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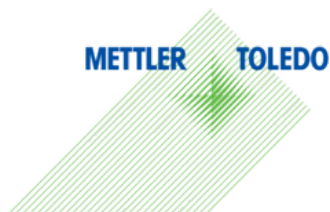
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P9: $K_{0.3}MoO_3$ thin films with micrometer sized grains

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In the last decade, we have produced several series of thin films of charge density wave (CDW) system $K_{0.3}MoO_3$ by pulsed laser deposition [1-4]. Films have granular structure with typically sub-micron grain size, resulting in somewhat suppressed CDW transition and electric conductivity governed by the variable range hopping mechanism. Recently, for the first time, we have obtained an order of magnitude longer (2-4 μm) and well patterned grains, as shown by AFM images in the Figure 1. Electrical conductivity and femtosecond pump-probe response in these films exhibit significant similarity with bulk samples, while the grain length is comparable to the CDW coherence length.

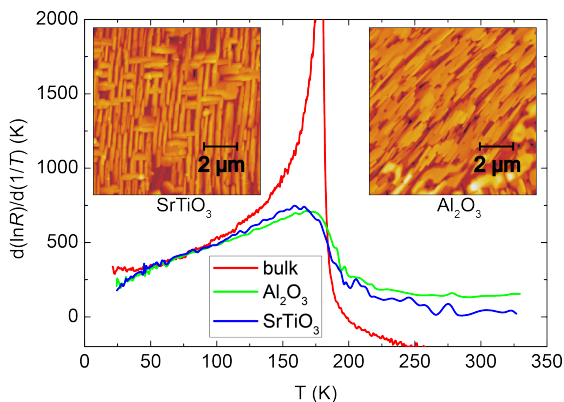


Figure 1 Logarithmic derivative of resistivity and AFM images of films from two substrates. Bulk logarithmic derivative is also shown for comparison.

[1] D. Dominko et. al., *J. Appl. Phys.* **110** (2011) 014907.

[2] D. Starešinić et al., *Physica B* **407** (2012) 1889.

[3] M. Đekić et al., *Vacuum* **98** (2013) 93.

[4] M. Đekić et al., *Thin Solid Films* **591** (2015) 210.