

Amendments to Cabinet Regulation No. 221 “Regulations Regarding Electricity Production and Price Determination upon Production of Electricity in Cogeneration” adopted on 10 March 2009

Issued in accordance with Article 28(1), 28(7), 28¹(2), and 28¹(5) of the Electricity Market Law

To make the following amendments to Cabinet Regulation No. 221 “Regulations Regarding Electricity Production and Price Determination upon Production of Electricity in Cogeneration” adopted on 10 March 2009 (“Latvijas Vēstnesis”, 2009, No. 42; 2009, No. 189, 2009, No. 205, 2010, No. 150, 2012, No. 142, 2013, No. 158, 2013, No. 234, 2014, No. 82, 2015, No. 250):

1. To delete the following sentence of Paragraph 14: “All pages of the submission shall be numbered and each page shall be signed by the authorised official of the merchant.”
2. To replace the phrase “shall issue the specified decision to the merchant in three copies” of Paragraph 20 with the phrase “shall send the specified decision to the merchant, the transmission system operator and the public trader (hereinafter – the trader)”.
3. To delete words “public” and “(hereinafter – trader)” from Paragraph 24.
4. To express Subparagraph 51.2.1, 52.2.2, and 52.2.3 as follows:

“52.2.1. for cogeneration units, the installed electric capacity of which is greater than four megawatts, but less than 20 MW, the capacity component per installed electric megawatt a year shall be calculated using the following formula:

$$J = 153\,527 \times s;$$

“52.2.2. for cogeneration units, the installed electric capacity of which is greater than 20 MW, but less than 100 MW, the capacity component per installed electric megawatt a year shall be calculated using the following formula:

$$J = 119\,237 \times s;$$

“52.2.3. for cogeneration units, the installed electric capacity of which is greater than 100 MW, the capacity component per installed electric megawatt a year shall be calculated using the following formula:

$$J = 102\,304 \times s, \text{ where}$$

J – the capacity component per installed electric megawatt a year (EUR/MW a year)

s – price differentiation coefficient for preventing overcompensation;”

5. To express Subparagraph 53.1 as follows:

“53.1. for cogeneration units, which use renewable energy resources or peat as fuel:

$$C = k_{\text{AER}} \times s, \text{ where}$$

C – the price without value added tax, for which a trader purchases electricity produced in cogeneration (EUR/MWh);

k_{AER} – the price differentiation coefficient for power plants using renewable energy sources or peat, which depends on the installed electric capacity of the cogeneration unit;

s – price differentiation coefficient for preventing overcompensation;”

6. To express Subparagraph 53.2 as follows:

“53.2. for other cogeneration units:

$$C = \frac{T_g \times k}{9,3} \times 3,4 \times s, \text{ where}$$

T_g – the regulator’s approved final tariff for trade of natural gas without value added tax in accordance with the actual calorific value of natural gas (EUR / thousand n.m³);

k – the price differentiation coefficient, which depends on the installed electric capacity of the cogeneration unit;

s – price differentiation coefficient for preventing overcompensation;”

7. To add the following Subparagraph 54.3 to the regulation:

“54.3. the price differentiation coefficient for preventing overcompensation is used in accordance with Paragraph 54³ of this regulation.”

8. To delete number “53.1” from Paragraph 54¹ and 54².

9. To add the following Paragraph 54³ to the regulation:

“54.³ The price differentiation coefficient s for preventing overcompensation used in the formulae specified in Paragraph 52, 53 and 55 hereof:

54.³1. is greater than 0 and does not exceed 1, and is established in the Ministry’s decision in accordance with Paragraph 56² or 56¹² hereof;

54.³2. is equal to 1, in case the Ministry has not made a decision in accordance with Paragraph 56² or 56¹² hereof:

10. To replace formula “ $M = \frac{224\,459 \times P}{12}$,” with formula “ $M = \frac{224\,459 \times P \times s}{12}$,” in Paragraph 55.1.

11. To replace formula “ $M = \frac{136\,186 \times P}{12}$,” with formula “ $M = \frac{136\,186 \times P \times s}{12}$,” in Paragraph 55.2.

12. To add the phrase “ s – price differentiation coefficient for preventing overcompensation.” after the letters “(MW)” in Paragraph 55.2.

13. To add the following Chapter IV¹ to the regulation:

**“IV¹. Conditions for the assessment and prevention of
overcompensation**

56.¹ If the producer of electricity exercises the rights granted in accordance with Article 28 of the Electricity Market Law in relation to a cogeneration unit with a capacity of no more than four megawatts for five full calendar years, including the year, for which the report specified in Paragraph 40 hereof is submitted, and the merchant has not submitted the calculation specified in Paragraph 56³ hereof, the Ministry, within two months after the receipt of the report, calculates the total capital investment internal rate of return of the power plant for the entire period of receiving aid in accordance with Annex 8 hereof.

56.² If the total capital investment internal rate of return of the power plant for the entire period of receiving aid exceeds 9% in accordance with the calculation specified in Paragraph 56¹, 56⁴ or 56⁸ hereof, the Ministry shall carry out a calculation of the price differentiation coefficient for preventing overcompensation according to Paragraph 56¹⁸, 56¹⁹, and 56²⁰ hereof and make a decision, establishing the price differentiation coefficient s for preventing overcompensation to be used in the formulae specified in Paragraph 53 hereof. The decision shall be communicated to the merchant, trader and system operator.

56.³ If a merchant does not consent the result of calculation performed by the Ministry of the power plant's total capital investment internal rate of return for the entire period of receiving aid, or upon its own initiative, if the merchant exercises the right specified in Paragraph 56¹ hereof for less than five full calendar years, in case the electric or heat capacity of the cogeneration unit is changed, it may submit an alternative calculation of the total capital investment internal rate of return of the power plant for the entire period of receiving aid approved by a sworn auditor and supplemented with supporting documentation. The calculation is carried out according to the following procedures:

56.³1. formulae provided in Annex 8 of this regulation shall be used in the calculation, replacing the benchmark values with the actual and anticipated revenue and expenditure values

56.³2. the merchants shall include the investments made in and planned for the cogeneration unit that are needed for the intended life cycle of the unit, for extending the cycle or increasing the unit's efficiency in the calculation of net cash flow TNP_t . The additional amount of investment (EUR) shall be included in the net cash flow calculation in the year when it was made.

56.³3. when carrying out a calculation for a past period, the merchant shall indicate the actual revenue and expenditure values of the power plant

56.³4. when carrying out calculations for future periods, the merchant shall comply with the following conditions:

56.³4.1. electricity price for future periods must be based on the electricity financial contract price quotation of NASDAQ OMX exchange for the price area of Latvia or Finland. When using electricity financial contract price quotation of the price area of Finland, the price of electricity for future periods for the price area of Latvia shall be determined by adding the price difference of Finland and Latvia (EUR/MWh) for the respective year. The average price quotations during the last month prior to submitting the calculations to the Ministry must be used in the calculations;

56.³4.2. for the price of natural gas, data must be used in accordance with the forecast specified in Table 9 of this Annex;

56.³4.3. fuel price, personnel costs, operating costs and other operating costs for future periods must be based on corresponding actual costs in previous three full calendar years, attributing inflation forecast values set out in Table 1 of Annex 8 hereof;

56.³4.4. number of working hours for future periods must be determined in accordance with the average value of number of working hours in previous three full calendar years;

56.⁴ If the total capital investment internal rate of return of the power plant for the entire period of receiving aid exceeds 9% in accordance with the calculation specified in Paragraph 56³ hereof, the merchant shall attach a calculation of the price differentiation coefficient for preventing overcompensation approved by a sworn auditor to this calculation and the date of commencement of application thereof according to Paragraph 56²¹ hereof. If in accordance with the calculation specified in Paragraph 56³ hereof, the total capital investment internal rate of return of the power plant for the entire period of receiving aid does not exceed 9% the price differentiation coefficient for preventing overcompensation equals 1.

56.⁵ After identifying changes in the installed electric or heat capacity of a cogeneration unit, changes in the subsidized electricity tax rate applied to the merchant, or actually received additional amount of public funding for the merchant's cogeneration station, or in case the values included in Table 1, 2, 4, 5, 7, or 9 of Annex 8 hereof are reviewed in accordance with the provisions of Paragraph 56¹⁷ hereof, or at the request of the merchant, the Ministry can calculate the power plant's total capital investment internal rate of return for the entire period of receiving aid and the price differentiation coefficient for preventing overcompensation.

56.⁶ The merchant may submit the request specified in Paragraph 56⁵ hereof in case they exercise the right specified in Paragraph 56¹ hereof for less than five full calendar years, or in case the electric or heat capacity of the cogeneration unit is changed, or in case at least one year has passed since the day of entry into force of decision specified in Paragraph 56².

56.⁷ If the merchant has submitted the calculation specified in Paragraph 56³ hereof, the Ministry, after identifying changes in the installed electric or heat capacity of a cogeneration unit or actually received additional amount of public funding for the merchant's cogeneration station, or in case the values included in Table 1, 2, or 9 of Annex 8 hereof are reviewed in accordance with the provisions of Paragraph 56¹⁷ hereof, may request to submit specified calculations referred to in Paragraph 56³ and 56⁴ hereof.

56.⁸ If within two months after sending the request specified in Paragraph 56⁷ the merchant fails to meet the requirements specified in Paragraph 56⁷, the Ministry calculates the total capital investment internal rate of return of the power plant for the entire period of receiving aid in accordance with Annex 8 hereof.

56.⁹ If the producer of electricity exercises the rights granted in accordance with Article 28 or 28¹ of the Electricity Market Law in relation to a cogeneration unit with a capacity of more than four megawatts for eight or thirteen full calendar years, including the year, for which the report specified in Paragraph 40 hereof is submitted, a calculation of the total capital investment internal rate of return approved by a sworn auditor for the entire period of receiving aid in accordance with the requirements of Annex 8 hereof shall be attached to the report.

56.¹⁰ If the total capital investment internal rate of return of the power plant for the entire period of receiving aid exceeds 9% in accordance with the calculation specified in Paragraph 56⁹ hereof, the merchant shall attach a calculation of the price differentiation coefficient for preventing overcompensation approved by a sworn auditor to this calculation and the date of commencement of application thereof according to Paragraph 56²¹ hereof.

56.¹¹ The merchant may submit the calculation specified in Paragraph 56⁹ and 56¹⁰ hereof in case it exercises the right specified in Paragraph 56⁹ hereof for less than eight full calendar years, in case the electric or heat capacity of the cogeneration unit is changed, or in case at least one year has passed since the day of entry into force of decision specified in Paragraph 56¹².

56.¹² Based on the calculation specified in Paragraph 56⁴ or 56¹⁰ hereof, the Ministry, within a month after receipt thereof, shall make a decision, establishing the price differentiation coefficient s for preventing overcompensation to be used in the formulae specified in Paragraph 52, 53 and 55 hereof and the date of entry into force of the decision. The decision shall be communicated to the merchant, trader and system operator.

56.¹³ The merchant shall apply the price differentiation coefficient for preventing overcompensation established according to the decision specified in Paragraph 56² or 56¹² starting from the first day of the following full calendar month after the day of entry into force of the decision specified in Paragraph 56² or 56¹² hereof.

56.¹⁴ If the merchant does not meet the requirements of Paragraph 56⁹ or 56¹⁰ hereof within a month, the Ministry shall send a warning to the merchant within a month.

56.¹⁵ In case the merchant, within a month after receiving the warning specified in Paragraph 56¹⁴, does not meet the requirements of Paragraph 56⁹ or 56¹⁰ hereof, the Ministry shall make a decision annulling the right granted to the merchant to sell electricity produced in cogeneration within the framework of the mandatory procurement or to receive payment for the installed electric capacity of the

cogeneration unit. The decision shall be communicated to the merchant, trader and system operator.

56.¹⁶ The requirements of Paragraph 56¹ and 56⁹ hereof do not apply to the cogeneration units, whose tariff of produced heat energy is approved by the regulator within three years since the date when the merchant has started exercising the rights granted under Paragraph 20 hereof.

56.¹⁷ The Ministry may propose a revision of the validity and compliance with the market situation of the values included in Table 1, 2, 4, 5, 7, or 9 of Annex 8 hereof.

56.¹⁸ The price differentiation coefficient s for preventing overcompensation shall be calculated by incremental iterations using the calculation of internal rate of return.

56.¹⁹ The price differentiation coefficient s for preventing overcompensation shall be set at a level so that the total capital investment internal rate of return of the power plant for the entire period of receiving aid does not exceed 9%, calculating it for the merchant's each power plant individually to the nearest thousandth.

56.²⁰ When calculating the price differentiation coefficient s for preventing overcompensation, the Ministry shall take into account the date of commencement of application thereof in accordance with Paragraph 56¹³ hereof.

56.²¹ When calculating the price differentiation coefficient s for preventing overcompensation specified in Paragraph 56⁴ or 56¹⁰ hereof, the sworn auditor shall set the date of commencement of application thereof, taking into account the fact that this date shall be the first day of the third full calendar month following the day, when the calculation was submitted to the Ministry.

14. To add the following Paragraph 84 to the regulation:

“84. The requirements mentioned in Chapter IV¹ hereof shall be applied also to the merchants, to whom the right to sell electricity generated in a cogeneration unit within the framework of the mandatory procurement was granted by decisions passed by the Ministry according to Cabinet Regulation No. 921 “Regulations Regarding Electricity Production” of 6 November 2006.

15. To add the following Paragraph 85 to the regulation:

“85. If the producer of electricity exercises the rights granted in accordance with Article 28 of the Electricity Market Law in relation to a cogeneration unit with a capacity of no more than four megawatts for at least five full calendar

years until the day of entry into force of Chapter IV¹ hereof, the Ministry shall carry out the activities mentioned in Chapter IV¹ hereof within two months after the day of entry into force of Chapter IV¹ hereof.

16. To add the following Paragraph 86 to the regulation:

“86. Requirements of Paragraph 85 hereof shall not apply, if the term for executing the rights granted to the producer of electricity in accordance with Article 28 of the Electricity Market Law in relation to a cogeneration unit with a capacity of no more than four megawatts is 31 December 2017.”

17. To express row 8 of the table of Chapter I of Annex 5 as follows:

| | | | |
|------|-----------|--------------------|--|
| 6.2. | heat (MW) | gross ³ | |
|------|-----------|--------------------|--|

18. To add the following sentence to the Notes of Chapter I of Annex 5:

“3. The installed heat capacity of the cogeneration unit that corresponds to the sum of gross heat capacities prescribed by the manufacturer of cogeneration equipment installed at the unit.

19. To express Annex 6 as follows:

“Annex 6
to Cabinet Regulation
No. 221 of 10 March 2009

The values of coefficient K_{AER} and k and natural gas consumption volume depending on the installed electric capacity of the cogeneration unit

| No. | Installed electric capacity of the cogeneration unit | Value of coefficient k_{AER} | Value of coefficient k | Natural gas consumption per year, n.m ³ |
|-----|------------------------------------------------------|--------------------------------|--------------------------|----------------------------------------------------|
| 1. | Does not exceed 0.08 MW | 217.002 | 1.240 | 25 000–126 000 |
| 2. | More than 0.08 MW, but does not exceed 0.15 MW | 194.925 | 1.231 | 126 000–1 260 000 |
| 3. | More than 0.15 MW, but does not exceed 0.20 MW | 190.333 | 1.202 | |
| 4. | More than 0.20 MW, but does not exceed 0.40 MW | 179.090 | 1.131 | |

| | | | | |
|-----|--------------------------------------------------|---------|-------|----------------------------|
| 5. | More than 0.40 MW, but does not exceed 0.60 MW | 171.965 | 1.086 | |
| 6. | More than 0.60 MW, but does not exceed 0.80 MW | 169.748 | 1.072 | |
| 7. | More than 0.80 MW, but does not exceed 1.00 MW | 167.056 | 1.055 | |
| 8. | More than 1.00 MW, but does not exceed 1.50 MW | 153.988 | 1.035 | 1 260 000– 12 600 000 |
| 9. | More than 1.50 MW, but does not exceed 2.00 MW | 149.971 | 1.008 | |
| 10. | More than 2.00 MW, but does not exceed 2.50 MW | 147.590 | 0.992 | |
| 11. | More than 2.50 MW, but does not exceed 3.00 MW | 146.103 | 0.982 | |
| 12. | More than 3.00 MW, but does not exceed 3.50 MW | 144.912 | 0.974 | |
| 13. | More than 3.50 MW, but does not exceed 4.00 MW | 143.573 | 0.965 | |
| 14. | More than 4.00 MW, but does not exceed 20.00 MW | | | 12 600 000– 20 000 000 |
| 15. | More than 20.00 MW, but does not exceed 40.00 MW | | | 20 000 000– 100 000 000 |
| 16. | Exceeds 40 MW | | | more than 100 000 000 |

“

20. To add the following Annex No. 8 to the regulation:

“Annex 8
to Cabinet Regulation
No. 221 of
10 March 2009

Calculation of the total capital investment internal rate of return of the cogeneration unit

I. The procedure of calculation of the total capital investment internal rate of return of cogeneration units with the installed electric capacity of no more than 4 MW

1. Internal rate of return is the discount rate value, at which the current value of the discounted cash flow is equal to the value of the initially invested capital.

Internal rate of return is calculated for the last year, when the producer may exercise the rights granted under Article 28 or 28¹ of the Electricity Market Law.

2. Internal rate of return is calculated with incremental iterations, using the following formula:

$$\sum_{t=t_0}^n \frac{TNP_t}{\left(1 + \frac{r}{100}\right)^{t-t_0+1}} - I_0 + D_{t_0} = 0, \text{ where}$$

TNP_t – net cash flow or cash flow, which remains at the disposal of the merchant after covering all production expenses, in the calendar year t (EUR);

r – internal rate of return (%);

t – calendar year, for which the calculation is carried out;

t_0 – calendar year, when the merchant has started exercising the rights granted under Article 28 or 28¹ of the Electricity Market Law;

n – calendar year, when the term expires for the merchant exercising the rights granted under Article 28 or 28¹ of the Electricity Market Law;

I_0 – merchant's initial investment in the cogeneration unit (EUR);

D_{t_0} – the public funding granted and actually received (in EUR) for the merchant's cogeneration unit until the calendar year t_0 (included), including payments from the national or local government budget, credit interest rate subsidies and other financial assistance that has been granted or provided from the national, local government or the European Union budget funds and foreign financial aid resources.

3. Merchant's initial investment in the cogeneration unit I_0 shall be calculated using the following formula:

$$I_0 = P_{el\ t_0} \times I_{ip} \times 1000 + I_{p\bar{a}rv}, \text{ where}$$

$P_{el\ t_0}$ – installed electric capacity of the cogeneration unit (MW) specified in the contract with the public trader in the calendar year t_0 ;

I_{ip} – specific investment benchmark of the merchant's cogeneration unit (EUR/kW), which, depending on the fuel used by the cogeneration unit and the electric capacity installed at the corresponding period and specified in the contract with the public trader, is specified in Table 3, 6, and 8 of this Annex;

$I_{p\bar{a}rv}$ – actual electricity connection costs of the merchant's cogeneration unit to the electricity transmission network (EUR). If the merchant's cogeneration unit is connected to the electricity distribution network, $I_{p\bar{a}rv}$ is 0;

4. The net cash flow in the calendar year t shall be calculated using the following formula:

$$TNP_t = \sum_{i=1}^{12} TNP_t^i - I_{k\ t} + D_t, \text{ where}$$

TNP_t^i – net cash flow or cash flow, which remains at the disposal of the merchant after covering all production expenses, in the calendar month i of the calendar year t (EUR);

$I_{k\ t}$ – adjustment of the initial investment in the cogeneration unit (EUR);

D_t – the public funding granted and actually received (in EUR) for the merchant's cogeneration unit in the calendar year t , including payments from the national or local government budget, credit interest rate subsidies and other financial assistance that has been granted or provided from the national, local government or the European Union budget funds and foreign financial aid resources.

5. The net cash flow in the calendar month i of the calendar year t shall be calculated using the following formula:

$$TNP_t^i = IEN_t^i - IZD_t^i, \text{ where}$$

IEN_t^i – income of the cogeneration unit in the calendar month i of the calendar year t (EUR);

IZD_t^i – expenses of the cogeneration unit in the calendar month i of the calendar year t (EUR);

6. If the installed electric capacity of the merchant's cogeneration unit specified in the contract with the public trader has not increased in the calendar year t , the adjustment $I_{k\ t}$ of initial investment in the cogeneration unit shall be 0 EUR. If the installed electric capacity of the merchant's cogeneration unit specified in the contract with the public trader has increased in the calendar year t , the adjustment $I_{k\ t}$ of initial investment in the cogeneration unit shall be calculated by using the following formula:

$$I_{k\ t} = (P_{el\ t} \times I_{ip} \times 1000) - (P_{el\ t-1} \times I_{ip} \times 1000), \text{ where}$$

$P_{el\ t}$ – installed electric capacity of the cogeneration unit (MW) specified in the contract with the public trader in the calendar year t ;

$P_{el\ t-1}$ – installed electric capacity of the cogeneration unit (MW) specified in the contract with the public trader in the calendar year $t-1$;

7. Income of the cogeneration unit in the calendar month i IEN_t^i of the calendar year t shall be calculated using the following formula:

$$IEN_t^i = C_{el\ t}^i \times P_{el\ t}^i \times \frac{d}{12} \times \left(1 - \frac{SEN_t^i}{100}\right) + C_{th\ t}^i \times P_{th\ t}^i \times \frac{d}{12} \times \left(1 - \frac{E_{th} \times 8000}{100 \times d}\right), \text{ where}$$

$C_{el\ t}^i$ – electricity purchase price set for the merchant's cogeneration unit in the calendar month i of the calendar year t (EUR/MWh);

$P_{el\ t}^i$ – installed electric capacity of the cogeneration unit (MW) specified in the contract with the public trader in the calendar month i of the calendar year t ;

d – benchmark of the number of working hours of the merchant's cogeneration unit in a calendar year, which, depending on the fuel used by the cogeneration unit and the capacity $P_{el\ t}^i$ installed in the calendar month i of the calendar year t , is specified in Table 3, 6, and 8 of this Annex;

SEN_t^i – subsidized electricity tax rate (%) actually applicable to the merchant in the calendar month i of the calendar year t ; The applicable rate for a future period is determined by the subsidized electricity tax rate actually applicable to the merchant at the calculation date;

$C_{th\ t}^i$ – heat benchmark price in the calendar month i of the calendar year t (EUR/MWh);

$P_{th\ t}^i$ – net installed heat capacity benchmark of the cogeneration unit in the calendar month i of the calendar year t (MW);

E_{th} – heat consumption benchmark for the production of biogas (%). For cogeneration units using natural gas, biomass, landfill gas or biogas obtained in the biomass gasification process, E_{th} is 0, while for other biogas cogeneration units, E_{th} is 35%.

8. Installed net heat capacity benchmark $P_{th\ t}^i$ of the cogeneration unit in the calendar month i of the calendar year t shall be calculated using the following formula:

$$P_{th\ t}^i = P_{thb\ t}^i \times 0,97, \text{ where}$$

$P_{thb\ t}^i$ – the installed heat capacity of the cogeneration unit that corresponds to the sum of gross heat capacities prescribed by the manufacturer of cogeneration equipment installed at the unit (MW).

9. Heat benchmark price in the calendar month i of the calendar year t shall be calculated using the following formula:

$$C_{th\ t}^i = \frac{C_{kur\ t}^i}{\eta_{ref}}, \text{ where}$$

$C_{kur\ t}^i$ – fuel benchmark price in the calendar month i of the calendar year t (EUR/MWh);

η_{ref} – efficiency factor for the calculation of heat sales price, which depends on the type of fuel used and is established in Table 3, 6, and 8 of this Annex.

10. Fuel benchmark price in the calendar month i $C_{kur\ t\ i}^i$ of the calendar year t for cogeneration units using renewable energy sources as fuel, depending on the type of fuel used and installed electric capacity, is established in Table 4, 5, and 7 of this Annex. Heat benchmark price in the calendar month i of the calendar year t for cogeneration units using natural gas as fuel shall be calculated using the following formula:

$$C_{kur\ t}^i = \frac{T_g^i + AN_t^i}{9,3}, \text{ where}$$

T_g^i – the regulator's approved final tariff for trade of natural gas for calendar month i of the calendar year t excluding value added tax in accordance with the actual calorific value of natural gas (EUR / thousand n.m³), determined in accordance with the natural gas consumption volumes (Annex 6), depending on the installed electric capacity of the cogeneration unit specified in the contract with the public trader, in the calendar month i $P_{el\ t}^i$ of the calendar year t . It shall be determined for a future period in accordance with natural gas sales price benchmarks included in Table 9 of this Annex;

AN_t^i – excise duty on using natural gas as fuel in the calendar month i of the calendar year t (EUR / thousand n.m³). The excise duty rate in force on the date of calculation shall be used for the future period.

11. Expenses of a cogeneration unit using renewable energy sources $IZD_{t\ i}$ in the calendar month i of the calendar year t shall be calculated using the following formula:

$$IZD_t^i = A \times I_{A\ t} + P_{el\ t}^i \times I_{ip} \times 1000 \times \left(\frac{I_M + I_O}{12 \times 100} \right) + C_{kur\ t}^i \times B_{kur\ t}^i, \text{ where}$$

A – benchmark of the number of full-time employees of the merchant's cogeneration unit, which, depending on the fuel used by the cogeneration unit and the installed electric capacity specified in the contract with the public trader, in

the calendar month i $P_{el\ t}^i$ of the calendar year t is specified in Table 3, 6, and 8 of this Annex;

I_{At} – benchmark of the cogeneration unit's personnel costs for full-time work (EUR / year), which is determined using Table 2 of this Annex;

I_M – operating cost benchmark (%), which characterizes the ratio of annual costs related to the maintenance of the cogeneration unit to capital investment costs and which, depending on the fuel used by the cogeneration unit and the installed electric capacity specified in the contract with the public trader, in the calendar month i $P_{el\ t}^i$ of the calendar year t is specified in Table 3 and 6 of this Annex. Operating costs also include costs associated with major repairs of cogeneration unit engines and similar expenses. Operating costs are indexed with the rate of inflation, as defined in Table 1, with effect from the next calendar year following the calendar year, when the producer has started exercising the rights granted under Article 28 or 28¹ of the Electricity Market Law;

I_O – other operating cost benchmark (%), which characterizes the ratio of the rest of annual operating costs of the cogeneration unit to capital investment costs and which, depending on the fuel used by the cogeneration unit and the installed electric capacity specified in the contract with the public trader, in the calendar month i $P_{el\ t}^i$ of the calendar year t is specified in Table 3, 6 and 8 of this Annex. Other operating costs include administrative, transport, lease of land, insurance and other costs. Other operating costs are indexed with the rate of inflation, as defined in Table 1, with effect from the next calendar year following the calendar year, when the producer has started exercising the rights granted under Article 28 or 28¹ of the Electricity Market Law;

$B_{kur\ t}^i$ – the estimated amount of fuel consumed (MWh), which is necessary to ensure operation of the merchant's cogeneration unit in the calendar month i of the calendar year t .

12. Expenses of a cogeneration unit using natural gas $IZD_{t,i}$ in the calendar month i of the calendar year t shall be calculated using the following formula:

$$IZD_t^i = A \times I_{At} + P_{el\ t}^i \times I_{ip} \times 1000 \times \left(\frac{I_O}{12 \times 100} \right) + P_{el\ t}^i \times \frac{d}{12} \times I_g + C_{kur\ t}^i \times B_{kur\ t}^i, \text{ where}$$

I_g – operating cost benchmark (EUR/MWh), which characterizes the annual costs related to the maintenance of the cogeneration unit using natural gas per produced unit of electricity and which, depending on the installed electric capacity specified in the contract with the public trader, in the calendar month i $P_{el\ t}^i$ of the calendar year t is specified in Table 8 of this Annex. Operating costs also include costs associated with major repairs of cogeneration unit engines and similar expenses. Operating costs are indexed with the rate of inflation, as defined in

Table 1, with effect from the next calendar year following the calendar year, when the producer has started exercising the rights granted under Article 28 or 28¹ of the Electricity Market Law;

13. The estimated amount of fuel consumed $B_{kur t}^i$ is determined using the formula:

$$B_{kur t}^i = \frac{(P_{el t}^i + P_{th t}^i) \times d}{12 \times 0,75}, \text{ where}$$

0.75 – coefficient characterizing minimum efficiency of the cogeneration unit.

13. In the calculation carried out in accordance with this Annex, monetary values shall be rounded to the nearest cent, taking into account the third decimal. If the third decimal is 0 to 4, the cent value does not change. If the third decimal is 5 to 9, the cent is rounded up for a single unit.

II. The procedure of calculation of the total capital investment internal rate of return of cogeneration units with the installed electric capacity of more than 4 MW

1. Merchants with a cogeneration unit with the installed electric capacity of more than 4 MW shall calculate the unit's internal rate of return using the formulae of Chapter I of this Annex, replacing the benchmark values with the actual and anticipated revenue and expenditure values.

2. When carrying out a calculation for a past period, the merchant shall indicate the actual revenue and expenditure values of the cogeneration unit. The carrying out calculations for future periods, the merchant shall comply with the following conditions:

2.1. Electricity price for future periods must be based on the electricity financial contract price quotation of NASDAQ OMX exchange for the price area of Latvia or Finland. When using electricity financial contract price quotation of the price area of Finland, the price of electricity for future periods for the price area of Latvia shall be determined by adding the price difference of Finland and Latvia (EUR/MWh) for the respective year. The average price quotations during the last month prior to submitting the calculations to the Ministry must be used in the calculations;

2.2. For the price of natural gas, data must be used in accordance with the forecast specified in Table 9 of this Annex;

2.3. Inflation forecast values set out in Table 1 of this Annex can be attributed to the fuel price, personnel costs, operating costs, other operating costs, and future periods;

2.4. The merchants using natural gas as fuel shall include expenses related to the purchase of necessary greenhouse gas emission allowances in addition to the emission allowances allocated to the merchant;

2.5. Number of working hours for future periods must be determined in accordance with the average number of working hours of the previous three years;

2.6. The merchants shall include the investments made in and planned for the cogeneration unit that are needed for the intended life cycle of the unit, for extending the cycle or increasing the unit's efficiency in the calculation of net cash flow TNP_t . The additional amount of investment (EUR) shall be included in the net cash flow calculation in the year when it was made or when it is planned to make it.

III. Benchmarks for calculation of the total capital investment internal rate of return of the cogeneration unit

Table 1

Inflation benchmarks

| Year | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 | 2014 |
|--------------|-------------|-------------|-------------|-------------|-------------|------------------|-------------|-------------|
| Inflation, % | 10.1 | 15.3 | 3.3 | -1.2 | 4.2 | 2.3 | 0.0 | 0.7 |
| Year | 2015 | 2016 | 2017 | 2018 | 2019 | 2020-2040 | | |
| Inflation, % | 0.2 | 0.4 | 2.0 | 2.5 | 2.5 | 1.8 | | |

Table 2

Benchmark of the cogeneration unit's personnel costs for full-time work

| Year | 2007 | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 | 2014 | 2015 |
|---------------------------------------------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|-------------|
| Personnel costs per full-time employee, EUR/month | 1082 | 1140 | 1083 | 1143 | 1180 | 1237 | 1248 | 1310 | 1379 |
| Year | 2016 | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 | 2023 | 2024 |
| Personnel costs per full-time employee, EUR/month | 1379 | 1396 | 1417 | 1438 | 1464 | 1490 | 1517 | 1544 | 1572 |
| Year | 2025 | 2026 | 2027 | 2028 | 2031 | 2032 | 2033 | 2034 | 2035 |
| Personnel costs per full-time employee, EUR/month | 1600 | 1629 | 1659 | 1688 | 1781 | 1813 | 1846 | 1879 | 1913 |
| Year | 2036 | 2037 | 2038 | 2039 | 2040 | | | | |
| Personnel costs per full-time employee, EUR/month | 1947 | 1982 | 2018 | 2054 | 2091 | | | | |

Table 3

Benchmarks applicable to biogas plants, except for biomass gasification plants

| Installed electric capacity P_{el} | Number of working hours per year d (h) | | | | | Specific investment I_{ip} (EUR/kW _{el}) | Number of employees A (eligible workload) | Operating costs per year I_M (% of the total investment) | Other operating costs per year I_O (% of the total investment) | Heat consumption for production of biogas E_{th} (% of the produced amount) | The efficiency factor for calculation of the heat sales price η_{ref} (%) |
|--------------------------------------------|------------------------------------------|----------------|-----------|----------------|--------------------------|------------------------------------------------------|---------------------------------------------|------------------------------------------------------------|------------------------------------------------------------------|-------------------------------------------------------------------------------|--------------------------------------------------------------------------------|
| | Year 2007-2011 | Year 2012-2013 | Year 2014 | Year 2015-2016 | Year 2017 and thereafter | | | | | | |
| Does not exceed 0.5 MW | 4000 | 5500 | 6000 | 6500 | 6800 | 4000 | 3 | 3.3 | 2 | 35 | 92 |
| More than 0.5 MW, but does not exceed 1 MW | 4000 | 5500 | 6000 | 6500 | 6800 | 3800 | 5 | 3.1 | 2 | 35 | 92 |
| More than 1 MW, but does not exceed 2 MW | 4000 | 5500 | 6000 | 6500 | 6800 | 3800 | 6 | 2.8 | 2 | 35 | 92 |
| More than 2 MW | 4000 | 5500 | 6000 | 6500 | 6800 | 3300 | 6 | 2.6 | 2 | 35 | 92 |

Table 4

Benchmarks of fuel price applicable to biogas plants, except for plants using biomass gasification or landfill gases

| Installed electric capacity P_{el} | Fuel price excluding VAT C_{kur}^1 , EUR/MWh | | | | | | | | |
|--------------------------------------------|------------------------------------------------|-------|-------|-------|-------|-------|-------|-------|-------------------|
| | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 | 2014 | 2015 | 2016 ¹ |
| Does not exceed 0.5 MW | 21.12 | 21.82 | 21.56 | 22.47 | 22.99 | 22.99 | 23.15 | 23.20 | 23.30 |
| More than 0.5 MW, but does not exceed 1 MW | 26.46 | 27.33 | 27.00 | 28.13 | 28.78 | 28.78 | 28.98 | 29.04 | 29.16 |
| More than 1 MW, but does not exceed 2 MW | 28.71 | 29.66 | 29.30 | 30.53 | 31.23 | 31.23 | 31.45 | 31.51 | 31.63 |
| More than 2 MW | 28.71 | 29.66 | 29.30 | 30.53 | 31.23 | 31.23 | 31.45 | 31.51 | 31.63 |

¹ prices for subsequent years are indexed in accordance with the inflation forecast of Table 1

Table 5

Benchmarks of landfill gas price

| Installed electric capacity P_{el} | Fuel price excluding VAT C_{kur} , EUR/MWh |
|--------------------------------------|----------------------------------------------|
| | All years |
| All capacities | 10 |

Table 6

Benchmarks applicable to biomass and biomass gasification plants

| Installed electric capacity P_{el} | Number of working hours per year d (h) | Specific investment I_{ip} (EUR/kW _{el}) | Number of employees A (eligible workload) | Operating costs per year I_M (% of the total investment) | Other operating costs per year I_O (% of the total investment) | The efficiency factor for calculation of the heat sales price η_{ref} (%) |
|------------------------------------------|------------------------------------------|------------------------------------------------------|---------------------------------------------|------------------------------------------------------------|------------------------------------------------------------------|--------------------------------------------------------------------------------|
| Does not exceed 1 MW | 5500 | 4500 | 3 | 2 | 2 | 80 |
| More than 1 MW, but does not exceed 4 MW | 5500 | 4000 | 5 | 2 | 2 | 80 |
| More than 4 MW | 5500 | 3600 | 7 | 2 | 2 | 80 |

Table 7

Benchmarks of fuel price applicable to biomass and biomass gasification plants

| Installed electric capacity P_{el} | Fuel price excluding VAT C_{kur}^1 , EUR/MWh | | | | | | | | |
|--------------------------------------|------------------------------------------------|------|------|------|------|------|------|------|-------------------|
| | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 | 2014 | 2015 | 2016 ¹ |
| All capacities | 11.3 | 12.6 | 9.2 | 9.5 | 11.1 | 10.9 | 11.1 | 11.2 | 11.2 |

¹ prices for subsequent years are indexed in accordance with the inflation forecast of Table 1

Table 8

Benchmarks applicable to natural gas plants

| Installed electric capacity P_{el} | Number of working hours per year d (h) | Specific investment I_{ip} (EUR/kW _{el}) | Number of employees A (eligible workload) | Operating costs I_{DG} (EUR/MWh) | Other operating costs per year I_O (% of the total investment) | The efficiency factor for calculation of the heat sales price η_{ref} (%) |
|------------------------------------------|------------------------------------------|------------------------------------------------------|---------------------------------------------|------------------------------------|------------------------------------------------------------------|--------------------------------------------------------------------------------|
| Does not exceed 1 MW | 6000 | 1600 | 1 | 13 | 1.5 | 92 |
| More than 1 MW, but does not exceed 2 MW | 6000 | 1300 | 3 | 12 | 1.5 | 92 |
| More than 2 MW, but does not exceed 4 MW | 6000 | 1200 | 4 | 11 | 1.5 | 92 |

Table 9

Benchmarks of the natural gas sales price

| Year | 2016 | 2017 | 2018 | 2019 | 2020 | 2021 | 2022 | 2023 |
|-----------------------------------------------------------------------------------------------------|-------|-------|-------|-------|-------|-------|-------|-------|
| The projected annual average natural gas sales price, EUR / thousand n.m ³ (without VAT) | 158.6 | 176.2 | 185.8 | 193.1 | 199.7 | 205.4 | 210.4 | 210.4 |
| Year | 2024 | 2025 | 2026 | 2027 | 2028 | 2029 | 2030 | 2031 |

| | | | | | | | | |
|-----------------------------------------------------------------------------------------------------|-------|-------|-------|-------|-------|-------|-------|-------|
| The projected annual average natural gas sales price, EUR / thousand n.m ³ (without VAT) | 210.4 | 210.4 | 210.4 | 210.4 | 210.4 | 210.4 | 210.4 | 210.4 |
|-----------------------------------------------------------------------------------------------------|-------|-------|-------|-------|-------|-------|-------|-------|

”

21. This regulation shall take effect on the first day of the following full calendar month after the European Commission has adopted a decision on compliance of the state aid conditions with the European Union’s internal market conditions within the framework of the State Aid Scheme SA.43140 (2015/NN) “Aid to Electricity Producers”.

22. After the European Commission has adopted a decision on compliance of the state aid conditions with the European Union’s internal market conditions within the framework of the State Aid Scheme SA.43140 (2015/NN) “Aid to Electricity Producers”, the Ministry shall send a corresponding notice for publication in the official publication “Latvijas Vēstnesis”.

Prime Minister

M. Kučinskis