Submitting Records of Site Condition - Getting it Right the First Time

This article deals with some common pitfalls to avoid when making a record of site condition (RSC) submission. The article focuses on issues with RSC submissions themselves, rather than on details of the underlying scientific environmental site assessment (ESA) work. ESA reports are not part of the RSC submission, except for conceptual site models. It is important to note that most of the legislative requirements deal with ESA work. This article assumes familiarity with the relevant part of the Environmental Protection Act (Part XV.1) and with Ontario Regulation 153/04 (Records of Site Condition – Part XV.1 of the Act), (the Regulation). Readers unfamiliar with this legislation may wish to refer to the "Background Information About Records of Site Condition" at the end of the article as well as O.Reg. 153/04 and the Environmental Protection Act via www.ontario.ca/laws.

Introduction

The Ministry of the Environment and Climate Change wants to help professional geoscientists and professional engineers avoid time-consuming and often frustrating mistakes in the record of site condition (RSC) submission process by sharing some common errors so they can be avoided.

As key partners in the redevelopment of brownfield properties in Ontario, professional geoscientists and professional engineers have an important role to play in preparing RSCs in accordance with the Regulation and in maintaining the integrity and dependability of the RSC program.

A significant amount of time and effort is spent by the ministry resolving conflicting or incomplete information which can lead to multiple submissions of the RSC resulting in delays for the property owner and qualified person (QP).

The accuracy of the information submitted is also important for another reason: should a filed RSC contain false or misleading information or certifications, the protection from certain orders which the filing of a RSC creates, does not apply. In addition, QPs may also be subject to prosecution and, if convicted, fined for submitting RSCs that are deficient. In a recent court case related to a filed RSC, a QP was convicted and fined \$16,000.

If you are a professional geoscientist or professional engineer who submits RSCs for filing to the ministry on behalf of property owners, the following information will help you avoid making some common errors and will assist you in getting your RSC submission right the first time.

www.ontario.ca/environment-and-energy/brownfields-redevelopment



PHASE ONE ESA

Submission Requirement

Table of current and past uses required for a phase one environmental site assessment (ESA)

The table of current and past uses of the phase one property is completed, in part, using information gathered during the preparation of the chronological chain-of-title back to the first developed use of the property as part of the phase one ESA.

(The Regulation, s. 16(2)(b) of **Schedule D**)

Common Errors in Meeting the Requirement

- The required format was not followed (see *Guide for completing phase one ESA under Ontario Regulation 153/04*).
- The "Property Use" does not relate to the activities provided in the "Description of Property Use" column.
- The "Property Use" does not follow the uses defined in the Regulation.
- The most recent "Property Use" (i.e., the current or most recent use) does not match the current use provided in the RSC or other supporting documents.
- The "Name of Owner" identified as "unknown" or "private individuals" or "various owners".
- The current owner of the property identified in the RSC does not match the current owner identified under "Name of Owner" in the table.
- The first developed use was not included.
- "Time" was left blank or the time frame of ownership was not provided.
- The "Other Observations from Aerial Photographs, Fire Insurance Plans, Etc." column was left blank. You are expected to enter in some brief information about the property, structures and potentially contaminating activities (PCAs) (e.g., 1966 aerial photograph depicts the phase one property as beginning to be developed with structures. Interviews conducted with the former site manager revealed the presence of a chemical storage area located in the northeast corner of the building). You may identify a "nil" in this area of the table; however, the efforts to obtain information must be documented.

Submission Requirement

Areas of potential environmental concern (APECs) and PCAs

Both terms are defined in O.Reg. 153/04.

(The Regulation, s. 1(1) and Table 2 of **Schedule D**)

- A PCA is identified at the phase one property but an APEC is not (Note: If there is a PCA on, in or under the phase one property, there must be a resulting APEC on, in or under the phase one property).
- APECs are identified in properties adjacent to the phase one property. This
 is an error because APECs can only occur on, in or under the phase one
 property. They cannot occur off-site.

Common Errors in Meeting the Requirement (continued)

An activity is misidentified as a PCA (i.e., the activity does not match any
listed in Table 2 of Schedule D). If there is an area on, in or under a phase one
property where one or more contaminants are potentially present as a result
of a past or present use, but the use is not listed in Table 2 of Schedule D, it is
an APEC, but not a PCA since only the things listed in Table 2 are PCAs.

Submission Requirement

Table of APECs

The table of APECs provides a summary of the PCAs (located on- and offproperty) and the APECs (on the property) and is prepared as part of the phase one ESA.

(The Regulation, s. 16(2)(a) of **Schedule D**)

- The required format was not followed (see *Guide for completing phase one ESAs under Ontario Regulation 153/04*).
- APECs off the phase one property were identified; by definition, APECs can only occur on the phase one property.
- PCAs and APECs are deleted following remedial activities. The table of APECs is a product of the phase one ESA and unless new PCAs or APECs are encountered during or following phase two ESA activities, the version of the table of APECs that appeared in the phase one ESA report is what is submitted with the RSC.
- The PCA number and the corresponding description are either missing or not consistent with wording in Table 2 of Schedule D. The term "Potentially Contaminating Activity" means a use or activity set out in Column A of Table 2 of Schedule D that is occurring or has occurred in the phase one study area and only this.
- The description provided in this column does not match with any PCAs in Table 2. If the activity is not listed in Table 2, then the entry under "PCA" should be "not applicable" (Note: This does not necessarily mean there is no APEC. APEC means the area on, in or under a phase one property where one or more contaminants are potentially present, as determined through the phase one ESA, including through, (a) identification of past or present uses on, in or under the phase one property; and (b) identification of PCA).



PHASE TWO ESA

Submission Requirement

Lateral and Vertical Delineation

Delineation of contaminants in soil, ground water and (where relevant) sediment is required laterally and vertically to the point where the applicable site condition standard is met regardless of whether a risk assessment (RA) will be conducted.

Delineation must be done by assuming the lateral and vertical extent of the area in which a contaminant is present at a concentration *greater than* the applicable site condition standard for that contaminant extends laterally and or vertically to the next sampling location at which the concentration of the contaminant is *equal* to or below the applicable site condition standard for the contaminant.

(The Regulation, s. 7, 16 and 17 of Schedule E)

Common Errors in Meeting the Requirement

- No deeper samples were collected in locations where one or more contaminants exceed the applicable site condition standard.
- Insufficient ground water sampling down-gradient and cross-gradient of locations where one or more contaminants exceed the application site condition standard.
- See Guide for completing phase two ESAs under Ontario Regulation 153/04.

Submission Requirement

Installation of monitoring wells

O.Reg. 153/04 requires a minimum of three monitoring wells to be installed when ground water is being investigated as part of the phase two ESA.

(The Regulation, s. 23(1)(i) of **Schedule E**)

- Either no wells or fewer than three monitoring wells installed or one or more
 of the wells was dry. All three wells must encounter water so that water levels
 can be measured.
- Three monitoring wells installed; but the length of one or more screens exceeds the maximum length of 3.1 metres (i.e., saturated length) (refer to the Regulation, s. 8, paragraph 3 of **Schedule E**).
- Three monitoring wells installed; but, where petroleum hydrocarbons or light non-aqueous phase liquids may be present, the screened intervals of the wells were not positioned to intersect the water table (refer to the Regulation, s. 8, paragraph 2 of **Schedule E**).

Submission Requirement

Phase two conceptual site model (CSM)

The phase two CSM should provide a narrative and illustrative summary of how the contaminants came to the property, the nature and extent of the contaminants at the property, and activities taken to reduce the concentrations of contaminants at the property.

(The Regulation, s. 43 of **Schedule E**)

Common Errors in Meeting the Requirement

- Required information is missing; for example, there is no mention of the
 approximate depth to water table or the approximate depth to bedrock or
 whether section 41 or 43.1 of the Regulation applies to the property. There
 should be a description of what has been considered; otherwise it is not clear
 whether it has been overlooked.
- Cross-sections do not show lateral and vertical delineation of contaminants in soil and ground water for all contaminants that exceed the applicable site condition standard.
- There is no discussion or illustration of the location of APECs at the property.
- The plan view, cross-sections and receptor/pathway diagrams contain postremediation information only. The phase two CSM needs to demonstrate either the current condition of the property where there have been no remedial actions or, where there have been remedial actions, the condition of the phase two property before the remedial actions.



RSC SUBMISSION AND FILING

Submission Requirement

Notification date to municipality(ies) of proposal to use non-potable standards

Where the owner plans to use non-potable ground water standards for the RSC property, the local and any upper-tier municipality must be notified no earlier than six months before the RSC submission date. Where multiple RSC submissions are needed, the six month notification requirement applies to each submission.

(The Regulation, s. 19(2) of **Schedule A**)

- The notification date is more than six months before the submission date of the RSC.
- Where the property is located in both a local and an upper-tier municipality, only one of the municipalities has been notified of the proposal to use nonpotable standards.

Submission Requirement

"Certification date" and "date of the last work"

In the RSC, the QP is required to identify several different dates including, the certification date, the date of the last work on the phase one ESA and the date of the last work on the phase two ESA.

If a phase two ESA has *not* been conducted, the certification date is the day on which the qualified person forms the conclusion that the certifications made in the RSC are true. If a phase two ESA has been conducted, the certification date is the last day on which sampling was done that confirms that the property meets any applicable site condition standards, or any standard specified in a RA, in relation to a contaminant.

The start of the 18 month timeline for an ESA report is the date the last work was conducted (on either all of the records review, interview and site reconnaissance required for the phase one ESA or, all of the planning the site investigation, conducting the site investigation and reviewing and evaluation the information gathered through the site investigation required for the phase two ESA).

(The Regulation, s. 17(1), 17(2), 28(1)(a) and 33.5(1)(a))

- The date identified as the date of the last work on all of the records review, interview and site reconnaissance in a phase one ESA is more than 18 months before the date of the RSC submission.
- The date identified as the date of the last work on all of the planning the site investigation, conducting the site investigation and reviewing and evaluation the information gathered through the site investigation in a phase two ESA is more than 18 months before the date of the RSC submission.
- Additional sampling or phase two investigation activities are conducted following the completion of the phase two ESA report but a failure to document this new information in a phase two ESA report update.
- The date of the last work in the RSC is after the ESA report date, (which is not possible). The date of last work must be earlier than the date the ESA report (or update) is finalized; and
- The certification date is identified as a date that occurs after the ESA report is finalized. Logically, the certification date in both cases (i.e., no phase two ESA conducted or phase two ESA conducted) must be prior to the ESA report or an ESA update report being finalized.

Submission Requirement

Legal description of the RSC property

A lawyer, after reviewing a current plan of survey of the property that has been prepared, signed and sealed by a surveyor and all other necessary documents is required to prepare a letter that includes:

- a legal description of the property;
- a list of its owners and a description of the nature of their interest; and,
- a list of any municipal address, assessment roll number and property identifier number (PIN) applicable to the property.

(The Regulation, s. 4.1(i) of **Schedule A**)

Common Errors in Meeting the Requirement

- The description of the owner's interest in the property is missing.
- The municipal address of the RSC property does not match with the address provided in the RSC or other supporting documents.
- The lawyer references a plan of survey that is not related to the submission.
- Information in the lawyer's letter about the owner, the address, or other property attributes is not consistent with supporting documents and the RSC itself.

The ministry recommends that the lawyer provide a brief plain language narrative tying together the various documents (i.e., the transfer, the parcel register, the PIN(s) and the plan of survey). If the relationship between these documents is not obvious to a lay person or there are inconsistencies in the information, this should be included and explained in the narrative. For example, if the lands are not the entire property as described in the original transfer with the same PIN number, then the lawyer should add additional information explaining the differences and reasons for the differences in accurate but plain language which is understandable to a lay person.

In the simplest case, the property and ownership would remain consistent throughout the ESA/RA/RSC work; however, if not, owners and QPs should ensure there is awareness and accounting for any changes to the property and ownership. For example, if property transactions split the property into separate ownership, ESAs may need to take this into account or be re-done. It is essential that QPs make every effort to keep current, and for them to make this point to others and to ensure the information is documented.

Submission Requirement

Plan of Survey

The regulation requires a copy of a current plan of survey, prepared, signed and sealed by a surveyor showing:

- the RSC property;
- any RA property within which the RSC property is located; and
- the phase one property and any phase two property within which the RSC property is located.

(The Regulation, s. 5(7) of **Schedule A**)

Common Errors in Meeting the Requirement

- The boundaries of the applicable properties (i.e., the phase one property, and, where applicable, the phase two property and the RA property) are not shown on the plan of survey.
- The survey is actually a sketch and not a plan of survey.
- The survey is missing the certifying statement and signature of the Ontario Land Surveyor.
- The plan of survey is not representative (as it is required to be) of current conditions (e.g., boundaries have changed, buildings are demolished or changed, etc.).

In order to further assist you with general information about the requirements of O.Reg. 153/04, the ministry has additional resources available on-line. These resources can be found at **www.ontario.ca/environment-and-energy/brownfields-redevelopment** (those involved with RSC submission should review the actual legislation and obtain appropriate professional advice about it).

Background Information About Records of Site Condition

What is a record of site condition?

A record of site condition (RSC) summarizes the environmental condition of a property, as of a certification date, based on the completion of one or more environmental site assessments (ESAs) conducted or supervised by a qualified person (QP) (some aspects of an ESA must be conducted by the QP and may not be delegated). A RSC, along with supporting documents, is filed electronically in the Environmental Site Registry (ESR) once the ministry confirms that the contents of the RSC meet regulatory requirements.

Who are qualified persons?

Only QPs can conduct and supervise ESAs under the Regulation. QPs must hold either:

- a licence, limited licence or temporary licence under the Professional Engineers Act or
- a certificate of registration under the Professional Geoscientists Act, 2000 and be a practising member, temporary member or limited member of the Association of Professional Geoscientists of Ontario.

Both the QP and the QP's employer cannot have any direct or indirect interest in the property being assessed, reported or certified. QPs also need to have a specified form of liability insurance.

Often the work undertaken to support a RSC is completed by an interdisciplinary team of experts. A QP is the team leader and the person accountable for the quality of work undertaken by the ESA and remediation team – by conducting or supervising the ESA work. The QP is responsible for personally conducting several aspects of the phase one and phase two ESAs as specified in the Regulation and is not signing off on work completed by others. For example, as part of the phase one ESA, the QP must prepare a table of areas of potential environmental concern, a table of current and past uses of the phase one property and a phase one conceptual site model, and there are aspects of a phase two ESA which must be conducted personally by the QP. Anyone wishing to work as a QP must familiarize themselves with these rules, as well as with the other requirements of the regulation.

Where permitted by the Regulation, the QP may be to supervise the work of others (although the QP can still perform this work personally); however, the QP remains responsible for others' work and for the information contained in a RSC. The QP makes the required certifications and statements that the property meets the relevant contaminant standards during the electronic submission process: these steps cannot be delegated.

It is important for a would-be QP to recognize the breadth of expertise that is required for a submission and to take steps to coordinate the team work to ensure it meets the requirements. The team involved with a RSC submission will likely include, in addition to the QP, and technicians and others working under the QP's supervision, lawyers, surveyors, in most cases laboratory technicians, and in some cases toxicologists or others qualified under the Regulation to conduct risk assessments. It is important that they have a common information base throughout the work to prepare for a RSC submission and that the QP ensures this is done.

Why are qualified persons important?

QPs play a key role in ensuring RSCs are prepared in accordance with the Regulation and in maintaining the integrity and dependability of the RSC system. The work and certifications of QPs should provide credibility to the RSCs filed and help to maintain public confidence in the RSC program.

The legislation places a high degree of accountability on QPs. While there is a broad range of persons who are defined in the Regulation as QPs, it is important that anyone falling within the definition and contemplating acting as a QP have the appropriate education and degree of work experience, as well as detailed familiarity with the regulatory requirements.

The property owner(s) and others involved in a property for which a RSC is filed receive limited protection after a RSC is filed to the ESR (see Environmental Protection Act s. 168.7(1)). The RSC provides limited protection from environmental orders. The regulatory protections are lost if the filed RSC is found to contain false or misleading information. Anyone providing false or misleading information may also be subject to prosecution. Since RSCs are commonly relied on in transfers, lending and planning decisions, there may be other consequences for a QP whose work is substandard.

Why is precision about property and ownership important?

The ESR where RSCs are filed tells the public about specific real property. The description of the property and its ownership must be exact. An exact legal description of the RSC property and an up to date and accurate survey are required so the public may see what property has been assessed, how, and where remediation may have been carried out; and so that owners and regulators may know where and to whom the protection from orders applies, and when it is lost, for example, because a contaminant has migrated across the RSC property boundary (this applies to all boundaries of a property, including horizontal boundaries if they exist).

Important Notice

This article contains general descriptions of selected legislative requirements as of July 2015. While every effort has been made to ensure its accuracy, it is provided for convenience only. It is not legal or technical advice and it may not be relied on as such. Anyone involved with submitting a record of site condition should obtain a copy of the relevant Ontario legislation to determine the requirements, and should obtain appropriate professional advice, including the advice of a qualified lawyer, when considering questions about the application or interpretation of this legislation. The legislation is available at **www.ontario.ca/laws**.

For more information, call the Ministry of the Environment and Climate Change at 1-800-461-6290

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