

DYNAMIC SWEATER INDUSTRIES LIMITED (DHAKA SWEATER) (Extension)

10, Ganda, Savar, Dhaka-1340

(23.827606, 90.261289)

5 February 2024

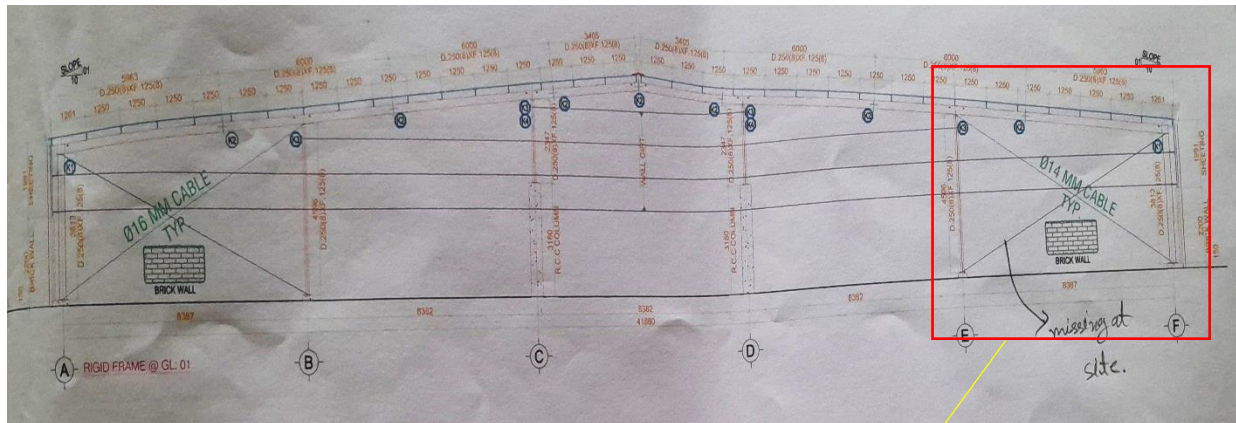
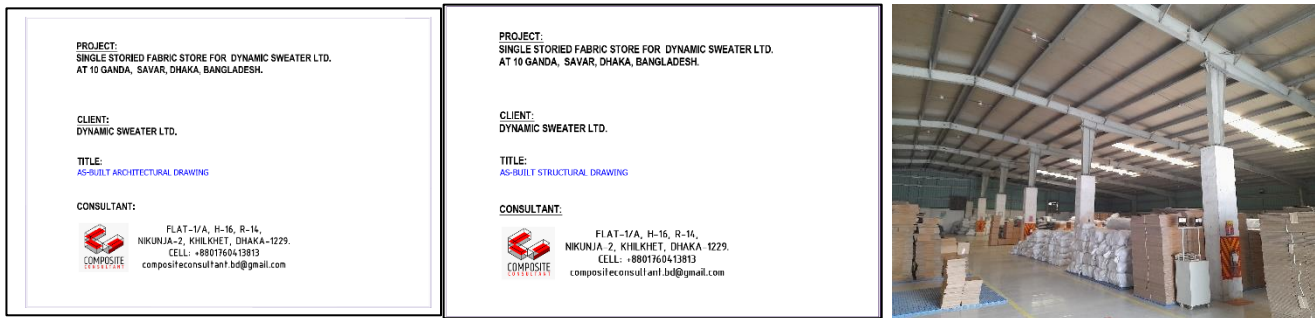


1. Building Information

Finished Goods Warehouse: is a single storied steel shed.

2. Observations

Observation-1: Lack of information in as-built drawing.

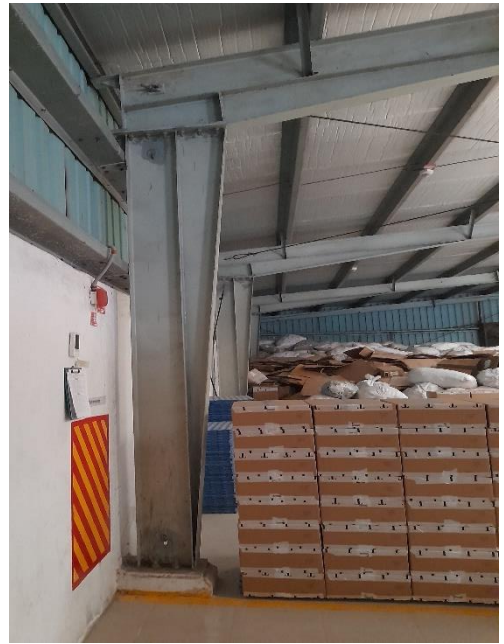


Description: During inspection, only as-built architectural and structural drawings for steel parts were available. The details of the RC columns and sub structures such as pedestal, grade-beam and foundations has not been provided in the drawing.

The vertical cable bracing was not found at site as per provided as-built drawing. The cable bracing was found missing as marked in figure.

Building Engineer is required to survey the whole structure and prepared accurate as-built drawing including the foundation information.

Observation-2: Missing continuous lateral load transfer media.

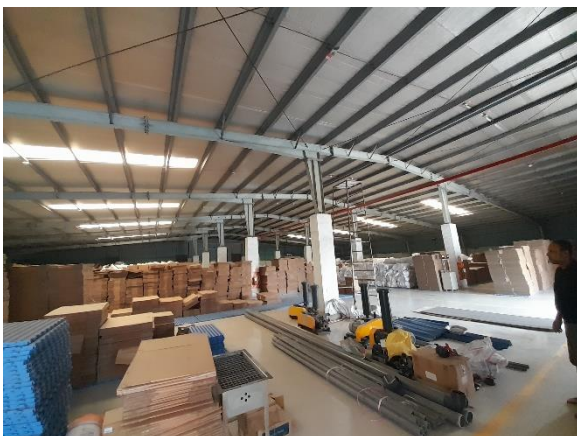


Description: During inspection, Lateral load transfer media (compression strut) along the ridge and eaves were missing. Also, cable bracing at roof and wall seems to be inadequate. The building engineer is required to check the lateral load path and review the stability of the structure accordingly.

Also, the sub-structure information was not available in as-built drawing as well as sub-soil investigation report was not available.

The building engineer is required to prepare a full set of design documents including the adequacy of the RC columns, grade beam and foundation.

Observation-3: Lack of permit drawing.



Description: The structure is a single storied steel shed. The shed is being used for storage purposes. The construction of the shed was started in June-2012 and completed in May-2013. The shed has been occupied since March 2021. During inspection, the building permit drawing from the local authority was not available for the single storied steel shed. The factory is required to collect permission for the shed from local government authority.

Observation-4: Cable bracing found loose.



Description: During inspection, the horizontal and vertical cable bracing was found loose. Factory is required to take necessary measures to tighten the loose bracings.

Observation-5: Non-structural elements not anchored or braced.



Description: Racks are not adequately anchored or braced to resist lateral (earthquake) forces. Building is required to adequately anchor and brace all non-structural elements to resist earthquake forces to comply with the BNBC.

3. Action Plan

Serial No	Observation	Action Plan	Timeline
1	Lack of information in as-built drawing.	The building engineer is required to survey the full structure and produce accurate as-built drawings including the foundation details.	within 6 weeks
2	Missing continuous lateral load transfer media.	The building Engineer is required to confirm the lateral load path & verify the lateral stability of the steel shed.	within 6 weeks
3	Missing continuous lateral load transfer media.	Check the adequacy of RC members and adequacy of foundation.	within 6 weeks
4	Missing continuous lateral load transfer media.	Implement the remediation if required.	within 6 months
5	Lack of permit drawing.	The factory is required to collect the building permit from the local government authority.	within 6 months
6	Cable bracing found loose	The factory is required to tighten the cable bracings.	within 6 weeks
7	Non-structural elements not anchored or braced.	The factory is required to adequately anchor and brace all non-structural elements to resist earthquake forces to comply with the BNBC.	within 6 months

Survey Limitations and Assumptions

This report is for the private and confidential use of RSC for whom it was prepared together with their professional advisors as appropriate. It should not be reproduced in whole or in part or relied upon by third parties for any use without the express written permission of RSC.

This report can be used in discussion with the supplier or factory owner as a means to rectify or address any observations made. The report is not comprehensive and is limited to what could be observed during a visual inspection of the building.

This Report is not intended to be treated as a generalized inspection and does not cover the deterioration of structural members through dampness, fungal or insect attack, nor does it deal with problems and defects of a non-structural nature. Other non-structural aspects of the building such as fire safety have not been assessed in this survey.

Except as otherwise noted, drains and other services were not viewed or tested during our inspection and are therefore similarly excluded from this Report. We have not inspected any parts of the structure which are covered, unexposed or inaccessible and we are therefore unable to report that any such part of the property is free from defect.

External inspection of the façade walls has generally been carried out from ground level only by visual sighting. No opening up works were carried out (except as noted) and we rely on the Architects and Engineers drawings provided to us for our views on concealed parts of the structure and in particular foundations. Strengths of materials and components are untested and we recommend that the factory owners Building Engineer carries out in situ testing over and above those suggested to satisfy themselves with the material strengths and component details.

Recommendations, where given, are for the purpose of providing indicative advice only, are not exhaustive, relate solely to identifying key and obvious structural defects as identified in this presentation, and do not take the form of or constitute a specification for works. We take no responsibility for the works as constructed. This report does not interfere with the factory owners Building Engineers responsibility for the structural performance of this building, The Building Engineer remains fully responsible for the structural adequacy of the building.

This report does not comment in detail on the future seismic performance of the building and only highlights the fact that the building may experience significant damage or collapse in a seismic event along with many others in the Dhaka region.

The observations in this report are based on the Engineering Judgement of the lead surveyor/engineer at the time of the survey. We assume in making these observations that no covering up of faults defects, filling or plastering over cracking or significant repair work has been carried out by the building owner. Any future alteration or additional work by the building owner will void this report.