HOUSING PRICE INDEX

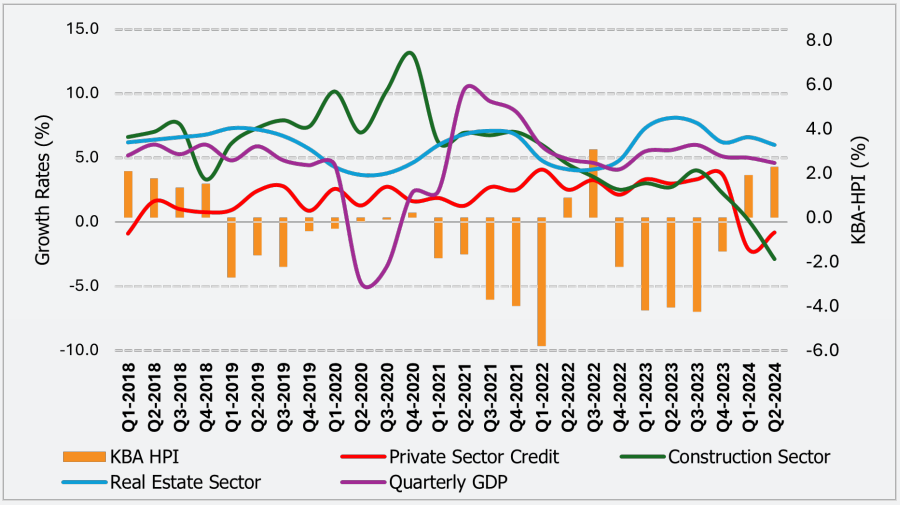
OCTOBER 2024 ISSUE 32

Housing Market Remains Resilient in the Second Quarter of 2024

The Kenya Bankers Association Housing Price Index (KBA-HPI) displayed a consistent upward trajectory in house prices during the second quarter of 2024, underscoring the resilience of the housing market. As **figure 1** shows, the house prices rose by 2.3 percent for the quarter. The rising in house prices manifested in the sustained uptick in the rate of price growth seen over the first two quarters of 2024 is a reversal of the decline seen in most quarters of 2023.

This growth reflects renewed demand, bolstered by stable economic conditions. Notably, the rise in the KBA-HPI aligns with broader economic trends, with private sector credit growth and stable performances in real estate and construction sectors fueling demand.

Figure 1: Evolution of Sectoral GDP, Overall GDP and House Inflation (Q1-2018 – Q2-2024)



Source: KNBS, CBK and KBA

Highlights

Comparison of Key Metrics for Q1 and Q2 2024

House Price Growth: Increased slightly from 2.0% in Q1 to 2.3% in Q2 2024.

Real Estate Growth: Decreased from 6.6% in Q1 to 6.0% in Q2. Construction Activity: Shifted from a slight 0.1% growth in Q1 to a -2.9% decline in Q2.

Cement Production: Showed a positive change with a 1.9% increase in Q2 (compared to no notable change in Q1).

Buyer Preferences in Q2 2024

Apartments: Dominated the market at 44.23% of transactions, though with a slight decrease from previous quarters.

Maisonettes: Grew in popularity, capturing 25.96% of transactions.

Townhouses: Declined to 2.88%, indicating a preference shift towards other housing types. Bungalows: Remained steady at 26.92%.

Figure 2a: Y-o-Y Growth in Cement Production and Consumption

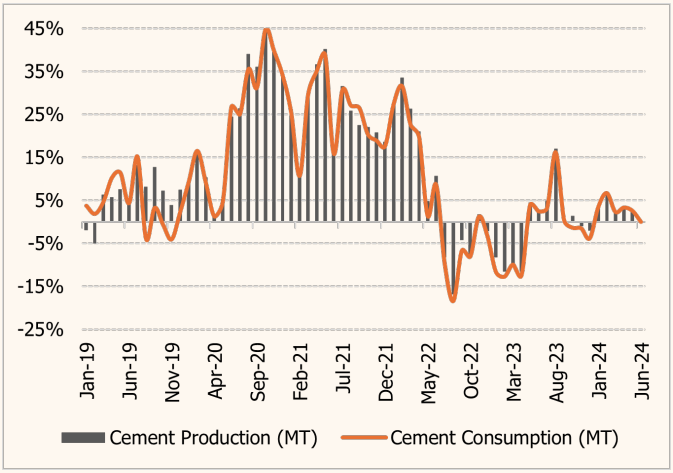
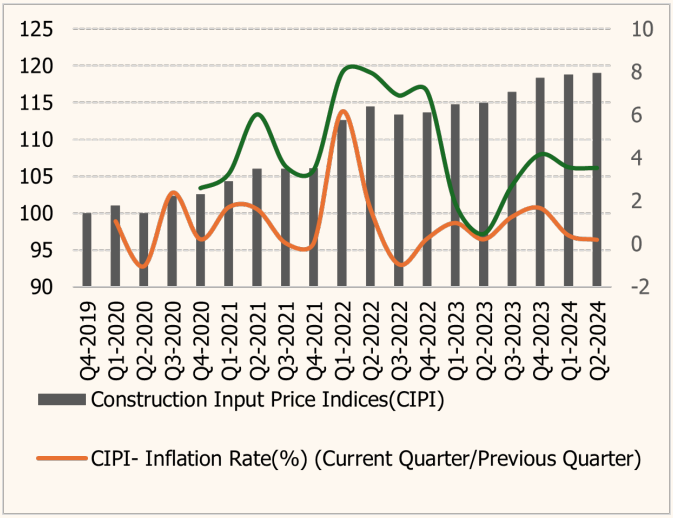


Figure 2b: Construction Input Price Indices and Inflation Rate



Source: KNBS

> Despite rising costs, the real estate sector remained buoyant during the quarter.

The real estate sector expanded by 6.0 percent during the second quarter of 2024, slightly down from 6.6 percent recorded in the first quarter of 2024. Meanwhile, the construction sector dipped by 2.9 percent after a modest 0.1 percent growth in the first quarter of 2024. On its part, as reflected in **Figure 2a**, cement production rose by 1.9 percent, signaling a slight boost in construction activities.

Cement consumption mirrored this trend with a 2.0 percentage growth. The Construction Input Price Index (CIPI) climbed to 119.06, driven by inflationary pressures on key materials **(Figure 2b)**. Despite rising costs, the real estate sector remained buoyant during the quarter.

> The increased lending remained instrumental in stabilizing the housing market.

On the supply side, credit from commercial bankís lending to the construction **(Figure 3a)** and real estate sectors **(Figure 3b)** provided essential liquidity, enabling developers to keep pace with the increasing demand.

The increased lending remained instrumental in stabilizing the housing market.

Figure 3a: Credit to Building and Construction Sector (Y-o-Y, Percent)

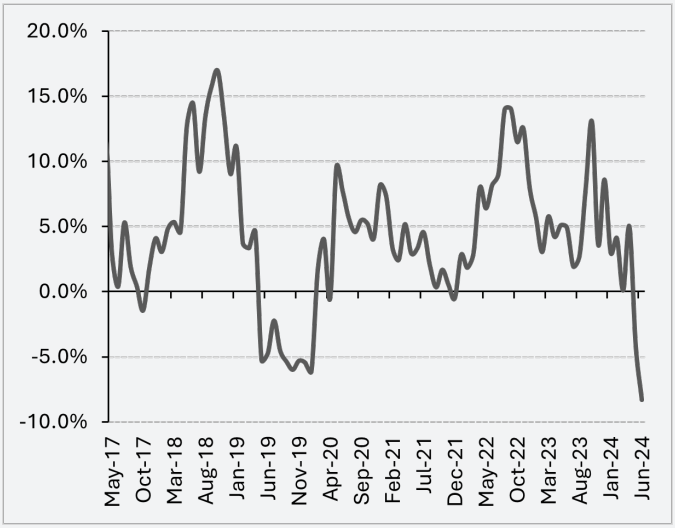
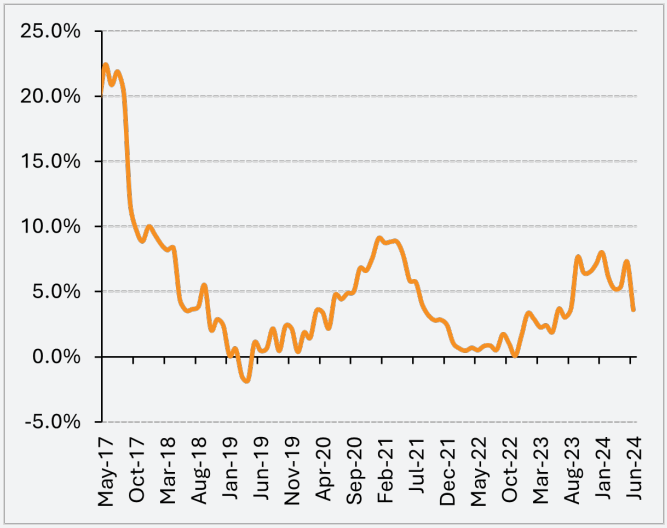


Figure 3b: Credit to the Real Estate Sector (Y-o-Y, Percent)



Source: CBK

Based on the Laspeyres Index methodology **(See Technical Note)**, The KBA-HPI movement depicts a balanced housing market, with steady demand and active supply **(Table 1)**.

The KBA-HPI index based on fixed-base index suggests stable prices, with modest quarter-on-quarter increases; The index stood at 116.01 in the second quarter compared to 130.33 in the prior quarter **(Figure 4a)**.

Meanwhile, the moving-base index stood at 102.41 compared to 100.11 in the first quarter; pointing to some market adjustment as market players adapt to evolving economic conditions **(Figure 4b)**.

> **"The KBA-HPI movement depicts a balanced housing market, with steady demand and active supply**

Table 1: KBA-HPI Movement (Q4-2019 to Q2-2024)

Period	Fixed Base Index (Base Period = Q1 2013)	Moving Base Index (Q-o-Q)
Q4-2019	109.04	118.04
Q1-2020	106.87	117.44
Q2-2020	106.66	117.20
Q3-2020	106.63	117.11
Q4-2020	107.60	117.37
Q1-2021	108.69	115.23
Q2-2021	108.19	113.32
Q3-2021	110.33	109.13
Q4-2021	109.35	104.77
Q1-2022	109.10	98.69
Q2-2022	104.78	99.58
Q3-2022	123.04	102.64
Q4-2022	126.72	100.35
Q1-2023	120.00	96.15
Q2-2023	120.01	92.25
Q3-2023	123.28	99.75
Q4-2023	118.21	98.22
Q1-2024	130.33	100.11
Q2-2024	116.01	102.41

Figure 4a: Fixed Base Index (Base Period = Q1 2013)

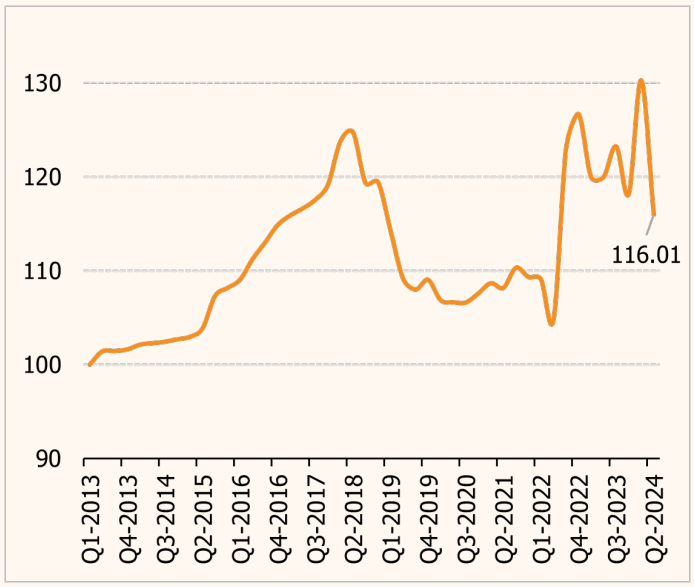
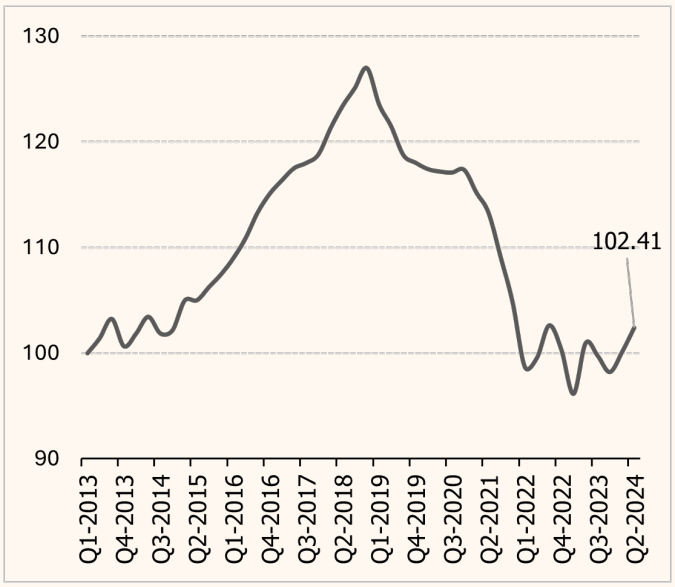


Figure 4b: Moving Base Index (Q-o-Q)



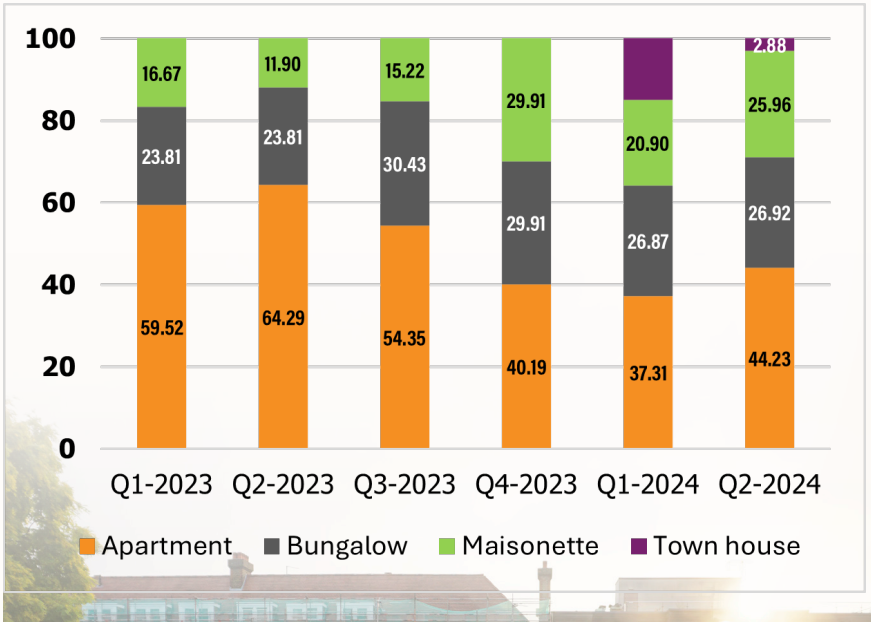
Source: KBA Computation from Housing Prices Survey

Buyer preferences in the second quarter of 2024 shifted notably, pointing to a diverse market that caters to varying budget ranges and lifestyle choices.

First, Apartments, accounting for 44.23 percent of transactions, remained the dominant type of housing but saw a reduced market share compared to earlier quarters **(Figure 5a)**. Interest in maisonettes grew to 25.96 percent, while bungalows held steady at 26.92 percent. Townhouses, in contrast, saw fewer transactions, dropping to 2.88 percent, reflecting buyersí inclination towards more versatile and moderately priced housing options.

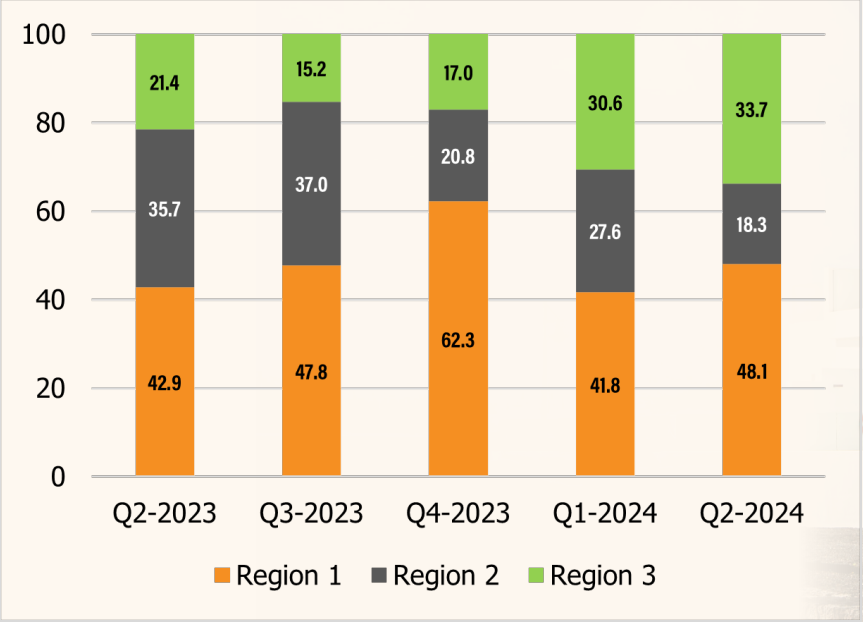
Second, the regional distribution of property transactions was more dynamic compared to the previous quarter. The low-market segment remained dominant, with 48.07 percent of sales. The high-market segment, however, exhibited notable growth, contributing 33.65 percent of the total transactions. In contrast, the mid-market segment experienced a slight decline, with only 18.26 percent of the transactions, indicating a potential shift in market focus **(Figure 5b)**.

Figure 5a: Figure 5a: Quarterly Distribution of House Transactions by Region (%)



Source: KBA Computation from Housing Prices Survey

Figure 5a: Quarterly Distribution of House Transactions by House Type (%)

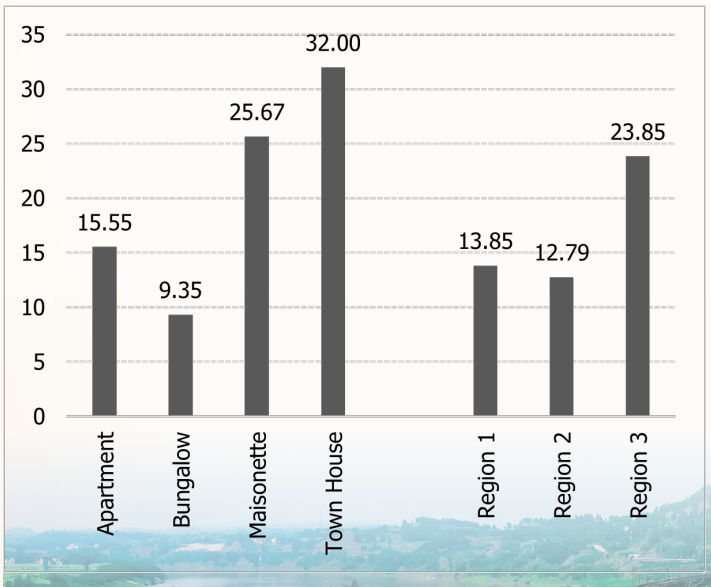


Source: KBA Computation from Housing Prices Survey

Third, the price analysis by region and house type further illustrated these shifts, with maisonettes and townhouses maintaining their status as the most expensive, while apartments remained the more affordable option **(Figure 6a)**.

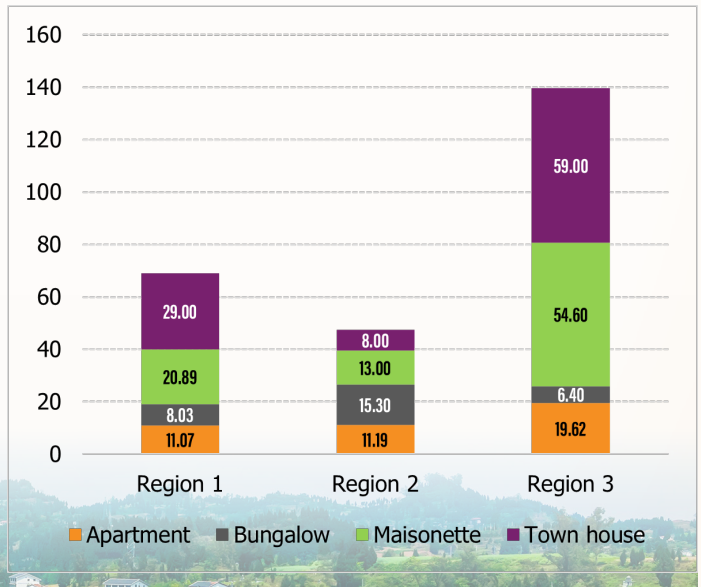
In particular, the high-market segment recorded the highest prices for maisonettes, highlighting strong demand for luxurious homes in these regions **(Figure 6b)**.

Figure 6a: House Prices By Region



Source: KBA Computation from Housing Prices Survey

Figure 6b: House Prices By Type of House



Fourth, the average plinth area analysis reinforced the premium segmentís appeal, with townhouses remaining the largest at 3,735.07 square feet **(Figure 7a)**.

Region 2 continued to feature developments catering to buyers seeking more spacious and upscale living environments, reflecting the preferences of a wealthier clientele **(Figure 7b)**.

Figure 7a: Average Plinth Area by House Type

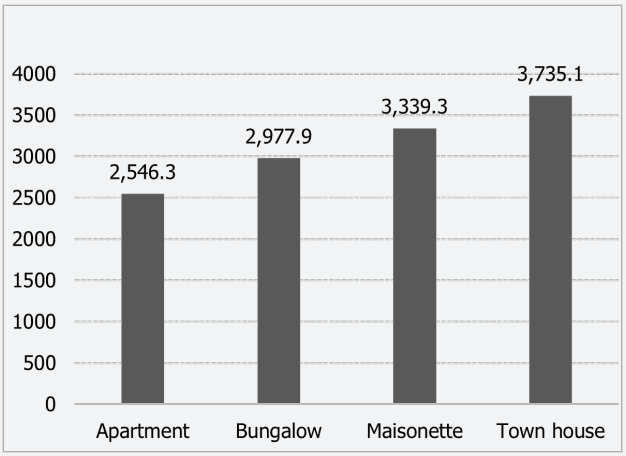
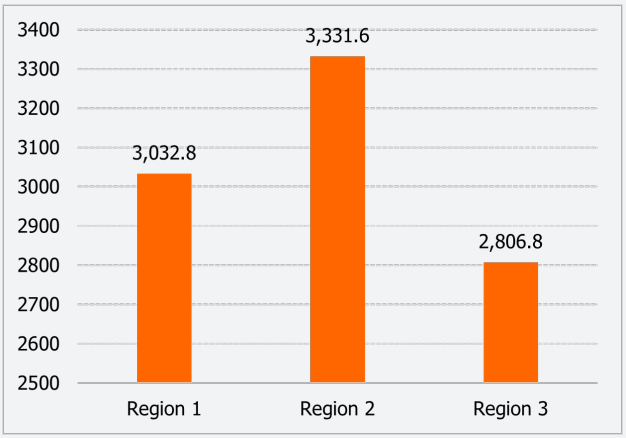


Figure 7b: Average Plinth Area Across the Region



Source: KBA Computation from Housing Prices Survey

Drivers of House Prices Based on Hedonic Regression

The hedonic regression results in **Table 2** show that the main drivers of house prices remained largely unchanged compared to the previous quarters. Moreover, consistent with the earlier observed trends, three key patterns emerge for shadow price attributes.

First, shifts in buyer preferences are clear as demand for properties with more bedrooms and bathrooms remains strong, heavily influencing market values. This aligns with the observed trends in second quarter of 2024, where larger townhouses and maisonettes with ample plinth areas attract higher prices.

Second, regional price variations remain evident. High-market segment **(Region 3)** see higher property values, aligned with stronger demand and transaction activity. Meanwhile, the low-market segment **(Region 1)** has more transactions but is likely saturated, keeping price premiums down.

Third, property type and affordability heavily influence buyer choices. Apartments appear to be an affordable option and is popular among budget-conscious buyers. This preference drives high transaction volumes for apartments, even with their lower market values, reinforcing their appeal in the entry-level segment.

> “shifts in buyer preferences are clear as demand for properties with more bedrooms and bathrooms remains strong, heavily influencing market values.

The computation of the KBA-HPI is underpinned by estimating the weights and the shadow prices. The weighting scheme applied to the shadow prices varies from one quarter to another and relates to the units transacted during the quarter (See Technical Note for details).

The weights applied in the case of quantitative attributes (i.e., plinth area, number of bedrooms, number of bathrooms, and number of floors) are their respective averages, and proportions are applied as weights in the case of the qualitative attributes (i.e., type of house, and the region).

The qualitative and quantitative parameters, that drive the house price change and feed into the construction of the KBA-HPI, are based on an estimation of a hedonic regression. The regression generates the shadow prices or marginal contributions, taking cognizance of the heterogeneous nature of housing goods best characterized by their attributes.

The hedonic regressions recognize that a dwelling is composed of a bundle of characteristics for which no market for them exists, as they cannot be sold separately, so the prices of the characteristics are not independently observed. The demand and supply for the properties implicitly determine the characteristicsí marginal contributions to the prices of the properties.

> The qualitative and quantitative parameters, that drive the house price change and feed into the construction of the KBA-HPI, are based on an estimation of a hedonic regression.

Technical Note

The index follows a Laspeyers index method. In this method, the index is computed by getting the ratio of the estimated current quarter price from the hedonic method (multiplied by the weights of the preceding quarter) to the price of the preceding quarter (multiplied by the respective weights of that quarter).

The weights of the quantitative variables are obtained by getting their respective mean values. For the dummy variables however, their weights are computed as the proportions of the number of houses possessing a certain attribute to the total number of houses. Thus the index is computed by the formula:

$$Index = \sum_{i=1}^{n} w_i \frac{\hat{P}_1}{\hat{P}_0} = \frac{\sum_{i=1}^{n} w_0 \hat{P}_1}{\sum_{i=1}^{n} w_0 \hat{P}_0}$$

Where; $\hat{P}_1$ is the shadow price from the estimated hedonic function for the current quarter;

$\hat{P}_0$ is the shadow prices from the estimated hedonic function for the preceding quarter;

And w_0 are the weights of the respective variables for the preceding quarter.

Table 2: Housing Price Index Drivers for Quarter 2 of 2024

Source	SS	df	MS
Model	32.89	9.0	3.65
Residual	23.68	94.0	0.25
Total	**56.57**	**103.00**	**0.55**

Number of obs = 104.00
F(8, 93) = 12.94
Prob > F = 0.00
R-squared = 0.582
Adj R-squared = 0.537
Root MSE = 0.504

Market Value	Coefficient	Std. err.	t	P>t	[95% conf.	interval]
Constant	14.272	0.032	31.890	0.000	0.033	0.159
Plinth Area	0.096	0.239	3.030	0.003	0.088	1.038
No. of Bedrooms	0.563	0.146	2.350	0.021	0.327	0.909
No. of Bathrooms	0.618	0.076	4.220	0.000	-0.168	0.136
No. of Floors	-0.016	0.319	-0.210	0.835	-0.803	0.465
House Type Dummy						
Townhouse	-0.169	0.151	-0.530	0.597	-0.425	0.174
Apartment	-0.125	0.163	-0.830	0.409	-0.750	-0.104
Bungalow	-0.427	0.138	-2.630	0.010	-0.387	0.161
Regional Dummy						
Region 1	-0.113	0.161	-0.820	0.415	0.283	0.923
Region 3	0.603	0.448	3.740	0.000	13.384	15.161

Notes:

- All the Quantitative variables (Plinth Area, No. of Bedrooms, No. of Bathrooms, No. of Floors) enter the hedonic regression function in their natural logarithm. The house price is also expressed in its natural logarithmic form

Housing Price Index
Quarter 2 2024

102.41

Table 3: Housing Price Index Drivers for Quarter 1 of 2024

Source	SS	df	MS
Model	25.38	8.0	3.14
Residual	22.29	93.0	0.24
Total	**47.66**	**101.00**	**0.47**

Number of obs = 102.00
F(8, 88) = 12.93
Prob > F = 0.00
R-squared = 0.527
Adj R-squared = 0.486
Root MSE = 0.493

Market Value	Coefficient	Std. err.	t	P>t	[95% conf.	interval]
Constant	14.451	0.443	2.510	0.014	13.572	15.330
Plinth Area	0.055	0.030	1.830	0.070	-0.005	0.760
No. of Bedrooms	0.200	0.282	0.710	0.480	-0.360	0.760
No. of Bathrooms	0.772	0.203	3.810	0.000	0.370	1.175
No. of Floors	0.085	0.079	1.080	0.282	-0.071	0.241
House Type Dummy						
Townhouse	0.024	0.530	0.050	0.964	-0.103	1.077
Apartment	-0.081	0.136	-0.600	0.553	-0.350	0.189
Bungalow	-0.315	0.189	-1.670	0.099	-0.690	0.060
Regional Dummy						
Region 1	-0.160	0.124	-1.280	0.202	-0.407	0.087
Region 3	0.419	0.150	2.790	0.006	0.121	0.717

Notes:

- All the Quantitative variables (Plinth Area, No. of Bedrooms, No. of Bathrooms, No. of Floors) enter the hedonic regression function in their natural logarithm. The house price is also expressed in its natural logarithmic form.
- Reference categories for the dummy variables for house types and region were maisonettes and region 2, respectively.

Housing Price Index
Quarter 1 2024

100.11

Table 4: Housing Price Index Drivers for Quarter 4 of 2023

Source	SS	df	MS
Model	26.14	8.0	3.27
Residual	21.61	88.0	0.25
Total	**47.75**	**96.00**	**0.50**

Number of obs = 97.00
F(8, 88) = 13.31
Prob > F = 0.00
R-squared = 0.547
Adj R-squared = 0.506
Root MSE = 0.496

Market Value	Coefficient	Std. err.	t	P>t	[95% conf.	interval]
Constant	14.716	0.420	3.280	0.002	13.881	15.550
Plinth Area	0.004	0.030	0.130	0.897	-0.056	0.063
No. of Bedrooms	0.823	0.278	2.960	0.004	0.271	1.375
No. of Bathrooms	0.469	0.175	2.680	0.009	0.121	0.818
No. of Floors	0.032	0.070	0.450	0.652	-0.107	0.171
House Type Dummy						
Apartment	-0.032	0.147	-0.220	0.826	-0.326	0.261
Bungalow	-0.364	0.147	-2.480	0.015	-0.655	-0.072
Regional Dummy						
Region 1	-0.418	0.202	-2.070	0.042	-0.821	-0.016
Region 3	0.056	0.214	0.260	0.795	-0.370	0.481

Notes:

- All the Quantitative variables (Plinth Area, No. of Bedrooms, No. of Bathrooms, No. of Floors) enter the hedonic regression function in their natural logarithm. The house price is also expressed in its natural logarithmic form.
- Reference categories for the dummy variables for house types and region were maisonettes and region 2, respectively.

Housing Price Index
Quarter 4 2023

98.22

Table 5: Housing Price Index Drivers for Quarter 3 of 2023

Source	SS	df	MS
Model	17.72	8	2.21
Residual	12.32	37	0.33
Total	**30.03**	**45**	**0.67**

Number of obs = 46.00
F(8, 37) = 6.65
Prob > F = 0.00
R-squared = 0.590
Adj R-squared = 0.501
Root MSE = 0.577

Market Value	Coefficient	Std. err.	t	P>t	[95% conf.	interval]
Constant	13.339	1.038	0.000	0.999	11.263	15.442
Plinth Area	0.269	0.134	2.010	0.052	-0.003	0.541
No. of Bedrooms	0.784	0.629	1.250	0.220	-0.490	2.059
No. of Bathrooms	0.585	0.445	1.320	0.196	-0.316	1.486
No. of Floors	0.105	0.106	0.980	0.331	-0.111	0.320
House Type Dummy						
Apartment	0.206	0.301	0.680	0.498	-0.403	0.815
Bungalow	-1.065	0.369	-2.880	0.007	-1.813	-0.317
Regional Dummy						
Region 1	-0.509	0.638	-0.800	0.430	-1.800	0.783
Region 3	-0.846	0.680	-1.240	0.222	-2.224	0.533

Notes:

- All the Quantitative variables (Plinth Area, No. of Bedrooms, No. of Bathrooms, No. of Floors) enter the hedonic regression function in their natural logarithm. The house price is also expressed in its natural logarithmic form.
- Reference categories for the dummy variables for house types and region were maisonettes and region 2, respectively.

Housing Price Index
Quarter 3 2023

99.75

THE DEFINITION OF THE SUB-REGIONS

REGION 1

Athi River, Mlolongo, Mavoko, Nakuru, Ngong, Ruaka, Syokimau, Embakasi, Kahawa Wendani, Thika, Mtwapa, Utange, Kitengela, Kiembeni, Nyeri, Likoni, Eldoret, Ruiru, Kilifi,Thika road (Kasarani, Roysambu, Ruaraka), Meru, Bungoma.

REGION 2

Thindigua (Kiambu Road), Kiambu, South B, South C, Kabete, Komarock, Imara Daima, Membley, Buruburu, Rongai, Waiyaki Way (Uthiru, Regen, Kinoo, Kikuyu), Mbagathi road, Ngong Road, Langata.

REGION 3

Kileleshwa, Kilimani, Lavington, Westlands, Spring Valley, Riverside, Milimani (Kisumu), Milimani (Nakuru), Runda, Karen, Garden Estate, Parklands, Ridgeways, Muthaiga, Loresho, Kitisuru, Adams Arcade, Nyali, Mountain View, Nyari.

Kenya Bankers Association
13th Floor, International House, Mama Ngina Street
P.O. Box 73100– 00200 NAIROBI
Telephone: 254 20 2221704/2217757/2224014/5
Cell: 0733 812770/0711 562910
Fax: 254 20 2221792
Email: research@kba.co.ke
Website: www.kba.co.ke

KENYA BANKERS ASSOCIATION
One Industry. Transforming Kenya.