

Microsoft Corp. & Apple Inc.
Petitioners

v.

Proxense, LLC
Patent Owner

IPR2024-00573 and IPR2024-01398

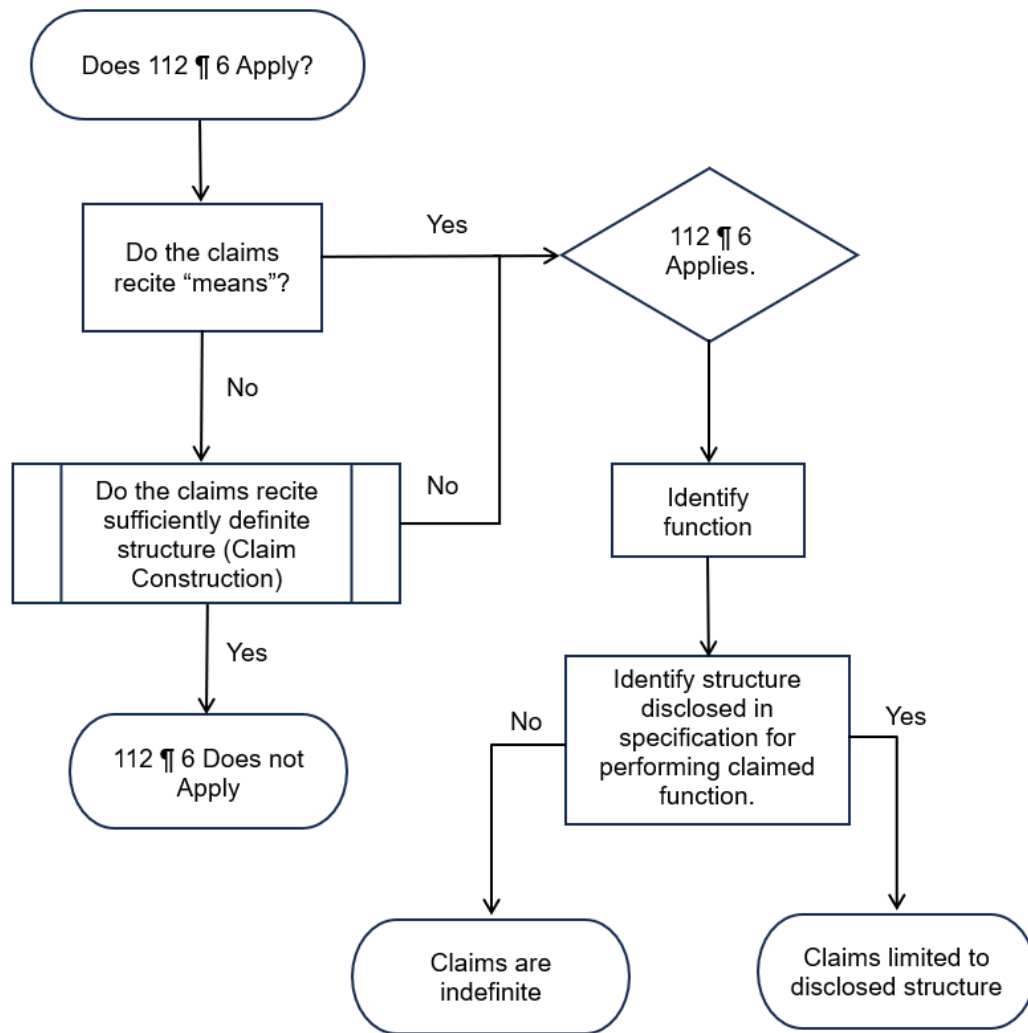
PROXENSE

Roadmap

- The Petition fails as a matter of law.
- The Petition asks the Board to overrule the District Court's construction.

IPR2024-00573 and IPR2024-01398

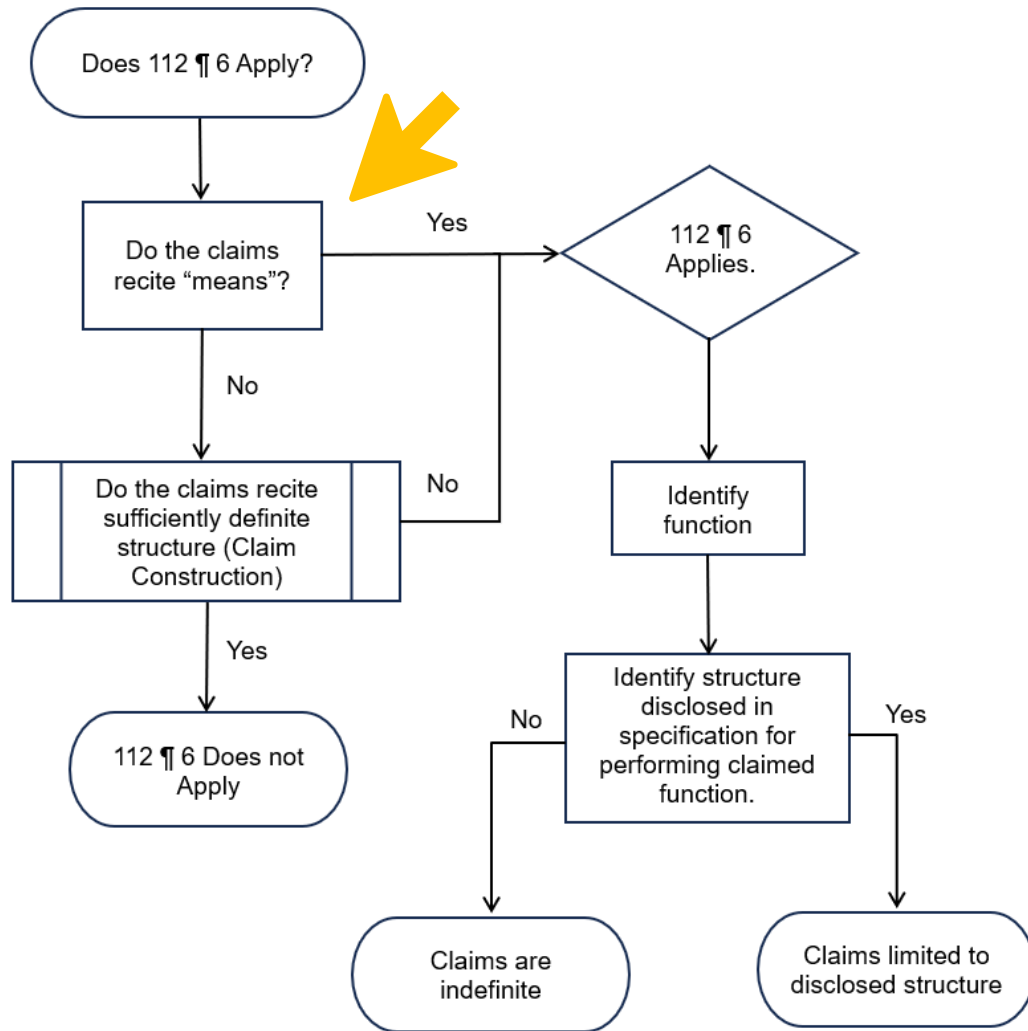
Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



"To determine whether § 112 ¶ 6 applies to a claim limitation, we must inquire whether the words of the claim are understood by persons of ordinary skill in the art to have a sufficiently definite meaning as the name for structure. If those words lack a sufficiently definite meaning, § 112 ¶ 6 applies. If the limitation uses the word 'means,' there is a rebuttable presumption that § 112 ¶ 6 applies. If not, there is a rebuttable presumption that the provision does not apply. But that presumption can be overcome and § 112 para. 6 will apply if the challenger demonstrates that the claim term fails to recite sufficiently definite structure or else recites function without reciting sufficient structure for performing that function."

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1005 (Fed. Cir. 2021)
(citing *Williamson v. Citrix, LLC*, 792 F.3d 1339 (Fed. Cir. 2015))

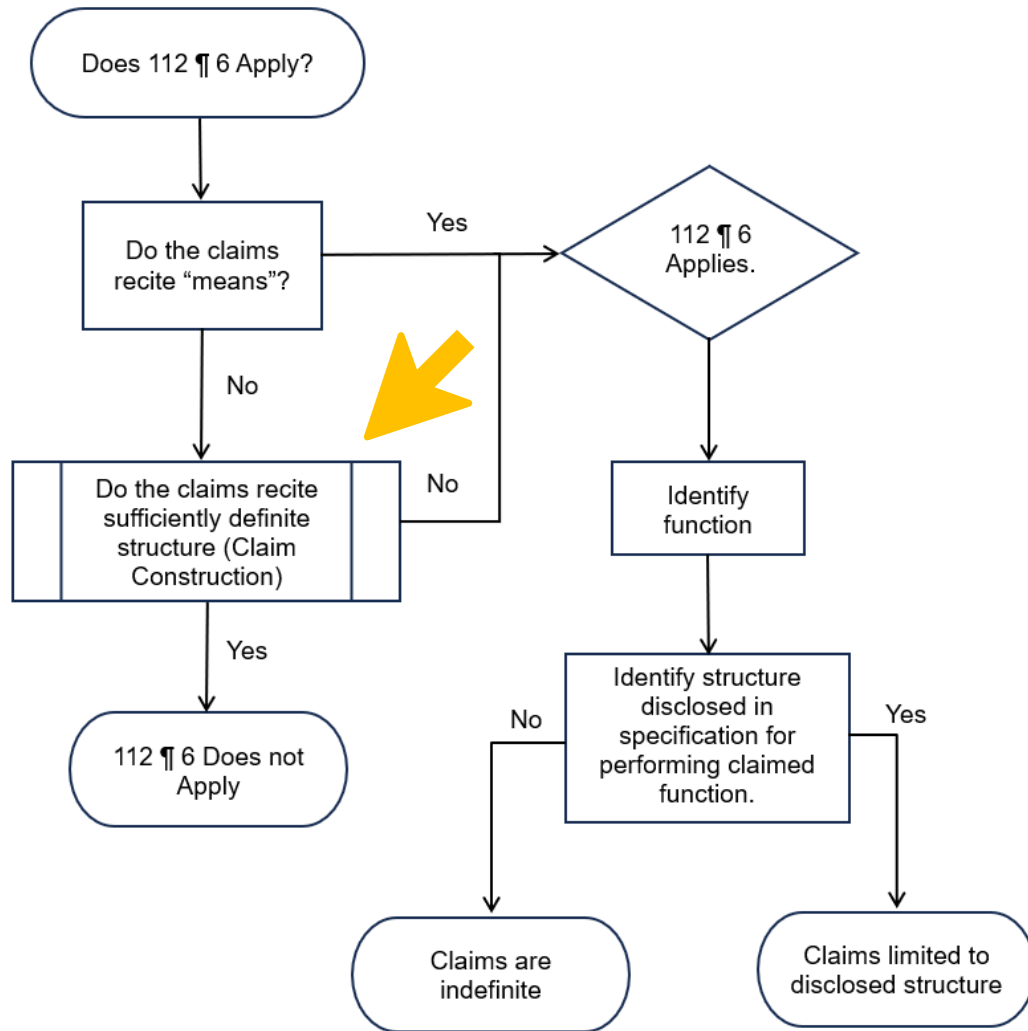
Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



To determine whether § 112 ¶ 6 applies to a claim limitation, we must inquire whether the words of the claim are understood by persons of ordinary skill in the art to have a sufficiently definite meaning as the name for structure. If those words lack a sufficiently definite meaning, § 112 ¶ 6 applies. ***If the limitation uses the word ‘means,’ there is a rebuttable presumption that § 112 ¶ 6 applies.*** If not, there is a rebuttable presumption that the provision does not apply. But that presumption can be overcome and § 112 para. 6 will apply if the challenger demonstrates that the claim term fails to recite sufficiently definite structure or else recites function without reciting sufficient structure for performing that function.

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1005 (Fed. Cir. 2021) (citing *Williamson v. Citrix, LLC*, 792 F.3d 1339 (Fed. Cir. 2015))

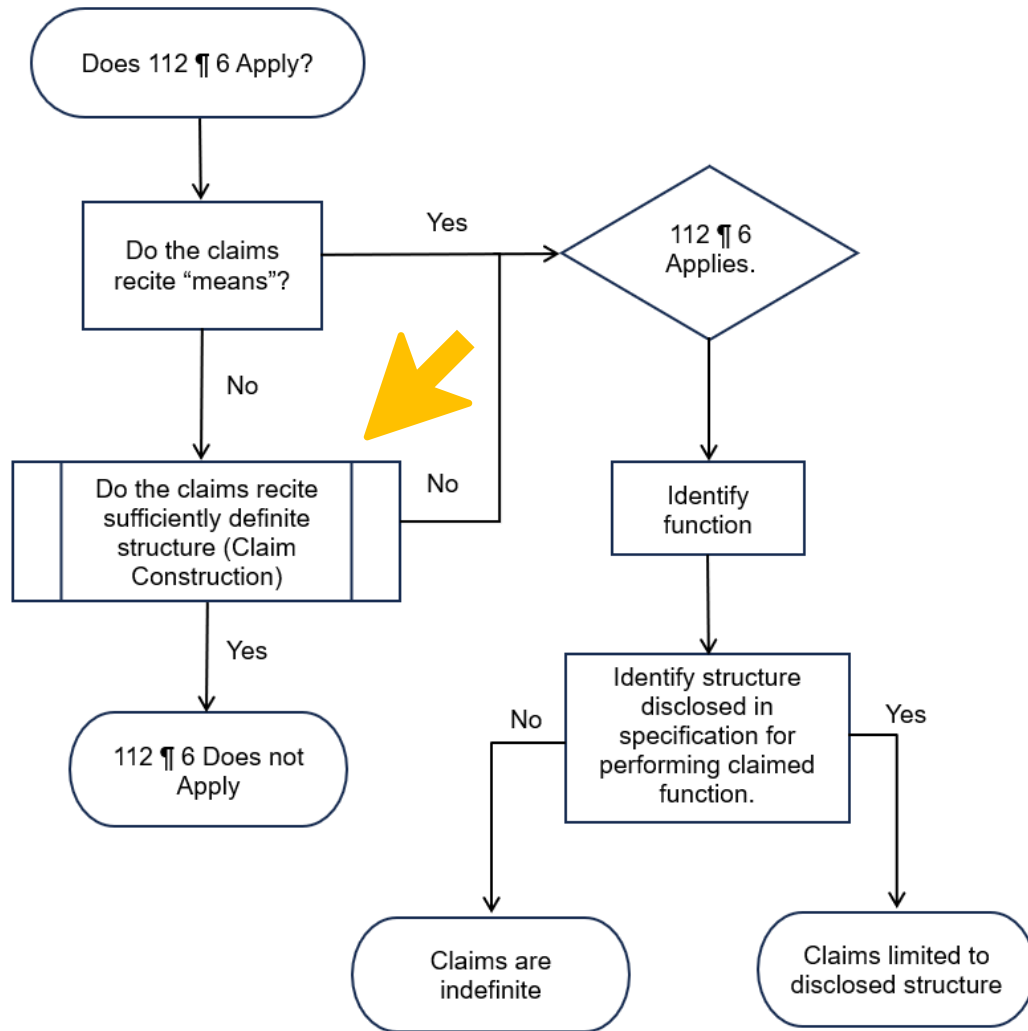
Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



To determine whether § 112 ¶ 6 applies to a claim limitation, we must inquire whether the words of the claim are understood by persons of ordinary skill in the art to have a sufficiently definite meaning as the name for structure. If those words lack a sufficiently definite meaning, § 112 ¶ 6 applies. If the limitation uses the word 'means,' there is a rebuttable presumption that § 112 ¶ 6 applies. If not, there is a rebuttable presumption that the provision does not apply. But that presumption can be overcome and **§ 112 para. 6 will apply if the challenger demonstrates that the claim term fails to recite sufficiently definite structure or else recites function without reciting sufficient structure for performing that function.**

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1005 (Fed. Cir. 2021) (citing *Williamson v. Citrix, LLC*, 792 F.3d 1339 (Fed. Cir. 2015))

Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



Nonce is Not Determinative

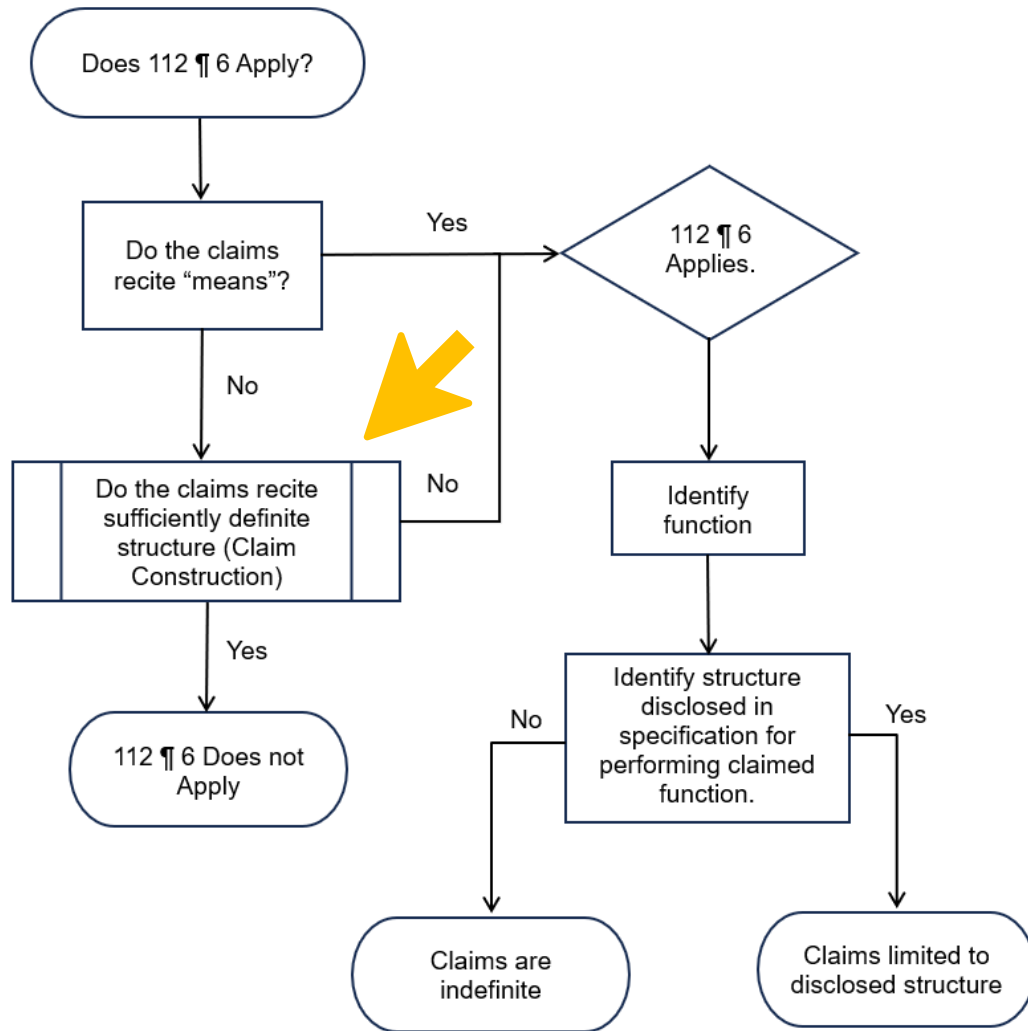
“One way to demonstrate that a claim limitation fails to recite sufficiently definite structure is to show that, although not employing the word ‘means,’ the claim limitation uses a similar “nonce word that can operate as a substitute for ‘means’ in the context of § 112, para. 6

....

In addition, even if the claims recite a nonce term followed by functional language, other language in the claim ‘might inform the structural character of the limitation-in-question or otherwise impart structure’ to the claim term.”

MTD Products Inc. v. Iancu, 933 F.3d 1336, 1341-1342 (Fed. Cir. 2019)

Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



Claim Construction is Determinative

"The 'essential inquiry is not merely the presence or absence of the word means but whether the words of the claim are understood by persons of ordinary skill in the art to have a sufficiently definite meaning as the name for structure..."

*"In each case, a critical question is whether 'the claim **term** is used in common parlance or by persons of skill in the pertinent art to **designate structure, including either a particular structure or a class of structures**'"*

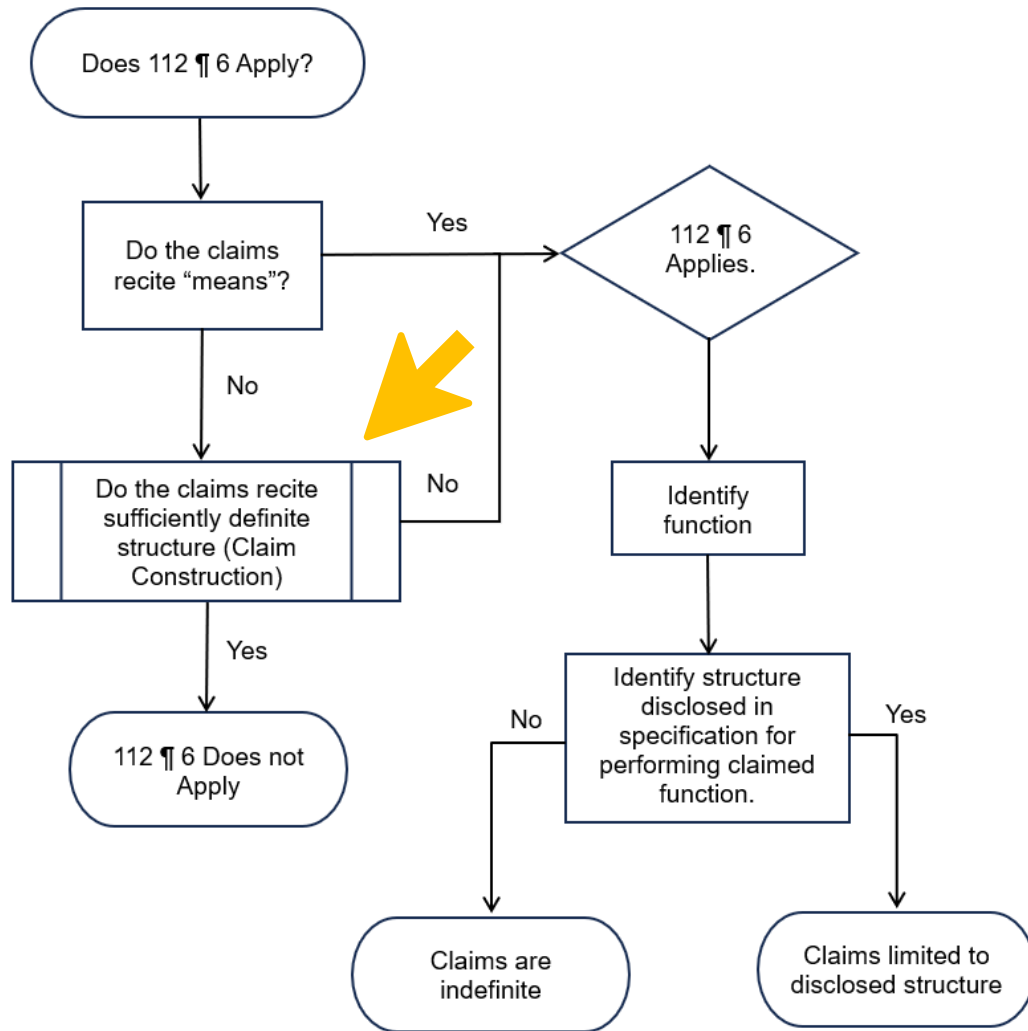
MTD Products Inc. v. Iancu, 933 F.3d 1336, 1341 (Fed. Cir. 2019)

Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6

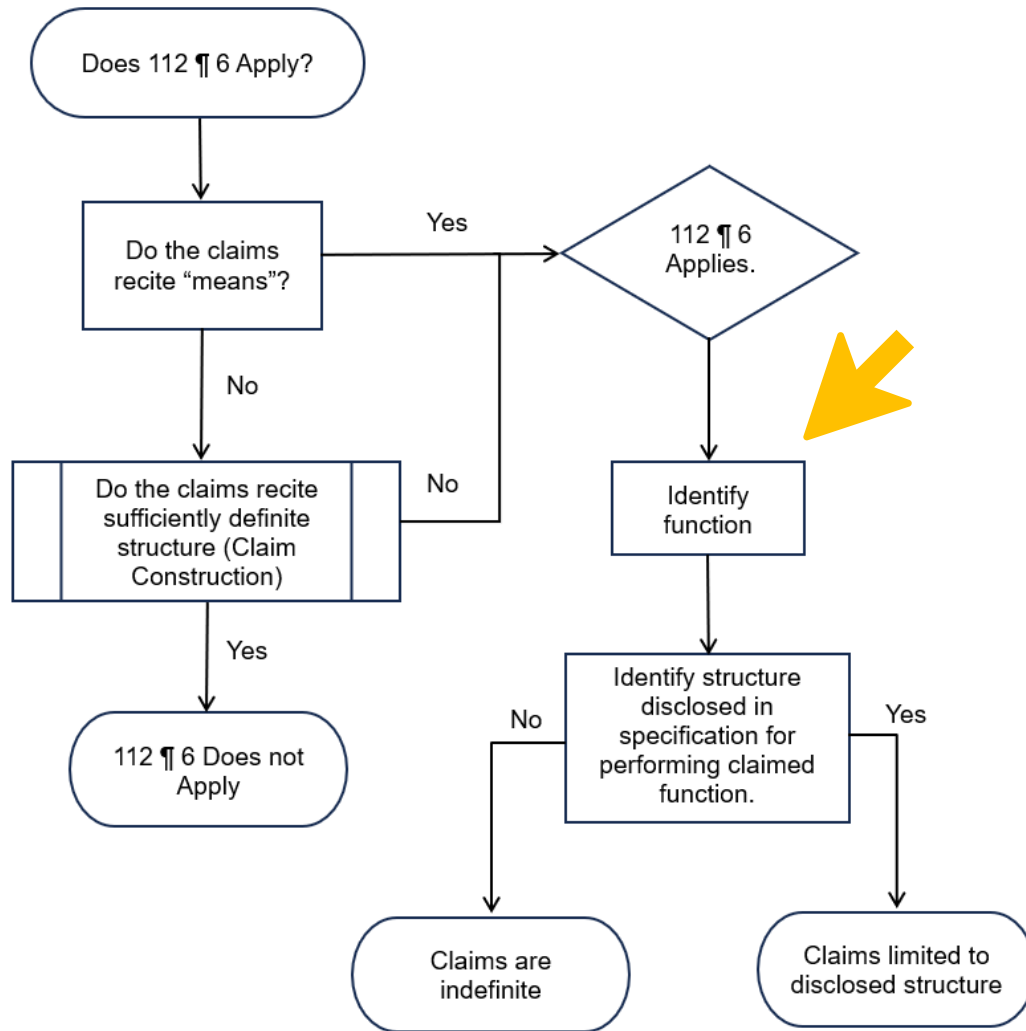
Claim Construction is Determinative

“The ultimate question is whether “the claim language, read in light of the specification, recites sufficiently definite structure to avoid § 112, ¶ 6.”

MTD Products Inc. v. Iancu, 933 F.3d 1336, 1342 (Fed. Cir. 2019)



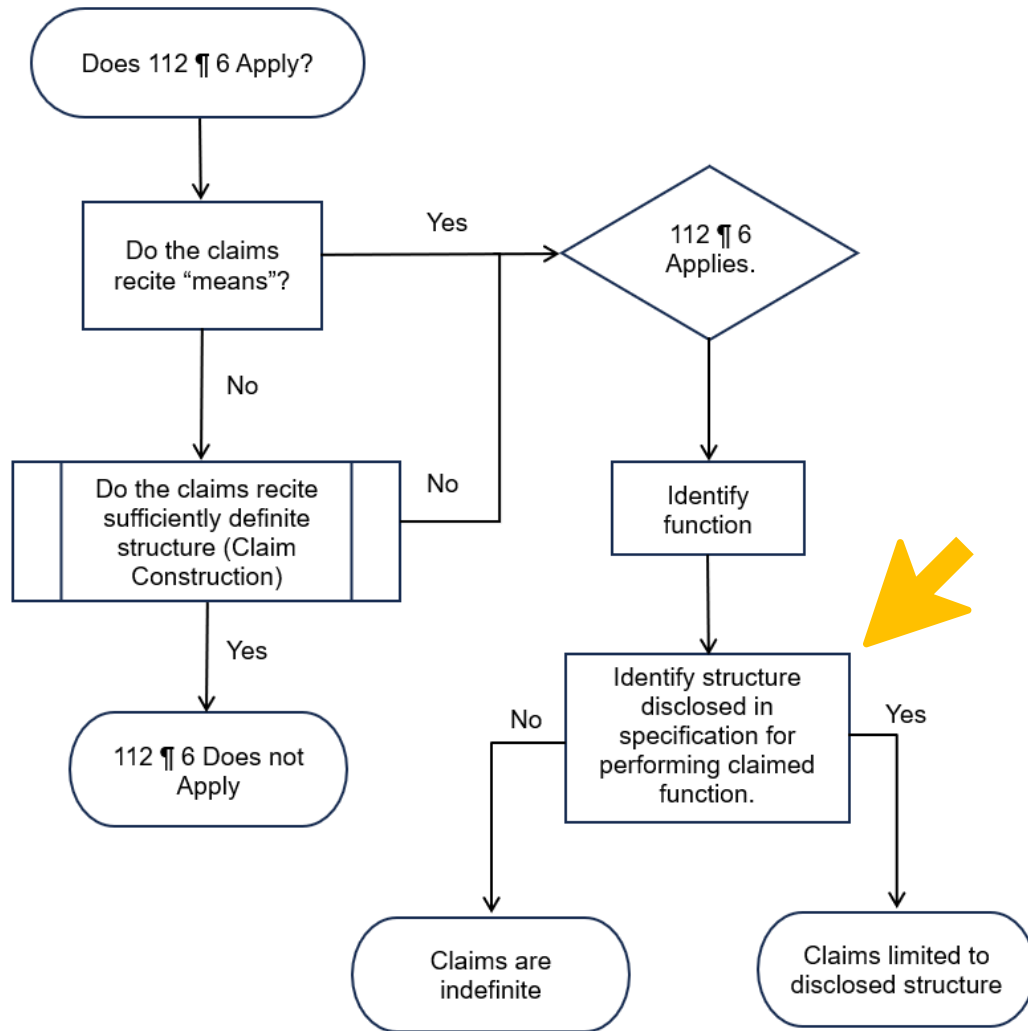
Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



"The first step in construing a means-plus function claim is to identify the claimed function."

See *Rain Computing v. Samsung Electronics America*, 989 F.3d 1002, 1007 (Fed. Cir. 2021) (citing *Williamson v. Citrix, LLC*, 792 F.3d 1339 (Fed. Cir. 2015))

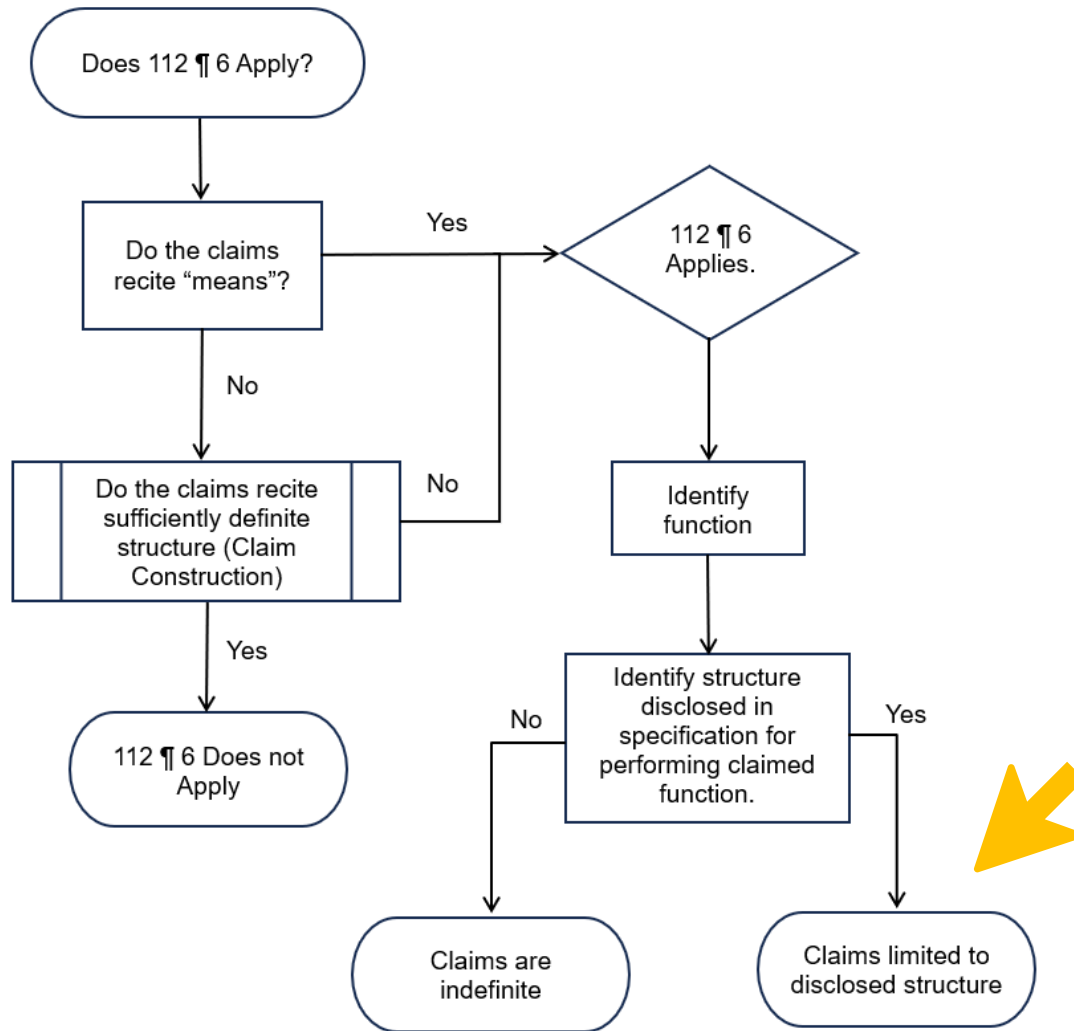
Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6



"After identifying the function, we then determine what structure, if any, disclosed in the specification corresponds to the claimed function. Under this second step, structure disclosed in the specification is corresponding structure only if the specification or prosecution history clearly links or associates that structure to the function recited in the claim."

Rain Computing v. Samsung Electronics America,
989 F.3d 1002, 1007 (Fed. Cir. 2021)
(citing *Williamson v. Citrix, LLC*, 792 F.3d 1339 (Fed. Cir. 2015))

Legal Framework for Determining Application of 35 U.S.C. § 112 ¶ 6

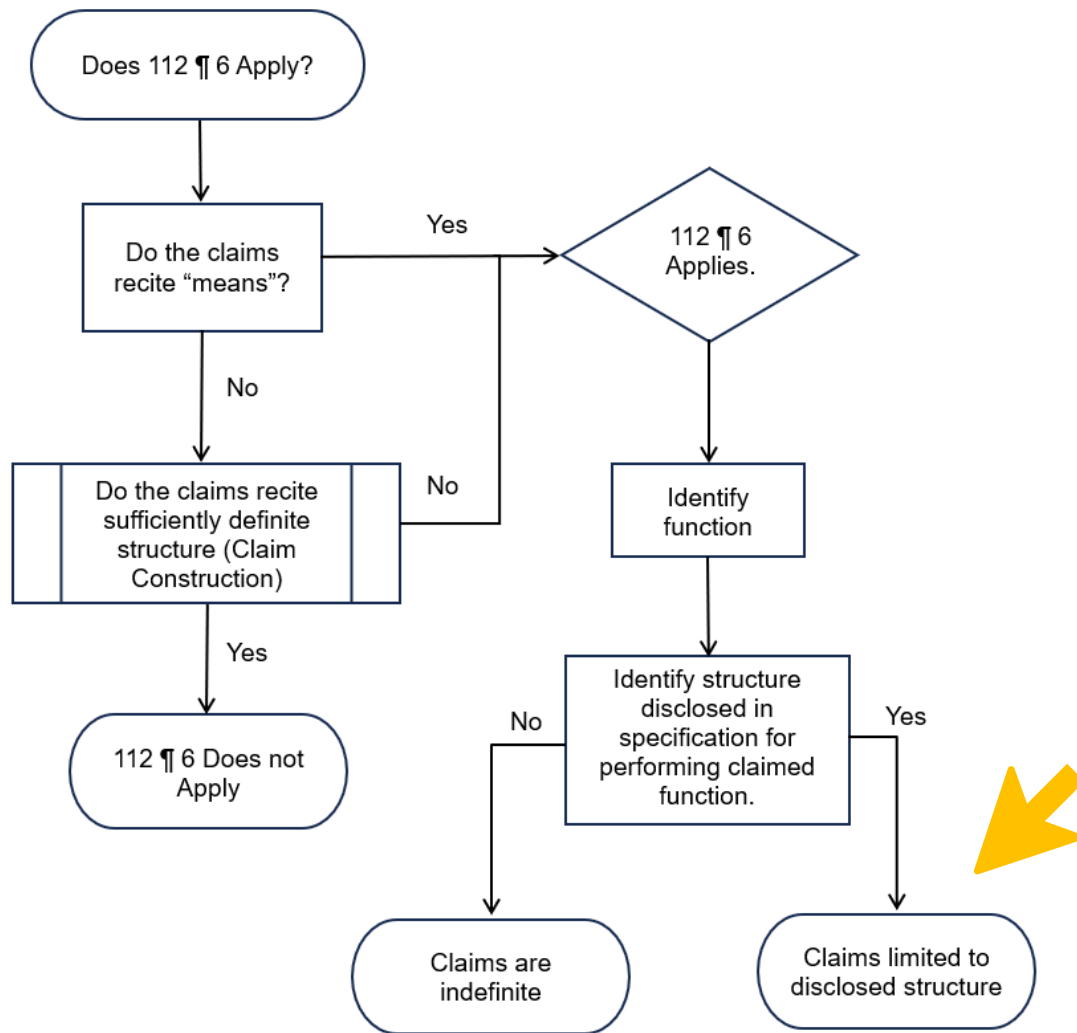


General Purpose Computer Not Sufficiently Definite – See Algorithm

If the function is performed by **a general-purpose computer or microprocessor**, then the second step generally further requires that the **specification disclose the algorithm** that the computer performs to accomplish that function... For means plus-function claims in which the disclosed structure is a computer, or microprocessor, programmed to carry out an algorithm, we have held that **the disclosed structure is not the general purpose computer, but rather the special purpose computer programmed to perform the disclosed algorithm.**

Rain Computing v. Samsung Electronics America,
989 F.3d 1002, 1007 (Fed. Cir. 2021)
(citing *WMS Gaming, Inc. v. Int'l Game Tech.*, 184 F.3d 1339
(Fed. Cir. 1999))

Legal Process for Determining Application of 35 U.S.C. § 112 ¶ 6

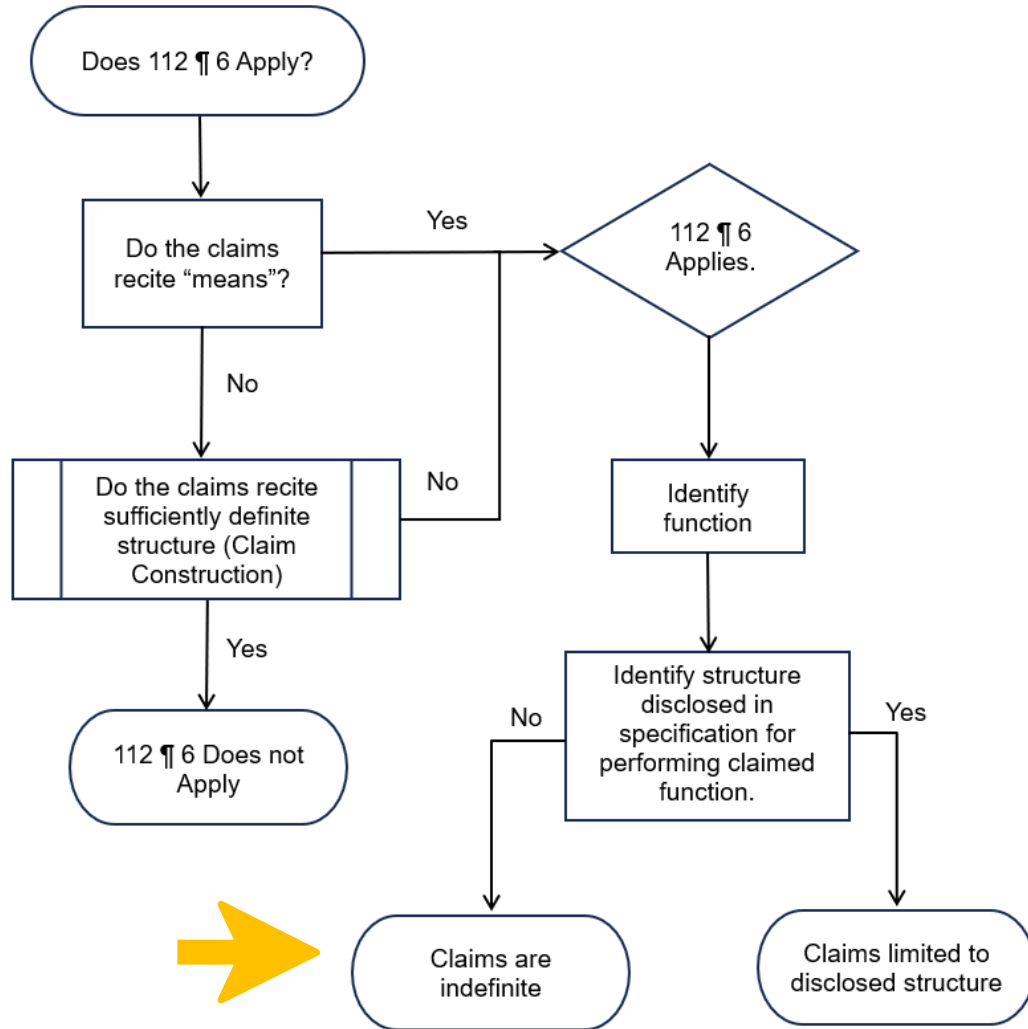


General Purpose Computer Not Sufficiently Definite – See Algorithm

"We have 'consistently required that the structure disclosed in the specification be more than simply a general purpose computer or microprocessor.' *Aristocrat Techs. Austl. Pty Ltd. v. Int'l Game Tech.*, 521 F.3d 1328, 1333 (Fed.Cir. 2008). General-purpose 'computers' or 'processors' can be 'programmed to perform very different tasks in very different ways.' *Id.* Accordingly, '***simply disclosing a computer as the structure designated to perform a particular function does not limit the scope of the claim to the corresponding structure, material, or acts that perform the function, as required by section 112 paragraph 6.***' *Id.*"

HTC Corp. v. IPCom GmbH & Co., KG, 667 F. 3d 1270, 1280 (Fed. Cir. 2012).

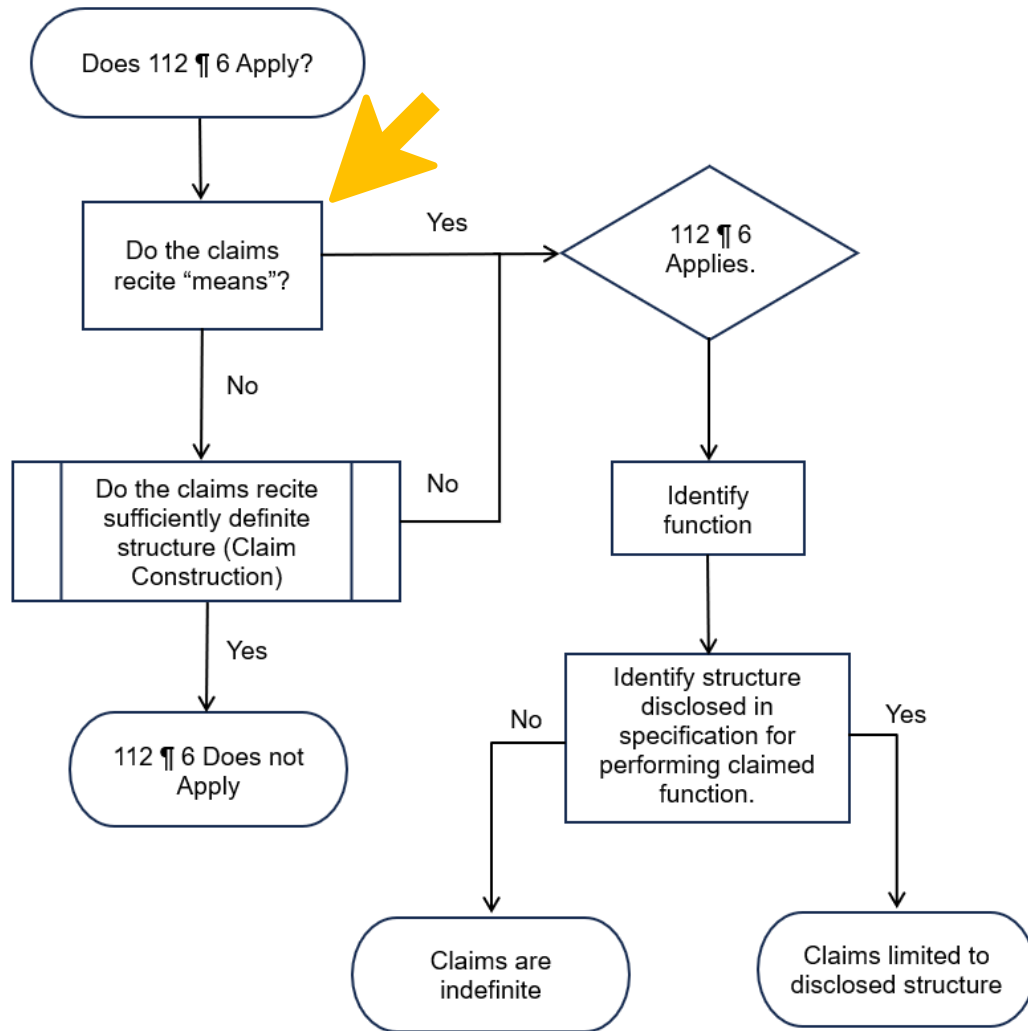
Legal Process for Determining Application of 35 U.S.C. § 112 ¶ 6



Failure to Construe Results in Indefiniteness

"And finally, if the patentee fails to disclose adequate corresponding structure, the claim is indefinite."

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1007 (Fed. Cir. 2021)



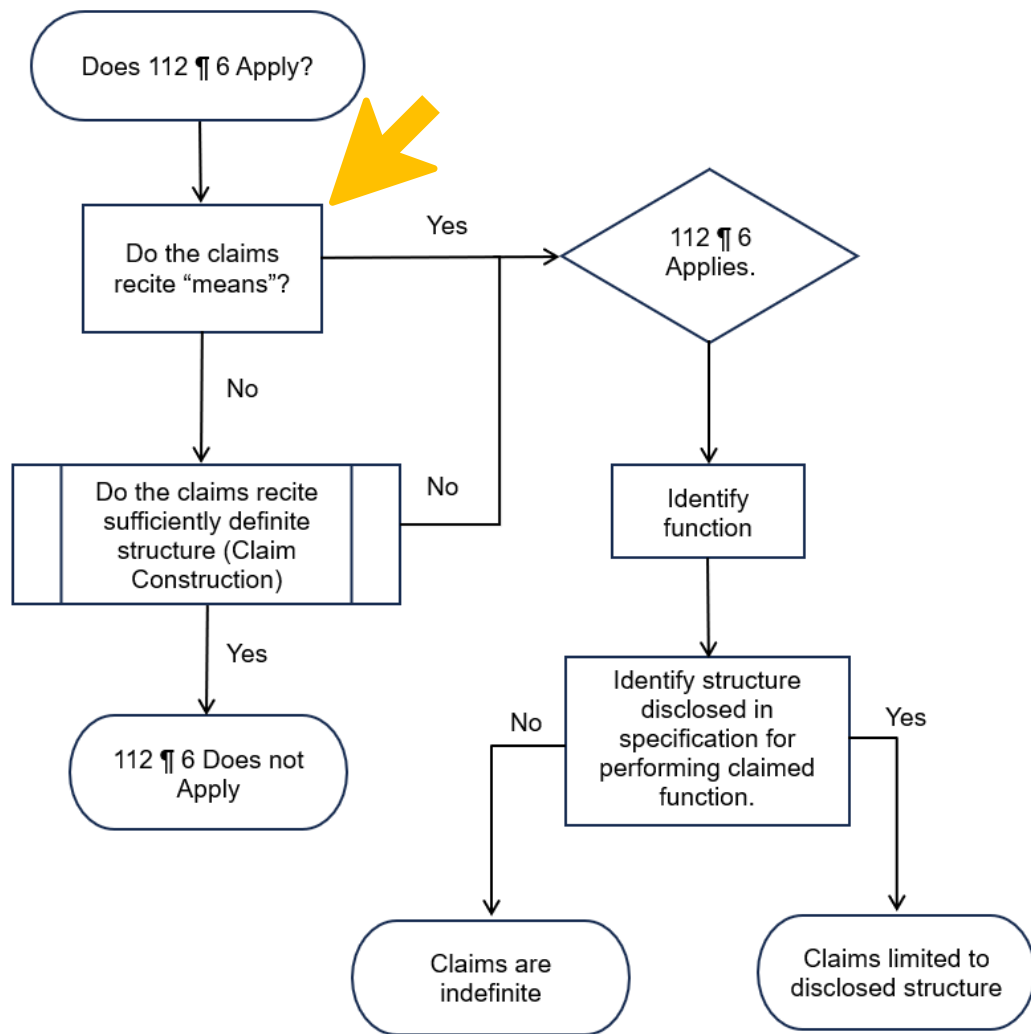
Claim 1 Does Not Recite “Means”

The invention claimed is:

1. A hybrid device comprising:

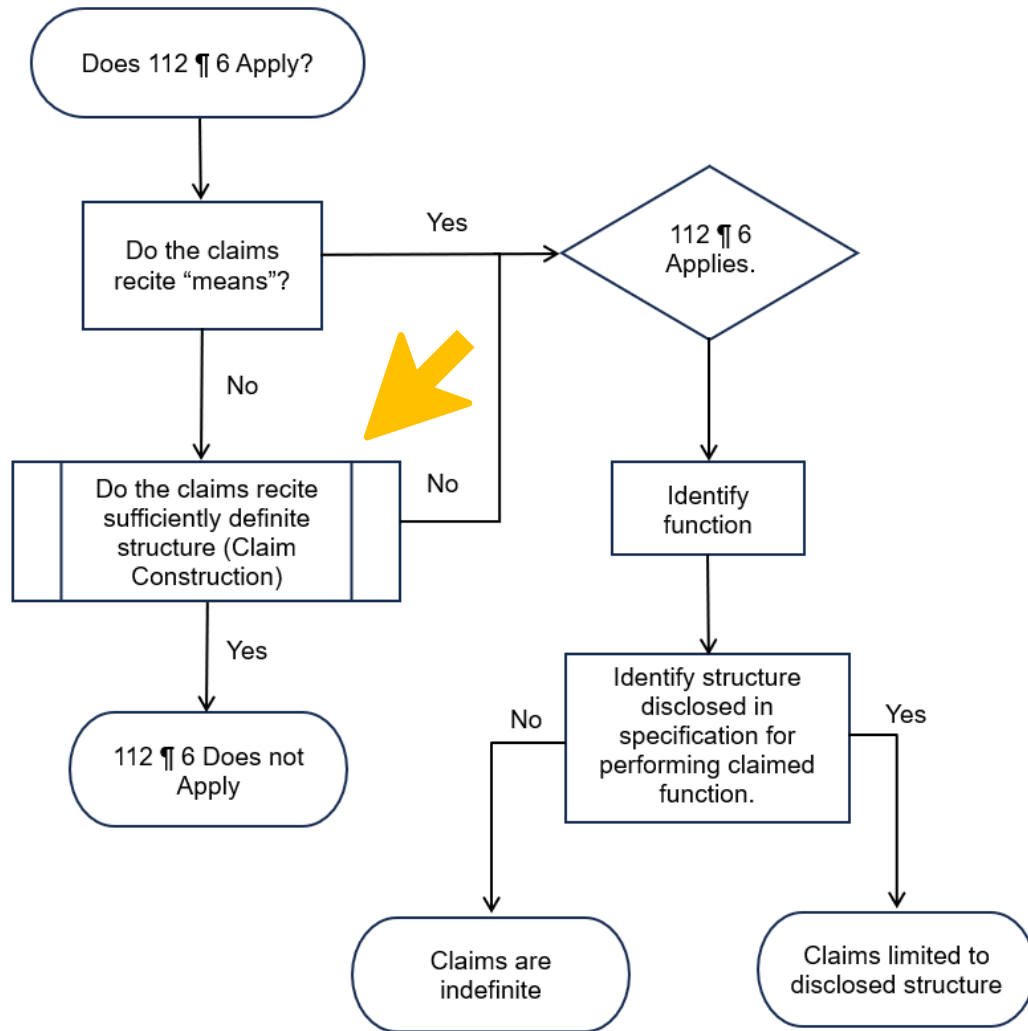
an integrated personal digital key (PDK) for storing information and capable of communicating wirelessly with at least one external receiver-decoder circuit (RDC); and
an integrated RDC for communicating wirelessly with at least one external PDK within a proximity zone, the integrated RDC coupled to the integrated PDK by a first signal line for communication, the integrated RDC coupled to at least one other component of the hybrid device by a second signal line, one or more of the integrated RDC and integrated PDK enabling one or more of an application, a function, and a service on one or more of the hybrid device and a device associated with the external RDC.

Claims at Issue



Claim 10 Does Not Recite “Means”

10. A method comprising:
creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service on one or more of the hybrid device and a device associated with an external RDC; and
sending the enablement signal to one or more of the hybrid device and the device associated with an external RDC.

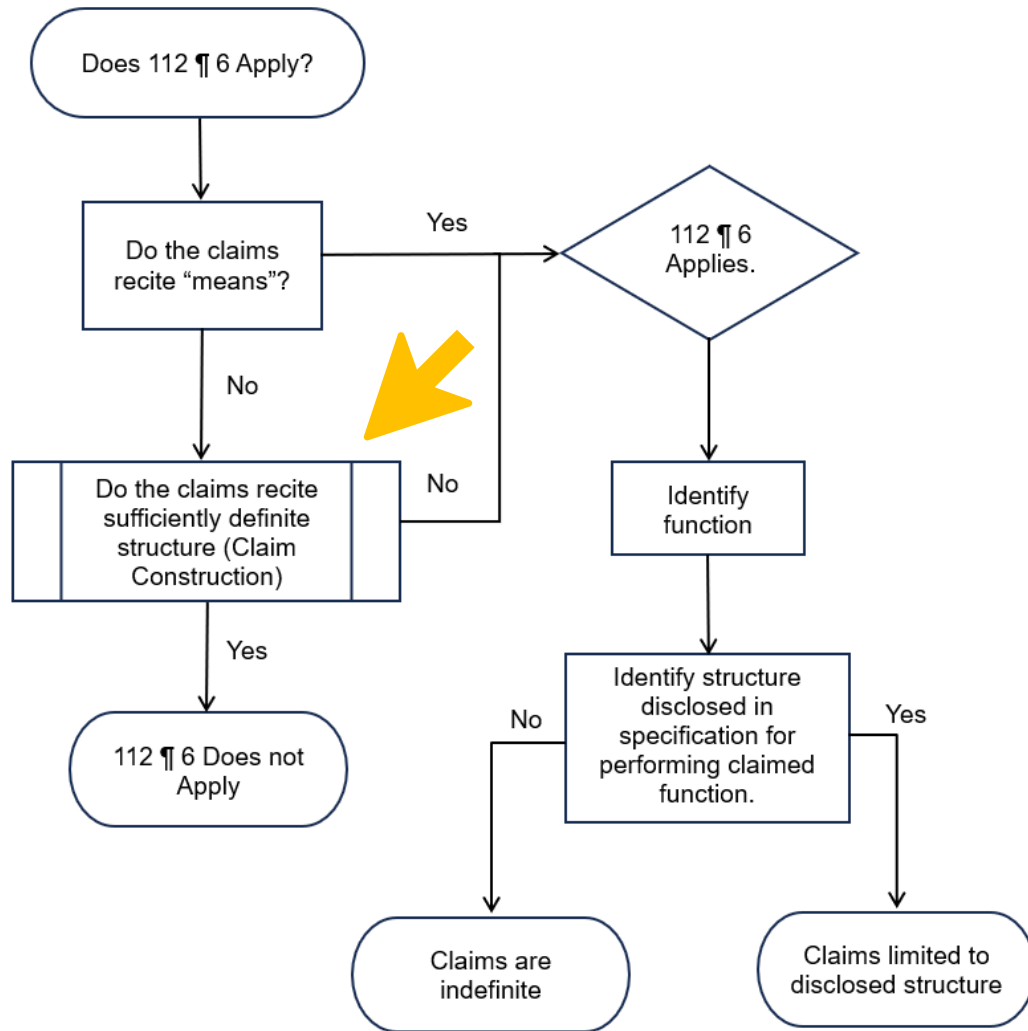


Function without Sufficient Structure

The invention claimed is:

1. A hybrid device comprising:

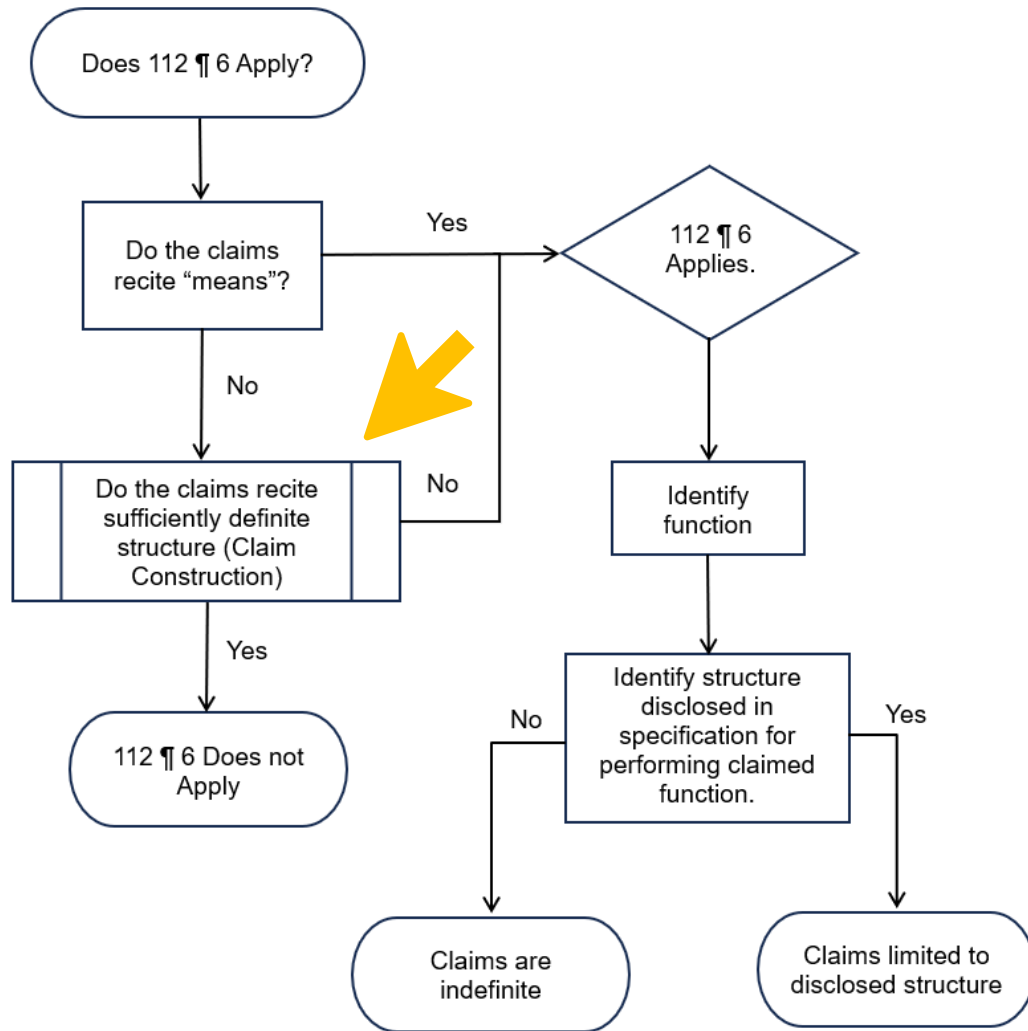
an integrated personal digital key (PDK) for storing information and capable of communicating wirelessly with at least one external receiver-decoder circuit (RDC); and an integrated RDC for communicating wirelessly with at least one external PDK within a proximity zone, the integrated RDC coupled to the integrated PDK by a first signal line for communication, the integrated RDC coupled to at least one other component of the hybrid device by a second signal line, one or more of the integrated RDC and integrated PDK enabling one or more of an application, a function, and a service on one or more of the hybrid device and a device associated with the external RDC.



Function without Sufficient Structure

10. A method comprising:
creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service on one or more of the hybrid device and a device associated with an external RDC; and
sending the enablement signal to one or more of the hybrid device and the device associated with an external RDC.

Claims at Issue

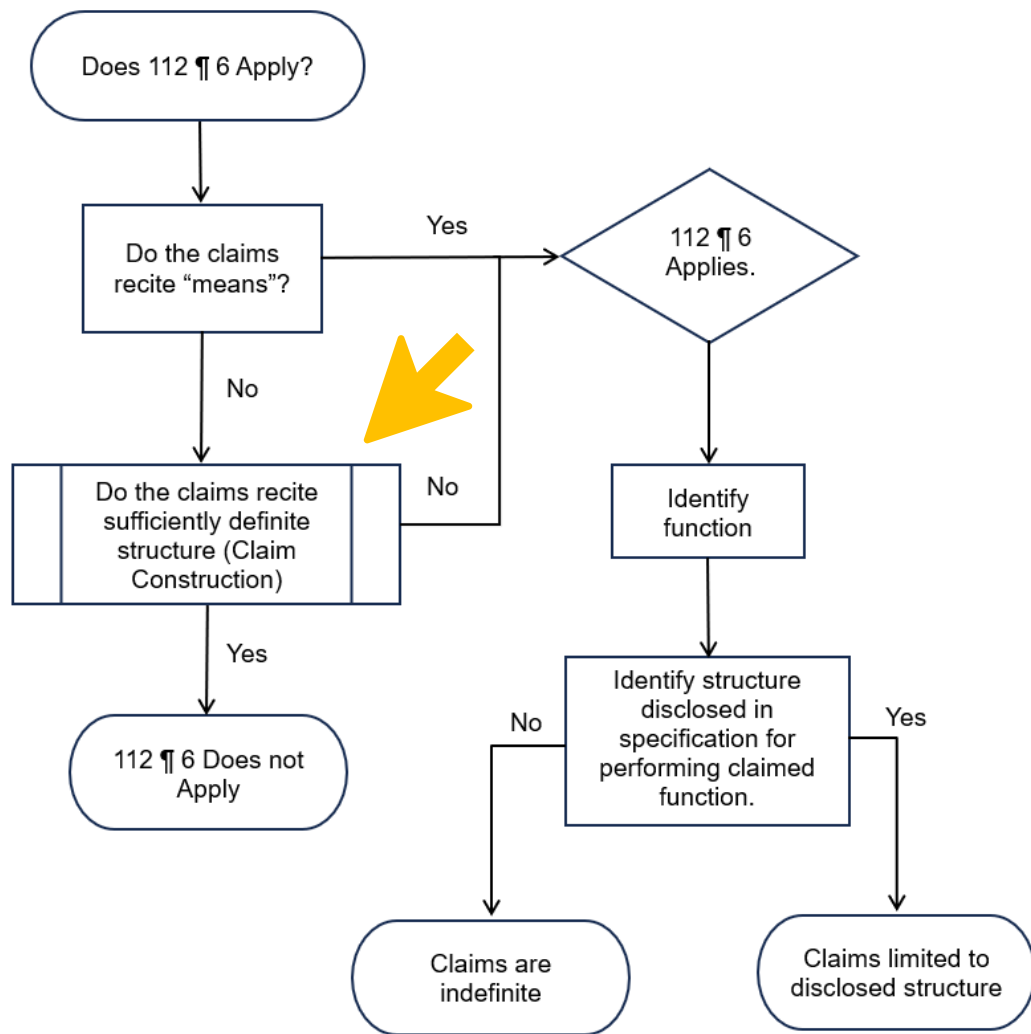


Function without Sufficient Structure

§ 112 para. 6 will apply if the challenger *demonstrates* that the claim term fails to recite sufficiently definite structure or else *recites function without reciting sufficient structure for performing that function.*

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1007 (Fed. Cir. 2021) (citing *WMS Gaming, Inc. v. Int'l Game Tech.*, 184 F.3d 1339 (Fed. Cir. 1999))

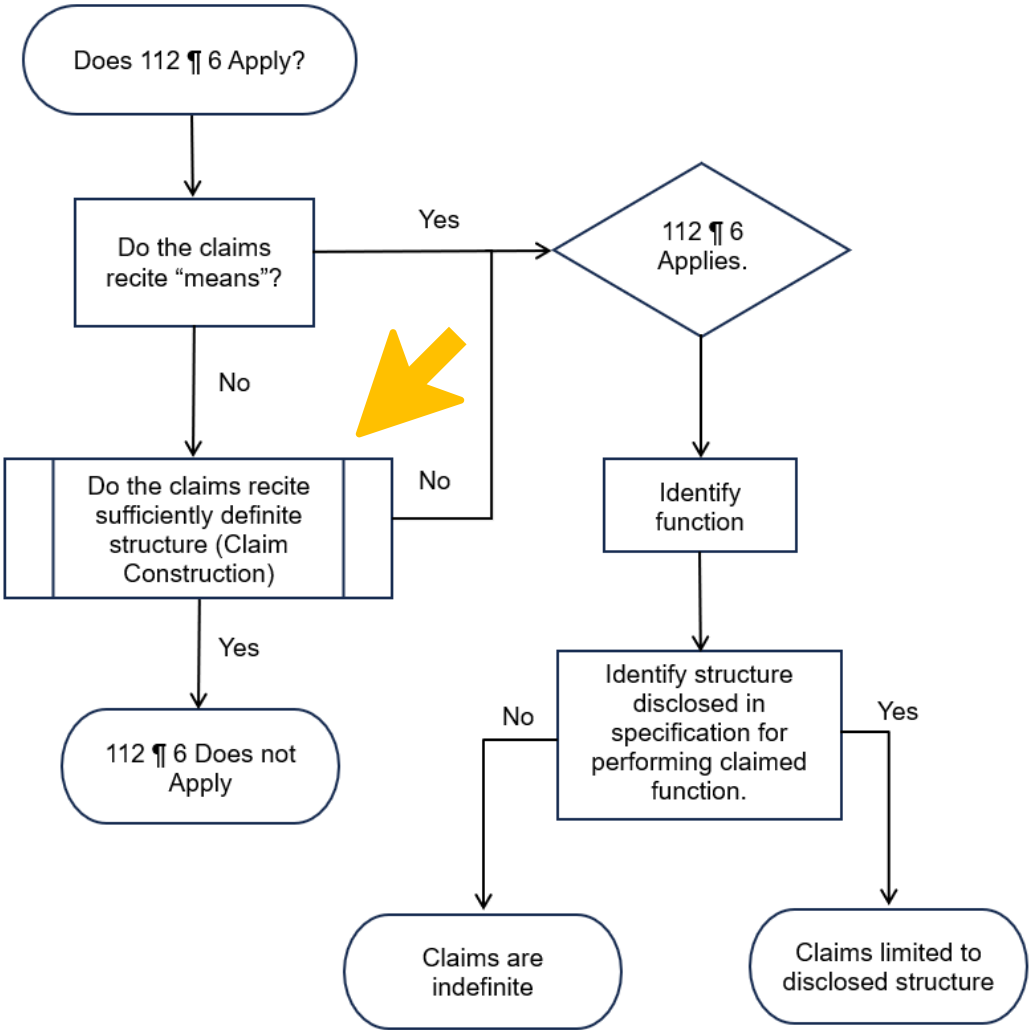
Claims at Issue



PDK is a General Purpose Computer - Not Sufficiently Definite

"The term 'integrated PDK' (Personal Digital Key) is not recognized by those of ordinary skill in the art to provide a sufficiently definite structure for performing the function of 'enabling one or more of an application, a function and a service.'"

Jakobsson Decl., ¶ 18.

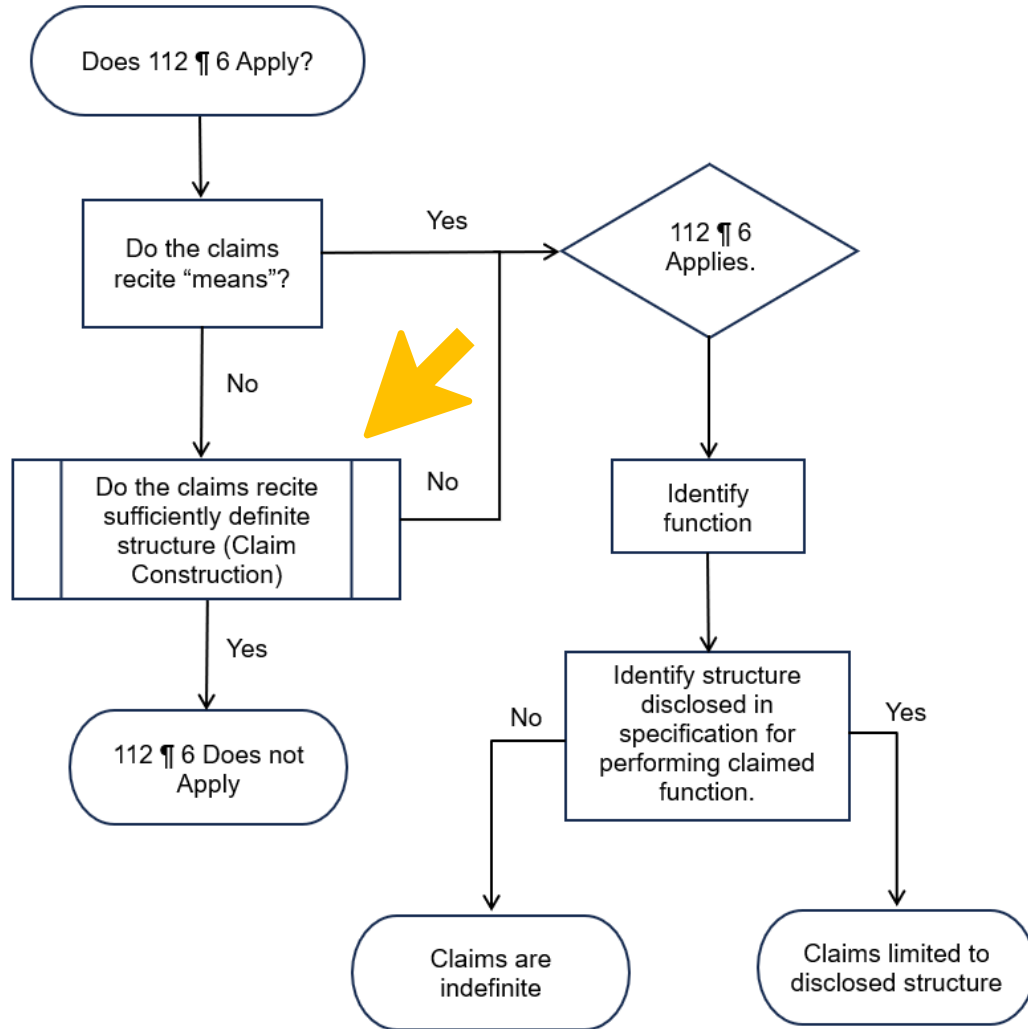


PDK is a General Purpose Computer - Not Sufficiently Definite

Term	Proxense Construction	Defendant Construction	Court Construction
"Personal digital key" (Claims 1, 10)	An operably connected collection of elements including an antenna and a transceiver for communicating with a RDC and a controller and memory for storing information particular to a user.	A device that includes an antenna, a transceiver for communicating with the RDC and a controller and memory for storing information particular to a user.	An operably connected collection of elements including an antenna and a transceiver for communicating with a RDC and a controller and memory for storing information particular to a user.

Ex. 2001 (CC Order);
see also Ex. 2012.

Claims at Issue

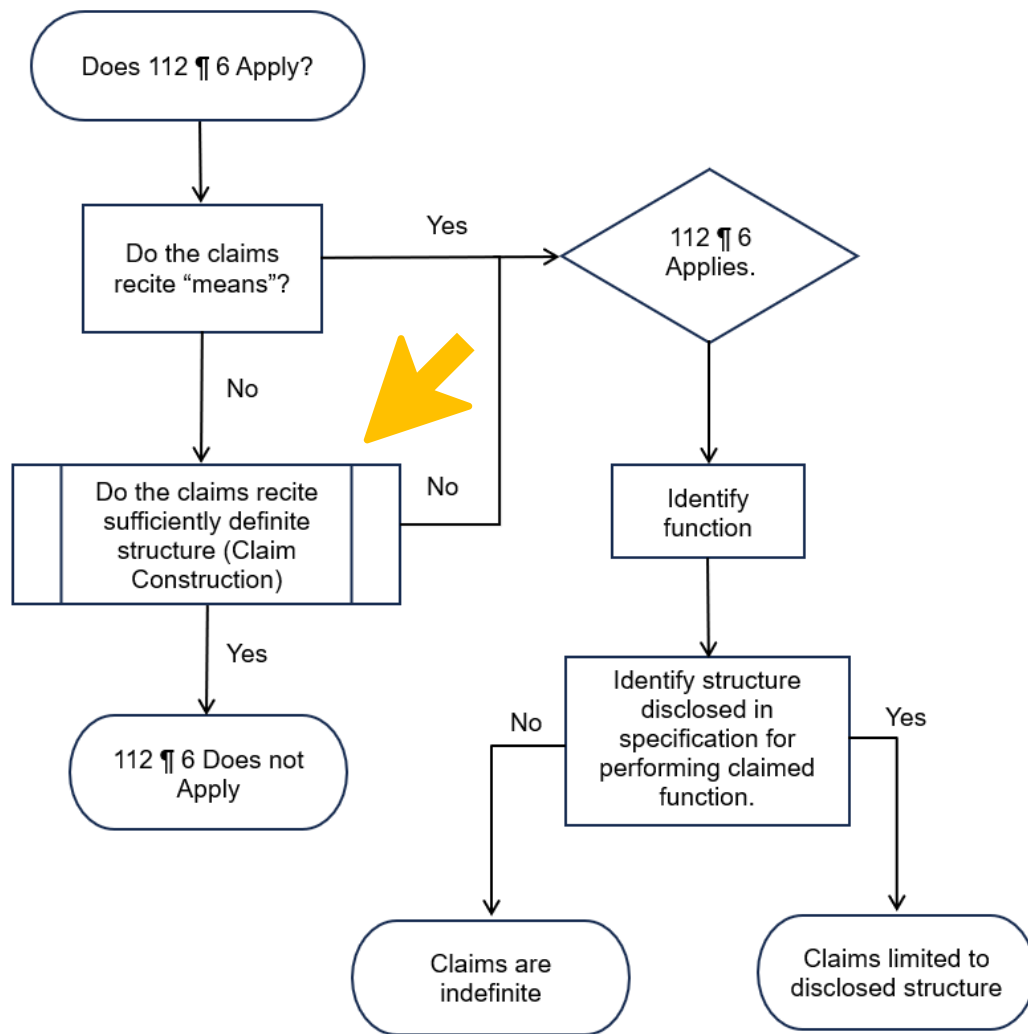


PDK is a General Purpose Computer - Not Sufficiently Definite

"In a minimal embodiment, the PDK 102a includes an **antenna and a transceiver** for communicating with a RDC (not shown) and a **controller and memory** for storing information particular to a user."

042 Patent, 13:46-49.

Claims at Issue

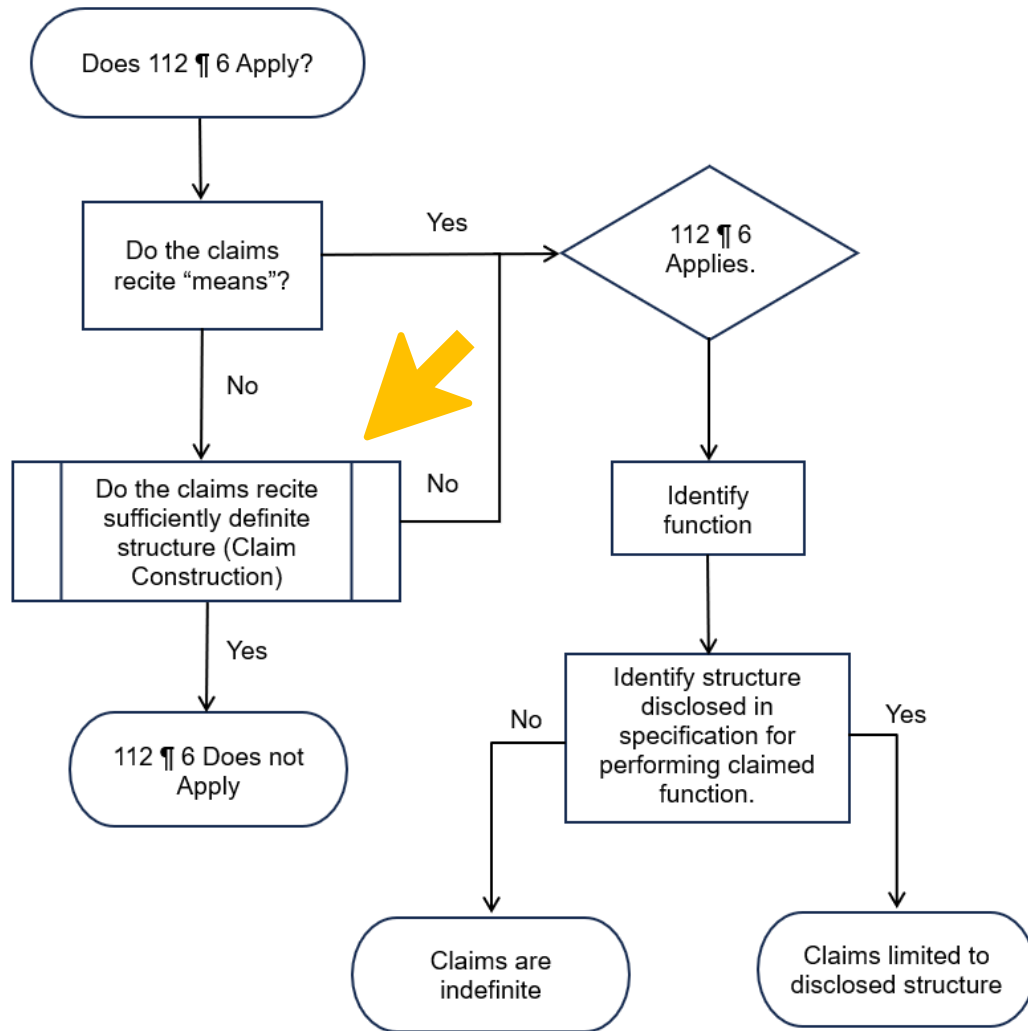


PDK is a General Purpose Computer - Not Sufficiently Definite

"The district court misstated the law, however, when it stated that disclosure of a processor and transceiver alone was sufficient to provide structure to these claims. ***The processor and transceiver amount to nothing more than a general-purpose computer. We have consistently required that the structure disclosed in the specification be more than simply a general purpose computer or microprocessor.***"

HTC Corp. v. IPCOM GmbH & Co., KG, 667 F.3d 1270, 1280 (Fed. Cir. 2012).

Claims at Issue

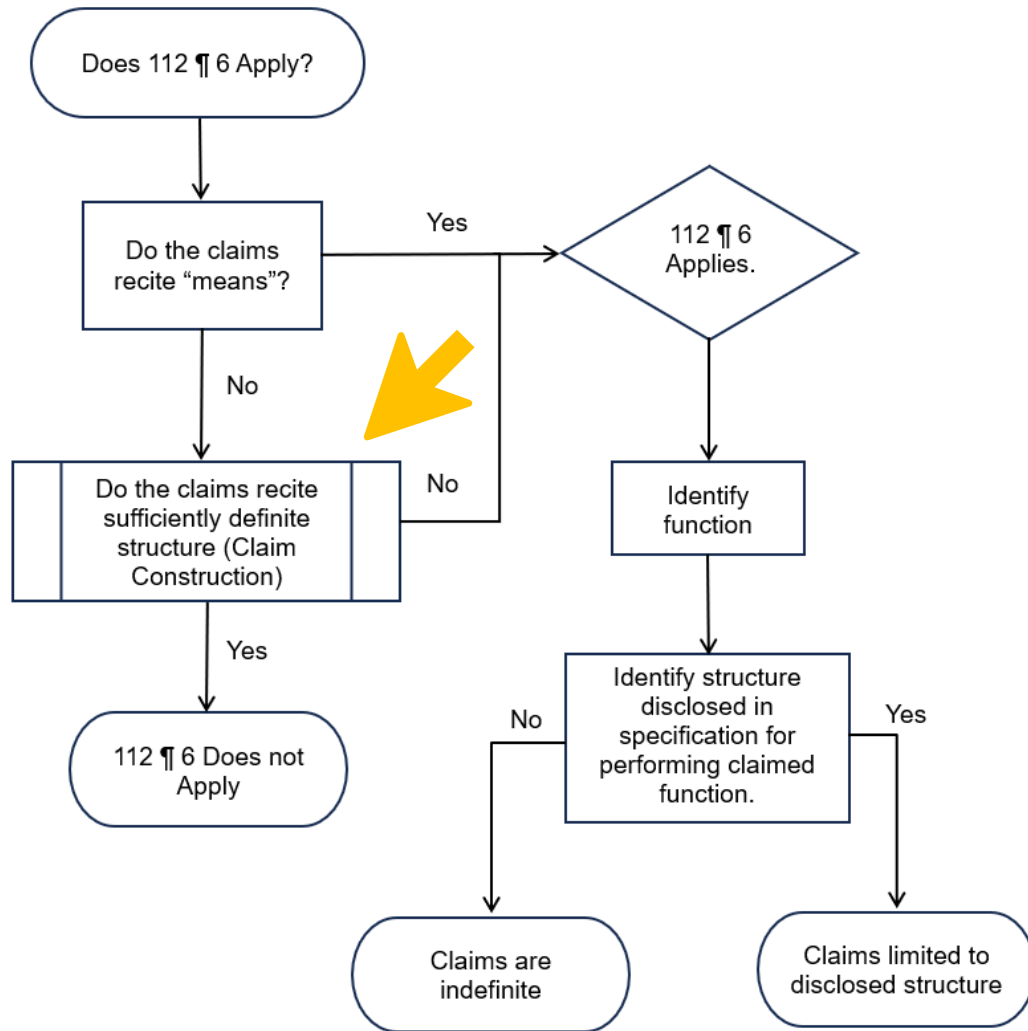


PDK is a General Purpose Computer - Not Sufficiently Definite

The district court erred, however, in concluding that the disclosure of computer readable media or storage devices provided sufficient structure for the 'control access' function. ***These computer-readable media or storage devices amount to nothing more than a general-purpose computer. And 'controlling access to one or more software application packages to which the user has a subscription' requires more 'than merely plugging in a general purpose computer.'*** Rather, some special programming, i.e., an algorithm, would be required to control access to the software application packages.

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1007-1008 (Fed. Cir. 2021)

Claims at Issue

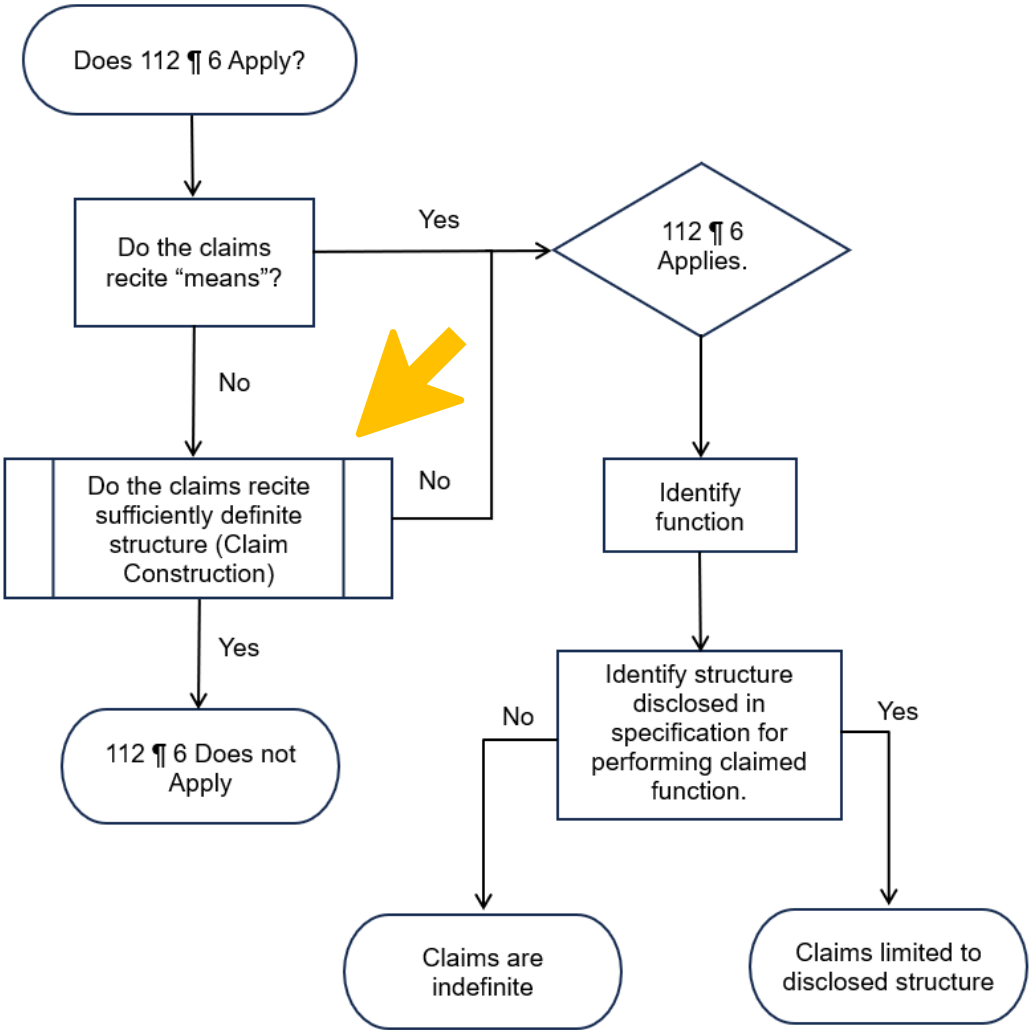


RDC is also a General Purpose Computer - Not Sufficiently Definite

The term “integrated RDC” is not recognized by those of ordinary skill in the art to provide a sufficiently definite structure for performing the function of “enabling one or more of an application, a function and a service.”.

Jakobsson Decl., ¶¶ 18 and 53.

Claims at Issue

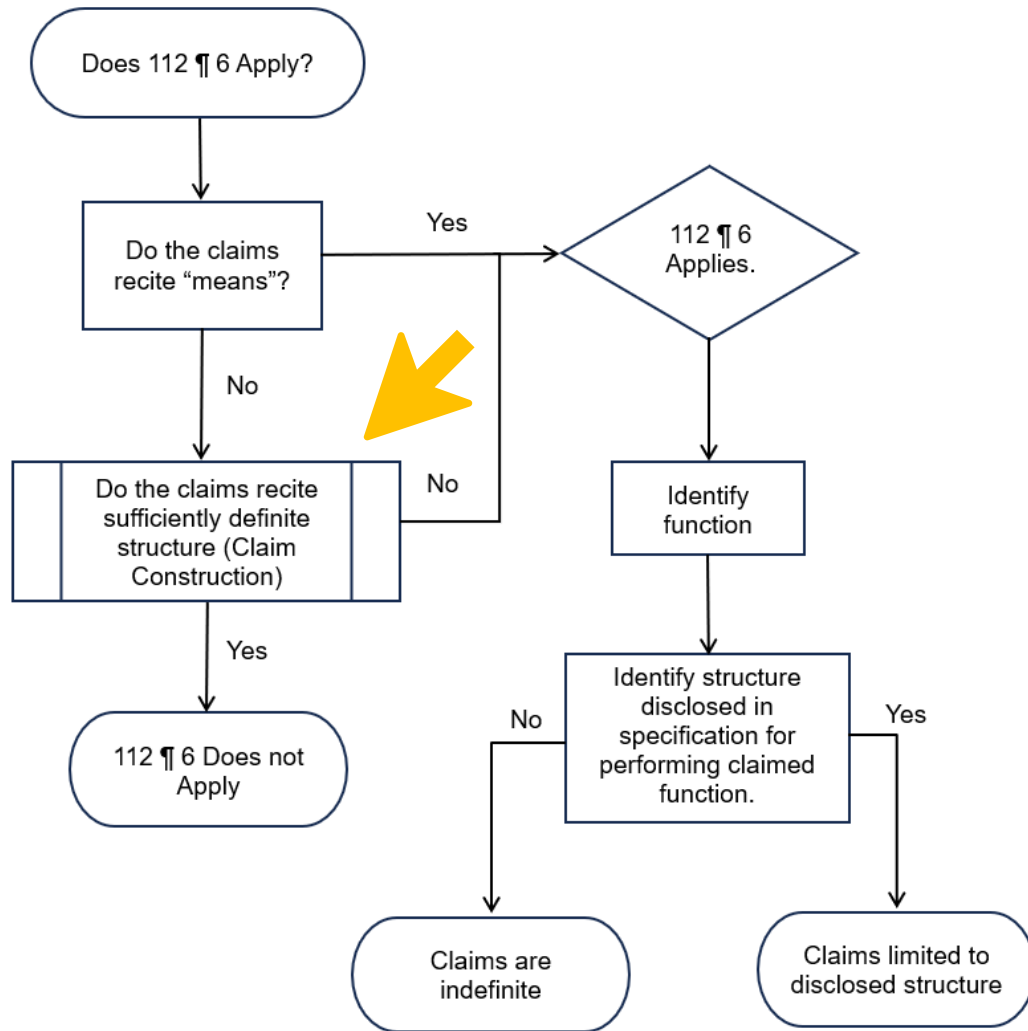


RDC is a General Purpose Computer - Not Sufficiently Definite

Term	Proxense Construction	Defendant Construction	Court Construction
"Personal digital key" (Claims 1, 10)	A component or collection of components, capable of wirelessly receiving data in an encrypted format and decoding the Encrypted data for processing.	A device that provides a wireless interface to the PDK.	A component or collection of components, capable of wirelessly receiving data in an encrypted format and decoding the Encrypted data for processing.

Ex. 2001 (CC Order);
see also Ex. 2012.

Claims at Issue

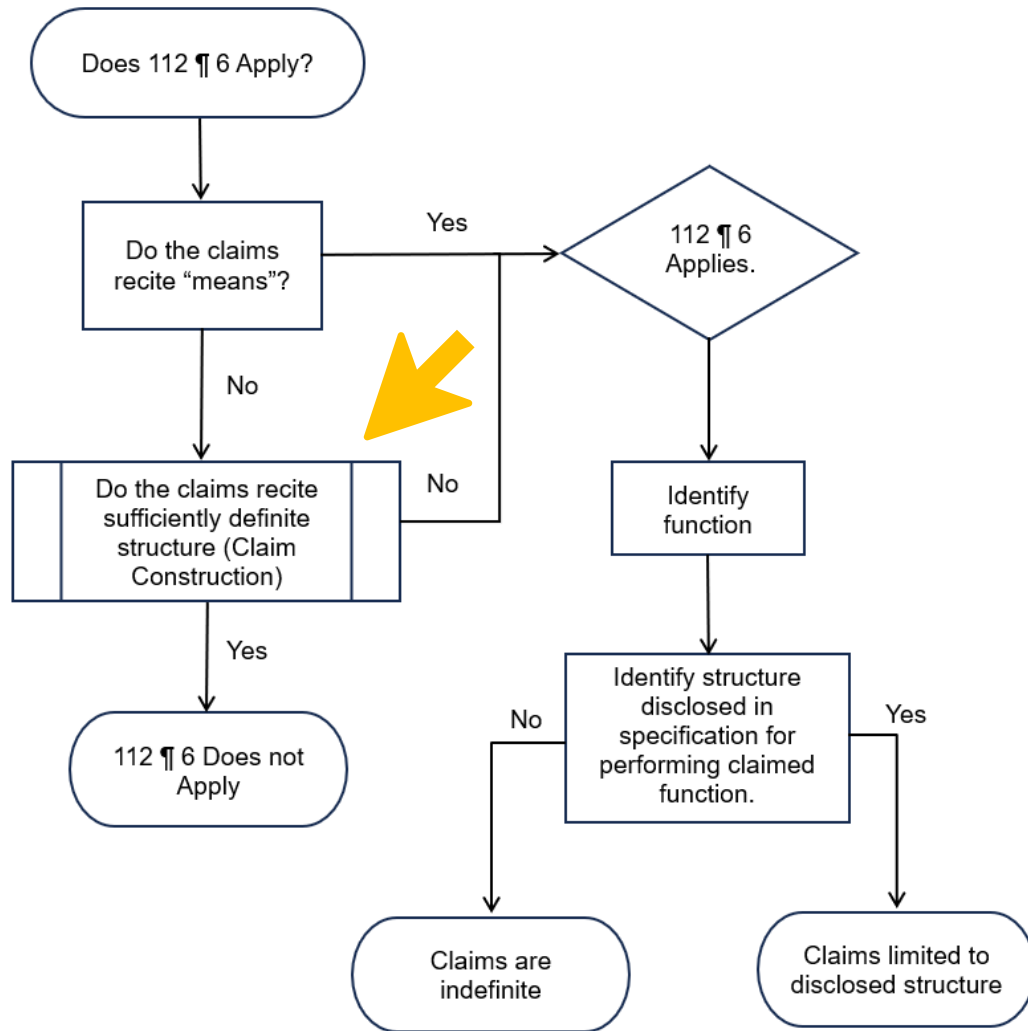


RDC is a General Purpose Computer - Not Sufficiently Definite

The RDC 304 provides the wireless interface to the PDK 102. Generally, the RDC 304 wirelessly receives data from the PDK 102 in an encrypted format and decodes the encrypted data for processing by the processor 306.

042 Patent, 7:10-13

Claims at Issue

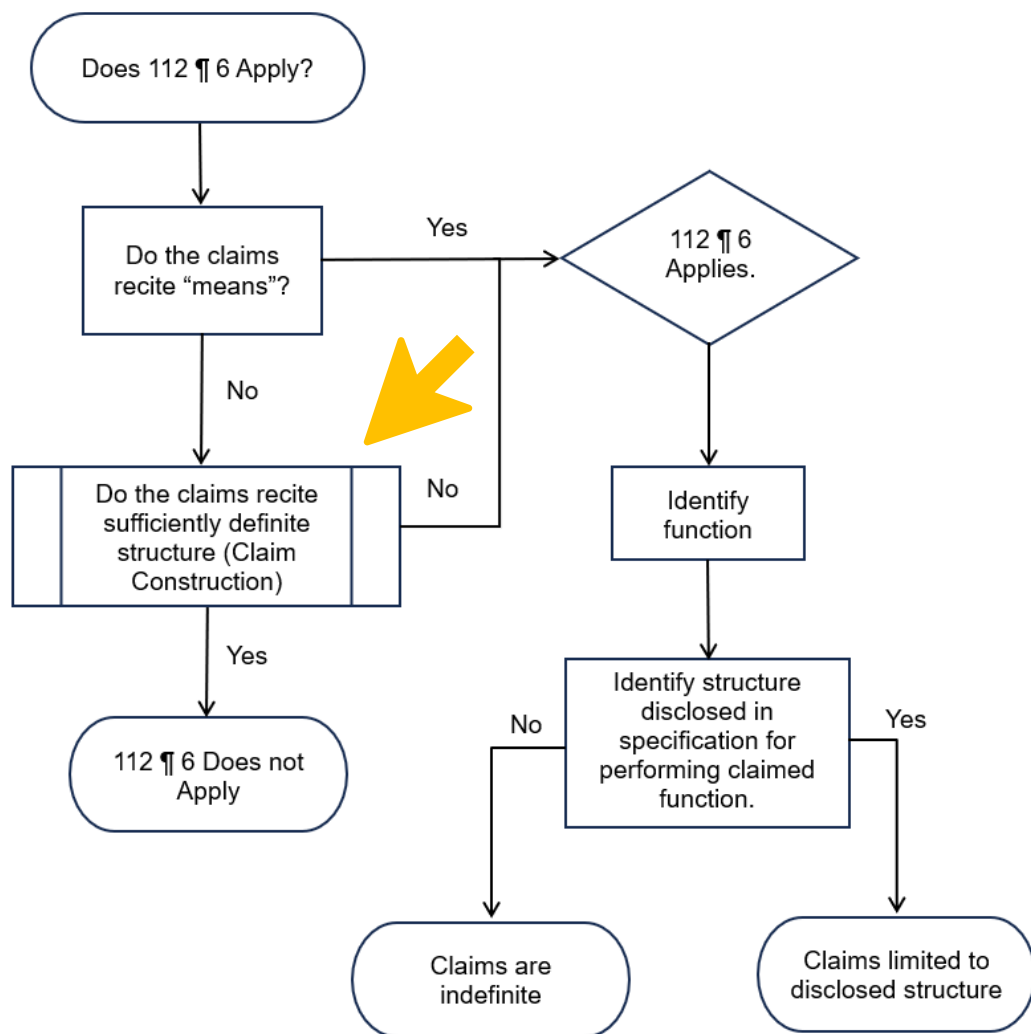


RDC is a General Purpose Computer - Not Sufficiently Definite

[W]e held that absent a possible narrower construction of the terms 'processing,' 'receiving,' and 'storing,' the disclosure of a general-purpose computer was sufficient. We explained that in substance, claiming 'means for processing,' 'receiving,' and 'storing' may simply claim a general-purpose computer, although in means-plus-function terms.

Ergo Licensing, LLC v. CareFusion 303, Inc., 673 F. 3d 1361, 1365 (Fed. Cir. 2012)

Claims at Issue



Enablement Signal - Not Sufficiently Definite

"The term 'enablement signal' is not recognized by those of ordinary skill in the art to provide a sufficiently definite structure for performing the function of 'enabling one or more of an application, a function and a service.'"

Jakobsson Decl., ¶ 56.

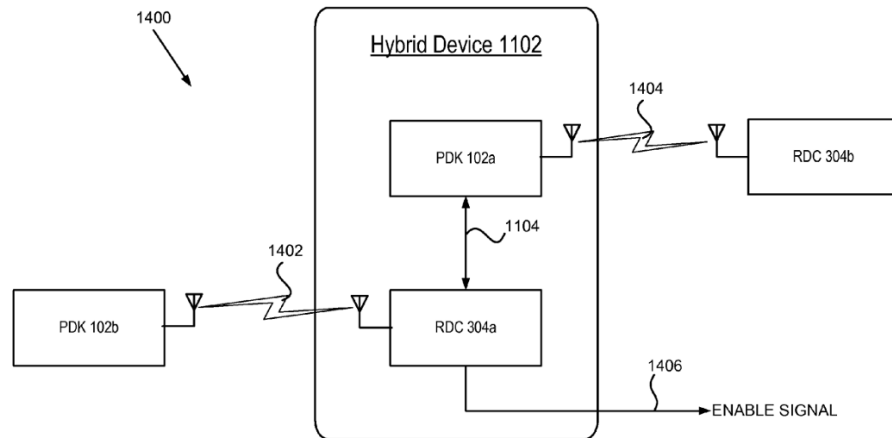


FIG. 14

Enablement Signal - Not Sufficiently Definite: Operation of RDC and PDK

Referencing Figure 14, the specification states: “only when the hybrid device 1102 has multiple links 1402, 1404 will the hybrid device 1102 generate an authorization or enable signal on signal line 1406.” 042 Patent, 16:67-17:3.

“If either the RDC 304b or PDK 102b is not present, the hybrid device 1102 does not allow operation of the personal computer.” 042 Patent, 17:16-19.

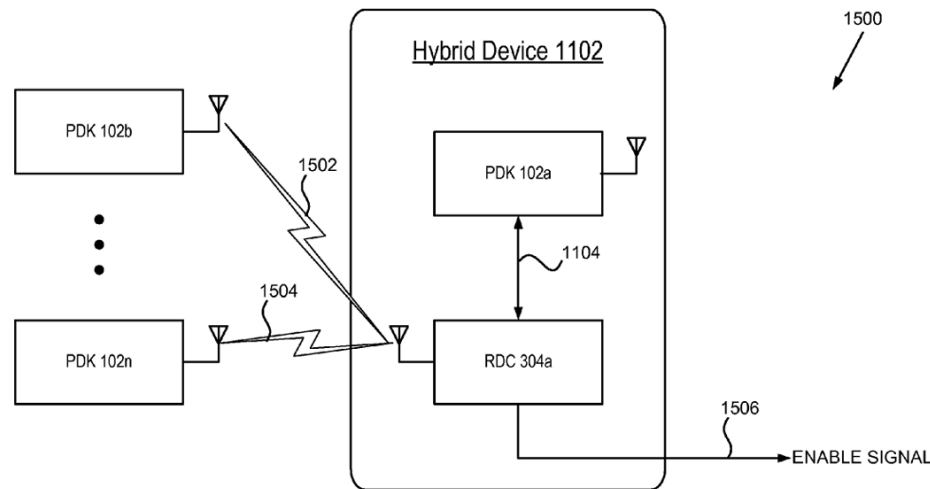


FIG. 15

Enablement Signal - Not Sufficiently Definite: Operation of RDC and PDK

“For the system 1500, only when multiple PDK links 1502, 1504 to the hybrid device 1102 exist, will an authorization/enablement signal be generated on signal line 1506.”

042 Patent, 17:23-26.

The use of signals to enable functions was well known. MS-1022, 3, (definition: “activate - To start an operation, usually by application of an appropriate enabling signal.” (emphasis added)); MS-1032, ¶¶21-22.

Paper 18, at 23.

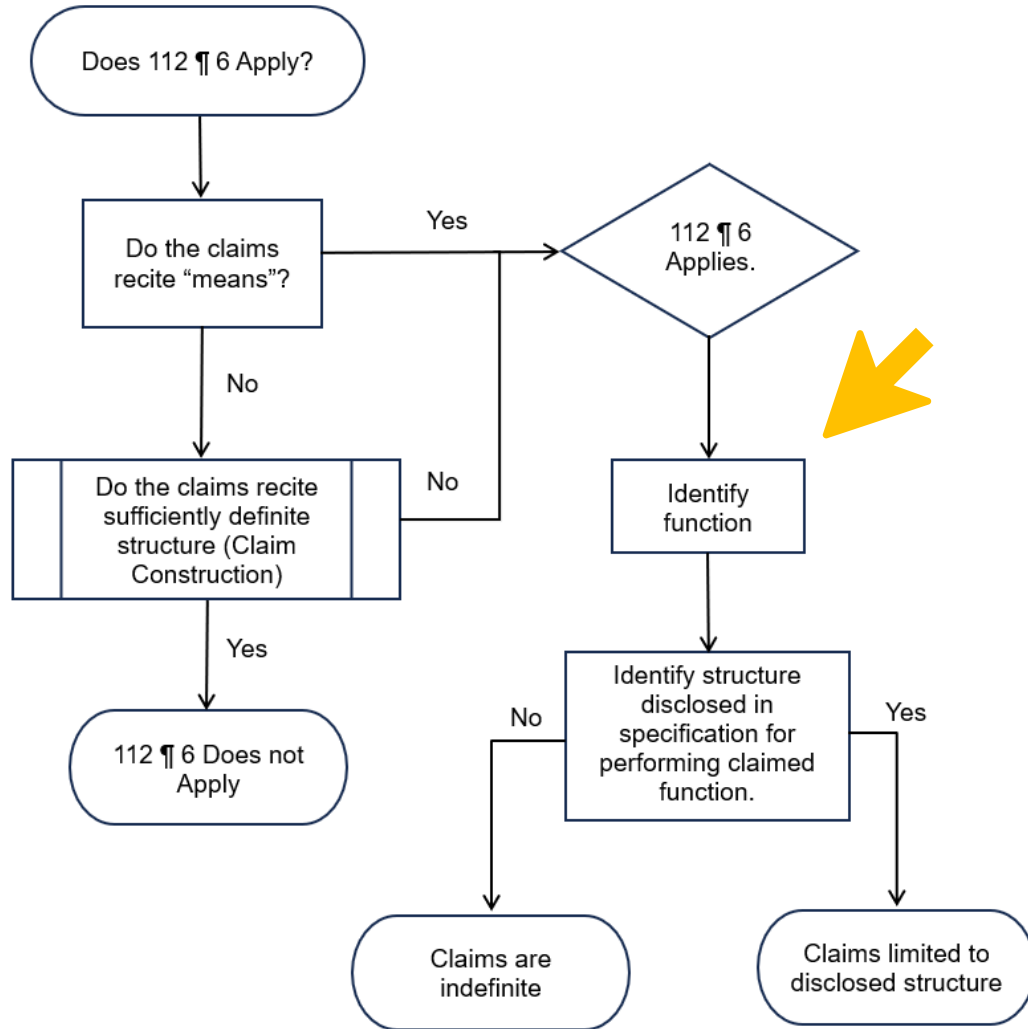
Enablement Signal - Not Sufficiently Definite: Operation of RDC and PDK

10. A method comprising:
creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service on one or more of the hybrid device and a device associated with an external RDC; and
sending the enablement signal to one or more of the hybrid device and the device associated with an external RDC.

Enablement Signal - Not Sufficiently Definite: Operation of RDC and PDK

By the express language of claim 10, the mere receipt of a signal starting a process or receipt of a signal via a wireless link is insufficient to perform the function of “enabling one or more of an application, a function and service.”

10. A method comprising:
creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service on one or more of the hybrid device and a device associated with an external RDC; and
sending the enablement signal to one or more of the hybrid device and the device associated with an external RDC.

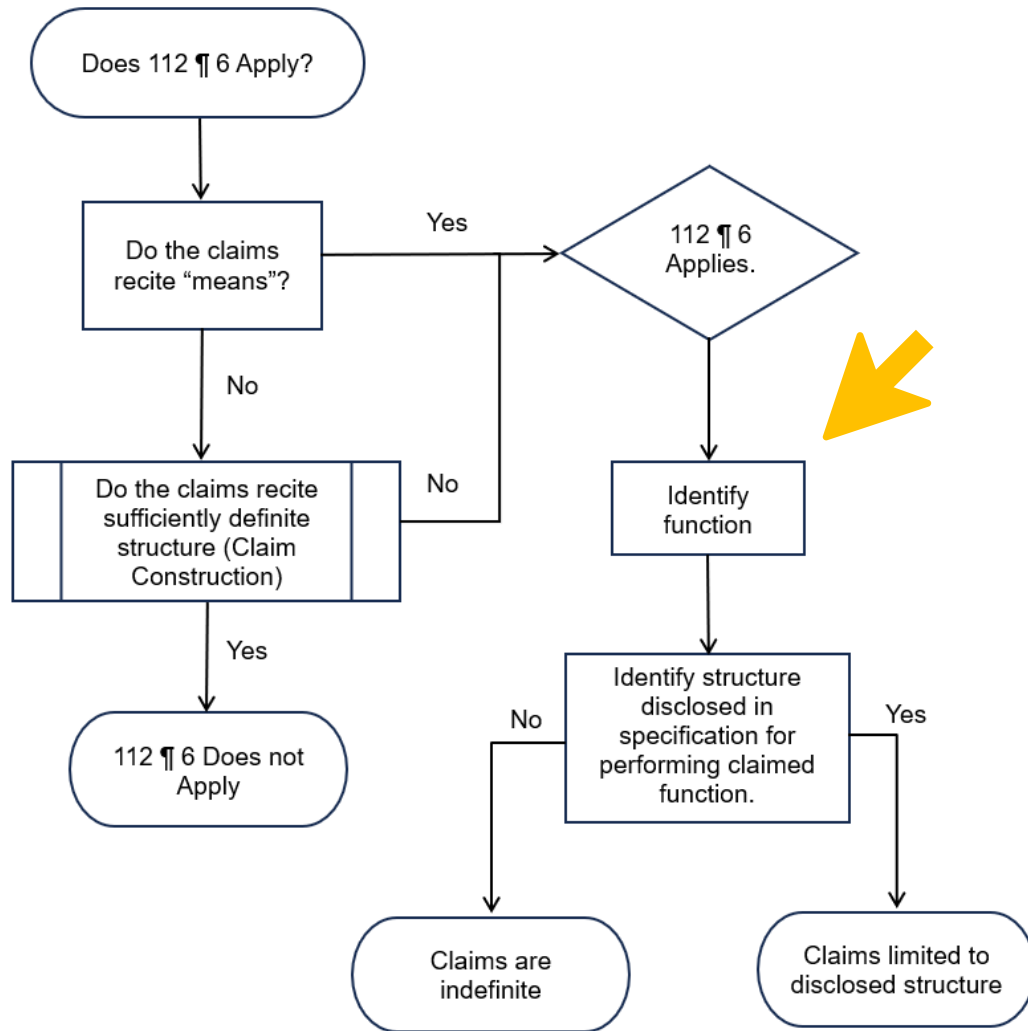


Identify Function – Enabling one or more of an application, a function, and a service

The invention claimed is:

1. A hybrid device comprising:

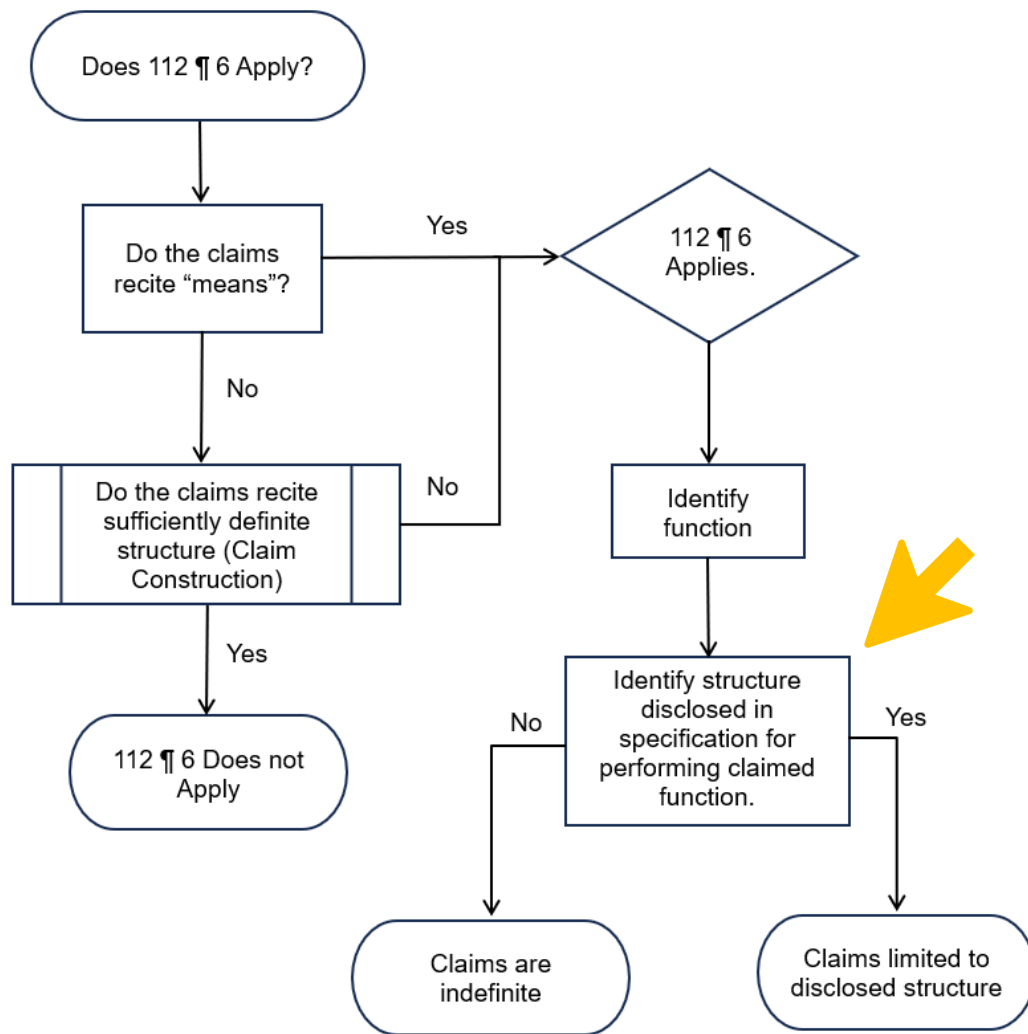
an integrated personal digital key (PDK) for storing information and capable of communicating wirelessly with at least one external receiver-decoder circuit (RDC); and an integrated RDC for communicating wirelessly with at least one external PDK within a proximity zone, the integrated RDC coupled to the integrated PDK by a first signal line for communication, the integrated RDC coupled to at least one other component of the hybrid device by a second signal line, one or more of the integrated RDC and integrated PDK enabling one or more of an application, a function, and a service on one or more of the hybrid device and a device associated with the external RDC.



Identify Function – Enabling one or more of an application, a function, and a service

10. A method comprising:
creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service on one or more of the hybrid device and a device associated with an external RDC; and
sending the enablement signal to one or more of the hybrid device and the device associated with an external RDC.

Claims at Issue

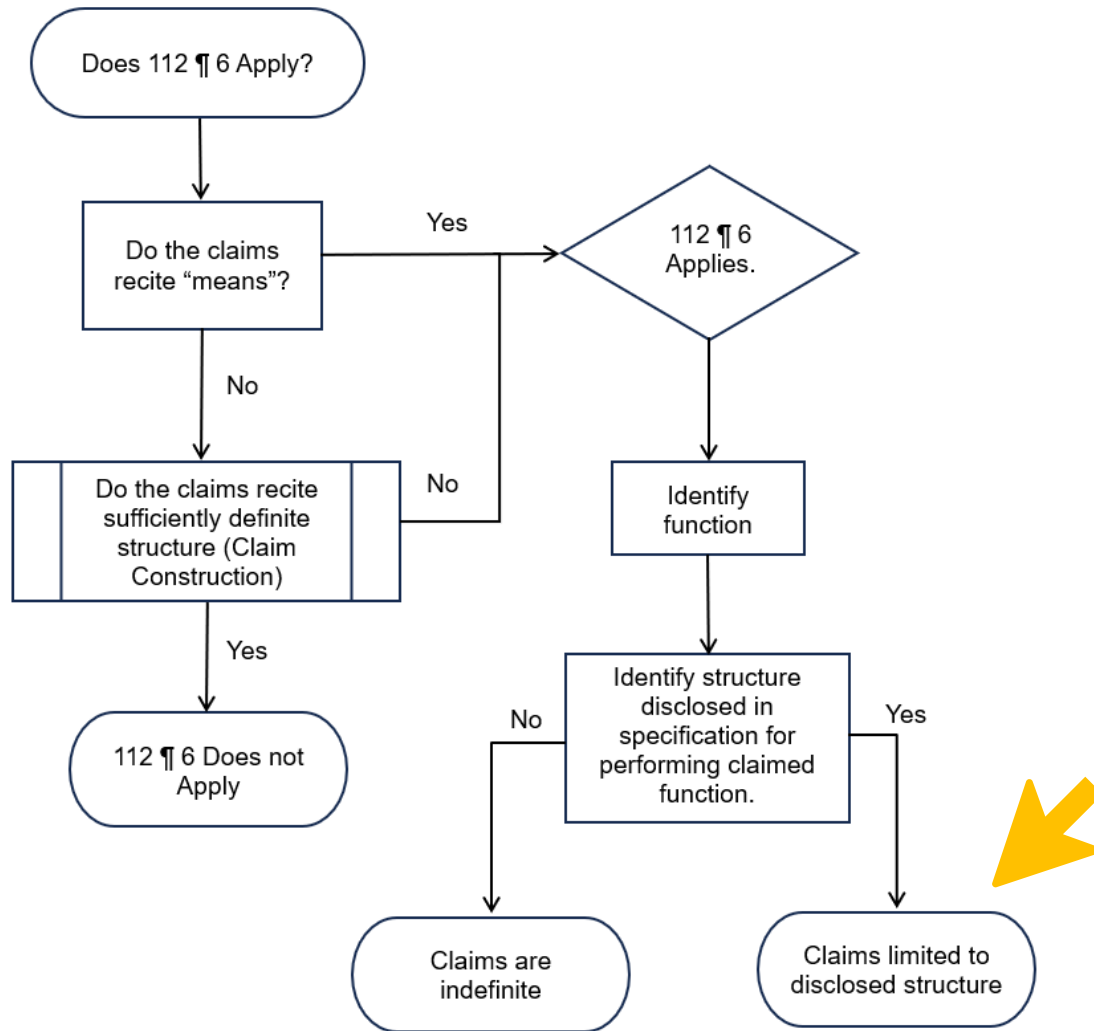


Structure / Algorithm Disclosed in Specification

Regardless of how created, once created, **external applications (such as applications 120 in FIG. 1) can gain access to a specific service block 112 by proving the corresponding access key 118.** In FIG. 2, this is shown conceptually by control logic 250. The wireless application 260 on the PDK 102 communicates to the sensor (not shown in FIG. 2) via transceiver 270. The wireless application provides a service block select 226 and **a service block access key 118 in order to store, retrieve and/or modify data in a service block 112.** The selector 252 selects a service block 112 based on the select signal 226 and the access key 118. The encryption engine 254 encrypts/decrypts data 228 flowing to/from the service block 112 based on the access key 118 (or some other key generated based on the access key, for example a session key). In an alternate method, **the service block 112 may be selected based on the service block access key 118,** eliminating the need for a separate select signal 226.

042 Patent, 6:23-39 (emphasis added).

Claims at Issue



Structure / Algorithm Disclosed in Specification

“[O]ne or more of the *integrated RDC* and *integrated PDK enabling one or more an application, a function and a service.*’ An application, function, or service is ‘enabled’ by a PDK when it *receives information from a PDK in exchange for an access key.* Similarly, an RDC ‘enables one or more of an application, a function, and a service’ *when it forwards such a message to the application, function, or service.*”

Ex. 2002, at 26.

Nearly Identical Claims Construed by District Court

The invention claimed is:

1. A hybrid device comprising:

an integrated personal digital key (PDK) for storing local, secured biometric information for authenticating a user and capable of communicating wirelessly with an external receiver-decoder circuit (RDC); and
an integrated RDC for communicating wirelessly with at least one external PDK within a proximity zone, the integrated RDC coupled to the integrated PDK by a first signal line for communication, the integrated RDC coupled to at least one other component of the hybrid device by a second signal line, one or more of the integrated RDC and integrated PDK enabling one or more of an application, a function, and a service.

U.S. Patent No. 9,049,188
(Family Member)

The invention claimed is:

1. A hybrid device comprising:

an integrated personal digital key (PDK) for storing information and capable of communicating wirelessly with at least one external receiver-decoder circuit (RDC); and
an integrated RDC for communicating wirelessly with at least one external PDK within a proximity zone, the integrated RDC coupled to the integrated PDK by a first signal line for communication, the integrated RDC coupled to at least one other component of the hybrid device by a second signal line, one or more of the integrated RDC and integrated PDK enabling one or more of an application, a function, and a service on one or more of the hybrid device and a device associated with the external RDC.

042 Patent

Nearly Identical Claims Construed by District Court

10. A method comprising:

creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC, wherein the integrated PDK stores local, secured biometric information for authenticating a user;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service.

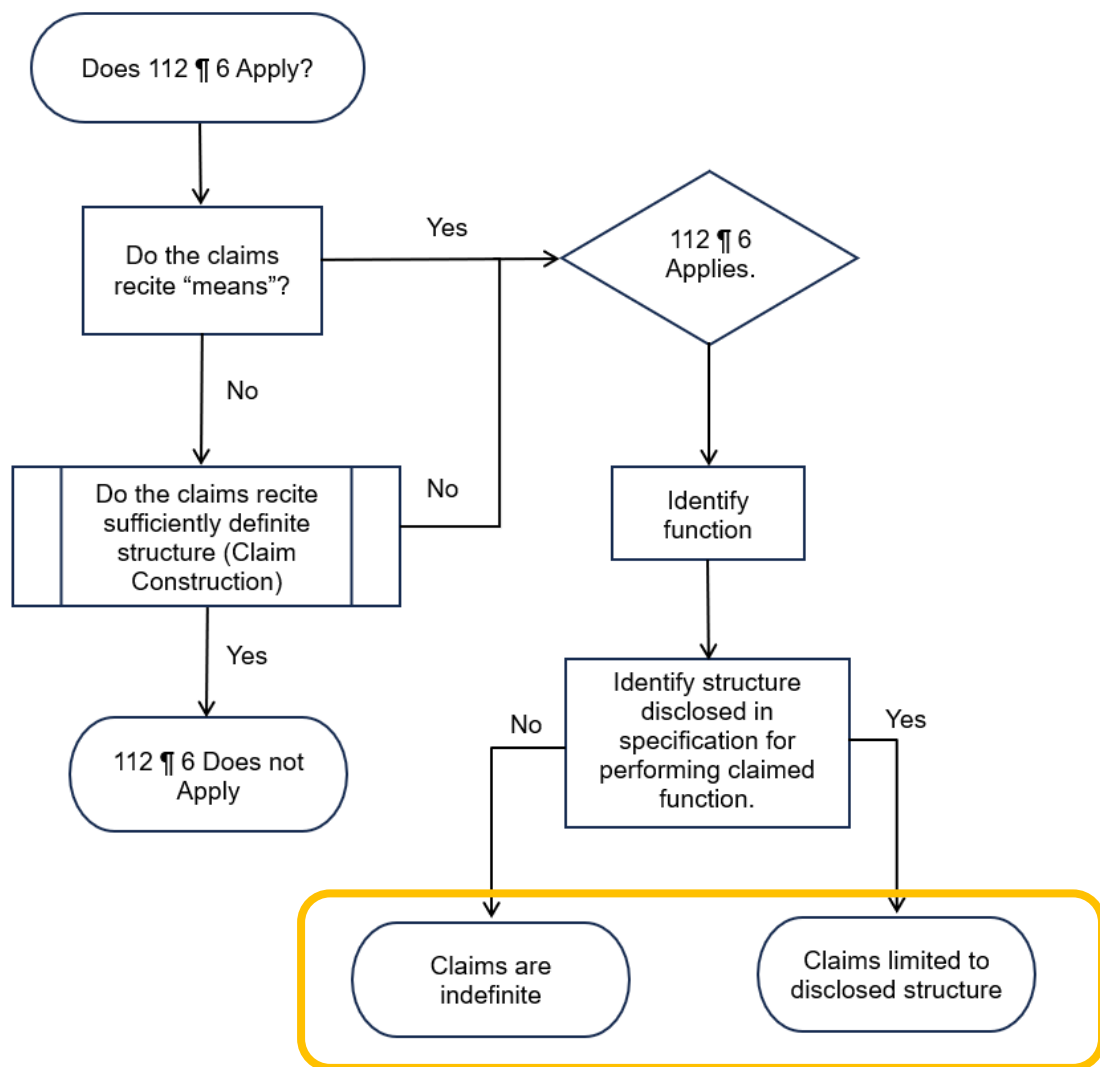
U.S. Patent No. 9,049,188

10. A method comprising:

creating a first wireless link between an integrated receiver-decoder circuit (RDC) of a hybrid device and an external personal digital key (PDK), the hybrid device including an integrated PDK and the integrated RDC;
receiving a first signal at the integrated RDC via the first wireless link from the external PDK;
generating an enablement signal enabling one or more of an application, a function and a service on one or more of the hybrid device and a device associated with an external RDC; and
sending the enablement signal to one or more of the hybrid device and the device associated with an external RDC.

042 Patent

Nearly Identical Claims Construed by District Court



Addressing Indefiniteness Requires Construing the Claim

"And finally, if the patentee fails to disclose adequate corresponding structure, the claim is indefinite."

Rain Computing v. Samsung Electronics America, 989 F.3d 1002, 1007 (Fed. Cir. 2021)

Construction Was with Respect to PDK and RDC

Claim Term	Plaintiff's Proposed Construction	Defendant's Proposed Construction	Court's Final Construction
"Hybrid device" (188: 1-12, 15, 20; 700: 1-13, 16)	A device comprising an integrated personal digital key (PDK) and an integrated receiver-decoder circuit.	Indefinite	A device comprising an integrated personal digital key (PDK) and an integrated receiver-decoder circuit.

Ex. 2002, at 25

The District Court considered whether the combination of ***PDK and RDC*** for performing the function of ***enabling one or more of an application, a function, and a service*** was indefinite.

The Board Should Not Overrule the District Court

“[O]ne or more of the ***integrated RDC*** and ***integrated PDK enabling one or more an application, a function and a service.***’ An application, function, or service is ‘enabled’ by a PDK when it ***receives information from a PDK in exchange for an access key.*** Similarly, an RDC ‘enables one or more of an application, a function, and a service’ ***when it forwards such a message to the application, function, or service.***”

Ex. 2002, at 26.

- The District Court’s construction is binding on Patent Owner
 - Patent Owner cannot challenge the District Court’s Construction
 - Patent Owner presented consistent infringement contentions. See Paper 19, 1-5
- Neither Apple or Microsoft challenged the construction during *Markman* hearings.
- Apple and Microsoft now asks this Board to overrule the District Court.