Tilbury Douglas

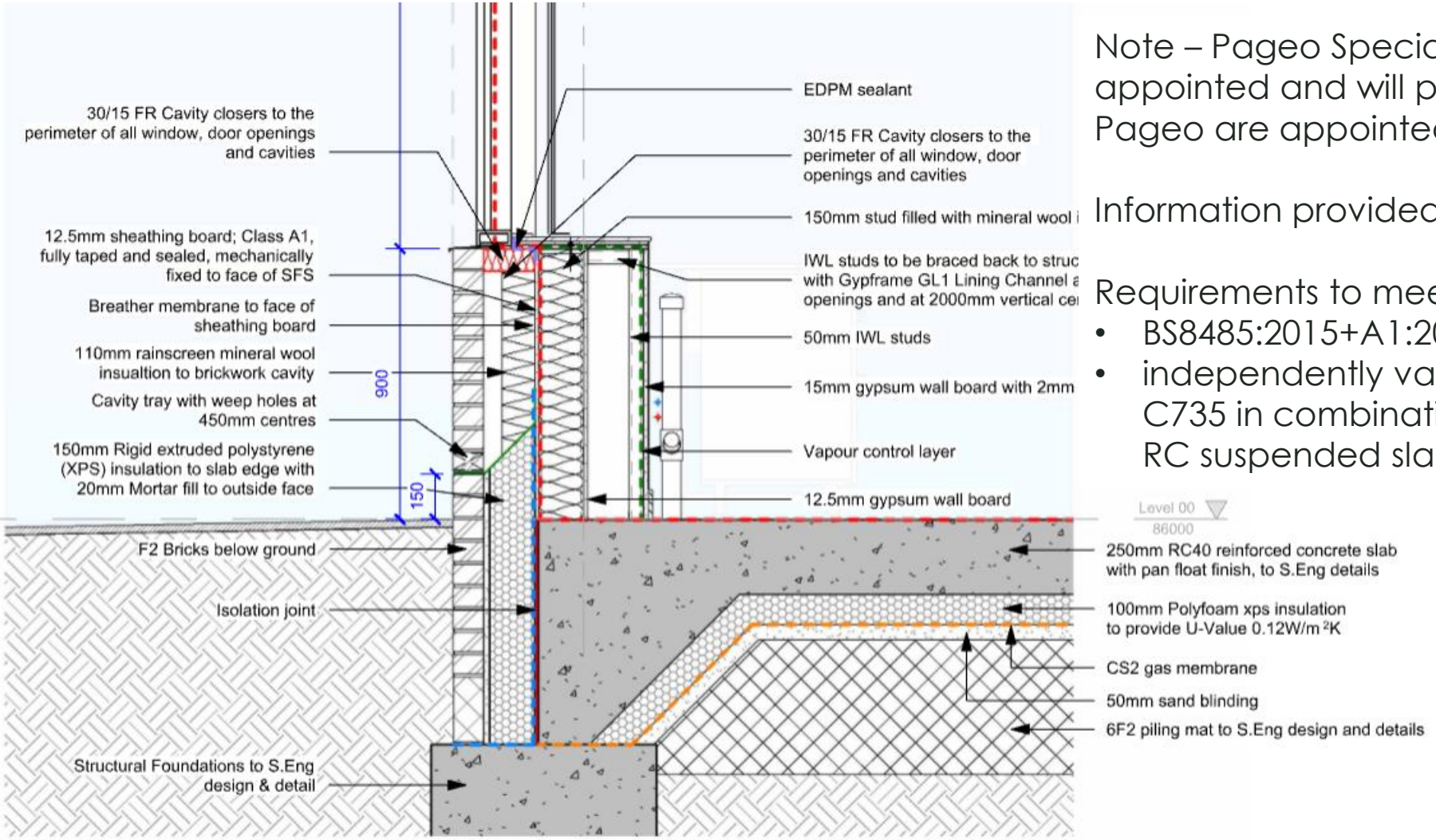
DfE John Flamsteed Community School
Derby

Planning Additional Clarifications
5/11/26

Building a better future **together**

Architect Gas Membrane Details

Tilbury Douglas



Note – Pageo Specialist details will be appointed and will provided in Stage 5 when Pageo are appointed for the works.

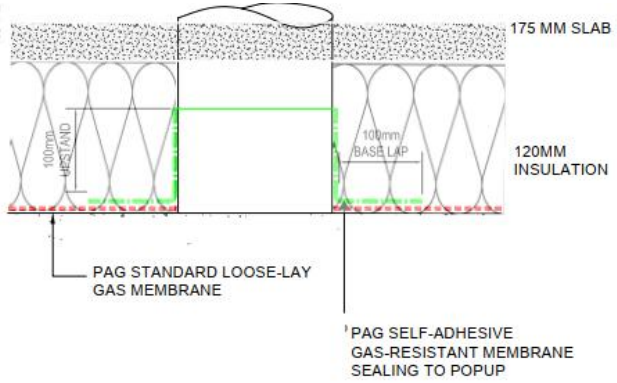
Information provided confirms the following :-

Requirements to meet :-

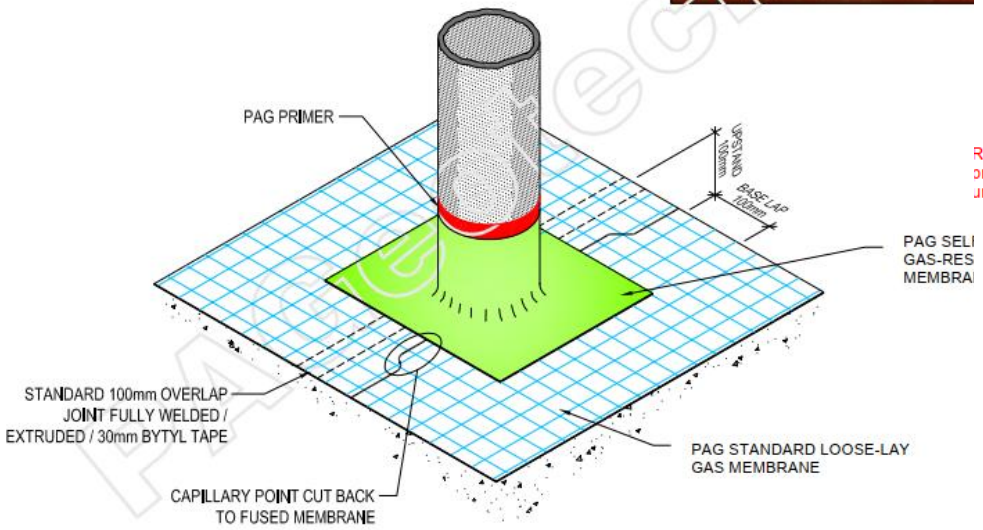
- BS8485:2015+A1:2019
- independently validated in line with CIRIA C735 in combination with the 250mm thick RC suspended slab

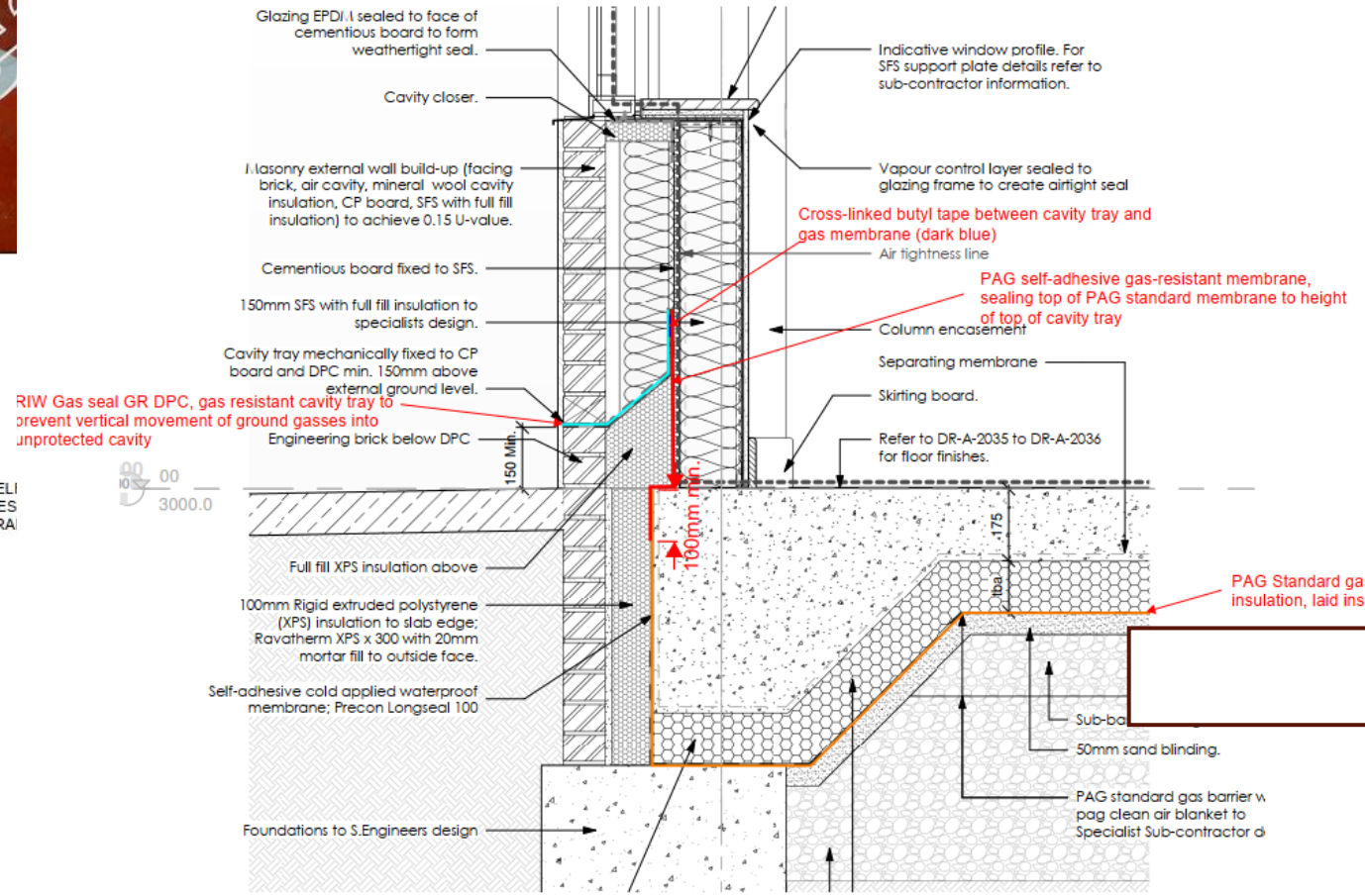
Pageo Gas Membrane Details

Tilbury Douglas



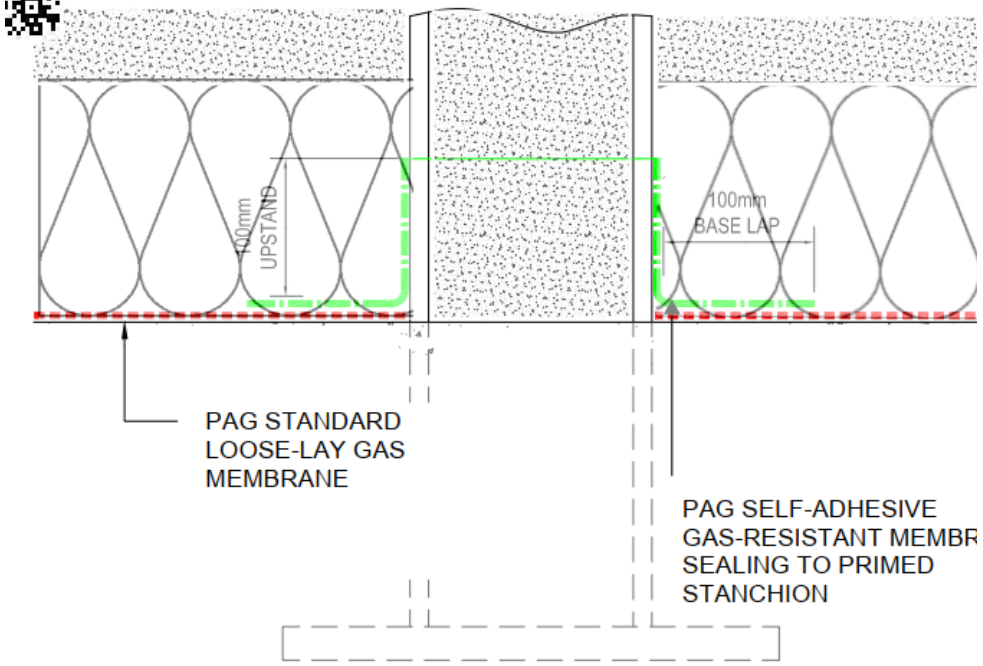




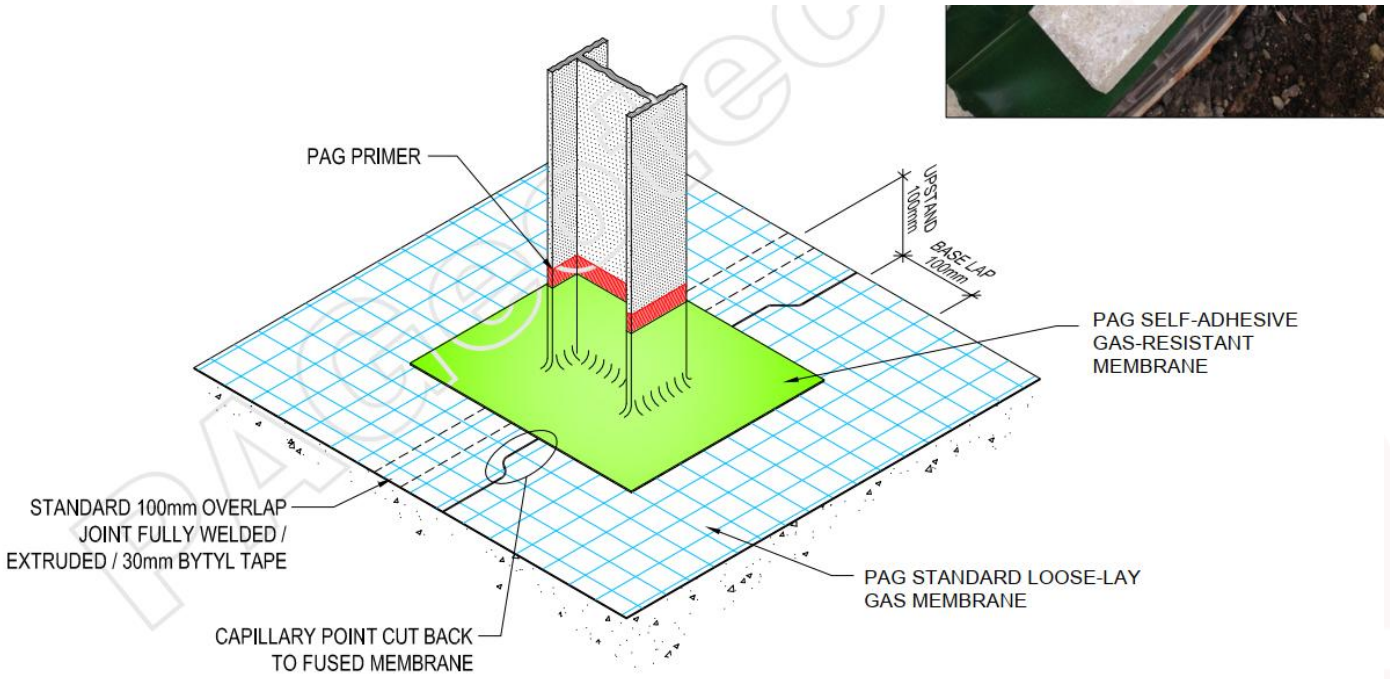


Pageo Gas Membrane Details

Tilbury Douglas



175 MM SLAB



Pageo Gas Membrane Details

Tilbury Douglas





Pageo Specification

- Principal horizontal loose lay membrane - Juta GP1.

- Lift pit – Juta GP Titanbond
- Detailing – PAG Self Adhesive Gas Resistant (SAGR) Membrane

- The gas membrane meets all the physical criteria set out in table 7 of BS8485:2015+A1:2019 and independently validated in line with CIRIA C735 in combination with the 250mm thick RC suspended slab will provide an appropriate level of protection in line with the guidance inBS8485:2015+A1:2019. Neither passive nor active venting will be required.
- Final details to be issued when appointed for the Contract In stage 5.

Third Party Inspection / Validation

Tilbury Douglas

Please find Scope of Works confirmed from our 3rd Party Inspector.

Their Stage 5 Verification Plan will be completed and issued when they are appointed in Stage 5.

We trust this satisfies the comments made on our planning application.

GeoDyne

Geotechnical & Environmental Consultants

Our ref: D46130/CEH

15th October 2026

PAGeoContracting Limited
Darwin House
Corby Gate Business Park
Corby
Northants
NN17 5JG

For the attention of Mr A Wright

Dear Andrew

Re: John Flamsteed Community School, Ripley (PAG Ref: 9702)

Following your recent valued enquiry, we are pleased to provide our proposals to undertake verification of the ground gas protection measures at the above site.

PROJECT UNDERSTANDING

It is understood that it is proposed to construct a new multi-purpose teaching block at the John Flamsteed Community School site.

As you are aware, GeoDyne has been involved with the preparation of the following reports which relate to the site:

- BSP Consulting report '*Phase I Desk Study & CMRA*' prepared for Tilbury Douglas, BIM Ref: SRP1244-BSP-ZZ-XX-T-S-0000_P03, dated 4th August 2026.
- BSP Consulting report '*Phase II Exploratory Investigation & Rotary Drilling report*', prepared for Tilbury Douglas, BIM Ref: SRP1244-BSP-ZZ-XX-T-S-0004_P02, revision P02, dated 4th August 2026.

A programme of ground gas monitoring was undertaken as part of the Phase II works; the ground gas regime was classified as Characteristic Situation CS2 based on BS8485:2015 +A1:2019. It is understood that it is proposed to incorporate ground gas protection measures within the proposed structure, these will incorporate a ground gas resistant membrane which is designed to work in conjunction with the floor slab to mitigate against the risk of ground gases within the structure.

It is understood that the membrane is to be installed by PAGeoContracting Ltd (PAGC). In accordance with the requirements of BS8485, the installed ground gas resistant membrane should be subject to third-party inspection. GeoDyne has been requested to provide a quotation to carry out third-party validation of the membrane.

PROPOSED WORKS

We would propose to inspect the membrane in general accordance with current CIRIA Guidance C735, therefore, we would propose to prepare a Verification Plan in advance of our visits.

Registered Number: 4265419 England & Wales
Registered Office: Clarendon House, Clarendon Park Clumber Avenue, Nottingham NG5 1AH

GeoDyne Limited
9 Brunel Parkway, Pride Park,
Derby, DE24 8HR
Tel: 01332 290798
email: info@geodyne.co.uk

A Verification Plan provides a summary of the ground gas risk assessment for the site and the gas protection system proposals together with our proposals to carry out inspection of the installed gas protection system. A copy of all relevant plans and drawings should be forwarded in due course to enable preparation of the Verification Plan.

Following our inspection of the membrane, it will be necessary to produce a Validation Report, to be submitted to the Local Authority as part of the planning process.

Taking account of the CS2 classification of the site, it is considered that validation of the installed membrane will comprise a visual inspection supplemented by pick testing. Air lancing is considered to not be necessary at this stage, although this may be required dependant on the consistency and quality of the membrane installations.

Our proposals to undertake validation of the gas protection measures at the site are based on our understand on the phased approach of the membrane installation and may be broken down as follows:

- Preparation of a Verification Plan – £500.00.
- Inspection of membrane:
  - Lift pit – attendance to site to carry out a visual inspection, 1 No. Visit @ £600.00/visit.
  - Floor slab across structure – attendance to site to carry out a visual inspection, 3No. visits @ £600.00/visit i.e. £1800.00 (allowing 1No. visit ahead of each floor pour).
  - Perimeter detail – attendance to site to carry out a visual inspection, 2No. visits @ £600/visit i.e. £1200.00. We would request CQA evidence for any areas of the perimeter not available / incomplete at the time of our visits (see below).
  - DPC to perimeter detail – attendance to site to carry out a visual inspection, 1No. visit @ £600.00/visit.
  - Stanchion box out detail – attendance to site to carry out a visual inspection, 1No. visit @ £600.00/visit. We would request CQA evidence for any stanchion seals that are not available / complete at the time of our visit (see below).
- Preparation of a Validation Report following completion of all validation works – £500.00.

On the basis of the foregoing, our fees to undertake validation works would be **£5800.00**. These fees are inclusive of mileage and disbursements but exclusive of VAT.

It should be noted that dependant on the build programme and the timing of the floor pours, it may be necessary to carry out additional visits at the site; these will be charged in accordance with the above rates; similarly, where fewer visits are required our fees would be adjusted accordingly. Any additional site meetings or abortive visits will be charged pro rata to reflect our time at the site.

Our visits during the installation of the membrane will be flexible to suit the programme and we would propose to liaise with the Site Manager and PAGC to agree the most appropriate days to attend site, We would request CQA evidence and photographs from site / PAG for the days we are not in attendance for example where the whole perimeter DPC detailing is not available to inspect in a single visit or where all of the stanchions seals are not available at the time of our visit. The CQA evidence would be incorporated in our Validation Report upon completion of the inspection works.

We would intend to visit the site to carry out our inspection works whilst the membrane installation team are on site. This would enable any repairs to be made by the installers and re-inspected by ourselves at the time of our visit. We would propose to liaise with PAGC to agree the most appropriate days to attend site.

Our lead Inspecting Engineers have a number of years of experience of ground gas protection validation and hold the NVQ Level 4 qualification in '*Verification of Gas Protection Measures*' or the CL:AIRE SGPV accreditation.