

Examining the Growth and Mobilization Behavior of Early-Stage Biofilms in a Controlled, Full-Scale PVC Drinking Water System Laboratory

Artur Sass Braga, Yves Filion, Ben Anderson

Supplemental Data

Table S1 – Dominant bacterial community composition found in the bulk water of preliminary experiments in the pipe loop at growth stages of 1, 14 and 28 days, obtained through 16S rRNA sequencing. Biofilms were grown using bacteria sourced from a granular activated charcoal filter feed for an extended period of time with local tap water, and addition of Nutrient Broth #3 (Millipore Sigma). Percentages denote relative abundance of sequenced genes.

Genus	1 day	14 days	28 days
<i>Acinetobacter</i>	80.82%	10.44%	0.23%
<i>Pseudomonas</i>	11.74%	11.08%	5.02%
<i>Bacillus</i>	2.04%	15.56%	16.90%
<i>Sediminibacterium</i>	0.15%	30.40%	14.49%
<i>Legionella</i>	0.00%	13.09%	31.50%
<i>Unidentified #1</i>	0.00%	0.00%	1.87%
<i>Unidentified #2</i>	0.00%	3.04%	0.13%
<i>Bosea</i>	0.00%	1.53%	8.58%
<i>Rhodobacter</i>	0.00%	0.15%	10.66%
<i>Hydrogenophaga</i>	0.00%	3.61%	0.84%
<i>Unidentified #3</i>	0.00%	0.02%	2.71%
<i>Pseudarthrobacter</i>	0.00%	0.00%	0.39%
<i>Niveispirillum</i>	0.00%	0.82%	0.17%
<i>Fimbriimonas</i>	0.00%	0.03%	0.59%
<i>Lactobacillus</i>	0.02%	0.00%	0.00%
<i>Others (n = 146)</i>	5.23%	10.22%	5.92%

Figure S1 – Dissolved oxygen (DO) concentration of the bulk water of pipe loops A and B during the growth stage of the biofilms.

