EPA Region 7 Climate Adaptation Implementation Plan Addendum

EPA Region 7 released its <u>Climate Adaptation Implementation Plan</u> in October 2022, which featured 28 priority actions to be taken by its divisions, offices, and programs. Performance metrics were established for these priority actions through Fiscal Year (FY) 2023. This addendum serves to 1) provide a status update on those existing priority actions; 2) continue existing priority actions with new performance metrics and identify new priority actions Region 7 will take in FY24-26; and 3) highlight other ongoing climate-related activities in Region 7.

Designation of a Senior Career Leader

Beginning October 8, 2023, Region 7 designates Acting Deputy Regional Administrator, Josh Tapp, as the Region 7 Senior Career Leader for Climate, responsible for the development, management, and execution of Region 7's Climate Adaptation Implementation Plan. The DRA will work with Region 7 divisions and offices to ensure the Plan's priority actions and management activities are implemented.

Regional Climate Actions

1. Existing Priority Actions

Description: This section details Region 7's existing climate change priority actions from its <u>Climate Adaptation Implementation Plan</u> (October 2022) and showcases progress to date (through FY23 Q3).

APPRO	ACH		TRACKING & REPORTIN	IMPACT			
Action	Who's involved?	Timeframe	Performance Measure Output(s) & Outcome(s)	Agency Climate Priority(s)*	Related Climate Impact(s)**	Climate Vulnerability(s) Addressed***	Co-Benefit(s)
Partner with states and tribes to assess air quality challenges, including but not limited to monitoring risks, and develop recommendations consistent with national guidance to assess the risks.	Air and Radiation Division (ARD)	FY22-23	Output(s): Conversations on climate adaptation priorities were held with seven tribes and all four Region 7 states. EPA developed and provided recommendations to assess climate-related risks to air quality. This action is still ongoing and will be completed by the end of FY23. Outcome(s): Tribes and states are aware of climate-related challenges to ambient air quality and ways to address them.	Priority 2 Priority 1	Extreme weather events Heat	• Air quality	Public health Data availability
Integrate air quality monitoring risks into the regional review process.	ARD	FY23	Output(s): The air monitoring regional review process was updated to include climate adaptation considerations. A section was added to evaluate which monitors are in floodplains, which ones may need to be replaced sooner due to increased heat (no shelters), or other effects of climate change. Outcome(s): Climate change impacts are now embedded into the air monitoring regional review process.	Priority 2 Priority 1	Extreme weather events Heat	• Air quality	Public health Data availability

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Partner with states and tribes to assess indoor air quality health risks related to climate impacts and develop recommendations on messaging and outreach.	ARD	FY22-23	Output(s): Climate-related messaging recommendations related to indoor air quality were developed and provided to seven tribes and all four Region 7 states. This action is still ongoing and will be completed by the end of FY23. Outcome(s): Tribes and states are aware of climate-related challenges to indoor air quality and ways to address and convey them to the public.	Priority 1 Priority 2	Extreme weather events Wildfire	• Air quality	• Public health	
Provide tribal drinking water infrastructure funding through interagency agreements with the IHS to support climate resilience for tribal drinking water systems.	Water Division (WD)	FY22-26	Progress to date Output(s): Region 7 has one climate resilience-related interagency agreement currently in progress. This action is still ongoing and will continue in future fiscal years. Outcome(s): The current interagency agreement is focused on the use of water meters to reduce water loss on tribal lands.	Priority 2 Priority 1	Drought Extreme weather events	Water quality	Environmental justice Public health Safe drinking water	
Conduct training for Enforcement and Compliance Assurance Division staff on climate change impacts to regulated industry sectors to include examples from extreme weather events and onsite observations.	Enforcement and Compliance Assurance Division (ECAD)	FY22	Progress to date Output(s): 40 out of 55 of ECAD staff were trained on climate change impacts. Outcome(s): ECAD staff are now more familiar with ways to identify potential risks due to climate change impacts at a variety of source sectors, including but not limited to wastewater treatment plants, agricultural ammonia facilities, and RCRA treatment storage and disposal facilities.	Priority 1 Priority 2	Extreme weather events	Air quality Water quality Contaminated sites Chemical safety and pollution prevention	Environmental justice Public health Improved technical assistance to state and tribal partners	

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Seek enforcement mitigations and remedies that consider climate change impacts and include climate adaptation actions.	ECAD FY22-26		Output(s): No suitable cases to include climate adaptation actions have been presented to date. This action will be expanded in future fiscal years in alignment with current policies and to address climate change impacts in the most vulnerable areas in Region 7.		Extreme weather events	Air quality Water quality Contaminated sites Chemical safety and pollution prevention	GHG emission reductions Public health	
Develop an overall climate adaptation strategy for Region 7's Superfund and Emergency Management Division.	Superfund and Emergency Management Division (SEMD)	FY22-23	Outcome(s): N/A. Progress to date Output(s): A climate adaptation strategy has been developed for SEMD and is undergoing internal review for coverage of activities with an identification of other internal and external resources. It will be completed by the end of FY23. Outcome(s): This strategy provides an overall framework for climate adaptation considerations across division-		Extreme weather events	Contaminated sites	• Public health	
Map National Priority List site boundaries to determine sites with flooding vulnerabilities.	SEMD	FY23	Output(s): A map of Region 7 Superfund National Priority List site boundaries overlayed with the 100-year floodplain (FEMA) has been created to assess site vulnerabilities to flooding. The map is currently being internally reviewed and will be completed by the end of FY23. Outcome(s): This map enables Region 7 SEMD to better assess sites for flooding impacts caused by climate change and consider these impacts throughout the cleanup process, from preliminary assessment to remedial design and action to site reuse and redevelopment.	Priority 1	• Flooding	Contaminated sites	• Public health	

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Develop a draft climate adaptation checklist for Superfund removal use.	SEMD	FY23	Progress to date Output(s): A one-page climate adaptation checklist has been developed for Region 7 Superfund removal action use. It is undergoing internal review and will be completed by the end of FY23. Additional priority actions have been developed for the implementation of this checklist and others in future fiscal years. Outcome(s): This checklist enables Region 7 SEMD to better prepare for and respond to removal actions by integrating climate adaptation throughout the process.	Priority 1	Extreme weather events	Contaminated sites	Public health
Identify and incorporate climate adaptation concerns for Region 7 states, tribes, communities, and vulnerable populations into regional science priorities.	aptation concerns for Region 7 states, bes, communities, and vulnerable pulations into regional science Laboratory Services and Applied Science Division (ISASD)		Output(s): Seven climate-related Region 7 science priorities were developed, and 184 science needs were identified in March 2022. Outcome(s): Region 7 is integrating climate change into Regional, Tribal, and State-identified science needs and through collaborative research efforts with EPA's Office of Research and Development.	Priority 5 Priority 1	• All	• All	Assistance to partners Climate-ready workforce and facilities Improved measurement and tracking Science needs addressed
Make improvements to the region's mobile laboratory to increase capacity for responding to drinking water emergencies associated with extreme weather events.	LSASD	FY22-23	Progress to date Output(s): Region 7 received the Region 2 mobile lab in April 2023 and has been making incremental improvements as funding and resources have been available. It is now Region 7's larger capacity mobile lab used to respond to drinking water emergencies. This action was originally aspirational for Region 7, but it became a true priority when funding became available. It is still ongoing and will continue in FY24. Outcome(s): N/A.	Priority 1 Priority 2	Extreme weather events	Water quality	• Public health

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Improve the real-time water monitoring network capabilities to capture the impact of extreme weather events on regional waterways.	LSASD	FY22-26	Progress to date Output(s): Region 7 is currently working on the decommissioning of three sites in the Kansas City metro area and the installation of Nile radar and telemetry systems at two regional monitoring network locations. This action was originally aspirational for Region 7, but it became a true priority when funding became available. It is still ongoing and will continue in future fiscal years. Outcome(s): These improvements allow Region 7 LSASD staff to better understand and analyze the impacts of extreme weather events on regional waterways.	Priority 5 Priority 2	Extreme weather events Heat	Water quality	Ecological health Public health	
Develop a strategic approach for data management of continuous stream monitoring data collected by the region's water monitoring network.	ous stream LSASD FY22-23		Output(s): WISKI training will take place in September 2023, after which regional monitoring network equipment will be installed. The overall data management approach is still in development. This action will continue in FY24. Outcome(s): N/A.	Priority 5 Priority 2	Extreme weather events Heat	Water quality	Ecological health Public health	
Strengthen local food system infrastructure by connecting stakeholders to build resilience in the face of climate-related food insecurities by hosting one regional food summit in FY22 and two regional food summits in FY23.	Land, Chemical, and Redevelopment Division (LCRD)	FY22-23	Progress to date Output(s): Three Regional Food Summits were held in FY22 in Quad Cities, Iowa, Wichita, Kansas, and Springfield, Missouri. As a result, seven separate partner organizations took action on recycling, composting, and food waste prevention. Outcome(s): In each community, stakeholders were able to network and build partnerships, discuss community food system goals, challenges, and successes, and find feasible solutions to reduce food waste and increase access to healthy food for all.	Priority 2	Drought Extreme weather events Heat Pest pressures Wildfire	Contaminated sites Chemical safety and pollution prevention	Environmental justice Increased food equity and access Public health	

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Strengthen local food system infrastructure by connecting stakeholders to build resilience in the face of climate-related food insecurities by creating a web-based food system atlas for the Kansas City metropolitan area.	LCRD	FY22-23	Output(s): Data has been collected. The online Kansas City metro area food system atlas has been completed. Outcome(s): The map builds community climate resilience by better connecting Kansas City metro area stakeholders to their local food system infrastructure.	Priority 2	Drought Extreme weather events Heat Pest pressures Wildfire	Contaminated sites Chemical safety and pollution prevention	Environmental justice Increased food equity and access Public health	
Partner with state solid waste leaders and their networks to identify potential excess food in food manufacturing and processing. Promote food security and equity through the reduction of food loss and waste by facilitating the charitable and safe donation of healthy food from manufacturers and processors to vulnerable communities that are food insecure.	LCRD	Progress to date Output(s): One meeting was held with an Iowa-based food processing organization in FY22. This action is still ongoing and will continue in FY24. Outcome(s): By meeting with food manufacturers, they are better able to find ways to divert edible food from landfills and find opportunities to donate to charitable organizations in vulnerable communities and increase resiliency to climate change in areas of food insecurity.		Priority 2 Priority 5	Drought Extreme weather events Heat Pest pressures Wildfire	Contaminated sites Chemical safety and pollution prevention	Environmental justice GHG emission reductions Public health Waste diversion	
Support ORD's Sustainable and Healthy Communities team with piloting a tool for assessing waste management infrastructure resilience strategies in Davenport, Iowa.	LCRD	FY21-23	Output(s): The tool to assess waste management infrastructure resilience strategies was created and a final project report was completed and published in September 2023. Outcome(s): The Davenport, Iowa community now has a tool to more thoroughly assess climate resilience practices that will be incorporated into their solid waste management plan for Scott County Solid Waste Department.	Priority 5 Priority 4	Extreme weather events	Contaminated sites Chemical safety and pollution prevention	Environmental justice GHG emission reductions Public health	

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Work with FEMA and state emergency management agencies to identify properties subject to flooding that have or may be bought out by local governments through available FEMA grant programs. Offer climate-resilient redevelopment assistance to local governments from Region 7's Brownfields program.	LCRD	FY23-24	Output(s): Region 7 worked with Iowa's State Emergency Management Agency to develop a list of potential communities that could use climate-resilient redevelopment assistance. No communities were interested. Other states will be assessed for opportunities. This action is still ongoing and will continue in FY24. Outcome(s): N/A.	Priority 2 Priority 5	• Flooding	Contaminated sites	Economic development and job creation Environmental justice Public health	
Engage agricultural stakeholders to solicit data and insights regarding climate-induced changes to weed, insect, and disease pests and their impacts to inform Office of Pesticide Programs (OPP) policy, registration, and regulatory decision-making. Facilitate communication promoting OPP IPM priorities to promote adaptive responses to climate-induced pest pressures.	LCRD	FY24-26	Progress to date Output(s): This action will begin in FY24 and will focus on the number of growers/grower organizations educated on Integrated Pest Management (IPM) as a means for adapting to climate-influenced pest pressures. A target of 2 growers/organizations is anticipated to take action on EPA's education and technical assistance. Outcome(s): N/A.	Priority 2 Priority 1	Extreme weather events Heat Pest pressures	Chemical safety and pollution prevention	Economic development and job creation Sustainable food supply Soil health Water quality	
Map RCRA and Coal Combustion Residual sites within regional floodplains to have available during flooding events.	LCRD	FY22-23	Progress to date Output(s): A map detailing RCRA and Coal Combustion Residual (CCR) sites within regional floodplains was created in FY23. Outcome(s): Region 7 is more aware of the vulnerability of RCRA and CCR sites posed by flooding due to climate change-induced increased precipitation and extreme weather events. The project team is now working with EPA's Office of Research and Development on an addendum project to look at additional climate vulnerabilities.	Priority 1 Priority 5	• Flooding	Contaminated sites	Environmental justice Public health	

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Offer assistance to local governments to incorporate climate adaptation (e.g., green infrastructure, urban forestry, native landscaping, outdoor shade structures) into brownfield site redevelopment, resulting in decreased heat island impacts.	LCRD	FY22-24	Output(s): Region 7 worked with the St. Louis Development Corporation to incorporate heat island mitigation options into the redevelopment plan of the old Marshall School property. The plan was completed in April 2023. Outcome(s): St. Louis area stakeholders have a more thorough understanding of potential climate change impacts (e.g., increased temperatures) and associated heat island mitigation strategies available to them when redeveloping properties.	Priority 2	• Heat	Contaminated sites	Environmental justice GHG emission reductions Public health
Work with local governments and communities in the Mississippi River corridor under the Memorandum of Understanding with the Mississippi River Cities and Towns Initiative (MRCTI) to identify technical support needs for climate adaptation related to solid waste infrastructure, recycling, and plastic pollution reduction, with a focus on underserved and low-income communities.	LCRD	FY23-26	Output(s): As part of a regional research project, the project team developed a list of stakeholders in four communities to connect with regarding plastic pollution along the Mississippi River. Initial project outreach took place, and a kickoff call has been arranged in September 2023. This action is still ongoing and will continue in FY24. Outcome(s): N/A.	Priority 2 Priority 5	Drought Extreme weather events	Contaminated sites Chemical safety and pollution prevention	Environmental justice Public health Sustainable materials management Trash-free waters
Enhance the reliability of logistics support operations by coordinating within the region to increase local stockage levels of expendable critical response, monitoring, and enforcement materials.	Mission Support Division (MSD)	FY22-26	Output(s): Minimum stockage levels and reorder points were established. This action will continue in future fiscal years. Outcome(s): Region 7 improved its supply availability.	Priority 3	Extreme weather events	Facilities and operations	Economic development and job creation

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Action	Who's involved?	Timeframe	Performance Measure Output(s) & Outcome(s)	Agency Climate Priority(s)*	Related Climate Impact(s)**	Climate Vulnerability(s) Addressed***	Co-Benefit(s)		
Continue to utilize the Environmental Management System (EMS) to ensure regional facilities have climate impact contingency plans for water/electricity reductions in place and to promote staff water and electricity use efficiencies.	MSD	FY22-26	Progress to date Output(s): Region 7's EMS was administered to include the annual contingency plan validation and quarterly messaging to staff. This action is still ongoing and will continue in future fiscal years. Outcome(s): Region 7 increased its building operating efficiency and built greater awareness of baseline utility requirements.	Priority 3	Extreme weather events	Facilities and operations	GHG emission reductions		
Continue to consolidate information technology servers to reduce demand on local utilities.	MSD	FY22-26	Output(s): 13 on-site servers were decommissioned or transferred to the national data center in FY23. This action will continue in future fiscal years. Outcome(s): This resulted in a net decrease in local power consumption and improved network resilience (e.g., stronger, more continuous access).	Priority 3	Extreme weather events	Facilities and operations	GHG emission reductions		
Award and manage environmental justice (EJ) grants that relate to climate adaptation.	Office of the Regional Administrator (ORA)	FY22-26	Output(s): Zero climate adaptation-related EJ grants have been awarded thus far in FY23. This action is still ongoing and is expected to be completed by the end of FY23. It will continue in future fiscal years. Outcome(s): N/A.	Priority 2	All; will vary by grant	• All	Environmental justice Public health Others will vary by grant		
Conduct outreach and grant training to Region 7 communities, including tribal and rural communities, to increase their capacity to develop strong grant applications, including grants related to climate adaptation and resilience.	ORA	FY22-26	Output(s): 112 unique stakeholders have been educated on climate-related grant opportunities in FY23. This action will continue in future fiscal years. Outcome(s): Region 7 stakeholder are more aware of the climate-related funding opportunities available to them, including the types of eligible projects and applicants.	Priority 2	• All	• All	Economic development and job creation Environmental justice Public health		

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Action	Who's involved?	Timeframe	Performance Measure Output(s) & Outcome(s)	Agency Climate Priority(s)*	Related Climate Impact(s)**	Climate Vulnerability(s) Addressed***	Co-Benefit(s)
Develop EPA Region 7's Climate Adaptation Implementation Plan	ORA	FY22	Progress to date Output(s): Region 7's Climate Adaptation Implementation Plan was developed in August 2022 and published in October 2022 with input from Tribes, States, and all internal divisions and offices. Outcome(s): Region 7 established FY22-23 climate adaptation-related goals and actions around the five Agency climate adaptation priorities.	Priority 1 Priority 4	• All	• All	Assistance to partners Climate-ready workforce and facilities Improved measurement and tracking Science needs addressed

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2. Ongoing & New Priority Actions

Description: This section includes both continuing / modified and new climate change priority actions Region 7 will take in FY24-25 to increase community climate resilience and reduce GHG emissions. Resources are available to execute and complete all actions.

RATIONALE	APPROACH			TRACK	ING & REPORTING	G	IMPACT			
Why this action? (Regional Importance / Need / Knowledge Gap)	Action	Who's involved?	Timeframe	Performance Measure Output(s)	Expected Outcome(s)	Agency Climate Priority(s)*	Related Climate Impact(s)**	Climate Vulnerability(s) Addressed***	Co-Benefit(s)	
A more educated and aware workforce enables us to better integrate and consider climate change in all EPA programs.	[NEW] Engage with and provide training* to Region 7 staff and management on the principles of climate change, how to integrate climate change into EPA programs, and past/current actions taken by Region 7. *Section 4 of the Region 7 Climate Adaptation Implementation Plan covers Region 7's commitment to internal and external climate change training, including the distribution of EPA National Program modules.	Lead: ORA Support: All Divisions	FY24-26	Number of engagements and trainings conducted. (FY24 Target: 4)	Increased internal awareness of climate change impacts and ways to adapt to and address them; integration of climate change across regional work.	Priority 1	• All	• All	Environmental justice Public health	
EPA climate change information is scattered, presenting challenges (e.g., awareness, comprehension) to both EPA management and staff and external partners.	[NEW] Develop a Region 7 climate platform to include tools, resources, funding opportunities, an interactive map of climate-related projects, and links to state, tribal, and local climate adaptation programs.	Lead: ORA Support: All Divisions	FY24	Platform created. (FY24 Target: 1)	Increased internal and external access to climate change resources.	Priority 1 Priority 2	• All	• All	Economic development and job creation Environmental justice GHG emission reductions Public health	
Engaging regional partners widens the net and strengthens our capacity to build awareness of not only climate change-related funding but also EJ and EE funding; training and outreach is the conduit.	[CONTINUING / MODIFIED] Conduct targeted outreach, training (e.g., grant writing), and technical assistance to Region 7 partners to increase their awareness of climate-related funding opportunities (e.g., BIL, IRA) and capacity to develop strong applications.	Lead: ORA Support: All Divisions	FY22-26	Number of partners reached. (FY24 Target: 50)	More external partners, including tribes and rural communities, aware of available climate-related funding opportunities and how to apply.	Priority 2	• All	• All	Economic development and job creation Environmental justice GHG emission reductions Public health	

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Why this action? (Regional Importance / Need / Knowledge Gap)	Action	Who's involved?	Timeframe	Performance Measure Output(s)	Expected Outcome(s)	Agency Climate Priority(s)*	Related Climate Impact(s)**	Climate Vulnerability(s) Addressed***	Co-Benefit(s)	
Outreach is needed to ensure regional partners, particularly underserved and nontraditional audiences, understand the portfolio of BIL and IRA programs and the types of eligible projects available to reach their goals and reduce GHG emissions.	[NEW] Develop and implement a regionally relevant sector-based outreach strategy for engaging key partners and audiences on Bipartisan Infrastructure Law (BIL) and Inflation Reduction Act (IRA) funding opportunities.	Lead: ORA- OPA Support: All Divisions	FY24	Target sector outreach strategy and set of materials developed*. (FY24 Target: 3) *The number of partners in target sectors reached will be tracked under the previous action.	Increased external partner awareness of BIL and IRA funding opportunities and how they can support climate-smart investments to address goals and priorities.	Priority 2	• All	• All	Economic development and job creation Environmental justice GHG emission reductions Public health	
Embedding climate change into EJ grants helps to protect those communities most affected by climate change impacts, thereby directly advancing EPA's commitment to taking the actions necessary to protect human health and the environment and to increase the resilience of the entire nation.	[CONTINUING / MODIFIED] Award and manage climate change-related environmental justice (EJ) grants.	Lead : ORA- OIA	FY22-26	Number of climate change- related EJ grants awarded. (FY24 Target: 3)	More EJ grantees integrating climate change work into their activities.	Priority 2	All; will vary by grant	• All	Economic development and job creation Environmental justice GHG emission reductions Public health Others will vary by grant	
When willingly provided to EPA, IK is important for anticipating, preparing for, adapting to, and recovering from climate change impacts.	[NEW] Participate in EPA American Indian Environmental Office's (AIEO) quarterly Indigenous Knowledge (IK) and climate change discussions and implement at least one action that incorporates IK in climate adaptation actions.	Lead: ORA- OIA Support: ORA-OTA; All Divisions	FY24	N/A (Region 7 will report actions to AIEO and AIEO will report to OP quarterly on Region 7's behalf).	Climate adaptation measures take into account the needs and history of those disproportionately impacted.	Priority 1	• All	• All	Environmental justice Public health	
With agriculture a critical sector in the midwest, Region 7 is seeking input and engagement from key partners to add value and bring about tangible results and solutions in the climate-smart agriculture space.	[NEW] Stand up a regional partnership to identify and address critical climate-smart agriculture policies, knowledge gaps, and project opportunities.	Lead: ORA Support: All Divisions External: Regional land grant universities and research institutions, agriculture sector partners	FY24-26	Number of meetings held. (FY24 Target: 2)	Tangible, regionally relevant climate-smart agriculture results and solutions; clearer understanding of where EPA can play a role and add value in this area.	Priority 2 Priority 5 Priority 1	• All	Air quality Water quality Chemical safety and pollution prevention	Economic development and job creation Environmental justice GHG emission reductions Public health	

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Anaerobic digestion presents a unique and timely topic in Region 7. Its complexity requires a convening format that embraces shared dialogue and networking. This conference seeks to enhance regional partnerships, promote environmental justice, support the agriculture community, and ultimately spotlight anaerobic digestion as an opportunity for climate resilience.	[NEW] Develop and hold an anaerobic digestion in agriculture conference.	Lead: ORA, ARD, LSASD Support: All Divisions External: Iowa State University, University of Iowa, farmers, industry partners	FY24	Conference held. (FY24 Target: 1)	Increased information sharing and awareness of the opportunities, benefits, and impediments to anaerobic digestion implementation.	Priority 2	• All	Air quality Water quality	Economic development and job creation Environmental justice GHG emission reductions Public health Soil health Waste diversion
Recruiting partners into the Advance Program helps arm areas to reduce ground-level ozone and particulate matter (which is increasing due to climate change). Joining the Advance Program allows partners extra resources and support lowering particulate matter and ground-level ozone to stay in attainment.	[NEW] Contact local governments and air quality organizations that are not currently part of the Advance Program* with the goal of recruiting new partners to join. *The Advance Program supports tribes, states, and local governments that want to take proactive steps to keep their air clean by promoting local actions to reduce ozone and/or fine particle pollution. More information can be found at: https://www.epa.gov/advance.	Lead : ARD	FY24	Number of partners contacted and provided information* about the Advance Program. (FY24 Target: 20) *The number of new partners who join the program will also be monitored.	Increased awareness of practices to reduce particulate matter and ground-level ozone in different communities.	Priority 1 Priority 2	Particulate matter Ozone	• Air quality	Environmental justice GHG emission reductions Public health
By identifying noncompliant facilities so that plans can be developed and implemented, the likelihood of infrastructure service gaps due to risks, such as climate-related disasters, can be reduced.	[NEW] Target facilities noncompliant with the America's Water Infrastructure Act (AWIA) of 2018, which requires risk and resilience assessments and emergency response plans to address risks, such as climate-related natural disasters.	Lead: ECAD Support: ORC, OECA, OW	FY24-26	Number of facilities targeted for compliance. (FY24 Target: 14)	Enforcement actions where the required emergency response plan is developed.	Priority 1	Extreme weather events Flooding	Water quality	Environmental justice Public health

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It is important to evaluate compliance at facilities that handle extremely hazardous substances, hazardous wastes, drinking water, and wastewater that are at risk due to climate change impacts, such as extreme weather events. It is also important to evaluate the compliance of GHG emitters, such as landfills and oil and natural gas facilities.	[NEW] Target compliance inspections to facilities vulnerable to climate change impacts or GHG emitters. In enforcement work, use all available authorities, injunctive relief, and mitigation tools to address the impacts of climate change as appropriate on facilities in the most vulnerable areas.	Lead: ECAD Support: ORC	FY24-26	Number of facilities targeted for climate change impacts. (FY24 Target: 10)	Reduced risk of impacts to the environment or human health and a reduction of the potential for GHG emissions.	Priority 1	Extreme weather events Flooding	Air quality Water quality Contaminated sites	 Environmental justice GHG emission reductions Public health 	
By identifying facilities that are at risk of climate change impacts, such as extreme weather events, compliance monitoring efforts are strengthened.	[NEW] Work with the regional mapping team to evaluate facilities for climate change-related risks in the most vulnerable areas.	Lead: ECAD Support: LCRD, LSASD, OECA	FY25-26	Map of facilities that are at the highest risk to climate change impacts and in or near the most vulnerable populations created. (FY24 Target: N/A)	Reduced risk of impacts to the environment or human health and a reduction of the potential for GHG emissions.	Priority 1	Extreme weather events Flooding	Air quality Water quality Contaminated sites	 Environmental justice GHG emission reductions Public health 	
Food waste is a priority focus material for EPA's Sustainable Materials Management program. Reducing food waste can have significant climate implications by reducing the amount of food sent to landfill and, thus, GHG emissions. It can also provide support to low-income and disadvantaged communities via donations, etc.	[CONTINUING / MODIFIED] Identify potential excess food in food manufacturing and processing. Facilitate the charitable and safe donation of healthy food from manufacturers and processors to vulnerable communities that are food insecure.	Lead : LCRD	FY22-24	Number of meetings held with food manufacturing and processing facilities. (FY24 Target: 1)	More manufacturing plants will have knowledge about recovering healthy food waste from their processes and donating edible food to charitable organizations.	Priority 2 Priority 5	Drought Extreme weather events Heat Pest pressures Wildfire	Contaminated sites Chemical safety and pollution prevention	 Environmental justice GHG emission reductions Public health Waste diversion 	
Communities with flooding concerns need support to consider and incorporate climate change considerations into property redevelopment.	[CONTINUING / MODIFIED] Work with FEMA and state emergency management agencies to identify properties subject to flooding that have or may be bought out by local governments through available FEMA grant programs. Provide climate-resilient redevelopment assistance to local governments from Region 7's Brownfields program.	Lead: LCRD	FY23-24	Number of communities supported via climate-resilient redevelopment assistance. (FY24 Target: 1)	More communities aware of and using technical assistance available through EPA's Brownfields and Land Revitalization program to increase flood resiliency.	Priority 2 Priority 5	• Flooding	Contaminated sites	Economic development and job creation Environmental justice Public health	

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Why this action? (Regional Importance / Need / Knowledge Gap)	Action	Who's involved?	Timeframe	Performance Measure Output(s)	Expected Outcome(s)	Agency Climate Priority(s)*	Related Climate Impact(s)**	Climate Vulnerability(s) Addressed***	Co-Benefit(s)
It is important to promote IPM actions to agricultural partners, while also informing EPA OPP policy and decision-making to help partners develop IPM priorities to address adaptive responses for climate change-induced pest pressures.	[CONTINUING / MODIFIED] Engage agricultural partners to solicit data and insights regarding climate change-induced changes to weed, insect, and disease pests and their impacts to inform Office of Pesticide Programs (OPP) policy, registration, and regulatory decision-making. Facilitate communication promoting OPP Integrated Pest Management (IPM) priorities to promote adaptive responses to climate-induced pest pressures.	Lead: LCRD	FY24-26	Number of engagements held with agricultural partners*. (FY24 Target: 2) *Resulting actions taken by agricultural partners will also be monitored.	More states and communities aware of IPM practices and how they can help them be more responsive and adaptive to climate changes that are causing pest pressures.	Priority 2 Priority 1	Extreme weather events Heat Pest pressures	Chemical safety and pollution prevention	Economic development and job creation Soil health Sustainable food supply Water quality
Understanding social barriers and motives for addressing solid waste, recycling, and plastic pollution problems in low-income and underserved communities can be used improve policy, technical support, and funding opportunities.	[CONTINUING / MODIFIED] Work with communities along the Mississippi River under the Memorandum of Understanding with the Mississippi River Cities and Towns Initiative (MRCTI) to identify technical support needs for climate change related to solid waste infrastructure, recycling, and plastic pollution reduction, with a focus on underserved and low-income communities.	Lead: LCRD Support: ORA, Regions 4, 5, 6, ORD	FY23-26	Number of community workshops held*. (FY24 Target: 3) *Resulting actions from communities will also be monitored.	Community-driven solutions for plastic pollution identified by communities along the Mississippi River, with potential for implementation and replication elsewhere.	Priority 2 Priority 5	Drought Extreme weather events	Contaminated sites Chemical safety and pollution prevention	Environmental justice Public health Sustainable materials management Trash-free waters
Based on LCRD division climate meetings each quarter, a broad list of relevant climate change mitigation and adaptation information and actions would be beneficial for each branch to use when communicating with external partners.	[NEW] Create a pamphlet of climate change actions for all LCRD branches to use as a guide when connecting with regional partners to assist with future climate goals and direction.	Lead : LCRD	FY24-25	Pamphlet/guide created. (FY24 Target: 1)	Increased awareness of actions and practices to reduce GHG emissions and allow communities to be more resilient to climate change.	Priority 1 Priority 5	DroughtFloodingHeat	Contaminated sites Chemical safety and pollution prevention	Environmental justice GHG emission reductions Public health

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Region 7's current mobile lab is not sufficient to meet regional needs or those of our most frequent customer, Region 6, who relies on Region 7 as a vital first backup during emergencies. The vehicle does not have sufficient climate control to operate in high heat, which is critical to providing valuable capacity building and emergency response with certified bacteria analysis.	[CONTINUING / MODIFIED] Continue to make improvements to the region's mobile lab to increase capacity for responding to drinking water emergencies associated with extreme weather events.	Lead: LSASD Support: WD, SEMD	FY22-24	Up-to-date mobile lab that can function and operate in high heat. (FY24 Target: 1)	Emergency certified bacterial analysis available as needed, especially in response to increasing climate change emergencies.	Priority 1 Priority 2	Extreme weather events	Water quality	• Public health
Upgrading regional monitoring network sites provides real-time water data from long-term monitoring sites. The ability to capture changes in flow regimes in sentinel streams serves as an indicator for larger watershed scale issues caused by runoff events. Having real-time data eliminates the need for staff to regularly visit sites to manually upload data from existing systems. Understanding flow regime changes caused by extreme weather events allows EPA to understand the impact these events have on the biotic communities in those sites and allows for the potential to extrapolate the events seen at small sentinel sites to larger riverine systems.	[CONTINUING / MODIFIED] Improve the real-time water monitoring network capabilities to capture the impact of extreme weather events on regional waterways.	Lead: LSASD Support: WD	FY22-26	Number of Nile radars installed at regional monitoring network sites. (FY24 Target: 2)	Real-time data availability at all regional monitoring network sites, including those operated by EPA, states, and tribes, which will save staff time and allow all data to be publicly accessible.	Priority 5 Priority 2	Extreme weather events Flooding Heat	Water quality	Ecological health Public health

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The development of a strategic approach for data management and operation of the WISKI database allows for real-time data display from remote monitoring locations. Additionally, the database serves as a hub for biological and water monitoring data collected by Region 7 and partner states and tribes who participate in the regional monitoring network.	[CONTINUING / MODIFIED] Develop a strategic approach for data management of continuous stream monitoring data collected by the region's water monitoring network.	Lead: LSASD Support: WD	FY22-24	Number of Region 7 staff trained in the operation of the WISKI database. (FY24 Target: 3)	Access to historical data; hub and data repository for all Region 7 real-time biological and water monitoring data; data configuration, analysis, and formatting for upload to EPA's Water Quality Exchange.	Priority 5 Priority 2	Extreme weather events Flooding Heat	Water quality	Ecological health Public health
It is important for Region 7 to assess demand for specific items and adjust shelf stocks to reduce potential shortages of key offices supplies due to supply chain disruptions.	[CONTINUING / MODIFIED] Continue to enhance the reliability of logistics support operations by coordinating within the region to increase local stockage levels of expendable critical response, monitoring, and enforcement materials.	Lead : MSD	FY22-26	Stockage levels increased. (FY24 Target: 100%)	Sufficient supplies and materials on site in the event of change change-related disruptions.	Priority 3	Extreme weather events	Facilities and operations	Economic development and job creation
The EMS, specifically contingency and continuity of operations plans that consider climate change risks and potential disruptions, is crucial to have in place to ensure critical work functions continue.	[CONTINUING / MODIFIED] Continue to use the Environmental Management System (EMS) to ensure regional facilities have climate change impact contingency plans for water/electricity reductions in place and to promote staff water and electricity use efficiencies.	Lead : MSD	FY22-26	EMS Administered. (FY24 Target: 100%)	Climate change impact contingency plans for water/electricity reductions in place and up to date.	Priority 3	Extreme weather events	Facilities and operations	GHG emission reductions
It is important for Region 7 to reduce demand on local utilities and enhance regional resiliency.	[CONTINUING / MODIFIED] Continue to consolidate information technology servers to reduce demand on local utilities.	Lead: MSD	FY22-26	Number of servers consolidated. (FY24 Target: 6)	Reduced electricity demand on local utilities.	Priority 3	Extreme weather events	Facilities and operations	GHG emission reductions
A rapid assessment tool for the removal program allows for climate considerations and strategies to be incorporated into response actions, including the protective management of wastes left in place.	[CONTINUING / MODIFIED] Develop and implement a climate resilience checklist for use across the Superfund removal program.	Lead : SEMD	FY23-25	Number of Superfund sites where checklist was applied*. (FY24 Target: 5) *Resulting lessons learned and implementations will also be monitored.	Protective and adaptive measures that consider climate change impacts consistently incorporated at Superfund removal sites and throughout the cleanup process.	Priority 1	Extreme weather events Flooding	Contaminated sites	Public health

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Historical remedies at Superfund remedial sites have not consistently considered climate change as a balancing evaluative criterion in developing sustainable cleanup proposals. A rapid assessment tool for the remedial program allows for climate considerations and strategies to be incorporated into remedial actions.	[NEW] Develop and implement an activity-based, climate resilience checklist for use across the Superfund remedial program.	Lead : SEMD	FY24-26	Checklist created. (FY24 Target: 1)	Protective and adaptive measures that consider climate change impacts consistently incorporated at Superfund remedial sites and throughout the cleanup process.	Priority 1	 Extreme weather events Flooding 	Contaminated sites	• Public health
Climate vulnerability considerations are increasingly key to ensure durable and resilient protective remedies at Superfund sites.	[NEW] Pilot and implement climate vulnerability assessments at Superfund NPL sites.	Lead: SEMD	FY24-26	Number of sites where vulnerability assessment was applied*. (FY24 Target: 20) *An SOP will be developed prior to implementation.	Improved durability and resilience of planned and ongoing remedies; documentation of considerations for follow-on staff awareness.	Priority 1	Extreme weather events Flooding	Contaminated sites	Public health
These interagency agreements and funding mechanisms are already part of existing Tribal work. It is important to capitalize on these existing programs to increase climate resilience.	[CONTINUING / MODIFIED] Provide tribal drinking water infrastructure funding through interagency agreements with the Indian Health Service to support climate resilience for tribal drinking water systems.	Lead: WD	FY22-26	Number of interagency agreements implemented. (FY24 Target: 2)	More climate resiliency considered and incorporated into water infrastructure.	Priority 2 Priority 1	Drought Extreme weather events	Water quality	Environmental justice Public health Safe drinking water
Water infrastructure changes can be significant. Before implementing climateresilient strategies, communities and utilities need examples of successful projects, especially those from communities with similar backgrounds, to understand the value and benefits.	[NEW] Engage with states to present how climate mitigation and resilience can be integrated into new and existing water infrastructure.	Lead : WD	FY24-26	Engagement strategy developed. (FY24 Target: 1) *For FY25-26: Region 7 will track the number of engagements with states that support climate resilience and efficiency improvements.	Increased likelihood of community adoption of climate-resilient water infrastructure improvements through the creation of a compendium of projects to be shared with regional partners, including states.	Priority 2	Drought Extreme weather events Flooding	Water quality	Environmental justice GHG emission reductions Public health Safe drinking water

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3. Other Regional Actions

Description: This section features additional climate change actions being taken or to be pursued by Region 7 divisions / offices. While these are not listed as priority actions, they are nonetheless important to Region 7's work to build resilience to climate change impacts.

Action & Rationale	Who's Involved	Timeframe
Using a Climate External Events Tracker to track requests and invitations for climate-related activities and presentations coming into Region	Lead: ORA	FY23-26
7. This ultimately includes Region 7 participation, role, and key event notes (e.g., number of attendees, BIL/IRA information shared).	Support: All Divisions	F123-20
Tracking climate-related Regional-ORD Applied Research (ROAR) projects to understand what climate-related research is being funded and	Lead: LSASD	FY24-26
implemented in Region 7.	Support: ORD	1124-20
Working with ORD to add vulnerability layers to the RCRA, CCR, and Landfills map created by Region 7 LCRD's RCRA Branch.	Lead: LCRD	FY23-24
working with one to add vulnerability layers to the north, cork, and canding map created by neglot / corb s north branch.	Support: LSASD, ORD	F125-24
Under the MOU with the University of Kansas – Graduate Students for Environmental Science, supporting food waste reduction research in	Lead: LCRD	
the food service and retail sectors.	Support: LSASD, OLEM, ORD	FY23-24
the root service and retain sectors.	External: University of Kansas	
	Lead: LCRD	
Supporting the RePowering America's Land program to provide technical assistance to communities to install renewable energy projects on	Support: Region 7 Redevelopment Navigation Team, OLEM, OAR	FY22-26
contaminated and formerly contaminated properties.	External : Communities who receive technical assistance (FY23: Howardville, MO, Desloge, MO),	1122 20
	Hastings, NE	
Creating a 5-year water monitoring strategy where climate-related projects (e.g., flowtography camera deployments, nature-based	Lead: WD	
solutions projects) will be included. The water monitoring strategy will be used as a regional tool to guide, track, evaluate, and accomplish	Support: OW	FY23-24
monitoring efforts funded by and/or facilitated in the interest of the Office of Water or Region 7's Water Division.		

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