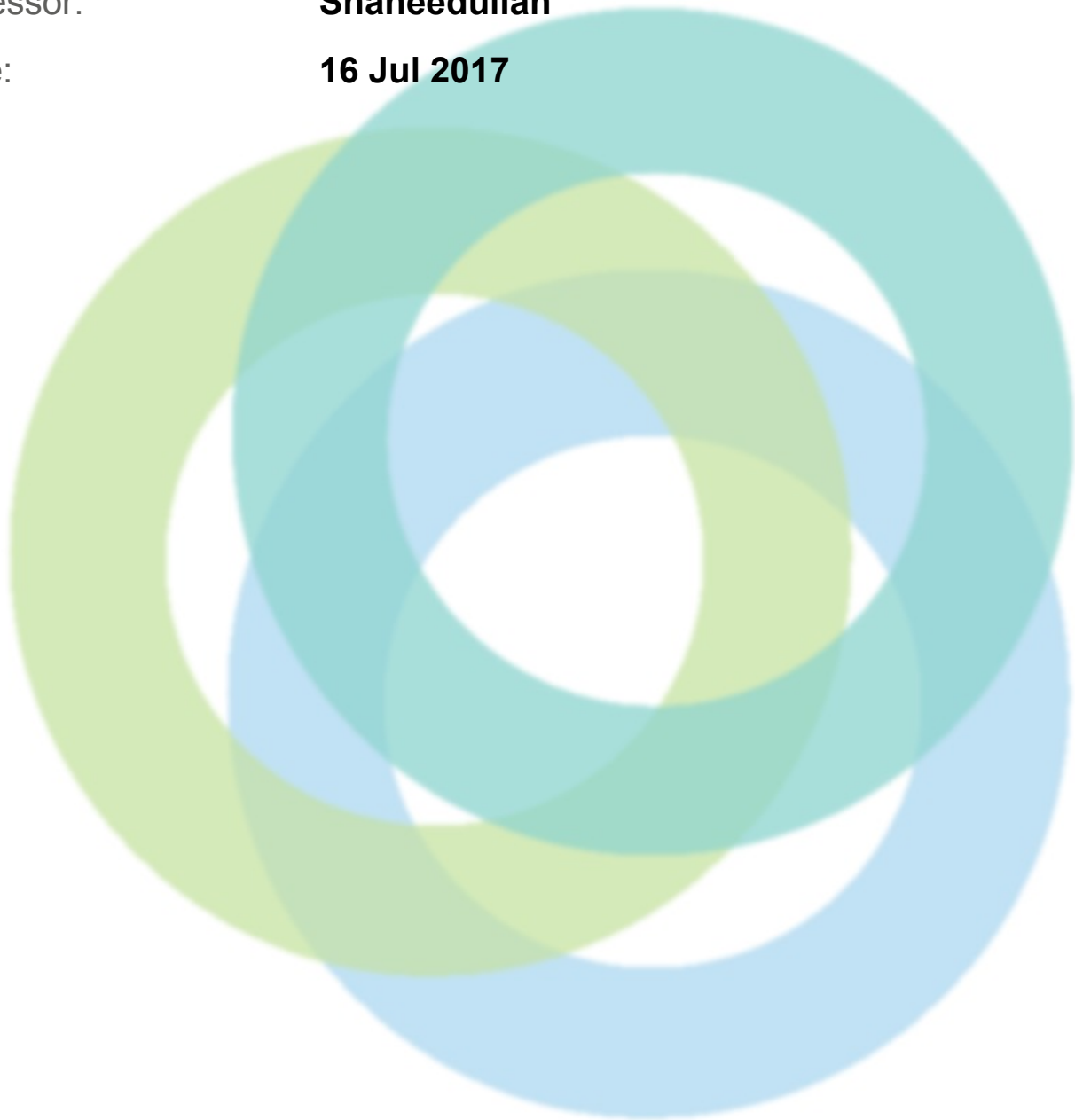




# INITIAL FIRE SAFETY ASSESSMENT

Factory Name: **Lyric Industries (Pvt.) Ltd**  
Address: **East Mouchak, Cha Bagan Road, Mouchak, Kaliakoir,  
Gazipur Bangladesh**  
Assessor: **Shaheedullah**  
Date: **16 Jul 2017**





## Introduction to the Report

The following report contains a site profile and summary of non-conformities identified during an onsite assessment commissioned by the Alliance for Bangladesh Worker Safety (Alliance) and conducted by a third-party Qualified Assessment Firm (QAF). The assessment was conducted against the Alliance for Bangladesh Worker Safety Assessment Protocols (APs) and Fire Safety and Structural Integrity Standard, which is harmonized with the factory assessment guidelines developed by Bangladesh University of Engineering and Technology (BUET) for the Bangladesh National Tripartite Plan of Action (NTPA). The goal of the Alliance process is to provide clear and practical technical requirements by which Bangladeshi Ready Made Garment (RMG) Factories producing for Alliance members may be consistently and fairly evaluated for fire, structural, and electrical safety in a non-duplicative manner. Each assessment will prompt action plans that will be used by RMG factories to systematically and sustainably improve safety conditions for garment workers. Beyond tracking and reporting on action steps taken in a transparent manner, the Alliance organization and its members will seek to further support factory improvements through technical assistance, training, implementation support for functional Worker Committees, and in some cases financial assistance and wage support for workers if factories are closed for remediation.

The contents of the report do not constitute a guarantee of compliance with the applicable laws, the Alliance Standard or the absolute or continued safety against fire, electrical and/or structural integrity issues that may lead to injury or loss of life. The report is designed to provide a non-exhaustive summary of risk issues, based on a limited sampling and duration of time onsite by the named QAF. Neither the QAF nor the Alliance can certify or guarantee the quality, outcome, or effectiveness of actions taken in response to the report.

For more information and report feedback please go to: [www.bangladeshworkersafety.org](http://www.bangladeshworkersafety.org).





## GENERAL INFORMATION

General Information	
Factory Name:	Lyric Industries (Pvt.) Ltd
Address:	East Mouchak, Cha Bagan Road, Mouchak, Kaliakoir, Gazipur Bangladesh
Country:	Bangladesh
Province:	
City:	Gazipur
Zip Code:	1751
Audit Duration:	2 Days
Re-Audit:	Re-Audit After 0 Months
Draft Report Date:	August 12 2017
Final Report Date:	August 24 2017
Are all Action Items From Previous Assessment Completed?:	N/A
Buildings in Complex:	There are 7 buildings in the factory complex, 1 main production building and 6 ancillary structures. 1) Main Production Building; 2) Utility Building; 3) Security and Fire Control Room; 4) Wastage Storage Building; 5) Pump House; 6) Shower Stand (Block 1&2); 7) Sewage treatment Plant(STP).
Is the building(s) owned or rented by the Factory:	Owned
Number of Building Levels (Stories):	Main Production Building: 5-stories.
Approximate Building Area (SF):	Main Production Building: 171,770 SF.
Date of Building Construction:	2015
Date of Last Building Renovation/Addition:	N/A.
Ancillary Structures in Complex:	There are 6 Ancillary Structures. 1) Utility Building (Generator, Substation, Compressor, and Boiler); 2) Security and Fire Control Room; 3) Wastage Storage building; 4) Pump House; 5) Shower Stand (Block 1&2); 6) Sewage treatment Plant (STP).
Approximate Ancillary	1) Utility Building: 2,160 SF; 2) Security and Fire Control Room: 530 SF; 3) Wastage Storage Building: 566



Structures Area (SF):	SF; 4) Pump House: 500 SF; 5) Shower Stand (Block 1&2): 300 SF; 6) Sewage Treatment Plant (STP): 1,030 SF.
Number of Occupants:	Total occupants: 1,907. 1) Main Production Building: 1,887 (GF: 112, 2nd: 625, 3rd: 550 (proposed), 4th: dining capacity 600); 2) Utility Building: 2; 3) Security and Fire Control Room: 5; 4) Wastage Storage Building: 0; 5) Pump House: 0; 6) Shower Stand (Block 1&2): 13 (capacity); 7) Sewage Treatment Plant (STP): 0.
Number of Ancillary Levels (Stories):	1) All ancillary buildings: 1 story.
Occupancy Type:	1) Main Production Building: G2; 2) Utility Building: K; 3) Security and Fire Control Room: F1; 4) Wastage Storage Building: H2; 5) Pump House: K; 6) Shower Stand (Block 1&2): K; 7) Sewage Treatment Plant (STP): K.
Construction Type:	All buildings and ancillary structures: Type 2.
Height of Highest Occupied Floor Level Above Grade:	1) Main Production Building: 16 m (52.5 ft); 2) All other structures: At grade.



## ASSESSMENT FINDINGS

### Fire Protection Construction

Question:	Are openings and penetrations through rated walls and/or assemblies protected?
Priority Level:	High
Non-Compliance Level:	2
Description:	There is an unprotected opening and penetration through the rated floor slab and wall by the BBT in the MDB room, near stair 1 at each floor in the main production building.
Source of Findings:	Photograph: i) The opening and penetration in the floor slab. ii) The penetration in the wall.
Suggested Plan of Action:	Provide fire-resistive rated opening or penetration protection for rated walls and assemblies in accordance with Alliance Standard Sections 4.6 and 4.7. Consult a qualified fire protection engineer to design the required opening or penetration protection systems.
Suggested Deadline Date:	15 Nov 2017
Standard:	Includes doors, windows, ducts, piping, etc. Reference Alliance Standards Part 4 Section 4.6 Opening Protectives and Section 4.7 Penetrations
Question:	Are exit enclosures provided with fire-resistive rated construction barriers?
Priority Level:	High
Non-Compliance Level:	2
Description:	4 stair enclosures in the main production building are provided with 10 inch thick masonry walls which provide fire-resistive rated barriers. Openings to the stairs are protected with fire doors, but listings of the doors could not be determined. All documents, including listings for the fire doors and their components, are required to be reviewed by the Alliance.
Source of Findings:	Document Review: The documents provided have been reviewed., Photograph: i) The fire door. ii) The fire door component.
Suggested Plan of Action:	Providing listing documentation to the Alliance for review and approval.
Suggested Deadline Date:	15 Nov 2017
Standard:	Reference Alliance Standards Part 4 Section 4.5 Separation





Question:	Are separations between hazards provided with fire-resistive rated construction barriers.
Priority Level:	Medium
Non-Compliance Level:	2
Description:	Spot removal room is provided with glass wall and non-rated door at levels 2 & 3 in the main production building. It is not separated from the adjoining production floor by rated fire-resistive barriers.
Source of Findings:	Photograph: The spot removing room, level 3.
Suggested Plan of Action:	Provide fire-resistive rated construction barriers (with associated opening protection) between hazard types in accordance with Alliance Standard Sections 3.4 and 4.5. Consult a qualified fire protection engineer to design the required rated construction barrier.
Suggested Deadline Date:	15 Feb 2018
Standard:	Reference Alliance Standards Part 4 Section 4.5 Separation
Question:	Fire dampers installed on air-conditioning and ventilation ducts appear to be in good condition and operational.
Priority Level:	Medium
Non-Compliance Level:	2
Description:	Air-conditioning and ventilation ducts were found on Level 1 of the accessories storage, and on levels 2 and 3 in the spot removing rooms. The ducts pass through rated walls, but the associated protection with fire dampers is not provided.
Source of Findings:	Photograph: The ventilation ducts., Visual Assessment: The facility survey.
Suggested Plan of Action:	Provide fire dampers in accordance with Alliance Standard Section 4.5.6. Consult a qualified fire protection engineer to design the required equipment.
Suggested Deadline Date:	15 Feb 2018
Standard:	Reference Alliance Standards Part 4 Section 4.6 Opening Protectives and Section 4.7 Penetrations
Question:	Certificates of Occupancy for each building have been issued and are on file.
Priority Level:	Low
Non-Compliance Level:	3
Description:	Certificates of occupancy for the buildings were not provided.
Source of Findings:	Document Review: Certificates of occupancy for each building and structure were not provided.





Suggested Plan of Action:	Apply to appropriate authority in an expeditious manner for issuance of the Certificates of Occupancy for each building and ancillary structure according to building use.
Suggested Deadline Date:	30 Sep 2017
Standard:	Are certificates of occupancy provided for each building or ancillary structure?

**Fire Protection Systems**

Question:	Does the building have a Standpipe System?
Priority Level:	High
Non-Compliance Level:	2
Description:	During the inspection, it was noted that the installation of the Class III Standpipe System is in progress. 2 1/2 in. hose connections in the stairwells, 1 1/2 hose stations in the interior of the floor near the exit doors, and the pressure gauge at the top of the riser were found installed. However, the design document has not been submitted for review and approval to the Alliance.
Source of Findings:	Photograph: The facility survey, Visual Assessment: i) The 2 1/2 in. hose connection. ii) The 1 1/2 in. hose station. iii) The pressure gauge. iv) The FDC v) The pillar hydrant.
Suggested Plan of Action:	The design documents for the Class III Standpipe System being installed throughout the facility, and all associated documents of system components, shall be submitted to the Alliance for review.
Suggested Deadline Date:	15 Nov 2017
Standard:	Does the building have a standpipe system installed where required. Alliance Standard Part 5 Section 5.4.2





Question:	Does the building have a fire pump?
Priority Level:	High
Non-Compliance Level:	2
Description:	An electrically driven fire pump (1250 gpm @ 9 bars) with a standby diesel pump, is provided in the basement of the pump house. The fire pump and associated the components is reportedly listed. The detailed shop drawings, hydraulic calculations, and associated listing documents have not been reviewed by the Alliance.
Source of Findings:	Photograph: i) The pump house. ii) The Fire Pump.
Suggested Plan of Action:	All documents, including listing information for the fire pump and its components, shall be submitted to the Alliance for review and approval.
Suggested Deadline Date:	15 Nov 2017
Standard:	Alliance Standard Part 5 Fire Protection Systems
Question:	Trouble or alarm notifications were not indicated on the fire alarm control panel.
Priority Level:	High
Non-Compliance Level:	2
Description:	The installation of fire alarm and detection system is in progress. The FACP is installed but it is not functional. The listing document and design documents have not been submitted to the Alliance for review.
Source of Findings:	Photograph: The FACP.
Suggested Plan of Action:	Submit the listing document and the design documents for review by the Alliance.
Suggested Deadline Date:	21 Sep 2017
Standard:	Alliance Standard Part 13 Section 13.10 Maintenance of Fire Protection Equipment





Question:	Are notification and initiation devices for the fire alarm system installed at required locations based on occupancy type?
Priority Level:	High
Non-Compliance Level:	2
Description:	The installation of the notification and initiation devices for the automatic fire alarm system is in progress.
Source of Findings:	Document Review: The design document., Photograph: i) The call point. ii) The SD iii) The strobe.
Suggested Plan of Action:	Submit the design documents to the Alliance for review. Install initiating devices and notification appliances as required by the Alliance Standard and NFPA 72. This includes electrical supervision of all valves controlling fire protection systems (fire pumps, water supplies, etc.). Connect devices to an automatic fire alarm and detection system for the facility. All fire alarm installations or modifications shall be documented with shop drawings and submitted for review by the Alliance prior to commencement of installation.
Suggested Deadline Date:	15 Nov 2017
Standard:	Pull stations at egress points, smoke detectors in air handling equipment, visual and audible devices spaced appropriately based on occupancy type. Reference NFPA 72
Question:	Are fire department connections provided and clearly identified for the Fire Protection Systems?
Priority Level:	Medium
Non-Compliance Level:	2
Description:	The fire department inlet connection and pillar hydrants are available and are clearly identified in the factory premises, but the fire department outlet connection to allow the fire department pumper vehicles to draw water from the underground water storage tank has not been provided.
Source of Findings:	Photograph: i) The facility survey. ii) The FDC, the inlet connection. iii) The pillar hydrant., Visual Assessment: The facility survey.
Suggested Plan of Action:	Provide Fire Department (Siamese) connections in accordance with Alliance Standard Section 5.5.4. Connections shall match the Fire Service and Civil Defence hose thread standard.
Suggested Deadline Date:	15 Feb 2018
Standard:	Alliance Standard Part 5 Section 5.5.4 Fire Department Connections
Question:	Portable fire extinguishers have been selected based on potential fire class and hazards?
Priority Level:	Medium





Non-Compliance Level:	2
Description:	Fire extinguishers have been selected based on the potential fire class and hazards, and these are CO2, dry chemical powder (ABC), and foam type installed in the facility. In a total CO2: 35, DCP: 113, and Foam: 2, for a grand total 150 extinguishers, have been installed on the 2 functional floors of the 5-story main production building and in the ancillary structures assessed. However, none are not installed on the 3 non-occupied floors.
Source of Findings:	Visual Assessment: The facility survey.
Suggested Plan of Action:	Install fire extinguishers based on hazard type in accordance with BNBC Part 4 and NFPA 10 on the 3 floors prior to occupancy.
Suggested Deadline Date:	15 Nov 2017
Standard:	NFPA 10 Chapter 5
Question:	Fire extinguishers are inspected, tested, and maintained as required.
Priority Level:	Medium
Non-Compliance Level:	2
Description:	A monthly inspection document of the extinguishers is available, but no records of testing and maintenance were found.
Source of Findings:	Document Review: The documents provided have been reviewed.
Suggested Plan of Action:	Establish an inspection, testing, and maintenance program for all fire extinguishers. The program must comply with the requirements of NFPA 10 Chapter 7
Suggested Deadline Date:	15 Feb 2018
Standard:	NFPA 10 Chapter 7
Question:	Is the fire alarm and detection system monitored by a central station monitoring service or directly connected to the Fire Service and Civil Defense?
Priority Level:	Medium
Non-Compliance Level:	2
Description:	Installation of an automatic fire alarm and detection system is ongoing throughout the facility, including the installation of a FACP. The design document has been prepared in accordance with NFPA 72, but it has not been submitted to the Alliance for review.
Source of Findings:	Document Review: The design document of the CFDS., Photograph: i) UL listed fire alarm control panel (FACP), Visual Assessment: The visual assessment.
Suggested Plan of	Submit the design document to the Alliance for review and approval. Complete





Action:	the installation of the fire alarm and detection system in accordance with the reviewed design document. Once installed, arrange for direct connection of the fire alarm and detection system to a central station monitoring service or the Fire Service and Civil Defence as per Alliance Standard Section 5.7.5. Until that time, a person trained to contact the Fire Service and Civil Defence in the event of fire alarm activation shall be provided. An annunciator shall be located in a constantly attended location (such as a fire control room) to alert this person.
Suggested Deadline Date:	21 Sep 2017
Standard:	Alliance Standard Part 5 Section 5.7.5 Monitoring
Question:	Are there additional areas of non-compliance related to the Fire Protection Systems?
Priority Level:	Medium
Non-Compliance Level:	2
Description:	The fire pump has been installed in the basement 16 feet below grade level in the 1 story pump house. The pump house super structure is enclosed with walls fitted with glass. The fire pump is not provided with sufficient ventilation. Also, the storage battery for the fire pump is placed in a damp condition on the basement floor of the pump house.
Source of Findings:	Photograph: i) The fire pump installed at the basement. ii) The pump house. iii) The storage battery in a damp condition.
Suggested Plan of Action:	Sufficient ventilation shall be provided for the pump house and the storage battery shall be placed on a dry platform in the pump house in accordance with Alliance Standards.
Suggested Deadline Date:	15 Nov 2017
Standard:	Not Applicable
Question:	Are portable fire extinguishers installed throughout the building at required locations and mounted at the correct height?
Priority Level:	Medium
Non-Compliance Level:	1
Description:	Portable fire extinguishers are not installed on the 3 floors that are not currently occupied.
Source of Findings:	Visual Assessment: The facility survey.
Suggested Plan of Action:	Prior to occupying these floor levels, install fire extinguishers at locations and heights based on the hazard type per BNBC Part 4 and NFPA 10.
Suggested Deadline	15 Nov 2017







Date:		
Standard:	BNBC Part 4 Section 4.10 and NFPA 10	
Question:	Are inspection, maintenance, and testing procedures of the standpipe and hose system documented and up to date? Including inspection and testing of hoses if provided.	
Priority Level:	Low	
Non-Compliance Level:	3	
Description:	The installation of the Class III Standpipe System is on going. The inspection, maintenance, and testing program for the standpipe and hose system has not been established by the factory yet.	
Source of Findings:	Document Review: No document has been provided.	
Suggested Plan of Action:	After completion of the Class III Standpipe System installation, establish an inspection, maintenance, and testing program for the standpipe and hose system. Program must comply with the requirements of NFPA 25.	
Suggested Deadline Date:	15 Feb 2018	
Standard:	Reference NFPA 25 Chapter 6 Standpipe and Hose Systems Table 6.1.1.2	
Question:	Is signage for the standpipe system installed at required locations and on required components?	
Priority Level:	Low	
Non-Compliance Level:	2	
Description:	The installation of the Standpipe System in the facility is ongoing. So far, signage for the Standpipe System did not appear to be at all required locations and on required components.	
Source of Findings:	Photograph: i) The 2 1/2 hose connection. ii) The FDC iii) The pressure gauge iv) The fire pump., Visual Assessment: The facility survey.	
Suggested Plan of Action:	Install required identification signs at the noted locations. Signage must comply with NFPA 14 Chapter 6.	
Suggested Deadline Date:	30 Sep 2017	
Standard:	Reference NFPA 14 Chapter 6	
Question:	Are inspection, maintenance, and testing procedures of the fire pump documented and up to date?	
Priority Level:	Low	
Non-Compliance Level:	2	



Description:	The inspection, maintenance, and testing procedure for the fire pump have not been established in accordance with Alliance Standards.
Source of Findings:	Document Review: No document has been provided.
Suggested Plan of Action:	Establish an inspection, maintenance, and testing program for the fire pump. Program must comply with NFPA 25 Chapter 8.
Suggested Deadline Date:	15 Feb 2018
Standard:	Reference NFPA 25 Chapter 8 Fire Pumps

**Means of Egress**

Question:	Aisles are provided with the minimum unobstructed clear width of 0.9 m (36 in) based on occupant loads.	 
Priority Level:	High	
Non-Compliance Level:	2	
Description:	Aisles marks were noticed from the ground floor to level 2 with a minimum unobstructed clear width of 0.9 m (36 in.), but not on floor levels 3 & 4.	
Source of Findings:	Photograph: i) No aisles on levels 3 & 4 ii) Aisle mark on the ground floor., Visual Assessment: The facility survey.	
Suggested Plan of Action:	Provide proper egress width in accordance with the Alliance Standard Section 6.5. Provide aisle clear width minimum of 0.9 m (36 in) and provide proper markings. Keep aisles free of storage. Relocate equipment if necessary to provide proper width. The path of egress travel along a means of egress shall not be interrupted by any obstruction. The capacity of the means of egress shall not be reduced along the path of travel.	
Suggested Deadline Date:	15 Nov 2017	
Standard:	Higher occupancy loads will require a greater width to accommodate the increased load. Alliance Standard Part 6 Section 6.5 Egress Width	




Question:	Doors along the path of egress have a minimum width of 0.8 m (32 in) and have required ratings.
Priority Level:	High
Non-Compliance Level:	2
Description:	The doors along the path of egress were measure to be 2.44 m (96 in.). All doors would seem to be UL listed and 2 hrs fire rated, but the listing documents for the fire doors installed have not been reviewed by the Alliance.
Source of Findings:	Photograph: i) Doors width greater than 32 inch. ii) Door frame 2 hrs rated iii) Door leaf 2 hrs rated
Suggested Plan of Action:	Submit all documents to the Alliance for review, including the listings for the installed fire doors.
Suggested Deadline Date:	15 Nov 2017
Standard:	Alliance Standard Part 6 Section 6.5.6 Minimum Widths. Increased occupant loads will require a door width greater than 0.8 m.
Question:	Stairwells are not utilized as storage spaces.
Priority Level:	High
Non-Compliance Level:	2
Description:	Two Electric pumps for domestic water supply are in stairwell # 1, and in another stairwell, worker lockers have been installed on the ground floor.
Source of Findings:	Photograph: i) Workers locker in the stairwell ii) Electric pump in the stairwell
Suggested Plan of Action:	The pumps and the workers lockers shall be removed from the stairwells at noted locations in accordance with the Alliance Standards.
Suggested Deadline Date:	21 Sep 2017
Standard:	Alliance Standard Part 13 Section 13.9 Safety Inspections
Question:	Landings are provided on both sides of doors used along the path of egress. Doors do not swing out over stairs.
Priority Level:	High
Non-Compliance Level:	1
Description:	A brick-masonry sill, approx. 6 1/2 in. high, is provided at the door of each stair to the roof level to protect rain water intrusion into the stairwell. This arrangement causes issues with providing landings on each side of the doors at the noted locations.
Source of Findings:	Photograph: i) The brick-masonry door sill., Visual Assessment: The facility





	survey.	
Suggested Plan of Action:	Provide landings on both sides of the doors in the noted locations at the roof level in accordance with the Alliance Standards.	
Suggested Deadline Date:	15 Nov 2017	
Standard:	Alliance Standards Part 6 Section 6.8 Doors and Gates	
Question:	Interior exit stairways and ramps terminate at an exit discharge except where terminating at a rated exit passageway.	
Priority Level:	High	
Non-Compliance Level:	1	
Description:	The 4 interior exit stairs terminate on the ground floor at an exit passageway. The requirements of Alliance Standard Section 6.15 are met by providing a fire door as the opening protective in the stair enclosure, but the listing document is required to be submitted to the Alliance for review.	
Source of Findings:	Visual Assessment: The facility survey.	
Suggested Plan of Action:	Submit all documents, including a listing of the fire doors installed at the noted locations in the facility for review to the Alliance.	
Suggested Deadline Date:	15 Nov 2017	
Standard:	Alliance Standard Part 6 Section 6.14 Exit Enclosures	
Question:	Emergency power for means of egress illumination is verified at least once per year. If battery operated lights are used, these lights are tested on a monthly basis. Functional testing of battery powered lights is provided for a minimum 90 min once per year.	
Priority Level:	Medium	
Non-Compliance Level:	3	
Description:	No credible documents were provided regarding inspection and testing of these egress lighting.	
Source of Findings:	Document Review: No credible document was provided.	
Suggested Plan of Action:	Develop a testing and maintenance program that ensures the emergency power for all egress lighting is verified at least once per year. If battery-operated lights are used, these lights shall be tested on a monthly basis. Functional testing of battery powered lights shall be provided for a minimum 30 min once per year.	
Suggested Deadline Date:	21 Sep 2017	
Standard:	Alliance Standards Part 10 Section 10.12 Illumination of Exit Signs and Means	



	Of Escape Lighting	
Question:	Emergency power for exit signs is tested at least once per year. If battery operated, these lights are tested on a monthly basis. Functional testing of battery powered signs is provided for a minimum 90 min once per year.	
Priority Level:	Medium	
Non-Compliance Level:	3	
Description:	There are no credible documents available regarding the testing of the exit signage on a monthly basis, as well as their functional testing for a minimum 90 min once per year.	
Source of Findings:	Document Review: No credible documents have been provided.	
Suggested Plan of Action:	Develop a testing and maintenance program that ensures the emergency power for exit signs is verified at least once per year. If battery-operated signs are used, these signs shall be tested on a monthly basis. Functional testing of battery powered signs shall be provided for a minimum 90 min once per year.	
Suggested Deadline Date:	21 Sep 2017	
Standard:	Alliance Standard Part 10 Section 10.12 Illumination of Exit Signs and Means Of Escape.	
Question:	Occupant loads are posted for every assembly and production floor in a conspicuous space near the main point of egress.	
Priority Level:	Medium	
Non-Compliance Level:	2	
Description:	Occupant loads are not posted for the 2 production floors, or the 3 non-functional floors in the Main Production Building.	
Source of Findings:	Visual Assessment: The facility survey.	
Suggested Plan of Action:	Post the occupant load for all assembly and production floor areas in a conspicuous space near the main exit or exit access doorway for the space in accordance with Alliance Standard Section 6.4.4.	
Suggested Deadline Date:	21 Sep 2017	
Standard:	Alliance Standards Part 6 Section 6.4.4 Posting of Occupant Load	
Question:	All paths of egress are provided with compliant means of illumination.	
Priority Level:	Medium	
Non-Compliance Level:	2	
Description:	The paths of egress lighting has not been installed on the floor levels 3 and 4.	



Source of Findings:	Photograph: i) Illumination measured in aisles as 18 lux
Suggested Plan of Action:	Install emergency lighting for all paths of egress in accordance with Alliance Standard Section 6.7. Illumination needs to be a minimum of 10 lux for all corridors, exit doors and stairways. Illumination for aisles needs to be a minimum of 2.5 lux. Egress lighting shall be provided with emergency power or supplemented with battery powered lights that provide a minimum of 10 lux for not less than 30 mins in the event of failure of normal lighting.
Suggested Deadline Date:	15 Feb 2018
Standard:	Alliance Standards Part 6 Section 6.7 Egress Illumination and Part 10 Section 10.12 Illumination of Exit Signs and Means Of Escape
Question:	Illuminated exit signs are placed at entrances to exits and along the path of egress anywhere the continuation of egress is not obvious or there is a change in the direction of the path of travel.
Priority Level:	Medium
Non-Compliance Level:	2
Description:	Illuminated exit signs are placed at the entrances to the exits on all levels, but the additional directional signs along the path of egress where the continuation of egress is not obvious or there is a change in the direction of the path of travel are only provided on the bottom two levels.
Source of Findings:	Photograph: i) No exit sign at level 3 & 4. ii) Exit sign presents at ground floor, level 1, and 2.
Suggested Plan of Action:	Provide continuously illuminated exit signs per Alliance Standard Section 6.11. Signs shall be placed at all required exits and along egress paths, especially where there is a change in direction for the path of travel.
Suggested Deadline Date:	15 Feb 2018
Standard:	Alliance Standard Part 6 Section 6.11 Exit Signs
Question:	Handrails are provided on both sides of each stairway. Intermediate handrails are provided when the stair width exceeds 2.2 m (87 in.). Handrails are not mounted lower than 760 mm (30 in.) or higher than 1100 mm (44 in.).
Priority Level:	Medium
Non-Compliance Level:	2
Description:	Handrails are provided only on one side of the stairway at a mounting height of 0.97 m (38 in.). There are no stairways in the facility with a width that exceeds 2.2 m (87 in.).
Source of Findings:	Photograph: i) Both side handrails are not provided at level 4 & 5.
Suggested Plan of Action:	Provide handrails on both sides of each stairway. Mount the new handrail at 38 in. to match the existing handrails. The spacing between vertical members






	will not exceed 200 mm (8 inch).		
Suggested Deadline Date:	15 Feb 2018		
Standard:	Alliance Standard Part 6 Section 6.9 Stairs and 6.12 Handrails and Guards		
Question:	All occupied roofs are provided with parapets or guards with a minimum height of 1067 mm (42 in.).		
Priority Level:	Medium		
Non-Compliance Level:	1		
Description:	The roof of the Main Production Building is occupiable and it is provided with a parapet of approx. 36 inches in height.		
Source of Findings:	Photograph: i) Parapet height 36 in. less than the minimum required 42 in.		
Suggested Plan of Action:	Provide parapets or guards with a minimum height of 1067 mm (42 in.) for all occupiable roof areas in accordance with Alliance Standard Section 6.12.		
Suggested Deadline Date:	15 Feb 2018		
Standard:	Alliance Standard Part 6 Section 12 Handrails and Guards		
Question:	Stair designation signs are provided at each floor entrance from the stair to the floor in English and Bengali. Signs indicate the name of the stair and the floor level. Signs are posted adjacent to the door.		
Priority Level:	Low		
Non-Compliance Level:	3		
Description:	Stair designation signs have not been provided in accordance with the Alliance Standards.		
Source of Findings:	Visual Assessment: The facility survey.		
Suggested Plan of Action:	Install signage adjacent to each stair door at the entrance from the stair to the floor indicating the stair name and the floor level in both English and Bengali.		
Suggested Deadline Date:	21 Sep 2017		
Standard:	Alliance Standard Part 6 Section 6.9 Stairs		
<b>Fire Safety Programs</b>			
Question:	Are the required number of people trained and certified in fire fighting, first aid, and rescue training by the appropriate authority.		
Priority Level:	High		
Non-Compliance Level:	2		



Description:	There are currently 737 occupants and the total is proposed to be 1,837 in the facility. To date, 120 people have been trained and certified in fire fighting, first aid, and rescue training by the FS&CD.
Source of Findings:	Document Review: The documents provided have been reviewed.
Suggested Plan of Action:	Provide training and certification for the required number of people (18% of total workers) in fire fighting, first aid, and rescue training by an appropriate authority in accordance with the Alliance Safety Training Curriculum.
Suggested Deadline Date:	15 Feb 2018
Standard:	Alliance Standard Part 13 Human Element Programs
Question:	Training programs are implemented and documented in accordance with the Alliance Safety Training Curriculum.
Priority Level:	Medium
Non-Compliance Level:	3
Description:	No documents confirming the implementation and documentation of training programs in accordance with the Alliance safety training curriculum has been found.
Source of Findings:	Document Review: Documents have not been provided.
Suggested Plan of Action:	Implement training programs and document in accordance with the Alliance Safety Training Curriculum.
Suggested Deadline Date:	21 Sep 2017
Standard:	Alliance Standards Part 13
Question:	An emergency evacuation plan has been developed and communicated to all employees.
Priority Level:	Medium
Non-Compliance Level:	2
Description:	A Layout of emergency evacuation plan has been found posted on the interior wall of the factory building, but, it does not show the duties and responsibilities of various people/groups, interfacing between groups and fire brigade, headcount and identification of trapped victims, physically disabled people and their rescue, etc. and all other components required by the Alliance Standards
Source of Findings:	Visual Assessment: The facility survey.
Suggested Plan of Action:	Develop an emergency evacuation plan which includes all components required by the Alliance Standards and communicate the plan to all employees as per Alliance Standard Section 13.1.
Suggested Deadline	15 Sep 2017




Date:		
Standard:	Alliance Standards Part 13 Section 13.1 Fire Safety Director	
Question:	Emergency egress maps are posted at the entrance to each exit stair or main point of egress.	
Priority Level:	Medium	
Non-Compliance Level:	2	
Description:	No emergency egress maps were noticed posted at the entrance to each exit stair or the main point of egress in the enclosed area located in different locations on the floor.	
Source of Findings:	Visual Assessment: The facility survey.	
Suggested Plan of Action:	Create and post emergency egress maps at the entrance to each exit stair or main point of egress as per Alliance Standards Section 13.4.	
Suggested Deadline Date:	15 Sep 2017	
Standard:	Alliance Standards Part 13 Section 13.4 Evacuation Plan	
Question:	Storage areas underneath the cutting tables are clear of combustibles.	
Priority Level:	Medium	
Non-Compliance Level:	2	
Description:	Storage of combustibles materials in the areas underneath the cutting tables was found.	
Source of Findings:	Photograph: The storage of combustibles., Visual Assessment: The facility survey.	
Suggested Plan of Action:	Remove all combustibles stored underneath the cutting tables in accordance with Alliance Standard Section 13.7.2.	
Suggested Deadline Date:	15 Sep 2017	
Standard:	Alliance Standard Part 17 Section 13.7.2 Cutting tables.	
Question:	A Fire Safety Director position has been filled.	
Priority Level:	Low	
Non-Compliance Level:	2	
Description:	The position of a fire safety director has been filled by the factory through the appointment of Md. Masum Ali, Officer (Fire & Safety), on 1st June, 2017 as per documents provided, but his duties and responsibilities as per the Standards Part 13 Section 13.1 Sub Section 13.1.1 are not mentioned in the appointment letter.	



Source of Findings:	Document Review: The documents provided have been reviewed.
Suggested Plan of Action:	Create a Fire Safety Director position and fill the position with an individual that has sufficient training to be able to carry out the required duties in accordance with Alliance Standard Section 13.1. The factory shall issue a supplementary order as regards to his duties and responsibilities to this post as per the Standards.
Suggested Deadline Date:	15 Feb 2018
Standard:	Alliance Standards Part 13 Section 13.1 Fire Safety Director
Question:	Fire Department pre-planning has been completed.
Priority Level:	Low
Non-Compliance Level:	2
Description:	No documents were found with respect to completion of Fire department pre-planning.
Source of Findings:	Document Review: Documents have not been provided.
Suggested Plan of Action:	Complete Fire Department pre-planning activities with the local Fire Service and Civil Defence in accordance with Alliance Standard Section 13.1.1(2).
Suggested Deadline Date:	15 Sep 2017
Standard:	Alliance Standards Part 13 Section 13.1 Fire Safety Director
Question:	A hot-work permit program has been established.
Priority Level:	Low
Non-Compliance Level:	2
Description:	A hot work permit program has been established, but it did not appear that it has been developed in accordance with NFPA 51B.
Source of Findings:	Document Review: The document provided have been reviewed.
Suggested Plan of Action:	Develop a hot work permit program. The program must comply with the requirements of NFPA 51B
Suggested Deadline Date:	15 Feb 2018
Standard:	Alliance Standards Part 13 Section 13.4 Hot Work Permit and NFPA 51B
Question:	Are all applicable permits up to date including Fire License & Boiler License.
Priority Level:	Low



Non-Compliance Level:	2	
Description:	The status of applicable permits reviewed is as follows: 1) Fire License: Expired on June 30 2017. The factory has applied to the FS&CD for renewal of the Fire License for the new fiscal year 2017-2018, and the expected date of issuance of the same is on Aug 10 2017. 2) BERC certificate of waiver: The BERC certificate is not available. The factory has already applied to the BERC authority for issuance of the certificate for 704 KW power generation on April 30 2017. 3) Boiler License: Valid until April 19 2018. 4) Boiler operator certificate: A 2nd class boiler operator certificate has been issued in favor of Md. Shamim Reza on June 17 2015. 5) Trade License: Issued by No. 4, Mouchak Union is valid until June 30 2018. 6) ABC license for the electrician: Class ABC, for Md. Minarul Islam is valid until Sept 17 2017. Class C for Md. Eliash Hosain expired on Mar 09 2017.	
Source of Findings:	Document Review: The documents provided have been reviewed.	
Suggested Plan of Action:	Apply to appropriate authority in an expeditious manner for issuance of all applicable licenses and keep them up to date.	
Suggested Deadline Date:	15 Sep 2017	
Standard:	Alliance Standard Part 13 Human Element Programs	
Question:	Smoking is only allowed at designated areas.	
Priority Level:	Low	
Non-Compliance Level:	1	
Description:	There is no designated area where smoking is allowed, that is prohibited in the factory complex as per "NO SMOKING POLICY", but the "No Smoking" sign in English and Bengali has been noticed posted at one entrance only of the main building, and not at all building entrances.	
Source of Findings:	Photograph: i)The posted "No Smoking" sign., Visual Assessment: The facility survey.	
Suggested Plan of Action:	Smoking is prohibited in garment factory buildings or similar uses. Post "No Smoking" signs in English and Bengali at all building entrances. If the Owner designates a smoking area outside the building, information on the location of these areas shall be posted on the "No Smoking" signs.	
Suggested Deadline Date:	15 Sep 2017	
Standard:	Alliance Standards Part 13 Section 13.5 Smoking	