

Supplementary Materials

Table S1. Wavenumbers used in the model calibration of enzymatically treated orange juice

(a) Absorbance

	Wavenumber (cm ⁻¹)				
	Glc	Fru	Suc	GF2	GF3
Model A	900, 902, 904, 906, 908, 910, 912, 914, 916, 918, 920, 922, 924, 926, 928, 930, 932, 934, 936, 938, 940, 942, 944, 946, 948, 950, 952, 954, 956, 958, 960, 962, 964, 966, 968, 970, 972, 974, 976, 978, 980, 982, 984, 986, 988, 990, 992, 994, 996, 998, 1000, 1002, 1004, 1006, 1008, 1010, 1012, 1014, 1016, 1018, 1020, 1022, 1024, 1026, 1028, 1030, 1032, 1034, 1036, 1038, 1040, 1042, 1044, 1046, 1048, 1050, 1052, 1054, 1056, 1058, 1060, 1062, 1064, 1066, 1068, 1070, 1072, 1074, 1076, 1078, 1080, 1082, 1084, 1086, 1088, 1090, 1092, 1094, 1096, 1098, 1100, 1102, 1104, 1106, 1108, 1110, 1112, 1114, 1116, 1118, 1120, 1122, 1124, 1126, 1128, 1130, 1132, 1134, 1136, 1138, 1140, 1142, 1144, 1146, 1148, 1150, 1152, 1154, 1156, 1158, 1160, 1162, 1164, 1166, 1168, 1170, 1172, 1174, 1176, 1178, 1180, 1182, 1184, 1186, 1188, 1190, 1192, 1194, 1196, 1198, 1200, 1202, 1204, 1206, 1208, 1210, 1212, 1214, 1216, 1218, 1220, 1222, 1224, 1226, 1228, 1230, 1232, 1234, 1236, 1238, 1240, 1242, 1244, 1246, 1248, 1250				
Model B	918, 994, 1018, 1034, 1056, 1080, 1106, 1152	920, 968, 980, 1018, 1034, 1064, 1084, 1102, 1156, 1182	928, 1000, 1018, 1032, 1056, 1082, 1114, 1138, 1162, 1212	930, 1002, 1020, 1034, 1056, 1078, 1116, 1136, 1162, 1216	930, 998, 1018, 1034, 1054, 1080, 1116, 1136, 1162, 1220
Model C	918, 920, 928, 930, 968, 980, 994, 998, 1000, 1002, 1018, 1020, 1032, 1034, 1054, 1056, 1064, 1078, 1080, 1082, 1084, 1102, 1106, 1114, 1116, 1136, 1138, 1152, 1156, 1162, 1182, 1212, 1216, 1220				

(b) 2nd derivative

	Wavenumber (cm ⁻¹)				
	Glc	Fru	Suc	GF2	GF3
Model A	900, 902, 904, 906, 908, 910, 912, 914, 916, 918, 920, 922, 924, 926, 928, 930, 932, 934, 936, 938, 940, 942, 944, 946, 948, 950, 952, 954, 956, 958, 960, 962, 964, 966, 968, 970, 972, 974, 976, 978, 980, 982, 984, 986, 988, 990, 992, 994, 996, 998, 1000, 1002, 1004, 1006, 1008, 1010, 1012, 1014, 1016, 1018, 1020, 1022, 1024, 1026, 1028, 1030, 1032, 1034, 1036, 1038, 1040, 1042, 1044, 1046, 1048, 1050, 1052, 1054, 1056, 1058, 1060, 1062, 1064, 1066, 1068, 1070, 1072, 1074, 1076, 1078, 1080, 1082, 1084, 1086, 1088, 1090, 1092, 1094, 1096, 1098, 1100, 1102, 1104, 1106, 1108, 1110, 1112, 1114, 1116, 1118, 1120, 1122, 1124, 1126, 1128, 1130, 1132, 1134, 1136, 1138, 1140, 1142, 1144, 1146, 1148, 1150, 1152, 1154, 1156, 1158, 1160, 1162, 1164, 1166, 1168, 1170, 1172, 1174, 1176, 1178, 1180, 1182, 1184, 1186, 1188, 1190, 1192, 1194, 1196, 1198, 1200, 1202, 1204, 1206, 1208, 1210, 1212, 1214, 1216, 1218, 1220, 1222, 1224, 1226, 1228, 1230, 1232, 1234, 1236, 1238, 1240, 1242, 1244, 1246, 1248, 1250				
Model B	920, 990, 1034, 1080, 1110, 1156	922, 974, 1062, 1088, 1108, 1156, 1188	928, 996, 1056, 1110, 1140, 1212	928, 994, 1028, 1060, 1074, 1114, 1136, 1168, 1216	930, 994, 1030, 1060, 1072, 1114, 1138, 1168, 1218
Model C	920, 922, 928, 930, 974, 990, 994, 996, 1028, 1030, 1034, 1056, 1060, 1062, 1072, 1074, 1080, 1088, 1108, 1110, 1114, 1136, 1138, 1140, 1156, 1168, 1188, 1212, 1216, 1218				

Table S2. Wavenumbers used in the model calibration of fruit juice with added fructo-oligosaccharides.

	Wavenumber (cm ⁻¹)					
	Glc	Fru	Suc	GF2	GF3	GF4
Model A	900, 902, 904, 906, 908, 910, 912, 914, 916, 918, 920, 922, 924, 926, 928, 930, 932, 934, 936, 938, 940, 942, 944, 946, 948, 950, 952, 954, 956, 958, 960, 962, 964, 966, 968, 970, 972, 974, 976, 978, 980, 982, 984, 986, 988, 990, 992, 994, 996, 998, 1000, 1002, 1004, 1006, 1008, 1010, 1012, 1014, 1016, 1018, 1020, 1022, 1024, 1026, 1028, 1030, 1032, 1034, 1036, 1038, 1040, 1042, 1044, 1046, 1048, 1050, 1052, 1054, 1056, 1058, 1060, 1062, 1064, 1066, 1068, 1070, 1072, 1074, 1076, 1078, 1080, 1082, 1084, 1086, 1088, 1090, 1092, 1094, 1096, 1098, 1100, 1102, 1104, 1106, 1108, 1110, 1112, 1114, 1116, 1118, 1120, 1122, 1124, 1126, 1128, 1130, 1132, 1134, 1136, 1138, 1140, 1142, 1144, 1146, 1148, 1150, 1152, 1154, 1156, 1158, 1160, 1162, 1164, 1166, 1168, 1170, 1172, 1174, 1176, 1178, 1180, 1182, 1184, 1186, 1188, 1190, 1192, 1194, 1196, 1198, 1200, 1202, 1204, 1206, 1208, 1210, 1212, 1214, 1216, 1218, 1220, 1222, 1224, 1226, 1228, 1230, 1232, 1234, 1236, 1238, 1240, 1242, 1244, 1246, 1248, 1250					
Model B	918, 994, 1018, 1034, 1056, 1080, 1106, 1152	920, 968, 980, 1018, 1034, 1064, 1084, 1102, 1156, 1182	928, 1000, 1018, 1032, 1056, 1082, 1114, 1138, 1162, 1212	930, 1002, 1020, 1034, 1056, 1078, 1116, 1136, 1162, 1216	930, 998, 1018, 1034, 1054, 1080, 1116, 1136, 1162, 1220	932, 996, 1018, 1036, 1054, 1118, 1134, 1162, 1218
Model C	918, 920, 928, 930, 932, 968, 980, 994, 996, 998, 1000, 1002, 1018, 1020, 1032, 1034, 1036, 1054, 1056, 1064, 1078, 1080, 1082, 1084, 1102, 1106, 1114, 1116, 1118, 1134, 1136, 1138, 1152, 1156, 1162, 1182, 1212, 1216, 1218, 1220					

Table S3. Sugar concentrations of citrus fruit juices with added fructo-oligosaccharides as determined by PLS

		Concentrations (g/L)					
		Glc	Fru	Suc	GF2	GF3	GF4
Valencia Orange	A	18.8	21.6	41.1	5.1	6.6	0.6
	B	19.0	21.6	41.8	6.3	8.5	1.2
	C	19.2	21.9	42.3	8.0	10.7	1.4
	D	21.2	21.9	43.3	12.0	16.2	2.1
	E	26.1	22.9	44.4	8.1	8.4	1.0
	F	28.3	23.5	45.5	9.9	9.8	1.3
	G	31.4	34.2	22.2	4.8	6.3	0.7
	H	31.6	34.3	22.8	6.4	8.4	1.2
	I	38.7	35.5	25.1	8.2	8.1	1.1
	J	40.2	35.8	26.4	10.4	10.8	1.4
Mandarin Orange	K	21.2	21.8	22.5	5.7	7.7	1.0
	L	28.2	23.5	25.9	6.7	6.8	0.9
Citrus Unshiu	M	20.7	21.5	23.1	7.4	9.8	1.3
	N	28.7	23.2	26.3	9.2	9.4	1.4
White Grapefruit	O	12.2	15.3	43.3	7.1	9.2	1.2
	P	20.2	16.6	46.9	8.3	8.1	1.1
Ruby Grapefruit	Q	19.2	21.8	49.2	6.6	7.9	1.1
	R	20.1	22.1	50.9	7.7	9.8	1.2