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(71) Applicant: MOBIL OIL CORPORATION [US/US]; 3225 Gallows Road, Fairfax, VA 22037 (US).			
(72) Inventors: CHESTER, Arthur, Warren; 517 Country Club Drive, Cherry Hill, NJ 08003 (US). FUNG, Shiu, Lun, Anthony; P.O. Box 7338, Wilmington, DE 19803 (US). KRESGE, Charles, Theodore; 600 Thorncroft Drive, West Chester, PA 19380 (US). ROTH, Wieslaw, Jerzy; 123 Bound Brook, Sewell, NJ 08080 (US).			
(74) Agents: ROBERTS, Peter, W. et al.; Mobil Oil Corporation, 3225 Gallows Road, Fairfax, VA 22037 (US).			

(54) Title: **MODIFIED MCM-56, ITS PREPARATION AND USE**

(57) Abstract

A layered composition of matter, MCM-56, has an X-ray diffraction including the lines listed in Table (II) and has been selectively modified so that the ratio of the number of active acid sites at its external surface to the number of internal active acid sites is greater than that of the unmodified material. When used as an additive to a large pore zeolite catalyst in the catalytic cracking of a petroleum feedstock, the modified MCM-56 gives an improved gasoline yield/octane relationship, an improved coke selectivity and a higher combined gasoline and potential alkylate yield than an identical catalyst containing unmodified MCM-56.

TABLE II

Interplanar d-Spacing (Å)	Relative Intensity
12.4 ± 0.2	vs
9.9 ± 0.3	m-s
6.9 ± 0.1	w
6.2 ± 0.1	s
3.55 ± 0.07	m-s
3.42 ± 0.07	vs