

- 1 Table S1. Antimicrobial susceptibility profile of the *Staphylococcus aureus* isolates from milk and nasal/muzzles swabs samples performed by the
2 automated Vitek 2[®] compact system by minimum inhibitory concentration.

[illegible]

[illegible]

[illegible]

Tetracycline ¹ (1.0 – 16 µg mL ⁻¹)	≥ 16	Milk Swab	43.96 0	43.9 6 0	–	–	–	–	94 (51.64) 6 (85.71)	6 (3.30) 1 (14.29)	1 (0.55)	–	1 (0.55)	–	80 (43.96)	–	–	–	–	–	–	–	–
Trimethoprim/ sulfamethaxazole ² (10.0 – 320 µg mL ⁻¹)	≥ 80	Milk Swab	0.55 0	0.55 0	–	–	–	–	–	–	–	–	178 97.80) 1 (85.71)	–	3 (1.65) 1 (14.29)	–	–	–	–	–	–	–	1 (0.55)
Vancomycin ¹ (0.5 – 32 µg mL ⁻¹)	≥ 16	Milk Swab	3.30 0	3.30 0	–	–	–	88 (48.35) 5 (71.43)	78 (42.86) 2 (28.57)	10 (5.49)	–	–	–	–	–	6 (3.30)	–	–	–	–	–	–	–
Oxacillin ¹ (0.25 – 4.0 µg mL ⁻¹)	≥ 4	Milk Swab	4.40 0	4.40 0	–	–	162 (89.01) 7 (100)	11 (6.04)	–	1 (0.55)	8 (4.40)	–	–	–	–	–	–	–	–	–	–	–	–
Cefoxitin screening	≥ 8	Milk Swab	2.20 14.29	2.20 14.29	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–
Fusidic acid ² (0.5 – 32 µg mL ⁻¹)	≥ 1	Milk Swab	3.85 0	3.85 0	–	–	–	173 (95.05) 7 (100)	2 (1.10)	–	1 (0.55)	–	1 (0.55)	–	1 (0.55)	–	4 (2.20)	–	1	–	–	–	–

3 MIC: minimal inhibitory concentration. BP: MIC breakpoint, which is defined as the lowest concentration of an antimicrobial necessary to inhibit visible growth. ¹MIC breakpoints established by the Clinical & Laboratory
4 Standards Institute (CLSI) guidelines (CLSI, 2018a and 2018b). ²MIC breakpoints established by the European Committee on Antimicrobial Susceptibility Testing (EUCAST, 2019). Values in bold indicate intermediate
5 resistance to that antimicrobial. Values in bold and red indicate resistance to that antimicrobial. Swab: nasal swab. NA: not available. Dashes indicate values not tested for the indicated antimicrobial.