

Table 1. Formation of benzoic acid and derivatives (μM) during the *in vitro* fermentation (0 to 24h). A letter after the numerical value indicates significant differences ($p<0.05$) between the samples within a time point.

Time (h)	Benzoic acid (μM)					4-Hydroxybenzoic acid (μM)				
	Native	Ground	Xyn	Xyn+FAE	Control	Native	Ground	Xyn	Xyn+FAE	Control
0	2.39 ^{ab}	3.48 ^a	3.01 ^a	3.37 ^a	1.28 ^b	1.96 ^a	2.42 ^a	2.45 ^a	1.99 ^a	0.83 ^b
2	5.25 ^{ab}	5.61 ^{ab}	4.38 ^b	5.92 ^a	3.46 ^b	4.61 ^a	4.55 ^a	4.73 ^a	3.87 ^a	1.52 ^b
4	4.07 ^{bc}	2.72 ^c	5.64 ^{ab}	6.06 ^a	4.16 ^{abc}	4.26 ^a	4.02 ^a	4.22 ^a	3.33 ^b	1.68 ^c
6	5.36	3.54	6.04	6.49	4.31	3.61 ^a	3.67 ^a	3.44 ^a	3.19 ^a	1.70 ^b
8	8.17	6.26	7.01	5.71	4.75	3.26 ^a	3.13 ^a	2.95 ^{ab}	2.06 ^b	1.96 ^b
24	7.64 ^{ab}	10.82 ^a	6.43 ^{ab}	6.78 ^{ab}	5.26 ^b	0.92 ^b	1.45 ^a	0.72 ^b	0.59 ^b	1.36 ^a

Time (h)	3,4-Dihydroxybenzoic acid (μM)					3,4-Dihydroxytoluene (μM)				
	Native	Ground	Xyn	Xyn+FAE	Control	Native	Ground	Xyn	Xyn+FAE	Control
0	2.21 ^{bc}	2.88 ^{ab}	3.51 ^a	3.14 ^{ab}	1.50 ^c	0.21 ^{ab}	0.28 ^a	0.17 ^{ab}	0.13 ^{ab}	0.10 ^b
2	2.17	2.30	2.42	2.23	1.75	0.29	0.30	0.27	0.31	0.23
4	2.01 ^{ab}	2.09 ^a	2.24 ^a	2.17 ^a	1.70 ^b	0.33 ^{bc}	0.37 ^{bc}	0.52 ^{ab}	0.68 ^a	0.23 ^c
6	1.69	1.77	1.97	1.78	1.65	0.64 ^{ab}	0.51 ^{bc}	0.75 ^{ab}	1.04 ^a	0.20 ^c
8	1.58	1.20	1.69	1.20	2.40	0.97 ^a	0.88 ^{ab}	1.02 ^a	0.83 ^{ab}	0.20 ^b
24	0.84 ^b	1.01 ^{ab}	0.88 ^b	0.83 ^b	1.30 ^a	0.87 ^{bc}	1.91 ^a	1.35 ^{ab}	1.27 ^b	0.61 ^c

Table 2. Evolution of pH during the *in vitro* fermentation (0 to 24h) of aleurone fractions. A letter after the numerical value indicates significant differences ($p<0.05$) between the samples within a time point.

Time (h)	Native	Ground	Xyn	Xyn+FAE	Control
0	$7.30 \pm 0.01^{\text{ab}}$	$7.35 \pm 0.05^{\text{a}}$	$7.30 \pm 0.03^{\text{ab}}$	$7.04 \pm 0.02^{\text{c}}$	$7.24 \pm 0.01^{\text{b}}$
2	$6.87 \pm 0.06^{\text{b}}$	$6.88 \pm 0.04^{\text{b}}$	$6.69 \pm 0.04^{\text{c}}$	$6.55 \pm 0.05^{\text{c}}$	$7.13 \pm 0.07^{\text{a}}$
4	$6.75 \pm 0.01^{\text{b}}$	$6.73 \pm 0.01^{\text{b}}$	$6.64 \pm 0.02^{\text{bc}}$	$6.56 \pm 0.01^{\text{c}}$	$7.28 \pm 0.11^{\text{a}}$
6	$6.70 \pm 0.03^{\text{b}}$	$6.66 \pm 0.02^{\text{b}}$	$6.64 \pm 0.03^{\text{b}}$	$6.63 \pm 0.02^{\text{b}}$	$7.21 \pm 0.02^{\text{a}}$
8	$6.76 \pm 0.01^{\text{b}}$	$6.64 \pm 0.01^{\text{c}}$	$6.58 \pm 0.02^{\text{c}}$	$6.55 \pm 0.04^{\text{c}}$	$7.24 \pm 0.07^{\text{a}}$
24	$6.35 \pm 0.00^{\text{c}}$	$6.43 \pm 0.02^{\text{b}}$	$6.45 \pm 0.00^{\text{b}}$	$6.42 \pm 0.01^{\text{b}}$	$7.07 \pm 0.02^{\text{a}}$