Title: Coprecipitation of Arsenate with Metal Oxides: Nature, Mineralogy and Reactivity of Aluminum Precipitates

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Table S1. Positions of the ν (As-O) bands in the IR spectra of Al-As coprecipitates formed at an initial As/Al (R) molar ratio of 0.1

Sample	pH	30 d	710 d
4R0.1	4.0	864 cm^{-1}	864 cm^{-1}
7R0.1	7.0	859 cm^{-1}	850 cm^{-1}
10R0.1	10.0	850 cm^{-1}	843 cm^{-1}

Figure S1

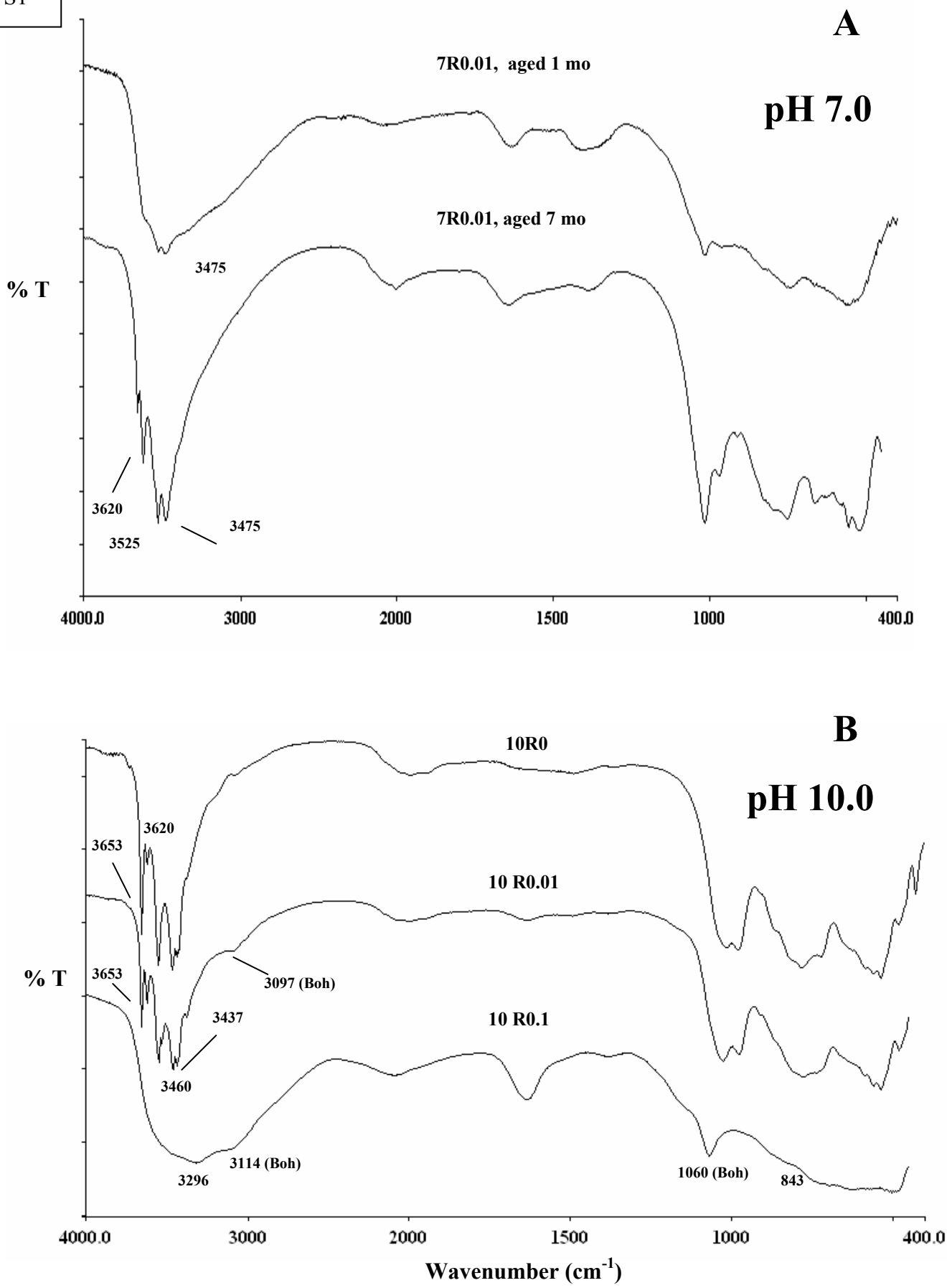

Figure S1. Infrared spectra of selected samples formed at pH 7.0 and 10.0 after 30 d or 210 d of aging at 50°C. (for sample symbols see Table 1).

Figure S2

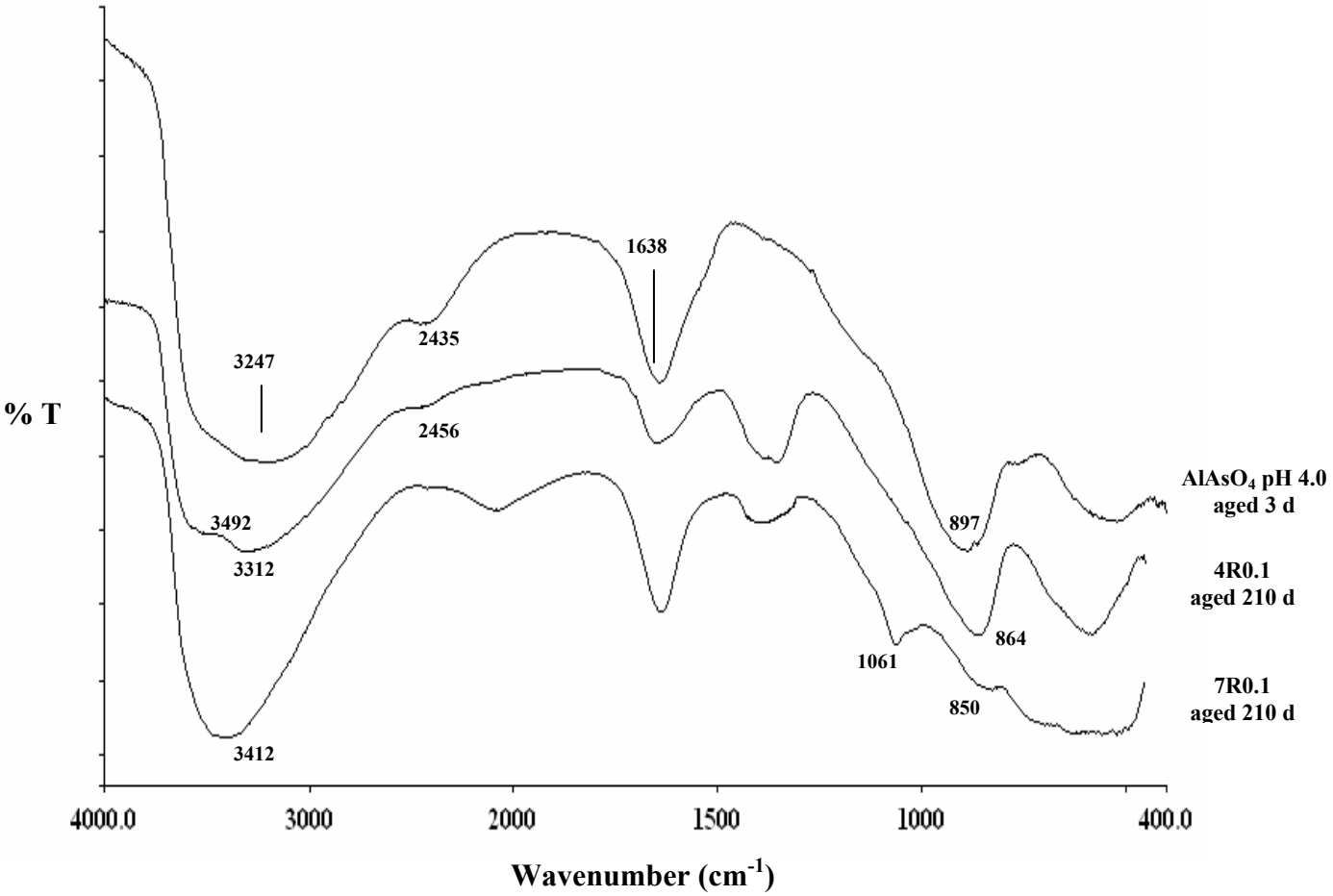

Figure S2. Infrared spectra of an aluminum arsenate precipitate formed at pH 4.0 and aged 3 d at 50°C and of the samples 4R0.1 and 7R0.1 aged 210 d at 50° C. The band at 1061 cm^{-1} (7R0.1) is characteristic of poorly crystalline boehmite.

Figure S3

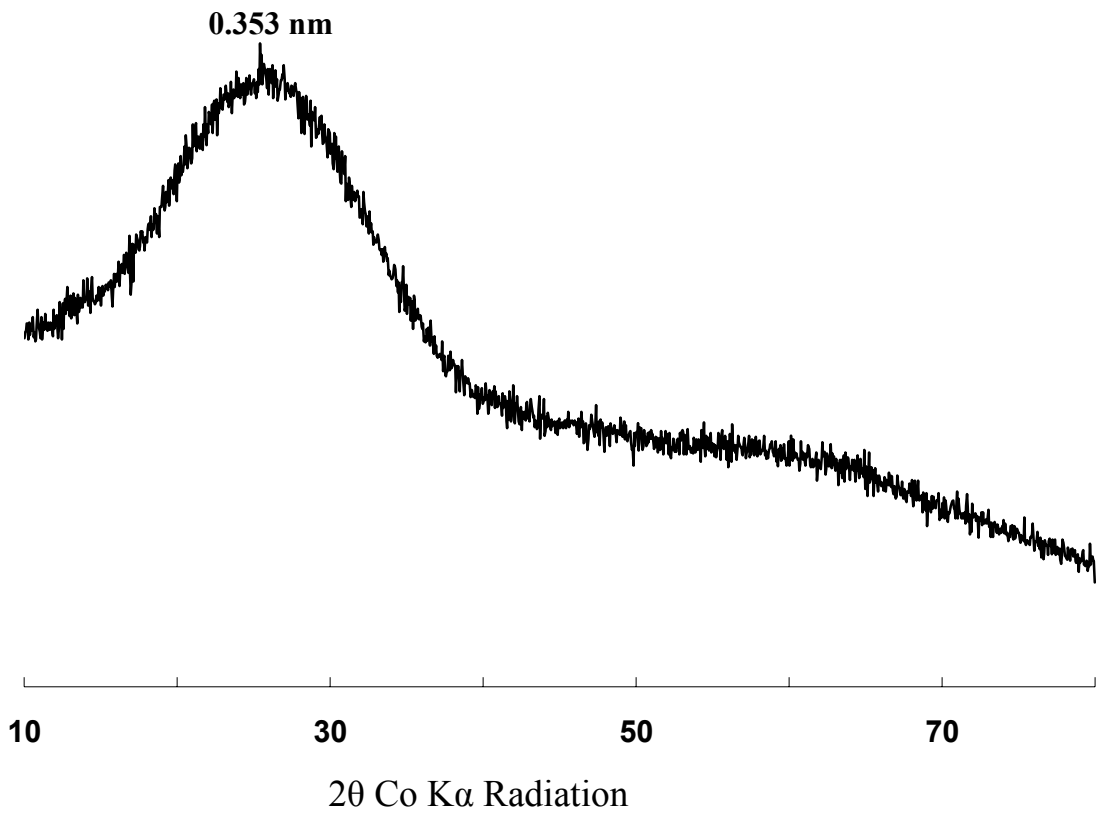

Figure S3. X-ray powder diffractogram of a randomly oriented aluminum arsenate precipitate formed at pH 4.0 and aged 3 d at 50° C.