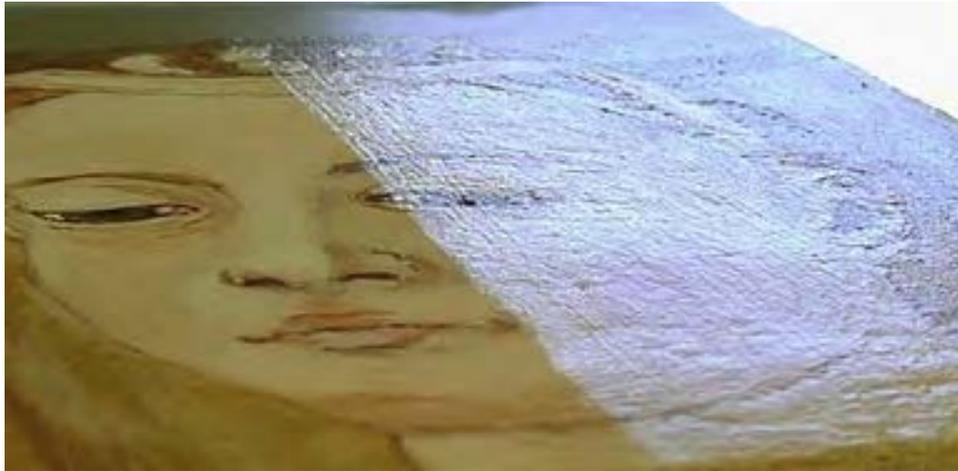


Conservation of Cultural Heritage: There is Plenty of Room for Nanoscience



Piero Baglioni,
Department of Chemistry and CSGI
University of Florence, Florence, Italy

"Conservation Science is still in its infancy. Nowadays most of the Conservation Science is related to diagnostic and only a few methods are available for the conservation and restoration of Cultural Heritage. We pioneered most of the innovative methodologies available for conservation using tools borrowed from Nanoscience. Micelles and microemulsions, nanoparticles, gels and responsive gels are used in a large number of applications. All these systems constitute a new platform for Conservation of Cultural Heritage and are characterized by scale lengths below 100 nm in one or more dimensions. With illustrative examples, we will report on the applications (and characterization by scattering techniques, mostly neutron scattering) of micelles, microemulsions, nanoparticles, gels with embedded microemulsions and magnetic nanoparticles in recent restoration workshops. Examples include the restored masterpieces of Beato Angelico, Taddeo Gaddi, Piero della Francesca, Santi di Tito, Maya wall paintings (Mexico), the deacidification of paper and wood from the Vasa warship (Stockholm), and the conservation from corrosion of organs pipes." – P. Baglioni

MCI

Topics in Museum Conservation

November 2, 2011
11:30 am
Wednesday

MCI Theater

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301-238-1240



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