Towards Ethical Research in Health Impact Assessment

Context

How Does Health Impact Assessment and Ethics Intersect?

Ethics are an important, and common, concern in health impact assessment (HIA) but also in impact assessment (IA) generally. How should a primary research program, covering sensitive health issues, be designed and carried out? What should a practitioner do when their client does not like what a community expert has to say? How should a practitioner respond when their client indicates that they need the assessment sped up? How can a practitioner ensure that an interviewee with controversial views in a community does not face backlash? How can a proponent ensure that their consultants are doing what must be done to build trust in a community? How can a proponent ensure that they will not face any legal risks brought about by their consultants' research? How can an IA regulator ensure it does not face any legal risks? How can an IA regulator promote reconciliation through ethical IA practice? These are but a few of the research ethics issues that commonly arise in IA and are certainly relevant in HIA given the sensitivity of many health issues.

Morals, Responsibilities, and Risks

Ethics are moral guides for conduct, and so ethical research is about conduct in a manner consistent with relevant values, principles, objectives, and policies (Vanclay et al. 2013). Ethics in this context concerns how practitioners design and carry out research, and how they deal with and report on the data they gather. In a HIA context, these issues are certainly a concern for primary research, but they are also relevant for secondary research – going and interviewing community members about sexual violence associated with existing resource development projects necessitates ethical practice, but so does the re-interpretation of existing community health data for a new project.

Ethical research also means responsibility – to professional and scientific communities, to IA regulatory bodies, to clients, but perhaps above all, to Indigenous rightsholders, stakeholders and the public (Vanclay et al. 2013). As a member of the IA professional and scientific communities, practitioners have a professional obligation and responsibility to do good work, and therefore ethical research means adhering to best known practices in IA and science. Practitioners also serve the broader IA process that

they are involved in; their duty is to serve this process as best they can. As an agent for clients – in Canada's proponent-led IA system, where most IA practice is performed by consultants for proponents – practitioners have a duty to do good work for their clients and to serve their clients' interests, though this duty must not conflict with practitioners' other responsibilities to their professions but also other parties in the IA process. Chief among these other parties are those who will be affected by projects – Indigenous rightsholders, stakeholders, and the general public, many of whom may interact directly with practitioners as sources of data.

Ethical research is also about risk management (Vanclay et al. 2013). Unethical research, from such things as poor practice (potentially due to lack of qualifications on behalf of the practitioner) or dishonest behaviour, creates risks for research subjects but also practitioners, their proponent clients, and potentially even IA regulators overseeing IA processes. Poor management of sensitive data – such as the interview data from the study of sexual violence in a community – creates risks of harm to those providing data, but this in turn may translate to legal or other risks to the practitioners and proponents that sought the data in the first place if they mishandle it. The existence, use, and adherence to an ethical research framework helps mitigate risk to all parties involved.

Three Sources for HIA Ethics

An ethical framework for HIA practice can be drawn from three sources: (1) the IA profession, (2) Indigenous organizations, given the preponderance of situations in IA in which Indigenous people and values come into play, and (3) Canada's main research funding bodies.

Ethics and the IA Profession

The IA profession, made up of IA professionals but also academics and others involved in IA, and organized into groups such as the International Association for Impact Assessment (IAIA) and Society of Practitioners of Health Impact Assessment (SOPHIA), is a first source of ethical guidance. Ethics in a professional sense means doing good work, being qualified to perform HIA, being an ambassador to the profession, but also mitigating risk to one's self and one's clients and principals (Vanclay et al. 2013). For those IA professionals that are accredited members of a professional association (such as nurses, biologists, engineers), there are sanctions for misconduct, but many doing IA and HIA may not be a member of any particular professional association, and so lacking a professional oversight body that could do much in the way of sanctioning its members, the ethical guidance from the IA professional community is just that, guidance.

From a professional standpoint, the seminal document capturing ethics in HIA practice is the Gothenburg Consensus Paper (ECHP 1999). This document espouses four values

for HIA – democracy, equity, sustainable development, and ethical use of evidence – and explains how these four values can be put into practice. HIA practitioners should be familiar with the Gothenburg paper and its content, and in this regard, practitioners may find it helpful to consult the 'minimum standards for HIA' presented by the SOPHIA (Bhatia et al. 2014), including elements of ethical HIA practice, based in substantial part upon the Gothenburg paper.

The various 'best practice' guides of the IAIA are another good source of guidance to good ethical IA practice from a professional standpoint. IA practice should adhere to the objectives and principles described in Senecal et al. (1999), such as promoting sustainable development and conducting rigorous and credible research. The IAIA's guide to HIA (Quigley et al. 2006) presents values of HIA, adding 'comprehensive approach to health' on top of the Gothenburg paper's four values (McCallum 2017), as well as principles of good HIA practice. Public participation should adhere to the principles outlined in Andre et al. (2006), such as ensuring that participation is equitable and transparent. The IAIA's guide to respecting Indigenous peoples and traditional knowledge (Croal et al. 2012) presents objectives and principles, such as equality of data, free prior and informed consent, and use of traditional knowledge in context. Two papers by Vanclay and colleagues (Baines et al. 2013; Vanclay et al. 2013) cover research ethics in IA specifically and present and illustrate 18 principles for ethical IA practice. The IAIA's guide to social impact assessment (Vanclay et al. 2015) reiterates these 18 principles alongside broader guidance for IA of human environment issues. Lastly, membership in the IAIA requires agreement to the association's professional code of conduct. Some professionals involved in preparing HIAs may have accreditation bodies, others may not, but all IA practitioners can become members of the IAIA subject to its code of conduct, and regardless any practitioner is generally expected to demonstrate ethical conduct as a part of being recognized as a professional (Baines et al. 2013).

Indigenous Ethics

As major projects subject to IA will occur on traditional lands of Indigenous peoples, and many projects will concern Aboriginal rights & title and the interests and values of Indigenous people, ethical frameworks developed by Indigenous peoples apply. Indigenous ethical frameworks are not legally binding in the Western legal sense, but are also not simply guides to good practice; Indigenous ethical frameworks are means of entry to Indigenous data but also codes of behaviour that shape practitioners', proponents', and the entire IA process' prospects. While IA under the *IAA* is now legally required to examine potential impacts on Indigenous people, and IA practitioners currently operate in a policy and societal context of reconciliation, practitioners face substantial challenges given the poor history between Indigenous peoples, researchers, proponents, and governments.

Gaining access to Indigenous data will entail adherence to at least several general principles including: (1) consulting communities prior to beginning research, (2) getting informed consent from community leaders prior to approaching community members, (3) involving communities in research, and building capacity in communities, (4) getting community consent for use, storage, and destruction of data, and (5) providing communities with the ability to comment on report drafts prior to completion (Weijer et al. 1999 in FNIGC 2014). Many communities demand and require much more than this, though. Adherence to free, prior, and informed consent (FPIC) is now the norm, and many Indigenous communities want much more than to be consulted and the ability to comment. In Canada different forms of collaborative IA have been undertaken, such as proponent funding of Indigenous communities' own IAs to be included in or submitted separate from the proponent's IA application, and joint assessment in which IA practitioners work directly with communities. These collaborative models can help address confidentiality and other concerns.

In Canada the First Nations Information Governance Centre has put forth its vision of ethical research in an Indigenous data context, centering around ownership, control, access, and possession (OCAP™) of data (FNIGC 2014). Various guides on use of Indigenous/traditional knowledge are available (e.g., FNEATWG 2004; MVEIRB 2005) and are generally consistent with OCAP™. Importantly, though,

> *OCAP™ is not a 4-criteria shopping list that can be "checked-off" according to the interpretation and interests of someone seeking to use or access First Nations data… [it] must be understood in the context of a particular First Nation or First Nations… What may work for one community may not be appropriate for another (FNIGC 2014, 32).*

What each of the four components of OCAP™ mean for each community needs to be sorted with each community; practitioners need to tailor their research program to the Indigenous communities potentially affected by the project. The IA community must be clear, though, that Indigenous ethical frameworks are not always harmonious with other applicable frameworks, such as that of the Tri-Council, discussed next. Practitioners will also benefit greatly from reviewing guidance from the First Nations Major Projects Coalition (FNMPC 2019, 2020) and the Tsimshian Nations (Shandro and Jokinen 2018) to get a further sense of many Indigenous communities' expectations in IA generally, but also with respect to research ethics.

Ethics According to Canada's Tri-Council

Canada's Panel on Responsible Conduct of Research – an arm of what is known as the Tri-Council, made up of the Canadian Institutes of Health Research, the National Science and Engineering Research Council, and the Social Sciences and Humanities Research

Council – has developed a policy on ethical research (SRCR 2016) and published detailed requirements for researchers and research ethics boards (REBs) in its Tri-Council Policy Statement (TCPS, SRCR 2019). The policy highlights overarching values, such as accuracy, fairness, rigour, acknowledgement of data sources, among other things. The TCPS, has three core principles for research on or with people providing data (termed 'participants'):

(1) respect for the person, which concerns participants' ability to freely choose whether they want to provide data, and the need to seek free, informed, and ongoing consent from participants;
(2) concern for welfare, which concerns privacy and control of information, and ensuring that participants are not exposed to unnecessary risks, such as discrimination due to participation in research; and
(3) justice, which concerns fair and equitable treatment of participants, such as ensuring that the benefits and burdens of research are distributed equitably, and being aware of imbalances of power that may exist between a researcher and participants.

The TCPS discusses these three principles in depth and the role of REBs in ensuring ethical research, and presents 139 'articles' describing requirements of researchers consistent with the three core principles.

Functionally, the Tri-Council's TCPS is the standard and authoritative source for research ethics in Canada. As such, any researchers in Canada conducting research at universities, hospitals, and in or for governments are required to develop research proposals and submit them to REBs for approval prior to beginning research. Being the standard, the TCPS can also form the basis for legal actions against researchers and funders under tort (i.e., civil) law. Health Canada and the Public Health Agency of Canada base their own ethics review process on the TCPS (Canada Undated).

Despite this place of the TCPS in research in Canada, the TCPS has challenges with respect to research on Indigenous people. The TCPS is seen by some to conflict with OCAP™ (FNIGC 2014), and the TCPS itself explicitly acknowledges limitations with respect to Indigenous data at Chapter 9, with such wording as

> *This chapter… marks a step forward establishing an ethical space for dialogue… between researchers and Indigenous communities… This chapter… is not intended to override or replace ethical guidance offered by Indigenous peoples themselves… it remains a living document (SRCR 2019, 107).*

The TCPS also acknowledges the apprehension and lack of trust among many Indigenous people towards outside researchers.

Lastly, it must be recognized that the TCPS was not designed for the IA context specifically. The TCPS was designed to guide scientific research, not studies undertaken by private consultants and proponents for the purposes of government permits to undertake development. Therefore, there may be limitations, gaps, and/or incompatibilities between the TCPS and the IA context, though comfort comes from the overlap of the TCPS with IA professional ethics guidelines like that in Vanclay et al. (2013).

Towards Good Ethical Practice in HIA

The comprehensiveness and level of detail in the TCPS, its overlap with other relevant ethical frameworks, but also its being the authoritative source for guidance of research ethics in Canada means that the TCPS is a good foundation for guiding ethics in HIA practice. The next section of this memo synthesizes relevant criteria from the TCPS (i.e., its 'articles') with ethical criteria from the IA professional community and Indigenous sources to produce a list of considerations for practitioners and others involved in HIA. The list of considerations is not a checklist to be self-administered by HIA practitioners but instead signals the range of ethical issues that can arise in HIA and therefore can be used by HIA practitioners as a starting point as they plan their HIA and prepare for research ethics review.

Considerations for Ethical HIA Practice

The list of considerations presented in Table 1, posed as questions, is a synthesis of the ethical guidance reviewed for this memo (see Sources) and is intended as an introduction to the many intersections between research ethics and HIA. The list can be thought of as an initial guide to ethical issues and norms in HIA, but this list may not cover all ethical issues that may arise in an HIA. The standard approach to ensuring ethical research is oversight by a REB, who would ask these types of questions of a researcher, a topic that is explored further in the discussion. If practitioners were to be given the list, they should only use it as a starting point in preparation for formal ethical review and oversight.

Table 1. List of considerations for ethical HIA

Theme	Consideration
Professional Values	1. Are HIA practitioners qualified to conduct the IA? 2. Is the planned research consistent with professional codes of ethics and values? 3. Will the research support the HIA practitioner in being an ambassador to the profession, to the IA community, and to the process as a whole? 4. What is being done to ensure that practice meets, or even exceeds, good IA practice standards? 5. How is undue influence be guarded against?
Level of Ethics Concern	6. Does the HIA research rely solely on information that is publicly available and/or in the public domain? 7. Is the level of ethical review of the research proportionate to the risks that it poses?
Oversight	8. Has the research proposal been developed and submitted for scrutiny prior to its start? 9. Who will be the independent party (i.e., research ethics board) reviewing the proposed research? 10. How will the HIA practitioner's actions be monitored throughout the research program? 11. How will grievances against the HIA practitioner and the research be managed? 12. What will be the ramifications of failures on the HIA practitioners to do research ethically?
Respect for Participants	13. How will respect for participants be demonstrated? 14. What will be done to ensure the HIA research does not stray into matters irrelevant to the HIA? 15. How will deception of participants be protected against?
Consent	16. How will consent for the HIA research be gained, but also maintained? 17. What will be done to ensure that consent is being given voluntarily? 18. How will prospective participants be fully informed of the intended research and how it will be used, prior to their giving consent? 19. How will potential risks to participants be identified and communicated to them? 20. How will consent be documented? 21. What will be done to ensure that the HIA research only begins once consent has been provided? 22. How can consent be withdrawn throughout the research? How can participants have their data withdrawn?
Community Engagement & Inclusivity	23. How will communities of interest be engaged to plan the research and address potential ethics issues? 24. How will community leaders be engaged to get permission to engage with community members? 25. What will be done to ensure that the HIA research examines the diversity that may exist within communities? 26. How is the community engagement process tailored to the particularities of each of the communities of interest? 27. How will adequate coverage of topics pertaining to marginalized and vulnerable people be ensured? 28. How will communities be involved in the conduct of the research?

Theme	Consideration
	29. What will be done to verify and validate interpretation of data? What mechanisms are planned to involve community representatives in data interpretation?
Transparency	30. How will the funding sources of the research be disclosed? 31. How will the client be disclosed?
Methodology	32. Is the HIA practitioner well-versed in the seminal guidance documents in HIA and IA? 33. What will be done to ensure that the proposed HIA methodology reflects current, best known practice? 34. What will be done to ensure that the proposed methodology is appropriate to the research context? 35. How will the proposed methodology (including assumptions and limitations) be made transparent?
Documentation & Reporting	36. How will community engagement for the purposes of ethics management be documented? How will agreement on the research program be documented? 37. How will the accuracy and appropriateness of materials from participants be confirmed prior to finalization of the IA report? 38. How will the results of the research be disseminated publicly and in a timely manner, despite any obligations that the HIA practitioner may have to the client?
Preventing Harm	39. How will harm to participants that may come from their participation be prevented? 40. What policies and/or safeguards are in place to prevent the disclosure of potentially incriminating information?
Confidentiality	41. How will data be kept confidential over the full lifecycle of the information? 42. Will individuals be identifiable from the data? How can data be presented to avoid this? 43. How will individuals' privacy be maintained when the individuals' participation is part of research on whole communities? What will be done to ensure that individual participants are not affected negatively because of their participation? 44. How will any consent to disclosure of identity be documented?
Community Benefits & Respect	45. How will the research benefit communities? 46. How will community advice be acknowledged? 47. How will intellectual property rights be addressed?
Ownership, Control, Access, and Possession	48. How will Indigenous communities' ownership of their data be protected? 49. How will Indigenous communities maintain control over their data? What decision-making process is in place with respect to use of the data? 50. How will Indigenous communities have access to their data? How will access to Indigenous communities' data be controlled? How will Indigenous data be protected from freedom of information requests? What happens to the data upon study completion? 51. How will the research help build the capacity of Indigenous communities to implement OCAP™?
Unanticipated Issues	52. What will be the process for dealing with unanticipated ethics issues that may arise in the course of the HIA research?
Conflicts of Interest	53. How will any obligations that a researcher has to their clients be appropriately balanced with the HIA practitioner's ethical duties to participants?

Theme	Consideration
	54. What process is in place to identify and manage real or perceived conflicts of interest between the HIA practitioner and participants?

Discussion

The list of considerations provided in Table 1 is but a starting point for a larger and more in-depth conversation that is necessary in Canadian HIA, but also for the broader IA community given that ethics transcends human environment and biophysical research topics. The list of considerations in Table 1 is not comprehensive, there is at least some conflict between the different applicable ethical frameworks (such as between the TCPS and OCAP™), and the list does not explore several substantial issues in the IA-ethics nexus, such as how to reconcile IA timelines with ethics review. These kinds of shortcomings should not be surprising.

Ethical practice isn't always clear cut; while the principles and main practices of ethical research may largely be agreed upon, it can be 'messy' reconciling competing objectives in research ethics, and what constitutes ethical practice in IA should be expected to evolve (Baines et al. 2013). Certainly in the IA context in Canada, with issues like reconciliation yet to be fully addressed, but also with broader questions in IA relevant throughout the world under debate, such as how best to balance the input of technical experts with the insight and values of those potentially affected by projects, the rule book for research ethics is yet to be fully written. Therefore, the list of considerations is only a starting point from which the IAAC and IA community can undertake further conversation and build. Overall, this whole memo can be thought of as a first attempt to scope out the nexus of research ethics and IA and lay a foundation for the IAAC and the Canadian IA community to build upon. In the following subsections we present several proposals and review several outstanding issues in HIA research ethics that could be explored further by the IAAC.

Institutionalizing Ethics in Federal IA

This initial research into ethics in IA raises the idea of how the IAAC could institutionalize research ethics in IA, for the betterment of HIA, but also the rest of the IA process. The IAAC would seem to face three options: (1) do nothing and assume that research ethics issues will be addressed as they have been up to this point, (2) acknowledge the need for greater research ethics review in IA but rely on existing institutions to address this need, or (3) establish its own research ethics ecosystem for federal IA.

The first option of doing nothing does not seem tenable given the coloured history of research and ethics in Canada, including in IA, the broader scope and mandate of the *IAA* compared to its predecessors, and the growing expectations and demands of the subjects of IA studies, such as Indigenous communities. Times have changed and it would seem federal IA needs to as well.

The second option of relying on existing ethics institutions may work, but may also under-serve the IA community. First, the IAAC could develop a policy on what types of

IA research should have, or be required to have, ethics oversight. Many desktop IA studies may not require oversight, and primary research studies involving people might be mandated to require oversight, but there may be further needed to hone in on what does and doesn't need oversight. Next, the IAAC could name the research ethics standards to be used, and who is to provide the oversight. The TCPS could be named, and the IAAC might develop contracts with existing REBs within federal government departments, universities, or even from third parties. Any differences between the TCPS and OCAP™ might be left to be resolved as they presently are (or are not). To implement this second option, the IAAC ought to at least bring these ethics bodies and their members up to speed on what IA is and what it is intended to do. The question is: will one or more existing research ethics frameworks be effective for IA, an already heavily contentious policy environment?

The third option is for the IAAC to develop its own research ethics framework. Presumably, at a minimum, a dedicated federal IA research ethics framework would be have its role and objectives articulated in an overarching policy statement, have its policies and guidelines captured in a document like the TCPS, and have its own REB and operating mechanisms. This third and more involved option could naturally look to the Tri-Council – but also the IA professional and Indigenous communities – for guidance on what this framework should contain and what it should look like. There are also research ethics frameworks in operation in Canada's northern territories, and so the IAAC might also look to them for guidance, especially given these territories' vigorous approaches to IA and the strong Indigenous context to IA there.[1] A collaborative approach to the development of a dedicated IA framework could further the pursuit of reconciliation with Indigenous peoples and foster buy-in from the IA professional community. Involvement from the development community would also be constructive. As well, consistent with IA harmonization agreements with provinces and territories' IA agencies, this ecosystem could be developed with, in parallel, or to demonstrate leadership to, these sub-national IA bodies.

Research Ethics Boards for IA

A standard and key element to ethical research frameworks is the REB. While REBs exist in universities, hospitals, in federal departments involved in research (such as Health Canada), and elsewhere in Canada to oversee ethics of research as a condition of funding, there is currently no REB overseeing IA studies in Canada at either the federal or provincial/territorial levels. The IAAC does review IA research plans, and may catch some ethics deficiencies, but is not currently equipped to provide fulsome ethical

[1] The Nunavut Research Institute (NRI) has its own research ethics review process (https://www.nri.nu.ca/scientific-research-licence-application-health-related-research). The NRI was contacted in the course of the research on this memo but no response was received.

review. Several federal government departments have internal REBs, but these may not be fully equipped to handle the breadth of topic matter and issues that may arise in HIA practice. For example, if housing is seen to be a key determinant of health in an IA, will the Health Canada-Public Health Agency of Canada REB be able to handle research proposals on this topic, and will these two government agencies' orientations towards health objectives create a perceived or real bias against proponents and their practitioners? Third party REBs exist for hire, and they might be able to fill gaps. The particularities of the IA process, such as time constraints, interest bias in many of the parties involved, and the IA regulatory and institutional framework, may mean that it makes the most sense for the IAAC to establish its own REB. An IA-focused REB could oversee not just federal IA but also be equipped and mandated to oversee ethics in subnational IA processes. Furthermore, an IA-focused REB could be established and operated as a tool for reconciliation through co-development with Indigenous organizations and designed to ensure ethical practice from both Western and traditional viewpoints. It is not acceptable in publicly-funded research to rely on researcher good will, and in a proponent-led IA system the incentives for ethical research would seem even more tenuous, and so regardless of which of the three options the IAAC chooses to institutionalize research ethics in HIA, an independent and external REB seems necessary.

Is IA the Same as Typical Research, From an Ethics Perspective?

According to interviewees, parties not normally required to adhere to the TCPS have used the TCPS as a guide, but its unclear how well the TCPS serves these 'atypical' research programs. The TCPS, or other ethics frameworks that might be identified, may need adaptation to guide research out of its normal scope.

It certainly seems that the IA context differs from 'typical research' overseen by the existing research ethics framework of the TCPS, but it is not clear how much these differences matter. For one, those doing research would seem to have a strong interest in the outcome of the research. In Canada's proponent-led IA system, impact assessors are usually consultants working for proponents, and the underlying objective of project approval means that certain outcomes from the research are desired. In contrast, the research typically overseen by the TCPS is more closely aligned with pure science, i.e., hypothesis testing without pressure for a particular outcome. In the IA context, there are also politics, between proponents, interveners, and government. The political context, never mind the other defining characteristics of the project proposed and IA context (Joseph 2013), mean that IA institutions have challenges to face. There are also practical realities, such as time. The timelines of proponents and their consultants, Indigenous communities, and the *IAA* itself tend to conflict, never mind the timelines of REBs. Another seeming differentiator between the IA and 'typical' research contexts is the

incidence of risk. In IA research, risks associated with unethical research fall on private consultants and private developers (government proponents aside), which tend to have different incentives and interests than universities, hospitals, and other scientific entities. The question also begs as to whether any risk in IA is shouldered by government IA bodies overseeing the process. It would thus seem that IA needs its own research ethics framework, suggesting that the second option of simply using existing frameworks is not advisable, but from the perspective of research ethics experts these differences in contexts may not be material.

Would all HIA Require Ethics Review?

One point of view is that only certain types of HIA would require ethics review, but from the perspective of modern, broad research ethics, this may be erroneous. Primary research, which in IA would be associated with baseline studies and potentially effects assessment, involving such methods as interviews and hair samples, plainly raise ethics issues such as privacy and control of use of data. Secondary research also raises ethics concerns, such as potential redirection of past research and consequent faulty interpretation, but also issues such as community involvement and whether communities and their members are treated as subjects or participants. Historically HIA in federal IA has been 'light' in breadth and depth, but the new *IAA* intends to change that, and even 'light' HIA can trigger ethics issues. It would therefore seem that the ethics review burden will not just grow naturally in the new federal IA legal context but *should* be grown to make federal IA better for all involved parties.

Challenges Establishing an IA Ethics Framework

Establishing a federal IA research ethics framework would not be without challenges.

First, there are the challenges already mentioned – reconciling IA realities like time constraints and dealing with interest bias, and further exploration of differences between IA and 'typical research' may uncover more challenges. To address time constraints, the IAAC could amend legal timelines, constrain the volume of ethics reviews by screening out IA research that is of low ethics concern, establish guidelines to ethical research along the lines of that in Table 1 to shepherd IA practitioners along, and/or amply resource the IA REB or other REBs that stand in. In theory, at least, good IA practice is more efficient and acceptable to the parties who will be critiquing the results, and so the time invested in ethics review may pay dividends.

A second challenge will be in achieving legitimacy, especially with proponents, practitioners who tend to work for proponents, and rights- and stakeholders. Proponents and their consultants may see ethics review as further IA 'bureaucracy' that creates further time risks, added costs, and more uncertainty, all of which are common complaints. Enforcing ethics review through new *IAA* regulation compared to 'softer'

means may heighten these complaints. Indigenous groups and IA stakeholders may also challenge a federal IA ethics framework, depending on how they were involved in developing it and their positions towards proposed projects.

Furthermore, reconciling a single federal IA framework with a diversity of Indigenous ethics frameworks may be challenging. A key principle of OCAP™ is recognition of differences across communities, and therefore in this context an IA REB's role might be to oversee the process and substance of practitioners' plans with respect to research with the general population as existing REBs do, and then to ensure that practitioners engage with Indigenous communities as these communities desire, leaving substantive ethical issues of Indigenous communities to be worked out between practitioners and Indigenous communities. A related challenge is how to address conflicts between the TCPS (if used as a foundation for the IA framework) and Indigenous protocols – which one should take precedence, or how should conflicts be resolved? Current federal government policy suggests that Indigenous community protocols supersede the TCPS.[2]

An Early Win: A Canadian Code of IA Ethics

Complimentary to the third option of establishing a federal IA research ethics framework, but easily compatible with the second and even first options, would be development of a Canadian IA code of ethics. Many, perhaps most, of the professionals doing IA in Canada do not belong to any particular professional body or have any particular accreditation, and many may not even have a strong sense of the professional and research ethics parameters they ought to operate within. This relatively simple undertaking of developing a Canadian IA code of ethics could be the first of a larger move towards embedding research ethics in Canadian IA. The IAAC might begin by giving consideration to the content in Vanclay et al. (2013) regarding ethical IA, which advocates not just developing a code with the IA community but also championing the code, communicating and acquainting practitioners with the code, creating a forum for professional discussion of ethical issues, enforcing the code, and developing a procedure for addressing code violations. The ethical frameworks of Indigenous groups and the TCPS may also be helpful with respect to code development.

Meshing with Relevant Law

The TCPS is not in and of itself a legal instrument, but through tort (i.e., civil) law it can become the standard to which legal complaints about ethics issues are compared against. There are laws that do exist that are relevant to HIA research ethics, though. The federal *Privacy Act* and *Personal Information Protection and Electronic Documents Act* (*PIPEDA*), sub-national counterparts (e.g., Ontario *Personal Health Information*

[2] https://www.justice.gc.ca/eng/csj-sjc/principles-principes.html.

Protection Act, New Brunswick *Personal Health Information Privacy and Access Act*, Newfoundland & Labrador *Personal Health Information Act*, and Nova Scotia *Personal Health Information Act*), Newfoundland & Labrador *Health Research Ethics Authority Act*, and other laws in Canada may have implications or at least lessons for federal IA, especially given the splits in jurisdiction the Canadian constitution establishes over health but also environmental matters. The relationships between IA, research ethics, and existing laws in Canada should be explored further.

Moving Forward on Research Ethics in HIA

This memo seeks to support further discussion on how to raise the research ethics bar in HIA and IA generally. Going forward, the IAAC might undertake the following next steps. As part of peer review of this memo, the IAAC should engage with the research ethics community, as well as the HIA community, on how to move forward (with either options 1, 2, 3, or perhaps other options). Workshops (over video conference, or in-person when possible) involving ethics experts (e.g., REB members) and HIA practitioners can explore both high-level issues as well as on-the-ground practical challenges and opportunities. Lastly, the IAAC might engage further with the Public Health Agency of Canada who have a joint ethics review process with Health Canada, as the Public Health Agency of Canada's use of research to support governance roles (such as enforcing public health rules) may have important parallels to the IA context.

Key Points to Remember

1. Historically, IA research has often had ethical shortcomings, and this has contributed to distrust of IA practitioners and IA generally.
2. The IAA expands the scope of HIA, and with this comes a greater need to consider research ethics.
3. IA research ethics can draw from several bodies of thought, including professional ethics, Indigenous ethics, and the Tri-Council's detailed ethics framework. The Tri-Council's ethics framework is a strong foundation for IA research ethics, but it is not perfect nor the final word on matters such as Indigenous data.
4. Research ethics is multi-dimensional and requires knowledge, time, and effort. Ethical research requires that IA practitioners be proactive in their pursuit of ethics in their practice, but other parties in an IA process also play important roles in ensuring ethical research takes place.
5. There are standard practices and conventions that HIA practitioners and the IA community can use to guide their research, but research ethics is not one-size-fits-all, and ethics is evolving, especially in the Canadian IA context.

6. HIA may be the focal point for research ethics review in IA, but other IA disciplines also raise ethics issues. Therefore, an IA research ethics can be developed more broadly than for HIA alone.
7. The scope of the new *IAA* raises the need for research ethics governance, and several options, ranging from doing nothing to developing an IA-focused research ethics framework are possible. Various questions need to be explored and resolved.

Sources

Key Sources

Bhatia, R., L. Farhang, J. C. Heller, M. Lee, M. Orenstein, M. Richardson, and A. Wernham (2014). Minimum Elements Practice Standards HIA. Society for Practitioners of Health Impact Assessment. 11 pp.

This document captures good practice from the views of a prominent international HIA organization, though the authors are American and Canadian. The guidance presented is this document is aligned with the Gothenburg Consensus Paper and lays out the foundation for good HIA. The document presents both 'minimum standards' and 'practice standards', with the former being elements essential to good HIA and the latter being guidance on how to go about doing good HIA. Eight minimum elements are presented (e.g., HIA involves and engages stakeholders affected by the proposal, particularly vulnerable populations), and eight practice standards are presented (e.g., standards for monitoring, including with respect to monitoring plans, methods, and results). This document is a good resource to support practitioners in achieving good practice HIA generally, but also with respect to being ethical in the course of HIA practice.

ECHP (European Centre for Health Policy) (1999). Health Impact Assessment: Main Concepts and Suggested Approach (Gothenburg Consensus Paper). Brussels, Belgium, WHO Regional Office for Europe / European Centre for Health Policy. 10 pp.

This seminal document establishes an internationally accepted foundation for HIA. A basic approach (method) for HIA is presented, key values are presented (democracy, equity, sustainable development, and ethical use of evidence), principles and practical considerations are presented, and key terms are defined. This 11-page document should be in all HIA practitioners' files.

FNIGC (First Nations Information Governance Centre) (2014). Ownership, Control, Access, and Possession (OCAP™): The Path to First Nations Information Governance. Ottawa, First Nations Information Governance Centre. 49 pp.

This report provides the context for and description of key principles in the research of Indigenous topic matter and the use of Indigenous data. The main contribution of this document is in its explanation, in detail and with case studies, of OCAP™, or ownership, control, access, and possession of data. The report discusses conflicts between OCAP™ and Tri-Council research ethics policy, as well as myths and barriers associated with implementation of OCAP™. Tools for implementation are shared. This document should be read and understood by all HIA practitioners involved in Indigenous health issues, as well as by all IA practitioners seeking to use Indigenous data.

FNMPC (First Nations Major Projects Coalition) (2019, 2020). Major Project Assessment Standard and Appendices. 41, 62 pp.

This document was developed by BC First Nations and captures expectations of proponents (and their consultants) and Crown agents in the IA process. The document presents nine principles (e.g., Principle 9: Adequate information will be provided to inform consent decisions made through First Nations' Worldviews) which are fleshed out by over 100 criteria and sub-criteria. The appendices provide additional guidance, including Appendix 4 entitled "Indigenous Health Impact Assessment". Much of this material is relevant to research ethics and is therefore a good resource to begin planning for Indigenous engagement in a HIA.

SRCR (Secretariat on Responsible Conduct of Research, on behalf of the: Canadian Institutes of Health Research, Natural Sciences and Engineering Research Council, and Social Sciences and Humanities Research Council) (2019). Tri-Council Policy Statement Ethical Conduct for Research Involving Humans (TCPS 2 2018). Ottawa. 223 pp.

This document contains the Tri-Council's current policy with respect to research ethics involving people as data sources. The document is over 200 pages and is the key source for understanding, in detail and as illustrated through case studies, the Tri-Council's expectations of researchers and funders. Much of the content is relevant to IA research that gathers data from communities and individuals. Chapters cover the consent process, equity, privacy and confidentiality, research ethics boards, conflicts of interests, research involving Indigenous people, and more. Practitioners seeking detailed guidance on particular ethics issues will do well to consult this authoritative source with the caveat that this document may conflict with other ethical frameworks, such as OCAP™.

Vanclay, F., J. T. Baines, and C. N. Taylor (2013). Principles for ethical research involving humans: ethical professional practice in impact assessment Part I. Impact Assessment and Project Appraisal 31(4): 243-253.

Baines, J. T., C. N. Taylor, and F. Vanclay (2013). Social impact assessment and ethical research principles: ethical professional practice in impact assessment Part II. Impact Assessment and Project Appraisal 31(4): 254-260.

These two journal articles provide a good overview of ethics in human research in IA, with the first paper providing an introduction to research ethics and presenting 18 principles and key concepts, and the second paper exploring the principles in more detail. Interestingly, the second paper makes a call to the International Association for Impact Assessment to provide a REB service. These papers are a good overview of IA ethics not just for HIA but for all disciplines involved in IA.

Other Sources

Andre, P., B. Enserink, D. Connor and P. Croal (2006). Public Participation International Best Practice Principles. Fargo, ND, International Association for Impact Assessment. 3 pp.

Canada (Government of Canada) (Undated). Research Ethics Board: Policies, guidelines and resources. https://www.canada.ca/en/health-canada/services/science-research/science-advice-decision-making/research-ethics-board/policy-guidelines-resources.html. Accessed on March 2, 2021.

Croal, P., C. Tetreault and Members of the IAIA IP Section (2012). Respecting Indigenous Peoples and Traditional Knowledge. Fargo, ND, International Association for Impact Assessment. 4 pp.

Gregory, R., D. Easterling, N. Kaechele and W. Trousdale (2016). Values-Based Measures of Impacts to Indigenous Health. Risk Analysis 36(8): 1581-1588. https://onlinelibrary.wiley.com/doi/abs/10.1111/risa.12533.

FNEATWG (First Nations Environmental Assessment Technical Working Group) (2004). First Nations Environmental Assessment Toolkit. 343 pp.

Joseph, C. T. R. B. (2013). Megaproject Review in the Megaprogram Context: Examining Alberta Bitumen Development. Doctor of Philosophy, Simon Fraser University. 507 pp.

MVEIRB (Mackenzie Valley Environmental Impact Review Board) (2005). Guidelines for Incorporating Traditional Knowledge in Environmental Impact Assessment. Yellowknife, NWT. 39 pp.

McCallum, L. C. (2017). Development and Application of Strategies for Health Impact Assessment of Projects and Policies. Doctor of Philosophy, University of Toronto. 298 pp.

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Shandro, J. and L. Jokinen (2018). A Guideline for Conducting Health Impact Assessment for First Nations in British Columbia. Tsimshian Environmental Stewardship Authority. 33 pp.

SRCR (Secretariat on Responsible Conduct of Research, on behalf of the: Canadian Institutes of Health Research, Natural Sciences and Engineering Research Council, and Social Sciences and Humanities Research Council) (2016). Tri-Agency Framework: Responsible Conduct of Research. Ottawa. 20 pp.

Vanclay, F., A. M. Esteves, I. Aucamp and D. Franks (2015). Social Impact Assessment: Guidance for assessing and managing the social impacts of projects. Fargo, ND, International Association for Impact Assessment. 98 pp.

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