



PENSION
MONITORING
CENTER

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Private Pension
Fund Performance
Assessment System
Report

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ABBREVIATIONS

A E S Auto Enrollment System

A I T Association of The Insurance and Pension Companies of Turkey

B I S T Borsa İstanbul A.Ş.

C B R T Central Bank of The Republic of Turkey

C M B Capital Markets Board of Turkey

C P I Consumer Price Index

C S D O F T U R K E Y Central Securities Depository

F P A C Fund Performance Assessment Committee

F P A S Fund Performance Assessment System

G U I D E L I N E S Pension Mutual Funds Guidelines

I P S Individual Pension System

P M C Pension Monitoring Center

T A K A S B A N K Istanbul Settlement and Custody Bank Inc.

T C M A Turkish Capital Markets Association

T U I K Turkish Statistical Institute



INTRODUCTION

This report has been prepared within the framework of responsibilities assigned to the Pension Monitoring Center (PMC) by Articles 10.4 (C/ii) and (D/ii) of the Pension Mutual Funds Guidelines (Guidelines) published by the Capital Markets Board of Turkey (CMB) in compliance with Articles 18 and 20/A of the Law No. 4632.

In the following chapters, the report broadly introduces the Fund Performance Assessment System (FPAS) initiated in 2020 and provides summary results of 2020 FPAS in the final chapter.

FUND PERFORMANCE ASSESSMENT SYSTEM PROCESS

The procedures and principles pertaining to the rewarding of portfolio management companies managing relatively high-return funds and the sanctioning of portfolio management companies managing relatively low-return funds during the real-time monitoring and assessment of pension mutual funds return performances are regulated by Article 10.4 of the Guidelines of the Capital Markets Board of Turkey.

The legislation assigns the operation of the system to Pension Monitoring Center (PMC) and dictates the below-elaborated issues to be settled by the Fund Performance Assessment Committee (FPAC) established within the PMC with the participation of the relevant stakeholders. Directions for the above-mentioned Guidelines and the FPAC include:

1. Comparing return performances of funds within the same comparison groups assorted by similar risk and title structures and asset allocation strategies, or, for other funds that cannot be included in any comparison groups, comparing return performances by benchmark return;

2. PMC determining fund comparison groups, funds excluded from comparison groups and related assessment methodology to present to the FPAC

followed by the announcement of the FPAC-approved methodology and fund lists to the public;

3. PMC monitoring fund performances in real-time; and, in compliance with the announced methodology, verifying the data and calculation with companies and conducting performance measurement and assessment within the relevant performance period;

4. PMC publicly announcing the performance results of the funds that are considered relatively successful or relatively poor within the first 15 business days of the year following the assessment period;

5. Imposing rewards or penalties on relevant portfolio management companies based on performance assessment results and the PMC announcing the results to the public.

Within this scope, the report presents the operations conducted by the FPAC and the secretarial work undertaken by the PMC as well as the assessment results of 2020, which are enclosed in the Appendix.



FUND PERFORMANCE ASSESSMENT COMMITTEE

The Fund Performance Assessment Committee (FPAC) is comprised of seven members (i.e. one from PMC, three from the Association of the Insurance, Reassurance and Pension Companies of Turkey [IAT], and three from the Turkish Capital Markets Association [TCMA]). FPAC decisions are reached by a vote majority and presided over by PMC representative. Information on FPAC members is provided in the below table.

Full Name	Representing	Position in Committee	Affiliated Organization	Position in Organization
Mustafa AKMAZ	PMC	Chairman	Pension Monitoring Center (EGM)	CEO
Ahmet KARAMAN	IAT	Member	Garanti Emeklilik ve Hayat A.Ş.	Assistant General Manager
Burcu UZUNOĞLU	IAT	Member	Allianz Yaşam ve Emeklilik A.Ş.	Chief Investment Officer/CIO
Fatih BOZKURT	IAT	Member	Katılım Emeklilik ve Hayat A.Ş.	Director of Fund Management and Fund Services
Oktay Okan ALPAY	TCMA	Member	Tacirler Portföy Yönetimi A.Ş.	CEO
Tankut Taner ÇELİK	TCMA	Member	Ziraat Portföy Yönetimi A.Ş.	CEO
Tevfik ERASLAN	TCMA	Member	İş Portföy Yönetimi A.Ş.	CEO

Table 1 – Information on FPAC Members

The duties of the FPAC are summarized below:

- Assessing and approving the comparison groups submitted by the PMC, and determining the minimum number of funds required to form a comparison group
- Defining a new grouping methodology for the funds that cannot be included in the comparison group, or in the event that there is an insufficient number of funds to create a group, or when considering such funds individually without including them in a group;
- Approving the calculation and verification processes submitted by the PMC;
- Processing and resolving the objections of the fund founders in accordance with the decisions of the FPAC.

The FPAC has held a total of 12 meetings so far and the decisions made are presented on our corporate website*.

* <https://egm.org.tr/fonlar/fon-performans-degerlendirme-sistemi/fpd-kararlari/>



2020 COMPARISON GROUPS SELECTION

In compliance with the principles of the Guidelines and the relevant decisions of the FPAC:

- Comparison Groups for 2020 were based on the fund types specified in the article within the Guidelines titled “Fund Types.”
- Groups were defined based on the nature of the assets in which they invest, while the fund type is the same.
- No distinction was made between IPS and AES when forming the comparison groups.
- Variable funds were sorted (conservative/cautious, balanced daring/dynamic/growth and aggressive) based on their risk values. Variable funds that do not hold a specific level of risk were assessed independently based on a different methodology
- Groups formed for the funds that are managed on the basis of participation and are the same type
- Comparison groups were designed to consist of a minimum of six funds.

Pursuant to the Guidelines, funds that cannot be sorted into any groups due to their asset allocation strategy or their risk structure, or because their number is below six, were listed under the title “Funds Not Included in Comparison Groups” and the FPAC determined a different methodology for these funds.

In this context, a total of 347 funds were sorted into 22 comparison groups while 53 funds remained excluded.



CALCULATION METHOD

Pursuant to relevant decisions of the Guidelines and the FPAC, the lower and upper thresholds for each comparison group were calculated as, respectively, “Arithmetic mean of gross returns from funds in a comparison group – standard deviation of gross returns from funds in the same group” and “Arithmetic mean of gross returns from funds in a comparison group + standard deviation of gross returns from funds in the same group.”

Accordingly, the performance of funds whose gross annual rate of return is equal to or below the lower threshold are considered “relatively poor” while those equal to or above the upper threshold are “relatively successful.” As for the funds whose gross rate of return is between the thresholds, their performance was considered “within acceptable limits.”



Figure 1 – Figure Depicting the Calculation Method for the Funds in the Comparison Group

Each of the funds that are not included in a comparison group will be assessed by its own benchmark return; lower and upper thresholds will be “benchmark return * 0.90” and “benchmark return * 1.10,” respectively; and, if the difference between the gross rate of return (%) and benchmark rate of return (%) of the said funds is above 0.75 percent of the absolute value, penalties or rewards will be applicable.

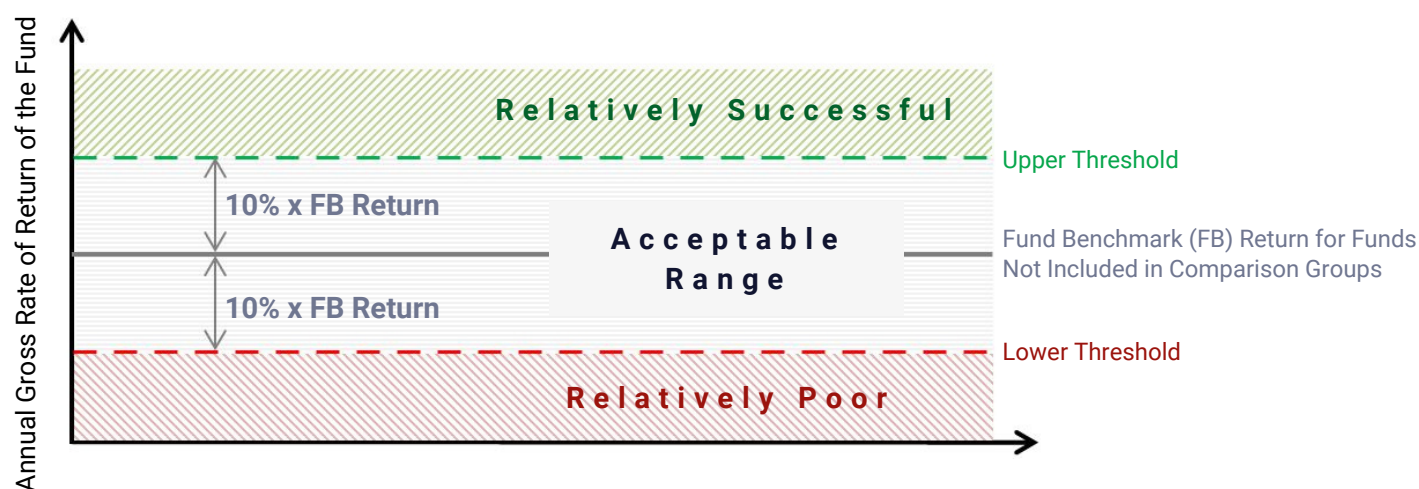


Figure 2 – Figure Depicting the Calculation Method for Funds Not Included in the Comparison Groups

PERFORMANCE-BASED REWARDS AND PENALTIES

Pursuant to the Pension Mutual Funds Guidelines, portfolio managers of the funds that are found to have performed “relatively poorly” for at least two years in a three-year performance assessment period will be replaced by the pension company that founded them. Such funds are prohibited from being managed by the same portfolio management company for the two years following the last year in which a poor performance was found.

On the other hand, the founding pension company will pay the portfolio management company an additional fee (success premium) equivalent to 50 percent of the fixed management fee paid to the portfolio manager from the fund management fee collected from the fund within the year in which the funds are found to be “successful” by a yearly performance assessment.

Each year, funds that are found to perform relatively poor and relatively will be announced on the Performance Assessment Results page by the PMC, with details of their yearly net returns, calculated performance results and respective portfolio managers.

PMC-CONDUCTED TECHNICAL STUDIES

PMC established an end-to-end digital platform to fully automate relevant processes of the FPAS, launched in compliance with Article 10.4 of the Guidelines.

To enable the automated gathering of data for calculation from Central Securities Depository (CSD of Turkey) , of funds prices and sizes from Takasbank and of index values for fund benchmark from various sources including BIST, the CBRT, TUIK, Bloomberg and Reuters, the PCM established data integration with these organizations and institutions.

Furthermore, the digital Fund Agreement Process was developed and integrated into the aforementioned system to compare the automated calculations by the FPAS with the results obtained by the pension companies and, if necessary, to impose due adjustments on company records.

With a view to maximize accountability and transparency while prioritizing the protection of trade secrets, web pages* were launched containing all information on the FPAS that might be relevant to stakeholders.

* <https://egm.org.tr/fonlar/fon-performans-degerlendirme-sistemi>



AGREEMENT ON THE 2020 PERFORMANCE ASSESSMENT RESULTS

Our calculations in compliance with the performance assessment methodology formulated pursuant to the Guidelines and the FPAC decisions, and the agreement on the net return, gross return and fund benchmark return values of funds with companies were conducted on the digital platforms within the first 15 working days of January 2021.

PUBLIC ANNOUNCEMENT OF THE 2020 PERFORMANCE ASSESSMENT RESULTS

Funds subject to rewards or penalties in compliance with Article 10.4 (B-iii) of the aforementioned Guidelines were announced to the public on January 22, 2021 through the PMC corporate website.

* <https://egm.org.tr/fonlar/fon-performans-degerlendirme-sistemi>

NOTIFICATIONS OF FUNDS SUBJECT TO REWARDS AND PENALTIES TO FOUNDING AND MANAGING COMPANIES

We notified the 15 pension companies and the 20 portfolio management companies of the "relatively successful" or "relatively poor" assessment of the funds they founded or manage via official letters numbered EGM-7030-21- 00001/... /EGM-7030-21-00035, dated February 3, 2021.

OTHER INFORMATION RELEVANT TO STAKEHOLDERS

We maintain the "Funds" heading on the PMC website with a view to provide stakeholders with easy access to all important publicly available information on pension mutual funds and to facilitate the comparisons of fund returns with alternative investment and comparison tools.

2020 FUND PERFORMANCE ASSESSMENT SUMMARY RESULTS

In 2020, all pension mutual funds (a total of 400 funds) were included in the Fund Performance Assessment System. In terms of quantity, 87 percent of funds are “Funds in Comparison Groups” and 13 percent are “Funds Not Included in Comparison Groups.” In terms of fund sizes as of late December, 2020, 86.8 percent of funds are “Funds Included in Comparison Groups” and 13.2 percent are “Funds Not Included in Comparison Groups.” Fund performance results for 2020 are summarized below.

The performances of 347 funds in the 2020 “Funds in Comparison Groups,” which had a net asset value of 146.96 billion Turkish lira as of year end, were assessed. In terms of quantity, 13 percent of these funds were deemed relatively successful, 77 percent within acceptable limits, and 10 percent were relatively poor. In terms of fund size, 6 percent were deemed relatively successful, 85 percent within acceptable limits and 9 percent relatively poor. (Figure 3 and 4)

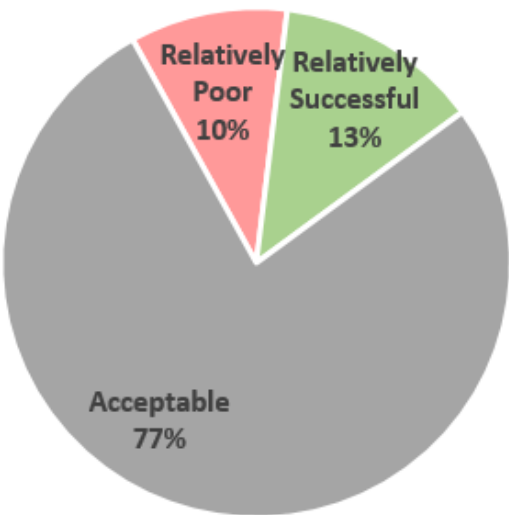


Figure 3 -
Distribution of Fund Performances
in the Comparison Groups by the Number of Funds

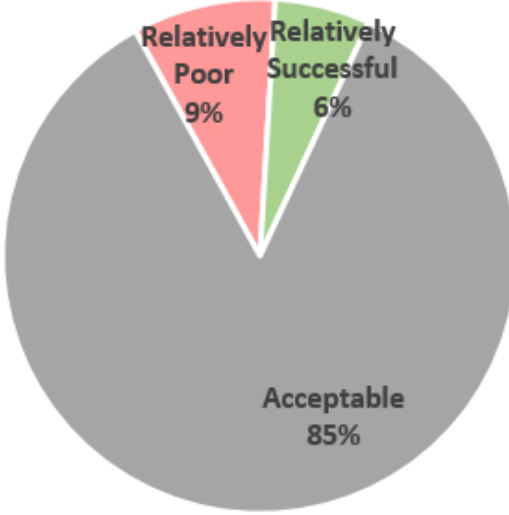


Figure 4 -
Distribution of Fund Performances
in the Comparison Groups by Net Asset Values



The performances of 53 funds in the 2020 “Funds Not Included in Comparison Groups,” which had a net asset value of 22.3 billion Turkish lira as of year end, were assessed. In terms of quantity, 40 percent of these funds were deemed relatively successful, 53 percent within acceptable limits, and 7 percent were relatively poor. In terms of fund size, 40 percent were deemed relatively successful, 59 percent were considered within acceptable limits, and only 1 percent was found to be relatively poor. (Figures 5 and 6)

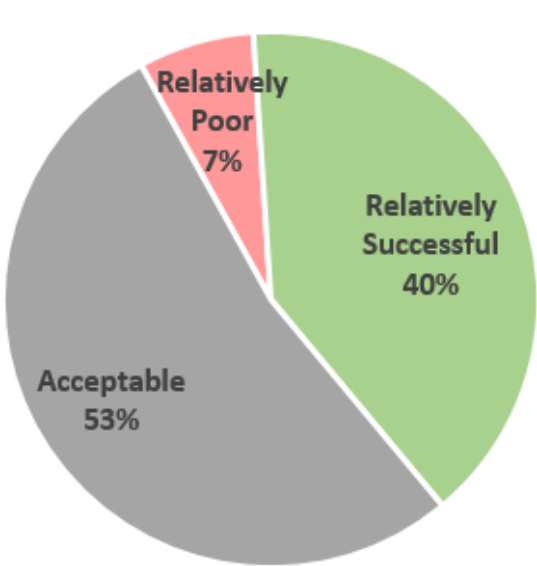


Figure 5 -
Distribution of Fund Performances Not Included in
the Comparison Groups by the Number of Funds

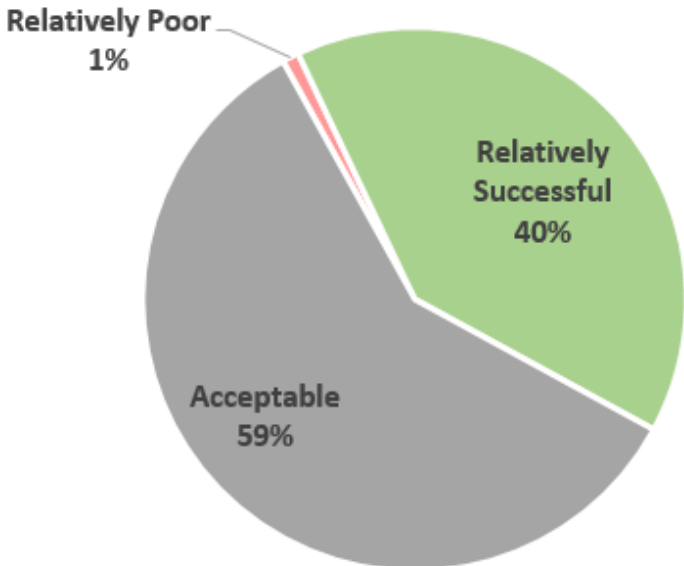


Figure 6 -
Distribution of Fund Performances Not Included in
the Comparison Groups by Net Asset Value

A comprehensive assessment of all funds (400 funds) included in the 2020 performance assessment system, which had a net asset value of 169.26 billion Turkish lira, was also conducted. In terms of quantity, 17 percent of all funds were deemed relatively successful, 74 percent within acceptable limits, and 9 percent was found to be relatively poor (Figure 7). In terms of fund size, 10 percent of all funds were deemed relatively successful, 82 percent within acceptable limits and 8 percent was found to be relatively poor (Figure 8).

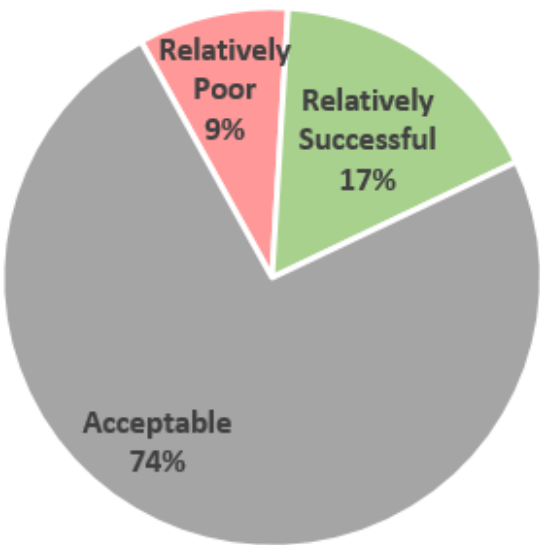


Figure 7 -
Distribution of Fund Performances of All
Funds Included in the Performance
Assessment by the Number of Funds

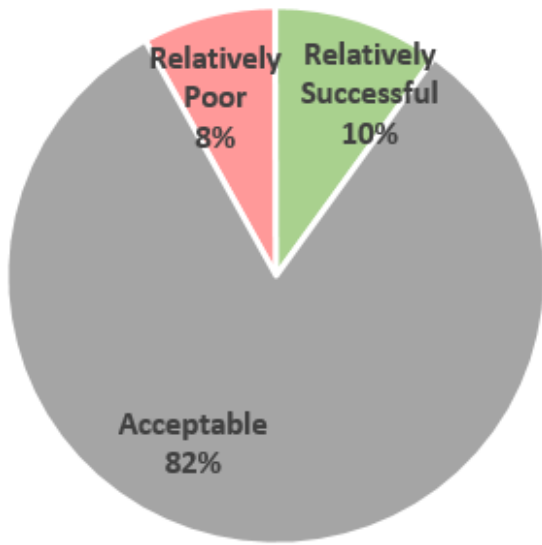


Figure 8 -
Distribution of Fund Performances of All
Funds Included in the Performance
Assessment by Net Asset Value

The 2020 fund performances of the 15 founding pension companies are demonstrated in the chart below. Figure 9 demonstrates performances by the number of funds and Figure 10 shows performances by net asset value.

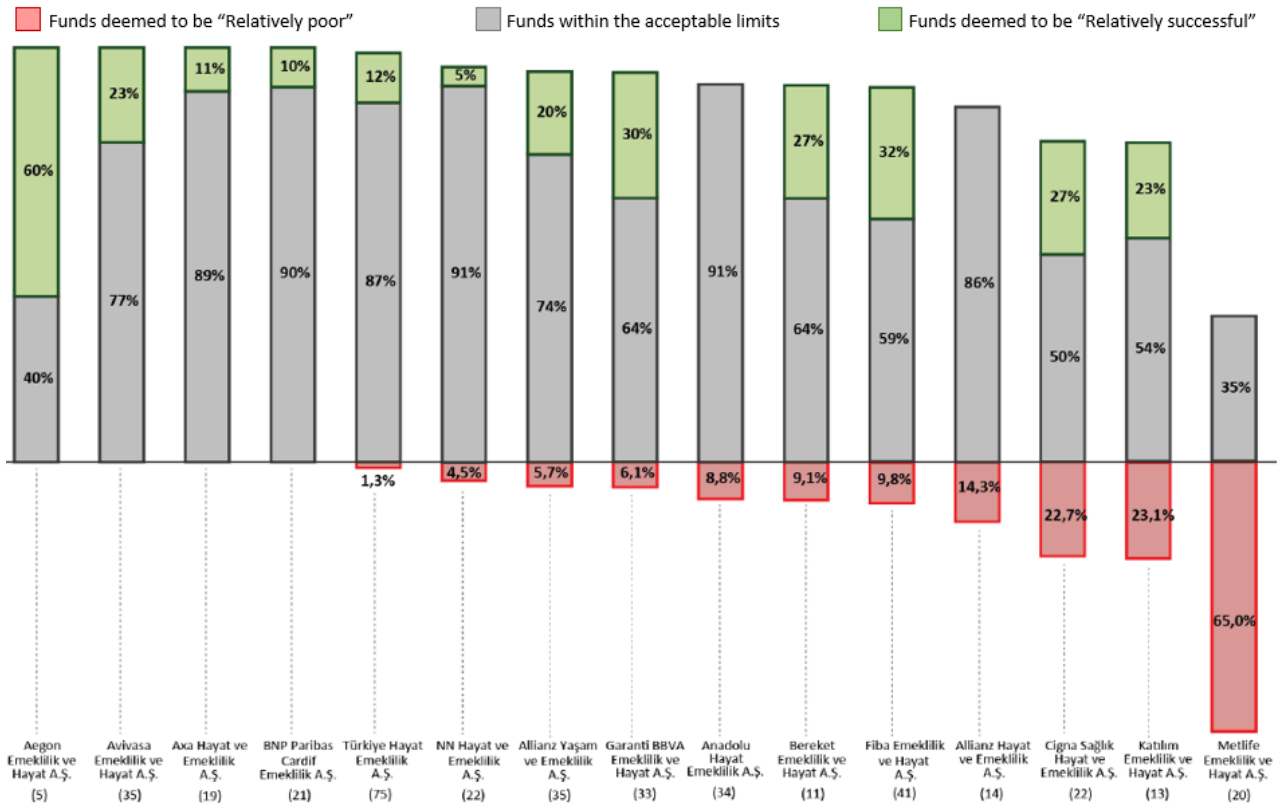


Figure 9 – Performance Results by the Number of Funds*

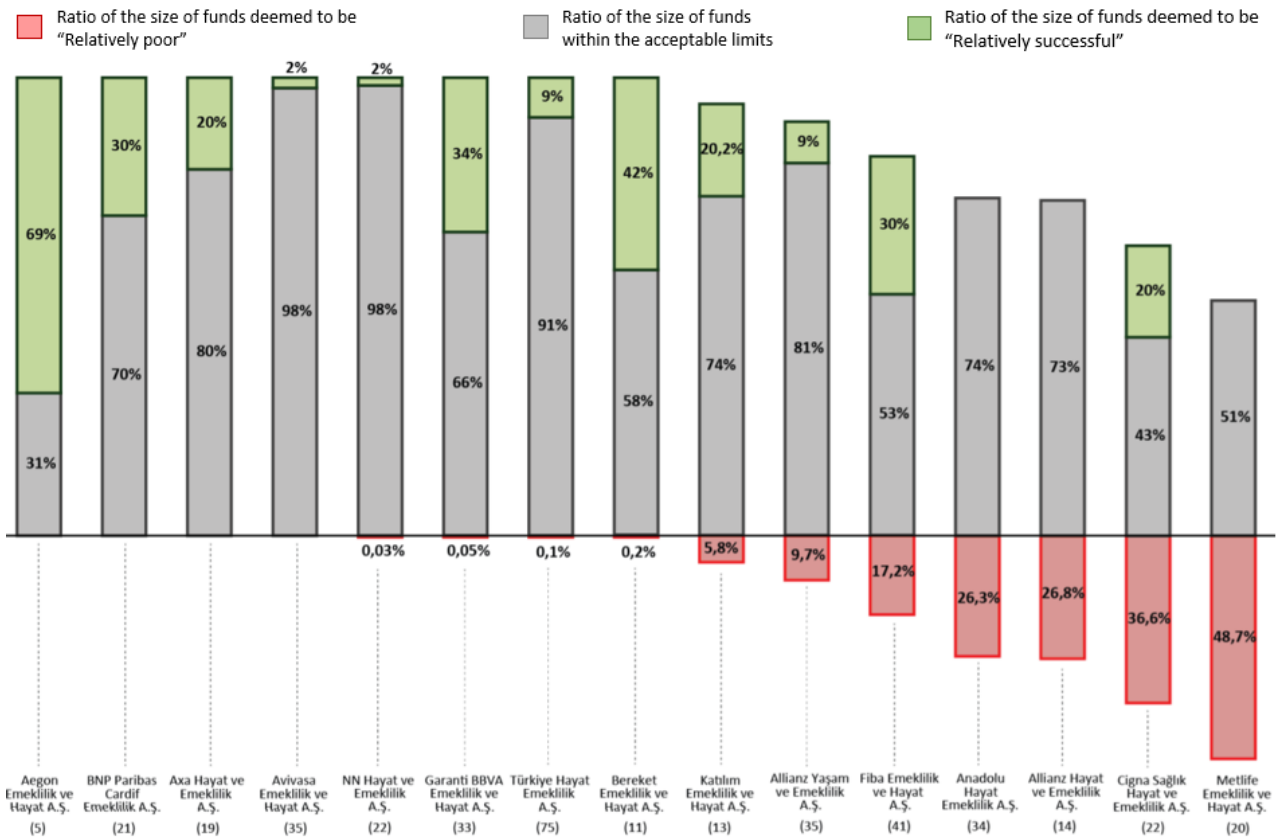


Figure 10 – Performance Results by Fund Size*

* In the above charts, the total number of funds founded by the same pension company and included in the performance assessment are provided in parenthesis below each company title.

The 2020 fund performances of the 25 portfolio management companies are demonstrated in the chart below. Figure 11 demonstrates performances by the number of funds and Figure 12 shows performances by net asset value.

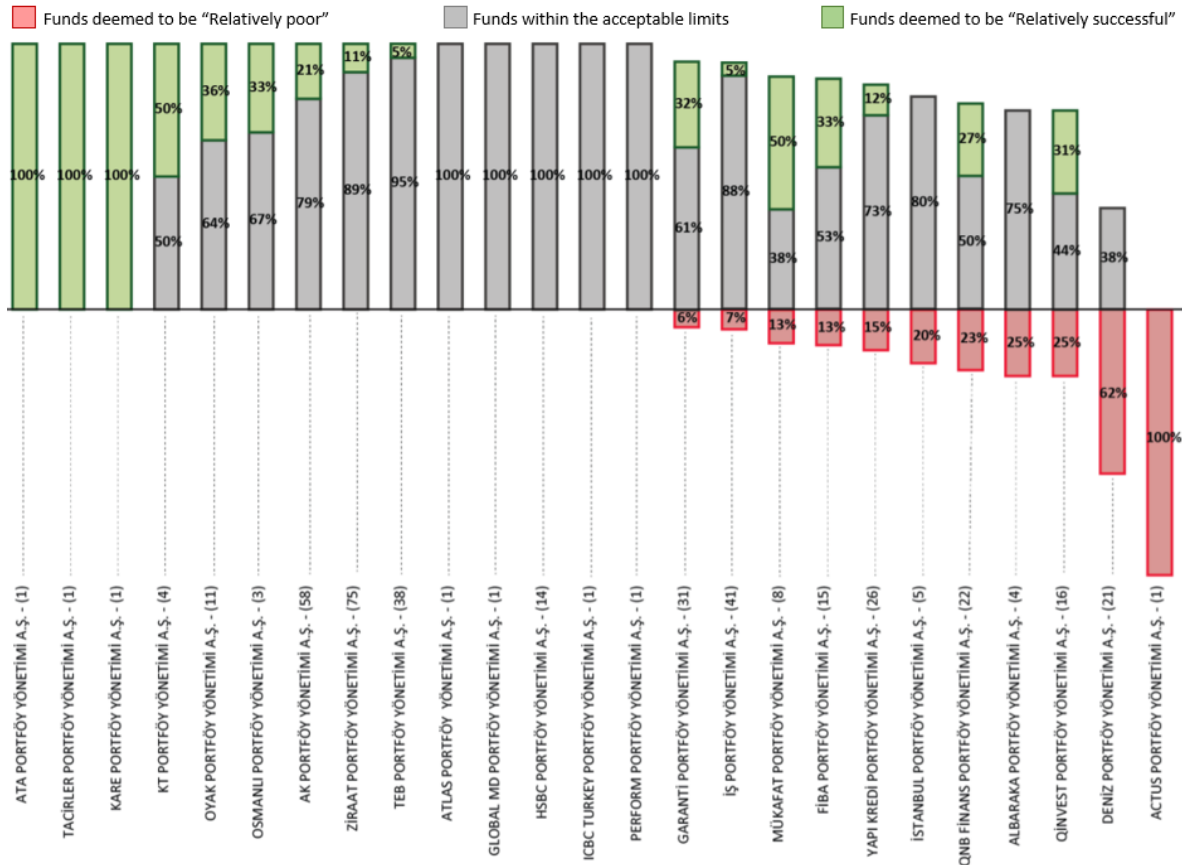


Figure 11 – Performance Results by the Number of Funds*

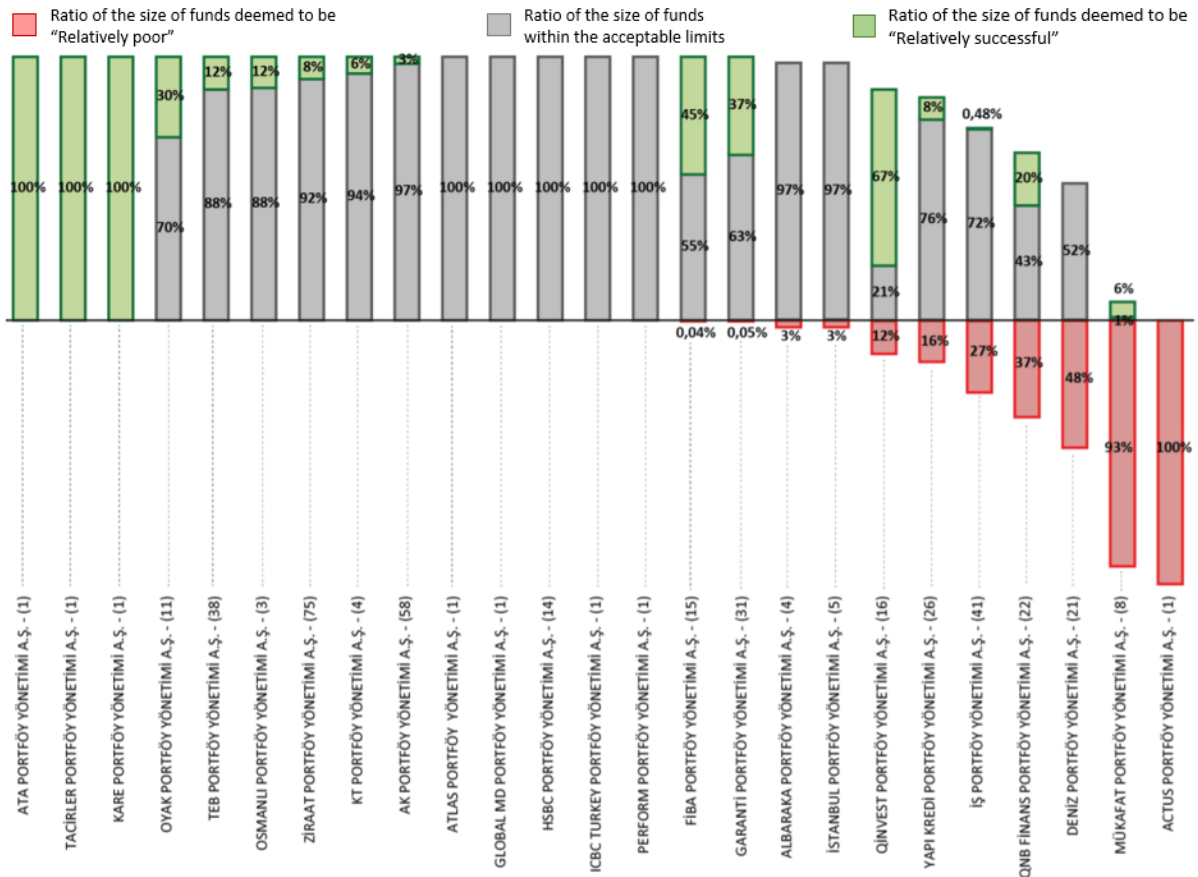


Figure 12 – Performance Results by Fund Size*

* In the above charts, the total number of funds managed by the same portfolio management company and included in the performance assessment are provided in parenthesis below each company title.

RETURN PERFORMANCE OF THE PRIVATE PENSION INDUSTRY COMPARED TO ALTERNATIVE INVESTMENT TOOLS

The PMC OVERALL INDEX* representing the weighted average of net returns of all pension mutual funds increased by 23.7 percent in the year end of 2020 compared to the previous year. In other words, the private pension industry achieved a higher return performance than deposit by obtaining an average of 23.7 percent net nominal return in the year 2020. (Figure 13).

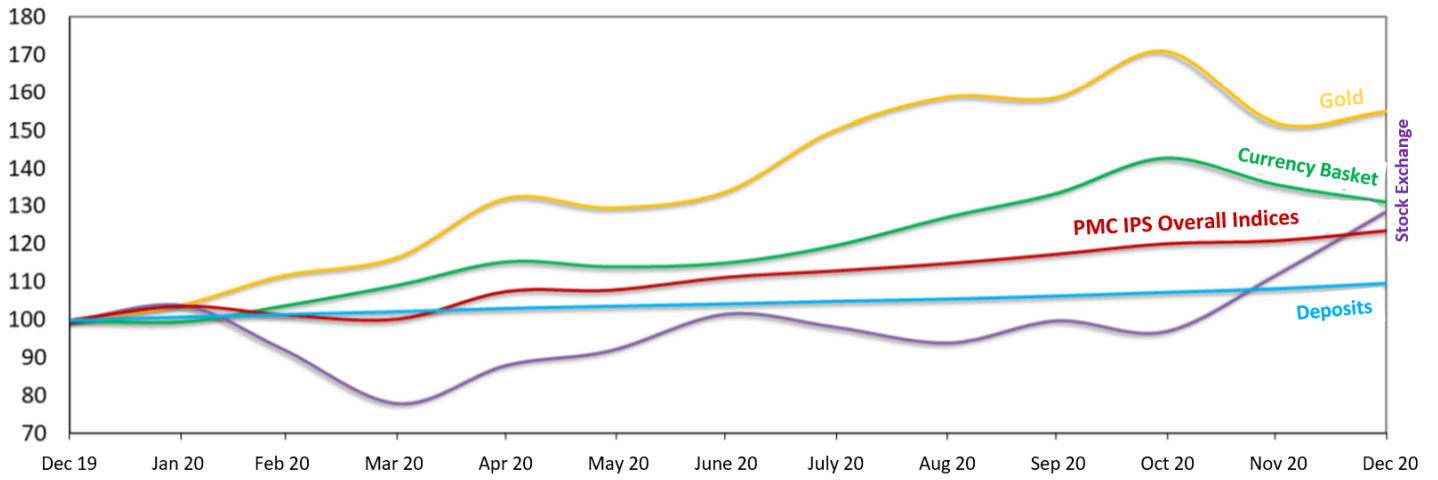


Figure 13 – Comparison of the PMC OVERALL Index and Alternative Investment Tools in 2020

*The PMC OVERALL INDEX is calculated by weighting the daily net nominal returns on all pension mutual funds active in the system (voluntary IPS, auto-enrollment and State Contribution funds) with their net asset values. You can find detailed information about the index at <https://emeklilik.egm.org.tr/egm-endeksleri>.



COMPARISON OF PENSION COMPANIES' RETURN PERFORMANCES

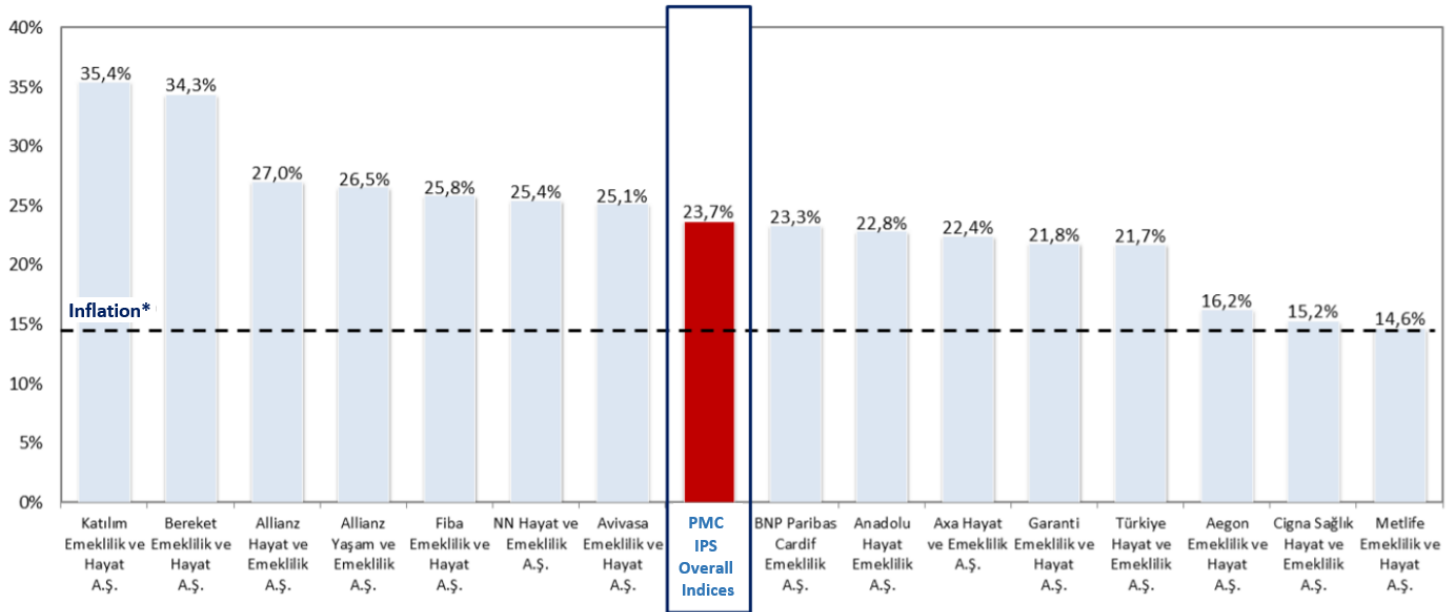


Figure 14 – Comparison of Funds in the PMC Indices by Pension Companies

The net return performances of pension companies affirm that all companies achieve returns above the inflation rate (Figure 14).

* In 2020, the CPI fluctuated by 14.6 percent.



ADDITIONAL MEASURES TO ENSURE HEALTHY SYSTEM OPERATIONS

To ensure that the performance monitoring and assessment mechanism defined in the Guidelines is operated correctly; competition is established; potential irregularities, omissions and abuses are prevented; and risks are managed most appropriately by the FPAC, a leading decision was made proposing that:

- The members representing the TCMA, pursuant to the items (b) and (c) of paragraph 2 of Article 74 of the Capital Market Law; and the members representing the IAT, pursuant to the items (ç) and (d) of paragraph 9 of Article 24 of the Insurance Business Law;
- The member representing the PMC, pursuant to the PMC's mission to ensure the safe and efficient operation of the system and to protect the rights and interests of participants as set forth in Article 20/A of Law No. 4632,

are to advise the FPAC regarding additional measures, and the PMC is to take initiative within this scope with the relevant Association and supervisory and regulatory authorities.

The decision also stipulates that: as the performance of pension mutual funds is calculated automatically using the data transferred over the integration between the PMC and CSD of Turkey, İstanbul Settlement and Custody Bank Inc. (Takasbank) and Borsa İstanbul A.Ş. (BIST); to ensure that calculations are accurate,

- Founders of funds and portfolio management companies should take the necessary measures to ensure that the data that founders report to MKK, TAKASBANK and BIST is accurate, coherent, and updated;
- and that all data required by the PMC to monitor fund performance (including principally the “net expense rate” and the index data used for fund benchmark/threshold, which will be provided in accordance with Annex 3 of the Guidelines) is parametrically reported to the PDP or submitted by pension companies to the PMC.

This report
was drafted by the PMC Corporate Reporting U-nit based on data from the digital platform Fund
Performance Assessment System, audited by the Internal Control and Risk Management and
Internal Audit unit, and approved by the General Directorate.

Contact us at
<https://www.egm.org.tr/contact-us/contact-us/>
for further inquiries or suggestions concerning the report.

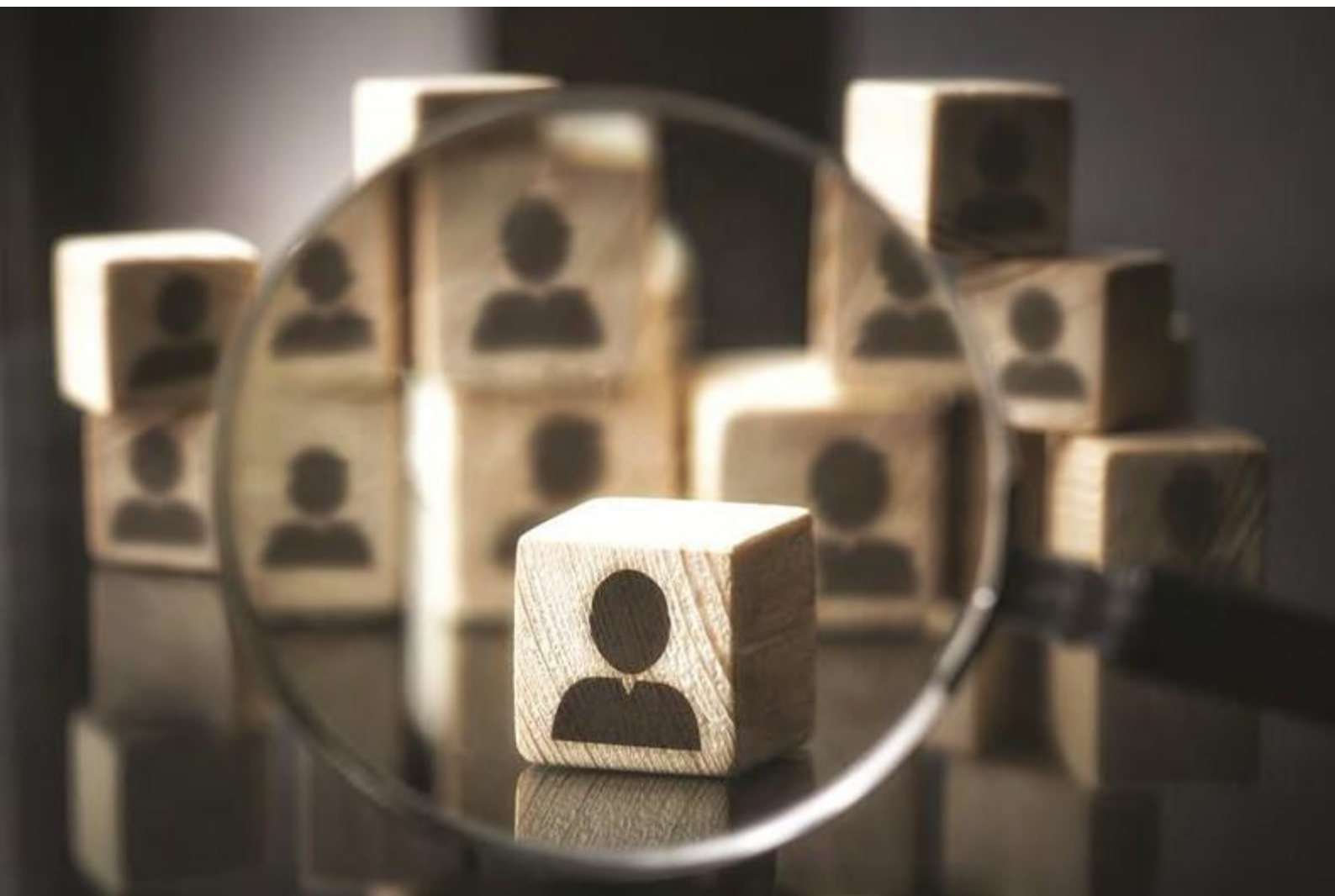


APPENDIX

2020

Fund Performance Assessment System

Results



FDAS Summary Results

			“Relatively Successful” Funds		Fund Performance within Acceptable Limits		“Relatively Poor” Funds	
			Amount of Funds	Size (Million TRY)	Amount of Funds	Size (Million TRY)	Amount of Funds	Size (Million TRY)
Funds in Comparison Groups	347	146,959.91	46	8,513.20	268	124,846.99	33	13,599.72
Funds Not Included in Any Comparison Groups	53	22,299.58	21	8,914.75	28	13,163.57	4	221.26
Grand Total	400	169,259.49	67	17,427.95	296	138,010.56	37	13,820.98

Table 1 – 2020 Fund Performance Assessment Summary Results

Gold Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Return (%)
BNA	BNP Paribas Cardif Emeklilik A.Ş. Gold Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	58.54	57.46
	Upper Threshold for Funds in the Gold Comparison Group		58.53	
NHA	NN Hayat ve Emeklilik A.Ş. Gold Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	57.89	56.80
AZN	Allianz Hayat ve Emeklilik A.Ş. Gold Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	57.69	56.60
AEL	Avivasa Emeklilik ve Hayat A.Ş. Gold Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	57.67	56.58
AMZ	Allianz Yaşam ve Emeklilik A.Ş. Gold Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	57.20	56.11
GHA	Garanti Emeklilik ve Hayat A.Ş. Gold Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	57.10	56.01
	Arithmetic Mean of Gross Returns from Funds in the Gold Comparison Group		56.59	
	Lower Threshold for Funds in the Gold Comparison Group		54.66	
GRA	Fiba Emeklilik ve Hayat A.Ş. Gold Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	53.61	52.52
CFA	Cigna Finans Emeklilik ve Hayat A.Ş. Gold Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	53.04	51.95

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group.

Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 2 – The 2020 FPAS Results Table for the Gold Comparison Group

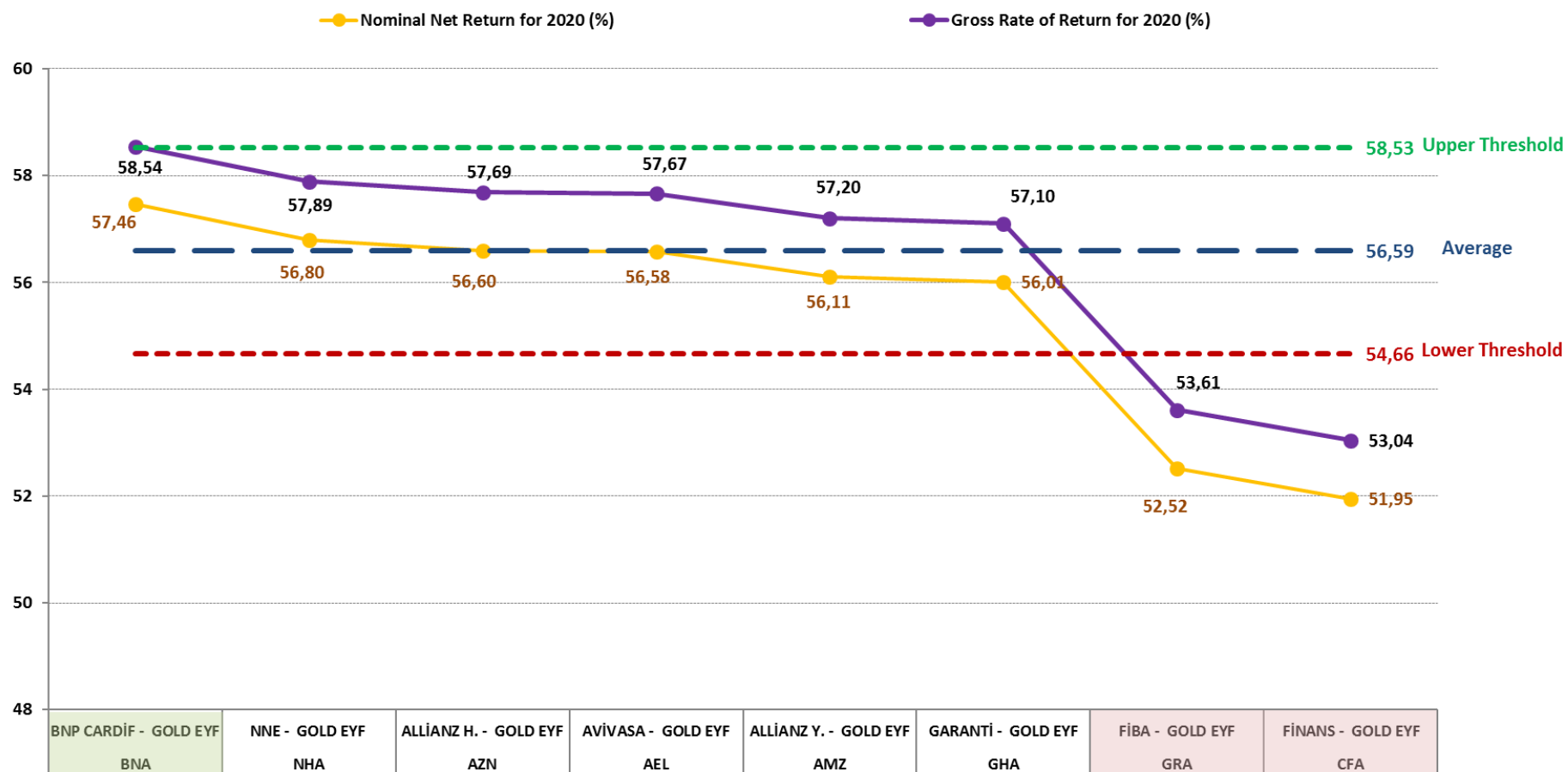


Figure 2 – The 2020 FPAS Results Chart for the Gold Comparison Group

Gold Interest Free Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
ZHN	Türkiye Hayat ve Emeklilik A.Ş. ZEM Gold Interest Free Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	57.21	56.17
	Upper Threshold for Funds in the Gold Participation Comparison Group		56.87	
VGA	Türkiye Hayat ve Emeklilik A.Ş. VEM Gold Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	56.82	55.87
HHF	Türkiye Hayat ve Emeklilik A.Ş. HEM Gold Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	56.74	55.65
	Arithmetic Mean of Gross Returns from Funds in the Gold Participation Comparison Group		56.37	
AGA	Bereket Emeklilik ve Hayat A.Ş. Gold Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	56.04	54.97
KEF	Katılım Emeklilik ve Hayat A.Ş. Gold Participation Pension Mutual Fund	KT Portföy Yönetimi A.Ş.	55.94	54.85
HEA	Axa Hayat ve Emeklilik A.Ş. Gold Participation Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	55.93	54.86
AEA	Anadolu Hayat Emeklilik A.Ş. Gold Participation Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	55.91	54.82
	Lower Threshold for Funds in the Gold Participation Comparison Group		55.87	

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 3 – The 2020 FPAS Results Table for the Gold Participation Comparison Group

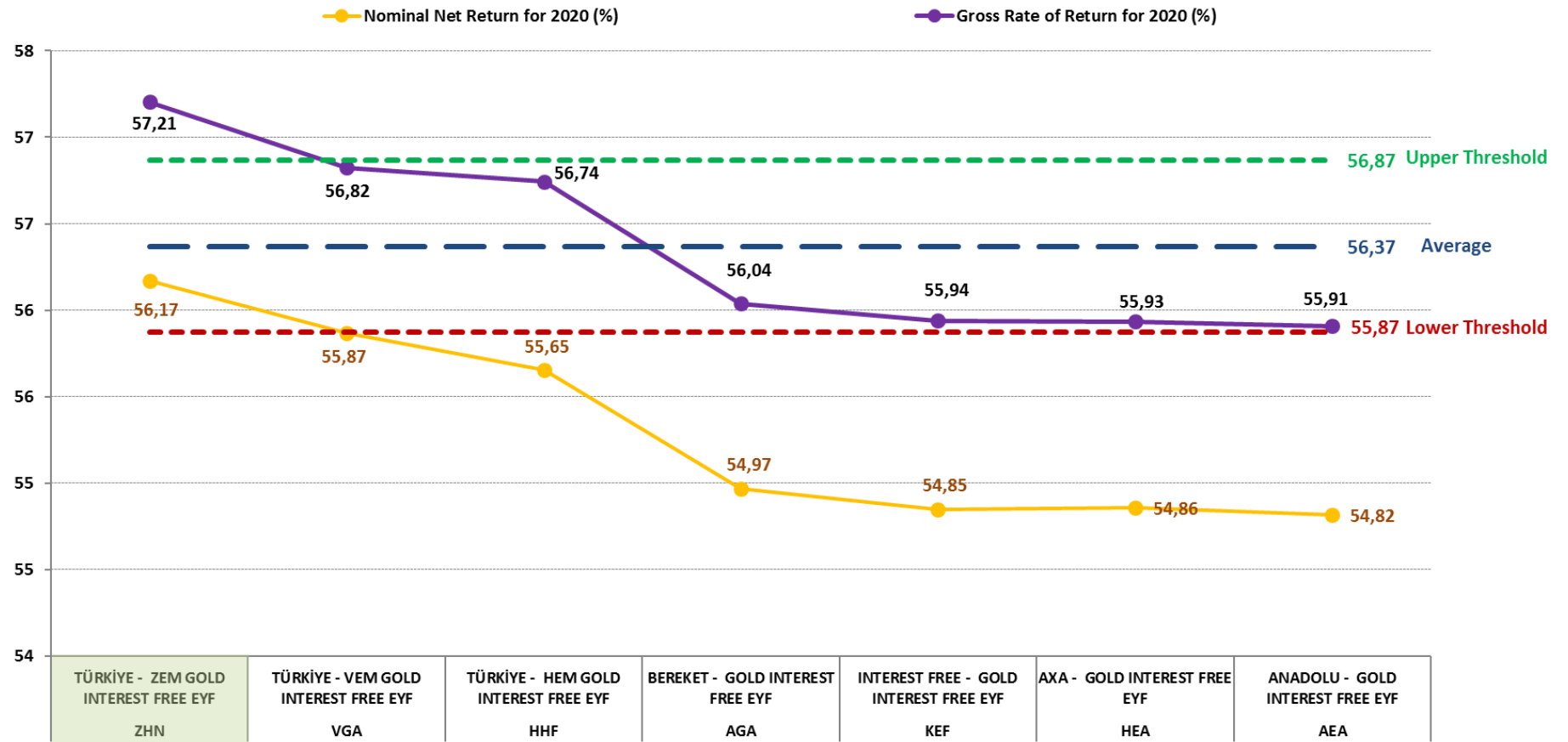


Figure 3 – The 2020 FPAS Results Chart for the Gold Participation Comparison Group

Initial Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
ALZ	Allianz Yaşam ve Emeklilik A.Ş. Initial Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.74	10.73
AHJ	Avivasa Emeklilik ve Hayat A.Ş. Initial Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.72	10.80
GCV	Garanti Emeklilik ve Hayat A.Ş. Initial Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	11.71	10.80
	Upper Threshold for Funds in the Initial Comparison Group		11.57	
ZEB	Türkiye Hayat ve Emeklilik A.Ş. ZEM Initial Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.45	10.53
HEL	AXA Hayat ve Emeklilik A.Ş. Initial Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	11.38	10.36
VKJ	Türkiye Hayat ve Emeklilik A.Ş. VEM Initial Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.35	10.38
	Arithmetic Mean of Gross Returns from Funds in the Initial Comparison Group		11.34	
HHR	Türkiye Hayat ve Emeklilik A.Ş. HEM Initial Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.27	10.35
CFB	Cigna Finans Emeklilik ve Hayat A.Ş. Initial Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	11.17	10.13
AO1	Anadolu Hayat Emeklilik A.Ş. Initial Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	11.16	10.25
PRS	BNP Paribas Cardif Emeklilik A.Ş. Initial Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	11.14	10.11
NHB	NN Hayat ve Emeklilik A.Ş. Initial Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	11.13	10.13
FIE	Fiba Emeklilik ve Hayat A.Ş. Initial Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	11.12	10.03
	Lower Threshold for Funds in the Initial Comparison Group		11.11	
MHB	Metlife Emeklilik ve Hayat A.Ş. Initial Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	11.10	10.09

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

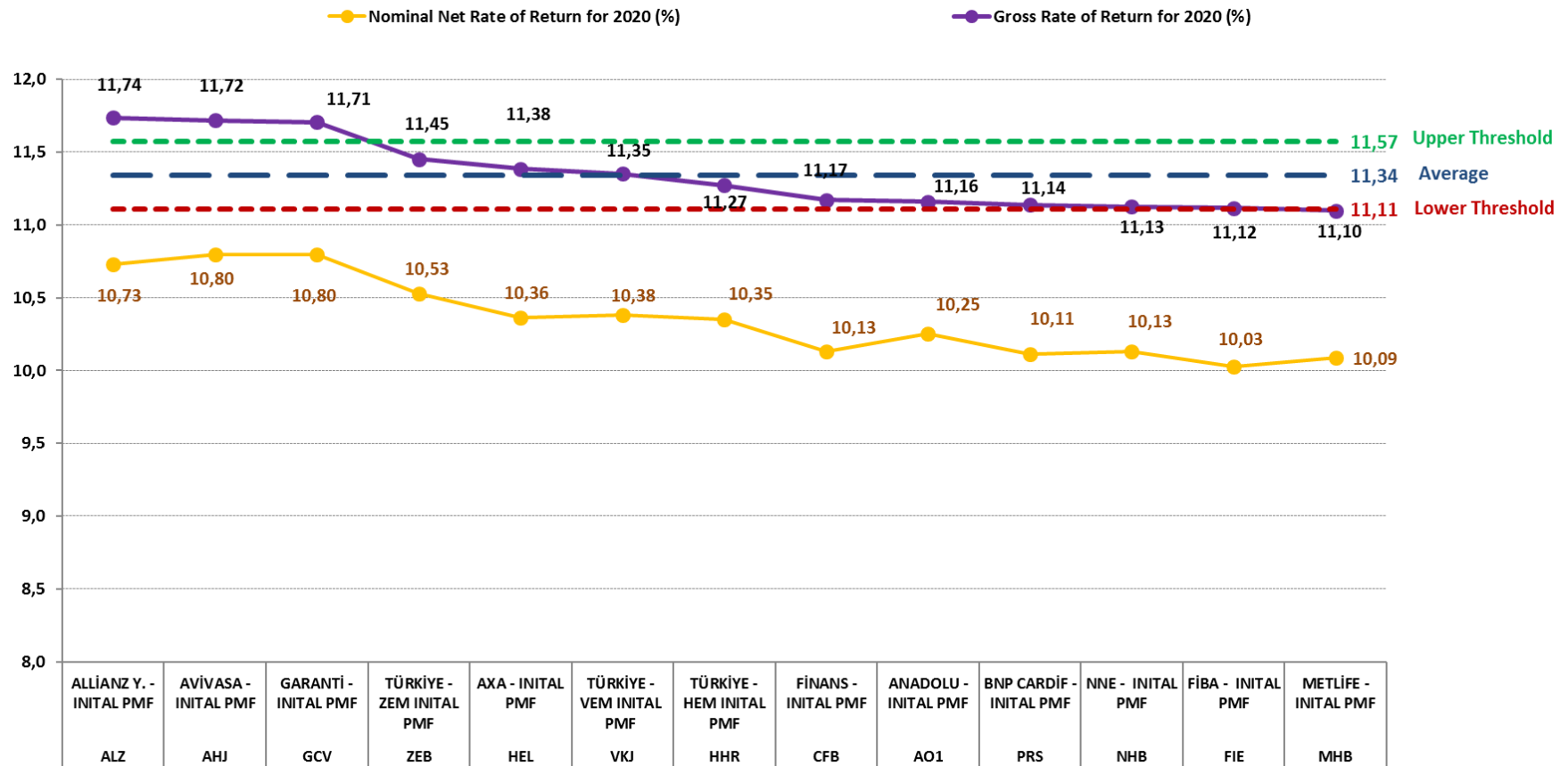


Figure 4 – The 2020 FPAS Results Chart for the Initial Comparison Group

Initial Participation Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
FIY	Fiba Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	11.62	10.53
ACV	Allianz Yaşam ve Emeklilik A.Ş. Initial Participation Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.61	10.60
GDV	Garanti Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	11.56	10.64
	Upper Threshold for Funds in the Initial Participation Comparison Group		11.48	
AVJ	Avivasa Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.44	10.52
TKV	Bereket Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.25	10.16
VKE	Türkiye Hayat ve Emeklilik A.Ş. VEM Initial Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.19	10.29
ZEK	Türkiye Hayat ve Emeklilik A.Ş. ZEM Initial Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.12	10.20
HHV	Türkiye Hayat ve Emeklilik A.Ş. HEM Initial Participation Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.11	10.21
	Arithmetic Mean of Gross Returns from Funds in the Initial Participation Comparison Group		11.07	
PRC	BNP Paribas Cardif Emeklilik A.Ş. Initial Participation Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	10.94	9.92
KEY	Katılım Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	Albaraka Portföy Yönetimi A.Ş.	10.93	10.38
CFY	Cigna Finans Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	10.92	9.87
AO2	Anadolu Hayat Emeklilik A.Ş. Initial Participation Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	10.87	9.97
NHK	NN Hayat ve Emeklilik A.Ş. Initial Participation Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	10.85	9.88
HEG	AXA Hayat ve Emeklilik A.Ş. Initial Participation Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	10.67	9.67
	Lower Threshold for Funds in the Initial Participation Comparison Group		10.66	
MHC	Metlife Emeklilik ve Hayat A.Ş. Initial Participation Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	9.99	8.99

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 5 – The 2020 FPAS Results Table for the Initial Participation Comparison Group

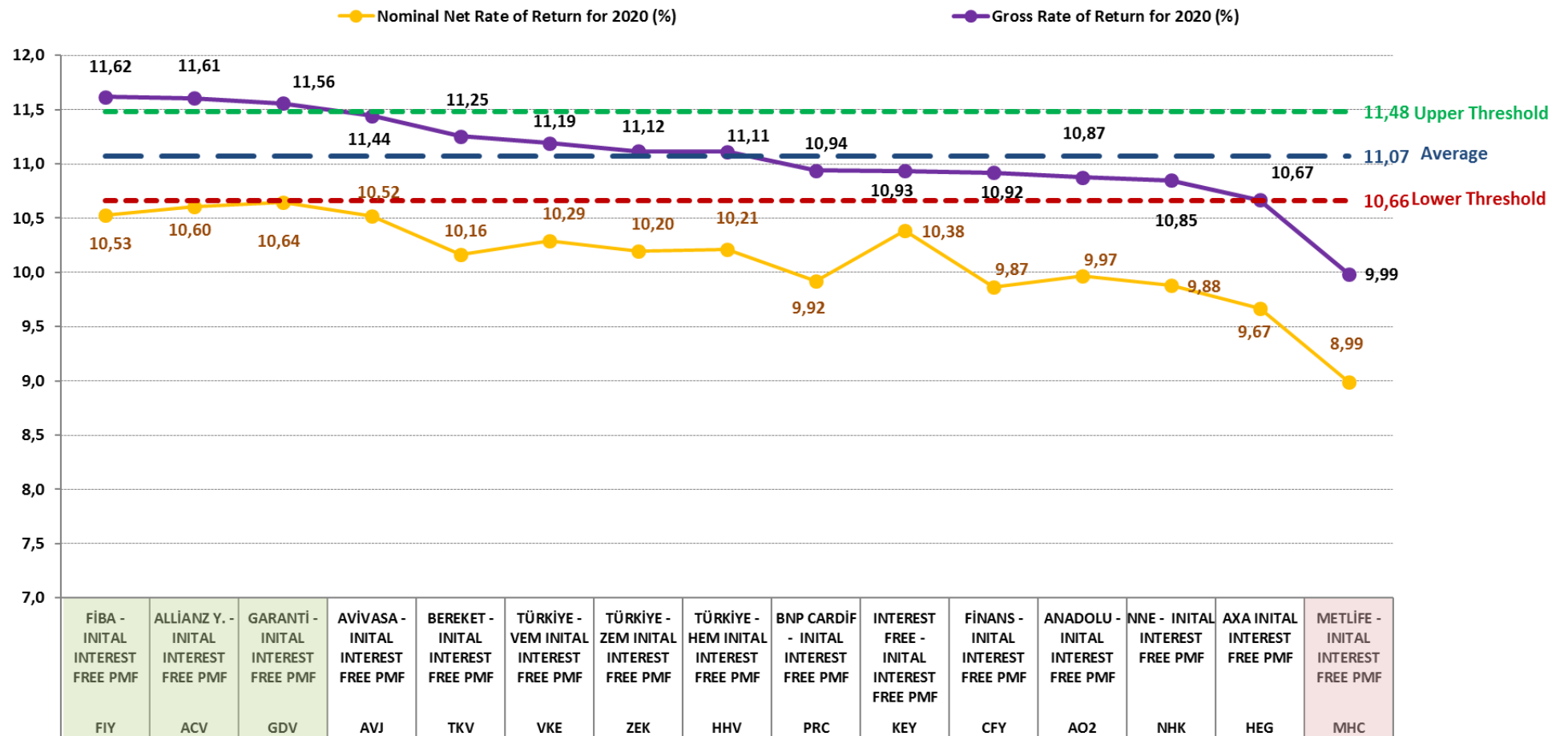


Figure 5 – The 2020 FPAS Results Chart for the Initial Participation Comparison Group

Bonds and Bills (TRY) Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
AEK	Avivasa Emeklilik ve Hayat A.Ş. Bonds and Bills Group Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.98	10.88
VGD	Türkiye Hayat ve Emeklilik A.Ş. VEM First Government Bonds and Bills Group Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.98	10.92
EIG	Fiba Emeklilik ve Hayat A.Ş. Bonds and Bills Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	11.89	9.98
GEK	Garanti Emeklilik ve Hayat A.Ş. Bonds and Bills Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	11.88	9.97
GHF	Garanti Emeklilik ve Hayat A.Ş. Bonds and Bills Group Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	11.82	10.77
AMA	Allianz Yaşam ve Emeklilik A.Ş. Bonds and Bills Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	11.76	9.85
	Upper Threshold for Funds in the Bonds and Bills Comparison Group		11.76	
AE2	Avivasa Emeklilik ve Hayat A.Ş. Bonds and Bills Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.48	9.57
BEK	Fiba Emeklilik ve Hayat A.Ş. Fiba Portfolio Bonds and Bills Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	11.33	9.42
AVK	Avivasa Emeklilik ve Hayat A.Ş. Medium-Term Bonds and Bills Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.27	9.36
ZHG	Türkiye Hayat ve Emeklilik A.Ş. ZEM Government Bonds and Bills Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.01	9.10
BPF	BNP Paribas Cardif Emeklilik A.Ş. Bonds and Bills Group Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	10.82	9.73
BPG	BNP Paribas Cardif Emeklilik A.Ş. Bonds and Bills Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	10.77	8.86
IEG	NN Hayat ve Emeklilik A.Ş. Bonds and Bills Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	10.74	8.83
AMB	Allianz Yaşam ve Emeklilik A.Ş. Bonds and Bills Group Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	10.42	9.34
HS1	Anadolu Hayat Emeklilik A.Ş. Bonds and Bills Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	10.39	8.48
AZK	Allianz Hayat ve Emeklilik A.Ş. Bonds and Bills Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	10.38	8.47
	Arithmetic Mean of Gross Returns from Funds in the Bonds and Bills (TRY) Comparison Group		10.32	
MHG	Metlife Emeklilik ve Hayat A.Ş. Bonds and Bills Group Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	9.75	8.69
AZA	Allianz Hayat ve Emeklilik A.Ş. Bonds and Bills Group Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	9.41	8.31
GKB	Garanti Emeklilik ve Hayat A.Ş. Government Bonds and Bills Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	9.22	7.31
AG1	Anadolu Hayat Emeklilik A.Ş. Second Bonds and Bills Group Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	9.19	8.13
AH1	Anadolu Hayat Emeklilik A.Ş. Second Bonds and Bills Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	9.08	7.17
	Lower Threshold for Funds in the Bonds and Bills Comparison Group		8.87	
CHK	Cigna Finans Emeklilik ve Hayat A.Ş. Government Bonds and Bills Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	8.68	7.13
BGK	Fiba Emeklilik ve Hayat A.Ş. Bonds and Bills Group Pension Mutual Fund	İstanbul Portföy Yönetimi A.Ş.	8.54	7.29
CGG	Cigna Finans Emeklilik ve Hayat A.Ş. Government Bonds and Bills Group Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	7.77	6.57
CFC	Cigna Finans Emeklilik ve Hayat A.Ş. Bonds and Bills Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	6.40	4.49

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$.

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.}}$

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 6 – The 2020 FPAS Results Table for the Bonds and Bills (TRY) Comparison Group

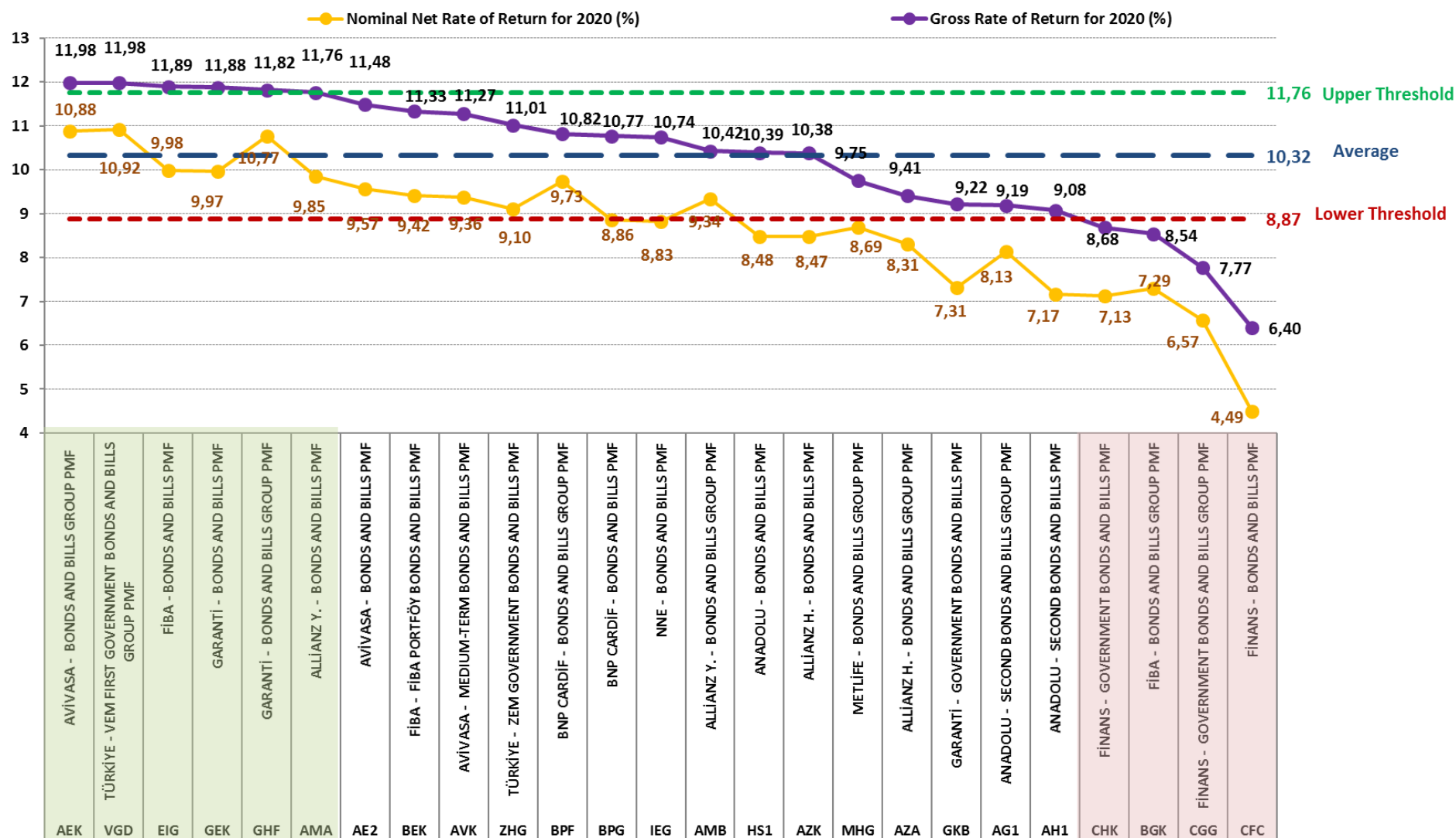


Figure 6 – The 2020 FPAS Results Chart for the Bonds and Bills (TRY) Comparison Group

Variable Daring/Dynamic/Growth Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
EIE	Fiba Emeklilik ve Hayat A.Ş. Daring Variable Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	42.79	40.67
CHO	Cigna Finans Emeklilik ve Hayat A.Ş. AES Daring Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	41.04	39.95
AEZ	Allianz Yaşam ve Emeklilik A.Ş. ATA Finans Dynamic Variable Group Pension Mutual Fund	ATA Portföy Yönetimi A.Ş.	37.86	35.58
CHM	Cigna Finans Emeklilik ve Hayat A.Ş. Dynamic Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	35.94	33.66
	Upper Threshold for Funds in the Variable Daring/Dynamic/Growth Comparison Group		33.21	
AEP	Allianz Yaşam ve Emeklilik A.Ş. Unilever Dynamic Variable Group Pension Mutual Fund	Istanbul Portföy Yönetimi A.Ş.	32.07	31.06
AJB	Anadolu Hayat Emeklilik A.Ş. AES Daring Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	30.29	29.20
IEF	NN Hayat ve Emeklilik A.Ş. Dynamic Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	29.89	27.61
AHO	Anadolu Hayat Emeklilik A.Ş. Daring Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	29.28	27
VGC	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Dynamic Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	25.78	24.69
	Arithmetic Mean of Gross Returns from Funds in the Variable Daring/Dynamic/Growth Comparison Group		25.74	
HHI	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Daring Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	24.92	23.83
GHM	Garanti Emeklilik ve Hayat A.Ş. AES Dynamic Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	24.70	23.61
ZHU	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Daring Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	24.58	23.63
AE3	Avivasa Emeklilik ve Hayat A.Ş. Dynamic Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	23.72	21.44
HHE	Türkiye Hayat ve Emeklilik A.Ş. HEM Dynamic Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	22.82	20.54
VEE	Türkiye Hayat ve Emeklilik A.Ş. VEM Dynamic Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	22.76	20.49
ANP	Allianz Yaşam ve Emeklilik A.Ş. AES Dynamic Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	22.46	21.37
AJP	Axa Hayat ve Emeklilik A.Ş. AES Daring Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	22.37	21.28
AEE	Allianz Hayat ve Emeklilik A.Ş. Dynamic Variable Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	22.34	20.06
VVD	Avivasa Emeklilik ve Hayat A.Ş. AES Dynamic Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	22.05	20.96
BPN	BNP Paribas Cardif Emeklilik A.Ş. AES Dynamic Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	19.79	18.70
VGE	Türkiye Hayat ve Emeklilik A.Ş. VEM Dynamic Variable Group Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	19.70	18.52
ALU	Allianz Yaşam ve Emeklilik A.Ş. Dynamic Variable Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	19.36	17.21
NHL	NN Hayat ve Emeklilik A.Ş. AES Dynamic Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	19.28	18.19
	Lower Threshold for Funds in the Variable Daring/Dynamic/Growth Comparison Group		18.28	
FIH	Fiba Emeklilik ve Hayat A.Ş. AES Daring Variable Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	16.95	15.86
MHO	Metlife Emeklilik ve Hayat A.Ş. AES Daring Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	10.78	9.69

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: "(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term."

Gross Return Rate: It is calculated using the following formula: "(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period)." The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 7 – The 2020 FPAS Results Table for the Variable Daring/Dynamic/Growth Comparison Group

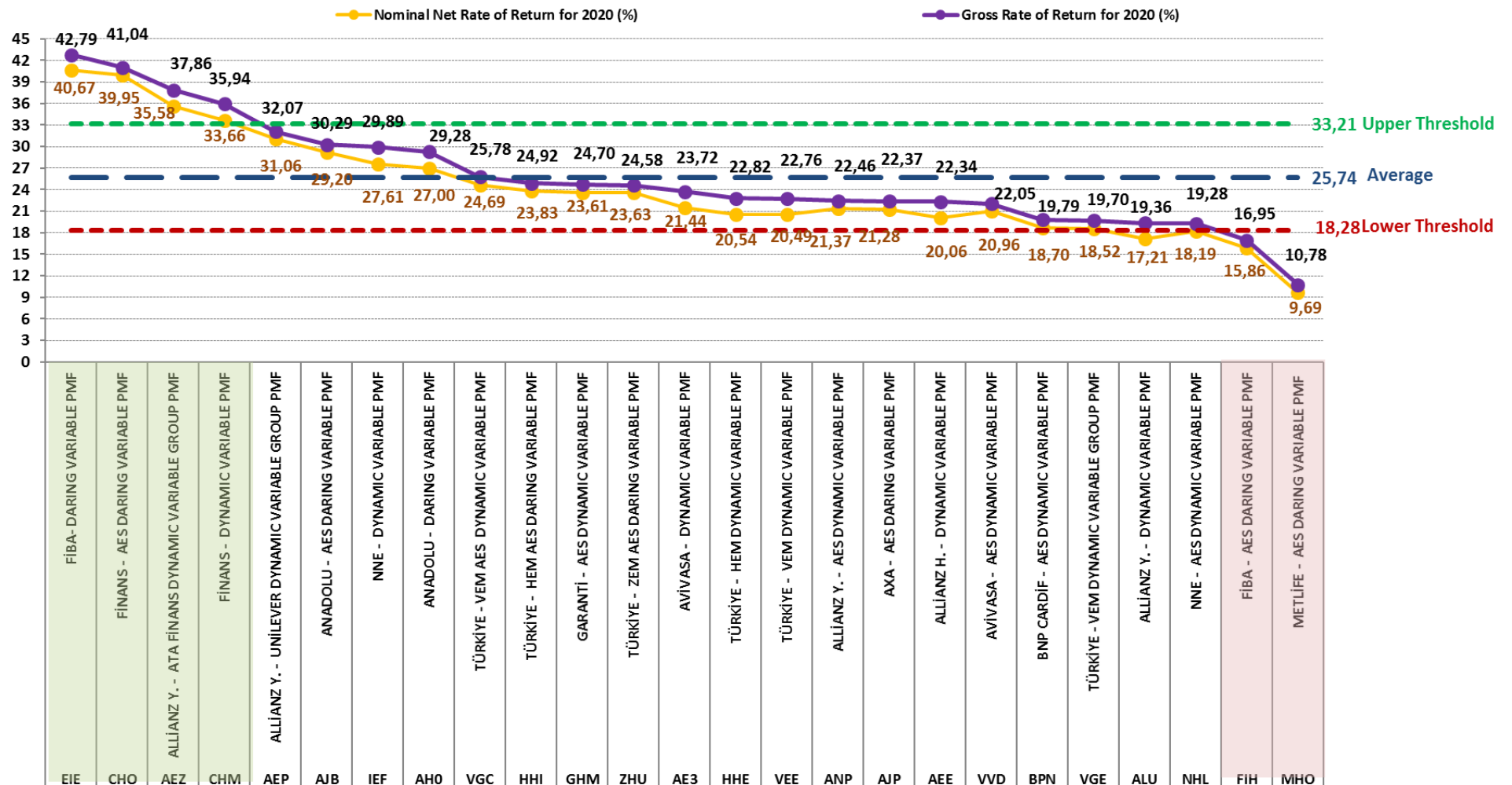


Figure 7 – The 2020 FPAS Results Chart for the Variable /Dynamic/Growth Comparison Group

Variable Participation Daring/Dynamic/Growth Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
HHN	Türkiye Hayat ve Emeklilik A.Ş. HEM Participation Dynamic Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	45.27	42.99
CHI	Cigna Finans Emeklilik ve Hayat A.Ş. AES Dynamic Participation Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	43.08	41.99
	Upper Threshold for Funds in the Variable Participation Daring/Dynamic/Growth Comparison Group		42.94	
AJY	Axa Hayat ve Emeklilik A.Ş. AES Daring Participation Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	41.61	40.52
AJH	Anadolu Hayat Emeklilik A.Ş. AES Daring Participation Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	41.54	40.45
VEY	Türkiye Hayat ve Emeklilik A.Ş. VEM Participation Dynamic Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	40.46	39.35
HHU	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Daring Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	39.77	38.73
KET	Katılım Emeklilik ve Hayat A.Ş. AES Daring Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	39.75	38.66
AGB	Bereket Emeklilik ve Hayat A.Ş. Growth Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	39.63	37.35
VGH	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Dynamic Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	39.47	38.46
ZHV	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Daring Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	39.15	38.20
AIE	Allianz Yaşam ve Emeklilik A.Ş. AES Growth Participation Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	38.70	37.61
GHY	Garanti Emeklilik ve Hayat A.Ş. AES Dynamic Participation Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	38.46	37.37
	Arithmetic Mean of Gross Returns from Funds in the Variable Participation Daring/Dynamic/Growth Comparison Group		38.43	
VVU	Avivasa Emeklilik ve Hayat A.Ş. AES Dynamic Participation Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	38.39	37.30
NHH	NN Hayat ve Emeklilik A.Ş. AES Dynamic Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	37.08	35.99
BEF	Bereket Emeklilik ve Hayat A.Ş. AES Dynamic Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	36.62	35.53
BPO	BNP Paribas Cardif Emeklilik A.Ş. AES Dynamic Participation Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	35.38	34.29
FIV	Fiba Emeklilik ve Hayat A.Ş. AES Daring Participation Variable Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	34.29	33.20
	Lower Threshold for Funds in the Variable Participation Daring/Dynamic/Growth Comparison Group		33.92	
MHU	Metlife Emeklilik ve Hayat A.Ş. AES Daring Participation Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	23.06	21.97

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group.

Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.}}$

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 8 – The 2020 FPAS Results Table for the Variable Participation – Daring/Dynamic/Growth Comparison Group

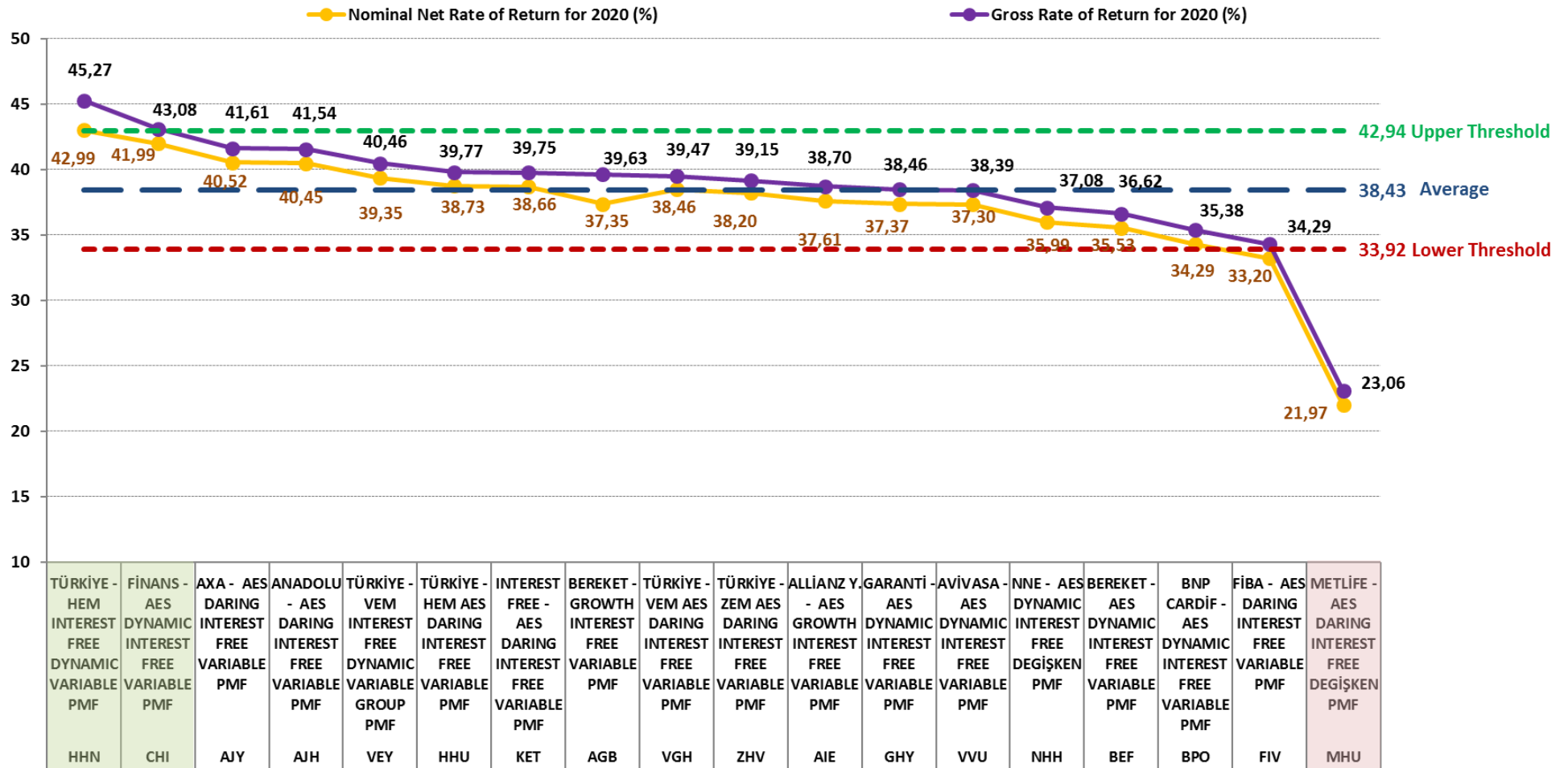


Figure 8 – The 2020 FPAS Results Chart for the Variable Participation – Daring/Dynamic/Growth Comparison Group

Variable Aggressive Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
CHG	Cigna Finans Emeklilik ve Hayat A.Ş. AES Aggressive Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	51.22	50.13
	Upper Threshold for Funds in the Variable Aggressive Comparison Group		36.99	
AJR	Axa Hayat ve Emeklilik A.Ş. AES Aggressive Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	35.55	34.46
AHL	Anadolu Hayat Emeklilik A.Ş. Aggressive Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	35.51	33.23
AJA	Anadolu Hayat Emeklilik A.Ş. AES Aggressive Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	35.05	33.96
HHO	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Aggressive Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	31.18	30.09
ZHM	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Aggressive Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	30.51	29.56
VGF	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Aggressive Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	30.06	28.98
	Arithmetic Mean of Gross Returns from Funds in the Variable Aggressive Comparison Group		29.83	
AVE	Avivasa Emeklilik ve Hayat A.Ş. Aggressive Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	27.77	25.65
NHN	NN Hayat ve Emeklilik A.Ş. VEM Aggressive Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	27.76	25.48
NHG	NN Hayat ve Emeklilik A.Ş. AES Aggressive Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	26.90	25.97
FIC	Fiba Emeklilik ve Hayat A.Ş. AES Aggressive Variable Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	26.90	25.81
ALJ	Allianz Yaşam ve Emeklilik A.Ş. AES Aggressive Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	26.89	25.80
BPI	BNP Paribas Cardif Emeklilik A.Ş. AES Aggressive Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	26.49	25.40
VVA	Avivasa Emeklilik ve Hayat A.Ş. AES Aggressive Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	26.29	25.20
	Lower Threshold for Funds in the Variable Aggressive Comparison Group		22.66	
MHR	Metlife Emeklilik ve Hayat A.Ş. AES Aggressive Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	20.20	19.11
GHJ	Garanti Emeklilik ve Hayat A.Ş. AES Aggressive Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	18.91	17.82

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background. The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 9 – The 2020 FPAS Results Table for the Variable Aggressive Comparison Group

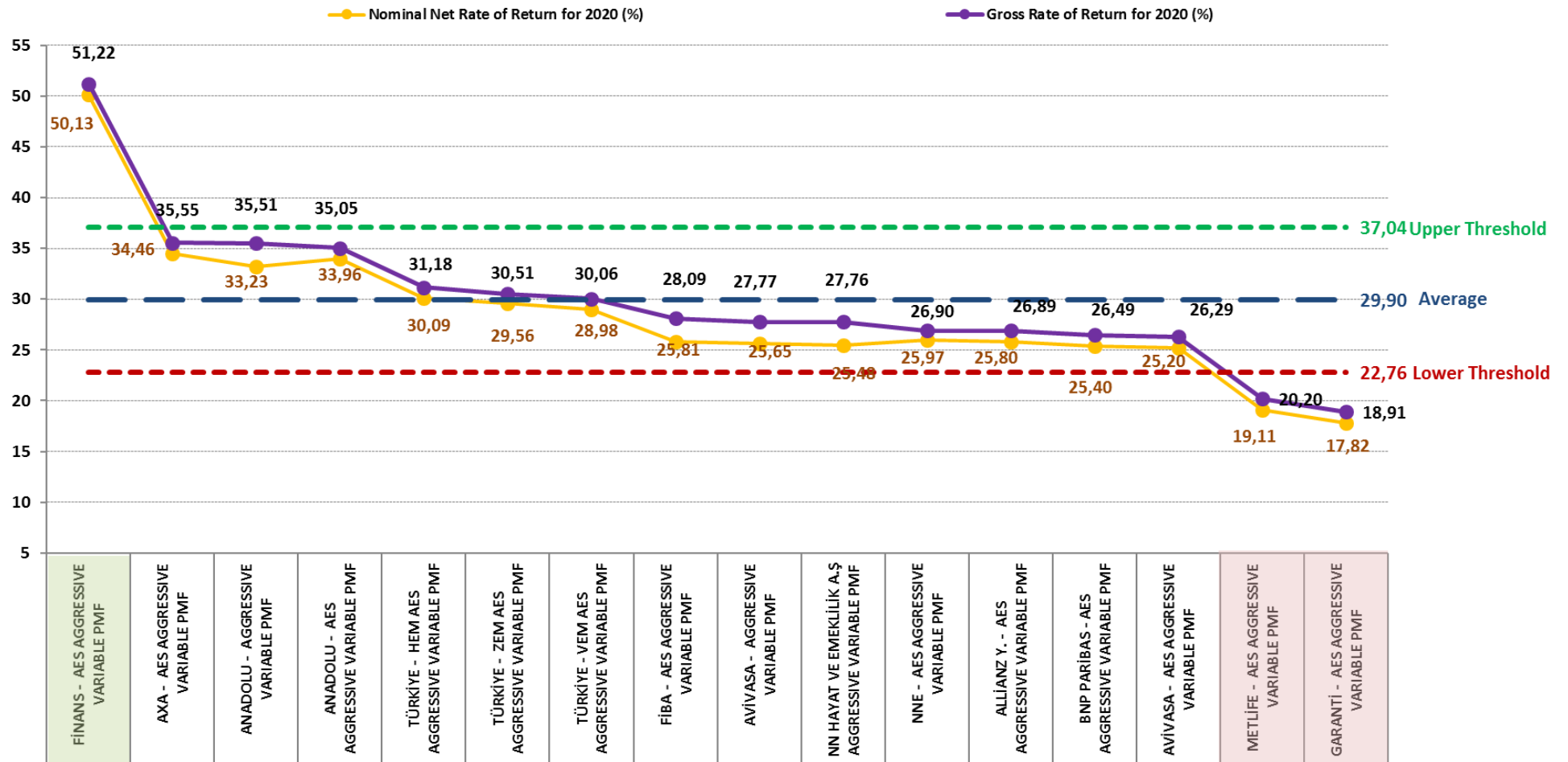


Figure 9 – The 2020 FPAS Results Chart for the Variable Aggressive Comparison Group

Variable Participation – Aggressive Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
KEZ	Katılım Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	KT Portföy Yönetimi A.Ş.	93.13	92.04
	Upper Threshold for Funds in the Variable Participation Aggressive Comparison Group		68.41	
AJZ	Axa Hayat ve Emeklilik A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	64.15	63.06
FIU	Fiba Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	60	58.91
CHD	Cigna Finans Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	59.78	58.69
BPS	BNP Paribas Cardif Emeklilik A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	57.05	55.96
AJG	Anadolu Hayat Emeklilik A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	56	54.91
HHZ	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Aggressive Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	55.74	54.70
VEO	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Aggressive Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	55.39	54.39
ZHP	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Aggressive Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	55.22	54.27
	Arithmetic Mean of Gross Returns from Funds in the Variable Participation Aggressive Comparison Group		54.54	
VVZ	Avivasa Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	54.03	52.94
AIP	Allianz Yaşam ve Emeklilik A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	53.67	52.58
GHU	Garanti Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	48.73	47.64
	Lower Threshold for Funds in the Variable Participation Aggressive Comparison Group		40.68	
NHC	NN Hayat ve Emeklilik A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	38.70	37.61
BEO	Bereket Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	38.01	36.92
MHV	Metlife Emeklilik ve Hayat A.Ş. AES Aggressive Participation Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	28.55	27.46

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 10 – The 2020 FPAS Results Table for the Variable Participation – Aggressive Comparison Group

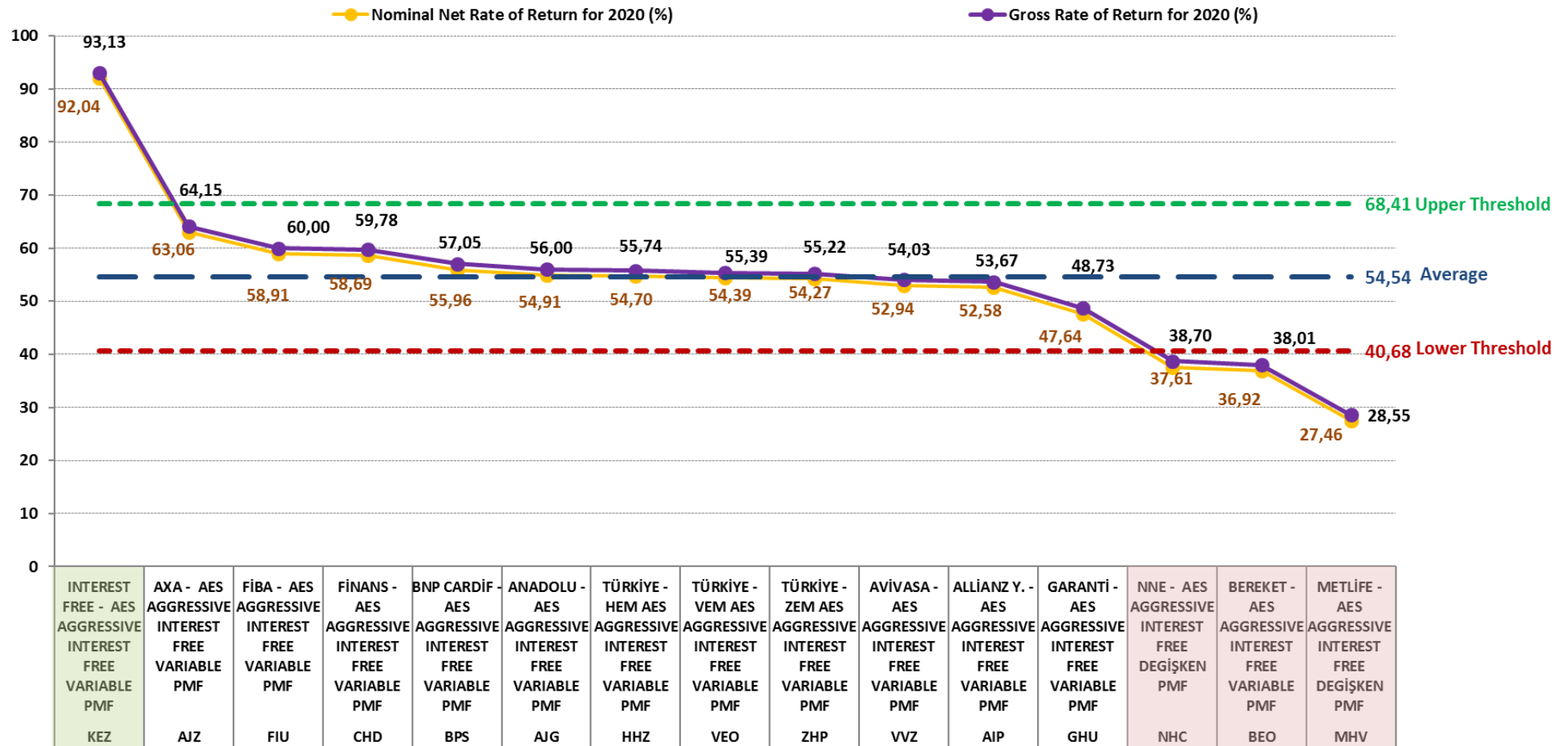


Figure 10 – The 2020 FPAS Results Chart for the Variable Participation – Aggressive Comparison Group

Variable Conservative/Cautious Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
NHM	NN Hayat ve Emeklilik A.Ş. QInvest Portföy Cautious Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	16.23	13.95
GHP	Garanti Emeklilik ve Hayat A.Ş. AES Cautious Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	14.29	13.20
HHY	Türkiye Hayat ve Emeklilik A.Ş. HEM Cautious Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.67	11.76
	Upper Threshold for Funds in the Variable Conservative/Cautious Comparison Group		13.66	
VEP	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Cautious Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.51	12.42
FES	Fiba Emeklilik ve Hayat A.Ş. Cautious Variable Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	13.10	10.82
HHC	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Cautious Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.03	11.94
GED	Garanti Emeklilik ve Hayat A.Ş. Cautious Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	12.93	11.36
AJF	Anadolu Hayat Emeklilik A.Ş. AES Cautious Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	12.79	11.70
VVM	Avivasa Emeklilik ve Hayat A.Ş. AES Conservative Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	12.38	11.30
VEU	Türkiye Hayat ve Emeklilik A.Ş. VEM Cautious Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	12.32	10.50
AFJ	Allianz Yaşam ve Emeklilik A.Ş. AES Cautious Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	12.28	11.19
	Arithmetic Mean of Gross Returns from Funds in the Variable Conservative/Cautious Comparison Group		12.25	
AEG	Avivasa Emeklilik ve Hayat A.Ş. Conservative Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	12.21	11.11
ZHZ	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Cautious Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.88	10.93
BPR	BNP Paribas Cardif Emeklilik A.Ş. AES Conservative Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	11.62	10.53
AEN	Allianz Yaşam ve Emeklilik A.Ş. Cautious Variable Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	11.54	9.43
AJT	Axa Hayat ve Emeklilik A.Ş. AES Cautious Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.35	10.26
NHF	NN Hayat ve Emeklilik A.Ş. AES Cautious Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	11.30	10.21
CHC	Cigna Finans Emeklilik ve Hayat A.Ş. AES Conservative Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	11.17	10.08
AG4	Anadolu Hayat Emeklilik A.Ş. Cautious Variable Group Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	11.03	9.97
MHM	Metlife Emeklilik ve Hayat A.Ş. AES Cautious Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	10.85	9.76
	Lower Threshold for Funds in the Variable Conservative/Cautious Comparison Group		10.83	
AH8	Anadolu Hayat Emeklilik A.Ş. Cautious Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	10.62	8.35
FIZ	Fiba Emeklilik ve Hayat A.Ş. AES Conservative Variable Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	9.35	8.26

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background. The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.}}$

Table 11 – The 2020 FPAS Results Table for the Variable Conservative/Cautious Comparison Group

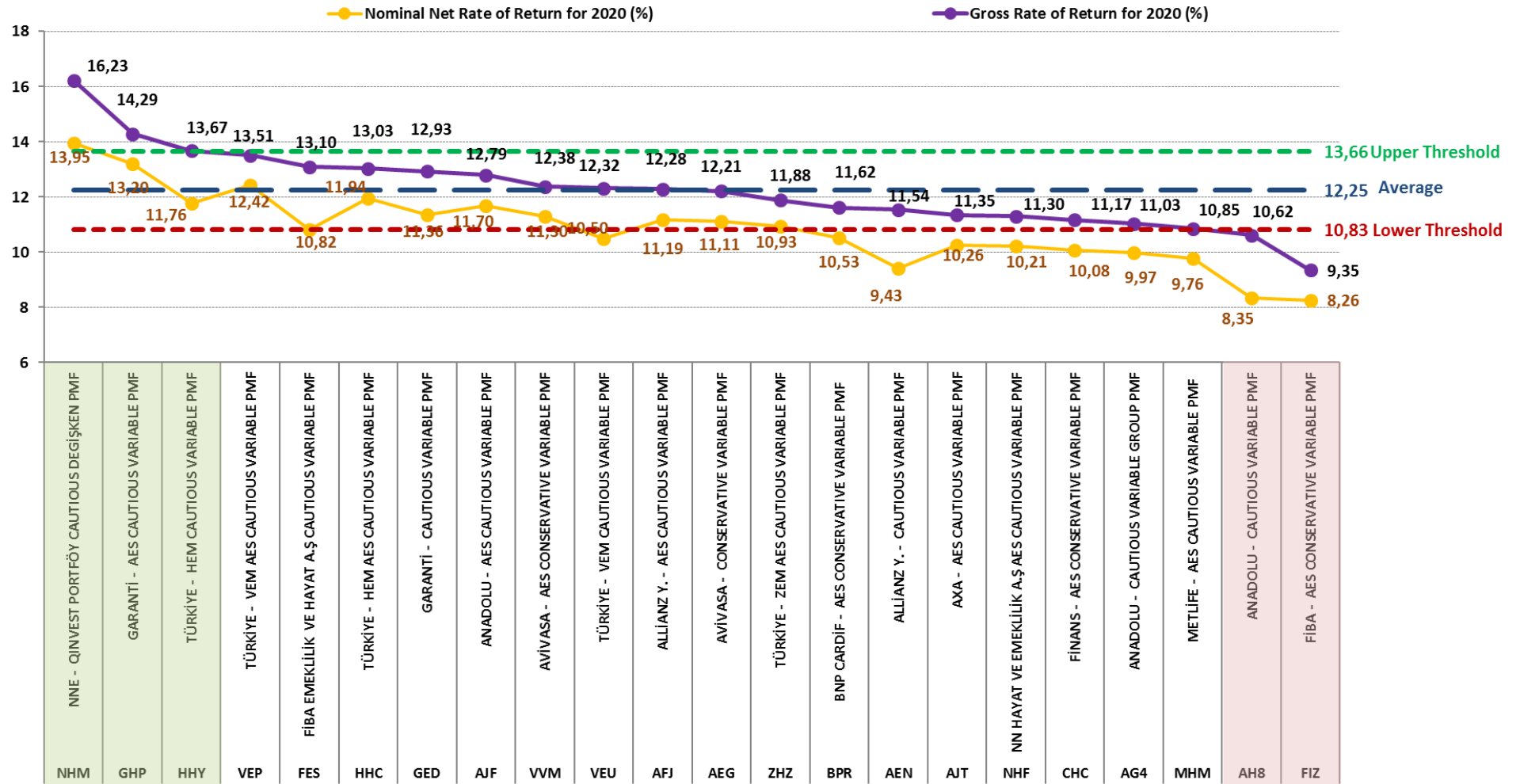


Figure 11 – The 2020 FPAS Results Chart for the Variable Conservative/Cautious Comparison Group

Balanced Variable Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
BEE	Fiba Emeklilik ve Hayat A.Ş. Balanced Variable Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	48.86	46.58
CHA	Cigna Finans Emeklilik ve Hayat A.Ş. AES Balanced Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	31.30	30.21
	Upper Threshold for Funds in the Variable - Balanced Comparison Group		27.64	
FIG	Fiba Emeklilik ve Hayat A.Ş. AES Balanced Variable Pension Mutual Fund	Osmanlı Portföy Yönetimi A.Ş.	24.98	23.89
AH9	Anadolu Hayat Emeklilik A.Ş. Balanced Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	22.84	20.56
BGE	Fiba Emeklilik ve Hayat A.Ş. Balanced Variable Group Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	22.76	20.72
ALS	Allianz Yaşam ve Emeklilik A.Ş. Balanced Variable Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	22.21	20.08
AGL	Allianz Yaşam ve Emeklilik A.Ş. Balanced Variable Group Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	21.66	20.41
IEE	NN Hayat ve Emeklilik A.Ş. Balanced Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	21.64	19.36
AZB	Allianz Hayat ve Emeklilik A.Ş. Balanced Variable Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	21.52	19.24
GEF	Garanti Emeklilik ve Hayat A.Ş. Balanced Variable Group Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	21.07	19.93
	Arithmetic Mean of Gross Returns from Funds in the Variable Balanced Comparison Group		21.02	
AJC	Anadolu Hayat Emeklilik A.Ş. AES Balanced Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	20.93	19.84
CHN	Cigna Finans Emeklilik ve Hayat A.Ş. Balanced Variable Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	20.92	18.99
CGE	Cigna Finans Emeklilik ve Hayat A.Ş. Balanced Variable Group Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	20.77	19.52
GHE	Garanti Emeklilik ve Hayat A.Ş. Balanced Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	20.68	18.54
AVP	Avivasa Emeklilik ve Hayat A.Ş. Balanced Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	20.46	18.24
GHN	Garanti Emeklilik ve Hayat A.Ş. AES Balanced Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	20.21	19.12
ZHY	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Balanced Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	19.84	18.89
HHH	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Balanced Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	19.83	18.74
VEV	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Balanced Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	19.82	18.73
VVE	Avivasa Emeklilik ve Hayat A.Ş. AES Balanced Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	19.79	18.70
ANJ	Allianz Yaşam ve Emeklilik A.Ş. AES Balanced Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	19.64	18.55
AJV	Axa Hayat ve Emeklilik A.Ş. AES Balanced Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	19.26	18.17
BPJ	BNP Paribas Cardif Emeklilik A.Ş. AES Balanced Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	17.19	16.10
NHI	NN Hayat ve Emeklilik A.Ş. AES Balanced Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	16.54	15.45
MHY	Metlife Emeklilik ve Hayat A.Ş. Balanced Variable Group Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	15.63	14.57
MHE	Metlife Emeklilik ve Hayat A.Ş. Balanced Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	15.59	13.32
AEC	Allianz Yaşam ve Emeklilik A.Ş. Unilever Balanced Variable Group Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	15.08	13.70
	Lower Threshold for Funds in the Variable - Balanced Comparison Group		14.41	
MHN	Metlife Emeklilik ve Hayat A.Ş. AES Balanced Variable Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	7.59	6.50

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.}}$

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 12 – The 2020 FPAS Results Table for the Variable Balanced Comparison Group

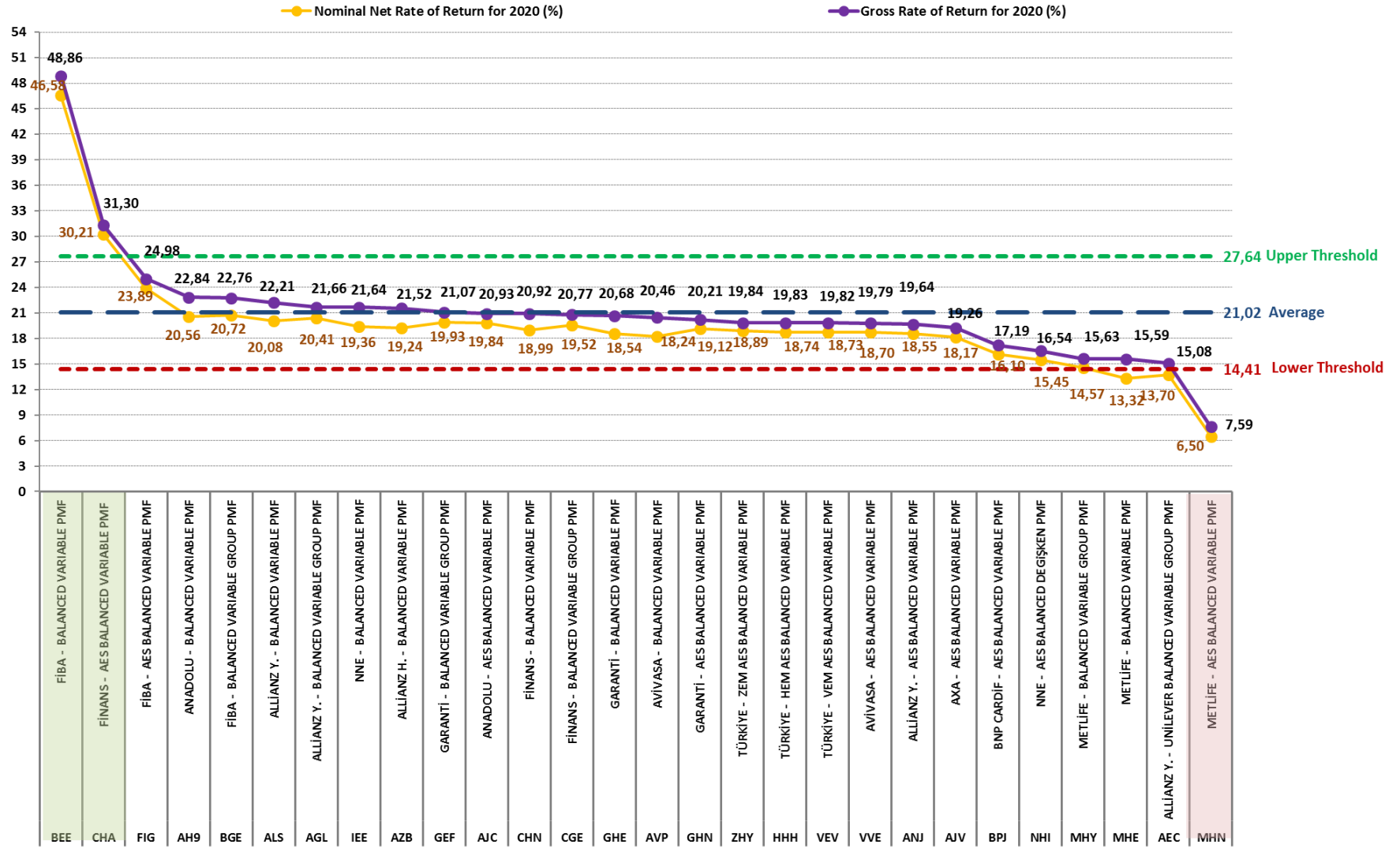


Figure 12 – The 2020 FPAS Results Chart for the Variable Balanced Comparison Group

Variable Threshold Value Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
FEF	Fiba Emeklilik ve Hayat A.Ş. Tacirler Portföy Variable Pension Mutual Fund	Tacirler Portföy Yönetimi A.Ş.	96.70	94.46
	Upper Threshold for Funds in the Variable - Threshold Value Comparison Group		47.20	
FER	Fiba Emeklilik ve Hayat A.Ş. Variable Group Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	42.20	40.57
FEA	Fiba Emeklilik ve Hayat A.Ş. Atlas Portföy Variable Pension Mutual Fund	Atlas Portföy Yönetimi A.Ş.	34.42	32.45
FIR	Fiba Emeklilik ve Hayat A.Ş. Osmanlı Portföy Variable Pension Mutual Fund	Osmanlı Portföy Yönetimi A.Ş.	33.92	32.09
VEG	Türkiye Hayat ve Emeklilik A.Ş. VEM First Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	32.37	30.26
FEO	Fiba Emeklilik ve Hayat A.Ş. İstanbul Portföy Dynamic Variable Pension Mutual Fund	İstanbul Portföy Yönetimi A.Ş.	30.53	28.27
	Arithmetic Mean of Gross Returns from Funds in the Variable Threshold Value Comparison Group		27.93	
EHG	Fiba Emeklilik ve Hayat A.Ş. Oyak Portföy Variable Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	25.91	24.66
BPE	BNP Paribas Cardif Emeklilik A.Ş. First Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	25.73	23.45
VGY	Türkiye Hayat ve Emeklilik A.Ş. VEM PERA 3 Variable Group Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	21.49	20.28
FIF	Fiba Emeklilik ve Hayat A.Ş. İstanbul Portföy Variable Pension Mutual Fund	İstanbul Portföy Yönetimi A.Ş.	20.82	19.01
VGP	Türkiye Hayat ve Emeklilik A.Ş. Pera 1 Variable Group Pension Mutual Fund for VEM Turkcell Group Employees	Yapı Kredi Portföy Yönetimi A.Ş.	20.51	19.53
AZY	Allianz Hayat ve Emeklilik A.Ş. Variable Group Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	18.55	17.20
ZHE	Türkiye Hayat ve Emeklilik A.Ş. ZEM Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	18.13	15.85
VGT	Türkiye Hayat ve Emeklilik A.Ş. VEM PERA 2 Variable Group Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	17.40	16.36
FEZ	Fiba Emeklilik ve Hayat A.Ş. Perform Portföy Variable Pension Mutual Fund	Perform Portföy Yönetimi A.Ş.	15.84	13.56
FEV	Fiba Emeklilik ve Hayat A.Ş. Global MD Portföy Variable Pension Mutual Fund	Global MD Portföy Yönetimi A.Ş.	14.80	12.66
	Lower Threshold for Funds in the Variable - Threshold Value Comparison Group		8.66	
VES	Türkiye Hayat ve Emeklilik A.Ş. VEM Bonds and Bills Pension Mutual Fund	Actus Portföy Yönetimi A.Ş.	5.45	3.54

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 13 – The 2020 FPAS Results Table for the Variable – Threshold Value Comparison Group

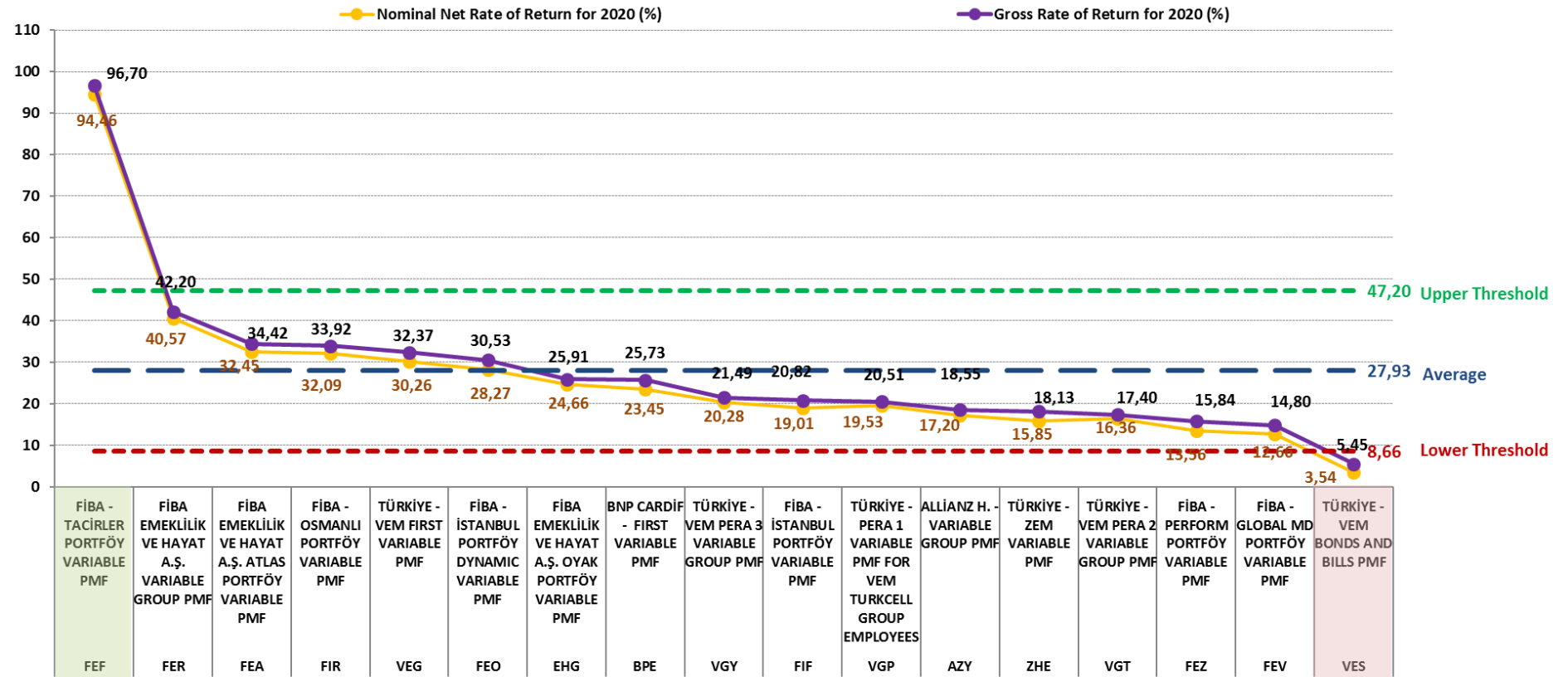


Figure 13 – The 2020 FPAS Results Chart for the Variable – Threshold Value Comparison Group

Stock Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
BEH	Fiba Emeklilik ve Hayat A.Ş. Stock Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	68.92	66.64
BBH	Fiba Emeklilik ve Hayat A.Ş. Stock Group Pension Mutual Fund	Osmanlı Portföy Yönetimi A.Ş.	67.85	66.26
	Upper Threshold for Funds in the Stock Comparison Group		48.59	
CHH	Cigna Finans Emeklilik ve Hayat A.Ş. First Stock Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	46.16	43.87
AG3	Anadolu Hayat Emeklilik A.Ş. Stock Group Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	38.59	37.44
AZH	Allianz Hayat ve Emeklilik A.Ş. Stock Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	38.28	36.10
ALH	Allianz Yaşam ve Emeklilik A.Ş. Stock Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	38.26	36.13
AHB	Anadolu Hayat Emeklilik A.Ş. Second Stock Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	38.05	35.77
	Arithmetic Mean of Gross Returns from Funds in the Stock Comparison Group		37.79	
EIH	Fiba Emeklilik ve Hayat A.Ş. Oyak Portföy Stock Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	37.55	35.57
ANS	Aegon Emeklilik ve Hayat A.Ş. Stock Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	37.43	35.16
HES	Axa Hayat ve Emeklilik A.Ş. Stock Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	36.74	34.46
AH5	Anadolu Hayat Emeklilik A.Ş. Stock Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	34.39	32.11
AEB	Avivasa Emeklilik ve Hayat A.Ş. Stock Group Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	33.34	32.10
GEG	Garanti Emeklilik ve Hayat A.Ş. Stock Group Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	33.32	32.10
AEH	Avivasa Emeklilik ve Hayat A.Ş. Stock Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	32.85	30.57
GEH	Garanti Emeklilik ve Hayat A.Ş. Stock Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	32.14	29.86
ZHB	Türkiye Hayat ve Emeklilik A.Ş. ZEM Stock Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	31.55	29.27
VEH	Türkiye Hayat ve Emeklilik A.Ş. VEM Stock Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	31.47	29.19
HHB	Türkiye Hayat ve Emeklilik A.Ş. HEM Stock Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	31.42	29.14
BPH	BNP Paribas Cardif Emeklilik A.Ş. Stock Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	29.91	27.64
IEH	NN Hayat ve Emeklilik A.Ş. Stock Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	29.86	27.58
	Lower Threshold for Funds in the Stock Comparison Group		26.99	
MHH	Metlife Emeklilik ve Hayat A.Ş. Stock Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	25.47	23.19

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: "(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term."

Gross Return Rate: It is calculated using the following formula: "(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period)." The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background. The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 14 – The 2020 FPAS Results Table for the Stock Comparison Group

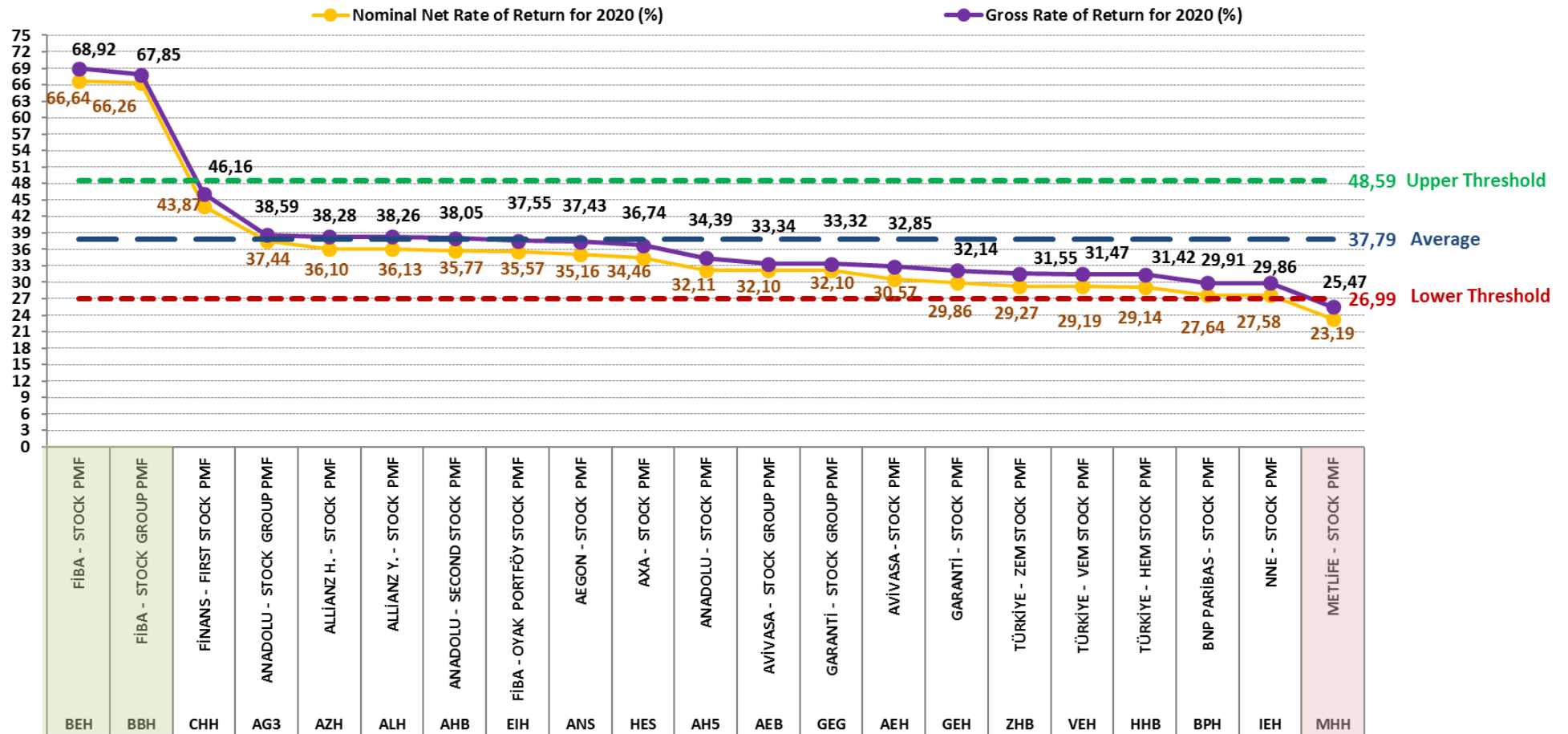


Figure 14 – The 2020 FPAS Results Chart for the Stock Comparison Group

Government Bonds and Bills (FX, Composite) Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
	Upper Threshold for Funds in the Government Bonds and Bills (FX, Composite) Comparison Group		40.08	
HED	Axa Hayat ve Emeklilik A.Ş. Government Bonds and Bills (FX) Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	39.45	38.26
GHK	Garanti Emeklilik ve Hayat A.Ş. Bonds and Bills (FX) Group Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	39.44	38.37
EIF	Fiba Emeklilik ve Hayat A.Ş. Oyak Portföy Government Bonds and Bills (FX) Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	39.41	37.50
GHG	Garanti Emeklilik ve Hayat A.Ş. Bonds and Bills (FX) Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	38.69	37.12
AVB	Avivasa Emeklilik ve Hayat A.Ş. Long-Term Bonds and Bills (FX) Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	38.30	37.19
VET	Türkiye Hayat ve Emeklilik A.Ş. VEM Government Bonds and Bills (FX) Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	38.14	36.23
AVG	Avivasa Emeklilik ve Hayat A.Ş. Bonds and Bills (FX) Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	37.87	35.96
ZHD	Türkiye Hayat ve Emeklilik A.Ş. ZEM Government Bonds and Bills (FX) Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	37.73	35.82
BPK	BNP Paribas Cardif Emeklilik A.Ş. Second Government Bonds and Bills (FX) Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	37.40	35.49
	Arithmetic Mean of Gross Returns from Funds in the Government Bonds and Bills (FX, Composite) Comparison Group		37.27	
BKB	Fiba Emeklilik ve Hayat A.Ş. Government Bonds and Bills (FX) Group Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	36.39	34.51
MHD	Metlife Emeklilik ve Hayat A.Ş. Government Bonds and Bills (FX) Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	35.63	33.72
	Lower Threshold for Funds in the Government Bonds and Bills (FX, Composite) Comparison Group		34.46	
CFD	Cigna Finans Emeklilik ve Hayat A.Ş. Bonds and Bills (FX) Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	28.74	26.83

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: "(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term."

Gross Return Rate: It is calculated using the following formula: "(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period)." The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 15 – The 2020 FPAS Results Table for the Government Bonds and Bills (FX, Composite) Comparison Group

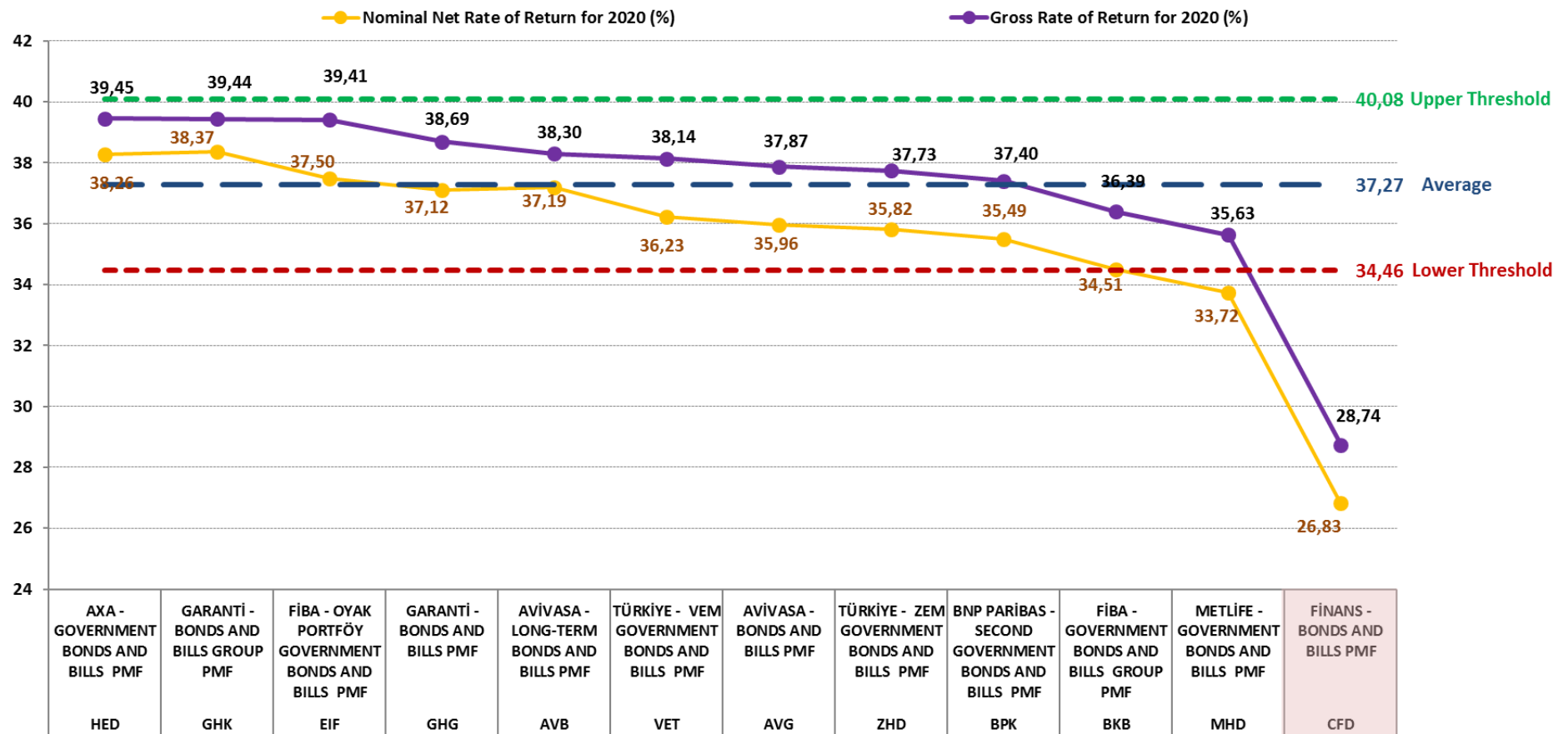


Figure 15 – The 2020 FPAS Results Chart for the Government Bonds and Bills (FX, Composite) Comparison Group

Government Bonds and Bills (USD) Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
EIK	Fiba Emeklilik ve Hayat A.Ş. Bonds and Bills (FX) Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	38.71	36.80
	Upper Threshold for Funds in the Government Bonds and Bills (USD) Comparison Group		37.98	
HHG	Türkiye Hayat ve Emeklilik A.Ş. HEM Government Bonds and Bills (FX) Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	37.83	35.92
AZM	Allianz Hayat ve Emeklilik A.Ş. Government Bonds and Bills (FX) Group Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	37.37	36.05
	Arithmetic Mean of Gross Returns from Funds in the Government Bonds and Bills (USD) Comparison Group		37.21	
BPU	BNP Paribas Cardif Emeklilik A.Ş. First Government Bonds and Bills (FX) Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	36.98	35.07
AMG	Allianz Yaşam ve Emeklilik A.Ş. First Government Bonds and Bills (FX) Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	36.73	34.82
	Lower Threshold for Funds in the Government Bonds and Bills (USD) Comparison Group		36.43	
AH3	Anadolu Hayat Emeklilik A.Ş. First Government Bonds and Bills (FX) Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	36.41	34.50
AZD	Allianz Hayat ve Emeklilik A.Ş. First Government Bonds and Bills (FX) Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	36.41	34.50

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: "(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term."

Gross Return Rate: It is calculated using the following formula: "(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period)." The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 16 – The 2020 FPAS Results Table for the Government Bonds and Bills (USD) Comparison Group

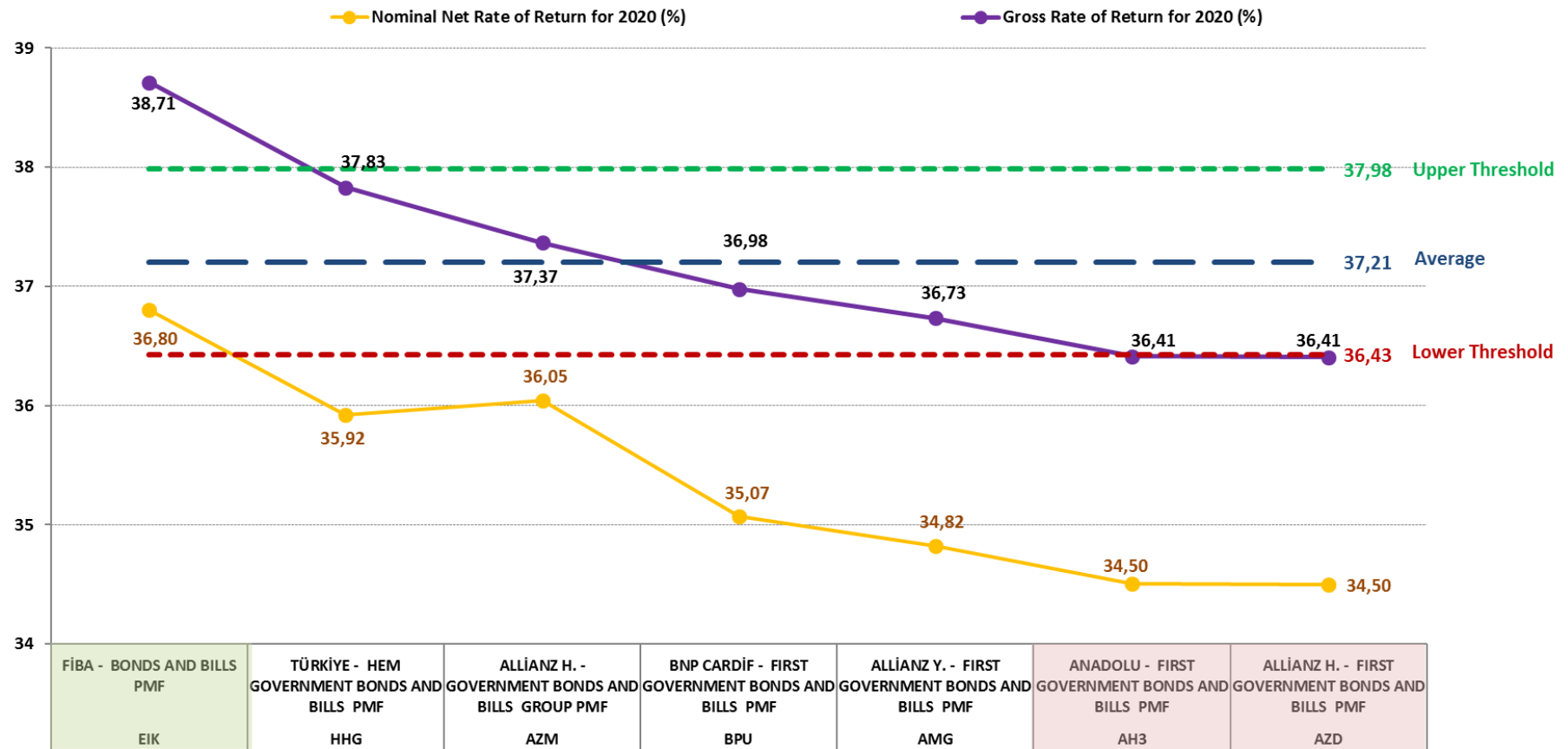


Figure 16 – The 2020 FPAS Results Chart for the Government Bonds and Bills (USD) Comparison Group

Contribution Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
AEY	Aegon Emeklilik ve Hayat A.Ş. Contribution Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	15.17	14.81
CHT	Cigna Finans Emeklilik ve Hayat A.Ş. Contribution Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	14.56	14.21
	Upper Threshold for Funds in the Contribution Comparison Group		13.81	
FEI	Fiba Emeklilik ve Hayat A.Ş. Contribution Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	13.37	13.01
GHI	Garanti Emeklilik ve Hayat A.Ş. Contribution Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	13.17	12.81
BNK	BNP Paribas Cardif Emeklilik A.Ş. Contribution Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	13.14	12.77
MHT	Metlife Emeklilik ve Hayat A.Ş. Contribution Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	12.89	12.52
IGE	NN Hayat ve Emeklilik A.Ş. Contribution Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	12.74	12.38
	Arithmetic Mean of Gross Returns from Funds in the Contribution Comparison Group		12.63	
ZHK	Türkiye Hayat ve Emeklilik A.Ş. ZEM Contribution Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	12.50	12.14
HET	Axa Hayat ve Emeklilik A.Ş. Contribution Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	12.45	12.09
VEI	Türkiye Hayat ve Emeklilik A.Ş. VEM Contribution Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	12.41	12.05
HHT	Türkiye Hayat ve Emeklilik A.Ş. HEM Contribution Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	12.37	12.01
AEI	Avivasa Emeklilik ve Hayat A.Ş. Contribution Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.83	11.46
	Lower Threshold for Funds in the Contribution Comparison Group		11.45	
AZT	Allianz Hayat ve Emeklilik A.Ş. Contribution Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	11.36	11
AMF	Allianz Yaşam ve Emeklilik A.Ş. Contribution Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	10.81	10.45
EEC	Anadolu Hayat Emeklilik A.Ş. Contribution Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	10.67	10.31

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.}}$

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 17 – The 2020 FPAS Results Table for the Contribution Comparison Group

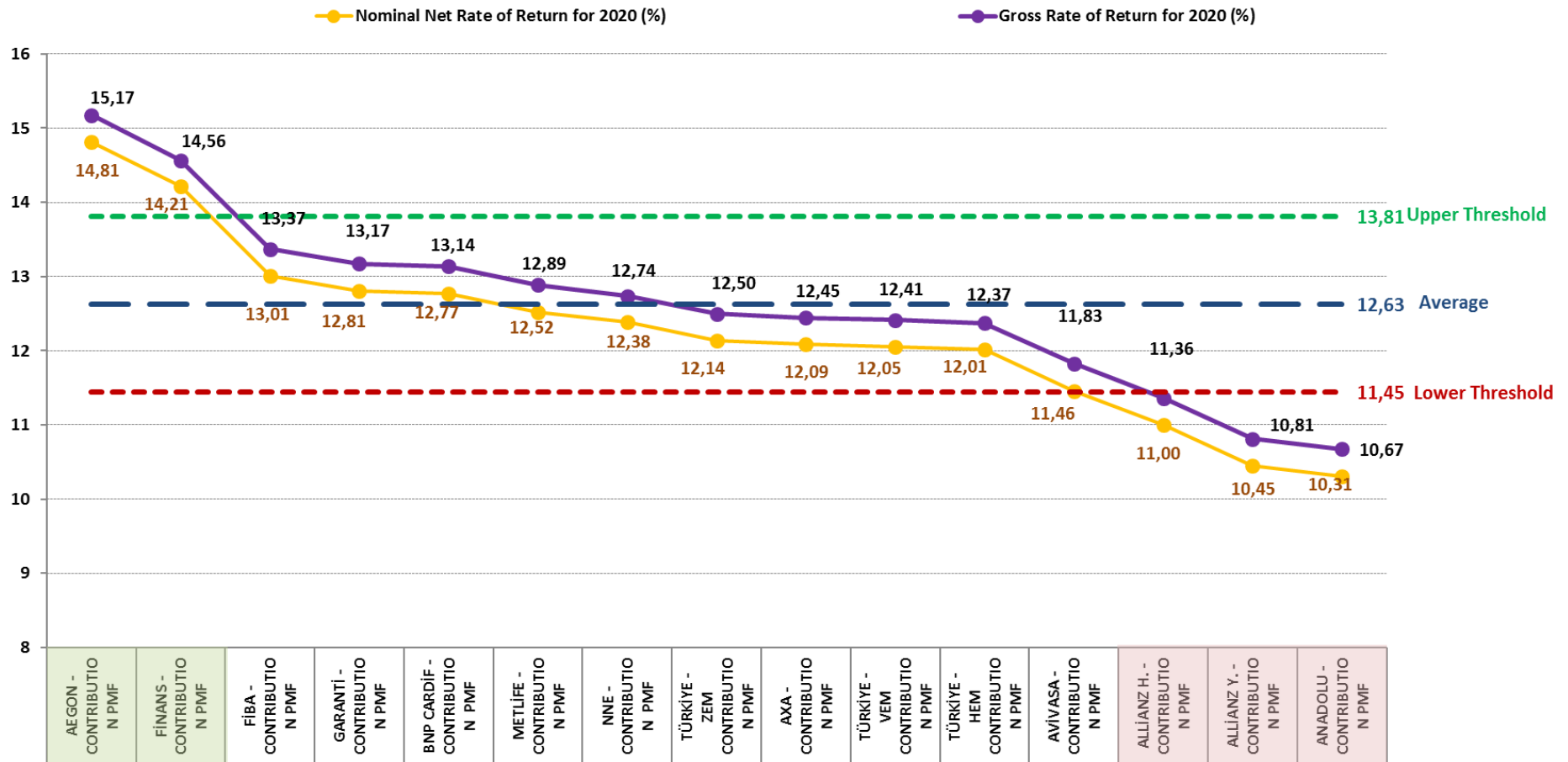


Figure 17 – The 2020 FPAS Results Chart for the Participation Comparison Group

Participation Contribution Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
FYL	Avivasa Emeklilik ve Hayat A.Ş. Participation Contribution Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	25.67	25.31
HHA	Türkiye Hayat ve Emeklilik A.Ş. HEM Participation Contribution Pension Mutual Fund	KT Portföy Yönetimi A.Ş.	24.27	23.90
	Upper Threshold for Funds in the Participation Contribution Comparison Group		23.26	
VER	Türkiye Hayat ve Emeklilik A.Ş. VEM Participation Contribution Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	22.17	21.80
ZHT	Türkiye Hayat ve Emeklilik A.Ş. ZEM Participation Contribution Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	22.06	21.70
FII	Fiba Emeklilik ve Hayat A.Ş. Participation Contribution Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	21.73	21.37
	Arithmetic Mean of Gross Returns from Funds in the Participation Contribution Comparison Group		21.18	
HER	Axa Hayat ve Emeklilik A.Ş. Participation Contribution Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	21.12	20.76
AGT	Bereket Emeklilik ve Hayat A.Ş. Participation Contribution Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	20.48	20.12
AER	Anadolu Hayat Emeklilik A.Ş. Participation Contribution Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	20.03	19.66
GHL	Garanti Emeklilik ve Hayat A.Ş. Participation Contribution Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	19.95	19.58
KEA	Katılım Emeklilik ve Hayat A.Ş. Participation Contribution Pension Mutual Fund	Albaraka Portföy Yönetimi A.Ş.	19.43	19.06
MHA	Metlife Emeklilik ve Hayat A.Ş. Participation Contribution Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	19.33	18.97
	Lower Threshold for Funds in the Participation Contribution Comparison Group		19.10	
FYY	Allianz Yaşam ve Emeklilik A.Ş. Participation Contribution Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	17.96	17.60

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$.

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{Total fund expense ratio}}$. The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 18 – The 2020 FPAS Results Table for the Participation Contribution Comparison Group

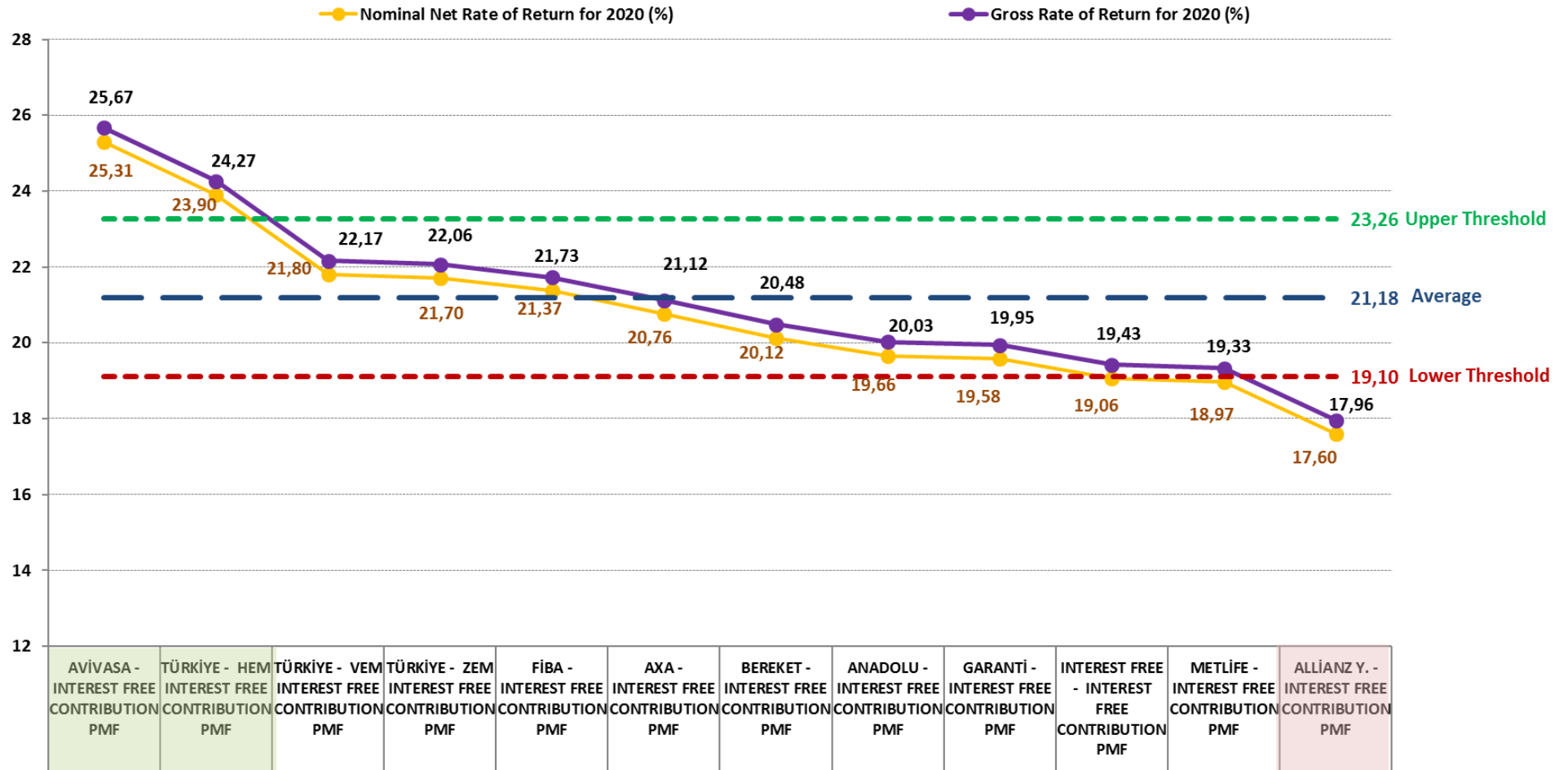


Figure 18 – The 2020 FPAS Results Chart for the Participation Contribution Comparison Group

Money Market Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
AVL	Avivasa Emeklilik ve Hayat A.Ş. Second Money Market Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.53	10.44
HEP	Axa Hayat ve Emeklilik A.Ş. Money Market Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.47	10.38
	Upper Threshold for Funds in the Money Market Comparison Group		11.42	
AE1	Avivasa Emeklilik ve Hayat A.Ş. First Money Market Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	11.41	10.32
VEL	Türkiye Hayat ve Emeklilik A.Ş. VEM Money Market Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.35	10.32
ZHR	Türkiye Hayat ve Emeklilik A.Ş. ZEM Money Market Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.35	10.26
HHP	Türkiye Hayat ve Emeklilik A.Ş. HEM Money Market Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.35	10.26
AZL	Allianz Hayat ve Emeklilik A.Ş. Money Market Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	11.33	10.24
BPL	BNP Paribas Cardif Emeklilik A.Ş. First Money Market Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	11.33	10.24
AMP	Allianz Yaşam ve Emeklilik A.Ş. Money Market Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	11.32	10.23
IER	NN Hayat ve Emeklilik A.Ş. Money Market Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	11.31	10.24
	Arithmetic Mean of Gross Returns from Funds in the Money Market Comparison Group		11.31	
GEL	Garanti Emeklilik ve Hayat A.Ş. Money Market Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	11.28	10.19
CHL	Cigna Finans Emeklilik ve Hayat A.Ş. Money Market Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	11.23	10.25
ANK	Aegon Emeklilik ve Hayat A.Ş. Money Market Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	11.22	10.13
AH2	Anadolu Hayat Emeklilik A.Ş. Money Market Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	11.21	10.12
FET	Fiba Emeklilik ve Hayat A.Ş. Money Market Pension Mutual Fund	ICBC Turkey Portföy Yönetimi A.Ş.	11.21	10.12
	Lower Threshold for Funds in the Money Market Comparison Group		11.20	
MHL	Metlife Emeklilik ve Hayat A.Ş. Money Market Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	11.03	9.94

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: "(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term."

Gross Return Rate: It is calculated using the following formula: "(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period)." The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

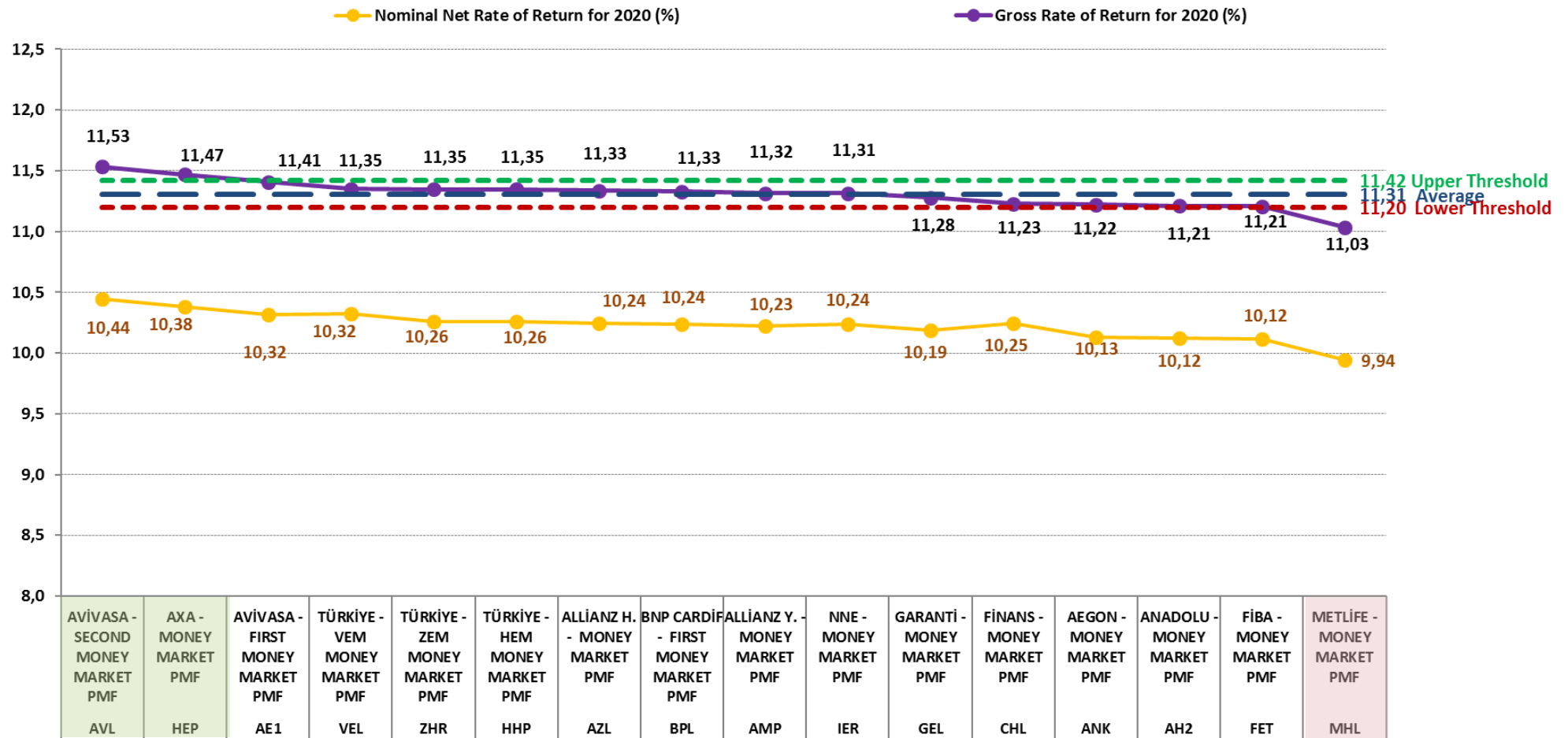


Figure 19 – The 2020 FPAS Results Chart for the Money Market Comparison Group

Standard IPS Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
VEK	Türkiye Hayat ve Emeklilik A.Ş. VEM Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	15.10	13.19
ANG	Aegon Emeklilik ve Hayat A.Ş. Standard Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	14.39	12.48
EST	Fiba Emeklilik ve Hayat A.Ş. Oyak Portföy Standard Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	14.29	12.38
	Upper Threshold for Funds in the Standard IPS Comparison Group		14.25	
HHK	Türkiye Hayat ve Emeklilik A.Ş. HEM Government Bonds and Bills Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.83	11.92
FEN	Fiba Emeklilik ve Hayat A.Ş. Standard Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	13.79	11.88
BNS	BNP Paribas Cardif Emeklilik A.Ş. Standard Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	13.66	11.75
IEB	NN Hayat ve Emeklilik A.Ş. Standard Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	13.61	11.71
	Arithmetic Mean of Gross Returns from Funds in the Standard IPS Comparison Group		13.61	
CHS	Cigna Finans Emeklilik ve Hayat A.Ş. Standard Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	13.57	11.95
AZS	Allianz Hayat ve Emeklilik A.Ş. Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.55	11.64
AVN	Avivasa Emeklilik ve Hayat A.Ş. Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.47	11.56
ATK	Anadolu Hayat Emeklilik A.Ş. Standard Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	13.39	11.48
AMS	Allianz Yaşam ve Emeklilik A.Ş. Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.33	11.42
ZHS	Türkiye Hayat ve Emeklilik A.Ş. ZEM Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.32	11.41
HEK	Axa Hayat ve Emeklilik A.Ş. Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.26	11.35
GHD	Garanti Emeklilik ve Hayat A.Ş. Standard Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	13.24	11.33
	Lower Threshold for Funds in the Standard IPS Comparison Group		12.96	
MHK	Metlife Emeklilik ve Hayat A.Ş. Standard Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	11.93	10.03

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.}}$

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 20 – The 2020 FPAS Results Table for the Standard IPS Comparison Group

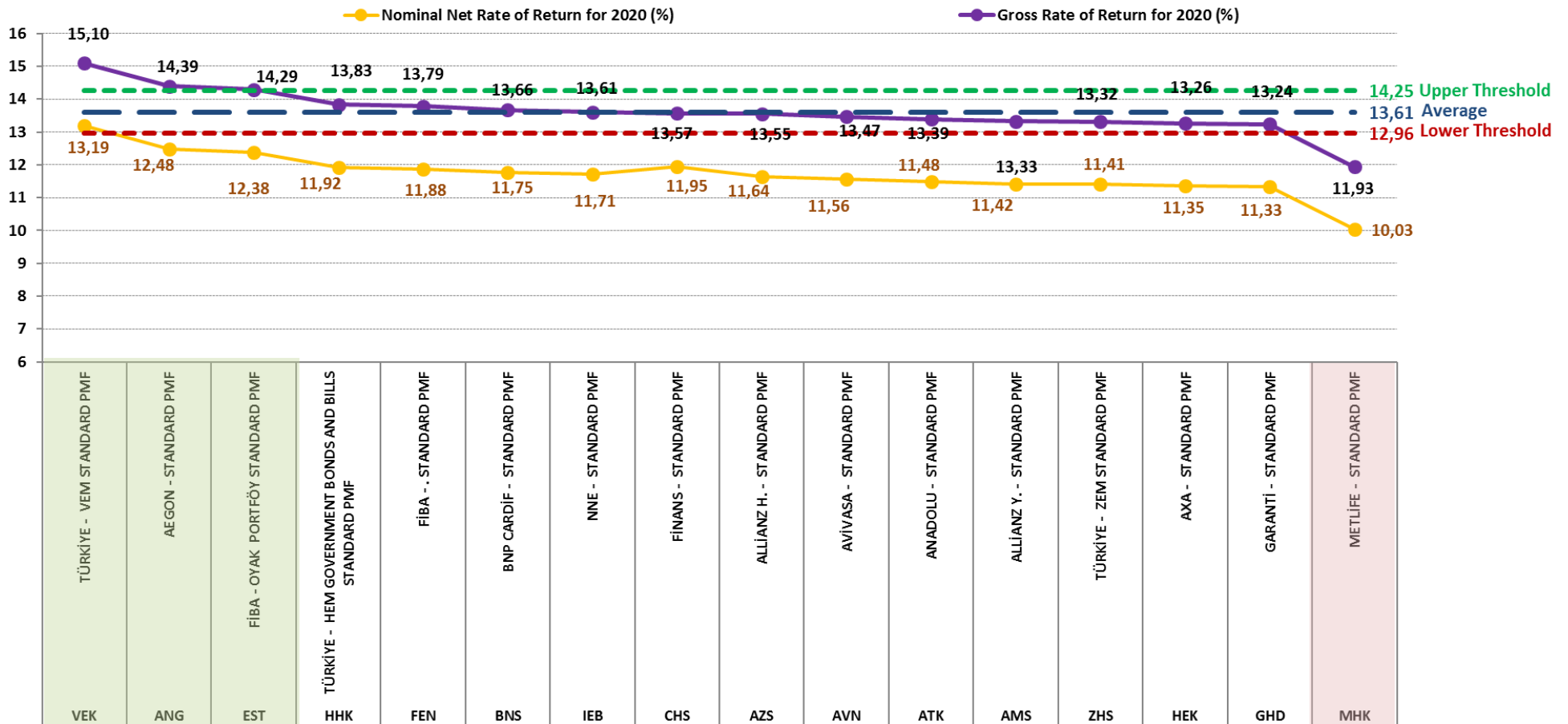


Figure 20 – The 2020 FPAS Results Chart for the Standard IPS Comparison Group

Standard Participation IPS Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
FYN	Avivasa Emeklilik ve Hayat A.Ş. Participation Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	31.75	29.84
FYU	Allianz Yaşam ve Emeklilik A.Ş. Participation Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	30.41	28.50
FIS	Fiba Emeklilik ve Hayat A.Ş. Participation Standard Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	29.62	27.71
	Upper Threshold for Funds in the Standard Participation IPS Comparison Group		29.17	
	Arithmetic Mean of Gross Returns from Funds in the Standard Participation IPS Comparison Group		25.10	
VGB	Türkiye Hayat ve Emeklilik A.Ş. VEM Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	24.82	22.91
AGE	Anadolu Hayat Emeklilik A.Ş. Participation Standard Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	24.82	22.91
AGD	Bereket Emeklilik ve Hayat A.Ş. Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	24.81	22.91
ZHA	Türkiye Hayat ve Emeklilik A.Ş. ZEM Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	24.65	22.74
KEB	Katılım Emeklilik ve Hayat A.Ş. Participation Standard Pension Mutual Fund	KT Portföy Yönetimi A.Ş.	23.87	21.96
GES	Garanti Emeklilik ve Hayat A.Ş. Participation Standard Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	22.42	20.51
HHD	Türkiye Hayat ve Emeklilik A.Ş. HEM Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	22.35	20.44
	Lower Threshold for Funds in the Standard Participation IPS Comparison Group		21.03	
MHS	Metlife Emeklilik ve Hayat A.Ş. Participation Standard Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	16.58	14.67

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 21 – The 2020 FPAS Results Table for the Standard Participation IPS Comparison Group

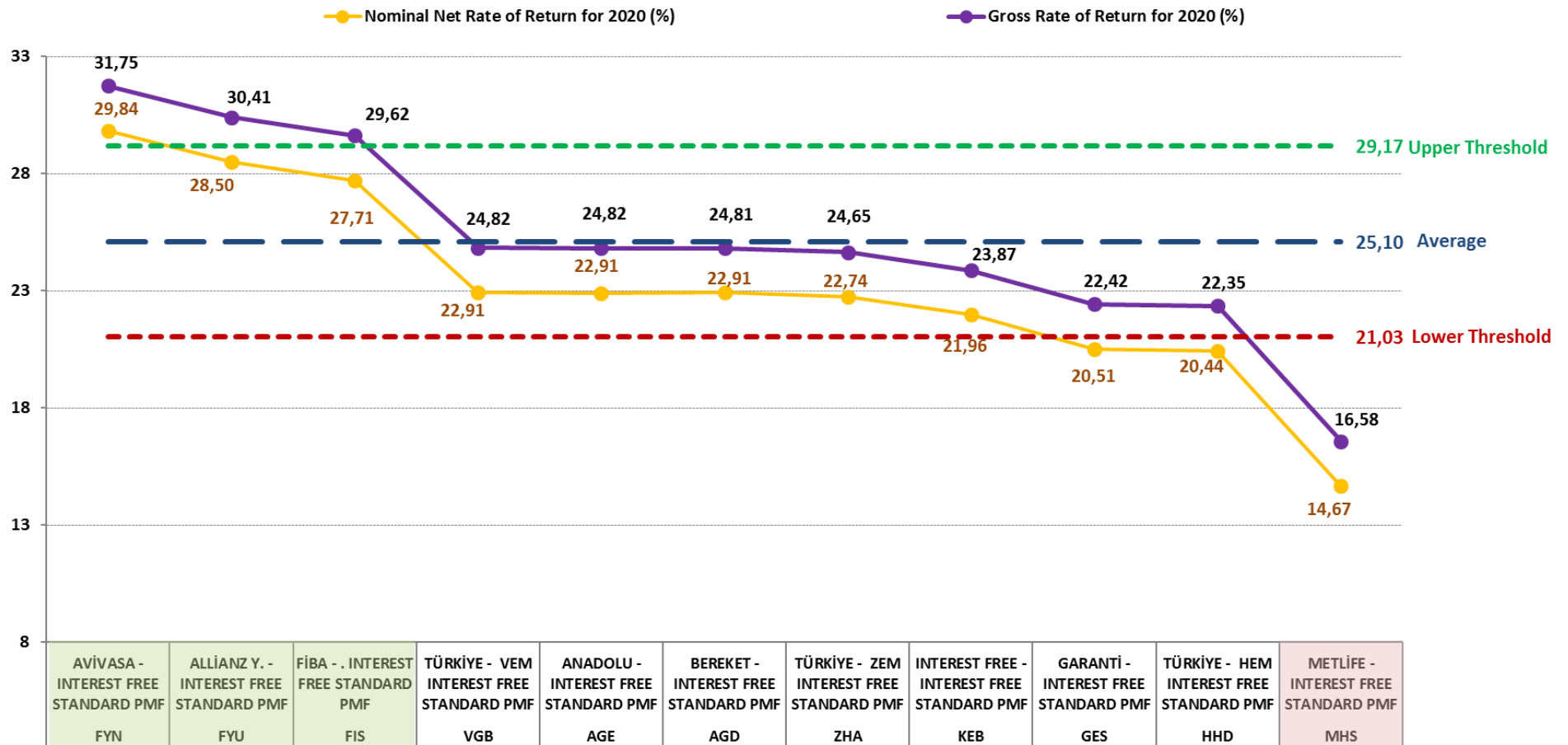


Figure 21 – The 2020 FPAS Results Chart for the Standard Participation IPS Comparison Group

Standard AES Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
GCS	Garanti Emeklilik ve Hayat A.Ş. AES Standard Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	18.18	17.27
	Upper Threshold for Funds in the Standard AES Comparison Group		15.25	
CHU	Cigna Finans Emeklilik ve Hayat A.Ş. AES Standard Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	15.20	14.24
VGZ	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.86	12.95
AAJ	Avivasa Emeklilik ve Hayat A.Ş. AES Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.86	12.96
KOA	Allianz Yaşam ve Emeklilik A.Ş. AES Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.81	12.91
	Arithmetic Mean of Gross Returns from Funds in the Standard AES Comparison Group		13.72	
HEC	Axa Hayat ve Emeklilik A.Ş. AES Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.60	12.61
HEN	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.53	12.64
ZHC	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	13.43	12.53
FGF	Fiba Emeklilik ve Hayat A.Ş. AES Standard Pension Mutual Fund	Fiba Portföy Yönetimi A.Ş.	13.32	12.23
AFH	Anadolu Hayat Emeklilik A.Ş. AES Standard Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	12.72	11.76
BNL	BNP Paribas Cardif Emeklilik A.Ş. AES Standard Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	12.70	11.77
NHO	NN Hayat ve Emeklilik A.Ş. AES Standard Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	12.57	11.67
	Lower Threshold for Funds in the Standard AES Comparison Group		12.19	
MHZ	Metlife Emeklilik ve Hayat A.Ş. AES Standard Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	11.59	10.69

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: $\frac{(\text{Unit price at the end of the term} - \text{Unit price at the beginning of the term})}{\text{Unit price at the beginning of the term}}$.

Gross Return Rate: It is calculated using the following formula: $\frac{(\text{Total fund expense ratio} - \text{The ratio of the fund expenses covered by the founder within the period})}{\text{Total fund expense ratio}}$. The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 22 – The 2020 FPAS Results Table for the Standard AES Comparison Group

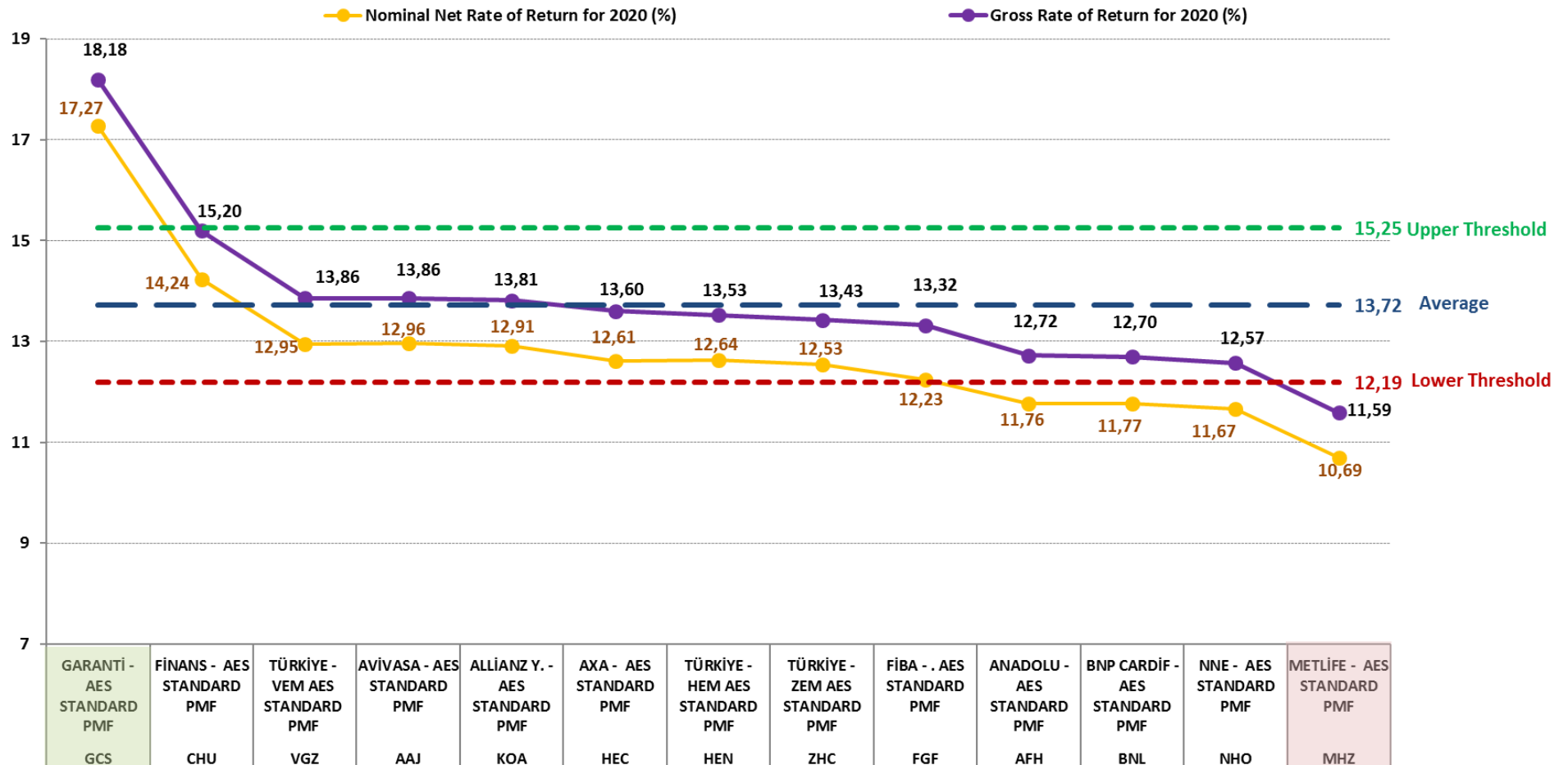


Figure 22 – The 2020 FPAS Results Chart for the Standard AES Comparison Group

Standard Participation AES Comparison Group

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)
FGH	Fiba Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	22.89	21.80
GCK	Garanti Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	20.15	19.24
	Upper Threshold for Funds in the Standard Participation AES Comparison Group		19.27	
CFE	Cigna Finans Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	QNB Finans Portföy Yönetimi A.Ş.	18.28	17.32
NHR	NN Hayat ve Emeklilik A.Ş. AES Participation Standard Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	17.98	17.07
AYJ	Avivasa Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	17.21	16.30
HEI	Axa Hayat ve Emeklilik A.Ş. AES Participation Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	17.17	16.20
BEI	Bereket Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	16.96	16.02
KOS	Allianz Yaşam ve Emeklilik A.Ş. AES Participation Standard Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	16.95	16.03
KTZ	Katılım Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	16.86	15.96
	Arithmetic Mean of Gross Returns from Funds in the Standard Participation AES Comparison Group		16.72	
BNZ	BNP Paribas Cardif Emeklilik A.Ş. AES Participation Standard Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	15.37	14.44
ZHI	Türkiye Hayat ve Emeklilik A.Ş. ZEM AES Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	15.13	14.23
AFP	Anadolu Hayat Emeklilik A.Ş. AES Participation Standard Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	15.03	14.12
HEU	Türkiye Hayat ve Emeklilik A.Ş. HEM AES Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	14.74	13.84
VGK	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Participation Standard Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	14.67	13.74
	Lower Threshold for Funds in the Standard Participation AES Comparison Group		14.18	
MHI	Metlife Emeklilik ve Hayat A.Ş. AES Participation Standard Pension Mutual Fund	Deniz Portföy Yönetimi A.Ş.	11.47	10.56

Remarks

Upper Threshold Value: It is calculated by adding the standard deviation of annual gross returns from funds in a comparison group to the arithmetic mean of gross returns from funds in the same group.

Lower Threshold Value: It is calculated by subtracting the standard deviation of annual gross returns from funds in a comparison group from the arithmetic mean of gross returns from funds in the same group. Net Return Rate: It is calculated using the following formula: “(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term.”

Gross Return Rate: It is calculated using the following formula: “(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period).” The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively poor and these funds are featured on a pink background.

Table 23 – The 2020 FPAS Results Table for the Standard Participation AES Comparison Group

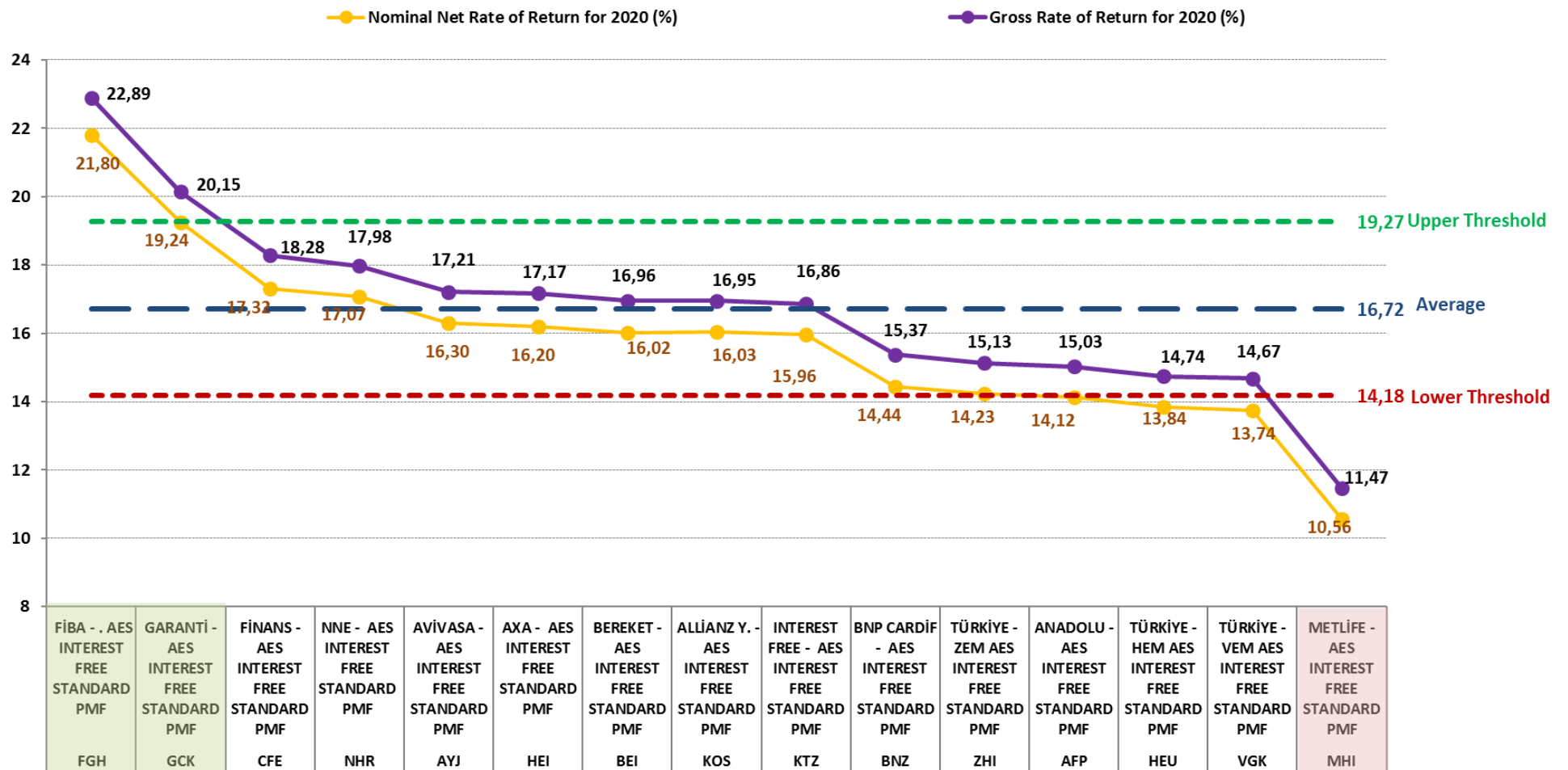


Figure 23 – The 2020 FPAS Results Chart for the Standard Participation AES Comparison Group

Funds Not Included in Any Comparison Groups

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)	2020 Benchmark Return (%)	2020 Relative Return (%)	Upper Threshold Value (%)	Lower Threshold Value (%)
KEH	Katılım Emeklilik ve Hayat A.Ş. Participation Stock Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	111.59	109.31	88.04	23.54	96.85	79.24
AGH	Bereket Emeklilik ve Hayat A.Ş. Participation Stock Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	109.21	106.93	76.16	33.05	83.78	68.55
KEG	Katılım Emeklilik ve Hayat A.Ş. Balanced Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	45.58	43.30	39.32	6.26	43.25	35.39
FIM	Fiba Emeklilik ve Hayat A.Ş. Mükafat Portföy Participation Variable Pension Mutual Fund	Mükafat Portföy Yönetimi A.Ş.	34.85	32.63	11.61	23.25	12.77	10.45
AUA	Allianz Yaşam ve Emeklilik A.Ş. 2035 Target Fund Basket Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	29.50	27.13	25.69	3.82	28.25	23.12
GEU	Garanti Emeklilik ve Hayat A.Ş. Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	26.74	25.18	21.93	4.81	24.13	19.74
AGM	Bereket Emeklilik ve Hayat A.Ş. Conservative Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	24.27	21.99	11.61	12.67	12.77	10.45
FIK	Fiba Emeklilik ve Hayat A.Ş. Kare Portföy Fund Basket Pension Mutual Fund	Kare Portföy Yönetimi A.Ş.	24.13	22.83	11.61	12.52	12.77	10.45
GEA	Garanti Emeklilik ve Hayat A.Ş. Participation Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	20.56	18.28	11.61	8.95	12.77	10.45
ZHF	Türkiye Hayat ve Emeklilik A.Ş. ZEM Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	19.19	16.91	11.61	7.58	12.77	10.45
ANE	Aegon Emeklilik ve Hayat A.Ş. Composite Pension Mutual Fund	Oyak Portföy Yönetimi A.Ş.	18.11	16.20	15.53	2.59	17.08	13.97
VEB	Türkiye Hayat ve Emeklilik A.Ş. VEM Participation Balanced Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	18.11	16.17	11.61	6.50	12.77	10.45
GHT	Garanti Emeklilik ve Hayat A.Ş. Absolute Return Targeted Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	17.76	15.48	11.61	6.15	12.77	10.45
AGG	Bereket Emeklilik ve Hayat A.Ş. Participation Variable Group Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	17.62	16.02	11.61	6.01	12.77	10.45
BNB	BNP Paribas Cardif Emeklilik A.Ş. Absolute Return Targeted Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	16.94	14.66	11.61	5.34	12.77	10.45
VGG	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Balanced Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	16.88	15.83	11.61	5.27	12.77	10.45
HEB	Axa Hayat ve Emeklilik A.Ş. Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	15.87	13.59	10.63	5.24	11.69	9.57
AVY	Avivasa Emeklilik ve Hayat A.Ş. Composite Group Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	15.83	14.65	13.85	1.98	15.24	12.47
AVD	Avivasa Emeklilik ve Hayat A.Ş. Composite Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	15.58	13.67	13.85	1.73	15.24	12.47
KOE	Allianz Yaşam ve Emeklilik A.Ş. Koç Holding Pension Foundation First Variable Group Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	13.26	12.77	11.34	1.92	12.47	10.21
AVO	Avivasa Emeklilik ve Hayat A.Ş. Private Sector Bonds and Bills Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	13.22	11.31	11.39	1.83	12.53	10.25
HHM	Türkiye Hayat ve Emeklilik A.Ş. HEM Participation Stock Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	90.44	88.16	84.08	6.36	92.49	75.67
VYB	Türkiye Hayat ve Emeklilik A.Ş. VEM Participation Stock Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	90.38	88.10	84.08	6.30	92.49	75.67
ATE	Anadolu Hayat Emeklilik A.Ş. İş Bankası Share Index Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	57.10	55.19	56.34	0.75	61.98	50.71
AMY	Allianz Yaşam ve Emeklilik A.Ş. Composite Group Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	55.52	54.35	52.13	3.39	57.34	46.92
ALI	Allianz Yaşam ve Emeklilik A.Ş. Koç Share Index Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	55.16	53.25	56.29	-1.13	61.92	50.66
AZO	Allianz Hayat ve Emeklilik A.Ş. Composite Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	53.91	51.72	52.13	1.78	57.34	46.92
ALR	Allianz Yaşam ve Emeklilik A.Ş. Composite Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	52.32	50.05	52.13	0.19	57.34	46.92
GHO	Garanti Emeklilik ve Hayat A.Ş. Third Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	47.76	45.85	48.07	-0.31	52.88	43.26
AEU	Allianz Yaşam ve Emeklilik A.Ş. BIST Dividend Index Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	42.06	40.15	42.40	-0.34	46.64	38.16
AVH	Avivasa Emeklilik ve Hayat A.Ş. Dividend-Paying Companies Stock Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	40.97	38.89	40.90	0.07	44.99	36.81
AUG	Allianz Hayat ve Emeklilik A.Ş. Second Government Bonds and Bills (FX) Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	40.72	38.81	41.25	-0.53	45.37	37.12

Fund Code	Fund Name	Portfolio Management Company	2020 Gross Return (%)	2020 Net Return (%)	2020 Benchmark Return (%)	2020 Relative Return (%)	Upper Threshold Value (%)	Lower Threshold Value (%)
AH4	Anadolu Hayat Emeklilik A.Ş. Second Government Bonds and Bills (FX) Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	40.25	38.34	41.16	-0.90	45.27	37.04
KEK	Katılım Emeklilik ve Hayat A.Ş. Participation Variable Group Pension Mutual Fund	Albaraka Portföy Yönetimi A.Ş.	38.65	37.57	39.32	-0.67	43.25	35.39
AH6	Anadolu Hayat Emeklilik A.Ş. First Variable Pension Mutual Fund	HSBC Portföy Yönetimi A.Ş.	38.46	36.22	36.40	2.05	40.04	32.76
IEA	NN Hayat ve Emeklilik A.Ş. Variable Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	33.34	31.08	32.99	0.35	36.29	29.69
AMR	Allianz Yaşam ve Emeklilik A.Ş. Second Government Bonds and Bills (FX) Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	32.90	30.99	32.83	0.07	36.12	29.55
AG2	Anadolu Hayat Emeklilik A.Ş. Bonds and Bills Group Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	32.42	31.24	32.24	0.18	35.47	29.02
AE4	Avivasa Emeklilik ve Hayat A.Ş. First Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	29.45	28.32	29.47	-0.02	32.41	26.52
HEE	Axa Hayat ve Emeklilik A.Ş. Participation Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	29.43	27.15	29.10	0.33	32.01	26.19
AVU	Avivasa Emeklilik ve Hayat A.Ş. Second Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	29.27	27.36	28.80	0.47	31.68	25.92
AVR	Avivasa Emeklilik ve Hayat A.Ş. BRIC Countries Foreign Variable Pension Mutual Fund	AK Portföy Yönetimi A.Ş.	23.66	21.38	23.53	0.13	25.88	21.18
GHH	Garanti Emeklilik ve Hayat A.Ş. Sustainability Stock Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	21.04	18.76	19.47	1.58	21.41	17.52
ABE	Anadolu Hayat Emeklilik A.Ş. BRIC Countries Foreign Variable Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	20.79	18.51	20.57	0.22	22.63	18.51
IEK	NN Hayat ve Emeklilik A.Ş. Composite Pension Mutual Fund	TEB Portföy Yönetimi A.Ş.	19.93	17.65	18.55	1.38	20.41	16.70
APG	Allianz Yaşam ve Emeklilik A.Ş. Sustainability Stock Pension Mutual Fund	Yapı Kredi Portföy Yönetimi A.Ş.	19.41	18.07	19.47	-0.05	21.41	17.52
GHV	Garanti Emeklilik ve Hayat A.Ş. AES Balanced Participation Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	12.59	11.50	11.61	0.98	12.77	10.45
AHC	Anadolu Hayat Emeklilik A.Ş. Private Sector Bonds and Bills Pension Mutual Fund	İş Portföy Yönetimi A.Ş.	11.83	9.92	11.74	0.09	12.92	10.57
VED	Türkiye Hayat ve Emeklilik A.Ş. VEM AES Conservative Participation Variable Pension Mutual Fund	Ziraat Portföy Yönetimi A.Ş.	11.12	10.03	11.61	-0.48	12.77	10.45
KES	Katılım Emeklilik ve Hayat A.Ş. Aggressive Participation Variable (FX) Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	29.87	27.59	38.47	-8.59	42.31	34.62
KED	Katılım Emeklilik ve Hayat A.Ş. Emlak Participation Bank Participation Variable Pension Mutual Fund	QInvest Portföy Yönetimi A.Ş.	26.60	24.32	32.88	-6.28	36.17	29.59
GHZ	Garanti Emeklilik ve Hayat A.Ş. AES Cautious Participation Variable Pension Mutual Fund	Garanti Portföy Yönetimi A.Ş.	10.31	9.22	11.61	-1.30	12.77	10.45
KKS	Katılım Emeklilik ve Hayat A.Ş. Public Lease Certificates Participation Pension Mutual Fund	Albaraka Portföy Yönetimi A.Ş.	5.65	3.74	8.87	-3.22	9.76	7.99

Remarks

Upper Threshold Value: It is calculated for the funds not included in any comparison groups by increasing the fund benchmark return by ten percent.

Lower Threshold Value: It is calculated for the funds not included in any comparison groups by decreasing the fund benchmark return by ten percent. Net Return Rate: It is calculated using the following formula: "(Unit price at the end of the term - Unit price at the beginning of the term) / Unit price at the beginning of the term."

Gross Return Rate: It is calculated using the following formula: "(Total fund expense ratio - The ratio of the fund expenses covered by the founder within the period)."

Benchmark: It consists of indices or investment instruments designated in fund bylaws in compliance with fund management strategies. The weighted average of the valid period returns for these indices or investment instruments calculated by the percentages set forth in the fund regulations by the founding company constitutes the "Benchmark Return."

Relative Return Ratio: It is the positive or negative percentage value calculated by subtracting the benchmark return ratio from gross return ratio.

Absolute Relative Return Ratio: It is the absolute value of the relative return ratio.

The funds of the absolute relative return ratio below 0.75 percent were considered to have performed within acceptable limits, and were not assessed as relatively successful or poor. The 2020 performances of funds with annual gross rates of return equal to or above the upper threshold are considered relatively successful and these funds are featured on a green background.

The 2020 performances of funds with annual gross rates of return equal to or below the lower threshold are considered relatively insufficient and these funds are featured on a pink background.

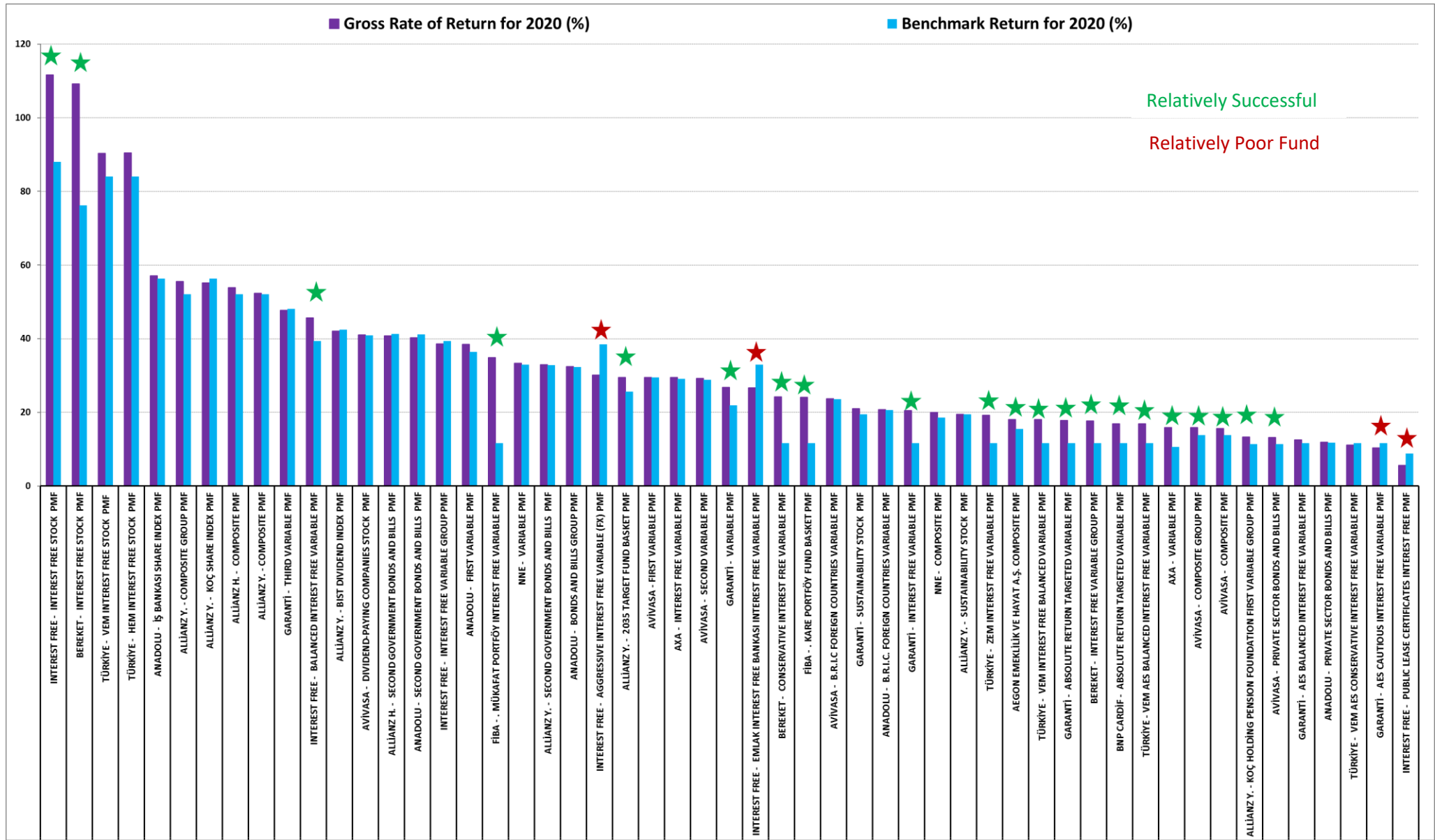


Figure 24 – The 2020 FPAS Results Chart for the Funds Not Included in Any Comparison Group

