

Keywords: claim construction; accused device; 35 U.S.C. § 112, paragraph six; means-plus-function

General: This decision on claim interpretation implies a connection between proper claim construction and devices accused of infringement. The case also sets forth the latest on when claim limitations should be construed under 35 U.S.C. § 112, paragraph six, absent the use of explicit “means-plus-function” language.

Massachusetts Institute of Technology v. Abacus Software

No. 05-1142 (Fed. Cir. 2006),

available at <http://www.fedcir.gov/opinions/05-1142.pdf>

Decided September 13, 2006

I. Facts

MIT is the assignee of U.S. Patent No. 4,500,919 (the “’919 patent”), which discloses a color processing system for producing copies of color originals. The invention set forth by the ’919 patent performs three basic steps: (a) scanning a color image, (b) displaying and interactively editing the scanned image, and (c) accurately reproducing the displayed image. Accordingly, claim 1 of the ’919 patent recites:

1. A system for reproducing a color original in a medium using a selected multiplicity of reproduction colorants, the system comprising in serial order:
 - a. a scanner for producing from said original a set of three tristimulus appearance signals dependent on the colors in said original;
 - b. display means connected to the scanner for receiving the appearance signals and aesthetic correction circuitry for interactively introducing aesthetically desired alterations into said appearance signals to produce modified appearance signals; and
 - c. colorant selection mechanisms for receiving said modified appearance signals and for selecting corresponding reproduction signals representing values of said reproducing colorants to produce in said medium a colorimetrically-match reproduction.

The district court held that the term “scanner” is not a mean-plus-function limitation and that it includes two limitations. First, the district court held that the scanner must have “relative movement between the scanning element and the object being scanned,” and second, the “color original” that the scanner scans must be “placed on or in close proximity to the scanner.”

The district court held that the terms “colorant selection mechanism” and “aesthetic correction circuitry” are means-plus-function limitations. The functions of the “colorant selection mechanism” were held to be performed by an ink correction module (ICM) and the functions of the “aesthetic correction circuitry” were held to be performed by a color transition module (CTM).

II. Issues

1. Did the district court properly construe the claim term “scanner”?
2. Did the district court properly construe the claim term “colorant selection mechanism”?
3. Did the district court properly construe the claim term “aesthetic correction circuitry”?

III. Discussion

1. Yes. The district court properly held that the scanner must have “relative movement between the scanning element and the object being scanned.” The specification only discloses a drum scanner that rotates a two dimensional original image past a scanning element. Thus, the only scanner disclosed in the specification requires “relative movement between the scanning

element and the object being scanned.” Additionally, dictionary definitions of “scan” and “scanner” at the time the application was filed in 1982 confirm that these terms require relative movement between a scanning element and an object being scanned. For example, a 1968 version of *Webster’s Dictionary* defines “scan” as “to cause a narrow beam of light to . . . traverse (an object) in order to translate light modulations into corresponding electrical current.” Additionally, a person of ordinary skill in 1982 would not interpret the term differently. For example, while flying-spot scanners were known and the mechanical components of flying-spot scanners may remain fixed during operation, such scanners operate by sweeping a beam of light across an object and the light beam qualifies as the scanning element. Further, although a camera may achieve the same result as a scanner, dictionary definitions and evidence of ordinary skill in the art in 1982 confirm that a “scanner” required relative movement between a scanning element and an object being scanned.

The district court properly held that the “color original” that the scanner scans must be “placed on or in close proximity to the scanner.” The only scanner disclosed in the specification requires this limitation. However, the claim is not limited to the disclosed embodiments and the district court turned to dictionary definitions. The pertinent dictionaries did not provide any assistance. Accordingly, the district court looked to the meaning the term had in the relevant art at the time the patent issued by looking at other sources. In view of these other sources, the district court concluded that in 1982 a person of ordinary skill in the art would have known of two general types of scanners (i.e., drum scanners and flatbed scanners). Both of these known scanners require close proximity between the original and the scanner. Thus, the district court properly construed the term “scanner.”

2. Yes. The district court properly held that the phrase “colorant selection mechanism” was a means plus function limitation under § 112, ¶ 6. While it is presumptively not subject to § 112, ¶ 6 because it does not contain the term “means,” the presumption is overcome because the claim term fails to recite sufficiently definite structure. Here, the patentee used “mechanism” and “means” as synonyms. Indeed, at least one dictionary definition equates mechanism with means. Additionally, the language “colorant selection,” which modifies the term “mechanism” is insufficient to avoid § 112, ¶ 6. It has previously been held that language that further defines a generic term can avoid § 112, ¶ 6. However, the term “colorant selection” is distinguished from such language because it is not defined in the specification, it has no dictionary definition, and there is no suggestion that it has a generally understood meaning in the art.

3. No. The district court improperly held that the phrase “aesthetic correction circuitry” was a means plus function limitation under § 112, ¶ 6. The circumstances must be unusual to overcome the presumption that applies when the term “means” does not appear in the claim. In contrast to the term “mechanism,” dictionary definitions establish that the term “circuit,” by itself, connotes structure. The term “circuit,” combined with a description of the function of the circuit generally connotes sufficient structure to one of ordinary skill in the art.

The term “circuitry” in claim 1 is limited to hardware. The parties agree that the CTM is the “aesthetic correction circuitry” of the ‘919 patent. Although the specification suggests that certain computations by the CTM can be accomplished with either software or hardware, this does not alter the specification’s repeated description of the circuit itself as involving hardware. Dictionary definitions of “circuit” in 1982 support this interpretation.