

Title (en)
METHOD FOR RELEASING A THIN-FILM SUBSTRATE

Title (de)
VERFAHREN ZUR ABLÖSUNG EINES DÜNNSCHICHTSUBSTRATS

Title (fr)
PROCÉDÉ DE FABRICATION D'UN SUBSTRAT À COUCHE MINCE

Publication
EP 2404317 A4 20140611 (EN)

Application
EP 10749454 A 20100308

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Abstract (en)
[origin: WO2010102306A1] The present disclosure relates to methods for selectively etching a porous semiconductor layer to separate a thin-film semiconductor substrate (TFSS) having planar or three-dimensional features from a corresponding semiconductor template. The method involves forming a conformal sacrificial porous semiconductor layer on a template. Next, a conformal thin film silicon substrate is formed on top of the porous silicon layer. The middle porous silicon layer is then selectively etched to separate the TFSS and semiconductor template. The disclosed advanced etching chemistries and etching methods achieve selective etching with minimal damage to the TFSS and template.

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Citation (search report)
• [X] US 2008157283 A1 20080703 - MOSLEHI MEHRDAD [US]
• [X] US 6331208 B1 20011218 - NISHIDA SHOJI [JP], et al
• [A] US 2008210294 A1 20080904 - MOSLEHI MEHRDAD [US]
• See references of WO 2010102306A1

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