



---

# Underground Injection Control (UIC) Class VI Program

## Public Participation Considerations for Geologic Sequestration Projects Fact Sheet

---

EPA's final *Federal Requirements Under the Underground Injection Control (UIC) Program for Carbon Dioxide Geologic Sequestration Wells*, codified in the U.S. Code of Federal Regulations (40 CFR 146.81 et seq.), are referred to in this document as the "GS Rule." The GS Rule establishes a new class of injection well, Class VI, and sets minimum federal technical criteria for Class VI wells for the purpose of protecting underground sources of drinking water (USDWs). This document is part of a series of guidance and implementation materials that EPA is developing to support owners or operators of Class VI wells, as well as the UIC Program permitting authorities. The final Class VI Rule and the associated guidance documents are available (with some guidance materials forthcoming) on EPA's Web site at [http://water.epa.gov/type/groundwater/uic/wells\\_sequestration.cfm](http://water.epa.gov/type/groundwater/uic/wells_sequestration.cfm).

This fact sheet is designed to assist UIC Program Directors and Class VI well owners or operators in developing a plan to educate and engage the public on geologic sequestration (GS) projects, as well as the permitting considerations for a particular proposed Class VI injection well site.

### **WHY IS PUBLIC PARTICIPATION IMPORTANT?**

Public involvement in Class VI permitting decisions is critical because GS is a relatively new technology. Providing communities with the means to understand the potential risks and benefits of a proposed Class VI well early in the project development process ensures that communities are informed and can participate in the application review. In addition, public participation can help UIC Program Directors and Class VI injection well owners or operators understand community concerns, preferences and perceptions on GS and the proposed Class VI injection well. Communities may also have information about site-specific features not readily available to the UIC Program Director or injection well owners or operators that will help fully inform the decision-making process.

EPA strongly encourages UIC Program Directors to work with owners or operators to provide information on the proposed Class VI injection well permit application as early as possible in the evaluation and approval process. EPA expects that there will be high levels of public interest in GS. Therefore, UIC Program Directors can increase the likelihood of Class VI injection well permitting success by integrating public involvement into the permit decision making process. See Box 1 below for the primary GS Rule public participation requirements.

## INITIATING A PUBLIC PARTICIPATION PLAN AND IDENTIFYING THE AUDIENCE

A comprehensive plan for engaging communities on a proposed Class VI injection well will help set the stage for early, effective, and inclusive public involvement in the permitting process. In initiating a public participation plan, a UIC Program Director and/or potential Class VI injection well owner or operator can begin to:

- Gauge the level of public interest and concerns in the permitting of a Class VI injection well;
- Identify key stakeholders in the community, including: local officials, landowners, business community, civic and environmental groups, local water systems, educators, etc;
- Determine how and when the public should be involved in the permitting decision; and
- Identify specific communications needs for specific key audiences (e.g., languages spoken, literacy levels) and how to best reach those audiences with the intended message (e.g., media avenues and forums).

## DEVELOPING THE MESSAGE

Developing a clear message on GS, and on a particular proposed Class VI injection well, will inform and educate the public about the well and the permit application under consideration. Effective messages will communicate information about the proposed project as clearly and succinctly as possible. Messages should address any concerns or objections to the proposed project to educate local citizens and encourage open dialogue and public involvement in the permitting process.

For GS projects, the message could address subjects that the public is likely to be interested in understanding, such as:

- What is GS? What are the proven GS technologies?
- What are the requirements for selecting suitable locations?

### **Box 1: UIC Class VI GS Rule Public Participation Requirements**

The GS Rule (40 CFR 146.81 *et seq.*) adopts the existing public participation requirements under the SDWA at 40 CFR Part 25 and permitting procedures at 40 CFR Part 124 for Class VI injection wells. These requirements discuss: 1) providing public notice to interested parties of pending actions via newspaper advertisements, radio, mailings, or e-mails; 2) holding public hearings; soliciting and responding to public comment; and 3) involving a broad range of stakeholders.

The GS Rule also requires, at 40 CFR 124.10(c)(1)(xi), that the UIC Program Director provide public notice of Class VI permitting activities to state and local oil and gas regulatory agencies, state agencies regulating mineral exploration and recovery, the Director of the Public Water System Supervision (PWSS) program in the state, and all other agencies that may have jurisdiction over injection activities within the state.

The GS Rule also states that UIC Program Directors must apply the public notice and participation requirements to all supplemental applications for Class VI injection depth waivers (40 CFR 146.95(c)). The UIC Program Director must give public notice that a waiver application has been submitted, and the notice must state: the depth of proposed injection zone; location of the proposed injection well; the name and depth of all USDWs within the delineated area of review (AoR); a map of the AoR; names of any public water supplies affected, reasonably likely to be affected, or served by USDWs in the AoR; and the results of UIC-PWSS Directors consultation pursuant to 40 CFR 146.95(b)(2).

- What are the potential health and safety implications of carbon dioxide injection, and how are these going to be addressed?
- How will USDWs be protected?
- What are the potential health and other community benefits of GS?

## SELECTING COMMUNICATION OPTIONS AND TESTING PLAN EFFECTIVENESS

Effective public participation events use multiple communication channels to deliver messages (see Box 2, EPA’s Seven Steps for Effective Public Involvement). Some of the ways in which a successful campaign could deliver the intended message may include traditional and newer social media-based avenues. Communication options may include, but are not limited to:

- **Face-to-face communication:** public meetings, speakers' forums, roundtable discussions, site visits;
- **Media:** traditional media (TV/radio/newspapers/conference calls) and Internet-based media (Web pages, blogs, webcasts); and
- **Materials:** Notices, fact sheets, fliers, press releases, visual images.

Public participation events may need to be translated and conducted in additional languages, depending on the needs of local communities interested in participating in Class VI injection well permitting decisions.

Follow-up analysis of a public participation event can help ensure that the intended message was received, that all target audiences had opportunities to participate in the permitting process, and that they understood the goals of the proposed Class VI injection well project. The results of such an analysis can inform future public participation efforts around proposed Class VI injection wells. Testing methods include surveillance of media coverage, polls, and surveys of target audiences.

Public involvement in permitting decisions is a critical component of Class VI Rule implementation, particularly because GS is a relatively new technology. For additional information on developing a public participation strategy and on outreach program for GS projects, see the EPA website. Other references include the U.S. Department of Energy (DOE/NETL) “Best Practices for Public Outreach and Education for Carbon Storage Projects” found at [http://www.netl.doe.gov/technologies/carbon\\_seq/refshelf/BPM\\_PublicOutreach.pdf](http://www.netl.doe.gov/technologies/carbon_seq/refshelf/BPM_PublicOutreach.pdf).

### Box 2: EPA’s Seven Steps for Effective Public Involvement

1. Plan and budget for public involvement activities.
2. Identify interested and affected communities.
3. Consider providing technical or financial assistance to facilitate public involvement.
4. Provide information and outreach to the public.
5. Conduct public consultation and involvement activities.
6. Use public input as appropriate and provide feedback to the public.
7. Evaluate public involvement activities to help inform future activities.

Source: EPA Public Involvement Policy, available at: [www.epa.gov/publicinvolvement/public/index.htm](http://www.epa.gov/publicinvolvement/public/index.htm).