

Defending the Chilean Social Security System

The economic crisis is having a significant impact on the financial markets. The fall in the price of shares has resulted in a sharp reduction in the pension funds of the affiliates of the Pension Fund Administrators (PFA) system because those companies invest part of the funds they administer in shares of national and foreign companies.

This has given rise to the questioning of the pensions system, generating doubts about the management of the funds by the PFAs, blaming them for the poor results.

Over the past year the titles of companies all around the world have dropped sharply. Chart Nr. 1 shows evolution of the leading stock indicators in Chile, Brazil, the United States and Japan this year.

The purpose of this paper is contributing to the debate, with arguments that explain the investment systems used by the PFAs in Chile and showing that the system's yield continues being positive.

Current Structure of the Chilean Social Security System

The pensions system in Chile was modified in 1981 from a pay-as-you-go system to an individual capitalization system, where each individual is the owner of its own funds, which are administered by a PFA so that they earn profits.

In 2002, Law Nr.19,795 modernized the system creating multiple funds. This mechanism permits individuals to freely choose the level of risk they want their social security investments exposed to. There are 5 alternatives, (represented by letters A, B, C, D y E) with different risk exposure and, therefore, different expected profitability.¹

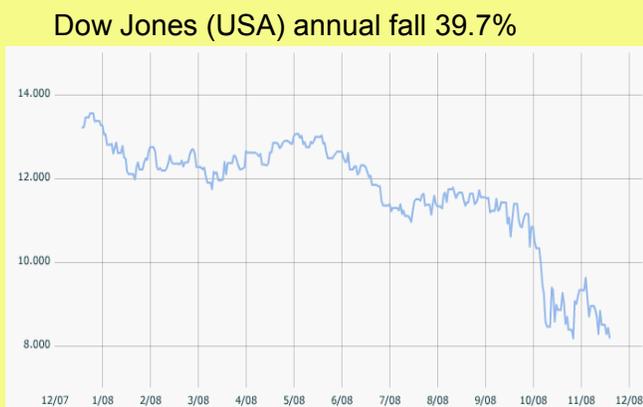
The riskiest fund, with the highest expected yield is fund A, whereas the safest one, with the lowest expected yield is fund E. Chart Nr. 2 shows the asset make-up of each one of the funds. Investment in variable income instruments has a greater expected yield, greater

The results obtained until now by the PFAs continue being positive since their creation and the results of each fund respond to the investment profile chosen by the affiliate. Recent negative yields are mainly due to a global economic crisis, whose principal impact has been the fall in the price of shares, practically all around the world.

In this Issue:

- **Defending the Chilean Security System**
- **Public Utility Statement: Concealed Expropriation**

Chart Nr. 1: Annual evolution of the principal stock indicators in selected countries



Source: Celfin Capital

associated risk is expected and it has a higher risk than investment in fixed rate instruments.

Upon analyzing the performance of funds along time (see Chart Nr. 3, annual average), we can see that they have actually behaved as expected.

Fund A has accumulated the highest average yield since the multi-funds were created, whereas Fund E has obtained the lowest yield.

But although Fund A has obtained the highest accumulated yield, it is also the fund with the greatest risk exposure and that is why

it has been affected most by the financial crisis (Chart N. 3, latest 12 months).

In other words, the results obtained by each fund and; therefore by the affiliates, are consistent with the expected long-term results and in times of crisis.

Impact on Pensions

There is tendency to think that the impacts seen at present in the fall in the individ-

Table Nr.2: Distribution of the Assets Portfolio of Each Fund

Fondo de pensiones	Renta Fija	Renta Variable	Forwards	Total
Tipo A	29,8%	83,4%	-13,3%	100%
Tipo B	50,0%	57,9%	-8,0%	100%
Tipo C	67,8%	35,8%	-3,7%	100%
Tipo D	84,7%	16,6%	-1,4%	100%
Tipo E	99,4%	0,8%	-0,3%	100%

Note: Investment in variable income instruments has a higher expected yield and greater associated risk than investment in fixed rated instruments.
Source: PFA Commission

who do not request having their savings in a determined fund are assigned depending on their age. Individuals under 36 years old are allocated to Fund B, males between 36 and 55 years old and women between 36 y 50 years old are allocated to Fund C, whereas all those that have less than 10 years to go until retiring are allocated to Fund D.

ual accounts will result in similar falls in future pensions, but that is a mistake.

First, we must consider that the amount of the pension is determined on the basis of the sum accumulated in the individual account at the time of retiring and not before.

The economic activity shows positive (growth booms) and negative (recessions) fluctuations in its trend. During positive growth experiences, the most risky funds accumulate the greatest yields, whereas during a crisis they accumulate the greatest losses. As in the long-term the trend is positive, variable income normally accumulates greater yields.

Therefore, we recommend individuals, that as they get older to change their savings to funds with lower risk exposure, because in the event of a negative shock, the higher risk assets will be affected most. If an individual is closer to retiring, a fall in his accumulated stock has a more negative consequence on his/her pension than if that same individual has a long time to go before retiring and has time for the economy to recover and his/her account to accumulate positive yields.

The law was designed to protect individuals from these fluctuations, because it establishes that individuals

Those affiliates whose age group change, according to the age ranges indicated above, and who do not express any preference for any of the five funds; by law, the PFA must change them gradually, 20% per year, to the fund that corresponds to their age group. Therefore, with 5 drawings, their entire accumulated savings will have been transferred to a lower risk fund.

In the case of affiliates that having chosen Fund A are within 10 years or less from the legal age to retire, the law provides that the relevant PFA must change the affiliate to Fund B.

Therefore, all of the affiliates in Fund A (the one that has lost most with the crisis) have more than 10 years to go before retiring for old age, so they have plenty of time for the economy to recover and accumulate yield in their

Table Nr.3: Yield of each Pension Fund

Fondo de pensiones	Promedio Anual*	Ultimos 12 meses
Tipo A	4,1%	-45,1%
Tipo B	3,4%	-34,2%
Tipo C	3,6%	-22,5%
Tipo D	3,6%	-12,1%
Tipo E	2,8%	-0,9%

* Since the creation of the multi-funds in September 2002.
Source: PFA Commission

Chart Nr. 4: Evolution of the S&P 500 Index



Source: Google Finance

account before retiring.

Figures of the PFA Association show that 99% of the affiliates in Fund B (the second most harshly hit by the crisis), will reach retirement age in over 5 years time; therefore, they also have time for the economy to recover.

The PFA Commission permits us to analyze where the savings of individuals near retirement age are. We can see that 84% of women that will retire for old age within less than 5 years are in Funds D and E, which are the ones that have been least affected by the crisis. This figure is 78% for men.²

This information shows that although there are many persons who have a smaller accumulated stock in their individual accounts, the effects on their pensions will not be of the same magnitude and they have time to accumulate yield before they retire.

Variable Income is Evaluated in the Long Term

Finally, it is worth explaining an important point about the investment system used by the

PFAs, which is the appropriate period to assess the investment's yield.

The purpose of the PFAs is making its affiliates' individual accounts grow so that at the time of retiring they can obtain a higher pension.

To achieve this, the PFAs may invest in fixed or variable income instruments. As we have already stated, variable income investment is riskier but it generates higher yield.

The PFAs investment portfolio is highly regulated in the law, restricting their investment possibilities. Therefore, if we want to compare PFA yields versus those of the financial industry in general, we must consider the additional restrictions that PFAs are subject to.

Chart Nr. 4 shows the evolution of the principal stock index of the United States for a period of almost 40 years, which is similar to social security savings. We can see that in crisis periods, variable income is harshly hit, but that in the long-term it recovers and obtains highly positive yields.

Thus, there is little point in analyzing the yield of investment in variable income instruments in the midst of a crisis, but rather the analysis must be conducted in the long term, in a period that includes all the favorable impacts of the economic crises as well as the positive effects of positive growth booms. This permits us to see that investment in variable income is

appropriate for a future horizon, like retirement after 40 years of work.

If due to the negative yields that we currently observe in variable income, we listen to the voices that are trying to drive PFA investment towards greater fixed income investment—which is available to those individuals that choose that option—we will be denying many individuals the possibility of obtaining higher pensions in the future. The yield of variable income must be evaluated in the long term, which is the period, which PFAs invest for.

Conclusion

The results obtained by PFAs to date continue being positive since their creation, and the results of each fund are in accordance with the investment profile selected by the affiliate. The recent negative yields are mainly due to a global economic crisis, whose chief impact has been a reduction in the price of shares practically all around the world.

The great majority of the individuals who are near to the retiring age have their savings in Funds D and E, which are the least risky and with the lowest expected yield, which have been affected least by the crisis. All individuals who have their savings in Fund A have at least 10 years more to go before retiring; therefore, they have plenty of time for their individual accounts to recover.

Finally, the yield of variable income investment has shown to be superior to that of fixed income investment in the long term.

If we limit individuals to choose exclusively between low-risk options for their social security savings, we will be restricting their freedom and probably denying them the option of obtaining higher pensions at the end of the work life.

If due to the negative yields that we currently observe in variable income, we listen to the voices that are trying to drive PFA investment towards greater fixed income investment, which is available to those individuals that choose that option, we will deny the possibility many individuals the possibility of obtaining higher pensions in the future. The yield of variable income must be evaluated in the long term, which is the period for which PFAs invest.

¹ Financial theory assumes a positive relationship between yield and risk.

² This exercise was conducted considering women between 55 and 60 years old, and men between 60 and 65.