

Pursuant to Article 15, paragraph 1, item 2. of the Energy Law (Official Gazette of the Republic of Serbia, No. 84/04) and Article 12 of the Statute of the Energy Agency of the Republic of Serbia (Official Gazette of the Republic of Serbia, No. 52/05),

The Council of the Energy Agency of the Republic of Serbia, at the Council Session held on December 16, 2008, passed the following

## DECISION

### on Amendments to the Decision on Establishing the Electricity Pricing Methodology for Tariff Customers

*(This Decision was published in the Official Gazette of the Republic of Serbia No. 116/2008 on December 22, 2008)*

1. In the Decision Establishing the Electricity Pricing Methodology for Tariff Customers (Official Gazette of the Republic of Serbia, No. 68/06 and 18/07), in the Electricity Pricing Methodology for Tariff Customers, Section III – TERMS AND DEFINITIONS, after paragraph 2 a new paragraph 3 is added and reads as follows:

“When calculations are done according to formulae defined in this methodology, all values expressed in percentages shall be divided by 100.”

2. In Section IV – SETTING MAXIMUM ALLOWED REVENUE after the paragraph 2 a new paragraph 3 is added and reads:

“Cost justification shall be assessed on the basis of the nature of a particular cost by analyzing the reasons for which it was incurred, the quantity, and the prices driving a particular cost, and by benchmarking data on costs of energy entities in the previous period and costs of energy entities conducting the same energy activity in the country and the region.”

3. The Section IV.1. **Common operating costs, assets, and other revenues** is amended and reads as follows:

#### **“IV. 1. Common operating costs, assets, depreciation costs, and other revenues**

Common operating costs are operating costs which are incurred to enable an energy entity performing two or more energy activities, or an extra non-energy activity, to operate, but which are not directly attributable to any specific location of cost.

Common assets are assets of an energy entity that are necessary for an energy entity conducting two or several energy entities, or an extra non-energy activity, to function, and which cannot be directly allocated to any specific activity (intangible investments, except goodwill, immovables, plant, and equipment).

Common depreciation costs are depreciation costs of common assets incurred to enable an energy entity conducting two or several energy activities, or an extra non-energy activity, to function, and which cannot be directly linked to any specific location of cost.

Other common revenues are other revenues earned by employing common energy entity's assets that cannot be directly allocated to any specific activity.

Common operating costs, assets, depreciation costs, and other revenues are allocated to energy activities for which maximum allowed revenue is set in accordance with this methodology (electricity generation, combined cycle generation of electricity and heat energy, wholesale or retail supply), and to other energy and non-energy activities, based on transparent rules (formulae) specified in line with accounting standards and objective criteria.”

4. In Subsection **IV.2. Electricity Generation**, paragraph 1, in the introductory sentence, the wording: “by production units” is deleted, and in the formula explanation, the wording:

““PPCK – rate of return on regulated assets calculated as weighted average cost of capital (in %)” is replaced with the following:

“WACC – the rate of return on regulated assets (%)”

In Subsection IV. 2.1. *Operating Expenditure*, paragraph 1, at the end of item 3) the word: “and” is deleted and a new item 4) is added and reads as follows:

“4) part of reservations for contributions and other staff benefits, paid during the regulatory period,”

The item 4) becomes now item 5).

In paragraph 5, the wording: “coal production units (coal mines)” is replaced with the wording: “by energy entities for coal production”

The paragraph 7 is deleted.

In Subsection IV. 2.2. *Depreciation Costs*, paragraph 2 is amended and reads as follows:

“Depreciation costs comprise costs of depreciation of existing assets at the beginning of the regulatory period and costs of depreciation of new assets to be put into service during the regulatory period.”

In Subsection IV. 2.3. *Regulatory Asset Base*, paragraph 1, second bullet, the word: “value” is replaced with: “net value”.

In paragraph 2, third bullet is amended and reads as follows:

“- harmonization of investments with the annual business program and development plan of the energy entity.”

In paragraph 5, in formula explanation, the wording: “pNSUP<sub>t</sub> – value of non-material investments”, is replaced with: “CWIP<sub>0t</sub> = opening net value of intangible investments (except goodwill).”

Paragraph 6. is amended and reads as follows:

“Closing value of regulated assets is calculated according to the following formula:

$$cRAB_t = oRAB_t + DRAB_t + \Delta Capex_t - Disposals_t - \Delta CC_t - \Delta CWIP_t$$

Where:

$D_{RABt}$  – depreciation costs of the regulatory asset base, excluding depreciation costs of assets funded by capital contribution in the period t, calculated by using the method specified in this Methodology (dinars),

$\Delta Capex_t$  – change in the value of intangible investments (except goodwill), immovables, plants, and equipment under construction, and advance payments made towards procurement thereof over the period t, increased by the net value of intangible investments (except goodwill), immovables, plants, and equipment under construction, and of advance payments for their procurement at the beginning of the regulatory period, but which will not be commissioned over the period t (dinars),

$Disposals_t$  – net value of assets that have been disposed of and/or permanently withdrawn from use in the period t (dinars),

$\Delta CC_t$  – change over the period t in the value of assets funded by capital contributions (dinars),

$\Delta CWIP_t$  – change in the value of intangible investments (except goodwill), immovables, plants, and equipment under construction, which will not be commissioned over the period t, or which are not justified nor/or efficient, and advance payments made towards procurement thereof (dinars).

Subsections IV.2.4. *Rate of return on regulated assets*, IV.2.5 *Penalty for Unavailability based on the Exceeded Planned Rate of Equivalent Forced Outage* are amended and read as follows:

*“IV. 2.4. Rate of Return on RAB*

The rate of return on the regulatory asset base is determined as the weighted average real cost of capital.

The weighted average real cost of capital is the weighted average of rate of return on equity capital and weighted average rate of return on debt capital calculated according to weight factors of 40% for equity and 60% for debt capital, and is calculated on a pre-tax basis according to the following formula:

$$WACC = (\text{equity portion}) * (\text{cost of equity, post tax, real}) / (1 - \text{tax rate}) + (\text{debt portion}) * (\text{cost of debt})$$

Where

$$\text{equity portion} + \text{debt portion} = 1$$

Where:

WACC = rate of return on the regulatory asset base (%),

Equity portion = the equity portion in funding the regulatory asset base (%),

Cost of equity, post tax, real = real cost of equity capital after taxation (%),

Tax rate = corporate tax rate in line with regulations in force (%),

Debt portion = the debt portion in funding the regulatory assets base (in %),

Cost of debt = weighted average cost of debt capital (%).

The real cost of the equity after taxation shall reflect the specific risk of the company, risk of the country and prevailing terms of acquiring capital on the financial market over the regulatory period.

The debt capital in the context of this subsection is equal to the sum of long-term liabilities and short-term financial liabilities used for financing the regulatory asset base.

The real cost of debt capital is calculated as the weighted average real interest rate on total debt, whereas the weight factors are the shares of debt in total debt capital. The real cost of debt capital is acceptable to the level of cautiously and reasonably borrowed assets.

#### IV.2.5. *Penalty for Unavailability based on the Exceeded Planned Rate of Equivalent Forced Outage*

The penalty for being unavailable which is based on the exceeded planned rate of equivalent forced outages is estimated from actual and planned rates of equivalent forced outages according to the formula below:

$$U/A_t = AC_{t-2} * \{1 - [(1 - EFORa_{t-2}) / (1 - EFORp_{t-2})]\}$$

Where:

$U/A_t$  – penalty for being unavailable over the period  $t$  based on exceeding the planned rate of equivalent forced outages in the period  $t-2$  (dinars),

$AC_{t-2}$  – the part of maximum allowed revenue that is reimbursed from the “available capacity” tariff element in the period  $t-1$  (dinars),

$EFORa_{t-2}$  – actual rate of equivalent forced outages in the period  $t-2$  (%),

$EFORp_{t-2}$  – planned rate of equivalent forced outages in the period  $t-2$  (%).

If, when submitting the request for opinion on prices, the energy entity has data on equivalent forced outage rates in the regulatory period  $t-1$ , the penalty for being unavailable is calculated according to data from regulatory period  $t-1$  or earlier regulatory periods for which correction was not done.

If the actual equivalent forced outage rate is lower than the planned equivalent forced outage rate, the resulting deviation is not calculated, namely  $U/A_t = 0$ .

In Subsection IV.2.6 *Other Revenues*, paragraph 1, the wording: “own products and services, revenue from sale of assets, deferred revenue in the period from realization of grants” is replaced with the wording: own products and merchandise, revenue from sale of assets“.

Subsection IV. 2.7. *Correction Factor* is amended and reads as follows:

“IV. 2.7. *Correction Factor*

The correction factor shall be a (monetary) value whereby the maximum allowed revenue for the regulatory period (t) is decreased or increased by the difference between the actual revenue according to the annual financial report of the energy entity for t-2 regulatory period and the justified revenue for t-2 regulatory period, calculated in accordance with this Methodology on the basis of the actual energy parameters and the value of justified costs, and other revenues earned in the t-2 regulatory period or in previous regulatory periods for which adjustments were not made.

The correction factor is calculated according to the formula below:

$$CF_t = (JR_{t-2} - AR_{t-2}) * (1 + CPI_{t-2})$$

Where:

t = regulatory period,

CF<sub>t</sub> = correction factor over period t (dinars),

JR<sub>t-2</sub> = justified revenue associated with conducting the energy activity over period t-2 and calculated in line with this Methodology on the basis of actual energy parameters and values of justified costs, and other revenues (dinars);

AR<sub>t-2</sub> = actual revenue associated with conducting the energy activity over period t-2 (dinars),

CPI<sub>t-2</sub> = consumer price index in the Republic of Serbia in the period t-2 in line with data published by the relevant statistics office (in %).

In the case mentioned under paragraphs 1 and 2 of this subsection, the correction factor shall not apply to the calculation of the maximum allowed revenue for the first two regulatory periods.

In case the energy entity has data on actual energy parameters and financial reports for t-1 regulatory period at the time the price act proposal is submitted, the correction factor calculation shall be based on data from the t-1 regulatory period or earlier regulatory periods for which adjustments were not made. In this case, the correction element is not applied to the maximum allowed revenue calculation for the first regulatory period.

In case regulated prices are not implemented at the beginning of the first regulatory period, the correction factor shall be calculated only for the part of the first regulatory period with implemented regulated prices, provided that the energy entity has the financial report for the part of the first regulatory period with regulated prices implemented. Where the financial report for the first part of the regulatory period with implemented regulated prices is not available, the actual revenue for the part of the first regulatory period during which the regulated prices were not implemented is calculated by applying regulated prices.

The first regulatory period in the context of this subsection is the calendar year during which, in line with the Energy law, implemented prices for tariff customers (regulated prices) are determined according to this Methodology. “

5. In Section IV.4. **Wholesale supply**, in Subsection IV.4.1. *Operating Expenditure*, in paragraph 1 at the end of item 3) the word:” and” is deleted and a new item 4) is added and reads as follows:

“4) part of reservations for contributions and other staff benefits, paid during the regulatory period,”

Item 4) becomes now item 5).  
Paragraph 3 is deleted.

In Subsection IV. 4.2. *Depreciation Costs*, paragraph 2 is amended and reads as follows:

“Depreciation costs comprise costs of depreciation of existing assets at the beginning of the regulatory period and costs of depreciation of new assets to be placed into service during the regulatory period.”

Subsection IV.4.4. *Correction Factor* is amended and reads as follows:

“IV. 4.4. *Correction Factor*

The correction factor shall be a (monetary) value whereby the maximum allowed revenue for the regulatory period (t) is decreased or increased by the difference between the actual revenue according to the annual financial report of the energy entity for t-2 regulatory period and the justified revenue for t-2 regulatory period calculated in accordance with this Methodology on the basis of the actual energy parameters and the value of justified costs incurred in the t-2 regulatory period, or in previous regulatory periods for which adjustments were not made.

The correction factor is calculated according to the formula below:

$$CF_t = (JR_{t-2} - AR_{t-2}) * (1 + CPI_{t-2})$$

Where:

t = regulatory period,

CF<sub>t</sub> = correction factor over period t (dinars),

JR<sub>t-2</sub> = justified revenue associated with conducting the energy activity over period t-2 and calculated in line with this Methodology on the basis of actual energy parameters and values of justified costs (dinars);

AR<sub>t-2</sub> = actual revenue associated with conducting the energy activity over period t-2 (dinars),

CPI<sub>t-2</sub> = consumer price index in the Republic of Serbia in the period t-2 in line with data published by the relevant statistics office (in %).

In the case mentioned under paragraphs 1 and 2 of this subsection, the correction factor shall not apply to the calculation of the maximum allowed revenue for the first two regulatory periods.

In case data on actual energy parameters and financial reports for t-1 regulatory period are known at the time the act proposal of electricity prices for tariff customers is submitted, the correction factor calculation shall be based on data from the t-1 regulatory period or earlier regulatory periods for which adjustments were not made. In this case, the correction element is not applied to the maximum allowed revenue calculation for the first regulatory period.

In case regulated prices are not implemented at the beginning of the first regulatory period, the correction factor shall be calculated only for the part of the first regulatory period with implemented regulated prices, provided that the financial report for the part of the first regulatory period with regulated prices implemented is prepared. Where the financial report for the first part of the regulatory period with implemented regulated prices is not prepared, the

actual revenue for the part of the first regulatory period during which the regulated prices were not implemented is calculated by applying regulated prices.

The first regulatory period in the context of this subsection is the calendar year during which, in line with the Energy law, implemented prices for tariff customers (regulated prices) are determined according to this Methodology. “

6. In Section IV. 5. **Retail Supply**, Subsections IV.5.1. *Operation Costs* and IV.5.2. *Depreciation Costs* are deleted.

Subsections IV.5.3. *Costs of Electricity Purchase*, IV.5.3. a) *Cost of Use of Transmission System*, IV.5.4. *Cost of Use of Distribution System*, and IV.5.5. *Charge for the Receivables Collection Risk* become now Subsections IV.5.1., IV.5.2., IV.5.3., and IV.5.4.

Subsection IV.5.6. that becomes now IV.5.5. is amended and reads as follows:

“IV. 5.5. *Meaning of other elements of the formula*

The meaning of other elements of the formula for calculating maximum allowed revenue of the energy entity for retail supply is identical to the meaning set in this Methodology for calculating maximum allowed revenue of the energy entity for wholesale supply, except that in this calculation parameters for retail supply are used. “

7. In Section VI. REGULATORY PERIOD, paragraph 2, at the end, item is deleted and the following wording is added:

“(calendar) year. Documentation and data based on which the maximum allowed revenue of the energy entity is calculated, shall be submitted to the Energy Agency of the Republic of Serbia, as a rule, 45 days before submission of the price act proposal for opinion.

8. This decision shall be published in the Official Gazette of the Republic of Serbia and shall apply as of January 1, 2009.

No. 703/2008-D-I/10

Belgrade, December 16, 2008

**The Council of the Energy Agency of the Republic of Serbia**

Council President  
Ljubo Macic