

December 2, 2022

DOE Seeking Input on Implementing Future Growth Grants Program for CO₂ Transport and Developing Field Laboratories for Carbon Storage

The US Department of Energy's Office of Fossil Energy and Carbon Management (FECM) issued two carbon management Requests for Information (RFIs) this week related to the Carbon Dioxide (CO₂) Transportation Infrastructure Finance and Innovation (CIFIA) program and Carbon Storage Technology Operations and Research (CarbonSTORE) initiative.

Carbon Dioxide Transportation Infrastructure Finance and Innovation (CIFIA) program This RFI is requesting feedback from industry members, investors, developers, academia, research laboratories, government agencies, and other stakeholders on the implementation of Future Growth Grants. Specifically, the RFI seeks information on how to support the expansion of transport infrastructure to meet future demands for CO₂. The grants will support regional and national CO₂ infrastructure projects. The CIFIA Future Growth Grants RFI feedback is due on January 17, 2023.

Carbon Storage Technology Operations and Research (CarbonSTORE) initiative
This RFI is requesting feedback from carbon management developers, researchers,
communities, and others to help develop the CarbonSTORE concept on best practices for
developing field laboratories. These laboratories, if funded, could exist at Carbon Storage
Assurance Facility Enterprise (CarbonSAFE) initiative project sites or other sites and would help
develop and test carbon management-related technologies. The CarbonSTORE RFI feedback
is due on January 9, 2023.

CUSP West's Upcoming Webinar on December 9 to Feature GPI's Senior Policy Manager Matt Fry

The Carbon Utilization and Storage Partnership of the Western United States (CUSP) is hosting a quarterly webinar series with the upcoming session, featuring the Great Plains Institute's Senior Policy Manager, Matt Fry. Matt will discuss the large number of developing carbon management activities throughout the Western US and key policy and regulatory updates within the 13-state partnership.

Register for the webinar here.

National Academies of Science Releases CO2 Utilization Markets and Infrastructure Report

This week the National Academies of Science (NASEM) released its much-anticipated Carbon Dioxide Utilization Markets and Infrastructure Report. The report emphasizes that circular carbon economies will be needed to reach net zero emissions and recommends that industries and governments plan for infrastructure and systems to support carbon utilization. Supporting this recommendation, the report assesses how best to improve carbon management infrastructure (capture, storage, use) for utilization.

The report will be followed by a second report focusing on CO₂ utilization's potential markets, infrastructure environmental and economic impacts, and demonstration needs to enable commercialization of CO₂ utilization technologies and processes.

For questions about the report, reach out to GPI's Senior Policy manager Matt Fry (mfry@gpisd.net), who is participating on NASEM's Committee on Carbon Utilization, Infrastructure, Markets, Research, and Development and helped develop the report.

Read a summary of the report here.

University of Michigan Report Finds High Potential for Carbon Storage in the Great Lakes Region

University of Michigan's Global CO₂ Initiative recently released Positioning the Great Lakes St. Lawrence Region as a Leader in the Voluntary Carbon Offset Market. The report evaluated the region's potential for offsets and found that the region could store 52 gigatons of CO2 by 2050 and generate up to 783 billion dollars. Watch the report webinar here.

Industry Leaders Form Collective to Help Develop Measurement, Reporting, and Verification for Carbon Management

Advanced Resources International, Denbury Inc., Enerflex Ltd., IMA Financial Group Inc., Project Canary, and Wolf Carbon Solutions announced their partnership this week to support the development of third-party independent environmental assessments and data measurement for carbon management.

The collective emphasized the importance of carbon management as a climate solution and noted the importance of gaining stakeholder and public trust in carbon management projects to help bring these projects to scale. To help facilitate confidence in carbon management projects the collective will work to bring together existing carbon management frameworks and standards. Specifically, the collective will use Project Canary's digital measurement, reporting, and verification platform to increase the reliability and availability of carbon capture and storage facility-level data across industries.

Gulf Coast Sequestration and Climeworks to Develop Direct Air Capture and Storage Hub in Louisiana

Gulf Coast Sequestration and Climeworks signed a memorandum of agreement on November 21 to partner on developing a direct air capture (DAC) project in Louisiana. The project is anticipated to be able to remove one million tons of CO₂ from the atmosphere by 2030 with the potential to expand in the future.

Oxy Low Carbon Ventures and Enbridge Plan Texas Carbon Transport and Hub Project

Oxy Low Carbon Ventures and Enbridge signed a letter of intent on November 30, solidifying their efforts to build a carbon hub near Corpus Christi, Texas with a goal of helping nearby industrial facilities reduce their CO₂ emissions. Enbridge would develop the CO₂ transport infrastructure while Oxy Low Carbon Ventures will support the storage efforts.

Related News:

- Oxy Low Carbon Ventures and Enbridge plan Corpus Christi carbon capture hub | Upstream Online
- Enbridge Set To Partner With Oxy Low Carbon Ventures For Texas CO2 Hub (carbonherald.com)
- Enbridge, Occidental Partner to Build CO2 Pipeline in Texas | Nasdaq
- Oxy and Enbridge to explore CO2 pipeline and storage hub in Texas (houstonchronicle.com)

News Roundup

- Products Made With Captured Greenhouse Gas Are Reaching Commercial Scale
- Leaders to decide fate of spending, permitting bills E&E News (eenews.net)
- E&E News | Article | EPA looks for ways to speed up CO2 well permits (politicopro.com)
- Biden-Harris Administration Launches Version 1.0 of Climate and Economic Justice Screening Tool, Key Step in Implementing President Biden's Justice40 Initiative | CEQ | The White House
- EJ Panel Rejects White House Call To Advise Agencies On CCS, For Now | Inside EPA
- SoCalGas and Captura Begin Testing Innovative Direct Ocean Carbon Removal Technology (prnewswire.com)
- E&E News | Article | What's the best way to regulate CCS? 2 competing visions. (politicopro.com)
- Beyond solar: Here's what the clean energy future might look like | Grist
- EPA seeks to mandate more use of ethanol and other biofuels | KUAC
- ExxonMobil to offer end-to-end carbon capture solutions | Upstream Online
- Energy Leaders Join Forces For A Clean Hydrogen Hub In The Southwest (carbonherald.com)
- A New Dawn for CCUS After Five Decades of Ups and Downs (yahoo.com)
- US government grants US\$3.7m towards Balcones cement plant carbon capture project
 Cement industry news from Global Cement

Global News

- Climate change: five key takeaways from COP27
- U.S. Secretary of Energy advances America's commitment to reaching net zero global emissions and combatting climate change at COP27
- UK government publishes CCUS business plan
- Equinor plots new CO2 carrier concept with compatriot ship design firm Offshore Energy (offshore-energy.biz)
- EU energy chief announces 'strategic vision' for CCUS in 2023
- Commission invests €3 billion in innovative clean tech projects to deliver on REPowerEU
- Stockholm bets on carbon capture to hit net zero
- Mitsui Is On The Lookout For CO2 Storage Sites In Asia-Pacific (carbonherald.com)
- How the GCC countries have fared on their net-zero commitments so far
- Saudi gives huge boost to carbon capture prospects
- Discussion on the long-term deployment of CCS technology in the CEE region is underway again
- Shell and Sinopec to launch the first 10-million-ton CCUS project in East China
- Commercial incentives for investment in CCS in Australia 'insufficient'
- Growth in carbon capture projects this year is dramatic, showing global determination to cut emissions
- Airbus and Air Canada invest in Canadian carbon capture plant » Airlnsight
- Petronas Initiates Kasawari Carbon Capture Project (carbonherald.com)
- Capture6 Sets Out To Remove 5M Tons Of CO2 From The Air In New Zealand (carbonherald.com)

New podcasts, reports, statements & blogs

- COP 27 Outcomes Global CCS Institute
- Manchin, Barrasso, Brown and Cramer Urge Senate Appropriators to Fund Carbon Mat... Remarks as Prepared for Delivery by Secretary Granholm Opening DOE's "U.S. Energy Earthshots: Decadal Goals to Power the Clean Energy Transition" COP27 Event
- Remarks as Prepared for Delivery by Secretary Granholm Opening DOE's "Net Zero World: Accelerating Global Energy System Decarbonization" COP27 Event
- Babcock & Wilcox and Chart Industries to Collaborate on Hydrogen Innovation Utilizing B&W's BrightLoopTM Technology | West Virginia Business News | wvnews.com
- Raising our ambition: Puro Standard CORCs will require 100 years minimum carbon storage durability
- U.S. Secretary of Energy Advances America's Commitment to Reaching Net Zero Global Emissions and Combatting Climate Change at COP27
- Bridging the Ambition Gap: A framework for scaling corperate funds for carbon removal and wider climate action | CarbonGap
- Carbon removal knowledge gaps | Frontier (frontierclimate.com)
- With A New Regulatory Framework On The Horizon, There Is Still Much Uncertainty Concerning The Future Of Offshore Carbon Storage | Liskow & Lewis - JDSupra

• Ethanol Report on Carbon Pipeline Projects | Energy (agwired.com)

News in the States

California

 Green hydrogen project powered by solar under development in California (solarpowerworldonline.com)

Colorado

 Colorado VC firm closes \$90 million fund to target carbon tech - Denver Business Journal (bizjournals.com)

Delaware

- Cardinal Midstream Partners acquires first assets in Delaware Basin (mrt.com)
- Carbon Reform lands \$3M seed round Delaware Business Times

Illinois

Proposing a clean future for CWLP | Opinion | Illinois Times

Indiana

• AES Indiana ramps up plan to get 85% of energy from renewable sources (indystar.com)

lowa

- E&E News | Article | CO2 pipeline developer seeks to void local lowa ordinances (politicopro.com)
- Close to 60% of lowa landowners have signed easements for carbon-capture pipeline project, company says (qctimes.com)
- Backers of Summit Carbon CO2 Pipeline tour Ida County corn processor as plans move forward | KMEG (siouxlandnews.com)
- Carbon pipeline company makes its pitch in northwest lowa (ktiv.com)
- Summit Carbon enlarges pipelines Cherokee Chronicle Times
- Linn supervisors consider safety rules that could affect CO2 pipeline | The Gazette
- Groups call for carbon capture pipeline permits to be paused in lowa (desmoinesregister.com)

Louisiana

Our Views: Educate public about safety of carbon capture | Our Views | nola.com

Maine

- Maine Beer Company starts brewing with carbon capture tech (gasworld.com)
- Maine Beer Company Installs Chart Industries' Earthly Labs (globenewswire.com)

Nebraska

- Nebraska: The Carbon Capture Race Is Heating Up In Nebraska: The builder of a \$2.5 billion pipeline moves from Dallas to Omaha to oversee the project. (siteselection.com)
- Navigator CO2 Is Moving Its HQ From Dallas To Omaha (carbonherald.com)

New Mexico

• San Juan Mine sealed, Westmoreland announces 60 more layoffs (daily-times.com)

North Dakota

• Port: While you weren't looking, North Dakota became a national leader when it comes to carbon capture (inforum.com)

Pennsylvania

- Pennsylvania Boosts Carbon Capture Research, Invests in State Geologic Survey (wdiy.org)
- Pa. environmental groups see hope, progress on the horizon in Harrisburg | News | phillytrib.com

Tennessee

 Memphis Flyer | Futurist: Tennessee Firms Up "Battery Belt" Status and Plans for Hydrogen Energy

Texas

- TLR Foundation releases nationwide analysis of carbon capture liability regulations |
 Southeast Texas Record (setexasrecord.com)
- CEMEX and RTI to advance carbon capture technology | Agg-Net
- Texas can be a national example with Carbon Capture Utilization and Storage | Opinion | dentonrc.com
- Entergy gets approval to build 1.2 GW hydrogen-ready CCGT in Texas Gas To Power Journal

Utah

 IPA Board rejects unsolicited bid to buy out assets, keep coal units open past 2025 -Millard County Chronicle Progress (millardccp.com)

Washington

• Republicans want to "Power Washington" with new energy plan | The Olympian

Wyoming

- UW Trustees Approve New Certificate Programs in Carbon Capture, Land Administration (uwyo.edu)
- UW to offer new credentials in carbon capture, energy | News | wyomingnews.com
- Wyoming utility regulators discuss implementing carbon capture | Wyoming Public Media
- Wyoming, partners await green light on hydrogen hub application (trib.com)

Upcoming events

December 5

Scrubbing the Skies: CDR and COP27 Tickets, Mon, Dec 5, 2022 at 1:00 PM |
 Eventbrite

Join the Institute for Carbon Removal and Policy in the launching of its new webinar series, Scrubbing the Skies: The Role of CO2 Removal in Combating Climate Change. This series will focus on scientific, technological, legal, political and justice-focused issues associated with CO2 removal.

December 5-8

Midland CO2 Conference

The event provides practical know-how to fit into the worlds of theory, models and response projections. The many well and field case histories address the surface and subsurface challenges, most of which are directly relatable to the coming energy transition world, with low risk and secure CO2 storage. Conference subjects include CO2 EOR, Carbon Capture Utilization and Storage (CCUS), Carbon Management, CO2 reservoir cyclic injection, depressurized oil and gas fields, and residual oil zone (ROZ) exploitation.

December 6

 Arizona Geological Society - Perspectives on a Carbon Storage Ecosystem Built from Distributed CO2 Sequestration Resources in Arizona

Carbon storage in Arizona has low risk because the state has minimal seismicity and is largely rural. However, CCS advancement in Arizona remains relatively new, due to the lack of deep, high quality subsurface data needed to identify seals and address challenges related to water salinity and availability. More recently, AZGS has begun investigating carbon storage in non-traditional geologic resources to make CCS more accessible and distributed throughout the state. We envision a carbon storage ecosystem that includes multiple facets of carbon capture, carbon storage, and economic or industrial carbon use that will facilitate America's energy transition and benefit disadvantaged communities in the region.

December 8

• CO2-Secure: A National Program to Deploy Carbon Removal at Gigaton Scale Launch Tickets, Thu, Dec 8, 2022 at 11:00 AM | Eventbrite

The Energy Futures Initiative's (EFI) latest report, CO2-Secure: A National Program to Deploy Carbon Removal at Gigaton Scale, outlines a federal program for scaling CDR in the United States. EFI is hosting experts and influencers in the CDR space, including EFI CEO Ernest J. Moniz and Rep. Paul Tonko, who will kick off the session. EFI staff will follow with key report takeaways and, joined by other topic experts, the broader implications of CO2-Secure for the future of CDR in the United States.

• Managing CCUS: Risk and Financing - University of Houston (uh.edu)
The University of Houston's Division of Energy and Innovation's Center for Carbon
Management in Energy, alongside co-sponsor Hunton Andrews Kurth, will bring together
experts in geologic storage, experts from the financial and legal community – with a
specific focus on regulatory insight - and experts from the risk insurance marketplace to
start and lead essential dialogue in an interactive setting, with the objective of providing
a sound understanding of the state of play in the CCUS marketplace.

December 12

Carbon Capture and Storage: Path to Sustainability Tickets, Mon, Dec 12, 2022 at 8:30
 AM | Eventbrite

Richland Community College, Illinois State Geological Survey, Wolf Carbon Solutions, and ADM invite you to Carbon Capture and Storage: Path to Sustainability. Learn about the basics of carbon capture and storage (CCS) technology, environmental sustainability education and outreach at Richland, and CCS projects in Decatur. Additionally, ADM will provide a tour of the Illinois Industrial Carbon Capture and Storage (IL-ICCS) Project, including the CO2 compression and dehydration facility and injection and monitoring wells. CO2 pipelines will also be discussed.

Subscribe or request to add an event, news story, report, blog, or job posting to the update by reaching out to Emma Thomley. Looking for more carbon management updates, studies, and fact sheets? Visit us at Carbon Capture Ready and read previous newsletters in our Action Alliance's newsletter archive.