



iron oxides in different mineral phases. The determination of these iron minerals that color the paintings, may not be the same crystalline phase.

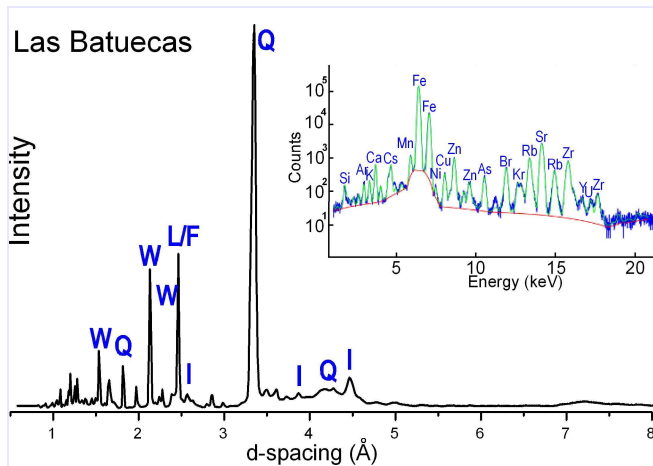


Fig. 2.- Diffractogram and fluorescence spectrum for Las Batuecas site, Salamanca.

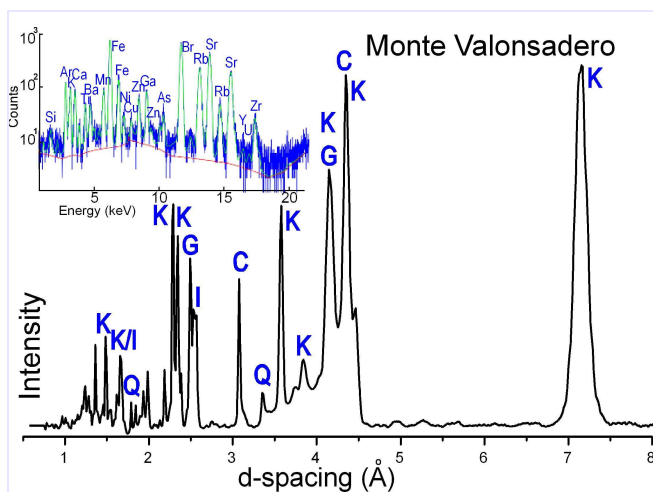


Fig. 3.- Diffractogram and fluorescence spectrum for Monte Valonsadero site, Soria.

The main silicate phases identified are quartz in the Hoces del Duratón site (Fig.1), with Illite/Muscovite in the Batuecas site (Fig.2); the same in Valonsadero site (Fig.3) with kaolinite as major mineral present. The silicate nature of the pigments gives an idea of the source, but a deeper study must be carried out to clarify this issue.

Regarding to iron oxides mineral phases, the identified phases are hematite and goethite in Segovia and Soria sites respectively, and lepidocrocite, ferrihydrite and wustite in Salamanca site.

Some mineral phases related to alteration processes and the influence of supporting rocks in paintings have been recognised: whewellite and gypsum in limestones substrate and monohydrocalcite in sandstone supporting rocks.

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