NATURAL GAS TRANSMISSION AND LNG RE-GASIFICATION TARIFF

Unofficial Translation

<u>IMPORTANT NOTE</u>: The English translation is not binding. In the event of discrepancies between the Greek and English version, the Greek text prevails.

NATURAL GAS TRANSMISSION AND LNG RE-GASIFICATION TARIFF

Article 1

1. This decision establishes the tariffs for third party access to the National Natural Gas System, in accordance with the provisions of Article 24 of Law 3175/2003 (Government Gazette Issue No. A 207).

2. The following definitions apply to the implementation hereof:

   2.1. The terms National Natural Gas System (hereinafter "NNGS"), NNGS entry point, NNGS Operator (hereinafter "Operator"), National Natural Gas Transmission System (hereinafter Transmission System), LNG Facility on Revythoussa island (hereinafter LNG System), Distribution System, High Heating Value (HHV), and regular cubic meter shall have the meanings assigned to them under the provisions of Law 3428/2005 (Government Gazette Issue No. A 313).

   2.2. NNGS exit point shall mean all metering stations at the NNGS for supplying with natural gas individual consumers not connected to a Distribution Network or, in case of Distribution Network supply, all exit points at which natural gas is offtaken to supply such Distribution Network.

   2.3. NNGS User shall mean all parties entering into an agreement with the Operator to transmit natural gas over the NNGS from one or more entry points to one or more exit points, in order to meet their own or third party needs in natural gas. If the contract duration for the use of the Transmission System or the LNG Facility is equal or greater than three hundred and sixty five (365) days, the contract is considered a Long-Term Contract. If the contract duration for the use of the Transmission System or the LNG Facility is less than three hundred and sixty (365) five days, the contract is considered a Short-Term Contract.

   2.4. Shallow Connections shall mean all works for the connection of individual consumers with the NNGS and include the metering installations, the immediate upstream valve station, the part of the pipeline up to the next NNGS valve station, as well as any other installation and equipment which is necessary, according to the Operator, only for the connection of the consumer's facilities to the NNGS. A natural gas facility or a set of such facilities located within the same area, which are controlled or used by the same natural or legal entity, are considered to be an individual consumer. The remaining NNGS extension or reinforcement works,

which are necessary as a result of the connection and for the provision of Transmission services by the Operator to the Users in a safe and efficient manner, shall be called Deep Connections.

2.5. Natural gas year (hereinafter "Year") shall mean the time period commencing at 08:00 on January 1st of each calendar year and ends at 08:00 on January 1st of the following calendar year. More specifically, the first natural gas Year shall commence at 08:00 on July 1st, 2005 and end at 08:00 on January 1st, 2006. Natural gas day (hereinafter "Day") shall mean the time period commencing at 08:00 on one day and ending at 08:00 the next day.

2.6. The MWh (megawatt hour) of Higher Heating Value (HHV) is defined as the measuring unit of the natural gas quantity. The assumption is made herein that one thousand (1000) normal cubic meters of natural gas are equivalent in terms of calorific value to eleven point sixteen (11.16) MWh HHV. The foregoing equivalence may be modified if the natural gas' average HHV transported through the NNGS changes, following the Operator's proposal and RAE's approval.

3. For natural gas transmission services and for the use of the LNG terminal station, in respect to reception, temporary storage, regasification and injection of LNG into the Transmission System, users shall pay a consideration on the one hand for using the Transmission System according to the published natural gas transmission tariff (hereinafter "Transmission Tariff"), and on the other hand for using the LNG System according to the published tariff (hereinafter "LNG Tariff"). The use of part of the LNG terminal station facilities which provides exclusively natural gas storage services (hereinafter "LNG Storage") shall be subject to a separate LNG Storage Tariff, not established hereby.

4. Each NNGS User who, for the purpose of meeting the natural gas needs it serves, wishes to use both the Transmission System and the LNG System, shall be required to enter with the Operator into a separate contract for the transmission of natural gas over the Transmission System which shall be subject to the Transmission Tariff, and a separate contract for using the LNG System, which shall be subject to the LNG Tariff.

5. The Transmission Tariff shall be the same throughout Greece and shall not depend on the distance over which natural gas shall be transmitted.

6. Subject to paragraph 15, the Transmission Tariff includes a charge for the transmission capacity reserved by the User each Year, and a charge for the natural gas quantity transmitted each Year on the User's behalf. In the context of the contract for the transmission of natural gas entered into by and between the User and the Operator, the User shall state the transmission capacity it reserves each Year, as well as the entry points where it shall inject natural gas to the Transmission System and the exit points

from which it shall offtake natural gas. Notwithstanding paragraph 14 below, Annual Transmission Capacity (hereinafter “TC”) shall mean the maximum natural gas quantity the Operator is committed under the relevant contract to transmit Daily on the User's behalf for the given Year to all stated exit points. Annual natural gas quantity transmitted on the User's account (hereinafter “TQ”) shall mean the natural gas quantity transmitted each Year on the User's behalf at the stated exit points, as such quantity is measured at the metering stations at each of the stated exit points. Actual Annual Transmission Capacity (hereinafter “ATC”) shall mean the maximum natural gas quantity which the Operator transmitted daily on the User's behalf for the given Year, as such quantity is measured at all metering stations of the stated exit points.

7. Subject to paragraph 15, the LNG Tariff includes a charge for the LNG System capacity reserved by the User each Year, and a charge for the liquefied natural gas quantity gasified and transmitted each Year on the User's behalf. In the context of the contract for the use of the LNG System entered into by and between the User and the Operator, the User shall state the LNG System capacity it reserves each Year. Annual LNG System Capacity (hereinafter “LC”) shall mean the maximum natural gas quantity the Operator is commited to re-gasify and transmit Daily on the User's behalf in the given Year, from the entry point that corresponds to the LNG System. Annual natural gas quantity gasified and transmitted on the User's account (hereinafter “LQ”) shall mean the natural gas quantity gasified and transmitted each Year on the User's behalf, as such quantity is measured at the metering station of the entry point corresponding to the LNG System. Actual Annual Transmission Capacity of the LNG System (hereinafter “ALC”) shall mean the maximum natural gas quantity which the Operator gasified and transmitted daily on the User's behalf for such Year, as such quantity is measured at the metering station of the entry point that corresponds to the LNG System.

8. In case of Long-term Contracts, the Annual User Charge for natural gas transmission (hereinafter “TRch") shall be calculated on the basis of the Transmission Tariff as follows:

TRch = TCC x TC + TQC x TQ

TRch shall be calculated in € per Year, the TCC coefficient in € per MWh of the Peak Day each Year, TC in MWh at the Peak day, TQC in € per MWh and TQ in MWh per Year. The first part of the tariff, namely TCC x TC corresponds to the Transmission System capacity charge, which depends on reserved capacity and the capacity realized by the User, in accordance with the provisions of paragraphs 10 to 12 hereof. The second part of the tariff, namely TQC x TQ corresponds to the Transmission System commodity charge, which depends on the natural gas quantity transmitted on the User’s behalf.

The TCE and TQC coefficients (at nominal values) are set as follows:

Transmission tariff	TCC (€/MWh of the Peak Day /Year)	TQC (€/MWh)
Year 1.1.2006-31.12.2006	693.285	0.341087
Year 1.1.2007-31.12.2007	625.589	0.307781
Year 1.1.2008-31.12.2008	541.121	0.266224
Future years	CPI Adjustment	

If the start or the end dates of the Long-term Contract are different than the first or last day of a given Year, the following shall apply:

a) The TCC coefficient corresponding to this Year shall be applied after having been adjusted proportionally to such part of the Year in which the contract was in force, calculated in days.

b) User's transmission charge shall be calculated separately for the sections of the contractual duration before and after the change of the Year.

c) For the implementation of paragraphs 10, 11, 12, and 14, the values of TC, TCe, ATC, TQ, accordingly, are determined with regard to the sections of the contractual duration before and after the change of the Year. The provision of the previous subparagraph does not stand for the application of the formulas set forth in paragraphs 25.2.2 and 25.3.1 of this article.

If during the Year the User changes, under the provisions of the NNGS Code of Operations (Government Gazette Issue No. B' 379/01.04.2010, hereinafter "Network Code"), the transmission capacity he reserves for any customer category in accordance with paragraphs 6, 14 and 25 hereof, the following shall apply:

a) The User's transmission charge for the respective customer category shall be calculated separately for each part of the Year prior to and after such change in the reserved transmission capacity took place, calculated in days.

b) The TCC that corresponds to the specific Year shall be applied to each part of the Year adjusted pro rata to such part of the Year, calculated according to the number of days.

c) For the implementation of paragraphs 10, 11, 12, and 14, the values of TC, TCe, ATC, TQ, accordingly, are determined with regard to the sections of the contractual duration before and after the change.

9. In case of Long-term Contracts, the Annual User Charge for natural gas re-gasification and transmission (hereinafter "LNGch") shall be calculated on the basis of the LNG Tariff as follows:

LNGch = LCC x LC + LQC x LQ

LNGch shall be calculated in € per Year, the LCC coefficient in € per MWh of the Peak Day each Year, LC in MWh at the Peak day, LQC in € per MWh and LQ in MWh per Year. The first part of the tariff, namely LCC x LC corresponds to the LNG System capacity charge, which depends on reserved capacity and the capacity realized by the User, in accordance with the provisions of paragraphs 10 to 12 hereof. The second part of the tariff, namely LQC x LQ corresponds to the LNG System commodity charge which depends on the natural gas quantity re-gasified and transmitted on the User's behalf.

The LCC and LQC coefficients (at nominal values) are established as follows:

LNG Tariff	LCC (€/MWh of the Peak Day /Year)	LQC (€/MWh)
Year 1.1.2006-31.12.2006	29.088	0.021947
Year 1.1.2007-31.12.2007	26.247	0.019804
Year 1.1.2008-31.12.2008	22.703	0.017130
Future years	CPI Adjustment	

If the start or the end dates of the Long-term Contract are different than the first or last day of a given Year, the following shall apply:

a) The LCC coefficient corresponding to this Year shall be applied after having been adjusted proportionally to such part of the Year in which the contract was in force, calculated in days.

b) User's re-gasification charge shall be calculated separately for the sections of the contractual duration before and after the change of the Year.

c) For the implementation of paragraphs 10, 11, 12 the values of LC, ALC, LQ are determined with regard to the sections of the contractual duration before and after the change of the Year.

If during the Year the User changes, under the provisions of the Network Code, the re-gasification capacity he reserves, the following shall apply:

a) User's re-gasification charge shall be calculated separately for each part of the Year prior to and after such change in the reserved transmission capacity took place.

b) The LCC that corresponds to the specific Year shall be applied to each part of the Year adjusted pro rata to such part of the Year, calculated according to the number of days.

c) For the implementation of paragraphs 10, 11, 12 the values of LC, ALC, LQ are determined with regard to the sections of the contractual duration before and after the change.

10. The following are calculated Yearly for each User:

10.1. The deviation of the Annual actual transmission capacity from the Annual transmission capacity (hereinafter "DTC") as the difference: DTC = ATC – TC.

10.2. The deviation of the actual Annual LNG System capacity from the Annual LNG System capacity (hereinafter "DLC") as the difference: DLC = ALC – LC.

11. If such deviations as a percentage of the reserved capacity fall within the tolerance levels (hereinafter "TTL" and "LTL" for the Transmission System and the LNG System respectively) determined below, then capacity charges are calculated on the basis of actual capacities. In such case, Annual charges for each User are calculated as follows:

TRch = TCC x ATC + TQC x TQ for the Transmission System; and

LNGch = LCC x ALC + LQC x LQ for the LNG System.

Tolerance levels are established as follows:

	Tolerance Levels: DTC/TC (%)	Tolerance Levels: DLC/LC(%)
Year 1.1.2006-31.12.2006	±15	±15
Year 1.1.2007-31.12.2007	±10	±10
Year 1.1.2008-31.12.2008	±8	±8
Future years	±5	±5

12. If the deviations as a percentage of the Annual transmission capacity and the Annual LNG capacity are beyond the foregoing tolerance levels, an additional charge shall be imposed upon the User for the capacity part of the Transmission Tariff and the LNG Tariff respectively. In such case, overall charges are calculated as follows:

TRch= TCC x ATC x [1 + Abs(DTC)/TC – Abs(TTL)]^EFT + TQC x TQ
LNGch = LCC x ALC x [1 + Abs(DLC)/LC – Abs(LTL)]^EFL + LQC x LQ
Where Abs() is the absolute value of the expression in brackets and [ ]^n is the n^{th} power of the expression in square brackets.
EFT and EFL are considered equal to 1.20 in case of a positive deviation, and to 1.00 in case of negative deviation.
If the deviation is negative, the capacity charge may not be under 75% of the Annual transmission capacity charge, namely under 75% of TCC x TC for the Transmission System and LCC x LC for the LNG System. If the deviation is negative, the additional charge for capacity may not exceed 75%, namely [1+Abs(DTC)/TC – Abs(TTL)]^EFT and [1+Abs(DLC)/LC –Abs(LTL)]^EFL may not exceed 1.75.

13. The Transmission Tariff which regards exclusively the supply of a new customer at a given exit point and during the first six calendar months of operation, including the

month in which the first delivery and offtake of natural gas took place (Trial Operation Period), shall include only a commodity charge according to the natural gas quantity which is allocated exclusively for such consumer to the respective User at the specific exit point. Depending on the date on which the consumer's Trial Operation Period begins, the charge (in nominal values) shall be calculated using the following table:

	(€/MWh)
Year 1.1.2006-31.12.2006	3.451675
Year 1.1.2007-31.12.2007	3.115002
Year 1.1.2008-31.12.2008	2.682874
Future years	CPI Adjustment

During the Year in which the Trial Operation Period ends and for the following Year, the tariffs described in paragraphs 8 to 12 shall apply and the tolerance levels for these two Years are set to ±15% and ±10% respectively. Especially for the Year in which the Trial Operation Period ends, TCC and LCC shall apply reduced proportionally to the remaining part of the Year (after the Trial Operation Period has ended).

After the end of the second Year, the tariffs shall apply normally.

14. If a User enters into an agreement with the Operator to also serve, among others, power generation units registered in the Dispatchable Generation Units Register of the Hellenic Electricity Transmission System Operator (hereinafter "HTSO") in accordance with the provisions of Article 4 of the Grid Operation and Power Exchange Code (Government Gazette Issue No. B 655/17.05.2005, hereinafter "Electricity Code"), which are not Peak Units in accordance with the definition of paragraph 25 of this article, the following shall apply:

    14.1. In the context of the natural gas transmission contract entered into by and between the User and the Operator, the User shall state separately the Annual transmission capacity it shall reserve to serve each generation unit and the transmission capacity which reserves to serve the remaining customers.

    For each generation unit served by the User:

    14.1.1. TCe shall mean the maximum natural gas quantity which the Operator undertakes under the relevant contract, to transmit Daily on the User's behalf during the Year at hand to the exit point corresponding to the generation unit concerned.

    14.1.2. TQe shall mean the total natural gas quantity transmitted each Year on behalf of the User to the exit point which corresponds to the concerned generation unit, as such quantity is measured at the metering station of such point.

14.2. For each power generation unit, TCe may not be under the value determined using the following formula:

TCe = NCAP x T x SFC x UC x CVC

Where:

NCAP: The Net Power of the Unit as it is defined in paragraph 1 of Article 217 of the Electricity Code and has been registered with the Dispatchable Generation Units Register kept by the HTSO, in MW of electric power.

T: The time of operation of the unit at the peak Day, taken as 24 hours.

SFC: The Special Fuel Consumption which corresponds to the maximum continuous capacity of the unit, as is declared in the Technical and Financial Information Statement in accordance with Article 44 of the Electricity Code in GJ per MWh of electric power generated.

UC: Unit conversion factor equal to 0.27778 MWh/GJ.

CVC: Conversion factor to MWh HHV of Natural Gas, equal to 1.11.

14.3. The Annual User charge for each generation unit separately [TRch(e)] shall be calculated as follows:

TRch(e) = TCC x TCe+ A + TQC x TQe

Where:

TCe, TQe: as defined in paragraph 14.1.

TCC, TQC: as defined in paragraph 8.

A: coefficient equal to 0.85.

14.4. Invoicing of the User for each unit shall be carried out as follows: (a) The Annual transmission capacity charge, namely TCC x TCe x A, shall be paid by the User in equal instalments for each month of the relevant contract concluded with the Operator for the given Year. (b) The commodity charge, namely TQC x TQe, shall be paid by the User on a monthly basis, according to the natural gas quantity transmitted during each month.

15. In case of a Short-term Contract for the use of the Transmission System or the LNG System, the User's capacity charge and commodity charge are calculated according to the formulas of the first subparagraph of paragraphs 8 and 9, accordingly, and in particular according to the provisions of this paragraph as follows:

15.1. For the calculation of the commodity charge of the System, the coefficients TQC and LQC of paragraphs 8 and 9 are applied accordingly.

15.2. Subject to subparagraph 15.3, for the calculation of the capacity charge of the System, the coefficients TCC and LCC of paragraphs 8 and 9 accordingly, shall be applied after they have been adjusted proportionally to the part of the Year in which the contract is in force, calculated in days, and multiplied by the factor B which corresponds to the total duration of the contract, according to the following table:

Total contract duration	Factor B
1 day to 90 days	2.30
91 days to 180 days	1.85
181 days to 364 days	1.60

15.3. In case of a Short-term Contract for the use of the Transmission System for the supply of power generation units which falls under the provisions of paragraph 14, which is concluded after a transmission capacity release for a given period of time according to the provisions of the Network Code, for the calculation of the capacity charge of the System the coefficient TCC is applied after it has been adjusted proportionally to the section of the Year in which the contract was in force, calculated in days, and is multiplied by the factor B corresponding to the contract for the use of the Transmission System from which the capacity release was made, with a 10% increment. If the contract for the use of the Transmission System from which the capacity release was made is a Long-term Contract, for the application of this paragraph the Long-term Contract shall have a factor B equal to one (1.00).

15.3.1. In case of a Short-term Contract for the use of the Transmission System, concluded after a transfer of capacity for a given time period according to the provisions of the Network Code, and when the change of the Reserved Transmission Capacity of the Transferee User is at least equal with the change of the Reserved Transmission Capacity of the Transferor User for the specific capacity transfer, for the calculation of the capacity charge of the Transmission System, the coefficient TCC is applied after it has been adjusted proportionally to the section of the Year in which the contract was in force, calculated in days, and is multiplied by the factor B which corresponding to the contract for the use of the Transmission System from which the capacity transfer was made, with a 10% increment. If the contract for the use of the Transmission System from which the capacity transfer was made is a Long-term Contract, for the application of this paragraph the Long-term Contract shall have a factor B equal to one (1.00). For the contracts for the use of Transmission System of this paragraph the factor B is increasing multiplied by the factor C as follows:

Total contract duration	Factor C
1 day to 90 days	1.44
91 days to 180 days	1.25
181 days to 364 days	1.15

15.3.2. In case of a Short-term Contract for the use of the Transmission System or the LNG System, concluded after a capacity release or transfer according to the provisions of the Network Code, and doesn't fall under the cases of paragraphs 15.3 and 15.3.1 hereof, the relevant charges are made according to paragraph 15.2.

15.4. For the calculation of capacity charge under paragraphs 10, 11, 12 and 14 the values of TC, TCe, ATC, TQ or LC, ALC, LQ, accordingly, are determined with regard to the total duration of the contract.

15.5. If the contract duration covers time periods in two subsequent Years, the following shall apply:

a) User's charge is calculated separately for the different sections of the contract duration before and after the change of the Year, calculated in days.

b) For the implementation of paragraphs 10, 11, 12 and 14 the values of TC, TCe, ATC and TQ, and LC, ALC, LQ, accordingly, are determined with regard to the sections of the contractual duration before and after the change the change of the Year, calculated in days.

15.6. If during the contractual period the User changes, according to the provisions of the Network Code, the value of the reserved capacity, the following shall apply:

a) User's charge is calculated separately for the different sections of the contract duration before and after the change of the reserved capacity value.

b) For the implementation of paragraphs 10, 11 and 12 the values of ATC or ALC, accordingly, are determined with regard to the total duration of the contract.

15.7. For the invoicing of the use of the System, the following shall apply:

a) The capacity charge is calculated for each month according to the number of days in which the contract was in force.

b) The commodity charge is calculated for each month.

The invoices issued by the Operator shall indicate following charges separately:

a) the transmission charge for each power generation unit which falls under the provisions of paragraph 14,

b) the transmission charge for each Peak Unit which falls under the provisions of paragraph 25,

c) the transmission charge for the rest of the customers served by the User, and

d) the charge for the LNG System use. The total charge of the User is the sum of all the above charges.

15.8. In case of a Short-term Contract for the use of the Transmission System for the supply of power generation units of open cycle gas turbine technology with the capability to operate on alternative fuel (Peak Units) which keep such fuel reserves, the provisions of paragraph 25 do not apply.

16. Subject to the provisions of paragraph 15.7, invoicing of the NNGS use shall be calculated as follows:

16.1. In case of power generation units and Peak Units, the provisions of paragraphs 14 and 25 hereof respectively shall apply.

16.2. With regard to the remaining consumers served by the User, invoicing for the Transmission System use shall be carried out as follows: (a) The Annual transmission capacity charge based on reserved capacity, namely TCC x TC, shall be paid by the User in equal instalments for each month of the relevant contract concluded with the Operator for the given Year. (b) The commodity charge shall be paid by the User on a monthly basis according to the natural gas quantity transmitted during each month.

16.3. Invoicing for the LNG System use shall be carried out as follows: (a) The Annual LNG capacity charge based on reserved capacity, namely LCC x LC, shall be paid by the User in equal instalments for each month of the relevant contract concluded with the Operator for the given Year. (b) The commodity charge shall be paid by the User on a monthly basis according to the natural gas quantity gasified and transmitted during each month.

16.4. The invoices issued by the Operator for the specific User shall indicate the following charges separately: (a) the transmission charge for each generation unit that falls under the provisions of paragraph 14; (b) the transmission charge for each Peak Unit in accordance with the provisions of paragraph 25; (c) the transmission charge for the remaining consumers served by the User; and (d) the charge for the LNG System use. The overall charge to the User shall be the sum of all above charges.

17.

17.1. Shallow Connections shall be constructed by the Operator, while the relevant cost of the metering and regulation installations, as well as the upstream pipeline of the new exit point which is constructed and up to a length of two (2) kilometres, up to the limit of € 5 million adjusted to CPI index from 2011, shall be paid by those consumers that apply for the connection. After the completion of the construction works, the Shallow Connection becomes the property of the Operator and an integral part of the NNGS. If the upstream pipeline of the constructed new exit point is part of another project, in order to determine the construction cost for the two (2) km pipeline, the pro-rata rule is applied on all cost elements according to the length of the pipeline. The cost of Deep Connections, as well as the cost of Shallow Connections which are constructed if the Operator and RAE both agree, and beyond the construction cost of the two (2) km pipeline from the constructed new exit point or the € 5 million limit, as adjusted by the CPI index from 2011, shall be paid by the Operator and become part of the NNGS RAB. Special NNGS investments that do not fall under the foregoing cases shall be recovered by means of special charges agreed upon by the interested parties.

17.2. If the Shallow Connection concerns the supply of more than one (1) power generation facilities which can operate independently, the installation of a different meter for each facility is required.

17.3. If the Shallow Connection concerns the supply of power generation facilities, as well as of facilities other than power generation, the installation of a different meter for each power generation facility and a separate meter for the rest of the facilities are required.

18. The tariff coefficients under paragraphs 8, 9 and 13 have been calculated based on the assumptions regarding the annual CPI change (consumer price index as published each calendar year by the National Statistical Service of Greece - NSSG) as included in Annex A.

19. Before 01/01/2007 and 01/01/2008 the average change of the consumer price index is calculated for the previous Year, according to the data published by the NSSG, and if there is a positive or negative deviation from the annual CPI included in Annex A, the tariff coefficients under paragraphs 8, 9 and 13 are adjusted accordingly. From the Year 01/01/2009 - 31/12/2009 all tariff coefficients shall be adjusted to the consumer price index on an Annual basis.

20. From the percentage which represents the annual CPI change it is possible to subtract a percentage value, as this is established by RAE separately for the

Transmission System and the LNG System, in order to provide an incentive for the improvement of the Operator's productivity. Such incentive shall be established at the latest one Year prior to its application and shall apply over a 3-year period. The amount corresponding to the productivity incentive may not be over 40% of the annual CPI change. The productivity incentive may not be applied prior to the Year 01/01/2009 - 31/12/2009.

21. The methodology and assumptions set forth in Annex A hereof, have been used for the calculation of the Transmission and LNG Tariffs.

22. A general review of the tariffs and other arrangements hereunder shall take place in the year 2010, and such review shall take effect as from 01/01/2011, at which time all assumptions and the methodology used to determine and review tariffs shall be revised.

23. During the tariff review under paragraph 22, the implementation of this Decision regarding in particular the deviation between the forecasted and the actual revenues of NNGS' Operator in the previous Years will be examined, taking also into account the progress of the Operator's investment plan.

24. Paragraph 14 of this article shall be repealed when there is no User serving power generation units the consumption of which exceeds 75% of the overall natural gas quantity consumed in Greece in the previous Year for the purpose of power generation.

25. If a User serves, among others, open cycle turbine power generation units with the capability to operate on alternative fuel and keep such fuel reserves (Peak Units), the following shall apply:

    25.1. In the context of the natural gas transmission contract entered into by and between the User and the Operator, the User shall state separately the Annual transmission capacity it shall reserve to serve each Peak Unit and the transmission capacity which it reserves to serve its remaining customers.

    For each Peak Unit served by the User:

    25.1.1. TC shall mean the maximum natural gas quantity which the Operator undertakes, under the relevant contract, to transmit Daily on the User's behalf during the Year at hand to the exit point corresponding to the unit concerned.

    25.1.2. TQ shall mean the overall natural gas quantity transmitted each Year on behalf of the User to the exit point which corresponds to the concerned unit, as such quantity is measured at the metering station of such point.

25.1.3. ATC shall mean the maximum natural gas quantity transmitted daily by the Operator on behalf of the User in the given Year, as such quantity is measured at the metering station of the exit point corresponding to such unit.

25.2. User charge for each Peak Unit shall be calculated as follows:

25.2.1. The Annual charge to the User for each Peak Unit shall be calculated separately, in accordance with paragraphs 8, 10, 11 and 12 based on the values of TC, TQ and ATC as these are defined in paragraph 25.1 above.

25.2.2. The Annual charge for each Peak Unit may not exceed the charge as this is calculated using the following formula:

$$\left(\frac{\mathrm{TCC}}{\mathrm{X}} + TQC\right) \cdot \mathrm{T}Q \text{ (€/year)}$$

Where:

TCE: The coefficient applicable for each Year, as defined in paragraph 8 hereof.

TQE: The coefficient applicable for each Year, as defined in paragraph 8 hereof.

X: A Coefficient equal to 47.45 MWh/MWh Peak day/Year.

TQ: The variable defined in paragraph 25.1.2.

25.3. Invoicing of the User for each Peak Unit shall be carried out as follows:

25.3.1. For each month of the given Year to which the respective contract with the Operator concerns, the User shall pay to the Operator for each Peak Unit it serves the following amount:

$$\left(\frac{\mathrm{TCC}}{\mathrm{X}} + \mathrm{T}QC\right) \cdot \mathrm{T}Q\mathrm{m} \text{ (€/month)}$$

Where:

TCC, TQC and X: The coefficients defined in paragraph 25.2.2 above.

TQm: The natural gas quantity transmitted during the month to the Peak Unit Exit Point.

25.3.2. Within one (1) month from the end of the Year, the Annual User charge shall be calculated for each Peak Unit in accordance with point 25.2 and a settlement shall be made for the sums already paid by the User during the Year in accordance with point 25.3.1.

26. In case of Short-term Contracts, the settlement shall be made at the end of these Contracts. In the case of Long-term Contracts the settlement shall be made in the following cases: (a) At the end of each Year, if the Contract duration is extended to the following Year. (b) At the end of the Contract.

Article 2

1. This decision, including Annex A hereto, which forms an integral part hereof is rendered enforceable upon its publication in the Government Gazette.
2. This decision shall be published in the Government Gazette.

The Minister of Development

APPENDIX A
METHODOLOGY AND MAIN ASSUMPTIONS USED FOR TARIFF CALCULATION

1. Natural Gas Demand

Table 1 lists the anticipated total natural gas demand and the anticipated LNG demand for the period 2006-2016, which are used to calculate the Transmission Tariff and the LNG Tariff respectively. The demand parameters used are gas quantity and Annual capacity (maximum daily supply capacity).

Table 1 Forecasted Natural Gas and LNG Demand, 2006 - 2016

Year	Annual Natural Gas Demand (m3/year)	Daily peak of the Transmission System (m3/ day /year)	Annual LNG Demand (m3/year)	Daily peak of the LNG System (m3/ day /year)
2006	*3,147,450,000*	*12,678,095*	*600,000,000*	*3,389,525*
2007	*4,060,880,000*	*16,040,079*	*700,000,000*	*4,279,103*
2008	*4,672,460,000*	*19,023,626*	*830,000,000*	*5,452,262*
2009	*5,520,890,000*	*22,983,838*	*1,060,000,000*	*6,865,122*
2010	*5,944,180,000*	*25,586,325*	*1,140,000,000*	*7,741,343*
2011	*6,507,930,000*	*28,946,773*	*1,210,000,000*	*8,399,971*
2012	*6,806,180,000*	*31,207,233*	*1,270,000,000*	*8,893,367*
2013	*6,934,570,000*	*32,584,228*	*1,320,000,000*	*9,331,211*
2014	*7,151,070,000*	*33,994,624*	*1,350,000,000*	*9,749,718*
2015	*7,214,330,000*	*34,751,078*	*1,360,000,000*	*9,897,748*
2016	*7,270,440,000*	*35,269,461*	*1,370,000,000*	*10,007,997*

2. Required Revenue Calculation

Tariff calculation is based on the principle of recovery of a Required Revenue for each activity (Transmission and LNG). The Required Revenue is calculated annually and includes operating and capital costs (depreciation and return on capital employed) of the respective activity and is calculated using an accounting approach.

Capital employed shall mean the Regulated Asset Base (RAB), which includes all existing tangible and intangible assets after depreciation, working capital, as well as the new investments. The undepreciated asset value corresponding to subsidies, including those which consist part of DEPA's share capital, were not included in the RAB. The overall RAB in 2005 was calculated to € 706.10 million. Of such amount, € 495.09 million correspond to the Transmission System and € 211.00 million correspond to the LNG System.

The Required Revenue includes the total accounting depreciation, including depreciation which corresponds to the subsidized asset value.

Given on the one hand the considerable uncertainty regarding the extent of utilization of the LNG terminal station in the future, either for balancing the load of the Transmission System or as an entry point for new suppliers in the natural gas market, which could have a considerable effect on the NNGS Operator's revenue and therefore on ensuring as stable as possible tariffs for its Users, and on the other hand the importance of such station for the smooth operation of the Transmission System and the security of supply of the country, 95% of the LNG Required Revenue is recovered through the Transmission Tariff (namely it is added to the Required Revenue of the Transmission System).

The projections of operating expenses, depreciation, RAB, and the overall Required Revenue used in tariffs' calculation are presented in Tables 2 to 5 below.

Table 2 Projected Transmission and LNG Operating Expenses, 2006 - 2016

Year	Transmission Operating Expenses (€)	LNG Operating Expenses (€)	Total (€)
2006	*45,208,322*	*8,785,209*	*53,993,532*
2007	*49,042,799*	*9,602,294*	*58,645,092*
2008	*50,946,709*	*10,295,307*	*61,242,016*
2009	*52,313,560*	*10,910,308*	*63,223,868*
2010	*53,858,962*	*11,379,017*	*65,237,979*
2011	*56,251,084*	*11,801,178*	*68,052,263*
2012	*58,745,894*	*12,239,002*	*70,984,896*
2013	*61,356,726*	*12,693,069*	*74,049,795*
2014	*64,107,556*	*13,163,982*	*77,271,538*
2015	*66,861,742*	*13,652,366*	*80,514,108*
2016	*69,456,118*	*14,158,869*	*83,614,986*

Table 3 Projected Transmission and LNG Depreciation, 2006 -2016

Year	Transmission Depreciation (€)	LNG Depreciation (€)	Total (€)
2006	*31,439,743*	*11,500,791*	*42,940,533*
2007	*33,542,096*	*12,016,018*	*45,558,114*
2008	*34,333,995*	*12,190,490*	*46,524,485*
2009	*34,333,995*	*12,190,490*	*46,524,485*
2010	*34,333,995*	*12,190,490*	*46,524,485*
2011	*34,333,995*	*12,190,490*	*46,524,485*
2012	*34,333,995*	*12,190,490*	*46,524,485*
2013	*34,333,995*	*12,190,490*	*46,524,485*
2014	*34,333,995*	*12,190,490*	*46,524,485*
2015	*34,333,995*	*12,190,490*	*46,524,485*
2016	*34,333,995*	*12,190,490*	*46,524,485*

Table 4 Projected Transmission and LNG Regulated Asset Base, 2006 -2016

Year	Transmission RAB (€)	LNG RAB (€)	Total (€)
2006	*544,174,710*	*222,949,874*	*767,124,584*
2007	*575,162,078*	*225,779,989*	*800,942,068*
2008	*572,769,212*	*221,809,951*	*794,579,163*
2009	*555,329,625*	*215,335,633*	*770,665,257*
2010	*536,433,226*	*208,654,002*	*745,087,227*
2011	*518,018,136*	*202,040,864*	*720,059,000*
2012	*498,693,267*	*195,298,259*	*693,991,526*
2013	*478,786,346*	*188,472,824*	*667,259,170*
2014	*459,181,347*	*181,690,355*	*640,871,702*
2015	*439,051,247*	*174,833,160*	*613,884,408*
2016	*418,896,646*	*167,972,479*	*586,869,126*

Table 5 Required Revenue, 2006-2016

Year	Transmission Required Revenue (€)	LNG Required Revenue (€)	Total (€)
2006	*131,392,040*	*42,714,758*	*174,106,798*
2007	*140,446,200*	*44,331,779*	*184,777,978*
2008	*142,901,287*	*44,799,877*	*187,701,165*
2009	*142,513,716*	*44,763,562*	*187,277,278*
2010	*142,158,139*	*44,560,099*	*186,718,239*
2011	*142,697,704*	*44,316,979*	*187,014,683*
2012	*143,248,432*	*44,076,497*	*187,324,929*
2013	*143,856,628*	*43,843,925*	*187,700,553*
2014	*144,635,195*	*43,632,522*	*188,267,717*
2015	*145,364,293*	*43,431,071*	*188,795,365*
2016	*145,931,116*	*43,247,390*	*189,178,506*

3. New Investments

New investments, standing at € 352.4 million until 2008, are considered to be included in the RAB as at the time they are expected to be realized, however, they are included in tariff calculation to normalize charges.

Table 6 lists new investments included in the RAB and which have been taken into account in calculating the amounts presented in Tables 3 to 5. It is noted that in calculating the data listed in Table 6, only the part of non-subsidized new investments value (national or EC subsidies) was included in the RAB, while the depreciation of assets that correspond to new investments also includes depreciation corresponding to subsidies.

Table 6 New Investments, 2006 - 2008

New Investments	In million Euros
Transmission System Expansion	*218.0*
Compressors	*38.8*
NNGS Modernization	*8.8*
Connection of new Gas Corporations	*19.0*
LNG Station Upgrade	*52.8*
Revythousa combined station	*13.3*
M/R SOVEL Station	*0.6*
Temporary Lamia M/R Station	*0.1*
Fiber optic cable at Diavata - Karperi	*1.0*
Total	*352.4*

4. Weighted Average Cost of Capital

Rate of return on RAB shall be the Operator's Weighted Average Cost of Capital (WACC). WACC is calculated according to the following formulas:

$$WACC_{pre-tax,nominal} = EQ \times \frac{(RF + \beta \times RP)}{1 - TX} + (1 - EQ) \times RD$$

$$WACC_{pre-tax,real} = \frac{WACC_{pre-tax,nominal} \times (1 - TX) - Inf}{(1 - TX) \times (1 + Inf)}$$

where:

RF: Risk Free Rate

RP: Risk Premium

β: Beta coefficient

RD: Cost of debt

TX: Tax rate

EQ: Equity to total employed capital

Inf: Inflation

According to the above, WACC is calculated to 10.06% in pre-tax nominal values, or 6.56% in pre-tax real values.

5. Consumer Price Index (CPI)

Annual values of the Consumer Price Index are presented in Table 7.

Table 7 Consumer Price Index

Change to the annual CPI	(%)
2006	2.80%
2007-2016	2.50%

6. Capacity / Commodity Charges

The tariff methodology provides for the application of a capacity charge part, by which 90% of the Required Revenue is recovered (based on reserved maximum daily capacities) and a commodity charge part, by which 10% of the Required Revenue is recovered (based on the quantities transmitted).

7. Tariff Parameter Normalization

To ensure higher tariff stability, a tariff parameter normalization procedure is applied for a period of 11 years (2006-2016). According to this normalization procedure, TCC and TQC coefficients of paragraph 8 hereof are calculated as follows: (a) TCC as the ratio of the present value of 90% of the annual Required Revenue to be recovered to the present value of annual capacity. (b) TQC as the ratio of the present value of 10% of the annual Required Revenue to be recovered to the present value of annual quantity of gas. Present values are calculated at a discount rate equal to the WACC for the period 2006-2016. The foregoing charge coefficients for tariffs are calculated at 2006 real values which are then adjusted to inflation to obtain the nominal values for the following years. The same procedure is also applied to calculate LCC and LQC coefficients under paragraph 9 hereof.

Especially for the first and second Years (2006 and 2007), the charge coefficients as calculated above are increased by 30.2% and 14.3% respectively in order to ensure that the Operator's financial operation will adapt to the new conditions created by the application of the present tariffs. The increase in revenues realised in such way during the first two years is compensated by a decrease during the next years of the normalization period, so that the

present value of the revenues earned in 2006-2016 shall be equal to the present value of the Required Revenue for the same period.

It is noted that the normalization period does not coincide with the period over which investments are depreciated, nor with their recovery period. Once the normalization period has ended, there shall still be depreciation, undepreciated investments, working capital, hence there shall be Required Revenue for both the Transmission System and the LNG System, which shall be covered annually by the Transmission Tariff and the LNG Tariff, as these shall apply after 2016.