

# **DTEK Group: business description**

**DTEK CEO BRIEFING IN WASHINGTON DC  
28 FEBRUARY – 1 MARCH 2018**

Energy  
in action



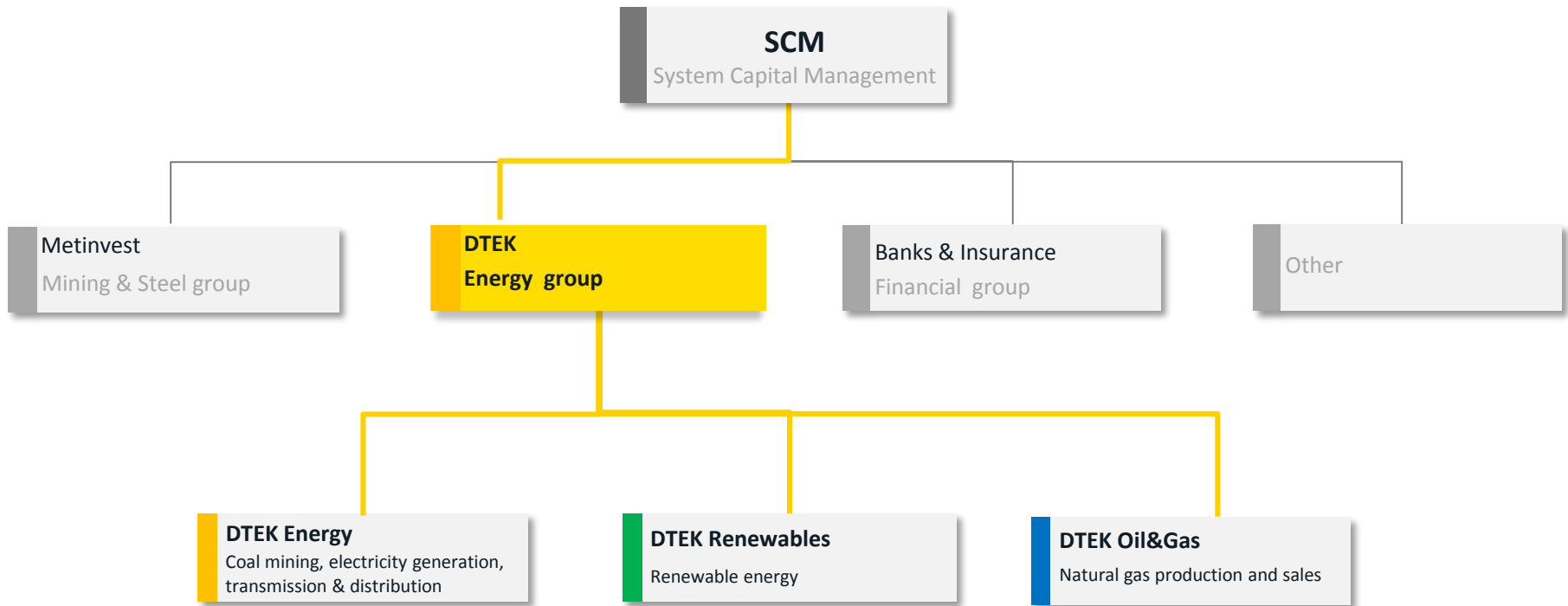


## **DTEK GROUP OVERVIEW**

DTEK ENERGY

DTEK RENEWABLES

DTEK OIL&GAS



**Incorporated in 2000**, System Capital Management (**SCM**) is one of the largest and diversified industrial groups in Ukraine, which controls more than **100 companies**




**Main areas of activity:** energy, mining and steel, as well as banking, telecommunications, media, real estate; operations in Ukraine, USA, Italy, UK, Switzerland, Bulgaria and Russia

Over **300.000 employees** — SCM enterprises are recognized leaders in corporate social responsibility across Ukraine

## DTEK

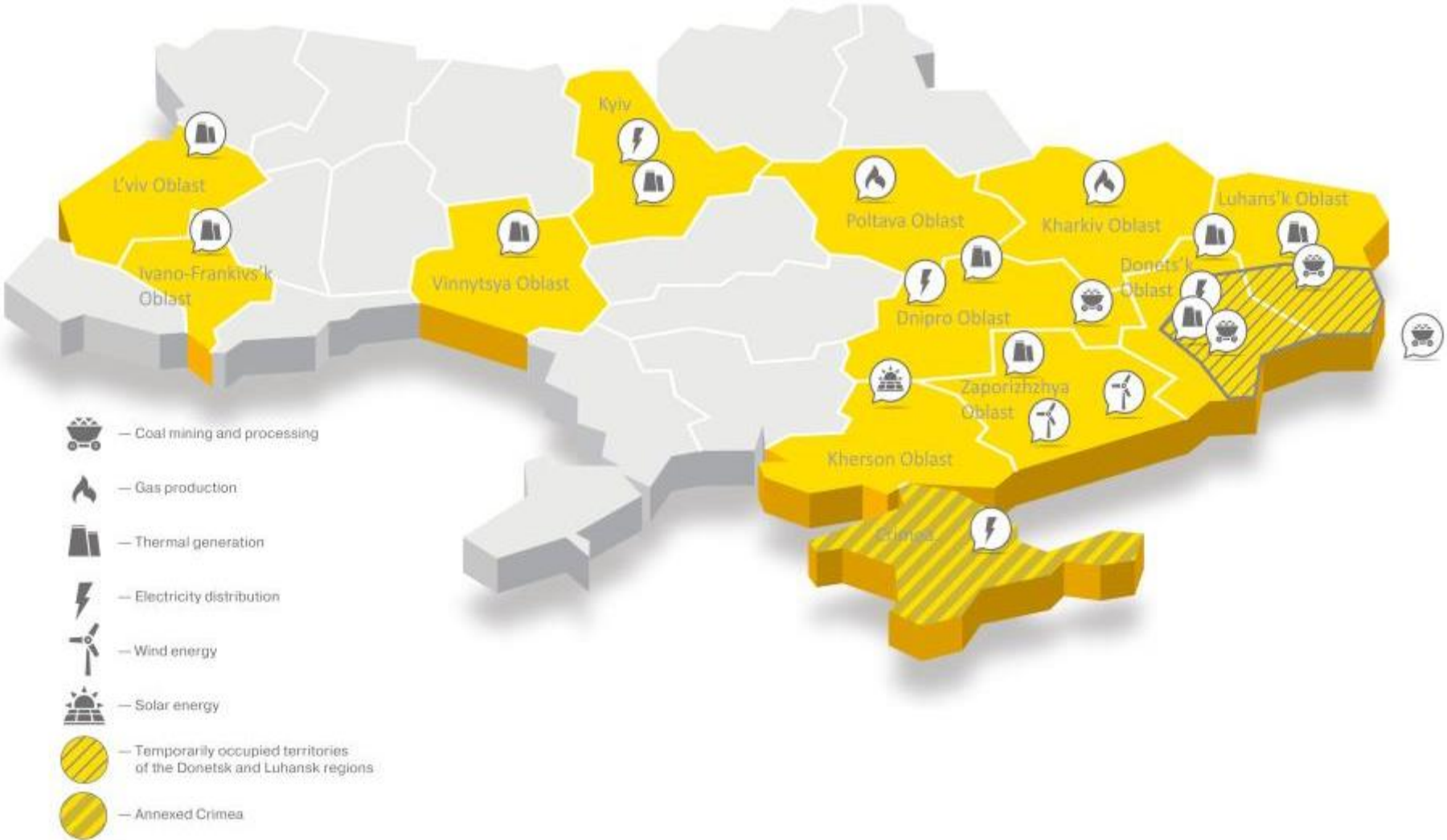
### The leading private vertically-integrated energy company in Ukraine

- As a part of SCM, DTEK is responsible for strategic management of fuel and energy assets of the Group
- Recognized leader in corporate governance, member of Eurelectric, EURACOAL, European Energy Forum, US-Ukraine Business Council, American Chamber of Commerce (ACC), etc., through SCM partners with the **Atlantic Council**
- One of the largest Ukrainian employers (75 000 people)

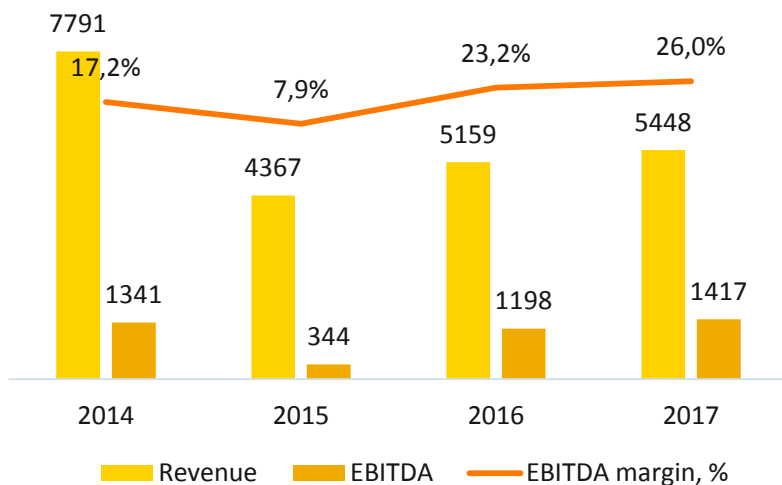
DTEK ENERGY B.V.		<b>COAL MINING AND PROCESSING</b>	<ul style="list-style-type: none"> <li>• 16 mines and 5 coal processing plants<sup>1</sup></li> <li>• Coal mining: 27.7 mln tonnes</li> </ul>
		<b>ELECTRICITY GENERATION</b>	<ul style="list-style-type: none"> <li>• 9 coal TPPs and 2 gas CHPPs<sup>1</sup></li> <li>• Electricity generation – 37.1 bln kWh</li> <li>• Installed capacity – 16.3 GW</li> </ul>
		<b>ELECTRICITY DISTRIBUTION AND SALES</b>	<ul style="list-style-type: none"> <li>• 5 distribution companies<sup>1</sup>, 3.5 mln final consumers</li> <li>• Electricity transmission – 43.2 bln kWh</li> <li>• Total length of transmission lines – 99.1 ths km</li> </ul>
DTEK OIL&GAS B.V.		<b>OIL&amp;GAS EXTRACTION AND SALES</b>	<ul style="list-style-type: none"> <li>• Three licensed fields, participation in PSA</li> <li>• Gas production – 1655 mcm, condensate – 54.8 ths t</li> <li>• Reserves – approx. 23 bln m<sup>3</sup> of natural gas</li> </ul>
DTEK RENEWABLES B.V.		<b>RENEWABLES</b>	<ul style="list-style-type: none"> <li>• The largest wind farm in Ukraine (200 MW) and pilot solar plant for 10 MW; 200 MW wind farm under construction</li> <li>• Electricity generation – 637.8 mln kWh</li> </ul>

<sup>1</sup> under operational management

# Business geography: location of assets



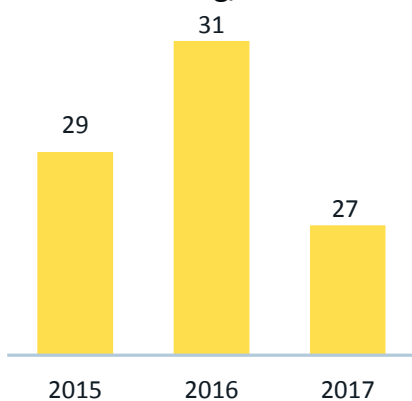
Key financial indicators DTEK B.V., \$ mln



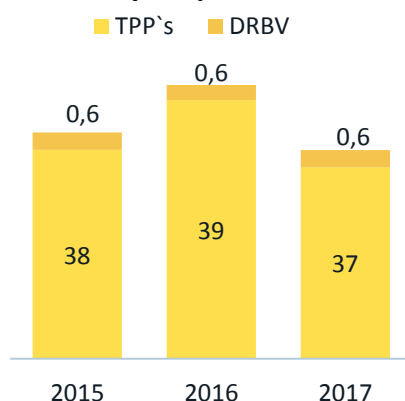
DTEK Energy restructured bonds  
2024 10,75% , bid price USD



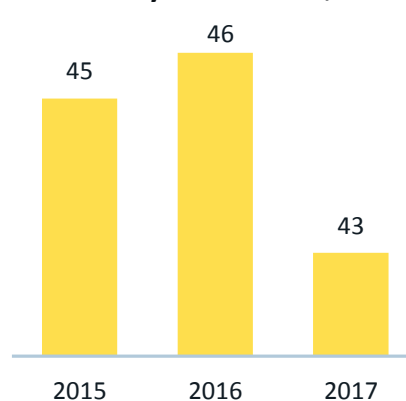
Coal mining, mln t



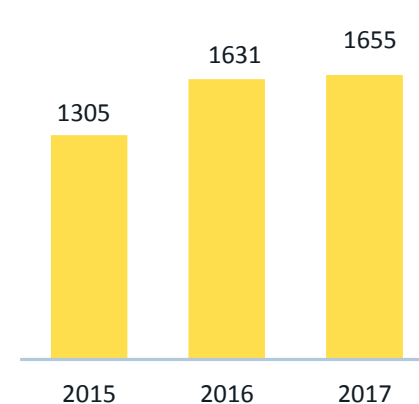
Electricity output, TWh



Electricity distribution, TWh



Natural gas production, mcm



UAH/USD FX rate used: 2014 – 11,92 2015 – 21,84; 2016 – 25,55, 2017 – 26,60

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DTEK B.V. OVERVIEW

**DTEK ENERGY OVERVIEW**

DTEK RENEWABLES

DTEK OIL&GAS

## DTEK Energy operational results

<i>DTEK Energy B.V.</i>	Unit	2013	2014	2015	2016	2017
<b><i>Operational indicators</i></b>						
Coal mining	kT	41 408	37 121	28 692	30 737	24 800
Thermal power generation	mIn kWh	52 786	47 138	37 650	39 463	36 500
Heat generation	k Gcal	12 087	10 066	9 237	9 841	8 443
Electricity distribution	mIn kWh	56 896	53 810	45 086	45 809	43 200
Electricity exports	mIn kW	9 829	7 988	3 555	3 984	5 000
Coal exports	kT	4 732	4 057	1 387	1 158	748
Coal imports	kT	0	1 687	404	222	2 571

- In 2014-2015 DTEK ENERGY faced sharp contraction of operational and financial results due to conflict in Eastern Ukraine and hostilities in the Donetsk and Luhansk regions.
- Starting from 2016, along with the improvement of the Ukrainian economy, a noticeable enhancement in DTEK ENERGY's operational and financial performance is continuing.
- Apart for the macro rebound there are two major factors that have contributed to the improvement: (1) successful debt management and restructuring; and (2) regulatory and legislative developments in Ukraine.

## DTEK ENERGY today

- **Biggest private thermal electricity producer: 9 TPP and 2 CHP plants generate 23% of Ukraine's electricity.**
- **Key player in the Ukrainian coal industry: represented by 16 mines and 5 coal processing plants producing 73% of the country's coal.**
- **Extensive electricity distributor with 33.2% of Ukrainian market: grid length of 99,138 km with 5 distribution companies servicing 3.5 mln households and 84,665 corporate and other customers.**



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DTEK B.V. OVERVIEW

DTEK ENERGY

**DTEK RENEWABLES OVERVIEW**

DTEK OIL&GAS

## DTEK Renewables operational results

<i>DTEK Renewables</i>	Unit	2012	2013	2014	2015	2016	2017
<b>Operational indicators</b>							
Electricity output	GWh	24	268	652	634	608	637
Availability factor	%	-	97	96	99	99	98
Capacity factor	%	-	34	38	36	35	36

- Owner and operator of the largest wind farm in Ukraine - 200MW Botievo wind farm (TOP5 onshore wind farms in Eastern Europe).
- DTEK Renewables’s strategic goal is to retain a leading position and share in the RES generation market in Ukraine as this market continues to expand.
- The main focus will be wind and solar power.
- A portfolio of solar and wind power projects is being developed allowing to meet its growth targets for installed renewable energy capacity.
- DTEK Renewables is aiming to annually increase its installed wind power capacity by min 200 MW and solar power capacity – by 300 MW since 2018.
- In January 2018 DTEK and GE Renewable Energy signed a contract on provision, installation and maintenance of 26 wind turbines for 200 MW Primorsk wind farm.

## DTEK Renewables today

- 38% of Ukrainian market of wind power capacities.
- 12% of Ukrainian market of RES capacities.
- Largest Ukrainian investor in “green” energy projects.
- 10 MW pilot PV farm in Kherson region – Tryfanovka PV farm in operation since August 01, 2017.

## Botievo wind farm site:



## Botievo wind farm main characteristics:

- The Botievo wind farm, with total installed capacity of 200 MW, was developed, built and put into operation for 4 years (2011-2014)
- The wind farm was built within budget and ahead of schedule
- 65 wind turbines produced by Vestas (Denmark) – world leading manufacture – equipped Botievo wind farm which, as of to date, is the largest wind farm in Ukraine
- Total investment costs, including ECA premium, - €340 mln of which €245 financed from a senior loan provided by a German commercial bank (LBB bank)
- The team that was responsible for the design, planning, construction and commissioning of Botievo Wind Farm is still in place and is responsible for project portfolio implementation

## Tryfanovka PV farm site:



## Tryfanovka PV main characteristics:

- The Tryfanovka PV farm, with total installed capacity of 9,99 MW, was developed, built and put into operation in 2017
- JA Solar (China) and ABB (Switzerland/Italy) was selected as suppliers of solar panels and string inverters correspondingly
- The PV farm was built within budget and schedule
- On July 19th, 2017 full PV farm capacities were put into operation and the generation of electricity according to “green” tariff has started on August 1st
- Total investment costs - €8,12 mln of which €7,1 financed from a senior loan provided by a Ukrainian commercial bank

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DTEK B.V. OVERVIEW

DTEK ENERGY

DTEK RENEWABLES

**DTEK OIL&GAS OVERVIEW**

## DTEK OIL&GAS operational results

DTEK Oil&Gas B.V.	Unit	2013 <sup>1</sup>	2014	2015	2016	2017
<b>Operational indicators</b>						
Gas production	mcm	506	752	1 304	1 631	1655
Condensate production	ths. t	20	29	45	56	54
Well stock at the end of the period	units	8	11	18	21	23

- Biggest private natural gas producer in Ukraine (1.65 bcm in 2017).
- DTEK Oil&Gas has been consistently increasing gas production: its output has grown by 3.2 times since 2013.
- Commissioning of 14 wells with depth between 5.400-6.750 meters and well №17 at Semyrenkivske field that uncovered industrial gas reserves at 6.750 m depth (the deepest commercial well in Europe).
- Commissioning “Olefirivka” – the most modern preliminary gas conditioning facility with a total annual capacity exceeding 2 bcm of gas.

## DTEK OIL&GAS today

- **Dominant proportional share in gas production: 40,6% of gas production in private sector.**
- **100% success rate for DTEK OIL&GAS wells (i.e. no “dry” wells).**
- **Unique expertise for gas producing in extreme reservoir pressure (up to 1100 atm) and temperature (up to 158 0C) conditions**

<sup>1</sup> Consolidation Nov.-Dec. 2013



## Semyrenkivske Field

Location: Shyshaky and Myrhorod Districts of Poltava Region

Area: 158,8 km<sup>2</sup>

Natural gas reserves: P1 – 14,235bcm, P2 - 28,155 bcm

Gas condensate reserves: 1P – 534 ths t, 2P – 1 191 ths t

Wells depth: over 5,600 m



## Machukhske Field

Location: Poltava District of Poltava Region

Area: 19,2 km<sup>2</sup>

Natural gas reserves: P1 – 3,118 bcm, P2 – 5,053 bcm

Gas condensate reserves: 1P – 10 ths t, 2P – 16 ths t

Wells depth: over 5 500 m

Unique in its complexity of geological conditions of development (stratum pressures of over 1,000 atm with anomaly factor of more than 2)



## Khoroshevo Field

Location: Kharkiv District of Kharkiv Region

Natural gas reserves (C3 category): 1,28 bcm

Gas condensate reserves: 80,7 ths t