How to SAIL

Guidance on interpretation and use of version 3.0 of the Simple Agreement for Innovation Licensing (SAIL)

Introduction

The Simple Agreement for Innovation Licensing (SAIL) responds to historical challenges commercializing academic research by constructing a mechanism for tech transfer out of post-secondary institutions based on six foundational axioms of technology transfer (Durand & Briggs, 2025). The SAIL framework is predicated on the idea that it is possible to build a licensing agreement that can be adapted to a wide variety of circumstances and that will work to align incentives and fairly reward all parties for their participation in the process of commercializing academic research.

Unlike existing express licence frameworks that are primarily optimized for the United States, SAIL is specifically designed with the Canadian ecosystem context in mind. In ecosystems characterized by a dearth of private capital for early-stage technologies and lack of access to affordable private sector research resources there is a need for a differentiated approach supporting early-stage commercialization efforts. Research institutions, including universities, are well positioned to provide resources and support, with the goal of being the anchors for a self-sustaining innovation ecosystem that turns research into long-term economic and social impact.

This guide (Durand & Briggs, 2025), provides a clause by clause review of SAIL, clearly describing the intent and purpose behind each section and providing guidance to startups, investors, funding agencies, policy makers, and tech transfer offices (TTOs) on recommended best practices for licensing of IP portfolios arising from publicly funded research.

The authors acknowledge that SAIL cannot work in a vacuum, and that challenges with under-resourcing of TTOs, tensions between spinouts and TTOs (Fink et al., 2023), and institutional challenges arising from IP policy may make adoption challenging. Addressing these issues requires active engagement by all stakeholders. SAIL, and the growing number of organizations who support it or have contributed to its ongoing development, serve as a call to action for policy makers, Research Institutions, and funding agencies to rethink the approach to research and intellectual property (IP) management.

Throughout this document, terms that are capitalized have the meaning assigned to them in the SAIL agreement.

The main objectives of the SAIL framework are to:

1. Reduce any tensions between stakeholders (Fink et al., 2023) by:

    a. accelerating the licensing cycle of Research Institution owned IP onto a startup with guided negotiation to reduce deal friction and increase transparency. In other words, by “hammering out” a licence in a shorter period calculated in days, not months (Markman et al., 2005);

    b. incentivizing Research Institutions to support research and commercialization (and more accurately capturing its value) in addition to that which is already paid for by taxpayer funding of research (e.g. through access to lab space, mentorship, and professional services);

    c. enabling inventors who are not involved to benefit from commercialization of their inventions through revenue-sharing as specified in the IP policy of the Research

Institution without diverting resources away from the startup in the early stages of operation;

d. enabling the transfer of ownership of licenced technology to the startup, on a predetermined triggering event (described later in this guide), balancing the need of Research Institutions to see evidence that the startup is a viable business (AUTM, 2007) with the desire of investors and founders to have a clear path to IP ownership;

e. enabling Research Institutions or related investment organizations to hold minority shares in startups created using Research Institution IP while respecting guidelines for the holding of equity in private companies by public institutions.

2. Facilitate not just the transfer of Research Institution owned IP to startups, but also the entrepreneurial training for transition of academic inventors into entrepreneurs, and thereby drive improved domestic talent retention, recognizing the importance of inventor involvement in nascent IP portfolio commercialization (Agrawal, 2006; Kenney & Patton, 2009; Park, Goudarzi, et al., 2024; Park, Maine, et al., 2024) and of ensuring ample opportunities for Canadian innovators.

3. Promote innovation and commercialization of IP arising from publicly funded research in line with the AUTM's best practices for tech transfer and licensing of IP by academic institutions as ratified by many major institutions (AUTM, 2007).

4. Create a fair and equitable framework that aligns the interests of the Research Institutions, inventors, researchers, startup founders, investors, and public funding agencies during the commercialization process.

5. Enable the Research Institution to become the anchor for a local innovation ecosystem that converts IP into economic or social impact and future seed capital for the next generation of startups (e.g., from founders to funders (Stuart & Sorenson, 2003)).

6. Promote long-term creation of economic activity derived from publicly-funded research.

To these ends, the drafting guidelines presented in this document may assist the parties to a SAIL licence to determine the factors affecting a decision to licence IP to a startup and to fill in the editable parts of the related SAIL agreement. Recognizing that IP ownership is usually of more value if the IP is commercially exploited and that Research Institutions do not, as a rule, commercialize IP themselves, the guidelines should help them provide sound governance of IP while also supporting the transfer of IP to the private sector to realize its economic benefit or societal value.

We note that this document is not yet in plain language. A future iteration will correct this.

Axioms of tech transfer

SAIL is built on six axioms of tech transfer developed by the authors (Durand & Briggs, 2025). When conflict arises in contract negotiations, the conflicts may be resolved by consulting the axioms, presented below in order of importance from greatest to least:

1. A licence should not unduly limit innovation or the use of publicly funded research outputs to realize economic or social benefit (axiom of benefit);

2. Ownership of the IP should transfer from the academic institution to the Licensee if there is sufficient evidence to conclude that the Licensee is a, economically viable entity (axiom of ownership);

3. Every dollar available to a startup should be used to build value in the startup (axiom of value creation);

4. Valuation of an IP portfolio should be deferred until the market has been established (axiom of valuation);

5. Supporting high-risk commercialization activity should be rewarded with equity proportional to the costs incurred in doing so, providing unlimited potential value in consideration of the risk (axiom of incentivization); and

6. Licence templates should be understandable and usable by someone without legal training (axiom of simplicity and clarity).

General Guidelines

Bearing in mind the axioms of tech transfer and their relative importance toward a positive outcome, the parties considering SAIL should commit to the following principles:

1. Have a clear and transparent set of target outcomes when entering into a negotiation;
2. Favour ongoing dialogue and prompt communication, before, during, and after a transaction;
3. Recognize that while it is usually too early to accurately assess the value of a commercial opportunity when technology is transferred, this uncertainty should not impede a good faith attempt at commercialization;
4. Recognize the perception or potential of conflict of interest arising from Research Institution commercialization activity involving active members of the lab that originated the IP, and engage in transparent and active dialog to establish a framework to mitigate any issues in a way that is compatible with Research Institution policy;
5. Recognize the need for publicly funded institutions to ensure that licensing is fair and equitable for all inventors, including those who may not be directly involved in the commercialization of the research;
6. Identify reasonable criteria or milestones to trigger the sale or assignment of IP to the startup based on the principle that IP generated using public funding should only be transferred to the private sector when there is a reasonable expectation that the transfer will result in economic or social benefit, i.e. that the startup is now economically viable; and
7. Recognize that innovation requires ongoing data-driven development and commit to long-term collection and provision of data in support of this goal.

The SAIL financial model

The cost of commercialization

Selection of technology transfer financial revenue models is challenging. Scientific literature is replete with discussion about financial models to be adopted in technology transfer (Bray & Lee, 2000, 2000; Doran et al., 2024; Savva & Taneri, 2015), but there has historically been little in the way of rationale behind the financial models adopted by Canadian universities in tech transfer agreements. SAIL seeks to bring rigour to the process of constructing a financial model. Three axioms are pertinent to this process.

First, the axiom of value creation dictates that fees and royalties are to be avoided, as they have been noted to create value-destroying distortions by diverting much-needed resources away from companies in their most vulnerable stages. Especially in ecosystems that lack risk-tolerant investment capital, like Canada, it is critical to avoid these distortions. As such, SAIL strongly discourages the use of royalties or cash fees, with a few very specific exceptions that are discussed later in this guide.

Second, the axiom of valuation discourages attempting to assign value to a company or to an IP portfolio before a clear market exists. By assigning a valuation SAIL does not mean just assigning a literal valuation, it also means to assign any specific percentage of equity to a licence deal. Given that it is possible (as we will discuss) to reasonably estimate the dollar cost of support provided by the Research Institution toward supporting the commercialization attempt, taking a specific equity percentage assigned at the time of licensing is equivalent to assigning a valuation to the company.

Taken together, these first two axioms push us toward convertible debt as the preferred mechanism for institutional reward from tech transfer, but say nothing about the specific amount, which is provided by the axiom of incentivization through careful consideration of what qualifies as a "cost of commercialization".

Universities are resourced using public funding to conduct and disseminate the results of research, but commercialization activity is often not explicitly included in their mandate or funding agreement. In contrast to executing on publicly funded research, any support provided by the university or Research Institution toward commercializing a technology involves costs borne by the university that are not covered by any existing funding source.

The amount of convertible debt is intended to capture costs to the university that would not have been incurred in the normal course of research and publication in the absence of a commercialization attempt (i.e. anything above and beyond those costs associated to the social contract of universities for which taxpayers foot the bill), and convert those costs into long-term value through a proportional equity stake in the Licensee. On the other hand, support for commercialization is a significant risk, since a majority of such attempts are expected to fail. As such, there should be no limit to the upside potential in case of a success, to ensure the possibility that a single success can more than offset the cost of many failures. This is the essence of Axiom 5, which calls for effectively treating any costs absorbed by the Research Institution as though they were angel investments in the company.

These costs are not always simple to account for. While things like fees paid to IP specialists (patent and/or trademark agents) can be easily accounted for, person-hours spent by university staff, for example, are generally not billed to the companies they support, and the value of connections to the local entrepreneurial network is certainly nonzero but is difficult to quantify. In the SAIL framework, we suggest avoiding the difficult accounting exercise to quantify these costs by categorizing costs into Accountable Costs (i.e., those that are typically actually invoiced to a Licensee in a typical licence arrangement), and Unaccounted Support Costs (i.e., those costs which are generally not accounted for in licencing deals but which still represent the costs of commercialization). Note that in SAIL, Accountable Costs is not a number to be calculated, but rather a category to which a subset of costs are assigned.

Let's break down the definition of Accountable Costs, reproduced below:

> *"**Accountable Costs**" means costs of the Licensor or Research Institution in support of the commercialization of the Technology that can be reasonably measured or projected for which the Licensor or Research Institution, as the case may be, is not or will not be reimbursed by a third party, and which have been or will be invoiced by the Licensor or Research Institution to the Licensee, including …*

Note that only costs incurred by the Licensor and the Research Institution are considered. Investor costs are not typically passed on to their investees. The costs that are to be considered are discussed above, being limited to that which can be "reasonably measured". The intention of this phrase is to include only costs that would already be considered in the course of any other licensing agreement, some examples of which are given in the list below the definition, to ensure that SAIL is not more administratively complex

than any other licensing framework. The limitation to costs for which the Licensor or Research institution "is not or will not be reimbursed by a third party" is how the discussion of the cost of commercialization above is captured in the definition, since the costs of research have already been reimbursed by a third party, be that a grant agency, funds that are earmarked for the indirect cost of research, or industry partners. The last limitation, that costs "have been or will be invoiced … to Licensee" again avoids adding administrative complexity by including only those costs for which an invoice can reasonably be issued. The definition in SAIL then lists several examples of Accountable Costs, a list to which the Parties can add additional components as appropriate without violating any design principles of SAIL provided they comply with the spirit of the definition and the axioms of tech transfer.

SAIL then suggests that the amount of convertible debt should then be the sum of Accountable Costs incurred before the Effective Date (Past Costs), a good faith estimate of the Unaccounted Support Costs (which SAIL suggests in most cases should be in the ballpark of $10,000-$20,000), and a variable amount that captures Accountable Costs incurred after the Effective Date (Future Costs). A detailed discussion of Future Costs is presented later in this guide. This approach of only carefully accounting for Accountable Costs while hand-waving the Unaccounted Support Costs components is intended to recognize that the Research Institution does in fact incur costs that are not normally captured by licencing deals, while requiring formal administration only of those costs that are already being accounted for in the course of any licensing transaction.In this way, SAIL ensures that executing and managing a SAIL agreement is no more administratively complex than any existing licensing process, while still fairly rewarding the Research Institution for its efforts.

Finally, in recognition that the Licensor may need to recover some costs upfront and that a small financial commitment on the part of the Licensee may be desirable as a means to ensure that they are serious about attempting commercialization, SAIL has an Upfront Fee built in that must be paid by the Licensee. Since this fee is paid directly to the Licensor, this represents "reimbursement by some other means", and so this amount is subtracted from the convertible debt. An Upfront Fee of no more than 20% of Past Costs is suggested.

A common theme in discussions with universities in constructing SAIL was that by tying the convertible debt to the *cost* of commercialization as opposed to the *value provided* in support of it, SAIL devalues the university role in the process. The axiom of incentivization asserts that the university contribution should be treated on the same footing as any other investor: venture capitalists that provide both cash and in-kind support toward their investments are only ever formally rewarded with equity for the cash portion, which is to say the cost of the investment. The conversion from cost to value arises through the successful building of value in that investment over time.

Investor considerations other than convertible debt

There is little practical difference between equity and convertible debt in terms of eventual outcomes, assuming the initial conversion of the debt is comparable to the equity taken. While equity works well in ecosystems such as the United States where risk-tolerant capital is abundant, it is clear after decades of underperformance that importing American licensing practices fails in Canada.

That said, there are situations in which use of institutional reward mechanisms that violate one of the axioms are appropriate, specifically those situations in which non-use of that mechanism would result in violation of a more important axiom. As a result, the wording of SAIL does not require use of convertible debt, per se. If some other mechanism is used, careful thought should be given as to the rationale for why, in light of the 6 axioms.

For example, straight equity can be used in cases where insistence on use of convertible debt for that particular tech transfer deal would result in a violation of an axiom with greater weight (those being the axioms of benefit, ownership, and value creation). A possible example here would be when licensing to a startup that has already raised capital and has no need for institutional support, a situation in which the company may not be open to taking on convertible debt and in which there would be little to no Future

Costs. Likewise, royalties can be considered even though they violate the axiom of value creation in cases where non-use of royalties would for some reason violate one or both of the axioms of benefit and ownership. Royalties are also generally better suited when licensing to established companies, a situation which is outside the scope of SAIL.

We note that convertible debt is the only investment mechanism that is explicitly compliant with all the axioms by default. SAIL strongly suggests the use of convertible debt primarily because it provides an additional incentive to stakeholders in the Canadian ecosystem to provide additional support to early-stage startups as compared to a simple equity grant, in recognition of those contextual differences.

When comparing equity and convertible debt, it is important to consider the impact of anti-dilution protection. Angel investors in particular eschew investment in companies in which existing investors have anti-dilution protection for the simple reason that it causes them additional dilution at a stage where the investment made is very high-risk. At the same time, the nascent nature of the technologies to which SAIL is applicable means that angel investment may be the only accessible source of pre-seed, pre-revenue development capital. It is therefore critical to consider first-round investor perceptions of the licence when constructing the financial model. As such, SAIL suggests use of posts-money SAFEs with a valuation cap in cases where dilutions is a key concern, an instrument that is well understood by angel investors but which still provides the university with a form of anti-dilution protection since dilution of the resulting equity stake only occurs after conversion of the debt to equity. In all cases considered, all else being equal, use of convertible debt with a valuation cap on conversion outperforms equity taken at the moment of licensing without dilution protection, without negatively impacting the ability of the Licensee to raise further capital from risk-tolerant investors.

Finally, there are technology types for which TTOs tend to prefer royalties over equity, specifically pharmaceuticals, drugs, and other small molecules. In these cases the long-term value of royalties can be comparable to equity, but it is probable that a newly formed startup is not the best vehicle by which to bring such an invention to market (Arora et al., 2009). As such, SAIL may not be applicable in these cases. SAIL is most appropriate when considering newly formed companies that may be many years from significant revenues, a situation in which royalties will be of little value.

Below are examples of several possible types of investor consideration, including advantages and disadvantages:

Table 1: Investor Consideration Comparison

Convertible Debt	**Equity**	**Royalties**	**Fees**
Advantages			
Institution is treated like an angel investor and is rewarded in proportion to their support	Simple	Ongoing cash flow	Immediate and/or ongoing cash flow
If an agreement with a valuation cap is used, the Institution has implicit anti-dilution protection up to the Triggering event without being off-putting to angel or other early-stage investors.	Preferred for licensing to startups that already have adequate resources and that do not need institutional support (out of the scope of SAIL)	Preferred for licensing to established companies (out of the scope of SAIL).	Preferred for licensing to established companies (out of the scope of SAIL).

Can be made compliant with all axioms of tech transfer through accounting consistent with the axiom of incentivization			
Disadvantages			
Requires deferral of cost recovery and a tolerance to operating at a short-term loss	Dilution of equity stake commences immediately rather than after a Triggering event	Redirection of royalties makes startup success less likely due to resource limitations, thereby devaluing equity in the case of a licence that takes both.	Startups cannot afford initial fees unless they have raised capital, and investors view fees as a reduction of the impact of their investment
	If anti-dilution protection is used, it severely reduces the chances of startup getting angel investment, reducing the chance of success and therefore the value of the equity	If the Licensee novel technology that obviates the need for continued access to the licenced technology, the institution is left with no upside possibility on success	Fees are disconnected from revenues arising from the Technology, possibly making the Technology a net-negative asset
	No incentive for the Research Institution or provide ongoing support	Long-term value of royalties is very low when averaged over all deals	No incentive for the Research Institution or provide ongoing support
	Not compliant with the axiom of valuation	not compliant with the axiom of value creation	not compliant with the axiom of value creation

Investment agreements & securities law

In light of all of this, the SAIL framework pairs best with convertible debt agreements with a valuation cap, but aside from this non-critical preference, SAIL does not prefer one convertible debt agreement over another and can be paired with any type of agreement (Coyle & Green, 2018) that allows conversion of debt into equity, such as:

- SAFE Agreements: The Y Combinator Simple Agreement for Future Equity (SAFE) is a widely used template for early stage fundraising via convertible debt. It is considered founder friendly, and is the instrument of choice for many angel investors. It involves conversion of a flat amount of debt into equity on realization of a priced round, usually without any time-based triggers for conversion. The most commonly used SAFE template, the post-money SAFE, specifies a valuation cap for calculation of the equity conversion, which sets the minimum equity stake that an investor will hold after conversion. Other template forms use a discounted share value when calculating the conversion of debt to equity.
- KISS Agreements: The Keep It Simple Security (KISS) agreement is a less common but still well tested instrument for investment via convertible debt that is considered more investor-friendly

than the SAFE. The debt may be interest-bearing and, unlike SAFE, KISS may specify a maturity date, after which the investor can unilaterally trigger conversion to equity. KISS may also allow for either conversion or repayment, possible at a multiple of the original investment, again at the sole discretion of the investor.

- Convertible note: Convertible notes are a broad class of investment tools that enable conversion of debt into equity, and are not standard agreements per se. For compatibility with SAIL, any customized convertible note paired with SAIL would need to be standardized and publicly available.
- Crowdfunding: Crowdfunding is an increasingly popular means of getting early-stage funding. To comply with SAIL, any crowdfunding must be specifically limited to convertible debt.

Note, however, that these templates are typically designed for a fixed amount of debt, and will require some changes to accommodate the variable nature of the debt contemplated by SAIL. In practice we suggest that the template be modified to include a formula for calculating the amount of debt accrued at any given time, rather than a fixed amount, to avoid the need for ongoing amendments as debt accrues. Institutions that seek to use SAIL should also make public their preferred investment agreement, taking care to ensure that any definitions and clauses therein are consistent with those in SAIL.

As a general reminder, when raising capital, the startup must also comply with all applicable domestic and international law including:

- **Securities law:** Any offering or sale of securities must comply with securities law, probably in more than one jurisdiction, including registration requirements.
- **National security:** The activities of the startup may be subject to review by governmental authorities responsible for national security, including reviews of foreign investment, and export controls.[1]
- **Research security:** The [startup/spin out] must also be committed to protecting sensitive research and IP Issues may include data security, privacy, and research security.[2]

The above are some examples among many, also including competition law, product safety, employment law, and so on. While SAIL is designed to reduce the complexities involved in negotiating an agreement from scratch, legal advice remains essential in ensuring this compliance in any specific situation.

Clause by clause review of SAIL

While SAIL is written in plain language, it is still the basis of a legal document and issues of interpretation may arise. This part clarifies the intention behind each section of the agreement, providing a more colloquial form of guidance in support of an accurate interpretation of the intention behind the letter of the contract.

The parties to SAIL

A SAIL crew consists of 4 roles. This is an explicit acknowledgement that tech transfer is a multi-stakeholder process and is intended to encourage dialogue early. It also allows flexibility with respect to the institutional tech transfer setup, in recognition that many Canadian universities work with TTOs that are formally at arm's length from the university, requiring the separation of Licensor and

[1] See the Guidelines on the National Security Review of Investments under the Investment Canada Act.
[2] See Canada's Named Research Organizations list

Research Institution roles, and that many more have recently established arm's length investment funds, requiring separation of the Investor role. In practice, however, more than one entity can fill multiple roles if the situation warrants it. The most common example of this would be a situation in which a university with a traditional TTO setup plays the role of Licensor, Research Institution, and Investor. Regardless of how the roles are filled, each member of a SAIL crew has specific responsibilities in the SAIL framework and an objective to work collaboratively toward delivery of positive economic or social impact.

Licencee

Characteristics

SAIL is an agreement for licensing to startups and so the Licensee will in most cases be a new company formed specifically to commercialize the Technology. Because SAIL may reward the Licensor with equity, the Licensee must be able to issue equity. The Licensee is expected in most cases to be pre-revenue and pre-investment, and will likely be formed specifically to attempt commercialization of a technology portfolio that is at a TRL between 2 and 4 that has arisen from publicly funded research. SAIL is not appropriate for use in cases where the Licensee is an established company.

Responsibilities

The Licensee role is central to SAIL, having numerous responsibilities, including issuing convertible debt to compensate other parties for their support of the commercialization activities, managing both commercialization of the IP portfolio and sublicensing to entities seeking to use that portfolio in other fields, and reporting data on their activities to the Licensor in service of broader innovation ecosystem development.

Assuming they are able to secure downstream investment, the Licensees will (ideally) at some point have the option to take assignment of title to the licenced technology. On exercise of this option, the Licensee must continue in good faith to commercialize the IP portfolio and to grow the business. Failure to comply with the licence, or failure of the Licensee for any reason, may mean the return of the IP to the Licensor.

As the recipient of an exclusive license to a portfolio of IP created using public funds, the Licensee has been entrusted with ensuring compliance with the axiom of benefit. Their primary associated responsibility is to make a good faith attempt to secure economic or social benefit from the Technology. Note that failure to commercialize does not necessarily mean that the axiom of benefit has been violated. The learning and personal growth achieved through the attempt will position SAILors as highly valuable contributors to the Canadian innovation ecosystem. Independent of the success of their first attempt, SAILors carry forward a responsibility to contribute positively to ensuring a self-sustaining flywheel of innovation, through further attempts at entrepreneurship and through investment of capital and mentorship in the next generation of innovators.

Research Institution

Characteristics

The Research Institution role is that of the organization where the licenced technology was created. It is often, but not always, a university, although it could also be a government lab, a hospital, or any organization that has a mandate to conduct and disseminate the results of research using public funds. SAIL is designed to be used in institutional contexts where the IP arising from research is not solely

owned by the inventor, for which no licence agreement with the Research Institution is necessary (Kenney & Patton, 2009). The Research Institution may also be the Licensor and/or Investor, depending in part on the IP policy and institutional rules with respect to equity ownership.

The role of Research Institutions in Canadian society is changing. Whereas previously they were seen as primarily sources of research and intellectual contribution, there has been a shift toward an expectation to deliver economic and social impact from the government and funding agencies. Use of SAIL directly serves this unofficial "third mission" of publicly funded Research Institutions, providing a streamlined path to getting technologies out of the lab and into the market in anticipation of this third mission becoming an explicit part of the mandate in the coming years.

Responsibilities

As a publicly funded institution, the Research Institution has a mandate to conduct and disseminate the results of research. In recent years, universities have been under pressure to go beyond this and ensure economic or social impact beyond the lab through commercialization activity (Amry et al., 2021; Bouchard et al., 2023; The Jenkins Report, 2011). SAIL seeks to bring these potentially conflicting objectives into alignment. One of the unusual aspects of SAIL with respect to tech transfer is that it provides an incentive, but not an obligation, for the Research Institution to play an active role in the commercialization process.

In their positions at the input end of the innovation pipeline, it is critical that Research Institutions are thoughtful and deliberate about what they hope to achieve through technology transfer. As such, SAIL strongly encourages Research Institutions to have an explicit mission statement with respect to the goals of technology transfer. The SAIL team suggests the following mission statement, and is designed with this end goal in mind: *To be the anchor for a self-sustaining innovation ecosystem that turns research into long-term economic and social impact.*

Note that mission acknowledges that while direct return on investment through tech transfer activity alone is the least part of the value of a successful tech transfer program. There is enormous value in being central to a self-sustaining innovation ecosystem. The relationships built through early support of the founders that will form the next generation of Canadian innovators will lead to countless opportunities to be the beneficiary of the "pay-it-forward" ethos for which SAIL advocates, including donation back to the university from the proceeds of future success. It is often the case that first-time founders fail, but go on to found successful companies on their second, third, or fourth attempts, and a Research Institution that supported their first learning experience is in a much better position to request that a part of that success be returned to the alma mater that supported them when they most needed it. Finally the data reporting requirements built into SAIL provide the tools necessary to demonstrate impact beyond the lab, which is expected to have a direct bearing on grant opportunities in the coming years.

In practice, the institution should seek to provide ongoing support for the commercialization process, which could include IP management services, lab space and specialized equipment access, ensuring improvements to the licenced technology are properly documented and communicated, and management of conflicts of interest that may arise in the course of pairing commercialization activity with publicly funded research. The institution is encouraged but not required to defer payment by adding associated costs to the convertible debt that is issued by the Licensee. Finally, the institution is responsible for ensuring that any returns arising from liquidation of the Licensee or sale of the equity, or from sublicence royalties, are shared with any uninvolved inventors in accordance with the institution's policy on sharing the proceeds of commercialization activity with inventors.

In addition to the above, any Research Institution using SAIL has a responsibility to make public all related agreements in service of the Canadian innovation ecosystem, as well as aggregating and making public any and all metrics collected through annual Licensee reporting.

Licensor

Characteristics

The Licensor is the entity that owns or has the right to exploit the licensed technology. While this will in most cases be the Research Institution, there will be cases where the Licensor is a different entity. For example, some universities use a third-party tech transfer office, such as U Calgary, and Quebec has unified its tech transfer operations under Axelys, with a handful of exceptions.

Regardless of the details of the setup, it is the Licensor that is the first and most frequent point of contact for the Licensee, and plays a key role in the innovation ecosystem as the bridge through which IP arising from publicly funded research takes the first step toward economic or social impact.

Responsibilities

Before entering into a SAIL agreement, the Licensor is responsible for protecting the licenced technology and identifying a Licensee that is both capable of bringing it to market and aligned with the goals and values of Parties to the Agreement.

Given their role managing the IP, the Licensor is responsible for ensuring it has the legal right to licence the IP, including any Included Improvements if Section 7 of SAIL is used. It is also responsible, alongside the Investor, for verifying that the agreement for convertible debt that is paired with SAIL is compatible with SAIL and the definitions therein, and for making the debt agreement public and readily available for, in particular, prospective Licensees. The Licensor is the primary point of contact for the Licensee for reporting obligations under SAIL, and is responsible for

1. ensuring management of the IP portfolio on behalf of the Licensee, including filing, maintenance, and prosecution[3] of IP;
2. ensuring Licensee compliance with its contractual obligations; and
3. collecting, aggregating, and reporting data arising from the commercialization process.

While the Licensee is usually responsible for the costs of IP portfolio management, the Licensor may front the costs. SAIL incentivizes but does not require that the Licensor (or indeed any of the Licensor, Research Institution, or Investor) absorb as much of these costs as possible by agreeing with the Licensee to include them in Future Costs and thereby adding them to the convertible debt issued by the Licensee to the Investor. The Licensor is responsible for clearly setting expectations with the Licensee as soon as possible with respect to what costs will and will not be deferred into convertible debt in order to allow the Licensee to make informed budget decisions.

The Licensor also must ensure, through the reporting requirements in SAIL and ongoing dialogue with the Licensee, that the Licensee is making a good faith attempt to commercialize the Technology, and must act to correct any failure to do so. In extreme cases, this could mean termination of the licence with cause. The Licensor may also take back ownership of the technology if the Licensee fails for any reason, and is

[3] Prosecution refers to the process of obtaining patent protection and rights for an invention by interacting with the patent office.

encouraged, though not required, to take over as the primary Licensor on any sublicences should the Licensee no longer be able to do so. To this end, the Licensor has a responsibility to make clear whether or not it will accept to assume a particular sublicense, ideally before such a sublicense is signed by the Licensee and a prospective sublicensee, and should be actively involved in any discussions relating to sublicensing.

While not contractually required, the Licensor is also incentivized under SAIL to provide as much support as possible to the success of the venture, which could include provision of legal advice and strategic or operational guidance, connections to the broader investment ecosystem, etc.The Unaccounted Support Costs component of the SAIL agreement should be no larger than a good-faith estimate of the cost of such support, which will vary by Licensor depending on the level and type of support provided.

Investor

Characteristics

The Investor is the organization that will hold the convertible debt and eventual equity arising under SAIL. While this will be the Research Institution in most cases, it could also be a third party organization, including the Licensor, or a dedicated entity created to hold equity on behalf of a publicly funded Research Institution. Many Research Institutions have recently established associated investment funds that may provide the first source of risk-tolerant, dilutive capital to startups that seek to commercialize Research Institution owned IP (Durand & Mulcair, 2023; Swamidass, 2013). The Investor could also be a partnered investment fund, for-profit or otherwise, such as those that are contracted by several UK-based universities to facilitate startup activity arising from their research.

Responsibilities

The Investor is responsible for holding and managing the convertible debt and eventual equity issued under SAIL, properly accounting for all contributions to that debt through cost deferral by the Research Institution and the Licensor, with the agreement of the Licensee. The Investor is also responsible for collecting and managing the proceeds of sale of this equity or repayment of the debt by the Licensee where the agreement for convertible debt allows for that eventuality. In cases where more than one organization comprises the Licensor, Research Institution, or Investor, the Investor must manage dissemination of any proceeds under an appropriate agreement for sharing of revenue. If there are pro-rata rights under the agreement for convertible debt, the Investor is also responsible for any further investment in the Licensee.

The Investor is responsible for selecting the investment agreement to be paired with SAIL. To the extent possible, this agreement, or at least a generic version of it, should be made public, to avoid any complexities or unexpected additional negotiations and to ensure that the investment agreement is not a bottleneck to establishing the SAIL agreement. As discussed earlier in this document, SAIL strongly prefers agreements for convertible debt, but other types of agreement can be considered, subject to the guidelines presented in the Financial model section of this guide and in Schedule B of the SAIL agreement itself. The Investor has a responsibility to ensure that the investment agreement used will not be an impediment to realization of economic or social impact through SAIL, in accordance with the axiom of benefit. Practically, this means that commonly used templates (such as the SAFE or the KISS) should be favored over bespoke agreements to ensure that their use will not add complexity to downstream due diligence processes if the Licensee seeks to raise capital in the future, and, bearing in mind the sources of capital that are accessible to emerging technologies and the preferences of these sources, should

avoid use of anti-dilution clauses, side letters to standard instruments, or any other contractual elements that might be objectionable to angel investors or other early-stage sources of downstream capital.

In the event that there is liquidity arising from a SAIL agreement, the Investor is the entity that will initially receive all of the proceeds, and has the subsequent responsibility to distribute those proceeds among the rest of the stakeholders as required by any related contracts, discussed in the following section.

Joint responsibilities of the Licensor, the Research Institution, and the Investor

In cases where they are different entities, it is expected that the Licensor, the Research Institution, and the Licensor will establish related contracts between themselves to share in the returns of any SAIL agreement to which they are a Party. This is necessary in part because all common investment templates, such as the SAFE and the KISS, are designed to be two-party agreements, and not all institutions are set up to hold or manage equity in for-profit companies. While the investment agreement established alongside SAIL is between the Licensee and Investor only as a result, it is acceptable (and indeed expected) that if the Licensor, Investor, and Research Institution are different entities, they will establish ancillary agreements relating to how the proceeds of any profits arising from the Agreement are shared between them. This need for additional agreements may also be present in cases where different units within a Research Institution are involved. For example, it is often the case that individual faculties within in a Research Institution control the available lab space, and as such, any deferral of the cost of leasing a lab would need to be approved not just by the technology transfer office, it may also require some internal work to ensure that the proceeds of any SAIL agreement are apportioned among them fairly. This is beyond the scope of SAIL directly and is not something to which the Licensee needs to be privy. However, it is the responsibility of the other Parties to ensure that all related necessary agreements are in place and that all stakeholders are fully aware of expectations and potential outcomes up front.

Emerging technologies often involve complex and long technical roadmaps before impact can be realized. All participants are encouraged to explicitly acknowledge in any related contracts that emerging technologies may require long times to impact, and, especially in cases where a third party Investor is a Party to SAIL, to ensure that the risk tolerance and liquidity timeline requirements of the Investor are compatible with this timeline.

The Technology

The Technology refers to a portfolio of IP that is the result of publicly funded research that is licenced to the Licensee by the Licensor. While in most cases it will be a patent or family of patents, SAIL may cover any type of IP (patents, trademarks, software code, data, trade secrets, etc.). SAIL may also operate in any technology sector, as discussed in our review of the literature that gave rise to the SAIL agreement (Durand & Briggs, 2025).

Sections 1 to 16 of SAIL: General principles

1. This section provides the core definitions of concepts needed to make SAIL work. While most are fairly self-explanatory, a few are worth more detailed deconstruction. As with the definition of Accountable Costs that was unpacked in the previous section entitled “The cost of

commercialization", these definitions will be broken down as needed in support of the explanations in the following sections.

2. This section lists a set of editable fields which must be filled in prior to signing the Agreement.

   The Buyout Price sets the dollar amount that must be either paid or added to Future Costs upon exercise of the option for the Licensee to take full ownership of the IP under section 9. In the case of IP arising from a Canadian Research Institution being licensed to a Canadian startup, particularly one that is spinning out of that Research Institution, the suggested value is $0 so as to minimize any impediment to tech transfer that could violate the axiom of benefit. That being said, SAIL recognizes that licensing may in some cases be to foreign startups or to more established domestic companies, in which case a nonzero Buyout price may be appropriate to ensure that the licence is net positive for Canada before the IP is transferred.

   Jurisdiction determines the governing law through which the Agreement is to be interpreted, and in most cases should be the home jurisdiction (Province or equivalent local jurisdictional unit) of the Licensor.

   Licensor Royalty Share refers to the fraction of sublicensee gross sales that must be paid to the Licensor by the Licensee. While royalties are incompatible with the axiom of value creation, use of mandatory sublicensing under section 5 is SAIL's answer to the conflict between the need for an exclusive license in order to satisfy the axiom of ownership and the need for broad access to technology required by the axiom of benefit. The value chosen should be small (no more than 2.5%, which is typical of university licenses as reported to AUTM (Durand & Briggs, 2025)), to avoid to the extent possible any value-destroying distortions induced by royalties generally (Doran et al., 2024; Savva & Taneri, 2015), and Licensors are encouraged to set this to 0% when the Licensee is a Canadian startup formed specifically to commercialize the Technology.

   Past Costs, as noted previously, refers to the Accountable Costs that were incurred prior to the Effective Date, and should be tallied up and presented here, ideally alongside invoices or other documentation itemizing each cost that is included in this value.

   Primary Field of Interest refers to an agreed upon sector in which the Licensee intends to exploit the Technology by developing a product or service. Note that choosing this field does not restrict the Licensee from pursuing opportunities in other fields, nor does it limit the sectoral scope of the exclusivity granted under SAIL. Rather, it defines the sector in which the Licensee will not be obligated to grant a sublicense or expand its scope of operations should a third party express interest in a sublicense under section 5. By definition, if the Licensee decides to pivot into any field of interest other than the Primary Field of Interest, release of a product of service inn that new field of interest would satisfy section 5(1)(b) and obviate any requirement to issue a sublicense, effectively extending the exclusivity granted under SAIL to any field in which the Licensee decides to operate in the future.

   The checkboxes indicating whether or not section 7: Access to Included Improvements is in force are self-explanatory. By default, this section should be in force unless there is a structural reason it cannot be (for example, conflict with institutional IP policy, as noted above).

Unaccounted Support Costs is a dollar figure, negotiated ahead of SAIL signing, that provides the Parties an opportunity to recognize that the Research Institution or Licensor may provide support for the commercialization process that is not accounted for by a strict addition of Accountable Costs over the lifetime of SAIL. This number should be chosen in careful consideration of the axiom of incentivization and the associated discussion in the section of this guidance document entitled “The cost of commercialization” and take into account only costs that are not part of some other mandate of the Research Institution or Licensor and which are paid by some third party. For example, the costs associated with conducting and disseminating the results of the research that led to the Technology are not admissible here given that those were paid for by taxpayers via the various granting agencies. Costs that might be considered for inclusion would be the time spent by TTO personnel managing the technology and the costs associated with delivering incubation-related programming. Note however that this is a cost bucket for which careful accounting is not expected; rather, the Parties should agree to a number that is reasonable for everyone. The “hand-waving” nature of Unaccounted Support Costs is intended to avoid any additional complexity associated with accounting in relation to SAIL

When negotiating Unaccounted Support Costs, the guiding principle at work, aside from the axioms of tech transfer, should be the mission of Parties with respect to tech transfer. SAIL advocates, as noted previously, that the mission should be to be the center of a self-sustaining innovation ecosystem. If this mission is adopted, Unaccounted Support Costs should be the same number for almost all SAIL deals and should target the smallest number that allows for the tech transfer operation to be self-sustaining in aggregate, bearing in mind that most of this will be added to the convertible debt rather than actually paid up front. In the vast majority of cases, this value should be between $0 and $20,000, unless the Research Institution or Licensor provides some extraordinary source of value above and beyond what is typical of Canadian tech transfer that cannot be reasonably considered an Accountable Cost. Research Institutions or associated Licensors are encouraged to make this number public, or to at least make public their own guidelines for arriving at an estimate.

Finally, the Upfront Fee represents the amount of money that actually changes hands as a result of the SAIL license, with everything else being absorbed into the convertible debt in cases where a convertible debt agreement is used as the investment instrument. For obvious reasons this fee cannot be larger than the sum of Past Costs and Unaccounted Support Costs, which would represent full immediate cost recovery and no convertible debt. In the rare cases where convertible debt is not used as the investment instrument, Upfront Fee can be set to full cost recovery. Otherwise, and in almost all cases, SAIL recommends that the Upfront fee be set to be no more than 20% of Past Costs. While a value of $0 represents the least barrier tech transfer and can be considered in cases where the Licensee is a Canadian startup spinning out of a Research Institution specifically to commercialize the Technology, the axiom of benefit does not preclude a nonzero value here, for the sample reason that paying some small amount up front indicates commitment on the part of the Licensee that they actually intend to exploit the Technology and increases the likelihood that benefit will be derived as a result of the Agreement.

3. SAIL is an exclusive licence limited by neither field nor territoryThe need for exclusivity is dictated by the axiom of ownership: if there is more than one Licensee, then there is no “clean” way to transfer ownership to them without risking legal ownership issues or problematic incentives in choosing which one takes ownership. As noted previously, while a Primary Field of Interest is defined in section 2, this does not limit the scope of exclusivity in any way; rather, it dictates in which circumstances a sublicense must be issued under section 5.

4. As one of the requirements for SAIL to be executedThe Licensee and the Investor must establish an investment instrument between them, which in most cases should be one through which the Licensee issues convertible debt to the Licensor. SAIL is designed to be compatible with almost any investment type agreement, but strongly favours use of well-established instruments such as the SAFE, the KISS, or standard convertible notes (Coyle & Green, 2018). Because the convertible debt issued through SAIL has a variable component (Future Costs), while most such agreements were created with a fixed amount in mind, some modifications will likely be necessary. Licensors are strongly encouraged to make such modifications to their templates ahead of time and make these templates public in service of the community and of effective and streamlined tech transfer.

   In creating these investment agreements, care should be taken to ensure that:
   a. Definitions are consistent between SAIL and the Investment Agreement used;
   b. The Triggering Events listed in section 9 are consistent with the Triggering Events for which the investment agreement for convertible debt converts to equity, if applicable;
   c. No clauses in the investment agreement conflict with SAIL; and
   d. All clauses in the investment agreement are consistent with the axioms of tech transfer.

   In particular with respect to item d. above, SAIL discourages the use of agreements that involve ongoing interest payments on the convertible debt, these being incompatible with the axiom of value creation.

   As a reminder, the formula for calculating the amount of convertible debt suggested by SAIL is:

   Convertible debt = Past Costs + Unaccounted Support Costs + Future Costs - Upfront Fee

5. Exclusive control is required to ensure a path to ownership transfer per the axiom of ownership. However, this could in principle conflict with the axiom of benefit: if a third party wants to use the Technology in a field unrelated to the Primary Field of Interest, this represents potential economic or social benefit that is now blocked by the exclusivity of SAIL.

   Required sublicensing is SAIL's attempt to balance these conflicting axioms. SAIL requires that the Licensee define a Primary Field of Interest, which defines sectors in which it is not required to engage interested third parties in sublicensing discussions (though nothing prevents the Licensee from doing so if it chooses). If a third party expresses interest in using the licenced technology for an application outside the Primary Field of Interest, the Licensee must either pursue commercialization in that field itself, or issue a sublicence to the third party.

   Licensees have a dual incentive to comply. Failure to issue a sublicence or to commercially exploit the technology in the field of interest of the third party in a reasonable time allows the Licensor to issue a licence to that third party directly (5.b), which immediately invalidates the transfer of ownership enabled under Section 9 given that the Agreement is no longer exclusive. If so, not only does the Licensee forgo the royalties they would otherwise collect from a sublicensee, they lose the possibility of taking ownership of the Technology and its IP.

   However, this requirement to sublicense does not survive termination of SAIL upon transfer of ownership of the licenced technology under section 9. IP ownership assignment to the Licensee signals trust that the Licensee is a good candidate to carry the technology forward, and so access

control is vested in the Licensee from that point onward. This also serves as an incentive to the Licensee to take ownership of the IP portfolio as soon as the option for assignment arises.

Sublicences should be royalty-bearing. While this conflicts with the axiom of value creation, preceding axioms are of greater importance. In any event, sublicences of this sort are not necessarily going to be to startups, making royalties more appropriate.

There is a flow-through mechanism to ensure that the Licensor can benefit from sublicences as well, since a percentage of sublicensee net sales must be passed on to the Licensor**.** This is money owed to the Licensor by the Licensee (who must collect it from sublicensees).

Sublicences should not themselves allow sublicensing. The primary Licensee is intended to be the single source for all access to the IP.

When constructing sublicenses, it is important that the terms of those sublicenses be no more onerous than SAIL as it is the intention of the agreement that the control of sublicenses should pass to the Licensor. SAIL does not require this, however, giving the Licensor the option but not the obligation to take over. As a critical element of due diligence as a potential sublicensee to a SAIL agreement, the SAIL crew strongly recommends that the Licensor be asked to review the terms of the sublicense and to commit to taking it over if the event the Licensee loses control of the Technology for whatever reason. Failure to do so could result in automatic termination of sublicenses on failure of the Licensee, a risk that can be mitigated early through clear and open communication between all Parties.

6. The Research Institution retains rights for non-commercial use of the licenced technology, and it is critical that nothing in any SAIL agreement, including confidentiality provisions, prevents a Research Institution from publishing further on the topic. While SAIL does include a lightweight non-disclosure agreement (NDA) in section 12, the right of the Research Institution to conduct and disseminate research should take priority as long as the Licensor (or on instruction of the Licensee) has been given an opportunity to secure IP rights beforehand. However, SAIL does include provision for a reasonable embargo period on publication in order for the Licensee to have time to evaluate the content and seek IP protection if appropriate. The exception to the review period is thesis defenses, which cannot be delayed for any reason, a requirement that comes directly from the tri-council agencies as a condition of research funding.[4] In cases where a thesis contains IP that must be protected, SAIL allows for an embargo on public release and a private defense, but does not allow for any delay in either submission or defense.

   This clause is the main reason why the Research Institution role may be better separated from the role of Licensor**.** While the Licensor may not need any retained rights, the Research Institution always will.

7. SAIL seeks to avoid new IP originating in a lab that generated licenced technology leading to conflicts related to freedom to operate without unfairly encumbering future academic research. To this end, a subset of Improvements generated by the Research Institution falls into the definition of Included Improvements, and may give the Licensee the option, but not the obligation, to have any such IP included in the licence upon payment (or inclusion in Future Costs) of the associated Accountable Costs incurred by any other Party to SAIL in securing it.

[4] See: NSERC Policy on Intellectual Property, available here.

The core intention of the way Improvement (and subsequently Included Improvement) is defined in SAIL is that it is unlikely that any third party could use an Improvement without a license to the Technology already licensed under SAIL. In other words, Included Improvements are by definition utterly useless to any third party that does not have access to the Technology, and so there is no reason or incentive for it to be licensed to anyone other than the Licensee in the first place. In AUTM parlance, Improvements are “dominated by” the Technology (AUTM, 2007).

The definition of Included Improvement in section 1 lays out what constitutes an Improvement to the Technology to which the Licensee has the option to include in the Technology. Given that it represents control over future IP, Included Improvements narrows that which is included even further than merely Improvements, being restricted in four key ways.

First, an improvement is only included if it is created by a researcher at the Research Institution that is Party to SAIL. Second it must share at least one inventor with the Technology already licensed. Together, these first two restrictions limit Included Improvements to those that are related to what is already Licensed, and immediately frees inventors of any ongoing licensing obligations if they move on from the Research Institution.

Lastly, Included Improvements are limited to those inventions to which the Licensor can grant a licence. While this seems obvious, there is a subtlety here that this third restriction seeks to make explicit: not all tech transfer offices have standing to bind researchers to give up future IP. For example, Research Institutions that have inventor-owned IP policies, those that use arm’s length tech transfer offices, and those whose collective agreements forbid encumbering future IP, all cannot sign a contract that encumbers future IP rights. In these cases, there is an explicit option in section 2 that nullifies all Included Improvements, but this part of the definition serves as an extra layer of safety in case there is any confusion.

While not explicitly time-limited, access to Included Improvements terminates with SAIL following exercise of the option to take ownership of the Technology under section 9. This ensures that Research Institution staff are not unduly encumbered in the long term, which could at some point come into conflict with the axiom of benefit, and in most cases can be expected to practically limit the effect of this clause to just a few years. This is directly consistent with best practices suggested by AUTM (AUTM, 2007). Given that Improvements are dominated by the Technology even after SAIL terminates, it is expected that they will continue to be licensed to the Licensee simply because they are not useful to any third party by definition, but at this point the Licensee is expected to be in a position to be able to negotiate a license that does not need to be compliant with the axioms given that they will be better established.

8. It is critical to further policy improvements that Licensees of academic technology provide data relating to their long-term use of IP generated using public funding. This section is intended to impose a vital reporting requirement on Licensees, ensuring that the Licensor remains apprised of all entities that have access to the technology, and has a general idea of the commercial success of the IP portfolio through ongoing reporting of revenues. It also gives the Licensor the power to audit the Licensee to ensure compliance. It is expected that data collected in this section should be aggregated by the Licensor and made public in service of continued improvements to the framework. The specific data to be collected is also likely to change over time, and while SAIL does not force acceptance of additional reporting requirements on Licensees, they are encouraged to comply with the latest set of data to be collected in service of broader ecosystem

development. Importantly, Licensee are expected to include compatible reporting requirements in any sublicenses issued, to enforce that data collection, and to pass such information on to the Licensor as part of their own reporting requirements.

Research Institutions rarely litigate or take any action to enforce contractual obligations, an issue that severely impacts compliance with data collection requirements. Licensors are encouraged to act to enforce these requirements where necessary. In recognition of historical failures to collect useful metrics of impact arising both fromm noncompliance and nonenforcement of related obligation and the use by public funding agencies of metrics that are generally not indicative of actual impact, the SAIL crew suggests that a mandate to report data arising from licensing should be included in grants issued to Research Institutions as a matter of (enforceable and enforced) public policy.

Understanding the complexities of acquisition, the SAIL crew strongly recommends that, in the event a SAILor is acquired by a company headquartered outside of Canada, that the Licensee seek a commitment by the acquirer to continued reporting with respect to control and access over the Technology.

SAIL leaves open the possibility that the Parties agree to additional data collection above and beyond what is included in SAIL by default. Other metrics to consider include:

To collect at time of execution:

1. Technology sector
2. Licensee country of control
3. Time between negotiation initiation and licence execution
4. Value of Past Costs, Unaccounted Support Costs, Upfront Fee, Buyout Fee and other editable fields in SAIL
5. Other Triggering Events are listed in the Agreement
6. The initial cap table for the company?
7. The agreement type used for section 4
    a. Is a template of the agreement publicly available?
    b. Assuming convertible debt, what is the valuation cap / discount / interest rate?
    c. Assuming equity, is there anti-dilution protection?
    d. Is the agreement compliant with 6 axioms of tech transfer? If not, which are non-compliant?
    e. Any modification to the SAIL formula for convertible debt
8. Is the company a spinout or an external startup?
    a. Is the PI of the lab involved?
    b. Are postdocs involved?
    c. Are grad students involved?

To collect at Buyout Event:

1. Time delay between SAIL signing and the occurrence of a Triggering Event
2. Value of the investment round that caused the Triggering Event, if applicable
3. Time delay between the occurrence of a Triggering Event and exercise of the buyout option

To collect quarterly (or annually) for 10 years or until no longer relevant:

1. Current value of Future Costs (estimate of costs absorbed into convertible debt)

2. Breakdown of components: what support, if any, are the other Parties providing to the Licensee for which the Licensee is being charged (either directly or via addition to Future Costs)? Consider:
    a. Lab space lease
    b. Access to equipment
    c. Incubation program
    d. IP management services
3. Total amount of Accountable Costs that were not added to Future Costs but were instead charged to the Licensee for immediate payment
4. How many and what type of Included Improvements have been added to the Technology?
5. List of all entities with access to any of the licensed IP for commercial use (e.g. through sublicensing),
    a. Country of control of the parent company of same
6. Total revenues and source (country)
    a. Revenues and source (country) arising from products and services that incorporates the Technology
    b. Revenues and source (country) arising from sublicensing of the Technology
7. Any new financing into the company
    a. Close date
    b. Type (debt, equity, crowdfunding, etc)
    c. Amount
    d. Valuation, if applicable
    e. Post-money cap table
8. Number of employees
9. Rate of Licensee compliance in reporting of the above
10. In which new jurisdictions have IP relating to the Technology been filed?
11. In which jurisdictions have IP protections been lost, and why?
12. Amount of new spend on IP protection-related costs

To collect on Liquidity Event:

1. Type of liquidity event (IPO, acquisition, closure, etc.)
2. Country of control over the Technology following the event
3. Value of liquidity event to each Party to SAIL, both absolute and relative to the cost of investment made under SAIL
4. In the event of the acquisition, did the acquirer agree to continued data collection?

9. Ownership transfer of the licenced technology is one of the core elements of SAIL that sets it apart from other express licences. When the market signals that the startup is a viable entity (which SAIL suggests should be after closing a priced round), the startup acquires the right, but not the obligation, to take ownership of the IP portfolio. Other Triggering Events can also be used, if appropriate. For example, situations in which the benefit sought is social, rather than economic, may involve other indicators of viability that should be included as Triggering Events, and the investment agreement executed under section 4 may involve other key events or milestones that should be considered Triggering Events for SAIL.

    If the startup is not in a position to pay the Buyout Fee or wants to continue to receive the support of the other parties to SAIL, then it should not be forced to take ownership until it is ready. There is still an incentive to acquire ownership since otherwise the Licensee can be required to grant

sublicenses, and ongoing support via deferral of cost recovery to Future Costs is only available by agreement. Licensors and Research Institutions are encouraged to stop deferring costs to Future Costs entirely after a Triggering Event has occurred, even in cases where exercise of the right to take ownership is delayed for any reason, so as to avoid incentivizing further delays. The Buyout Fee can be absorbed into Future Costs, and in this way can serve as a soft form of anti-dilution protection that is unlikely to deter other investors, provided it is reasonable.

Transfer of ownership is of clear importance to investors and founders. Interestingly, it is not part of most express licence frameworks, a direct consequence of the influence of American policy (specifically the Bayh-Dole Act) on Canadian tech transfer practices (Durand & Briggs, 2025). Ownership transfer is in the best interest of the Licensor and Research Institutions as well, provided that the Licensee has demonstrated that they are a viable receptor of the Technology as indicated by the occurrence of a Trigger Event, given that Research Institutions rarely have the resources to act to enforce or even review contracts in the long term. SAIL, designed as it is to terminate within a few years in most cases, is expected to reduce related administrative burden in the long run.

Once ownership has transferred, the Research Institution has no further need or obligation to provide support. This timing is intentional: the trigger event of a priced round will coincide with the time when a startup no longer needs support, and should be able to afford to pay for that support itself (for e.g. lab space, IP services, legal, etc.). Accordingly it will no longer require (or have the option) for support payments to be deferred into convertible debt. However, section 9(6) survives termination of SAIL, and represents an assign-back clause in the event that the Licensee fails. This is done in support of the axiom of benefit, potentially allowing valuable Technology to be recycled for another attempt. This assign back has a carveout, however, that will block the assign back if some other obligation takes precedence, a carveout intended to allow for the possibility that the Technology be used as collateral, for example for IP-backed financing.

10. Until ownership is transferred, the Licensor should continue to manage the IP portfolio and can, by agreement with Licensee, add any associated fees to Future Costs. In this way, the Licensor is rewarded for taking on costs for the Licensee in the vulnerable early stages, promoting adherence to the axiom of value creation.

    Importantly, the Licensee is not actually obligated to pay any fees relating to IP management as long as they communicate their nonpayment intention ahead of time, but if they choose not to, they may forfeit license to the related IP. To avoid any issues, SAIL encourages proactive dialogue between the Parties. The Licensor should communicate expected fees to the Licensee as far in advance of incurring them as possible, and should work with the Licensee to minimize costs related to IP portfolio management. Failure to provide reasonable management services is the only other circumstance in which SAIL allows a transfer of ownership from the Licensor to the Licensee aside from section 9.

11. In cases of third party infringement of rights conferred related to the licenced technology, all parties must inform the others. The Licensee decides what, if anything, to do about it, at its own expense, though the other Parties can help and may choose to defer associated costs to Future Costs. The Licensor can initiate proceedings if the Licensee does not, and does not oppose such an action, but this is unlikely to occur in practice. Litigation relating to the IP should be a collaborative process. While SAIL lays out the procedure for litigation clearly, the intention is that

it should only proceed through clear communication of strategy between the Licensor and Licensee.

12. This section provides a lightweight NDA applicable to all the parties. SAIL is agnostic to the type of NDA included, provided it is compatible with the rest of the agreement and that section 6(4) takes precedence. While the NDA provided binds all Parties, it may be appropriate to limit it to just the Licensor, Research Institution, and Licensee in cases where the Investor is a separate entity to one of these, since many investors do not sign NDAs as a matter of course. This exclusion is compatible with SAIL.

13. Research institutions do not usually accept liability or provide indemnities when licensing technology. The Licensee will almost certainly have to indemnify the other parties against incurred liabilities to pay or compensate another person for damages or losses. The indemnity and limitations of liability here are minimal, and effectively indicate that, barring gross negligence, the Research Institution cannot be held liable for damages, and that the Licensee

14. Dispute resolution is to be done via arbitration, which is both standard practice among existing express licenses and should provide a relatively simple process if things ever get acrimonious.

15. SAIL remains in effect until either all the registered IP associated with the licenced technology expires, or the agreement is terminated. Termination can happen in several ways: the Licensee can terminate for convenience, the Licensor can terminate if the Licensee breaches a term of the licence or fails as a business or SAIL automatically terminates when ownership of the IP is transferred. Note, however, that several important clauses survive termination, as noted in section 16(9), including:

    a. The investment agreement issued under section 4 and attached to Schedule B;
    b. section 3(2), which disclaims any warranty for the IP;
    c. section 9(5), which simply reiterates that some provisions survive termination;
    d. section 9(6), which provides an assignment back to the Licensor in the event of a failure of the Licensee;
    e. section 12, the NDA, which includes ongoing obligations to confidentiality for a period of 1 year post-termination;
    f. section 13, which limits liability and indemnifies Parties as previously noted; and
    g. section 14, which dictates how disputes are resolved.
    h. All payment obligations, including ongoing pass-through royalties from sublicenses.

16. The general provisions are in all intended to be standard boilerplate clauses, simplified to be in plain language. Importantly, note that several clauses in SAIL survive termination, and should be reviewed carefully, as noted in the previous section.

Schedule A

In this section, a complete list of the Technology that is licensed under the Agreement should be attached. Note that this is not limited to patents, but could include:

1. Patents
2. trademarks
3. copyright

4. plat breeder rights
5. industrial designs
6. trade secrets
7. data
8. service marks
9. brand names
10. trade dress
11. logos
12. trade names
13. domain names
14. corporate names and other indications of origin
15. the goodwill associated with IP and related registrations in any jurisdiction
16. applications in any jurisdiction to register IP including any
    a. extension
    b. modification, or
    c. renewal of registration of application
17. extension, modification or renewal of registration or application,
18. inventions, discoveries, designs and ideas, whether patentable or not, in any jurisdiction
19. applications for patents, including
    a. divisions
    b. continuations in whole or in part
    c. renewal applications
    d. any renewals, extensions, reexaminations, or reissues in any jurisdiction
20. design registrations and applications, in any jurisdictions
21. non-public information or Confidential Information
22. trade secrets and Confidential Information, including
    a. know-how
    b. technical data
    c. manufacturing and productions processes and techniques
    d. customer and supplier lists
    e. pricing and cost information
    f. business and marketing plans and proposal and rights in any jurisdictions to limit use of disclosure by any person
    g. writings
    h. computer software
    i. other works, whether copyrightable or not, in any jurisdictions
    j. registrations or applications for registration of copyrights in any jurisdictions,
    k. renewals and extensions

Schedule B

This is intended to contain the investment agreement between Licensee and Investor in consideration of SAIL, and provides some guidance toward its establishment, which is reproduced here.

Choice of Financial Model: Understanding that selection of technology transfer and financial model is challenging, SAIL was designed to allow the Parties to use their own investment agreements, favouring convertible debt as the mechanism of institutional benefit, mediated by any one of the SAFE, the KISS, or some form of convertible note. In addition, convertible debt adheres to all of the SAIL axioms discussed in Schedule D and constructed in Durand & Briggs, 2025, with the amount given in the formula below. However, recognizing that ‘one size does not fit all’, there are exceptional situations where institutional reward mechanisms may violate one or more of the SAIL axioms, especially in cases where straight equity, royalties, or a hybrid model are used.

For example, simple equity can be considered, even though it violates the axiom of valuation, if insistence on use of convertible debt for that tech transfer deal would result in a violation of an axiom with higher weight (those being the axioms of benefit, ownership, and value creation). Likewise, royalties can be considered even though they violate the axiom of value creation in cases where non-use of royalties would for some reason violate one or both the axioms of benefit and ownership.

If some mechanism other than convertible debt is used, careful thought should be given as to the rationale for why, considering the 6 SAIL axioms and their relative importance.

Factors to consider in constructing the investor agreement:

1. Quantification of the amount of convertible debt, if applicable, which SAIL recommends be calculated as follows:

   Convertible Debt = (Past Costs + Unaccounted Support Costs + Future Costs) - Upfront Fee

2. The definition provided for Past Costs and Future Costs is intended to capture only those costs that are already being accounted for in the course of any licensing transaction (Accountable Costs), while Unaccounted Support Costs provides a mechanism for universities to be rewarded for the intangible or unaccounted-for support they provide, thereby ensuring that executing and managing a SAIL agreement is no more administratively complex than any existing licensing process while fairly compensating all Parties for their contributions.
3. Use of a nonzero Upfront Fee to be paid upon signing and which reduces the convertible debt, for example as a demonstration of commitment by the founders;
4. Perception of the financial model among first-round investors in the startup and the impact of the licensing deal on the ability of the Licensee to attract early capital for pre-revenue development
5. Note in particular that angel investors, who often prefer to invest using convertible debt and who are often the primary source of risk-tolerant capital available to pre-revenue startups, are generally resistant to any form of anti-dilution protection on the part of other entities on the Licensee cap table. Use of anti-dilution protected in the agreement may negatively impact the ability of the Licensee to raise further risk-tolerant capital in the early stages, and is discouraged. Instead, SAIL encourages use of valuation caps, discounts, or pro-rata rights in conjunction with convertible debt as a means to secure effective anti-dilution protection without reducing the Licensee's chance of raising early third-party investment, in accordance with the SAIL Guidance Document.
6. Additional Triggering Events for conversion of the debt to equity as may be situationally appropriate. Triggering events listed in the convertible debt agreement should be explicitly added to section 9.a. such that conversion of the debt to equity coincides with the option to take assignment of the Licensed Technology.

Schedule C

This is intended to contain any ancillary agreements that relate to SAIL in some way, the most common being agreements between the Research Institution and the Licensee for use of lab space, equipment, or services. Other types of agreements that could be contemplated here are Material Transfer Agreements, Sponsored Research Agreements, or Non-disclosure agreements whose scope differs from that included in SAIL. This section provides some lightweight guidance on typical terms that should be considered in

such agreements. It is the responsibility of the parties thereto to ensure compatibility of the clauses in that agreement with those in SAIL.

Such agreements should, where applicable, explicitly delineate which related costs, if any, will be added to Future Costs.

Schedule D

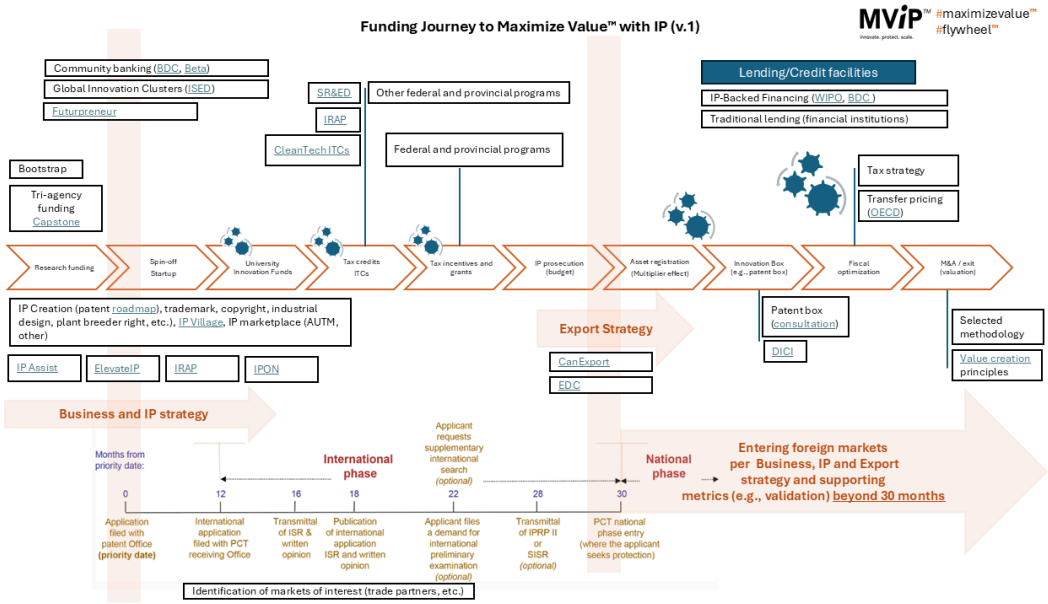
Schedule D provides non-binding drafting guidelines to assist with setting up a SAIL licence, which is to say, it refers to this document.

Competition Matters

While Rambe et al. suggests that tech transfer agreements enhance competitiveness (Rambe & Khaola, 2023), others indicate that competition or antitrust law issues may arise when adopting standardization activities (de Sousa, 2019) such as: using standard form contracts (Patterson, 2010), standard essential patents (SEP), or FRAND (from a European perspective (Bruzzone & Capozzi, 2019; de Sousa, 2019), among others (ITU, 2024)).

What's next?

Licensing is just the first step of a complex process, and while the Licensor is responsible for management of the IP, the Licensee is responsible for strategy, and so it is critical that the Licensee understand and anticipate every step of the process.



There is no substitute for legal advice - disclaimer

SAIL was created to facilitate tech transfer, but it is not a substitute for legal advice which remains essential to avoid missteps. A qualified lawyer can assist with:

1. developing an IP strategy or roadmap for commercialization with an overview of:
    a. the jurisdictions in which the IP portfolio is to be prosecuted,
    b. past, present and future fees relating to the IP portfolio,
    c. time sensitive deadlines, including national phase entries in one or more jurisdictions;
2. understanding the timeframes required or expected to negotiate licences and buy-out events (ie, longer than you think);
3. Engaging early with the TTO.

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