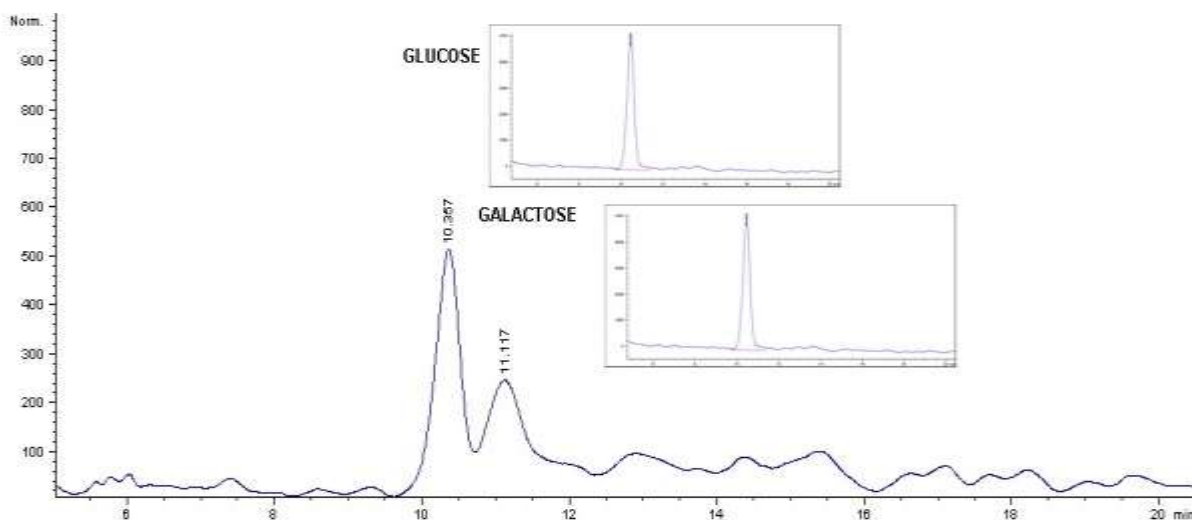


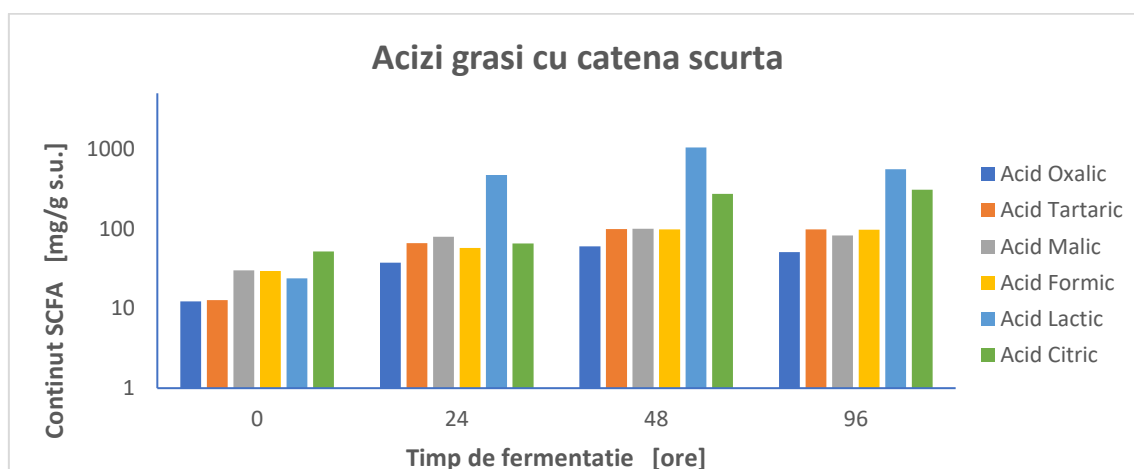
Schema de flux tehnologic pentru Colostru fermentat cu Kefir ameliorat

Rezultatele determinarilor fizico-chimice efectuate pentru colostrul fermentat

Analiza	Colostru fermentat (sarja 1)	Colostru fermentat (sarja 2)	Colostru fermentat (sarja 3)
Cenusa %	2,50	2,60	2,00
Substanta uscata % (min. 95%)	97	96,7	98,9
pH sol. 1% (4 – 5)	4,30	4,40	4,35
Lipide % (max 25%)	22,33	20,3	24,3
Carbhidrati (fata de glucoza) % (max. 15%)	11,80	12,0	11,98
Proteine % (min. 8%0	10,527	11,05	11,88
Peptide %	16,62	16,85	16,54



Profilul cromatografic al hexozelor din kefir



Variatia continutului in acizi grasi cu catena scurta in functie de timpul de fermentare

ANALYTICAL CERTIFICATE

Bovine Colostrum 20	batch # BC20-18AA03-WZ
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	Methods	Specifications	Result / Frequency
MAIN CHARACTERISTICS			
Nature		Skimmed pre-milk of bovine (first 36hs after calving)	Conform
Appearance		Creamish fine powder	Conform
Color		Off-white to yellowish	Conform
Odor		Slightly milky to odorless	Conform
PHYSICO-CHEMICAL DATA			
pH	2% in water	5-7	6,4
Water content (% w/w)	IR method	≤ 6	5,1
Ashes (% w/w)	Mineralization	≤ 9	6,8
Proteins (% w/w)	Nx 6,38 (Kjeldahl)	≥ 65	73,6
Fat (% w/w)	NF-EN-1736	≤ 3	2,7
Carbohydrates (% w/w)	by difference	≤ 18	16,9
ACTIVE PROTEINS			
Total Immunoglobulins (%)	Immunoaffinity/HPLC	> 20	20,7
Immunoglobulins type G1 + G2 (%)	Immunoaffinity/HPLC	> 15	16,5
Lactoferrin -LFL- (%)	HPLC+UV	> 2,5	Conform
Proline-rich Polypeptides (%)	HPLC+UV	> 1,5	Conform
MICROBIOLOGY			
Total plate count (CFU/g)	ISO 4853 (2003)	< 10 ⁴	< 1000
Yeasts & moulds (CFU/g)	ISO 7954 (1998)	< 10 ³	< 100
Enterobacteris (CFU/g)	ISO 21528-2 (2004)	< 10	< 10
E. coli (CFU/25g)	ISO 16649-2 (2001)	Negative	Negative
S. aureus coag. + (CFU/25g)	ISO 6888-1 (1999)	Negative	Negative
Salmonella (CFU/25 g)	ISO 6579 (2002)	Negative	Negative
L. monocytogenes (CFU/25g)	Vidas	Negative	Negative
CONTAMINANTS			
Lead (ppm)	Mineralization + ICP-MS	< 3	Conform
Arsenic (ppm)	Mineralization + ICP-MS	< 2	Conform
Cadmium (ppm)	Mineralization + ICP-MS	< 1	Conform
Mercury (ppm)	Mineralization + ICP-MS	< 0,1	Conform
Dioxins+PCBs	HRGC/HRMS	Negative	Conform
Pesticides	GC/ECD	Negative	Conform
Aflatoxin M1	Immunoaffinity/HPLC	Negative	Conform
Antibiotics	Delvotest®	Negative	Conform

Shelf-life: 24 months if properly stored (dry & cool place, away from light and air)

 Production date : 30 JAN 2018
 Best before date : 30 JAN 2020

 Issued on : 07 FEB 2018
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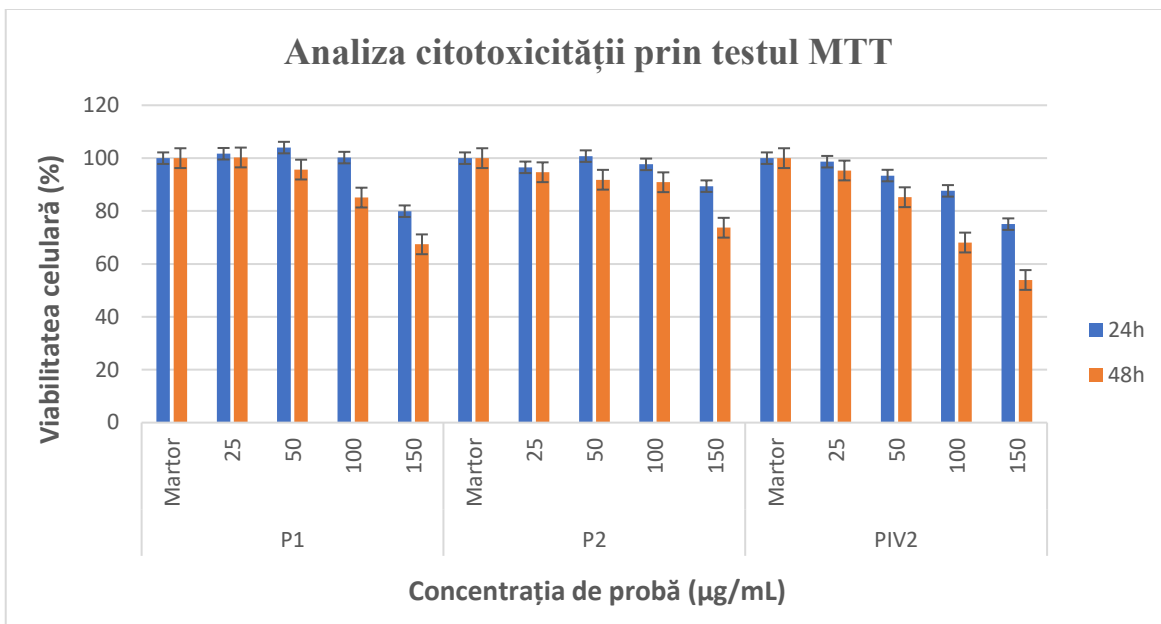
Produced in EU and commercialized by:

Analiza reproductibilității metodei de determinare a activității antioxidante a peptidelor bioactive

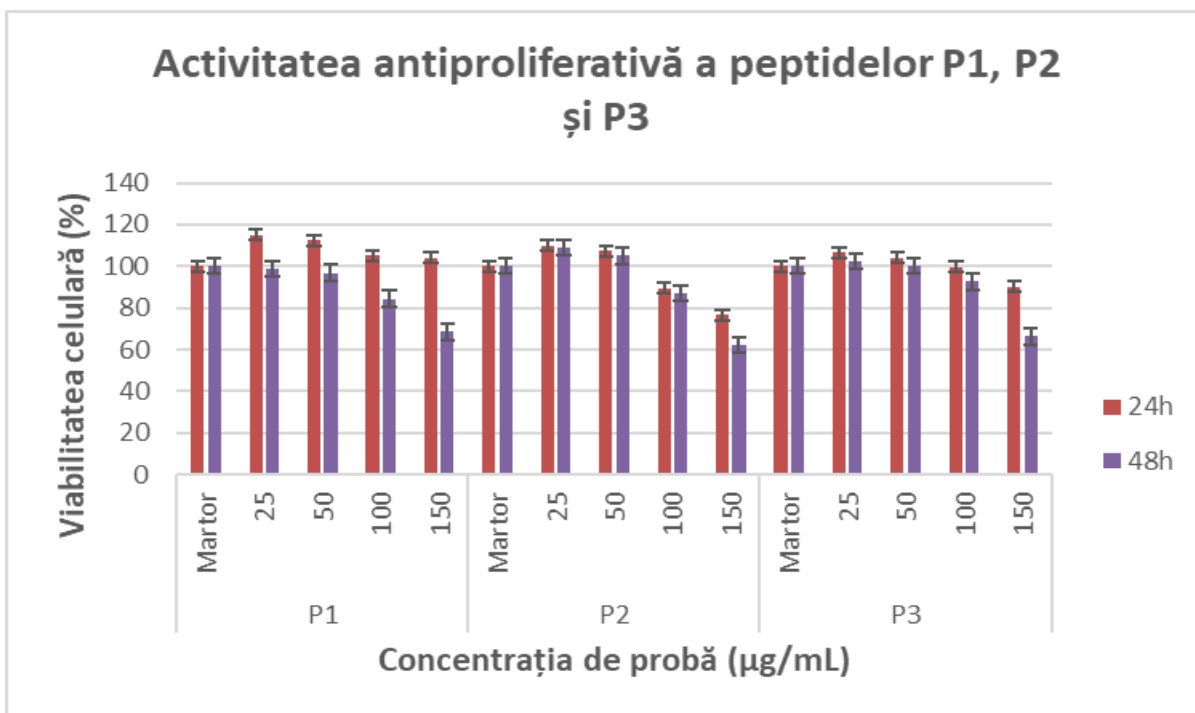
Nr. probă	Activitatea antioxidantă, mM ET/mL	Valoarea medie (MD)	Deviația standard (SD)	Incertitudinea	CV, %
1	1,27				
2	1,28				
3	1,27				
4	1,3	1,2188	0,0671	0,1341	5,5030
5	1,18				
6	1,16				
7	1,14				
8	1,15				

Analiza reproductibilității metodei de determinare a activității prebiotice a peptidelor bioactive

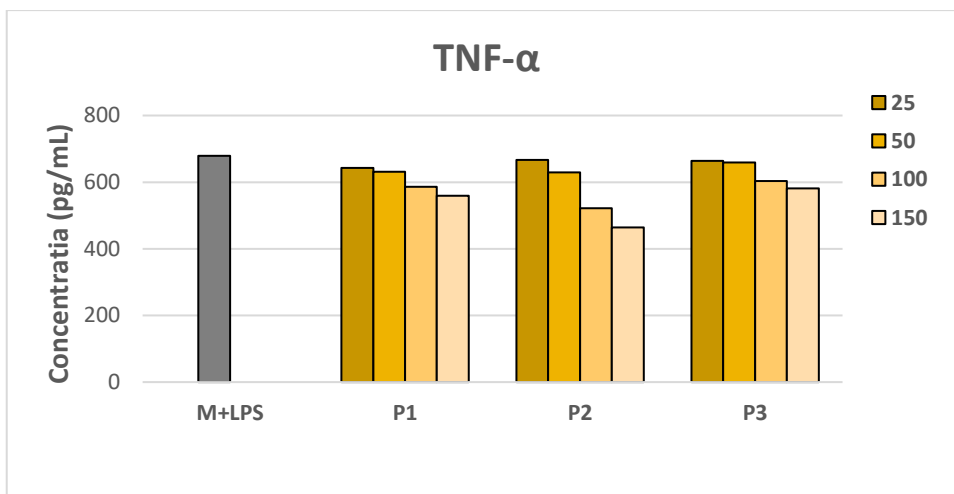
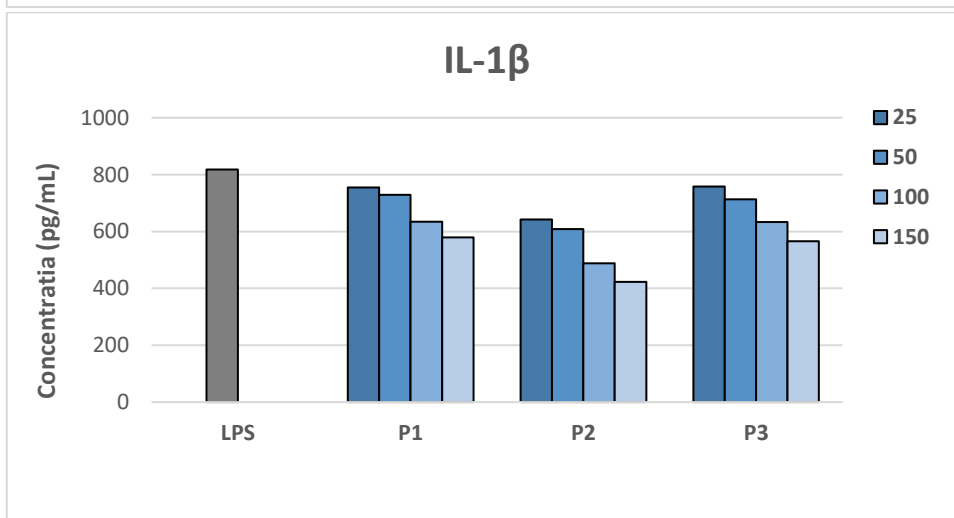
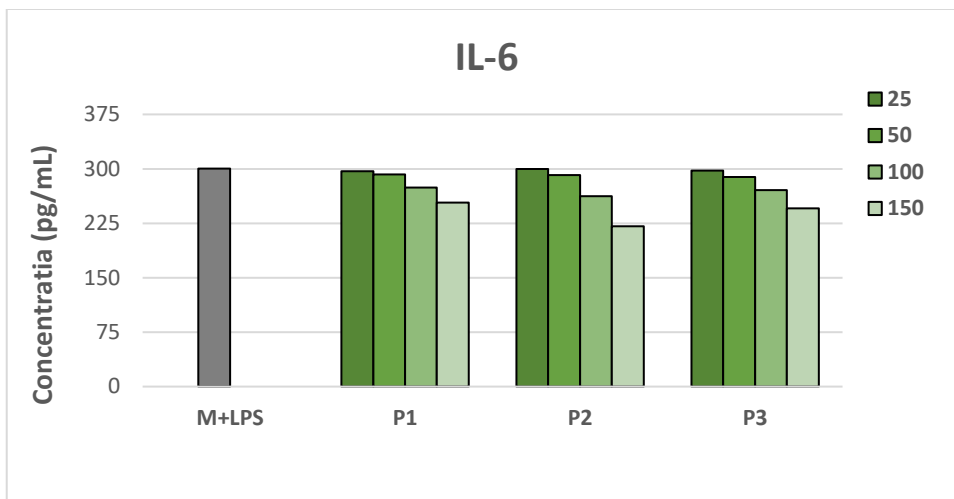
Nr. probă	Activitatea prebiotică, log cfu/mL	Valoarea medie (MD)	Deviația standard (SD)	Incertitudinea	CV %
1	8,67				
2	8,38				
3	8,63				
4	8,8	8,6388	0,1356	0,2712	1,5695
5	8,56				
6	8,67				
7	8,6				
8	8,8				



Viabilitatea celulelor NCTC în prezența peptidelor P1, P2, P3 la 24h și 48h de incubare



Graficul activității antiproliferative a peptidelor la 24h și 48h de incubare



Dozarea citokinilor IL-6 (A), IL-1 β (B) si TNF- α (C) secretate de celulele THP-1 stimulate cu LPS si tratate cu diferite concentratii de peptide, prin metoda ELISA.