

Future of Copyright Anthology

A collection of texts from a crowd-funded contest.

Thank you for all your contributions! You made this book possible.

Dear readers!

It is our great pleasure to present you the "Future of Copyright Anthology", a collection of 10 best short stories sent in for the "Future of Copyright" contest organized by Modern Poland Foundation. These works have been selected by our jury – Prof. Michael Geist, Piotr Czerski and Jarosław Lipszyc.

The main prize in this contest was founded by you, the readers, on the Indiegogo crowdfunding platform. We are proud to announce that this prize goes to Aymeric Mansoux, author of "Morphology of a copyright tale", in appreciation of the originality, power and the strong message of this work. Moreover, the jury decided to grant an honorable mention to Togi, author of the work "Give".

We would like to thank you for your crowdfunding support and a high standard of the submitted works. We were pleasantly surprised by the interest shown in the competition, and we have decided to hold its second edition next year. We hope that with your help it will be even more successful and the collected works will provide a strong voice in the debate on the future of copyright law and system.

Modern Poland Foundation Team



http://nowoczesnapolska.org.pl/

AYMERIC MANSOUX

Morphology of a copyright tale

This text is based on the work from Vladimir Yakovlevich Propp in his 1928 essay "Morphology of the Folktale". By studying many Russian folktales, Propp was able to break down their narrative structure into several functions, literally exposing an underlying thirty one step recipe to write new and derivate similar stories.

* I. ABSENTATION

Once upon a time in the wonderful Folklore Valley, a creator wonders about the becoming of her memetic folktale legacy and decides to take some distance from the anonymous creative practices of her community.

* 2. INTERDICTION

The creator is warned by a giant caption. It reads: "Do Not Want".

* 3. VIOLATION OF INTERDICTION

Despite the viral warning, the creator leaves her community and starts to sign her work as a mean to legitimate her individual contribution to the folktale scene.

* 4. RECONNAISSANCE

On her way to authorship, she encounters the Lawyer and the Publisher.

* 5. DELIVERY

The Lawyer delivers rights to the creator.

* 6. TRICKERY

The creator becomes the Author.

* 7. COMPLICITY

At this point the Author and the Publisher begin to promote copyright laws in the Folklore Valley.

* 8. VILLAINY AND LACK

With the help of the Lawyer, the Publisher uses the Author as an excuse to transform the Folklore Valley into a profitable folktale factory.

* 9. MEDIATION

The Author receives distressed calls from another creator persecuted by the Publisher for making a derivative work from a copyrighted folktale.

* IO. COUNTERACTION

The Author hears the sound of a flute. The free melody comes from a campsite, beyond the Folklore Valley.

* II. DEPARTURE

The Author leaves the, now fully copyrighted, Folklore Valley and heads toward the campsite, attracted by the melody of this open invitation. The Lawyer is following her from a distance.

* I2. TESTING

Arrived at the campsite, the Author learns from the Man with a Beard, that useful information should be free. And by free he is not referring to its price. The Lawyer, hiding, is listening attentively. The Man with a Beard resumes his flute practice.

* 13. REACTION

Leaving the campsite, the Author wonders whether or not cultural expressions can also be free and, somehow, now liberated from copyright.

* 14. ACQUISITION

The Lawyer appears in front of the Author and hands over free culture licenses.

* 15. GUIDANCE

With the help of remix culture, the Lawyer uses the Author as an excuse to transform the Folklore Valley into a techno-legal free for all bureaucratic maze.

* 16. STRUGGLE

With licensing proliferation, the Author cannot cope with the increasing complexity linked to her practice. She feels that she lost all control over her work, just so it can be used as fuel for the ever expanding information network nurtured by the Lawyer and the Publisher.

* 17. BRANDING

Regardless of what her true intentions are, her whole body of work gets tattooed with different logos, iconic representations of supposedly human readable deeds that all reinforce the many conflicting ideologies, commercial interests and beliefs now rationalised by copyright laws and their different copyleft-inspired hacks.

* 18. VICTORY

The only escape left is to ignore copyright, no matter what. Leave everything behind, a small personal victory, over the techno-legal machine, but a first step towards the liberation of the Folklore Valley.

* 19. RESOLUTION

As a result, the Author becomes Pirate of her own work, of any work, once again. She puts on an eyepatch.

* 20. RETURN

The Pirate returns to the, now fully copyfreed, copyrighted, copylefted and copyfarlefted incompatible and fragmented Folklore Valley. The Publisher and the Lawyer make sure everything is tidy and sound. Vladimir Propp's Morphology of the Folktale becomes a patented algorithm for a freemium manufacture that feeds itself automatically from the aggregation of open content produced by the Folklore Valley's creators.

She has something to say about that.

* 21. PURSUIT

The Publisher and the Lawyer, who see the presence of the Pirate as a serious threat to their information empire, start several campaigns of misinformation to question the legitimacy of the Pirate to comment on anything but her unlawful, therefore moralistically evil, activities.

This undermining process is strengthen by increasingly aggressive, punitive and gratuitous repression mechanisms towards any creators who might want to follow her footsteps.

* 22. RESCUE

The Pirate escapes for a while from the Publisher and the Lawyer by using the underground networks of tunnels and caverns right under the, now fully tracked, logged, cloudified and gamified, Folklore Valley.

* 23. ARRIVAL

Eventually, the Pirate decides to face the surface of the Valley instead of living the rest of her life as some underground rat. She emerges right in the middle of an astonished crowd of brainwashed creators and template-based folktales.

* 24. CLAIM

The Publisher and the Lawyer steps in and deliver the usual moralistic speech, the one that kept the creators of the Folklore Valley quiet and under control all this time. The fear of being stolen can be felt in all the tales, panic is about to break loose.

* 25. TASK

The publisher and the Lawyer challenges the Pirate. They argue that she has no rights to comment on the situation. She is merely a parasite, a free rider who has no clue of what is at stake.

* 26. SOLUTION

The Pirate drops her eyepatch.

* 27. RECOGNITION

All of sudden all the creators recognise the Author. The one Author who once started to sign many of the folktales that are now used as licensed templates in the tale factories planted by the Lawyer and the Publisher.

And they all listen to her...

* 28. EXPOSURE

The Author explains her journey.

Since her individualistic awakening she started to initiate many experiments and ways of working with her medium, using others' material directly or indirectly. She was interested in as many collaborative methodologies as there were colours in the world. She explains that, as her practice grew, she felt the need to sign and mark her work in a way or another, and was confused about this sudden paradox: on the one hand her desire to be just this simple node in this continuous stream of creativity, and on the other hand she had this instinctive need to stand above her peers, to shine and be visible for her own contribution. She also tells them about her needs to simply make a living and therefore, why she genuinely thought copyright was a fair model, harmless for her audience and peers. She says that she equally failed to understand that the freedom they

once had as a community of folktale creators cannot be emulated through contract laws, no matter what good intentions drive them.

She concludes that at every stage of her quest to understand the very fabric of culture, the Publisher and the Lawyer were present to enable and support her experiments, yet slowly getting stronger and out of control. If anything at all, she feels responsible for letting them decide how her work, how culture, should be produced and consumed.

She apologises.

* 29. TRANSFIGURATION

The Author becomes a creator, once again.

* 30. PUNISHMENT

The Publisher's and the Lawyer's work is undone. Copyright is banned from the Folklore Valley.

* 31. WEDDING

The creator marries another creator. They live happily ever after, creating many new folktales.

As for the Man with a Beard, I was told that he turned his campsite into a brewery, but that's another story...

HONORABLE MENTION

TOGI

Give

0

The repetition, alteration and imitation of patterns is fundamental to life.

0.0

Life expresses itself through this movement.

O. I

Each interaction between any differing form of life is dependent on the exchange between the forms of the details of the forms themselves.

O. I. O

There is no interaction without exchange.

O. I. I

There is no life without interaction.

0.2

All perception depends on this movement.

0.2.0

Perception consists of continual repetition, imitation, interpretation.

0.2.0.0

Any pattern must be repeated and imitated multiple times by varied elements and organs in order to be perceived.

O. 2. O. I

Perception is 'copying'.

0.3

Nothing comes from nothing.

0.3.0

All growth (that is, *living*) requires input from external and internal forces, of patterns developed from internal and external exchange.

0.3.0.0

The growth of a living entity is the continual reinterpretation of its base pattern, performed by forces internal and external to itself.

0.4

All culture is reliant on copying, on repetition, imitation, interpretation and alteration.

0.4.0

All experience of the world relies on interpreting the elements of that world.

0.4.0.0

All interpretation is a case of repetition, imitation and alteration.

0. 4. 0. I

All experience relies on copying.

0. 4. I

All human interaction is a process of imitation, repetition, and interpretation.

o. 4. I. o

Language is 'copying'. So is art.

0.4.2

To restrict the exchange of information within a culture is to diminish its potential for growth. This will weaken it. Strong culture relies on fluid exchange.

0.5

All attempts to deny the fundamental nature of 'copying' are attempts to deny the fundamental nature of our existence. They are nihilistic.

0.5.0

Any attempt to deny the ability of another entity to experience, to interpret, to copy, is violent in essence.

O. 5. O. I

Copyright represents a violent, nihilistic attempt to restrict and delimit the fundamental natures of life and culture.

0. 5. 0. I. 0

Copyright is an act of war.

0.6

Private communication (that is, directed communication — the interaction of data expressly within a limited reach) is also fundamental in the sense that directed communication is a core process of life

0.6.0

Eyes do not hear, the nose does not send signals to the tongue...

о. 6. і

Privacy is inbuilt and necessary for directed communication to have relevance. Relevance, and privacy are purpose, goal; directedness.

o. 6. I. o

This means that improvement on the methods of privacy serve to increase effectiveness. If the tongue received aural queues, the ears would have to reduce their output so as not to drown the signals from the tongue: the overall ability of the organism would be reduced.

о. 6. г. о. о

If one can ensure effective directedness and relevance in one's communication, without needing to water down this communication for fear of it not reaching location, or being dispersed through other locations, one improves the communication.

0. 6. 1. 0. 1

In directed communication, we have encoding — ensuring the message is received in the manner intended. Encoding in words, encoding in sound, encoding words cryptographically...

o. 6. i. o. i. o

We can also rely on trust, on respect, to request that a communication does not leave certain bounds.

o. 6. i. o. i. o. i

All communication relies on trust unless it is fully open. Privacy and trust are interlinked.

o. 6. I. o. I. o. I. o

Copyright is neither privacy nor trust — it is a release of information that is not strictly encoded (music, for example, is open, and relies on being open to be enjoyed) but which aims to restrict its flows of dissemination.

0. 6. 1. 0. 1. 0. 1. 1

The closest we might get to 'intellectual property' is 'a secret', but they are clearly not the same thing. A secret is no longer a secret if many know it, yet we are to believe that a thought, a pattern, remains 'a secret' (i. e. 'mine, and mine alone') once known by all?

0. 6. 1. 0. 1. 0. 1. 1. 0

We might liken copyright to wanting to both broadcast a secret, yet keep it a secret.

0.6.2

If one wishes to ensure privacy, one must use the tools available to retain this privacy.

0.6.2.0

One is responsible for both the keeping of one's own secrets, and to whom one tells those secrets.

0. 6. 2. 0. 0

Once one 'releases' a pattern, one no longer retains control of it.

0. 6. 2. 0. 0. 0

To fight this fact is akin to wanting to both drink a bottle of wine and keep it in the cellar: 'To have your cake and eat it too'.

0. 6. 2. 0. 0. 0. 0

To base legal and cultural structures on this idea is clearly absurd.

0.7

Copyright seeks to deny self-ownership — one's ownership (control) of one's own thoughts and perceptions. It seeks to take from us our endless possibilities of creation.

0.7.0

On its own terms, copyright is theft.

I

Whether or not there is an ideological advantage to unrestricted sharing of data, there is currently a massive corporate and governmental effort to limit it.

I. O

Given the lack of historical telos, faith in 'things will go the way we want' is invalid. (See 'information wants to be free' and other glib idealism.)

I. O. O

History is a story of power against power.

I. O. I

Societal choices (or, 'History') are made by those with the will to push for what they want. That is, things happen because people do them.

I. O. I. O

This is irrespective of 'right' or 'wrong'. The universe is not a moral occasion.

I. O. I. I

The strongest wills have chosen, and likely always will choose the course of 'humanity'. History is a story of power against power.

I. I

Those who get what they want are the people who are aware of [1. o]. They do not rely on 'fate' to deliver what they wish — fate rarely delivers.

I. I. O

Those who do not get what they want are often at an ideological disadvantage as they do not like the game of powerplay.

I. I. O. O

This often shows itelf in a desire not to show one's personal desires as such, but instead as a kind of 'historical/divine/democratic/Good will'.

I. I. O. I

Another telltale sign is one of speaking of 'rights' and 'freedoms'.

I. I. O. I. O

Rights and Freedoms are those things which we request from those who have power over us.

I. I. O. I. O. O

They assume reliance on being controlled, and unempowered.

I. I. O. I. O. I

Those who have power over us have a direct interest in maintaining this power.

I. I. O. I. O. I. O

To request or demand 'rights' and 'freedoms' only makes sense in the context of an implicit assumption and affirmation of those who hold power over us.

I. I. O. I. O. I. O. O

Discourse in the context of 'rights', or 'freedoms' is a discourse that takes place within the boundaries set by those in power.

I. I. O. I. O. I. O. O

To frame the desire for open sharing and copying in this context is to ask for what we want, rather than to make it happen.

I. I. O. I. O. I. O. O. O

This means to relinquish responsibility for one's own wishes — 'Hoping for' and 'asking for', rather than 'getting'.

I. I. I

Those who get what they want, and those who are in power, know to act in ways that perpetuate and maintain this power, and what they want.

I. I. I. O

This can be spoken of most simply in economic terms.

I. I. I. I

A government's power takes shape of force and money.

I. I. I. O

A government will choose its actions from the methods that continue governmental power.

I. I. I. I

That which contradicts the flow of a government's power will not be preferred by a government.

I. I. I. 2

Monetary power of a government relies on taxation.

I. I. I. 2. 0

Those entities which represent the greatest tax gain will be preferred by government.

I. I. I. 2. I

That which provides no monetary gain to government will only be allowed if it presents no cost to government.

I. I. I. 2. 2

That which provides no monetary gain, but which threatens other channels of profit, threatens the power of the government.

I. I. I. 2. 2. 0

Competition between taxable entities will be tolerated, and sometimes encouraged.

I. I. I. 2. 2. I

Competition between taxable entities and nontaxable or non-monetary entities will be repressed.

I. I. I. 2

A corporation relies on profit and government for its power.

I. I. I. 2. O

Perpetuation of corporate power relies on continued public worth, and/or government power.

I. I. I. 2. O. O

If a corporation cannot maintain profit through continued public worth, it must rely on government action (force) to maintain its profit.

I. I. I. 2. O. O. O

Repression of free exchange will continue as long as it represents a threat to corporate and government power.

2

The creation of culture is dependent on ability of a creator to be able to sustain the time required for gestation and creation of a work (be that a work of art, science, or otherwise).

2. 0

Cultural creativity is dependent on people having the time and capability to follow their own interests and activities to the fullest degree.

2. 0. 0

This 'free' time is limited by many factors, but the largest is the requirements of supporting oneself monetarily.

2. O. O. I

If we are to encourage continued vibrant creation, the costs of living and experience must be met in a way that allows 'free' time to be devoted to creation.

2. O. O. I. O

The most direct means to encourage this continued creation is to reward artists, that they may devote further time to creation.

2. O. O. I. O. O

When we give to a creator, we reward or thank them, or invest in their future work.

2. 0. 0. 2

The less a person has to spend to access culture (education, art, research...), the lower their overall monetary burden.

2. 0. 0. 2. 0

Open access to all areas of culture allows and encourages greater cultural creativity.

2. O. I

The limits we place on access to knowledge, education, art, etc serve to reduce overall cultural creativity.

2. O. I. O

These limits often serve to exclude or to skew culture in preference of certain groups or interests.

2. O. I. O. O

Historically, these groups have used censorship in various forms to delimit what people may or may not know, experience, or think.

2. O. I. O. O. O

Currently, this censorship takes the form of intellectual property — those who cannot *pay* are excluded.

2. I

How a culture rewards, thanks and invests in its creators (of arts, of knowledge, of any other kind of *pattern*) will determine the output of that culture.

2. I. O

The current model of patronage sees creators and distributors holding art, knowledge and other patterns to ransom. This 'gatekeeper' model denies access to culture based on the simple question of payment.

2. I. O. O

This model assumes reward and thanks must be given *before* receipt, and that investment must be made blindly.

2. I. O. O. O

This ensures that reward has little relation to worth, that thanks become disconnected from gratitude, and that investment is ill-guided and lacks direction.

2. I. O. I

The current model implicitly assumes the work is bad (and will not be well rewarded), that the receiver is dishonourable (and will not show gratitude), and that worth and merit should be fixed values.

2. I. O. I. I

A culture that does not value its own works and the people who encounter them has become nihilistic.

2. I. O. I. 2

A culture that cannot accommodate reward based on worth, thanks based on gratitude, and investment based on goal, has become faulty.

2. I. O. I. 3

Artists who create only in order to receive pay have become beggars.

2. I. O. I. 4

Artists who hold their works to ransom have become brutes.

2. I. O. I. 5

A culture that rewards beggars and brutes over the brave and the generous is corrupt.

2. I. O. 2

The current model of patronage is broken.

2. I. I

Copyright, as a growth from the ill-conceived 'gatekeeper' model of patronage assumes a lack of trust and respect (an author can request that people do not disseminate work without their permission, but copyright is different to this).

2. I. I. O

It relies on force (from the power of law) to enact the will of the producer.

2. I. I. O. O

Thus, copyright assumes force, denies respect, and revokes the responsibility of the producer for ensuring their own valid flows of (encoded) dissemination.

2. I. I. O. O. O

Once one takes out copyright on a work, one revokes any respect one has for either one's audience, or one's work.

2. 2

Given the points of [2. 0] and [2. 1], we see two goals: The encouragement of unrestricted and universal access to all realms of culture, and the emergence of viable means to reward, thank, invest in, or otherwise support the creators of our culture.

2. 2. 0

The encouragement of universal unrestricted access is underway, but must be protected, expanded, and, inevitably, fought for.

2. 2. I

The issue of patronage is also being rethought, but requires vocal support and encouragement for modes other than 'gatekeeper' exchange.

3

The future of culture rests in two things: The future of patronage and the future of copyright.

3.0

Patronage and copyright are two wholly separate affairs linked only by falsehoods.

3. 0. 0

Copyright ensures the continued health of culture in the same sense that doctors' fees ensure the continued health of the public.

3. O. I

Copyright is lazy, aggressive, and destructive. It limits pathways that encourage reciprocal trust and respect between producers and consumers, and takes the approach of making law out of what is a personal problem (law is the last refuge of the scoundrel).

3. O. I. O

In doing so, it has retarded the development of effective means of monetized dissemination that do not rely on threat to work.

3. O. I. O. O

Copyright *assumes* that nobody would pay for works — an assumption that needs to be countered.

3. O. I. O. O. O

In its limiting of the available possibilities for patronage of creation, copyright creates situations where this assumption seems valid — those who do not pay for packaged products give no other money because *they cannot*.

3. O. I. O. O. O. O

Copyright thus creates the illusion of its own necessity for continued patronage.

3. O. I. I

We need to make clear that one is responsible for the dissemination of one's own work. One cannot wish for free expression, yet also limit it to those who pay to access it.

3. O. I. I. O

If one wishes to limit access to one's works, one is responsible for ensuring that one's methods of dissemination are secure (i. e. secret, encoded) — this is not the duty of the culture as a whole.

3. O. I. I. I

If nondisclosure agreements are to be made, these are to be done in the normal manner, but the issue would be breach of contract, not of 'theft'.

3. O. I. 2

Copyright is both symptom and cause of the erosion of trust.

3. 0. 2

'Copyleft' and its kin can only make sense as a reactive protection against copyright. This cannot be a solution in its own right.

3. 0. 2. 0

While one might fight in self-defense, one could not confuse fighting as peace.

3. O. 2. I

The kinds of 'viral' licensing that encourage open culture, while spreading the license into any derivative work, allow a movement in the right direction, but must be seen only as that — a movement — and not an end in themselves.

3. 0. 2. 2

Some may argue the issue is not who gets to see a pattern, but who gets to receive reward for it. Correct attribution, copyleft licenses etc, that allow for unimpeded charge-free distribution, but payment only to the creator.

3. 0. 2. 2. 0

This may be valid idea in ethical terms (perhaps... but then, who could be grudge the gift to another of profit from one's works? We only need look at the gifts given to the great distribution companies for a model of the generosity of the artist...), but one better dealt with in the truth of life, rather than the threats of law.

3. 0. 2. 2. 0. 0

Simply, people care about correct attribution, and often work to ensure plagiarism is exposed. With such immediate and broad means of contact available worldwide, such exposure is simple and immediate.

3. I

Much as copyright is vaunted as the saviour of culture, while it slowly strangles it, the industries parade as the sustainers of the arts and sciences, while hobbling them.

3. I. O

That is not to say that recompense for work is invalid. Quite the opposite. However, restriction of culture with the aim of fueling culture is counterproductive.

3. I. I

The future we would like to see is in unrestricted free access and exchange. But given [1], this is by no means certain.

3. I. I. O

We need a counter to the claims and workings of corporate government.

3. I. I. O. O

An effective means of patronage will decrease support for forceful means of recompense (i. e. copyright, intellectual property) amongst creators and the public.

3. I. I. O. I

A sustained, strong, effective continuation and expansion of the sharing of all information will serve to override the efforts to restrict it.

3. I. I. O. 2

At the point where government profit from copyright/IP is negated by the cost of its enforcement (both in monetary terms and in terms of public goodwill), free culture will be permitted.

3. I. I. O. 2. O

That is; we have to do it to make it permitted.

3. 2

We need to encourage modes of patronage that are honest and effective.

3. 2. 0

This requires that we make new direct modes of giving to artists and other creators, outside of the '\$X for Y' of simple business and physical produce.

3. 2. O. I

That is; a model whereby the artist is supported by true thanks, reward, and investment in their future produce.

3. 2. O. I. O

Examples are: subscriptions, 'pay what you want' models, 'donations' (though we ought to move from 'charity' to 'patronage').

3. 2. I

This honesty has the counter-effect of opening creators to the risk that their work becomes valued honestly.

3. 2. I. O

This 'risk' has the effect of humility — an artist becomes worth how people value them, nothing else.

3. 2. I. O. O

It might also serve to act against the miserliness of people who wish to control all that takes place with their work, who have no wish to see their work enjoyed by people who won't first give them some money.

3. 3

The development of modern modes of patronage allows for a natural movement away from copyright.

3. 3. 0

Creation can be supported without the requirement of the concept of an 'owned product' — people are rewarded and thanked for what they do, rather than paid for access.

3. 3. 0. 0

The use of copyright becomes redundant.

4

We approach a cultural Eden.

We have the ability to share information near-instantly, for free, with anyone on the planet. This 'anyone' can remix, rework, reinvent, and create afresh from what they have copied. Our culture is becoming open to endless possibilities of creation.

We must protect this potential and encourage its growth.

Let no talk of 'theft', no thought of 'guilt', and no confused speak of 'property' get in our way.

We must have only two thoughts: How to remove ourselves of the violence of 'copyright', and how to further increase and improve channels of endless free distribution and access.

"What you give, you shall receive tenfold."

The Brick in Room 207

The sound of a roaring crowd projected through Trent and Eliza's ears even though the tennis court they were playing in was completely abandoned. The ambiance stim that they had downloaded to create the effect was a little expensive, but still the most adequate one they could find since the interruptions from R-Tek Communications popped up only every forty-five minutes or so. After a little over an hour of exertion, Trent had to stop. The tennis ball puttered towards the wall behind him.

"Don't tell me you've already reached your limit for this month!" Eliza said as he stood frozen in his tracks. "You know you wouldn't get those extra fees if you'd turn off that metabolism boosting stim. Just a few months ago you were complaining about how silly it was..."

Trent rubbed the orb protruding from the back of his neck, which was warm to the touch. "Yes, Eliza, I'm aware of the irony... that's not the problem though. I just haven't been thinking straight lately. I've been having more... problems, you know?" He peered over at Eliza, who was busy pressing invisible buttons in mid-air. While the holo-windows she was projecting through her orb were limited to her own vision, he figured they were the same inane gossip and trivia stims she normally distracted herself with

"More anxiety problems?" she asked. "Didn't your therapist tell you to keep painting to help get your mind back on track? I know you were getting really involved with the last one you were working on."

Trent turned his back as he went to retrieve the ball, trying hard to hide his apprehension. "There's... been a problem with that. You know the new firmware update that was sent out a couple of weeks ago? Well, I installed it into my orb so I could get back online, but as soon as I did I wasn't able to see my painting anymore!"

"What do you mean?" she asked.

"It's turned into this unintelligible mess! Like some kind of pixelated puke! I keep trying to fix the painting, but the more I mess around with it, the more chaotic it gets."

Eliza continued pushing and pulling invisible windows around in an absent-minded fashion as they walked toward the exit. "So... just turn off your orb..."

"You think I haven't tried? Even when I'm offline or have the orb in suspension mode, it won't show up! I can't see it! I've tried everything... there's no way around it, at all!"

Trent showed just enough frustration to get at least some of Eliza's attention. "Now that you mention it, I think I heard something about that. I think you're supposed to buy some kind of license before you start an artistic project now. So that R-Tek can properly handle distribution or something. Didn't you try and buy one?"

"Hah, are you kidding me?" Trent said, "that's not even a real option. They jacked the prices up again last month."

"Maybe your therapist is getting a cut?"

Trent rolled his eyes as they walked out the exit and down the sidewalk. The "Better Times" stim he and his fiancée downloaded overlaid the barren streets of the real world with the cosmetic projection of a neatly cobbled road and early twentieth century street lamps. Simple sensory and perception stims like that were inexpensive enough, but creation licenses were a different story.

"I can't wrap my head around all this junk anymore," said Eliza, "but I overheard a friend mention some kind of specialist who fixes weird problems like this." She tried to look like she was recalling this information, but Trent could tell she was discreetly bringing up a chat log stored in her orb. "Her name is Lydia Bodagier, and she's only one of a handful of people who can handle stuff like this. It only works if you stay disconnected from the network, though. That means no stims at all... it seems unbearable."

Sensing no other options for her future husband, Eliza got in contact with the woman and set up an appointment. When the arranged day came, she waited with Trent at his apartment as a short woman in baggy, earthtone clothes knocked on the door to room 207 exactly on schedule. She had large, white eyes accentuated by her dark skin and an eccentric use of eyeliner, and carried around a worn out, bootleg designer bag. Without any hesitation, Lydia demanded that she be shown the painting, and had Trent set up the easel and display the canvas. After hunching over and staring intently at it for well over a minute, she tapped the orb on the back of her neck to disconnect from the net to make a final analysis.

"Nope, can't see a thing," she said, "whatever you're making here has definitely been put on some kind of blacklist. But hey, at least they didn't put a goddamn ad over it, right?" She laughed to herself. Eliza forced herself to laugh along as she discreetly closed the five video ads she had running in her holo-windows. Trent, she noticed, was not finding quite as much humour in the situation.

Lydia had already started shuffling through her bag. "So, if you don't want to shell out for a license, we're going to have to do a full physical jailbreak. Grab a chair and just try not to freak out or anything." She pulled out a small hard drive, a ball gag, a pair of pliers matched with a series of progressively long needles, and an ice pick.

"A... hard drive?" said Trent, "aren't those illegal?"

Lydia stood up, scrunching her eyes at him. "What? You thought what we were doing was legal?" She looked at Eliza, who was caught off guard by this unforeseen piece of trivia.

"I... didn't really know the difference," Eliza stammered, flustered over what she believed to be an innocuous arrangement. Lydia chuckled, as she slipped on a pair of surgical gloves, clearly finding some amusement in the young woman's ignorance.

"Don't freak out, it'll be fine. Just tell the hubby here to hold still." Lydia pushed Trent's head down and brushed his unkempt hair aside to get a clear view of the dimly glowing orb in the back of his neck. She tapped it a few times, placing it in suspension mode. Before he could ask how she managed to figure out his password, she jammed the ball gag into his mouth and strapped it tightly around his face. "Soooo... we're going to have to manually puncture some of your nerves before I can even hook the drive in properly, and it's really important that you don't scream. Can't be drawing any attention."

Eliza looked at Lydia, just barely noticing that Trent's eyes had become dilated and blood-shot. "What the hell? I thought you were just going to tinker with his orb... isn't that how these things work?"

"He's a late adopter, so I've gotta do it the rough way. Don't worry though, he'll only think that his eyes are popping out." Lydia picked up one of the needles, and began sterilizing it with a small cloth. "He won't know what's what either way, so I suggest you just go distract yourself in the other room. Shouldn't be too hard!"

Finding no argument to be had, Eliza stepped into Trent's small kitchen, somewhat overwhelmed by the situation she gotten him into. Knowing that there was no going back at this point, she could only assure herself that this was the only viable solution to his anxiety problems. After all, painting was really the only thing that ever kept him captivated in any significant way, and R-Tek wasn't giving them any kind of reasonable work around. She remembered her baby niece who had just had her orb installed the previous month – one of the newer models that didn't protrude out of the body at all. If anything, Trent was lucky he had the type of unit that he did. She told herself that things could be much, much worse. Hoping to tune out the procedure going on in the other room, she gradually drew herself back into the same half dozen holo-windows she usually had opened. After all, expensive stims like "Chrono Surveys," "Virtua Celebrity Stalker," as well as the plethora of other programs that discreetly ran in the background of her day-to-day life had become the closest things she had to a comfort zone.

After a short wait, she heard Lydia call her back out. She was surprised to see her fiancé, now fully hacked, dabbing a piece of blood-soaked gauze around the back of his neck. He was clearly uncomfortable, but was already calmed by the sight of his painting.

"Alright," Lydia began to explain, "so here's where we're at. I installed a workaround for the blacklisting thing, so you should be able to continue with your painting therapy

crap with no trouble. I suggest that you don't take too long with it though, because you're going to need me back here to undo the process once the next firmware update is sent out. If R-Tek detects a circumvention in your hardware during the installation process, the orb will permanently deactivate cutting your brain off from the rest of your body. And then you die."

"WHAT?" screamed Trent, "how can they do that? Why would they do that?"

"Because they're dicks," said Lydia matter-of-factly. "Look, just try not to think about it too much. Best thing to do is just keep your orb completely deactivated for the next few weeks, and you should have no trouble. When you're done, give me a ring, and I'll fix you back up. We won't even need to work out a payment until the second visit. Obviously you won't be able to wire me anything, but we'll arrange something, and I promise it'll be much cheaper than one of those licenses. Just remember that I'm the only one who can finish the job."

"So do you really think this is the best way to deal with stress?" Trent asked.

"Well, if you really fancy yourself an artist, you should find that deactivating all of your stims will help you relax," Lydia said, gathering up her equipment. "You just might be surprised."

Trent slumped down in his chair. "You know, sometimes I really miss S-Tek Communications."

Despite the risks, he took her words to heart. At first acclimating himself to a world without interaction seemed unbearable. His only source of news was through the scarce television signals picked up by a second-hand set Eliza had found for him. He could hardly bring himself to go outside. Without his "Heavenly Scent" stim, the stagnant stench of the outdoors was no longer perfumed through his nose. Without the "Flab Filter" stim, his eyes no longer slimmed down the overweight leviathans he saw roaming the streets each day. The lack of cosmetic patches was a sobering reminder of just how run-down and chaotic his neighbourhood actually was, especially his own apartment. But if nothing else, it served as fuel for his artistic escape. He let the painting became his solitary oasis of order and beauty.

His hermetism essentially required Eliza to stop by a few times a week to drop off groceries and provide him with a bare minimum of socialization. In fact, she had been seeing more of him in the past few weeks than she had in prior months, although the chasm caused by Trent's disconnection kept her from fully realizing it. Even though they could not be authorized to so much as enter a movie theatre without Trent's orb activated, Eliza tried not to let the many inconveniences ruin the general routine they had followed for the past two years of their engagement. She was also never bothered by the fact that she would never be able to see his painting, despite the large amount of time Trent spent working on it.

This went on for nearly a month before Eliza learned of grim news while walking to Trent's apartment. Projecting a news holo-window while carrying groceries, she was shocked to see Lydia's face appear at the tail end of a report. Underlying it was the text: "Renegade Hacker Found Dead In Local Hotel Room."

"While we hope to bring you more on the coverage of the famous hacker's death, we again stress that police have ruled out foul play," the reporter said, before trailing off into unrelated banter with her co-hosts. She rushed to Trent's building, and found him huddled in front of the television with beads of sweat dripping down his face. He had already gotten the news.

Trent was showing all the familiar signs of his anxiety attacks. Eliza grabbed the chair in front of his painting and sat him down, doing everything she could to calm his nerves, putting as much focus as possible on bringing down his accelerated breathing. She tried desperately to make eye contact with him as his pupils bolted in every direction. She closed her holo-windows and tried to shut down every one of her sensory stims that she consciously could. Some kind of physical reciprocation had to be established, but removing every digital obstacle in her system that stood in the way seemed unwieldy. In such an urgent situation, it was much too difficult for her to even distinguish which of the things she saw and heard and felt were real or generated by the countless stims she

constantly ran simultaneously. No matter how hard she tried, she could not bridge the chasm between her and her fiancé.

Suddenly, the radiance of her surroundings instantly fizzled out as Eliza found herself cut off from the network. Her orb deactivated, leaving her only with a blinking message stating that a major firmware update was available, and that she must install it in order to reactivate. She looked past the disembodied red notice in front of her and briefly glanced around at the bland, ill-maintained surroundings she was so rarely subjected to. Still unable to see his painting, she turned her focus back on Trent. At first she was drawn to the subtle differences that the lack of incessant filters had imbued upon his face. But then she noticed that he had become completely calm and content. Despite the horrible circumstances, he had stopped panicking. He was tranquil, and had completely absorbed her attention.

Since Trent disconnected from the system, he had been able to look at her actual face directly, which he rarely had a chance to do before. It had been difficult to get her attention while she was distracted by her stims, but looking in her eyes now, he could tell without doubt that she was truly looking at him as well. For a brief moment they sat together, free of the system and together in the dingy, run-down world they always worked so hard to avoid. Eliza stayed in his gaze for an indefinite moment, their hands pressed together.

The serenity was soon broken when Eliza began to hesitate and shift her eyes. "Trent... sorry, wait just a minute." She smiled at him as she pulled her hand away from his and reached for her orb, preparing to download the new update, "I can't put this off. It won't take long."

Trent waited and tried his best to stay calm as Eliza closed her eyes and processed the firmware. His situation was dire and he had by no means found true relief, but he knew that as long as he and Eliza could work together, they would find a solution. After all, they wanted him to play by the rules and be a part of the system so badly. Surely getting back in would be much easier than breaking out was.

When the installation finished, Eliza opened her eyes, but they never made contact with Trent's. "Trent... Trent where are you?" She called out to him as she shuffled around the apartment, looking in every direction. She opened and closed the doors and closets, seemingly unable to notice her fiancé standing in the middle of the room. "No... no, don't tell me he got up and left!"

"Eliza... what's wrong? What are you doing?" He yelled as loud as he could to grab her attention, but she failed to notice him as she headed towards the closet to grab her jacket.

"No... no don't leave! What's wrong with you, can't you hear me? I'M RIGHT HERE!" The feeling of dread that had lingered in his throat before returned and began to plug all of his senses. The world was becoming a blur. Disoriented and confused, he stumbled backwards, knocking his painting off of the easel. He reached out to grab her hand, which he was only barely able to discern, only to be repelled away by an invisible aura. He tried again and again, but every attempt at contact was automatically rejected. He and his hacked system had now completely fallen off of her radar. He was locked out

As Eliza grabbed her bag and slipped on her shoes, Trent collapsed on the floor. Consumed by anxiety, he could no longer see straight, let alone rationalize his situation. He wanted nothing more than to regain that one true connection that had transfixed him mere minutes before, and regardless of the consequences, he became completely fixated on the one place he could chase after it. With every bit of reason and logic in his mind drowned out with unyielding terror, he tapped the orb on the back of his neck and immediately connected to the net. Without any warning or prompt, the new firmware update began downloading and installing into his system.

"ELIZA, DON'T LEAVE! I'M RIGHT HERE! YOU'LL SEE!" The door slammed shut right as the installation finished. Not a second after, all of Trent's warped senses funneled together into a field of empty blackness surrounding three lines of text written out in a simple, rudimentary font:

"We at R-Tek Communications have detected a problem with your hardware. It appears that this orb system has been circumvented and compromised. Regardless of intent, this is a direct violation of current international law, and as such your device will be deactivated immediately."

The white text stayed clear for only a moment before diffusing into endless darkness.

History of Copyright 2012–Present

Journal of Information History, Book Review: *History of Copyright* 2012–present by Engstrom and Grucht, Lu Xu Fei, 14 April, 2072

In *History of Copyright 2012 — Present*, Erik Engstrom and Karel Grucht explore the recent history of copyright, from its heyday in the early 2000's through the middle of the century. In revisiting these issues — many of which are now of merely historical interest — the authors hope to bestow the modern reader with a sense of the road travelled towards current creative production. I here present some highlights of the book, before reflecting on its broader themes and lessons for the modern day.

The histories collected here indicate the sheer complexity of the copyright crisis of the 21st century, and the diversity of responses to that crisis from governments, businesses, artists and consumers. They also show how the disputes over copyright which took place during that time stemmed from fundamental economic, political and philosophical questions; questions about the nature of creativity, incentives and rewards, rights and freedoms, and the value of immaterial, infinitely copyable goods — questions which remain equally pertinent today.

Despite the many changes in knowledge production which have taken place over the last eight decades, the format in which most knowledge is curated — the academic journal — has remained relatively stable since its initial incarnation in the 17th century (in the form of *Philosophical Transactions of the Royal Society*). This very journal, which is now nearing its 60th anniversary, is testament to the resilience of the format.

What has changed is access to this realm of knowledge. When *Information History* was first published in 2013, it was part of a growing minority of open access academic journals. At that time, most of the world's peer-reviewed knowledge was locked up behind paywalls; only the most well-endowed institutions could afford access to the whole catalogue. But through a slow and steady movement for open access, the dream of a free online library of the world's knowledge was eventually realised.

This change is documented by Engstrom and Grucht, in the first chapter "The Demise of Closed-Access Academic Publishing". They argue that the incumbent publishing industry eventually crumbled due to three major events. The first was driven by research funding bodies. Their increasing adoption of open-access mandates ensured the fruits of their research grants were published open-access. The second came when academics began saying "No"; no more submissions to closed-access journals, no more refereeing, no more editorial work. Starved of this free labour, the closed-access publishers began to lose their only source of value.

The final nail in the coffin, argues Engstrom, came when the remaining three major publishing companies went bankrupt after losing a high-profile joint lawsuit. *Elsevier-Wiley-Springer vs ScholarSec* (2022) was a landmark case in which the defendants, a group of students, had harvested several million academic articles from behind a paywall and disseminated them online. After a stirring defence, the prosecution lost and could not afford the court fees and damages. The bankrupt publisher's assets — millions of copyrighted papers — were then seized and turned over to the public domain.

With the adoption of open licensing of academic literature as the default, educational opportunities opened up not only to scholars but also to those outside the walls of academia. Health workers in the developing world could access medical research. Concerned citizens could better scrutinise the scientific evidence cited in government policy-making. High school students around the world now had exactly the same informational resources as a Harvard professor — significantly levelling the playing field.

At the time when data mining was truly taking off in all areas of business, it became possible to apply these techniques to the vast trove of scientific literature. Where the legacy publishers had prohibited researchers from mining datasets attached to scientific papers, open access led to a wave of new research based on the new data mining techniques.

niques. Meta-studies proliferated, allowing researchers to gain a broader perspective on their own disciplines. New insights came from statistical inferences drawn from the mass of data. Even the humanities and social sciences were transformed by the new trend in data-driven "culturomics".

(It is worth noting this chapter has great personal significance for one of the authors; Engstrom is the former CEO of Elsevier Publishing who, after a Damascene conversion in 2021, quit to become an open access advocate and historian.)

In the second chapter "Copyright Policy Behind Closed Doors: International Trade Agreements of the 2010's", Engstrom and Grucht take us back to the 2010's, when governments of the then "developed" world began attempts to negotiate their intellectual property arrangements in secret. Previous attempts to push agreements through democratic scrutiny had resulted in failure. The Anti-Counterfeiting Trade Agreement (ACTA), which consolidated a number of anti-piracy measures, had been signed by several national governments before being put to the EU Parliament in 2012. A workshop on ACTA was organised by the Commission for members of parliament and civil society groups. The Commission's approach demonstrated their disdain for public engagement. Archived twitter messages from the time indicate that when the audience clapped to show appreciation for the case made against ACTA, they were asked to be quiet or leave. But after a successful citizen campaign, the Parliament rejected ACTA, and the international treaty was abandoned.

However, this was just the beginning. The dead body of ACTA came back, zombie-like, again and again. Subsequent proposals were negotiated in secret and had equally obscure acronyms: TPP (Trans-Pacific Partnership), CAUD (Coalition Against Unauthorised Duplication), PITTA (Preventing Idea Theft Technology Alliance), PASTA (Preserving Artificial Scarcity Trade Agreement), and many more. While drafted by the governments of developed nations, each was the result of heavy input from copyright industry lobby groups.

At first it was just Hollywood and the software industry who wanted worldwide legislation to control what individuals could do with their networked personal computers. But as computation became ever more embedded in products — from fridges to cars to pacemakers — and these products became connected to the emerging internet of things, virtually every consumer goods industry had an economic interest in copyright enforcement. Owning copyright over the code that runs on their products became an essential part of their business model, allowing them to control the way customers interacted with their new computerised environments. The combined weight of their lobbying efforts accelerated government attempts at global copyright enforcement into overdrive.

Some developing economies accepted these extreme measures, for fear of invoking hostile trade relations with first world governments. Others did not, and suffered trade embargoes as a result. But the price they paid was, in many ways, worth the benefit: rapid economic development fuelled by free access to knowledge and the fruits of technological innovation. Several rogue European states — especially those who had fared worse in the collapse of the eurozone — also elected to reject the new copyright enforcement measures. In their conclusion to this chapter, the authors argue that this was the beginning of the current divide in the global economy between "open" and "closed" economic models.

Chapter 3 deals with the entrance of 20th century works into the public domain, with the illuminating case study of Martin Luther King's "I Have A Dream" speech. Unlike many public speeches, audio and video of speech was under copyright (administered by EMI publishing) and was not widely available. In 2038, King's speech was released into the public domain in several countries (U.S. citizens are still waiting; copyright over the work is due to expire in 2068 due to the 20 year extension of copyright term). For many, this was the first time they had seen the most famous footage of the US civil rights movement in full. The video was watched by millions, and reinterpreted in light of the political and civil rights struggles of the 2030's. The authors track how it very quickly became a viral meme, remixed and cut in to thousands of new works, exploring just about every issue affecting 2030's and 40's society.

The fourth chapter charts the history of two international organisations; the IAA (Independent Artists' Alliance) and the CCA (Content Consumers Alliance). They had their origins in opposing sides of the copyright debate, but by mid-century, it became clear that each one had the key to solving the others' problems; their individual interests were actually in alignment towards a common future.

The IAA had its origins in disputes between the representative bodies of big content companies and the artists they represented. The former had a deserved reputation as staunch defenders of copyright maximalism, having lobbied heavily for SOPA, PIPA, ACTA and their various later incarnations (covered in the second chapter of this volume). By the late 2010's, sentiment against these industry lobbies was fermenting among a majority of artists. The RIAA in particular was increasingly seen by artists as the mouthpiece of recording industry executives, at the expense of the artists it claimed to represent. The Independent Artists Alliance was then formed by a group of artists who had rebelled against their own labels by encouraging fans to illegally download their music. The IAA became the new de facto representative body for music artists whose interests were no longer represented by the RIAA. It later joined forces with authors, video makers, games designers and others, all of whom were similarly at odds with their former representative bodies.

The Content Consumers Alliance (CCA) was an initiative started in 2019 by a world-wide coalition of consumer rights bodies, technology companies and activists pushing for the reform of copyright laws. Despite traditionally being positioned on opposite sides of the copyright debate, by the mid 2020's, the CCA and IAA had begun to see their interests as aligned around a set of emerging funding models. Their first joint campaign was to liberate the huge portion of 20th and 21st century culture — music, movies, books, art — for which legal copies were effectively unavailable. The CCA had published figures estimating that around 95% of cultural works created in the preceding 70 years were no longer available. Large multinational companies who owned the copyright were unable or unwilling to release them, while they continued to promote a narrow selection of mainstream content. Most fans had turned to the darknet, where illegal copies thrived.

The IAA successfully lobbied for new laws governing contracts between artists and companies. Artists were granted new rights to renegotiate unfair contracts, and to reclaim copyright over their works if companies failed to make them legally available for a prenegotiated period of time. Meanwhile, the CCA facilitated crowdfunding campaigns to encourage 20th century artists, many of whom had faded nearly into obscurity, to make use of their new powers, regain copyright over their work and release it to fans. Engstrom and Grucht argue that this combination of legal reforms lobbied for by artists, and fanbased crowdfunding, gradually freed up a treasure trove of cultural works. It led to a renaissance of 20th century subcultures, reinterpreted and appreciated by 21st century sensibilities.

In their final chapter, Engstrom and Grucht attempt what must be a near impossible task; an overview of the business models which gradually overtook the default 20th century model of copyright. This one-size-fits-all model of "create, copyright, then sell copies" is now just one model out of many, a niche practice which works only in a particular set of social, legal and technological circumstances. The authors are quick to point out that there are almost as many business models as there are types of creative practice. And even when they focus on particular creative practices, broad generalisations prove impossible.

Take, for instance, film and video. In the first decades of the century, the film industry had argued in vain that movies needed strong copyright enforcement to survive. In reality, their business model was supplanted by not one, but dozens of alternatives. As increasingly high quality film cameras were embedded in every personal device, and sophisticated CGI effects became available to bedroom amateurs, many more films were produced than ever before, and at lower cost than ever before. Some blockbusters were shown for free and relied on product placement and merchandise for profits. Others survived and even thrived on ticket sales alone, by building in live audience interaction and participation as an essential feature (it is no surprise that the 2030's saw a revival

of all-night cinema parties reminiscent of the 1970's *Rocky Horror Picture Show*). But perhaps the most significant change came with film-makers turning to fans for capital. By 2026, 57 out of the top 100 U.S. box-office hits were financed primarily through crowd-funding websites, where thousands of fans put up the cash to get the films they wanted to see, made.

The film industry was not an isolated case. In every niche of every content industry, from romance novels to political documentaries, from collaborative storytelling to augmented reality games, new business models and revenue streams proliferated. But very few of them had anything to do with enforcing copyright. Their combined effect on the cultural landscape was huge, highly unpredictable and incredibly varied. If there's one thing we can learn from Engstrom and Grucht's final chapter, it's that there was not one answer to fixing the 20th century's copyright crisis. There were hundreds.

But in reading this book, one common theme clearly emerges. For most creators of video, music, art or text in the 21st century, it was no longer a case of selling copies of immaterial goods. Their recipients were no longer *consumers* interested in buying discrete digital products which can be infinitely copied at zero cost. Instead, they had become *patrons*, who wanted to support culture through real life experiences and human relationships. And unlike digital goods, which are by nature infinitely copyable, experiences and relationships cannot be pirated.

Lu Xu Fei, 14th April 2072.

EDDIE

In Session

"Studio throwing to you in, 3, 2..." The misshapen lump of ear-pieces, sweat and sand-wich that was the cameraman didn't say the "one," instead just pointing at the collection of make-up, shoulder-pads and failed dreams holding the microphone before the unflinching gaze of the camera.

"Jim, the second day of this potentially world-changing case starts in just few moments. Yesterday was very much a day of formalities with very little of the meat of the case. Gentech's legal team spent most of the day presenting the fairly complicated technical information that they felt the jury needed in order to verify the claims they are making. Today it's expected that they'll be calling Mr McQuinn to the stand." Here she paused for a moment whilst the haircut in the studio cut across her. "That's right Jim, Mr McQuinn is the man at the heart of this case. Gentech works at the forefront of what is still a fairly new industry, there has been talk in legal circles for sometime about how current copyright law would be applicable to Gentech's products." Another pause whilst the studio asked another inane question. "Yes. Many people within the industry are looking at keeping a very close eye on this case and, should this case go the way Gentech is banking it will, we could well see a slew of similar lawsuits." She paused for a moment before finishing. "Thanks Jim."

Within seconds her microphone was off and she was strutting away from the camera, all indignation and muttered dissent.

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"All rise for the honourable judge Cubert McLesterson!" the court officer yelled as the many journalists shuffled into position. An unnatural hush fell over the court-room as the judge transported an almost-ungodly amount of black fabric to his seat on his equally preposterous frame.

"Be seated." He motioned for the for the many performers assembled on his stage to sit with a massive flabby paw. "This court is now in session." He punctuated the line with an entirely unnecessary bang of the gavel. He'd worked hard to get where he was and he'd be damned if he wasn't going to use every available opportunity to play with the tiny hammer.

"Counsel," he nodded in a dignified fashion towards one of the two suits representing the plaintiff.

"You may begin."

"Thank you, your honour," The Suit replied with a slick half-nod. "We call the defendant Mr McQuinn to the stand!" There was a slight murmur from the crowd followed by an entirely needless gavel-bang. As Mr McQuinn rose from behind the desk he was revealed to be a dishevelled-looking man, distinctly unsuited to being suited, and as such he looked decidedly scruffy. As he stepped from behind the desk he shot a nervous glance and smile towards the voluminous pregnant woman seated in the front row and slouched unwillingly towards the stand. A court bailiff solidified out of the ether with a selection of books for Mr McQuinn to swear in upon. There was a delay as he perused the stack before finally opting for a copy of Watchmen. After muttering a few binding words of dubious provenance, McQuinn returned the book and took his seat.

"Just confirm you are Mr Alonso McQuinn of 72 'I Can't Believe They Named This Awful Street That' Gardens." McQuinn replied with a curt nod and a brief affirmation. "Can you also confirm for the court that you are currently employed at Gentech Industries?" Again a curt nod and a mumble. "And what is your roll at Gentech?"

"I'm a lead coder," Mr McQuinn replied.

"Could you please identify this document for the court Mr McQuinn?" The Suit flourished a document skyward before thrusting it aggressively towards the stand.

"Yes. That is my code," McQuinn replied with another nervous smile.

"Your code Mr McQuinn?" The Suit asked accusingly whilst his partner slithered from behind the desk to distribute copies to the jury. "Can you confirm that this code has been used as the basis for nearly every project you've designed whilst at Gentech?" The Suit grasped a stack of papers from the desk and slammed them down on the stand with a force that the judge, as an experienced hammer-man, couldn't help but respect.

"Well... yes everyone does." McQuinn adjusted his glasses nervously. "But it's my code I've had forever, it substantially pre-dates my employment at Gentech..."

"Mr McQuinn, at some point or another every single piece of this original code appears in products you developed for Gentech." The Suit purposefully strutted back to his desk seized another document, again he flourished it needlessly towards the ceiling before holding it an inch from McQuinn's face.

"Do you recognise this document?" McQuinn adjusted his glasses took the paper from The Suit's claw, moved it further away from his face and pushed the lawyers still-stationary hand to one side to allow him to see the document.

"This is the employee agreement that I signed when I first started working for Gentech," McQuinn offered.

"And could you, please read the hi-lighted section... Mr... McQuinn?" The Suit asked, flashing a predators grin.

"I, the under-signed, here after referred to as Minion, agree that any and all works produced pertaining to the realm of genetic construction and modification whilst employed at Gentech, and any derivative works, are the sole copyright of Gentech and it's parent companies; Morally Questionable Developments, Shady Weapons Development and Large & Soulless Multinational..." At this point McQuinn stopped and looked up from the paper. "Look, this document is designed to stop me from packing up my office, jumping ship and giving our competitors all of our information, not..."

"The court will be the judge of what this document is meant for, Mr McQuinn," The Suit snapped, snatching the document away and placing it in front of the judge whilst the second suit once again slunk out to supply copies of the document to the jurors.

"But it's my DNA! It's really hard to write an entire genome, so we cheat by using our own and tweaking and adapting it to get the desired results. Gentech can't own my DNA!" McQuinn exclaimed rising to his feet. He'd gotten no further than halfway out of his chair when he was deflated by the judge's most emphatic gavel-bang of the day.

"You will compose yourself Mr McQuinn, or you'll find yourself in contempt of court," he said with a satisfied smile that dared McQuinn to challenge him.

"I'm sorry your honour but it's not fair," McQuinn moaned as he dropped back into his seat.

"This is about protecting peoples livelihoods Mr McQuinn. You can't just choose to use someone else's copyrighted materials for your own profit." The Suit smirked with all the compassion of a shark.

"Mr McQuinn, could you please identify for the court, Mrs McQuinn." McQuinn pointed with a trembling hand towards his pregnant wife, sitting in the front row of the court-room. "Let the record show that Mr McQuinn indicated the pregnant lady in the front row. Is she pregnant with your child Mr McQuinn?"

"What the hell are you trying to imply?" Mr McQuinn asked angrily. "Of course it's my child."

"From the defendants own mouth!" The Suit pointed at the jury, taking two strident paces to stand before them. "Half of that child's DNA is the copyrighted material of Gentech Industries. By any definition that is a derivative work. Yet Mr McQuinn embarked upon its development without even attempting to gain the permission of his employers." Here the lawyer reached to his table and held up another document. "This is an e-mail Mr McQuinn sent to a colleague using his employers e-mail system. It includes this line: 'Rosemary and I are trying for a baby.' This child was not an accident, but a deliberate attempt to use copyrighted material for your own gain Mr McQuinn."

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"I'm not going to lie to you. We're getting battered in there," the cut-price lawyer, the best the McQuinns could afford, said, exuding an air of nervousness that was only matched by his odour.

"We've not done anything wrong," Rosemary replied angrily striking fear into both the lawyer and her husband as only a pregnant woman can.

"Mrs McQuinn. This isn't about right or wrong it's about the law," Cut-price replied, but he at least had the decency to look sheepish as he said it.

"He's right." The three of them looked down the corridor to see The Suit standing a small way down the corridor. "I'm betting that settlement we offered you looks pretty good right now. And before you ask; No. My clients have made it very clear to me that getting a court decision on this is much more important than getting the money out of you two." With that he turned on his heel and walked away with a whistle on his lips and a song in his — for want of a better word — heart.

"I wish I was heartless bastard like that," Cut-price muttered whilst staring wistfully at his opponent's retreating back, showing once and for all where the true priorities of the legal profession lie. "We've got to focus on damage control here. We need to go in and argue not on the whether or not you are in breach of copyright, but on the profitability of your child."

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"Mr McQuinn, both Gentech and yourself have had a look at your son's DNA. Is there anything in there that indicates that the child will have any aptitude for high income professions? Medicine, Sport, Financial Speculation?"

"No. There's nothing in his DNA to indicate any of that," Mr McQuinn replied to the court-room at large.

"So there's no reason to assume that this child will be anything other than a massive financial drain," Cut-price asked with a smile.

"Well, I wouldn't say that, but from a purely financial stand-point, no. I don't think there is any reason to assume that he'll wind a up being a millionaire," McQuinn replied.

"Objection, your honour," The Suit cried from behind his desk. "Mr McQuinn has no way of predicting the future. Just because his child is genetically unremarkable it doesn't mean it won't go on to become a profitable individual... have you seen Jersey Shore? Those people have no talent and are still incredibly wealthy. This child has already become the centre of a media circus. The very idea that someone isn't already getting ready to approach the McQuinn's about a potential reality TV show is, frankly, ludicrous." The Suit dropped back into his seat.

"Sustained, Mr McQuinn has no way of knowing how much this child will ultimately be worth and every incentive to misjudge the possibilities," the judge replied, several of his chins wobbling as he did so. McQuinn and his lawyer exchanged forlorn glances.

"No further questions your honour."

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There was a palpable sense of tension in the court-room as the jury returned from their deliberations. It seemed as if every piranha in the state had swarmed on the case and were waiting to pick clean the corpse of the McQuinn's lives, they weren't alone though. Several Guy Fawkes were scattered conspicuously among the watchers, as well as multiple representatives of the various other online communities that had taken an interest in this case. Of all these various groups that had descended on the scene that day, the only ones not resting on the edge of their seat were the McQuinns and their legal team, who were instead drowning in a sea of perpetual gloom. A door to one side of the court swung open and the jury traipsed back from whatever hinterland they were confined to for the duration of their musings. There was a slight susurration from among the watchers. The judge responded to this with an unreasonably fast gavel slam

that might have been entirely unrelated to the murmur. There were a few moments of shuffling from among the jurors themselves before all but the foreman had taken a seat. He passed a piece of paper to a bailiff who nobly fought the overwhelming urge to take a peek before passing it to the judge, who took a glance and passed it back.

"Have you reached a verdict with which you are all happy?" The Judge asked.

"Juror Six found out her cat had passed away last night so she's not that happy at the moment but we have all agreed to find in favour of the plaintiff," he said before dropping quickly back to his seat.

The was an audible groan from Rosemary McQuinn. The judge managed to surprise everyone by exercising enough self-control to keep his gavel had still for a moment. The rest of the court seized this moment to start chattering like a gaggle of school girls, resulting in the judge banging his hammer not once but twice. He waited for silence before he spoke.

"Mr McQuinn, under normal circumstances I'd award Gentech the royalties you'd earned from this endeavour, unfortunately that doesn't seem to be applicable in this case. As such I'm awarding Gentech Industries 75% of the earnings of your child. To be garnished from it's earnings directly to Gentech. I'd suggest you get a reality-show locked in as quickly as possible Mr McQuinn. Court Adjourned." There was another hearty slap of wood on wood and the court began to disperse.

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"We are pleased with the verdict, obviously," The Suit stated smilingly out on the steps of the court-house. "It is our hope that this ruling has now provided a clarification of the laws pertaining to DNA copyright and will allow companies such as Gentech to avoid the unnecessary expense of court cases such as this in future. Now there's a precedent, it will be much easier to explore out of court settlement options." There was a question from one of the reporters that was hard to hear over the clamour. "Well, the civil liberties discussion is really something for our political leaders to talk about but they've sided with rights-holders nearly every time the debate has happened in the past." He gave a smirk and sauntered off to his car as the media circus moved on to engulf the unfortunate couple behind him.

Future of Copyright

"Copyright" (henceforth, copyrestriction) is merely a current manifestation of humanity's malgovernance of information, of commons, of information commons (the combination being the most pertinent here). Copyrestriction was born of royal censorship and monopoly grants. It has acquired an immense retinue of administrators, advocates, bureaucrats, goons, publicists, scholars, and more. Its details have changed and especially proliferated. But its concept and impact are intact: grab whatever revenue and control you can, given your power, and call your grabbing a "right" and necessary for progress. As a policy, copyrestriction is far from unique in exhibiting these qualities. It is only particularly interesting because it, or more broadly, information governance, is getting more important as everything becomes information intensive, increasingly via computation suffusing everything. Before returning to the present and future, note that copyrestriction is also not temporally unique among information policies. Restriction of information for the purposes of control and revenue has probably existed since the dawn of agriculture, if not longer, e.g., cults and guilds.

Copyrestriciton is not at all a right to copy a work, but a right to persecute others who distribute, perform, etc, a work. Although it is often said that a work is protected by copyrestriction, this is strictly not true. A work is protected through the existence of lots of copies and lots of curators. The same is true for information about a work, i.e., metadata, e.g., provenance. Copyrestriction is an attack on the safety of a work. Instead, copyrestriction protects the revenue and control of whoever holds copyrestriction on a work. In some cases, some elements of control remain with a work's immediate author, even if they no longer hold copyrestriction: so-called moral rights.

Copyrestriction has become inexorably more restrictive. Technology has made it increasingly difficult for copyrestriction holders and their agents to actually restrict others' copying and related activity. Neither trend has to give. Neither abolition nor police state in service of copyrestriction scenarios are likely in the near future. Nor is the strength of copyrestricition the only dimension to consider.

Free and open source software has demonstrated the ethical and practical value of the opposite of copyrestriction, which is not its absence, but regulation mandating the sharing of copies, specifically in forms suitable for inspection and improvement. This regulation most famously occurs in the form of source-requiring copyleft, e.g., the GNU General Public License (GPL), which allows copyrestriction holders to use copyrestriction to force others to share works based on GPL'd works in their preferred form for modification, e.g., source code for software. However, this regulation occurs through other means as well, e.g., communities and projects refusing to curate and distribute works not available in source form, funders mandating source release, and consumers refusing to buy works not available in source form. Pro-sharing regulation (using the term "regulation" maximally broadly to include government, market, and others; some will disbelieve in the efficacy or ethics of one or more, but realistically a mix will occur) could become part of many policies. If it does not, society will be put at great risk by relying in security through obscurity, and lose many opportunities to scrutinize, learn about, and improve society's digital infrastructure and the computing devices individuals rely on to live their lives, and to live, period.

Information sharing, and regulation promoting and protecting the same, also ought play a large role in the future of science. Science, as well as required information disclosure in many contexts, long precedes free and open source software. The last has only put a finer point on pro-sharing regulation in relation to copyrestriction, since the most relevant works (mainly software) are directly subject to both. But the extent to which pro-sharing regulation becomes a prominent feature of information governance, and more narrowly, the extent to which people have software freedom, will depend mostly on the competitive success of projects that reveal or mandate revelation of source, the success of pro-sharing advocates in making the case that pro-sharing regulation is so-

cially desirable, and their success in getting pro-sharing regulation enacted and enforced (again, whether in customer and funding agreements, government regulation, community constitutions, or other) much more so than copyrestriction-based enforcement of the GPL and similar. But it is possible that the GPL is setting an important precedent for pro-sharing regulation, even though the pro-sharing outcome is conceptually orthogonal to copyrestriction.

Returning to copyrestriction itself, if neither abolition nor totalism are imminent, will humanity muddle through? How? What might be done to reduce the harm of copyrestriction? This requires a brief review of the forces that have resulted in the current muddle, and whether we should expect any to change significantly, or foresee any new forces that will significantly impact copyrestriction.

Technology (itself, not the industry as an iterest group) is often assumed to be making copyrestriction enforcement harder and driving demands for for harsher restrictions. In detail, that's certainly true, but for centuries copyrestriciton has been resilient to technical changes that make copying ever easier. Copying will continue to get easier. In particular the "all culture on a thumb drive" (for some very limited definition of "all") approaches, or is here if you only care about a few hundred feature length films, or are willing to use portable hard drive and only care about a few thousand films (or much larger numbers of books and songs). But steadily more efficient copying isn't going to destroy copyrestriction sector revenue. More efficient copying may be necessary to maintain current levels of unauthorized sharing, given steady improvement in authorized availability of content industry controlled works, and little effort to make unauthorized sharing easy and worthwhile for most people (thanks largely to suppression of anyone who tries, and media management not being an easy problem). Also, most collection from businesses and other organizations has not and will probably not become much more difficult due to easier copying.

National governments are the most powerful entities in this list, and the biggest wildcards. Although most of the time they act roughly as administrators or follow the cue of more powerful national governments, copyrestriction laws and enforcement are ultimately in their courts. As industries that could gain from copyrestriction grow in developing nations, those national governments could take on leadership of increasing restriction and enforcement, and with less concern for civil liberties, could have few barriers. At the same time, some developing nations could decide they've had enough of copyrestriction's inequality promotion. Wealthy national governments could react to these developments in any number of ways. Trade wars seem very plausible, actual war prompted by a copyrestriction or related dispute not unimaginable. Nations have fought stupid wars over many perceived economic threats.

The traditional copyrestriction industry is tiny relative to the global economy, and even the U.S. economy, but its concentration and cachet make it a very powerful lob-byist. It will grab all of the revenue and control it possibly can, and it isn't fading away. As alluded to above, it could become much more powerful in currently developing nations. Generational change within the content industry should lead to companies in that industry better serving customers in a digital environment, including conceivably attenuating persecution of fans. But it is hard to see any internal change resulting in support for positive legal changes.

Artists have always served as exhibit one for the content industry, and have mostly served as willing exhibitions. This has been highly effective, and every category genuflects to the need for artists to be paid, and generally assumes that copyrestriction is mandatory to achieve this. Artists could cause problems for copyrestriction-based businesses and other organizations by demanding better treatment under the current system, but that would only effect the details of copyrestriction. Artists could significantly help reform if more were convinced of the goodness of reform and usefulness of speaking up. Neither seems very likely.

Other businesses, web companies most recently, oppose copyrestriction directions that would negatively impact their businesses in the short term. Their goal is not fundamental reform, but continuing whatever their current business is, preferably with increasing profits. Just the same as content industries. A fundamental feature of muddling

through will be tests of various industries and companies to carve out and protect exceptions. And exploit copyrestriction whenever it suits them.

Administrators, ranging from lawyers to WIPO, though they work constantly to improve or exploit copyrestriciton, will not be the source of significant change.

Free and open source software and other constructed commons have already disrupted a number of categories, including server software and encyclopedias. This is highly significant for the future of copyrestriction, and more broadly, information governance, and a wildcard. Successful commons demonstrate feasibility and desirability of policy other than copyrestriction, help create a constituency for reducing copyrestriction and increasing pro-sharing policies, and diminish the constituency for copyrestriction by reducing the revenues and cultural centrality of restricted works and their controlling entities. How many additional sectors will opt-in freedom disrupt? How much and for how long will the cultural centrality of existing restricted works retard policy changes flowing from such disruptions?

Cultural change will affect the future of copyrestriction, but probably in detail only. As with technology change, copyrestriction has been incredibly resilient to tremendous cultural change over the last centuries.

Copyrestriction reformers (which includes people who would merely prevent additional restrictions, abolitionists, and those between and beyond, with a huge range of motivations and strategies among them) will certainly affect the future of copyrestriction. Will they only mitigate dystopian scenarios, or cause positive change? So far they have mostly failed, as the political economy of diffuse versus concentrated interests would predict. Whether reformers succeed going forward will depend on how central and compelling they can make their socio-political cause, and thus swell their numbers and change society's narrative around information governance — a wildcard.

Scholars contribute powerfully to society's narrative over the long term, and constitute a separate wildcard. Much scholarship has moved from a property- and rights-based frame to a public policy frame, but this shift as yet is very shallow, and will remain so until a property- and rights-basis assumption is cut out from under today's public policy veneer, and social scientists rather than lawyers dominate the conversation. This has occurred before. Over a century ago economists were deeply engaged in similar policy debates (mostly regarding patents, mostly contra). Battles were lost, and tragically economists lost interest, leaving the last century's policy to be dominated by grabbers exploiting a narrative of rights, property, and intuitive theory about incentives as cover, with little exploration and explanation of public welfare to pierce that cover.

Each of the above determinants of the future of copyrestriction largely hinge on changing (beginning with engaging, in many cases) people's minds, with partial exceptions for disruptive constructed commons and largely exogenous technology and culture change (partial as how these develop will be affected by copyrestriction policy and debate to some extent). Even those who cannot be expected to effect more than details as a class are worth engaging — much social welfare will be determined by details, under the safe assumption that society will muddle through rather than make fundamental changes.

I don't know how to change or engage anyone's mind, but close with considerations for those who might want to try:

- » Make copyrestriction's effect on wealth, income, and power inequality, across and within geographies, a central part of the debate.
 - » Investigate assumptions of beneficent origins of copyrestriction.
- » Tolerate no infringement of intellectual freedom, nor that of any civil liberty, for the sake of copyrestriction.
- » Do not assume optimality means "balance" nor that copyrestriction maximalism and public domain maximalism are the poles.
- » Make pro-sharing, pro-transparency, pro-competition and anti-monopoly policies orthogonal to above dimension part of the debate.
- » Investigate and celebrate the long-term policy impact of constructed commons such as free and open source software.

- » Take into account market size, oversupply, network effects, non-pecuniary motivations, and the harmful effects of pecuniary motivations on creative work, when considering supply and quality of works.
- » Do not grant that copyrestriction-based revenues are or have ever been the primary means of supporting creative work.
- » Do not grant big budget movies as failsafe argument for copyrestriction; wonderful films will be produced without, and even if not, we will love whatever cultural forms exist and should be ashamed to accept any reduction of freedom for want of spectacle.
- » Words are interesting and important but trivial next to substance. Replace all occurrences of "copyrestriction" with "copyright" as you see fit. There is no illusion concerning our referent.

ALF MELIN

Remote Kill

"Six hours in profiling, that is just nuts!" Connor said, shaking his head in disbelief at his companion.

"Yeah, I'm used to it though", Mohmad answered, then continued with a smile. "When your mother is from Chechnya and your father from Iran you get used to showing up at the airport really early and still potentially missing your flight. They ask every question seven different ways trying to trip you up in a contradiction so they can deny you boarding. They've got monthly targets for 'detections' so unless they've already met quota I'm always in for a rough ride."

Laughing and still shaking his head, Connor picked up his bacon sandwich and bit into it but as his jaw closed there was an audible crack and he winced.

"What the..." he said, reaching into his mouth gingerly. In moments he confirmed his suspicion, feeling the jagged edge where only smooth surface should exist. He checked for any hard objects in the sandwich but saw nothing that would give reason for raising a complaint with the restaurant staff.

"Broken tooth?" Mohmad asked. "Haven't seen that happen in years."

"Yeah it is weird", Connor answered, "I'd better message my dentist."

Grabbing a glass of water, he swirled some around his mouth to clear it. A look of consternation came across his face and he froze momentarily, then spat into the glass. Quickly sinking through the water were two whole teeth, with complete roots. The friends both stared quietly at the glass in quiet disbelief.

After several seconds Connor shook off the shock and reached for his communicator, hitting the entry for his dentist. Seconds later a short text message appeared on the screen, stating that the clinic was closed for the day.

"Why would the clinic be closed at one in the afternoon on a weekday?" Connor asked.

"Why don't you call my dentist instead, she's great. Really knows her stuff and doesn't cost an arm and a leg. Here I'll wave the contact to you."

Quickly manipulating his device, Mohmad brought up the entry for his dentist and then held his communicator over Connor's communicator, shaking it gently once as if adding a little salt to a dish.

The entry appeared on Connor's communicator and he selected it, sending a brief query. Just six seconds later a calendar appointment opened up on screen and he confirmed acceptance. A Galileo position dot instantly appeared on the map application, showing estimated travel time from his current location to the clinic.

"Ok, I've got an appointment 45 minutes from now so I'd better get going. Catch up with you another time, ok? Maybe at the old library, they've turned it into a hacker space and maker's workshop now, some of the kids are turning out really cool micro-satellites."

"All right, yeah I'll see you there. Go get your teeth fixed, I'll get the bill here." Mohmad answered, waving his friend away before Connor could reach for the NFC pod on the table.

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"Ok, you've broken a molar and lost two incisors. It is very unusual, actually I've never seen anything like this. You said you haven't had any sore gums or bleeding?" the dentist, Jaśmina, asked.

"None, no problems at all for years." Connor answered, speaking as well as he could with the dentist probing deep inside his mouth with a metal instrument.

"I'm going to probe the area around the adjacent teeth, signal if you feel any pain." Jaśmina continued.

Moments later she paused, shock registering on her face before she slammed down a neutral, professional demeanour. Slowly she retracted a whole tooth, dropping it into a tray and then turned slightly towards her lapel microphone, calmly dictacting into it.

"Lower right premolar detached when probed, no sign of gum disease or damage. No bleeding or pain". The case file on her computer instantly updated with the voice clip and a transcript.

Turning back to Connor, she continued "What is your dental history? Anything unusual, maybe something in the family history?"

Connor shook his head, staring at the tooth in the tray. "No, nothing unusual. I had a full replacement about six years ago and no problems since then, not a single cavity. They were the good stuff, some patented method. My dentist went on about how great they were and I paid a fortune for the job, but it was worth it... well, until now I suppose."

"I'm going to need the contact details for your dentist and authority to pull your case from central records, Connor. I don't want to speculate so if you could please be patient and let me investigate this fully I'll get back to you, ok? Don't eat anything for now, maybe just get water or get a smoothie. Use a straw if you are hungry and absolutely have to eat."

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It was almost seven in the evening before his communicator buzzed. Picking it up immediately he scanned the message, seeing it was another appointment with Jaśmina at the dental clinic in just an hour. He quickly accepted, glancing down at the glass in front of him. At the bottom of the clear water were another six teeth, gleaming white with long roots. It had been a horrifying experience, sitting at the franchise chia outlet, feeling his teeth falling out one after the other.

He hadn't been able to drink or eat anything, fearing that it would dislodge the remaining teeth, and had spent the day cursing his old dentist and trying to contact him to get answers. The office had remained closed and none of the alternate contacts or even emergency number had worked. He had given up on hearing back from Jaśmina today so the message was an enormous relief.

An hour later he was at the clinic but wasn't called into the treatment room. Instead Jaśmina invited him into her office and asked him to sit down. She unrolled a display on the desk in front of him, the bright screen showing Connor's treatment history.

"I couldn't reach your old dentist today, it seems the clinic has been closed. I've checked the tooth that I extracted earlier today and compared it to your dental records. Connor, it seems that you were sold unlicensed teeth."

"Unlicensed? What does that mean?" he answered, confusion clear on his face. "I paid a fortune! What about consumer rights, don't I have some kind of legal protection?"

"Consumer rights don't protect you when you have bought counterfeit goods, actually you could be fined for buying them. Your dentist was not an authorized practitioner. It looks like his license had expired about six months before he grew your teeth from stem cells using the patented method. The rights holder seems to have caught up with him and discovered the malpractice. They activated the remote kill switch yesterday and your teeth are dislodging."

"Remote kill switch! What are you talking about? How can somebody kill my teeth?" Connor replied in horror. "They were grown from my stem cells, I paid for the procedure, they are my teeth!"

"It is like remote deletion of ebooks", Jaśmina answered. "You know how when they find copyright infringement in a text, like unattributed quotes, the title is removed remotely?" Connor nodded and she went on "Basically each tooth is implanted with a tiny chip that includes details on method, the dentist license number, a serial number and so on. It also has a remote kill switch, so if the manufacturer needs to do a safety recall then they can deactivate it remotely."

"What? There is a safety issue with my teeth? Are they poisoning me?" Connor cried out, getting more agitated as he spoke.

"No, no, sorry, please calm down. Do you remember the Third Berne Convention? It was just after the nuclear bomb attack in the Turkish Republic of Northern Cyprus so the mainstream media didn't really report a lot on the negotiations, but that is when they brought in the new rules on intellectual property. There was a patient safety provision which mandated the inclusion of the chip so they could track defects. There is nothing wrong with your teeth, they are not dangerous. It is just that they used the safety feature to remotely kill them because your dentist had not paid the licensing fees. Basically your teeth are unlicensed and infringing manufactured goods."

Connor was shaking his head in disbelief, refusing to believe what he was hearing. His dentist had sold the treatment to him as being top of the range, with a life time guarantee. How could this be happening? He wasn't some fake designer leather purse from a Chinese sweatshop or pirated music clip exceeding the 3-second limit on fair use for previewing! This was his own body, his teeth grown from his own cells.

Slowly be became aware that Jaśmina had continued talking. "... not reversible I'm afraid. The teeth can't be re-implanted and as you had a full set you are going to lose all of them. I can remove them now if you want or you can wait for them to fall out on their own. I can give you a set of temporary dentures while we grow a new set of your own teeth."

Connor looked at her, started to speak and then caught himself, pausing briefly before continuing "Look, I'm a little dazed and confused. Can we take a break so I can go splash some cold water on my face?"

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Coming back from the restroom, Connor said "Are you licensed?", looking straight into the dentist's eyes.

Jaśmina smiled at him. "Yes, I'm licensed but not for the patented method that your previous dentist used. I do mostly OpenTeeth work. Here, let me show you my current accreditations." She worked the screen briefly, bringing up her profile with live links to a standards body that verified her certificates.

Connor nodded, checked the certificates closely and then asked her "OpenTeeth? What is that?"

"It is similar to the treatment you had before, but it is not covered by patents. The work was done in collaboration between the University of Gothenburg — that is in Sweden — and the Dental Hospital in Glasgow, then licensed under Creative Commons. There are no extra fees for using it as it was developed by public funded research, they publish everything in open journals as there are strict policies against patenting anything that is derived from research initiatives that are funded by taxation."

"Ok, eh, I haven't heard about this before. Why didn't my dentist use it then, is it substandard?" Connor asked.

"No, they are feature equivalent but because there is no advertising they don't really have the same name recognition as the major brands. A lot of people haven't heard of it, I mean if you are not a dentist then you probably don't read dental journals, right? That is really the only place this gets discussed. Teeth are like any other consumer product, when people don't have any real insight they tend to use price as a guide to quality and the patent methods are by far the most expensive. Your dentist could charge a much higher price for using the patented method and as he wasn't paying license fees the money went straight into his pocket."

"Speaking of my money, how do I get it back? It looks like my dentist is gone and the clinic closed down" Connor said. "Can I claim against the rights holders?"

Shaking her head, Jaśmina answered "No, they will state that the teeth were implanted by fraudulent means and deny responsibility, saying you should have checked his licenses. You could pursue a claim against the dentist if you can find him, but other than that it is a lost cause."

"Are there any, uhm, safety provisions in the OpenTeeth?" Connor asked.

"No, the researchers didn't see any reason to include it. There are no known safety risks with teeth grown in the lab from the patients own stem cells. The stimulus methods provide strict control over growth and the implant step is done after growth is completed." Jaśmina said. "There are no hazardous materials in the teeth either, they are identical to original human teeth except for enhanced resistance and durability."

"Has there ever been a safety issue with these teeth? Or with the patented ones I had before?" he asked.

"No, none, it really is a proven method. The only remote kills ever done were on patented teeth due to invalid licensing and there has never been a recall of OpenTeeth product" she answered. "Also, it is not like the books or music that used to be in the public domain before it was sold off to private rights holders, the Creative Commons is a real license that protects works but it doesn't try to extract fees from users. There are some specific rules about how it can be used, for example I can only charge you for my time and costs, not for the design of the teeth. Also I have to encode the teeth with the license and attribute the design to the original researchers, not to my own name. The final product is yours though, free to use in perpetuity but you can't sell them to anybody."

"I don't see any reason I would ever sell my own teeth." Connor said "You have convinced me. No extra fees, no remote kill. It looks like I'll be getting some of those OpenTeeth then."

CARLOS SOLÍS

Blurred. A utopian story

Vera Ruthenford is not an ordinary citizen. She is able to see people where others see blurs. She is able to hear noise where others hear silence. She is able to perceive the truth.

Ι

It all began with a chip. A group of investigators had developed a method to blur away people with special eyeglasses, for the sake of personal privacy. A separate group developed a method to filter voices out of conversations without distorting the background audio, which made it crucial for just-in-time censoring of swear words. Both groups called the attention of a certain neuroscientific firm. Since carrying eyeglasses and earbuds all the time would be a burden, they proposed to integrate their results in a chip that would be implanted in the brain. Both groups were hired by the firm and, five years later, began the testing phase of the chip.

Then came the IIPPA.

The International Intellectual Property Protection Agency saw a promising future on this technology. Its applications could be easily adapted to, as they put it, «properly defend content protected under intellectual property against unauthorized transmission, duplication and tampering». The chip, which until then was only referred with the cryptic code F_3 – 6_16 , was thus named the Rights Management Chip — RiMChip for short. With some money cashed to the firm, plus some lobbying in the United States' Senate, its mandatory usage was soon enforced in the US. Some more lobbying in the United Nations, and the enforcement was implanted worldwide.

Today, every newborn of every country has the chip permanently implanted in their brain, through an incision on their soft spot minutes after birth. Now every word, every image, every sound is encrypted. A paranoid interpretation of personal rights, plus a maximalist interpretation of all sorts of intellectual monopolies, forced to blur the appearance and mute the sound of every person, every building, every sculpture, every text, every image, every video, *every thing*.

In short, every person today views the world as silent and blurred — that is, unless they pay.

In order for anybody to watch a TV series, or hear a song, or read a newspaper, the person's chip must have paid the rights to watch it, plus a fee per second of view. Expensive, you say? Well, the rights managers insist that «with proper budgeting, entertainment is more than affordable». Especially since they account advertisements as a discount to the show they're displayed on. Now ads are now nearly mandatory to view: if you happen to have the urge to go to the bathroom, most possibly you won't afford to watch your favorite series.

The chip caused some controversy, of course. Some adults refused to get the chip implanted, since people from before the enforcement were not required to do so. However, they soon found out that they couldn't check the news, or be paid for their job, or even understand people who used the chip — even their speech was encrypted! The message was clear: censorship or ostracism. In fact, some people without the chip were even murdered.

«An unidentified man was found dead near the Brooks-Parkhurst Town Forest in Boston, Massachusetts. The man was identified as Sheldon Mattias Richardson, but his RiMChip was found to be forged. Although the first hypothesis pointed to a heart attack due to his overweight, his netbook was burned nearby his corpse, suggesting an attack against advocates of privacy.»

«A songwriter and singer from Ohio was murdered with a chainsaw during his concert in a local cafeteria. The murderer was masked and fled inmediately after. The corpse is unidentified, since the autopsy showed that the RiMChip had not been yet installed. However, a paper was found in the crime scene; it had written the following sentence, quote: "I know you don't believe in the Apocalypse — don't worry, you won't live to see it anyway"»

Nearly nobody could tell who they were. But those who could, got the message: promoting any ideology that opposed the RiMChip meant an excruciatingly painful execution. If there was a Seal of the Beast, this was definitely it.

Vera Ruthenford lives blissfully unaware of her special condition, and is, for all accounts, able to live a so-called normal life. Perhaps she lived the strangest moments of her life when she was young, when she would tell people that she could see a sort of black-and-white pattern in the screens where others saw a blank, or that the radio was buzzing while it was silent. The adults dismissed those weird manifestations as inventions of her young mind, fortunately, instead of what they actually were: her RiMChip was the first one successfully jailbroken in history, by a team of white-hat hackers leaded by yours truly and including programmers that, as one may easily guess, were anonymously reported as murdered in prime time. Now that I'm the last one standing, I had no choice but to visit her. The time would be almost ripe to see her once again, but these are violent times.

Of course she won't remember me. The last time I saw her was when she was three, and very fleetingly, when I checked whether she was safe with her adoptive family. The second-to-last time was when I implanted her the modified chip in her brain. Her biological mother was sixteen, single, and had eloped from her house with a man twenty years older than her. Shortly after she was born, her parents had a minor discussion that scaled terribly and left her mother dead. The father of the creature decided that he wouldn't be caught by the earthly justice. Her adoptive family... well, they provided her with only the most basic things she would need, and all of them were *objects*. Even though they were neither poor nor busy, Vera Ruthenford was basically raised on her own.

She knows that she can trust nobody but herself. I'd better gain her trust; it will be easy if I show her that I understand her visions of reality better than herself. These are times where the government can both blind its own citizens and look through their eyes, leave them deaf and eavesdrop their every word. And it has been done for so long, that nobody can even think of a time where this didn't happen. Well, at least nobody but me. And eventually her, hopefully, if this conversation doesn't have any incident.

The place seems safe. I'll initiate a secure remote handshake to encrypt our conversation, using the hidden key I have personally implanted in her chip, and that only I know about. The government will just hear a common conversation between two acquaintances that hadn't met in a long time.

Now, if I had only thought of some pick-up line.

2

Seeing the people in the street conforts me.

As a girl who has been lonely most of her lifetime, the presence of people makes me feel a bit accompanied.

People don't talk with me very much. It's almost as if I couldn't be seen.

I'm fine with that. The gestures of the people, their sounds, their movements, all of that gives me the illusion of a conversation. That's just enough for me; proper conversations are cumbersome. The other has to agree with talking with me. Most often they don't. Who'd want to talk with a stranger?

Wait — that man does! Hooded jacket, eyeglasses, long jeans. That's not the most usual outfit. Oh, I forgot to tell! I have a hobby. I like to see people in the street to watch unusual outfits and hairstyles. Clumsy, over-the-top, elegant, all of those I like to

memorize. Weirdly enough, though, I've noticed that most people use almost the same plain look. I'd like to know why is it so, but I've never had the chance to talk with anyone with an unusual look. Perhaps I'll learn a thing or two in this conversation. I accept.

Suddenly, the environments go blank. From the few times I've ever had a private conversation, I know this is one of those. I'm still unaccustomed to talking in a white void, like most do. What I notice first is that he has an issue with this particular conversation.

- If I had only thought of some pick-up line...
- Hmm... what about your outfit?
- My... outfit? What about that?
- It's unusual. Not as plain as most people's.
- Oh no don't tell me I didn't think about it!
- ...Is it bad? That's why I see most people dressed in a plain way?
- Now that you mention it, that's a good pick-up line. I need... no, I'm *urged* to talk with you. *Now*.
- Perfectly fine for me! I've been longing to talk with someone for quite a long time.

I take a seat on the ground.

- Listen to me well, miss Vera Ruthenford. I know about the noises you can hear.
- Really? I knew that talking with you would yield a most interesting conversation! So, what are those noises exactly? Ghosts? Some mental disorder? Some say I have a problem with my brain or something.
- What if I told you... that you're the only person who can perceive the world as it truly is?
 - What.
 - What you heard. Your RiMChip is unique.
 - Rhymechip?
- No, no. RiMChip. It rhymes with... nevermind. The RiMChip is the thing in everyone's brain that puts a paywall on anything copyrighted. Nobody notices it because it distorts the senses. Yours can bypass some of the locks. Where others hear nothing, you can hear noise. Sounds and images encrypted by the chip only those authorized to perceive them can do so. While others can't hear or view the undecrypted noise, you can. Many of the aspects of reality that are censored to the average citizen you can view it at will.
 - So, I'm the only one jailbroken?
 - Yes
- That's why people sound like they buzz as they speak! And why do screens look like with ants on them! And why do I hear noises instead of music when I don't pay!
 - Yes. Yes and yes.
 - Uh, so no ghosts. Lame.
 - At least it's not your brain. More like an interference inside of it.
 - Yeah. Still, that doesn't answer my question. Why do people dress so plainly?
 - That's something related. Wearing a dress requires to pay for a license.
 - Like music.
- Exactly. And not just the wearer, also those who watch have to pay or else they'll just see the usual plain clothes. Most don't bother paying for something that others can't see. Granted, *you* can see them, but —
- That solves my doubt, thanks! But, you said that you were *urged* to speak with me. And you know too much about me. It's starting to worry me. Rarely do I talk with strangers. Unless... you are actually an acquaintance of mine?
- Technically yes, I am. Sorry about that. The last time I saw you was when you moved with your adoptive parents.
- Such a long time indeed. They live with me no longer, however. They moved to a large mansion, left me the house, send me some money every month. It's like if they thought I could live with —
- Just objects, I know that much. Well, to the point. I actually need to move with you.

- Hey, that's a little too fast, stranger!
- Let me finish, miss Ruthenford. I'm almost sure that I've been blacklisted. The government is about to release a firmware update for the RiMChip. It's worse than I thought it will let the IIPPA, and also the government, to manipulate thoughts at will. Don't you know the implications? First, people will be made to forget copyrighted content, to force them to pay for it once and over again. Then it will be abused, no doubt about it. People will forget everything that the powerful wants to make them forget. It will be able to force people to obey them without questioning. It will, in a few words, gain control over every mind of the world!
- What about me? Why should you stay at my house? I'd technically lodge a criminal —
- I need you. You're immune to the upgrade, I'm not. If someone can stop this, it's you and only you. My time is short, and I must share many secrets with you. However, this is an unsafe place to show you everything. We should be going home now.

I'm unsure. Either he's a stalker who can't afford rent, or the man says the truth and the world is deafblind. But that means that either I'm crazy and he's manipulating me, or that I'm actually meant to save the planet somehow.

He seems sure of what he says. If he has a plan, then I can learn a thing or two. And also, his outfit is rather interesting. It's like if he had some mysterious aura, and I wanted to discover what he hides.

— Why not! — I say with only shades of doubt.

3

As she accompanies me to her house, I remember about Juan. He was an artist who was born in Andorra. He spoke Spanish and French fluently, and some English too, and he was an excellent singer who excelled at rockabilly. He was recruited by a talent seeker, who promised him riches and fame. He got neither. He recorded a pair of albums, but thanks to the shady accounting of the record companies, every single song he composed actually left him more indebted with them. And the fame, yes, he got a bit of that, but the company required to guard him almost like porcelain. He couldn't get out of his house. During the concerts, he had to play behind crystal barriers. His contact with the outer world was pretty much null. It was less for his own safety and more for the safety of the company: in that way, Juan couldn't learn that his own songs were licensed at obnoxious prices, while he was only getting more and more debts. One good day he took an overdose of sleep pills, and didn't wake up ever again. That didn't stop his company to abuse his memory even as of today — the licensing price for his music increased by 650%, on average, inmediately after the news about his death, dismissed as yet another artist falling as a victim of drug overdose, were announced.

He shared the same fate with writers. Painters. Histrions. Programmers. Even historians, dammit. All quickly recruited, then locked from the outside world by order of the IIPPA and its affiliates.

Worse enough: as of today, the IIPPA is more or less the intellectual task force of the government. A logical step, since any censorship technology is coveted by any government eager to manipulate its citizens.

And now, the impending firmware upgrade. Technically, it's more like a rootkit. It will forcefully spread itself through every wireless router, every computer, every phone, and what's even worse, every person — although they will not know about it. After that, every person infected with the virus will lose what remains of their freedom. Their thoughts will be, literally, moderated by administrators up above. If she is to stop the madness, she will require to become one of them.

She is still too young and unexperienced to successfully join the ranks of the IIPPA and infiltrate into their physical, heavily guarded headquarters, which are, of course, the only place from where the rootkit can be successfully undeployed. It will take her years of training, plus a long way to earn the trust of the IIPPA's elite. One single doubt, even the fact that I ever talked with her, could be more than enough to stop this last kindle of hope. Long before that, everyone will be hunting anyone like her, including myself.

Perhaps I'll be made to kill her in a gruelsome way. Perhaps I'll be made to throw myself from a building. Perhaps, if the almost divine authorities are merciful with me, I'll be made to forget what I used to do, and reduce my cognitive capacities just in case, to prevent me from disobeying the powers that be ever again.

I have to teach her all I know. And flee inmediately after. Very, very far away.

Fortunately, I'm ready for this case. Her modified RiMChip is not only immune to the firmware upgrade, it's also able to use a similar system to receive specifically-encoded information from other minds at very high speeds. Eventually, when she earns enough trust from her superiors and becomes safe to do so, she will be able to inject a counter-upgrade in other people's minds.

We're finally home. My contacts (may they rest in peace) told me that the upgrade would be deployed today or tomorrow. I'd better speak with her right now.

4

The man in the hood seems nervous. If he's actually right (as I expect), then he has all the right to feel so. What exactly am I supposed to do? He said something about having to enter some secret base. How am I supposed to do that? Do I have some sort of mental superpower or something? Am I able to see some kind of secret entrance that nobody else can? I'm about to ask him, when he issues me a question instead.

- Miss Ruthenford, do you remember anything about your adoptive parents?
- Honestly, not too much. They were too busy travelling abroad. They were rich, kept me alive, little else. In fact, I almost can't remember talking with them.
- Well, of course your parents were busy they work for the IIPPA. Actually, that's part of the plan. I've been cooking it since you were adopted, actually.
 - Wait did you choose my parents? You could have chosen better, I guess...
- Sorry about that. Actually, I just told them about you, they accepted, things got worse. Who would have thought they'd become so lazy? Still, the point is that infiltrating as another employee will be quite easy. Nepotism for the win, one may say. You enter the IIPPA, and do your best to get promoted until you can enter the headquarters. When the time is ripe, you will inject code in the server that issues upgrades worldwide, and will send a code to hack into the government's systems and send a chip-bricking signal instead. Get ready I'll transfer some important information into your RiMChip. You may feel some tingling, headache, maybe worse, so you'd better take a seat.

I sit in my sofa and close my eyes.

— Uh, and about my outfit. I saw that you like it. It's weird to see somebody with a hooded jacket, and I'll have to leave as anonymously as possible. Would you like to take it?

He dresses me with his old white jacket. It has this weird smell of old sweat, but at the very least it makes a nice addition to my collection.

- Seems to fit you very nicely. Do you feel confortable?
- I might say yes.
- Let's start, then.

The world goes blank. Another secret conversation. But wait — the world becomes rainbow-colored, there are all sorts of noises, people talking, people typing, people whistling, chanting, chanting, sharing —

5

What has just happened?

Oh no. It's the worst case scenario.

Her eyes are watching me with scorn. That can only mean one thing.

— You're so gullible. My parents knew all the time. Now I remember. You fell on my trab.

Her voice is deeper, more furious. I know this is not actually her speaking. Time for the plan B $-\!\!\!\!\!-$

- It's too late for a plan B. I know what you're planning to do. You have told us *everything*. Now we can stop your plan. You should know better. You should know by rot that there must be a master and a slave at all times. When a world has no masters, one must surely appear. It's a natural law. We're actually making a favor to the world. Whomever owns ideas, will own the humanity. Controlling all ideas will stop all the conflicts of the world. Every idea will be used to make the powerful even more powerful.
 - What point is there in owning all the ideas, if that's the end of creativity?
- Creativity is overrated. Creativity makes inventions and art. Those bring us money and power. Power, and money, and the resources that money can buy that is all what a leader needs to have a fulfilling life. You, on the other hand, have lived a pitiful life defending abstract ideas. Who needs freedom when you must suffer for it? When you can give it up in order to be a happy slave?
- For me, no amount of distractions could make me feel complete. Not today. Not tomorrow. Your kind have made the people lose the focus on the important values that must be defended, and instead you've made them addict to entertainment and celebrities. You've made them pay for the tools that they can use, and you have built them in a way that prevents them to use those tools against you. Bread and circus, and tools faithful to the master. The government knows it well. And now, Vera is another tool...
- Did you think you could trust in her? In her parents, faithful administrators of the IIPPA? Of course they suspected from the very first day. We just let it continue because it would lead us to the demise of your group, the only ones who could even *think* about taking us down, without us dirtying our hands. You're not the only one who can hack a chip. «The price for freedom is constant vigilance» remember?
- My bad, agreed. But let me tell you something. Did you really think I was so short-sighted? That I would plunge myself into the abyss without taking some bungee rope? Just to paraphrase, the IIPPA and the government are not the only ones who can hack a chip. Man, I love to be snarky... Anyway. I know it's shady and stuff, but they're not the only ones who can control a mind either.

Her face, no, the face of the powers that be began to express doubt.

— Ideas deserve to be free. My fellow defenders of freedom have long fought alone, even isolating themselves from the world, hoping for the day that is surely to come. I myself have lived as a beggar for a long time. Even my name has been long forgotten. But a powerful idea eventually grows. You will know when the time is ripe. One last thing: make my slumber short, Vera Ruthenford.

It would be fool to tell that I didn't transfer her every single thing I know. A good white-hat hacker knows that some secrets are better left untyped. For example, my plan B. I installed her a rootkit with a logic bomb, meant to be run only when she finally reaches the highest ranks of the IIPPA, whether she wants it or not. She will forget about its existence pretty soon. Me too. Everyone, in fact. The idea may be lost, but there's no way to destroy hope. I know that it will be very soon, because I can feel myself becoming unconscious while I'm still fully awake. *The upgrade has begun*.

6

«I pledge allegiance to the new order of the world, and the IIPPA, legitimate owner of all the ideas of the world. Hereby I transfer all rights on all my intellectual work to the IIPPA.»

The pledge resonates on the mouth of every single human being, with cacophonic echoes coming from all corners of the planet.

Vera Ruthenford, still under control, is the first to swear allegiance.

The fighter of freedom, who has long lost his old name, quickly falls under control and swears second.

Both are made to walk towards the nearest police station to bring the old hacker to the justice.

As she escorts him, a smile appears on her face.

A smile. And a tear.

ROLAND SPITZLINGER

Future of Copyright

CHANGE LEGAL DEFAULT TO CC BY-NC-SA

The history of intellectual property rights shows that exclusive intellectual property rights were not designed to secure to the authors a natural right in their produce. They were designed to induce new knowledge for the benefit of society. Starting from the first recorded patent in ancient Greece to its legal codification in the cities of Florence and Venice, lawmakers have continually expressed their hope that intellectual property regulation will promote individuals to excel in their labor for the benefit of all. This rationale is still present in most modern intellectual property laws. Take e. g. the constitution of the United States, which empowers Congress "to promote the Progress of Science and useful Arts, by securing for limited times to Authors and Inventors the exclusive Right to their respective Writings and Discoveries." (United States Constitution, Article I, section 8, clause 8)

The difficult part is of course to balance between individual private interests and the interests of the general public. Where should we draw the line between protecting the produce of individual labor and the freedom of the community to take up new ideas and develop them further? It seems that in the past decades lawmakers have focused their attention almost entirely on the positive effects of copyrights on individuals, while turning a blind eye to the negative effects on society. Today authors do not need to claim exclusive intellectual property rights. They are granted automatically by default, allowing them to exclusively publish, reproduce, adapt and sell their works.

This is remarkable given the fact that individuals by themselves would be unable to secure their intellectual property rights without support of others. As an individual alone I am unable to enforce my claim, no matter how justified it may be. If I want my my works protected from being (naturally) copied by others, society must grant me an exclusive copyright and help me enforce it. In other words I must convince society that granting me such privilege not only serves me personally but also the community as a whole. Why else would society provide me with all necessary institutions (police force, legal system, etc.) to secure my claim, given that this comes with a significant cost?

A SIMPLE SOLUTION

Change the default legal copyright setting from "All rights reserved" to Creative Commons BY NC SA". Using the Attribution Non-commercial Share Alike licence by default would let users remix, tweak, and build upon creative works non-commercially without the threat of legal action, as long as they credit the original author and respect the author's right to exclusively sell her works. Authors would also retain their moral right of attribution. On the other hand, all other users could freely consume and build on existing works for non-commercial purposes.

Besides the basic CC BY NC protection individual creators should also be able to ask for additional (temporary) copyright protection. However, these special privileges shall only be granted if the applicant can prove (e. g. by means of independent scientific studies) that additional protection also provides a clear benefit to society. Once granted other parties could contend these rights at court at any time by providing new evidence that undermines the original finding. This should guarantee that additional protection only remains as long as there is a benefit for society.

In daily life most people will not bother to claim additional protection as they are generally fine with others using their works for non-commercial purposes. As a result, all cultural works — except those specifically marked as "copyrighted" (additionally protected) — will by free to use by default. This should give creative production and re-production another boost.

JAROSŁAW ŻYŁA

Heritage of ACTA

It was a warm late afternoon and Jack Aari was sitting in his office. Rays of the sun, heading for rest after a whole day of labour, were finding their way through window shutters and playing with cigarette smoke that was nonchalantly whirling in the still atmosphere of the room. Jack was sitting silently and the only sounds that one could hear were the monotonous ticking of an old-era mechanical clock (a 'gift' from one of the people Jack was investigating) and a dull buzz coming from the direction of the street.

His eyes were focused on the end of the lit cigarette and just when the last trace of fire vanished from the tobacco roll the phone rang. It took a while for him to notice that. He didn't like all these modern videocoms and whatnot. The good ol' phone was all that he needed, especially when dealing with not that pleasant people was one of his job duties. "We could've been using holographic communication by now, have it not been for what I do…" — he thought and sighed.

- —"Yes?" he asked.
- —"Listen up, Jack." his boss, a government official, always cut to the chase. —"We've got a new case of ICIA level 5. Take a look at it, OK? Your plane leaves in two hours"
 - —"Sure, boss" Jack answered and put down the phone.

He stood up, took his badge with the Copyright Infringement Bearueau logo, took his coat and hat and left. The smoke in the office whirled up vigorously and slowly calmed down. After a short while the only sign of his former presence were the ash and a stub in the ashtray. And the clock was still ticking monotonously.

CIB was a bureau dealing with copyright infringement acts (International CIAs). It was almost a century old, with its beginnings rooted deeply in the ACTA and SOPA acts that were pushed through legislations around the world in late 2019. Shortly after an international bureau to trace copyright infringement acts was established and it was so successful that not even a decade passed and it got executive rights to chase and investigate copyright criminals, becoming a second Interpol of sorts. But later it even got greater privileges. And so the era of infringer hunting commenced.

Jack joined the bureau when it was in its golden age. Thousands of people, hundreds of divisions all around the world. There was a lot of work to be done and every pair of hands and a brain was wanted. He was young, skilled, educated, and had no conscience whatsoever. They were chasing everyone who was infringing somebody else's rights. Due to the period of all-out copyright wars, which were literally choking courts all over the world, he was promoted almost instantaneously.

Investigations concerned everyone without exception. Common folks living their daily life day by day just watching movies and listening to music (illegally) were the subject of his interest just as huge international companies of billions daily sales. He was always working with surgeon's precision — pinpointing the place of the crime, getting proofs and dealing with the people. His lack of conscience was an advantage in that environment and helped him greatly. Higher-ups appreciated his results and he was being promoted on a regular basis.

The criminals that he was dealing with were quite often hostile and aggressive until he locked himself with them in a small room for half an hour. After that everyone would leave the room and head straight to Agreement Department to settle the matter and pay the fine. Very rarely he stumbled upon somebody that was stubborn enough to actually insist on a court trial. That fact alone gave him a 'No Trial Jack' nickname among his coworkers.

As the time passed Jack began international work. He was now dealing not with local or country-wide cases but traveling all around the world and tracing various world-wide crimes. What didn't slip past his mind was that slowly but steadily development in almost all fields was halting. After two decades of intense court work (the number of copyright courts easily quadrupled in that time) everyone was starting to feel conscious

about all that copyright stuff. Everyone interested in his or her well-being should have been interested in copyright laws — fines for infringement caused quite a number of suicides of people who were stripped of their life's worth of belongings.

That fact alone was more than enough to stifle all development. Before you began to work on anything you had to check whether anything you were going to use was not copyrighted (and by the end of the third decade there were few things that weren't). It took time. And resources, and time. Then you most likely had to pay to copyright owners for using various components. Which in most cases made your whole enterprise not profitable. Those lucky ones, who managed to push through all these ordeals, in most cases crashed into the wall of copyright trolls, sharks and moguls.

Ever since the memorable ruling of the International Court in Hague that copyright is a property in just the same way as patents and may be traded just as any other goods, the world witnessed a rapid rise in the number of companies whose sole purpose of existence was to search, buy and then either troll or sell the copyrights. No matter the subject, be it a song, a movie, a news article, a medicine formula or a way to cultivate better potatoes — every copyright was a subject to those companies.

Jack remembered that period very well. It was then when he finally reached the top office of CIB. Not the current position, but now he worked in Headquarters — a huge, 300-story-high building in Dubai, which made Burj Khalifa look like a matchstick. Somewhere in the meantime he regretted for a while that he didn't marry, but it passed with time. He was never good with women and the few relationships he had always ended up with a woman slamming the doors on her way out.

Working from his international office in Dubai, traveling around all developed and developing countries (the latter were basically forced to comply with copyright treaties), he had a great deal of opportunities to investigate what was going on behind the closed doors of copyright trading. In the beginning of that period of his career the amounts of money he had to deal with when chasing rouge copyright traders were astonishing. He got used to them pretty quickly though.

All these factors caused all development first to slow down and then to halt completely. The only ones that were able to do anything were a few of the big companies, who in the end managed to buy out all copyright instances. He vaguely remembered that a similar thing happened with patents in the late 1990s and the beginning of 21st century. In such moments Jack used to smile and think to himself that the only thing we learn from history is that we don't learn from history.

A pretty fragile balance was established between copyright moguls and about fifteen years ago the OCO (Organization of Copyright Owners) — 4 companies cartel was created. It was engineered in order to cease various criminal activities connected with illegal trades and black market. And probably that was it.

Jack knew the date very well — it was the day he had been appointed to be the head chief of the CIB. During the first two years of his work in that position he had quite a bit of work to do. After some time things began to calm down, though, and after a couple of years CIB divisions started to vanish from around the world.

Crime rate dwindled rapidly, everyone was educated about copyrights and infringements (there was a separate subject introduced at schools all around the world) and the amount of work Jack's bureau had to deal with steadily got negligible. Five years after cartel establishment he was left only with his main HQ, which he had to move to some cheaper location. Governments didn't see any reason to pay massive rent if Jack's office didn't produce any relevant income anymore. The suburbs of London occurred to have the best price/location ratio so the bureau ended up in some three-story Victorian building.

It took another five years for Jack's staff to disappear. Crimes were occurring at a rate I or 2 per couple of weeks and all that was needed were Jack's investigation skills and some secretary to do the paperwork. She was quite a pretty lady in her late thirties and was dropping by the office every once in a while, usually just to put all the reports together and send them to the government administration at the end of the month. Jack was obviously her type, but all those years of dealing with suspicious criminals, two-faced

cheaters and whatnot made him literally unable even to notice her smile, not to mention the creation of a proper relationship.

In the end what he would do was to sit around in his office and patiently wait for the phone to call. Once he knew there was a case to deal with he was getting a bit livelier, but not too much. Just like right now.

Level 5 was a minor issue. Estimated worth of possible fine was between \$10 000 and \$50 000. Barely enough to cover his expenses and the losses of the copyright owner. "A job is a job" — he used to think in such moments and kept fulfilling his duty in the only way he knew how — as best as he could.

By the time he arrived at the airport he already received all the necessary details. He waved his badge to the airport guard and got on-board a government plane. "It is damn hard to tell where the OCO ends and the government begins" — Jack thought to himself and fastened his seat-belts. After a couple of minutes he was up in the air flying to Argentina.

A couple of hours and much more than a couple of drinks later he landed in Buenos Aires. The air was hot and humid and he started sweating almost immediately after leaving the airport. He chose the cab and took a seat.

- Cañada de Gómez, por favor. he said to the driver.
- Si, por supuesto, señor. answered the driver and started up the engine.

Jack felt a little bit of excitement, just a shadow of the one he used to have back in the days, but still pleasant. "Another day at work" — he thought to himself wiping the sweat off of his forehead. "Let's get this Level 5 bastard done".