Part II. All Bodies Deserve Clothes

Pattern Cutting Without Cultural Appropriation

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In this chapter we consider how cultural appropriation can be minimized within the process of pattern cutting in fashion design. In the creative arts, cultural appropriation is the adoption of different, creative elements of a minority culture by members of another creative, yet more dominant culture. This can involve the use of concepts, objects, emblems and other facets of visual or non-visual artefacts that are associated with a particular culture. Cultural appropriation is widespread in the fashion design process and can be seen in the use of: design, textiles, silhouette, models as well as in patternmaking. Many current fashion teaching methods comply, normalize and perpetuate cultural appropriation. For instance, fashion design students are often instructed to gather images from different cultures and pull elements of them together to create a narrative for a design and subsequently a pattern cutting idea. There is often little regard or depth of understanding for the significance of the people or customs presented in the cultural images. This perpetuates an oppression of minority cultures and allows the empowered culture to profit from the ideas of the minority. In doing so, it has the potential to diminish the importance of the minority's cultural knowledge, visual identity and craft practices even though the dominating culture may retain admiration and respect for the plundered nations traditions.

Fashion education has not addressed cultural appropriation on a grand scale because it exists within a system that often benefits from cultural hierarchies and colonialism. Historically there has been no real financial motivation to change this system within the fashion industry because we have often trained students to work within cultural confines, whether this be

developing design and pattern cutting ideas or showing work with mood boards and technical illustrations, etc. In order to minimize cultural appropriation in the future it is important to teach students to be aware of its negative connotations throughout their fashion education in order to redress this balance of power when they enter the industry.

A literature search ascertained that pattern-cutting methods taught in the majority of global fashion schools, are largely, based on western traditions. This approach evolves around flat pattern-cutting where a shape is drafted on a flat surface, using measurements and the silhouette is created by darts and seaming. Methods of pattern-cutting in Asia, including China and Japan are more fluid and utilize the kimono shape, which is without darts. This is unstructured and involves wrapping and draping fabric on the body to create silhouette. It is also noteworthy that cultures, which have their own pattern cutting traditions, teach the craft using a western methodology. For instance, Bunka Fashion School in Japan teaches western pattern cutting despite Japan having a rich history of garment making, where cutting emanates from Eastern traditions. Examples such as this suggest there is a global dominance of western culture in pattern cutting however the west appropriate ideas from a wide proportion of global approaches to cut, in their practices. Although a greater awareness of cultural appropriation has recently been embedded in global fashion design curriculums, education has not fully embraced this in the teaching of patternmaking. This skill is integral as the pattern is the first stage in transforming a design idea into a three dimensional garment. It is often taught separately from design however patternmaking can also be a source of inspiration for design. Teaching students to rebalance their reliance on cultural appropriation in pattern cutting is important as they can be

encouraged to begin the process from a minimal reference point in order to diminish bias. It also boosts a greater ethical awareness of the activities involved in this process.

Within this chapter, we explore a pedagogic case study, which evaluated pattern cutting initiatives that minimized and shifted cultural appropriation within the classroom. This was conducted with second year undergraduate fashion design students at both Parsons School of Design (New York) and California College of Arts (San Francisco), USA. The aim was also to initiate a globally diverse approach to pattern cutting where innovation was explored, through craft approaches and the possibilities inherent in fabric. The motivation for this project came from the conversations that began when we first met at, The First International Symposium for Creative Pattern Cutting, held at The University of Huddersfield in the UK in 2013 (Almond, 2013). We initially discussed cultural appropriation within design and referred to European colonization in American history and the subsequent limitations placed on the indigenous people of the country. The conversation shifted to a discussion about pattern cutting craft. Here, we were talking about the theft of ideas and the erasure of cultural craft traditions but now there was a relatable skill set on which to hang our discussion. From a personal perspective our investment in the project meant we had to critically observe our own culture as well as learn from others as we investigated cutting practices that acknowledge a variety of cultural references. We firmly believed that by decentering western pattern making approaches within the fashion industry it could create opportunities for new knowledge in the discipline to develop as well as realistic cross cultural collaboration. For instance, in the case study students were presented with patterns for garments from different countries to demonstrate how diverse cultures arrived at similar shapes and also illustrated how each culture has its own unique approach. As the idea was to

focus on the cut of the garments themselves, we discouraged any reference to pattern cutting manuals from either the East or West. Initially, students were enthusiastic however quickly became frustrated because they could not reference the literature.

Fashion embraces the new and unexpected yet the teaching of pattern cutting tends to perpetuate methodologies without interrogating their underlying logic. Creative approaches to pattern cutting aim to challenge assumptions about our traditions, not eradicating them but unpacking them. We recognized that designing and creating patterns without any reference point was challenging because our ideas and imagination are always influenced by what we have seen: in popular culture, the fashion industry and through lived experiences. We had this discussion with students at the beginning of the project as we identified the challenges in eradicating cultural bias. We recognized how we could rebalance power in pattern cutting through minimal physical reference to other visual sources from books, magazines and the Internet etc. Therefore the students had to drape shapes on the human form to create ideas and had to explore what was possible by manipulating fabric. This initiated a problem-solving exercise between tutee and student in order to understand the qualities in the cut of the garments they began to create. We identified the value of this at the end of the project. The students felt a sense of achievement because they were forced to evaluate why each stage of the cutting process for the garments worked and to extrapolate this new knowledge to the development of their patterns. Cultural appropriation and bias was minimized, as no visual culture was emphasized as the ideal and the students explored what was possible, through the craft techniques inherent in the manipulation of shapes and the qualities of the fabrics. The case study also opened up opportunities to better understand the body and create clothes for body diversity as the class included individuals with

different body shapes, ethnicities and genders. The students were therefore encouraged to think beyond traditional body silhouette and sizing by draping the fabric on each other and considering how fabric hung beyond the traditional shape and sizing of the dress mannequin or the pattern block.

The aims of the chapter are to:

- Discuss and evaluate pattern-cutting initiatives, which minimize cultural appropriation.
- Initiate a globally diverse approach to pattern cutting where innovation in cut is explored through craft approaches and the innate possibilities inherent in fabric.
- Establish an important reference point of lasting influence and a catalyst for new thinking in the practice of pattern cutting that transcends cultural appropriation and bias and is globally significant.

Literature Review

Within the literature review we explored the wider meaning behind cultural appropriation (Hall, 1997; Vasalou, Khaled, Gooch and Benton, 2014). It is defined by the Oxford English Dictionary as, 'The unacknowledged or inappropriate adoption of the practices, customs, or aesthetics of one social or ethnic group by members of another (typically dominant) community or society' (2018:1). This statement hints at the negativity behind appropriation suggesting that removing an object or image from a country or culture and placing it within another context is both unfitting and inapt. The concept is supported by the United Nations and is guided by the principles of their charter, the: *Declaration of the Rights of Indigenous Peoples,* which seeks to protect human rights that maintain standards for the dignity, welfare and survival of indigenous peoples globally. Article 31 of the declaration states that, 'Indigenous peoples have the right to maintain control, protect and develop their cultural heritage, traditional knowledge and

traditional cultural expressions' (Cultural Survival, n.pag). This authenticates the cultural identity for different ethnicities. The sociologist Steve Fenton, described how identification with an ethnic group involves retaining a shared ancestry, national and regional origins and a sense of language (Fenton, 1999). The embezzlement of aspects of an ethnicity occurs when it is appropriated and exploited within another culture. As the writer Rebecca Naughton observed, 'Cultural appropriation affects a culture such as an ethnic group, whether that be an ethnic group currently habituating in their country of origin, or whether a group retain ancestors from that ethnicity' (2019: 10).

Within design and pattern cutting activities in the fashion industry, the cultural appropriation of an ethnic group is where the brand or designer utilizes an ethnic, visual source that belongs to another culture, religion or country but has not sought the correct permission to do this. This is subsequently used in the brand's designs to gain a profit for the company (Green and Kaiser, 2017; Pham, 2014; Vasalou, Khaled, Gooch and Benton, 2014). Cultural appropriation within the industry has been prevalent throughout its history however questioning the ethics behind it has become topical because it is in effect, theft. Some fashion scholars have considered how we can move away from cultural appropriation by shifting power structures. The academics, Green and Kaiser (2017) emphasized how the many strata's and levels of appropriation need careful consideration in relation to this. Media studies expert Minh-ha T. Pham (2014) explored how designers could benefit from a deeper historical exploration of indigenous regions in order to inspire as opposed to appropriate ideas. These concepts are further explored in the multifaceted approaches the students adopted within their work.

There has been an increase in Internet articles about the topic (Gharib, 2018; Gorrie, 2017; Manning, 2013). Naughton discussed design appropriation in Riccardo Tisci's Autumn/Winter 2015 collection *Chola Victorian,* for French fashion house, Givenchy (Armstrong, 2015). The collection was controversial because in Mexico, *Chola* is an expression used to describe a dog and it has been used to negatively describe Mexican immigrants who live in the USA. The hair styling during the fashion show was inspired by the female immigrants but failed to use any Hispanic models (Picardi, 2015). Naughton described how the designer had appropriated a style from a culture but had not involved them in aspects of the restyling. The journalist Alice Thompson, writing for The Times newspaper, described how accusations of cultural appropriation had gone into overdrive with the example of *Papercut Patterns*, a New Zealand pattern cutter for the online sewing community who, 'Had been shunned by some craft people for copying Japanese culture by suggesting that its followers try a "Kochi Kimono'' pattern' (Thompson, 2019: 25).

Pattern cutting involves the three-dimensional interpretation of a design idea in order to manufacture the final garment and the merger of cultural approaches has informed many different pattern cutting methods. There is a fundamental difference to pattern cutting in Eastern and Western cultures (Almond, 2010; Fox and Sissons, 2016; McQuillan, Rissanen and Roberts, 2013; Nakamichi, 2010; Nakamichi, 2011). This is embodied in the differences between the bodice and kimono block. The Western bodice block relies on darts and seams to create its shape, whereas the Eastern kimono block has an in-built sleeve and relies on wrapping the fabric around the body. A synthesis of these two approaches can create exciting results as emphasized by fashion journalist, Brenda Polan, 'My admiration for the Japanese designers of the last decades

of the twentieth-century, from Kenzo, through Miyake to Kawakubo and Yamamoto and their inheritors is rooted in their respect for the craft traditions of all cultures and the creativity expressed in their East meets West sensibility' (2019: n.pag).

Within the literature search we included an in-depth review of pattern cutting taught in the majority of global fashion schools. This included an analysis of contemporary and historical literature related to pattern-cutting methods (Carr, Ohrn-McDaniel and Mehta, 2016; Page, 2013; Plummer, 2016). The purpose was to identify if a bias towards teaching is based on Eastern or Western traditions. The findings identified little bias with the majority of approaches converging on three methods: flat pattern drafting, cutting on the stand and 2D and 3D pattern development software. Flat pattern drafting uses body measurements and a pre-formulated draft, the pattern is drawn upon paper in a two-dimensional format and is altered to form the style lines required in interpreting the design idea (Aldrich, 2002; Aldrich, 2008; Bray, 1986; Fischer, 2009; Joseph-Armstrong, 1999). Making up the garment in a cheap fabric such as calico allows the shape to be refined and altered, when fitted on the body. Draping on the stand is a three-dimensional approach to creating garments ideas (Joseph-Armstrong, 2008; Kissel, 2013). It involves the manipulation of fabric on a three-dimensional form to achieve a shape. This allows for greater experimentation. The draped pieces are laid onto pattern paper then traced around to create a pattern. A toile is then produced and is fitted on a model to test the pattern before the final the final pattern is created. Two and three-dimensional, CAD pattern cutting has been significantly developed in the last decade. The advantages of computerized pattern cutting lie in the saving of time and the ability to view and manipulate ideas on a screen (Fang, 2003; Hardaker and Fozzard, 1998; Jefferson, Power and Rowe, 2012; Power, Apeagyei and Jefferson,

2011; Sul and Jin Kang, 2006). Pattern designs are displayed on avatars in a variety of poses, with realistic drape.

We identified a recent body of pattern cutting literature from Japan. This explores a creative approach to cutting that appropriates both Eastern and Western influences. Pattern cutting manuals published by a former professor from Bunka College in Japan, Tomoko Nakamichi document the results of the research she carried out developing pattern cutting instruction for her students (Nakamichi, 2010; Nakamichi, 2011). A reviewer of Nakamichi's books described her approach as, 'Intimidating and inspirational at the same time, Pattern Magic is not so much a "read" as a "see and ponder' (Shea, 2018: 1). The author shows how complex sculptural effects can be added to simple garments through experimental manipulation of paper. These books also document some of the sculptural techniques created by influential Japanese designers such as, Comme des Garcons and Yohji Yamamoto. When they began showing their collections in Paris in the 1980s, their extraordinary shapes were soon appropriated by Western designers who were inspired by their creations. The *transformational reconstruction* techniques introduced by the Japanese pattern cutter and designer, Shingo Sato popularized the elimination of darting with seam lines, which is considerably different from conventional Western approaches to pattern cutting because the garments are constructed in three-dimensions (Sato, 2014). This process follows neither a Western or Eastern approach to cut.

Figure 1: Pattern workshop by Shingo Sato. Photograph courtesy of The British Fashion Council.

There is some literature that considers how the discipline of pattern cutting, has been taught and practiced, through innovative, interdisciplinary approaches. This was investigated through a review of research papers presented at, *The Second International Conference for Creative Pattern Cutting* in 2016 (Climer, 2016; Harding, 2016; Hardingham, 2016; McQuillan, 2016; Lindqvist, 2016). This conference was significant as it was an international platform for the presentation and discussion of research related to pattern cutting. Each of the identified authors had explored new ways to practice and teach pattern cutting that, 'Blur the boundaries between different disciplines, mediums and techniques, introducing reflective practice to

underpin learning by doing and encouraging the exploration of novel techniques and their benefits to learning' (Almond and Power, 2018: 34). None of these papers explored issues related to cultural appropriation in pattern cutting. Ultimately, we identified a scarcity of work that documented cutting approaches that were devoid of cultural references. Therefore, the purpose of this chapter is to record the results of the pedagogic case study, which explored a culturally bereft approach. These results are evaluated as a catalyst for new thinking in pattern cutting that will transcend cultural appropriation and be globally significant, as well as fill a significant gap in pattern cutting literature.

Figure 2: Interdisciplinary approach to cut - How Does a Box Become a Garment - Laura Hardingham. Photograph courtesy of Laura Hardingham.

Methodological Approach

We selected a qualitative methodological approach because it allows the researcher to get close to the heart of the subject. As Denzin and Linken said, 'Qualitative researchers stress the socially constructed nature of reality, the intimate relationship between the researcher and what is studied, and the situational constraints that shape inquiry' (2005: 10). We wanted the process to be both explorative and observational in order to consider the characteristics, descriptions and definitions of cultural appropriation and pattern cutting in the classroom. The first research method was the pedagogic case study, which evaluated pattern cutting initiatives, which minimize cultural appropriation and bias. This was conducted with students in the second year of their fashion design program at both Parsons School of Design (New York) and California College of Arts (San Francisco), USA. Case studies are a comprehensive and thorough analysis of a subject and its contextual setting. They inform a practice by establishing the positive attributes of what has worked and been achieved as well as identifying issues. In this educational context, the case study incorporated practice led activities in the pattern cutting studio. Practice based research involves work carried out in order to gain new knowledge by utilizing the practice and examining the outcomes of that practice. At the beginning of the activities, we discussed with the students how different cultures cut garments in contrary ways. We then explained the approach we would take in the classroom, which revolved around the creation of algorithms for cutting consisting of using shapes on the human form to create ideas with no reference to other visual sources or more importantly in the case of this research, cultural references. Instead we asked the students to explore what was possible by manipulating fabric.

The aim being to initiate a diverse approach where innovation in cut is explored, through craft approaches and the possibilities inherent in the fabrics used.

We also introduced an object-based approach, which permits an article to be closely analyzed. This allowed the students to study the on-going progression and results of their work through observation and handling (Kawamura, 2011; Kim and Mida; 2015; Taylor, 2002). On completion of the case study we sent an exit questionnaire to the students. This was devised to allow them to write down their thoughts about how they engaged with the project and what they had learnt. As a result, the focus on pattern cutting, which minimized cultural reference was not built into the questionnaire. This anonymity allowed the students to consider their exploration of creative pattern cutting in an organic way. We had devised the project to free students up from relying on cultural or indeed other pattern cutting references apart from the sub conscious visual influences gathered from their lived experiences. It was therefore essential for them to consider their learning from this shift in reference points.

Findings

Description of Project

The pedagogic case study involved second year, undergraduate, fashion design students. Although designed to minimize cultural reference, at the beginning we did not make the students aware of this approach in case it prejudiced their creative thinking. Instead, it was presented to them as a minimal reference project, the student's only tools being their pattern cutting equipment and the shapes they were given to work with. The project was entitled, *Creative Construction: Explorations in Pattern Cutting* and asked the students to create patterns and evaluate the initiatives. We explained that we would explore fashion concepts and design

practice outside the constraints of collection building. Initially, we asked students to consider how any two shapes (such as squares or triangles) with the same perimeter could fit together. They may not lie flat, but they could come together. Taking this basic rule, each student was asked to begin to work with a single shape repeated in multiple. It was suggested this could be a rectangle, a square, a triangle, or a more complex shape. From this a sculptural shape was created. New seam lines could be introduced to the shape, allowing the structural technique to influence silhouette while not dictating style lines, print or color, etc. The challenge with these shapes was that the students needed to consider how to finish them and how they would fit the human body and begin to emulate the look of a garment. In order to trouble shoot these questions, we asked each designer to completely finish the prototype garments with facings/linings and seam finishes. The garments were subsequently made in an inexpensive muslin and needed to be of high-fidelity in their make and finish.

As well as evaluating pattern cutting initiatives that minimized cultural appropriation and bias, the learning objectives of the project were to:

- Demonstrate methodologies in which pattern cutting can be used as a design process either alone or in tandem with other design processes such as drawing or draping.
- Demonstrate how explorations with non-traditional shapes can be transformed into fully functional garments.
- Develop creative innovation and experimentation in the application of pattern cutting.
- Develop the critical and reflective skills required to translate explorations into fashion design.
- Develop an independent approach to design.

Appropriation or Appreciation: The Pedagogic Approach to Cut

The approach to cut in the project began with an acknowledgement that the pattern cutting would initially be created from western knowledge. Although the students were not allowed to reference pattern cutting manuals, we discussed a modicum of selected literature at the beginning. Using *Cut My Cote* by Dorothy Burnham (1973), the students were shown how different cultures cut garments based on the width of their traditional looms. Burnham was a curator at the Royal Ontario Museum, Toronto, Canada. She published *Cut my Cote* as an exhibition catalogue to accompany a curated exhibition with the same name in 1973 and was one of the first to emphasize the proficiency of cut as essential to the interaction between fabric width, garment cut and the resultant waste of fabric. We also showed students patterns for garments from other countries to demonstrate how many cultures arrived at similar shapes, yet each culture had its own unique approach. Much of this information was derived from a book by historian Max Tilke entitled, *Costume Patterns and Designs: A Survey of Costume Patterns and Designs of all Periods and Nations from Antiquity to Modern Times* (1974). This is a large sourcebook widely used within the theatrical costume industry as it contains an exhaustive series of costume patterns and designs from all periods and nations.

This initial research created algorithms for cutting. Algorithms are instruction sets, which can be repeated with different variables. For example, as a short exercise, one shape was used repeatedly. The students cut multiple rectangles, circles or hexagons, which were pinned together to create three dimensional volumes and these were taken to the dress form to begin draping (figure 3). This forced them to step away from the conventional mindset of for instance, a bodice

or a skirt. The shapes, when pinned together, created unexpected volumes, which meant the students had to think beyond their understanding of traditional silhouettes (figure 4). Another short exercise began with an A4 piece of paper, cutting it once or twice, and connecting it together to create volume. The students had to identify one shape that could be imagined as a garment, enlarging it to a garment size and then draping with it. The underlying idea behind these exercises was to enable the students to drape with something other than a rectangle of fabric. Whether it was shapes sewn together or a rectangle with cuts it disrupted more conventional approaches to draping, although some students began to pin the shapes into a skirt or bodice shape as a way of controlling the volume.

Figure 3: Multiple rectangles. Photograph courtesy of Greg Climer.

Figure 4: A student draping with only rectangles, exploring unexpected drapes, which occur on the body as a result. Photograph courtesy of Greg Climer.

When faced with the task of draping the human form with fabric, designers often go towards the garments they are familiar with (skirt, bodice, jacket, etc), in an attempt to bring order to the shapes created. The students naturally reflected on their own prior knowledge of garments however the various cutting activities in the project disrupted this. The students wanted

to produce conventional pattern pieces but were prevented from doing so because they started with other shapes that needed to be placed on the human form (in this case the dress stand or their own bodies). Established approaches to pattern cutting were disrupted and the students were forced to be creative in order to find new outcomes. These outcomes were built in the moment and the shift in approach, from using visual references to using shapes on the human form limited cultural appropriation from happening. The designers could not reference a culture (or other pattern cutting manuals) but were exploring what was possible through crafting techniques and understanding the possibilities (as well as limitations) of the fabric.

In the classroom, the project broke down into three, 3-hour sessions, once a week for four weeks. In the first week we introduced the concept. The notion of identical shapes being sewn together was demonstrated using squares cut from calico fabric. If two identical squares were sewn together and simply stacked, one on top of the other, the result was a pillow. However, if they were offset, so the corner of one square was sewn to the middle of the other square's edge, then volume was produced. The next demonstration considered how this could be expanded. Six squares would produce a cube if they were aligned, corner to corner. However, if they are offset, the resulting volumes were more dynamic. As fabric, has a unique ability to drape and flow or hold its form, the outcomes were still able to adapt to the overall shape of the human body.

Having shown the students this basic concept of creating volume, we asked them to begin exploring shapes in a more abstract manner. Each student was instructed to select a shape and cut it in multiples. As the creative volumes evolved out of how the shapes were connected and not from the inherent complexity of the shapes, we encouraged the students to start simply, using - a

square, a triangle, a rectangle or a circle. However, they often wanted to work with a shape that was symbolic to them, such as a star or a heart. While the initial explorations were trickier with these more complex shapes, they resulted in equally compelling work. The students pinned shapes together on the table, not the dress form. They were asked to continually pick up the piece, hold it from different directions, and observe how it draped when held in each way. They were searching for forms that would inspire them to create clothes. This continued for most of the first session as the students gradually moved from the table to the dress stand, with a rough idea of what form the garment was beginning to take.

As the project evolved it proved challenging, if not impossible, to create garment shapes with minimal cultural reference. As we are surrounded by the vocabulary of many different cultures and their clothing. this is something we are visually conscious of. Therefore, an individual student's project could evolve into a shirt shape and the student had to decide if a western men's collar and button front placket was appropriate or perhaps fronts that cross and tie like an Eastern kimono. In this context it was important to remember there was a difference between minimizing cultural appropriation and bias and attempting to ignore all cultures and their influence on our daily lives. We identified that design and pattern cutting are forms of problem solving and learning how to decide upon a shape that could become a garment is a far cry from appropriating the aesthetic of another culture, it is multifaceted and more subtle. This was emphasized by Green and Kaiser who said, 'Appropriation is a complex political and ethical discussion with many nuances and layers that require careful and critical unpacking' (2017: 145). Within the case study students had to find new ways to engage with garment creation and their findings evolved from their own practice and consideration of how the shapes

they created would impact on the human form. The student's subconscious awareness of cultural influences acquired through their lived experiences therefore needed to disregard the wider impact of appropriation on indigenous identities, aesthetics and their resultant economies in order to be truly original.

In the second week of the project, the students discussed their pinned together prototypes with the group in a feedback session (figures 5 and 6). The variety of ways they designed known garments or parts of garments: shirts, sleeves, skirts, dresses, etc were considered. Conversation focused on the overall aesthetic as well as the unique solutions to shaping fabric to the body. The discussions unfolded in different ways because each student's work was unique. We wanted to identify clear examples of how they created new or unexpected ways of forming shapes. For example, a sleeve might exist which is set into an arm hole but neither the sleeve cap nor the armscye follow traditional patterns (the armscye is the circumference of the armhole measurement). Although the project was designed not to reference ideas from other cultures, we discussed how ideas found in different cultures had subconsciously collided organically on the garment. For instance, a straight band used as a collar, reminiscent of a Japanese kimono being used on a neckline that has been cut to the curve, as taught by western pattern cutters such as Winifred Aldrich (Aldrich 2002, 2008). We identified these moments were opportunities to talk about how creating patterns are problem solving exercises. What are the benefits of rectangle collars versus those of shaped collars? Which patterns create more waste and which patterns value the qualities inherent in the textiles more? How did the ideas impact on the overall aesthetic or the ability to move in the garment?

The conversations led to an understanding of how the students could put themselves into a new mindset. It was perceived that it is simplistic to believe we can follow the thoughts of an entire culture's evolution through a few questions about how a garment works. However the questions of why different shapes have evolved is an important step towards understanding other cultures. It was therefore agreed that this technique could be used in a serious and rigorous study of another culture to inspire pattern cutting as opposed to appropriating cultural ideas. This concept was suggested by Minh-ha T. Pham who described how media criticism had not stopped fashion designers from continuing to appropriate ideas from other cultures. She said, 'Critics should change the subject by examining the histories of what gets swiped—and more importantly, what doesn't (2014: n.pa). In pattern cutting, instead of simply appropriating a pattern idea from another culture a much deeper analysis of its indigenous visual heritage could result in a greater depth of original ideas instead of commandeering them.

Figure 5: Pinned together prototype discussed in student feedback session. Photograph courtesy of Greg Climer.

Figure 6: Pinned together prototype discussed in student feedback session. Photograph courtesy of Greg Climer.

Student Feedback and Observations

The focus of the case study evolved organically out of an ongoing exploration of creative pattern cutting in both of our individual research ventures (Almond 2010, 2016; Climer 2013, 2016). As a result, the emphasis on cultural appropriation was not built into the exit interviews with students and this allowed them to consider what they had achieved with minimal reference to other cultural artefacts (Almond and Climer, 2019). At the end of the project we were able to emphasize to the students the relationships between minimal cultural appropriation and bias and

a creative approach to pattern cutting. The students also acknowledged that minimal reference points had encouraged greater creativity in both thought process and practice. The interviews were conducted online and the responses were anonymous. Seven different versions of the class, delivered to different sets of students at both the educational institutions were analyzed (Parsons School of Design (New York) and California College of Arts (San Francisco), USA). The average number of respondents in total was 50% with a high of 64% and a low of 11% responding to each of the seven versions.

The question, which brought about the most insightful response was, *What were the most effective aspects of this project*? One student commented that it, 'Taught me how to start a project from nothing. Now I know I can figure out the design through the experimenting process' (respondent 1). This points towards the idea that designing can successfully begin from a place other than cultural reference and in this case the inspiration was in the shapes given to the students as a starting point. Other students reiterated this idea. The challenge of finding forms in the fabric, evolving from the initial experiments opened the students up to new possibilities. One commented, 'It gave me a totally new aspect for developing a pattern. Very inspiring and helpful for my future works. Also, the project was very challenging, but it made me want to improve for the better' (respondent 2). This highlights how many fashion students consider design and patternmaking to be a defined process of viewing inspiring images and then reimagining them as clothes. The new aspect of developing a pattern from shaped pieces refers to designing and pattern development being the same process. The clothing design is a result of the pattern cutting and the two activities are merged.

Throughout the project, we identified how the pattern cutting approach required the designer to respond to the fabrics in their hands, instead of cultural imagery pulled from literature and Internet sources. Criticism from some students was that we, as tutors did not teach from the full extent of our own pattern cutting knowledge and experience. As one said, 'The tutors introduced ideas and let the students utilize the ideas in a rather open-ended manner' (respondent 3). This was an intentional choice on our part, aimed at generating creative freedom and encouraging the exploration of many possibilities. We considered this to be critical to the success of the project because if the goal had been to generate shapes that were referential, the foresight of the end goal would have been counterproductive. This also suggests opportunities for future iterations in the project when we emphasize its pedagogic aims and objectives with the students. By introducing this meta level discussion, related to how we learn and how this fits into a play-based and creative freedom model of learning, the frustrations expressed by the student's criticism could be alleviated. Reframing the struggle and frustration at failed iterations is therefore a crucial part of the process in which we learn.

Based on our observations during the project delivery, the initial approach to pattern cutting from a minimal reference point was a struggle for the students. The results of draping on the dress stand or the human body are fleeting unless each change to the garment is carefully documented. Often students would express dismay that they had found and lost a beautiful shape and could not quite recreate it. This style of cutting is a skill, which needs to be developed. Creating habits within the students where each change is photographed or recorded in other ways, such as drawing or note taking, is a process that will also be introduced into future project delivery. Our classroom observations also identified that many students struggle to think outside

their known vocabulary of clothing. Indeed, it is difficult to think outside any vocabulary, whether language, clothing or otherwise. What can be encouraged is an awareness of choices and to continually ask - *is this choice because I know about established garment shapes or because it is the best choice for this new garment*? The students did not articulate these observations in the exit interviews although one commented, 'One of the things I really like about the project is how easy it is to start over, even just how easy it is to make a new model because I love the feeling of going back to the start' (respondent 4). Overall we identified that future project delivery will include more direct discussion of the appropriation of and use of the student's established knowledge and how this influences the subsequent learning style. It was also considered that minimal reference to cultural appropriation and bias at the onset of the project would continue to be an important element in its continued delivery so the student's creative thinking is unprejudiced from the outset (figure 7).

Figure 7: Student outcome of creative pattern cutting project. Photograph courtesy of JunLin He.

Conclusion: The Call to Action

As fashion is waking up to the negative consequences of cultural appropriation, we need to seek out new ways to work which are equitable. The project explored in the case study is one entry point into pattern cutting (as well as designing) that seeks to minimize cultural reference and bias. However, we do not advocate a fashion industry that is devoid of cultural influences and cultural cross pollination. There is an argument that without cultural appropriation and indeed admiration for different cultures, the artefacts and clothing of oppressed peoples would

have disappeared with no hope of revival however this does not mean it is acceptable as a practice. It also needs to be recognized that designers are inspired by a multitude of other visual sources. As the fashion journalist, Brenda Polan pointed out, ‘Designers have just as often been inspired by the clothing of the 'dead' or at least past cultures -- by ancient Greece and Rome of the Republic, by Mediaeval, Renaissance and Directoire, by operetta milkmaids and opera queens, archaic pirates and matelots, soldiers and streetwalkers. Is that cultural appropriation? Or is it OK because there's no one left to whine that it is’ (2019: n.pa).

It is questionable as to whether patterns are ever cut without a reference point as our ideas and imaginations are always influenced by what we have already seen. Ultimately, as instructors this was the main thing we learnt. It also presents a challenge for the future development of the project and the possibilities of beginning from zero instead of minimal cultural appropriation and bias. We were also conscious of our own identities in the process of thinking through cultural appropriation and our own analysis of pattern cutting and how we taught it. As Caucasian males, one British and one American our critique of student’s work came from that point of view. We openly discussed our identities with the students as a possible factor that influenced how we viewed the work. We conceded that if we had been raised in a culture which had different traditions from those we taught, we would have been more aware of cultural appropriation in pattern making. Instead the clothing we were surrounded by was initially the type of clothing we had taught our students to design and pattern cut, therefore we had been unaware of these missing aspects in pattern cutting education for a long time. The project in the case study presented an opportunity to discuss this inherent bias which might not have been addressed otherwise as we both recognized that you can't change what you don't acknowledge.

It can be concluded that finding ways to empower and collaborate with cultures and their heritage when they are referenced in pattern cutting (and design) approaches is necessary. New entry points into design, such as the minimal reference cutting project are a starting point for new ways of thinking about form and pattern cutting. If these ideas are combined with equitable cross-cultural collaborations, there is a possible future in which pattern cutting and subsequently design evolves beyond an over reliance on cultural influences subconscious or otherwise. When student patternmakers reference other cultures, using that culture's imagery or knowledge, they should be encouraged to ask - a*re they benefitting from this as much as I am*? This may entail rethinking approaches to the design process such as sourcing actual fabrics from artisans in other countries, instead of appropriating their patterns and ideas. As an example, the menswear designer, Siki Im did this in his Autumn/Winter 2011 collection when he collaborated with Navajo textile artist Tahnibaa Naataanii, where her fabrics became an integral part of the designs. (Designers Part, 2011). This is an example of how designers can actively work with the cultures which inspire their imagination in a way that is respectful and mutually beneficial.

We consider the overriding call to action, when working across cultural lines would be to evaluate how this pedagogic case study could enhance the teaching of pattern cutting in global fashion education. Instructors can be inspired by the results and see them as a catalyst to develop further exciting projects that encourage new thinking and shifts in power which result in exciting ways to create patterns. The minimal reference point will have international relevance because it can be accessible to all countries and cultures. This approach should also prompt educational faculties to look at their wider curriculums and examine further minimal approaches to cultural

misuse in fashion design activities such as research, design development, marketing promotion, as well as in other design disciplines such as textiles or illustration. The results of the case study have allowed us to document these initiatives, therefore we have established an important reference point for new thinking in pattern cutting that transcends cultural appropriation and bias and is globally significant. Overall it should encourage students as well as professionals, in the fashion studio to pick up fabric and start pattern cutting as an approach to design without the need to reference visual artefacts related to other civilizations and their populations, either subconsciously or physically.

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