

Tuesday, January 28, 2020 | daily publication

Morning Comments

Equity Market, Poland

Research Department:

Michał Marczak +48 22 438 24 01 Michał Konarski +48 22 438 24 05 Piotr Poniatowski +48 22 438 24 09 Kamil Kliszcz +48 22 438 24 02 Paweł Szpigiel +48 22 438 24 06 Jakub Szkopek +48 22 438 24 03 Aleksandra Szklarczyk +48 22 438 24 04 Mikołaj Lemańczyk +48 22 438 24 07 Piotr Bogusz +48 22 438 24 08

DJIA	28,535.8	-1.57%	FTSE 100	7,412.1
S&P 500	3,243.6	-1.57%	WIG20	2,083.8
NA SDA Q	9,139.3	-1.89%	BUX	43,929.2
DAX	13,204.8	-2.74%	PX	1,131.6
CA C 40	5,863.0	-2.68%	PLBonds10	2.218

7,412.1	-2.29%	Copper (LME)	5,743.0	-3.09%
2,083.8	-3.27%	Crude Oil (Brent)	58.21	-3.00%
43,929.2	-1.32%	USD/PLN	3.8818	+0.51%
1,131.6	-0.99%	EUR/PLN	4.2776	+0.51%
2.218	-0.034	EUR/USD	1.1019	-0.05%

Company & Sector News

Getin Noble Bank

Getin Noble with penalty for abusive clauses in CHF loans

Polish consumer watchdog (UOKiK) imposed a penalty in amount of PLN 13.5m on Getin Noble for using abusive clauses in FX loan agreements. Decision isn't final as bank has right to appeal. **Information shouldn't have material impact. (M. Konarski, M. Lemańczyk)**

MOL

Accumulate – 2019-11-27 Target price: HUF 3,302

MOL interested in buying Polish gas stations

Hungary's MOL would be interested inspin-off gas stations if Poland's oil refiners PKN Orlen and Grupa Lotos were to merge, MOL's Deputy Chief Executive Peter Ratatics tells daily Parkiet in interview. The group would enter talks for "several hundred" units. Poland, right next to Austria, is the country which they would like to be on with stations under MOL own brand but it is a rather distant prospect. However Czech Republic, Romania, Serbia and Slovenia have the biggest growth potential among countries the group is present in with its overall network of around 1,900 stations. MOL plans organic investments of around USD 200m this year, with additional spending possible in case an offer to buy some gas stations occurs. **Such declarations are not surprising to us. (K. Kliszcz)**

Telecommunications

Polish UKE launched the second round of consultations on 5G auction

Poland's telecom market regulator UKE launched the second round of consultations ahead of the 3.4-3.8 GHz frequency band (C-band) auction. In the second round of consultations all participants would give feedback on the changes introduced after the first round. What is important, the changes can hardly be seen as material. UKE lowered the auction deposit to PLN 182m from PLN 450m (what was actually required by Polish Law) and increased the coverage requirements slightly. The key point is that UKE still plans to distribute four comparable 80 MHz bands with cap of one band per one capital group (minimum price for each band still set at PLN 450m). Therefore, the likelihood of high prices in the upcoming auction decreases what should meet positive reaction of investors. Second round will last until February 27th. (P. Szpigiel)

Comarch

Buy - 2019-11-25 Target price: PLN 250.00

Insider selling

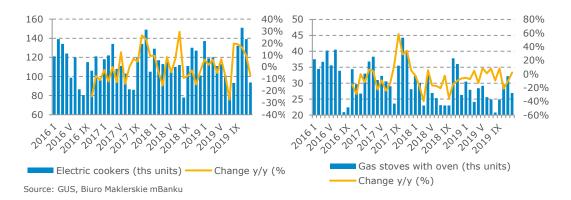
Comarch's supervisory board head Elzbieta Filipiak sold 335,926 company shares at PLN 198.0 a piece (amouting to PLN 66.5m) on January 24th, the company said in a market filing. Therefore, her share in company's capital fell to 10.40% from 14.53%. Mrs Filipiak still holds 846.0 k shares of Comarch. Together with Mr Filipiak, they have 34.95% of total shares in Comarch and 64.78% of total votes on GM. (P. Szpigiel)

Amica

Neutral - 2019-12-05

December electric and gas oven production statistics

According to Poland's statistics office GUS, domestic production of electric cookers in December 2019 decreased by 7% y/y (+7% in 4Q'19), while production of gas ovens increased by 2% y/y (-11% in 4Q'19). The production trends are lightly positive for domestic appliance producers as total cookers number increased 3% in y/y terms. (J. Szkopek)



Amica

Neutral - 2019-12-05

Apator

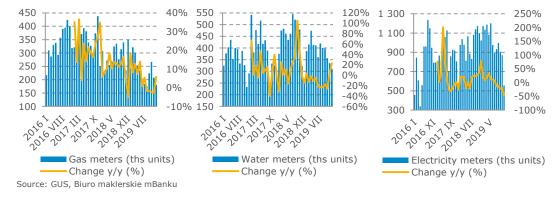
Neutral - 2019-12-05

Whirlpool forecasts 2020 largely above estimates as profit beats

Whirlpool Corp (WHR.N) beat analysts' estimates for quarterly earnings and forecast 2020 profit largely above expectations on Monday, as the appliances maker raised prices and reined in expenses to cushion the impact of higher production costs. The Whirlpool data strictly corresponds to US market but improves global mood to white goods producers which should support Amica. For more information please visit https://tinyurl.com/uf4mnrl (J. Szkopek)

December utility meter production in Poland

Official GUS statistics indicate that production of gas meters slumped 48% y/y in December 2019 (-29% y/y in 4Q'19), with production of electricity meters down 46% y/y (-29% in 4Q'19), accompanied by a 23% rebound in water meters (-5% in 4Q'19). The low production numbers may be part of the reason behind Apator's weak quarterly financials. (J. Szkopek)

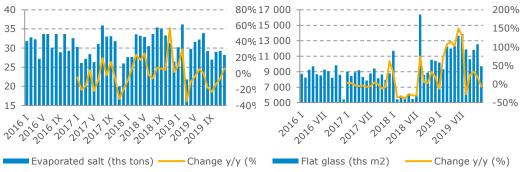


Ciech

Buy - 2019-12-05 Target price: PLN 44.41

December statistics for evaporated salt and float glass production

Polish production of evaporated salt increased by 6% y/y in December (-5% in 4Q'19), and production of float glass was down 7% (+14% in 4Q'19). The December rise in evaporated salt volumes represents a rebound from the previous month and marked improvement from 3Q'19, when volumes slumped, due probably to mining disruptions). Production of float glass has increased at a double-digit pace since the beginning of 2018, driven by new capacity added during 2019 and 2020). These trends slightly positive for Ciech. (J. Szkopek)



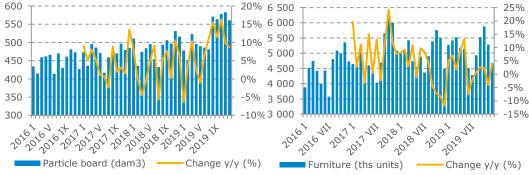
Source: GUS, Biuro maklerskie mBanku

Forte

Neutral - 2019-12-05

Particleboard and furniture production statistics for December

Production of particle boards increased 9% y/y in December 2019 (+12% in 4Q'19), while at the same time furniture production increased 4% (+1% in 4Q'19). Particleboard production in Poland has increased since the launch of a new Eggers factory in May 2019. The board supply is rising at a faster pace than the domestic furniture output—a trend which could affect future board prices in the local market. The 4% rebound in December in furniture production marked a reversal of a 4% slump registered a month earlier. The statistics are neutral from Forte's standpoint except for the potential negative effects on particleboard pricing. (J. Szkopek)



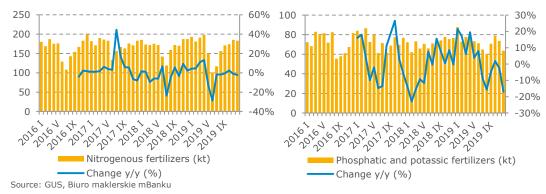
Source: GUS, Biuro maklerskie mBanku

Grupa Azoty Hold – 2019-12-05

Hold - 2019-12-05 Target price: PLN 32.75

Fertilizer production update for December

Polish production of nitrogenous fertilizers decreased 2% y/y in December (+2% in 4Q'19), while production of potassic and phospatic fertilizers was down a combined 17% (-6% in 4Q'19), driven mainly by lower potassic fertilizer volumes (-13% in 4Q'19). **The data is negative for Azoty Group, and relatively negative for its Police unit. (J. Szkopek)**



Cognor

Hold - 2019-12-06 Target price: PLN 1.25 **JSW**

Hold - 2020-01-20 Target price: PLN 23.32

December crude steel production update

Production of crude steel in Poland decreased 25% y/y in December (-19% y/y in 4Q'19) following a temporary stoppage on an Arcelor steel plant in Krakow. The lower steel production is a negative cross read for JSW. On the other hand, Cognor should benefit from reduced competition in the domestic market for metal products and steel scrap. (J. Szkopek)



Source: GUS, Biuro maklerskie mBanku



Economy, China

Fast-spreading coronavirus in China

China's death toll from the coronavirus rose to 106 by the end of Jan. 27 and the total number of confirmed cases increased to 4,515, the National Health Commission said. The outbreak is expected to hurt the world's second-largest economy, as Chinese authorities step up preventive measures, impose travel restrictions and extend the Lunar New Year holidays to limit the spread of the virus. Amid concerns of a wider outbreak, the United States and Canada warned against travel to China. For more information please visit https://tinyurl.com/wv8wvy7 (J. Szkopek)

Erbud

New deal for PLN 75 million net

Erbud's subsidiary, PBDI inked a PLN 75 million net deal to perform works accompanying the construction of a wind farm in the Zachodniopomorskie region. The deadline is December 31, 2021. **Neutral news. Value of the contract amounts to about 3% of annual revenue.** (A. Szklarczyk)

Quarterly Earnings Results

Astarta

Overweight - 2019-12-05

Trading update for Q4'19

- The company presented trading volumes and average prices realized in Q4'19. The sales of sugar were flat in Q4'19 and total grain sale volume increased by 29% y/y. Milk sales were about 10% lower, which is in line with trends from previous quarters. The company was selling sugar in 4Q'19 with about 7% discount to market prices (9% in Q3'19). The realized sales price for corn was 2% higher than the market, while corn and wheat was about 4-5% below the market.
- We believe the presented sales volume will translate into Q4'19 revenues at the level 3,3 bln UAH (-14% y/y on lower grain prices) and EBITDA -8 m UAH. We believe the company will decrease significantly the loss on biological assets revaluation, which is in line with company guidance at the end of Q3'19. We estimate the company will improve margins milk sales and soy oil sales, white sugar margin will be a bit below last year and grain margin will be close to zero because of lower realized prices and cost pressure. The higher y/y volumes should translate into positive OCF in Q4'19. (J. Szkopek)

mBank 2019 Q4 expectations

(m UAH)	Q4'19E	Q4'18	у/у	2019E	у/у
Revenues	3264.7	3790.4	-14%	13173.7	10.1%
EBITDA	-7.8	-485.0	-98%	1349.8	-19.6%
BA. Revaluation	69.4	-457.2		781.0	-41.0%
EBITDA margin	-0.2%	-12.8%		10%	-27.0%
EBIT	-357.8	-1227.9	-71%	-184.4	-
Net income	-558.9	-52.6	963%	-441.5	-

Source: Astarta, E - estimates by mBank; Consensus estimates provided by PAP

Astarta 2019 Q4 trading update

AStarta 2019 QT	traumig update						
	Sales volume						
	Q4'19	Q4'18	Change		Q4'19	Q4'18	Change
Sugar	6	0.9	52.6	15.8%	9 701	9 590	1.2%
Wheat	3	5.4	75.0	-51.4%	4 243	5 555	-23.6%
Corn	25	1.5	158.4	58.8%	4 079	4 752	-14.2%
Sunflower	5	1.3	30.5	68.5%	8 321	8 430	-1.3%
Soybean oil	1	0.6	16.1	-34.2%	17 136	17 924	-4.4%
Soybean meal	4	4.8	33.9	31.9%	8 390	10 875	-22.9%
Milk	2	1.9	24.6	-10.9%	10 298	9 516	8.2%

Source: Astarta

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Alior	Ва	nk	

Coal

Arctic Paper	Arctic Paper sees its 2020 capital expenditures capped at PLN 60 mln, CEO Michal Jarczynski told
	PAP. The company wants to return to regular dividend payments, he reiterated. Arctic Paper
	wants to keep its production capacity in the paper segment at 94-95% throughout 2020, while
	boosting its appual sales volumes to levels significantly higher than the 610,000 tennes recorded

boosting its annual sales volumes to levels significantly higher than the 610,000 tonnes recorded in 2018 and 2019, CEO Jarczynski told PAP.

Alior Bank had its long- term issuer default rating affirmed at 'BB' by rating agency Fitch, Fitch

Cargo Shipments Poland's cargo shipments decreased by 1.5% y/y to 47.2 mln tons in December, stats office GUS announced.

> State coal group PGG's unions established a protest committee, having questioned the rules of the so-called fourteenth salary bonus payout proposed by the management board, according to a

statement from the unions.

Ratings said in a statement.

Poland is reviewing mining sector's investment plans and will adjust the strategy for the sector to Coal, Mining match the actual needs, deputy minister of State Assets Adam Gaweda told reporters at the

sidelines of industry congress.

Elemental Holding Recycling company Elemental Holding's unit Tesla Recycling will buy a 49% stake in a Turkish

company Evciler Kimya, Elemental said in a market filing.

Monnari Nationale-Nederlanden Open Pension Fund reduced its involvement in Monnari Trade to 4.97% of

votes at the general meeting.

PGE Listed power utility PGE secured an environmental permit for offshore wind farms Baltica 2 and

Baltica 3, with total capacity of 2.5 GW, the company said in a press statement.

Listed fuel concern PKN Orlen eyes putting some PLN 8 bln to 2020 capex, excluding potential **PKN Orlen**

Lotos and Energa acquisitions, a plan that poses no threat to the dividend policy as financing for

investment projects has been secured, CEO Daniel Obajtek told PAP.

PPK Poland assumes pension plan PPK participation among employees of mid-sized firms will be near

the level for large firms and amount to some 35-45%, the Finance Ministry said in an answer to

an MP interpellation.

Production Volumes Polish lignite production fell notably in December; refining volumes were down, data from the

stats office GUS show.

Rafako Rafako targets 30- 40% share in contracts for modernization of coal-fired blocks of ca. 200 MWe,

Rafako officials told a news conference.

Rafako, ARP Rafako and state industry agency ARP's joint venture could produce ca. 300 electric buses in the

first two years of its operations, deputy head of ARP Pawel Kolczynski told PAP.

Real Estate Polish office space owners signed deals to rent out 160k sqm in floor space in 2019, intermediary

JLL said in a statement.

Work Service struck a deal with bondholders on terms of debt reduction, in which bondholders **Work Service**

agreed to a 70% haircut on PLN 35 mln debt as a part of a potential deal between the company

and an international investor, the company said in a market filing.

YUM China The company says Hubei restaurants are closed due to coronavirus.

Corporate Action Calendar

Date	Time	Company	Event
28-Jan			Meeting with mBank Head of Economics (mBank HQ, Senatorska 18, Warsaw) – registration required
29-Jan		Santander	Q4'19 earnings announcement (preliminary)
30-Jan		PKN Orlen	Q4'19 earnings announcement
3-Feb		Millennium	Q4'19 earnings announcement (preliminary)
4-Feb		Izoblok	Investors meeting (Przyokopowa 33, Warsaw)
6-Feb		ING BSK	Q4'19 earnings announcement (preliminary)
6-Feb		mBank	Q4'19 earnings announcement (preliminary)
6-Feb		Moneta Money	Q4'19 earnings announcement
6-Feb		Komercni Banka	Q4'19 earnings announcement
6-Feb		RBI	Q4'19 earnings announcement (preliminary)



Economic Calendar

Tuesda	ay, 28 Janı	uary 2020			
Time	Region	Data	Period	Forecast	Previous
08:00	UK	Nationwide House Prices	January		0.10% m/m
12:00	UK	CBI Distributive Trades Report	January		0%
14:30	USA	Durable Goods Orders Less Transportation	December	0.30% m/m	0.00% m/m
14:30	USA	Durable Goods Orders	December	-0.30% m/m	-2.00% m/m
15:00	USA	S&P/Case-Shiller Composite 20	November		2.20% y/y
16:00	USA	Conference Board Index	January		126.50
16:00	USA	Richmond Fed Index	January		-5
Wedne	esday, 29 J	anuary 2020			
Time	Region	Data	Period	Forecast	Previous
08:00	Germany	GfK Consumer Confidence	January		9.60
08:45	France	Consumer Confidence Index	January		102
10:00	EU	M3 Money Supply	December	5.45% y/y	5.60% y/y
16:30	USA	Crude Oil Inventory	24 January		428.10m
20:00	USA	Interest Rate	•		1.50%
	Japan	Consumer Confidence Index	January	39.70	39.10
Thurse	lay, 30 Jar	nuary 2020	•		
Time	Region	Data	Period	Forecast	Previous
08:00	Germany	CPI Harmonized (P)	January		0.60% m/m; 1.50% y/y
08:00	Germany	CPI (P)	January		0.50% m/m; 1.50% y/y
08:00	Germany	Unemployment Rate	December		3.10%
11:00	EU	Business Climate Indicator	January		-0.25
11:00	EU	Consumer Confidence Index	January		-8.10
11:00	EU	Unemployment Rate	December		7.50%
13:00	UK	Interest Rate			0.75%
14:30	USA	GDP Deflator	Q4		1.80% q/q
14:30	USA	GDP	Q4		2.10% q/q; 2.10% y/y
14:30	USA	PCE	Q4		3.20% q/q; 2.60% y/y
			~ .		
14:30	USA	Core PCE	Q4		
	USA , 31 Janua		Q4		1.70% y/y
			Q4 Period	Forecast	
Friday	, 31 Janua	ry 2020		Forecast	1.70% y/y
Friday Time	, 31 Janua Region	ry 2020 Data	Period	Forecast	1.70% y/y Previous
Time 08:00	Region Germany	ry 2020 Data Factory Goods Orders	Period December	Forecast	1.70% y/y Previous -1.30% m/m; -6.50% y/y
Time 08:00 08:00	, 31 Janua Region Germany Germany	ry 2020 Data Factory Goods Orders Import Price Index	Period December December	Forecast	1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y
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Time 08:00 08:45 08:45 10:30 10:30	Region Germany Germany France France UK UK	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals	Period December December December December December December	Forecast	1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990
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Time 08:00 08:00 08:45 08:45 10:30 10:30 11:00 14:30	Region Germany Germany France France UK UK EU USA	Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index	Period December December December December December Q4 Q4	Forecast	1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70%
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Friday Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA Japan	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts	Period December December December December December December Q4 Q4 January December December December	Forecast	1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; -0.80% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30
Friday Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020	Period December December December December December December Q4 Q4 January December December December		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; -0.80% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y
Friday Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Monda Time	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data	Period December December December December December December Q4 Q4 January December December December December		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y
Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Time 09:00	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data PMI Manufacturing	Period December December December December December December Q4 Q4 January December December December December		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y Previous 48.00
Friday Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Time 09:00 09:50	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data PMI Manufacturing PMI Manufacturing (F)	Period December December December December December December Q4 Q4 January December December December December December December January December January December		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y Previous 48.00 50.40
Friday Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Time 09:00 09:50 09:55	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data PMI Manufacturing PMI Manufacturing (F) PMI Manufacturing (F)	Period December December December December December December Q4 Q4 January December December December December January December January December January December January December		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y Previous 48.00 50.40 43.70
Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Monda Time 09:00 09:50 09:55 10:00	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data PMI Manufacturing PMI Manufacturing (F) PMI Manufacturing (P)	Period December December December December December December Q4 Q4 January December December December December January December January December January January January January January January		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y Previous 48.00 50.40 43.70 46.30
Time 08:00 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Monda Time 09:00 09:55 10:00 10:30	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data PMI Manufacturing PMI Manufacturing (F) PMI Manufacturing (P) PMI Manufacturing (P) PMI Manufacturing (P)	Period December December December December December December Q4 Q4 January December December December December January December January		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y Previous 48.00 50.40 43.70 46.30 47.50
Time 08:00 08:45 08:45 10:30 11:00 14:30 15:45 16:00 16:00 16:00 Monda Time 09:00 09:55 10:00 10:30 10:30	Region Germany Germany France France UK UK EU USA USA USA USA USA USA USA USA USA US	Pata Factory Goods Orders Import Price Index Consumer Spending PPI M4 Money Supply Mortgage Approvals GDP Employment Cost Index Chicago PMI Core PCE Deflator Personal Income Personal Spending University of Michigan Consumer Confidence Index Housing Starts ary 2020 Data PMI Manufacturing PMI Manufacturing (F) PMI Manufacturing (P) PMI Manufacturing Sentix Index	Period December December December December December December Q4 Q4 January December December December December January December January		1.70% y/y Previous -1.30% m/m; -6.50% y/y 0.50% m/m; -2.10% y/y 0.10% m/m; 0.20% y/y 1.10% m/m; -0.80% y/y 0.80% m/m; 4.50% y/y 64,990 0.20% q/q; 1.20% y/y 0.70% 48.90 0.10% m/m; 1.60% y/y 0.50% m/m 0.40% m/m 99.30 -12.70 y/y Previous 48.00 50.40 43.70 46.30 47.50 7.60

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Current Recommendations by mBank

Company	Recommendation	Issued On	Price At	Target	Current	Upside/	P/E		EV/EBI	TDA
Company	Recommendation	Issued Oil	Reco.	Price	Price	Downside	2019	2020	2019	2020
Financial Sector						+7.8%	10.1	10.4		
Alior Bank	hold	2019-11-06	29.34	31.00	27.20	+14.0%	8.5	7.9		
Handlowy	accumulate	2019-12-05	51.70	57.44	56.10	+2.4%	16.3	11.8		
ING BSK	hold	2019-12-05	190.80	187.77	204.50	-8.2%	16.7	14.9		
Millennium	hold	2019-12-05	5.49	5.47	5.91	-7.4%	10.3	12.9		
Pekao	buy	2019-12-05	96.34	115.20	97.46	+18.2%	11.3	10.3		
PKO BP	accumulate	2019-12-05	34.99	39.50	34.46	+14.6%	9.6	9.9		
Santander Bank Polska	hold	2019-12-05	279.00	265.50	277.40	-4.3%	13.0	11.7		
Komercni Banka	buy	2019-12-05	792.00	928.20 CZK	797.00	+16.5%	9.9	10.5		
Moneta Money Bank Erste Group	buy	2019-08-28	75.95	94.33 CZK	84.85	+11.2% +9.8%	11.4 9.3	10.6 8.9		
RBI	accumulate accumulate	2019-12-05 2019-12-05	32.20 21.24	36.61 EUR 23.05 EUR	33.35 20.63	+9.8%	9.3 5.8	5.6		
OTP Bank	hold	2019-12-05	14,870	14,681 HUF	14,470	+1.5%	10.0	9.1		
PZU	accumulate	2019-12-05	36.47	41.91	40.59	+3.3%	11.1	10.6		
Kruk	buy	2019-12-05	150.90	210.31	160.60	+31.0%	9.1	9.0		
Skarbiec Holding	buy	2019-12-05	17.20	29.34	20.90	+40.4%	6.6	6.2		
GPW	buy	2020-01-16	40.85	47.82	42.60	+12.3%	14.0	16.1		
Chemicals	buy	2020 01 10	10.03	17102	12.00	+20.0%	10.1	15.5	5.2	6.0
Ciech	buy	2019-12-05	36.40	44.41	38.60	+15.1%	14.9	9.1	6.6	5.6
Grupa Azoty	hold	2019-12-05	30.00	32.75	26.50	+23.6%	5.4	21.9	3.9	6.3
Oil & Gas	11010	2019 12 00	50.00	32.73	20.00	+23.0%	10.2	8.6	4.3	4.7
Lotos	reduce	2019-12-05	85.20	77.80	83.50	-6.8%	13.5	9.7	6.4	5.0
MOL	accumulate	2019-11-27	2,926	3,302 HUF	2,662	+24.0%	8.9	8.0	4.2	4.6
PGNiG	buy	2019-11-06	5.07	5.64	3.86	+46.2%	11.6	7.6	4.2	3.3
PKN Orlen	hold	2019-12-05	88.50	94.17	82.58	+14.0%	7.4	9.2	4.4	4.8
Power Utilities						+36.0%	4.8	5.6	3.7	3.7
CEZ	buy	2019-12-05	502.00	597.80 CZK	517.50	+15.5%	15.4	13.4	7.4	6.9
Enea	buy	2019-11-06	8.59	11.53	7.32	+57.6%	3.1	3.0	3.1	3.1
Energa	buy	2019-11-06	6.37	11.67	7.45	+56.6%	5.8	5.6	3.7	4.3
PGE	buy	2019-10-24	8.42	12.20	7.14	+70.9%	4.8	6.2	3.1	3.5
Tauron	buy	2019-11-06	1.73	2.45	1.51	+61.9%	2.9	2.4	4.1	3.7
Telecoms, Media, IT						+1.9%	31.3	18.9	6.5	6.6
Netia	hold	2019-12-05	4.44	4.70	4.50	+4.4%	31.4	32.2	4.6	4.7
Orange Polska	accumulate	2019-11-29	6.46	7.40	7.06	+4.9%	33.2	36.4	5.4	5.6
Play	buy	2019-11-14	31.30	36.00	35.70	+0.8%	10.3	9.4	6.5	6.4
Agora	buy	2019-10-30	9.50	17.00	12.15	+39.9%	57.9	30.9	7.3	6.9
Cyfrowy Polsat	reduce	2019-11-14	28.86	26.10	26.60	-1.9%	15.2	12.9	6.9	6.8
Wirtualna Polska	hold	2019-12-05	68.20	70.00	81.00	-13.6%	31.3	21.7	14.1	11.1
Asseco Poland	hold	2019-12-05	57.35	59.20	65.65	-9.8%	16.6	16.0	5.4	5.1
Comarch	buy	2019-11-25	189.50	250.00	201.00	+24.4%	14.6	14.0	6.3	6.1
11 bit studios	buy	2019-12-05	360.50	454.00	434.50	+4.5%	43.6	52.0	27.7	31.1
CD Projekt	accumulate	2019-12-05	260.30	281.30	271.00	+3.8%	-	11.6	-	10.0
Industrials, Mining		2010 12 05				+0.2%	7.2	11.1	4.6	5.1
Cognor	hold	2019-12-06	1.20	1.25	1.27	-1.6%	6.8	39.5	4.4	6.2
Famur	buy	2019-12-05	2.98	5.18	3.45	+50.4%	5.3	8.1	4.2	4.3
Grupa Kęty	hold	2019-12-05	338.50	335.44	347.00	-3.3%	11.8	13.6	8.1	8.8
JSW	hold	2020-01-20	22.68	23.32	19.20	+21.5%	4.8	- 0 4	0.8	2.7
Kemel	hold	2019-12-05	41.20	41.60	48.10	-13.5%	5.4	9.1	5.0	6.8
KGHM	hold	2019-12-05	88.66	85.54	93.16	-8.2%	9.2	9.7	4.7	5.1
PKP Cargo Stelmet	reduce hold	2019-12-05	20.00	18.13 8.78	19.84 8.00	-8.6% +9.7%	7.5 12.5	12.5	2.8 5.5	3.4 5.2
Property Developers	HOIG	2019-12-05	8.20	0.70	8.00	+0.6%	10.2	12.5 8.9	9.2	8.1
Atal	buy	2019-12-05	37.20	44.90	41.00	+9.5%	10.2	9.0	10.7	8.4
Dom Development	hold	2019-12-05	93.00	88.92	95.00	-6.4%	9.4	8.8	7.7	7.7
Retail		2017 12 03	55.00	00.72	55.00	+6.0%	37.1	19.9	9.7	8.8
AmRest	hold	2019-12-05	46.35	47.00	46.40	+1.3%	37.6	36.2	12.4	11.6
CCC	buy	2019-12-05	108.10	157.00	87.50	+79.4%	82.4	18.4	5.1	4.0
Dino	accumulate	2019-11-25	134.00	148.60	153.90	-3.4%	37.1	27.6	22.0	16.7
Eurocash	reduce	2019-11-25	22.22	19.80	19.80	+0.0%	67.2	40.0	7.3	6.9
Jeronimo Martins	hold	2019-11-23	14.92	14.30 EUR	15.58	-8.2%	22.1	19.9	9.7	8.8
LPP	buy	2019-12-05	8,575.00	10,100.00	8,385.00	+20.5%	24.8	18.3	10.5	9.0
VRG	accumulate	2019-12-02	3.94	4.50	3.90	+15.4%	15.1	12.5	4.8	4.3
	accumulate	-017 12 02	3.77	7.50	3.70	1 13,770	10.1	14.5	7.0	7.3



Current Calls by mBank

Campany	Relative	Rated On	Price At	Current	Change	P/I		EV/EBI	TDA
Company	Positioning	Rateu On	Rating	Price	Change	2019	2020	2019	2020
IT						14.9	12.4	6.5	5.5
Ailleron	neutral	2019-10-31	7.16	8.30	+15.9%	15.0	11.3	5.9	4.6
Asseco BS	neutral	2019-12-05	27.60	31.20	+13.0%	15.9	15.4	10.3	9.8
Asseco SEE	overweight	2019-12-05	25.60	24.00	-6.3%	14.8	13.3	7.2	6.1
Atende	neutral	2019-12-05	3.06	3.46	+13.1%	12.2	11.4	5.1	4.8
Industrials						12.1	11.1	6.5	6.7
AC	neutral	2019-12-05	43.20	47.80	+10.6%	12.0	12.1	8.4	8.0
Alumetal	neutral	2019-12-05	39.30	42.50	+8.1%	13.3	13.8	7.7	7.9
Amica	neutral	2019-12-05	133.20	145.00	+8.9%	9.8	9.1	6.3	6.3
Apator	neutral	2019-12-05	21.10	20.70	-1.9%	11.0	11.1	6.4	6.7
Astarta	overweight	2019-12-05	15.90	16.80	+5.7%	-	3.0	6.5	2.9
Boryszew	neutral	2019-12-05	4.09	4.57	+11.9%	15.1	11.9	7.0	7.1
Forte	neutral	2019-12-05	28.15	32.80	+16.5%	26.5	15.2	10.3	8.8
Kruszwica	overweight	2019-12-05	45.80	52.80	+15.3%	12.2	11.0	6.3	5.9
Mangata	neutral	2019-12-05	72.00	74.50	+3.5%	9.0	10.6	6.4	6.9
Pozbud	neutral	2019-12-05	1.80	1.69	-6.1%	4.0	3.9	4.5	5.4
TIM	overweight	2019-12-05	10.90	11.55	+6.0%	13.0	11.5	6.8	6.2

CEE bank valuations

			P/E			ROE			P/BV			DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Polish banks													
Alior Bank	27.20	8.5	7.9	7.5	6%	6%	6%	0.5	0.5	0.4	0.0%	0.0%	0.0%
Handlowy	56.10	16.3	11.8	11.3	6%	9%	9%	1.0	1.0	1.0	6.7%	6.8%	6.4%
ING BSK	204.50	16.7	14.9	13.6	12%	12%	12%	1.9	1.8	1.6	1.7%	1.8%	2.0%
Millennium	5.91	10.3	12.9	15.8	8%	6%	5%	0.8	0.8	0.7	0.0%	0.0%	0.0%
Pekao	97.46	11.3	10.3	9.6	10%	10%	11%	1.1	1.1	1.0	6.8%	6.6%	7.3%
РКО ВР	34.46	9.6	9.9	9.5	11%	10%	10%	1.0	1.0	1.0	3.9%	9.1%	10.3%
Santander BP	277.40	13.0	11.7	11.5	9%	9%	9%	1.1	1.0	1.0	7.1%	1.9%	2.1%
Median		11.3	11.7	11.3	9%	9%	9%	1.0	1.0	1.0	3.9%	1.9%	2.1%
Investors in Polish ba													
ВСР	0.182	6.5	5.9	4.9	6%	7%	8%	0.4	0.4	0.4	2.2%	5.0%	7.2%
Citigroup	76.710	10.1	9.0	8.6	10%	10%	9%	0.9	0.9	0.8	2.5%	2.8%	3.2%
Commerzbank	5.070	7.7	6.5	6.3	3%	3%	3%	0.2	0.2	0.2	4.1%	4.8%	5.5%
ING	9.939	7.7	7.8	7.7	10%	9%	9%	0.7	0.7	0.7	6.9%	7.0%	7.1%
UCI	12.336	6.8	7.0	6.7	8%	7%	6%	0.5	0.5	0.4	4.8%	5.6%	6.2%
Median		7.7	7.0	6.7	8%	7%	8%	0.5	0.5	0.4	4.1%	5.0%	6.2%
Foreign banks													
Erste Group	33.35	9.3	8.9	8.8	11%	11%	10%	1.0	0.9	0.9	3.9%	4.5%	4.7%
Komercni Banka	797.00	9.9	10.5	10.1	15%	13%	13%	1.4	1.4	1.3	6.4%	6.4%	6.4%
Moneta Money	84.85	11.4	10.6	10.5	15%	16%	16%	1.7	1.6	1.6	7.2%	6.6%	7.1%
OTP Bank	14,470	10.0	9.1	8.9	20%	18%	17%	1.8	1.6	1.4	1.6%	1.6%	3.8%
RBI	20.63	5.8	5.6	5.5	10%	9%	9%	0.5	0.5	0.5	5.6%	5.1%	5.4%
Akbank	8.54	8.1	5.1	4.2	11%	16%	16%	0.9	0.7	0.6	2.4%	3.6%	5.4%
Alpha Bank	1.84	16.5	12.6	8.7	2%	3%	4%	0.3	0.4	0.3	0.0%	0.0%	0.0%
Banco Santander	3.48	7.2	6.8	6.6	8%	8%	8%	0.6	0.5	0.5	6.4%	6.8%	7.0%
Deutsche Bank	7.72	27.4	16.5	10.6	-1%	1%	3%	0.3	0.3	0.3	0.0%	0.6%	2.2%
Eurobank Ergasias	0.88	12.4	7.7	6.7	4%	8%	9%	0.6	0.6	0.5	0.0%	0.0%	0.0%
National Bank of Greece	2.97	12.1	12.5	9.2	5%	4%	6%	0.5	0.5	0.5	-	0.0%	0.0%
Piraeus Bank	3.25	15.9	10.9	7.4	2%	3%	4%	0.3	0.3	0.3	-	0.0%	0.0%
Sberbank	255.32	6.5	5.7	5.2	21%	21%	21%	1.3	1.1	1.0	7.4%	8.8%	9.8%
Turkiye Garanti Bank	11.77	7.1	5.3	4.2	13%	15%	16%	0.9	0.8	0.7	1.3%	1.7%	1.7%
Turkiye Halk Bank	6.93	5.6	3.0	2.1	5%	7%	10%	0.3	0.3	0.2	0.7%	1.3%	1.9%
Turkiye Vakiflar Bankasi	6.58	6.0	3.6	2.9	9%	13%	13%	0.5	0.4	0.4	-	-	-
VTB Bank	0.05	3.3	3.3	2.9	12%	12%	12%	0.4	0.3	0.3	6.4%	6.4%	8.5%
Yapi ve Kredi Bankasi	3.05	6.2	4.6	3.6	10%	13%	13%	0.6	0.5	0.5	0.0%	0.0%	0.0%
Median		8.7	7.2	6.6	10%	11%	11%	0.6	0.5	0.5	2.4%	1.7%	3.8%

Insurance company valuations

			P/E			ROE			P/BV			DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Insurers													
PZU	40.59	11.1	10.6	10.4	21%	22%	22%	2.3	2.3	2.3	7.3%	7.2%	7.6%
Aegon	3.73	5.8	5.4	5.3	7%	8%	7%	0.4	0.3	0.3	8.2%	8.6%	9.0%
Allianz	215.80	11.4	10.7	10.1	12%	12%	12%	1.3	1.3	1.2	4.4%	4.7%	5.0%
Assicurazioni Generali	17.72	11.3	10.3	9.8	11%	10%	10%	1.1	1.0	1.0	5.5%	5.8%	6.1%
Aviva	4.03	6.7	6.7	6.4	13%	13%	14%	0.9	0.9	0.8	7.8%	8.1%	8.4%
AXA	23.87	9.0	8.3	8.0	10%	11%	11%	0.9	0.9	0.8	6.2%	6.5%	7.0%
Baloise	174.30	12.1	12.5	12.4	10%	9%	9%	1.2	1.1	1.1	3.7%	3.9%	4.0%
Helvetia	141.10	13.8	13.9	13.4	11%	10%	10%	1.2	1.1	1.1	3.5%	3.6%	3.8%
Mapfre	2.34	9.4	8.7	8.3	9%	10%	10%	0.8	0.8	0.8	6.6%	6.9%	7.0%
RSA Insurance	5.41	13.4	11.5	10.7	11%	12%	13%	1.4	1.4	1.3	4.5%	5.2%	5.9%
Uniqa	8.74	12.4	11.6	11.1	7%	7%	7%	0.9	0.9	1.0	6.3%	6.5%	6.7%
Vienna Insurance G.	24.85	10.2	9.5	9.0	6%	7%	7%	0.6	0.6	0.6	4.2%	4.5%	4.7%
Zurich Financial	403.00	14.6	13.3	12.6	13%	13%	13%	1.8	1.7	1.7	5.0%	5.3%	5.7%
Median		11.3	10.6	10.1	11%	10%	10%	1.1	1.0	1.0	5.5%	5.8%	6.1%

Source: mBank (stocks marked with bold), Bloomberg

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Gas & Oil valuations

		ΕV	//EBITD	A		EV/S			P/E		EBIT	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Oil companies																
Lotos	83.50	6.4	5.0	4.9	0.6	0.6	0.6	13.5	9.7	10.8	10%	12%	12%	3.6%	3.6%	3.6%
MOL	2662.00	4.2	4.6	4.2	0.5	0.7	0.6	8.9	8.0	7.4	13%	15%	15%	5.4%	5.6%	5.9%
PKN Orlen	82.58	4.4	4.8	5.3	0.4	0.4	0.4	7.4	9.2	11.4	9%	8%	7%	4.2%	4.2%	4.2%
Hellenic Petroleum	8.28	6.2	4.8	5.1	0.5	0.4	0.4	10.8	6.4	6.7	7%	9%	8%	6.1%	6.9%	6.7%
HollyFrontier	44.13	5.4	5.3	5.6	0.6	0.6	0.6	9.1	8.5	9.4	10%	10%	10%	3.0%	3.1%	3.1%
Marathon Petroleum	52.70	7.5	5.7	6.0	0.6	0.5	0.5	12.8	7.0	7.6	7%	9%	9%	4.1%	4.5%	5.0%
Motor Oil	20.40	4.7	4.1	4.6	0.3	0.3	0.3	7.8	6.2	7.2	6%	7%	7%	6.7%	6.9%	7.0%
Neste Oil	33.77	12.9	11.8	11.3	1.7	1.7	1.6	20.7	18.2	17.2	13%	15%	15%	2.6%	2.9%	3.1%
OMV	46.21	3.8	3.6	3.5	1.0	0.9	1.0	8.8	8.1	7.6	25%	26%	27%	4.3%	4.7%	5.1%
Phillips 66	96.92	7.6	6.6	6.9	0.5	0.5	0.5	12.2	9.4	9.7	7%	7%	7%	3.6%	3.9%	4.2%
Saras SpA	1.29	3.5	2.2	3.1	0.1	0.1	0.1	12.2	4.4	7.2	4%	6%	4%	5.2%	10.8%	7.2%
Tupras	115.80	6.8	4.5	4.7	0.4	0.4	0.4	11.3	5.2	5.1	6%	8%	8%	8.8%	16.2%	17.0%
Valero Energy	85.05	8.2	5.7	6.1	0.4	0.4	0.4	17.7	8.9	9.7	5%	7%	7%	4.2%	4.6%	4.9%
Median		6.2	4.8	5.1	0.5	0.5	0.5	11.3	8.1	7.6	7%	9%	8%	4.2%	4.6%	5.0%
Gas companies																
PGNiG	3.86	4.2	3.3	2.8	0.6	0.6	0.5	11.6	7.6	6.7	14%	17%	18%	2.9%	3.5%	5.3%
A2A SpA	1.79	7.8	7.3	7.0	1.4	1.4	1.3	17.4	14.8	14.1	18%	19%	19%	4.4%	4.5%	4.6%
BP	476.95	4.7	4.4	4.4	0.6	0.6	0.6	12.2	10.9	10.3	14%	14%	14%	0.0%	0.0%	0.0%
Centrica	89.04	4.5	4.3	4.7	0.3	0.3	0.3	12.9	9.4	9.1	7%	7%	7%	0.0%	0.0%	0.0%
Enagas	24.10	10.7	10.4	11.4	8.6	8.7	9.4	13.6	12.6	13.8	80%	84%	82%	6.6%	6.8%	6.8%
Endesa	24.22	8.8	8.7	8.6	1.6	1.6	1.5	16.8	16.6	16.2	18%	18%	18%	5.9%	6.0%	5.1%
Engie	15.70	7.0	6.6	6.3	1.1	1.0	1.0	15.2	13.6	12.3	16%	16%	16%	5.0%	5.3%	5.8%
Eni	13.20	3.5	3.4	3.2	0.8	0.9	0.9	12.3	10.2	9.3	24%	26%	28%	6.5%	6.6%	6.8%
Equinor	175.90	3.3	3.0	2.7	1.2	1.1	1.0	12.1	10.6	9.7	35%	36%	37%	0.1%	0.1%	0.1%
Gas Natural SDG	23.31	9.3	8.9	8.7	1.5	1.5	1.6	16.8	15.4	14.7	17%	17%	18%	5.9%	6.2%	6.5%
Gazprom	230.96	3.7	3.6	3.4	1.0	1.0	1.0	3.6	4.0	3.7	28%	28%	28%	7.1%	7.9%	10.3%
Hera SpA	4.16	8.4	8.0	7.8	1.5	1.3	1.3	20.4	19.8	19.7	17%	17%	17%	2.5%	2.6%	2.7%
NovaTek	1176.60	11.1	11.2	11.5	4.2	4.1	3.7	8.4	11.8	10.5	38%	37%	32%	2.4%	3.0%	3.3%
ROMGAZ	36.90	5.6	5.7	5.3	2.8	2.7	2.6	9.6	9.7	9.1	49%	47%	48%	9.0%	9.0%	10.3%
Shell	25.44	3.4	3.2	3.0	0.5	0.5	0.5	12.1	10.0	9.4	16%	17%	17%	8.2%	8.2%	8.5%
Snam SpA	4.80	13.0	12.7	12.3	10.5	10.3	10.0	15.0	14.8	14.2	81%	81%	81%	5.0%	5.2%	5.5%
Total	46.11	5.3	4.9	4.7	0.9	0.9	0.9	11.7	10.3	9.9	17%	19%	19%	6.4%	6.7%	7.0%
Median		5.6	5.7	5.3	1.2	1.1	1.0	12.3	10.9	10.3	18%	19%	19%	5.0%	5.3%	5.5%

Power generation company valuations

		EV	//EBITD	A		EV/S			P/E		EBIT	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Power generation																
CEZ	517.50	7.4	6.9	6.7	2.1	1.9	1.8	15.4	13.4	13.5	29%	28%	27%	4.6%	5.8%	6.7%
Enea	7.32	3.1	3.1	2.8	0.6	0.5	0.6	3.1	3.0	2.3	20%	18%	21%	0.0%	0.0%	3.3%
Energa	7.45	3.7	4.3	4.5	0.7	0.7	0.8	5.8	5.6	5.1	19%	17%	17%	0.0%	0.0%	0.0%
PGE	7.14	3.1	3.5	2.7	0.7	0.6	0.6	4.8	6.2	4.1	21%	17%	21%	0.0%	5.2%	4.0%
Tauron	1.51	4.1	3.7	3.2	0.7	0.6	0.6	2.9	2.4	2.0	18%	17%	19%	0.0%	0.0%	0.0%
EDF	11.49	5.5	5.0	4.9	1.3	1.2	1.2	17.0	13.7	13.0	23%	24%	24%	2.9%	3.4%	3.6%
EDP	4.25	9.5	9.1	8.7	2.1	2.1	2.0	19.2	17.5	16.3	22%	23%	23%	4.5%	4.6%	4.8%
Endesa	24.22	8.8	8.7	8.6	1.6	1.6	1.5	16.8	16.6	16.2	18%	18%	18%	5.9%	6.0%	5.1%
Enel	7.67	7.9	7.5	7.2	1.7	1.7	1.7	16.3	15.0	14.1	22%	23%	23%	4.3%	4.7%	5.0%
EON	10.30	9.8	7.3	7.2	1.6	0.8	0.7	15.1	16.2	15.0	16%	11%	10%	4.5%	4.7%	4.8%
Fortum	22.92	15.3	14.2	13.6	4.7	4.6	4.5	16.0	15.3	14.2	31%	33%	33%	4.8%	4.8%	4.8%
Iberdola	9.80	10.5	9.9	9.4	2.8	2.7	2.6	18.6	17.4	16.7	27%	27%	28%	3.8%	4.1%	4.3%
National Grid	1006.40	12.3	11.7	11.0	4.0	4.0	3.9	17.3	17.2	16.3	32%	34%	35%	0.0%	0.0%	0.0%
Red Electrica	18.15	9.5	9.6	9.7	7.4	7.5	7.5	13.7	14.6	15.0	78%	78%	77%	5.8%	5.7%	5.5%
RWE	31.56	11.3	6.4	5.5	1.4	1.0	0.9	28.6	18.3	13.6	12%	15%	16%	2.5%	3.0%	3.5%
SSE	1496.00	12.6	12.2	11.2	0.9	3.4	3.3	22.3	17.0	14.8	7%	28%	29%	0.0%	0.0%	0.0%
Verbund	47.60	8.7	7.3	6.9	3.1	2.8	2.7	29.2	22.8	21.5	36%	38%	39%	1.5%	2.0%	2.5%
Median		8.8	7.3	7.2	1.6	1.7	1.7	16.3	15.3	14.2	22%	23%	23%	2.9%	4.1%	4.0%

Machine and equipment manufacturers

		E۱	//EBITD	A		EV/S			P/E		EBI	TDA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Industrials																
Famur	3.45	4.2	4.3	4.7	1.0	1.2	1.2	5.3	8.1	9.3	25%	28%	26%	15.4%	11.4%	9.4%
Caterpillar	135.73	8.1	8.5	8.3	1.7	1.7	1.7	11.6	11.3	10.9	21%	20%	20%	2.8%	3.1%	3.4%
Epiroc	118.20	9.4	8.9	8.5	2.3	2.3	2.2	21.7	20.3	19.2	25%	25%	25%	2.2%	2.3%	2.5%
Komatsu	2567.00	5.9	6.4	6.4	1.2	1.2	1.2	9.7	11.0	10.8	19%	18%	19%	4.1%	4.4%	4.4%
Sandvig AG	181.85	10.1	9.7	9.3	2.3	2.2	2.2	17.1	16.3	15.4	23%	23%	23%	2.5%	2.7%	2.9%
Median		8.1	8.5	8.3	1.7	1.7	1.7	11.6	11.3	10.9	23%	21%	22%	2.8%	3.1%	3.4%

Fertilizer producers and chemical companies

		EV	/EBITD	A		EV/S			P/E		EBI	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Fertilizer producers																
Grupa Azoty	26.50	3.9	6.3	7.9	0.5	0.6	0.8	5.4	21.9	-	14%	10%	10%	0.0%	0.0%	0.0%
Acron	4736.00	7.1	6.5	6.5	2.3	2.1	2.0	9.0	8.5	8.7	33%	33%	31%	7.1%	7.4%	8.1%
CF Industries	39.42	8.7	7.9	7.5	3.2	3.0	3.0	16.6	13.7	12.3	37%	39%	40%	3.0%	3.1%	3.1%
Israel Chemicals	1407.00	5.8	5.7	5.5	1.3	1.3	1.2	9.7	8.9	8.6	23%	23%	22%	0.0%	0.0%	0.0%
K+S	8.24	6.9	6.1	5.5	1.2	1.2	1.1	8.9	6.6	5.3	17%	19%	20%	4.2%	5.9%	7.2%
Phosagro	2426.00	6.0	5.6	5.3	1.8	1.8	1.7	8.8	8.8	8.6	31%	31%	31%	7.5%	6.2%	6.4%
The Mosaic Company	18.56	6.4	5.4	4.9	1.2	1.1	1.1	17.1	10.4	8.0	19%	21%	23%	1.1%	1.2%	1.5%
Yara International	331.70	43.8	37.9	35.9	7.0	6.5	6.4	-	-	-	16%	17%	18%	0.6%	0.8%	0.6%
ZA Police	10.30	5.1	4.1	4.1	1.1	1.0	1.0	1.2	0.9	0.9	21%	24%	24%	80.7%	87.4%	97.1%
ZCh Puławy	89.60	1.3	1.7	1.7	0.3	0.3	0.3	4.1	6.7	6.9	21%	16%	16%	5.6%	5.6%	5.6%
Median		6.2	5.9	5.5	1.3	1.2	1.2	8.9	8.8	8.3	21%	22%	22%	3.6%	4.3%	4.3%
Chemical companies																
Ciech	38.60	6.6	5.6	5.5	1.0	1.1	1.1	14.9	9.1	9.1	16%	20%	19%	0.0%	0.0%	5.5%
Akzo Nobel	85.68	14.2	12.5	11.7	2.0	2.0	1.9	26.8	20.7	18.6	14%	16%	16%	2.2%	2.5%	2.7%
BASF	62.13	9.3	8.2	7.6	1.2	1.2	1.2	16.2	13.8	12.4	13%	15%	15%	5.1%	5.2%	5.5%
Croda	5085.00	17.2	16.2	15.4	5.0	4.8	4.7	26.6	24.9	23.3	29%	30%	30%	0.0%	0.0%	0.0%
Sisecam	5.07	3.9	3.4	2.9	0.8	0.7	0.6	6.0	5.8	5.2	20%	20%	20%	4.6%	5.0%	5.4%
Soda Sanayii	6.48	4.8	4.0	3.5	1.2	1.0	0.8	5.0	5.1	4.5	24%	25%	24%	5.2%	5.2%	6.0%
Solvay	93.36	5.3	5.1	4.8	1.1	1.1	1.1	10.7	10.9	9.8	22%	22%	22%	4.1%	4.3%	4.4%
Tata Chemicals	749.65	10.2	9.0	8.1	1.9	1.8	1.6	18.2	16.4	14.5	18%	20%	20%	1.6%	2.0%	1.7%
Tessenderlo Chemie	30.05	6.0	5.6	5.3	0.8	0.8	0.7	15.5	12.3	10.7	13%	14%	14%	-	-	-
Wacker Chemie	60.02	5.1	4.6	4.3	0.8	0.7	0.7	21.5	15.1	12.1	15%	16%	17%	3.5%	4.1%	4.7%
Median		6.3	5.6	5.4	1.2	1.1	1.1	15.8	13.0	11.4	17%	20%	20%	3.5%	4.1%	4.7%

Mining company valuations

		EV	/EBITD	A		EV/S			P/E		EBIT	ΓDA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Metals																
KGHM	93.16	4.7	5.1	5.3	1.1	1.1	1.1	9.2	9.7	11.4	24%	22%	20%	0.0%	1.6%	3.1%
Anglo American	2032.50	4.2	4.5	4.8	1.5	1.5	1.5	8.8	9.6	10.5	36%	34%	31%	0.0%	0.0%	0.0%
Antofagasta	837.40	5.6	5.8	5.2	2.7	2.7	2.6	18.2	19.5	15.9	49%	47%	50%	0.0%	0.0%	0.0%
BHP Group LTD	40.45	3.9	3.9	4.2	2.1	2.1	2.2	14.4	13.1	14.8	53%	53%	51%	3.7%	2.8%	2.3%
Boliden	233.00	5.3	5.0	5.2	1.3	1.2	1.2	11.1	10.2	10.4	24%	25%	24%	4.8%	5.1%	5.1%
First Quantum	11.28	8.5	5.9	5.5	3.4	2.5	2.4	20.7	14.7	10.2	40%	42%	44%	0.1%	0.1%	0.1%
Freeport-McMoRan	10.90	11.9	8.4	4.9	2.2	2.1	1.7	-	19.5	7.9	18%	25%	35%	1.8%	2.7%	3.3%
Fresnillo	638.20	8.3	6.6	5.4	3.1	2.9	2.6	31.6	22.4	15.9	37%	44%	49%	0.0%	0.0%	0.0%
Gold Fields	9367.00	5.4	4.5	4.3	2.4	2.2	2.1	25.3	15.8	14.5	45%	49%	49%	0.0%	0.0%	0.0%
Hudbay Min	4.25	3.6	3.2	2.6	1.1	1.1	1.1	-	35.0	9.8	32%	35%	40%	0.3%	0.3%	0.2%
KAZ Minerals	446.00	4.8	4.8	4.6	2.6	2.5	2.4	6.0	6.0	5.4	55%	52%	53%	0.0%	0.0%	0.0%
Lundin Min	6.95	6.8	4.1	3.6	2.4	1.8	1.7	21.8	9.8	8.0	35%	43%	46%	1.1%	1.1%	1.4%
MMC Norilsk Nickel	33.43	8.4	8.0	8.0	4.7	4.7	4.5	15.1	14.8	14.5	56%	59%	57%	7.2%	8.2%	8.7%
OZ Minerals	10.33	7.4	6.0	4.8	3.2	2.6	2.3	20.5	16.8	9.7	43%	44%	48%	2.0%	2.2%	2.8%
Polymetal Intl	1269.00	9.1	7.8	7.9	4.3	3.9	3.9	14.6	11.4	11.4	47%	50%	49%	0.0%	0.0%	0.0%
Polyus	7857.00	7.9	7.2	7.1	5.1	4.7	4.7	10.7	9.8	9.8	65%	66%	66%	4.1%	4.7%	4.7%
Sandfire Resources	5.94	2.4	2.0	1.8	1.2	1.1	1.0	8.4	7.0	5.8	51%	54%	56%	4.2%	4.6%	5.2%
Southern CC	37.97	9.8	9.7	9.0	4.8	4.7	4.4	18.3	17.6	16.9	49%	49%	49%	4.0%	3.9%	3.7%
Median		6.2	5.4	5.1	2.5	2.3	2.2	14.9	13.9	10.5	44%	46%	49%	0.7%	1.4%	1.9%
		EV	/EBITD	A		EV/S			P/E		EBIT	ΓDA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Coal																
JSW	19.20	0.8	2.7	2.5	0.2	0.2	0.3	4.8	-	-	19%	9%	11%	8.9%	0.0%	0.0%
Alliance Res Partners	9.22	1.8	2.2	2.3	0.6	0.6	0.6	3.0	6.3	8.0	30%	27%	28%	23.0%	16.8%	16.8%
Arch Coal	55.50	2.1	2.4	2.3	0.4	0.4	0.4	3.7	4.6	4.5	18%	17%	17%	3.2%	3.2%	3.2%
Banpu	10.20	10.2	10.7	10.0	1.9	2.0	2.2	10.5	9.7	8.9	19%	19%	22%	4.7%	5.0%	5.4%
BHP Group	52.74	3.8	3.8	4.1	2.0	2.0	2.1	13.9	12.6	14.3	53%	53%	51%	8.4%	6.4%	5.2%
China Coal Energy	2.85	4.7	4.7	5.1	0.9	0.9	1.0	5.9	6.3	6.1	20%	20%	19%	4.0%	3.7%	3.4%
LW Bogdanka	33.20	1.1	1.2	1.3	0.4	0.4	0.4	4.0	4.8	5.5	35%	33%	31%	3.3%	5.6%	6.0%
Natural Res Partners	20.21	1.2	1.3	1.3	0.9	1.0	1.0	4.1	3.7	3.6	77%	78%	78%	8.9%	8.9%	8.9%
Peabody Energy Corp	7.46	1.4	1.6	1.6	0.2	0.3	0.3	8.0	-	-	18%	16%	16%	29.2%	7.4%	7.6%
PT Bukit Asam Tbk	2240.00	3.4	3.5	3.3	0.9	0.9	0.9	5.8	6.2	6.0	28%	26%	26%	12.4%	11.7%	11.1%
Rio Tinto	4216.00	3.7	4.1	4.6	1.8	1.9	2.0	8.6	9.9	12.0	49%	46%	43%	0.0%	0.0%	0.0%
Semirara Mining&Power	21.65	5.5	4.9	4.6	2.5	2.3	2.2	8.1	7.5	7.2	46%	46%	47%	7.5%	7.9%	8.0%
Shanxi Xishan Coal&Ele	5.58	5.1	5.2	5.1	1.0	1.0	1.0	8.9	8.9	8.7	19%	19%	19%	3.5%	3.5%	3.4%
Shougang Fushan Res	1.69	0.9	0.9	0.9	0.5	0.5	0.5	7.3	6.8	7.4	54%	54%	49%	7.1%	7.0%	5.6%
Stanmore Coal	1.00	1.1	1.6	2.3	0.4	0.4	0.5	2.6	3.9	6.0	38%	28%	21%	8.8%	6.7%	6.4%
Teck Resources	13.32	2.7	2.9	2.9	1.1	1.1	1.1	5.3	5.6	5.8	39%	39%	38%	2.1%	2.6%	5.3%
Terracom	0.33	1.3	2.0	1.7	0.4	0.4	0.4	2.5	4.6	3.3	30%	22%	23%	_	6.2%	9.2%
Warrior Met Coal	19.57	2.2	3.3	3.3	0.9	1.0	1.1	3.2	5.1	5.4	39%	31%	32%	18.0%	8.1%	11.6%
Yanzhou Coal Mining	6.35	3.5	3.9	4.0	1.0	1.0	1.0	3.0	3.3	3.4	28%	26%	26%	14.4%	8.2%	7.5%
Median		2.2	2.9	2.9	0.9	0.9	1.0	5.3	6.2	6.0	30%	27%	26%	7.9%	6.4%	6.0%
	arked with I		ombera													



European telecom valuations

		EV	/ EBITD	4		EV/S			P/E		EBIT	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Polish companies																
Netia	4.50	4.6	4.7	4.7	1.5	1.6	1.6	31.4	32.2	29.0	34%	34%	34%	0.0%	0.0%	8.9%
Orange Polska	7.06	5.4	5.6	5.1	1.5	1.5	1.5	33.2	36.4	20.0	29%	28%	29%	0.0%	0.0%	3.5%
Play	35.70	6.5	6.4	5.9	2.2	2.3	2.1	10.3	9.4	9.4	34%	36%	36%	4.1%	4.1%	4.1%
Median		5.4	5.6	5.1	1.5	1.6	1.6	31.4	32.2	20.0	34%	34%	34%	0%	0.0%	4.1%
Mid Caps																
Proximus	25.59	5.8	5.9	5.9	1.9	1.9	2.0	15.1	15.0	15.2	33%	33%	33%	5.9%	6.0%	6.1%
Telefonica CP	237.50	7.2	7.2	7.3	2.3	2.3	2.2	14.3	14.7	14.8	31%	31%	31%	8.8%	8.8%	8.7%
Hellenic Telekom	13.70	5.6	5.5	5.4	2.0	1.9	1.9	19.1	15.5	13.6	35%	35%	36%	4.1%	4.5%	4.8%
Matav	456.50	4.3	4.3	4.3	1.3	1.3	1.3	10.2	9.5	9.2	31%	31%	31%	5.7%	6.1%	6.7%
Telecom Austria	7.24	5.3	5.2	5.0	1.8	1.8	1.7	11.6	10.8	10.4	34%	34%	35%	2.9%	3.3%	3.8%
Median		5.6	5.5	5.4	1.9	1.9	1.9	14.3	14.7	13.6	33%	33%	33%	5.7%	6.0%	6.1%
Big Caps																
BT	171.92	3.8	3.6	3.6	1.2	1.2	1.2	6.6	7.1	6.9	32%	34%	34%	0.0%	0.0%	0.0%
DT	14.58	5.3	5.0	4.8	1.7	1.6	1.6	14.5	13.2	11.8	32%	33%	33%	5.0%	5.3%	5.6%
KPN	2.66	7.3	7.1	6.8	3.1	3.2	3.2	23.0	19.7	16.7	43%	44%	47%	5.0%	5.2%	5.5%
Orange France	12.95	5.0	4.9	4.8	1.5	1.5	1.5	12.5	11.7	10.9	31%	31%	31%	5.5%	5.8%	6.1%
Swisscom	528.00	8.3	8.3	8.2	3.1	3.1	3.1	18.4	18.7	18.7	38%	38%	38%	4.2%	4.2%	4.2%
Telefonica S.A.	6.04	5.1	5.1	5.0	1.7	1.7	1.7	9.0	8.4	7.7	34%	34%	35%	6.7%	6.7%	6.8%
Telia Company	40.64	8.5	8.3	8.2	3.0	2.9	2.9	17.3	15.7	14.6	35%	35%	36%	6.0%	6.2%	6.3%
TI	0.49	4.6	4.6	4.5	1.9	1.9	1.9	8.0	7.7	7.5	42%	42%	42%	0.0%	0.0%	0.0%
Median		5.2	5.1	4.9	1.8	1.8	1.8	13.5	12.5	11.3	35%	35%	35%	5.0%	5.2%	5.6%

Media company valuations

		EV	//EBITD	A		EV/S			P/E		EBIT	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Polish companies																
Agora	12.15	7.3	6.9	6.5	1.0	1.0	1.0	57.9	30.9	20.4	14%	14%	15%	4.1%	4.1%	4.1%
Wirtualna Polska	81.00	14.1	11.1	10.0	3.7	3.3	2.9	31.3	21.7	19.1	27%	29%	29%	1.2%	1.5%	2.4%
Median		10.7	9.0	8.3	2.4	2.1	1.9	44.6	26.3	19.8	20%	22%	22%	2.7%	2.8%	3.3%
Daily Mail																
Arnolgo Mondadori	1.91	6.7	6.2	6.2	0.7	0.7	0.7	13.6	12.4	12.5	10%	11%	11%	2.5%	3.0%	2.6%
Axel Springer	63.00	7.9	8.2	7.3	1.8	1.7	1.7	24.3	25.2	21.6	23%	21%	23%	3.4%	3.5%	3.7%
Daily Mail	792.00	9.0	9.8	9.3	1.2	1.2	1.2	21.0	19.6	18.4	13%	13%	13%	0.0%	0.0%	0.0%
Gruppo Editorial	0.46	6.5	6.2	5.7	0.5	0.6	0.6	-	19.9	14.7	8%	9%	10%	1.1%	2.0%	3.9%
New York Times	32.69	23.6	21.3	18.0	2.9	2.8	2.6	43.4	39.4	31.4	12%	13%	15%	0.6%	0.6%	0.7%
Promotora de Inform	1.33	8.6	7.3	6.7	1.8	1.7	1.6	22.6	15.1	9.3	21%	23%	24%	0.0%	0.0%	-
Median		8.2	7.7	7.0	1.5	1.5	1.4	22.6	19.7	16.6	13%	13%	14%	0.9%	1.3%	2.6%
TV																
Atresmedia Corp	3.20	5.1	5.3	5.4	0.9	0.9	0.9	5.9	6.1	6.3	18%	17%	17%	13.6%	13.4%	12.6%
Gestevision Telecinco	5.17	6.3	6.8	7.1	1.6	1.6	1.7	8.7	8.9	9.1	26%	24%	23%	7.8%	8.8%	8.3%
ITV PLC	139.75	9.3	9.1	8.7	2.0	2.0	1.9	10.9	10.6	10.1	22%	22%	22%	0.0%	0.0%	0.0%
M6-Metropole Tel	15.50	5.3	5.2	5.0	1.3	1.3	1.3	11.2	10.8	10.4	25%	25%	26%	6.3%	6.4%	6.8%
Mediaset SPA	2.49	4.2	4.0	3.7	1.4	1.4	1.4	12.1	10.4	10.0	33%	35%	37%	4.6%	6.3%	6.6%
Prosieben	12.92	5.8	5.6	5.4	1.3	1.3	1.2	6.6	6.4	6.0	23%	22%	22%	7.9%	8.1%	7.7%
TF1-TV Francaise	7.07	3.0	3.0	2.9	0.6	0.6	0.6	8.4	7.7	6.9	20%	20%	21%	6.4%	6.9%	7.6%
Median		5.5	5.4	5.2	1.4	1.3	1.3	9.8	9.7	9.5	24%	23%	23%	6.3%	6.7%	7.2%
Pay TV																
Cogeco	106.68	6.0	5.8	5.7	2.9	2.8	2.7	15.3	14.0	13.9	48%	48%	48%	2.0%	2.2%	2.4%
Comcast	44.00	8.8	8.2	8.0	2.8	2.6	2.6	14.5	13.0	12.0	31%	32%	32%	1.9%	2.1%	2.2%
Dish Network	36.75	9.7	10.7	11.6	1.8	1.9	1.9	15.1	20.6	22.4	19%	18%	16%	0.0%	0.0%	0.0%
Liberty Global	20.82	4.3	4.2	4.2	1.8	1.8	1.8	-	-	-	41%	42%	43%	0.0%	0.0%	0.0%
Shaw Communications	20.04	7.9	7.5	7.1	3.2	3.1	3.0	19.1	19.4	18.1	41%	41%	42%	7.9%	7.9%	7.9%
Median		7.9	7.5	7.1	2.8	2.6	2.6	15.2	16.7	16.0	41%	41%	42%	1.9%	2.1%	2.2%

IT company valuations

II Company var	uations															
		EV	//EBITD	A		EV/S			P/E		EBI	ΓDA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Polish companies																
Asseco Poland	65.65	5.4	5.1	4.9	0.8	0.8	0.7	16.6	16.0	15.6	15%	15%	15%	4.7%	4.7%	3.4%
Comarch	201.00	6.3	6.1	5.7	1.1	1.0	0.9	14.6	14.0	13.4	18%	16%	16%	0.7%	0.7%	0.7%
Median		5.9	5.6	5.3	1.0	0.9	0.8	15.6	15.0	14.5	16%	16%	15%	2.7%	2.7%	2.1%
Foreign companies																
Atos Origin	77.18	7.8	7.5	6.9	1.1	1.1	1.1	9.3	8.6	8.0	14%	15%	15%	2.1%	2.3%	2.5%
CapGemini	117.95	9.5	8.9	8.4	1.4	1.4	1.3	18.0	16.5	15.2	15%	15%	15%	1.6%	1.7%	1.9%
IBM	138.62	9.5	9.0	8.6	2.2	2.1	2.1	10.8	10.3	9.6	23%	24%	24%	4.7%	4.9%	5.1%
Indra Sistemas	10.90	6.8	6.4	6.1	0.7	0.7	0.7	14.5	12.6	11.4	11%	11%	11%	0.8%	1.4%	1.9%
Microsoft	162.28	22.0	19.2	17.1	9.4	8.4	7.6	35.4	30.9	27.4	43%	44%	44%	1.1%	1.2%	1.3%
Oracle	52.69	10.2	9.9	9.6	4.8	4.7	4.6	15.3	13.6	12.5	47%	47%	47%	1.6%	1.8%	1.8%
SAP	123.74	19.2	16.6	14.7	5.9	5.5	5.1	25.3	22.8	20.3	31%	33%	34%	1.3%	1.4%	1.6%
TietoEnator	28.86	10.2	9.1	8.7	1.4	1.3	1.3	15.6	15.1	14.4	14%	14%	14%	4.8%	5.1%	5.3%
Median		9.8	9.0	8.7	1.8	1.7	1.7	15.4	14.3	13.5	19%	19%	20%	1.6%	1.8%	1.9%

Gaming company valuations

		EV/EBITDA				EV/S			P/E		EBIT	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Gaming																
11 bit studios	434.50	27.7	31.1	6.9	12.6	12.4	4.3	43.6	52.0	10.5	45%	40%	63%	0.0%	0.0%	0.0%
CD Projekt	271.00	-	10.0	10.9	59.2	7.6	8.8	-	11.6	12.9	28%	76%	81%	0.4%	0.0%	0.0%
PlayWay	261.00	21.0	18.6	16.6	13.8	12.4	11.2	31.2	28.6	26.7	65%	67%	67%	1.0%	2.4%	2.6%
Activision Blizzars	58.32	18.7	15.9	14.6	6.5	5.9	5.5	26.5	22.9	20.2	35%	37%	37%	0.6%	0.7%	0.7%
Capcom	3010.00	15.3	13.9	12.4	3.7	4.0	3.6	24.6	20.7	19.4	24%	29%	29%	1.2%	1.3%	1.4%
Take Two	123.07	16.8	17.4	16.2	4.1	4.3	4.3	26.0	26.1	25.0	24%	25%	26%	-	-	-
Ubisoft	66.36	7.7	8.2	7.4	3.8	3.6	3.3	22.4	23.8	20.9	50%	44%	45%	0.0%	0.0%	0.0%
Electronic Arts	110.56	19.1	16.7	14.8	6.1	5.6	5.3	28.2	24.0	21.8	32%	34%	36%	-	0.0%	0.0%
Paradox Interactive	153.70	20.9	15.9	13.4	11.6	9.4	8.2	49.6	38.3	26.0	55%	59%	61%	1.2%	1.5%	1.2%
Mediana		18.9	15.9	13.4	6.5	5.9	5.3	27.4	24.0	20.9	35%	40%	45%	0.6%	0.3%	0.4%

Source: mBank (stocks marked with bold), Bloomberg

Steam Global Top Sellers

2020-01-27	Company	Position	D/D change	W/W change	1-week average	Price (PLN)	D/D change	W/W change	1-week average
Frostpunk	11 bit studios	61	-15	+124	28	44	0%	-60%	44.00
Frostpunk: SP	11 bit studios	59	-38	+37	45	88	0%	0%	88.00
Frostpunk: GOTY	11 bit studios	60	-15	-	29	119	0%	-	119.00
Blair Witch	Bloober Team	200+	-	-	-	-	-	-	-
Cyberpunk 2077	CD Projekt	36	+7	-16	79	199	0%	0%	199.00
The Witcher 3: WH	CD Projekt	54	-12	+59	77	30	0%	-70%	80.00
The Witcher 3: WH (GOTY)	CD Projekt	4	-	+33	27	45	0%	-70%	120.00
Green Hell	Creepy Jar	200+	-	-	-	-	-	-	-
Chernobylite	The Farm 51	200+	-	-	-	-	-	-	-
Dying Light	Techland	67	+28	+102	139	34	0%	-66%	73.60

Steam Wishlist

2020-01-27	Company	Position	D/D change	W/W change	1-week average	Release date
Cyberpunk 2077	CD Projekt	1	-	-	1	2020-04-16
Alaskan Truck Simulator	Movie Games	55	-	-3	55	2020
Bum Simulator	PlayWay	42	-	-1	42	2019
I am Your President	PlayWay	67	-	-1	68	TBA
Junkyard Simulator	PlayWay	51	-	-2	50	2019
Ship Builder Simulator	PlayWay	82	-	-3	81	TBA
Tank Mechanic Simulator	PlayWay	62	-	-1	62	2019
Dying Light 2	Techland	3	-	-	3	Spring 2020

Source: Steam (Valve Corporation), Biuro maklerskie mBanku



Construction company valuations

		EV/EBITDA				EV/S			P/E		EBIT	DA mar	gin		DY	
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Construction																
Acciona	99.75	8.4	8.2	8.0	1.4	1.4	1.4	19.0	18.8	17.7	17%	17%	17%	3.7%	3.9%	4.2%
Astaldi	0.55	0.4	0.4	0.5	0.0	0.0	0.0	0.7	0.7	0.7	9%	9%	6%	-	-	180%
Budimex	186.60	12.0	11.6	13.5	0.5	0.5	0.5	28.6	27.8	25.7	4%	5%	4%	5.2%	3.4%	3.1%
Ferrovial	29.12	-	43.1	39.5	4.5	4.5	4.4	-	47.4	41.7	3%	10%	11%	2.5%	2.6%	2.7%
Hochtief	109.30	4.1	4.0	3.7	0.3	0.3	0.2	11.7	11.0	10.6	6%	6%	7%	5.5%	5.9%	6.1%
Mota Engil	1.70	4.1	3.7	-	0.6	0.6	0.5	13.0	8.5	6.1	15%	15%	-	2.7%	6.5%	-
NCC	159.60	6.7	5.6	5.3	0.3	0.3	0.3	16.9	11.6	10.9	4%	5%	5%	3.9%	4.7%	4.9%
Skanska	220.10	9.1	9.6	9.1	0.5	0.5	0.5	16.2	16.4	15.5	6%	5%	6%	3.0%	3.2%	3.6%
Strabag	30.20	2.9	2.9	2.8	0.2	0.2	0.2	9.5	9.6	9.2	6%	6%	6%	4.3%	4.4%	4.7%
Median		5.4	5.6	6.6	0.5	0.5	0.5	14.6	11.6	10.9	6%	6%	6%	3.8%	4.2%	4.5%

Real-estate developers

	EV/EBITDA			P/BV			P/E			EBITDA margin				DY		
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
RE Developers																
Atal	41.00	10.7	8.4	6.8	1.9	1.8	1.7	10.9	9.0	7.0	24%	23%	23%	11.5%	8.4%	10.1%
Dom Development	95.00	7.7	7.7	7.6	2.2	2.2	2.1	9.4	8.8	8.3	19%	20%	20%	9.5%	10.6%	11.4%
Develia	2.61	6.5	11.4	11.9	-	-	-	-	-	-	30%	28%	16%	14.6%	16.9%	12.5%
Echo Investment	5.23	9.6	12.2	12.7	1.4	1.3	1.3	8.3	8.3	11.4	55%	43%	36%	8.4%	8.2%	6.1%
GTC	9.22	15.8	14.7	14.1	1.0	0.9	0.9	10.9	10.1	9.7	83%	82%	79%	0.2%	0.2%	0.3%
CA Immobilien Anlagen	39.10	30.1	26.4	24.2	1.3	1.3	1.2	31.2	27.4	24.8	70%	65%	62%	2.5%	2.7%	2.9%
Deutsche Euroshop AG	25.06	15.3	15.3	15.4	0.7	0.7	0.7	14.0	13.6	13.1	88%	88%	88%	6.2%	6.3%	6.4%
Immofinanz AG	24.80	28.7	25.8	25.1	0.9	0.9	0.9	15.4	17.2	16.1	48%	56%	56%	3.6%	4.0%	4.2%
Klepierre	32.07	20.8	20.0	19.6	0.9	0.9	1.0	11.9	11.6	11.3	83%	86%	86%	6.8%	7.0%	7.2%
Segro	896.00	39.2	35.2	32.2	1.3	1.2	1.1	36.4	33.6	31.2	77%	80%	82%	0.0%	0.0%	0.0%
Median		15.6	15.0	14.7	1.3	1.2	1.1	11.9	11.6	11.4	62%	61%	59%	6.5%	6.7%	6.3%

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Clothing and footwear company valuations

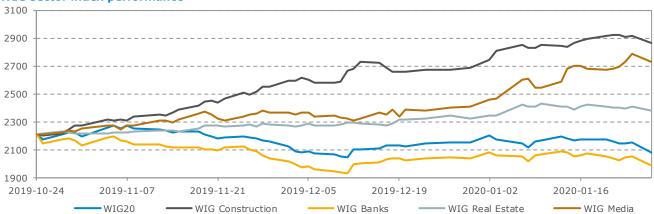
		EV/EBITDA		EV/S				P/E EBI			EBITDA margin			DY		
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Polish companies																
CCC	87.50	5.1	4.0	3.4	0.8	0.7	0.6	-	18.4	12.2	15%	17%	17%	0.5%	2.3%	2.3%
LPP	8385.00	10.5	9.0	7.7	1.6	1.4	1.2	24.8	18.3	14.6	15%	15%	15%	0.7%	0.5%	0.8%
VRG	3.90	4.8	4.3	3.9	0.9	0.8	0.7	15.1	12.5	11.2	19%	19%	19%	0.0%	0.0%	0.0%
Median		5.1	4.3	3.9	0.9	0.8	0.7	19.9	18.3	12.2	15%	17%	17%	0.5%	0.5%	0.8%
Foreign companies																
ABC Mart	6950.00	9.3	9.0	8.6	1.7	1.6	1.6	18.8	18.5	17.7	18%	18%	18%	2.3%	2.5%	2.5%
Adidas	300.00	17.0	15.6	14.0	2.5	2.3	2.2	30.6	27.1	23.5	15%	15%	16%	1.3%	1.5%	1.7%
Assoc Brit Foods	2633.00	10.0	9.5	8.9	1.3	1.2	1.2	19.4	17.9	16.7	13%	13%	13%	0.0%	0.0%	0.0%
Caleries	20.01	4.5	4.1	3.8	0.3	0.3	0.3	8.8	8.3	7.5	7%	7%	8%	1.4%	1.4%	1.4%
Crocs	40.48	18.3	15.8	14.8	2.3	2.2	2.1	29.2	25.4	21.4	13%	14%	14%	-	-	-
Foot Locker	38.34	3.8	3.8	3.7	0.4	0.4	0.4	8.4	7.7	7.4	11%	11%	11%	3.6%	3.9%	4.4%
Geox	1.11	5.2	4.2	2.9	0.4	0.3	0.3	-	20.9	13.9	7%	8%	11%	1.8%	3.0%	5.5%
H&M	184.60	10.0	9.4	8.9	1.2	1.1	1.1	23.4	21.5	20.1	12%	12%	12%	5.3%	5.2%	5.1%
Hugo Boss	43.55	5.5	5.2	4.9	1.1	1.0	1.0	12.3	11.2	10.3	19%	19%	20%	6.3%	6.9%	7.5%
Inditex	30.46	15.8	11.8	11.2	3.3	3.1	2.9	27.2	24.9	23.3	21%	27%	26%	2.6%	3.4%	3.8%
KappAhl	20.02	6.0	5.6	5.7	0.4	0.4	0.4	10.6	10.4	10.8	7%	7%	7%	5.2%	5.0%	5.0%
Lululemon	236.74	34.1	28.5	24.5	8.6	7.3	6.3	63.2	49.9	42.1	25%	26%	26%	0.0%	0.0%	0.0%
Nike	100.24	22.0	19.9	17.4	3.2	3.0	2.7	38.9	33.8	29.1	15%	15%	16%	0.8%	0.9%	1.0%
Under Armour	20.65	9.6	7.9	6.3	0.8	0.7	0.7	61.1	43.3	32.0	8%	9%	11%	0.0%	0.0%	0.0%
Median		9.8	9.2	8.8	1.2	1.2	1.1	23.4	21.2	18.9	13%	13%	13%	1.8%	2.5%	2.5%

Luxury, e-commerce, and food retail company valuations

	EV/EBITDA				EV/S P/E					EBITDA margin				DY		
	Price	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021	2019	2020	2021
Luxury goods																
Estee Lauder	196.99	14.3	12.7	11.6	3.0	2.8	2.6	37.6	32.9	29.5	21%	22%	22%	0.8%	0.9%	1.0%
Hermes Internetional	680.40	26.1	23.9	21.9	10.0	9.2	8.6	47.3	42.7	38.8	39%	39%	39%	0.8%	1.0%	1.0%
Kering	552.60	13.1	12.1	11.4	4.6	4.2	3.9	22.2	19.5	18.0	35%	35%	35%	2.1%	2.3%	2.6%
LVMH	401.00	14.7	13.5	12.6	3.9	3.7	3.4	27.7	25.0	22.9	27%	27%	27%	1.7%	1.9%	2.1%
Moncler	38.86	16.2	14.4	13.0	5.8	5.1	4.6	26.7	24.8	22.3	36%	36%	36%	1.2%	1.3%	1.5%
Median		14.7	13.5	12.6	4.6	4.2	3.9	27.7	25.0	22.9	35%	35%	35%	1.2%	1.3%	1.5%
E-commerce																
Asos	3064.00	23.2	16.2	12.5	1.0	0.8	0.7	-	50.9	34.5	4%	5%	6%	0.0%	0.0%	0.0%
boohoo.com	306.10	42.0	29.7	23.8	4.1	2.9	2.3	-	58.9	45.7	10%	10%	10%	0.0%	0.0%	0.0%
Zalando	44.09	29.2	23.7	18.6	1.6	1.4	1.2	-	-	65.0	6%	6%	6%	0.0%	0.0%	0.0%
Median		29.2	23.7	18.6	1.6	1.4	1.2	-	54.9	45.7	6%	6%	6%	0.0%	0.0%	0.0%
Retail																
Dino	153.90	22.0	16.7	12.8	2.1	1.6	1.2	37.1	27.6	20.7	9%	9%	10%	0.0%	0.0%	0.0%
Eurocash	19.80	7.3	6.9	6.6	0.1	0.1	0.1	67.2	40.0	27.7	2%	2%	2%	5.2%	3.0%	3.8%
Jeronimo Martins	15.58	9.7	8.8	8.3	0.6	0.5	0.5	22.1	19.9	18.9	6%	6%	6%	1.8%	1.8%	1.9%
Carrefour	15.22	4.9	4.4	4.2	0.2	0.2	0.2	13.3	11.5	10.7	5%	5%	5%	3.3%	3.8%	3.9%
AXFood	198.45	10.1	9.9	9.7	0.9	0.9	0.8	25.4	24.8	24.5	9%	9%	9%	3.5%	3.5%	3.4%
Tesco	245.30	7.8	5.5	5.3	0.4	0.4	0.4	17.3	14.4	13.4	5%	8%	8%	0.0%	0.0%	0.0%
Ahold	22.12	6.5	6.3	6.3	0.5	0.5	0.5	13.7	12.7	12.1	8%	8%	8%	3.4%	3.7%	3.9%
X 5 Retail	2228.00	6.2	5.6	5.2	0.5	0.4	0.4	15.3	13.5	12.4	7%	7%	7%	4.8%	5.8%	6.7%
Magnit	3708.50	5.6	4.9	4.4	0.4	0.4	0.3	14.4	11.2	8.3	7%	7%	7%	5.9%	6.2%	7.2%
Sonae	0.84	9.5	8.9	6.9	0.8	0.7	0.7	11.5	9.9	10.1	8%	8%	10%	5.2%	5.7%	5.8%
Median		7.6	6.6	6.4	0.5	0.5	0.4	16.3	14.0	12.9	7%	7%	7%	3.5%	3.6%	3.9%

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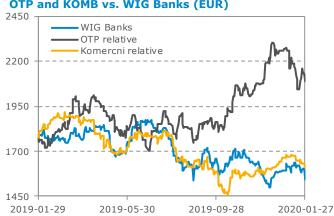
WIG sector index performance



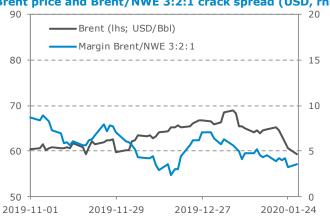
WIG IT vs. MSCI Europe Software & Services (USD)



OTP and KOMB vs. WIG Banks (EUR)



Brent price and Brent/NWE 3:2:1 crack spread (USD, rhs) Orange Polska vs. BETELES (EUR)

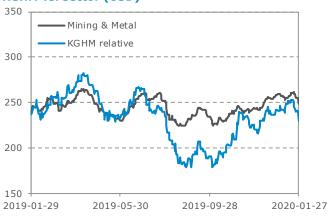




LME copper prices



KGHM vs. sector (USD)



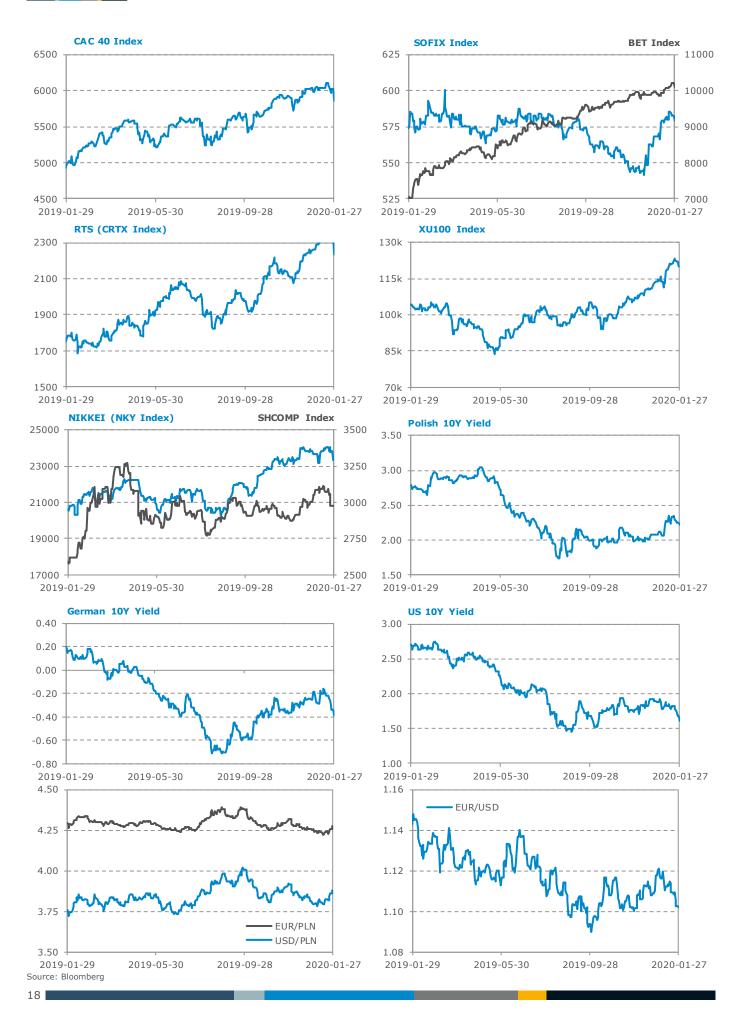
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Global Market Overview

S&P 500 2020-01-27 3,247.16 3,258.85 3,234.50 3,243.63 NASDAQ 2020-01-27 9,092.46 9,185.45 9,088.04 9,139.31 DAX 2020-01-27 13,374.99 13,399.42 13,195.28 13,204.77 CAC 40 2020-01-27 5,924.06 5,942.83 5,851.00 5,863.02 FTSE 100 2020-01-27 7,585.98 7,585.98 7,392.83 7,412.05 WIG20 2020-01-27 2,141.68 2,141.68 2,083.69 2,083.79 BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,323.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,31	ex	Date	Open	Maximum	Minimum	Close	Change
NASDAQ 2020-01-27 9,092.46 9,185.45 9,088.04 9,139.31 DAX 2020-01-27 13,374.99 13,399.42 13,195.28 13,204.77 CAC 40 2020-01-27 5,924.06 5,942.83 5,851.00 5,863.02 FTSE 100 2020-01-27 7,585.98 7,585.98 7,392.83 7,412.05 WIG20 2020-01-27 2,141.68 2,141.68 2,083.69 2,083.79 BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	Α	2020-01-27	28,542.49	28,671.79	28,440.47	28,535.80	-1.57%
DAX 2020-01-27 13,374.99 13,399.42 13,195.28 13,204.77 CAC 40 2020-01-27 5,924.06 5,942.83 5,851.00 5,863.02 FTSE 100 2020-01-27 7,585.98 7,585.98 7,392.83 7,412.05 WIG20 2020-01-27 2,141.68 2,141.68 2,083.69 2,083.79 BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,3	500	2020-01-27	3,247.16	3,258.85	3,234.50	3,243.63	-1.57%
CAC 40 2020-01-27 5,924.06 5,942.83 5,851.00 5,863.02 FTSE 100 2020-01-27 7,585.98 7,585.98 7,392.83 7,412.05 WIG20 2020-01-27 2,141.68 2,141.68 2,083.69 2,083.79 BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	SDAQ	2020-01-27	9,092.46	9,185.45	9,088.04	9,139.31	-1.89%
FTSE 100 2020-01-27 7,585.98 7,585.98 7,392.83 7,412.05 WIG20 2020-01-27 2,141.68 2,141.68 2,083.69 2,083.79 BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 59.86.00 5,850.00 <	(2020-01-27	13,374.99	13,399.42	13,195.28	13,204.77	-2.74%
WIG20 2020-01-27 2,141.68 2,141.68 2,083.69 2,083.79 BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	2 4 0	2020-01-27	5,924.06	5,942.83	5,851.00	5,863.02	-2.68%
BUX 2020-01-27 44,523.00 44,534.31 43,858.89 43,929.17 PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	E 100	2020-01-27	7,585.98	7,585.98	7,392.83	7,412.05	-2.29%
PX 2020-01-27 1,142.95 1,143.02 1,128.84 1,131.58 RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	320	2020-01-27	2,141.68	2,141.68	2,083.69	2,083.79	-3.27%
RTS 2020-01-27 2,310.03 2,310.03 2,232.51 2,233.57 SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	(2020-01-27	44,523.00	44,534.31	43,858.89	43,929.17	-1.32%
SOFIX 2020-01-27 582.81 582.81 579.49 579.49 BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818		2020-01-27	1,142.95	1,143.02	1,128.84	1,131.58	-0.99%
BET 2020-01-27 10,219.23 10,221.68 10,101.40 10,105.37 XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818		2020-01-27	2,310.03	2,310.03	2,232.51	2,233.57	-3.86%
XU100 2020-01-27 120,711.70 121,673.60 120,000.20 120,149.70 BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	IX	2020-01-27	582.81	582.81	579.49	579.49	-0.57%
BETELES 2020-01-27 131.99 131.99 130.26 130.52 NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818		2020-01-27	10,219.23	10,221.68	10,101.40	10,105.37	-1.12%
NIKKEI 2020-01-27 23,427.90 23,463.89 23,317.32 23,343.51 SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	.00	2020-01-27	120,711.70	121,673.60	120,000.20	120,149.70	-1.63%
SHCOMP 2020-01-23 3,037.95 3,045.04 2,955.35 2,976.53 Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	ELES	2020-01-27	131.99	131.99	130.26	130.52	-1.41%
Copper (LME) 2020-01-27 5,836.00 5,850.00 5,726.00 5,743.00 Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	KEI	2020-01-27	23,427.90	23,463.89	23,317.32	23,343.51	-2.03%
Crude Oil (Brent) 2020-01-27 59.02 59.15 57.91 58.21 USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818	COMP	2020-01-23	3,037.95	3,045.04	2,955.35	2,976.53	-2.75%
USD/PLN 2020-01-27 3.8570 3.8858 3.8541 3.8818 -	per (LME)	2020-01-27	5,836.00	5,850.00	5,726.00	5,743.00	-3.09%
·	de Oil (Brent)	2020-01-27	59.02	59.15	57.91	58.21	-3.00%
EUR/PLN 2020-01-27 4.2562 4.2793 4.2537 4.2776 -)/PLN	2020-01-27	3.8570	3.8858	3.8541	3.8818	+0.51%
	R/PLN	2020-01-27	4.2562	4.2793	4.2537	4.2776	+0.51%
EUR/USD 2020-01-27 1.1023 1.1038 1.1010 1.1019	R/USD	2020-01-27	1.1023	1.1038	1.1010	1.1019	-0.05%
USBonds10 2020-01-27 1.6270 1.6528 1.5960 1.6080 -	Bonds10	2020-01-27	1.6270	1.6528	1.5960	1.6080	-0.0759
GRBonds10 2020-01-27 -0.3430 -0.3360 -0.3900 -0.3850 -	Bonds 10	2020-01-27	-0.3430	-0.3360	-0.3900	-0.3850	-0.0500
PLBonds10 2020-01-27 2.2380 2.2380 2.2120 2.2180 -	onds10	2020-01-27	2.2380	2.2380	2.2120	2.2180	-0.0340



mBank Biuro maklerskie



List of abbreviations and ratios contained in the report:

EV - net debt + market value (EV - economic value)
EBIT - Earnings Before Interest and Taxes
EBITDA - EBIT + Depreciation and Amortisation PBA - Profit on Banking Activity P/CE – price to earnings with amortisation MC/S – market capitalisation to sales

MC/S - market capitalisation to sales

EBIT/EV - operating profit to economic value

P/E - (Price/Earnings) - price divided by annual net profit per share

ROE - (Return on Equity) - annual net profit divided by average equity

P/BV - (Price/Book Value) - price divided by book value per share

Net debt - credits + debt papers + interest bearing loans - cash and cash equivalents

EBITDA margin - EBITDA/Sales

OVERWEIGHT (OW) – a rating which indicates that we expect a stock to outperform the broad market **NEUTRAL (N)** – a rating which indicates that we expect the stock to perform in line with the broad market **UNDERWEIGHT (UW)** – a rating which indicates that we expect the stock to underperform the broad market

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ACCUMULATE – we expect that the rate of return from an investment will range from 5% to 15%

HOLD – we expect that the rate of return from an investment will range from -5% to +5%

REDUCE – we expect that the rate of return from an investment will range from -5% to -15%

SELL – we expect that an investment will bear a loss greater than 15%

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assumptions in the model.

Relative – based on a comparison of valuation multipliers of companies from a given sector; simple in construction, reflects the current state of the market better than DCF; weak points include substantial variability (fluctuations together with market indices) as well as difficulty in the selection of the group of comparable companies.

Economic profits – discounting of future economic profits; the weak point is high sensitivity to changes in the assumptions made in the valuation model.

Discounted Dividends (DDM) – discounting of future dividends; the weak point is high sensitivity to changes in the assumptions as to future dividends made in the valuation model.

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mBank S.A.

Senatorska 18 00-950 Warszawa http://www.mbank.pl/

Research Department

Kamil Kliszcz director +48 22 438 24 02 kamil.kliszcz@mbank.pl energy, power generation

Jakub Szkopek +48 22 438 24 03 jakub.szkopek@mbank.pl industrials, chemicals, metals

Aleksandra Szklarczyk +48 22 438 24 04 aleksandra.szklarczyk@mbank.pl construction, real-estate development Michał Marczak +48 22 438 24 01 michal.marczak@mbank.pl strategy

Paweł Szpigiel +48 22 438 24 06 pawel.szpigiel@mbank.pl media, IT, telco

Piotr Poniatowski +48 22 438 24 09 piotr.poniatowski@mbank.pl industrials Michał Konarski +48 22 438 24 05 michal.konarski@mbank.pl banks, financials

Piotr Bogusz +48 22 438 24 08 piotr.bogusz@mbank.pl retail, gaming

Mikołaj Lemańczyk +48 22 438 24 07 mikolaj.lemanczyk@mbank.pl financials

Sales and Trading

Traders

Piotr Gawron director +48 22 697 48 95 piotr.gawron@mbank.pl

Adam Prokop +48 22 697 47 90 adam.prokop@mbank.pl

Sales, Foreign Markets

Bartosz Orzechowski +48 22 697 48 47 bartosz.orzechowski@mbank.pl Krzysztof Bodek +48 22 697 48 89 krzysztof.bodek@mbank.pl

Magdalena Bernacik +48 22 697 47 35 magdalena.bernacik@mbank.pl

Jędrzej Łukomski +48 22 697 49 85 jedrzej.lukomski@mbank.pl Tomasz Jakubiec +48 22 697 47 31 tomasz.jakubiec@mbank.pl

Andrzej Sychowski +48 22 697 48 46 andrzej.sychowski@mbank.pl

Private Client Sales

Kamil Szymański director +48 22 697 47 06 kamil.szymanski@mbank.pl Jarosław Banasiak deputy director +48 22 697 48 70

jaros law.banasiak@mbank.pl