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Note on Reinvested Earnings and Own Funds
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Reinvested earnings and own funds

Introduction

This note addresses two inter-connected items which raised comments in discussion on the accumulation chapters, particularly on chapter 13. They are the questions of how to record (and more particularly where to record) reinvested earnings of foreign direct investment enterprises and own funds.

The paper put to the AEG in February 2006 suggested including the reinvested earnings component in the other change in the revaluation account but the AEG felt this was inappropriate since reinvested earnings are a transaction and the revaluation account should exclude transactions. The AEG concluded that "a further articulation of the flows relating to reinvested earnings is required".

Although the AEG did not recommend adopting the reinvested earnings approach of the BOP to the public sector (issue 34), there was some sympathy for this approach and it was recommended that it be referred to in the revised text as one way to identify the appropriate treatment of these unusually large payments.

Both of these issues involve the concept of retained earnings of corporations and this also leads to the question of defining "own funds" which the AEG agreed was needed in the updated SNA. Considering this also gets back to the concept of "residual corporate net worth" which the AEG did not want included in the SNA but which happens to fit neatly within a framework which addresses these various issues. The purpose of this note is to suggest a way to encompass these requests for further elaboration of flows between corporations and their owners.

Reinvested earnings

To investigate the how reinvested earnings contribute to the value of the organisation, it is necessary to look first at retained earnings. Thereafter it is possible to consider how reinvested earnings feature in foreign direct enterprises that are 100% owned and those that are only majority share owned.

Retained earnings of corporations

The SNA defines the retained earnings of a corporation in para 7.122 but does not use the concept thereafter. Starting from entrepreneurial income, adding all current transfers receivable and deducting all current transfers payable as well as the pension entitlement adjustment gives an aggregate which could be described as distributable income. This can be subdivided into the amounts actually distributed as property income payable by the corporation as distribution of earnings and the rest which may be described as retained earnings. Using the data in the SNA for non-financial and financial corporations (NFC and FC respectively) gives the following table

		NFC	FC	NFC+FC
	Entrepreneurial income	120	55	175
Plus	Current transfers receivable	24	88	112
Minus	Current transfers payable	48	85	133
Minus	Pension entitlement adjustment	0	11	11
Equals	Distributable income	96	47	143

Of which	Distributed income	48	36	84
	Retained earnings	48	11	59

This definition of retained earnings gives exactly the same results as saving for the two sectors, but because it is derived differently and will be used differently, the term retained earnings will be used for the present purpose.

Foreign direct investment enterprises

Suppose a direct investment enterprise is 100 per cent foreign owned with listed shares. It will have no retained earnings as all distributable income will be treated as distributed either as dividends payable or reinvested earnings. The reinvested earnings are fed back to the enterprise in the financial account as some sort of equity but the question is what sort. Given this enterprise is supposed to have listed shares, separate figures are available for purchases and sales of these shares in the accounting period and this is what is shown under the [proposed] item "listed shares" in the financial account. The receipt of reinvested earnings increases the value but not the number of the existing shares. However, there is no guarantee that this increase will match the observed change in the market price of the shares. It is possible that in an accounting period there are positive reinvested earnings but the share price still falls. However, it seems appropriate to say that the figure required for the non-transaction change in value recorded in the revaluation account is the observed change in the price of the shares less the amount of reinvested earnings. To make this accounting clear, it would be desirable to show the reinvested earnings explicitly in the financial account.

Proposal 1: They could be included in "other equity" so that this item covers both the increase in owner's equity of quasi-corporations and reinvested earnings of direct investment enterprises or a separate entry could be made so that equity consisted of (i) listed shares, (ii) unlisted shares, (iii) equity of quasi-corporations and (iv) reinvested earnings of direct investment enterprises.

Suppose the direct investment enterprise in the previous paragraph had reinvested earnings of 60. This figure corresponds to the amount of distributable earnings that are not actually distributed as dividends. Suppose further that now it is only 66 per cent foreign owned. The 1993 SNA recommends that two thirds of the 60, or 40, should be shown as reinvested earnings. The other 20 will continue to be recorded as retained earnings and will be shown as saving in the accounts for the enterprise.

If we follow the suggestion in the previous paragraph, the 40 will be shown as part of an increase in the value of equity in the financial account and the revaluation item calculated as the observed change in the price of the shares less the amount of reinvested earnings will be 20 higher than in the case of 100 per cent ownership. If the premise that non-distributed earnings increases the value of shares holds, there is no reason to suppose that this effect is dependent on whether the earnings are shown as being rerouted through the rest of the world account or not. Thus the whole of the value of retained earnings should be treated as leading to an increase in share value independently of purchase and sales of shares.

However it cannot be shown in the same way as reinvested income (either for quasi-corporate or direct investment enterprises). The redistribution of income from a foreign direct investment enterprise is shown as an outflow, a transaction, which reduces saving and thus is not an immediate source of funding in the capital account for capital formation or payment of capital transfers. As a consequence, the fact that the funds are actually available to the enterprise must be shown as part

of net lending or borrowing in the financial account and this is why they appear as part of the increase in equity in the enterprise. In the case of retained earnings, the amount involved *is* available in the capital account for capital formation or payment of capital transfers. If it is not so used, it forms part of net lending or borrowing and must be used either to acquire another financial asset or to reduce a financial liability. The increase in share value will occur but will not now be due to a transaction. The question arises of whether the impact of retained earnings should be shown separately from the overall increase in share price in the revaluation account. Doing so would treat all (positive) distributable income as leading to an increase in share value whether it is actually shown as being distributed or not.

It appears at first sight that there would be no resource cost in doing so since all the components of retained earnings are available. However, if equity is to be divided between listed shares, unlisted shares and quasi-corporate equity, then retained income must be compiled separately for corporations with listed shares and those with unlisted shares.

Consequence of proposal 1: By the same token, even without this treatment of retained earnings as an identifiable part of share price increase, a full articulation of the accumulation accounts means that reinvested earnings must be split between companies with listed shares, those with unlisted shares and quasi-corporations. This extra detail was not explicitly considered when it was decide to split equity into these three categories because of the lack of articulation of how reinvested earnings fed through the whole of the accumulation accounts.

"Reinvested earnings" between government and public corporations

There are two types of transactions to be considered, payments by the owners into the corporation and withdrawals from the corporation to the owners.

Following consideration of issue 34 for the SNA update, consisting of a proposal to extend the concept of reinvested earnings to publicly controlled corporations., the AEG agreed to recommend making the following changes to the SNA.

Exceptional payments by government to publicly controlled corporations should be treated as additions to equity if there was a "commercial" reason (new issuance of shares and valid expectations of dividends).

Exceptional payments by government to public corporations intended to offset accumulated losses to be treated as capital transfers.

Exceptional payments by public corporations to government funded from accumulated reserves or sales of assets to be treated as withdrawals of equity.

Thereafter, the ISWGNA agreed that the same recording of withdrawals from and contributions to private corporations should also apply.

What is exceptional?

By accepting the link between retained earnings and the changes in the value of shares and other equity, "exceptional" could be defined to be payments made that are out of line with retained earnings or with the trend level of retained earnings over a number of years. This would sill involve judgement but gives a base line to work from.

Proposals for the update - reinvested earnings

In order to meet the requirement to articulate the increase in value of shares and other equity from one balance sheet to the next, showing the role of reinvested earnings, the following steps are necessary;

Define retained earnings

Show reinvested earnings as a subcomponent of [changes in] shares and other equity in the financial account for each of listed shares, unlisted shares and other equity.

Determine the revaluation term for each of listed shares, unlisted shares and other equity as the change in the value between the start and end of a period excluding the value of reinvested earnings. The residual amount will include the value of retained earnings.

The end balance sheet value is equal to the opening balance sheet item plus change in shares and other equity from the financial account (including the reinvested element) plus the revaluation term as just described plus any other changes in volume of shares and other equity.

As far as reinvested earnings are concerned

The present treatment of reinvested earnings by foreign direct investment enterprises is unchanged

Changes are proposed for the recording of exceptional withdrawals from and payments to publicly controlled quasi-corporations

For consistency, similar rules are applied publicly controlled [share-based] corporations in respect of exceptional withdrawals and payments

Exceptional should be defined in relation to retained earnings

Own funds

The paper presented to the AEG on financial services (SNA/M1.06/04) contained the following text concerning own funds.

- 16. In the present paper, own funds are defined as the sum of the net worth (B.90) and shares and other equity (AF.5). The following more precise definition was brought forward by the Eurostat Working Group on Unquoted Shares (WGUS) (originally suggested by the Sub-group on shares and other equity of European Monetary Institute's Monetary Financial Accounts Task Force (MUFA TF) and slightly modified by Working Group on balance of Payments and External Reserves Statistics (WG BP&ER)). The definition consists of the following components:
- paid-up capital net of own shares
- shares premium accounts, investment grants excluding goodwill,
- all types of reserves,
- non-distributed profits net of losses and including the results for the current year

The IMF's *Monetary and Financial Statistics Manual* (MFSM) contains the following:

SHARES AND OTHER EQUITY

- 213. For the financial statistics described in Chapter 8, the values of shares and other equity on both sides of the balance sheet are based on market prices or fair values. This treatment is in accordance with the valuation methods in the 1993 SNA. For the monetary statistics described in Chapter 7, asset holdings in the form of shares and other equity are valued at market prices or fair values. However, most components of liabilities in the form of shares and other equity should be valued at book value for the monetary statistics.
- 214. For monetary and other policy purposes, it is highly desirable to show, in the monetary statistics, data on the separate components (as described in Chapter 4) of shares and other equity on the liability side of the balance sheets of financial corporations. These data are particularly important for analyzing the soundness of financial systems. Even though shares and other equity at the total level can be valued at market prices or fair values, this approach is not possible for valuing all individual components, given that no non-arbitrary method exists for market valuation of funds contributed by owners, retained earnings, and general and special reserves. Therefore, this manual recommends that the following valuation principles be used for the components of shares and other equity on the liability side of the sectoral balance sheets described in Chapter 7:
 - Funds contributed by owners should be book valued—that is, valued as the nominal amount of the proceeds from the initial and any subsequent issuances of ownership shares.
 - Retained earnings should be valued as the nominal amount of earnings that have been retained.

- General and special reserves should be valued as the nominal amount of such reserves.
- SDR allocations should be valued on the basis of the market exchange rates as of the transaction or balance sheet date.
- *Valuation adjustment* is market valued by definition, given that the valuation adjustment in specifically designed as the net counterpart to changes in the market or fair values of assets and liabilities on the balance sheet.

Although the exact form of words is different, it seems clear that these two definitions are intended to be similar. The difference between the two is captured in the valuation adjustment given at the end of the extract from MFSM.

Valuation of equity

The AEG paper on the valuation of equity (SNA/M1.06/23) describes at some length the concept of residual corporate net worth. The extract appears as an annex to the paper.

This text equates residual corporate net worth with the valuation term just described. It is the difference between the values of the cost of acquiring shares, retained earnings, reserves and SDRs (in the case of the Central Bank only) as recorded at book value and the value of shares and other equity at market prices (or fair value). Putting the three extracts together, we have the relationship that:

The value of shares and other equity is equal to the value of own funds plus residual corporate net worth.

Proposal 2: Thus although the AEG recommended not to refer to residual corporate net worth in the updated SNA, it seems it could be useful to include it to explain the relationship between own funds and the book value measure of those items contributing to shares and other equity.

Proposals for the update -own funds

In order to define own funds, the item residual corporate net worth has also to be defined in order to show the relation between own funds and the value of shares and other equity

Residual Corporate net worth (Extract from paper SNA/M1/06/23)

Background

49. SNA93 says that corporations "can be seen to have a residual net worth ..." (13.74), but does not say anything about the nature of this item. This suggests that residual corporate net worth (RCNW) is the difference between the market value of shares outstanding and the net asset value, though the reader can only infer this from the current SNA93 text. RCNW is a standard feature in *Balance Sheet Accounts* that cover both non-financial and financial assets. The question is related to the intent of SNA93, specifically: Whether RCNW is a statistical issue (measurement error) or a conceptual issue implying that it could have an economic interpretation. It would appear to be both.

Measurement error

50. RCNW will always contain some measure of measurement error in item in the sense that it reflects any valuation and coverage issues that drive a wedge between the market value of corporate equity liabilities on the one hand and the net asset values derived as the difference between assets and liabilities (excluding equity) on the other hand. Most countries do not cover intangible assets and natural resources in their net asset value estimates, and there is a long history of dissatisfaction with the widely-used PIM models used to estimate and value stocks of produced assets. On the financial side, some countries may not have all marketable securities (assets/liabilities) valued at market or may not cover certain assets (e.g., financial derivatives). Market value equity estimates may have some measurement issues associated with it, related to the valuation of unlisted shares. It was established and agreed upon by the TF that RCNW is partly measurement error, and that this was important for compilers to understand.

Intangible assets

- 51. The Canberra Group has spent some time debating the valuation and inclusion of intangible assets in a revised SNA93. They have broken down intangible assets into two principal categories: Intangible produced assets; and, intangible non-produced assets. Intangible produced assets cover research and development (which is assumed to cover the value of patented entities). Intangible non-produced assets cover leases and other transferable contracts, purchased goodwill and other. The issue before the TFVME is how business asset coverage issues relate to the market value of corporate equity. Only including purchased goodwill in a revised SNA93 does not account for intangibles such as ongoing customer relations. This is important in most industries and key in certain industries (e.g., the customer service relationships of some software and computer companies).
- 52. TFVME agreed that asset coverage, particularly for intangible assets, should be discussed with reference to the market value of corporate equity and residual corporate net worth in a revised SNA93). RCNW may be considered a conceptual issue if, in the evolving SNA93 recommendations, certain intangible assets are considered out of scope, but are reflected in market value equity estimates. In this case, this leads to a specific interpretation of RCNW.

Conceptual issue

- 53. More generally, the issue of whether RCNW is a conceptual construct revolves around a specific question: Whether we would expect that there could be at different points in time (say over an economic cycle) a difference, as well as fluctuations in the difference, between net asset values and the market value of corporate equity liabilities. The consensus on this issue was yes -- that market value equity can fluctuate around net asset value estimates reflecting, for example, excess demand for corporate shares in a period. This can be formalized as the macroeconomic version of Tobin's Q, which is: The market value of assets divided by replacement value of assets (where, essentially, a Tobin's Q ratio greater than 1 indicates the firm has done well with its investment decisions).
- 54. That RCNW conceptually exists was considered crucial for compilers and users of data to understand. This implies that RCNW is a legitimate entry in the system that is, has an economic interpretation. Notably, this interpretation differs markedly from that of net worth in the other (ultimate) sectors. This argues that consideration should be given to creating a separate sub-category for RCNW under B.90.

Summary

55. While RCNW is derived in the same way as with other (non-corporate) sectors, its nature is quite different from net worth in these (ultimate) sectors. It was concluded that the concept of RCNW required expansion and clarification in a revised SNA93, in particular as to its interpretation and with respect to the coverage and valuation of assets and liabilities (especially intangible assets). It was also recommended that the AEG should consider whether RCNW should be treated as an explicit sub-category of B.90.

Questions for AEG

56. Does the AEG agree that RCNW discussion requires expansion? Does the AEG agree that RCNW exists as a conceptual item; and, if so, does the AEG agree that it be a separate subcomponent of B.90?