
DIGITAL EXHAUSTION AND HYBRID SOFTWARE: A PREDOMINANT PURPOSE TEST FOR RECONCILING EU AND INDIAN COPYRIGHT LAW

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ABSTRACT

This article discusses whether the copyright exhaustion doctrine (also known as the first sale doctrine) can be applied to hybrid software products, i.e. works that combine functional computer programs with substantial expressive elements such as user interfaces graphics icons, fonts, and templates. Comparative analysis shows that European Union law and Indian law have very different approaches, resulting in two completely different situations for digital resale. According to case law of the EU, the digital exhaustion principle is applicable to computer programs that is sale of downloaded software copies is allowed, but is denied for other creative works. Such difference causes the great legal uncertainty in the EU for hybrid products, as it is not known which regime will be applicable.

Being an entirely different context, India offers another viewpoint. Although the Copyright Act, 1957¹ still upholds the principle of exhaustion, to a great extent limited only to the domestic market. It was generally equated with physical copies only. So far, Indian courts and other authorities have not clearly articulated that the right of digital exhaustion in the case of software which is as strong as the EU's *UsedSoft*² concept, is a token with them. In fact, the selling of digital software products second-hand has always been and still is for the most part regulated and restricted by the terms of the End-User License Agreements (EULAs).

This doctrinal bifurcation produces regulatory incoherence, particularly where software products cannot be meaningfully disaggregated into functional and expressive components. This method supports looking at hybrid products on a spectrum, between entirely functioning code and mainly expressive works. The paper describes a multi-factor method which takes into account the percentage of components, the level of functional integration and the typical consumer usage for identifying the main function of the product. Doing so and comparing with the present scenario in India, the paper brings to light the worldwide regulatory difficulties in finding a balance

¹ Copyright Act 1957 (India)

² Case C-128/11 *UsedSoft GmbH v Oracle USA Inc* [2012] ECLI:EU:C: 2012:407.

between the control of rightsholders and consumer rights in the developing digital economy. This paper argues that digital exhaustion should apply to hybrid software where functional elements predominate, and proposes a structured ‘predominant purpose test’ to guide courts.

Keywords: Digital Exhaustion, Hybrid Software, Predominant Purpose Test, and First Sale Doctrine.

Introduction: The Problem of Digital Exhaustion in Hybrid Software

The concept of digital exhaustion, also known as the “first sale doctrine” is filled with controversies as far as copyright law globally is concerned. The EU copyright law is divided in a most striking way that has found a lot of support among Indian legal scholars.³ While the Software Directive⁴ (Directive 2009/24/EC) allows the exhaustion of copyright for computer programs and the InfoSoc Directive⁵ (Directive 2001/29/EC) prohibits it for other types of copyrighted works. This “double standard” raises a serious problem for “hybrids” merchandising like Microsoft Office or Adobe Acrobat, which constitute a combination of functionally coded elements and highly expressive user interfaces.⁶ In India, as per Section 2(o) of the Copyright Act 1957⁷ software is considered as a “literary work” and consequently, the law has been quite slow in addressing the issue of such combined digital products and the rights of consumers and the freedom of the market.

The CJEU’s *UsedSoft* judgment basically confirmed the exhaustion of rights after a software sale digitally nevertheless later decisions such as *Tom Kabinet*⁸ and *Nintendo* have considerably darkened the situation, very much reflecting the fears of Indian courts coming to a head with the resale of licensed digital assets. For India, a country that is still developing, the situation is very critical; secondary-marketing of “hybrid” software is not only a commercial preference but rather a means of digital inclusion and a way of getting around the “licensing-trap” that big global IP players set.⁹ The paper analyses whether imposing EU-like restrictions

³ P Bernt Hugenholtz, ‘UsedSoft v Oracle: The ECJ’s Ruling on Software Exhaustion’ (2012) 34(11) *European Intellectual Property Review* 859.

⁴ Directive 2009/24/EC of the European Parliament and of the Council of 23 April 2009 on the legal protection of computer programs [2009] OJ L111/16 (Software Directive).

⁵ Directive 2001/29/EC of the European Parliament and of the Council of 22 May 2001 on the harmonisation of certain aspects of copyright and related rights in the information society [2001] OJ L167/10

⁶ Lucie Guibault, ‘Digital Exhaustion and the Role of the ECJ’ (2014) 36(3) *European Intellectual Property Review* 132.

⁷ Copyright Act 1957, s 2(o).

⁸ Case C-263/18 *Nederlands Uitgeversverbond and Groep Algemene Uitgevers v Tom Kabinet Internet BV* [2019] ECLI:EU:C: 2019:1111.

⁹ Prashant Reddy and Sumathi Chandrashekar, *Create, Copy, Disrupt: India’s Intellectual Property Dilemmas*

on hybrid works can still go hand in hand with a copyright system that gives priority to access.

This article main idea is that if the software is functional, it should not be possible to create a barrier to reselling by simply putting an expressive “layer”. The article argues for applying the Software Directive exhaustion rules to any product that is mainly functional and distributed as a single unit, using the “dominant nature” test from Indian contract and tax law as a model. By examining the case law of *UsedSoft*, *Nintendo*, and *Tom Kabinet* together, this work suggests a legal framework that is capable of opposing narrow, pro-right holder interpretations that currently restrain the secondary digital market.¹⁰ In the end, it intends to clarify the position of hybrid products in the market by first sale doctrine, making it a less vulnerable means of consumer freedom in the digital environment.

Research Objectives

- Compare the legal conflict between EU directives and the Indian Copyright Act regarding how digital exhaustion applies to software versus literary works.
- Analyse how the legal status of “hybrid software” in case law creates licensing traps and regulatory gaps for digital consumers.
- Propose a “Predominant Purpose Test” to help Indian courts decide if a hybrid product qualifies for digital resale based on its primary function.
- Evaluate how legalizing digital resale in India could improve market competition and digital inclusion for consumers.

Research Questions

1. How does the lack of clear legal standards in the EU and India undermine the “first sale doctrine” for products that combine software and media?
2. Can a “Predominant Purpose Test” balance a creator’s intellectual property rights with a consumer’s right to resell digital goods?

(OUP 2017).

¹⁰ Mireille van Eechoud, ‘The Role of Judges in the Digital Exhaustion Debate’ (2015) 6(2) *JIPITEC* 157.

Research Hypothesis

The application of a “Predominant Purpose Test” will provide a more legally coherent and economically beneficial framework for digital exhaustion in India than current formalistic approaches by correctly identifying the functional core of hybrid software.

Research Methodology

This research employs a doctrinal and comparative analysis of EU and Indian legal frameworks to evaluate how digital exhaustion applies to hybrid software products. It utilizes case-spectrum studies and policy assessments to test a proposed “Essentiality Test” and determine its impact on Indian market competition and consumer welfare.

Conceptual Foundations of the Exhaustion Doctrine in the Digital Environment

The Indian legal system has not yet definitively decided on the exhaustion issue for hybrid digital products, however there are many points of agreement with the case law of the CJEU. Decisions like Nintendo provide deep understandings into the combination of software and other pieces of protected subject matter and the cases of UsedSoft and Tom Kabinet explore in depth the boundaries of digital exhaustion. Indian law, which is becoming a strong advocate of rights for consumers and secondary markets, would find the reasoning of UsedSoft very attractive. In the conflict, Oracle was the plaintiff trying to stop UsedSoft a reseller from selling again the software licences which the original customers had bought. The CJEU had to give a ruling on whether or not the right to distribute a software was exhausted according to Article 4(2) of the Software Directive after the “first sale.”

Importantly, for the Indian legal scenario where the “right to sell” is a fundamental aspect of copyright as per Section 14, the CJEU decided that perpetual licences are a “sale”. This is a very significant aspect in the Indian legal scenario where the “right to sell” constitutes a major part of the copyright according to Section 14. This ensures that if a copyright holder has been adequately remunerated, their authority over further distribution is terminated. The Court also found that the reselling of digital copies is lawful, even those downloaded from the Internet, provided the first user stops using the copy. By insisting on “functional equivalence” between digital and physical copies, UsedSoft is in harmony with the Indian goal of ensuring that copyright is not used to eliminate competition. In fact, the Court interpreted the Article 4(2) of

the Software Directive as not only covering the analogue exhaustion but also the digital exhaustion of the distribution rights.

On the other hand, the Tom Kabinet decision indicates a more limited approach which Indian courts may be hesitant to adopt. In that case, the Court considered e-books as non-software works under the InfoSoc Directive and identified digital downloads as a form of “communication to the public” rather than “distribution”.¹¹ This new stance effectively rules out the digital exhaustion concept in its third paragraph. A very restrictive interpretation like this one generates a lot of problems for hybrid products works that include both software and expressive elements. The CJEU in Nintendo acknowledged that video games are “complex matter” that combine software with audiovisual content. The Court indicated that licensing for these components is separately managed under the InfoSoc Directive “together with the entire work.”¹² Although this statement appears to indicate that digital exhaustion would not apply to hybrid products, it is worth noting that the Court, in the context of Nintendo, was dealing with the issue of technological protection measures under Article 6 of the InfoSoc Directive and not the issue of exhaustion.¹³

Fragmentation in EU Copyright Law: Software vs Non-Software Works

The Software Directive and Recognition of Digital Exhaustion

One natural way to set out the relevant legal regime would be to consider the ‘hybrid software products’ as a range of phenomena. Such a conceptualization is not only fundamental to the Indian claim of law. In fact, it presents different kinds of software products as end points of the scale. On one side of the spectrum there are purely functional programs - backend modules or firmware - which India predominantly considers for patent eligibility under the ‘technical effect’ doctrine.¹⁴ On the other hand, there are expressive digital products like e-books which are regarded simply as literary works.

The middle part of the spectrum is made up of hybrid products such as video games and highly complex consumer applications (e.g. Microsoft Word). These, to the Indian law would require a double-faceted approach; the code underlying the program can be copyrighted as a literary

¹¹ Case C-263/18 Netherlands v Tom Kabinet Internet BV EU:C: 2019:1111.

¹² Case C-355/12 Nintendo Co Ltd v PC Box Srl EU:C: 2014:25.

¹³ Estelle Derclaye, ‘The Court of Justice and the Future of Digital Exhaustion’ (2015) *EIPR* 127.

¹⁴ (2019) SCC OnLine Del 11867; Patents Act 1970 (India), s 3(k).

work at the same time, the artistic elements of the user interfaces can be classified as cinematograph film or artistic work. The spectrum therefore is a handy reference when it comes to interpreting the Indian Patents Act and the Copyright Act, especially as regards the doctrine of exhaustion. Taking account of this hybrid nature is what will result in the legal measures being adjusted to the dual function creative character of the current-day software, leading not only to the prevention of unreasonably broad monopolies but also to the protection of true innovation and original creative expression inside India.

The InfoSoc Directive and the Non-Recognition of Digital Exhaustion

According to the normative interface between the InfoSoc Directive and the Software Directive through Article 1(2)(a), the latter one serves as a *lex specialis* in fact.¹⁵ The differentiation in the hierarchy of these two is similar to a great extent with the Indian copyright regime, where computer programmes are only a sub-species of 'literary works' as per Section 2(o) of the Copyright Act 1957. The principle *lex specialis derogat legi generali* is an important and effective method of resolving disputes between the general copyright provisions and those specifically related to software, especially when the application of such specific provisions results in legal consequences which are incompatible with the general ones in the context of authors' rights. In fact, this principle of law is used as a vital methodological tool in Indian jurisprudence for such conflict resolution cases.

As the Nintendo judgment indicated, determining a *lex specialis* means to face a definite rule against a less definite one which may incorporate it.¹⁶ Within the European framework, the Software Directive is considered as more specific when compared to the InfoSoc Directive because the former deals only with software while the latter is about copyrightable subject matter in general. This reasoning by elimination is getting more and more questioned in India's changing technological scene. In her Opinion, Advocate General Sharpston indicated that the precedence of the Software Directive is valid only when the subject matter protected 'falls entirely' within its scope. In the case of video games that are complex and inseparable works, she thought that the 'greater protection' of the general directive is the one that should be given - a view which strongly corresponds with India's legislative intention to protect multi-layered

¹⁵ Directive 2001/29/EC (InfoSoc Directive) [2001] OJ L167/10, art 1(2)(a); Directive 2009/24/EC (Software Directive) [2009] OJ L111/16.

¹⁶ Case C-355/12 Nintendo Co Ltd v PC Box Srl EU:C: 2014:25; Opinion of AG Sharpston in *Nintendo* EU:C:2013:596.

creative expressions.

Indian perspective generally favours such a comprehensive way of looking at things and in fact it often interprets multimedia productions as ‘cinematograph films’ within the meaning of Section 2(f) or as a combination of several rights bundled together. This way the combined or joint value of code, art and sound will not be lost or sidelined by giving them technical or separate classifications only. AG Sharpston’s opinion corresponds to a principle whereby a specific law only displaces a general one if the factual situation is completely covered by the specific law. If the situations are only partly dealt with the principle is not applicable and the general law will prevail.

While the Court of Justice of the European Union (CJEU) has not directly established the ‘entirety’ requirement, its remark that graphic and acoustic elements are covered as parts of the ‘entire work under the InfoSoc Directive can be interpreted as a silent approval of this inclusive conceptual structure. When one also considers AG Sharpston's parts, the Nintendo decision is indicative that for hybrid software, whichever law is applied will still be the general one, no matter the actual extent of the product’s hybridization. For India, this is a clear signal that comprehensive protection needs to take precedence over narrow software-related ones. In the end, even Indian courts appear to be siding with the idea that for truly intellectual works, the *lex generalis* is the best protective measure, so that the core creative aspect of today’s digital innovations is not merely treated as a by-product of technology. Such a move confirms that the principle of “greater protection” continues to occupy the highest rank in defending the varied interests of creators in the digital era, and hence a more balanced and fair copyright environment is developed which acknowledges the complexity of modern hybrid works worldwide. In fact, the doctrinal harmony between European judgments and Indian laws is instrumental in setting a uniform global standard for multimedia protection, thereby giving creators in the knowledge economy their due.

Trying to strictly apply a very formalistic division between literal code and its help components will raise a major legal obstacle in the Indian copyright law system. As we have argued in another place, such a method if the law is followed strictly will almost make the Software Directive and similar protections under Section 14 of the Indian Copyright Act, just an insignificant category of ‘non-hybrid’ programs. These programs without user interfaces or textual content will make the digital exhaustion regime almost useless. Since today’s consumer

software is by nature a composite work made up of icons, templates, and help files, from the angle of law only pure functional code like embedded firmware would be allowed, which would be a very big step against the legislative aim to find a balance between the rights of the owners and the interests of the public.

The CJEU's *UsedSoft* decision that recognizes the digital second-hand sale rights of a rightful buyer is in line with the changing Indian court view on the first sale doctrine, and the court's focus on digital exhaustion.¹⁷ If the scope of exhaustion was restricted to non-hybrid software only, the first sale doctrine would cease to be a remedy. For instance, it is often physically impossible to resell 'pure' software like firmware as it is locked to hardware, whereas simpler command-line tools frequently do not have a commercial resale value. Under this view, the secondary market for digital goods would be effectively starved, which is at odds with the pro-competition attitude that is commonly endorsed in Indian legal scholarship and policy and where the access to affordable technology is considered a priority for development.

Moreover, the *UsedSoft* case was about enterprise software which by nature, is a mixed product. The Court certainly did not indicate that exhaustion would only be applicable to 'pure' code. If there had been such a limitation, it would have been stated. To interpret the *Nintendo* decision in a very limited manner so as to dismiss *UsedSoft* through a mere obiter dictum would be to undermine the entire digital exhaustion rule at a time when the global market was changing to software-as-a-service models. In India, where the changeover from the physical to digital markets is very fast, it is still very important to keep the doctrine of exhaustion intact so as to avoid vendor lock-in forever. The only reasonable interpretation of the *lex specialis* rule is one which recognizes the hybrid nature of modern software, so that the right to resell does not become merely a theoretical issue but a reality that works. Therefore, the stance of India should be in favour of a comprehensive interpretation of the law that sees software as a single product, irrespective of its hybrid features, in order to maintain the principle of exhaustion surviving well into the digital era.

Reconceptualising Hybrid Software Classification: The Predominant Purpose Test

The paper argues that the issue of hybrid digital products being listed in the Indian Copyright Act 1957 should not simply depend on a mechanical recognition of whether any part of the

¹⁷ Case C-128/11 *UsedSoft GmbH v Oracle International Corp* EU:C:2012:407.

product contains expressive elements. Rather than treating all non-program aspects as suddenly leading to the granting of extensive protections, courts in India should go for a deep “Dominant Purpose” test.¹⁸ This means determining:

- (i) what is the main function of the hybrid product, and
- (ii) to what extent is the rationale for the provision of specific rights in relation to computer programs under Section 2(o) still relevant to the case.

In cases where a product’s operation is the main feature, this kind of fact-based analysis should prevail over the unbending, formalistic reading as per international references such as the CJEU’s Nintendo decision.

The main reason for the decision in cases like Nintendo which focused mainly on the expressive “InfoSoc” features is the unique character of video games. In fact, the software of such works is usually only the technological framework supporting the main audiovisual and narrative elements. In the case of India, although a top-of-the-line video game could probably be considered a “cinematograph film” under Section 2(f)¹⁹ due to its high level of expression, such a decision would not be binding for mainly functional hybrid products. Unlike games, the main purpose of productivity apps or system utilities is to enable users to work with data and perform processes rather than to consume artistic content.

While these products have non-software parts, they are still more “functional” than “expressive” on the spectrum. A couple of examples of functionally integrated wholes are productivity suites like Microsoft Excel and Adobe Acrobat. Their non-software parts, for example UI icons or help text, are neither independently dimmed for exploitation nor intended to be experienced as standalone pieces of art. To do an “Excel Test”- narrative-driven games which are often adapted into films or TV shows (showing their expressive value that can stand on their own) whereas a functional computer program for the spreadsheet application does not have such an independent narrative existence.

Hence, the Indian judiciary should first ask whether the expressive elements are “essential” or just “incidental” to the product’s market value to determine the copyright regime to apply. This

¹⁸ *Bharat Sanchar Nigam Ltd v Union of India* (2006) 3 SCC 1

¹⁹ Copyright Act 1957 (India), s 2(f).

is consistent with the reasoning behind *Tom Kabinet*,²⁰ in which the nature of the content determined the legal category. To ensure that judges will be consistent, I suggest a multi-factor “Essentiality Test” that is specially designed for the Indian IT sector:

Quantitative Dominance: What is the proportion of the functional code in product’s architecture as opposed to the creative assets?

Functional Interdependency: Are the expressive elements so interwoven with the program’s operation that they cannot be separated and consumed as independent works?

Consumer Perception and Utility: Is the user primarily interested in the product to carry out a particular function (Utility) or to experience the creative aspect (Expression)?

With this sophisticated guide in place, Indian law can avoid the scattering of the protections specifically earmarked for software programming due to the accidental presence of the creative component. In fact, it should be the very safeguarding of the “literary work” status of the core software exports of the country that should be a result of it.

Digital Resale and Functionally Predominant Hybrid Software

Discussing the doctrine of exhaustion, the CJEU’s reading of the InfoSoc Directive confines the principle exclusively to physical goods, thereby not recognizing digital resales such as e-books. In the view of Indian law, which has always been a balancing act between the rights of owners and public access. This strict separation seems to be going too far. The main argument for leaving the door to second sales shut for digital products is the risk of financial losses for the rights holders. Nevertheless, this argument does not make sense when one looks at the almost exclusively digital one’s hybrids that are functionally dominant in India's evolving market.

Apart from the fact that traditional content, according to AG Szpunar²¹, is actually viewed only once and then quickly finds its way to the secondary market. This is completely different from the Indian software sector where software is purchased and used for a long time. Since such equipment is physically with the user for a long time, their subsequent digital resale does not

²⁰ Case C-263/18 *Netherlands v Tom Kabinet Internet BV* EU:C:2019:1111; Opinion of AG Szpunar EU:C:2019:697.

²¹ Case C-263/18 *Tom Kabinet* (n 7), AG Szpunar Opinion, ECLI:EU:C:2019:697.

result in the primary market being cannibalized in such a disruptive manner as the resale of e-books in the digital environment.

Moreover, software functions inside a hyper-accelerated technological cycle. In a growing digital economy such as India's, a person who is selling his/her copy is most likely to do so because the technology has got outdated or the software no longer caters to complex requirements. Therefore, the used version becomes significantly less appealing when compared to the latest releases. Unlike e-books that keep their usefulness intact over time, digital software programs quickly become outdated. Hence, a second-hand market for such software will not, to the copyright holders or their main revenue streams, extent the fears that the literary sector has been with.

The “predominant purpose” criteria proposed here by the author is a perfect match with the Indian legal system. It guarantees that the range of exhaustion law corresponds to the actual functionality of modern digital products rather than just coming under formalistic classification. What is important is that it stops foreign copyright owners from “overreaching” by inserting minor expressive elements in functional programs. This technique is usually used for circumventing the more generous exhaustion provisions of the Software Directive, thereby enabling the companies that own copyrights to have excessive control over secondary markets and at the same time restrict Indian consumer rights. This standard is intended to ensure that the exhaustion principle still holds in growing economies such as India with the objective of spreading knowledge and providing affordable access to basic technologies.

Conclusion

India is on the verge of a defining role in the evolution of digital copyright laws worldwide, particularly when dealing with hybrid software and the rule of exhaustion.²² With the digital economy soaring and technology becoming a vital channel for development, sticking to a narrow, form-based way of classifying software can really hamper innovation and the welfare of consumers. This article has pointed out that the issues related to hybrid digital products those that have both functionality and expression shall definitely not be fixed by relying on rigid opposites that come from the past copyright systems.

²² Prashant Reddy and Sumathi Chandrashekar, *Create, Copy, Disrupt: India's Intellectual Property Dilemmas* (OUP 2017).

Going for a predominant purpose test is a more reasonable and a bit long-range policy step. Giving more weight to the functionality of the software as opposed to mere expressive elements, Indian courts have the power to keep the doctrine of exhaustion as a concept with relevance even when we talk about online digital goods. In fact, this kind of reasoning is very much in line with India's main development objectives such as enhancing access, restraining anti-competitive lock-in and fostering a lively secondary market for digital goods.

An evolving and flexible interpretation of the law would help India not only to stay away from doctrinal splits observed in other countries but also to maintain the right of the owners in a proper way. Instead of importing the models which are restrictive, India would be in a position to make a well-targeted decision that would reflect its peculiar socio-economic situation. In this respect, the judiciary can be left the key through which copyright law will be allowed to keep pace with the technological changes.

In the final analysis, acknowledging digital resale rights for functionally predominant hybrid software is definitely more than just a legal change it marks the birth of a more accessible, competitive and innovation-led digital environment in India.