

EU global action on sustainable land management





©FAO/Giulio Napolitano

Foreword

Land is the foundation for food security, economic growth and development. It is more and more at the cross-roads of different agendas. An integrated approach to sustainable land management is recognised as providing tangible benefits for sustainable development. That is why achieving a land degradation neutral world is one of the targets for the 17 Sustainable Development Goals.

This factsheet provides an overview of the EU's support for sustainable land management and the concrete partnerships we engage in to tackle land degradation and desertification. It demonstrates the EU's commitment to reduce poverty and achieve sustainable development for all through a better management and restoration of landscapes that respects the environment while also improving prospects for jobs and livelihoods, enhancing food, water and energy security and furthering climate change adaptation and mitigation.

Stefano Manservisi

Director-General of the Directorate-General for International Cooperation and Development

The importance of sustainable land management



©FAO/Giulio Napolitano

One increasingly important challenge we face is to ensure that the **land we have - this finite resource -** is able to meet the rising demands placed on it. Global population is expected to reach over 9 billion by 2050, resulting in increased competition for resources. This will be compounded by the accelerating impacts of a changing climate, and growing pressures on food, water and energy supplies.

10 to 20 per cent of the Earth's lands is already degraded resulting in an estimated economic loss of USD 6.3-10.6 trillion each year. **Land degradation** is adversely affecting living conditions for over one billion people and around 1.9 billion hectares of land.

Land productivity and terrestrial ecosystem services are threatened by land and soil degradation, deforestation and desertification. This is often driven by **population growth, rising demand for food, feed and fuel,** as well as unsustainable agricultural and pastoral practices and other land uses. One particular pressure has been the pursuit of short-term economic gains from land resources over long-term sustainable uses, partly driven by a lack of understanding of

the value of land. Inadequate management of land resources is often directly linked to issues of land tenure and access to land, and often leads to the overuse of land.

Did you know?

44 per cent of global food production takes place in the world's degrading **drylands**. 12 million hectares of soil are lost each year from desertification and drought alone, where 20 million tons of grain could have been grown instead.

Land degradation also means that more people have to share diminishing, increasingly unproductive resources. This trend leads to **conflicts** about land, water and energy and compounds poverty. The link between land management and migration is particularly telling. Forced **migration** at global level has accelerated. Overall, 135 million people will be at risk of being permanently displaced by desertification and land degradation over the coming decades. In sub-

Women represent on average 43 per cent of farm labour in developing countries, whilst owning a tiny fraction of farms. Women are key players in both agricultural and pastoral production processes. They are the primary natural resource managers, providers of food security, and repositories of knowledge and expertise on indigenous plants, medicines, food and water. Women regularly face discrimination in rights and access to resources, extension and support for farms.

Saharan Africa alone, some 60 million people are expected to move from desertified areas to northern Africa and Europe by 2020.

While these challenges are global, the negative pressures happen more intensively in sub-Saharan Africa and the Sahel region, where population growth, poverty, land degradation, and climate change exacerbate conflicts related to natural resources, weak governance and insecurity.

Climate change is one of the most critical issues on the global agenda and it is inherently linked with land degradation and agriculture. Global and national agendas are looking at the effect of agriculture and land use on climate change, but also their potential to contribute to climate change mitigation. Land-use, land-use change and deforestation are an important source of greenhouse gases (GHGs) to the atmosphere. Consequently, the effects of this, such as rising average temperatures, have in turn exacerbated drought, flooding, land erosion, and loss of soil fertility. That is why it is important to invest in improved agricultural practices and cost-effective sustainable land management which can contribute to climate change mitigation by reducing emissions from agriculture and other land uses and by storing carbon in plant biomass and soils.

Did you know?

Together with agriculture, land degradation, land use change, deforestation and forest degradation represent 24 per cent of **greenhouse gas emissions** globally, and they are by far the main source of emissions in most countries in Africa. They also have a negative impact on the resilience and adaptive capacity of ecosystems and populations in the face of climate change.

It is important to remember that farms, forests, water bodies and settlements are not isolated elements but part of a wider landscape in which all land uses are integrated. There is growing interest in landscape approaches that entail viewing and managing multiple land uses in an integrated manner, considering both the natural environment and the human systems that depend on it.

Reversing land degradation and achieving sustainable land management is essential to meet rising demands while addressing climate change and maintaining the range of services provided by healthy terrestrial ecosystems. Land is the most important natural asset for billions of people, whose livelihoods depend on farming or harvesting. Its sustainable management is key to ensuring food security, jobs and incomes over the long term. And it is not beyond our control. Measures to address land degradation through sustainable land management entail soil protection, water and forest management and contribute to climate change

adaptation and mitigation; they are therefore a key element in agricultural, forestry and rural development policies. And, according to the Economics of Land Degradation Initiative, each year USD 75.6 trillion can be gained from adopting policies that enable sustainable land management. The evidence is convincing.

KEY TERMS AND DEFINITIONS

Land constitutes the part of the earth's surface that is not covered by water.

Soil is the upper layer of earth in which plants grow, a black or dark brown material typically consisting of a mixture of organic remains, clay, and rock particles.

Land degradation refers to 'any reduction or loss in the biological or economic productive capacity of the land caused by human activities, exacerbated by natural processes, and often magnified by the impacts of climate change and biodiversity loss.'

Desertification means land degradation in arid, semi-arid and dry sub-humid areas resulting from various factors including climatic variation and human activity. It affects the livelihoods of rural people in drylands, particularly the poor, who depend on livestock, crops, limited water resources and fuel wood.

Sustainable land management is the use of land resources, including soils, water, animals and plants, for the production of goods to meet changing human needs, while simultaneously ensuring the long-term productive potential of these resources and the maintenance of their environmental functions.

Restoration is a process that initiates or accelerates the recovery of a degraded terrestrial ecosystem with respect to its health, integrity and sustainability. Land restoration aims to return an area of land to a close approximation of its condition prior to disturbance.

Ecosystem services are the benefits that the environment provides to people in the form of provisioning services (e.g., food, water), regulating services (e.g., flood control), supporting services (e.g., species habitat, genetic diversity) and cultural services (e.g., recreation and conservation/non-use values).

What is being done at the global level?



Sustainable Development Goal 15.3 By 2030, combat desertification, restore degraded land and soil, including land affected by desertification, drought and floods, and strive to achieve a land degradation-neutral world.

The 2030 Agenda for Sustainable Development recognises the importance of the conservation and sustainable use of terrestrial ecosystems (Goal 15) and of reversing land degradation and achieving Land Degradation Neutrality (target 15.3). This target is at the heart of the United Nations Convention to Combat Desertification (UNCCD) and is a clear recognition of the need for action. Sustainable land management is also central to many African countries' agriculture and food security policies as well as their Intended Nationally Determined Contributions (INDC) to the UN Framework Convention on Climate Change.

The three **Rio Conventions** - on Biodiversity, Climate Change and Desertification - derive directly from the 1992 Earth Summit. The three conventions are intrinsically linked, operating in the same ecosystems and addressing interdependent issues.

The UNCCD aims to forge a global partnership to reverse and prevent desertification/land degradation and to mitigate the effects of drought in affected areas in order to support poverty reduction and environmental sustainability.



Did you know?

The United Nations
Convention to Combat
Desertification (UNCCD) is

the only multilateral environmental agreement on sustainable land use and soil. With 195 parties (194 + the European Union), it is the most ratified environmental Convention in the world.

Although land use is often seen as a national issue, there are strong reasons justifying **action at global level**, in particular the trans-boundary dimension of some impacts of land degradation, including floods and sediment changes in trans-boundary river basins, as well as the impact of land degradation on climate change.

Recent initiatives like the **Global Soil Partnership** and the International Year of Soil in 2015 also contribute to raising awareness and defining action for soil protection at global level. Furthermore, the **Voluntary Guidelines for Responsible Governance of Tenure of Land**, Forestry

and Fisheries represent an unprecedented international agreement on the governance of tenure.

At **EU level**, the Resource Efficiency Roadmap seeks to ensure that "by 2020 EU policies take into account their direct and indirect impact on land use in the EU and globally...with the aim to achieve no net land take by 2050; soil erosion is reduced and the soil organic matter is increased, with remedial work on contaminated sites well underway". Furthermore, the 7th EU Environmental Action Programme to 2020 ('living better within the limit of our planet') calls on sustainable management of land and for setting targets on land take and on a number of soil quality aspects (erosion, organic matter and contamination).

The **Great Green Wall** for the Sahara and the Sahel Initiative (GGWSSI) is a commitment by African leaders to act together to fight desertification and land degradation. From the initial idea of a line of trees from east to west through the African desert, the GGWSSI has evolved into a mosaic of sustainable land and water management interventions addressing the challenges facing the people in the Sahel and the Sahara. The two contending visions of the Great Green Wall have come closer together over time with the focus on planting trees waning and a more integrated programme of sustainable development that addresses desertification, climate change, biodiversity and food security taking place.

Land restoration is already being addressed by initiatives launched at the COP21 such as the Africa Forest Landscape Restoration 100 (AFR100), the Bonn Challenge that preceded it, or the 4/1000 Initiative 'Soils for Food Security and Climate' oriented to restore millions of hectares of degraded landscapes that will increase carbon sequestration in soil. Other initiatives such as the **Evergreen Agriculture Partnership** promoted by the World Agroforestry Centre (ICRAF), the Forest and Landscape Restoration Mechanism established by the FAO, or the field work of NGOs are significant contributions to large-scale land restoration activities addressing degrading agricultural lands and the subsequent food insecurity and challenges to the livelihoods of smallholder farmers.

In order to unlock the full potential of land restoration, however, there is a need to further scale up good land management practices and existing agroforestry farming systems that can turn ambitious commitments into actual results.



Regreening Mopti, an arid region of Mali bordering the Sahara desert

"Assisted Natural Regeneration is very simple. Trees grow naturally in your field; all you need to do is to look after them and take care not to cut them down. The fallen leaves can be used for compost on the field, branches for fuel wood for our women and their fruit serves as food." Amadou Coulibaly, farmer in the Mopti region.

Worsening soil degradation in recent decades – a result of population growth, inappropriate farming methods, and increasingly arid weather patterns linked to climate change - has undermined Mali's capacity to produce food. In response, the Malian government has prioritised reforestation as a means to combat both the

degradation of natural resources and poverty.

Selected results

- 141,000 trees planted and 700,000 trees protected thanks to good management and the application of Assisted Natural Regeneration.
- 30 people trained in water and soil conservation techniques and 35 ha of degraded land have been restored.
- Two partnership agreements signed for the management of the Samori and Segue forests, and action plans developed for each to restore degraded areas and create firebreaks.

EU cooperation and programmes on sustainable land management



©FAO/Giulio Napolitano

EU support for development is anchored in delivering on the **2030 Agenda for Sustainable Development** and its 17 Goals. It provides support and financing for developing countries to increase their capacity to protect and manage natural resources in a sustainable manner, for the wellbeing of all people.

The EU supports a number of development initiatives directly and indirectly promoting sustainable land management addressing desertification, land degradation and drought. These have the overall objective of contributing to poverty reduction, often with the joint aim to adapt to, and mitigate climate change and to reduce deforestation and biodiversity loss.

At the **global level**, the EU is party to the UNCCD and provides technical and financial assistance to developing country parties to implement the UN Convention to Combat Desertification. Most notably, EU policies and programmes on land degradation in development cooperation will contribute to the Land Degradation Neutrality (LDN) target (SDG 15.3) and politically support the mandate the UNCCD has been given in this context to assist partner countries in developing baselines and plans to achieve the target.

At the **continental level** in Africa, EU Coordination on African agriculture with other donors takes place in the framework of CAADP – **the Comprehensive Africa Agriculture Development Programme** – a programme of the African Union in the New Partnership for Africa's Development (NEPAD). One of the four pillars of CAADP deals with

'extending the area under sustainable land management and reliable water control systems'. In this context, the EU supports the Great Green Wall (GGW) Initiative, led by the African Union. The GGW enhances resilience and contributes to improving local incomes by supporting a wide range of issues, such as natural resource management, infrastructure, sustainability of rural production systems, including agriculture, forestry, etc.

The EU funds a broad range of actions and programmes to address land degradation in developing countries at national and regional level. In terms of **specific projects**, for example, the EU contributes to the GGW by supporting programmes in the focal countries and targeted multicountry programmes such as Action Against Desertification (EUR 20 million) with the ACP Secretariat and the Food and Agriculture Organisation, FLEUVE (EUR 6.75 million) with the Global Mechanism of the UNCCD and TerrAfrica (EUR 9.7 million) with the World Bank and other partners.

FLEUVE (Front Local Environmental pour une Union Verte) supports local African communities as key protagonists in decision-making processes on sustainable natural resource management. Fleuve targets five countries (Burkina Faso, Mali, Niger, Senegal and Chad).

TerrAfrica is nationally driven and depends on the leadership and commitments of sub-Saharan African countries. It is led by the African Union and provides a flexible financing mechanism to support activities that have the potential for scaling up sustainable land and water management

in sub-Saharan African countries. Over the last decade, the programme has supported 28 countries in sub-Saharan Africa, in leveraging and designing innovative interventions in sustainable land and water management. TerrAfrica aims to effectively deliver on strategic priorities over the long term to enhance country level capacities, policies and investments on the ground.

Sustainable land management is centre-point in several of the key development intervention areas of the EU. It cuts across rural development, agriculture, the environment, water, energy and governance agendas and is key to food security and resilience. That is why EU development cooperation also actively promotes **mainstreaming** of environment and sustainable management of natural resources. Such support includes encouraging the design and implementation of national policies that promote sustainable land management (such as conservation agriculture programmes in Malawi and Zambia and the soil and water conservation programme in Ethiopia) and mainstreaming of this in relevant sectors of EU development cooperation (e.g. agriculture/rural development, energy, water, private sector development, etc.).

The EU also supports partner countries' efforts to mainstream the values of biodiversity and ecosystem services into policies

and plans, through for example, the Poverty-Environment Initiative (PEI), the Economics of Land Degradation (ELD) initiative and The Economics of Ecosystems and Biodiversity (TEEB).

Sustainable agriculture and food and nutrition **security** constitutes the main sector of EU development cooperation over 2014-2020 with bilateral programmes in 60 developing countries and more than EUR 8 billion allocated. Through these programmes and partnerships, the EU supports partner countries' efforts to reach economic, environmental, social and nutritional goals while ensuring the long-term sustainability of food systems. A big part of EU support includes promoting sustainable agricultural practices, in order to ensure natural resources are used efficiently and sustainably and farmers are strengthened in their role as managers of their landscapes and ecosystems so as to improve their resilience to climatic, economic and political shocks. However, it is important to remember that secure and responsible access to land and natural resources is recognised as crucial for fair and sustainable development, food security and good governance. The EU has long shown a commitment to land governance related issue



Expanding Africa's Great Green Wall: Communities at the heart of land restoration in Action Against Desertification

Action Against Desertification supports local communities, government and civil society of six African countries - Burkina Faso, Ethiopia, the Gambia, Niger, Nigeria and Senegal – as well as Fiji and Haiti in the sustainable management and restoration of their drylands and fragile ecosystems affected by desertification, land degradation and drought. It is an initiative in support of the implementation of the Great Green Wall for the Sahara and the Sahel initiative and UNCCD national action plans. The programme is implemented by FAO.

Working with village communities in the Sahel, results achieved so far demonstrate that land degradation

is not irreversible. Between 2013 and 2016, field interventions were successfully put in place in Burkina Faso, Mali and Niger, in partnership with Royal Botanic Gardens, Kew (UK) with the following results:

- 200 villages involved in restoration activities in their village degraded lands.
- over 50,000 farmers and herders participated, half of them women.
- using 60 native woody and herbaceous fodder species that were produced in tons of seeds for direct sowing and/or seedlings for planting.
- 3,235 hectares of degraded land restored for sylvo-pastoralism.

The current scale and pace of **deforestation and forest** degradation is alarming. This has a negative impact not only at a local level – on local economies, community livelihoods and ecosystem goods and services provided to the local population (timber and non-timber forest products, local climate, water availability, protection against erosion and natural disasters) – but also globally, especially on climate change and biodiversity, and desertification. REDD+ (Reducing Emissions from Deforestation and Forest Degradation) aims to create incentives for developing countries to slow, halt and eventually reverse emissions from forest lands, including the conservation, sustainable management and enhancement of forest carbon stocks.

Human activities are one of the principal drivers contributing to land degradation, desertification and climate change. The interactions and linkages between **climate change and land degradation** are complex and can often be mutually reinforcing or mutually aggravating. For instance, fossil fuel

combustion is one of the biggest causes of emissions while at the same time fossil fuel extraction is also responsible for pollution and land degradation. Sustainable land management can contribute not only to mitigate climate change, but also to help us adapt to a changing climate. So, the EU Global Climate Change Alliance invests in specific climate change adaptation programmes with more than EUR 300 million to over 50 programmes in 38 countries, 8 regions and sub-regions. At the global level, the focus is put on working with national governments to identify and implement the changes needed to cope with our changing climate. Increasing the resilience of populations in the face of climate change is essential for ensuring their long term stability and development.

According to the OECD DAC reporting system, in 2015 alone, the EU provided around EUR 471 million in projects significantly contributing to combat desertification and land degradation.

Snapshot of selected projects contributing to combat desertification (2015)

Title of the project	Total amount in EUR
Programme d'Appui Structurant de Développement Pastoral (PASTOR – Tchad)	20 000 000
Projet d'appui à l'environnement et à l'agriculture durable pour sauvegarder des sites biologiques prioritaires de la RDC	120 000 000
Support to the Productive Safety Net Programme IV of Ethiopia (PSNP IV)	50 000 000
Support to the Sustainable Land Management (SLM-Phase II) of Ethiopia	20 000 0000
Global Climate Change Alliance + initiaitive in Guinea Bissau	4 000 000
Alliance Mondiale pour le Changement Climatique + Madagascar : Renforcement des conditions et capacités d'adaptation durable au changement climatique	8 000 000
Renforcement Institutionnel vers la Résilience Agricole et Pastorale (RIRAP) en Mauritanie.	25 000 000
Resilience Programme for Somalia	34 000 000
Global Monitoring for Environment and Security (GMES) and Africa Support Programme	26 500 000
Support to Bovine Value Chain in Nicaragua (BOVINOS)	20 000 000
Fortalecimiento de la agricultura familiar y soberania alimentaria en zonas expulsoras de poblacion hacia areas de produccion de coca en Bolivia	20 000 000
EU-CA Water and Environmental Platform Phase II	2 000 000
Sustainable Use of Peatland and Haze Mitigation in ASEAN	20 000 000
PRO-ACT: Resilience building mechanism for Food and Nutrition Security	64 000 000
The Nexus Dialogues (Phase I)	5 000 000
Non-State Actors Participation in Forest Governance, Forest Law Enforcement Governance and Trade and Reduction Emission from Forest Degradation and Deforestation	27 000 000
Support to developing countries in UNFCCC	4 400 000
Support to the implementation of FAO's Global Soil Partnership in the period 2016-2018	1 500 000

Total 471 400 000



Scaling up conservation agriculture in Zambia

67 per cent of the Zambian population depends on agriculture but agricultural productivity does not keep up with the annual population growth rate of 3 per cent. Moreover, policies have favoured maize at the expense of crop diversification. Conservation agriculture is a way of increasing productivity even under reduced rainfall while maintaining soil fertility. Although conservation agriculture is known in Zambia, it still requires more widespread adoption. The project aims at increasing the number of farmers having adopted conservation agriculture through peer-learning, improved inputs and reliable markets.

Conservation agriculture enables farmers to increase their productivity, adapt to climate change and reverse environmental degradation. It comprises three main farming practices: minimum soil disturbance, organic soil cover and diversified crop sequence. The project builds on gains made by

the 2009-2012 FAO implemented Farmer Input Support Response Initiative with a contribution of €16.9 million from the EU.

Selected Results

- By 2015, 19,500 lead farmers and 207,000 follow farmers have registered under the project.
 41 per cent of them are female farmers
- More than 600 Ministry of Agriculture extension officers, provincial and district agricultural officers and private sector agro-dealers improved their conservation agriculture skills through intense technical training provided.
- More than 100,000 small scale farmers improved their skills on sustainable land preparation, 6,300 use pigeon pea for crop rotation and about 1,500 started practicing agroforesty. Using mobile phones, an extension system is in place and reaches 68,000 farmers.

Projet Résilience Sud

This project was set up in 2012 to respond to the food crisis and implement short and medium term actions to fight hunger in the regions suffering from a food crisis in the south of Mali. The World Food Programme implemented the project with EUR 15 million from the EU. The activities included the distribution of food or cash for asset creation. Many of the activities centred around reforestation, soil and water conservation and the establishment of perennial crops, food and vegetables. This project is one of many that highlights the link between sustainable land management and the resilience of populations and production systems.





Looking ahead

Land is subject to growing demands to provide food, feed and fuel and deliver ecosystem services to a growing world population. These pressures will only increase in the future. But land is a finite resource, and it is shrinking. Land degradation affects communities on a global scale. Without a significant change in how the world values and treats land including tackling perverse effects stemming from the lack of access and tenure security, and as the effects of climate change undermine livelihoods, there will be an increasing number of displaced people forced off the land and into overcrowded cities. As long as land degradation and desertification persist, efforts to increase agricultural productivity will be less effective, and attempts to eradicate poverty will be seriously hampered.

The Sustainable Development Goal 15.3 to combat desertification, restore degraded land and strive to achieve land degradation neutrality is a clear global recognition of the need for enhanced action. We need to make sure that this ambitious goal does not remain a platitude, but is supported by implementation. Investing in sustainable land management brings massive economic and social benefits, is essential for sustainable agriculture and forestry, contributes to healthy ecosystems and to combating climate change and is key for food security and resilience. As such, stepping up investments in sustainable land management can greatly contribute to the achievement of Sustainable

Development Goals 1 (poverty), 2 (hunger), 6 (water), 13 (climate) and 15 (terrestrial ecosystems). It is also important in the EU's renewed commitment – emphasised in the Global Strategy for the EU's Foreign and Security Policy – to enhance environmental resilience and continue to recognise the challenges of climate change and environmental degradation which exacerbate potential conflict, in light of their impact on desertification, land degradation, and water and food scarcity.

So, the EU is reinforcing partnerships with partner countries, international organisations and international and local stakeholders. In particular, the EU is committed to providing support to partner countries to strengthen national abilities to assess and monitor the impacts of land degradation and ensure appropriate investment in sustainable land management. Progress at country level will play a crucial part in achieving a land degradation neutral world. And here local actors, in particular farmers, civil society and the private sector play a key role as they are often the ones closest to the issue.

With both the EU and partner countries prioritising sustainable agriculture as the key focal sector to work on in a large number of countries (2014-2020), ensuring further integration of sustainable land management in all programmes is a safe investment to guarantee better resilience for all in a land degradation neutral world.



European Commission

© **European Union 2016.** Reproduction is authorised provided that the source is acknowledged.

Directorate-General for International Cooperation and Development

Rue de la Loi 41, B-1049 Brussels

With special thanks to the FAO for the photographs from the EU-FAO project Action Against Desertification, which promotes sustainable land management and restores drylands and degraded lands in Africa, the Caribbean and the Pacific.

Cover: ©FAO/Giulio Napolitano

Published by Directorate-General for International Cooperation and Development. Printed in Belgium, 2016



The contents of this publication do not necessarily represent the official position or opinion of the European Commission. Neither the European Commission nor any person acting on behalf of the Commission is responsible for the use which might be made of information in this publication.