Zamara Consulting Actuaries Schemes Survey

March 2022





Introduction

We are pleased to present our 65th Investment Performance Survey for the period ending 31 March 2022.

This Survey covers 430 schemes with a total of K Shs 1.05 trillion of assets under management.

We acknowledge and thank each of the participating Fund Managers for providing the necessary asset and performance data in a timely manner.

Fund Manager	Number of Participating Schemes	Value of Assets Under Management (KShs m)
African Alliance Kenya Investment Bank Limited	7	
Apollo Asset Managers	2	
British American Asset Managers	23	
CIC Asset Managers	7	
Co-op Trust Investments	64	
Cytonn	3	
GenAfrica Asset Managers	101	
ICEA Lion Asset Management Limited	59	
NCBA Investment Bank Limited	2	
Old Mutual Investment Group Limited	85	
Sanlam Investments East Africa Limited	77	
Subtotal	430	1,051,240

Some schemes did not qualify to be included in the Survey. This was due to one or more of the following reasons:

- Incomplete data.
- Data received did not pass sense checks.
- Responses to queries were not received as at the date of issuing this report.

Market Commentary Q1 2022



General Economic Review: The Kenyan Economy is projected to grow at an average rate of 4.9% in 2022: with the Russia- Ukraine conflict and inflationary pressures around the world expected to put a drag on the post- Covid economic recovery. The Stanbic Bank Purchasing Managers' Index declined to 50.5 at the end of the quarter from 53.7 the previous quarter. The decline indicates a general slowdown in the business environment in the private sector amid concerns over inflation pressures.

Inflation: Overall inflation declined to 5.6% at the end of the quarter in comparison to 5.7% the previous quarter. The decline was despite the recent pressures arising from supply disruptions caused by the Russia- Ukraine crisis as well as the surge in global oil and local commodity prices.

Currency Market: The Kenya Shilling depreciated by 1.6% during the quarter against the U.S. Dollar to close at Kshs 115.0, from Kshs 113.1 on 31 December 2021. The depreciation is attributable to rising dollar demand by importers of petroleum products due to uncertainty in global oil prices.

Index	Q1	1 yr	3 yr ³	5yr ³
NASI	(6.4%)	(1.8%)	(0.4%)	3.6%
Zamara Kenya Equity Index	(3.6%)	10.5%	3.5%	7.6%
NSE 25 Share Index	(4.8%)	0.9%	(3.2%)	0.5%
S&P Kenya Sovereign Bond Index	1.1%	10.4%	11.6%	13.6%
FTSE Bond Performance Index	1.8%	10.1%	11.8%	13.8%
91 Day Tbill	1.8%	7.0%	6.9%	7.3%
Inflation CPI K Shs	1.6%	5.6%	5.6%	5.7%
USD/K Shs ¹	(1.6%)	(4.7%)	(4.3%)	(2.2%)
MSCI ACWI Index ²	(4.2%)	10.9%	16.9%	12.1%
MSCI Emerging Markets ²	(5.8%)	(9.0%)	7.2%	5.9%
MSCI World Index ²	(4.0%)	14.0%	18.2%	12.9%

- 1. Negative implies Shilling depreciated, positive implies Shilling appreciated
- 2. Returns are Kenya Shilling adjusted
- 3. For periods more than 1-year; returns are annualized
- 4. All values are as at 31 March 2022

Source: NSE, CBK, MSCI, KNBS

Equity Market: The equity market was on a downward trajectory during the quarter with NASI & ZKEI losing 6.4% and 3.6% respectively. The equities market performance during the quarter was mainly driven by losses recorded by large caps such as Safaricom and EABL.

Fixed Income: The Monetary Policy Committee retained the Central Bank Rate at 7.0%. The committee's view was that the accommodative stance implemented in March 2020 was having the intended effects on the economy. The average yields on short-term government debt instruments changed marginally with the 364-day, 182-day, and 91-day T-bills averaging at 9.6%, 8.1%, and 7.5% respectively during the quarter. The S&P Kenya Sovereign Bond Index gained 1.1% over the quarter compared to 2.3% in December 2021.

Offshore markets: Global equity markets recorded declines over the quarter as the Emerging Markets Index, the All Country World Index, and the All-World Index lost 7.5%, 5.7%, and 5.3% respectively in USD terms. The losses were attributable to investors flight to safety from the equities markets to less risky assets such as the bonds market. This was also coupled with increased interest rates in markets such as the USA, promising investors higher yields.



Executive Summary and Key Highlights

Key Highlights

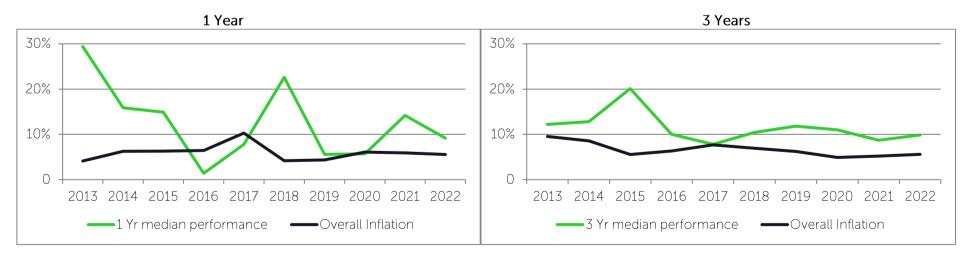
In the table below, we set out a summary of the median performance of schemes for each of the years from 31 March 2013 to 31 March 2022.

Period Ending 31 March	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022
Number of Schemes Participating	132	126	317	373	379	389	417	415	421	430
Total Assets K Shs Bn	195.2	224.6	490.4	535.3	582.5	717.9	808.3	852.4	969.2	1,051.2
1 Yr Median performance	29.4%	15.9%	14.9%	1.4%	7.8%	22.6%	5.6%	5.7%	14.2%	9.2%
3 Yr Median performance	12.2%	12.8%	20.1%	10.0%	7.8%	10.4%	11.8%	11.0%	8.7%	9.9%
Overall 1 year Inflation ¹	4.1%	6.3%	6.3%	6.5%	10.3%	4.2%	4.3%	6.1%	5.9%	5.6%
Overall 3 year Inflation ²	9.5%	8.6%	5.6%	6.3%	7.7%	6.9%	6.2%	4.9%	5.2%	5.6%

Notes:

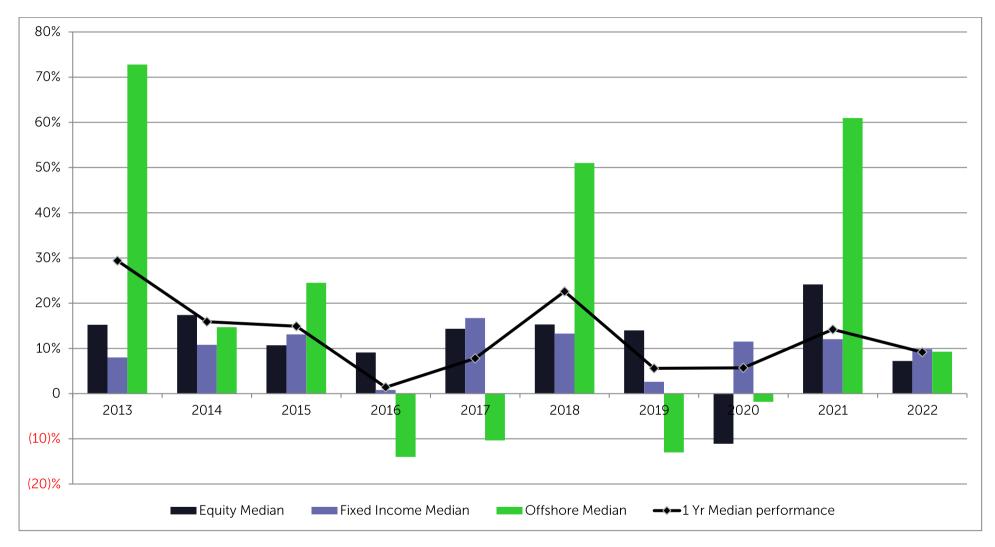
- 1. Based on KNBS Statistics 2012 2022: <u>www.knbs.or.ke/</u>
- 2. Calculated geometric average over 3 years.

The Survey indicates that the median scheme did not always outperform overall inflation over the 1-year. Over 1-year, median returns underperformed inflation in 2016,2017 and 2020, as shown in the 1-year chart below. Over 3-years, median returns have outperformed inflation in all periods. as shown in the 3-year chart below.



Executive Summary and Key Highlights





The chart above shows the median performance trend of the three asset classes (equity, fixed income and offshore) as at 31 March for each of the last 10 years.

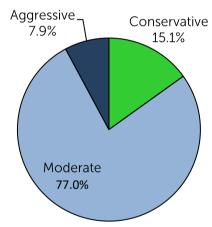
Risk Profile of Participating Schemes



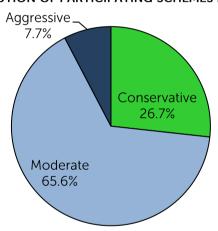
	STATISTICS													
Risk Profile	Fixed Income Allocation*	Number of Schemes	Scheme Percentage %	Assets Under Management K Shs m*	Asset Percentage %									
Conservative	Over 80%	115	26.7%	142,005	15.1%									
Moderate	65% to 80%	282	65.6%	724,115	77.0%									
Aggressive	Less than 65%	33	7.7%	73,845	7.9%									
Total		430	100.0%	939,965	100.0%									

^{*}Asset allocation shown above and used to determine the above profiles excludes property

DISTRIBUTION OF PARTICIPATING SCHEMES BY ASSET SIZE



DISTRIBUTION OF PARTICIPATING SCHEMES BY NUMBER



430 Schemes qualified for inclusion in the Survey on the basis of being segregated arrangements with at least 3 months return periods.

The survey is dominated by moderate schemes; they comprise 65.6% of participating schemes and manage 77.0% of assets in this survey.

Conservative schemes make up 26.7% of number of participating schemes with 15.1% of assets under management. Aggressive schemes make up 7.7% of number of participating schemes with 7.9% of assets under management.

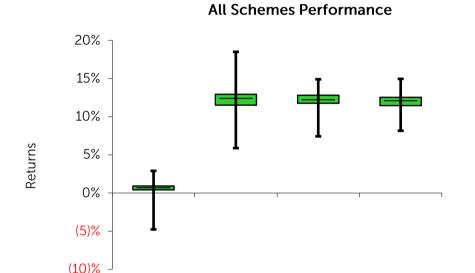
Analysis and Distribution of Returns for the Period



	3 Month	1 year	3 year*	5 year*
25th Percentile	(0.8)%	8.7%	9.4%	10.8%
Median	(0.4)%	9.2%	9.9%	11.5%
75th Percentile	(0.1)%	9.6%	10.3%	11.9%
Range of Returns	6.0%	12.9%	12.4%	14.2%
Average	(0.3)%	9.1%	9.8%	11.3%
Weighted Average	(0.6)%	8.6%	9.7%	11.3%

5 year (%)

3 year (%)



3 Months (%) 1 year (%)

Over the quarter ended 31 March 2022, the median return of the participating schemes was (0.4)%, compared to 0.7% in December 2021. The decline in performance has been attributed to losses in the equities and Offshore markets and reduced performance from the Fixed Income segment over the quarter.

Over the 1-year period to 31 March 2022, the median return of the participating schemes was 9.2% compared to 14.2% over a similar period in 2021.

Over the 3-year period to 31 March 2022, the median return of the participating schemes was an annualized 9.9%.

Over the 5-year period to 31 March 2022, the median return of the participating schemes was an annualized 11.5%

The box plots on the next page show our analysis of the median and range of returns of the participating schemes categorized by risk profile: conservative, moderate and aggressive schemes

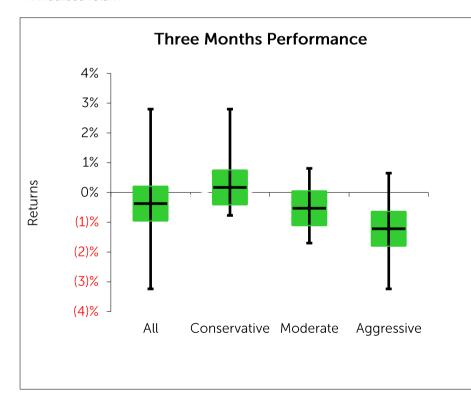
^{*}Annualised return

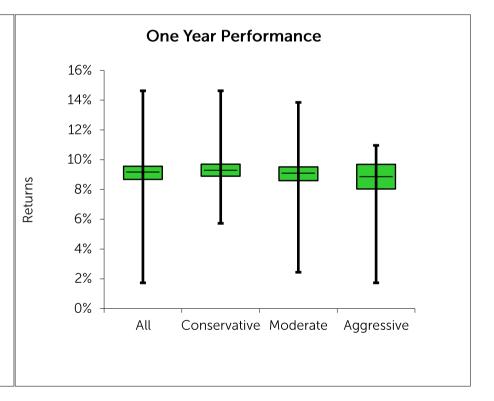
Analysis and Distribution of Returns



						Return [Distribution						
		Conservat	ive Schemes			Moderate	Schemes			Aggressive Schemes			
	3 Month	1 year	3 year*	5 year*	3 Month)	1 year	3 year*	5 year*	3 Month	1 year	3 year*	5 year*	
25th Percentile	(0.1)%	8.9%	9.6%	10.9%	(0.8)%	8.6%	9.4%	10.8%	(1.4)%	8.0%	8.6%	10.4%	
Median	0.2%	9.3%	10.1%	11.7%	(0.5)%	9.1%	9.8%	11.4%	(1.2)%	8.9%	9.6%	11.1%	
75th Percentile	0.7%	9.7%	10.4%	11.9%	(0.3)%	9.5%	10.2%	11.8%	(0.8)%	9.7%	10.5%	12.0%	
Range of Returns	3.6%	8.9%	6.3%	9.3%	2.5%	11.4%	9.0%	9.3%	3.9%	9.2%	8.8%	5.4%	
Average	0.4%	9.4%	9.9%	11.3%	(0.5)%	9.0%	9.8%	11.3%	(1.2)%	8.5%	9.1%	11.1%	
Weighted Average	0.4%	8.7%	10.0%	11.6%	(0.7)%	8.5%	9.7%	11.3%	(1.3)%	9.0%	9.6%	10.9%	

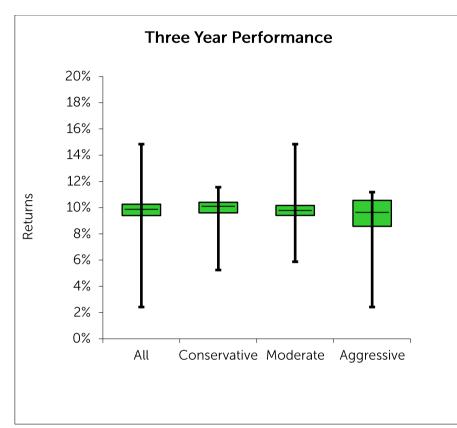
^{*}Annualised return

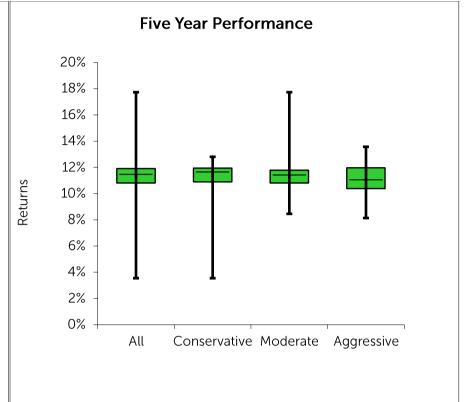




Analysis and Distribution of Returns







Conservative schemes posted the highest median returns over all the periods (3 months, 1 year, 3 year and 5 year), aided by a higher allocation towards Fixed Income that had stable performance over these periods.

Aggressive schemes had the lowest median return over all the periods (3 months, 1 year, 3 year and 5 year), on the background of lower performance from the equity class over these periods. Aggressive schemes have a higher allocation towards equity asset class.

Asset Class Returns for 3 Months Ending 31 March 2022

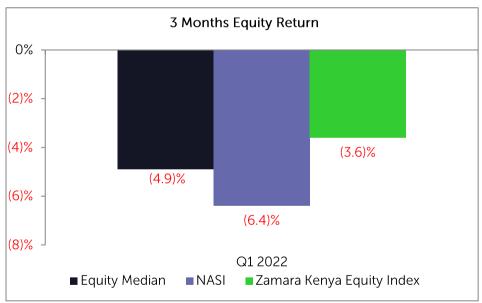


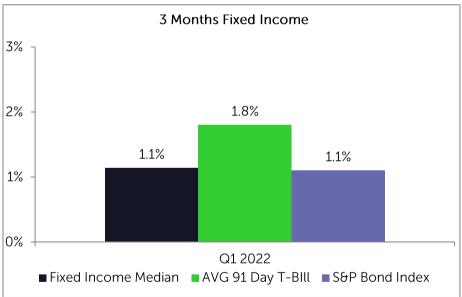
	Equity	Fixed Income	Offshore
25th Percentile	(5.3)%	1.0%	(12.1)%
Median	(4.9)%	1.1%	(10.9)%
75th Percentile	(4.3)%	1.3%	(7.3)%
Range of Returns	10.5%	3.6%	30.2%
Average	(4.7)%	1.2%	(9.3)%
Weighted Average	(4.8)%	1.1%	(8.7)%

Equity: The equity median return underperformed Zamara Kenya Equity Index, while outperforming NASI.

Fixed Income: The fixed income median return underperformed the average 91 Day Treasury Bill.

Offshore: The offshore median return under-performed MSCI Emerging, MSCI ACWI, and the MSCI world Indices.







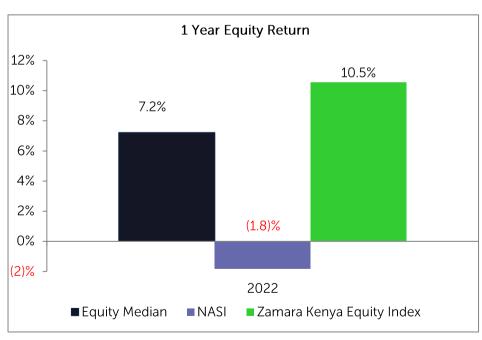


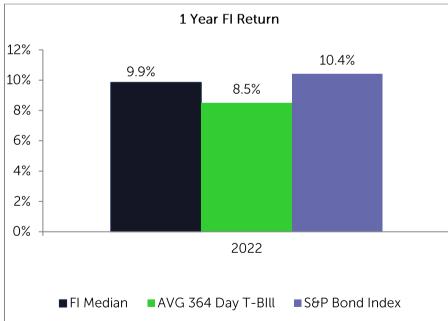
	Equity	Fixed Income	Offshore
25th Percentile	6.2%	9.5%	5.1%
Median	7.2%	9.9%	9.3%
75th Percentile	8.2%	10.1%	11.2%
Range of Returns	27.2%	13.4%	48.8%
Average	7.1%	9.8%	7.5%
Weighted Average	6.6%	9.2%	9.5%

Equity: The equity median return outperformed NASI, while underperforming the Zamara Kenya Equity Index.

Fixed Income: The fixed income median return outperformed the average 91 Day Treasury Bill, while underperforming the S&P Bond index.

Offshore: The offshore median return out-performed MSCI Emerging index, while under performing the MSCI world and MSCI ACWI Indices.







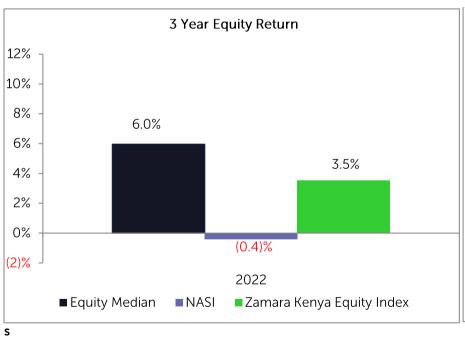


	Equity	Fixed Income	Offshore
25th Percentile	4.5%	10.6%	11.2%
Median	6.0%	11.0%	19.8%
75th Percentile	7.0%	11.3%	21.4%
Range of Returns	33.5%	13.1%	46.6%
Average	5.6%	10.7%	16.9%
Weighted Average	5.6%	10.9%	18.7%

Equity: The equity median return outperformed the NASI and the Zamara Kenya Equity Index.

Fixed Income: The fixed income median return outperformed the average 364 Day Treasury Bill but underperformed the S&P Bond Index.

Offshore: The offshore median return out-performed MSCI Emerging, MSCI world and MSCI ACWI Indices.





Asset Class Returns for 5 Years Ending 31 March 2022

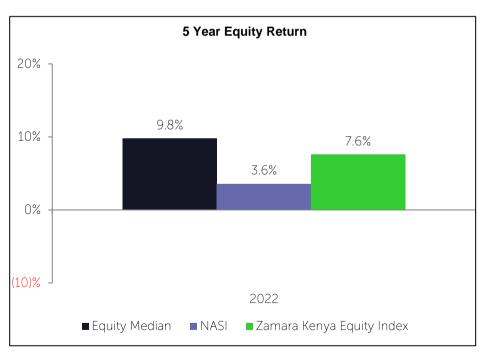


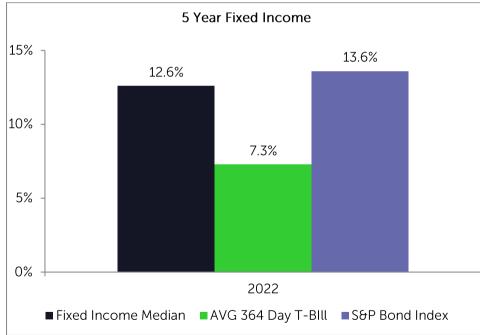
	Equity	Fixed Income	Offshore
25th Percentile	7.6%	12.2%	10.8%
Median	9.8%	12.6%	15.2%
75th Percentile	11.2%	12.9%	16.5%
Range of Returns	28.5%	8.1%	23.5%
Average	10.2%	12.6%	12.8%
Weighted Average	9.6%	12.6%	13.7%

Equity: The equity median return outperformed the NASI and the Zamara Kenya Equity Index.

Fixed Income: The fixed income median return outperformed the average 364 Day Treasury Bill but underperformed the S&P Bond Index.

Offshore: The offshore median return out-performed MSCI Emerging, MSCI world and MSCI ACWI Indices.





Analysis of Asset Allocation for the Period Ending 31 March 2022



	Asset Class Allocation																
	All Schemes					Conservative Schemes				Moderate Schemes				Aggressive Schemes			
	Equity	Fixed Income	Property	Offshore	Equity	Fixed Income	Property	Offshore	Equity	Fixed Income	Property	Offshore	Equity	Fixed Income	Property	Offshore	
Average	20.3%	71.9%	5.7%	2.1%	12.9%	85.0%	1.9%	0.2%	22.9%	70.1%	5.5%	1.5%	23.8%	41.1%	21.7%	13.4%	
Weighted Average	21.4%	66.2%	10.6%	1.8%	12.9%	83.8%	3.2%	0.2%	22.9%	66.4%	9.3%	1.4%	22.2%	41.0%	30.8%	6.0%	
Range of Allocation	61.0%	99.2%	89.3%	99.2%	20.0%	73.0%	73.0%	6.4%	25.5%	60.4%	71.2%	7.1%	61.0%	62.5%	89.3%	99.2%	
Median	17.3%	68.4%	-	-	15.4%	83.4%	-	-	20.6%	68.7%	-	-	23.5%	45.2%	13.1%	4.0%	

For comparison, we include the asset allocation figures as shown in our December 2021 report.

	Asset Class Allocation																
	All Schemes					Conserva	ative Scheme	es	Moderate Schemes					Aggressive Schemes			
	Equity	Fixed Income	Property	Offshore	Equity	Fixed Income	Property	Offshore	Equity	Fixed Income	Property	Offshore	Equity	Fixed Income	Property	Offshore	
Average	21.8%	71.5%	5.3%	1.4%	11.6%	86.6%	1.6%	0.2%	24.0%	69.8%	4.8%	1.4%	27.2%	49.4%	18.5%	4.9%	
Weighted Average	22.2%	65.1%	10.7%	2.0%	12.6%	84.3%	2.9%	0.2%	23.5%	66.3%	8.7%	1.5%	24.0%	45.0%	25.7%	5.3%	
Range of Allocation	40.3%	96.4%	88.6%	14.3%	19.7%	73.6%	73.6%	6.4%	26.5%	58.5%	68.5%	7.0%	32.4%	61.1%	88.6%	14.3%	
Median	22.5%	73.1%	-	-	13.3%	86.0%	-	=	21.4%	67.8%	-	-	29.0%	54.5%	9.3%	4.2%	

22.6% of the Schemes participating in the Survey had an allocation to property.

38.6% of the Schemes participating in the Survey had an allocation to offshore assets.

The Survey indicates that the average scheme's exposure to fixed income, property and offshore increased with allocation to equities decreased over the quarter.

Historical Economic Indicators



Exchange Rates	Mar-2022	Mar-2021	Mar-2020	Mar-2019	Mar-2018	Mar-2017	Mar-2016	Mar-2015	Mar-2014	Mar-2013
KES/ USD	114.9513	109.5118	104.6926	100.75	100.8472	103	101.3339	92.335	86.4414	85.6386
Inflation										
Headline	5.56%	5.90%	5.33%	4.35%	4.18%	10.28%	6.45%	6.31%	6.27%	4.11%
Food	9.92%	6.65%	10.55%	2.84%	2.19%	18.56%	9.41%	10.96%	8.29%	2.93%
Non-food	4.91%	4.01%	2.55%	8.19%	8.98%	2.45%	3.45%	2.92%	4.44%	4.82%
Interest Rates										
Central Bank Rate	7.00%	7.00%	7.25%	9.00%	9.50%	10.00%	11.50%	8.50%	8.50%	8.50%
Interbank Rate	5.02%	5.55%	5.19%	2.60%	6.07%	3.95%	3.75%	8.25%	7.29%	8.40%
Lending Rate		6.46%	7.07%	7.22%	8.16%	7.12%	7.17%	6.63%	6.61%	6.54%
Government Securities Yields										
AVG 91 Day T-Bill	7.04%	6.77%	6.91%	7.53%	8.34%	8.18%	11.05%	8.79%	9.00%	10.20%
AVG 182 Day T-Bill	7.68%	7.37%	7.74%	9.06%	10.43%	10.39%	12.58%	9.74%	9.64%	10.92%
AVG 364 Day T-Bill	8.73%	8.35%	9.78%	10.09%	11.00%	11.10%	13.34%	10.49%	10.59%	12.33%
Stock Market Indices										
NASI	(1.82)%	20.24%	(16.33)%	(17.55)%	46.50%	(11.48)%	(15.80)%	21.70%	22.03%	60.49%
ZKEI	10.55%	17.71%	(14.68)%	(15.79)%	54.14%	(10.77)%	(14.59)%	28.91%	15.30%	
MSCI World KES	13.98%	45.08%	(8.66)%	2.14%	9.10%	14.32%	3.90%	11.09%	17.77%	12.75%
MSCI ACWI KES	10.93%	45.51%	(9.61)%	0.71%	10.30%	14.56%	2.90%	10.39%	15.25%	11.37%
MSCI Emerging KES	(8.96)%	48.31%	(16.67)%	(9.42)%	19.50%	16.41%	(5.77)%	4.66%	(2.77)%	2.24%
Bond Indices										
FTSE Bond Index	10.14%	13.09%	12.31%	16.00%	17.80%	14.20%	8.64%	10.18%	16.57%	
S&P Sovreign Bond Index	10.41%	10.86%	13.66%	15.49%	6.50%	13.79%	7.61%	9.89%	16.84%	



Zamara Consulting Actuaries Schemes Survey FAQs

What is the Z - CASS Survey?

The Z - CASS Survey is an industry first initiative of Zamara Actuaries, Administrators and Consultants Limited and analyses the returns of retirement schemes invested in segregated vehicles with both discretionary and non-discretionary mandates. Schemes invested on an insured deposit administration basis are excluded as well as schemes having incomplete performance periods or returns.

What does the Consulting Actuaries Schemes Survey mean to a trustee?

One of the benefits of having a scheme based Survey is that retirement scheme trustees are given the opportunity to compare the performance of their scheme relative to their peers within the broader retirement scheme industry. The Survey considers the returns over a rolling one (1) three (3) year and five (5) year period and trustees can gain valuable insight into how similar sized schemes performed over the same period.

The Survey further analyses the allocation across four broad asset classes: equity, fixed income, property and offshore. The asset class allocation analysis is based on a point in time, which corresponds with the Survey reporting period. The benefit of this is that trustees can gain valuable insight into how similar sized schemes are invested and how asset class allocation contributed to their specific scheme's performance. Attribution performance for property asset class was unavailable from the data provided and hence excluded from the Survey.

Important issues to be aware of

The Survey is based on individual scheme returns rather than fund manager performance. Trustees also need to be aware that the schemes in the Survey differ in terms of their risk profiles, investment mandates and fund manager reporting bases (as a consequence of the absence of a uniform reporting basis by the fund managers). These factors may have an impact on the reported performance. It should also be noted that performance should not be assessed over the short-term and past performance is not necessarily a guide to future performance.

For specific Consulting Actuaries Schemes Survey gueries, contact:

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Glossary of Terms

Annualised

To convert an investment return into an equivalent one-year rate of return.

Asset Class Allocation

The allocation of a scheme's assets between different asset classes, i.e. equity, fixed income and interest, property and offshore investments.

Average

The mean or simple average of the schemes' performance and asset class allocation.

Discretionary Investment Mandate

This refers to the level of freedom (i.e. discretion) given to a fund manager by the trustees to invest the scheme's assets in accordance with the fund manager's best investment view. In many instances broad parameters are set by the trustees but the fund manager has complete autonomy in the investment decision making.

Inflation

Inflation is defined as a continued increase in the general level of prices and represents the cost of living index. Overall inflation includes in the 'basket' fuel and food stuffs, while underlying inflation excludes these from the 'basket'.

Median

The median is the return or weighting of the middle scheme (irrespective of size) when all the schemes' returns and asset allocations are ranked in order of performance or weighting. The median is not skewed by a wide range of returns or asset class weightings.

Non-Discretionary Investment Mandate

This refers to the degree of prescription to how the scheme's assets are invested and is the opposite of a fully discretionary mandate. The Trustees will be involved in the investment decision making and will instruct the fund manager how and in which assets to invest.

Percentile

Or quartile is one quarter of a sample. If returns of a scheme are ranked in a league table, then, for example, a second quartile ranking indicates that 25% of the schemes performed better and 50% achieved a lower return. i.e. the return in the second quarter or 25% of returns.

Performance Attribution

The composite performance broken down between the asset classes to determine how the respective classes contributed to the overall performance i.e. to which asset classes the performance was attributed.

Return

The increase in the value of an investment over a period of time, expressed as a percentage of the value of the investment at the start of the period.

Weighted Average

The mean or average of the schemes weighted according to the size of the assets under management.



Disclaimer

In preparing this Survey, we have used data supplied by the fund managers of the participating schemes. The data has been checked for reasonability where possible. While all possible care is taken in the compilation of the Survey to ensure that this document is accurate in all material respects, reliance is placed on information received from the fund managers.

Whereas the above constitutes the participating schemes per manager in the Survey, it is not representative of the total schemes under management by the various fund managers

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