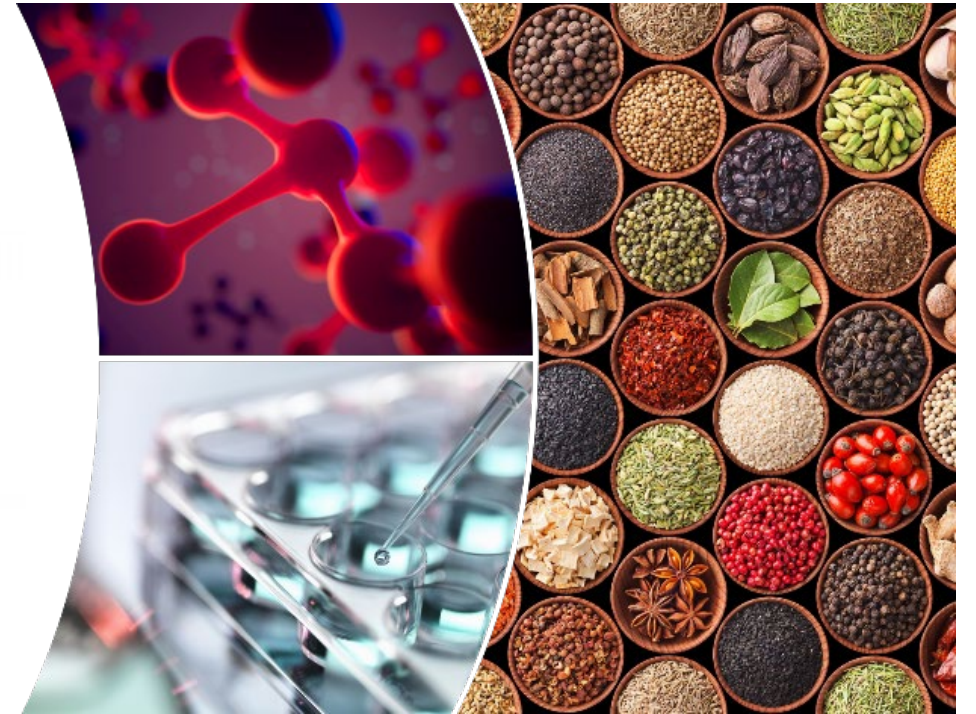




EPFL



Entrepreneurship in Food & Nutrition Science



Audrey Orengo

- Cross-Category Prototype Developer, Nestlé Research
- Master's Degree, Engineer in Food Science and Technology
- Experience in product development and Nutrition (e.g. Nutrient Profiling Science)

expertise

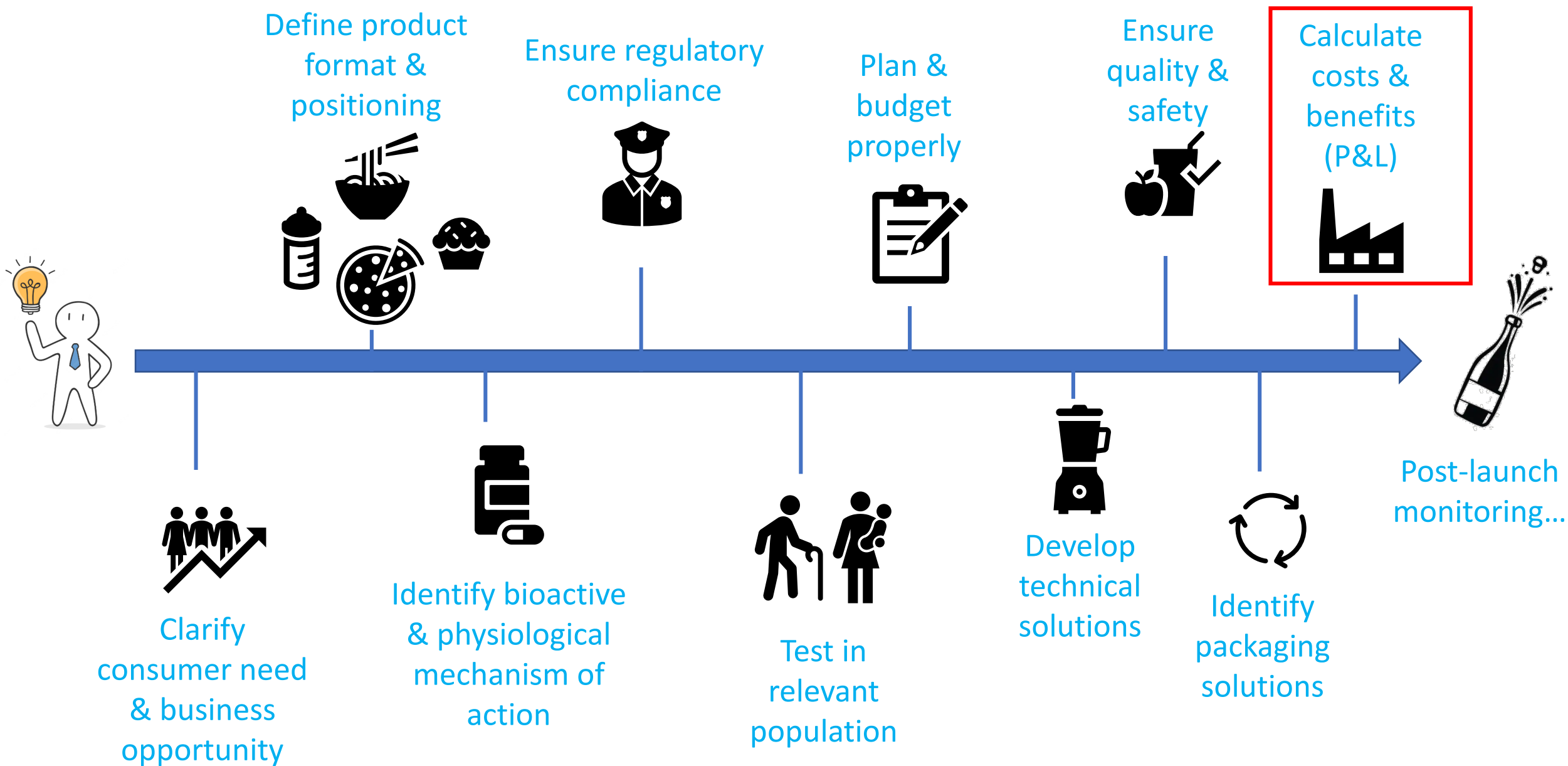
Product Development



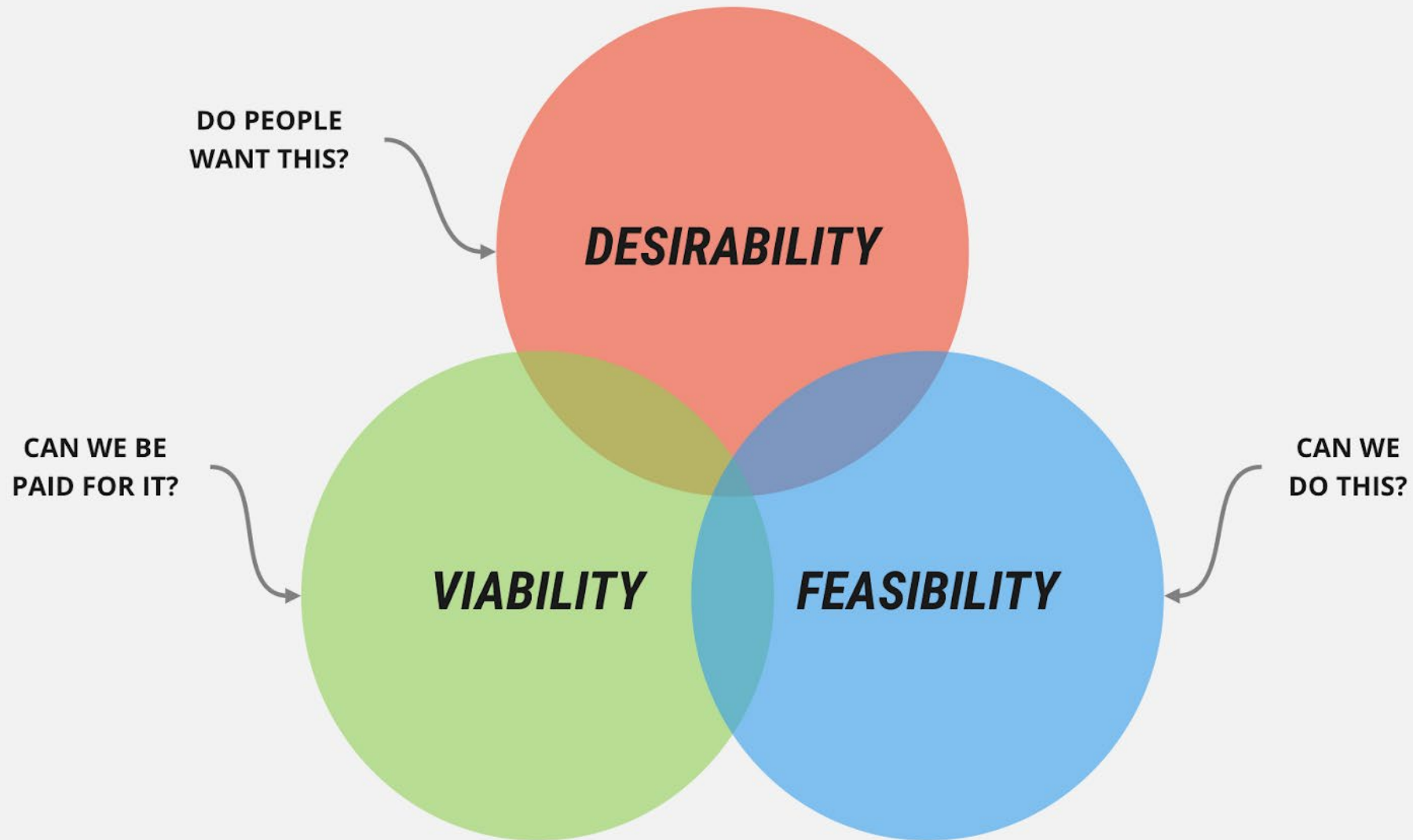
Clinical products



Food Supplements



Do you remember ?



Outline

- Introduction
- Profit & Loss Breakdown
- How to Impact your P&L
- Marketing Importance
- Key Messages
- Q&A

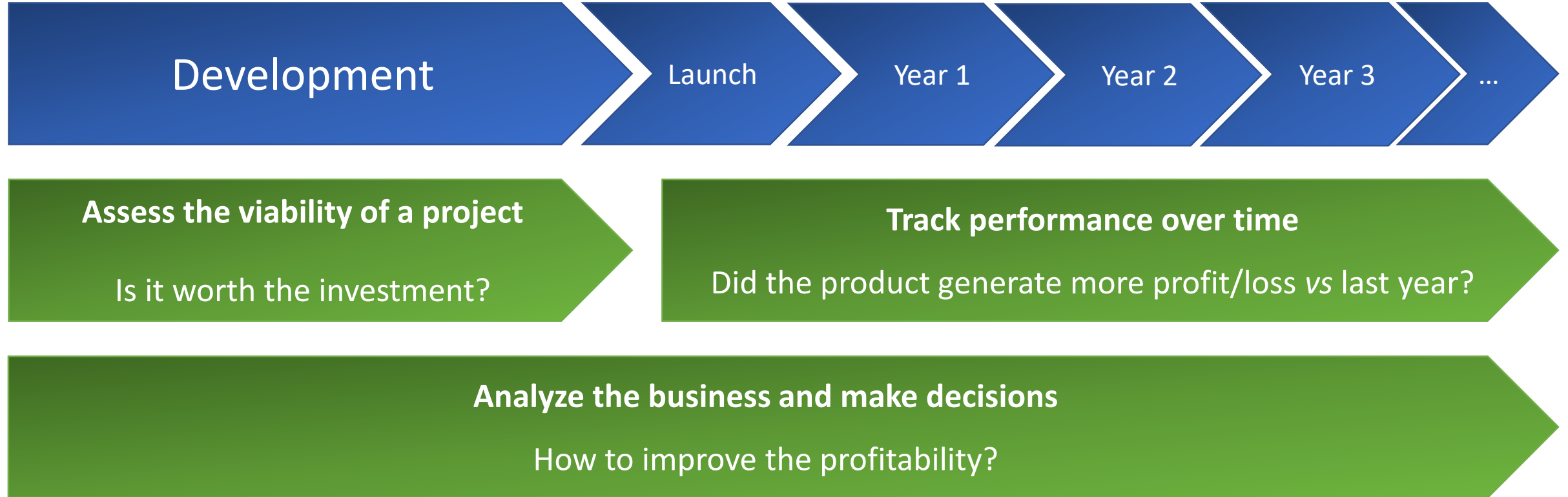
P&L (Profit & Loss)

The **P&L (Profit & Loss)** summarizes the revenues/incomes and the costs/expenses incurred during a specified period.

It tells you if you are **making a profit** or if you're **losing money**.



Why and when a P&L?



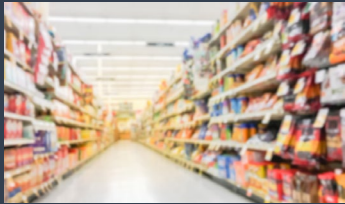
P&L breakdown - Revenue

Quantity sold * List price

= Gross Revenue

- Costs of doing business with the trade to increase sales volume

Product listing



Placement



Promotions



= Net Revenue

Note: List price ≠ shelf price

P&L breakdown – Variable Costs & Marginal Contribution

Variable costs → evolve depending on volume

Cost of Goods Sold (COGS)

- Raw material
- Packaging
- Variable labor at the factory



Variable Distribution Expenses

- All transportation expenses on finished goods and handling items



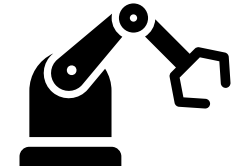
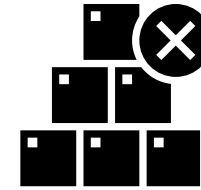
Other variable Expenses

Marginal Contribution → how much revenue is left after subtracting variable costs

P&L breakdown – Fixed Costs & Profit

Fixed costs → not affected by volume

- Salaries
- Rent
- Insurances
- Depreciation of equipment
- Maintenance
- Non sold items
- Other..



Operating Profit → how much money is left after subtracting fixed costs (gross profit)

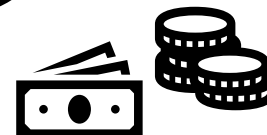
P&L breakdown

Shelf price	176
- VAT, trade margin	46
= Gross Revenue	130
- Listing fees, promotions etc.	30
= Net Revenue	100
- Variable Costs (COGS, distribution..)	55
= Marginal Contribution	45
- Fixed Costs	31
= Operating Profit	14



What
consumers
see/pay

Is this a
profitable
product?



What
companies
earn (gross)

How to improve profits



[Fixed/Variable Costs and Room Revenue Management \(revenue-hub.com\)](http://revenue-hub.com)

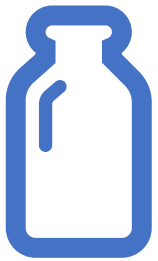
How to impact your P&L – What is your solution

- Firstly understand:
 - Who is your target **consumer**?
 - What is their **problem** you are trying to solve?
- What is the right **solution** for your consumer ?
 - **Product Format** (e.g. wet vs dry)
 - **Ingredients** (e.g. value-up vs mainstream)
 - **Usage** (e.g. single vs multiserve)
 - **Pack Format** (e.g. bottle vs jar vs pouch)
 - **Pack Material** (e.g. plastic vs carton vs glass)
 - **Claims** (e.g. needed or not)
- The selected solution will impact:
 - **COGS** elements
 - Consumer **acceptance**
 - **Frequency** of consumptions
 - **Rotation** sales



How to impact your P&L – Pricing strategy

- Defining the **sales price** is one of the most important elements for the profitability
- The **manufacturer recommends** a sales price to the **retailer** who ultimately **defines** the shelf price
- Positioning vs competition vs product uniqueness



Pasteurized
Milk

CHF 1.80/L



Organic Milk

CHF 1.95/L



**Lactose Free
Milk
(unbranded)**

CHF 2.10/L



**Lactose Free
Milk
(branded)**

CHF 2.40/L



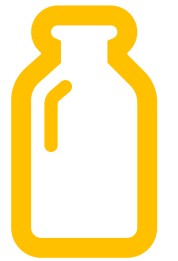
**High Protein
Lactose free
Milk**

CHF 2.95/L



**Oat «Milk»
(unbranded)**

CHF 3.35/L

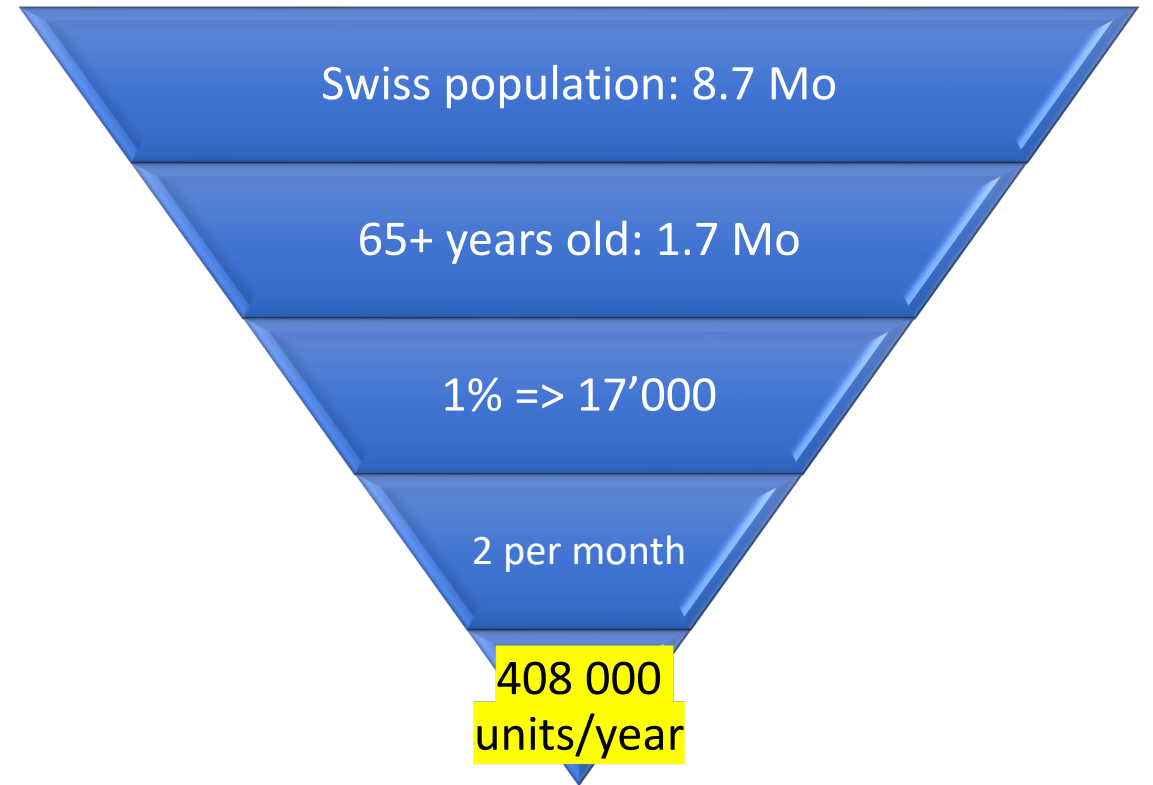
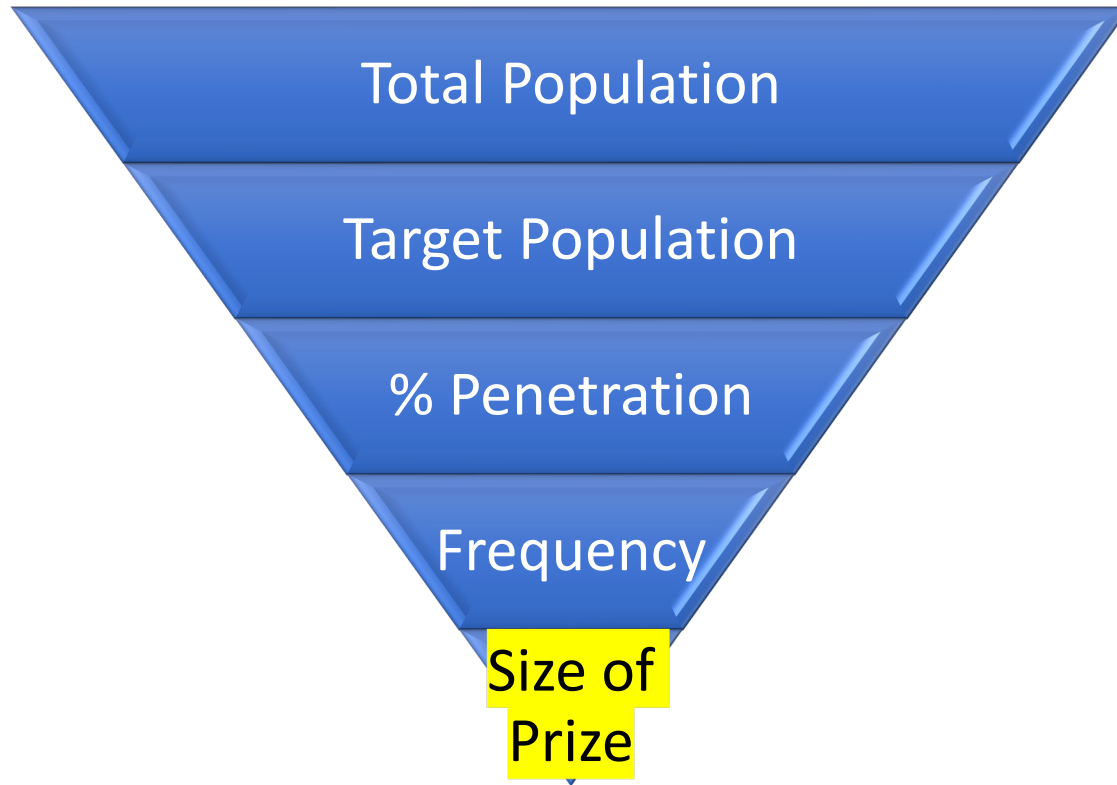


**Oat «Milk»
(branded)**

CHF 3.75/L

How to impact your P&L – Sales volume

- Volume forecasting (top down)



How to impact your P&L – Sales volume

- **Cannibalization:** reduction in sales volume, sales revenue or market share of one product as a result of the introduction of a new product by the same producer

Existing business
Do nothing scenario



100

Existing business + New product



90



40

Cannibalization = 10

How to impact your P&L – Costs – Raw materials

Main cost drivers

- Price, performance and quality may vary depending on suppliers → **Test & Compare**
- **Select the right grade for the target** application and communication
 - Target population
 - GMO
 - Vegan
 - Halal/Kosher
 - Naturality
 - Ingredient claims
 - Sustainability



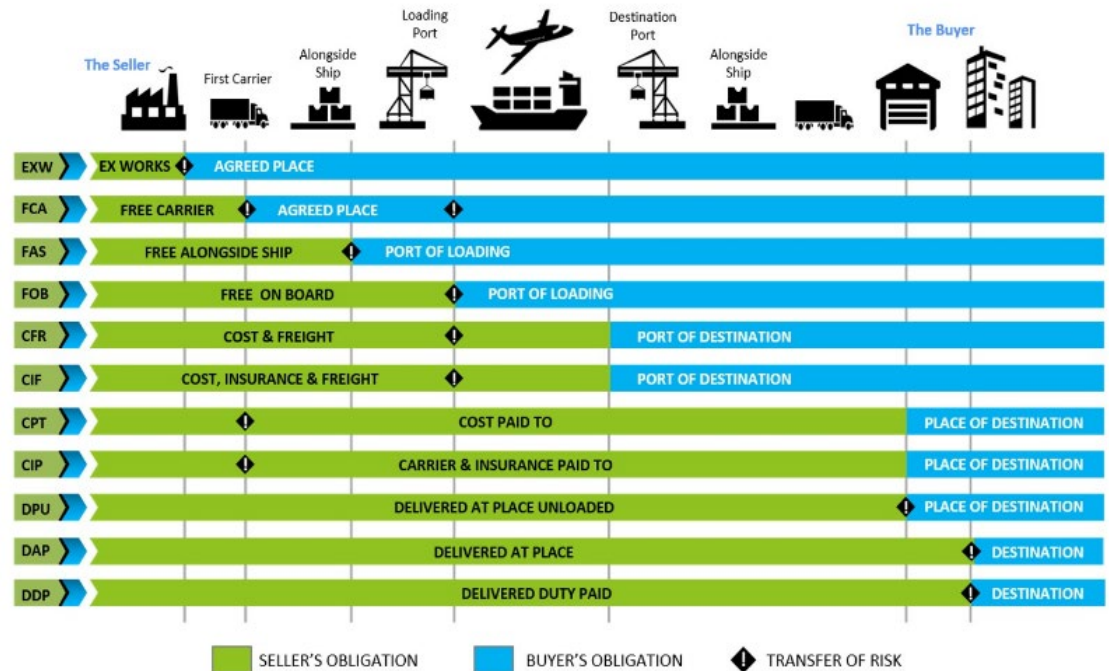
How to impact your P&L – Costs – Raw materials

- Price will vary based on **volumes**
- Impact** of transport, insurances and taxes on final raw material cost

Min Order Quantity = 100kg	Indicative EXW Price EUR/kg
Call off 100 – 499 kg	54.82
Call off 500 – 999 kg	39.04
Call off 1000 – 1499 kg	34.83
Call off 1500+ kg	28.23

INCOTERMS 2020

Point of Delivery and Transfer of Risk



How to impact your P&L – Costs – Raw materials

- Look at your **recipe holistically**
 - e.g. a cheaper ingredient may not always be the best option

	RM Cost (CHF/kg)	Recipe A	Recipe B
Extract A (bad taste, bitter)	4	4%	
Extract B (good taste, no off-note)	5		4%
Masking flavor	45	0.12%	
Recipe cost (CHF/kg)		0.214	0.200

How to impact your P&L – Costs – Raw materials

- Look at your recipe holistically
 - Calculate the **cost in use / cost impact**
 - reformulate based on most impactful ingredients
- Note: most expensive doesn't automatically make it the target ingredient to reduce

	RM Cost (CHF/kg)	Recipe	Cost in use	Cost impact
Ingredient 1	2	18%	0.36	23%
Ingredient 2	3	10%	0.30	19%
Ingredient 3	25	0.3%	0.075	4.8%
Ingredient 4	6	1%	0.06	3.4%
Recipe cost (CHF/kg)			1.56	

How to impact your P&L – Costs – Raw materials







- Test with consumers, **recipe acceptance**
 - More **premium ingredients** / complex / “authentic” recipes don't automatically increase consumer acceptance
→ identify best ingredient for best solution; recipe format, claims, consumer target etc.

	Recipe A	Recipe B	Recipe C
Recipe cost (CHF/kg)	2.46	2.66	3.58
Ingredient	Saffron Flavor	Saffron powder	Saffron Threads
Consumer Acceptance	49%	51%	46%



How to impact your P&L – Costs – Raw materials

- Test with consumers, **recipe acceptance**
 - More **claims** don't automatically increase consumer acceptance
 - identify nice to have vs must have, based on your target consumer, e.g. vegetarian vs vegan

	Recipe A	Recipe B	Recipe C
Recipe cost (CHF/kg)	1.56	1.90	2.55
Claims		 	  
Consumer Acceptance	44%	53%	48%

How to impact your P&L – Costs – Pack materials

- **Primary pack:** in direct contact with the product
E.g. foil, jar, can/tin, bottle, pouch/sachet, carton, cup,...
- **Secondary pack:** pulls together the primary pack, also used in some cases for displaying the product on shelf
E.g. carton box, pouch,...
- **Tertiary/quaternary pack:** used for transportation of secondary pack items
E.g. carton box
- **Labels**



How to impact your P&L – Costs – Pack materials

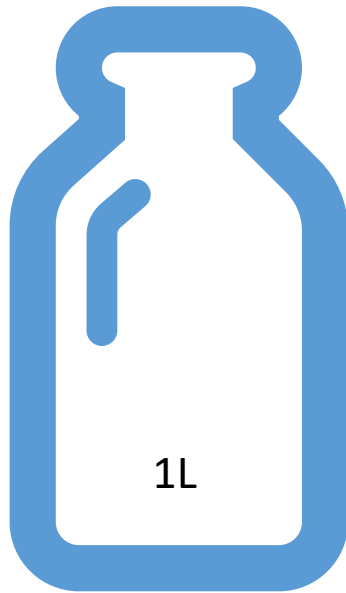
- Impact of pack **type**
 - **On direct pack cost:** e.g. Carton cheaper than PET bottle



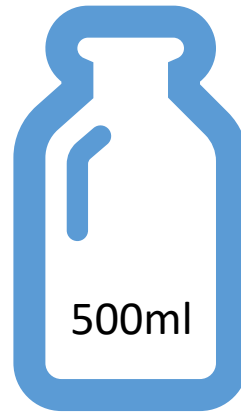
- **On other elements**
 - **Barrier protection / shelf-life** → e.g. a transparent pack might look better but decreases the shelf-life of product → less time on shelf
 - **Variable labor**
 - **Transportation cost** → e.g. glass might look more premium but heavier than plastic/carton
 - **Sustainability**

How to impact your P&L – Costs – Pack materials

- Impact of pack **size, single-serve vs multi-serve**
- The smaller the size, the higher the contribution of pack material to COGS



CHF 1.6/L



CHF 2.0/L



CHF 2.8/L

How to impact your P&L – Manufacturing & supply chain

- **Increased scale**

- Increased productivity
- Fixed costs spread over a larger number of units

	Year 1	Year 2
Fixed costs	100	100
÷		
Output	20 units	50 units
Cost/unit	5	2

- **InHouse vs CoMan**

- Can you manufacture In-House? Do you need to invest in new lines, equipment,..?
- Can a CoMan produce easier for you? And in what long-term cost?
- Do you have proprietary elements that you don't want to disclose?

- **Supply chain**

- **Manufacturing location vs target markets**

→ Distribution

- **Ambient vs chilled vs frozen**

→ What is the benefit for the consumer in each chain?

→ Do you have better price on shelf?

→ Will you have enough sales to avoid having product running out of shelf life?

Don't forget..

- **Good marketing** to support a good product, bad marketing can “kill” a good product



- In which **stores** will it be sold?
- In which **shelf** will it be positioned?
- How much will you **charge** for it?
- How will you **attract consumers**?
- How will you **promote** it?

Key messages

- Don't look at **Cost** only at the end of your development
- Have a **Holistic Approach** → consult with experts along the way
- **Success looks different** depending on the Business and may take **Time**

