



Independent Cleanup

In its 2000 session, the Wyoming Legislature created new opportunities, procedures, and standards for voluntary remediation of contaminated sites. These provisions, enacted as Articles 16, 17, and 18 of the Wyoming Environmental Quality Act and implemented by the Wyoming Department of Environmental Quality (DEQ), will govern future environmental cleanups in Wyoming.

This outlines the Voluntary Remediation Program's (VRP) Independent Cleanup Process (ICP).

1. What is the ICP and why is it needed?

The ICP is one of two administrative processes under the VRP. It is designed to allow Volunteers who have less complicated cleanup sites and who choose a pre-defined conservative remedial approach to move quickly and confidently through the Program and qualify for a certificate of completion or other liability assurance.

DEQ developed the ICP because not all cleanups present the same types of challenges or risks. Streamlining administrative procedures for Volunteers who have less complicated cleanup sites saves resources for the Department and for Volunteers, and moves contaminated properties back into productive use more quickly.

If you are conducting cleanup because you have experienced a spill or release, the VRP does not replace existing requirements for notification, control, containment, and cleanup of spills established in Chapter IV of the Water Quality Rules and Regulations, or other applicable spill response requirements. If you have experienced a reportable spill or release you must immediately notify DEQ at (307) 777-7781. For more information on spill response, see Fact Sheet #5 *Spill Response*.

2. What types of cleanups are eligible for the ICP?

Cleanups are eligible for the ICP when three conditions are met:

- Contamination is only in soil – no impacts to groundwater or surface water.
- Cleanup will be completed within a reasonable period of time, generally six months or less.
- The Volunteer agrees to implement the pre-defined, conservative ICP remedy.

The pre-defined ICP remedy is excavation (removal) of all soil that is contaminated above concentrations that are appropriate for unrestricted site uses. This means that in the ICP, Volunteers must, through soil excavation, meet the cleanup levels for unrestricted site uses as

defined in § 35-11-1605(a)(ii) and discussed in Fact Sheet #12 *Soil Cleanup Levels* and properly manage and dispose of all excavated material. Cleanup levels and the ICP remedy are discussed further later in this Fact Sheet.

3. How is the ICP different from the traditional VRP process?

The ICP is different from the traditional VRP process in two ways. First, Volunteers carry out cleanup work with reduced DEQ oversight. Second, the ICP does not use preliminary remediation agreements (PRAs) or remedy agreements (RAs).

4. Why is it acceptable to skip PRAs and RAs and reduce DEQ oversight for independent cleanup?

DEQ has decided that it is appropriate to skip PRAs and RAs and to reduce Department oversight for independent cleanups for two reasons. First, cleanup at eligible ICP sites is less technically complex than cleanup at other VRP sites because contamination is limited to soil. Second, the remedy used at independent cleanup sites is pre-defined, well understood, and conservative – all contaminated soil above unrestricted site use cleanup levels must be excavated. Because of this, independent cleanups will not involve development of site use restrictions or implementation of engineering or institutional controls and, since all contaminated material will be excavated, ongoing source control will not be an issue.

DEQ emphasizes that independent cleanups must meet the same technical requirements and cleanup standards as other VRP cleanups, only the administrative portions of the cleanup process have been changed.

5. Are there any potential disadvantages in choosing the ICP?

There may be. When the ICP is used, DEQ generally will not oversee day-to-day cleanup activities or activities in the field, so Volunteers run the risk that DEQ will require additional work, such as additional soil removal or additional sampling and analysis, after reviewing an ICP report. DEQ believes this risk is minimal because the types of cleanup actions that are eligible for the ICP are not technically complex, the standardized ICP remedy is well understood and conservative, and DEQ has prepared detailed guidance on two of the most important site-specific elements of the ICP: soil cleanup levels and confirmation sampling. (This guidance is discussed further later in this Fact Sheet.) Nonetheless, Volunteers should carefully weigh the risks associated with carrying out cleanup with reduced DEQ oversight before entering the ICP.

6. May I use the ICP for only a portion of my site?

Yes. The ICP may be used for an entire site, for only a portion of a site, or for only a specific release. If the ICP is used for a portion of a site or a specific release, only the portion(s) of the site (or specific release) that are addressed by the cleanup will be covered by the certificate of completion or other liability assurance issued at completion of cleanup.

7. What are the steps in the ICP?

The ICP has five steps:

- Step One: Application
- Step Two: Public involvement
- Step Three: Investigation, excavation and confirmation sampling
- Step Four: Reporting
- Step Five: Liability assurance decision

Each of these steps is discussed below.

Step One: Application

8. Why is an application needed?

An application is needed because only certain types of sites are eligible for the VRP, and of the sites that are eligible for the VRP, only certain types of cleanup actions are eligible for the ICP. Volunteers who complete cleanup before applying for the VRP still must complete an application after cleanup is complete so DEQ can verify that they are eligible for the VRP.

In addition, a simple Ecological Exclusion Assessment checklist (see Fact Sheet #14, *Ecological Risk Assessment*) must be submitted, with the application. The Ecological Exclusion Assessment checklist is designed to identify sites where ecological receptors are unlikely to be affected.

9. When do I apply for the VRP and the ICP, before or after I do the cleanup?

Volunteers may apply for the ICP before or after completing cleanup. Volunteers who apply before they have begun cleanup will complete the five steps in the order listed above. Volunteers who apply after completing all or most cleanup activities will complete all (or most) investigation, excavation and confirmation sampling and reporting before submitting a VRP application or completing public involvement.

10. Is there any disadvantage to me if I wait to apply until after I complete the cleanup?

There may be. In addition to the potential disadvantages that are associated with carrying out cleanup with reduced DEQ oversight discussed earlier in this Fact Sheet (see question 5), there are two more potential disadvantages for volunteers who wait until after completing cleanup to apply to the VRP.

First, if you complete cleanup before DEQ makes a determination that your site is eligible for the VRP, you run the risk that DEQ may determine that your site is not eligible for the Program. If your site is not eligible, DEQ cannot issue a VRP liability assurance at completion of your cleanup.

You also run the risk that DEQ might determine that your site is eligible for the VRP, but not eligible for the ICP. If this is the case, DEQ may require additional work (e.g., groundwater sampling) before making a decision about a liability assurance for your site.

Second, you run the risk that DEQ may modify the standardized ICP remedy to require additional investigation or cleanup, or to impose other additional requirements in response to public comment or other site-specific circumstances. If this occurs after you have completed cleanup, the remedy modifications may be more difficult, and more costly, to implement.

As discussed earlier in this Fact Sheet, DEQ believes these potential disadvantages are minimized because the eligibility criteria for the VRP and the ICP are clearly identified, DEQ has issued detailed guidance on two of the most important elements of independent cleanups (cleanup standards and confirmation sampling), and the standardized remedy required for independent cleanups is well understood and is generally the most conservative remedy available. Using this information, DEQ expects that volunteers will be able to make well-informed choices about carrying out cleanup before applying for the Program. Nonetheless, Volunteers should, before they begin a cleanup action, carefully weigh the risks associated with carrying out cleanup before being accepted into the VRP.

Volunteers should also be aware that certain site characterization or cleanup activities may require prior authorization and/or permitting from a variety of city, county, state or federal agencies. DEQ has a number of permitting programs that apply to common site characterization activities. For example, the construction of a groundwater monitoring well must comply with Water Quality Rules and Regulations and be authorized by DEQ; the Solid Waste Rules and Regulations require permitting before you treat, store or dispose of a solid or hazardous waste and require compliance with other requirements for solid or hazardous waste accumulation. When sites are in the VRP, DEQ can work with Volunteers to integrate approvals (as much as possible) with VRP program approvals, and separate permitting is often unnecessary. When sites are not in the VRP, DEQ cannot offer this type of assistance and Volunteers must identify and obtain all necessary permits and authorizations. In addition, of course, permits or authorizations obtained outside the VRP will address only the specific activity being authorized or permitted. They will not address the adequacy of your site characterization plan or whether you have achieved cleanup standards. To receive DEQ review of your cleanup and to qualify for a liability assurance, you must enter the VRP.

DEQ has not attempted to list all potential authorizations and/or permits that might apply to site characterization or cleanup activities in this Fact Sheet; you are responsible for determining the programs that may apply to your activities and for obtaining permits or other necessary authorizations. Volunteers who choose to begin site characterization or cleanup before entering the VRP are strongly encouraged to contact the appropriate local, State and Federal agencies, including DEQ, to determine if planned activities are regulated.

The DEQ Outreach Office can help you determine how planned activities may be regulated. You can contact the DEQ Outreach Office at (307) 777-7937.

11. How do I apply to enter the VRP and the ICP?

Volunteers fill out a simple application form to provide DEQ with basic information about the location and size of their cleanup site and the type of contamination they expect to address. The application form is explained in Fact Sheet #3 *Application for the Voluntary Remediation Program*, and is available from DEQ at the numbers listed below or on the DEQ website at <http://deq.wyoming.gov/shwd/voluntary-remediation-program/>.

To request participation in the ICP, Volunteers must supplement the normal VRP application with two additional types of information. First, Volunteers must submit information to document that their cleanup action is eligible for the ICP. This will include a brief description of the contaminants and contaminant sources, and an explanation of why the Volunteer believes contamination is limited to soil. Second, Volunteers must certify on the application form that they intend to use the standardized ICP remedy: soil excavation to achieve unrestricted site use cleanup levels.

Under the VRP, Volunteers pay DEQ oversight costs, though the expected oversight required on an ICP site is minimal. Currently, All Volunteers must pay a \$550 application fee with their application. The application fee covers the first ten hours of DEQ oversight (no partial refund is available if total oversight time is less than 10 hours). Additional oversight will be billed at a rate of \$55 per hour and will be invoiced monthly. If Volunteers are found ineligible for the VRP, the \$550 application fee will be refunded in full. Your \$550 should be submitted to DEQ with your application.

12. How do I show that contamination is limited to soil?

You should make a straightforward demonstration that it is reasonable to believe that contamination is limited to soil based on conservative application of good geological, hydrogeological, and engineering principles. Some of the factors that may be useful to consider when making this demonstration are:

- Timing of the cleanup action as it relates to timing of the release.
- Amount of material estimated to have been released.
- Physical and chemical characteristics of material released.
- Soil properties, topography, climate, distance to surface water, and depth to groundwater.
- Environmental evidence, such as sampling results and field observations.

Note that sampling of groundwater is not automatically necessary to demonstrate that it is reasonable to believe contamination is limited to soil. However, even in cases where groundwater sampling is not necessary to demonstrate eligibility for the ICP, it will likely be necessary before DEQ will issue a no further action letter liability assurance. (Other liability assurances, such as certificates of completion, may not require groundwater sampling.)

For guidance on standards modeling techniques to facilitate evaluation of contaminant fate and transport to groundwater, please refer to Fact Sheet #25 *Using Fate and Transport Models to Evaluate Cleanup Levels*.

13. How quickly will DEQ review my application?

At a minimum, DEQ will make a determination about whether your site is eligible to participate in the VRP and the ICP within 45 days of receiving your complete application. Applications often will be reviewed in less than 45 days.

14. Do I have to wait for DEQ to approve my application before I begin work at my site?

No, you may begin work at your site at any time. However, if you begin work before DEQ makes a determination that your site is eligible for the VRP, you run certain risks discussed above, including the risk that DEQ will determine your site is not eligible for the Program. Volunteers should carefully consider these risks before proceeding with cleanup outside the VRP.

In addition, if you begin cleanup before entering the VRP, many cleanup activities may be regulated under other DEQ environmental programs or under local or federal programs. For example, installation of a groundwater monitoring well is regulated by DEQ and requires DEQ approval. You are responsible for identifying the programs that may apply to your activities and for obtaining necessary permits or other authorizations.

Step Two: Public Involvement

15. Why is public involvement needed?

Wyoming residents are important partners in implementing the VRP. It is vital that communities where contaminated sites are located have full, fair, and equitable opportunities to participate in cleanup decisions. For that reason, the public must be given notice of all VRP sites and an opportunity to participate in cleanup decisions.

16. What must my public notice include?

At a minimum, your public notice must be in the form of a newspaper display advertisement and include the following:

- Notification that your site (or portion of a site) has entered the VRP and the ICP.
- Information on the types of contamination present at your site and notification that you intend to implement the standardized ICP remedy: soil excavation to unrestricted site use cleanup levels.
- An invitation for people to offer comments on the remedial approach.
- Notification that, at completion of your cleanup, you will apply for a liability assurance for your site.

DEQ has prepared standard templates for public notice for your use. Use of these templates is strongly recommended, as they ensure all public notice requirements are addressed. The templates can be used at sites where Volunteers apply to the VRP before beginning cleanup or where Volunteers apply to the VRP after completing cleanup. Upon acceptance into the VRP,

DEQ will provide Volunteers with a template customized for their site. Additional information on public involvement is available in Fact Sheet #2 *Public Participation* or you may contact DEQ at (307) 777-7752 for additional assistance.

In addition, the Department expects Volunteers to file the original Affidavit of Publication and a copy of all letters for each required public notice with DEQ. The Affidavit is notarized, signed by a representative of the newspaper in which the public notice is published, and includes a copy of the notice.

17. To whom must I give notice?

Notice must be published as a display advertisement, once per week for a minimum of four weeks in a newspaper of general circulation in the county in which the site is located. Notice must also be given in writing to all surface land owners of record for land that is contiguous to the site. Under the VRP, “contiguous” is interpreted to have its standard meaning of “touching” or “in contact.” Contiguous property is property that is touching or in contact with an eligible VRP site.

Note that contiguous land owners are required to receive written notice even when there is no evidence that contaminants may have migrated from the cleanup site onto the contiguous property. Receipt of a contiguous land owner notification does not mean that your property is contaminated.

The VRP generally requires Volunteers also to give notice to owners of “adjacent” property. “Adjacent” property is defined as both contiguous and non-contiguous property onto or under which contaminants are known to have migrated. Because the ICP is limited to sites with simple soil contamination only, DEQ believes that generally there will not be “adjacent” property owners within the meaning established by the VRP who require notice of ICP cleanups. However, if you believe that contaminants from your site may have migrated onto adjacent property, you must give notice to adjacent property owners. See § 35-11-1604.

18. How long is the public involvement period?

For sites in the ICP, the public involvement period is 30 days from the date of the first newspaper notice.

19. Do I have to wait for the public involvement period to be over before I begin my cleanup?

No, as discussed earlier (see question 14), you may begin work at your site at any time. However, if you begin work before completing public involvement you run certain risks discussed above (see questions 5 and 10), including the risk that DEQ will require additional work (including additional soil removal or sampling) in response to public comment. Volunteers should carefully consider these risks before proceeding with cleanup before public involvement is complete.

Step Three: Carrying Out Cleanup

20. How should I design my cleanup so that it will be acceptable to DEQ?

You should design your cleanup based on the statutory requirements of the VRP, DEQ guidance, and on application of good engineering, geological and hydrogeological principles. DEQ believes investigation and cleanup of sites in the ICP will not be complicated. DEQ intends for the ICP to be streamlined and simple, commensurate with the level of complexity presented by ICP sites and appropriate to the pre-defined conservative ICP remedy.

Although they will be simple, cleanups of sites in the ICP will involve the same types of activities as all cleanups: site assessment and characterization (including an ecological risk evaluation), identifying cleanup levels, selecting and implementing a remedy, and confirming that cleanup levels are achieved. In the ICP, site characterization activities will be very straightforward because contamination is limited to soil, the cleanup levels and the remedy are standardized (excavation of soil to achieve cleanup levels for unrestricted site uses), and confirmation sampling should conform to DEQ guidance.

21. How do I determine the site characterization activities that are needed at my site?

For information on site characterization (i.e., in the case of ICP sites, determining the extent of soil contamination), Volunteers should refer to Fact Sheet #8 *Site Characterization*. This guidance establishes the VRP site characterization performance criteria and provides a menu of the types of site characterization activities that may be necessary at VRP sites.

The site characterization guidance applies to all VRP sites, including very complicated cleanups; therefore, all of the site characterization activities listed in the menu will not be necessary at ICP sites. DEQ emphasizes that site characterization activities at all cleanup sites should be tailored to the level of complexity of the site in question and focused to avoid collection and analysis of unnecessary information. At ICP sites, the only purpose of site characterization is to determine the amount of soil that must be excavated to achieve cleanup levels for unrestricted site uses.

Volunteers should be sure to record and document site characterization activities for inclusion in the report required under Step 4 of the ICP (see questions 26 and 27).

22. How do I determine the cleanup levels for unrestricted site uses for contaminants at my site?

Cleanup levels that are appropriate for unrestricted site uses generally are the cleanup levels established in § 35-11-1605(a)(ii) calculated using residential exposure assumptions. A list of unrestricted site use cleanup levels that have already been calculated by DEQ and instructions

for applying these pre-calculated levels to site-specific conditions are available in Fact Sheet #12 *Soil Cleanup Levels*.

Note that the pre-calculated cleanup levels assume that sites have “passed” the ecological risk exclusion assessment. That is, they assume that ecological receptors do not require special consideration at your site. Volunteers who have not completed the ecological risk exclusion assessment checklist should work with DEQ to ensure that ecological receptors (if any) are appropriately identified and addressed. For more information on ecological risk assessment screening, see Fact Sheet #14 *Ecological Risk Assessment – Steps 1 and 2 Ecological Exclusions and Scoping Assessments*.

Be sure to document any work to define cleanup levels for unrestricted site uses so it can be included in your ICP report as required under Step 4 (see question 26 below). In addition, remember that, in the ICP, you must achieve cleanup levels for unrestricted site uses without relying on any institutional controls, engineering controls, or use control areas. That is, you must excavate and remove all contamination above unrestricted site use cleanup levels. DEQ is taking this approach because cleanups which use less conservative exposure assumptions or rely on engineering or institutional controls require more DEQ oversight and therefore are not appropriate for the ICP. You are not required to use the ICP, even if your cleanup is eligible; if you prefer, you may use the traditional VRP process to obtain a liability assurance. You also may choose to participate in the traditional VRP process and work with DEQ and the appropriate local government to obtain a use control area and restricted site use cleanup levels.

23. How do I implement the standard ICP remedy?

The standard ICP remedy is excavation and removal of all soil contamination that is above unrestricted site use cleanup levels. Excavated soil must be sent off-site for proper treatment and/or disposal, unless on-site treatment and/or disposal alternatives are specifically approved by DEQ. You should carry out excavation carefully, using good engineering, geological, and hydrogeological principles. Note that worker and public safety requirements may apply to excavation activities.

Be sure to record and document any excavation activities and the treatment, storage, and disposal of excavated soil so this information can be included in the ICP report required under Step 4 (see questions 26 and 27 below).

24. How do I demonstrate that cleanup levels have been achieved?

You show that cleanup levels have been achieved through soil confirmation sampling. Soil confirmation samples are samples, collected at the completion of excavation, beneath and adjacent to areas from which contaminated soil has been removed. That is, at the base and along the sidewalls of an excavation pit.

In general, if your excavation area is 10,000 square feet or less, DEQ expects between five and sixteen confirmation samples depending on the exact size of the excavation. Samples must be

collected both from the floor of the excavation pit and from each side wall. For excavation areas that are greater than 10,000 square feet, DEQ expects you to determine the number of soil confirmation samples based on a standard grid size of 400 to 1000 square feet or an alternative grid size approved by DEQ. DEQ has issued detailed guidance on soil confirmation sampling in Fact Sheet #10 *Soil Confirmation Sampling Guidelines*. This guidance should be followed carefully to ensure that DEQ can quickly evaluate your cleanup and make a decision about issuing a certificate of completion or other liability assurance. If you choose a non-standard approach to soil confirmation sampling, DEQ may determine that your site is no longer appropriate for the ICP and may require you to negotiate a PRA or RA.

Even if you have chosen to begin your cleanup before entering the VRP, DEQ strongly advises that you contact the Department for evaluation of your confirmation sampling before you completely backfill excavated areas. This will avoid the need to completely re-excavate if DEQ determines that additional sampling (or additional soil removal) is needed. (Of course, you must at all times properly maintain excavated areas to ensure they do not pose a hazard for workers or the public.) In addition, if your excavation area is greater than 10,000 square feet and you want to use a sampling grid size other than the standard grid size, DEQ strongly advises that you prepare a Soil Confirmation Sampling Plan as described in Fact Sheet #10 *Soil Confirmation Sampling* and contact DEQ for review before sampling.

Be sure to record and document any confirmation sampling activities so this information can be included in your ICP report, as required under Step 4 (see questions 26 and 27 below).

25. What if I begin work in the ICP and later find that contamination is not limited to soil?

DEQ understands that site cleanup is iterative and some Volunteers may begin work under the ICP expecting that contamination is limited to soil, only to find that soil contamination has migrated to groundwater. If groundwater impacts are identified, you should notify DEQ immediately so DEQ can work with you to address groundwater investigation. DEQ will also discuss with you transition into the traditional VRP administrative process.

Steps Four and Five: Independent Cleanup Report and Liability Assurance

26. What should I do when my cleanup is finished?

When site cleanup is finished, you prepare an independent cleanup report for DEQ review. If you believe that confirmation sampling shows that you have achieved unrestricted site use cleanup levels, you may request a certificate of completion or other liability assurance as part of the cleanup report.

27. What information is needed in my independent cleanup report?

The cleanup report should summarize all work done to characterize the site, identify cleanup levels, remove contamination, and confirm that you have achieved cleanup levels. Cleanup reports should:

- Document the sources of contamination for the site.
- Describe the horizontal and vertical extent of contaminated soil and how you determined the extent of contamination.
- Confirm that contamination has not impacted groundwater or surface water.
- Identify the site-specific cleanup levels you achieved and how these cleanup levels were derived.
- Include a completed ecological risk exclusion assessment form.
- Describe how you excavated contaminated soil and where and how contaminated soil was managed and disposed.
- Document confirmation sampling through a Remedial Action Completion Report as described in Fact Sheet #10 *Soil Confirmation Sampling*.

If confirmation sampling shows you have achieved unrestricted site use cleanup levels, you may request that DEQ issue a certificate of completion or other liability assurance at the same time that you file your cleanup report.

Remember that in accordance with § 33-41-102, any report or submittal containing geologic work that is defined as the “practice of geology before the public” must be certified by a professional geologist registered in the State of Wyoming.

28. How quickly will DEQ make a decision about my liability assurance?

DEQ anticipates making decisions about liability assurances within 45 days of receiving a complete ICP report.

29. How can I get more information about the VRP?

To learn about VRP sites that may exist in your community, obtain copies of other VRP Fact Sheets/guidance documents, get answers to your questions, or volunteer for the program, contact DEQ at (307) 777-7752 or through the VRP website at: <http://deq.wyoming.gov/shwd/voluntary-remediation-program/>.

The VRP website includes all of the Fact Sheets and other guidance documents for the VRP. This website is updated frequently and includes the latest information about DEQ’s progress in developing guidance, policy, and other supporting documents for the VRP.