

Article

Aptamer-Conjugated Polydiacetylene Colorimetric Paper Chip for the Detection of *Bacillus thuringiensis* Spores

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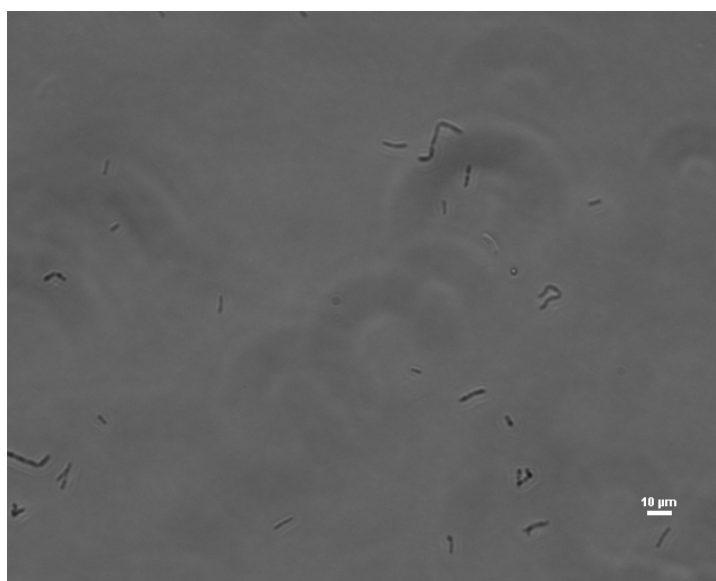
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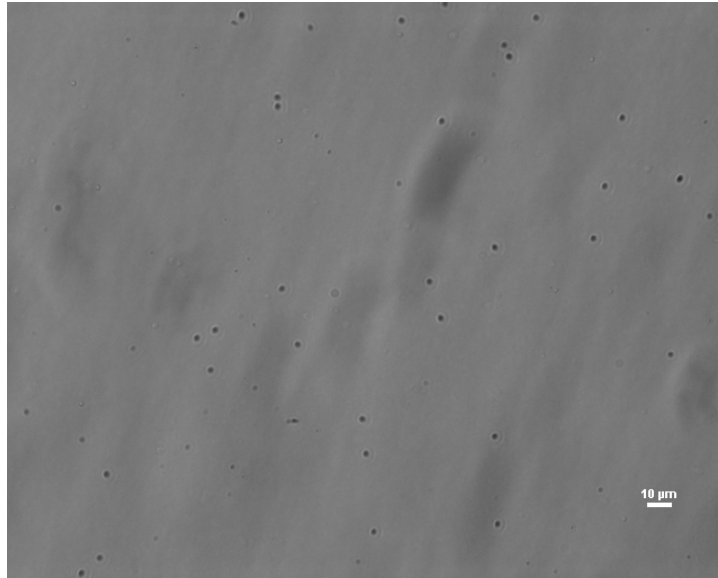
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(a)



(b)

Figure S1. Microscopic images of *Bacillus thuringiensis* (a) and GYS medium cultured *Bacillus thuringiensis* spores; (b) The formation of spores can be confirmed by shape difference.

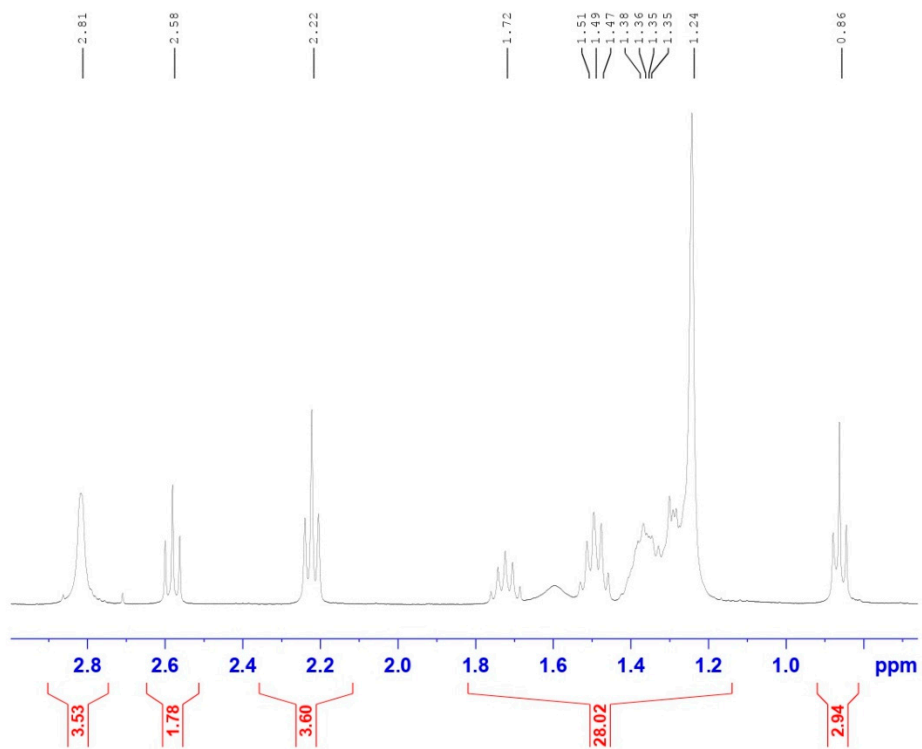


Figure S2. ^1H nuclear magnetic resonance (NMR) spectra of TCDA-NHS. (400 MHz, chloroform- d) δ ppm 0.86 (t, 3 H) 1.24–1.79 (m, 28 H) 2.22 (t, 4 H) 2.58 (t, 2 H) 2.81 (s, 4 H); 2.81 (s, 4 H) indicates ^1H peak of N-hydroxysuccinimide (NHS).

Table S1. The RGB values of paper strips after 4 h incubation in different *Bacillus thuringiensis* spore concentrations.

Sample (CFU/ml)	Red	Green	Blue
$3 \times 10^7 - 1$	154.435	154.490	208.898
$3 \times 10^7 - 2$	82.666	116.423	162.158
$3 \times 10^7 - 3$	205.192	133.755	119.921
$3 \times 10^8 - 1$	177.115	162.176	202.169
$3 \times 10^8 - 2$	87.293	100.973	162.158
$3 \times 10^8 - 3$	137.705	121.271	138.726
$3 \times 10^9 - 1$	179.809	157.424	191.787
$3 \times 10^9 - 2$	101.524	105.638	140.92
$3 \times 10^9 - 3$	205.192	133.755	119.921
$3 \times 10^{10} - 1$	175.550	145.488	173.686
$3 \times 10^{10} - 2$	135.205	107.468	143.350
$3 \times 10^{10} - 3$	164.303	151.722	169.155
$3 \times 10^{11} - 1$	178.749	111.172	129.571
$3 \times 10^{11} - 2$	101.524	105.638	140.920
$3 \times 10^{11} - 3$	151.215	121.017	129.273



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