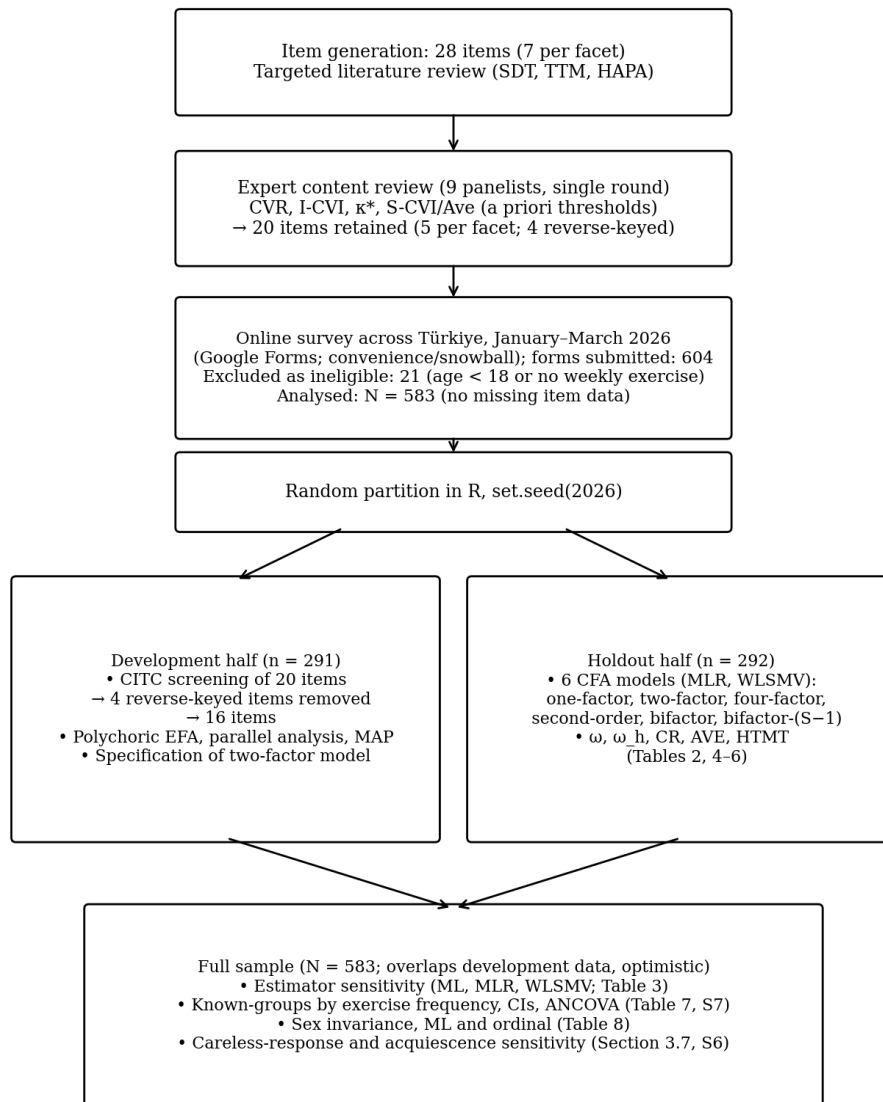


Supplementary Materials

Figure S1. Flow of participants and analytic sequence.



Note. The development/holdout partition was generated in R with `set.seed(2026)` (Supplementary File S1).

Table S1. The final 16-item ExNCS: Turkish source form, English working translation, and item statistics (N = 583).

No.	Code	Turkish item (source form)	English (working translation — not validated)	M (SD)
ENA — Exercise-Nutrition Awareness / Egzersiz-Beslenme Uyum Bilinci (EBUB); $\alpha = .770$, $\omega = .764$				
1	ENA1	Egzersiz yaptığım günlerde beslenmeme daha çok dikkat ederim.	I pay more attention to my diet on the days I exercise.	3.63 (1.17)
2	ENA2	Sağlıklı beslenmenin egzersiz performansımı etkilediğini düşünüyorum.	I believe healthy eating affects my exercise performance.	4.37 (1.01)
3	ENA4	Egzersiz sonrası nasıl beslenmem gerektiği konusunda bilinçliyim.	I am conscious of how I should eat after exercise.	3.85 (1.07)
4	ENA5	Egzersiz ve beslenme birlikte düşünüldüğünde daha anlamlı hale gelir.	Exercise and nutrition become more meaningful when considered together.	4.46 (0.90)
CHR — Commitment to Healthy Routines / Sağlıklı Yaşam Rutinine Bağlılık (SYRB); $\alpha = .833$, $\omega = .834$				
5	CHR1	Hem egzersiz hem de sağlıklı beslenme benim için günlük rutinin bir parçasıdır.	Both exercise and healthy eating are part of my daily routine.	3.48 (1.14)
6	CHR2	Bu iki alışkanlık yaşam tarzımın temelini oluşturur.	These two habits form the foundation of my lifestyle.	3.73 (1.12)
7	CHR4	Egzersiz yapmadığım günlerde de beslenme düzenimi korurum.	I maintain my nutrition routine even on days I do not exercise.	3.25 (1.14)
8	CHR5	Uzun vadede bu alışkanlıkları sürdürebileceğime inanıyorum.	I believe I can sustain these habits in the long term.	3.79 (1.13)
ECD — Emotional Consistency and Discipline / Duygusal Durumda Disiplin ve Sürdürme (DDDS); $\alpha = .862$, $\omega = .846$				
9	ECD2	Zor duygular yaşasam da sağlıklı yaşam alışkanlıklarımı korurum.	I maintain healthy habits even when I face difficult emotions.	3.23 (1.19)
10	ECD3	Moralimin düşük olduğu zamanlarda bile egzersiz yapmaya çalışırım.	I try to exercise even when I feel emotionally low.	3.60 (1.26)
11	ECD4	Duygusal dalgalanmalarım, beslenme düzenimi etkilemez.	Emotional fluctuations do not affect my eating patterns.	2.95 (1.28)
12	ECD5	Psikolojik olarak zor zamanlarda bile bu alışkanlıklara bağlı kalırım.	I stick to these habits even during psychologically challenging times.	3.19 (1.24)
PEO — Performance and Efficiency Orientation / Performans ve Verim Odaklılık (PVO); $\alpha = .764$, $\omega = .765$				
13	PEO1	Egzersiz öncesi ve sonrası ne yiyeceğimi planlarım.	I plan what to eat before and after exercising.	3.46 (1.17)
14	PEO2	Daha iyi performans için ne zaman ne yiyeceğimi bilirim.	I know what and when to eat to improve my performance.	3.75 (1.14)
15	PEO3	Yediklerim egzersiz verimimi doğrudan etkiler.	What I eat directly affects my exercise efficiency.	4.02 (1.01)
16	PEO4	Spordan önce ağır yemekler yememeye özen gösteririm.	I avoid heavy meals before working out.	4.17 (1.11)

Note. Response format: 1 = Kesinlikle Katılmıyorum (Strongly Disagree) to 5 = Kesinlikle Katılıyorum (Strongly Agree). Total ExNCS = mean of all 16 items. Subscale groupings are shown for transparency of item writing only; on the present evidence, subscale scores (especially CHR) should not be scored or interpreted independently. Facet α values are for the full sample (N = 583), and facet ω values are those reported in the first submission; holdout-half values are given in manuscript Table 5. Turkish scale name: Egzersiz-Beslenme Tutarlılık Ölçeği (EBTÖ). The English wording is an unvalidated working translation and must not be used to collect data before formal cross-cultural adaptation (forward/back translation, expert committee, cognitive pretesting, invariance testing). The four removed reverse-worded items are ENA3R, CHR3R, ECD1R and PEO5R in the deposited dataset.

Table S2. Mapping of the retained items to the construct definition (perceived coupling and stability of exercise and eating).

Item	Component of the definition represented	Content type	Behaviours referenced
ENA1	Cross-behaviour coordination (coupling)	Reported behaviour	Both
ENA2	Belief about interdependence	Belief	Both
ENA4	Perceived knowledge of post-exercise eating	Knowledge/awareness	Both
ENA5	Belief about interdependence	Belief	Both
CHR1	Joint maintenance in daily routine (stability)	Reported behaviour	Both
CHR2	Joint maintenance as lifestyle foundation (stability)	Self-appraisal of pattern	Both

CHR4	Stability of diet on non-exercise days	Reported behaviour	Nutrition (conditioned on exercise)
CHR5	Confidence in long-term maintenance	Self-efficacy	Both
ECD2	Joint maintenance under difficult emotions (stability)	Reported behaviour	Both
ECD3	Exercise maintenance under low mood	Reported behaviour	Exercise only
ECD4	Dietary stability under emotional fluctuation	Reported behaviour	Nutrition only
ECD5	Joint maintenance under psychological strain (stability)	Reported behaviour	Both
PEO1	Planning eating around exercise (coupling)	Reported behaviour	Both
PEO2	Perceived knowledge of performance nutrition	Knowledge/awareness	Both
PEO3	Belief about interdependence	Belief	Both
PEO4	Avoiding heavy meals before exercise (coupling)	Reported behaviour	Both

Note. Nine of 16 items report behavior; the remaining items assess beliefs, perceived knowledge, or self-efficacy regarded as proximal cognitions (Section 1). Two items (ECD3, ECD4) refer to a single behavior and index stability of one domain under emotional strain. The total score is therefore interpreted as perceived integration with supporting cognitions, not as a behavioral measure of alignment.

Table S3. Response-category frequencies (% of N = 583) and smallest category count in the holdout half.

Item	1	2	3	4	5	Min. count (holdout)
ENA1	5.3	9.8	32.9	20.8	31.2	13
ENA2	2.9	3.4	11.5	18.5	63.6	6
ENA3R	8.7	5.5	13.2	11.5	61.1	removed
ENA4	3.8	5.7	26.4	30.2	34.0	9
ENA5	1.7	1.7	12.2	17.3	67.1	3
CHR1	4.3	14.2	36.4	19.6	25.6	12
CHR2	2.9	11.5	28.0	24.7	32.9	7
CHR3R	9.8	17.2	31.2	19.4	22.5	removed
CHR4	6.5	17.0	40.1	17.3	19.0	17
CHR5	4.1	8.2	27.8	24.5	35.3	13
ECD1R	25.0	20.9	31.7	13.4	8.9	removed
ECD2	8.6	17.7	34.8	20.2	18.7	28
ECD3	7.7	11.1	26.6	22.1	32.4	25
ECD4	16.1	20.6	31.7	15.4	16.1	44
ECD5	10.8	17.7	32.1	20.4	19.0	38
PEO1	6.9	11.8	33.4	23.8	24.0	23
PEO2	4.5	9.6	24.7	28.8	32.4	12
PEO3	2.2	4.3	23.7	29.2	40.7	5
PEO4	4.6	3.6	16.1	21.3	54.4	9
PEO5R	9.6	7.2	13.6	12.9	56.8	removed

Note. Reverse-worded items (suffix R) are shown in recoded direction as stored in the dataset. Ceiling effects are pronounced for ENA2, ENA5 and PEO4; lowest categories are sparse for ENA5 (3 observations in the holdout half) and PEO3.

Table S4. Development-half item screening (n = 291): corrected item-total correlations for the 20-item pool.

Item	CITC (20-item pool)	Decision
ENA1	.64	Retained
ENA2	.48	Retained
ENA3R	.09	Removed (CITC < .30)
ENA4	.62	Retained
ENA5	.52	Retained
CHR1	.72	Retained
CHR2	.69	Retained
CHR3R	.23	Removed (CITC < .30)

CHR4	.61	Retained
CHR5	.66	Retained
ECD1R	.07	Removed (CITC < .30)
ECD2	.62	Retained
ECD3	.61	Retained
ECD4	.46	Retained
ECD5	.55	Retained
PEO1	.65	Retained
PEO2	.68	Retained
PEO3	.62	Retained
PEO4	.42	Retained
PEO5R	.15	Removed (CITC < .30)

Note. α (20 items) = .882; α (16 items) = .920; CITC range of retained items against the 16-item composite = .42-.75. Removal decisions used development-half data only.

Table S5. Exploratory factor solutions in the development half (n = 291; 16 items).

Item	2F: F1	2F: F2	2F: h ²	4F: I	4F: II	4F: III	4F: IV	4F: h ²
ENA1	.73	.09	.60	.67	-.09	.24	-.03	.59
ENA2	.81	-.19	.54	.08	-.07	.79	-.10	.56
ENA4	.79	-.00	.62	.49	-.21	.08	.40	.59
ENA5	.88	-.22	.63	.09	-.06	.86	-.12	.67
CHR1	.54	.41	.67	.71	.18	-.02	.01	.68
CHR2	.63	.26	.63	.58	.10	.17	.01	.59
CHR4	.41	.44	.55	.69	.19	-.12	.01	.57
CHR5	.52	.35	.58	.53	.17	.07	.04	.52
ECD2	.10	.83	.77	.19	.70	-.14	.09	.69
ECD3	.28	.58	.57	.02	.59	.16	.09	.54
ECD4	-.10	.87	.68	.07	.82	-.10	-.09	.62
ECD5	-.01	.87	.75	-.02	.94	.02	-.10	.79
PEO1	.69	.15	.60	.29	-.08	-.14	.72	.67
PEO2	.69	.17	.63	.03	-.05	-.15	1.02	.86
PEO3	.75	.03	.58	.06	.04	.37	.35	.52
PEO4	.45	.13	.27	-.17	.18	.24	.33	.26

Note. 2F = polychoric correlations, minimum-residual extraction, oblimin rotation; factor correlation $r = .49$; 60.5% of common variance. 4F = Pearson correlations, principal axis factoring, promax rotation (procedure of the first submission): all communalities < 1 (maximum .86); the PEO2 pattern coefficient of 1.02 occurs in an oblique solution with communality .86 and is not a Heywood case. The four factors do not reproduce the intended facets (I: CHR with ENA1/ENA4; II: ECD; III: ENA2/ENA5 doublet; IV: PEO1/PEO2 with ENA4). Retention: component-based parallel analysis (polychoric and Pearson) and MAP = 2 factors; factor-based parallel analysis = 4. First four polychoric eigenvalues: 8.47, 1.94, 0.96, 0.84. Full-sample 2F solution: same pattern (factor $r = .46$).

Table S6. Careless-response screening (20 items, original direction) and sensitivity analysis (N = 583).

Criterion / analysis	Full sample	Excluding flagged cases
Zero response variability (identical answer to all 20 items)	21 (3.6%)	—
Longest identical string ≥ 10	69 (11.8%)	—
Mahalanobis D^2 , $p < .001$	31 (5.3%)	—
Flagged on ≥ 1 criterion	97 (16.6%)	—
n analysed	583	486
Total α (16 items)	.913	.903
Four-factor model (MLR): CFI / RMSEA	.917 / .083	.907 / .085
Bifactor-(S-1) (MLR): CFI / RMSEA	.930 / .079	.923 / .080
Four-factor model (WLSMV): CFI / RMSEA	.884 / .115	.876 / .116

Bifactor-(S-1) (WLSMV): CFI / RMSEA	.900 / .110	.896 / .109
Known-groups η^2 (total score)	.153	.169

Note. Longstring and IRV computed on unrecoded responses (Meade & Craig, 2012; Curran, 2016). Acquiescence (random-intercept model, 20 items, MLR): acquiescence variance = 0.157 (SE = 0.029, $p < .001$); standardized loadings 1.29-.441; scaled $\Delta\chi^2(1) = 13.78$, $p < .001$ versus one-factor model.

Table S7. Known-groups comparisons: Games-Howell mean differences, Hedges' g , and covariate-adjusted effects ($N = 583$).

Scale	Contrast (days/week)	Mean difference [95% CI]	p	Hedges' g [95% CI]
ENA	1-2 vs 3-4	0.35 [0.15, 0.54]	<.001	0.43 [0.24, 0.62]
ENA	3-4 vs ≥ 5	0.20 [0.02, 0.37]	.022	0.27 [0.07, 0.47]
ENA	1-2 vs ≥ 5	0.54 [0.33, 0.75]	<.001	0.67 [0.44, 0.90]
CHR	1-2 vs 3-4	0.49 [0.28, 0.70]	<.001	0.56 [0.36, 0.76]
CHR	3-4 vs ≥ 5	0.32 [0.11, 0.53]	.001	0.38 [0.17, 0.58]
CHR	1-2 vs ≥ 5	0.81 [0.57, 1.06]	<.001	0.88 [0.65, 1.12]
ECD	1-2 vs 3-4	0.62 [0.38, 0.85]	<.001	0.63 [0.43, 0.83]
ECD	3-4 vs ≥ 5	0.51 [0.29, 0.73]	<.001	0.56 [0.35, 0.76]
ECD	1-2 vs ≥ 5	1.12 [0.86, 1.39]	<.001	1.11 [0.87, 1.35]
PEO	1-2 vs 3-4	0.37 [0.17, 0.57]	<.001	0.44 [0.25, 0.64]
PEO	3-4 vs ≥ 5	0.33 [0.15, 0.52]	<.001	0.44 [0.23, 0.64]
PEO	1-2 vs ≥ 5	0.70 [0.48, 0.93]	<.001	0.82 [0.59, 1.05]
Total	1-2 vs 3-4	0.46 [0.29, 0.62]	<.001	0.66 [0.46, 0.86]
Total	3-4 vs ≥ 5	0.34 [0.18, 0.50]	<.001	0.51 [0.31, 0.72]
Total	1-2 vs ≥ 5	0.79 [0.60, 0.99]	<.001	1.08 [0.84, 1.32]

Scale	η^2 [95% CI] (unadjusted)	Partial η^2 , adjusted A	Partial η^2 , adjusted B
ENA	.064 [.029, .104]	.066	.019
CHR	.106 [.062, .153]	.097	.033
ECD	.156 [.104, .207]	.130	.055
PEO	.091 [.050, .136]	.091	.035
Total	.153 [.102, .204]	.141	.053

Note. Adjusted A: sex, age, education, body-mass index ($df = 2, 573$). Adjusted B: additionally, years of exercise experience and usual session duration ($df = 2, 563$); all adjusted effects $p < .01$. η^2 CIs by inversion of the noncentral F distribution.