Supplemental Fig. 1. Optimization of the saponin-permeabilized myofiber preparation for human female subjects. Comparison between the standard saponin concentration (50 μg/ml) and the saponin concentration used in the current study (30 μg/ml) to permeabilzed vastus lateralis myofibers obtained from women. *A*: representative oxygraphic trace of O_2 concentration (*top*) in the experimental chamber with vastus lateralis myofibers from an obese woman (i.e., BMI >30) permeabilized with either 50 μg/ml (black trace) or 30 μg/ml (gray trace) and the corresponding respiratory O_2 flux derivation (JO_2; *bottom*) from the oxygraphic trace. Substrate conditions during JO_2 measurements were 10 mM glutamate + 2 mM malate (GM); GM + 4 mM ADP (+ADP); GM+ADP + 10 μM cytochrome *c* (+cyt c). *B*: data are means ± SE from 4 separate myofibers obtained from one obese woman. Percent coefficient of variation (%CV) of the JO_2 for myofibers permeabilized with 50 μg/ml saponin were 32.7, 32.7, and 20.1% for GM, +ADP, and +cyt c conditions, respectively. %CV of the JO_2 for myofibers permeabilized with 30 μg/ml saponin were 14.8, 7.0, and 7.6% for GM, +ADP, and +cyt c conditions, respectively. $*P < 0.05$ vs. 50 μg/ml; $***P < 0.001$ vs. 50 μg/ml.