Article

Preparation of a Novel Organic Phosphonic Acid Intercalated Phosphate Tailings Based Hydrotalcite and Its Application in Enhancing Fire Safety for Epoxy Resin

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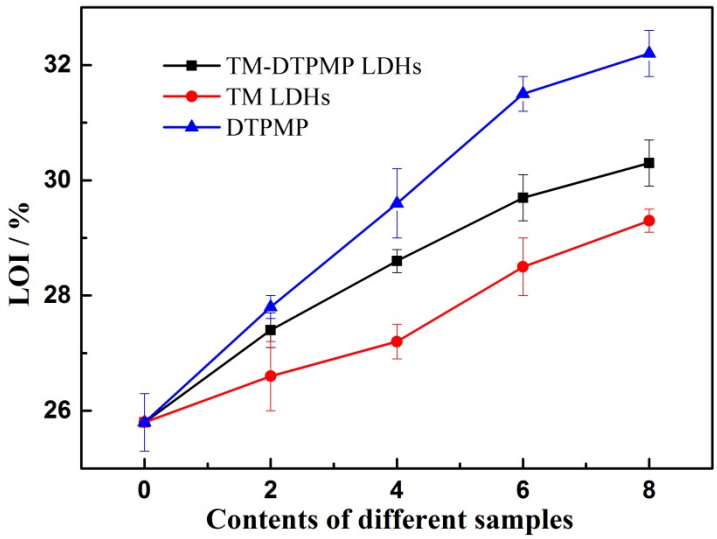

Figure S1. LOI trends curves of TM-DTPMP LDHs/EP, TM LDHs/EP and DTPMP /EP composites.

Table S1. Different FR in Epoxy achieving the same LOI rating

Sample	Adding amount (%)	LOI rating (%)	References
FCIN	9.0	31.0	(6)
FRs-rGO	5.0	29.5	(7)
Cell-P-Fe	10.0	29.1	(8)
TM LDH	9.2	30.1	this work
DTPMP	6.0	31.5	this work
TM-DTPMP LDHs	8.0	30.3	this work

Table S2. Elements content in different solid residue

Sample	O (%)	C (%)	N (%)	P (%)	Ca (%)	Mg (%)	Al (%)
TM LDHs/EP	26.22	59.17	-	-	5.18	5.81	3.62
DTPMP/EP	34.94	57.02	0.82	7.22	-	-	-
TM-DTPMP LDHs/EP	25.01	60.02	0.23	2.51	4.45	4.72	3.06