

Evaluation of Pharma Distribution Alternatives...

Market Insights

... for High-priced Drugs on the French Retail Market

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This position paper evaluates the distribution alternatives for high-priced drugs on the French retail pharma market, based on Smart Pharma Consulting know-how and external interviews

Context, objectives and approach



- In a context of increasing number of high-priced drugs available in the pharma retail market, we decided to evaluate the distribution alternatives from the following concerned stakeholders' perspective:
 - Pharma companies Retail pharmacists Patients



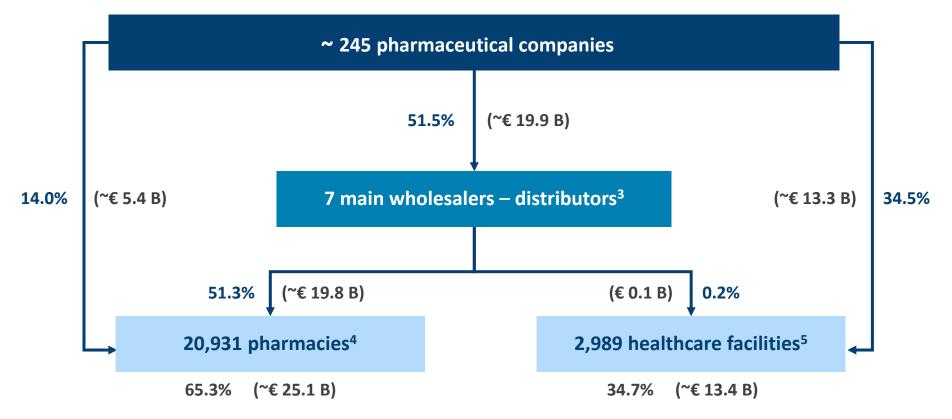
- Desk research and review of former Smart Pharma Consulting publications
- External interviews with representatives from:
 - 7 pharma companies
 - 2 wholesalers
 - 2 agents (pre-wholesalers)
- Analysis of the collected insights
- Evaluation of the distribution alternatives



Drugs sold in retail pharmacies are mainly sourced from wholesalers / distributors, while hospital drugs are usually directly sourced from pharmaceutical companies, through agents¹

Drug supply chain (2022)

Total pharmaceutical market² ~€ 38.6 B



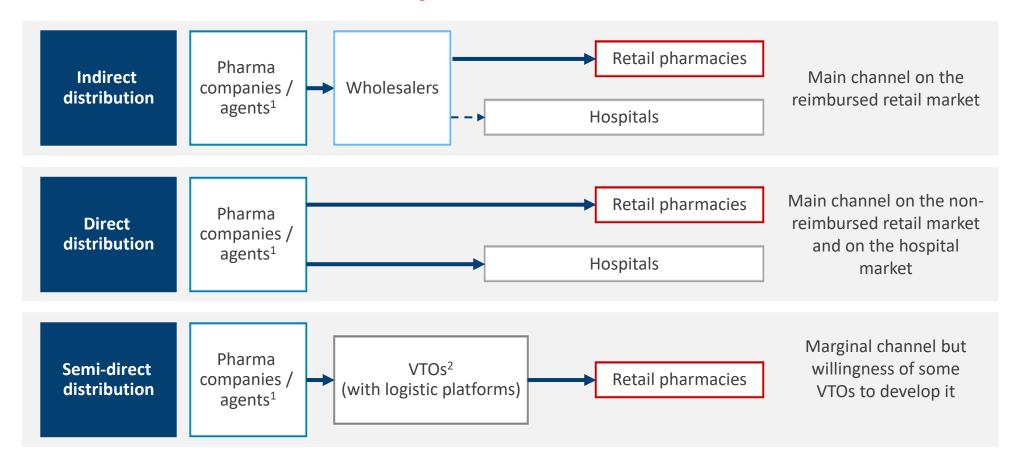
Sources: Leem ("Bilan Economique 2022") – GERS dashboard (December 2022) – Ordre National des Pharmaciens (as of January 2022) – Smart Pharma Consulting estimates

¹ Pre-wholesalers - ² Ex factory-price, before rebates and taxes - ³ Accounting together for 96.6% of the market - ⁴ Of which more than 90% are members of VTOs (Voluntary Trade Organizations) - ⁵ Public and private



The supply of retail pharmacies by wholesalers remains important, despite the recent multiplication of players on the other channels

Drug distribution channels



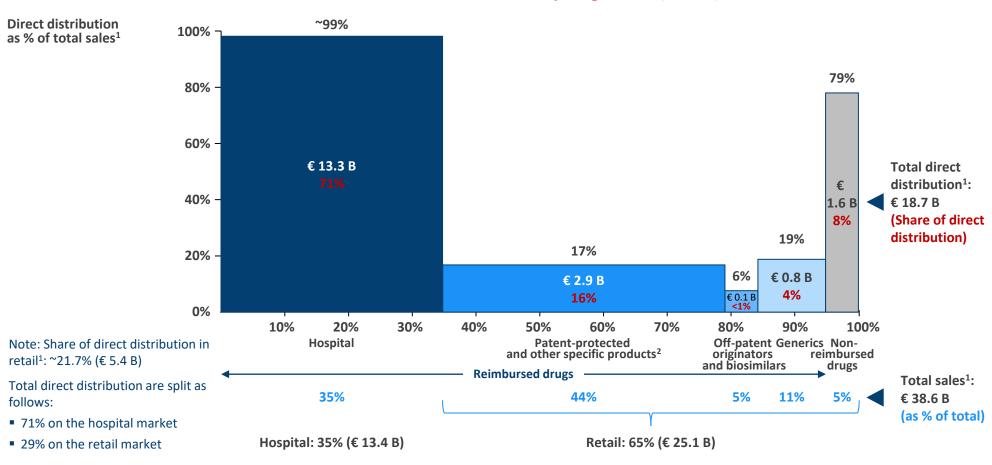
Sources: Smart Pharma Consulting analyses

¹ Pre-wholesalers – ² Voluntary trade organizations



99% of hospital and ~22% of retail sales are directly distributed by pharma companies, through agents (pre-wholesalers)

Share of direct distribution by segment (2022)



Sources: GERS dashboard (December 2022) – Smart Pharma Consulting estimates

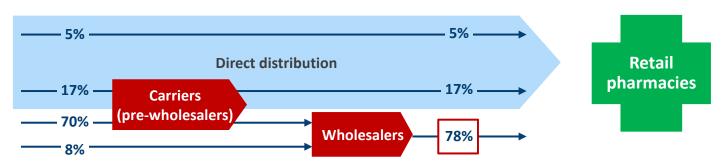
¹ Ex-factory prices, before rebates and taxes – ² Sales of drugs that are not part of any generic group, whether patented or not, or other special products (calcium, sodium, potassium, paracetamol, etc.)



In the retail market, ~78% of the value goes through wholesalers, who are the cornerstone of the supply chain between pharma companies and retail pharmacies

Distribution alternatives on the retail market (2022)





Agents / Pre-wholesalers

- Independent family health specialist:
- CSP / Movianto (Walden Group¹)
- Subsidiaries of integrated distribution groups and health specialists:
 - Alloga / Directlog (Alliance Healthcare)
 - Eurodep (Astera formerly CERP Rouen)
 - Evrard DPE Pharmalpa (Welcoop)
 - IvryLab (PharmaVie / Phoenix Pharma)
- Sogiphar (Giphar)

- Subsidiaries of integrated distribution groups; non health specialists:
- FM Health (FM Logistic)
- Arvato Services Healthcare (Bertelsmann)
- Pharmalog (Geodis)
- Rhenus (Rethmann)
- Subsidiaries of pharmaceutical companies:
 - Aguettant
- AstraZeneca
- Pierre Fabre
- Sanofi Pasteur
- Servier

Wholesalers

	Market share ²
■ Phoenix Group network	39.1%
- OCP	30.8%
Phoenix Pharma	8.3%
■ CERP network	36.1%
 Astera (formerly CERP Rouen) 	21.5%
 CERP Rhin Rhône Méditerranée 	11.1%
 CERP Bretagne Atlantique 	3.5%
 Alliance Healthcare France (AmericansourceBergen) 	18.5%
■ Giphar	2.9%
■ Others³	3.4%

Sources: GERS dashboard – CSRP – Register of the French pharmaceutical establishments – ANSM – Le Moniteur des pharmacies (December 3, 2022) – Smart Pharma Consulting analyses

¹ Funded in June 2020 by the merger of Movianto and EHDH, following the acquisition of Movianto by EHDH to Owens & Minor. Merger, on January 2022 of CSP and Movianto France – ² Market share in value in 2022 – ³ Non-members of the "Chambre Syndicale de la Répartition Pharmaceutique (CSRP)"



Agents¹ directly provide ~35% of the volume of drugs delivered to retail pharmacies, whether they are subsidiaries of wholesalers, independents or agents

Agents / Pre-wholesalers – Role, activity and profile

		Agents	
Definition		olic Health Code, agents carry out activit e distribution of drugs to wholesalers, h	
Role	 Agents offer their services in the cont 	text of direct distribution to pharmacies	but also to wholesalers
Activity	 Agents' vocation is national or region In 2022, they directly distributed ~35 	al, depending on their structure % of the volume and ~22% of the value	of drugs delivered to retail pharmacies
Profiles	Subsidiaries of wholesalers	Independents	Subsidiaries of carrier groups
Examples	 Alloga / Directlog (Alliance Healthcare) Eurodep (Astera) Evrard DPE – Pharmalpa (Welcoop) IvryLab (PharmaVie / Phoenix Pharma) Sogiphar (Giphar) 	■ CSP / Movianto (Walden Group²)	 FM Health (FM Logistic) Arvato Services Healthcare (Bertelsmann) Pharmalog (Geodis) Rhenus (Rethmann)

¹ Pre-wholesalers − ² Funded in June 2020 by the merger of Movianto and EHDH, following the acquisition of Movianto by EHDH to Owens & Minor. Merger, on January 2022 of CSP and Movianto France



The activity of wholesalers must meet five obligations derived from the "good delivery practices" guide and from European regulations

Wholesalers – Obligations

Serve all the retail pharmacies of their area of activity within 24 hours

Reference at least 90% of drugs and hold at least 15 days of inventory

In case of emergency, deliver on demand a non-client pharmacy or a pharmacy outside of the area of activity¹

5 obligations of wholesalers

Have at their head a Chief Pharmaceutical Officer (pharmacien responsable) and one or more assistant(s)

Promptly withdraw a drug if the authorities deem it dangerous



The prices, margins and level of rebates are regulated by the drug pricing committee (CEPS) throughout the value chain of the reimbursable products, either originators or generics

Prices, margins and rebates on the retail market for reimbursable drugs

	Originator without TFR ¹	Originator with TFR	Generic without TFR	Generic with TFR
Ex-factory price		EPS voriginator price at patent expiry after generics entry or at patent ex	piry	
Wholesalers' margins		ex-factory price below € 4.33 factory price from € 4.33 to € 468.9 ting a maximum of € 32.50 margin		
Pharmacists' margins	 Variable margin: 10.0% of ex-factory price bel 7.0% from € 1.92 to € 22.90 5.5% from € 22.91 to € 150.0 5.0% from € 150.01 to € 1,93 0% above € 1,930.00 Dispensing fees (VAT excluded € 1.00 per pack (for monthly € 2.70 per pack (for quarterly € 0.50 per prescription included € 3.50 for specific drugs (e.g.) € 1.55 if the patient is under € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 per prescription with a specific drugs (e.g.) € 0.30 p	00 80.00): packs) y packs) ding at least 1 reimbursable drug , immunosuppressive drugs) 3 years or over 70 years old	Margin in absolute terms identical to the corresponding originator	Calculation identical to the originator's one

Pharmacists' rebates²

- Maximum legal rebate:2.5% of ex-factory price
- Maximum legal rebate: 40% of ex-factory price, since September 2014 (17% before)
- Possibility to add up to 100% of the wholesaler margin in case of direct distribution

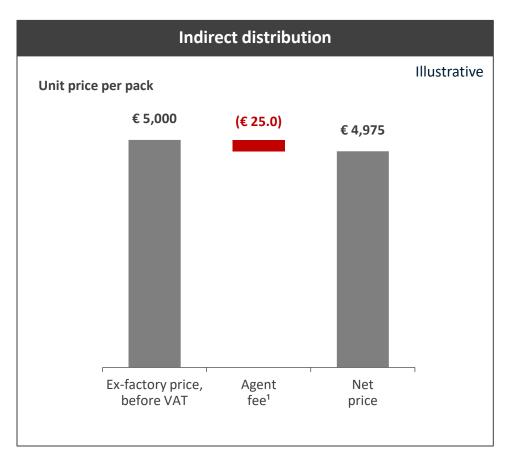
Sources: CEPS annual report (December 2022) – National pharmaceutical agreement (March 2022) – Legifrance – Ameli – Leem – Smart Pharma Consulting analyses

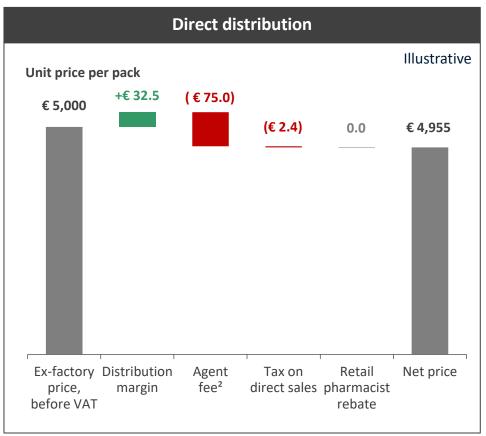
 $^{^1}$ Tarif Forfaitaire de Responsabilité (Reference price) $-^2$ Including cooperation and other commercial rebates



Assuming an ex-factory price of € 5,000 per pack, pharma companies would generate a net price of € 4.975 € in indirect distribution vs. € 4,955 in direct distribution (- € 25 / - 0.4%)

Pharma companies' net price* – Indirect vs. direct distribution



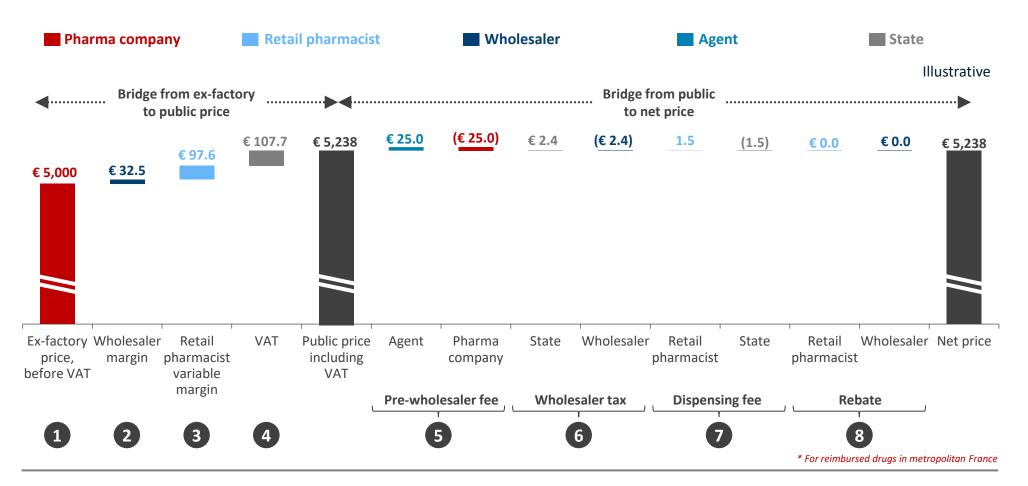


^{*} For reimbursed drugs in metropolitan France



In case of distribution through wholesalers, pharma companies net price corresponds to the exfactory price (€ 5,000 per pack) minus the distribution paid to the agent¹ (€ 25 per pack)

Net price distribution across drug value chain* – Indirect distribution (1/2)



Sources: Legifrance – External interviews (September – October 2023) – Smart Pharma Consulting analysis

¹ Fee paid to the agent to ensure the distribution from the pharma company warehouse to the wholesalers



Almost all prices, margins and rebates are regulated, but pharma companies distributing through wholesalers should also negotiate with agents for their "pre-wholesaler" activities

Net price distribution across drug value chain* – Indirect distribution (2/2)

Item	Price component	Assumption	Flexibility
1	Ex-factory price, before VAT	Price negotiated / set by the CEPS	
2	Wholesaler margin	■ Margin regulated, with a maximum margin of € 32.5 per pack for drugs with an ex-factory price above € 468.97 per pack	
3	Retail pharmacist variable margin	■ Margin regulated, with a maximum margin of € 97.6 per pack for drugs with an ex-factory price above € 1,930 per pack	
4	VAT	 2.10% of the price before VAT (as applied for all reimbursable drugs) 	
6	Agent fee (pre-wholesaler)	Fee negotiated with the agent for its pre-wholesaler activities (~0.5% of pharma company's ex-factory price for a € 5,000 ex-factory price per pack)	
7	Wholesaler tax due to URSSAF	■ Set by the URSSAF¹: € 2.4 per pack for drugs with a wholesaler price above € 160.4 per pack (that could be adjusted depending on wholesaler sales evolution vs. previous year)	
5	Retail pharmacist dispensing fee	Set in the National Convention for Retail Pharmacies (dated March 2022): at least € 1.0 per dispensation and € 0.5 per prescription with ≥ 1 reimbursable drug	
8	Wholesaler rebate to pharmacist	 Could reach up to 2.5% of the wholesaler price for reimbursed originators, but quite never proposed to retail pharmacists for non-substitutable Rx-bound drugs 	

From low: (1) to high

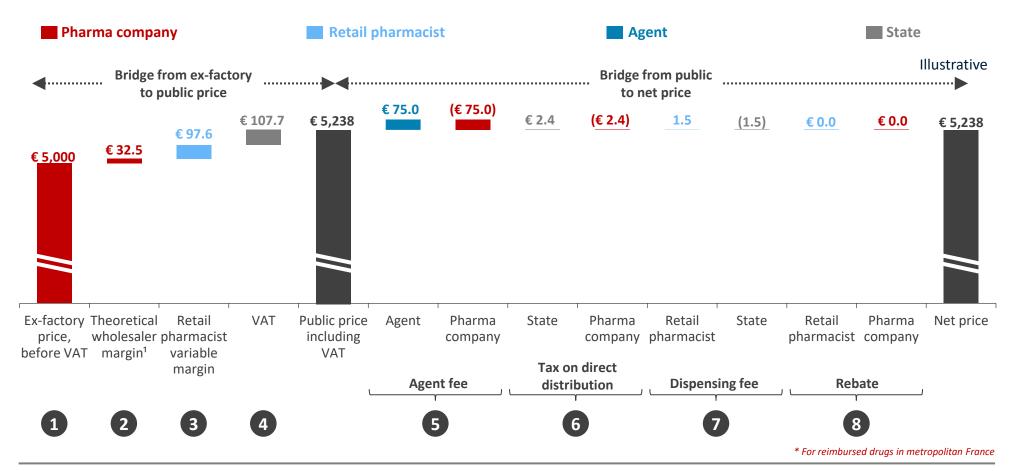
to high:

* For reimbursed drugs in metropolitan France



In case of direct distribution, pharma companies "retain" the wholesaler margin (~€ 32.5) from which should be deducted agent fee (~€ 75) and tax on direct distribution (~€ 2.4)

Net price distribution across drug value chain* – Direct distribution (1/2)



¹ Margin which would have benefited the wholesaler in the case of indirect distribution, and which will be shared between the pharma company and the retail pharmacist in the case of direct distribution



In case of direct distribution, pharma companies can retain up to 100% of the wholesaler margin, but would have to negotiate fee for services with their agent and to pay tax on direct sales

Net price distribution across drug value chain* – Direct distribution (2/2)

Item	Price component	Assumption	Flexibility
1	Ex-factory price, before VAT	Price negotiated / set by the CEPS	
2	Wholesaler margin	■ The pharma company most often keeps the theoretical wholesaler margin and does not share it with retail pharmacists for non-substitutable Rx-bound drugs	
3	Retail pharmacist variable margin	■ Margin regulated, with a maximum margin of € 97.6 per pack for drugs with an ex-factory price above € 1,930 per pack	
4	VAT	 2.10% of the price before VAT (as applied for all reimbursable drugs) 	
6	Agent fee	■ Fee negotiated with the agent for its services (~1.5% of pharma company's ex-factory price, assuming a full service from order to cash. This fee could vary depending on volumes)	
7	Tax on direct distribution	Set by the URSSAF¹: € 2.4 for drugs with a price invoiced to retail pharmacists above € 160.4 (that could be adjusted depending on pharma company's sales evolution vs. previous year)	
5	Retail pharmacist dispensing fee	Set in the National Pharmacies Convention (dated March 2022): at least € 1.0 per dispensation and € 0.5 per prescription	
8	Pharma company rebate to pharmacist	 Could reach up to 2.5% of the ex-factory price for reimbursed originators, but quite never proposed to retail pharmacists for non-substitutable Rx-bound drugs 	

From low: () to hi

to high:

* For reimbursed drugs in metropolitan France



Indirect distribution (through wholesalers)



Pros	1 to 5*
Pharma companies	
 Outsourcing of distribution risks (e.g., preparation errors, breakage in transport, unsold items, unpaid invoices) 	4
Wholesalers' maturity	4
Slightly lower logistic costs (vs. direct distribution)	2
Environmentally friendly (optimized shipments)	2
Retail pharmacists	
 Wholesalers' presence in all retail pharmacies 	5
Easy ordering (limitation of order-taking platforms)	4
 Stocking of expensive drugs avoided 	4
Limitation of the number of daily supplier deliveries	3
Patients	
Drug availability secured (deliveries twice a day)	3
Precise knowledge of product availability time	2

Cons	1 to 5*
Pharma companies	
 More difficult access to data to monitor parallel exports, especially for products at risk of shortage 	4
 Multiplication of stocks at each agency for wholesalers that do not propose a national centralized platform 	4
 Does not exempt pharma companies from signing an agreement with an agent 	4
 Each service outside the framework contract is chargeable (e.g., data on sales / stocks, information to pharmacists) 	3
 Need to sign with at least the top 6 wholesalers to cover the pharmacy network (each distributor has its own clients) 	2
Retail pharmacists	
 Risk of local shortages if the wholesaler has not properly distributed its volumes by agency 	4
Remote learning only (no face-to-face)	3
Patients	
■ N/A	

* Importance for high-priced drugs - From 1 = Low to 5 = High



Direct distribution (through agents)



Pros	1 to 5*
Pharma companies	
 Particularly relevant for low-moving secondary care drugs 	5
 Sales monitoring at each retail pharmacy level enabling to: Better prevent / limit parallel exports, especially for products at risk of shortage 	5
 Get insights on Rx habits (e.g., initiations vs. renewals) 	
 Agent services customizable to pharma company needs (e.g., orders, storage, delivery, invoicing, cash collection) 	4
Easier management of shortage vs. indirect distribution	4
 Very few in-house resources¹ required by pharma companies in case of agent full-service offer 	4
 Possibility to retain up to 100% of the wholesaler margin 	2
Retail pharmacists	
 Customizable services by retail pharmacy (e.g., questionnaires, trainings, information kits) 	3
 Possibility to benefit from part of the "wholesaler margin"² 	1
Patients	
 Better information from the retail pharmacist leading to better use and greater compliance by the patient 	4

Cons	1 to 5*
Pharma companies	
 Non-outsourcing of certain risks (e.g., preparation errors, breakage in transport, unsold items, unpaid invoices) 	4
 Variability of agent fee (inflation of storage and transportation costs recharged to pharma companies) 	3
 Longer implementation of contracts (from 2 to 3 months vs. ~ 20 days with wholesalers), unless there is yet an existing agreement 	2
Slightly higher logistic costs (vs. indirect distribution)	2
Retail pharmacists	
 Higher complexity (e.g., lack of a single order-taking platform, increase in the number of supplier deliveries to manage each day) 	4
Patients	
 Longer supply times (D+2 vs. D+1) but no impact for non- urgent drugs 	1

* Importance for high-priced drugs - From 1 = Low to 5 = High

Evaluation of Pharma Distribution Alternatives for High-priced Drugs on the French Retail Market

 $^{^{}m 1}$ Only 1 collaborator in charge of the relationship with the agent -

² Quite never proposed by pharma companies to retail pharmacists for non-substitutable Rx-bound drugs



Indirect distribution (through wholesalers)



Pros	1 to 5*
Pharma companies	
 Costs (e.g., transportation, clearance, storage, logistics) and risks (e.g., preparation errors, breakage in transport, unsold items, unpaid invoices) outsourced to wholesalers 	5
Wholesalers' expertise in each territory	4
 Outsourcing of complexity (e.g., relationship with local carriers, cash collection) 	4
Retail pharmacists	
 Access to all retail pharmacies (~230 in La Reunion, ~140 in Guadeloupe and ~130 in Martinique) 	4
Patients	
Product availability secured by wholesalers	4

Cons	1 to 5*
Pharma companies	
 No tracking of sales and prescriptions 	4
 Wholesalers' reluctance to build up stocks of new expensive drugs (pharma companies most often asked to take over all unsold items during the first six months after product launch) 	4
 Individual contracts to be signed with each wholesaler subsidiary (one per territory) 	3
 No transfer of products between wholesalers' subsidiaries 	3
Retail pharmacists	
■ N/A	
Patients	
■ N/A	

* Importance for high-priced drugs - From 1 = Low to 5 = High



Direct distribution (through carriers)



4
3
2

Cons	1 to 5*		
Pharma companies			
 Need to sign contracts with carriers (e.g., DHL, FedEx, Géodis) Or to have deported stocks (as there is no agent in Overseas France) 	5		
 Logistics complexity (e.g., unforeseen events, local partners heterogeneity, need for a specific follow-up of each delivery) 	5		
 Risk of unpaid invoices 			
Retail pharmacists			
■ N/A			
Patients			
■ N/A			

* Importance for high-priced drugs - From 1 = Low to 5 = High



Eurapharma (CFAO, Toyota Tsusho Corporation), Ubipharm (Planet Pharma) and CERP Bretagne Atlantique are the 3 main wholesalers leading the distribution market in Overseas France

Mapping of main distributors present in Overseas France

	The Caribbean & Guyana	Indian ocean	Pacific ocean
.eurapharma	sopharma eurapharma . Spg eurapharma	. soredip eurapharma	. citahitipharm
P L A N E T P H A R M A	GUANE LIBURTARM GUYANE LIBURTARM MARTINIQUE	Liberarm MAYOTTE	No presence identified
ERP SRETAGNE - ATLANTIQUE	GPG	PHARMAR COPHARMAY	ÇERPOL
Other distributors	Pharma	Pharma SIPR Société d'importation des Pharmaciens de la Réunion	Pharma MédiPac UniPharma



The preferred distribution strategy of pharma companies would depend on volumes to be distributed, parallel export and drug shortage risks, as well as patient program priorities

Recommendations for pharma companies



Metropolitan France

- There is no clear benefits of direct distribution through an agent vs. indirect distribution through a wholesaler
- The net price difference for high-priced drugs is marginal (<0.5%) and not perceived as a key decision-making criteria
- The decision to adopt a direct distribution strategy in Metropolitan France will mainly depend on:
 - The risk of parallel exports¹
 - The need to limit the stock in distribution² if there is a risk of shortage
 - The willingness to partner with retail pharmacists to carry out patient usage and compliance programs

"Direct distribution is a **bit more expensive**, but it enables to:

- Limit parallel exports
- Better manage the stocks in distribution"

"We decided to change our distribution strategy from direct to indirect distribution for two main reasons:

- Externalize the risks associated to drug distribution
- Build a lean and agile distribution organization"

¹ Especially as agents can set up alerts based on co-defined orders thresholds –

² No need to multiply the stock by the number of agencies



Distribution through wholesalers should be preferred in Overseas France due to the fragmentation of the territories, the limited population, and the associated complexity and extra costs

Recommendations for pharma companies



Overseas France

- Direct distribution would lead to too much complexity in Overseas France for high-priced drugs that are in general indicated for a limited number of patients
- Therefore, it is preferable to select local distributors having a strong presence in the retail pharmacy network
- Such a strategy allows to outsource many:
 - Costs (e.g., transportation, clearance, storage, logistics)
 - Risks (e.g., preparation errors, breakage in transport, unsold items, unpaid invoices)

"Going through **wholesalers** is the **most** economically **viable solution** for pharma companies in Overseas France,...

... in particular for expensive drugs that retail pharmacists are not ready to stock"

"The wholesalers' **lobby** is **very strong** in these territories, where they have always preserved their monopoly"



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 - Focuses on easy to implement managerial recommendations
- Each issue is designed to be read in 15 to 20 minutes and not to exceed 24 pages

Evaluation of Pharma Distribution alternatives...

... for high-priced drugs on the French retail market

- This position paper describes and evaluates the pharma distribution channels in France
- A special focus is given to the distribution of high-priced drugs to the retail pharmacies in Metropolitan France and Overseas France
- Smart Pharma Consulting has evaluated the pros and cons of direct and indirect distribution alternatives for pharma companies, retail pharmacies and patients
- Recommendations are also proposed to distribute high-priced drugs to retail pharmacies in Metropolitan France and Overseas France

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 - Our teaching activities in advanced masters (ESSEC B-school, Paris Faculty of Pharmacy)
 - Training activities for pharma executives
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- Our publications can be downloaded from our website:
 - 41 articles
 - 72 position papers covering the following topics:
 - Market Insights
- 5. Marketing

2. Strategy

- 6. Sales Force Effectiveness
- 3. Market Access
- 7. Management & Trainings
- 4. Medical Affairs
- Our research activities in pharma business management and our consulting activities have shown to be highly synergistic
- We remain at your disposal to carry out consulting projects or training seminars to help you improve your operations

Best regards

Jean-Michel Peny