

CARBON CAPTURE AND SEQUESTRATION LEGISLATION IN THE UNITED STATES OF AMERICA



Condensed Version

March 2010

6325 Amherst Court ★ Norcross ★ Georgia ★ 30092 ★ Tel (770) 242-7712 ★ Fax (770) 242-9956 ★ www.sseb.org

ALABAMA ARKANSAS FLORIDA GEORGIA KENTUCKY LOUISIANA MARYLAND MISSISSIPPI MISSOURI NORTH CAROLINA
OKLAHOMA PUERTO RICO SOUTH CAROLINA TENNESSEE TEXAS U.S. VIRGIN ISLANDS VIRGINIA WEST VIRGINIA

SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America

About the Southern States Energy Board

The **Southern States Energy Board** is an interstate compact, comprised of governors and state legislators from sixteen southern states, Puerto Rico and the U.S. Virgin Islands, as well as a presidential appointee. The Board's mission is to promote economic development and enhance the quality of life in the South, through innovations in energy and environmental programs, policies and technologies.

Our Mission

Through innovations in energy and environmental policies, programs, and technologies, the Southern States Energy Board enhances economic development and the quality of life in the South.

SOUTHERN STATES ENERGY BOARD

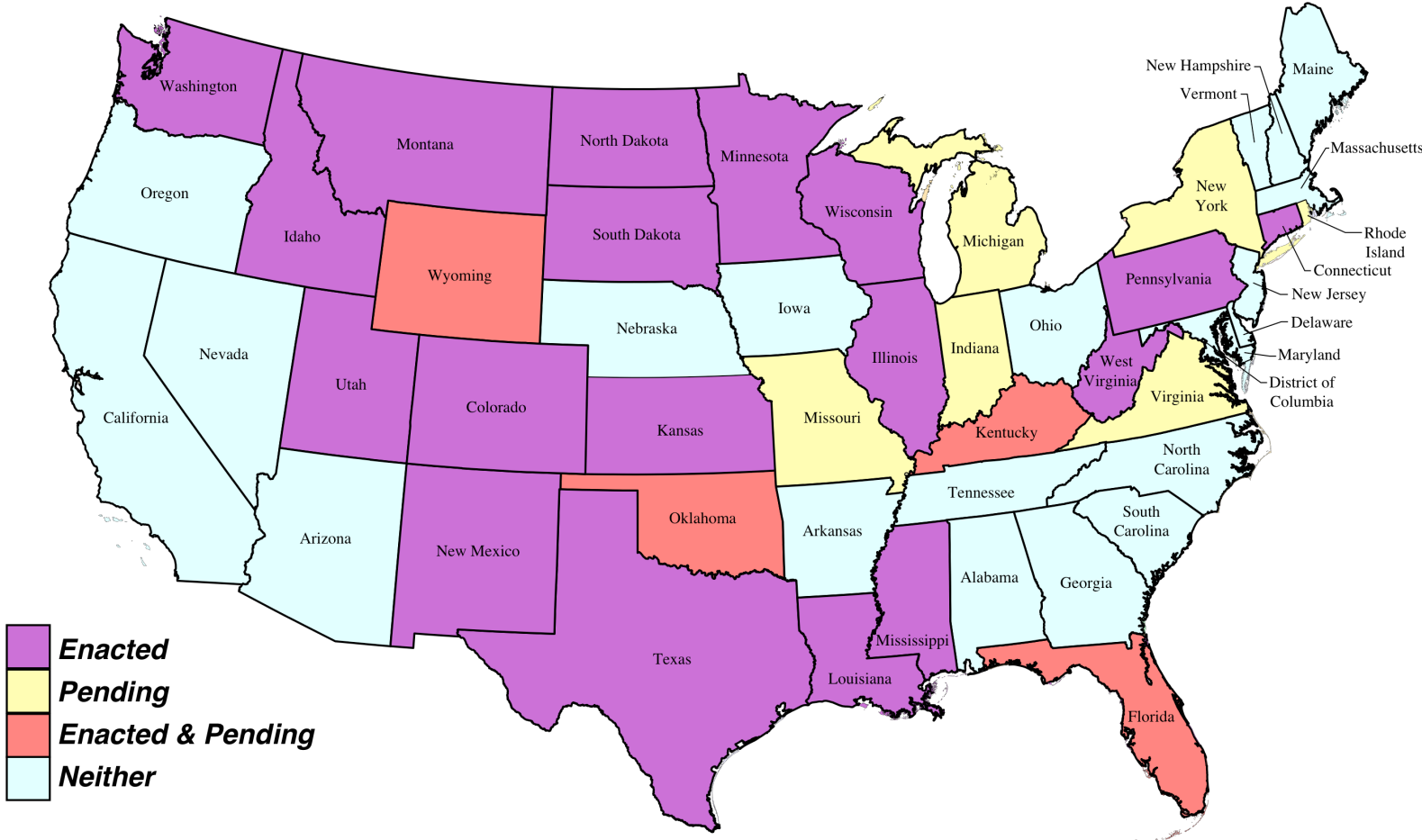
6325 Amherst Court
Norcross, GA 30092
Tel: (770) 242-7712
Fax: (770) 242-0421

www.sseb.org

For more information about the contents of this document, please contact Patrick McShane at mcsbane@sseb.org.



SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America



***Carbon Capture and Sequestration Legislation
In the United States of America***

Introduction

At the time of publication, there were 22 states with Carbon Capture and Storage (CCS) related legislation (CO, CT, FL, ID, IL, KS, KY, LA, MN, MS, MT, ND, NM, OK, PA, SD, TX, UT, WA, WI, WV, WY) and 10 states had CCS Bills Pending in 2010 (FL, IN, KY, MI, MO, NY, OK, RI, VA, WY). While coal power is associated mainly with the Midwest and Appalachian regions, the states with CCS legislation represent a comprehensive cross section of the country.

States differ on their approach to enforcing these bills. Some states, such as Texas, are pushing full steam ahead, yet others, like Montana, are awaiting an EPA final rule. Some tackle the statute first and regulations second (Wyoming, North Dakota), while others are working to create legislative recommendations (Utah, Illinois, West Virginia). Kansas, among others, has concluded that existing legislative authority is sufficient and is able to move directly to promulgation of final regulations.

This study on state CCS legislation does not include every element addressed by these bills. Instead, it is intended to give an overview of four key areas identified as necessary elements of a broader comprehensive regulatory framework governing CCS activities. The key areas are Project Authority, Pore Space and Carbon Dioxide (CO₂) Ownership, Liability and Financing Sources.

Project Authority: This area addresses which state regulatory agency (SRA) will be charged with developing and administering rules and regulations governing CCS projects. The agency must have the authority to require compulsory joining of all participating interests in the underground storage reservoir and have appropriate permitting authority to require and operator to submit any data necessary to evaluate a proposed CO₂ storage project. Examples of such SRAs are state oil and gas regulatory agencies, state environmental agencies or state public utility commissions.

Pore Space and CO₂ Ownership: This area addresses who has the property rights to inject CO₂ into wells and who owns the CO₂ in case of unintended trespass. The right to use reservoirs and associated pore space is considered a private property right in the United States and must be acquired from the owner of those rights. To determine this, states are most likely to follow their traditional common law approach in determining these rights and, in most cases, pore space is deemed to be owned by the surface estate. CO₂, on the other hand, is treated like any other commodity and, in general, is owned by the injector.

Liability: This area addresses what party is liable for the injected CO₂ both during the injection, the closure and the long-term, post closure phase. What party is liable depends, therefore, on the phase of the project. The injection phase is the period of time during active injection. The closure period is the time when the plugging of the well is completed and continues until a future date is reached, usually 10 years after injection activities and the wells are plugged. During these phases, the operator is the liable party. The post closure phase is the period of time beginning when the project is deemed complete, usually marked by the issuance of a Certificate of Completion, and extends for the life of the well. During this phase, liability transfer to the state for monitoring, verification and remediation activities. The injector is then usually released from all liability.

Financing Sources: This area addresses both the costs of the CO₂ injection projects themselves and the long-term costs. For the costs associated with the injection project, many states will give tax incentives in the form of sales tax, income tax or property tax exemptions for qualifying endeavors. Many states have established some type of CCS trust fund to pay for the expense of long-term monitoring, verification and remediation. These trusts tend to be state administered and industry funded on a cost per ton basis.



SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America

<u>State</u>	<u>Bill (year)</u>	<u>Project Authority</u>	<u>Pore Space/CO2 Ownership</u>	<u>Liability</u>	<u>Financing Source</u>
CO	HB 06-1281 (2006)				Incentives for IGCC plants
FL	HB 549 (2007)				Incentives for IGCC plants
IL	P.A. 92-0012 (2002) P.A. 93-0167 (2004) P.A. 94-65 (2005) P.A. 94-1030 (2006) P.A. 95-18 (2007)				Incentives for IGCC plants
IL	SB 1987 (2009)				Illinois power agency may fund or operate sequestration facility.
IL	SB 1592 (2007)				Incentives for advanced coal plants in locations where geology is suitable for sequestration.
IN	SB 21 (pending)	Department of Natural Resources			
IN	P.L. 105-1989 (1989) P.L. 159-2002 (2002) P.L. 174-2005 (2005) P.L. 191-2005 (2005) P.L. 175-2007 (2007)				Incentives for clean coal technology



SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America

<u>State</u>	<u>Bill (year)</u>	<u>Project Authority</u>	<u>Pore Space/CO₂ Ownership</u>	<u>Liability</u>	<u>Financing Source</u>
KS	HB 2419 (2007)	State Corporation Commission			Property and income tax incentives for CCS
KS	SB 303 (2006)				Incentives for IGCC
KY	HB 1 (2007)				Tax incentives for advanced coal plants
LA	HB 661 (2009)	Office of Conservation	CO ₂ ownership matter of private contract.	Operator is liable during operation; state assumes ownership 10 years after injection is complete; operators and others with interest are released from future liability.	
LA	HB 1117 (2008)	State Mineral Board	CO ₂ owned by operator.		
LA	HB 1220 (2008)			State Mineral Board may operate and assume responsibility for facilities.	
MI	Draft Bill	Department of Environmental Quality	Pore space owned by surface owner.	Operator is liable during operation; state assumes liability upon issuance of Certificate of Completion.	Carbon Dioxide Storage Facility Trust Fund
MI	SB 775 (pending)	Department of Environmental Quality	CO ₂ ownership begins with operator and transfers to state 10 years after Notice of Completion.	Operator is liable during operation; state assumes liability 10 years after Notice of Completion.	Carbon Dioxide Storage Facility Trust Fund
MN	SF 145 (2007)				Incentives for IGCC
MS	HB 1459 (2009)				Income tax of 1.5% on businesses that sell CO ₂ for EOR or sequestration



SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America

<u>State</u>	<u>Bill (year)</u>	<u>Project Authority</u>	<u>Pore Space/CO₂ Ownership</u>	<u>Liability</u>	<u>Financing Source</u>
MT	SB 498 (2009)	Board of Oil and Gas Conservatory with comments from Department of Environmental Quality	Pore space owned by surface owner. CO ₂ owned by operator.	Operator is liable during operation; state assumes long term liability.	
MT	HB 3 (2007)				Tax incentives for gasification plants that sequester CO ₂
ND	SB 2034 (2009)				Tax incentives for Enhanced Oil Recovery (EOR) with CO ₂
ND	SB 2095 (2009)	Industrial Commission	CO ₂ owned by operator.	Operator is liable during operation; state assumes long term liability.	
ND	SB 2139 (2009)		Pore space owned by surface owner; severance prohibited.		
ND	SB 2221 (2009)				Tax incentives for coal plants that capture CO ₂
NM	SB 994 (2007)				Incentives for energy facilities to capture and sequester CO ₂
NY	A05836 (pending)	NY Department of Environmental Conservation	Pore space owned by surface estate owner.	Operator is liable during operation; state assumes long term liability after 10 years.	
NY	A08802 (pending)	NY Department of Environmental Conservation	Pore space owned by surface owner. CO ₂ owned by operator.		
NY	Advanced Clan Coal Power Plant Initiative (2006)				Incentive program for advanced coal plants with sequestration



SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America

<u>State</u>	<u>Bill (year)</u>	<u>Project Authority</u>	<u>Pore Space/CO2 Ownership</u>	<u>Liability</u>	<u>Financing Source</u>
OK	SB 2024 (pending)	Corporation Commission			
OK	SB 610 (2009)	Corporation Commission for fossil fuel bearing formations; Department of Environmental Quality for all others	CO2 owned by operator.		
TX	HB 1796 (2009)	General Land Office and the Bureau of Economic Geology to build and operate a carbon dioxide repository on state-owned, offshore, submerged land	CO2 owned by state for offshore sequestration.	School Land Board is liable during operation for offshore sequestration.	
TX	HB 1387 (2009)	Railroad Commission has jurisdiction over the injection of CO2 into wells for production of oil or gas	CO2 owned by operator, unless otherwise agreed.		Anthropogenic Carbon Dioxide Storage Trust Fund
TX	HB 469 (2009)				Tax incentive for energy projects that capture and sequester CO2
TX	HB 3732 (2007)				Incentives for advanced energy projects, including advanced coal
VA	SB 247 (pending)	Department of Mines, Minerals and Energy	CO2 owned by operator, transfer to Commonwealth upon issuance of Certificate of Project Completeness.	Operator liable during operation, transfer to Commonwealth upon issuance of Certificate of Project Completeness.	Carbon Dioxide Storage Facility Trust Fund
VA	SB 1416/HB 3068 (2007)				Incentives for advanced coal plants



SOUTHERN STATES ENERGY BOARD
Carbon Capture and Sequestration Legislation
In the United States of America

<u>State</u>	<u>Bill (year)</u>	<u>Project Authority</u>	<u>Pore Space/CO2 Ownership</u>	<u>Liability</u>	<u>Financing Source</u>
WA	ESSB 6001 (2007)	Department of Ecology			
WV	HB 2860 (2009)	Department of Environmental Protection			
WY	HB 17 (pending)	Water Quality Division of the Department of Environmental Quality			
WY	HB 58 (2009)		CO2 owned by operator.	Operator liable during operation.	
WY	SB 1 (2008)				Funding for sequestration site evaluation and advancement of clean coal and carbon management activities
WY	HB 90 (2008)	Department of Environmental Quality			
WY	HB 89 (2008)		Pore space owned by surface owner, may be severed.		



Alabama

Arkansas

Florida

Georgia

Kentucky

Louisiana

Maryland

Mississippi

Missouri

North Carolina

North Carolina

Oklahoma

Puerto Rico

South Carolina

Tennessee

Texas

U.S. Virgin Islands

Virginia

West Virginia



SOUTHERN STATES ENERGY BOARD

6325 Amherst Court
 Norcross, GA 30092
 Tel: (770) 242-7712
 Fax: (770) 242-0421
 www.sseb.org

