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摘要: This paper investigates the feasibility of using terahertz pulsed imaging to detect breast cancer in a reflection imaging geometry. Spectroscopic terahertz data is used to simulate the reflected time domain response functions of healthy fibrous breast tissue and breast cancer tissue. Previously we have looked at the refractive index and absorption coefficient separately to characterize tissues. In this work we investigate their combined effects and identify parameters of the simulated reflected impulse response function and corresponding spectroscopic properties with a view to improving our ability to distinguish between the fibrous and cancer tissues in the breast.
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