

WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

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FROM
THE MANAGING DIRECTOR'S
DESK

I am happy to welcome you all to the third successive edition of Water and Sanitation News. Things are really taking shape with the National Urban



Water Sector Reform and Port Harcourt Water Supply and Sanitation Project (UWSR&PHWSS). The Project has progressed into action stages. Citizen engagement has commenced with the Advocacy Visits to the Community Leaders in the 28 Wards in the two LGAs where the Project will traverse. The advocacy visits to the communities is one of the preliminary stakeholders engagement activities of the Corporation concerning the on-going Project. Internal and external trainings are going on as well and the capacity of the staff of PHWC are being enhanced in an increasing manner. Beyond the Project Port Harcourt Water Corporation has taken full responsibility for the provision of safe, clean and affordable water and sanitation services for the people of Obio-Akpor and Port Harcourt Local Government Areas. The Rivers State Water Services Regulatory Agency has released Water Operators Certificate to PHWC. Again the Water Sector Development Law No. 7 of 2012 as gazetted establishing Port Harcourt Water Corporation and other allied water governance institutions in the state entrusted PHWC with powers to be the only organization to run water quality test and analysis and provide waste water and sewerage services in Port Harcourt and its environ. So I encourage all stakeholders in Port Harcourt to take advantage of these services. Happy reading and best regards.

Kenneth Anga

Managing Director PHWC



PORT HARCOURT WATER CORPORATION RECEIVES WATER OPERATORS LICENCE.



PHWC MD Kenneth Anga receiving the certificate from DG Rivers State Water Services Regulatory Commission, Mr. Chris Obasiolu.

The Port Harcourt Water Corporation on Thursday 18 August, 2016 received the Rivers State Water Operator License from the Rivers State Water Services Regulatory Commission (RSWSRC). The event which took place at the Function Room of the Ministry of Water Resources and Rural Development, Rivers State Secretariat Port Harcourt was witnessed by the Commissioner Chief Ibibia Walter and other senior officials of PHWC and the Ministry. Handing over the Certificate, the Director General of the Commission, Mr. **Chris Obasiolu said that issuing of Water Operator's License to all qualified operators is one of the statutory responsibilities of the Commission.** "Port Harcourt Water Corporation having fulfilled all requirements and fully paid its licensing fees is hereby granted license to produce and distribute safe, clean and affordable water to the people of Obio-Akpor and Port Harcourt Local Government Areas of Rivers State", he added. He further stated that PHWC was not operating illegally before now because the Corporation was issued with **provisional license.** "by this license, PHWC is now fully empowered to operate as a water service provider" he concluded. The Commissioner in his remarks described the event as epoch making adding that PHWC is expected to deliver on its mandates to the people of Port Harcourt. Mr. Kenneth Anga the MD of PHWC thanked the Regulatory Commission for their support and partnership. "We shall more than ever work to deliver safe, clean and affordable water to our customers" he enthused.

WATER AND SANITATION NEWS

PHWC e-Newsletter

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PHWC TAKES GRASSROOT STAKEHOLDERS ENGAGEMENT FOR PORT HARCOURT WATER SUPPLY AND SANITATION PROJECT TO RUMUEME ANCIENT KINGDOM



PHWC PMC WITH RUMUEME COMMUNITY COUNCIL OF CHIEFS SHORTLY AFTER THE ADVOCACY

In this issue

- PHWC Receives Water Operator’s License 1
- PHWC Takes Grass root Advocacy on NUWSR & PWSSP to Rumueme Community 2
- National Urban Water Sector Reform & PHWSSP in Brief 3
- Rumuadaolu Community pledges support PHWSSP 4
- Rumuokwuta Clan hosts PHWC PIU 5
- Rumuola agree to support PHWSSP 6
- Commissioner for Budget and Economic Planning meets PHWC PMC 7
- PHWC Water Quality Lab. 12

The Traditional Ruler and Chairman of Rumueme council of Chiefs HRH Engr. Chief Larry Nyeche JP has pledged the support of the entire Rumueme extended and nuclear kingdom to the Port Harcourt Water Supply and Sanitation Project. Chief Nyeche gave this assurance when the Project Implementation Unit PIU of Port Harcourt Water Supply and Sanitation Project paid advocacy and project briefing visit to Rumueme Council of Chiefs. “ This Project is a welcome development. We are well aware that the Government of Rivers State in the past has been making efforts to actualize this same dream. The Greater

Port Harcourt City Plan articulated the standard sewerage system, drainage and water supply stations to be built” He pleaded that the Port Harcourt Water Corporation and Government of Rivers State make extra effort to see that the Project is actualized. “The lives and environment of the people of Rivers State need to be improved adding that the very poor sanitation and very unhealthy standard of living amongst the people is leading to increase vices amongst the people especially the youths” he opined. Chief Nyeche further said: “Even if the people need to be discomforted for a while for a meaningful development to take place , the people of Rumueme will support it . The Rumueme people support the Project in its entirety” he concluded. Earlier, the Communications and Social Marketing Expert of PHWC, Mr. Christian Maduka had introduced the Port Harcourt Water Supply and Sanitation Project to the Council of Chief outlining the various benefits, expectations and likely challenges to the people of Obio Akpor and Port Harcourt Local Government Areas. “We have come to tell you about this Project and to seek your support and also to tell you to inform your people to position themselves to take every advantage of it” he said.



3rd NATIONAL URBAN WATER SECTOR REFORM & PORT HARCOURT WATER SUPPLY AND SANITATION PROJECT FACTSHEET

What: The 3rd National Urban Water Sector Reform and Port Harcourt Water Supply and Sanitation Project is concerned with provision of clean, affordable and safe urban water and sanitation services for the people of Port Harcourt and Obio Akpor Local Government Areas of Rivers State Nigeria. It will also address the issues of capacity development for Port Harcourt Water Corporation in the development of institutional frameworks for the financial management, autonomy and regulations. Full operational and financial autonomy for PHWC is envisaged. The project is planned to be implemented by Rivers State Government with support from the African Development Bank and the World Bank.

Beneficiaries: Port Harcourt Water Corporation PHWC and the people of Port Harcourt and Obio-Akpor LGAs of Rivers State

Where: Port Harcourt and Obio Akpor LGAs

When: Aug. 2014 to Jun. 2020

Funders: WB, AfDB and RVSG

Managers: Ramboll Environ
Denmark



The Rivers State Government through the Port Harcourt Water Corporation is implementing the Port Harcourt Water Supply and Sanitation Project to provide water and sanitation services for the population within the Port Harcourt and Obio Akpor Local Government Areas of Rivers State. The project is planned to be implemented with support from the African Development Bank and the World Bank. The current population of the two Local Government Areas is put at 1.7 million. This population is rapidly increasing and is expected to reach 4 million by 2040. Currently, the citizens of the areas do not benefit from a water services that is of acceptable quantity, quality or reliable standard. This is because the water service system is grossly non-functional. The population of Port Harcourt Municipal and Obio/Akpor obtain water from the combination of sources which includes: private boreholes/shallow wells (directly in their household or bought through intermediate vendors) and sachet water commonly called pure water. These sources come with varying levels of sub-standard quality, high cost Implications and availability. In the area of sanitation, most households in Port-Harcourt and Obio/Akpor are served by toilets with on-site septic tanks or household pit latrines, while most public centers such as markets and motor parks lack adequate sanitation or sewerage facilities. The overall purpose of this project is to enhance the supply of potable water and improve sanitation service facilities within Port-Harcourt and Obio/Akpor. It is also aimed at meeting projected demand of these services up to the year 2040. This will be achieved through the following results: Improving water production in the project area through the expansion of storage facilities, distribution networks and metering of new connections within Port-Harcourt and Obio/Akpor LGAs. Establishment of appropriate institutional and organizational arrangements for the effective operation and maintenance of the completed schemes.

WATER AND SANITATION NEWS

PHWC e-Newsletter

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www.portharcourtwater.com

RUMUADAOLU COMMUNITY PLEDGES SUPPORT FOR PORT HARDCOURT WATER SUPPLY AND SANITATION PROJECT



“On behalf of the Rumuadaolu community, I give you my word. We shall support the National Urban Water Sector Reforms and Port Harcourt Water supply and **Sanitation Project.**” Those were the words of the Assistant Paramount Ruler of Rumuadaolu kingdom, Chief F.O Amadi while receiving the team from Port Harcourt Water Corporation who paid him and the custodians of Rumuadaolu community an advocacy visit recently. **“We are pleased that Port Harcourt Water Corporation deemed it fit to consult the leaders of our community to tell us about the Project. The Project from all we have been told will benefit all of us” he concluded.** Earlier the Chairman of Rumuadaolu Community Development Committee Comrade Stephen Atuzie said that the project is a welcome development to the community. He assured the Corporation of their continued support to ensuring that the vision of the project is fulfilled. **“Our community is one of the most peaceful in Rivers State as such we welcome any meaningful development that will benefit our people”** he added. Introducing the purpose of the visit, the Communications and Social Marketing Expert of PHWC started by giving a general over view of NUWSR & PHWSS Project. He told the Rumuadaolu Community that Rivers State Government and the Port Harcourt Water Corporation (PHWC) are implementing a project to provide water and sanitation services for the population of Port-Harcourt and Obio Akpor Local Government Areas. The project is part of a wide sector institutional reform embarked on by the Rivers State Government, and is planned to be implemented with parallel financing support from the African Development Bank (AfDB) under the Urban Water Reform and Port-Harcourt Water Supply and Sanitation Project, and by the International Development Association (IDA), hereafter also referred to as World Bank (WB), under the

third National Urban Water Sector Reform Project (NUWSRP3). The Project will bring so many benefits to the communities in the two local government areas and proceeded to give a summary of the project. He said that the Rivers State Water Sector Development Law No.7 of 2012 brought about the Corporatization of PHWC to repeal old Rivers state Water Board and birthed Port Harcourt Water Corporation adding that the water reform law gives the new Corporation the mandate to become a legal entity. The NUWSR and PHWSS Project will bring benefits in terms of the empowerment of the women, youths and capacity building of all water and sanitation stakeholders in the areas covered by the Project. He told the community representatives that the sensitization/advocacy meeting is to lay the foundation **for the larger and future stakeholders’ meeting** adding that the individuals who own boreholes are encouraged to test the quality of their water at the state of the art Water Quality and Analysis laboratory of PHWC. The Communications Expert added that the little payment that will be required from the water consumers when the time comes for the water and sanitation services will be to ensure sustainability and improved service delivery. **“The project funders seek to bring prosperity and not poverty to the people of the community, therefore no one will suffer any hardship because of the project. There are also tools put in place to compensate anyone affected negatively by the project”** he said. The funding of this project is based on a funding understanding and agreement between World Bank, African Development Bank and Rivers Tate Government of Nigeria. The Utility Management and Institutional Development Expert added that the customer service unit has been established to entertain and handle all complaints and issues and to ensure excellent customer delivery. .



WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

www.portharcourtwater.co
RUMUOKWUTA CLAN HOSTS PHWC DELEGATES - Daisy Anderson


The Rumuokwuta Clan of Port Harcourt played host to the Port Harcourt Water Supply and Sanitation Project **Implementation Unit (PIU) Team**. **The Team's visit to Rumuokwuta** took place on Wednesday 10 August, 2016 is part of the continuation of its advocacy visits to the 28 wards in Obio Akpor and Port Harcourt Local Government Areas where the new Project will traverse. The Traditional Ruler of Rumuokwuta clan, His Royal Highness Chief Eze Victor received the Team in company of the Chairman Rumuokwuta Community Development Committee Comrade Bright Happy, the Executives of Rumuokwuta CDC and other leaders of the community. The Communications and Social Marketing Expert of PHWC Christian Maduka told the gathering that the reason for the visit was to brief them about the National Urban Water Sector Reform and Port Harcourt Water Supply and Sanitation Project recently launched in the State. The project is being implemented by Rivers State Government through the Port Harcourt Water Corporation is to provide water and sanitation services for the population within the Port-Harcourt and Obio Akpor Local Government Areas. The project is also being implemented with support from the African Development Bank and the World Bank. The overall purpose of this project is to enhance the supply of potable water and improved sanitation service facilities within Port-Harcourt and Obio/Akpor. It is also aimed at meeting projected demand of these services up to the year 2040. This will be achieved through the following results: Improving water production in the project area through the expansion of storage facilities, distribution networks and metering of new connections within Port Harcourt and Obio/Akpor LGAs, Establishment of appropriate institutional and organizational arrangements for the effective operation and maintenance of the completed schemes. He also stated that the creation of PHWC out of the old Rivers State Water Board by law was all part of **Government's**

interest to ensure that safe and clean water is made available to the people of Obio Akpor and Port Harcourt LGAs. The Social Safeguard and Gender Expert Mimidoo Achakpa said women and youth will be given attention within the empowerment and graduate placement components of the Project when the **contracts for the constructions start**. **"There will be social inclusion, the vulnerable and physically challenged will be put into consideration"** she added. Mr. Gilbert Emmanuel the Legal Adviser to PHWC said that PHWC is working in line with the constitutional provisions which enjoins all the citizens **to be part of development in their communities**. **"The PHWC infrastructures and the Project belongs to the community, please support it"** he said. Some of the questions that were asked by the Rumuokwuta community during the visit includes: Is there money available to fund the project?, What are the financial commitments from the community to this water project? What will be the fate of those who own private water wells and boreholes? Etc. The Communications and Social marketing Expert provided answers to some of the questions but promised the community that the meeting will be repeated in a bigger level in the near future.



WATER AND SANITATION NEWS

PHWC e-Newsletter

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www.portharcourtwater.com

RUMUOLA COMMUNITY LEADERS AND CUSTODIANS AGREE TO SUPPORT PORT HARCOURT WATER SUPPLY AND SANITATION PROJECT - Daniel Ochoma



On Tuesday 9 August, 2016 the highest Community governing body of Rumuola Clan played host to the Project Implementation Unit of Port Harcourt Water Corporation PHWC. The Traditional Ruler of Rumuola Clan, HRH Eze Ambassador R.E Amadi JP, Eze Epara III of Ola Kingdom, his Council of Chiefs, Community Development Committee Chairman, Youth and Women Leaders and other eminent opinion leaders from Rumuola Clan were in attendance. Eze Ambassador Amadi in his speech pledged the support of his community to the Port Harcourt Water Corporation. “On behalf of the people of Rumuola Clan, I promise the Corporation the support of my people. We are your host community and we shall always support your projects” he said. He also reminded the delegates that several promises made to Rumuola Community in terms of employment of youths, award of contracts and citing of Community development projects have not been actualized. “We are a very peaceful and peace-loving community and as such will continue to press that what is due to us is given to us”. The Traditional Ruler also used the opportunity to thank the management of PHWC and the Government of Rivers State for all the assurances given to Rumuola community so far, adding that the community has very strong faith that all her sacrifices will one day be rewarded. The Communications and Social Marketing Expert of PHWC; Christian Maduka introduced the Urban Water Sector Reform and Port Harcourt Water Supply and Sanitation Project to the Community Heads. He said that the Project by the end of 2020 will have provided regular access to safe, clean and affordable water and sanitation services to the urban communities in Obio Akpor and Port Harcourt City Local Government Areas of Rivers State. “We are sent here to tell the Leaders of this community about this Project which was launched by the Governor of Rivers State on 15 April, 2016” he said. “There are so many benefits this Project will provide to all the residence of the two Local Government Areas, this include employment and increased standard of living”.

Mr. Maduka added that the Project is funded by Loan accessed by the Government of Rivers State from World Bank and African Development Bank. This means that the Project is being funded by Rivers State Government through the two Banks. He urged the Rumuola Community Leaders to make very good use of the information and tell their people to position themselves to benefit from the enormous goodies which the Project will bring into their wards. In his own presentation, the PHWC Legal Adviser Mr. Gilbert Emmanuel urged the Rumuola Community to make efforts to understand the Rivers State Water Development Law and follow the path of dialogue always in negotiating for things that will benefit their Community adding that Port Harcourt Water Corporation is a very new corporation which must be supported to grow and not be suffocated with pressures of demands from interest groups. The Institutional Development and utility Management Expert Engr. Hossana Dajan said that part of his job on the Project is to ensure that all the policies of the funding banks concerning youth and graduate employment is adhered to. He said that PHWC has began to develop terms of references for the contractors to ensure that they give priority to employ youths, women and people from the Project areas than others. Mimidoo Achakpa the Social Safeguard and Gender Expert added that there will equal opportunity for all: women, men, youths, vulnerable people etc. in the project. “Even those who might be affected in one negative way or another will be compensated commensurately” she concluded.



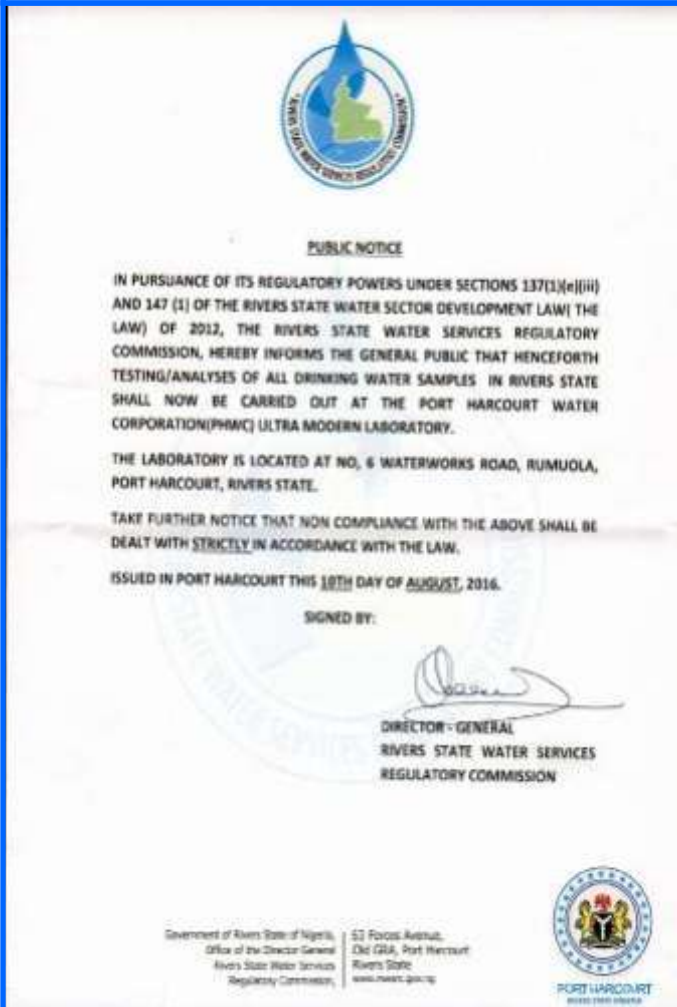
WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

www.portharcourtwater.com

PHWC IS EMPOWERED BY RIVERS STATE WATER DEVELOPMENT LAW NO. 7 OF 2012 TO TEST WATER QUALITY IN PORT HARCOURT.



PUBLIC NOTICE

IN PURSUANCE OF ITS REGULATORY POWERS UNDER SECTIONS 137(1)(e)(iii) AND 147 (1) OF THE RIVERS STATE WATER SECTOR DEVELOPMENT LAW (THE LAW) OF 2012, THE RIVERS STATE WATER SERVICES REGULATORY COMMISSION, HEREBY INFORMS THE GENERAL PUBLIC THAT HENCEFORTH TESTING/ANALYSES OF ALL DRINKING WATER SAMPLES IN RIVERS STATE SHALL NOW BE CARRIED OUT AT THE PORT HARCOURT WATER CORPORATION(PHWC) ULTRA MODERN LABORATORY.

THE LABORATORY IS LOCATED AT NO. 6 WATERWORKS ROAD, RUMUOLA, PORT HARCOURT, RIVERS STATE.

TAKE FURTHER NOTICE THAT NON COMPLIANCE WITH THE ABOVE SHALL BE DEALT WITH STRICTLY IN ACCORDANCE WITH THE LAW.

ISSUED IN PORT HARCOURT THIS 18TH DAY OF AUGUST, 2016.

SIGNED BY:

[Signature]

DIRECTOR - GENERAL
RIVERS STATE WATER SERVICES
REGULATORY COMMISSION

Government of Rivers State of Nigeria
Office of the Director General
Rivers State Water Services
Regulatory Commission
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Off GSA, Port Harcourt
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PORT HARCOURT
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PHWC PMC PAYS ADVOCACY VISIT TO COMMISSIONER FOR BUDGET AND ECONOMIC PLANNING

As the implementation of the 3rd National Urban Water Sector Reform and Port Harcourt Water Supply and Sanitation Project progresses, the Project Management Consultant Team Leader Engr. Martin Ede and his team held an advocacy and interactive meeting with the Honourable Commissioner Rivers State Ministry for Budget and Economic Planning; Hon. Barrister Isaac Kamalu. The meeting which was held at Landmark Hotel on Friday 12 August, 2016 had the Permanent Secretary of the Ministry Mr. Felix Odungweru also in attendance. The PHWC PMC Team include also Engr. Emmanuel Idoniboye; the Project Manager, Mr. Francis Fakoyejo; Financial Management Expert, Mr. Christian Maduka; Communications and Social Marketing Expert, Mr. Barine Lenee; the Internal Auditor and Ms. Fiberesima Dennisada; Communications and Public Relations Officer. The Commissioner said the Governor of Rivers State Chief Barrister Nyesom Wike is committed to the success of Port Harcourt Water Supply and Sanitation Project because provision of clean water and sanitation services is part of his campaign promises. He stated further that Rivers State Government will provide all the necessary support needed to ensure that the Port Harcourt Water Corporation succeeds with all its Projects because of the enormous benefit that will be derived from them for the people of Rivers State. According to the Commissioner, PHWC when it succeeds will not only provide clean water to the people but provide employment to the unemployed youths. The PMC Team Leader Engr. Martin Ede thanked the Commissioner for accepting to meet with them.



TEST AND ANALYSE YOUR WATER AT OUR ULTRA MODERN LABORATORY
Port Harcourt Water Corporation, 6 Water Works Road, Rumuola, Port Harcourt
Email: waterquality@portharcourtwater.com, Tel: +234817777004
www.portharcourtwater.com



WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

www.portharcourtwater.com

PORT HARDCOURT WATER CORPORATION RENOVATES EAGLE ISLAND WATER TREATMENT PLANT

— Enefaka Okoye



In its effort to improve on the services to its customers, the management of Port Harcourt Water Corporation is embarking on the renovation of one of its pumping stations at the Eagle Island district of Port Harcourt. The Eagle Island Water Treatment and Pumping Station is currently partially shut down because a comprehensive maintenance and upgrade of the facility is being done. This is one of the many efforts that PHWC has taken to ensure that the residents of Eagle Island in Port Harcourt enjoy excellent service delivery from the Corporation. According to the Water Operations Manager of PHWC; Engr. Bowadua Ngiangia, "We are making all efforts to ensure that our

services at Eagle island is efficient and regular. The reason is quite simple. We are using the Eagle Island as our pilot project. Anything that works at the Eagle Island will be replicated in other locations under our mandate". Speaking further, Engr. Ngiangia said "The contracting firm, LOWPEL AND GEOWALK Nigeria LTD has assured us that they are working tirelessly to ensure that the renovation work be completed within the shortest time possible in order to resume full operations at Eagle Island". He further stated that the major aim of embarking on this face lift is to ensure that PHWC customers have high confidence in our services which is built on quality, accessibility and availability of water. He also appealed to the PHWC customers at Eagle Island to bear with the Corporation adding that the services will surely be better at the completion of the renovations.



STUDENTS OF NATIONAL OPEN UNIVERSITY OF NIGERIA PORT HARDCOURT VISIT PHWC WATER QUALITY TEST AND ANALYSIS LABORATORY - Dennisada Fiberesima



Human Resources Assistant Solikume Joel, Public Relations Officer Fiberesima Dennisada and Water Operations Officers Anosieya Onyige and Edward Lawson. The tour was concluded by a visit to the PHWC Water Quality Laboratory where they were given an in-depth description and practical demonstrations of our water analysis and treatment process. It is expected that the knowledge gained would aid the student in understanding their chosen course of study better.

The operations of Port Harcourt Water Corporation has been receiving attentions from far and wide. On Thursday 4 August, 2016, over 58 students from the Department of Environmental Science and Resources Management of National Open University of Nigeria (NOUN) Port Harcourt campus came on a field trip to the Corporation. The purpose of the field trip was for the students to gain insight into and get first hand experience of Water Resources Management, especially water production processes. The students were taken on a tour of the PHWC facilities by



WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

www.portharcourtwater.com

DECODING THE DNA OF WASTE WATER

CULLED FROM THE SOURCE: OFFICIAL NEWSLETTER OF IWA



Many professionals describe the biological treatment of wastewater as “bug farming,” where operators feed pollutants to microorganisms, which help break the sewage down to recover clean, valued resources. Yet bugs are surprisingly fussy eaters. They prefer specific pollutants, **won’t touch others, and their fickle appetites** hurt the performance of treatment plants. If you could just **identify the species of bacteria, you’d know what food and environmental conditions they’d enjoy.** “Easier said than done,” says Erik Bundgaard, Vice President, Director of Technology, KRÜGER A/S. “Raw wastewater entering the treatment plant contains billions of bacteria per milliliter coming from all kind of sources. The work, the time and the resources required to have sufficient knowledge about the bacteria has been a barrier for progress in the past.” One consequence of not being able to identify bacteria is the problem of bulking and foaming, **which affects 30 percent of the world’s** activated sludge wastewater treatment plants. Bulking occurs when sludge does not settle after air has been pushed through the wastewater. It lowers effluent quality and drives up costs yet it is endemic to the engineering, hydraulic and microbiological dynamics of the process. Plant operators can design and manipulate those first two components but the third has remained off limit. The key, as microbiologist Per Halkjaer Nielsen explains, is to link the identity of a microbe with its function. Nielsen borrowed the tools and lessons from the decade-long, US\$3 billion undertaking to map the human genome, and began applying and further developing them in order to identify the bacteria in treatment plants, the better to feed, nurture, and cater to their needs. In a process called metagenomics, his team extracts DNA from a water or sludge sample, for the individual species. chops it into pieces, sequences it and by using bioinformatics tools,

puts it together in genomes. “By looking into the DNA of the microbes in wastewater treatment plants, or any other ecosystem, we can get two types of important info: identification of the microorganisms and some understanding of their **function,”** says Nielsen. It was as a student in Denmark in the 1970s that Nielsen first began to apply microbial ecology to problems like eutrophication, and later, sewer systems. “I could see the microbes were the work-horses in wastewater treatment,” he says, but he also noted how they also created their own problems like bulking and foaming. Interestingly, Nielsen also spent time in the medical field and his cross-cutting exposure to the treatment of living human systems, living ecosystems, and living wastewater systems revealed a common denominator: All living organisms have DNA.

The DNA revolution: **Nielsen’s discoveries could** lead to a range of benefits. Among the advantages: less bulking and foaming, reduced need for chemicals and energy, maintained plant stability, better effluent quality, and higher recovery of nutrients like phosphorus. DNA analyses identify indicator species, to serve as early warning systems for pathogens, and micro-pollutants, and allow for control strategies. “By looking into the DNA of the microbes in wastewater treatment plants, or any other ecosystem, we can get two types of important info: identification of the microorganisms and some understanding of their **function,”** says Per Nielsen © Aalborg University “The overall benefit from this research at Aalborg University will be that treatment of wastewater can be much more targeted even where the conditions have **formerly been a challenge,”** says Bundgaard, a converted skeptic. “Knowledge and better understanding of this will bring benefits both from an economical and **environmental point of view.”** In **contaminated drinking water, ‘source tracking’** can now use molecular tools to detect and trace unique fingerprints to the contaminating microorganisms, and remove the pollution source. **Last year, Nielsen’s discovery of the enigmatic Comammox bacteria,** helped oxidize ammonium directly to nitrate in one step, which fundamentally changed our understanding of the nitrogen cycle in nature and engineered systems. Indeed, the DNA revolution may irreversibly alter our relation with the water systems we depend on. Nielsen speaks of **unlocking the “circular economy”**

WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

www.portharcourtwater.com

PHWC STAFF TRAINED ON EFFECTIVE COMMUNICATIONS SKILLS IN PORT HARCOURT



institutions in River State, importance of communications and social marketing personnel in a utility company, introduction to social marketing, steps to social marketing, stakeholder mapping and engagement, effective communications strategy, public speaking skills, communications matrix, basic writing techniques and audience sociology and analysis among others. According to the Managing Director of PHWC; Mr. Kenneth Anga, said that **“building capacity for the staff of Port Harcourt Corporation is a major component of the National Urban Water Sector Reform and Port Harcourt**

A 4-Day Training Workshop on Effective Communications Skills was held for staff of Port Harcourt Water Corporation. The Workshop which started on Monday 1st and ended on Thursday 4th August, 2016 had over 35 staff of the Corporation in attendance. Declaring the training sessions open, Engr. Martin Ede, the Team Leader of Project Management Team for the Port Harcourt Water Supply and Sanitation Project urged the participants to make the best use of the opportunity by devoting efforts to take many skills away from the training. He said that the series of internal trainings by the Consultants for the PHWC is part of the deliverable of the Project. According to



Cross section of participants at the Effective Communications Training Workshop



The Team Leader of the Project Management Consultants Engr. Martin Ede during the Opening ceremony of the Workshop

Water Supply and Sanitation Project”. The outcomes of the Workshop included enhanced communication skills of the PHWC staff, total subscription to the entire water and sanitation reform and better performance of their duties. The training was another opportunity created by the Project Management Consulting Team to explain what is expected from the staff of PHWC in the implementation of the Project. Certificate of participation were awarded to staff who participated fully in the 4-day training workshop.

the Facilitator of the Training Mr. Christian Maduka, the Communications and Social Marketing Expert, the objectives of the Workshop include: To enhance the skills of staff of PHWC in Utility reform, introduce the staff to effective communication techniques, introduce staff of PHWC to communication demands of National Urban Water Sector Reform Project and communications personnel in a water utility. Some of the modules delivered at the Workshop include: the legal and historical background of water



Some of the PHWC Communications and Customer Care Staff during the Effective Communications Training Workshop

WATER AND SANITATION NEWS

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RUMUOLA NEWLY ELECTED YOUTH FORUM LEADERSHIP VISITS PORT HARCOURT WATER CORPORATION

DECODING THE DNA OF WASTE WATER Contd.

CULLED FROM THE SOURCE: OFFICIAL NEWSLETTER OF IWA

"The Rumuola Youth Forum could serve as a good platform of understanding between the Community and Port Harcourt Water Corporation and can serve as very good platform for continued interaction with the Corporation" This was the welcoming words of Engr. Bowadua Ngiangia, the Head of Water Operations of PHWC while receiving the Executive Committee of newly elected Rumuola Youth Forum who paid a courtesy visit to Port Harcourt Water Corporation. Engr. Ngiangia who received the Forum on behalf of the Managing director Mr. Kenneth Anga said "Looking at young members of your Exco, I see a lot of hope for Rumuola Community and I can say that this has given me a clearer picture of the high expectations for your Forum". Responding, the President General of Rumuola Youth Forum Engr. Samuel Nsirimovu said Rumuola Youth Forum appreciates the efforts of Rivers State Government to revitalize Port Harcourt Water Corporation. "I will strive to change the ways my predecessors approached issues. My focus is to develop the Rumuola youths through empowerment and education so that Rumuola youths will stop to be associated with touting and other vices" . Continuing, Nsirimovu said that Rumuola Youth Forum will be 20 years in 2017 and will be requiring assistance of PHWC to build and equip its Secretariat with computers. "I was also offered employment by Commissioner for Water Resources and Rural Development into PHWC, I will plead that action is expedited on that so that I can be absorbed into the PHWC fold" he concluded. Mr. Gilbert Emmanuel the Legal Adviser to PHWC urged Rumuola Youths to help nurture PHWC to grow and not put so much pressure on the new Corporation through big demands and expectations.

by augmenting the traditional treatment process. "All parts of this circle consist of microbes—influent, primary sludge and external sources, activated sludge, digester, recovery of nutrients, and polishing of the effluent—in all cases a surveillance of the microbiology will help optimize the plant and the entire circular economy," he says. By collaborating with companies like KRÜGER A/S, Nielsen's research centre offers a pioneering model of cooperation between industry and universities. There is healthy tension as both parties challenge each other over competing priorities. Curious university researchers wish to overturn each rock in a desire to know everything, while the industry side seeks operational results which can be rapidly applied in "real life". Where industry is slow to pick up and apply lessons, Nielsen's team is developing a for-profit business venture. "The DNA methods are still not a 'normal' part of the solution as only few companies offer to do that," he said. "That is also why we have set up a company, DNASense that provides such services". Demand will vary by place. But from a web tracking source, MIDAS, there appears to be a growing and universal need to decipher wastewater. A micro biome has a particular metabolic function unique to treatment plant, whether it's located in northern China, eastern Brazil, or southern Portugal. Wherever there had been a mystery over the content of wastewater, it can now be affordably and accurately unlocked. The DNA sequencing process—giving a name tag to hundreds of microorganisms—can turn a mysterious liquid into a clearly identifiable table of contents. They can serve as "knowledge banks, like a Google for wastewater". Nielsen's discovery of the enigmatic Comammox bacteria changed our understanding of the nitrogen cycle in nature and engineered systems © PHN. Nielsen's excitement is infectious, yet cultural barriers remain. The still novel technology is not for everybody, he concedes. Only highly skilled people can carry out investigations, generate data, or handle and interpret the results. "But results are coming fast," he promises. "Within the next few years it will be possible to carry out DNA analyses on-site in almost real time, also by non-specialists, and this will be a real game-changer.



Some Members of PHWC Management in a Group Photograph with newly Elected Executive Members of Rumuola Youth Forum shortly after the visit

WATER AND SANITATION NEWS

PHWC e-Newsletter

Issue 03 August 2016

www.portharcourtwater.com

THE PHWC WATER QUALITY TEST AND ANALYSIS LABORATORY EMPOWERED BY LAW TO CERTIFY WATER FITNESS IN RIVERS STATE.



health and causes diseases such as Hepatitis A, Cholera and Dysentery” Port Harcourt Water Corporation Water Quality Test and Analysis Laboratory has capacity to test for 22 parameters including: Bacteria, Physical and chemical parameters at moderate charges. The Laboratory can test drinking water, Borehole, swimming pool, fish pond and water for industrial purposes. It uses National Standard for Drinking Water NSDWQ and World Health Organization WHO Standards for comparisons. The general public is hereby informed that Port Harcourt Water Corporation’s Modern Water Quality Testing and Analysis Laboratory is now open to serve the public. The Laboratory is open from 8:00AM to 5:00PM Mondays to Friday. For more information please contact:

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As part of the efforts of Rivers State Government to organize the water and sanitation sector in the State, the Rivers State Water Services Regulatory Commission in pursuant of the relevant sections of Water Sector Development Law No. 7 of 2012, has empowered the Port Harcourt Water Corporation to among other things be responsible for certifying water quality and fitness in the State. The Port Harcourt Water Corporation to ensure it carries out this function well has established a state of the art Water Quality Test and Analysis Laboratory at its Corporate headquarters in Port Harcourt. According to the Managing Director of PHWC Mr. Kenneth Anga, “We are pleased to inform the public of our services at the newly commissioned Water Quality Test and Analysis Laboratory. Our services include water quality testing and certification” The Laboratory test water quality and conducts analysis with the most recent equipment handled by a team of competent technicians and analysts. Speaking further Mr. Anga said : “We at Port Harcourt Water Corporation know that it is very important for all water users to know what is in the water they are either drinking or using to cook. That is why we are out to ensure that the water we use especially for drinking is potable and fit for drinking”. The Manager of the Laboratory Mrs. Monica Nwafor said “research has indicated that consumption of raw water without proper treatment poses great threat to human

