Participant Behavior and Demographics (FERS)

2019-2023 Analysis

Highlights at a Glance

Link	Key FERS Statistics	2019	2020	2021	2022	2023
Figure 1	FERS Participation Rate	93.8%	94.6%	95.5%	95.1%	95.9%
Figure 3	FERS Deferral Rate	7.9%	8.1%	8.4%	8.9%	9.1%
Figure 5	FERS Traditional Deferral Rate	7.3%	7.4%	7.5%	8.0%	7.9%
	FERS Roth Deferral Rate	5.3%	5.7%	5.9%	7.1%	7.1%
Figure 9	FERS Loans Usage	8.6%	7.1%	7.0%	6.6%	8.3%
	FERS Hardship Withdrawals Usage	3.7%	2.9%	4.0%	2.1%	3.1%

Introduction

The Federal Retirement Thrift Investment Board (FRTIB) conducted an analysis of the participant demographics of the Thrift Savings Plan (TSP) based on participant data.

The report focuses solely on active participants in the Federal Employee Retirement System (FERS). Information from this analysis provides insight on demographics, investment behaviors, and how plan design changes may have influenced participation and contribution behaviors. Finally, this analysis helps identify trends with participant usage of benefit options.

Background

FRTIB is an independent Federal agency that was established to administer the Thrift Savings Plan (TSP) under the Federal Employees' Retirement System Act of 1986 (See 5 U.S.C. §§ 8351; 8401 et seq.). Like the type of savings and tax benefits that many private corporations offer their employees under I.R.C. §401(k) plans, the TSP provides Federal civilian employees and members of the uniformed services the opportunity to save for retirement security. The Agency's mission is to act solely in the interest of its participants and beneficiaries.

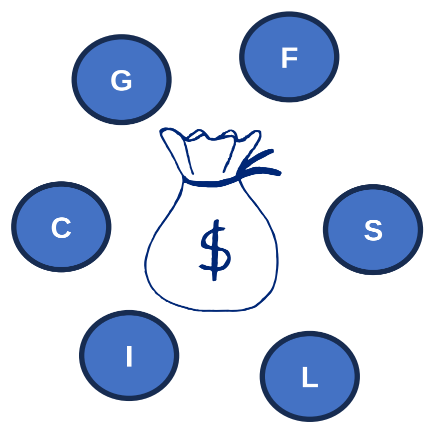
TSP participants can invest their employee and employer contributions in the following core funds:

- Government Securities Investment Fund (*G Fund*)
- Fixed Income Index Investment Fund (*F Fund*)
- Common Stock Index Investment Fund (*C Fund*)
- Small Cap Stock Index Investment Fund (*S Fund*)
- International Stock Index Investment Fund (*I Fund*)

In addition to these indexed core funds, participants may also invest in ten Lifecycle Funds (L Funds). The L Funds are custom target-date funds, provided in five-year intervals, invested exclusively in the G, F, C, S, and I Funds. TSP added six additional funds, and retired the L 2020 Fund, on July 1, 2020.

During the five-year period covered by this report, the TSP underwent a few major plan design changes:

- October 1, 2020, TSP raised the default deferral rate to 5% from 3%.
- January 1, 2021, the plan implemented spillover method for catch-up contributions which ensures that participants do not miss out on employer matching contributions by maxing out the participant's contributions early in the year.
- June 1, 2022, FRTIB authorized the use of a second general purpose loan.



Data Collection and Methodology

This report is based on data extracted from the TSP recordkeeping system for **all TSP participants identified as civilian Federal employees covered by the FERS retirement system who were active for all of 2023**. (Please note that blended retirement system (BRS) demographics will not be covered in this report as it is a separate system from FERS.)

In the same manner as previous reports, the agency 1% automatic contributions were used to estimate salary. The exact formula is:

Salary **=** participant's 1% match contribution as of December 31st, 2023, **x** 100 **x** participant's payroll frequency

This value is then used to calculate salary quintiles and the average deferral rate. This method excludes overtime and performance awards, so it does not represent the total employee compensation. The effect is that the average deferral rate (calculated using a smaller denominator) will be higher using this methodology but will largely match the participant's elected deferral rate percentage. This effect is expected to be roughly equivalent across salary ranges, so the use of salary quintiles will mitigate the impact.

In this report, salaries are shown in quintiles. The first quintile represents the 20% of all records in the lowest annual salary band; the fifth quintile represents the 20% of records in the highest salary band.

In summary, the analysis provided in this report is subject to the following limitations:

- The calculation of salary based on automatic 1% contributions may modestly distort the findings compared to reports prior to 2016 when OPM data was last available, showing a higher rate but one more representative of the participant's actual deferral choice.

- The TSP recordkeeping system does not contain information on a participant's work schedule. Therefore, the inclusion of TSP accounts for part-time and intermittent workers is likely to have a more meaningful impact on the findings compared to reports prior to 2016. Since this group is likely to participate and contribute at lower rates than full-time employees, its inclusion will also likely result in lower estimated participation and contribution rates (versus an analysis including only full-time employees), particularly for the lowest salary quintile.

- Employees' actual deferral rate elections are not included in the TSP recordkeeping system. Therefore, an approximation of annualized deferral rate is calculated by comparing the actual total employee contributions to the estimated annual salary rate for each calendar year.

- In 2022, the automatic enrollment status codes which were previously used for this report were discontinued as the result of a change in recordkeeper. For the 2023 report we instead look at enrollment behaviors in the first 90 days for those who joined the TSP in 2023. Because of the new data source, year over year comparison is advised against. The variables we look at are:

    - Auto enrolled/no change: they made no change since being auto enrolled in the first 90 days.

    - Opt-out: in the first 90 days they changed to 0% contribution.

    - Decrease rate: their traditional plus Roth rate was changed to under 5% in the first 90 days.

    - Increase rate: their traditional plus Roth rate was changed to over 5% in the first 90 days.

    - Subsequent activity: they stayed at 5% but changed to Roth or made an investment allocation change in the first 90 days.

Analysis

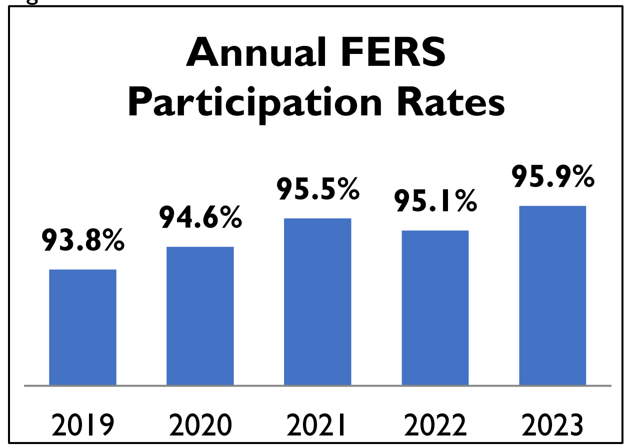
The following sections of this report examine the behaviors of FERS participants across a five-year period ending December 31, 2023, and through the lens of two demographic filters – age and salary. The graphics and narratives summarize the relationships between these demographic factors and participant behaviors associated with plan participation, automatic enrollment, deferral rates, investment allocation, and loan and hardship withdrawal usage.

Plan Participation

As of December 31, 2023, there were 4,060,009 FERS participants with a balance in the TSP and 1,014,278 participants with a Roth balance. The average participant balance was $175,692 while the median participant balance was $57,384. The average balance for Roth accounts was $26,472 while the median account balance for Roth accounts was $9,701.

The FERS participation rate increased by 0.8% year over year, with 95.9% of participants contributing to the plan in 2023. Since the implementation of automatic enrollment for new hires in 2010, participation rates increased year over year, however in 2021, rates began leveling off at around 95%. Figure 1 illustrates the plateau of participation rates over the last three years. The automatic enrollment policy automatically defers 5%[1] of new employees' salaries into the TSP unless the employee makes an active election not to participate in the Plan or to change the contribution amount.

Figure 1



Automatic enrollment continues to keep participation rates high for the youngest and lowest paid participants. In table 1, we see that the two youngest participant groups are near a participation rate of 97% maintaining the highest rates of all age groups. Over the years, the differences between age groups have shrunk, with all age groups having an average in the 90% range now. There is a slight gap of 4.3% between the lowest and highest paid, like the difference we saw in 2019. The highest paid quintile continues to have the highest participation rate in the plan at 97.9%.

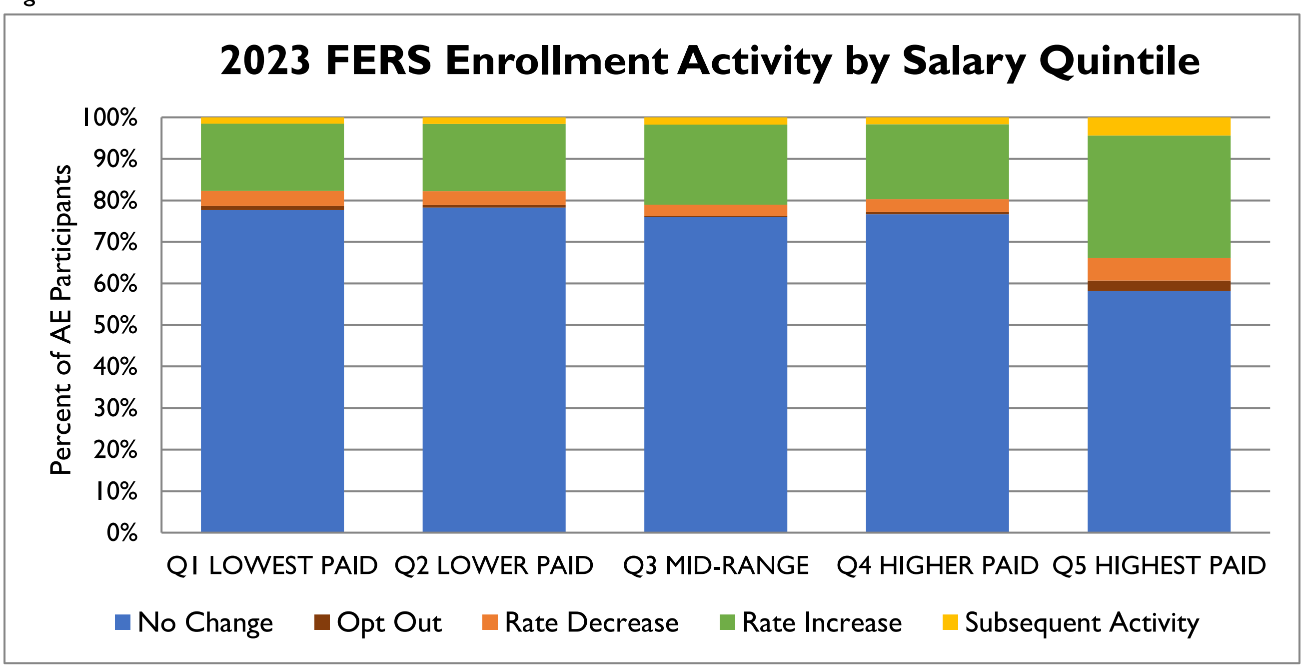
[1] Default deferral rate for automatically enrolled participants increased from 3% to 5% on October 1, 2020.

Table 1

Annual FERS Participation Rates by Demographic Cohorts					
	2019	**2020**	**2021**	**2022**	**2023**
Age					
<= 29	97.1%	97.3%	97.7%	96.7%	96.8%
30 – 39	95.7%	96.2%	97.1%	96.5%	97.0%
40 – 49	93.7%	94.6%	95.8%	95.5%	96.4%
50 – 59	92.7%	93.5%	94.6%	94.5%	95.4%
60 – 69	91.9%	92.6%	93.3%	93.3%	94.0%
70+	88.2%	88.6%	89.6%	89.7%	90.1%
Salary Quintile					
Q1 Lowest Paid	92.9%	93.8%	94.9%	93.8%	93.6%
Q2 Lower Paid	91.1%	92.2%	93.9%	93.6%	94.7%
Q3 Mid-Range	91.7%	92.9%	93.9%	94.1%	94.8%
Q4 Higher Paid	95.2%	95.7%	96.4%	96.3%	96.9%
Q5 Highest Paid	97.0%	97.4%	97.8%	97.5%	97.9%

An examination of the behaviors of participants who enrolled in the plan in 2023 indicates that auto-enrollment has been impactful in increasing participation rates. Notably, each salary quintile has seen 2% or fewer participants opting out of contributions, as depicted in Figure 2. Moreover, a significant majority of participants did not alter their deferral rates, remaining auto enrolled and receiving a full 5% match. When considering the highest earners, it is evident that these individuals take a more active role in managing their retirement accounts, with nearly 34% either raising their total contributions above 5% or engaging in other activities, such as changing their contributions to Roth or modifying their investment portfolio.

Figure 2



Deferral Rates

The FERS average deferral percentage rate (ADP) (includes employee Roth, traditional and catch-up contributions) has been steadily increasing since 2019 (see figure 3). The FERS deferral rate exceeds the 7.1% ADP of other defined contribution plans according to Deloitte[2] and the 7.3% ADP for automatic plans according to Vanguard[3]. The current average deferral rate for FERS participants is moving towards the 9.5% rate from the mid-2000s. While the introduction of auto-enrollment in 2010 increased the participation rate, many auto-enrolled participants have continued to contribute at the 3% or 5% default level. The increase in new participants at the default level caused the average deferral rate to slowly decline; however, the increase in the default deferral rate in 2020 from 3% to 5% has caused the average deferral rate to increase again.

Figure 3

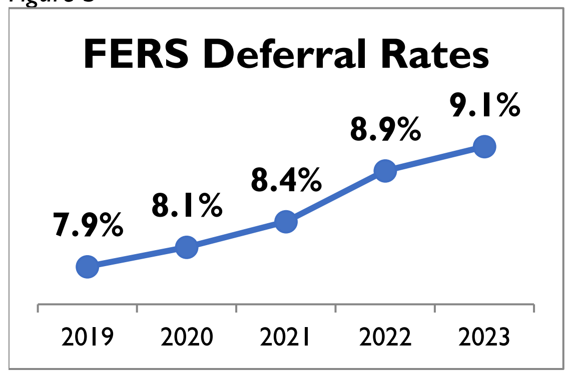
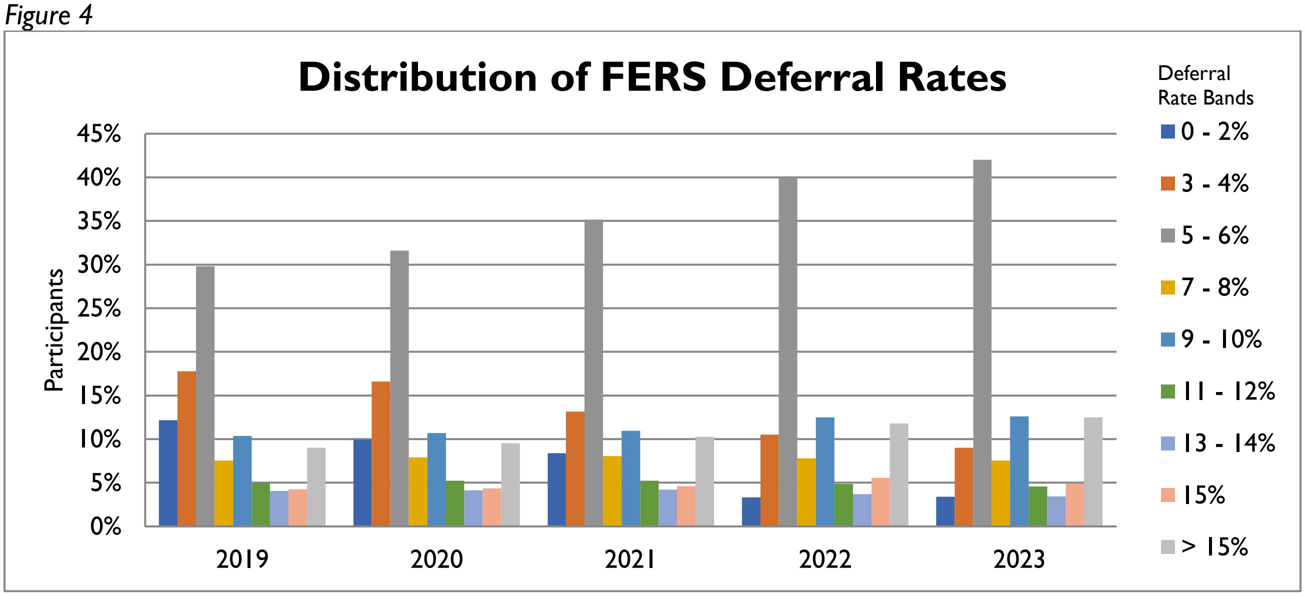


Figure 4 below illustrates the impact of automatic enrollment showing that the percent of participants contributing 3-4% is steadily declining while the percent at the default contribution rate of 5% grows. This is proof of the power of plan design, as those who contribute 5% or more, receive their full match benefit[4]. Overall, there was little change year over year for the other deferral rate bands, signaling that auto-enrollment is the main driver behind any significant changes. Still of importance, 12.4% of participants are not receiving the full matching contribution as they are contributing less than 5%.

Figure 4



[2] "For [Non-highly compensated employees], the median ADP was 6.2% . . ., while the median ADP for [highly compensated employees was 7.8% ……." Deloitte, Annual Defined Contribution Benchmarking Survey – Ease of Use Drives Engagement in Saving for Retirement, 2019 Edition.
[3] "Participants had an average deferral rate of 7.3% in 2022." Vanguard, How America Saves 2023.
[4] FERS participants receive dollar-for-dollar matching contributions on the first 3% of pay and 50 cents on the dollar on the next 2%. The full match is achieved with a 5% contribution.

In table 2, we see that the lowest-paid participants are deferring the least, which is 3.7 percentage points less than the highest paid. This differential has stayed steady in the 3% range over the last 5 years. With an average deferral rate of 7.0%, many of the lowest paid are still receiving the full match. The TSP has worked to educate the lower paid employees about the benefits of receiving the full employer match. More information about those efforts can be found at https://www.frtib.gov/reading-room/participant-surveys/outreach/.

The youngest participants and lowest paid participants are well above the automatic enrollment rate of 5%, meaning on average these groups are receiving their full match.

Deferral rates for the higher salary quintiles increased with both averages over 10% deferred. The youngest participants have the lowest average deferral rates, with deferrals steadily increasing with each age bracket. Each age bracket also saw an increase in deferral rates year over year, with the youngest participants reaching above 7%. This is a change from last year where we saw smaller increases in the younger participants and decreases in older participants.

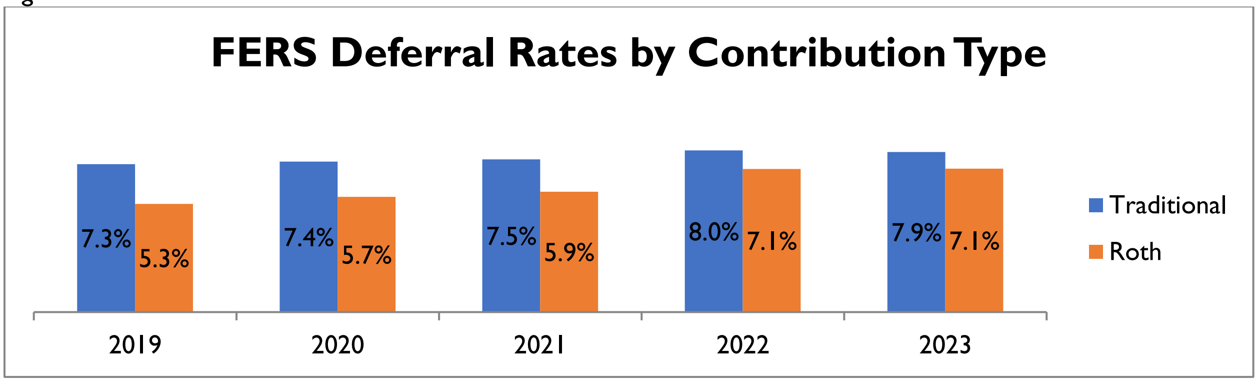
Table 2

Annual FERS Deferral Rates by Demographic Cohorts

	2019	2020	2021	2022	2023
Age					
<= 29	5.5%	5.8%	6.2%	6.6%	7.1%
30 – 39	6.6%	6.8%	7.1%	7.3%	7.5%
40 – 49	7.3%	7.6%	7.8%	7.9%	8.2%
50 – 59	9.1%	9.3%	9.5%	9.4%	9.7%
60 – 69	10.0%	10.2%	10.3%	10.1%	10.4%
70+	10.4%	10.5%	10.6%	10.0%	10.4%
Salary Quintile					
Q1 Lowest Paid	6.6%	6.1%	6.5%	6.8%	7.0%
Q2 Lower Paid	6.8%	7.0%	7.1%	7.8%	7.6%
Q3 Mid-Range	8.1%	8.3%	8.7%	8.9%	8.9%
Q4 Higher Paid	9.1%	9.3%	9.5%	9.9%	10.0%
Q5 Highest Paid	9.9%	10.0%	10.2%	10.4%	10.7%

The Roth TSP option was introduced in May 2012, allowing participants to make contributions from after-tax dollars, and for their earnings on those contributions to be tax-free at withdrawal (as long as certain IRS requirements are met). For those contributing to Roth, their average deferral rate was 7.1%, versus the average traditional deferral rate of 7.9% (Figure 5). In 2022 this figure was changed to include catch-up contributions.

Figure 5



Roth deferral rates are highest among our oldest and highest paid participants. However, all demographic cohorts except the youngest and lowest paid experienced an increase in Roth deferrals in 2023 over 2022. (See Table 3.)

Table 3

FERS Traditional and Roth Deferral Rates by Demographic Cohorts						
	2021		2022		2023	
	Traditional	Roth	Traditional	Roth	Traditional	Roth
Age						
<= 29	5.1%	5.9%	5.7%	6.9%	5.9%	6.0%
30 – 39	6.1%	5.9%	6.5%	6.7%	6.3%	6.8%
40 – 49	7.1%	5.5%	7.4%	6.4%	7.2%	6.7%
50 – 59	8.7%	6.1%	9.0%	7.4%	9.0%	7.8%
60 – 69	9.5%	7.1%	9.8%	8.7%	9.6%	9.0%
70+	10.0%	8.3%	10.4%	10.6%	11.3%	12.8%
Salary Quintile						
Q1 Lowest Paid	5.8%	5.6%	5.9%	6.4%	5.5%	5.3%
Q2 Lower Paid	6.3%	5.6%	6.9%	6.6%	6.6%	6.7%
Q3 Mid-Range	7.8%	6.2%	8.0%	7.1%	7.7%	7.4%
Q4 Higher Paid	8.6%	6.4%	8.9%	7.4%	8.9%	7.5%
Q5 Highest Paid	9.5%	6.1%	9.7%	7.5%	9.4%	7.7%

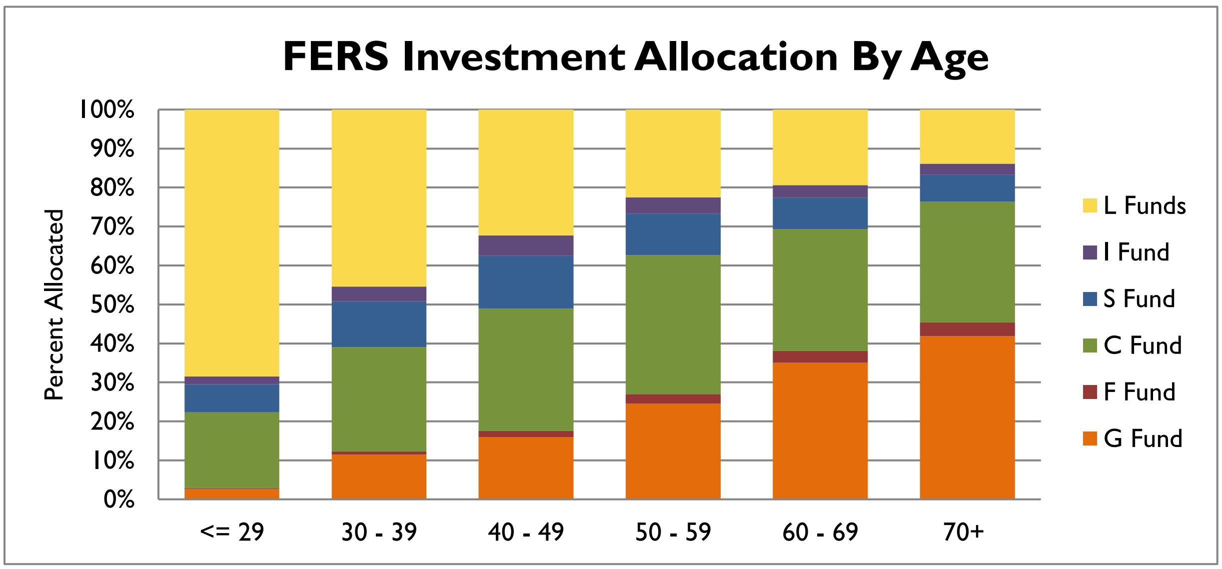
Investment Allocation

Until September 2015, contributions for automatically enrolled participants were defaulted into the Government Securities Investment (G) Fund. With the passage of the Smart Savings Act, Public Law 113-255, the default investment fund for new participants changed from the G Fund to an age-appropriate Lifecycle (L) Fund.

In Figure 6, we note that allocations to the G Fund increase with age; the youngest participants only hold 2.6% of their assets in the G Fund. This behavior is consistent with the expectation that participants tend to shift their investments toward the relative safety of guaranteed/income producing assets as they approach retirement age. This is also a significant improvement from 2014, when the youngest participants held 41.7% of their assets in the G Fund.

*The youngest participants who have the longest time horizon to reap the benefits of compounding returns have **2.6%** of their assets invested in the G Fund. This is a continual and significant decline from previous years.*

Figure 6



As noted in Table 4, the lowest-paid participants have approximately 33.6% allocated to the G fund; this contrasts with the highest paid, who allocated only 20.1% to the G Fund in 2023. All cohorts have decreased their investment considerably in the G Fund compared to 2022 investment allocations. Participants of all ages and salary quintiles increased the amount allocated to the C fund year over year, with higher paid participants allocating over 30%.

When examining L Fund allocations, the youngest age cohort had the highest level of utilization at 68.5%, which continues to increase each year. The oldest cohort has the lowest level of L Fund utilization at 13.9% which is still an increase from 2022. The increase in L Fund utilization for younger participants is likely influenced by the default investment changing from the G Fund to an age-appropriate L Fund in 2015, as well as the impact of ongoing communications regarding the benefits of utilizing the L Funds.

Table 4

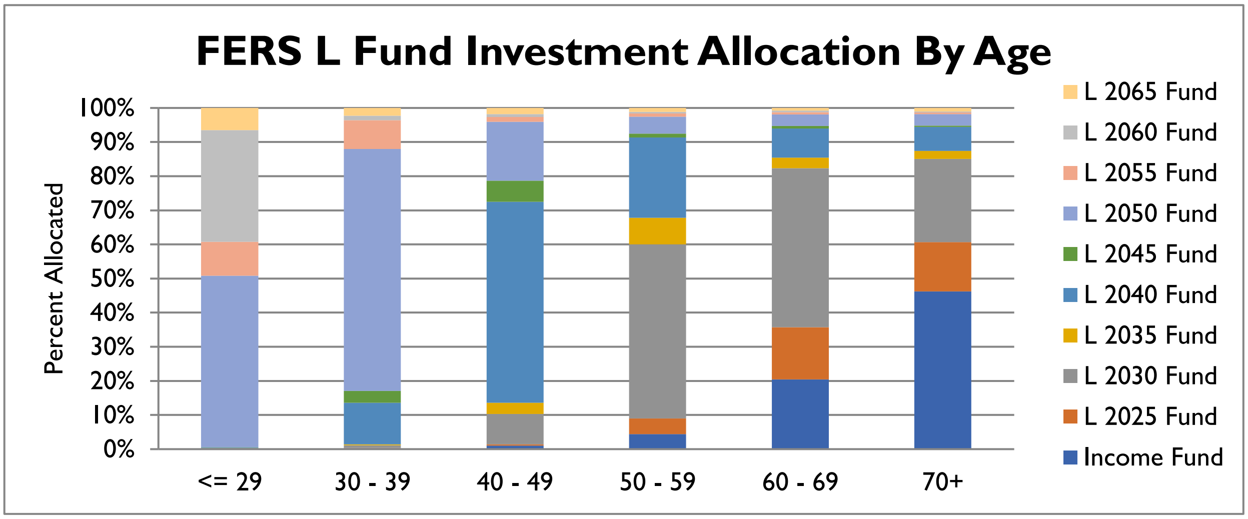
2023 Investment Allocations by Demographic Cohorts

	G Fund	F Fund	C Fund	S Fund	I Fund	L Funds
Age						
<= 29	2.6%	0.3%	19.4%	7.2%	2.0%	68.5%
30 – 39	11.5%	0.8%	26.8%	11.7%	3.8%	45.4%
40 – 49	16.0%	1.5%	31.4%	13.5%	5.2%	32.3%
50 – 59	24.5%	2.5%	35.6%	10.7%	4.2%	22.5%
60 – 69	35.0%	3.0%	31.3%	8.0%	3.2%	19.4%
70+	41.9%	3.5%	31.0%	6.9%	2.8%	13.9%
Salary Quintile						
Q1 Lowest Paid	33.6%	1.8%	22.8%	6.8%	2.6%	32.4%
Q2 Lower Paid	34.2%	1.8%	25.2%	8.1%	2.8%	28.1%
Q3 Mid-Range	31.8%	2.1%	30.3%	9.6%	3.4%	22.9%
Q4 Higher Paid	24.4%	1.9%	30.8%	11.5%	4.1%	27.4%
Q5 Highest Paid	20.1%	2.6%	35.9%	11.3%	4.6%	25.5%

As discussed earlier, TSP launched 6 additional L Funds and retired the L 2020 Fund in July 2020. These new L Funds added 5-year L Funds up to the L 2065 Fund. The L Funds' strategy is to invest in an appropriate mix of the G, F, C, S, and I Funds for a particular time horizon. The investment mix of each L Fund becomes more conservative as its target date approaches. Thus, the participant only needs to invest in one L Fund to achieve diversification among the core funds. As of December 31, 2023, 54% of accounts have invested in at least one L fund and 38% of accounts have their money solely in the L Funds.

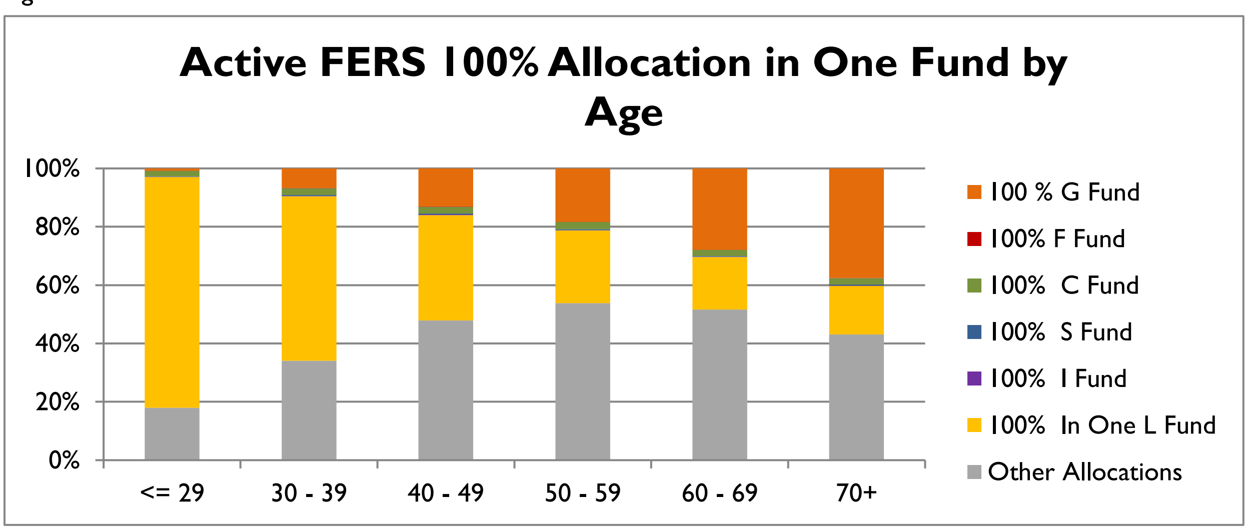
Of the participants utilizing the L Funds, the allocation is largely as we would expect, age cohorts use their age-appropriate L fund. For example, those in the age 29-and-under cohort were taking advantage only of L Funds 2050 or higher, while participants aged 70 and over are mostly in the L Income fund, L2025 fund and L2030 fund. The usage of the L Income Fund decreased in all cohorts year over year, showing that participants are gravitating away from the relatively safe investment mix of the L Income Fund and towards other funds that yield slightly higher returns.

Figure 7



As shown in Figure 8, the use of one L Fund is most common with the two youngest age cohorts – 79.1% for participants 29 and under and 56.3% for participants 30 to 39. The use of a single L Fund has been increasing each year among the younger cohorts. Most participants do not invest solely in one core fund but instead in multiple funds "Other Allocations" or an L fund. Among those who do invest solely in a core fund, the most popular choice is the G Fund. Investing solely in the G Fund is problematic for any age, as the G Fund is not guaranteed to keep up with inflation. If not invested in a single L Fund, participants are most likely allocating across multiple funds. See Figure 8.

Figure 8



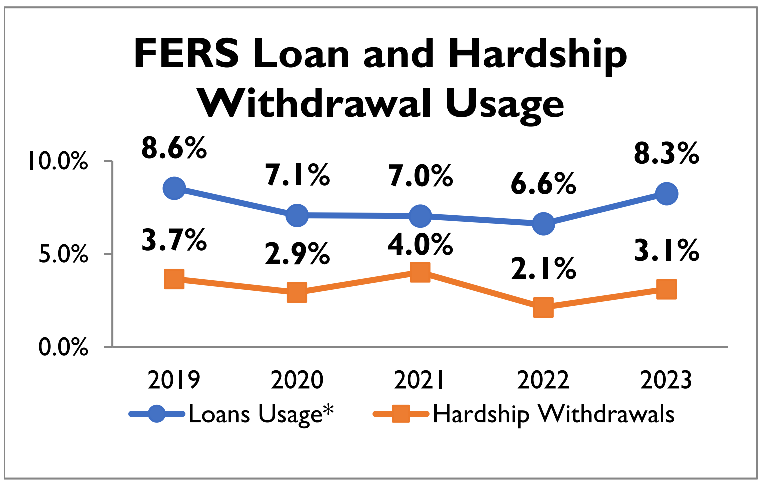
Since 2014, the most meaningful change has been in the younger age groups where there was an increase in the number solely invested in one L fund and a decrease in the percentage solely invested in the G fund. This was likely influenced by the change to an age-appropriate L fund as the default investment in 2015.

Loan and Hardship Withdrawal Usage

The TSP allows two types of loans – general purpose and residential. A general purpose loan has a repayment term of 1 to 5 years, while a residential loan for the purchase of a primary residence has a repayment term of 1 to 15 years. A change in policy was implemented on June 1, 2022, allowing participants to take out a second general purpose loan. Participants may only borrow their employee contributions, up to $50,000, and the minimum loan amount is $1,000.

Participants may take a hardship withdrawal if they have a financial need as the result of a recurring negative cash flow, medical expenses, a personal casualty loss, or legal expenses associated with a divorce. Participants may only withdraw their employee contributions, and the minimum withdrawal amount is $1,000, with a 10% early withdrawal penalty if the participant is younger than 59 ½.

Figure 9

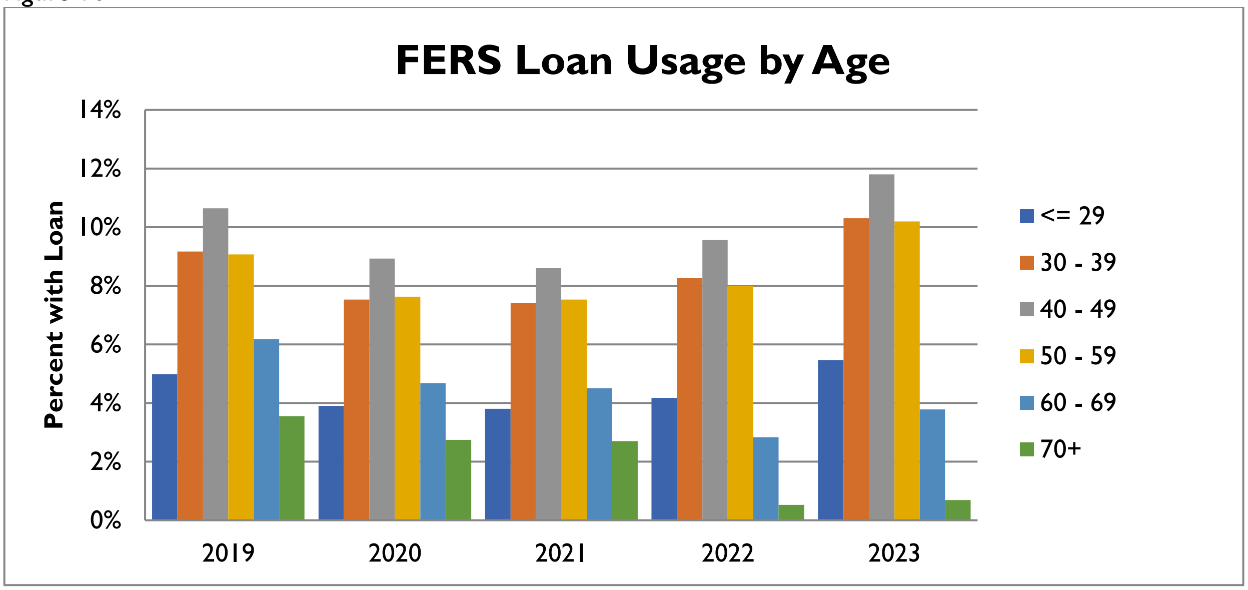


Loan usage increased year over year to 8.3%, which is close to the 8.6% rate we saw in 2019. The addition of the second general purpose loan could be a reason for the increase.

Hardship withdrawals have increased by 1% compared to 2022. 3.1% of participants taking hardship withdrawals is in line with the 5-year average.

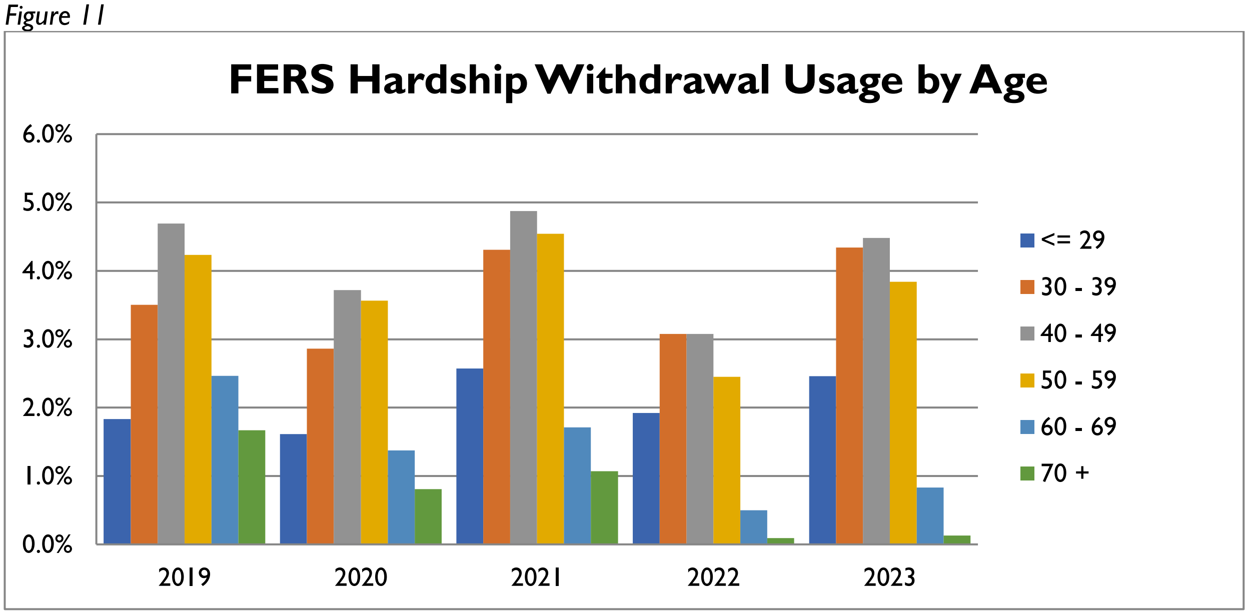
As seen in Figure 10, loan usage increased among all age groups. Usage remains the highest among the 40-49 age cohort, with 11.8% of the participants in this cohort having an active loan at the end of 2023. The 40-49 and 50-59 age groups had the largest increases in active loans year over year, increasing by 2.2%.

Figure 10



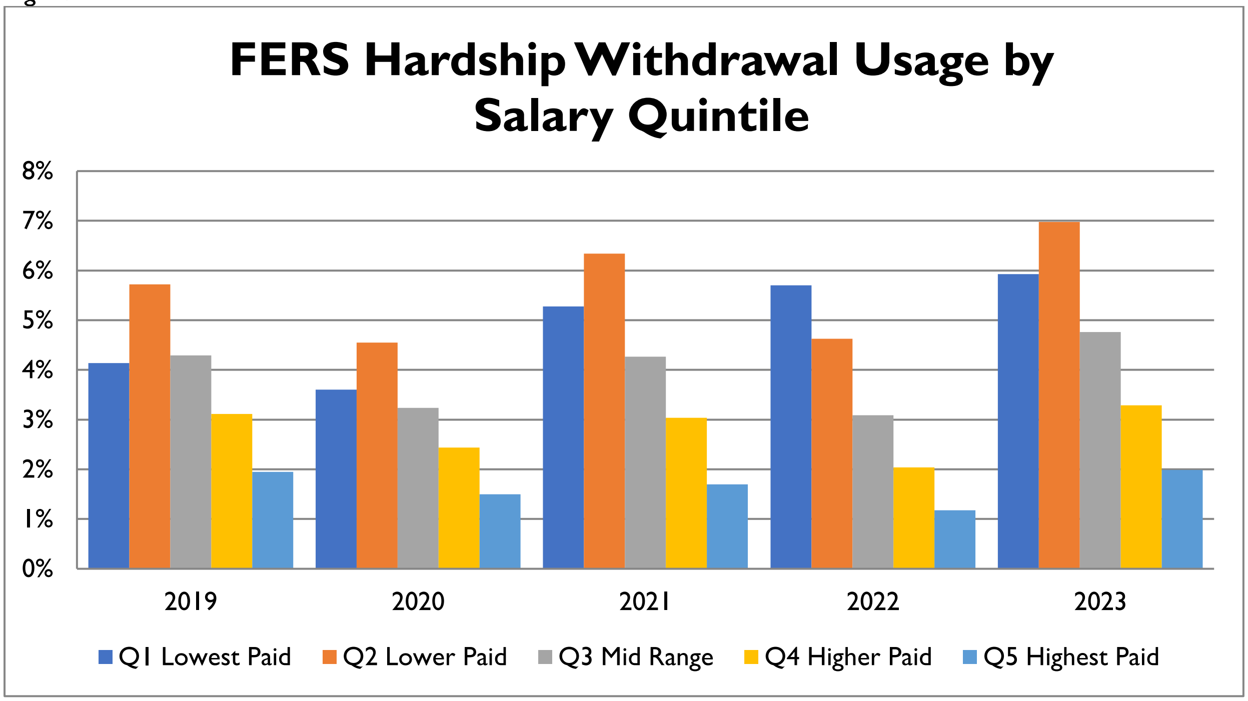
In Figure 11 we see that all age cohorts saw an increase in hardship withdrawals year over year. Over the last two years the 30-39 age group has moved from the 3rd highest user of hardship withdrawals to the 2nd highest, with a usage rate of 4.3%. The 40-49 age group has consistently stayed the top using cohort at 4.5% in 2023. Overall usage is slightly lower than the rates experienced in 2021.

Figure 11



In Figure 12 we see that hardship withdrawal usage continues a similar pattern from previous years. Since last year, the lowest paid group increased usage by 0.2% while the second lowest paid increased by 2.4%, bringing this group to the top group at a 7% usage rate. All salary groups have a lower hardship withdrawal usage rate than loan usage rate.

Figure 12



Summary

An analysis of TSP participant data from 2019 to 2023 reveals that the TSP participant trends changed slightly year over year but in general plan design is working effectively. In 2023, participation rates increased, deferral rates increased, and more participants were taking advantage of the life cycle funds than ever before. Looking at the participant behavior of those that joined the plan in 2023, we see that a high percentage are receiving their full match benefit, showing that auto-enrollment and plan design are driving high participation rates in age-appropriate funds. Loan usage and hardships withdrawals increased, with participants in the middle of their career having the highest rate.