

Incremental Capacity Demand Assessment Report between Bulgaria and Romania

23.10.2023

This report is a joint assessment of the potential incremental capacity projects developed by:

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Table of Contents

A. Non-binding demand indications.....	4
B. Demand assessment.....	6
i. <i>Historical usage pattern</i>	6
ii. <i>Results of the current annual yearly auction for firm capacity products</i>	6
iii. <i>Temporary arrangements for the auction of existing capacity at IPs</i>	6
iv. <i>Expected amount, direction and duration of demand for incremental capacity at interconnection points on the Bulgaria-Romanian border</i>	7
v. <i>Preparation of the conditions related to the non-binding demand indications</i>	8
C. Conclusion for the initiation of an incremental capacity project/process.....	8
i. <i>Indicative timeline</i>	9
D. Fees.....	10
E. Contact information.....	10

A. Non-binding demand indications

During the period of collection of non-binding demand indications for incremental capacity within the market demand assessment process for incremental capacity launched by Transgaz and Bulgartransgaz in July 2023, immediately after the start of the annual yearly capacity auction (3 July 2023), as provided for in Article 26 of Regulation (EU) 2017/459 (CAM NC), gas market participants submitted indicative demands for incremental capacity as follows:

- **Non-binding demand indications that were received by both TSOs within 8 weeks after the start of the annual yearly capacity auction;**
- **Non-binding demand indications that were received only by Bulgartransgaz later than 8 weeks after the start of the annual yearly capacity auction.**

In accordance with CAM NC requirements, transmission system operators may consider non-binding demand indications submitted after the deadline set out in art. 26, paragraph 6 in the ongoing market demand assessment, or introduce them into the next market demand assessment.

The involved TSOs, Transgaz and Bulgartransgaz, have agreed to consider all non-binding demand indications received in this cycle of the incremental capacity market demand assessment process:

- **The demand indications received within 8 weeks include non-binding demand for incremental capacity in the Bulgaria → Romania direction for 10 consecutive gas years, in the period from 2028/2029 to 2037/2038, at the Interconnection point (IP) Negru Voda 1/Kardam. The indicated demand is for 151 917 808.22 kWh/d for the whole period. According to the specified conditions, these non-binding demand indications for incremental capacity are linked to each other and include several interconnection points.**
- **The demand indications received later than 8 weeks include non-binding demand for incremental capacity in the Bulgaria → Romania direction for 15 consecutive gas years, covering the period from 2026/2027 to 2040/2041, for the interconnection points at the BG-RO common border. The indicated demand is for 72 250 275 kWh/d for the period from 2026/2027 to 2027/2028, 101 150 385 kWh/d for the period from 2028/2029 to 2030/2031, and 150 280 572 kWh/d for the period from 2031/2032 to 2040/2041.**

Transgaz and Bulgartransgaz currently offer capacity on two interconnection points located at the Bulgarian-Romanian border:

- **Interconnection Point (IP) Negru Voda 1/Kardam** – a connection between the gas transmission system operated by Bulgartransgaz EAD (Bulgaria) and the national gas transmission system operated by Transgaz S.A. (Romania), located at the Bulgarian-Romanian border near Negru Voda (Romania) and near Kardam (Bulgaria), for the transmission of natural gas in both directions to and from Bulgaria/Romania.
- **Interconnection point (IP) Ruse/Giurgiu** – a connection between the gas transmission system operated by Bulgartransgaz EAD (Bulgaria) and the national gas transmission system operated by Transgaz S.A. (Romania), located at the Bulgarian-Romanian border near the town of Ruse (Bulgaria) and near the town of Giurgiu (Romania), for the transmission of natural gas in both directions to and from Bulgaria/Romania.

Within the current market demand assessment, **no non-binding demand for incremental capacity was indicated in the Romania → Bulgaria direction, at the interconnection points on the common border.**

The subject of this Joint Report will be the analysis of the aggregated non-binding demand indications submitted by market participants.

According to the **Interconnection agreements and Joint Methods for the determination of technical capacities** for **IP Negru Voda 1/Kardam** and **IP Ruse/Giurgiu**, concluded between Transgaz and Bulgartransgaz, in the transmission direction indicated in the demands (BG>RO), the following agreed technical capacity is available as of 01.10.2023:

Technical capacity	IP Negru Voda 1/Kardam (BG>RO)	
	EIC Code: 21Z000000000159I	
	$m^3/day (0^{\circ}C)$	$kWh/day (25^{\circ}C / 0^{\circ}C)$
	13 783 240	157 770 849*

*To determine the capacity in energy units, the GCV agreed by the two TSOs for the gas year 2023/2024 was used, i.e. 11,446572 kWh/cm (25°C / 0°C)

Technical capacity	IP Ruse/Giurgiu (BG>RO)	
	EIC Code: 21Z0000000002798	
	$m^3/day (0^{\circ}C)$	$kWh/day (25^{\circ}C / 0^{\circ}C)$
	2 387 952	27 420 397**

** To determine the capacity in energy units, the GCV agreed by the two TSOs for the gas year 2023/2024 was used, i.e. 11.482809 kWh/cm (25°C /0°C)

B. Demand assessment

i. Historical usage pattern

The historical usage data of the concerned interconnection points (IP Negru Voda 1/Kardam and IP Ruse/Giurgiu) is available on the websites of both TSOs and is also published on the ENTSO-G Transparency Platform.

The relevant IP EIC codes are:

21Z000000000159I	21Z0000000002798
IP Negru Voda 1/Kardam	IP Ruse/Giurgiu

ii. Results of the current annual yearly auction for firm capacity products

In the annual yearly firm capacity auction held on the Regional Capacity Platform (RBP) on 03.07.2023 for the joint interconnection points, no capacity bookings were made at IP Ruse/Giurgiu in the BG>RO direction, and there are no previous bookings that would impact the provision of demand.

For IP Negru Voda 1/Kardam, the following identical results were obtained by Bulgartransgaz and Transgaz:

IP		IP EIC code	Flow direction	Gas year	Offered capacity (kWh/d)	Booked capacity (kWh/d)
Negru 1/Kardam	Voda	21Z000000000159I	BG>RO	2024/2025	140.827.218	1.000.000
Negru 1/Kardam	Voda	21Z000000000159I	BG>RO	2025/2026	140.827.218	1.000.000

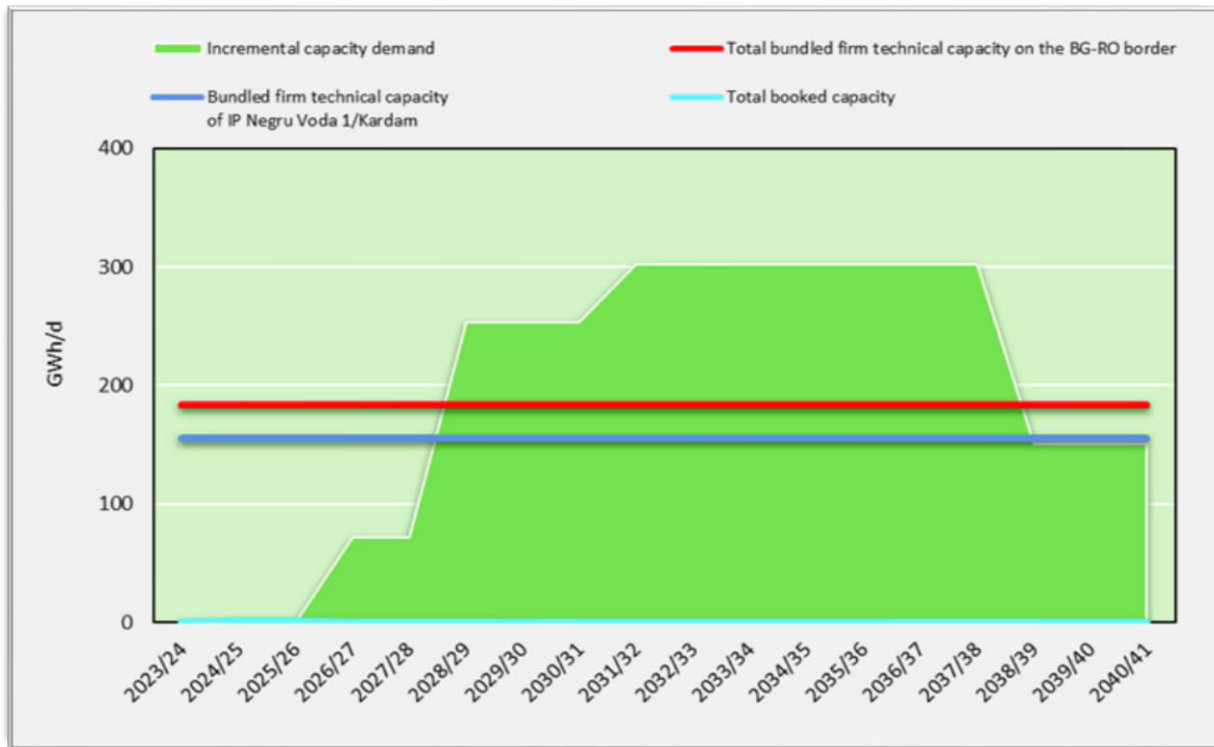
Capacity bookings at IP Negru Voda 1/Kardam in the BG>RO direction for the gas years 2024/2025 and 2025/2026 do not intersect with the requested period in the non-binding demand indications for incremental capacity.

iii. Temporary arrangements for the auction of existing capacity at IPs

There are no temporary arrangements affecting the existing technical capacity at interconnection points in the BG>RO direction at the Bulgarian-Romanian border for the requested period in the non-binding demand indications for incremental capacity.

iv. Expected amount, direction and duration of demand for incremental capacity at interconnection points on the Bulgaria-Romanian border

Gas year	Direction	Bundled firm technical capacity of IP Negru Voda 1/Kardam	Bundled firm technical capacity of IP Ruse-Giurgiu	Total bundled firm technical capacity on the BG-RO border	Total booked capacity	Incremental capacity demand
		(kWh/d) (25°C /0°C)	(kWh/d) (25°C /0°C)	(kWh/d) (25°C /0°C)	(kWh/d) (25°C /0°C)	(kWh/d) (25°C /0°C)
2024/25	BG>RO	157 770 849	27 420 397	185 191 246	1 000 000	0
2025/26	BG>RO	157 770 849	27 420 397	185 191 246	1 000 000	0
2026/27	BG>RO	157 770 849	27 420 397	185 191 246	0	72 250 275
2027/28	BG>RO	157 770 849	27 420 397	185 191 246	0	72 250 275
2028/29	BG>RO	157 770 849	27 420 397	185 191 246	0	253 068 193
2029/30	BG>RO	157 770 849	27 420 397	185 191 246	0	253 068 193
2030/31	BG>RO	157 770 849	27 420 397	185 191 246	0	253 068 193
2031/32	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2032/33	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2033/34	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2034/35	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2035/36	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2036/37	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2037/38	BG>RO	157 770 849	27 420 397	185 191 246	0	302 198 380
2038/39	BG>RO	157 770 849	27 420 397	185 191 246	0	150 280 572
2039/40	BG>RO	157 770 849	27 420 397	185 191 246	0	150 280 572
2040/41	BG>RO	157 770 849	27 420 397	185 191 246	0	150 280 572



In the period from the gas year 2028/2029 to 2037/2038 (10 consecutive gas years), the non-binding demand for incremental capacity significantly exceeds the total technical capacity existing at both interconnection points existing on the Bulgarian-Romanian border.

v. Preparation of the conditions related to the non-binding incremental capacity demand indications

According to the specified conditions, there are non-binding demand indications for incremental capacity that are linked to each other and include several interconnection points. The non-binding demand indications for the relevant interconnection points were submitted to the respective transmission system operators.

C. Conclusion for the initiation of an incremental capacity project/process

The results of the market demand assessment, based on the non-binding demand indications received, show significant interest in the demand for incremental capacity in the direction from Bulgaria to Romania. The requested indicative demand for incremental capacity by market participants is for 10 consecutive years and is higher than the total existing technical capacity of interconnection points at the Bulgarian-Romanian border in the BG>RO direction.

Over the years, Bulgartransgaz and Transgaz successfully cooperated and implemented a number of joint activities to maximise the capacities of existing interconnection points. Considering that the total existing technical capacity at interconnection points on the common border in the BG>RO direction will be insufficient to meet the expected demand level for the 10 indicated years (from the gas year 2028/2029 to 2037/2038) as well as all other economically efficient means for maximising the availability of existing capacity are exhausted, **an incremental capacity project should be initiated. Both TSOs made the decision to cooperate in conducting technical studies for incremental capacity projects at the border (IP Negru Voda 1/Kardam and IP Ruse-Giurgiu) in order to ensure sufficient capacity (total technical and incremental) expectedly to meet maximum indicated cumulated non-binding demand level of up to 302 198 380 kWh/d.**

i. Indicative timeline

Bulgartransgaz and Transgaz intend to carry out the technical studies according to the following indicative timeline:

Description of the tasks	Expected starting date	Expected completion date
Publication of DAR	23.10.2023	
Technical studies for incremental capacity project	24.10.2023	15.01.2024
Public consultation on draft Project proposal	16.01.2024	16.02.2024

This timeline has a provisional character and is therefore indicative and subject to change. Following the end of the public consultation and further refinements of the draft Project Proposal, the TSOs will submit the draft Project Proposal to the relevant NRAs for coordinated approvals. In case of positive decision of the NRAs, the binding phase will start, and a notice will be published on the TSOs’ websites at least 2 months before the binding phase. The process for the binding phase will be detailed in the draft Project Proposal. The TSOs intend to hold the binding phase on 1st of July 2024.

D. Fees

Neither Bulgartransgaz EAD, nor Transgaz S.A. have imposed fees for the evaluation and processing of non-binding demand indications for incremental capacity.

E. Contact information

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