

The cause of excessive pollution in Serbia is already well documented, and is predominantly, though not exclusively, in the way of production of electricity and heat, which is primarily obtained by burning large amounts of lignite. Despite the warnings of experts about the dangers to health, low quality coal and low thermal power are mostly used in the public sector and industrial production, but also in private furnaces, due to their price and availability. The increase in profits in the economy and the thickness of wallets among citizens thus dictate that the immediate economic interest takes precedence over the long-term protection of health and life.

The news that Serbia has become one of the signatories of the Sofia Declaration on the Green Agenda for the Western Balkans has aroused optimism in some circles that this will lead to a proactive government policy in terms of solving environmental problems. With this plan, the EU seeks to influence the countries of the region to harmonize with the European goal of achieving climate neutrality by 2050. Serbia, along with BiH, Montenegro, Kosovo, Albania and Northern Macedonia, has pledged to implement measures to prevent climate change and pollution, as well as develop energy efficiency, mobility, the circular economy, biodiversity, sustainable agriculture and food production. In return, these countries will be able to count on 9 billion euros of financial resources from the IPA III program for the period 2021-2027. years. The funds are intended to encourage the reduction of carbon dioxide emissions and assess the socio-economic impact of decarbonization, as well as the development of energy efficiency, the gradual abolition of subsidies for coal, as well as increasing the share of renewable energy sources.

The hope lies that the external pressure of cooperation with the EU (which still represents a key economic associate of Serbia and has a market to which domestic producers export the most) will force local authorities to pay more attention to the issue of reducing pollution. However, it should not be forgotten that these are not the first commitments the country has made to introduce environmental improvements. Those arising from membership in the Energy Community, then the obligations from Chapter 27 for EU accession (environmental protection), but also other international commitments have so far been largely ignored. The funds obtained on this occasion were eventually used to create strategies that remain a dead letter on paper or to create websites as a screen for the complete absence of concrete actions.

In reality, issues of ecology and environmental protection are not on the agenda of the Serbian Government at all. This is clearly evidenced by the fact that the draft budget of the city of Belgrade for 2021 reduced investments in the fight against air pollution by 45 million dinars compared to the already insufficient amount from 2020. Instead of urgently

addressing the environmental catastrophe, the government's strategy is to as in similar situations, he points the finger at citizens and their "irresponsible" behavior. It is true that private energy consumption, primarily for the production of thermal energy in private furnaces, significantly contributes to the level of pollution. However, the fact is that a drastic reduction would be achieved in the short term by installing filters in large furnaces in thermal power plants, heating plants and industrial plants, introducing measures that would encourage private users to switch to other types of energy, as well as better monitoring and penalties for those economic entities that do not respect the legal regulations on environmental protection.

Renewable energy

When it comes to renewable energy sources (RES), it is estimated that from the available potentials, Serbia could meet about 50 percent of energy needs. Currently, RES participate with about 21-22 percent in energy production - a share that has not changed much in the past decade, and despite the fact that Serbia, based on international commitments, should reach 27 percent by 2020.

In this group of energy sources, the greatest potential lies in hydro energy and biomass. When it comes to the exploitation of water resources, over 60 percent has already been used. A good part of the untapped potential concerns smaller hydro streams on which the construction of mini hydro power plants is planned, whose negative environmental impact exceeds the potential benefits for society.

Biomass exploitation has the greatest potential - it is estimated at almost 3.5 million tons of oil equivalent (tan) per year, which makes over 60 percent of available RES and has the potential to meet up to 30 percent of energy needs in Serbia. However, almost half of that is forest biomass, whose further exploitation threatens to worsen the problem of deforestation. The remaining part is agricultural biomass and the remains of agricultural crops and fruit trees, of which only about 2 percent is used for energy production.

Although it may seem unbelievable to those living in the Kosava wind areas, Serbia is not doing too well in terms of wind potential. There are only a few locations where wind farms would be economically viable. The situation is somewhat better in terms of solar energy potential, however this source is almost completely untapped. One of the main obstacles is the lack of regulation, which prevents private users from installing solar panels and connecting to the energy network with them.

Another great potential that is completely untapped lies in geothermal springs. Serbia abounds in hot water springs, since with 238 springs and wells, it has the most so-called

geothermal phenomena in relation to the number of inhabitants. Natural and artificial thermal water sources are located in more than 60 municipalities and could be used primarily for thermal energy production, but they are currently used exclusively for spa tourism.

This review of energy potential shows us that the situation in terms of switching to renewable energy sources, which will not leave great environmental consequences, is quite complex. It can hardly be expected that with the existing resources, Serbia will ensure energy independence, but the seriousness of the situation regarding environmental pollution imposes that a radical turn in the current policy is necessary. This can certainly not be achieved only within an individual economy, but through international cooperation and cross-border redistribution of energy obtained from clean and renewable sources, it is possible to meet energy needs.

Source: bilten.org