Proposed restoration interventions for the Port Department building at Marina Wharf in Valletta

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ABSTRACT

The Customs IT Centre has been formerly known as the Department of the Port Superintendent and is just over a hundred and ten years old. This valuable historic building is constructed in globigerina limestone and lower coralline. The lower coralline courses of the structure have suffered relatively little damage. However, the first floor balcony had been reconstructed in reinforced concrete cast on steel joists and was later completely removed because of the severe concrete deterioration and steel corrosion. Parts of the structure are failing and with several cracks in the sea-facing corners, the façade is now falling outwards. The quay is also deteriorating and cracks are evident near the building. As a result, the building’s unity, aesthetics, and structure were badly affected by the cracks and the deterioration of the balcony materials. The aim of this thesis study was to find the best possible interventions for restoring the building. The author discovered, collected, and analysed archived records, drawings, photographs, and documentation on the building and its design architect. The edifice was physically surveyed, photographed, mapped, and closely studied, monitoring its crack behaviour over a one-year period. A three dimensional CAD model of the building was produced. The stone units and cracks on the three façades were digitally mapped into the model.

The results of the crack monitoring, and the surveys of the structural condition of the building when analysed, show that the edifice will be lost if it is not restored. Possible interventions are therefore suggested and the pros and cons of each proposal are analysed. One structural solution is recommended as it is proved more suitable for this particular building. Other, necessary, treatments to the external fabric of the building are also investigated and respective solutions adopted for each case.

The proposed interventions will strengthen and renew as necessary, the building’s damaged structural fabric, reinstate the balcony, consolidate any deteriorating parts where possible, conserve all architectural features, counteract the problem of salts and restore the building to its former glory, thus preserving it for posterity.