

ELABORATION OF SUPPLY TABLES IN MOROCCO

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SUPPLY TABLE

PRODUCT	Trade Margins	+	TTM+ Taxes less subsidies	+	Output by Industry +	M =	Total supply
	Transport Margins						
	Non déductible VAT						
	- Subsidies on products						
	Other Taxes on products						
	Taxes on exports						
	Taxes on imports excluding VAT						
	industries' Output (basic prices)						
Imports							
TOTAL supply at purchaser's prices							
Total output							

Compilation of domestic production Matrix

- Using different data sources:
 - Surveys
 - Census
 - Administrative data
- Constructing “bridge” tables between the classifications used in the various datasets and the SUT categories,
- Converting the data from the original classifications into SUT categories

Challenges:

- Wrong classification in data sources of establishment according to “Moroccan classification of industry”
- Difficulties to breakdown the item "other products" reported in the surveys
- Lack of output’s detail by product for some establishments

Compilation of import's vector

- Data sources :
 - Customs statistics: import of goods according to HS classification
 - Balance of payments: for services imported
- Converting custom statistics by HS item into production classification
- Introducing CIF/FOB adjustment (from Balance of payments)
- Introducing adjustment for Direct Purchases Abroad by Residents (from Balance of payments: travel item)

Import duties

➤ Data sources :

- Customs statistics: Import duties are drawn directly from customs statistics
- The bridge table between HS and the product's classification adopted in SUT is used to present Import duties by SUT's product.

[import duties extract.xlsx](#)

Taxes on products excluding VAT

Domestic consumption tax (DCT) and others taxes

➤ Data sources:

- the Government budget
- Customs statistics

➤ the products concerned are limited and easily identifiable

- alcoholic beverages and lemonades
- cigarettes
- cement
- petroleum products

Subsidies on products

Data sources:

- the Government budget: total
- compensation fund: subsidies on:
 - sugar
 - flour
 - petroleum products: gasoline
- inter professional board for cereals and pulses: subsidies on wheat.

VAT channel through an example

Economic channel of Sugar (VAT 20%)	Importer	WHOLESALER	Retailer (with accounting)	Retailer (without accounting)	consumer
Purchases excluding VAT	10000	20000	15000	10000	45000
VAT on Purchases	2000	4000	3000	2000	6000
Sales excluding VAT	20000	25000	30000	15000	
VAT on sales	4000	5000	6000	0	
Recoverable VAT	2000	4000	3000	0	0
VAT received by the government	2000 = 4000 - 2000	1000 = 5000 - 4000	3000 = 6000 - 3000	2000	6000
	2000 + 1000 + 3000 + 2000 = 8000			2000 + 6000 = 8000	

Non-deductible VAT: Moroccan methodology

- VAT is an indirect tax that can be deducted by the companies that achieve a turnover exceeding a level determined by the tax code
- Households and informal units as well as government, NPISH can not deduct their VAT.
- Data sources:
 - government general budget: VAT collected by the Government (VAT on imports + VAT on domestic activities): **the total to have in SUT**
 - tax code: VAT's theoretical rate by product

Non-deductible VAT: Moroccan methodology

- General Directorate of Taxation:
 - VAT invoiced by companies classified by industry
 - VAT paid by those companies on their purchases for IC or GFCF purposes from domestic or external producers and the amount of VAT deductible for each purchase.
 - VAT deductible by these companies

[Formulaire de déclaration de la TVA.pdf](#)

Non-deductible VAT: Moroccan methodology

From « structural surveys » we have:

- Output of organised companies by industry and product (including VAT)

[questionnaire structure industrie 20-5-15 v01.pdf](#)

→ This structure is used to breakdown the VAT invoiced (from General Directorate of Taxation) by product (1)

- IC of Organised enterprises classified by industry and product (including VAT)
- And their GFCF by product (Including VAT)

→ We use these two structures to breakdown by product the invoiced and deductible VAT by industry given by the General Directorate of Taxation (2).

from (1) invoiced VAT by product and (2) deductible VAT by product

→ non deductible VAT by product to be adjusted to the total VAT received by government

Trade margins: Moroccan methodology

Data sources:

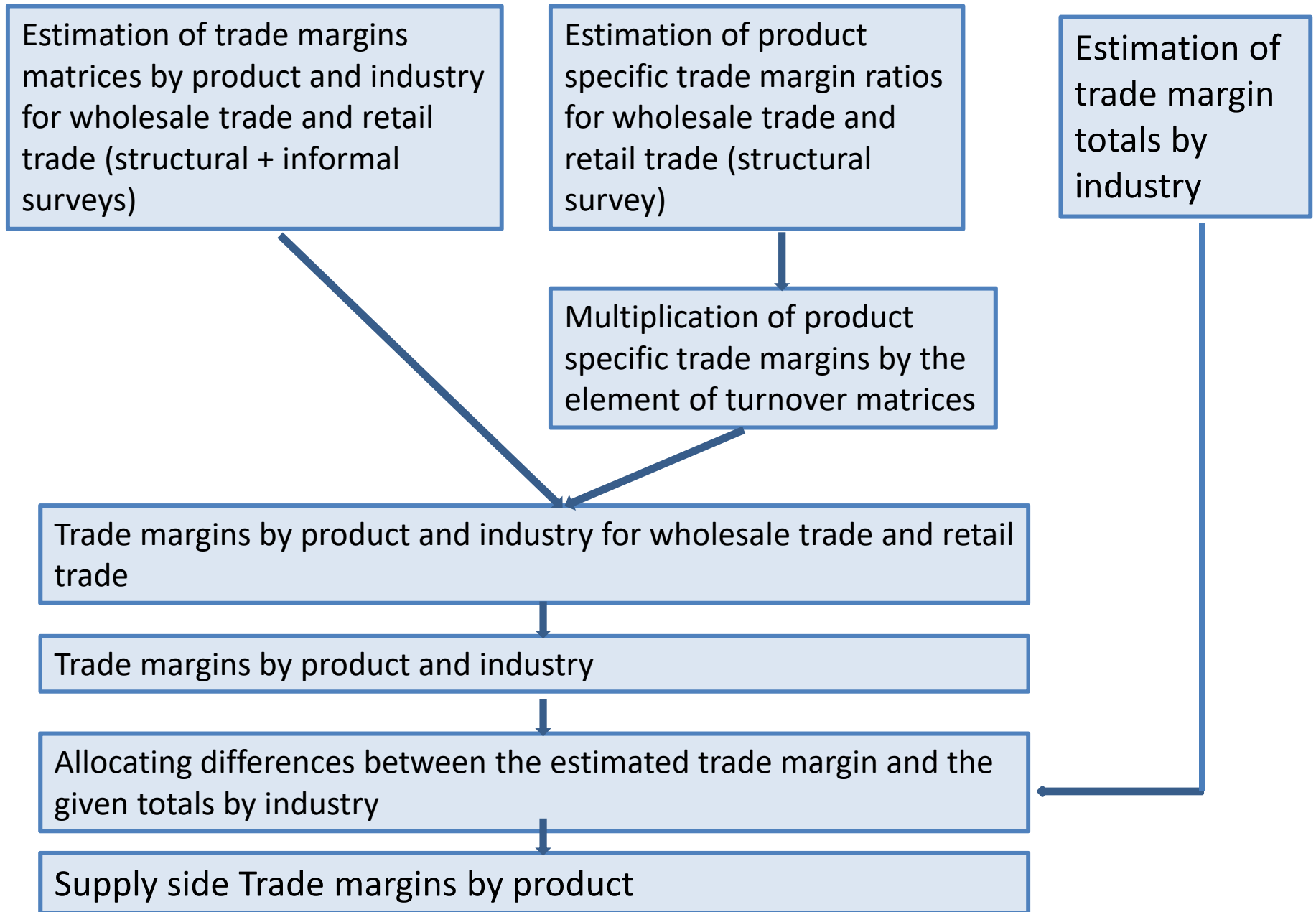
Structural surveys: trade margins by industry and product (or trade margins' rate)

[questionnaire structure commerce-20-5-2015 v01.pdf](#)

Survey on Informal sector: trade margins of wholesalers and retailers by product

[QUESTIONNAIRE UPI \(2\).pdf](#)

The compilation process of supply-side trade margins- Morocco



Use-side of trade margins

[TM supply and use.docx](#)

[xlsقمح صلب- توازن.](#)

Transport margins

- Transport margins only occur when transport services are separately invoiced. (2008 SNA)
- Transport margins are the transport costs for transportation of products paid separately by the purchaser and included in the use of products at purchasers' prices but not in the basic price of a manufacturers' output or in the trade margins of wholesalers or retail traders
- **This definition of transport margins implies that the transportation has to be arranged by the seller (producer or trader).**
- **This also implies that transportation arranged directly by the purchaser (and thus, of course, also directly paid for by the purchaser) is not included in the transport margins.**

Transport cost in moroccan business accounting

- **Moroccan accounting code** : regulation apply to all natural persons or legal entities subject to the legal obligation to draw up annual accounts.
- Moroccan companies report transport costs on:
- Purchases: on the Item 61425
- Sales : on the Item 61426

Transport cost in moroccan business accounting

The accounting treatment of transport costs is quite diversified, because depending on the sales conditions, it is up to the supplier to specify the terms of transport.

1- Free transportation: The port is free when it is not charged to the customer. The invoice can then be marked "Free of charge" or "Free port". This does not mean that the sales price is not calculated to cover transport costs, because the supplier can charge the cost of transport over the price of the goods indirectly.

Example 1 : The producer manufactures a good **A** worth **90** at the basic price and sends a carrier **B** to deliver the product to a customer **C**, at **10 (transport cost)**

customer's bookkeeping

Item	wording	value
61425	Transportation on purchases	0
61XX	Purchases	100



Transport cost is not separately invoiced, thus it's included in the basic price and it's a supplier's IC..

Transport cost in moroccan business accounting

- 2- inclusive shipping
- The goods are delivered by the seller with his own means. He then charges a lump sum because it is difficult to accurately calculate a priori the cost of each delivery.
- Example: The supplier manufactures a good A worth 90 and use his own means to deliver to C. He charges C a transport cost worth 10
- Supplier's bookkeeping

Item	wording	value
7127	Sales and accessories	100
4455	Invoiced VAT	20

- customer's bookkeeping

Item	wording	value
61425	Transportation on purchases	0
61XX	Purchases	100



The cost of transportation (10) is a transport margin. it's unfortunately, there is no available data to treat it as such.

Transport cost in moroccan business accounting

3- Transport disbursed

transport is disbursed“ when the seller (producer) bills the buyer for shipping costs paid to a carrier on behalf of the buyer.

Example: The producer manufactures a good **A** worth **90** at the basic price and sends a carrier **B** to deliver the product to a customer **C**, at **10 (transport cost) invoiced to the customer**

- **customer's bookkeeping**

Item	wording	value
61425	Transportation on purchases	10
61XX	Purchases	90



Item : 61425 refers to a transport margin but it's not included in the purchases price

Transport cost in moroccan business accounting

4- Transportation due

- In this case the transport costs are not included in the supplier's invoice. The customer himself uses a transport company to collect the purchased goods or materials.
- **customer's bookkeeping**

Item	wording	value
61425	Transportation on purchases	10
61XX	Purchases	90



Transport cost is not a transport margin , it's a customer's IC

Transport margin in moroccan national account's

In moroccan national account, transport margins refers to the cases 3 (Transport disbursed) and '4 (Transportation due) even if the last case doesn't much with SNA recommendations and the case 2 is missed (as we don't have any data about it) .

- If the customer is a trader (wholesaler or retailer) the transport cost is treated as trader's IC.

In the structural survey's:

- The transport cost on purchases is given as a total by establishments which are classified by industry
- Transport margins' breakdown by product is made using the structure of transportable product bought by industries (IC or GFCF values)

Transport margin in moroccan national account's

Example:

The surveys allow the M.j vector below:

	Agriculture,	Mining	Manufacturing	Electricity, gas and water	Construction	trade & repair	others services	total
TrM.j	0	6	120	14	56	36	232	464

And the detail purchases by industry on transportable goods

Xij	Agriculture,	Mining	Manufacturing	Electricity, gas and water	Construction	trade & repair	others services	total
Agriculture product	198	0	584	0	0	14	796	1593
Mining products	0	4	394	43	30	1	472	944
Manufactured prod	187	33	1461	33	482	185	2381	4762
Total industry	385	37	2439	76	513	200	3649	7299

Using the structure of the industries purchases by goods we can break down the transport margins TrM.j on kind of products

The last vector refers to the transport margins by product TrMi

TrMij	Agriculture,	Mining and quarrying	Manufacturing	Electricity, gas and water	Construction	trade & repair	others services	TrMi.
Agriculture product	0	0	29	0	0	2	51	82
Mining products	0	1	19	8	3	0	30	61
Manufactured prod	0	5	72	6	53	33	151	321
Total industry	0	6	120	14	56	36	232	464

Transport margin in moroccan national account's

By adding the transport margins TrM_{ij} to the initial purchases by industry we estimate the purchasers' prices of transportable goods by industry X'_{ij}

X'_{ij}	Agriculture	Mining and quarrying	Manufacturing	Electricity, gas and water	Construction	trade & repair	others services	total
Agriculture product	198	0	613	0	0	17	847	1675
Mining products	0	5	413	51	33	1	502	1005
Manufactured prod	187	38	1533	39	535	218	2532	5083
Total industry	385	43	2559	90	569	236	3881	7763

Transport margins an example from SNA2008

Delivery method	Basic price	Tax	Producers price	Transport margin plus tax on transport	Purchaser's price	Comment
A charges B an all-inclusive price and uses own delivery fleet	210	21	231		231	Transport is an ancillary activity of A
A charges B for delivery but uses own delivery fleet	200	20	220	11	231	Transport is a secondary activity of A
A charges B an all-inclusive price but uses C to deliver	210	21	231		231	C's production is intermediate consumption of A
A charges B for delivery but uses C to deliver	200	20	220	11	231	C's production is intermediate consumption of A إنتاج ج هو استهلاك وسيط من إنتاج أ
B collects the product from A using own delivery fleet	200	20	220		220	220 Transport is an ancillary activity of B
B uses C to collect product from A and deliver to B	200	20	220		220	B buys 2 products; one from A for 220 and one from C for 11
	10	1	11		11	

Transport margins have to be more clarified

The concept of transport margin and its relationship to invoicing procedures may need more explanation. Thus if a purchaser of a good receives two separate invoices, one for the good as such, and another one for its transportation, he is supposed to *add them before reporting* his purchase of this good. To get this right not only invoicing procedures should be known, but the instructions on the questionnaires should also reflect this. In general the understanding of basic prices as highly pragmatic (and therefore useful) concept seems to be somewhat lacking among both compilers and users of national accounts data.

Transport margins have to be more clarified

- The complexity of the transport margin is important, not only because of the different kinds of margins (for each type of transport: road, railway, water, air, pipeline) but also because of the definitions themselves. Also, the data availability gives rise to many practical elaboration problems. The relationship between the supply of goods and the transport margins connected with them is much looser than in the case of trade margins.
- Several reasons can be given for this fact: the transport costs are usually not related to the value of the goods transported; a lot of transportation is done as ancillary activity; and the way transportation costs are paid might differ from product to product and from transaction to transaction.

Transport margins: different choices by national accountants

The extreme case is that of Germany: their accountants do not put transport margins in their accounts. In contrast to countries such as Australia or the United States, transport margins are recorded with significant amounts that correspond in part to the relative importance of transport in these two countries. While the Germans do not feel able to isolate a separate billing of transport, the latter two countries account for a significant share of freight transport margins (except the part that "transits" through trade). Other European countries account for more or less significant transport margins