

Multimodal analysis of traction forces and the temperature dynamics of living cells with a diamond-embedded substrate: supplement

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MULTIMODAL ANALYSIS OF TRACTION FORCES AND TEMPERATURE DYNAMICS OF LIVING CELLS WITH DIAMOND-EMBEDDED SUBSTRATE: SUPPLEMENTAL DOCUMENT

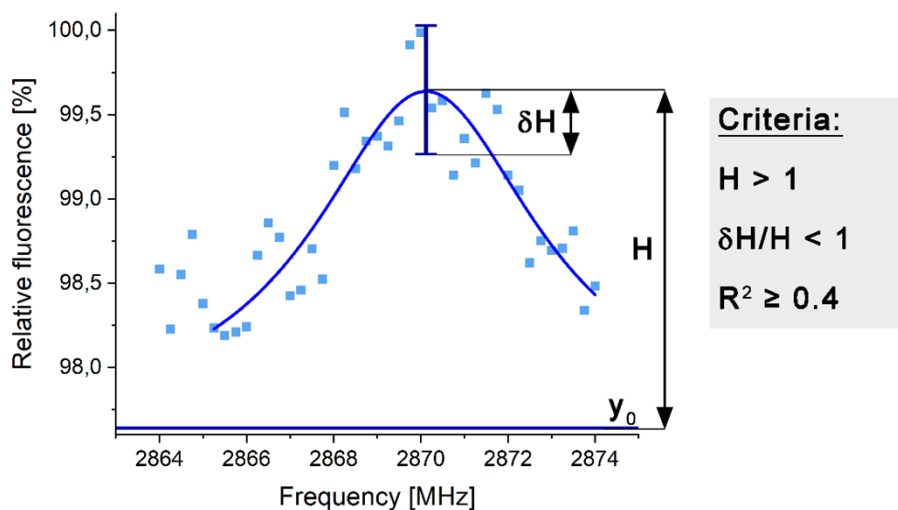


Fig. S1. Criteria for including the ODMR spectrum of a particular microdiamond. The height of the central dip (H) should be visible enough, i.e. show at least 1% of relative fluorescence. The uncertainty of height (δH) should not be higher than the height itself ($\delta H/H < 1$) and the fitted function should show a minimal agreement with data ($R^2 > 0.4$). These criteria allow for elucidating even the weakest ODMR signals present in the field of view.

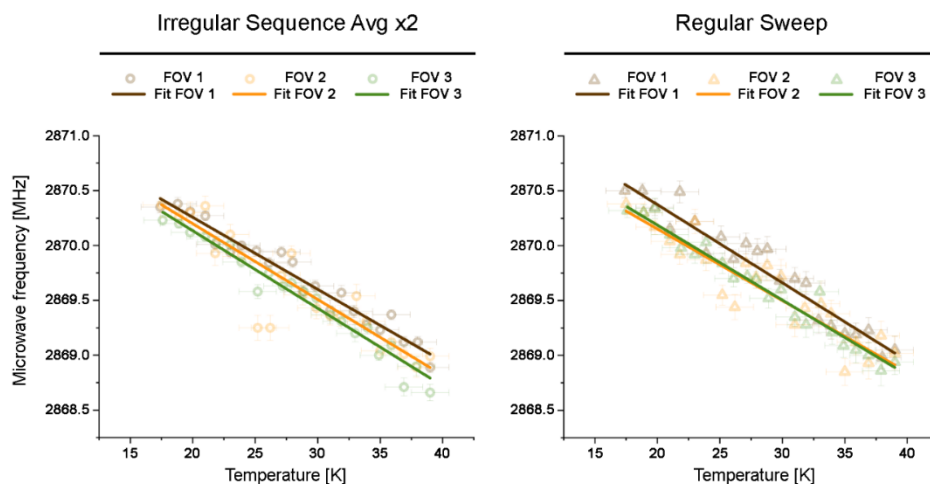


Fig. S2. Temperature calibration of the ODMR-TFM substrate. The left plot shows the three experimental series for an irregular sequence ($t = 2.5$ s), whereas the right plot shows the ODMR calibration for a regular sweep ($t = 5.1$ s).

Table S3. Slopes of linear functions fitted to the temperature calibration data in Fig. S2.

	Irregular seq. avg. $\times 2$		Regular sweep	
	Slope [kHz/K]	R ²	Slope [kHz/K]	R ²
Position 1	-65.6 ± 3.0	0.96040	-71.2 ± 3.8	0.94498
Position 2	-69.0 ± 5.3	0.89545	-65.2 ± 5.6	0.87062
Position 3	-70.7 ± 2.7	0.97225	-68.3 ± 3.2	0.95796
Averaged	-68.4 ± 3.6	---	-68.2 ± 4.2	---