

INTERGOVERNMENTAL COPYRIGHT COMMITTEE

Fourteenth session of the Committee of the Universal Copyright Convention as revised in 1971 Paris 7-9 June 2010

COMITE INTERGOUVERNEMENTAL DU DROIT D'AUTEUR

Quatorzième session du Comité de la Convention universelle révisée en 1971 Paris 7-9 juin 2010

COMITE INTERGUBERNAMENTAL DE DERECHO DE AUTOR

Decimocuarta reunión del Comité de la Convención Universal revisada en 1971 París 7-9 junio de 2010

МЕЖПРАВИТЕЛЬСТВЕННЫЙ КОМИТЕТ ПО АВТОРСКОМУ ПРАВУ

Четырнадцатая сессия Комитета по Всемирной конвенции, пересмотренной в 1971 г. Париж 7-9 июня 2010 г.

اللجنة الدولية الحكومية لحقوق المؤلف

الدورة الرابعة عشرة للجنة التابعة للاتفاقية العالمية بصيغتها المعدلة في 1971، باريس 7-9/6-2010

Distribution: limited

IGC(1971)XIV/4

Paris, 8 March 2010

Original: English

THE NEW CHALLENGES OF STRIKING THE RIGHT BALANCE BETWEEN COPYRIGHT PROTECTION AND ACCESS TO KNOWLEDGE, INFORMATION AND CULTURE ¹

This study was commissioned by UNESCO for the 14th session of the Intergovernmental Copyright Committee, 7-9 June 2010. It addresses the intersection between access to information and copyright protection and presents an overview of challenges for authors, owners of rights and the public in the digital age.

I. The intersection between access to information and copyright protection

A. The intersection between access to information and copyright protection within the fundamental rights regime

Both access to information and copyright protection are guarded by international human rights covenants. In these covenants one can find the recognition of (1) everyone's right to freedom of expression, (2) everyone's right to take part in the cultural life of the community, to enjoy the arts and to benefit from scientific progress and (3) the author's right to the protection of his moral and material interests resulting from his scientific, literary or artistic productions.

¹ This study was prepared by Dr Patricia Akester, Centre for Intellectual Property and Information Law, University of Cambridge, at the request of UNESCO Secretariat for the 14th session of the Intergovernmental Copyright Committee in June 2010. The opinions expressed in this study are not necessarily those of the UNESCO Secretariat.

As to the right to freedom of expression, according to the Universal Declaration of Human Rights, everyone has the right to freedom of opinion and expression, which includes the right to “seek, receive and impart information and ideas.”² This principle is reiterated in the International Covenant on Civil and Political Rights, and, at a regional level, in the European Convention on Human Rights and in the Charter of Fundamental Rights of the European Union.³

A right to take part in the cultural life of the community, to enjoy the arts and to benefit from scientific progress, can be found both in Article 27 of the Universal Declaration of Human Rights⁴ and Article 15 of the International Covenant on Economic, Social and Cultural Rights.⁵

Protection of an author’s moral and material interests resulting from his/her scientific, literary or artistic productions follows from the same international provisions - Article 27 of the Universal Declaration of Human Rights⁶ and Article 15 of the International Covenant on Economic, Social and Cultural Rights.⁷

At a conceptual level, the rights that underpin access to information and copyright protection are linked within a perpetual cycle of discovery, enlightenment and creation. Freedom of expression, information, science and art promotes this cycle and, as such, is not only an essential element of man’s spiritual freedom and of a democratic society⁸, but also vital for the existence of a dynamic and self-renewing environment of information, knowledge and culture. This process continuously leads to the creation of scientific, literary and artistic production, which may be protected by copyright law. In turn, copyright law provides an incentive/reward mechanism, which aims to promote cultural productivity. Hence, both access to information and copyright protection subsist within the same cultural and creative domain.

In spite of this theoretical harmony, those values can challenge each other on a practical level. Unrestricted access to information will hamper copyright protection and excessive copyright protection will encumber the reception of the information contained in protected works.

² Universal Declaration of Human Rights, Article 19: “Everyone has the right to freedom of opinion and expression; this right includes freedom to hold opinions without interference and to seek, receive and impart information and ideas through any media and regardless of frontiers.”

³ See Article 19 of the International Covenant on Civil and Political Rights, Article 10 of the European Convention on Human Rights and Article 11 of the Charter of Fundamental Rights of the European Union.

⁴ Universal Declaration of Human Rights, Article 27(1): “Everyone has the right freely to participate in the cultural life of the community, to enjoy the arts and to share in scientific advancement and its benefits.”

⁵ The International Covenant on Economic, Social and Cultural Rights declares in its preamble “that, in accordance with the Universal Declaration of Human Rights, the ideal of free human beings enjoying freedom from fear and want can only be achieved if conditions are created whereby everyone may enjoy his economic, social and cultural rights, as well as his civil and political rights”, also recognising, in Article 15(1)(a)-(b) the right of everyone “to take part in cultural life” and “to enjoy the benefits of scientific progress and its applications.”

⁶ Article 27(2) of the Universal Declaration of Human Rights: “Everyone has the right to the protection of the moral and material interests resulting from any scientific, literary or artistic production of which he is the author.”

⁷ Article 15(1)(c) of the International Covenant on Economic, Social and Cultural Rights recognises the right of everyone “to benefit from the protection of the moral and material interests resulting from any scientific, literary or artistic production of which he is the author.”

⁸ See Z.M. Nedjati, *Human Rights Under the European Convention* (North-Holland, 1978); H. Kanger, *Human Rights in the UN Declaration* (Graphic Systems AB, 1984).

It is, thus, necessary to reconcile the public's interest in promoting creativity through the protection of the moral and economic interests of authors and owners, and the public interest in fostering freedom of expression and access to information and culture.

B. The intersection between access to information and copyright protection within the copyright regime

The need for equilibrium between these interests has been extrapolated into the legislative copyright arena. Traditionally, the balance between these rights is achieved (1) by granting authors rights in their works⁹ and (2) by setting copyright boundaries, such as, the idea/expression dichotomy (indicating that protection extends to expressions and not to ideas)¹⁰, the fact that only original works of authorship are protected (meaning that the work will be protected only where it is an intellectual creation)¹¹, the limited term of protection (guaranteeing that copyright protection is finite) and the existence of exceptions and limitations to copyright.¹²

Generally, copyright exceptions may be found in national laws in connection to news reporting, quotation, criticism, scientific research, educational establishments, libraries, museums, archives, private use, people with disabilities, and for purposes of administrative, parliamentary or judicial proceedings.¹³

As a result of this legislative framework, the public should be able to freely use (1) ideas, (2) unoriginal works (3) protected works once they have entered the public domain and (4) protected works, in certain specific situations, without permission or even compensation.

II. Online challenges and practices regarding copyright protection and access to information

⁹ For example, member countries of the Berne Convention must award authors "the rights specially granted" by the Convention (Berne Convention, Article 5(1)). See Berne Convention, Articles 6bis (moral rights), 8 (translation right), 9 (reproduction right), 11 (public communication right), 11bis (broadcasting and cable retransmission right), 12 (adaptation right), 14 (distribution of cinematographic works).

¹⁰ See, for example, TRIPS Agreement, Article 9(2).

¹¹ For example, the Berne Convention states that "collections of literary or artistic works such as encyclopaedias and anthologies, which by reason of the selection and arrangement of their contents, constitute intellectual creations shall be protected as such, without prejudice to the copyright in each of the works forming part of the collections." (Berne Convention, Article 2(5)).

¹² The Berne Convention, for example, allows for certain exceptions to author's rights. According to Article 9(2) of the Berne Convention: "*exceptions and limitations regarding the reproduction right will only be allowed in certain cases and may not conflict with the normal exploitation of the author's work nor unreasonably hinder the legitimate interests of the author*". This test will be referred to as the *three-step test*. For other exceptions, see Articles 2bis(1) and (2) (certain speeches, certain uses of lectures and addresses), 10 (quotations, illustrations for teaching), 10bis (certain articles and broadcast works, works seen or heard in connection with current events), 11bis(3) (ephemeral recordings made by broadcasting organisations) of the Berne Convention. Berne also allows for some limitations, in the form of statutory or compulsory licences in Articles 11bis(2) (broadcasting and related rights) and 13(1) (right of recording musical works and any words pertaining thereto).

¹³ See, for example, Article 29 of the Copyright Law of Angola, 1990; Article 48 of the Copyright Law of Cape Verde, 1990; Schedule 1 of the Copyright Law of the Seychelles, 1991; Chapter III of the Copyright Law of Madagascar, 1995; Part IV of the Copyright Law of Mauritius, 1997; Chapter V of the Copyright Law of Brazil, 1998; Section I of the Copyright Law of Mozambique, 2001; and Sections 19-23 of the Copyright Law of Ghana, 2005.

A. Online challenges for authors and owners

a) Generally

With the advent of the digital revolution, information has become easy to store, replicate, modify, mix, transmit, place and find on the Internet - with or without the consent of the relevant copyright owners.¹⁴

These properties of digital information gained momentum in the 1990s, in the context of the Web 1.0 technology (where the web appeared as a relatively static information source) and were amplified with the advent of the Web 2.0, the participatory web.

Web 2.0 technology facilitates information sharing and collaboration among users (on the basis of technologies, such as, blogs, wikis, online social networking and virtual worlds) and permits the making of podcasts, remixes and mashups of audio, visual and textual content.

From the viewpoint of authors and owners, though, the increased ability to copy works, the high quality of digital copies, the potential to manipulate works and the speed with which infringing copies can be delivered to the public, bear the risk of infringing moral rights¹⁵ as well as economic rights¹⁶.

In the digital environment, it is more difficult for authors to enforce the decision of whether or not to divulge their work. This is because works can easily be placed on the Internet without the authors' agreement, thus violating their right of divulgation. Even if the work is disseminated with the author's agreement, the work may be manipulated, with or without his/her authorization, and the manipulated version may be made available to the public on the Internet. Digital alteration can jeopardize the integrity of the work, easily amounting to a distortion or other modification of a work, which may endanger the author's legitimate interests in the work, his honour or his reputation.

Economic rights too are at risk, as works may be reproduced, communicated, adapted and distributed, illegally.

b) File-sharing

Recent online challenges for authors and copyright owners can be appropriately illustrated with the case of illegal file-sharing carried out through P2P networks.

P2P technology harvests and optimizes the joint capabilities of participating user machines. To do so, these networks share content directly between users, avoiding the classic client/server model, in which a server provides a particular service to a multitude of users. As such, P2P technology has immense potential and has been used, for example, on the Sciencenet search engine¹⁷ and on Skype (the Internet phone).

The problem, of course, is that P2P technology can also be used for copyright infringement purposes. According to a recent study:

¹⁴ See Pamela Samuelson, "Digital Media and the Law" (1991) 34:10 COMM. ACM 23, 23-26.

¹⁵ Moral rights arise automatically with the creation of the work and, in general, cannot be assigned. They allow the author to control the uses made of the work, irrespective of assignment of economic rights and their aim is to ensure the respect for the author's personality as expressed in the work.

¹⁶ Economic rights form "the pecuniary components of copyright, as distinguished from moral rights. They imply as a rule that, within the limitations set by copyright law, the owner of the copyright may make all public use of the work conditional on payment of remuneration" (*WIPO Glossary of Terms of the Law of Copyright and Neighbouring Rights* (Geneva, 1980), 95).

¹⁷ <http://141.52.175.10:8080/Network.html?>

Ten years after the emergence of Napster, the illegal download of music via peer-to-peer (P-to-P) file-sharing networks is at least as widespread now as it has ever been (...) The growth of Europe's online population has driven the growth of the number of European music P-to-P users. Between 2004 and 2009, the Internet population across the UK, Germany, France, Spain, and Italy grew by more than 45 million. Thus, even though regular music P-to-P rates are relatively flat over the period, the total number of regular music P-to-P users grew from 18.9 million in 2004 to 29.8 million in 2009.¹⁸

Problems emerge where the files being exchanged through P2P networks contain subject-matter protected by copyright, which is being swapped without the permission of the relevant copyright owners. When that is the case, several issues need to be examined to draw a full copyright picture.

Legal results are likely to vary from country to country in view of the lack of international harmonization in various respects. This study can only offer a summarized overview of the copyright issues at stake.

Regarding direct infringement, P2P downloads are likely to infringe the right of reproduction and the making available right. If a country has adhered to the TRIPS Agreement 1994, P2P downloads will infringe the reproduction right and if a country has adhered to the 1996 WIPO Treaties, P2P downloads and uploads will infringe, respectively, the reproduction right and the right to communicate the work or related subject-matter to the public (which includes the making available right).¹⁹

But the act at stake (such as reproduction or making available) may be covered by an exception, such as fair use, in the United States, or the more restricted fair dealing in the United Kingdom, or the private copying exception familiar in continental Europe.²⁰ If so, certain acts of file-sharing may be justified by public policy considerations.

We must add to this complex equation the fact that both the TRIPS Agreement and the WIPO Copyright Treaty place exceptions under the umbrella of the three-step test.²¹ In countries where the three-step test has not been implemented merely through the *ratio legis* of the exception, but also in a separate provision within the copyright act, one may have to ask whether the case in question complies with the test.

Whether secondary liability is present,²² brings to mind the lack of international harmonization in the context of contributory copyright infringement and the question then emerges as to whether that is required, and, if so, what legal template should be followed. In a P2P context, should copyright be infringed by a person who facilitates P2P file-sharing

¹⁸ Conducted by JupiterResearch, in 2009, on behalf of IFPI, BPI, IFPI Germany, FIMI, Promusicae, London Connected/AIM, IMPALA and MPAA, entitled "Analysis of the European Online Music Market Development & Assessment of Future Opportunities". Data were kindly made available, in January 2010, by Gabriela Lopes (Director of Market Research, International Federation of the Phonographic Industry) upon consultation with Shira Perlmutter (Executive Vice-President Global Legal Policy, International Federation of the Phonographic Industry).

¹⁹ See TRIPS Agreement, Article 9; WIPO Copyright Treaty, Articles 1(4) and 8 and agreed statement concerning Article (4); WIPO Performances and Phonograms Treaty, Articles 7 and 11.

²⁰ See United States Copyright Act, 1976, Section 107; United Kingdom Copyright, Designs and Patents Act, 1988, Sections 29-30; Directive 2001/29/EC, Article 5(2)(b).

²¹ TRIPS Agreement, Article 13; WIPO Copyright Treaty, Article 10; WIPO Performances and Phonograms Treaty, Article 16.

²² See, inter alia, W. R. Shiell, "Viral online copyright infringement in the United States and the United Kingdom: the end of music or secondary copyright liability? Part 1: (2004) Ent. L.R. 15(3), 63; Part 2: (2004) 15(4), 107; R. Giblin-Chen, "Rewinding Sony: An inducement theory of secondary liability" (2005) 27(11) E.I.P.R. 428; T. Hays, "The evolution and decentralisation of secondary liability for infringements of copyright-protected works: Part 1" (2006) 28(12) E.I.P.R. 617; T. Hays, "Secondary liability for infringements of copyright-protected works: Part 2" (2007) 29(1) E.I.P.R. 15.

leading to the making available of a work or to the making of a copy of a work, without the authorization of the copyright owner? Should this person believe (on reasonable grounds) that the P2P network will be used for infringing purposes? Should a P2P software provider only be liable for contributory infringement where P2P transmissions are facilitated for commercial purposes? Should an act of primary infringement be required? What should be done as regards Internet service providers and search engines?

When confronted with an act of secondary infringement, we must consider whether the P2P software provider may be deemed a service provider and, if so, whether their activities are covered by a safe harbour.²³

From an enforcement point of view, there are practical difficulties not least because some P2P networks, such as GUNet, MUTE and Ants P2P, include built-in encryption and anonymity features, with all communication being carried out via intermediaries. These networks are designed to hinder the tracing of the sharer and consumer of data.

B. Existing mechanisms to address problems of authors and owners

a) Digital rights management

The properties of digital information led to challenges in the context of copyright enforcement. In turn, enforcement challenges led to the erection of technological barriers²⁴ to prevent illicit copying and to control access to works. To avoid circumventing of such technological barriers, the law established an extra layer of protection prohibiting their neutralization - aiming to create a secure environment for the distribution of digital content.

At the international level, DRM systems are protected by the WIPO Copyright Treaty and the WIPO Performances and Phonograms Treaty, covering both technological measures for protection of copyright and rights management information.²⁵

The WIPO Treaties gave considerable latitude to contracting parties in terms of implementation. The broad wording employed has enabled contracting parties to prohibit circumvention acts and/or trafficking in circumvention devices and services, in relation to copyright control measures and/or access control measures.

Hence, for example:

²³ For example, in the United States, the Digital Millennium Copyright Act of 1998 (DMCA) added Section 512 to title 17 of the United States Code, entitled *Limitations on liability relating to material online*. This new section contains limitations on service providers' liability for four general categories of activity: transitory digital network communications, system caching, information residing on systems or networks at direction of users and information location tools (United States Copyright Act, 1976, Section 512 (a)-(d)). In the European Union, similar legislative action was taken by means of the Electronic Commerce Directive, which set out certain exemptions regarding mere conduits, those responsible for caching and hosts (Directive 2000/31/EC, Articles 12-14).

²⁴ Throughout this study reference to these technological products will be done under the all-embracing term of digital rights management (DRM), rather than technological protection measures - a subcategory of the former. As understood in this study, a DRM contains technological protection measures (particularly focused on access control and copy control) and other components, such as identifiers (which identify content in a unique manner) and meta-data (including, for example, the identity of the copyright owner and the price for usage of the work).

²⁵ See WIPO Copyright Treaty, Articles 11-12 and WIPO Performances and Phonograms Treaty, Articles 18-19.

- Botswana chose to prohibit the trafficking in circumvention devices in relation to copyright control measures (but not the act of circumvention per se, nor trafficking in relation to access control measures)²⁶,
- Ghana made it illegal to circumvent and traffic in circumvention devices in relation to copyright control measures (but not in relation to access control measures)²⁷,
- the United States banned circumvention of access control measures and trafficking in circumvention devices and services in relation to copyright control measures and access control measures (but not the act of circumvention)²⁸, and
- the European Union went further, by prohibiting the circumvention and trafficking in circumventing devices and services, both in relation to copyright control measures and access control measures.²⁹

b) Progressive response legislation

The most recent mechanism to address problems of authors and owners involves the enactment of progressive response legislation. Broadly speaking, such legislation aims to deter online copyright infringement by establishing that users who upload content to the Internet without the authorization of the relevant copyright owners (1) will be sent progressively stronger warnings, (2) followed by, where infringement still persists, suspension of their Internet accounts.

Such laws have emerged in Singapore, South Korea and France.³⁰ In the United Kingdom, the possibility of implementing progressive response legislation was proposed in the UK Digital Economy Bill³¹.

C. Online challenges for the public

Generally, from the perspective of the public, the following problem arises: the concerns resulting from the vulnerability of works in digital format have led to a system where the ability of users to take advantage of exceptions to copyright may be greatly reduced by the combined effect of contract, technology and law. The following sections will describe, briefly, the main points in this respect.

a) Contractual overridability of exceptions to copyright³²

²⁶ Copyright Law of Botswana, 2005, Section 33(a).

²⁷ Copyright Law of Ghana, 2005, Section 42(h)-(i).

²⁸ In the United States, the implementation of the WIPO treaty obligations took the shape of the Digital Millennium Copyright Act of 1998 (DMCA). The DMCA added a new Chapter 12 to title 17 of the Copyright Act, entitled *Copyright Protection and Management Systems*. Section 1201 of the United States Copyright Act, 1976 contains three provisions targeted at the circumvention of technological measures: Section 1201(a)(1)(A), the anti-circumvention provision, and Sections 1201(a)(2) and 1201(b)(1), the anti-trafficking provisions.

²⁹ Directive 2001/29/EC, Article 6.

³⁰ The press release from the French Constitutional Council is available at <http://www.conseil-constitutionnel.fr/conseil-constitutionnel/francais/les-decisions/2009/decisions-par-date/2009/2009-590-dc/communique-de-presse.46023.html>.

³¹ Available at <http://services.parliament.uk/bills/2009-10/digitaleconomy.html>.

³² See, inter alia, L. Guibault, *Copyright Limitations and Contracts: An Analysis of the Contractual Overridability of Limitations on Copyright* (Kluwer Law International, 2002); B. Trompenaars, "Legal Support for Online Contracts" in P.B. Hugenholtz (ed.), *Copyright and Electronic Commerce* (Kluwer Law International, 2000) 267; H. Schack, "Anti-Circumvention Measures and Restrictions in Licensing Contracts as Instruments for Preventing Competition and Fair Use" (2002) *University of Illinois Journal of Law, Technology and Policy* 321; J. De Werra, "Moving Beyond the Conflict Between Freedom of Contract and Copyright Policies: In Search of a New Global Policy for On-Line Information Licensing Transactions" (2003) *25 Columbia Journal of Law and the Arts* 239.

The international copyright instruments are silent as regards the relationship between contractual freedom and copyright law, which is left to domestic legislators.

At a regional level, in the European Union, for example, thus far copyright law has tackled the relationship between exceptions to copyright and contract in a piecemeal and, arguably, contradictory manner.

The EC Computer Programs Directive establishes a rule of prevalence of certain exceptions over contract³³, which was followed in the EC Databases Directive³⁴, so that contractual provisions contrary to certain exceptions set in those Directives are deemed null and void.

The EC Information Society Directive, however, favours a rule of prevalence of contract over exceptions in an online context. Recital 53 of the Information Society Directive determines that:

The protection of technological measures should ensure a secure environment for the provision of interactive on-demand services [...], Where such services are governed by contractual arrangements, the first and second subparagraphs of Article 6(4) should not apply (...)

And this principle is reiterated in Article 6(4) of the same directive, which states that, in relation to works supplied online on agreed contractual terms, copyright owners may prevent users from benefiting from all exceptions to copyright.³⁵

A recent report put this perception to the test by looking at the main contractual practices developed in Europe for the supply of online services, concluding that:

The contractual language used in the majority of licences examined (...) may have a chilling effect on users who would like to use the protected material for otherwise legitimate purposes than strictly private non-commercial use (...) Restrictive contract terms may therefore impede such legitimate uses such as music review, media studies and film critique, to name just a few examples.

(...)

In view of the silence of the Information Society Directive on this point, the only remedies available against abusive contractual clauses are to be found in the general rules of law, such as competition law or consumer protection law, which are, at present, poorly suited to meet the needs of users of copyrighted material in the digital networked environment.³⁶

b) Technological overridability of exceptions to copyright³⁷

³³ Council Directive 91/250/EE, Article 9.

³⁴ Directive 96/9/EC, Article 15.

³⁵ Directive 2001/29/EC, Article 6(4), *in fine*: "The provisions of the first and second subparagraphs shall not apply to works or other subject-matter made available to the public on agreed contractual terms in such a way that members of the public may access them from a place and at a time individually chosen by them."

³⁶ B. Hugenholtz, M. Eechoud, S. Gompel, L. Guibault, et al, "The Recasting of Copyright & Related Rights for the Knowledge Economy", report to the European Commission, DG Internal Market, November 2006, available at http://www.ivir.nl/publications/other/IViR_Recast_Final_Report_2006.pdf.

³⁷ See, inter alia, J.E. Cohen, "Some Reflections on Copyright Management Systems and Laws Designed to Protect Them" (1997) 12 Berkeley Tech. L.J. 161; S. Dusollier, "Electrifying the fence: the legal protection of technological measures for protecting copyright" (1999) 21(6) E.I.P.R. 285; J.E. Cohen, "WIPO Copyright Treaty Implementation in the United States: Will Fair Use Survive" (1999) 21(5) E.I.P.R. 236; J.E. Cohen & D. Burk, "Fair Use Infrastructure for Copyright Management Systems" (Fall 2001) 15:1 Harvard Journal of Law & Technology; K.J. Koelman, "The Protection of Technological Measures vs. Copyright Limitations", in J.C. Ginsburg and J.M. Besek (eds.), *Adjuncts*

In practice, the principle of prevalence of contractual freedom over exceptions may be enforced by technology. Technology enables copyright owners to enter into non-negotiated electronic contracts with end users – who may or may not understand the contractual terms and conditions imposed by content providers. Consequently, the extent to which an end user may be able to benefit from an exception (or not) may be restricted by licensing agreements enforced by DRM.

The problem is that DRM may prevent both illicit and permitted acts. Recently, the author of the present study assessed, empirically, the impact of DRM on the ability of users to take advantage of certain exceptions to copyright, in the United Kingdom.³⁸

Based on a series of interviews with key organizations and individuals involved in the use of copyright material and the development and deployment of DRM, the author examined how these issues are working out in practice.

It was concluded that certain beneficiaries of exceptions, such as, the British Library and the film lecturers and students/researchers community, are being adversely affected by the use of DRM.

Where a beneficiary of a privileged exception for educational purposes is not able to benefit from it or is only able to do so in a limited manner, it could be argued that this undermines the public interest considerations underlying the exception – an argument that invokes the spirit of the law, rather than just its letter.

Overall, there is a gap between user expectations and what is being delivered by DRM, and this gap may have considerable repercussions in developing countries.

Digital technology offers great opportunities for developing countries in terms of access to information, particularly regarding educational and research activities. Online distance-learning tools offer people in developing countries the opportunity to access information, knowledge and culture, at a time and a place individually chosen by them.

In fact, it has been pointed out that:

(...) researchers or students in developing countries would be enabled to get access to virtually the same electronic journals, books, and databases as their counterparts at the world's leading educational institutions. Hence, the universal realization of the right to development, the right to education, and the right to freedom of expression,

and alternatives to copyright, Proceedings of the ALAI Congress, June 2001, Columbia University School of Law, New York, 2002, 448; S. Dusollier, "Tipping the Scale in Favour of the Right Holders: The European Anti-Circumvention Provisions" in E. Becker, W. Buhse, D. Gunnewig and N. Rump, Digital Rights Management: Technological, Economic, Legal and Political Aspects (Springer, 2003), 462; N. Braun, "The interface between the protection of TPMs and the exercise of exceptions to copyright and related rights: comparing the situation in the United States and the European Community" (2003) 25(11) E.I.P.R. 496; S. Dusollier, "Technology as an imperative for regulating copyright: from the public exploitation to the private use of the work" (2005) 27(6) E.I.P.R. 201; P. Akester, "The political dimension of the digital challenge: copyright and free speech restrictions in the digital age" 2006 (1) I.P.Q. 16; N. Garnett, "Automated rights management systems and copyright limitations and exceptions", WIPO Document SCCR/14/5, April 2006.

³⁸ See P. Akester, "Technological accommodation of conflicts between freedom of expression and drm – the first empirical assessment", 2009, full report available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=146941.

enshrined in the major international and regional instruments for the protection of human rights, will be significantly reinforced in the digital age.³⁹

But the reinforcement of these fundamental rights may not emerge, as DRM systems used to protect digital content (thereby assuring revenue from uses) may reduce the availability of online educational resources for developing countries. In practice, users in developing countries may not be able to afford access to and use of that content.

D. Existing mechanism to address problems of the public

The fear that the current copyright system may curtail, excessively, access to information and, possibly, stifle innovation and creativity, has led to the strengthening of the open content philosophy, leading, most notably, to the emergence of the Creative Commons.⁴⁰

The aim of the Creative Commons movement is to increase the amount of cultural, educational and scientific content that is freely available to the public for “sharing, use, repurposing, and remixing”.⁴¹

This is achieved through an automated licensing mechanism that enables creators to reserve some rights (allowing certain uses of a work) or to place their works in the public domain (opting for a no rights reserved alternative to copyright).

With Creative Commons licences, creators may choose a set of conditions to apply to their work:

- Attribution -You let others copy, distribute, display, and perform your copyrighted work — and derivative works based upon it — but only if they give credit the way you request.
- Share alike - You allow others to distribute derivative works only under a licence identical to the licence that governs your work.
- Non-commercial - You let others copy, distribute, display, and perform your work — and derivative works based upon it — but for non-commercial purposes only.
- No-derivative works -You let others copy, distribute, display, and perform only verbatim copies of your work, not derivative works based upon it.⁴²

Every Creative Commons licence is founded on the *attribution clause*, but creators may then decide whether to authorize commercial use, whether to authorize modifications to the work and whether to authorize the dissemination of derivative works under the same freedoms as those provided by the licence of the original work.

Significantly, Creative Commons licences do not affect exceptions to copyright. To make this clear all licences include the following or similar provision:

Nothing in this licence is intended to reduce, limit, or restrict any rights arising from fair use, first sale or other limitations on the exclusive rights of the copyright owner under copyright law or other applicable laws.⁴³

³⁹ H. Sun, “Copyright law under siege: an inquiry into the legitimacy of copyright protection in the context of the global digital divide” (2005) 36:2 I.I.C. 192, 192.

⁴⁰ http://wiki.creativecommons.org/Legal_Concepts.

⁴¹ <http://creativecommons.org/about/what-is-cc>.

⁴² <http://creativecommons.org/about/licences>.

In December 2002, Creative Commons released its first copyright licences to the public. It is estimated that, in 2003, there were one million Creative Commons licensed works around the world and, in 2008, one hundred and thirty million.⁴⁴

III. Assessment

From the perspective of authors and owners, digital technology brought with it new modes of infringement, the common denominator of which is the ease, the speed, the (virtual) absence of cost and the large-scale of copying and dissemination of protected material that it makes possible.

Naturally, this led to the use of protective technologies in order to prevent works from being used unlawfully.

In turn, this was followed by international, regional and national legislative crafting of anti-circumvention provisions, as otherwise those protective technologies could be circumvented without any consequences.

Simultaneously, technology facilitated the use of contracts to regulate the use of digital content - with the law offering little guidance as regards the validity of a contract that prevents or limits the exercise of an exception to copyright.

From the perspective of the public, valid concerns resulting from the vulnerability of works in digital format have led to a system where the ability of law abiding users to take advantage of exceptions to copyright may be greatly reduced.

On a practical level, where access and use of digital content are secured by technology and contract, the possibility of a law abiding user benefiting from exceptions to copyright may be eliminated.

The problem seems to be that while copyright owners have acquired technological and legal weapons to protect their interests in the face of digital dangers, the public has not been awarded equivalent instruments to safeguard access to information in the digital age – with stronger repercussions foreseen in the developing world.

In fact, recent legislative efforts have focused on protecting rights (that are central to copyright's mission) but not on counterbalances to protect exceptions (which complement those rights and are indispensable to safeguard public access to protected information).

Responses to concerns about preserving public access to information have not come from lawmakers but from civil society. The Creative Commons movement, for example, emerged as a result of the perception that the current balance had tilted too far in favour of copyright owners.

The open content philosophy has provided creators with an alternative path to the traditional copyright system, but the open content movement, per se, cannot eradicate problems that have emerged within the mainstream copyright system.

The result, given the role played by exceptions (in reconciling the protection of the moral and economic interests of authors and owners and the public interest in fostering freedom of expression and public access to information and culture) is one of unbalance – and it is possible that a perception of unbalance may provide an incentive for illegal online activity.

⁴³http://wiki.creativecommons.org/Frequently_Asked_Questions#Do_Creative_Commons_licences_affect_fair_use.2C_fair_dealing_or_other_exceptions_to_copyright.3F.

⁴⁴ <http://creativecommons.org/about/history>.

Practical solutions are required that focus on identified problems with surgical precision and consider and articulate, on the one hand, the protection of access to information, knowledge and culture and, on the other hand, the protection of creativity.

IV – Possible Solutions

A. Scope and methodology of proposed solutions

The following proposed solutions are premised on the hypothesis that the recent alliance between copyright law and two tools to safeguard the interests of copyright owners online, contract and technology, has affected the “metaphor of balance” traditionally enshrined in the copyright system.

As such, the proposed solutions (to address the challenges resulting from the contractual and technological overridability of copyright exceptions in the digital world) do not entail re-evaluating, re-thinking, re-formulating and re-architecting the existing copyright system *per se*.

Rather than abandoning tried and tested traditional copyright principles, the proposals require re-architecting efforts to be devoted to contract and DRM (paracopyright rather than copyright) in their intersection with copyright.

It is suggested that these solutions be promoted through a soft-law approach, with national governments being provided with a set of recommendations or guidelines to be implemented at the national level.⁴⁵

This recognizes that (1) given the compatibility of the proposed solutions with the existing international copyright law framework, there is no imperative need to modify the international texts in question and (2) national governments are likely to be in a better position to drive legislative efforts that reflect their own particularities.

While non-binding and therefore weaker than a hard-law approach, the soft-law path has several advantages: it is easier to achieve, easier to amend and may evolve, eventually, into hard-law at international level.⁴⁶

B. Possible solution regarding the contractual overridability of exceptions to copyright

As seen above, at the international and European levels, the intersection between contract and exceptions to copyright is condemned to either silence or, arguably, contradiction.

⁴⁵ See, advocating the use of soft law mechanisms, C. Geiger, “Implementing an International Instrument for Interpreting Copyright Limitations and Exceptions” 40(6) I.I.C. 627; A. Kur and H. Grosse Ruse-Khan, “Enough is Enough - The Notion of Binding Ceilings in International Intellectual Property Protection”, http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1326429; P.B. Hugenholtz and R. Okediji, “Conceiving an International Instrument on Limitations and Exceptions to Copyright”, http://www.ivir.nl/publications/hugenholtz/limitations_exceptions_copyright.pdf.

⁴⁶ P.B. Hugenholtz and R. Okediji, “Conceiving an International Instrument on Limitations and Exceptions to Copyright”, http://www.ivir.nl/publications/hugenholtz/limitations_exceptions_copyright.pdf.

In practice, this legal environment has facilitated the exploitation of protected works through electronic mass-market licences that may override exceptions to copyright - thus, enabling stronger protection than that afforded by copyright.

The problem is that the principle of freedom of contract presupposes the equality of the parties, but often the unequal bargaining power of the parties will mean that one of them will be able to determine, unilaterally, the terms of a contract.

Hence, clarification is required as to the extent to which contract may be used to override exceptions, bearing in mind that exceptions designed to protect fundamental rights or driven by public interest considerations should be preserved and defended in the digital environment.

It should be recognized that, in certain cases, the public may need to be protected from the ability to alienate the possibility to benefit from copyright exceptions.

Rather than providing that all exceptions are either mandatory or waivable by contract, a *via media* would entail differentiating between exceptions on the basis of their rationale.⁴⁷

In line with this, where an exception is attributable, principally, to the protection of fundamental rights, such as freedom of expression, and to the defence of corollaries of the latter, such as dissemination of information, contractual overridability would not be possible. This would be the case, for example, with exceptions that allow entities, such as libraries, the visually impaired, researchers and teachers, to carry out certain acts of copying.

Unilateral decisions as regards waiver of exceptions to copyright could be avoided by a clause deeming null and void any contractual provision eliminating or impeding the normal exercise of certain exceptions. Such a clause could read:

Any contractual provisions intended to eliminate or impede the normal exercise of exceptions designed to protect fundamental rights or driven by public interest considerations will be null and void, although the parties may freely agree on the respective forms of exercise, including the amount of equitable remuneration.⁴⁸

This principle would not prevent parties from entering agreements on ways in which exceptions may be carried out, as long as such agreements, ruled by *bona fide* rules, do not eliminate or impede the normal exercise of exceptions. An agreement could state, for example, that the user is able to work an exception in exchange for an equitable remuneration.

C. Possible solution in connection to the technological overridability of exceptions to copyright⁴⁹

⁴⁷ B. Hugenholtz, "Fierce Creatures. Copyright Exemptions: Towards Extinction?", <http://www.ivir.nl/staff/hugenholtz.html>. See also S. Dusollier, Y. Pouillet and M. Buidens, "Copyright and Access to Information in the Digital Environment", <http://unesdoc.unesco.org/images/0012/001238/123894eo.pdf> and L. Guibault, "The Nature And Scope Of Limitations And Exceptions to Copyright And Neighbouring Rights With Regard To General Interest Missions For The Transmission Of Knowledge: Prospects For Their Adaptation To The Digital Environment", *E-Copyright Bulletin* (October-December 2003) 9.

⁴⁸ This principle can be found, for example, in the EC Computer Programs Directive (Council Directive 91/250/EE, Article 9), in the EC Databases Directive (Directive 96/9/EC, Article 15) and in Article 75(5) of the Portuguese Author's Right and Connected Rights Code, 1985.

⁴⁹ The following proposal is based on a solution put forward in P. Akester, "Technological accommodation of conflicts between freedom of expression and DRM – the first empirical assessment", 2009, full report available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1469412.

The following proposal is premised on the assumption that beneficiaries of exceptions designed to protect fundamental rights or driven by public interest considerations (hereinafter referred to as *privileged exceptions*) require access to works protected by DRM, so as to be able to carry out certain permitted acts in spite of the legal protection of DRM systems (and, therefore, take advantage of certain copyright exceptions that are connected to core freedoms).

Thus, what is required is an expeditious procedure to facilitate access to works by beneficiaries of privileged exceptions and to enable optimum use of those exceptions. **This implies the need for access to works portals.**

The existence of access to works portals would be made possible by a DRM deposit system, according to which the means to enable beneficiaries of privileged exceptions to benefit from them (such as, a non-protected version of the work or a decryption key) would be deposited and made available through access to works portals, in specified circumstances.⁵⁰

As to scope, national copyright offices (or other appropriate entities) could conduct regular hearings and create deposit obligations (for particular categories of works and users) when beneficiaries of exceptions designed to protect fundamental rights or driven by public interest considerations are found to be adversely affected by DRM in their ability to carry out non-infringing uses.

In practice, the creation of access to works portals requires selecting a deposit entity within a given country, setting up a procedure to enable expeditious access to works by beneficiaries of privileged exceptions and establishing incentives to guarantee the effectiveness of the system.

The selection of a deposit agency within a given country could echo national legislative choices in terms of legal deposit, so that a main deposit library could become the entity with which those means are deposited (and the entity providing access to those means).

As to the procedure to enable expeditious access to works by beneficiaries of privileged exceptions, it could involve three simple steps: (i) request (ii) partitioning and authentication and (iii) immediate access. A beneficiary of a privileged exception upon finding that a DRM prevents or limits the enjoyment of that exception would request, through the appropriate national access to works portal, online access to the means required to enable exercise of the privileged exception in question. In line with the existing self-certification practice in the context of access to libraries, a beneficiary would have to provide identification elements (such as full name and email address) and declare the lawful purpose of the use (educational, for example) and country of usage. Lastly, the beneficiary in question would have immediate access to the means of benefiting from that exception.

In order to minimize abuse, all copies issued under this procedure could be individually watermarked, and it could be made an offence to distribute those copies knowingly to persons to whom the certification does not apply. This should ensure that copies of works obtained legitimately through national access to works portals are not then circulated online illegally.

⁵⁰ For an analysis of the compatibility of this solution with Article 5(2) of the Berne Convention, see P. Akester, "Technological accommodation of conflicts between freedom of expression and DRM – the first empirical assessment", 2009, full report available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1469412.

An emerging problem would be that of privacy. In order to identify individual digital copies, without jeopardizing privacy of users, individually watermarked copies should be numbered, without identifying the beneficiary. Only deposit agencies would have access to the database holding the link between numbers and individual beneficiaries, which information they would only disclose to law enforcement authorities in specified circumstances.

Effectiveness of the proposed solution could be guaranteed by an incentive: an exemption from the prohibition against circumvention of DRM could be offered in cases where a beneficiary cannot take advantage of an exception designed to protect fundamental rights or driven by public interest considerations, but no means have been deposited with the relevant authority.

This incentive tool takes on a practical and useful dimension when extended to both beneficiary and deposit agency. It would enable a deposit agency to make a digital copy of a work to ensure availability through the respective national access to work portal – in the absence of deposit. And it could be a very valuable mechanism for beneficiaries of exceptions designed to protect fundamental rights or driven by public interest considerations, such as, film lecturers and students/researchers community who are experiencing difficulties in extracting portions of DRM protected films for educational use and are, consequently, being led to perform isolated acts of self-help for academic and educational purposes. Hence, it is suggested that this exemption could be offered to the beneficiary and the deposit agency in question.

V – Further Work

There is a certain amount of legal uncertainty in connection to progressive response legislation. Whilst its goal of encouraging Internet users to use legitimate online music services and to deter repeat infringers is a valid one, there are doubts as to the method employed.

The possible sanction of suspension of the Internet accounts of repeat copyright infringers may affect human rights – where Internet access is seen “as an instrument for promoting the realization of the human rights as defined in Articles 19 and 27 of the Universal Declaration of Human Rights.”⁵¹

Therefore, further work should be carried out on the subject, examining, *inter alia*, whether and how progressive responsive legislation may affect human rights and proposing creative solutions, in that context, that comply with both human rights and copyright legal frameworks.

VI –Recommendations

Rights emerge hand in hand with exceptions, which are regarded as an essential part of the compromise between the various interests associated with copyright.

The recent alliance between copyright law, contract and technology facilitates the watering down of copyright exceptions in the digital world, thus affecting the “metaphor of balance” traditionally enshrined in the copyright system.

This balance will be restored when all interests at stake are protected, equitably: rights that are central to copyright's mission and exceptions that complement those rights (and are indispensable to safeguard public access to protected information).⁵²

⁵¹ UNESCO Recommendation concerning the Promotion and Use of Multilingualism and Universal Access to Cyberspace, 6.

⁵² This accords with the UNESCO Recommendation concerning the Promotion and Use of Multilingualism and Universal Access to Cyberspace, 23, which reaffirms the equitable balance between the interests of copyright owners and those of the public: “Member States should undertake,

This does not require abandoning tried and tested copyright principles. The challenges resulting from the contractual and technological overridability of copyright exceptions in the digital world may be solved without re-evaluating, re-thinking and re-formulating the existing copyright system per se. Instead, re-architecting efforts should be devoted to contract and DRM (paracopyright rather than copyright) in their intersection with copyright.

In order to take into account all interests at stake, the following recommendations, based on the solutions put forward above, could be made:

1. To avoid the contractual overridability of exceptions to copyright, it may be established that any contractual provision eliminating or impeding the normal exercise of certain exceptions (those designed to protect fundamental rights or driven by public interest considerations, that is, "privileged exceptions") will be deemed null and void.

2. To avoid the technological overridability of exceptions to copyright, a DRM deposit system may be created, according to which the means to enable beneficiaries of "privileged exceptions" to benefit from them (such as, a non-protected version of the work or a decryption key) will be deposited and made available through access to works portals, in specified circumstances [This solution entails a deposit incentive and penalties for abuse of the system].

in close cooperation with all interested parties, the updating of national copyright legislation and its adaptation to cyberspace, taking full account of the fair balance between the interests of authors, copyright and related rights-holders, and of the public embodied in international copyright and related rights conventions."

Table of Abbreviations

“Berne Convention”. Berne Convention for the Protection of Literary and Artistic Works, Paris text, 1971.

“Computer Programs Directive”. Council Directive on the legal protection of computer programs (Dir. 91/250/EEC).

“Databases Directive”. Directive on the legal protection of databases (Dir. 96/9/EEC).

“European Convention on Human Rights”. European Convention for the Protection of Human Rights and Fundamental Freedoms, Rome, 1950.

“Information Society Directive”. Directive on the harmonization of certain aspects of copyright and related rights in the information society (Dir. 2001/29/EC).

“International Covenant on Civil and Political Rights”. International Covenant on Civil and Political Rights, 1966.

“International Covenant on Economic, Social and Cultural Rights”. International Covenant on Economic, Social and Cultural Rights, 1966.

“UNESCO Recommendation concerning the Promotion and Use of Multilingualism and Universal Access to Cyberspace”. “Recommendation concerning the Promotion and Use of Multilingualism and Universal Access to Cyberspace”, Adopted by the UNESCO General Conference in 2003 (32nd session).

“TRIPS Agreement”. Agreement on Trade-related Aspects of Intellectual Property Rights, Marrakesh, 1994.

“WIPO Copyright Treaty”. WIPO Copyright Treaty, Geneva, 1996.

“WIPO Performances and Phonograms Treaty”. WIPO Performances and Phonograms Treaty, Geneva, 1996.

“Universal Copyright Convention”. Universal Copyright Convention, Paris text, 1971.

“Universal Declaration of Human Rights.” Universal Declaration of Human Rights, Paris, 1948.

Table of Legislation

International

- Berne Convention for the Protection of Literary and Artistic Works, Paris text, 1971.
- International Covenant on Civil and Political Rights, 1966
- International Covenant on Economic, Social and Cultural Rights, 1966.
- Agreement on Trade-related Aspects of Intellectual Property Rights, Marrakesh, 1994.
- WIPO Copyright Treaty, Geneva, 1996.
- WIPO Performances and Phonograms Treaty, Geneva, 1996.
- Universal Copyright Convention, Paris text, 1971.
- Universal Declaration of Human Rights, Paris, 1948.

Regional

- Charter of Fundamental Rights of the European Union, Nice, 2000.
- Council Directive on the legal protection of computer programs (Dir. 91/250/EEC).
- Directive on the legal protection of databases (Dir. 96/9/EEC).
- Directive on certain legal aspects of information society services, in particular electronic commerce, in the Internal Market (Dir. 2000/31/EC)
- European Convention for the Protection of Human Rights and Fundamental Freedoms, Rome, 1950.
- Directive on the harmonization of certain aspects of copyright and related rights in the information society (Dir. 2001/29/EC).

National

- Copyright Law of Angola, 1990.
- Copyright Law of Botswana, 2005.
- Copyright Law of Brazil, 1998.
- Copyright Law of Cape Verde, 1990.
- Copyright Law of Ghana, 2005.
- Copyright Law of Madagascar, 1995.
- Copyright Law of Mauritius, 1997.
- Copyright Law of Mozambique, 2001.
- Copyright Law of Portugal, 1985.

Copyright Law of the Seychelles, 1991.

Copyright, Designs and Patents Act of the United Kingdom, 1988.

Copyright Act of the United States, 1976.