

ID5



Catalogue by ID5 Offices and Summary of User Sessions

Protection of Digital Design in Metaverse

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Introduction

With the rapid growth of industries related to virtual spaces like the “Metaverse”, virtual products and services are becoming increasingly similar to those provided in reality, and various types of digital designs continue to emerge. For example, on Metaverse platforms, we can decorate our own avatar with digital items which are very similar to real ones in the metaverse platform, or we can extend our business activities to a virtual space which is digitalized based on a real building and interior decoration.

On the other hand, digital designs within the metaverse do not need to be functionally perfect, and can go beyond real-world user needs. For example, few users in the real world would want to buy shoes with wings, but in the metaverse, they can. This opens up endless creative possibilities for unique shapes that would never be seen in the real world.

Despite their growth potential and value, such digital designs are not yet protected under current legislation or practices in many jurisdictions. In particular, digital designs in the metaverse do not presuppose physical or tangible objects, presenting so we are faced with very challenging cases where traditional drawing requirements or requirements for registration are difficult to apply. As the Metaverse is likely to be created regardless of national border intergovernmental discussions to harmonize practices are necessary.

This project compares the current status of protection provided to digital designs in the Metaverse, so that ID5 Offices can identify a direction and make a recommended practice in the long run. However, it may be different from case to case and more complicated than the examples we have gathered here.

Below, we summarized the responses from 5 offices and the key issues discussed in the 2023 ID5 user sessions. This case study aims to provide and understand information on the systems of the Partners and has no legal binding power. However, we believe there is a value in simulating the legal issues that are likely to arise between the virtual world and the real world.

A. Current Laws/Regulations and Practices of ID5 Offices

A.1 Definition, Classification and Forms of views

A.1.1 Related Terminology or Definition in Laws and Regulations

“What types of designs are Virtual/Digital Design?”

[CNIPA] There is no definition of "virtual" or "digital" design in design-related laws and regulations in CNIPA.

[EUIPO] The following are examples of what are considered to be virtual/digital designs:

Ex) Icons (static and dynamic), Animated characters, Holograms, Displays, Projections, Videogames, Virtual interfaces, Voice user interfaces, Virtual spaces

[JPO] Virtual/digital designs are not legally defined in Japanese laws and regulations.

[KIPO] There is no definition of "virtual" or "digital" design in the design-related laws and regulations in Korea. In the "Design Protection Act," however, we put the definition of "image" in 2021, through which digital designs are not necessarily applied to a physical product any longer. The term "image" means a figure, symbol, etc. expressed by digital technology or electronic means [limited to those that are used for operation of devices or that exhibit a function, and including parts of an image] (Article 2 (Definition) 2-2. of the Design Protection Act)

[USPTO] There is no definition of “virtual” or “digital” design in the laws or regulations of the USPTO.

Relevant Laws and Regulations regarding Digital Designs in your country/region

[CNIPA] 4.5 chapter 3 part1 of Guidelines for Patent Examination.

[EUIPO] Currently we have no definition of virtual/digital designs in our law, regulation or guidelines but we are currently undergoing a legislative reform. Please see the proposed change in the definition of a design in Article 4 of the draft Amending Regulation¹:

“For the purposes of this Regulation, the following definitions apply:”

(1) ~~(a)~~ “design” means the appearance of the whole or a part of a product resulting from the features of, in particular the lines, contours, colours, shape, texture, ~~and/or~~ ~~and/or~~ materials of the product itself and/or of its ~~ornamentation~~ decoration, including the movement, transition or any other sort of animation of those features;

(2) ~~(b)~~ “product” means any industrial or handicraft item other than a computer program, regardless of whether it is embodied in a physical object or materialises in a non-physical form, including inter alia:

(a) packaging, sets of articles, spatial arrangements of items intended to form an interior or exterior environment, and parts intended to be assembled into a complex product,

(b) ~~packaging, get-up;~~ graphic works or symbols, logos, surface patterns, and typographic typefaces, and graphical user interfaces ~~but excluding computer programs;~~

[JPO] “Graphic Image”- Article 2 of the Design Act

Article 2 of the Design Act:

The term "design" in this Act means the shape, patterns or colors, or any combination thereof (hereinafter referred to as the "shape or equivalent features"), of an article (including a part of an article; the same applies hereinafter); the shape or equivalent features of a building (including a part of a building; the same applies hereinafter); or a graphic image (limited to one used in the operation of a device or displayed as a result of the device performing its function, and including a part of a graphic image; hereinafter the same applies excluding paragraph (2) of the following Article, Article 37, paragraph (2), Article 38, items (vii) and (viii), Article 44-3, paragraph (2), item (vi) and Article 55, paragraph (2), item (vi)), which is aesthetically pleasing in its visual presentation.

1 For further information on the reform please visit the European Commission website:

https://single-market-economy.ec.europa.eu/industry/strategy/intellectual-property/industrial-design-protection_en.

[KIPO] “Image” - Article 2 (Definition) 2-2 of the Design Protection Act

[USPTO] The relevant laws and regulations in the USPTO are the same for all designs, including virtual/digital designs.

- 35 U.S.C. 171(a): “Whoever invents any new, original, and ornamental design for an article of manufacture may obtain a patent therefore, subject to the conditions and requirements of this title.”
- A claim to a picture, print, impression, etc. per se, that is not applied to or embodied in an article of manufacture should be rejected under 35 U.S.C. 171 as directed to non-statutory subject matter. See MPEP 1504.01.
- The USPTO considers the term “icon” as indicating that the design is not merely a displayed picture, but an integral and active component in the operation of a programmed computer displaying the design. See *Ex parte Strijland*, 26 USPQ2d 1259 (Bd. Pat. App. & Int. 1992).
- Therefore, the USPTO considers designs for computer-generated icons embodied in articles of manufacture to be statutory subject matter eligible for design patent protection under 35 U.S.C. 171. See MPEP 1504.01(a), subsection I.

Example of design that complies with 35 U.S.C. 171



Title: Computer display screen with icon

Claim: The ornamental design for computer display screen with icon as shown and described.

Description: The broken lines showing a portion of the computer display screen form no part of the claimed design.

A.1.2 Classifications for Digital Designs

“What classification code does your office give to an application such as virtual/digital designs? or Do you have any special mark related to digital design?”

[CNIPA] The classification is 14-04.

[EUIPO] The examiner relies on the product indication provided by the applicant, and ensures that this coincides with the design, and classifies it accordingly.

- If the design is of a shoe, and the product indication is graphic symbols in class 14-04, we would accept that the shoe is a digital design of a shoe for use in a virtual environment.
- If the product indication was footwear, we would accept in class 02-04.
- Animated images depicted in a sequence of snapshots are icons/screen displays/GUIs are classified in 14-04
- Static images (designs with one view) can be in 14-04 or in 32-00, the applicant decides on the indication
- Designs with one view of a screen display are in 14-04.

[JPO] In Japanese Design Classification, "N3" (equivalent to Locarno Class 14-04)) is assigned to "a graphic image" that is separate from the article. Where "a graphic image" is included in the article, and the claimed part also includes other parts besides the image displaying part, an article classification with "W" is assigned.

[KIPO] If the design is not applied to a physical product, the classification should be 14-4. There is no mark related to digital design.

[USPTO] If the claim is a display screen, computer screen, monitor, other display panel, or a portion thereof with an icon or GUI it would be classified in USPC D14/485-495 (Locarno Class 14-04). There is no special mark related to digital design.

A.1.3 Forms of Views for Digital Designs

“What kind of forms of views digital designs present themselves in? Can it sufficiently indicate interaction function or details of a digital design just in form of views?”

[CNIPA] Applicants can submit drawings in the same way as for designs applied to physical products.

[EUIPO] Our Regulations only allow the representation of a design to be in static views, up to a maximum of 7. We allow a sequence of snapshots as a means of indicating the interaction of the functions or details of the digital designs. Snapshots are a short sequence of views used to show a single animated design at different specific moments in time, in a clearly understandable progression.

In principle, according to the Common Practice (CP6), all views of an animated icon or graphical user interface need to be visually related, which means that they must have features in common. It is the applicant's responsibility to order the views in such a way as to give a clear perception of the movement/progression.

[JPO] Presented in drawings or photographs (same procedure for standard filing of applications for design registration applies) No limitations to number of drawings, but the image size of 200 MB or smaller per application is required.

[KIPO] In filing a digital design application, applicants can still submit drawings in the same way as for designs applied to physical products. 3D file (IGES, OBJ, STP, STL) is also available.

[USPTO] In filing a “virtual” or “digital” design application, applicants can submit drawings in the same way as for designs applied to physical products. Views cannot indicate interaction function. The description, e.g., title, claim, and/or descriptive statement, must indicate interaction function.

“Are there any potential or promising forms can be accepted by your office? Such as video files?”

[CNIPA] Applicants can submit video files as explanatory views if it is necessary.

[EUIPO] Drawings, photographs (except slides), computer-made representations or any other graphical representation are accepted, provided they are suitable for reproduction, including on a registration certificate in paper format.

On the basis of the current legislation set out in Article 36(5) CDR and Article 4 CDIR, 3D computer-animated design generating motion simulation can only be considered as an additional technical means of viewing the design and does not replace conventional static views. CD-ROMs and other data carriers are not accepted.

[JPO] N/A

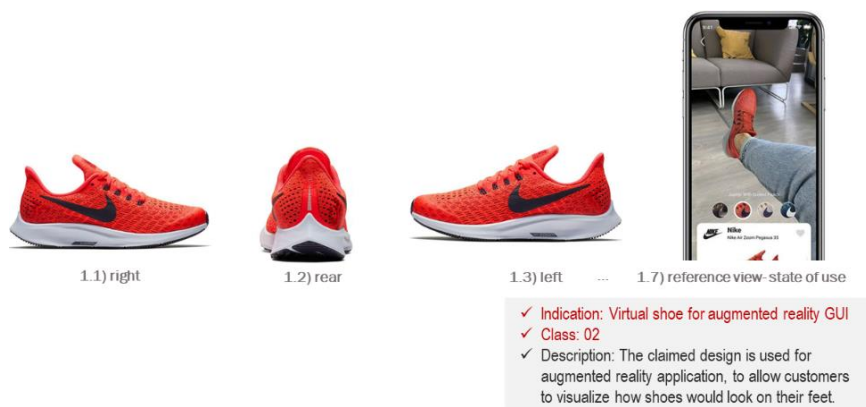
[KIPO] Applicants can submit video files (swf, mpeg, wmv, gif, avi) as supplementary views.

[USPTO] For domestic filings, images or representations may be filed electronically in .pdf format or filed in traditional paper filing format. In most circumstances, the maximum file size is 25 MB. For international design applications filed under the Hague Agreement, the USPTO accepts .pdf and .jpeg files, as well as paper filings. The USPTO does not accept video files.

A.2 Subject matter of Digital Designs for VR/AR items

A.2.1 Only the Digital Designs itself

“Can the following design of “Virtual shoe for augmented reality GUI” be registered? If not, what would a ground of refusal be?”



<Nike Air Zoom Pegasus 35>²

[CNIPA] No. Virtual product can not be protected in CNIPA at current stage.

[EUIPO] Yes. However, the product indication and classification would be changed ex officio to Graphic symbols for screen display in class 14-04.

[JPO] Cannot be registered. According to the information provided at this point, it is not clear whether the design is a graphic image for operation or display.

[KIPO] No. ‘virtual shoe’ is not an acceptable indication. classification should be amended to 14-04. And the title should be amended to ‘GUI(or icon) for virtual fitting.

[USPTO] As presented, the design is not patentable, it would be rejected for failing to comply with the article of manufacture requirement of 35 U.S.C. 171.

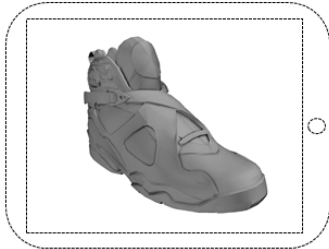
Maybe : If descriptive statements explaining the broken lines and the transitional nature of the design are provided and the application complies with the relevant USPTO statutes and regulations

² Nike Air Zoom Pegasus 35, image courtesy of wannaby,

<https://www.designboom.com/technology/wanna-kicks-augmented-reality-app-try-on-sneakers-01-31-2019/>

A.2.2 When the Product(or Article, device etc.) to be used is drawn or the Indication of product is titled with icon for VR/AR

“Are the following designs are protected through your system?”



“Mobile device with icon”
(Digital design on device)



“Icon for augmented reality”
(Digital design)

3

[CNIPA] Yes / No

[EUIPO] Yes / Yes

[JPO] Yes / Yes (limited to designs that fall under the graphic images for operation or display protected under the Japanese Design Act)

[KIPO] Yes / Yes (limited to designs that fall under the “image” protected under the Korean Design Protection Act)

[USPTO] Maybe (if a descriptive statement explaining the broken lines is provided and the application complies with the relevant USPTO statutes and regulations) / No

“If digital design is protected, are there any additional requirements that must be met, besides general requirements for design for physical product?”

[CNIPA] Digital design on device are eligible in CNIPA. For a GUI that can be applied to any electronic device, the product name should include the keyword to indicate the universal GUI

³ The example used in this report is a rendering image(3D modeling) of the Nike Air Jordan 8.

<https://www.nike.com/jordan/air-jordan-8>

<https://www.artstation.com/marketplace/p/70010/nike-air-jordan-8-shoes-low-poly>

design. Applicants can submit views of the GUI without indicating the device. The purpose of the product in brief description can be summarized as an electronic device.

[EUIPO] According to EUIPO practice there is no need for designs to be represented on a physical device. Our Regulation already allows for the protection of “graphic symbols” and there is no requirement for a link to a physical device. Our guidelines allow for the protection of screen displays, icons, graphic user interfaces and other kinds of visible elements of a computer program. Please see here: <https://guidelines.euipo.europa.eu/2058424/1926295/designs-guidelines/4-1-3-icons--graphic-user-interfaces-and-the-like>

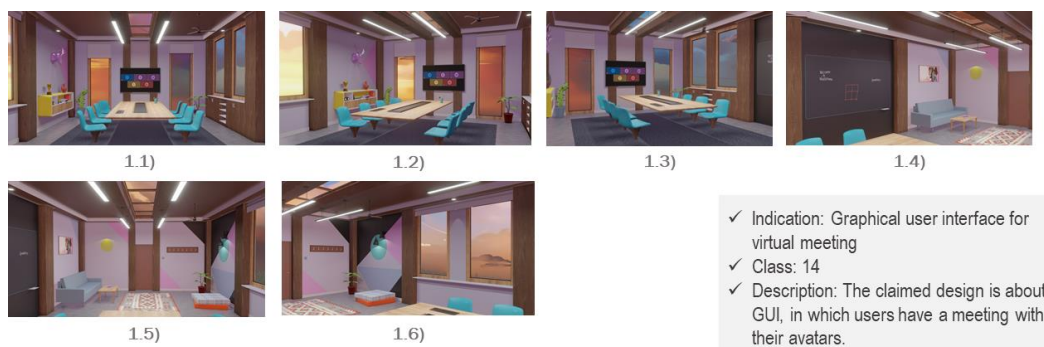
[JPO] Article 2 of the Design Act

[KIPO] A digital design should be used for the operation of devices or exhibit a function. In other words, to be an eligible digital design protected under the "Design Protection Act" in Korea, it must be based on functionality. An applicant should indicate it using description of design or product indication.

[USPTO] The USPTO considers designs for computer-generated icons embodied in articles of manufacture to be statutory subject matter eligible for design patent protection under 35 U.S.C. 171.

A.2.3 Digital designs for VR Space

“Can the following design of "GUI for virtual meeting" be registered? If not, what would a ground of refusal be?”



<Metaverse Workroom Low-poly 3D model>⁴

[CNIPA] Maybe. Combination of the indication, views and brief description is needed to make a decision. The GUI seeking for design patent protection should be applied to a physical product and complies with the requirements of relevant regulations.

[EUIPO] Yes. The representation would be acceptable for registration. The product indication would be changed to Graphical user interfaces in Class 14-04

[JPO] Maybe. Cannot decide whether to register according to the information provided at this point, for it is not clear whether the design is a graphic image for operation or display. If it becomes clear through written opinions etc. that the design is a graphic image for operation or display, there is the possibility that the design may be protected.

[KIPO] Yes. If design of the whole space is fully disclosed by submitted drawings, it can be registered.

[USPTO] No. As presented, the design is not patentable. It would be rejected for failing to comply with the article of manufacture requirement of 35 U.S.C. 171.

Maybe. If descriptive statements explaining the broken lines and the transitional nature of the design are provided and the application complies with the relevant USPTO statutes and regulations

* class(if complies with 35 U.S.C. 171) : D14/485 (Locarno 14-04)

⁴ Cgtrader, Metaverse Workroom, <https://www.cgtrader.com/3d-models/architectural/other/metaverse-workroom>

A.3 Animated GUI (Transitional/Sequential or Moving Images)

A.3.1 Case including Interactions with the user

“Can the following design of "Computer screen with animated GUI" be registered?

If not, what would a ground of refusal be?”



- ✓ Indication: Animated GUI (or, Mobile device with animated GUI)
- ✓ Class: 14
- ✓ Description: The feature of this design is that the cloud-shape icon changes according to the state of the lower bar when it is slid.

<Screenlane, Breeze Track mood>⁵

[CNIPA] Yes. (Variation processes of the animations for interaction should be defined)

[EUIPO] Yes. The representation would be acceptable for registration. The product indication would be changed to Graphical user interfaces in DesignClass. According to EUIPO guidelines and the Common Practice CP6, all views of an animated icon or graphical user interface need to be visually related, which means that they must have features in common. It is the applicant's responsibility to order the views in such a way as to give a clear perception of the movement/progression.

[JPO] Can be registered. By comprehensive determination on Description and Reproductions, it can be found to be a design of a graphic image either for operation or display.

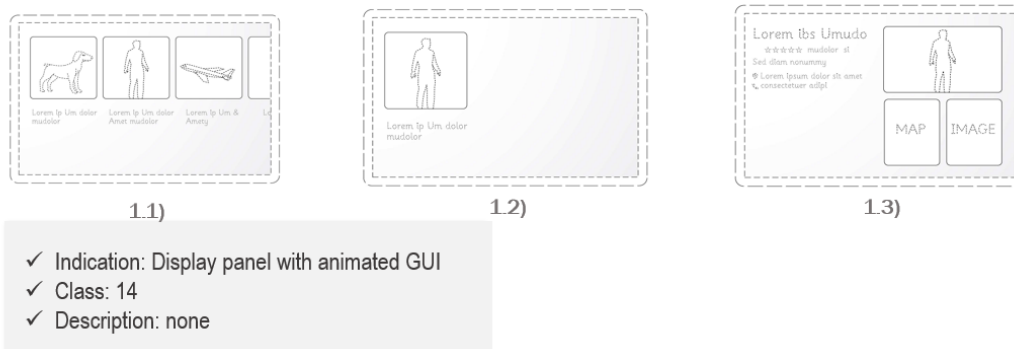
[KIPO] Yes, it can be registered as "Animated GUI."

[USPTO] Maybe. (If descriptive statements explaining the broken lines and the transitional nature of the design are provided and the application complies with the relevant USPTO statutes and regulations)

⁵ Screenlane, Breeze Track mood, <https://screenlane.com/screen/breeze-ios-app-265/>

A.3.2 Case where the transition(or progression) is not clear

“Can the following design of "Display panel with animated GUI" be registered? If not, what would a ground of refusal be?”



<modified case of registered design, KR30-1016157>

[CNIPA] Maybe. Combination of the indication, views and brief description is needed to make a decision. Multi-layer GUI design per se is eligible in CNIPA. (Variation processes of the animations for interaction should be defined)

[EUIPO] The product indication would be changed to Graphical user interfaces in DesignClass. (All views of an animated icon or GUI need to be visually related, which means that they must have features in common)

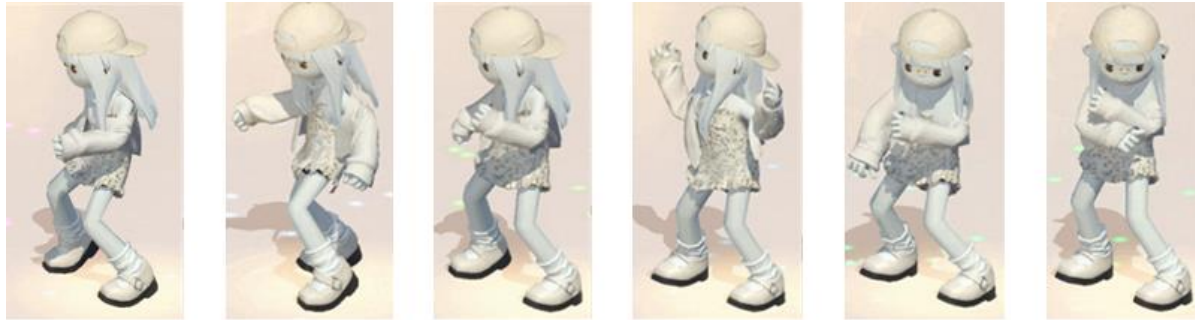
[JPO] Cannot decide whether to register according to the information provided at this point, for it is not clear whether the design is a graphic image for operation or display. If it becomes clear through written opinions etc. that the design is a graphic image for either case, the design can be protected. (All views should be for the same function or visually related)

[KIPO] Animated GUI design should represent the identical sequence in each drawing, which is not the case in the following design. It will be considered as not complying with 1 design for 1 application. (Design Protection Act, Article 40(1)). Through a request for reexamination, Fig 1.1 and 1.2 were recognized as a single application with animated GUI.

[USPTO] Maybe. (If descriptive statements explaining the broken lines and the transitional nature of the design are provided and the application complies with the relevant USPTO statutes and regulations) * class : D14/488 (Locarno 14-04))

A.3.3 Animated designs for VR space

“Can the following design of “Animated icon for VR space” be registered? If not, what would a ground of refusal be?”



1.1)

1.2)

1.3)

1.4)

1.5)

1.6)

- ✓ Indication: Animated icon for virtual reality space
- ✓ Class: 14
- ✓ Description: The claimed design serves as an icon for displaying emotions or feelings of users.

<Bondee>⁶

[CNIPA] Maybe. Combination of the indication, views and brief description is needed to make a decision. The GUI seeking for design patent protection should be applied to a physical product and complies with the requirements of relevant regulations. However, the animated icon with limited actions may not be the original intention of the applicant to request design protection.

[EUIPO] Yes. The representation would be acceptable for registration. The product indication would be changed to icons, or graphic symbols for screen displays in class 14.04

[JPO] Can be registered. By comprehensive determination on Description and Reproductions, it can be found to be a design of a graphic image for operation or display.

[KIPO] Yes. It can be registered. (The relevance of form and the consistency of change should be represented through submitted views and/or description)

[USPTO] No. As presented, the design is not patentable. It would be rejected for failing to comply with the article of manufacture requirement of 35 U.S.C. 171.

* class(if complies with 35 U.S.C. 171) : D14/495 (Locarno 14-04)

⁶ Bondee, <https://bondee.com/main>

“If it is eligible for design protection, does it mean the overall avatar figure is protected? Or does it just mean that the animated icon with limited actions is protected?”

[CNIPA] If it is applied for physical products, the animated icon with limited actions could be protected. However, the animated icon with limited actions may not be the original intention of the applicant to request design protection.

[EUIPO] The avatar may also be protected. Article 19 CDR states that the rights conferred by a Community design is to use it and to prevent third parties from using it. It goes on to say what that use covers. The use of "in particular" in the definition would indeed imply that the list is not exhaustive and so we could conclude that other types of use, such as using a product in which the design is incorporated, even if that product is virtual, in an online virtual environment would also constitute such use.

[JPO] Protected as a design for animated icon, which is a dynamic image design accompanying a set of actions that evolve in the order of the views.

[KIPO] It protects the avatar with limited actions only.

[USPTO] N/A

A.3.4 Additional Representations for Digital Designs

“Does your Office accept representations from each view for a virtual car used for animated GUI, like a physical car?”



- ✓ Indication: Icon for automobile GUI
- ✓ Class: 14
- ✓ Description: The design serves as an icon for manipulating GUI for cars.

<Tesla Model 3>⁷

⁷ Tesla Model 3, <https://x.com/TeslaNewswire/status/1783943961511383502>

[CNIPA] It is more about subject of the protection rather than a matter of view representations.

[EUIPO] Yes.

[JPO] Yes.

[KIPO] Yes.

[USPTO] Yes. However, in this instance, the claim would be rejected for failing to comply with the article of manufacture requirement of 35 U.S.C. 171.

* class(if complies with 35 U.S.C. 171) : D14/492 (Locarno 14-04)

“Does your Office accept a 3D modeling file instead of representations from each view?”

[CNIPA] No.

[EUIPO] Our regulation currently only allows the filing of up to 7 static views. Our filing system allows a 3D file to be uploaded, and the snapshots taken from that 3D file, but the 3D file is not protected.

[JPO] No.

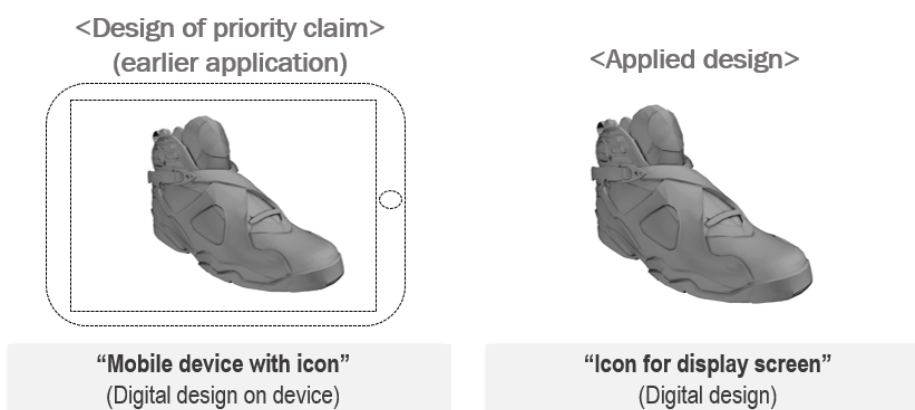
[KIPO] Yes.

[USPTO] No.

A.4 Issues for Substantive Examination(Priority, Novelty etc.)

A.4.1 Priority between Physical(Real world) Product and Digital item

“In case an applicant of "Icon for screen display" claims foreign priority based on an application of "mobile device with icon," would an examiner from your Office consider them substantively identical, enough to approve priority claim?”



[CNIPA] Same subject matter is the key principle when it comes to approval of priority at examination stage.

[EUIPO] N/A. Notwithstanding, according to EUIPO practice there is no need for designs to be represented on a physical device.

[JPO] In this case, the effect of the priority claim cannot be obtained at JPO, since the design in the application needs to be identical to the design filed with the first Office.

[KIPO] It may not be approved. In principal, for a priority claim to be approved, both the article and the shape must be identical in order to be treated as the same design.

[USPTO] If the conditions as specified in 35 U.S.C. 119 and 172 are satisfied, it may be reasonable for an examiner to determine that a “Display screen with icon” is entitled to the benefit of the filing date of a prior application of “mobile device with icon.” However, the reverse may not be true as it may be reasonable for an examiner to determine that “display screen” does not sufficiently support mobile device.

“If not approved, would the applied design be rejected due to the prior design?”

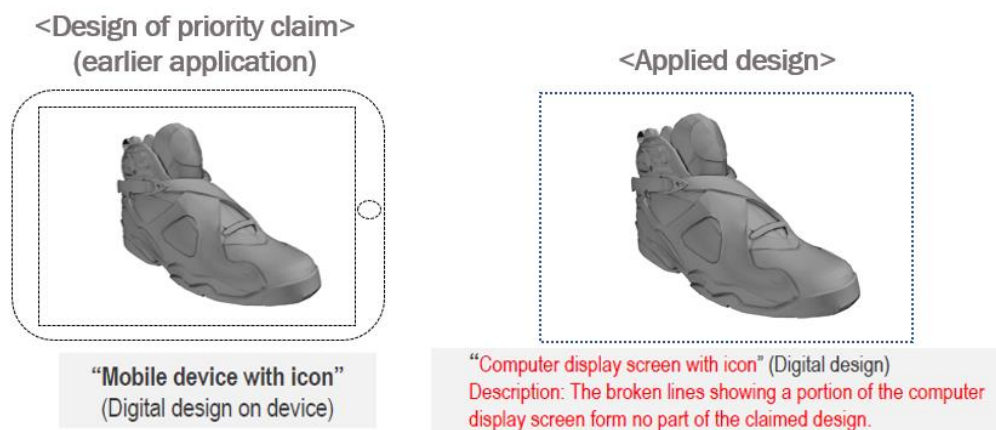
[CNIPA] If the design of priority claim is not disclosed before the filing date of application, the applied design could be patentable. Otherwise, it may be rejected that the applied design could easily be generated by the design of priority claim according to Article 23 Paragraph 2.

[EUIPO] The EUIPO only performs a formal examination of the priority requirements. The substantive requirements of a priority claim in respect of the contested RCD will be examined ex officio by the Office during invalidity proceedings when the outcome of the invalidity case depends on whether priority was validly claimed

[JPO] After the filing with the first Office, where an application which serves as a basis of priority claim is not disclosed before an application claiming priority is filed with JPO, JPO does not refuse the design in the application.

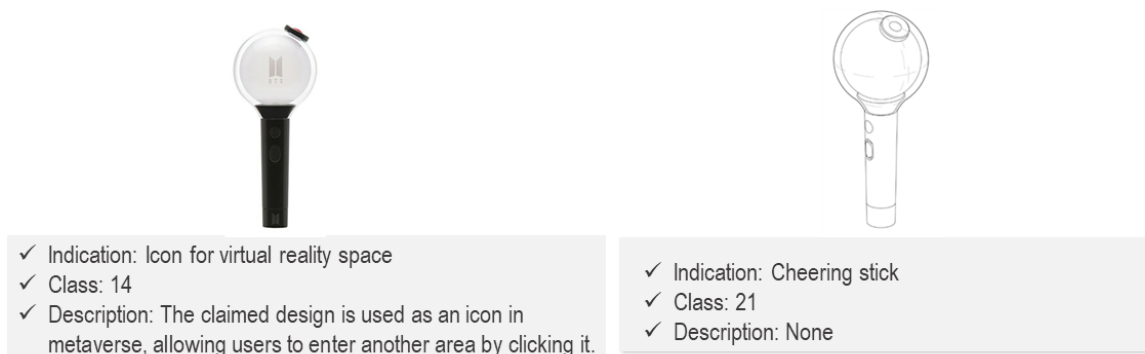
[KIPO] The two designs are applied to different products, so the priority claimed design does not diminish the novelty of the applied design. However, the applied design will be rejected as it could have been easily created by applying the priority claimed design. (Article 33(2) of the Design Protection Act)

[USPTO] If the prior design is available as prior art under 35 U.S.C. 102 (e.g., an exception does not apply), it may be reasonable for the examiner to determine that the claim should be rejected as anticipated under 35 U.S.C.102 and/or obvious under 35 U.S.C. 103.



A.4.2 Patentability between Physical(Real world) Product and Digital item

“Can the examiner reject this virtual design based on the physical product?”



<BTS Official Light Stick(left) and registered design KR 30-1077635 (right) >⁸

[CNIPA] Virtual product can not be protected in CNIPA at current stage.

The examiner will reject this design at the very first place under the Article 2.4 of the Patent Law

[EUIPO] Yes, in invalidity proceedings, provided sufficient evidence was provided to prove disclosure prior to registration

[JPO] Yes. There is a possibility that the design can be rejected due to lack of creative difficulty. When viewed from a specific angle, the icon in this example can be considered almost identical with a stick, which is a three-dimensional article. Additionally, if this stick was publicly known before the filing of the application of the icon design and so was the technique for using an icon based on a three-dimensional article for operation of entering another area in the metaverse, there is a possibility that a notification of reasons for refusal due to lack of creative difficulty will be issued.

[KIPO] Yes. The design will be rejected as it could have been easily created by applying the prior design.

[USPTO] Depends on Fact Finding (This is a developing issue in the US in view of a recent Federal Circuit decision (*In re SurgiSil, L.L.P.*, 14 F.4th 1380, 1382, 2021 USPQ2d 1008 (Fed. Cir. 2021)) and further case law may clarify the scope of this decision.)

⁸ BTS Official Light Stick, MAP OF THE SOUL, https://shop.weverse.io/en/shop/US_USD/artists/2/sales/14186



- ✓ Indication: Display screen with icon
- ✓ Class: D14/492 (Locarno 14-04)
- ✓ Description: The broken lines showing a portion of the display screen form no part of the claimed design.



- ✓ Indication: Cheering stick
- ✓ Class: D21/405 (Locarno 21-01)
- ✓ Description: None

“How about vice versa?”



- ✓ Indication: Shoe
- ✓ Class: 02



- ✓ Prior design: Item for avatar in metaverse

<Nike Air Max 2021 Venice>⁹

[CNIPA] Yes. It is rejected under the Article 23.2 of the Patent Law.

[EUIPO] Yes, in invalidity proceedings, provided sufficient evidence was provided to prove disclosure prior to registration

[JPO] Unless creative difficulty as a physical product is identified, the notification of reasons for refusal is likely to be issued.

[KIPO] Yes. It is rejected under the Article 33(2) of the Design Protection Act as well. (Easily creatable design)

[USPTO] See *In re SurgiSil, L.L.P.*, 14 F.4th 1380, 1382, 2021 USPQ2d 1008 (Fed. Cir. 2021)



- ✓ Indication: Shoe
- ✓ Class: D2/908 (Locarno 02-04)



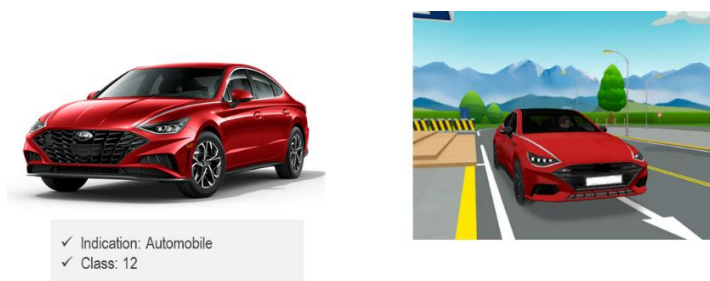
- ✓ Prior design: Item for avatar in metaverse
- ✓ Class: D14/492 (Locarno 14-04)

⁹ Nike Air Max 2021 Venice, NIKELAND on ROBLOX,

<https://www.sneakerfreaker.com/news/nike-roblox-nikeland-world-metaverse-info/>

A.5 Scope of Protection of Design rights about Metaverse items

“Can a holder of right to the "automobile" design claim infringement against unauthorized use of the identical design in metaverse?”



< HYUNDAI MOTORSTUIO x ZEPETO >¹⁰

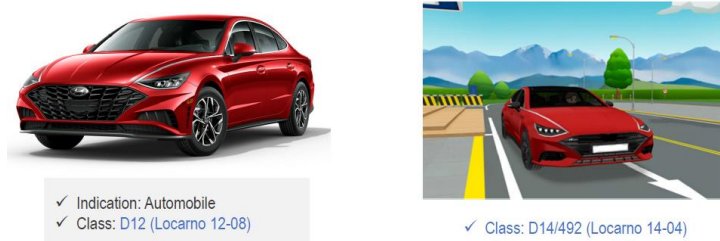
[CNIPA] There is still no relevant judicial case. Discussion of necessity and possibility of design protection regarding digital design in metaverse are significant.

[EUIPO] Infringement proceedings are outside the competence of the EUIPO.

[JPO] Under the current Japanese legal system, we would have to say it is unlikely that an injunction against unauthorized use of the identical design used in the Metaverse claiming infringement of the design right for a physical product would be granted.

[KIPO] No. The owner of a design right shall have the exclusive right to work the registered design or any similar design commercially (Art.92 Effects of Design Rights) If both of articles are different, they are not treated as similar in design, even if they are similar in shape.

[USPTO] The USPTO does not take positions on infringement. However, we are aware of a district court decision, P.S. Products, Inc. v. Activision Blizzard, Inc., 140 F.Supp. 3d 795, 801-03 (E.D.Ark. 2014), holding that no reasonable person would purchase defendants’ video game believing that they were purchasing plaintiff’s product.



¹⁰ HYUNDAI MOTORSTUIO X ZEPETO

<https://web.zepeto.me/ko/detail/Ia4nC39nx8Cs0aeLDk868CG?referrer=search>

B. Issues raised by Users in 2023 ID5 User Sessions

B.1 Various forms of “Metaverse” and its features

ID5 user session was successfully held on 15th September 2023(Incheon, KR). The presentation titles and presenters are listed in the table below. Here's a summary of the key issues and suggestions raised during the User Sessions.

Presentation Title (Engaged office)	Presenter (Company or Organization)
Patent Protection for GUI design in XR space (CNIPA)	PICO
Digital Design Protection in Metaverse (JPO)	JIPA (Japan Intellectual Property Association)
	JPAA (Japan Patent Attorneys Association)
IP Rights and Metaverse (EUIPO)	AIPPI (International Association for Protection of Intellectual Property)
Digital Design Protection in Metaverse (KIPO)	NEWJAK

Metaverse is now being used not only for Game, but also for Social Activities, Online Collaboration, Simulation & Design, Creator Economies, and more. While the types are diverse, they all share the common goal of providing new experiences by blending real and virtual spaces or virtual objects. The competitiveness of Metaverse contents/platforms depends on how seamlessly they represent these connections and interactions to enhance user experience. Throughout the presentation, we observed the following terms intermingled as major forms of Metaverse.

- **Virtual World** : A world that is distinguished from Reality, and constructed with Digital data.
- **Augmented Reality** : AR environment where virtual objects are expressed in 2D and 3D can be layered and interacted with Real World.
- **Mirror World(Digital Twin)** : A form that copies and reflects the Real World as it is, but adds expandability by grafting information.
- **Lifelogging** : Technology to capture, store and depict information about objects and people, allowing users to share information with other users.

B.2 Considerations for submitting drawings for VR(XR) GUI

Some users have prepared the following table about the differences between the GUI in VR(Virtual Reality)/XR(eXtended Reality) and the Traditional GUI. They raised the issue of how drawings can be represented effectively to protect the design of the metaverse.

GUI in VR(XR) Space	Traditional GUI
The interface elements and layout can be both in 3D	The interface elements and layout are both flat
The interface is not attached to any physical carrier	The interface is attached to a physical carrier, such as display screen
No boundary	Clear boundary

→ The GUI in virtual space is more similar to a physical object, rather than a flat, traditional GUI.

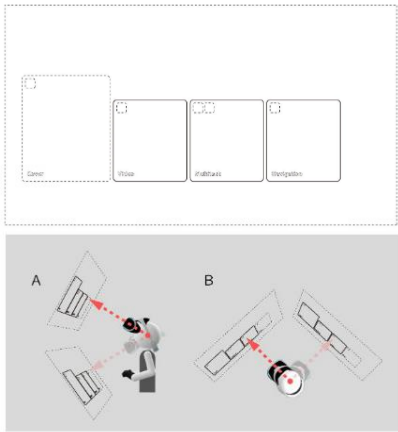

Layouts and elements of GUI in an VR/XR space can be 3-dimensional. Furthermore, the interface does not depend on physical devices and the VR/XR space itself has no boundaries. Traditional GUIs are designed by 2D graphical elements such as windows, icons and menus etc. Therefore, it was not difficult to represent their features in drawings with a single view and a few usage states.

However, GUIs used in XR space need to reflect the arrangement and relationships of multiple interface elements in the space through multiple views. Furthermore, multiple views from different perspectives or angles may not be different states of operation ; they can be just images of the same 3D spatial interface from different angles. A single view cannot effectively capture these features, so we need an alternative. Currently, this is done using perspective and projection or sometimes with additional reference diagrams. This will require future research on how to make effective applications.

B.3 Ambiguous Boundary about what is and isn't protected in Metaverse

Some countries exclude “contents”(or digital items/goods) in Metaverse from those to be protected by design rights. For example, in Japan and Republic of Korea, registerable digital designs are limited to those that are used for the operation of devices or that exhibit a function. If it's just an avatar's virtual costume or shoes without any interaction with the user, it may be difficult to be registered.

These restrictions on eligibility seem to stem from a concern to minimize overlapping with the copyright law and to maintain the legal interpretation of an article protected by the Designs Act. Thus, for protection of designs in the "metaverse" space by a design right, it is necessary to clarify the boundary between digital designs in Metaverse, which is protected and Contents(or digital items/goods) in Metaverse, which is excluded from protection.

JPD 1691956 (User Interface for selecting contents)	JPD 1715416 (Navigation display image for digital showroom)
 <p>The image shows a user interface for selecting contents. It features a grid of four rectangular buttons labeled 'Diner', 'Pizza', 'Kebab', and 'Margarita'. Below the grid, there are two diagrams labeled 'A' and 'B' showing a person interacting with a virtual environment using a handheld device, with red dashed lines indicating the interaction path.</p>	 <p>The image shows a navigation display image for a digital showroom. It consists of two panels, each displaying a perspective view of a virtual interior space with various rooms, corridors, and furniture, designed for navigation.</p>

Meanwhile, there needs to be a discussion on whether design rights for physical products in real world can extend to that in the metaverse. There are still no leading cases in each jurisdictions on whether design rights for existing physical products extend to digital designs in the metaverse.

When a physical product(shoes) in real world is converted to a digital item(virtual shoes) in Metaverse, the digital design for Metaverse cannot be registered as the design is already publicly known. Therefore, it may be difficult for the design right holder to acquire design rights or prevent the design used by any third party in Metaverse.

On the other hand, virtual spaces offer unlimited creative possibilities for product development without technical constraints. Various product forms can be created that would have been unthinkable for designers in the past. If someone else makes tangible products in the real world that is identical or similar to digital designs created for the metaverse and sells it commercially, there may not be sufficient protection for original creator.

In particular, The Metaverse platform also provides users with tools to easily create digital designs or virtual spaces. Therefore, copying between digital designs in Metaverse is fully expected. And this raises the question of what type of intellectual property rights are granted to the creation of a digital design and to whom they belong. Copyright is a likely candidate. There has

been a recent copyright dispute¹¹ over the reproduction of architecture a type of copyrighted work in games. However, it is questionable whether functional items such as shoes or smartphones that have been digitally transformed can be considered works of copyright.

The following questions were asked during user sessions. As you can see from the table below, even a functional product such as a shoe may be eligible for copyright if it is simplified into an icon(example 1) or artistically represented(example 2). However, it is very unclear whether a hyper-realistic depiction(example 3) of an actual product as it is sold, or a hyper-realistic 3D modeling of a virtual shoe(example 4) in a non-existent form would be eligible for copyright.

example 1(Icon) ¹²	example 2(NFT image) ¹³	example 3(item for Avatar) ¹⁴	example 4(virtual 3D item) ¹⁵
			

¹¹ Infringement Cases regarding Metaverse : usually accompanying copyright issues
 - Conseratorium Hotel case (pending) : The 5-star hotel in Amsterdam is reproduced in a game and appears bombed & damaged → Copyright infringement issue and damages to the reputation of the hotel.
 The software/computer program can be protected by copyright as literary work [Article 1(1) and (3) of the Software Directive 2009/24/EC]. Audiovisual display of the metaverse, such as music, voices, dialogues, character appearance, avatars, landscapes, icons, logos, UI, etc. my also be protected if they meet the originality requirement (the Confemel ECJ case)
 - Mango case (preliminary injunction decisions): The main issue at stake is the extent of the right of exhibition of the owner. (Court orders of 21/10/2022 & 28/10/2022 of the Commercial Court No.9 of Barcelona)
¹² Flaticon, Rugby, https://www.flaticon.com/kr/free-icon/shoes_5620714
¹³ Amongus-leviet99,
<https://opensea.io/assets/matic/0x2953399124f0cbb46d2cbacd8a89cf0599974963/82480267604232605>
¹⁴ ZEPETO (collaboration with GUCCI), <https://web.zepeto.me/ko>
¹⁵ vrism, <https://vrism.com/#products>

B.4 Available Legal Suggestions

Some audience members asked whether, for those jurisdictions that have not adopted Class 32 of the Locarno International Classification, it would be possible to amend the definitions in the Design Act and add a new Locarno Classification code.

While the legal system varies across jurisdictions, some user(JPAA) suggested several options under JP Design Act as follows ; (Each of these suggestions has its own limitations)

[Option 1] Expansion of Infringement Actions: Include acts conducted in Metaverse in the current scope of infringement. Imitating a design that has been registered in the real world into a virtual world constitutes an infringement of the design right.

Limitations) If digital items in Metaverse is not registered, it is essentially impossible to enforce design rights in the event that it is copied in the real world or copies of each other in the virtual world.

[Option 2] Expansion of “Designs” which can be protected through design rights: Remove the distinction between the real world and Metaverse, so that the scope of the design right can be expanded to Metaverse.

Limitations) It may not fit into the existing legal framework (e.g., in some countries, cars and car toys have been interpreted as not being similar articles enough to claim infringement)

[Option 3] Addition of “Design” Categories: Designs for Metaverse and the real world can be registered respectively.

Limitations) The burden of filing several applications for a design in physical form in the real world and for a digital design(items or goods) traded in the virtual world.

C. Conclusion

“If the last twenty years was amazing, the next twenty will seem nothing short of science fiction. The Metaverse is coming.”¹⁶ - Jensen Huang (CEO of NVIDIA)

The Metaverse is also a place where people interact. There are avatars acting on behalf of people, items to dress and decorate avatars, and places or buildings for avatars to interact and live. Digital items traded in the Metaverse are not intended to be manufactured, so the digital designs are part of a virtual world that can be shaped by the user's imagination. Each of these categories of creation represents someone's time and effort, and even in this world there may be people who make money by copying others' creations without permission.

Some users emphasized the need for international harmonization and ID5's leadership as the metaverse is a market that crosses national boundaries. They also elaborated on the need to clarify whether infringement between real and virtual worlds should be recognized for the healthy development of the market. Additionally, they reminded to actively reflect the opinions of users.

During the case study, it was very impressive to learn that digital designs in Metaverse have different characteristics from traditional GUI, so careful attention is needed when preparing drawings for design applications. It was also apparent that users wanted clarification of the scope of existing laws (what is and is not protected under current design laws), and the question of how to draw the line between digital design protected by design law and works protected by copyright was also very informative.

Thanks to the limitless human imagination, digital items traded within the Metaverse are being created in a way have never been seen before. The Metaverse platform is continuously evolving in various ways and should inspire further meaningful research in the future.

¹⁶ <https://www.ibc.org/trends/nvidia-the-metaverse-is-coming/6864.article>

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