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Sommario/riassunto	<p>Inspired by superhydrophobic leaves of water plants, a flexible superhydrophobic self-cleaning, transparent thin polymeric nanofur film was fabricated through highly scalable hot embossing and hot pulling techniques. Nanofur can retain an air film underwater, whose stability against external stimuli such as high pressure and movement through fluids is investigated. Additionally, the optical properties of nanofur are investigated and exploited to enhance the efficiency of optoelectronic devices.</p>