



Application Information Sheet
U.S. EPA Brownfield Assessment Grant Application

R01-26-A-008

1. Applicant Identification

Northern Middlesex Council of Governments, 672 Suffolk Street, Suite 100 Lowell, MA 01854

2. Website URL

<https://www.nmcog.org>

3. Funding Requested

- a. Assessment Grant Type: Community-Wide Assessment Grant
- b. Federal Funds Requested: \$500,000

4. Location

The Greater Lowell Region is located in Middlesex County, Massachusetts and includes the City of Lowell and the Towns of Billerica, Chelmsford, Dracut, Dunstable, Pepperell, Tewksbury, Tyngsborough, and Westford.

5. Target Area and Priority Site/Property Information

- a. The Target Areas discussed in the narrative are the Concord River Corridor in Lowell, North Billerica in Billerica, and Railroad Square in Pepperell.
- b. The Concord River Corridor – Lowell, MA 01852
 - i. 1052 Gorham Street, Lowell, MA 01852
 - ii. 135 and 137 Billerica Street, Lowell, MA 01852
 - iii. 105 Whidden Street, Lowell, MA 01852
- c. North Billerica – Billerica, MA 01862
 - i. 71 Faulkner Street, Billerica, MA 01862
- d. Railroad Square, Pepperell, MA 01463
 - i. 128 Main Street, Pepperell, MA 01463
 - ii. 20 Mill Street, Pepperell, MA 01463

6. Contacts

- a. Project Director Meghan Tenhoff, ENV SP, Principal Planner – Sustainability (978) 454-8021, extension 124 (mtenhoff@nmcog.org) 672 Suffolk Street, Suite 100, Lowell, MA 01854
- b. Chief Executive/Highest-Ranking Elected Official Jennifer Raitt, (978) 454-8021, extension 120 (jraitt@nmcog.org) 672 Suffolk Street, Suite 100, Lowell, MA 01854

7. Population

Among the Target Areas, the Concord River Corridor is home to 19,953 residents. North Billerica contains 5,536 residents. Railroad Square has 3,424 residents.

8. Other Factors

Other Factors	Page #
Community Population is 15,000 or less	5
The applicant is, or will assist, a federally recognized Indian tribe or United States territory.	N/A
The proposed brownfield site(s) is impacted by mine-scarred land	N/A
The priority site(s) is adjacent to a body of water (i.e., the border of the priority site(s) is contiguous or partially contiguous to the body of water or would be contiguous or partially contiguous with a body of water but for a street, road, or other public thoroughfare separating them).	1-6
The proposed site(s) is in a federally designated flood plain.	2
The reuse of priority site(s) will facilitate renewable energy from wind, solar, or geothermal energy.	N/A
The reuse of the priority site(s) will incorporate energy efficiency measures.	3
The proposed project will improve local resilience to the impacts of extreme weather events and natural disasters.	3-5, 9
At least 30% of the overall project budget will be spent on eligible reuse/area-wide planning activities, as described in Section 3.A.(2), for priority site(s) within the target area(s).	8-9
The target area(s) is impacted by a coal-fired power plant has recently closed (2015 or later) or is closing.	N/A

9. Letter from the State or Tribal Environmental Authority (not included in the three-page limit)

Attached after this summary.

10. Releasing Copies of Applications

In concert with EPA's commitment to conducting business in an open and transparent manner, copies of applications submitted under this funding opportunity may be made publicly available on EPA's [Office of Brownfields and Land Revitalization website](#) or other public website for approximately 3 months after the selected applications are announced. EPA recommends that applications not include confidential business information (CBI) or trade secrets. Applicants must not include information that, if disclosed, would invade another individual's personal privacy (e.g., an individual's salary, personal email addresses, etc.).

Application will not include any confidential business information.



Commonwealth of Massachusetts
Executive Office of Energy and Environmental Affairs

Department of Environmental Protection

Address: 100 Cambridge Street, Suite 900, Boston MA 02114 | Phone: 617-292-5500

Maura T. Healey
Governor

Kim Driscoll
Lieutenant Governor

Rebecca Tepper
Secretary

Bonnie Heiple
Commissioner

December 23, 2025

[Via Email]

Attn: Jennifer Raitt, Executive Director
Northern Middlesex Council of Governments
672 Suffolk Street, Suite 100
Lowell, MA 01854

RE: STATE LETTER OF ACKNOWLEDGMENT

***Northern Middlesex Council of Governments
Brownfields Community-Wide Assessment Grant***

Dear Ms. Raitt:

I am writing to support the application submitted by the Northern Middlesex Council of Governments (NMCOG) under the Fiscal Year 2026 U.S. Environmental Protection Agency (EPA) Brownfield Grant Program. We understand that the NMCOG Regional Planning Agency is proposing to undertake several assessment projects to promote redevelopment in target areas that include the City of Lowell, and the Towns of Billerica and Pepperell. EPA funding will facilitate Brownfields redevelopment by providing resources to assess properties, conduct cleanup planning and redevelopment planning at properties where actual and perceived contamination inhibits development.

In Massachusetts, state and federal agencies have developed strong partnerships and work together to ensure that parties undertaking Brownfield projects have access to available resources and incentives. The Massachusetts Department of Environmental Protection (MassDEP), through our regional offices, provides technical support to Brownfield project proponents when regulatory issues arise. If this proposal is selected, MassDEP will work with our state and federal partners to support the NMCOG and member communities to help make this project a success.

We greatly appreciate EPA's continued support of Brownfield efforts in Massachusetts.

Sincerely,

David Foss, CPG, LSP

Statewide Brownfields Coordinator, Bureau of Waste Site Cleanup

cc: Chris Hayes, Housing & Economic Development Manager
Meghan Tenhoff, ENV SP, Sustainability Planner
Isabel Emmet, AICP, Regional Land Use Planner
Katy Deng, US EPA Region 1
Joanne Fagan, MassDEP Northeast Regional Office

(1). PROJECT AREA DESCRIPTION AND PLANS FOR REVITALIZATION**Target Area and Brownfields: 1.a. Overview of Brownfields Challenges and Description of Target Areas:**

The Northern Middlesex Council of Governments (NMCOG) is a regional planning agency serving nine municipalities in Massachusetts: Billerica, Chelmsford, Dracut, Dunstable, Lowell, Pepperell, Tewksbury, Tyngsborough, and Westford. Located 35 miles north of Boston, this area is home to 310,000 residents and is shaped by the Merrimack Watershed, which includes the Merrimack, Shawsheen, Nashua, and Concord Rivers. In the 18th and 19th centuries, these rivers fueled the region's textile industry. By the 1980s, most mills shuttered, leaving a landscape of canals and dams; contaminated soils, sediments, and water; and abandoned sites. Communities that relied on these mills experienced rising poverty and continue to suffer barriers to success, including low education attainment and drug addiction. As the economy changed, sprawl fragmented open spaces, drove up housing and infrastructure costs, strained municipal budgets, and created automobile dependency. While many sites have been mitigated and redeveloped, 300 identified brownfields remain in the region, as well as four National Priorities List (NPL) Superfund Sites.¹ Contaminants from these sites threaten drinking water and air quality, ecosystems, public health, and safe access to natural resources, while flooding and extreme heat intensify these risks. Meanwhile, lack of sufficient safe, clean housing threatens the region.

The Geographic Boundary for this application encompasses this region, and through the awarding of this grant, NMCOG would focus on three Target Areas due to their economic role and concentration of brownfields: **Concord River Corridor, Lowell; North Billerica, Billerica; and Railroad Square, Pepperell.** These areas are exceptionally contaminated: there are over 30 brownfields sites across them. Although Lowell's Concord River Corridor is urban, North Billerica is suburban, and Railroad Square is rural, they are alike in that they each are adjacent to rivers and rail lines that once contributed to their industrial economy and now are held back by a preponderance of vacant brownfields. The Target Areas are home to sensitive populations with higher than federal rates of low-income residents and seniors that experience higher rates of environmental and health burdens. Furthermore, the Areas' ongoing vacancies limit their residents' economic opportunity. However, the Sites' proximity to regional public transportation and role as neighborhood centers positions them as ideal candidates for revitalization aligned with regional resiliency, transit-oriented development, and housing goals.

A Communitywide Assessment Grant will enable NMCOG to take the first step in transforming the sites by assessing contaminants. This will ultimately lead to beneficial outcomes: revitalizing brownfields; reusing existing infrastructure; creating safe, resilient housing and jobs; and connecting community members to open space resources. Individual communities are too small or have too few resources to undertake this work on their own, but with the financial support of this grant, NMCOG will holistically integrate community engagement, site assessments, and cleanup planning. Environmental Site Assessments (ESAs) will identify and quantify contaminant threats, providing critical data to develop cleanup and reuse plans. Guided by local voices and interim successes, these plans will unlock cleanup funding and bring the brownfields back into productive use.

1.b. Description of the Priority Brownfields Site(s): NMCOG established the following five brownfields Priority Sites in the three Target Areas that are underutilized and are prime candidates for beneficial reuse. Using historical data, the state waste site cleanup database, and communication with the municipalities, NMCOG evaluated former usage and suspected/known contamination. Due to the location of many brownfield sites in flood zones, flood adaptation measures will be incorporated into the assessment, cleanup design, and reuse.

Name & Address (<i>Size</i>), Description	Potential CoCs	Needs
Concord River Corridor, Lowell		
105.1 Whidden Street, 1.3 Acres: Little information is available about this city-owned site. It was previously owned by the Preston Oil Company for over 80 years, and various contaminants have been identified. It is nestled in a mixed-income residential neighborhood, creating health concerns for the abutters. The site is of key importance due to these health concerns in a dense, lower-income neighborhood and the revitalization role mixed-income housing could play.	VOCs, SVOCs, petroleum, metals	Phase II ESA, Cleanup Plan, Reuse Plan

¹ EPA National Priorities List (NPL) Sites by State. <https://www.epa.gov/superfund/national-priorities-list-npl-sites-state#MA>

<p>135 and 137 Billerica Street, 1.8 Acres: This site consists of two parcels on the banks of the Concord River taken via tax title. They may have been part of a former dump site. Sporadic assessment was conducted in the late 1980s through 2002, and some contaminated soil and drums were reportedly removed, but additional assessment of soil, sediment, and groundwater is needed. Despite enforcement actions, an abutter illegally parks on this land, creating unsafe conditions and possibly contributing to environmental degradation. The site could be key river access for low-income communities, and its contamination threatens river health.</p>	<p>Petroleum, VOCs, SVOCs, metals, and pesticides</p>	<p>Phase II, Cleanup Plan, Reuse Plan</p>
<p>1050 Gorham Street, 1.1 Acres: This site is on the corridor’s mixed-use “Main Street,” but it has been contaminated by leakages from storage tanks and chemicals. The City took it via tax title. Due to its ongoing vacancy, illegal and illicit activities often take place in the unsafe structure despite security measures, holding back the economic vitality and quality of life of the neighborhood. Phase I/II ESAs have been completed, but the Phase II recommends additional assessment is needed before cleanup is possible.</p>	<p>Petroleum, metals, Hazardous Building Materials</p>	<p>Add'l Phase II, Cleanup Plan, Reuse Plan</p>
<p>North Billerica, Billerica</p>		
<p>Faulkner Mills, 71 Faulkner Street, 5.2 Acres: The centerpiece of historic North Billerica, this 78,000 SF facility built in 1811 once created prosperity as a textile mill and dyeworks. A portion is still used as a metals die casting facility and a museum. However, suspected contaminants create health concerns for the neighborhood, and the complex’s vacancies hold back North Billerica’s revitalization. Assessment/cleanup is needed both within and outside the building footprint to redevelop this cornerstone of the community for housing and other uses.</p>	<p>VOCs, SVOCs, metals, petroleum, HBMs</p>	<p>Ph. I & II ESA, Cleanup Plan, Reuse Plan</p>
<p>Railroad Square, Pepperell</p>		
<p>Paper Mill, 128 Main Street and 20 Mill Street, 20.9 Acres: A thriving community grew around this paper mill partially within floodplain on the Nashua River. When it closed, the rural community faced economic decline. Since then, the mill buildings have been removed and arsenic was discovered on an adjacent parcel. Two previous privately-led redevelopment efforts failed, leading to the conclusion that additional assessment and cleanup may be necessary to redevelop and repair this gaping hole and revitalize Railroad Square.</p>	<p>Petroleum, Arsenic, PFAS, Proximity to surface water</p>	<p>Ph. I & II ESA and Cleanup Plan</p>

1.c. Identifying Additional Sites: NMCOG plans to use assessment grant funds for additional brownfield sites both within and potentially outside Target Areas. NMCOG will work with member communities to make them aware of the 300+ brownfield sites and funding availability through methods detailed in Section 2.b. and will encourage applications for assessment funding from owners, developers, and/or prospective purchasers. NMCOG will form a **Brownfields Steering Committee (BSC)** with community stakeholders to score and prioritize applications. NMCOG and the **BSC** will develop an application that will include criteria such as site history, redevelopment plans, social and natural benefit, leverage of private money for redevelopment, alignment with the region’s revitalization and reuse plans, and whether the site is located within or serves an underserved community. Priority will be placed on sites located in overburdened communities and with reuse plans aligning with community need.

Revitalization of the Target Areas: **1.d. Reuse Strategy and Alignment with Revitalization Plans:** NMCOG’s 2011 Regional Strategic Plan contains strategies for advancing housing initiatives, economic development, and job creation through cooperative efforts between local, state, and regional levels of government. Plans for economic development (CEDS), housing, and transportation (LRTP), all updated between 2023 and 2025, built upon this foundation. Specific strategies and alignments follow:

Site: Reuse Strategy	Alignment with Revitalization Plan
<p>105.1 Whidden Street: As this site is surrounded by residential uses, the City envisions potential mixed-income multifamily housing.</p>	<p>Concord River Corridor Revitalization: The Concord River Corridor contains two Urban Renewal (UR) Districts. The “Lowell Forward” Comprehensive Plan recommends identifying and creating areas for redevelopment through both</p>

135 and 137 Billerica Street: This is adjacent to a planned boat launch, making it ideal for riverfront access to the surrounding lower-income community. Other options could be considered.	of these UR Districts and the implementation of a Brownfields program. These sites were chosen based on that redevelopment priority. Additionally, the local “Lowell Forward” Comprehensive Plan has a goal of celebrating, improving, and activating waterfront resources. The Concord River Greenway is a long-planned pathway through the area, most notably the Billerica Street sites. Several sections have been built recently, and its extension would serve as a transportation and recreation spine.
1050 Gorham Street: The City envisions demolition of the existing structure and redevelopment into housing or mixed use aligned with bus transit and within 5 minutes of MBTA commuter rail.	North Billerica Revitalization: The property has extensive vacancies but is near the river and train station. The Town has shown its commitment to housing-based revitalization for this area by passing the Boston Road at Treble Cove Road Overlay District, allowing by-right multi-family, and the Mill Conversion and Reuse Overlay District, which encourages reuse of mill buildings for housing and economic development.
Faulkner Mills, 71 Faulker Street; The Town envisions affordable housing to complement the museum use, providing critical housing cost relief to residents adjacent to MBTA commuter rail and the Middlesex Canal Trail.	Railroad Square Revitalization: The local Railroad Square Rapid Recovery Plan highlights the need to redevelop the Paper Mill site to support economic growth and the expansion of the community’s historic, recreational, and agricultural assets to attract businesses, visitors, and private investment. The site is a key node in a trail network that uses the Nashua River Rail Trail to connect housing with employment and recreation.
Paper Mill, 128 Main Street and 20 Mill Street: To catalyze redevelopment of this central business district, this is envisioned as a complex of mixed-use buildings including housing in uplands and recreational areas as an anchor for a revitalized town center.	

1.e. Outcomes and Benefits of Reuse Strategy: The assessment, cleanup, and reuse of sites in the Target Areas will drive significant economic development and housing creation by addressing environmental contamination and transforming underutilized brownfields into vibrant, mixed-use spaces. These sites were carefully chosen along principal corridors and/or centers of their traditional villages or neighborhoods so their opportunity to catalyze broader revitalization is maximized. The reuse strategy of Faulkner Mills and 105.1 Whidden Street—mixed-income residential—will help fill the gap identified by NMCOG of up to 17,750 units throughout Greater Lowell. This housing production is critical to control housing costs, maintain economic growth, and expanding housing choice for low-income populations. The strategy for 1050 Gorham Street and the Paper Mill—mixed use—will not only bring housing benefits but also expand living-wage jobs and become hubs for their neighborhoods. The strategy for 135 and 137 Billerica Street, although not ideal for mixed use or residential, will provide much-needed public spaces for underserved communities, raising quality of life and the value of nearby properties. These redevelopment initiatives strategies align with the region’s broader goals of sustainable growth, transit-oriented development, and reducing urban sprawl via targeted infill projects.

Additionally, all Target Areas are increasingly vulnerable to more intense rainfall and rising water levels² and the priority sites are all abutting or near rivers. The sites’ assessment, cleanup, and redevelopment will reduce the risk of contamination spreading through those nearby waterways. Moreover, the project will improve the region’s capacity for resilience to flooding, heat islands, and other severe weather events. Priority sites’ new buildings will incorporate energy efficient mechanical systems, flood-resistant designs, passive solar generation, LED lighting, and LID techniques for stormwater management. These features will improve efficiency and resilience to the impacts of extreme weather events and natural disasters. Given their proximity to rivers, clean up and treatment of all priority sites will benefit their respective communities through protecting wetlands and increasing environmental health.

Strategy for Leveraging Resources: **1.f. Resources Needed for Site Reuse:** NMCOG and its communities are experienced in obtaining and leveraging grants for brownfields and redevelopment projects and have already secured commitment from MassDEP to provide technical assistance, including the possibility of leveraging

² Massachusetts Climate and Hydrologic Risk Project and the Resilient Massachusetts Climate and Hazards Viewer

128A Brownfields funding. Additional existing resources that would be leveraged include **(1) Lowell Community-wide Assessment Program:** Lowell is currently managing a \$500,000 EPA Community-wide Assessment Grant. **(2) MassDevelopment Brownfields Fund:** This fund, established in 1998, awards up to \$250,000 for site assessment and/or up to \$750,000 for remediation. The Town of Westford is utilizing a \$250,000 grant from this fund for a mill property as well as a \$500,000 EPA cleanup grant. **(3) CDBG/HOME:** Lowell receives, on average approximately \$3 million in annual CDBG and HOME funds from U.S. HUD, successfully leveraging those funds to improve the lives of low/moderate-income residents. **(4) Chapter 90:** Collectively the region has been allotted over \$3M in FY22 MassDOT Chapter 90 transportation funding (awarded annually), some of which will be allocated to enhance the Target Areas.

NMCOG would not only leverage these existing resources, but also would be a venue for coordinating, prioritizing, and making most efficient use of them across the region. NMCOG and its municipalities will also apply for additional funding to support assessment, cleanup, and redevelopment. When necessary, once assessments are complete, NMCOG will partner with site owners and municipalities to craft a funding strategy for site cleanup, infrastructure, and redevelopment. Utilizing this strategy, NMCOG will proactively assist in grant applications and private-public partnership funding strategies. NMCOG already has access to funding resources for this fund-identification and -raising effort.³ NMCOG will provide regular communication to member communities regarding funding opportunities and eligible projects. Agreements outlining clear roles among federal and state departments, NMCOG, and municipal governments will be established, and applications will clearly outline site conditions, funding needs, and long-term visions for updated site uses. Sources NMCOG will pursue include: **(1) EPA Revolving Loan Fund (2) Massworks and Housingworks:** Over \$2M in annual MassWorks grants have been awarded to address infrastructure improvements and revitalization studies in the Target Areas. **(3) Private Incentives:** NMCOG has experience using District Improvement Financing and Tax Incentive Financing mechanisms and Opportunity Zone designations to encourage private investment. **(3) MassDEP Brownfields Program:** Municipalities are eligible to apply for up to \$100K in Assessment and \$750K in Cleanup funding annually. **(4) Other State Programs:** Billerica, Lowell, and two other NMCOG communities are designated as Housing Choice Communities, giving them exclusive access to Capital Grants and priority for the State Revolving Fund, Complete Streets, MassDOT capital projects, PARC and LAND grants, and other programs. If appropriate, NMCOG will assist in pursuing state Brownfields and historic tax credits, MVP Action grants, and MassDevelopment Site Readiness program. Given the region's history of successfully securing funds to redevelop brownfields combined with NMCOG's ability to leverage financial and technical resources, NMCOG is well-qualified for receipt of this EPA grant.

1.g. Use of Existing Infrastructure: All Target Areas are connected to public water, sewer and stormwater utilities, electric, natural gas, and communications (including high-speed fiber optics). Most utilities in the Target Areas are underground, increasing resilience against storm events. While the existing infrastructure is sufficient to support anticipated site reuses, new development may provide opportunities to enhance and upgrade existing stormwater collection/treatment systems, potentially improving flood resilience along the river corridors. Such improvements would support walkable connections to recreational amenities (e.g., trails, canoeing/kayaking areas) and strengthen the area's infrastructure capacity. If redevelopment necessitates infrastructure upgrades, NMCOG is experienced in assisting communities with funding public projects. In addition to funding through increased tax revenue and water/sewer fees generated by new development, NMCOG will leverage private funding of infrastructure and state and federal economic development sources such as the MassWorks Infrastructure Program and State Revolving Fund loans for water and sewer projects.

(2) COMMUNITY NEED AND COMMUNITY ENGAGEMENT

Community Need: 2.a. The Community's Need for Funding: Local municipalities in this region, already strained by housing shortages, high infrastructure costs, and rising social service needs, lack the financial capacity to fund comprehensive environmental assessments and subsequent reuse redevelopment independently. The Target Areas especially have experienced decades of disinvestment due to their industrial past. Lowell has a poverty rate of 17.4%, much higher than the U.S. average of 12.4%. The North Billerica Target Area, with a population of 6,802,

³DLTA is provided by the state to provide technical assistance such as grant research, grant writing, and reporting and administration.

struggles with a senior poverty rate of 13.7% compared to 10.4% nationally, and a 36.0% housing cost burden rate (compared to 31.0%). Pepperell, on the other hand, has too small a population to attract funding: only 3,858 live in the Target Area and town population is 11,656.⁴ Due to these barriers, private investment has been limited in all Target Areas and the local tax base is unable to locally fund assessment. By addressing contamination and planning for resilient redevelopment, the grant will enable communities to overcome economic barriers and achieve long-term, sustainable growth while preserving local character and minimizing displacement risks.

2.b. Health or Welfare of Sensitive Populations: The sensitive populations within the Target Areas include people below poverty, people 65 and older, veterans, and people with a disability. In each Target Area, poverty disproportionately impacts both children and seniors. Billerica and Pepperell both have significant populations of older adults (18.6% and 17.9% compared to 16.8%). Lowell and Billerica's Target Areas have higher-than-average senior poverty (18.1% and 13.7% respectively compared 10.4% U.S. average), limited English (12.2% and 4.6% compared to 4.2%), and housing cost burden (43.5% and 36.0% compared to 31.0%). Lowell and Pepperell's proportion of people with disabilities (14.2% and 15% respectively) exceeds state and national averages (12.1% and 13.0%). Pepperell has a notable population of veterans, 7.5% compared to the national average of 6.4%.

These sensitive populations experience compounded health and welfare impacts as a result of environmental contamination, neighborhood blight, and long-term disinvestment. All identified sensitive populations are more likely to live in older housing stock or near brownfields, especially given the high levels of Housing Cost Burden, where exposure to contamination and pollution is more common. Elevated asthma rates, higher cancer prevalence, and other chronic health conditions disproportionately affect these groups, who often face barriers to preventive care and transportation. For older adults and people with disabilities, limited mobility increases exposure duration and reduces the ability to relocate away from hazardous conditions. Poverty further intensifies these challenges by restricting access to health care, housing, and education, while neighborhood decline contributes to social isolation, reduced safety, and increased strain on municipal services. This grant will directly address these health and welfare issues by identifying environmental hazards that create the greatest risks to sensitive populations. Environmental assessment will lead to remediation to reduce exposure to contaminants that exacerbate health issues among sensitive populations. The reuse strategy for sites in all three Target Areas includes mixed-income housing, which will not only provide safer, healthier homes for sensitive populations, but also boost the local economy and increase resilience to future environmental risks.

2.c. Greater than Normal Incidence of Disease and Adverse Health Conditions: All three communities have a greater-than-average incidence of adult population with Asthma (12.2%, 12.1%, and 12.2% for Lowell, Billerica, and Pepperell respectively), compared to 10.6% for the U.S. This elevated asthma prevalence is a critical concern for brownfield-impacted communities as exposure to contaminants suspected of being in the Target Sites can trigger and exacerbate respiratory conditions. The Target Areas also experience notable rates of cancer. Pepperell's Target Area has a higher prevalence of cancer (9.2%) than the U.S. average (9.0%). Formerly-industrial brownfield sites frequently contain carcinogenic compounds, associated with elevated cancer rates. The Priority Site in Pepperell, a former paper mill, is especially important to address as this use often leaves carcinogenic contaminants that can increase both cancer and asthma risks for nearby residents.

Indicator (CDC Places Tool/BFRSS, 2024)	Concord R. Corridor	N. Billerica	RR Square	MA	U.S.
% Adult Population with Asthma	12.4%	12.1%	12.2%	11.6%	10.6%
% Adults Diagnosed with Cancer	6.2%	8.3%	9.2%	9.0%	9.0%

Additionally, in 2022, high levels of PFAS were measured in fish samples collected at the Concord River, above the Fish Action Level of 0.22 parts per billion, meaning regular consumption of the fish could present health concerns.⁵ Pepperell has identified PFAS contamination in its water supply, which also services adjacent towns. The elevated levels of PFAS, related to brownfields, may contribute to higher incidence of disease. Finally, the lack of investment in all Target Areas has resulted in vacant buildings and high unemployment, which in turn have contributed to an opioid-related health crisis. According to the U.S. Drug Enforcement Administration, fentanyl is a top threat and Middlesex County's annual opioid-related death rate

⁴ The Brownfields FY26 FAQ for Assessment Grants defines communities of 15,000 people and less as "small."

⁵ Per- and polyfluoroalkyl substances (PFAS) levels per the Billerica Board of Health. [Board of Health – Town of Billerica, MA](#)

doubled between 2012 and 2022 to 382 deaths. From 2022-2025, a total 2,015 overdoses were reported.⁶ In fact, Billerica received funds from statewide opioid-related lawsuit settlements for a recovery specialist.⁷

This grant will directly reduce asthma, cancer, and other health risks by identifying, assessing, and providing plans to clean up brownfield contaminants that contribute to respiratory illness and long-term disease. Assessment and cleanup activities will reduce exposure to these hazards, all of which are in close proximity to existing homes. Reuse strategies will be adjusted when necessary to ensure safe reuse and reduce disease, including reducing the threat of opioid abuse by reducing derelict, blighted properties and cancer and asthma through elimination of compounds that contribute to these diseases.

2.d. Economically Impoverished/Disproportionately Impacted Populations: Populations within the Target Areas experience significant economic hardship and disproportionately bear the negative environmental consequences of historic industrial activity. All Target Areas are economically impoverished. Data from CDC/ATSDR indicates that Target Areas in Lowell, Billerica, and Pepperell have a .81-.90, .78, and .65 ranking for Unemployment, respectively. This represents significant burden according to the database. Deficient housing is another indicator of economic impoverishment: all three Target Areas are above the U.S. median in housing built pre-1980. CDC/ATSDR also reports disproportionate environmental impact. The Target Areas rank as having a high environmental burden in many indicators with high levels for Potentially Hazardous and Toxic Sites (.71 in Pepperell and .99 in Billerica), National Priority List Sites (1.0 in Lowell - the highest possible ranking), Toxic Release Inventory Sites (1.0 in Lowell and .84 in Billerica), and Treatment, Storage, and Disposal Sites (.84 in Lowell), as well as Extreme Heat (.85 in Pepperell). These datapoints reflect the disproportionate and severe environmental impacts of brownfields on the low-income, high-unemployment populations in the Target Areas. This grant and the proposed reuse strategy will directly address these disproportionate economic and environmental impacts by identifying and reducing contamination and lowering exposure risks. This funding will remove barriers to investment; support economic recovery; create more safe, affordable housing; advance stronger health outcomes; and promote community-driven and productive redevelopment and revitalization.

Economic Impoverishment Indicators	Concord R. Corridor	N. Billerica	RR Square	U.S.
Unemployment	0.81-0.90	0.78	0.65	0.5
English language proficiency	0.89-0.95	0.67	0.60	0.5
Housing built pre-1980	0.61-0.91	0.60	0.64	0.5
Disproportionate Environmental Impact Indicators (All data is CDC/ASTDR Tool, 2022 data)				
Toxic Release Inventory Sites	0.97-1.0	0.84	0.71	0.5
Potentially Hazardous and Toxic Sites	0.95-0.97	0.99	0.31	0.5
Extreme Heat	0.81	0.80	0.85	0.5
Riverine Flooding Frequency	0.84	0.84	0.84	0.5

Community Engagement: 2.e-f. Project Involvement and Project Roles: First and foremost, NMCOG's nine member municipalities, especially Lowell, Billerica, and Pepperell, will be critical partners. Their involvement will be on the **BSC** assisting with site selection and future reuse and with additional outreach throughout Task 2, community engagement. In addition, the following community-based organizations will provide assistance for this project. Each organization will ensure local residents and businesses, particularly underserved and language-limited populations, participate in the redevelopment process. Each partner will have a meaningful role in decision-making in regards to site selection, cleanup, and future reuse options.

Name of Entity	Entity's Mission	Point of Contact	Specific Project Involvement
Merrimack River Watershed Council	Focuses on the protection and recreation of the Merrimack River Watershed in which all three Target Areas are within.	Curt Rogers, Executive Director; crogers@merrimack.org; 617-755-1640	Contribute expertise on river health, access, and recreation opportunities in community outreach and reuse planning (Tasks 2, 3, & 4)

⁶ U.S. Drug Enforcement Administration. "Lowell." Accessed 12/22/25. [Lowell | DEA.gov](#)

⁷ Angelo, Karen. "Town of Billerica Tackles Opioid Epidemic with Help from Alumni and Students." UMass Lowell News. Published Wednesday, 4/17/2024. [Town of Billerica Tackles Opioid Epidemic with Help from Alumni and Students | News | UMass Lowell.](#)

Lowell Development and Financial Corporation	A nonprofit economic development corporation and lender that partners with Lowell, developers, and lenders to ensure fair revitalization	LZ Nunn, Executive Director; LZ@lowellplan.org; (978) 459-9899	Connect the project to small business and commercial building owners to facilitate redevelopment efforts (Task 4)
CHOICE	A nonprofit dedicated to reusing underutilized land for housing and community needs currently operating in several communities.	David Hedison, Executive Director; David@chelmsfordha.com, (978) 256-7425	Evaluate the feasibility of affordable housing at targeted brownfield sites to assist reuse planning (Tasks 2 & 4)
Cambodian Mutual Aid Association	A nonprofit to improve the quality of life for Cambodian Americans through educational, cultural, economic, and social programs.	Sothea Chiemruom, Community Leader; schiemruom@cmaa lowell.org	Assist with outreach to Southeast Asian residents, ensuring engagement in the redevelopment process (Task 2 & 4)
Small Town Collaborative	Association of municipal and business leaders in six small communities including Pepperell.	Stephen Themelis; jthemelis@charter.net ; (978) 852-8520	Support outreach to small businesses and individuals in rural NMCOG communities impacted by brownfields (Task 2 & 4)

2.g. Incorporating Community Input: NMCOG is committed to fostering transparent community engagement throughout the project and will implement a comprehensive communication plan prioritizing consistent updates and broad community engagement. Multiple methods will be used to share progress updates, including virtual town hall meetings for each project, quarterly newsletters, press releases, and a project-specific webpage. These platforms will offer alternatives to in-person engagement, ensuring stakeholders can access information conveniently. To ensure meaningful participation, NMCOG will put special focus on reaching sensitive populations, seeking background on local sites and sharing information about each phase of the assessment process. We will also partner with community-based organizations for at least one major in-person meeting in each Target Area to discuss concerns and vision for priority sites and an additional meeting in Lowell (four total) at accessible, familiar neighborhood locations. Feedback will also be solicited through focus groups, surveys, and public comment periods. Feedback will be presented to a **Brownfields Steering Committee (BSC)** which NMCOG will form, and feedback will be considered in project decisions. As ESAs are completed, NMCOG will provide digestible Community Reports with findings for each ESA. Community-driven strategies will address local environmental concerns, promote inclusive decision-making, and enhance accessibility to community resources. Regular follow-ups at meetings will respond to community input and address how this input is integrated, ensuring transparency in the decision-making process. This strategy aligns with the EPA's best practices.

(3) TASK DESCRIPTIONS, COST ESTIMATES, AND MEASURING PROGRESS

Description of Tasks/Activities and Outputs: Grant implementation will be a collaborative effort between NMCOG, municipal staff, selected QEP, and stakeholders. The scope has been organized into four tasks, with all activities funded by this EPA Brownfield Communitywide Assessment Grant. No non-EPA resources are needed.

3.a.-3.d. Project Implementation, Anticipated Project Schedule, Task/Activity Lead, and Outputs

Task 1: Cooperative Agreement Oversight

<p>i. Project Implementation: EPA Funded: NMCOG will issue a Request for Proposals (RFP) to engage a Qualified Environmental Professional (QEP), procurement will comply with federal requirements for fair and open competition (2 CFR 200 & 1500) and DBE participation (40 CFR 33). QEP will assist with ACRES updating and maintenance. NMCOG will track and evaluate project outcomes through quarterly reports and feedback from the BSC. Metrics will include community engagement levels, number of site assessments, and planning project progress milestones. The project schedule will adapt to incorporate community feedback and any site-specific changes. NMCOG will attend two Brownfields national conferences. Non-EPA Resources Needed: None.</p>
<p>ii. Anticipated Project Schedule: Q1: QEP procurement. Q2 through End of project: Quarterly reports and ACRES updates. The final project report submitted upon project completion.</p>
<p>iii. Task/Activity Lead(s): Project Management by the NMCOG Executive Director, Finance Manager for financial reporting, and QEP & planning staff for task support.</p>

iv. Outputs: QEP procurement, up to 16 Quarterly reports, ACRES database updates, final project report, and evaluation of documented key project outcomes.

Task 2: Community Engagement

i. Project Implementation: EPA Funded: NMCOG will begin by forming a BSC composed of local stakeholders, municipal representatives, and community-based organizations. This committee will guide the engagement process, help identify key community priorities in potential sites, and ensure that local voices are integrated throughout the project. NMCOG and the BSC will work with the QEP to prepare a story map and conduct community workshops, with extra attention to sensitive populations, to gather input on site reuse, planning priorities, and environmental concerns. This will include at least 4 major meetings that include education on Brownfields and redevelopment benefits and focus groups and interviews with key stakeholders. NMCOG will work with the QEP to prepare one Community Involvement Plan (CIP) to facilitate site reuse. QEP will prepare a “Community Report” for each of the 16 Task 3 Ph. I/Ph. II ESAs that is suitable for public consumption, assisting NMCOG in sharing these findings. Non-EPA Resources Needed: None.

ii. Anticipated Project Schedule: Q1: Form the BSC and initiate community engagement activities. Q2 through end of the project: Continue workshops, major meetings, focus groups, stakeholder interviews, and Community Reports regularly. Quarterly Updates: Report the number of participants engaged and the feedback documented, ensuring consistent repeat and new engagement tracking.

iii. Task/Activity Lead(s): NMCOG Sustainability Planner will lead BSC formation, community engagement activities, and meetings with NMCOG staff support. QEP will provide supporting materials, attend meetings, and assist in procurement and provision of compensated liaisons, translation services, and participant support costs. QEP will lead story map development, CIP, and Project Reports with NMCOG oversight.

iv. Outputs: BSC formation. At least 4 community meetings; 1 story map; 16 Community Reports; up to 1 CIP.

Task 3: Environmental Site Assessments (ESA)

i. Project Implementation: EPA Funded: Sites will be selected, with NMCOG and the BSC leading per section 1.c, and meeting site eligibility requirements. The selected QEP will lead Phase I ESAs to identify potential contamination risks and perform Phase II ESAs, including preparation of a SSQAPP for EPA approval. Phase II ESA include sampling and laboratory analysis to characterize contamination levels and other site conditions. Non-EPA Resources Needed: None.

ii. Anticipated Project Schedule: Q1: Begin site selections and Phase I ESAs, with Phase II assessments conducted as needed. At least 1 site ready for ABCA/RAP by Year 2. Ongoing: Continued Phase I & II ESAs reports. Findings and progress updates will be included in quarterly reports.

iii. Task/Activity Lead(s): NMCOG and BSC will lead site selection per section 1.c with QEP assistance. QEP, in coordination and oversight with NMCOG and BSC will lead completion of ESAs.

iv. Outputs: Site Eligibility Forms; access agreements, permits, 10 Phase I ESA and 6 Phase II ESA reports.

Task 4: Cleanup Planning, Site Reuse, and Visioning

i. Project Implementation: EPA Funded: NMCOG will conduct comprehensive land use assessments and develop site-specific visioning documents for selected Brownfield sites. This includes infrastructure evaluations, resource roadmaps, and collaboration with municipal and community stakeholders to align with smart growth principles. Visioning activities will incorporate feedback from community workshops and stakeholder interviews. NMCOG will work with the QEP to develop 4 ABCAs and Phase III RAPs and 1 market study. Non-EPA Resources Needed: None.

ii. Anticipated Project Schedule: Land use and infrastructure assessments will be completed by the end of Year 1, with preliminary visioning reports and resource roadmaps finalized by Year 2. ABCAs and RAPs undertaken in Year 2 through end of project. Quarterly reports will include monthly updates on progress.

iii. Task/Activity Lead(s): NMCOG Sustainability Planner leads reuse studies, with NMCOG & municipal staff, BSC, and QEP supporting. QEP will lead ABCAs, RAPs, and Market Study with NMCOG oversight and support.

iv. Outputs: Two reuse studies; four ABCAs and Phase III RAPs; and one market study.

3.e. Cost Estimates

Category		Task 1-Cooperative Agreement Oversight	Task 2 - Community Engagement	Task 3 – Ph. I/ Ph. II ESAs	Task 4 - Site Cleanup and Reuse Planning and Visioning	Total
Direct Costs	Personnel	\$7,425	\$16,425	\$1,800	\$16,425	\$42,075
	Fringe Benefits	\$2,970	\$6,570	\$720	\$6,570	\$16,830
	Travel	\$5,170	\$600	\$200	\$200	\$6,170
	Supplies	\$0	\$525	\$0	\$0	\$525
	Contractual	\$8,000	\$41,400	\$317,500	\$67,500	\$434,400
Total Direct Costs		\$23,565	\$65,520	\$320,220	\$90,695	\$500,000
Total Indirect Costs		\$0	\$0	\$0	\$0	\$0
Total Budget		\$23,565	\$65,520	\$320,220	\$90,695	\$500,000

All QEP contractual costs below are estimated from a survey of unit cost estimates from seven QEPs. NMCOG staff hours are estimated based on previous community engagement work and current rates/fringe. No administrative costs are proposed to be funded by this grant, as NMCOG will absorb indirect costs.

Cost Breakdowns: Task 1: Cooperative Agreement Oversight: Personnel \$7,425 (NMCOG staff 165 hours at \$45/hour); Fringe Benefits \$2,970 (40% of Personnel); Travel: \$5,170 (National Conference: 2 conferences x (\$1,200 flight + \$135 lodging + \$1,250 per diem); Contractual: \$8,000 (QEP ACRES reporting 16 reports @ \$500). **TOTAL = \$23,565**

Task 2: Community Engagement: Personnel \$16,425 (NMCOG staff 365 hours at \$45/hour); Fringe Benefits \$6,570 (40% of Personnel); Travel: \$600 (travel to meetings (mileage/tolls)); Supplies: \$525 for engagement supplies & large-format printing; Contractual: \$41,400 (QEP prepare 1 CIP = \$4,000, 4 meetings x \$750 each = \$3,000, 1 Story Map - \$4,000, Community Reports 16 reports x 1,900 each = \$30,400). **TOTAL = \$65,520**

Task 3: Environmental Site Assessments (ESA): Personnel \$1,800 (NMCOG staff 40 hours at \$45/hour); Fringe Benefits \$720 (40% of Personnel); Travel: \$200 (travel to sites (mileage/tolls)); Contractual: \$317,500 (10 Phase I ESAs @ \$4,750/site = \$47,500, 6 Phase II ESA including SSQAPP @ \$45,000/site = \$270,000). **TOTAL = \$320,220 – The Ph I/Ph II ESA budget is 64% of total budget, exceeding the 40% minimum.**

Task 4: Cleanup Planning, Site Reuse, and Visioning Personnel \$16,425 (NMCOG staff 365 hours at \$45/hour); Fringe Benefits \$6,570 (40% of Personnel); Travel: \$200 (travel to sites (mileage/tolls)); Contractual: \$67,500 (4 ABCA/Phase III \$7,500/site = \$30,000, 1 Market Studies @ \$37,500 = \$37,500). **TOTAL = \$90,695**

3.f. Plan to Measure and Evaluate Environmental Progress and Results: NMCOG will implement a comprehensive tracking and evaluation system to monitor the progress of the Brownfields Assessment Program. We will prepare quarterly reports and update ACRES to document site progress, tracking metrics such as the brownfield sites identified, number of Phase I and II assessments completed, cleanup planning, and community engagement through meetings, attendance, and participant support costs. The evaluation will capture qualitative and quantitative outcomes of community involvement to ensure alignment with local needs while maintaining a flexible project schedule to accommodate changes in property ownership, staffing, and weather conditions.

Beyond immediate outputs, NMCOG will track long-term outcomes such as acres remediated, green spaces created, and restored wetlands. NMCOG will measure progress through metrics including jobs created, housing units developed, and acres of recreational spaces established. Key outcomes also include reduced homelessness, increased community engagement, and anti-displacement efforts by tracking the retention of residents and small businesses in revitalized areas. Some sites are likely to meet MassDEP reporting criteria, and NMCOG will work with Potential Responsible Parties to facilitate entry into the state cleanup program, further supporting environmental health and community resilience.

(4) PROGRAMMATIC CAPABILITY AND PAST PERFORMANCE

Programmatic Capacity 4.a. Organizational Capacity: As a regional state agency, NMCOG serves nine municipalities in Greater Lowell. NMCOG has a well-established capacity to oversee federal grant tasks and manage complex federal projects' programmatic, administrative, and financial requirements. Our 15-member team operates with a includes principal sustainability planners, economic development professionals, and finance specialists. Our

approach is place-based and community-focused, enhancing local planning objectives in land use, environmental protection, energy, economic development, housing, public health, municipal services, and transportation.

4.b. Organizational Structure: NMCOG's structure consists of a policy board made up of local elected officials and planning board members from each member municipality, fostering close collaboration and direct community representation. This governance model allows NMCOG to streamline decision-making, ensuring projects progress on time and within budget. NMCOG is carefully structured so that there are clear roles and responsibilities across various departments, facilitating effective oversight, consistent communication, and alignment with both community priorities and grant requirements as described below.

4.c. Description of Key Staff: The project will be led by **Meghan Tenhoff, ENV SP, Principal Planner - Sustainability**, who has over a decade of experience in program and project management, especially in multi-system collaborations. Meghan will be supported by NMCOG's team of experts, including:

- Jennifer Raitt, Executive Director: Oversees staff, grant management, and quality control, drawing on 30 years in housing, community development, land use, and economic planning, with extensive experience in oversight of Phase I and Phase II ESAs and Phase III RAP/ABCAs and federal grant experience.
- Christopher Glenn Hayes, AICP, Director of Housing and Economic Development: Provides regional housing and economic development expertise with deep knowledge of funding, policies, and stakeholders.
- Michael Asciola, AICP, Senior Planner of Housing and Land Use: Experienced in Brownfields assessment, cleanup, and site reuse, including work on naval base realignment.
- Carlin Andrus, GISP, GIS and Data Program Manager: Responsible for updating municipal databases with Brownfield site inventories.
- Sara Schreiber, Finance and Benefits Manager: Manages NMCOG's project budget and ensures compliance with state and federal financial documentation standards.

4.d. Acquiring Additional Resources: To successfully complete this project, NMCOG will leverage a robust system for acquiring additional resources. NMCOG, with QEP support, will assist with leveraging additional resources from MassDevelopment, MassWorks, MassDEP's Brownfields Program, EPA TBA, CDBG funds, and other state and local resources. NMCOG's team, experienced in procurement and contract management, will oversee compliance to align efforts with project schedules, budgets, and EPA terms and conditions.

Past Performance and Accomplishments: **4.f. NMCOG Has Not Received an EPA Brownfields Grant but has Received Other Federal or Non-Federal Assistance Agreements**

(1) Purpose and Accomplishments: NMCOG's recent success in securing and managing grants from the USDOT, EDA, and the state's EOEEA and MS4 programs demonstrate our capability to administer complex, multi-year projects like the EPA Brownfields Grant. Each of these grants requires NMCOG to engage in robust community outreach, data analysis, and synthesis of public feedback, skills that are directly transferable to the community-focused and data-driven requirements of the Brownfields program. As a recipient of MassDOT funding, NMCOG manages \$1.2 million in federal transportation funding annually, with \$1 million toward program staff for regional and local plans, reports, and certified documentation maintenance and the remainder toward field work contractors. In compliance with reporting requirements, NMCOG staff provide monthly project updates and annual reports at the end of each federal fiscal year. Similarly, NMCOG managed a \$150,000 project funded by the U.S. EDA and undertaken in collaboration with contractors, completing semiannual financial reports, project progress reports, and completing the project: An EPA-compliant Economic Development Strategy. These experiences underscore NMCOG's readiness to manage the EPA Brownfields Grant, ensuring accountability, effective community engagement, and achievement of project objectives.

(2) Compliance with Grant Requirements: NMCOG consistently meets reporting requirements and adheres to all terms and conditions outlined by awarding agencies. For each project, including the ones mentioned above, NMCOG follows a comprehensive work plan and maintains a detailed schedule to ensure the timely completion of each subtask. Our project teams monitor progress against these benchmarks and adjust resources as needed to stay on track. Quarterly reports, invoices, and annual summaries are submitted on schedule, providing transparent updates to funders and confirming compliance with all grant stipulations. This structured approach underscores NMCOG's commitment to accountability and efficient project management, ensuring that each project aligns with the scope, schedule, and objectives set forth in the grant agreement.

Attachment A – Threshold Criteria for Assessment Grants – Northern Middlesex Council of Governments, Massachusetts USEPA FY26 Brownfields Assessment Grant Application

USEPA FY2026 Brownfields Assessment Grant Application

1. Applicant Eligibility

a. The Northern Middlesex Council of Governments (NMCOG) is a government entity other than a city, county, Tribe, or State.

NMCOG is a Regional Council established under governmental authority or group of General Purpose Units of Local Government established under Federal, State, or local law (e.g., councils of governments) to function as a single legal entity with authority to enter into binding agreements with the Federal Government. Authorized under Massachusetts General Law Part I Title VII Chapter 40B, NMCOG is a Massachusetts state regional planning agency serving the nine community in Greater Lowell, Billerica, Chelmsford, Dracut, Dunstable, Lowell, Pepperell, Tewksbury, Tyngsborough, and Westford. Documentation of NMCOG's eligibility is attached.

b. NMCOG is not a 501(c)(3) or 501(c)(4) tax-exempt entity.

2. Community Involvement

NMCOG's community engagement efforts will include entities with backgrounds in watershed protection, housing and commercial redevelopment, and cultural engagement. Our list of nonprofit organizations includes the Merrimack River Watershed Council, the Lowell Development and Financial Corporation, the Cambodian Mutual Aid Association, and the Small Towns Collaborative. NMCOG will organize virtual town hall meetings for each new project, send out quarterly newsletters and press releases, and create a project-specific webpage. NMCOG plans to engage community liaisons who will bridge NMCOG and their communities, representing the needs and interests of community members who will be most affected by the projects and ensure that their voices are heard and reflected in final plans. NMCOG will also host in-person meetings in each Target Area to discuss concerns and vision for priority sites. Translation services will be provided at these meetings. Additional feedback will be collected through focus groups, surveys, and public comment periods to be presented to a Brownfields Steering Committee formed by NMCOG.

3. Expenditures of Assessment Grant Funds

NMCOG does not have any open EPA grants.

4. Contractors and Named Subrecipients

- **Contractors:** Not applicable.
- **Named Subrecipients:** Not applicable