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Mr Sadler
c/o Ground Designs
Sedum House
Sandpit Lane
Gimingham
NR11 8HH

BY EMAIL

Dear Mr Sadler

Class Q Conversion of Agriculture Building @ Burnells Farm, East Ruston

Principal Conclusion

THE PRINCIPAL STRUCTURE APPEARS TO BE IN RELATIVELY GOOD CONDITION AND CAN CONTINUE TO PROVIDE THE PRIMARY STRUCTURAL SUPPORT WITHIN THE PROPOSED CONVERSION WITHOUT SUBSTANTIAL REPAIR

Introduction

1. Thank you for your instruction to advise in respect of the proposed Class Q conversion of the single agriculture building at Burnells Farm, East Ruston.
2. I confirm that I visited the property 12th April 2021 to undertake my inspection. This letter report is based upon the visual observations that I was able to make during my inspection.
3. This report has been prepared in support of a Class Q conversion of the existing agriculture building into habitable accommodation.

Observations

1. The existing agriculture building is constructed as a simple steel portal framed structure. It is rectangular in plan with a duo-pitched roof. The portal frames are located at approximately 1/5th points along the length of the building. The ridge line is orientated approximately east to west.
2. The front (south) elevation is open from ground to eaves. The side and rear elevations are constructed as blockwork masonry to 8 courses high, above which is vertically orientated cement fibre corrugated sheeting panels supported by horizontal sheeting rails that span between the portal columns/gable posts. The roof is finished with similar corrugated sheeting spanning between proprietary cold rolled galvanised steel purlins that are supported by the portal frames.

3. The portal frames benefit from diagonal eaves bracing in the plane of the front elevation, with plan diagonal bracing in the plane of the roof.
4. Foundations were not exposed but are assumed to be mass concrete. Geological mapping suggests that the founding soils will be sands and gravels although there is a possibility that Diamicton may be present.
5. Except for the purlins the steel structural elements were originally painted by way of corrosion protection. This paint protection has served a useful purpose insofar that corrosion of the steel structural elements appears to be limited to minor pitting with negligible section loss.
6. There is no obvious evidence of any significant structural distress to the frame, masonry, and cladding. The ridge and eaves lines appear to be reasonably straight and true with no obvious evidence of roof spread or sway distortion. There is no obvious evidence of any significant foundation movement.

Considerations

1. To succeed as a Class Q conversion, it is important that the existing building structure is retained and can continue, without strengthening, to provide primary support to the converted building. Localised repair of defective structural elements might be considered acceptable (to be agreed with the local planning authority).
2. To comply with the Building Regulations, it is envisaged that a conversion would see the introduction of insulation and other wall/ceiling finishes. By inspection, the existing structural elements shall be able to support the associated nominal additional loads without the requirement for strengthening.
3. The front elevation will be closed in however this can be adequately restrained back to the existing portal frames without requirement for strengthening of the steelwork. The wind load attracted by the building will not increase because of the conversion therefore the existing stability systems will not require enhancement.

Conclusion

1. The principal structure appears to be in relatively good condition and can continue to provide the primary structural support within the proposed conversion without substantial repair.

Should you have any queries then please do not hesitate to contact me.

Yours sincerely



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