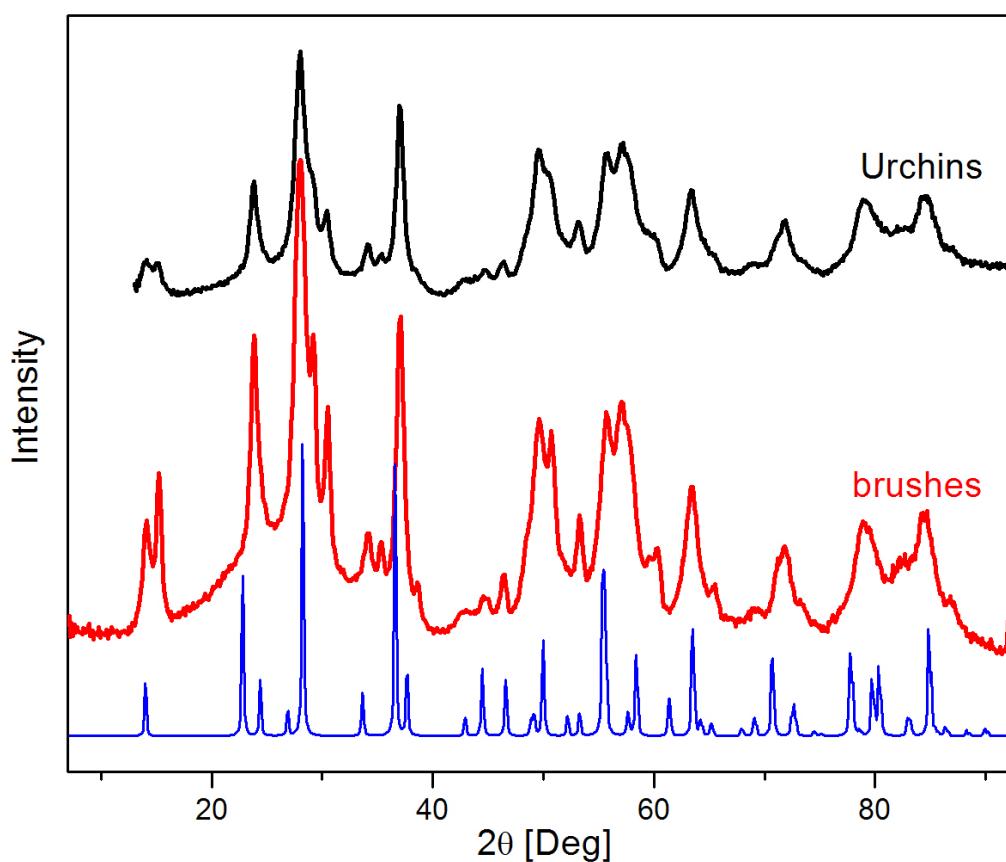


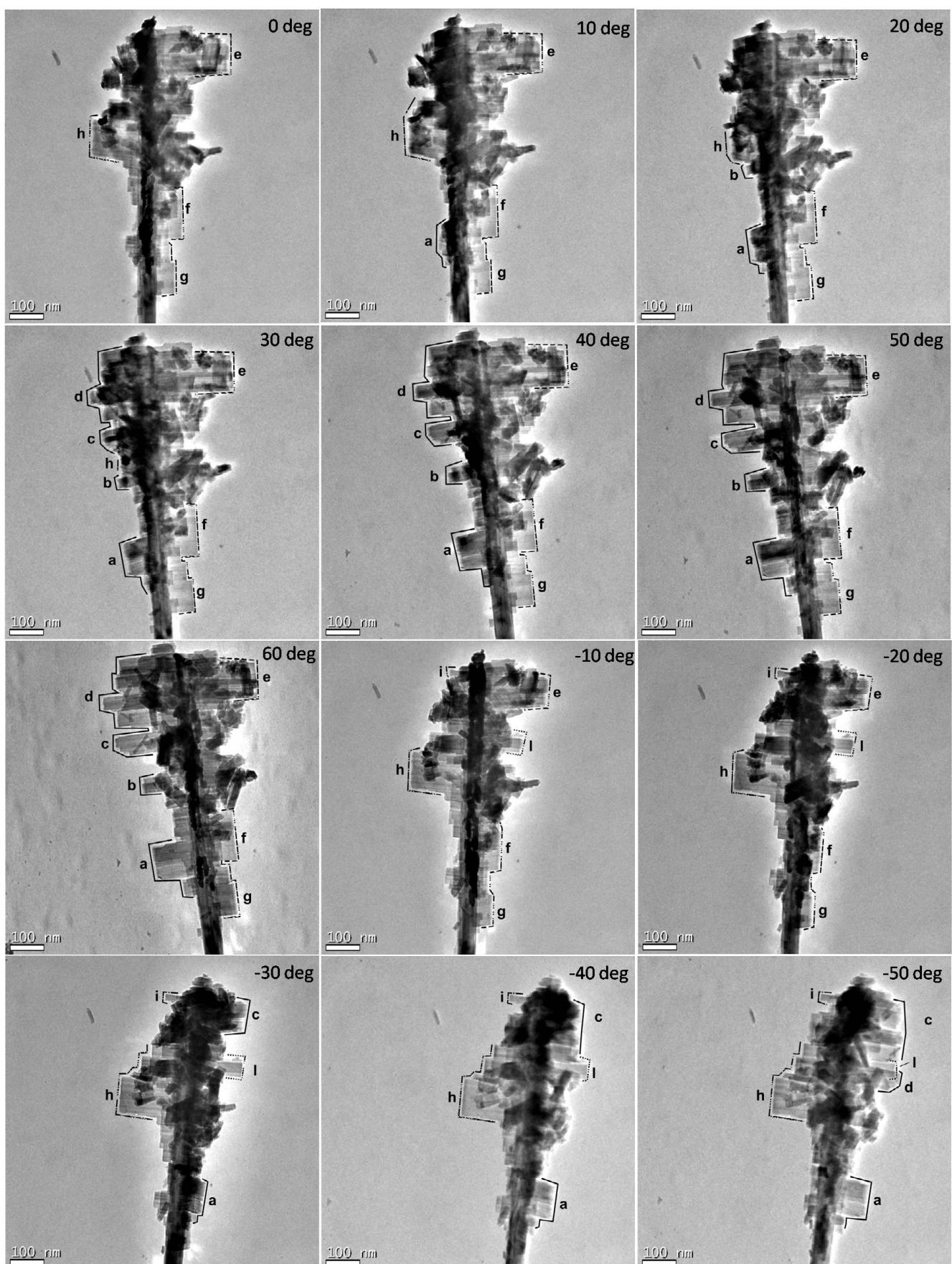
# Supporting Information

## Asymmetric Tungsten Oxide Nanobrushes via Oriented Attachment and Ostwald Ripening

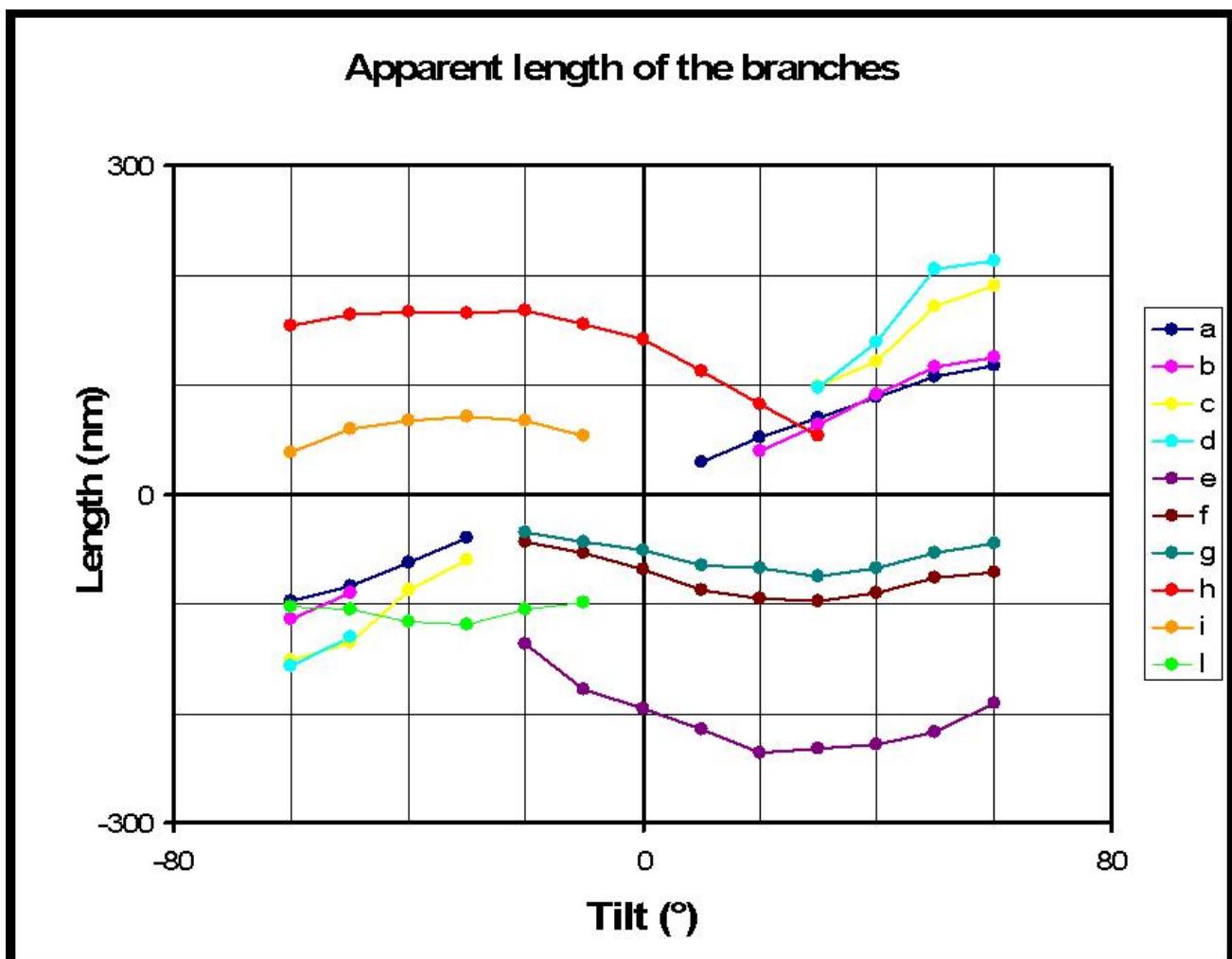
*Aswani Yella,<sup>a</sup> Ujjal K Gautam,<sup>b</sup> Enrico Mugnaioli,<sup>c</sup> Martin Panthöfer,<sup>a</sup> Yoshio Bando,<sup>b</sup> Dmitri Golberg,<sup>b</sup> Ute Kolb,<sup>c</sup> and Wolfgang Tremel<sup>a\*</sup>*



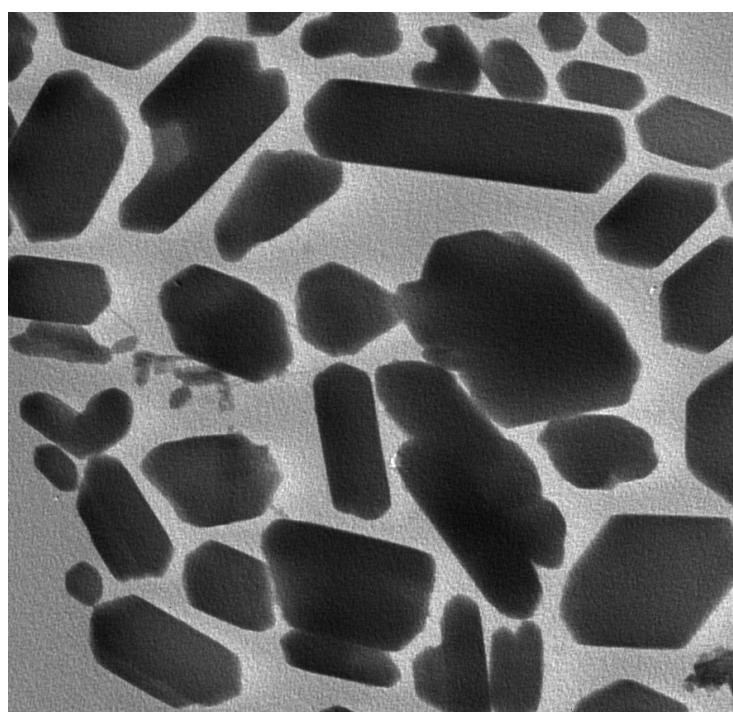
**Fig. S1.** X-Ray powder diffraction pattern (black/urchin,red/brushes) of the product obtained after the solvothermal treatment. The diffractograms show the reflections from  $\text{WO}_3$  (PDF No. 033-1387).



**Fig. S2.** Rotation of the tungsten oxide brushes clearly indicates that 3 main branches were formed at an angle of  $120^\circ$ . TEM images at different rotation angles written at the top right part of the image. The letters (a, b, c, d) represents the branches from first set, (e, f, g) represents the branches from thesecond set and (h, i) represents the branches from the third set.



**Fig. S3.** Graphical representation of the three different branches at  $120^{\circ}$  to each other. The first set (e, f, g) has a minimum at  $+30^{\circ}$  and the second set (h, i) has a maximum at  $-30^{\circ}$  and the third set (a, b, c, d) lies on to the back side.



**Fig. S4.** TEM image of the product obtained without the use of surfactants.