EXECUTIVE SUMMARY

Strengthening women's participation in low-carbon jobs in Senegal Spotlight on the solar energy sector



Laurence Dhaleine and Servane Fauvet

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Introduction

In the transition towards a green economy, Senegal stands out as a regional leader. Renewable energy provides 30% of its electricity mix and the country has ambitions to increase this to 40% by 2030 (IEA, 2023). This shift towards low-carbon industries paves the way for the creation of green jobs in a variety of sectors, such as energy, agriculture and waste management. It is vital that women are able to access these new opportunities: their participation is essential to ensure a just and inclusive transition to renewable energy in Senegal and throughout Africa.

Greater participation by women in the renewable energy sector will generate a dual benefit. Once trained in these technologies, they will be able to not only become professionals in the sector but also to use these new forms of energy to develop income-generating activities, furthering women's development in the country. Improving girls' access to training in renewable energy will, therefore, enable them to advance both economically and socially.

At present, however, women across the African continent have a low rate of participation in the renewable energy sector – the result of various sociocultural and economic barriers. There is, for example, persistent gender stereotyping. Women are seen as more suitable for administrative positions rather than technical jobs in the energy sector, which are seen as more physically demanding (as highlighted in interviews conducted for this study). Nevertheless, this fast-growing sector requires a skilled workforce and women are well placed to play a key role in this transition.

It is important to examine the specific challenges that women face. Cultural norms, lack of access to education, and the absence of female role models present significant barriers to their participation in these fast-growing sectors.

A qualitative study carried out by FAADEV¹ (Femmes Africaines Actives pour le Développement) during the last quarter of 2024 set out to answer two questions:²

- What restrictions and challenges do women encounter during their training and on entering the labour market in the solar energy sector?
- What recommendations can be made to reduce the gender gap in the solar energy sector in Senegal?

This executive summary provides an overview of the challenges and opportunities faced by women working in the solar energy sector in Senegal, before outlining a set of recommendations to reduce the gender gap in participation - based on findings that emerged from the field study.

¹ FAADEV is a non-profit organisation that that works for the economic and social empowerment of women and girls by providing them with training, capacity building, and support for entrepreneurship.

² Following a detailed literature review, a total of 46 in-depth interviews (lasting 45 minutes to an hour each) were held with 34 young women in vocational or university education or in work, and with 12 men and women working in the solar energy sector.

Context

The energy transition in Senegal presents a complex challenge: the need to balance economic development with environmental sustainability. International commitments and local initiatives need to be aligned to ensure the future of energy is sustainable and inclusive.

There are, however, persistent challenges. In particular, women's participation in the renewable energy sector is limited despite a government commitment to gender equality. While legal and strategic frameworks are in place to promote gender equality, obstacles remain. These include gender stereotyping, cultural traditions and structural barriers, all of which continue to hamper women's empowerment.

To achieve true gender equality, increased efforts are needed to change mindsets, improve access to education and promote women's participation in all sectors of the economy, particularly in renewable energy. When women have access to energy, they can manage their daily tasks better, giving them more time to spend on income-generating activities.



Gaye Fatoumata Konte inspecting solar panels (Credit: Gaye Fatoumata Konte)



Overview of study and opportunities

Despite the considerable potential in renewable energy in Senegal, **women's participation in this sector is hampered by many socioeconomic and cultural restrictions**. The testimonies gathered for the study highlight significant barriers, including limited access to technical training, gender stereotyping and difficulties in entering the labour market.

Access to training is often hindered by a lack of awareness of the careers available and by financial constraints. Although increasing numbers of girls are entering scientific fields, they are still subject to cultural expectations that discourage them from pursuing technical careers. In addition, aspiring female entrepreneurs face difficulties in accessing finance, which limits their ability to start businesses in this sector.

Once training is complete, women face additional difficulties establishing themselves in the labour market. Prejudices about their role as mothers, along with sociocultural expectations, mean they are forced to juggle domestic responsibilities with professional aspirations. This situation is exacerbated by challenging working conditions and a lack of childcare.

Nevertheless, this study highlighted opportunities that could be developed. Women who are working in the renewable energy field show great determination. In many cases, they benefit from a supportive family and a favourable educational environment. Targeted initiatives, such as awareness-raising programmes and practical training, could help them – and others who want to enter the sector – to overcome the existing barriers.

It is vital to promote a gender-equitable approach in educational and professional policies to encourage women to embark on careers in the renewable energy sector. By building their skills and breaking down gender stereotypes, Senegal can not only improve the position of women in this sector but also benefit from a diverse, skilled workforce, which is essential for the country's sustainable future.

Women's involvement in the renewable energy sector represents an opportunity, not only for women's economic empowerment, but also the socioeconomic advancement of Senegal. Concerted efforts are needed to create an environment conducive to their professional development, in order to fully exploit the potential of renewable energy for the benefit of society as a whole.

Recommendations

A number of recommendations have emerged from the study on how to reduce the gender gap in the renewable energy sector in Senegal:

Education and training: it is vital to develop mobile training provision in rural areas, increase the range of training courses available after the baccalaureate³, and provide more accredited apprenticeships. There is also a need for a more gender-equitable approach that starts at school, as well as more practical teaching at university.

Communication: this needs to be improved to make young people aware of the opportunities available, promote women as role models, and make the sector more attractive.

Workplace: there must be a clearer distinction between apprenticeships and jobs, better security for entrepreneurs and skills building for women.

Social policy: it is important to make it easier for women to balance their professional and private lives by developing accessible childcare and providing financial support for its use during working hours. These measures are designed to encourage women to fully participate in the sector, become more independent, and at the same time contribute to the country's socioeconomic development.

To support further development of the recommendations in this report, it would be useful to compare the qualitative data gathered during the study with reliable quantitative data.

Before any of these recommendations are implemented, **effective measures must be taken to address the structural barriers in the renewable energy sector in Senegal**. These are hindering the development of employment in general, regardless of gender.

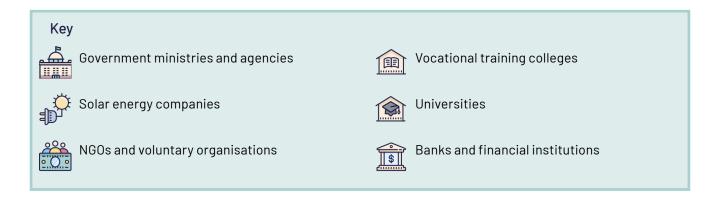
In addition, to ensure a successful transition and maximise the benefits for Senegalese society as a whole, **it is vital to develop new economic models focused on sustainability** (including quality labelling of equipment, and installation and maintenance guarantees) **and inclusion**.

³ Diploma awarded upon completion of secondary school



Table of recommendations to reduce the gender gap

The following set of recommendations has been developed, based on lessons learned through the field study, to increase women's representation in the renewable energy sector in Senegal. For each recommendation, the target institutions and actors are indicated by icons.⁴



Education, training and a more practical focus

Recommendation	Description and impact	Actors and funders
Reach out to young women and provide training in rural areas.	A mobile project using a bus equipped to provide training in maintaining solar facilities would raise aspirations and, above all, give women the necessary skills in, for example the maintenance and repair of solar-powered pumps and mills. This training would support income-generating activities that most closely match their needs.	
Provide more training courses in renewable energy following completion of the baccalaureate.	This would attract people to the sector at a younger age, encouraging girls who are leaving secondary school to train before they are hindered by family and domestic responsibilities.	
Increase practical training and provide opportunities for accredited apprenticeships.	Accredited apprenticeships and practical training courses will have real technical value, making young people more employable when looking for work.	
Develop specific training for women in low- carbon sectors.	Adopting a gender-equitable approach that starts at school, and adapting the learning environment, could have a positive impact on the number of girls enrolling to train in this field. As observed in the study, some girls and their families are deterred from choosing these male-dominated fields by logistical concerns. Providing a learning environment based on a gender-equitable approach from the early school years could help to integrate girls into this sector.	

⁴ The icons used are copyright free from <u>icons8.com/icons</u>

Increase the proportion of practical teaching at university.	This would increase the chances of young graduates finding employment. Companies specialising in renewable energy need young people who can work independently on the ground as soon as they enter the sector. They place a strong emphasis on practical skills and much less on theoretical skills, which are seen as insufficient for the installation and maintenance of facilities.	
Organise links between educational institutions and companies.	These closer links would allow the courses provided to be better tailored to the needs of the solar/renewable energy industry.	

Improve communication about the renewable energy sector

Recommendation	Description and impact	Actors and funders
Provide girls with more and better communication about the careers and training available.	Communication strategies are essential to encourage girls to choose these fields. They could take the form of school forums, for example, widening young people's options to include fields they currently know little about.	
Create mentoring programmes involving women leaders in the sector.	Showcasing women as role models is a helpful way to raise the aspirations of girls who may identify with them and feel inspired. This would also help women who are already trained to find professional fulfilment and to realise their potential, reducing the limitations they place on themselves.	
Provide awareness-raising and advocacy.	It is crucial to run campaigns to change societal perceptions about women working in technical jobs. One major challenge in developing renewable energy in Senegal is how to raise girls' awareness of the potential for women in this sector. Given the size of their audience in Senegal, social media networks could be a powerful vehicle for awareness-raising, alongside more traditional media such as television and radio. It is vital to overcome the deep-rooted prejudices that are excluding girls from what are considered 'male' careers.	
Publicise and promote the sector and the jobs available.	To make the renewable energy sector more attractive, the career profiles produced by the sector could be jointly designed by companies, universities and training centres.	
Highlight complementary skills and job profiles in the renewable energy sector.	This would help highlight women's place in the sector and their right to be there. It should include publicising the variety of careers available, in particular demonstrating options other than working on a building site with hard and physically demanding working conditions.	



Encourage innovation.	Promoting initiatives that encourage women to innovate in the sector can make a real difference, and should include support for projects that incorporate sustainable solutions tailored to the needs of communities.	
Provide long-term support.	Provide training in maintenance to ensure the long- term viability of the equipment and to support the local economy created by these activities, particularly for women who use solar energy to drive income-generating activities.	

Strengthen policies that promote women's employment

Recommendation	Description and impact	Actors and funders
Support work-life balance.	Establish state-approved and affordable childcare facilities, helping to develop a virtuous circle that provides stability and balance for working women while also creating jobs for nursery assistants.	
In government calls for tender, prioritise proposals that include a significant percentage of women.	This could encourage prime contractors and subcontractors to take on more women for major contracts, which could boost the female labour market in renewable energy.	
Clarify the status of apprenticeships and salaried employment.	This is a priority to give young people easier and more secure access to the labour market. More favourable regulations need to be introduced to make it easier to secure permanent contracts and to prevent abusive oral contracts for apprenticeships with no prospect of employment.	
Establish specific funds to support women-led initiatives.	Support for women in their entrepreneurial projects should be explored, particularly by providing them with access to start-up finance. Senegalese women who wish or need to work see entrepreneurship as the best way to reconcile their professional and private lives. Supporting those who are motivated to take this path would help many women to enter the renewable energy sector, contribute to Senegal's economic and social development, and increase empowerment. This support could include more secure status, easily accessible dedicated training, and help in setting up networks.	

References

See full report (French language only).

ALIGN

Advancing Learning and Innovation on Gender Norms

About ALIGN

ALIGN is a digital platform and programme of work that supports a global community of researchers, practitioners and activists, all committed to gender justice and equality. It provides new research, insights from practice, and grants for initiatives that increase our understanding of – and work to change – patriarchal gender norms.

ALIGN Programme

ODI Global 203 Blackfriars Road London SE18NJ United Kingdom

Email: align@odi.org.uk
Web: www.alignplatform.org

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