Emotional eating in overweight, normal weight, and underweight individuals

Allan Geliebter*, Angela Aversa

Departments of Psychiatry and Medicine, College of Physicians and Surgeons,
NY Obesity Research Center, St-Luke’s-Roosevelt Hospital, Columbia University,
1111 Amsterdam Avenue, New York, NY 10025, USA

Abstract

Emotional states and situations can affect food intake. We predicted that underweight individuals would eat less and overweight individuals would eat more during negative as well as positive emotional states and situations. Questionnaires to assess eating during emotional states and situations were distributed and collected in person in several major university and public libraries. Ninety questionnaires, representing for each gender the 15 most overweight, the 15 closest to normal weight, and the 15 most underweight, were analyzed. Gender had only minor effects on the eating ratings, and therefore the results are presented for the sexes combined. Underweight individuals reported eating less ($P=.000$) than both the normal and overweight groups during negative emotional states and situations. More surprisingly, underweight individuals also reported eating more ($P=.01$) than the other groups during positive emotional states and situations. Thus, part of the prediction was confirmed: the relative undereating by the underweight group, and the relative overeating by the overweight group during negative emotional states and situations. As compared to their usual eating behavior, undereating by underweight individuals during negative emotional states and situations was of a greater magnitude than their own overeating during positive states and situations ($P=.01$). Undereating by underweight individuals when experiencing negative emotions may contribute to their low body weight.

© 2003 Elsevier Science Ltd. All rights reserved.

Keywords: Emotional eating; Weight gain; Weight loss; Obesity; Food intake

* Corresponding author. Tel.: +1-212-523-4184; fax: +1-212-523-4380.
E-mail address: ag58@Columbia.edu (A. Geliebter).
1. Introduction

Emotional states can have major effects on eating behavior and result in either overeating or undereating. There have been several reviews of studies concerning emotional eating in relation to body weight (Allison & Heshka, 1993; Faith, Allison, & Geliebter, 1997; Ganley, 1989; Van Strien, 1995). These studies have almost always dealt with negative emotions such as depression or fear (Abramson & Wunderlich, 1972; Arnow, Kenardy, & Agras, 1995; Blair, Lewis, & Booth, 1990) and have mainly compared obese and normal-weight subjects (Allison & Heshka, 1993; Faith et al., 1997; Fitzgibbon, Stolley, & Kirschenbaum, 1993; Plutchik, 1976). The findings have been conflicting, but most indicate relative overeating in obese individuals during negative emotional states (Baucom & Aiken, 1981; Lowe & Fisher, 1983; McKenna, 1972; Plutchik, 1976; Ruderman, 1983; Schachter, Goldman, & Gordon, 1968; Slochower, Kaplan, & Mann, 1981). A psychosomatic interpretation has been that eating by obese individuals in response to negative emotions is a learned behavior to reduce the negative state (Kaplan & Kaplan, 1957).

Our objective was to examine a wide array of both negative and positive emotions and situations in relation to not only overweight and normal-weight but also to underweight individuals. Overeating or undereating during these states could predispose a person to becoming overweight or underweight. We predicted that overweight individuals would tend to overeat, whereas underweight individuals would tend to undereat, in response to both positive and negative emotions and situations.

2. Methods

2.1. Participants

Questionnaires were distributed in person to small groups of people sitting at tables in several large libraries in New York, including two major university libraries and one major public library. More than 500 questionnaires were distributed, with a refusal rate of less

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Underweight</th>
<th>Normal</th>
<th>Overweight</th>
</tr>
</thead>
<tbody>
<tr>
<td>BMI (kg/m²)</td>
<td>18.9 ± 1.4</td>
<td>22.2 ± 0.80</td>
<td>29.8 ± 2.7</td>
</tr>
<tr>
<td>Age</td>
<td>29.2 ± 9.6</td>
<td>28.9 ± 6.6</td>
<td>33.5 ± 11.2</td>
</tr>
</tbody>
</table>

Gender

<table>
<thead>
<tr>
<th></th>
<th>Men, n =</th>
<th>Women, n =</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>15</td>
<td>15</td>
</tr>
</tbody>
</table>

a BMI did not differ between gender, F(2,84)=0.001, P=.98, but did between weight categories, F(2,84)=330, P=.000.
b Age did not differ between gender, F(1,84)=1.3, P=.26, or between weight category, F(2,84)=2.4, P=.10.
دریافت فوری متن کامل مقاله

امکان دانلود نسخه تمام متن مقالات انگلیسی
امکان دانلود نسخه ترجمه شده مقالات
پذیرش سفارش ترجمه تخصصی
امکان جستجو در آرشیو جامعی از صدها موضوع و هزاران مقاله
امکان دانلود رایگان ۲ صفحه اول هر مقاله
امکان پرداخت اینترنتی با کلیه کارت های عضو شتاب
دانلود فوری مقاله پس از پرداخت آنلاین
پشتیبانی کامل خرید با بهره مندی از سیستم هوشمند رهگیری سفارشات