

Case Report

Influence of Residential Treatment Environments on Women’s Body Weight

Mariana Conceição^{1*}, Tito Abrantes¹, Sofia Campelos², João Freitas³ and Bruno Barbosa³

¹Department of Pulmonology, Centro Hospitalar Tondela-Viseu, Viseu, Portugal

²Institute for Research and Innovation in Health (I3S), University of Porto, Porto, Portugal

³Department of General Surgery, Centro Hospitalar Tondela-Viseu, Viseu, Portugal

***Correspondence:** Mariana Conceição¹, Department of Pulmonology, Centro Hospitalar Tondela-Viseu, Viseu, Portugal, E-mail: marianacon@hotmail.com, DOI: 10.1042/TDOM.3.1.0006

Abstract

The study examined body weight changes among women living in residential treatment facilities, particularly those receiving care for substance use disorders. The main objective was to understand whether women in structured residential environments experience weight loss or weight gain during treatment and what factors influence these changes.

Keyword: Women; Residential facilities, Weight loss, Body composition, Physical fitness, Dietary habits

Received date: May 2, 2026; **Accepted date:** May 12, 2026; **Published date:** May 27, 2026

Citation: Aldiouma Guindo (2026) Influence of Residential Treatment Environments on Women’s Body Weight. TDOM, 3:1

Copyright: © 2026, Aldiouma Guindo. All intellectual property rights, including copyrights, trademarks rights and database rights with respect to the information, texts, images, logos, photographs and illustrations on the website and with respect to the layout and design of the website are protected by intellectual property rights and belong to Publisher or entitled third parties. The reproduction or making available in any way or form of the contents of the website without prior written consent from Publisher is not allowed.

Introduction

Residential treatment programs are designed to support recovery from substance use by providing structured living conditions, regulated routines, and access to counseling and health services. However, these environments can also influence lifestyle behaviors such as eating patterns, physical activity, and emotional coping mechanisms. The study explored how these factors affect body weight among women in such facilities.

Participants and setting

Variable	Description
Population	Women in residential treatment facilities
Setting	Multiple residential recovery centers
Health status	Substance dependence with nutritional and metabolic concerns
Background	Predominantly minority and low-income populations
Primary outcome	Body weight change during treatment

Table 1: Characteristics of study participants.

The research focused on women in multiple residential treatment centers, many of whom were from minority and low-income backgrounds. Participants often entered treatment with complex health needs, including substance dependence, nutritional imbalances, and pre-existing weight issues. The residential setting provided controlled meals and limited but structured daily routines [Table 1].

Weight change patterns

Findings indicated that body weight changes were common during residential treatment, but the direction of change varied depending on individual circumstances and program structure. Some women experienced weight gain due to increased food intake and reduced physical activity, while others showed weight loss, particularly when substance use had previously suppressed appetite or disrupted metabolism.

Overall, the study highlighted that weight fluctuations are typical in early recovery. These changes are influenced not only by biological recovery from substance use but also by environmental conditions within the facility.

Key influencing factors

Several important factors contributed to weight changes:

Factor	Mechanism	Potential outcome
High-calorie meals	Increased energy intake	Weight gain
Reduced physical activity	Lower energy expenditure	Weight gain
Emotional eating	Stress-related overeating	Weight gain
Behavioral substitution	Food replacing substance reward	Increased calorie intake
Recovery from substance use	Return of appetite and metabolism	Weight stabilization or gain

Table 2: Factors associated with weight changes.

Pattern	Possible explanation
Weight gain	Increased appetite, sedentary lifestyle, emotional eating
Weight loss	Recovery from previous metabolic disruption, improved health behaviors
Weight stabilization	Balanced nutrition and physical activity

Table 3: Patterns of weight change during recovery.

Dietary environment

Meals in residential facilities were often readily available and sometimes high in calories, leading to increased food consumption.

Reduced physical activity

Limited exercise opportunities and structured indoor routines contributed to sedentary behavior.

Emotional eating: Many participants used food as a coping mechanism to replace substance use or manage stress, boredom, and anxiety.

Behavioral substitution

Eating sometimes replaced drug or alcohol use as a form of reward or emotional regulation.

Recovery effects: As substance use decreased, normal appetite patterns returned, which in some cases led to increased weight. Interpretation of findings

The study suggested that body weight changes in residential treatment should not be viewed in isolation but rather as part of a broader recovery process. Weight gain or loss may reflect physiological stabilization, behavioral adjustment, and environmental influences rather than a single cause.

However, the findings also raised concerns that residential programs may unintentionally contribute to unhealthy weight changes due to lack of structured nutrition planning and limited physical activity programs [Tables 2, 3].

Implications

The authors emphasized the need for integrating health-focused interventions into residential treatment settings. These may include:

- Balanced nutrition planning and dietary monitoring
- Regular physical activity programs
- Health education on eating behaviors
- Screening for weight changes during treatment

Such measures could help ensure that recovery from substance use also supports long-term physical health.

Conclusion

The study concluded that women in residential treatment facilities may experience significant changes in body weight, including both loss and gain, depending on behavioral, emotional, and environmental factors. It highlighted the importance of addressing nutrition and physical health as part of comprehensive addiction recovery care.

References

- 1) Dutoit CE, Binet L, Fujii H, Lattuati-Derieux A, Gourier D. Nondestructive analysis of mummification balms in ancient Egypt based on EPR of vanadyl and organic radical markers of bitumen. *Anal Chem.* 2020;92(23):15445-15453.
- 2) Dew WA, Hontela A, Rood SB, Pyle GG. Biological effects and toxicity of diluted bitumen and its constituents in freshwater systems. *J Appl Toxicol.* 2015;35(11):1219-1227.
- 3) Keogh C, Wallace E, O'Brien KK, Galvin R, Smith SM, Lewis C, et al. Developing an international register of clinical prediction rules for use in primary care: A descriptive analysis. *Ann Fam Med.* 2014;12(4):359-366.