

Supporting information

Water-induced Spinodal Decomposition of Mixed Halide Perovskite captured by Real-Time Liquid TEM Imaging

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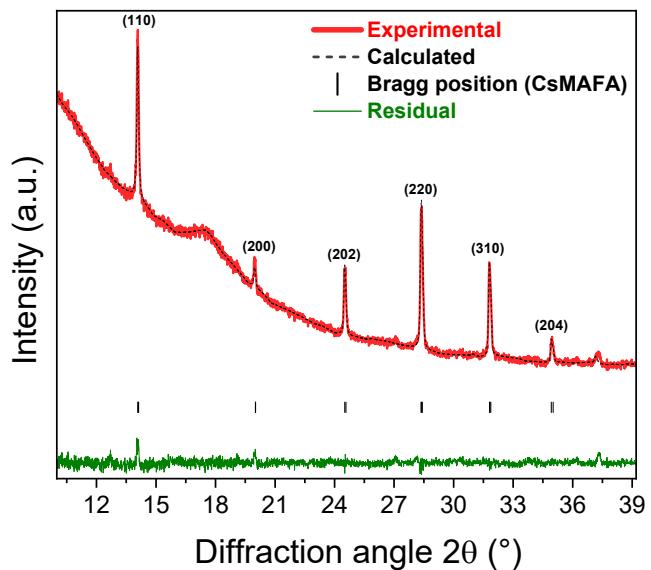


Figure S1 X-Ray diffraction pattern of CsMAFA film obtained following the procedure reported in the experimental part. Structural refinement of the lattice cell parameter by full pattern matching using Fullprof is reported including all Bragg reflections. The broad background contribution at ca. 17° and the diffraction peak at ca. 37° are corresponding to the substrate.

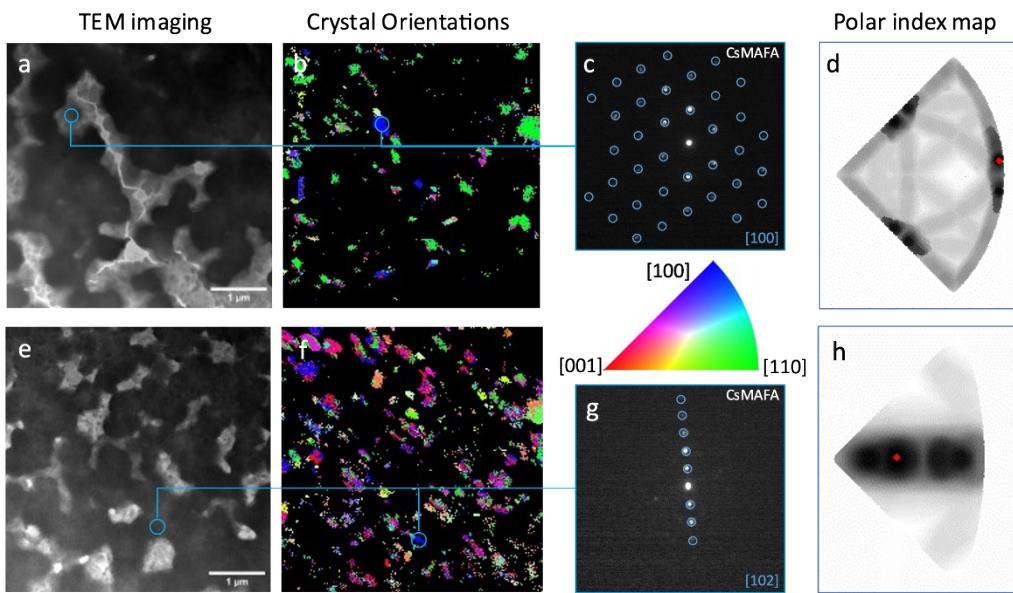


Figure S2 **(a,e)** TEM imaging and **(b,f)** 4D-STEM-ASTAR grain orientation maps of two different areas of pristine CsMAFA. Two diffraction patterns **(c,g)** captured from the 4D-STEM scans show the typical noise due to the thickness of the pristine sample. The triangle color code indicates the corresponding crystal directions. The darkest part of the polar index maps **(d,h)** shows the most probable crystalline orientations, and the red dot indicates the most probable one.