Charity review assignment: VillageReach  
Ju Min Kim  
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This review is based on GiveWell's main web page for VillageReach  
(http://givewell.org/international/top-charities/villagereach ). A short reflection on the update page  
(http://www.givewell.org/international/top-charities/villagereach/updates ) is added at the end of this 
review as an appendix.

Part 1

• "What do they do?" section. Does this section give you a clear picture of the charities' 
  activities, to the point where you can picture how donations are spent? 

  :This section describes the main and extra activities of the organization, including its clients, 
  goal, covered area, history, details on the pilot project, plans, and the financial. 
  • From the information given in this section, one can see that the organization is focused 
    on the logistics for the vaccinations, distributing supplies such as vaccines and 
    improving the delivery system by, e.g. providing refrigerators to the (clinical) facilities. 
    However, it is not completely clear how this works: For instance, is the organization a 
    supplier of vaccines as well? If not, considering that there is an activity called “supplies-
    tracking” which is a part of the system, we suspect that VillageReach collects the 
    supplies from “near, real-time inventory” and delivers them to the clinics that need 
    vaccinations – But then, what is the systematic difference from the previous delivery 
    system, apart from that the service is now performed by external staffs (hired and better 
    trained by VillageReach)?

  • It seems that in the overall budget (table in “Other plans”), the expenses for the contract 
    engagements are included (that will/should be fully compensated by external funding 
    except the South African project.). We believe that the analysis below the table, “there 
    were a total of $810,844 in expenses […] that were neither part of the Mozambique 
    expansion nor included in contract engagements”, is meant to show the expenses not 
    used for the Mozambique program that will be supported by the individual donor. 
    However, it is not completely clear for the reader how to interpret this analysis. For 
    instance, are the expenses on “General Program” and “Program Development” those not 
    useful for the Mozambique program? If yes, how do they then match with the 
    description on the activities for the Mozambique program above, and if no, what are 
    they at all? On the other hand, the management and fund-raising activities are essential 
    for the carrying out the organization's main activity – would it not be misleading the 
    reader, if these expenses are given, being combined with the expenses for the unproven 
    program?

  • The table in “Other plans” provides financial information not only on other plans, but 
    also on the organization’s main activity.

The bottom line: Notwithstanding (minor) critics above, the section gives the reader a brief 
picture of the charities’ activities. She can see roughly how and how much of donations 
are/will be spent in Mozambique for current and future activities, and in South Africa (i.e.
for the activities not proven).

- "Does it work?" section. Does this section use reasonable methods and use reasonable conclusions to assess the extent to which this charity meets the "impact" criterion laid out at http://www.givewell.org/impact-analysis?

  The “impact” criteria for health programs are: (a) medical treatments are administered appropriately; (b) health-related supplies (such as condoms and insecticide-treated nets) are used appropriately and consistently by beneficiaries and; (c) health-related behavior change programs succeed in changing behavior over the long term. We accept evidence of improved health outcomes (lowered incidence/prevalence of diseases; drops in death rates; etc.) as well.

  ◦ Does the review discuss any relevant evidence base for the general kinds of programs the charity is running? (If there is a highly relevant program with a substantial evidence base, the review should link to it, and it should have been included as a separate document in your packet).

    : In the review, GiveWell’s report on immunization is linked. This provides the reader with the evidences of the impacts of the child immunization. On the other hand, there is no information about other organizations running the general kinds of programs the charity is running (i.e. vaccination distribution). Therefore, it is not clear to the reader if there is no such organization or there is, yet without a substantial evidence base. In addition, it might be helpful for reference to have a link to a program directly providing vaccination(s) to the clinics or running clinics dedicated to the immunization.

  ◦ Does the review competently address the question of whether there is evidence of the charity's past impact, including both "direct" evidence and evidence that the charity has executed proven programs in ways that are likely to replicate their results? Does the review explicitly raise and reasonably consider all strong "alternative hypotheses" for any empirical patterns noted as evidence of impact? (For example, if it is observed that vaccination rates rose in the area the charity worked in, one alternative hypothesis for this pattern would be that other nonprofits in the same area were working there as well.)

    : In order to address the evidence of the charity’s past impact, the number of children receiving a certain vaccine (DTP-3) and the number of children who “dropped out” (DTP1-3), which corresponds to the “improved health outcomes” on GiveWell's criteria combined with the proven impacts by immunization, as well as the “reported stock-outs”, which corresponds to the “(a) medical treatments are administered appropriately” on GiveWell's criteria, in the pilot project area (Cabo Delgado) over the project period (2004-2007) are shown.

    As “alternative hypotheses”, other nonprofit activities on immunization and the political situation such as a civil war are considered. We suspect that the economic empowerment as well as education programs (including general schooling as well as special programs on healthcare), that are not discussed by GiveWell, will also affect the immunization rate, but they might be rather indirect (and thus weak influence).

    In order to isolate the contribution by VillageReach, the documentation on immunization situation in the project area before VillageReach, the vaccination coverage between 1997-2008 in pilot project area and the control area, and that between 1990-2008 in Sub-Saharan
African countries are given. The review competently addresses the question of evidences of the charity's past impact.

- **Does the review make reasonable conclusions regarding the likelihood of future impact, considering past evidence?**

  The review makes conclusions regarding the likelihood of future impact by pointing out the similarities between the pilot projects with the (proven) impacts, and the current/future activities. On the other hand, GiveWell has listed four factors that have alongside convinced them of the VillageReach’s impact, which includes entering an area with clearly documented logistic problems and no other supplementary nonprofits. While we believe that it is reasonable to expect sister projects of a successful project in one province to be also (to a certain extent) successful in other eight provinces, we find it not convincing insofar we do not have any relevant information about the other provinces.

- **In assessing empirical evidence, has GiveWell used the best analytical methods available? Would other analytical methods be more helpful in reaching reasonable conclusions and predictions?** (Please follow footnotes and read any Excel sheet attachments to the extent that it would help answer this question.)

  In order to assess the empirical evidence, GiveWell compares the immunization coverage for a certain vaccine of the pilot project area to that of historical records as well as that of geographically extended records. Assuming that the data on this vaccine can represent those for the other vaccines, this appears to be the best analytical method available.

- **Does the review make a reasonable assessment of possible negative/offsetting impact, as discussed in the "impact" framework laid out at http://www.givewell.org/impact-analysis?**

  The review discusses the charities’ potential diversion of skilled labor and/or interference with government responsibilities as possible negative impacts. It concludes that these effects are smaller for VillageReach, arguing that (a) VillageReach is focused on logistics; (b) VillageReach has tried to hand off its program to the government.

  The supporting argument (a) is based on the more fundamental claim of GiveWell, which reads: “the more a charity relies on highly skilled local labor, the greater the risk that it is creating small (or zero or negative) impact, as it simply switches skilled professionals from one useful, helpful job to another”, supported by the discussion on surgeons by GiveWell\(^1\). We agree that VillageReach might require a relatively small number of highly skilled professionals, and thus that the negative effect of such type might be small.

  The (b) is less convincing: We do not believe that the fact that VillageReach tried to hand off its program to the government (which appeared to be a failure) implies that it does not interfere with the services from the government sector, while it may indicate that VillageReach tries to minimize this effect, regardless of if there has been already a similar service from the government sector in parallel or not. However, it is still not clear if and to which extent there are such negative effects.

  Moreover, if activities of VillageReach turned out to save government’s money (for, e.g. the logistics), even though it does not grant money directly to the government, there should be

\(^1\) [http://www.givewell.org/international/health/surgery#Whatisthebottlenecktomoresurgeriesmoneyorskilledlabor](http://www.givewell.org/international/health/surgery#Whatisthebottlenecktomoresurgeriesmoneyorskilledlabor)
still non-negligible risk of “help bad governments to do more harm”.

- "What do you get for your dollar?" section.
  - Are there issues with the estimates given by GiveWell (ways in which they could be substantially overstated or understated) that are not noted?
    - Based on the information on costs provided by VillageReach, GiveWell finds the cost-per-death averted significantly lower than the DCP’s estimate, and it appears reasonable to us, even considering that the definition for the full immunization is different for VillageReach and for DCP.

GiveWell’s own estimate is more conservative than that by VillageReach, yet we believe that the cost-per-death averted is still underestimated. GiveWell states that it ignores government costs entirely, but still includes the vaccinated children under the government’s control of the program when counting the number of vaccinated children covered by VillageReach. Even under the (reasonable) assumption, that the system built by VillageReach still worked in 2007-2008, it is hardly possible that it does not cost anything to sustain the system, yet the program cost VillageReach only up to 2006, and that was included as the “cost” for the estimation. We believe that the estimate should have used the data only up to 2006, (which gives us ~70S instead of ~41$) or have included the government cost in 2007-2008. For the latter, if we calculate it such as [($ of VillageReach cost 2001-2006)+($15 per additional child vaccinated in Cabo Delgado in 2007-2008)]/(# of additional children immunized 2003-2008), we end up with ~47$, which corresponds to ~$630. Note that this is, however, still within the range discussed by GiveWell.

In addition to that, we believe that some of the assumptions that GiveWell made are not reasonable. For instance, GiveWell assumed that there is no extra cost but that of VillageReach to vaccinate a child whose vaccination is attributed to the activity of VillageReach. However, since VillageReach is an organization simply distributing preexisting vaccines and facilities, we should take at least, the cost of the vaccine itself as well as that of the medical staffs into account. In fact, in the footnote 77 of GiveWell's review, the cost is computed including the government cost also for 2003-2008, and we believe that this should be included in the main text.

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2 In [7], the cost for the fully immunized child in Cabo Delgado (project area) is claimed to be $5.03, while in [6], $5.76. In [6], the latter is explained to include the cold chain depreciation while the former not. Since the full text of [6] is not posted on GiveWell's web page, but only a summary, it might appear to have little ground at the first sight; however, [6] can be downloaded from VillageReach's website.

3 VillageReach's full immunization includes DPT and Hepatitis B, while DPT, Polio, Measles and the BCG (“We evaluated the cost per FIC for the childhood EPI cluster antigens by World Bank region”) are considered in DCP.

4 There is a very minor inconsistency in the table of footnote 76: If you calculate the additional children immunized in a way indicated in the text, you get higher numbers for 2004, and 2006. You get the right numbers when you compute (Number of children immunized in Cabo Delgado) - (% of children immunized in Niassa)* (Total number of children in need of immunizations in Cabo Delgado) instead, 75.5% rounded up to 76% in the table.

5 http://www.givewell.org/international/technical/criteria/cost-effectiveness#Howcosteffectiveiscosteffective

6 In fact, it is not completely clear how much of vaccines are purchased with VillageReach's cost.

7 “Labor costs account for the largest share (roughly 30 to 46 percent of total cost) for all strategies all strategies except extended outreach. Vaccine costs range from 8 percent for vaccines to 27 percent for extended outreach strategies. Transportation costs account for the second-largest share of EPI costs for mobile strategies, while building costs account for a greater share of fixed facility strategies.” (Jamison et al. [5], 2006, p.399-400.) This seems to be not quite consistent with the claim by that the cost of vaccine is similar to or smaller than $1 (Gauri et al. [9], 2002, p.29), but we take the more recently published data.

8 For the other costs than logistics, see, for example, [11], p.27.
Is GiveWell's conclusion the most firm that can be reached with relatively little work? Are there adjustments and/or other methods and sources that would lead to a different, and better, estimate of cost-effectiveness?

We believe that GiveWell’s conclusion is the most firm that can be reached with relatively little work. For another approach, see the cost-effectiveness estimate in Part 2.

"Room for more funds" section. Does this section clearly address what is known about the likely impact of additional donations?

The review addresses brief plans of the organization and estimates short-term as well as long-term funding gaps based on the known or expected costs, revenues, and funds. The donor can have a clear picture on what is known about the likely impact of additional donations.

Part 2

Footnote spot-check

- 35, 53/54, 55, 68, 80 (generated by a random number generator on-line); 29, 84 (checked while preparing the other parts of this review)

- 35, “Kane, Mark. 2008. Evaluation of the project to support PAV (expanded program on immunization) in northern Mozambique, 2001-2008: An independent review for VillageReach with program and policy recommendations”: The citation is used to provide the source for the data on the “stock-outs” during the VillageReach’s pilot project period. The statement is given in page 9, not 10 as given in the review, but the citation itself is accurate both in letter and in spirit.

- 53/54, “Measure DHS. Statcompiler.”: The citation is used to provide the data on DTP-3 immunizations for countries in Sub-Saharan Africa and to support the claim that the observed change in Cabo Delgado cannot be explained purely by the broader regional change. Observing various changes among the countries, this rather weak claim is reasonable, even considering the differences in the political and/or economical situations of the countries. The citation is accurate in spirit, yet some data seem to be missing or updated in the meanwhile: Madagascar 2008, 73%; Rwanda 2007, 90%; Kenya, 2008, 86%.

- 55, “VillageReach. Milestones”: The citation is used to provide the source of information on the hand-off of the Cabo Delgado project to the local government’s responsibility in 2007. The citation is accurate both in letter and in spirit.

- 68, “VillageReach, Cabo Delgado: Six-Month Process Evaluation (February 2011),”: The citation is used to provide the source and the detailed information on a short-term financial problem of the [local] government and its effect on VillageReach. The citation is accurate both in letter and in spirit.

- 80/81, “VillageReach, Mozambique Budget with GiveWell Additions (February 2011, updated April 2011),”, “VillageReach, Health System Strengthening in Mozambique,”: The citation is used to support the claim on the aggregate cost-per-vaccination for the project in Mozambique.

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10 Measure DHS.Statcompiler: [http://www.statcompiler.com](http://www.statcompiler.com) (assessed 27, August, 2011)
using either only the Mozambique costs (80) or the total costs including the costs for the South
Africa project (81). The footnote 80 is accurate both in letter and in spirit. Yet, it is not clear
to us why GiveWell used the expense in the year to 2010 which includes the budget of
South Africa project which will last three years in order to estimate the costs for six years
in the footnote 81.

- 29, “Organization Budget (2010)”: The citation is used to provide the source on the
information about VillageReach's overall budget reported in a table following the citation. The
citation is accurate in letter. However, from the wording therein, we find it unclear if the
budget for the South African project (the matching requirement, $33,333) is already
included in “Other contract Engagements (aside from Malawi)” or not.

- 84, the citation is used to provide the source on the information about VillageReach's funding
gap for 2011. The citation itself is accurate in letter, but we found that there is a minor
inconsistency in figures in “Mozambique Budget with GiveWell Additions (February 2011,
updated April 2011)”. The “indirect” cost, which is referred to be 14% of the total budget is
given as 13% of the “direct” cost from 2011.

• Fairness of summary. Having read the entire review and spot-checked footnotes, please read
the summary at the top of the review. Does it accurately and fairly summarize the content of
the full review?

: The organization is briefly and broadly introduced in terms of its vision, acting area, activities,
and history, and the GiveWell’s assessment on the organization is given in terms of cost-
effectiveness. The summary of the contents of the full review is overall fair and accurate.

• Independent assessment of the charity. Please attempt an independent assessment of the
charity.

○ Charity’s activity

: VillageReach is a non-government-organization improving the distribution system for
vaccines as well as for the relevant facilities, partnering with governmental and non-
governmental organizations in very rural areas mainly in Mozambique. Their main activities
include training the logistic experts dedicated to the regular vaccine distribution, applying
information technology for the inventory management, and distributing the necessary
facilities such as refrigerators and injection safety equipment.

○ Assessment with respect to

  ▪ Proven: In order to assess the impact of VillageReach, we need to examine (a) the
impact of immunization program on the life change; and (b) the impact of the
organization’s program on the immunization rate. The documents showing evidences for
the (a) at the micro-level as well as at the macro-level are collected in [1]. Besides, we
agree with GiveWell that the life-changing impacts of vaccines for children are already
well accepted in the medical community.

  ▪ Mozambique: In Cabo Delgado, there are evidences that the coverage of DTP 3
has increased significantly more in the pilot area than the comparison area from
2003 to 2008 [2]. For other vaccines as well as syringes, there are evidences that
they have been delivered to the clinics, and that the drop-out rates have been
significantly lowered [3]. We find it reasonable to assume that the trained
medical staffs who had been under the high stock-outs of vaccines will use the
supply appropriately and consistently. For these reasons, we believe that the
program is proven.
- South African project: We have tried to contact VillageReach individually as
instructed in GiveWell's web page, using the contact form on VillageReach's
website in order to collect more information. However, VillageReach did not
answer to us.
- VidaGas: This social business activity should be examined as an economic
empowerment program, applying the criteria designed for it. However, we do not
consider this program further, since (a) the stake of VidaGas from VillageReach's
budget is very small, for instance, in 2010 < 3% [4]; and (b) we could not find
enough information published.
- Cost-effectiveness: The best estimate we found for the cost per fully-immunized child is
also $14.21 in sub-Saharan Africa by Jamison et al, which corresponds to a cost per
death averted of approximately $200 [5]. This cost is presumably estimated in the
system without VillageReach's program, which includes the costs for vaccines and
labors. Below we will assume that this cost is still there with VillageReach's program12.
We will consider the cost-effectiveness as follows, using the data in [2]:
\[ X: \text{total cost for immunization without VillageReach} \]
\[ A: \text{number of vaccinated child without VillageReach}^{13}. \]
\[ A = 40324 \text{ in 2003}; \]
\[ (\text{cost per vaccinated child without VillageReach}) = \frac{X}{A} = $14.2 \]
\[ X = $14.2 \times 40324 = $573,004 \text{ in 2003} \]
\[ Y: \text{cost for VillageReach program} \]
\[ X': \text{total cost for immunization except VillageReach} \]
\[ B: \text{number of additional vaccinated child with VillageReach} \]
\[ (\text{total number of vaccinated child}) = (A+B) = 50588 \text{ in 2003} \]
\[ X' = $14.2 \times 50588 = $718,855 \]
\[ (\text{total cost}) = (X'+Y) = $(718,855+258,989) = $977,844 \text{ in 2003} \]
\[ (\text{cost per vaccinated child with VillageReach}) = \frac{(X'+Y)}{(A+B)} = $19.3 \text{ in 2003}. \]
Applying this computation in 2003-2007, including the total cost of VillageReach in this
period, we find the cost per vaccinated child with VillageReach $27. As expected, the
cost has increased with the VillageReach's program. On the other hand, the number of
vaccinated child has increased significantly. Since VillageReach's program adds only the
cost at the first sight14, it can be seen as a trade-off between those two. We believe that as
long as the cost per vaccinated child with VillageReach is lower compared to the other
health-improving programs, we should consider VillageReach's program as being cost-

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11 In [10], it is claimed to be $30-$40, presumably depending on the region and other relevant factors. Assuming such high
costs, the cost-effectiveness will be much lower.
12 Here to be conservative, we neglect the portion for the transportation which overlaps with VillageReach's program in
this $14.21. Also see Footnote 6.
13 We assume that the immunization rate in Cabo Delgado would have been the same as that in Niassa without
VillageReach, and linearly interpolate the data between 2003 and 2008, as GiveWell did.
14 We believe that the more efficient transportation program with VillageReach will save money in the long run, for
instance, by reducing the contaminated and thereby wasted vaccine or syringe, let alone the efficiency of transportation
itself, but it is hard to estimate them reasonably precisely, and we took the conservative approach by neglecting this. In
fact, VillageReach claims that “The dedicated vaccine logistics system in Cabo Delgado was 23.2% less expensive than
the Niassa system on an absolute level.” in [6]. Even though we trust them, we don't know what is really saved in the
full list of the costs.
efficient. Extrapolating Jamison et al.'s result linearly, we find that $27 per vaccinated child in sub-Saharan Africa corresponds to about $380 per death averted, which is, at least as good as the other health-improving priority programs by GiveWell. Note, however, that the data used here from VillageReach is collected for the pilot program and the estimates by Jamison et al. are out-dated.

- Ability to use more funds productively: There is a clear road-map for the whole project which is planned to take six years [7][8]. Accordingly, VillageReach claims that there is a funding gap of approximately $3.2M for the project completion in [7], which is updated in August, 2011. However, from the information that VillageReach is seeking financial support for provincial government, that spending of VillageReach has been behind the projected budget due to the slow start [7], and that the revenue was more than the expenses in 2010, we believe that funding is currently not the most critical problem for VillageReach to commit the program.

- Transparent: VillageReach is sharing its self-evaluation analyses and case studies as well as its budgets and plans. We find that VillageReach's transparency is reasonably high, but it is relatively hard for a casual donor to get an overview of the VillageReach's most recent activities, for there is no standard annual report.

  - Is there any publicly available information that calls into question GiveWell's assertions about the charity's activities, evidence for impact, evidence for cost-effectiveness, or room for more funding?
    : We found no publicly available information which contradicts with GiveWell's assertions.

  - Does this independent assessment raise any important issues not discussed in the GiveWell review?
    : In [10], economical impacts of immunization are briefly given, e.g. that the internal rate of return on immunization is higher than the educational investments.

**Bottom line.** Please summarize whether you feel GiveWell has reached a reasonable assessment, based on the most relevant available information and best available analytical methods and data, about the extent to which this charity meets its criteria.

 : Based on GiveWell's standard review on VillageReach, we believe that GiveWell has reached a reasonable assessment about the extent to which this organization meets its criteria. In particular, we also find the evidences of impacts, transparency and self-evaluation excellent. The cost-effectiveness seems to be slightly overestimated, considering that VillageReach is an organization working to improve only the logistics among various factors that affect vaccination. However, we believe that even being more conservative, the conclusion will not deviate much.

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15 The newest report (October, 2011) for the impact evaluation by VillageReach, from which one can get the data on, e.g. immunization coverage, which can be found on its website is still that published in 2008.
**Bibliography**

2: Mark Kane, Evaluation of the Project to support PAV in Northern Mozambique, 2001-2008, 2008
3: VillageReach, FDC, MISAU, 5-year assessment of the project to support PAV Cabo Delgado province, 2007
4: VillageReach, Organization budget, 2010
5: Jamison et al., Disease Control Priorities in Developing Countries, 2006
6: VillageReach, Comparison of Costs Incurred in Dedicated and Diffused Vaccine Logistics Systems, 2009
7: VillageReach, Health System Strengthening in Mozambique, 2011
9: Gauri and Khaleghian, Immunization in Developing Countries: Its Political and Organizational Determinants, 2002
11: GAVI, Immunize Every Child, 2000 (Googling)

**Additional Sources (Part 2 – Continued)**

**Examined**

- VillageReach, FDC, and MISAU, 5-year Assessment of the Project to Support PAV Cabo Delgado Province, 2007
- Miller and McCann, Policy Analysis of the Use of Hepatitis B, Haemophilus Influenzae Type B-, Streptococcus Pneumoniae-Conjugate and Rotavirus Vaccines in National Immunization Schedules, 2000 (Googling)
- Moz budget with GiveWell additions, updated April 2011.xls, Downloaded from GiveWell website
- 02.18.2011.GiveWell Report.doc, Downloaded from GiveWell website
- 02.09.2011.MozGap.xls, Downloaded from GiveWell website
- VillageReach Cost Estimates.xls, Downloaded from Givewell website

**Clicked/Downloaded**

- VillageReach, 6-2010.VillageReach-At-a-Glance.pdf, 2010
- VillageReach, VillageReach historical timeline.pdf, Downloaded from VillageReach website in Aug., 2011
- VillageReach, 110815-VillageReach-History-in-Mozambique.pdf, Downloaded from VillageReach website in Sep., 2011
- VillageReach, Social-Business-Solutions-8.092.pdf, Downloaded from VillageReach website in Sep., 2011
- VillageReach, VillageReach-Mozambique-expansion-summary1.pdf, Downloaded from VillageReach website in Sep., 2011
- VillageReach, 2010 Revenue Attribution.xls, Downloaded from GiveWell website in Oct., 2011.
- http://www.iumap.org/?s=vidagas
Appendix: A Short note on the update page of VillageReach review, dated on August, 2011

According to our understanding, this update page is not a standard review of GiveWell, yet a brief note provided to complement the gap (in time) between the information used for its standard review and that GiveWell has collected in the meanwhile.

- **Transparency**
  - VillageReach: A large portion of information, similar to of which has been already used to evaluate the pilot program is now stated to be forbidden by government to be public\(^{16}\). We expect GiveWell to clarify this point in its standard update.
  - GiveWell: A large part of statements seem to be based on the private communication with VillageReach. We expect GiveWell to publish the information in its standard update (e.g. as a link to a PDF file for the email exchange with VillageReach, or edited phone conversation.).

- **Cost-effectiveness**
  - It is hard to determine at this point, without any solid data. However, reported delays in Niassa as well as reported high current vaccination rate in Maputo raise concerns for lower cost-effectiveness there than in the pilot area.

- **Room for more funding**
  - We cannot confirm GiveWell's estimation on the funding gap, having no relevant information. However, trusting it, it seems that the funding gap for the long term plan is larger than previously reported. On the other hand, the plans now become less clear.

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\(^{16}\) Examples of this are:

- "VillageReach told us that it is collecting monthly data in the province but that it is only able to share progress reports with us every 6 months, due to government restrictions on data sharing."
- "Based on the baseline study, current vaccination rates in Maputo seem extremely high\(^{23}\) - significantly above the levels VillageReach used when it estimated the impact of its program (VillageReach has not been granted permission by the government to share details publicly)"
- "VillageReach told us that government has not given it permission to share data on stock levels."