Supplementary Information

Associated factors to the consumption of non-nutritive sweeteners in the Mexican adult population

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Table S1. Questionnaire: Spanish version of the Healthy Eating Index (Índice de Alimentación Saludable)*

Questions	1. ¿Con qué frecuencia consume cereales y sus derivados como tortilla de maíz, arroz, pasta, avena, papa, elote, pan de caja o bolillo?				
	2. ¿Con qué frecuencia consume verduras como pepino, jitomate, nopales, lechuga, zanahoria, chayote, champiñones, calabacitas, brócoli, etc.?				
	3. ¿Con qué frecuencia consume frutas frescas como manzana, plátano, pera, guayaba, fresa, naranja, papaya, piña, etc.? NO aplica para jugos o aguas de sabor con fruta.				
	4. ¿Con qué frecuencia consume lácteos bajos en grasa como leche, yogurt o quesos blancos (panela, requesón, fresco o cottage)?				
Answers	Daily	3 or more times a week but not daily	1 or 2 times a week	Less than 1 time a week	Never or almost never
Score	10	7.5	5	2.5	0
Questions	5. ¿Con qué frecuencia consume carnes rojas no procesadas de res, ternera, cerdo o cordero?				
	6. ¿Con qué frecuencia consume leguminosas cocidas como frijoles, lentejas, habas, garbanzos, alubias, soya, etc.?				
Answers	Daily	3 or more times a week but not daily	1 or 2 times a week	Less than 1 time a week	Never or almost never
Score	2.5	7.5	10	5	0
Questions	7. ¿Con qué frecuencia consume embutidos y carnes procesadas como salchicha, chorizo, jamón, paté, tocino, longaniza, pepperoni, etc.?				
	8. ¿Con qué frecuencia consume postres y dulces como pan dulce, galletas, caramelos, chocolate con azúcar, helados, etc.?				
	9. ¿Con qué frecuencia consume refrescos o bebidas con azúcar añadida como Coca-Cola, Pepsi, Jumex, Boing, etc.?				
Answers	Daily	3 or more times a week but not daily	1 or 2 times a week	Less than 1 time a week	Never or almost never
Score	0	2.5	5	7.5	10
Variety of diet	2 points are given for each "Daily" response to questions 1 to 4 and 1 point for each "1 or 2 times a week" response to questions 5 and 6.				
Interpretation	The total score of the questionnaire ranges from 0 to 100 and is classified as unhealthy (<50 points), needs changes (50 to 80 points), and healthy (>80 points).				

*Adapted from Norte Navarro AI, Ortiz Moncada R. [Spanish diet quality according to the healthy eating index]. Nutr Hosp. 2011;26(2):330–6. https://doi.org/10.3305/nh.2011.26.2.4630

Table S2. Questionnaire: Food Frequency Questionnaire adapted to products containing Non-Nutritive Sweeteners in the Mexican Market*

Questions	1. ¿Con qué frecuencia consume sobres de sustituto de azúcar (Splenda, Canderel, Svetia, Sweet'N Low, etc.)?			
	2. ¿Con qué frecuencia consume bebidas light o sin azúcar (refrescos, jugos, tés industrializados, botellas de agua de sabor) como Coca-Cola Light, Pepsi Light, Be Light, Lipton, Bonafont Levité, etc.?			
	3. ¿Con qué frecuencia consume yogurt light sin azúcar (Activia zero, Yoplait doble cero, Griego sin azúcar de sabor, Vitalinea triple cero, LALA griego zero, Soful LT, etc.)?			
	4. ¿Con qué frecuencia consume gelatinas de caja versión regular o light (Jell-O, D'Gari, Pronto, etc.)?			
	5. ¿Con qué frecuencia consume chicles o pastillas sin azúcar (Trident, Clorets, Halls, Orbit, etc.)?			
	6. ¿Con qué frecuencia consume saborizantes de agua en polvo (Clight, Tang, Zuko, Frutimax, etc.)?			
	7. ¿Con qué frecuencia consume postres y dulces sin azúcar (chocolate, mermelada, miel, caramelos, merengues, etc.) como Turín o Larín sin azúcar, Smucker's sin azúcar, jarabe Hershey's light, miel de maple D'Gari sin azúcar, merengues light Don't Worry, etc.?			
	8. ¿Con qué frecuencia consume cereales light o sin azúcar (avena en sobre con sabor, granola, hot cakes, galletas) como Granvita 0% azúcar, Quaker línea 0%, Stila, Taifeld's, Gamesa sin azúcar, etc.?			
Answers	Every day	At least once a week but not every day	At least once a month but not every week	Never or very few times a year
Score	3	2	1	0
Interpretation	The total score of the questionnaire ranges from 0 to 24 and a higher score indicates that there is a greater consumption of products with ENN.			

Table S3. Differences in the variables evaluated between tertiles of NNS consumption in health professionals. Mexico, November 2020-June 2021

	Tertile 1 (n= 632)	Tertile 2 (n= 753)	Tertile 3 (n= 595)	P*
Female sex, n (%)	523 (82.8%)	634 (84.2%)	498 (83.7%)	0.64
Age, years	31 [25-40]	30 [23-38]	31 [25-40]	<0.01
Economic income, n (%)				0.06
Category 1 (Low)	263 (41.6%)	334 (44.4%)	225 (37.8%)	
Category 2	189 (29.9%)	222 (29.5%)	169 (28.4%)	
Category 3 (High)	180 (28.5%)	197 (26.2%)	201 (33.8%)	
Chronic diseases, n (%)	65 (10.3%)	110 (14.6%)	92 (15.5%)	<0.01
Weight, kg	64.0 ± 12.8	66.9 ± 14.2	68.2 ± 14.0	<0.01
BMI, kg/m^2	24.2 ± 4.0	25.1 ± 4.4	25.5 ± 4.4	<0.01
Smoking habit, n (%)	38 (6.0%)	72 (9.6%)	55 (9.2%)	0.03
Physical activity, METs-min/w	1,075 [396-2,116]	1,306 [462-2,520]	1,380 [462-2,652]	<0.01
Sedentarism, h/d	7 [5-10]	7 [5-9]	7 [5-9]	0.98
Physical activity level, n (%)				<0.01
Low	235 (37.2%)	226 (30.0%)	176 (29.6%)	
Moderate	193 (30.5%)	240 (31.9%)	173 (29.1%)	
High	204 (32.3%)	287 (38.1%)	246 (41.3%)	
Diet quality	71.2 ± 11.8	71.1 ± 11.5	73.8 ± 11.2	<0.01
Diet quality category, n (%)				0.01
Unhealthy	29 (4.6%)	32 (4.2%)	15 (2.5%)	
Needs changes	440 (69.6%)	539 (71.6%)	395 (66.4%)	
Healthy	163 (25.8%)	182 (24.2%)	185 (31.1%)	

NNS: non-nutritive sweeteners; BMI: body mass index; METs: metabolic equivalents of task. Values are means ± SDs or medians [IQRs] unless otherwise indicated. *Differences were evaluated with Pearson's Chi-square test for trend, one-way analysis of variance (ANOVA) or Kruskal–Wallis test, as appropriate.

Table S4. Differences in the variables evaluated between tertiles of NNS consumption in general population. Mexico, November 2020-June 2021

	Tertile 1 (n= 1,094)	Tertile 2 (n= 1,142)	Tertile 3 (n= 822)	P*
Female sex, n (%)	913 (83.5%)	925 (81.0%)	635 (77.3%)	<0.01
Age, years	31 [23-43]	28 [22-40]	32 [24-44]	<0.01
Economic income, n (%)				<0.01
Category 1 (Low)	626 (57.2%)	612 (53.6%)	341 (41.5%)	
Category 2	247 (22.6%)	287 (25.1%)	225 (27.4%)	
Category 3 (High)	221 (20.2%)	243 (21.3%)	256 (31.1%)	
Chronic diseases, n (%)	142 (13.0%)	165 (14.4%)	169 (20.6%)	<0.01
Weight, kg	65.9 ± 14.5	67.7 ± 15.4	71.2 ± 15.7	<0.01
BMI, kg/m^2	24.9 ± 4.7	25.4 ± 4.8	26.3 ± 5.0	<0.01
Smoking habit, n (%)	143 (8.3%)	196 (10.3%)	182 (12.8%)	<0.01
Physical activity, METs-min/w	960 [291-2,312]	973 [297-2,118]	1,207 [396-2,565]	<0.01
Sedentarism, h/d	7 [5-10]	7 [5-10]	7 [5-10]	0.43
Physical activity level, n (%)				<0.01
Low	422 (38.6%)	425 (37.2%)	274 (33.3%)	
Moderate	329 (30.1%)	356 (31.2%)	226 (27.5%)	
High	343 (31.3%)	361 (31.6%)	322 (39.2%)	
Diet quality	67.6 ± 10.7	67.3 ± 11.4	68.6 ± 11.5	0.03
Diet quality category, n (%)				0.01
Unhealthy	57 (5.2%)	86 (7.6%)	44 (5.4%)	
Needs changes	905 (82.7%)	907 (79.4%)	647 (78.7%)	
Healthy	132 (12.1%)	149 (13.0%)	131 (15.9%)	

NNS: non-nutritive sweeteners; BMI: body mass index; METs: metabolic equivalents of task. Values are means ± SDs or medians [IQRs] unless otherwise indicated. *Differences were evaluated with Pearson's Chi-square test for trend, one-way analysis of variance (ANOVA) or Kruskal–Wallis test, as appropriate.