## 4.5.6. Groove Sealants, Gaskets, Backer Rod and vapour barrier systems

**4.5.6.1.** Use of flammable silicon or fillers or non rated groove sealants, materials in between panel joints is not permitted unless these joint fillers are tested as per **Section 7.1.45** and part of their full wall assembly and were used in achieving "pass criteria" as the Wall Assembly "Large Scale Tests". See **figures 1.19.a and figure 1.19.b.**

**4.5.6.2.** **Vapour Barrier systems (VBS) and membranes** are generally provided to resist water vapour and are often an essential part of the façade system. Vapour barriers, particularly rubber, bituminous based materials, maybe combustible by their nature and may affect the overall performance of the façade system in respect of fire development and spread. Therefore the VBS product should be checked against the MSDS for base content **(See Section 4.5.1.1).** VBS products must be registered and Licensed by the Civil Defence and must achieve EN13501-1 Class A as per **Section 7.1.45.**

**4.5.6.3.** **EPDM products, Rubber sheeting and architectural carpets** are creating new design possibilities as building skins. EPDM rubber (ethylene propylene diene monomer rubber) and similar rubber products must not be used as a full VBS/Façade Liner. However it is acceptable in other discrete locations, such as Curtain Wall Gaskets or window waterproofing provided the fire performance achieves a minimum of EN 13501-1 C, S2,d0., as per **Section 7.1.45.**

**4.5.6.4.** **Artificial turf** has been typically used for sports grounds or indoor solutions, but now this surface covering is being used in the design of indoor and outdoor spaces in horizontal and vertical applications. Where such applications are used as floor coverings they shall be tested to EN 13501 -1 and achieve a minimum of Cfl,S1 where the premises are provided with a sprinkler system or, with the exception of areas being used for Assembly, where the installation is completely out doors. Where the material is being used as an internal wall covering it must comply with **Section 7.1.4.** or when proposed as an External wall covering, it shall comply with the requirements of chapter 1 Section 4, achieve ASTM E84 class A and EN13501-1 Class A2 minimum. The Façade system which the material forms a part must also be tested to NFPA 285 and NFPA 268 ( 'no ignition at 12.5 kw/$m^2$ at 20 minutes)

## 4.5.7. Openings (Window, Doors, Ventilation) Flashing

**4.5.7.1.** Window (opening) flashing where cladding materials intersect shall be of steel formed and fixed mechanically or an appropriate and Civil Defence approved Fire Stopping/safing system fire to completely line windows or openings and overlap onto both exterior and interior surfaces of wall assembly. It must be ensured that any void or cavity between the exterior and interior surfaces of the façade system is protected to prevent fire accessing the space. See **figures 1.19.a and figure 1.19.b.**