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**COMMUNICATION FROM THE COMMISSION TO THE EUROPEAN
PARLIAMENT, THE COUNCIL, THE EUROPEAN ECONOMIC AND SOCIAL
COMMITTEE AND THE COMMITTEE OF THE REGIONS**

Rio+20: towards the green economy and better governance

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1. RIO+20: AN OPPORTUNITY THE WORLD CANNOT AFFORD TO MISS

In June 2012 all eyes will be on Rio de Janeiro, where twenty years after the first "Earth Summit", Heads of State and Government will attend the United Nations Conference on Sustainable Development¹ (UNCSD or "Rio+20"). Rio+20 will build on previous global summits: the United Nations Conference on the Human Environment in Stockholm (1972), the Conference on Environment and Development ('Earth Summit') in Rio de Janeiro (1992), and the World Summit on Sustainable Development in Johannesburg (2002). It also follows on from the United Nations Millennium Summit in 2000 and the establishment of the Millennium Development Goals (MDGs).

Rio+20 offers a unique opportunity for our mutually interdependent world to secure renewed political commitment for sustainable development. It will assess progress made and address implementation gaps and emerging challenges. It will do so in the context of two intertwined themes: "a green economy in the context of sustainable development and poverty eradication" and "the institutional framework for sustainable development".

Rio+20 can mark the start of an accelerated and profound, world-wide transition towards a green economy – an economy that generates growth, creates jobs and eradicates poverty by investing in and preserving the natural capital offers upon which the long-term survival of our planet depends. It can also launch the needed reform of international sustainable development governance.

The European Commission is determined to help make Rio+20 a success. As a basis for further dialogue with EU institutions, civil society, business and countries globally, this Communication sets out the Commission's initial views on potential concrete outcomes for Rio+20. It builds on the EU's range of policies pertaining to sustainable development and the EU 2020 Strategy, and also takes account of a public consultation launched in February 2011².

2. TAKING STOCK SINCE '92: IMPLEMENTATION GAPS AND EMERGING CHALLENGES

2.1. Sustainable development at international level

The past decades have witnessed a number of positive global trends. This is most notable for income growth, for which more than 120 million people rose above the "dollar a day"

¹ www.uncsd2012.org

² http://ec.europa.eu/environment/consultations/un_2012.htm.

benchmark between 2000 and 2005. Access to education, healthcare and water has also seen improvements.

The United Nations Framework Convention on Climate Change (UNFCCC) and the Convention on Biological Diversity (CBD) launched at Rio in 1992 have demonstrated the potential of action at global level. The 2010 climate negotiations in Cancún marked progress towards new global climate change governance and the objective of limiting climate change to less than a 2°C increase. Similarly, the 2010 CBD meeting in Nagoya achieved significant progress. There has also been a major increase in scientific information and public awareness of environmental issues, in particular climate change, and the participation of civil society in global policy-making, not least thanks to improved internet communication.

Over the past twenty years, a number of developing countries have now become major economic and political players. As a result, a new balance of power and influence has started to emerge, entailing new roles – which will also require the acceptance of new responsibilities.

Despite positive developments, considerable implementation gaps and challenges remain, and these will have to be addressed as part of the Rio+20 agenda. Around 1.4 billion people still live in extreme poverty (a large part of them in Sub-Saharan Africa and South-Asia) and one sixth of the world's population is undernourished. Several of the Millennium Development Goals (MDGs) are severely off-track. For instance, for the MDG on sanitation, only half of the developing world's population uses improved sanitation. Progress towards the MDGs is very uneven geographically with some regions lagging behind others; and no single MDG has been achieved in any one fragile state. Efforts to address these problems have been hindered by the recent economic crisis and rising food prices that have increased the number of people living in poverty.

Many environmental challenges have not been solved and have become more acute. Increasing demand for resources (such as land, water, forests, ecosystems) has led to increasing depletion and degradation, and biodiversity loss and deforestation continue at an alarming rate. Scarcities of material resources, as well as access to these resources, are also becoming issues of global concern. Global greenhouse gas emissions continue to rise, fuelled by land-use changes and growing demand for fossil fuels. Furthermore, the impacts of climate change (such as changing precipitation and sea level rise) can further multiply existing environmental problems. The depletion and pollution of water resources and the marine environment pose increasingly serious problems, and water scarcity could affect one-third of the world population by 2025. Desertification and land degradation impact a number of developing countries whose economies largely depend on agriculture and subsistence farming. Exposure to hazardous substances (such as pesticides hazardous waste) continues in developing countries and emerging economies, despite progress in implementing international conventions. Many of these environmental problems are not stand alone issues, but are mutually related and inter-dependent.

Future economic growth is likely to be fastest in emerging economies, and if well managed, can help lift people out of poverty. However, the continuation of current consumption and production patterns in many countries around the world will increase the use of natural resources, accelerate environmental degradation and worsen climate change. Environmental pressures and impacts will be exacerbated by an increasing population (expected to rise to at least 9 billion in 2050), urbanization and social changes (such as an additional 1.2 billion people joining the "middle class" population in emerging economies).

2.2. Sustainable Development in the EU

Over the past decades, sustainable development has been promoted by a number of EU policies. For example, the EU has adopted binding climate targets together with the EU Emissions Trading Scheme, as well as range of legislative instruments on biodiversity, waste management, water and air quality. This has encouraged the growth of EU eco-industries, which now correspond to over 2.5% of EU GDP and provide jobs to over 3.4 million people. In 2001 the EU adopted an EU Sustainable Development Strategy (EU SDS) which was renewed in 2006.

Since the most recent EU SDS report in 2009, progress towards achieving sustainability in the EU has been assessed in various ways, including sustainability indicators and the State of the Environment Report of the European Environmental Agency . These publications show that while progress has been made many challenges still exist, in particular to make growth more sustainable.

A key policy development has been the adoption of the Europe 2020 Strategy in 2010. This aims to transform the EU into a knowledge-based, resource efficient and low-carbon economy and provide a sustainable response to the challenges facing the EU up to 2050. The Strategy seeks to mainstream and reinforce the role of sustainability in policy development by establishing the mutually reinforcing priorities of *smart*, *sustainable* and *inclusive* growth which are driven by five headline targets and seven flagship initiatives (see Annex).

Many of these flagship initiatives are of direct relevance for this Communication. For example, the flagship initiative on resource efficiency aims to decouple the use of natural resources from economic growth and envisages a range of new policy measures including action on raw materials, energy efficiency, biodiversity, as well roadmaps to decarbonise the economy, energy and transport. It also advocates the stepping up of the use of market-based instruments, phasing out environmentally harmful subsidies and the "greening" of tax systems.

Progress on improving resource efficiency and the other targets and flagship initiatives will be monitored within the governance framework of the Europe 2020 Strategy and the "European Semester". This will bring together the input of sectoral Councils, the Member States' national reform programmes, the opinions of the Commission as well conclusions of the European Council. This will result in a strengthened mechanism to deliver greater integration and policy coherence in favour of the environment and sustainable development.

To assess progress on the implementation of the EU SDS, the European Commission through its statistical office Eurostat, the European Environmental Agency and others will continue to provide statistical information and indicators that allow sustainability to be measured and reported, also in the context of Europe 2020 Strategy.

Rio+20 will be a defining moment for sustainable development, both in the EU and globally. Its outcome will inspire the EU's strategy and actions for sustainable development, and in particular help further shape the EU Europe 2020 strategy as an effective tool for delivering on sustainable development.

3. TOWARDS THE GREEN ECONOMY AND BETTER GOVERNANCE

3.1. Enabling the transition

Twenty years after the Rio Summit, the world is still facing two major and interlinked challenges: meeting the demands for better lives for a global population set to grow by over a third by 2050, and addressing environmental pressures that if not tackled, will undermine the world's ability to meet those demands.

Responses to these challenges will not come from slowing growth, but rather from promoting the *right kind* of growth. There are compelling reasons to fundamentally rethink the conventional model of economic progress: simply working at the margins of an economic system that promotes inefficient use of natural capital and resources, will not be sufficient to bring about change. What is needed is an economy that can secure growth and development, while at the same time improving human well-being, providing decent jobs, reducing inequalities, tackling poverty and preserving the natural capital upon which we all depend. Such an economy – a green economy – offers an effective way of promoting sustainable development, eradicating poverty and addressing emerging challenges and outstanding implementation gaps.

Moving towards a green economy necessitates preserving and investing in the assets of key natural resources. This is essential for all economies, but applies in particular to developing countries, which have the opportunity to grow their economies, by building on the sustainable management of their natural capital. It also means making use of low-carbon and resource efficient solutions and stepping up efforts to promote sustainable consumption and production patterns. All this involves establishing the right regulatory frameworks, creating strong incentives for markets and innovation, leveraging financial resources, and promoting entrepreneurship and greater private sector involvement. It also involves the proper valuation of natural capital, and, in more general terms, a revision of the way in which we measure growth and progress.

In a green economy many challenges can be transformed into economic opportunities, not only reversing negative environmental trends, but also driving future growth and jobs. For instance, experience shows that market-based approaches such as emissions trading are not only cost effective tools to address environmental problems but are also a source for investment.

The green economy offers opportunities to *all* countries, irrespective of their level of development and the structure of their economies. While in many cases investments to move towards a green economy can result in short-term win-win solutions, in other cases a medium term perspective will be needed, and transitional costs will have to be addressed, including through "pro-poor" policies. Even though there is no "one-size-fits-all" model, there are common challenges and solutions, and countries will benefit from exchanging experience and improved international cooperation.

At the same time, moving towards the green economy does not start from zero. There are already a number of strategies in place that countries can build on, such as: climate change, biodiversity, sustainable consumption and production, research and innovation, all of which can contribute to enabling a green economy. Future national and international green economy strategies should build on and strengthen these, as is happening in Europe 2020 Strategy, and recently in the roadmap for moving to a competitive low carbon economy by 2050.

International organisations, including the United Nations Environment Programme (UNEP) and the Organisation for Economic Cooperation and Development (OECD) are developing Green Economy and Green Growth Strategies. The International Labour Organisation is developing programmes for green, decent jobs. The G8 and G20 are also increasingly engaging in the green economy agenda. In Cancún, the Parties to UNFCCC agreed that all countries should develop low-carbon development strategies, consistent with sustainable development.

Following from the above initiatives, to achieve the transition to a green economy we need to address three interlinked policy dimensions:

- (1) Investing in the sustainable management of key resources and natural capital ("what")
- (2) Establishing the right market and regulatory conditions ("how")
- (3) Improving governance and private sector involvement ("who")

In the next sections these three dimensions will be analysed in more detail, as a framework for targeted action and investment.

3.2. Investing in the sustainable management of key resources and natural capital

Resources such as water, energy, land, forests as well as materials constitute the foundations of any economy – and in particular of the green economy. The livelihoods of many people across the world depend on them, especially in developing countries, where the lack of access to quality resources, as well as insufficient knowledge on how to manage them sustainably, are important underlying causes of poverty. There are many telling examples of how access to sustainably managed resources can draw people out of poverty. Thus, the resource areas outlined below could become the green economy's key growth markets, underpinning future economic development, the creation of jobs and the eradication of poverty, in particular in developing countries.

Water is one of the most valuable resources, fundamental to life and health, but also to the growth of many economic sectors such as agriculture, manufacturing and energy production. The sustainable management of water is crucial in the efforts to eliminate poverty, since poor people's lives are closely linked to access to water and its multiple uses and functions. Water also has strong implications for regional relations, peace and security. Clearly, policies have to be strengthened to improve water access, quality and efficiency.

Access to **energy** services is a fundamental prerequisite for social and economic development. Access to energy is also a key ingredient to poverty eradication. In developing countries, more than 1.4 billion people currently lack access to electricity and 2.7 billion people rely on traditional use of biomass for cooking. Many regions in the developing world have a huge potential for **renewable energy**, in particular where extensions of the electricity grid are not economical. Developing renewable energy should go hand in hand with measures to enhance **energy efficiency** and reduce the dependency on fossil fuels.

Marine resources are a source of food and economic prosperity. The fisheries sector is essential for the economic development and livelihood of millions of people around the world, particularly in developing countries. **Oceans and seas** are an essential component of the earth's ecosystem and play a key role in moderating climate change. Coral reefs and mangrove forests are not only a store of carbon and a source of biodiversity; they also protect

coastal areas against flooding, thus reducing disaster risks. However, the marine environment faces several threats: the depletion of fish stocks, biodiversity loss, marine litter, waste and pollution including acidification. Many issues are trans-boundary and need to be addressed at the international level.

A key challenge for **agriculture** is to be able to feed 9 billion people by 2050 without further degrading and polluting land. The sustainable use of land and agriculture will be a cornerstone of the green economy. Current farming practices represent over 70% of the world's freshwater resources and contribute to over 13% of greenhouse gas (GHG) emissions. Sustainable agriculture can substantially increase yields, especially on small farms. Even though many sustainable land management techniques are available, investment in these is not sufficient. Land degradation has a direct link to agriculture, and has a direct effect on some 1.5 billion people, including 42 % of the world's poor. Land degradation is a global issue, not only in arid and semi-arid regions, and requires a global response. Good governance is essential to address these problems, through respect for land rights and ownership, including from communities and indigenous peoples. All these aspects must be addressed in order to ensure the sustainable supply of food.

Forests are the basis for the livelihoods of millions of people, many of whom live in the tropics and belong to poorer segments of society. Furthermore, forests are a crucial part of the earth's ecosystem, providing functions such as protection of soil, water and biodiversity. However, the global rate of deforestation is still alarmingly high and has significant impacts on global climate change and biodiversity. Emissions from tropical deforestation, forest and peat degradation are currently estimated to be 15% of global CO₂ emissions. Forests are likely to become increasingly important in a green economy as sources of new materials such as bio-based plastics and in renewable energy strategies. In this context the conservation and sustainable management of forests is crucial.

Sustainable land use, agriculture, forests, water and the oceans are underpinned by **ecosystems and biodiversity**, which determine the longer term resilience and health of the environment. There is a growing awareness of the benefits of ecosystem services for businesses and society at large³, and of the potential of investing in natural capital for the green economy.

Waste can be a valuable resource, and if not properly managed causes environmental and health risks. Good **waste management** minimises environmental impacts such as green house gas emissions, promotes efficient use of resources, and provides a new source of recycled materials. The economic potential of waste management is growing in many regions of the world, offering important business and job opportunities. It is crucial to ensure that these jobs are decent, in particular in terms of working conditions. As developing countries grow economically, there are increasing needs and economic opportunities for better waste management. Hazardous waste and chemicals also remain an area of particular concern, both nationally and globally.

The transition towards a global green economy will need reinforced global policies based on these areas, and Rio+20 should offer a platform to help achieve this.

³ The Economics of Ecosystems and Biodiversity for Business – "TEEB for Business"

3.3. Establishing the right market and regulatory conditions

A number of market and regulatory conditions need to be put in place to enable and direct growth in the above areas. Such enabling conditions are not only key to promote environmental objectives, but also to ensure predictability and a level playing field for business. They also provide a sound basis for investments and fostering eco-innovation through new technologies and new ways of working.

Regulatory instruments will play an important role in greening the economy both nationally and internationally. Regulatory instruments should be combined with **market-based instruments** (such as taxes, tradable permits and environmental subsidies) which are flexible and cost-effective tools that can help achieve combined economic, social and environmental objectives. Fiscal reforms that shift tax burdens from labour to environmental impacts and energy can create win-win outcomes for employment and the environment. Cap and trade systems, such as the EU Emissions Trading Scheme, have proven to be effective markets instruments. Other effective schemes include fiscal incentives for SMEs, water charges, eco-taxes, and feed-in tariffs. Payments for ecosystem services are already being applied in some countries and reflected in ongoing negotiations on Reducing Emissions from Deforestation and Forest Degradation (REDD).

Environmentally harmful subsidies are a major obstacle for a greener economy. They perpetuate unsustainable practices and direct financial resources from needed green investments. Momentum is building to address them. In 2009, the G20 committed to rationalize and phase out inefficient fossil fuel subsidies that encourage wasteful consumption. This commitment will be revisited in 2011. In 2010, Parties to the Convention on Biological Diversity committed to eliminate, phase out or reform subsidies harmful to biodiversity by 2020.

To enable the transition to a global green economy, **large scale financial resources** will have to be mobilized. This will require action by *all* countries, international organisations and banks. UNEP estimates that the scale of global investments needed could be to the order of 2% of global GDP per year in the period up to 2050. This will require a paradigm shift in approaches to financing, enabling countries to make use of innovative public and private solutions. Reliance on public funds alone will not be sufficient – rather, public financing will have to catalyse and leverage much greater private investment. Incentives will have to be put into place to encourage private green investments, and ways of channelling equity, insurance and pension funds towards sustainable development can be applied on a much greater scale. At the same time, both the national public sector and international public financing will have important roles to play in laying down conditions to help reduce risks for private investment and to ensure fair and equitable approaches to investment. In addition, access to finance and venture capital coupled with a favourable regulatory environment is crucial to **stimulate eco-innovation, environmental technologies and green SMEs**.

Without the necessary **skills and know-how**, a transition to a green economy will not be possible. At the same time, it must be ensured that **new jobs** will be "decent jobs" including guarantees of rights at work, social protection and social dialogue. Economic policies need to be accompanied by labour policies to equip employees with new skills and help create new job opportunities. Of the world's estimated 211 million unemployed people in 2009, nearly 40 per cent are between 15 and 24 years of age, and a range of measures need to be taken to provide opportunities for youth. In addition, many of the obstacles hindering the transition to

a green economy and a more sustainable future can only be removed through greater **scientific and research cooperation**.

Sustainable patterns of supply and demand at international level can be supported by enhancing **mutual supportiveness between trade and sustainable development**. This includes maintaining an open and non-discriminatory multilateral trading system, and ensuring that no country should be prevented from taking measures to promote sustainable development, provided that such measures do not constitute arbitrary or unjustifiable discrimination, or a disguised restriction on international trade. Mutual supportiveness can also be promoted by reducing or eliminating tariff and non-tariff barriers for environmental goods, technologies and services, as well as environmentally-friendly or fair trade products. In addition, as sustainability assurance schemes and corporate social responsibility practices expand, the development of international guidelines and standards, certification schemes and labels, can provide economic, environmental and social benefits. International measures to combat illegal trade in environmentally sensitive goods (such as wildlife, hazardous substances and natural resources) need to be strengthened – a good example of what can be done are the Voluntary Partnership Agreements that the EU is negotiating in the context of its initiative on Forest Law Enforcement Governance and Trade (FLEGT). The inclusion of sustainability provisions as part of multilateral and bilateral trade agreements also need to be promoted.

Ensuring and measuring progress requires comparable metrics and indicators to be in place. A number of organisations, such as the OECD, have been working to provide various forms of indicators that can reflect the state of the environment and natural assets, well being and the quality of life. These indicators should be used alongside Gross Domestic Product (GDP). However, only some of these indicators have so far been used widely in communicating policy needs, such as CO₂ intensity and the Human Development Index. Agenda 21 already requested governments to develop sustainable development indicators and environmental accounting. However, progress has been slow and uneven. Rio+20 should promote the transparency of national reporting and agree on the use of environmental accounting and robust indicators at national and at global level in order to measure this wider sense of progress in addition to GDP.

3.4. Improving governance and private sector involvement

Governance structures are crucial to help deliver sustainable development, green our economies and eradicate poverty. However, it is widely recognized that current governance structures need significant reform. Four broad tracks of reform need to be addressed.

There is a need to reinforce and mainstream **sustainable development governance** within the UN system, inter alia by enhancing coherence and policy integration between the activities carried out under the economic, social and environmental pillars. Within the UN, a number of efforts are ongoing, including improved inter-agency mechanisms and as part of the “Delivering as One” initiative that seeks to promote UN-wide coherence in the areas of development, humanitarian assistance and the environment. Also, cross-cutting issues such as climate change call for further mainstreaming. Such processes should be reinforced. While reinforcing international governance for sustainable development is crucial, corresponding **regional, national and local structures** also need attention.

Compared to global economic structures **international environmental governance** is weak. This is due to institutional fragmentation, a lack of accountability for implementing agreed policies, the lack of a strong and authoritative voice within the global governance system, as

well as a lack of human and financial resources. In addition, the new roles and responsibilities of emerging economies are not sufficiently defined. Over the past decade, attempts to improve international environmental governance have been made – most recently as part of high-level consultative group under the aegis of UNEP (Nairobi-Helsinki process) – but making tangible progress has so far proved difficult.

International economic and social governance is addressed by a number of institutions. The International Financial Institutions (such as the World Bank Group and the International Monetary Fund) as well as regional development banks (such as the Asian Development Bank, the Inter-American Development Bank, the African Development bank, the European Bank for Reconstruction and Development and the European Investment Bank) play a central role in world economic policies and actions. The role of the World Trade Organisation in regulating global trade is essential. Furthermore, institutions such as the International Labour Organisation and other UN bodies play roles in shaping employment and social issues. Each of these will have to play a role in greening global economy.

Agenda 21 and the Johannesburg Plan of Implementation stress the important role **of non-state actors** (the "Major Groups") which include indigenous people, women, youth, workers, farmers, local governments, the scientific community, business and industry, and NGOs. However, their role and impact has been limited in scope and needs strengthening. In particular, boosting the **participation of business** will be essential. In a number of cases business is already committing to greening their operations, such as in the food, drink and chemical industries. This needs to be taken further through more dynamic public/private partnerships, new business networks and alliances, as well as financing facilities to accelerate green business and innovation.

4. PROPOSED LINES OF ACTION FOR RIO+20

4.1. A framework to deliver results

To give renewed impetus to sustainable development Rio+20 needs to create a shared vision for change, backed by a decision framework for specific action. The main "ingredients" of an overall outcome could be envisaged as follows:

1. A broad political "rallying call" with a shared, ambitious vision and goals.
2. A set of specific actions at international, regional and national level - mapped out as a "Green Economy Roadmap".
3. A "toolbox" of policy approaches and best practice examples to be used to reach agreed objectives.
4. A mechanism to promote and monitor overall progress.

A Green Economy Roadmap can guarantee continued commitment beyond Rio+20, ensuring that the agreed vision and goals will be followed through in a systematic manner. It can map out a range of international, regional and national actions with milestones, indicators and targets, as well as mechanisms to monitor overall progress.

A Green Economy Roadmap can help all countries to accelerate progress towards the green economy, building on existing initiatives and respecting national differences. The

establishment of strategies for greening the economy as part of the overall economic and development policies and plans of countries will be essential. Such strategies – to be designed "bottom-up" – should contain objectives and timelines for action at national and, where appropriate, regional levels. Actions should build on existing efforts and could be incorporated into national economic and development strategies, also bringing together low carbon strategies and sustainable consumption and production plans. Where needed, donor countries and international organisations could provide assistance, in line with national development strategies. In designing specific actions, countries would be able to make use of a "toolbox" of best practice policy approaches.

However, national efforts alone will not be enough to green the global economy. As many challenges require a global and regional response, the Green Economy Roadmap should also include actions at global and regional level.

To monitor progress towards a green economy, the identification and development of key indicators and a globally agreed system for environmental and social accounting to supplement current economic accounting will be essential. This would build on existing initiatives such as the international system for integrated environmental and economic accounting (SEEA), the UNDP (Human Development Index) and the OECD (Measuring the Progress of Societies). The EU's planned regulatory framework for environmental accounts could also serve as an example.

Building on the policy dimensions outlined in section 3 ("what", "how" and "who") the following sections propose an initial set of specific actions, that would form part of the Green Economy Roadmap.

4.2. Action on resources, materials and natural capital

Rio+20 needs to renew commitment to promote sustainable water. This could be achieved by establishing **international partnerships on water**. These could build on and expand the EU Water Initiative, which has contributed to improved water management and water governance, but giving greater emphasis to economic aspects and the greater engagement of business. International river basin management also needs to be addressed, in particular within trans-boundary river commissions.

Partnerships could also be launched to **increase energy access, energy security and promote renewable energy and energy efficiency**. These could build on existing actions such as the EU-Africa Energy Partnership (AEEP), the EU Regional Investment Facilities, the EU Africa Infrastructure Trust Fund, the ACP Energy Facility and the Global Energy Efficiency and Renewable Energy Fund (GEEREF), which could provide experiences of leveraging private investment for such partnerships.

To strengthen protection of the **marine environment and oceans**, those states which have not yet done so should be encouraged to ratify the UN Convention on the Law of the Sea (UNCLOS). There is a need for new initiatives for the protection and conservation of areas beyond national jurisdiction (the "high seas and the deep sea bed") for instance through an implementing agreement under UNCLOS. To help conserve marine biodiversity in these areas, an agreement should establish multi-purpose marine protected areas and ensure access to the fair and equitable sharing of benefits derived from the utilisation of genetic and other resources. It should also establish surveillance and enforcement mechanisms. Special

attention should also be given to develop a global action programme to combat marine litter and pollution.

Activities to promote **sustainable agriculture, land-use and food security** need to be put into place. This should include strengthening existing initiatives on sustainable agriculture, building on multilateral actions (such as the FAO), regional activities (such as on organic farming) as well as business initiatives. In addition, **international partnerships on food commodities** could be established to make the consumption and production of food commodities more sustainable. Given that agriculture depends on the quality of land, work should be strengthened to improve land quality and to combat desertification. This could include launching a global economic valuation of the costs and benefits of improving land quality. Initiatives could also include giving further impetus to the "Global Soil Partnership", as well as implementing services for global land use monitoring, as part of the Global Earth Observation System of Systems (GEOSS).

Partnerships with governments, civil society and the private sector can also help promote **sustainable forest management** and combat deforestation. Such partnerships could build on the successful approach of FLEGT (Forest Law Enforcement Governance and Trade) and on the initial experiences of REDD+.

The time is ripe to establish a more robust and coherent **international regime on chemicals and hazardous substances** and Rio+20 could launch a process to achieve this. This would build on previous commitments, such as the Strategic Approach to International Chemicals Management (SAICM) as well experience gained from the EU approach to managing chemicals. A regime – possibly in the form of a framework convention – should be guided by the Johannesburg target, according to which by 2020 chemicals should be used and produced in ways that do not lead to significant adverse effects on human health and the environment. The regime should take account of the Global Chemicals Outlook currently under preparation by UNEP and work underway on financing options for assisting developing countries to meet the challenge of a globalising chemicals and waste industry. The regime should include criteria to identify chemicals and substances of global concern, as well as a framework for assessing substances.

All these challenges will require unprecedented level of **scientific and technological cooperation** at the global level, and a mechanism for global science and research cooperation on societal challenges of global importance (e.g. resource constraints, climate change, oceans) should be put in motion.

4.3. Providing economic instruments and financing and investing in human capital

Rio+20 should encourage countries, in particular industrialised and emerging economies, to develop domestic and regional carbon **emission trading schemes** with a view to reducing emissions at least cost, and as building blocks of a future international carbon market. Such instruments may also play an important role in generating innovative finance.

In addition, Rio+20 should launch a coordinated set of actions by countries to identify and phase out **environmentally harmful subsidies**, accompanied by targets and deadlines. The G20 commitment to address fossil fuels subsidies could serve as one specific example. Such an initiative would make use of guidelines and good practice examples of how harmful subsidies have been successfully removed in the past.

To direct and leverage funds for the green economy, Rio+20 should recommend to consolidate and ***strengthen existing financing strategies and facilities***, or establish ***new public-private financing schemes*** as needed. Development organisations (such as UNDP) and International Financial Institutions (such as the World Bank and other multilateral development banks, the European Investment Bank, the Global Environment Facility), should play a strong role, with a commitment to establish green economy financing strategies that can lead to demonstrable results. Private banks, insurance companies and pension funds should also play their part. An important focus of these financing facilities and schemes should be to assist Least Developed Countries as well as SMEs.

In developing countries, Official Development Aid (ODA) will continue to represent a significant source of investment. The EU remains committed to raise the volume of aid to 0.7% of Gross National Income (GNI) by 2015; currently the EU accounts for about 58% of global aid. ODA will continue to be available and can help implement national and regional green economy strategies of partner countries, in the context of their national development plans. In this context, programmes such as EU SWITCH, which has been promoting sustainable consumption and production practices in Asia, could be established as part of global action on sustainable consumption and production.

Rio+20 should establish ***green skills training programmes*** in priority areas such as energy, agriculture, construction, natural resource management, waste and recycling. As the transition to a green economy will create jobs and replace others, the *re-skilling* of the existing workforce will be needed. This could include schemes to protect workers interests, providing social protection, and formalising informal work, for example building on the "just transition" work of the ILO. Youth training programmes are also needed. These should support the school-to-work transition with specific training, and encourage national curricula in secondary education to include green skills.

4.4. Improving governance

Better and more efficient global governance is needed to accelerate global action towards a greener and more sustainable economy, and to eradicate poverty. This should provide opportunities for all stakeholders to participate and contribute.

There are several options to ***strengthen sustainable development governance*** within the UN. One is to reinforce the role of the UN Economic and Social Council (ECOSOC) on sustainable development, with equal weight given to the economic, social and environment pillars. An alternative approach would be to upgrade the UN Commission on Sustainable Development (CSD) to a more permanent body with extended functions. Such efforts should be geared up to ensure that all relevant UN bodies place a much stronger emphasis on sustainable development. In a number of cases improvements can be made within current mandates.

Building on the recommendations of the UNEP Nairobi-Helsinki process aimed at ***strengthening international environmental governance***, UNEP needs to be reinforced. This could be achieved in several ways: i) enhancing UNEP within its current mandate; ii) strengthening UNEP with new tasks and responsibilities; iii) the creation of a global multi-lateral environmental organisation, for example by transforming UNEP into a UN Specialized Agency (such as the ILO). The latter option, which would entail the adoption of a legally binding treaty, would be the most promising way forward to improve international environmental governance and make progress towards global sustainable development. At the

same time it is clear that all options have advantages and disadvantages, and will have to be further discussed.

As part of the strengthening of international environmental governance, the work on streamlining and reinforcing the MEA system needs to be accelerated. While respecting the autonomy of different MEAs, their administration can be substantially streamlined, and overlaps reduced – thus creating a better platform for securing coherent and focused political oversight and leadership, and furthering favourable conditions for green growth.

Reinforced capacity building for the environment is needed within the UN. This should include strengthening environmental expertise and green economy awareness within UN country teams to promote mainstreaming in country programmes, increasing the range of expertise in UN/UNEP regional offices, and developing a system-wide framework for capacity building for MEA implementation. The capacity to monitor the global environment should also be strengthened.

As businesses are the engines of the economy, Rio+20 must **strengthen the engagement of the private sector**. Business and civil society needs to play important roles in the variety of **partnerships and schemes** proposed in this Communication, such as on water, energy, food commodities, forests, and financing.

5. MOVING FORWARD

While progress towards sustainable development has been made in some areas since the 1992 Rio de Janeiro Summit, we are still facing major global environmental, economic and social challenges. This Communication sets out the Commission's initial views as part of the preparatory process leading up to Rio+20.

Rio+20 is a significant opportunity to advance sustainable development across the world. However, it must not simply result in statements of good intent – tangible actions are needed to ensure that Rio+20 will be a major milestone in enabling the transition to the green economy and better governance. The EU is open to discussions with all countries and players on how to further shape this agenda in the build-up to Rio+20. All countries and players have to work together to make sure that the outcomes of Rio+20 can meet our global challenges. Together, we need to ensure tangible, effective action that can have real impact across the world.

Annex

The Europe 2020 Strategy: Targets and Flagship

Headline Targets

- (1) 75 % of the population aged 20-64 should be employed;
- (2) 3% of the EU's GDP should be invested in R&D;
- (3) the "20/20/20" climate/energy targets for a 20% reduction greenhouse gas emissions, 20% share of renewable energy and 20% energy efficiency improvement should be met (including an increase to 30% of greenhouse gas emissions reduction if the conditions are right);
- (4) the share of early school leavers should be under 10% and at least 40% of the younger generation should have a tertiary degree;
- (5) 20 million less people should be at risk of poverty.

Flagship initiatives

- (1) **"Innovation Union"** to improve framework conditions and access to finance for research and innovation so as to ensure that innovative ideas can be turned into products and services that create growth and jobs;
- (2) **"Youth on the move"** to enhance the performance of education systems and to facilitate the entry of young people to the labour market;
- (3) **"A digital agenda for Europe"** to speed up the roll-out of high-speed internet and reap the benefits of a digital single market for households and firms;
- (4) **"Resource efficient Europe"** to help decouple economic growth from the use of resources, support the shift towards a low carbon economy, increase the use of renewable energy sources, modernise our transport sector and promote energy efficiency;
- (5) **"An industrial policy for the globalisation era"** to improve the business environment, notably for SMEs, and to support the development of a strong and sustainable industrial base able to compete globally;
- (6) **"An agenda for new skills and jobs"** to modernise labour markets and empower people by developing their of skills throughout the lifecycle with a view to increase labour participation and better match labour supply and demand, including through labour mobility;
- (7) **"European platform against poverty"** to ensure social and territorial cohesion such that the benefits of growth and jobs are widely shared and people experiencing poverty and social exclusion are enabled to live in dignity and take an active part in society.