

# HOUSE BILL REPORT

## HJM 4014

---

**As Reported by House Committee On:**  
Agriculture & Natural Resources

**Brief Description:** Supporting the continued research, development, production, and application of biochar from our forests and agricultural lands.

**Sponsors:** Representatives Shea, Fitzgibbon, Wilcox, Tharinger, Dent, Doglio, Buys, Fey, Manweller, Peterson, Maycumber, Ryu, Nealey, Pettigrew, Johnson, Springer, Haler, Lytton, Stokesbary, Smith, Gregerson, Muri, McBride, Kloba and Goodman.

**Brief History:**

**Committee Activity:**

Agriculture & Natural Resources: 1/25/18, 2/1/18 [DP].

**Brief Summary of Bill**

- Affirms the Legislature's support for biochar research, including research into the production of biochar and research into applications for biochar.

---

### HOUSE COMMITTEE ON AGRICULTURE & NATURAL RESOURCES

**Majority Report:** Do pass. Signed by 15 members: Representatives Blake, Chair; Chapman, Vice Chair; Buys, Ranking Minority Member; Dent, Assistant Ranking Minority Member; Chandler, Fitzgibbon, Kretz, Lytton, Orcutt, Pettigrew, Robinson, Schmick, Springer, Stanford and Walsh.

**Staff:** Robert Hatfield (786-7117).

**Background:**

Biochar is a fine-grained charcoal left behind after pyrolysis of crop residues, livestock manures, or other organic materials. Pyrolysis is the high temperature processing of organic materials in the absence of oxygen.

Biochar is used in multiple applications, including as a soil amendment and in sewage and wastewater treatment. Researchers have found that biochar applied to wet soils can decrease

---

*This analysis was prepared by non-partisan legislative staff for the use of legislative members in their deliberations. This analysis is not a part of the legislation nor does it constitute a statement of legislative intent.*

the production of methane and nitrous oxide. Other research has shown that biochar can be useful for restoring degraded soils because of its ability to bind heavy metals.

---

**Summary of Bill:**

The House Joint Memorial affirms the Legislature's support for the biochar research efforts of the United States Forest Service, the Agricultural Research Service of the United States Department of Agriculture, the Washington State University, the Department of Ecology, and other institutions. These research efforts include research to produce biochar from the removal of wildfire fuel loads, from waste agricultural products, and from other waste biomass destined for landfills or combustion.

The House Joint Memorial also affirms the Legislature's support for the research of biochar as an animal feed, remediation tool, landscaping material, and soil amendment for forest and agricultural lands.

---

**Appropriation:** None.

**Fiscal Note:** Not requested.

**Staff Summary of Public Testimony:**

(In support) This House Joint Memorial encourages the use of biochar. Charred, diseased trees can be turned into something useful, like soil amendments. There are already biochar companies in Washington. The use of biochar helps the environment, helps agriculture, and helps utilize diseased trees.

There are a lot of exciting aspects of biochar. It is basically just charcoal made from waste biomass that is then heated in a low-oxygen environment. Biochar produces high-value environmental services, including pollution remediation, animal feed, agricultural soil amendment, and carbon sequestration. One pound of biochar has 32 acres of surface area. Biochar creates a hotel for healthy soil microbes. Indigenous peoples of the Amazon were using biochar as a soil amendment 2,000 years ago. Biochar has a very long half-life, so that adding it today will produce benefits on a generational time scale. Biochar can also encourage rural economic development.

(Opposed) None.

**Persons Testifying:** Representative Shea, prime sponsor; and Greg Rock, Carbon Washington.

**Persons Signed In To Testify But Not Testifying:** None.