

ICP 1980—A BRIEF ACCOUNT FROM AUSTRIA

BY A. FRANZ AND R. SCHWARZL

Austrian Central Statistical Office

This paper discusses Austria's experiences in connection with the 1980 round of the UN International Comparison Project, in which comparisons were first made within regions and the regions then linked. Austria played a dual role, as (a) the linking country between Group I (the European Community) and Group II (selected middle and eastern European countries), and (b) the base country for Group II. The paper consists of two principal parts. The first part reports, at the 3-digit commodity level, on the success achieved in finding comparable items, both within Group II and between Austria and Group I. The second part discusses a number of methodological problems that were encountered in carrying out the comparison. Chief among these was the treatment of social services that are marketed in some countries and provided free of charge or at nominal prices in others. Other questions touched upon include the treatment of output for own consumption, rents, drugs and medicines, and tourist expenditures.

A. PRELIMINARY REMARKS

The design of ICP 1980 ("Phase IV") differs from previous rounds (Phases I through III) as the worldwide comparison is now being implemented on the basis of self-contained regional comparisons.¹ The European region in its turn is composed of two subregions which differ widely as regards the nature of the economies covered and the methodology of comparison. The one, much larger subregion comprises those countries for which comparisons are made under the auspices of the Statistical Office of the European Communities (SOEC), on regular terms (*Group I*). The other subregion comprises a smaller group of countries, a part of which belongs to the eastern hemisphere (*Group II*. Austria, Finland, Hungary, Poland, Rumania, Yugoslavia).

Within and between these two groups a double function falls on Austria in that it acts as the base country for group II and as the bridge country between group I and group II. To accomplish the latter function Austria had to fully participate in the SOEC comparison. Accordingly, like in a clearinghouse, a lot of information and experience accumulates in Austria which is not easily available elsewhere. This is supported by the assignment of further functions in the field of methodological standardization, which exceed the genuine base or reference country's function (namely to provide prices of representative items and perhaps to check the prices reported for comparability). Although, due to the multilateral comparison concept of the Geary-Khamis methodology, the base country influence so characteristic for traditional star-concepts is not felt within the whole ICP framework there is still a star-situation in existence within group II. In addition, the wider responsibilities of the base country, which are reflected in the elaboration of some methodological contributions as well as in assistance in their application, may also be considered in the context of what a base/reference country contributes under present circumstances to the final outcome. However,

¹As a matter of fact, this concept follows from what is going on in the various regions actually, but has not been enacted so far through an official set of world wide guidelines.

by far the most important feature is, without any doubt, the degree to which Austria succeeds in providing sufficient representative price material to enable other group II participants to find matching items in their country; and at the same time, in providing fully equivalent price data for the comparison within the SOEC framework.

Therefore, in describing and analysing Austria's function from the point of view of the possible dependence of the final outcome on the base country's contributions three main features may be taken into account: base country bias, methodological contributions and efficiency of assistance in price collection.

This paper concerns the more qualitative aspects of the efficiency of the price material provided by Austria for Group I and Group II, respectively, and of the methodological conventions and solutions in the field of non-market transactions and related activities; issues of the quantitative base country bias due to index concepts must be excluded because of still missing final results. A practice-oriented presentation is given, rather than a full account of all possible ramifications and theoretical implications. There is broad unanimity of statisticians that empirical issues of comparability and of certain conventions adopted in the so-called comparison-resistant fields are of major importance as regards the final outcome. This paper may be understood as one contribution to such concerns.

B. THE USE OF PRICE INFORMATION PROVIDED BY AUSTRIA

Table I shows the number of representative items for which prices have been provided by Austria (Groups I, II) and used by other countries of group II. The number of items which have been uniformly employed within group II and between group I and group II is also indicated. These figures are also compared with original ICP 1975 target numbers. From this it becomes immediately evident where there have been difficulties in finding a sufficiently broad basis for the price comparison either in the relation of Austria to SOEC (group I), within group II, or between the two groups.

It should be noted here that the degree of equivalence (identity) of the representative items is generally poorer within group II (as it is in ICP as a whole) as compared with the much more homogeneous group I. However, even where the primary description was met no mechanical approach of accepting the items submitted seemed acceptable because of possibly inherent substantial qualitative differences. Therefore, the subjective element of comparability is inevitably higher in the group II context (but it still seems to be of relevance in group I).

For group I the descriptions of the representative items had to be accepted by Austria as they stood, without possibility of adaptation; in this respect Austria faced a situation even worse than the group II countries did because there was almost no possibility of subsequent adaptation. The descriptions of the representative items proposed for pricing in group II were specified first with a view to meeting ICP 1975 standards but were adapted to European circumstances wherever useful. In many instances the original proposals of Austria were bilaterally adapted later on in order to enable the items to be used. Accordingly, the cross-section comparability is somewhat limited even if the "same" item

TABLE I
THE USE OF PRICE INFORMATION PROVIDED BY AUSTRIA

Summary	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
1. Food, beverages and tobacco	67	283	167	291	156	191	127	133	77	11	74	25
2. Clothing and footwear	51	75	64	153	119	138	130	78	37	7	22	20
3. Gross rents, fuel and power	8	44	29	39	25	16	13	23	15	—	3	1
4. Furniture, furnishings household equipment and operation	36	301	126	148	100	111	90	70	40	2	6	14
5. Medical care and health expenses	11	1,236	316	27	15	22	16	23	19	2	7	11
6. Transport and communication	21	121	83	46	42	39	30	38	35	2	16	8
7. Recreation, entertainment, education and cultural services	20	107	78	109	53	67	47	38	25	3	12	12
8. Miscellaneous goods and services	17	77	62	61	44	54	45	33	27	4	18	10
Total	231	2,244	925	874	554	638	498	436	275	31	158	101

TABLE 1 (cont.)

1. Food, Beverages and Tobacco	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every 11 Country	Group I Items Reported by at Least One 11 Country	Group II Items Reported by Every 11 Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi-lateral List	Items Reported	Items reported								
111. Bread and cereals	10	39	23	37	18	20	14	23	11	—	5	1
112. Meat	11	39	30	81	37	48	24	23	8	—	7	1
113. Fish	3	24	14	17	11	10	8	9	5	—	8	2
114. Milk, cheese, eggs	3	30	15	30	15	15	17	12	5	—	5	2
115. Oils and fats	4	9	7	11	6	5	5	5	4	—	2	2
116. Fresh fruits and vegetables	11	28	17	20	18	20	15	16	9	6	15	7
117. Fruits, vegetables other than fresh	4	25	17	28	15	21	11	11	7	1	6	2
118. Potatoes	1	5	2	4	2	3	1	2	2	1	2	1
119. Sugar	1	5	3	2	1	2	1	1	1	—	2	—
120. Coffee, tea, cocoa	3	9	8	9	5	6	6	4	3	—	5	—
121. Other food	6	18	13	18	13	15	9	12	5	2	8	3
131. Non-alcoholic beverages	1	5	4	7	4	6	3	2	2	1	4	1
132. Alcoholic beverages	5	36	11	22	9	17	11	9	11	—	5	3
141. Cigarettes	2	6	2	3	2	3	1	3	2	—	—	—
142. Other	2	5	1	2	—	—	1	1	2	—	—	—
Total Food, Beverages and Tobacco	67	283	167	291	156	191	127	133	77	11	74	25

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
2. Clothing and Footwear												
211. Material for clothing	9	4	4	22	21	21	18	16	3	—	—	3
212. Outer clothing other than fur and leather	16	34	27	58	48	49	50	25	11	4	13	5
213. Hosiery, underwear and night wear	10	12	8	27	16	25	22	13	5	1	2	3
214. Leather clothing and furs	2	—	—	3	3	3	3	2	1	—	—	1
215. Other clothing and textiles	4	5	5	14	9	11	11	6	3	—	1	1
216. Hire of clothing, repair to clothing other than footwear	3	3	3	4	4	4	4	3	1	1	1	1
221. Footwear	6	15	15	23	16	23	20	12	13	1	3	6
222. Repair to footwear	1	2	2	2	2	2	2	1	—	—	2	—
Total Clothing and Footwear	51	75	64	153	119	138	130	78	37	7	22	20

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
3. Gross Rents, Fuel and Power												
311. Gross rents	— ^a	20	12	13	10	—	—	12	8	—	—	—
312. Expenditure of tenants on indoor repair and upkeep	3	9	6	8	5	7	6	6	2	—	1	1
321. Electricity	1	4	3	4	2	4	1	—	1	—	—	—
322. Gas	1	5	3	5	2	—	—	1	—	—	—	—
323. Liquid fuels	1	2	2	3	1	1	2	2	3	—	2	—
324. Firewood, charcoal, peat, etc.	1	1	1	1	—	1	1	1	—	—	—	—
325. Coal, coke and other solid fuels	1	3	2	4	4	3	2	1	1	—	—	—
326. Purchased heat	—	—	—	1	1	—	1	—	—	—	—	—
Total Gross Rents, Fuel and Power	8	44	29	39	25	16	13	23	15	—	3	1

^aOther methodology

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
411. Furniture and fixtures	4	119	10	20	16	17	12	11	6	—	—	3
412. Floor coverings	2	6	3	7	3	3	3	3	—	—	—	—
421. Household textiles	6	17	14	24	12	14	10	8	6	—	1	1
431. Refrigerators, freezers, cooling appliances	2	19	11	5	1	2	2	2	4	—	—	—
432. Washing appliances	1	17	10	5	3	3	2	2	3	—	—	—
433. Cooking appliances	2	7	3	6	4	5	3	3	—	—	—	—
434. Heating appliances other than cooking	2	6	2	7	5	6	6	5	—	—	—	—
435. Cleaning appliances	1	6	5	3	2	3	1	1	2	—	—	—
436. Other major household appliances	1	26	21	3	2	3	3	1	1	—	—	—
437. Washing machine repair	—	—	—	1	1	1	1	1	—	—	—	—
441. Glassware	4	8	6	8	4	6	4	3	1	—	—	1
442. Tableware		3	—	5	4	3	5	2	2	—	—	—
443. Cutlery and flatware		6	4	5	5	4	4	3	1	1	2	1
444. Cooking utensils		8	1	7	5	5	6	5	1	—	—	1
445. Other household utensils		19	11	12	9	10	10	5	3	—	—	2
451. Non-durable household goods	8	28	19	23	20	22	15	12	9	1	1	5
452. Domestic services	1	1	1	1	1	1	1	1	—	—	—	—
453. Household services	2	5	5	6	3	3	2	2	1	—	2	—
Total Furniture, Furnishings, Household Equipment and Operation	36	301	126	148	100	111	90	70	40	2	6	14

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
Multi- lateral List		Items Reported	Items reported									
5. Medical Care and Health Expenses												
511. Drugs and medical preparations	7	1,221	309	20	11	16	10	18	18	2	5	11
512. Medical supplies	2	4	4	5	3	4	4	3	1	—	1	—
521. Eyeglass lenses	} 2 {	5	1	1	1	1	1	1	—	—	1	—
522. Earphone		6	2	1	—	1	1	1	—	—	—	—
Total Medical Care and Health Expenses	11	1,236	316	27	15	22	16	23	19	2	7	11

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
611. Passenger cars	— ^a	34	28	—	10	10	1	12	8	—	4	—
612. Other	2	19	9	3	3	4	1	2	1	—	—	—
621. Tires, tubes, other parts and accessories	2	11	7	6	4	4	4	4	1	—	—	—
622. Repair charges	3	14	8	5	3	—	5	5	4	—	1	—
623. Gasoline, oils, greases	2	6	5	3	2	3	2	3	3	—	—	2
624. Other expenditures	2	5	4	3	1	1	1	1	—	—	2	—
631. Local transport	2	10	6	6	4	1	3	3	4	—	3	1
632. Long distance transport	3	8	3	9	4	7	3	2	4	—	1	—
633. Miscellaneous purchased transport	1	3	2	1	1	—	—	1	—	—	1	—
641. Postal communication	2	5	5	4	4	3	4	1	4	1	3	1
642. Telephone and telegraph	2	6	6	6	6	6	6	4	6	1	1	4
Total Transport and Communication	21	121	83	46	42	39	30	38	35	2	16	8

^aOther methodology

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
7. Recreation, Entertainments Education and Cultural Services												
711. Wireless, TV-sets, gramophones	4	25	15	23	8	11	7	6	3	—	—	—
712. Major durables for recreation, enter- tainment and cultural purposes	3	28	18	28	6	8	6	6	2	—	—	2
713. Other recreational goods	4	39	31	34	21	29	20	16	9	1	7	3
721. Public entertainment	3	3	3	7	6	7	5	4	5	1	1	3
722. Other entertain- ment, religious, recreational and cultural services	3	5	4	11	7	6	5	1	3	—	1	1
731. Books, newspapers, magazines and other printed matter	3	7	7	6	5	6	4	5	3	1	3	3
Total Recreation, Entertainment, Education and Cultural Services	20	107	78	109	53	67	47	38	25	3	12	12

TABLE 1 (cont.)

	ICP 1975	GROUP I		GROUP II						Group I Items Reported by Every II Country	Group I Items Reported by at Least One II Country	Group II Items Reported by Every II Country
		SOEC	A	A	P	H	R	YU	SF			
	Target Numbers	1980		1980								
		Multi- lateral List	Items Reported	Items reported								
8. Miscellaneous Goods and Services												
811. Services of barber and beauty shops	2	2	2	5	3	5	5	3	1	—	2	—
812. Goods for personal care		31	23	12	9	11	11	8	7	—	—	3
821. Jewelry, watches etc	7	5	5	3	3	2	1	2	2	1	2	1
822. Other personal goods		17	10	3	2	3	1	1	3	—	2	1
823. Writing and drawing equipment and supplies	2	6	6	7	6	5	4	4	1	—	3	—
831. Restaurants and cafes	4	11	11	21	13	20	19	10	11	3	7	5
832. Hotel and lodging	1	3	3	7	6	6	4	4	1	—	1	—
861. Classified ad	1	1	1	1	1	1	—	1	—	—	—	—
862. Funerals		1	1	1	—	1	—	—	—	—	—	—
863. Photocopying	—	1	1	1	1	—	—	—	1	—	1	—
Total Miscellaneous Goods and Services	17	77	62	61	44	54	45	33	27	4	18	10

appears as having been used by more than one country.² Thus bilateral comparability with the base country's proposal has been given preference over multilateral comparability, which is in line with the basic idea of the star concept.

Table 1 refers to private consumption³ only because the above-mentioned limitations of cross-section comparability in the field of producers' durables are much more serious and the final data are not yet available. The numerical outcome may, though, give an interesting picture of the width of the potential comparison basis offered by Austria and its actual application in practice.

C. METHODOLOGICAL QUESTIONS WITH PARTICULAR INVOLVEMENT OF AUSTRIA

In this section some particular conceptual solutions proposed or supported by Austria are presented. Most important for the practical implementation of the project is the solution in the "comparison-resistant" field of social services. This is therefore dealt with here in more detail.

1. *Comparison of Social Services: The Concept of "Coincident" Categories*

a. Introduction

Within the whole range of final expenditure comparison the problems arising in the field where certain social services like health, education, welfare services etc. (SNA: "non-market services") are normally produced stand out, for two reasons mainly⁴:

(1) The individual transactions involved are often not easy to identify, and even if individual transaction prices can be identified they may not adequately reflect costs.

(2) The institutional circumstances in the field where these services normally occur differ widely among countries. This applies all the more when countries with different socio-economic systems and equivalently differing statistical systems (SNA/MPS) are to be compared.

The method of selecting representative items for price or quantity comparison of such services depends on the solution chosen for reconciling the different institutional circumstances.

The Austrian proposals may be considered an attempt to provide practically acceptable guidance in a difficult and often controversial area, by means of a few basic conventions, reference to presently available and useful classifications, and use of feasible statistical techniques. The original proposal, which covered the whole activity range where non-market services may occur, has recently been adopted in principle, but no separate identification has been envisaged for ISIC 932 (Research and scientific institutes), 9332 (Veterinary services), and 9391 (Religious organisations); 9414 (Theatrical etc. services) are to be treated on a market basis.

²Such individual adaptations are not counted separately in Table 1 so that the figures show, in fact, whether use has been made of a "bundle" of proposals for one individual item, or no use has been made of that item by a country at all.

³Excluding consumption in institutions of medical care and education.

⁴A further more incidental peculiarity is the frequent lack of sufficiently reliable data, particularly as regards services of private non-profit bodies.

b. The Concept of Exclusiveness/Coincidence of Sector Production

The present proposal proceeds from the idea that for any (group of) providers of the services concerned there may be a *production account* available which depicts the input and output flows of such production. In the case of non-market producers, which do not provide their services on a profit making basis, no operating surplus can occur. Instead, there is a *residual* output (SNA: “services produced for own use/consumption”) which can be identified by reference to the producing *unit as a whole* only. This is the reason why, within the context of final expenditure, consumption of those services is (as a sort of “alien” element) defined by reference back to production. Therefore, the necessary level is “establishment”, the necessary classification is “by activity”. It is just this relation to *production* of the services and the nature of the underlying statistical units (*producers*) which suggests the present solution.

In most countries there are certain *activity* categories where market producers are the only or, at least, preponderant type while in other categories market and non-market producers occur *simultaneously*, and a third group is reserved for non-market activities only. This situation of in part parallelism, in part exclusiveness is not directly reflected in mere activity classifications, like ISIC.⁵ It becomes obvious only when additional criteria are introduced through reference to certain notions of “sector” classification (SNA: enterprise, government, private non-profit), the sector representing an aggregate of units likely to provide their output on a uniform economic basis (e.g. profitability). Also, on the level of *goods and services* classification, similar criteria may be applied to individual sales (SNA: commodity or non-commodity) or other output elements to identify their market or non-market nature.

Although not expressed completely explicitly the SNA seems to assume some correspondence between certain activities and the respective “*sector*.” Accordingly, the activity of public administration and defence is reserved to government “by definition.” A series of other activities is reserved to business (“industries”), also by definition (irrespective of possible non-market elements, e.g. in the utilities). The few remaining categories only are conceived of as being susceptible to market *and* non-market production. Such a conventional solution provides a useful means of *basically structuring the whole range of activities*.

Roughly referring to ISIC the overall situation outlined above appears as follows:

11. Agriculture etc.	}	exclusively market producers
: :		
82. Real Estate etc.	}	exclusively non-market producers
91. Public Administration and Defence		
92. Sanitary and Similar Services	}	coincident market and non-market producers
93. Social and Related Community Services		
94. Recreational and Cultural Services		
95. Personal and Household Services		exclusively market producers ⁶

⁵International Standard Industrial Classification, Series M, No. 4, Rev. 2, U.N., New York 1968.

⁶Domestic services included in 95 are qualified as non-market in SNA. However, since they comprise wages only their treatment is not affected by this qualification.

The *coincident* categories are most interesting here while the other ones serve as a means of definition of what is included in addition, or what is not included at all.

According to the above basic structure it is possible to establish a meaningful concept of comparison between similar countries as regards market and non-market activities in that *both types are merged in the coincident categories* (and only there). All the more will such a combination of market and non-market production enable comparisons to be made between countries which differ just in the institutional arrangements of the coincident categories. However, such a concept requires an adequate solution of the valuation problem (basis) and carefully detailed selection of the coincident categories (homogeneity).

c. The Concept of Total Costs

To adequately combine market and non-market activities of the coincident categories a common basis of valuation must be introduced. This is easily achieved by referring to the *cost (input) side* of the production account of both the market and the non-market components of coincident categories as well as of exclusively non-market activities. In the case of market producers operating surplus (if any) will be covered by total costs.

To ensure international comparability of this valuation basis any *subsidies* have to be taken into account in that their deduction from the indirect taxes entry (if any) in the production account is removed.⁷ This applies to output-related subsidization as well as to current covering of operating deficits (=negative operating surplus). The total costs concept affects the determination of expenditure data and the determination of prices of the representative items as well. As regards SNA the above proposal of treatment of subsidies entails a divergence from the common concept of Gross Domestic Expenditure, which is net of subsidies. The difference is made up by subsidies received by producers classified with the coincident (and exclusively non-market) categories.

Besides subsidies there are other adjustments, too, which prove necessary, in order to avoid *double counting*. It is likely that non-market services are almost always absorbed by final demand. This is not so clear for the market component of the coincident categories. In any case, such outputs (SNA commodity and/or non-commodity sales) included in the *intermediate consumption* of others have to be taken into account *by deduction* from total costs.⁸

On the other hand, sales type output of coincident or exclusively non-market producers included in *final demand* elsewhere (mainly households) has to be eliminated therefrom, instead of from total costs.⁹

⁷Subsidies apply to commodity sales and, if based otherwise, to the enterprise sector only.

⁸If there have been subsidies added to the cost side they would have to be added proportionately to such deductible output for intermediate use.

⁹However, as regards representative items no particular reference would be suggested at all with a view to any of the above adjustments, except total costs basis.

The structure of the primary data set for the coincident categories (e.g. ISIC 931) is as follows:

Market	Non-market	Total
Gross output	Gross output	Gross output
- Output (sales receipts) absorbed elsewhere by intermediate consumption	- Output (sales receipts) absorbed elsewhere by intermediate consumption	- Output (sales receipts) absorbed elsewhere by intermediate consumption
+ Subsidies	-	+ Subsidies
<u>Gross output adjusted</u>	<u>Gross output adjusted</u>	<u>Gross output adjusted</u>
Memo required for deduction from final demand, in order to avoid double counting: Sales receipts from final demand	Sales receipts from final demand	Sales receipts from final demand

For the selection of the coincident categories ISIC served as the basic reference. In order to avoid misidentification of a coincident situation (which possibly veils a partly underlying situation of exclusiveness) a sufficient degree of detail of classification has been aimed at, namely the *ISIC four-digit level* which is the most detailed breakdown available. As pointed out above major divisions 1 through 8 and division 95 are market throughout and can therefore be omitted here. On the other hand division 91 (public administration and defence) is exclusively non-market, by definition. Only the remaining divisions 92 through 94 have to be examined more closely, in Table 2.

TABLE 2
COINCIDENT AND MARKET CATEGORIES OF ISIC DIVISIONS 92-94

	ISIC	Sector Specification
92	920 Sanitary and Similar Services	coincident
93	<i>Social and Related Community Services</i>	
	931 9310 Education services	coincident
	932 9320 Research and scientific institutes	coincident
	933 Medical, dental and other health and veterinary services	
	9331 Medical, dental and other health services	coincident
	9332 Veterinary services	coincident
	934 9340 Welfare institutions	coincident ^a
	935 9350 Business, professional and labor associations	non-market
	939 Other social and related community services	
	9391 Religious organizations	non-market
	9399 Social and related community services n.e.c.	non-market
94	<i>Recreational and Cultural Services</i>	
	941 Motion picture and other entertainment production	
	9411 Motion picture production	market
	9412 Motion picture distribution and projection	market
	9413 Radio and television broadcasting	market
	9414 Theatrical producers and entertainment services	coincident
	9415 Authors, music composers and other independent artists etc.	market
	942 9420 Libraries, museums, botanical and zoological gardens and other cultural services n.e.c.	coincident ^a
	949 9490 Amusement and recreational services n.e.c.	coincident

^aIn most instances these will be non-market.

d. Basic Concepts of Deriving Price Ratios in the Field of Non-Market Services

Two main approaches may be used for non-market services either exclusively or, more often, simultaneously: an input price approach and a quantity comparison approach.

The *input price approach* may refer either to *individual input units* if they are considered sufficiently representative of intermediate input flows (e.g. wages of certain employee categories), or to such flows in the aggregate, converted by appropriate price indices derived from other parts of the comparison (*input price index method*).

Quantity comparison relates to identifiable quantities of output (or input) if the prices charged are not really comparable (e.g. nominal fees), or to some quantity notions which do not lend themselves to being priced at all but may be accepted as a basis of comparison because of a lack of other suitable data (e.g. numbers employed; bed days in the case of inpatient health care).

The problem inherent in any quantity comparison is the likely neglect of quality differences. Input approaches (either price or quantity) suffer in addition, from the likely omission of productivity differences.¹⁰

For the selection of the representative items to be converted two basic requirements are to be aimed at, namely national *representativeness* and international *comparability*. Unfortunately, these will often conflict so that more approximate solutions are sometimes unavoidable. Accordingly, parallel recommendations have often been made to enable countries to choose the most suitable solution. No uniform methodology can be applied, therefore; pragmatic *ad hoc* solutions may be a more typical situation.

The present international recommendations on classification of occupations, education and economic activities have been consulted in describing the individual items.

As regards the adjustments described above it seems advisable first to convert *total costs* (adjusted for subsidies if any = gross output plus subsidies) by its components and then to adjust the outcome for the respective deductions (i.e. sales receipts absorbed elsewhere by intermediate consumption). That way the deductions are implicitly converted by the overall price ratios of each activity.

2. Some Other Questions

a. Consumption of Own Production

This is a long known field of controversy and estimating problems in the national accounts and it is so in international comparisons too. While almost negligible in highly industrialized countries consumption of own production is still of significant importance at least in some group II countries for households of farmers. Two main difficulties require careful specification of the procedure to be adhered to: quality differences between countries and between market and

¹⁰*Price comparison*, the method used in the field of final expenditure on market goods in other than coincident and exclusively nonmarket categories, is ruled out here as a consequence of the basic concept. Non-commodity sales of non-market producers could serve as a basis of comparison only if the procedure of price determination is sufficiently similar in the countries concerned, presumably a rather exceptional case.

own account consumption and (2) basic differences between countries in the units to be valued (e.g. prices of meat versus whole animals).

As regards quality, in Austrian experience prices averaged over market and own-account transactions as suggested by ICP are not an appropriate basis of comparison. Specific weights and specific representative items are needed for this field. In order to overcome data difficulties both problems can be solved simultaneously by a compromise solution where weights are based on producers' prices while ppp could be drawn from related market consumption but may be adjusted for possible quality differences bilaterally, if there is no comparable information available on representative items of own account consumption.

b. Gross Rents

In socialist countries expenditure for rents is often substantially subsidized, so that actual outlays of consumers do not reflect production costs. An adjustment of rent subsidies is accordingly proposed in ICP, and should be taken into account in the expenditure weights as well as in the specification of prices for the representative items. On the other hand, comparable rents have to be *imputed* for owner-occupied dwellings. Accordingly these imputed rents must also be adjusted for the subsidy element in both the level and the ppp calculation, for reasons of symmetry. Even if the comparison of levels is directly based on quantities (e.g. m² per apartment of certain categories of dwelling) this problem cannot be avoided since in the ppp calculations the subsidization must be taken into account wherever such programmes apply. The problem may possibly assume more general importance if there are certain other areas where subsidization plays a major role. However, ICP rules are quite positive in this respect and it seems not desirable to introduce too many elements of deviation from the basic concepts. Despite this, an *indication of substantial subsidization* can help to judge the suitability of the prices reported, and such additional indication has therefore been requested by Austria.

c. Expenditure Categories 5.1¹¹ and 5.2¹² of Private Final Consumption

In these categories the expenditure of private households and of social security institutions are combined. Often the prices of social security purchases are different from (lower than) prices paid by private households (e.g. quantity discount). For such differences an adjustment has been proposed which, however, applies to the ppp ratios only.

d. Domestic Concept

In order to arrive at the domestic concept specific additions/subtractions have to be introduced when proceeding from final expenditure aggregates. This refers in particular to the adjustments for *foreign tourism*. Obviously the adjustments should be made to all categories affected by them, in full classification detail. (This is done by Austria, where tourism is of substantial importance.) No special provision is required as regards representative items. Similar problems

¹¹Drugs and medical preparations, medical supplies.

¹²Therapeutic appliances and equipment.

arise with respect to the merchandise balance. Here the traditional ICP convention may seem more feasible, i.e. converting the balance by official exchange rates. Such conversion is not without ambiguity, however, in the case of the socialist countries, because of the poor significance of official exchange rates. This situation still requires some explicit arrangement.