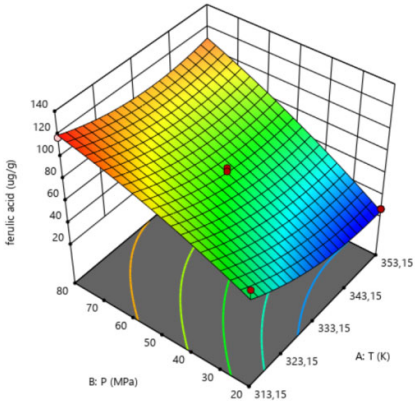
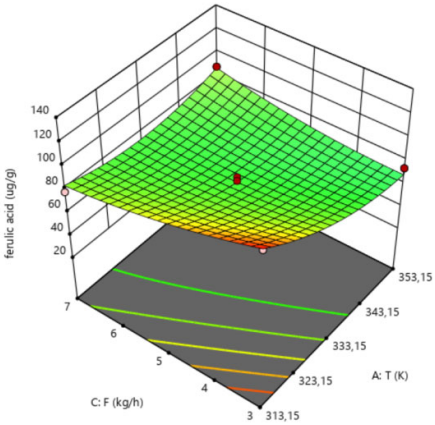
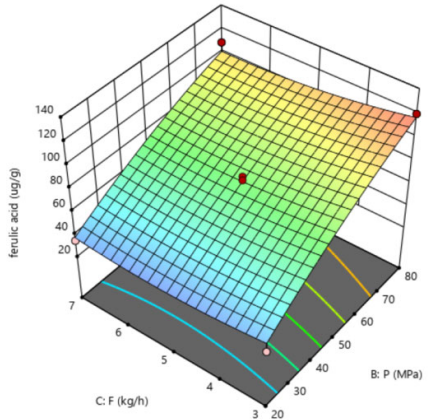


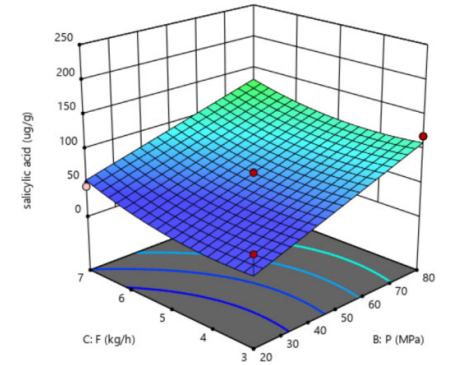
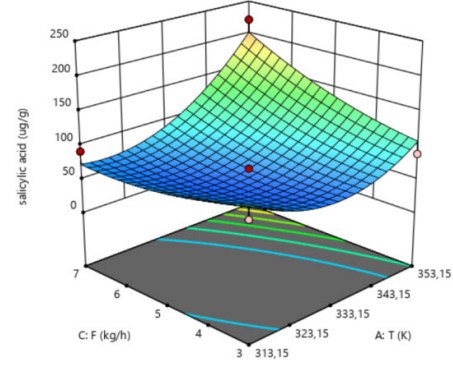
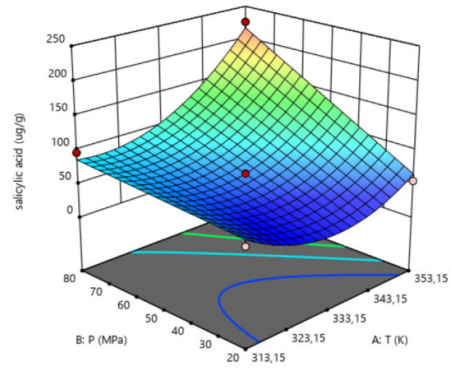
Table S1. Specific HPLC-MS/MS results for lucerne extracts, where quantities as express as $\mu\text{g } 100\text{g}^{-1}$ DW (DW – dry weight of the feedstock; 200 g).

compounds	number of extraction experiments														
	E1	E2	E3	E4	E5	E6	E7	E8	E9	E10	E11	E12	E13	E14	E15
coumaric acid	2.99	1.97	0.32	2.61	1.35	1.21	1.19	1.35	1.32	0.59	2.13	1.25	0.93	0.23	2.04
salicylic acid	51.59	112.85	27.40	43.93	32.24	42.42	33.19	1.00	48.44	21.54	29.25	45.67	59.78	22.51	110.71
caffeic acid	0.39	0.49	0.21	0.18	0.29	0.24	0.30	0.31	0.19	0.14	0.08	0.13	0.30	0.13	0.62
syringic acid	4.82	3.41	1.67	4.07	2.54	2.78	2.49	2.59	3.90	2.25	2.30	2.50	3.42	1.17	3.38
ferulic acid	54.37	50.93	13.45	59.87	34.52	37.06	39.45	37.82	58.88	16.05	36.96	39.35	59.80	17.30	43.88
protocatechuic acid	0.16	0.15	0.10	0.15	0.13	0.11	0.12	0.13	0.12	0.09	0.06	0.05	0.13	0.04	0.22
sinapic acid	0.66	0.64	0.12	0.76	0.48	0.43	0.50	0.48	0.53	0.13	0.14	0.17	0.81	0.12	0.40
4-hydroxybenzoic acid	0.43	0.49	1.18	0.59	0.93	0.56	0.97	1.01	1.58	0.26	n.d.	n.d.	n.d.	0.12	0.18
biochanin A	0.17	0.06	0.02	0.05	0.08	0.04	0.08	0.08	0.07	0.03	0.03	0.08	0.23	0.04	0.10
esculetin	0.11	0.06	0.04	0.04	0.06	0.04	0.05	0.06	0.07	0.05	0.02	0.02	0.03	0.04	0.08
esculin	0.01	n.d.	n.d.	n.d.	0.01	n.d.	0.01	0.01	0.01	n.d.	0.01	0.01	0.01	n.d.	n.d.
naringenin	0.14	0.09	0.02	0.05	0.08	0.07	0.09	0.09	0.08	0.04	0.01	0.06	0.12	0.02	0.13
naringin	0.01	0.01	n.d.	0.01	0.01	0.01	0.01	0.01	0.01	0.01	n.d.	n.d.	0.01	n.d.	0.01
quercetin	1.02	0.43	0.14	0.48	0.28	0.37	0.28	0.30	0.37	0.16	0.33	0.34	1.12	0.20	0.68
rutin	n.d.	n.d.	n.d.	0.01	0.01	n.d.	0.01	0.01	n.d.	n.d.	n.d.	n.d.	0.01	n.d.	n.d.
luteolin	0.07	0.09	n.d.	0.01	0.03	0.04	0.03	0.03	0.05	n.d.	n.d.	0.01	0.07	n.d.	0.06
apigenin	1.30	0.61	0.04	0.01	0.23	0.49	0.28	0.25	0.79	0.24	n.d.	0.45	1.10	0.11	0.67

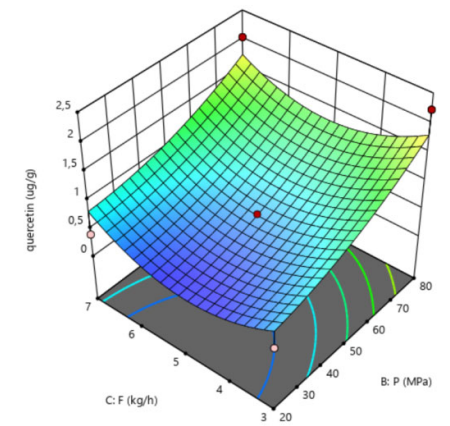
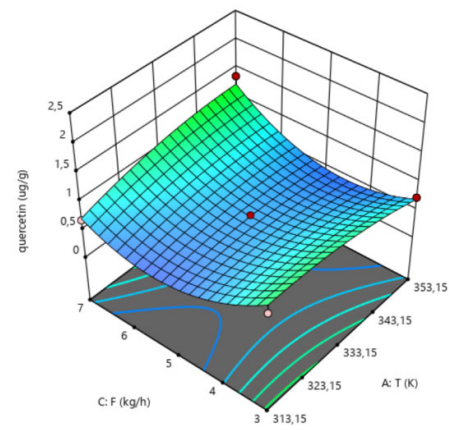
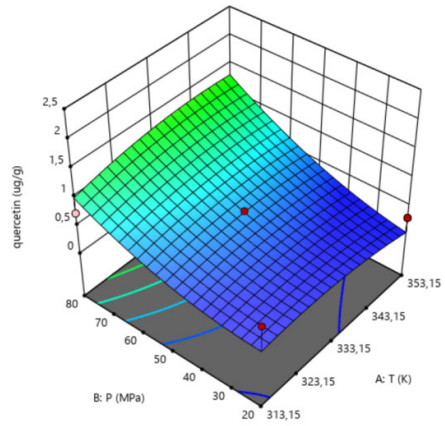
Table S2. Response surface plots for the most concentrated polar bioactive compounds in lucerne extracts as a function of main process parameters.

	Response surface plot as a function of: pressure (P) and temperature (T)	Response surface plot as a function of: solvent flow rate (F) and temperature (T)	Response surface plot as a function of: pressure (P) and solvent flow rate (F)
Ferulic acid, $\mu\text{g g}^{-1}$			

Salicylic acid, $\mu\text{g g}^{-1}$



Quercetin, $\mu\text{g g}^{-1}$



Apigenin, $\mu\text{g g}^{-1}$

