## Tender Specification Language Accofoam

## DUCT ACOUSTIC LINING

For internal lining of ducts **for both thermal and acoustic insulation** semi-open thermo-acoustic convoluted elastomeric nitrile rubber foam should be used.

Thermal conductivity of the insulation material shall not exceed 0.038 W/moK or 0.212 BTU / (Hr-ft2-oF/inch) at an average temperature of 30oC. Density of the nitrile rubber shall be 60-80 Kg/m3. The product shall have temperature range of -40 oC to 105oC. The insulation material shall be fire rated for Class 0 as per BS 476 Part 6 : 1989 for fire propagation test and for Class 1 as per BS 476 Part 7, 1987 for surface spread of flame test. Water vapour permeability shall be not less than 0.024 perm inch (2.48 x 10-14 Kg/m.s.Pa i.e.  $\mu$ >7000: Water vapour diffusion resistance).

Thickness of the material shall be 15 mm thick specified for the individual application. The insulation should be installed as per manufacturer's recommendation.

The Sound Absorption Coefficient values (SAC values); tested as per IS:8225/ISO:354/ASTM 423C, should be minimum as per following chart

Freq (Hz)	125	250	500	1000	2000	4000	5000
NRC	0.15	0.05	0.15	0.48	0.68	0.52	0.54