

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

CISCO SYSTEMS, INC.,
Petitioner,

v.

WSOU INVESTMENTS, LLC
d/b/a BRAZOS LICENSING AND DEVELOPMENT,
Patent Owner.

IPR2021-00961
Patent 9,357,014 B2

Before THU A. DANG, ROBERT J. WEINSCHENK, and
JOHN A. HUDALLA, *Administrative Patent Judges*.

WEINSCHENK, *Administrative Patent Judge*.

DECISION
Denying Institution of *Inter Partes* Review
35 U.S.C. § 314

I. INTRODUCTION

A. Background and Summary

Cisco Systems, Inc. (“Petitioner”) filed a Petition (Paper 2, “Pet.”) requesting an *inter partes* review of claims 1–19 (“the challenged claims”) of U.S. Patent No. 9,357,014 B2 (Ex. 1001, “the ’014 patent”). WSOU Investments, LLC d/b/a Brazos Licensing and Development (“Patent Owner”) filed a Preliminary Response (Paper 6, “Prelim. Resp.”) to the Petition. With our authorization, Petitioner filed a Reply (Paper 7) to the Preliminary Response, and Patent Owner filed a Sur-reply¹ (Paper 9) to the Reply.

An *inter partes* review may not be instituted unless “the information presented in the petition . . . and any response . . . shows that there is a reasonable likelihood that the petitioner would prevail with respect to at least 1 of the claims challenged in the petition.” 35 U.S.C. § 314(a). We determine that Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that at least one of the challenged claims of the ’014 patent is unpatentable. Accordingly, the Petition is denied, and no trial is instituted.

B. Real Parties in Interest

The parties identify themselves as the only real parties in interest. Pet. 62; Paper 3, 1.

¹ We authorized Patent Owner to file a corrected Sur-reply (Paper 9) to replace its original Sur-reply (Paper 8).

C. Related Matters

The parties indicate that the '014 patent is the subject of the following district court case: *WSOU Investments, LLC v. Cisco Systems, Inc.*, No. 6:21-cv-00128 (W.D. Tex.). Pet. 62; Paper 3, 2.

D. The '014 Patent

The '014 patent relates to “communication networks and, more specifically but not exclusively, to connections in communication networks.” Ex. 1001, 1:5–7. The '014 patent states that “[n]etworking connections are currently identified by Internet Protocol (IP) address and port number.” *Id.* at 1:11–12. According to the '014 patent, “[w]ith the advent of mobility, and now cloud-based computing, the IP address of a host of a networking connection may change.” *Id.* at 1:12–14. As a result, “in order to maintain the networking connection and hide the change from the application, either the IP address is forced to remain the same while rerouting packets or the networking connection is closed and a new networking connection is opened.” *Id.* at 1:14–19.

To address this alleged deficiency, the '014 patent describes a “service-based networking capability” that “replaces traditional networking connections between endpoints with service connections between endpoints.” *Id.* at 2:23–26. “The service connection between endpoints may be provided above the transport layer and below the application layer.” *Id.* at 2:29–31. “In general, use of a service connection between endpoints may provide various advantages over use of traditional transport layer connections between endpoints, such as obviating the need for applications or services to have knowledge of the underlying communication network

[and] . . . handling IP address changes . . . in a manner transparent to the application or service client.” *Id.* at 2:37–67.

E. Illustrative Claim

Of the challenged claims, claims 1, 18, and 19 are independent. Claim 1 is reproduced below.

1. An apparatus, comprising:

a processor and a memory communicatively connected to the processor, the processor configured to run a connected services stack, the connected services stack comprising a connected services layer configured to operate below an application layer and above a transport layer, wherein the connected services layer is configured to support establishment of a service connection between the connected services layer and a remote connected services layer of a remote endpoint, wherein the connected services layer is configured to support establishment of the service connection based on a service name of the connected services layer, a service name of the remote connected services layer, and a service connection identifier for the service connection, wherein the connected services layer is configured to:

send, toward a server, a service connection request message comprising the service name of the connected services layer and the service name of the remote connected services layer of the remote endpoint; and

receive, from the server, a service connection response message comprising the service name of the remote connected services layer of the remote endpoint, an Internet Protocol (IP) address of the remote endpoint, and the service connection identifier for the service connection.

Ex. 1001, 14:28–53.

F. Evidence

Petitioner submits the following evidence:

Evidence	Exhibit No.
Declaration of Nader F. Mir, Ph.D. (“Mir Declaration”)	1003
Traversat, US 8,359,397 B2, issued Jan. 22, 2013 (“Traversat”)	1005
Guo, US 2005/0015427 A1, published Jan. 20, 2005 (“Guo”)	1006

G. Asserted Grounds

Petitioner asserts that the challenged claims are unpatentable on the following grounds:

Claim(s) Challenged	35 U.S.C. §	Reference(s)/Basis
1–11, 18, 19	103	Traversat
12–17	103	Traversat, Guo

II. ANALYSIS

A. Level of Ordinary Skill in the Art

Petitioner argues that a person of ordinary skill in the art would have had “a bachelor’s degree in electrical engineering, computer engineering, or equivalent training, and approximately two years of professional experience in the field of communication networks,” as well as “a working knowledge of the communication network art that is pertinent to the ’014 patent.” Pet. 8 (citing Ex. 1003 ¶ 20). Petitioner’s description of the level of ordinary skill in the art is supported by the testimony of Petitioner’s declarant, Dr. Nader Mir. Ex. 1003 ¶ 20. Patent Owner does not propose a description of the level of ordinary skill in the art or dispute Petitioner’s description. Prelim. Resp. 12. We adopt Petitioner’s description for purposes of this Decision.

B. Claim Construction

In an *inter partes* review proceeding, a claim of a patent is construed using the same standard used in a civil action under 35 U.S.C. § 282(b),

including construing the claim in accordance with the ordinary and customary meaning of the claim as understood by one of ordinary skill in the art and the prosecution history pertaining to the patent. 37 C.F.R.

§ 42.100(b). Neither party proposes an express construction for any claim terms. Pet. 8; Prelim. Resp. 13. Nonetheless, we determine that it is necessary to address the claim limitations below for purposes of this Decision.

Claims 1, 18, and 19 recite “wherein the connected services layer is configured to support *establishment of the service connection based on a service name of the connected services layer, a service name of the remote connected services layer*, and a service connection identifier for the service connection.” Ex. 1001, 14:37–42, 16:38–43, 16:65–17:3 (emphasis added). Claims 1, 18, and 19 also recite “wherein the connected services layer is configured to: send, toward a server, *a service connection request message comprising the service name of the connected services layer and the service name of the remote connected services layer* of the remote endpoint.” *Id.* at 14:42–47, 16:43–48, 17:3–8 (emphasis added). Because the former limitation refers to “*a service name*” and the latter limitation refers to “*the service name*,” those limitations together require a service connection request message that includes the *same* “service name of the remote connected services layer” that is used to establish the service connection. *Id.* at 14:37–47, 16:38–48, 16:65–17:8 (emphasis added); *see Tech. Consumer Prods., Inc. v. Lighting Sci. Grp. Corp.*, 955 F.3d 16, 22 (Fed. Cir. 2020) (“No other heat sink is specified in the claim. Consequently, ‘the heat sink’ that is used in the calculation of the height-to-diameter ratio is the same heat sink that is annularly coupled to the heat spreader.”).

C. Obviousness of Claims 1–11, 18, and 19 over Traversat

Petitioner argues that claims 1–11, 18, and 19 would have been obvious over Traversat. Pet. 10–40. For the reasons discussed below, Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that claims 1–11, 18, and 19 would have been obvious over Traversat.

1. Independent Claim 1

Claim 1 recites “wherein the connected services layer is configured to support *establishment of the service connection based on* a service name of the connected services layer, *a service name of the remote connected services layer*, and a service connection identifier for the service connection.” Ex. 1001, 14:37–42 (emphasis added). Claim 1 also recites “wherein the connected services layer is configured to: send, toward a server, *a service connection request message comprising* the service name of the connected services layer and *the service name of the remote connected services layer* of the remote endpoint.” *Id.* at 14:42–47 (emphasis added).

With respect to the claimed “service name of the remote connected services layer,” Petitioner argues that Traversat teaches “a peer-to-peer platform” where the “peers are identified by a ‘unique identifier (UUID)’ (a peer identifier) *or* by a ‘unique string as a name.’” Pet. 12, 17 (citing Ex. 1005, code (57), 17:14–15, 17:21–22, 19:59–61, 35:50–54) (emphasis added). Petitioner contends that based on the description of a service name in the ’014 patent, “either of” Traversat’s peer identifier or its peer name “is the claimed service name.” *Id.* at 17–18 (citing Ex. 1001, 6:22–26; Ex. 1003 ¶ 86) (emphasis omitted).

With respect to the claimed “establishment of the service connection,” Petitioner argues that Traversat teaches establishing a pipe between an originating peer and an endpoint peer. Pet. 15, 18 (citing Ex. 1005, 9:39–48, 20:10–15, 38:13–15). Petitioner contends that “[t]he pipe identifier of the pipe (*service connection identifier for the service connection*) and the peer identifiers of the originating peer (*service name of the connected services layer*) and the endpoint peer (*service name of the remote connected services layer*) are thus used to establish the pipe between the core layer 120 of each peer.” *Id.* at 18–19 (citing Ex. 1003 ¶¶ 90–91; Ex. 1005, 20:10–15, 20:22–35). Thus, Petitioner relies on the *peer identifier* of the endpoint peer as being the service name of the remote connected services layer used to establish the service connection. *Id.*; Ex. 1003 ¶ 90.

With respect to the claimed “service connection request message,” Petitioner argues that Traversat teaches a discovery query message. Pet. 19–20 (citing Ex. 1005, 16:59–66, Fig. 15). Petitioner contends that “[t]he discovery query message requests the discovery of a specific endpoint peer and identifies it by name (*service name of the remote connected services layer of the remote endpoint*).” *Id.* at 20 (citing Ex. 1003 ¶ 96; Ex. 1005, 52:12–22, 52:33–35). Thus, Petitioner relies on the *peer name* of the endpoint peer as being the service name of the remote connected services layer that is included in the service connection request message. *Id.*; Ex. 1003 ¶ 96.

Patent Owner responds that Petitioner does not show sufficiently that Traversat teaches a service connection request message comprising the service name of the remote connected services layer. Prelim. Resp. 17–18. Patent Owner contends that Traversat teaches that “using the peer discovery

protocol, a requesting peer, after receiving any and all reachable advertisements, may look for, and find a specific ‘named peer’ within those returned advertisements.” *Id.* at 18. But, according to Patent Owner, Traversat “does not require or guarantee that ‘the service name of the remote connected services layer of the remote endpoint’ is included in Traversat’s discovery query message.” *Id.* at 17–18.

We agree that Petitioner does not show sufficiently that Traversat’s discovery query message includes the service name of the remote connected services layer, but for a different reason than the one articulated by Patent Owner. As discussed above, claim 1 requires a service connection request message that includes the *same* “service name of the remote connected services layer” that is used to establish the service connection. *See* Section II.B. On this record, Petitioner does not show sufficiently that Traversat’s discovery query message includes the *same* service name of the remote connected services layer that is used to establish the service connection.

As discussed above, Petitioner argues that Traversat teaches a discovery query message that includes the *peer name* of the endpoint peer. Pet. 20; Ex. 1003 ¶ 96. On the other hand, Petitioner argues that Traversat teaches establishing a service connection based on the *peer identifier* of the endpoint peer. Pet. 18–19; Ex. 1003 ¶ 90. Petitioner, though, does not identify evidence indicating that the peer name and the peer identifier of the endpoint peer are the same.² *See* Pet. 17–22; Ex. 1003 ¶¶ 82–100.

² Petitioner appears to acknowledge that Traversat’s peer name and peer identifier are different. Pet. 17 (“[P]eers are identified by a ‘unique identifier (UUID)’ (a peer identifier) *or* by a ‘unique string as a name. . . . A peer UUID *or* unique name is contained in a peer advertisement.”) (emphasis added).

In fact, the portions of Traversat cited by Petitioner indicate that the peer name is different than the peer identifier. Pet. 17 (citing Ex. 1005, 17:14–15, 17:21–22, 19:59–61, 35:50–54), 21 (citing Ex. 1005, 35:50–36:15). Specifically, Traversat teaches that “[a] peer advertisement may . . . hold specific information about the peer, such as its *name*, *peer identifier*, registered services and available endpoints.” Ex. 1005, 35:50–54 (emphasis added). And Traversat provides the following “example of one embodiment of a peer advertisement” in Extensible Markup Language. *Id.* at 35:56–58.

```
<?xml version="1.0" encoding="UTF-8"?>
<PeerAdvertisement>
  <Name> name of the peer </Name>
  <Keywords>search keywords </Keywords>
  <Pid> Peer identifier </Pid>
  <Services>
    <Service advertisement>
      ....
    </Service advertisement>
  </Services>
  <Endpoints>
    <endpoint advertisement>
      ....
    </endpoint advertisement>
  </Endpoint>
  <InitialApp>
    <Service advertisement>
      ....
    </Service advertisement>
  </InitialApp>
</PeerAdvertisement>
```

Id. at 35:54–36:15 (emphasis added). The above example shows that the peer advertisement includes separate fields for the peer name and the peer identifier. *Id.* Further, the portions of Traversat cited by Petitioner consistently describe the peer name and the peer identifier separately.

Compare id. at 17:14–15 (“unique identifier (UUID)”), 19:52–55 (“peer group universal unique identifier (UUID)”), 36:26 (“Peer identifier”), *with id.* at 17:21–22 (“name”), 19:52–55 (“name”), 36:19–22 (“Name”).

Thus, on this record, Petitioner does not show sufficiently that the peer name and the peer identifier of Traversat’s endpoint peer are the same. And, as a result, Petitioner also does not show sufficiently that Traversat teaches a service connection request message that includes the *same* service name of the remote connected services layer that is used to establish the service connection. For that reason, Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that claim 1 would have been obvious over Traversat.

2. Independent Claims 18 and 19

Claims 18 and 19 recite limitations similar to those discussed above for claim 1. Ex. 1001, 16:38–48, 16:65–17:8. Petitioner asserts that claims 18 and 19 would have been obvious over Traversat based on the same arguments and evidence discussed above for claim 1. Pet. 40. Thus, for the same reasons discussed above, Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that claims 18 and 19 would have been obvious over Traversat.

3. Dependent Claims 2–11

Claims 2–11 depend, directly or indirectly, from claim 1. Petitioner’s arguments and evidence regarding these dependent claims do not compensate for the deficiencies discussed above for claim 1. *See* Pet. 24–40. Thus, for the same reasons discussed above, Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that claims 2–11 would have been obvious over Traversat.

4. *Summary*

For the foregoing reasons, Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that claims 1–11, 18, and 19 would have been obvious over Traversat.

D. Other Asserted Grounds

Petitioner argues that claims 12–17 would have been obvious over Traversat and Guo. Pet. 40–56. Petitioner’s arguments and evidence regarding this asserted ground do not compensate for the deficiencies discussed above for the asserted ground based on Traversat alone. *See id.* Thus, for the same reasons discussed above, Petitioner does not demonstrate a reasonable likelihood of prevailing on this asserted ground.

III. CONCLUSION

Petitioner does not demonstrate a reasonable likelihood of prevailing in showing that at least one of the challenged claims of the ’014 patent is unpatentable.

IV. ORDER

It is hereby

ORDERED that the Petition is denied, and no trial is instituted.

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