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"I'm Not Satiety Without Rice": Phenomenological Study of Barrier and Weight Loss Efforts in Home Settings

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Abstract

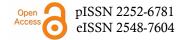
The prevalence of obesity around the world is relatively high. Obesity management takes a long time and high disciplinary. This can increase the noncompliance with obesity treatment. Family is a support system that can help obesity management. The study explored family experiences regarding the efforts and barriers to obesity management in a home setting. This study used a descriptive phenomenological research design. The seventh families who lived in Depok City were selected using purposive sampling. Inclusion criteria included 1) having family members who were overweight/obese, 2) obese family members who did not have comorbid diseases, 3) informants who did not have a chronic disease. A semi-structured interview was used to collect data. The data analysis used Colaizzi's method. Four themes emerged, including 1) nutrition management efforts, 2) weight loss efforts, 3) unhealthy nutritional behavior patterns, 4) desire to achieve normal conditions. Family plays a vital role in obesity management in the home setting. Nurses can optimize the family's functions by providing home visits. Family counselling is needed to reduce weight management barriers.

INTRODUCTION

Transitions in nutrition, lifestyle, and modernization have all contributed to a relatively rapid increase in obesity prevalence at all ages in almost every part of the world. According to the WHO, the prevalence of obesity over the age of 18 was 13% obese and 39% overweight in 2016. In 2020, 39 million children under the age of five will be overweight or obese (World Health Organization., 2021).

Indonesia is the fifth country in Southeast Asia with the highest obesity prevalence (Ng et al., 2014). The prevalence of obesity in Indone-

sia varies according to the age groups: the 5-12 years olds are 9.2%, the 13-15 years olds reached 4.8%, the 16-18 years olds are 4%, and the adults are 21.8% (Health Research and Development Agency, 2018). The prevalence of obesity in West Java province by age groups: the 5-12 years olds attained 9,65%, the 13-15 years olds are 13,39%, the 16-18 years olds are 4.51%, and the adult ages reached 23%. Based on age categories, Depok City has a prevalence of obesity of 9,65% in children aged 5 to 12, 4,86% in children aged 13 to 15, 14,02% in children aged 16 to 18, and 29,16% in adults (Badan Penelitian dan Pengem-



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bangan Kesehatan, 2019).

Obesity has an impact on various aspects such as health, psychology, society, and the economy. Health problems due to obesity are hypertension (Ryoo et al., 2017), cardiovascular disease (Attard, Herring, Howard, & Gordon-Larsen, 2013), type 2 diabetes mellitus (Furler, Rudock, Manski-Nankervis, Blackberry, & Kennedy, 2016), dyslipidemia (Rinkuniene et al., 2015), pulmonary disease (Dixon & Peters, 2018), gastrointestinal comorbidities and orthopedic complications (Ranjani et al., 2016), reproductive problems (Elizondo-Montemayor, Hernández-Escobar, Lara-Torre, Nieblas, & Gómez-Carmona, 2017), arthritis and urinary incontinence (Amarya, Singh, & Sabharwal, 2014). Psychologically, the impact that is felt due to obesity includes impaired self-esteem (Carrard & Kruseman, 2016; Gillespie et al., 2015), victims of bullying (Álvarez-García, García, & Núñez, 2015). Obesity also has a significant impact on the economy in several countries (Tremmel, Gerdtham, Nilsson, & Saha, 2017). The total economic loss due to obesity in Indonesia is IDR 78.478 billion/year, equivalent to 0.9% of Indonesia's Gross Domestic Product (GDP) (Wulansari, Martianto, & Baliwati, 2016).

Obesity management needs to be done comprehensively by involving various parties. The family has a critical role in handling obesity (Kristina & Huriah, 2020). Family-based intervention is the "gold standard" in managing obesity (Skelton, Buehler, Irby, & Grzywacz, 2012). The family plays a vital role in changing the behaviour of family members, especially in weight loss since the function of the family is closely related to the diet of the family (Berge, Wall, Larson, Loth, & Neumark-Sztainer, 2013).

Home cooking has been associated with increased food intake, including lower sugar intake, according to the research. The habit of consuming fast food once a week is closely related to the increasing prevalence of obesity (Taillie & Poti, 2017). Preliminary studies through observations and interviews at the research site show that the routine of providing food by cooking at home has faded. Ten housewives interviewed reported they cook on occasion but mostly buy ready-made food. The availability of ready-to-eat food that is sold supports the hectic activities of housewives and working mothers, causing housewives to pick practical ways to offer nourishment.

The burden of responsibility and commitment, as well as low parental self-efficacy, can all have an impact on food provision. Unique time management challenges include commitments to

work, a shortage of time, and a lack of support from family and the surroundings (Perry, Daniels, Bell, & Magarey, 2016). Personal factors such as a lack of knowledge and personal preferences, communication and modeling such as other people and media/advertising are all examples of personal factors, modernization such as the nutrition transition and the role of women, and a lack of access to healthy food such as insufficient trust, perceived risks, high prices, and time constraints are all barriers to providing food at home (Farahmand et al., 2015).

Obesity management requires a long time, high discipline, and a multisectoral approach. Family is one of the support systems that can fail the client's weight loss program. However, to enhance family member participation in care planning, a greater comprehension of the interactions between family ties and food is required (Almeida et al., 2016). Related research about barriers and support in family obesity management in Indonesia has never been done. Thus, this study will provide an overview of the family experiences regarding barriers and effort perceived by a family in obesity management in-home setting.

METHOD Study Design

A descriptive phenomenology approach was used in the study. Descriptive phenomenology is a part of phenomenological research in which researchers' perceptions will be stimulated through the richness, depth, and breadth of the Informants' lives (Speziale, Streubert, & Carpenter, 2011). The descriptive phenomenological research process has four steps: bracketing, intuiting, analyzing, and describing (Polit & Beck, 2014).

Informants

This study used purposive sampling. The informants chosen are family caregivers, either moms or grandmothers, who are in charge of providing meals for the family. Seven informants were selected using purposive sampling according to the inclusion criteria, such as: 1) family consists of overweight/obese, 2) obese family members who do not have comorbid diseases, 3) Informants who do not have a chronic disease.

Data Collection

Data collection was carried out from April to June 2017 in Depok City, Indonesia. In-depth interviews were conducted and recorded using a USB digital voice recorder. Open questions are used to conduct interviews. Direct interviews were carried out based on the agreement with the informants. According to the agreement,

all interviews were conducted at the informants' houses. The duration of each interview is around 45-60 minutes (Shosha, 2012). The informants listened to the interview findings to see if there was any further information. When the following informant did not provide any new information, data saturation was achieved.

Data Analysis

The data were analyzed by three researchers using the Collaizi analysis stage. The stage consists of the following 7 steps: 1) Reading the informant verbatim with brackets, 2) Noting relevant statements (keywords) identified in the transcript, separated on different pages by providing page numbers and rows in accordance with an appropriately original transcript, and 3) Using the original transcript as a guide. 3) From significant assertions placed in a category, the precise meaning is determined. 4) Dividing the categories into sub-themes and themes, 5) eDscribing the study phenomena using the research findings. Sorting overlapping categories and themes to identify the basic organization and connections between topics, 7) Validating themes and findings with informants through member-checking (Shosha, 2012).

Trustworthiness/Rigor

Data validity has been done under the principle of credibility, transferability, dependability, and confirmability(Polit & Beck, 2014; Speziale et al., 2011). Playing back the results of informant interviews shortly after the interviews were over helped establish the credibility. The researcher conveyed to the informants before listening to the recording that they were allowed to add or provide new information. Transferability was done by giving the thematic analysis results to families that have the same characteristics as informants. The family concerned was requested to read and comprehend the themes of the study's findings. The researcher also conducted a review and comparison with previous research to ensure the fulfillment of transferability. Dependability was done by involving member researchers to examine and analyze the data. Confirmability was done by peer review through the presentation of research results.

Ethical Consideration

Researchers have confirmed that informants are protected ethically. The researchers collected data after receiving ethical clearance from the research ethics committee, Faculty of Nursing, Universitas Indonesia with reference number 108/ UN2.F12.D/ HKP.02.04/ 2017. All of the study's informants were given a description of the study's goals at the outset. After

getting an explanation, the informant signed a form requesting informed consent. Additionally, the researcher disclosed that informants had the option to discontinue taking part in the study. The researcher also promised to protect the participants' identities' confidentiality.

RESULT AND DISCUSION Characteristics of Informants

Seven informants as presented in Table 1 were used in this study. The age of informants is between 29 and 60 years. Most informants' education levels (85.71%) are low education (1 graduated from elementary school, 1 from junior high school, and 4 from high school). Most informants work in housekeeping. Five informants have been married, one informant is single, and one is a widow. All informant religions is moslem.

Nutrition Management Efforts

Attempts to manage nutritional demands are made by giving family food and monitoring family members' nutritional adequacy. Informants indicated that cooking and purchasing food are two ways to supply food for the family. Informants three and four prefer to purchase cooked food from food stalls or sellers passing by in front of their houses since they are too busy working and have no time to cook. The transcript of the interview with the informant is as follows:

"...I always cook at home" (P1)

"I rarely cook on weekends because I'm lazy (chuckles).....Uwak (household assistant) some times cooks..." (P4)

"I usually cook during the day, but sometimes I buy ready-to-eat-food" (P7)

"... I am a working mother we buy food ..."
(P3)

"I often cook at home... just once in the morning. I cook the same menu for everyone at home. I buy food out in the afternoon. I bought meatballs and fried food" (P6)

The following informants explain how they process food for their families.

".. spinach is cooked in a clear sauce and chicken broth ..." (P1, P3)

"I often cook spinach, vegetable soup, fried chicken, and egg... I bought meatballs, crispy fried chicken and cooked vegetables...I cook vegetables with the seasoning of onion, garlic, sugar, salt..." (P4)

"Even though I know that cooking by frying is not healthy, but eating without fried food is not very tasty...salted squid cooked with chilies. (P6) The informant used weight to monitor of

Table 1. Informants Characteristics

Informants Characteristics	N	%
Ages		
Young Adults	4	57,14
Middle aged Adults	2	28,57
Old	1	14,29
Gender		
Male	0	0
Female	7	100
Education Level		
Low Education Level	6	85,71
High Education Level	1	14,29
Religion		
Moslem	7	100
Protestant	0	0
Catholic	0	0
Marital Status		
Single	1	14,29
Widow	1	14,29
Married	5	71,43
Work Status		
Housekeeper	5	71,43
Working Mother	2	28,57

his family's nutritional adequacy. Weighing is done regularly at home independently. Routine weighing habits are rarely done. It makes weight gain uncontrollable. The following is the excerpt:

- "... I often weigh if there is a routine weighing at Posyandu ... (P2)
- "... When he's grown up, I rarely weigh his body ..." (P3)
- "... I weigh people at home quite often" (P7)

The first theme emphasizes the role of the family in managing nutritional needs at home. Nutritional management includes providing dietary needs and monitoring body weight (Buleheck, Butcher, Dochterman, & Wagner, 2016). The way to provide food is to process raw ingredients into ready-to-eat food. The informants explained that they bought food for their families. Previous research found that adults who ate all of their family meals at home had a 26% lower risk of obesity than those who ate little or nothing (Tumin & Anderson, 2017). This is consistent with a study conducted that demonstrates a correlation between having dinner at home and increasing food intake, particularly low-sugar intake, which lowers the prevalence of obesity (Taillie & Poti, 2017). A Japanese study found that children

who cooked less regularly at home had a 2.27 times higher risk of being obese than those who cooked more frequently (Tani, Fujiwara, Doi, & Isumi, 2019). Cooking at home give an effect on nutrition intake. The guidelines state that your nutrition will improve if you cook at home more regularly. According to studies, people who cook frequently consume significantly more fiber and fewer grams of carbohydrates, fat, and sugar than people who cook infrequently (Wolfson & Bleich, 2015).

Informants made the decision to buy fast food frequently. The causes are exhaustion, a lack of cooking time, and laziness. This is consistent with the motivational theme, which is categorized as parent-child bonds and responsibilities (Rylatt & Cartwright, 2016). Other studies suggest that the internal locus control of the parents includes the burden of responsibility and commitment or low parental self-efficacy, which can result in unhealthy diet intake. Laziness shows that the internalization of the concept of responsibility is lacking. The informants feel she has no capability and time for cooking. Thus, they choose other alternatives to provide food instead of cooking at home. The study also conveyed lack of cooking

skills is one of the reasons for low cooking at home (Perry et al., 2016).

Cooking methods and menus results in weight gain. Clear soup is the vegetable most often provided. The composition of vegetables consists of basic spices such as shallots, garlic, salt, and sugar. These cooking habits tend to be healthier but are disliked by family members. This is consistent with the participant's expression that the family does not spend on the vegetables served in addition to the family choosing certain types of vegetables. This method is closely related to the third theme, in which family members tend to dislike certain types of vegetables so vegetable intake is inadequate. Previous studies have revealed that eating fewer vegetables is associated to weight increase (Anggraeni, Sukartini, & Kristiawati, 2017).

Monitoring nutritional status through scheduled weighing is essential for the family. This study shows that only one participant has a scale and regularly weighs family members at home. Routine weighing is the easiest and cheapest way to monitor nutritional status. Regular weighing 2-4x / week can encourage motivation to lose weight. The informant will return to a strict diet and apply strict eating arrangements after knowing their weight has increased (Carrard & Kruseman, 2016).

Weight Loss Efforts

The informant expressed this theme of their experiences in helping family members lose weight. The informant stated several selected actions, including limiting certain foods in type, quantity and exercise. The following is the excerpt:

> "... I reduce the fish. One kilogram contains three fish. I reduced one fish to half for one serving." P2

"Sometimes I even hide it [food]. I hide her sister's milk, so she doesn't take it without my permission. If she sees food, she will increase her food portion. I stow the food away before I leave so she won't add more servings." (P6)

"I bought six large cartons of milk. I started out buying four huge boxes of milk, then two large boxes, and now I just buy one large box. Additionally, I bought less liquid UHT milk." (P4)

The next effort is doing exercise. Here's the statement:

"... Exercise is done by walking in the morning every day. Sometimes the morning walk is up to 7 km ... "(P5)

"We motivate her to get up and move. I asked

her to sweep the floor. His father told her to get up early and exercise. But, sometimes she cries because she doesn't want to exercise. We hoped that she could lose weight by exercising..." (P6)

The second theme raised in this study emphasizes families' efforts in controlling weight. Healthy eating habits refer to eating methods that include balance, variety, and eating regularly (Bisogni, Jastran, Seligson, & Thompson, 2012). These initiatives include limiting particular foods, such as carbohydrate and protein diets, lowering meal portions, restricting ice cream and milk intake, and eliminating the consumption of snacks. The informant stated that the carbohydrate diet was done by limiting the consumption of rice. Changes in dietary patterns can maintain sustainable weight loss (Sherwood et al., 2013). Reducing the calorie density of the consumed food is a diet strategy for those who are overweight (Lawrence, Kushner, Lau, & Kumar, 2013). The results of this study are consistent with previous research that both dietary changes and food composition manipulation have a positive effect on weight loss (Soeliman & Azadbakht, 2014). Diet is expressed as a way to lose weight (Wills & Lawton, 2015). A decrease in 300 kcal/day calories will result in weight loss of ½ to 1 kg/week. The recommended diet is low in carbohydrates and high in protein, with a composition of 20% protein and 40% carbohydrates (Sugondo, 2014).

Milk consumption is decreased to lower body weight. Informants 1 and 4 reported that they gradually cut back on their daily milk intake. Decreasing the amount of formula milk has been shown to reduce weight gain. Milk formula contains high enough sugar levels and is grouped into types of animal protein. As a result, cutting out this sort of food has caused weight loss (Lawrence et al., 2013).

Doing regularly exercise is also chosen as an effort to lose weight (Lawrence et al., 2013). Gaining weight can be prevented by exercise. Regular exercise can help overweight persons lose weight (Sweeting, Smith, Neary, & Wright, 2016).

Unhealthy nutritional behavior patterns

The theme of unhealthy nutritional behavior patterns is divided into several sub-themes: types of unhealthy food consisting of fried snacks, fast food consumption, foods high in sugar, and less consumption of fruits and vegetables; the influence of people around and difficulty controlling appetite. Nearly all of the participating households prefer fried foods. The following quote illustrates this point:

"We enjoy eating fried snacks, the most we like

to eat fried foods ... Sometimes 5 pieces, sometimes 4 pieces, but mostly five pieces at a time.... At breakfast, we also eat like fried foods (P5)

"... I know that fried food makes you fat, but if you don't have it, it won't taste good ..." (P6)

The next food that is often consumed is fast food. The following are the quotes given by informants one and four:

"... if you go to KFC, eat crispy chicken if you go to McD you eat french fries and burgers also just fatty foods ... go at least once a month ..." (P1)

"... They e at french fries and fried chicken. Fried chicken can be eaten three pieces at a time ... nuggets and sausages as snacks as a snack a day can be three times a day. Therefore, I prepared frozen potatoes, nuggets, and sausages. Sometikes, a single pack of sausages sometimes runs out in one day ... "(P4)

Informant also described their sweet eating and drinking habits in the following quotations:

"... She often eats candy ... He drinks packaged iced tea every day ..." (P3)

"I give homemade snacks with the basic ingredients of sweet potatoes and brown sugar (sweat meatball) every day ... (P2)

"She often drinks packaged milk and ice sold by traders ..." (P6)

"She often drinks three bottles of sweet tea a day. He eats ice cream five times a day if left un checked ... She can finish two packs of instant noodles at a time "(P4)

The habit that hinders subsequent weight loss is the pattern of consuming fruit and vegetables based on guidelines. The informant said that their families sometimes tend to choose similar fruits and vegetables so that when they feel bored, there is no substitute. However, if other vegetables are bought or made, they are not eaten because they do not like them. The informant stated their preferred types of vegetables and fruit as below:

"... She doesn't like all kinds of fruit ... She likes all kinds of vegetables except beans ..." (P1)

"She rarely wants to eat other types of vegetab les. He just likes spinach and sponge luffa ... She likes longan fruit only. I once bought other fruit such as red dragon fruit, but she didn't want to eat it ... "(P3)

"... She doesn't like all kinds of vegetables, only certain types like spinach and Kang kong ... (P6)

The informant said the types of fruit their family likes are as follows:

"... They only like melons, mangoes, and papa

yas .." (P4)

".. She only likes oranges, melons, watermelons and papayas ..." (P2)

Informant stated the influence of the closest per son to eat as one of the factors that hinder the weight loss program. Here are the informant' expressions:

"... My husband likes to invite family to eat at restaurant ... so does my friend ..." (P1)

"... When her friend buys food, she likes to buy similar foods ..." (P4)

The difficulty in controlling appetite was spoken by the informant as one of the major obstacles to controlling body weight. The following is a participant statement:

"... I have a hard time controlling their appetite ..." (P1)

"Sometimes they are difficult to control .. (P7)

Besides being difficulty to control their appetite, the informants stated their difficulty in managing feeding times, especially at dinner. The following quote illustrates this point:

"... We're used to eating dinner. When we tried to eat in the afternoon, we couldn't because at night we still wanted to eat ..." (P1)

"Her mother came home from work at 8 pm, she asked for fried rice ... even though she bought bread, she said she was still hungry because she had not eaten rice ... (P4)

The third theme emphasizes the habits of family members that hinder weight loss. The informant expressed that feeling tired due to work and feeling lazy made them rarely cook at home. Responsibility, practical barriers, time costs and lack of cooking skills, pressure flexibility, and emotional motivation are categories that support the emergence of motivational themes (Rylatt & Cartwright, 2016). Other studies have shown that the level of fatigue after work greatly influences the choice of a meal plan as well as the activity of preparing food (Storfer-Isser & Musher-Eizenman, 2013).

The second barrier is unhealthy eating and drinking patterns. The informant said that fast food, fried foods, sweet drinks, and snack eating habit are very difficult to reduce or eliminate from family habits. Fast food is food that has high levels of calories but low in nutritions. It can trigger weight gain (Storfer-Isser & Musher-Eizenman, 2013). Excessive consumption of sugar or sugary drinks has been shown to increase body fat composition and body weight (Stanhope, 2016). Another prior study revealed food addiction, with participants expressing difficulties quitting fast food because it tastes so good (Cullen et al., 2017). The availability of frozen food is one

of the things that hinders efforts to control body weight (Lawrence et al., 2013).

The family's calorie limitation is disrupted by friends' and husbands' pressure to eat out on special occasions. This is in line with the results of previous research on social pressure. One of the social pressures is the difficulty in choosing food when socializing with the environment. This difficulty is also caused by pressure from family and friends. Families can sabotage food even though they are aware of the weight loss program that is being carried out (Rogerson, Soltani, & Copeland, 2016).

The next barrier is limited-time control and appetite. This sub-theme is divided into two categories, namely difficulty controlling appetite and eating habits. Informant said that if fat does not cause disease, efforts are not needed to lose weight. This misperception is following previous publications which show that informant feel happy with the ability to provide high calorie food (Rohayati, Wiarsih, & Nursasi, 2019). This misperception was also conveyed in previous research which showed that obesity is a funny thing (Suprawoto, Hayati, Rachmawati, & Wanda, 2019). Satiety is felt when eating rice as the primary source of carbohydrates. Informants tend to choose rice as a staple food that makes satiety more than other carbohydrate sources. Studies showed that the source of carbohydrates that have a high effect on satiety is potatoes than rice (Zhang, Venn, Monro, & Mishra, 2018). If they are hungry at night, the informant chooses to consume high-calorie foods such as fried rice compared to high-fiber foods. More than half of one's daily energy intake is associated with an increased risk of obesity. Obesity was twice as likely in people who ate nearly half of their daily caloric intake at dinner (Bo et al., 2014). The habit of consuming fruit and vegetables is less than the recommended amount. Families tend to like certain vegetables and fruits. This is inline with other research stated that one of the personal factors that support the selection of food types is personal taste (Farahmand et al., 2015).

Desire to Achieve Normal Conditions

This theme describes the family's desire for all family members to weigh within the normal range. The following quote illustrates the above theme::

"Even if she likes eating ... we want that her weight to be normal "(P4)

"... I want her to be able to lose weight ..."..(P6)

The fifth participant expressed their hope that in addition to being able to lose weight, they

also hope that there will be no comorbidities. Here's an excerpt:

"I think the most important thing is health. We don't suffer from any serious illnesses" (P5).

The fourth theme emphasizes the informant's desire to achieve ideal body weight and avoid comorbidities. This study is following the results of previous studies that the participant expectats to reach a normal body weight (Cullen et al., 2017). This expectation is following the results of previous research that external control is needed to reduce body weight. One form of external control is to control diet (Van Ostrand, 2015).

The next expectation is to avoid comorbidities. Comorbid diseases are known as complications of obesity. This is in line with the results of other studies which show that when losing weight to ideal obesity is difficult to achieve, informants hope that avoiding complications of obesity is the only hope they have (Akinrinlola, 2012).

CONCLUSION

This study concludes that informants' experiences in managing obesity at the family level include the efforts that have been made, obstacles, and expectations. The family views that all efforts at home are often thwarted by obstacles both within the obese patient himself and environmental influences. Support from family and various parties is significant in maintaining a discipline of obesity management. Besides, support from the health care team is needed to ensure the effectiveness of weight loss efforts. Future research is expected to explore the surrounding support available for obese patients in weight loss.

REFERENCES

Akinrinlola, O. A. (2012). Beliefs and attitudes to obesity, its risk factors and consequences in a Xhosa community: a qualitative study. Stellenbosch: Stellenbosch University.

Almeida, J. De, Ramalho, M., Lachal, J., Sursis, J., Ferro, N., Moro, M., & Revah-levy, A. (2016). A qualitative study of the role of food in family relationships: An insight into the families of Brazilian obese adolescents using photo elicitation. Appetite, 96, 539–545. https://doi.org/10.1016/j.appet.2015.10.023

Álvarez-García, D., García, T., & Núñez, J. C. (2015). Predictors of school bullying perpetration in adolescence: A systematic review. Aggression and Violent Behavior, 23, 126–136.

Amarya, S., Singh, K., & Sabharwal, M. (2014).

- Health consequences of obesity in the elderly. Journal of Clinical Gerontology and Geriatrics, 5(3), 63–67. https://doi.org/10.1016/j.jcgg.2014.01.004
- Anggraeni, A. S., Sukartini, T., & Kristiawati, K. (2017). Consumption of Fruit and Vegetable with Risk of Obesity in Schoolage Children. Jurnal Ners, 12(1), 27–32. https://doi.org/10.20473/jn.v12i1.3448
- Attard, S. M., Herring, A. H., Howard, A. G., & Gordon-Larsen, P. (2013). Longitudinal trajectories of BMI and cardiovascular disease risk: The national longitudinal study of adolescent health. Obesity, 21(11), 2180–2188. https://doi.org/10.1002/oby.20569
- Badan Penelitian dan Pengembangan Kesehatan. (2019). Laporan Provinsi Jawa Barat. In Lembaga Penerbit Badan Penelitian dan Pengembangan Kesehatan.
- Berge, J. M., Wall, M., Larson, N., Loth, K. A., & Neumark-Sztainer, D. (2013). Family functioning: associations with weight status, eating behaviors, and physical activity in adolescents. Journal of Adolescent Health, 52(3), 351–357.
- Bisogni, C. A., Jastran, M., Seligson, M., & Thompson, A. (2012). How People Interpret Healthy Eating: Contributions of Qualitative Research. Journal of Nutrition Education and Behavior, 44(4), 282–301. https://doi.org/10.1016/j.jneb.2011.11.009
- Bo, S., Musso, G., Beccuti, G., Fadda, M., Fedele, D., Gambino, R., ... Cassader, M. (2014). Consuming more of daily caloric intake at dinner predisposes to obesity. A 6-year population-based prospective cohort study. PloS One, 9(9), e108467.
- Buleheck, G., Butcher, H., Dochterman, J., & Wagner, C. (2016). Nursing Interventions Classification (NIC) (5th ed.). Philadelpia: Elsevier.
- Carrard, I., & Kruseman, M. (2016). Qualitative analysis of the role of self-weighing as a strategy of weight control for weight-loss maintainers in comparison with a normal, stable weight group. Appetite, 105, 604–610. https://doi.org/10.1016/j.ap-pet.2016.06.035
- Cullen, A. J., Barnett, A., Komesaroff, P. A., Brown, W., O'Brien, K. S., Hall, W., & Carter, A. (2017). A qualitative study of overweight and obese Australians' views of food addiction. Appetite, 115, 62–70. <a href="https://doi.org/http

org/10.1016/j.appet.2017.02.013

- Dixon, A. E., & Peters, U. (2018). The effect of obesity on lung function. Expert Review of Respiratory Medicine, 12(9), 755–767.
- Elizondo-Montemayor, L., Hernández-Escobar, C., Lara-Torre, E., Nieblas, B., & Gómez-Carmona, M. (2017). Gynecologic and Obstetric Consequences of Obesity in Adolescent Girls. Journal of Pediatric and Adolescent Gynecology, 30(2), 156–168. https://doi.org/10.1016/j.jpag.2016.02.007
- Farahmand, M., Amiri, P., Ramezani Tehrani, F., Momenan, A. A., Mirmiran, P., & Azizi, F. (2015). What are the main barriers to healthy eating among families? A qualitative exploration of perceptions and experiences of Tehranian men. Appetite, 89, 291–297. https://doi.org/10.1016/j.appet.2015.02.025
- Furler, J., Rudock, G., Manski-Nankervis, J.-A., Blackberry, I., & Kennedy, M. (2016). Identifying Risk for Diabetes in Adolescence (IRDA): A pilot study in general practice. Australian Family Physician, 45(8), 582–586.
- Gillespie, J., Midmore, C., Hoeflich, J., Ness, C., Ballard, P., & Stewart, L. (2015). Parents as the start of the solution: A social marketing approach to understanding triggers and barriers to entering a childhood weight management service. Journal of Human Nutrition and Dietetics, 28(s1), 83–92. https://doi.org/10.1111/jhn.12237
- Health Research and Development Agency. (2018). National Report Basic Health Research (Riskesdas) 2018,. Jakarta: Ministry of Health.
- Kristina, A., & Huriah, T. (2020). Program pencegahan obesitas anak dengan perlibatan peran keluarga: Literature Review. Jurnal Keperawatan Muhammadiyah, 5(2).
- Lawrence, V., Kushner, R., Lau, N., & Kumar, S. (2013). Practical Manual of Clinical Obesity. Retrieved from http://ebookcentral.proquest.com/lib/indonesiau-ebooks/detail.action?docID=1161326
- Ng, M., Fleming, T., Robinson, M., Thomson, B., Graetz, N., Margono, C., ... Gakidou, E. (2014). Global, regional, and national prevalence of overweight and obesity in children and adults during 1980–2013: a systematic analysis for the Global Burden of Disease Study 2013. The Lancet, 384(9945), 766–781. https://doi.org/10.1016/S0140-6736(14)60460-8

- Perry, R. A., Daniels, L. A., Bell, L., & Magarey, A. M. (2016). Facilitators and Barriers to the Achievement of Healthy Lifestyle Goals: Qualitative Findings From Australian Parents Enrolled in the PEACH Child Weight Management Program. Journal of Nutrition Education and Behavior, 49(1), 43-52.e1. https://doi.org/10.1016/j.jneb.2016.08.018
- Polit, D. F., & Beck, C. T. (2014). Essentials of Nursing Research Seventh Edition Appraising Evidence for Nursing Practice. In Lippincott Williams & Wilkins.
- Ranjani, H., Mehreen, T. S., Pradeepa, R., Anjana, R. M., Garg, R., Anand, K., & Mohan, V. (2016). Epidemiology of childhood overweight & obesity in India: A systematic review. The Indian Journal of Medical Research, 143(2), 160–174. https://doi.org/10.4103/0971-5916.180203
- Rinkuniene, E., Laucevicius, A., Petrulioniene, Z., Dzenkeviciute, V., Kutkiene, S., Skujaite, A., & Kasiulevicius, V. (2015). The prevalence of dislipidemia and its relation to other risk factors: A nationwide survey of Lithuania. Clinical Lipidology, 10(3), 219–225. https://doi.org/10.2217/clp.15.16
- Rogerson, D., Soltani, H., & Copeland, R. (2016). The weight-loss experience: a qualitative exploration. BMC Public Health, 1–13. https://doi.org/10.1186/s12889-016-3045-6
- Rohayati, Wiarsih, W., & Nursasi, A. Y. (2019). Perspektif caregiver dalam merawat keluarga dengan obesitas: studi fenomenologi. Jurnal Mitra Kesehatan, 2(1), 37–49.
- Rylatt, L., & Cartwright, T. (2016). Parental feeding behaviour and motivations regarding pre-school age children: A thematic synthesis of qualitative studies. Appetite, 99, 285–297. https://doi.org/10.1016/j.appet.2015.12.017
- Ryoo, J.-H., Park, S. K., Oh, C.-M., Choi, Y.-J., Chung, J. Y., Ham, W. T., & Jung, T. (2017). Evaluating the risk of hypertension according to the metabolic health status stratified by degree of obesity. Journal of the American Society of Hypertension, 11(1), 20–27.
- Sherwood, N. E., French, S. A., Veblen-Mortenson, S., Crain, A. L., Berge, J., Kunin-Batson, A., ... Senso, M. (2013). NET-Works: Linking families, communities and primary care to prevent obesity in preschool-age children. Contemporary

- Clinical Trials, 36(2), 544–554. https://doi.org/10.1016/j.cct.2013.09.015
- Shosha, G. (2012). Employment of Colaizzi'S Strategy in Descriptive Phenomenology: a Reflection of a Researcher. European Scientific Journal, 8(27), 31–43. https://doi.org/10.1093/cid/cir626
- Skelton, J. A., Buehler, C., Irby, M. B., & Grzywacz, J. G. (2012). Where are family theories in family-based obesity treatment?: conceptualizing the study of families in pediatric weight management. International Journal of Obesity (2005), 36(7), 891–900. https://doi.org/10.1038/ijo.2012.56
- Soeliman, F. A., & Azadbakht, L. (2014). Weight loss maintenance: A review on dietary related strategies. Journal of Research in Medical Sciences: The Official Journal of Isfahan University of Medical Sciences, 19(3), 268.
- Speziale, H. S., Streubert, H. J., & Carpenter, D. R. (2011). Qualitative research in nursing: Advancing the humanistic imperative. Lippincott Williams & Wilkins.
- Stanhope, K. L. (2016). Sugar consumption, metabolic disease and obesity: The state of the controversy. Critical Reviews in Clinical Laboratory Sciences, 53(1), 52–67. https://doi.org/10.3109/10408363.2015.1084990
- Storfer-Isser, A., & Musher-Eizenman, D. (2013). Measuring parent time scarcity and fatigue as barriers to meal planning and preparation: quantitative scale development. Journal of Nutrition Education and Behavior, 45(2), 176–182.
- Sugondo. (2014). Obesitas. In S. Aru, AB; Setiyohadi, B, Alwi, I; Simadibrata, M; Setiati (Ed.), Buku ajar ilmu penyakit dalam (V). Jakarta: FK UI.
- Suprawoto, D. N., Hayati, H., Rachmawati, I. N., & Wanda, D. (2019). "Fat Kids Are Adorable": The Experiences of Mothers Caring for Overweight Children in Indonesia. Comprehensive Child and Adolescent Nursing, 42(sup1), 226–233. https://doi.org/10.1080/24694193.2019.1594454
- Sweeting, H., Smith, E., Neary, J., & Wright, C. (2016). 'Now I care': a qualitative study of how overweight adolescents managed their weight in the transition to adulthood. BMJ Open, 6(11), e010774. https://doi.org/10.1136/bmjopen-2015-010774
- Taillie, L. S., & Poti, J. M. (2017). Associations of Cooking With Dietary Intake and Obesity Among Supplemental Nutrition As-

- sistance Program Participants. American Journal of Preventive Medicine, 52(2), S151–S160. https://doi.org/10.1016/j.amepre.2016.08.021
- Tani, Y., Fujiwara, T., Doi, S., & Isumi, A. (2019). Home Cooking and Child Obesity in Japan: Results from the A-CHILD Study. Nutrients, Vol. 11. https://doi.org/10.3390/nu11122859
- Tremmel, M., Gerdtham, U.-G., Nilsson, P. M., & Saha, S. (2017). Economic Burden of Obesity: A Systematic Literature Review. International Journal of Environmental Research and Public Health, Vol. 14. https://doi.org/10.3390/ijerph14040435
- Tumin, R., & Anderson, S. E. (2017). Television, Home-Cooked Meals, and Family Meal Frequency: Associations with Adult Obesity. Journal of the Academy of Nutrition and Dietetics, 117(6), 937–945. https://doi.org/https://doi.org/10.1016/j.jand.2017.01.009
- Van Ostrand, G. (2015). Why some women eat too much: A qualitative study of food-de-

- pendent women. Walden University.
- Wills, W. J., & Lawton, J. (2015). Attitudes to weight and weight management in the early teenage years: A qualitative study of parental perceptions and views. Health Expectations, 18(5), 775–783. https://doi.org/10.1111/hex.12182
- Wolfson, J. A., & Bleich, S. N. (2015). Is cooking at home associated with better diet quality or weight-loss intention? Public Health Nutrition, 18(8), 1397–1406. https://doi.org/DOI: 10.1017/S1368980014001943
- World Health Organization. (2021). Obesity and overweight. Retrieved March 30, 2022, from https://www.who.int/news-room/fact-sheets/detail/obesity-and-overweight
- Wulansari, A., Martianto, D., & Baliwati, Y. F. (2016). Estimasi Kerugian Ekonomi Akibat Obesitas. 11(2), 159–168.
- Zhang, Z., Venn, B. J., Monro, J., & Mishra, S. (2018). Subjective satiety following meals incorporating rice, pasta and potato. Nutrients, 10(11), 1–10. https://doi.org/10.3390/nu10111739