X

- Home (https://www.greencarcongress.com/)
- About (https://www.greencarcongress.com/about3.html)
- · Contact (https://www.greencarcongress.com/about3.html#contact)
- RSS (https://feeds2.feedburner.com/greencarcongress/TrBK)
- GCC Twitter (https://twitter.com/GreenCarCongres)
- Newsletter (https://www.greencarcongress.com/newsletter-subscription.html)

Home (https://www.greencarcongress.com/) About (https://www.greencarcongress.com/about3.html) Contact (https://www.greencarcongress.com/about3.html#contact) RSS (https://feeds2.feedburner.com/greencarcongress /TrBK) GCC Twitter (https://twitter.com/GreenCarCongres) Newsletter (https://www.greencarcongress.com /newsletter-subscription.html)

(https://www.greencarcongress.com/2019/11/20191103-ft.html) Zhejiang team boosts gasoline-range products from Fischer-Tropsch synthesis (https://www.greencarcongress.com/2019/11/20191103-ft.html)

Israeli startup Ride Vision to partner with Sara Assicurazioni to reduce motorbike accidents in Italy (https://www.greencarcongress.com/2019/11/20191104-ridevision.html) • (https://www.greencarcongress.com/2019/11/20191104-ridevision.html)

DOE awards \$4M to carbon capture and storage projects selected as part of ACT (https://www.greencarcongress.com /2019/11/20191104-doeact.html)

04 November 2019 (https://www.greencarcongress.com/2019/11/20191104-doeact.html)

The US Department of Energy's (DOE) Office of Fossil Energy (FE) announced (https://www.energy.gov/fe/articles/us-department-energyannounces-4m-projects-collaborate-internationally-and-accelerate) \$4 million in federal funding for national laboratories to collaborate with international partners on seven projects out of the 12 that were selected as a part of the Accelerating Carbon Capture and Storage Technologies (ACT) Initiative.

The ACT Initiative is a consortium of ten European countries—France, Germany, Greece, the Netherlands, Norway, Romania, Spain, Switzerland, Turkey, the United Kingdom—and the United States.

Together, DOE and the ACT Initiative are funding researchers in each of the



In Brief

Toshiba selects Cypress flash for next-gen ADAS; targeting Level 2 autonomous driving (https://www.greencarcongress.com /2019/12/20191212-toshiba.html)

BMW introducing Android Auto in vehicles from mid-2020 (https://www.greencarcongress.com /2019/12/20191212bmwandroid.html) participating countries to collaborate on projects that will accelerate and mature carbon capture, utilization, and storage (CCUS) technologies around the world.

The 12 selected projects have a total value of nearly \$49 million, with the ACT consortium members contributing \$35 million of this total. The seven projects with US involvement and funding include three carbon capture projects and four carbon storage projects.

Projects	Activities	ACT, M€	France (ADEME)	Germany (PU)	Greece (GSRT)	Netherlands (RVO)	Norway (RCN and Gassnova)	Romania (UEFISCDI)	Spain (AEI)	Switzerland (DETEC)	Turkey (TUBITAK)	UK (BEIS)	USA (DoE)
AC2COM	Oxyfuel technology in cement production	3,0	×	x	x		×			×			
АСТОМ	Offshore monitoring	1,5				x	x					x	x
ANICA	Carbonate looping process in cement industry	2,4		x	x							x	
DIGIMON	Digital monitoring of CO2 storage projects	5,0		x	x	x	x	x				x	x
FUNMIN	CO2 mineralisation into anhydrous MgCO3	0,7	x						x			x	
LAUNCH	CO2 capture in various industries	5,1		x		x	x					x	x
MemCCSea	Membrane systems for CO2 capture and storage at sea	1,7		×	×		×						x
NEWEST-CCS	Negative emissions in the waste to energy sector	2,2		×		×	×					x	
PRISMA	Sorbent materials for energy efficient carbon capture	2,1					×			x		x	×
REX-CO2	Reusing existing wells for CO2 storage	2,5	x			x	x	x				x	x
SENSE	CO2 storage sites - ground surface monitoring	2,7	x	x			x		x			x	x
SUCCEED	CO2 storage coupled with geothermal energy deployment	2,5				×					x	x	
		31,5											

(https://bioage.typepad.com/.a/6a00d8341c4fbe53ef0240a4e72704200bpopup)

The table shows the projects' acronyms, their primary activity, the request for funding from ACT and the country partners involved in ACT2. The green marks indicate the lead country for the specific projects. The total budget of the 12 projects is \notin 43.6 million of which \notin 31.5 million is funded by the ACT consortium; private financing amounts to \notin 1.5M with the remaining coming from matched funding from the projects themselves.

Carbon Capture Projects:

1. Lowering Absorption Process Uncertainty, Risks, and Costs by Predicting and Controlling Amine Degradation (LAUNCH). Los Alamos National Laboratory (LANL) and its subcontractor, the University of Texas at Austin, will work with their partners to establish a fast-track, cost-effective, de-risking mechanism to predict and control degradation of carbon capture solvents. This will help resolve one of the main drawbacks of chemical solvent capture systems that leads to increased costs.

DOE Funding: \$1,000,000; Non-DOE funding: \$7,118,460; Total Value: \$8,118,460

 Innovative Membrane Systems for CO₂ Capture and Storage at Sea (MemCCSea). In this project, the National Energy Technology Laboratory is collaborating on the development of hyper compact membrane systems for maritime and offshore applications. The project team will conduct lab- and pilot-scale tests to optimize and evaluate novel ceramic and mixed membrane systems. DOE Funding: \$500,000; Non-DOE funding: \$1,656,354; Total Value: \$2,156,354

3. Process-Informed Design of Tailor-Made Sorbent Materials for

<u> Teentsteerstorationalitergy as a lidar</u>

Autor Mail And Autor And A

 December 2019 (https://www.greencarcongress.com, <u>Toshiba Jaunches general-purpose</u>

system power IC with multiple November 2019 (https://www.greencarcongress.com, outputs for automotive functional index.html)

safety October 2019 (https://www.greencarcongress.com/2((https://www.greencarcongress.com

/2019/12/20191211.toshiba.html) • September 2019 (https://www.greencarcongress.com /index.html)

More... (https://www.greencarcongress.com/archives.html) Volvo Group Venture Capital

invests in Autotech Ventures

(https://www.greencarcongress.com /2019/12/20191210-

volvogroup.html)

RoboSense launches lidar solution for Robo Taxis outside of China (https://www.greencarcongress.com /2019/12/20191209-rs.html)

Ford & McDonald's collaborate to convert coffee bean chaff into car parts (https://www.greencarcongress.com

/2019/12/20191205-ford.html)

Hubject and Penta Security to provide first global crosscertification for secure ISO15118based EV charging (https://www.greencarcongress.com /2019/12/20191204-hubject.html)

Penske Logistics logs more than 10,000 miles in heavy-duty electric trucks

(https://www.greencarcongress.com /2019/12/20191204-pense.html)

Birla Carbon and CHASM Advanced Materials partner to **Energy Efficient Carbon Capture (PrISMa).** Lawrence Berkeley National Laboratory is partnering on a project that helps to bridge the gap between molecular science and process engineering by developing tailor-made materials for a wide range of carbon capture applications. By coupling these disciplines, the project hopes to bridge the gap that can move promising sorbent materials beyond the lab.

DOE Funding: \$501,000; Non-DOE funding: \$2,724,551; Total Value: \$3,225,551

Carbon Storage Projects:

 Digital Monitoring of CO₂ Storage Projects (DigiMon). Lawrence Livermore National Laboratory (LLNL) is collaborating on a project to integrate a broad range of monitoring technologies with data analytics to improve system cost and reliability for carbon storage projects.

DOE Funding: \$514,000; Non-DOE funding: \$6,727,333; Total Value: \$7,241,333

2. Re-Using Existing Wells for CO₂ Storage Operations (REX-CO₂). In this project, LANL will work with its project partners to develop a procedure and tools for evaluating the re-use potential of existing hydrocarbon wells for carbon dioxide storage. Re-use of existing wells, particularly in offshore environments, can potentially minimize well development costs for CO₂ storage projects.

DOE Funding: \$500,000; Non-DOE funding: \$3,448,544; Total Value: \$3,948,544

3. Assuring Integrity of CO₂ Storage Sites Through Ground Surface Monitoring (SENSE). LLNL and its project partners will demonstrate how ground surface movement detection—combined with geomechanical modeling, inversion, and data analytics—can be used to provide information on pressure distribution and hydraulic behavior of storage sites. This project will result in improved reliability and lower costs of carbon storage sites.

DOE Funding: \$487,000; Non-DOE funding: \$4,587,612; Total Value: \$5,074,612

4. ACT on Offshore Monitoring (ACTOM). LANL and its subcontractor, the University of Texas Bureau of Economic Geology, are a part of a team that will build a web-based toolkit that will, for the first time, collect algorithms for designing optimal monitoring programs for offshore geologic storage sites. DOE Funding: \$500,000; Non-DOE funding: \$1,775,063; Total Value: \$2,275,063

Posted on 04 November 2019 in Carbon Capture and Conversion (CCC) (https://www.greencarcongress.com/carbon-capture-and-conversion-ccc/), Carbon Capture and Storage (CCS) (https://www.greencarcongress.com /carbon capture and storage ccs/) | Permalink

(https://www.greencarcongress.com/2019/11/20191104-doeact.html) | Comments (0) (https://www.greencarcongress.com/2019/11/20191104doeact.html#comments)

P.

Comments

Verify your Comment

develop nanotube-enhanced carbons; tires, coatings, batteries (https://www.greencarcongress.com /2019/12/20191203-birla.html)

Wärtsilä to provide hybrid energy storage solution for off-grid mine in Mali (https://www.greencarcongress.com /2019/12/20191203-wartsila.html)

Lucid Motors begins construction at Arizona EV factory site (https://www.greencarcongress.com /2019/12/20191203-lucid.html)

Autotalks announces first FIPS-Compliant C-V2X/DSRC chipset for secure deployment in the US (https://www.greencarcongress.com /2019/12/20191203-autotalks.html)

Report: SK Innovation to invest \$1B to build second EV battery plant in China to supply Kia (https://www.greencarcongress.com /2019/12/20191202-sk.html)

Seedland launches pilot operation of China's first electric autonomous commuter vehicle: Hachi Auto (https://www.greencarcongress.com /2019/12/20191202-seedland.html)

GRI introduces eco-friendly solid rubber tires (https://www.greencarcongress.com /2019/11/20191130-gri.html)

<u>GlobalData: rising automotive</u> <u>electrification comes at a jobs cost</u> (<u>https://www.greencarcongress.com</u> /2019/11/20191129globaldata.html)

Categories (https://www.greencarcongr/ /archives.html) Previewinghtouwwww.commengtess.com/3d-printing/)

 48V (https://www.greencarcongress.com/48v/) Posted by (https://www.greencarcongress.com/5g/)

This 1s 8011 4 Attesi W. Wo green farent gress of the thousand posted.

- Additives (https://www.greencarcongress.com/additives/)
 - Africa (https://www.greencarcpggress.com/africa/)
 - AI (https://www.greencarcongress.com/ai/)
 - Algae (https://www.greencarcondigress.com/algae/)
- Algal Fuels (https://www.greencarcongress.com/algal_fuels/)

Your commente outproduce seen arrongrees.com/ammonia/) Your constine (https://www.grspercaresnaresnaresnore/arater/h) The refters Arta (https://www.perrepret/cnosicofnatin/frightable. Please try again. ATJ (https://www.greencarcongress.com/atj/)

 Australia (https://www.greencarcongress.com/australia/) As a final step perfore nosting your comment enter the letters and numbers you see in the image below https://www.greencarcongress.com/autonomousposting comments.

Having Aviation (Hand WWW in age avenue at constant of the station /)

- B2U (https://www.greencarcongress.com/b2u/)
- Con描述(https://www.greencarcongress.com/b2v/)
- Batteries (https://www.greencarcongress.com/batteries/)
- Behavior (https://www.greencarcongress.com/behavior/)

Big Data (https://www.greencarcongress.com/big-data/)

Post au commente strugge encarcongress.com

POSL PAIR (NEPS/INVINGENCINC) (1000) (100

(https://www.greencarcongress.com/carbon-capture-and-conversionccc/)

- Carbon Capture and Storage (CCS) (https://www.greencarcongress.com /carbon_capture_and_storage_ccs/)
- Catalysts (https://www.greencarcongress.com/catalysts/)
- · Cellulosic ethanol (https://www.greencarcongress.com /cellulosic ethanol/)
- China (https://www.greencarcongress.com/china/)
- Cities (https://www.greencarcongress.com/cities/)
- City car (https://www.greencarcongress.com/city_car/)
- Climate Change (https://www.greencarcongress.com /climate change/)
- Climate Change Adaptation (https://www.greencarcongress.com

Kalmar to collaborate with Bosch Rexroth to develop fully electric versions of its reachstacker and heavy forklift solutions (https://www.greencarcongress.com /2019/11/20191128-kalmar.html)

Low-friction aluminum crankcase for diesels (https://www.greencarcongress.com /2019/11/20191127-alutech.html)

/climate_change_adaptation/)

- Climate models (https://www.greencarcongress.com/climate_models/)
- Co-Optima (https://www.greencarcongress.com/co-optima/)
- Coal (https://www.greencarcongress.com/coal/)
- Coal-to-Liquids (CTL) (https://www.greencarcongress.com /coaltoliquids ctl/)
- Compressed Air Engines (https://www.greencarcongress.com /compressed air engines/)
- Concept Engines (https://www.greencarcongress.com /concept engines/)
- Conferences and other events (https://www.greencarcongress.com /conferences_and_other_events/)
- Connected vehicles (https://www.greencarcongress.com /connected vehicles/)
- Controls and controllers (https://www.greencarcongress.com/controlsand-controllers/)
- Conversions (https://www.greencarcongress.com/conversions/)
- CV2X (https://www.greencarcongress.com/cv2x/)
- D-I-Y (https://www.greencarcongress.com/diy/)
- Deepwater (https://www.greencarcongress.com/deepwater/)
- Diesel (https://www.greencarcongress.com/diesel/)
- DME (https://www.greencarcongress.com/dme/)
- DMF (https://www.greencarcongress.com/dmf/)
- Driver Assistance Systems (https://www.greencarcongress.com/driverassistance-systems/)
- Electric (Battery) (https://www.greencarcongress.com /electric_battery/)
- Emissions (https://www.greencarcongress.com/emissions/)
- Engines (https://www.greencarcongress.com/engines/)
- Environmental Justice (https://www.greencarcongress.com /environmental-justice/)
- Enzymes (https://www.greencarcongress.com/enzymes/)
- Ethanol (https://www.greencarcongress.com/ethanol/)
- Europe (https://www.greencarcongress.com/europe/)
- Exascale computing (https://www.greencarcongress.com/exascalecomputing/)
- Fleets (https://www.greencarcongress.com/fleets/)
- Forecasts (https://www.greencarcongress.com/forecasts/)
- Friction (https://www.greencarcongress.com/friction/)
- Fuel Cells (https://www.greencarcongress.com/fuel_cells/)
- Fuel Efficiency (https://www.greencarcongress.com/fuel_efficiency/)
- Fuels (https://www.greencarcongress.com/fuels/)
- Gas-to-Liquids (GTL) (https://www.greencarcongress.com /gastoliquids_gtl/)
- Gasification (https://www.greencarcongress.com/gasification/)
- Geoengineering (https://www.greencarcongress.com/geoengineering/)
- Geothermal (https://www.greencarcongress.com/geothermal/)
- Graphene (https://www.greencarcongress.com/graphene/)
- Green Chemistry (https://www.greencarcongress.com/greenchemistry/)
- Health (https://www.greencarcongress.com/health/)
- Heavy-duty (https://www.greencarcongress.com/heavyduty/)
- High Octane Fuels (https://www.greencarcongress.com/high-octanefuels/)
- High Performance Computing (https://www.greencarcongress.com /high-performance-computing/)
- HMI (https://www.greencarcongress.com/hmi/)
- Hybrids (https://www.greencarcongress.com/hybrids/)

- Hydraulic Hybrid (https://www.greencarcongress.com /hydraulic_hybrid/)
- Hydrogen (https://www.greencarcongress.com/h2/)
- Hydrogen Production (https://www.greencarcongress.com /hydrogen_production/)
- Hydrogen Storage (https://www.greencarcongress.com /hydrogen_storage/)
- India (https://www.greencarcongress.com/india/)
- Industry 4.0 (https://www.greencarcongress.com/industry-40/)
- Infrastructure (https://www.greencarcongress.com/infrastructure/)
- Intelligent Transportation Systems (ITS) (https://www.greencarcongress.com /intelligent_transportation_systems_its/)
- Internet of Things (https://www.greencarcongress.com/internet-ofthings/)
- Japan (https://www.greencarcongress.com/japan/)
- Land use (https://www.greencarcongress.com/land-use/)
- Latin America (https://www.greencarcongress.com/latin_america/)
- LCFS (https://www.greencarcongress.com/lcfs/)
- LFG (https://www.greencarcongress.com/lfg/)
- Li-O2 (https://www.greencarcongress.com/li-o2/)
- Li-Sulfur (https://www.greencarcongress.com/li-sulfur/)
- Lifecycle analysis (https://www.greencarcongress.com /lifecycle_analysis/)
- Lighting (https://www.greencarcongress.com/lighting/)
- LNG (https://www.greencarcongress.com/lng/)
- Low Temperature Combustion (https://www.greencarcongress.com /low-temperature-combustion/)
- LPG (https://www.greencarcongress.com/lpg/)
- LSV/NEV (https://www.greencarcongress.com/lsvnev/)
- Lubricating Oils (https://www.greencarcongress.com/lubricating_oils/)
- Manufacturing (https://www.greencarcongress.com/manufacturing/)
- Mapping (https://www.greencarcongress.com/mapping/)
- Market Background (https://www.greencarcongress.com /market_background/)
- Materials (https://www.greencarcongress.com/materials/)
- Methanol (https://www.greencarcongress.com/methanol/)
- Micro-mobility (https://www.greencarcongress.com/micro-mobility/)
- Micromobility (https://www.greencarcongress.com/micromobility/)
- Microprocessors and controls (https://www.greencarcongress.com /microprocessors-and-controls/)
- Middle East (https://www.greencarcongress.com/middle_east/)
- Mobility (https://www.greencarcongress.com/mobility/)
- Mobility services (https://www.greencarcongress.com/mobilityservices/)
- Motors (https://www.greencarcongress.com/motors/)
- Motorsport (https://www.greencarcongress.com/motorsport/)
- Nanotech (https://www.greencarcongress.com/nanotech/)
- Natural Gas (https://www.greencarcongress.com/natural_gas/)
- Nuclear (https://www.greencarcongress.com/nuclear/)
- Ocean acidification (https://www.greencarcongress.com /ocean_acidification/)
- Off-road (https://www.greencarcongress.com/offroad/)
- Oil (https://www.greencarcongress.com/oil/)
- Oil sands (https://www.greencarcongress.com/oil_sands/)
- Oil Shale (https://www.greencarcongress.com/oil_shale/)
- Open Source (https://www.greencarcongress.com/open-source/)
- Opinion (https://www.greencarcongress.com/opinion/)

- Optima (https://www.greencarcongress.com/optima/)
- Other Asia (https://www.greencarcongress.com/other_asia/)
- Other Powertrains (https://www.greencarcongress.com /other_powertrains/)
- Personal Transit (https://www.greencarcongress.com /personal_transit/)
- Personalities (https://www.greencarcongress.com/personalities/)
- Perspective (https://www.greencarcongress.com/perspective/)
- Plastics (https://www.greencarcongress.com/plastics/)
- Plug-ins (https://www.greencarcongress.com/plugins/)
- Polar (https://www.greencarcongress.com/polar/)
- Policy (https://www.greencarcongress.com/policy/)
- Ports and Marine (https://www.greencarcongress.com /ports and marine/)
- Power Electronics (https://www.greencarcongress.com /power electronics/)
- Power Generation (https://www.greencarcongress.com /power_generation/)
- Power-to-Gas (https://www.greencarcongress.com/power-to-gas/)
- Power-to-Liquids (https://www.greencarcongress.com/power-toliquids/)
- Powertrain materials (https://www.greencarcongress.com/powertrainmaterials/)
- Quantum computing (https://www.greencarcongress.com/quantum-computing/)
- Racing (https://www.greencarcongress.com/racing/)
- Rail (https://www.greencarcongress.com/rail/)
- Recycling (https://www.greencarcongress.com/recycling/)
- Regulations (https://www.greencarcongress.com/regulations/)
- Research (https://www.greencarcongress.com/research/)
- Resilience (https://www.greencarcongress.com/climate-resilience/)
- Resources (https://www.greencarcongress.com/resources/)
- Ridesharing (https://www.greencarcongress.com/ridesharing/)
- Robotics (https://www.greencarcongress.com/robotics/)
- Russia (https://www.greencarcongress.com/russia/)
- Safety (https://www.greencarcongress.com/safety/)
- Sales (https://www.greencarcongress.com/sales/)
- Science (https://www.greencarcongress.com/science/)
- Security (https://www.greencarcongress.com/security/)
- Sensors (https://www.greencarcongress.com/sensors/)
- Simulation (https://www.greencarcongress.com/simulation/)
- Smart charging (https://www.greencarcongress.com/smart-charging/)
- Smart Grid (https://www.greencarcongress.com/smart-grid/)
- Solar (https://www.greencarcongress.com/solar/)
- · Solar fuels (https://www.greencarcongress.com/solar-fuels/)
- Solid-state (https://www.greencarcongress.com/solid-state/)
- SSVs (https://www.greencarcongress.com/ssvs/)
- Standards (https://www.greencarcongress.com/standards/)
- Surveys (https://www.greencarcongress.com/surveys/)
- Sustainability (https://www.greencarcongress.com/sustainability/)
- SVO (https://www.greencarcongress.com/svo/)
- Synthetic Biology (https://www.greencarcongress.com /synthetic_biology/)
- TEF (https://www.greencarcongress.com/tef/)
- Telematics (https://www.greencarcongress.com/telematics/)
- Thermoelectrics (https://www.greencarcongress.com/thermoelectrics/)
- Tires (https://www.greencarcongress.com/tires/)
- Transmissions (https://www.greencarcongress.com/transmissions/)

- Trials (https://www.greencarcongress.com/trials/)
- Gudeen Okir Olobijitys(http://www.gr.careatxonyrase.xorratesarcan/) © 2004-2019 BioAge Group, LLC. All mobility/) Rights Reserved.
- O Urban mobility (https://www.greencarcongress.com/urban-mobility/)
- TepV2X (https://www.greencarcongress.com/v2g/)
- Vehicle Dynamics (https://www.greencarcongress.com/vehicledynamics/)
- Vehicle Manufacturers (https://www.greencarcongress.com /vehicle_manufacturers/)
- Vehicle Systems (https://www.greencarcongress.com /vehicle_systems/)
- Waste Heat Recovery (https://www.greencarcongress.com /waste heat recovery/)
- Water (https://www.greencarcongress.com/water/)
- Wave and Tidal (https://www.greencarcongress.com/tidal/)
- Weight reduction (https://www.greencarcongress.com/weightreduction/)
- Wind (https://www.greencarcongress.com/wind/)
- Wireless (https://www.greencarcongress.com/wireless/)