

Dear PIVOT community,

We are proud to share our final Quarterly Impact Report of 2020. We hope it finds you and your loved ones safe and well.

What a year it has turned out to be! At PIVOT we decided to take the opportunity for an overdue shift of fiscal year in order to better align with the Malagasy government planning cycle and closed 2020 as of September 30. With that, we're happy to report this quarter marks the first of our FY21 fiscal year – happy new year to all!

This quarter, PIVOT launched renovation of six health centers in remote corners of Ifanadiana District, marking the most significant expansion in our history. On December 31, national government officials signed off on the joint recruitment[†] component of the Universal Health Coverage (UHC) implementation plan that PIVOT and Ministry of Public Health (MOPH) have been co-designing for over a year. This includes how the MOPH, with PIVOT's support, will staff some of the most remote and rural health centers on earth in a way that works for the patients, clinicians, and the overall health system for the long term.

At scale, we envision these UHC components covered by a strong national system that invites bilateral and NGO support to help resource plans that have been written, tested, and evolved through our model district partnership. We're thrilled to have pen to paper on some of the most complex design elements, informed by our first 7 years on the ground and the last 18 months of co-designing for scale with the MOPH.

Of course, this quarter also saw PIVOT continuing to respond to COVID on the frontlines, while maintaining productivity and connection across a team of 200+ staff working from home (apart from direct clinical engagement), and helping the world navigate what the pandemic means for countries like Madagascar and others where under-testing and under-reporting are at play. Key to greater testing capacity for the country, the RT-PCR lab we're developing, with local partner Centre ValBio, has faced delays due to widespread challenges with international supply chain, but is projected to open in March of 2021.

We are pleased to report that this calendar year – which began with the closing of our Boston office in an effort to shift more resources and responsibility to our Senior Management Team in Madagascar – has wrapped with \$200,000 more support generated than in 2019, the completion of our annual audit in record time, and major effort on the part of our Malagasy leaders to lean in where US-based colleagues were asked to lean out.

Congratulations to the team and many thanks to you, our community of supporters, for having our backs during the pandemic and beyond.

Onward together,

Tara Loyd Executive Director Matt Bonds

Co-Founder & Scientific Director

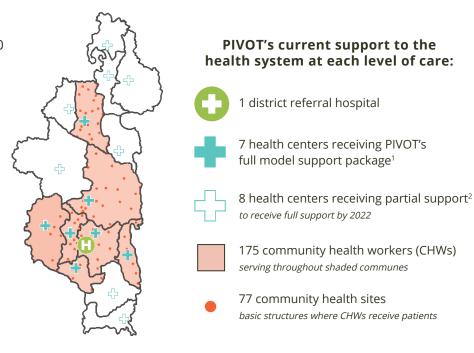
IFANADIANA DISTRICT

In partnership with Madagascar's Ministry of Public Health, we are transforming Ifanadiana District's public health system into an evidence-based model for universal health coverage that can be sustained, replicated, and scaled.

Total District Population: 182,640 **Current Catchment Area:** 80,062

Baseline Statistics (2014):

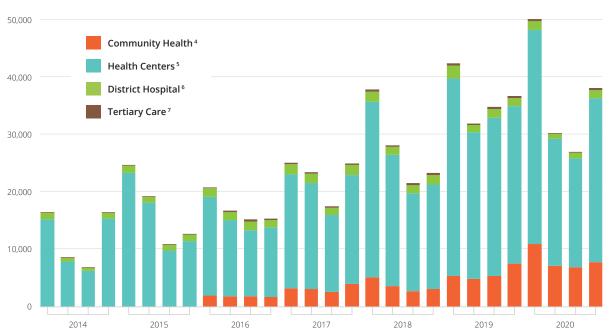
- 1 in 7 under-5 mortality
- 1 in 14 maternal mortality
- 71% of the population lives >5km walk from nearest health facility
- 49% of the population lives >10km walk from nearest health facility



HIGHLIGHTS & CHALLENGES

- **Launched the largest expansion in PIVOT history!** Rehabilitation efforts at 6 primary care facilities are now underway in communes where we will expand our full support package over the course of 2021.
- Being named the Ministry of Public Health's (MOPH) implementing partner for the roll-out of a national strategy for
 Universal Health Coverage (UHC) at scale, this quarter we hired a new UHC Manager, established a local committee
 for joint recruitment of clinical personnel with the MOPH, developed messaging for local UHC sensitization, and
 organized meetings with local stakeholders to discuss implications of the upcoming launch of new UHC activities.
- To address growing stigma about COVID-19, our sensitization and communications teams collaborated to **disseminate key facts and dispel misinformation about the pandemic** via regional radio.
- CHW supervision remained paused to reduce risk of transmission and so that community health supervisors could provide additional support needed at facilities amid the pandemic. Despite this, every fokontany in our catchment area has maintained staffed and functional health sites, and we were able to advance the **recruitment of 158 new CHWs.**
- In response to an **increase in requests for psychological support** for patients by clinicians, the social support team **accelerated existing plans to recruit more social workers**.
- Having observed many patients accessing care without family or community accompagnateurs (a common cultural
 practice, especially for patients traveling long distances to access public health services), the social support team
 has initiated a process for matching patients with volunteer accompagnateurs to provide support during
 hospitalization and more.
- Together with our partners at Centre ValBio, **continued efforts to establish an RT-PCR testing lab in Ranomafana** (expected to be the first of its kind outside of the nation's capital).
- Rolled out **restructured and expanded data dashboards** to foster greater transparency and promote integration of information systems in routine activities and planning.
- Across the hospital and health center levels, our **sensitization team connected with over 10,000 patients** to reinforce key messages about preventive public health practices.

PATIENT VISITS SUPPORTED³



THIS QUARTER (OCT-DEC '20)

37,987

ALL-TIME (SINCE 2014)

655,428

In 2020, we adjusted our calculation of all patient visits supported to include care provided at the household level and to reflect various updates to historical data. For information on how this has affected figure reported previously, contact us at info@pivotworks.org.



Community Health

VISITS (CHILDREN UNDER-5)

7,760

(Target: 9,518)

82% of target achieved

PER CAPITA UTILIZATION 9

2.2 visits

per child under 5 (annualized)



Health Centers

EXTERNAL CONSULTATIONS 10

28,483

(Target: 36,837)

77% of target achieved

PER CAPITA UTILIZATION 9

1.6 visits

per person (annualized)



District Hospital

(ALL AGES)

1,441

(Target: 1,243)

116% of target achieved

DSPITALIZATIONS BED OCCUPANCY 11

497

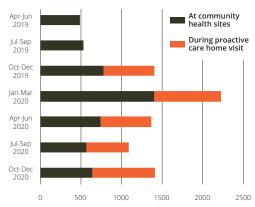
46%

(Target: 572) (Target: 70%)

PROACTIVE CARE PILOT UPDATE

Our community health proactive care pilot was launched in October 2019 to test, optimize, and expand the rollout of policies that aim to address the major financial and geographic barriers to care experienced by the majority of Ifanadiana District's and Madagascar's population. Results from the project's 6-month evaluation showed utilization of care improving at nearly quadruple the rate in the pilot commune compared with other communes, and that the quality of care provided by CHWs in the pilot is better, with a higher rate of adherence to protocol. Despite challenges created by COVID-19, that trend of improved outcomes continued throughout 2020. To the right are some of the pilot's key 15-month outcomes.

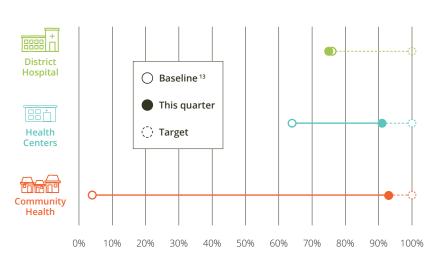
Under-5 Consultations by CHWs in Pilot Commune



Comparison of 15-Month Community Health Outcomes, Pilot vs. Non-Pilot Communes

	Proactive Care Pilot	Non-Pilot Communes
Percent of Households Visited	88%	0%
Per Capita Utilization Rate	3.2	2.1
CHW Adherence to Protocol	100%	71%
CHW Supervision Rate	Supervision was reduced this quarter to minimize risk oj COVID-19 transmission.	

AVAILABILITY OF ESSENTIAL MEDS 12



CONTINUUM OF CARE



38% transferred by PIVOT ambulance

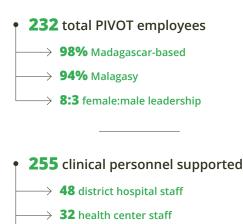
26% transferred by taxi bus

with transport fees covered by PIVOT

35% by other mode

of transport on foot, or by car, tractor, stretcher, etc.

STAFF



> **175** community health workers

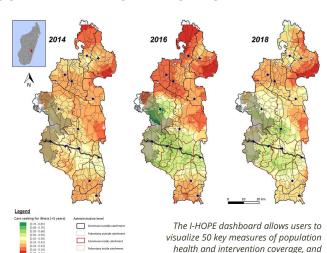


INNOVATION SPOTLIGHT: COMPLETING OUR THIRD IMPACT EVALUATION

One of the innovations that has been fundamental to PIVOT's identity since the very beginning: every two years, we conduct a longitudinal cohort study, surveying over 1,500 households (more than 8,000 individuals) in Ifanadiana District about health, healthcare access, and socioeconomic conditions. Using the data collected, the PIVOT Science team conducts comprehensive impact evaluations that allow us to understand the population-level impacts of our work.

In December 2020, BMJ Global Health published our third impact evaluation, led by Associate Scientific Director Dr. Andres Garchitorena. High-level results show that, between 2014 and 2018, child mortality rates decreased faster in PIVOT's catchment area than in parts of the district we have not yet reached, and that we observed significant improvements in care seeking for children under 5 and individuals of all ages. The study also underscores areas in need of improvement, such as strengthening utilization of maternal health services and overcoming geographical barriers to care.

This round of the longitudinal cohort study was coupled with a step toward increased data transparency and availability. The study's data are now freely accessible to government and other implementing partners, other researchers, and the general public through the newly established I-HOPE dashboard.



Garchitorena A., et al. District-level health system strengthening for universal health coverage: evidence from a longitudinal cohort study in rural Madagascar, 2014-2018. BMJ Global Health 2020;5:e003647.

explore questions about geographic barriers,

economic equity, and change over time.

MATERNAL & REPRODUCTIVE HEALTH

This quarter, we saw a

99% maternal survival rate 15

at PIVOT-supported health facilities.

In addition to this, we achieved:

61%

contraceptive facility-based delivery rate 17

(Target: 45%)

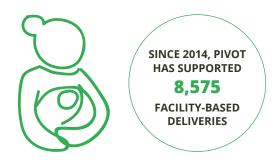
(Target: 40%)

(Target: 30%)

41%

antenatal 4-visit completion rate 18

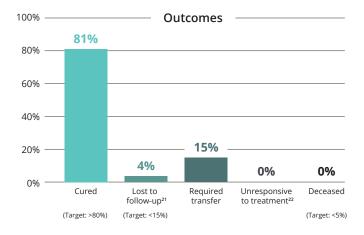
(Target: 30%)



MALNUTRITION

HEALTH CENTERS

- 50 children began treatment for acute malnutrition 19
- 33 children were discharged from treatment



DISTRICT HOSPITAL

- 11 children were treated for severe malnutrition 20
- 3 were successfully discharged from intensive treatment (either cured or referred to health center for continued care)



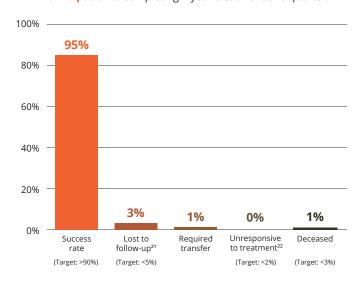
TUBERCULOSIS

This quarter, 53 patients were enrolled for TB treatment.

83% smear positive
2% smear negative
15% extrapulmonary

Cohort Outcomes

for **73 patients** completing 1 year treatment this quarter:



SOCIAL SUPPORT

349 social kits (food and household essentials) distributed to vulnerable patients at the district hospital

259 psycho-social sessions provided for hospital patients

358 reimbursements provided for transport to/from care

meals served to hospitalized patients and their accompagnateurs ²³













mafana Health Center, July 2018

PATIENT SPOTLIGHT: ELISA

Elisa was born to her loving parents, Vao and Prosper, in 2014. Apart from what looked like a small bruise on her cheek, she was a perfectly healthy baby girl. Over time, the mark remained, but didn't cause concern until it began to grow. When Elisa was 8 months old, doctors determined the growth was a benign tumor, and urged her parents to return periodically to monitor its development.

By mid-2018, Elisa was 4 years old, and the tumor had malformed most of one side of her face, impeding her ability to eat and speak. One day when she was running a fever, Prosper brought her to Ranomafana Health Center for treatment. What started as a simple health center visit turned into a 2.5-year partnership to ensure Elisa access to the care she needed.

The only option for transformative care was to refer Elisa outside of Ifanadiana District for maxillofacial surgery – she stood to gain a lot from a successful operation, but potentially even more to lose if it went poorly. Our social support team helped the family weigh the options to decide.

Elisa first ventured to the Madagascar's capital for care in 2018, but faced surgical complications and returned home in even more discomfort than before.

By 2019, PIVOT forged a connection with Face Au Monde, a French organization that connects children with severe facial deformities to specialized care. With her parents' support, PIVOT began arranging Elisa's trip to Paris: a surgical team at Necker-Paris Children's Hospital was on board to volunteer services to handle her case, she would be accompanied by PIVOT nurse Miora for the 8-week journey, and they would stay with a host family.

Elisa and Miora journeyed from Ranomafana to Paris before the pandemic was on anyone's radar. Following operation, Elisa spent part of her recovery in intensive care, but eventually experienced improvements to her eating and breathing. But by March, when Elisa was scheduled to return to Madagascar, the appearance of her face had worsened, and the 6-year-old expressed confusion about why she had traveled so far for these results, worrying that people would continue to stare at her in the way they always had.

As fate would have it, the burgeoning COVID-19 pandemic would soon eliminate the possibility of returning Madagascar as planned. Their host family, Cécile and Régis, graciously welcomed Elisa and Miora to extend their stay.

By June, the hospital had agreed to perform and cover the cost of a reconstructive surgery that would reduce both the pressure on Elisa's airway and the size of the previously overstretched parts of her face. The operation was a success. In the 3 months that followed, Elisa not only healed, but flourished. She spent the seasons in Paris experiencing new things and keeping in touch with her family through regular video calls facilitated by PIVOT's social workers.

Once Elisa's recovery was deemed complete, the excitement for her return was tangible among her family and the PIVOT team, who gathered for a small socially-distanced homecoming reception in September.

Now, "we see her happier," say Vao and Prosper. "She's not afraid of people looking at her anymore." And for that, the many who played a part in this remarkable journey are all celebrating.

Click here for Elisa's full story.

MORE FROM THIS QUARTER:



From Emergencies to Epidemics, Always Ready to Respond | Johnson & Johnson Center for Health Worker Innovation "During the plague season, we were there, during the measles, we were there, and now with COVID, we are here," says PIVOT reference nurse Alex Rakotondramasy. Learn more about the challenges and rewards of working as a health care worker in Ifanadiana District in this profile of Alex published as a part of Johnson & Johnson's Voices From the Front Line series.



Why Expanding Our Reach is Our Top Priority | Hasina Rakotoarisoa, Responsable Communications

Following an expedition to Ifanadiana District's most remote areas, Communications Manager Hasina Rakotoarisoa recounts stories from rural patients and health workers about their most pressing daily challenges - the likes of which PIVOT and the MOPH aim to address together over the next two years through the roll-out of an expanded UHC strategy.



Our Carbon Emissions Baseline and a Commitment to Come Back Better after COVID | Tara Loyd, Executive Director PIVOT is building a model health system next to a World Heritage-designated park in Madagascar, one of the places most vulnerable to climate change in the world. With air travel (one of our biggest emission areas) on hold for 2020, we became one of four founding members of the Climate Accountability Initiative to quantify and lessen our climate harm and call on others in the global health sector to do the same.

Our <u>2019-2020 Impact Report</u> is available now!

Take a look back at the success stories, milestones, and health impacts made possible by your support over the past two years! (Also be sure to check out the recording of our live Year In Review panel to hear directly from the PIVOT team about 2020's highlights.)



DEFINITIONS

- 1. **PIVOT full support (for health center):** a health center that receives PIVOT's technical and financial support to ensure that: it is staffed at or above Ministry of Health standards; fees for patient visits are covered; facility infrastructure is improved; and the data system is supported through data quality assessments and feedback
- 2. PIVOT partial support (for health center): a health center that receives PIVOT's financial and technical support to hire staff, perform routine data collection, and address urgent district-wide or facility-specific issues as needed
- **3. Supported patient visit:** a patient visit to community health worker, health center, or hospital for which costs of care are reimbursed by PIVOT; patients are not charged a consultation fee
- **4. Community health:** disease prevention and health promotion conducted by community health workers (CHWs) outside of health facilities and within a community
- **5. Health center:** a health facility offering primary care services for the population of a geographically-defined commune, ranging from 4,500 to 20,800 people (NOTE: In Madagascar, every health center or centre de santé de base (CSB) is designated as either a CSB1 or CSB2; CSB2s are larger and staffed with at least one advanced level clinician; CSB1s are staffed by nurses and midwives; PIVOT support currently focuses on CSB2s.)
- **6. District hospital:** a secondary health facility offering inpatient care and specialized clinical services (including dentistry; emergency obstetric care, including caesarean sections; laboratory and radiology; infectious disease treatment; and inpatient malnutrition for children) for the district population; to access care at the district hospital, patients are referred from the health center
- 7. Tertiary care: specialized medical care provided at regional or national health facilities outside of the district
- 8. Community health worker (CHW): an elected community member trained to provide care for common illnesses in their home communities and to refer patients in need of higher levels of care to health facilities; patients served are primarily pregnant women and children under five
- **9. Per capita utilization:** annualized rate at fully-supported health centers is calculated using the total number of quarterly health center visits multiplied by four and divided by total catchment area population
- 10. External consultation: new and follow-up outpatient visits with a clinician at a fully-supported health center or hospital
- 11. Bed occupancy: percentage of total hospital beds available that are occupied by admitted patients
- **12. Essential medicines:** a subset of total medicines supplied (7 medicines at the community level, 15 medicines at health centers, and 31 medicines at the district hospital) that, informed by international standards, are necessary for providing basic health care in our setting
- **13. Baseline:** the assessment of the availability of essential medicines before PIVOT intervention, which was: 2018 at the district hospital, 2014 at health centers, and 2015 at the community level
- **14. Standard referral:** a non-emergency referral from a community, health center, or hospital in which patients are counseled to seek specialized care, but are not provided transport by ambulance
- **15. Maternal survival rate:** the percentage of health center births in the last quarter for which the mother was discharged alive following delivery
- **16. Contraceptive coverage rate:** the percentage of women between the ages of 15-49 in PIVOT's catchment area who use any method of birth control as documented at the health center for a three month period (adjusted for reporting delays)
- **17. Facility-based delivery rate:** the percentage of the estimated number of infants expected to be born in the review period who were born at a fully-supported health center
- **18. Antenatal 4-visit completion rate:** the percentage of women who gave birth at a fully-supported health center who attended at least four antenatal care visits prior to delivery
- 19. Acute malnutrition: weight for height between -2 and -3 z-scores according to growth standards
- 20. Severe malnutrition: weight for height below -3 z-score according to growth standards
- 21. Lost to follow-up: a patient whose treatment has been interrupted and who has not completed a program of care
- 22. Unresponsive to treatment: a patient whose health outcomes do not improve with treatment for specified disease
- **23. Accompagnateur:** a family member, friend, or community member who accompanies a patient to seek care; often to cook, clothe, or otherwise provide necessary day-to-day support for the patient

CORRECTIONS MADE TO VERSION POSTED FEBRUARY 22, 2021 (RE-POSTED MARCH 4, 2021)

- † Page 1, we previously stated that a financing component of the UHC has been approved, but it had not yet been at time of publication.
- †† Page 6, we previously misidentified the person pictured with Elisa in the swimming pool as Régis, but it was actually a family friend.