

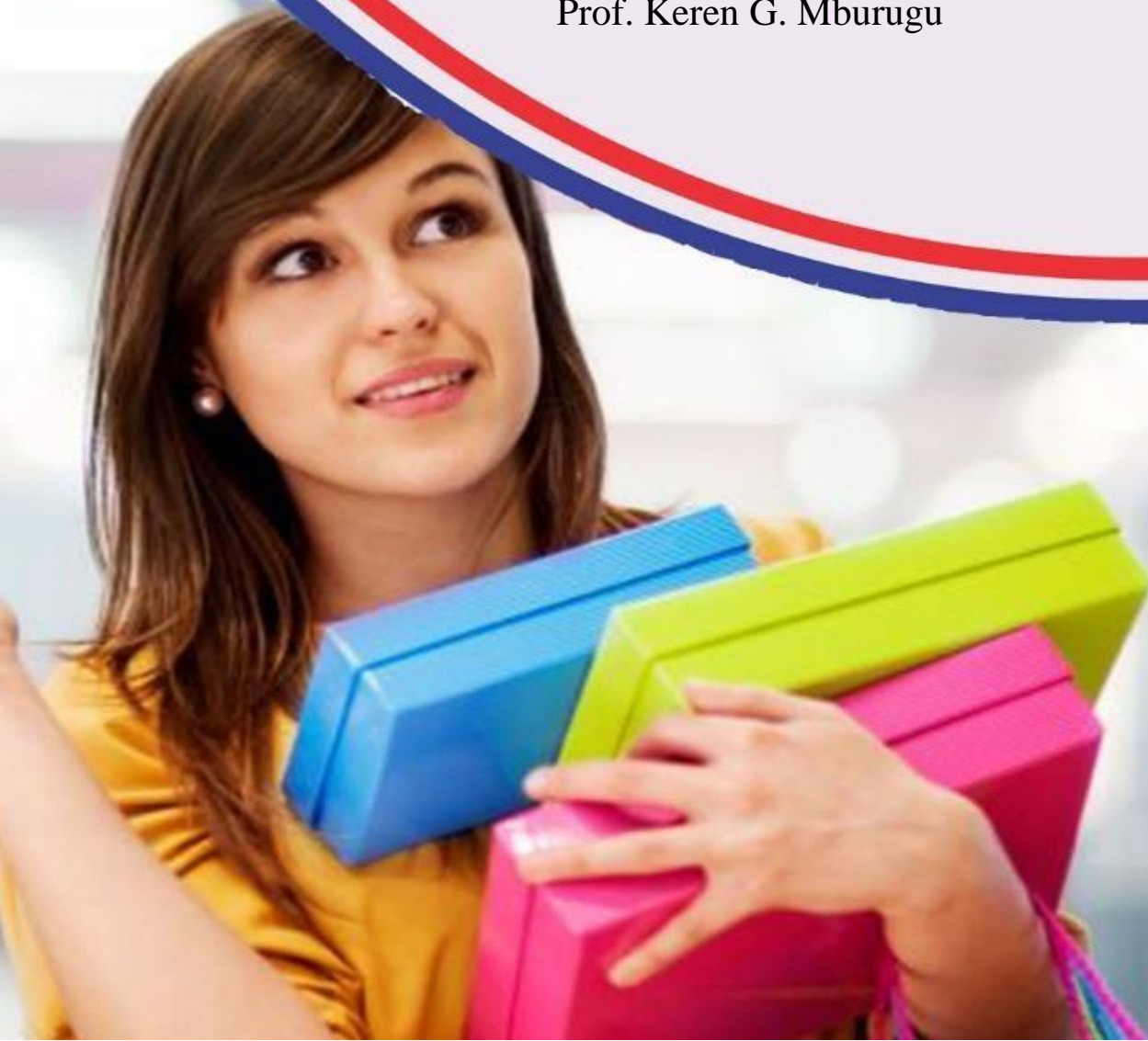
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## **APPRENTICES PERCEPTION ON APPAREL FIT MADE WITH PATTERN DRAFTING AND FREE-HAND CUTTING METHODS**

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## **APPRENTICES PERCEPTION ON APPAREL FIT MADE WITH PATTERN DRAFTING AND FREE-HAND CUTTING METHODS.**

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### **ABSTRACT**

**Purpose:** To assess the perceptions of apprentices on apparel fit made with pattern drafting and free-hand cutting methods.

**Methodology:** The study employed a cross-sectional descriptive survey was considered adequate for this study as it has the advantage of soliciting respondent's views on the nature of the situation as it existed at the time of a study. The design is an efficient way of collecting information of a large group of people within a short time using questionnaires. The survey design was deemed appropriate for this study as it has the advantage of seeking the views of informal dressmakers and tailors on the use of pattern drafting and free-hand cutting in apparel construction. It allowed for the use of both quantitative and qualitative techniques in the study. This paved way for better understanding of a phenomenon under study. The use of these methods offered the opportunity to have in-depth information and also the weakness in one method is compensated for by the strength in another method.

**Results:** respondents agreed that using free-hand cutting method of apparel construction has certain limitations such as its inability to neither produce a perfect fit, takes care of fullness nor bring out the curves among others. Less than one third of the respondents were of the view that free-hand cutting contributed to perfect fit of apparel. Apprentices held a positive view about the use of pattern drafting as providing better fit of apparel as compared to free-hand cutting. It was

summed that although free-hand cutting was the main training method used, some styles, because of their unique features, could only be cut with pattern and comes out better than freehand cutting.

**Unique Contribution to theory, practice and policy:** The implication is that given the opportunity, training and necessary materials, these apprentices would start using more of pattern drafting than free-hand cutting. Therefore, the study recommended that the IDTA increase the opportunities of pattern drafting training which will lead to more production of better apparel fit.

The study recommended the IDTA should enact policy to incorporate pattern drafting and other methods of apparel construction into the training curriculum of apprentices to develop interest in the use of these methods right from the onset. Additionally, the study suggested future studies to focus on the factors that contribute to the dropouts during the apprenticeship period.

**Keywords:** *Apprentices, Pattern Drafting, free-hand cutting, apparel fit*

## **INTRODUCTION 1.1Background to the study**

Most informal dressmakers and tailors are not aware of the inaccuracy of apparel sewn with the free-hand method (Foster & Ampong, 2012). As a result, they prefer free-hand cutting to other sewing method which seems to them faster, but sometimes pose a lot of problems in terms of fit for their clients when the apparel is made. The method of apparel construction has great influence on the outcome of apparel fit. Since, each technique is suited to a particular fit and style and modification, the dressmakers need to familiarize with both of the techniques to enable utilization of a technique where it is best suited.

The use of free-hand cutting does not involve much precision, science and formal education therefore, informal dressmakers and tailors in Ghana seem to be comfortable with it (Foster & Ampong, 2012; Obinnim & Pongo, 2015a). Many dressmakers acquire and use the skills of sewing as hobbies or part-time jobs to enhance their income. They are very busy and do not find the time or bearing of schooling to gain more in-depth knowledge to be more skilful (Gizeski, 2009). It has been observed that most informal dressmakers and tailors prefer to use free-hand cutting while sewing because it is a faster way of making apparel without minding its fit (Efajemue & Lily, 2011). According to Efajemue and Lily (2011), clothes made from pattern drafting are made to fit well and done to the wearer's choice and exact size. In contrast, freehand cutting method is less time consuming and easy to learn.

## **1.2 Statement of the Problem**

Clients now demand better products as they have difficulties with the fit of apparel made by their informal dressmakers and tailors (Wallace & Choi, 2011). The level of dissatisfaction with the fit and modification of apparel by clients of informal dress makers, tailors and apprentices has increased (Dove, 2016). Studies by Foster and Ampong (2012) revealed that pattern drafting still remains a challenge in the informal sector (small scale apparel industries) because it is believed that free-hand cutting instructions were fewer and easier to commit to memory. Studies by Mangieri (2006) and Foster and Ampong (2012) revealed that, the input cost, including labor and energy, poor product quality, unpredictability of prices and lack of market outlet are some of the setbacks in the fashion industries in Ghana.

It has been observed that in Ghana, the informal dressmakers and tailors' industry is growing speedily. Limited technical know-how on the skills with regard to pattern drafting which ensures that apparel comes out with unique style and improved fit, seems to pose problems in its use (Efajemue & Lily, 2011; Foster & Ampong, 2012). This problem was supported by the study by Kinuthia (2010) who indicated how informal dressmakers and tailors in Kenya face a challenge in apparel making due to the lack of education and training.

### **1.3 Purpose of the study**

To investigate the apprentices' perceptions on apparel fit made with pattern drafting and freehand cutting.

### **LITERATURE REVIEW 2.1 Challenges of informal Dressmakers and Tailors**

Foster and Ampong (2012) and Foster and Adamtey (2009) intimated that with regard to freehand cutting, masters normally allow learners to explore because there is not enough documented information on skills for the method. Researchers realized that in most cases beginners are given a small piece of brown paper to manipulate the cutting of particular styles without using accurate measurements for a number of months just to master how to hold the scissors well and cut.

For the foregoing reasons, the researchers also agreed on the use of pattern drafting in apparel making as part of the training for the informal fashion industry but lack the technical know-how (Foster & Ampong, 2012; Foster & Adamtey, 2009). There are few documented studies on the challenges for skills recognition in the informal sector in foreign countries worldwide. These challenges need to be studied to identify where skills exist, define those skills, communicating to learners, and administer the learning process.

Steenekamp and Singh (2012) indicated that five African countries beside Ghana, namely; Mauritius, Seychelles, Botswana, Namibia and South Africa were studied for recognition and validation of informal learning. The results of these studies facilitated the participation in formal education and training, employability and labor mobility in the informal sector (Steenekamp & Singh, 2012).

There are many constraints associated with sewing using adapted patterns for informal dressmakers and tailors. The processes of drafting and adaptation of patterns before laying, cutting and sewing is time consuming and may be difficult for an inexperienced person. It can be boring to a dressmaker or frustrating if the individual lacks the needed competence (Foster & Ampong, 2012). The dressmaker or tailor may not be able to satisfy his/her clients' needs without detailing the design at the first stage of construction before sewing (Boakye, 2010; Foster & Ampong, 2012; Obinnim & Pongo, 2015a). Hence, conflicts may arise due to incompetence and costs interests. This outlines the need to address the constraints in apparel making through measures such as vocation training, internship and enterprise education in Ghana.

### **2.2 Traditional Apprenticeships**

In Ghana, the use of apprenticeships is increasing for youth 15–30 years of age, as measured by Ghana's Living Standards Surveys in 1991/92 and 2005/06 (World Bank, 2009). The share entering an apprenticeship has been rising for young men and women, reaching just over



onequarter of the population, but with a higher growth rate for young women. Apprenticeships are more evident. Traditional apprenticeships are by far the most frequent form of skills training in Africa for the informal sector, with a concentration in West and Central Africa.

Filipiak (2007) and Haan (2006) estimate that up to 70 per cent of urban informal sector workers in Africa have been trained through the traditional apprenticeship system. The Ghana Statistical Service (2012) for example, found 207,000 youths registered as apprentices in 2002, while in this same period, a much smaller number, just over 50,000 youths, were enrolled by public and private providers (World Bank, 2009).

Traditional and formal apprenticeships have fundamentally different structures (Filipiak, 2007; Haan, 2006). Traditional apprenticeships in the informal sector consist of private contractual arrangements between a parent or apprentice and a master craftsperson who agrees to provide practical training in the workplace, ranging from several months to three or four years in duration, and subsequently to certify the training in return for some fee or reduced earnings for the apprentice while learning (Biney-Aidoo & Antiaye, 2013). Traditional apprenticeships have both strengths and weaknesses. They are self-financing and self-regulating and provide practical, hands-on training with good prospects for employment after training.

However, traditional apprenticeships suffer from weak education among the entrants, where literacy is an issue (Biney-Aidoo & Antiaye, 2013). Few participants pass beyond a lowersecondary education and many will not have completed a primary education. In addition, choices of trades follow gender biases. Master craftsmen, in turn, do not provide theoretical knowledge alongside practical experience and, more often than not, teach outdated technologies (Palmer, 2007). Pedagogy varies and few market standards are available to judge the quality of the training provided (Johansson & Adams, 2004).

### **2.3 Apprenticeship and Gender Equality**

Apparel manufacturing is a major determinant of Ghana's economic growth and development. It is one of the industrial businesses that are labor intensive and a systematic form of manufacturing that does not require highly sophisticated technical skills to start off.

Pongo et al., (2015) reported that apparel construction is a small-scale occupation for both men and women in Ghana and has been practiced for many years with sustained conditions of apprenticeship in the industry. The National Apprenticeship Services (NAS) which has been set up by the YWCA in most countries has encouraged and increased apprenticeship training for young people and this saw a significant increase in the 2010 in England (TUC & YWCA, 2010; Marangozov et al., 2009).

This increase was more in the area of gender equality which has led to an increase in the proportion of female apprenticeship. The increase in female apprenticeship as reported was largely due to an increase in workforce in mostly retail and business services and not increasing influx of young women (Fuller & Unwin, 2012; Betto & Vereshchagin, 2009). Beck, Fuller and Unwin (2005) reported that occupations with labor shortages are in areas such as construction and automotive engineering where female participation is lowest. In addition, men wishing to work in hairdressing

or childcare may be dissuaded not only by the low pay prevalent in those sectors but also by stigma and tagging attached to these occupations as “women’s work”.

Researchers have also reported that there is a correlation between low pay and the prevalence of women in certain apprenticeship sectors. Beck, Fuller and Unwin (2005) showed that in England, in 2007 electro- technical, engineering and construction apprentices topped the wages league with 210, 189 and 174 pounds pay piece but had 1%, 3% and 1% women apprentices. In contrast, the bottom of the wage league was health/social care, childcare and hairdressing apprentices with 157, 142 and 109 pounds pay piece with high women participation of 92%, 97% and 92% respectively.

In Ghana, women with sewing skills have been said to have benefited from sewing apprenticeship since they mostly work at home and also have enough time to take care of their families without obstacles (Biney-Aidoo, 2006). Gondwe and Walenkamp, (2011) using information from the Ghana Statistical Service reported that the distribution of apprentices in the service sector were mostly (36%) in the textile and apparel industry and predominantly women (78%). Imirhe (2004) showed that most of master craftsmen (67.5%) and apprentices (70.4%) in the dressmaking and tailors industry were females.

In an Agreement with the aforementioned, Fuller and Unwin (2012) also revealed that apparel construction historically throughout the world has been dominated by women. This is also prevalent in most communities in Ghana where sewing is seen as more women work than men. Fuller and Unwin (2012) further argued that most young girls receive training in needlework and handicrafts skills within the home and this helps them to easily enroll in the trade.

## **2.4 Apprenticeship and Educational Levels**

Apprenticeship is where master craftsmen and apprentices agree to the apprentice given a prescribed on the job training for a defined time period through practical experience, and under the supervision of the master craftsmen. In Ghana, this agreement is mostly not formal and not written (Anokye & Afranie, 2014). It is a kind of on-the-job training which allows the apprentice to learn from the workplace (Uwameiye & Iyama, 2010). The apprentice system of training dressmakers and tailors provides a form of training for the youth to have expertise in employable skills which could help the youth to gain employment.

Apprentice training in sewing organized by master craftsmen has been in existence for years where knowledge and skills in making clothing are taught to individuals from generation to generation. The knowledge acquired by master craftsmen is passed on through generations to ensure continuity (Larbi & Atta 2009). They intimated further that it is important for the youth to be trained through the system of apprenticeship to acquire strong vocational and technical skills especially where the youth have no academic qualifications or other paper qualifications. Eze and Okorafor (2012) indicated that traditional apprenticeship training provides vocational and technical skills and this informal training sector is important for every economy.

The Ghanaian national policy which was introduced in 2002 mandated that Junior Secondary School graduates who dropped out of formal school should be given the opportunity to undertake apprenticeship in informal education was seen as laudable (Ghana Statistical Service, 2014). Many researchers have presented many and varied entry requirements for new apprentices but Donkor

(2006) reported that though entry requirements vary for new apprentices however, it's generally opened for one who can pay the training fee, but minimum educational requirements do not exist (Middleton, Anokye & Afranie, 2014).

Some level of education is important for a category of teaching to be done in apprenticeship but some dressmaker apprentices may not have had basic education. A number of studies have shown that master craftsmen have had some education but Imirhe (2004) reported that 84, 6% and 15.4% of apprentices examined had first cycle and second cycle education respectively. Uwamieya and Iyama (2010) argued that apprenticeship was mostly available to school dropouts and those who cannot afford acquiring some level of education may be helpful in apprenticeship training but might not be pre-requisite entry criteria.

## **2.5 Apprentice Age and Training Period**

Apprenticeship as a means of acquiring skills and transferring them from generation to generation in the wake of the changing socio-economic conditions in Ghana also faces challenges in its processes and dynamics. It is important to examine how apprenticeship in various service fields provides alternative paths to job acquisition and entrepreneurship (Freund, 2008; Moubari, 2012). In Ghana, Anokye and Afranie (2014) reported that nearly 33% and 42% of students drop out of Junior High School and Senior High School respectively. It was also evident that most of the master craftsmen/women in apparel making have limited theoretical basis of their trade and were financially handicapped. They turn to vocational and technical skills to make a living. Evans (2013) reported that in England, new apprentices were mostly of age 25 years and above and had risen to 44%.

The formal educational system seems not to provide the requisite vocational and technical skills which will enable students to produce standard fashion products. This in effect makes the students unemployable in the formal sector as they are unable to exhibit the required skills needed to meet the competitive nature of the job market. Many of the young school dropout people, as a survival and coping strategy, have opted for learning a trade and settling in the informal sector. This has created awareness and increased interest in apprenticeship training in the informal sector in Ghana and Africa at large (Fox & Gaal, 2008; Connell & Presley 2012).

DiMacro (2010) intimated that the apprenticeship system which was once regarded as a 'marginal job' is now an important determinant of the Ghanaian economy. Apprenticeship training as a way to learning a trade is beneficial and should be organized regularly with theoretical and practical components.

Some researchers have indicated that most apprentices enter the training in the adolescent age. For instance, Anokye and Afranie (2014) reported that a great number of pre-teens in the adolescent age starts apprentice training in most instances. This could be due to the fact that, in the past or the mid-year of 1900s, young people had to support household chores before entering into training. Anokye and Afranie (2014) reported that new apprentices examined in a study ranged in age from 14 years to 35 years with a frequency of 78.5% and 20% for the age groups 19years – 24 years and 18 years and lower respectively. This contrasting revelation of new apprentices at youngest age of

14 years and majority between 19 – 24 years may be due to most students completing Junior High school at about 15 years in Ghana before joining the apprenticeship system (McIntosh, 2007).

The duration of apprenticeship varied from various service sectors. There is limited documented information on the durations of apprenticeship. Hogarth and Hasluck (2003) reported that the average duration of apprenticeship training ranges from one year to five years but differs for the various professions. They indicated that duration of apprenticeship training is longer in engineering and construction sectors than sewing and social care. Anokye and Afranie (2014) intimated in a study in Ghana that, most apprentices totaling 76% spent an average of 3 years, whereas only 14% spent 2 years in training.

Notwithstanding Anokye and Afranie (2014) further reiterated that some apprentices totaling 6% or less spent close to 4 years on the training. There are also some instances where apprentices stay on and provide additional services to their master craftsmen to pay off their fees or be on contract appointment.

### 3.0 Research Methodology

The study employed a cross-sectional descriptive survey was considered adequate for this study as it has the advantage of soliciting respondent's views on the nature of the situation as it existed at the time of a study (Creswell, 2012; Mugenda, 2008). The design is an efficient way of collecting information of a large group of people within a short time using questionnaires. The survey design was deemed appropriate for this study as it has the advantage of seeking the views of informal dressmakers and tailors on the use of pattern drafting and free-hand cutting in apparel construction. It allowed for the use of both quantitative and qualitative techniques in the study. This paved way for better understanding of a phenomenon under study. The use of these methods offered the opportunity to have in-depth information and also the weakness in one method is compensated for by the strength in another method (Creswell, 2012). The study used SPSS version 20 and Excel for the analysis of the quantitative data. The data analyzed was presented in form of tables and figures.

### 4.0 Results and Discussion

Results of the findings of apprentices' views on fit using pattern drafting in construction of the apparel are shown in Table 1.

**Table 1: Apprentices' Views on Fit of Apparel using Pattern Drafting**

No	Statement on Pattern Drafting	<u>Agree</u>	<u>%</u>	<u>Disagree</u>	<u>%</u>
1	Pattern drafting contributes to fit of an apparel	166	100	0	0
2	Pattern drafting enhances the aesthetic view of an apparel	166	100	0	0
3	Pattern drafting takes care of fullness	163	98.2	3	1.8



4	The curves in pattern drafted apparel fit better	164	98.8	2	1.2
5	Pattern drafted apparel gives more comfort in wearing	159	95.8	7	4.2

**Source:** Analysis of Survey Data (2017)

As can be seen in Table 1, most of the apprentices agreed with the fact that use of pattern drafting in apparel construction had advantages over free-hand cutting. All the respondents (N=166, 100%) indicated that the use of pattern drafting contributed to perfect fit of apparel. Regarding the aesthetic view of the apparel, all respondents agreed that the pattern drafted apparel was better as clients easily appreciate apparel which stand out or show clearly all the aesthetical features. On the issue of whether pattern drafting takes care of the fullness of the apparel, 162 (98.2%) of the apprentices agreed to the statement. The results revealed that most of the apprentices believed that the fullness of apparel made from pattern drafting was good. The results also show that the majority of the apprentices (N=164, 98.8%) indicated that the outward and inward appearance of apparel made from pattern drafting came out better. In general, the respondents were of the view that apparel made from pattern drafting feels more comfortable in wearing as indicated by 159(95.8%) of the apprentices with only a few who disagreed (N=7, 4.2%).

Another set of questions were used to explore apprentices' views on apparel constructed with free-handing cutting. Table 2 presents the results

**Table 2: Apprentices' Views on Fit of Apparel using Free-hand Cutting**

No	Statement on Free hand Cutting	Agree	%	Disagree	%
1	Free-hand cutting contributes to fit of an apparel	49	29.5	117	70.5
2	Free-hand cutting enhances the aesthetic view of an apparel	12	7.2	154	92.8
3	Free-hand cutting takes care of fullness	51	31.0	115	69.0
4	The curves in free-hand apparel fit better	4	2.4	162	97.6
5	Free-hand apparel feels more comfortable in wearing	37	22.3	129	77.7

In Table 2, more than two thirds (N=117, 70.5%) did not agree to the statement that free-hand cutting contributed to perfect fit of an apparel though 49(29.5%) agreed. On the statement that free-hand cutting was able to bring out the aesthetic view of an apparel, 154 (92.8%) of the respondents agreed while the rest disagreed. Majority 115 (69%) of the apprentices did not concur

to the statement that free-hand cutting takes care of fullness of apparel construction to enhance perfect fit. As many as 162 (97.6%) did not agree to the view that the outward and inward appearance of apparel made free-hand cutting comes out better whereas a few indicated it does. The majority (N=129, 77.7%) of the apprentices refuted the general perception that apparel made from free-hand cutting feels more comfortable in wearing.

As seen in Table 2, respondents agreed that using free-hand cutting method of apparel construction has certain limitations such as its inability to neither produce a perfect fit, takes care of fullness nor bring out the curves among others. Less than one third of the respondents were of the view that free-hand cutting contributed to perfect fit of apparel.

## **5.0 Conclusion and Recommendation**

The study concluded that majority of the apprentices attested to the fact that use of pattern drafting in apparel construction enhances aesthetic nature of the product and ensures perfect fit. Majority of the respondents also indicated that the use of pattern drafting contributed to the perfect fit of an apparel. This view may have been influenced by relating ready-made apparel normally made by pattern drafting with that made by free-hand cutting. The respondents also confirmed that the use of pattern drafting changed and translated itself better on the figure, that is, when apparel is being worn by models. Apparel were easily appreciated by clients if the wearer stood out or showed clearly all the aesthetical features.

Generally, the responses from apprentices on the fit of apparel made from pattern drafting suggested that they are happier with the outcome on apparel made with pattern drafting than free-hand cutting. Apprentices also held a positive view about the use of pattern drafting as providing better fit of apparel as compared to free-hand cutting.

Apprentices held a positive view about the use of pattern drafting as providing better fit of apparel as compared to free-hand cutting. It was summed that although free-hand cutting was the main training method used, some styles, because of their unique features, could only be cut with pattern and comes out better than free-hand cutting. The implication is that given the opportunity, training and necessary materials, these apprentices would start using more of pattern drafting than free-hand cutting. Therefore, the study recommended that the IDTA increase the opportunities of pattern drafting training which will lead to more production of better apparel fit.

Additionally, there are factors that contribute to the dropouts during the apprenticeship period. Further studies can be conducted to ascertain the causes and suggest solutions to help curb this phenomenon as the youth are the engine to the sustainability of the informal fashion industry.

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