

UNITED STATES PATENT AND TRADEMARK OFFICE

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BEFORE THE PATENT TRIAL AND APPEAL BOARD

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BROAD OCEAN TECHNOLOGIES, LLC,  
Petitioner,

v.

NIDEC MOTOR CORPORATION,  
Patent Owner.

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Case IPR2015-01617  
Patent 7,990,092 B2

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Before BENJAMIN D. M. WOOD, JAMES A. TARTAL, and  
PATRICK M. BOUCHER, *Administrative Patent Judges*.

BOUCHER, *Administrative Patent Judge*.

DECISION  
Denying Request for Rehearing  
*37 C.F.R. § 42.71(d)*

On January 6, 2016, we instituted *inter partes* review of claims 7–13 of U.S. Patent No. 7,990,092 B2 (“the ’092 patent”) and denied institution with respect to claims 1–6. Paper 10 (“Dec.”). On January 20, 2016,

Petitioner filed a Request for Rehearing, contending that “the Board abused its discretion in declining to institute an *inter partes* review of method claims 1-6 based on Beifus [i.e., US 2007/0205732] under §102(b).” Paper 12 (“Req. Reh’g”), 1. Pursuant to our authorization, Patent Owner filed an Opposition to the Request for Rehearing on February 16, 2016 (Paper 14, “Opp.”), and Petitioner filed a Reply on February 29, 2016 (Paper 15).

On rehearing, the burden of showing that the Decision should be modified lies with Petitioner, the party challenging the Decision. 37 C.F.R. § 42.71(d). “The request must specifically identify all matters the party believes the Board misapprehended or overlooked, and the place where each matter was previously addressed in a motion, an opposition, or a reply.” *Id.*

For purposes of its Request for Rehearing, Petitioner does not contest the preliminary claim-construction determinations adopted in the Decision, and does not contest the Board’s preliminary observations regarding the disclosure of Beifus. Req. Reh’g 1. In relevant part, such preliminary determinations and observations include the following.

1. A “motor having multiple torque settings,” recited in the preamble of independent claim 1, means a “motor that receives multiple discrete pre-set torque demand values,” which may be expressed with units that include inch-pounds or percentages of a maximum torque rating or operating torque value. Dec. 8.

2. An “adjustment factor,” recited in the body of independent claim 1, is “a quantity that defines a quantitative relationship between a maximum rated torque value and an adjusted maximum torque value.” *Id.* at 9.

3. The phrase “proportionally reduced torque settings,” recited in the body of independent claim 1, means “multiple torque settings that have been reduced by the same relative amount.” *Id.* at 12.

4. Beifus discloses a “motor having multiple torque settings,” with “[t]he four curves for each ‘option’ in Figure 6 [of Beifus] provid[ing] multiple discrete pre-set torque demand values for the motor, i.e., at what appear to be 25%, 50%, 75%, and 100% torque demand.” *Id.* at 16.

5. Beifus discloses selection of an “adjustment factor to obtain an adjusted maximum torque value that is less than the maximum rated torque value.” *Id.*

Petitioner’s disagreement with the Institution Decision lies with our additional observation that “Beifus does not disclose ‘adjusting *all* the torque settings of the motor with the adjustment factor to obtain proportionally reduced torque settings[,]’ . . . as recited in [] claim [1].” *Id.* (citing Paper 9, 27) (emphasis in Institution Decision). Because we found Petitioner did not sufficiently demonstrate that element of independent claim 1 was disclosed by Beifus, we concluded that Petitioner had not demonstrated a reasonable likelihood of prevailing on its anticipation challenge of claims 1–6 over Beifus. *Id.* at 16–17.

Figure 6 of Beifus is reproduced below.

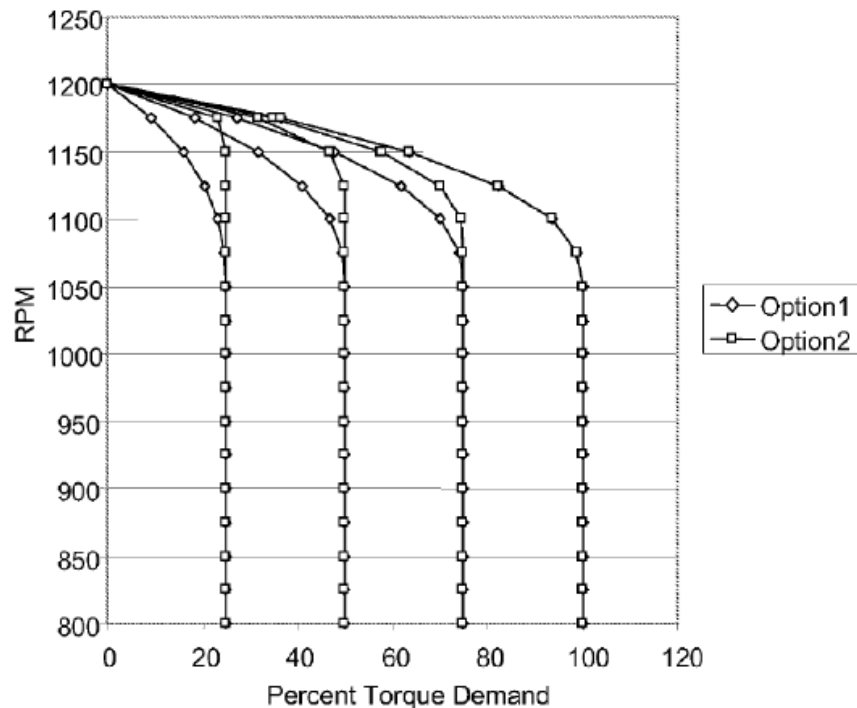


Figure 6 illustrates “key characteristic points” (depicted with diamonds and squares) of an induction-motor speed-torque curve that may be stored within the memory of an electrically commutated motor (“ECM”) circuit, including breakdown speed, no-load or synchronous speed, and a “shape description number” used in calculating new torque demands. Ex. 1007 ¶ 36. The drawing illustrates scaling of the torque by a factor less than one between a breakdown speed of 1050 RPM and a no-load speed of 1200 RPM, with no scaling at speeds less than the breakdown speed. *Id.* That is, when Beifus adjusts torque settings at any particular operating speed that is between the breakdown speed and the no-load speed, the same adjustment factor is applied; consequently, torque settings of the motor are adjusted “with the adjustment factor to obtain proportionally reduced torque settings,” as recited in independent claim 1.

Petitioner contends that this focus on a particular operating speed is sufficient to demonstrate a reasonable likelihood of prevailing on its anticipation challenge of claims 1–6 over Beifus. Specifically, Petitioner contends that independent claim 1 “does not recite any speed or range of speeds at which the motor must be operating when performing the steps of the recited method.” Req. Reh’g 5. And Petitioner draws our attention to the Federal Circuit’s pronouncement that “‘a prior art product that sometimes, but not always, embodies a claimed method nonetheless teaches that aspect of the invention.’” *Id.* at 2 (quoting *Hewlett-Packard Co. v. Mustek, Inc.*, 340 F.3d 1314, 1326 (Fed. Cir. 2003)). Petitioner asserts that

the “adjusting all [the] torque setting[s] of the motor with the adjustment factor to obtain proportionally reduced torque settings” limitation is satisfied by Beifus when the motor is operated between the breakdown speed . . . and the no-load speed . . . , and is not satisfied when the motor is operated at a speed lower than the breakdown speed.

*Id.* at 8. Petitioner reasons that “[t]his undisputed disclosure in Beifus is sufficient, under the controlling Federal Circuit precedent, to anticipate claims 1-6 of the [’]092 patent.” *Id.*

Patent Owner counters that Petitioner’s “heavy reliance” on *Hewlett-Packard* is misplaced because “[p]art time’ anticipation is only possible if the claims do not impose restrictions.” Opp. 2–3, 7. We agree with Patent Owner that the principle discussed by the Federal Circuit in *Hewlett-Packard* is inapplicable because the claim itself imposes a specific restriction that “*all* the torque settings of the motor” (emphasis added) are

adjusted with the adjustment factor. Each of the “key characteristic points” shown in Figure 6 of Beifus is a “torque setting” because it defines a discrete preset torque demand value. See Dec. 7–8. Not “all” the torque settings of the motor are adjusted with the adjustment factor because those at a speed less than the breakdown speed (1050 RPM) are not adjusted.

Petitioner’s focus on a particular operating speed in its Request for Rehearing represents a shift in position from that taken in its Petition. In its Petition, Petitioner argued that “Beifus discloses that *multiple torque values* represented in *each* of these curves (based on an induction motor’s characteristic points) is stored within a memory of an ECM control circuit.” Paper 6, 27 (emphases added). In finding that Beifus discloses a “motor having multiple torque settings,” we credited the implicit argument that the “motor” of Beifus includes the memory of the ECM control circuit. See Dec. 16. Critically, Petitioner’s original argument identifies *each* of the “key characteristic points” in Figure 6 as a “torque value.” See also Paper 6, 27 (“*Each* of the curves for Option 1 and Option 2 *represent a plurality of torque values* that may be stored within a memory of an ECM control circuit” (emphases added)). Thus, according to Petitioner’s original argument, each of these “key characteristic points,” including those at different operating speeds, is a “torque setting” of the Beifus “motor” by virtue of inclusion of the memory of the ECM control circuit. Because not “*all* the torque settings of the motor” (emphasis added) are adjusted with the adjustment factor, Petitioner has not demonstrated a reasonable likelihood of prevailing on its challenge of claims 1–6 as anticipated by Beifus.

IPR2015-01617  
Patent 7,990,092 B2

We conclude that Petitioner has not identified adequately any matter that we misapprehended or overlooked.

In consideration of the foregoing, it is hereby:

ORDERED that Petitioner's Request for Rehearing is *denied*.

PETITIONER:

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