

UNITED NATIONS DEVELOPMENT PROGRAMME

**UNITED NATIONS INDUSTRIAL
DEVELOPMENT ORGANIZATION**

ENERGY FOR POVERTY REDUCTION: THE CONCEPT OF THE MULTI-FUNCTIONAL PLATFORM (MFP) AS A REGIONAL PROJECT

Concept Paper

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1. ENERGY AND POVERTY IN RURAL AFRICA

1.1 The scale of energy poverty.

According to the World Energy Assessment, energy services are indispensable for human survival and development. They play a critical role across the whole spectrum of development activities. Of the three billion people living in rural areas in developing countries today, nearly 2 billion still have neither access to nor can pay for modern energy carriers, such as electricity and/or liquid or gaseous fuels. These energy carriers are to provide essential energy services such as heating for cooking, motive power, lighting and cooling (refrigeration), thus seriously reducing the income opportunities and quality of life. In spite of some investment made, population growth has kept these numbers of people without access to energy services virtually stable since 1980. The problem is particularly acute in Sub-Saharan Africa, which includes 30 of the 49 least-developed countries (LDCs). In those countries, per capita commercial energy use has remained static since 1980. Although over 800 million people in developing countries as a whole benefited from rural electrification schemes during 1970-1990, only 20 million gained access in Sub-Saharan Africa.

The switch to modern energy carriers for two billion people would amount to only 3% of global oil consumption—when measured in terms of oil equivalent units—as relatively small amounts of absolute energy are involved. Yet, such access would lead to vast gains in terms of human development, in the social and economic well-being of the women, men and children concerned, who are currently among the poorest segments of the world's population. Increased access to modern energy services is necessary (but not sufficient) for sustainable development and poverty eradication.

1.2 The energy system of poor women in rural Africa

In Africa, millions of women spend hours a day carrying fuel and water, taking away valuable time for other activities. Women in rural areas in Sub-Saharan Africa are at the bottom rung of the so-called “energy ladder,” which associates users of progressively cleaner, more efficient fuels with corresponding higher levels of income. It is a situation that is both a determinant and a manifestation of poverty and inequitable gender relations. Traditional biomass (dung, agri residues and fuel wood) is at the bottom rung of the ladder for cooking, with charcoal, then kerosene and finally liquid petroleum gas (LPG) and electricity are towards the top.

Traditional rural energy systems are characterized by the use of biomass, in the form of wood, plant residues, dung for heating and cooking, and human energy and or animal energy for motive power. Approximately 80% of household energy requirements are thermal energy for cooking and that is mostly provided by biomass. Human energy, measured in energy units, constitutes a small proportion of energy resources consumed compared to other sources. But the labour of women and children are indispensable in making the energy chain work: such as the extraction/collection of biomass to its transformation into an energy service such as heat for cooking. The extraction, transport, processing, conversion and distribution are the responsibility and the work of women, girls and boys primarily, according to the social norms which prescribe which activities are the obligations of women and which are those of men.

Women are also at the bottom rung of another energy ladder for motive force. They depend entirely on their own motive force and are normally without any other resources such as animal power, mechanical or electrical devices for such energy transformations. Even where animal power and/or mechanical equipment are available in the household, gender norms, relations of power and division of labour tend to exclude women from use and certainly ownership and control of these assets.

This energy situation has tremendous survival and developmental implications since the tasks associated with food preparation are critical to the prevailing agricultural systems. Small land owners engaged in agricultural production make up about three quarters of the rural population. Their production, the main source of rural livelihood and income, is primarily based on human and animal energy, that is on muscle power. This motive power requires the biological conversion and storage of food into useful energy. Food intake, crucial for the daily reproduction of human energy for agricultural labour, in turn depends on processing and preparing the food harvested or gathered. The frequent, repetitive tasks associated with post-harvest food preparation, such as provisioning for water, firewood, grinding grain, pressing cooking oil and processing other ingredients are women's responsibilities and obligations. These are in addition to women's other labour inputs in agricultural production and in gathering the "wild" resources used in food preparation, oil and soap making and other household provisioning needs.

Dependence on such traditional energy systems leads to multiple social and economic costs, which are overwhelmingly borne by poor women. Linked to the lower energy efficiency of fuelwood combustion (15% for firewood cooking stoves, compared to kerosene at 50% and gas at 65%) are the higher emissions of sulphur, carbon dioxide and particulates, pollutants resulting from incomplete combustion. The occupational hazards for women –and for their young children– from exposure to indoor air pollution, smoke and particulates when cooking are the negative impacts in terms of health: burns, acute respiratory infections, lung disease, internal disorders and eye problems. Load carrying of fuel and other materials, for example in palm oil processing takes a health toll in terms of injury, miscarriages, fatigue.

Poor women in particular pay a disproportionate price for energy services not only because of the inefficiency and associated health costs. Long hours are spent collecting water and firewood for both food preparation and agro processing, as well as the multiple other tasks that sustain rural livelihoods. The arduous and time consuming nature of women's activities in such energy systems has significant opportunity costs in terms of other activities. These are agricultural production and other productive and income generating uses of time and energy, as well as time and energy for child care, health, education, rest, social and cultural activities, recreation and personal maintenance. As traditional fuelwood sources and water get increasingly scarce, the costs in terms of women's time and energy become more severe. This can also mean that they need to generate cash to buy firewood that is no longer possible to collect individually and this cash generation in its turn takes time and energy, including marketing time.

Widening access to modern energy services can be a catalyst for sustainable human development, given these patterns of energy uses. But increased income is necessary to be able to afford to climb another rung of the energy ladder and release human time and energy for human development purposes. However this increased income is not possible without spending further time and human energy, when usage levels are already very high. Such is the energy-poverty trap which women in Sub Saharan Africa, in particular are struggling to get out of.

2. EXPERIENCES AND LESSONS LEARNED FROM THE MULTI-FUNCTIONAL PLATFORM

The challenge is how to enable poor women particularly, as well as men, to get out of the energy-poverty trap, and have affordable and sustainable modern energy services. The main lesson is that for energy services to be affordable by poor women and men, it has to be for end-uses which are directly

productive and income-generating. It is this chain of conversion of energy for income which can facilitate the transition over time to cleaner, more efficient fuels and more opportunities for enhancing productive and welfare uses of human time and energy.

2.1 The responses needed: The Multifunctional Platform (MFP) approach

In order to respond to those challenges, UNDP and UNIDO, in collaboration with the Government of Mali, initiated a Multifunctional Platform Project in Mali in 1996. After a participatory evaluation in 1998, the project was extended, under National Execution, to four regions of Mali to enable 450 villages to benefit from the multifunctional platform. The Programme seeks to reduce the rural poverty in general and that of the rural women in particular, while creating income-generating opportunities through provision of affordable energy services. In October 1999 UNDP, in collaboration with the Government of Senegal, Ivory Coast, Burkina Faso and Guinea, launched a regional multifunctional platform programme. Today, the programme also works with other UN agencies including UNIDO, UNCDF and IFAD.

Figure 1. A typical Multifunctional Platform set-up



The platform (see Figure 1 above) has a simple diesel engine that can power different tools, such as a cereal mill, husker, and/or battery charger. The engine can also generate electricity for lighting and refrigeration and to pump water. The advantages of the engine are its simplicity and multiple uses. With its many functions, it can be used for variety of services that can generate incomes for the group operating the platform. Because it is a very simple machine, its installation and maintenance can all be handled by local artisans and its spare parts are readily available across the West Africa.

The project is managed in a decentralized manner. In Mali where the project is in its most advanced stage, Advisory Units have been set up in different cities in order to respond to a variety of local demands on a timely manner. The Advisory Units, under the directive of a national Co-ordination Unit, facilitate:

- support for the purchase of end-use equipment and for access to financial services
- building entrepreneurial and management capacity to own, to manage an energy enterprise and to operate end- use equipment for the energy end-uses desired

- strengthening a network of private suppliers and service providers for the installation, repair and maintenance of the platform
- building capacity to achieve the outcomes and impacts desired, such as more rest and better health, better income generation in food production and processing,.

The key elements of the strategy are:

Demand-driven: The project only responds to firm requests from rural entities such as a Women's Association for the installation of a platform. The clients of the end-use equipment and the purchasers themselves determine the type and level of energy services they are willing and able to pay for. The configuration of tools installed is thus village-specific.

Feasibility assessment, Monitoring and Evaluation: Before a platform is installed the social economic and technical feasibility study is undertaken. This assessment enables the users and purchasers to make a decision for purchase based on informed choices, the identification of partners for the energy enterprise, establishes a base line against which results can be tracked, helps to determine a strategy for effective follow-up (see photo below).



Ownership and management by women: The platform is owned by the Womens' Association which has already mobilized funds for its acquisition. They elect a management committee members of which are trained in managerial and entrepreneurial skills to ensure the technical and economic viability of the platform. The platform as an estimated cost of US\$4,000 for engine, rice de-huller, stone mill, battery charger and housing. It is comparatively cheap to buy, to install, to maintain and replace. Between 40- 60% of the cost is financed by the beneficiaries and the one-time subsidy of US\$1,500 is provided by the project. The programme informs villages of existing financial and management support facilities and facilitates access to credit in order to allow them to finance the platform. Depreciation and variable costs (maintenance, salaries of female operators, etc.) are borne entirely by the Women Management Committee.

Local capacity building for the private sector: All technical operations required by the platform are handled by the private sector (purchasing, installation, repair, and maintenance). The project identifies, networks and strengthens the capacity of existing mechanics and artisans to service platforms.

2.2 Impacts and challenges

The present project has received 221 requests from villages in Mali in 2000 and aims to install 250 new platforms in 2001. It is aimed at expanding its operation to cover 450 villages, reaching about 10% of the rural population in Mali. Although its results are yet to be fully seen and examined, there are tangible positive impacts as well as challenges that are emerging.

2.2.1 Impacts

The availability of affordable modern energy services in rural areas is already transforming conditions in many of the villages. With a lighter burden on women and a new source of income, women have acquired better status in their society. Some of these impacts are highlighted below:

2.2.1.1 Indication of financial sustainability

Despite that many of the platforms are purchased through one-time subsidy, which is provided for by the donor-funded project, there are several positive signs that give some lights for sustainability. For example:

- 19 platforms were installed in the Sikasso area of Mali without any subsidies given from the project. In these cases, the villages directly contacted private artisans who had been trained by the project, and procured and installed them on a commercial basis.
- At least 5 villages have been able to replace the engine through their own funds or supplier credit.
- In 1998 at the end of the pilot phase, 40 out of the 45 platforms installed were in existence and are still operational.

Giving support for its purchase has widened access to poorer groups of women who are nevertheless still able to afford to run and maintain it, particularly given its income-generating potential.

2.2.1.2 Income generation

In most cases, there is a prioritisation of end-uses of energy (or type of income-generating services that the platform provides.) Table 1 and Figure 2 present a fairly typical breakdown of end-uses of the motive power: Crushing shea nuts for butter production and soap-making, making food pastes and shelling hulled grains are the most widespread income-generating activities, as the efficiency and productivity of food processing is increased. As shown in the Table 1 and the Figure 2, the platform at Kondogola is providing a positive net income.

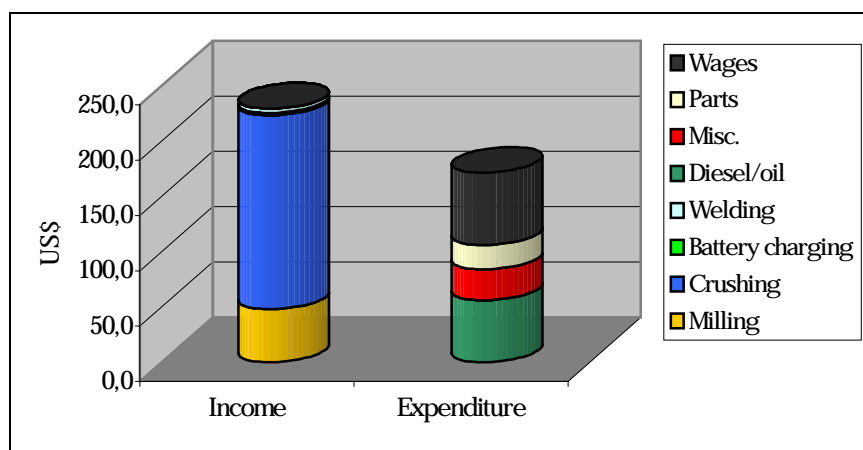
Table 1. Balance sheet of platform operations

Balance sheet of MFP at Kondogola, Oct 2000			
Income, US\$		Expenditure, US\$	
Milling	47,62	Diesel/oil	55,98
Crushing	175,34	Misc.	27,68
Battery charging	2,06	Parts	21,98
Welding	4,12	Wages	65,82

Total income	229,15	Tot. expenditures	171,45
Profit, US\$57,70			

1 US\$ = 728 CFA

Figure 2. Graphical representation of financial operations at Kondogola

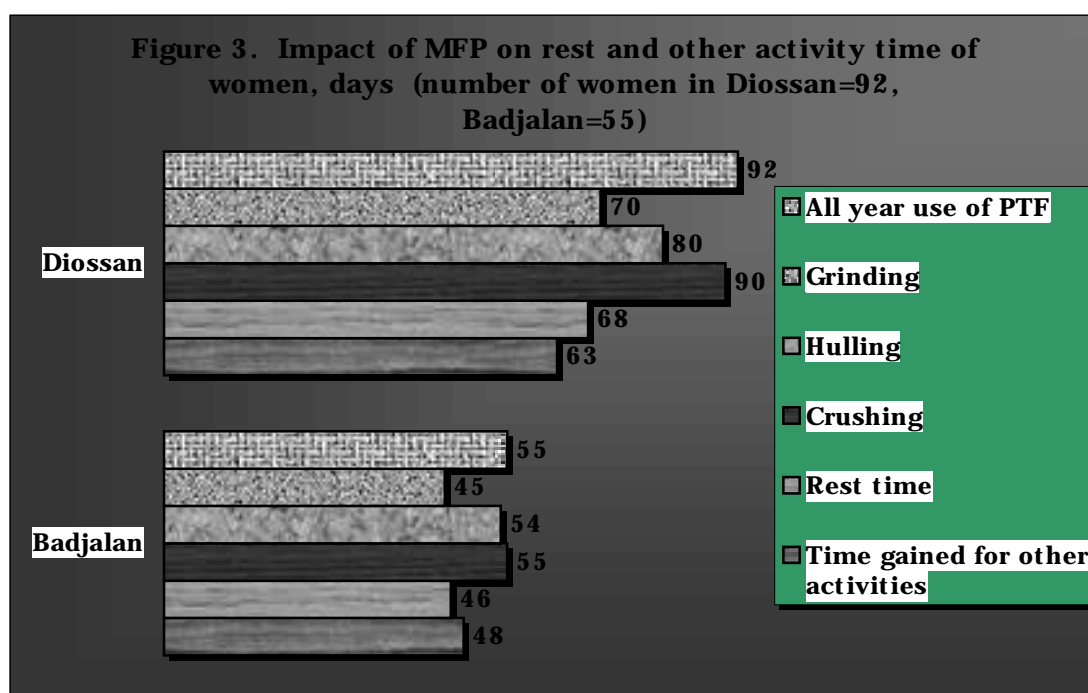


Net annual benefits of well-managed platforms can rise up to US\$ 500-700

2.2.1.3 Freeing-up women's time

One of the most important impacts that the multifunctional platform brought to women is the time to rest. As shown in Figure 3, rest and income generation are the two most important desired and expected outcomes by the potential clients from the energy services, which are being realized. This willingness to pay for rest by women is a compelling indicator of the depth and severity of their energy poverty. A floor has been reached in terms of women's capability to maintain themselves, with significant trade-offs in terms of health and well-being and to provide for the food security needs of their families.

Rest can be interpreted in two ways: less time per task and/or less arduous tasks enabling other activities to be done. The equipment allows women more choices in determining the uses of time and energy that they desire and are willing to pay for. If it's for rest, it clearly benefits them, if it's income, then the feasibility methodology attempts to ascertain and the follow-up activities attempt to enhance the conditions under which they retain control over the income for their own desired ends.



Time gained on food processing and domestic tasks can reach up to 8 hours per week.

2.2.1.4 Market and employment creation

- Women's unpaid and visible labour in providing energy services is made visible and transformed into the employment of 5 to 10 operatives and cashiers per platform (mostly women) who receive wages based on enterprise turnover.
- The platform as energy enterprise creates an energy market within the village and among villages. It makes use of and generates business for private service providers such as repair and maintenance artisans, providers of parts, supplies and equipment, business management support services networked and trained further by the project.
- The battery-charging and welding end -uses are revenue-generating activities for the energy enterprise, which directly exploits the multifunctional character of the platform.

2.2.1.5. Women's empowerment and gender equality

The platform enables the relative shift from women's unpaid labour to remunerated work—the women clients are able to spend more time and energy in socially and economically more efficient and welfare-enhancing activities.

- In many villages it means that they can have access to their own private plots, as they now have more time/energy to work these plots, the income from which is recognised as theirs alone to dispose of as they wish. It is not lack of available land and the practice of customary law which is a constraint to women's access to land. It is women's labour time and energy, which is the limiting factor in agricultural production. This situation provides a basis for men to continue to

assert their right to command women's labour in their own fields, and the women to continue to undertake it unpaid, as an obligation.

- Girls released from energy and time-intensive tasks have more time for school and/or recreation, at the same time as their mothers, often responsible for school-related expenses, generate the ability to pay for this schooling.

Gender relation: The breakthrough in the gender division of assets is striking, because male clients for battery charging and welding pay for these modern energy services to an energy enterprise owned, managed and operated by women. Using energy as entry point to transform gender relations and empower women draws on the interdependent, but however unequal, nature of the economic relations between poor women and men.

- Easing women's energy poverty certainly benefits men too. This allows women to mobilize men's financial and social support.
- But it at the same time creates the conditions for women to negotiate over time more equitable terms of cooperation, and be able to continually manage the ever present risk of resistance to change from men as well as attempts to take over control of assets.
- Without capital grants, the women's associations would not be able to afford the platforms and leverage other funds. The village contributions from women's own funds and those that they can mobilize in the village from the male associations, finance on average between 40% to 60% of the total equipment costs of the platform.
- The higher the share of the women's association, the more leverage they have in controlling the platforms and ensuring energy services appropriate to them. The project through mechanisms such as the feasibility study and negotiations for loan funds helps to create the institutional conditions for women's access to credit, crucial in breaking the energy-poverty trap. Raised by the women-owned enterprise, credit further increases their financial stake in the business relative to men.

It is through these relationships that addressing women's energy poverty particularly also lead to knock-on effects on children and men's poverty as well. This is a key element for the social assessment of the platform: the social capital it embodies and its potential for transforming gender relations and contributing to women's economic empowerment. Overcoming the energy-poverty challenge would mean an alternative decentralised demand-driven approach in which the poor users and purchasers of the energy services themselves determine the type and level of energy services.

2.2.2 Challenges

There are a number of constraints to be overcome and opportunities to exploit which present particular challenges for sustainability.

- **Income generation:** The platform depends crucially on income-generating capabilities to break the energy-poverty trap but local markets, serving poor customers, are limited in the scope for revenue growth. Village level cereals shea butter and food pastes processing combined with marketing the products of a cluster of platform villages to more profitable markets is one opportunity to increase local value-added and generate economic growth, but these would need meso-macro linkages.

- **Sustainable energy:** The use of diesel is an obstacle for acceptance within environmental management and sectoral programmes which favor renewable energy technologies. And at the same time, the fact that the engine can run using locally available biomass, the *jatropha curcas* shrub, whose nuts can be converted into liquid fuel is currently under exploited as are its income-generating and environment regeneration potential (see Figure 4 below). Without a determined and focused approach at micro, meso and macro level to exploit this potential and explicitly address energy poverty and environment linkages by a range of stakeholders, using the platform as a hub, the target of 15% of platforms running on jatropha oil in Mali by the end of the project is unlikely to be met. The use of other biomass resources should be looked into.

Figure 4. *Jatropha curcas* shrub and its nuts



- **Market creation and clustering:** The platform approach privileges private sector development and a market-making strategy, which implies being able to achieve a high rate of replication in platform installations within supply zones. However local rural industrial markets are narrow and the rural technical skill pool very weak. The clustering for energizing rural markets requires more concerted public-private sector efforts as part of a strategy for rural and regional development at both macro and meso levels.
- **Enabling access to credit:** The responsibility of easing transaction and information costs of many small loans to widen access to credit still rests with the regional support zones as intermediaries. There are no intermediaries at present with knowledge and know how in managing energy loan programmes at zone level and the capacity of the local private sector to do so durably needs to be reinforced.
- **Institutional framework:** There is no easy organizational vehicle or platform for a technology and a methodology with the multifunctional platform's cross-sectoral approach. Often, there is no clear policy and institutional framework for decentralized energy supply for rural areas. There is a problem of sustainability of this current institutional framework as the programmes, dependent on donor funding draw to a close. A challenge is to identify and work with appropriate legal and institutional mechanisms for building the capacity for upscaling and replicating the platform approach. Building competence and capability to mainstream the platform approach into existing public and private institutions at meso and macro level for sustainability will also pose a significant challenge.

- **Policy co-ordination:** At meso and macro level, how a focus on the users of energy services for multiple ends can be a practical engine of synergy for policy co-ordination and for linking sectoral programmes to promote sustainable human development is poorly understood and advocated. For example, national poverty reduction strategies do not address time and human energy poverty. Data for policy macro economic analyses and policy which make the link between poverty reduction and economic growth do not count and analyze data on the informal sector and on household provisioning under smallholder production, as can be generated by individual platforms and aggregated to national level. This misses out the significant constraint which the energy poverty of poor rural women represents for growth and poverty reduction prospects.

Environmental policies and programmes do not closely specify the connections between sustainable energy and poverty eradication. Energy policies and planning tend to be top-down and supply-driven. They do not mainstream a gender approach while gender equality and women's empowerment programmes do not clearly make the micro-macro linkage between energy poverty at micro level and integrating women's unpaid labour in national accounts for better macroeconomic management.

3. BUILDING ON THE LESSONS LEARNED: SUSTAINABLE ENERGY STRATEGY FOR POVERTY REDUCTION IN RURAL AREAS

The achievements the multifunctional platform initiative made clearly present excellent opportunities for breaking the energy-poverty lock-in that most developing countries are faced with. A challenge is to mainstream the platform approach into national policies/strategies and scale-up and replicate its achievements in order to make macro-scale impacts on socio-economic status of poor women and men in rural areas.

Taking into account the challenges and constraints to-date, such a ***strategy for a scaled-up multifunctional platform project in Africa*** should focus on the following objectives and be composed of the elements listed thereof:

Outline of project objectives and key activities.

The main objectives of the scaled-up project are:

- Build and strengthen the capacity to disseminate, implement and for ongoing review of the platform approach to sustainable rural energy services.
- Promote policy co-ordination and strengthen the capacity of existing institutions to sustain the effective provision of decentralized sustainable energy services targeting poor rural women and men.
- Enhance the income-generating ability of access to energy services and end use technologies as well as the ability to afford sustainable energy services.

Key elements of project activities include:

I. Peer review of the experience

The experience with the dissemination of the platform at the village and regional level throws light on some ways forward for a sustainable energy strategy for poverty reduction in rural areas. However, in order to come up with an appropriate implementation framework for a scaled-up project in other African countries, the initiative in Mali will be further scrutinized. Consolidation and evaluation of results, including various tools for project-level implementation and assessments, will be made, and a peer review will be conducted in the form of a multi-stakeholder workshop. Based on these, the conceptual and operational framework for the scaled-up project will be established.

II. Assessment of national policies

The strategy of the scaled-up project needs to address the macro, meso level constraints in upscaling and replicating the platform and adopting a bottom-up approach to sustainable energy for rural areas. It also needs to enhance the opportunities, which exist for poverty reduction and for the transition to sustainable energy services. In order to find entry points to best meet these challenges, the project will begin by doing an **assessment of the energy-poverty situation** in each of the concerned countries, providing a peer review of the status of rural energy and its policies; identifying constraints and opportunities that current rural energy systems presents for rural women and men; and advising policy options that can be tested and put into practice through, *inter alia*, the multifunctional platform approach.

III. Development of national strategies

Based on the national energy-poverty assessment, a country-wide strategy will be established that define the implementation framework of the multifunctional platform initiative in the country. Such strategy would have to be built based on the following considerations:

- III.a) **Promoting pro-poor local governance:** A key for success in mainstreaming efforts will lie in how to integrate the project approach into local governance structure. Too often external supports have focused on either central governance or civil society organizations, bypassing local government - a critical missing link in poverty reduction efforts. Although the multifunctional platform approach will be built around private sector interventions, supporting local governance structures as a platform for implementation is the key to foster long-term impacts and sustainability. Building on the country assessment and the evaluation of the experience in Mali, the national strategy will provide an in-depth analysis on the institutional aspect. Needs for capacity building of the concerned local authority will be identified as one of the major components of the project.
- III.b) **Flexible, context-specific approach:** One guiding principle in considering a strategy for replicating and up-scaling is the need to keep a flexible, client-oriented and context-specific approach. At multi-country level, it means transferring know how about the platform concept so that each country is able to mainstream the platform approach at the meso and macro levels and to replicate it through adaptation to local conditions and innovation. There is no quick fix about how this can be done as the learning curve of the Mali project shows. For a scaled-up project this means an approach which builds on common problems and solutions but which is able to respond to the specificity of each country.

- III.c) **Adopting measures to exploit the opportunities for transition to renewable fuels:** Investigations into local energy resources such as the use of bio-fuels will be conducted on a county-by-country basis, where appropriate. This includes a feasibility study of *jatropha* oil substitution for diesel in platforms taking into account its potential for meeting other objectives of sustainable agriculture and income generation.

IV. Implementation of national strategies:

- IV.a) **Implementing pilot multifunctional platforms in new countries:** The main vehicle to “test” identified policy options at the country level would be the installation of 50 pilot platforms on which concrete results on social, economic and environmental benefits would be achieved. 20 water and/or lightning networks should also be installed in this perspective. Through this “experiment of policy option,” the specific obstacles and opportunities within each country will be identified and analyzed. This analysis will provide a direct feedback into the national rural energy strategy for strategizing significant scale-up/replication of the initiative without further external financial support.
- IV.b) **Promoting “upstream-downstream-upstream” linkages:** A critical component of the project is that it is designed to inform better policy making on poverty-energy, gender-energy nexus, etc at the country level. For this purpose performance and impacts of pilot platforms will be monitored on a regular basis, using the methodologies being developed for the project in Mali. One of the important targets in this area is the unpaid energy services performed by rural women. The dominant trend so far is to make this visible and account for it through time use data, aggregated as satellite accounts or into national accounts. This would really be an innovative approach, linking poverty reduction, energy and gender responsive macroeconomic information and policy making.

V. Networking and sharing experiences about lessons learned for further replications

- V.a) **Sub-regional approach:** The strategy for replicating would be to have a sub-regional approach, as a context-specific and supply zone approach is still important. The existing project focuses on West African countries (all Francophone) and concentrating at first on the replication and upscaling lessons and responding to new country requests within that sub-region would be very valuable insight for designing strategies for replication and up-scaling in other sub-regions. The current networks, linkages, instances and arenas for sub-regional initiatives can then be exploited. Existing countries in the regional project can then be used as demonstration sites. By the end of the project, lessons would be learned and disseminated about replication and upscaling at country, sub-regional level for adaptation to other sub-regions.
- V.b) **Networking and sharing experiences:** Over the project life, these common activities, but with different country profiles would be the basis for distilling and sharing experiences about lessons learned among participating countries by the organizations involved in micro and meso level activities. On the basis of these in-country experiences with the platform, policy advocacy and co-ordination activities would be carried out to carry the strategy for overcoming constraints and building on opportunities at policy level. A number of workshops will be organised at national and regional levels. It will also host a website that will provide a whole spectrum of results and lessons-learned from the initiative.

4. IMPLEMENTATION MODALITIES

Building on the momentum already generated by the Mali project and the current UNDP regional project, the expended regional programme will seek to strengthen the partnership with UNIDO to ensure the most efficient execution of the programme, within their respective organizational mandates and comparative advantages.

5. BUDGET

The scaled-up project would support initially the scaling up of those countries covered thus far and extend its operation in 10 countries in Africa over the period of the next four years.

An estimated budget, related to above-mentioned activities, is given below:

Ref.	Activities	Budget (US\$ million)
I	Review/stocktaking of lessons-learnt	0.4
II	Assessment of existing national policies	0.4
III	Development of national strategies	0.6
IV	Implementation of national strategies (including pilot platforms and water/lighting networks)	5.0
V	Networking/dissemination	1.0
	Programme management	0.6
	TOTAL	8.0

Figure 5. Blackboard for Multifunctional Platform accounting

