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标题: High-efficiency terahertz pulse generation via optical rectification by suppressing stimulated Raman scattering process
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摘要: We experimentally demonstrate high-efficiency terahertz pulse generation via optical rectification in LiNbO3. The spectral broadening of an excitation pulse via the stimulated Raman scattering process coincides with high-efficiency terahertz pulse generation, which enhances undesired stretching of the excitation pulse owing to the very high group velocity dispersion in LiNbO3. We avoid this by the bandwidth control of the excitation pulse and achieve the highest reported efficiency of 0.21% for energy conversion into a THz pulse. (C) 2012 Optical Society of America
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