

**Supplementary table S1.** Compiled results of raw sheep's milk microbiological quality and resistance studies.

Samples	Mesophiles	Total coliforms	E. coli	S. aureus	Enterotoxins	Nº of isolates	Identified species	Antimicrobial resistance	Resistance genes
Farm 1 (milk)	7.0E+3	3.1E+1	2.1E+1	2.8E+3	Negative	13	<i>S. simulans</i> , <i>S. sciuri</i>	Oxacillin, Cefovecin, Benzylpenicillin,	
	8.7E+4	9.0E+0	0.0E+0	2.0E+3	Negative			Ceftiofur, Kanamycin, Neomycin,	<i>tetL</i> , <i>sul1</i> ,
	7.6E+4	1.7E+1	0.0E+0	2.7E+3	Negative			Pradofloxacin, Clindamycin,	<i>ermB</i> , <i>tetM</i> ,
	6.1E+4	2.5E+1	2.0E+0	2.0E+3	Negative			Tetracycline, Chloramphenicol,	<i>strA</i>
	9.0E+4	2.6E+1	0.0E+0	1.8E+3	Negative			Trimethoprim, Erythromycin	
Farm 2 (milk)	3.8E+4	1.8E+3	3.0E+0	1.0E+3	Negative	1	<i>S. sciuri</i>	Oxacillin, Cefovecin	<i>ermB</i> , <i>tetM</i>
	5.2E+4	3.7E+1	0.0E+0	5.3E+3	Positive				
	4.8E+4	1.7E+2	0.0E+0	3.8E+3	Negative				
	6.5E+4	6.1E+3	2.0E+0	1.8E+3	Negative				
	3.2E+4	7.9E+3	9.0E+0	1.9E+3	Negative				
Farm 3 (milk)	6.0E+4	4.0E+2	1.9E+2	2.2E+3	Negative	10	<i>S. simulans</i> , <i>S. sciuri</i> , <i>S. aureus</i>	Oxacillin, Cefovecin, Benzylpenicillin,	
	3.0E+4	8.7E+2	7.0E+1	4.0E+3	Negative			Ceftiofur, Kanamycin, Neomycin,	
	3.3E+4	4.5E+3	1.9E+2	4.6E+3	Negative			Pradofloxacin, Clindamycin,	<i>tet L</i> , <i>sul1</i> ,
	3.2E+4	3.8E+2	1.3E+2	4.0E+3	Negative			Tetracycline, Chloramphenicol,	<i>sul2</i> , <i>ermB</i> ,
	3.3E+4	4.1E+3	1.3E+2	2.4E+3	Negative			Trimethoprim, Doxycycline,	<i>tetM</i> , <i>strA</i>
								Enrofloxacin, Amoxicillin,	
								Marbofloxacin, Cephalotin, Ampicillin,	
								Rifampicin	

**Supplementary table S2.** Compiled results of raw sheep's cheese microbiological quality and resistance studies.

Samples	Mesophiles	Total coliforms	<i>E. coli</i>	<i>S. aureus</i>	Enterotoxins	Nº of isolates	Identified species	Antimicrobial resistance	Resistance genes
Feta-Type	4.4E+5	2.6E+2	0.0E+0	0.0E+0	Negative	8	<i>S. lentus</i> , <i>S. sciuri</i>	Rifampicin, Benzylpenicillin, Oxacillin, Cefovecine, Ceftiofur, Clindamycin	<i>tetL</i> , <i>sul1</i> , <i>ermB</i> , <i>tetM</i> , <i>strA</i>
	4.5E+5	0.0E+0	0.0E+0	0.0E+0	Negative				
	1.4E+5	0.0E+0	0.0E+0	0.0E+0	Negative				
	5.4E+6	1.9E+2	0.0E+0	0.0E+0	Negative				
	6.0E+6	1.5E+5	0.0E+0	0.0E+0	Negative				
Colonial	8.3E+3	0.0E+0	0.0E+0	0.0E+0	Negative	3	<i>S. pseudintermedius</i> , <i>S. chromogenes</i>	Benzylpenicillin, Oxacillin, Cephalothin, Cefovecine, Ceftiofur, Pradofloxacin, Erythromycin, Clindamycin, Tetracycline	<i>ermB</i> , <i>tetM</i> , <i>AAC(6)</i> , <i>strA</i>
	3.0E+4	0.0E+0	0.0E+0	0.0E+0	Negative				
	3.4 E+4	0.0E+0	0.0E+0	0.0E+0	Negative				
	1.3E+5	0.0E+0	0.0E+0	0.0E+0	Negative				
	2.9E+5	0.0E+0	0.0E+0	0.0E+0	Negative				
Fresh	1.7E+5	1.2E+3	0.0E+0	6.4E+1	Negative	0	Not performed	Not performed	Not performed
	3.5E+5	2.4E+3	0.0E+0	1.8E+1	Negative				
	3.1E+5	8.1E+2	0.0E+0	1.0E+1	Negative				
	3.0E+5	1.3E+3	2.6E+2	6.0E+1	Negative				
	4.7E+5	3.2E+3	9.3E+2	0.0E+0	Negative				
Pecorino-Type	2.1E+5	0.0E+0	0.0E+0	0.0E+0	Negative	4	<i>S. lentus</i> , <i>S. warneri</i>	Rifampicin, Benzylpenicillin, Erythromycin	<i>sul1</i> , <i>tetW</i> , <i>strA</i>
	2.0E+5	0.0E+0	0.0E+0	0.0E+0	Negative				
	4.1E+6	1.1E+3	0.0E+0	0.0E+0	Negative				
	6.4E+6	2.8E+3	0.0E+0	0.0E+0	Negative				
	2.7E+5	1.2E+2	0.0E+0	1.5E+2	Negative				