

pCAS Technical Specifications

Partial flow adult (full flow pediatric) pump oxygenator

Fiber bundle surface area: 0.64 m²

Pump-oxygenator total priming volume: ~50 ml

Maximum blood flow: 3 lpm @ 4900 RPM

Rated blood flow: 2 lpm @ 120 mmHg @ 3500 RPM

Rated oxygen delivery: 100 ml/min @ 2 lpm @ 1:1 sweep gas flow @ FiO₂ = 60%

Rated carbon dioxide removal: 100 ml/min @ 2 lpm @ 1:1 sweep gas flow

Full flow adult pump oxygenator (under development):

Fiber bundle surface area: 0.94 m²

Pump-oxygenator total priming volume: ~100 ml

Maximum blood flow: >8.2 lpm @ 4900 RPM

Rated blood flow: 6 lpm @ 120 mmHg @ 4000 RPM

Rated oxygen delivery: >270 ml/min @ 5 lpm @ 1:1 sweep gas flow @ FiO₂ = 60%

Rated carbon dioxide removal: >220 ml/min @ 5 lpm @ 1:1 sweep gas flow