

Team	Topic Theme/ Enterprise Name	Abstract
Evan Kimani Muruku Azarius K. Karanja		<p><u>The Students in Micro-finance</u>, is a project that aims at intensively addressing the students' challenges for their good. The project aims at mobilizing the students' resources in terms of finances, skills and talents towards the realization of a body that should work towards the improvement of their living standards at present and in the nearby future.</p> <p>The project aims at utilizing the students skills, talents and knowledge in running its very own affairs which includes banking, accommodation, loaning student oriented project ideas and sponsoring students to local and international events such as seminars, workshops and conference which work towards the advancement of the students' level of exposure and knowledge exchange.</p> <p>The project targets the youth among the Egerton fraternity and its main objectives include: reducing environmental pollution by waste paper through environmental education and awareness of the economic significance of waste paper among the masses and the creation of an income generating activity among the youths in the region hence the realization of a common goal in environmental sustainability.</p>
William Chilya Jeremiah Orina		<p>Instead of the government and other concerned parties in spending money on developing SMEs which fail within the first few years, this project calls for pooling all unemployed and skilled graduate students who are capable of imparting the necessary knowledge and skills to SME owners and or managers for the sustainable development of SMEs. The unemployed graduates will receive their salaries obtained from a funding pool from the government and other interested stakeholders who are currently funding for the growth and development of SMEs</p> <p>This project will yield benefits to the following parties in the following ways:</p> <ol style="list-style-type: none"> <li>1) Unemployed graduates- Creation of employment and improvement of social life</li> <li>2) SMEs- Reduction of failure rate of SMEs and improving on sustainability</li> <li>3) Government- The improved production of SMEs contributes to GDP.</li> </ol>
Samuel Muoria Samya Rashid	Water Conservation/ Agriculture	<p>Zai is a traditional technique mainly practiced in Mali, and other West African countries for conserving water and rehabilitating degraded land. Zai pits are dug approximately 80 cm apart to a depth of 5 to 15 cm and with a diameter of 15 to 50 cm. The purpose of creating the holes is to capture runoff precipitation, because the land is typically less permeable to water. The zai pits are filled with organic matter so that moisture can be trapped and stored more easily.</p> <p>Water is a critical resource for arrow root production for farmers in Kenya and our study plan will use a polythene lining bag instead of organic matter to capture the water runoff and enable soil to retain water and moisture for a long time in the growth of</p>

		<p>arrow roots</p> <p><u>Benefits</u>  High agricultural yield output throughout the year  No special equipment or knowledge is needed to adopt the technology and the cost of implementation is mainly calculated according to the farmer's opportunity cost of time. The maintenance of the pits does require the farmer to invest additional time in watching over, deepening and refilling the pits.</p> <p><u>Disadvantages</u>  Water logging during extremely wet years.  Labour intensive  Expensive Polythene lining</p>
Daisy Karega Lilian Ngima	E-Waste	<p><b>Better than New</b> is inspired by the need to tackle the e-waste problem in Kenya. It reduces the e-waste by reusing of non-toxic electronic components such as resistors, capacitors, transistors, inductors, diodes etc. These components will be used for decoration purposes. These include decoration of old furniture and then putting it back in the market looking as good as new. This may attract the cost of small repairs of the furniture but redecorating will improve its value.</p> <p>Besides refurbishing old furniture, they can also be used for decoration of home décor accessories that make use of locally available products that would otherwise go to waste or be of far lower value in the market e.g. calabashes, gourds and pots. They can also be used for making collages, wall hangings, small statues, accessorizing wall mats, etc.</p> <p>This project will help reduce e-waste, put into use material (furniture) that may no longer be desirable, gain revenue and create job opportunities.</p>
Were Agneta Samuel Atula Effie Ochieng Tevin Koing'ang'i	Fuel Kenya Initiative	<p>The disposal of polythene bags in Kenya has been a major issue to the environmental sustainability. Many environmental organizations have put efforts to ban the use and production of these bags but these has been met with resistance both at the social level and the government level, citing reasons such as unemployment.</p> <p>This calls for an alternative way of putting the plastic bags to better use; by producing energy. Of the materials used to manufacture the bags, 80% is polyethylene. Polyethylene is derived from natural gas and petroleum. This means that they have a high calorific value. Burning these bags in a Combined Heat and Power (CHP) system, can provide an alternative source of electricity and heat which can be used in hospitals, hotels and also for agriculture.</p> <p>We propose a plan to set up a CHP plant in one of the major cities Kibera Slum in Nairobi to be able to deal with the issue of environmental pollution as well as generate income.</p>
Alpha Yacob Khlud Mohammed SemiraAkmel	Complimentary Currency/ Waste	<p>Entrepreneurship is the action of initiating or financing new commercial enterprises. Green entrepreneurship will then be more sustainable and resilient way of creating jobs and businesses. Even though it is quite workable in an individual level, we believe it works very efficiently in a community level. A community is composed of diverse people with quite diverse talents. We propose the creation of an arena where such diverse skills get the chance to come out and be exchanged within the community, say with the use of <u>complementary currency</u>, without compulsory use of conventional currency system. By designing and promoting interest free, demurrage based mutual credit system, community life will be enhanced and cooperation among individuals be well promoted giving huge opportunity to the under privileged. People will have access to the abundance</p>

<p>Samuel Muoria Jelieth Muthoni</p>	<p>of their environment when bridging of unused resources and unmet needs is achieved. Hence, our proposal is the design, construction and implementation of a 'space' where sustainable and ecological transactions which match with the resources we have take place smoothly, which by the end creates community level entrepreneurship.</p> <p>.....</p> <p>A community is composed of diverse people who can come together to be of great force, be it building up the neighbourhood or polluting it drastically with wastes. One way of taking advantage of this resource is taking the responsibility of organizing it into a profitable and sustainable direction. We propose a community based association which creates job opportunity for the community members by taking domestic wastes- solid/liquid, organic/inorganic- and turning it in to energy which will again serve the community.</p> <p>Enzymatic transesterification has attracted much attention for biodiesel production as it produces high purity product and enables easy separation from the by-product, glycerol. But the cost of enzyme remains a barrier for its industrial implementation.</p> <p>In order to increase the cost effectiveness of the process, the enzyme (both intracellular and extracellular) is reused by immobilizing in a suitable biomass support particle and that has resulted in considerable increase in efficiency. But the activity of immobilized enzyme is inhibited by methanol and glycerol which are present in the reacting mixture.</p> <p>This technology will benefit the youth and create jobs and other industries in the countries and create platforms for proper sanitation and energy infrastructure. In both settings it would give people the power to grow a clean burning renewable fuel while simultaneously cleaning wastewater runoff.</p> <p><u>Aim and Objectives</u></p> <ul style="list-style-type: none"> <li>• The aim of this research is to evaluate the viability of algae growth in wastewater.</li> <li>• Evaluate techniques and solvents for the safe and cost-effective extraction of oil from algae.</li> <li>• Cost –effective conversion of algal oil to biodiesel using lipases</li> </ul>
<p>Rene Moturi (Kenya) AdemolaSadiq (Nigeria)</p>	<p>In many developing countries, the issue of domestically generated solid waste management remains a lingering challenge. It is business as usual, as no one seems to really care as huge dumpsites keep growing every day. Unknown to many people, there is a huge money making potential in recycling some solid waste material while also ensuring that our environment is made cleaner.</p> <p><u>Our Activities:</u></p> <p>We are collaborating on glass recycling projects at domestic level to create household goods like drinking glasses, flower vases, glass beads for jewellery, candle holders and many more.</p> <p>Given an opportunity we will like to present some few samples that we bought with us and a small power point presentation.</p>
<p>Danson Ndegwa. M. and Jomo Kenyatta</p>	<p>Own or rent a land at a semi-arid area, harvest the rare rain water to sustain food crops irrigation (chillis, onions and mangoes) for one year before the next rainfall. Incorporated the mango preservation, and mango wine processing in the land.</p> <p>It will act as a model and increase food value chains.</p>
<p>Prof. Martin Klöti (with the support of</p>	<p>A group of professors at the University of Applied Sciences Northwestern Switzerland (FHNW) has defined a three page Charter for Sustainability that can serve as a common denominator for such bundling of like-minded people, organisations and</p>

Antoine Khalife and Nickson Otieno)		<p>networks and it has a website <a href="http://puntmuragl.org">puntmuragl.org</a> running to support the bundling process for education, vocational education, forming and self-learning bodies and platforms.</p> <p>The co-operation of FHNW (in form of <a href="http://puntmuragl.org">puntmuragl.org</a>) with YES! (International workshops for sustainable education with a big alumni community), with Young Engineers for Sustainable Empowerment (YESEF) and with <a href="http://seecon.ch">seecon.ch</a> has been agreed. Seecon.ch is an experienced and successful company that runs sustainable development projects since 15 years in Africa, Asia and Eastern Europe. These three Swiss organizations would like to find potential support to give them relieve and support in smooth and secured ongoing operations.</p>
Martin Kloeti (with the support of Olusegun Koleola and Dominique Jaquemet)		<p>The so called EM-technology makes best use of such low tech and low price practice: applied with organic material it is very effective to cure spoiled land, soil, water and bodies, it can replace antibiotics, fertilizers, fungicides, pharmaceuticals, chemicals, detergents.</p> <p><u>The case</u></p> <p>The case includes the promotion, distribution and application of the particular microorganism materials in agriculture, gardening, water preparation and possibly health care in Africa. There are already representations in place, however the potential is not very well known yet and shall be increased all over the continent.</p> <p>I would be glad to enjoy your great support. Thank you very much in advance.</p>
Olusegun Koleola	Waste Management	<p>Based on the presented concept of the workgroup "Waste Management - Solid Waste" I want to address all schools in Nigeria to start and maintain the collection of solid waste all over the country. We count on the commitment of the pupils and students, who actually bring the waste to the households and collect it on a regular basis and bring it to the collection centers. For the collected materials the pupils and students earn bonus points. If they have enough bonus points, they can use them to get fancy trophies, i.e. sport shoes, books, laptops, mobile phones, shirts, trousers, etc. There are even big trophies, which would require the pupils and students to organize themselves in groups. These groups will then efficient enough to collect enough points to win big trophies, i.e. music instruments, band rooms, sport equipment for a football team, etc.</p> <p>To start the case, we shall be able to buy, design and stock the collection means (bags, baskets, containers, ... with a self speaking/explaining logo), small carriages to carry heavy weights and the trophies. Although the collection centers will be run by private parties, we need to define their business case and processes, as well support to get them started.</p> <p>I would be glad to enjoy your great support. Thank you very much in advance.</p>
Cleave Odhiambo, Peter Munyaka	Rabbit Farming	<p>With a niche market for rabbit meat and rabbit fur skin, Kenyans can benefit from rabbit farming, if only people change their attitude to rabbit meat. The gestation period for a rabbit is 28 days and a mother rabbit can have between 5-10 young ones in her litter. Young rabbits, which are given commercial feed, can mature within 3 months although normally, a rabbit takes 6 months to reach maturity. Rabbits do not require too much space for rearing, and provide both meat and skin if sold, as well as give food to the family.</p> <p>Local market for rabbit meat is largely untapped, with a kilo of meat going for Shs 250 at the butcheries and Shs 350 in local 5 star hotels. With the health benefits of rabbit white meat, demand has increased in many nations across the world, especially after the Bird Flu pandemic that led to the culling of poultry in many Asian countries. Kaka Sungura is a Kiswahili word meaning 'brother rabbit'.</p>

<p>Tamunosiki Wokoma, Joyce Ojino.</p>	<p>“SUSTAINERGY” Aims at producing BRIQUETTE. Briquettes are alternative source of energy for charcoal that is health and eco friendly. It is targeted at the middle class income people of Kenya, Uganda and Rwanda. The sources of the raw material are from organic waste which would be gotten locally. The aim is to reduce the cutting down of trees, recycle of organic waste and to conserve the environment.</p>
<p>Anthony Musili Geoffrey Mosongo</p>	<p>The university community is a major consumer of print paper and this makes it one of environments where paper waste is produced. To pioneer this project, the business name shall be registered with the Registrar of Companies, Kenya. We shall then create awareness in the university about waste segregation so as to facilitate easy collection of print paper waste. This paper shall then be turned in briquettes and then sold for fuel.</p>
<p>Omulloh Augo</p>	<p>There is no known dedicated communication media and channel(s) available to especially public schools or rural schools. It is also important to note that this situation is common to other African countries and even other third world countries. It is on this background that a means of communication for information and knowledge sharing that is affordable both at individual and institutional levels become a necessity. The idea is to establish a magazine targeting each niche, both online and print. The respective institutions shall be brought on board by asking them to subscribe so as to have a known volume of production from the start and hence avoid long runs in normal operations and so ensure zero or very minimal loss. At the same time, the cost to the institutions shall be taken care of by the recyclable papers that are immensely available in these institutions. Hence, the project shall not significantly affect the budgets of these institutions. On the same note, the cost shall be kept at minimal; about half a dollar or less. The online version shall ensure the effect on trees is minimized. On the same note, the cost incurred with earning from recycled paper shall also ensure that trees are saved significantly. It is on this perspective that it is called the green magazine publications</p>
<p>Ochieng Effie Kongiani Tevin</p>	<p>The main aim is to reduce environmental pollution by collecting polythene and subjecting it to high pressure and heat with the goal of harnessing maximum energy from it. The energy can be used by the locals in Kiberia to drive their energy needs. Fumes emitted in the process can also be put to use in that the CO<sub>2</sub> emitted is trapped and used to make fire extinguishers. Collection of polythene provides employment for the locals and this project can help solve the problem of dependency on the Kenya Power and Lightening Company (KPLC) as the only source of energy in the country.</p>
<p>MilanaPeric, MilovanMedojevic, Serbia</p>	<p>The idea is to make the center where pupils and students can learn practical things about energy efficiency and renewable energy, bat also we will provide workshops on organic farming and produce electricity and heat for our own needs as well as trade with the amount of final energy with our community. Also. We will provide consultancy services like energy audits, trainings, courses as well as technology research.</p> <p>Key partners:</p> <ul style="list-style-type: none"> <li>• Government</li> <li>• Universities</li> <li>• Equipment producers</li> <li>• Like-minded organizations</li> </ul>

Kamran Asif (Pakistan)	<p>Value proposition:</p> <ul style="list-style-type: none"> <li>• Practical experience and workshops</li> <li>• Show-case (producer show-case opportunity, business marketing)</li> <li>• Local contribution to decreasing energy imports</li> <li>• Behavioural change and activism</li> </ul>
	<p>To aware/educate the Youth (Nepal, Bangladesh and Pakistan) on climate change issues and to build sustainable future prospects for themselves in their local economies by re-establishing the value of healthy natural systems for continued human existence and thus to create young custodians of nature, the participants of the youth forum may be awarded and declared as “Green Fellows of Mountains” to give them sense of responsibility and ownership so that they could actively take part in environmental conservation activities in their respective areas. The Green Fellows will also work on voluntarily basis to support the ICIMOD’s initiatives in awareness and capacity building of the Youth.</p> <p><u>Objectives of Green Fellows</u></p> <ul style="list-style-type: none"> <li>• Environmental awareness among youth in their respective areas</li> <li>• Creation of sense of ownership towards environmental protection and rehabilitation.</li> <li>• Information and understanding about common local and national environmental/ climate change issues</li> <li>• Increased confidence, knowledge, skill and leadership</li> <li>• Positive attitudes towards nature, natural resources and processes</li> <li>• Networking for future interaction and collaboration</li> </ul>