

**Alabama Department of Public Health**  
**Final Public Health and Infrastructure Improvement Plan (PHIIP)**  
**Bureau of Environmental Services**

Table of Contents

1. Public Health and Infrastructure Improvement Plan (PHIIP) Overview .....	2
a. Background.....	2
i. Interim Resolution Agreement.....	2
ii. Environmental Health Assessment .....	3
iii. Site Conditions and Other Prerequisites for Onsite System Installations.....	4
b. Purpose.....	4
c. Timing.....	4
d. Definitions.....	4
2. Plan Development and Implementation.....	6
3. Community Input.....	7
4. Public Health and Infrastructure Improvement Plan (PHIIP).....	7
a. Methodology for Selecting and Prioritizing Lowndes County Residents to Receive Onsite Wastewater Systems .....	7
b. Timeline for Installing Onsite Wastewater Systems .....	8
c. Number and Type of Onsite Wastewater Systems to Be Installed.....	10
d. Process for Informing Residents of ADPH’s Lowndes County Septic System Improvement Program .....	10
e. Obtaining and Using Federal and Other Funding .....	11
f. Initiatives to Expand Access to Onsite Sewage Systems (OSS).....	12
g. Continued Collection of Data for Compliance with Title VI and Section 1557.....	13
h. Continued Public Health Information Campaign and Information-Sharing with Healthcare Providers.....	13
i. Screening and Monitoring for Infectious Diseases and Outbreaks Related to Raw Sewage Exposure.....	14
j. Immediate Temporary Solutions and Additional Solutions to Expand Access to Onsite Sewage Systems.....	15

k. Continuation of the Moratorium .....	16
l. Implementation of CDC Environmental Health Technical Assistance Recommendations.....	17
m. Community Outreach and Engagement Plan.....	17
5. Contact Information .....	19
Appendix A .....	20

---

**1. Public Health and Infrastructure Improvement Plan (PHIIP) Overview**

**Background**

***Interim Resolution Agreement***

On May 3, 2023, the Alabama Department of Public Health (ADPH) entered into an Interim Resolution Agreement (Agreement) with the United States Departments of Justice (DOJ) and Health and Human Services (HHS) following a civil rights investigation into ADPH’s onsite wastewater and infectious diseases and outbreaks programs. Under the Agreement, ADPH has taken multiple actions to improve access to proper onsite wastewater disposal and improve public health for Lowndes County residents who lack the means to install/repair functioning septic systems. These actions include suspending criminal penalties and liens related to possible violations of sanitation laws, expanding public health awareness, and developing a plan to improve public health and wastewater infrastructure in Lowndes County.

Under the Agreement, ADPH is required to create a Public Health and Infrastructure Improvement Plan (PHIIP) that sets forth actions ADPH will take to protect public health, improve the onsite wastewater infrastructure of Lowndes County, and establish a strategy for abating the public health nuisance of raw sewage exposure from inadequate onsite sewage systems (OSS) in Lowndes County. ADPH has already begun implementing many of these actions as outlined in more detail below. Primary among these actions is the creation of ADPH’s [Lowndes County Septic System Improvement Program](#) through which ADPH will fund the installation or repair of OSS for Lowndes County residences. ADPH created the Lowndes County Septic System Improvement Program in May 2023.

On August 23, 2023, ADPH received a direct appropriation of \$5 million of American Rescue Plan Act 2 (ARPA) funds to address sewage problems in Black Belt counties. Of these funds, the State legislature allocated \$1.5 million to specifically address Lowndes County sewage problems. ADPH is using this funding to implement the PHIIP and the Lowndes County Septic System Improvement Program.

ADPH created this PHIIP pursuant to the Agreement. DOJ and HHS will review this Plan and provide final approval.

### ***Environmental Health Assessment***

The Agreement requires ADPH to conduct a comprehensive assessment of site conditions and prerequisites for the installation of OSS in Lowndes County. As part of this provision, ADPH launched a comprehensive Environmental Health Assessment (Assessment) on January 17, 2024. The purpose of the Assessment is to determine which residences face the most serious environmental and health risks from exposure to raw sewage from inadequate OSS. ADPH will use the information collected through the Assessment to prioritize households for installation of new onsite septic systems or repairs, as appropriate, through ADPH's Lowndes County Septic System Improvement Program.

ADPH developed the Assessment's environmental risk component with technical assistance from the Centers for Disease Control and Prevention (CDC). The Assessment asks questions about each home's individual sewage conditions, including whether residents use straightpipes or other forms of inadequate wastewater systems, how often they experience issues such as sewage backing up into their homes, and how close they are to sources of raw sewage such as cesspools and ditches. The Assessment also asks about the age of residents and whether any are experiencing certain medical conditions that cause them to be more vulnerable to becoming ill if they come into contact with raw sewage. Additionally, the Assessment asks questions to determine what barriers are preventing residents from obtaining functioning ADPH-permitted systems.

ADPH published the Assessment on its website on January 17, 2024. ADPH issued a news release statewide on January 18, 2024 (<https://www.alabamapublichealth.gov/blog/2024/01/nr-18.html>), to let residents know the Assessment is available to complete online and that a printed version, with a postage paid return envelope, would be mailed out. ADPH worked with a vendor to mail the Assessment to all residences in Lowndes County on January 26, 2024; the total was 4,907 addresses. ADPH also made the Assessment available to complete at the Lowndes County Health Department, and will train ADPH staff to assist residents with the Assessment.

To encourage residents to fill out the Assessment, ADPH created a postcard that included a QR code linked to the [Lowndes County Septic System Improvement Program](#) page on ADPH's website. ADPH distributed the postcard at public places across the County, such as community centers, stores, and gas stations. To answer common questions about the Assessment, ADPH developed a Frequently Asked Questions and Answers document. Copies are available at the Lowndes County Health Department and ADPH is distributing the document at community events.

ADPH held several community meetings to assist residents in filling-out the Assessment, answer questions, and encourage participation. These include meetings with residents at Snow Hill Christian Church on March 18, 2024, and with local elected leaders at Hayneville Town Hall on March 19, 2024. ADPH also conducted outreach on the Assessment at several community meetings and events in Fort Deposit, Mosses, and White Hall in April 2024. ADPH is continuing to contact community representatives to encourage participation in the Assessment and to answer questions. These community representatives include church leaders, members of local government, school leaders, and local business owners. ADPH is also continuing to attend and

organize community outreach events where residents have the opportunity to fill out the Assessment in-person and ask questions.

ADPH engaged the [Black Belt Community Foundation](#) (BBCF) to provide staff resources in Lowndes County to assist with community outreach and individual Assessment follow-up efforts. ADPH trained BBCF Community Health Workers on administering the Assessment. In addition to the meetings held in March, BBCF is also organizing 9 community events in Lowndes County and will be attending additional events to encourage and assist residents with completing the Assessment.

As of May 3, 2024, the total number of Assessments received is 314. ADPH is required to provide monthly updates to DOJ and HHS.

### ***Site Conditions and Other Prerequisites for Onsite System Installations***

Under ADPH's Onsite Sewage Treatment and Disposal Rules, for engineered onsite sewage systems, covenants that run with the land must be probated before an ADPH Approval For Use is issued. For conventional systems, ADPH does not verify property ownership. For both engineered and conventional systems, ADPH requires a legal description of the property which may be a deed, subdivision plat, or survey.

Under ADPH's new Lowndes County Septic System Improvement Program, for participants whose property will require installation of an engineered system, ADPH has determined it can waive the covenants to run with the land requirement of the ADPH Onsite Sewage and Disposal Rules for the duration of ADPH's Lowndes County Septic System Improvement Program. This means there is no clear title to property requirement for septic system installations under ADPH's Lowndes County Septic System Improvement Program.

Based on responses to the Assessment as of April 23, 2024, residents have identified the following as barriers preventing them from repairing or obtaining a functioning, ADPH-permitted system: lack of money and credit.

### ***Purpose***

This (PHIIP) sets forth concrete actions ADPH will take to protect public health, improve the onsite wastewater infrastructure of Lowndes County, and establish a strategy for abating the public health nuisance of raw sewage exposure from inadequate onsite wastewater systems in Lowndes County.

### ***Timing***

The final United States-approved PHIIP will cover a three-year period from the date that the United States approves the PHIIP, with termination as provided in Section VI (Effective Date and Termination) or as modified by all Parties to the Agreement.

### ***Definitions***

Approval for Use - The authorization issued to the responsible person to operate an OSS or EDS. This is issued by the local health department (LHD) after all conditions of these rules and permits are satisfied.

Covenant - A legal document stating that an engineered OSS is installed on a property and is signed by the property owner and recorded in a county probate office.

Conventional Onsite Sewage System (OSS) - a system for treating sewage that involves the use of a septic tank or proprietary advanced treatment unit that has been issued a Product Permit followed by non-pressurized dispersion of effluent in an effluent disposal field (EDF) such that the trench bottom and sidewalls are located completely in unaltered natural soil and the bottom of the trench is at a depth not greater than 60 inches below the unaltered natural ground surface. Such systems do not require an engineered design. Statewide, a conventional septic system is the most common type of OSS installed.

Engineered OSS - all systems, other than those meeting the definition of a Conventional OSS, that require an engineer design. This includes, but is not limited to, controlled fill mound systems, advanced treatment (except proprietary advanced treatment followed by a conventional EDF), drip irrigation, low pressure pipe, non-proprietary uniform distribution, constructed wetlands, and systems with a septic tank, followed by an EDF where any portion of the EDF protrudes above the unaltered natural soil surface.

Environmental Health Assessment (Assessment) - the series of comprehensive questions ADPH developed to determine which Lowndes County residents face the most serious health risks from exposure to raw sewage from inadequate onsite wastewater systems for purposes of prioritization of septic system installations/repairs under ADPH's Lowndes County Septic System Improvement Program.

Moratorium - the temporary suspension of the state law authorizing ADPH to refer for prosecution potential violations of the sanitation laws in the Code of Alabama, regulations in the Alabama Administrative Code, or any other State or local statute or regulation used by ADPH against residents without the means to install or repair an ADPH-permitted system as outlined in further detail below.

Parties - the Alabama Department of Public Health (ADPH) and the United States Departments of Justice (DOJ) and Health and Human Services (HHS).

Program Administrator - the third-party organization/company selected to administer ADPH's Lowndes County Septic System Program.

Public Health and Infrastructure Improvement Plan (PHIIP) - the plan setting forth actions that ADPH will take to protect public health, improve onsite wastewater infrastructure of Lowndes County, and abate the public health nuisance of raw sewage exposure from inadequate onsite wastewater systems in Lowndes County.

Sewage or Wastewater - this term refers to the following:

(a) Sewage -- waterborne waste of similar composition and strength as may be found in the typical residence or dwelling and that typically has a concentration of 250 mg/l of BOD, Total Suspended Solids - 250 mg/l, Ammonia - 10 mg/l, and Total Phosphorus - 9 mg/l.

(b) High Strength Sewage -- waterborne waste from establishments, such as kitchen waste, that is of similar composition but of higher strength than would be found in a typical dwelling. This may be permitted at the discretion of the LHD.

(c) Graywater -- the portion of sewage generated by a water-using fixture, excluding toilet and food preparation waste from dwellings and regulated establishments. It is of similar composition but of lower strength than sewage.

(d) Processed Septage -- waterborne waste of similar composition and strength found in a typical residence or establishment where the solids have been removed through a dewatering process.

Without the Means - an individual “without the means” to install or repair an ADPH-permitted OSS refers to a resident or homeowner who faces one or more financial, legal, or other barrier limiting their ability to complete the process of obtaining a functioning, ADPH-permitted OSS. This term is to be interpreted expansively with the presumption that residents who currently do not have an ADPH-permitted OSS are in that situation because they are without the means to do so.

## **2. Plan Development and Implementation**

Several units of ADPH were essential in developing and drafting the PHIIP. They include, but are not limited to: Administration; Governmental Affairs; External Affairs and Community Relations; Office of Health Equity and Minority Health (OHEMH); Legislative and External Affairs; Office of General Counsel (OGC); Environmental Services; Prevention, Promotion and Support; Health Media and Communications; Informatics and Data Analytics (OIDA); Disease Control and Prevention; Communicable Disease; Infectious Disease & Outbreaks (ID&O); and the East Central Public Health District (ECD). The United States reviewed and approved the PHIIP on [date to be inserted]<sup>1</sup>. As required by the Agreement, Section II.F.1.e.ii., ADPH has hired a full-time Community Liaison for Lowndes County and Black Belt Communities – Ursula Crittenden<sup>2</sup> – with oversight for implementation of the PHIIP on April 1, 2024. The community liaison serves the Black Belt communities, focusing on Lowndes County, in order to ensure sewage issues are addressed through contacts with and involving stakeholders and partners. The liaison coordinates outreach efforts which include scheduling events, identifying target audiences, and gathering and disseminating appropriate public health materials in coordination with community partners and stakeholders to assist with onsite sewage issues. The community liaison reports to a committee consisting of one representative from OGC, Environmental Services, OIDA, Disease Control and Prevention, and ADPH’s East Central District.

To ensure a consistent stream of funding to support ADPH's Lowndes County Septic System Improvement Program, ADPH will assign a Bureau of Environmental Services staff member to seek funding opportunities in conjunction with a Grant Manager with the ADPH Finance Office. The Bureau of Environmental Services and Health Finance will manage and distribute any funds received in accordance with State Finance requirements.

---

<sup>1</sup> The United States will provide approval after ADPH incorporates comments on the PHIIP from Lowndes County stakeholders. ADPH is requesting comments to be submitted by June 1, 2024.

<sup>2</sup> Ursula Crittenden’s official ADPH title is Environmental Supervisor.

### **3. Community Input**

On April 1, 2024, ADPH appointed a Community Liaison for Lowndes County and Black Belt Communities for the purpose of establishing relationships and obtaining and implementing Lowndes County community feedback. On September 26, 2023, ADPH and DOJ/HHS met with a group of religious leaders from Lowndes County to discuss the draft Assessment and to obtain feedback on data collection, the methods for determining residences most-at-risk of exposure to raw sewage, and questions used to solicit information from residences. On February 7, 2024, ADPH staff met in person with Pastor Brenson Crenshaw of New Salem Missionary Baptist Church, to discuss ways to increase completion rates for the Assessment.

### **4. Public Health and Infrastructure Improvement Plan (PHIIP)**

In compliance with Section II.F. of the Parties' Agreement, ADPH developed this PHIIP. The PHIIP sets forth actions that ADPH will take to protect public health, improve onsite wastewater infrastructure for Lowndes County residents, and to establish a strategy for abating the public health nuisance of raw sewage exposure from inadequate onsite wastewater systems in Lowndes County. These actions will be prioritized based on risk of exposure to infectious diseases and public health threats.

#### **a. Methodology for Selecting and Prioritizing Lowndes County Residents to Receive Onsite Wastewater Systems**

ADPH's Bureau of Environmental Services, Infectious Diseases & Outbreaks Division of the Bureau of Communicable Disease, Office of Informatics and Data Analytics, and its East Central District consulted with CDC for technical assistance to develop the Assessment's environmental risk component for the purpose of determining residents' level of risk of infectious diseases and public health threats related to exposure to raw sewage from inadequate onsite wastewater systems.

ADPH developed a ranking system in consultation with the CDC to select and prioritize Lowndes County residences for installation of septic systems through ADPH's [Lowndes County Septic System Improvement Program](#) based on residents' answers to the Assessment. The CDC, DOJ, and HHS approved the ranking system, which considers three risk criteria:

1. Adequacy of current onsite wastewater system;
2. Exposure to raw sewage; and
3. Health conditions of residents.

Based on the above criteria, residences are placed in one of three tiers:

- I. Inadequate system, exposure to sewage, and health conditions;
- II. Inadequate system and exposure to sewage (no health conditions); and
- III. Inadequate system only (no exposure to sewage or health conditions).

Residences within Tier I are further ranked based on their proximity to the raw sewage:

1. Sewage backed up into your home;
2. Sewage under the house; and
3. Sewage within 30 feet of the house.

ADPH's Office of Informatics and Data Analytics (OIDA) is completing data input and analysis using the ranking system. Assessments are analyzed in batches based on time periods during which they are received. For example, Assessments received during Phase 1 (December 8, 2023 through December 31, 2023) have been analyzed and placed into Tiers I, II, and III. Tier I was then analyzed for a second time to determine residences within Tier I that are most at risk. This was determined by reviewing answers to question 8 of the Assessment.

The results of the ranking system are shared with the Lowndes County Septic System Improvement Program Administrator once analysis is complete for each batch of Assessments. The Program Administrator is responsible for contacting the soil professionals, the first step in the installation process, once this information is received.

Action Steps:

ADPH will:

- 1) Analyze data received from Assessments based on the required criteria.
- 2) Conduct the data analysis to rank residences within Tiers I, II, or III.
- 3) Continue to administer the Assessment and implement the ranking criteria and priority methodology described in this section.

**b. Timeline for Installing Onsite Wastewater Systems**

Installation of onsite wastewater systems begins with a soil and site parameters assessment. This assessment is done by a licensed soil professional (engineer, land surveyor, geologist, or professional soils classifier). The Program Administrator will implement the Lowndes County Septic System Improvement Program, will hire the appropriate soil professional to do this assessment. Based on the findings of the soil and site parameters assessment, the licensed soils professional will recommend either a conventional OSS or an engineered OSS.

If an engineered OSS is recommended, the ADPH Program Administrator will submit the OSS design to the Lowndes County Health Department as an Application for a Permit to Install. If the Lowndes County Health Department finds discrepancies in the report, it will contact the soil professional to correct any identified issues. After all corrections are completed, the Lowndes County Health Department will issue the Permit to Install. Then, the ADPH Program Administrator will hire a licensed installer to install a system based on the permit conditions.

If a conventional OSS is recommended, the Lowndes County Health Department will visit the site to confirm that the listed soil conditions and any other limitations match the Application for a Permit to Install. After the Lowndes County Health Department confirms the accuracy of the information, ADPH will issue a Permit to Install. Then, the ADPH Program Administrator will hire a licensed installer to install the conventional OSS.



Although the timeline for these steps can vary due to major weather events, for example, the steps as detailed above should generally be completed within the following timeframes if ideal circumstances exist:

1. Soil and site parameters assessment: 1-2 weeks
2. Submission of OSS design to Lowndes County Health Department, as part of an Application for a Permit to Install: 2 weeks
3. For conventional systems, Lowndes County Health Department issues the Permit to Install: 2 weeks
4. For conventional systems, after step 3 is complete, the ADPH Program Administrator shall hire a licensed installer to install a system based on the permit within a reasonable time
5. For engineered systems, ADPH shall contact the professional to correct any discrepancies in the engineer's report within 28 days<sup>3</sup>
6. For engineered systems, after the professional corrects all discrepancies, the Lowndes County Health Department shall issue the Permit to Install: 30 days
7. For engineered systems, after steps 5-6 are complete, the ADPH Program Administrator shall hire a licensed installer to install a system based on the permit conditions within a reasonable time

The \$1.5 million ARPA 2 funding allocated to address Lowndes County sewage issues must be expended by December 30, 2026. Funding not expended under ADPH's Lowndes County Septic System Improvement Program will be returned to the State legislature. Therefore, ADPH and its Program Administrator for the Lowndes County Septic System Improvement Program will promptly take all actions to appropriately install onsite systems under the program, as required by ADPH rules and regulations for installation of onsite systems and this PHIIP.

#### Action Steps

- 1) For a conventional OSS, the Lowndes County Health Department visits the site to confirm the listed soil conditions and any other limitations match the application. If so, the Permit to Install is issued.

---

#### <sup>3</sup> **420-3-1-.13 Time Limitations and Permitting Actions**

(1) All ADPH applications shall be submitted to the LHD or the ADPH as applicable.

(a) The LHD or ADPH shall fulfill any request for a permit within 28 calendar days after receiving the application or notify the responsible person of the reason for failure to issue the permit. After the initial 28 days, if the application remains incomplete, the responsible person shall be allowed an additional 30 calendar days to submit a complete application, or the application review period shall expire. After an application has expired, a new application and applicable fee shall be required.

(b) If the application does not meet the requirements of this rule, it shall be denied pursuant to the Ala. Admin. Procedure Act, § 41-22-1, et seq., Code of Ala. 1975.

- 2) For engineered OSS, a permit will be issued based on the engineer's soil report. If there are discrepancies, the professional will be contacted to work out any identified issues, and then the Permit to Install is issued.

**c. Number and Type of Onsite Wastewater Systems to Be Installed**

The number and type of onsite wastewater systems will depend on several factors. The number of systems installed under ADPH's Lowndes County Septic System Improvement Program will be based on the number of residences ranked by ADPH through the Environmental Health Assessments (See 4.a.). The type of onsite wastewater systems installed – conventional or engineered – will depend on the soil and site parameters assessment discussed above. (See 4.b.) The number of systems installed will also depend on available funding.

Based on the current ADPH Lowndes County Septic System Improvement Program, the average cost of a Lowndes County OSS conventional and engineered systems is \$25,000 per residence. Therefore, under ideal circumstances and based on current funding, ADPH's goal is to install approximately 60 systems by December 30, 2026.

Action Steps

ADPH will:

- 1) Provide quarterly updates on the number of onsite systems installed under the Lowndes County Septic System Improvement Program on the program's [website](#).

**d. Process for Informing Residents of ADPH's Lowndes County Septic System Improvement Program**

ADPH informed Lowndes County residents about the methodology for selecting and prioritizing residences, the process for installation, and the number and type of systems to be installed by its Lowndes County Septic System Improvement Program (items a-c above), through a variety of methods. Information was shared widely through community outreach events, news releases, mailings, social media posts, and on ADPH's website. Additionally, ADPH worked with local faith and community leaders and the Lowndes County Board of Commission to disseminate information throughout Lowndes County. Individuals who provided their contact information through the Assessment were also provided this information directly. News releases can be accessed through the following links:

- 1-18-24: News Release: <https://www.alabamapublichealth.gov/blog/2024/01/nr-18.html>
- 7-5-23 News Release: <https://www.alabamapublichealth.gov/blog/2023/07/nr-05b.html>
- 6-6-23 News Release: <https://www.alabamapublichealth.gov/blog/2023/06/nr-06.html>

ADPH will continue to use these methods of communication to disseminate information and other updates about ADPH's Lowndes County Septic System Improvement Program. This includes any information about future deadlines related to the program. For residents selected for an onsite system, ADPH will provide information directly through: (1) email, (2) phone, and (3) regular mail.

Action Steps

ADPH will:

- 1) Continue to provide information to participants in ADPH's Lowndes County Septic System Improvement Program in the following order: (1) email, (2) phone, and (3) regular mail.
- 2) Continue to provide additional information to residents relating to ADPH's Lowndes County Septic System Improvement Program through community outreach events, news releases, mail-outs, social media posts, the ADPH website, and through collaboration with local faith and community leaders and the Lowndes County Board of Commission.

**e. Obtaining and Using Federal and Other Funding**

ADPH has applied for funding to support its Lowndes County Septic System Improvement Program from federal agencies, private foundations, and other sources. In 2023, ADPH received from the State Legislature a direct appropriation of \$5,000,000 of second tranche ARPA 2 funds for sewage problems in Black Belt counties. Of these funds, the State Legislature allocated ADPH \$1.5 million to address the sewage issues in Lowndes County, with the remaining funds to address similar issues in other Black Belt counties. The ARPA 2 funds were contracted through a Request For Proposals process – one to focus on Lowndes County, and a second to focus on other Black Belt counties. ADPH is required to expend the ARPA 2 funds for Lowndes County by December 30, 2026.

In 2024, ADPH met with the State Finance Director and General Fund Budget Chairs to discuss requesting funding support from the FY25 General Fund Budget. As a result, the Governor's Office presented a FY25 budget to the Legislature that included \$1.5 million for the Lowndes County Septic System Improvement Program. The Governor's Budget is presented to both legislative bodies for review and approval. Budget items requested by the Governor could be changed during the legislative process. ADPH is communicating with the region's federal representatives and senators on the need for funding.

To ensure a consistent stream of funding to support ADPH's Lowndes County Septic System Improvement Program, ADPH will assign a Bureau of Environmental Services staff member to seek funding opportunities in conjunction with a Grant Manager from the ADPH Finance Office. The Bureau of Environmental Services and Finance Office will manage and distribute any funds received in accordance with State Finance requirements.

In December 2023, ADPH received approval to use existing CDC National Wastewater Surveillance System funds to implement wastewater surveillance at schools in Lowndes County. These funds will include testing for respiratory viruses (e.g., SARS-CoV-2, influenza, respiratory syncytial virus), norovirus, and soil-transmitted helminths. CDM Smith, Inc. has been approved to be a sole source vendor and will be responsible for onboarding new sites (including the school in Lowndes County), installing autosamplers, and collecting wastewater samples. ADPH aims to meet with school administrators in Lowndes County during Summer 2024 to obtain buy-in on the wastewater surveillance project prior to contact by CDM. Until the soil transmitted

helminths test is ready to be implemented, ADPH will test wastewater for the other pathogens mentioned above, which are important pathogens of concern in Lowndes County.

Action Steps

ADPH will:

- 1) Apply for additional funding through grants from federal agencies including the United States Department of Agriculture, Environmental Protection Agency, and Department of Housing and Urban Development.
- 2) Apply for additional funding from private foundations.
- 3) Seek additional funding from the state legislature.
- 4) Continue to communicate with federal representatives and senators for the region the need for funding for Lowndes County Septic System Improvement Program.
- 5) Provide status updates on the 15<sup>th</sup> day of each month to the United States, unless modified by the Parties to the Agreement, regarding ADPH's efforts to obtain funding.

**f. Initiatives to Expand Access to Onsite Sewage Systems (OSS)**

Under ADPH's Lowndes County Septic System Improvement Program, the ADPH-permitted OSS will be provided with a minimum **two-year warranty**, based on manufacturer standards. ADPH issues permits for septic system products. Standard language from product permits state that System(s) shall be provided with a minimum two-year warranty that complies with the provisions of Ala. Code 1975 §§7-2-316(2), 7-2-714(1)(3), and 7-2-318, and under which the repair or replacement of a failing or defective product, System(s), or a component thereof shall be guaranteed at no cost to the owner

As required under the Agreement (Section II.F.1.f), ADPH will not seek liens in relation to the installation or maintenance of systems under the Lowndes County Septic System Improvement Program. ADPH will only accept contractors who agree to not seek liens in relation to installation or maintenance of systems. ADPH will specifically state in any contract that the recipient of ADPH-provided funds will not place any lien on the property when ADPH-provided funds are used for OSS installation, and further, any sub-contractors hired by the recipient will not place liens on the property.

ADPH has coordinated with Faulkner Law, Thomas Goode Jones School of Law-Public Interest Program to provide assistance to residents that are facing obstacles in obtaining clear title to their property. The Director of the Public Interest Program has agreed to provide individuals to attend any of the ADPH community events held in Lowndes County for the purpose of offering legal aid related to heir property.

Action Steps

ADPH will:

- 1) Require OSS's installed by licensed installers through any ADPH's program, to provide warranties of at least two years in accordance with manufacturer standards.
- 2) Not seek liens in relation to the installation or maintenance of systems.
- 3) Require that contractors, and sub-contractors, agree to not seek liens in relation to installation or maintenance of systems.

**g. Continued Collection of Data for Compliance with Title VI and Section 1557**

DOJ and HHS Title VI regulations require recipients of federal financial assistance, such as ADPH, to “keep such records and submit to [the agencies] timely, complete, and accurate compliance records at such times, and in such form and containing such information . . . to ascertain whether the recipient has complied or is complying with [the regulations]. In general, recipients should have available for [DOJ and HHS] racial and ethnic data showing the extent to which members of minority groups are beneficiaries of federally assisted programs.” 28 C.F.R. § 42.106(b) (DOJ); 45 C.F.R. § 80.6(b) (HHS). In its agreement for receiving federal financial assistance, ADPH agrees to comply with these and other requirements.

To comply with the Title VI data collection requirements, ADPH asks for residents' race/ethnicity information as part of the Assessment.

Additionally, those responsible for implementing ADPH's Lowndes County Septic System Improvement Program, including contractors, will be required to collect race and ethnicity data as part of the application process for residences who seek ADPH-permitted systems.

Action Steps

ADPH will:

- 1) Continue collecting race and ethnicity data of residents through the Assessment.
- 2) Require those responsible for implementing its OSS installation program, including contractors, to collect race and ethnicity data for residents as part of the application process for the Lowndes County Septic System Improvement Program.

**h. Continued Public Health Information Campaign and Information-Sharing with Healthcare Providers**

In July and August of 2023, ADPH finalized a series of informational flyers on topics related to septic systems and exposure to raw sewage, including:

- *Exposure to Sewage Can Make You Sick - Learn How To Protect Yourself*,  
<https://www.alabamapublichealth.gov/onsite/assets/sewage-exposure-flyer.pdf>
- *Prevent Sewage Exposure*,  
<https://www.alabamapublichealth.gov/onsite/assets/prevent-illnesses-flyer.pdf>
- *Protect Yourself from Illness*,  
<https://www.alabamapublichealth.gov/onsite/assets/sewage-illnesses-flyer.pdf>

- *Maintaining Your Septic System*,  
<https://www.alabamapublichealth.gov/onsite/assets/maintain-system-flyer.pdf>
- *Cleaning Up Indoor Sewage Spills*,  
<https://www.alabamapublichealth.gov/onsite/assets/indoor-sewage-spill-flyer.pdf>

ADPH posted these flyers on its website and social media, mailed them to Lowndes County residents, and distributed them during community outreach events and meetings with local faith and community leaders and government officials.

ADPH also shared these and other materials to healthcare providers through a Health Action Network (HAN) alert. The HAN alert went out to providers including private physicians, urgent care facilities, pharmacies, and medical associations. In addition, the Alabama Department of Education distributed the HAN alert to Lowndes County schools. ADPH is encouraging healthcare providers to expand their understanding of the link between inadequate wastewater sanitation and related health conditions, diagnostic considerations, and recommended treatments by promoting the University of Alabama (UAB) School of Medicine online course – UAB Sanitation Health Study. Healthcare providers can receive 1.5 hours of continuing medical education credit by registering and completing the course by using the following link: [Registration Page for SL001](#).

#### Action Steps

ADPH will:

- 1) Continue to update informational flyers on topics related to OSS and exposure to raw sewage.
- 2) Continue to make informational flyers available to the public by posting them on an easily accessible page on ADPH's website.
- 3) Continue to disseminate the above referenced information through ADPH's social media, mailings to Lowndes County residents, community outreach events and meetings with local faith and community leaders and government officials, and HAN alerts to healthcare providers.

#### **i. Screening and Monitoring for Infectious Diseases and Outbreaks Related to Raw Sewage Exposure**

ADPH updates its website ([alabamapublichealth.gov/bcd/index.html](http://alabamapublichealth.gov/bcd/index.html)) with the list of notifiable diseases and conditions, the time frame to report, and the required method of reporting. The Infectious Diseases & Outbreaks Division (ID&O) will continue to investigate reports of notifiable diseases and conditions, including cases of public health importance and outbreaks of any kind, following appropriate processes and protocols. ADPH medical officers are available to provide guidance on specimen collection and testing and offer treatment recommendations as needed. ADPH will also provide stool specimen collection cups to residents when needed.

ADPH will collaborate with the UAB Sanitation Health Program and ADPH's state public health laboratory to offer screening for notifiable diseases and conditions. UAB facilitates testing in collaboration with the University of North Carolina and CDC's parasitic disease diagnostic

division. Testing and treatment are provided through this program free of charge for uninsured residents. The ADPH health laboratory also performs microscopy testing for soil transmitted helminths and requests assistance from CDC when needed. With funding from CDC, UAB's program continues to offer a \$50 incentive for patients who seek care through local healthcare providers and request testing for notifiable diseases and conditions.

ID&O will explore the use of additional supplemental questions for specific disease investigations.

ADPH uses the Alabama National Electronic Disease Surveillance System Base System (ALNBS) and ID&O continues to research if there are fields where supplemental questions could be added, such as questions related to exposure to raw sewage.

The Public Health District Epidemiologist for the East Central District will continue to monitor cases of infectious diseases in Lowndes County, and staff will continue to recommend appropriate control measures and provide educational materials. Epidemiologists will monitor the enteric disease "documents requiring review" queue within the ALNBS to identify cases of reportable notifiable diseases and health conditions in Lowndes County with an exposure or condition of concern. Enteric diseases are caused by micro-organisms such as viruses, bacteria, and parasites that cause intestinal illnesses and are most frequently acquired through contaminated food and water, contact with fecal matter, and through other means. Epidemiologists will also review syndromic surveillance data to look for trends or spikes of gastrointestinal illness.

In December 2023, CDC's National Wastewater Surveillance System program approved ADPH's proposal to implement wastewater surveillance in participating schools in Lowndes County. In addition to respiratory viruses (e.g., SARS-CoV-2, influenza, and respiratory syncytial virus), surveillance will include monitoring for norovirus and soil-transmitted helminths in the wastewater. If any soil-transmitted helminths are detected in the wastewater, ADPH will provide education to health care providers and the general public, as well as offer control measures, testing, and treatment recommendations to residents.

#### Action Steps

ADPH will:

- 1) Continue to investigate reports of notifiable diseases and conditions in residents of Lowndes County, including cases of public health importance and outbreaks of any kind.
- 2) Monitor enteric diseases reported for patients residing in Lowndes County and review syndromic surveillance data for Lowndes County residents.
- 3) Meet with Lowndes County Public Schools' Administrators in Summer 2024 to propose conducting wastewater surveillance at one of their member schools. If ADPH gets buy-in from the school administrators, ADPH will install an autosampler to facilitate weekly sampling.

#### **j. Immediate Temporary Solutions and Additional Solutions to Expand Access to Onsite Sewage Systems**

ADPH contacted state environmental directors from other states for ideas and input on immediate temporary solutions to expand access to onsite sewage systems through the State Onsite Regulators Association online listserv, which consists of state onsite wastewater program directors. ADPH received three replies from members in the United States (Nebraska, Oregon, Connecticut) and one from Canada (Manitoba). All replies referenced using holding tanks as an immediate temporary solution and offered no other possible solutions. After consideration, ADPH determined that holding tanks are not financially viable. Also, holding tanks and portable toilets are not a good temporary fix because the tanks and toilets have to be rented and require a pumping contract. ADPH considered and rejected this proposal because using available state funds in this manner reduces the funding available for permanent solutions (onsite sewage disposal installations in accordance with ADPH rules).

ADPH will continue to investigate and search for viable immediate temporary solutions by consulting Alabama Department of Environmental Management (ADEM) to discuss options for temporary solutions; soliciting input from the selected Program Administrator on ideas for temporary solutions that would be appropriate for the community since they are local to Lowndes County; and soliciting input from Lowndes County residents as part of community outreach.

#### Action Steps

ADPH will:

- 1) Continue to investigate and discuss options for temporary solutions through community outreach, soliciting input from Lowndes County residents, and by consulting ADEM.
- 2) Solicit input from the selected Program Administrator on ideas for temporary solutions that would be appropriate for the community since they are local to Lowndes County.
- 3) Solicit input from Lowndes County residents, regarding whether there is support for holding tanks or portable toilets as temporary solutions.

#### **k. Continuation of the Moratorium**

On June 6, 2023, ADPH issued a Moratorium on its enforcement of sanitation-related criminal statutes and related lien statutes against Lowndes County residents without the means to install or repair an ADPH-permitted OSS designed to function at the residence. Under the Moratorium, ADPH will no longer report Lowndes County residents to law enforcement for not having a working septic tank or for straightpiping their wastewater as long as they:

- a. Provide information to ADPH about their method of wastewater disposal (i.e., complete the Assessment); and/or
- b. Apply under any program administered by ADPH to receive an OSS approved by ADPH and designed to function with the specific soil at the property (i.e., complete the Assessment and apply to participate in the Lowndes County Septic System Improvement Program) and keep sewage discharge to their property and not drain it onto other people's property.



ADPH notified the public about the Moratorium through a press release posted on its website and mailed out to all residences in Lowndes County on June 6, 2023. The press release can be found here: <https://www.alabamapublichealth.gov/blog/2023/06/nr-06.html>. To date, ADPH confirms that it has not made any referrals to law enforcement in accordance with the Moratorium and the Agreement.

Under the Agreement, the Moratorium remains in effect for three years from the date that the United States approves the PHIIP. However, ADPH plans to reissue the Moratorium for Lowndes County residents with inadequate onsite sewage systems. The Moratorium will continue to apply to Lowndes County residents that do not have the means to install/repair an ADPH-permitted OSS designed to function at their residence, and residents who do not have an installed ADPH-permitted OSS as of January 1, 2025. The timeline for the conclusion of the Moratorium will be included in the re-issuance of the Moratorium.

#### Action Step

ADPH will:

- 1) Re-issue the Moratorium when the current Moratorium expires. The re-issued Moratorium will include a new expiration date.

### **I. Implementation of CDC Environmental Health Technical Assistance Recommendations**

On May 19, 2023, ADPH requested environmental health technical assistance from the CDC. The request sought “environmental health technical assistance to assess levels of risk of infectious diseases and public health threats that may be associated with exposure to raw sewage and related environmental conditions from inadequate wastewater systems in Lowndes County.” CDC agreed to provide the requested assistance and worked directly with ADPH to develop the Environmental Health Assessment. CDC also provided guidance as ADPH developed the methodology for prioritizing households based on the findings of the Assessment.

ADPH will use the data collected from the Assessment and the prioritization methodology for the Lowndes County Septic System Improvement Program.

#### Action Steps

ADPH will:

- 1) Continue to collect data from the Assessment and implement the prioritization methodology developed in collaboration with the CDC.
- 2) Continue to request technical assistance from CDC as needed, provide any information and resources requested by CDC for technical assistance, and implement the recommendations.

### **m. Community Outreach and Engagement Plan**

Under the Agreement, ADPH is required to create a process to ask for and receive concerns and recommendations on solutions for public health risks tied to raw sewage exposure from inadequate onsite wastewater systems. The Agreement requires ADPH to seek input from Lowndes County residents, wastewater experts, infrastructure experts, soil experts, engineering experts, and environmental justice advocates.

Since May 2023, ADPH and DOJ/HHS have met with religious leaders from Lowndes County and attended meetings of the Lowndes County Commission to discuss the Assessment and obtain feedback on data collection. This has included the methods and questions used for the Assessment and recommendations to increase completion rates for the Assessment. ADPH has also received information from other stakeholders in Lowndes County, through DOJ/HHS.

ADPH will post the PHIIP it submits on May 3, 2024 to the United States on the ADPH website, distribute it at outreach events to solicit community input, and share a link to the document in any related press release. ADPH will ask for Lowndes County stakeholder input on the PHIIP to be submitted by June 1, 2024 and will detail how it considered this community input in the final version of the PHIIP. ADPH recognizes that input from residents, subject matter experts, and environmental justice advocates is beneficial and that the public needs to know how ADPH incorporates this input into its decision-making process.

To ensure that the Lowndes County Septic System Program is successful, ADPH will continue to seek public input throughout the duration of the Lowndes County Septic System Improvement Program. ADPH will seek this input in several ways, including through its Community Liaison for Lowndes County and Black Belt Communities, its Lowndes County Septic System Improvement Program webpage (<https://www.alabamapublichealth.gov/environmental/septic-system-program.html>) and general webpage [www.alabamapublichealth.gov](http://www.alabamapublichealth.gov), and through periodic community outreach and other events.

To ensure that ADPH continues to communicate effectively and is responsive to the needs of Lowndes County residents, ADPH developed a Public Outreach and Participation Plan (**Appendix A**). ADPH developed this plan in consultation with DOJ and HHS. As detailed further in Appendix A, this plan applies broadly to the development of programs, policies, and other efforts to improve wastewater challenges and reduce the related public health risks from exposure to raw sewage from inadequate OSS.

ADPH will continue to update the Lowndes County Commission through monthly communication or attendance at the monthly Commission meetings.

#### Action Steps

ADPH will:

- 1) Post the PHIIP, as submitted to the United States on May 3, 2024, to ADPH's website and seek the public's feedback by June 1, 2024.
- 2) Continue to seek public input on the Lowndes County Septic System Improvement Program.

- 3) Implement the Public Outreach and Participation Plan (Appendix A) when taking actions to address public health effects from inadequate OSS.
- 4) Continue to provide updates on the installation of septic systems through the Lowndes County Septic System Improvement Program webpage, the general ADPH webpage, through communication with the Lowndes County Commission, and other community outreach events.

## **5. Contact Information**

For more information about the PHIIP, please visit:

<https://www.alabamapublichealth.gov/environmental/septic-system-program.html>

For questions on the PHIIP you may contact:

**ADPH** Bureau of Environmental Services at 334-206-5375

**The United States Department of Justice** at 833-739-2103 or via email at [AL.Lowndes.EJ@usdoj.gov](mailto:AL.Lowndes.EJ@usdoj.gov)

**The United States Department of Health and Human Services** at 800-368-1019, (TDD) 800-537-7697 or via email at [OCRMail@hhs.gov](mailto:OCRMail@hhs.gov)

## Appendix A

### Public Outreach and Participation Plan

**Objective:** This plan describes the steps ADPH will take to ensure that stakeholders and other members of the public are informed and involved in actions taken to address the public health effects from inadequate onsite wastewater systems in Lowndes County. The plan provides instructions for when and how to conduct public outreach to ensure that Lowndes County residents receive vital information concerning their health and wellbeing. The plan also provides instructions for when and how ADPH will obtain the public's participation in the development of programs, policies, or other efforts designed to address onsite wastewater-related public health issues.

**Purpose:** Effective public outreach and participation is crucial to ADPH's work as the state agency responsible for promoting, protecting, and improving Alabama's health. Public engagement is already part of ADPH's work, from providing health programs and direct services, to receiving complaints about unsafe food establishments and other facilities. The purpose of this Public Outreach and Participation Plan is to ensure that public outreach and participation efforts on public health issues related to onsite wastewater systems in Lowndes County are effective and tailored to the unique characteristics of this community. The purpose is also to inform members of the public of what to expect, and to ensure that best practices are sustained moving forward.

**Scope:** This Plan applies to any ADPH informational materials, programs, policies, or other efforts designed to address public health effects from inadequate onsite wastewater systems in Lowndes County.

**Steps:**

1. Identify what kind of public outreach and/or participation is needed;
2. Determine who needs to be informed or involved;
3. Identify points of contact;
4. Decide the method of public outreach and/or participation;
5. Prepare materials and logistics;
6. Receive feedback and take necessary follow-up actions.

**1 – Identify what kind of public outreach and/or participation is needed**

ADPH will engage with members of the public on efforts to address the public health effects of inadequate onsite wastewater systems. The type of engagement – outreach and/or participation – will depend on whether ADPH's goal is to inform members of the public or if the goal is to consult or involve members of the public in decision-making processes.

ADPH will conduct public outreach when it has information that needs to be shared with the public. Public outreach is required for the following:

- 1) Educational flyers about prevention of infectious diseases associated with raw sewage exposure

- 2) Information relevant to health care providers on symptoms and illnesses related to raw sewage exposure
- 3) Information about the Environmental Health Assessment
- 4) Information about ADPH's onsite system installation program
- 5) Advertisements about ADPH community outreach events in Lowndes County, and
- 6) Press releases and other updates related to the Interim Resolution Agreement, such as the moratorium on enforcement of sanitation-related criminal statutes and the Public Health Infrastructure Improvement Plan.

In addition to the above, ADPH will assess new and revised informational materials related to the public health effects of exposure to raw sewage to determine whether public outreach is needed. In general, if the intended audience for any information materials are members of the public, ADPH will engage in public outreach.

ADPH will seek public participation when developing or changing any initiative aimed at addressing the public health effects of inadequate onsite wastewater systems. Public participation is necessary if ADPH creates or makes substantive changes<sup>4</sup> to its:

- 1) Program to install onsite wastewater systems,
- 2) Program to help residents clear title to their property and address other barriers to installation of new onsite wastewater systems,
- 3) Questionnaire to collect information about health risks from exposure to raw sewage, or
- 4) Public Health and Infrastructure Improvement Plan.

In addition to the above, ADPH will assess new and updated programs, policies, and other efforts to determine whether public participation is needed. In general, if the intended beneficiaries or targets of any new or updated program, policy, or other effort are members of the public, ADPH will seek public participation.

In some circumstances, ADPH may need to engage in both public outreach and engagement.

## ***2 – Determine who needs to be informed or involved***

ADPH will identify participants for any public engagement activities based on the goals of the particular informational materials, programs, policies, or other efforts. The following communities should be involved:

- Community and neighborhood groups
- Community service organizations (health, welfare, and others)

---

<sup>4</sup> Substantive changes include, for example, new eligibility requirements to participate in an ADPH program, new program initiatives, and changes to questions in the Questionnaire. Re-formatting a flyer or posting an announcement about a program on a webpage would not be considered substantive.

- Religious leaders and congregations
- Spiritual communities
- Schools and other educational institutions and academia
- Environmental organizations
- Industry and business
- Medical community
- Government agencies (state, county, and local), and
- Non-government organizations.

ADPH will consider other key stakeholders from:

- Affected communities
- Educational institutions
- Engineering experts
- Soil scientists, and
- Policy and decision-makers (such as local government).

### ***3 – Identify points of contact***

ADPH will identify key individuals who represent various community and stakeholder interests. ADPH’s Community Outreach Coordinator is responsible for maintaining contact information of community representatives. ADPH may compile this information from various sources such as online searches, canvassing staff across ADPH, or by asking existing contacts for information on how to reach others.

While ADPH may ask existing contacts to pass on information about particular public outreach or participation activities, it remains ADPH’s responsibility to affirmatively identify and reach out to community representatives for whom it has contact information.

### ***4 – Decide the method of public outreach and/or participation***

Public outreach and participation can take many different forms. ADPH will determine the best method(s) of public outreach and participation based on the goals and needs of the particular informational materials, program, policy, or other effort, as well as the unique characteristics of the target participant group(s). For example, if the target audience includes individuals who lack access to reliable internet services, posting materials online and seeking input via email will not be sufficient. It is likely that multiple methods of public outreach and participation will be needed.

Types of public outreach may include:

- Posting on ADPH’s website and social media
- Posting in public spaces and businesses with permission

- Radio, television, or newspaper announcements
- Mass mailers
- Announcements at community events, church or religious services, and
- Distributing hardcopy materials to points of contact.

Types of public participation may include:

- Public meetings
- Meetings with select groups or representatives
- Telephone calls
- Surveys, and
- Asking members of the public to submit feedback to a designated email address, through an online portal, or by ADPH pre-paid return envelopes.

ADPH will also determine the appropriate timing for conducting engagement activities. ADPH will solicit public participation early in decision-making processes to allow for sufficient time to engage in meaningful participation and act on information learned through that process.

### ***5 – Prepare materials and logistics***

Prior to launching any public engagement activities, ADPH will consider what logistical and administrative matters need to be addressed. These include:

- 1) Equipment or materials needed,
- 2) Costs associated with preparing for/conducting the engagement activities, and how and by whom will these be funded, and
- 3) Timing needed to secure locations, vendors, and obtain any necessary approvals.

Informational materials will be culturally sensitive, relevant, and written in plain language. ADPH will ensure that these materials are made readily accessible as appropriate (for example, accessible for individuals with disabilities and sight- and hearing-impaired, and translated for limited English-speaking populations). ADPH may engage with relevant community representatives and stakeholders as it develops informational materials to ensure those materials are effectively received by the target audience.

Meetings, outreach, and other engagement events will be accessible and user-friendly for all who wish to participate. This includes:

- Accessibility for persons with disabilities, language interpreters and/or translation of documents for limited English proficient populations, and other means of communicating where there are literacy issues under applicable laws.
- Time frames that do not conflict with work schedules, rush hours, dinner hours, and other community commitments that may decrease attendance.

- Locations with appropriate facilities (size and conditions of the space, parking, etc.), and that are local and convenient to the target population.
- Use of technology to allow for more effective communication where appropriate (teleconference capability, audio visual equipment, etc.).
- Meeting formats that maximize equal participation, such as allowing ample time for discussion, preparing questions to present to participants, and considering break-out groups or small group discussion.
- Advertising the event and any proposed agenda in a timely manner so that participants have ample time to prepare and make accommodations to attend.

***6 – Receive feedback and take necessary follow-up actions***

In all public engagement activities, ADPH will provide contact information for members of the public to provide feedback, ask follow-up questions, and otherwise connect with ADPH.

After conducting public engagement activities, ADPH will take any necessary follow-up actions. ADPH will also identify any lessons learned that might help other public engagement activities in the future.