

Abstract

- The present invention relates to a novel reactive resin system for intumescent coating and to a process for producing said resin system. Intumescent coatings are used in particular for fire protection of metallic building components, such as steel girders in building construction. In the event of a fire, said coatings undergo reactive foaming that results in the formation on the metal girder of a fireproof insulating layer having low thermal conductivity and that – through the insulation that this creates – retards any early, thermally induced failure of said building component.
- 10 The present invention relates in particular to methacrylate-based resin systems produced by means of a novel process in which a first monomer fraction is polymerized to a maximum degree of 95% by weight and then diluted with a second monomer mixture. The glass transition temperature of the polymeric component of the composition that is formed is particularly low by comparison with the prior art. In addition, the organic acids incorporated into the resin system have a surprising
- 15 synergistic effect with the filler system. The resin systems thus produced are found to be particularly efficient at thermally induced foaming, by virtue of their fine-pored and closed-pored foam structure.

[No figure]