



## Revisión

# Intuitive eating: An emerging approach to eating behavior

Leslie Cadena-Schlam and Gemma López-Guimerà<sup>1</sup>

<sup>1</sup>Dept. Clinical and Health Psychology. Universitat Autònoma de Barcelona. Barcelona. Spain.

### Abstract

**Introduction:** In an effort to treat obesity, health care professionals pursue, by means of dieting and exercise interventions, weight loss as a primary goal of treatment. Although in few cases these interventions induce short-term moderate weight loss, in the long-term, the efficacy of these treatments is at least questionable. Weight-loss interventions based on restrictive diets may be associated to adverse health and well-being. In this regard, some researchers have considered shifting the focus of obesity treatment into a health-centered paradigm. Among the models derived from this new paradigm, Health at Every Size (HAES) is one of the most referenced. HAES has enhanced intuitive eating as a core component of the paradigm, which refers to the reliance on biological mechanisms to regulate food intake (i.e., internal hunger and satiety cues). Recently, intuitive eating has been winning recognition since it has been associated with numerous indices of physical and psychological well-being, and noteworthy, it has not been related to any adverse effects.

**Objective:** The present paper reviews the concept of intuitive eating, as well as the existing evidence that upholds this emerging approach. Also, it discusses the implication of shifting the focus of dietetic interventions into a health-centered paradigm.

**Design:** Narrative Review.

**Conclusions:** Although it is certain there is a need to extend current research on health-centered interventions, this approach may be a more promising and realistic alternative to address overweight and obesity than the conventional weight-loss treatments.

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Key words: *Intuitive eating. Health-centered paradigm. Weight-neutral approach. Obesity.*

### INGESTA INTUITIVA: UN NUEVO ABORDAJE DEL COMPORTAMIENTO ALIMENTARIO

### Resumen

**Introducción:** Con la finalidad de tratar la obesidad, los profesionales en salud buscan, por medio de intervenciones dietéticas restrictivas y ejercicio, la pérdida de peso como objetivo principal del tratamiento. Aunque en algunos casos estas intervenciones inducen pérdida de peso a corto plazo, en el largo plazo la eficacia de estos tratamientos es, al menos, cuestionable. Investigaciones recientes han sugerido que los tratamientos dirigidos a la pérdida de peso basados en dietas restrictivas no resultan eficaces a largo plazo e incluso pueden comprometer la salud y el bienestar del paciente. En este sentido, algunos investigadores han considerado cambiar el enfoque del tratamiento de la obesidad a un paradigma centrado en la salud y no en la pérdida de peso. Entre los modelos derivados de este nuevo paradigma, Salud a Cualquier Talla (HAES, por sus siglas en inglés) es uno de los más referenciados. Como componente central de este paradigma se sitúa la ingesta intuitiva, la cual se refiere a la confianza en los mecanismos biológicos para regular la ingesta de alimentos (i.e., las señales internas de hambre y saciedad). Recientemente, la ingesta intuitiva ha ganado reconocimiento, pues se ha asociado a diversos parámetros de bienestar físico y psicológico, además, no se ha observado ningún efecto adverso en pacientes que la practican.

**Objetivo:** El presente artículo revisa el concepto de la ingesta intuitiva, así como la evidencia que sustenta este nuevo enfoque. Además, se discute la implicación de cambiar el enfoque convencional de los tratamientos dietéticos a un paradigma centrado en la salud.

**Diseño:** Revisión Narrativa

**Conclusiones:** A pesar de la necesidad de ampliar la investigación de las intervenciones centradas en la salud, este enfoque podría ser una alternativa más prometedora y realista para el abordaje del sobrepeso y la obesidad que los tratamientos de pérdida de peso convencionales.

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Palabras clave: *Ingesta intuitiva. Enfoque en salud. Percepción neutral del peso. Obesidad.*

**Correspondence:** Leslie Cadena-Schlam  
Jurel 37. Costa de Oro.  
Boca del Río, Veracruz. CP 94299.  
E-mail: cadena.schlam@gmail.com

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## Abbreviations

BMI: Body Mass Index.  
ED: Eating disorders.  
HAES: Health at Every Size.  
HDL: High Density Lipoprotein.  
IES: Intuitive Eating Scale.  
IES-A: Intuitive Eating Scale for Adolescents.  
IES-2: Intuitive Eating Scale version 2.  
IH: Initial hunger.  
IS: Interoceptive Sensitivity.  
LDL: Low Density Lipoprotein.

## Introduction

According to traditional weight-centered paradigm, weight loss must occur in order to achieve health. Therefore, in an effort to treat obesity, health care professionals pursue weight loss as a primary goal of treatment by means of dieting and exercise interventions. In few cases, these interventions induce short-term moderate weight loss (between 5 and 10 % of body weight), which in turn, may result in improvements of certain health parameters such as blood pressure, cholesterol and blood glucose<sup>1,2</sup>. However, a growing body of evidence demonstrates that, in the long-term, the efficacy of these treatments is at least questionable. Most of the patients (95-98%) regain weight over three to four years, being unable to maintain neither the behavioral lifestyle changes, nor the improvements in health<sup>3-5</sup>. In fact, several longitudinal studies reveal that restraint eating (i.e. dieting) may prompt weight gain<sup>6-8</sup>.

Furthermore, it has been mentioned that weight-loss interventions based on restrictive diets may be associated to adverse health and well-being. In this line, research also indicates that these types of interventions may increase psychological distress, food/weight preoccupation, depression and dissatisfaction, prompt weight fluctuations, lower self-esteem, and embolden disordered eating<sup>4,9-12</sup>. In addition, the strong focus placed on weight and appearance may endorse weight stigmatization<sup>13-15</sup>. Weight stigmatization and discrimination are highly associated with several unhealthy practices, such as increasing food intake, engaging in binge eating behaviors, avoiding exercise and postponing medical care, which in turn may heighten the risk of obesity<sup>11,16</sup>.

Besides, it has been suggested that dieting, as not being consistent with internal physiological hunger and satiety signals, disrupts interoceptive awareness, i.e. the perception of sensations that originate within the body, which in turn increases the susceptibility to other stimulus that incite eating, such as external or emotional motivations<sup>9,17</sup>. Indeed, it has been suggested that the stronger the emphasis on external factors (e.g., weight and appearance), the higher the interference with energy intake regulation mechanisms<sup>18</sup>.

Thus, the attempts to restrict caloric intake may backfire by disconnecting individuals from their natural hunger and satiety cues<sup>19</sup>. Such internal disconnection is considered to be a potent risk factor of eating disorders (ED), as well as overweight and obesity<sup>6,20-22</sup>.

Regarding the adverse effects associated to weight-loss interventions, some researchers have considered shifting the focus of obesity treatment into a health-centered paradigm, by supporting interventions that encourage the adoption of healthy behaviors regardless of weight status. Among the models derived from this new paradigm, Health at Every Size (HAES) is one of the most referenced<sup>11,16,23,24</sup>. In order to address eating behavior, HAES has enhanced intuitive eating as a core component of the paradigm, which refers to the reliance on biological mechanisms to regulate food intake (i.e., internal hunger and satiety cues), while a sense of body appreciation is well infused. In other words, intuitive eating intervention aims to address the cause of energy deregulation by retrieving the innate abilities of food intake regulation and promoting positive attitudes towards food and body image.

Recently, intuitive eating has been winning recognition since a broad range of research has associated this eating behavior with numerous indices of physical and psychological well-being<sup>25-29</sup>. Most importantly, intuitive eating interventions, in addition to improving health outcomes such as cholesterol levels, blood pressure and insulin sensitivity, have not been associated with any adverse effects. In fact, body acceptance and intuitive-based interventions have proven effective in reducing the risk of disordered eating, by decreasing thin-ideal internalization, dietary restraint, and psychological impairment<sup>30</sup>.

In order to raise a proper state of affairs, the first part of this paper aims to review the concept of intuitive eating as well as the existing evidence that upholds this emerging approach. In the second part, the implication of shifting the focus into a health-centered paradigm in current research and clinical practice will be discussed.

## Definition of Intuitive Eating

Intuitive Eating is defined as “the dynamic process-integrating attunement of mind, body and food”<sup>31</sup>. It refers to an adaptative form of eating essentially based on hunger and satiety cues to regulate food intake. Thus, a strong connection with internal body signals, known as interoceptive awareness, is fundamental to this process.

This eating style was initially developed by Tribole and Resch in 1995, but it was not until 2006, that Tylka and cols. operationalized intuitive eating features.<sup>31,32</sup> Since then, four core components of intuitive eating have been identified and empirically supported by several studies<sup>25,27,32</sup>. The four components of intuitive eating help remove the barriers that interfere with

interoceptive awareness and improve such awareness in relation to food intake, while a sense of body appreciation is well infused<sup>31</sup>. The main components of intuitive eating style are: 1) *Unconditional permission to eat when hungry and whatever food is desire* goes on the opposite direction to diet mentality. As people who respond unconditionally to feelings of hunger and food cravings do not tend to classify food into categories of “good” or “bad” and instead perceive every food as emotionally-neutral; 2) *Eating for physical rather than emotional reasons* reflects the tendency to eat to satisfy physical hunger rather than to cope with emotional distress; 3) The intuitive eater’s *reliance on internal hunger and satiety cues to determine when and how much to eat*. Perceiving hunger and satiety cues is not sufficient to eat intuitively; a sense of strong reliance to these cues has to be developed, and 4) *Body-Food Choice Congruence* has been identified recently<sup>27</sup>. It consists in using gentle nutrition to guide food choices that meet both physical and sensory needs. This means that intuitive eaters tend to be mindful about how their body responds to certain foods, usually choosing foods that better contribute to their body functions, but also considering flavor as a central component of food choice.

### Self-report measures of Intuitive Eating

In order to be able to gauge the above-mentioned features, self-report measures had to be developed. To our knowledge, there are only two validated questionnaires that measure intuitive eating in adults. Both are referred to as Intuitive Eating Scale (IES). The first one was developed by Steven Hawks and cols. in 2004, and the other one by Tracy Tylka in 2006<sup>32,33</sup>. Despite the fact that both seem to measure intuitive eating features, they do not share the same factor structure. While Hawk’s IES encompasses a four-factor structure (intrinsic eating, extrinsic eating, antidiating, self-care), Tylka’s IES embraces a three-factor model (unconditional permission to eat, eating for physical rather than emotional reason, and reliance on internal hunger and satiety cues to determine when and how much to eat). Nevertheless, most researchers preferred Tylka’s IES to better assess intuitive eating style, and have been using it widely in subsequent studies<sup>25,27-29,34</sup>. Moreover, building on Tylka’s work, new scales have emerged. In 2012, Dockendorff et al. developed Intuitive Eating Scale-Adolescents (IES-A) to assess intuitive eating in adolescent population<sup>28</sup>. Some of the items included in this questionnaire are: 8) *I can tell when I’m slightly hungry*, 16) *I use food to help me soothe my negative emotions, such as feeling sad or angry*, and 20) *I don’t trust myself around fattening or high-calorie foods*. More recently, the Tylka’s IES questionnaire has been updated to the latest version named Intuitive Eating Scale-2 (IES-2), in order to address certain limitations of the previous scale<sup>27</sup>. In this

new version IES-2, the fourth factor Body-Food Choice Congruence was included. The IES-2 consists of 23 items, such as: 7) *I trust my body to tell me what to eat*, 12) *I am able to cope with negative emotions (e.g. anxiety, sadness) without turning to food for comfort*, and 20) *I mostly eat foods that make my body perform efficiently (well)*. Responses are rated on a 5-point scale ranging from 1=“strongly disagree” to 5=“strongly agree”. The possible range for total IES score is 21-105, where a higher total score corresponds to more intuitive eating.

According to current evidence, IES-2 and IES-A are considered viable measures to assess intuitive eating in both men and women, and within adult and adolescent populations<sup>27-29</sup>. Moreover, it has been stated that IES-2 could be a useful clinical tool to assess not only adaptative behaviors (i.e., intuitive eating), but also the risk of developing maladaptative compartments (e.g., emotional eating, dieting) that could result in disordered eating and obesity, due to the fact that this questionnaire predicts psychological wellness beyond the mere absence of eating disorder symptomatology<sup>27</sup>.

### Intuitive Eating Correlations

The above mentioned instruments have been the basis for many subsequent investigations aimed at exploring intuitive eating correlations with other constructs<sup>25,27-29,35,36</sup>. This research demonstrates that intuitive eating is inversely related to, although distinct from, ED symptomatology, but it is also positively related to several parameters of physical and psychological well-being. Since, the newest version of the IES (IES-2) is very recent, previous studies have used the IES-1 which encompass only three components of intuitive eating<sup>27,32</sup>. These correlations are reviewed in the following sections.

#### *Intuitive Eating as the absence of ED symptomatology*

Recent studies claim that the intuitive eating components are inversely associated with various risk factors of ED, such as internalization of the thin ideal, pressure to lose weight, body dissatisfaction, body surveillance, body shame, lack of interoceptive awareness, emotional eating and negative affect<sup>25,27,28</sup>. Particularly, intuitive eater’s unconditional permission to eat predicts lower levels of ED symptomatology because it is strongly associated with lower cognitive restraint and dieting<sup>25</sup>. In fact, intuitive eaters are 40% less likely to indulge in extreme weight control behaviors, and less likely to experience chronic binge eating and dieting<sup>29</sup>. Moreover, unconditional permission to eat is highly related to the perception of bodily signals (interoceptive awareness), which directly influences the vulnerability to emotional and external stimuli<sup>17,32</sup>. Interestingly, this relation is bidirectional, creating a spiral effect. To be-

gin, people with low interoceptive awareness are more susceptible to develop disordered eating, because they tend to adjust food intake based on other reasons rather than their physiological needs (e.g. emotional eating). Subsequently, people that already have an ED strive to ignore their internal signals of hunger and satiety to the extent that, at some point, they no longer perceive them normally (e.g. anorexia nervosa), preserving and aggravating the disordered eating cycle. Although the causality of this association is not yet well defined, it is certain that the lack of interoceptive awareness is particularly seen in people suffering from an ED<sup>21</sup>.

Based on these results, it appears that low levels of intuitive eating might be a risk factor for ED. Inversely, high levels of intuitive eating may guard against disordered eating, by endorsing psychological wellness<sup>25</sup>.

#### *Intuitive Eating as a distinct construct associated with indices of physical and psychological wellbeing*

The absence of ED symptomatology does not necessarily predicts adaptative eating (e.g. people could eat in absence of hunger but without experiencing a binge). This fact supports the idea that intuitive eating has distinctive characteristics that go beyond its relation with ED.<sup>25</sup> In this sense, several clinical trials have associated intuitive eating with significant improvements in psychological wellbeing indices (e.g. self-esteem, body appreciation, optimism), cardio-metabolic parameters (e.g. blood pressure, total cholesterol, LDL cholesterol and triglycerides), and healthy behaviors (e.g. dietary and physical activity habits, nutritional quality of food intake)<sup>23,24,26,35</sup>.

In regard to its psychological benefits, research has associated intuitive eating with higher levels of body appreciation, self-esteem and feelings of satisfaction<sup>27</sup>. These findings suggest that people who eat intuitively are more likely to be satisfied with their own body and feel less pressure to achieve societal thinness ideals. Thus, it is presumed that intuitive eaters show greater psychological well-being because they do not condition their self-worth to weight or body image. In addition, two components of intuitive eating, eating for physical rather than emotional reasons and relying on hunger and satiety cues, have been positively associated with certain adaptative psychological features, such as positive affect, proactive coping, optimism and social problem solving<sup>25</sup>.

Furthermore, studies focused on examining the relationship between intuitive eating and physical health have shown that intuitive eating is significantly correlated with lower levels of blood triglycerides, lower levels of total cholesterol and LDL cholesterol, higher levels of HDL cholesterol, decreased diastolic blood pressure, and therefore, diminished cardiovascular risk<sup>26,37</sup>. Moreover, intuitive eating has been associated with lower body mass index (BMI) in numerous cross-sectional surveys<sup>17,26,27,29,32,34,35,38,39</sup>. This broadly

suggests that having a stronger awareness of physiological signals and relying on them to decide what, when and how much to eat can be associated with a lower caloric intake<sup>35</sup> (in regard to the amount of food rather than the type of food eaten)<sup>34</sup>. Thus, it seems that intuitive eaters are less likely to engage in behaviors that may lead to weight gain (e.g. binge eating) than those who follow external rules<sup>32</sup>. However, the causality of this relationship needs to be further investigated, as intuitive eating and BMI can be bidirectional related<sup>29</sup>. On the one hand, it is well-demonstrated that intuitive eating promotes a healthy weight status, but on the other hand, people with normal weight are more likely to trust their internal hunger and satiety cues to regulate their intake, being therefore more intuitive<sup>29</sup>.

In addition, since there is some concern about whether intuitive eating (particularly the unconditional permission to eat premise) could result in an excessive and unbalanced diet, some studies have focused on examining its relationship with the nutritional quality of food intake. Research has shown that intuitive eaters do not tend to consume more high-fat/sugar foods than restrictive eaters<sup>34</sup>. In fact, intuitive eating has been associated with a more varied and nutritious diet, as well as, the adoption of healthy eating habits (e.g. eat breakfast)<sup>35</sup>.

#### **The role of interoceptive sensitivity**

The findings mentioned above are based solely on self-report measures of intuitive eating, which reveal only subjective data. In this regard, some researchers, attempting to find a more objective marker, have used interoceptive sensitivity (IS) as measured by a heart-beat perception<sup>17</sup>. Because interoceptive sensitivity represents a significant predictor of intuitive eating behavior, researchers have explored its association with BMI and health outcomes. In this sense, Herbert and cols. reveal that training in self-perception of bodily signals could prove effective for increasing responsiveness to bodily symptoms in regard to food intake regulation<sup>17</sup>. Furthermore, interoceptive sensitivity could partly explain the inverse association between intuitive eating and BMI, as it directly influences the degree of individual vulnerability to external factors that incite eating<sup>17</sup>.

Meanwhile, Ciampolini and colleagues have evaluated the effects of training in the recognition of initial hunger (IH) by using levels of pre-prandial blood glucose as a biochemical marker of hunger<sup>38</sup>. This method aims to standardize the training program by helping identify more accurately interoceptive sensations. As Ciampolini has stated, “blood glucose acts to clarify, verify, and validate what might otherwise remain as undifferentiated interoceptive sensations”<sup>22</sup>. In this sense, people who have been trained in perceiving initial hunger have significantly improved energy regulation (i.e. intuitive eating), reduced their caloric

intake by a third, increased their insulin sensitivity levels, and lowered their BMI by 2 points<sup>22</sup>. Based on these findings, the authors suggest that overweight and insulin resistance might be rooted in the unconsciousness of body signals<sup>22,38</sup>.

### **Potential benefits of an intervention based on Intuitive Eating**

Recent evidence suggests that intuitive eating intervention has shown several benefits. Primarily, training in intuitive eating has a relative long-term lasting effect on improving physical and psychological wellness in comparison with conventional weight loss interventions<sup>23,24,40-42</sup>. Secondly, this model has an integrative scope for action. As it not only reduces the risk of developing disordered eating by endorsing numerous adaptative strategies (e.g. increasing interoceptive sensitivity); but also reduces the onset of chronic diet-related diseases (e.g. obesity) by improving physical and psychological outcomes.

The table I shows the studies aimed to explore the efficacy of interventions based on Intuitive Eating and HAES principles.

### **Implications for research and practice**

Weight loss strategies are widely encouraged in public health policy and health care practice as an answer to the increasing rates of obesity affecting the general population. However, since dieting has been associated with disordered eating, health risk and psychological distress, encouraging patients to start dieting may be uncertainly ethical<sup>11,43</sup>. Therefore, the pursuit of a more ethical and effective approach to eating behavior should be the priority for health care professionals<sup>16,44</sup>.

In this regard, an alternative approach with a main focus on health and inclusive focus on weight has been proposed. So far, such health-centered interventions have met ethical standards of beneficence and non-maleficence by stopping weight stigma, honoring size diversity, and being constructed from a holistic focus where all aspects of health are considered<sup>16</sup>. Instead of pursuing weight-loss by means of food restriction, these interventions aim at adopting healthy behaviors regardless of weight status. Plenty of evidence has shown that it is likely the behavior to change (and not the weight loss per se) that plays a greater role in health improvement<sup>11</sup>. In a recent study conducted by Matheson and cols., healthy life style habits (moderate drinking, not smoking, regular exercise, fruit and vegetable consumption) were inversely associated with mortality risk, irrespective of the subject's initial BMI<sup>45</sup>. In fact, the researchers revealed that the "obese individuals who adopted all 4 healthy lifestyle habits had the lowest risk of mortality compared with every other weight strata and life style combination<sup>45</sup>".

Furthermore, despite of what is commonly thought, weight is not a modifiable behavior, but a result of involuntary factors both personal and environmental<sup>16</sup>. Therefore, weight suppression may be an unattainable target for health care interventions. The fact that intuitive eating interventions may offer a more realistic longer-lasting improvement of health outcomes and general wellness, independent of weight loss, makes them more promising than conventional treatments. This might be linked to the significantly higher retention rates seen in health-centered interventions when compared to diet and control groups<sup>37,41</sup>, as patients involved in this approach may be less likely to become discouraged and may continue to engage in healthy behaviors by not using weight loss as a marker of success<sup>44</sup>. However, although it is not the central aim of the health-focused and intuitive-based interventions, modest weight loss might occur<sup>37,41,42</sup>. And it could continue to occur post-treatment, contrary to dieting outcomes where weight rebound is particularly common. The mentioned weight loss can be explained by the fact that intuitive eaters have shown to be able to maintain a stable eating behavior over time, while dieters tend to increase their food intake post-treatment<sup>46</sup>. That being said, an intervention based on intuitive eating skills might be a viable strategy towards weight management and weight gain prevention.

In addition, since intuitive eating not only promotes adaptative behaviors, but also prevents the occurrence of future ED, this intervention should be especially useful for chronic dieters who have not obtained satisfactory results with conventional treatments and are at risk of engaging in disordered eating. Moreover, some surveys have revealed that women who binge especially benefit from training intuitive eating skills<sup>31,34,47</sup>. Finally, a further advantage of intuitive eating interventions is that, from a clinical point of view, it could be applied to a wide range of areas. For instance, it could work as health diffusion strategies in workshops or support groups, health campaigns at college centers, educational courses with curricular value or even as individual therapy session<sup>48</sup>.

Some limitations of the present paper should be acknowledged. Firstly, it is not a systematic review. Secondly, the studies presented in this paper were the ones consider having a greater scientific rigor, leaving a side part of the literature related to this subject. Last but not least, it is worth addressing some limitations of the intuitive eating framework. Further research is required to describe more precisely the effectiveness of this new approach. Future studies should focus on deeply examined adaptative eating behaviors in order to extend the current evidence regarding health-centered interventions and address unsolved matters in this subject. It could be meaningful to explore the effects of intuitive eating interventions in specific cases where its implementation can present certain complications (e.g. low-income population)<sup>27</sup>. Also, it seems necessary to estimate the impact of weight-neutral

**Table 1**  
Controlled trials that used interventions based on Intuitive Eating and HAES principles

Study	Design Group type (n)	Population	Tx sessions / length in weeks	Follow-up (weeks post-tx)	Attrition	Main findings
Mellin et al., 1997	Training group 22	Obese men and women	18/18	78	T group 18%	The intervention showed several positive effects: improved health indexes, as well as various aspects of psychosocial, vocational and economic functioning, decreased depression and lowered body weight.
Goodrick et al., 1998	Nondiet group 62 Diet group 65 Control group 58	Overweight and obese women, binge-eaters	50 sessions	78	Not reported	Both intervention groups, Non Diet and Diet, reduce binge eating episodes in a similar way, but none of them showed significant weight loss.
Bacon et al., 2002 & 2005	HAES group (39) Diet group (39)	obese female chronic dieters	30/24	72	HAES 8% Diet 42%	Despite de HAES group do not showed significant weight loss, the improvements in metabolic fitness, psychology and eating behavior were remarkable. Also, the attrition rates within de HAES group were significantly lower in comparison to the diet group. After a two-year follow-up, only the HAES group maintained weight and sustained improvements in all outcome variables.
Provencher et al., 2007 & 2009	HAES group (48) Social Support (48) Control group (48)	Pre-menopausal obese and overweight women	14/16	48	HAES 8% S.S 19% Control 21%	Larger decreases in habitual susceptibility to disinhibition and susceptibility to external hunger, as well as higher increase in flexible restraint, were associated with the maintenance of a lower body weight in the HAES group (63.4% of HAES women maintained a 2% weight loss at follow-up). No large difference was noted between HAES and SS groups.
Gagnon-Girouard et al, 2010	HAES group (48) Social Support (48) Control group (48)	Weight-preoccupied obese and overweight women	14/14	48	Not reported	In the long-term, psychological variables (depressive symptoms, body and self-esteem, binge eating and quality of life) and body weight remained stable or continued to improve among the HAES group, but not in the other groups.
Ciampolini et al, 2010	IH Training 89 Control group 31	Men and women adults, suffering from symptoms of functional bowel disorders	7 weeks	12	IHT 20% Control 16%	Over a 5-month period, training in hunger recognition improved insulin sensitivity index and cardiovascular risk factors, and decreased energy intake, body weight and BMI.
Leblanc et al., 2012	HAES group (48) Social Support (46) Control group (46)	Pre-menopausal obese and overweight women	14/16	24	HAES 8% S.S 19% Control 21%	HAES group reported decrease in hunger and external hunger, which were associated with a decrease in overall energy intake.
Gravel et al. (2013)	Sensory-based (24) Control group (26)	Restrictive overweight women	6/6	12	S-Based 20% Control 30%	Sensory-based intervention improved eating-related attitudes and behaviors among restrained women. Intervention group showed a significant decrease in disinhibition and situational susceptibility to disinhibition, after treatment and in the follow-up.

T group: Training group; HAES: Health at Every Size; SS: Social support intervention group; BMI: Body Mass Index; IHT: Initial Hunger Training.

health policies in a broader context. Regarding this last point, scholars agree that “the implementation of global strategies for people of all sizes and shapes may be a more effective method for addressing weight related problems than focusing exclusively on obese individuals<sup>44</sup>.”

## Conclusions

Although it is certain there is a need to extend current research on health-centered interventions, it is worth mentioning the several advantages encompassed in this approach:

- a) Intuitive Eating intervention may be a more promising and realistic alternative to address overweight and obesity than the conventional weight-loss treatments.
- b) This method, in addition to meeting health goals, does not affect the integrity and welfare of the patient.
- c) Instead, it guards people of all sizes and shapes from unhealthy weight-control behaviors that may diminish their health and wellbeing.

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