



## Study on Preparation and Properties of Expansive Fireproof Coatings Containing Different Synergistic Agents

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### Abstract

In this paper, the transition metal oxide ( $\text{Ni}_2\text{O}_3$ ), 4A molecular sieve, sepiolite and montmorillonite were selected as the cooperative agent of the expansive flame retardant system and applied to the fire retardant coating. The study focuses on the influence of four coefficient agents on the fire resistance of the coating. The specific content is to compare the coefficient effect of metal oxide  $\text{Ni}_2\text{O}_3$ , 4 Å molecular sieve, sepiolite and montmorillonite through combustion back temperature test, and study the influence of four coefficient agents on the fire resistance of the coating. Co-effectors can significantly change the pyrolytic carbonization process of the inflatable flame retardant

**Keywords:** Association effect; APP expansion flame retardant; Epoxy coating; refractory

Retracted