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Morgan Le Rouzic, François Krier, Vincent Phalip, Rozenn Ravallec, François Coutte

► **To cite this version:**

Morgan Le Rouzic, François Krier, Vincent Phalip, Rozenn Ravallec, François Coutte. Health benefits of innovated *Curcuma longa* extract. *Food Bioactives & Health*, Sep 2023, Prague (République Tchèque), Czech Republic. . hal-04551912

**HAL Id: hal-04551912**

**<https://hal.science/hal-04551912>**

Submitted on 18 Apr 2024

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# Health benefits of innovated *Curcuma longa* extract

Morgan Le Rouzic<sup>1,2</sup>, Fabrice Coloma<sup>2</sup>, François Krier<sup>1</sup>, Vincent Phalip<sup>1</sup>,

Rozenn Ravallec<sup>1</sup> and François Coutte<sup>1</sup>

1 Université de Lille, UMRt BioEcoAgro 1158-INRAE, Institut Charles Viollette, France  
2 Eurabiotech, France

BioEcoAgro



4<sup>th</sup> International Conference on  
**FOOD BIOACTIVES & HEALTH**

18.-21. 9. 2023  
PRAGUE CONGRESS CENTRE  
CZECH REPUBLIC

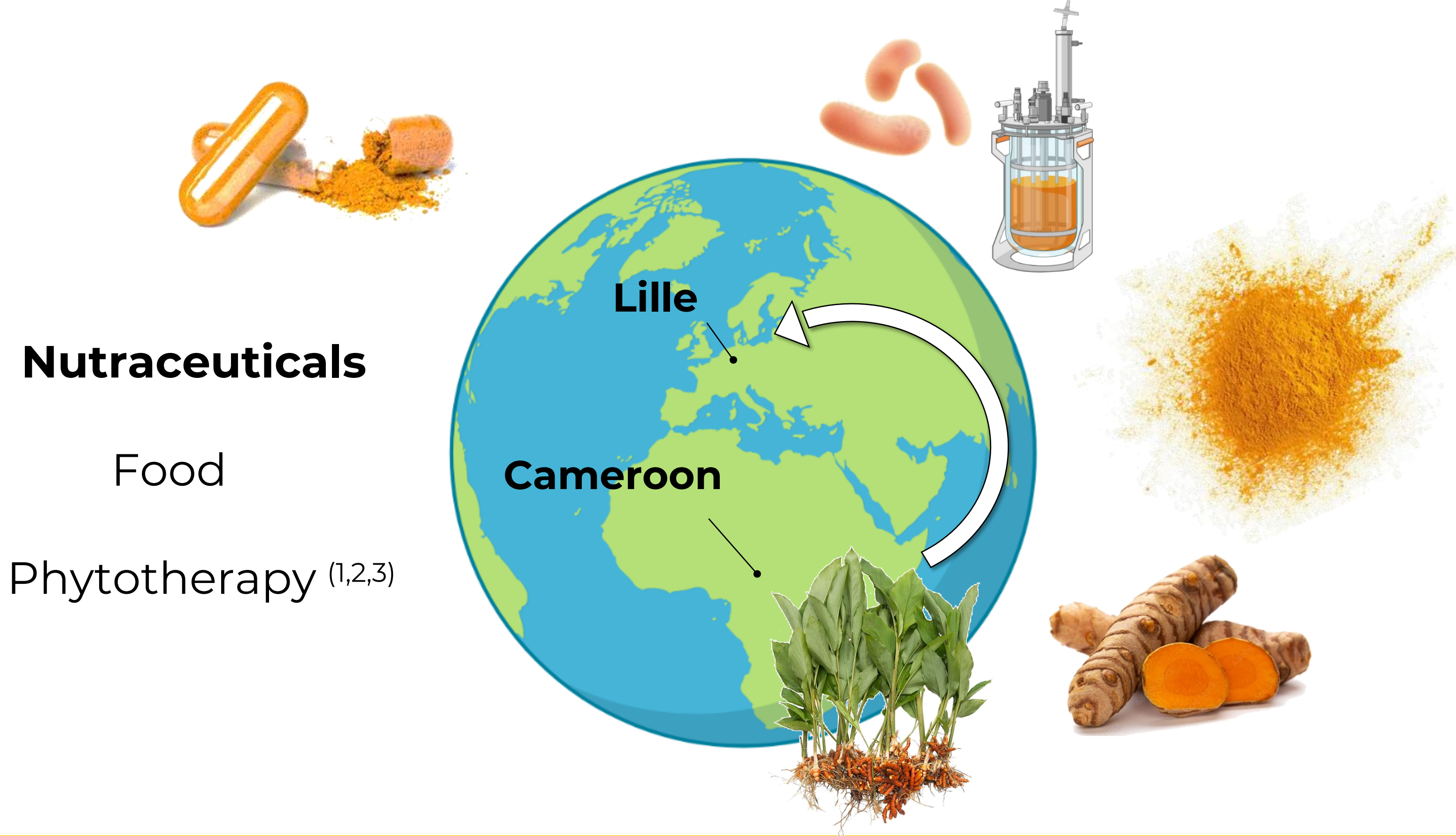
## Objective

Anti-inflammatory innovative turmeric extracts

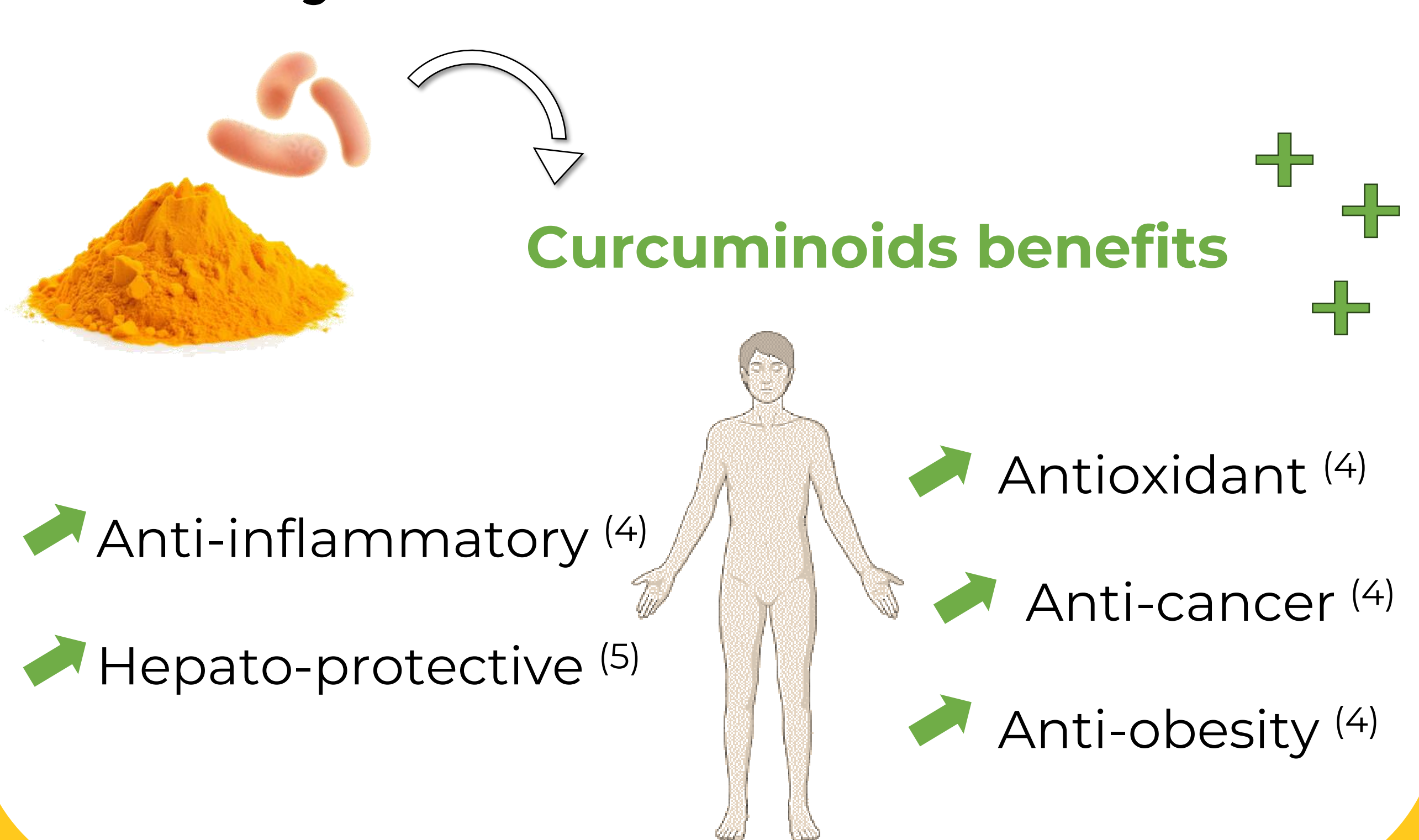
## How ? → Biotransformation

No solvent, adjuvant, physical-chemical processing

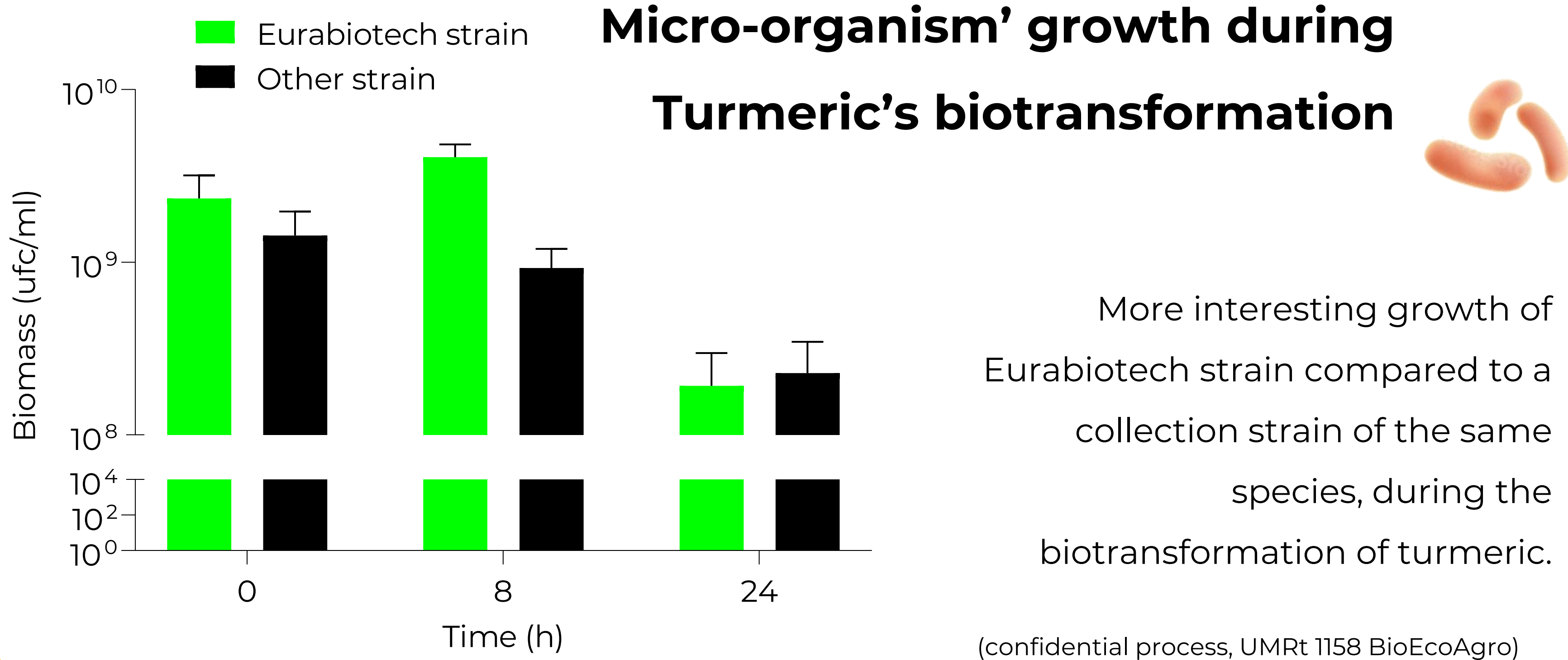
## Curcuma longa transformation



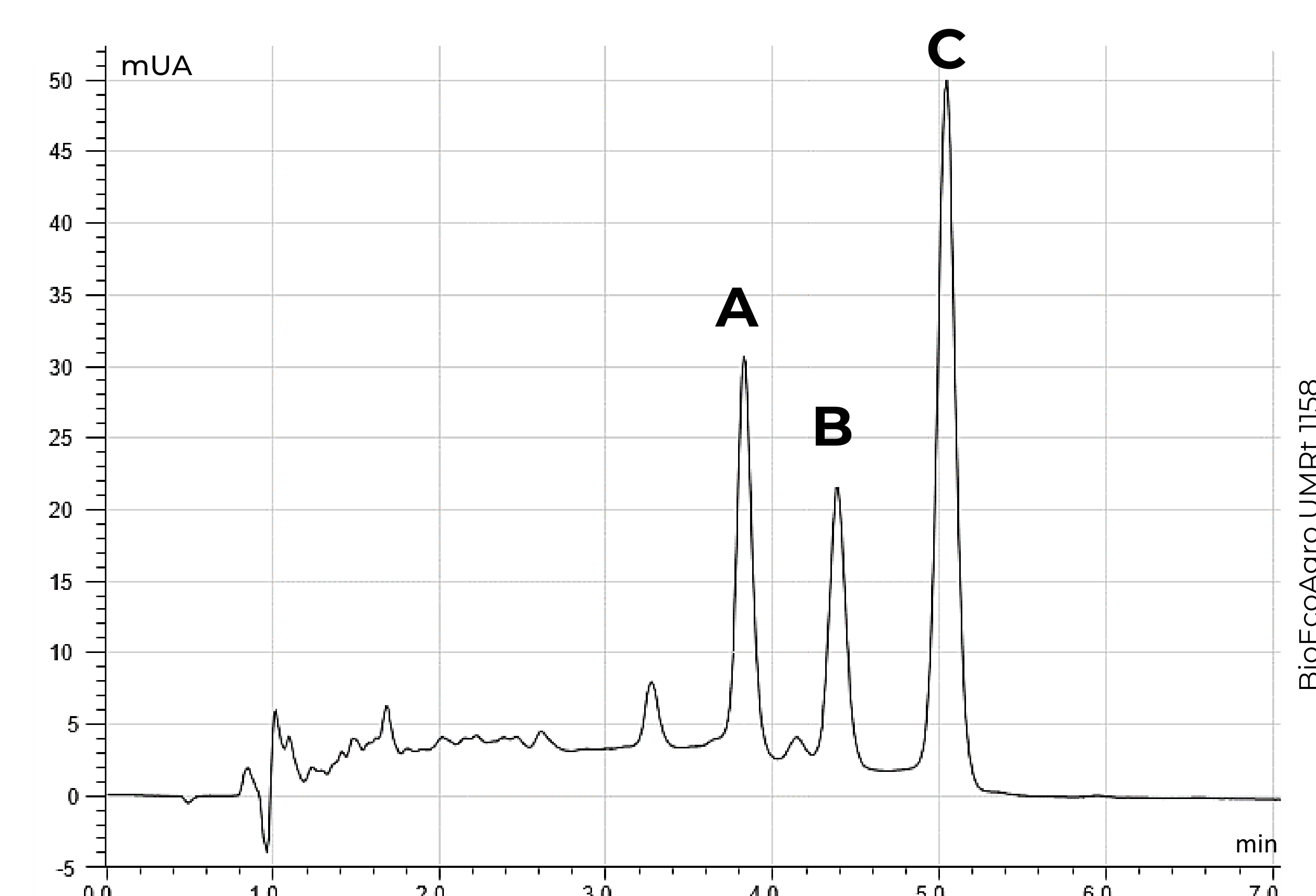
## Why biotransform turmeric ?



## Micro-organism' growth during Turmeric's biotransformation



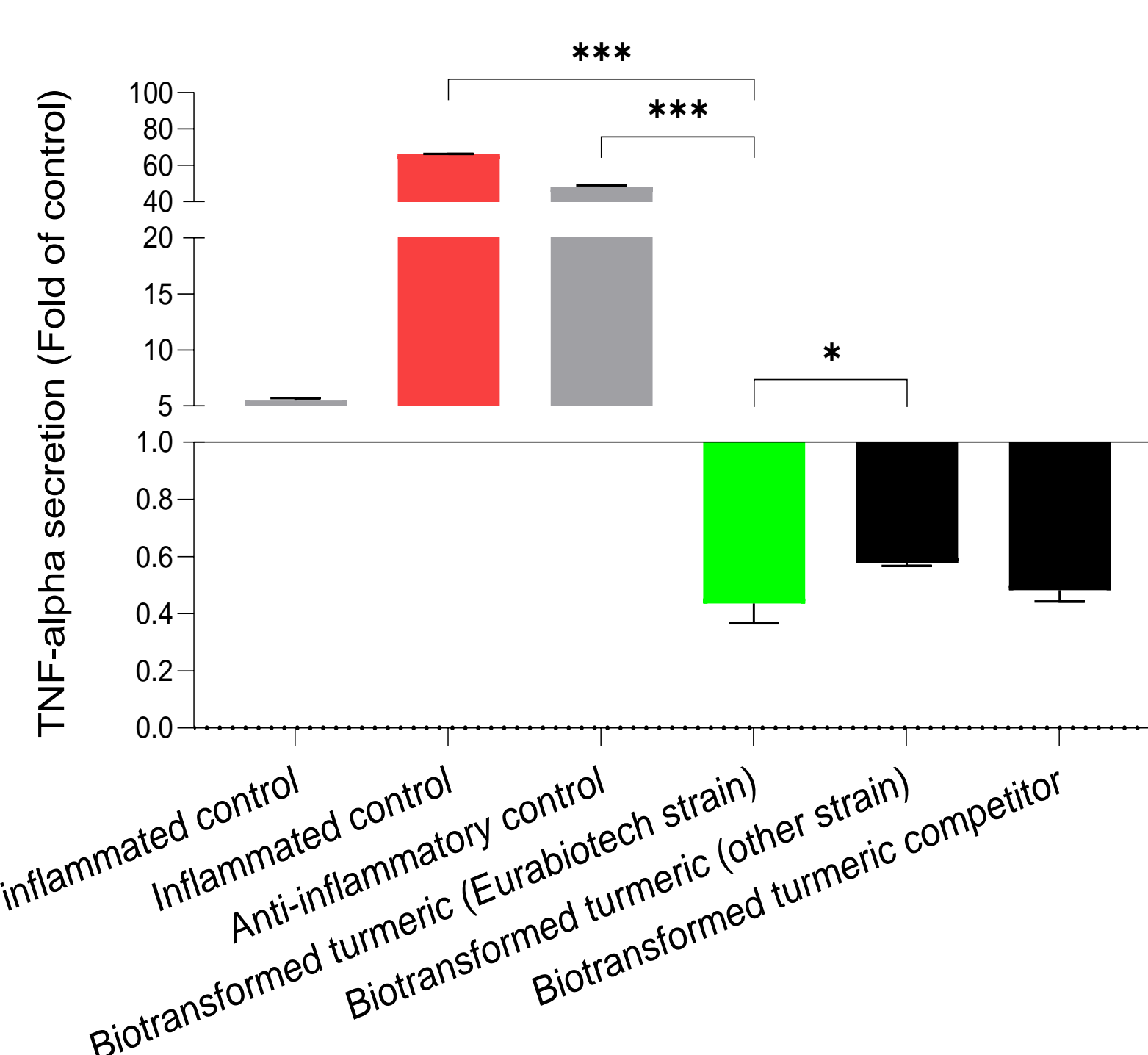
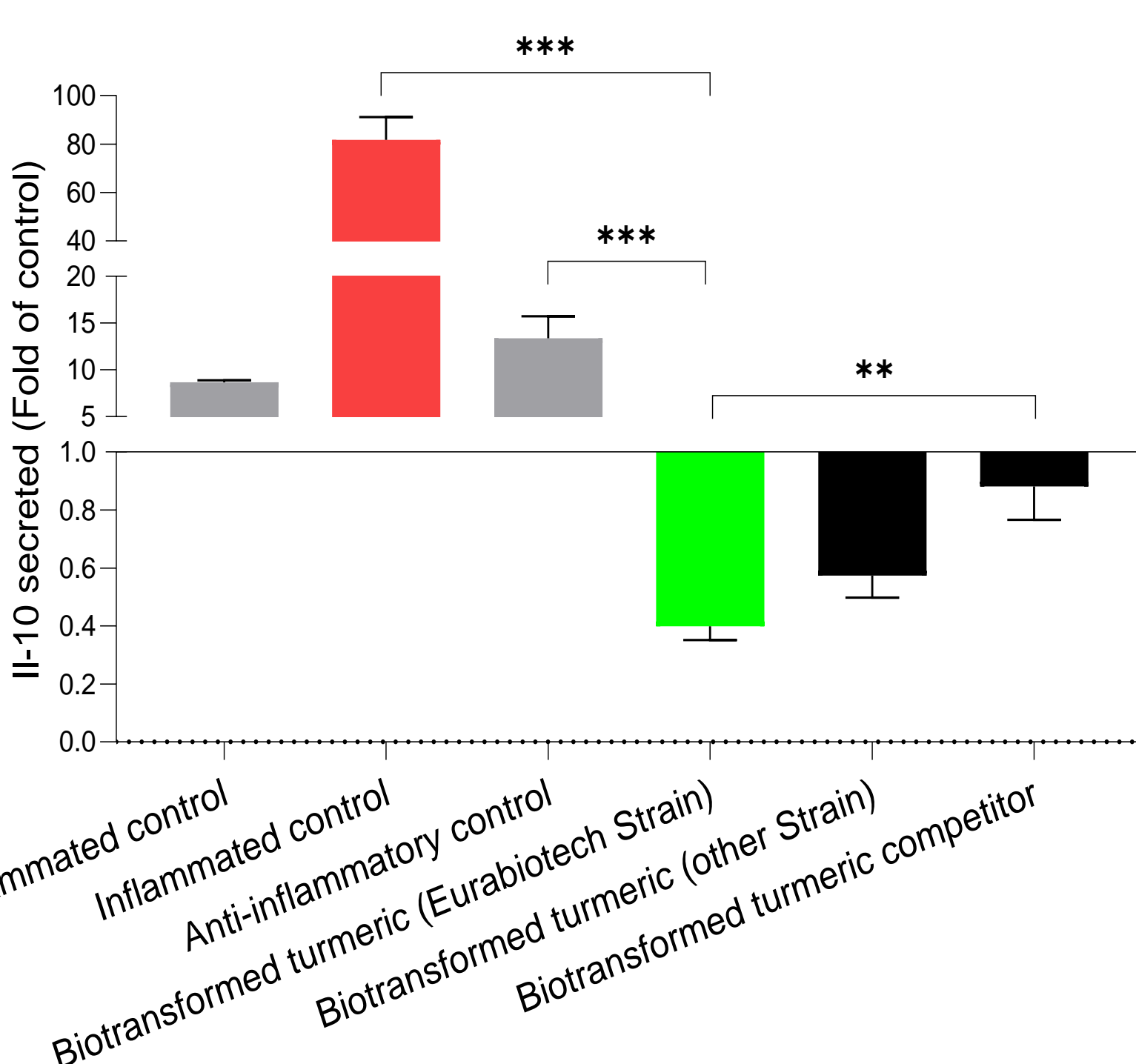
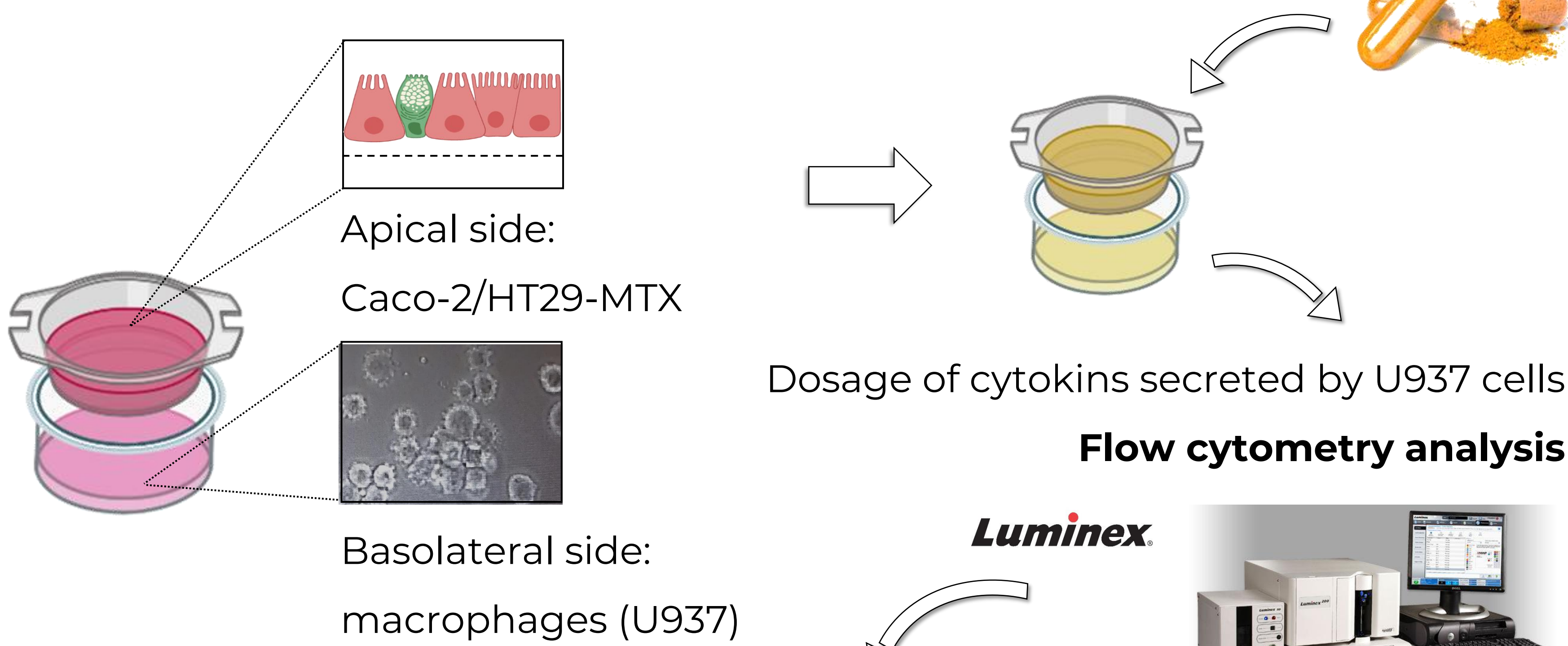
## Bioactive compounds of turmeric



### Turmeric powder's major curcuminoids

Turmeric powder (1 g/l, MeOH), High performance liquid chromatography (PFP column, UV detector, 420 nm)  
BMC : Bis-demethoxycurcumin,  
DMC : demethoxycurcumin

## Inflammatory model of study : Intestinal cell barrier



## Anti-inflammatory activity of biotransformed turmeric

Non biotransformed turmeric (FC=1) v.s. different biotransformed turmeric. The Eurabiotech biotransformed turmeric shows a lower secretion of two pro-inflammatory biomarkers : IL-10 and TNF-alpha compared to turmeric biotransformed by another strain and compared to a competitor. (Tukey test, p<0,02)

## Conclusion

Safety  
Anti-inflammatory  
Bowel diseases  
Naturality

