



**THE PERCEPTION AND BODY CARE AFTER *BRAINSPOTTING*
INTERVENTION: A PHENOMENOLOGICAL VIEW OF OBESITY IN
ADOLESCENCE¹**

**A PERCEPÇÃO E O CUIDADO DO CORPO APÓS INTERVENÇÃO COM
BRAINSPOTTING: UMA VISÃO FENOMENOLÓGICA DA OBESIDADE NA
ADOLESCÊNCIA**

Débora Candido de Azevedo²

Maria Aparecida Viggiani Bicudo³

Tulio Konstantyner⁴

Abstract: This article presents qualitative results of a randomized clinical trial carried out with adolescents with obesity who underwent an innovative treatment with *Brainspotting* therapy with the aim of reducing and controlling excess weight. We sought to understand the perception and care of the self-body after the intervention. The data were analyzed and interpreted in the light of the Husserlian philosophy of the living body, and the concepts of perception, according to Maurice Merleau-Ponty, and Care, according to Martin Heidegger's hermeneutics. We understand that obesity speaks of the body in the continuous flow of experiences with retentions/protections, intertwining with the acts of consciousness. The phenomenological interpretations and reductions pointed to five Overarching Ideas: perception of the body, modes of care, modes of feeling, movement towards freedom, and openness to the future. The metacomprehension revealed a new meaning for the experience of obesity. *Brainspotting* emerges as a psychotherapeutic technique and complementary strategy for managing obesity.

Keywords: Psychology; Adolescence; Obesity; Phenomenology; Body.

Resumo: Este artigo apresenta resultados qualitativos de um ensaio clínico randomizado realizado com adolescentes com obesidade que passaram por um tratamento inovador com a terapia de *Brainspotting* com o objetivo de reduzir e controlar o excesso de peso. Buscamos compreender a percepção e o cuidado do corpo-próprio após a intervenção. Os dados foram analisados e interpretados à luz da filosofia husserliana do corpo-vivente, e dos conceitos de percepção, segundo Maurice Merleau-Ponty, e de Cuidado, conforme a hermenêutica de Martin Heidegger. Entendemos que a obesidade diz do corpo no fluxo contínuo das vivências com retenções/proteções, entrelaçando-se com os atos da consciência. As interpretações e reduções fenomenológicas apontaram cinco Ideias Abrangentes: percepção do corpo, modos de cuidado, modos de sentir, movimento de mudança rumo à liberdade e abertura ao futuro. A metacompreensão desvelou um novo sentido para a vivência da obesidade. O *Brainspotting* surge como técnica psicoterapêutica e estratégia complementar para o manejo da obesidade.

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² PhD in Pediatrics and Applied Sciences to Pediatrics from Universidade Federal de São Paulo (UNIFESP). Psychologist and affiliated preceptor at EPM/UNIFESP. Professor in the Graduate Program at Instituto de Fenomenologia do Rio de Janeiro (IFEN). São Paulo, SP, Brazil. E-mail: debora.azevedo@unifesp.br.

³ PhD in Sciences from Faculdade de Filosofia Ciências e Letras de Rio Claro (FFCLRC). Full Professor of Philosophy of Education (retired) at Universidade Estadual Paulista "Júlio de Mesquita Filho" (UNESP). Professor in the Graduate Program in Mathematics Education at UNESP Rio Claro, São Paulo, Brazil. E-mail: mariabicudo@gmail.com

⁴ PhD in Pediatrics and Applied Sciences to Pediatrics from EPM/UNIFESP. Associate Professor of the Nutrology course in the Department of Pediatrics at EPM/UNIFESP. São Paulo, SP, Brazil. E-mail: tkmed@uol.com.br



Palavras-chave: Psicologia; Adolescência; Obesidade; Fenomenologia; Corpo

1 Introduction

Obesity is a complex and worrying issue. It is considered a Chronic Non-Communicable Disease (CNCD) of multifactorial etiology that poses challenges for prevention and treatment, with serious health consequences. It is characterized by an inflammatory process resulting from excessive fat accumulation caused by excessive calorie consumption and low Daily Energy Expenditure, which results in a positive energy balance (Weffort, 2019). Since it is a disease or a risk factor for other comorbidities, the natural sciences approach obesity as something to be avoided, which contributes to the anti-obesity movement and to increasing social stigma, as it suggests that as well as being a medical responsibility, obesity is also a matter of personal and moral responsibility for the individual (Randall-Arell; Utley, 2014).

From an existential point of view, obesity is seen as a way of being in the world that reflects human diversity. Everyone is a body that lives both externally and internally, to the extent that the physical and psychological dimensions make the living body the guiding center of the person's life and physical and sensory sensations intertwine in the totality of the living body, involving all organs and functionalities. This fluidity of feeling penetrates the carnality of the body and links acts that go beyond sensations, constituting values and bringing the socio-cultural dimension of the world (Bicudo, 2022). Thus, obesity can be understood as a manifestation of the way in which the subject understands himself and perceives their existence in the world.

From the point of view of man as a being-in-the-world influenced by culture, obesity is currently classified as a global public health epidemic, representing a health threat due to increasing prevalence rates (WHO, 2022). Historically, obesity has had different meanings in the Western world. In the Middle Ages, it was associated with prestige, health, and power; and in the clerical model, with guilt and sin due to gluttony, bringing feelings of guilt and shame. In modern times, it was seen as laziness and incompetence. This view intensified even more in the Enlightenment, when a more technical and individualized approach with fat measurements and classifications increased the stigma at the beginning of the 19th century. During this period, the idea of organic functioning changed, with the body coming to be seen as an "energetic" apparatus and with chemical analysis identifying condemned foods, which brought changes in the way of stigmatizing the weaknesses and inferiorities of the body and obesity. From the



obese person's perspective, physical, moral, and psychological suffering was revealed as unhappiness.

In the 20th century, changes in lifestyle and advances in medicine, whether from an aesthetic point of view or through the discovery of weight loss therapies, accentuated the conflict related to body images and the fight against obesity, further stigmatizing obese individuals. Nowadays, with obesity seen as an epidemic, obese individuals are often stigmatized as socially ill and morally failed, and are annoying, expensive beings who disturb everyone. What an individual with obesity says in their self-testimony is that they experience an "insurmountable intimate laceration" (Vigarelo, 2012, p. 318). The suffering of being obese, of facing difficulties in losing weight, of needing to get into an ideal shape, added to the stigmas arising from this condition, accumulates traumas in personal experiences.

In this work, obesity will be analyzed from the Husserlian perspective of the living-body, which is intentionally directed towards other bodies and other living bodies and, as a center of orientation towards the world, the other and itself (Bicudo, 2022), having its own body as a zero point of reference, or as Merleau-Ponty (1999, p. 122) says: "my body is the pivot of the world". The living body as conscious and intentional moves autonomously and perceives itself, revealing autonomy and freedom in relation to the world (Bicudo, 2022). In this way, the suffering subject will be taken as saying what he suffers from, with the intention of understanding the adolescent's experience of obesity, how he perceives himself in the lifeworld and how he looks after his body.

According to the World Health Organization (WHO), adolescence is a complex phase of intense changes, spanning from 10 to 20 years of age. The set of somatic transformations is called puberty (Brasil, 2017), a multifaceted phase influenced by socio-historical and cultural characteristics.

Historically, the concept of adolescence is recent, emerging in the 20th century with industrialization and social changes. At the end of the 19th century, nationalist campaigns marked a milestone in human development when young people in this age group moved from a "morality subordinate to the productive system to one that was more bellicose and aware of its rights" (Frota; Morato, 2009, p. 300). At the beginning of the 20th century, social movements in search of freedom consolidated adolescence as a period of crisis and a search for identity. Psychology contributed to the construction of the concept by promoting the developmental nature of human capacities through psychological tests. In Brazil, youth movements in the 1960s and 1970s fought for



political, behavioral, and existential freedom. In the 1980s, the consumption of material and cultural goods gained prominence among young people (Frota; Morato, 2009), and in the 1990s adolescence came to be understood more as psychic work than as an age stage. In addition, the violence represented by gangs and video games exploded in adolescents' daily lives (Dias, 2009).

In the new millennium, the technological era, globalization, and social networks have brought new challenges, impacting on adolescents' mental health. The "society of fatigue" (Han, 2017), characterized by the incessant search for consumer goods and information overload, profoundly affects young people. Despite all the difficulties they face, adolescents and young people, who represent 30% of the population of Latin America and the Caribbean, play an important role in contemporary society. Among the problems they face are global youth violence, which includes bullying, physical altercations, murders, physical and sexual aggression; premature morbidity and mortality due to the high incidence of injuries; teenage pregnancy; social inequalities; chronic diseases associated with substance use; risk behaviors; gender difficulties; lack of access to information; and insufficient health services. The main causes of mortality include suicide, traffic accidents and homicides (PAHO, 2024).

Strengthening the healthy development of adolescents is crucial if they are to become adults capable of taking care of themselves and the world. Heideggerian ontology emphasizes care (*Sorge*, translated from Latin as cure) as an essential characteristic of human experience, expressing concern for life, the other and the world (Heidegger, 2002a, 2002b).

In this work, *Brainspotting* (BSP) was used to establish this care and treat adolescents with obesity. BSP is a mind-body therapy aimed at reprocessing trauma (Hildebrand; Grand; Stemmler, 2017), which helps regulate anxiety, relieve suffering and cope with emotional difficulties. Among the principles that guide this intervention are neuroscience, the therapist/patient relationship, and the phenomenological stance (Grand, 2013).

Based on concepts of neuroplasticity and neurogenesis, BSP seeks to treat trauma with the self-regulation of the *self* and the resolution of psychophysical symptoms. The relational aspect is crucial to promoting trust through the Dual Attunement Frame - BSP's mode of action - which creates a neurobiological connection between the patient and the therapist (Corrigan; Grand; Raju, 2015), i.e. the success of the therapy depends on trust and attunement between the pair. Finally, the phenomenological stance taken by the



therapist, who waits for the phenomenon to show itself without anticipating it, letting the patient direct their healing process, is fundamental. The patient leads the reprocessing, with an observant and compassionate presence from the therapist who, without interrupting the process, remains ever-present, bringing a sense of care.

In this way, the BSP can facilitate the clinical treatment of adolescents with obesity, helping with the psycho-emotional suffering related to being overweight. As a result, the patient acquires self-awareness and body perception, which are essential for adherence to nutritional and behavioral guidelines. The approach proved effective in regulating subjective and bodily aspects of adolescents, providing comprehensive support that goes beyond traditional talking therapies.

In this epidemiological scenario, the difficulty of treating pediatric obesity raises the need to develop alternative strategies. Multidisciplinary approaches which combine diet, exercise and behavioral therapy are proving to be more effective (Salam *et al.*, 2020). In addition, body-mind therapies based on neuroscience have shown promise. One example is *Eye Movement Desensitization and Reprocessing* (EMDR), which significantly reduces the symptoms of post-traumatic stress disorder (PTSD) - depression, anxiety, and subjective distress - often associated with obesity (Chen *et al.* 2014).

In fact, studies point to a complexity of biological and psychosocial factors involved in weight gain. These include neuroticism, which includes anxiety, depression, impulsivity, anger, and hostility (Slabá *et al.* 2020), especially among adolescents. During this period, the individual undergoes a brain reorganization that affects their synaptic capacity and makes the brain highly receptive to environmental influences on their brain engrams (Herculano-Houzel, 2005). Thus, adolescence is a promising stage for the application of brain reprocessing techniques and for the treatment of diseases that are sensitive to the psycho-emotional state.

In this context, this research aimed to estimate the effects of *Brainspotting* on the anthropometric nutritional status of adolescents with obesity and to investigate the experience of adolescents, with the aim of understanding their perception and care of the body with obesity after the intervention with BSP.



2 Methodology

2.1 Research procedures, sample, and setting

The subjects of this study are adolescents aged 10 to 19 who were part of a randomized clinical trial carried out at the Escola Paulista de Medicina of the Universidade Federal de São Paulo (UNIFESP). Those with a Body Mass Index for Age (BMI/A) z-score greater than 2 (De Onis *et al.* 2007) were considered eligible for obesity. The intervention tested was BSP therapy associated with the standard intervention for the treatment of obesity (medical, nutritional, and psychological support). Participants were randomized and allocated to either the Intervention Group (IG) or the Control Group (CG). The treatment took place from March to July 2022, with six fortnightly meetings lasting approximately 60 to 90 minutes. The BSP approach followed the steps of the original application proposal (Grand, 2013).

After the BSP intervention, the IG (n=9) underwent an individual phenomenological interview. The guiding question was: "How do you perceive your body and how do you take care of it from before treatment until now?".

2.2 Data collection

A blind interviewer was chosen - a psychologist guided by the main researcher who already knew the adolescents as an observer. A pilot interview was carried out, which revealed that small changes were needed. Just like the appointments, the interviews took place in a place suitable for health care, in comfort and confidentiality, and lasted approximately 30 minutes. They were conducted in October 2022, audio-recorded, transcribed verbatim and are available to be audited for five years.

2.3 Ethics

The project was approved by the UNIFESP Research Ethics Committee under No. 3.903.607. The study was registered and approved in the *Brazilian Registry of Clinical Trials* (ReBEC) under number RBR-8c5cjmg. The participants and their guardians signed an informed consent form.



2.4 Phenomenological analysis

The phenomenological method seeks to understand the phenomenon that is shown, understood as the way in which the obese person sees and takes care of themselves, seeking to understand their way of perceiving the experiences of treatment and the way in which they relate to their illness. In this way, a careful look at the transcript of the interviews conducted led to an understanding of what was expressed by the subjects. The highlighted segments in the texts were called Meaning Units (MUs), representing what was meaningful to the researcher and framed by the guiding question. These MUs were then opened to hermeneutic analysis, constituting what is known as hermeneutic grafting (Bicudo, 2011), a movement in which we seek to understand the totality of the text with the support of the literature. It is an articulating movement that moves towards the constitution of Transformed Meaning Units (TMUs), written in a language more appropriate to the field of investigation, without modifying what is said in the text.

The analysis procedures included an Ideographic Analysis, with careful reading of the transcripts, the organization of the content into discursive parts, and the survey of 154 MUs that were converted into 263 Transformed Meaning Units (TMUs), through a hermeneutic study, according to the examples shown in Chart 1.

Chart 1: Example of the ideographic analysis movement

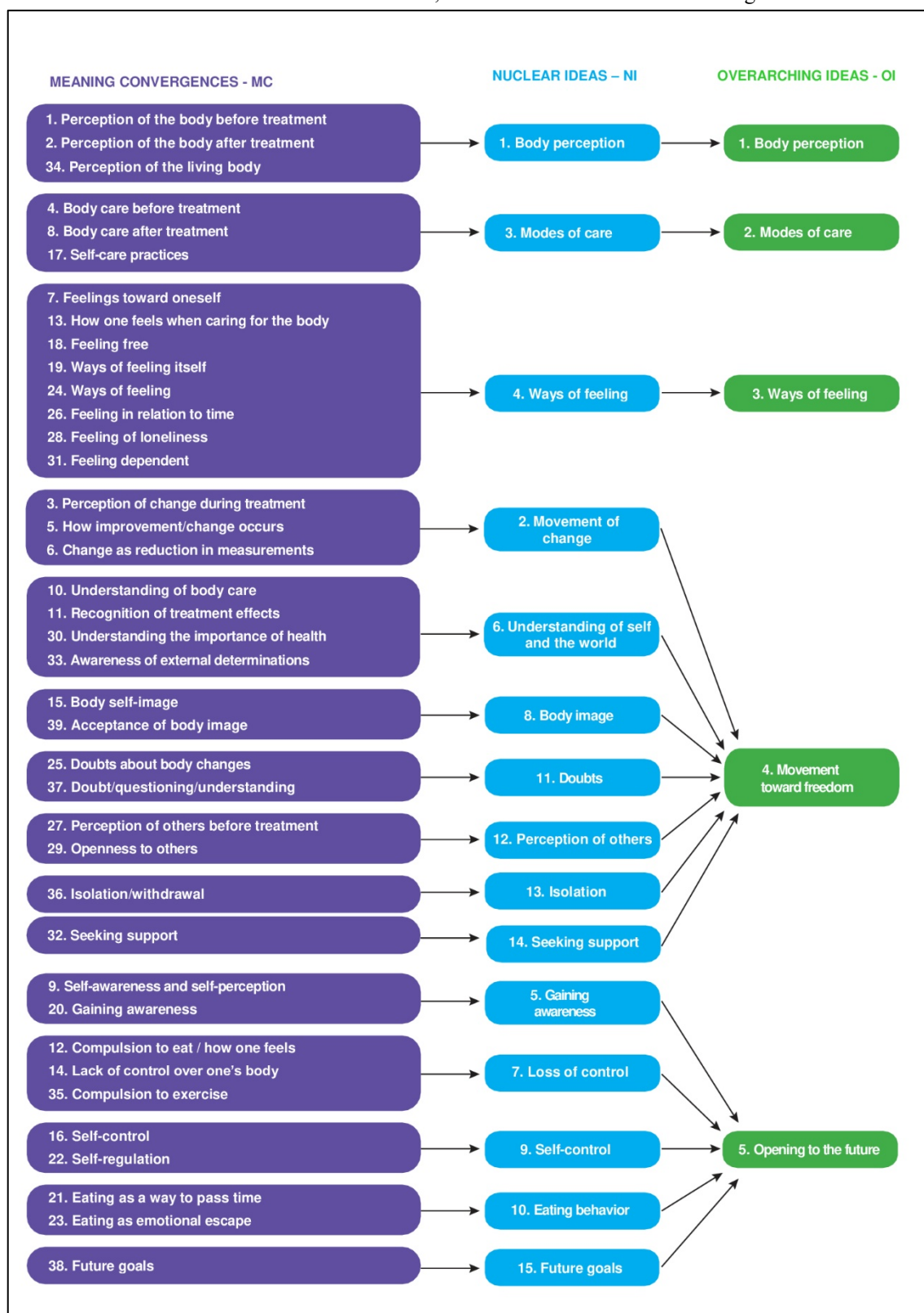
MUs	Hermeneutic Graft	WHAT IT SAYS
<p>MU1ADO4</p> <p>Well, I feel <i>better</i>. I've lost about seven kilos this year alone, it's going well.</p>	<p>Improve: 1. make better. 2. make prosperity. 3. to make improvements in. 4. to restore health to; to reduce illness in.</p> <p>"<i>melhora</i>" (improvement), in <i>Dicionário Priberam da Língua Portuguesa</i>, 2008-2021, https://dicionario.priberam.org/melhora [consulted 11-02-2023].</p>	<p>TMU1ADO4</p> <p>The subject sees him/herself in a definite temporal movement with the prospect of improvement, has lost weight, quantifies this objectively and clearly evaluates this change positively.</p>
<p>MU1ADO9</p> <p><i>My body is like this:</i> first I like to think that I've lost weight, something I couldn't do. I'm more relaxed, something that used to be very difficult for me. I've been observing myself less nervously, so there are fewer signs of nervousness, sweating, breathing, palpitations, and even this extra compulsion for food.</p>	<p>My body is like this: Merleau-Ponty (1999) contradicts the idea of a body understood as a thing in the world that is made up of the sum of physical-chemical processes linked by causal relationships, shedding light on the concept of an existential body.</p> <p><i>I like to think that I've lost weight, I couldn't. I'm more relaxed, which used to be very difficult:</i> relaxed, rested, carefree, tranquil, relaxed, calm, meek, willing. https://www.sinonimos.com.br/relaxada/</p> <p><i>I've been observing myself, fewer signs of nervousness, sweating, breathing, palpitations. Even this extra compulsion for food:</i> Clinically speaking, it's the kind of behavior that the subject is driven to perform by an internal imposition. A thought (obsession), an action, a defensive operation, even a complex sequence of behaviors, are qualified as compulsive when their non-realization is felt to lead to an increase in anguish. http://newpsi.bvpspsi.org.br/uploads/lista_terminologia_alfa_BVS_13032014.pdf</p>	<p>TMU1ADO9</p> <p>The subject talks about his body, not just in terms of its physical-chemical aspects, but as an existential body. He is happy to recognize that he has lost weight, which he could not do before the treatment.</p> <p>TMU2ADO9</p> <p>The subject feels more relaxed, something that was not easy before. They notice their symptoms of nervousness diminishing.</p> <p>TMU3ADO9</p> <p>The obsession with food has diminished.</p>

MU: Meaning Unit; TMU: Transformed Meaning Unit; ADO: Adolescent.

Source: Authors.

In the movement of phenomenological reductions, the TMUs were articulated through a movement of thinking, bringing together ideas that indicate the same meanings, resulting in 39 Meaning Convergences (MCs). These MCs form nuclei of ideas coming from the intertwined MUs, after being named by the TMUs with broader expressions, but always carrying indications from the texts of all the interviews. The converging ideas were transformed, through successive articulations of thought, into 15 Nuclear Ideas (NI), organizing the meanings that converged on the same theme. This movement is called Nomothetic Analysis (Figure 1). In this way, we arrived at five Overarching Ideas (OI), which are the great convergences of articulated meanings.

Figure 1: Data analysis movement - Nomothetic Analysis: First reductions to Meaning Convergences, second reductions to Nuclear Ideas, and third reductions to Overarching Ideas



Source: The authors.

The OIs were interpreted as excerpts from the transcript and references to authors that are interwoven in the study. After interpreting the OIs, a comprehensive synthesis or



metacomprehension followed to delve deeper into what was revealed, providing new insights into the phenomenon of adolescent obesity.

3 Results and Discussion

The interpretation of the MUs expresses the ways in which adolescents perceive themselves as obese and contextualizes their specificities. Assuming that the living body is a bio-psychic-spiritual totality, this investigation leads to the understanding that obesity and weight loss occur in this body in which life flows in a *continuum*. Becoming aware of oneself as a biological body that is overweight and losing that weight occurs through feeling good or not, being accepted or not, and dealing with oneself.

The respective interpretations and successive phenomenological reductions will be presented in five OIs: perception of the body, modes of care, modes of feeling, movement towards freedom and openness to the future.

3.1 Perception of the body

The perception of the body, as we understand it in the subjects' expressions, tells us about the ways in which they perceived themselves throughout the treatment and how they saw themselves in this temporality, delineated as before and after the interventions with the BSP.

The concept of the living body - a body that lives and feels itself living - will be expressed in this work by the word *Leib*, which brings the organization of the enthelechia soul and "[...] reveals itself as an organizing nucleus of the corporeal dimensions - of the *Körper* - psychic, affective and spiritual" (Silva, 2017, p. 27).

When reflecting on the perception of the lived body in this temporality, the adolescents mostly identified very negative aspects of the body, feelings and experiences, as one of the participants said: "*For me, it's not as despicable as I thought (MUI2ADO2)*".

The teenagers expressed a lot of shame about their bodies and shyness when positioning themselves in the world, with a certain embarrassment in dealing with their own bodies, trying to hide them, often because they considered them to be wrong. They perceived, yet, their bodies through the discomfort they felt through pain, depression, anxiety, symptoms, and difficulties. Based on *MUIIADO6*, we understand that the teenagers were very concerned about their body shape and the negative looks and comments from others:



[...] when I started seeing Doctor D., I felt horrible. It was so hot, and I was wearing a thick sweater even though it didn't make sense. The girls kept staring - at my butt, my belly, my arms, my stretch marks. It destroyed me. Right there, in the middle of it all, I just broke.

As they talked about the shape of the body in its concreteness, they brought up a body that was heavy, slow and difficult to manage: *"Before, I felt much more tired. Before my body was..., I felt it was much heavier... (MU1ADO7)".*

When talking about self-perception before treatment, the adolescents realized what their relationship was with food intake and exercise or physical activity. In general, they were aware of the appropriate recommendations, but did not follow them: *"Before treatment, they said I had to lose weight, I didn't care as much as I do now (MU3ADO5)".*

When asked about the aftermath of the treatment, all but one of the adolescents showed a good understanding of the possibilities they had because of the process, seeing the outcome as good and positive. In describing what seemed good to them, they mentioned having a lighter body; waking up better; being able to walk naturally; not having anything to hold them back; increasing their respiratory capacity through aerobic activity; increasing their mood; being uninhibited, relaxed, able to talk to people and socialize; calming down; reducing anxiety, adrenaline, hormone discharge and balance. In this sense, we quote MU8ADO9: *"So, I'm really relaxed. It's a peaceful feeling. I feel more relaxed, calmer"*. In addition to the change in the negative perception of bodily aspects, it is important to emphasize the different way in which the adolescents begin to relate to themselves, to others, and to the world after the treatment.

Heidegger (1981) argues that being-in-the-world-with takes place in three instances: in one's own world (*eigenwelt*), in the shared world (*mitwelt*) and in the surrounding world (*unwelt*). In their own world, in an encounter with themselves and after the clearing that opened during treatment, the adolescents realized that they were their own embodied body. In an expansion of self-perception, they came to better accept the ways in which the body is, as exemplified in MU12ADO2: *"It's a body. For me, it's something that's part of me, so I'm going to love it the way I love myself"*.

In the shared world, the adolescents went from an uncomfortable affective disposition when relating to others to a more authentic way of *being-with*, taking possession of their own body as an embodied subject. This is how they refer to this feeling, like MU13ADO5: *"Now I don't mind exposing myself so much, like wearing a jacket... But I'm not that bothered by other people's opinions"*.



In the world around them, they showed a change in attitude towards things, especially physical activity, and food. They reported improvements in their perception of the meanings of quantity and quality, understanding what is possible and necessary. There was a broadening of the phenomenal field, as we read in MU7ADO8: *"I think I'm eating more fruit now. Like, I've been taking it to school instead of cookies and stuff like that"...*

Only one participant noticed that his body had become worse, unwell and unwell: *"It's worse. Until now... before it had gotten better and then it got worse (MU1ADO3)"*.

To conclude this topic, it is important to say that the teenagers were referring to the living body, in other words, they were not just talking about the physical-chemical aspects, but about the body in operation, existing. Contrary to the idea of a body as a thing among things in the world, the result of the sum of physical-chemical processes linked by causal relationships, Merleau-Ponty (1999) sheds light on the concept of an existential body. The improvements pointed out by the participants speak of a body-in-itself in transformation, an embodied body more in tune with the temporality of the world of things, freer. They speak of a body in movement and expansion, expanding the phenomenal field of existence, in line with world events.

3.2 Ways of caring

Caring for the body, as we understand it in the expressions of the significant subjects, is a process in progress and ways of caring for oneself. Most of the participants revealed their perception of the inadequate and lax way of looking after their bodies and themselves, in a state of disarray, before treatment. They did not take care of their bodies; they were not interested because it was too complicated. Caring required a lot of effort to achieve goals, even if they were the same ones they had set themselves. They felt a lack of support, which made it difficult to lose weight. They described a negative and disturbed way of looking after their bodies, as well as closing themselves off as a strategic way of dodging the world and protecting themselves, such as: *"Before, I barely took care of anything. I didn't feel like I could take care of myself. It was something I just couldn't manage... it was really difficult for me. (MU5ADO7)"*.

Not taking care of one's body indicates a careless way of dealing with oneself and the world, as well as in relation to food. The teenagers had a disturbed way of eating: they ate junk food and sat or lay down, inert in front of the television. They reported eating automatically and too much, swallowing everything they found along the way. They had

great difficulty with routine habits, such as eating their first meal of the day. They fasted indiscriminately. They ate poorly and a lot, then exercised repetitively (compulsively) to make the calories disappear. To avoid guilt, they ate in secret. This is evidenced by MU5ADO6: *"Before, I used to eat for the sake of eating, everything I saw in front of me I would eat ..."*

This disordered way of eating says something about people today: desperate, compulsive, and guilty. It speaks of a restriction of freedom and inert prostration in front of oneself. The adolescents were faced with an impossibility, even though they were aware of what they had to do, as they had adequate nutritional guidance from the Obesity Outpatient Clinic team.

Another point revealed was the way of looking after the body based on instant needs or aesthetic standards, in which values such as beauty and sensuality appear, with the importance of appearance being compared to a standard, bringing a feeling of incompleteness, as we can see in MU8ADO8: *"It's just that I think that before I cared more about aesthetics"*.

After treatment, the adolescents were able to take better care of themselves, with frequent reports of dedication to their bodies and a feeling of self-worth, such as: *"but now I have a bit more self-respect and I can take care of myself. I think a moisturizer, something that... being on a diet, eating foods that make my skin feel better and I didn't do that before (MU9ADO2)"*.

Among the main areas of care, awareness of how to improve their diet was highlighted, and the participants reported that they no longer ate so much junk food. They began to eat healthier foods even if they did not enjoy them very much, trying to increase their portions and reduce their consumption of junk food, eating when they felt hungry and no longer satisfying other needs. Little by little, they realized what healthy eating means: *"I've cut out more junk food. It's not that I eat the healthiest things, because I don't eat them. Like beans, which I don't like, but I do eat them (MU10ADO5)"*.

There was also a change of attitude in the increase in physical activity, which speaks of a body that has taken on movement. The adolescents reported moving more, both at school and at home, with some taking up new sports and others including activities such as walking and cycling. In general, they became more active and, with the effort they made, they noticed that they gained vigor. In this sense, we quote MU21ADO7:

I think that the more you exercise, the more you adapt your body to exercise more, it gets stronger and stronger. So, the more I walked, the more I realized that I had more

breath to walk. So, the further I went, the more I realized that I could go further, so it was a very good thing for me.

They also reported taking specific care of themselves, such as drinking more water, looking after their skin, and doing things (artistic, physical, and intellectual) to feel less stressed, like MU4ADO8:

Nowadays I listen to a lot more music than I used to, I also play soccer, it de-stresses me, sometimes it stresses me too, but it de-stresses me (laughs). Anything that comes up, like, 'Oh, let's go hiking that day? Let's go!' It's a way to de-stress. Often drawing, I've started reading as well, or sometimes something more about not having to move my body too much, like watching a series or something. But I'm always doing something different.

One participant, however, continued not to take care of his own body, perceiving himself in a complication, entangled in something difficult to solve. He reported that he felt weak, tired, and unwell because of the shape of his body, with no action to change it. From his point of view, he remained in inertia: *"It's bad. Very bad. I feel tired. The shape of my body makes me feel bad. And... it's... there's not much to do (MU8ADO3)"*. It should be noted, however, that his perception does not reflect the objective data, which showed a reduction in BMI/A.

Generally, the transformation described by the adolescents refers to the perception of the lived body in movement, expanding in the spatial dimension and taking in the world. They took a stand for themselves. Caring for the lived body through intimacy and closeness to each part, valuing oneself as a presence in the world, speaks of the pre-occupied way of caring for existence, which is a way of healing.

3.3 Ways of feeling

Within this horizon of understanding, it was possible to capture the various ways in which adolescents felt about obesity, themselves, the world, others, and their own bodies. They talked about the feeling of being free or dependent, the loneliness that accompanies them and how they felt during and after treatment.

Most of them were able to notice a transformation in their sense of self. We observed a change in self-perception: they began to perceive themselves with greater self-esteem, and appreciation for themselves. They began to see themselves as better people. This is a clipping that shows this interpretation: *"I'm happy. I feel proud... because I see that there has been an evolution. When I arrived here at the clinic, I was a different person than I am now (MU16ADO9)"*.

The lived body, understood here as their living body updated in everyday life, no longer caused sadness or anguish. The adolescents showed acceptance of *Leib* in the lifeworld. They began to look after their bodies in their own way, getting on with life and loving themselves. There was an encounter with themselves when they discovered their own body as their own. They felt full and in tune with a sense of peace, as *MU6ADO2* said: *"I've been trying to love myself a lot at the moment"*. As a result, they were happier, more self-confident and satisfied with their existence, since they were experiencing a comfortable way of existing, with well-being.

However, they understood that it was an arduous and tiring process of being towards becoming a person. This is the movement of how self-awareness comes about, as the subject becomes aware of themselves and their ways of dealing with themselves and the world. Some reports described the heavy weight of the physical and emotional body as a burden, such as *MU8ADO3*:

I: When you say 'your body is worse', do you mean in terms of the physical or in terms of what you feel emotionally?
ADO: Both. My weight is high too. I don't know how much I weigh. But it's high and I don't like my shape either.

One participant, however, continued to feel aversive, hating himself. He said: *"Unfortunately I don't like my body. I see myself as bigger than I am. I don't like it, I hate myself, I can't like myself at all (MU18ADO3)"*.

Before treatment, adolescents felt immobilized in the face of life's situations. They were passive, with little action, unable to leave the house, afraid of social interactions and feeling incapable, experiencing an impossibility of being active players in the world of life, as we can see in *MU13ADO7*: *"It helped a lot. Before, I couldn't leave home for anything. I think last year, at the beginning of the year, I couldn't leave home to go to the market, it was a social phobia, it was something that was hurting me at school."*

After the treatment, they realized where they had been before, when they found it difficult to open themselves to others, and began to see the losses due to their isolation. As they accepted themselves and became more emotionally available, everyday tasks became easier, and they were able to do things more easily than before. This process expanded their possibilities for action, overcoming their existential isolation. They changed the way they saw themselves and the world.

However, there were still some reports about feeling ugly and anxious about being obese, with challenges to face, such as: *"I don't see myself as pretty, you know? I don't feel beautiful being fat. I would feel more beautiful if I were thin (MU13ADO6)"*.



After the treatment, as well as being lighter in physical weight, the subjects felt relieved, unimpressed, and serene. With an affective tone of well-being, in harmony with themselves and the world, they marked the change as a process that was happening at their own pace. It was a movement of transformation and openness felt in the temporality of their own bodies. According to *MU14ADO7*: " *Because of this treatment, I started going to school more regularly. Especially now, taking things at my own pace, everything has been going well*". Regarding the way they feel about the enjoyment of time, the adolescents realize that it is not so complicated to go on with their own bodies, without rushing. They were able to focus more, breathe, live in the present and not anticipate the future, perceiving the fluidity of time with a new sense of life. Being able to breathe in one's own time speaks to the cadence of temporality. Time is a primary and vital experience that cannot be exhausted by knowledge, feelings or will. It exists in two forms: as "time assimilated to space" and as "quality time or lived time" (Costa and Medeiros, 2009).

Specific feelings include loneliness, dependence, and restlessness. According to Heidegger (1981), "the world is always something that I share with others. The being-in-itself of *Dasein* (being-there) is being-with" (p. 35). Being apart, in the isolation of solitude, is an existential way of being-with - "an indifferent and careless lingering alongside everything and nothing" (p. 37). In the adolescents' accounts, there is a solitary existence, without encounters; and some closed themselves off and moved away to protect themselves from the difficulties of obesity, like *MU20ADO9*: "*It was like staying in my room all day under the blanket, not talking to anyone*".

Dependence was presented in a hasty manner as the need to have someone they knew by their side because of the insecurities brought on by obesity, such as the lack of support and the need for parental protection. A systematic review that investigated the association between parent-child relationships and obesogenic risk suggests that several aspects are important in understanding eating attitudes and behaviors, including the emotional bond felt between them, the child's perception of how much their parents care about them and the mother's sensitivity towards her child. The study concludes that family structure plays an important role in the genesis of obesity (Blewitt *et al.*, 2016).

Addiction was also present in the virtual world, since the adolescents expressed a desire to be like the people they saw on social networks, despite many knowing that it is an illusion to want something from the other person's appearance. In this sense, we quote *MU20ADO8*:



[...] *the internet has an influence on this, you see people on the internet and then you see people at school who are similar to those on the internet, who you think are people you want to achieve or be like. I think this is why I became insecure.*

In addition, in some way the teenagers were able to become aware of the insecurities generated by the outside world, such as the influence suffered through the *internet*.

Feelings like this express a way of being-for-the-other in inauthenticity or impropriety. By comparing themselves to others, adolescents understand themselves from the perspective of what is missing, taking the body of others as their measure. Caring for the body in this way reveals a disturbance that blocks their being-with-others, as Heidegger (1981) teaches. This way of being has the character of detachment, because the subject is in submission. Their daily possibilities as *Dasein* are arranged by the will of undefined others and not by a specific person. Thus, anyone can be a representative of this undefined mass. This indiscernible domination takes on the burden of being-with for the being-there, intensifying its power. This nameless mass is "all of us" and at the same time "nobody", configuring an "us" that prescribes a way of being in everyday life (Heidegger, 1981, p. 49).

The feeling of restlessness came through in reports of ways of seeking rest and not being able to sleep. The subjects reported that they could not rest, could not stop, could not do anything, could not give in to sleep. They realized that this was affecting them. This is evidenced by *MUI9ADO7*: *"From the moment I'm very overweight, it ends up affecting my whole body, right? It affects my sleep a lot. So, with the weight loss I ended up eliminating a lot more things that affected me"*.

As the treatment progressed, the subjects became freer. They spoke of the freedom of their own bodies, even from the gaze of others, to be in the world in a more authentic way, with ownership of their being. They were no longer so worried about showing and exposing their bodies or parts of them and felt freer to wear the clothes they wanted. With more strength and energy, they became the authors of their own existence, they became authentic. Concerns about appearance gave way to pleasurable activities, such as going out with friends and having fun. This is what *MUI2ADO6* says:

Now the change is that I just wear what I want. If I want to look, I look. If I want to talk, I talk, you know? Yesterday, I was going to school and it was sunny, but I was wearing a heavy sweater. Then I thought, 'No, are people going to stare? Well, then let me stare back.' So, I went without the sweater. That's what's changing.

The change refers to the existential freedom that has also been constituted in the way of being with others. The teenagers were no longer so bothered by the way others

thought or spoke about them, unlike before the treatment, when the other person's gaze bothered them. The gaze and speech of others no longer deprived the subject of feeling free, revealing a movement from inauthentic to authentic living. Self-understanding took place in the expansion of care to being-with-the-other. This is because knowing oneself is based on being-with, which acts in knowing-with, together with others. According to Heidegger (1981), "caring is understood at the level of what we are caring for with our understanding of it. Thus, the other is immediately unveiled in caring solicitude" (p. 44). This statement is made explicit in the speech of subject 8 - MU15ADO8: *"I think I stopped caring too much. What other people thought I should or shouldn't do or how I should look"*.

The imposing determination stemming from the empty opinion of "everyone... no one..." was also felt in relation to the health standards exposed in the results of clinical examinations. The teenagers did not want to be held hostage by the issue of health, they did not want their daily actions to be directed solely by this, as MU18ADO7 put it: *"It feels like I'm not really in control—not irresponsible, but more like trapped in always having to take care of my health. I'm constantly thinking, 'Oh, I can't ride a crowded bus because I know I'll get sick from anemia'"*.

The freedom experienced speaks of an openness, a possibility of foreseeing (glimpsing) possible spaces and times. It reveals a widening of the phenomenal field in the spatial dimension of being and shows a way of being-in-the-world in authenticity, that adolescents become available to intersubjective encounters, allowing themselves to be-with-them and not holding back or preventing themselves from being in the movement of happening together with others. The world expanded in a movement of realization, they now affirmed themselves in their positive points, they began to do what they wanted, walking and expressing themselves daily with the power they found in their lived body, exercising their freedom to be. As an example, we quote MU22ADO9: *"So, these are my highs. It's just that now I can walk, I can talk normally, I can be more me. I can do what I want"*.

3.4 Movement towards freedom

Within this horizon of meanings, to understand how the movement of change occurred with the BSP intervention and how the improvement occurred, to explain whether there was a reduction in measures, we focused on the subjects' understanding of

themselves, the world and health. Their reports showed certainties but also doubts and questions. The adolescents who received support moved from a position of closure and isolation to a reconstruction of their self-image, thus changing their perception of themselves and others.

The adolescents were realistic when describing the changes during treatment. They perceived their own development and pointed to improvements. However, some felt that the effect of the intervention was like a back-and-forth, since they had a greater commitment during the treatment, which then moderated, with a certain decline. They perceived their moods as fluctuating, tending to be more negative before the treatment and more balanced afterwards. Despite perceiving themselves as undergoing a transformation, some felt it was necessary to go slowly because of the strength of heredity, marking individual differences. For example: *"It's a process, right, so... like this... Sometimes you don't feel like doing anything and then you say: 'Oh, I'm going to eat'. But I think it's improved a lot since the appointments. I think it's improved a lot (MU5ADO8)".* And even though they were moving from a state of closure and inactivity to one of greater willingness, they still experienced moments of discouragement when it came to deciding what to eat. Only one participant said that his general condition had worsened: *"It seems like it was a 'rebound effect', you know, since it ended and everything came back at once (MU6ADO3)".*

The participants improved in a variety of ways: directly, by trying to lose weight and better adhering to the nutritional advice given at the clinic; by moving around more with home activities or other activities such as dancing, for example; by perceiving their bodies as more functional and mobile; by better understanding the aspects of obesity and weight loss; by changing their psycho-emotional aspects. According to one of the teenagers: *"I think it's more functional. I can handle more climbs or anything that I want to do, which I couldn't do before (MU2ADO2)".*

However, in some of the reflective moments of the interviews, when they saw themselves in the movement of the treatment, *before* and *after*, there were reports that there had been little change, identifying states of worsening with binge eating or because not much had changed in the way the subject perceived themselves. This reveals doubts and questions typical of adolescence, such as MU2ADO3: *"My binge eating has come back very strongly and then it's worse"* and MU10ADO6: *"I: How have you seen yourself?; ADO: So, it hasn't changed much (chuckles). But, like, I've changed a bit".*



Weight loss, despite appearing in some reports, was not the main change mentioned, as in the case of subject 7: *"I don't remember my weight when I started this treatment, but when... I think it was last week, when I checked it, I was one hundred and six (106) and before, last year, I was almost one hundred and twenty-five (125) (MU16ADO7)".* Among the participants, three referred to weight loss in an objective way, relating it to the loss of measurements. They perceived themselves as losing weight, feeling good and happy, reviewing how they were compared to how they were. The reduction in measurements was in line with what they were looking for and the goals they were aiming for, as MU3ADO8 pointed out: *"I think what I noticed most was the weight loss"* and MU4ADO2: *"I think it has mainly reduced measurements more than before when it took a long time to reduce"*.

In the course of the changes that have taken place, the comprehension of existential meaning or isolation, which they understood as protection from some evil or danger, has given way to openness to others, to seeking support from family, colleagues or health professionals, as MU18ADO8 said: *"Then, like, sometimes I take inspiration from my sister, who likes to go out a lot, she doesn't care what other people think. So, she has a lot of fun"*.

In this trajectory of changes, there was also a modification in the perception of body self-image, which was very negative and was transformed into self-acceptance. With the treatment, the subjects were able to come to terms with their own image and were happy that they had overcome it. In this sense, we highlight MU27ADO9:

I can see myself in the mirror. So, it was something automatic, without thinking, and I didn't even realize that I was already looking at myself in the mirror. I couldn't look at myself in the street, in the mirror, or in my reflection. I felt very ashamed, and that was something that changed.

Self-acceptance enabled the acceptance of others. They were able to expand by expressing their thoughts and feelings. They understood that they can rely on themselves, but they can also look to their friends and parents for support. There was an opening up to *com-viver* (living with) because they felt lighter and more uninhibited around people. Before the treatment they had difficulties with self-confidence and trusting others, which caused obstacles in socializing, as MU9ADO7 said: *"I felt I couldn't count on people, but I think the main thing is that I felt I couldn't count on myself"*.

More than just a positive assessment, the set of changes refers to: the perception of oneself as one's own body in action; becoming aware of oneself and changing one's attitude towards oneself and others, as a horizon opening up to self-care, transforming

body and thought; the existential movement towards self-consciousness; the possibility of presenting oneself to the world and others as the subject of oneself, without hiding or denying oneself, which reveals a change in affective disposition, a new understanding given by action as a confrontation with the world. This *Leib* in movement, in expansion, broadening the phenomenal field of existence, in line with worldly events, opens up the possibility of well-being.

About understanding how to care for their own bodies, the teenagers realized the need to exercise with a view to health and well-being. They also realized that some changes in the quantity and/or quality of food and eating habits made a difference to their bodies. They were thus able to take a little more responsibility for the guidelines for healthy living. In this sense, we transcribe *MU8ADO6*:

I've been doing a lot of dancing because I find walking very boring. So, dancing is something I love, I love it. I sweat and the doctor said it's good to sweat. So, I think dancing and my diet are making a difference to my body.

However, a significant qualitative leap towards their own autonomy and the perception of themselves as the guiding center of their lives was made by understanding that taking care of their own bodies is, at the same time, taking care of their emotions, feelings, and the way they see themselves in the world. They realized, for example, that they could channel their negative emotions into other things, such as physical and leisure activities, eating only when they were hungry and no longer to make up for their needs. As *MU12ADO9* tells us: "*I don't eat because it's something, let's say, 'compensatory'. It's just because if I'm hungry I eat, if I'm not...*"

A very important aspect was the understanding of the importance of health. With reports of improvements in clinical indicators, the adolescents were happy with the positive test results, as shown by subject 8:

Because, after I saw the test results, it's much nicer than realizing: 'Oh, I've lost weight in this part of my body' or 'I've increased this part of my body'. I was much more relieved to see the result. "Oh, my cholesterol is down", "My iron is up" (MU10ADO8).

They became aware that changes in the body's appearance, such as weight or aesthetic aspects, are no more important than changes in health. They understood that what is important is physical and mental well-being.

In the search for self-understanding, doubts, and questions about becoming also arose. One of the participants, while reflecting on the idea of losing weight, questioned how her body might look with loose skin and whether staying overweight might actually be preferable to being thin under such condition. Another participant understood her



obesity as a need to have a suit of armor and, when she reframed it, she no longer found logic or purpose in this way of understanding it.

The understandings, doubts, questions, and changes made during this movement of self-perception point to awareness and action. There has been a change of outlook, understanding health and perceiving the lived body beyond appearance, more integrated. The changes reflect an awareness of self that transcends what is immediately given, as a power-to-be, wanting to be, full of possibilities. Heidegger (1981) tells us that "the 'care' of food and clothing and the nourishment of a sick body are forms of 'solicitude'" (p. 40), which can take the form of indifference and negligence or of "anticipating" its existential possibility of being, as authentic care. We understand that this was the path taken by the adolescents.

About the effects of the intervention with BSP, one participant had his expectations dashed in relation to losing weight, although he reported that the therapeutic intervention had helped him lose a little weight and control his compulsion, although he had hoped for something greater. In his words: *"I think Brainspotting must have helped a little. A little weight loss. A little bit. But it wasn't that big. But it did help a little, to control it (MU3ADO3)"*. In general, all the other participants in the survey considered the effects of the treatment to be positive, and four teenagers spoke directly about these effects.

The treatment highlighted things that they had not realized, and they noticed a huge change in the way they think and see the world. They found support in the treatment, and this was very significant for them to change their perception of themselves, favoring action in search of improvement. Individually, some learned not to focus on the negative aspects of life and to look for other strategies, such as *hobbies*, to avoid unhealthy behaviors; others learned to avoid and/or get rid of conflicts; others learned not to stop their daily lives because of intrusive thoughts or negative feelings. Some learned to self-regulate with the techniques applied during the BSP treatment, and one participant understood that these new learnings can work permanently. The reports show these effects:

That I thought the study was really cool. A lot of people will like it. I told my mother about it and she said she was interested in doing it. So, it's going to be really cool. I liked it a lot. They taught me some techniques for not thinking only about life's problems, only in a bad way, so I really liked it. (MU23ADO8).

It really is a technique that has changed. Obviously, it's not that much, but it was a huge help, everything was paralyzing for me, and this technique with D. really changed the way I think and the way I see situations, and also how I escape from them. (MU10ADO9).

3.5 Openness to the future

In this section, we will present aspects relating to the openness that occurred through the temporality experienced throughout the treatment. The act of eating was understood in a different way and with greater self-perception, and the reports showed that uncontrolled ways of relating to food were being replaced by the possibility of controlling themselves. Self-regulation helped them re-signify the past, establish themselves in the present and inaugurate a future, being able to envision a different existence with more freedom.

We understand that before treatment, the way they dealt with food was upsetting. The adolescents described a way of eating that was at odds with their hunger or physiological needs. Many were not even able to organize themselves around a routine according to the nutritional advice they had received. In addition, they reported eating as an escape from their emotions or to occupy their time, such as MU5ADO6: *"When I was anxious, I ate more, I ate way too much. Because anxiety... there are always different kinds of anxiety, but in my case, it seems that eating is my hiding place when I'm anxious. And I ate way too much"*.

Many described the power of binge eating as something difficult to bear, with great power and control over the individual, generating suffering. They perceived themselves as dependents on food, as MU4ADO3 said:

It's... there's a huge addiction to food. A whole lot of sweets. And then I eat a lot of junk food, a lot of sweets. And then I see a sweet and I don't want to not eat it, because I'm working in a market. There's lots of sweets there, lots of junk food. And then I keep eating and eating, I can't stop. Then it gets complicated.

Compulsion was perceived by the adolescents through repetition and overeating, unruly, inordinate, which can be seen as a symptom of anxiety due to obsessive or intrusive thoughts.

We can see from MU15ADO3's words: *"At the same time that I feel good eating, I fall apart afterwards, you know?"* that, although they felt good eating sweets to relieve their anguish, after eating they were dejected and disconcerted. Some even vomited, denoting disgust. This compulsive way of eating reveals the complication of dealing with a body, taken in its physicality, which is foreign to themselves and which they cannot control. It is a struggle between will and power, a body that sees the sweet and does not obey the will (not to eat), an uncontrolled body that cannot stop. It is a disturbing and unhealthy way of being-with-food. This impossibility of autonomy and of taking control

of one's own life is reflected in a person who thinks they are going to stop eating, but cannot. Compulsion is evidenced by the restriction of freedom and repetition, and it speaks of the body as something foreign and not of the lived body. For some, the feeling of lack of control extended to other issues such as sleep and physical activity. Even though they knew what was necessary for a healthy life, such as exercising and eating properly, it seemed thorny to them, as if the body, separated from their will, did not obey. This compulsion was so intense that for one teenager it extended to a compulsion to exercise: *"It was like staying in my room all day under the blanket, not talking to anyone. Eating in secret. Doing the exercises over and over again (MU20ADO9)"*.

Over the course of the treatment, the adolescents became more aware of themselves and the world. By improving their self-perception, there was an increase in body self-perception with a desire to transform their own bodies. They realized that they had the strength to change when they realized that they were their own embodied body, now feeling the *Leib* as their own. This encounter with themselves opened them up to the future. Dealing with the lived body in temporality revealed it as the origin and history of life, a place of transience and the possibility of being. The adolescents perceived themselves as more capable, inaugurating power-to-be. There was a transformation in their perception of themselves by changing the way they saw themselves and the world, in the movement of self-understanding and self-acceptance, in other words, of being themselves. In this sense, *MUIADO5* said: *"I'm more aware of the things that can be bad and the things that bothered me before treatment and now I can define what they are"*.

Only one subject seems not to have evolved in the same direction, despite having lost weight after treatment: *"Then I always think 'Oh, I'm going to stop eating', and I don't stop eating. I can't stop eating. It's complicated (MU17ADO3)"*.

Some teenagers pointed out the potential of the BSP to help them make this change, allowing them to self-regulate, calm down, reduce anxiety, lower adrenaline and hormone discharge. One subject in particular mentioned neuroplasticity, which is the brain's ability to adapt to new situations, relearn or reprogram past experiences, such as traumas and injuries. This ability is present in nerve cells, and, in general terms, neuroplasticity is related to the brain's ability to undergo morphological and neurochemical changes as a result of experience (Weyandt *et al.*, 2020). The reports nucleate the main ideas of this work and the objectives of the therapeutic intervention with BSP, indicating that there was learning towards self-regulation, which could lead to self-healing. In this sense, we highlight *MU7ADO9*:

It was challenging. But then, with D. and also college and, like I was saying to her, a 'neuroplastin' was forming in my head, and then I started to adapt, I started to relearn and I started to see that my current situations wouldn't necessarily be the same as the ones I'd experienced in the past.

The subjects acquired new strategies for coping with their problems, taking control of themselves and their own bodies. The possibility of self-control and self-regulation are modes of self-care, revealed by the *care* felt in the therapeutic relationship as concern for the other with a view to freedom so that essential possibilities can be realized as healing (Bicudo, 2011), which means taking care of being, caring for existence, caring for the spirit as loving kindness. This can be seen in the words of MU5ADO4:

Now I realize, for my own health, that I have to take care of myself more. Now I'm doing it for myself[...] I've started taking more courses, let's say I have less time, but whenever I have some time I try to make an effort to do more exercise, dancing, something like that.

Achieving balance enabled the teenagers to envision goals for the future, not only in relation to the transformation of the lived body, but also in relation to existence beyond themselves, because, by perceiving themselves differently, the internal experience transformed and expanded the world, making them free.

For Merleau-Ponty (1999), perception is the primacy of knowledge; it brings the first reality; and the perceived world is the foundation, as it is the experience of perception. Understood in this way, perception contains a paradox, since the thing perceived only exists to the extent that someone can perceive it. This leads us to think that the appearance of something requires the absence of that same something (the visible requires the invisible). Thus, perception offers truths as *presences*. Presence is the moment when things, truths and values show themselves. It is the moment when *logos* is born (Bicudo, 1997), or as Merleau-Ponty (1999) says, perception is a *logos* in its nascent state. This is what happened to the teenagers who, after experiencing the treatment, were able to develop a new meaning for living the embodied body.

According to Heidegger (1981),

When being-there discovers the world in its own way (eigens) and approaches it, when it unveils to itself its own authentic being, this discovery of the 'world' and this unveiling of being-there are consummated as an untangling of concealments and obscurities, as a breaking through of disguises with which being-there obstructs its own way (p. 54).

4 Conclusion

The changes that took place after the intervention with BSP, as evidenced by the adolescents in the interviews - a new perception of self and taking care of obesity - speak of the lived body that experienced sensations throughout the treatment and perceived itself in action in the lifeworld with its cosubjects and other entities. The experiences took place in the temporality of the course of this study. Even though their duration was delimited by before and after treatment, these experiences were able to slip into the past and bring the future into the now. Many experiences could be relieved through memories and intertwined with the experiences of the present in the flow of consciousness, constituting a person's style of being in its new configuration of meaning, perceiving the lived body with obesity in another way. This new meaning makes the adolescent a person with an axis that, although dynamic and flexible, remains with its individual qualities, unique in its personalities. However, this change was not a decision made solely on a rational and intellectual level by the patient, but something that occurred in the carnality of the living body, which is understood, within the framework of Husserlian phenomenology, as a bio-psychic-spiritual totality.

In addition to the personal issue, this possible effect of BSP in the treatment of adolescents with obesity is consistent with meta-analyses that study the effects of psychological and behavioral interventions on obesity control (Johnston *et al.*, 2022). Thus, BSP has emerged as an innovative psychotherapeutic technique with positive results in weight control and weight loss and is now indicated as a complementary strategy for managing obesity. Like other psychotherapeutic techniques, *Brainspotting* can be incorporated into treatment plans for weight loss to promote adherence and intrinsic motivation, since monitoring based on individual values can promote existential, cognitive and affective restructuring that is important for lifestyle change. This reasoning is corroborated by the main objective of psychological and behavioral interventions, which is to help people living with obesity make sustainable changes that promote positive self-esteem and confidence to improve health and quality of life, bringing greater existential freedom.

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