

Accepted Manuscript

Title: Hydrothermal Separation of Lignin from Bark of Japanese Cedar

Authors: Masaru Watanabe, Yukihiro Kanaguri, Richard L. Smith



PII: S0896-8446(17)30339-X
DOI: <http://dx.doi.org/10.1016/j.supflu.2017.09.009>
Reference: SUPFLU 4035

To appear in: *J. of Supercritical Fluids*

Received date: 11-5-2017
Revised date: 7-9-2017
Accepted date: 7-9-2017

Please cite this article as: Masaru Watanabe, Yukihiro Kanaguri, Richard L. Smith, Hydrothermal Separation of Lignin from Bark of Japanese Cedar, The Journal of Supercritical Fluids <http://dx.doi.org/10.1016/j.supflu.2017.09.009>

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.

*Revised manuscript for a special issue of The Journal of Supercritical Fluids,
entitled "Biomass fractionation in subcritical & supercritical water"*

Hydrothermal Separation of Lignin from Bark of Japanese Cedar

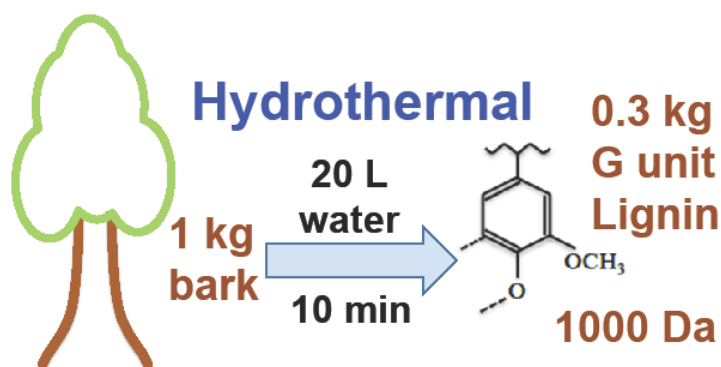
Masaru Watanabe ^{a,b,*}, Yukihiro Kanaguri^b, Richard L. Smith Jr.^{a,b}

^aResearch Center of Supercritical Fluid Technology, Graduate School of Engineering,

^bGraduate School of Environmental Studies, Tohoku University, Sendai, Japan

*E-mail: meijin@scf.che.tohoku.ac.jp, & Fax: +81-22-795-5864

Graphical abstract



Highlights

- ◆ Lignin yields of 65 wt% from Japanese cedar bark in 10 min treatment at 598 K
- ◆ Recovered lignin composed mainly of guaiacyl units with average 1000 Da

Download English Version:

<https://daneshyari.com/en/article/6670461>

Download Persian Version:

<https://daneshyari.com/article/6670461>

[Daneshyari.com](https://daneshyari.com)