

OFFICE NATIONAL DE L'ASSAINISSEMENT DU SENEGAL



BILL & MELINDA
GATES *foundation*

PROGRAM FOR THE STRUCTURING OF THE FECAL
SLUDGE MANAGEMENT MARKET FOR THE BENEFIT
OF POOR HOUSEHOLDS IN DAKAR

PROGRESS REPORT

I. Summary Information

Grant Information

Project Name	Market Structuring of Sludge Management for the benefit of Vulnerable households in Dakar		
Organization Name	ONAS		
Grant ID#	OPP1029666	Foundation Program Officer	Doulaye KONE
Date Grant Awarded	November 2011	Project End Date	January 2017
Grant Amount	\$ 4 932 446	Project Duration	60 months
Report Period from	November 9, 2013	to	Month Year December 10, 2013
Report Due	December 10, 2013		
Has this project been granted a no-cost extension?	No		

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II. Project Progress and Results

Key Milestones Tab

Objective	key milestones	Target in Year 2 (nov.2012 to Dec.2013)	Actual Key milestones results
<p>Research identifies, tests, and evaluates key interventions to increase demand and competition in the fecal sludge emptying services market</p>	<p>Economies of scale, increased competition, and coordinated markets reduce costs for FSM by 10% per year for 3 years in the target communities with population of 120,000</p>	<p>Identification of existing market and service provision</p>	<p>The baseline (situational analysis) and the market studies reports have been validated by the Program Coordination Unit (PCU). The final versions are available.</p>
	<ul style="list-style-type: none"> • At least 80% of the sludge operators registered in the association are approved and have access to the dump sludge station 	<p>Identification and assessment of existing laws, regulation & accreditations</p>	<ul style="list-style-type: none"> • The final version of the report on Laws and Regulation validated by the coordination team is available. • The final version of the report on the Certification process of emptiers validated by the PCU and emptiers is available. • The manual of emptiers is also available. • Series of meetings has been held with several stakeholders such as the Police, the National Hygiene Service, The Environment Department and the Association of Mayors for the purpose to exchange on the Certification process and the way to create and sign a decree by the President of the Republic and later on to enforce it. • A workshop to share the research findings has been held with the other actors in order to keep them updated.
	<p>Local partners and private enterprise are able to monitor and respond to customer led demand for FSM creating a living map of community needs</p>	<p>Data collection</p>	<p>The calling center is well functioning. The Beta and pilot phases have been completed. The dissemination phase will be starting in early December 2014.</p>
	<p>Measurement of the direct impact of the full at-scale project on household take up rates of hygienic sanitation services in the targeted regions of Dakar.</p>	<p>Monitoring tools & processes implemented</p>	<p>A M/E tool has been elaborated, but it's early to measure the direct impact of the project because it's only the second year of implementation.</p>

Objective		Target at period end	Actual results at period end (and explanations)	Future milestone target revisions (if necessary)
<p>Research identifies, tests, and evaluates key interventions to increase demand and competition in the fecal sludge emptying services market.</p>	<p>A trial of subscription sanitation services for 4,000 households in 400 neighborhoods is conducted including randomized trials of marketing strategies and project designs taking advantage of social, behavioral, and savings factors affecting willingness to pay for sanitation services at the household level are integrated into the trial of subscription services, and 800 additional households are surveyed in the 400 neighborhoods for calculation of spillover effects. (IPA)</p>	<p>Initial data collection from first cycle of subscription services completed, and baseline data on neighboring 2 households collected. Mobile money systems rolled out for automated payment of desludging services and savings by research households. Community meetings in pilot area (Sicap mbao) for call in center roll out and advertising</p>	<p>Demographic data collected from 400 neighborhoods; preparation for collection of subscription data and roll out of mobile money services for automated payment of desludging services and savings; two cycles of community meetings, poster, and door-to-door visits conducted in pilot area (Sicap Mbao) for call in center roll out and advertising</p> <p><i>The IPA team has focused much of its time and effort on preparing and supervising the call center; despite these efforts, the technical preparations of the call center went much slower than expected and delayed its launch.</i></p>	<p>Period Three: First and second cycles of subscription services take place; endline survey to follow treatment offer by at least 9 months.</p> <p>Grant end: Third cycle of subscription service takes place; endline survey conducted; data analysis completed and research papers drafted; 2,500 research participant households pay consistently for sanitation services through ONAS management systems.</p>
	<p>A research paper measuring and analyzing industrial organization factors in the restriction in sanitation supply in Dakar. (IPA)</p>	<p>Beta and pilot for the call-in center conducted, midline price-dispersion survey data collected, auctions rolled out.</p>	<p>Beta and pilot for the call center conducted; auctions rolled out, monitored, and design modified based on results; preparations to launch call center at scale</p> <p>Given the late launch of the call center, we did not conduct the midline price dispersion survey as there would not have been enough activity over a significant amount of time to measure changes in desludging due to the call center. As the center is going to scale soon, we will plan to run the midline survey a few months into the at-scale operations.</p>	<p>Period Three: midline price dispersion survey data collected; auction system evaluated through cleaning prices and baseline and midline surveys; call center desludging system evaluated for impact on competition among desludging service providers and initial impact of the call center on household desludging prices.</p>

Key Milestones Tab of the Coordination Component

Objective	Key Milestones	Target Year 2	Actual Key milestones results
Sector interventions are successful and made sustainable through adequate coordination, management and technical oversight.	A project document exists and is updated quarterly in order to measure the level of progress based on indicators, and to supply data for PEPAM's database and the internet portal	4 Quarterly reports are elaborated and 4 updating of the database of PEPAM are done.	A semi-annual report is produced and shared with all the partners. As for PEPAM database updating, it is planned to develop a web site which will integrate the PEPAM web portal.
	An action plan including a monthly monitoring component is developed and monitored by all actors; procurement procedures, contracts and disbursements of the various components are processed, the expected products (results) are delivered by all components.	12 monthly reports of the program including reporting from each component; 12 monthly meetings coordinating; the disbursement is about 30%.	11 monthly reports were produced and reviewed at the coordination meetings.
	Twenty municipalities, six ONAS regional services, five regional structures of private operators and one association in Dakar are equipped and trained.	25% of the municipalities, ONAS Regional service and the private operators are trained. The municipalities of Pikine and Guédiawaye and the private operator are trained and equipped.	Two training workshops were organized for emptiers and ONAS regional services. Eight community district level workshops were organized corresponding to 38% training of the total municipalities.
Marketing program led by the sanitation workers about the importance of use of mechanized desludging services	In the project zone 90% of households (target zone) have seen the visuals or listened the messages at the radio and the manual emptying decreased and households practicing manual desludging have subscribed to mechanical desludging services	50% of the target population have seen or listened to the messages at the radio.	The impact of broadcasted messages and posters was evaluated in the project area and testifies for good acceptance of the program. To date, more than 20 broadcastings (awareness spots and sketches) are made through the television and 220, through the radio.

			6000 posters are put up and 5000 flyers are distributed in the project area.
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Progress Narrative
Research Component:

Market study

Market research has been finalized and approved by the Programme Coordination Unit . The main results are as follows:

- 98.2% of the population of the study area use onsite sanitation facilities, which corresponds to a production of 1000 m³ of fecal sludge per day, representing a potential annual market of 2.2 million \$US;
- The average cost of mechanical emptying amounted to 51.4 \$US in the study area;
- 66% of emptying companies do not have legal existence (informal sector);
- 68% of companies are of small (1 truck), 27% medium-sized (2-5 trucks) and 5% are large companies owning more than 5 trucks;
- The average age of trucks is 15 years;
- 68-74% of charges of emptying companies are related to operating costs;
- 36-41% of operating costs are related to fuel, 13 to 15% to the tipping fee and 7-12% to maintenance / repair of trucks;

The size of the company strongly influences its profitability. Indeed, the activity of emptying is not profitable for small and medium size companies (profit < 20%). On the other hand, it is profitable for large companies.

Based on the results of the study, a prediction model of the sludge market in the study area was designed.

Laws and Regulation Study / Certification process

An important advocacy activity has been conducted for the establishment of an appropriate legal framework to organize the fecal sludge sector. Fruitful discussions were held with all stakeholders. In summary, it was found that the best way to accomplish this is to bring the President of the Republic to take a decree which will be based on Article L83 of the sanitation code acting about the organization of the activity of sludge emptying. Contacts are in progress with the cabinet of the President of the Republic.

A compromise has been reached with the emptiers about the certification criteria and the planning for the implementation. Furthermore, all the stakeholders have been involved in the process. A validation workshop will be organized in December 2013.

Research in sanitation technologies

The report on the sanitation technologies was submitted by WSA and validated by ONAS. He addressed the entire value chain of fecal sludge management: storage in the household, collection, transport, treatment and reuse.

Measurement of the direct impact

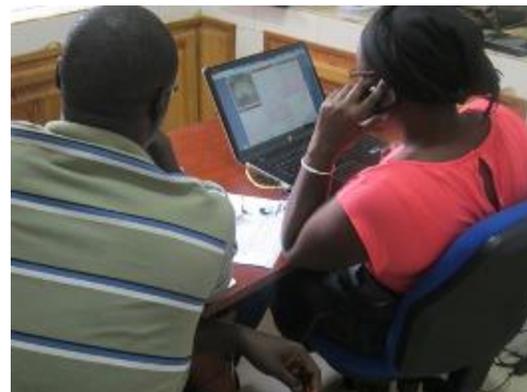
The execution phase of scaling up the call center was delayed due to the lateness completion of the call center platform programming. It has therefore not been possible to carry out surveys to measure the impact of the project in the study area, particularly on the faecal sludge market. However, it was noted that the principle of competition is well understood by emptiers, which resulted, during the pilot phase, a decrease in the cost of emptying in some tenders. The scaling phase will allow to verify this trend.

Marketing of Subscription Services

Over the past year, major advances have been made in this project.

We worked with the whole stakeholders over the past two years to design and develop the call center - at the end of 2013, the call center was launched and the first customers were registered.. Making the call center operational occurred in multiple phases: starting with the elaboration, in the first months of the year, of a strategic document describing the scale-up and commercial plans for the center. To prepare the call center's technical platform, a technical specifications document was finalized with Manobi (*Subcontractor of WSA & IPA*) and throughout several phases of benchtesting, a mostly bug-free platform was achieved. The physical installation of the call center was also carried out, namely purchasing furniture and equipment as well as the recruitment and training of an operator in June 2013.

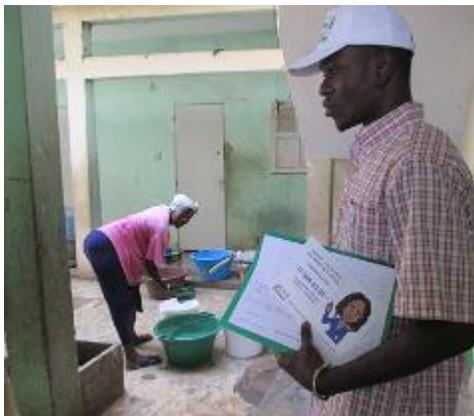
All active desludging truckers in Dakar were visited and their consent to participate in the call center was asked. In late June, truckers were trained, by sector, in four sessions: Grand Médine, with 68 participants; Guédiawaye with 23 participants; Diamaguène-Sicap Mbao with 42 participants, and Pikine with 34 participants. In the months following these trainings, several visits to garages and treatment plants were organized in the purpose to reinforce the training on truckers' participation in call center auctions in an head-to-head mode.



The first phase of the call center is the “beta” phase, in which we conducted several tests in situ, with real clients, in favorable conditions, to test both the technical and operational aspects of the call center at a manageable scale, in the goal to prevent any crucial problems before scaling up. To prepare the launch of a Beta 0 phase, a list of participants was collected from program partners to become the call center's first clients. From 15 to 26 July, the first auctions were launched and the treatment of the incoming calls from these participants. The potential bugs and needed improvements were noted and the training of the new operator was continued. Then, an implementing area was identified for the Beta 1 phase, where the pilot zone would not be affected; a census was conducted in this zone, the Ouest Foire neighborhood, in mid-May, in order to add these client profiles to the call center platform. The call center is promoted in this Beta 1 zone in July, first creating promotional supports (posters, flyers, t-shirts), then recruiting and training a promotional team, and finally supervising door-to-door visits and a poster campaign. From 29 July to 23 August, SMS messages requesting pit's desludging from residents who were involved in the census were also received. Auctions were organized for the treatment of these requests. During this beta phase, 58 successful auctions were launched and 40 desludging were completed successfully.



To prepare for the launch of the pilot phase, we spent a week after the Beta phase analyzing data, reviewing potential bugs and improvements, and reinforcing certain elements of training with the operator. We then launched a promotional campaign in the pilot neighborhood of Sicap Mbao, creating promotional supports, training the promotional team, and supervising promotional activities. During the first round of promotional activities in late August and early September, we completed roughly 2000 door-to-door visits, hung 200 posters, and facilitated 8 community meetings with 8 different neighborhoods and community groups. In a second round of promotional activities in November, we conducted around 1000 door-to-door visits, hung an additional 150 posters (the majority of the original 200 were still hanging), facilitated 7 new community meetings, hung a promotional banner across the main neighborhood entrance, and launched a SMS informational campaign. The pilot phase was launched on 2 September and will continue until the preparations to bring the call center to-scale (Dakar) are completed. Through 25 November, we have launched 40 additional successful auctions, and completed 19 additional successful desludgings during this pilot phase.



Throughout the process, we have been observing the call center's activities, supervising the operator, sharing regularly the progress and challenges during the monthly meeting, working through bugs and improvements with Manobi, and analyzing the data generated by the call center's activities. Based on these analyses, we have adjusted certain of the call center's operational parameters to improve results. Initially asking clients to commit to a maximum price, we have now changed to a no-commitment model for the customers so that they are willing to call in without knowing the final price that will be offered to them. We are also no longer setting a maximum price, so that there will be bidding on all households. We have increased the number of participants in each auction, and weighted invitations based on past participation, in order to ensure that more auctions that are launched receive at least one or two valid bids from interested desludging operators. Progressively, along with these changes, we are seeing that desludging operators have been bidding with increasing frequency, the bidding is becoming more competitive, and we are beginning to see price decreases.

We are currently working to prepare for the call center's scale-up to the entire project zone, ensuring technical, material, and personnel preparation. These preparations will continue in the coming weeks, and will soon be accompanied by a mass communication campaign to promote the call center in the project zone.

Having finalized the call center platform design and operations, we have also worked this year with CSI to prepare the mobile money component of the call center for testing in the willingness to pay/marketing study. The system includes not only the standard Wari payment system, but also a new CSI savings accounts platform which we expect to help households to be able to save for mechanized desludgings. We are currently bench-testing the mobile money component, and expect to go to the field with it in December or January.

We have made substantial progress in cleaning and analysis of the treatment center data, and have a dataset that includes all three treatment centers and begins in 2006 and extends through 2012. We are currently adding 2012-2013 data to the dataset so that we will be able to observe the impact of privatization of the treatment center which occurred since 1st november 2013..

Understanding the Organization of the Desludging Services Sector

We have conducted extensive preparation for the second round of the willingness-to-pay study baseline, to be rolled out in January 2014. We began by mapping the willingness-to-pay research sample zones, including a field collect, a subsequent period of data entry and cleaning (including a list of roughly 2000 landmarks necessary for call center operations), and preparing these mapping tools for exploitation during the survey phases. We developed and programmed questionnaires, both for the first and second rounds of the willingness to pay survey, and piloted the first round. We recruited and trained enumerators for Round 1, and completed the Round 1 (“demographic”) field collect from 28 August to 25 October. Cleaning data began at the beginning of the survey, but is still underway. We are currently preparing the relevant data for Round 2, which will focus on offering the interventions to the household’s desludging “decider”, and on creating and refining the enumerator and team leader training materials.

We have conducted analysis of Price Dispersion study data. This has included cleaning the data, analyzing the data, preparing a report on the data, and combining the data with the trucker and treatment center data.

Works Component:

Building of the FSTP

It should be reminded that the program plans to build a new fecal sludge treatment plant in the Rural Community of Tivaoune Peulh_Niag not only to bring the sludge disposal facilities closer to the desludging operators to help reduce the desludging cost but also to reduce the far exceeded loads of the other three stations receiving more than three times their original volumes.

During the first year, we completed the Preliminary Design (APS) and Detailed Design (APD) studies, and the ToRs for the environmental and social impact assessment.

In the second year, we conducted the following:

- The environmental impact study, which was pre-validated and validated by the Directorate of Environment and Classified Establishments (DEEC) before its recent validation in public hearing by the beneficiaries.
- The bidding documents were also elaborated and validated by the Central Directorate for Public Procurement (DCMP)

The call to bid for the construction of the station will be issued during the month of January 2013.



Photo1 : Public Hearing on Environmental Impact Assesment (EIA)

Delegation of FSTPs

During the first year, the work focused on the feasibility study on the delegation of the FSTPs, the bidding documents, and the assessment report to issue the contract at national and international levels. After the validation of these documents by the Central Directorate for Public Procurement (DCMP), Eight Senegalese companies showed interest in the bidding documents and only one submitted a bid. It is the Delta/Vicas consortium.

We completed the process during the second year. The ONAS has already signed the concession agreement with the Delta/Vicas group, which has started operating the three fecal sludge treatment plants.

Coordination Component:

Guarantee Fund

The guarantee fund implementation agreement has just been signed between Senegal National Sanitation Utility (ONAS) and the Sahelo-Sahelian Bank for Industry and Trade (BSIC) after a long process which lasted several months. In order to get the best offer, a request for proposal had been sent to all the banks in Dakar with a 15 days deadline for financial proposals. At the conclusion of this process, five banks answered to this request.

In view of evaluating the received offers, a consultant specialist in banking and with great experience in the operation of guarantee fund, was recruited. The consultant started by meeting several fecal sludge emptiers with the aim of inquiring about their expectations with the guarantee fund. He then carried out the evaluation of the received offers and their classification. He quickly realized that none of the individual financial offers deals enough with the PSMBV guarantee fund issue. He then established a financial counter-proposal sent to the five banks that answered to the request of proposal with a 15 days deadline for a new tender.

At the conclusion of this second phase, only three banks answered by sending an offer that the consultant evaluated. The best financial offer got comments on its tripartite agreement technical and legal terms. The technical and legal terms define essentially the level of responsibility of the guarantee fund when establishing funding for the emptier and in the event of a payment problem by the latter. They also indicate the monitoring mechanism of the operator commitments with the bank.

Following the signing of the agreement between ONAS and BSIC, the next stage is the training of the desludgers who are likely to be given secured credit through the funds. They will be trained in the finance mechanism and the need for them to respect the credit refunding schedule in order to increase the number of recipients.

Workshops organized

Workshops for information on the program for emptiers and ONAS regional services:

Two workshops for information to the intention of the emptiers were organized during the month of April 2013 and November 2013. They were about:

- The fecal sludge management value chain: on-site facilities, sludge collection and transport mode, processing and promotion, new paradigm (link sanitation and business),
- Autonomous sanitation and ONAS role,
- Delegation of the FSTP: objectives, contents, relationship between emptiers and delegator, ONAS role in the new configuration, etc.
- Access to credit for desludgers: system planned by the PSMBV,
- Which organization is best for emptiers vis-à-vis the new challenges?

The workshops permitted the program to better inform and make the actors aware of its objectives and activities.



Photo 2: Workshop for information to the emptiers



Photo 3: Workshop for information to ONAS regional services

Technical committee meeting

After the setting up meeting of November 2012, the technical committee met three times in the course of this year presided over by the Director of Sanitation to assess the Program progress report.



Photo 4: Technical committee meeting

Coordination and monitoring activities:

The monthly coordination meetings are often organized to assess the level of achievement of the objectives and find out the constraints and major problems.

The data provided by the various partners also allow us updating synthesis tools and identifying the major trends in terms of achievement of the program objectives.

Apart from the monthly meetings, working sessions are frequently organized to share strategies and methodologies.

Component Flood-Prone Areas

We should not forget that this component was added to the basic program in the course of the second year of implementation of the program; it is monitored by Oxfam America in collaboration with ONAS.

As this is the very first reporting period of three, almost all activities undertaken through-out the period consisted of 'laying-down' a solid foundation to successfully implement and meet the five objectives. To this end, the following major progress was made among others:

- MoU was developed, agreed and signed between ONAS and Oxfam.
- Baseline study for behavior change initiative in Pikine and Guediawaye was conducted and completed;
- Topographical study and cartography/mapping of the two locations were undertaken and completed;
- Market and livelihoods profile study was conducted and completed;
- Criteria for the design and selection for two to three innovative sanitation technology models was developed;
- A strategy for engagement of communities and partners with local and national authorities was developed, and training of communities just began.

Marketing Component

The implementation of the communication and awareness strategy is an important component of the Program for the Structuring of the Fecal Sludge Market (PSMBV). It sets out the strategic guidelines of the communication and awareness actions aimed at making the Program more visible, facilitating ownership by the beneficiaries, boosting and encouraging behavior change expected from the communities and public and private actors.

To this end, four major television channels (RTS, Walf TV, RDV, and TFM) and five major radio stations (Walf FM, RFM, Sud Fm, Oxy Jeunes, and Ndeflene) were mobilized to deliver messages .

As of 1 December 2013, more than 20 television broadcasts were made and 220 radio airplays.

The mass communication tools reached the targets of the program, the message delivered through the radio and television spots was clear, understandable and convincing.

Alongside this mass communication, we conducted eight (8) workshops at the town district level to reinforce the institutional foundation of the program and to strengthen the ties between the town districts and the ONAS.

Communication Tools



Key Milestone Deviation

We had expected to begin our initial data collection for the call center in early 2013, but the roll out of the call center was delayed by technical issues until September 2013. In July and August 2013 we beta-tested the call center for technical issues, and in September we began the pilot of the call center. The delay in the call center also led to delay the willingness-to-pay treatment. We ran the demographic survey for the willingness-to-pay survey in fall, 2013, and we are finalizing bench-testing of the mobile money component for the willingness-to-pay treatment to prepare for field testing in January 2014.

Because the call center was delayed, and was launched at a particularly difficult time of year, take-up and use of the call center in Sicap Mbao hasn't had time to catch on yet. We decide in November to prepare for scale up of the call center and the pilot phase was cut short (from 9 to 3 months) and the scaling will start earlier than expected, in December 2013. Because this means that the call center will now be advertised in our control zones, we will no longer be able to measure the impact of the call center on overall prices in the zone.

Concerning the *Flood-Prone component*, there were no major key milestone deviations in content except for some delays (e.g. development of the Business Plan). The development of the Business Plan needed the completion of study documents mentioned above, and hence delayed until all these documents were completed. However, the delay will not entail significant adverse impact on continued implementation of the project during the second report period. The one 'deviation' in terms of content that may be worth mentioning is the number of innovative sanitation technology models mentioned under Objective 2, which is proposed to change from 3 -5 to 2-3. This was also discussed with our Program Officer at the foundation (see also 'Key Milestones spreadsheet' report). We discussed the case and concluded that more than 3 (if that) models are not necessary, as the technology piloting locations are not very wide.

Achievements of the indicators

After one year implementation of the program, a lack of consistency in the program's objectives and indicators definition was noted. In fact, the selected indicators and objectives were not specific enough to allow the assessment of the changes which would have resulted from the program in the course of the implementation.

Due to the importance of the indicators in the measurement and assessment of the impact of the program, not only for guaranteeing the accountability and transparency towards all the stakeholders, but also to ensure the program continuity, a workshop dedicated to sharing out with the program partners was organized to review contract indicators and objectives in order to make them relevant, significant and realistic.

This permits us to select a number of indicators among which:

Indicators	Achievements of the Indicators	Comments
<p><i>12200 of direct beneficiaries served by call center (through calls or through subscription purchase) to empty their septic tank.</i></p>	<p>702 direct beneficiaries served by the call center to empty their septic tank</p>	<p>59 desludgings treated by the call center, with an average of 11.9 beneficiaries per desludging.</p> <p>The pilot phase was initially planned for a 9-month period. Due to a delay in the technical development of the call center, the pilot started September 2, 2013, and thus has been operational for roughly 3 months. It should also be noted that we have approximately 5.1 calls per week, with 2.8 calls converted into actual desludgings each week. Because prices will take some time to go down as desludging operators become more competitive, we expect a larger and larger percentage of these calls to be converted into actual desludgings. To meet this indicator, we would have needed approximately 115 desludgings to occur per month over the 9 month period. As we saw from the baseline survey, about 5% of households desludged per month between October and December of last year, so this target would have been more than the estimated 75 mechanicals desludgings per month in the pilot zone. (November and December appear to be low months for desludgings compared to August and September.) As prices get bid down and desludgers learn to offer lower prices to the call center in order to get business, we can expect that these calls are more likely to end in desludgings.</p>
<p><i>40% of desludging request calls to the call center are ended in a desludging service being provided</i></p>	<p>55% of desludging request calls to the call center have ended in a desludging service being provided</p>	<p>Initially, we would only launch an auction if the client agreed with the principal that a desludging could cost up to 30,000fcfa. After having noted that the 30,000fcfa price seriously limited the number of auctions launched, and thus the participation and motivation of desludgers, we removed this condition and launched auctions for all clients requesting a desludging. This change has resulted in a higher rate of clients refusing the proposed price, but we are still maintaining a high overall average of successfully treated desludging requests. As the auctions become more competitive we also expect to have more of the households accept the prices. The 30,000fcfa starting price also seemed to be creating a focal point for desludgers at 30,000fcfa, so that desludgers were not bidding the price down as much as we had expected; the removal of the 30,000fcfa maximum seems to have made the price go down to some extent. With 107 calls since launching and 59 desludgings, 55% of calls have ended in a desludging.</p>

<p><i>Average rated satisfaction of households is more than 50% with desludging services gained through the call center</i></p>	<p>Average rated satisfaction of households is 98% with desludging services gained through the call center.</p>	<p>Clients systematically remark that they appreciate the call center's service, both the facility of the service and its quality. 93% of clients report the highest level of satisfaction with the quality of service of the desludger, and 98% report the highest level of satisfaction with the call center.</p>
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Course Correction

We will meet the key milestones, although we will be slightly delayed in achieving them. Although technical issues in the call center delayed all activities, we are now moving forward and expect to go to the field with the second component of the willingness-to-pay survey in January.

Now that the call center is operational and that the "scaling" stage will start earlier than expected, we believe that the research component of the project does not require major modification.

By the end of this year, the process of certification will be validated by all the actors. However, it is important to ensure good support for emptiers in the certification process through:

- The effectiveness of access to financing facilitated by the guarantee fund,
- and **finalization of the omni-Ingestor** to solve issues related to pumping of solids and access to pits inaccessible to conventional trucks (sandy areas, narrow street).

Plans for the Next Reporting Period:

- In the next reporting period, we will start by preparing for the call center's scale-up, including technical improvements of the call center's platform, continued analysis from previous phases to suggest operational improvements, and intense training and supervision with the new operator. Once the scale-up is successfully launched, we will then begin round 2 of the willingness-to-pay treatment. After the willingness-to-pay treatment has been completed, in Spring, 2014, we will prepare to go to the field with the midline survey of the price dispersion survey. This will allow us to observe the impact of the call center on take-up of mechanical desludging in Sicap Mbao and other areas of Pikine.
- With regard to neighborhood communication, more workshops will be held at the municipal level, focal points will be identified and trained, and mass communication based on the call center will be disseminated in the scaling phase.
- The construction of the fecal sludge treatment plant planned will also start in the course of the year 2014. The call for tender will be launched at the latest in first half of January.
- In terms of grassroots communication, it is expected to continue the workshops at district level select and train relays, carry out mass communications centered on the call center in the scalability phase.
- During the third year we will continue the process of the certification, through a validation workshop and advocacy at the level of the Cabinet of the President of the Republic. We will conduct also a mid-line evaluation of the project.

Risks:

- One significant concern is that the push for scale up of the call center will lead to the center being expanded so quickly that we will not be able to collect data through it as well as hoped. We are also concerned that with the fast scale up, it may be difficult to adapt components of the center as we see ways to improve them to make it more marketable. Because the call center is being scaled up early, we will not be able to measure the impact of the call center on desludging prices—all neighborhoods are treated since with scale up the control neighborhoods are also receiving advertisements for the call center.
- Delays in the project stemming from technical issues make it impossible for us to give the full treatment period to the households participating in the willingness-to-pay study so that we can fully measure the impact of the different treatments on their behaviors. In order to have the impacts well-measured, it would be better to have the complete treatment period of 18 months (18 months is slightly below an average of 3 desludging periods for the median household). Since delays have cut the treatment period to 9 months, we are now concerned about measuring the extent of the longer-term impact of the treatments.
- With all the hard work and good intentions for the success of this project, the risk of finding an affordable innovative sanitation technology for the target population is still in front of us. The various studies already completed (market and livelihoods assessment in particular) have given the project an excellent tool that will enable to find the right model. This, coupled with developing a creative financing scheme to enable the most vulnerable access the technology will help minimize this risk (and we do have financing flexibility within our budget to be creative).
- Even though at low level, we are likely to experience delays in the starting of the Sludge Processing Station construction. This delay will mainly be related to the national administrative procedures for procurement.

Sustainability

We will endeavor to ensure sustainability through the following:

- Supporting communities to engage with local and national authorities through trainings;
- Working with local private contractors, including training, to produce the selected sanitation technology locally will help bringing costs down and grow the local economy; for the flood-prone component
- Engaging with local and national authorities through various means of communication, including print and electronic media;
- Working with private financial institutions and establishing a favorable financing mechanism for the most vulnerable to access the innovative sanitation technology.
- In particular, ensuring the community's consistent and active engagements with local and national authorities is fundamental to sustainability and replication of this pilot project. Hence, continued mobilization and training of the communities remains an important aspect of the project which we will need to intensify through the remaining period of the project life.

Scalability:

- ONAS is building Fecal Sludge Treatment Plant in five (5) secondary cities. The organization that will be set up in these secondary cities exclusively depends on the outcomes of ONAS/BMGF fecal sludge program (certification, management of the stations, call center, mobile money, etc).
- We are now preparing the extension of the call center at the cities level of Tivaouane and Mbacké, cities which have been equipped recently of fecal sludge treatment plants.
- Information and training courses for ONAS Staff and the private sector are also organized for a better ownership of the program's outcomes.
- With USAID (SUWASA Program), collaboration already exists for the implementation of the program outcomes in Tambacounda.
- Apart from Senegal, a communication platform is set up at the Water African Association level to share the good practices started within the framework of the program.
- With IPA and WSA, we are conducting research using tools which will allow us to be able to use as it scales up the programme. For example, we already have plans to scale up the call center over the next few months. If They (WSA/IPA) find that some of the marketing techniques for the desludging services work particularly well, they will also make sure that they can be easily scaled. They (IPA/WSA) have designed the interventions with scalability as one of the key factors of the design—for example, the mobile money component could easily be scaled and packaged for a broader population.
- The inclusive approach used in the certification process and accompanying measures in place should ensure its acceptance across the country.
- Similarly, the flexibility and adaptability of the configuration of the call center platform, and the environment will be implemented (mobile money) should enable this innovative tool to be adopted and accepted by the population of other Senegalese cities and even other African cities.

Lessons Learned:

- There are a number of partners with key roles in this project, including a national NGO, a government body and the private sector. Over the past year, the partnerships have demonstrated that, as much as there are ups and downs when engaging closely with one another, we can work together and achieve significant results provided that we are open, transparent, and ready to discuss any time. The partnerships established between ONAS, IPA, WSA, Oxfam , EDE on the one hand, and between IPA&WSA/Manobi; Oxfam/EVE on the other are two good examples of this, which must be continued.
- Over the past year, we have found that the technical elements of the program (the call center platform, the mobile money component, electronic data collection) require substantially more time for preparation and require substantially more debugging than we had expected. The innovative nature of these components makes the final roll out of the products extremely exciting, but bench-testing and debugging of these components have taken significantly more time and efforts than originally planned.
- Programming the platform of the call center has been long and difficult due to the innovative nature of this tool in the field of fecal sludge. In addition to technical aspects, there is also the commercial policy must designed to support the operation of the call center.
- The strong commitment of emptiers to participate in the modernization of their business. It is a real strong point for the project's success.

ONAS – Project coordination

The expenditure was carried out in accordance with the budget; we had no budget overrun in the course of this second period. The total rate of expenditure execution during this period is 16%.

Innovations for Poverty Action (IPA)

We are progressing on-track in terms of the budget. Because we are running the willingness-to-pay treatment in early 2014 rather than 2013, our spending in 2013 in terms of the other direct costs and consulting costs have been low. However, these costs are not reduced costs; they are just delayed until 2014. We will be spending these funds on the willingness-to-pay treatment as soon as it is rolled out.

Water and Sanitation for Africa (WSA)

The total amount budgeted for the reporting period was \$1 050 078 and 73% of the total amount was actually spent (\$768,154).

1. Budget Variances:

ONAS – Project coordination

The budgetary variances are very high for two reasons. The first is that the budget estimates for 2013 during the period 1 report delivery were not realistic because we cumulated budget balances by November 9th, 2012 with the initial forecasts for 2013. The second reason is the non achievement of some activities of a total amount of \$ 2,462,500 and which account for 68% of the budget expenditure of \$ 3,609,084.

They are the following activities:

- Travel – Dakar - to for Water Forum country place
- Fecal sludge treatment station (Dakar)
- Transfer system
- IT equipment for GIS use
- Training to communes
- IT equipment for communes
- GPS

Innovations for Poverty Action (IPA)

Our personnel cost was somewhat higher than expected in 2013 because we needed more full time programming support than we had expected. In order to compensate for this, we have reduced the size of the UVA subcontract to \$30,000. As stated above, we have delayed the willingness-to-pay treatment until 2014, which has created variances in the other direct costs and consulting budgets, but these funds will be used in early 2014.

Water and Sanitation for Africa (WSA)

None of the budget categories had variance exceeding 10% as shown above. The total variance on the reporting budget to date is 27%.

2. Budget Plans for Next Reporting Period:

ONAS – Project coordination

As for coming periods' forecasts, they are made on the basis of expected expenditure over each period starting on November 10th and ending on November 9th of the year next to the beginning, so that these forecasts coincide with the financial report release periods.

We used the “travel” section balance remaining in 2013 and amounting to \$ 25,802, to the “guarantee fund” for the evaluation of the offers received from the banks within the framework of the implementation of the guarantee fund and to the “training of ONAS regional services” over 2014.

Besides, we carried out, with the consent of our program manager in the foundation to the allocation of the “site of transfer” section budget on “vehicles”, “staff” and “call center operation” sections. The section “call center operation” is a new section which we created at the “other direct expenses” section, to deal with part of the call center operation that IPA and WSA did not plan.

Innovations for Poverty Action (IPA)

The shift of the willingness-to-pay treatment from 2013 to 2014 does not create a change in the overall budget, it only changes the year in which the costs are realized. Therefore, we do not believe that significant re-budgeting is necessary at this time.

Water and Sanitation for Africa (WSA)

The planned activities for the next reporting period will be covered under the budget plan in the financial report.

3. Budget or Financial Risks:

ONAS – Project coordination

At this stage, no risk or significant problem that could hinder ONAS capacity to carry out the activities planned within the framework of the sludge market structuring program was identified.

Innovations for Poverty Action (IPA)

In response to the unavoidable delays in the willingness-to-pay survey and the related shortening of the willingness-to-pay intervention period, it may make sense to extend the intervention period at the end by several months. This would require a no-cost extension, but we are concerned about the possibility of increased administrative costs covering the period.

Water and Sanitation for Africa (WSA)

The potential exchange rate variations can affect the estimates of cash flows in the future. At times, they may be way off the mark and this may be favorable or unfavorable