

Summary of the Presentations and Questions



Speakers and overview of the presentations and questions:



Alexander Huppertz

Alex Huppertz is a Project Manager / Advisor for GIZ. One of his projects is the RECP. His key focus is coordinating the different RECP partners.

What is their presentation about?

Introduction to the Africa-EU Renewable Energy Cooperation Programme (RECP) and short description of its services.

More info: <http://www.africa-eu-renewables.org/about-recp/>

Question asked during Webinar:

1. Give us an idea on how the concrete activity interaction of the advisory service works?

We accept applications via a form on the RECP website. On the website there is a subsection on the finance catalyst which outlines services, eligibility quality and provides information about the team and their experience. Projects that fit the criteria, submit the project outline onto the webpage. The server is encrypted and is separate from the RECP server. This can only be accessed by the advisory team. There's a two-step process, if you are not immediately selected you might get some feedback from the advisory team. For example, they might tell you what's missing or the next step and then you can apply again once you add the missing step or information to your project. If you get chosen, in about 4 weeks, they start a discussion with you on how to start and determine what it is exactly that you need.

Godwin Eni Aigbokhan

Godwin Eni Aigbokhan is a Renewable Energy Market Adviser, National Competitiveness Council of Nigeria. He works closely with GIZ. NCCN is a private-public effort aimed at enhancing the productivity of businesses operating in Nigeria with the ultimate goal of improved socio-economic outcomes for Nigeria. It is largely driven by the private sector, with government playing a supportive and enabling role.

What was their presentation about?

Introduction to West Africa context with focus on Nigeria

His focus during the presentation is on the West Africa region as a whole. He will provide a short overview of the energy situation in West Africa as well as explain the current challenges and opportunities.

More info: <http://nccnigeria.org/our-vision-and-mission/>

Question that was asked during the webinar:

1. Could you give examples of recent successful projects which have been developed?

What we tried to do here is limited to woody biomass, but if we have a look at agricultural waste or animal waste, there are some projects in West Africa. There is a project in SENEGAL by a company called Thecogas which is an abattoir that has 1 MW power plant in Dakar which is showing people the opportunity.

In Nigeria, there is the PRESCO project, which produces palm oil. Here they produce 3.5 million cubic meters per year of gas from the Palm Oil Mill Effluent (POME) from the plant and they are looking at options. People are getting used to it and into it, especially private investors. There's one investor in Ghana, Gold Fields, which is looking at a 15MW biomass plant in Ghana. Different things are happening.

Extra questions:

1. Do you think that the energy access situation is evolving in West Africa – in which way?

What are the consequences of this evolution?

Yes, I think the energy access situation is evolving due to the fact that the removal of subsidies is driving up energy costs across the region. The costs of grid extension are becoming prohibitively expensive for many areas and mini-grids are becoming very popular, especially Solar PV mini-grids. With the success of many (mainly private sector led) mini-grid projects, governments across the region are becoming aware of the relative efficiency and lower cost of distributed renewable energy. For now, there is only one significant Biomass fired mini-grid project in the region, but this will improve as more agricultural zones become aware of the possibility of using their agricultural residues to generate power.

2. Could you provide some examples of "Bioenergy good news" for the region?

West Africa's first grid connected Biogas plant in Burkina Faso (FasoBiogaz) is a very encouraging development. The power-plant has an installed capacity of 275 kW which is expected to grow to 525 kW in

the second phase, is supported by the Dutch government. It is hoped that projects like this will make more Governments and Private sector see the bioenergy as being capable of providing energy beyond domestic applications.

3. Any comments on investments/government promotion of Bioenergy in the region?

I think it is fair to say that Government has been the biggest driver of investment across the region, but with most of the regional economies being dependent on commodity exports whose prices are falling, it is imperative that private sector investment starts to ramp up. Some countries in the region are currently in the middle of an energy crisis due to years of under investment in the energy sector especially between the 1980s and 1990s. However, I believe that private sector investment in the energy sector in West African countries can deliver modern energy sources to a great deal of its over 200 million people without access to energy, quicker and cheaper than the government could and bioenergy has a role to play in ending poverty in the region. There are some policies to encourage private sector bioenergy investments but they are not enough and do not encourage private sector investment in the scale that is needed. Also many of these bioenergy projects are mainly focused on the biomass for domestic energy (like the regional ECOWAS Policies) and on Biofuels like from Jatropha. More sectors need to see private sector investment as favourable. Government policies are needed in order to see greater amounts of private sector capital. For a start, Renewable Energy equipment should be tax-exempt across the region.



Mr. Aniche Phil-Ebosie

Mr. Aniche Phil Ebosie works specifically in promoting and managing project development for Eongratis/pellets.

What is their presentation about?

His focus during the presentation is what Eongratis currently does. He will also discuss some challenges and strong points of Eongratis as a company as well as what the region has to offer. He will also discuss what he can offer his clients and possible investors.

More information: <http://eongratis.com/>

Question that was asked during the Webinar:

1. We have seen in the last 3 years, dramatic drop in oil prices. Is this counter acting the possibility of bioenergy or not?

Nigeria is a peculiar country in that the cost of fuel in petrol drop while in Nigeria it actual increased by the government because we have a foreign exchange challenge--- we don't have foreign exchange because the cost has reduced. We export crude oil, then its changed to oil and diesel and then brought back to Nigeria. So Nigeria has increased prices of fossil fuels so this is good for bioenergy.

Extra Questions:

1. You mention there is great potential for investment and collaboration with your company. Can you elaborate a bit more on this?

Eongratis is looking into creating a formal industry for biomass in Nigeria (pellets and briquettes). Since biomass already accounts of 80% of Nigeria's energy mix, bringing modern equipment and expertise to biomass cultivation, collection, conversion and utilisation will revolutionise the industry in Nigeria.

2. Can you explain how your process is sustainable/ how you incorporate sustainability into your operations?

Our feedstock will come from three sources namely:

1. Sawmills
2. Crop farmers
3. Energy crops

For sources 1 and 2, the feedstock comes as waste from other industries. Eongratis will be responsible for converting these waste streams to useful biomass products as opposed to open burning.

For item 3, Eongratis will purposefully and sustainably cultivate energy crops for biomass. Land, water and fertiliser usage will be minimised, making our choice of perennial energy crop available all year round.



Mr. Osuma Bukunmi

Presentation of a rice mill that produces rice husks as waste at Ebony Agro Industries Ltd. – explanation of current use of the waste for energy production and what potential there is to do more.

What is their presentation about?

His focus during the presentation is on what Ebony Agro does/produces and their future plans. He explains the process of making energy from Rice husks with diagrams and photos. He will also discuss the benefits of rice husk to energy and what he can offer potential financiers and partners.

More information: <https://www.growafrica.com/organizations/ebony-agro-industries-ltd>

Question that was asked during the webinar:

1. Is it more profitable to sell the briquettes or the electricity from the rice husk and is there enough?

We are interested in selling the goods. The factory now is almost being run 24 hours on the generator. So if we can utilise the husk in generating power for the factory this would be great. There is enough husk in the states also. So the plan is that apart from using our own husk, we can use other factories to produce briquettes and at the same time use power for factory use.

Further information:

We are presently using the waste from our production processes to produce Briquettes; we need those that can collaborate with us in the production of Briquettes for commercial purposes either for local use or export. Current Briquette production is too small, 1.2tons/day from a Japanese Machine made by Thromso Co LTd. We would require additional machines to produce enough Briquettes to be offered to a variety of

users. Our Long term objectives is to convert all available Rice Husk into Briquette- Eliminate Rice Husks heaps which is environmental degrading, put the Rice Husk into good use.

The Japanese machine by thromso Co LTD is very costly at about USD37, 000 from Japan. Is there cheaper equipment to process? We are willing to export Briquettes for domestic heating in temporary areas. Any foreign partner investor can put in some money by purchasing additional Japanese processing machines to help us increase capacity. Thus all export of the Husk Briquettes can be handled on our behalf by the partner investor. This will grow the business. We are open to new ideas or technologies to handle/convert the Rice husk into other unique material. If there are cheaper technologies, we are interested to explore these. Also we are interested in extracting Oil from our Rice Bran in the future. The Rice Bran which is a by-product, is currently being sold to animal seed producers for the formulation of animal/chicken feed. We are open to new ideas or technologies that will help us stabilise the Bran for oil extraction.

We are a shareholder in Abakaliki Power plant being promoted by Ebonyi state Government, the state is exploring all avenues for funding and would welcome any interested investor that could partner with the promoters of the power plant which is dependent on Rice husk for its power generation.

Extra Questions:

1. You mention there is great potential for investment and collaboration with your company. Can you specify how one could collaborate with Ebony Agro, in which way?

We considered situating our Company in Ebonyi State because we know that Ebonyi State has enough arable fertile lands that could be cultivated for Rice farming. We can source entirely all our Paddy Raw materials input from the State. We actually want to go to Rice farming as part of our backward integration plan and any Agricultural Company that is into Rice(Paddy) farming can partner with us. We would equally be ready to work with any financial institutions that want to work with us in the areas of funding.

(B) We are presently using the wastes from our production processes to manufacture briquettes. We are considering manufacturing it as a replacement for firewood for those in the rural areas of the country as well as bakeries and others that consume a high volume of firewood. We need those that can collaborate with us in the manufacturing of briquettes for commercial purpose either for local use or export.

2. Do you have sufficient technology to do this the best way or do you require investment in more efficient technologies?

The future potential for waste from our production processes is that:

- The Rice Husks could be utilised to generate power. It could equally been used to manufacture briquettes or pellets.
- Rice bran on the other hand has future economic potential by virtue of the highly nutritious oil contained within the bran of the Rice which can be extracted.

3. Can you explain what the future potential for waste from your production processes is?

We have put in place a good Rice Mill that we have improved over time. However, we don't have the technology to convert our Rice husks to power presently and we equally don't have the technology to stabilise our Rice Bran for oil extraction, so we will need investment in more efficient technology in the conversion of Rice Husks to power and in the stabilisation of Rice bran for oil extraction. We would equally welcome those that might want to improve on our existing briquette that we are manufacturing.