Existing Studies on Woody Biomass Utilization and Availability

Compiled by

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Background

This document’s primary purpose is to serve as a working list of existing literature that focuses on the utilization and on the availability of woody biomass. Hopefully, by maintaining a thorough list of woody biomass reports, the risk of duplicating an existing report will be minimized.

Minnesota Department of Natural Resources (MN DNR)

- Active and Proposed Wood Energy Facility Listings including information regarding annual volumes and specifications of biomass used. Updated Annually.
- Development of Procedures to Assess Brushland Resources for Woody Biomass Energy Markets. A pilot project was completed to assess shrubland density over a several county area using a combination of on-site biomass measurements and remote sensing techniques. Additionally, a simple technique for appraising Brushland biomass volumes for markets was developed for use by field resource managers. 2009.
- Linking Habitat Restoration to Bioenergy. An innovative new pilot project funded by the MN LCCMR that unites two separate but linked aspects of environmental health: habitat restoration and bioenergy. 2008.
- MN Forest Resources. An annual publication with information on Minnesota's forest resources and forest industry, and trends impacting them. 2009.
- MN Logged Area Residue Analysis. This report summarizes the results of data collected on woody logging residue remaining on harvested sites across Minnesota. Tables showing estimates of average harvest acreage by county, forest, and harvest type are also presented. 2007.
• Woody Biomass Availability Reports composed by the Minnesota DNR’s Utilization and Marketing Program. These reports examine biomass fuel availability from all ownerships within a specified procurement area. While these reports provide valuable information regarding fuel availability, they are not meant to substitute a full economic analysis for biomass utilization. Woody Biomass Availability Reports have been composed for the following areas:
  o Bemidji Fuel Supply Analysis. 50 mile procurement area. 2009.
  o Crookston County Fuel Supply Analysis. 50 mile procurement area. 2004.
  o Fairmont Fuel Supply Analysis. 50 mile procurement area. 2008.
  o Keewatin Fuel Supply Analysis. 100 mile procurement area. 2009.
  o Little Falls Fuel Supply Analysis. 50 mile procurement area. 2005.
  o Morrison County Fuel Supply Analysis. 75-150 mile procurement area. 2008.
  o Owatonna Fuel Supply Analysis. 50 mile procurement area. 2006.
  o Park Rapids Fuel Supply Analysis. 50 mile procurement area. 2007.
  o Remer and Mountain Iron Fuel Supply Analysis. 65 mile procurement area. 2009.
  o RockTenn (St. Paul) Fuel Supply Analysis. 50 mile procurement area. 2004.
  o 35 County Area around Sartell Fuel Supply Analysis. 2002.
  o William Fuel Supply Analysis. 60 mile procurement area. 2008.
  o Fond du Lac (Brookston) Fuel Supply Analysis. 100 mile procurement area. 2011.

Agriculture Utilization Research Institute (AURI)
• Aitkin County Biomass Utilization Report. 2009.
• AURI Biomass Pellet Plant Feasibility Guide. 2007.

The Blandin Foundation

Dovetail Partners
- Forest Biomass Heating and Electricity in Cook County, MN. 2011.

**Iron Range Resources (IRR)**

**Minnesota Forest Resources Council (MFRC)**

**Natural Resources Research Institute (NRRI)**
- Development of Procedures to Assess Brushland Resources for Woody Biomass Energy Markets. Brushlands have the potential to provide biomass for energy particularly in northern regions where these land types are common. A pilot project was completed to assess shrubland density over a several county area using a combination of on-site biomass measurements and remote sensing techniques. Additionally, a simple technique for appraising Brushland biomass volumes for markets was developed for use by field resource managers. 2009.

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