

hoi ik ben een titel

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Universal free online access of scientific journal articles is within reach if universities and funders mandate their authors to self-archive their refereed manuscripts in an institutional archive (IR), upon acceptance in the (subscription) journals of their choice. This form of *Green* open access (OA) can be implemented unilaterally by the universities and funders at little cost. It should not be confused with *Gold* OA, meaning OA through *publishing* directly in an OA journal.

I claim that the Dutch government and the association of universities (VSNU), by focussing on Gold prematurely, have made deals that will needlessly slow down the provision of access and maintain or even increase the publishers' profit margins. Sustainable Gold access (including copyright reform) will follow once universal Green has been reached and publishers only provide the organisation of peer-review and luxury services like enhanced PDFs or paper versions.

Grassroots publishing initiatives, such as SciPost, politicize the community by offering a glimpse of a possible future. But if they are serious about subverting the publishing industry, they should, in addition to their innovative activities, put their full weight behind the optimal Green mandate.

I. Introduction

The current accessibility of research journal articles is decidedly suboptimal. Journal prices have been rising at 2.5 times the rate of inflation the last couple of decades [1, 2], but even if all 40000 existing journals could be subscribed to at production cost, universities would not be able to afford them all [3]. This means that all researchers, even at the richest institutions, do not have full access to the output of their colleagues, and all researchers are denied the full impact of their research, since they cannot reach the entirety of their intended audience.

It is unbearable that this *access/impact problem* still persists, because with the advent of the Web, articles can be reproduced and spread at virtually no cost. Doubly unbearable, since the whole enterprise is funded with tax-payer money for the benefit of society.

The solution to the problem is, according to Stevan Harnad, closer to raincoat science than rocket science [4].

It's the online age
You're losing research impact...
Make it free online

In other words, authors can continue publishing in subscription journals, but should as an extra administrative step *publicly self-archive* their refereed manuscripts. This practice, which Harnad has been advocating since 1994 [5], was laid out by the Budapest Open Access Initiative (BOAI) as the first strategy to be implemented [6]. It later came to be known as the *Green* strategy [7]. If it is universally adopted, the access/impact problem would be solved.

Apart from public self-archiving (the "Green" road), the BOAI described a complimentary *Gold*



Figure 1: Raincoat science by Judith Economos

strategy, namely to start a new generation of journals that provide open access to the material they publish. It is this second strategy that often has been misunderstood to be the *only* viable strategy of providing open access, by scientists, media and politicians alike.

This is very unfortunate, since the Green solution is by far the most cost-effective way of providing access [8], can be decided on by universities and funders unilaterally, without having to convince publishers to alter their business model, and it does not limit authors' choices of journals in which they wish to publish.

Furthermore, it is plausible that once universal Green open access has been achieved,

II. Raincoat science: the optimal open access policy

Another solution

III. To cite

- self-selected or mandated: oa increases impact [9]
- green is most cost-effective strategy [8]

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