

HOUSING MARKET FACING PANDEMIC COVID-2019

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Purpose: The aim of this article is to present the situation of the housing market in the face of the conditions resulting from the covid-19 pandemic. The research focuses on the phenomena that took place in the individual quarters of the years 2019-2021, i.e. just before the pandemic period, during the restrictive phase of the pandemic and just after the pandemic.

Design/methodology/approach: Data for 16 cities, which are provincial capitals, were analysed. The source data comes from the Central Statistical Office (CSO) and the Report on the Situation on the Residential and Commercial Real Estate Market in Poland in 2019, 2020 and 2021 prepared by the National Bank of Poland. The methodology of the research was based on statistical methods, and a study was made of changes over time in the number of transactions made and average unit prices of residential units and rental rates, as well as the number of dwellings offered.

Findings: The research shows that the market dynamics hardly slowed down during the pandemic period. In all surveyed cities, an increase in unit prices of residential units and a decrease in rental rates were observed in selected quarters of 2020. In 2021, the residential property market in the main cities in Poland was in an expansionary phase. The number of transactions made was strongly influenced by the ability to obtain mortgage loans. During the study period, the interest rate was at a significantly low level. On the basis of the research carried out, it must be concluded that the market that defended itself from the pandemic crisis was the residential market. This supports the finding that residential real estate is perceived as a relatively safe investment of capital, which has so far yielded higher rates of return compared to placing cash in safer assets such as Treasury bonds or bank deposits.

Originality/value: The publication describes the behaviour of the residential property market during and immediately after the COVID 19 pandemic. Demand, supply and prices of residential units are analysed. The publication is aimed at those analysing the impact of pandemics and other unusual events on markets and real estate professionals.

Keywords: housing market, pandemic covid-19, buy-sell, rent-to-rent.

Category of the paper: market research.

1. Introduction

The epidemic incidence of COVID 19 in Poland resulted in an epidemic state from March 2020 to May 2022, according to the regulation of the Minister of Health. In the face of the situation, public sentiment and the so-called uncertainty of tomorrow changed, which had its dimension in the residential real estate market. A time of increased uncertainty in both the economic and social spheres was observed, and entrepreneurs as well as households were forced to exist in the new reality, which undoubtedly affected the demand and supply side of the residential real estate market.

The housing market is a specific segment of the real estate market, which satisfies the basic needs of human beings: livelihood and shelter. At the same time, the realization of these needs can take place not only through sales transactions, i.e. purchases, but also through real estate rental contracts. The behavior of the residential real estate market in the face of such specific conditions as the pandemic arouses great interest, so the purpose of this article is to reposition the actual situation of the residential real estate market under the conditions of the covid-19 pandemic.

The research focuses on the phenomena that took place in the individual quarters of 2019-2021, that is, just before the pandemic period, during the restrictive phase of the pandemic and just after it. The number of transactions made, as well as prices and rental rates, according to a breakdown of purchase-sale and rental transactions in the secondary market in each quarter of each year, were examined. In order to illustrate the situation on the housing market in Poland, data on 16 cities, which are provincial capitals, were analyzed: Warsaw, Gdansk, Krakow, Poznan, Wrocław, Białystok, Bydgoszcz, Katowice, Kielce, Lublin, Łódź, Olsztyn, Opole, Rzeszów, Szczecin, Zielona Góra. The source data comes from the Central Statistical Office (CSO) and the Report on the Situation of the Residential and Commercial Real Estate Market in Poland in 2019, 2020 and 2021 prepared by the National Bank of Poland. The research methodology was based on simple statistical methods, and a study was made of changes over time in the number of transactions made and average unit prices of residential units and rental rates, as well as the number of apartments offered.

2. Survey results

2.1. Number of transactions made

In the real estate market, residential demand always fluctuates more rapidly than happens with supply, which, due to technological processes, is determined for several years. Rapid increases or decreases in demand guided by so-called market sentiment are very often the cause

of instability in these markets, when demand shocks meet stiff supply. Despite the onset of the COVID-2019 pandemic, 2019 saw high demand for apartments in the local real estate markets of all Polish cities (Gajowniczek, 2021). This demand was a consequence of stable economic growth, favorable labor market conditions and the low cost of money. Financing of transactions continued with a significant share of buyers' own funds, while lending accelerated compared to the previous year (Liu, Su, 2021). In the housing market, in addition to consumer demand, investment demand played an important role, which was related to purchases of apartments for rent (Koszel, 2020). Thus, 2019 was another year in which economic factors positively affected the situation of local housing markets. Despite a slight weakening of GDP growth over the year, Poland's economic growth in 2019 was 4.0%. Positive trends continued in the labor market, which, combined with the low cost of credit and the low level of interest rates on bank deposits, continued to provide a strong demand stimulus for housing. It was created by households meeting their own housing needs, but also investment needs. The purchase of a rental unit was still seen as a relatively simple and attractive form of capital investment, providing a favorable rate of return, despite the low liquidity of the apartment and the level of investor risk associated with, among other things, the legal protection of the tenant (Kozicki, Sowa, 2021).

Such a tendency was noted in each of the surveyed cities, and a particularly high number of transactions characterized large Polish cities, viz: Warsaw, Krakow, Wroclaw and Poznan. In 2020, when the Polish real estate market was affected by restrictions related to the 2019 covid pandemic, demand for apartments remained stable.

In the first months of lockdown, many Poles had to postpone their housing plans, a sharp drop in interest in the topic of real estate purchases was noticeable. Observations of the Polish real estate market show that the COVID-19 pandemic has weakened the trend of buying real estate for investment purposes in terms of short-term rentals and has not significantly affected the demand and supply of housing for buyers' own needs (Verhaeghe, Ghekiere, 2021). At the same time, a historically high (highest since 2005) quarterly number of housing units completed was recorded in March 2020. At the same time, the first work-life restrictions were introduced for the entire population, to the point of a total lockdown that few expected. Real estate players involved in buying, selling and renting transactions, such as developers, real estate offices and notaries, had to adapt to ever-changing regulations (Mazurczak, 2021). Most forecasts at the start of the pandemic were pessimistic and the total lockdown caused many people to hold off on investments and the execution of many transactions to be frozen or significantly delayed due to movement restrictions (Najbar, 2021). Analyzing the data, it should be noted that the housing situation in local markets varied (Li, Zhang, 2021). Figure 1 shows the number of completed residential sales transactions in selected cities in Poland in 2019-2021. The study shows that the highest number of transactions was made in 2019 and 2021 with a clear downward trend in 2020.

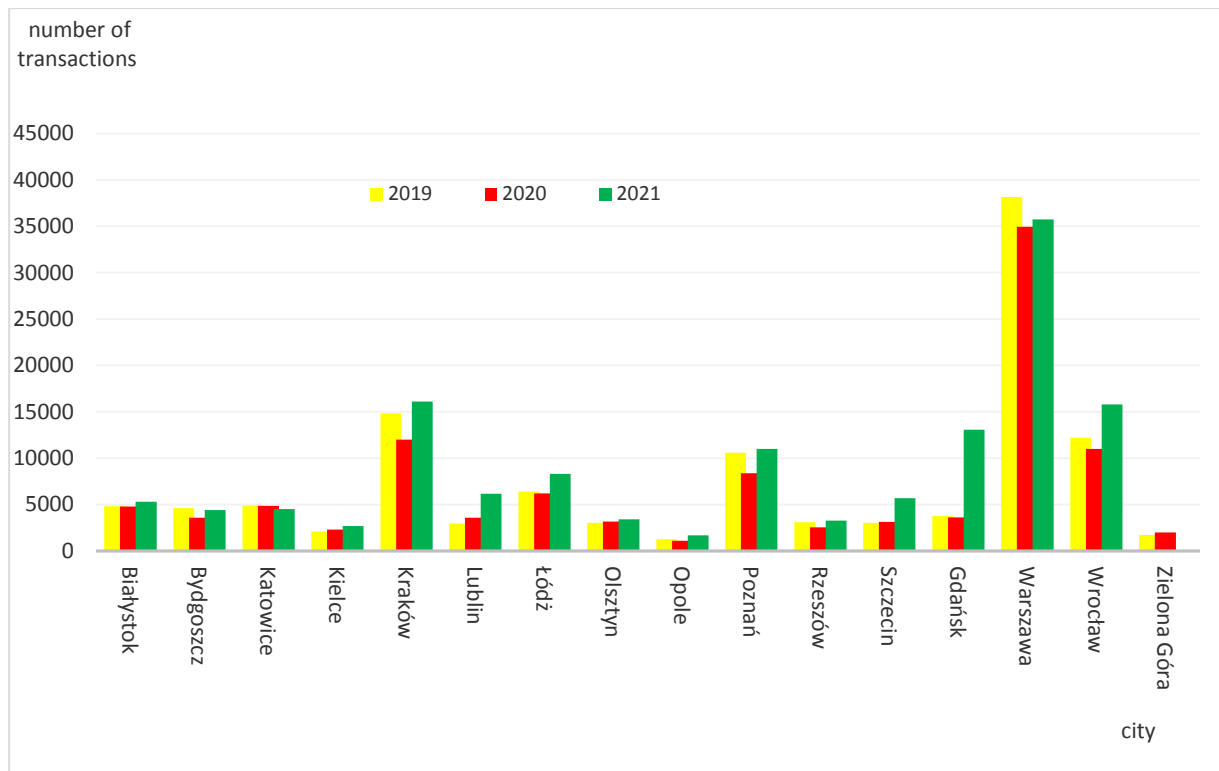


Figure 1. The number of completed residential sales transactions in selected cities in Poland in 2019-2021.

Source: compiled on the basis of data from the Central Statistical Office and the Report on the Situation in the Residential and Commercial Real Estate Market in Poland in 2021 prepared by the National Bank of Poland.

The first two months of 2020 saw record mortgage sales (Czech, Karpio, Wielechowski, Woźniakowski, Żebrowska-Suchodolska, 2020). According to the Credit Information Bureau (BIK), at that time the total value of loans granted was 26% higher than a year earlier. The epidemic situation in the country turned the credit market upside down. The Monetary Policy Council's lowering of interest rates to record levels also played its part, causing loan installments to fall, but banks, fearing hard times, quickly tightened mortgage procedures. They began to analyze the creditworthiness of a potential borrower much more closely (Bolesta, Sobik, 2020). In addition, many lending institutions have decided to raise the required contribution, despite the fact that the Financial Supervision Commission has not issued new recommendations on this issue. In mid-2020, the following phenomena were observed in Poland, for the first time since 2009: a decrease in the credit indebtedness of the non-financial corporate sector, greater than during the global financial crisis, the banking sector's declaration to tighten credit policy. Under such circumstances, the question arose about the possibility of excessive restriction of credit supply by banks, due to the effects of the COVID-19 (Łasak, 2020). Pandemic effects increase likelihood of timely debt service problems (Ostrowska, 2021). The trend of reducing the supply of credit is known as the credit crunch (André, Chalaux, 2023).

In the third quarter of 2020, some banks lowered back the size of the required contribution, and even allowed civil servants to become borrowers. Mainly in the second quarter 2020, the number of transactions in the housing market fell dramatically due to pandemic restrictions,

but also due to significant uncertainty affecting the behavior of economic participants. However, a return of activity in the housing market has already been observed since late 2020. Thus, as early as 2021, high sales of apartments were recorded in the provincial capitals of Poland. The survey shows that residential units in Poland's leading cities were particularly popular. The largest number of transactions in 2021 took place in the capital (Warsaw - 35,740) and four other large cities: Krakow (16,124), Wroclaw (15,800), Gdansk (13,084) and Poznan (11,014). On the other hand, the least transactions took place in Opole (1,693), Bydgoszcz (2,413) and Kielce (2,493). The varying number of completed residential sales transactions in individual cities confirms the locality of the market.

2.2. Prices and rates

Real estate prices are shaped by the market game of supply and demand, while demand and supply are influenced by many factors interacting with varying intensity from period to period, both real and psychological, interrelated in various ways, often in a feedback manner (Malesa, 2022). Inflation, increases in the price of building materials, increases in the price of building services, increases in the price of land for construction, increases in the income of the population, annual increases in the minimum wage, insufficient supply of housing are a set of factors that can significantly drive up prices (Zbyrowski, 2022). Rising interest rates, more expensive credit to buy property, depopulation of the population, uncertainty about the pandemic situation - are a set of factors that could slow down price growth or reduce prices (Kokot, 2022). Table 1 shows the average prices per square meter of a residential unit (unit prices) in the provincial capitals in Poland in each quarter of 2019-2021.

Table 1.

Average unit prices of residential units in selected cities in Poland in each quarter of 2021 and 2022

city	Average price per square meter of residential units (PLN)											
	2019				2020				2021			
	quarter				quarter				quarter			
	I	II	III	IV	I	II	III	IV	I	II	III	IV
Białystok	4896	5069	5315	5316	5518	5732	5716	5866	5 892	6 216	6 320	6 552
Bydgoszcz	4601	4914	5050	5095	5297	5456	5611	5698	5 689	5 792	5 861	6 102
Katowice	4438	4521	4749	4895	5106	5327	5278	5376	5 370	5 481	5 728	5 842
Kielce	3968	4067	4345	4453	4578	4774	4770	4867	4 973	5 301	5 377	5 716
Kraków	6912	7286	7404	7657	8162	8469	8620	8847	8 940	9 380	9 695	10 001
Lublin	5095	5176	5371	5565	5747	5884	6485	66331	6 767	6 950	7 176	7 362
Łódź	4616	4596	4708	4870	5011	5245	5613	5522	5 433	5 800	6 075	6 158
Olsztyn	4823	5049	5171	5381	5449	5637	5672	5781	5 690	5 994	6 174	6 281
Opole	4808	4978	5004	5043	5189	5474	5429	5520	5 567	5 605	5 774	6 083
Poznań	6151	6343	6443	6663	6836	7022	7069	7095	6 960	7 408	7 518	7 675
Rzeszów	5546	5697	5708	5713	6313	6611	6516	6713	6 627	6 957	7 033	7 495
Szczecin	5077	5123	5409	5634	5619	5841	6185	6128	6 609	6 830	7 212	7 666
Gdańsk	7351	7823	7767	8364	8391	8509	8960	9042	10 529	10 819	11 156	11 444
Warszawa	8985	9243	9457	9812	10004	10286	10472	10661	10 879	11 218	11 512	11 128
Wrocław	6267	6482	6858	7316	7315	7496	7301	7973	8 057	8 992	9 160	9 327
Zielona Góra	3950	4203	4354	4547	4650	4758	4430	4767	5 174	5 375	5 568	5 719

Data source: own compilation based on the Report on the Situation in the Residential and Commercial Real Estate Market in Poland in 2021 prepared by the NBP.

The construction sector, including real estate development - due to its specific business profile - is of great importance for the entire economy, however, on the other hand, it is very sensitive to changes in it (Zaborowski, 2022).

In 2019, Poland's real estate sector continued its phase of increased activity, which was associated with the accumulation of high demand from the general construction, housing residential and commercial real estate sectors. This situation changed in March 2020, with the emergence of the COVID-19 pandemic. Average unit prices of apartments across Poland increased. In nominal terms, prices in the analyzed cities exceeded the maximum levels recorded during the period of stress during the previous cycle (2006-2008). Specifically, the highest unit prices for apartments were recorded in the fourth quarter of 2019: in Warsaw (PLN 9812), Gdansk (PLN 8364), Wrocław (PLN 7316) and Krakow (PLN 7657), while the lowest were in Kielce (PLN 4453) and Zielona Gora (PLN 4547).

In 2020 and 2021, housing prices in the surveyed cities in Poland continued their upward trend. In the second quarter of 2020, after buyer activity declined due to the pandemic, quarterly price increases became only slightly lower than in 2019. In all quarters, average transaction prices of residential units rose between 8.3% and 14.7% year-on-year. In 2021, prices also trended upward in all analyzed city capitals, with price dynamics accelerating towards the end of the year and even reaching double-digit size in the fourth quarter. The CSO data shows that housing prices grew faster than average prices in the economy. Comparing average unit prices in the first quarters of 2021 to 2019, one should find an increase of 10-40%. The data shows a large spatial variation in unit prices of housing units. The highest unit prices even in double digits are observed in the fourth quarter of 2021 in two Polish cities, viz: Warsaw (PLN 11,444), Gdansk (PLN 11,128), while the lowest prices (below PLN 6,000.) in Kielce, Opole and Zielona Gora. At the same time, it is worth noting that the purchase of 1 square meter of a residential unit in the capital of Poland, on average, is more than PLN 500 more expensive than in Kielce, and we can see such a situation in all quarters of the surveyed years.

Despite fiscal and monetary interventions that avoided the collapse of the economy, Poland's real estate sector was hit by the constraints of the COVID-19 pandemic, with the short- and long-term rental market segment suffering the most. Specific conditions: lockdown, lack of special events, uncertainty in vacation planning and the like, took their toll on the short-term rental market (Gabryjończyk, Gabryjończyk, 2021). In addition, the COVID-19 pandemic has significantly affected popular short-term rental platforms such as Booking.com and Airbnb (Kacprzak 2021). Some apartment owners and some hotels have begun to bail out with medium-term rentals of 1- 3 months. In a situation where it is hard to plan activities and work in the long term, these solutions have allowed many landlords to wait. In addition, a shortage of students and remote work has caused rental interest and rental rates to temporarily drop (Rybka, Wrześniewska-Pietrzak, Wiatrowski, Zagórska, Kołodziejczak, Świerkowska, Wyszynski, 2021). It has been difficult to find takers for longer-term rentals, but after the initial shock of a total lockdown in the spring of 2020, the market has slowly begun to thaw. It can be concluded

that the radical impact incurred by the outbreak of the COVID-19 pandemic has shaped new consumer attitudes toward real estate. Table 2 shows the average rental rates of 1 square meter of a residential unit in each quarter of 2019-2021 for the surveyed cities.

The study shows that in the 2019-2021 period, the apartment rental market saw a dynamic increase in average apartment rental rates in all surveyed cities. Only in 2020 (the period of restrictive pandemic restrictions) we observe a decrease in rental rates in most of the surveyed cities. In local markets in most cities, the growth rate of rents was positive. Certainly, such a situation was related to the rising cost of credit, which reduced the purchasing capacity of apartments and stimulated the rental market, as well as seasonal demand, for example, from students returning to universities (Bryk, 2019). Due to the lack of attractive investment alternatives and the uncertainty generated by the pandemic period, in addition to high inflation not only in Poland, but throughout Europe or the world, the purchase of an apartment as an investment good was often considered by buyers, in many cases regardless of short-term changes in the rental market (Zaniewska, Kobylńska, 2023). Average apartment rental rates in most of the analyzed markets rose as much as 12.6% year-on-year. This acted as a driver for wealthier households to invest in rental housing, even though the onset of the pandemic resulted in reduced interest in renting by, for example, students or foreign workers. The first quarter of 2020 saw a slight downward adjustment in rental rates and deepened in the following quarter. Average apartment rental rates in the analyzed markets declined in the second and third quarters and by the fourth quarter of 2020 had already stabilized. The deceleration in renters' activity was not permanent, because with the loosening of restrictions, students, as well as foreign workers, mostly quickly returned to the labor market and the rental market (Subaşı, Baycan, 2022).

Table 2.

Average unit rental rates for residential units in PLN/sqm in selected cities in Poland in each quarter of 2019-2021

city	Average rent rate of one square meter of residential unit (PLN)											
	2019				2020				2021			
	quarter				quarter				quarter			
	I	II	III	IV	I	II	III	IV	I	II	III	IV
Białystok	32,10	32,20	32,90	34,30	32,00	29,60	33,80	35,50	32,60	36,60	37,70	34,90
Bydgoszcz	29,00	35,00	30,00	33,00	31,00	31,00	29,00	30,00	27,00	29,00	35,00	34,00
Katowice	34,30	36,80	38,90	38,00	34,50	34,40	35,00	37,50	36,50	34,30	35,70	33,30
Kielce	28,30	28,00	27,40	27,80	27,00	28,10	27,50	28,60	28,80	29,10	29,30	29,00
Kraków	42,60	47,30	47,60	48,40	41,50	41,60	41,00	39,40	35,90	39,30	42,20	43,90
Lublin	32,00	33,00	33,00	34,00	36,00	37,00	34,00	34,00	34,00	35,70	37,00	39,00
Łódź	35,00	33,60	36,50	36,50	34,70	31,90	29,80	32,40	39,40	43,10	40,00	39,50
Olsztyn	25,20	28,50	27,00	25,90	28,50	28,10	27,80	27,40	26,90	28,60	28,60	31,20
Poznań	40,10	42,00	42,60	45,30	44,70	41,00	41,80	45,60	37,50	36,60	39,30	45,10
Rzeszów	32,80	31,50	32,20	33,60	33,40	32,60	32,00	31,00	31,60	31,50	31,90	33,40
Szczecin	39,00	38,80	40,60	40,70	40,40	40,50	41,90	39,50	41,40	40,30	43,40	44,60
Gdańsk	49,00	50,30	52,20	51,20	52,10	50,04	49,20	46,10	46,30	49,80	54,30	54,20
Warszawa	50,80	52,40	53,20	54,90	50,70	49,20	48,10	48,90	47,40	49,40	50,90	52,70
Wrocław	45,10	47,60	49,30	50,20	47,30	43,90	44,00	43,90	44,80	45,40	48,90	50,90
Zielona Góra	30,10	31,20	31,50	33,00	32,40	32,40	32,90	33,00	32,70	33,60	38,50	38,10

Data source: own compilation based on the Report on the Situation in the Residential and Commercial Real Estate Market in Poland in 2021 prepared by the NBP.

The highest unit rental rates for residential units were formed in the fourth quarter of 2021 in Gdansk (PLN 54.20), Warsaw (PLN 52.70) and Wrocław (PLN 50.40) and were significantly higher than the other locations. The lowest average unit rental prices during the period under review were approximately in Olsztyn (PLN 31.20) and Kielce (PLN 29) and were recorded depending on the quarter. The survey shows that the residential rental market in Poland's largest cities is characterized by a discernible division of cities into the following price groups: Gdańsk, Warsaw and Wrocław with unit rates above PLN 50, Kraków, Poznań and Szczecin with rates above PLN 40 and the remaining cities with rates between PLN 29 and 39.50. In almost all of the surveyed cities, rental prices of residential units showed similar trends with a clear increase in rates especially at the end of 2021 (Table 2).

3. Summary

In the face of the COVID-19 pandemic, the world stood on its head, and all signs pointed to the fact that there would be no recession, a drop in incomes, the emigration of students from academic centers and the collapse of international tourism would effectively discourage real estate purchases in 2020, forcing down prices in the housing market. However, reality has shown how unpredictable the Polish housing market is. The pandemic has caused Poles to fear layoffs, loss of some income or even financial crisis. Along with the closure of numerous industries due to sanitary restrictions, this translated into a 3% drop in consumption compared to 2019. On the other hand, people's incomes increased - the government carried out an exceptionally high increase in the minimum wage, some companies, especially in manufacturing or professional services, even paid the promised increases, and only a few entrepreneurs decided to lay off employees. In addition, many billions of zlotys spent by the government as part of the anti-crisis shield have found their way into the pockets of Poles. As a result, Poles' nominal disposable income was in the first three quarters of 2020, as much as 9.8% higher than a year earlier. The difference between the increase in income and the decrease in consumption increased Poles' savings, further prompting them to look for a place to put them safely. The beginning of 2021 already saw a phase of very high activity related to the accumulation of pandemic deferred high demand in the housing sector. However, since the third quarter of 2021, there has been a gradual reduction in activity in the housing market. The reason for this situation may have been the average creditworthiness of residents resulting from, among other things, the level of average wages and the level of mortgage interest rates. The increase in interest rates (from the third quarter of 2021) did not encourage borrowing and only reduced effective demand for the purchase of housing. The central bank in November 2021 began the process of raising interest rates, which made a big difference, but already in 2022.

The survey shows that market dynamics have hardly slowed down during the pandemic period. In 2020, the dynamics of housing prices in the 17 largest cities admittedly decreased, but much less than expected - in the primary market it amounted to 7.5% year-on-year against 10.6% year-on-year in 2019, and in the secondary market to 11.2% against 11.5% in record 2019. All surveyed cities saw an increase in unit prices of residential units and a decrease in rents in selected quarters of 2020. While rents in many cities, especially academic and tourist cities, fell, they continued to rise nationwide and in January 2021 were 2.1% higher than a year earlier. The data presented shows that in 2021, in major cities in Poland, the residential real estate market was in an expansion phase. A large influence on the number of transactions made was the ability to obtain mortgage loans. According to the CSO data, the largest increase in the number of granted loans (at 17% compared to the previous quarter) was recorded at the end of the first and the second quarter of 2021. During that period, the interest rate was at a significantly low level. Demand clearly slows down only in the third quarter of 2021 mainly due to an increase in the cost of financing (Monetary Policy Council began a cycle of interest rate increases starting in October 2021, raising the benchmark rate in October to 0.5 percent, in November to 1.25 percent, in December to 1.75 percent).

Based on the research, it should be concluded that the market that defended itself from the pandemic crisis was the housing market. This only confirms the fact that residential real estate is seen as a relatively safe investment of capital, which has so far yielded higher returns compared to putting cash into safer assets such as Treasury bonds or bank deposits. Capital holders, faced with inflation and the unprofitability of putting money away in banks or bonds, were looking for alternatives. The choice fell most often on real estate as those assets that would maintain value in the long run anyway, and would also allow them to earn money on rent especially in Poland's thriving cities. Such a trend is a result of the relatively high returns on rental housing relative to returns on other assets at the time, which always drives investment demand. It is important to remember that the preferences and expectations of customers in the housing market are variable. The residential real estate market is distinguished from other markets by the way it behaves. In the long term, it is determined mainly by demand, which is determined by fundamental factors. In the short term, the market struggles with external demand shocks, which force it to activate the mechanism of short-term adjustments. Final housing market decisions can also be influenced by the current economic situation, as well as state interventionism in the form of programs to support the purchase of real estate.

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