

# Tax and the Separation of Ownership and Control – Comment on the paper by Steven Bank and Brian R. Cheffins

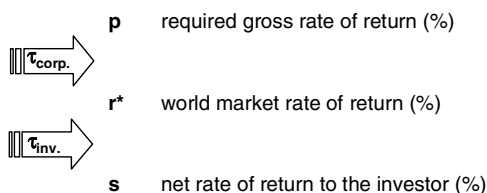
*Krister Andersson*

This paper, by Steven Bank and Brian Cheffins, brings out the impact tax has on pattern of corporate ownership and control. It shows that taxes played an important role in the development of ownership in Britain and in the United States.

The paper is particularly interesting since it takes into account not only taxes levied at the corporate level but also at the shareholder level. Unfortunately, most studies have analyzed the effect of corporate taxes only. For instance, the well-known literature on the cost of capital<sup>1</sup> typically only addresses the impact of taxes on corporate behavior as an endogenous effect of tax levied at the corporate level. In general, the role of taxes on corporate social responsibility need to be explored more in future research.

In my comments, I will focus on the link between this paper and the cost of capital literature. I will try to highlight some of the benefits as well as limitations of the approach taken by the authors compared to this literature. In the cost of capital literature, tax wedges are defined using a set of rates of return.

## Ownership and Taxes



where  $\tau_{\text{corp}}$  = corporate income tax, including taxation of inter-corporate dividends and,  $\tau_{\text{inv}}$  = personal income tax, dividend and capital gains taxation, estate taxes.

<sup>1</sup> The first work in this field was reported by MUTÉN, The Corporation Income Tax and The Cost of Capital (1968). It was followed by a strictly formalised analysis by KING/FULLERTON, The Taxation of Income from Capital: A Comparative Study of the United States, the United Kingdom, Sweden and West Germany (1984). This framework was developed to an open economy setting by BOVENBERG/ANDERSSON/ARAMAKI/CHAND, Tax Incentives and International Capital Flows: The Case of the United States and Japan, in: RAZIN/SLEMROD (eds.), Taxation in the Global Economy (1990). By focusing not only on the marginal effective tax rate but also on the average marginal effective tax rate, new measures were developed by DEVEREUX/GRIFFITH, Taxes and the location of production: evidence from a panel of U.S. multinationals, 68 Journal of Public Economics 335 (1998).

While most economists have stopped their analysis at  $r$ , Bank & Cheffins carry the analysis through to  $s$ . Quite a number of economists (including myself from time to time) have furthermore assumed that the required rate of return for any investor would be given from the world market required rate of return, in particular in small open economies. By assuming rational investors, it has sometimes even been argued that the required rate of return in small, closely held companies, should be the same as  $r^*$ . This is clearly not the case, since investing in a small closely held company involves an investment that can not be undertaken piecemeal and the asset invested in may not be a liquid asset. The required rate of return will therefore not be identical for investments in assets were the usual assumptions are fulfilled.

In any case, it is important not to stop the analysis by considering the required rate of return,  $r$ , but to consider all taxes relevant in the investor's investment decision. The investor is faced with the basic question of whether to invest or not, *i.e.* to consume all income presently earned or to postpone consumption to a later stage and invest in the meantime. This is typically expressed as the intertemporal decision. A tax system should not distort this decision unless there is a need to increase or decrease savings for reasons of externalities. For an analysis of the basic decision making process, *see* Appendix.

In short, taxation of savings affects the wealth accumulation of the households. Households shift away from a good which through taxation is relatively more expensive (future consumption or savings) in favor of the good that is not affected by the introduction of taxation in the planning. This conclusion is of course closely linked to investment decisions since savings finance investments. On the other hand, if the impact on the investor is excluded, the analysis does not offer a complete picture. As mentioned before, most of the cost of capital literature does not carry the analysis through to the necessary level of also considering taxes at the investor level. However, the paper by Bank and Cheffins does indeed capture these effects of taxation as well.

Accordingly, they study the net rate of return at the investor level,  $s$ , and the opportunity to sell off holdings at a reasonable price.

The fact that the required rate of return in a closely held company typically differs from the prevailing world market rate of return (however defined) is explicitly recognized as well as the difference in taxation between direct and indirect holdings. Many countries have favored indirect holdings, by having lower effective tax rates on savings in pension funds, *etc.* compared to the taxation of dividends and capital gains on outright stock holdings.

The paper convincingly argues that taxes played an important role in the change of ownership and control in corporate Britain.

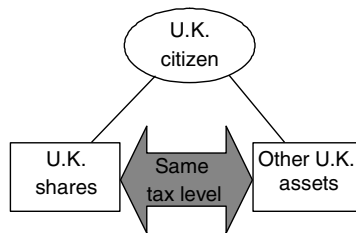
Taxes contributed significantly to the emergence of Britain's outsider/arm's-length system of ownership control

- corporate taxes
- taxes on earned income
- tax bias against dividends
- introduction of capital gains taxes
- estate taxes
- lower effective taxes on institutional investors

The arguments presented are very convincing, maybe with the exception of the role of the corporate tax. Since corporate taxes would be levied also on alternative portfolio allocations, the impact of corporate taxes may be rather small. Special circumstances can apply to closely held companies, *e.g.* through rules forcing capital income to be taxed as earned income. The corporate tax does also play a role for these companies. However, the classification of income as earned income, and thereby, in a dual income tax system, subjecting it to a higher tax rate, as well as taxes on dividends and capital gains would typically be an incentive for holding assets in the corporate sector. Combined with a lower effective tax on an institutional investor, this would also lead to an incentive to disinvest in closely held companies in favor of indirect portfolio holdings.

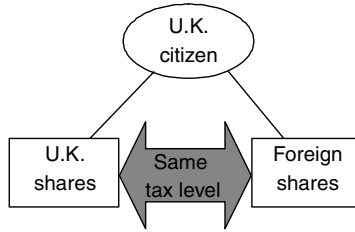
Many governments, including the British, have failed to achieve neutrality in the taxation of various assets. “Tax neutrality”, often so well spoken of, has in many countries remained a nice theory but has not been implemented in practice.

### Domestic Tax Neutrality



Many countries have instead been more concerned about protecting the short-term revenue base by advocating Capital Export Neutrality (CEN). Citizens have been expected to report foreign income and this income has been taxed at the same rate as if it had been invested within the national borders in a similar asset category. In relatively closed economies, or economies still regulated, the effect on portfolio allocation has probably been rather limited. However, as economies open up and competition increases, the impact on ownership structure and tax revenues can be dramatic.

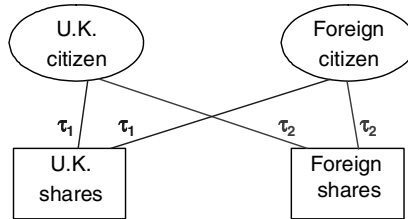
**Capital Export Neutrality**



Since the taxation at the shareholder level varies across countries, the required rate of return on a corporate investment will also vary. Asset holders in countries with lower taxes on dividends and capital gains, will find themselves having a competitive edge over asset holders in high tax countries. This will have an impact on the ownership structure and the control in the corporate sector. It will also influence the opportunities for existing asset holders to dispose of their assets. As financial markets open up, it will be increasingly easy to dispose of assets at a reasonable price. The effect will be particularly pronounced in high tax countries (countries with high tax rates on dividends, capital gains and wealth taxes).

In highly integrated economies, ownership neutrality requires that the Capital Export Neutrality approach in tax policy is replaced by Capital Import Neutrality (CIN).

**Capital Import Neutrality**



To achieve Capital Export Neutrality at the same time;  $\tau_1 = \tau_2$

By trying to achieve CIN, countries in reality also achieve Capital Ownership Neutrality, at least as far as foreign and domestic owners are concerned. Unless the government of a particular country knows that some owners are superior to others, domestic or foreign, there is no economic rationale to discriminate between different owners. However, foreign owners can typically only be taxed by applying source taxes, *i.e.* corporate taxes and withholding taxes on dividend income. The room for applying withholding taxes in a European context is very limited and withholding taxes are challenged on economic grounds as well. Inevitably, this will lead to a shrinking tax base for high tax countries. Therefore, the ownership structure will

have an impact on the potential of governments to collect taxes on the return of corporate assets. With an increase in foreign ownership, national tax revenues tend to be reduced. This situation also has bearing on the privatization of state owned enterprises. If a sell-out to the private sector will mainly result in foreigners buying the asset, the medium to long term tax revenues may suffer.

The role of applying world-wide taxation schemes is not explicitly elaborated upon in the paper. Both the U.S. and the U.K. have used such a tax concept in their international taxation. World-wide taxation can be seen as an extreme form of CEN. It tends to disfavor domestic asset holders, in terms of both domestic investments and investments overseas to the extent the system can be enforced.

The reader may wonder whether the examples of the U.K. and the U.S. are representative for the effects of taxation on ownership and control. I am in no position to give a general answer but I can just do the same analysis for my own country, Sweden, and confirm that increased taxes on direct shareholders and ownership control have led to an even more pronounced development than in the cases studied in the paper.

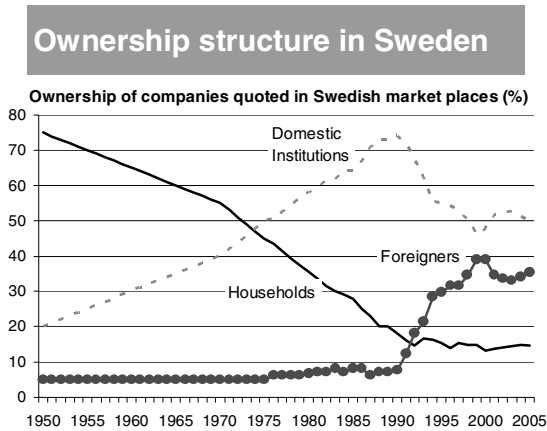
From being a relative low tax country up to the middle of the last century, Sweden progressively increased its tax burden and during the last two decades it has had the highest tax burden among the OECD-countries. Private savings and closely held companies have in particular seen a sharp increase in their taxes. However, not only taxes have played a major role on the ownership structure in Sweden. Up to the time of deregulation of capital markets and the foreign exchange market, the share of foreign ownership was kept very low. Sweden did not liberalize financial markets until the very late 1980s and early 1990s. Since the liberalization, foreign ownership has increased significantly. Foreign owners have taken over the role of domestic institutional investors as buyers of privately controlled companies.

The lack of a neutral tax treatment between indirect holding through insurance and pension funds and direct ownership resulted in an increase in indirect holdings at the expense of direct holdings. Double taxation in a classical corporate tax system in combination with increase in capital gains taxation propelled this development.

In an attempt to maintain high tax revenues in a deregulated economy, Sweden has, like the U.S. and the U.K., tried to use the tax system to recapture control over capital flows in such a way that taxes can still be collected. Sweden has strongly advocated the role of exchange of information. After deregulations in the early 1990s, there seems to be a shift away from ensuring a level playing field for Swedish corporations in their activities in third countries by promoting tax credit rather than exemption in tax treaties and also by imposing CFC (Controlled Foreign Companies) taxation on activities in low tax countries. To some extent, a re-regulation is taking place, not in terms of capital market controls or foreign exchange controls but rather through the tax code.

The U.S. has in a much more pronounced way consistently used the tax code in its pursuit of CEN and world-wide taxation. In the same way as regulations of capital markets lower the welfare of households, the use of the tax system in an attempt to achieve similar limitations on capital flows, are equally reducing welfare. Economic efficiency could be increased by allowing for CIN and a level playing field also in

terms of taxation. These aspects are not covered in the paper but would be suitable topics for future research.



## Concluding Remarks

This paper is worth reading both due to its historical overview with interesting details, and due to its clear and interesting analysis of the role of taxes in social corporate governance. The conclusions that taxes play an important role in the ownership structure are very convincing and merit policy considerations at ministries of finance around the world. Capital gains taxes as well as dividend taxes play a key role in explaining corporate ownership and control. The introduction or changes of the tax treatment of entrepreneurs and closely held companies may trigger a sell-off, provided there is a capital market facilitating the change of ownership.

## Appendix: The Role of Taxes at the Investor Level – The Consumption-Savings Decision<sup>2</sup>

This decision will depend on preferences and the prices (rates of return after taxes). It can be expressed as having preferences for consumption over time, where  $U$  represents the utility derived from consumption today and later on:

$$U = U(C_1) + \beta U(C_2)$$

The utility function is maximized subject to

$$C_1 + \frac{C_2}{1+r(1-\tau)} = y_1 + \frac{y_2}{1+r(1-\tau)}$$

where  $y_1$  is income in period 1 and  $y_2$  is income in period 2.  $r$  is the world market interest rate and  $\tau$  is the tax rate on savings (investments).

<sup>2</sup> This appendix is based on the paper ANDERSSON/FALL, Capital Taxes and Wealth Accumulation (2001). It was presented at the SNEE conference in Mölle in May 2001.

First order condition is

$$U'(C_1) = (1+r(1-\tau))\beta U'(C_2)$$

Let us assume an isoelastic utility function of the form:

$$U(C) = \frac{C^{1-\frac{1}{\sigma}}}{1-\frac{1}{\sigma}}$$

Then

$$U'(C) = C^{-\frac{1}{\sigma}}$$

and we can express  $C_1$  in terms of  $C_2$  as

$$C_1^{-\frac{1}{\sigma}} = (1+r(1-\tau))\beta C_2^{-\frac{1}{\sigma}}$$

which implies that

$$C_2 = (1+r(1-\tau))^\sigma \beta^\sigma C_1$$

By using the budget constraint we can derive the following expression:

$$C_1 + \frac{(1+r(1-\tau))^\sigma \beta^\sigma C_1}{1+r(1-\tau)} = y_1 + \frac{y_2}{1+r(1-\tau)}$$

and

$$C_1 = \frac{1}{1+(1+r(1-\tau))^{\sigma-1}\beta^\sigma} * \left( y_1 + \frac{y_2}{1+r(1-\tau)} \right)$$

There is no need to assume that households in different countries need to have the same preferences over the consumption profile. Economies are assumed to be open and therefore investments are assumed to be financed from abroad if domestic savings are insufficient. The households' preferences for consumption in the two periods are captured in the coefficient  $\beta$  as a time preference factor and their willingness to substitute consumption between periods is reflected by  $\sigma$ .

The parameter values are to a large extent an empirical question. The willingness to substitute consumption between periods is influenced by the ability to preserve the value of savings. In an economy where it is only possible to save commodities for barter trade, it may not be wise to save even if there is a large need to secure future consumption.<sup>3</sup> In a world with developed and deregulated financial markets, the opportunities to diversify and allocate risk in a coherent way have improved immensely. As a consequence, tax differences between different assets and countries have probably increased in relative importance for savings decisions.

If a country decides to tax postponed consumption, the relative price between consumption today and tomorrow will be affected. There will be both an income and

---

<sup>3</sup> Take as an extreme case that it is only possible to save bananas. Rotten bananas are of little help satisfying consumption needs in the future.

a substitution effect. Given the uncertainty of the parameter values, sensitivity analysis is presented below.

If we assume that incomes in period 1 and 2 are equal, the world market interest rate to be equal to 10 percent and the tax rate 30%, the allocation of consumption over time will depend on the values for  $\beta$  and  $\sigma$ .

If we assume that beta is equal to 1 and sigma to 1.2, the savings ratio in period 1 will be 3.93 percent. If the tax rate is reduced to 10 percent, the savings ratio increases by one percentage point to 4.95 percent.

For a broad range of parameter values, with this utility specification, lower taxes on savings are associated with an increase in savings. If a country increases its tax rate on savings, its residents will hold less assets or claims abroad. They will also own less of the domestic capital stock.

However, a lot of factors are left out in such a simple model. Distortions on the labor market may be an important factor also in savings decisions, as will expectations about future earnings and tax rates. One effect in particular is worth mentioning.

When new technology is introduced, productivity in the corporate sector tends to increase. The increase in productivity will eventually lead to higher wages, but for some period profits usually tend to increase. The profits will be allocated to the owners, and if the tax system in one country discourages savings, its residents may hold less of the capital stock, and are therefore receiving only a small portion of the productivity gains.

It is possible that households take this into account when they make their intertemporal consumption decisions, but since a technology breakthrough is a discrete event, households may not properly discount the chances for achieving such extra rates of return on their savings.

The conclusion that a lower tax rate on savings would increase the wealth accumulation of the households in that country is not in any way a unique result. One would expect households to shift away from a good which becomes relatively more expensive in favor of the good that is made less expensive through a tax change.

Tanzi showed that countries with a high tax rate on savings, and therefore also favoring indebtedness through generous deductions for interest payments, tended to have considerably lower household savings rate than countries with lower taxes on savings.<sup>4</sup> Both the income- and the substitution effect would tend to increase the savings rate for indebted households as the tax rate on savings is reduced.

To sum up, a considerably higher level of savings taxes is likely to reduce ownership of corporate assets, not only in the residence country but also abroad.

---

<sup>4</sup> TANZI, *Taxation in an Integrating World* (1995). He also compared countries over time and found that the savings ratio remained low for countries that maintained high tax rates on savings.