Liabilities of virtual world developers as intermediary service providers: the case of Second Life

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Through a review of the EU and the US regulation and case law, this article discusses the extent to which virtual world developers can be held liable as intermediary service providers with regard to potentially infringing user-created and user-uploaded virtual items. Among many virtual worlds, this study focuses on Second Life, developed by Linden, as it allows user-created and uploaded contents, and offers services such as the Marketplace and LindeX exchange, which enable users and the developer to financially benefit from these contents. The article argues that, beyond mere game developers, virtual world developers such as Linden are intermediary service providers and may be liable with regards to user-created and uploaded content on their services. Within the scope of the EU regime, Linden is too active to benefit from the E-Commerce Directive's safe harbors. However, it should not be considered as an online content-sharing service provider within the scope of the DSM Directive because Second Life does not compete with other online content services for the same audiences. According to the comprehensive protection brought by the DMCA in the US, Linden can benefit from the safe harbors if it takes the necessary steps after becoming aware of specific infringing activity and fulfills the procedural measures listed in the act.

Keywords: copyright, intermediary liability, virtual worlds, Second Life, E-Commerce Directive, DMCA, DSM Directive

1 INTRODUCTION

Scholarly literature shows that intermediary liability is a more complex and less harmonized issue compared to primary liability in dealing with copyright infringements in different works.1 Throughout the years, both the role of intermediary service providers and the legal framework surrounding these providers have changed, arguably from a liability to a responsibility regime.2 This complexity has been exacerbated and become more visible in the case of virtual worlds, whose conceptualization, scope, and stakeholders have changed over the years and still vary greatly.

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With hundreds of millions of virtual world users around the world,³ participating in over 1000 active virtual worlds,⁴ and spending billions of US dollars,⁵ virtual worlds have substantial social and economic significance. Despite this significance, the concept of the virtual world is vague and sometimes can be confused with other platforms. The term is used for a variety of different services ranging from social worlds such as Second Life to massively multiplayer online role-playing games (MMORPGs) such as World of Warcraft.⁶ Taylor and Matteucci state that virtual worlds are ‘computer-based simulated environments which users access via an online interface and in which they can interact with other users and with the simulated environment’⁷. Similarly, Bartle asserts that virtual worlds are ‘computer-moderated, persistent environments through and with which multiple individuals may interact simultaneously’⁸. These definitions point to the complex nature of virtual worlds, which has been stressed by many scholars. Rogers underlines virtual worlds’ multifaceted nature and states that ‘they combine nearly every aspect of modern popular culture. Part video game, part chat room, part auction site, part social network, they are capable of fulfilling a wide range of user needs’.⁹ Some virtual worlds, especially those that fall in the category of massively multiplayer online role-playing games, such as World of Warcraft, conceptualize themselves as games and leave no space for user creativity with regard to virtual items. Everything inside these virtual worlds is created by the developer. Users cannot create anything new which might potentially infringe the exclusive rights of the copyright owner. However, non-game-oriented virtual worlds like Second Life offer users the tools and means to create virtual items from scratch or even upload items created using third-party software to the virtual world. Some of these non-game-oriented virtual worlds even build specific marketplaces, which work like e-commerce marketplaces, where users can list, advertise, and sell their creations to other users in exchange for a virtual or a real currency.

The complex nature of virtual worlds inevitably makes virtual world developers more than mere game producers and brings up the question of whether they can be liable as service providers with regard to user-created or uploaded content existing in the virtual world. To capture this intricacy, among many virtual worlds, this study focuses on Second Life as its case study due to its relatively free structure,

6. For example, see Sung-Byung Yang and others, ‘Using Real Options to Investigate the Market Value of Virtual World Businesses’ (2012) 23 Information Systems Research 1011. Yang and colleagues state that there are three types of virtual worlds: 3D virtual worlds such as Second Life, MMORPGs such as Lineage, and 2D or 3D social virtual worlds such as Facebook.
allowing user-created and uploaded content, and therefore, potential infringements. Launched in 2003, Second Life is a relatively old, but still one of the most popular active virtual worlds.\textsuperscript{10} It acts as an important platform for user-created items with millions of items created by its users and billions of US dollars exchanged between users for the sale of these items as it opens up space for user creativity and provides the necessary means for users to capitalize on this creativity.\textsuperscript{11} When a user creates an infringing virtual item in Second Life or uploads it to the virtual world, two kinds of liabilities may arise due to copyright infringement. The direct infringers (such as users who create or upload infringing virtual items) are the primarily liable party when an infringement takes place.\textsuperscript{12} Yet, both in the EU and the US, secondary liability of another party might arise in different forms such as vicarious liability or contributory liability, if she contributes to the infringement in various ways. In the EU, in contrast to the highly harmonized primary liability in copyright, secondary liability has received limited harmonization. This inescapably affects the liability of online service providers, in cases where they do not primarily infringe rights of the copyright owner but rather their users utilize their services to commit copyright infringements. Second Life is an example of such a service. In addition, Second Life also offers a marketplace-like environment where users can display and sell their virtual creations to other users in exchange for a virtual currency, which they can covert to US dollars by using the in-world exchange called LindeX. These services add different layers of relationships between Linden and the complex user-created virtual items that can potentially infringe the rights of the copyright owners. At this point, (to what extent) can Linden be held liable for the infringing activities in Second Life, at least for being the party whose services enable others to reproduce/publicly display the infringing virtual item? How does Linden’s liability change in the Second Life virtual world, the Second Life Marketplace, and services such as LindeX, which enable Linden to financially benefit from user-created virtual items?

In this study, these questions are addressed in relation to US and EU law, the two main approaches to copyright. Developers’ and users’ liabilities and the issues that affect liability, such as restricted and fair uses, primary and secondary liabilities, and safe harbors designated for information society service providers, vary between the US and the EU regimes. This may potentially result in a situation where a virtual worlds developer becomes liable in one regime, and benefits from safe harbors in another with regard to the same user-created or user-uploaded content. Hence, a comparative discussion will help us understand whether and the extent to which differences between these two regimes play a role in the liability of virtual world developers. With this analysis, this article examines different services provided by virtual world developers and discusses whether they can be considered as intermediary service providers

\textsuperscript{10} As of 2020, Second Life has about 900 000 active monthly users and continues to be one of the most popular virtual worlds in the world. See Shamani Joshi, ‘Virtual Reality Is Going to Change Live Events Culture Forever’ [2020] Vice <https://www.vice.com/en/article/4aydzg/virtual-reality-is-going-to-change-live-events-culture-forever>.


\textsuperscript{12} The primary liability of service providers is a controversial issue, especially in the EU. There have been many cases in the EU where service providers were found to be primarily liable for infringing content taking place on their servers. However, in general, both in the EU and the US, primary liability lies with the parties who directly infringe the right of the copyright holder themselves. See Section 3 for more information.
within the scope of the E-Commerce Directive\textsuperscript{13} and the DMCA,\textsuperscript{14} whether they can benefit from the safe harbors designated in these regulations, and whether they fall within the scope of the DSM Directive\textsuperscript{15} as online content-sharing service providers.

This article is developed in three main sections. The first section outlines virtual item creation and upload processes in Second Life, the tools and means provided by Linden for users (as well as Linden) to financially benefit from user-created virtual items, and how Linden governs its relationship with the users through user agreements. The second section moves on to discuss the services provided by Linden and whether Linden can be considered as an information society service provider for each of these services and benefit from the safe harbors stipulated in the E-Commerce Directive and the DMCA. The last section focuses on the DSM Directive and discusses whether virtual world developers are online content-sharing service providers to understand whether they can be liable within the scope of the controversial Article 17 of the Directive.

2 VIRTUAL ITEMS IN SECOND LIFE

Linden defines Second Life as a ‘virtual world created entirely by its users’.\textsuperscript{16} This definition led some scholars to conceive Second Life as a ‘collaborative 3-D wiki space’.\textsuperscript{17} Indeed, Second Life employs various tools that allow users to create complex virtual items inside the virtual world. These tools allow users to create primitive objects also known as \textit{prims}. They provide options to create and modify virtual items such as creating its shape, designating the size, color, and texture of the item, making the item rigid or flexible, and setting other properties such as the transparency of the item. While the in-world building tools in Second Life are relatively complex, third-party software can be used to create even more complex virtual items. Second Life users can use graphics editors to create textures for virtual items. Second Life recognizes various graphics file formats.\textsuperscript{18} A graphics editor can produce an output in one of these formats and it can be used to create graphics to be uploaded to Second Life.\textsuperscript{19} In a similar way, Second Life users can use 3D modelling software to create 3D models, also known as \textit{meshes},\textsuperscript{20} and then upload them to Second Life. Users can use software which can produce output in a format that is recognized...
by Second Life. It is not only static forms of virtual items, that is, 2D textures and 3D models that are created by users. Second Life users can create animations, sounds, music, and scripts for virtual items or avatars, and consequently determine how items behave in the virtual world and how avatars can interact with the items. Like textures and models, users can use third-party software to create the animations, sounds and music. These third-party software packages are not exclusively for creating virtual items in Second Life. They are tools used to create real-world designs and end-products by professionals outside the realm of virtual worlds.

The flexibility of creating virtual items in Second Life is also evident in the Second Life Marketplace, the official marketplace website featuring millions of user-created items. The marketplace includes items ranging from free items to items that cost a few million Linden dollars, Second Life’s official virtual currency. While users cannot officially sell an item in exchange for a real-world currency, they can convert Linden dollars to US dollars via LindeX, Second Life’s official exchange service. When buying and selling Linden dollars, users trade with each other. Linden does not buy and sell Linden dollars directly but manages the LindeX exchange. Therefore, the USD price of Linden dollars is determined by supply and demand.

Linden makes money from various kinds of transactions among users. For example, when a user sells an item through Second Life Marketplace, Linden charges 5 percent of the listed price as commission. Similar to other online auction companies such as eBay, sellers in Second Life can buy enhancements for their Marketplace listings, such as appearing on the homepage or category page, prices for which range from 269 Linden dollars to 2599 Linden dollars. Also, Linden offers potential buyers of virtual items the option to buy the item in exchange for US dollars instead of Linden dollars. Even if a user sells a virtual item in exchange for Linden dollars, Linden can sell this item in US dollars to other users for a price in US dollars specified by Linden at its own discretion. In this case, Linden can designate an exchange rate different from the LindeX exchange and charges the buyer an additional US$0.30 per purchase.

24. While Linden does not directly interfere with Linden dollar prices, LindeX features a system called Automatic Circuit Breakers. This system halts Linden dollar trade when there is a big positive or negative movement in the average exchange rate. When there is a 10 percent change during a 12-hour period, the trade is halted for one hour, when there is a 20 percent change during a 12-hour period, the trade is halted for two hours, and when there is a 30 percent change during a 12-hour period, the trade is ‘close[d] until at least noon the following day’. For more information, see <https://secondlife.com/my/lindex/index.php> (requires a Second Life account).
25. Since the listed price of virtual items in Second Life Marketplace is in Linden dollars, the charged commission by Linden during this sale is also in Linden dollars.
28. Linden states that with this exchange rate, users pay generally between 10 to 15 percent more than they would pay if they bought Linden dollars through LindeX and made they payment with Linden dollars.
29. For example, a user can list a virtual car in Second Life Marketplace for a price of 8000 Linden dollars. Linden can add the option for the potential buyer to buy this car for US$40. If the
Linden also charges transactions made through LindeX. For example, when buying Linden dollars, Linden charges US$0.30 per transaction. It also charges 3.5 percent of the total value when selling Linden dollars. When users decide to cash out their US Dollar credits in LindeX, Linden charges US$1 for transfers to PayPal, US$10 for a US check, and US$15 for an international check.\textsuperscript{30} Linden also charges an additional value added tax (VAT) for users living in the EU.\textsuperscript{31} Through these methods, Linden goes beyond working similar to an intermediary platform, and actually sells virtual items created by users to other users in exchange for a price it designates.

While Linden financially benefits from user-created and uploaded virtual items in Second Life, it seeks to avoid or limit its liabilities due to potentially infringing items through user agreements. In its terms of use, apart from various terms stating that users release Linden from all kinds of claims,\textsuperscript{32} Linden states that it has no control over the virtual items created by the users and may not be held responsible for the legality of user-created items and services.\textsuperscript{33} Accordingly, Linden is merely ‘a service provider that enables its users to interact online’.\textsuperscript{34}

Acknowledging that users can create potentially copyrightable content in-world or upload such content to the virtual world, Linden underlines that users retain all intellectual property rights they have under applicable law in items they create or upload.\textsuperscript{35} Linden seeks to avoid the infringement of third parties’ IP rights by requiring users to have the necessary rights or licenses on the content they create in or upload to Second Life.\textsuperscript{36} Nevertheless, Linden obliges users to give it a broad license to use their virtual items in various ways. As seen in the following Terms of Service (ToS) term, the license includes economic rights and mediums for Linden’s interests:

You hereby grant to Linden Lab, and you agree to grant to Linden Lab, the non-exclusive, unrestricted, unconditional, unlimited, worldwide, irrevocable, perpetual, and cost-free right and license to use, copy, record, distribute, reproduce, disclose, modify, display, publicly perform, transmit, publish, broadcast, translate, make derivative works of, and sell, re-sell or sublicense (through multiple levels) (with respect to Second Life, Inworld or otherwise on the Service as permitted by you through your interactions with the Service), and otherwise exploit in any manner whatsoever, all or any portion of your User Content (and derivative works thereof), for any purpose whatsoever in all formats, on or through any media, software, formula, or medium now known or hereafter developed, and with any technology or devices now known or hereafter developed, and to advertise, market, and promote the same.\textsuperscript{37}
This term illustrates that while Linden offers a space for user-created content, it has an overarching control over virtual items created by the users. It underlines that virtual items are licensed by users to Linden, and gives Linden the right to exploit user content in various ways, which include financially benefitting from them due to enhancements bought for Marketplace listings, commissions charged for sales between users, commissions charged for LindeX exchange transactions, and even direct sale of user-created content by Linden. These broad economic exploitation options also raise the question: What happens when a user-created or uploaded content is infringing? Can Linden be found liable with regard to potentially infringing user-created or uploaded content?

3 SECOND LIFE, THE E-COMMERCE DIRECTIVE, AND THE DMCA

3.1 The E-Commerce Directive

In the limited EU harmonization, the E-Commerce Directive is the main regulation with regard to the liability of service providers. The Directive defines an (information society) service provider as ‘any natural or legal person providing an information society service’. Information society service was already defined in the amended version of the Directive 98/34/EC. This definition is repeated in Recital 17 of the E-Commerce Directive, which states that an information society service ‘covers any service normally provided for remuneration, at a distance, by means of electronic equipment for the processing (including digital compression) and storage of data, and at the individual request of a recipient of a service’.

Here, the emphasis on the requirement of remuneration is significant, especially with regard to virtual worlds. Today, many virtual worlds offer free services to their users and earn money through the sale of premium memberships with additional benefits or in-world items. Linden offers two choices for Second Life users: premium membership (provided in exchange for a monthly fee) and basic membership (provided for free). There are almost nine times more basic users than premium users in total. Hence, Linden’s services are not provided for remuneration for most of its users. Would this prevent Linden from being considered as an information society service provider according to the E-Commerce Directive? Recital 18 of the E-Commerce Directive clarifies the issue of remuneration and explains that information society services cover free services if they ‘represent an economic activity’. In addition, the CJEU explained this requirement in Papasavvas, and stated that remuneration should not necessarily be provided by the recipients of the service. Thus, the fact that roughly nine out of ten users of Second Life receive the service for free does not prevent Second Life from being an information society service.

40. C-291/13 Sotiris Papasavvas v O Fileleftheros Dimosia Etaireia Ltd and Others [2014].
The E-Commerce Directive does not build an overarching immunity regime for service providers. A service provider does not automatically become immune from all liabilities once it fits the definition of ‘service provider’ in the Directive. The service provider must meet the conditions specified in Articles 12, 13 and 14 of the Directive: (1) being a mere conduit that transmits the data; (2) automatically caching third parties’ data; or (3) merely hosting third parties’ data.41 Here, the actual practices of the service providers, rather than the categories of service providers, matter. Hence, each activity of the service provider should be examined individually to understand whether the service provider can benefit from the safe harbors.42

From this perspective, Linden does not provide any services as a ‘mere conduit’, where it transmits data like an internet access provider. Linden’s activities also do not fall under Article 13 (caching), which specifically targets proxy-servers.43 Yet, for some of its practices, Linden might be considered as a hosting provider, even though these practices do not totally match with practices of the now ‘traditional’ hosting providers such as YouTube and eBay. Similar to Google’s position with regard to YouTube videos, Linden hosts potentially infringing user-uploaded works on its servers. As in eBay, virtual items can also be categorically listed in Second Life Marketplace, even on the web, accessible to everyone.44 Despite similarities, Linden, as a virtual world developer, is in a unique position. For example, in eBay, users list pictures and specifications of physical items which they sell to other users. In Second Life Marketplace, users list pictures and specifications of works which they license to other users. In this regard, the question of service provider liability revolves around trademark infringements in eBay because of the counterfeit products that are listed and sold. In Second Life, what is at stake is copyright infringement.

One of the main reasons why harmonization in intermediary liability could not be achieved in the EU is the E-Commerce Directive’s negative definition of liability. It does not specify when the service provider can be held liable for copyright infringement on its servers. Instead, it only offers the minimum instances where the service providers cannot be held liable for the infringements taking place on their services. This means that any service provider acting outside the scope of the above-mentioned activities regulated in the E-Commerce Directive might be held liable or be immune to any liability claims, depending on the secondary liability regulations of the particular Member State. Accordingly, several Member States such as Spain, Portugal, Austria, and Liechtenstein, have regulations which extend the scope envisioned in the Directive and provide additional safe harbors to service providers.45 In other words, if Linden can benefit from the safe harbors of the E-Commerce Directive, it cannot be held liable in any Member State. However, depending on the national law of secondary liability, Linden can still be immune to liability even if it does not benefit from the safe harbors of the Directive.

41. Articles 12, 13 and 14 of the E-Commerce Directive require further conditions in order for the service provider to be immune from liabilities.
Regulating only the minimum instances for the liability of service providers leaves an ambiguous space for Member States to regulate secondary liability. However, even the application of this limited harmonization is not clear. Dinwoodie cites various national court cases across Europe, and concludes that even in supposedly harmonized schemes of immunity (such as in the implementation of the E-Commerce Directive in the Member States of the European Union), there has been variation in interpretation of who comes within the definition (or the safe harbor, which will be a more fact-specific question and vary from case to case).46

For the CJEU, applying this limited harmonization and benefiting from safe harbors rely on the extent to which the service provider is active/neutral in providing its services. This approach derives from Recital 42 of the E-Commerce Directive, which states that the activity of the service provider should be ‘of a mere technical, automatic and passive nature, which implies that the information society service provider has neither knowledge of nor control over the information which is transmitted or stored.’

Drawing on this requirement, in the EU courts tend to evaluate how active or neutral a service provider is in order to determine whether it can be exempted from liability. For example, in Google France,47 when assessing whether Google can be exempted from liability for the display of advertisements for counterfeit versions of Louis Vuitton products in Google searches, the CJEU stated that in order to establish whether the liability of a referencing service provider may be limited under Article 14 of [the E-Commerce Directive], it is necessary to examine whether the role played by that service provider is neutral, in the sense that its conduct is merely technical, automatic and passive, pointing to a lack of knowledge or control of the data which it stores.48

While the Court left it to the national court to examine the active/passive role of Google, it first acknowledged that Google arranges the order in which ads are displayed according to the amount of payments made by the advertisers.49 Afterwards, the Court stated that the fact that the referencing service, provided by Google, is a paid service, where Google sets the terms and conditions, is not sufficient to conclude that ‘Google has knowledge of, or control over, the data entered into its system by advertisers and stored in memory on its server’.50 In other words, the CJEU holds that providing paid services or sorting the order of displays (of infringing goods) on a website in accordance with these payments does not necessarily indicate that a service provider’s role goes beyond neutral.

This view has been upheld by the CJEU in later decisions. In the subsequent case, L’Oreal v eBay,51 the CJEU discussed whether eBay can rely on the exemption in the E-Commerce Directive for the infringing items listed on its website. In the decision, the Court acknowledged that eBay sets the terms and conditions for the display of offers on its website, only manages data created by its seller users, and further helps

46. Dinwoodie (n 1).
47. C-236/08 Google France SARL and Google Inc. v Louis Vuitton Malletier SA, Case C-237/08 Google France SARL v Viaticum SA and Luteciel SARL, C-238/08 Google France SARL v Centre national de recherche en relations humaines (CNRRH) SARL and Others [2010].
48. ibid para 114.
49. ibid para 115.
50. ibid paras 116, 117.
51. C-324/09 L’Oreal SA and Others v eBay International AG and Others [2011].
them in optimizing and promoting their products for sale.\textsuperscript{52} In line with the Louis Vuitton case, the CJEU first stated that offering paid services or setting terms and conditions for its services cannot deprive eBay of the exemptions from liability.\textsuperscript{53} However, the Court highlighted that eBay’s role might go beyond this neutral position due to the assistance provided by eBay to the sellers. The Court stated that eBay, by ‘optimizing the presentation of the offers for sale in question or promoting those offers’ played ‘an active role of such a kind as to give it knowledge of, or control over, the data relating to those offers for sale’.\textsuperscript{54} Hence, the Court concluded that eBay could not rely on exemptions from liability specified in Article 14(1) of the E-Commerce Directive.\textsuperscript{55}

In essence, the CJEU asks whether the service provider plays a role which gives it knowledge of or control over data, a notion which the E-Commerce Directive does not specifically define. This limits the discussion to within the scope of the active/neutral tests carried out by the CJEU, which evaluates whether a ‘diligent economic operator’ could have ‘identified the illegality in question’.\textsuperscript{56} Unlike the DMCA, the E-Commerce Directive does not specifically identify how knowledge of illegal activity can be obtained by the service providers. In this case, any activity which generates the knowledge of the service provider could be deemed sufficient. As stated by the CJEU in \textit{L’Oreal v eBay}, ‘if the rules set out in Article 14(1)(a) of [the E-Commerce Directive] are not to be rendered redundant, they must be interpreted as covering every situation in which the provider concerned becomes aware, in one way or another, of such facts or circumstances’.\textsuperscript{57} As pointed out by Husovec, the interpretation of the CJEU might equate neutrality with technical non-interactivity, and considering that current business models of service providers usually go beyond the situation of technical non-interactivity, this interpretation runs the risk of excluding many service providers from the safety of safe harbors.\textsuperscript{58} From this perspective, in \textit{L’Oreal v eBay}, the interpretation of the CJEU could be read in a way where they distinguished the activity of storing the data of the eBay user (the state of technical non-interactivity) and promoting the sale of the user goods by running an internal advertisement program (going beyond the state of technical non-interactivity).

What does this analysis say for Linden’s position? Does Linden have knowledge of or control over the virtual items in Second Life? Does it optimize or promote the sale of virtual items in the Second Life Marketplace? Linden’s position resembles both that of YouTube and that of eBay. While the Second Life service itself is similar to YouTube, where users upload potentially infringing works to the developer’s service, Second Life Marketplace resembles eBay where users list potentially infringing items they want to sell. Since Linden offers different services, it does not hold a single position. For this reason, its services, Second Life and Second Life Marketplace, should be considered separately.

\textsuperscript{52} ibid para 114.  
\textsuperscript{53} ibid para 115.  
\textsuperscript{54} ibid para 116.  
\textsuperscript{55} ibid. Similar analyses are seen in national courts in the EU. For example, in 2012, the French Supreme Court ruled that eBay could not benefit from safe harbor provided for hosting providers under Article 14 of the E-Commerce Directive because it was too active in assisting sellers. See Cass.com., May 3, 2012, Bull. civ. IV, No. 89 (Fr.) (\textit{eBay Inc. v LVMH, Parfums Christian Dior}).  
\textsuperscript{56} ibid para 120.  
\textsuperscript{57} ibid para 121.  
\textsuperscript{58} Husovec (n 45) 55, 56.
3.1.1 Linden’s position with regard to Second Life

A report, commissioned by the Information Society and Media Directorate-General, specifically discussed the position of two virtual worlds, Second Life and World of Warcraft, within the scope of the liability of service providers:

A considerable amount of courts will not consider operators of virtual worlds (such as Second Life) and multiplayer online games (such as World of Warcraft) to meet the conditions of the special liability regime, as storage-related facilities only constitute a small part of the service offering. Some courts may, however, sub-divide the service into various sub-services.59

The report holds that the hosting service constitutes only a small part of the whole virtual world service because users are offered the ‘software to build characters and environments, chat facilities, programming tools, currency exchange, etc.’.60 Yet, from this perspective, almost no popular information society service could benefit from safe havens because they are complex systems bringing together many sub-services. For example, YouTube is not a mere platform for uploading videos. In its own words, YouTube is a place to ‘share and build community’.61 It is a social media platform with features such as YouTube TV, YouTube Red, Community tab, and more. Similarly, Facebook combines various services where video and photo upload by its users constitute only a part of the whole service. In such information society services, where various services are combined, each sub-service should be evaluated in its own right and the immunity of the service provider should be identified accordingly, that is, with regard to the sub-service it offers. As Dinwoodie argues, what is at stake is not whether information society service providers fit the definition of ‘service provider’, but whether the conditions for immunity exist in the present case.62

From this perspective, in order for the ‘conditions for immunity’ to exist, Linden should be a neutral service provider with regard to Second Life itself and other sub-services. Second Life relies so much on the user-created virtual items that the sum of these items, together with other user-created content, constitute the Second Life service itself. In other words, Second Life is not a mere file storage service, where the provider has no knowledge of or has limited control over the hosted content. On the contrary, as aforementioned, Linden has a broad license to exploit (including using, copying, distributing, reproducing, modifying, displaying, selling, etc.) all the works uploaded to or created in Second Life by its users. For Leistner, neutrality means that ‘the service of the host provider as such is independent from the contents of the hosted or carried information and does not involve any direct interest of the provider as regards the specific contents of the carried or hosted information’.63 Considering that Linden provides the user-created content as the Second Life service to the users, it is not a neutral service provider and is much more active compared to traditional online file storage providers.

59. Van Eecke and Truyens (n 43) 35.
60. ibid.
61. <https://www.youtube.com/yt/about>.
62. Dinwoodie (n 1) 5.
3.1.2 Linden’s position with regard to the Second Life Marketplace

The Second Life Marketplace is another sub-service that should be evaluated separately. In the Marketplace, seller users list their virtual items for sale and can buy ‘enhancements’ for their listings for 7-day, 15-day or 30-day periods. These enhancements enable sellers to list their virtual items on the Homepage, Category Landing Page, Checkout Receipt Page, or L$0 Cart Checkout Ads Page for various fees paid in Linden dollars, which can be converted into US dollars by LindeX exchange.64 These categories promote sellers’ advertisements and enable more users to see and consequently buy their virtual items. This can potentially give rise to a situation similar to the case in eBay v L’Oreal, where the CJEU ruled that eBay did not take ‘a neutral position between the customer-seller concerned and potential buyers but … played an active role of such a kind as to give it knowledge of, or control over, the data relating to those offers for sale’.65 Although Linden does not interfere with the virtual items that are sold in the Second Life Marketplace (the content itself), it actively controls how they are promoted and sold by the seller users. In other words, there is no absolute technical non-interactive between Linden and the user-created content.

However, not every technical interactivity necessarily means that the service provider goes above the limit of neutrality. The immunity bar that is set by the CJEU in eBay v L’Oreal is arguably high. As highlighted by the Court, storing offers for sale on servers, setting the terms of the service, being remunerated for the service, and providing general information to customers are examples of practices which cannot deprive a service provider of the safety of the safe harbors.66 Linden’s practices do not only include these examples, but go beyond them. Just like in eBay v L’Oreal, some of the activities of Linden in Second Life Marketplace, specifically selling promotion services to seller users, prevents Linden from taking ‘a neutral position between the customer-seller concerned and potential buyers’. This causes Linden to go beyond the bar set by the CJEU and become an active service provider that cannot benefit from the safe harbors.

3.2 The DMCA

The arguably high immunity bar set by the CJEU in eBay v L’Oreal is set even higher in the US. The DMCA and case law on secondary liability regulate the immunity and liability of service providers in the US. Similar to the E-Commerce Directive in the EU, the DMCA introduced safe harbors for certain service providers in the US. There are several differences between these two regulations. The DMCA regulates policy and procedures that should be implemented by service providers in detail, whereas the E-Commerce Directive leaves it up to the Member States. Naturally, this difference stems from the fact that while the DMCA is a national (federal) act, the E-Commerce Directive is a union-wide directive that does not interfere with the national procedures of the Member States. The scope of application of these two regulations is also different. The DMCA only applies to copyright infringements whereas the E-Commerce

64. For more information, see Linden Research, ‘SL Marketplace Fees and Commissions’ (n 26).
65. Case C-324/09 L’Oreal SA and Others v eBay International AG and Others [2011], para 116.
66. ibid para 115.

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Directive applies to all relevant infringements such as trademark disputes and defamation. As in the EU, Linden’s position with regard to the DMCA should be discussed within the scope of the immunity regime regulated for the hosting providers, specifically those who “[store] at the direction of a user … material that resides on a system or network controlled or operated by or for the service provider”. There are several additional requirements that need to be fulfilled by the service provider if it wants to benefit from the safe harbors. The Copyright Law states that the service provider can benefit from the immunity if it does not have actual knowledge that the material or an activity using the material on the system or network is infringing; in the absence of such actual knowledge, is not aware of facts or circumstances from which infringing activity is apparent; or upon obtaining such knowledge or awareness, acts expeditiously to remove, or disable access to, the material; does not receive a financial benefit directly attributable to the infringing activity, in a case in which the service provider has the right and ability to control such activity; and upon notification of claimed infringement …, responds expeditiously to remove, or disable access to, the material that is claimed to be infringing or to be the subject of infringing activity.

The Law also requires the service provider to designate an agent to receive notifications for the claimed infringements. According to the US Copyright Law, Linden can only benefit from safe harbors and become immune to liability claims if it meets all these requirements together.

In the US, before the enactment of the DMCA, only primary liability for IP infringements was regulated by the US Copyright Law. Secondary liability was developed through case law. Therefore, even before the DMCA, service providers were not held primarily liable for the infringing activity taking place on their servers/networks because they were not volitionally infringing copyright owners’ rights. Service providers were found liable for indirect infringement rather than direct infringement. The difference between the statutory regime (DMCA) and the common law secondary liability regime is important for assessing Linden’s liability with regard to the infringing virtual items in Second Life. In order to be liable for indirect infringement, ‘the defendant need only

68. Copyright Law of the United States, 17 USC § 512(c).
69. ibid.
70. ibid.
71. Two kinds of secondary liabilities have been developed in US case law: contributory liability and vicarious liability. In general, contributory liability occurs in situations where the defendant is aware of the infringement and contributes to this infringement in various ways such as inducement or encouragement, and vicarious liability takes place when there is a higher degree of control on the part of the service provider and the provider supervises this activity and gains financial benefit from it. For more information on contributory and vicarious liability, see Dan Hunter, The Oxford Introductions to U.S. Law: Intellectual Property (Oxford University Press 2012) 61–4; Salil K Mehra and Marketa Trimble, ‘Secondary Liability of Internet Service Providers in the United States: General Principles and Fragmentation’ in Graeme B Dinwoodie (ed), Secondary Liability of Internet Service Providers (Springer 2017). A third kind of secondary liability, inducement liability, has developed as a separate doctrine in non-copyright-related areas such as patent law. For more information, see ibid 94, 95.
have known of the direct infringer’s activities, and need not have reached the legal conclusion that these activities infringed a copyrighted work.\textsuperscript{72} However, according to the US Copyright Law, the defendant can benefit from the safe harbors if it ‘does not have actual knowledge that the material or an activity using the material on the system or network is infringing’\textsuperscript{73} and ‘in the absence of such actual knowledge, is not aware of facts or circumstances from which infringing activity is apparent’.\textsuperscript{74} In other words, with the DMCA, the immunity of service providers is extended because a service provider can benefit from the safe harbors if it knows that an activity is taking place but does not specifically know that this activity is infringing.

The meaning of having ‘actual knowledge’ has been subject to dispute and discussed in various courts. According to the current interpretation, also embraced by the Second Circuit, having actual knowledge ‘requires knowledge or awareness of specific infringing activity’.\textsuperscript{75} The Ninth Circuit supports this view, stating that actual knowledge requires ‘specific knowledge of particular infringing activity’.\textsuperscript{76} In \textit{UMG v Shelter},\textsuperscript{77} the Ninth Circuit decided that hosting copyrightable content by knowing that your services could be used to share infringing works, is not sufficient to meet the requirement of actual knowledge.\textsuperscript{78} Hence knowing that some infringing activity is taking place in the service is not enough to make the service provider liable for the copyright infringement. As stated by the court in \textit{UMG v Veoh},\textsuperscript{79} ‘if investigation of “facts and circumstances” is required to identify material as infringing, then those facts and circumstances are not “red flags”’.\textsuperscript{80} In other words, the service provider cannot be held liable unless it has the related specific knowledge of a particular infringing activity.

Given that the service provider does not have the knowledge of a particular infringing activity, it should also not be ‘aware of facts or circumstances from which infringing activity is apparent’ to benefit from the safe harbors. In \textit{Perfect 10 v CCBill},\textsuperscript{81} the Ninth Circuit elaborated on what it means to be aware of an infringing activity:

Perfect 10 alleges that CCBill and CWIE were aware of a number of ‘red flags’ that signaled apparent infringement. Because CWIE and CCBill provided services to ‘illegal.net’ and ‘stolencelebriyntips.com,’ Perfect 10 argues that they must have been aware of apparent infringing activity. We disagree. When a website traffics in pictures that are titillating by nature, describing photographs as ‘illegal’ or ‘stolen’ may be an attempt to increase their salacious appeal, rather than an admission that the photographs are actually illegal or stolen. We do not place the burden of determining whether photographs are actually illegal on a service provider.\textsuperscript{82}

\textsuperscript{74} ibid § 512(c)(1)(A)(ii).
\textsuperscript{75} Viacom International, Inc. v YouTube, Inc., 676 F.3d 19, 30 (2d Cir. 2012).
\textsuperscript{76} \textit{UMG Recordings, Inc. v Shelter Capital Partners LLC}, 667 F.3d 1022, 1037 (9th Cir.2011).
\textsuperscript{77} \textit{UMG Recordings, Inc. v Shelter Capital Partners LLC}, 667 F.3d 1022 (9th Cir.2011).
\textsuperscript{78} ibid at 1038.
\textsuperscript{80} ibid at 1108.
\textsuperscript{81} \textit{Perfect 10, Inc. v CCBill LLC}, 488 F.3d 1102 (9th Cir. 2007).
\textsuperscript{82} ibid at 1114.
Clearly, the court requires the defendants to know that an illegal activity is taking place rather than placing the ‘burden’ on the defendant and stating that they should have known. This has also been underlined by a district court in *Corbis*; 83

In determining whether a service provider is ‘aware of facts or circumstances from which infringing activity was apparent,’ the question is not ‘what a reasonable person would have deduced given all the circumstances.’ Instead, the question is ‘whether the service provider deliberately proceeded in the face of blatant factors of which it was aware.’ As articulated by Congress, apparent knowledge requires evidence that a service provider ‘turned a blind eye to “red flags” of obvious infringement.’ 84 (citations omitted)

Both courts underlined the importance of determining whether a service provider has the necessary knowledge of an infringing activity. In this regard, the DMCA extends the protection for service providers and makes them exempt from liability even if they were aware of their customer’s activities but did not actually know that these activities were infringing. In *Tiffany v eBay*, 85 the Second Circuit decided that even though eBay had general knowledge of counterfeit Tiffany products sold on its website, this knowledge was not enough to hold eBay responsible for these infringing activities. To be responsible, eBay should have had ‘some contemporary knowledge of which particular listings are infringing or will infringe in the future’. 86 Farano argues that the US courts set such a high bar for being ‘aware of facts or circumstances from which infringing activity is apparent’, it amounts to actual knowledge. 87 In practice, service providers can benefit from the safe harbors unless they can be proven to have demonstrated ‘willful blindness’. It is long established that willful blindness amounts to knowledge in the US copyright law. 88 To be willfully blind, a service provider should have known of a high probability of an infringing activity but should have consciously looked the other way in order not to confirm the infringement. As noted by the Second Circuit, willful blindness ‘cannot be defined as an affirmative duty to monitor’. 89 Accordingly, Angelopoulos argues that, in the US, the liability of a service provider only occurs if the provider has actual knowledge of a specific infringing activity, which can be acquired by a notification from a third party, or if it takes the necessary steps to avoid receiving these notifications. 90

From this perspective, Linden, as a service provider, benefits from the safe harbors introduced with the DMCA unless (1) it knows that a Second Life user’s specific activity is infringing but nevertheless allows the activity to take place or (2) takes the necessary steps to avoid receiving notifications for infringing uses in its virtual world. If Linden takes the procedural requirements designated in Article 512(c) of the US Copyright Law, it will not be liable with regard to the infringing use on its servers. Within the scope of these procedural requirements, Linden has an Intellectual

84. ibid at 1108.
85. *Tiffany Inc. v eBay Inc.*, 600 F.3d 93 (2d Cir. 2010).
86. ibid at 107.
89. ibid.
90. Angelopoulos (n 42) 53.
Property Infringement Notification Policy\textsuperscript{91} and a system that can be used by rights owners to notify Linden of intellectual property infringements in Second Life. Therefore, ‘upon obtaining such knowledge or awareness’ if Linden acts ‘expeditiously to remove, or disable access to, the material’, it will benefit from the safe harbor protection of the DMCA.

4 SECOND LIFE AND THE DSM DIRECTIVE

While the US protects service providers extensively through the DMCA, the EU pushed for further liabilities and control mechanisms by introducing a new category within information society services. In 2019, the DSM Directive was adopted by the European Parliament and the Council of the European Union. The Directive is being implemented into national laws by EU Member States even though most have failed to meet the deadline of 7 June 2021. The Directive brings new requirements for information society service providers, which qualify as online content-sharing service providers, such as obtaining authorization from right holders for hosting copyrighted content. In this regard, the discussions about the Directive center around Article 17, which regulates how copyright protected works can be used by online content-sharing service providers. The European Commission published its guidance on the application of Article 17 in June 2021.\textsuperscript{92} However, the debates on the Directive will likely continue even after the transpositions into national law.\textsuperscript{93}

To understand whether virtual world developers must comply with the requirements of the DSM Directive, we need to evaluate whether they can be considered as online content-sharing service providers. The Directive defines an online content-sharing service provider as ‘a provider of an information society service of which the main or one of the main purposes is to store and give the public access to a large amount of copyright-protected works or other protected subject matter uploaded by its users, which it organizes and promotes for profit-making purposes’.\textsuperscript{94} Recital 62 of the Directive gives us further information on the scope of this definition, and the Commission tried to further explain this in its guidance. Virtual worlds check several boxes of this definition. Virtual worlds are information society services as defined in the EU Directive 2015/1535\textsuperscript{95} as they are services ‘provided for remuneration, at a distance, by electronic means and at the individual request of a recipient of services’\textsuperscript{96} They also ‘store and give the public access to … copyright-protected works’. The Commission states

\textsuperscript{94}. DSM Directive, art 2(6).
that the word ‘store’ points to the requirement of storing the content for a period more than temporary,\textsuperscript{97} which is the case for virtual worlds. The userbase of most virtual worlds, including Second Life, can also be considered as ‘the public’. In \textit{SGAE},\textsuperscript{98} when discussing the term ‘the public’ within the scope of the right of communication to the public, the CJEU stated that ‘the term “public” refers to an indeterminate number of potential television viewers’.\textsuperscript{99} Afterwards, in \textit{SCF v Marco Del Corso},\textsuperscript{100} the CJEU focused on the relationship among the recipients themselves in defining the public. In the case, the Court referred to the WIPO glossary and stated that the public should not consist of ‘specific individuals belonging to a private group’.\textsuperscript{101} Furthermore, citing previous decisions such as \textit{Mediakabel},\textsuperscript{102} \textit{Lagardere Active Broadcast},\textsuperscript{103} and \textit{SGAE},\textsuperscript{104} the Court stated that ‘public’ should consist of ‘a fairly large number of people’.\textsuperscript{105} According to the CJEU, the public should consist of ‘an indeterminate number of’\textsuperscript{106} people, and there should be a certain minimum threshold of people, excluding small or insignificant groups of individuals.\textsuperscript{107} Considering the user-base of Second Life, consisting of millions of persons from all around the world, it is fair to argue that users of this world are not ‘specific individuals belonging to a private group’ or a ‘[group] of persons which are too small, or insignificant’.\textsuperscript{108}

What should be understood from ‘large amount of’ content is unclear; however, Recital 63 of the Directive states that any assessment should be made on a case-by-case basis by considering the audience of the service and number of files uploaded by the users. From this perspective, Second Life, hosting millions of user-created and uploaded works and having millions of users,\textsuperscript{109} stores and gives public access to ‘a large amount of’ content. Unlike game-oriented virtual worlds such as World of Warcraft where all virtual items are designed by the developer, in virtual worlds such as Second Life, almost all content is created or uploaded by the users. Therefore, the requirement of the content being uploaded by the users applies to Second Life.

The last two requirements of the definition of online content-sharing service providers are more controversial. First, it is not clear whether ‘the main or one of the main purposes’ of virtual worlds is ‘to store and give the public access to a large amount of copyright-protected works’. It would be best to evaluate this on a case-by-case basis, as suggested in Recital 63 of the Directive. The main purpose of Second Life is arguably to create a simulated environment for its users or to provide the means to its users

\textsuperscript{97} European Commission (n 92).
\textsuperscript{98} C-306/05 \textit{Sociedad General de Autores y Editores de España (SGAE) v Rafael Hoteles SA} [2006].
\textsuperscript{99} ibid para 37.
\textsuperscript{100} C-135/10 \textit{Societa Consortile Fonografici (SCF) v Marco Del Corso} [2012].
\textsuperscript{101} ibid para 85.
\textsuperscript{102} C-89/04 \textit{Mediakabel BV v Commissariaat voor de Media} [2005].
\textsuperscript{103} C-192/04 \textit{Lagardere Active Broadcast v SPRE and GVL} [2005].
\textsuperscript{104} C-306/05 \textit{Sociedad General de Autores y Editores de España (SGAE) v Rafael Hoteles SA} [2006].
\textsuperscript{105} Case C-135/10 \textit{Societa Consortile Fonografici (SCF) v Marco Del Corso} [2012], para 84.
\textsuperscript{106} Case C-306/05 \textit{Sociedad General de Autores y Editores de España (SGAE) v Rafael Hoteles SA} [2006], para 37.
\textsuperscript{107} Case C-135/10 \textit{Societa Consortile Fonografici (SCF) v Marco Del Corso} [2012], para 86.
\textsuperscript{108} ibid.
\textsuperscript{109} Linden Research, ‘Infographic: 10 Years of Second Life’ (n 22); Joshi (n 10).
for them to create their own simulated environments. After all, Linden highlights the fact that Second Life is a world ‘created entirely by its users’. However, it can still be argued that storing and giving the public access to user-created or user-uploaded content is ‘one of the main purposes’ of Second Life, if not its main purpose. Second, it is also not clear whether Linden does ‘organize and promote the content uploaded by users for profit-making purposes’. As previously mentioned, Linden hardly plays a big role for its Second Life service in organizing and promoting user-uploaded content. However, the Second Life Marketplace is different and, as stated by the Commission, ‘where the information society service provider provides more than one service, care should be taken to consider each service separately to determine which service providers fall within the scope of Article 17 or not’.

Therefore, Second Life Marketplace, evaluated on its own, can be considered as a service where Linden organizes and promotes the user-created content. However, Article 17 of the Directive specifically excludes online marketplaces from online content-sharing service providers. Yet, this exclusion should be considered together with Recital 62, which states that online marketplaces are excluded from the definition because their main activity is ‘online retail, and not giving access to copyright-protected content’. Second Life Marketplace is unique in this sense as it is a marketplace with the main aim of giving access to copyright-protected content. In Second Life Marketplace, users list copyrighted content which they license to each other. In this regard, it is different from other online marketplaces. Hence, the exclusion of online marketplaces in Article 2(6) of the Directive should not apply to the Second Life Marketplace even though it is an online marketplace.

Considering all of these issues together, virtual world developers like Linden check all the requirements of being an online content-sharing service provider as defined in Article 2(6) of the DSM Directive. However, Recital 62 of the Directive highlights an important point by stating that ‘the definition of an online content-sharing service provider laid down in this Directive should target only online services that play an important role on the online content market by competing with other online content services, such as online audio and video streaming services, for the same audiences’. In its current form, it is hard to argue that Second Life competes with other online content services for the same audiences. Linden’s audience is unique, and the content created for Second Life is mostly created specifically for Second Life. Therefore, even though non-game-oriented virtual worlds like Second Life could fall within the scope of the definition of online content-sharing service providers, they should not be regarded as such until they are in a position to compete with other online content services for the same audiences. It is possible to upload music files, video files, and other artistic works to Second Life which could potentially be the subject of competition with other content services for the same audiences. Hence, virtual worlds, willingly or unwillingly, may find themselves in such a position depending on how their users use the related virtual world. Therefore, in line with Recital 63 of the Directive, a case-by-case analysis is required to understand whether the virtual world is competing with other content services for the same audience and determine whether it can be considered as an online content-sharing service provider.

111. European Commission (n 92).
112. DSM Directive, art 2(6).
5 CONCLUSION

Through a review of the US and the EU regulation and case law, this article discussed the liability of virtual world developers as intermediary service providers with regard to user-created and user-uploaded virtual items through the case of Second Life. It illustrated that virtual world developers, especially those developing non-game-oriented virtual worlds such as Second Life, are not mere game developers but may also be intermediary service providers, who may be liable with regard to user-created content on their services. This liability can be evaluated differently according to the US and the EU safe harbor regimes, which vary in terms of protecting service providers.

Due to the complexity of virtual worlds, virtual world developers provide users with various services. In the EU context, as stated by the European Commission, the liability of virtual world developers should be evaluated separately for each different service. Hence, Linden’s liability can be examined by dividing its services into two main categories: Second Life and Second Life Marketplace. Before entering the virtual world or uploading any virtual item, Linden requires users to grant a broad license which enables the exploitation of user-created works by Linden in various ways. Owing to these licenses, Linden offers user-created works as the Second Life service itself. In other words, user-created content and the Second Life service offered by Linden are intertwined, and Linden is more than a neutral hosting provider whose services are independent from the content it hosts. This conclusion also holds true for the second main service offered by Linden, the Second Life Marketplace. In the Marketplace, users selling potentially infringing virtual items can get Linden’s promotion services for listing their items on the Marketplace homepage or other prioritized pages. Furthermore, the fact that Linden earns money through every LindeX exchange transaction and can directly sell user-created items for a price it freely designates are additional factors that see Linden go beyond the position of a neutral service provider in the EU.

In contrast to the EU regime, the DMCA and the US case law protect service providers comprehensively. Service providers can benefit from safe harbors, given that they do not have knowledge of the specific infringing activity or are not aware of the apparent conditions that lead to this infringing activity on their servers. The condition of being aware is interpreted so narrowly by the courts that it amounts to the requirement of actual knowledge. In addition, the US system sets out procedural requirements for service providers to benefit from safe harbors, such as designating an agent to receive infringement notifications. Accordingly, in the US, Linden would not be held liable for the infringing activity taking place in Second Life and the Second Life Marketplace as long as it did not volitionally infringe right holders’ rights, took the necessary steps after knowing/becoming aware of the infringing activity, and took the other necessary procedural measures listed in the DMCA.

Contrary to the US case that protects service providers extensively, in the EU, the DSM Directive brings further requirements for providers that qualify as online content-sharing service providers. Non-game-oriented virtual worlds such as Second Life check all the boxes of the definition of online content-sharing service providers. Furthermore, even though Article 17 of the Directive excludes online marketplaces, this exclusion would not apply to Second Life Marketplace as the main activity of the marketplace is not online retail but ‘giving access to copyright-protected content’. Yet, it is fair to argue that virtual worlds such as Second Life were not intended to be

113. European Commission (n 92).
included within the scope of the Directive. Recital 62 clearly states that only those services that compete with ‘other online content services, such as online audio and video streaming services, for the same audiences’ should be covered by the Directive. As a service having a unique audience, Second Life, in its current form, should not be considered as an online content-sharing service provider. However, other non-game-oriented virtual worlds, such as the newly introduced Metaverse of Facebook, can fall within the scope of the Directive, if they choose to follow a path where they compete with other online content services for the same audiences.