

Report On
Unique Designers Limited
“Knitwear Industry Management” in RMG: an analysis for
Unique Designers Limited

By

Yesmin Akter
Student ID-KIM-19281155

An internship report submitted to the Executive Development Center,
Brac Institute of Governance and Development (BIGD),
Brac University in partial fulfillment of the requirements for the degree of
Post Graduate Diploma in Knitwear Industry Management (PGD-KIM).

Executive Development Center, BIGD
Brac University
25 May 2021

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Declaration

It is hereby declared that-

1. The internship report submitted is my own original work while completing degree at Brac University.
2. The report does not contain material previously published or written by a third party, except where this is appropriately cited through full and accurate referencing.
3. The report does not contain material which has been accepted, or submitted, for any other degree or diploma at a university or other institution.
4. I have acknowledged all main sources of help.

Student's Full Name & Signature:



Yesmin Akter
ID: 19281155

Academic Supervisor's Full Name & Signature:



Atiya Rahman
Senior Research Associate, (BIGD)
BRAC University

Letter of Transmittal

Atiya Rahman,
Senior Research Associate,
BIGD, BRAC University,
66 Mohakhali,
Dhaka-1212.

Subject: Internship report on KIM based on Unique Designers Limited.

Dear Madam,

With great pleasure, I am hereby as a part of the Post Graduate Diploma in Knitwear Industry Management (PGD-KIM), which is a collaborated program of the Bangladesh Government, Ministry of Finance & BRAC University. This is my pleasure to submit my internship report based on my industry involvement with Unique Designers Limited. During my three-month internship program in Unique Designers Limited, I had acquired valuable skills experience & knowledge. It was a great opportunity for me to acquire theoretical knowledge in the practical arena and sometime more which may out of this course. The purpose is to gather accumulated theoretical knowledge, skill & experience which will help me in the future to lead a Knit Industry as top-level management also figures out challenges & difficulties. I try my best to link my knowledge gathered from (PGD-KIM) to going beyond the challenges & difficulty of the organization & to provide suggestions for better development of the organization Unique Designers Limited.

I have attempted my best to finish the report with the essential data and recommended proposition in a significant compact and comprehensive manner as possible. I trust that the report will meet the desires.

Sincerely yours,



Yesmin Akter

ID -19281155

Executive Development Center, BIGD

Brac University

Date: May-25, 2021.

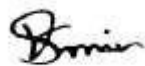
Non-Disclosure Agreement

This agreement is between the organization (Unique Designers Limited) & intern (Ms. Yesmin Akter) a student of (PGD-KIM) program by EDC, BIGD and BRAC UNIVERSITY for the purpose of receiving several confidential information.

Intern & company are hereby agreeing as follows:

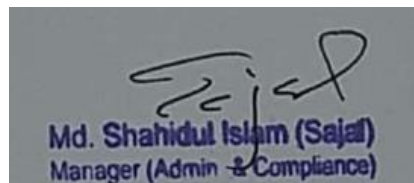
- The organization will allow the intern to complete three months long internship. During this period of time intern will have to get the opportunity to work closely with the officials of several departments of the company and have access to official data and information.
- Based on theoretical knowledge, skill & experience gathered from the organization including data and information collected during the internship from organization the intern will prepare an internship report.
- Intern will use all sorts of data and information for academic purposes and will not disclose against the interests of the organization.
- All confidential information delivered by company to intern will be and remain property of company. All confidential information and any copies thereof, will be promptly returned to company or destroyed by intern upon company's request.

Student's Full Name & Signature:



Yesmin Akter
ID -19281155

Industry Supervisor's Full Name & Signature:



Md. Shahidul Islam Sajal
Manager (HR, Admin & Compliance)
Unique Designers LTD

Acknowledgement

First and foremost, praise and thanks to the Almighty for his blessings. My deepest gratitude to Brac University, Bangladesh Government, Ministry of Finance & Unique Designers Limited for this opportunity to be a part of this program. I would like to thank our honorable teachers who had given their effort & guideline during this period of learning to achieve the goals of PGD-KIM course & helped us to get our self to prepare to serve in future. I would like to thank all the members of PGD-KIM (12 batch, section-B) for their tremendous patience & supportive activity during this course facing several obstacles for this pandemic situation to successfully complete this course. I felt proud to be a part of PGD-KIM 12th batch.

Special thanks to Ms. Atiya Rahman, my academic supervisor for her responsiveness during the period of our internship report preparation also for her wonderful & clear guidelines. The deepest gratitude for providing time from her busy schedule to us when required. Gratitude to Unique Designers Limited & my supervisor Md. Shahidul Islam Sajal for given the opportunity to complete three months long internship. Thanks for the opportunity to work closely with the officials of several departments of the company and have access to official data and information. Gratitude to Merchandising, Commercial, HR & Compliance, Planning, Industrial Engineering (IE), and Logistic department to provide me required help and data when needed. My sincere thanks to all of those departments who helped me a lot to complete my internship report.

I would also like to show my gratitude to my head of department Mr. Moshir Rahman Moilul. He is one of the best leaders & mentors I have ever seen. He provided me full support and guideline to complete my PGD course. He shared his valuable experience from this RMG field to prepare this report. I also learned how to adapt to the working environment, working culture, and dealing with colleagues and top management under her leadership.



Yesmin Akter

ID -19281155

Executive Summary

This report is all about Knitwear Industry Management. The objective of this internship program is to learn practical operating skills of the industry also practice & apply what we had learned during the PGD-KIM course. As academic discussion cannot give a complete overview of real business situations & the global market. It was a great opportunity for the students to gather practical knowledge & technical skill also know the real-life working conditions & barriers through this program. I wanted to work on over all Knitwear Industry Management process because this accumulated theoretical knowledge, skill & experience will help me in the future to lead a Knit Industry as top-level management also figures out challenges & difficulties in the way of handling the business. I have divided this report into four parts, the first one is Company Profile, the second one is the briefing of my activities and learning in the industry, the third one is the application of industry-specific courses during internship and suggestion & the last chapter four is for conclusion.

Keywords: Operation flow of Knit Industry; Merchandising activity; HR operation; Industry involvement; RMG; KIM.

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List of Acronyms

BIGD	BRAC Institute of Governance and Development
PGD	Post Graduate Diploma
KIM	Knitwear Industry Management
UDL	Unique Designers Limited
IE	Industrial Engineering
RM	Raw Material
ETA	Estimated Time of Arrival
ETD	Estimated Time of Departure
ATD	Actual Time of Departure
ATA	Actual Time of Arrival
HRD	Human Resource Development.
WH	Warehouse
CP	Critical Path
PSD	Production Start Date
PCD	Product Cutting Date
SSD	Sewing Start Date
SAH	Standard Allocate Hour
AQL	Acceptable Quality Level

Chapter 1

Overview of the Industry

UDL has been established by Engr Sayed Farid Ahammed, a highly educated and well-experienced entrepreneur who has an excellent track record of industrial management, international marketing, local & international business. The company is being managed under the direct control and dynamic supervision of company chairmen Engr Sayed Farid Ahammed. UDL organizational & operational activity is managed by a group of highly qualified professionals under the company chairman. UDL starts its journey in 2006. Now, UDL has near than 8k skilled workforces among them 57% female & 43 % male. Over 250 professionals from various disciplines. UDL amount of export in the year 2019 is 49M which is growing by an average of 9% per year. The raw materials used in UDL are sustainable & environment friendly and 75% of raw are producing locally. UDL believes in sustainability. Its building structure is more than 8.38% energy saving 20.56% water saving from the regular building structure. UDL renewable energy consumption is 241107kwht & increase of renewable energy 15.36%. In the year 2019, it reduces 10.77% greenhouse gas during the operation process. UDL makes 160,000 pc of apparel daily. UDL total investment US\$ 50 million. Annual turnover US\$ 168 million in 2019. UDL has all its own investment, it has about 450000 SFT factory space including hundred lines. It covered a total of 350000 SFT open land space. UDL is Oeko-tex & GOTS certified.

1.2 Vision & Mission

To become a renowned global organization, as a part of continuous improvement UDL has been identifying their luminaire for the future. UDL believes having clarity on the vision and mission of the company will help them to reach their goals more conclusively.

1.2.1 Our Mission

UDL mission and values are “IMPACT”.

- Integrity.
- Mutual Trust.
- Passion for Excellence.
- Agility.
- Customer Focus.
- Teamwork & Co-operation.

1.2.2 Our Vision

Unique Designers Limited promise to be the most trusted partner for its employee, stakeholder customer to create sustainable value together. UDL Vision is-

- To be the most trusted partner.

1.3 Goals & Objectives

As we all know, without proper goals & objectives success can't achieve and measure. From the very beginning, UDL has setup its own goals & objectives. UDL has its own goals & objectives as following:

- ☐ On time delivery
- ☐ Right quality first time.
- ☐ Product safety.
- ☐ Friendly and legal working condition.
- ☐ Continuous improvement and sustainability.

1.4 Organizational structure, Organogram, Branches and Departments

UDL is governed by the Chairman on the top of all decision-making processes, under him, we have our Managing Director & Executive Director. Under our Executive Director, we have our General Manager (GM) for our production unit at factory, one for whole the factory. He handles the entire department.

1.4.1 Organizational structure: briefly pictures of all the departments of UDL

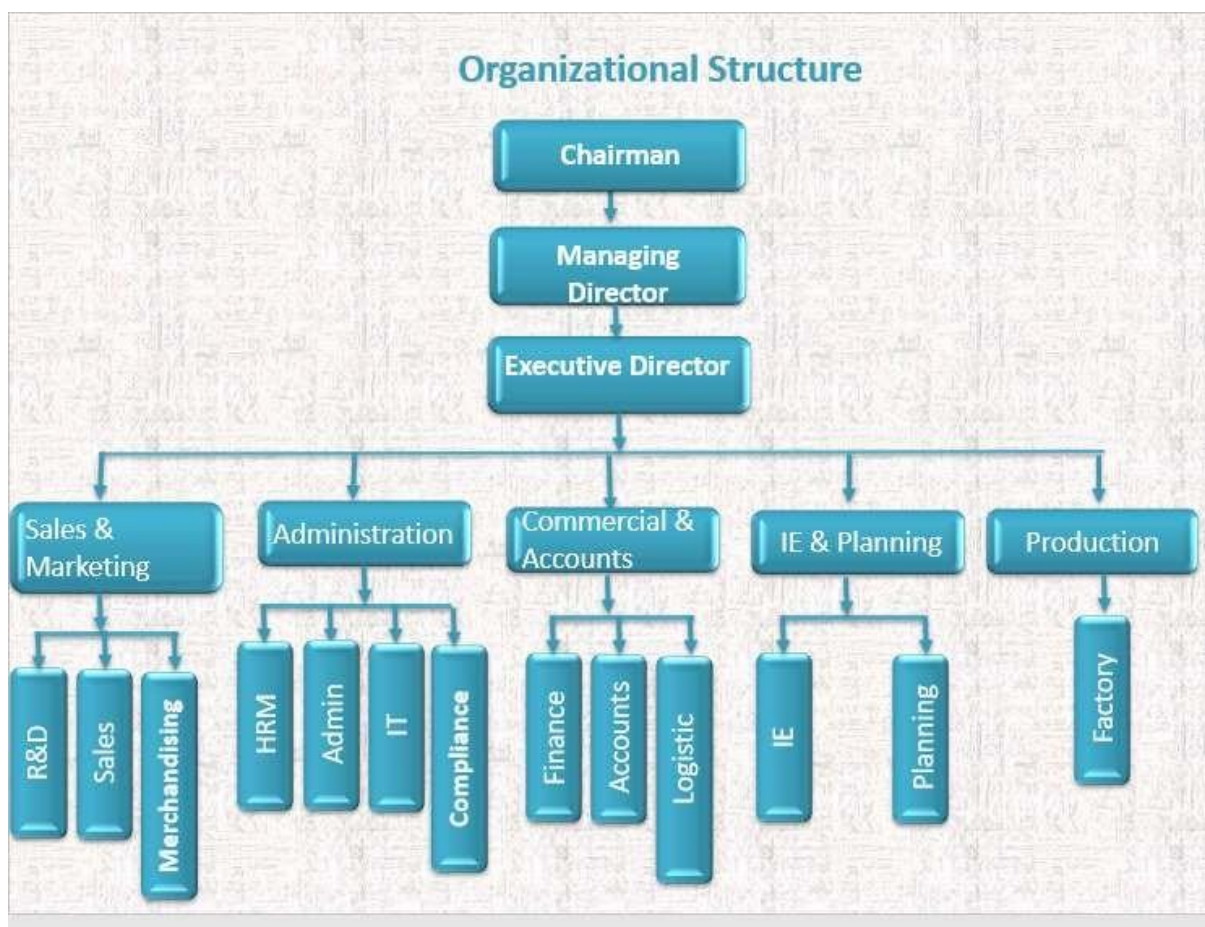


Figure 1: Organizational Structure

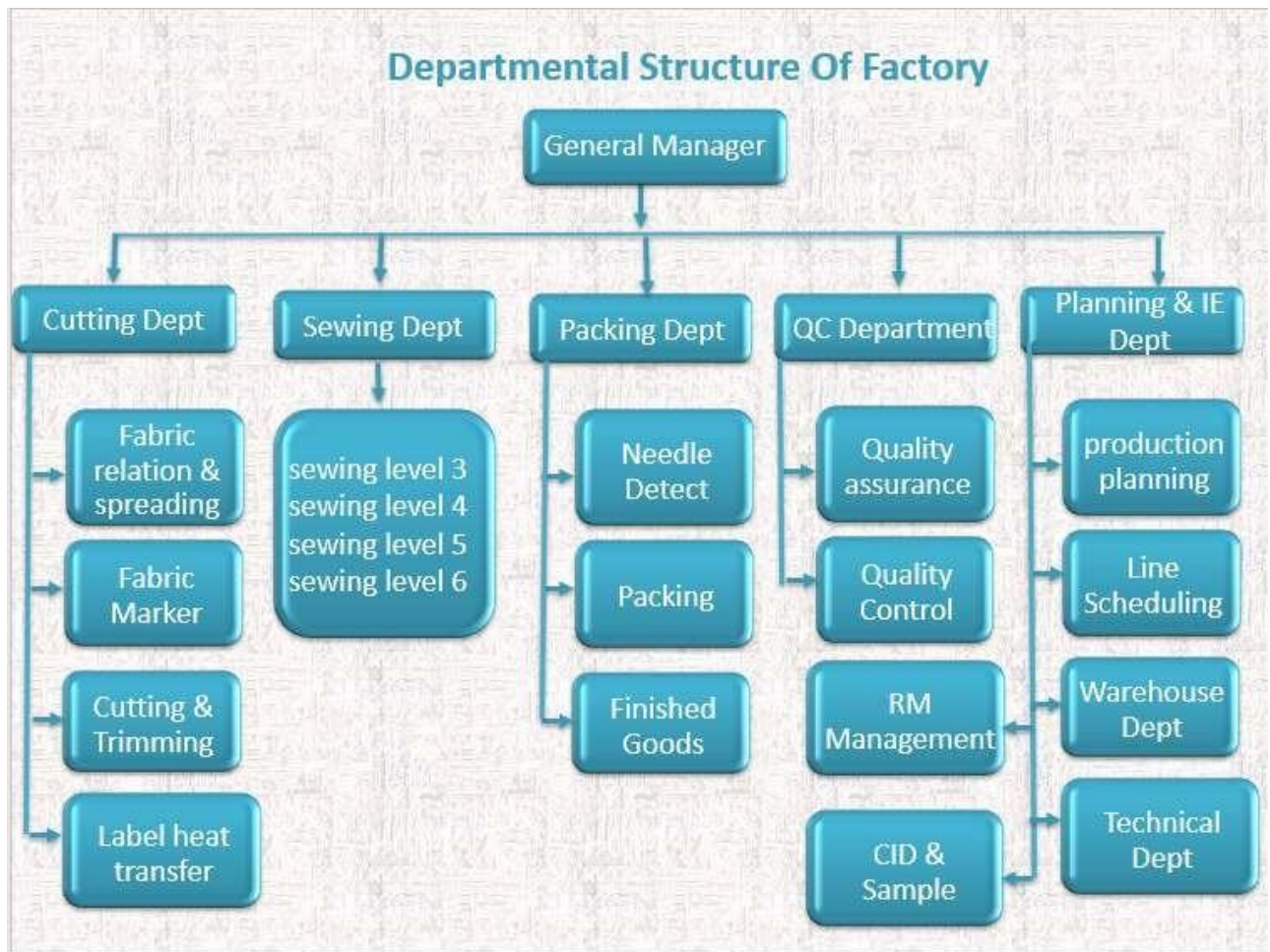


Figure 2: Departmental Structure of Factory

1.4.2 Organogram: Briefly pictures of organogram of UDL

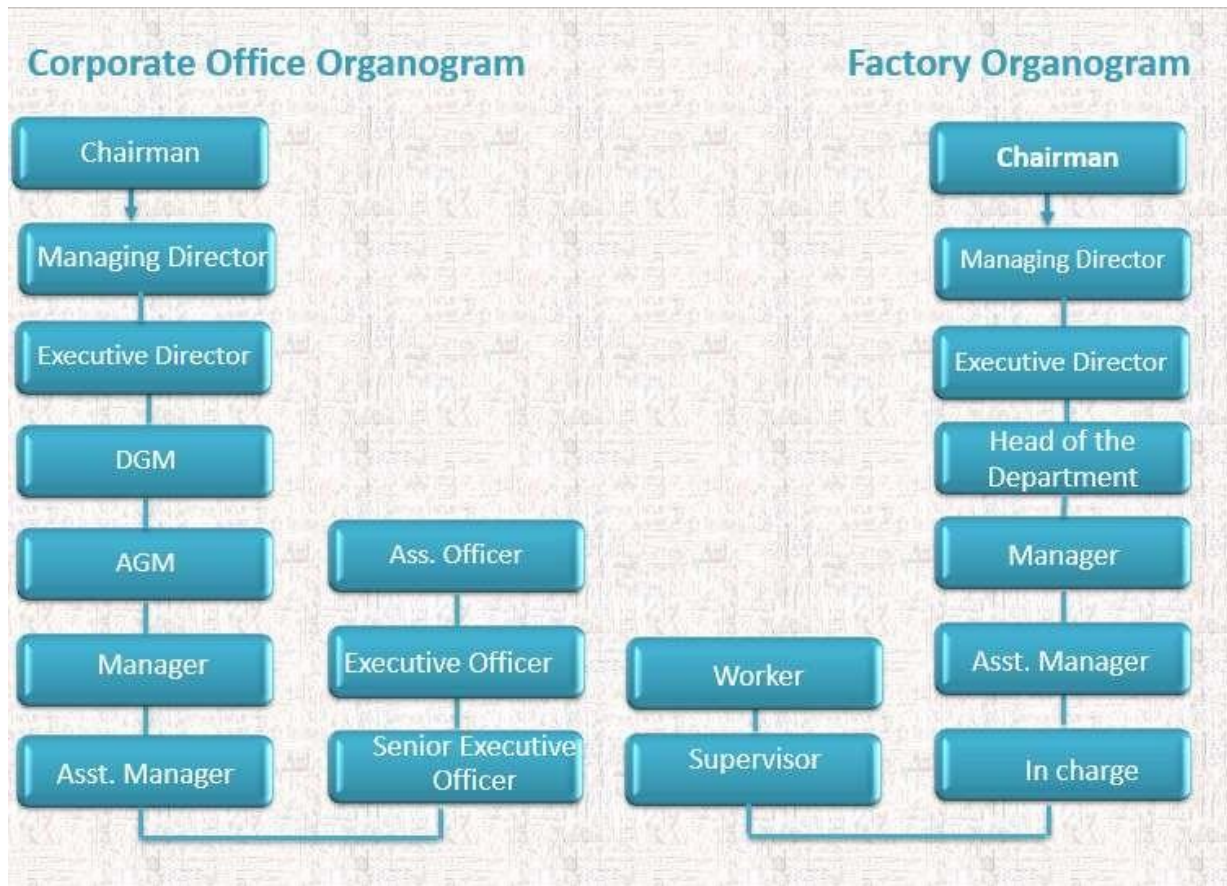


Figure 3: Organogram

1.4.3 Departments List of UDL:

Based on pre-production, production, and post-production activity UTL management organized their organization into several departments as follows-

1. Sales & Marketing.

- 1.1 Marketing and business development department.
- 1.2 Research & product development department.
- 1.3 Merchandising department.
- 1.4 Sourcing department.

2. Product Development.

2.1 Pattern & CAD department.

2.2 Sampling department.

3. Warehouse.

3.1 Fabric Store.

3.2 Trims and Accessory Store.

3.3 Testing Lab.

4. Production Planning & Control Department.

5. Industrial Engineering Department.

6. Cutting Department.

7. Sewing Department.

8. Quality Control Department.

8.1 Quality Control.

8.2 Quality Assurance.

9. Finishing Department.

10. Machine Maintenance Department.

11. Technical Department.

12. Garment Washing Department.

13. Printing Department.

14. Embroidery Department.

15. Human Resource and Administration.

15.1 HRM Department.

15.2 Administration Department.

15.3 Security.

16. Compliance Department.

- 16.1 Factory Audit Department.
- 16.2 Sustainability Department.
- 16.3 Technical Compliance Department.

17. Commercial Department.

- 17.1 Import Department.
- 17.2 Export Department.
- 17.3 Logistic.

18. Accounts Department.

- 18.1 Finance.
- 18.2 Accounts.
- 18.3 Cost control.

19. Information Technology (IT) Department.

- 19.1 MIS.
- 19.2 Server Tracking.

20. Medical department.

21. Women health & child care department.

1.5 Products of UDL

Products					
☐ T-shirt	☐ Polo shirt	☐ Hoodies	☐ Sweet shirt	☐ Tank top	☐ Jackets
☐ Sports wear	☐ Evening wear	☐ Active wear	☐ Night wear	☐ Work wear	☐ Trouser

Table 1: Products of UDL

1.5.1 Product/ Order execution process

On the execution of upper mention product UDL follow a specific order execution process flow. The order execution process starts with receiving Tech-pack from the buyer. The marketing and business development department receives this Tech-pack from the buyer & forwards it to Research & product development department. After receiving Tech-pack, Research & product development department develop a development sample using available fabric & accessories. In the mid-time, they check with the CAD department for Bulk consumption. IE for SMV, sewing thread consumption & Man-Machin-Line layout. They check with the Planning team for space availability & projection. They arrange a meeting including every requires department for critical analysis & technical issues. They quote a price to the buyer.

After submitting the development sample & price quotation they make a negotiation with the buyer. After fair bargaining & reviewing the development sample buyer Place an order. In this case, Research & development merchandiser receives L/C from the buyer by return, as a confirmation of order. After receiving L/C they forward it to the commercial department for back to back L/C & hand over all required documents to Merchandising department. After receiving those documents merchandising department starts the pre-production activity. They forward all required documents to the supply chain department for material sourcing. They forward all required information to IE & Planning department. Planning department stat order projection & production planning. IE department makes Line layout at a time sourcing department confirms the material booking, based on the RM in-house date merchandiser book W/H space. Considering order Ex-fty based on RM ETA below execution process is followed to confirm on-time shipment with good quality. This is a bust process. All the depart & sub-department are included here for order execution.

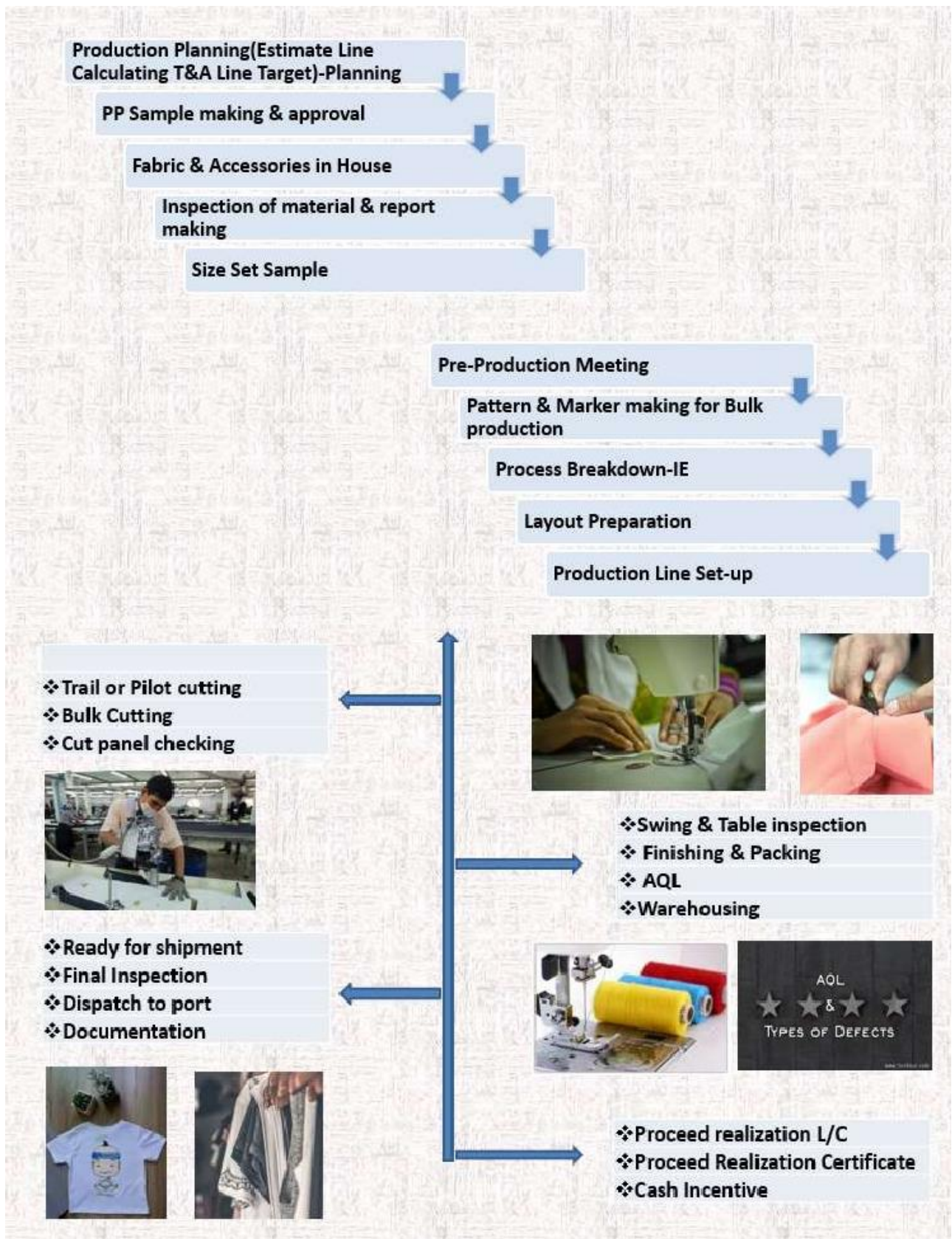


Figure 4: Order execution process

1.5.2 Clients list of UDL:

UDL work for a huge buyer group. Below is the list of some well-known buyer list that UDL works for.

Clients List					
					
					
					
					
					
					
					

Figure 5: Clients List

1.5.3 Certifications of UDL:

UDL has a well reputation for its compliance & sustainability. Below is some international certifications UDL achieve for its product, compliance & safety.

Compliance Performances-UNIQUE DESIGNER LTD

Unit Name	Type of Certification /Audit		Rating/Result/Score	Issuing Authority	Validity	Remarks
UDL	ACCORD		"No Color Certificate Received"	Bangladesh Accord	N/A	Remediation progress 98%
	BSCI		Overall rating "B"	ITS (INTERTEK)	23-Sep-20	
	ICS		Rating "B" Score-91	Arche Advisor	As per client	
	FAIRTRADE		Certified	FLOCERT INDIA	19-Feb-23	
	GOTS		Certified	Control Union (CU)	24-Jul-20	
	OCS		Certified	Control Union (CU)	24-Jul-20	
	OEKO-TEX (STeP)		Certified	HOHENSTEIN	31-Jul-20	
	CPI2		Certified	HAMBURG (GERMANY)	27-Mar-20	

Figure 7: Certifications of UDL

Chapter 2

Description about task accomplishment

I had started my internship program after completing my 2nd semester from 15 February 2021 and during the period of internship program report is in working process & the UDL environment help me to proceed to work. The activities during the internship period are part of this report. I made this report basing on the information get from UDL's employees, executives, managers, websites, and the activities of myself during the internship period. I monitored and fixed all the departments through daily working hours, also check-in & out time. I visited all production floors to oversee the environment of the manufacturing area and workers. I checked all those reports that submitted to the head office and buyers for audit. To meet my goal, I coordinated with so many departments where human interaction takes on the role of combining the integration of time, ability, effort, energy, and resources of multiple individuals. I had completed my internship program at UDL with such a good experience. Here I tried to show my working days in the respective departments-

SL. NO	Department	Start Date	End Date	Duration
1	Human Resource (HR)	20-Feb	28-Feb	6
2	Marketing & Merchandising	1-Mar	8-Mar	6
3	Product Development	9-Mar	16-Mer	7
4	Planning	17-Mer	24-Mar	6
5	IE	25-Mar	31-Mar	7
6	Supply Chain	1-Apr	8-Apr	6
7	Cutting	10-Apr	15-Apr	6
8	Sewing	17-Apr	22-Apr	6
9	Finishing	24-Apr	25-Apr	3
10	Accounts & Finance	26-Apr	2-May	5
11	Commercial & Logistic	3-May	5-May	5
12	MIS	6-May	9-May	3
13	Warehouse	10-May	11-May	2
14	ERP	17-May	18-May	2
15	Cost control	19-May	20-Apr	3
Total number of working days				73

Table 2: Work allocation

A clear picture of task accomplishment is given below-

2.1 Human Resource Department (HRD)

The human resource department is a division of a company that is responsible for effectively managing a company's employee's life cycle, recruiting, onboarding, training, and firing employees, and administering employee benefits. I gathered knowledge from this department and spend few days in this department. It was a good working environment.

2.1.1 Follow up various functions

factory there are around 25 departments to follow up. The main duty of this department is to keep record of working hours, in and out time, missing. I have to monitor and fix department wise daily working hours, in and out time of the workers and the employees also. Those reports are having to submitted to the head office and the accounts.

2.1.2 Recruiting

Recruiting is an important part of a company. To reach the organization it's business goal HRD helps to select and recruit a promising & qualified candidate. they help to appoint an employee from thousands of candidates by considering their experience, skills, and desire qualifications also observing their optimism, versatility, flexibility, integrity, smartness, honesty. They also take an interview to select a hardworking, honest, promising person and publish an appointment letter. After recruiting a candidate, they arrange training if needed for employee development.

2.1.3 Support to employee on various issue

When an employee needs support in various issues & faces difficulties, HR department gives them support to overcome that situation such as a mismatch of salary, OT mismatch, ID card missing, helping to open a bank account, promotion, bonus, or if needs it helps to switch department. HR department also provides motivational & legal support to the employee. They also work on yearly

increments, issuing show-causes, suspend, warning, organizing different programs, company security & benefit for the company etc.

2.1.4 HR workflow

UDH HR team follow a classified work order for execution. During my internship program working with UDL HR team I follow below work flow-

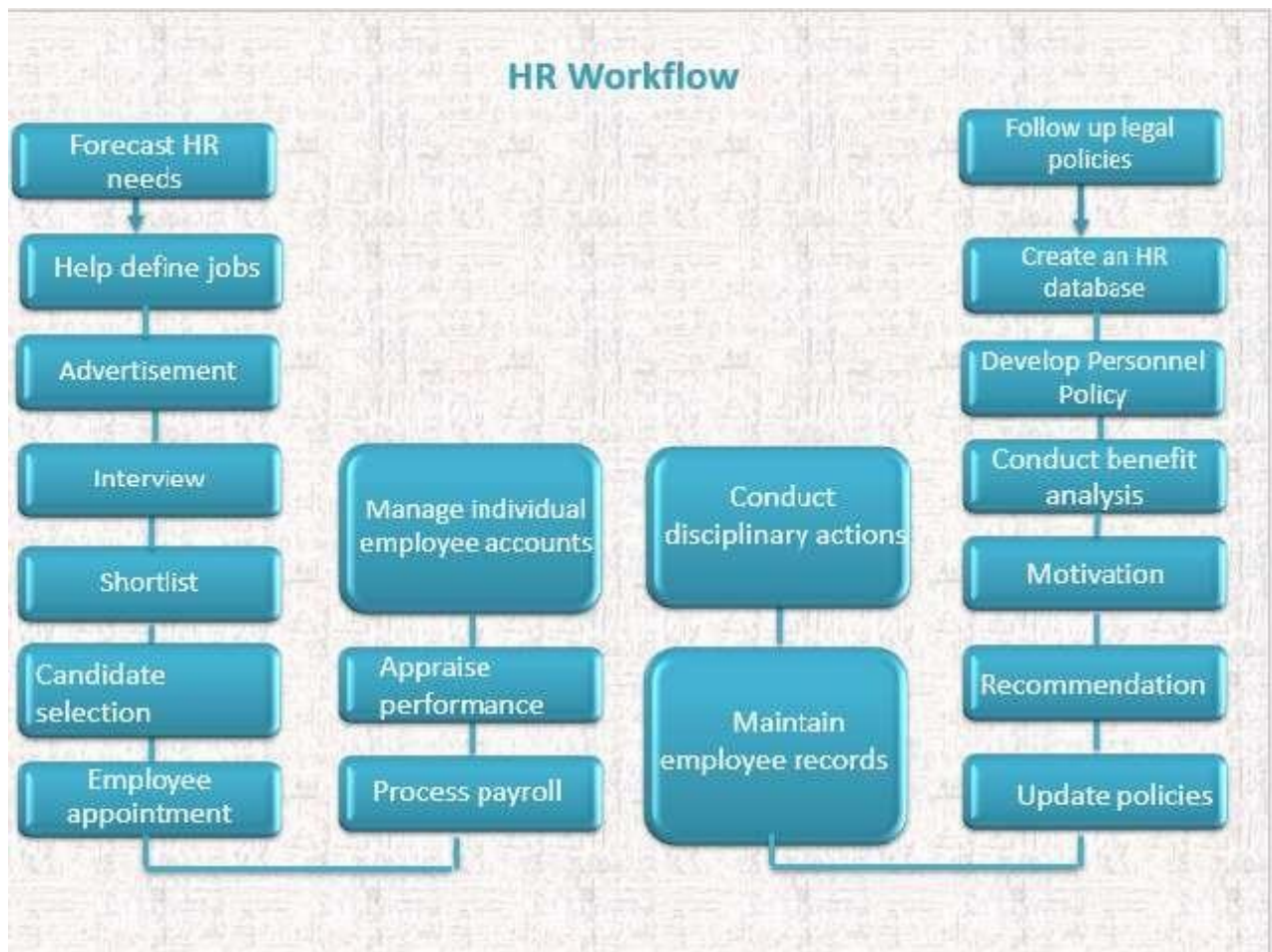


Figure 8: HR Workflow

2.2 Sales & Marketing

Sales & Marketing is called the heart of a company. Merchandising is the core and Marketing is the face of a company. Its importance is massive. UDL divided its Sales, Marketing & Merchandising department into four core parts. They are-

1. Marketing and business development department.
2. Research & product development department.
3. Merchandising department.
4. Sourcing department.

Merchandisers basically communicate with buyers and confirm orders, negotiate prices with buyers, and so on. Operation Merchandisers normally follow up and usually communicate with other departments. Operation Merchandiser usually contacts with supplier, commercial, W/H cutting, sewing, finishing, IE, Planning, Quality concern persons. Development Merchandiser develop the product based on the buyer requirement.

2.2.1 Marketing and business development department

Marketing & business development department work for searching new business market & buyer for UDL. They are the person who takes 1st initiative in business development. Manage client account at the order inquiry Label and assure capacity management. Monitor production as per T&A to assure on-time shipment. Core responsibilities are the following-

- Analysis of global & internal market.
- Business forecast.
- Order projection.
- Confirm capacity.
- Communication with the buyer with own development.
- Collect new orders from Buyer.

2.2.2 Research & product development department

Research & product development merchandisers play the role of product developers in UDL. They work with buyers to develop new products. They are the key person to develop samples to confirm a new order. They develop new samples as per buyer's standard, specification, quality, and getting required approval for on the sample. Based on the buyer's query prepare product costing. Communicate, develop and follow up raw materials, trims, accessories lab-dip approval for on-time delivery. Their core responsibility is the following-

- Communicate with buyers for new development.
- Development new sample according to tech-pack.
- Work with sourcing to source material as per requirement.
- Collect RM price from sourcing for costing.
- Work closely with IE to get SMV & sewing thread consumption.
- Prepare costing for price quotation.
- Negotiation with buyer.
- Give order projection.

2.2.2.1 Research & product development department workflow



Figure 9: Research & Product Development Department Work flow

UDL Research & product development department workflow this upper classified work order for execution. During my internship program as a part of their team I followed it accordingly.

2.2.3 Merchandising department

Production merchandise executes confirm order production. From order confirmation to shipment they played a vital role. They work with required every department & stakeholders for execution. They execute order according to planned "Time and Action Plan" on a regular basis to ensure on-time shipment. Follow up samples & production. Ensure all local purchase & manage all bookings

based on buyer requirements. Manage all samples & getting all the required approvals. Handle several numbers of orders/styles at a time. Day by day follow-up & report to management.

Their core responsibility is the following-

- Master L/C collection.
- Back to back L/C forward to the supplier.
- RM layout approval.
- RM booking.
- Coordinate with the planner for the production Plane.
- Follow up with RM supplier for delivery.
- Follow up RM in-house with W/H.
- Follow up with sample room for sample.
- Getting all sample & RM layout approval from buyer.
- Follow-up with production.
- Follow-up inspection and quality control.
- Follow-up garments testing with lab.
- Update buyer about the current order status.
- Follow-up commercial regarding shipment.
- Booking for final inspection, vessel booking, and send goods according to the shipment date.

2.2.3.1 Merchandising department workflow-

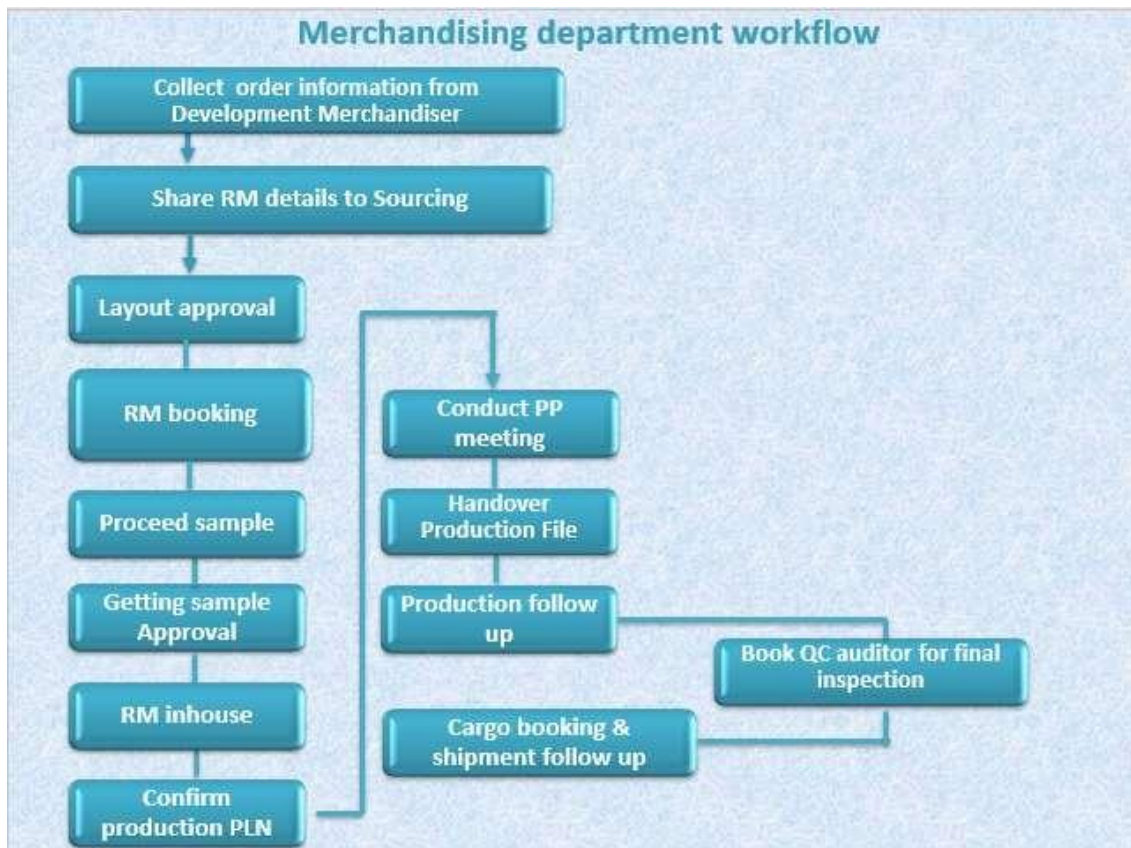


Figure 10: Merchandising Department Workflow

2.2.4 Sourcing department

The sourcing department sources new suppliers & establishes business relations. Constantly check new development with suppliers. Develop, negotiate, integrate, and execute raw materials procurement based on buyer requirements with new & existing suppliers. Ensure the implementation of the negotiated agreement. Guide Merchandising, Production, Finance teams on demand of the situation. Their core responsibility is the following-

- Collect supplier information.
- Update supplier information on the system.
- Develop new RM with supplier.
- Collect RM price from the supplier & forward to merchandiser.
- Coordinate with Accounts, Merchandiser & Supplier for payment issue.

2.2.4.1 Sourcing department workflow-

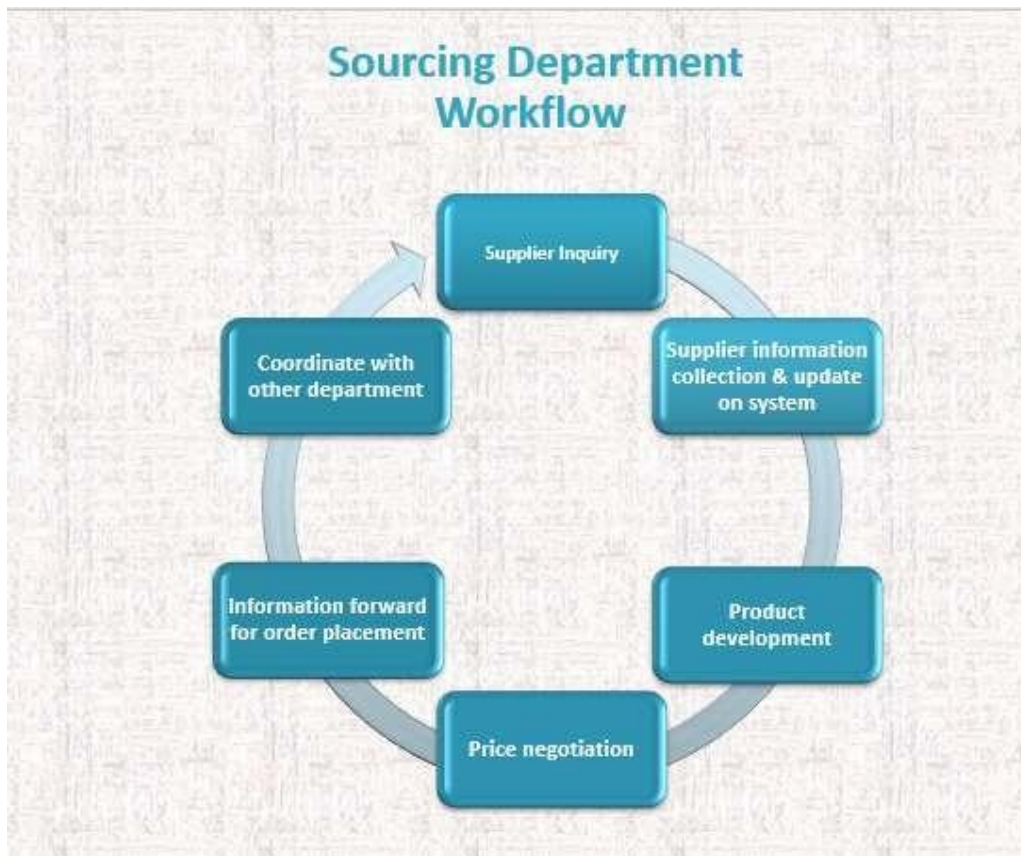


Figure 11: Sourcing Department Workflow

2.3 Planning

Planning is an important department for RMG sector. They make the plan for production, man and machine distribution for a smooth output of production to ensure on-time shipment. They have some core responsibilities such as managing the man & machine, capacity management, controlling order, controlling inventory, line allocation, overtime control, etc. Their core responsibility is the following-

- Order confirmation receive from the merchandiser.
- Collect reacquired documents such as Buyer PO, size breakdown, Tech-pack & original reference sample from Merchandiser.
- Order ongoing process follow up.

- Order projection.
- Order allocation.
- Distribute SAH.
- Allocate Man-Machine.
- Line allocation according to confirm the order.
- Follow up inhouse material.
- Production follow up.
- Collect daily production update & analysis.
- Make Production & update report for management.
- Make backup plane for any delay & disaster.
- Production follow up.

2.3.1 Planning workflow-



Figure 12: Planning Department Workflow

The planning department allocates Man-Machine-Material-Product that is essential for the factory. If a company works for success then they must need proper and accurate planning.

2.4 Product development

PD or Product Development is one of the most valuable departments in the factory. UDL has a massive strong team for product development. UDL divided it into three segments:

1. Technical Department (for sample).
2. Pattern & CAD Department.
3. Sample Department.

Key responsibility of Technical Department is given below-

- Analyzing Tech-pack & buyer requirements.
- Analysis risk and criticality.
- Make critical path.
- Prepare technical analysis sheet.
- Arrange risk analysis meeting.
- Help R&D team for RM development.
- Provide technical support during sample & bulk stages.
- Maximize technical difficulty.

The sample section of UDL follows the requirement of the tech-pack which is chosen by buyers.

Sample section does the following activities:

- Provide CAD consumption.
- Make a pattern for both sample & bulk.
- Make sample as per buyer instruction.
- Ensure measurement and other issues.

- Find out an easy & friendly production method for bulk.
- Atten PP meeting.

PD or Product Development is such a place of learning. Really, I learned many things in this department especially CAD. Here I learned about patterns. Here I learn about different kinds of samples & their process flow. Sample process flow is given below-

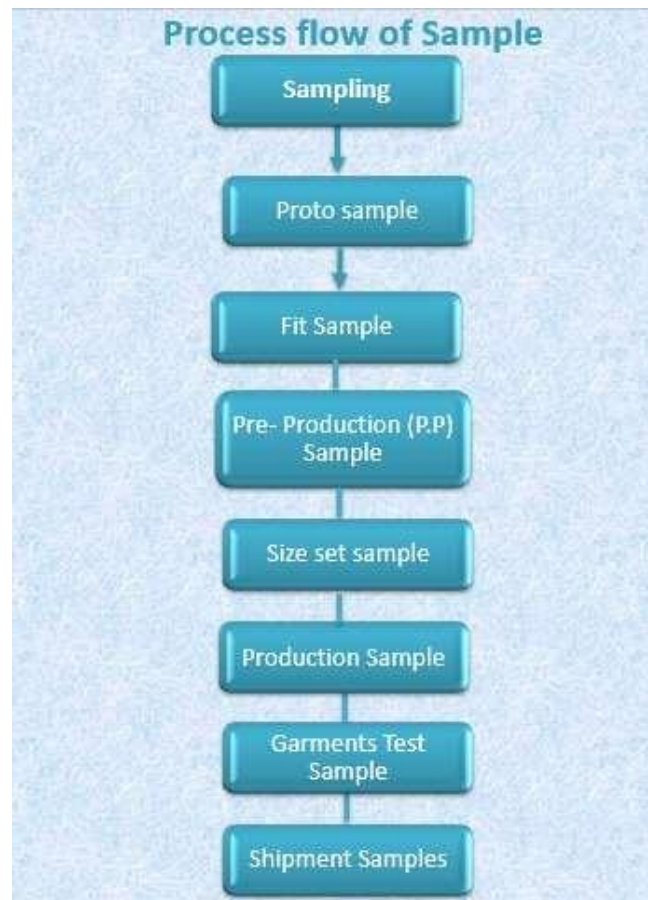


Figure 13: Process flow of Sample

The people of this department helped me in an effective way. This knowledge will help me to grow up in the future.

2.5 Industrial Engineering (IE)

Industrial Engineering (IE) is a part of engineering which optimizes complex processes, systems, activity & cost of the organization. Industrial engineers work to minimize waste of time & resources. They amplify the use of resources & and make the work process easy. Their core responsibility is given below-

- Prepare floor layout.
- Prepare line layout.
- Optimize man-machine.
- Monitor production.
- Monitor worker performance.
- Count cycle time.
- Calculate SMV.
- Calculate sewing thread consumption.
- Arrange training section.
- Line balancing.
- Line feeding.
- Installation of new technology & machine.
- Update production system.
- Waste reduction.
- Production report.
- Problem-solving by applying IE tools.
- Coordination with another department- BP, CP, Production, HR, Quality, PDC, Maintenance, Marketing, Supply Chain.

2.5.1 IE workflow

Workflow of IE is given below-

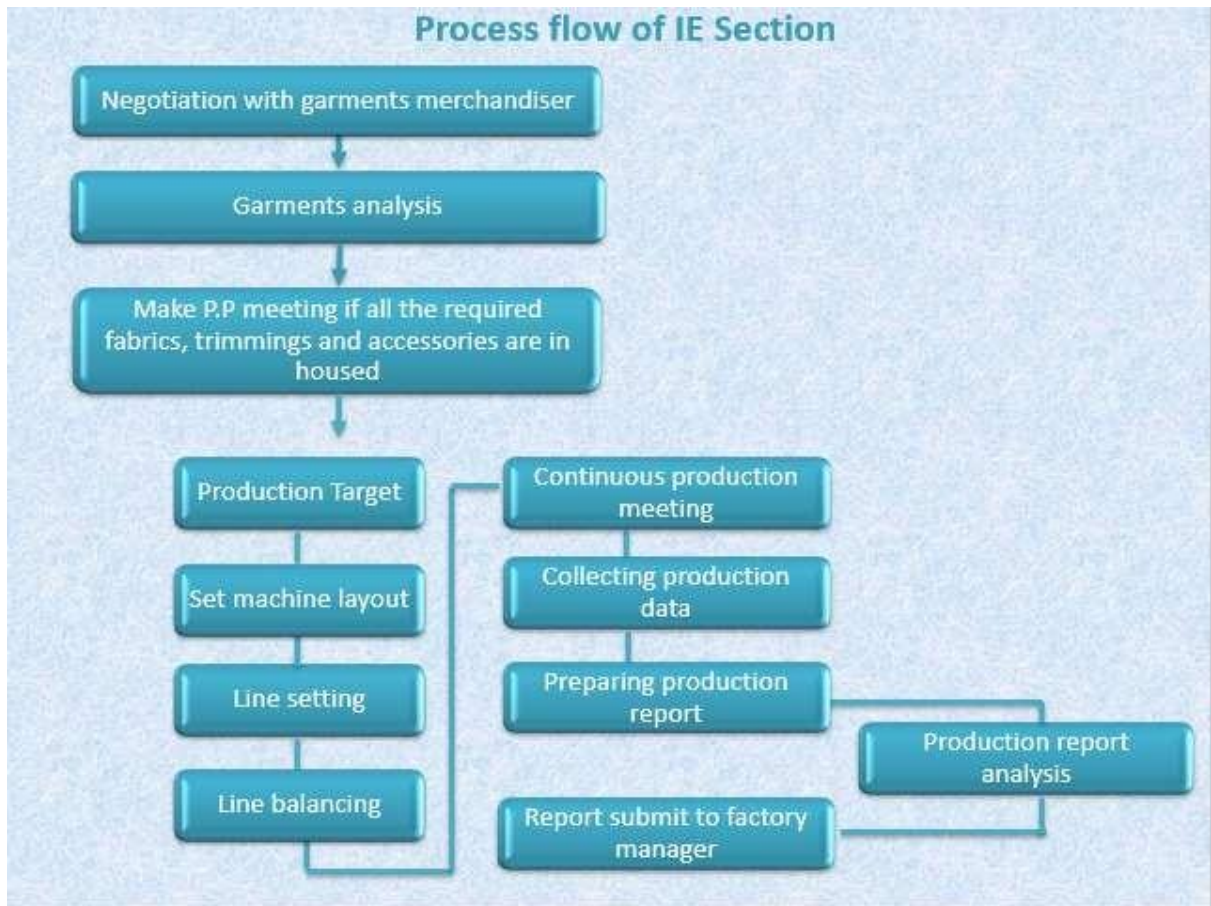


Figure 14: IE Workflow

2.6 Cutting section

If a company wants to get a quality product it must give importance to the cutting section. The strong cutting section can be given the desired output. UDL has a strong cutting section and a good working environment. So, they can cut material according to the pattern which is instructed. UDL uses two types of cutting machine here-

1. Automatic cutting & spreading machine used for solid panel.
2. straight knife machine and manual spreading used for stripe panel.

Key responsibility of cutting section is given below-

- Collet fabric quality, LD & comments from merchandising department.

- Collect pattern from Sample (pattern) department.
- Collect cutting ratio from CAD & Merchandising.
- Make marker.
- Receiving fabric from the store.
- Spread and relax the fabric.
- Cutting & numbering fabric.
- Checking all cut panel, shorting & quality check.
- Sending cut panel to sewing.

2.6.1 Cutting workflow

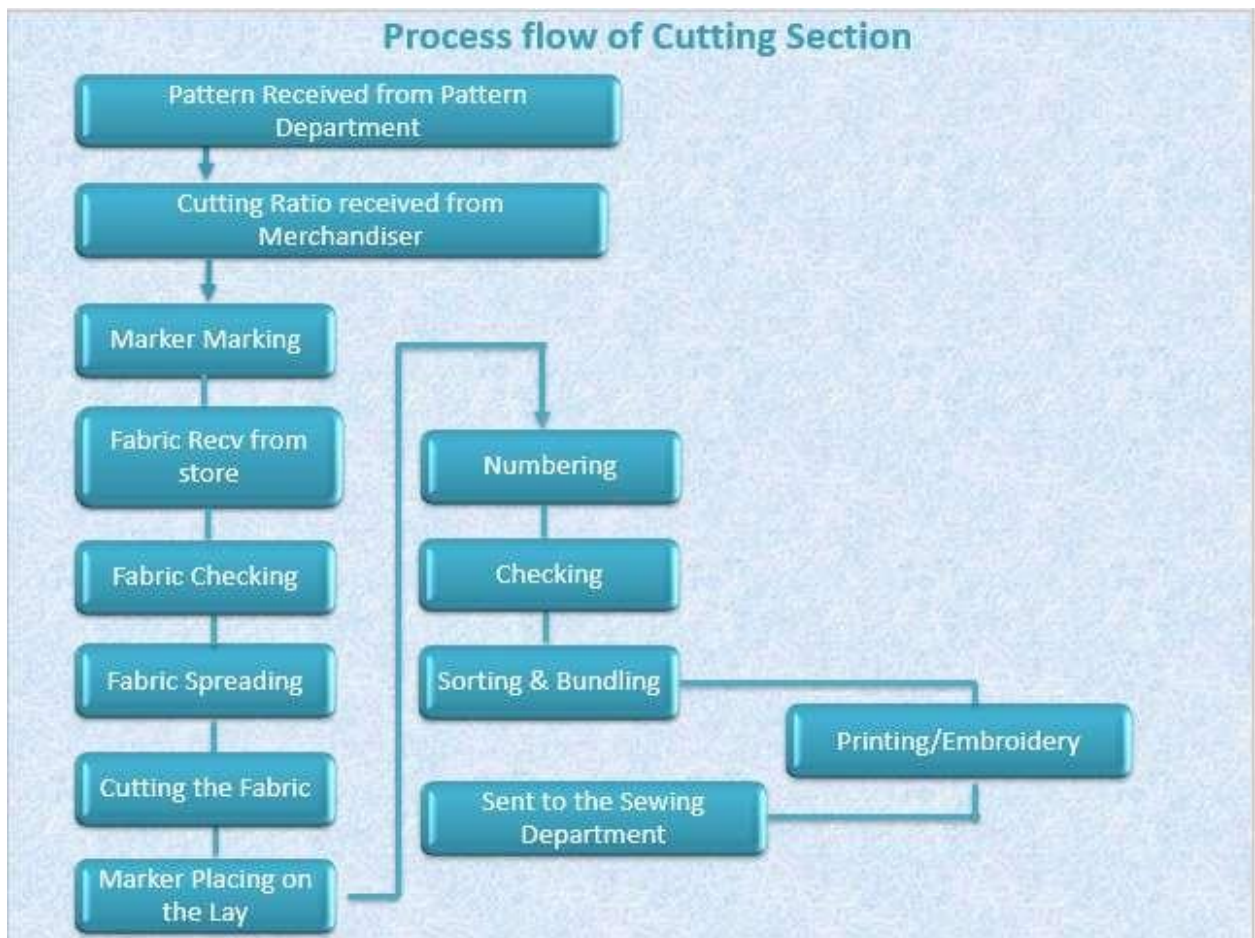


Figure 15: Cutting Section Workflow

I feel lucky myself because I got the chance to observe cutting activities very closely.

2.7 Sewing

The sewing section is the actual place where the product is really made and got shape. It is proved that a quality sewing product is a good quality product. There are more than 100 lines in total in UDL (including sample). Different types of products are made in separated lines. Key responsibility of sewing section is given below-

- Follow production PLN.
- Set up a monthly target PLN.
- Guidance & sample comments collect from the sample room.
- Follow IE instruction.
- Follow Merchandiser instruction.
- Follow the Machine layout provided by IE.
- Follow the Man-Machine combination provided by IE & Planning.
- Collect production plane from Planning.
- Create balance in the sewing line daily.
- Maintain Hourly target.
- Make quality product and send it to finishing line.
- Complete inline inspection.

2.7.1 Sewing workflow

Sewing workflow/Process flow is given below-

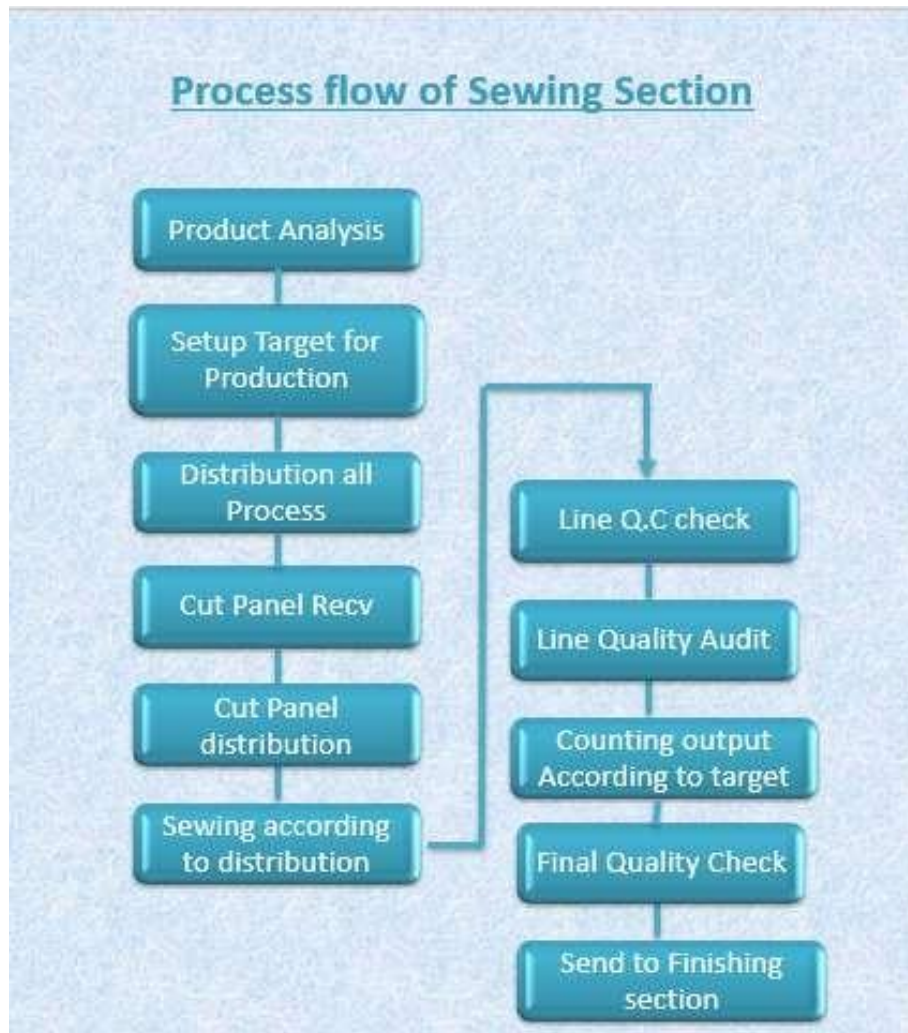


Figure 16: Sewing Workflow

2.8 Finishing

The finishing department is the depart meant to decorate a product based on buyer instruction by considering customer demand. This department work for product outlook & final finishing. Key responsibility of finishing section is given below-

- Garments final check.
- Collect accessories & packing material from W/H.

- Collect packing instructions from the merchandiser.
- Attach accessories to the garments.
- Packing.
- Maintain quality standards.
- Making a dummy packing list.
- Making final packing list.
- Getting all required in-house approval for the ship.

2.8.1 Finishing workflow

Finishing workflow/Process flow is given below-



Figure 17: Finishing Workflow

2.9 Quality

QA or Quality Assurance means, to give a standard quality of the product that has no defect and accepted by the buyers and customers. It is the most important section in textile. According to the requirements of buyers sending standard product create satisfaction to this department. Key responsibility of quality section is given below-

- Ensure product quality.
- QC file making.
- Collect all records of buyer approval from the merchandiser.
- Keep the record of all buyer approval.
- PP meeting proceeding.
- Inline inspection.
- Final Inspection.

2.9.1 Quality department workflow



Figure 18: Quality Department Workflow

Buyers are concerned about quality products and the quality section is responsible to ensure product quality.

Chapter 3

Critical assessment of Internship work

3.1 Application of Generic and Industry-specific courses during internship

During our nine-month long academic period we had both Generic and Industrial courses. By accomplished this course I am able to acquire a deep knowledge and understanding about organizations behavior, complexity and Industrial activity.

3.1.1 Application of generic courses during internship

At PGD-KIM course we had 3 consecutive semester which is of three months duration. Each course is a graph by several unique thoughts & studies, especially interconnected with the application also have a direct impact on the next course including the internship program. Our first semester was designed for interpersonal skill development for both the personal & professional arena. In the generic course, we had four different subjects, as follows-

1. **KIM 101:** HR Skills and Competencies.
2. **KIM 102:** Analytical Skills and Competencies.
3. **KIM 103:** Communication Skills.
4. **KIM 104:** Business Operation Skills.

By accomplished these four generic courses we are able to acquire accumulated theoretical knowledge, skill & experience which will help us in the future to lead the Knit Industry as top-level management. We will able to figures out challenges & difficulties also how to deal with them.

3.1.1.1 HR Skills and Competencies

1. **Level 5 leadership:** Bangladesh is the 2nd largest exporter in the global apparel market. In this situation, leadership is what is most needed to move an organization towards its specific goals. Leaders make people committed, productive through styles to excel in competition. In this course, we learned about Level 5 leadership. By applying this method in our organization, we are able to train highly capable individuals by makes productive contributions through talent, knowledge, skill, and good work habit. We are able to assure highly contribution of all team members towards archive the organization objective. By following this method organizational managerial competency upgrades, as a result we are able to find out effective leadership & builds enduring greatness through a paradoxical blend of personal humility and professional well.
2. **Teamwork:** Towards sustainable employee performance teams plays a vital role. During this course, we are able to learn the importance of teamwork. In our organization now, we emphasize teams rather than individual “stars”. By collaboration within the team now are able to solve difficult problems. Now we are able to do more brainstorming & it helps us to find out various opportunities & help to exchange ideas. Now we are giving effort on smart work rather than hard work & allow the creativity of doing things. By working together, now we are able to find the solutions that work best.
3. **Motivation:** Most often employees leave a company because they don’t feel they are being recognized. Motivation the driver to put the necessary effort and action towards work-related activities & recognition. During this course, we learned about the Hierarchy of Needs by A. Maslow. Using this theory now we are able to identify below the label of needs
 1. Physiological needs.
 2. Safety need.

3. Belongingness needs.

4. Belongingness needs

5. Self-actualization needs.

Considering the label of need now we are able to motivated employees based on intention, intensity, and perseverance.

4. **HR values:** Every organization has some culture & values. During this course, we are able to know 8 major values that the HR department is fully abide-

- Embrace innovation.
- Respect for people.
- Integrity.
- Boundary less enterprise.
- Deliver bottom line result.
- Delight our customer.
- Energize others.

By applying these values in our organization now we are able to maintain a great relationship with the workers, employees, stakeholders.

3.1.1.2 Analytical Skills and Competencies

It was an accumulated course in a very short duration of time. Here are the most important skills applied from analytical skills and competencies. I also applied them during the internship program-

- To find out the reliability of an average data to take a proper decision I used variability.

- To compare two different products' future probability & variability I used the coefficient of variation. The coefficient of variation is more useful for comparing the variability of two or more series when the units of measurements are different.
- When productivity increases in UDL accordingly expenditures increase. To take proper decision & find out the impact I used correlation. It helps me to take rejection challenge.
- As a part of the scientific research method we learned about hypotheses & research questions, it helps me to analyze the different situations.

3.1.1.3 Communication Skills

The process helps us to be effective in sharing information, ideas, thoughts, and feelings with diverse internal & external audiences repeatedly in cross-cultural situations, apropos to develop two-way understanding between the audience and the communicator is called communications skills. On the way to be Knitwear professionals, it helped in our regular professional & personal life by focusing on the development of professional oral and written communication skills. During this course, we are able to learn how to develop interpersonal skills. Also, we are able to learn some academic terms like- job application strategies, presentation skills, participation in and chairing of meetings, policy and proposal writing, Memo, letter, email, reports in a professional way which we can use in our regular corporate life. Below are the most critical skills I used during my internship period-

- I Identify communication styles based on situation and atmosphere. Managed multidimensional communication in the office during the internship.
- To overcome the barriers of communication in the organization at the professional level I demonstrate the knowledge of communication skills & establish a quality relationship with employee, worker & stockholder.

- By improving my listening and questioning skills now I am able to collect vast information which is helped me to improve my analytical skills & that helps me to take the correct decision.
- I apply effective communication, like-



Figure 19: Effective Communication Skills

3.1.1.4. Business Operation Skills

It was a huge course to cover in a very short duration of time. These are the most important skills for Business Operations that I apply during my internship program.

- **Management Function and Feature:** During this course, we learn about management functions and features. As a part of my internship program, I work in a managerial position at UDL. I had to manage a big operation from order negotiation with the buyer to shipped finished goods as specified by the buyer including after-sales services. To run the entire activity in a professional manner to protect the company and buyer's interest as well, to manage the whole activity management function and feature give me the right direction.
- **Organizational Structure and Strategy:** As a PGD-KIM student during this season, we are trained to design & describe operational flow charts. As professional at first I analyze

the essential element of the macro environment. On this process I will follow A PESTEL analysis. A PESTEL analysis is a framework or tool used to analyses and monitor the macro-environmental (external marketing environment) factors that have an impact on an organization.



Figure 20: PESTEL Analysis

After that I analyze UDL internal & external factors. Formally we called it SWOT analysis. SWOT analysis identifies the key internal and external factors seen as important to achieving an objective.

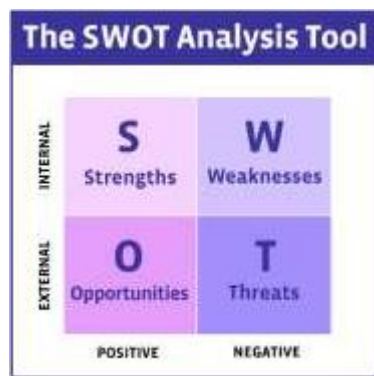


Figure 21: SWOT Analysis

Using this knowledge, I prepare an operational flow chart for UDL so that we can present it to prospective buyers so that buyers can get a clear understanding of UDL operation ensuring a competitive price of products and also for bargaining more price.

- **Marketing, sales and customer service:** The marketing mix is one of the important topics in this course. The marketing mix is the process of designing & integrating various elements of marketing in such a way to ensure the achievement of the organization's objective. Due to this pandemic situation, UDL faces various difficulties. Based on my knowledge I acquired during class, I share some important points with UDL to grab the new opportunity. To take this opportunity UDL need to focus on the element of marketing Mix as below-



Figure 22: Marketing MIX

- **Communication and negotiation:** Every product has to pass a different stage in its business life cycle. We can divide this life cycle into four-stage. They are introduction, growth, maturity & decline.

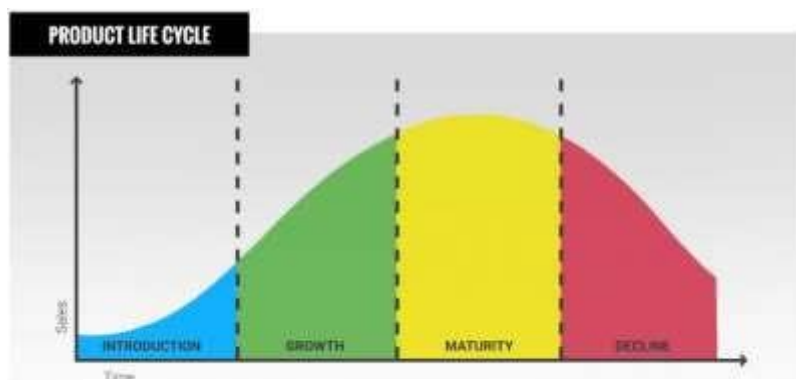


Figure 23: Product Life Cycle

Using product life cycle knowledge, I prepare a flow chart for UDL. So that we can present it to prospective buyers & enlighten buyers about the latest trend, business market also they can get a clear understanding of UDL products to compare with other's price for same products.

- Leadership.
- Problem solving.
- Financial management etc.

The whole managerial work is distributed in some departments and some sub-departments as well. During the internship, I worked with them closely to know how they are working. Also, try to accumulate my knowledge with them with better output.

3.2 Application of industry specific courses during internship

During this course in the second semester, we have covered four specific knitwear industry-oriented courses, they are as follows-

- **KIM 201:** Introduction to Garments Industry – Knitwear.
- **KIM 202:** Industrial Engineering.
- **KIM 203:** Production Management and Merchandizing.
- **KIM 204:** Quality Management.

We got a very clear guideline from these four industry-oriented courses to how the Knitwear Industry needs to manage in the era of global marketing.

3.2.1 Introduction to Garments Industry

This course is beneficial for all who work in Knit Industry or intend to work. During this course, we receive a clear picture of fiber, yarn count, knitting, weft knitting, warp knitting, fabric, stitch length, course length, and yarn path notations. We also know about fabric, garments, processes, raw materials, machines, technology, automation, and so on. We get practical knowledge about knitting elements, needles, needle beds, cams; loop formation in knit tuck and miss; single bed/double bed, and terms and definitions. Here we get a sharp knowledge about stitching length and dimensional

stability, common faults, review of bad samples, as well as knitwear techniques in fashion garments.

3.2.2 Industrial Engineering

Industrial Engineering works for the optimization of complex processes, systems at the organization. Industrial Engineers work to eliminate waste of time & and make the work easier to perform. Below are the technical knowledge I applied during my internship period-

- At UDL I worked on operation bulletin. During this period I face some difficulties but the knowledge that I gain from this course about motion study & its principles, effective use of PMTS help me to develop the best method of doing an operation bulletin.
- In this course, I learned about critical path analysis & problem identification using gang process chart. Using this knowledge during my internship program, I am able to design proper line balancing. It help me to distribute workload among workers evenly in order to achieve maximum utilization of manpower & machine.
- By using gang process chart during setting line target directly impact manufacturing performance by improving productivity.
- IE related formulas that I learned from KIM help me to identify & decisions making in production lines.
- Different formula on KPI (Key performance indicators) help me to calculate productivity & performance.
- I learn about several waste detection tools during this course. It helps me to eliminate maximum wastage of time, money, materials, man-hours, machine time, energy, and other resources during working at UDL.
- Knowledge about pull, kush, kanban, supermarket systems helps me to understand the technique of maintaining minimum inventory. It helps to save cost & maintaining the

maximum productivity level. Now, I am able to identify a systematic approach to continuous improvement which helps me to minimize machine downtime.

- I used my technical knowledge that I gains from this course at UDL to take the mechanical advantages & proper usage of mechanical devises also equipment such as conveying, systems, trolleys, forklifts.
- This course helps me to understand the scientific way of designing human-friendly workstations that ensure health and safety issues while maintaining productivity at the desired level.

3.2.3 Production Management and Merchandising:

Merchandising is the bridge between the buyer & the factory. From inquiry receive till shipment merchandising department played a vital role in order execution. During my academic program on production management and merchandising, I gather relevant knowledge & skills. This knowledge helps me in my internship program. Below is a short summary of my implementation using these skills.

- During this course, we got a vast idea about analytical skills. Analytical skill is a key driving factor in the way of knit merchandising. This skill helps me to an analysis of the situation of UDL. Based on this analysis I determine the future demand and supply of goods.
- During this course, we got clear updated about local & international supplier also the global market. Now we are able to source supplier & business market. Which helps me to collect actual RAM price for costing during work on UDL.
- In this course, our teacher enlightens us about the importance of teamwork. We attended an aerial program on team management during this course. This experience helps to work in ULD during my internship program as a team.

- In this course, we got the actual product and manufacturing knowledge. During my internship program at UDL sometimes I need to make decisions quickly. This accumulated knowledge helps me to take the correct decision in such cases of quick decision-making.
- During this course, we got guidelines for the details about Factory workflow & barriers. This skill helps me to order execution in UDL.
- Correct consumption calculation knowledge help business to earn profit from an order. In this course, we got clear guidelines about garment consumption & costs. This knowledge helped me to make price quotations & fair negotiations during receive orders in UDL.
- Good product knowledge is a key to success in merchandising. During our course, we get details knowledge about products. This knowledge helped me during my internship program. Even after that in my professional life.

3.2.4 Quality Management

During the Quality Management course, we are well-guided by our honorable teacher in quality, quality control, and quality assurance. We also know about the quality management system and its benefits. During this course, we get a clear picture of statutory and regulatory requirements in the textile sector, standard and guideline accreditation, international test method of textile testing & ISO. We learned about the process of certification and product certification. Now we have a clear picture about good practice and bad practice, registration, evaluation, authorization, and restriction of chemicals (REACH) pictorial. During my internship program as a Quality Assurance Manager first I highlight the below benefit of Quality Management System to UDL through my academic knowledge-

- Greater efficiency and less waste.
- Better and consistent control of major business processes.
- A better understanding of customer needs.

- Regulation of successful working practices.
- Improved risk management.
- Increased customer satisfaction.
- Improved participation of employees.
- Better internal communication.
- Greater consistency in the quality of products and services.
- Differentiation of your business from its competitors.
- Increased profits.
- Reduction of costly errors.
- Exploitation of new markets, both in the UK and overseas.
- Managing growth more effectively.
- An embedded culture of quality.

Considering upper benefit & based on the above steps I take some initiatives for implementing QMS (Quality Management System) to achieve international certification & perform necessary laboratory testing to obtain the eco-labelling mark at UDL. Those are given below.

- Define and map processes.
- Define quality policy.
- Define quality objectives.
- Develop metrics to track and monitor CSF data.
- Define detects for every process.
- Define quality process.
- Determine training needs.
- Use quality management system.
- Measure, monitor, and implement activities to improve performance.

3.3 Suggestion for industry improvement

During my internship time, I found here some improvement area below some points-

- Growing demand for RMG products, considering its impact on our environment and future generation this sector UDL to start transforming its manufacturing process into green and environment-friendly.
- Increase mid-level management development program by professional training, organized work environment, motivation, leadership opportunity.
- Increase number of technical workshop & training program.
- Increase proper training session for our own workforce to reduce dependency on foreign top management.
- To reduce ideal time follow standard SOP.
- Introduction of new technology & automation in the meantime manage proper training session to adopt new technology.
- To ensure worker mental & physical health arrange counseling & exercise program.
- Considering the future environment needs to give importance to sustainable production & infrastructure development.
- Ensure work environment considering 100% compliance & safety.
- Ensure women's safety during & after work.
- Ensure proper raw material management to control the cost.
- Establish a link between worker, employee & stakeholder interest with company mission, vision, goal & objective.
- Follow standard SOP & TNA for on-time delivery.

- **Line balancing:** After 3 days new style output, need get capacity in each operator to find out the line bottle neck areas and each bottleneck operations need to have a plan to improve by using method and time study tools. By using this capacity studies and technique of engineered garments line has to re-balance to solve the bottle necks. Required monitoring of each individual operator efficiency & performance till the line reached their plan targets. Production team will be monitoring the hourly production in each line and will update progress in hourly basic. Line industrial engineering officer or work study officer will update the line balancing graph as per actual production output so that easy to identify the fall back operation and can take the action fast , also line balancing graphs of garments worker required to get sign by PM/Factory Manager/GM.
- **Line Balancing and its benefit:** Line balancing is a production strategy that involves balancing operator and machine time to match the production rate to the Takt time. Takt time is the rate at which parts or products must be produced in order to meet customer demand. Rose some sewing line are proper line balancing that's why some operator is over flow and some operator is idle time.

 1. Calculate talk time.
 2. Perform time studies.
 3. Identify bottlenecks and excess capacity.
 4. Re-allocate resources.
 5. Make other improvements.
 6. Reduce wastage.
 7. Reduce WIP with smooth line operation.

Line balancing is an optimization problem with significant industrial importance. By improving the efficiency of their lines, manufacturers can reduce the wastes of lean manufacturing and unlock more value.

3.4 Learning for self-improvement

Due to this internship program, I communicated with several departments as well as people. It increases my intercommunication skills & confidants also I am able to learn about different activities of several departments. I am able to acquire knowledge about overall the organizational & industrial process., I had acquired valuable skills, experience & knowledge. This accumulated theoretical and practical knowledge, skill & experience will help me in the future to lead a Knit Industry as top-level management. Below is some valuable area of my self-improvement during this course-

- My interpersonal skill like communication, negotiation, versatility improve at the maximum level. Now we are live in the world of global marketing. Using acquired versatile knowledge now I am able to face the challenge of global marketing, Market diversification, also able to handle the process of designing and integrating various elements of marketing in such a way that ensures the achievement of the organization's objective.
- Through this course, I am able to improve my analytical skills. Now I am able to analyze the probability, risk, and other required areas to take proper decisions.
- Able to gather sound knowledge about technical, mechanical, automation, organization management, motivation, leadership, marketing, operation management, recherche & development process. Now I am confident to run the industry in an organized way.
- Green and environment-friendly industrial initiative is a major drive towards sustainable industrial development around the world. During this course I am able to learn the overview of the social, economic, and environmental benefit of green & environment-friendly industries activity in the RMG sector. I am able to learn major

prerequisites of green & environment-friendly industry as location and transportation, materials and resources, water efficiency, energy and atmosphere, sustainable sites, indoor environmental quality, regional priority credits. It will help me to convert my own working organization from a general structure GMG factory to a sustainable well structure green factory.

4. Conclusion

Bangladesh, a hub of garment manufacturing, has positioned as the world's second-largest Readymade Garment (RMG) exporter after China. It has a crucial contribution to the transformation of the Bangladesh economy (CPD, 2002). Akter (2020) shows that about 84% of the export earning of Bangladesh come from the garments industry. Khan (2016) identified cheap labor, enough skill, and the development of supportive sectors attract world-famous buyers. In this huge sector, A great number of top management employees are foreign citizens. They take away the lion's share of our income. Due to this concern, our government took the incentive to train our own people as a professional by KIM. I am hereby a part of the Post Graduate Diploma in Knitwear Industry Management (PGD-KIM). By the grace of Almighty, I've successfully completed my internship at UDL. I observed all the activities from the beginning of my internship program till the end. In the last three months, I had visited the most important areas whenever needed. I directly work with 10 individual departments in that internship time frame. I got support from the HR & Admin, Technical compliance, Merchandising, IE, Commercial & and Logistics department, like other departments. This long three-month internship has given me the opportunity to work in a favorable environment though an epidemic, with the use of new technologies, managerial skills, and proper processing of manpower and I learned a lot of information and experience.

A clear idea I have gathered from the internship, for my professional development on Knitwear Industry operation through working with UDL team. For order execution, from the beginning of the order to till closing to cover the full activation area, I had to proceed by doing lots of activities and going different departments. A business's objective is to gain profit. At each level activation, I have realized that keeping the price and quality of the product good keeps the business sustainable. Great leadership is mandatory accurate at every stage from marketing to product preparation. During the internship period, I've been guided properly by my academic and industrial supervisors. I tried to accumulate my PDG-KIM subjective knowledge with my internship program, and it connects perfectly. I am very glad that I've completed my internship at UDL which is one of the largest knit product manufacturers and exporters in Bangladesh.

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