ERRATA

Erratum: Microwave vortex dissipation of superconducting Nd-Ce-Cu-O epitaxial films in high magnetic fields [Phys. Rev. B 48, 9861 (1993)]

N.-C. Yeh, U. Kriplani, W. Jiang, D. S. Reed, D. M. Strayer, J. B. Barner, B. D. Hunt, M. C. Foote, R. P. Vasquez, A. Gupta, and A. Kussmaul

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In Fig. 1 and Fig. 2, the absolute values of the surface resistance R_s were incorrect due to an error in the scaling factor used to convert the measured dissipation into the surface resistance. This error was in the axis labels only, and was not in the plotted data. Thus, all the physics and analyses presented in the paper remain unchanged. The corrected values are shown below. There are also two typographic errors in the unnumbered equation above Eq. (8) and the sentence leading that equation. In both places, R_n should be corrected into $\mathcal{R}_n$. Therefore the sentence leading the equation should read ''..., J_0 is related to the *averaged areal* resistance *of the sample* ($\mathcal{R}_n$) and the BCS gap function $\Delta(T)$ by the expression'', and the equation following which should be

$$J_0=\frac{\Delta(T)}{2e\mathcal{R}_n}\tanh\left[\frac{\Delta(T)}{2k_BT}\right],\quad \mathcal{R}_n=\mathcal{R}\left[\frac{w}{a}\right]=\rho_n w,$$

where w denotes the width of the junction, and $(w/a)\approx 10^{-3}$.

For explicit justification of the use of Eq. (3), a few words should be added to the leading sentence: ''... the **J** and **E** for a sample of a thickness d and surface area $\mathcal{A}$, *placed under the evanescent field of a whispering gallery (WG) mode with an angular frequency* ω, are given by''. Also, a few additional words for clarity are inserted into the second line after Eq. (3): ''In Eq. (3), we assume a microwave field $\mathbf{h}=h_0e^{-i\omega t}\hat{\mathbf{x}}$ on the sample surface at $z=d$, *and* $\mathbf{h}=h_0e^{-i\omega t}e^{-(d-z)/\tilde{\lambda}}\hat{\mathbf{x}}$ *inside the sample. This assumption is an approximation for the asymmetric evanescent fields of the WG mode relative to the center of the sample and the complication of a sample supporting sapphire rod at* $z\leqslant 0$.''

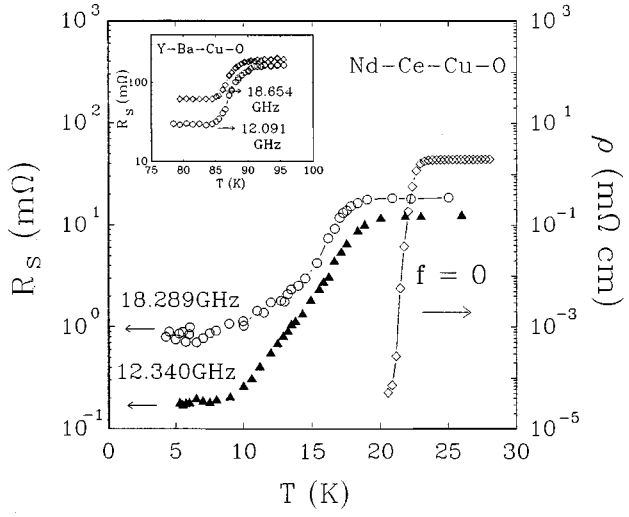

FIG. 1. Zero-field microwave surface resistance R_s for $f=12.340$ and 18.289 GHz, as well as the zero-field dc ($f=0$) resistivity (ρ) of a Nd-Ce-Cu-O epitaxial film are shown as a function of the temperature (T). The inset shows the zero-field R_s-vs-T data for a Y-Ba-Cu-O epitaxial film at $f=12.091$ and 18.654 GHz. Note that $R_s\propto f^{\alpha}$ and $\alpha\approx 2.0$ for both samples.

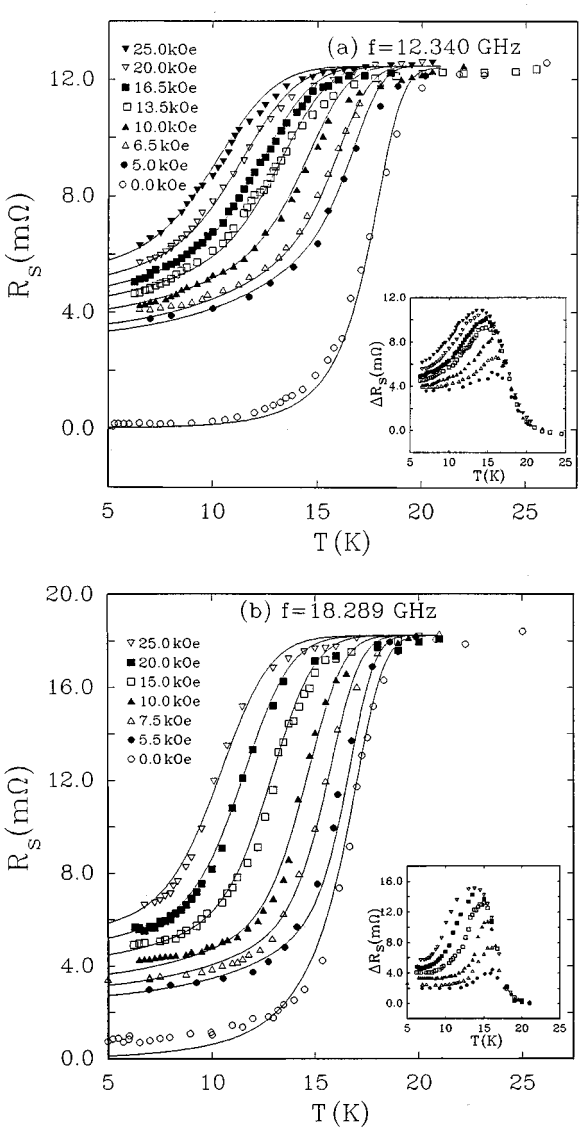

FIG. 2. Experimental surface resistance (R_s) and least-squares theoretical fitting curves [solid lines, obtained by using Eqs. (5) and (8)] are shown as a function of the temperature (T) and the magnetic field (B). (a) $f=12.340$ GHz. (b) $f=18.289$ GHz. The insets show the net vortex dissipation $\Delta R_s(T,B)=R_s(T,B)-R_s(T,0)$.

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