

Based on the findings of the Environmental Protection Agency, at the top of the list of sources of harmful substances in Serbia are the production of electricity and heat, individual furnaces and industry, while much less, although certainly not neglected, is road traffic. Separate sectors contribute differently when it comes to emissions of individual pollutants, so thermal power plants account for 90 percent of sulfur oxide emissions and over 50 percent of nitrogen oxide emissions, while individual combustion plants are responsible for almost 60 percent of PM10 pollution and almost 80 percent of emissions. PM2.5 particles. It is estimated that in Belgrade alone, about 300,000 households use home fireplaces for heating, and just over a quarter of the total number in Serbia emits pollutants within the allowed limits. Authorities used it to blame the old recipe on the citizens themselves "who lie what they can". However, although individual furnaces are certainly major polluters, experts point out that the matter is not so simple when it comes to the emission of PM particles themselves. Namely, it is possible to distinguish two categories of this pollutant primary, which are emitted as solid particles, and secondary, which are formed from gases by the process of particulate matter of sulfur and nitrogen oxides. In the days of the greatest measured pollution, the weather conditions often just favored the formation of secondary PM particles.

Therefore, the profession believes that the contribution of individual combustion plants and the production of electricity and heat to the type of pollution is equal. The three domestic thermal power plants, Kostolac, Kolubara and Nikola Tesla, emit six times more harmful gases than prescribed and emit sulfur oxides as much as 50 thermal power plants in Europe. This is also the reason why Serbia is on the list of countries against which the Secretariat of the Energy Community recently initiated a procedure for exceeding the maximum emission set by the National Emission Reduction Plan.

The production of electricity and heat in Serbia is still predominantly from fossil fuels, primarily by burning huge amounts of low-calorie lignite. The reason for that is primarily its availability and price on the Serbian market. Both business entities and private consumers decide to buy the cheapest fuel. When it comes to individual furnaces, 10 percent of the poorest users use almost exclusively solid fuels for heating and cooking, which are the largest source of PM particulate emissions. In addition to coal and wood, solid waste is often burned in them. For most of them, it is a matter of necessity because they are simply not in a position to afford to take into account either their own or someone else's health. However, even those who do not belong to the category of the poorest cannot afford better energy sources. Expensive network connections and the high price of district heating are behind the fact that only a quarter of citizens heat their households in this way.



After the issue of air pollution was raised in public last winter, President Aleksandar Vucic attributed it to huge economic progress and an increase in living standards. The logic is that due to higher earnings, people buy cars more often today, and pollution is normal for all developed societies. In other words, a better life comes at a price.

However, this cannot be further from the truth. Apart from ignoring the heaviest polluters, Vucic is a spin and a real reason for the pollution caused by traffic. It is not that people can now afford more vehicles, but that they cannot afford quality cars with adequate standards. According to the data of the Chamber of Commerce, about 120,000 used cars are imported to Serbia every year, most of which are older than 14 years. Serbia has become a landfill for EU cars that do not meet European standards regarding environmental protection. It is an additional practice to remove DPF filters intended for exhaust gas purification from newer diesel vehicles in order to reduce the cost of repairing the car. The destruction of public transport, primarily rail road transport, forces people to manage by buying vehicles that will soon not be able to pass the technical inspection. Poverty thus turns out to be the main cause of air pollution. People heat themselves on waste and drive garbage because they don't have it for the better.

## **Empty promises and subsidies for the rich**

Truth be told, the authorities, both republican and city, are coming out with measures that need to be taken. Thus, for example, after a long announcement, the state adopted changes to the regulations that enable the reduction of the price of gas connection for households by up to 50 percent. It is estimated that only about 260,000 citizens use that fuel in Serbia, but that with the realization of the started gasification and the cheaper connection in the next few years, about half a million households will be heated by gas. While this may be seen as a step in a better direction, it is far from sufficient.

At the city level, the Draft Air Quality Plan for Belgrade was recently adopted, which covers the intentions of the city authorities in the next decade. Some of the proposed measures relate to improvements related to the City Transport Company, such as the transition from diesel vehicles to electric and natural gas buses, then the improvement and construction of road, bicycle, as well as gas and hot water infrastructure, afforestation of the city, procurement of new compositions for BG-train lines, construction of subways, etc. Although the measures themselves may work well, the Draft Plan has been criticized by the professional public and the work of organizations dealing with issues of urban planning and environmental pollution. Procedural and substantive objections are highlighted, such as the lack of air pollution reduction goals, which would provide a starting point for measuring the



success of the implementation of the Plan, but also the fact that these measures and indicators are inaccurate and descriptive, which makes monitoring the implementation practically impossible. The main reason for doubt that the new plan will be applied in practice lies in the fact that from the previous five-year plan that was adopted in 2016, almost none of the planned was implemented. And just like the previous ones, the new Plan is adopted without the active participation of the public.

On the other hand, the measures that the government pushes to the forefront concern the road transport sector, which is far behind other polluters. A ban on the import of vehicles with EURO 3 engines should come into force in the middle of this year. The number of old cars that are imported and bought clearly shows that this would be quite a blow to most buyers, but also to the huge car industry that has grown around importing used vehicles. Although this type of regulation is necessary from the point of view of environmental protection, there is no doubt that it will hit those with a shallower pocket the hardest. It is estimated that 10-15 percent more will be needed to buy a similar model with a higher engine standard.

The fact that in such a situation the Government of Serbia decided to pass the Decree on subsidizing the purchase of electric and hybrid vehicles, for which about one million euros were allocated from the budget, seems insane. Even if we leave aside the fact that in the given conditions, electricity production is far more harmful to the environment than internal combustion engines, as well as the fact that in Serbia there is no necessary infrastructure for powering electric vehicles (imagine a situation where someone in the middle of the New Belgrade block from the fifth floor he runs an extension cable to his electric car parked in front of the building), it is about this only subsidizing the consumption of the rich. Namely, fully electric or hybrid vehicles often exceed the prices of 20,000 euros, which is a noun for most citizens, even with a maximum subsidy of 5,000 euros.

## Solution for the air pollution

It turns out that the most concrete measure taken to solve the problem of pollution was to change the criteria for assessing air quality. You change the criteria and the air is, look, suddenly clean. Because everything else that is proposed is not enough to achieve the necessary improvement. The question is why is that so? Don't government officials and their relatives breathe the same air? Is it possible that they primarily care about filling their own pockets? Ultimately, a list of measures that need to be taken to achieve cleaner air already exists. To the already listed measures proposed by the government itself should be added the shutdown of thermal power plants, the transition to sustainable energy sources and



subsidizing the shutdown of individual furnaces, and the goal would be achieved. For the most part, the opposition to the public explains all the motivation of the ruling regime through corruption. Undoubtedly, that really plays a huge role. Keeping the overgrown party apparatus in power is possible only if all (or at least most) of its parts have been settled.

However, such an approach overlooks other structural socio-economic constraints that must not be ignored. Despite being punched in the chest by government officials, the productivity of the Serbian economy is still at very low levels. With the exception of a few sectors, Serbia has positioned itself in the global division of labor as a zone of cheap labor and cheap resources. One of the comparative advantages of the domestic economy is the low price of electricity, as well as looking through the fingers of foreign investors in terms of respecting environmental standards. This makes Serbia especially attractive to dirty industry. Thus, over the years, we have witnessed the opening of numerous companies that maximally exploit looking to the side of the competent institutions when it comes to the pollution they create.

The price of electricity has been kept extremely low for many years through abundant subsidies for coal production. This is, among other things, one of the reasons why the installation of solar panels is not cost-effective for the population. On the one hand, cheaper electricity buys a certain social peace from social strata that barely pay their existing monthly bills. On the other hand, it is a conscious decision of the authorities in order to encourage and attract investments in the domestic economy. The first and most effective step to drastically reduce pollution would certainly be the decommissioning of coal-fired power plants, or at least the installation of the necessary filters. However, this would automatically lead to a drastic increase in the price of electricity, which, if everything else remains the same, would hit the most vulnerable sections of the population the hardest. In the long run, the only sustainable measure may be to switch to sustainable energy sources, but the potential that Serbia has is not nearly enough to ensure its energy independence. This could mean additional imports of electricity and its potentially even higher price. However, without an energy transition, it is impossible to get clean air. But even the energy transition cannot take place if the position and interest of the poorest sections of the population are not taken into account. Therefore, a solution for economically and environmentally sustainable production and use of electricity can be sought only in international cooperation. The first precondition for that is that this cooperation is realized on different bases. The Serbian economy, like many others, can no longer be a stock of cheap resources, but in the interest of everyone's health, it is necessary to build a solidarity



system of production and consumption of electricity and heat. The second precondition is the change of the corrupt comprador regime, which puts its own interest before the lives of the citizens in whose name it allegedly speaks.

Source: bilten.rs