

# INSTITUTE OF SOCIAL STUDIES

Working Paper Series No. 164

## **THE NONPROFIT SECTOR IN THE NATIONAL ACCOUNTS: A Numerical Exercise with Data for the Netherlands**

J.J.P. van Heemst

December 1993

# WORKING PAPERS

**Comments are welcome and should be addressed to the author:**  
c/o Publications Office - Institute of Social Studies - P.O. Box 29776  
2502 LT The Hague - The Netherlands



THE NONPROFIT SECTOR IN THE NATIONAL ACCOUNTS:  
A NUMERICAL EXERCISE WITH DATA FOR THE NETHERLANDS

Jan J.P. van Heemst    \*

1. INTRODUCTION.

In the last two decades or so, an increasing number of studies has been published that deal with different aspects of nonprofit organisations (NPOs) and their activities.

The nature of these studies is diverse. A number of them focus on the role of nonprofits in developed countries, while others primarily concentrate on the nonprofit sector (NPS) in developing countries. The scope of some studies is wide, encompassing basically the entire sector, while that of others is narrower, i.e. referring to one or more sub-sectors, such as education, health, social services etc. While the analysis in some studies touches mainly on economic aspects (e.g. resource flows; effectiveness and efficiency questions etc.), that in other studies is oriented (more) to social, political (e.g. relationships to government) or organisational (e.g. governance structures, managerial issues) aspects.

One overall conclusion from this body of studies on the NPS must be, that its role, whether in economic, social or political terms, in many countries, whether developing or developed, is quite significant.

The increased interest for this sector both from a policy and an academic point of view seems therefore fully justified<sup>(1)</sup>.

Notwithstanding what has been achieved so far in terms of data collection on, and further analysis of NPS, many gaps are still to be filled. Among these is the need for systematic statistical data, including data on the macro-economic dimensions of NPS and its sub-sectors in different countries. In this regard it must be said, that the most obvious sources one would think of in this connection, i.e. a country's national accounts, are in almost all cases of no avail, due to a variety of reasons. As a consequence, very little is known in numerical terms about the relative position of NPS in the economies of most countries <sup>(2)</sup>.

---

\*     The author wants to thank J.V. Alarcon and P.P. van der Wel (both ISS), and J. Cornelisse (Netherlands Central Bureau of Statistics) for comments on an earlier version of this paper. The latter has moreover been instrumental by providing unpublished data on the Dutch nonprofit sector.

Elsewhere (van Heemst, 1991; Anheier, Rudney and Salamon, 1992) more has been said about the various reasons underlying the poor representation of NPS in the national accounts of almost all countries. Among them problems of data collection, as well as of classification play a role. As far as the latter is concerned reference may be made to the United Nations' System of National Accounts (the UNSNA, or for short: the SNA) i.e. the international guidelines on national accounting, which recommends - as will be explained in more detail in the next section - the classification of many types of NPOs under institutional sector headings (e.g. enterprises sector, government sector etc.) which makes it impossible to recognize them anylonger as belonging to NPS or one of its sub-sectors. Furthermore, those types of NPOs which according to the SNA may be classified under an institutional sector heading which explicitly refers to NPS, may in many cases be rather small organisations. As such, data collection on these NPOs is rather poor, generally speaking, resulting in under-coverage, if covered at all, in the national accounts estimates in the case of so many countries.

In summary one can say therefore, that the treatment of NPS in the national accounts of almost all, if not all, countries leaves much to be desired for purposes of macro-economic analysis of this sector.

Considering the above, any attempt to provide further evidence on the macro-economic dimensions of NPS and its sub-sectors in different countries is to be welcomed. This paper aims at presenting some calculations in the context of such attempts. As such, it will give at the same time an indication of how application of the SNA classification may affect the presentation of NPS in the national accounts.

The paper takes the case of the Netherlands as an example. While the official national accounts of the Netherlands do not show data for NPS or any of its sub-sectors separately, some unpublished data from the Netherland CBS on NPS have been made available to us, which enable the making of some alternative calculations as to the relative size of this sector in the economy of the Netherlands.

The organisation of the paper is as follows.

In section 2. brief reference is made to the SNA guidelines re institutional sectoring, as well as to the classification of NPOs in this connection. Also, some observations will be made with respect to the way in which the output, the value added, and the final consumption expenditure of NPOs may be measured according to the SNA guidelines. This section serves the purpose of providing the proper background for our exercise with the data for the Netherlands.

In section 3. we discuss some relevant aspects of the national accounts of the Netherlands; furthermore some macro-economic and sectoral national accounts aggregates are being presented, together with some unpublished data for NPS and its sub-sectors.

In section 4. we present the results of some further calculations which aim at giving indications of the relative size of NPS and its sub-sectors in the case of the Netherlands for the year 1985.

Finally, in section 5. some conclusions will be drawn from the exercise.



## 2. INTERNATIONAL GUIDELINES.

Both the SNA edition of 1968 and the revised edition to be published this year distinguish at the primary level five institutional sectors <sup>(3)</sup>. These sectors are (in the terminology of the forthcoming edition) : 'non-financial corporations'; 'financial corporations'; 'general government'; 'households' (including unincorporated enterprises); and 'private non-profit institutions serving households'. As such, the institutional sectoring as distinguished by the SNA includes a sector in which reference is being made to nonprofit institutions. However, this sector is supposed to include only a limited number of organisations from all those which may be considered NPOs, depending on whether the organisations in question possess certain characteristics. The remaining NPOs are according to the SNA to be included among other institutional sectors, depending on how the organisations may be further characterized.

In order to clarify the above, we will have a closer look at the main types of NPOs as distinguished by the SNA, and the proposed sectoral classification. The typology presented in the scheme below is an adjusted version of the one given in Anheier, Rudney and Salamon (1992), which aims at summarizing the NPO typology of the SNA (1968 edition, as well as forthcoming edition).

Scheme 1

MAIN TYPES OF NPOS	/	SECTOR OF ASSIGNMENT
1. NPOs producing market goods/services		Corporate sector
2. NPOs serving business		Corporate sector
3. NPOs serving government		Government sector
4. NPOs serving households, mainly financed through government subsidy		Government sector
5. NPOs serving households, mainly financed through household subsidy		Nonprofit sector

As far as the first category is concerned, i.e. NPOs producing market goods/services, this type actually refers to those organisations which provide goods/services at more or less commercial prices (i.e. at prices which more or less cover the cost of production), subject to a profit distribution constraint. The latter means that these organisations are according to their statutes not allowed to distribute profits made, if any, to their owners or founders, which makes them in this respect different from ordinary businesses; as such they are generally being considered a particular kind of non-profits.

In practice, they may include organisations such as: educational institutions, hospitals, day-care centers etc. In spite of the fact that these organisations differ from business, the SNA assigns them to the corporate sector; supposingly, because many of their economic characteristics are similar to those of the business sector.

The second category, i.e. NPOs serving business, refers to those NPOs which have been established to promote interests of the business sector. These organisations include employers associations, chambers of commerce, laboratories etc. They are mainly financed by dues, membership fees, and contributions. As the SNA considers these forms of financing as payments for (market) services rendered, they are being included in the corporate sector.

The third category, i.e. NPOs serving government, refers to those organisations that, while having a legal status of their own, have been created by government for the purpose of rendering certain services to government, e.g. research activities. Because the activities of this kind of organisations is financed through governmental subsidies and contributions, the SNA incorporates them in the government sector.

The fourth category, i.e. NPOs serving households while being mainly financed through government subsidy, refers to those NPOs which provide services to households which are mainly (or fully) paid for by government. In practice, this category includes schools, hospitals and other health institutions, welfare organisations and cultural institutions as run by private bodies, while being government financed. Because of the way in which the activities of these NPOs are being financed, the SNA includes them in the government sector.

The fifth category, i.e. NPOs serving households while being mainly financed through household subsidy, refers to those NPOs which provide services to households, and which are mainly (or fully) financed by households, i.e. through donations, contributions, membership fees etc. Analytically, this category may be seen as being composed of two sub-groups, i.e. (1) organisations which render services primarily to their own members; (2) organisations which render services primarily to others, i.e. non-members.



The first sub-group includes churches and religious bodies; trade unions; consumer associations; political parties; social, recreational and sports clubs. The second sub-group includes basically organisations involved in charitable, relief and aid activities. All organisations belonging to either of the two sub-groups as described here, are according to the SNA being classified as forming part of the nonprofit sector (i.e. the sector 'Private Non-profit Institutions serving Households'), provided they employ at least two full-time employees. Those organisations which fail to satisfy this latter criterion, are according to the SNA to be included in the household sector.

From the above presentation of the main categories of NPOs as distinguished in the SNA, and their classification by institutional sector, it will be clear, that the latter is primarily based on the way in which the different categories are being financed. Those types which cover their expenditure mainly or wholly through sales at commercial prices are being included in the corporate sector; those which cover them mainly/wholly through government subsidies are being included in the government sector; while those covering them mainly/wholly through household subsidies are included in the nonprofit sector (provided they meet the employment criterion).

The concrete implication of the classification proposed in the SNA will now be clear as well. Only certain types of all those organisations which are considered NPOs are being classified as belonging to the nonprofit sector, while many other types 'disappear' either in the corporate sector, the government sector, or the household sector. If national accounts provide no additional data on the NPO components as incorporated in the various sectors, a comprehensive overview of the entire NPO sector (and its components) in terms of various economic aggregates cannot be obtained. The latter will have no doubt rather far reaching implications for research geared towards NPS. Summing up the above situation in the words of Anheier, Rudney and Salamon (1992, p.17): '...the SNA treatment represents an understatement of the nonprofit sector in terms of organisations which may produce market as well as non-market services for social purposes.' They add to this: 'Nonprofits are often viewed as institutions established for social purposes. Social policy and other societal considerations as well as economics play an important role.'

After the question of sectoring of NPOs in the SNA, brief mention may now be made of the recommendations by the SNA re the valuation of output of NPOs. This may facilitate our appreciation of some of the data to be presented by us later, i.e. those on value added and final consumption expenditure. This, because the definition of these latter measures involves the output concept.

With regard to the output of those NPOs which sell their goods and services at market prices, valuation should be done at the actual market price. However, in the alternative case of NPOs providing their output below market prices, i.e. free or at nominal charges only, the (gross) output is according to the SNA

to be valued at the cost of production. The latter is defined equal to the sum of the intermediate consumption of goods and services, compensation of employees (gross wages and salaries, including allowances, contributions to social security schemes, to pension funds etc. paid by the employer, consumption of fixed capital, and indirect taxes (if applicable)).

Elsewhere (c.f. van Heemst, 1991, p. 5) we have pointed to the fact that this cost-of-production-based output measure considers only those labour inputs used in the production process for which compensation has been paid (i.e. compensation of employees). As such, this measure ignores the use of those labour inputs which have been rendered voluntarily, i.e. without remuneration. Consequently one could argue, that in particular in those cases in which the provision of free labour services plays a significant role, the cost-of-production-based output measure may result in serious underestimation of the actual size of output. This may apply especially to NPOs belonging to categories 4. and 5., i.e. NPOs serving households financed by government, and NPOs serving households financed by households, as these categories are being known in particular for their reliance on voluntary labour.

Value added is, in general, defined as the difference between the gross output value and the value of the intermediate inputs used in the production process.

In the case of NPOs selling their output at market prices a residual (which may be positive or negative), i.e. operating surplus, will be obtained after deducting compensation of employees, consumption of fixed capital, and indirect taxes from value added. In other words, in this case value added will be equal to the sum of compensation of employees, consumption of fixed capital, indirect taxes, and operating surplus.

However, in the case of NPOs providing their output below market prices value added will be just equal to the sum of the first three components, i.e. compensation of employees, consumption of fixed capital, and indirect taxes. This because of the particular way in which output value has been defined in this case, as outlined above.

NPOs selling their output at market prices are, like enterprises in general, not supposed to have final consumption expenditure. NPOs which provide their output below market prices provide at least part of that output without payment by the users. Final consumption expenditure is supposed to be a measure of the value of that part of their output. It is calculated by subtracting the value of revenues from sales from the total output value.

Our earlier observation in relation to underestimation of output in the case of NPOs providing their output below market prices may be extended to the measures of value added and of final consumption expenditure. This, because the way in which these measures are calculated involves directly or indirectly the same component (i.e. compensation of employees) that causes underestimation of output.

### 3. THE DUTCH NATIONAL ACCOUNTS AND THE NONPROFIT SECTOR.

Since a number of years the national accounts of the Netherlands present accounts for sectors which are defined in terms of institutional units. The following institutional sectors are being distinguished: (1) non-financial enterprises; (2) insurance companies and pension funds; (3) credit institutions; (4) central government; (5) local government; (6) social security institutions; and (7) households (including unincorporated enterprises). A striking difference of the above institutional sector classification with the one proposed by the SNA is the complete absence of a sector referring to NPOs. This means that NPOs are in the Dutch system all being included in the various sectors distinguished, about which more will be said below. In passing it may be noted, that the consolidation of sectors (2) and (3) into one sector 'financial institutions', and furthermore the consolidation of sectors (4), (5) and (6) into one sector 'general government' would yield a classification similar to that of the SNA at the primary level, the only remaining difference being the absence of a separate NPO sector.

In Table 1 some data for the above sectors and for the economy as a whole are presented on value added (gross at factor costs, and net at factor costs), final consumption expenditure, and saving (net). These data, which apply to 1985, provide the basis for the contextual framework within which we will carry out the analysis of our NPO data. It may be noted that the row 'imputed banking services' does not refer to a real sector, but has been included only for the purpose of consistency between the sectoral value added data and those for the economy. Table 2 gives data resulting from a rearrangement made by us of the data in Table 1. This rearrangement, made for purposes of analytical simplicity, basically involves the consolidation of the sectors 'non-financial enterprises', 'insurance companies and pension funds', and 'credit institutions' into one single sector 'enterprises', and in addition the consolidation of the sectors 'central government', 'local government', and 'social security institutions' into a single sector 'general government'. The data in this table provide the actual frame of reference for our numerical analysis to be presented below.

As far as the assignment of NPOs to the various institutional sectors distinguished in the Dutch national accounts is concerned CBS follows largely the SNA guidelines summarized in section 2., except for NPOs serving households that are mainly financed from households subsidies. Thus, those types of NPOs which cover their expenditure basically through sales at commercial prices are being included in the relevant enterprises (sub-)sector, as are those NPOs which render services in the interest of business. NPOs which cover their expenditure mainly through government subsidies (whether they serve government or households) are being included in the relevant government (sub-)sector. However, the NPOs which cover their expenditure mainly through household subsidies are not included in the nonprofit sector as in the SNA,

TABLE 1  
SOME AGGREGATES FOR THE DUTCH ECONOMY AND ITS INSTITUTIONAL SECTORS, 1985

Data in current prices; billions of guilders.

	VALUE ADDED GROSS, F.C.	VALUE ADDED NET, F.C.	FIN. CONS. EXPEND.	NET SAVING
ECONOMY TOTAL	388.92	342.71	319.79	57.06
Non-financial Enterprises	261.39	229.51	-	18.37
Insurance comp. & Pension funds	3.64	3.52	-	0.42
Credit institutions	16.25	15.40	-	4.75
Central government	16.46	15.92	26.27	-3.64
Local government	32.01	29.32	37.47	0.76
Social security Funds	2.19	2.12	3.14	3.36
Households	73.80	63.74	252.91	33.04
Imputed bank services	-16.82	-16.82	-	-

Source: data derived from "Nationale Rekeningen 1992", CBS, 1993

TABLE 2

SOME AGGREGATES FOR THE DUTCH ECONOMY AND ITS INSTITUTIONAL SECTORS, 1985:  
RE-GROUPINGS INTO THREE MAIN SECTORS

Data in current prices; billions of guilders.

	ECONOMY	ENTERPRISES	GOVERNMENT	HOUSEHOLDS
VALUE ADDED GROSS, F.C.	388.92	264.46	50.66	73.80
VALUE ADDED NET, F.C.	342.71	231.61	47.36	63.74
FINAL CONSUMPTION EXPENDITURE	319.79	0.00	66.88	252.91
SAVING NET	57.06	23.54	0.48	33.04

Source: Data derived from Table 1

since such sector is not being distinguished. Instead, these NPOs are being included in the household sector.

Because all NPOs are being assigned in principle to either one of the enterprise sub-sectors, to one of the government sub-sectors, or to the household sector, no separate data re macro-economic measures of the activities of this group of institutions can be obtained from the published accounts.

By using some unpublished data on NPS as a basis for making some estimates of output, value added, and final consumption expenditure for this sector and its sub-sectors, we may nevertheless get some idea of its relative size, as this is now hidden in the official accounts.

The data, on which our calculations are based, and which were provided to us by CBS, refer to current income and expenditure of different kinds of NPOs in 1985. The different kinds of organisations distinguished in this connection basically follow a kind of activity classification, concerning more in particular different kinds of services in the fields of health care, education, welfare, and recreation. By considering for each activity the average revenue composition of the group of NPOs included in that activity, CBS assigns that group to one of the institutional sectors distinguished. A basic assumption here is, that the average revenue composition of the group is representative for that of the individual organisations that form part of the group concerned. In a few cases groups may be split-up into sub-groups, i.e. when strong diversities in income composition exists, after which the sub-groups will be assigned to different institutional sectors. In addition to using direct data on income composition for allocating groups of NPOs to institutional sectors, other information that gives indications on the main source of income (e.g. data on legal status) may be used as well.

In Table 3 some aggregate data on income and expenditure are being given for different groupings of NPOs. The data for these groupings, which have been derived from the unpublished data obtained by us from CBS, are being presented under headings which refer to an institutional sectoring. As all NPOs together may be seen as forming an institutional sector (i.e. NPS) in its own right - although not being recognised as such in the national accounts of the Netherlands - , this sector may be broken down into sub-sectors on the basis of assignment of the NPOs to main institutional sectors according to Dutch national accounting practices. The sub-sectoring as referred to in Table 3 should be understood in those terms. It may be noted, however, that while the different groupings as defined in the above manner should in the first place be understood as sub-sector of NPS, they may at the same time analytically be interpreted as representing sub-sectors of the main institutional sectors distinguished in the Dutch national accounts.

Of the four NPS sub-sector groupings for which data have been presented in Table 3 the meaning of three of them, i.e. 'NPO -

TABLE 3

SOME DATA ON CURRENT INCOME AND EXPENDITURE FOR DIFFERENT NPO SUB-SECTORS  
AND THE AGGREGATE NPO SECTOR, 1985

Billions of guilders					
	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
CURRENT REVENUES					
Sales	23.56	1.55	0.60	0.55	26.26
Transfers	0.75	12.58	2.32	0.09	15.74
Other	..	..	..	..	..
TOTAL	24.31	14.13	2.92	0.64	42.00
CURRENT EXPENDITURES					
Salaries	13.30	7.60	1.00	0.25	22.15
Fees	1.46	0.03	0.06	0.31	1.86
Interm. purch.	6.58	4.38	1.25	0.00	12.21
Depreciation	1.25	0.81	0.22	0.05	2.33
Interest	1.34	0.63	0.01	0.05	2.03
Transfers	0.09	0.50	0.27	0.0	0.86
Taxes	..	..	..	..	..
Other	..	..	..	..	..
TOTAL	24.02	13.95	2.81	0.66	41.44

NPO ENT = NPO - ENTERPRISES SUB-SECTOR

NPO GOV = NPO - GOVERNMENT SUB-SECTOR

NPO HH = NPO - HOUSEHOLDS SUB-SECTOR

NPO ? = NPOS UNCLASSIFIED

NPO ALL = AGGREGATE NPO SECTOR

Source: unpublished data, CBS.

TABLE 4

INCOME/EXPENDITURE CATEGORIES AS A PERCENTAGE OF TOTAL INCOME/EXPENDITURE  
DATA FOR DIFFERENT NPO SUB-SECTORS AND THE AGGREGATE NPO SECTOR, 1985

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
CURRENT REVENUES					
Sales	96.91	10.97	20.55	85.94	62.52
Transfers	3.09	89.03	79.45	14.06	37.48
Other	..	..	..	..	..
TOTAL	100.00	100.00	100.00	100.00	100.00
CURRENT EXPENDITURES					
Salaries	55.37	54.48	35.59	37.88	53.45
Fees	6.08	0.22	2.14	46.97	4.49
Interm. purch.	27.39	31.40	44.48	0.00	29.46
Depreciation	5.20	5.81	7.83	7.58	5.62
Interest	5.58	4.52	0.36	7.58	4.90
Inc. transfers	0.37	3.58	9.61	0.00	2.08
Taxes	..	..	..	..	..
Other	..	..	..	..	..
TOTAL	100.00	100.00	100.00	100.00	100.00

NPO ENT = NPO - ENTERPRISES SUB-SECTOR  
 NPO GOV = NPO - GOVERNMENT SUB-SECTOR  
 NPO HH = NPO - HOUSEHOLDS SUB-SECTOR  
 NPO ? = NPOS UNCLASSIFIED  
 NPO ALL = AGGREGATE NPO SECTOR

Source: Table 3



enterprises', 'NPO - government', and 'NPO - households' should be clear in the light of what has been remarked above<sup>(4)</sup>. A fourth grouping, i.e. 'NPO - ?' refers to a (relatively small) group of NPOs of which the institutional sector allocation was undecided at the time we obtained the NPO data from CBS.

From the data in Table 3 it will be clear, that the sub-sector 'NPO-enterprises' is the largest one in terms of current income and expenditure, followed by 'NPO-government'. The sub-sector 'NPO-households' appears to be rather small. For completeness' sake it should be pointed out however, that the data as presented in the table not necessarily cover all current income and expenditure of the various sub-sectors, but rather the main categories only.

In Table 4 we have expressed the different income and expenditure categories as percentages of total income and expenditure respectively. As might have been expected, the income of 'NPO-enterprises' is almost entirely made up of revenues from sales. If the sales in absolute terms (see Table 3) are compared to the sum of the current expenditures (ignoring transfer payments), a clear relationship appears to exist between cost of production and sales. In other words: costs of production are more or less covered by sales.

In the cases of 'NPO-government' and 'NPO-households' on the other hand sales play a minor role only. Transfers appear to be the main income component in these cases. Although this income category has not been further broken down according to origin, it may be assumed, that in the former case most of it comes from government, while in the latter case from households.

It is worth noting that for 'NPO-households' the percentage of transfer payments made is considerably larger than for the other sub-sectors. This finding is not surprising, however. It underscores the nature of the kinds of NPOs which one may expect to find in this sector, such as churches, charitable organisations, and relief/aid organisations. For these bodies transfer payments may assume significant dimensions.

Before proceeding to section 4. we would like to conclude this section by making an important observation in relation to the coverage of the NPS data in Table 3. More specifically the point to be made here concerns the fact that these data do not include income and expenditure of government-financed private education, i.e. education which is being provided through schools managed by private bodies, albeit being almost fully financed by government. These bodies are in most cases religion-based (i.e. denominationally-rooted) associations and foundations. In fact the larger part of primary and secondary education in the Netherlands is provided on this basis, although the degree of autonomy of the governing bodies is debatable, considering the extensive legislation and regulation re educational matters and the heavy dependence on government finance. Because of the limited autonomy of these organisations, CBS defines government-financed private education as part of the government sector,

TABLE 5  
SOME DATA ON CURRENT INCOME AND EXPENDITURE OF GOVERNMENT-FINANCED  
PRIVATE EDUCATION, 1985

	Absolute (Bill. of guild.)	In percentages of totals
CURRENT REVENUES		
Sales	0.43	3.07
Transfers (government)	13.55	96.85
Interest	0.01	0.07
Other	..	..
TOTAL	13.99	100.00
CURRENT EXPENDITURES		
Salaries	10.93	73.40
Interm. purch.	2.88	19.34
Depreciation	0.92	6.18
Interest	0.10	0.67
Transfers	0.00	0.00
Taxes (indirect,net)	0.06	0.40
Other	..	..
TOTAL	14.89	100.00

Source: unpublished data, CBS.

together with those schools run by the state itself. This explains why the data in Table 3 are exclusive of this kind of NPO-managed education.

However, since it could be argued that in spite of limited autonomy this kind of education formally belongs to NPS (see also E. James, 1989), we will present in our calculations in section 4. some alternative estimates which include government-financed private educational institutions. As such, two concurrent NPS concepts will be used, i.e one which is exclusive of government-financed private education, and one in which this is included. The income and expenditure data presented in Table 5 serve as the basis for extending NPS in terms of national accounts aggregates, this kind of aggregates being the subject of our analysis in the next section. We will for obvious reasons include government-financed private educational institutions (which receive according to Table 5 about 97% of their income from government) in the sub-sector 'NPO-government'.



#### 4. SOME FURTHER CALCULATIONS.

In this section we will shed some more light on the question of the relative size - measured in terms of certain national accounting aggregates - of NPS and its sub-sectors in the case of the Netherlands. These aggregates concern more in particular: gross value added at factor costs; net value added at factor costs; final consumption expenditure; and saving (net). The value added measures give an indication of the primary incomes generated in production activities; the final consumption expenditure gives an indication of the value of output provided without charge, while the savings give an indication of the part of current income that is available for investment purposes. Unfortunately, data did not allow us to present estimates on actual investments made.

We will begin our analysis by presenting estimates in absolute terms for 1985 of these aggregates for NPS as a whole, as well as for each of the sub-sectors (see Table 6). In fact, two data sets will be presented, i.e. one referring to the narrowly defined NPS (version A), and another one referring to the broadly defined NPS (version B). These data have been derived from the income and expenditure data presented in tables 3 and 5. We will proceed by analysing first the role of the various sub-sectors in NPS as a whole by looking at the shares of the sub-sectoral aggregates in those for the entire NPS (see Table 7). Next we will establish how the values of the aggregates for the sub-sectors and for the entire sector relate to the aggregates for the economy (see Table 8). This will give us some idea of the macro-economic significance of NPS and its sub-sectors. Finally we will examine the shares of the sub-sectors in the main institutional sectors to which the former are being assigned according to Dutch national accounting practices (see Table 9), in order to assess the contribution of NPS sub-sectors to the main institutional sectors.

While the meaning of the data presented in Table 6 will be clear, a few words may be said about the way in which the data were calculated from the data in Tables 3 and 5, while following the SNA guidelines. The gross value added of the sub-sector 'NPO - enterprises' has been obtained by deducting the sum of intermediate purchases and fees paid to professionals from the value of sales, the former component representing intermediate consumption, the latter gross output<sup>(5)</sup>. In the case of the other sub-sectors gross value added was estimated as the sum of salaries and depreciation. Obviously, net value added is being obtained by deducting the depreciation value from the gross value added estimate.

Final consumption expenditure has been defined equal to zero in the case of 'NPO - enterprises', while in the case of the other sub-sectors this aggregate has been estimated by deducting revenues from sales from the gross output value. The latter item was calculated as the sum of intermediate purchases, fees paid to professionals, salaries, net indirect taxes, and depreciation. Finally, savings (net) have been calculated as the difference

TABLE 6

SOME AGGREGATES FOR DIFFERENT NPO SUB-SECTORS AND FOR THE ENTIRE NPO SECTOR,  
1985

Data in current prices; billions of guilders.

VERSION A (NPO GOV and NPO ALL exclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
VALUE ADDED GROSS, F.C.	15.52	8.41	1.22	0.30	25.45
VALUE ADDED NET, F.C.	14.27	7.60	1.00	0.25	23.12
FINAL CONSUMPTION	0.00	11.27	1.93	0.06	13.26
SAVING NET	0.29	0.18	0.11	-0.02	0.56

VERSION B (NPO GOV and NPO ALL inclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
VALUE ADDED GROSS, F.C.	15.52	20.26	1.22	0.30	37.30
VALUE ADDED NET, F.C.	14.27	18.53	1.00	0.25	34.05
FINAL CONSUMPTION	0.00	25.63	1.93	0.06	27.62
SAVING NET	0.29	-0.72	0.11	-0.02	-0.34

NPO ENT = NPO - ENTERPRISES SUB-SECTOR

NPO GOV = NPO - GOVERNMENT SUB-SECTOR

NPO HH = NPO - HOUSEHOLDS SUB-SECTOR

NPO ? = NPOS UNCLASSIFIED

NPO ALL = AGGREGATE NPO SECTOR

Source: derived from unpublished CBS data

TABLE 7

**AGGREGATES FOR DIFFERENT NPO SUB-SECTORS AS PERCENTAGES OF THE AGGREGATES  
FOR THE ENTIRE NPO SECTOR, 1985**

VERSION A (NPO GOV and NPO ALL exclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
VALUE ADDED GROSS, F.C.	60.98	33.05	4.79	1.18	100.00
VALUE ADDED NET, F.C.	61.72	32.87	4.33	1.08	100.00
FINAL CONSUMPTION	0.00	84.99	14.56	0.45	100.00
SAVING NET	51.79	32.14	19.64	-3.57	100.00

VERSION B (NPO GOV and NPO ALL inclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
VALUE ADDED GROSS, F.C.	41.54	54.32	3.27	0.80	100.00
VALUE ADDED NET, F.C.	41.84	54.42	2.93	0.73	100.00
FINAL CONSUMPTION	0.00	92.80	6.99	0.22	100.00
SAVING NET	-85.29	211.76	-32.35	5.88	100.00

NPO ENT = NPO - ENTERPRISES SUB-SECTOR  
 NPO GOV = NPO - GOVERNMENT SUB-SECTOR  
 NPO HH = NPO - HOUSEHOLDS SUB-SECTOR  
 NPO ? = NPOS UNCLASSIFIED  
 NPO ALL = AGGREGATE NPO SECTOR

Source: derived from table 6

between current revenues and current expenditures.

The percentage data in Table 7 give indications of the significance of the different sub-sectors within NPS. If one looks at the value added data in relation to version A the prominent position of the sub-sector 'NPO - enterprises' in primary income generation by NPS is clear. Over 60 percent is being generated in this sub-sector. 'NPO - government' is responsible for about 33%, and 'NPO - households' for 5% only. If the same kind of comparison re roles in primary income generation is being made for version B a different picture can be observed. In this case the sub-sector 'NPO - government' assumes a first position (about 55%), while 'NPO - enterprises' comes second (contributing about 42%). Obviously, this is not surprising, considering the enlargement of 'NPO - government' in this version resulting from the inclusion of government-financed private education. As in version A, 'NPO - households' assumes here a modest role only in income generation.

As far as final consumption expenditure is concerned the data reveal the dominant share of 'NPO - government' in versions A (about 85%) and B (about 93%). The share of 'NPO - households' on the other hand is rather modest, although not quite insignificant. As observed earlier, final consumption expenditure of 'NPO - enterprises' has been defined equal to zero, so its percentage share in NPS equals zero as well.

With regard to the sub-sectoral shares in savings of NPS it may be noted that in the case of version A the largest contribution comes from 'NPO - enterprises' (i.e. over 50%), followed by 'NPO - government' (about 32%).

In the case of version B the data should be understood in the light of the fact that in this case the savings by 'NPO - government' as well as those for NPS as a whole are negative. The reason for this is to be found in relatively large negative savings for government-financed private education

The role of NPS and its sub-sectors in economy-wide terms may now be assessed by looking at the percentages presented in Table 8. These figures have been obtained by expressing the data from Table 6 as percentages of the corresponding data for the economy as presented in Table 2.

From the value added data for NPS as a whole it will be clear that its share in the generation of primary income is between 6 and 7 percent on the basis of version A. In relation to version B this share lies between 9 and 10 percent of the domestic income at factor costs. These figures clearly underline the significant role of NPS in the economy of the Netherlands.

In terms of the sub-sectors it appears that 'NPO - enterprises' is responsible for the generation of about 4% of the domestic income at factor costs, and 'NPO - households' for about 0.3%. The sub-sector 'NPO - government' generates over 2% in the case of version A, and 5% in the case of version B.



TABLE 8

**AGGREGATES FOR DIFFERENT NPO SUB-SECTORS AND THE ENTIRE NPO SECTOR AS  
PERCENTAGES OF THE AGGREGATES FOR THE ECONOMY, 1985**

VERSION A (NPO GOV and NPO ALL exclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
VALUE ADDED GROSS, F.C.	3.99	2.16	0.31	0.08	6.54
VALUE ADDED NET, F.C.	4.16	2.22	0.29	0.07	6.75
FINAL CONSUMPTION	0.00	3.52	0.60	0.02	4.15
SAVING NET	0.51	0.32	0.19	-0.04	0.98

VERSION B (NPO GOV and NPO ALL inclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH	NPO ?	NPO ALL
VALUE ADDED GROSS, F.C.	3.99	5.21	0.31	0.08	9.59
VALUE ADDED NET, F.C.	4.16	5.41	0.29	0.07	9.94
FINAL CONSUMPTION	0.00	8.01	0.60	0.02	8.64
SAVING NET	0.51	-1.26	0.19	-0.04	-0.60

NPO ENT = NPO - ENTERPRISES SUB-SECTOR  
 NPO GOV = NPO - GOVERNMENT SUB-SECTOR  
 NPO HH = NPO - HOUSEHOLDS SUB-SECTOR  
 NPO ? = NPOS UNCLASSIFIED  
 NPO ALL = AGGREGATE NPO SECTOR

Source: calculations based on data from tables 2 and 6

With regard to final consumption expenditure the table makes clear that the share of NPS in the economy-wide total amounts to over 4% in the case of version A, and to well over 8% in the case of version B. Evidently, this increase is to be attributed to the considerable final consumption expenditure involved in government-financed private education. The share of 'NPO - households' in final consumption expenditure for the economy as a whole is very modest, amounting to about 0.6%.

On the basis of version A savings of NPS represent about 1 percent of the total net national savings. The sub-sectors 'NPO - enterprises', 'NPO - government', and 'NPO - households' contribute about 0.5%, 0.3%, and 0.2% respectively. In the case of version B the percentages for 'NPO - government' and for NPS as a whole are negative as a result of the earlier mentioned negative savings in relation to government-financed private education.

The data presented in Table 9, finally, shed light on the relationship between NPS sub-sectors on the one hand, and the main institutional sectors on the other. These figures have been obtained by expressing the data from Table 6 as percentages of the corresponding sectoral data presented in Table 2.

With regard to primary income generation the value added data suggest that the sub-sector 'NPO - enterprises' contributes about 6% to all factor incomes generated in the main sector 'enterprises'. The sub-sector 'NPO - government' contributes over 16% to the main sector 'government' in the case of version A, and about 40% in the case of version B. Finally, about 1.6% of the factor incomes generated in the main sector 'households' stems from the sub-sector 'NPO - households'. Thus it may be concluded that the sub-sectors 'NPO - enterprises' and 'NPO - government' play a significant role in the primary income generation of the corresponding main sectors.

The share in final consumption expenditure of main sector 'government' by sub-sector 'NPO - government' amounts to some 17% in the case of version A, and to over 38% in the case of version B. In both cases these shares are considerable. On the other hand, the percentage share of final consumption expenditure by 'NPO - households' in that of the main sector 'households' is rather small, i.e. less than 0.8%.

The sub-sector 'NPO - enterprises' makes a relatively small contribution to the total savings of main sector 'enterprises', i.e. a little over 1%. Even smaller is that of 'NPO - households' in relation to the main sector 'households', namely about 0.3%. In contrast with this the contribution of sub-sector 'NPO - government' to the total savings of main sector 'government' should be considered large, at least in the case of version A, where it amounts to over 37%. The negative figure in the case of version B should of course be explained from the negative savings associated with government-financed private education.

TABLE 9

**AGGREGATES FOR THREE NPO SUB-SECTORS AS PERCENTAGES OF THE AGGREGATES FOR  
THE CORRESPONDING THREE MAIN SECTORS OF THE ECONOMY, 1985**

VERSION A (NPO GOV exclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH
VALUE ADDED GROSS, F.C.	5.87	16.60	1.65
VALUE ADDED NET, F.C.	6.16	16.05	1.57
FINAL CONSUMPTION	-	16.85	0.76
SAVING NET	1.23	37.50	0.33

VERSION B (NPO GOV inclusive of government-  
financed private education)

	NPO ENT	NPO GOV	NPO HH
VALUE ADDED GROSS, F.C.	5.87	39.99	1.65
VALUE ADDED NET, F.C.	6.16	39.13	1.57
FINAL CONSUMPTION	-	38.32	0.76
SAVING NET	1.23	-150.00	0.33

NPO ENT = NPO - ENTERPRISES SUB-SECTOR  
 NPO GOV = NPO - GOVERNMENT SUB-SECTOR  
 NPO HH = NPO - HOUSEHOLDS SUB-SECTOR  
 NPO ? = NPOS UNCLASSIFIED  
 NPO ALL = AGGREGATE NPO SECTOR

Source: calculations based on data from tables 2 and 6



## 5. SUMMARY AND CONCLUSIONS

In the above presentation reference has been made to the SNA guidelines re institutional sectoring, as well as to the classification of NPOs in this connection. Also, some observations were made with respect to the way in which gross output, value added, and final consumption expenditure of NPOs may be measured according to the SNA guidelines.

Next, the results of some calculations were presented, based on data for the Netherlands, with the purpose to give indications of the relative size of NPS and its sub-sectors in the year 1985<sup>(6)</sup>. It was demonstrated in several ways that NPS plays a significant role in the case of the Netherlands, at least in terms in primary income generation and final consumption expenditure. It was furthermore shown, that in particular the sub-sectors 'NPO - enterprises' and 'NPO - government' are responsible for the role of NPS in this connection.

However, as was outlined above, the institutional sectoring adopted in the national accounts of the Netherlands makes no explicit reference to NPOs as a separate institutional sector. Consequently, with regard to primary income generation it is not possible to identify that in terms of version A about 6.5%, or in terms of version B about 9.5%, of value added at factor costs has been generated by NPS. A similar problem exists for example with regard to final consumption expenditure, the contribution of NPS being over 4% in terms of version A, or 8.5% in terms of version B.

Although the SNA sectorization does distinguish a separate NPO sector, it was pointed out that this concerns a very limited sector concept, i.e. including only certain types of NPOs. It was argued that this boils down in concrete terms to inclusion of only those NPOs which cover their expenditure mainly through subsidies from households, provided they employ at least two full-time employees. On the other hand, those organisations which cover their expenditure basically through sales at commercial prices should be included in the corporate sector, while those which cover them mainly through government subsidies should be included in the government sector.

Assuming that the sub-sectors 'NPO - enterprises' and 'NPO - government' in the case of the Netherlands are being composed more or less in accordance with these SNA classification guidelines, application of the SNA sectorization would mean that still the larger part of primary income generation by NPS, or of final consumption expenditure by NPS, would remain 'hidden'. This can easily be seen from Table 8. Taking for example the gross value added, of the total contribution of NPS of about 6.5% (version A) approximately 5.2% has been generated by 'NPO - enterprises' and 'NPO - government.' As these sub-sectors should be included among 'enterprises' and 'government' respectively, their joint contribution of 5.2% (in the case of version B amounting even to 8.2%) would disappear. Similar conclusions

could be drawn with regard to final consumption expenditure.

The above examples illustrate in numerical terms the implications of the treatment of NPOs according to the SNA guidelines re sectoring and classification for the analysis of NPS. While this is an illustration for only one particular case, its conclusion may have a wider application. This, because it may be assumed that the macro-economic importance of NPS in general, and of its sub-sectors 'NPO - enterprises' and 'NPO - government' in particular, is in a number of other cases comparable to that of the Netherlands.

Finally it may be noted, that the above analysis of the contribution of NPS to various macro-economic aggregates has been based essentially on the SNA definitions of these concepts. As such, it did not consider voluntarily provided labour inputs. In case that would have been done, our findings might have pointed to an even more prominent position of NPS, at least according to certain measures.

\* NOTES

- (1) In this connection The John Hopkins Comparative Nonprofit Sector Project may be cited as an example of a more recently started larger scale research project aimed at making a systematic effort to analyze the scope, structure, financing, and role of the private nonprofit sector in a cross-section of countries around the world (c.f. L.M. Salamon and H.K. Anheier, 1992 - A).
- (2) A full discussion on the definition and deliniation of NPS is beyond the scope of this paper. A clear presentation of this subject can be found in L.M. Salamon and H.K. Anheier (1992 - B)
- (3) Institutional sectors are composed of institutional units. An institutional unit is - in accordance with the SNA - defined as an economic entity which is capable, in its own right, of owning assets, incurring liabilities and engaging in economic activities and in transactions with other entities.
- (4) Among the kinds of organisations included in the sub-sector 'NPO - enterprises' are the following: general hospitals; mental hospitals; institutions for the mentally handicapped; day-care institutions; nursing homes; certain categories of para-medical services; certain categories of homes for aged persons.  
Among the kinds of organisations included in the sub-sector 'NPO - government' are the following: certain categories of medical and health services; certain categories of homes for aged persons; social services; cultural activities/services; professional organisations; employers organisations.  
Finally, among the kinds of organisations included in the sub-sector 'NPO - households' are the following: churches and other kinds of religious organisations; charitable organisations; sports clubs; trade unions.
- (5) Strictly speaking the value added concept as obtained in this way is in terms of market prices. Since no data on net indirect taxes are available, the equivalent at factor costs cannot exactly be calculated. However, assuming net indirect taxes to be relatively insignificant, the obtained estimate may be considered a proxy for value added at factor costs in this particular case.
- (6) In view of the provisional character of the NPS data, the calculations based on them should be considered as tentative only. In fact, they should be seen as no more than just rough indications of the relative size of NPS in the case of the Netherlands.





\* BIBLIOGRAPHY

H.K. Anheier, G.R. Rudney and L.M. Salamon (1992), The Nonprofit Sector in the United Nations System of National Accounts: Definition, Treatment, and Practice. Working Paper No. 4, The John Hopkins Comparative Nonprofit Sector Project, Institute of Policy Studies, John Hopkins University.

Centraal Bureau voor de Statistiek (1993), Nationale Rekeningen 1992, SDU/CBS, Den Haag/Voorburg

J. van Heemst (1991), The Treatment of the NGO Sector in the National accounts: Guidelines, Empirical Evidence, and some Related Issues. ISS Working Paper Series No. 115, Institute of Social Studies.

E. James, (1989), The Private Provision of Public Services: a Comparison of Sweden and Holland, in E. James (ed.): The Non-Profit Sector in International Perspective, Oxford University Press, New York.

L.M. Salamon and H.K. Anheier (1992 - A), Towards an Understanding of the International Nonprofit Sector. Working Paper No. 1, The John Hopkins Comparative Nonprofit Sector Project, Institute of Policy Studies, John Hopkins University.

L.M. Salamon and H.K. Anheier (1992 - B), In Search of the Nonprofit Sector I: The Question of Definitions. Working Paper No. 2, The John Hopkins Comparative Nonprofit Sector Project, Institute of Policy Studies, John Hopkins University.

United Nations (1968) A System of National Accounts. UN, New York.

United Nations (1992) Revised System of National Accounts - Draft. UN Secretariat, New York

