**Abstract**

*Title:* **About one of the possible effects of the current distortions on the electricity market in Central Europe**

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*Overview:* Subsidizing the production of electricity from renewable sources in Germany has been so extensive to begin a notable influence on the electricity supply and demand in Slovenia. Germany has started to be great net exporter of electric power. In 2015 net electricity exports accounted for 9% of its final electricity consumption. From 2011 to 2016 the price of electricity on the European energy exchange market has fallen by 43%. In this process Slovenia has become a big net importer of electric power. Market distortions in Central Europe could cause the business difficulties of Coal Mine Velenje and Thermal Power Plant Šoštanj producing 3,6 TWh of electric power, covering more than 1/3 of final electricity consumption in Slovenia.

*Methodology:* Direct and indirect impacts of a given volume and the structure of spending reduction were evaluated as follows:

**M = (I-Ad)-1 \*Y**

**H = (diag GDP/X) \* (I-Ad)-1 \*Y**

**G = Au \* (I-Ad)-1 \*Y**

**Z = (diag F/X) \* (I-Ad)-1 \*Y**

**M** is the impact on activity (income) by industries as a consequence of simulated reduction in electric power production (**Y);** the sum of these sectoral effects shows total impact on the economy; The **Ad** is the matrix of technical coefficients – with the column of the domestic input in the given industry divided by its income; **I** is an identity matrix with ones on main diagonal and zero elsewhere, and **(I-Ad)-1** is a multiplier.

**H** is the impact of a decline in income of electric power production (**Y)** on value added where **diag GDP/X** is adiagonal matrix formed by sectoral value added (**GDP**) divided by income in this sector (**X**).

**G** is the impact of a decline in income of electric power production (**Y)** on imports. **Au** is the import component of the technological matrix, obtained by dividing the imports to the industry by its income.

**Z** is the impact of a decline in income of electric power production (**Y)** on the engagement of production factors; **F** isthe number of employees or the value of the fixed assets or the R&D investment by sectors; **diag F/X** is a diagonal matrix formed by sectoral coefficients between an engaged production factor (**F)** divided by sectoral income (**X**).

Results: Business problems of Coal Mine Velenje and Thermal Power Plant Šoštanj might lead to a decline of demand on the production chain of these two enterprises as well as to reduction in personal, investment and public spending that would all together influence the loss of a billion euros in Slovenian value added and 27 thousand jobs. Further consequence would be 5.8 billion euros of unused fixed assets, the fall of research and development investment for 17 million euros and the reduction in general government revenues for 380 million euros. At the annual level, the initial negative impact of the closure of the Coal Mine Velenje and Thermal Power Plant Šoštanj would excess the 3% of Slovenia GDP and employment.

The potential loss of the Slovenian economy due to the termination of the operation in the Coal Mine Velenje and Thermal Power Plant Šoštanj during the whole of the expected period of their existence (until the year 2054) would have amounted to 5 billion euros of gross value added (in 2015 prices), of which 2.5 billion euros would be the lost gross income of employees, 1.8 billion euros would be the lost in government revenue and 1.2 billion euros would be the lost in gross operating surplus.

*Conclusions:* Huge subsidies to price inefficient electric power producers in one part of European Union have a strong influence at the location of the electric power production, and following a transitional period the consequences will also spread to geographical locations of other sectors of activity – the research area of the geography of energy (Hamhaber 2015). One of the results is going to be a reduction of the added value in the countries with vanishing electric power production. Possible victim is Slovenia. Therefore we appeal to the government and stakeholders to act quickly as there is still time to prevent negative scenarios in Slovenian energetic.

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