Public Consultation Document

(Ref: No. PNGRB/M(C)/7-Vol-II dated 03.10.2017)

Subject:	**Final initial unit natural gas pipeline tariff under the provisions of the Petroleum and Natural Gas Regulatory Board (Determination of Natural Gas Pipeline Tariff) Regulations, 2008.**
Name of Entity:	**GAIL (India) Limited**
Name of Pipeline:	**Mumbai Regional Natural Gas Pipeline Network**

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1. Regulatory Framework

1.1. In terms of Section 22 of the PNGRB Act, 2006, the Board is entrusted with the responsibility of determining the natural gas pipeline tariff to be charged by the entities laying, building, operating or expanding a natural gas pipeline before the appointed day.

1.2. The methodology for determination of pipeline tariff has been specified in the relevant provisions of the Petroleum and Natural Gas Regulatory Board (Determination of Natural Gas Pipeline Tariff) Regulations, 2008 (hereinafter referred to as "Tariff Regulations") notified on 20.11.2008. Under the provisions of these regulations, PNGRB is to determine the initial unit natural gas pipeline tariff on a provisional basis first and then finalize the same considering the actual costs and data at the end of the financial year on the basis of audited accounts. The transportation tariff is determined using the Discounted Cash Flow (DCF) method using actual and projected pipeline capex and opex costs (in line with provisions of Tariff Regulations) over the entire economic life (25 years) of the pipeline thus arriving at a single levelized transportation tariff. If the length of the pipeline is more than 300 km the recovery of the transportation tariff is apportioned across such zones of 300 km each resulting in zonal tariff where the zonal tariff of a later zone is higher than that of an earlier zone.

2. Provisional Transportation Tariff Orders

2.1. PNGRB issued the final terms and conditions for acceptance of Central Government Authorization for GAIL's Mumbai Regional Natural Gas Pipeline Network vide communication dated 14.03.2011, under Regulation 17(1) of the Petroleum and Natural Gas Regulatory Board (Authorizing

Entities to Lay, Build, Operate or Expand Natural Gas Pipelines) Regulations, 2008. The Mumbai Regional Pipeline of GAIL consists of two sub-networks i.e. (a) Uran-Thal-Usar (UTU) natural gas pipeline sub network and (b) Trombay RCF sub network.

Particulars	**Uran-Thal-Usar**	**Trombay RCF**
Capacity (Common carrier)	3.542 (0.89) MMSCMD	3.494 (0.87) MMSCMD
Length	115.43 Km	13.25 Km

2.2. PNGRB issued a provisional tariff order no. TO/01/2012 dated 12th March, 2012, determining the provisional initial unit natural gas pipeline tariff under the provisions of the Tariff Regulations for UTU and Trombay RCF sub-network of GAIL's Mumbai Regional Pipeline (available on PNGRB's website). The provisional transportation tariffs initially as proposed by GAIL and subsequently revised including the capex of Mahanagar Gas Limited (MGL) connectivity in the main pipeline and as determined by PNGRB, are as follows:

Pipeline	**Initial proposed Tariff by GAIL (Rs. / MMBTU on GCV basis)**	**Revised proposed Tariff by GAIL (Rs. / MMBTU on GCV basis)**
Uran-Thal Usar Levelized Provisional Transportation Tariff	8.16	10.74
Trombay RCF Levelized Provisional Transportation Tariff	8.20	7.66

Pipeline	Provisional Tariff determined by PNGRB (Rs. / MMBTU on GCV basis)
Uran-Thal Usar Levelized Provisional Transportation Tariff	3.49
Trombay RCF Levelized Provisional Transportation Tariff	1.04

2.3. Trombay RCF and Uran-Thal-Usar (UTU) natural gas pipelines were transferred from ONGC to GAIL in 1992. Accordingly, 25 years of economic life for Trombay RCF and UTU networks was completed on March 29, 2017 and May 26, 2017 respectively, from the date of transfer mentioned above. GAIL has applied for the extension of the Mumbai Regional pipeline; however, the same is under consideration of the Board. GAIL in its tariff submission has submitted tariff for 35 years from the date of transfer mentioned above, thereby submitting tariff upto March 29, 2027 and May 26, 2027.

3. Correspondence for final tariff filing with GAIL

3.1. GAIL vide letter dated 29.04.15, 09.07.2015 has provided actual financial data upto FY 13-14 and other relevant future data for period from FY 14-15 onwards in response to Board’s letter dated 23.03.15 and 11.06.15. Further, GAIL vide its letter dated 29.08.17, in response to Board’s letter dated 25.07.2017 and 16.08.17, provides actual financial data upto FY 16-17 and future data for period from FY 17-18 onwards till 29th March 2027 for Trombay RCF and 26th May 2027 for UTU Pipelines.

3.2. GAIL vide letter dated 29.04.2015 and 09.07.2015 submitted the following documents:-

a) Financial costs and other relevant data for determination of final initial unit natural gas tariff of Uran-Thal-Usar sub network and Trombay sub network of Mumbai Regional Networks as per the format specified in the extant regulations;

b) Attachment 1, 1(a)-1(j) as per Schedule A of Tariff Regulation.

c) Audited Trial Balance for the FY 2008-09 to 2013-14.

d) List of customers.

e) Certificate from HOD of site finance, certifying that the trial balances submitted are the final trail balances which have been taken into consideration in the preparation of audited balance sheet of GAIL.

f) CA certificate of Opening Gross Block of the pipeline as on 01.04.08, depreciation for the year 08-09 and net block of the pipeline as on 31.03.2009 as per the format of PNGRB along with re-casted accumulated depreciation and re-casted net block.

g) Details of additions to fixed assets (FA) [excluding Interest during construction (IDC)] from 09-10 to 13-14, certified by the Chartered Accountant, duly reconciled with trial balances of DUPL and Mumbai Regional Network for the respective years.

h) Capital Work-in-Progress (CWIP) [excluding Interest during construction (IDC)] from 08-09 to 13-14, duly certified by the Chartered Accountant and reconciled with trial balances of DUPL and Mumbai Regional Network for the respective years.

i) Original CA certified copies of operating expenditure from 01.10.08-31.03.09 to FY 2013-14 duly reconciled with trial balances for the respective years.

j) Details of future capex from 14-15 onwards for Mumbai Regional Network along with supporting documents.

k) Soft copies of tariff model of Mumbai Regional Network with proper linkages is being forwarded vide email.

3.3. PNGRB vide its letter dated 25.07.2017 asked GAIL to submit updated tariff filing for Mumbai Regional Network upto FY 16-17. In response to this, GAIL vide letter dated 14.08.2017 requested for extension for a period of 15 days (up to 31.08.2017) for submission of final tariff. PNGRB vide its letter dated 16.08.2017 accepted the request.

3.4. GAIL vide letter dated 29.08.2017 submitted following documents:-

a) The tariff model, along with approved financial costs and other data for determination of updated final initial unit natural gas pipeline tariff proposal of Mumbai Regional Natural Gas Pipeline Network.

b) Copy of GAIL's letter dated 29.04.2015 and 09.07.2015.

c) Copy of Trial balance duly certified by CA for FY 14-15, 15-16 and 16-17.

d) Copy of certificate from site finance, certifying that trial balances submitted for financial year 2014-15 to 2016-17 by unit BA-3120 are the final trial balances which have been taken into consideration in the preparation of audited Balance Sheet of GAIL (India) Ltd.

e) CA certified copies of Gross Block, Accumulated Depreciation, Net Block, Net Addition/deletion to Gross Block, Net addition/deletion to CWIP and Operating Expenditures of Mumbai unit (BA 3120) for the FY 14-15, 15-16 and 16-17 in respect of the Mumbai Regional Network were provided.

f) CA certified for allocation of Corporate Common Capex and Opex for FY 14-15 and 15-16 has been forwarded to PNGRB vide email date 27.07.2017. Copy of CA certificate for allocation of corporate common capex and opex for FY 16-17 is placed.

g) Supporting documents consist of copies of letter of acceptance, letter of indent, budgetary quotations, purchase order and write up etc. in respect of future capex.

h) List of customers

i) Soft copy of tariff model is being sent through email.

3.5. GAIL in its submission has submitted the following tariff:

Final tariff submitted by GAIL as per letter dated 11.08.2017 in its tariff filing (tariff model in excel sheet)

Financial Year	**Uran-Thal Usar Rs./MMBTU (GCV basis)**	**Trombay RCF Rs./MMBTU (GCV basis)**
20.11.2008 to 2017-18	3.49	1.04
2018-19 onwards	59.82	79.63

4. Details of tariff filing submitted by GAIL

The various aspects of final tariff filing submitted by GAIL are as follows:

4.1. **Economic Life of Pipeline**

Trombay RCF and Uran-Thal-Usar (UTU) natural gas pipelines were transferred from ONGC to GAIL in 1992. Accordingly, economic life for Trombay RCF and UTU have been considered for the 25 years i.e. upto March 29, 2017 and May 26, 2017 respectively, from the date of transfer. GAIL has applied for the extension of Mumbai Regional pipeline, however, the same is under consideration of the Board. GAIL in its tariff submission has submitted tariff for 35 years from the date of transfer mentioned above, thereby submitting tariff upto March 29, 2027 and May 26, 2027.

4.2. **Trial Balance**

GAIL in support of its tariff submission for Mumbai Regional Pipelines has submitted trial balance of 3120-Mumbai business area. On analyzing the trial balance it is found that total of Gross block and CWIP for FY 11-12 and 12-13 pertaining to Mumbai Regional and other pipelines are not matching with the CA certificates. However, differences in both the years are compensating each other. A clarification, duly supported by CA certificate/audited trial balance shall be obtained during processing of tariff.

4.3. **Capital Expenditure (Capex)**

GAIL, in its tariff submission, has considered total capex outgo of Rs. 80.83 Cr (including freehold land and ROU) in case of UTU sub network from 30.09.2008 till the FY 2027-28 and Rs.79.88 Cr (including freehold land and ROU) in case of Trombay RCF sub network from 30.09.2008 till the FY 2026-27. The head-wise breakup is as follows:

a) For Uran-Thal-Usar (UTU)

Particulars	(Rs. in Cr)
Net block as on 30.09.2008	35.54
CWIP as on 30.09.2008	0.00
Net block of Common Corporate asset allocated as on 30.09.08	2.19
Actual capex outgo from 01.10.2008 to FY 16-17	(1.11)
Common corporate assets allocated from 01.10.08 to FY 16-17	5.83
Future capex outgo projections from FY 17-18 to 27-28	38.38
Total	**80.83**

b) For Trombay RCF

Particulars	(Rs. in Cr)
Net block as on 30.09.2008	33.80
CWIP as on 30.09.2008	0.00
Net block of Common Corporate asset allocated as on 30.09.08	2.12
Actual capex outgo from 01.10.2008 to FY 16-17	24.77
Common corporate assets allocated from 01.10.08 to FY 16-17	8.89
Future capex outgo projections from FY 17-18 to 26-27	10.30
Total	**79.88**

a) <u>Net Block (NB) / Net Fixed Assets (NFA) as on 30.09.2008</u>

NFA as on 30.09.2008 as per tariff filing and CA certificates submitted by GAIL is as follows:

(Rs. in Cr)

Pipeline	Tariff Filing	CA Certificate
Uran-Thal-Usar	35.54	21.70
Trombay RCF	33.80	28.66

GAIL in its tariff filing has recalculated NFA considering depreciation rate of 3.17% on pipelines and related assets since inception of the pipeline. However in books of accounts GAIL has considered depreciation of 3.17% from 01.04.2005 onwards as per the approval of Ministry of Company Affairs. This rate of depreciation has been approved by Ministry of Company Affairs for Oil and Gas pipelines vide letter dated 31.08.2005 to be effective from 01.04.2005 whereas in its tariff filing GAIL has recalculated NFA considering 3.17% depreciation since inception of the pipeline.

b) Actual capex outgo from 01.10.2008 to FY 2016-17

GAIL, in its tariff filing, has claimed total actual capex outgo (including CWIP, Land & ROU) of Rs. (1.11) Cr for its UTU sub network and Rs. 24.77 Cr for Trombay RCF sub network.

Year-wise breakup of capex claimed in tariff filing and that certified in CA certificates submitted by GAIL is as follows:

(Rs. in Cr)

	UTU		**TROMBAY RCF**	
Year	**Tariff Filing**	**CA Certificate**	**Tariff Filing**	**CA Certificate**
01.10.08-31.03.09	0.06	0.06	0.50	0.50
2009-10	2.84	2.84	3.06	3.06
2010-11	(11.85)	(11.85)	(9.59)	(9.59)
2011-12	(0.61)	(0.61)	(1.19)	(1.19)
2012-13	4.59	4.59	1.11	1.11
2013-14	13.92	13.92	7.97	7.97
2014-15	5.84	5.84	3.64	3.64
2015-16	30.99	30.99	23.67	23.67
2016-17	(46.88)	(46.88)	(4.40)	(4.40)
Total	**(1.11)**	**(1.11)**	**24.77**	**24.77**

It is also observed that Interest During Construction (IDC) is nil for all years in the CA certificates.

c) Future Capex Outgo from FY 17-18 to FY 32-33

GAIL, in its tariff filing, has claimed total future capex outgo as O&M capex of Rs.38.38 Cr (without escalation of Rs.28.91 Cr) for UTU sub network and Rs.10.30 Cr (without escalation of Rs. 8.88 Cr) for Trombay RCF sub network.

To support these claims, GAIL has submitted year wise future expenditure projection upto FY 2027-28 in case of UTU sub network and upto FY 2026-27 in case of Trombay RCF sub network. The figures are escalated at 4.86% p.a. from FY 17-18 onwards. GAIL has submitted the future expenditure under various heads i.e. civil, electrical, instrumentation and mechanical. Year wise future expenditure (with escalation) submitted by GAIL in its submissions dated 29.08.2017 are as follows:

Rs. in Cr

Year	UTU Pipeline	Trombay RCF
2017-18	1.26	0.16
2018-19	4.18	7.51
2019-20	2.58	0.30
2020-21	4.84	-
2021-22	5.39	0.19
2022-23	2.74	0.59
2023-24	3.74	0.44
2024-25	3.40	0.40
2025-26	3.16	0.37

2026-27	2.88	0.34
2027-28	4.22	-
Total	**38.38**	**10.30**

d) <u>Common corporate assets as on 30.09.08 and from 01.10.08 to FY 16-17</u>

GAIL, in its tariff filing, has claimed Net block of Common Corporate asset of Rs. 2.19 Cr for UTU sub network and Rs. 2.12 for Trombay RCF as on 30.09.08. Common corporate assets from 01.10.08 to FY 16-17 claimed by GAIL for its UTU sub network of Mumbai regional pipeline is Rs. 5.83 Cr and for Trombay-RCF sub network Rs.8.89 Cr. No future common corporate asset has been claimed by GAIL in its tariff filing. Year wise common corporate asset allocated to the UTU sub network and for Trombay RCF sub network of Mumbai Regional Pipeline are as follows:

a) For UTU sub network:

Rs. in Cr

Year	**Additions to capex Claimed**	**CA certificate for capex as on**	**Addition to CAPEX**
30-09-2008		3.75	
31-03-2009	(0.01)	3.74	(0.01)
2009-2010	0.65	4.39	0.65
2010-2011	(0.62)	3.76	(0.63)
2011-2012	2.95	6.71	2.95
2012-2013	0.71	7.43	0.72
2013-2014	0.80	8.22	0.79
2014-2015	2.18	10.41	2.19
2015-2016	0.09	10.49	0.08
2016-17	(0.91)	9.58	(0.91)
TOTAL	**5.83**		**5.83**

b) For Trombay RCF sub network

Rs. in Cr

Year	Additions to capex Claimed	CA certificate for capex as on	Addition to CAPEX
30-09-2008		3.64	
31-03-2009	(0.01)	3.63	(0.01)
2009-2010	0.69	4.31	0.68
2010-2011	(0.53)	3.78	(0.53)
2011-2012	2.32	6.10	2.32
2012-2013	1.23	7.32	1.22
2013-2014	2.38	9.70	2.38
2014-2015	2.35	12.05	2.35
2015-2016	(0.07)	11.99	(0.06)
2016-17	0.55	12.53	0.54
TOTAL	**8.89**		**8.89**

With regards to mechanism for allocation of common corporate assets GAIL has stated that it has 8 offices/work centers and 11 zonal marketing offices providing services to whole company. There are many capital expenditure and operating expenditure incurred to build, maintain and operate these offices and bifurcated them among all business segments of the company on the basis of total gross block of respective business segments. Capex and Opex allocated to business segment i.e. NG Transmission is then allocated to all the pipelines including dedicated pipelines on the basis of actual throughput in that particular pipeline system in the corresponding previous year.

PNGRB in its letter dated 07.09.2015 sought clarifications on the allocation of corporate common expenses that GAIL had submitted on 23.06.2015. It was also observed that GAIL had included marketing related expenses in the common corporate expenditure and has allocated it to NG transmission business which is not in line with PNGRB Regulations. GAIL was asked: (a) rationale of allocation of the expenses to all business segments on the basis of gross block, (b) bifurcation of these expenses (excluding all marketing and finance related expenses) into direct and indirect expenses certified by CA, (c) reconciliation of indirect expenses (excluding all marketing and finance related expenses) with un-allocable expenses appearing in the business segment information in annual report of GAIL certified by CA.

GAIL vide its letter dated 18.09.2015, in its response to the clarifications sought by PNGRB reiterated the same rationale allocation for common corporate expenses and has not submitted the bifurcation into direct and indirect expenses and reconciliation of indirect expenses with un-allocable expenses. GAIL further stated that as corporate marketing department is providing services to Gas Transmission and all other business segments also, therefore all common expenses including marketing related expenses are allocated to all business segment.

4.4. **<u>Operating Expenses (Opex)</u>**

GAIL in its tariff submission has submitted CA Certificate for opex considered in tariff filing. GAIL has not considered certain items appearing in trial balance. Details of items not considered in tariff filing w.r.t. opex considered has not been submitted. Further, GAIL in its tariff submission has claimed total opex of Rs. 869.25 Cr. for UTU sub network and Rs. 1099.14 Cr for Trombay-RCF sub network. Head-wise breakup of opex considered by GAIL in its tariff submission for the entire economic life of the pipeline as follows:

UTU Sub Network

Particulars	(Rs. in Cr)
Actual opex outgo (01.10.2008 to 16-17)	132.54
Actual common corporate expenses (Nov'08 to FY 16-17)	108.08
Future opex projections (FY 17-18 to 27.05.2027)	406.27
Future O&M opex projections (FY 17-18 to 27.05.2027)	12.86
Future common corporate expenses (FY 17-18 to 27.05.2027)	209.50
Total	**869.25**

Trombay-RCF Sub Network

Particulars	(Rs. in Cr)
Actual opex outgo (01.10.2008 to 16-17)	151.96
Actual common corporate expenses (Nov'08 to FY 16-17)	117.76
Future opex projections (FY 17-18 to 29.03.2027)	560.48
Future O&M opex projections (FY 17-18 to 29.03.2027)	0.36
Future common corporate expenses (FY 17-18 to 29.03.2027)	268.58
Total	**1099.14**

a) Actual Opex Outgo from FY 2008-09 to FY 2016-17

In its tariff filing, GAIL has claimed actual opex of Rs.132.54 Cr for UTU sub network and Rs. 151.96 Cr for Trombay-RCF sub network from 01.10.2008 to FY 2016-17. GAIL's in its tariff model during calendar year 2017 i.e. 3 months from FY 16-17 and 9 months of FY 17-18, has considered 35% increase in salary and wages. Bifurcation Year-wise and sub network wise breakup of opex claimed (net of miscellaneous income) in tariff filing and that certified in CA certificates (net of miscellaneous income) submitted by GAIL are as follows:

UTU Sub Network

(Rs. in Cr)

Financial Year	Tariff Filing	CA Certificates
2008-09 (01.10.2008 to 31.03.2009)	7.64	7.64

2009-10	13.41	13.41
2010-11	8.80	8.80
2011-12	7.53	7.53
2012-13	8.66	8.66
2013-14	12.05	12.05
2014-15	26.14	26.14
2015-16	20.16	20.16
2016-17	28.16	27.41
Total	**132.54**	**131.80**

Trombay-RCF Sub Network

(Rs. in Cr)

Financial Year	Tariff Filing	CA Certificates
2008-09 (01.10.2008 to 31.03.2009)	7.40	7.40
2009-10	13.19	13.19
2010-11	8.84	8.84
2011-12	6.84	6.84
2012-13	8.55	8.55
2013-14	14.22	14.22
2014-15	30.27	30.27
2015-16	23.02	23.02
2016-17	39.64	38.58
Total	**151.96**	**150.91**

b) Future opex projections from FY 2017-18 onwards

In its tariff filing, GAIL has claimed future opex of Rs. 419.13 Cr from FY 2017-18 to 27.05.2027 for its UTU sub network and Rs. 560.84 Cr for its Trombay-RCF sub network under different heads which are detailed below:

I. **Future Opex:** GAIL has claimed Rs. 406.27 Cr for its UTU sub network and Rs. 560.48 for its Trombay-RCF sub network under this head. Further on analyzing the GAIL's tariff model, it has been observed that GAIL during calendar year 2017 i.e. 3 months from FY 16-17 and 9 months of FY 17-18, has considered 35% increase in salary and wages. GAIL has also considered annual escalation at rate slightly higher to 4.86% from FY 17-18 onwards. Sub network wise and year wise future opex under this head considered by GAIL is as follows:

Year	UTU sub network (Rs.in Cr)	Trombay-RCF sub network (Rs.in Cr)
2017-2018	31.88	44.88
2018-2019	33.43	47.06
2019-2020	35.05	49.35
2020-2021	36.76	51.75
2021-2022	38.55	54.26
2022-2023	40.42	56.90
2023-2024	42.39	59.67
2024-2025	44.45	62.57
2025-2026	46.61	65.61
2026-2027	48.88	68.43
2027-2028	7.86	-
TOTAL	**406.27**	**560.48**

II. Future O&M opex:- GAIL in its submission has claimed of Rs. 12.86 Cr for UTU sub network and Rs. 0.36 Cr as future O&M opex. Sub network wise and year wise future O&M opex claimed by GAIL in its submission are as follows:

Year	UTU Sub network (Rs.in Cr)	Trombay-RCF Sub network (Rs.in Cr)
2017-2018	1.77	0.01
2018-2019	2.74	0.01
2019-2020	1.08	0.07

2020-2021	0.93	0.04
2021-2022	0.74	0.02
2022-2023	0.77	0.03
2023-2024	1.01	0.10
2024-2025	1.20	0.05
2025-2026	1.04	0.03
2026-2027	1.13	-
2027-2028	0.45	-
TOTAL	**12.86**	**0.36**

c) <u>Actual common corporate expenses from FY 2008-09 to FY 2016-17</u>

Actual corporate expenses claimed by GAIL during this period in its tariff filing for UTU sub network is Rs.108.08 Cr and for Trombay-RCF sub network is Rs. 117.76 Cr. Sub network wise and year-wise breakup of expenses claimed in tariff filing and that certified in CA certificates submitted by GAIL is tabulated in table below. GAIL has submitted two CA certificates on the bifurcation of common corporate expenses amongst all natural gas pipelines for period from Nov 09 to FY 13-14. However, the figures in these two CA certificates do not reconcile. For the remaining period i.e. from FY 14-15 to 16-17 figures considered in tariff filing and CA certificate are matching.

UTU sub network

Rs. in Cr

Financial Year	**Tariff Filing**	**CA Certificate Dated 18.06.2015**	**CA Certificate dated 16.09.2015**
Nov’09-March’09	3.74	3.89	3.74
2009-10	12.66	12.96	12.66
2010-11	11.76	11.88	11.76
2011-12	8.11	7.54	8.11

2012-13	16.19	11.17	16.19
2013-14	11.89	11.60	11.89
TOTAL	**64.35**	**59.05**	**64.35**

Rs. in Cr

Financial Year	Tariff Filing	CA Certificate
2014-15	14.50	14.50
2015-16	15.15	15.15
2016-17	14.08	13.55
TOTAL	**43.73**	**43.20**

Trombay-RCF sub network

Rs. in Cr

Financial Year	Tariff Filing	CA Certificate Dated 18.06.2015	CA Certificate dated 16.09.2015
Nov'09-March'09	3.63	3.78	3.63
2009-10	12.45	12.75	12.45
2010-11	11.81	11.93	11.81
2011-12	7.37	6.85	7.37
2012-13	15.97	11.02	15.97
2013-14	14.02	13.69	14.02
TOTAL	**65.25**	**60.01**	**65.25**

Rs. in Cr

Financial Year	Tariff Filing	CA Certificate
2014-15	16.79	16.79
2015-16	17.30	17.30
2016-17	18.42	17.73
TOTAL	**52.51**	**51.81**

Rationale for allocation of the actual expenses: With regards to mechanism for allocation of common corporate expenses GAIL has stated that-GAIL has 8 offices/work centers and 11 zonal marketing offices providing services to whole company. There are many capital expenditure and operating expenditure incurred to build, maintain and operate these offices and bifurcated them among all business segments of the company on the basis of total gross block of respective business segments. Capex and Opex allocated to business segment i.e. NG Transmission is then allocated to all the pipelines including dedicated pipelines on the basis of actual throughput in that particular pipeline system in the corresponding previous year.

PNGRB in its letter dated 07.09.2015 sought clarifications on the allocation of corporate common expenses that GAIL had submitted on 23.06.2015. It was also observed that GAIL had included marketing related expenses in the common corporate expenditure and has allocated it to NG transmission business which is not in line with PNGRB Regulations. GAIL was asked: (a) rationale of allocation of the expenses to all business segments on the basis of gross block, (b) bifurcation of these expenses (excluding all marketing and finance related expenses) into direct and indirect expenses certified by CA, (c) reconciliation of indirect expenses (excluding all marketing and finance related expenses) with un-allocable expenses appearing in the business segment information in annual report of GAIL certified by CA.

GAIL vide its letter dated 18.09.2015, in its response to the clarifications sought by PNGRB reiterated the same rationale allocation for common corporate expenses and has not submitted the bifurcation into direct and indirect expenses and reconciliation of indirect expenses with un-allocable expenses. GAIL further stated that as corporate marketing department is providing services to Gas Transmission and all other business segments also, therefore all common expenses including marketing related expenses are allocated to all business segment.

d) Future common corporate expenses from FY2017-18 onwards

In addition to the above, GAIL has also claimed future common corporate expenses of Rs. 209.50 Cr for its UTU sub network and Rs.268.58 for its Trombay-RCF sub network. Further on analyzing the GAIL's tariff model, it has been observed that GAIL during calendar year 2017 i.e. 3 months from FY 16-17 and 9 months of FY 17-18, has considered 35% increase in salary and wages. In the tariff filing, expenses claimed in each year are calculated by escalating previous year expenses at rate slightly higher to 4.86% p.a. from FY 17-18 onwards. Sub network wise and year wise future opex under this head considered by GAIL is as follows:

Year	**UTU Sub Network (Rs.in Cr)**	**Trombay-RCF Sub Network (Rs.in Cr)**
2017-2018	16.44	21.51
2018-2019	17.24	22.55
2019-2020	18.08	23.65
2020-2021	18.95	24.80
2021-2022	19.88	26.00
2022-2023	20.84	27.27
2023-2024	21.86	28.59
2024-2025	22.92	29.98
2025-2026	24.03	31.44
2026-2027	25.20	32.79
2027-2028	4.05	-
TOTAL	**209.50**	**268.58**

4.5. Unaccounted Gas Loss

GAIL has considered 0.30% of the throughput as unaccounted gas loss, as a cost to be recovered through the transportation tariff. Amount claimed by

GAIL towards unaccounted gas loss is Rs.186.22 Cr for UTU sub network and Rs.197.73 Cr for Trombay-RCF sub network. Further GAIL has submitted year wise CA Certificate for gas expenditure/unaccounted gas data from Q4 2008-09 till 16-17. Sub network wise and year wise amount as per CA certificate are as follows:

(Rs. in Cr)

Financial Year	UTU Sub Network	Trombay-RCF Sub Network
4th Quarter 2008-09	0.27	0.26
2009-10	4.52	4.54
2010-11	7.04	6.39
2011-12	5.68	5.61
2012-13	-	-
2013-14	2.51	2.91
2014-15	1.29	1.62
2015-16	1.80	2.53
2016-17	34.61	28.91
Total	**57.72**	**52.77**

4.6. **Volume Divisor**

Year-wise volume divisor considered by GAIL in its tariff submission for its sub networks are as follows:

Financial Year	Volume (in MMSCMD) for UTU sub network	Volume (in MMSCMD) for Trombay-RCF sub network
2008-09	0.5901	1.3651
2009-10	1.2372	1.8947
2010-11	1.1138	1.8338
2011-12	3.1380	4.4292
2012-13	2.9070	3.7328
2013-14	3.2015	3.9480
2014-15	3.2130	3.6123
2015-16	2.8776	3.5505

2016-17	3.2532	3.2093
2017-18 to 2026-27	3.2532	3.2093
2027-28	3.2532	-

4.7. **Weighted Average Heat Value:**

As per Clause 6 of Schedule A of Tariff Regulations, the volume of natural gas determined as per the regulations shall be converted into its energy equivalence in MMBTU terms for the purpose of determination of final initial unit natural gas pipeline tariff by considering the weighted average heat value of natural gas delivered to customers during the initial unit natural gas pipeline tariff period. GAIL, in its tariff submission has submitted weighted average heat value on net basis and converted the Net heat value into Gross heat value by dividing Net heat value by 0.9.

4.8. **Working Capital**

In the tariff filing, GAIL has considered total working capital of Rs. 19.79 Cr for UTU sub network and Rs.21.44 Cr for Trombay-RCF sub network calculated as sum of 30 days of opex and 18 days of revenue, in conformity with the Tariff Regulations.

4.9. **Number of Working Days**

GAIL has considered 124.77 operating days in FY 2008-09, 345 operating days for all years from FY 2009-10 to FY 2026-27. For FY 2027-28 GAIL has considered 52.93 days in case of UTU sub network and for FY 2026-27 for Trombay-RCF sub network considered 343.11 days.

4.10. **Line Pack**

Line pack is the value of gas which always remains in the pipeline and as per regulations it is to be considered as cash outflow in the initial year and to be considered as cash inflow in the last year of the economic life of the pipeline. GAIL, in its tariff filing, has considered line pack of Rs. 0.62 Cr for UTU sub network and Rs. 0.19 Cr for Trombay-RCF sub network as cash outflow in FY 2008-09.

4.11. **Terminal Value**

Terminal Value is the sum of the residual value of the NFA, working capital and line pack and is cash inflow at the end of economic life of the pipeline. The terminal value submitted by GAIL in its tariff filing is Rs.63.41 Cr for UTU as on 26.05.2027 and Rs.65.46 Cr for Trombay RCF as on 29.03.2027.

4.12. **Return on Capital Employed**

As per Clause 2 of Schedule A of the Tariff Regulations, natural gas pipeline tariff shall be calculated based on the DCF methodology after considering the reasonable rate of return (i.e. “twelve percent post-tax” as per clause 3 to Schedule A) to be the projects internal rate of return.

The pre-tax rate of return on capital employed shall be computed by grossing-up twelve percent by the nominal rate of income tax applicable for corporate assesses. Rates of corporate income tax applicable each year to GAIL and subsequent computation of pre-tax rate of return (as submitted by GAIL) is as follows:

Financial Year	2008-09 & 2009-10	2010-11	2011-12 & 2012-13	2013-14 & 2014-15	2015-16 onwards
Income Tax Rate	33.99%	33.22%	32.45%	33.99%	34.61%
Pre-tax rate of return	18.18%	17.97%	17.76%	18.18%	18.35%

5. Views of stakeholders sought

5.1. Determination of the final initial unit natural gas pipeline tariff is a time bound exercise. PNGRB solicits the views in writing of stakeholders on GAIL's tariff filing for the Mumbai Regional Natural Gas Pipeline Network within 15 days of the issue of this document at the following address:

Secretary,
Petroleum and Natural Gas Regulatory Board,
1st Floor, World Trade Centre,
Babar Road, New Delhi 110001.

(Vandana Sharma)
Secretary
For and on behalf of the Board