



# Prospective Purchaser Agreements: Benefits, Challenges, and Recommendations

FEBRUARY 2026

## Executive Summary

Superfund sites are locations contaminated with hazardous substances designated by the U.S. Environmental Protection Agency for cleanup. Non-liable third parties interested in cleaning up and acquiring these sites can seek liability protections through mechanisms like a Prospective Purchaser Agreement. PPAs facilitate the safe cleanup and reuse of contaminated sites by providing liability protection to purchasers, thereby encouraging redevelopment. The purpose of this evaluation was to document any benefits of entering into a PPA for various stakeholders, identify catalysts and barriers to PPA implementation, and define the outcomes resulting from a PPA. The evaluation team conducted a mixed-methods evaluation with quantitative and qualitative data. The evaluation addressed five key questions:

### 1. What are the tangible environmental, social, and economic impacts on communities resulting from the cleanup and reuse of a site?

**Based on available economic data, Superfund sites that utilized a PPA typically have larger economic benefits compared to those that did not utilize a PPA.** Environmental and economic benefits include the remediation of contaminated areas and revitalization efforts that contribute to community health and economic development. Sites utilizing PPAs generally have a higher median value in the number of businesses, employees, sales, and income compared to other sites. This finding does not imply causality, as confounders may affect observed differences.

### 2. What are the key differences in communities where a PPA is utilized to help redevelop a site?

**Superfund sites that utilized a PPA are not concentrated in any demographic group,** suggesting that the presence of PPAs does not disproportionately favor or disadvantage any particular demographic.

### 3. Are there any benefits or challenges in the development and/or implementation of a PPA that have impacted a community?

**While communities are not required to be directly involved in the PPA process, they can factor into their execution.** PPAs present both opportunities and challenges for surrounding communities. Community engagement during the PPA process, although not uniform, can be crucial for redevelopment success.

### 4. What are the benefits and challenges for the EPA in the development and/or implementation of a PPA?

**The EPA leverages resources from parties that would otherwise not have an obligation to perform work or pay response costs, saving Superfund tax dollars.** This enables the EPA to achieve its environmental and redevelopment goals more efficiently.

**PPA development and implementation are subject to the same challenges that exist in other enforcement instruments: extended negotiations and adapting the agreement for site-specific circumstances.** The PPA process involves extensive coordination among multiple stakeholders, which can lead to delays and procedural complexities similar to other enforcement instruments.

### 5. What catalysts or challenges did the purchaser/lessee encounter in the PPA negotiation process?

**The economic opportunity, legal protections, and federal support encourage third-party purchasers to pursue a PPA.** Purchasers are motivated by the potential economic gains and PPA legal protections. High quality support from the EPA and DOJ staff further facilitates the PPA process.

**The slow remediation negotiation process often imposes a burden on purchasers.** Purchasers face challenges like lengthy negotiation timelines that result in increased costs and delayed project completion.

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## Prospective Purchaser Agreements: Benefits, Challenges, and Recommendations

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The Short-Term Evaluation Program is a pilot initiative designed to support the collection of evidence to inform decision-making and program operations in alignment with the Foundations for Evidence-Based Policymaking Act of 2018.

In August 2023, the United States Environmental Protection Agency's Office of Site Remediation Enforcement within the Office of Enforcement and Compliance Assurance submitted a proposal which was selected for the Office of Finance and Administration<sup>1</sup> STEP pilot round. OSRE's proposal described a need for documenting the outcomes from utilizing Prospective Purchaser Agreements at Superfund sites, along with identifying catalysts or barriers impacting the implementation of PPAs. The evaluation team collaborated with OSRE staff to develop evidence-building options and subsequently created an Evaluation Plan based on those options. This report contains the evidence-building findings.

### Background

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A Superfund site is a location contaminated with hazardous substances, pollutants, or contaminants that pose risks to human health or the environment, designated by the EPA for cleanup under the Comprehensive Environmental Response, Compensation, and Liability Act. These sites undergo assessment, investigation, remediation, and monitoring to mitigate contamination and restore safety. Under CERCLA, the EPA holds private and federal government parties responsible for the contamination at a site and accountable for performing or paying for its cleanup through enforcement instruments. Enforcement instruments include orders, settlements, settlement amendments, reuse agreements and demand letters. Passed in 2002, the Small Business Liability Relief and Brownfields Revitalization Act amended CERCLA to codify liability protections for some prospective purchasers. Specific CERCLA provisions support the cleanup and reuse of Superfund sites by non-liable third parties through landowner liability protections, such as the Bona Fide Prospective Purchaser provision. While these provisions are self-implementing, a non-liable third party interested in acquiring and cleaning up a contaminated site may seek additional liability protections from the U.S. Government, including through a mechanism called a Prospective Purchaser Agreement.<sup>2</sup> A PPA is a legal agreement typically used in the context of environmental law and property transactions. It involves an arrangement between a prospective purchaser of a Superfund site and the EPA. A PPA is the preferred vehicle in circumstances where a party who has historically not been affiliated with a site of EPA interest is proposing to voluntarily conduct or pay for cleanup at that site. PPAs can help facilitate the safe cleanup and reuse of the site. In addition to site-specific agreements, EPA may also consider participating in a prospective purchaser inquiry call or issuing comfort/status letters to communicate key information that the EPA has about a contaminated, potentially contaminated, or formerly contaminated property. Prospective purchaser inquiry calls and comfort letters are intended to address concerns of interested parties and help them make an informed decision regarding the purchase, lease, or redevelopment of the property.

Key features and benefits of a PPA include:

- **Liability Protection:** In a PPA, a party agrees to undertake all actions required by the settlement. In exchange for their performance of cleanup or payment for response costs at the site, the settlement resolves the prospective purchaser's liability to the United States under CERCLA. Additionally, a party receives protection from contribution actions brought by responsible parties at the site.
- **Encouraging Redevelopment:** By offering CERCLA liability protection, PPAs encourage the cleanup and reuse of contaminated sites, which might otherwise remain unused due to potential legal and financial risks.
- **Conditions and Obligations:** The agreement includes specific conditions and obligations that the purchaser must meet, like conducting certain environmental assessments, implementing cleanup activities, or maintaining specific land use restrictions.
- **Negotiation with Government:** The PPA is negotiated between the prospective purchaser, EPA, and the Department of Justice, ensuring that the parties agree on the terms related to liability and site management.

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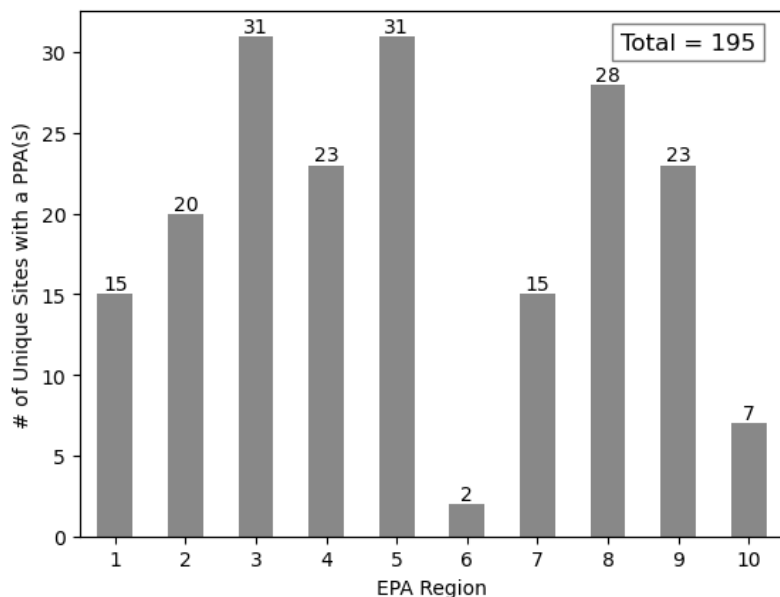
<sup>1</sup> In fall 2025, the EPA Office of the Chief Financial Officer re-organized and is now the Office of Finance and Administration.

<sup>2</sup> For this report, prospective purchaser agreements, prospective lessee agreements, bona fide prospective purchaser agreements, and bona fide prospective lessee agreements will be collectively referred to as "Prospective Purchaser Agreements" or PPAs.

- **Site-specific:** The starting point for any PPA is the EPA’s model settlement document, but each agreement is tailored to the specific circumstances of the property in question, including the type and extent of contamination, the intended use of the property, and the purchaser’s plans for redevelopment.

Figure 1 shows the distribution of the number of Superfund sites by EPA Region that utilized one or more PPAs since 1991.

**Figure 1.** Number of Unique Sites with a PPA by EPA Region since 1991. Data collected from the Superfund Enterprise Management System (SEMS)



**Figure 2.** Map of EPA Regions. Each regional office is responsible for the execution of programs within several states and territories (EPA 2025c)

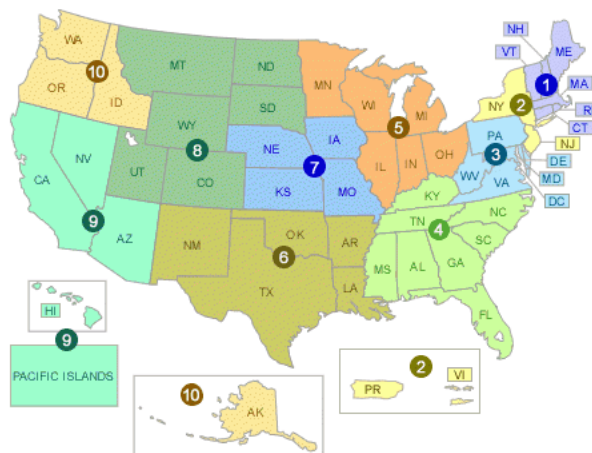


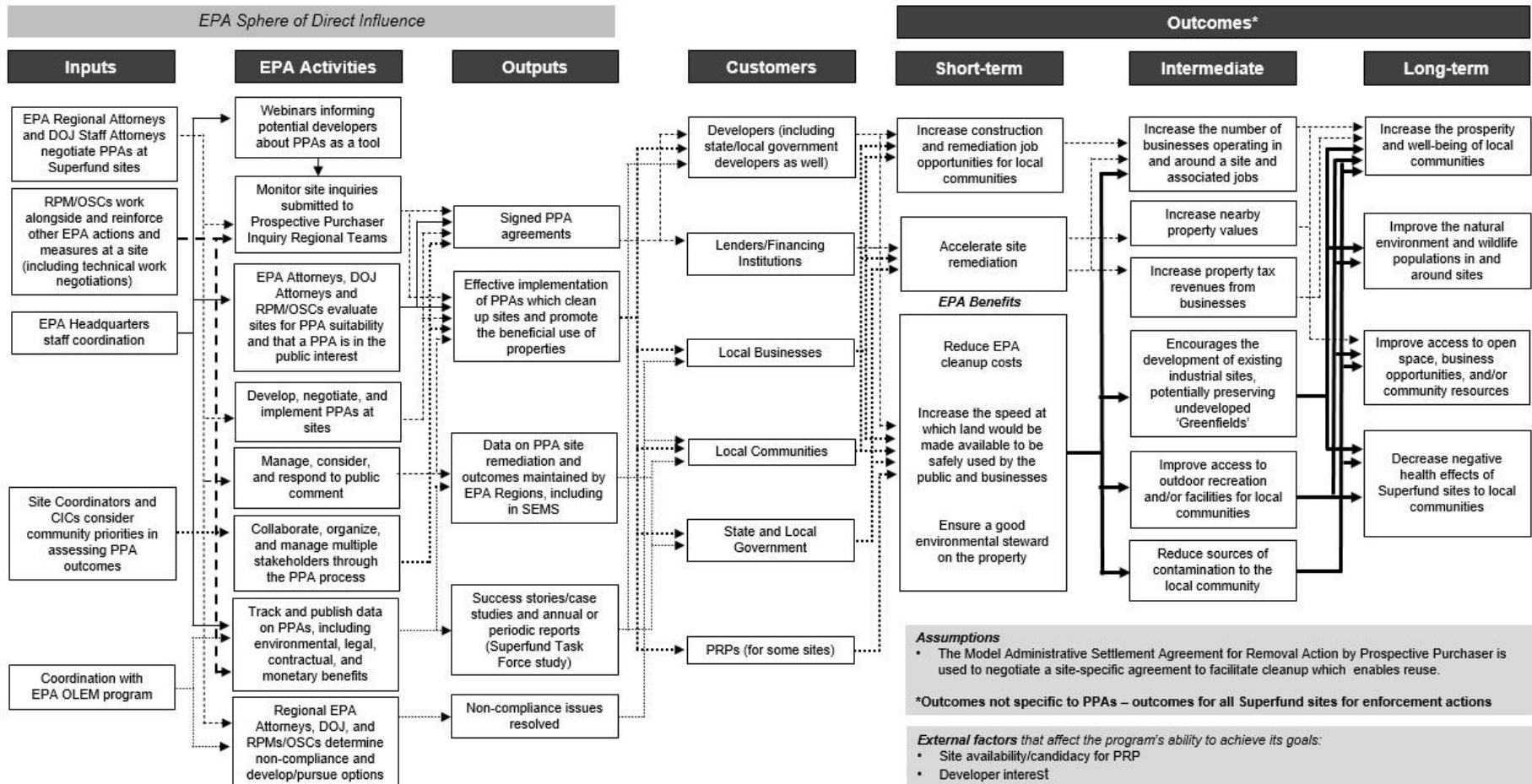
Figure 3 (below), a logic model, demonstrates how the relevant inputs, activities, and outputs associated with PPAs can lead to tangible, positive outcomes. A logic model is a visual "roadmap" or blueprint that explains how a program or project works by connecting its resources (inputs) to its activities, the direct results (outputs) of those activities, and the intended, longer-term changes (outcomes) it aims to achieve, essentially showing the "if-then" logic of how planned work leads to desired results.

While PPAs provide many benefits, the EPA has not consistently tracked PPA-specific related outcomes. Limited implementation and economic data for some Superfund sites (including those utilizing a PPA) exists, but the EPA did not specifically analyze aggregated economic data for PPAs before this evaluation. As the EPA had not evaluated the PPA program to date, this initial evaluation helps the EPA better understand the challenges, benefits, and outcomes resulting from entering into a PPA.

**Figure 3. Prospective Purchaser Agreement Logic Model**

**Office of Site Remediation Enforcement  
Prospective Purchaser Agreement Logic Model**

**VISION:** Facilitate the cleanup and safe reuse of Superfund sites which are underutilized or abandoned using Prospective Purchaser Agreements to benefit local communities economically, environmentally and through improved public health outcomes



## Audience and Purpose

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The intended audience for this report are OSRE staff and management, and the purpose is to provide:

- Quantitatively and qualitatively defined outcomes from sites where the EPA utilized a PPA
- Outcome comparisons from sites utilizing a PPA vs sites not utilizing a PPA
- Specific and actionable recommendations to improve the PPA process

The purpose of this evidence-building project is to document the benefits of entering into a PPA for various stakeholders, identify both catalysts and barriers to PPA implementation, and define the outcomes resulting from a PPA. The evaluation achieved this purpose by answering the following evaluation questions:

- 1) **What are the tangible environmental, social, and economic impacts on communities resulting from the cleanup and reuse of a site?**
- 2) **What are the key differences among communities where a PPA is utilized to help redevelop a site?**
- 3) **Are there any benefits or challenges in the development and/or implementation of a PPA that have impacted a community?**
- 4) **What are the benefits and challenges for the EPA in the development and/or implementation of a PPA?**
- 5) **What catalysts or challenges did the purchaser/lessee encounter in the PPA negotiation process?**

## Evidence Building Design

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The mixed-methods evaluation design was comprised of two phases: Phase 1- Data Collection and Phase 2 - Data Analysis & Report Development. These two phases comprised four tasks: (1) quantitative data collection (such as economic, geospatial, and demographic information) and data quality assurance/quality control (QA/QC); (2) qualitative data collection through interviews with government employees and private entities that negotiated or worked on PPAs; (3) mixed-methods analysis, and (4) report refinement and delivery. The four tasks are described below, along with modifications to the original Evaluation Plan described in the Limitations section. The evaluation team performed all quantitative analysis and data visualization with Python or R; see GitHub repository for code (EPA, 2025d). Note that the evaluation team did not perform all tasks sequentially, and some tasks were performed simultaneously. A participatory evaluation method was utilized through collaboration with the OSRE staff in the development of evaluation design, findings, and recommendations. This evaluation benefitted from a participatory approach that engaged with stakeholders throughout the process, ensuring the accuracy of mixed methods data, the relevance of findings, and utility of recommendations.

### Phase I: Data Collection

#### Task 1: Quantitative Data Collection

**Economic and PPA site data collection and QA/QC.** The evaluation team identified and compiled relevant, quantitative economic data on Superfund sites to compare economic impacts from three groups of sites: sites utilizing a PPA and other enforcement instruments; sites that had enforcement instruments but did not utilize a PPA; and sites that did not have any enforcement instruments nor PPAs. The EPA's *Redevelopment Economics at Superfund Sites* webpage hosts an interactive map displaying economic impact data on over 700 (and growing) Superfund sites (EPA, n.d.). Note that this is only a subset of the entire Superfund population (i.e., sites with available survey data). An OSRE team member provided the evaluation team with an Excel file that tabulated the economic data utilized by the map. This file included administrative data (e.g., Site ID, EPA ID, EPA Region where the site is located, and the site name) and economic data (number of businesses, employees, sales, and income at the Superfund site) from a Dun & Bradstreet survey conducted in 2024.

The Superfund Enterprise Management System database was queried to identify sites where the EPA utilized a PPA or utilized enforcement instruments other than PPAs (EPA, 2025b). Additionally, Superfund site geospatial data was downloaded to compare the size of Superfund sites (US EPA, 2025a). Next, the economic, geospatial, and PPA/enforcement instrument datasets were merged, and all economic data and observations (sites) were retained and categorized by whether

the site 1) utilized a PPA, 2) had enforcement instruments but no PPA, or 3) had neither any enforcement action nor a PPA. With this merged dataset, the aggregated economic and site size data were compared across the three groups.

While the merged dataset included values for all administrative data and the number of businesses located at the Superfund site, some observations did not contain values for the number of employees, sales, income, or size at the Superfund site, as the surveyed entity(ies) at the site did not provide this data or this data was missing from the geospatial dataset. Accordingly, missing values were filtered out when analyzing the economic data (EPA, 2025d) and the remaining dataset only required minimal further cleaning.

**Census data collection.** The U.S. Census was queried for census tract data on geographic locations, percentage of the population with at least a bachelor's degree, median income, percentage of the population in poverty, unemployment rates, and homeownership rates. This Census data was then linked to the geographic locations of PPA sites for demographic analysis (missing PPA geographic location data were added at a later point).

## **Task 2: Qualitative Data Collection**

**Interview Guide Development.** In-depth interview guides and contact scripts were developed to guide data collection discussions among OSRE staff, Remedial Project Managers, On-scene Coordinators, DOJ partners (those directly involved in the PPA process), and purchasers. The focus group guide began with introductory language from the interviewer, reiterating informed consent language for the focus group participants/ interviewee. Next, the guide focused on background information, participant experience with various aspects of the PPA process, and site outcomes. Additional questions centered on wrapping up the interview and providing participants the opportunity to provide any other information about the PPA implementation process, as well as contact information for future focus group participants (such as purchasers, DOJ contacts, etc.).

**Focus groups with EPA employees involved with PPA implementation.** Informed consent language was integrated into data collection processes and obtained from all participants with agreement for data to be anonymized and aggregated for analysis and dissemination of findings. A total of five focus groups were conducted among three distinct groups of EPA employees involved with PPA implementation, with an additional individual interview included to accommodate conflicting schedules. Each focus group ran less than 60 minutes. Anonymized notes were taken for all components of the qualitative data collection. Focus groups that utilized Microsoft Teams auto transcription were transcribed verbatim and participant identifiers were removed prior to analysis. Notes were used for qualitative coding of the interview, as the participant did not provide consent for transcription.

The three groups included:

- OSRE headquarters' employees involved with implementing PPAs
- Remedial Project Managers/On-Scene Coordinators involved with a PPA(s) implemented within the past 5 years
- Regional counsel involved with a recently implemented PPA(s)

**Interviews with purchasers utilizing a PPA.** The evaluation team conducted three interviews with three separate private entities that utilized a PPA. The interviewees provided qualitative data from their unique perspectives (distinct from federal employees) to help answer evaluation questions and provide additional context for quantitative findings.

## **Phase 2: Data Analysis & Report Development**

### **Task 3: Mixed methods analysis of the PPA program**

The evaluation team conducted a mixed methods analysis to document the benefits of entering into a PPA for various stakeholders, identify both catalysts and barriers to PPA implementation, and define the outcomes resulting from a PPA.

**Economic (Business Activity) Quantitative Analysis.** First, exploratory data analysis was conducted on economic data and PPA data from SEMS to identify any trends or anomalies. Count plots were created displaying the total number of PPAs per Region (Figure 1) and the number of PPAs with associated economic data (e.g., number of businesses) available per Region (Figure 4). Additionally, the exploratory analysis examined the distributions (via boxplots and histograms) and medians of five variables (4 discrete measures and 1 control variable), grouped by whether the EPA utilized a PPA at the

observed site, whether the EPA utilized some other enforcement instrument (s) not including a PPA, or whether the site did not have any enforcement or PPA action present. The four measured discrete economic variables are:

- Number of businesses at the Superfund site location
- Number of employees employed at the businesses
- Annual sales of the businesses (gross sales)
- Annual income of the businesses (profit)

The fifth variable is the size of the Superfund site. The comparison of Superfund size differences across the three groups of data allowed for consideration of confounding and explain any differences observed between the calculated economic variables for each group.

Next, a Shapiro-Wilk test was used to determine the normality of the distributions of each variable for each of the three groups and a Kruskal-Wallis test was used to determine if the distribution of economic and Superfund size values for the three groups differed significantly from each other. As the values of each observation are independent, but no distribution of values demonstrated a normal distribution, the team first utilized the non-parametric Kruskal-Wallis statistical test. Finally, the team utilized the non-parametric Mann-Whitney U statistical test to compare pairs of the different distributions for each economic and size variable.

**Demographic Quantitative Analysis.** R code was created to calculate nationwide quintile ranges (five “bins”) for various census tract metrics including: the percentage of the population with at least a bachelor's degree, median income, poverty rates, unemployment rates, and homeownership rates. With these ranges, the team assigned a quintile label, 1-5, for the previously listed census tract metrics at each PPA site. A label of “1” indicated the PPA site’s census tract metric landed in the lowest bin for that metric, while a label of 5 indicated the metric landed in the highest bin for that metric. In other words, a label of 1 for a PPA site’s census tract’s median income indicated that census’ median income was in the bottom 20% of all census tract median incomes, while assigning a label of 5 indicated the census’ median income was in the top 20% of all census tract median incomes. For logical consistency, in the R code, a label of 1 for census tracts with the highest poverty rate and highest unemployment rate, and a label of 5 for census tracts with the lowest poverty rate and unemployment rate. With all PPA sites’ census metrics categorized, Python code was drafted to summarize the distribution of PPA sites’ locations across the five quintiles for each identified metric.

**Qualitative Analysis of Interviews/Focus Groups.** A codebook was developed to outline and define emergent themes based on evaluation questions and review of focus group transcripts. Qualitative analysis was conducted using data gathered from the interviews and focus groups highlighted in *Task 2: Qualitative Data Collection* to support and enhance answers to the following questions outlined in the Evaluation Plan:

- What are the tangible environmental, social, and economic impacts on these communities resulting from the cleanup and reuse of the site?
- Are there any benefits or challenges in the development and/or implementation of the PPA that have impacted the community?
- What are the benefits and challenges for the EPA in the development and/or implementation of the PPA?
- What catalysts or challenges did the purchaser/lessee encounter in the PPA negotiation process?

The evaluation team coded the anonymized notes and transcripts and used deductive analysis to identify themes and subthemes.

#### **Task 4: Report refinement and delivery**

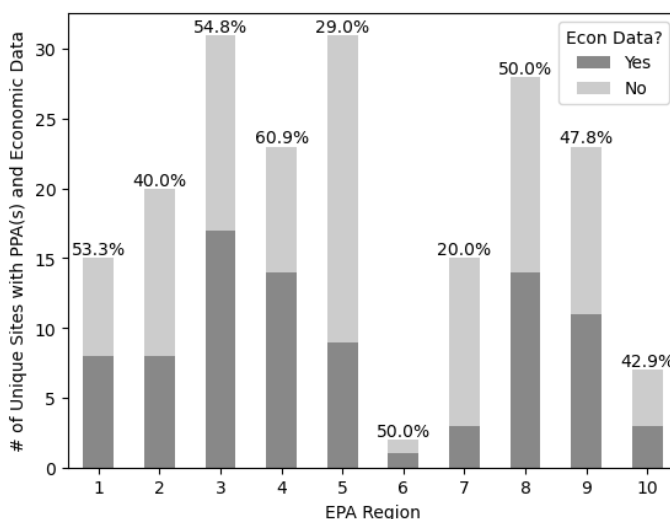
EPA staff completed the interviews, data collection, and the majority of the data analysis (both quantitative and qualitative) and prepared this report, informed by the initial analysis conducted by a support contractor. EPA staff sought input from OSRE to ensure accuracy in describing aspects of the PPA program, and clarity in presenting the findings.

#### **Limitations**

The limitations below describe the impact to the report’s adherence to the original Evaluation Plan:

- **Change in Scope:** Due to changes in availability, the evaluation team could not interview DOJ counsel on their experiences related to PPAs. Therefore, the report’s results do not reflect their perspective.
- **Geospatial data:** The geospatial dataset contains some missing values, limiting the amount of analyzed data.
- **Economic data:** The economic dataset does not contain economic data for all Superfund sites, only the 718 sites with a business (i.e., not a Superfund site that became a park, housing development, etc.) that Dun & Bradstreet surveyed. The economic dataset contains data on less than half of all PPA sites (88/195). However, the geographic/regional distribution of PPA sites with economic data (Figure 4) contained PPA site economic data from all ten EPA Regions.
- **Paperwork Reduction Act:** The Paperwork Reduction Act requires that federal agencies obtain approval from the Office of Management and Budget for data collection efforts involving 10 or more non-federal entities. This ensures that the burden of paperwork on businesses, individuals, and other entities is minimized, and that the government collects only necessary information to meet Agency goals, but the approval process requires significant lead times. In the interest of producing an evaluation in a timely manner, the team elected to interview less than 10 non-federal entities. Accordingly, the data is not a representative sample of purchasers as private entities are also subject to the Paperwork Reduction Act provisions. The data for this evaluation represents a convenience sample of purchasers with a PPA negotiated in the last 5 years.
- While the Evaluation Plan initially outlined the development and delivery of interview guides and contact scripts for community representatives and Community Involvement Coordinators, due to capacity limitations and a narrowing of the evaluation’s focus, the team was not able to produce these deliverables.

**Figure 4.** Number and percentage of unique sites with a PPA(s), with and without economic data by EPA Region (% at the top of each bar indicates the % of PPA sites in that Region with economic data). Total PPAs with economic data: 45.1%



## Results

### What are the tangible environmental, social, and economic impacts on communities resulting from the cleanup and reuse of a site?

#### ***Superfund sites that utilized a PPA typically have larger economic benefits compared to Superfund sites that did not utilize a PPA.***

The implementation of PPAs, other settlements, and enforcement instruments at Superfund sites generally leads to significant environmental and economic benefits. EPA respondents expressed that one of the primary advantages observed at these sites is the remediation of contaminated areas, which brings about substantial health and environmental benefits (including the cleanup of contaminated soils and groundwater at sites) for the surrounding communities. Broadly, staff highlighted that some of the cleanup of contaminants provide health benefits to communities through removing environmental threats or potential hazards. Additionally, the revitalization of Superfund sites often removes unsightly and hazardous "eyesores" from the community landscape. Some interviewed EPA staff noted the importance of site revitalization efforts through the demolishing of dilapidated and/or abandoned buildings on Superfund sites.

From an economic perspective, both interviewed EPA staff and purchasers reported that PPAs can contribute to the economic development of communities. Respondents expressed the importance of PPAs and other enforcement instruments to increasing job opportunities, expanding housing options, and creating an incentive to develop sites that increase tax rolls for local communities. Finally, the qualitative analysis revealed that a Superfund site’s location and the area’s economic viability are key considerations for purchasers when considering whether to pursue a PPA. While all

enforcement and remediation actions typically result in a tangible economic benefit, remediating and reusing a contaminated site in an economically opportunistic area will typically result in greater economic benefits.

The quantitative economic analysis indicated that within the available economic data, the group of Superfund sites utilizing PPAs (whether or not they also involve other enforcement instruments) generally demonstrate higher median values in the number of businesses, employees, sales, and income at the PPA site compared to the group of sites with other enforcement instruments except a PPA and the group of sites without a PPA or other enforcement instrument(s). Table 1 shows the median values for each of the economic variables across all 3 groups. Per the conducted tests, these results were statistically significant (i.e., a p-value less than 0.01), suggesting the results are not due to randomness.

Table 1- Comparisons of economic variable medians for Superfund sites. Note: Underlying data includes 718 Superfund sites surveyed in 2024, which does not represent the entire population of Superfund sites.

<b>Economic Variable Median</b>	<b>Superfund sites without any enforcement instruments (# of sites with data on the variable)</b>	<b>Superfund sites with enforcement instruments, excluding PPAs (# of sites with data on the variable)</b>	<b>Superfund sites with PPAs, with or without other enforcement instruments (# of sites with data on the variable)</b>
# of Businesses	1 (122)	2 (508)	4 (88)
# of Employees	20 (105)	45 (429)	111 (85)
Sales from Businesses	\$5,823,500 (98)	\$8,569,000 (410)	\$22,442,000 (81)
Income from Businesses	\$1,391,104 (105)	\$3,123,640 (429)	\$8,473,920 (85)
Area of Superfund Site	74 acres (113)	79 acres (473)	211 acres (81)

Of note, while PPAs are one of multiple enforcement mechanisms that can drive economic benefits at a Superfund site, this evaluation does not imply a causal link to the use of a PPA and these positive outcomes. Confounding variables, like the inherent economic potential of the site's location and existing plans for redevelopment, may explain some of the differences observed in economic outcomes noted in Table 1. Related factors like the presence of a prospective purchaser with a vested interest in the site's economic success may also contribute to the observed enhanced economic results for sites utilizing a PPA. Notably, on average, Superfund sites in the economic dataset that utilized a PPA were statistically significantly larger than the other two groups of surveyed Superfund sites. Sites with more acreage could allow for more construction and therefore more economic activity. Finally, the data is based on a limited number of surveyed sites (718 Superfund sites surveyed in 2024), representing a subset of the entire Superfund population, which may not fully capture the range and complexity of all Superfund sites. Nonetheless, the results indicate that PPAs and other enforcement instruments can play a significant role in enhancing the economic viability of redeveloped Superfund sites.

### **What are the key differences among communities where a redevelopment utilizes a PPA?**

#### ***Superfund sites that utilized a PPA are not concentrated in any demographic.***

The demographic analysis of Superfund sites utilizing a PPA suggests that these sites are not heavily concentrated within any specific demographic indicator. Table 2 presents the percentage of the PPA population within each quintile for several demographic indicators. In a perfectly even distribution, 20% of PPA sites would fall within each quintile of any given demographic measure. However, the data shows no notable trends or concentrations in census tracts characterized by low income, high poverty, low educational attainment, or high unemployment rates. This potentially suggests that the presence of PPAs does not disproportionately favor or disadvantage any particular demographic group. Nonetheless, the team observed a slight trend where more PPA sites are located in census tracts with lower homeownership rates. Various confounding variables could account for this slight trend, including simple randomness. Further evaluation and comparison of this analysis to a similar analysis using the population of all Superfund sites could reveal other trends.

Table 2- % of the total number of PPAs within each quintile. *Note: % may not exactly sum to 100% due to rounding.*

	1 (lowest)	2	3	4	5 (highest)
Income	24.2%	21.6%	18.3%	20.3%	15.7%
Poverty (1 = most impoverished)	24.0%	22.7%	13.6%	18.8%	20.8%
Bachelor's degree attainment	20.1%	24.0%	15.6%	20.8%	19.5%
Unemployment (1 = highest unemployment)	21.4%	17.5%	22.7%	17.5%	20.8%
Homeownership	27.3%	24.7%	25.3%	9.7%	13.0%

**Are there any benefits or challenges in the development and/or implementation of a PPA that have impacted communities?**

***While communities are not required to be directly involved in the PPA process, community engagement can inform and enhance implementation.***

The development and implementation of PPAs present both opportunities and challenges for communities surrounding Superfund sites. Although the community typically provides input during Superfund pipeline processes rather than the PPA process, some developers actively choose to engage with local communities to secure buy-in for their projects. Some respondents highlighted that community support and buy-in are crucial for redevelopment success. Additionally, respondents noted that leveraging EPA Community Involvement Coordinators and organizing community information sessions detailing a Superfund site's reuse can increase the understanding and support for redevelopment projects. This outreach helps communities gain insights into project details that may not be included in publicly released documents, ultimately lending credibility to the redevelopment efforts. For instance, one purchaser noted that communities do not always realize that certain reuse (e.g., business/industry) may require greater remediation efforts at a site compared to other reuse options; communities may prioritize increased cleanup over any specific reuse plan.

Despite the potential benefits, community engagement by purchasers is not uniform and varies significantly across different sites. This variability is influenced by several factors, including the unique characteristics of every Superfund site (not just those utilizing a PPA), the nature of its remediation history, the planned redevelopment, the specific needs of the community, and other factors. Consequently, community engagement strategies must be tailored to each site's circumstances.

Communities have a wide range of opinions on remediation projects, including those involving PPAs. Per multiple respondents, some community members express a preference for transforming areas into parks or open spaces rather than commercial developments. Conversely, other community members support the increased remediation of contaminated sites, regardless of their eventual use, with the goal of removing old or abandoned structures. This range of opinions underscores the importance of understanding and addressing community concerns to achieve a successful site redevelopment for a purchaser. The economic and tangible benefits accompanying remediation and redevelopment are often at the forefront of community interests, further highlighting the need for effective communication and collaboration between developers and local stakeholders to the extent possible.

**What are the benefits and challenges for the EPA in the development and/or implementation of a PPA?**

***The EPA leverages resources from parties that would otherwise not have an obligation to perform work or pay response costs to clean up hundreds of Superfund sites and save Superfund tax dollars.***

The use of PPAs presents several benefits for the EPA in Superfund site cleanup and redevelopment efforts. One significant advantage is the ability to leverage resources from parties that are not otherwise obligated to perform cleanup work or cover response costs, leading to remediation that otherwise may not easily occur. Whereas a party in other enforcement instruments has statutory obligations under CERCLA, a PPA allows a non-liable party to provide substantial benefits to the EPA as the basis for a PPA. The PPA is designed to address the concern that once an otherwise non-liable party acquires the property, it will need legal protections that allow it to perform important cleanup work or other valuable improvements to the property. As of October 2025, nearly 200 Superfund sites have utilized PPAs, leading to substantial

remediation work completed at the expense of a purchaser. EPA staff noted that the monetary benefits to the EPA from PPAs often involve millions of dollars in remediation work, varying on the site and specific agreement. As of October 2025, more than \$300 million dollars in cash payments from PPAs have gone towards cleanup and reimbursement of past cleanup. This arrangement alleviates the financial burden of remediation on the EPA and results in the successful deletion of Superfund sites from the National Priorities List. Having a committed partner to remediate and reuse a site allows the EPA to achieve its environmental protection goals more efficiently. Importantly, the EPA and the DOJ face minimal risk utilizing PPAs, as the non-labile party voluntarily assumes much of the financial risk in exchange for significant legal protections provided under the PPA.

***PPAs are subject to the same challenges that exist in other enforcement instruments: extended negotiations and adapting the agreement for site-specific circumstances.***

Despite these benefits, challenges exist in the development of PPAs, many of which are experienced with other enforcement instruments. The PPA process often involves extensive back-and-forth communication and coordination among multiple parties, including the purchaser, EPA regional offices, EPA headquarters, DOJ, and sometimes state and local governments. While respondents generally viewed this coordination and communication positively, they also reported instances of disagreements and bottlenecks during the process. These issues can arise from stakeholder turnover, potential delays due to deliberations over language changes in the PPA, and alternative processes (other Agency, state, and/or local programs) interfering with the PPA.

Moreover, some respondents indicated that stakeholders must adhere to strict rules regarding remediation requirements for Superfund sites, resulting in an extensive remediation process that contributes to prolonged timelines and additional procedural complexities. The unique characteristics of each site further complicate the process, as the specific details and circumstances of a site cannot be addressed with a one-size-fits-all approach. This necessitates careful consideration and negotiation, which can slow down the process and present additional challenges for the EPA in executing PPAs effectively.

**What catalysts or challenges did the purchaser/lessee encounter in the PPA process?**

***The economic opportunity, legal protections, and federal support encourages third party purchasers to pursue a PPA.***

One of the primary incentives for a prospective purchaser to pursue a PPA is the economic opportunity it presents. Purchasers are often motivated by the potential to remediate and subsequently profit from the redevelopment of a site. Additionally, the legal protections offered by PPAs are critical, as some respondents described the additional legal protections (namely liability protection) offered through the PPA process as a necessity compared to other institutional controls. Additionally, support from EPA and DOJ staff during the PPA process is a crucial catalyst. Purchasers highlighted the quick response to purchaser inquiries from both the EPA and DOJ, as well as the exceptional attention to detail and clarity regarding relevant statutory and regulatory requirements. Similarly, respondents emphasized the quality of legal expertise and transparency provided by federal staff as vital components that facilitated the PPA process. Furthermore, respondents noted that model documents from OSRE staff provided guidance and parameters to purchasers. Due to these catalysts, and assuming the right situation arose, purchasers indicated they would enter into a PPA again, highlighting the legal and economic benefits of a PPA for a purchasing entity.

***The slow remediation negotiation process often imposes a burden on purchasers.***

Despite the numerous incentives, purchasers face challenges during the PPA negotiation process. A major hurdle noted by respondents are the challenges stemming from the negotiation timeline. The PPA negotiation process often takes from six months to over two years, according to estimates from interviewed EPA staff. Although this timeframe is shorter than that of Superfund sites using other enforcement instruments, the expediting nature of PPAs for redevelopment purposes means purchasers are eager to see a return on investment as quickly as possible.

Additionally, purchasers frequently expressed frustration with the time-consuming nature of negotiating remediation work plans, as well as the challenges of adhering to timelines and budgets. Delays often result in missed deadlines and increased costs, particularly regarding legal expenses due to the extended back-and-forth negotiations. Some purchasers also reported feeling treated like "the bad guys" (akin to Potentially Responsible Parties) during the negotiation process, despite the purchaser's role in providing a significant service to the EPA and community, albeit with their own economic incentives in mind. Furthermore, the purchaser is performing a service for a site in which they are not the original polluter. Both purchasers and some EPA staff recommended revisiting and streamlining the PPA processes to reduce bureaucratic burdens, costs, and timelines for purchasers, thereby enhancing the overall efficiency of the PPA negotiation process.

Lastly, some respondents noted they had to approach the EPA to initiate a PPA, indicating purchasers benefit by having prior knowledge about a site, awareness of the availability of redevelopment tools, and familiarity with the PPA process. Most respondents (both EPA staff and purchasers) indicated that they had previous experience with PPAs before engaging in their most recent PPA.

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## Recommendations and Opportunities for Additional Evidence Building

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The evaluation team makes the following recommendations to address some of the challenges identified in this evaluation:

**1) Challenge 1: Purchasers expressed that the remediation and PPA negotiation processes often take too long to be economical for the purchaser to pursue/execute a remediation and redevelopment.**

***Recommendation 1: Identify opportunities to make negotiations less burdensome for prospective purchasers.***

This may include focusing on increasing purchaser understanding of tradeoffs (specific language changes initiated by purchaser/lessee versus the amount of time spent on negotiations) from utilizing standardized model language provided to purchasers by the EPA.

***Recommendation 2: Refer EPA teams involved in the PPA process to each Regional Continuous Improvement Program Manager (CIPM) and/or the Headquarter Continuous Improvement Branch.***

Continuous improvement helps the Agency maximize the efficiency of internal processes and address enterprise-wide issues. The Continuous Improvement Branch coordinates the agencywide implementation of the Lean management system and could help to identify process improvements (e.g., standardization, automation, etc.) within the EPA's control.

**2) Challenge 2: Regions may not be fully utilizing the PPA tool.**

***Recommendation 1: Explore factors contributing to the frequency of EPA Regions utilizing PPAs.***

While not directly answering an evaluation question, the evaluation team identified the distribution of PPAs across EPA Regions as a point of further exploration (see Figure 1). We recommend delving into this finding, potentially via a short-term evaluation, to determine if there is a reason (e.g., historical context, size of the Region, economic potential, land use planning) for why some Regions have differing amounts of PPAs utilized, and if some/all Regions could further utilize PPAs.

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## Conclusions

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PPAs can be an effective tool to help remediate Superfund sites and put them back into productive use, resulting in numerous environmental, social, and economic benefits. When possible, the EPA, communities, and purchasers would realize these benefits sooner by reducing the time needed to remediate a site and put it back into productive reuse. Recommendations outlined in this report can support the EPA's PPA process.

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