Canadian scholarly journals in the humanities and social sciences

A quantitative and qualitative portrait

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Contents

Executive Summary	3
Introduction	6
The characteristics of Canadian scholarly journals	7
Research and journal funding: two disciplinary families	7
Forms of access to articles: the state of open access	8
Publishers and disseminating organizations: an independent field	
Language(s) of publication: the state of bilingualism	
Key findings	
Financial and organizational portrait of a cross section of Canadian scholarly	-
in HSS	
Journals' responses	
Revenues: grants and subscriptions	19
Expenses: compensation for editorial work	
Hours worked and non-monetary contributions	23
Key findings	26
Conclusion	28
Bibliography	30
Appendix 1 – Data collection: sources and methods	32
Sources and methods of quantitative data collection	
Study of a cross section of twelve funded Canadian scholarly journals in the human social sciences	
Appendix 2 – Survey results: portraits of the sample journals	34

Tables and figures

Table 1: Canadian journals in HSS and STM by form of access (2019)	8
Figure 1: Distribution of HSS journals by year of inception and form of access in 2019	10
Table 2: Publishing media of Canadian journals in HSS and STM (2019)	10
Table 3: FRQSC-funded journals by form of access (2019)	
Table 4: Canadian journal-publishing organizations in HSS and STM (2019)	13
Table 5: Organizations dedicated to disseminating Canadian journals in HSS and STM (2019)	14
Table 6: Publishing language(s) of Canadian journals in HSS and STM (2019)	17
Table 7: Publishing language(s): comparison of eligible and funded journals at FRQSC (2019)	18

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Executive Summary

For a number of years now, the emergence of open access in Canada and internationally has been transforming scholarly publishing, not least its finances. Globally, open access is well on track to being adopted on a massive scale, especially in the wake of robust policy initiatives such as Plan S. The current pandemic appears only to be intensifying this trend. Yet the implementation of an open-access environment that responds to the actual situation of scholarly journals in humanities, social sciences, and arts and letters (HSS) remains a challenge. The present study paints a general portrait of scholarly publishing in Canada, documents several of the main characteristics of academic journals—in HSS as well as in science, technology and medicine (STM)—and offers an analysis of the socioeconomic situation of a cross section of journal in HSS.

Quantitative data collected on Ulrichsweb identified 825 active Canadian periodicals in 2019; three quarters were in HSS (611) and one quarter in STM (214). Our findings show that of all Canadian scholarly journals, 45% are open access. They also confirm the heterogeneity and fragmentation of the sector, as well as the very weak presence of commercial publishers. Echoing an international trend, Canadian academic publishing is marked by the pressure to publish in English, stronger in STM than in HSS, with the ratio of articles written in French falling below that of francophones in the country. Furthermore, the analysis of the funding policies of the Fonds de recherche du Québec Société et culture (FRQSC) makes clear that funding agencies' support is crucial to safeguarding francophone academic literature, and a key factor in the adoption of open access by scholarly journals.

The financial data collected from a cross section of HSS journals confirms that revenues remain modest—even among the most well-funded journals—ranging, in our sample, from \$17,000 to \$119,500 per year. Grants are the main source of revenue, but for a significant number of journals subscription sales are quite important too. Our findings suggest that although producing a journal involves material costs, personnel costs, particularly the payment of copyeditors and editorial assistants, actually make up the bulk of journals' expenses. Indeed, publishing a journal involves, at its core, harnessing the efforts of often highly qualified people. Printing costs pale in comparison to the editorial board's and editor-in-chief's ability to do their work, especially at a time when those positions in national journals garner little institutional regard.

Finally, one of the most striking findings of this study is journals' pressing desire for dialogue. Many journals sense a lack of support, especially concerning open access requirements which threaten to strain their resources at a time when chronic underfunding is already an important sectorial issue. Interestingly, boosting journals' finances may not be the only solution to these challenges. The relatively low rate of participation in the study as well as comments gathered from editors-in-chief indicate that editorial teams are overstretched. In order to support a field whose weakness is compounded by a logic that prizes competition among journals, it may be worth considering strategies that include (1) putting in place shared, collective resources; and (2) acknowledging journals' importance within the research cycle, and thus establishing mechanisms that improve the standing of tasks associated with running a journal, namely, by recognizing the time and effort such work takes.

Introduction

It has been two decades now that digital technologies have been drastically reorganizing academic publishing. Despite calling existing funding models into question, both in Canada and abroad, the transition to open access continues to pick up speed and seems well on track to being broadly embraced around the world. Thus, starting in 2021, researchers receiving grants from Plan S signatory agencies—which include some of Europe's leading research funders—will have to disseminate the results of their research in full open access, with that date being pushed to 2024 in the case of "transformative agreements."

As the current pandemic appears to be hastening the uptake of open access (as shown for instance in the movement to remove paywalls to scholarly publications in 2020), the financial stakes remain difficult to make out for Canadian actors in the milieu: learned societies, funding agencies, presses, university libraries and the journals themselves. Indeed, though for-profit publishers no longer resist open access—applying article processing charges (APCs) instead when authors want to make their research freely available in the most prestigious journals—for smaller journals that are national in scope and/or supported by independent organizations, open-access funding remains a major challenge. Scholarly journals are in a situation of profound long-term change affecting not just their individual finances, but the overall economy of the ecosystem in which they operate. Journals in the arts, humanities and social sciences are vulnerable in a particular way, on account of their weaker concentration and reticence to adopt APCs.

The socioeconomic situation of HSS journals has been the focus of several studies in recent years.¹ These studies reveal the heterogeneity of publishing practices, the fragility of journals' economic structures and the challenges posed by open access particularly for journals founded before the digital era. The present study aims to confirm, contextualize and clarify the conclusions presented by these reports in reference to the Canadian context. To do this, it calls upon two sets of data whose collection methods are detailed in Appendix 1. On one hand, the analysis of quantitative data allowed us to identify the most salient characteristics of Canadian scholarly publishing as well as of funded HSS journals. On the other hand, a qualitative investigation into the finances and organizational practices of a cross section of HSS journals brought forward detailed information on journals' finances: particularly their revenue sources and expenses, but also the non-monetary contributions that support them.

¹ Two reports that have focused specifically on the situation in Canada and Quebec are "Shaping a Collective Future: An Investigation into Canadian Scholarly Journals' Socio-Economic Reality and an Outlook on the Partnership Model for Open Access" (2015) and "État de l'édition savante francophone en sciences humaines et sociales au Québec" (2018). In France in 2019, the Scientific Publishing Monitoring Committee published a study that examined the economic situation of scholarly journals in humanities and social sciences ("L'Édition scientifique de revues : plan de soutien et évaluation des effets de la loi du 7 octobre 2016").

The characteristics of Canadian scholarly journals

Research and journal funding: two disciplinary families

In Canada and internationally, HSS research is clearly distinguished from STM research by its focus. Another marked contrast is in the funding available for their academic activities and related dissemination practices. This difference is borne out in the budgets of the three federal granting agencies: the Natural Sciences and Engineering Research Council (NSERC), the Canadian Institutes of Health Research (CIHR), and the Social Sciences and Humanities Research Council (SSHRC).² STM researchers' budgets in Canada are, on average, three to five times larger than those of researchers in HSS. This gap notwithstanding, the SSHRC remains the sole agency to allocate part of its budget to scholarly journals. Similarly, in Quebec—the only province in Canada endowed with its own funding agencies—the Fonds de recherche du Québec Société et culture (FRQSC) is alone in maintaining a support program for academic publishing.

In STM, academic life has been globalized for a long time, and a handful of academic publishers dominate the field. Many STM researchers, regardless of their university affiliation, also publish in what are considered international journals such as *Nature* or the *New England Journal of Medicine*, which are not based in Canada. By contrast, HSS researchers tend more often to publish in national journals, which are embedded in specific social, academic and disciplinary contexts, be they in Canada or abroad. These national periodicals are the go-to venues for disseminating research in these study areas, while also serving as hubs of debate and reflection for communities with shared questions and approaches. They contribute to the emergence of international academic networks firmly anchored in the countries where these journals are based.

The quantitative data allowed us to identify 825 active Canadian scholarly journals in 2019, of which 611 (74%) are in HSS and 214 (26%) in STM. These figures underline the strong overrepresentation of HSS journals relative to the number of researchers in HSS disciplines, who account for 48% of the total research community.

² NSERC, which supports research in natural sciences and engineering, has the biggest budget of all the federal agencies (\$1.3 billion), supporting a community of around 30,460 researchers, or around \$43,000 each. Research in health has the highest level of funding per researcher: CIHR's \$1.088 billion budget is distributed among 13,000 researchers, an average of roughly \$84,000 per researcher (essentially twice the amount of NSERC). The humanities and social sciences appear as the poor cousin of the lot: the SSHRC budget of \$440 million is distributed across a community of 28,390 researchers, which averages out to around \$15,000 each (roughly one third of what natural sciences and engineering researchers and less than a fifth of what health researchers receive). The sources for these figures are presented in Appendix 1.

Types of access to articles: the state of open access

The proportion of open access articles has been growing steadily since the 2002 Budapest Open Access Initiative. Current studies show that, in recent years, half of all academic articles published in the world were open access (Piwowar et al. 2018; Robinson-Garcia et al. 2020). Three other forms of access are evaluated in this study: hybrid open access, delayed open access, and restricted access.

Hybrid open access was developed by commercial publishers concurrently with open access (Björk 2017). It pertains to journals that grant access to articles through subscriptions, but that allow authors to pay publication fees (Article Processing Charges or APCs) in order to make their articles freely available. Hybrid open-access journals thus present their publishers with two income streams, namely subscriptions and APCs. The practice has raised equitability concerns, *vis-à-vis* libraries in particular (Matthias 2018).

Delayed open access grants free access to articles after a certain lapse of time has passed following the date of publication. The waiting period, known as an embargo, is usually 12 months (Laakso and Björk 2013). In the interim, access to articles requires paying a subscription. In the case of restricted access, a paid subscription (or membership in a learned society) is needed at all time to access the content.

According to the data, in Canada the proportion of open-access journals is equal in HSS and in STM, 45%. A quarter of HSS journals (26%) are restricted access, slightly less than in STM (29%). There is a sharp contrast, though, in the use of embargo (delayed access), which 18% of HSS journals resort to versus only 6% of journals in STM. Inversely, the hybrid open-access option has been adopted by only 11% of HSS journals, with the figure almost doubling (20%) among STM journals.

Type of access	Humanities and social sciences (HSS)		Science, technology and medicine (STM)	
Open access	276	45%	97	45%
Restricted access	159	26%	62	29%
Delayed open access	110	18%	13	6%
Hybrid open access	65	11%	42	20%

Table 1: Canadian journals in HSS and STM by form of access (2019)

In our qualitative survey of 12 journals, open-access publications are actually overrepresented next to the national average (7 out of 12, or 58%). This overrepresentation is even more pronounced in the case of delayed open access (12-month embargo), which applies to 4 of the journals in the sample (30%), nearly twice the proportion of Canadian HSS scholarly journals. By contrast, only one restricted-access journal (connected to a commercial publisher) and no hybrid open-access journals participated.

Among the restricted-access and delayed open-access journals, there is an impression that the shift to open access is inevitable. Journal 2, the only restricted-access journal in the qualitative survey, decided to switch to another commercial publisher-distributor in 2019, believing it would place them in a better position to make the transition. Delayed open-access Journal 12 mentioned having ongoing discussions about shifting to open access because its adoption seems inevitable. Some of the journals that have not yet taken that step admit the prospect is stressful—Journal 3, for instance, is considering becoming open access but worries about the potential drop in revenues. Open-access Journal 5 reckons that open-access requirements are weakening journals due to a general lack of funding. Journal 8, open access since 2003, did not express any particular worries; the importance of the editor-inchief's involvement (520 hours per year) is nonetheless worth noting, raising questions about how the journal will fare when the time comes to replace him.

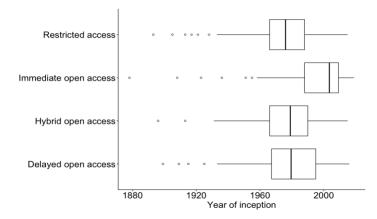
By contrast, Journal 6 is in the unique position of being the only periodical in the sample to receive funding from two open-access and open-scholarship organizations, as well as from its home university, which has a clear-cut aim to promote scholarly publishing. This journal indicated being as interested in exploring the modalities of running a journal as it is in investigating a particular subject area. Absent in their approach is the much more common cleavage between the expertise of editorsin-chief (in their respective disciplinary fields) and their usually more limited knowledge of the insand-outs of scholarly publishing.

One journal's managing editor—which did not complete the financial part of the data-collection process, and for that reason was not officially included in the sample—also expressed concern at seeing how academic journals rely solely on professors, who, despite the importance of the work's administrative dimension, have neither the time nor the interest in learning it. According to him, if the goal is to produce sound publications and to ensure their continuity and reach, editing work would ideally be done by a qualified editor who would be responsible for all journals at the same university.

Journals' date of foundation and form of access

As Figure 1 shows, the median year of foundation among active Canadian open-access journals in HSS is 2004, confirming the link between the emergence of open access and online publication. By contrast, the median year of foundation for journals that still rely on classic subscription-based forms of access dates from the end of the 1970s: 1976 for those with restricted access, 1979 for those with hybrid open access and 1980 for those with delayed open access.

Figure 1: Distribution of HSS journals by year of foundation and form of access in 2019³



The qualitative survey sample confirms the above point about recently founded journals: 4 of the 7 journals that today are open-access were born-digital, either in the 1990s (Journals 6 and 8) or the 2000s (Journals 10 and 11). The 3 others (Journals 1, 5 and 7) have a different trajectory, shifting to open access from subscription-based models while having been founded in the late 1960s (Journal 7) and the mid-1970s (Journals 1 and 5). The restricted-access journals (2) and delayed open-access journals (3, 4, 9 and 12) are all relatively old, with foundation dates between 1945 and 1974.

Publishing media

Half of HSS journals (51%), and practically the same proportion of STM journals (50%), publish simultaneously in print and digitally. Of the remaining half of journals, a majority in both areas is available only digitally (44%). The rest, a small fraction of Canadian scholarly journals (5%), is exclusively available in print.

Medium	Humanities and social sciences (HSS)		, 0,		0,
Print and digital	311	51%	108	50%	
Digital only	267	44%	95	44%	
Print only	33	5%	11	5%	
Total	611	100%	214	100%	

Table 2: Publishing media of Canadian journals in HSS and STM (2019)

Digital-only publishing is slightly overrepresented in the qualitative survey sample (7 out of 12, or 58%) compared to the Canadian situation overall; the 5 other journals publish simultaneously in print and digitally.

³ The method by which these results were obtained is outlined in Appendix 1.

Journals' commitment to print is often attributed to their readership (Journal 3; Journal 7, which is open access; off-sample Journals 14 and 17)—either because the print issues complete an existing collection, or because of preferences in reading. The case of Journal 4 stands out because its international readership—located mainly in African countries, Asia (China) and Latin America—sometimes has easier access to the print publication than to the online platform that makes it available. This example shows that digital does not always mean accessible, highlighting also how journals' familiarity with their readership can inform their choices.

In line with these questions, Journal 9 indicated that the prospect of becoming digital-only and thinking about the shift to open access go hand in hand. The off-sample Journal 18 cited environmental concerns as a factor in the unavoidable decision to stop its print issues. Printing costs were rarely brought up as a reason to abandon print; nevertheless, the rise in shipping costs is worth noting.

Funding policies and forms of access: the case of the FRQSC

FRQSC grants within the Scientific Journal Support Program are offered on a four-year cycle based on the criteria of quality and academic excellence, as well as on the distinctiveness of the journal in its research field and its relevance for meeting dissemination needs. Additionally, journals' operations must be managed by an editorial team under the leadership of a director/editor-in-chief in dialogue with a competent and active editorial board.

Regarding dissemination and outreach, the Scientific Journal Support Program's stated objective is to promote open access. Since 2006, all FRQSC-funded journals must be disseminated on the Érudit platform. In 2017, Érudit began to comply with federal open-access policies by lowering its moving wall (embargo) from 24 to 12 months. All the journals that receive grants from FRQSC are disseminated on Érudit and respect the open-access policies of Canada (2015) and Québec (2019). The evolution of the Scientific Journal Support Program's criteria for the last fifteen years confirms the prescriptive power that funding organizations have *vis-à-vis* practices within the field, and especially open access.

The FRQSC's open-access requirements come with a form of financial compensation, since the agency agrees to cover digitization costs on top of the annual \$20,000 support grant. Journals are not expected to submit budgets that include these types of costs or to provide estimates for them in their applications. The FRQSC agrees, moreover, to cover such costs throughout the journal's four-year funding period. Journals that are recommended for FRQSC funding but which do not receive a grant at the end of their evaluations are also eligible to receive this digitization coverage, allowing them to disseminate on the Érudit platform.

Against this backdrop, an analysis of FRQSC-funded journals following the last competition (2019) reveals that delayed open-access journals are the most well-funded, both in absolute terms (25 journals) and relatively: 41% of delayed open-access journals received funding, compared to 29% of immediate open-access journals.

Table 3: FRQSC-funded journals by form of access (2019)

Type of access	FRQSC (2019)		Eligible journals		Percentage funded
	n	(%)	n	(%)	(%)
Delayed open access (embargo)	25	69	61	62	41
Immediate open access	11	31	38	38	29

While the majority (51%) of FRQSC-eligible journals are digital-only, they account for only 36% of funded journals, effectively echoing the distribution of funding by form of access. In other words, practically half the journals appearing in both digital and print formats receive funding, compared to only a quarter of digital-only journals.

One should note as well that, for the last competition, the criteria for SSHRC's Aid to Scholarly Journals program were modified in favor of a transition toward open access. The structuring and longstanding impacts of this policy shift remain to be evaluated.

Publishers and disseminating organizations: an independent field

In the past, academic journals tended to be associated with the learned societies that produced them. But with periodicals' home organizations growing more diverse over time, that list has come to include not just learned societies but university departments, research centres, libraries, professional associations and commercial publishers as well.

Internationally, scholarly publishing takes place within an oligopolistic environment dominated by five large commercial publishers (Wiley, SAGE, Elsevier, Taylor & Francis and Springer-Nature) which, together, publish roughly half of all academic articles (Larivière et al. 2015). This concentration is more pronounced in STM, where the three principal publishers (Reed-Elsevier, Springer-Nature and Wiley-Blackwell) publish half of all articles, while in HSS the three biggest publishers (Reed-Elsevier, Taylor & Francis and Wiley-Blackwell) publish 37% of articles. Certain large academic presses such as Cambridge University Press complicate the picture, however, on account of having developed an operating model that closely resembles that of for-profit publishers.

Traditionally, academic journals' subscription sales provided their learned societies with a reliable source of income for financing their research activities. In the present context, many of these learned societies depend on agreements with commercial publishers for these revenues. This arrangement comes at a sizeable collective cost: currently, a large number of North American university libraries spend 75%—sometimes more—of their budgets on journal subscriptions (Shu et al. 2018), a majority of which pass through commercial publishers.

Our findings portray a situation that is markedly different from the international one, which as noted is largely oligopolistic. Indeed, they show (1) the near absence of commercial publishers in the Canadian scholarly publishing landscape; and (2) the extremely weak concentration of journal publishers in Canada overall, especially in STM, where, from the sixth rank on, all surveyed organizations publish only two journals.

Yet while all of the publishing organizations in HSS are affiliated to a university institution, the situation in STM is exactly opposite; here, Canadian Science Publishing, previously the press of the National Research Council of Canada, holds the most journals (22, or 10.3%), followed by associations, institutes and learned societies.

Rank	Humanities and social sciences (HSS)			, 87		d medicine
1	University of Toronto Press	29	4.7%	Canadian Science Publishing	22	10.3%
2	University of Alberta	21	3.4%	JMIR Publications	10	4.7%
3	University of Toronto	20	3.3%	Avestia Publishing	8	3.7%
4	Université Laval	14	2.3%	Canadian Medical Association	5	2.3%
5	McGill University	12	2.0%	Canadian Mathematical Society	3	1.4%
6	University of Ottawa	12	2.0%	Agricultural Institute of Canada	2	0.9%
7	Université de Montréal	11	1.8%	British Columbia Medical Association	2	0.9%
8	University of Victoria	10	1.6%	Canadian Aeronautics and Space Institute	2	0.9%
9	Dalhousie University	9	1.5%	Canadian Geriatrics Society	2	0.9%
10	Presses de l'Université de Montréal	8	1.3%	Canadian Veterinary Medical Association	2	0.9%

Table 4: Canadian journal-publishing organizations in HSS and STM (2019)

Regarding dissemination, the data shows a relatively small share of Canadian scholarly journals is carried by the five big commercial publishers, which disseminate only 5% of HSS journals and 7% of

STM journals. A comparable proportion of HSS journals are available through the software application for managing and publishing scholarly journals Open Journal Systems (OJS) (24.5%), on the Érudit platform (22.1%) and on the websites developed either by the journals themselves or by the associations responsible for them (25.1%). STM journals have followed a more independent route, with 37.4% of them disseminating directly from their own websites; OJS is used by 16.4% of journals, followed by Canadian Science Publishing, which disseminates 11.7% of titles.

Humanities and Social Sciences (HSS)			Science, Technology and Medicine (STM)		
Open Journal Systems	150	24.5%	Journal website	80	37.4%
Érudit	135	22.1%	Open Journal Systems	35	16.4%
Journal website	103	16.9%	Canadian Science Publishing	25	11.7%
Association website	51	8.3%	Association website	23	10.7%
University of Toronto Press	31	5.1%	No online disseminator	10	4.7%
No online disseminator	26	4.3%	Érudit	10	4.7%
ProQuest	14	2.3%	SAGE	6	2.8%
Taylor and Francis	14	2.3%	Elsevier	3	1.4%
Wiley	8	1.3%	Taylor and Francis	3	1.4%
Cambridge University Press	7	1.1%	Springer	2	0.9%

Of the 12 journals surveyed in the qualitative study, 5 use OJS's automated management and article publishing software or at least some of its features.

All the journals that use OJS, even those that admitted liking the software, stressed the amount of time and energy it took to learn it. This led the publisher of Journal 6 to develop an adapted version of the software specifically for the journal. Journal 7 considered using OJS, but ultimately opted to customize its own publishing software. Several journals also mentioned how burdensome OJS maintenance was, requiring support that was often provided by the university libraries but not always

sufficient (Journals 11 and 12). Finally, some journals only use certain features of the software, either for the processing of articles (Journal 1), or, conversely, for their formatting (Journal 10).

Other journals choose to not rely on such publication management software; they consider their automated communication features to be disrespectful, especially toward external evaluators, whose work is already often disregarded (Journals 4 and 9).

Language(s) of publication: the state of bilingualism

Globally, English is far and away the most dominant language in scholarly publishing, more so in STM than in the HSS ecosystem. According to Web of Science—whose census data tends to overrepresent STM and English publications (Mongeon and Paul-Hus 2015)—practically all articles published in STM (94%) are in English. The hegemonic use of English in STM is inseparable from the long-running internationalization of its communities.

By contrast, the subjects studied in HSS have a tendency to be more contextually anchored, and more connected to specific national traditions in their analyses, which explains the enduring relative linguistic diversity among HSS disciplines (Gingras and Mosbah-Natanson 2010). That being said, several studies demonstrate the growing importance of English, both within HSS disciplines and in the countries where English is not the (only) official language. In 2015, 70% of articles in the social sciences and 40% of articles in arts and humanities were published in English, marking increases in both areas (Larivière 2018).

Likewise, while roughly half the journals created since the beginning of the twentieth century have been anglophone, that proportion has jumped to 70% in the last decade (Larivière 2018). The trend is similar in Canada where, since 1940, some 80% to 90% of newly created journals have been anglophone. From 2010 on, practically all the journals created were anglophone.

This kind of environment makes linguistic diversity a particularly important issue for Canada, whose research funding agencies are officially bilingual. At the provincial level, only New Brunswick is formally bilingual. Quebec is, for its part, officially unilingual and francophone, hence the policies encouraging French-language scholarly publishing adopted by the provincial funding agency, the FRQSC. The latter actually requires that half (50%) of articles be written in French for a journal to be eligible to its Scientific Journal Support Program.

In trying to shed light on the linguistic situation of Canadian scholarly journals, we identified their language(s) of publication by consulting their websites. This presents a certain risk, however, since a journal can be "bilingual" without noting how many articles it publishes in each of the two languages, potentially obscuring what are in reality quite diverse situations. A journal that publishes 5% of its articles in French is often considered bilingual, notably by the journal itself. In this way, certain journals' stated or desired bilingualism may in fact, in some cases, result in publications that are overwhelmingly monolingual. Our qualitative study of 12 journals illustrates this; certain journals that are formally bilingual are, in practice, unilingual.

Nationwide, too, our findings show that English is more dominant in STM than in HSS. While 43% of HSS journals are published in English, that percentage climbs to 60% in STM. Forty-one percent of HSS journals and 34% of STM journals indicate being bilingual. In both disciplinary families, the percentage of unilingual francophone journals is low; nonetheless, it is twice greater in HSS (11%) than in STM (5%), for a francophone population that makes up about 20% of the country. The greater linguistic diversity of HSS journals is also reflected in the "multilingual" category, which groups together journals that accept articles written in languages other than French and English, and represents 5% of journals in HSS and only one STM-related journal.

Language	Humanities and Social Sciences (HSS)		Science, Technology and Medicir (STM)	
English	261	43%	129	60%
Bilingual	251	41%	73	34%
French	69	11%	11	5%
Multilingual	30	5%	1	0%

Table 6: Publishing language(s) of Canadian journals in HSS and STM (2019)

In the qualitative study, the cross section of journals displays a marked overrepresentation of francophone journals—7 of a total of 12, or 58%—while in the Canadian HSS totals that figure is 11%. This is despite initial contact being made in both languages, in English and/or in French, in accordance with the language(s) posted on the journal's website.

The qualitative study displays a tension between linguistic diversity (real or stated) and English dominance, mirroring the trend of growing Anglicisation in scholarly publishing in general. In our Canadian sample, the question of linguistic diversity pertains foremost to French, but it is worth pointing out that several periodicals get their abstracts translated into Spanish, in addition to French and English (Journals 3, 4, 7 and 12). The complete absence of Indigenous languages is also worth noting.

One of the few truly bilingual periodicals of the sample, Journal 3, stressed its commitment to francophone publishing; it is the only one doing so in its disciplinary field. Journal 3 nevertheless pointed out how, in a hegemonic environment, this commitment has cramped its influence, explaining how its bilingualism has actually put it at a disadvantage in the rankings, which only consider articles written in English.

Journal 9, which is 80% francophone, also pointed out how it is the only such journal in its field in North America and the importance of French was underlined by Journal 5 as well.

The tension between the desire to publish in French and having to shoulder the financial costs of bilingualism (related to editing and copyediting) was conveyed by two anglophone journals (6 and 11). Journal 11 mentioned wanting to get its abstracts translated into French but not having the funds to do it. Journal 6 indicated that a graduate student in French had begun working for the journal, effectively allowing them to publish their next issue entirely in French.

The case of off-sample Journal 16 sheds an interesting light on the situation. Facing a drop in Frenchlanguage submissions, even from francophone authors, this bilingual periodical is planning a redesign. In the new plan, linguistic diversity is no longer accounted for by looking at the language articles are written in; it is achieved instead through the production of thematic issues that focus on topics that interest francophone researchers, all the while publishing mostly in English.

Thus, in an environment so dominated by anglophone publishing, we are noticing a shift among linguistically diverse periodicals to other approaches. Journals 6 and 11 mentioned their growing interest in publishing texts by authors from the global South who are not native English speakers. This implies a considerable amount of editing work, which is done by graduate students through collaborations with certain departments in their universities—an arrangement that is already working in the case of Journal 6 and which is in the works in the case of Journal 11.

Finally, the role played by the Scientific Journal Support Program in maintaining bilinguism in the field of Canadian HSS scholarly publishing must be noted. Indeed, the program's language policy requires that journals publish half (50%) of their articles in French in order to be eligible. This requirement is aligned with the FRQSC's mandate to promote French-language scholarly publishing.

The data collected shows how the language practices of FRQSC-funded journals have remained quite stable between 2009 and 2019, with one half (50%) of journals publishing entirely in French and another (45%) publishing bilingually. This is mirrored in the relationship of FRQSC-eligible to FRQSC-funded journals, with francophone and bilingual journals receiving almost equivalent levels of support (around 37% and 35% of eligible journals, respectively).

Language	FRQS	FRQSC (2019) E		journals	Percentage funded
	n	(%)	n	(%)	(%)
Francophone	17	47	46	46	37
Bilingual	16	44	46	46	35
Others	3	8	7	7	43

Table 7: Publishing language(s): comparison of eligible and funded journals at FRQSC (2019)

The influence this policy has on journals' practices is palpable in a comment made by the editor-inchief of Journal 4. For a multilingual journal, the editor said, the requirement to publish 50% of articles in French was not always easy to meet, but they've endeavoured to do so by publishing French-only thematic special issues and by creating a new francophone rubric. He noted that English is not as dominant as it used to be, because the journal accepts another language of publication in addition to English and French.

Key findings

Close integration of scholarly journals within the HSS research cycle

Our study identified 825 active Canadian scholarly journals in 2019, of which 611 (74%) are in HSS and 214 (26%) in STM. In comparison to STM journals, whose research and publishing networks have long been globalized, Canadian HSS periodicals are more closely integrated in the research cycle. This is borne out in the large proportion of journals published by universities and university presses.

Close to half of Canadian scholarly journals are open access

Our findings show that in Canada there is an equal proportion of open-access journals in HSS and in STM (45%).

The analysis of the Scientific Journal Support Program's criteria confirms the prescriptive power of funding agencies on journals' practices, especially regarding open access.

Very low concentration of publishing and disseminating organizations

The Canadian scholarly publishing landscape differs markedly from the more oligopolistic situation internationally and, in Canada, comparatively, there is a very low concentration of scholarly publishing organizations.

Regarding dissemination, our findings show that the five big commercial publishers only carry a modest share of Canadian scholarly journals. In HSS, periodicals are available mainly through the software application for managing and publishing scholarly journals OJS, Érudit's dissemination platform or via their own websites.

A fragile bilingualism in an English-dominated environment

The data collected confirm that English is more dominant in STM than in HSS. While 43% of HSS journals are published in English, that figure climbs to 60% in STM. Bilingualism is taken up by 41% of journals in HSS and 34% in STM. There is a low percentage of unilingual francophone journals in both disciplinary families; nonetheless, that figure is twice greater in HSS (11%) than in STM (5%), for a francophone population that makes up about 20% of the country. The greater linguistic diversity of HSS journals is also reflected in the category of "multilingual" journals.

The interviews conducted as part of the qualitative survey revealed a tension between journals' desire to publish in French and the costs of bilingualism, be they financial (related to editing and copyediting); or symbolic, stemming from the hegemony of English in the rankings. Finally, the role played by the Scientific Journal Support Program's criteria in maintaining a francophone scholarly literature must be highlighted.

Financial and organizational portrait of a cross section of Canadian scholarly journals in HSS

As previously noted in the report "Shaping a Collective Future: An Investigation into Canadian Scholarly Journals' Socio-Economic Reality and an Outlook on the Partnership Model for Open Access," Canadian scholarly journals, especially those in HSS, operate in an environment marked by significant funding cuts, despite even the most well-funded journals posting modest annual revenues.⁴ Our qualitative survey of a sample of 12 HSS journals provides a more detailed representation of their socio-economic reality. The following section presents the financial data collected, detailing journals' main sources of revenue and most up-to-date expenses. It concludes with an evaluation of the non-monetary contributions to scholarly journals' operations.

Journals' responses

In addition to the 4 journals that took part in the trial phase of the study, we contacted 55 journals that met the cross section's established criteria. Of this total, only 11 completed the data-collection form—despite most journals (even those that could not participate) commenting on the importance of the study.

Most journals' refusals to participate were due to their material inability to do the work for lack of time or resources (5 out of 9 journals). More rarely, journals expressed fears surrounding the confidentiality of the process (2 of 9 journals). The two other refusals were motivated by insufficient knowledge of the information requested. Additionally, some journals that had confirmed their participation in the study later withdrew, in some cases even after providing an interview. Their withdrawal was essentially motivated by the lack of time and/or resources (3 of 8). The withdrawal of 4 other journals was tacit (break in communications) and is suggestive of a lack of time.

Some journals' reticence surrounding the confidentiality of their data resonates with all journals' categorical refusal to allow their response spreadsheet to be shared, even after being assured of their full anonymization. Such restraint indicates a certain lack of confidence, no doubt related to a dominant logic that prizes rivalry and competition in access to resources.

Revenues: grants and subscriptions

The journals declared two major sources of revenue—grants and commercialization—along with other less important sources, mostly the sale of reproduction rights. Journals' grants come primarily

⁴ In the qualitative survey of 12 periodicals, journals' annual budgets range from \$17,000 to \$119,500 (not including unpaid work).

from two public funding agencies, the SSHRC and the FRQSC, though on rare occasions they can also come from other academic institutions (universities, departments or faculties, learned societies, and so on). Commercialization covers earnings from subscriptions (paper and digital) and other earnings connected to digital strategies adopted by the sector (particularly royalties from aggregators).

The journals we surveyed tended to have the most detailed knowledge of their revenues, and often said they determine their expenses purely on the basis of this knowledge in order to maintain a financial balance.

The journals in the sample have gross revenues (not counting non-monetary contributions) that range between \$17,000 and \$119,500 per year. Periodicals can be divided into four revenue categories: the lowest rung, from \$17,000 to \$24,000, includes 4 periodicals (Journals 1, 5, 10 and 11), of which 3 publish two issues per year (1, 5 and 10), with the fourth (Journal 11) publishing continuously 22 articles per year, which is more than the 12- to 16-article average for two issues. Next, Journal 8 has a revenue of \$34,500 per year and publishes two issues (13 articles). The next revenue category, from \$55,000 to \$69,500, includes 3 journals (2, 6 and 7): Journal 2 is associated with a commercial publisher, has a financial structure that diverges from the other, non-commercial, journals, and publishes six issues per year (40 articles); Journals 6 and 7 publish around 30 articles each, the former continuously and the latter in two issues. Finally, the top revenue category, from \$90,000 to \$119,500, includes 4 journals (3, 4, 9, 12): Journals 9 and 12 publish around 20 articles per year (in four issues in the case of Journal 30 articles each diverges for the case of Journal 3, and in three issues in the case of Journal 4).

Grants

Two journals operated without any grants in 2019. Journal 1, whose FRQSC funding was not renewed in 2014, exists on the margins of HSS and is part of the financial and symbolic circuits of the medical sciences. The case of this journal is presented below, when we address the topic of reliance on APCs. Journal 2 is published and disseminated by a commercial publisher. Unlike the other journals, Journal 2 holds that, since it does not need grants, it has not applied to the ASJ program in the past 10 years. The journal is compensated by the publisher with a lump sum of \$55,000 per year. Part of this amount serves to pay its editorial assistant, with the rest going to the journal's editorial board, in the form of financial disbursements to professors' research budgets.

For the 10 other journals (83% of the sample), grants account for anywhere between half (42%, Journal 4) and all of their revenues (Journals 10 and 11). The amounts range significantly, depending on whether the journal received funding from one or both funding agencies. The 3 journals whose revenues come completely or almost-completely from grants (Journals 10 and 11: 100%; Journal 8: 81%) are all immediate open access—and have been so since they were created (or close) in the 1990s or 2000s. These journals have relatively low overall budgets, between \$17,000 (Journal 11) and \$34,500 (Journal 8).

Five journals (3, 4, 7, 9 and 12) receive around \$50,000 in grants each year (from \$50,000 to \$57,000). Four of them are delayed open access (12-month embargo) and one is open access (Journal 7). All 5 come from a subscription-based model, with subscriptions remaining an important revenue stream, although the amounts vary for each.

Commercialization

Journals 3 and 4 stand out here because their comparatively higher subscription earnings allow them to double what they receive in grants. These two journals actually have the highest revenues of all the journals in the sample, \$108,000 and \$119,500. Significantly, Journal 4's earnings from print subscriptions, around \$30,000 per year, are nearly equivalent to its digital earnings. As mentioned earlier, this journal indicated its readership is spread internationally, in countries in Africa, Asia and Latin America, where it is often easier to access its print issues than the digital platform the journal is disseminated in.

Additionally, 3 journals indicate print subscription sales hovering around \$10,000 (Journals 3, 7 and 9), corresponding to roughly 10% of their revenues—and this, despite Journal 7 being immediate open access since 2017. Finally, Journals 3, 4, 9 and 12 indicate substantial digital revenues, ranging between \$22,000 and \$44,000 per year.

In the case of Journals 4 and 7, the two revenue streams—grants and subscriptions—remain separate and actually feed into distinct workflows: the grants are managed by the journals themselves while the subscription earnings go to the publishers.

The situation of Journal 6 is worth noting. This relatively young journal, which has been immediate open access since its creation, receives income from three separate sources in addition to its \$30,000 grant, which represents about half of its revenues (47%). Journal 6 forms part of an ecosystem that is striving to make open scholarship and open-access publishing more sustainable.

Reflected in the qualitative survey, too, is the low proportion of journals in HSS that rely on APCs. Only Journal 1, which is in a psychology-related field and is positioned therefore on the border between HSS and the medical sciences, employs this practice. Its APCs are relatively modest (\$500 per article for a total of \$4,000 per year), but underline the place APCs occupy within the comparatively more affluent health research networks. Aware that this practice necessarily presents barriers to publishing, the journal is currently brainstorming ways of continuing to publish doctoral students' work, possibly by offering them a grant that would defray the cost of the APCs. Journal 1's sale of questionnaires to a professional medical association garners a revenue of \$10,000 per year, enough to cover the other half of the journal's production budget.

Journal 5, finding itself in difficult financial straits, has accepted to publish thematic issues funded by foundations and/or by research groups that have the means to pay for them.

Expenses: compensation for editorial work

A journal's production involves both material and human expenses, the latter in the form of salaries. As this section shows, personnel costs—which cover essentially the pay of an editorial assistant and copyeditors—in fact account for the bulk of journals' expenses. Indeed, more than anything else, running a journal involves mobilizing the labour of often highly qualified people.

Regarding journals' expenses, it is important to mention that journals often do not have a detailed picture of their expenses; in such cases, the latter are determined on the basis of the journals' known revenues in order to maintain a financial balance. In fact, the accounting is not often done by the journals themselves but by their home institutions. Instead of having direct access to their detailed expenses on an issue-by-issue basis, journals tend to have a general idea of their annual situation.

Production and personnel costs

The direct costs of producing issues, counting production and personnel costs, range from \$14,600 (Journal 8) to \$118,300 (Journal 3) per year.

These expenses can be grouped into three tiered financial categories: the lowest of these, from \$14,600 to \$24,300, brings together 5 journals (1, 5, 8, 10 and 11), of which 4 only publish two issues per year (1, 5, 8 and 10) amounting to between 12 and 16 articles per year; the fifth journal (Journal 11) publishes continuously 22 articles per year.

Five journals occupy the middle tier, in which expenses are between \$53,000 and \$65,000 (4, 6, 7, 9 and 12). Journals 4, 6 and 7 publish around 30 articles per year—in two issues (Journal 7), three issues (Journal 4), or continuously (Journal 6). Journals 9 and 12 publish around 20 articles per year, in four and three issues respectively.

Journal 3 stands out with annual expenses of \$118,300, but it bears noting that it puts out four issues and around 30 articles per year.

Journal 9 employs an editorial assistant whose hours are paid by the journal's home university. It also benefits from students who copyedit portions of the journal as part of a course. Journal 1 also benefits from administrative work paid by its home university, albeit to a lesser degree.

Editing and production

For journals recommended for funding or effectively funded by the FRQSC, the costs associated with digitization (Érudit) are covered by the funder; this applies to 7 of the 12 journals in the sample (1, 3, 4, 5, 7, 9 and 12).

Variations in per-issue production costs stem mainly from the cost of copyediting, the rates for which are highly dependent on the person contracted: some journals hire professional copyeditors, while others work with students from their university. The case of Journal 5 is insightful in this regard: until its second issue of 2015, it was copyedited by a professional at a cost of around \$4,800 per issue. This amount dropped to around \$1,300 for the subsequent issues when, following the loss of its SSHRC

and FRQSC grants, the journal began to draw on the pool of doctoral students in its department to save money. The potential decline in quality caused by this change is impossible to quantify.

In attempting to compare production expenses—however imperfectly—we considered article processing costs, the principal expense item; these costs include translation, copyediting and proofreading for a single issue.

The responses concerning this budget line can be broken down into four groupings: 2 journals spend between \$1,600 and \$1,700 on article processing (Journals 3 and 12), while 3 spend between \$2,800 and \$3,900 (1, 4 and 7). Journal 8 reported \$5,200 for such expenses, and Journal 9 almost \$10,000. Journals 6 and 11, which publish continuously, estimate their copyediting and proofreading costs are \$500 and \$700 per article.

These figures should not divert attention from the fact that putting out these issues depends, albeit variably, on the work of the editorial assistant and of the paid and unpaid personnel responsible for the journals.

Four journals (3, 4, 7 and 9) have print runs. The costs associated with this aspect of production comprise printing and mailing costs and range from \$9.20 per copy in the case of Journal 3 to \$21.10 per copy in the case of Journal 7, which has the most limited print run (275 copies per year).

Commercial publishing: separating academic work from production

Journal 2—associated with a commercial publisher—is particular in that it is its publisher and not the journal itself that is responsible for the production of the issues. As a result, the journal did not report any expenses in this budget line. What expenses it does incur have to do mainly with the salary of the editorial assistant and the compensation, mentioned earlier, of professors working for the journal.

Hours worked and non-monetary contributions

After observing the importance of non-paid work in the overall economic functioning of journals, a particular effort was made to devise, to the best of our abilities, a quantifiable measure for these contributions. One part of the financial data-collection form was therefore dedicated to these measures—which, it bears mentioning, incited a lot of interest among the journals, even during the trial phase of the study. On several occasions, editors-in-chief evoked their heavy and at times growing workloads against a backdrop of dwindling institutional recognition. The portrait that emerges is therefore one of a structurally weakened field, undermined for several years now by journals' operating and financial conditions.

Symbolic capital and scholarly journals

The operation and existence of scholarly journals depend on the commitment, effort and skills of highly qualified people. These are mainly professors and graduate students, but also, in certain cases, proofreaders and editors. The costs of physically producing a journal are negligible in comparison to the editorial board's ability to evaluate submissions and to oversee the journal's research mission.

Today, however, for national journals, this work is being carried out in an environment of dwindling institutional recognition. From the 1960s to the end of the 1990s, journal positions carried a certain prestige, which in turn translated into increased material support for journals from their home universities.

Since the 2000s, the decline in the symbolic value of these positions has led to the withdrawal of this financial support, exposing several Canadian journals in HSS (which favour local research and horizontal dissemination) to institutional disregard. This sort of disregard is evident in journals' oftreported difficulties attracting external peers to review manuscripts recommended by the editorial board, the majority of them double-blind.

The task of searching for external evaluators and following up on their work was often described as being especially time-consuming (Journals 2, 5, 8 and 9), at times even delaying the release date of an issue.

Two key factors in this situation are a journal's disciplinary field and its language of publication, both of which determine the pool of potential peer-reviewers. This variance by discipline can also be glimpsed in Journal 1, which exists on the fringes of health research: unlike the other journals in the qualitative study, positions at this journal (administration and editing, as well as the evaluation of articles) are rewarded in the career paths of those who occupy them.

To counter these challenges, some journals—having seen the positive impact of more personalized communications—have started seeking closer contact with their peer-reviewers, led by either the journal directors (3 and 10) or the issue editors (Journal 6). Journals 5 and 11 mentioned the support editorial boards could lend as well, especially by taking on some of the evaluation responsibilities (Journal 11).

In such a context, our attempt to quantify the hours editors-in-chief and editorial board members dedicate to a journal drew keen interest from our interviewees, including those who were unable to complete the data-collection process. In calculating hours worked, we distinguished between compensated and non-compensated working time, with the former being the case (at least in part) in 7 of the 12 journals in the sample.

Course releases: uneven access

At 6 of the journals, compensation is offered in the form of course releases (all are non-commercial journals).⁵ Access to course releases varies widely among the journals, in part because only one of the two public funding agencies, the FRQSC, cover them through its grants. Three journals are thus able to rely on their FRQSC funding to provide this sort of easement: one every two years for the editor-in-chief of Journal 7; one per year for the editor-in-chief of Journal 4 and two per year for associate

⁵ A course release refers to the reduction in a professor's teaching duties through the hiring of a sessional instructor. In this study, we estimated the work time corresponding to a course release to be 250 hours, which is the amount calculated by employment insurance for a one-course teaching load. The cost of a course release was estimated at \$10,000 (a low estimation).

editors of Journal 12. The course releases for the directors of 2 other journals are funded by their home organizations: two for the editor-in-chief and one for the associate editor of Journal 3, and two for the editor-in-chief of Journal 9. Finally, Journal 10 does not provide any course releases to its editor-in-chief, who, as research chair, nonetheless has access to three others.

Commercial publishing: working and funding conditions

Journal 2, which has a contract with a commercial publisher, offers its editor-in-chief and editorial board financial compensation. The latter is deducted from the transfers the publisher makes to the periodical. A certain sum is deposited annually in the research budget of the professor who oversees the journal, while members of the editorial board receive a fixed amount for each article they evaluate.

Working with a commercial publisher guarantees Journal 2 a degree of financial stability that other journals lack. For this journal, the time and effort spent on securing funding is reduced to a minimum. Moreover, the physical production of the issues is fully the responsibility of the publisher, allowing the editorial board to focus on the academic aspect of the work. The counterpart for such working conditions is a sort of privatization of the journal's financial stability, with the added costs covered mainly by university libraries.

Institutional support: variable but essential

As already suggested by the rather uneven apportioning of course releases to journals on behalf of their home organizations, the operating support journals receive from their home organizations can vary significantly.

Still, some journals associated with academic institutions (universities, departments, or faculties) do receive various kinds of support, some of which is unrecognized (for instance, journals' accounting is often done by their home department or university). Such support may take the form of punctual assistance—as in the case of Journal 5, which lost all its grants and stays afloat in part thanks to a small grant provided by its editor-in-chief's university. But such support may also be more structural and integrated into journals' operations—e.g., through copyediting carried out by graduate students, either as part of a for-credit course (Journal 9), or as a form of supplemental training (Journal 6; currently being put in place by Journal 11). Administrative personnel who are on an organization's payroll may also be put at a journal's disposal (Journals 1, 6 and 9).

In the case of Journals 6 and 9, there is something systemic behind the relatively high amount of support they receive, in the sense that both journals, despite their marked differences, are nested in home organizations that consider them an integral part of their mission, and which do not treat academic publishing as an externality. The off-sample Journal 14 illustrates this—albeit in the negative—through the disengagement of its home organization, whose role has since become that of a service provider. For this journal, not only did the organization's financial support disappear, but it is now being charged for the support it used to receive in-kind.

Overwork: a factor contributing to organizational weakness

Unlike hours worked, which are compensated in one form or another, the remaining non-monetary contributions exist in a sort of grey zone because the time scholars spend working on a journal counts in part as "service" to the university community. In reality, professors tend to spend more time working on a journal than what they are paid or otherwise compensated for, all the more so considering this work is, in general, undervalued by academic institutions and therefore is not greatly taken into account in faculty evaluations. Moreover, as our qualitative study indicates, a simple increase in a journal's financial resources does not imply a corresponding decrease in unpaid work, but rather leads to an increase in it. This phenomenon is in all likelihood connected to the "prestige economy" that exists in the academic milieu, where symbolic and financial capital feed back into each other reciprocally.

In an interview, the director of a journal that did not complete the data-collection process confided that the state of scholarly journals is a growing problem within the university milieu. The increasing number of submissions and the difficulty in finding peer-reviewers is adding to the workload while financial and institutional recognition continues to wane: the work posts journals depend on to operate are among the services being disregarded by universities. As a result, it is becoming harder and harder to find people willing to take these positions: the director of the aforementioned journal is on his third mandate because the journal has not found a replacement.

The pressure journal directors are under was evident in the responses we received after we contacted journals to participate in the study. Out of the 55 journals we contacted, only 11^6 (22%) completed the data-collection process by filling in the form, despite most journals mentioning how important they felt this study to be.

Key findings

Relatively poor knowledge of budget expenses

The findings from the qualitative survey indicate that journals have a more detailed understanding of their revenues than of their expenses. The latter are more often incurred with known revenues as a point of reference, which ensures that a financial balance is respected.

Negligible production costs and the importance of highly qualified personnel

Scholarly journals depend on the labour of highly qualified people for their existence and production, and the costs of physically producing a journal are negligible in comparison to editors' ability to pursue

⁶ Of the 12 journals in the qualitative survey, one had participated in the test phase; its characteristics fit the criteria established for the makeup of the sample.

the journal's research mission. In reality, as this section shows, the bulk of journals' expenses stem from personnel costs, in particular the remuneration of editorial assistants and copyeditors.

Two main sources of revenue

Journals have two main sources of revenue: grants and commercialization. The gross revenues of journals in the sample (not counting in-kind contributions) range between \$17,000 and \$119,500 per year.

Generally, the poorest journals publish the fewest number of articles per year (less than 20). Beyond a certain amount there stops being a direct link between revenues and the number of articles published.

Grants come mainly from two public funding agencies, the SSHRC and the FRQSC, and at times from other academic institutions. For the majority of journals, grants are essential and represent anywhere between half to all of their revenues.

Journals operating without grants

Of the two periodicals operating without grants, one has recourse to article processing charges (APCs) and to other resources from its research milieu (health), the other has an agreement with a commercial publisher.

Importance of subscription earnings

In the case of five journals, earnings from print and/or digital subscriptions (commercialization) remain important.

A considerable workload

Access to course releases is unevenly distributed among the journals, in part because only one of the two public funding agencies, the FRQSC, covers them through its grants. The question concerning workload incited the interest of the journal directors we interviewed, whose work for national scholarly journals takes place within an environment of dwindling institutional recognition. The pressure professors in charge of journals are under was evident in the study's response rate: less than 22% of the journals we contacted completed the data-collection form, despite comments from many of those we contacted highlighting the importance of the study.

Worry and apprehension among journals

Exchanges with the journals also hinted at a certain lack of confidence, no doubt connected to the privileged place accorded to rivalry and competition in the distribution of resources.

Conclusion

The importance of open access has been increasing steadily over the past thirty years, and its adoption now looks likely to become widespread, particularly in the wake of Plan S and other similar policies. The current health situation is reconfirming the importance of having open access to publicly funded research. Indeed, as UNESCO maintains,⁷ open-access scholarship has become essential to our everyday lives, be it to gain a better understanding of public health measures, to limit the spread of the virus, or to allay fears that may be caused by ignorance and misinformation. HSS open-access scholarship democratizes access to articles that support people as they go about finding information and reflecting on the historical, sociological, political, economic and even cultural aspects of the pandemic. However, the implementation of an open-access environment adapted to the reality of scholarly journals in HSS remains a challenge.

Combining quantitative data collection and a qualitative survey, the present study sought to gain a deeper understanding of the socio-economic situation of Canadian HSS scholarly journals. By the same token, this study has also sought to better understand these journals' financial and operational functioning, and to evaluate how they are responding to changes in the evaluation criteria within the granting programs offered by the research councils.

Our findings show that there are 825 scholarly journals in the country, of which 611 are in HSS and 214 in STM. Altogether, 45% of Canadian scholarly journals are open access; the use of article processing charges is not a widespread practice. In both HSS and STM, Canadian academic journals are for the most part independent and associated with research organizations-university presses, learned societies, libraries and university faculties. The role that commercial publishers play in this environment is minor. Moreover, the ever growing dominance of English in the world of scholarly publishing, and the attendant drop in French-language submissions, appears to be putting bilingual and francophone journals in a difficult position. In this context, the policies adopted by funding agencies concerning francophone and bilingual publishing (in both official languages) seem crucial for the preservation of francophone academic literature. Regarding grants, our findings reveal the existence of two categories of HSS journals. In the first and biggest category, one finds journals for which grants account for a substantial portion of their operating budgets. In the second and comparatively smaller category, one finds journals that receive enough financial support from their publishers and/or disseminating organizations to pursue their activities without public funding. Finally, our analysis confirms that personnel costs are the main expense for HSS publications, whose existence and operation depends on the work of often highly qualified individuals. These expenditures are quite often made on the basis of journals' known revenues, allowing them to maintain balanced budgets.

⁷ https://en.unesco.org/covid19/communicationinformationresponse/opensolutions

A particularly striking takeaway from this study is journals' desire for greater dialogue with the institutions that support them. Considering how important national journals are for the dissemination of scholarship in HSS, this desire is worth heeding. Indeed, several journals described current levels of support as insufficient, particularly in relation to open-access requirements which are weakening an already chronically underfunded academic publishing ecosystem. Interestingly, however, boosting financial support does not appear to be the only solution to these challenges, which are indicative of increasingly overstretched editorial teams. What this shows is the need to tap certain kinds of expertise—expertise capable of giving journals a leg-up in and across their operational activities, but which do not derive from the journal's intellectual leadership. The implementation of shared resources might strengthen a field weakened by the prioritization of competition over access to resources. Mitigating the vicious circle that has led to the devaluing of editorial work in HSS journals over the past 20 years also appears urgent. This can be achieved by fully recognizing the work journals require as well as the important place they occupy in the research cycle.

Against this background, Canadian HSS scholarly journals are facing a looming dilemma, which may lead some to enter into agreements with commercial publishers. Such agreements promise journals a stable source of revenue, freedom from preparing time-consuming grant applications whose outcomes are uncertain and, ultimately, more time and energy to focus on the academic and editorial aspects of the publication. Such a scenario places the cost of journals' financial and operational stability squarely on the shoulders of university libraries, which are left to purchase expensive subscriptions. The remaining journals—those unable to sign deals with commercial editors, notably because they do not publish in English—will be threatened by a progressive drop-off in their numbers. The only way of countering this tendency appears to be through the full recognition of the place they occupy in a research environment understood as an ecosystem.

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Appendix 1 – Data collection: sources and methods

Sources and methods of quantitative data collection

The list of Canadian journals on which this study is based was collated from two types of sources: it uses data gathered and provided by the funding agencies (SSHRC and FRQSC) as well as from Ulrich's Periodicals Directory, or Ulrichsweb, which tracks all active scholarly publications in the world across the disciplines.

The Ulrichsweb database provided an initial, exhaustive list of scholarly journals published in Canada (or classified as Canadian between 1998 and 2020⁸) across all disciplines. Going through it manually afterward allowed us to correct certain inaccuracies, pertaining namely to language and form of access, and to exclude predatory journals. The challenge of identifying predatory journals led to a combination of two approaches: first, consultation of Beall's List, which is now out of date; followed by a manual revision based on the characteristics of predatory journals—badly made websites, low-quality language, unclear review policies and information, excessive uniformity in authors' institutional affiliations.

Research allocations to Canadian scholars in STM and HSS

Below are the sources that document research allocations to Canadian researchers as a portion of funding agencies' budgets:

- NSERC budget (2018–2019): <u>https://www.nserc-crsng.gc.ca/db-tb/index-eng.asp</u>
- CIHR budget (2018–2019): <u>https://cihr-irsc.gc.ca/e/51250.html</u>
- SSHRC budget (2018): https://app.powerbi.com/view?r=eyJrIjoiMTcyNDU4OWQtY2UxMC00YzNlLThmYWUt YTJmYjI4ZDM3NzU1IiwidCI6ImZiZWYwNzk4LTIwZTMtNGJlNy1iZGM4LTM3MjAz MjYxMGY2NSJ9
- For the number of researchers in natural sciences and engineering and in the humanities and social sciences (2015): <u>https://www150.statcan.gc.ca/</u>

⁸ When the list of Canadian scholarly journals was compiled using the Ulrichsweb data and figures provided by the SSHRC (1998–2020) and FRQSC (2009–2019), 35 journals turned out to be published by non-Canadian organizations. The reasons for this may be multiple: a journal may have been purchased by an organization based outside Canada; the make-up of the journal's editorial board and direction may have changed, and so on.

Publishers

The journal publishing organizations identified through Ulrichsweb were verified manually. The clear identification of organizations is a delicate process, especially when several organizations are implicated. For example, one very common type of organization in Canada is the learned society, but university departments and professional associations are also among the organizations we identified. For this reason, when the journal appeared to be published by a university department, we decided to categorize it at the level of the university, though this pattern became harder to maintain when it came to research centres, which may be associated with several institutions at once.

Disseminating organizations

Disseminating organizations were distinguished from publishers on the basis of publishing activities. Most often a disseminating organization does not perform any of the publishing work. That being said, there are times when disseminating organizations and publishers are identical, as is the case with Canadian Science Publishing and University of Toronto Press.

Study of a cross section of twelve funded Canadian scholarly journals in the humanities and social sciences

Data collection

The case study presents data gathered from a cross section of 12 funded Canadian scholarly journals that were randomly selected on the basis of four intersecting criteria: discipline, language, disseminating organization (for-profit or not-for-profit), and location (in or out of Canada). The results are presented in the form of case studies that provide an overview of the diversity of scholarly publishing in HSS.

Data pertaining to journals' management and operations were gathered through interviews conducted by independent external consultants. Participating journals were asked to record their financial information on a standardized form, which was subsequently verified by the consultants in close collaboration with the journals' directors. The data is presented in a way that shows journals' financial flows (revenues and expenses) separate from their work hours (with or without course releases).

To ensure the integrity of the data collected and to facilitate comparisons across cases, a trial phase involving 4 journals was undertaken. This exercise helped to refine the qualitative survey's approach and to validate the form used to gather information about journals' finances and work hours.

Journals' responses

For a presentation of the journals' responses to our participation request, see the paragraph dedicated to this issue on page 21, in the section "Financial and organizational portrait of a cross section of Canadian scholarly journals in HSS."

Appendix 2 – Survey results: portraits of the sample journals

The survey results are presented as summary portraits of each journal in the sample. Each portrait begins with an analysis of the most salient aspects of the journal's finances and operations, followed by a table detailing the journal's key operating figures. The numerical information provided is split into two broad categories: "financial flows," which include the journal's revenues and expenses; and "work hours," which account for the time spent working on the journal, with and without course releases.

It is worth noting that the majority of journals do not maintain an adequate internal accounting system. Despite our efforts to ensure their accuracy, journals' financial information, and particularly their expenses, should be approached with some discretion. Editorial teams' work hours were tabulated by the journals themselves. This portion of the survey drew the interest of many of the journals we contacted (even those that did not participate in the study), echoing a perception among many interviewees that their work is underrecognized by academic institutions.

Financial flows

Revenues

The financial data collection form identifies three possible sources of revenue. First is commercialization, which includes proceeds from print and digital subscriptions as well as from other digital sources (namely, royalties from aggregators) connected to sectorial strategies. Grants, the second possible source, come mainly from two public funding agencies, the SSHRC and the FRQSC, though they may also come from other academic institutions (universities, faculties or departments, learned societies, etc.). A third section allows journals to declare other sources of revenue—e.g., the sale of reproduction rights, but also proceeds from specific initiatives developed by each journal. Of all categories, journals appeared to have the most precise knowledge of their revenues, which very often serve as the reference point against which expenses are incurred.

Expenses

Expenses in the financial data collection form are divided into three areas: production costs, personnel costs, and administrative costs. Nevertheless, the distinction between production costs and personnel costs is somewhat artificial (beyond printing costs, in any case) and does not appear to have been understood in the same way by all respondents.

Work hours

Non-monetary contributions

The non-monetary contributions (or unpaid work) of a journal's directors and editorial board members exist in a kind of quantitative grey zone, since the time professors dedicate to working on a

journal counts in part as "service" to the university community. In reality, they tend to dedicate more time than what they are paid or otherwise compensated for; all the more so considering this work is, in general, undervalued by academic institutions and therefore given short shrift in professors' evaluations.

Course releases

Course releases refer to the reduction of a professor's teaching charge through the hiring of a sessional lecturer. In this study, the work time corresponding to a course release was estimated to be 250 hours, which is the figure calculated by employment insurance for a one-course teaching load. The cost of a course release was estimated at \$10,000 (a low estimation).

Professors' access to course releases is unevenly distributed among HSS scholarly journals, in part because only one of the two public funding agencies, the FRQSC, covers them through its grants.

Journal 1 – Psychology, Canada, non-commercial, francophone

The first journal in the sample is in the discipline of psychology. It is disseminated non-commercially from Canada and it is a francophone publication.

Journal 1 is a digital-only publication and recently made the transition to immediate open access (2019). It publishes two issues per year, which amounted to 16 articles in 2018, the reference year for the financial and operational data collected.

From a funding perspective, psychology is a discipline on the border of HSS and STM. As a result, Journal 1 is not admissible to the SSHRC's Aid to Scholarly Journals program because it falls within the area of health. On the other hand, Journal 1 has received grants from FRQSC but lost that agency's support in 2014.

The director of the university department where this journal is based is automatically editor-in-chief of the journal. The department provides some material support, giving a portion of its accountant's and administrative assistant's work hours to the journal (about 20 hours per year).

While Journal 1 lost its FRQSC funding, it is situated in a relatively well-funded research domain (health) which enables it to access other sources of funding: Journal 1 has recourse to APCs of \$500 and it has also developed a unique initiative which is specific to its research milieu, producing professional training questionnaires for practitioners in its specific field. Authors are required to attach 10 questions to their articles that serve as the basis for the questionnaire. These questions are edited by two students who receive \$500 each. The sale of these questionnaires to a professional association generates a revenue of \$10,000 per year, which covers half of the journal's production budget.

From a more symbolic angle related to the economy of prestige surrounding this journal, it is worth noting that, in contrast to journals in more clearly-defined HSS disciplines, the work scholars perform for this journal—be it direction, editing, or article evaluation—is recognized as contributing to their career trajectories.

Financi	al flows	Work hours		
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)	
Digital revenues:	Digital production	Editor-in-chief: 40h	Editorial secretary	
\$8,700	c osts: \$100		(work hours paid by	
		2 Associate editors: 80h	the university): 80h	
Sale of reproduction	Personnel costs:			
rights: \$1,400	\$15,200			
APCs: \$4,000	Administrative costs:			
	\$2,900			
Professional training	Training: \$1,000			
material: \$10,000				
\$24,100	\$19,200	140h / \$8,400 ⁹	80h / \$3,500	

⁹ The hourly rate used to give time worked as a dollar value (\$60) was obtained by averaging out the two amounts journals provided in the sample.

Journal 2 - Humanities, other (outside Canada), commercial, bilingual

Journal 2 is in the disciplinary field of humanities. It is disseminated by a commercial publisher located outside Canada. It is officially a bilingual journal.

Journal 2's articles are available through restricted access. This journal appears digitally and in print. It puts out six issues per year, which amounted to 48 articles in 2019, the reference year for the financial and operational data collected.

One distinct trait of this journal is that it is disseminated by a commercial publisher, which in exchange pays the journal around \$55,000 per year. The sum is used to pay scholars for their editorial and academic work for the journal, while material production remains the responsibility of the publisher. Compensation of the editor-in-chief and editorial board (all professors) takes the form of financial contributions to their research budgets, counted as part of "personnel costs" (\$31,000 of \$42,000). The editor-in-chief's compensation amounts to \$11,000. The remaining \$20,000 is divided among the 17 members of the editorial board on the basis of the number of articles evaluated by each member (which depends on their specialization). According to the journal, this amounts to around \$75 per submission.

It is worth noting that the amount paid into the editor-in-chief's research budget is more or less equivalent to the cost of a course release. Nevertheless, these amounts are not, in a strict sense, remuneration; the number of hours that appears in the "Compensation (course releases or other)" column is therefore unrelated to the research-budget allocation. These hours were estimated by the journal at 2 hours per week for each committee member. The particularly high number of hours is due to the number of this committee (17).

Considering the number of hours worked, the financial amounts involved are comparable to that of public funding. Particularly, the publisher's disbursement provides the journal with a modicum of financial security, sparing it the time and effort it would otherwise need to invest in the search for funding and reporting.

This kind of financial support amounts to a privatization of financial sustainability, with the added costs being transferred to university libraries, which purchase expensive subscriptions from the commercial publishers. The institutional subscription costs in Canada set by the publisher of this journal are \$470 for a print-and-digital subscription and \$399 for a digital-only subscription.

Journal 2 has not applied to the Aid to Scholarly Journals program in the past 10 years: its editorial board considers the journal does not need the money whereas many other journals do, so it has refrained from applying.

Finances		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
Annual revenues (disbursement from	Personnel costs: \$42,000		Editor-in-chief: 260h

commercial	Administrative costs:	Editorial board (17 profs.):
publisher): \$55,000	\$16,900	1,700h	
\$55,000	\$58,900	1,960h / \$117,60	0

Journal 3 – Management and economics¹⁰, Canada, non-commercial, bilingual

Journal 3 is in the field of management and economics. It is disseminated non-commercially from Canada and it is actively bilingual.

Articles published in Journal 3 are available through delayed open access (12-month embargo), both digitally and in print. The journal publishes four issues per year, which amounted to 28 articles in 2018, the reference year for the financial and operational data collected.

Journal 3 receives some of the most ample institutional support of all the journals in the qualitative survey. The university department where the journal is based provides it with three course releases per year—two for the editor-in-chief and one for the associate editor.

Bilingualism is very important for this journal, which is the only one in its field to publish articles in French. This experience has been a difficult one, though, because the journal is penalized in Anglo-Saxon rankings, which only take into consideration articles written in English.

Although it is old and financially well-supported, this journal worries about its future stability. Its situation exemplifies the challenges posed by open access to journals historically funded through subscription revenues. Journal 3's subscription revenues are high (\$54,000). Like others, the journal's director looks forward to the study's results to better situate themselves. Journal 3 frames its worries in terms of neoliberal governance, particularly the importance given to rankings, to the increased competitiveness of funding applications (whose demands seem increasingly difficult to meet), and to the importance given to communications. Looking forward, the journal plans to make improvements to its website and to increase its presence on social media—changes it regards as unavoidable. The journal has also recruited some prestigious colleagues to its advisory board to act as its ambassadors at academic events.

Finances		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC and FRQSC grants: \$54,000	Personnel costs: \$114,600	Associate editor: 208h	Editor-in-chief: 416h
Print subscriptions: \$10,000	Printing costs: \$3,700 Mailing costs: \$4,600		Associate editor: 208h
Digital revenues: \$44,000	0 ")		

The members of the journal's editorial board agree to evaluate two articles per year, but the journal is looking for ways to involve them further (the number of hours is missing in the summary table).

¹⁰ Although Journal 3 is classified under this category in databases, the journal's editorial committee considers its disciplinary affiliation as being closer to social sciences.

	Administrative costs: \$12,900		
\$108,000	\$135,800	208h / \$12,480	624h / \$37,440

Journal 4 – Humanities, Canada, non-commercial, multilingual

Journal 4 is in the disciplinary field of humanities. It is disseminated non-commercially from Canada and it is multilingual.

Journal 4's articles are available through delayed open access (12-month embargo), both in print and digitally. The journal publishes three issues per year, which amounted to 30 articles in 2017, the reference year for the financial and operational data collected.

Journal 4 appears to be in a secure situation, with a committed, international readership. The journal's print dissemination is important, because readers in some areas do not always have access to the online platform that carries the digital version of the journal. This situation is reflected in its quite significant shipping fees (\$9,130).

This journal is part of two distinct financial flows. On one side, it is published by a university press, which is primarily responsible for the journal's material production—copyediting, proofreading and printing—and its dissemination. These costs are covered by the journal's subscriptions earnings (\$67,800). On the other side, the journal's editorial board is responsible for evaluating submissions and overseeing the peer-review process, as well as for the editing, copyediting and layout of articles. The journal's operating costs are covered through public grants (SSHRC and FRQSC) amounting to \$50,000.

Finances		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC and FRQSC grants: \$50,000	Personnel costs: \$49,800 (+ 1 course release:	Editor-in-chief: 650h	Editor-in-chief: 250h
Print subscriptions: \$29,100	\$10,000) Printing costs: \$4,400	Consultants (2 profs): 15h	
Digital subscriptions: \$36,600 Sale of reproduction	Administrative costs: \$22,200	Editorial board (9 profs): 30h	
rights: \$3,700	Mailing costs: \$9,100		
\$119,500	\$95,600	695h / \$41,700	250h / \$15,000

The journal is able to provide one course release to its editor-in-chief with the grant from FRQSC. This is estimated to be equivalent to \$10,000, indicated in the "Personnel costs" in the summary table.

Journal 5 – Social sciences, Canada, non-commercial, francophone

Journal 5 is in the disciplinary field of social sciences. It is disseminated non-commercially from Canada. It is a francophone publication.

Journal 5's articles have been available only digitally and via immediate open access since 2016. It publishes two issues per year, which was equivalent to 12 articles in 2016, the reference year for the financial and operational data collected.

This journal is in a precarious financial situation, and considers itself so. The SSHRC and FRQSC grants it used to receive were not renewed during the last two competitions. The journal was able to stay afloat thanks to some punctual support from its editor-in-chief's home university as well as a two-year \$20,000 grant offered by FRQSC in 2016 to some of the journals that were recommended but did not receive funding from the 2014 competition. This allows the journal to benefit from the FRQSC's open-access policy, which covers the digitization costs of journals that do not receive grants but are nonetheless recommended for funding.

Technically, the journal has not generated any revenues since 2018 except from a share from its home learned society membership (\$1,230 in 2016).

This journal perceives open-access requirements as having a weakening effect on account of the lack of general funding available for journals.

Following the grant refusals, copyediting is handled by a doctoral student rather than a professional. Production costs dropped from around \$5,000 to \$1,500 per issue, the possible loss of quality is impossible to assess. The journal has agreed to publish thematic issues funded by foundations and/or research groups that have the means to pay for it.

Financial	Financial flows		x hours
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
FRQSC support (2016- 2018): \$10,000	Personnel costs: \$6,600	Editor-in-chief: 250h	
Digital revenues: \$4,500			
Foundation: \$5,000			
Emergency support: \$1,200			
Learned society: \$1,200			
\$22,000	\$6,600	250h / \$15,000	

Journal 6 – Social sciences, Canada, non-commercial, bilingual (English)

Journal 6 is in the disciplinary field of humanities. It is disseminated non-commercially from Canada. The journal is officially bilingual but anglophone in practice. It publishes articles continuously, which amounted to 30 in 2019, the reference year for the financial and operational data collected.

Journal 6 receives significant institutional support from three separate sources. It receives support from a disciplinary organization (\$6,000). It is also part of a consortium of open-access journals which assumes some of the production costs (the latter are paid to the journal's publisher and amount to \$500 per article). According to their agreement, the journal is obliged to cover the cost of the first 18 articles, and the consortium covers the rest; in 2019, this amounted to 12 articles (\$6,000). Finally, the journal's home university contributes to the journal's operations in a variety of ways. The university pays three graduate students (\$21,600), who handle the administrative and copyediting duties of the journal. The students' editorial work is instrumental in the processing of submissions from authors in the Global South who are not native English speakers, who the journal is increasingly interested in publishing. These graduate students are supervised by an editorial assistant whose salary is covered by a university institution set up to ensure the sustainability of scholarly publishing in on online, open-access environment. This initiative by the university is rare in an academic environment where the dissemination of research is more often treated as an externality.

Journal 6 uses a customized version of OJS provided by its publisher for processing articles. The same graduate students who are in charge of copyediting are responsible for the treatment of submissions in OJS. The journal has a system in place for ensuring quality throughout the process. One problem with OJS and other automated editorial workflow systems is the personalization of messages to authors and reviewers. Journal 6's personalized messages, written by the issue editors, have led to a rise in reviewers' acceptance rates. The challenge is involving the editor-in-chief at the right moment.

Finan	Financial flows		hours
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC grant: \$30,000	Personnel costs: \$44,000	Editor-in-chief: 210h	
	Digital production:	Editorial board (3	
Disciplinary organization: \$6,000	\$13,000	profs.): 1,000h	
	Administrative costs:		
University: \$21,600	\$8,500		
Consortium of			
open-access			
journals: \$6,000			
\$63,600	\$61,500	1,210h / \$72,600	

Journal 7 – Social sciences, Canada, non-commercial, francophone

Journal 7 is in the disciplinary field of social sciences. It is disseminated from Canada noncommercially. It is a francophone publication.

This journal appears in print and digitally, and has been open access since 2017. It publishes two issues per year, which amounted to 29 articles in 2018, the reference year for the financial and operational data collected.

The journal provides its editor-in-chief with one course release every two years (indicated in the summary table as a half-release and estimated at \$5,000 in the personnel costs). The course release has been made possible by a grant from the FRQSC.

The journal is part of two distinct financial flows. On one side, it is published by a university press which is primarily responsible for the production (printing of proofs, proofreading, printing) and dissemination of the journal. Its revenues come from subscriptions and the sale of reproduction rights (\$19,500). On the other side, the journal's editorial team is responsible for reviewing and treating submissions, as well as for the editing, copyediting and layout of the articles. The revenues come from public grants (SSHRC and FRQSC) amounting to \$50,000.

Journal 7 uses an article management system tailored to its needs by a programmer (a cost of around \$5,000). This system was developed after the journal considered OJS, which it found to be too high-maintenance.¹¹

Financ	Financial flows		rk hours
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC and FRQSC grants: \$50,000	Personnel costs: \$61,700 (+ 0.5 course release:	Editor-in-chief: 225h	Editor-in-chief: 125h
Print subscriptions:	\$5,000)	Associate editor:	
\$9,000	Digital production: \$1,000	350h	
Digital subscriptions: \$6,300	Print: \$3,100	Editorial board (8 profs.): 65h	
Sales of reproduction rights: \$4,100	Mailing costs: \$2,700		
	Administrative costs: \$20,200		
\$69,500	\$93,700	640h / \$38,400	125h / \$7,500

¹¹ Unfortunately, we do not know more about what the journal means by this, but it is possible that its editorial board considered that it needed only some of its features, and so preferred to use a tailor-made program to develop these. Several journals expressed having problems with OJS after updates and figuring out program bugs that required outside assistance. Others worried about how the platform encouraged less personalized forms of communication.

Journal 8 – Social sciences (pluridisciplinary), Canada, non-commercial, francophone

Journal 8 is pluridisciplinary. It is disseminated from Canada non-commercially and is a francophone publication.

Journal 8 is digital-only and has been open access since 2003. It publishes two issues per year, which amounted to 13 articles in 2018, the reference year for the financial and operational data collected.

Journal 8 is defined by a very slender structure on account of its early transition to digital and later to open access. The journal's situation appears secure, but it relies on a significant investment from its editor-in-chief (10 hours of work per week) and associate editor (5 hours of work per week).

Financial flows		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC grant: \$28,000	Personnel costs: \$12,000	Editor-in-chief: 520h	
Sale of reproduction rights: \$4,000	Digital production: \$2,600	Associate editor: 260h Editorial board (6	
Digital revenues: \$2,500	Administrative costs: \$2,800	profs.): 120h	
\$34,500	\$17,400	900h / \$54,000	

Journal 9 – Vocational field, Canada, non-commercial, bilingual (~80% francophone)

Journal 9 is in a vocational field. It is disseminated from Canada non-commercially. It is a bilingual journal, with an estimated 80% of its articles appearing in French and 20% in English.

Journal 9 appears digitally and in print, and its articles are available via delayed open access (12-month embargo). It publishes four issues per year, which amounted to 31 articles in 2018–2019, the reference year for the financial and operational data collected.

Within the qualitative survey sample, Journal 9 is among the most well-funded by its home institution, which provides it with an editorial secretary who works four days a week (a salary of around \$60,000). The journal's editor-in-chief notes, however, that his work is increasingly taken up with other tasks related to the running of the department. The department provides the editor-in-chief with two course releases, which amounts to about half of his yearly course load. The journal's disciplinary field requires particular attention be given to copyediting, which is done by students as part of two 3-credit courses focused on this activity. These students are supervised by a doctoral student paid by the journal.

Financial flows		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC and FRQSC grants: \$53,700	Personnel costs: \$55,800		Editor-in-chief: 500h Editorial secretary
Student investment fund: \$6,100	Printing and mailing costs: \$8,600		provided by university (4 days per week): 1,400h
Print subscription: \$11,300	Administrative costs: \$10,600		Undergraduate students (copyediting):
Digital revenues: \$22,200 \$93,400	\$75,000		100h (minimum) 2,000h / \$92,000

Strangely, the journal is now responsible for its own mailing costs, after the university announced it would cease to cover these.

Journal 10 – Arts and letters, Canada, non-commercial, francophone

Journal 10 is in the disciplinary field of arts and letters. It is disseminated from Canada noncommercially and is a francophone publication.

Journal 10 has been digital-only and open access since its inception in 2006. The journal publishes two issues per year, which amounted to 15 articles in 2019, the reference year for the financial and operational data collected.

The journal's operations are particularly lean and its production costs negligible. The journal's editorin-chief and reviewers are responsible for editing and copyediting. Its digital production (as a PDF) is carried out by the editor-in-chief and the editorial secretary (a master's student) using OJS, which is made available by the online platform that hosts the journal. The journal only uses OJS for this part of its work, and considers itself too small to benefit from the other features.

A change in directorship in 2018 led to a shift in the journal's editorial orientation that made it even leaner in its operations. The journal's stated disciplinary field was reduced to better fit the editor-inchief's specialization, which improved the journal's ability to find reviewers for the articles submitted. In the same way, the journal also decided to cease publishing book reviews, logistically quite a demanding activity.

As research chair, the editor-in-chief already has access to three course releases, none of which are related to the journal.

The editorial board is composed of three professors. The board is active and each of its members evaluates roughly two articles per year.

At a cost of \$1,400, the journal is hosted on a provincial university-library platform which grants free access to its articles.

Financial flows		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC grant: \$21,000	Personnel costs: \$18,000 Hosting platform costs (dissemination): \$1,400 Administrative costs: \$1,600	Editor-in-chief: 100h Editorial board (3 profs.): 150h	
\$21,000	\$21,000	250h / \$15,000	

Journal 11 – Vocational field, Canada, non-commercial, anglophone

Journal 11 is in a vocational field. It is disseminated from Canada non-commercially. It is an anglophone publication.

Journal 11 has been digital-only and open access since its inception. It publishes the majority of its articles continuously, which amounted to 12 articles in 2018—during which time it also published a special issue containing 10 articles, for a total of 22 articles in 2018, the reference year for the financial and operational data collected.

This is a relatively young journal that received its first SSHRC grant in 2014. This grant allowed the journal to professionalize its operations, to reduce the size and weight of the editor-in-chief's workload (especially important in the absence of an editorial assistant) and to publish special issues. In 2019, the journal only received a partial grant. If it receives full support in the next competition, the journal plans to hire a graduate student to build its social-media presence.

Over the past year, the journal has set up an editorial board. This has helped with the evaluation process especially, leading to a faster pace of publication.

Otherwise, the journal is also developing a collaboration with the languages and literatures department at its university to find graduate students who can help copyedit manuscripts, especially those submitted by authors who are not native English speakers.

Journal 11 uses OJS, with data hosting provided by the library of its home university. The support is relative, though; the editor-in-chief has to keep watch because the necessary system updates are not always carried out.

Financial flows		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC grant: \$17,000	Personnel costs: \$15,400 Administrative costs: \$1,600	Editor-in-chief: 145h Associate editor: 65h Editorial board (3 profs.): 180h	
\$17,000	\$17,000	390h / \$23,400	

Journal 12 – Vocational field, Canada, non-commercial, francophone

Journal 12 is in a vocational field. It is disseminated from Canada non-commercially. It is a francophone publication.

The articles published by Journal 12 are available via delayed open access (12-month embargo), and since 2016 only digitally. The journal publishes three issues per year, which amounted to 18 articles in 2018, the reference year for the financial and operational data collected.

The journal's FRQSC grant allows it to provide two course releases per year, one to its editor-in-chief, the other to its associate editor. These releases are estimated at \$20,000 and are included in the journal's "Personnel costs."

In 2017, the journal changed directors and switched to a co-directorship. It was after this change that the journal adopted OJS as its management system, spending \$4,500 on training. The journal is happy with the system, but noted that problems transferring to OJS 3 have been a source of worry and some discouragement.

One of the directors previously worked with another journal that had a larger editorial team (4–5 people). This experience informed the journal's decision to expand its staff by hiring a postdoctoral student from the journal's home university as an editorial assistant. This student has a postdoctoral grant and is not paid by the journal.

Financial flows		Work hours	
Revenues	Expenses	Non-monetary contributions	Compensation (course releases or other)
SSHRC and FRQSC	Personnel costs: \$45,000	Editorial	Editor-in-chief:
grants: \$57,000	(+ 2 course releases: \$20,000)	assistant: 180h	250h
Digital revenues:			Associate editor:
\$34,000	Administrative costs: \$12,800		250h
Sale of reproduction rights: \$6,000			
\$97,000	\$ 77 , 800	180h / \$7,200	500h / \$30,000