

SUPPORTING INFORMATION

Combined carbon mesh and small graphite fiber brush anodes to enhance and stabilize power generation in microbial fuel cells treating domestic wastewater

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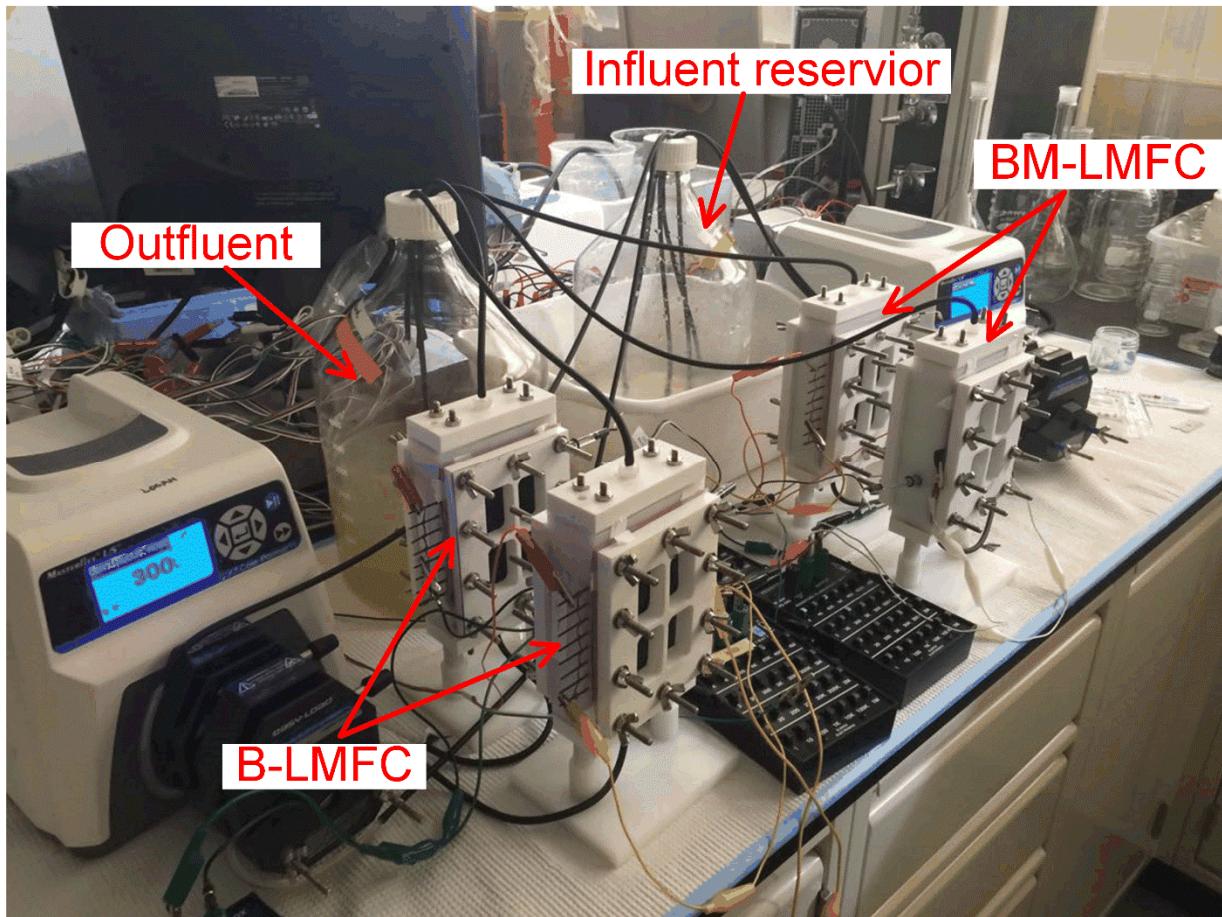


Fig. S1. Photograph illustrating the whole continuous operation system consisting of feed pumps, LFMCs, and influent and effluent reservoirs.

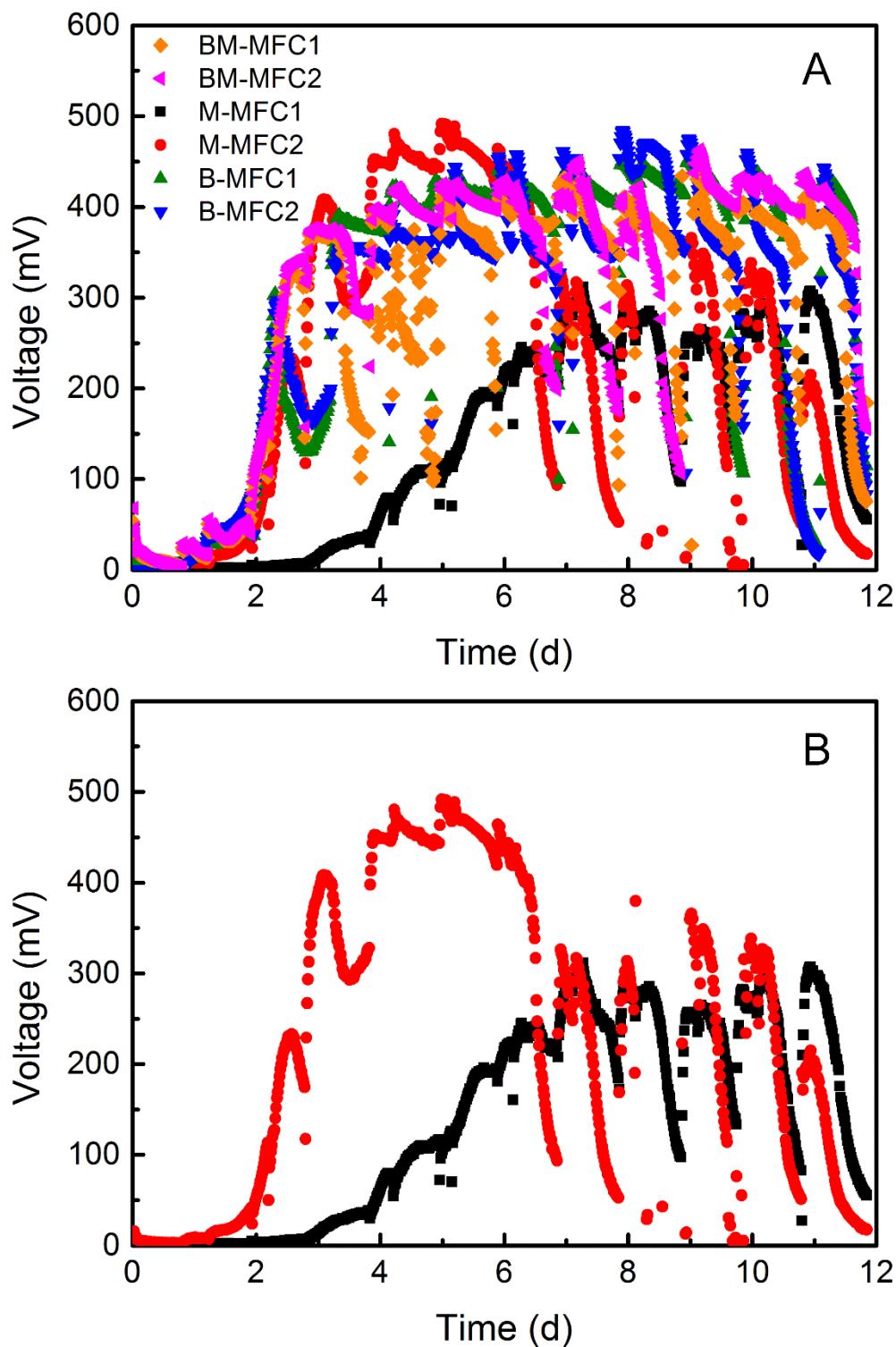


Fig. S2. Changes of the voltage output of (A) all small cubic MFCs and (B) two M-MFCs under $1000\ \Omega$ over time during start-up period in fed-batch operation mode.

Table S1. The P-value of Student's T-test for the effluent COD differences between B- and BM-LMFC at three hydraulic retention times before cathode refurbishment.

| HRT | 2 h | | 4 h | | 8 h | |
|---|---------|---------|--------|---------|--------|---------|
| MFC configuration | B-LMFC | BM-LMFC | B-LMFC | BM-LMFC | B-LMFC | BM-LMFC |
| Effluent COD data (mg L ⁻¹) | 299 | 310 | 261 | 287 | 227 | 241 |
| | 282 | 305 | 269 | 283 | 221 | 235 |
| | 283 | 317 | 257 | 275 | 215 | 230 |
| | 297 | 311 | 251 | 268 | 210 | 225 |
| | 293 | 320 | 266 | 277 | 209 | 221 |
| | 285 | 303 | 252 | 271 | 218 | 233 |
| | P-value | 0.0004 | | 0.0019 | | 0.0057 |

Table S2. The P-value of Student's T-test for the effluent COD differences between B- and BM-LMFC at three hydraulic retention times after cathode refurbishment.

| HRT | 2 h | | 4 h | | 8 h | |
|---|---------|---------|--------|---------|--------|---------|
| MFC configuration | B-LMFC | BM-LMFC | B-LMFC | BM-LMFC | B-LMFC | BM-LMFC |
| Effluent COD data (mg L ⁻¹) | 227 | 218 | 216 | 203 | 153 | 167 |
| | 245 | 236 | 205 | 196 | 166 | 178 |
| | 239 | 224 | 201 | 190 | 163 | 171 |
| | 240 | 229 | 217 | 205 | 157 | 169 |
| | 233 | 227 | 221 | 211 | 170 | 185 |
| | 231 | 218 | 208 | 192 | 155 | 167 |
| | P-value | 0.0230 | | 0.0282 | | 0.0128 |