

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES

Ex parte WENER M.A. GROOTAERT,
ERIC W. ADAIR, and MIGUEL A. GUERRA

Appeal 2008-0323
Application 11/014,042
Technology Center 1700

Decided: March 10, 2008

Before BRADLEY R. GARRIS, CHUNG K. PAK, and CATHERINE Q.
TIMM, *Administrative Patent Judges*.

GARRIS, *Administrative Patent Judge*.

DECISION ON APPEAL

Appellants appeal under 35 U.S.C. § 134 from the Examiner's decision rejecting claims 1-3 and 32. We have jurisdiction under 35 U.S.C. § 6.

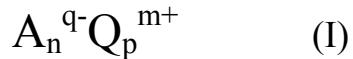
We REVERSE.

Appellants claim a curative composition comprising a cation and an anion having a particular formula (claim 1) which embraces a curative such as tetra-alkylammonium 1,1,1,3,3,3 hexafluoroisopropanoate (claim 3).

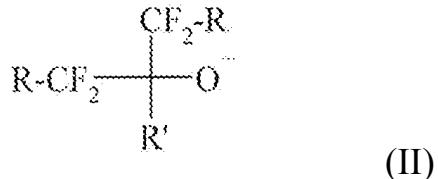
Appellants also claim a method of making the curative of claim 1 (claim 32).

Representative claim 1 reads as follows:

1. A curative composition comprising a cation and an anion of Formula 1:



wherein m, n, p, and q are positive integers, wherein * p= n * q, wherein Q^{m+} is an organo onium, and A^{q-} is an anion, provided that at least one A^{q-} is selected from Formula II:



wherein each R independently is H, halo, alkyl, aryl, aralkyl, or cycloalkyl, and which also may be halogenated, fluorinated, or perfluorinated, wherein two or more of R and R' groups may together form a ring, wherein each R group independently may contain one or more heteroatoms(s), wherein R' can be the same as R, with the proviso that R' cannot be halo.

The references set forth below are relied upon by the Examiner as evidence of obviousness:

Proskow	3,740,369	June 19, 1973
Grootaert	4,882,390	Nov. 21, 1989
Jing	5,654,375	Aug. 5, 1997

All appealed claims are rejected under 35 U.S.C. § 103(a) as being unpatentable over Grootaert in view of Proskow and Jing.

The Examiner finds that Grootaert discloses a vulcanization accelerator (i.e., curative) in the form of an organo-onium compound having a cation and an anion structure (para. bridging cols. 4-5) wherein patentee's organo-onium corresponds to the organo-onium of claim 1 (*id.*) (Ans. 3-4). The Examiner also finds that, while the anion of Grootaert may be an alkoxide (col. 5, ll. 9-11), patentee does "not teach the anion ... to be 1,1,1,3,3,3 hexafluoroisopropanoate" (Ans. 4). In this latter regard, the Examiner additionally finds that Proskow teaches 1,1,1,3,3,3-hexafluoropropanol-2 as a viscosity reducer for a fluoropolymer solution and that Jing discloses using alcohol to form a storable solution of cured accelerators, crosslinking agent and uncured polymer gum (*id.*). Concerning this latter point, the Examiner states that "[h]exafluoroisopropanol is known as an alcohol" (*id.*).

Based on these findings, the Examiner concludes that "it would have been obvious at the time the invention was made to include the anion of hexafluoroisopropanol of Proskow in the cure composition including organo-onium taught by Grootaert ... in order to obtain the aforementioned advantages [i.e., the advantages taught by Proskow and Jing]" (Ans. 4). As further support for this conclusion, the Examiner states that "[t]he alkoxide anion of Grootaert ... is a genus, the anion of hexafluoropropanol which is hexafluoroisopropanoate is species" and that "[o]ne [of] ordinary skill in the art would expect all species [to] work well for the genus, motivated by a reasonable expectation of success" (Ans. 4-5).

The Examiner has failed to establish a *prima facie* case for the above-quoted conclusion of obviousness. As correctly argued by Appellants, the hexafluoropropanol of Proskow does not correspond to the here-claimed anion (Br., filed Feb. 22, 2007, 6). Moreover, we fully share Appellants' view that neither Proskow nor Jing contains any teaching, reason or suggestion of transforming hexafluoropropanol into an anion for use in the organo-onium compounds of Grootaert (*Id.* at 7-8). More specifically, Proskow's teaching of hexafluoroisopropanol as a viscosity depressing compound for a fluoropolymer solution would not have suggested that the anion form of this alcohol would yield effective vulcanization accelerators when combined with Grootaert's organo-onium compounds.

The above discussed deficiency of the Examiner's reasoning is fatal to the rejection as applied against each of the claims on appeal. Therefore, we cannot sustain the § 103 rejection of all appealed claims as being unpatentable over Grootaert in view of Proskow and Jing.

The decision of the Examiner is reversed.

REVERSED

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