
Weight-Control Practices Among U.S. Adults, 2001–2002

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Background: Approximately \$50 billion a year is spent by Americans on weight-loss products and services. Despite the high cost, few national studies have described specific weight-loss and weight-maintenance practices among U.S. adults. This analysis describes the use of specific practices by U.S. adults who tried to lose weight or tried only not to gain weight during the previous 12 months.

Methods: Data were analyzed from the 2001–2002 National Health and Nutrition Examination Survey (NHANES) conducted on a nationally representative sample of the U.S. population. This study focused on adults aged 20 years or older who were both interviewed and examined ($n = 5027$).

Results: Fifty-one percent of U.S. adults tried to control their weight in the previous 12 months, including those who tried to lose weight (34% of men, 48% of women) and those who tried only not to gain weight (11% vs 10%, respectively). Among 2051 adults who tried to control their weight, the top four practices were the same: ate less food (65% among those who tried to lose weight, 52% among those who tried only not to gain weight); exercised (61% vs 46%, respectively); ate less fat (46% vs 42%); and switched to foods with lower calories (37% vs 36%). Less than one fourth combined caloric restriction with the higher levels of physical activity (300 or more minutes per week) recommended in the 2005 dietary guidelines by the U.S. Department of Health and Human Services and U.S. Department of Agriculture.

Conclusions: Although weight control is a common concern, most people who try do not use recommended combinations of caloric restriction and adequate levels of physical activity. (Am J Prev Med 2006;31(1):18–24) © 2006 American Journal of Preventive Medicine

Introduction

Americans spend approximately \$50 billion a year on weight-loss products and services.¹ Despite the high cost, the availability of a wide variety of weight-loss programs and services, and a heightened awareness of the epidemic of obesity, few national studies have described specific weight-loss and weight-maintenance practices among adults in the United States.^{2–6} Both the 1998 National Institutes of Health (NIH) guidelines⁷ and the 2005 dietary guidelines by the U.S. Department of Health and Human Services (USDHHS) and U.S. Department of Agriculture (USDA)⁸ recommend reducing calories and increasing physical activity as strategies for weight loss. For the prevention of gradual weight gain, the dietary guidelines recommend making small decreases in food

and beverage calories and increasing physical activity.⁸ While the 1998 NIH guidelines⁷ recommend that all adults set a long-term goal to accumulate at least 30 minutes of moderate-intensity physical activity on most, and preferably all, days of the week for weight loss and weight maintenance (150 or more minutes per week), the 2005 USDHHS/USDA dietary guidelines⁸ recommend engaging in approximately 60 minutes of moderate- to vigorous-intensity activity on most days of the week (300 or more minutes per week) to help manage body weight and prevent gradual, unhealthy weight gain in adulthood.^{7,8} An improved understanding of Americans' current weight-management practices and rates of meeting the recommended combination of caloric restriction and adequate levels of physical activity could lead to a better targeting and promotion of recommended practices.

Weight-control practices reported by the National Health and Nutrition Examination Survey (NHANES) were assessed using the most current data available (2001–2002).⁹ Unlike other national surveys, NHANES asks about weight-control practices tried in the past 12 months rather than just at the time of the survey. Our

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objectives follow: (1) to determine the prevalence and predictors of trying to lose weight or trying only not to gain weight in the previous 12 months, (2) to describe the use of specific practices either to lose or to keep from gaining weight, and (3) to determine the prevalence of meeting current recommendations for caloric restriction combined with physical activity at both lower (150 or more minutes per week) and higher (300 minutes or more per week) levels.

Methods

Data used were from the 2001–2002 NHANES, a continuous annual survey of the civilian non-institutionalized U.S. population.⁹ NHANES uses a complex, stratified, multistage probability sampling design. Data are collected through both an in-home interview and a physical examination at mobile examination centers. The overall participation rate for completing both the in-home interview and the physical examination in 2001–2002 was 81% (S. Ramirez, National Center for Health Statistics, e-mail communication, May 25, 2005).

Weight-control status was determined by the following algorithm. Respondents were asked, “During the past 12 months, have you tried to lose weight?” This question was skipped in those who reported an intentional weight loss of ≥ 10 lb from their weight a year ago to their current weight. Respondents were defined as having tried to lose weight if they either tried to lose weight or intentionally lost ≥ 10 lb in the past 12 months. Additionally, all respondents were asked, “During the past 12 months, have you done anything to keep from gaining weight?” After excluding those who tried to lose weight, respondents were defined as having tried only not to gain weight if they reported doing anything to keep from gaining weight during the past 12 months.

Weight-control practices were assessed for respondents who tried to lose or to keep from gaining weight during the previous 12 months. Respondents who tried to lose weight were asked, “How did you try to lose weight?” and were given a card that listed the following weight-control practices: (1) ate less food (amount); (2) switched to foods with lower calories; (3) ate less fat; (4) exercised; (5) skipped meals; (6) ate “diet” foods or products; (7) used a liquid diet formula such as Slimfast or Optifast; (8) joined a weight-loss program such as Weight Watchers, Jenny Craig, Tops, or Overeaters Anonymous; (9) followed a special diet such as Dr. Atkins, other high-protein or low-carbohydrate diet, Zone, grapefruit, or Pritikin (specify); (10) took diet pills prescribed by a doctor; (11) took other pills, medicines, herbs, or supplements not needing a prescription; (12) took laxatives or vomited; (13) drank a lot of water; or (14) other. Respondents were allowed to select as many as were applicable. Respondents who tried to keep from gaining weight were asked, “What did you do to keep from gaining weight?” They too were given a card listing all of the aforementioned options and asked to select as many as were applicable.

Physical activity was assessed with the following questions. Participants were asked, “Over the past 30 days, did you do any vigorous activities for at least 10 minutes that caused heavy sweating, or large increases in breathing or heart rate?” They were then given examples of common vigorous activities (e.g., running, high-impact aerobics). Those who indicated

“yes” were asked, “[Over the past 30 days], what vigorous activities did you do?” To assess moderate physical activities, participants were asked, “[Over the past 30 days], did you do moderate activities for at least 10 minutes that cause only light sweating or a slight to moderate increase in breathing or heart rate?” They were then given examples of common moderate activities (e.g., walking, yoga). Those who indicated “yes” were asked, “[Over the past 30 days], what moderate activity or activities did you do?” For each moderate and vigorous activity reported, participants were asked, “Over the past 30 days, how often did you do [activity]?” and “Over the past 30 days, on average about how long did you do [activity] each time?” The total time spent on all moderate and vigorous activities in the previous month was used to calculate the average minutes of weekly leisure-time physical activity of moderate intensity or greater.

Caloric restriction was defined by those who reported that they ate less food (amount), switched to foods with lower calories, or both. Physical activity was defined on two levels: (1) ≥ 150 minutes per week (based on the 1998 NIH guidelines⁷ of ≥ 30 minutes of moderate-intensity physical activity on most days of the week for weight loss and weight maintenance); or (2) ≥ 300 minutes per week (based on the 2005 USDHHS/USDA dietary guidelines⁸ recommendation of ≥ 60 minutes of moderate- to vigorous-intensity physical activity on most days of the week for weight management and to prevent gradual, unhealthy body weight gain in adulthood).

Of the 5027 adults aged ≥ 20 years who were both interviewed and examined, participants were excluded if they were pregnant or missing pregnancy information ($n=362$), or if they were missing information on demographics or physical activity ($n=13$), body mass index (BMI) ($n=289$), weight-control efforts ($n=7$), or weight-control practices ($n=2$). The final sample consisted of 4354 participants.

To account for the complex sampling design, the SUDAAN version 9.0 (Research Triangle Institute, Research Triangle Park NC, 2005) software package was used for data analysis. Multiple logistic regression was used to identify variables associated with trying to lose weight or trying only not to gain weight. The independent variables included in the models were age (20 to 29, 30 to 39, 40 to 49, 50 to 59, 60 to 69, ≥ 70), race/ethnicity (non-Hispanic white, non-Hispanic black, Mexican American, other [including multiracial]), education (less than high school, high school graduate, more than high school), smoking status (never smoker, former smoker, current smoker), and BMI. The chi-square test was used to detect significant differences ($p < 0.05$) between weight-loss and weight-maintenance practices and between practices for men and for women.

Results

The prevalence of trying to control weight (i.e., lose, keep from gaining weight, or both) in the previous 12 months was 51.3%. The prevalence of trying to lose weight in the previous 12 months was 33.8% for men and 47.9% for women (Table 1). Women had a higher prevalence of trying to lose weight in nearly every sociodemographic and BMI category. Many more women with a normal BMI reported trying to lose weight in the previous year than men (29.8% vs 9.9%).

Table 1. Prevalence of weight-control status^a among U.S. adults (aged ≥20 years) by gender, NHANES 2001–2002

	Men				Women			
	<i>n</i>	Tried to lose weight (<i>n</i> = 700) %	Tried only not to gain weight (<i>n</i> = 212) %	Neither (<i>n</i> = 1297) %	<i>n</i>	Tried to lose weight (<i>n</i> = 955) %	Tried only not to gain weight (<i>n</i> = 184) %	Neither (<i>n</i> = 1006) %
Overall	2209	33.8	11.0	55.2	2145	47.9	9.8	42.3
Age in years								
20–29	387	32.3	6.4	61.3	344	53.4	8.6	38.0
30–39	361	28.9	11.0	60.1	357	48.8	6.2	45.0
40–49	438	36.5	11.7	51.8	407	45.5	14.9	39.6
50–59	332	39.3	13.5	47.2	301	56.5	7.8	35.7
60–69	311	35.0	12.8	52.2	346	49.8	8.9	41.3
≥70	380	29.2	12.7	58.1	390	27.0	11.9	61.1
Race/ethnicity								
Non-Hispanic white	1162	35.5	12.1	52.4	1126	48.7	11.8	39.5
Non-Hispanic black	433	27.3	7.5	65.2	430	46.3	5.1	48.6
Mexican American	479	27.2	5.7	67.1	439	48.9	6.7	44.4
Other (including multiracial)	135	33.0	10.0	57.0	150	43.8	2.6	53.6
Education								
Less than high school	680	22.1	5.0	72.9	621	43.6	3.7	52.7
High school graduate	514	33.1	8.3	58.6	509	47.8	7.0	45.2
More than high school	1015	38.1	14.2	47.7	1015	49.4	13.1	37.5
Smoking status								
Never smoker	902	37.9	12.5	49.6	1288	47.6	11.6	40.8
Former smoker	707	33.9	13.1	53.0	439	52.6	8.9	38.5
Current smoker	600	27.3	6.3	66.4	418	44.5	5.9	49.6
Body mass index (kg/m²)								
<25.0	676	9.9	9.1	81.0	738	29.8	13.7	56.5
25.0–<30.0	951	37.2	12.8	50.0	672	55.0	8.2	36.8
≥30.0	582	55.5	10.2	34.3	735	63.6	6.4	30.0

Sample sizes were unweighted. Percentages were weighted to be nationally representative.

^aTime period covered is previous 12 months.

NHANES, National Health and Nutrition Examination Survey.

The prevalence of trying only not to gain weight over the previous 12 months was similar between women and men at 9.8% and 11.0%, respectively.

Among both genders, trying to lose weight varied by sociodemographic category, but was most strongly positively associated with increased BMI (Table 2). Among men, there was no significant association with age between trying to lose weight and trying neither practice. However, among women the adjusted odds of trying to lose weight decreased significantly in those aged ≥60 compared to those aged 20 to 29. The odds of trying to lose weight were about 50% lower in non-Hispanic black women compared with non-Hispanic white women, but did not vary significantly by race/ethnicity among men. Among both genders, the odds of trying to lose weight increased with education, and were about 30% lower among current smokers than never smokers.

The gender-specific odds of trying only not to gain weight compared with trying neither practice varied by race/ethnicity, education, and smoking status similarly to the odds of trying to lose weight (Table 2). The adjusted odds of men trying only not to gain weight (although only statistically significant for those aged 60

to 69) were higher in those aged ≥30 (compared to those aged 20 to 29), which differs from the suggested decrease or lack of association with age among men trying to lose weight. Unlike for women trying to lose weight, there was no statistically significant decrease in women trying only not to gain weight compared with trying neither in those aged ≥60. The adjusted odds of trying only not to gain weight were higher in overweight and obese men compared with normal-weight men, but were not statistically different in overweight or obese women compared with normal-weight women.

In general, the prevalence of specific practices was higher for those trying to lose weight compared with those trying only not to gain weight. Among those who tried to lose weight or tried only not to gain weight, the top four practices were the same (Table 3): ate less food (amount) (64.7% among those who tried to lose weight, 52.2% among those who tried only not to gain weight), exercised (61.3%, 45.9%), ate less fat (45.7%, 41.7%), and switched to foods with lower calories (37.2%, 35.9%). Less-common practices included the following: drank a lot of water (30.0%, 20.3%), skipped meals (16.7%, 8.9%), ate diet foods or products (11.5%, 5.1%), took nonprescription supplements

Table 2. Predictors associated with weight-control status^a among U.S. adults (aged ≥ 20 years) by gender, NHANES 2001–2002

	Men		Women	
	Tried to lose weight ^b OR (95%CI) ^c	Tried only not to gain weight OR (95%CI) ^c	Tried to lose weight OR (95%CI) ^c	Tried only not to gain weight OR (95%CI) ^c
Age in years				
20–29	1.0	1.0	1.0	1.0
30–39	0.7 (0.5–1.1)	1.5 (0.7–3.2)	0.7 (0.4–1.1)	0.6 (0.2–1.6)
40–49	0.9 (0.6–1.2)	1.5 (0.6–3.8)	0.6 (0.4–1.0)	1.4 (0.6–3.3)
50–59	1.0 (0.6–1.6)	1.9 (0.9–3.9)	0.8 (0.6–1.2)	0.8 (0.5–1.6)
60–69	0.8 (0.5–1.4)	1.7 (1.03–2.8)*	0.5 (0.4–0.7)*	0.8 (0.3–2.2)
≥ 70	0.8 (0.5–1.3)	1.6 (0.9–3.2)	0.2 (0.1–0.3)*	0.7 (0.3–1.6)
Race/ethnicity				
Non-Hispanic white	1.0	1.0	1.0	1.0
Non-Hispanic black	0.7 (0.5–1.1)	0.8 (0.5–1.3)	0.5 (0.4–0.7)*	0.4 (0.2–0.7)*
Mexican American	0.8 (0.6–1.1)	0.7 (0.4–1.1)	0.7 (0.5–1.0)	0.7 (0.3–1.4)
Other (including multiracial)	1.1 (0.7–1.9)	0.9 (0.4–1.9)	0.6 (0.3–0.9)*	0.2 (0.1–0.4)*
Education				
Less than high school	1.0	1.0	1.0	1.0
High school graduate	1.6 (1.1–2.4)*	1.8 (0.8–3.8)	1.3 (0.9–1.9)	1.9 (0.7–4.8)
More than high school	2.4 (1.5–3.8)*	3.4 (1.7–6.8)*	1.6 (1.2–2.2)*	3.6 (1.5–8.3)*
Smoking status				
Never smoker	1.0	1.0	1.0	1.0
Former smoker	0.7 (0.6–0.98)*	0.9 (0.6–1.2)	1.2 (0.9–1.5)	0.6 (0.3–1.2)
Current smoker	0.7 (0.5–0.9)*	0.5 (0.3–0.96)*	0.7 (0.5–1.0)	0.4 (0.2–0.8)*
Body mass index (kg/m²)				
<25.0	1.0	1.0	1.0	1.0
25.0–<30.0	6.1 (4.4–8.5)*	2.1 (1.5–3.0)*	3.6 (2.7–4.9)*	1.2 (0.8–1.9)
≥ 30.0	13.8 (9.1–20.9)*	2.3 (1.6–3.3)*	4.9 (4.0–6.1)*	1.0 (0.6–1.6)

^aTime period covered is previous 12 months.

^bComparison group is those who tried neither (to lose or not to gain weight).

^cOR adjusted for age, race/ethnicity, education, smoking status, and body mass index.

*Significant at $p < 0.05$ (bolded).

CI, confidence interval; NHANES, National Health and Nutrition Examination Survey; OR, odds ratio.

(11.5%, 1.4%), used a liquid diet formula (10.2%, 1.8%), followed a special diet (7.3%, 1.1%), joined a weight-loss program (6.8%, 0.4%), took prescription diet pills (3.2%, 0.6%), other (specify) (3.0%, 3.1%), and took laxatives or vomited (2.6%, 1.7%).

Among those who tried to lose weight, men were significantly more likely than women to exercise (66.4% men, 57.9% women), but less likely to use a liquid diet formula (7.0%, 12.4%); join a weight-loss program (2.5%, 9.8%); take diet pills prescribed by a doctor (1.5%, 4.5%); take other pills, medicines, herbs, or supplements not needing a prescription (8.0%, 13.9%); and drink a lot of water (24.2%, 34.0%). Among those who tried only not to gain weight, men were less likely than women to use a liquid diet formula (0.1%, 3.6%).

The prevalence of caloric restriction was 74.4% in those who tried to lose weight and 67.8% in those who tried only not to gain weight (Table 4). The median weekly leisure-time physical activity was 135 minutes in those who tried to lose weight, and 180 minutes in those who tried only not to gain weight (results not shown). The combination of caloric restriction and

meeting minimum physical activity recommendations (≥ 150 minutes per week) did not differ significantly among those who tried to lose weight compared with those who tried only not to gain weight (35.3% vs 35.6%, respectively). The combination of caloric restriction and meeting higher physical activity recommendations (≥ 300 minutes per week) also did not differ significantly between the two groups (22.6% vs 23.7%, respectively).

Among obese individuals trying to control their weight, the prevalence of meeting recommendations was 76.3% for caloric restriction, 30.0% for caloric restriction combined with minimum physical activity, and 18.9% for caloric restriction combined with higher physical activity. Compared to normal-weight individuals, obese individuals had 50% higher odds of meeting recommendations for caloric restriction alone (odds ratio [OR]=1.5, 95% confidence interval [CI]=1.2–1.9); however, their odds of meeting combined recommendations for caloric restriction with either minimum (OR=0.6, CI=0.5–0.7) or higher physical activity (OR=0.6, CI=0.5–0.8) were 40% lower (results not shown).

Table 3. Weight-control practices^a of U.S. adults (aged ≥20) by weight-control status and gender, NHANES 2001–2002

Weight-control practice	Tried to lose	Tried only not to gain weight	Tried to lose		Tried only not to gain weight	
	All	All	Men	Women	Men	Women
	<i>n</i> = 1655 %	<i>n</i> = 396 %	<i>n</i> = 700 %	<i>n</i> = 955 %	<i>n</i> = 212 %	<i>n</i> = 184 %
Ate less food	64.7*	52.2	64.7	64.8	52.1	52.4
Switched to lower calorie foods	37.2	35.9	34.9	38.7	37.3	34.4
Ate less fat	45.7	41.7	44.0	46.8	37.7	46.0
Exercised	61.3*	45.9	66.4**	57.9	43.7	48.3
Skipped meals	16.7*	8.9	17.4	16.2	11.9	5.5
Ate “diet” foods or products	11.5*	5.1	8.4	13.7	4.2	6.1
Used liquid diet formula	10.2*	1.8	7.0**	12.4	0.1**	3.6
Joined weight-loss program	6.8*	0.4	2.5**	9.8	0.0	0.9
Followed a special diet	7.3*	1.1	6.2	8.0	0.8	1.4
Took prescription diet pills	3.2*	0.6	1.5**	4.5	0.3	0.9
Took nonprescription supplements	11.5*	1.4	8.0**	13.9	1.3	1.4
Took laxatives or vomited	2.6	1.7	1.6	3.3	2.9	0.4
Drank a lot of water	30.0*	20.3	24.2**	34.0	17.4	23.4
Other (specify)	3.0	3.1	2.6	3.3	2.2	4.2

Note: Sample sizes are unweighted.

Percentages were weighted to be nationally representative.

Unstable estimates are italicized (standard error greater than 1/3 of estimate).

*Significant differences in practices to lose weight versus practices only to not gain weight, $p < 0.05$.

**Significant differences between men and women, $p < 0.05$. (All are bolded.)

^aPrevalence in previous 12 months.

NHANES, National Health and Nutrition Examination Survey.

Among those who tried to lose weight, men and women had similar rates of caloric restriction (73.6% men, 75.0% women); however, men reported higher median weekly physical activity (180 minutes/week vs 100 minutes/week, respectively) and were significantly more likely than women to meet recommendations for the combination of caloric restriction with either minimum physical activity (41.0% vs 31.4%) or higher

physical activity (28.1% vs 18.8%). Among those who tried only not to gain weight, men and women again did not differ significantly in rates of caloric restriction (71.2% men, 64.1% women); however, men again reported higher median weekly physical activity (210 minutes/week vs 113 minutes/week) and were significantly more likely than women to meet recommendations combining caloric restriction with either mini-

Table 4. Prevalence^a of meeting recommendations among U.S. adults by weight-control status and gender, NHANES 2001–2002

Recommendations	Tried to lose	Tried only not to gain weight	Tried to lose		Tried only not to gain weight	
	All	All	Men	Women	Men	Women
	<i>n</i> = 1655 %	<i>n</i> = 396 %	<i>n</i> = 700 %	<i>n</i> = 955 %	<i>n</i> = 212 %	<i>n</i> = 184 %
CR ^b	74.4	67.8	73.6	75.0	71.2	64.1
CR + physical activity ≥150 min/wk ^c	35.3	35.6	41.0*	31.4	45.7*	24.6
CR + physical activity ≥300 min/wk ^d	22.6	23.7	28.1*	18.8	32.2*	14.5

Notes: There were no significant differences in meeting recommendations between those who tried to lose weight versus those who tried only not to gain weight at $p < 0.05$. Sample sizes are unweighted. Percentages were weighted to be nationally representative.

*Significant differences between men and women, $p < 0.05$ (bolded).

^aPrevalence in previous 12 months.

^bCR was defined as those who reported they ate less food or switched to lower calorie foods.

^cMet recommendations for combined caloric restriction and physical activity (≥150 minutes per week). The total minutes spent on all moderate and vigorous activities in the previous 30 days was used to calculate the average minutes of weekly leisure-time physical activity of moderate intensity or greater.

^dMet recommendations for combined caloric restriction and physical activity (≥300 minutes per week). The total minutes spent on all moderate and vigorous activities in the previous 30 days was used to calculate average minutes of weekly leisure-time physical activity of moderate intensity or greater.

CR, caloric restriction; min/wk, minutes per week; NHANES, National Health and Nutrition Examination Survey.

mum physical activity (45.7% vs 24.6%) or higher physical activity (32.2% vs 14.5%).

Discussion

Among Americans, weight control is a common concern. More than half of adults in this study tried to control their weight in the previous 12 months. The most common practices for weight loss and prevention of weight gain were eating less food, exercising, eating less fat, and switching to foods with lower calories. Since caloric restriction combined with physical activity is recommended for both weight loss and weight maintenance, it is not surprising that participants met recommendations for caloric restriction combined with physical activity at similar levels regardless of whether they tried to lose weight or tried only not to gain weight. However, the overall prevalence of meeting recommendations was low. Only one third of those who tried to control their weight combined caloric restriction and the minimum levels of physical activity (150 or more minutes per week) recommended in the 1998 NIH guidelines,⁷ and less than one fourth combined caloric restriction with the higher levels of physical activity (300 or more minutes per week) recommended in 2005 USDHHS/USDA dietary guidelines.

Consistent with previous studies,^{2-4,10,11} this study showed higher rates of trying to lose weight for women compared to men (48% of women, 34% of men). This may reflect increased societal pressure on women to be thin.^{12,13} The lower rate of trying to lose weight among black women compared to white women and among women aged 60 and older compared to women aged 20 to 29 may reflect differing societal pressure on women to be thin based on age and race/ethnicity.¹⁴⁻¹⁶ Although women attempted to control their weight more often and at a lower BMI than men, women were less likely than men to meet recommendations for combining caloric restriction and adequate levels of physical activity, largely because of their lower levels of physical activity.

Although concerns about weight gain may be a barrier to smoking cessation,¹⁷⁻¹⁹ information on the use of smoking as a specific practice for weight control was not collected. However, the prevalence of smoking for weight control in adults is probably low, since only 3% reported use of a weight-control practice in the "other" category. This study is consistent with previous national studies^{10,11} that reported lower odds of trying to lose or maintain weight among current smokers compared to nonsmokers. This relationship may represent a clustering of unhealthy habits among adult smokers. Alternatively, it may represent a residual effect of BMI on weight-control status, since smokers tend to weigh less than nonsmokers.^{20,21}

Participants reported a wide variety of practices for weight loss and the prevention of weight gain. In

addition to the recommended strategies of caloric restriction and exercise, eating less fat was commonly reported among those trying to control their weight. Although reducing fat is a practical way to reduce calories, reducing dietary fat alone without restricting calories is not effective for weight loss.⁷ Consistent with other surveys, the prevalence of unhealthy weight-control strategies, such as taking laxatives or vomiting, was low.²⁻⁶ Use of prescription diet pills is an appropriate complement to weight-loss therapy for some people; however, the use of prescription (0.6%) and non-prescription (1.4%) diet pills and supplements only to prevent weight gain is concerning, since the long-term side effects of many of these pills are not known.

A previously unreported finding was the high prevalence of drinking a lot of water as a weight-control strategy (30% among those who tried to lose weight, 20% among those who tried only not to gain weight). Water has been suggested as a strategy for weight control in minimizing hunger and energy intake^{22,23} as well as replacing other calorie-containing beverages in the diet,²⁴ although the effectiveness of using water as a weight-control strategy is currently unknown.

These findings are subject to several limitations. First, data on weight-control practices are based on self-report. Socially objectionable behaviors, such as taking laxatives or vomiting, may have been under-reported, while other more socially acceptable behaviors, such as caloric restriction, may have been over-reported. Second, caloric restriction could not be quantified. Third, while most specific weight-control practices were estimated for the previous 12 months, data for levels of physical activity were estimated for the previous 30 days. Fourth, the data do not differentiate between weight maintenance and weight-loss maintenance. Lastly, the questionnaire did not provide detail on the frequency or duration of weight-control practices.

Despite substantial interest and efforts by U.S. adults to control their weight, obesity rates have not decreased. Nearly one third of obese individuals did not try to control their weight. In addition, only 30% of obese adults who tried to control their weight met minimum recommendations. An important future direction is to determine whether the low rates of meeting recommendations are due to a lack of knowledge regarding recommended practices, an inability or unwillingness to comply with recommendations, a desire to try other practices instead of those recommended, or some other combination of factors. More research is needed to identify methods to increase adherence to recommended practices, including techniques to tailor recommendations to individuals based on their lifestyle, food preferences, and medical conditions.²⁵ Current evidence supports the recommendation that clinicians screen all adult patients for obesity and offer obese adults intensive counseling and behavioral interventions to promote sustained weight loss.²⁶

Changes in societal and environmental factors, such as the increases in convenience food availability, automobile use, and televised entertainment, have likely contributed to the current obesity epidemic.^{27,28} To be most effective, interventions for weight control will require individual as well as societal and environmental supports. Creating or improving access to places for physical activity is effective at increasing population physical activity.²⁹ Less is known about what environmental factors are helpful in supporting individuals to limit their caloric intake.

The findings and conclusions in this report are those of the authors, and do not necessarily represent the views of the Centers for Disease Control and Prevention.

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