

For a Slow Science movement

Researchers, teachers, we urgently need to slow down! Let's free ourselves of the Red Queen Syndrome! Stop wanting to run faster and faster. Stop wanting to run faster and faster, which just results in standing still or even going backward. Following Slow Food, Slow City and Slow Travel, we call for the creation of the Slow Science movement.

Looking, thinking, reading, writing and teaching all take time. We have less and less of this time, if we have not lost it completely. Within our institutions and beyond, social pressure promotes a culture of immediacy and urgency. With real-time, just-in-time production, projects come and go at an ever increasing pace. Our professional lives are not the only victims of this pressure – a colleague who is not overworked and stressed out passes for eccentric, apathetic or lazy – but also to the detriment of science. Fast Science, like Fast Food, favors quantity over quality.

We multiply the research projects to fund our laboratories, which are often poverty-stricken. In consequence, as soon as we have finished developing one program and, by merit or by luck, got a grant, we must immediately consider meeting the next tender, rather than devoting ourselves to the first project.

Because the appraisers and other experts are always in a hurry too, our CVs are often solely evaluated by their length: how many publications, how many presentations, how many projects? This phenomenon creates an obsession with quantity in scientific production. One result is that it is impossible to read everything, even within a narrow speciality. Thus, many articles are never cited and they may not even be read. In this context, it is increasingly difficult to identify publications and presentations that really matter – those that a colleague has spent months, sometimes years, perfecting – among the thousands of others that are duplicated, sliced and recycled, or even more or less “borrowed”.

Of course, the training that we offer must be “innovative”, obviously “high performance”, “structuring” and adapted to “changes in the business world”. It is hard to identify the appropriate changes in a world in perpetual motion. As a result of this frantic race to “adapt”, the issue of selecting the fundamental knowledge to pass on – knowledge which, by definition, is unchanging – is no longer on the agenda. What matters is to be in tune with the times, and especially to change constantly, to keep the hot air blowing.

If we accept managerial responsibilities (university councils, departmental or laboratory management), as we are all required to do during an academic career, we are immediately forced to fill out endless forms, often giving the same information over and over again. Much more serious, the result of invasive bureaucracy and “meetingitis” – the latter to maintain the appearance of collegiality while generally emptying it of its essence – is that no one has time for anything: we must comment on the application received today for implementation tomorrow! While we caricature the situation slightly, the truth is uncomfortably close.

This degeneration of our activity is not inevitable. Resisting Fast Science is possible. We can build a Slow Science, giving priority to values and principles:

- In universities, research is the motor of education, despite the repeated attacks of those who dream of eliminating research from French universities. Therefore, at least 50% of our time must be reserved for research. It determines the quality of everything else. This principle implies the rejection of any task that would encroach on the 50%.
- Producing high quality research and publications requires focus exclusively on these tasks for a sufficiently long time. To this end, we must have regular periods without managerial responsibility or training. For example, the right to devote three months exclusively to research every 4 years.
- Stop focusing on quantity in the CV. Foreign universities already show the way, by only allowing candidates to mention five publications in their applications for a position or promotion (“Reward quality not quantity”, Trimble, S.W., *Nature*, **467**, 789, 2010). This principle implies that we must decide, in a collegial and transparent way, how to assess scientists by the quality of their scientific production, not just its quantity.
- Nourished by research, the key mission of university scientists is the teaching of acquired knowledge. Faculty members must be given time to teach, by improving their working conditions. How much time is wasted solving practical, often trivial, problems that are outside their job definitions? The time spent on administrative tasks and “setting up frameworks” must be reduced. Those famous “frameworks” should do no more than define the curriculum specific to one discipline in one university. There is no need to change the overall framework every four or five years, as is currently the case.
- In our management tasks, insist on enough time to study the issues. In the interest of all, critically analyze the content. Reject the ersatz democracy and collegiality created by voting on issues that, in the best case, we only have time to analyze superficially. There is no reason to accept the ideology of urgency, repeated ad nauseam by the Ministry and its “managers”. More generally, we must not forget that there is life outside the university. We need time for our families, our friends, our leisure ... for the pleasure of doing absolutely nothing!

If you agree with these principles [sign the petition](#) [text](#) for the foundation of the Slow Science movement. Above all, take your time before deciding whether to sign or not!

Joël Candau, October 29, 2010 (published July 17, 2011)