





IMPACT REPORT

FY 23 / 24 July - September

EVERY BREATH IS A CHANCE AT LIFE



Respiratory failure claims the lives of more than 1.6 million children under the age of five every year. This includes fatalities from pneumonia, birth asphyxia and preterm births. Despite the preventable nature of these deaths, children residing in low-resource settings face significant barriers to accessing life-saving treatment.

At FREO2, we offer Oxygen as a Service (O2aaS) — a reliable, affordable, and accessible solution. O2aaS comprises innovative products ensuring an uninterrupted oxygen supply, clinical training for timely diagnosis and treatment, and technical training for sustainable maintenance and support.

Partnering with remote healthcare facilities in under-resourced communities, we ensure that oxygen reaches areas where its impact is most valued — a concept we term **maximising oxygen miles.**

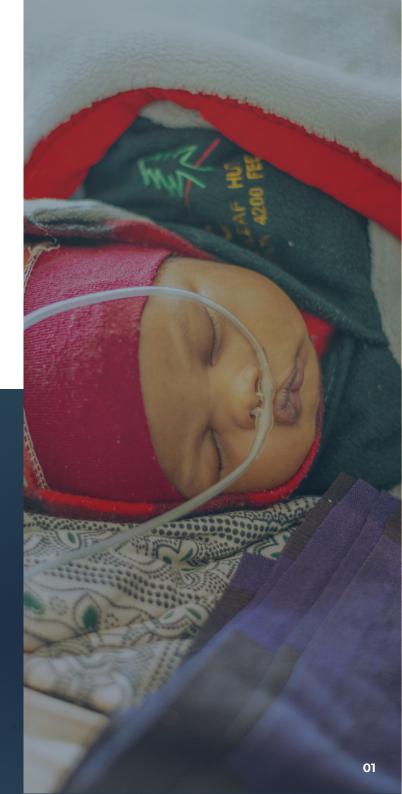
OUR MISSION

Improving oxygen access for children in low-resource settings to save lives and reduce inequalities in health.

OUR VISION

A world where every child can breathe, live and thrive.

Children treated with FREO2 enabled oxygen. June 2026 Strategic Target: 246,912 Uganda 20 Uganda 27 Tanzania 27



A NEW CHAPTER

Dear Friends and Supporters of FREO2,

I am Máire Ruane, and I feel very humbled to introduce myself as the new CEO of FREO2. Having worked with the organisation for nearly three years in various capacities and as 2IC to the previous CEO, I am honoured to assume this role during a period of significant changes and milestones. I feel so fortunate to be chosen to lead FREO2 into the next chapter of its journey and I wholeheartedly commit to preserving the legacy of our co-founders and carrying forward their vision.

My background includes experience in entrepreneurship, innovation, strategy, business architecture, and portfolio management. However, the most profound influence on my life is a deeply personal experience—a harrowing encounter with the devastating effects of hypoxia and lung failure in August 2019. I struggle to find adequate words to describe the horror of the moments when my lungs could no longer absorb oxygen. The memories serve as a stark reminder of the critical nature of the work we do at FREO2. It is our mission to prevent tiny babies and children from enduring needless suffering due to this dreadful disease.

Two simple interventions, if made available earlier in my own experience, could have potentially changed my outcome. Coincidentally, these are the very things FREO2 is committed to bringing to the furthest corners of the world:

- A pulse oximeter: this simple device ensures the most critical children are prioritised for treatment.
- Timely access to oxygen: earlier access to oxygen can have a significant impact on outcome.

At FREO2, we are acutely aware of these facts, they fuel our passion to make oxygen more reliable, accessible, and affordable. We must do this better and we must do this faster.

Highlights from this quarter include the commencement of our three year strategy, *Maximising Oxygen Miles*, an initiative aimed at taking oxygen even further to regions where mortality rates are unacceptably high. This quarter we have reached some significant milestones, we have installed a total of 50 FREO2 Oxylink Systems across three countries and we have treated over 10,000 children and babies with FREO2-enabled oxygen since 2018. I was fortunate enough to meet our 10,000th patient whilst visiting a hospital outside Karatu in Tanzania.

I firmly believe in the immense value that can be created when courageous leaders come together to pursue audacious goals. I am surrounded by exceptional leaders in Africa, the Pacific Islands, and Australia, and I am filled with optimism about what we can collectively achieve. In the pages of this report, you will find their voices and many more.

Thank you for your unwavering support and for being a part of this journey with us. Together, we can maximise oxygen miles so those who need it most receive it first.

With gratitude,

MÁIRE RUANE

CEO

FREO2 Foundation



IMPACT NUMBERS



UNINTERRUPTED OXYGEN DELIVERY

Children treated with FREO2 enabled oxygen.

Q1 = +1,334

24% of target achieved





247

Beds supplied with FREO2 oxygen including 24 new beds in Q1.

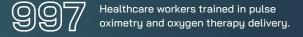


Remote health facilities with FREO2 Oxylink Systems installed.

 $Progression \ on \ children \ treated \ with \ FREO2-enabled \ oxygen \ per \ country \ over \ time \ (cumulative)$

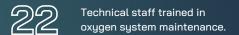


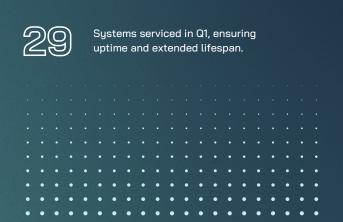
CAPACITY BUILDING











HIGHLIGHTS

MAXIMISING INSTALLS WITH A SYSTEMATIC APPROACH

In recent months, we've focused on standardising on-theground installation procedures, processes and training initiatives. This focus is necessaru if we are to achieve our ambitious scaling targets. Led by Msira Mageni, our Technical Team in Tanzania showcased the success of these efforts by installing six FREO2 Oxylink Systems in just six days this quarter.

Before each installation, our team meticulously follows procedures, including pre-installation and general needs assessments. These steps set baselines, identify potential obstacles, and address oxygen delivery demands for each site. Standardising these procedures is as crucial as the Oxylink Systems themselves, streamlining our path to effective installations.

This systematic approach has improved our ability to serve communities with speed and effectiveness. The six newly installed sites across Northern Tanzania now have the capacity to treat 30 children simultaneously. Additionally, our team has successfully trained 60 healthcare workers in pulse oximetry and oxygen therapy delivery.

holding us back. As we implement our new three-year strategy, Maximising Oxygen Miles, we aim to raise funds that will support growth. With a consistent, well-designed approach and increased funding, we will be well-positioned to confidently establish our Oxugen as a Service (O2aaS) model in any lowresource setting.





50 SYSTEMS

This quarter marked a significant achievement as we successfully installed our 50th FREO2 Oxylink System. This milestone was reached at the conclusion of the six installations in just six days at Makuyuni Health Centre in Northern Tanzania. It positions us well on our path to fulfilling our annual goal of 100 systems and our strategic objective of 400 systems by June 30th 2026.

The Oxylink System, comprised of six key components, is purpose-built for low-resource settings, ensuring a continuous oxugen supply to patients, even during power outages. By reducing the reliance on expensive oxygen cylinders, it substantially lowers the cost of oxygen therapy treatment per patient while simultaneously capturing real-time data on oxygen delivery.



While we would love to see more of this, limited funding is

Our Pathway to Simplified Installations

Identify **Keu Sites** Conduct baseline assessment

Pre-installation assessment of sites

Acquire products

Develop logistical travel plan

Site installation Train staff on oxygen therapy and system operation

HIGHLIGHTS

PARTNERSHIP STRENGTHENING IN EAST AFRICA

Máire's recent visit to East Africa, her first as CEO but one among several during her tenure at FREO2, proved to be productive. She journeyed through Uganda, Tanzania and Kenya, visited FREO2 health facilities, met with global donors, and held discussions with Uganda's Ministry of Health (MOH).

This trip was invaluable in raising FREO2's profile with potential partners. In Kenya, we met with the <u>Center for Public Health and Development (CPHD)</u>, a fellow CoLab/UK Aid grantee, gaining a deeper understanding of their approach. They are strong candidates for a FREO2 partnership to expand our operations into Kenya. During our time in Kenya, we had the privilege of traveling with the CoLab Team, they subsequently visited a FREO2 supported facility in Kisiizi Uganda and were thoroughlu impressed with the FREO2 sustem and our team.

In Uganda, a successful meeting with the MOH saw both parties committing to collaborate in securing funding for our services. Máire also met with the <u>Elizabeth Glaser Pediatric AIDS Foundation (EGPAF)</u> Uganda team, led by Dr Edward Bitarakwate, and held insightful discussions with the <u>Gould Family Foundation (GFF)</u> and the <u>Babies And Mothers Alive</u> (BAMA) Foundation.

In Tanzania, discussions with <u>FAME</u>, a hospital in Karatu, explored potential partnership opportunities. Each meeting represented an opportunity to extend the reach of life-saving oxygen to more regions in East Africa. We eagerly anticipate the development of these partnerships over the next quarter.



Visiting facilities with CPHD and CoLab in Kenya.



Meeting with Uganda Ministry of Health

A NEW ALLY: OXYGEN ALLIANCE

FREO2 is thrilled to announce we have become members of the Oxygen Alliance; a dynamic coalition focused on enhancing healthcare infrastructure in low- and middle-income countries. Our shared goals and commitment to making a positive impact have brought us together, and we are inspired by the potential of this collaboration.

Together, we believe that with proper repair, maintenance, and support, many oxygen systems can be revitalised, ensuring prolonged usage and saving both time and money. By restoring these devices, we can enhance access to life-saving oxygen equipment and ultimately save more lives. Our partnership with the Oxygen Alliance represents a significant milestone in our collective mission.

SUCCESS IN THE PACIFIC ISLANDS

In September, we successfully completed the first two stages of our Pacific Islands Expansion Program, underscoring the critical need for FREO2 in the Solomon Islands and beyond. This success paves the way for seeking funding from strategic partners to expand the model across new countries in the region. We are already seeing an increased interest from the Ministry of Health and Medical Services (MHMS).

We installed three Oxylink Systems in two health facilities, resulting in a 70% reduction in oxygen cylinder purchases and usage by the hospitals. We also demonstrated cost savings, with a \$25,900 annual cost savings in oxygen consumption per system. Our system now operates at 61% lower cost compared to the previous "cylinder-only" approach at the national hospital.



FREO2's first patient in the Pacific, baby Madeleine Rose, and her mother.

OBSTACLES AND INSIGHTS

Collecting data on oxygen flow rates, purity levels, and system pressures for our Oxylink System relies on remote monitoring units. These units transmit data to the cloud automatically, enabling our FREO2 teams to monitor impact, oxygen delivery, and system maintenance data. However, challenges have arisen due to unstable fluctuations in Wi-Fi connectivity.

 Insight: Our product team in Melbourne is actively exploring solutions to address this issue in the next monitoring iteration, with a potential shift towards a more open-source system.

During our recent visits to Uganda and Tanzania, heavy rains had left many roads in poor condition, significantly affecting travel and necessitating frequent schedule adjustments.

 Insight: Future trips will need to be planned to accommodate wet seasons, allowing for ample visitation time. Additionally, consistent van maintenance is crucial to minimise disruptions to in-country teams.

While traveling in East Africa with bilateral funders, concerns about proximity to conflict-affected neighbouring countries led to the inability to visit certain facilities due to safety concerns.

 Insight: Safety considerations must be a priority when planning donor and funder visits, and appropriate safety measures must be in place. This extends to safeguarding our team during national travel.

Our in-country teams have been operating with lean staffing structures for an extended period. As we scale, it's become evident that the current individual country-focused structure may not be sustainable.

 Insight: We're transitioning toward a more regional team approach, leveraging strengths to address existing gaps in team structures.

LEADING VOICES



Sheillah Bagayana M.B Country Manager – Uganda

This quarter, we have mapped out new facilities in the south-western regions of Uganda and treated 623 children with the current FREO2 Oxylink Systems in place.

We've diligently supported our current facilities, emphasising maintenance and enhancing Oxygen Management practices. We've also completed crucial baseline assessments to identify facilities in need of our services, technical support, training, and repairs. Furthermore, we've cultivated partnerships with organisations like UPMB, Save the Children, EGPAF, and the MOH, strengthening our network.

We are excited for our next quarter which will include a number of installations, repairs, team building for staff, partner engagements and planning for 2024. We are also looking forward to working with Adara Group as they expand their program to Luwero Hospital.





The past quarter has been filled with countless lifesaving moments. During my visit to Mang'ola Health Facility this quarter, I had the privilege of witnessing firsthand the impact of our work. Being able to supply a baby (baby 10,000) in the NICU with oxygen and extend his life was a powerful reminder of the countless stories of hope unfolding in FREO2-supported health facilities. It was also a pleasure to host Máire during her trip to East Africa. As we look ahead to the next quarter, I am filled with excitement about the continued impact we can make.



George Massay Country Manager — Tanzania



Dr Divi Ogaoga

This quarter we have made significant progress in gaining the much needed attention of the Ministry of Health and Medical Services (MHMS) of the Solomon Islands. I updated them on FREO2's impact after successful completion of our pilot phase and received a very positive reaction to our work. They were highly impressed with the 70% reduction in oxygen consumption, resulting in annual cost savings of \$25,900 per system at the national hospital. Our FREO2 Oxylink System now operates at a remarkable 61% lower cost compared to the previous "cylinder-only" approach.

Furthermore, the MHMS expressed a strong interest in expanding the Oxygen project to other health facilities. It's truly a rewarding experience to be part of this team.

MIRACLES AND LESSONS FROM 'BABY 10,000'

As we celebrated a remarkable milestone - having treated 10,000 children - our FRE02 Storyteller, Caroline Wairimu, embarked on a journey with our team to visit FRE02-supported health facilities in Karatu, Tanzania. What unfolded during this visit was a tale of hope, and at the heart of it all, the story of "Baby 10,000".

We set off for the Mang'ola facility in the afternoon. We travelled for about three hours, initially passing small villages, then some Maasai huts, then nothing except the odd cow or shepherd herding goats. The soil was rocky and barren for miles on end. As we finally approached the facility, a massive, curved wall of red brick seemed to miraculously rise from the earth and soar into the heavens. The wall was simple, beautiful and thoughtfully designed.

As we made our way to the Toto Ward (Children's Ward), a sign caught my eye, labeled "Dad, Mum and Baby Clinic." This inclusion of "dad" gave me hope, perhaps a sign of shifting gender roles in this village. We discovered that the facility was funded by a Spanish faith-based foundation and operated without government support, offering free services to all.

Inside the ward, our visit coincided with the treatment of the 10,000th baby with FREO2 enabled oxygen. Sister Francesca cradled a tiny baby "Emmanuel" as she shared the impact of our system. Before FREO2, there was no oxygen, and many children had been lost. She told us babies like Emmanuel would not have survived the journey to the closest district hospital and that every year 220,000 babies are born preterm in Tanzania. Since our system's installation, 263 children have received treatment. Emmanuel, born two months premature, had received FREO2-enabled oxygen for two weeks, starting at 1.5 litres and gradually weaning off. We called him 'baby love.'

Emmanuel's mother, a hardworking woman, shared her joy, saying, "My baby is doing really well, and I was not expecting such progress." She had worked up to 18 hours per day, even during pregnancy, performing strenuous tasks to support her family. This is a common reality for many women in Tanzania, where gender roles are deeply entrenched, and women often bear the responsibility of providing income and managing households, even while pregnant. Stressful working environments and poor living conditions have been associated with an increased risk of preterm birth and its recurrence.

But that wasn't the only hurdle for Emmanuel's mother. She recounted her challenging journey to the hospital, navigating bumpy roads on a motorbike when she felt something wasn't right. Sister Francesca held hope that both mother and Emmanuel would soon return home.

We also heard that word was spreading in the community and more and more mothers were bringing their babies for treatment. Soon they wouldn't be able to deal with demand and Sister Francesca asked FREO2 for more.

What struck me most about the Mang'ola facility was its minimal equipment and lack of fancy devices. Funding was evidently tight, yet the performance data was impressive. It was apparent that Mang'ola's success was driven by warmth, love, and compassion. There's a lot we could all learn from Mang'ola.

Mang'ola is a shining testament to our latest three year strategy, Maximising Oxygen Miles, a tangible demonstration of our commitment to extending oxygen access to underserved facilities. In doing so, we maximise the value of every litre of oxygen, recognising that its delivery to remote regions holds far greater significance than within city centres.







LOOKING FORWARD

As we implement our new strategy, we are excited to bring core capabilities to East Africa. We are actively seeking key hires for various roles, and your recommendations are highly valued. If you know of suitable candidates based in East Africa, please email maire@freo2.org. We have open positions for:

• East African Lead

 Leading our African organisation, engaging and strengthening relationships with strategic partners and East African governments.

• Technical Operations Manager

· Leading our technical delivery in East Africa.

• MEL Support Officer

- Supporting the FREO2 global MEL strategy.
- o Position planned for second half of 2024.

In the upcoming months, we have several exciting initiatives planned, including:

- Installing and providing training for several new FREO2 Oxylink Systems in East Africa.
- Launching a partnership with Save the Children in Uganda to support oxygen training at their partner facilities.
- Sustaining our ongoing engagements with MOH representatives in all countries.
- Working through the final stages and confirmation of our partnership with Grand Challenges Canada (GCC).
- Our Ugandan team will be presenting a talk on 'Documentation in the Maintenance and Handling of Medical Equipment' for the Oxygen Alliance.
- Partnering with <u>Adara Group</u> as they expand their program to Luwero Hospital.

We are also thrilled to announce that we will be hosting our Annual General Meeting on December 13th, marking the official launch of our Maximising Oxygen Miles Strategy.

