

ANNEX I

INTRODUCTION TO THE INPUT-OUTPUT FRAMEWORK

A supply table shows goods and services, classified by type of product, that an economy (i.e., a country) can get either because they have been produced by domestic activities or they have been imported, whereas a use table shows how those goods and services are used in the economic system (i.e., intermediate inputs, final consumption, investment, and exports). The use table also shows the components of gross value added by activity, including compensation of employees, other taxes less subsidies on production, consumption of fixed capital and net operation surplus. By doing so, it allows knowing the cost structure of national industries (Eurostat, 2008). Additionally, an IOT¹ displays the relations between homogeneous products and components of the final demand in an economy under the assumption that each product is produced by a single activity (product technology assumption) (Eurostat, 2008).

Both SUTs and IOTs are accounted in monetary units. However, there are some nuances. Supply tables are compiled in basic prices², including a valuation matrix which allows to transform total supply by product at basic prices into purchasers' prices³. Use tables are compiled in purchasers' prices. The *INE* also publishes use tables at basic prices. This transformation from purchaser's prices to basic prices is needed for the construction of IOTs, which are entirely accounted at basic prices.

1. IOTs published by the *INE* are *product by product* kind of (INE, 1999).

2. The basic price is defined as "the price receivable by the producer from the purchaser for a unit of good or services produced as output minus any tax payable on that unit as a consequence of its production or sale (i.e. taxes on products), plus any subsidy receivable on that unit as a consequence of its production or sale (i.e. subsidies on products). It excludes any transport charges invoiced separately by the producer. It includes any transport margins charged by the producer on the same invoice, even when they are included as a separate item on the invoice" (EUROSTAT, 1996).

3. The purchasers' price is defined as "at the time of purchase, the producer's price is the price the purchaser actually pays for the products; including any taxes less subsidies on products (but excluding deductible taxes like VAT on products); including any transport charges paid separately by the purchaser take delivery at the required time and place" (EUROSTAT, 1996).

ANNEX II

FIGURE AII.1.

Products involved in the agri-food system by type of classification.

Years	1980	1985-1994	1995-1999	2000-2007	2008-2009	2010-2015	2016
Classification	R43	R56	CNPA-96	CNPA-96	CPA 2008	CPA 2008	CPA 2008
System of Accounts	ESA 1979	ESA 1979	ESA 1995	ESA 1995	ESA 1995	ESA 2010	ESA 2010
AGRICULTURAL, STOCKBREEDING, FORESTRY AND FISHING (ASFF) PRODUCTS			(1) Cropping products	(1) Cropping products	(1) Cropping products		(1) Cropping products
		(010) Cropping, livestock	(2) Livestock breeding products	(2) Livestock breeding products	(2) Livestock breeding products	(1) Cropping, livestock breeding and related services	(2) Livestock breeding products
	(01) Cropping, livestock breeding	breeding and fishing	(3) Services related to cropping and livestock breeding	(3) Services related to cropping and livestock breeding	(3) Services related to cropping and livestock breeding		(3) Services related to cropping and livestock breeding
	and fishing products	products	(4) Forestry products	(4) Forestry products	(4) Forestry products	(2) Forestry products and related services	(4) Forestry products
			(5) Fishing products	(5) Fishing products	(5) Fishing products	(3) Fishing products and related services	(5) Fishing products and related services
FOOD PRODUCTS	(15) Meat products	(310) Meat products	(16) Meat products	(16) Meat products	(11) Meat products		(11) Meat products
	(16) Milk products	(330) Milk products	(17) Milk products and ice-cream	(17) Milk products and ice-cream	(12) Milk products		(12) Milk products
			(18) Fats and vegetable oils	(18) Fats and vegetable oils	(13) Fats and vegetable oils		(13) Fats and vegetable oils
	(17) Other food products	(350) Other food products	(19) Animal feed	(19) Animal feed	(14) Animal feed	(5) Food products, beverages, and tobacco	(14) Animal feed
			(20) Other food products	(20) Other food products	(15) Other food products		(15) Other food products
	(18) Beverages	(370) Beverages	(21) Alcoholic beverages	(21) Alcoholic beverages	(16) Alcoholic beverages		(16) Alcoholic beverages
			(22) Non-alcoholic-beverages	(22) Non-alcoholic-beverages	(17) Non-alcoholic-beverages		(17) Non-alcoholic-beverages
	(19) Tobacco products	(390) Tobacco products	(23) Tobacco products	(23) Tobacco products	(18) Tobacco products		(18) Tobacco products
FOOD AND ACCOMMODATION SERVICES	(29) Food and accommodation	(590) Food and accommodation	(68) Accommodation services	(68) Accommodation services	(73) Accommodation services	(36) Food and accommodation services	(73) Accommodation services
			(69) Food services	(69) Food services	(74) Food services		(74) Food services

Source: based on the input-output framework (INE, a)

FIGURE AII.2
Activities involved in the agri-food system by type of classification.

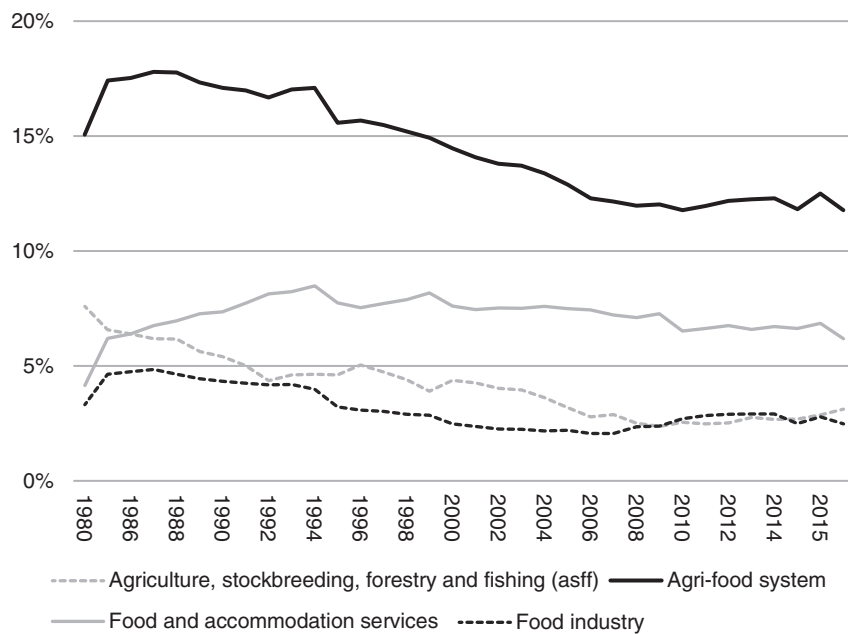
Years	1980	1985-1994	1995-1999	2000-2007	2008-2009	2010-2015	2016
Classification	R43	R56	CNAE-93	CNAE-93	NACE Rev. 2	NACE Rev. 2	CNAE 2009
System of Accounts	ESA 1979	ESA 1979	ESA 1995	ESA 1995	ESA 1995	ESA 2010	ESA 2010
AGRICULTURE, STOCKBREEDING, FORESTRY AND FISHING (ASFF)	(01) Cropping, livestock breeding and fishing	(010) Cropping, livestock breeding and fishing products	(1) Cropping, livestock breeding and hunting (2) Forestry (3) Fishing	(1) Cropping, livestock breeding and hunting (2) Forestry (3) Fishing	(1) Cropping, livestock breeding and hunting (2) Forestry (3) Fishing	(1) Cropping, livestock breeding and hunting (2) Forestry (3) Fishing	(1) Cropping, livestock breeding and related services (2) Forestry (3) Fishing
FOOD INDUSTRY	(15) Meat products' industry	(310) Meat industry	(12) Meat industry	(12) Meat industry	(5) Meat industry	(5) Food products, beverages, and tobacco industries	(5) Meat products' industry
	(16) Milk industry	(330) Milk industry	(13) Milk industry	(13) Milk industry	(6) Milk industry		(6) Milk products' industry
	(17) Other food industries	(350) Other food industries	(14) Other food industries	(14) Other food industries	(7) Other food industries		(6) Other food industries
	(18) Beverage industry	(370) Beverage industry	(15) Beverage industry	(15) Beverage industry	(8) Beverage industry		(7) Beverage industry
	(19) Tobacco industry	(390) Tobacco industry	(16) Tobacco industry	(16) Tobacco industry	(9) Tobacco industry		(8) Tobacco industry
FOOD AND ACCOMMODATION SERVICES	(29) Food and accommodation services	(590) Food and accommodation services	(44) Food and accommodation services	(44) Accommodation services (45) Food services	(45) Accommodation services (46) Food services	(36) Food and accommodation services	(47) Accommodation services (48) Food services

Source: based on the input-output framework (INE, a).

ANNEX III

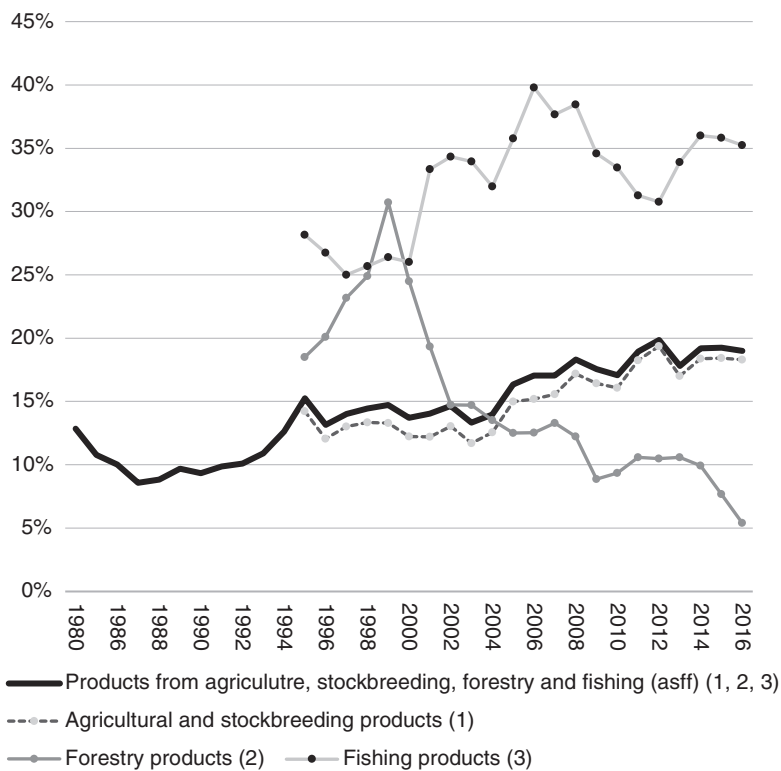
FIGURE AIII.1

Value added by group of activity (% of total economy), Spain 1980-2016



Source: based on data from the input-output framework (INE, a).

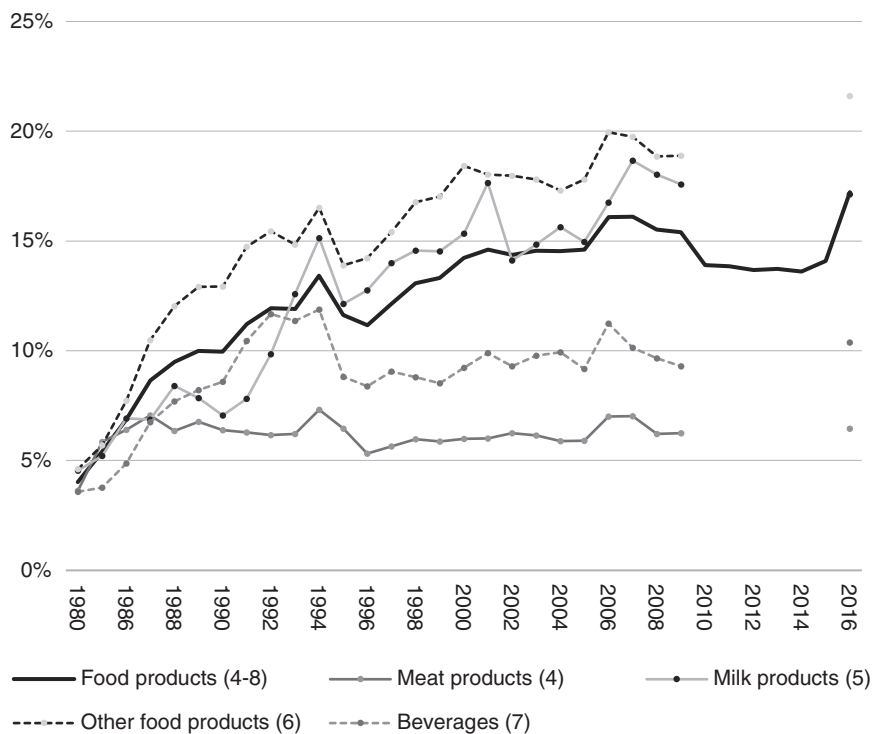
FIGURE AIII.2
Imports of *ASFF* products regarding total supply by category of product (in%),
Spain 1980-2016



Notes: Share of imports is calculated as the number of imported products in relation to its total supply by category of product.

Source: based on data from the input-output framework (INE, a).

FIGURE AIII.3
Imports of *food products* regarding total supply by category of product (in %),
Spain 1980-2016

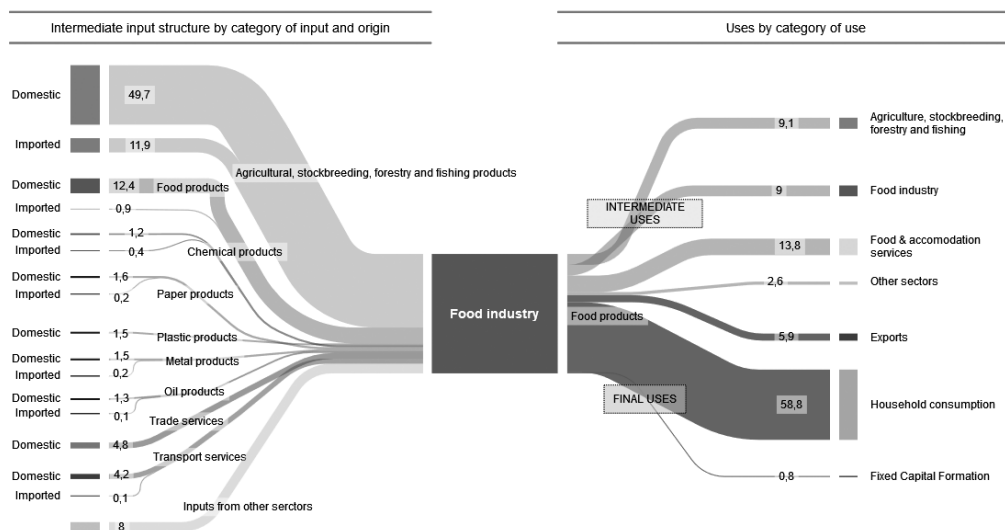


Notes: Share of imports is calculated as the number of imported products in relation to its total supply by category of product. *Food products* also includes category 8 (*Tobacco products*).

Source: based on data from the input-output framework (INE, a).

FIGURE AIII.4
Structure of intermediate inputs of *food industry* (in%) and of the subsequent intermediate or final uses of *food products* (in%), Spain 1980

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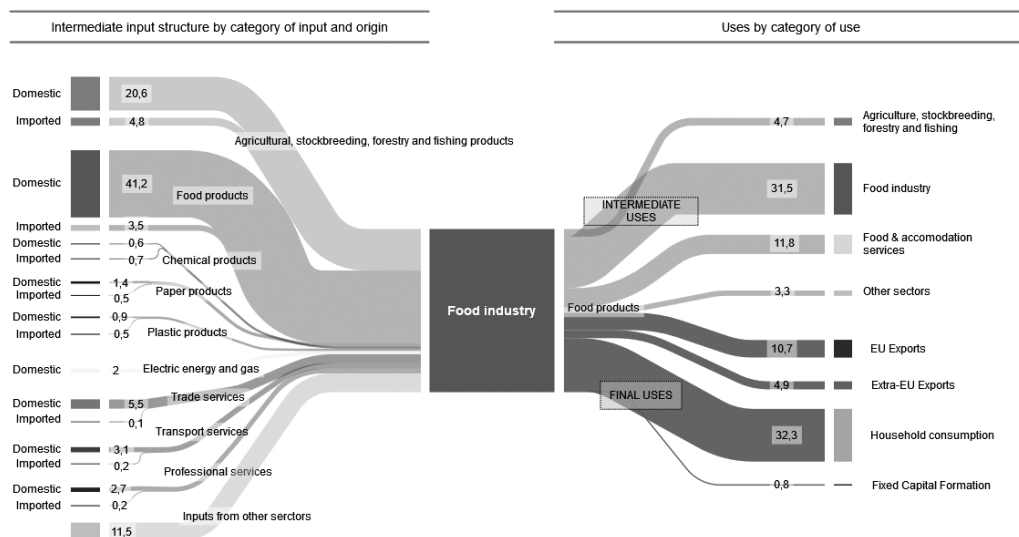
Notes: Data were collected from the input-output table at basic prices (million pesetas) 1980. The intermediate input structure shows the nine main categories of inputs in terms of weight.

Source: based on data from the input-output framework (INE, a).

FIGURE AIII.5

Structure of intermediate inputs of food industry (in%) and of the subsequent intermediate or final uses of food products (in%), Spain 2015

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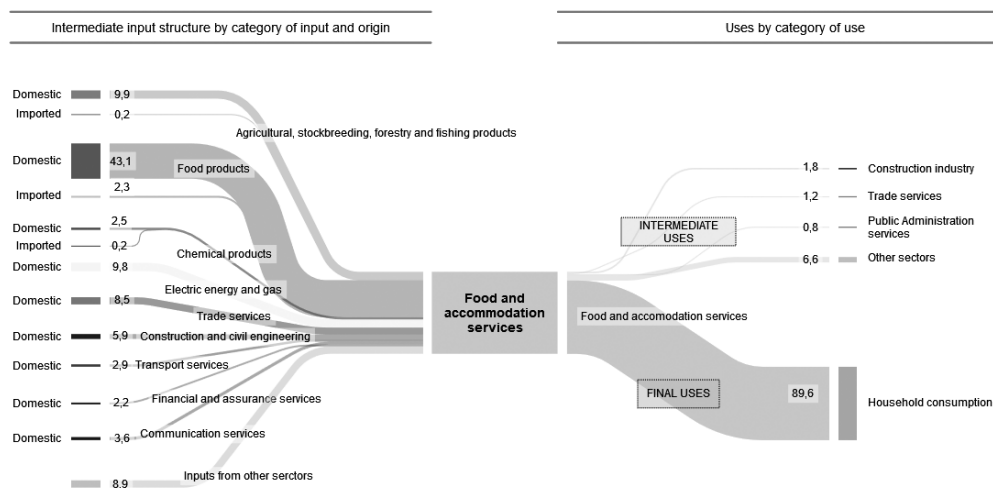


Notes: Data on the intermediate input structure (left side of the diagram) was collected from the input-output table of domestic production at basic prices (million euros) and the input-output table of imports at basic prices (million euros) of Spain, 2015. Data on the uses (right side of the diagram) were collected from the input-output table at basic prices of Spain, 2015. The intermediate input structure shows the nine main categories of inputs in terms of weight. *Trade services* include *wholesale services, except of motor vehicles and motorcycles* and *retail services, except of motor vehicles and motorcycles*. *Professional services* is made up of categories *other professional, scientific and technical services; veterinary services* and *security and research services; building and landscaping services; administrative and office services* and *other business services*.

Source: based on data from the input-output framework (INE, a).

FIGURE AIII.6
Structure of intermediate inputs of food and accommodation services (in%)
and of the subsequent intermediate or final uses of food
and accommodation services (in%), Spain 1980

created with www.sankeyflowshow.com

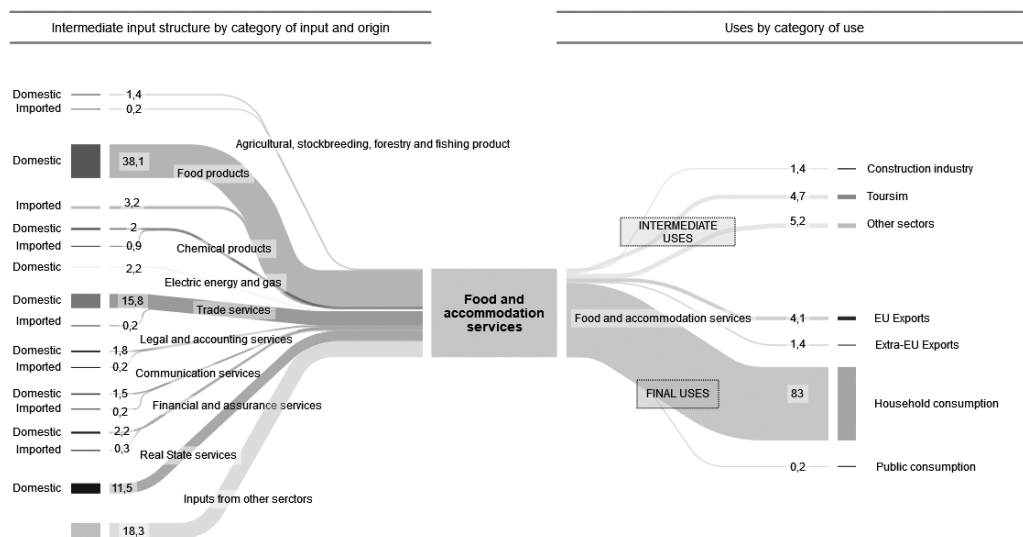


Notes: Data were collected from the input-output table at basic prices (million pesetas) 1980. The intermediate input structure shows the nine main categories of inputs in terms of weight.

Source: based on data from the input-output framework (INE, a).

FIGURE AIII.7
Structure of intermediate inputs of food and accommodation services (in%)
and of the subsequent intermediate or final uses
of food and accommodation services (in %), Spain 2015

created with www.sankeyflowshow.com



Notes: Data on the intermediate input structure (left side of the diagram) were collected from the input-output table of domestic production at basic prices (million euros) and the input-output table of imports at basic price (million euros) of Spain, 2015. Data on the uses (right side of the diagram) were collected from the input-output table at basic prices of Spain, 2015. The intermediate input structure shows the nine main categories of inputs in terms of weight. *Trade services* include categories *wholesale services, except of motor vehicles and motorcycles* and *retail services, except of motor vehicles and motorcycles*. The supply tables of 2015 do not show disaggregated data on *food services* and *accommodation services*. The supply table of 2016 at purchasers' prices shows it. Based on it, *food services'* output –as an activity– was 83 496 million euros (basic prices) and *accommodation services'* output –as an activity– was 28 609 million euros (basic prices). Thus, *food services* accounted for 74% of the aggregated value. *Food services'* output –as a product– was 90 161 million euros (purchasers' prices) and *accommodation services'* output –as a product– was 26 554 million euros (purchasers' price) in 2016. Thus, *food services* accounted for 77% of their aggregated. These figures can be used as proxy of the weight of each component in 2015.

Source: based on data from the input-output framework (INE, a)