

Submission to the Financial System Inquiry

Re: Section 4 *Superannuation* and Section 8 *Retirement Income* of the Interim Report

1. Summary

This submission focusses on issues in the retirement phase of superannuation, specifically on the way the superannuation framework interacts with investment and divestment strategies. The main points of this submission are:

- a) There is no agreed philosophy of superannuation, serious misunderstanding is widespread, and legislative risk is high. This has created a retirement system which is unnecessarily complex, is poorly understood and often produces sub-optimal results.
- b) The Interim Report overstates the importance of fees in superannuation, and it fails to identify what really matters to the investor. The important parameters are: returns after fees, tax and inflation; proper risk analysis; and other less quantifiable characteristics of the fund.
- c) Longevity risk is the risk of drawing down too much capital during one's retirement, not the risk of living too long. It is best managed by maintaining sustainable growth investments throughout retirement – a far better solution than annuities or lifecycle funds which are misconceived. Such products should never be mandatory. Nor is 'income efficiency' a meaningful way of characterising investments from the retiree's perspective.
- d) Numerical modelling shows that minimum pension withdrawals have created a major systemic failing within superannuation. They act unfairly to shrink capital, reduce pensions, exacerbate longevity risk and increase reliance on the age pension. This problem affects any retiree whose pension account earns low to moderate returns, which probably includes many 'balanced' funds.
- e) The withdrawal limits should be removed, and replaced with a better mechanism for limiting superannuation balances. This requires a complete rethink of superannuation – based on a better appreciation of what matters to the investor - in both the accumulation and retirement phases, and care must be taken to protect existing account balances and conditions by appropriate grandfathering (but without the withdrawal limits).

2. Legislative risk

This section responds to the following observation:

P2-118 Superannuation policy settings lack stability, which adds to costs and reduces long-term confidence and trust in the system.

The Interim Report quite rightly recognises that superannuation lacks an underlying philosophy, and that frequent rule changes are a serious problem.

One part of the problem is that government typically does not understand the purpose of tax concessions in superannuation, which is to provide

- compensation for tying up money for decades
- compensation for sometimes being forced to accept worse investment results in superannuation than could be achieved outside it (paying down a mortgage for example)
- an incentive to contribute
- a boost to earnings

The tax concessions are not there as a honey pot which can be raided whenever a budget needs propping up.

The tax concessions are often seen as a cost to be reduced; but that view subverts the purposes listed above, and threatens to undermine the entire system.

It is often hard to see the point of the many rules that have been built up around superannuation. It is, frankly, embarrassing for two trustees of an SMSF to have to write to themselves as trustees instructing themselves to do what they had just decided as individuals over dinner. It is strange too, that the law requires trustees to take more care when investing on behalf of themselves than when investing directly on their own account.

Some rules grow from misconceptions. For example, the Interim Report canvasses the notion of making investing in annuities compulsory for superannuation funds (p4-25), yet some simple calculations (see Section 5 of this submission) show this can be wealth destroying.

It has long been known that superannuation rules - particularly the tight nexus with salaries and the constraints on contributions - discriminate against people with a fragmented employment history or an interrupted career. This includes most women, many people on low incomes and most people who are retrenched and cannot find suitable employment. This issue needs to be dealt with. The superannuation system desperately needs clearly articulated philosophy and objectives, against which any of the rules can be tested, at least in logic if not in law.

3. Fees

This section responds to the following questions/observations in the Interim Report:

- P2-99 *There is little evidence of strong fee-based competition in the superannuation sector, and operating costs and fees appear high by international standards. This indicates there is scope for greater efficiencies in the superannuation system.*
- P 2-114 *The Inquiry seeks further information on the following areas ... Does or will My Super provide sufficient competitive pressures to ensure future economies of scale will be reflected in higher after-fee returns?*
- P2-126 *The Inquiry seeks further information on the following areas: ... high operating expenses of many SMSFs ... limitations on establishment of SMSFs.*
- P4-32 *The Inquiry seeks further information on the following areas: ... What are some ways to assess and compare retirement products?*

3.1. The importance, or otherwise, of fees

Fees of large superannuation funds, or costs of SMSFs, generate a lot of discussion both in the FSI Report and in the community generally. There is a widespread belief that if fees or costs can be reduced then returns after fees will improve by the same amount, and simplistic calculations show this has a large affect. Hence statements like the following from p2-100 of the Interim Report: *'The Super System Review found that reducing fees by around 40 percent ...would increase ... superannuation balance at retirement by approximately \$40,000'.*

Similar beliefs abound in manufacturing industry. One often hears companies promising to increase profits by reducing manufacturing costs, yet the promise frequently fails to materialize because of scenarios like this:

- Adoption of inferior raw materials
- ⇒ Lower costs, but poorer quality
- ⇒ Price reductions and loss of sales
- ⇒ Profit collapse

In the superannuation context, reducing fees can either improve or reduce a fund's returns after fees, depending on how the fee reduction is accomplished. This simple observation shows that fees *per se* are not relevant to the investor (any more than manufacturing costs are relevant to the consumer who buys a product). They are not necessarily a guide to performance and are basically an internal management concern of the fund.

Fees do matter, though, but only to a limited extent and only when considered in the context of other significant parameters. This is more in the province of modelling the performance of various investment strategies than in trying to modify the behaviour of a particular fund.

The Interim Report's use of fees as the primary consideration when considering such topics as efficiency, competition, economies of scale, returns, regulation and cost effectiveness is therefore inappropriate and bound to lead to inconclusive results (which it does).

The *My Super* concept of low-fee default superannuation funds is similarly flawed and unlikely to give the results expected. An alternative concept is suggested below.

On p2-126, the report asks for feedback on the high operating costs of many SMSFs, especially young ones (p2-125). A beginner has to start somewhere and therefore a high cost relative to earnings, or even negative earnings, should be of no concern in the early years. Provided the trustees learn from the experience their long term returns will benefit. Regulators should not attempt to control an internal investment management issue like fees. On the other hand, where an adviser has pushed an investor into a situation with inappropriately high fees, that is a matter for enforcing and if necessary strengthening FOFA.

3.2. What really matters?

Despite the repeated emphasis on the importance of fees, the Interim Report does note '*superannuation funds should be judged on their after fee return for a given risk profile*' (p2-101). This goes only part of the way to a correct statement of how to judge a fund's performance.

The following are of critical importance to a superannuation investor, and should form the basis of any assessment:

- **Return after fees, tax and inflation.** It is a matter of simple arithmetic that the real value of an investment after a period of years is the cumulative effect of each year's return after fees, tax and inflation. Tax and inflation are critical costs and it is a serious mistake to ignore them. For example, a 5% return on a fixed interest investment might seem reasonable, but after applying a 1.5% management fee, 15% earning tax and 3% inflation the return is nothing.

Note that 'return' encompasses both capital growth and dividends or interest. This is why minimum pension withdrawals can be a disaster (as will be shown in Section 5): they force a negative component of capital growth, which can destroy an otherwise sound investment.

- **A proper consideration of risk.** The quote above refers to the 'risk profile' of the investor, but this is a crude and misleading measure of tolerance to volatility, not risk. It is determined from a simplistic questionnaire and is wide open to manipulation and abuse.

Proper consideration of risk in any scenario involves assessing the most likely and worst case outcomes, and developing strategies to enhance the former and ameliorate the latter.

- **Access to competent and honest advice.** Most large funds offer some form of advice; SMSFs must obtain advice externally. Incompetent or misleading advice can lead an investor into poor asset selection with devastating effects on long term returns.
- **Features like ease of interaction and flexibility.** These may be hard to quantify but can still have a significant financial effect.

This simple and obvious list of criteria serves to emphasise just how inadequate it is to consider fees or return after fees in isolation.

The Interim Report makes several references to a short paper issued by the Sqam Lake group (Ref 24, p2-101) but there is no mention of Sqam Lake's excellent suggestion for describing funds: a simple standardized 'disclosure label' which shows fees, expected returns (average and 5th, 50th and 90th percentiles) over ten years, plus annual volatility. For many purposes the disclosure label deals effectively with the first two dot points above (provided returns are net of taxes, fees and inflation).

Requiring large funds to provide such a disclosure label for each investment option would help foster competition between funds which is based on parameters meaningful to investors. Applying the label to each investment option within a fund would make it easier for the investor to compare different options, for example by making it clear how hard it is for a cash-type investment to outperform equities over the medium term. This would help counter the prevailing nonsense that volatility equals risk.

If funds focus on improving the minimum likely and average return after fees, tax and inflation, and they are assessed on this basis, then there will be no place for the My Super concept. Instead, the nature of a default superannuation fund needs to be carefully considered.

The fact that an investor chooses not to engage in the detailed management of his/her superannuation is no reason to offer an inferior product. In fact lack of engagement in most cases is a responsible decision – who services their own car these days?

A default fund should be expected to offer efficient interaction (especially for employers), few if any options and probably only limited advice; on the other hand, its internal governance should protect the interests of investors and ensure a high level of performance against the rest of the dot points above.

4. Longevity risk and annuities

This section responds to the following questions/observations in the Interim Report:

- P 4-8 *The retirement phase of superannuation is underdeveloped and does not meet the risk management needs of many retirees.*
- P4-25 *The Inquiry would value views on the costs, benefits and trade-offs of the following policy options or other alternatives: ... Provide policy initiatives to encourage retirees to purchase retirement income products that help to manage longevity and other risks. ... Mandate the use of particular retirement income products (in full or in part or for later stages in retirement).*
- P4-25 *There are regulatory and other policy impediments to developing income products with risk management features that could benefit retirees.*
- P4-32 *“The Inquiry seeks further information on the following areas: ... What are some appropriate ways to assess and compare retirement income products? Is ‘income efficiency’ a useful measure?”*

4.1. Longevity risk

‘Longevity risk’ refers to running out of money before you die, but it is a misnomer. One does not run out of money by living too long – many people die wealthy - one runs out by depleting capital too quickly. A more accurate term is ‘overspending risk’.

Thus the statement ‘*Longevity risk cannot be eliminated*’ (p 4-29) seems quite silly if it is translated as ‘*You cannot eliminate overspending risk*’. Simple common sense responds: spend less, invest better, start with more. These are the keys to managing this risk.

Throughout Sections 4 and 8 of the Interim Report it is repeatedly implied that only a lifetime annuity, or something similar, can protect against longevity risk. But this is nonsense: any investment will last indefinitely provided that the amount withdrawn, averaged over the medium term, is less than the return after fees, taxes and inflation. With a little care, one can also draw down some capital to boost income, while keeping the lifetime of the investment well beyond any plausible human lifetime.

Simply not going broke is a fairly miserable objective. The retiree’s needs are best suited by a pension income that (a) is as high as possible on retirement, and (b) continues to rise in real terms. The latter is particularly important to someone who retires with a relatively low superannuation balance.

A higher pension income provides more enjoyment, better ability to cope with life’s unpredictable problems, and the possibility of a significantly longer life through being able to afford better healthcare. The community’s interests are also advanced because the retiree has more to spend thus stimulating the economy, and is less likely ever to need the age pension.

Therefore superannuation should focus on achieving sustainably high returns after fees, tax and inflation throughout the accumulation phase, and then on through the pension phase.

This statement is counter to the attitude of the Interim Report and that of some commentators, but 'sustainable' implies that funds should not gamble, and good investments will always recover from temporary setbacks. So, sustainable growth does not imply an increased risk of irreversibly losing funds, although it does not preclude significant capital volatility. Where volatility is a concern, returns can be smoothed by averaging over, say, a five year period without affecting long term performance.

Annuities and lifecycle funds seek to remove volatility in the retirement phase by retreating to relatively stable low-growth investments at the expense of a lower long term income and, as stated above, that is a miserable objective to the long term detriment of the investor.

4.2. Annuities

Annuities are seductive because they promise certainty and the avoidance of 'longevity risk' (overspending risk), but there are substantial costs. Most obvious is the loss of access to capital, which hobbles one's ability to deal with the major uncertainties of life, especially in old age. The lack of access to capital is an enormous opportunity cost and is considered unacceptable by many people. Less obvious is the very poor investment return.

Quite straightforward strategies will produce a better long term return than annuities, while retaining the flexibility and access to capital so necessary for dealing with life's uncertainties. There is a simple answer to the 'academic puzzle' (p 4-16) of the unpopularity of annuities: there is no puzzle.

Annuities are by no means risk-free investments. Some risks associated with life annuities are well known: as mentioned above, lack of access to capital in order to deal with changing circumstances risks major opportunity costs, which could include premature death; investment returns for those with less than the average lifespan can be very poor (to -100%); a standard annuity contributes nothing to the estate; whatever means is used to index an annuity might not relate to the way in which costs of the retiree escalate during life.

Less well known is that annuities do not even protect against sequencing risk – the risk that a major economic slump may decrease the value of retirement savings shortly after retiring. According to Ref 16 (p4-10) a 65 year old single man investing \$1,000,000 in 2006 would receive a nominal (not indexed) income of \$7,180. That is approximately \$8,700 in 2014 dollars, 65% better than what is currently available. A 65% difference in income for 20 or more years of retirement is a huge difference. Choosing when to buy an annuity is a gamble, and the results are permanent.

The Interim Report asks (p4-25) whether ‘... *particular retirement products should be mandated...*’ which clearly is a reference to annuities, lifecycle funds or similar products. The answer has to be ‘no’ for two reasons:

- The government should not dictate investment strategy. That is the responsibility of trustees.
- Annuities have many associated risks and, together with lifecycle funds, they have an inappropriate investment philosophy to deal with longevity risk, as outlined in the previous section.

4.3. Income efficiency

The Interim Report asks (p4-32) whether income efficiency is useful measure with which to compare retirement products. Income efficiency is defined on p 4-10 as ‘*the expected present value of [retirement] income as a percentage of the purchase price of the product*’ but there is more to the definition than this.

Mathematical details can be found in Ref 16, where Income Efficiency is called ‘Money’s Worth’. Importantly, the calculation extends for the lifetime of the investor so calculating an average weighted by the life expectancy distribution is essential. Ref 16 also extends the definition to cover the life expectancy of the surviving spouse, where the annuity partly or wholly reverts to him/her. The calculation for an investment (whether an annuity or not) which has a residual cash value on the death of the investor should include the residual value as a final income payment, which would go to the surviving spouse or estate.

Income Efficiency is not efficiency in the normal sense of the word – performance as a percentage of some theoretical limit – and it is a term laden with emotional value. Most people would find it hard to resist an advisor who said one investment was more Income Efficient than another. Yet the comparison may well be meaningless.

Income Efficiency is determined from a discounted cash flow (DCF) calculation, and they are notoriously sensitive to assumptions – especially with regard to the discount rate – which are often not disclosed.

A good example of the way Income Efficiency can be misleading (I am not suggesting that was the intention) is the following from p 4-10:

‘A lifetime annuity has an estimated income efficiency of 76 percent for an average 65 year old male ...¹⁶ The income efficiency for an account based pension that is drawn down at the minimum rate for a 65 year old male is around 70 percent¹⁷.’

This appears to show that the annuity is the better investment, but

- The annuity calculation was done using 2006 data, using a discount factor based on forward interest rates - relevant to the annuity supplier but not to the retiree who will be more concerned with CPI, AWOTE or possibly escalating medical costs.

- Annuity payments were not indexed. An account-based pension often is effectively indexed because of its exposure to growth assets.
- The reference for the account based pension is not readily accessible for comparison.
- It is not mentioned that provided the allocated pension is invested in a strongly growing asset, such as a share portfolio, it is possible to substantially outperform the annuity and to avoid running foul of the minimum withdrawal limits (see Section 5 of this submission).

By trying to condense the income sequence into a single number, the Income Efficiency hides a lot of important detail which matters if investments other than annuities are considered (as shown in Section 5).

A life annuity can be described by a single number which is much more meaningful to the investor: the initial income for a given investment, which can then be assessed in combination with the conditions on the annuity (whether indexed, reversionary, etc).

In expert hands Income Efficiency is no doubt a useful measure, but as a tool to describe and compare funds to the ordinary investor, it is far too obscure.

5. Modelling the effects of minimum pension withdrawals

This section responds to the following questions/observations:

P4-8 *The retirement phase is underdeveloped and does not meet the risk management needs of many retirees.*

It also provides quantitative support for many of the points raised earlier.

The modelling described below show that unless a fund earns more than about 9% after fees in the pension phase, the minimum pension withdrawal limits will force too fast a depletion of capital (overspending) which prevents the fund from being able to provide a constant real income throughout retirement.

5.1. Assumptions

The assumptions used in this analysis are unremarkable at the present time. Although it is an obvious oversimplification to assume a constant inflation rate for decades in the future, the general nature of the conclusions drawn is not sensitive to this. A higher inflation rate will exacerbate the real rate of capital depletion.

Item	Assumption	Rationale
Age range	Simulation starts at 65, goes to 100 unless stated otherwise.	Few people will live beyond 100.
Annuity	Lifetime annuity for 65 year old man; pays 4%, inflation adjusted	Currently available terms
Fixed interest	5% return	Matches the initial withdrawal limit
Shares	Capital growth 6%; grossed up dividend 4%; trading costs ignored	Approximately represents long term expectations of a portfolio of Australian shares
Tax outside super	Includes CGT, assuming shares bought at age 65; current tax scales indexed to inflation.	Current income tax scales are assumed to be indexed to inflation
Inflation	3%	Typical of recent years
Strategy	Aim for constant real income to age 100, subject to min pension limits	A reasonable goal
Fees	Large fund 1.2%; SMSF 0.5%; outside super 0.1%	Average for large funds (p 2-102); Costs for SMSF and outside super based on actual costs of managing two similar portfolios.
Age pension	Parameters are indexed to inflation. In particular, the assets test maximum is \$764,000 for a single male homeowner.	Ignores current debate about which particular index should be used.

The calculations were performed in Excel, using a yearly time-step. An initial value is chosen for the desired constant real income, and the balance at the exhaustion age is calculated. Actual income for any year is the greater of the desired income and the withdrawal limit. The initial value is then adjusted using the *Goal Seek* function to make the balance at exhaustion \$1. (There is no unique solution for a final balance of exactly zero).

5.2. Minimum pension drawdowns with fixed-interest investment

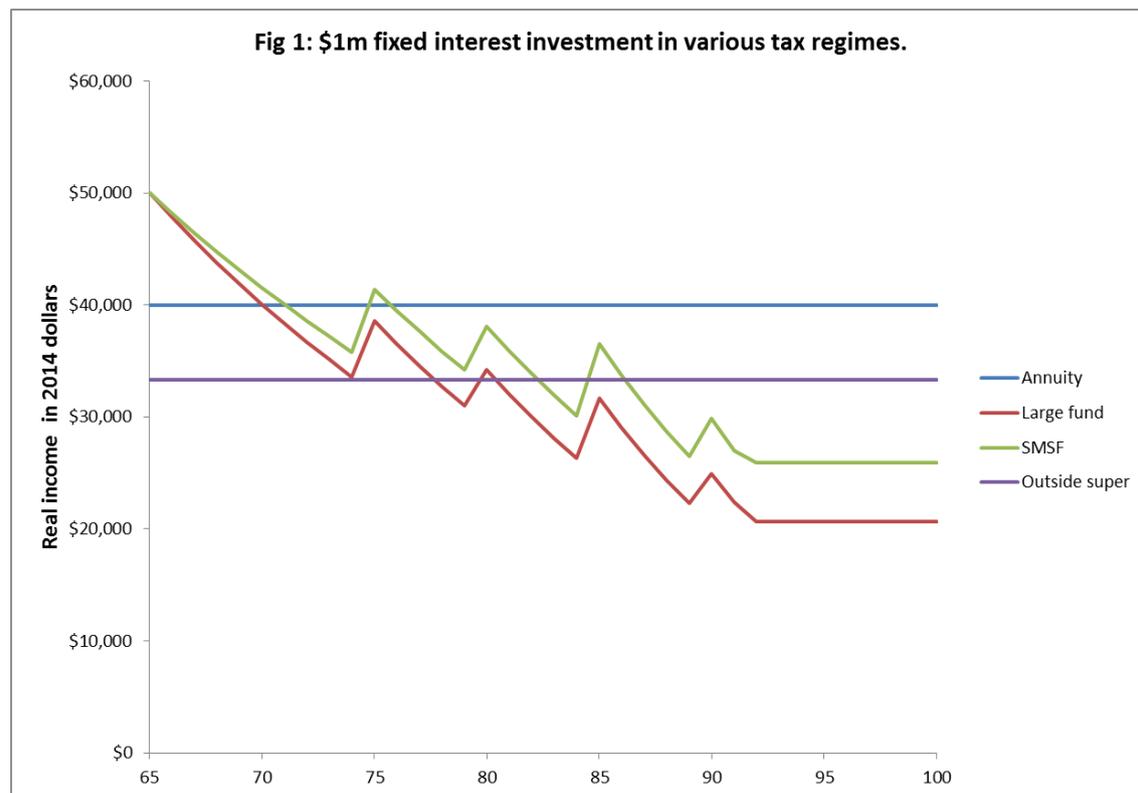


Fig 1 shows the annual inflation-adjusted income received from investing \$1,000,000 in a fixed interest investment paying 5% when withdrawals are calculated to exhaust the fund at age 100. Income from a 4% indexed annuity is shown for reference. For this particular set of parameters, the annuity provides the best long term return, although this calculation does not assess the opportunity cost of tying the capital up indefinitely.

Investing the money outside the superannuation system, and paying income tax, provides the next best long term income, although the income in the first decade is lower than the other options.

When this investment is made within superannuation, minimum withdrawal limits cause the real income to roughly halve by age 90. They also create quite an erratic income which may be tricky to manage. The effect of higher fees in the large fund than in the SMSF is significant, but less important.

5.3. Minimum pension drawdown with shares investment

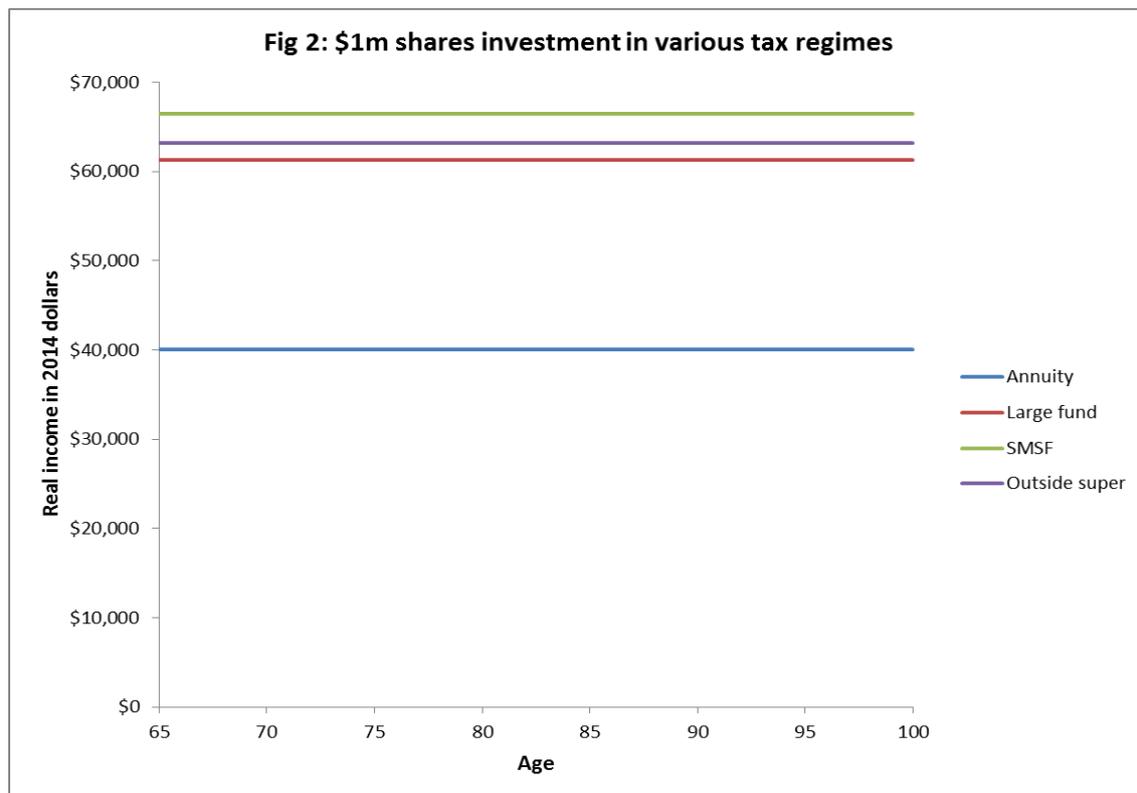


Fig 2 shows the results of investing in shares rather than fixed interest, given the assumed values of the parameters. Investment within superannuation or outside it provides a constant real income until age 100 with no interference from withdrawal limits.

Regardless of the tax regime, the share investment outperforms the annuity by a large margin. This margin provides a buffer against the volatility from which annuities are supposed to protect the investor, without the consequences of losing access to capital.

The relative effect of superannuation fees has narrowed compared to Fig 1, both absolutely and as a percentage of income. Therefore arguments along the lines of 'Fees cost the retiree \$x per year' should be taken with a grain of salt, unless carefully documented and placed in context. As pointed out earlier it does not follow that if a particular fund reduces its fees then returns after fees, taxes and inflation will improve.

The curves for superannuation pensions in Figs 1 and 2 both scale in proportion to the initial investment. Thus if the initial investment were \$500,000 income at any age would halve also. Furthermore, because there is no tax on the superannuation pensions, there is no distinction between the capital growth and dividend portions of income. This simplifies modelling because only the total return of the fund after fees needs to be considered.

5.4. Effect of returns after fees

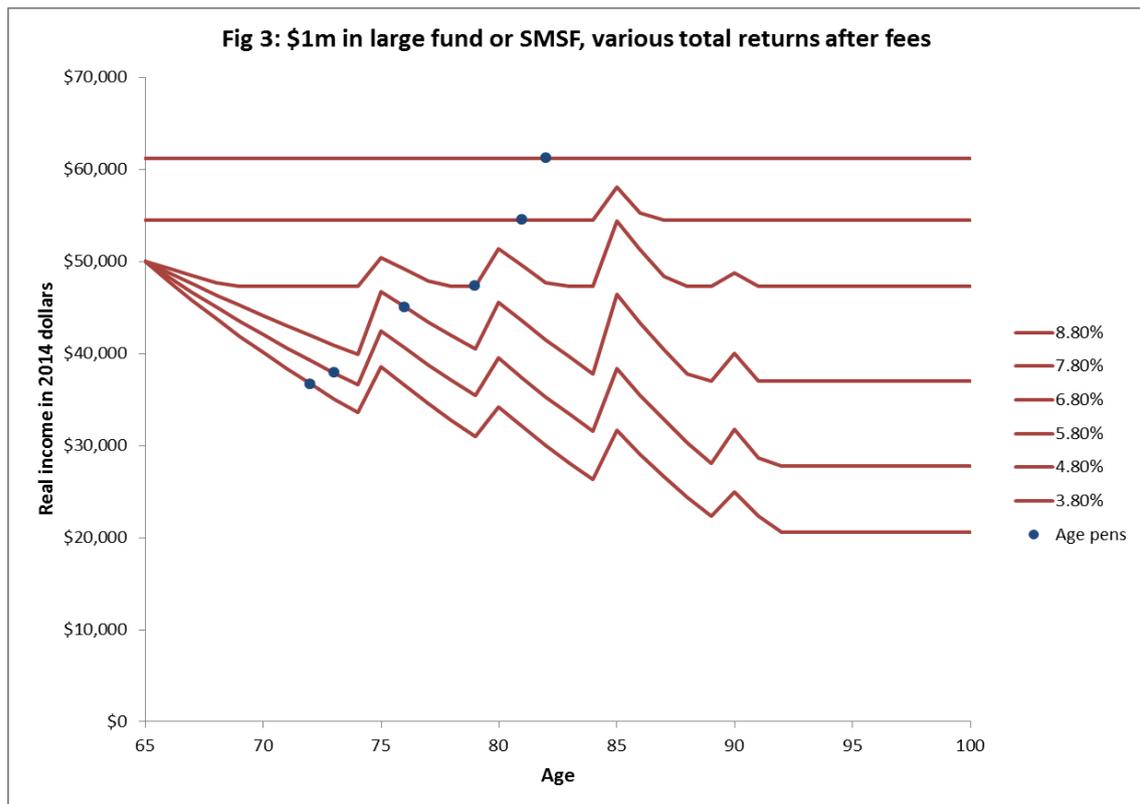
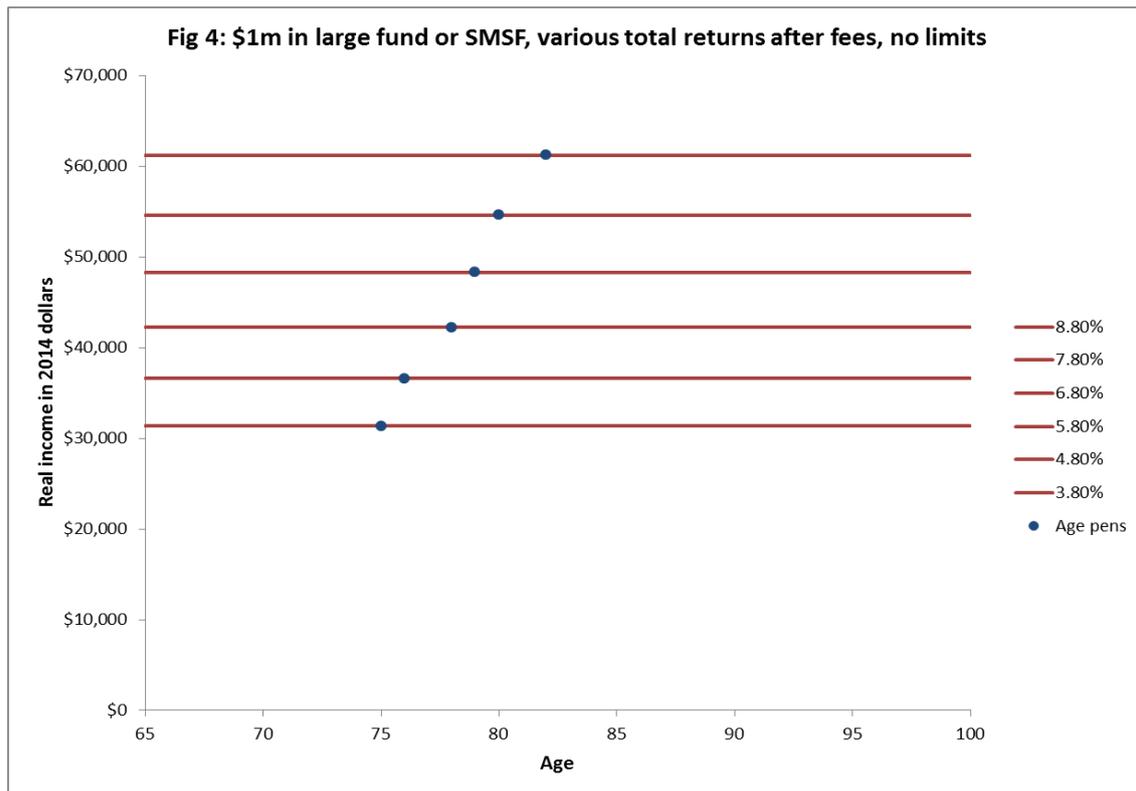


Fig 3 shows the income curves for pensions within a large fund or an SMSF, for various total returns after fees. The 3.8% and 8.8% curves are the large fund curves in the previous graphs. The blue dots show the age at which a part age pension becomes available, as assets go below the asset test limit (single male homeowner).

If there were no minimum pension withdrawal limits, the curves of Fig 3 would be as shown in Fig 4. As with Figs 1 & 2, both diagrams scale in proportion to the initial investment, except the blue dots which would shift to higher ages if the initial investment were higher.



Figs 3 and 4 are truly disturbing. They show that the minimum draw-down rules gratuitously and seriously damage the ability of the superannuation fund to pay a consistent pension unless the fund return after fees exceeds about 9%. The limits make the pension more erratic and therefore harder to manage, while at the same time substantially reducing the pension in the later years.

Furthermore, in the case of a retiree with no other income or assessable assets, the limits bring forward the age at which the retiree becomes entitled to a partial age pension – exactly the opposite of what superannuation pensions are supposed to achieve. This does not imply a problem with the age pension, which will make an important contribution to total income in many cases; it is a problem with the superannuation withdrawal limits.

The extent to which each retiree would like to balance present income against long term retention of capital and to make the best use of the age pension (if available) is a personal decision depending on many factors. Thus some would be happy to exhaust their capital at an earlier age than 100, as assumed here, while some would want to maintain a lower income in the early years, to protect their longer term position. There is no general purpose optimum strategy.

The withdrawal limits add another layer of complexity and systemic volatility to the task of managing retirement income in the face of the natural volatility of returns after fees and unpredictability of inflation. It is no surprise that in practice most retirees take the minimum pension (p 4-6). They have little choice if they want to minimise longevity risk.

5.5. Remove the limits

The purpose of the withdrawal limits is to prevent too much wealth being accumulated within the tax-free superannuation pension environment. The calculations described above show that for a \$1m initial investment the treatment is too harsh and its effects are destructive, and the same conclusion would apply to substantially higher initial balances.

The minimum withdrawal limits should be removed, and replaced with a completely different mechanism to prevent excessive wealth accumulation in superannuation.

A promising solution is one proposed by the SMSF Owners' Alliance: contributions and earnings are tax free but withdrawals in retirement are taxed as ordinary income.

Whatever changes are made, care is needed to establish a fair transition from the existing system, where retirees have paid tax throughout the accumulation phase, by grandfathering existing superannuation accumulation and pension accounts, and the tax-free status of the latter (but without the withdrawal limits).