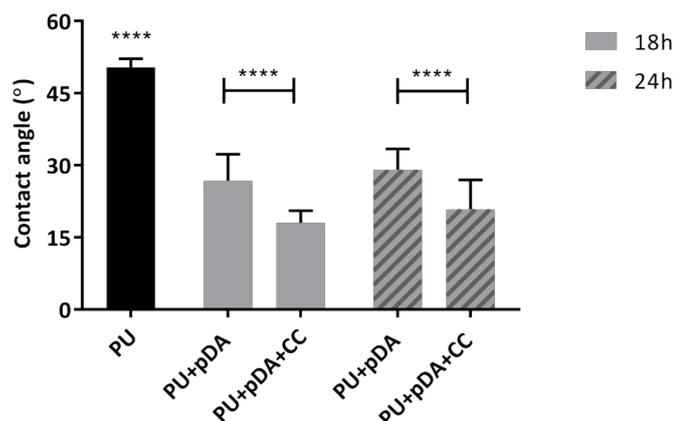
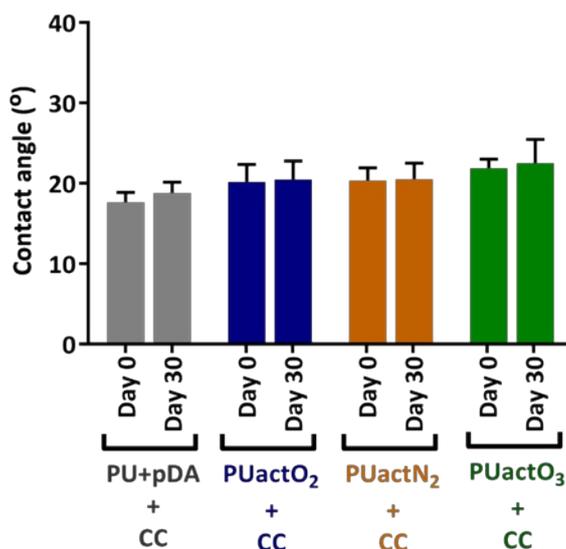


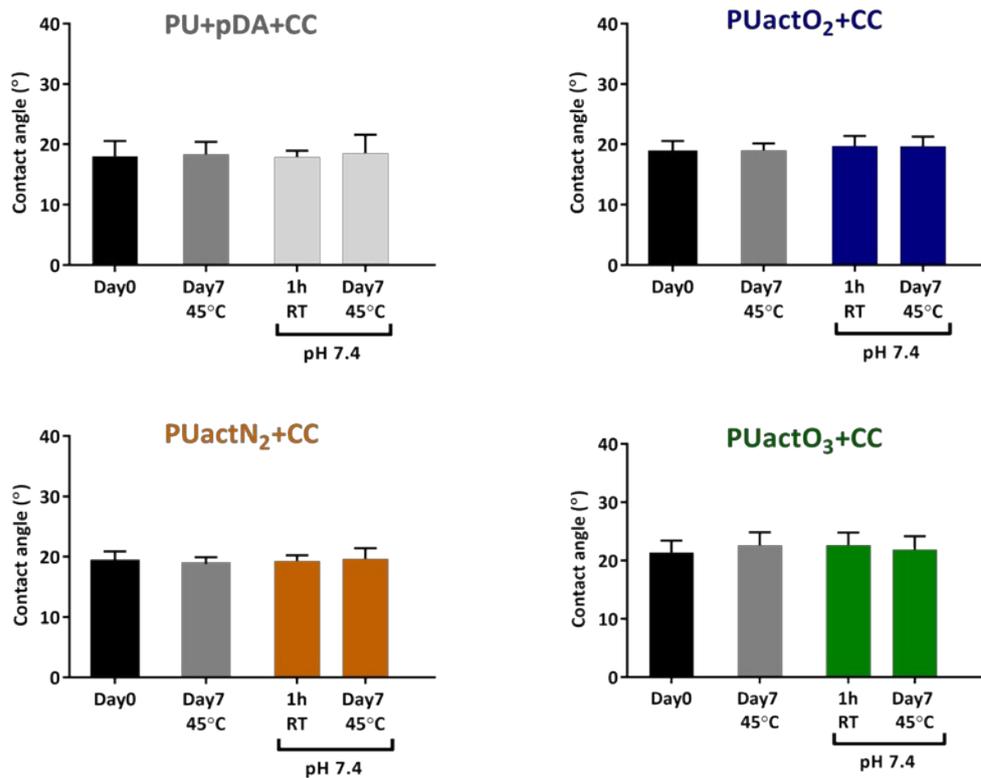
### Supporting information



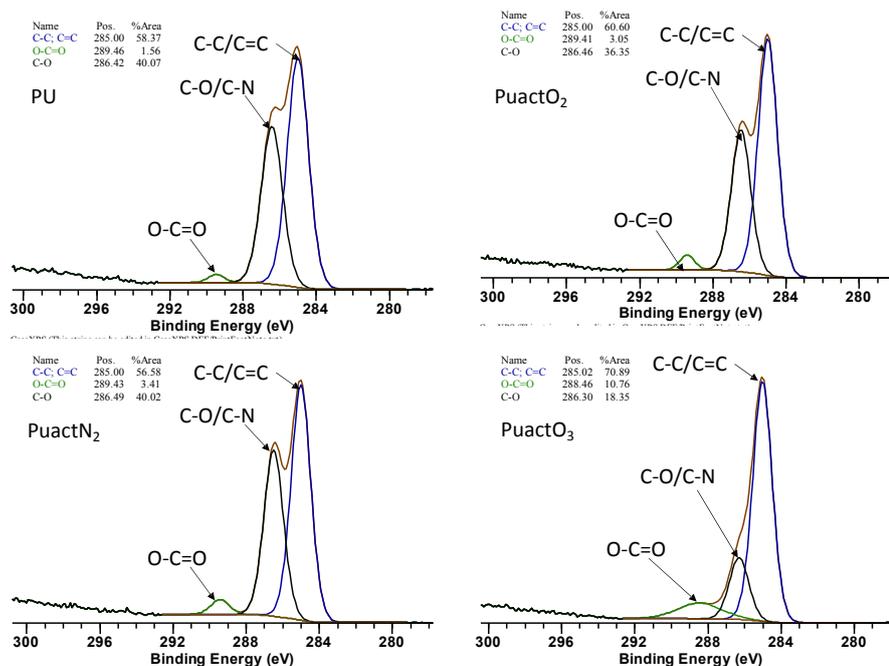
**Fig. S1** Contact angle measurements (captive bubble method) of uncoated polyurethane (PU), PU with pDA layer (PU+pDA) and PU with pDA layer and CyanoCoating (CC) (PU+pDA+CC) using two different pDA incubation periods (18 h and 24 h). Statistical analysis was performed by ordinary one-way ANOVA analysis and statistical differences are indicated with \*\*\*\* ( $p < 0.0001$ ). #-Statistical different from all other samples.



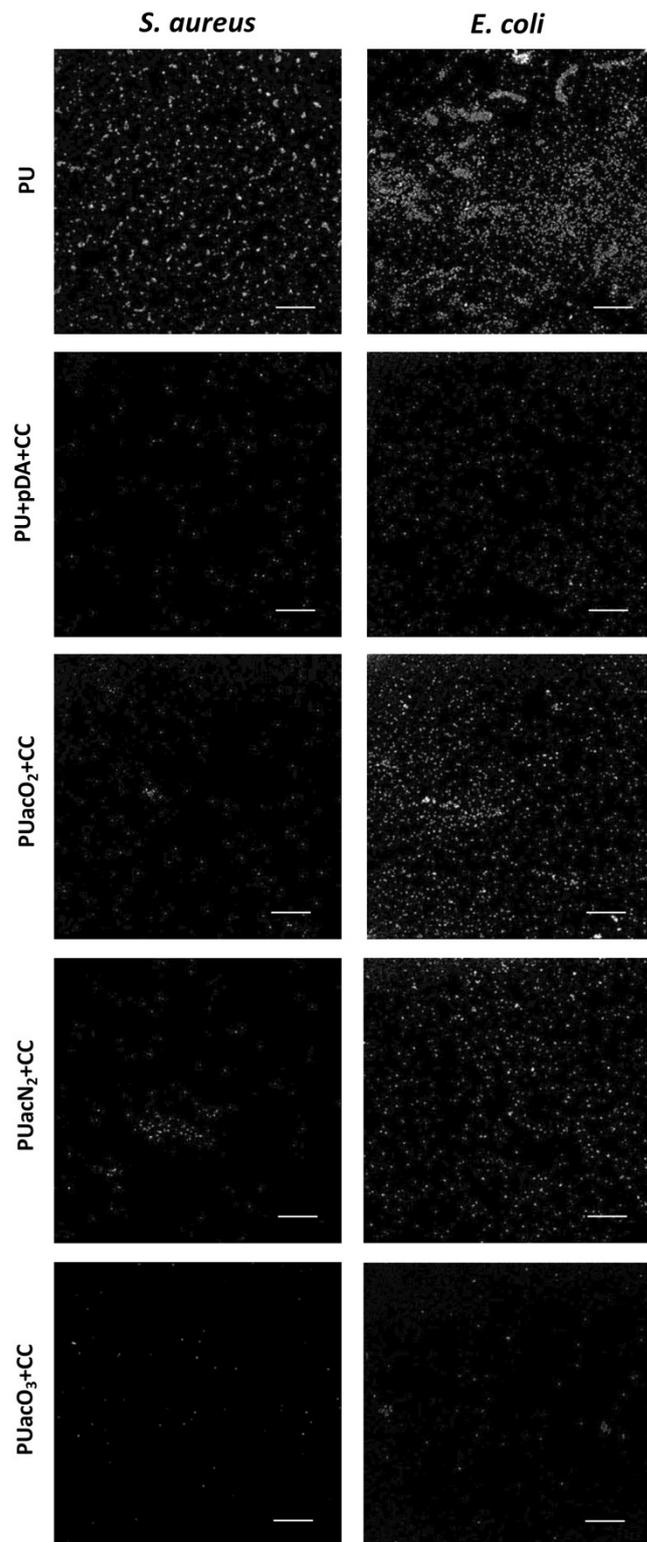
**Fig. S2** Contact angle measurements (captive bubble method) of coated surfaces with CyanoCoating (CC) through pDA (PU+pDA+CC), O<sub>2</sub>-plasma (PUactO<sub>2</sub>+CC), N<sub>2</sub>-plasma (PUactN<sub>2</sub>+CC) and ozone (PUactO<sub>3</sub>+CC) immediately after coating application (Day 0) and after 30 days storage in argon atmosphere (Day 30) at room temperature. Results are the average of two measurements of three replicates. Statistical analysis was performed by non-parametric Kruskal-Wallis analysis.



**Fig. S3** Contact angle measurements (captive bubble method) of coated surfaces with CyanoCoating (CC) through pDA (PU+pDA+CC), O<sub>2</sub>-plasma (PUactO<sub>2</sub>+CC), N<sub>2</sub>-plasma (PUactN<sub>2</sub>+CC) and ozone (PUactO<sub>3</sub>+CC) and exposed to accelerated degradation static conditions following an adapted protocol from ISO10993-13 (2009). Freshly prepared CC – Day0; CC incubated 7 days at 45 °C – Day7 45 °C; CC incubated 1 h at room temperature in phosphate buffered saline solution (pH 7.4) – 1 h RT (pH 7.4); CC incubated 7 days at 45 °C in PBS (pH 7.4) – Day7 45 °C (pH 7.4). Results are the average of two measurements of three replicates. Statistical analysis was performed by non-parametric Kruskal-Wallis analysis.



**Fig. S4** XPS high resolution spectra of C1s of uncoated polyurethane (PU), PU activated by O<sub>2</sub>-atmospheric plasma (PUactO<sub>2</sub>), N<sub>2</sub>-atmospheric plasma (PUactN<sub>2</sub>) or ozone (PUactO<sub>3</sub>).



**Fig. S5** Micrographs of *Staphylococcus aureus* and *Escherichia coli* cells adhered to uncoated polyurethane (PU) and PU surfaces coated with CyanoCoating (CC) through polydopamine layer (PU+pDA+CC), O<sub>2</sub>-atmospheric plasma (PUactO<sub>2</sub>+CC), N<sub>2</sub>-atmospheric plasma (PUactN<sub>2</sub>+CC) and ozone (PUactO<sub>3</sub>+CC), after 24 h incubation at 37 °C and stained with Draq5 (scale bars – 50 μm). Micrographs were acquired using the IN-Cell Analyzer 2000 instrument (GE Healthcare Life Sciences).