

## Supporting Information

### Exploring Label-Free Imaging Techniques with Copper Sulfide Microspheres for Observing Breast Cancer Cells

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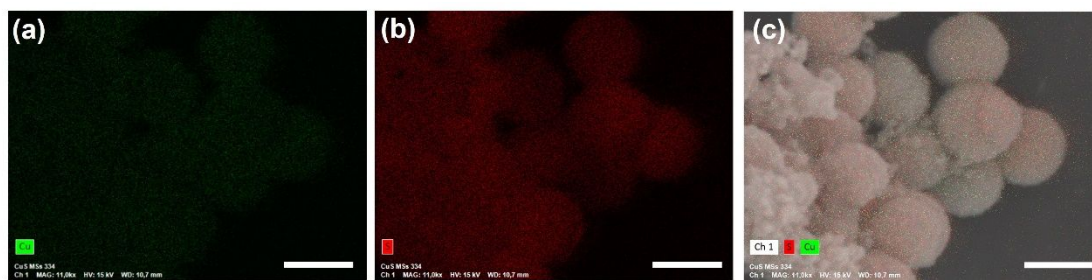
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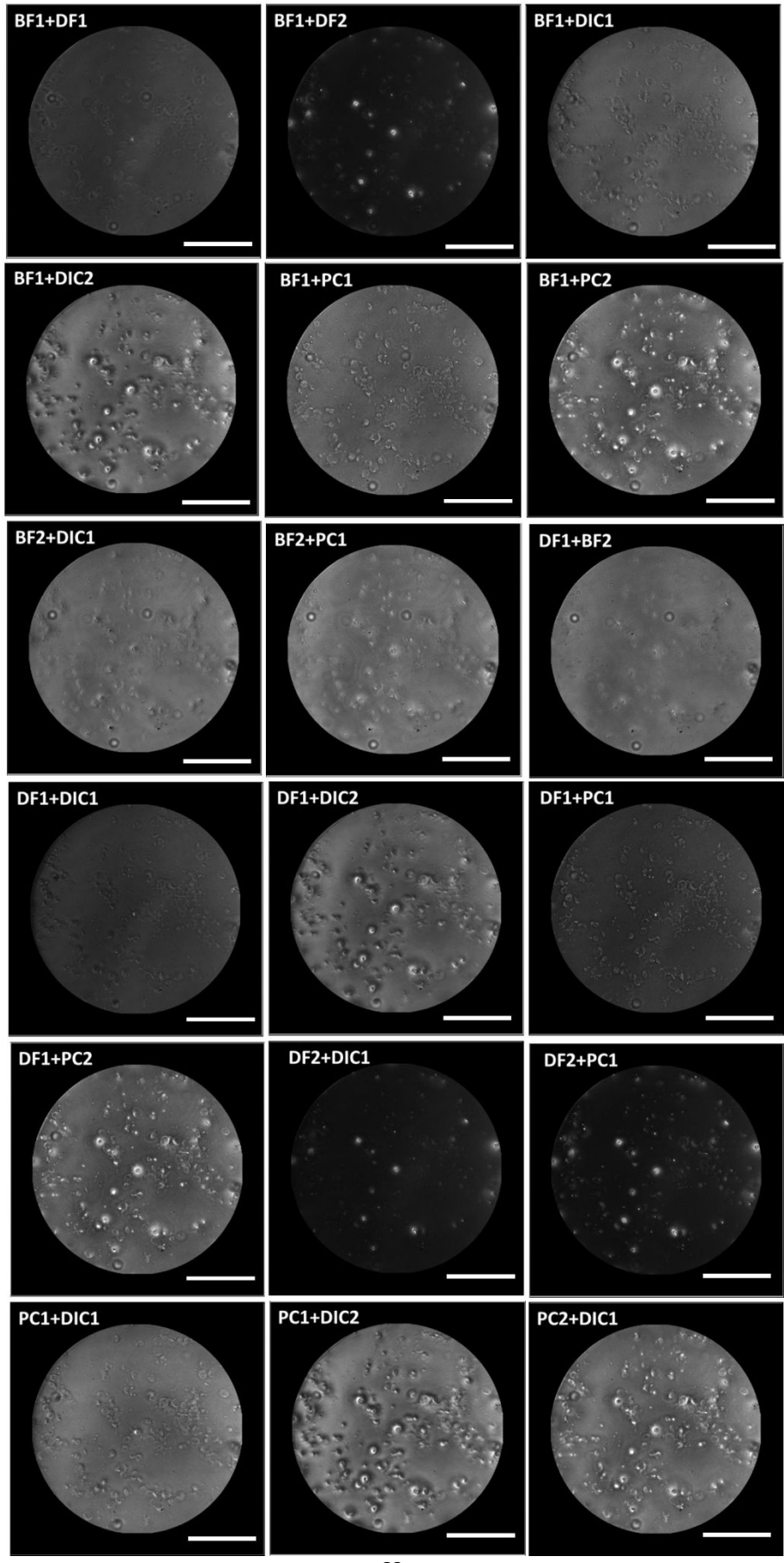
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**Figure S1.** EDX elemental mapping of CuS Ms (a) Cu mapping, (b) S mapping, and (c) overlay map.



**Figure S2.** The images combined two basic contrast techniques, including DIC+PC, DIC+BF, DIC+DF, PC+BF, PC+DF, and BF+DF. For each contrast technique, we selected two images, including DIC1, DIC2, PC1, PC2, DF1, DF2, BF1, and BF2. Afterward, we combined two images from two different contrast techniques to become BF1+DF1, BF1+DF2, BF1+DC1, BF1+DIC2, BF1+PC1, BF1+PC2, BF2+DDIC1, BF2+PC1, DF1+BF2, DF1+DIC1, DF1+DIC2, DF1+PC1, DF1+PC2, DF2+DIC1, DF2+PC1, PC1+DIC1, PC1+DIC2, and PC2+DIC1. The scale bar is 100  $\mu\text{m}$ .