

Optimum:

$$l_{\text{sensing}} \approx \max\{l_{\text{source}}, l_{\text{working}}\}$$

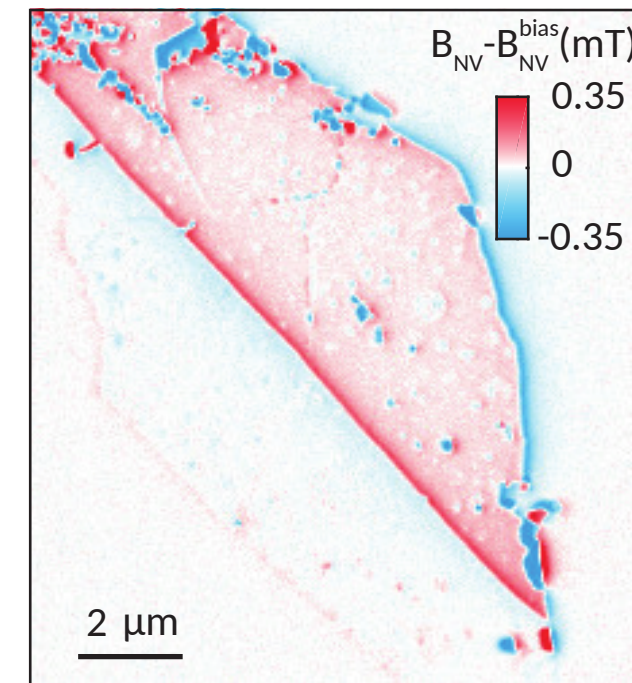
Magnetoencephalography



$$|\vec{B}| \sim 10 \text{ fT}$$

$$l \sim 1 \text{ cm}$$

2D materials magnetism



$$|\vec{B}| \sim 100 \mu\text{T}$$

$$l \sim 50 \text{ nm}$$