

Application Note No. 062

Automated Analysis of the Preservative Compound HDO in Impregnated Wood by Direct Thermal Desorption-GC-MS Using the Focus-DTD Robotic Sampler

Sjaak de Koning, ATAS, Veldhoven, The Netherlands Peter Jüngel, Federal Research Centre for Forestry and Forest Products, Hamburg, Germany

- No Sample Preparation Required
- Automated Sampling of Solid Samples

Instrumentation

- Optic 2-200 programmable injector
- Focus Direct-TD automated thermal desorber
- Agilent 6890 GC and 5973N MSD
- HP5-MS capillary column; 25 m x 0.25 mm x 0.25 μm

Procedure

- · A series of wood splinters are loaded into Sepliners and the Sepliners placed into the auto sampler tray
- Each Sepliner is automatically picked from the tray and placed into the injector
- HDO preservative is desorbed thermally from the wood samples and analysed by GC-MS

Chromatograms

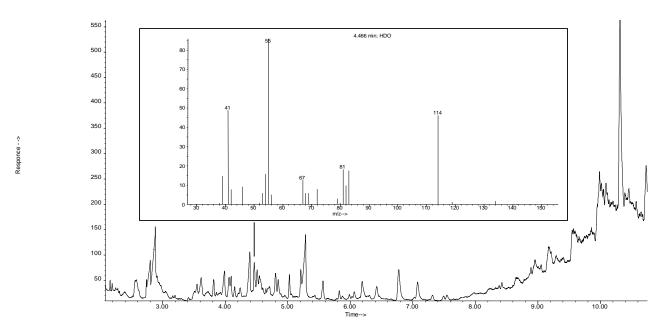


Figure: Full scan DTD-GC-MS chromatogram of 10 mg pine impregnated with 56 ppm HDO. Insert: mass spectrum of HDO peak

For more information please contact us at one of the addresses below.