IMF COMMITTEE ON BALANCE OF PAYMENTS STATISTICS AND OECD WORKSHOP ON INTERNATIONAL INVESTMENT STATISTICS

DIRECT INVESTMENT TECHNICAL EXPERT GROUP (DITEG)

ISSUES PAPER 1

VALUATION OF DIRECT INVESTMENT EQUITY STOCKS

The views expressed in this paper are those of the authors and do not necessarily represent those of the European Central Bank.

Prepared by the European Central Bank

April 2004

Introduction

1. In 2000 the ECB Working Group on Balance of Payments Statistics and External Reserves carried out some ad-hoc investigations which led to the conclusion that the wide variety of valuation criteria being applied by the European Union Member States to compile foreign direct investment (FDI) stock statistics accounted for a fairly significant volume of bilateral asymmetries.¹ Similar arguments are likely applicable world-wide too. Indeed, this situation may to a large extent explain the level of global imbalances in the area of FDI stock statistics.

2. The lack of clear guidance from international statistical standards and the practical difficulties to apply the main recommendations may explain the current state of play. Both the IMF Balance of Payments Manual (BPM5) and the OECD Benchmark Definition of Foreign Direct Investment (B-FDI) promote the use of market prices as the basis of valuation for both transactions and stocks. ² International statistical standards for national accounts also prescribe the use of market prices for the valuation of assets when they exist. ³

3. However, these standards also recognise that the market price measurement cannot always be implemented because of the absence of regular revaluations.⁴ Therefore, in practice book values / balance sheets are generally utilised to determine the value of direct investment stocks.⁵

4. Unfortunately, in the absence of observable market prices no single concept of "book value" is stated in the manuals. Actually, both BPM5 and B-FDI recognise that this value might be assigned on the basis of (i) original (acquisition) cost; (ii) a more recent revaluation; or (iii) current value, in the latter case, not specifying how such a "current value" should be calculated.

5. This variety of methods leaves ample room for manoeuvre to compilers, thus paving the way for dissimilar valuation methods applied across countries. One of the most important factors originating such asymmetries lies on the accessibility of information for inward and outward FDI stocks. While in the case of inward FDI stocks, compilers normally have access to fairly detailed balance-sheet information from the resident direct investment companies, in the case of outward FDI stocks compilers most often collect only limited evidence provided by the resident direct investors.

6. Keeping for granted that the update of BPM5 as well as the new edition of the B-FDI should help reduce the level of global imbalances between inward and outward FDI, the promotion of asymmetry-free methodologies could be the guiding principle to examine the issues to be considered in this paper, in particular, the valuation criteria that should be applied to listed as well as to unlisted FDI companies.

¹ See background document "Valuation of direct investment equity stocks: outcome of the questionnaire and follow-up proposals".

² BPM5, paragraphs 91 and 107; and BMD, paragraph 20.

³ ESA95, 1.51, 1.53, 7.25, etc.; SNA93, 3.71

⁴ BPM5, paragraph 108

⁵ BMD, paragraph 21 and 22.

Listed companies

7. As already mentioned, market prices have been established as the basic standard valuation criterion for all transactions and stocks. In the case of listed companies, this standard seems to ensure a symmetric measurement from the perspective of both direct investor and direct investment enterprise. Stock-exchange prices should be a valuation criterion equally accessible to compilers of inward and outward FDI.

8. On practical grounds, it should be borne in mind that compilers usually have to face more difficulties to access market quotation information in the case of outward FDI. However, it can hardly be argued that this may justify the existence of asymmetries.

9. Therefore, it is recommended that marked-to-market prices continue being the standard criterion for the valuation of FDI listed companies (for both inward and outward FDI).

Unlisted companies

10. Starting purely on conceptual grounds, it might be questionable what the price of an unlisted company may be at any moment in time in the absence of a market quotation. Most probably, the final price of an eventual sale will most likely depend on a number of surrounding and strategic circumstances which can hardly be objectively valued by b.o.p./i.i.p. compilers on a continuous basis.

11. Assuming the non-existence of a market price for this type of companies (leaving aside the specific period in which these companies may have been purchased/sold⁶), it seems necessary to promote an alternative and objective valuation criterion, which should leave no room for asymmetries.

12. Approximations to a market valuation for these types of companies frequently much depend on the volume of information available to compilers and on the benchmark indexes selected to revalue past figures. For instance, US statistics are revalued on the basis of a current-cost method, which consists of revaluing tangible assets -inventory stocks, land, and plant and equipment- by means of special adjustment factors (for inventories), general price indexes (for land), and a perpetual inventory model (for plant and equipment)⁷.

13. It is not surprising that the results of the diverse estimates performed by different b.o.p./i.i.p. compilers may turn out to be substantially different depending on whether they are seen from the perspective of the direct investor or from that of the direct investment company, i.e. for inward FDI or outward FDI. In the case of resident direct investment companies, compilers usually have access to a much wider range of information on detailed components of the companies' balance sheet. Conversely, information provided by resident direct investors is usually the only channel through which the compiler may have access to the balance sheet information of the (non-resident) direct investment company. Such

⁶ Purchases and sales of these companies' shares do not commonly and frequently happen due to the very nature of such equity securities.

⁷ See background document "Valuing the Direct Investment Position in U.S. Economic Accounts", presented in the October 2002 meeting of the IMF Bop Committee.

information may prove insufficient to allow a final result consistent with that resulting from the analysis performed by the compiler where the direct investment companies resides. In short, such criteria may most likely end up in an increasing volume of global imbalances between inward and outward FDI.

14. Considering both the conceptual arguments as well as the practical difficulties mentioned so far, an alternative measure is proposed in this paper. With a view to obtaining an objective standard that could be equally applicable to both inward and outward FDI, the proposal is to use a single definition of "own funds at book value" (OFBV) for the valuation of FDI equity stocks of non-listed companies.

15. The components of such a single definition of OFBV would be as follows:⁸

- i) Nominal (paid-up) capital excluding own shares
- ii) All types of reserves including shares premium accounts and investment grants
- iii) Non-distributed profits net of losses (including results for the current year).

16. The main advantage of this recommendation is that it leaves no room for interpretation or for dissimilar assessments by compilers of inward and outward FDI. The OFBV definition constitutes a single and objective measure to both parties. Additionally, no discretion is allowed on the way to measure statistics (or, in other words, on the way to approximate market values when such market prices do not exist).

17. Obviously, in the case of outward FDI more difficulties exist to have access to such information. However, in comparison with other methods the practicality of the solution proposed lies on the fact that the information required from the balance sheet of the direct investment company is restricted to a limited number of (liabilities) accounts representing the direct investment company's own funds.

18. This recommendation could be seen as a prudent approach, more in line with accounting principles than with general statistical standards. But still, the practical advantages of a solution which is also conceptually defendable may well outweigh any potential disadvantage. As mentioned above, the applicability of a market-value standard to non-listed companies poses substantial difficulties both on conceptual and, especially, on practical grounds.

19. Should this recommendation for the valuation of the official i.i.p. series be accepted, it is also recognised that, with a view to further preserving the analytical value of FDI statistics, users may also request to be provided with additional series, namely with a pure marked-to-market valuation for all types of direct investment companies.

20. Bearing in mind all the shortcomings previously mentioned (namely to which extent could any estimate reflect the true value of the company in the absence of any market quotation⁹), such a request from users could be considered in the framework of other foreseeable requests for more analytically meaningful FDI statistics, e.g. based on the geographical allocation of the Ultimate Beneficial Owner

⁸ For a more technical description of the individual components of the definition of OFBV, see background document *"Valuation of FDI stocks remaining conceptual issues of the 'Own funds at book value' method*".

⁹ Could any estimate ensure that, should the investor decide to sell the company, he would get such an "estimated" price?

(rather than on that of the first-known counterpart), on the sector of activity of the last FDI enterprise along the chain of ownership (instead of that of the immediate counterpart), etc. All these valuable requests could be satisfied by means of satellite FDI accounts or memorandum items, in which any potential asymmetries would be less problematic.

21. In the specific case of the valuation of FDI in unlisted companies on a marked-to-market basis, in addition to the US "current-cost" methodology, one possible alternative could be the projection of a ratio market value/book value observed for listed companies to unlisted FDI enterprises. This would require collecting two different valuations for FDI in listed companies, namely market values and book values.¹⁰ ¹¹ In any case, any such projections would not be incorporated to the official i.i.p. figures but would rather be supplied as supplementary information.

Summary of the proposals

22. Member of the DITEG are invited to consider the following proposals:

- (i) Any valuation proposals for the official i.i.p. FDI series should ensure symmetrical recording of inward and outward FDI stocks and leave no room for dissimilar interpretations.
- (ii) The global standard valuation criterion should continue being "marked-to-market" prices, where relevant.
- (iii) Due to the non-existence of market prices for unlisted companies, a symmetrical concept should be promoted as the only way to avoid global imbalances.
- (iv) The proposal is to use a single definition of "book values" as the standard valuation criterion for unlisted FDI companies. The notion of "book values" - in opposition to "historical/acquisition price" or other accounting valuation methods - should be exclusively confined to a standardised definition of the direct investment company's "own funds at book value";
- (v) The applicability of the previous proposals implies that separate FDI stock statistics should be compiled for listed and unlisted companies. An additional split could be considered in the IIP standard components of the forthcoming version of the manual.
- (vi) Finally, the production of additional information through satellite accounts/memorandum items for analytical purposes should be promoted so as to also provide users with (partially estimated) marked-to-market stocks for all types of direct investment companies. To this aim, the collection of FDI stocks in listed companies on the basis of both market values and book values

¹⁰ It might not be necessary to collect both values from reporters through the inclusion of additional questions in the FDI surveys. Market prices may be collected from stock-exchange information and from the media alternatively (though the latter option may be very resource consuming). More information on country practices and solutions may be obtained from the *Final report of the Task Force on Foreign Direct Investment*.

¹¹ Obtaining detailed information crossed by country and by sector of activity on this basis might be more problematic due to the need to ensure that a sufficiently representative population of listed FDI companies exist for each counterpart country and each sector of activity.

could help supply valuable information that could also be used to estimate marked-to-market FDI stocks in unlisted companies.

Background documents¹²

- Task Force on Foreign Direct Investment "*Final report of the Task Force on Foreign Direct Investment (chapter 3)*", published on the ECB website (http://www.ecb.int/pub/pdf/foreigndirectinvestment200403en.pdf)
- European Central Bank "Valuation of FDI stocks remaining conceptual issues of the 'Own funds at book value' method", [July 2001], available on the BEA's DITEG-dedicated website.
- European Central Bank "Valuation of direct investment equity stocks: outcome of the questionnaire and follow-up proposals", [November 2000], available on the BEA's DITEG-dedicated website.
- US Bureau of Economic Analysis "*Valuing the Direct Investment Position in U.S. Economic Accounts*", presented in the October 2002 IMF Bop Committee meeting.

¹² Background documents are available on the BEA's DITEG-dedicated website