacity, in case of Net capacity approved Aux. consumption and Transmission loss if any shall be taken in to account)		

Sr. No	Item	Description	Ren	narks
8.	Tenure (Years)			
9.	Date of signing of PPA with DISCOM			
10.	Effective date of supply of Power as per PPA			
11.	Actual date of supply of Power			
12.	PPA valid up to (date):			
13.	Remaining period of the PPA in Years			
14.	Source of coal as per PPA and adopted by Regulator			
15.	If the PPA has been adopted by Regulator (Yes / No) if Yes furnish date of adoption and effective date of PPA.			
16.	If PPA signed through MoU or tariff based competitive Bidding			
17.	In case PPA signed through MoU whether two part tariff or single part tariff or on variable cost etc.			
a.	Fixed Charge and Variable Charge for 1 <sup>st</sup> year and levellised tariff to be furnished.		Fixed Charge	Variable Charge
b.	1 <sup>st</sup> Year			
c.	Levellised			
18.	In case PPA signed through tariff based Competitive Bidding furnish the following:			
a.	Whether competitive bidding is as per competitive bidding guidelines and standard bidding documents issued by MoP			

Sr. No	Item	Description	Remarks
b.	If not, furnished details about basis of competitive bidding		
19.	Fixed Charge and Variable Charge for 1st year and levellised tariff to be furnished.		Fixed Charge Variable Charge
a.	1 <sup>st</sup> Year		
b.	Levellised		

Signature of Authorised Person of Signature of Authorised Person of DISCOM/Lead Procurer

Date

Name

Designation

Seal Seal

Designation

#### **ANNEXURE II**

# NORMS FOR ANNUAL CONTRACTED QUANTITY

# The normative coal requirement for different sizes of Non-Pit head Thermal power plants.

Grade	GCV	Adjusted GCV			Sub Critical Technology			
	Considered (kcal/kg)1	after considering	Less than	100 MW to	200 MW to	250 MW	Supercritical units\$	
	(Real/Rg)1	effect of Total	100 MW		less than 250	and	GIII	
		Moisture*		MW	MW**	above\$		
		(kcal/kg)		Unit H	leat Rate (kcal	/kW h) <sup>1</sup>		
			2600	2600	2500	2375	2250	
			Annı	ual coal consu	-		nnes per	
				N	IW per Annu	m)		
G1	6915	6569	2971	2971	2856	2714	2571	
G2	6615	6284	3105	3105	2986	2837	2687	
G3	6315	5999	3253	3253	3128	2971	2815	
G4	6015	5714	3415	3415	3284	3120	2955	
GS	5715	5429	3594	3594	3456	3283	3111	
G6	5415	5144	3794	3794	3648	3465	3283	
G7	5115	4859	4016	4016	3862	3669	3476	
G8	4815	4574	4266	4266	4102	3897	3692	
G9	4515	4289	4550	4550	4375	4156	3937	
G10	4215	4004	4874	4874	4686	4452	4218	
G11	3915	3719	5247	5247	5045	4793	4541	
G12	3615	3434	5683	5683	5464	5191	4918	
G13	3315	3149	6197	6197	5959	5661	5363	
G14	3015	2864	6814	6814	6552	6224	5896	
G15	2715	2579	7567	7567	7276	6912	6548	
G16	2415	2294	8507	8507	8180	7771	7362	
G17	2115	2009	9714	9714	9340	8873	8406	

<sup>&</sup>lt;sup>1</sup> As per Norms of Coal Consumption issued by CEA on 27.03.2019, GCV considered includes storage loss of 85 kcal/ kg as prescribed by CERC in its Tariff Regulations 2019

Adjusted GCV = GCV Considered - {5% GCV Loss due to difference between GCV(ARB) & GCV(EQ)}

<sup>\*</sup>Adjusted GCV in above table has been calculated as follows:

Reconciliation of final coal quantity shall be carried out as per actual data regarding Equilibrated Moisture (%EM) and Total Moisture (%TM) provided by third party sampler using following formula:

$$GCV (TM) = GCV (EM) \times (1-TM)$$

$$(1-EM)$$

\*\* In case, Main Steam pressure is 150 ata or above, the Unit Heat Rate shall be reduced by 100 kcal/kWh

\$ In case of units having Motor Driven Boiler Feed Pump (MDBFP) of 500 MW and above size units (including Super Critical units), the unit heat rate shall be reduced by 50 kcal/kwh

#### Note:

- 1. The above norms include Transit Loss as 0.8%. Further, prevailing transit loss will be applicable as per future CERC Tariff Regulations.
- 2. In case of power projects where approved heat rate by the Regulator is higher than the above considered value, the Heat Rate approved by the Regulator would be considered with upper ceiling of 2600 kcal/kwh.
- 3. ACQ for the current year may be further adjusted on the basis of Grade Variation data for Q1, Q2 and Q3 of previous year.
- 4. The above mechanisms for Moisture/Grade correction will have no tariff implications and no performance incentive to be levied by the Coal Companies for supplying the additional quantity due to any variation
- 5. These Norms will also be applicable for Captive Power Plants also.

# NORMS FOR ANNUAL CONTRACTED QUANTITY

# The normative coal requirement for different sizes of <u>Pit head</u> Thermal power plants.

Grade	GCV	Adjusted	Sub Critical Technology			Sub Critical Technology				C	
	Considered (kcal/kg)1	GCV after considering	Less than	100 MW to	200 MW to	250 MW	Supercritical units\$				
	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	effect of	100 MW	less than 200 MW	less than 250 MW**	and above\$	·				
		Total			eat Rate (kca						
		Moisture*	2 (0.0			T	2250				
		(kcal/kg)	2600	2600	2500	2375	2250				
			Annua		mption at 85		Connes per				
					W per Annu						
G1	6915	6569	2953	2953	2839	2697	2555				
G2	6615	6284	3087	3087	2968	2820	2671				
G3	6315	5999	3234	3234	3109	2954	2798				
G4	6015	5714	3395	3395	3264	3101	2938				
GS	5715	5429	3573	3573	3436	3264	3092				
G6	5415	5144	3771	3771	3626	3445	3263				
G7	5115	4859	3992	3992	3839	3647	3455				
G8	4815	4574	4241	4241	4078	3874	3670				
G9	4515	4289	4523	4523	4349	4131	3914				
G10	4215	4004	4845	4845	4658	4425	4193				
G11	3915	3719	5216	5216	5015	4765	4514				
G12	3615	3434	5649	5649	5432	5160	4888				
G13	3315	3149	6160	6160	5923	5627	5331				
G14	3015	2864	6773	6773	6513	6187	5861				
G15	2715	2579	7522	7522	7232	6871	6509				
G16	2415	2294	8456	8456	8131	7724	7318				
G17	2115	2009	9656	9656	9284	8820	8356				

<sup>&</sup>lt;sup>1</sup> As per Norms of Coal Consumption issued by CEA on 27.03.2019, GCV considered includes storage loss of 85 kcal/ kg as prescribed by CERC in its Tariff Regulations 2019

Adjusted GCV = GCV Considered - {5% GCV Loss due to difference between GCV(ARB) & GCV(EQ)}

Reconciliation of final coal quantity shall be carried out as per actual data regarding Equilibrated Moisture (%EM) and Total Moisture (%TM) provided by third party sampler

<sup>\*</sup>Adjusted GCV in above table has been calculated as follows:

using following formula:

$$GCV (TM) = GCV (EM) \times (1-TM)$$

$$(1-EM)$$

\*\* In case, Main Steam pressure is 150 ata or above, the Unit Heat Rate shall be reduced by 100 kcal/kWh

\$ In case of units having Motor Driven Boiler Feed Pump (MDBFP) of 500 MW and above size units (including Super Critical units), the unit heat rate shall be reduced by 50 kcal/kwh

#### **Note:**

- 1. The above norms include Transit Loss as 0.2%. Further, prevailing transit loss will be applicable as per future CERC Tariff Regulations.
- 2. In case of power projects where approved heat rate by the Regulator is higher than the above considered value, the Heat Rate approved by the Regulator would be considered with upper ceiling of 2600 kcal/kwh.
- 3. ACQ for the current year may be further adjusted on the basis of Grade Variation data for Q1, Q2 and Q3 of previous year.
- 4. The above mechanisms for Moisture/Grade correction will have no tariff implications and no performance incentive to be levied by the Coal Companies for supplying the additional quantity due to any variation
- 5. These Norms will also be applicable for Captive Plants also.