

SENATE BILL No. 368

DIGEST OF INTRODUCED BILL

Citations Affected: Noncode.

Synopsis: Study of carbon sequestration. Urges the legislative council to assign to an appropriate interim study committee for the 2020 interim the task of studying carbon sequestration through forest preservation and carbon farming.

Effective: Upon passage.

Stoops

January 13, 2020, read first time and referred to Committee on Environmental Affairs.



Second Regular Session of the 121st General Assembly (2020)

PRINTING CODE. Amendments: Whenever an existing statute (or a section of the Indiana Constitution) is being amended, the text of the existing provision will appear in this style type, additions will appear in **this style type**, and deletions will appear in ~~this style type~~.

Additions: Whenever a new statutory provision is being enacted (or a new constitutional provision adopted), the text of the new provision will appear in **this style type**. Also, the word **NEW** will appear in that style type in the introductory clause of each SECTION that adds a new provision to the Indiana Code or the Indiana Constitution.

Conflict reconciliation: Text in a statute in *this style type* or ~~this style type~~ reconciles conflicts between statutes enacted by the 2019 Regular Session of the General Assembly.

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A BILL FOR AN ACT concerning environmental law.

Whereas, a report from the Indiana Climate Change Impacts Assessment, "Hoosiers' Health in a Changing Climate", indicates that climate change is affecting public health in Indiana by increasing heat stress and heat stroke, worsening air quality which exacerbates cardiovascular and respiratory diseases, increasing tick and mosquito borne diseases, lengthening Indiana's allergy season, and increasing injuries due to flooding;

Whereas, a report from the Indiana Climate Change Impacts Assessment, "Indiana's Agriculture in a Changing Climate", indicates that climate change is reducing corn and soybean yields; delaying planting due to wet spring seasons; shifting Indiana's suitability for certain crops; increasing risk of heat stress for livestock; decreasing plant protein content, which lowers the quality of forage for livestock; increasing needs for drainage, which can increase soil nutrient losses; and increasing weed and pest pressure on crops;

Whereas, soil can store carbon dioxide as organic matter, the Indiana Conservation Partnership states that increasing organic matter in soil improves soil health and productivity, and multiple Purdue University scientists are researching how to increase soil carbon, also known as carbon farming;



Whereas, Carbon capture is relevant to forest preservation because plants and trees absorb carbon dioxide by the process of photosynthesis, therefore capturing carbon dioxide from the atmosphere. When trees are removed from a forest, the forest's capacity to capture and store carbon dioxide diminishes as a consequence;

Whereas, Carbon farming is a tool that can be used to remove carbon from the atmosphere while improving the health of our farmlands, which increases the resilience of our farmlands and farming communities; and

Whereas, Indiana should recognize the scientific complexities of this issue and have the necessary tools to make informed policy decisions with the goal of reducing our carbon emissions: Therefore,

Be it enacted by the General Assembly of the State of Indiana:

1 SECTION 1. [EFFECTIVE UPON PASSAGE] (a) **As used in this**
2 **SECTION, "carbon farming" means the use of agricultural**
3 **practices that:**

4 **(1) increase the rate at which carbon dioxide is removed from**
5 **the atmosphere; and**

6 **(2) increase the storage of atmospheric carbon:**

7 **(A) in the soil as organic matter; and**

8 **(B) in plant material.**

9 **(b) "Carbon farming" includes the following practices, which**
10 **are identified in the greenhouse gas and carbon sequestration**
11 **ranking tool of the United States Department of Agriculture's**
12 **Natural Resources Conservation Service:**

13 **(1) Using anaerobic digesters to reduce methane emissions**
14 **and provide energy.**

15 **(2) Using trees and shrubs as an overstory to crops to increase**
16 **net carbon storage in woody biomass and soils and provide a**
17 **source of renewable fuel and feedstock.**

18 **(3) Planting trees and shrubs along with forage crops on**
19 **pasture land to increase biomass carbon stocks and enhance**
20 **soil carbon.**

21 **(4) Planting deep rooted perennial forage plants to sequester**
22 **carbon.**

23 **(5) Precisely managing the amount, source, timing, placement,**



- 1 and form of nutrient and soil amendments to ensure ample
2 nitrogen availability and avoid excess nitrogen application.
- 3 **(6) Employing diet and feed management strategies to**
4 **minimize enteric methane emissions from ruminants.**
- 5 **(c) As used in this SECTION, "carbon sequestration" means the**
6 **process of:**
- 7 **(1) capture, through photosynthesis; and**
8 **(2) long term storage;**
- 9 **of atmospheric carbon dioxide.**
- 10 **(d) "Carbon sequestration" includes:**
- 11 **(1) the taking up of atmospheric carbon in trees through**
12 **photosynthesis and the storage of the carbon in the trunk,**
13 **branches, foliage, and roots of the trees; and**
- 14 **(2) the transfer of carbon fixed in plants into the soil as root**
15 **exudates and the storage of carbon in the soil as soil organic**
16 **matter.**
- 17 **(e) The legislative council is urged to assign to an appropriate**
18 **interim study committee for the 2020 interim the task of studying**
19 **carbon sequestration through forest preservation and carbon**
20 **farming in Indiana. An interim study committee assigned to study**
21 **this subject shall consider:**
- 22 **(1) potential legislation promoting carbon sequestration**
23 **through forest preservation and carbon farming; and**
- 24 **(2) potential legislation under which major sources of carbon**
25 **dioxide emissions could offset their emissions by making**
26 **contributions to the President Benjamin Harrison**
27 **Conservation Trust Fund for use in expanding forests in**
28 **Indiana for carbon sequestration purposes.**
- 29 **(f) This SECTION expires January 1, 2021.**
30 **SECTION 2. An emergency is declared for this act.**

