

The opinion in support of the decision being entered today was **not** written for publication and is **not** binding precedent of the Board.

Paper No. 22

UNITED STATES PATENT AND TRADEMARK OFFICE

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BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES

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*Ex parte* ROBERT B. BRUCE  
and  
DAVID M. HARRISS

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Appeal No. 2003-0710  
Application No. 09/513,097

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Heard: August 20, 2003

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Before WALTZ, TIMM, and PAWLIKOWSKI, *Administrative Patent Judges*.  
TIMM, *Administrative Patent Judge*.

***DECISION ON APPEAL***

This appeal involves claims 1-10. Claims 11-20, the only other claims pending in the application, stand withdrawn from consideration pursuant to a restriction requirement (Brief, p.

1). We have jurisdiction over the appeal pursuant to 35 U.S.C. § 134.

### ***INTRODUCTION***

Our review is limited to the obviousness of claims 1-10, as the Examiner has withdrawn the provisional rejections previously made under the doctrine of obvious-type double patenting (Answer, p. 3). Claim 1 is illustrative of the subject matter on appeal:

1. A fungus resistant gypsum board, comprising:

a first polymeric fibrous sheet, said first sheet having a first surface and opposite first and second edges;

a second polymeric fibrous sheet, said second sheet having a first surface and opposite first and second edges;

a gypsum core sandwiched between said first and second sheets, said gypsum core containing less than 0.03% by weight, based on the weight of the dry gypsum core, of formulation additives that serve as fungus nutrients; and

a synthetic adhesive on the first and second edges of said second sheet, said synthetic adhesive adhering the first edge of said first sheet to said first edge of said second sheet, and adhering the second edge of said first sheet to the second edge of said second sheet.

As evidence of obviousness, the Examiner relies upon the following prior art references:

White	4,327,146	Apr. 27, 1982
Adler et al. (Adler)	5,702,828	Dec. 30, 1997
Philips et al. (Philips)	5,879,486	Mar. 9, 1999 (filed Jul. 25, 1997)
Randall	5,981,406	Nov. 9, 1999 (filed Jan. 23, 1998)
Bruce et al. (Bruce)(CA)	1 189 434	Jun. 25, 1985

Appellants rely upon the following prior art reference in rebuttal:

Burkard et al. (Burkard)

3,870,538

Mar. 11, 1975

The claims stand rejected under 35 U.S.C. § 103(a) as follows:

1. Claims 1, 2, 6-8, and 10 over White in view of Bruce and Randall;
2. Claims 3-5 over White, Bruce, and Randall and further in view of Adler;
3. Claim 9 over White, Bruce, and Randall and further in view of Philips.

We reverse with respect to all the rejections for the reasons presented by Appellants and those that follow.

### ***OPINION***

All of the claims are directed to a fungus resistant gypsum board having a gypsum core sandwiched between polymeric fibrous sheets adhered with synthetic adhesive (Claims 1 and 6).

The claims additionally require that the core contain low levels of additives that serve as fungus nutrients (Claim 1: less than 0.03 % dry weight; Claim 6: less than 0.02 % wet weight).

According to the specification, “‘fungus nutrients’ means carbohydrate or cellulosic based materials, or other organic materials which are biodegradable by fungi commonly found in building construction materials.” (specification, p. 6, ll. 17-19). The claims, therefore, all require the substantial exclusion of starch, paper fibers and other organic nutrient materials in the core.

The rejection is based upon the use of the core formulation of White with the polymeric spunbonded sheet facing taught by Bruce. The Examiner finds that “White teaches away from

using starch, a carbohydrate, in the gypsum core and does not use any other material in the gypsum core that can be considered ‘fungus nutrients.’” (Answer, p. 4). This finding is unsupported by the record before us.

The portion of White cited by the Examiner does not support the Examiner’s finding that White discloses formulating a core containing no starch (Answer, p. 7). The portion relied upon, i.e., column 4, lines 12-17, states only that “the invention can be practiced using a core formulation containing no additive such as starch *for aiding the paper to core bonding properties.*” (emphasis added). This statement follows a disclosure of a formulation which specifies the use of “only that amount of starch which is present in the set accelerator used” and which specifies a level of 2 lbs. of starch per thousand sq. ft. of ½" gypsum board. White, thus, does not contemplate eliminating all starch for all uses from the core.

Moreover, Appellants argue that the level of set accelerating starch disclosed by White, i.e., 2 lbs per thousand sq. ft. of ½" board, equates to 0.121 wt% of the core weight (Brief, p. 6). This level is outside that allowed by the claims and the Examiner does not throw doubt upon the Appellants’ determination.

We also cannot agree that there is a sufficient basis for the finding that White “does not use any other material in the gypsum core that can be considered ‘fungus nutrients.’” (Answer, p. 4). Contrary to the position of the Examiner, it cannot be assumed here that silence in the broad disclosure of White equals absence of the ingredients at issue (Answer, p. 9). The broad disclosure of White focuses on the identity of the defoamer and provides little guidance as to the

other additives present in the core formulation. The tenor of the examples indicates that the formulation is a standard foamed settable gypsum aqueous slurry (White, col. 3, ll. 5-24). The examples further indicate that, at the very least, starch was included in such standard formulations as a set accelerator in amounts above the claimed range (White, col. 3, ll. 19-25). White refers to Burkard for a description of the starch-based set accelerator used therein (White, col. 3, ll. 21-23). As pointed out by Appellants, Burkard indicates that, not only do standard formulations contain starch set accelerator, they contain paper pulp (Burkard, col. 2, ll. 5-20 and 46-50). Appellants further point out that both Bruce and Randall describe including starch and paper fibers in standard core formulations (Brief, p. 6; see Bruce, p. 7, l. 18 and Randall, col. 8, ll. 18-21). The evidence as a whole does not support the contention that White describes the omission of starch and paper fiber from the core formulation.

Adler and Philips, as applied by the Examiner, fail to remedy the deficiencies of the primary rejection.

We conclude that a *prima facie* case of obviousness has not been established with respect to the subject matter of claims 1-10. We, therefore, need not address the evidence of secondary considerations advanced by Appellants.

### ***CONCLUSION***

To summarize, the decision of the Examiner to reject claims 1-10 under 35 U.S.C. § 103(a) is reversed.

REVERSED

THOMAS A. WALTZ  
Administrative Patent Judge

CATHERINE TIMM  
Administrative Patent Judge

BEVERLY A. PAWLIKOWSKI  
Administrative Patent Judge

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