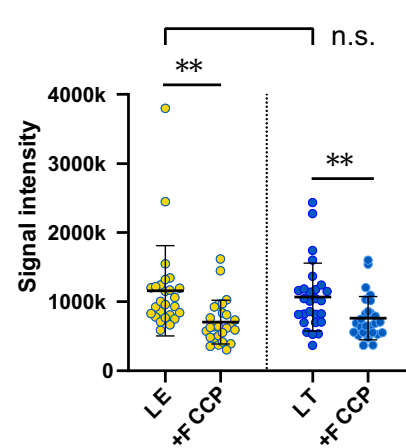
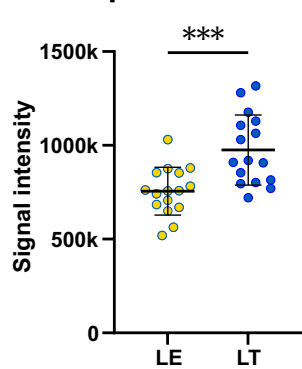


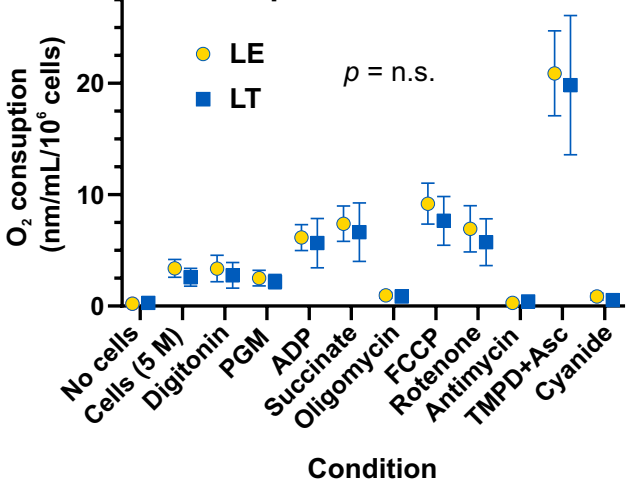
**A** Mitochondrial mass



**B** Mitochondrial membrane potential



**C** Cell respiration

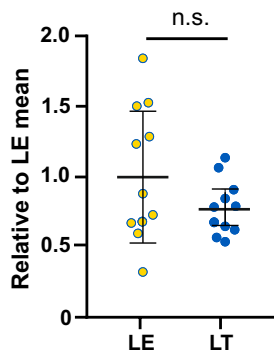


**D**

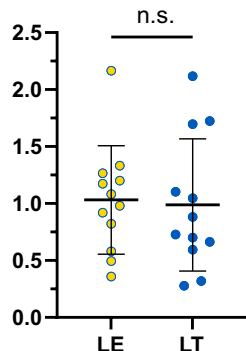
Condition	Role	Effect	Mitochondrial state
Cells			Basal mitochondrial respiration (state 1)
Digitonin	Detergent	Cell permeabilisation	
PGM = Pyruvate, Glutamate & Malate	Substrates	Krebs cycle, CI and CII	Respiration with substrates (state 2)
ADP	Respiration driver	CII	Max physiological respiration (state 3)
Succinate	Substrate	CV	
Oligomycin	Inhibitor	CV	CV block
FCCP	Uncoupler	Uncoupling mitos	Max respiration
Rotenone	Inhibitor	CI	CI block
Antimycin A	Inhibitor	CIII	CIII block
TMPD	Susbstrate	CIV (electron carrier)	Maximum CIV respiration
Ascorbate (Asc)	Substrate	CIV (electron donor)	
Cyanide	Inhibitor	CIV	CIV block

**E**

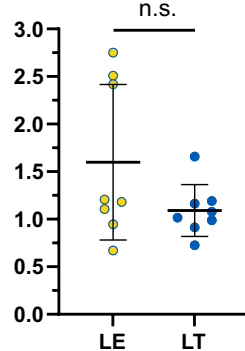
mtDNA copy number



CIV to  $\beta$ -actin



SDHa to  $\beta$ -actin



VDAC to  $\beta$ -actin

