DECLARATION OF THE MEMBERS OF THE CLIMATE COALITION BULGARIA

Reform Is Possible: Bulgaria Can and Must Transform Its Energy Sector

Reducing greenhouse gas emissions from coal-fired power plants by 40% by 2026 is achievable and gives Bulgaria a competitive advantage

Bulgaria can implement reforms to reduce greenhouse gas emissions from coal-fired power plants by 40% by 2026 and implement a gradual exit from coal dependence by 2038 at the latest. This reform has been agreed with the European Commission in Bulgaria’s National Recovery and Resilience Plan (NRRP). The energy transition is imperative not only because of the climate crisis, but also to modernise the Bulgarian economy and energy sector. This requires systematic work to transform the energy sector and transition from fossil fuels to renewable energy sources. This is the position of energy experts, environment and climate advocates united in the Climate Coalition Bulgaria.

Coal-fired power plants are the largest source of greenhouse gas (GHG) emissions in Bulgaria\(^1\). They should therefore be addressed as a priority in decarbonisation efforts. At the same time, converting coal-fired capacity to gas, biomass, waste or other sources will not lead to economic viability or climate neutrality, but will exacerbate energy dependence and air pollution problems.

In addition to the impact of greenhouse gas emissions on the climate, the lack of an energy transition is associated with very serious health consequences for Bulgarian citizens from air pollutants that are not taken into account in economic models, nor included in the price of energy produced. According to 2018 estimates, the health damage to the country from emissions of hazardous pollutants such as fine particulate matter, sulphur dioxide and nitrogen oxides from coal-fired power plants costs the Bulgarian health system

\(^1\) According to the National Greenhouse Gas Inventory Report of April 2022, the share of the energy sector in Bulgaria's greenhouse gas emissions is 70.3%, and the combustion of solid fuels (coal) is responsible for 49.7% of this sector's emissions (https://eea.government.bg/bg/dokladi/BG_NIR_15April_2022.pdf, p. 57).
between EUR 1 and 1.8 billion and EUR per year\(^2\). In 2016 alone, emissions of these pollutants from coal-fired power plants in Bulgaria resulted in 607 premature deaths, 13,865 symptom days in children with asthma and 298 cases of chronic bronchitis in adults. Bulgaria is already under a sanctions procedure for the unacceptable exposure of Bulgarian citizens to this pollution\(^3\).

For these reasons, we believe that achieving the decarbonization goals set forth in the NRRP is critical to the country and that accelerated decarbonization becomes a matter of national security and the nation's future.

However, the implementation of these goals does not mean the collapse of the Bulgarian energy sector. A report by the Electricity System Operator (ESO) from October 2022\(^4\), based on resource adequacy modelling and covering energy supply and demand in Bulgaria and the region, shows clearly that a 40% reduction in greenhouse gas emissions from coal-fired power plants will not lead to risks for the country's system adequacy of electricity supply, but there will be a need for diversification of the technologies that provide balancing of the grid, as well as strong and clear political support for the development and deployment of new energy sources.

In the modelling of reform implementation conducted as part of the Energy Transition Commission's work, it is clear\(^5\) that reform is feasible and that the incremental costs of an accelerated energy transition do not exceed the health costs cited above. A large part of the necessary investment costs are already planned under various financial instruments supporting the achievement of the European Green Deal objectives.

In addition, there is no guarantee that coal-fired power plants will be able to continue to generate and sell electricity on a market basis after 2025-2030, as all subsidies to this sector will cease after this period. Renewable energy from solar and wind has already established itself as the cheapest energy source in Europe's electricity markets. With grid capacity and energy storage options, fossil fuel power plants can hardly compete with electricity generated from renewables.

---


\(^4\) Page 20 in the analysis of the Electricity System Operator "Bulgarian resource adequacy assessment, 2022 edition": "No adequacy concerns in the Bulgarian bidding zone were detected in each set of 700 Monte-Carlo simulations for different scenarios and TYs. Even gas crisis, CO2 reduction, and lignite fleet closure don't affect the adequacy of the Bulgarian bidding zone, respectively in the short, medium, and long term. The text of the analysis is here: [https://www.eso.bg/fileObj.php?oid=4252](https://www.eso.bg/fileObj.php?oid=4252)

\(^5\) In media publications, Commissioners have quoted costs of €1.2 billion a year. This amount is subject to refinement in the final report of the Energy Transition Commission.
In this context, the construction of RES in neighbouring countries could turn Bulgaria into a net importer of electricity, regardless of the preservation of the plants, due to the competitive advantages of RES energy, but especially due to low and stable RES prices and the need to pay for carbon emissions within the reformed European carbon market.

Greece, for example, is moving towards a new target of over 80% green energy in its electricity mix by 2030. The share of renewables is increasing in neighbouring Romania to over 50%, and growing in all other neighbouring countries. Both the mentioned countries have announced coal phase-out in 2028 for Greece and 2030 for Romania respectively, despite short-term increases in coal use or temporary postponement of some interim targets for closure of plants and mines. North Macedonia is also betting on an accelerated energy transition, and there is increased investment interest in the region from companies that would only invest if they could rely on enough green energy to meet their individual decarbonisation targets.

The transformation of existing coal-fired capacity should be directed towards the production and storage of renewable energy from solar and wind, making maximum use of existing infrastructure, disturbed and reclaimed land. The Maritsa basin energy complex can maintain its leading position as an energy hub for the country, but also for the region, due to its proximity to the major cities and ports on the Balkan Peninsula. This hub has the human potential and infrastructure to be developed for the benefit of both local communities and national interests. Delaying the transformation will put the region at risk of an abrupt end to the industry, without a gradual and planned transition.

In contrast to the commitment for complete closure of 1.6 GW of capacity in an earlier version of the NRRP, the 40% target implies a variety of means to achieve it. These should be at the heart of the discussions of the Energy Transition Commission of the European Green Deal Advisory Board, in particular: the possibility that, with the target thus formulated, certain coal-fired capacity could be available as seasonal reserve and operated where there is a real risk to the power system or where it is economically viable to include it. This means preserving jobs in the thermal sector and losing jobs only in the mining sector, where a mix of solutions can fully compensate those affected.

In the final trialogue on 16-18 December 2022, the European Union finalized the decision that electricity generators and heavy polluters covered by the Emissions Trading Scheme

---

6 Statement by the Greek Minister of Energy and Environment, November 2022, available here: https://balkangreenenergynews.com/greece-targets-80-from-renewables-by2030with-28-gw-plus-7-gw-storage

must limit their pollution by 62% by 2030. The agreement also mandates that all revenues generated by the carbon market must be spent on climate action.

Therefore, we call on Bulgarian institutions and all stakeholders to work for an effective expert dialogue to formulate the necessary actions for a rapid and successful decarbonisation of the Bulgarian energy sector - through the creation of a Roadmap for Climate Neutrality of the Bulgarian Economy, setting realistic deadlines for the closure and output reduction of specific coal-fired power plants. This will best support affected workers and communities in coal regions with the EU funds now available under the Just Transition Fund and the NRRP.

The Roadmap should be prepared and adopted as soon as possible, including an awareness-raising campaign on the benefits of the energy transformation, supporting the work of the European Green Deal Council (EGDC) and the Energy Transition Commission (ETC) and other relevant EGDC Commissions, which work to accelerate economic modernization and raise living standards in Bulgaria.

The roadmap and reform for the decarbonisation of the energy sector should be enacted with corresponding changes to the Climate Change Mitigation Act, the Long Term Strategy and the Integrated Energy and Climate Plan.

For more information:

Apostol Dyankov, WWF Bulgaria: adyankov@wwf.bg
Meglena Antonova, Greenpeace Bulgaria: meglena.antonova@greenpeace.org
Todor Todorov, Ecological Association Za Zemiata: t.todorov@zazemiata.org

More about Climate Coalition Bulgaria

The Climate Coalition Bulgaria is an informal platform established in 2005. It brings together energy experts, academics, conservation and business organisations, as well as individual members working to limit climate change. The Coalition's experts prepare recommendations and positions on plans, strategies and laws directly or indirectly related to climate change. Its representatives participate in inter-ministerial working groups and citizens' councils working at national and international level.

Among the members of the Coalition are WWF Bulgaria, Greenpeace Bulgaria, Ecological Association Za Zemiata, the Green Policy Institute and others. BlueLink civic engagement network coordinates and supports the actions of the Climate Coalition.

---

8 The EU has reached agreement on critical climate policies after a marathon of negotiations. 