|  |
| --- |
| **INAB ACCREDITED BUILDING AIRTIGHTNESS TEST & RESULTS** |
| **Report Number:** | **2766** |
| **Building Name & Address** | **Virginia Civic, Library and Cultural Centre Cavan** |
| **Client Details:** | **Demac Construction** |
| **Test Date:** | **23/01/2023** |
| **Test Time:** | **08:51:00** | **DEAP Value:** |
| **Test Engineer:** | **Brian P Cunningham** | **RESULTS**  |
| **Tester position:** | **Inside** |
| **Building Measurements**  |  |
| **Volume, *V*:** | **0 m³** | **Air changes at 50 Pa, n50 [/h]:** | **0.00** |
| **Envelope Area, *Ae*:** | **1125 m²** | **Air Permeability at 50 Pa, AP50:** | **10.391264m3.h-1.m-2** |
| **Floor Area, *Af*::** | **0 m²** | **Flow per Floor Area at 50 Pa, [m³/h/m²]:** | **11690.17** |
|  | **Air flow at 50 Pa, [h/m²]:** | **11690.17** |
|  | **Correlation Coefficient, r2:** | **0.99928** |
|  | **Slope, n:** | **0.557607557** |
|  | **Air Flow Coefficient, Cenv:** | **1294.45 m3.h-1** |
|  | **Air Leakage Coefficient, CL:** | **1319.66 m3.h-1** |
| **The Building achieved an air permeability of 10.391264 m3.h-1.m-2 This is Less than the specified air permeability of 5 m3.h-1.m-2 at 50 Pa building pressure** |
| **Test Data** | **Depressurized or Pressurized Method 2**  |
| **Start (Pa):** | **1.10** | **1.20** | **1.30** | **Start Inside Temperature** | **10.3°C** | **Start Outside Temperature** | **4.1°C** |
| **Building (Pa)** | **-60.00** | **-55.00** | **-50.00** | **-45.00** | **-40.00** | **-35.00** | **-30.00** | **-25.00** |
| **Flow** | **7893.00** | **8823.00** | **9590.00** | **10423.00** | **11209.00** | **11827.00** | **12297.00** | **13021.00** |
| **Error** | **-0.5** | **0.2** | **-0.3** | **0.4** | **1.0** | **0.4** | **-1.1** | **-0.3** |
| **End (Pa):** |  |  |  | **End Inside Temperature** | **10.3°C** | **End Outside Temperature** | **4.1°C** |
| **Average Barometric Pressure** | **100.1 kPa** | **Wind Speed** | **WindSpeed1** |

|  |  |  |
| --- | --- | --- |
| ***Graph of Building Pressure*** |  | ***Equipment details used in test*** |
|  |  | **Equipment Type** | **Serial No……** | **16/08/2022** |
|  | **#2 Fan:** | **3PH600646** |  |
|  | **Manometer:** |  |  |
|  | **Barometer:** |  |  |
|  | **Thermometer:** |  |  |
| ***Information of building*** |
| **Type of Test:** | **Whole building** |
| **Internal Doors:** | **Open** |
| **External Doors:** | **Closed** |
| **External Windows:** | **Closed** |
| **Trickle Vents:** | **Closed & Sealed** |
| **Ventilation:** | **System 1 - Background ventilators with intermittent extractors** | **Sealed** |
| **Heating:** | **Gas/Oil/Heap Pump** |
| **Deviations from Standard’s Notes:** |
| ***The building has been tested in accordance with the following standards. EN ISO 9972:2015, ATTMA TSL1/TLS2/TSL3 and BCTS Ltd ISO17025 quality management system. Refer to terms and condition for MU. The external envelope was calculated by BCTS from drawings issued by the client.***  |
|
| **Checked by and signed off by:** | **Brian Cunningham:**  | **Director.** | **Date:** |