Emphasis of DAM and IDM March 2022



March 2022

DAM RESULTS in the IPS of UKRAINE

VAT) was transferred to electricity sellers on the DAM

<u>Legislative changes in the electricity market, which were extended in March:</u>

✓ NEURC's Resolution №333 dated on 27 February, 2022: during the special period, one trading zone – the IPS of Ukraine was identified within Ukraine.

✓ NEURC's Resolution №333 dated on 27 February, 2022 :

since the delivery date of 28 February 2022, there are restrictions on the minimum declared prices on DAM in the IPS:
for hours of maximum load (from 07:00 to 23:00) – 2 646,25 UAH/MWh (net of VAT)
for hours of minimum load (from 00:00 to 07:00 and from 23:00 to 24:00) – 1 378,97 UAH/MWh (net of VAT).

✓ NEURC's Resolution №354 dated 26 March, 2022:

since the delivery date of 28 February 2022, for electric power producers using type D generating units, regardless of other licenses availability (except for electric power producers using hydro or renewable energy sources), the maximum volume of sales under bilateral contracts for day D is determined as 125% of the total energy volume produced for D-3 of this market participant in accordance with the available commercial accounting data in the market management system at the time of the TSO calculation. The TSO brings to the MO maximum sales of electricity on the DAM on each electricity producer, based on the maximum volume of sales been calculated.

The volume of accepted electricity

1,189 GWh

Index BASE

2 225,01 UAH/MWh

227

active participants

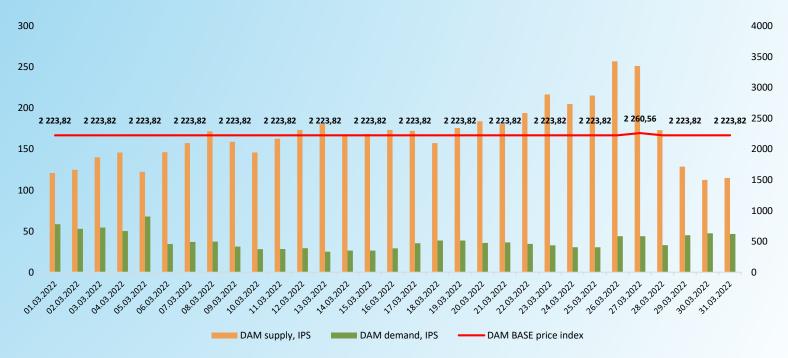
DAM in the IPS, MARCH 2022

Emphasis:

- √ The BASE index increase of 12,7% (+ UAH 251,47) due
 to restrictions of the minimum declared prices
- ✓ The reduced demand of 67,1% (-2 422,1 GWh, amounted to 1 188,6 GWh in March), from suppliers by -70,5%, DSOs by -57,2%, producers by -28,9%, consumers by -41,8% because of the military actions on the territory of Ukraine. There was a slight increase in purchases from the TSO by + 16.3%
- ✓ Reduction of supply by -7,4% (-417,6 GWh, the offer in March amounted to 5 200,2 GWh) from all electricity market participants, except producers who increased sales by + 20,2%
- The sale of imported electricity on the DAM did not take place
- √ The BASE index on European markets was higher than the IPS base load price index



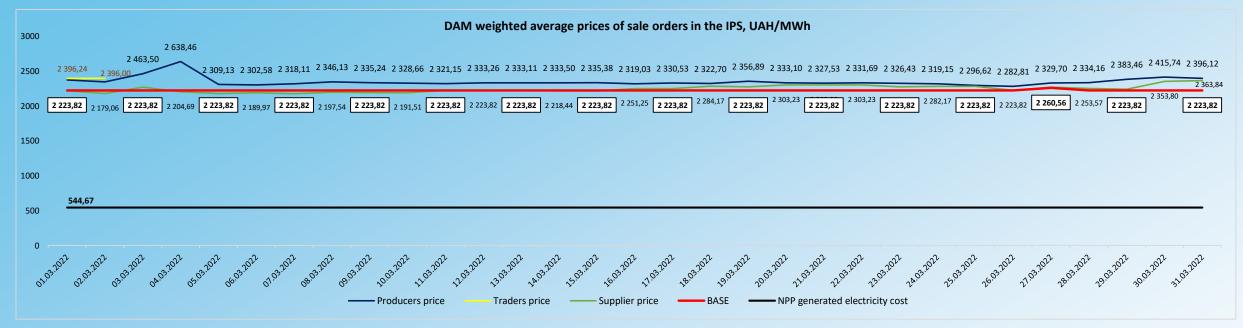
DAM demand and supply in the IPS

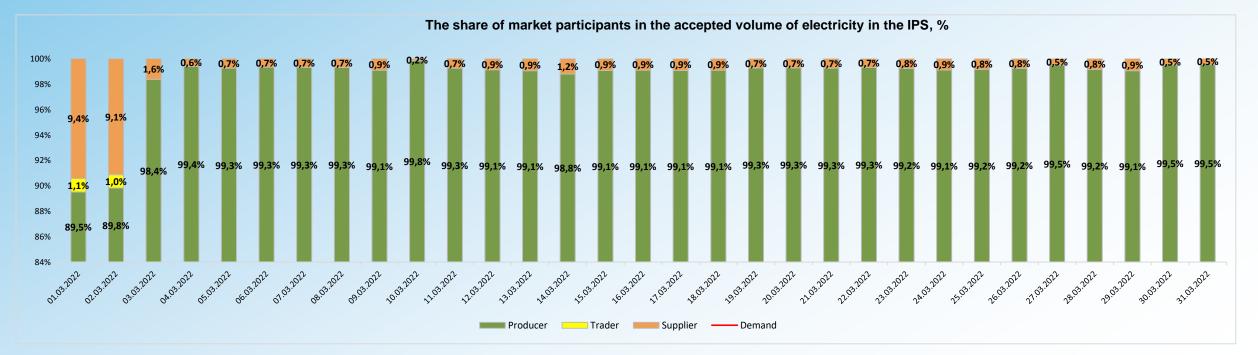


^{*}comparison with February 2022

^{**}Sales volumes of the Guaranteed buyer are considered in sales volumes of producers, purchase volumes of the Guaranteed buyer - in purchase volumes of suppliers

DAM in the IPS





March 2022

IDM OUTCOMES in the IPS of UKRAINE

VAT) was transferred to electricity sellers on the IDM

Legislative changes in the electricity market, which were extended in March:

✓ NEURC`s Resolution №333 dated on 27 February, 2022: during the special period, one trading zone – the IPS of Ukraine was identified within Ukraine.

✓ NEURC`s Resolution №332 dated on 25 February, 2022 (with changes №334 dated 01 March, 2022): the level of minimum prices applies to the IDM in the IPS of Ukraine: in their orders, the participants must indicate the electricity price not less than 110.0% of the DAM price.

The volume of electricity accepted

55,273 *GWh*

Weighted average price 2 687,75

125 of active participants

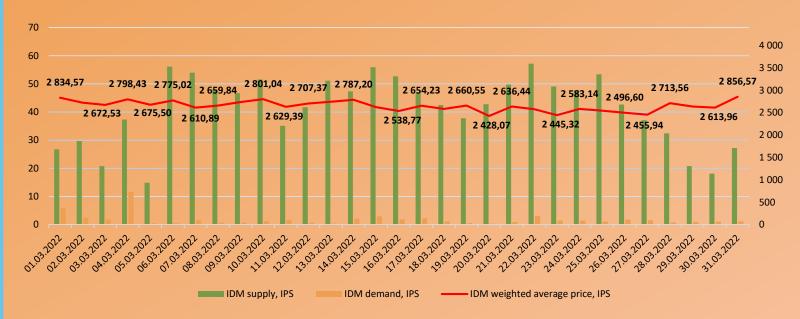
IDM in the IPS, MARCH 2022

Emphasis:

MARKET OPERATOR /EQUILIBRIUM ENERGY/

- ✓ The IDM weighted average price increase in the IPS
 of +21,8% (+481,63 UAH) is due to the restrictions
 of the minimum declared prices on the DAM and
 IDM
- ✓ The reduced demand of -96,2% (-1 415,5 GWh, amounted to 0,56 GWh in March) from suppliers by -97,2%, producers by -49,3% with an increase from DSOs by + 49,2%. Traders and the TSO did not declare purchase volumes
- ✓ Reduction of supply by -47,1% (-1 135,2 GWh, supply in March amounted to 1 275,1 GWh) from producers by -43,8%, suppliers by -88,4%, traders by -87,7%, DSOs by -95,8% and consumers by -95,8%
- ✓ IDM weighted average prices in the IPS are lower than in European countries

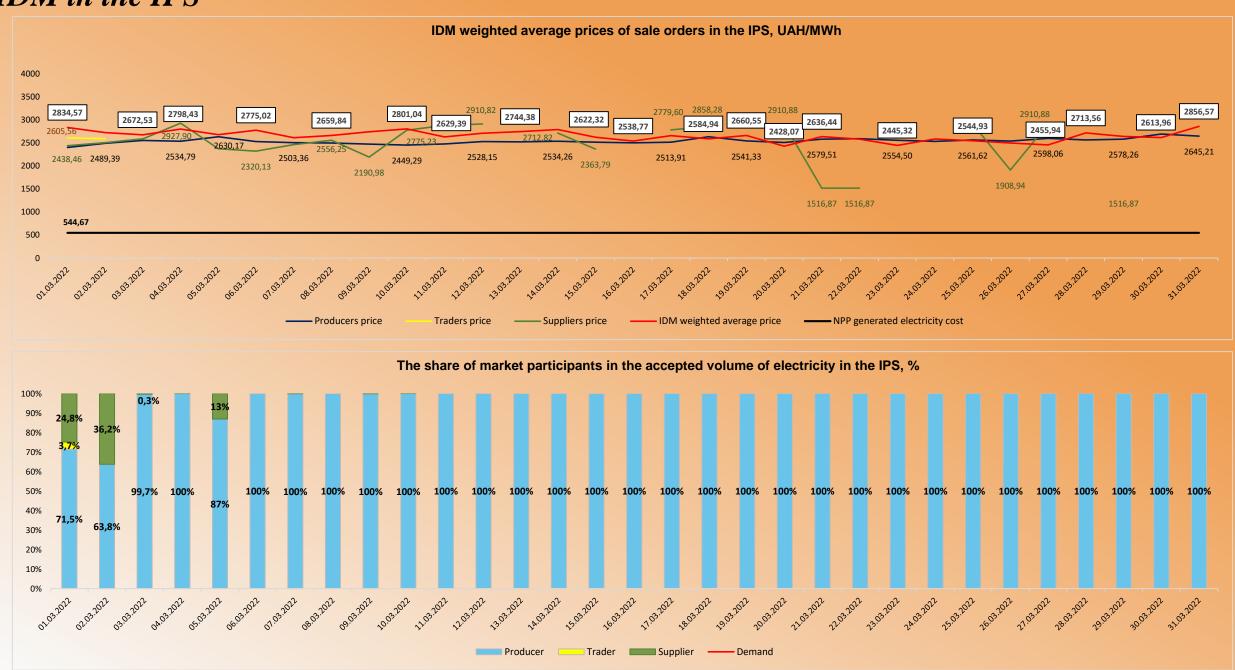
IDM demand and supply in the IPS



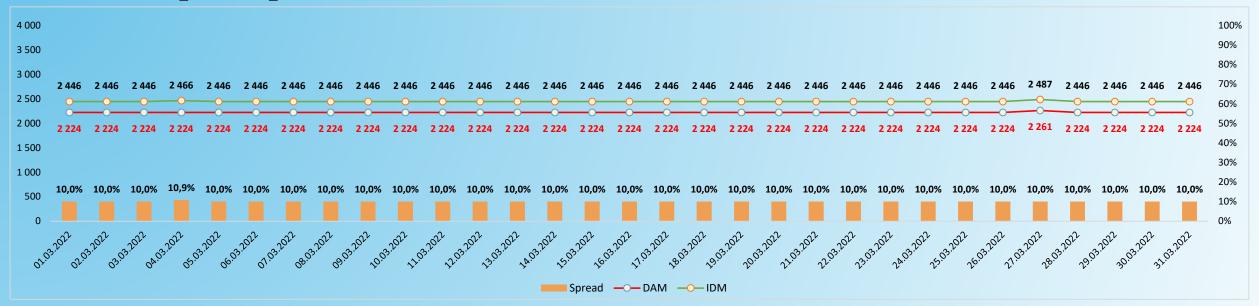
^{*}comparison with February 2022

^{**}Sales volumes of the Guaranteed buyer are considered in sales volumes of producers, purchase volumes of the Guaranteed buyer - in purchase volumes of suppliers

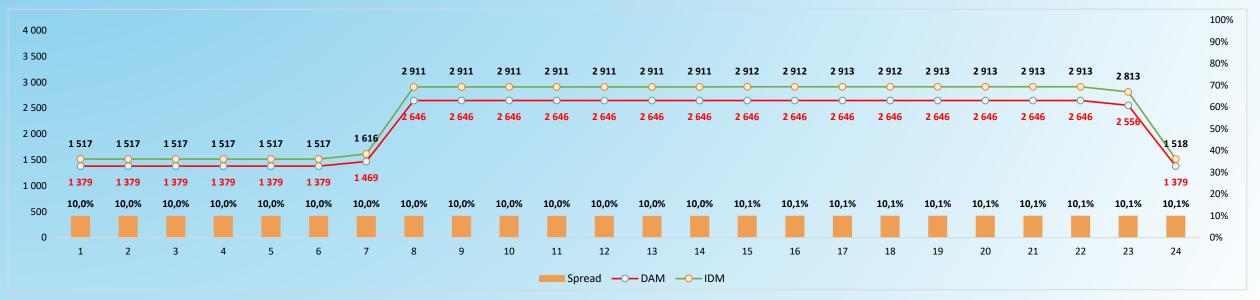
IDM in the IPS



DAM/IDM price spread in the IPS



DAM/IDM price spread (average hourly prices) in the IPS



The spread is calculated at the average prices of the respective days and hours. In the absence of bidding at certain hours on the IDM, the relevant DAM data were not taken into account in the

Price indices of the European countries

The DAM average prices in the IPS of Ukraine were significantly lower than the corresponding indicators of neighboring countries in March 2022: the base-load price indices in the IPS decreased by 53,9% -76,3%.



IPS		Comparison with other countries								
		IPS	Р	L	R	0	Н	U	SI	<
Prices:				IPS/PL		IPS/RO		IPS/HU		IPS/SK
BASE	UAH/MWh	2 225,01	4 824,09	-53,9%	9 038,01	-75,4%	9 405,34	-76,3%	9 202,65	-75,8%
PEAK	UAH/MWh	2 646,25	4 975,58	-46,8%	9 556,95	-72,3%	9 621,50	-72,5%	9 404,06	-71,9%
OFFPEAK	UAH/MWh	1 802,64	4 577,58	-60,6%	8 522,56	-78,8%	9 191,76	-80,4%	9 003,97	-80,0%

The IDM weighted average prices in the IPS of Ukraine remained lower than the corresponding indicators of European countries by 69,2% -72,2% in March 2022.

		IDM	Comparison with other countries		
			SK	CZ	
Price:			IPS/SK	IPS/CZ	
Weighted average	UAH/MWh	2 687,75	9 663,47 -72,2%	8 717,97 -69,2%	

Price indices of the European countries

BASE index on the spot markets of Europe and Ukraine, EUR/MWh								
		2021	2022					
	September	October	November	December	January	February	March	
Ukraine, IPS	66,96	82,35	96,58	91,60	82,29	61,16	67,64	
Ukraine, BEI	52,58	66,06	71,32	69,86	78,93	78,20		
Slovakia	132,67	151,24	185,28	232,06	194,64	171,33	279,34	
Poland	101,95	101,69	118,76	179,79	146,50	115,57	143,75	
Romania	133,89	192,26	212,55	230,21	192,00	188,51	274,22	
Hungary	135,1	197,16	215,87	245,81	204,77	194,27	194,27	
Czech Republic	129,75	140,57	180,21	228,69	179,57	154,98	260,15	
Ukraine, BEI Slovakia Poland Romania Hungary	52,58 132,67 101,95 133,89 135,1	66,06 151,24 101,69 192,26 197,16	71,32 185,28 118,76 212,55 215,87	69,86 232,06 179,79 230,21 245,81	78,93 194,64 146,50 192,00 204,77	78,20 171,33 115,57 188,51 194,27	279, 143, 274, 194,	



