

Abstract Submitted
for the MAR08 Meeting of
The American Physical Society

Synthesis of Triangle Tungsten Oxide Nanosheets with Potassium Doped RONG HU, KUNQUAN HONG, HUASHENG WU — We report that large quantity of tungsten oxide nanosheets are synthesized by oxidizing tungsten plate directly. Using potassium hydrate as the catalyst and tungsten plate as the substrate, those triangle tungsten oxide nanosheets with thickness of 50-300 nm and wide up to tens of micrometers are obtained on a large scale. The angles of the triangle nanosheets are around 35° and 50° statistically. We discussed the potential reason of this peculiar phenomenon, besides the several characterizations results of the grown nanosheets. The probable growth mechanism is also investigated.

Rong Hu

Date submitted: 23 Nov 2007

Electronic form version 1.4