Special Issue

Research and Application Progress of Wood Adhesives

Message from the Guest Editors

In recent years, a continuous growth can be observed in the frame of adhesives and resins for the woodworking industry. Investigations concerning environmentally friendly products have been carried out, and proecological adhesives have been used for gluing not only wood but also composites and modified wood. Adhesives or resins that are used for gluing have not always shown high thermoresistance and/or water resistance of glue lines, e.g., by gluing modified wood. The bonding characteristic of modified wood becomes a complex issue due to the large diversity of wood species, adhesives, and modification methods. The drying time of the binder increases a few times compared to unmodified wood. Sometimes, problems occur with gluability, and surface shoulds be activated using different methods or tools, e.g., plasma treatment or adhesion promoters. This Special Issue will serve as a forum for exchanging novel research ideas and application progress in the different groups of wood adhesives. Emphasis in this Special Issue is placed on the properties of adhesives, gluability of modified or activated wood and wood-based composites, and the strength and durability of glue lines.

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Message from the Editor-in-Chief

Materials (ISSN 1996-1944) was launched in 2008. The journal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites, advanced materials characterization, porous materials, manufacturing processes and systems, advanced nanomaterials and nanotechnology, smart materials, thin films and interfaces, catalytic materials, carbon materials, materials chemistry, materials physics, optics and photonics, corrosion, construction and building materials, materials simulation and design, electronic materials, advanced and functional ceramics and glasses, metals and alloys, soft matter, polymeric materials, quantum materials, mechanics of materials, green materials, general. *Materials* provides a unique opportunity to contribute high quality articles and to take advantage of its large readership.

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