

# Genius and the soil

State and corporate interests have sought to crack down on the power to share information digitally. But could the new technologies point towards a more democratic model of creativity, asks JONATHAN GRAY

Who can share what on the internet? There is an increasing awareness of debates around protected material being shared online through high profile court cases and controversies in the news, through things like the Pirate Bay, Wikileaks, or the recent tragic case of Aaron Swartz (see box, right). But, stepping back from questions around the law and its implementation in these 'edge' cases, what kinds of information should we be able to use and share with others as a matter of principle?

Is digital material that can be legally shared with others nothing but the residue from all the valuable stuff that is worthy of protection? Once all of the good stuff is packaged up and sold from behind 'clickwrap' agreements, digital rights management technologies, iTunes stores and subscription paywalls, is there nothing left but a strange wasteland of free giveaways, taster content, third-rate amateurism, ads and piracy? Or can we think of a more positive characterisation of that body of culture, research and public information, which should be free for everyone to use, enjoy and benefit from as a matter of principle?

The laws, policies and discourses concerning the way we share the fruits of our intellectual labour (whether patterns of pixels, waves, words, chemicals, DNA or software instructions) tend to focus on individual innovation, originality, protection and compensation, rather than on collaboration, shared tradition, iteration and equitable access. We tend to talk about these fruits first and foremost as commodities for which their creators or owners are entitled to receive return on their investment.

Why? In many ways we live in the shadow of certain romantic conceptions of cultural and intellectual innovation

from the 18th and 19th centuries. Reacting against models of literary and artistic creation that privileged imitation of the classics and striving towards perfection within an established tradition, this period saw a general turn towards the individual genius who broke previous rules and invented new ones. Through this new aesthetic frame, the world was divided into visionary and rebellious pioneers and slavish imitators.

Stories like this remain very influential - from the restless obsession with conceptual novelty exhibited by much of the contemporary art world, to the elevation of the 'disruptive' entrepreneur or the renegade maverick in Silicon Valley or Wall Street. Rules are to be broken, temples smashed, traditions overcome by a caste of outstanding individuals leading us over the bleeding edge. New voices need to define themselves against others - and are haunted by the fear of being derivative, by the 'anxiety of influence'.

## Creativity and copyright

While this picture arose as a cultural response to the predominance of aesthetic classicism, it was happily embraced by publishers, lawyers and theorists who were looking for new ways of conceptualising the legal and philosophical foundations of 'the copyright' and what would later become known as 'intellectual property'. It still continues to exert significant influence on the way we think about creativity and intellectual labour, as well as on the formation of laws and policies that dictate the way that information moves around in society.

Large rights holders and lobbyists who work on their behalf are certainly not afraid to use this to their advantage. Rather than directly addressing the economic interests of big rights holders, industry associations and lobbyists

talk in terms of protecting the interests of innovative individuals: authors, musicians, and scholars. To give just one example, the Motion Picture Association of America, supported by some of the biggest players in the film industry - Disney, Paramount, Sony, 20th Century Fox, Universal and Warner Brothers - claims to pursue 'commonsense solutions' that '[protect] the rights of all who make something of value with their minds, their passion and their unique creative vision'.

This notion of the individual innovator, the lone pioneer breaking rules and creating new paradigms, is only one side of the romantic story about literary creativity. The other side (perhaps less useful for those who are keen to expand property rights to products of the mind) is that great new works inevitably depend on and build on shared cultural tradition. The poet Edward Young - whose tract on literary composition sold out twice in Germany in the mid-18th century - said that literary genius grew like a new plant out of a shared body of culture. The philosopher and literary critic Johann Gottfried Herder, greatly influenced by Young, said that literary geniuses such as Shakespeare depended on a fertile body of stories, songs, characters and metaphors, the soil out of which groundbreaking new works could grow - a thought that catalysed collections of folk tales such as those of the Brothers Grimm.

When we think, speak, and express ourselves we cannot help but use words, ideas, structures, tropes, conventions, operations that come to us from others. We are always already standing on the shoulders of giants, and we can but supplement (not escape from or reinvent) the shared traditions through which we articulate ourselves. Individual innovation and invention is predicated upon what we inherit and borrow from others - from the languages we speak to the the archives of texts that make up a body of disciplinary knowledge. Having access to these traditions and bodies of knowledge is an essential precondition for the creation of new works of the mind.

We need a more balanced way

# Inspired by Aaron

**BENJAMIN MAKO HILL and SAMUEL J KLEIN pay tribute to their late friend Aaron Swartz, whose contribution to opening up culture, research and information to public access remains an inspiration**

of thinking and talking about how information is shared – one that moves beyond a near exclusive focus on compensation and control. Laws and policies that govern the way information is shared in society need to more explicitly recognise and promote the intrinsic and extrinsic benefits of increasing access and enabling reuse. We are beginning to see the emergence of a broader public conversation around the benefits of sharing information, but this is often focused on marginal cases and transgression rather than framed in terms of a positive conception of a shared body of information that everyone can access and use via the internet.

## **Shared digital commons**

The battle for a shared commons of digital information is being fought on many fronts. Digital copies of works that have fallen out of copyright hundreds of years

Sage Ross

**O**n 11 January, Aaron Swartz committed suicide in his New York apartment several months before he was scheduled to go to trial for downloading too many scholarly articles. For more than a decade, Aaron had been an important participant in what would eventually be called the ‘free culture’ movement. In some of this work, we were honoured to be Aaron’s collaborator and friend.

At the core of the free culture movement is the observation that those who control how knowledge is produced, reproduced and shared have a deep influence on our culture, knowledge, and

experience. In this sense, the question of who controls production and access to technology and publications is both deeply political and critically important.

Aaron saw the political and social implications of control over the technical infrastructure we use to share and access information and he worked relentlessly to build more democratic systems of knowledge production, organization and sharing. Although the internet is designed as a decentralised system, many of the web’s greatest commercial successes – like Google and Facebook – are centrally controlled. Decentralised collections are harder to access, organise, search, share and integrate.

Aaron’s projects tackled hard problems facing decentralised systems, to build democratic technology that would place control over information back in our hands. His work included the creation of widely used technical specifications for data sharing, a Wikipedia predecessor, several startups and a massive, democratically edited bibliographic database.

But technical tools were not his greatest work. Aaron’s enthusiasm for finding fundamental solutions to a pervasive problem was infectious. His projects and visions for society were ambitious and focused not only fixing problems but on understanding them deeply and addressing their cause.

For example, many in the free culture movement have bemoaned the way that much of our most important knowledge and information commons has been enclosed behind paywalls and put under the control of for-profit firms. Aaron helped to liberate hundreds of thousands of scanned copies of public domain books, millions of public domain US court documents, and an enormous cache of bibliographic metadata. He created,



Aaron Swartz at a Boston Wikipedia meetup in 2009

aggregated and coordinated general infrastructure for publishing, distributing, and analysing a range of datasets.

Over the past few years, Aaron became more heavily involved in a broad range of political activism on issues that went far beyond technology and information policy. But even this work was founded in free culture principles and tools. Aaron created an organisation that collected large datasets of public information related to government, policies and politics to make data more widely accessible, searchable and understandable. Working inside traditional political activist organisations, he directed his knowledge and skills to a broad range of political projects, including anti-censorship, anti-poverty and social justice activism.

Between and across these communities, Aaron was constantly lending a hand: connecting groups that needed to work together, providing server space and technical advice to groups that needed it. And he reminded us why this was important to good librarianship and governance, universal education and an informed society.

While he was quiet in crowds, Aaron was a natural connector and kept up an active correspondence with thousands of individuals. He was active in many online communities, including those devoted to digital archiving, open government, civic engagement, open access and universal education. Since his death, many in these communities and in others have launched

new projects and continued work in his memory. Press coverage served to expand the community inspired by Aaron, and enlisted many more into these efforts.

The effect has been staggering. In response to the overzealous prosecution of Aaron's case, the US Congress is considering legislation to amend the Computer Fraud and Abuse Act to exempt mere violations of terms of service agreements from the felony charges that Aaron was facing. In protest, many academics have published troves of scholarly works and datasets. In cities across the world, programmers and activists have organised dozens of 'hackathons' to further projects and tools to support transparency, accountability and political organising.

The most exciting examples of these projects are ones that incorporate the positive recklessness with which Aaron approached his own work. When confronted with a problem, most people, if they think that they might solve the problem at all, look to the simplest and most obvious solution. Aaron had the rare capacity to look for the more fundamental cause and solution. Frequently, he had the dedication and the talents to find it. His work is inspiring because he resisted playing by the rules; he would play with the rules. We are better because of his work and much worse without his continued contributions.

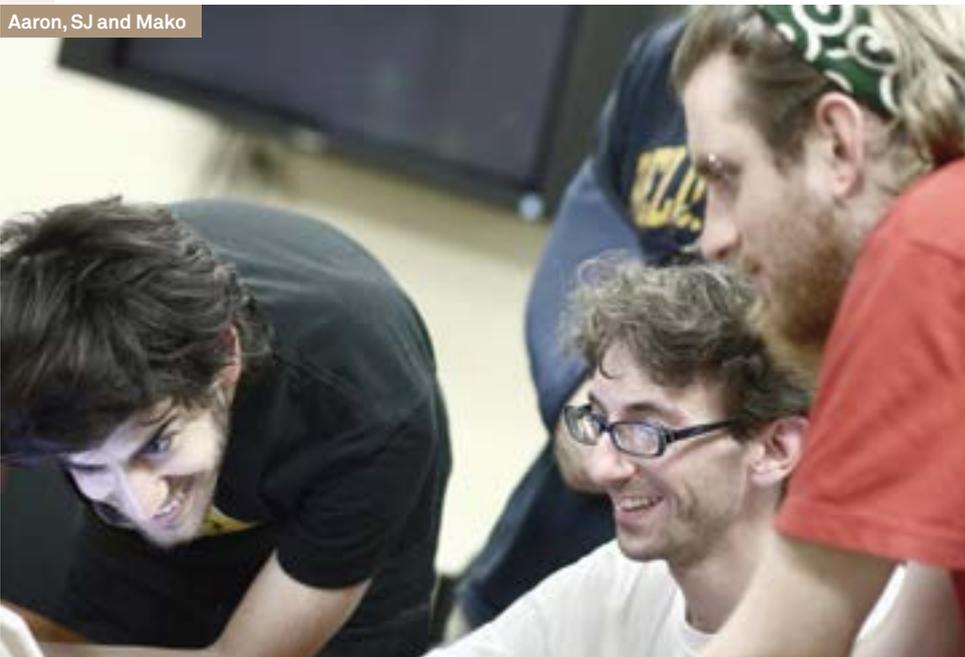
Aaron was a friend and an inspiration. We will miss him deeply.

ago continue to be locked up and sold by companies like Gale Cengage, whose subscription fees were so exorbitant that a national agency had to intervene to cut a special deal to enable university researchers in the UK to have access to them (if you're not affiliated with a university that has access, you won't be able to read any of these texts on the web). Many governments around the world still have exclusive contracts to sell critical information to private companies, who then sell on access to other companies and to the public. This means that in many countries around the world, you have to pay a third party company for a subscription if you want to know the text of the laws that govern you. Big academic publishers continue to use free labour from university students and employees to produce and review academic journal articles, selling subscriptions back to their libraries for extortionate prices.

We need a more widely accepted positive conception of a body of digital material that everyone is free to access and use in perpetuity - including essential information about the world that can be used to enable better journalism and better policy-making (from more granular and timely carbon emissions data to information on who is lobbying), access to research (such as supporting the release of information about clinical trials related to drugs that our medical services prescribe), and historical and cultural works that have entered the public domain.

There are still substantive debates to be had about the balance between open access and enabling creators to make a living from their work - as well as which policies and models support this balance. And there is plenty of work to be done to ensure that the exploitation of old industries built on the control and sale of wax, tape and dead tree aren't replaced by new forms of monopoly and control from fast-growing technology corporations. But it is imperative that recognition of open access to certain information as a matter of principle (not just through accident or transgression) becomes an essential part of 21st-century knowledge policy and the more public discourse around it. We need new and better stories about the importance of collaboration and access - about common traditions and building on shared bodies of evidence, reasoning, reflection and creativity - to complement the much more dominant stories about isolated geniuses and just desserts. ■

Aaron, SJ and Mako



Sage Ross