AKENTEN APPIAH-MINKA UNIVERSITY OF SKILLS TRAINING AND ENTREPRENEURIAL DEVELOPMENT

ANALYZING BODY PROPORTIONS AND THEIR UNIQUE ATTRIBUTES FOR OPTIMIZED GARMENT FIT IN PLUS-SIZE WOMEN: A CASE STUDY IN ACCRA, NUNGUA MUNICIPALITY

MARY FAABA ESSUMAN

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A Thesis in the Department of Fashion and Textiles Education, Faculty of Technology Submitted to the School of Graduate Studies, Akenten Appiah-Menka University of Skills Training and Entrepreneurial Development in partial fulfilment of the requirements for the award of the Master of Technology degree in Fashion Design and Textiles

AUGUEST, 2023

DECLARATION

STUDENT DECLARATION

I, **MARY FAABA ESSUMAN,** declare that this project report with the exception of quotations references contained in published works which have been identified and duly acknowledged, is entirely the result of my own original research work, and it has not been submitted either in part or whole for another degree elsewhere.

NAME: MARY FAABA ESSUMAN

SIGNATURE: …… DATE:…….

SUPERVISOR'S DECLARATION

I declare that, the preparation and presentation of this project work was supervised in accordance with the guidelines on supervision of project work laid down by Akenten Appiah-Minka University of Skills Training And Entrepreneurial Development

NAME: NINETTE AFI APPIAH (PhD)

SIGNATURE: …… DATE: ……

DEDICATION

I am dedicating this thesis to Almighty God who gave me strength, wisdom, ideas, knowledge and understanding, throughout this research work. I dedicate this work to my late parents Kwame Aggrey Essuman and Juliana Nani Essuman, Mr. Moses Kuwornu and all my children, Jenkins Cobbinah, Roberta Cobbinah, Gabriel Nyarko and Patrick Nyarko.

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ABSTRACT

The aim of the study was to aanalyze body proportions and their unique attributes for optimized garment fit in plus-size women. The researcher utilized a descriptive research approach. The quantitative research design was used. The study result indicates that obese women are more likely to be stigmatized by fashion designers and that weight discrimination has been found to bring "social stigmatism and stereotyping and that can lead to depression, discrimination, and binge eating." The total population was 320 respondents, and a random sampling technique was used to collect data from the respondents. The study recommended that fashion designers should maintain a certain degree of customisation required for obese females and fashion designers should do research to find out additional fashion information typically required from a secondary source such as a website, a workshop or a booklet to sew for obese females.

CHAPTER ONE

INTRODUCTION

1.1 Background to the Study

The contour or bodily outline of an individual is referred to as their figure. Every individual is unique. As a result, different people have various figure types. A person's height and width can be used to determine their figure (Baum & Ford 2019). A person's image is enhanced by their dress choices; however, they can also hide flaws. One must therefore dress appropriately. The several figure types that are taken into consideration when making clothing are tall and slim, short and fat (stout), long neck, short neck, flat chest, huge breast, flat hips, large hips, and droopy shoulders. There are further traits that have gone unnoticed, such as being tall and chubby, short and skinny, and having a huge head (Baum & Ford 2019).

It would be reasonable to think that clothing alternatives would reflect the fact that over one-third (1/3) of Ghanaian adults are fat, but this has not happened (Adkins, Natalie, & Ozanne, 2021). The restricted clothing market is one instance of weightism, which is described as "prejudice or discrimination against people based on body weight" (Fox-Kales, 2020, p.158). Obese men and women make significantly less money than their slim counterparts at work (Baum & Ford, 2019), and obese women are more likely to face stigma from human resource professionals (Gesser-Edelsberg, & Ronit Endevelt, 2021). This is where weightism is most apparent.

According to research, weight discrimination can lead to "social stigmatism and stereotyping and that can lead to depression, discrimination, and binge eating" (Dye, 2018, p. 2). As a result, weightism not only occurs in workplaces but also has the unintended consequence of encouraging sufferers to binge, which further increases their weight. Children have also been discovered to be affected by weightism, which

also affects adults. According to Steiner-Adair and Vorenberg (2019), "boys and girls both joke about, tease, and bully classmates whose body sizes do not fit the cultural norm" (Steiner-Adair & Vorenberg, 2019, p.117), these behaviours and attitudes about weight are "firmly established in most elementary schools."

Women report "significantly higher rates of mistreatment reported by overweight and obese adolescents than those of normal weight" as a result of these ideas being put into practise (Buccianeri, et al., 2020, p. 49). Because there aren't many fashion options, weight prejudice is harmful. It might result in kids having fewer fashion options, which would make them stand out among their peers. Even worse issues arise when fat adults in the adult population have few options and may need to shop online for apparel. As a result, this study aimed to assess the body types and their traits for appropriate fitting for obese ladies.

1.2 Problem Statement

Numerous earlier research (Connell et al., 2016; Douty, 2018; Simmons, Istook, & Devarajan, 2012) have demonstrated that the large female population has a variety of body forms. The interactions between these various body types and clothes frequently influence consumers' final purchase choices (Eckman, Damhorst, & Kadolph, 2011). In order to purposefully conceal bodily parts, they deem unattractive, consumers may employ a variety of styles (Yoo, 2013). The fashion industry has recently been aware of consumers' usage of clothing as a tool to obtain desired shapes, particularly among women. Due to increased competition and the full emergence of a consumer-driven market, it is now essential for enterprises in the garment sector to satisfy customer demands in order to generate and sustain profit. These societal prejudices against obese women are not just reflected in the world of fashion; they are also strengthened by it.

In fact, the majority of the research (Fox-Kales, 2011; Gesser-Edelsberg, Anat, and Ronit Endevelt, 2021) demonstrates that there is a pervasive bias against obese women in various fields, including the fashion industry. Given the widespread stigmatization of fat women, it should come as no surprise that the consumer group that marketers in this aesthetics-focused industry find least appealing have ugly bodies.

The limited clothing market is an illustration of weightism, which is defined as "prejudice or discrimination against people based on body weight." Weightism has been especially noticeable in the workplace, where obese women make much less money than their slender counterparts and are more likely to experience stigmatisation from HR professionals.

Due to this bias, overweight exercise practitioners have been shown to be passed over for fitness trainer positions in the professional world despite having more than sufficient credentials (Sartore & Cunningham, 2017). The causes of this bias have been examined in studies on obesity. In addition to the promotion of thin bodies in the fashion industry and in well-liked entertainment mediums like television, movies, and magazines, other factors may also contribute to having an obesity bias (Thompson & Heinberg, 2019).

For instance, American researchers discovered that female job applicants who were overweight or obese scored poorly on tests for supervisory skills, self-discipline, professional appearance, personal hygiene, and the ability to handle a demanding work (Rothblum, Miller, & Garbutt, 2018). It's interesting to note that when the level of perceived applicant beauty was controlled, the negative evaluations for these individuals were significantly lower. This finding implies that being overweight negatively affects one's perception of physical beauty, which is a factor that is more

significant for women in America than the actual "fat" itself. Therefore, there is the need to obtain an empirical evidence, by conducting an investigation, to analyze body proportions and their unique attributes for optimized garment fit in plus-size women in Nungua Municipality.

1.3 Purpose of the Study

The aim of the study was to analyze body proportions and their unique attributes for optimized garment fit in plus-size women.

1.4 Research Objectives:

1. To identify the unique body proportions and specific attributes of plus-size women and how these differ from standard sizes.
2. To evaluate the impact of garment fit on comfort, confidence, and satisfaction among plus-size women.
3. To explore current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types.
4. To propose an optimized, data-informed approach for garment creation that better caters to the unique body proportions of plus-size women.

1.5 Research Questions:

1. How do the body proportions and specific attributes of plus-size women differ from those of standard sizes, and what are the implications of these differences on garment fit?
2. How does garment fit affect plus-size women's comfort, confidence, and satisfaction?

3. Are current clothing manufacturing standards for plus-size women adequate in providing an optimal fit for diverse body types, and where do they fall short?
4. How can the garment industry utilize data-driven insights about unique body proportions to optimize clothing fit for plus-size women?

1.6 Significance of Study

The current study may significantly contribute to the body of knowledge in this important area of Ghanaian fashion and textiles industry. Again, when the customers' perceptions of the quality of services delivered are identified, it may help fashion designers redesign their products to attract more obese females and improve the quality of fashion products. Also, the knowledge gained in this study may serve as a strategic tool for those who want to enter and those already in the fashion business. Finally, the results of this research may help to equip the policymakers in the fashion industry in Ghana in formulating, implementing and modifying policy for improving the quality of fashion products for obese females in Ghana.

1.7 Limitation of the Study

Having to distribute the questionnaires was difficult for the researcher. For instance, the participants found it difficult to disclose certain important details about the current state of their fashion firms' operations. Second, the researcher has trouble getting the respondents to return the questionnaires. Thirdly, time restrictions could potentially have an impact on how the questionnaires are distributed.

1.8 Delimitation of the Study

The study's objective was to examine body proportions and their distinctive characteristics in Nungua Municipality plus-size women in order to get the best possible clothing fit. The investigation was therefore restricted to particular fashion designers and clients in Accra's Nungua Municipality. Additionally, the study was conceptually restricted to the aforementioned research goals.

1.9 Organization of the Study

There were six chapters in this study. The backdrop of the study, the statement of the problem, the purpose, the objectives, the research questions, the significance of the investigation, the scope of the study, and the organization of the study are all covered in chapter one, which is the introduction. A review of the relevant literature is presented in chapter two. Based on the literature review, a conceptual study was created. The research design, population, sample, and sampling techniques, as well as the research instrument for data collection, method of data collection, and data analysis, were covered in Chapter 3. In chapter four, statistical methods were used to analyze the data collected for the study, and the results were presented and debated. The findings were covered in Chapter 5, and the study's summary, conclusions, and recommendations were covered in Chapter 6.

CHAPTER TWO

REVIEW OF RELATED LITERATURE

2.1 Introduction

This chapter reviewed related literature to cover the concept of clothing and appearance, theories in clothing social psychology, theoretical framework, social adaptation theory, social factors and choice of clothing, empirical review, how obese short women figures are perceived in the fashion industry, the challenges obese short women face in their choice of clothes, fashion and obesity bias.

2.2 The Concept of Clothing and Appearance

The most noticeable aspect of clothes and look, apparel, reveals a lot about the person wearing it. Clothing can disclose a person's gender, age, occupation, socioeconomic standing, team participation or affiliation, marital status, intelligence, values, attitudes, and demeanour (Ryan, 2011). Clothes reflect the trends in everyday life. The concept of clothing and appearance is expanded. On a man or woman and private level, clothing and appearance "reflect the consciousness of human beings, and specific private values and the values of the society in which a person lives" (Damhorst, 2019, p.2).

Clothing is referred to as "an assemblage of adjustments to the physique and/or dietary supplements to the body" by Johnson et al. (2012, p. 6). Clothing is defined as "the complete presentation of all coverings and ornamentations worn on the human body" by Sproles and Burns (2014, p.7) (Damhorst, 2019). Clothing and appearance can communicate societal or personal values nonverbally by painting an image before utilising words (Dixon, 2017). Clothing and appearance, in particular, convey three key messages:

1. a person's characteristics, values, attitudes, interests, way of life, and mood;

2. Status and renown, group membership, group roles (family, job, friendship, and gender), and cultural background

3. Situational definitions, like the desire to act and the attitude (formal, informal, serious, or playful) (Dixon, 2017, p.

Damhorst (2019) continued by stating that one's appearance plays a significant role in how others perceive them. A person's hobbies, personality, roles, affiliation with a team, intentions, age, gender, socioeconomic status, and other characteristics are taken into consideration when selecting items. Clothing acts as a non-verbal communication structure because it is utilized to hide personal information about the wearer. The way you appear is another method of nonverbal communication. Before any words are even said, it can already transmit social or personal beliefs and paint a picture. It "includes points of the undressed body, such as form or color," according Johnson et al. (2012), p. 125.

At some point in social engagement, it has been discovered that appearance, particularly as it relates to dress, is a positive style of discussion. When these two incredibly apparent sorts of verbal engagement are combined, clothing and appearance are frequently the most obvious indicators regarding age, gender, ethnicity, social position, and social roles (Damhorst, 2019). Perceivers infer meanings from another's clothes and appearance, whether or not these meanings are deliberate, unconscious, or imagined, based on a few messages or cues that clothing consciously and subconsciously encodes for others to understand (Johnson et al., 2012).

The way someone is dressed and presented can tell you a lot about them. Johnson et al. (2012) looked into how people form perceptions based on how people are dressed and seem. They observed a range of observable and indiscernible clothing types, appearance cues used to generate judgments about others, as well as the various sorts of information derived from the cues. Johnson et al. found that participants judged others based on how they looked and what they were wearing, which covered obvious indicators of costume such attachments and bodily alterations. Observing how clothes was initially worn on the body or how outfits were put together also helped to shape impressions. Additionally, body visible components including the surface, motion, and types of the body have been identified to boost impressions.

The evidence was found to support the hypothesis that records about the wearer are only based on clothing and appearance, and observers were confident that their original impressions were correct. In general, individuals can infer a person's persona features, physiological and organic characteristics, demographic and social standing, attitudes and emotions, professional function, and intents or purposes just from their clothes and look (Johnson et al., 2010). Because apparel is a visually appealing part of look and clothes that people notice and remember, clothing is a frequently observed kind of language exchange (Dixon, 2017). Clothing is anything three-dimensional that surrounds and envelops the body. According to Sproles and Burns (2014), clothing serves as a decorative form of physical protection. Clothing is frequently used to cover the human body.

An essential component of clothes and appearance, apparel helps people identify themselves while also supporting the perceptions that others have of them. It has been repeatedly demonstrated that people successfully infer information about others from their clothing, particularly clothing (Johnson et al., 2012, p. 126).

Clothing is a tangible item that people use to create or project a picture of themselves to others, positioning the perceived persona in a particular action or magnificence, according to Dixon (2017).

Clothing that reflects a person is always a reflection of who that person is or aspires to be, according to Biecher et al. (2019). It has been established that these garments are used in the past (Horn & Gurel, 2011). According to Horn and Gurel (2011), minority-owned businesses use clothing as a covert strategy to improve their negative reputation. Recently, it has been discovered that Ghanaians spend a considerable sum of money on clothing as a status symbol, a method to demonstrate to others their success, and a way to improve their appearance.

The visible clothes that makes up a person's dress, however, can only offer a visual interpretation that may or may not adequately describe the meaning of dress. As a result, clothing is crucial in this study since it quickly allocates a person to a social role. Due to their abundance in symbolism, clothing and appearance are fascinating to explore (Damhorst, 2019).

2.3 Body Cathexis

How content a person is with their outward look is the emphasis of the body cathexis idea, which is related to body image (Kaiser, 2017). This structure is intricate and diverse, according to Kaiser (2017Body cathexis can differ from one body area to another since a person's contentment with their body can be influenced by a variety of circumstances, including gender and cultural expectations (Kaiser, 2017).Because men preferred having larger body parts, Jourard and Secord (2015) found that male body cathexis was predicted by body part size. They advised ladies to assess their actual physiques by contrasting them with their idealized perceptions of the female form that

the majority of women had. Female body cathexis research by Jourard and Secord (2015) indicates that, with the exception of the bust area, having a positive body cathexis is associated with having a relatively small body frame. In their research, Jourard and Secord (2015) also looked into if there is a standard for desirable body form or size. There is a typical optimum body shape, as evidenced by the researchers' discovery of a constrained range of optimal sizes (Jourard & Secord, 2015).

According to Hwang (2016), body cathexis is a factor that affects how people dress and feel about clothing. Many clients assume they have a physical fault when their apparel fails to provide their bodies the correct degree of body acuity. These buyers generally don't comprehend that clothing should be designed with the body in mind, not the other way around. These customers typically turn to external variables to assist them in getting the body of their dreams. Women develop unfavourable ideas about their own bodies when they don't conform to the expectations placed on female fashion models' bodies (Labat & DeLong, 2010).

Furthermore, many people believe that their ideal physical selves and their actual selves are not the same (Kaiser, 2017). The discrepancy between the customer's real and ideal body shapes suggests that she would prefer to have a different shape. The social norms and beauty standards that people have been exposed to frequently have an impact on how they perceive their ideal physical selves. According to research by Cusumano and Thompson (2017), the socially accepted ideal body standard fuels women's body dysmorphic disorder and negative body cathexis.

The actual weight may not have a substantial impact on how women feel about their bodies, despite its importance (Kwon & Parham, 2014). Women's thoughts of their weight—rather than their actual weight—had a higher impact on their dressing patterns, per the findings of Kwon and Parham's (2014) study on body perception and

dressing habits. Clothing might be utilised as a means of hiding or as a means of expressing one's individuality, depending on how they viewed different physical attributes (Kwon & Parham, 2014). The WTH ratio measures, rather than the apparent body weight, were used by both male and female respondents to judge attractiveness, according to Singh (2014). The goal of the study was to comprehend how the waist to hip (WTH) ratio affects how women are thought to be attractive.

This shows that a more appealing measure than weight is real proportion. According to the study's findings, a woman may exercise up until she reaches her target weight yet still be dissatisfied with how she appears. Body Mass Index (BMI) is a greater predictor of body beauty than WTH, according to studies by Tovee, Mason, and Cohen-Tovee (2013), Tovee, Reinhardt, Emery, and Cornelissen (2018), Tovee, Hancock, Mahmoodi, Singleton, and Cernalissen (2012), and Tovee, Hancock, Mahmoodi, and Tovee (2013). Singh's findings conflict with these findings. Another study by Harrison (2013) on ideal body proportions and mass media standards found that seeing television images of the thinnest persons increased women's desire for a smaller framed physique, especially their desire for a lower waist and hips.

These results are consistent with Singh and Tovee's predictions that women's body pleasure is significantly influenced by their BMI, WTH ratio, and the fact that women have a smaller bodily cathexis than men. Jourard and Secord (2015) discovered that none of the female study participants possessed the physical characteristics that the women believed to be ideal. When it comes to body size and shape, the majority of women hold themselves to standards that may be impossible to meet.

2.4 Body Shape

A person's body form can have a big impact on their body cathexis and design choices, according to previous research (Chattaraman & Rudd, 2016; Feather et al., 2016; Yoo, 2013). The majority of body shape research has focused on psychological characteristics of the customer, as opposed to physiological or perceptual considerations (Connell et al., 2016). It is so little understood how body shape affects conventional consumer behaviors that are based on visual analysis. Despite the fact that the current study deals with a psychological issue, namely body cathexis, the associations that were evaluated placed a focus on the visual features of the relationship between the body shape and garment shape.

In studies from the 1990s, body morphologies were examined by locating landmarks throughout the 2-D body outlines (Dryden & Mardia, 2018; Bookstein, 2011). Landmarks assist in form analysis by allowing examiners to compare body shapes by viewing them in an atomistic manner. The term "atomicistic" refers to a method that divides the shape of the body into various sections or points of comparison. Despite the fact that 2-D silhouettes frequently provide sufficient information, the human body is a three-dimensional (3-D) structure to be distinguished from the genuine thing (Costa & Cesar, 2011). A theory can be applied if shape inspection and analysis share a same foundation.

In 1988, Mossiman put up the idea that two people of different sizes could be considered to share the same body type. This shape-based categorization approach seeks to highlight differences across several groupings that fall under the same general heading (Costa & Cesar, 2011). Because there is such a wide variety of variation in female body types, it is challenging to classify women. As a result, it is challenging to divide different body types into a limited number of categories (Connell et al., 2016).

The first determines if a certain specified group that the input shape belongs to. The attempt to categorise forms has two components, according to Costa and Cesar (2011). This technique is known as shape recognition.

A form might be classified as a triangle, for instance, just because it resembles one. Finding the form category among a collection of shapes that are a component of a collection of previously identifiable shapes is the second aspect. Clustering is the name of this process. An assortment of shapes, for instance, might not resemble any existing figures, yet they might have some things in common. These characteristics enable the division and classification of shapes into groups based on shape similarity. Both strategies compare shapes; normally, this is done by comparing particular areas (landmarks) on the shapes. In the parts that follow, we'll talk about the classification schemes utilised for female body types.

2.5 The Body Shape Assessment Scale

Body Shape Assessment Scale (BSAS) created by Connell et al. (2016) has nine variations for evaluating frontal body shapes This scale was created when 42 women between the ages of 20 and 55 were selected, their body scans were examined, and existing body measurements were improved. This investigation discovered four unique frontal body types, which are described below (see Figure 2.1The shoulder point to shoulder point, frontal waistline, and the widest point between the waist and crotch line are employed as landmark sites to distinguish full body shapes in the four body types represented by digitally depicted female body silhouettes in the BSAS (Connell et al., 2016).

Hourglass figure: In proportion to shoulder and hip width, the waist is sharply defined and quite narrow.

Pear: Hip and thigh widths that appear wider than shoulders are called pear-shaped.

Rectangle: There is little to no waist definition and an even balance of shoulder and hip width.

Inverted Triangle: Triangle with the shoulders wider than the hips' widest point optically. Because it has a 5-step scale for each of the four featured body shapes, the BSAS is an ordinal scale. The number one for each phase stands for the first, smallest, and thinnest variation of the specific body form being treated. For instance, the third thinnest hourglass body form, designated H-3, is variation three of the hourglass body shape.

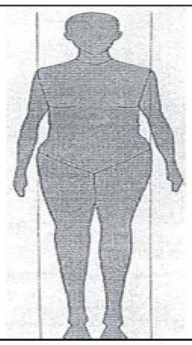
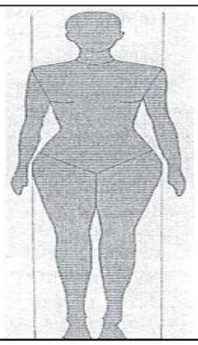
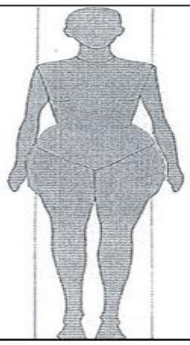
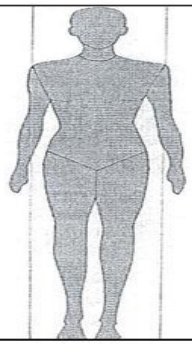
LABEL	R (RECTANGULAR)	H (HOURGLASS)	P (PEAR)	I (INVERTED TRIANGLE)
DESCRIPTION	SHOULDER AND HIP WIDTH ARE BALANCED WITH LITTLE TO NO WAIST DEFINITION	SHOULDER AND HIP WIDTH ARE BALANCED WITH CLEARLY DEFINED TO VERY SMALL WAIST IN RELATION TO SHOULDER AND HIP WIDTH.	HIP AND/OR THIGH WIDTH IS VISUALLY GREATER THAN SHOULDER WIDTH.	SHOULDER WIDTH IS VISUALLY GREATER THAN FULLEST WIDTH AT HIP OR THIGHS
STIMULI				

***Figure 2.1*. Body Shape Assessment Scale, Source: (Connell et al., 2016).**

2.5.1 Bonnie August's Body I.D. Scale

Three of Bonnie August's Body I.D. (1981) scale's eleven proportion designators are the front view width, side view width, and front view length. The various body form types' chosen landmarks are visually matched to the alphabetic letters used to indicate these proportions. August chose the alphabet over shape names out of fear that some shape categories would be offensive to women. In alphabetical order, they are A, X, H, V, W, Y, T, b, d, I, and r (see Figure 2). Due to the scale's layout, the frontal and side

view categories can be mixed. The remaining portions of the scale are irrelevant for the current study, which will only focus on the front view width categories (A, X, H, and V) of the scale. According to August's (1981) Body I.D. technique, women should trace their figures on a larger sheet of paper before using the "squint trick." The spectator must squint in order to discern the primary features of the body silhouette when utilizing this technique. When the dominant areas have been located, the observer can assess them by contrasting them with the Body I.D. stimuli (see Figure 2.2).

Since it lacks a ranking, the metric Fiore & Kimle, 2017) utilized is a hypothetical scale. The body silhouettes used in Bonnie August's Body I.D. scale are the stimulus, and each one has an accompanying alphabetic representation that corresponds to one of the body's distinctive features. The landmarks used to generate this scale were the shoulder points, natural waistline, and greatest hip point (Fiore & Kimle, 2017). This scale additionally assigns unidentified shapes to the category of shape recognition.

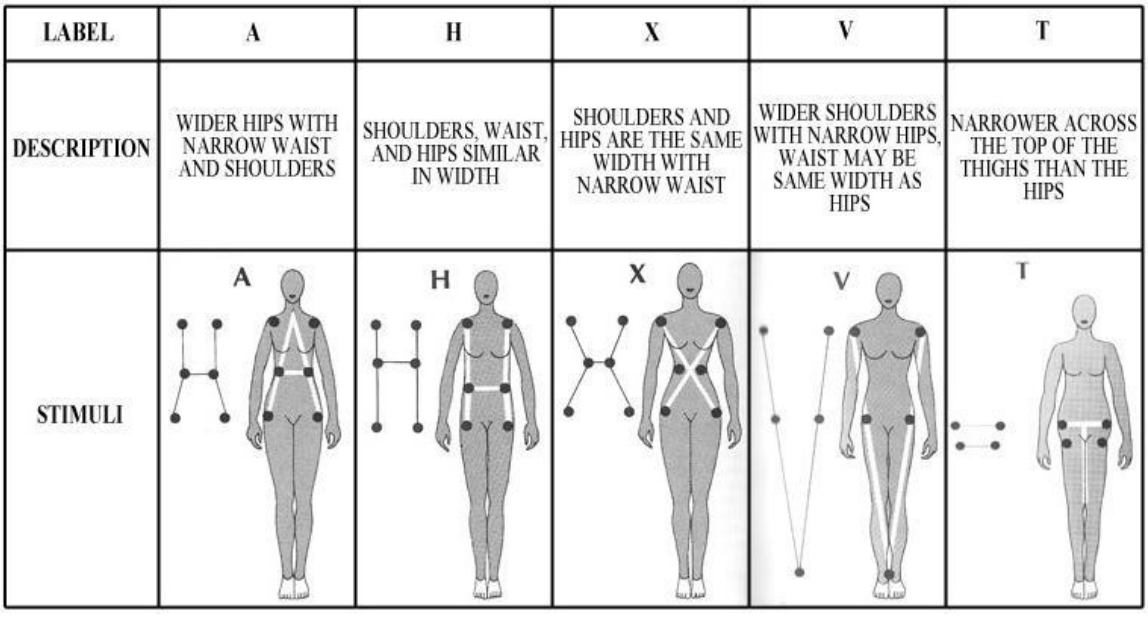


Figure 2.2 Source: Bonnie August Body I.D. Scale (August, 1981).

2.5.2 Douty's Body Build Scale

The Douty's Body Build Scale (Douty, 2018) lists five different body types. The body builds are given on this ordinal scale from smallest to greatest. The chest, belly, belly button, thighs, arms, and abdomen can all vary (see Figure 2.3). The scale's reference points are these points. Frontal images of female silhouettes that progressively grow in size (width, not length) in accordance with the numerical representation of the scale serve as the stimulus for Douty's Body Build Scale.

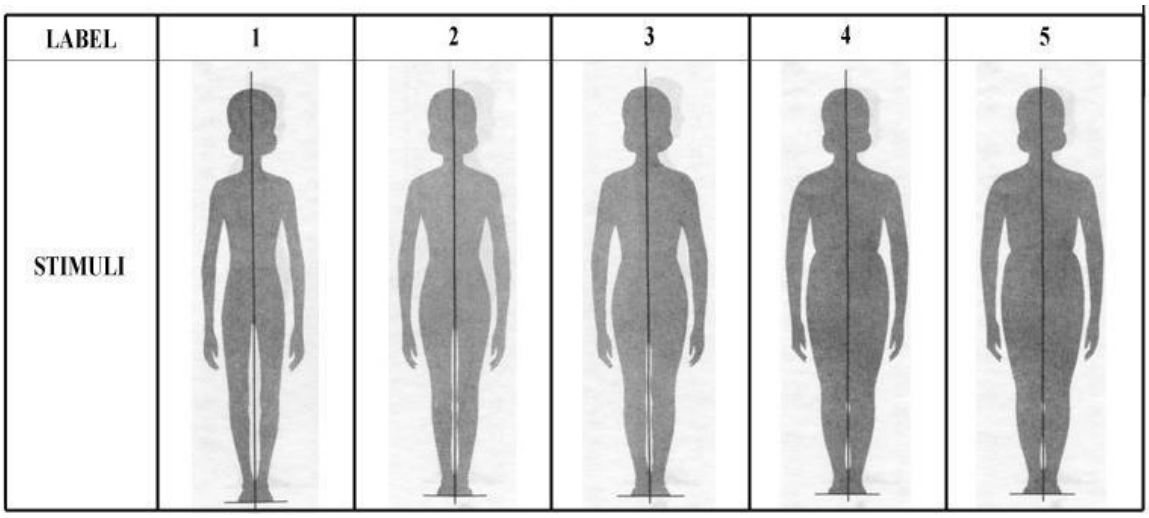


Figure 2.3. **Douty body build scale Source: (Douty, 2018).**

2.5.3 Female Figure Identification Technique (FFIT) for Apparel

With the exception of employing circumferential measurements rather than silhouettes, the Female Figure Identification Technique (FFIT) scale was developed using an approach that is remarkably similar to the BSAS (Simmons, 2012). A [TC]2 NX-12 3-D Textile and Clothing Technology should be used before body scanner to seek for patterns, researchers first evaluated the data on female body shape that was previously accessible. The following five shapes were created by combining common body shapes with the information already available: hips broader than the shoulder define the triangle shape; shoulders that are wider than hips define an inverted triangle;

rectangle, which is characterized by consistency in the shoulder, waist, and hip widths; Equally wide shoulder and hip widths that produced an hourglass shape, with a distinct waistline; and oval, which is characterized by a large or full abdomen with a thin top and bottom torso (Simmons, 2012).

Then, these five shapes were evaluated using 222 women over the age of 18's body scan data and mathematical criteria to identify each body shape. The breast, waist, stomach, and abdomen circumferences were used as landmarks in this evaluation. Due to the difficulty in identifying so many respondents, the results indicated the need for more body form classifications. Four new categories were produced in order to address this issue. These categories were given the names spoon, diamond, bottom hourglass, and top hourglass because of how much they resembled the shapes of the things they were named for. When compared to the scales mentioned above, the FFIT scale (Simmons, 2012) (see Figure 2.4) uses a range of landmark combinations based on the body form:

Hourglass figures: have proportionate hip and bust sizes and a distinct waist. The bust, waist, and hips serve as benchmarks for this shape.

Bottom Hourglass: The ratios of the bust to waist and the hip to waist are still sufficient to define the waist on this hourglass-shaped body, despite the hips being wider than the bust. Benchmarks for this shape are also the bust, waist, and hips.

Top Hourglass: Another hourglass shape, however this one maintains a distinct waist and has a larger chest diameter than hip. Benchmarks for this shape are also the bust, waist, and hips.

Spoon: The waist tapers from the bust to create a distinct waistline, while the high hip and hip spread outward result in a larger hip-to-waist ratio. This shape is distinguished by its breasts, waist, hips, and high hips.

Rectangle: Due to the low bust-to-waist and waist-to-hip ratios, the measurements of the bust and hips are practically identical, and there is no obvious waistline. The parameters for this shape are the bust, waist, and hips.

Diamond: The values of the bust and hip measures may be more than or equal to the values of the abdomen, waist, and stomach in this shape. The bust, waist, hips, and abdomen serve as cues for this shape.

Oval: The mean measurements of the waist, abdomen, and stomach are higher than the hips but lower than the bust. The bust, waist, hips, stomach, and abdomen serve as cues for this shape.

Triangle: Because of its wider hips than bust and small hip-to-waist ratio, this shape varies from the bottom hourglass. The ratio of breast to waist is not taken into consideration. The parameters for this shape are the bust, waist, and hips.

Inverted triangle: The inverted triangle differs from the top hourglass in that it has a lower bust-to-waist ratio and a larger bust in relation to the hips; the hip-to-waist ratio is ignored. The parameters for this shape are the bust, waist, and hips.

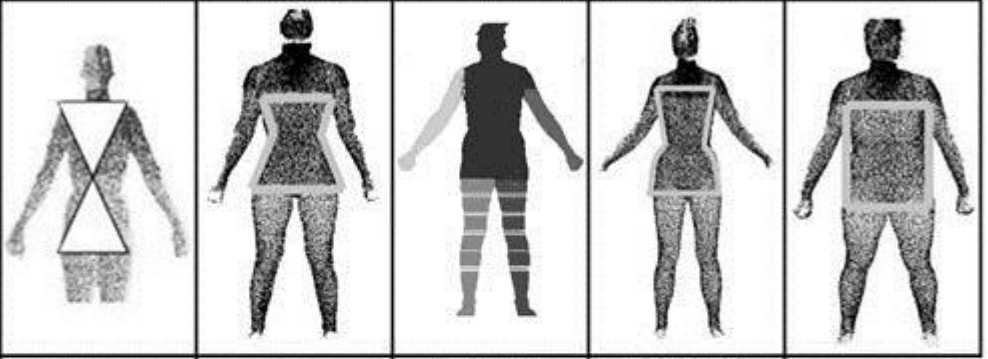
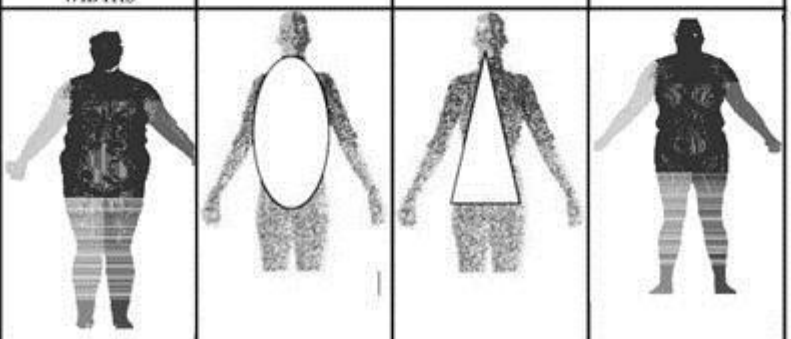
LABEL	HOURGLASS	BOTTOM HOURGLASS	TOP HOURGLASS	SPOON	RECTANGLE
DESCRIPTION	APPEARS TO BE PROPORTIONAL IN BUST AND HIP WITH A CLEARLY DEFINED WAIST	WIDER HIP THAN BUST, BUT MAINTAINS A CLEARLY DEFINED WAIST AS THE BUST-TO-WAIST AND HIP-TO-WAIST RATIOS ARE STILL SUFFICIENT ENOUGH TO CREATE THE WAIST	LARGER BUST CIRCUMFERENCE IN COMPARISON TO THE HIP, BUT MAINTAINS A CLEARLY DEFINED WAIST	WAIST TAPERS FROM THE BUST CREATING A DEFINED WAISTLINE, BUT THE HIGH HIP AND HIP CAST OUTWARD TO THE SIDE	BUST AND HIP WIDTHS ARE NEARLY EQUAL
STIMULI					
LABEL	DIAMOND	OVAL	TRIANGLE	INVERTED TRIANGLE	
DESCRIPTION	LARGE ABDOMEN, WAIST AND STOMACH VALUES, WHICH MAY EXCEED OR EQUAL THE VALUE OF THE BUST AND HIP WIDTHS	AVERAGED MEASURES FROM THE STOMACH, WAIST, AND ABDOMEN ARE LOWER THAN THE BUST	HIPS THAT ARE WIDER THAN THE BUST	LARGER BUST WHEN COMPARED TO THE HIPS, WAIST NOT CONSIDERED.	
STIMULI					

***Figure 2.4*. Female Figure Identification Technique (FFIT) Scale**

Source: (Simmons, 2012).

2.5.4 Obesity and Thinness Scale

Stunkard, Sorenson, and Schulsinger created the Obesity and Thinness Scale in 2013. Males and females in nine various body types, ranging from lean to obese, are depicted as visual cues on the scale (see Figure 2.5). The stimuli are rated in terms of

thinness or obesity, and the scale's usefulness depends on preserving this ranking, making it an ordinal scale. This scale is used methodically with form recognition.

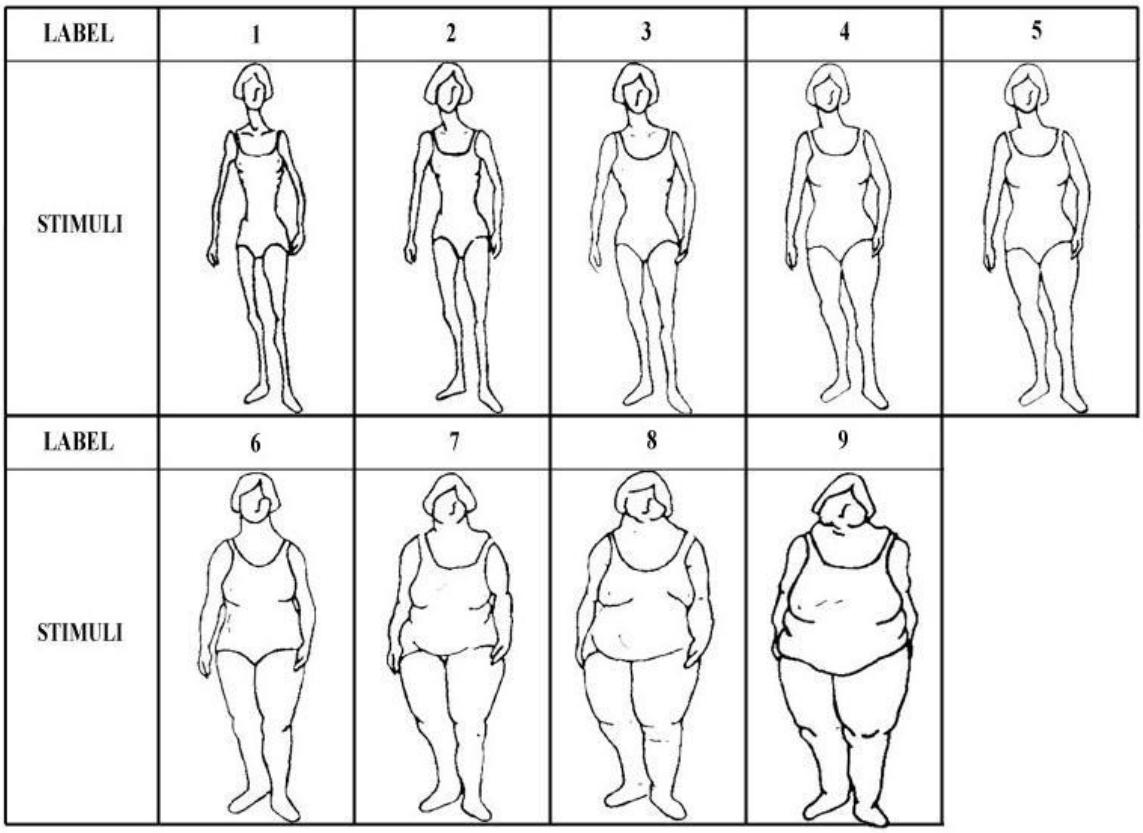


***Figure 2.5*. Stunkard's Obesity and Thinness Scale**

Source: (Stunkard et al, 2013, pg. 119)

2.6 Garment industry in Ghana

In Ghana, 138 medium- and large-scale clothing manufacturing businesses were recorded as being registered with the Ministry of Industry in 1979. The loss was so rapid that by 1987, there were only about 22 left. By 1995, there were roughly 72 medium- and large-sized businesses overall, the most of which were situated in Accra. Since then, about 50 more medium-sized businesses have joined the active list. Some of the notable companies that have closed are UTAMS Manufacturing Co., Zakour TextilesLtd., Corsetry Ltd., Glamour Garment Factory, Universal Garments Ltd.,

Mutual Union (Gh) Company Ltd., and 1NTRA Garment. Accra's Ministry of Trade and Industry.

The slump has been particularly hard on large and medium-sized firms due to a number of factors, such as competition from imported new goods and imported old apparel, as well as worn-out machinery, a lack of liquidity, and marketing-related challenges. Although it is difficult to estimate the precise amount, 69 percent of the country's small-scale clothing makers are located in Accra. At the end of 1994, 126 small-scale business owners had registered with the Ministry of Trade and Industry, 1994, p. 2, national Board for Small-scale Industries.

The following categories can be used to organize the primary product categories of the apparel industry: Boys' and girls' outfits are examples of children's clothing. Ladies' clothing examples include blouses, skirts, underwear, brassieres, nightgowns, ladies' dresses, morning jackets, corsets, etc. iii) Gent's dress in ties, safari suits, T-shirts, pajamas, hosiery, and men's undergarments. iv) other parasols, sheets, zips, elastic braids, thread, handkerchiefs, etc.

The performance of the garment sub-sector plunged in the early 1980s, but since 1986, with the exception of 1981, capacity utilization has been steadily rising. A significant influx of used clothing made 1991 somewhat problematic for the domestic garment industry, making it very challenging for many of them to sell their goods. As local factories were consequently forced to reduce their output (Ministry of Trade and Industry, Accra, 1995).

Printed and Unprinted textile materials, knit fabrics, zip fasteners, elastic braids, buttons, sewing thread, trimmings, etc. are important raw materials in the garment subsector. Currently available materials for sports apparel include nylon jersey and kente fabric. All other raw materials are available locally, with the exception of

rustproof pins, collarbones, butterfly pins, and fusible canvas and haircloth. The sub-sector employed roughly 25,000 people in 1992 as the industry shifted from large-scale to small-scale and home operations, but the number is projected to be closer to 20,000 people in 1995 due to the closure of about 10 large-scale garment manufacturers.

The Ghana Export Promotion Council estimates that the value of all exported apparel was 761,702 U.S. dollars in 1993 and 1,822,584 U.S. dollars in 1994, accounting for 2.34 percent of the country's non-traditional export value in that year.

2.7 Social Psychology of Clothing

In comparison to other disciplines, theories in the social psychology of clothes are relatively young, claims Dixon (2017). There is a brief history of social psychology's application to the study of clothing. In 1962, when academics were attempting to discover more about human behaviour, Sybers and Roach (1962) give an early overview of the pioneering scholar's study. clothes study previously reflected current challenges and concentrated on standardisation, consumer purchasing, conservation, and garment manufacturing. Sociological studies of clothes and human behaviour have since gained popularity. In 1904, professor of sociology George Simmel was recognised as one of the pioneers of social/psychological theory and clothing theory.

In his article "Fashion" from 1904, Simmel discussed fashion in terms of human behaviour. Simmel made an important contribution to the topic, but later studies (Sybers & Roach, 1962, quoted in Dibley, 2014) showed that clothing was a manifestation of a person's inner wants. In order to look into prospective social science-related study issues in textiles and apparel, Home Economists sponsored a

series of expert seminars in 1947. The discussions, which were moderated by home economists from top institutions and attended by sociologists, psychologists, and economists, centred on the goals of clothes and how clothing benefits society as a whole. Authors from the home economics, apparel, and textiles departments started publishing journal articles and pamphlets about the social relevance of clothing in the 1950s. In this domain, detailed knowledge accumulated over time, resulting in developing effective research procedures and theoretical frameworks within which hypotheses could be tested (Dibley, 2014).

Clarifying the effect of clothing on human relationships required an understanding of social psychology's well-organized body of knowledge and theory (Dixon, 2017). By the late 1970s, formal studies and research into the social meaning of clothes had begun, leading to the creation of publications in the area. Facts on ingrained theories, lookup, and human conduct, as well as on attire and conduct, were presented by Lennon and Davis (2019). To investigate social-psychological theories about the significance of clothing, Nagasawa, Hutton, and Kaiser (2011) provided a framework. In 1997, Kaiser employed symbolic play to set trends, arguing that every aspect of clothing has a deeper, changing symbolic meaning. In the years that followed, additional students from numerous clothing-related disciplines reacted to Nagasawa et al. (2011).

2.7.1 Social Adaptation Theory

A social adaptation, which comprises of the social and psychological components of a person's pondering and reasoning that increase values, served as the theoretical underpinning for this search in the past. Social adaptation is supported by one of psychology's best interaction theories. This theory holds that people adapt to different

life roles through economic growth and success (Kahle, 2016). According to the Piagetian theories that underpin the concept of social adaptation, recordings are integrated into present cognitive structures by using values. Due to similar interactions, information may also contribute to the improvement of current cognitive structures.

The statistics are then set up such that past information and clean statistics can be combined. This method successfully updates both new and old data, leading to a quicker integration of the records (Kahle, 2016). In other words, a person takes in external data and modifies it along with themselves to allow for adaptation. The integration and individual meanings of each person will differ. Kahle, on the other hand, created analogies between experiences and semantic contexts that people from the same demographic group would have, leading to observable similarities and reaction patterns. Additionally, those in subcultures might profit from this. People make money off of it.

A cognitive model based on psychology called "social adaptation" is used to study how people use clothing as part of social psychology ideas. In studies on dress, there is a connection between views about appearance and cognition, particularly social cognition. The cognitive process, or more specifically, the underpinnings of people's perceptions and cognitions, is the subject of research into social cognition (Johnson, Schofield, & Yurchisin, 2012). The study of social cognition focuses on how people construct their own identities and opinions of others (Johnson et al., 2012). The paper, per the authors, "emphasises the use of cognitive psychological techniques with social objects" (Lennon & Davis, 2019). Social adaptation is a cognitive mannequin based on psychology that falls within the paradigm of social psychology theories to examine the means of clothing.

In studies on dress, there is a connection between views about appearance and cognition, particularly social cognition. The cognitive process, or more specifically, the underpinnings of people's perceptions and cognitions, is the subject of research into social cognition (Johnson, Schofield, & Yurchisin, 2012). The study of social cognition focuses on how people construct their own identities and opinions of others (Johnson et al., 2012). The paper, per the authors, "emphasises the use of cognitive psychological techniques with social objects" (Lennon & Davis, 2019).

In their study on clothing, Nagasawa et al. (2011) used a cognitive approach, which is common in social psychology. According to the researchers, the cognitive approach "focuses mainly on how humans structure impressions of others and themselves" through the use of clothing cues. In instances where personality and attributes are discovered by others through perception, social interactions, and environmental stimulation, they said, the cognitive method is confined to only describing appearances. Sadly, this cognitive paradigm no longer permits self-evaluation or self-examination of internal and external issues, such as values, which may have an impact on decisions about what to dress and how to appear.

According to Lennon and Davis (2019), a social cognitive framework "provides researchers in the discipline with perception into gaps and deficiencies in apparel preference research." This is why they believe it to be a valuable theoretical foundation for understanding clothes and human behavior. A component of the attribution theory, the self-perception hypothesis, was previously examined by Lennon and Davis (2019). People can make decisions using the self-perception principle to decide on the goal of their social behaviour in the same manner that they would decide the goal of the social behaviour of other people. Due to its substantial social, cognitive, and behavioural research, Lennon and Davis (2019) strongly

suggested adopting social cognition as a paradigm for reading issue effects and clothing choice.

The most recent findings in clothing and material studies suggest a relationship between social cognition and impact growth. Because it encompasses a wide range of social, cognitive, and psychological viewpoints, Lennon and Davis (2019) strongly suggested utilising social cognition as a paradigm for reading issue effects and clothing choice. The most recent findings in garment and material research suggest a connection between social cognition and impact development (Johnson et al., 2012, p. 126). When examining influence development, we discover that people may draw conclusions because they have created intellectual classes to manage the massive amounts of data they have gathered about one another (Johnson et al., 2012, p. 126).

These intellectual disciplines help to organise knowledge, deduce new knowledge, pay attention to knowledge, and provide resources during the selection process. The observer's preference for goal cues as well as the interpretation attached to these cues may also be influenced by a number of observer characteristics, including recent experience, personal goals, and preferences. People frequently associate different intelligence levels with observable external factors like clothing. All social cognition theories rely on the idea that people infer facts about others solely from their attire and outward appearance.

Only the self-perception principle offers a chance to learn about someone solely based on how they perceive themselves. The notion focuses on individuals within societal circumstances. Due to the necessary records that each can provide, this teaches us the importance of concentrating on both societal and individual elements. The greatest concept for this study is social adaptation since it provides a framework

for assessing the person, allowing each person to cognitively evaluate themselves both internally (personally) and outside (socially) to justify their clothing choices.

2.7.2 Social Factors and Choice of Clothing

It is obvious that society is oversaturated with images of beauty, perfection, and exact appearances. We would all agree that there are more than just physical similarities between us if one were to base their decision about our lifestyle purely on images from television, movies, and magazines. Perhaps there is a more divisive undertone lurking beneath the abundance of desirable entertainers. If you encounter someone who does not fit the thin definition of a precise look while watching television, reading a magazine, or attending a movie, chances are good that person will be portrayed as the "bad guy" or, more likely, the "nerd" (S) (Johnson et al., 2012, p. 126).

What is deemed ideal by society can be categorised. Costume achieves two opposing objectives in the eyes of its audience: it unites individuals who dress similarly into a single identity while excluding those who dress differently (Dixon, 2017). The conduct of gowns varies greatly as a result. Africans, for instance, frequently negotiated their ethnic identity by donning a blend of native and Western dress ensembles. One can declare their authority in both passive and active ways by how they dress.

2.7.3 How obese short women are perceived in the fashion industry

Despite the fact that more than one-third of Americans are obese, it may be expected that clothing alternatives would reflect this fact (Overweight & Obesity, 2013). Weightism, which is defined as "prejudice or discrimination against people

based on body weight" (Fox-Kales, 2011, p.158), is just one example that may be found in the small clothes sector. In the workplace, where obese men and women earn much less money than their slim counterparts (Baum & Ford 2014) and where obese women are more likely to encounter stigma from human resource professionals (Giel, et al. 2012), weightism has been particularly visible.

According to research, weight discrimination can lead to "social stigmatism and stereotyping, and that can lead to depression, discrimination, and binge eating" (Dye, 2018, p. 2). As a result, weightism not only exists in the workplace but also has the potential to make sufferers binge eat even more. Even though it mostly affects adults, childhood weightism has been documented. This behaviour and these weight-related beliefs are "firmly established in most elementary schools as both boys and girls joke about, tease, and bully classmates whose body sizes do not fit the cultural norm" (Steiner-Adair & Vorenberg, 2019, p.117).

Children have reported "significantly higher rates of mistreatment reported by overweight and obese adolescents than those of normal weight" as a result of these ideas being put into practise (Buccianeri et al. 2013, p. 49). Due to the limited number of fashion options, weight discrimination is harmful. For kids, it can result in a shortage of fashion options that would make them stand out among their peers. Adults who are obese may have few options and may need to shop online for apparel, which poses even more serious issues.

According to conventional belief, one must look their best and present themselves professionally in order to land a high-paying job. However, one requires money to buy professional gear, which an obese person might not be able to do without a well-paying work. Therefore, there are economic ramifications to the relationship between overweight women's fashion choices.

2.8 The challenges obese females face in their choice of clothes

The traditional "weight-related belief system" that permeates American culture is being challenged by the social movement known as fat activism (Wann, 2019, p. ix). The National Association to Advance Fat Acceptance (NAAFA), which was founded in 1969, is credited with launching this advocacy in the United States (Wann, 2019, p. x). An "average-sized" man "observed the suffering of his large wife but had experienced at first hand the embarrassment and difficulties of being a man who is attracted to fat women" (Millman, 2010, p. 4). This is when it all started.

This inspired him to create a space where overweight people could express themselves freely and accept their size. The NAAFA has outlined their mission to "eliminate discrimination based on body size and provide fat people with the tools for self-empowerment through advocacy, public education, and support" (NAAFA, 2014) through conferences, publications, social gatherings, and other public activities.

One of the most well-known advocates for the rights of people who are overweight, Marilyn Wann, has emphasised the struggles that these people face because they "experience cruelty- the crushing burden of fat hatred" and "are subject to discrimination in employment, housing, in access to theatres and restaurants" (Cooke, 2016, para. 15). As a result, the group of fat activists seeks to challenge these assumptions on a political and social level.

Another advancement in this movement came with the introduction of the Health at Every Size (HAES) program. Even though it was not specifically founded by members or influenced by the fat activism movement, the NAAFA has embraced this attitude because it is more inclusive and less judgmental than other, more traditional health initiatives. According to Burgard (2019, p. 42), the HAES strategy focuses for "self-acceptance and healthy daily practices, regardless of whether a person's weight

changes." In contrast to other medical conditions, being overweight is frequently viewed as a problem brought on exclusively by the obese person and heavily relies on BMI estimates.

This disregards additional elements such various medical disorders or the inherited nature of fat. Instead, HAES emphasizes: enhancing general health without setting specific weight goals; physical body acceptance; eating without following a specific food plan or diet; participating in physical activity for the enjoyment of it and for its health benefits; and eliminating weight bias (Burgard, 2019). Instead, than attempting to fit in with cultural norms, individuals will reach their "natural" weight by adhering to these five principles (Burgard, 2019). By projecting healthy weight for each individual, the focus is shifted away from appearing a certain way.

Even while this movement has given rise to certain theories and provided assistance for obese people, it is not a very well-known group; "we don't have places of pride to get together on a daily basis...No fat-pride bar exists. Our initial response is to support fat-hating businesses (Weight Watchers, stomach amputation, etc.), not to fight back. We seek acceptance from our oppressors rather than calling for self-respect" (Cooke, 2016, p. 16).

This advocacy has given rise to a wide range of organizations, including the Health at Every Size campaign, online body positive communities, and fat fashion. Fat activism makes an effort to bridge the gap between these several efforts in order to better the living conditions of obese persons who may be facing various disadvantages as a result of their size.

2.9. Fashion Tips for Various Shapes Triangle

For women who have a triangle figure, your style goal is to balance your top and bottom halves by giving the impression that your upper body is wider.

Do wear:

- shoulder pads to widen your shoulders,
- short sleeves,
- shoulder patterns to emphasize your upper body,
- medium to high necklines, and accessories.
- dresses with straight or slightly flared skirts
- Low rise pants to avoid a gaping waistline
- Straight and bootleg pants
- attire that accentuates your waist

Source: (Stunkard et al, 2013)

Do not wear:

- baggy clothing and apparel that makes your hips bulkier (hip-line hems or design lines only serve to make the hips bigger).
- Pleated pants or skirts

Inverted Triangle

Your major style goals while dressing to accentuate your inverted triangle body type are to balance your upper and lower body to provide the appearance of a flawless hourglass figure and to detract attention from your upper body.

Do wear:

flowing fabrics,

• V-necklines,

• three-quarter sleeves,

• well-adjusted bras,

• flowy tops and dresses that fit snugly around the waist

• A-line skirts,

• flared pants,

• skirts with satin, denim, or tweed materials because they draw attention to your lower body.

Do not wear:

• bulky fabrics and styles that will emphasize your shoulders

• high necklines

• big collared shirts

• tapered skirts and pants

Source: (Stunkard et al, 2013)

Rectangle

For a woman with a rectangular figure, adding curves by defining your shoulder, hips, and waist is your main stylistic goal.

Do wear:

- shoulder padding (but please don't overdo it) to draw attention to your shoulders and give you a feminine body figure.
- Fitted clothing

- Sleeveless and short-sleeved tops and dresses if your upper arm is not too little.
- Clothing with a medium to high neckline
- garments that flow or wrap about the waist
- flat-fronted pants that are straight to mildly flared
- Shirts with A-line

Do not wear:

- clinging materials and fitting clothing, which will make you look extremely erect.
- Avoid low necklines because they will highlight your flat bust.
- Avoid wearing big shirts and baggy bottoms.
- Avoid wearing narrow skirts because they emphasize your flat bottom and are unflattering.

Hourglass

Your main fashion goals are to draw attention to your curves, especially your waist, without packing on more weight.

Do wear:

- fitted and semi-fitting clothing
- soft, clingy, flowing materials;
- Medium-low to low necklines
- defined waistlines on skirts; straight,
- slightly flared pants;
- straight, slightly flared shirts
- belt your waist to accentuate your figure;

Whatever that is comfy for you

Do not wear:

Thick materials or loose-fitting clothing since they will conceal your figure

Round/Oval

The primary fashion goals of rounded/oval-shaped women are to bring attention upward to your shoulders and face.

Do wear:

- • eye-catching jewelry, such as earrings and necklaces, that directs attention to your shoulders and face
- Clothing that is loose-fitting and semi-fitted
- extremely fitting bras and supportive undergarments to reduce your belly
- It looks nicer when tops and bottoms are the same color.
- Low-cut shirts
- Untucked tops that don't draw attention to the stomach's round shape
- flowy tops and dresses that fit snugly around the waist

Straight pants made of a supple, flowing material are a fantastic option.

Do not wear:

• slinky materials

• Form-fitting clothing

• material with prominent designs

• V-necklines

• shirts with tucks

• pleated skirts, which accentuate your form by adding volume;

Source: (Stunkard et al, 2013)

Diamond

The primary stylistic objectives of the diamond-shaped female are to give the appearance of a longer, inverted triangular body shape and to bring attention upward to their shoulders and face..

Do wear:

- eye-catching jewelry, such as earrings and necklaces, that directs attention to your shoulders and face
- Semi-fitted and baggy clothing
- Supportive undergarments and bras with proper fit and adjustment
- the top and bottom in the same colours
- Low-cut shirts
- Untucked shirts
- flowy tops and dresses that fit snugly around the waist
- flat-fronted straight pants in a fluid, silky fabric
- skirts that are straight with a modest flair.

Do not wear:

- slinky materials
- Clothes that fit
- material with prominent designs

- V-necklines
- Belts
- shirts with tucks
- Puffs
- tapered or narrow skirts or pants

Source: (Stunkard et al, 2013)

2.10 Conceptual Framework

The premise behind this study is important since it is the first to attribute differences between actual and ideal body forms to preferences for clothing. No one has truly scientifically evaluated how women utilise clothing, especially garment shapes, to lessen differences between their actual and ideal body shapes, despite previous studies showing that people use clothing to make themselves look slimmer and change how others perceive them. The findings of this study demonstrate that the pursuit of the ideal body type influences consumer purchase decisions.

The predictions of the respondents' motivations in this study were based on Fiore and Kimle's (2017) explanation of body shape balancing methods. Even though there is no solid data to determine if respondents were exposed to these balancing approaches, it is likely that they decrease or remove the disparity between their actual and ideal body forms, they naturally picked outfit shapes that balanced their current body shapes. This finding also implies that perceptual balance is the ultimate objective of garment purchasers.

This study looked at real and ideal body forms from the viewpoint of the individual; possibly different findings would have emerged if actual and ideal body shapes had been looked at from the perspective of others. The survey also looked at the

discrepancies between customers who are college-aged and their ideal body forms. These results showed that customers who matched the sample's demographics shared similar ideal body types. Body types were more at ease and more inclined to purchase dress shapes that visually balance the body and assist achieve optimum proportions as a result of these similarities, which appeared to have an impact on preferences in a reciprocal manner.

This study offers considerable research-based data on the topic, but further research is needed to determine how body type affects consumer choices other than dress shape. Branson and Sweeney's (1991) Clothing Comfort Model and Sproles' (1979) Fashion Adoption Process were used to create the conceptual foundation for this study. The application of this conceptual model or preference model with success shows a connection and potential symbiosis between comfort and the process of acquiring fashion.

Researchers studying how consumers adopt clothing may wish to use this preference model more because it has the ability to be applied to any component of clothing and goes well beyond dress shape. The findings persisted even after the two measures for purchase intent and comfort were investigated independently. Similar patterns were seen in terms of comfort and purchase intention among body types that belonged to the same group.

As a result, if a customer showed a higher level of purchase intent for a certain grouping of clothing shapes, she also showed a correspondingly higher level of comfort with that grouping. The conceptual model is strengthened by this result from the study's findings that comfort and purchase intent may be slightly related. Future research based on this preference model is needed to support the association between comfort and fashion adoption and to improve the model's validity.

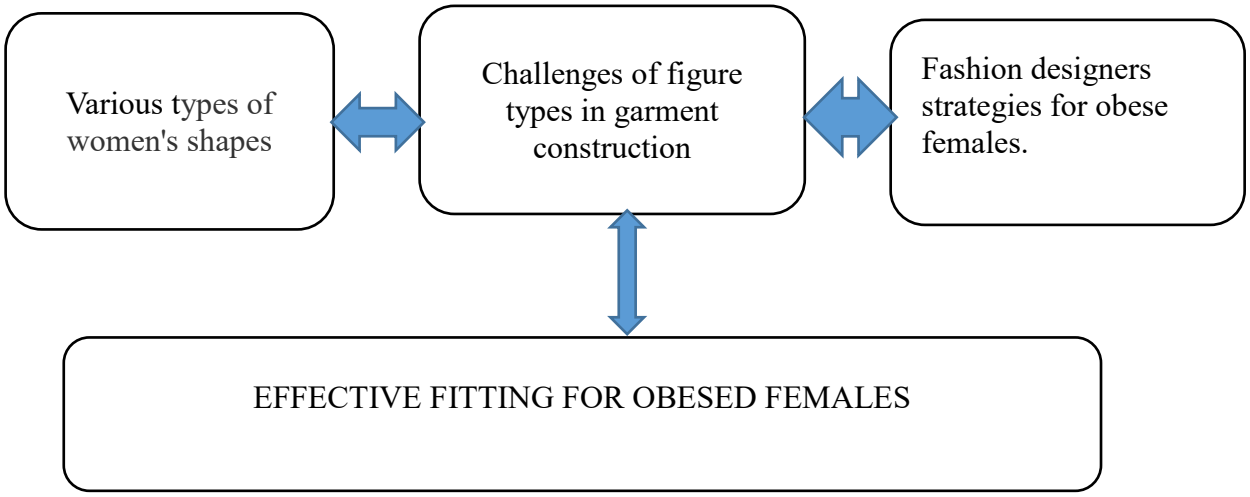


Figure 2.6 Conceptual model

Source: Author construct, (2022)

It also made an impression to watch how clothes was put together or how it was worn on the body. Additionally, it has been found that visual aspects of the body, such as the surface, movements, and forms, can leave an imprint. According to the study, one may infer information about the person from their appearance and clothing, and observers concurred that their impressions were reliable. The way a person dresses and presents themselves generally gives people information about their personality traits, physical and biological attributes, demographic and social standing, attitudes and feelings, occupational role, and intents or motives (Johnson et al., 2010).

CHAPTER THREE

METHODOLOGY

3.0 Introduction

The study methodology used by the researcher to arrive at the conclusions was detailed in this chapter. This chapter includes descriptions of the research design, research approach, population, sampling and sample processes, data collection tools, data collection measures, data analysis, and ethical considerations.

3.1 Research Design

The research design effectively directs how the entire investigation is carried out (Burns & Bush 2012). Before beginning data collecting and analysis, the researcher must use a proper study design, as this will determine the project's logical progression. To ensure rigor during the investigation process and confidence in the study's findings, it is crucial to have a clear and organized research design from the commencement of the project. There may be several steps to this procedure, and each stage has its own results.

According to Hair et al. (2013), a robust and systematic study design will determine the kind of data, the method of data collecting, the sample methodology to be utilized, the time-line, and budget compliance. In fact, it will be beneficial to match the proposed methodology with the study's concerns. For the study, the researcher utilized a descriptive research approach. This is a study that describes the characteristics of a certain phenomenon. It chooses how things are done and reports on it. Thus, descriptive research entails gathering information to test hypotheses or respond to research questions about the subject's current situation (Bryman, 2014).

According to Kothari (2010), descriptive research accurately profiles people, events, or circumstances. The descriptive survey is therefore thought to be the optimum

approach to achieving the goals of this study. The main goals of descriptive research, according to Kombo and Tromp (2006), are to define the features of the population, make precise predictions, and test associational correlations. It employed a quantitative research design. According to Hoepfl (2017), quantitative researchers aim to anticipate outcomes, determine causes, and generalize their findings. Data collecting is often measured, expressed quantitatively, and used for statistical data analysis in quantitative research. Researchers can test theories and proposed correlations using quantitative methodologies.

A methodical approach to study is quantitative research. It entails quantifying or quantifying characteristics and providing the 'what' and 'how many' replies. Demand Media Inc. (2012) claims that because the research data is based on numbers, statistical tools may be used to examine it. The link between an independent variable and the dependent variables under study is examined through this research methodology. The hypotheses are derived by researchers, who then use statistical software like SPSS to evaluate them. But there are always drawbacks to positives. Quantitative research has two drawbacks: it overlooks the natural environment, unlike qualitative research. In addition, a big sample size is necessary to perform the analysis statistical tool.

3.2 Profile of the Study Area

The Krowor Municipal is one of Ghana's 261 Metropolitan, Municipal and District Assemblies (MMDAs), one of the 29 MMDAs in the Greater Accra Region. The Krowor Municipal Assembly, which is distinct from the Ledzekuku-Krowor Municipal Assembly, is one of the 38 newly created and renovated District Assemblies in 2018.

Nungua serves as the administrative center for the Krowor Municipal Assembly, which was founded by Legislative Instrument (LI) 2318. It was inaugurated on March 15, 2018, along with the other 37 newly created districts. Krowor Municipal Assembly has a total area of (sq km) and is located on the coast at (o'N) longitude and (o'W) latitude. The Ledzokuku Municipal Assembly, Tema West Municipal Assembly, the Gulf of Guinea, and a small portion of the Accra-Tema Freeway form the western, eastern, southern, and northern boundaries of the Krowor Municipality. The Municipality's population is 143,012 as per the population and housing census of 2021, with 70,735 men and 72,277 women.

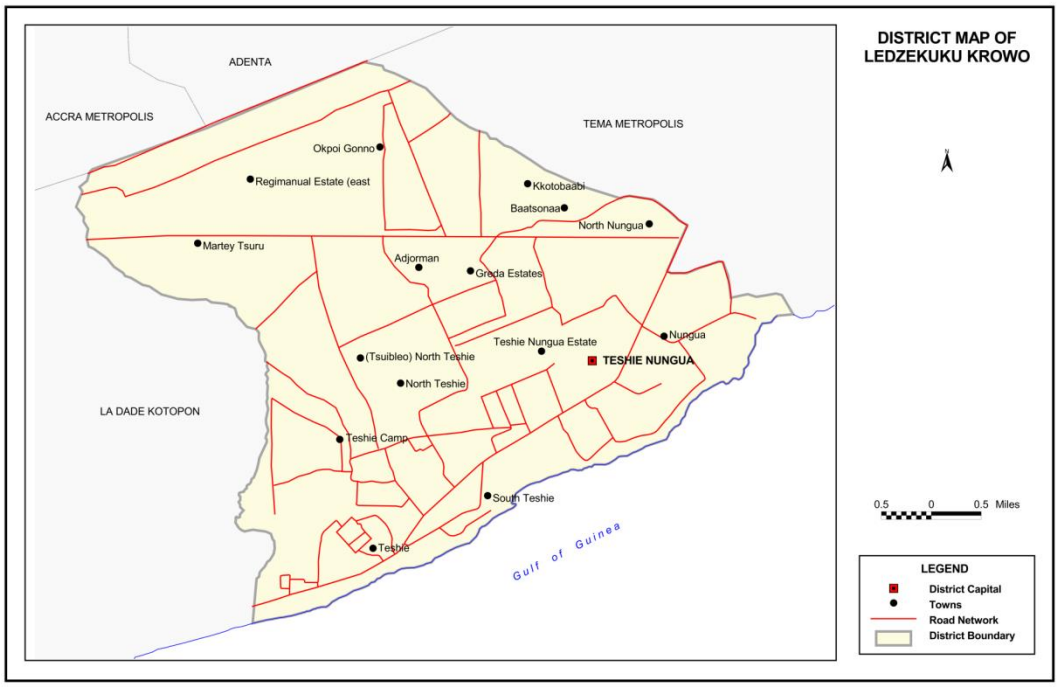


Figure 3.1: Map of LEKMA

3.3 Population

Population is defined by Mugenda (2008) as the collection of all groupings of individuals, objects, items, cases, articles, or things that share similar traits or features.

According to Kothari (2014), a population comprises all objects in a certain field of study. The total population was 320 respondents.

3.4 Sample Size and Sampling Technique

A sample is a carefully chosen, condensed representation of a larger group. When a population is too big for a statistical test to include all potential participants or observations, samples are utilized instead. A sample must be impartial and representative of the total population in order to be valid. According to Saunders et al. (2007), the sample size and selection procedure have a major impact on how confident you may be in your findings and how much you can generalize.

The sample size was calculated via random sampling. Random sampling, according to Auka et al. (2013), ensures that all the groups (categories) are properly sampled, which facilitates comparisons between the groups. A population of 320 necessitates a sample size of 175 according to the table for calculating sample size published by Krejcie and Morgan (1970). Therefore, 175 volunteers were chosen for the study using random sampling approaches. Thus, the accessible sample size was determined to be 175 samples, or 54.6% of the 320 respondents who made up the targeted population.

3.5. Data Collection Instruments

The methods used for data collecting must be carefully chosen to prevent obtaining unnecessary information in order to ensure that the data gathered address the study objectives (Odongo, 2013). A questionnaire was created to get information from the respondents for this investigation. The questionnaire items included both closed-ended and open-ended questions, giving the study the advantage of gathering quantitative data.. Separate sections of the questions covered the research questions and objectives.

A structured questionnaire was used as the main data collecting tool by the researcher to gather information from the study's chosen participants.

The four major portions of the questionnaire were created in accordance with the study questions. The respondents' age and gender were listed together with other sociodemographic information in the first part. The main purpose of this was to give the researcher background data on the respondents. The different shapes or figures of women would be described in section two. The third section would assess the difficulties in designing clothing for various physique types. For obese females, section four would design and produce evening and casual clothes. Based on the study's research goals, the analysis was conducted.

3.6. Pre-Testing the Instruments

Pre-testing of the instruments, sometimes referred to as piloting, is a small-scale preliminary investigation done to determine the efficacy of the research instruments (Alila, 2011). Depending on sample size, a pre-test sample should range from 1% to 10% (Mugenda & Mugenda, 2013). The pre-test sample size for this study, which included 17 respondents, was equal to 10% of the study sample size. The pre-test sample, which shared many features with the actual study population, was given copies of the questionnaires to complete on their own. This was important since it revealed features of ambivalence that were implied by the survey items and afterwards reframed in light of the respondents' responses.

3.7 Validity of the Instrument

According to Kothari (2014), validity assesses how accurately discrepancies between measured items are represented by a measuring instrument. An instrument is validated, according to Mugenda & Mugenda (2013), by proving that its items

accurately reflect the skills and characteristics that are intended to be measured. The validity of the research instruments was increased by ensuring that the questionnaire items sufficiently covered the research objectives, and the pilot study afterwards supported this.

Other steps taken to address questions of instrument validity included submitting the questionnaire for review and judgment by experts and peers, respectively. Randomization, which was useful in determining the impact of auxiliary variables, served to further ensure the validity of the instrument. Randomization is regarded as essential since it is the greatest method for guaranteeing that sample representatives are representative of the target population.

3.8 Reliability of the Instruments

According to Mugenda & Mugenda (2013), a measurement of a measuring instrument's reliability is how consistently it produces results or data after numerous trials. According to Kothari (2015), the consistency with which a test instrument yields the same results when administered to the group throughout time intervals is a measure of the dependability of a test instrument.

The questionnaire items were divided into two equal sections on the basis of odd and even appearances in this study as part of the split-half reliability measure. After the first component of the research tool was used and a result was acquired, the second component was used and the results were documented. After comparing the two scores, Pearson's product moment coefficient of correlation (r) produced an alpha value of 0.8, demonstrating the reliability of the data collection method.

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3.9 Data Collection Procedures

According to Kothari (2015), data collection procedures encompass both the steps that must be taken in the correct order for the research to be completed properly. The researcher began the process of obtaining data on the ground after creating a questionnaire, which was assessed, modified, and granted permission for research by the fashion designers in the Nungua Municipality. The researcher began distributing the questionnaires to the fashion designers after obtaining the research permit.

The researcher used the strategies suggested by Wiseman and McDonald (2010) to raise the return rate. These stages required the creation of cover letters that were attached to every questionnaire, explaining the significance of the study and assuring respondents of the researcher's commitment to confidentiality. The data collection tools were administered by the researcher to the study's participants in batches of ten copies each, systematically proceeding until all were used. The respondents were asked to complete the questionnaire in the researcher's presence in order to avoid any potential misunderstandings because the researcher was devoted to gathering the needed data. Plans were made for the researcher to collect the questionnaire at a later time to increase the questionnaire return rate in the event that the respondents were unable to complete it for any other reason.

3.10 Methods of Analysising Data

Because the study's primary elements were mostly descriptive in nature, descriptive statistics were the primary method employed for data analysis. Before beginning the data analysis, the data pieces were updated and examined to look for obvious errors, questions that had been answered incorrectly, and any blank spaces that the respondents had left unfilled. All of the quantitative questionnaire responses were processed using SPSS version 23, a computer statistical program for social scientists.

To create frequencies and percentages, the survey items were sorted, coded, and loaded into the SPSS computer. After that, frequency distribution tables were used to present the data. There were no longer any open-ended inquiries.

3.11 Ethical Considerations

Resnik (2011) lists a number of justifications for maintaining ethical standards in research. The goals of research, such as knowledge, are promoted by norms, which also discourage lying or distorting study findings and encourage accuracy. Furthermore, since research typically requires a great deal of cooperation and coordination among diverse people in various fields and institutions, ethical norms promote the qualities important for collaborative work, such as trust, responsibility, mutual respect, and fairness. The rules governing partnerships, copyright, patency, data sharing, confidentiality, and peer reviews, for example, are meant to protect intellectual property rights while encouraging cooperation.. Many ethical rules make it possible for the researcher to be held responsible by the respondents. A few of the ethical concerns are informed permission, secrecy, and anonymity, according to William (2016). The researcher avoided using anybody else's work and made note of it when it was used because of the significance of ethical issues in numerous ways. During the data collection process, respondent identities were kept a secret, and all information was handled with the utmost secrecy. No respondent was subjected to any kind of harm, privacy considerations were upheld, and cruelty was avoided.

CHAPTER FOUR

RESULTS

4.1 Introduction

The aim of the study was to analyze body proportions and their unique attributes for optimized garment fit in plus-size women. The following specific objectives were to iidentify the unique body proportions and specific attributes of plus-size women and how these differ from standard sizes. Secondly, to evaluate the impact of garment fit on comfort, confidence, and satisfaction among plus-size women. Thirdly, to explore current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types and lastly, to propose an optimized, data-informed approach for garment creation that better caters to the unique body proportions of plus-size women.

4.2 Respondents' Response Rate

175 questionnaires were distributed to participants by the researcher in order to collect their responses. For the primary data collection, 175 questionnaires were distributed; 167 were returned, while 8 were not. As a result, the study's analysis was predicated on a 95% response rate.

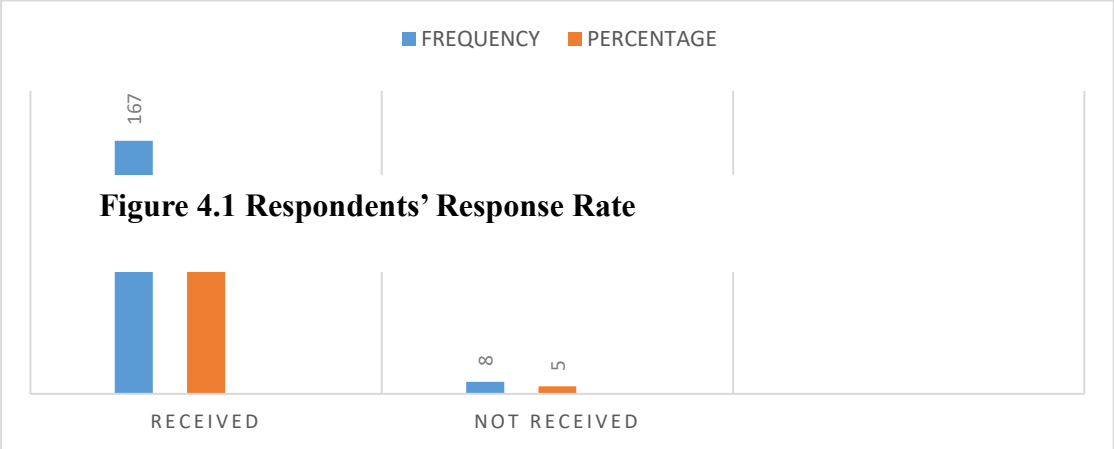


Figure 4.1 Respondents' Response Rate

Table 4.1 Demographic Data of Respondents

Demographic Data of Respondents	Frequency	Percent (%)
Gender		
Male	98	58.7
Female	69	41.3
Total	167	100
Age Category of Respondents		
19-29 years	16	9.6
30-39 years	23	13.8
40-49 years	33	19.7
50-59 years	19	11.4
60-69 years	35	21
Above 70 years	41	24.5
Total	167	100
Highest Educational Qualification		
Diploma	37	22.2
Bachelor's degree	96	57.5
Master's Degree	34	20.3
Total	167	100

Source: Field survey (2023), n= 167

According to Table 4.1, there were 69 respondents who were female and 98 who were male, or 58.7% and 41.3%, respectively. In addition, 41 respondents, or 24.5%, were over 70 years old, 35 respondents, or 21%, were in the 60–69-year age bracket, 33 respondents, or 19.7%, were in the 40–49-year bracket, 23 respondents, or 13.8%, were in the 30–39-year bracket, 19 respondents, or 11.4%, were in the 50–59-year bracket, and 16 respondents, or 9.6%, were in the 19–29-year bracket.

Furthermore, 34 respondents, or 20.3%, had a master's degree, while 37 respondents, or 22.2%, had a diploma as their highest academic status. This compares to 96 respondents, or 57.5%, who had bachelor's degrees.

Research Questions One: The unique body proportions and specific attributes of plus-size women and how these differ from standard sizes.

Table 4.2: The unique body proportions

The unique body proportions	SD %	D %	N %	A %	SA %	*Mean*	*Ranking*
Pear	5	6	4	137	15	4.32	1st
Hourglass	3	5	23	110	26	4.21	2nd
Top Hourglass	5	5	29	117	11	4.16	3rd
Inverted Triangle	4	7	4	129	23	3.98	4th
Bottom Hourglass	5	10	6	122	24	3.85	5th
Rectangle	4	13	14	117	19	3.76	6th
Spoon	10	8	6	117	26	3.12	7th
Diamond	4	6	4	131	22	3.08	8th
Triangle	6	6	11	131	13	3.03	9th
Oval	4	5	9	135	14	3.02	10th
Average Total	**50**	**71**	**110**	**1246**	**193**		
Average Percent (%)	**3**	**4.3**	**6.5**	**74.6**	**11.6**		

Where; 1= strongly disagree, 2= disagree, 3= not sure, 4= agree, 5= strongly agree

Source: Field survey (2023), n= 167

Table 4.2 indicates that an average of 74.6% of the respondents agreed that the various types of women's shapes or figures were pear (mean score of 4.32, ranked 1st), Hourglass (mean score of 4.21, ranked 2nd), top hourglass (mean score of 4.16, ranked 3rd), Inverted Triangle (mean score of 3.98, ranked 4th), Bottom Hourglass (mean score of 3.85, ranked 5th), Rectangle (mean score of 3.76, ranked 6th), Spoon (mean score of 3.12, ranked 7th), Diamond (mean score of 3.08, ranked 8th), Triangle (mean score of 3.03, ranked 9th), and Oval (mean score of 3.02, ranked 10th). Therefore, different people have different figure types. A person's figure could be determined by

judging the individual's height and width (Baum & Ford 2019). A good selection of one's clothing improves the appearance of the individual and has the bad points in a person too. Therefore, an individual must dress sensibly. The figure types in garment construction are tall and slender figure, short and plump (stout) figure, long neck, short neck, flat chest, large bust, flat hips, large hips, and droopy shoulders. There also exist others which have been ignored such as: tall and plumpy, short and slender, and large head (Baum & Ford 2019).

Research Question Two: The impact of garment fit on comfort, confidence, and satisfaction among plus-size women.

Table 4.3: The impact of garment fit on comfort, confidence, and satisfaction among plus-size women

Statements	**SD** *(%)*	**D** *(%)*	**N** *(%)*	**A** *(%)*	**SA** *(%)*
The idea that women's bodies are pliable to clothing has been promoted by prominent members of the fashion industry.	(3)	(3.6)	(2.4)	(70.1)	(21)
Fashion designers accuse women of having an unsuitable body type and blame them for thigh wear issues in their jeans.	(1.8)	(3.6)	(1.8)	(80.8)	(12)
Some retailers have defended size bias as an aspirational or excluding marketing strategy.	(3.6)	(2.4)	(2.4)	(77.2)	(14.4)
Not every customer will have a favorable experience with a fashion designer.	(3)	(3)	(13.2)	(61.7)	(19.2)
Beyond the fashion business, a number of health and wellness professions also oppose "fat" or obesity stigma.	(5.4)	(6)	(3)	(75.4)	(10.2)
It has been discovered that doctors and nurses, especially those who focus on the treatment of obesity, exhibit significant obesity bias.	(3.6)	(3.6)	(1.8)	(83.2)	(7.8)
Bias against obesity among students of nutrition, psychology, and physical education.	(6.6)	(3.6)	(3)	(79)	(7.8)
According to fashion designers, being overweight always indicates a lack of self-control and negatively impacts health.	(3)	(3.6)	(2.4)	(70.1)	(21)
Obesity bias is becoming a widely recognised form of discrimination.	(1.8)	(3.6)	(1.8)	(80.8)	(12)

In recent years, as the thin ideal has become more widespread, there has been an increase in explicit weight bias and weight-based discrimination.	(3.6)	(2.4)	(2.4)	(77.2)	(14.4)
Being overweight has a detrimental effect on how appealing you are seen as physically.	(5.4)	(6)	(3)	(75.4)	(10.2)
In comparison to those who report fewer instances of weight bias, people who frequently experience stigmatizing events consume more and lose less weight.	(3.6)	(3.6)	(1.8)	(83.2)	(7.8)
A person may be predisposed to possess high levels of explicit obesity prejudice due to a number of psychological factors.	(6.6)	(3.6)	(3)	(79)	(7.8)
Body size, gender, and ethnicity are only a few examples of the individual attributes that have been connected to an obesity prejudice.	(5.4)	(6)	(3)	(75.4)	(10.2)

Where; 1= strongly disagree, 2= disagree, 3= not sure, 4= agree, 5= strongly agree

Source: Field survey (2023), n= 167

According to Table 4.3, 70.1% of respondents agreed that visible fashion industry professionals have expressed the opinion that women's bodies can be shaped by clothing, while 21% strongly agreed, 3.6% disagreed, 3% disagreed, and 2.4% were neutral. In addition, 80.8% of respondents agreed that women are to fault for thigh wear issues in their trousers by having an incorrect body type, 12% strongly agreed, 3.6% disagreed, 1.8% strongly disagreed, and the remaining respondents were indifferent. It would be reasonable to think that clothing alternatives would reflect the fact that over one-third (1/3) of Ghanaian adults are fat, but this has not happened (Adkins, Natalie, & Ozanne, 2021). The restricted clothing market is one instance of weightism, which is described as "prejudice or discrimination against people based on body weight" (Fox-Kales, 2020, p.158). Obese men and women earn significantly less money than their slim counterparts at work (Baum & Ford, 2019), and obese women are more likely to face stigma from human resource professionals (Gesser-Edelsberg, Anat, & Ronit Endevelt, 2021). This is where weightism is most visible.

Furthermore, 77.2% of the respondents believed that size bias has been justified as an exclusionary or aspirational marketing strategy by some businesses; 14.4%

strongly agreed; 3.6% highly objected; 2.4% strongly disagreed; and 2.4% were indifferent. In addition, 61.7% of respondents agreed that fashion designers might not always interact favorably with their customers, 19.2% strongly agreed, 13.2% were indifferent, and 3% disagreed and strongly disagreed, respectively. It has been discovered that weight discrimination causes "social stigmatism and stereotyping and that can lead to depression, discrimination, and binge eating" (Dye, 2018, p.2). Thus, weightism is not simply a problem at the workplace; it can also lead to binge eating among those who are overweight. While weightism mostly affects adults, it has also been observed in kids. According to Steiner-Adair and Vorenberg (2019), "boys and girls both joke about, tease, and bully classmates whose body sizes do not fit the cultural norm" (Steiner-Adair & Vorenberg, 2019), these behaviors and views regarding weight are "firmly established in most elementary schools."

Additionally, 75.4% of the respondents concurred that the stigma associated with being "fat" or obese extends outside of the fashion business to a number of fields related to health and wellbeing. 10.2% of respondents strongly agreed, 6% strongly disagreed, 5.4% disagreed, and 3% were neutral. Additionally, 83.2% of respondents concurred that medical professional, even those who specialize in the treatment of obesity, had been proven to exhibit considerable obesity prejudice. 7.8% of respondents strongly agreed, 3.6% strongly disagreed, and 1.8% were impartial.

According to the study's findings, 79% of respondents agreed that obesity prejudice exists among students of physical education, psychology, and nutrition; 7.8% strongly agreed; 6.6% strongly disagreed; and 3% were indifferent. The study's findings show that 70.1% of respondents agreed, 21% strongly agreed, 3.6% disagreed, 3% severely disagreed, and 2.4% were indifferent on fashion designers' belief that being overweight always contributes to poor health and indicates a lack of

self-control. Additionally, 80.8% of respondents concurred that bias towards obese persons has become widely accepted, 3.6% of respondents disagreed, 12% strongly agreed, while 1.8% were neutral and 3.6% strongly disagreed. Furthermore, 14.4% highly agreed, 3.6% very disagreed, 2.4% strongly disagreed, and 2.4% were indifferent on the growth in explicit weight bias and weight-based discrimination over the past few decades as the thin ideal has become ubiquitous.

Additionally, 75.4% of respondents agreed that being overweight had a negative effect on how attractive people believe you to be; 10.2% strongly agreed; 6% disagreed; 5.4% strongly disagreed; and 3% were neutral. In addition, 83.2% of respondents agreed that people who frequently experience stigmatizing events eat more food and lose less weight than people who report experiencing less weight bias; 7.8% strongly agreed; 3.6% strongly disagreed; and 1.8% were indifferent.

According to the study's findings, 79% of respondents agreed, 7.8% strongly agreed, 6.6% strongly disagreed, and 3% were indifferent that certain psychological traits may make someone more likely to have an express bias against fat. In addition, 75.4% of respondents agreed that an obesity prejudice has been associated with individual traits such as body size, gender, and ethnicity; 10.2% strongly agreed; 6% disagreed; 5.4% strongly disagreed; and 3% were indifferent.

Women have documented "significantly higher rates of mistreatment reported by overweight and obese adolescents than those of normal weight" (Buccianeri, et al., 2020, p. 49) as a result of these ideas being put into practice. Due to the limited number of fashion options, weight discrimination is harmful. For kids, it can result in a shortage of fashion options that would make them stand out among their peers. Adults who are obese may have few options and may need to shop online for apparel, which

poses even more serious issues. Therefore, the purpose of this study was to assess the body types and their qualities for optimal adaptation to obese females.

Research Questions Three: The current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types.

Table 4.4: Current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types.

Statements	**SD** *(%)*	**D** *(%)*	**N** *(%)*	**A** *(%)*	**SA** *(%)*
Controlling the social belief that "fat" is a bad quality;	(3.6)	(9)	(12.6)	(68.9)	(6)
Customers that are obese demand some level of customization.	(4.8)	(4.2)	(13.2)	(67.7)	(10.2)
To sew for fat ladies, additional fashion knowledge is often needed from a secondary source, such as a website, a course, or a booklet.	(2.4)	(3.6)	(6.6)	(70.1)	(17.4)
To lessen the social and environmental effects of the life cycle of a fashion product, I employ intelligent fashion designs.	(1.8)	(3.6)	(17.4)	(66.5)	(10.8)
When selecting colors and prints for my clothing line, I take the surroundings into account.	(3)	(3)	(4.2)	(79)	(10.8)
I design products that perform better and endure longer, requiring less frequent replacement.	(3.6)	(3)	(3.6)	(82)	(7.8)
Producing fashion and apparel products of good quality is very important to me.	(1.8)	(2.4)	(3)	(82.6)	(10.2)
I am aware of the emerging design strategies in production of sustainable clothing and textiles.	(3)	(3)	(2.4)	(79)	(12.6)
In general, I try to produce the best quality products for obese females	(2.4)	(3.6)	(2.4)	(85.6)	(6)
Fashion designers must keep proper records of transactions to improve the business.	(2.4)	(3.6)	(6.6)	(70.1)	(17.4)

Where; 1= strongly disagree, 2= disagree, 3= not sure, 4= agree, 5= strongly agree

Source: Field survey (2023), n= 167

According to Table 4.4, 68.9% of respondents agreed that social ideologies that "fat" is a bad quality should be controlled, whereas 12.6% disagreed, 9% were neutral,

and 6% strongly agreed. Additionally, 67.7% of respondents agreed that obese consumers need some level of customization; 13.2% disagreed; 10.2% strongly agreed; 4.8% definitely disagreed; and 4.2% were neutral. Furthermore, 70.1% of the respondents agreed that aadditional fashion information is typically required from a secondary source such as a website, a workshop or a booklet to sew for obese females, 17.4% strongly agreed, 6.6% were neutral, 3.6% disagreed, while 2.4% strongly disagreed. According to the study's findings, 66.5% of respondents agreed that they employ smart fashion designs to lessen the social and environmental effects of the life-cycle of a fashion product; 17.4% were neutral; 10.8% strongly agreed; 3.6% disagreed; and 1.8% severely disagreed. Different body forms can be found among the large population of women, according to several research (August, 2011; Connell et al., 2016; Douty, 2018; Simmons, Istook, & Devarajan, 2012). The interactions between these varied body types and clothing frequently have an impact on consumers' overall purchasing decisions (Eckman, Damhorst, & Kadolph, 2011). In order to purposely conceal bodily areas they find ugly, clients may adopt a variety of patterns (Yoo, 2013). The use of clothing by consumers, especially women, as a means of achieving a desired shape has lately come to the attention of the apparel industry. As a result of escalating competition and the full development of a consumer-driven market, meeting customer demands has emerged as a crucial stage in generating and sustaining profit for businesses in the garment sector.

Also, 82.6% of respondents agreed, 10.2% strongly agreed, 3% were indifferent, 2.4% disagreed, and 1.8% strongly disagreed that they think about the environmental effects of the colors and prints they chose for their fashion line. For instance, American researchers have found that supervisory capability, self-discipline, professional appearance, personal hygiene, and the capacity to carry out a demanding job were all

negatively assessed for overweight and obese female job applicants (Rothblum, Miller, & Garbutt, 2018). However, it's interesting to note that the negative ratings for these candidates were dramatically decreased when the level of perceived applicant attractiveness was regulated. This finding implies that being overweight negatively affects one's perception of physical beauty, which is a factor that is more significant for women in America than the actual "fat" itself.

In addition, 82% of respondents agreed that doing so would result in a product that would live longer and work better, minimizing the need to replace it; 12.6% strongly agreed; 3% disagreed; and 2.4% were neutral. In addition, 85.6% of respondents agreed that they generally work to develop products of the highest quality for obese females, while 6.6% strongly agreed, 3.6% disagreed, 2.4% strongly disagreed, and 2.4% were neutral.

In addition, 82.6% of respondents said it is very essential to them to produce high-quality fashion and apparel products; 10.2% strongly agreed; 3% were neutral; 2.4% disagreed; and 1.8% severely disagreed. These societal prejudices against obese women are not just reflected in the world of fashion; they are also strengthened by it. As a matter of fact, the majority of the evidence (Fox-Kales, 2011; Gesser-Edelsberg, Anat, and Ronit Endevelt, 2021) evidence to an ongoing and widespread bias against obese women, both within and outside of the fashion industry. It is hardly surprising that the consumer group least appealing to marketers in this aesthetically focused industry would be consumers whose bodies society normally finds undesirable given the pervasive stigmatization of obese women.

According to the study's findings, 79% of respondents said they were aware of new design ideas being used to produce sustainable apparel and textiles, 12.6% strongly agreed, 3% strongly disagreed, and 2.4% were neutral. In order to develop

their business, fashion designers must keep accurate records of their transactions, according to 70.1% of respondents. Of them, 17.4% strongly agreed, 6.6% were indifferent, 3.6% disagreed, and 2.4% severely disagreed. One example of weightism, which is defined as "prejudice or discrimination against people based on body weight," is the restricted clothes market.

Weightism has been especially noticeable in the workplace, where obese women make much less money than their slender counterparts and are more likely to experience stigmatization from HR professionals. Despite possessing more than appropriate credentials, overweight exercise professionals have been proven to be excluded from fitness trainer roles in the professional world due to this bias (Sartore & Cunningham, 2017). Studies on obesity have looked at the factors that contribute to this bias. Other factors may contribute to harboring an obesity bias in addition to the promotion of slender bodies in the fashion media and popular forms of entertainment including television, movies, and magazines (Thompson & Heinberg, 2019).

4.3 Garment Production

4.3.1 Pre-Production Processes

4.3.2 Designing of the Garments

- Drafting of A- line casual wear with shirt sleeves

Plate 4.1 Drafting and adaptation of garments

Plate 4.2 Drafting and Adaptation of Garments

Plate 4.3 Adaptation of Garments

Designing plays a very important role in garment production. It is possible design garment to suit everyone for occasion. In designing, sketches are done to plan the garment which guides in the production process.

Below are pictures of sketches of the designs.

3.2.3 Taking of Measurement

To prevent wastage of fabric and achieve correct fit and size of garment, measurement was taken for the figure type**,** and are as follows;

Measurements for Front And Back Of A-Line Casual Wear for Obese Female

FRONT BODY MEASUREMENTS	**BACK BODY MEASUREMENTS**
Shoulder to waist 16 inches	Shoulder to waist 16 inches
Shoulder to hip 22 inches	Shoulder to hip 22 inches

Shoulder to bust 9.5 inches	Shoulder to bust 9.5 inches
Dress length 44 inches	Full length of dress 44 inches
Bust 38 inches	Bust 38 inches
Waist 35 inches	Waist 35 inches
Hip 40 Inches	Hip 40 inches
Shoulder to shoulder 16 inches	Shoulder to shoulder 16 inches
Across chest 13 inches	Across back 15 inches
Nipple to nipple 8 inches	
SLEEVE FOR CASUAL WEAR OBESE FEMALE GARMENT MEASUREMENT	
Sleeve length	11 inches
Cap height	3.2 inches
Around arm	14 inches
MEASUREMENTS OF PRINCESS LINE DINNER WEAR FOR OBESE FEMALE	
Measurements of front body	Measurements of back body
Hip 40 inches	Hip 40 inches
Bust 38 inches	Bust 38 inches
Waist 35 inches	Waist 35 inches
Nipple to nipple 8 inches	Nipple to nipple 8 inches

Nipple to nipple 8 inches	Nipple to nipple 8 inches
Shoulder to shoulder 16 inches	Shoulder to shoulder 16 inches
Shoulder to bust 9.5 inches	Shoulder to bust 9.5 in
Shoulder to waist 16 inches	Shoulder to waist 16 inches
Shoulder to hip 22 inches	Shoulder to hip 22 inches
Full length of dress 44 inches	Full length of dress 44 inches
Across chest 13 inches	Across back 15 inches
SLEEVE MEASUREMENTS OF PRINCESS LINE DRESS FOR OBESE FEMALE	
Sleeve length	17 inches
Cap height	3.5 inches
Around arm	11 inches
Design specification	
Silhouette : a-line	

GENDER	OBESE FEMALE
Style	Casual
Occasion	Daily
Neckline	Front; v-neck back; high-neck
Waistline	Natural
Sleeve style	Shirt sleeve
Sleeve length	Short
Fabric	Cotton
Dress length	Maxi

A-Line garments are fitted in bodice and flare out at the waistline. The Dresses are also designed to emphasize a narrow waist and wider hips and flattering on obese females body. A navy blue, cotton plain fabric for thinning or slimness effect are good for obese females.

Front Dress

It has a v- neckline with short shirt sleeves. It is shaped at the bust through the waist (darting) of the garment. The dress is not lined because it is a casual wear.

Back Dress

The back also has a high neckline with short shirt sleeves. It is also shaped at the bus through the waist (darting) of the garment and with no lining. There is zip fastener of the center backline of the garment. The neckline of the garment is finished with facing, side seams opened and edges overclocked.

Design specification

Princess line or dress for obese female dinner

It is a fitted garment cut in long panels without separation at the waist. It is a dress with a seam line that runs from the armhole to the hemline, where the bust and waist

darts are incorporated into this seam. Flare at the hips. The garment is made of brocade fabric and lined with taffeta.

Design Specification

Silhouette	:	*Princess Dress*
Gender	:	*Obese Female*
Style	:	*Dinner*
Occasion	:	*Formal*
Neckline	:	*Boat Neck*
Waistline	:	*Natural*
Sleeve style	:	*Three Quarters (3/ 4)*
Sleeve length	:	*Long Fabric*
Brocade (mixture of silk and cotton)		
Dress length	:	*Maxi*

Sourcing of Fabrics by researching the various options available in the shops at Accra Makola. Selection of Fabric that match the design aesthetic, functional needs of the garments as well as durability and comfort.

Plate 4.4: Fabrics and lining used

4.2.4 Production Processes

Sewing Techniques Used:

- Sketching of fashion garments.
- Drafting garments using the body measurements.
- Laying pattern pieces on fashion fabrics, lining and cut
- Joining the pieces cut together with stitches permanently.
- Sketching of finished fashion garments of A-line casual and princess line dinner wear.

Plate 4.5: Sketches of designs

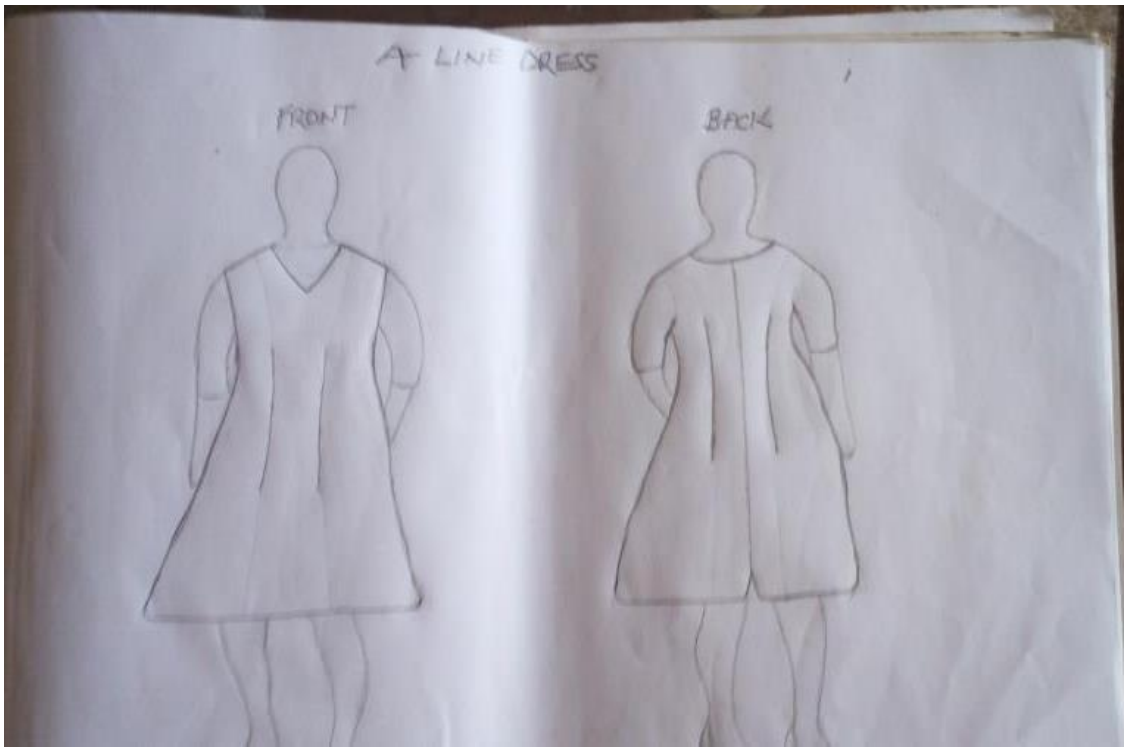
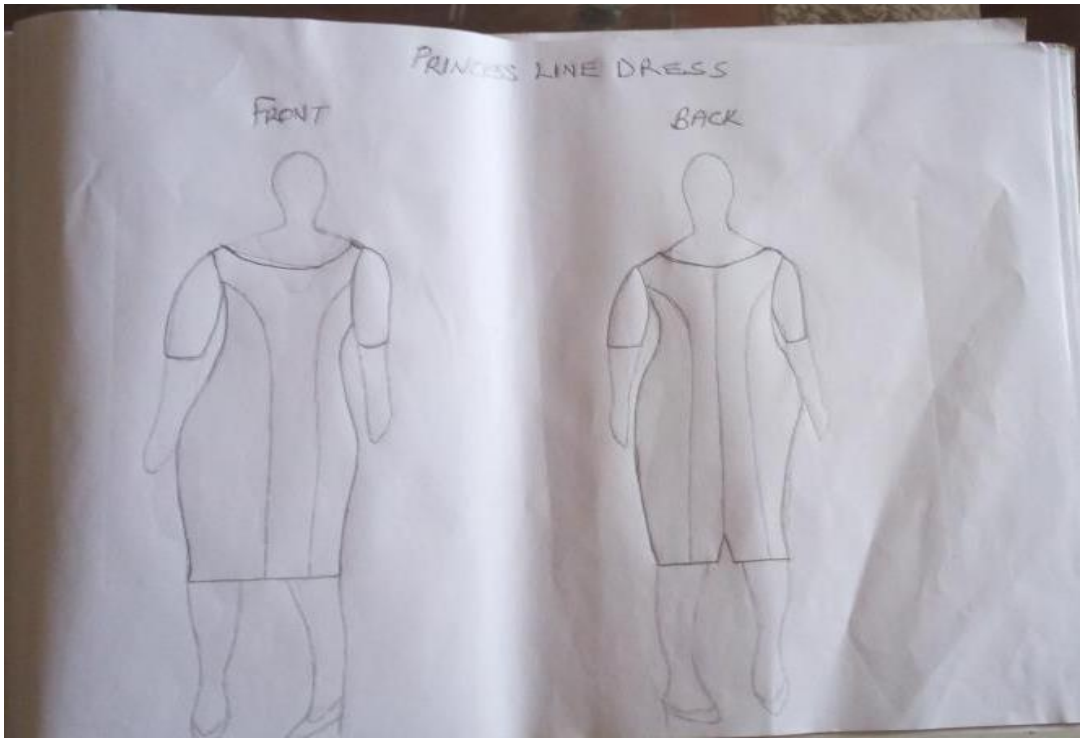


Plate 4.6: A-Line Obese Female Casual Wear



- *Princess line obese female dinner wear*

- Drafting of A- line casual wear with shirt sleeves

Plate 4.7 Drafting and adaptation of garments

Pattern Preparation

Plate 4.8 Drafting and adaptation of garments

Plate 4.9: Drafting and adaptation of garments

4.4 Functions of tools, materials and equipment for the project

Work table: for cutting patterns and pieces of fabrics on

Pencils: used for drafting and adaptation of patterns

Sharpener: for sharpening the pencils

Paper cutting scissors: for cutting out and separation of pattern pieces from the drafted papers

Dressmaker's Shears: for cutting out fabrics and the garment pieces, and the lining

Pressing iron: for pressing and ironing of the garments during sewing

Ironing board: for pressing and ironing of the garments on

Sewing machine: for sewing the pieces of garments together securely

Pins: used to hold layers of patterns and fabrics together during cutting out and stitching

Needles: used for hand and machine sewing of the garments

Tape measure: used for taking the body measurements, drafting and adaptation of the patterns

Tracing wheel: used with dressmaker's carbon papers to transfer pattern markings to the wrong sides of fabric pieces after cutting

French curves: used to make an adjustments on curved pattern areas like necklines and armholes

Thimble: for protection of middle finger from needle cut when hand stitching

Hook and eyes: for closing the back neckline opening

The Materials Used:

Brown paper: for drafting and adapting the patterns

Printed fabrics : used for an obese short woman garment

Lining fabrics: used for lining the garment wrong sides neatly

Vilene: for interfacing of neckline facing of the garment

Zippers: to close the opening at the back centre of the garment

Eraser: to clean the mistakes of the pencil

Plate 4.10 Cutting Out

4.2.5 Layout and cutting

Layout is designed to use fabric economically. Even small changes may result in the pieces not fitting into the space apportioned to them. Layout is an efficient way to arrange or place pattern of fabric. The fabric were prepared by ironing to remove all creases to enable the fabric lie flat on the surface of the cutting table. The fabric is straightened by graining to make sure the warp and weft yarns are at right angle to each other. Pattern pieces drafted are positioned on the straight grain mark parallel to the selvedge of the fabric, pinned and then cut out with sharp scissors.

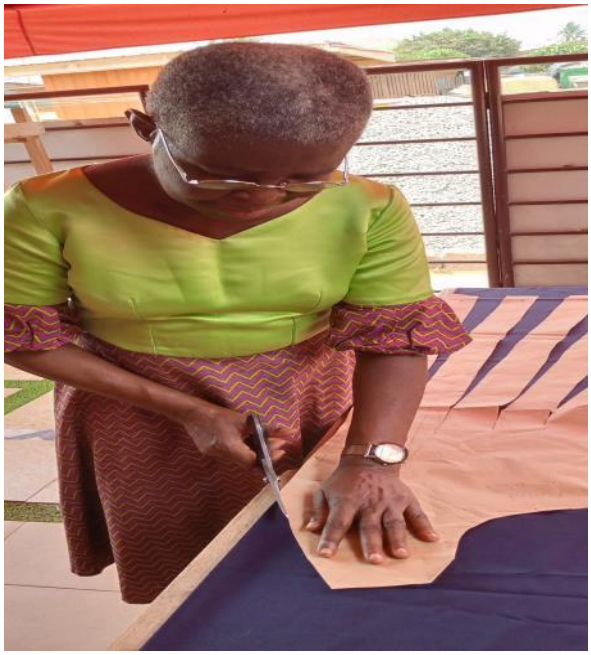


Plate 4.11: Cutting

4.2.5 Assembling of garment

After laying and cutting out, the garment pieces are ready to be assembled. Garments maybe assembled with the round or the flat method. The round method is also known as the unit method. To assembled the garment, all edges that were likely to stretch were stay stitched and fullness arranged. To complete the garment, appropriate stitches were done using the machine at the neckline and shoulder seams done as well as side seams. Fastenings inserted at the center back of the garments.


Plate 4.12: Joining the pieces of fabrics together with stitches permanently.


PC Plate 4.13 Assembling of garments

4.2.7 Finishing

Finishing is any process through which the performance, appearance and hand of fibre, yarn and fabric are changed, improved, or brought to an attractive and presentable condition. Through proper finishing processes textile product or garments become presentable and acceptable. There are different types of finishing processes, but ironing was considered in this regard where the garments were neatly ironed to make them more presentable and attractive.

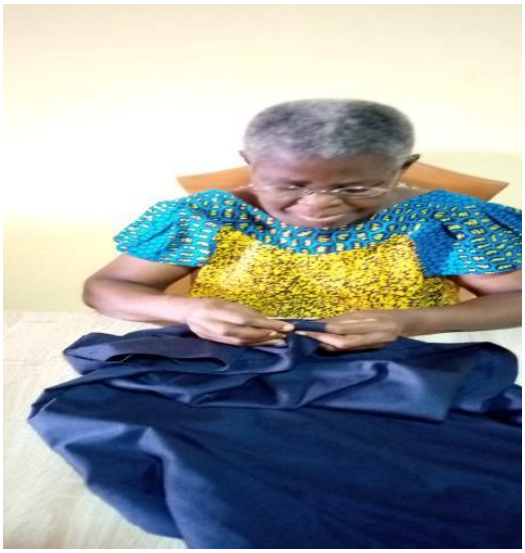
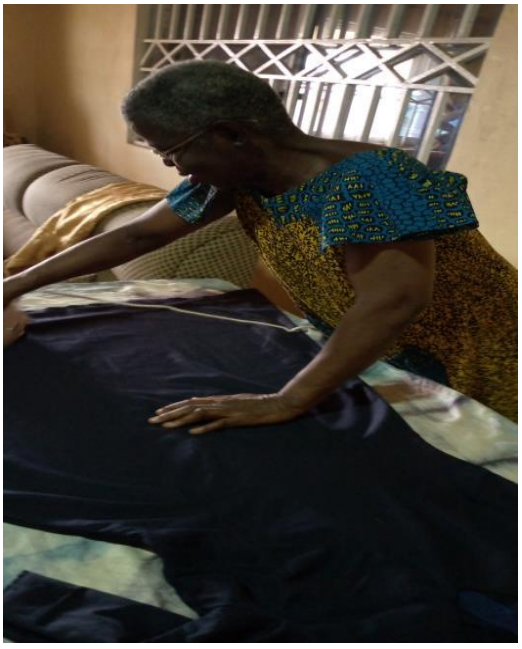


Plate 4.14: Hemming of Garments

Pressing



Plates 4.15 Pressing

A-Line Dress for Casual Wear

Front *Back*

Plate 4.16: Fittings

Princess line dinner wear

Front Back

Plate 4.17: Fittings

CHAPTER FIVE

DISCUSSIONS

5.1 The unique body proportions and specific attributes of plus-size women and how these differ from standard sizes

The study's findings show that, on average, 74.6% of participants agreed that the various types of women's shapes or figures were pear-shaped (mean score of 4.32, ranked first). Before using a Textile and Clothing Technology Corporation [TC]2 NX-12 3-D body scanner to look for patterns, researchers first examined the data on female body shape that was already available. The following five shapes were created by combining the information about common body shapes: triangle, which is indicated by wider hips than shoulders; shoulders wider than hips, which indicates an inverted triangle; rectangle, which is characterized by consistency in the widths of the shoulder, waist, and hips; Hourglass, which has a distinct waistline generated by equally wide hip and shoulder widths, and oval, which has a narrow top and bottom torso with a wide or full abdomen (Simmons, 2012).

Hourglass (mean score of 4.21, ranked 2nd), top hourglass (mean score of 4.16, ranked 3rd), Inverted Triangle (mean score of 3.98, ranked 4th), Bottom Hourglass (mean score of 3.85, ranked 5th), Rectangle (mean score of 3.76, ranked 6th), This study looked at real and ideal body forms from the viewpoint of the individual; possibly different findings would have emerged if actual and ideal body shapes had been looked at from the perspective of others. The survey also looked at the discrepancies between customers who are college-aged and their ideal body forms. These results showed that customers who matched the sample's demographics shared similar ideal body types. These similarities appeared to have an impact on preferences in a reciprocal manner; body types were more comfortable and more likely to purchase dress silhouettes that

visually balance the body and help achieve ideal proportions. More research is required to determine how body shape affects consumer preferences other than dress shape, despite the fact that this study offers important research-based evidence on the subject. Spoon (mean score of 3.12, ranked 7th), These five shapes were then evaluated using the body scan data of 222 women over the age of 18 as a sample, along with mathematical criteria that distinguished each body shape. The landmarks employed in this assessment were the circumferences of the bust, waist, stomach, and abdomen. The results demonstrated the need for more body form categories because so many respondents could not be located. Four additional categories were established to address this problem. The spoon, diamond, bottom hourglass, and top hourglass names were given to these groups because of how much they resembled the corresponding items. Some body shapes on the FFIT scale utilize various combinations of landmarks, in contrast to the scales discussed above (Simmons, 2012).

Diamond (mean score of 3.08, ranked 8th), Triangle (mean score of 3.03, ranked 9th), and Oval (mean score of 3.02, ranked 10th). Observing how clothing was put together or how it was worn on the body also left an impression. Additionally, it has been found that visual aspects of the body, such as the surface, movements, and forms, can leave an imprint. According to the study, one may infer information about the person from their appearance and clothing, and observers concurred that their impressions were reliable. The way a person dresses and presents themselves generally gives people information about their personality traits, physical and biological attributes, demographic and social standing, attitudes and feelings, occupational role, and intents or motives (Johnson et al., 2010).

5.2 The impact of garment fit on comfort, confidence, and satisfaction among plus-size women

According to the study's findings, 70.1% of respondents felt that visible fashion industry experts have promoted the idea that women's bodies are pliable to clothing. Additionally, 80.8% of respondents concurred that women's thigh wear issues in their pants are blamed on fashion designers by claiming that they have an unsuitable body type. The traditional "weight-related belief system" that permeates American culture is being challenged by the social movement known as fat activism (Wann, 2019, p. ix). The National Association to Advance Fat Acceptance (NAAFA), which was founded in 1969, is credited with launching this advocacy in the United States (Wann, 2019, p. x). An "average-sized" man "observed the suffering of his large wife but had experienced at first hand the embarrassment and difficulties of being a man who is attracted to fat women" (Millman, 2010, p. 4). This is when it all started.

In addition, 77.2% of respondents concurred that size bias has been justified by some shops as an exclusionary or aspirational marketing strategy. Additionally, 61.7% of respondents concurred that not all clients connect favorably with fashion designers. This inspired him to create a space where overweight people could express themselves freely and accept their size. The NAAFA has outlined their mission to "eliminate discrimination based on body size and provide fat people with the tools for self-empowerment through advocacy, public education, and support" (NAAFA, 2014) through conferences, publications, social gatherings, and other public activities.

Additionally, 75.4% of the respondents concurred that the stigma associated with being "fat" or obese extends outside of the fashion business to a number of fields related to health and wellbeing. Furthermore, 83.2% of the respondents concurred that medical professional, even those who specialize in the treatment of obesity, had been found to

exhibit severe obesity prejudice. This ignores additional elements like other health problems or the genetic makeup of fat. Instead, HAES places an emphasis on weight bias elimination, physical body acceptance, eating without following a particular diet or food plan, improving overall health without defining weight targets, and engaging in physical activity for enjoyment and health benefits. Participants will reach their "natural" weight by adhering to these five principles rather than trying to fit in with cultural norms (Burgard, 2019). This shifts the focus away from portraying a certain appearance and toward a healthy weight for each individual.

According to the study's findings, 79% of respondents believed that students studying physical education, psychology, and nutrition suffer from an obesity bias. Although this movement has given rise to some theories and provided assistance for obese people, it is a less well-known group; "we don't have places of pride to meet together on a daily basis...there's no fat-pride bar. Our initial response is to support fat-hating businesses (Weight Watchers, stomach amputation, etc.), not to fight back. We seek acceptance from our oppressors rather than calling for self-respect" (Cooke, 2016, p. 16).

The study's findings revealed that 70.1% of participants thought fashion designers always thought being overweight contributed to poor health and demonstrated a lack of self-control. Furthermore, 80.8% of respondents said that prejudice against obese people is becoming a widespread occurrence. This activism has developed into many different subgroups, including the well-publicized Health at Every Size campaign, online body positive communities, and fat fashion. Fat activism makes an effort to bridge the gap between these several efforts in order to better the living conditions of obese persons who may be facing various disadvantages as a result of their size.

Furthermore, 77.2% of the respondents believed that the rise in explicit weight bias and weight-based discrimination over the previous few decades was a result of the slim ideal's popularity. Connell et al. (2016) created the Body Shape Assessment Scale (BSAS), which has nine variations for evaluating frontal body shapes. This scale was developed after reviewing and revising existing body measurements and looking at body scans taken from 42 women between the ages of 20 and 55. This study revealed four unique frontal body types, which are described below. In the four body shapes represented by digitally illustrated female body silhouettes in the BSAS, the shoulder point to shoulder point, frontal waistline, and the widest point between the waist and crotch line are used as landmark locations to distinguish whole body shapes (Connell et al., 2016).

Additionally, 75.4% of respondents believed that being overweight has a negative effect on one's perception of physical beauty. Furthermore, 83.2% of the respondents concurred that people who experience stigmatization of their weight frequently eat more food and lose less weight than people who experience less stigma. It is obvious that society is oversaturated with images of beauty, perfection, and exact appearances. We would all agree that there are more than just physical similarities between us if one were to base their decision about our lifestyle purely on images from television, movies, and magazines. Perhaps there is a more divisive undertone lurking beneath the abundance of desirable entertainers. If you encounter someone who does not fit the thin definition of a precise look while watching television, reading a magazine, or attending a movie, chances are good that person will be portrayed as the "bad guy" or, more likely, the "nerd" (S) (Johnson et al., 2012, p. 126). According to the study's findings, 79% of respondents concurred that a person's psychological make-up may lead them to have high levels of explicit obesity bias. In addition, 75.4% of the

respondents concurred that a bias towards obesity has also been associated with individual traits like body size, gender, and race.

One of the most well-known advocates for the rights of people who are overweight, Marilyn Wann, has emphasized the struggles that these people face because they "experience cruelty- the crushing burden of fat hatred" and "are subject to discrimination in employment, housing, in access to theaters and restaurants" (Cooke, 2016, para. 15). As a result, the group of fat activists seeks to challenge these assumptions on a political and social level.

Another advancement in this movement came with the introduction of the Health at Every Size (HAES) program. Even though it was not specifically created by members or influenced by the fat activism movement, the NAAFA has adopted this stance because it is more accepting and less judgmental than other, more conventional health programs. Regardless of whether a person's weight decreases, the HAES strategy promotes "self-acceptance and healthy daily practices" (Burgard, 2019, p. 42). Being overweight is commonly seen as a medical disease, as opposed to other ailment problems brought on exclusively by the obese person and heavily relies on BMI estimates.

5.3 The current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types.

According to the study's findings, 68.9% of respondents thought it was important to regulate the social ideology that views being "fat" as a negative quality. Additionally, 67.7% of the respondents believed that fat clientele needs some level of customization. One example of weightism, which is defined as "prejudice or discrimination against people based on body weight" (Fox-Kales, 2011, p.158), is the restricted clothes

market. In the workplace, where obese men and women earn much less money than their slender counterparts (Baum & Ford 2014) and where obese women are more likely to encounter stigmatization from human resource professionals (Giel, et al. 2012), weightism has been particularly visible.

In addition, 70.1% of the respondents concurred that additional fashion knowledge is often needed to sew for fat females from a secondary source, such as a website, a class, or a guidebook. According to the study's findings, 66.5% of respondents said they used clever fashion designs to lessen the social and environmental effects of the life cycle of a fashion product. Women's perceptions of their bodies may not be significantly impacted by actual weight, despite its importance (Kwon & Parham, 2014). The results of Kwon and Parham's (2014) study on body perception and dressing practices revealed that women's clothing practices were more influenced by their perception of their weight than by their actual weight. Clothing was either to be utilized as a tool for hiding or to display one's individuality, depending on how people saw different physical attributes (Kwon & Parham, 2014). Singh (2014) discovered that WTH ratio measurements, as opposed to apparent body weight, were used by both male and female respondents to judge beauty. The goal of the study was to comprehend how the waist to hip (WTH) ratio affects how attractive women are thought to be.

Additionally, 82.6% of the respondents concurred that they think about how the colors and prints they chose for their fashion collection will affect the environment. This shows that a more appealing measure than weight is real proportion. The results of this study suggest that a woman may exercise till she reaches her goal weight yet still be unhappy with the way she looks. According to research by Tovee, Reinhardt, Emery, and Cornelissen (2018), Tovee, Hancock, Mahmoodi, Singleton, and Cernalissen (2012), and Tovee, Mason, and Cohen-Tovee (2013), body mass index is a better

indicator of health than BMI. Contrary to Singh's research, (BMI) is a better predictor of physical beauty than WTH. In another study on mass media standards and ideal body proportions by Harrison (2013), it was discovered that viewing television images of the thinnest people boosted women's desire for a smaller physique, especially their desire for a lower waist and hips.

Moreover, 82% of the respondents agreed that they create a longer-lasting and better-functioning product, thereby reducing the need to replace it. Also, 85.6% agreed that in general they try to produce the best quality products for obese females. Previous studies have found that one's body cathexis and design preferences can be significantly influenced by their body shape (Chattaraman & Rudd, 2016; Feather et al., 2016; Yoo, 2013). In contrast to physiological or perceptual aspects, psychological aspects of the consumer have been the focus of the majority of body shape research (Connell et al., 2016). As a result, little is understood about how body shape affects typical consumer behaviors that are based on perceptual analysis. However, the focus of the relationships tested was on the perceptual aspects of the interaction between the body shape and apparel shape, even though the current study addresses a psychological factor, namely body cathexis.

To add more, 82.6% of the respondents agreed that producing fashion and apparel products of good quality is very important to them. Additionally, people frequently feel that their ideal physical self and their actual self are different from one another (Kaiser, 2017). The consumer wishes to have a different shape than the one she currently has, as evidenced by the difference between her actual and ideal body shapes. People's perceptions of their ideal physical selves are frequently influenced by the social norms and beauty standards to which they have been exposed. It has been

discovered that the socially accepted ideal body standard contributes to women's body dysmorphic disorder and negative body cathexis (Cusumano & Thompson, 2017).

According to the study's findings, 79% of respondents said they were aware of new design approaches being used to produce sustainable fabrics and clothes. Finally, 70.1% of respondents felt that keeping accurate records of transactions is necessary for fashion designers in order to grow their firm. It has been discovered that weight discrimination causes "social stigmatism and stereotyping and that can lead to depression, discrimination, and binge eating" (Dye, 2018, p.2). Thus, weightism is not simply a problem at the workplace; it can also lead to binge eating among those who are overweight. While weightism mostly affects adults, it has also been observed in kids. According to Steiner-Adair and Vorenberg (2019), "boys and girls both joke about, tease, and bully classmates whose body sizes do not fit the cultural norm" (Steiner-Adair & Vorenberg, 2019), these behaviors and views regarding weight are "firmly established in most elementary schools."

Children have reported "significantly higher rates of mistreatment reported by overweight and obese adolescents than those of normal weight" as a result of these ideas being put into practice (Buccianeri et al. 2013, p. 49). Due to the limited number of fashion options, weight discrimination is harmful. For kids, it can result in a shortage of fashion options that would make them stand out among their peers. Adults who are obese may have few options and may need to shop online for apparel, which poses even more serious issues.

According to conventional belief, one must look their best and present themselves professionally in order to land a high-paying job. However, one requires money to buy professional gear, which an obese person might not be able to do without a well-paying

work. Therefore, there are economic ramifications to the relationship between overweight women's fashion choices.

CHAPTER SIX

SUMMARY OF FINDINGS, CONCLUSION AND RECOMMENDATION

6.1 Summary of Findings

The aim of the study was to analyze body proportions and their unique attributes for optimized garment fit in plus-size women. The researcher utilized a descriptive research approach. The quantitative research design was used. The total population was 320 respondents. The study's 175 participants were chosen through the use of random sampling techniques. Thus, the accessible sample size was determined to be 175 samples, or 54.6% of the 320 respondents who made up the targeted population. To gather information from the respondents for this study, a questionnaire was developed. Using SPSS version 23 a computer statistical tool for social scientists., all of the quantitative questionnaire responses were processed,

6.2 Major Findings

The unique body proportions and specific attributes of plus-size women and how these differ from standard sizes

The study result indicates that an average of 74.6% of the respondents agreed that the various types of women's shapes or figures were pear (mean score of 4.32, ranked 1st), hourglass (mean score of 4.21, ranked 2nd), top hourglass (mean score of 4.16, ranked 3rd), Inverted Triangle (mean score of 3.98, ranked 4th), Bottom Hourglass (mean score of 3.85, ranked 5th), Rectangle (mean score of 3.76, ranked 6th), Spoon (mean score of 3.12, ranked 7th), Diamond (mean score of 3.08, ranked 8th), Triangle (mean score of 3.03, ranked 9th), and Oval (mean score of 3.02, ranked 10th).

The impact of garment fit on comfort, confidence, and satisfaction among plus-size women

According to the study's findings, 70.1% of respondents felt that visible fashion industry experts have promoted the idea that women's bodies are pliable to clothing. Additionally, 80.8% of respondents concurred that women's thigh wear issues in their pants are blamed on fashion designers by claiming that they have an unsuitable body type.

In addition, 77.2% of respondents concurred that size bias has been justified by some shops as an exclusionary or aspirational marketing strategy. Additionally, 61.7% of respondents concurred that not all clients connect favorably with fashion designers. Additionally, 75.4% of the respondents concurred that the stigma associated with being "fat" or obese extends outside of the fashion business to a number of fields related to health and wellbeing.

Furthermore, 83.2% of the respondents concurred that medical professional, even those who specialize in the treatment of obesity, had been found to exhibit severe obesity prejudice. According to the study's findings, 79% of respondents believed that students studying physical education, psychology, and nutrition suffer from an obesity bias. According to the study's findings, 70.1% of respondents believed that fashion designers held the view that being overweight always has a negative impact on one's health and indicates a lack of self-control.

Additionally, 80.8% of respondents stated that bias against obese persons has become a commonplace phenomenon. Additionally, 77.2% of the respondents felt that the prevalence of the thin ideal over the past few decades had led to an increase in explicit weight bias and weight-based discrimination. Additionally, 75.4% of respondents

believed that being overweight has a negative effect on one's perception of physical beauty.

Furthermore, 83.2% of the respondents concurred that people who experience stigmatization of their weight frequently eat more food and lose less weight than people who experience less stigma. According to the study's findings, 79% of respondents concurred that a person's psychological make-up may lead them to have high levels of explicit obesity bias. In addition, 75.4% of the respondents concurred that a bias towards obesity has also been associated with individual traits like body size, gender, and race.

Current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types

According to the study's findings, 68.9% of respondents said it was important to regulate the social belief that "fat" is a bad quality. Additionally, 67.7% of the respondents believed that fat clientele need some level of customization. In addition, 70.1% of the respondents concurred that additional fashion knowledge is often needed to sew for fat females from a secondary source, such as a website, a class, or a guidebook.

According to the study's findings, 66.5% of respondents said they used clever fashion designs to lessen the social and environmental effects of the life cycle of a fashion product. Additionally, 82.6% of the respondents concurred that they think about how the colors and prints they chose for their fashion collection will affect the environment. In addition, 82% of respondents concurred that they produce a product that works better and lasts longer, minimizing the need to replace it.

Also, 85.6% agreed that in general they try to produce the best quality products for obese females. To add more, 82.6% of the respondents agreed that producing fashion and apparel products of good quality is very important to them. The study results held that, 79% of the respondents agreed that they are aware of the emerging design strategies in production of sustainable clothing and textiles. Finally, 70.1% of the respondents agreed that fashion designers must keep proper records of transactions to improve the business.

6.3 Conclusion

According to the study's findings, fashion designers are more likely to stigmatize obese women than thin ones, and discrimination based on one's weight has been shown to bring about "social stigmatism and stereotyping, which can lead to depression, discrimination, and binge eating." These actions and attitudes around weight are "firmly established in most schools as both boys and girls joke about, tease, and bully classmates whose body sizes do not fit the cultural norm". Additionally, children report "significantly higher rates of mistreatment reported by overweight and obese adolescents than those of normal weight" as a result of these ideas being put into practice.

Discrimination based on weight has a negative impact on the range of available fashion options. When it comes to adults, it poses even more serious issues if obese people have few options and may need to shop online for clothing. For kids, it may result in a lack of fashion options that isolates them from their friends.

6.4 Recommendations

In the view of the various findings that emerged from this study, the following recommendations are made;

1. There is the need to control the social ideology and negative attribute that ‘fat’ is a negative and ugly.

2. Fashion designers should maintain a certain degree of customisation required for obese females.

3. Fashion designers should do research to find out additional fashion information usually needed from an external resource like a website, a workshop, or a booklet to sew for obese females.

4. Psychological, socioeconomic, and clothing variables impacting obese ladies' choice of clothing should be taken into consideration by fashion designers.

5. In order to raise the standard of clothing on the local market, fashion designers must continually conduct research on the needs of fat females.

6. Obese girls should get along well with one another regardless of their dress choices, and they shouldn't use someone else's attire to gauge their social standing.

7. In order to prevent provocations, harassment, and distractions of all kinds, fashion designers should reorient students on appropriate dress practices and discourage the wearing of divisive, confused, and uncultured apparel on campus.

8. Obese women should dress well, regardless of the latest fashion, which they can do if they are aware of their structural flaws and dress to hide them.

9. Obese girls' apparel and accessories should be used with moderation and in a way that respects and offers them dignity..

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APPENDIX A

AKENTEN APPIAH MENKAH UNIVERSITY OF SKILLS TRAINING AND ENTERPRENEURIAL DEVELOPMENT

QUESTIONNAIRE FOR THE RESPONDENTS

Dear Respondents,

The researcher is studying a Master Program at AAMUSTED, Kumasi Campus. I have designed the following questionnaire to **"analyze body proportions and their unique attributes for optimized garment fit in plus-size women".** Your comments will be treated with the strictest secrecy and will only be used for academic purposes. Please complete this questionnaire; it would be greatly appreciated. It will take between ten and fifteen minutes. I kindly request your assistance in this matter.

Section A: Demographic Information of the respondents

1. What gender are you?

A Female [] Male []

What age group do you fit into?

Younger than 18 [] Between 19 and 29 [] 30-39 years [] 40-49 years [] 50-59 years [] Ages 60 to 69 [] Ages 70 and older []

3. What is your highest level of education?

MSLC, JHS and SHS [] Degree [] An undergraduate degree [] A master's degree [] PhD []

SECTION B: The unique body proportions and specific attributes of plus-size women and how these differ from standard sizes.

Please rate using a 1–5 scale, with 1 denoting strongly disagree, 2 denoting disagree, 3 denoting uncertain, 4 denoting agree, and 5 denoting strongly agree.

The various types of women's shapes or figures	**1**	**2**	**3**	**4**	**5**
Hourglass					
Pear					
Rectangle					
Inverted Triangle					
Bottom Hourglass					
Top Hourglass					
Spoon					
Rectangle					
Diamond					
Oval					
Triangle					

SECTION C: The impact of garment fit on comfort, confidence, and satisfaction among plus-size women.

Please rate using a 1–5 scale, with 1 denoting strongly disagree, 2 denoting disagree, 3 denoting uncertain, 4 denoting agree, and 5 denoting strongly agree.

Challenges of figure types in garment construction	**1**	**2**	**3**	**4**	**5**
The idea that women's bodies are pliable to clothing has been promoted by prominent members of the fashion industry.					
Women's thigh wear issues in their jeans are blamed on their improper body types, according to fashion designers.					
Some retailers have defended size bias as an aspirational or excluding marketing strategy.					
Not every customer will have a favorable experience with a fashion designer.					
Beyond the fashion business, a number of health and wellness professions also oppose "fat" or obesity stigma.					
It has been discovered that doctors and nurses, especially those who focus on the treatment of obesity, exhibit significant obesity bias.					
Bias against obesity among students of nutrition, psychology, and physical education.					
According to fashion designers, being overweight always indicates a lack of self-control and negatively					

impacts health.					
Obesity bias is becoming a widely recognised form of discrimination.					
In recent years, as the thin ideal has become more widespread, there has been an increase in explicit weight bias and weight-based discrimination.					
Being overweight has a detrimental effect on how appealing you are seen as physically					
Those who experience weight bias frequently eat more food and lose less weight than those who experience it less frequently.					
A person may be predisposed to possess high levels of explicit obesity prejudice due to a number of psychological factors.					
Body size, gender, and ethnicity are only a few examples of the individual attributes that have been connected to an obesity prejudice.					

SECTION D: Current plus-size clothing manufacturing standards and their adequacy in providing optimal fit for diverse body types

Please rate using a 1–5 scale, with 1 denoting strongly disagree, 2 denoting disagree, 3 denoting uncertain, 4 denoting agree, and 5 denoting strongly agree.

Statement(s)	**1**	**2**	**3**	**4**	**5**
Controlling the social belief that "fat" is a bad quality;					
Customers that are obese demand some level of customization.					
To sew for fat ladies, additional fashion knowledge is often needed from a secondary source, such as a website, a course, or a booklet.					
To lessen the social and environmental effects of the life cycle of a fashion product, I employ intelligent fashion designs.					
When selecting colors and prints for my clothing line, I take the surroundings into account.					
I design products that perform better and endure longer, requiring less frequent replacement.					
I place a lot of importance on producing high-quality fashion and apparel products.					
I am aware of the new design approaches being used in the creation of eco-friendly textiles and clothes.					
To grow their business, fashion designers must maintain accurate records of all transactions.					

Thanks for your cooperation