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youthXchange

t o w a r d s s u s t a i n a b l e l i f e s t y l e s

THE GUIDE

t r a i n i n g k i t o n r e s p o n s i b l e c o n s u m p t i o n



United Nations
Educational,
Scientific
and Cultural
Organization



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Early drafts of the guide were also submitted to those who initially encouraged UNEP and UNESCO to establish a source of information and education on sustainable consumption for young people: the participants at the UNEP/ UNESCO Expert Workshop on Youth, Sustainable Consumption and Lifestyles (Paris, 6-7 November 2000).

Since its launch in 2002 the YOUTHXCHANGE guide has been translated in more than 15 languages and distributed at the four corners of the world through partnerships with local organisations. The youthxchange translators are extremely motivated organisations (public, private or non-for-profit) thanks to whom the guide has reached about 400,000 people. They are the real ambassadors and implementers of the project. See the full list of local partners here below.

This second edition of the YOUTHXCHANGE guide mirrors the structure of the first one, including new entries and modifications.



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YXC partners worldwide
Nowadays (2007), the YXC GUIDE is available in the following languages:

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☞ **Flemish** (Belgium, 2004) - *UNESCO Platform Vlaanderen*
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☞ **Norwegian** (Norway, 2005) - *Ministry of Children and Equality; Ideebanken, Consumer Council* [oey@bld.dep.no]; [kirsten@idebanken.no];

Planet Earth is facing a severe global crisis. Economic and social development is putting an unbearable strain on our environment. Inefficient production and consumption patterns, together with uneven distribution of resources, have widened the existing gap between **North and South**.

It has been estimated that if all people of the world were to consume like in the affluent countries, then we would need the equivalent of **4 extra Earths**.

Young people today constitute an important group within our consumer societies, and the habits they develop **now** will play a decisive role in **future** consumption patterns. Their decisions as consumers exercise a growing influence on markets and lifestyles. Therefore, they deserve special attention in efforts to change wasteful consumption patterns into ones that are more attuned to sustainable development.

As the environmental conscience of the UN, the United Nations Environment Programme (UNEP) underlines the importance of and the urgent need for a worldwide change in consumption and production patterns and attitudes.

For its part, the United Nations Educational, Scientific and Cultural Organization (UNESCO) emphasises the role of education in shaping attitudes, values and behaviour, while developing the capacities, skills and commitments needed for building a sustainable future.

Through **youthxchange**, UNEP and UNESCO work to show young people that it is possible to translate our aspirations for a better world into everyday actions.

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The YXC project

"The starting point for a better world is the belief that it is possible."

[Norman Cousins, American writer]

The world's population is expected to increase by **50%** by 2050 bringing the total of people on this planet to some **9 billion**. Nearly all growth is projected to take place in the developing world.

This will put **immense pressure** on our natural resources, biodiversity and the ecological balance of the planet. We need to change the way we view our resources and, more importantly, how we use them. Promoting sustainable consumption is more **urgent** than ever.

Half the world's population is under **20 years old** and **90%** of all young people live in developing countries. Youth is a critical stakeholder in the global economy and will be the **main actor** and **motor** for change in the near future. Thus the energy, motivation and creativity of youth are essential assets to stimulating change.

This guide and the related website are intended as a **tool kit** to help teachers and trainers, NGOs and youth groups to help raise awareness of SC and empower youth to put **theory into practice**.

The ultimate target of YOUTHXCHANGE is the urban consumer class: despite the huge and growing gap in the quality of life between developed and developing

YXC, as we will refer to it.



IS THE FUTURE YOURS? In 2000, UNEP and UNESCO interviewed 10,000 young people (between 18-25). The aim was to open a dialogue with them about their:

- ▶ levels of **awareness** and interest in SC;
- ▶ degrees of **commitment** to sustainability;
- ▶ vision of the future and their **potential role** as leaders in the

development of more responsible consumption patterns.

The survey revealed that young people were ambivalent in their consumption patterns. In particular, the respondents:

- ▶ report as major concerns for the future: environment, human rights and health;
- ▶ understand the impact of their use and disposal of products on the environment but not of

their shopping behaviour. ▶ generally prefer individual to collective action to improve the world.

Given the findings, UNEP and UNESCO concluded that there is a need for reliable, clear and accessible information on the meaning and challenges of SC among young people.

Survey on line at: [www.unep.fr/pc/sustain/youth/research-project.htm]



countries, urban consumer class consumption is quite similar worldwide. Young people are inspired by the same **role models** (pop stars, actors, sport heroes, etc.) and look at an almost homogenous planet of products & services. YXC is addressed to **urban youth**, no matter where it lives.

The Kit illustrates the world behind products and the importance of choosing more sustainable options for our daily lives. But in order to do so without too much effort, we - as consumers - need:

- ▶ clear **information**;
- ▶ accessible **sustainable products & services**;
- ▶ adequate **infrastructures**.

Using accessible **information**, concrete **examples** and everyday **language**, the kit provides many **facts & figures** on SC issues. This tool kit highlights the **links** between cultural, geographical and inter-generational factors. In particular, YXC underlines how SC directly relates to quality of life, efficient use of resources (both human and natural), reduction of waste, ethical issues such as child labour, animal cruelty, fair trade and general equality.

Chapters such as 'Take care', 'Getting around', 'Getting away' or 'Looking cool &

Population aged 15-24				
<i>Medium variant (2005-2010)</i>				
Where	2005 /Thousands	% of total population	2010 /Thousands	% of total population
Africa	188,597	20.8	207,688	20.6
Europe	101,029	13.9	92,242	12.7
Lat. America & Caribbean	105,665	18.8	107,543	18.0
Asia	711,633	18.2	737,388	17.9
Northern America	46,818	14.2	49,255	14.2
Oceania	5,132	15.5	5,457	15.6

Source: [<http://esa.un.org/unpp/index.asp?panel=2>]



fair' relate to our health, how we eat, or dress, how we go on holiday or move around in our cities, and so on. These chapters show how these daily actions have direct and indirect implications for our environment and how important the choice of products and solutions we find to satisfy our basic needs is to shape the market.

YXC also touches upon more 'traditional' issues: waste, climate change and ozone, energy, water, child labour and human rights, animal welfare and biodiversity. Here the guide looks at the use and abuse we make of resources, at innovative solutions to manage them more rationally, and at the importance of respecting people and their potential to help society grow.

A look of the consumer society, its mechanisms and the key role active citizens can have in shaping their future is looked at in the sections '*Take action*' and '*Discover the global village*'.

www.youthxchange.net

The last chapter of this guide provides a section by section description of the youthxchange website, highlighting its interactive nature as well as its teaching potential.

 **WWW...**
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Need to know more on the YXC project? Have a look at the **Trainer's room** section:

- [what is YXC?]
- [case-based knowledge]
- [YXC approach]
- [pedagogical guidelines]

YXC Network - Anybody with access to the Internet can participate in this initiative. There are no language barriers for change. Since 2002, the youthxchange guide has been translated into 15 languages and is currently (2007) being translated into four more new ones - Japanese, Slovenian, Greek and Filipino.

From China to Italy from Dubai or Lima, UNEP and UNESCO estimate that the

guide has been distributed to over 400 000 people.

The youthxchange project has become over the years a network of organisations that actively pursue education for Sustainable Consumption and work at local level with the same materials and a comparable pedagogical approach.

The official YXC site is available also in French [www.youthxchange.net/fr]. Some YXC partners also

have their local version of the site: go to [www.youthxchange.org] if you speak Korean and to [www.jovenesporelcambio.org] if you are from Colombia.

The youthxchange partners all over the world have made the project a reality and a living proof of how complex SC values can be transmitted to young people, while having fun and exchanging ideas and active experiences.

In December 2002, resolution 57/254 on the United Nations Decade of Education for Sustainable Development (2005-2014) was adopted by the UN General Assembly and UNESCO was designated as lead agency for the promotion of the Decade. As the United Nations lead agency in education, UNESCO plays a key role in setting quality standards in education for sustainable development (ESD).

The ultimate objective of the *Decade of Education for Sustainable Development* is to mobilise everyone and see ESD implemented in thousands of local situations on the ground, involving the integration of the principles of Sustainable Development into a multitude of different learning situations. Governments from around the world have been invited to strengthen their contribution to **sustainability** through a focus on **education**.

Education for sustainable development contributes making **citizens** better prepared to face the challenges of the present and the future, and decision-makers who will **act responsibly** to create a viable world. Education for sustainable development is a complex and evolving concept. Thus, five kinds of fundamental learning will be enhanced: learning to know, learning to do, learning to be, learning to live together, and learning to transform oneself and society.

There is no universal model of education for sustainable development: **each country** has to define its own priorities and actions. The goals, emphases and processes must, therefore, be locally defined to meet the local environmental, social and economic conditions in culturally appropriate ways. Education for sustainable development is equally relevant and critical for both developed and developing countries. The underlying values which ESD must promote are the following:

- ▶ Respect for the dignity and human rights of all people throughout the world and a commitment to social and economic **justice** for all;
- ▶ Respect for the human rights of future generations and a **commitment** to intergenerational responsibility;
- ▶ Respect and care for the greater community of life in all its **diversity**, which involves the protection and restoration of the Earth's ecosystems;
- ▶ Respect for cultural diversity and a commitment to build locally and

Education for change

"The object of education is to prepare the young to educate themselves throughout their lives."

[Robert Maynard Hutchins, American educator]



Source: [www.unesco.org/education/desd]; [www.unesco.org/ccivs/New-SiteCCSVI/CcivsOther/esd/esd-presentation.htm]



globally a culture of **tolerance**, non-violence and peace.

This represents a **new vision** of education, a vision that helps people of all ages better understand the world in which they live, addressing the complexity and interconnectedness of problems such as poverty, wasteful consumption, environmental degradation, urban decay, population growth, health, conflict and the violation of human rights that threaten our future.

This vision of education emphasises a **holistic, interdisciplinary** approach to developing the knowledge and skills needed for a sustainable future as well as changes in values, behaviour, and lifestyles. This requires us to reorient education systems, policies and practices in order to **empower everyone**, young and old, to make decisions and act in culturally appropriate and locally relevant ways to redress the problems that threaten our common future. In this way, people of all ages can become empowered to develop and evaluate alternative visions of a sustainable future and to fulfil these visions through working creatively with others.

The basic vision of the *UN Decade of Education for Sustainable Development* is a world where everyone has the opportunity to **benefit** from education and **learn** the values, behaviours and lifestyles required for a sustainable future and for positive societal transformation. This translates into four objectives:

- ▶ facilitate networking, linkages, exchange and interaction among stakeholders in Education for Sustainable Development (ESD);
- ▶ foster an increased quality of teaching and learning in ESD;
- ▶ help countries to make progress towards and attain the Millennium Development Goals;
- ▶ provide countries with new opportunities to incorporate ESD into education reform efforts.

youthxchange is at the heart of this UN initiative, as this joint project seeks to promote sustainable lifestyles.

Source: [www.unesco.org/education/desd]

"Making the abstract real, and developing the capacities of individuals and societies to work for a sustainable future is, essentially, an educational enterprise."

How can you integrate sustainability issues into the class curricula? How do you put theory into action?

*Have a look at the **Trainer's room**: this section is particularly addressed to teachers and trainers. The aim is to provide them with a 'mini-guide' for an integrated and educational*

approach to the website, making their task of introducing SC to students easier.

By offering a series of class activities, trainers can raise interest and activate their students' participation. Youngster are confronted with complex issues like healthy living, consumption check-up,

media-literacy, etc.: they are asked to develop a concrete approach to sustainability's main issues and to take action by increasing awareness, critical analysis and networking.

[www.youthxchange.net/main/trainersroom.asp]



Introducing sustainable consumption

"Current trends in consumption will swamp any gains technology does provide unless there are radical changes in the way we consume resources."

[Barbara Young, UK Environment Agency Chief Executive, 2003]

Sustainable Consumption is about finding workable **solutions** to imbalances – social and environmental – through more responsible behaviour from everyone. In particular, SC is linked to **production and distribution, use and disposal** of products and services and provides the means to rethink their lifecycle. The aim is to ensure that the basic needs of the entire global community are met, excess is reduced and environmental damage is avoided.

— SC, as we will refer to it.

SC is an integral element of sustainable development and an issue of paramount importance to the United Nations:

"development which meets the needs of the present without compromising the ability of future generations to meet their own needs."

Providing **tools for change** is the responsibility of governments, regulatory institutions, NGOs and business. However, the role of the global consumer/citizen is essential in pushing these groups to take action more quickly and for the better.

— This definition which is still widely used today originates from the Brundtland Report (Gro Harlem Brundtland et al., Our Common Future, WCED, New York-Oxford, Oxford University Press, 1987, p. 43).

"Sustainable Consumption is about the power of individuals. Nobody is helpless. Everybody can make the choice to buy or not to buy environmentally friendly products. This will ultimately shape sustainable production patterns as well."

— Kofi Annan, former Secretary-General of the United Nations, New York, 29 April 2004.

This is why two United Nations agencies, **UNESCO** and **UNEP**, have joined forces to make **young people** aware of opportunities offered by more

The concept of SC
is rich and its definition is sometimes hard to pin down! Most definitions have the following common features:

- ▶ satisfying human needs;
- ▶ favouring a good quality of life through decent standards of living;
- ▶ sharing resources between rich and poor;
- ▶ acting with concern for future generations;
- ▶ looking at the 'cradle-to-grave' impact when

consuming;


- ▶ minimising resource use, waste and pollution.

Source: Teaching and Learning for a sustainable future - a multimedia professional development programme, UNESCO 2005 [www.unep.fr/pc/sustain/10year/SCP_Resource_Kit.htm]

UNEP is discussing the meaning and implications of SC with experts in all regions of the world.

Its SC-net, a forum of debate and information exchange is open to contributions from everyone and can be joined at:

[www.unep.fr/pc/sustain]



More on defining SC? Have a look at [www.unep.fr/pc/sustain]; [www.unesco.org/education/tlsf/theme]

Source: Teaching and Learning for a sustainable future – a multimedia professional development programme, UNESCO 2001.

sustainable lifestyles and empower them to make a difference starting from their daily lives.

Any definition of SC highlights how consuming **less** is often a priority, but not always just this. Consuming **differently** and **efficiently** is the key challenge. In many cases, redistributing the chance to consume is what is needed.

Over 2 billion people in the world need more, just to survive:

UNEP, Youth and Sustainable Consumption, Nairobi/ Paris, October 1999.

“Many people in the world need to consume more just to survive. Many others may need to make more responsible choices. In the end, this will mean that fewer resources are needed and fewer emissions are generated, while still serving the needs and wishes of the world’s population.”

Ernst von Weisäcker, Amory B Lovins and L Hunter Lovins. Factor Four: Doubling Wealth, Halving Resource Use, Earthscan Publications, UK 1998. [www.factor10-institute.org]

One way of looking at it is through the **Factor 4** and **Factor 10** approaches which argue that we should be able to live twice as well yet use half as much of our precious resources in the coming decades. We must also work towards a tenfold improvement in resource productivity in industrialised countries by 2050. Production and consumption patterns must become more efficient if we want a lasting and more equal access to resources for everybody.



<p>The UNEP Resource Kit on SC and Production - available in English and French - is composed of fact sheets on 12 key consumption areas: advertising, ecodesign, energies, food, housing, leisure, lifestyles, mobility, ICT, textiles, tourism and water. The fact sheets provide background information on the environmental and/or social impacts of these areas as well as examples of good practices around</p>	<p>the world, with tips for individuals, companies and local authorities to put environmental principles into practice.</p> <p>[www.unep.fr/pc/sustain/10year/SCP_Resource_Kit.htm]</p>	<p>The Millennium Development Goals are eight goals to be achieved by 2015 that respond to the world’s main development challenges. The MDGs are drawn from the actions and targets contained in the Millennium Declaration that was adopted by 189 nations and signed by 147 heads of state and governments during the UN Millennium Summit in September 2000.</p> <p>The 8 MDGs - poverty reduction, environmental</p>	<p>sustainability, improved health and education, local governance, and gender equality - break down into 18 quantifiable targets that are measured by 48 indicators.</p> <p>Sustainable Consumption and Production (SCP) emerged from the 2002 World Summit for Sustainable Development (WSSD) as a key means to achieve MDGs. See: ‘Putting priorities into perspective’, page 16.</p> <p>[www.undp.org/mdg]</p>
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Switching to sustainable lifestyles

"Consumers are increasingly interested in the 'world that lies behind' a product they buy. Apart from price and quality, they want to know how and where and by whom the product has been produced."

[Klaus Töpfer,
Executive Director UNEP]

What exactly does sustainability mean to US as individuals? What can we do to become more responsible? Do we all need to do the same thing? What should we do first, save the environment or eradicate poverty? What comes first, our health or the Earth's? Difficult questions never have easy answers - so the ancients say!

SC is not just an environmental issue, but one that promotes a dignified standard of living for everyone. It is also an issue in a continuing state of **evolution** in which the answers are rarely straightforward. Nevertheless, there are a number of basic elements that make up the whole picture. What follows is an overview of the **topics and challenges**.

The more we damage the environment, the more we put ourselves and future generations at risk. The planet's health is our health. Everyday **50** plant species become extinct. How many is that per week, per month, per year? Scientists believe that plants hold the key to finding cures for many diseases. So each **lost species** not only causes irreparable damage to the ecosystem, but is also a **lost opportunity** for our future development.

Figures from the GLOBAL FOOTPRINT NETWORK show that the average world citizen currently requires 2.2 hectares (one hectare is equal to the size of a football field) to produce what she or he consumes every year and then to dispose of the waste generated.

[www.footprintnetwork.org].
See also: Living Planet Report 2006 [www.panda.org/news_facts/publications/living_planet_report/index.cfm]

Case-based knowledge:
as a matter of fact, in the same way that many indigenous and traditional societies have always used the power of storytelling to transmit values and educate generations, today's grassroots groups, NGOs and other relevant organisations working for sustainability often choose to deliver their message

through success stories.

Youthxchange takes part in this global effort to produce a case-based knowledge by making it available on the web for many people.

YXC's innovative approach lies in the way cases are presented. In fact, they are not just listed

and told according to a strict format, but are crosscutting and transversal to the whole body of the web knowledge. Cases are intended to be not only descriptive of a reality of success, but also deliver a network of values and principles that can be reproduced in many other ways. Hence, they can be powerful source of inspiration for

those who read and surf among the cases and success stories of YXC.

[www.youthxchange.net/main/case-basedknowledge.asp]

So, are we all **equally responsible** then? No, not really. Disparities between countries are huge. A North American on average consumes 9.4 ha per year, a European 4.8 ha, an African 1.1 ha and an Indian 0.8 ha. These figures are an average only and there are also big differences between wealthier and poorer people in a same country.

The world's **20%** richest people consume nearly **75%** of the planet's natural resources. The wealth of the world's **225 richest individuals** equals the annual income of the bottom 47% of the world's population, or **2.5 billion people**.

This also tells us that the distribution of consumption is seriously **out of balance**. The whole youthxchange guide will illustrate these contrasts and some of the solutions in specific aspects of our lifestyles.

Just to give an example, lets look at food and food distribution: many people think that the planet is not producing enough to feed its population. **Wrong**. Unequal



 **WWW...**
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How far from sustainable are your consumption habits? How many planets would we need if all humans consumed as you do?

Go to the **Test & play** section and surf on the **[Look out for your prints]** page: YXC has gathered together a number of provocative games to help you answering these questions. Caution: some quizzes may surprise you, shock you, or make you think. Please remain calm... but not too calm!!

The Ecological Footprint is a way of measuring the impact of human demands on nature. It can be used to compare the environmental demand of our lifestyle (eating, driving, buying things and so on) with nature's ability to provide what people consume.

The Footprint measures our pressure on nature by calculating the amount of land and sea area needed to provide the required resources and to absorb

the waste produced. This allows us to analyze the consequences of the choices we make regarding consumption, production, land, settlement, or waste management.

According to the Living Planet Report 2006 issued by WWF and produced by Global Footprint Network, humanity's Ecological Footprint in 2003 was already 25% larger than the planet's bio-capacity. This report predicts that if we

continue with business as usual, by 2050 humanity's Ecological Footprint will be double the planet's bio-capacity. Basically, it would take two years for the planet to regenerate what we use in one year!
[www.footprintnetwork.org]

Do you want to calculate your own Footprint? Surf on: [http://ecofoot.org]

distribution of food is the main reason why there are more than **800 million** undernourished people in the world today.

In cruel contrast, **food wastage** is a common problem in affluent societies. In the United Kingdom, a shocking **30-40%** of all food is never eaten; in the United States **40-50%** of all food ready for harvest never gets eaten. The impact of this waste is not just financial. Environmentally this leads to:

- ▶ wasteful use of chemicals such as fertilizers and pesticides;
- ▶ more fuel used for transportation;
- ▶ more rotting food, creating more methane - one of the most harmful greenhouse gases contributing to climate change.

So is it feasible to reduce food wastage and its environmental impact and at the same time tackle poverty? **Food banks** are a possible solution to the problem...

How many of such issues and solutions do we face everyday in our lives?

By 2000-2002, the total number of undernourished people worldwide had risen to 852 million: 815 in developing countries, 28 million in countries in transition and 9 million in industrialised countries. Source: [www.wfp.org/aboutwfp/introduction/hunger_what.asp?section=1&sub_section=1]



The table on the following page - 'Putting priorities into perspective' - compares the estimated needed budget to achieve the Millennium Development Goals (MDGs) [see, p. 12] and what is currently being spent in sectors such as military equipment & services, pet food & pet care products, alcoholic drinks, ice cream & frozen desserts, cosmetics & toiletries, weight-loss products, sea cruises and so on. Food for thought...

Global FoodBanking Network (GFN) - *The paradox of hunger is that millions of the world's poorest people lack adequate food resources while there is an enormous amount of surplus food being wasted.*

The GFN works collaboratively to reduce world hunger by securing more food and enhancing the ability to efficiently distribute food through food banks and food bank networks around the globe. GFN officially

launched operations on July 1, 2006, founded by America's Second Harvest, the Canadian Association of Food Banks, the Mexican Association of Food Banks and the Argentine Association of Food Banks.

Together, these organisations form the largest private hunger fighting network in the world, delivering 2.6 billion pounds of food to assist more than 32 million people annually. In six months,

GFN has established working partnerships in Argentina, Canada, Colombia, Ghana, Guatemala, Israel, Japan, Mexico, the UK and the US.

Today, there are approximately 1,000 food banks worldwide that distribute more than 3.5 billion pounds annually (70% of them are GFN members, making up 85% of globally distributed food). The average food bank assists 40,000 people,

providing approximately 75 pounds to each person per year. But they reach less than 50 million of the 852 million hungry people... Clearly there is a need to expand their reach and create more food banks.

[\[www.globalfoodbanking.org\]](http://www.globalfoodbanking.org)

Putting priorities into perspective...

MDGs: what we should achieve... (by 2015)	US\$* (billion)	... compared to what we are spending now for:	US\$ (billion)	where	year
1. Eradicate extreme poverty and hunger TARGET 1: reduce by half the proportion of people living on less than a dollar a day	54/62	military equipment & services	1,001	worldwide	2005
TARGET 2: reduce by half the proportion of people who suffer from hunger ▶ halving the proportion of child malnutrition	29.6	pet food & pet care products	37	North America	2006
2. Achieve universal primary education TARGET 3: ensure that all boys and girls complete a full course of primary schooling	11	alcoholic drinks	56	UK	2004
3. Promote gender equality and empower women TARGET 4: eliminate gender disparity in primary and secondary education preferably by 2005, and at all levels by 2015	0.4/0.6	cosmetic surgery	8.5	USA	2004
4. Reduce child mortality TARGET 5: reduce by two thirds the mortality rate among children under five ▶ extending the coverage of maternal and newborn care	6.1	ice cream & frozen desserts	36.6	USA	2004
▶ child and maternal immunisation in the poorest countries	3.5	baby clothing & footwear	16.8	USA	2005
5. Improve maternal health TARGET 6: reduce by three quarters the maternal mortality ratio ▶ providing universal access to sexual and reproductive health services	23	cosmetics & toiletries	48.2	Western Europe	2005
6. Combat HIV/AIDS, malaria and other diseases TARGET 7: halt and begin to reverse the spread of HIV/AIDS	22.1	weight-loss products	49.2	Europe	2004
TARGET 8: halt and begin to reverse the incidence of malaria and other major diseases	3.2	cut flowers	40	worldwide	2005
7. Ensure environmental sustainability TARGET 9: integrate the principles of sustainable development into national policies and programmes; reverse loss of environmental resources ▶ funding protected areas (PA) for biodiversity conservation	12/13	sea cruises	28.3	USA and Europe	2005
TARGET 10: halving the proportion of people without sustainable access to drinking water	10	bottled water	100	worldwide	2006
TARGET 11: improving lives of 100 million slum dwellers	20	jewellery & watches	59.4	USA	2005
8. Develop a global partnership for development TARGET 12: develop more fully an open trading and financial system that is rule-based, predictable and non-discriminatory, including a commitment to good governance, development and poverty reduction - nationally and internationally	10.2	online gambling	12	worldwide	2005
TARGET 13: address the least developed countries' special needs. This includes tariff- and quota-free access for their exports; enhanced debt relief for heavily indebted poor countries; cancellation of official bilateral debt; and more generous official development assistance for countries committed to poverty reduction	-80	farm subsidies	321	USA, EU, Japan	2004
TARGET 14: address the special needs of landlocked and small island developing States	9.9	personal travel & tourism	348	Europe	2005
TARGET 15: deal comprehensively with developing countries' debt problems through national and international measures to make debt sustainable in the long term ▶ implementing the Heavily Indebted Poor Countries (HIPC) Initiative	63.2	advertising	451	worldwide	2007
TARGET 16: In cooperation with the developing countries, develop decent and productive work for youth	no data	video games	23	worldwide	2006
TARGET 17: In cooperation with pharmaceutical companies, provide affordable access to essential drugs in developing countries	no data	illicit drugs	322	worldwide	2005
TARGET 18: In cooperation with the private sector, make available the benefits of new technologies- especially information and communications technologies ▶ improving mobile phone infrastructure in developing countries	56	digital consumer electronics	167	worldwide	2006

* Estimated needed funds per annum.

MDGs' estimated budgets calculations are still controversial. The figures mentioned in this table were extracted from official statistics (see Sources, p. 82-83) but have no scientific ambition. The table simply aims at visualising the imbalances reported in this chapter highlighting some paradoxical comparisons between spending areas. The table does not make any value judgement and nor intends to suggest shifting of funds from one area to another. The research work was carried out between January and March 2007.



Take care

"No issue is more compelling than the air we breathe, be it hot or cold, be it hawk or human."

[Jack Nicholson, actor]

Health is wealth, so the old saying goes. People are increasingly opting for lifestyles that are more health-centred. Looking at your health should mean looking at the health of the planet too. Changes in lifestyle should benefit the planet as well as you.

Food is a key link between the two. Many people are choosing food products that are healthier, but that have also been produced in a way that does minimal damage to the environment and treats animals in a humane way. Moreover, people want the food they buy to be safe and not contain any surprises.

A few years ago, a series of food-related crises - mad cow disease (BSE), foot and mouth, dioxins in chickens - led to shoppers showing an active interest in more sustainable certified options (organic, free-range, GMO free).

In the end, the ones who decide are the consumers. Consumers are demanding **more information** on what is found on the supermarket shelf - does this tin of

— Bovine Spongiform Encephalopathy.

Genetically Modified Organisms: there is an ongoing and heated debate on GMOs. Concerned consumers should lobby decision makers to apply the precautionary principle. For further information: [www.foodbiotech.org]

Consumers & farmers restoring the link -

Markets run by farmers are becoming a common occurrence and a good shopping alternative in many urban areas around the world. They can be formalised as Certified Farmers Markets (CFM) or they can take place within a more informal scheme. Yet, the common concept is that of a place where farmers sell the products that they have grown directly to the consumer.

[www.cafarmersmarkets.com]

Examples can be found in many cities. To cite a few: *Chaville, France* - Greentrade.net [www.greentrade.net/sp/default.html]; *London* - London Farmers' Market [www.lfm.org.uk]; *Milan* - the Bio Market at Isola [www.cantierisola.org/bio/index.htm]; *San Francisco* - the Ferry Plaza Farmers' Market. [www.ferryplazafarmersmarket.com]

Nutrition, health & beauty are the three pillars of 'Respecting our bodies', the first thematic room of the YXC website. A lot of disparities still exist around the globe concerning access to food and health care. We live in a world of strong contrasts!

That's why the **Facts & figures** section put together [hunger] and [globesity], [organic food] and [harmful eating], [meat production] and [clean water],

food wastage [how much is thrown away?] and [food miles], [indoor pollution] and [acid rain]... they are all interconnected issues!

The world is complex but there are simple ways to start changing it! Have a look at the **dep't store** to discover organic food & drink products - [organic ice cream], [soul food], an alternative to junk take-away food [Indian lunch box], and much more...

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Stepping-stones

Eat and drink as healthily as you can: more fresh food, fewer additives and less processed food.

- ☞ Let your supermarket know that you want **labels** that inform you about the food you eat.
- ☞ Prefer locally grown **seasonal** food.
- ☞ Try to avoid intensively farmed **meat**.
- ☞ Get informed about **genetically modified** (GM) food and related regulations in your country.
- ☞ Only take **dietary supplements** if you really feel you need them. Choose ones made from natural ingredients rather than chemical imitations.
- ☞ Learn about '**E numbers**' that artificially colour and flavour foods.

There is a campaign by the Sustainable Agriculture Food and Environment Alliance on taking care to watch 'food miles': [www.sustainweb.org/chain_fm_index.asp]

In particular, steer clear of the E100 to 180 colourings, sulphur dioxide E220, the anti-oxidants E320 and 321, and monosodium glutamate E621. Find more on E-numbers at: [www.hacsg.org.uk]

The possible effects naturally have to be fully researched before any reliable information can be provided.

Capable of decomposing rapidly by micro-organisms under natural conditions (aerobic and/or anaerobic). Most organic materials, such as food scraps and paper are biodegradable. Source: [http://glossary.eea.europa.eu/EEAGlossary]

tomatoes contain GMOs? Has the meat I want to buy been injected with hormones? It's all about **choice**: some people may not care if GMOs are present in food, but what is important is that sufficient information is provided so that people can choose for themselves.

Eating **organic food** or being **vegetarian** are choices people make about how they want to live, or because it is part of their culture. It is also because they want to be healthier. These choices can also be good for the environment because meat production has a bigger environmental impact and requires more land than growing vegetables.

We need **25/35 kg** of cereals to produce **1 kg** of red meat: following a meat-free diet or reducing meat consumption does prevent several environmental impacts [water, soil, energy and so on]. Chicken has a smaller environmental impact than red meat: **15 times** less environmental damage per serving.

Taking care is also closely related to products we regularly use to clean and maintain our houses and ourselves. Many contain **chemicals** that add to already high pollution levels and are not biodegradable.

ASPEC, the Peruvian Association of Consumers and Users - In 2003 ASPEC started a campaign against the use of potassium bromide in bread production. The campaign was a success and the Peruvian Health Secretariat forbade using this salt in the preparation of all kinds of alimentary products. Potassium bromide (KBr) is a salt used as an anticonvulsant and a sedative in the 1800s. Today it is used as an anti-seizure medication for dogs and

cats. It's a white crystalline powder and soluble in water. In a dilute aqueous solution potassium bromide tastes sweet, at higher concentrations it tastes bitter, and when most concentrated it tastes salty. Potassium bromide is not approved by the US Food and Drug Administration (FDA) and has been declared dangerous for human health by WTO. Source: [www.nutrar.com]; [www.globalfoodbanking.org]

Chemicals: the dirty dozen comes to an end! - Talks to draw up an international legally binding treaty to phase out releases of persistent organic pollutants (POPs) were successful in May 2001. Officials from some 120 governments confirmed that emissions of an initial 'dirty dozen' of toxic chemicals including DDT, PCBs and dioxins should be eliminated. The Stockholm convention entered into force in May

2004, and now counts 98 countries (97 states and the European Community). Find out more on POPs and UNEP's role in campaigning for this convention on: [www.chem.unep.ch]



☺ Stepping-stones

There are many small steps we can take to reduce our use of **chemicals**:

- ☞ Inform yourself about **cleaning products, toiletries** and **cosmetics**, what they contain and what they do to you and the environment.
- ☞ Use **eco-friendly, cruelty-free** products whenever possible, and always use the minimum amount (in general a little bit less than recommended).
- ☞ Think carefully about how often you need to wash your **clothes**. Avoid **dry-cleaning** clothes, as the fluids used often contain highly polluting chemicals.
- ☞ If you must use **pesticides**, use the least harmful ones.
- ☞ When you visit your doctor, always ask whether the **remedy** being prescribed is the mildest that might work effectively.
- ☞ Sort out your medicine cabinet and take all the **medicines** which are out of date back to your chemist for disposal. Take usable ones you no longer need to pharmacies which collect them for people in need.

Not tested on animals.

The following websites provide further information:
[\[www.pmac.net/pestenvj\]](http://www.pmac.net/pestenvj);
[\[www.ianr.unl.edu/pubs/pesticides/index\]](http://www.ianr.unl.edu/pubs/pesticides/index)

Pesticides Action Network - Pesticides are hazardous to human health and the environment, undermine local and global food security and threaten agricultural biodiversity. Yet, these chemicals are aggressively promoted by multinational corporations and government agencies. The sector accounts for more than US\$35 billion a year. Pesticide Action Network (PAN) challenges the global proliferation of pesticides, defends basic

rights to health and environmental quality, and works to insure the transition to a just and viable society. PAN co-ordinates NGOs, institutions and individuals in over 90 countries. PAN projects and activities are implemented by five autonomous regional centres (North America, South America, Africa, Europe, Asia).
[\[www.pan-international.org\]](http://www.pan-international.org)

Out of target - Pesticides designed to kill pests are usually toxic to other creatures as well, including humans. According to the REACH - Registration, Evaluation, and Authorization of Chemicals, a European Union program, in the past 50 years more than 75,000 chemicals have been introduced into the environment. Today 300 synthetic chemicals are found in the bodies of humans. Even newborn babies have synthetic

chemicals passed on from their mothers. About 650 million pounds (about 294,835 tons) of pesticides that cause reproductive problems are used annually, with hundreds of millions of applications in our homes, lawns, and gardens. The World Health Organization (WHO) estimates today that 200,000 people are killed worldwide, every year, as a direct result of pesticide poisoning: [\[www.pesticide.org\]](http://www.pesticide.org); [\[www.who.int/topics/pesticides/en\]](http://www.who.int/topics/pesticides/en).



Stepping-stones

We should all take care of our bodies by adopting healthier behaviours:

☞ If you have a choice, **walk** through a park rather than along a main road.

☞ **Stop** or cut down on smoking.

☞ Remember to exercise regularly; you can't store up **fitness** for your old age.



Dangerous chemicals are also in the air we breathe. By 2030, for the first time in history, more people (61%) will live in cities than in the countryside. Unfortunately, **air pollution** has become one of the defining features of city life.

Poor air quality affects the health of the world's population in a frightening way - in both developed and developing countries. Air pollution has led to a sharp increase in the number of people suffering from **asthma** and **allergies** in urban areas. In extreme cases asthma sufferers often have no choice but to stay indoors when smog levels are high.

[www.who.int/topics/air_pollution_indoor/en/index.html]

Source: [www.epa.gov/iaq/pubs/hpguide.html] EPA provides a wide range of information concerning indoor air quality: pollutant sources, health impacts, and ways to reduce indoor pollution. [www.epa.gov/iaq/index.html]

However, chemical and biological pollution also affect **indoor** environments and have adverse health effects. According to the *World Health Report 2002* indoor air pollution is responsible for 2.7% of the global burden of disease.

US Environmental Protection Agency (EPA) studies of human exposure to air pollutants indicate that indoor levels of pollutants may be 2-5 times, and occasionally more than 100 times, higher than outdoor levels.

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The **Career compass** section offers spotlights on organisations like [sport for all association], or the [pesticides action network], and inspiring success stories like [Carlo Petrini - Slow Food].

If you are a trainer you will probably enjoy taking a glance at the **Trainer's room** section. Here

you will find plenty of classwork ideas related to health & nutrition: [food: fast or slow?] or [reading food labels].

And if after having strolled about the first YXC thematic room you feel ready to challenge yourself, then go straight to the **Test & play** section to test your taste [food for thought] and your knowledge on [sustainable food]... Enjoy yourself!

Finally, don't forget to use the **Links** section: check the [food & drink] and [health & safety] directories to save time carrying out your research projects.

The impact of air pollution on city dwellers' health is shocking: it triggers 1 in 50 heart attacks in London...

In India's main cities, Delhi and Mumbai, breathing the air is the equivalent of smoking 10-20 cigarettes a day and in Delhi alone 7,500 people die every year of respiratory illnesses.

Since 1980 in California, asthma disease has increased by 75% among

the total population, mainly because of air pollution. In 2005, more than 667,000 school aged children were suffering from asthma. [www.arb.ca.gov/research/asthma/asthma.htm].



Getting around

"It is transport that will make or break the sustainability of a city."

[Richard Rogers, architect]

Traffic in Taipei, Tomorrow magazine, n. 2-1991.

Mobility has always been a key feature and an area of constant change and improvement in human activity. Through the centuries we have seen modes of transport multiply, grow in size and power, and of course speed up. But progress has come at a price.

The average speed of travelling has increased and so also has the length of the journeys (quadrupled per capita!): [www.wbcsdmobility.org]

According to a World Bank forecast, *Development Indicators 2005*, the number of cars and commercial vehicles, currently **800 million**, will rise to **1,6 billion** by the year **2030**. Based on related population estimates, this would amount to about one motor vehicle for every 5 people on the planet.

People in countries such as Brazil, China, India, the Republic of South Korea, Mexico, Poland, Russia and Thailand will want to increase their individual mobility as they become more prosperous. As a result the demand for cars is visibly growing.

At the same time, despite social and environmental concerns, car ownership in industrialised countries also continues to increase.

[www.oica.net/htdocs/Main.htm]

Mobility footprint - Transport accounts for about 1/3 of human induced global warming and as such the extreme weather conditions considered 'a wake up call' to climate change; the transport sector is responsible for 40% of the CO₂ emissions in Europe with the majority coming from road transport.

at a rate of 2% per year since 1990 (total growth +17% from road and +12% from air).

[europa.eu.int/eur-lex/en/com/cnc/2004/com2004_0060en01.pdf]; [www.uitp.com/Project/pics/susdev/BrochureUK.pdf]

Emissions from transport are growing faster than any other sector: greenhouse gas (GHG) emissions from all transport have been growing

More and more cars - According to recent, conservative forecasts, China is expected to have 140 million automobiles plying its roads by 2020, seven times more than in 2004.

somewhere in the vicinity of 2050, when the country will have 382 cars per thousand people compared with China's 363 in that year.

[www.business-standard.com], October 23, 2004.

India is projected to have the largest number of cars in the world by 2050 - 611 million to be precise. Passenger car density in India will continue to be 1/3 of China's until 2025. India will overtake its neighbour

See also the European Local Transport Information Service - an interactive guide to current EU transport policies [www.eltis.org]; Reducing Greenhouse Gas Emissions From US Transportation, Pew Center on Global Climate Change, May 2003 [www.pewclimate.org]; International Energy Agency, Information Center [www.iea.org].



Further information at:
[\[www.wbcsd.org/web/publications/mobility/overview.pdf\]](http://www.wbcsd.org/web/publications/mobility/overview.pdf);
[\[www.transport2000.org.uk/factsandfigures/Facts.asp\]](http://www.transport2000.org.uk/factsandfigures/Facts.asp);
[\[www2.acnielsen.com/news/20050316_ap.shtml\]](http://www2.acnielsen.com/news/20050316_ap.shtml);
[\[www.unep.org/GEO/geo3/english/376.htm\]](http://www.unep.org/GEO/geo3/english/376.htm);
[\[http://observer.guardian.co.uk/carbontrust/story/0,16099,1511925,00.html\]](http://observer.guardian.co.uk/carbontrust/story/0,16099,1511925,00.html);
[\[www.worldcarfree.net/resources/stats.php #onecar\]](http://www.worldcarfree.net/resources/stats.php#onecar)

Further problems: emissions of **carbon monoxide** are polluting cities to critical levels and roads are severely congested by the volume of traffic. Drivers in Bangkok are estimated to spend an average of 44 days a year stuck in traffic. Carbon emissions from US cars and light trucks totalled 515 million tonnes in 2000 and exceeded the total emissions from all but a few countries worldwide. In addition, the supply of traditionally used fuels - i.e. gasoline - is not inexhaustible.

The increasing accessibility of cars has made us more and more **dependent** from motorised transport. Almost **1 in 3** journeys under **5 miles** (8 km) in big cities are made by car. Of course, motor vehicles are also essential to modern

Walking bus: so fun, so cool - The Walking Bus is an initiative developed in Great Britain by experts from the Pedestrian Association; it lets a group, or 'bus', of children walk from home to school each morning quickly and safely under the guidance of trained adult supervisors. It represents an excellent alternative to the school run in the car.

A Walking Bus typically consists of between 15-20

children and needs a 'rotar' of 6-10 parents to supervise it. The 'drivers' and the 'conductors' have no formal powers to stop traffic but they direct the children and check for hazards.

[www.walkingbus.org]

Sustainable mobility - The impact of traffic on the quality of urban life endangers the effective social and economic functioning of cities. The "Practical Alternatives to the Car" working group has been looking at an alternative approach.

Stattauto Car-Sharing can provide a 'car on demand' without the need for everyone to own a private car. Stattauto is a German organisation which promoted the creation of the Car Free

Cities Network - European cities co-operating for sustainable urban transport.

The car-sharing phenomenon has reached the net. To Share, in fact, is an example of an Internet-based resource specialised in sharing car journeys all over the world. The website includes 850,000 locations in over 70 countries on all 5 continents. For further information: [www.stattauto.de]; [www.carsharing.net]; [www.agenda21.bremen.de/carfree]; [www.toshare.org].



Stepping-stones

Congestion, polluted air, noise... our cities are becoming more and more uninhabitable. What can we do?

- ☞ **Walk, cycle or roller-blade.** Bicycles are the most energy-efficient means of transportation - 80% of the rider's energy is transformed into motion. It's fast and it will keep you fit!
- ☞ **Car share/car pool** whenever you can. Car sharing enables several people to use one car, a car pool puts one or more cars at the disposal of a group of people who organise themselves to share the car. Both alternatives reduce road traffic, save petrol and cut pollution levels, energy use per passenger and car disposal costs.
- ☞ Alternatively, if you only need a car periodically, **hire** it.
- ☞ **Public Transport.** Trains and buses are generally the greener options as they carry more people and pollute less and use less energy per passenger.
- ☞ Buy **environmentally friendly** motor vehicles and **maintain** them well. Before you buy, check on your car, scooter, or bike's energy efficiency, pollution performance, ability to take unleaded petrol and life expectancy.
- ☞ **Drive carefully.** Avoid sudden acceleration and braking. Aggressive driving leads to considerably higher fuel consumption and more pollution. Switch the motor off if waiting longer than 30 seconds. Do not wait too long before changing gears.



Caroline Clayton, *op. cit.* p. 16. These are precisely the conditions in which the use of vehicles is less efficient.

living. But more responsible use can bring further improvements, making cities cleaner, healthier and safer to live in. Short journeys add to pollution levels: a 5 km (about 3 mile) car journey made by car emits 10 times more carbon dioxide per passenger than a bus and 25 times more than a train.

Every mode of transport holds specific advantages. Using the whole spectrum of transport modes cleverly means choosing the most **appropriate** and **efficient** form of mobility regarding specific traffic situations and personal transport needs. If you want to join in the creation of a future worth living, then go for sustainability by re-thinking your personal mobility habits. Your individual change will be a small effort but have a huge effect. Just try it out!

Mobility mix + UNEP transport initiative - A smart mix of all transport modes ('intermodality') - motorised and non-motorised, public and private - is an essential step towards sustainable mobility. A clever choice within a mobility mix benefits the individual and, at the same time, the environment. It's not only smart, but also fun to combine various mobility options like car, motorbike, train, bus, tramway or one's own power by cycling, kick-

boarding, inline-skating or simply walking. A complete and clever mobility mix also includes 'virtual mobility', as the importance of travelling without physically moving is growing. The vision of such 'intermodality' is based on flexible mobility systems with every transport means playing a specific and important role - though the mix can vary with respect to regional differences. Of course, consumers' clever changes from one transport mode to another need to

be facilitated by appropriate infrastructure and technology. Most engines burn fossil fuels for power. UNEP DTIE - with sponsors from the automotive industry - promotes smart driving techniques for individual car users that lead to lower costs, more safety and cleaner air [www.greener-driving.net/site/home.html]... but public transport is still the best option! [www.unep.fr/en/info/videos.htm]

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The environmental 'footprint' of transport is growing in terms of resource use, energy and urban space as well as emissions and local pollution: the thematic room 'Looking for a place' hosts most of the case studies related to this issue.

Surfing within the **Facts & figures** section you will find global statistics on [public transport] and analysis on [using cars] and [carsharing].

Getting away

"There are no passengers on spaceship earth. We are all crew."

[Marshall McLuhan, sociologist]

More information on the issue:
www.ecotourism.org;
www.sustravel.org;
www.greenglobe21.com;
www.green-travel.org;
www.responsibletravel.com

Accounting for over 10% of world economic activity and providing direct or indirect employment to over 200 million people. For further details see:
[\[www.unep.fr/tourism\]](http://www.unep.fr/tourism);
[\[www.world-tourism.org\]](http://www.world-tourism.org);
[\[www.wttc.org\]](http://www.wttc.org)



Mobility means more than just getting around. It also means getting away, travelling, be it for **study, work or pleasure**. But are some choices more sustainable than others? Here's some food for thought...

Tourism has a huge impact on our planet and is the world's largest industry. According to the World Tourism Organisation, global international arrivals will reach almost **1.6 billion** by 2020 (763 million in 2004).

Unless tourism is well-managed it causes serious environmental damage. Scientists predict that by 2015, half of the annual destruction of the **ozone layer** will be caused by **air travel**. Not all air travel can be attributed to tourists, of course, but they do contribute substantially to the problem.



Air pollution, soil and water degradation are particularly problematic in **coastal areas**, being often over-exploited. And more visibly, what about the irresponsible tourist who transform pieces of paradise on earth into rubbish dumps? Are there alternatives? Yes. Nowadays, an increasing number of **sustainable holiday and travel options** are available (conservation and restoration projects, voluntary aid projects, teaching abroad, etc.).

A number of coastal areas around the Mediterranean are under extreme pressure from the high number of tourists they receive every year: one study cited by EEA (2001) suggests that 3/4 of the coastal sand dunes between Spain and Sicily have disappeared as a result of urbanisation linked to tourism development.

Check on the Net: you'll find hundreds of ideas and options, but be careful as some sites promote packages that are not as sustainable as they claim!

Looking for something more relaxing? No problem. Sustainability can also feature in conventional holiday choices... Carefully managed, locally run hotels, bed & breakfasts and camping sites are more likely to boost and respect the **local economy, environment and culture** than some **international hotel chains**.

A positive sign is that sustainable or **ethical tourism** is gaining popularity. Below are some pointers on holidays. The list may seem long but when travelling our efforts and attention need doubling. Not only are you going to a place where the culture is often unfamiliar to you, but you are going to somebody else's home and everybody appreciates a well behaved and considerate guest.

Why go for Sustainable Travel?

The numbers behind your holiday choice:

- ▶ 60% of international air traffic is for tourism.
- ▶ Cruise ships in the Caribbean discharge over 70,000 tonnes of waste each year.
- ▶ A study in Thailand estimated that 70% of all money spent by tourists ended up leaving Thailand (via foreign-owned tour operators, airlines, hotels, imported drinks and food, etc.). Estimates for other developing countries range from 80% in the Caribbean to 40% in India.
- ▶ An estimated 13-19 million children and young people below 18 years of age (10-15% of all employees) are employed in the tourism industry worldwide. They are frequently subjected to harsh working and employment conditions.

UNEP provides information on sustainable travel and the impact of your holiday choice [www.unep.fr/tourism]



Sources: Tourism and Deserts [www.unep.fr/tourism]; Tourism Concern's (UK) [www.tourismconcern.org.uk]; Survival International's code [www.survival-international.org]; The Himalayan Tourist Code (Nepal) [www.farfrontiers.com/about-us/166/the-himalayan-tourist-code]; Ecumenical Coalition of the Third World Tourism (Bangkok) [www.eed.de/fix/ten-tourism]; Tourism with insight [www.tourisminsight.com]; Sierra Club, America's oldest environmental organisation [www.sierraclub.org]



Stepping-stones

There are several things we can do to reduce our impact as tourists, for example...

- ☞ Choose travel options which produce the greatest benefit for the **host population**. Bargaining for lower prices when purchasing tickets and souvenirs may mean exploitation.
- ☞ Try to read about the country you are visiting - it will help you to respect the **local culture** and open doors for you. In many countries, loose and lightweight clothes are preferable to revealing ones. Similarly, kissing in public is often culturally inappropriate.
- ☞ **Reduce waste** and leave unnecessary food and equipment packaging at home before travelling.
- ☞ Save precious **natural resources**. Don't waste water and energy. Avoid using pollutants such as detergents in streams or springs.
- ☞ Dispose of **toxic waste** such as used batteries, ointment tubes, aerosols and photographic film packaging properly or take it back to your home country.
- ☞ Use forms of **local transport** (camels, horses, dugouts, feluccas). This is fun and at the same time provides the local communities with an additional source of livelihood.
- ☞ **Plants** should be left to flourish in their natural environment. Taking cuttings, seeds and roots is illegal in many parts of the world.
- ☞ Respect **land rights**. When on tribal lands, tourists should behave as they would on private property.
- ☞ Make sure that your **souvenirs** are produced locally and respect the environment.
- ☞ Respect the country's cultural and natural **heritage**: don't take away ancient relics.

So... as the AMERICAN SIERRA CLUB recommends: take only photographs; leave only footprints!



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Some people say "Tourism is like a fire, you can use it to cook your soup, but it can also burn down your house".

*Need to go in depth? Surf within the **Facts & figures** section: the data displayed here show how **[tourism]** is becoming a global phenomenon and analyse the pros **[traveller's world]** and cons **[environmental impact]** it implies.*

*Looking for alternative ways to travel? In our **Dep't store** you'll find a few suggestions:*

[responsible tourism], **[(ab)original tours]**, **[ecovolunteers]**, an international travel card for students **[ISIC card]** but also suggestions on how to have free accommodation while travelling **[(ex)changing houses]**, and much more.

'Looking for a place' hosts tourism-related case studies **[Green Map System]**, **[Tour operators go fair]**...

*Doubts about your trip destination? Get inspired at the **[UNESCO heritage list]** in the*

'Carrying the torch' thematic room!

*No time to waste? A special directory within the **Links** section will send you to the best on the Net on **[sustainable tourism]**: tourism impact, conservation groups, tour operators, accommodations, certifications, work camps, online forums...*



Reduce waste

"Every product we consume has a similar hidden story, unwritten inventory of its materials, resources, and impacts. It also has attendant waste generated by its use and disposition."

[Paul Hawken, environmental expert]

In recent years there has been a dramatic increase in **waste production**. On average, every person living in a developed country throws away **1kg** of rubbish every day.

According to a study by the EEA (European Environment Agency) in 2005, the average amount of municipal waste generated per capita per year in many western developed European countries has reached more than **500 kg**. Previous European objectives targeted to reduce waste generation to 300 kg per capita per year by 2000 were not achieved.

[http://themes.eea.eu.int/Environmental_issues/waste/reports]

It is clear that we must **stop** and reverse this trend if we want to avoid being overwhelmed by **rubbish**. We have to find long-term ways of preventing waste for two basic, yet crucial, reasons:

- ▶ the more **waste**, the more potential **pollution**;
- ▶ garbage is full of materials that can be **reused** and **recycled** - less waste, more money!

Nearly 113 billion cups, 39 billion eating utensils and 29 billion plates are used and discarded in the USA every year - and half of them are made of **plastic**. India

The Kiunga Marine Reserve in northern Kenya has no reef protection. The trash washed up on the beach pollutes but also threatens turtle nesting. Kiunga Eco-Friendly Handicrafts collects the trash and turns them into toys. Old flip-flops are transformed into toy cell phones and cars. The Kiunga Handicraft Team participated in the UNEP organised 'Plastic Fantastic' fashion show, June 4th, 2001 by making a flip-flop dress worn down the catwalk by a top model. After the show

the dress was auctioned off. In the first six months of 2001, 'Eco-Friendly' sold over US\$ 3,000 worth of items.

[www.kenya-wildlife-service.org/marine.html #Kiunga]; [www.ucc.ie/famine/GCD/Kiunga-Case%20Study.doc]

White garbage - People in China's cities can barely go a day without using a wide range of disposables: plastic cups, containers, combs, toothbrushes, ballpoint pens and chopsticks. China is turning into the world's largest market for disposables. Every year, it uses billions of disposables. The piling up of 'white garbage' has led to a major campaign in the media and on the streets to make Chinese consumers change their throw-away mentality. Many cities have

imposed local restrictions against plastic packaging. Hangzhou, the capital of Zhejiang province, is the first Chinese city to ban plastic packaging. People are encouraged to use wicker and straw baskets, cloth bags on shopping trips, and other eco-friendly containers made from paperboard, rice husk, straw or starch.

[www.atimes.com/china]

generates a total of 4.5 million tonnes of plastic waste annually. Plastics take up to **100 years** to decompose. The habit of using disposable plastic items [bags, cups, food containers...] and of leaving them as litter has devastating consequences on the environment and this is particularly visible in areas where nature is unspoilt.

Source: [www.mindfully.org/Plastic/Ocean/Moore-Trashed-PacificNov03.htm];
[www.plasticdebris.org];
[www.algalita.org]

For instance, in remote areas of the Pacific Ocean where you would expect a virgin environment, large areas are covered in floating plastic. The largest area is estimated to be as big as Texas and defined as the 'eastern garbage patch'. In fact, **plastics comprise up to 90%** of floating marine debris, threatening the life of sea plankton, birds, fishes and sea plants.



Computers contribute to SC, particularly by helping people to communicate with one another more sustainably. They also facilitate networking among sustainable development actors. However, electronic goods are generating harmful waste at the same time. **E-waste** is both a valuable source for secondary raw materials and toxic if treated and discarded improperly. Common e-waste includes: PCs, TVs, telephones, cell phones, air conditioners, electronic toys, etc. E-waste composition changes from country to country. For example, while TVs account for more than a half of total e-waste in the USA, they represent a small share in Germany and the UK.

Plastic free Goa! - This campaign was started with a clean-up drive, lasting 80 days through the end of 2000, in which plastic rubbish was collected from across the state of Goa. The aim was to raise awareness among villagers about the danger of non-biodegradable waste and to collaborate with local businesses to limit plastic waste among tourists. The Tourism Department of Goa worked with hoteliers, shack-owners, restaurant

owners and tour operators "to share the responsibility for the clean-up". Beaches needed special dustbins for plastic bottles as the many thousands of tourists left huge numbers of bottles behind them. The 80-day drive had a 'significant impact' on the consciousness of people across Goa. Recently, a new government law enforced a ban on thin plastic bags: in Goa, plastic bags less than 100 microns thick will no longer be handed out free

by shopkeepers. Instead customers will be charged for them in the hope that they will either re-use them or use alternatives such as baskets.

[www.goacom.com/community/pfgc]

Rapid technology change has resulted in a fast growing problem around the globe. In 2003, e-waste worth **US\$1.5 billion** was generated in **India**. In the **United States**, e-waste already makes up approximately **1%** of the total municipal solid wastes in the country. **4 million** PCs are discarded every year in China.

Sources: [www.svtc.org];
[www.worldwatch.org/pubs/goodstuff/computers];
[www.svtc.org/cleancc/pubs/2002report.htm]

One of the causes for e-waste booming is the increasing consumption of a wide range of electronic goods combined with their rapid obsolescence. Between 1970 and 1997, the number of **TV sets** in Asia went from 42 to 672 million. In average TVs can often last 10 years. It means that over **1 billion** TV sets used in Asia



during the nineties might be in the waste stream already.

How can we rethink waste? **First, use less!** Second, consider the product's design. Redesigning products to minimise or even prevent creating waste must also be part of the solution. To further explore the complex issue of **ecodesign**, try visiting these and other sites.

[www.o2.org/index.php];
[www.cfd.rmit.edu.au];
[www.wastewatch.org.uk];
[www.unep.fr/pc/sustain/design/design.htm]

One of the most important challenges facing the world is reducing **resource consumption**. In other words, we must stop thinking of the earth's natural

The European Union has taken the lead on reducing e-waste from electronic products by making producers responsible for taking back their products. The 2002 EU Waste Electrical and Electronic Equipment (WEEE) and Reduction of Hazardous Substances (RoHS) directives require the elimination of certain hazardous materials and set standards for producer responsibility for recycling and take-back: businesses

will have to organise and finance the treatment, recovery and disposal of 60% to 80% of their own waste, depending on the type of product they put on the market.

Best practices - There are several well-known companies which have adopted effective environmental strategies such as recycling programmes. Among them is Epson, which has launched an online recycling program that allows consumers to ship back the company's branded products for recycling.

Consumers pay a fee to cover the cost of shipping and recycling of Epson computers or peripherals,

including printers, scanners, digital cameras, laptops, and projectors. By participating in this program, you receive a \$5 coupon per item returned that can be used on your next purchase.

All products returned through the recycling program are sent to a licensed recycling facility where components are shredded and then separated for reuse.
[www.epson.com/cgi-bin/Store/Recycle/Recycle



What is ecodesign?

It is designing products using a 'circular approach' - which is known as 'cradle-to-grave' - taking into account their entire lifecycle from creation through use to disposal. The aims are to:

- ▶ Utilise materials, energy and other resources more efficiently.
- ▶ Choose materials that don't come from endangered ecosystems.
- ▶ Design to prevent pollution and waste.
- ▶ Select recycled/recyclable materials and energy saving technologies.
- ▶ Optimise a product's life: make it easy to use, maintain, update, reuse, recycle or re-manufacture.
- ▶ Keep it simple! - Use fewer materials/components and allow easy disassembly and recycling.
- ▶ Improve transport logistics.
- ▶ Avoid potential health risks. - Use safe, non-toxic materials.
- ▶ Respect human rights (avoid sweatshops and child labour).

Often, ecodesign is not about reinventing goods. It recognises that people do not always want a product they need solutions. If designed well, a laundromat could easily replace individual washing machines. Ecodesign looks for alternative ways of performing a task with lower ecological impact and equal (or greater) efficiency. Ecodesigners believe that ethics and aesthetics are not opposites but rather complement each other.



Program.jsp]

IBM also invests in take-back services. IBM's PC Recycling Service allows consumers and small businesses to recycle any manufacturer's PC, including peripherals.

Depending on its age and performance capability, the computer will either be recycled in an environmentally responsible manner or refurbished for donation through "Gifts in

Kind International". If the computer can be donated, the donor receives a receipt which can be used for tax deduction purposes. Customers can purchase the recycling service when they buy a new IBM computer. [www.ibm.com/ibm/environment]

Other famous companies which propose similar services are:

- Apple Computer [www.apple.com/environment

/recycling/nationalservices/],

- Compaq [h18000.www1.hp.com/corporate/ehss/2001rpt/products.html],

- Dell Computer Corp [www1.us.dell.com/content/topics/segtopic.aspx/dell_recycling?c=us&cs=19&l=en&s=dhs],

- Hewlett Packard (HP) [www.hp.com/hpinfo/global/citizenship/environment/return/index.html],

- Intel [www.intel.com/intel/other/ehs/product_ecology/R_R_Initiatives.htm],

- Philips Electronics [www.philips.com/assets/Downloadablefile/Environmental-responsibility-2828.pdf],

- Sony Electronics [www.sony.net/SonyInfo/Environment/recycle/japan/index.html],

- Xerox [www.xerox.com/go/xrx/template/020e.jsp?Xcntry= USA&Xlang=en_US]

resources – be they fossil fuels, water, natural gases or trees - as a never ending supply. Recycling plays a crucial role.

If we do not want to exhaust our supply of natural resources, the 3 R's - **repairing, reusing and recycling** - need to become second nature to us in commercial and daily life. This will help to:

- ▶ **minimise** and **prevent** further environmental damage;
- ▶ **avoid** unnecessary use of our natural resources;
- ▶ **conserve** energy and **bring down** pollution levels.

Recycling can also play a major role in reducing solid waste by reusing it to manufacture new products. For every **ton of paper** recycled, **17 trees** and **21.000 litres of water** are saved. In addition, air pollution is reduced by 30kg and landfill waste by 2.3m³.

Reusing and reducing are key tools to prevent **packaging waste**. In the USA, for example, 64 million tonnes of packaging are thrown away every year. But some companies are changing their approach.

Look for the **recycling logo**. As a shopper you can use your spending power to



Such as deforestation and the extraction of virgin raw materials from the earth.

To find out more, take a look at: [www.wastewatch.org.uk]; [www.recycle.net] - And for a glossary on recycled/recyclable materials: [www.grn.com/grn/library/gloss]

PHILIPS DESIGN, for example, created a global design programme for over 80,000 products that made up the Philips Consumer Electronics portfolio. In 2005, Philips launched 50 new 'Green Flagships' products, bringing the total to more than 160. Green Flagship products must be proven to offer substantial better environmental performance than their predecessors or closest commercial competitors on energy consumption, packaging, hazardous substances, weight, recycling & disposal and lifetime reliability. [www.philips.com/about/sustainability]



The UNEP/Japan 3R Initiative aims to promote the '3Rs' (reduce, reuse and recycle) globally so as to build a 'sound-material-cycle' society through the effective use of resources and materials.

The 3R was launched in spring 2005 in Japan as a new G8 initiative.

[www.env.go.jp/recycle/3r/en]

Waste to taste - Sotheby's, the prestigious auction house, has officially promoted waste as an honourable material for creating glamorous design.

Furthering its incontrovertible fame in pointing out the official market value of aesthetic trends, the London seat opened the 2003 Contemporary Decorative Arts and Design selling exhibition, an exciting annual event showcasing the very best of contemporary craft and design, with a complementary special exhibition: "Waste to Taste". Exploring the role of trend-setting designers in recuperating waste materials, the exhibition focused on the transformation of mundane 'waste' objects into consumer-friendly ones.

[www.shareholder.com/bid/news/20021206-96753.cfm]

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Reducing waste is a horizontal issue cutting across different thematic rooms: for instance, 'Packaging yourself' displays fashion-related cases: [Waste to taste] - [Rethinking luxury] - [Committed sportswear] - [2nd chance to clothes].

Find other relevant cases in 'Clean up your fun' [Don't waste your party], or in 'Looking for a place' [From waste to houses].

Plastic: recycling labels



With a little bit of care most plastic can be recycled, and the collection of plastics for recycling is rapidly increasing.

Plastic recycling faces one huge problem: plastic types must not be mixed for recycling, yet it is impossible to tell one type from another by sight or touch. Even a small amount of the wrong type of plastic can ruin the melt.

The plastics industry has responded to this problem by developing a series of colour-coded markers, commonly seen on the bottom of plastic containers.

Types 1 and 2 are commonly recycled. Type 4 is less commonly recycled. The other types are generally not recycled, except perhaps in small test programmes.

make a difference. Take care: some products' labels just indicate that part of their contents (see %) are **recycled** and others inform you that a product's components are easily **recyclable**, which in neither case means products are recycled.



ASIMELEC, Spain - The Spanish Communications and Electronics Companies Association (ASIMELEC) has designed and put in practice the Tragamóvil Initiative, a pioneering system in Spain for the selective collection and recycling of residues from cellular telephones. The Tragamóvil Initiative is the telecommunication sector's own answer, concretely for mobile telephony, to the need to manage the disposal of obsolete telephones and

accessories in an environmentally suitable way. All the economic agents involved in the life cycle of a mobile telephone participate in this initiative: manufacturers (Mitsubishi Electric, NEC, Nokia, Philips, Siemens, Samsung, and Panasonic); cellular telephony operators (Pleasant, Telefónica Móviles, Vodafone); distributors (Payma); recycling companies (Indumetal Recycling); public administrations; and

citizens, as the final users of cellular telephones. Tragamóvil initiative has obtained co-financing from the European Commission through its LIFE-ENVIRONMENT Program, which is a financial instrument that allows the development of pilot projects proposing innovating solutions to environmental problems. Life-Tragamóvil Project, presented by ASIMELEC to the 2002 LIFE-Environment session, was recognised by

the European Commission as one of the best projects presented in this call. colour-coded markers, commonly seen on the bottom of plastic containers. Types 1 and 2 are commonly recycled. Type 4 is less commonly recycled. The other types are generally not recycled, except perhaps in small test programs.

[www.tragamovil.com]



Stepping-stones

These are simple ways to reduce the amount of waste we produce in our everyday lives. Remember the 5 R's of recycling:

- ☞ **Reduce** waste by using fewer printer cartridges. Don't print in 'high quality' when you don't need to. Print your docs on both sides of sheets or - when not necessary - don't print at all (reducing paper consumption and waste).
- ☞ **Refuse** unnecessary packaging and encourage manufacturers to stop over-packaging their products.
- ☞ **Return** bottles and refillable containers whenever you can; buy returnable bottles if possible.
- ☞ **Reuse** and **refill** as much as you can. Items such as envelopes, bottles and plastic bags can all be reused. Take unwanted clothes to a charity shop - not only are you recycling but someone else will appreciate and benefit from them.
- ☞ **Repair** things rather than throw them away.
- ☞ **Recycle** paper, cans and bottles by taking them to your local recycling centre. Compost household waste.

For the eco-wise consumer, looking for products made of recycled goods has become a part of every day shopping. For example, you can find a range of items - including clothing, furniture and toys - all made from recycled paper.



Reciclar T3: the style of reuse - Reciclar T3 is a non-governmental organisation based in Brazil but operating worldwide. Its mission is to work with recyclable materials such as plastic, metal, glass and paper to create objects for everyday life necessities, such as clothes, accessories, furniture and others.

It works with research centres and schools and carries out projects with local communities to provide them with better incomes and

work alternatives. Well-designed objects have been created so far with the idea of simultaneously joining function and aesthetic value.

Reciclar T3 achieved international recognition at the Expo 2000 in Hanover, Germany, where it won an award for being totally integrated and practising sustainable development.

[www.reciclar-t3.org.br]

Would you like to know [how much is thrown away] worldwide? Within the **Facts & figures** section you will also find data on electronic waste [e-waste] and on waste of foodstuff [meat production].

Shocked by all these figures? Get some hope visiting the **Dep't store**: here you'll discover how you can reduce [e-waste], or valorise garbage at home [kitchen compost bins]; choose a carpet that helps you preventing waste

[Interface], and much more.

The **Trainer's room** offers a specifically addressed classwork activity [School waste audit] while the **Test & play** section give you the possibility to test your no-waste commitment: [Dumping or recycling?] - [Waste no waste].

[Recyclart] and [Reciclar T3], presented in the **Career compass** section, are organisations transforming litter into golden ideas..



WWW...
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Optimise energies

"It is up to us as individuals to do what we can, however little that may be. Just because switching off the light on leaving the room seems inconsequential, it does not mean that we should not do it."

[the 14th Dalai Lama, religious leader]



Source: International Energy Agency [www.iea.org]; Energy Information Administration [www.eia.doe.gov]

For centuries humankind has used the earth's resources as if there were no tomorrow. Since the Industrial Revolution, economic growth has been tied to increased use of energy. Over the past **30 years** energy consumption has risen by **85%**. Looking 30 years into the future, energy use is expected to increase by another **60%** - or an average annual growth rate of **1.7%**, just a slightly slower pace than gross domestic product.

Crude oil is the most important energy provider worldwide and provided about 36.4% of the world's commercial energy consumption in 2005. Source: International Energy Agency, Energy Outlook 2006 [www.eia.doe.gov/oiaf/ieo/pdf/highlights.pdf]

Coal and oil, our main sources of energy, are **fossil fuels**. They get their name from the fact that they were formed from the buried remains of plants and animals that lived millions of years ago. Fossil fuels, notably oil, are forecast to continue to dominate the energy mix in the coming three decades if the present energy consumption patterns remain unchanged. Following this scenario, the energy sector will still be the main contributor to emissions of greenhouse gases. Burning fossil fuels releases **carbon dioxide** into the atmosphere - see the following chapter - and causes acid rain.

Source: International Energy Agency [www.iea.org]

The **OVERUSE** of these fuels has resulted in a dramatic increase in the concentration of **greenhouse gases (GHG)** in the atmosphere, which creates the conditions for climate change. How? Too much heat is trapped in the

Saving energy: facts & tips - In developed countries, about 35% of all electricity is used in the home. Home electronics and small household appliances draw energy not only when they are in use, but also when the power is ostensibly off. This phenomenon is known as 'leaking electricity' and it is responsible for an estimated 45 billion kilowatt-hours (kWh) of electricity consumed by US households each year - nearly 5% of total

residential electricity use - and costs US consumers more than US\$3.5 billion annually.

[www.wri.org/wri/trends/index];
[www.fuelcellpark.com];
[www.lipower.org/cei/tips.html]

A new energy 'juice' - In its first endorsement of a commercial enterprise, Greenpeace has joined up with nPower to launch Juice, a new green electricity initiative in the UK that for the first time costs exactly the same as ordinary electricity. Juice bases its energy supplies on wind power. Not only is it affordable, but the more subscribers sign up, the more new wind power stations will be built. Until then, subscribers will get green supplies from existing

renewable sources. Once more than 50,000 have signed up, another site will be developed and so on. For further information:

[www.npower.com/juice]



atmosphere: the planet warms up and this disrupts the natural climate system, which is having negative consequences at all levels.

We have to reduce our dependence on the earth's exhaustible natural resources. We need alternative, **renewable energy** sources now. Unfortunately sources of power such as wind, solar, geothermal, biomass, and hydroelectric are still not widely used. Why?

The mechanisms that regulate the price of energy are complex and perverse: the prices of fossil fuels are artificially cheap as they do not take into account the full **environmental** and **social costs** associated with extraction, distribution and use. On the other hand carbon-free sources of energy, which are environmentally preferable, are more expensive because, being a relatively recent and innovative solution, they are not yet used widely enough to bring down the cost. How can we solve this paradox?

We need **policies** that encourage the private sector to invest in renewable sources of energy in order to expand the market and lower their cost. Also, the price of fossil fuels should reflect the **true costs** to society of producing and using them.

Find out more at:
[\[http://rredc.nrel.gov/tidbits\];](http://rredc.nrel.gov/tidbits)
[\[www.solardome.com\];](http://www.solardome.com)
[\[www.solarnow.org/glossary\];](http://www.solarnow.org/glossary)
[\[http://solstice.crest.org/sustainable/index\];](http://solstice.crest.org/sustainable/index)
[\[www.eren.doe.gov\];](http://www.eren.doe.gov)
[\[www.renewables.ca/main/main.php\];](http://www.renewables.ca/main/main.php) [\[www.fedarene.org\];](http://www.fedarene.org)
[\[www.energystar.gov\]](http://www.energystar.gov)

Smart Life - The Energy Conservation Centre of Japan has launched Smart Life, a campaign to support a new energy conserving lifestyle. The idea is to promote and educate the public using mass media outlets like newspapers, TV and radio and public relations tools such as posters, leaflets, and video.

In summer and winter when energy consumption is high, ECCJ carries out energy-saving campaigns in major cities around Japan.

In the area of clothing, ECCJ holds Smart Collection exhibitions in Tokyo and Osaka to encourage low-energy fashion.

The organisation also conducts surveys - for example, one on eating habits was a launching point to promote ideas for energy saving in cookware, food production and distribution.

ECCJ also looked at office automation appliances to support the reduction of

standby electricity consumption. ECCJ publishes the survey results in posters, brochures, and magazine advertisements, and on its home page on the worldwide web:

[\[www.eccj.or.jp/index_e.html\]](http://www.eccj.or.jp/index_e.html)

Solar energy - In the Galapagos Islands (Ecuador) electricity is based on generators which use more than 5 million litres of fossil fuel per year. To stop this waste, Floreana, which is the most populated island, has launched the first Latin American solar generator, which now provides electricity for all the territory.

More information on [\[www.seba.es\]](http://www.seba.es) [\[www.menergia.gov.ec/php/proy_galapagos_ELECT.php\]](http://www.menergia.gov.ec/php/proy_galapagos_ELECT.php)



Energy is **essential** for almost all our activities, including cooking our food, heating our houses or providing power for our industries. However, the planet's energy use, generation and waste has its consequences. After cars, power is the biggest **source of pollution** on earth.

Energy saving is a big issue that calls for both global and individual solutions. There are many things we can do every day to cut down on the energy we use. Remember that saving energy can save you money!

Space and water heating combined account for **75%** of a household's fuel bill. Rising energy costs should make us increasingly energy aware.

Green Building Material promotes housing materials, which are both healthy to live in and for the environment.
[www.designinggreen.com/english/index.htm]



GreenLight - is an on-going voluntary programme whereby private and public organisations make a commitment to the European Commission to reduce their lighting energy use, thus reducing polluting emissions. Since 2000 GreenLight has organised an annual award given to selected partners based on their efforts to reduce lighting energy use during the year. The last edition took place in Frankfurt in April 2006. For further

information:
[www.eu-greenlight.org]

In Portugal, a GreenLight Partner, **Sonae Imobiliária**, upgraded the Centro Colombo covered car park, one of the largest in Europe, by substituting its magnetic ballasts with electronic ones. These operate fluorescent lamps at higher frequencies and offer significant advantages compared to magnetic ballasts, among them lower power losses. After measurements, they

claimed the following results: lighting electricity savings: 400,838 kWh/year; reduction of electricity use in the areas covered: 11.5%; energy cost savings: 23,814 euro/year; internal Rate of Return of investment: 20%.
[www.eu-greenlight.org/pdf/GL_Catalogue/GL_catalog_14.pdf/community/pfgc]



😊 Stepping-stones

Here are some examples of how to save energy in the home:

- ☞ Turn it off! A **TV set** on standby can still use 1/4 of the energy it uses when it's on. In some countries, TV sets don't even have the turn off push anymore: so, in this case, simply unplug your TV set!
- ☞ Buy energy-efficient, compact fluorescent **light-bulbs**. Switch off **lights** in empty rooms.
- ☞ Turn down the **thermostat** by a few degrees. If you **feel cold** put on another layer instead of turning up the central heating.
- ☞ Take **showers** rather than baths and don't use more hot water than you need: cool showers keep you young!
- ☞ Connect **appliances** to the mains whenever possible. Discarded batteries are highly polluting. If you need to use batteries, make sure they are rechargeable ones.
- ☞ Draught-proof **doors** and **windows**.
- ☞ Make sure old household appliances are replaced by **energy efficient** ones.
- ☞ Take the **stairs**, not the lift; it's a great way to get fit!

Energy Star was introduced by the US Environmental Protection Agency in 1992 as a voluntary labelling programme designed to identify and promote energy-efficient products, in order to reduce carbon dioxide emissions. Energy Star has expanded to cover new homes, most of the building sector, residential heating and cooling equipment, major appliances, office equipment, lighting, and consumer electronics, and

much more. The European Commission also adopted the Energy Star in 2000, making it a global energy efficiency label. In the United States, according to January 2006 official data, more than 2,500 office buildings, schools, hospitals, and public buildings, representing 482 million square feet, earned EPA's Energy Star for superior energy and environmental performance in 2005. These buildings are saving an estimated US\$349

million annually in lower energy bills and are also preventing 1.8 billion pounds of greenhouse gas emissions, equivalent to the emissions from 540,000 vehicles. Energy Star qualified buildings use up to 40% less energy than typical buildings, while providing the required comfort and services.

For further information: [www.energystar.gov]; [http://energyefficiency.jrc.cec.eu.int/energystar]

 **WWW...**
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As we begin the 21st century, 2 billion people - 1/3 of us on the planet - have no access to electricity for basic needs such as lighting or cooking.

Get all the data at the **Facts & figures** section: [Energy facts & tips]; check out [Renewables/ intro] to go in depth on future energy trends: solar, wind, hydrogen, and more...

100% sustainable municipality - Varese Ligure is a small rural municipality in the region of Liguria, Italy. Around ten years ago, Varese Ligure found itself in difficulty. Its economy was weak, the settlements were decaying and people were moving away. The village launched its overall development strategy: promoting agriculture and tourism, encouraging farmers to take up organic farming, choosing renewable sources of energy.

The municipality already has two wind generators and will be installing a further two in the near future. A third solar

photovoltaic installation at the public wastewater treatment station is scheduled. In the field of biomass, the authorities are promoting the use of pellet boilers by encouraging local production of pellets as a means of generating income and contributing to forestry maintenance.

[europa.eu.int/comm/energy/en/renewable/idae_site/deploy/prj083/prj083_1.html];
[database.bestpractices.org/bp_display_best_practice.php?best_practice_id=1833]

Lighting up lives - The Barefoot College (Rajasthan, India) has, since 1990, provided lighting using solar panels in over 136 remote Himalayan villages. As part of Barefoot College's commitment to demystifying the technology of solar energy and demonstrating that poor communities can manage their own solar power without any technical help from the outside, 90 men and 19 women, many of whom are illiterate, have been trained as Barefoot engineers to install and maintain the fixed units and solar lanterns provided. The change that has taken place in the lives of over 15,000 people now benefiting from

solar energy has been immense. No longer do they have to walk for 2 days to get a 20 litre jerry can of kerosene that has to last for a month. The work of the Barefoot College has created significant employment opportunities, facilitated night schooling in the winter, regenerated wasteland through the use of solar water pumps and ensured a growing collective confidence among the communities involved to look after their own solar electrified villages across the Himalayas.

[www.barefootcollege.org]



Fabio Rosa: the sun shines for all - Approximately 25 million people in Brazil do not have access to electricity. Fabio Rosa, a local social entrepreneur, is aiming to fill this need through low-cost rural electrification models to improve the quality of life for the rural poor and to slow urban migration. Rosa, an economist and lawyer and agronomist by trade, is the founder of a for-profit

corporation, Agroelectric System of Appropriate Technology (STA), and a not-for-profit organisation, the Institute for Development of Natural Energy and Sustainability (IDEAAS). Both STA and IDEAAS have been working to bring electricity and community development to rural Brazil since the mid-1980s.

[www.wbcasd.org];
[www.fastcompany.com]

Soweto's energy-friendly houses - Conceived as a technology demonstration and a teaching resource, the Soweto ECOTM House is the first fully energy saving house to be built in Soweto (Johannesburg, South Africa). The house achieves natural thermal comfort for its residents, reducing energy consumption and the need to burn fossil fuels or consume large amounts of electricity.

The project was showcased on the occasion of the World Summit on Sustainable Development (WSSD) held in 2002 in Johannesburg.

[www.housing.gov.za/sustainablesettlements/CaseStudies/DisplayCase.asp]

 **WWW...**
youthxchange.net

'Looking ahead', the 9th thematic room, collects most of the energy-related case studies [choose positive energy!] - [lighting up lives] - [Soweto's house]. Also see 'Looking for a place' for an interesting case study on sustainable building [Bedzed].

In the Dep't store you'll find plenty of energy-saving products & services. To mention just a

few: [portable solar system] - [ecological wall boilers] - [solar camp fridge] - [solar-dynamo radios].

The Trainer's room offers two classwork activities focused on energy: [household energy audit] and [burn it up!]. This last one has been designed to raise students' awareness about the huge gap between industrialised and developing

countries in terms of energy access and consumption.

'Working for a better world' is not just a slogan. In the Career compass section get examples of people/orgs that focus on energy for tomorrow: [Fabio Rosa] - [Ashden awards] - [Smart municipality].



Forecast the weather

"Those who still claim that global warming is not caused by the greenhouse effect through human activities are a bit like people still believing that the earth is flat."

[Gerhard Berz, scientist]

The damage to the earth's atmosphere and climate seems such a massive problem that our initial reaction is to ask: what difference can one person make? But change is needed urgently. **Ozone depletion** and **global warming** are two different problems. They are linked because they both relate to the quality of our atmosphere and have a direct impact on our health and on the health of our entire planet. If nothing is done, the consequences for the Earth will be disastrous.

The hole in the ozone layer. Ozone is a gas that is poisonous at ground level. But 25km above the ground, a fine layer of ozone surrounds the planet and protects us from the sun's rays. This layer is crucial to life on earth. It soaks up almost all of the sun's damaging ultraviolet (UV) light, which causes **skin cancers** and **eye diseases**, and harms plants and animals. Ozone-depleting gases remain active and harmful in the stratosphere for up to **111 years**.

These substances were first used as the working fluid in fridges and later in air-conditioning units. Other major uses of CFCs include the spraying power in aerosols. For more information: UNEP DTIE Energy and OzonAction Unit - Email ozonaction@unep.fr; www.unep.fr/ozonaction

In 1985, scientists found a hole in the ozone layer. This hole lies above **Antarctica**, and it's now about three times bigger than the surface of the United States. So far, about **10%** of the earth's ozone shield has been destroyed. **CFCs** are responsible for destroying much of the 'missing' ozone layer.

Green biz is cool! - The US-based Climate Neutral Network gathers together companies and other organisations committed to developing products and services that reduce their greenhouse gas (GHG) emissions and thus their impact on the earth's climate. Participating companies can become certified as Climate Cool upon achieving the complete reduction and offset of all carbon emissions for the full spectrum of their internal

operations on a cradle-to-grave basis: the sourcing of materials; manufacturing or production; distribution, use, and end-of-life disposal.

[www.climateneutral.com]

The Earth's climate system has demonstrably changed on both global and regional scales...

Get all the data at the **Facts & figures** section: [Global warming] - [Extreme weather] - [Hotspots] - [Eco-footprint] -

 **WWW...**
youthxchange.net

[Endangered species] - [Energy/ Facts & tips].

The Dep't store provides useful tools for change: [carbon calculator] - [desertification kit] and many energy-saving products & services (see previous chapter).

UNEP, UNESCO and WHO have developed a teaching programme to learn about simple, concrete solutions to protect the ozone layer and safely enjoy the sun: [www.unep.fr/ozonation/topics/children.htm]

Developed countries have agreed to curb the use of ozone-destroying chemicals, either by banning them or phasing them out. In developing countries, however, their use will be allowed until the year 2010.

It's never too late to take action. The ozone layer will recover if we all use less ozone destroying substances. However, if these were all banned tomorrow, it would take **40 years** for the ozone layer to heal.

Global warming. Over the last 100 years, average global temperatures have increased by around ½ C°. The most visible phenomenon related to this is ice melting: glaciers are melting and shrinking everywhere: in Antarctica, Chile, Peru, the Alps and the Himalayas.

Greenhouse gases are called this because they make an insulating layer around the earth, like the glass in a greenhouse which traps the heat of the sun's rays. Find out more at: Intergovernmental Panel on Climate Change [www.ipcc.ch]; UN Framework Convention on Climate Change [http://unfccc.int/2860.php]; World Meteorological Organisation [www.wmo.ch/index-en.html]; UNEP/GRID [www.grida.no]. Also check: [http://pacinst.org/globalchange.org]; [www.greenpeace.org/international/campaigns/climate-change].

The INTERGOVERNMENTAL PANEL ON CLIMATE CHANGE (IPCC) tells us that the planet is getting warmer because humans, using fossil fuels for their millions of factories, cars, heating and air conditioning plants, are pumping more 'greenhouse gases' - carbon dioxide (CO₂), methane, nitrous oxide and fluorinated gases - into the atmosphere than ever before.

The IPCC has estimated that if **no action** is taken average surface temperatures will rise by up to **6.4°C** by the end of this century. This temperature increase could trigger serious consequences including the melting of glaciers. The resulting **18 to 59 cm** rise in sea levels would flood coastal areas and small islands. Extreme weather events such as hurricanes, floods or draughts would become more frequent and severe. Africa will be particularly affected. By 2085, between 25% and over 40% of species' habitats could be lost altogether.

For further information on the Kyoto Protocol: [http://unfccc.int/essential_background/kyoto_protocol/items/2830.php]

The **Kyoto Protocol** represents a global commitment to reduce CO₂ emissions by **5%** (compared to 1990 level) by the period 2008-2012. The protocol entered into force in February 2005, and by the end of 2006 it had been ratified by 168 countries.

We can still limit damage caused by climate change provided that we **modify** the way we currently consume and produce. **Reduction** is the first and most important step ahead. Experts say that global cuts in CO₂ emissions of **60 to 80%** (using 1990 as benchmark) will be necessary by **2050**. The costs of

The Pew Center on Global Climate Change is a non-profit, non-political, independent organisation dedicated to providing credible information and innovative solutions to address global climate change. Thirty-two major companies, most of them included in the Fortune 500, are working together through the Center to educate the public on the risks, challenges and solutions to climate change. Among these corporations are:

ABB, Alcan, BP, Deutsche Telekom, DuPont, Hewlett-Packard, IBM, Intel, Novartis, Royal Dutch/Shell, Toyota, and Whirlpool Corporation.

[www.pewclimate.org]

UNESCO launched an educational kit on **desertification** in collaboration with the Secretariat of the United Nations Convention to Combat Desertification (UNCCD).

It is available in Arabic, Chinese, English, French, German, Hindi, Mongol, Russian and Spanish.

[www.unesco.org/mab/ecosyst/drylands.shtml]

stabilising the concentration of greenhouse gases (GHG) in the atmosphere to levels that do not disrupt our climate should amount to 3% of world GDP by 2030. Doing nothing would be much more expensive: without special efforts to adapt to the effects of climate change, a 2.5° C increase in temperature is likely to reduce GDP by an average of 0.5 to 2%, with higher losses in most developing countries.

According to the UN IPCC, making this kind of immediate reduction in CO₂ (carbon dioxide) emissions is impossible but it indicates the kind of pollution cut that's needed to put the brakes on global warming.

However, because some changes will be irreversible, experts in the public and private sectors are working on 'adaptation', in other words developing strategies and initiatives to manage the impacts caused by the climate change that society is already facing.

Sources: [www.hm-treasury.gov.uk/media/8AC/F7/Executive_Summary.pdf]; [http://unfccc.int/files/press/backgrounders/application/pdf/factsheet_adaptation.pdf]; [http://ipcc-wg1.ucar.edu/wg1/Report/AR4WG1_Pub_SPM-v2.pdf] Summary for policy makers of IPCC's AR IV, p.12 table 10.7, and [http://news.bbc.co.uk/2/hi/science/nature/6620909.stm].

For a long time the apparent availability of fossil fuels has not really pushed us to consider alternative and cleaner options. As a result we are still **heavily dependent** on traditional energy sources and are experiencing the



Citizens' initiatives in Italy, France and Spain -

People want to take action: several initiatives are flourishing to provide individual consumers (people, administrations) tools to participate in the race to save our climate. Being at the level of citizens they offer realistic and feasible alternatives for everyone to 'do their bit'. They provide information about climate change, its causes and consequences; they help reduce the emissions of carbon dioxide

through practical advice to minimise energy consumption; and they offer calculators to quantify and compensate for individuals' emissions of carbon dioxide by supporting projects on energy efficiency, renewable energies and capture of carbon.

Impatto Zero is the first Italian project to help companies and citizens have a zero GHG impact life. Its particular strength is that it offers consumers advice on how to be 'zero impact

people' by calculating and offsetting the CO₂ emissions produced by their lifestyles. People can choose to support reforestation in Italy or Costa Rica. [www.impacttozero.it]

Defis pour la Terre is the French initiative to engage people in reducing GHG. It demands that people make a commitment to the environment and to reduce climate change. 70 French celebrities make their commitment public on the web-site and detail their individual efforts to reduce

their environmental impact. [www.defipourlaterre.org]

CeroCO₂ is a Spanish initiative, carried out by the Fundación Ecología y Desarrollo and the Fundación Natura, aiming to raise social awareness about the need to take immediate action against global warming. Carbon sequestration efforts: go to 'Proyectos' [www.ceroco2.org]

If you want to know more about these complex issues, start by surfing on [www.safeclimate.net/business/index.php]; [www.climatevoice.org]; [www.iisd.org/youth/internetcafe]



Stepping-stones

Doing my bit to control climate change and ozone depletion*:

- ☞ **Stop** using **aerosols (sprays)**. Although they no longer contain CFCs, they do contain other polluting chemicals and can't be recycled.
- ☞ Ensure that any new **fridge** contains reduced levels of CFCs or even better, none. Don't just dump your old fridge. Call the manufacturer and ask them to remove the old CFCs from it. These can (and should) be recycled!
- ☞ Cut down on **car/motor vehicle use**. Cars are the single biggest source of excess CO₂ and produce other greenhouse gases.
- ☞ Buy **local** and **seasonal** wherever possible. Producing crops out of season means either growing them in greenhouses or importing them, sometimes by air.
- ☞ At home: does it need to be so hot? Turning the **thermostat** down by just one degree can save you up to US\$58 (€44) a year on your heating bill and make a real dent in your household's emissions.
- ☞ Turn **lights** off! For comparison, lighting an empty office overnight can waste the energy required to heat water for 1,000 cups of coffee.
- ☞ **Unplug** equipment once fully charged. Mobile phones, shavers and electric tooth brushes keep drawing electricity even when the battery is full.

* Also refer to the 'Stepping stones' in the chapter 'Optimise energies'.

Source: "Energy Technology Perspectives - scenarios and strategies to 2050", International Energy Agency, Paris 2006. [www.iea.org/Textbase/npsum/enertech 2006SUM.pdf]

consequences of it on our health and on the planet. We must invest more time, money and 'human energy' to make **renewable energy** sources a viable alternative to fossil fuels. Today thanks to heavy investments and to a growing interest of consumers, renewables account for **18%** of the energy mix. This figure is predicted to rise by 2050 to 23%, up to 34% in the most optimistic scenario.

Nike, Sony Polaroid and others joined WWF Climate Savers Program - a voluntary initiative to reduce greenhouse gas emissions. See: [www.worldwildlife.org/climatesavers]

Whether on the ozone layer or on climate change, **responsible consumers** have a key role: through your positive actions, the 'sustainability-fan club' will grow! Powerful multinationals will have a hard time maintaining their success if they ignore your concerns. Ask them about their CO₂ policies! And do not forget to watch your own lifestyle!



youthxchange.net

Do you know what the link is between global warming and depletion of the ozone layer? How can your consumption habits contribute to reducing/increasing global warming?

Go to the **Test & play** section and test your knowledge on such a complex issue [Global warming].

What are people trying to do to reduce the damage? In

'Carrying the torch', you will find case studies where environmental education plays a key role [educar forestando] - [environment's caretakers].

Climate changes have another terrible consequence: the swollen ranks of environmental refugees could double to 50 million in just a few years time... See [a rest far from home] in the 'Looking for a place' thematic room.

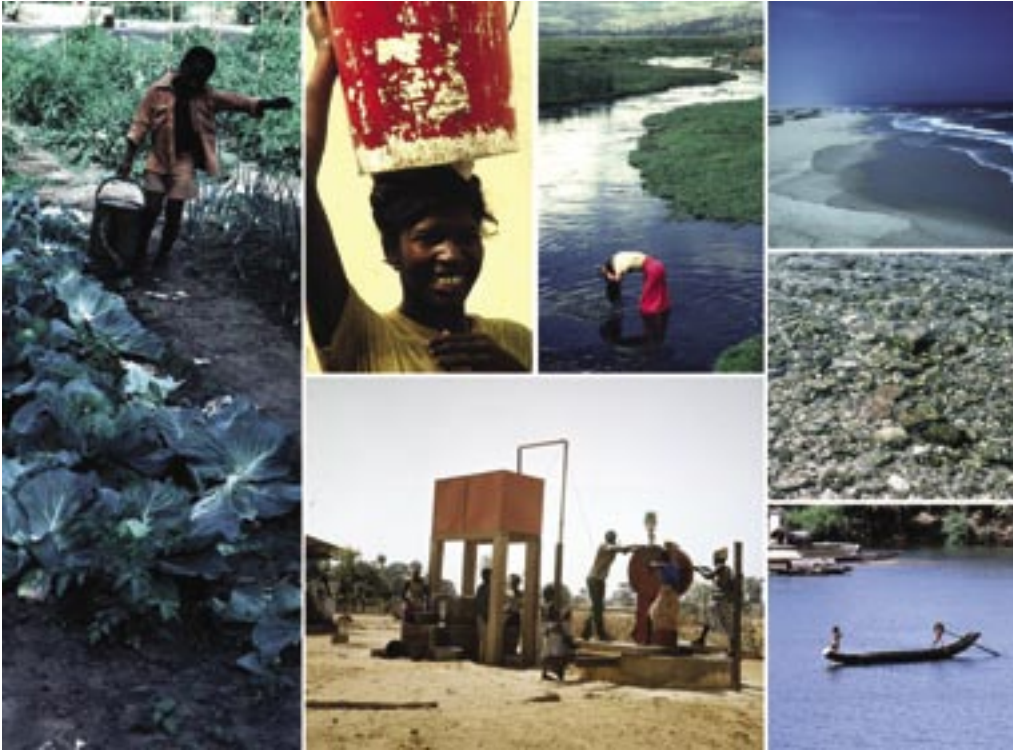
myclimate - The Climate Protection Partnership is based on the concept of voluntary and innovative solutions for climate protection and the promotion of renewable energies and energy efficient technologies. The international initiative originated 2002 as an ETH spin-off in Switzerland.

myclimate is one of the leading providers of carbon offsetting measures. Its clients include large firms, small and medium-sized

enterprises, public authorities as well as non-profit organisations and event organisers.

Private individuals can offset the environmental impact of emissions from their air travel by purchasing a myclimate ticket. In addition, myclimate encourages public dialogue on climate protection and campaigns for a reduction of greenhouse gases at the source.

[www.myclimate.org]



Save water, safe water

"Many of the wars in this century were about oil, but those of the next century will be over water."

[Ismail Seragelgin,
World Bank, 1995]

We drink it, we wash ourselves, our dishes, our clothes, our homes and our cars in it. The human body is largely made up of water. Food crops won't grow without it. In fact it is **vital** to the **survival** of all living organisms. You can do without food for about **1 month**, but only **5-7 days** without water.

97% of the earth's water is ocean water, unusable to man. Less than **1%** of the world's water is available for drinking and other purposes, including agriculture and industry. This supply comes from rivers, dams and ground-water sources.

Across the world, water consumption is on the increase. The availability of something as basic and fundamental as water is likely to become one of the **most**

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Water warriors - In Laporiya, a village in India's north-western state of Rajasthan, Laxman Singh and his Water Warriors, youth volunteers in the Gramin Vikas Navyuvak Mandal (GVNM), have used the village's rich religious and traditional customs to revive the area. The main mission was to raise the land around a pond by two meters. In less than a year, the entire village had begun to volunteer and take part in planning a comprehensive model of water management

that went much beyond the repair and construction of its ponds to include irrigation of the 300 hectares of land that the villagers owned collectively. As irrigation improved, so did the harvests. About 200 surrounding villages have expressed interest in adopting the Laporiya model. Government members have begun preparing blueprints of the agricultural and pasture lands in these villages.

[www.ashoka.org/global/ei_casestudies.cfm#laxman]

Did you know? - Whenever we use personal-care products and household cleaning products - whether they be laundry detergent, bleach, or fabric softener; window cleaner, dusting spray, or stain remover; hair dye, shampoo, or conditioner; cologne or perfume; toothpaste or mouthwash; antibacterial soap or hand lotion - we should realise that almost all of it goes down the drain. Similarly, when we take medications, we eventually excrete the drugs in altered

or unaltered form, sending the compounds into the waterways. Studies have shown that up to 90% of your original prescription passes out of you unaltered. Animal farming operations that use growth hormones and antibiotics also send large quantities of these chemicals into our waters.

Source:
[www.grinningplanet.com]

An average golf course in a tropical country such as Thailand needs 1,500kg of chemical fertilisers, pesticides and herbicides per year and uses as much water as 60,000 rural villagers.

urgent and destabilising resource issues in years to come.

Based on the present increase in demand, economically exploitable water should run out in some critical areas in the near future. And by the year 2025, $\frac{2}{3}$ of the world's population could be facing serious water shortages.

A huge proportion of the earth's population - 2.4 billion people - have no access to safe drinking water. Over 4 billion people worldwide have no running water at home. In some parts of Africa, women and children carry up to 20 litres of water, often for over 5 hours, from their nearest water supplies. Meanwhile, in industrialised countries the average urban home of 4.6 people uses 640 litres of water per day...

[www.waterweb.org]

These statistics are shocking enough, and there is every possibility that we will have a disaster of unprecedented proportions on our hands unless water conservation and management are taken seriously.

Recent studies draw attention to the economic value of freshwater ecosystems such as wetlands, lakes and rivers. Despite their importance, freshwater ecosystems are seriously threatened worldwide. In just 30 years, the Aral Sea - formerly the fourth largest lake in the world - has shrunk to less than half its original size, and become as salty as the ocean.

The developed world regularly pollutes water supplies, rivers and seas, putting the ecological balance in peril. Every day people pump pollution into

In the sixties, the flow of water into the Sea began to drop alarmingly. Upstream irrigation schemes, for the growing of rice and cotton, consumed more than 90% of the natural flow of water from the Central Asian Tian Shan mountains. As a result the Sea's surface area declined. For more information: [http://enrin.grida.no/ara1/main_e.htm]



Bottled water: the real cost

- The global consumption of bottled water reached 154 billion litres (41 billion gallons) in 2004, up 57% from the 98 billion litres consumed five years earlier. Even in areas where tap water is safe to drink, demand for bottled water is increasing - producing unnecessary garbage and consuming vast quantities

of energy. Although in the industrialised world bottled water is often no healthier than tap water, it can cost up to 10,000 times more. At as much as US\$2.50 per litre (\$10 per gallon), bottled water costs more than gasoline.

The United States is the world's leading consumer of bottled water, with Americans drinking 26 billion litres in 2004, or approximately one glass per person every day. Mexico has the second highest

consumption, at 18 billion litres. China and Brazil follow, at close to 12 billion litres each. Ranking fifth and sixth in consumption are Italy and Germany, using just over 10 billion litres of bottled water each. Italians drink the most bottled water per person, at nearly 184 litres in 2004-more than two glasses a day.

In contrast to tap water, which is distributed through an energy-efficient infrastructure, transporting

bottled water long distances involves burning massive quantities of fossil fuels. Nearly a quarter of all bottled water crosses national borders to reach consumers, transported by boat, train, and truck.

Fossil fuels are also used in the packaging of water. The most commonly used plastic for making water bottles is polyethylene terephthalate (PET), which is derived from crude oil. Making bottles to meet Americans' demand for bottled water requires



Stepping-stones

If we make efforts to change the way we use water, we can make a difference. The less water a river contains, the more concentrated its pollution becomes. What can we do to save water?

- ☞ Have a **shower**, not a bath. On average, a bath uses twice as much water as a shower.
- ☞ When replacing **toilets** and **washing machines**, ask for models with low water-use.
- ☞ Wash **clothes** less often. Sometimes clothes are not really dirty, they just need airing or freshening up. Your clothes will last longer too.
- ☞ Don't flush but throw away your **tampons**, **sanitary towels**, **nappies (diapers)** and **condoms**, especially if you live in an area where sewage is pumped untreated into the sea. Think about that next time you go for a swim.
- ☞ Never pour **household chemicals** (such as oil, turpentine and paint remover) down the drain.

Still thirsty for knowledge on water? Visit UNESCO's WATER PORTAL [www.unesco.org/water] or other relevant sites such as: [www.thewaterpage.com]; [www.gpa.unep.org]

different stages of the water cycle: from dumping sewage into the sea to pouring dangerous chemicals into our rivers...

Water **quality** is as important as **quantity** in developing and developed countries. A World Health Organization's study recently pointed out that the 'Acceptable Daily Intake' of pesticides is exceeded in the UK. The list of water pollutants is long: herbicides, nitrates, phosphates, lead, oil and various industrial chemicals.

World Health Organization, Guidelines for Drinking-water Quality, Third Edition 2004, ISBN 92 4 154638 7 or [www.who.int/water_sanitation_health/dwq/guidelines/en]
See also: Pesticides Action Network UK [www.pan-uk.org]



more than 1.5 million barrels of oil annually, enough to fuel some 100,000 US cars for a year. Worldwide, some 2.7 million tons of plastic are used to bottle water each year.

The United Nations Millennium Development Goal for environmental sustainability calls for halving the proportion of people lacking sustainable access to safe drinking water by 2015. Meeting this goal would require doubling the \$15 billion

a year that the world currently spends on water supply and sanitation. While this amount may seem large, it pales in comparison to the estimated \$100 billion spent each year on bottled water. Source:

[www.earth-policy.org/Updates/2006/Update51.htm]

See also: [www.panda.org/about_wwf/what_we_do/freshwater/news/index.cfm?uNewsID=2250]

 WWW...
youthxchange.net

In the 'Pay the right price' thematic room get the story of Laxman Singh and his [water warriors]; in 'Looking ahead' see how a cheap technology can change many lives [Approtech].

In the Facts & figures section check for: [saving water] - [clean water] - [wetlands] - [acid rain] - [global warming] - [extreme weather] - [hydropower] - [urbanisation] - [tourism].

The Dep't store displays several water-related products: [pure water sachets] - [desertification kit] - [ecological wall boilers] - [eco-washing machine], etc.

In the Trainer's room, learn how to carry out a [household water audit] and in the Test & play section answer - alone or with your classmates - some quizzes [water is basic] to discover how water-wise you are.



Purchase without pain

Injustice anywhere is a threat to justice everywhere.

[Martin Luther King, civil rights leader]

Not buying anything is unrealistic, but stopping excess buying is essential. SC is not just about the environmental cost of the way we produce and consume; human and social costs must be considered too.

Countless items that end up in the shops and in our home, are produced in the developing world because multinationals find that **labour** is often much cheaper there. But the deal has to be fair to everyone involved. SC has to uphold social justice and **respect** basic human, social and economic **rights**, which should be available to **everyone** and exclusive to no one.

Child labour is a clear example of why it is necessary to look at the conditions and the basic rights of the people involved in producing and manufacturing goods. According to estimates by the International Labour Organisation (ILO), about **211 million children**, aged between 5-14 years old, were engaged in 2000 in economic activity in the world.

ILO statistics indicate that 2 in 5 children in **Africa** (32% of the world total - WT - of children engaged in economic activity), 1 in 6 in **Latin America** (7% WT) and 1 in 3 in **Oceania** are engaged in economic activity. In Africa alone, numbers are rising by **1 million** a year and are on course to top **100 million** by the year 2015.

[www.ilo.org/public/english/standards/ipecc/simpoc/others/globalest.pdf]

Scoring against child labour - FIFA has given its full backing to a number of incentives designed to highlight the importance of human rights and education for children around the globe. One of the key issues to have been tackled is raising awareness of and attempting to curb child labour.

The International Labour Organisation (ILO) launched the 'Elimination of Child Labour in the Soccer Ball Industry' programme in

Atlanta in 1997 and has worked in close co-operation with the government, manufacturers, FIFA, trade unions, and NGOs.

The project has been a trendsetter in combating child labour in Sialkot, Pakistan. Since the inception of the programme, FIFA's participation has been crucial to its success. FIFA's financial support for these child labour initiatives amounted to US \$1,100,000 in the first two phases. In the first phase (1997-1999)

the project ended up educating 10,572 students, mainstreaming 5,838 of them and providing health cover to 5,408 students. It also succeeded in cleaning up 95% of the manufacturing line of hand-sewn footballs in the Sialkot district.

The second phase of the programme (2000-2004) mobilised remaining manufacturers (around 50 in all) to join the project, and included monitoring of education centres to ensure

that children removed from work remain in school.

Based on the lessons learned FIFA produced a concept paper for the next phase of the programme, which started in 2006. For this third phase, FIFA has already committed additional USD 540,000.

[www.fifa.com/en/fairplay/index/0,1255,113478,00.html?articleid=113478]



In **India**, thousands of children work to produce matches and fireworks. They are paid the equivalent of 48-57 US cents per day and work about 10-12 hours daily, seven days a week. In **Pakistan** about **75%** of the country's carpet weavers are girls under the age of 14.

"Research on Girl Child Weavers in the Carpet Industry", *Rugmark Society Pakistan, 1999*:
[www.rugmark.org/news_facts]

In **Zimbabwe**, children work in the mining sector. Many of the subcontractors use child labour to mine items like chromium and gold panning. **Safety standards** are non-existent and no protective clothing is available for workers.

[www.unicef.org/protection/files/child_labour.pdf];
[www.solidar.org/Document.asp?DocID=173&tod=44735]

However, this is not just a problem in the developing world. According to a recent UNICEF survey, approximately 2.5 million and 2.4 million children are working in industrialised and transition economies. In 2000, about **170 million** children were employed in **hazardous jobs** worldwide.

See the websites of the *US Department of Labor* [www.dol.gov] and the *USA Bureau of Labor Statistics* [www.bls.gov]

Children are usually involved in labour-intensive work that does not require specific skills but where small hands are an asset (carpet weaving, sewing, making matches). They are often exposed to dangerous working conditions and, being **physically vulnerable**, often fall ill. They work long hours, often receive little or no schooling and are paid a pittance.

The sad fact is that there are many **poor families** worldwide who depend

<p>Cutting child labour - Compulsory education has reduced child labour.</p> <p>In Egypt, between 1988 and 1998, school enrolment of 6-14 olds jumped from 81 to 89%, while their involvement in market and subsistence labour force activities fell from 18.5 to 7.1%.</p> <p>The study also revealed that work affects school enrolment more significantly for girls than for boys: 73% of girls</p>	<p>engaged in market work in 1998 were permanent workers, but only 54.4% of boys.</p> <p>UNICEF 2001, [www.unicef.org/sowc04/sowc04_education_child_labour.html]</p>	<p>Cleaning carpets - Rugmark is a non-profit organisation that works to end child labour and offer educational opportunities to children in Nepal, India and Pakistan. The Rugmark label means that the carpet or rug on sale was not produced using illegal child labour.</p> <p>The label also verifies that a portion of the carpet's price is contributed to the rehabilitation and education of former child weavers. In 2004, more</p>	<p>than 10,000 carpets carrying the Rugmark label were sold in North America, a 20% increase in sales.</p> <p>[www.rugmark.org]</p> 
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on the earnings of their children. Some policymakers believe that work plays an important and positive role in children's lives and in their relations with their families, and so seek reform, but not an end to child labour. The problem is complex but any workable solution must actively include the families of the children involved. However **the child must be put first.**

A MISSED OPPORTUNITY

Working only has an impact on a child's physical health and safety, their rights are ignored and, crucially, they are deprived of their chance to receive an **education.** In 2001, **115 million** children drop out of primary school before they have completed four years of education, and most of those children are **girls.** UN Millennium Development goals strive to achieve primary school for all children before 2015.

Without education, the chances of young people of escaping low-paid jobs and



Dakar's World Declaration - *The Dakar's World Declaration on Education for all in 2000 went in that direction by ensuring a free access to a complete and compulsory primary education of good quality for all by 2015, especially for girls, children in difficult circumstances and those belonging to ethnic minorities.*

[www.unesco.org/education/efa/fr/wef_2000/index.shtml]

Brazilian kids: back to school - *The Vale dos Sinos region in the Federal State of Rio Grande do Sul, Brazil, is one of the principal centres of shoe production in the country. The shoe industry is also well known for its high incidence of child labour. Since 1996, IPEC (the ILO Programme on the Elimination of Child Labour) has supported a project implemented by ASBEM, an NGO, aimed at preventing and eliminating child labour and providing alternatives*

for working children in two municipalities of Vales dos Sinos known for shoe manufacturing: Novo Hamburgo and Dois Irmãos. The program obtained good results: the shoe industry of Rio Grande do Sul has adopted a 'Terms of Commitment' on the elimination of child labour in its production chain and talks are being held to adopt an industry-wide 'Code of Conduct'. In the municipality of Dois Irmãos the local government has taken its own initiative

against child labour in the shoe industry by establishing an education centre for 300 children with the support of local enterprises. Similar initiatives are being taken by the local government in the municipality of Novo Hamburgo.

[www.ilo.org/public/english/standards/ipec/about/factsheet/expls-98/exampl3.htm]

poverty are drastically reduced and their country would miss the 'human capital' to help its economy and society to grow.

773 million people, 1 in 4 adults in the developing world, cannot read or write. 2/3 of them are women. To provide every child in the world with a primary education will cost an extra US\$6 billion, the same as 4 days of global military spending.

[www.uis.unesco.org/ev_fr.php?ID=5275_201&ID2=DO_TOPIC]

Consumer awareness, challenging the policies of governments and companies, and not buying a product unless we are convinced that it has been produced without ethical compromises, can all make a difference. Consumers can also turn to the growing presence on the market of fair trade organisations which guarantee that their products are both environmentally friendly and produced without exploitation.

Child labour is just a part of the broader issue of working conditions, human rights, gender inequality and the need to respect developing countries' right to a dignified and sustainable existence.



Seeds for a better future
 - Based on the philosophy that all children are entitled to an education and a childhood, the American Center for International Labor Solidarity's pilot project in Kenya, Uganda, and Tanzania is a good example of a successful, community-based child labour programme. Children living on or near agricultural plantations in East Africa stop going to primary school in order to work on plantations, look after their families, or to find other jobs in neighbouring towns. Since the project was set up in 1999, many children have gone back to school. To help families with the related costs, over 150 local self-help groups based on microcredits have been set up. Changing attitudes about child labour at the grassroots level is key to this project's success. By involving families, village communities, teachers, employers and trade unions, the aim is to create an anti-child labour culture and a monitoring system that is community-based. The training meetings are held on or close to the plantations to make it easy for all interested parties to attend. By working together at a truly local level, the community is trained to help itself and empowered and find practical solutions to its problems.

[www.stopchildlabor.org/internationalchildlabor/PlantationProject]

 WWW...
 youthxchange.net

Find all the case studies on child labour & sweatshops in 'Packaging yourself'.

Other stories on the key role played by education are displayed in 'Carrying the torch': [education for all movement] - [edu on boats] - [solidarity in literacy].



There are several initiatives on the Net to stop child labour: [www.icftu.org]

To find out more about human rights, what they encompass and what's going on and where, visit the following sites: [www.amnesty.org/actnow]; [www.hrw.org]

On successful boycotts, see: [www.ethicalconsumer.org/boycotts/successfulboycotts.htm]

There is a **strong link** between SC and the need to secure basic **human rights** and promote development. Poverty and environmental damage (through deforestation and overgrazing, for example) feed off each other and have a domino effect on human rights and development for current and future generations.

Governments have a **duty to protect** all the rights of their citizens. Sadly, there are all too many instances where human rights are abused and ignored. Increasing awareness means that people are beginning to **question** exploitative labour practices.

The **boycott**, as a campaigning tool, is gaining popularity via the web. Before boycotting, it is important to inform yourself on the possible outcomes and who it really will hit the hardest: the company or the workers you are trying to protect? Demanding transparency and **full disclosure** from companies is fundamental to ensuring that they don't just move and carry on unfair practices elsewhere.

This call for **transparency** can channel consumer action towards **sharing responsibility** and common aims within the broader community.

"Women Go Beyond", Sri Lanka - Most CSR programs have little to do with a company's strategy, but MAS - a \$650 million garment manufacturer based in Colombo - is trying to differentiate itself strategically from a horde of low-cost competitors throughout the developing world. MAS has set the global garment industry standard for compliance by developing Women Go Beyond, a program to educate and empower its 92% female workforce. Founded in 1986, MAS has plants in 9 countries.

Over the years, MAS has generated double-digit annual revenue growth while avoiding sweatshop conditions and spending 3-4% of costs on employee and philanthropic programs. It provides transport to work, free meals, medical care and on-site banking at all its plants. It also funds hospitals, schools and scholarships in the rural villages where its plants are located. MAS bases its operations near villages so that workers, mostly female, will not have to leave their families and move to cities.

Under the supervision of a Go Beyond Champion at each site, every plant is required to offer English, IT and financial management classes. The program includes a beauty, health and hygiene certificate sponsored by Unilever, in addition to classes on reproductive health, domestic violence, traditional crafts and starting a home business. After Go Beyond started, all four of their major customers - Victoria's Secret, Gap, Marks & Spencer and Nike - increased their business with MAS and made

it a strategic vendor in their production plans. Gap committed US\$150,000 over three years to Gap Go Beyond, which includes classes about sustainable development at 20 schools, university scholarships for local youth and entrepreneurship workshops for local women business owners. Now, Nike and Marks & Spencer Go Beyond programs are in the works.

[www.managementtoday.co.uk/article/600660]



☺ Stepping-stones

The following suggestions are intended to help you shop ethically:

- ☞ Choose goods made/distributed by manufacturers and retailers with clear ethical policies and related **codes of conduct**. Make sure that the **4 standards** of the International Labor Organization are respected: freedom of association, the abolition of forced labour, equality, elimination of child labour.
- ☞ Keep your favourite brands under continuous **scrutiny**; contact your local consumer group to find out more about them. Join web campaigns to improve manufacturing employment practices.
- ☞ Take into consideration the ethical policy of companies. Inform yourself about producers who underpay their workers or use slave labour, or whose suppliers support **slavery**.
- ☞ Whenever possible, choose products/services labelled '**NO child labour**'.
- ☞ If possible, choose products/services labelled '**NO animal testing**'.
- ☞ Develop your critical sense towards products/services that use **misleading** claims.
- ☞ Exchange **information** and **experiences** about ethics and goods with other consumers.

Check anti-slavery organisations' publications and websites such as [www.antislavery.org]

See following chapter.

Against human and animal dignity (e.g. promoting violence, sexual exploitations, slavery, etc.).

Bangladesh women - An estimated 90% of the more than 3,780 export garment factories in Bangladesh violate women's legal right to 3 months full pay maternity leave. Some companies pressure the pregnant women workers to force them to quit. Only a handful of companies pay the benefits. Against this background the National Labor Committee (NLC), the Bangladesh Centre for Worker Solidarity (BCWS), and the National Garment Workers Federation (NGWF)

launched a joint campaign to demand that the maternity rights be respected. They are asking Wal-Mart, Disney, Kohls and other companies to sign The Pledge - that any woman in Bangladesh sewing their garments, will be guaranteed her legal right to 3 months maternity leave with full pay.

[www.nlcnet.org/campaigns/maternity]

In the Facts & figures section check for: [children at work] - [behind textiles] - [clothes/ consumers trends] - [fair trade] - [fakes market] - [illiteracy].

Looking for ethical products? Get inspired at our Dep't store: [fair footballs] - [made in dignity] - [sweatshop free t-shirts]... Want to take action? [corporate watch] - [women's rights guide] - [books for development].

'Critical consumption': what does it mean? Go to the Trainer's room and try the [price make up] - [reading textile labels] and

 WWW...
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[make trade fair] classwork.

Test your ability to [shop carefully] at the Test & play section where you can also find two other quizzes: [behind fashion] and [fair trade].

The Career compass informs you on other inspiring organisations & success stories: [fairlabor] - [global march] - [John Wood] - [Avadesh Kaushal].

Live and let live

"The cruel wild beast is not behind the bars of the cage. He stands in front of it."

[Axel Munthe, physician, psychiatrist, and writer]



The right to a dignified existence is not exclusive to humans. An awareness of our **interrelationship** with nature and the consequences of human activity for ecosystems is a key element in understanding sustainable development.

The treatment of **animals** (bred for consumption and in captivity) and the question of **biodiversity** and preserving nature's balance are separate but related issues. This section intends to inform. It is up to individuals to take decisions in line with their **lifestyle choices** and priorities within the context of sustainability.

ANIMAL FARMS

People are increasingly concerned at how animals are treated during the production process of goods (factory farming, cosmetics testing, etc).

Cruelty can be avoided by following some fundamental principles. Treat animals respectfully: provide adequate food and shelter, ensure basic veterinary care and



Battery-cage egg production is so cruel that it is being phased out in European countries but is still practised in other parts of the world. In battery farms, four hens are typically crowded into a wire cage measuring just 40.64 cm wide (16 inches). The cages are stacked in tiers and lined up in rows in huge factory warehouses. Practically all laying hens are 'debeaked' in order to reduce injuries resulting from excessive pecking, when the confined birds

become claustrophobic, bored, and aggressive. They lay more than 250 eggs a year. After one year in egg production, the birds are either shocked into another egg-laying cycle or slaughtered. Battery hens usually end up in low-grade meat products where bruised flesh can be hidden from consumers.

From Matrix to Meatrix - The Meatrix is a humorous 3-minute Flash animation on the American meat machine, and on global factory farming methods. At the end of the movie, viewers are directed to an 'action page' where they are encouraged to eat sustainable meat and support local family farmers. Launched in 2003 by the Global Resource Action Center for the Environment (GRACE), the Meatrix was seen by well over 2.5 million viewers worldwide in only 6

weeks! As a result of this success, GRACE received many requests for Meatrix T-shirts so they decided to create a funny and varied line of Meatrix merchandise. All the proceeds from sales will go to FARM AID, which provides immediate support services to farming families in crisis, emergency grants to small farms threatened with hunger and loss of heat or electricity, etc.

[www.themeatrix.com/shop]

sanitary living conditions and never beat or force-feed.

Food production affects us all. We can choose to refuse products that have not been produced in a humane way. Choosing free range eggs and meat (look for **certified products**) is better for the animal, but also better for the consumer: the **hygiene** and **quality** of meat and other products coming from industrial farms can sometimes be substandard. **Food scares** such as mad cow disease have made us much more aware of the link between sanitary and feeding conditions for animals and our own health.



[www.leapingbunny.org]

Companies have realised that consumers want to avoid unnecessary cruelty. In 1997, an international coalition of animal protection groups from across North America and European Union defined a new 'Not tested on Animal Standards'. The 'leaping bunny logo' is recognised in America, Canada, and United Kingdom and in mostly all western European Countries.

Back in 1979, REVLON COSMETICS was one of the first large companies to fund research for **alternatives** to animal testing with a US\$750,000 contribution to the ROCKEFELLER UNIVERSITY. Other organisations, such as the JOHNS HOPKINS CENTER FOR ALTERNATIVES TO ANIMAL TESTING (CAAT), have started their own programmes to research alternatives. Animal testing is still prevalent in large corporations but there are now several hundred 'cruelty-free' consumer-products companies.

For a list of these companies visit: [www.allforanimals.com/cruelfree1.htm] or [www.naturewatch.org] for more information on cruelty free products.

Animal experimentation is a **controversial subject**. People's opinions on



Animal experiments - Each year inside British labs about 3 million animals are experimented on. Every 12 seconds one animal dies. Cats, dogs, mice, guinea pigs, primates (monkeys) and other animals are used to test new products, to study human disease and develop new drugs. Animal Aid, the UK's largest animal rights group, opposes animal experiments on both moral and scientific grounds. Thanks also to one of its strongest campaigns, an important victory was won in

January 2004 against animal experiments. Cambridge University, which had for several years been planning to build a multi-million pound primate research centre, announced it was shelving the plans. Hundreds of monkeys each year will now be spared the horror of torture and death inside a laboratory. Animal Aid is actively campaigning against a new animal lab under construction at Oxford University.

[www.animalaid.org]

More than Skin Deep - Aveda, maker of plant-based cosmetics, enjoys great commercial success and is renowned for its commitment to the environment and the use of organic ingredients. It started over 20 years ago and has built its success on the values we now define as sustainable (no animal testing, no use of endangered species, etc.).

[www.aveda.com/customer-service/ourmission.tmp]

Another well-known company that has had phenomenal success in the same area is The Body Shop, as famous for its principles as it is for its products.

[www.thebodyshopinternational.com/About+Us/Our+Passion/Home.htm]

animal testing are not always clear cut and often depend on individual perceptions and personal experiences.

STRENGTH IN DIVERSITY

Humans share this planet with at least **15 million** other species. All species play a role in building and maintaining the complex ecosystems that support all forms of life. Species are disappearing at an alarming rate. The current rate of extinction is unclear, but scientists put it at between **1,000** and **10,000** times more than it would be without uncontrolled industrial development.

See: [www.iucn.org]

The threat of **extinction** appears for a variety of linked reasons. Over-harvesting of plants and animals and their habitats, the introduction of alien species to ecosystems as well as climate change, pollution and disease all threaten the **ecological balance** between species.

Diversity is a precious resource: the interplay and interdependence of different species need careful management. Nearly **30%** of all **medicines** found in pharmacies have been developed from wild plants and animals. Many of these exist in unique and, unfortunately, threatened ecosystems. Maintaining



UNESCO 'Man and the Biosphere Programme' - Natural systems cannot be understood, conserved and managed without the recognition and respect for the human cultures that shape them. Together, biological and cultural diversity hold the key to ensuring resilience in both ecological and social systems and understanding the links between nature and culture is crucial in order to safeguard it. Since its early days, UNESCO's Man and the Biosphere

Programme has initiated programmes and activities focusing on the diversity and the resources provided by nature, human impacts on biodiversity, as well as how biodiversity affects human activities. These initiatives are intended to contribute to the fulfilment of a global biodiversity agenda.

[www.unesco.org/mab/biodiv.shtml]

Caught out - Tuna fishermen in the eastern tropical Pacific Ocean found that setting nets on dolphins to catch the tuna swimming underneath was a lucrative technique for tuna fishing, even though the practice is extremely harmful to dolphins. 7 million dolphins have been killed in the past 40 years from this practice.

In 1990, the 'dolphin-safe' tuna label was introduced in the United States, ensuring that any tuna caught by

intentionally setting nets on dolphins could not be labelled as 'dolphin-safe' and sold in the USA.

The 'dolphin-safe' programme was one of the many provisions of the Marine Mammal Protection Act of 1990. Since the implementation of its provisions, dolphin deaths have decreased by 97%.

[www.savedolphins.org]

biodiversity is pertinent at many levels: paradoxically, the areas of the world with the richest biodiversity often also have the world's poorest populations. The challenge of this century is to preserve **biodiversity** while eliminating **poverty**.

The world's leading scientists have developed a CONVENTION ON BIOLOGICAL DIVERSITY (CBD), which favours an holistic approach and has been ratified by 180 countries. **The convention** calls for international cooperation to conserve biological diversity; use of biological resources in a sustainable manner; and ensure that the benefits arising from their use are distributed fairly.

Effective resource management means **rethinking** many sectors of human activity such as agriculture, fishing, tourism, education and health care. Protecting biodiversity does promote sustainable societies, particularly among **indigenous peoples** who best know the ecosystems closest to them.

Limiting the **trade in wildlife** is one way of protecting species. The CONVENTION ON THE INTERNATIONAL TRADE IN ENDANGERED SPECIES (CITES) aims to ensure that trade in wild plants and animals does not pose a threat to their survival. Only the trafficking of drugs and weapons exceeds the worldwide **illegal trade in wildlife**. The demand for exotic pets, foods, medicines (such as tiger bone and rhino horn)

To find out more, visit:
[www.traffic.org/news/salaw]



Great Apes Survival Project - Great ape populations are declining at an alarming rate worldwide. The continuing destruction of habitat, in combination with the growth in the commercial bushmeat trade in Africa and increased logging activities in Indonesia, has led scientists to suggest that the majority of great ape populations may be extinct in our lifetime. Even if isolated populations were to survive, the long-term viability of great apes is

in doubt due to their limited numbers and the fragmentation of their habitat. Thus, drastic action is needed. Time is not on our side.

The Great Apes Survival Project (GRASP) Partnership is an innovative and ambitious project of the United Nations Environment Programme (UNEP) and the United Nations Educational, Scientific and Cultural Organization (UNESCO) with an immediate

challenge - to lift the threat of imminent extinction faced by gorillas (Gorilla beringei, G. gorilla), chimpanzees (Pan troglodytes), bonobos (Pan paniscus) and orangutans (Pongo abelii, P. pygmaeus) across their ranges in equatorial African and south-east Asia.

[www.unep.org/grasp]

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In the 'Respecting our bodies' thematic room, see: [committed beauty] - [EU ban on antibiotics]. Other cases relevant to this chapter of the guide can be found in 'Packaging yourself': [100% endangered specie] - [anti-fur TV spot] and in 'Pay the right price': [respect the Amazon].

and curios fuels this trade and depletes populations.

There are some **success stories** where species extinction or decline has been prevented: the black rhinoceros and the African elephant are two well-known examples. Between 1979-1989, poachers cut the African elephant population from 1.3 million to 625,000 but following concerted government and wildlife protection group action, elephant number are now rising again. Many species still remain **under threat**, however.

Time Europe, April 17, 2000
Vol.155 No.15.

For information on these and other species check the following sites: [www.eia-international.org]; [www.eia-international.org/Campaigns/Elephants/Updates/t0000053]; [www.ecocrimes.org]



Stepping-stones

The following suggestions are intended to help you shop without damaging biodiversity:

- ☞ Remember that some 'natural' products are not the things to buy! These include **plants** or **animals** taken from the wild or goods derived from endangered species.
- ☞ When on holiday, check before you buy plant and animal products. Don't buy trinkets or other goods made from coral, tortoiseshell or other **endangered species**.
- ☞ When travelling abroad, think before you eat. It's a great part of the travelling experience to try **exotic foods**, but find out where the meat comes from, and avoid meat that comes from endangered animals.
- ☞ Are you crazy for **sea-food**? Choose fish that comes from sustainable stocks, such as those with the *Marine Stewardship Council* label. Nearly 70% of the world's fish stocks are now fully fished, over-fished or depleted.
- ☞ Choose '**fair trade**' products (e.g. a number of manufacturers now offer chocolate and coffee that conserve the forest, don't use child labour or chemicals, and give the farmer a fair price).
- ☞ Buy produce in season, or even better: buy **organic seasonal** produce. This will avoid pesticides that threaten both your health and the ecosystem.
- ☞ Choose household cleaning products with ingredients that break down naturally in the environment and don't end up in the **sea**, don't contaminate **water supplies** and don't damage the health of people and wildlife.
- ☞ Dispose of household **chemicals**, waste oil and paint correctly: never dispose of them down the drain but use your local council's disposal facilities.
- ☞ Compost waste: as well as reducing the burden on landfill sites, **compost heaps** can provide valuable **habitats** for wildlife.
- ☞ Choose **wood products** bearing the *Forest Stewardship Council* label, which shows they have come from well-managed forests.



www.youthxchange.net

The **Facts & figures** section provides plenty of stats on animal welfare and biodiversity: [dark side of beauty] - [furs] - [hotspots] - [sharing the planet] - [meat production].

In the **Career compass** section see [ending animal testing] - [eblood clothing] - [bioplaneta].

How do you organise an effective campaign against animal testing? Go to the **Trainer's room** and get

the answer: [cruelty free labels].

Then when you feel ready to challenge yourself, go straight to the **Test & play** section and try [animal or beast] - [thinking biodiversity] - [preserving wild life] - [shop carefully].

Check the [bio-cultural diversity] - [endangered species] - [fashion & beauty] directories within the **Links** section to save time surfing on the Net.

Ethical shopping training

- Whether you go around the corner or around the globe, you can stumble across products made from endangered or threatened wildlife. Sometimes you may not even know that what you buy contains something questionable. So, it's up to you to read labels, ask questions, request documentation. Use the power of the consumer to protect wildlife. To help in your purchasing decisions - whether at home or abroad

- WWF has put together a virtual tourist shop and pharmacy. Browse around and click on the various items for sale. Finding them in the real world should arouse your suspicions:

[www.worldwildlife.org/buyer beware]



Looking cool & fair

"Fashion is a form of ugliness so intolerable that we have to alter it every six months".

[Oscar Wilde, Anglo-Irish playwright, novelist, and poet]

Sources: [<http://en.wikipedia.org/wiki/Fashion>]; [http://en.wikipedia.org/wiki/Dress_code]; [www.fashion-era.com/sociology_semiotics.htm]; [<http://online.sfsu.edu/~kendrav/fashion/>]; Joanne Finkelstein, Chic Theory, in *Australian Humanities Review*, 1997 [www.lib.latrobe.edu.au/AHR/archive/Issue-March-1997/finkelstein.html]; [www.marquise.de/en/misc/fashion.shtml].

What is Fashion? For centuries individuals or societies have used clothes and other body adornment as a form of non-verbal communication to indicate occupation, rank, gender, sexual availability, geographic origin, class, wealth, and group affiliation.

What we wear, how and when we wear it, provides others with shorthand to subtly read the surface of a social situation. Fashion is a **language of signs** and symbols, it is an international language, a sort of common art, through which a culture examines its notions of beauty and goodness.

Fashion does not concern only clothing. Fashion is **everywhere**, it's what is happening all around us: it constantly deals with our ideas and behaviours. In

Recommended reading:
Roland Barthes, *The Language of Fashion*, Berg Publishers, Oxford (UK), March 2006, pp 224:
[www.bergpublishers.com]

Eco & Ethical Fashion

Since 2004 every autumn, Paris, the most glamorous haute couture catwalk in the world, hosts the Ethical Fashion Show.

Conceived and organised by French Universal Love, the show invites designers to show off their talents and experts to discuss about how to make the fashion industry more sustainable. They come from all over the world, including Bangladesh,

Brazil, France, the Ivory Coast, Madagascar, the Philippines, Senegal, South Africa and the UK. Amongst them: People Tree, a pioneer in fair trade and ecology fashion.

[www.ethicalfashionshow.com]

Fashion may have some **hidden costs**, in terms of social and environmental impacts - sweatshops, use of pesticides for vegetal fibre production, wild animal trade, etc. In this context, labels play an important role in informing consumers and allowing free and responsible choices...

Get inspired at the 'Packaging yourself' thematic room:

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[blackspot sneakers] - [sustain. style foundation] - [danish eco-fashion] - [clean clothes campaign] - [anti-sweatshop catwalk] - [harmless textiles] - [rethinking luxury] - [waste to taste] - [committed sportswear] - [2nd chance to clothes] and much more...

fact, fashion embraces clothes, accessories, jewellery, hairstyles, beauty, body art, architecture & design, art & craft, music, and so on.

Fashion, by definition, **changes constantly**. The changes may occur more rapidly than in most other fields of human activity (language, thought, etc). For some, modern fast-paced changes in fashion embody many of the negative aspects of western societies: it results in **waste of resources** and encourages people to buy things they do not need. Others, especially young people, enjoy the **diversity** that changing fashion can apparently provide, seeing the constant change as a way to satisfy their desire to experience 'new' and 'interesting' things.

Everywhere - and sometimes despite very poor living conditions - **young people** are strongly influenced by fashion trends. Clothes and accessories encourage a feeling of social belonging within their 'tribe', the group of peers of reference. And the advertising and fashion industries know very well how to exploit youngsters search for an identity.

Globalisation, and the universal icons it 'produces' through internet, cinema,

Take a trip with Anita Roddick, The Body Shop's co-founder, into the worlds of activism, ethical business, human rights, environmentalism, and so much more: [www.anitaroddick.com]



Need to know more on environmental and social costs of fashion? Search the following keywords on the YXC website:

- **clothes** (consumers' global trends)
- **fibres** (textiles production and trade impact)
- **advertising** (and 'body image')
- **sweatshops**
- **child labour**
- **beauty** (dark side of beauty)
- **fashion victims**
- **cruelty free**
- **fakes** (counterfeiting impact)

*How do you choose what to wear? How healthy are your clothes? What is your favourite shirt made of? Where does it come from? Look at the **Trainer's room** section of the YXC website.*

The [reading textiles] classwork activity aims at raising awareness about the importance of reading labels; developing critical thinking on label credibility and clearness; inspiring responsible behaviour.

magazines and music, plays a crucial role in this process. It has a double effect: on one side it allows major brands and names to advertise and - some would say - impose certain lifestyles and fashion expressions. As a result it seems that people - especially youngsters - wear, eat, act the **same way** everywhere.

On the other hand, globalisation opens a window on the clothes, behaviours and habits of **different people** all around the world thus influencing fashions and making ideas travel. This encourages people's curiosity in where their clothes come from. Many youth go for an '**ethnic look**' that IS THE RESULT of mixing different items of clothing from around the world. This look says "I am a citizen of the world and am interested in other cultures and people".

MUST I HAVE IT?

Today, the need to pass the fashion test means - at least in industrialised countries - spending your life dip into a circle of diet, fitness, cosmetic surgery and other regimes; shopping in search of the ultimate clothing, mobile phones,



How to look 'cool & fair'? Several 'sustainable fashion' magazines are available online: get inspired! [www.sustainablestyle.org]; [www.lucire.com]; [www.treehugger.com]; [www.springwise.com/fashion_beauty]

<p>Coopa-Roca - Rocinha Seamstress and Craftwork Co-operative Ltd (Coopa-Roca) uses cast-off fabrics to create cutting edge, award-winning garments and decorative products such as lamps, rugs, linen, sheets, etc. The initiative - in the largest favela in Brazil - started when Maria Teresa Leal encouraged a group of 5 women to manufacture products out of textile remnants. Coopa-Roca's work has been shown in exhibitions and</p>	<p><i>has been reported in both the Brazilian media and international press. The co-operative now comprises 150 craftswomen and a great portfolio of work produced in collaboration with some of Brazil's best-known fashion designers and artists. The aim of the co-operative is to enable women to work from home, contributing to the family's budget while looking after their children at the same time. [www.coopa-roca.org.br/en/index_en.html]</i></p>	<p>Indigenous Designs is a progressive wholesale clothing company with a mission to provide training, sustainable employment, and fair wages for local and mountain-dwelling weavers, knitters and textile artisans in the mountains of Peru and Ecuador. Indigenous Designs works with more than 200 knitting and hand-loomed co-op groups of local people. Indigenous Designs is revolutionising the clothing</p>	<p><i>market by establishing ecological sustainability as the measure of success. The company protects the environment by replacing toxic, non-sustainable synthetics with organic natural fibres and dyes, while following fair trade principles. [www.indigenoussdesigns.com]</i></p>
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iPod, cars, etc. These **status symbols** can be 'out' in a season and fashion victims be pushed to buy the latest models within **6 months**.

Consumers, especially the young, are often confronted with the seemingly **contradictory choice** of wanting to help people and the planet on the one hand and, on the other hand, having the hedonistic desire to buy the latest 'must-have' brands.

At a first glance, nothing seems to be more opposed to one another than fashion and **sustainable living**: the first one being the symbol of superficiality, resources wastage, etc. and the second is strongly related to complex (and often 'unfashionable') issues like 'simple living', preferring long-lasting goods, etc. But forgetting our prejudices, we discover that a strong link between fashion and sustainability is possible and helpful for both, making fashion a bit **less superficial** and sustainability a little **more seductive**.

Sustainable fashion corresponds to a modern, **holistic** and **ethical** way of thinking. Sustainable goods can be as **cool, competitive** and **appealing** as the other goods. According to several surveys, more and more consumers appreciate this conscious approach, especially when purchasing high quality goods.

THE CLOTHING INDUSTRY/PEOPLE

Whatever you wear **your clothes** link you to the people who made them (wherever they live: close to you or far away).

The clothing industry is concentrated outside of Western Europe and North America. **Garment workers** often have to work under poor conditions with a low standard of health and safety. **90%** of garment workers are women, working in factories, **sweatshops** or as home-workers. Many are teenagers and some are even younger. Their wages are often below minimum survival levels. Their working hours are long and often they have to work overtime and are refused the right to organise or join unions.

Coalitions of NGO's, designers and trade unions like the **Clean Clothes**

[www.cleanclothes.org/codes/intro.htm]

See also:

[www.sweatshopwatch.org];
[www.corpwatch.org]

Corporate Code of Conduct - Unlike labour law, corporate codes of conduct do not have any authorised definition. The concept 'corporate code of conduct' refers to companies' policy statements that define ethical standards for their conduct. There is a great variance in the ways these statements are drafted.

Corporate codes of conduct are completely voluntary. They can take a number

of formats and address any issue - workplace issues and workers' rights being just one possible category. Also, their implementation depends totally on the company concerned.

Fundamentally, a code of conduct depends on its credibility: the extent to which it is taken seriously by industry, unions, consumers and governments. Credibility, in turn, depends on monitoring, enforcement

and transparency: the extent to which foreign contractors and subcontractors, workers, the public, nongovernmental organisations and governments are aware of the code's existence and meaning.

A code can be made transparent through its posting and dissemination and through training regarding its provisions. Monitoring can be internal (e.g. through a committee,

ombudsman, regular reporting obligations, field visits, or hot lines) or external (e.g. through an NGO, outside auditor, or consultant.

[www.itcilo.org/actrav/actrav-english/telearn/global/ilo/code/main.htm#The%20Concept]

Campaign (CCC) seek to improve these conditions as much as possible to improve these conditions as much as possible by organising campaigns and other awareness-raising events, which draw the attention of both the media and the general public to the workers' conditions.

Thanks to these initiatives, many **consumers** have become aware of the problems that exist along the production chain. **Workers** in the production sector have also started defending their own interests. Unfortunately, real improvements in the working conditions of garment and sportswear supply chains have increasingly been limited to **safety & health** conditions in the first tier of suppliers.

International networks have been established amongst stakeholders with to carry through further improvements. More and more organisations believe that **codes of labour conduct** can only make an effective and credible contribution to the working conditions if their implementation involves a broad range of stakeholders, including governments, trade unions, and employers' associations.

Many **indigenous workers** in developing countries have gotten together to form co-ops to grow and manufacture their goods and products.

And what about **companies**? Corporate Social Responsibility (CSR) has become a slogan entering the global debate. As companies have started to become more powerful worldwide, it is generally recognised that they have a **social responsibility** and that rules and regulations should be issued. Consumers now believe that companies should take responsibility for the labour conditions of their suppliers and for the environmental impacts of production all along the production chain, and put that policy on paper, usually in the form of a *Code of conduct*.

THE CLOTHING INDUSTRY/ENVIRONMENT

The textile industry is shared between **natural fibres** such as wool, silk, linen, cotton and hemp, and man-made ones, the most common of which are **synthetic fibres** made from petrochemicals.



Synthetic fibres are made of polymers that do not occur naturally but instead are produced entirely in the chemical plant or laboratory, almost always from by-products of petroleum or natural gas. These polymers include nylon and polyethylene terephthalate, but they also include many other compounds such as acrylics, polyurethanes, and polypropylene. Synthetic fibres can be mass-produced to almost any set of required properties. Millions of tons are produced every year (in 2004, global production reached 34.6 million tons, up 8.9% compared to 2003). Source: [http://concise.britannica.com/ebc/article-9108501/man-made-fibre] and [www.marketresearch.com]

The Joint Initiative (Jo-In) - Codes of labour conduct have become increasingly important in the last few years. A few orgs have committed themselves to verify that companies are implementing codes correctly. Other orgs support companies to implement codes more effectively. Six organisations have jointly started a project called the Joint Initiative on Corporate Accountability and Workers' Rights. The participants are: Ethical

Trading Initiative (ETI), London, UK; Fair Wear Foundation (FWF), Amsterdam, NL; Clean Clothes Campaign (CCC), Amsterdam, NL; Fair Labor Association (FLA), Washington DC, USA; Worker Rights Consortium (WRC), Washington DC, USA; Social Accountability International (SAI), New York, USA. Together, they undertook a project to verify codes of conduct and to improve labour conditions in garment

companies in Turkey. The project ran from May 2004 until approximately May 2007. The results of the project will determine the 'best practices' in implementation of the code of conduct and carrying out improvements. The results will be published and a worldwide guideline for effective implementation of codes of conduct will be available.

[www.jo-in.org]


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Dep't store: need to know more on responsible companies and things produced ethically?

Have a look at the 'Taking care' section (clothes & accessories, health & beauty) of our virtual store...

According to the Pesticide Action Network, cotton accounts for 22% of all insecticides used - about US\$2.5 billion worth worldwide each year. [www.pan-international.org]

Simon Ferrigno, Organic Cotton Fiber Report - Spring 2006, Organic Exchange, Oakland, April 2006. [www.organicexchange.org]

When Patagonia, the US outdoor garment maker based in Ventura, California, commissioned a study of the environmental impact of its raw materials in the early 1990's, it assumed that oil-based synthetics like polyester and nylon would cause the most harm to people and the environment. The company said it was shocked to find that cotton was worse. In 1994, Patagonia decided to convert its entire cotton line to organic - and did so in just 18 months. Source: [www.laborrights.org/projects/conference/ecopolitics.htm]

Most of the clothes in our wardrobes contain polyester, elastane or lycra. These cheap and easy-care fibres are becoming the textile industry's miracle solution. However, their manufacture creates pollution and they are hard to recycle (nylon takes 30 to 40 years to decompose).

'Natural' fibres such as cotton are not 'clean' either: although cotton accounts for less than 3% of the world's farmed land, it consumes almost a quarter of insecticides and 10% of herbicides.

The new eco-friendly fabrics are made with materials that are claimed to cause less harm to the environment, like organic cotton and wool produced without synthetic chemicals and pesticides, or hardy, fast-growing plants like bamboo and hemp that are produced with relatively little pesticides and fertilisers.

The number of brands using organic cotton is growing worldwide. As a consequence, between 2001 and 2005, the annual global sales of organic cotton grew by 35% - and 55% in the United States alone. Despite this, certified



T-shirt: simple, not innocent cloth - The world of fashion may be stylish, glamorous and exciting, but have you ever thought about its wider impact? From an environmental point of view, the clothes we wear and the textiles they are made from can cause a great deal of damage.

Cotton, for instance, is one of the most widely produced agricultural goods worldwide, providing

almost 50% of the global textile needs. It is commonly thought of as being a 'natural' and therefore eco-friendly choice.

Yet the simple act of growing and harvesting 1 pound of cotton fiber (needed to produce a T-shirt) takes an enormous toll on air, water, and soil, not to mention the health of people in cotton growing areas. The cotton grown for just one T-shirt requires

1/3 pound of agricultural chemicals.

The problems with clothing production do not stop in the field. During the conversion of conventional cotton into clothing, numerous toxic chemicals are added at each stage - silicone waxes, harsh petroleum scours, softeners, heavy metals, flame and soil retardants, ammonia, and formaldehyde - to name just a few. The pesticides

that farmers use to protect textiles as they grow can provoke a huge biodiversity loss, harming wildlife, contaminating other products and getting into our food. The chemicals that are used to colour textiles can damage our environment and health.

Old clothes that we throw away take up precious space in landfill sites, which are filling up rapidly. Most of these clothes could easily be recycled or reused.

organic cotton currently represents only an estimated 1% of the cotton grown in the world.

In the same way that we can farm organic livestock for food, we can also produce **organic wool**. Given the pesticides used in sheep production which put at risk both human health and the environment, it's not surprising that the demand for organic wool, which reduces the overall exposure to **toxic chemicals** from synthetic pesticides, is increasing.

There are also other new materials like **biopolymers** made from corn and soy... Another is *Ingeo* by Cargill-Dow, a natural synthetic fibre made by distilling sugar from plant starches such as corn. It made its high-fashion debut thanks to the Italian jeans designer Diesel, and Versace Sport.

Unfortunately, there are many **obstacles** to eco-friendly garments. Supply, for example, has been difficult. In many cases, companies had to develop sources from scratch. **Price** is another issue. Generally organic cotton costs more to

In 2005, M+R Strategic Services undertook a survey for the Organic Trade Association concerning organic wool production and markets in the United States and Canada. Responses to the survey indicated that 19,152 pounds (8,705 kilos) of organic wool were grown in the United States and Canada in 2005. [www.ota.com/organic/woolfactsheet.html]

Biopolymers are polymers produced by biotechnological processes. The basic products are mostly but not necessarily natural products (agricultural crops, bio-waste...). Biopolymers do not necessarily differ from conventional polymers produced by petrochemical processes. And finally, not all biopolymers are biodegradable or may be composted. [www.centexbel.be/Eng/i-box_archives.htm]



Öko-Tex certification network - The Öko-Tex Standard 100 was introduced in 1992 with the aim of offering consumers the maximum possible confidence in terms of health and safety when buying textile products, as well as reminding companies in the textile chain around the world of the need to deal responsibly with possible problem substances.

All textile products of the entire textile chain may

be certified: fibre, yarn, fabric, accessory, clothing... producers as well as textile finishers may apply.

More than 4.200 companies worldwide active in textiles and clothing are involved in the Öko-Tex certification network. With over 20.000 certificates granted to millions of textile products, Öko-Tex standard 100 has become the world's leading eco label for textiles. Products carrying this label have been tested and

certified by internationally renowned textile institutes (Centexbel). All testing institutes use the same set of test procedures and specifications ensuring worldwide uniformity. These specifications are defined according to the current state of knowledge, and are generally more rigorous than national regulations. *ade and Ecology Fashion.*

[www.oeko-tex.com]

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Get inspired to orient your choice in the working world...

The **Career compass** section displays a selection of companies and organisations relevant to the issues treated in this chapter :
[CSR - Europe] - [fiber futures] - [love the earth] - [eblood clothing] - [anti pesticides network] - [fairlabor] - [ad!dict] - [reciclar t3] - [Teruo Masaki on CSR].

Learn more about your power as a consumer with Katharine Hamnett. A pioneer in fashion activism, she launched her first protest T-shirts in 1983 emblazoned with slogans like 'Choose life', 'Preserve the rainforest' and 'Save the world'. [www.katarinahamnett.com]



grow than conventional cotton, but the difference in price depends on variables like quality and location.

The textile and clothing industry is a diverse one, in the raw materials it uses and in the techniques it employs. At each of the six stages typically required to make a garment, the negative impacts on the environment are numerous and varied. Spinning, weaving and industrial manufacture undermine **air quality**. Dyeing and printing use vast amounts of water and **chemicals**, releasing **volatile agents** into the atmosphere that are particularly harmful to our health.



Stepping-stones

You decide how to spend your money. Use your purchase power to send a clear, strong message to stylists, manufacturers, and retailers:

- ☞ **Think** before you buy. Think about what you really need and want: do not purchase your clothes and accessories just because 'everybody else has it!', or are pushed by an aggressive marketing campaign: buy **fewer** and more **durable** clothes.
- ☞ **Mend** clothes where it's possible to make them last longer.
- ☞ Read the labels: if they don't give you enough **clear information**, don't be afraid to ask.
- ☞ Choose goods made/distributed by manufacturers and retailers with clear environmental and ethical policies and related **codes of conduct**.
- ☞ Prefer **eco-labelled** and **ethical-labelled** products and services. Avoid products/services that use **misleading claims**.
- ☞ Choose products containing significant percentages of **recycled** materials or **re-manufactured** components or which are easily **disposable** and/or **recyclable**. **Recycle** your unwanted clothes.
- ☞ Keep your favourite brands under continuous **scrutiny**; contact your local consumer group to find out more about them. Join web campaigns to improve manufacturing employment practices.
- ☞ **Buy directly** from the producer: if you have access to the Internet, shop 'virtually' whenever possible and cut down the distribution chain. By doing so you'll contribute to reducing transport-linked pollution while benefiting local small producers.



Do you want to look into workers conditions in the textile and garment industry in developing as well as developed countries?

*Have a look at the **Test & play** section of the website; try **[behind fashion]**, our true-or-false quiz and see what you*

could concretely do to stop sweat logos...

*Don't forget to use the **Links** section: check the **[fashion & beauty]** and **[creative lab]** directories to save time carrying out your research projects.*

Eco-labels (among those recognised by governments)

1. Blue Angel (Germany)
2. European Union Ecolabel
3. Green Seal (USA)
4. Terra Choice (Canada)
5. China Environmental Labelling
6. Japan
7. Nordic White Swan
8. Austria
9. Taiwan
10. India
11. Israel
12. Milieukeur (The Netherlands)
13. Environment 2000 (Zimbabwe)
14. South Korea
15. Aenor (Spain)
16. Green Label Thailand
17. Green Label (Hong Kong)



information on the ecological and ethical characteristics of a product, but be careful!

For more information, check out the EU Commission's web page: [<http://europa.eu.int/comm/environment/ecolabel/index.htm>]

Only a few labels are officially recognised by governments and respond to strict and auditable criteria. Among the best known are the European Union's **Ecolabel Flower**, the German **Blue Angel**, the **Nordic Swan**, and the French **AB** (organic agriculture).

[www.energystar.gov]

In the USA, the **Energy Star** system is used to inform consumers on the energy efficiency of ITC. This system is currently being adopted by the EU.

Information and Communication Technologies.

Corporations and governments are being subjected to **increasing scrutiny** by the general public. The more people ask companies to change towards sustainability in their production and marketing methods, the more likely they

Let's exchange! - *The rich get richer, the poor get poorer... So it goes, but recent, noteworthy examples of reactive consumer behaviour all over the world testify that the power of money can be overcome, thanks to very special community-based initiatives.*

The Local Exchange Trading System (LETS) is a significant expression of non-monetary exchange among people. It is based

on mutual aid, for which the means of exchange is not money but rather takes root in the concept of barter of goods and/or services.

It is an increasingly widespread approach throughout the world and many countries are adapting the same concept according to their own culture and local needs. Some LETS organisations around the world: Ithaca Hours (USA), Banca del

Tempo (Italy), Community Exchange Systems (in Nigeria, Senegal, South Africa, Kenya, and Cameroon). Check the following links:

[www.ithacahours.org]; [www.comune.fe.it/banca_deltampo]; [www.appropriate-economics.org/africa/africa.htm]



Stepping-stones

You decide how to spend your money. Choose eco-friendly and more sustainable brands and send a strong message to supermarkets and retailers. A few pointers:

- ☞ **Think** before you buy. Think about what you need, not what you want.
- ☞ Read the **labels**: if they don't give you enough clear information, don't be afraid to ask.
- ☞ Select **eco-labelled** and **ethical-labelled** products and services.
- ☞ When possible, buy **locally produced and seasonal** goods.
- ☞ Choose products containing significant percentages of **recycled** materials or **re-manufactured** components or that are easily **disposable** and/or **recyclable**.
- ☞ **Buy direct**. If you have access to the Internet, shop 'virtually' whenever possible and cut down on transport and transport-linked pollution. If used intelligently, the Internet can contribute to more sustainable consumption.

UNEP-Tunza initiative - 'Tunza' means "to treat with care and affection" in Kiswahili (or Swahili, a language of Eastern Africa). UNEP's Tunza initiative encourages children and young people to care for the environment by raising awareness and promoting positive action. The Tunza Youth Network is a global database of youth organisations and young activists who are working together towards environmental development worldwide. Tunza representatives from all over the world raise the profile of environmental issues at local levels, share their experiences, exchange information, and give feedback to UNEP. Look at their magazine and web page within the UNEP portal: [www.unep.org/tunza]

are to change. If producers want to keep **consumers' trust** they have to demonstrate that they are listening to their needs and concerns.

It's time for citizens to take action! The number of initiatives from civil society increase a lot.

COMMITTED INVESTMENTS

In planning for the future, we can take steps to ensure that **investment or saving** choices promote more responsible lifestyles. If enough people do it, they can also send strong signals to companies and institutions encouraging active **corporate responsibility**. Companies with responsible policies can lead by

For further information on ethical finance, as well on companies that are committed to socially and environmentally responsible activities: [www.cool-companies.org]; [www.co-operativebank.co.uk/ethics.html]; [www.ethicalconsumer.org]; [www.novethic.fr/novethic/site/index.jsp].

Creative communities - The Sustainable Everyday Project (SEP) proposes an open web platform to stimulate discussion on possible sustainable futures...

Adopting a design perspective, the SEP website presents several case studies and 'creative communities', where individuals and groups use existing resources in a creative, original way to bring about system

innovation. The cases and the people are not only interesting because they are innovative, they are also aesthetically 'beautiful': there is something in the way they appear that evokes positive emotions and recalls the straightforward aesthetics of the useful.

They are beautiful because they are colourful, creative in an authentic and surprising way and they express vitality and spirit

of initiative. And they are also 'good': they propose solutions in which individual interests converge with those of society and the environment, creating conditions for a more satisfying use of resources. Because this restores meaning and value to everyday activities they look promising as a transition towards sustainability.

[www.sustainable-everyday.net]

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Volunteers play an especially important role not only in maintaining the non-profit sector's advocacy functions, but also in helping it maintain its long-standing commitment to social justice and development...

Need to know more? Go to the **Facts & figures** section and click [volunteering].

example: others will follow, having seen that it is possible both to make money and to make a difference.

A large and growing segment of the public - both individual and institutional - is investing ethically. These people demand that investments produce **more than profit** and want companies to behave responsibly. There are many forms of sustainable investment. Buying shares in committed firms is one; others include investing in ethical **pension funds, securities and community initiatives**.

Microcredit programmes extend small loans to very poor people for self-employment projects that generate income, allowing them to care for themselves and their families. Source: MICROCREDIT SUMMIT [www.gdrc.org/icm]

Ethical funds also offer the opportunity to address both **global and local needs**. Channelling essential capital to the village level creates **microcredit** and small business opportunities for entrepreneurs around the globe. Such schemes empower people facing economic and social difficulties.

Governments can also take the lead in ethical investing through their multilateral and international financing and investment decisions. Efforts are being made at an international level, for example, to promote **renewable energy** by increasing funding through the reform of IFIs and ECAs. THE G8 RENEWABLE ENERGY TASK FORCE, set up at the G8 Summit in Okinawa (July 2000), formulated key actions in this area.



Empowering Women at Risk

- Pact's WORTH program is giving poor women in communities around the world the opportunity to increase their self-confidence and expand their capacity to change their lives.

WORTH, currently being implemented in eight countries (Cambodia, Dem. Rep. of Congo, Ethiopia, Kenya, Nepal, Tanzania, Uganda and Zambia), consists of a sequence of

activities that enables women to improve their lives through financial and educational means: women come together in groups of 15-20 to save and borrow, take part in entrepreneurial training, and discuss strategies to improve their health and well-being.

The WORTH approach differs from typical microfinance programmes in that it provides no seed money and the women

themselves become bankers and lenders of funds that they own and manage. This grassroots approach allows the program to take root in regions that microfinance institutions may not be able to reach.

In three years, the Nepal WORTH program helped 125,000 women attain literacy, while savings increased among the groups by over US\$1 million, and their net

annual income increased from \$1.2 million to over \$10 million. The women also participated in numerous grassroots campaigns addressing issues such as human trafficking, domestic violence, property rights, and women's education.

[www.pactworld.org]

International Financial Institutions (IFIs) and, among these, Export Credit Agencies (ECAs) are national government instruments that use public money to provide financing, guarantees and insurance to the private sector. They make it easier for companies to invest in risky overseas markets because they absorb much of the risk associated with such investments. ECAs are designed to promote exports.

ECAs are now the world's biggest group of public International Financial Institutions, collectively exceeding the World Bank Group in size.

What should the **ethical investor** look out for when deciding where to put his/her money? Here are some pointers:

- ▶ What does the company do?
- ▶ What is the company's record on **social** policies and **environmental** issues? Does it use alternative energy?
- ▶ Does it offer **information** on the environmental impact of its product 'from cradle to grave'?
- ▶ What is the company's record as an **employer**? (women, minorities, flexible hours, job-shares, etc.)
- ▶ Is the company involved in local **community projects** and initiatives?



Banking for the poor - The Bangladeshi Grameen Bank Microcredit Programme started as a challenge to conventional banking, which rejected the poor by classifying them as 'not creditworthy'.

The Grameen credit philosophy was that the poor have skills, which remain unused or under-used. The credit is based on the voluntary formation of groups of five people who provide mutual,

morally binding group guarantees in place of the security required by conventional banks.

Currently 95% of loans are repaid thanks to group pressure and self-interest, as well as the motivation of borrowers. Loans are small, but sufficient to finance the micro-enterprises undertaken by borrowers: rice-husking, machine repairing, purchase of rickshaws, etc. The assumption is that if

individual borrowers are given access to credit, they will be able to identify and engage in viable income-generating activities.

[www.grameen-info.org/bank/moa.html]

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In the **Career compass** section see [volunteering online] - [planet finance] - [Marie Tamoifo Nkom] - [Chris Martin].

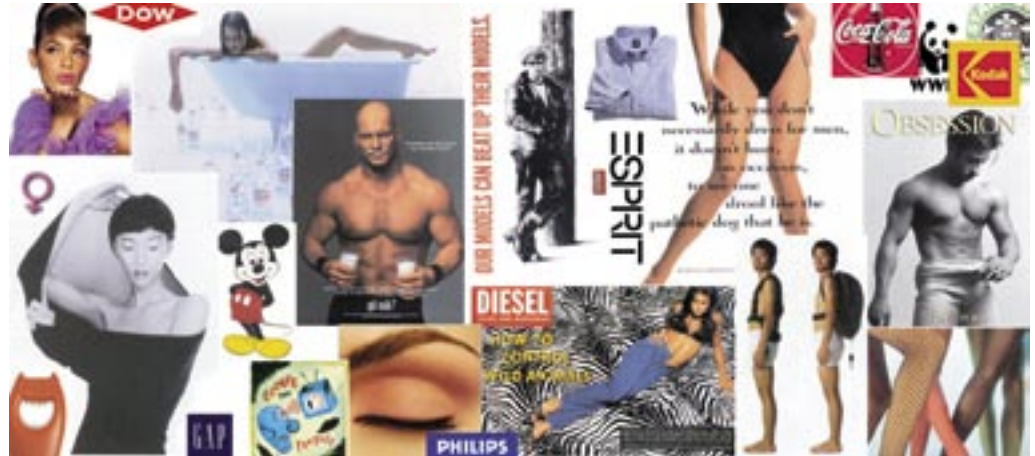
Are you still not sure about the importance of eco/ethical labels? Go to the **Trainer's room** and get some answers: [reading food labels] - [cruelty-free labels] - [reading textile labels].

In the **Test & play** section try [roll up your sleeves] and [fair trade].

Discover the global village

"Let the villages of the future live in our imagination, so that we might one day, come to live in them."

[Mahatma Gandhi]



Young people today often live in a media-rich environment, experiencing an **unprecedented flood** of images and data from many different sources. They are inundated with information on politics and current affairs, music, science, the 'hottest' new celebrities, fashion, and a myriad of other topics and issues.

Children are growing up in a culture where most of their **information and entertainment** comes from the media: newspapers, radio, magazines, film, the Internet, or television.

How do these media work? How are they organised, and how do they construct reality? Media literacy helps people develop a **critical understanding** of the mass media, the techniques used by media professionals, and their impact. In other words, it enables young people to make their own informed decisions.

Moreover, **media literacy** can help prepare young people to react to the influence media exerts on their values, consumption patterns and desires. It also teaches them how to 'use' the media to 'make a noise' and promote their own values and a more sustainable lifestyle - in other words - their **rights** as citizens and consumers.

In the USA, only 10% of children's viewing time is spent watching children's television. The other 90% is spent watching programs designed for adults. 35% of teenagers have a TV in their room and eat their meals alone in front of the screen.

Source: US National Association for the Education of Young Children; L'Espresso, 27 September 2001, p. 104.

US kids: media exposure

- A 2005 Kaiser Family Foundation study found that US children between the ages of 8 and 18 years old are exposed to about 8.33 hours of media each day, up by more than an hour over the past five years. The extra time is taken up by 'new media' such as computers, the Internet and video games. This study focused on non-school activities, so school work was not included in the measurement.

[www.kff.org]

According to the American Academy of Paediatrics, US children over the age of 2 watch about 4 hours of television every day and the average child sees more than 40,000 commercials each year.

Source: [https://drum.umd.edu/dspace/bitstream/1903/3120/1/umi-umd-2935.pdf]

US teens: spending power

- Teenage Research Unlimited (TRU), the nation's premier market-research firm focusing on the youth market, estimates that teenagers aged 12 to 19 spent \$169 billion in 2004, about \$91 per week. These teenagers, using their own money plus the cash they receive as gifts, allowance and other spending money from parents, purchase a wide range of goods, including food, shoes, clothing and the latest gadgets, such as

CD burners, MP3 players and mobile phones. The US market for teen and tween grooming products forecast the sale of youth hair care, cosmetics, skincare, and ethnic items to hit \$8 billion by 2008.

Source: [https://drum.umd.edu/dspace/bitstream/1903/3120/1/umi-umd-2935.pdf]

ADVERTISING

Gigantic billboards, TV commercials, magazines... There seems to be no way to escape advertising as it spreads to the four corners of the globe. Advertising messages are said to have a significant **influence** over people and to push to over-consumption. What mechanisms do these messages unlock? And is all advertising bad?

Some advertisements specifically target **young people**. They use language, images and messages that strike a chord with teenagers, but which might not have the same appeal to their parents (e.g. ads for video-games, snack food or music). Teenagers, in fact, are **important targets** because in a very competitive market companies need to build brand loyalty from an early age.

Often, advertising delivers simplified messages using **stereotypes**. So, for instance, advertising campaigns 'speak' to girls differently than to boys. A stereotype rigidly confirms the belief that if you are male or female (or white or black; heterosexual or homosexual), you must conform to **specific roles** and have specific characteristics and features.

— They want people to start using their products when they are young and continue using them for the rest of their lives.



UNEP has worked with the advertising sector to channel their skills to promote more sustainable lifestyles. For further information: [www.unep.fr/pc/sustain/advertising/advertising.htm]

ACT - Advertising Community Together - is a non-profit initiative. Its goal is to federate, promote and inspire responsible communication on sustainability, equitable development and social responsibility. ACT shows how advertising professionals from all continents can use their core talent - creativity - to play a significant role in addressing today's crucial world issues. In partnership with UNEP, ACT has

organised an exhibition of ads - "Taking Care of our Future". The exhibition was first held during the Cannes Advertising Festival and then started to travel around the world.

[www.adforum.com/spcialevents/ACT/ACT6/tc.asp]

The Body Shop began campaigning on self-esteem in 1995 and still does. In 1997 it launched a campaign based on 'Ruby', a real doll representing real women; the slogan was: "There are three billion women in the world who don't look like supermodels and only eight who do". The Body Shop challenged the unrealistic beauty ideal presented by the beauty industry and used language and images that showed respect and real reverence for women. [www.thebodyshop.com]

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You can find media-related case studies in several thematic rooms: in 'Carrying the torch' see [make your voice heard] - [mondialogo]; in 'Awakening your soul' - [advertisers anonymous] - [poetic attack]; in 'Clean up your fun' - [sustainable broadcasts] - [sust. living festival] - [eco-manga]; in 'Looking ahead' - [ICT in Afghanistan] - [simpuler].

By accepting this we risk giving up our right to make personal choices. We don't have to sit back and accept all the messages the media (especially advertising) feed us. We can **'talk back'** and voice our opinions.

In 1999 Calvin Klein ads were withdrawn because consumers complained they sexualised children. Camel cigarettes had to stop using the 'Joe Camel' character in advertisements thanks to consumer complaints that it targeted kids. Source: [www.media-awareness.ca]

However, advertising is not only pushing people to buy more. Various organisations increasingly use advertising techniques to capture consumers' attention on issues of public interest such as environmental or social causes. In particular, they tend to encourage more sustainable consumption patterns. Advertising towards sustainability means more than advertising eco-products. It means communicating **lifestyle changes** that are desirable to people and responding to their search for greater significance, transparency and ethics.

TELEVISION

Cultural and class stereotypes are also widespread on television. Often minorities are portrayed stereotypically and are undervalued compared with the dominant group. Furthermore, TV programmes are regularly seen by a **large audience** that is well beyond the target group.

For instance, children and youth have easy access to programmes containing violence, sex, social trauma, etc. but they do not have the **emotional maturity** or critical capacity to cope with them. An adult can analyse, children tend to absorb. According to several studies, children who watch a large amount of **violent programmes** tend to favour using aggression to resolve conflicts.

But television is not always a negative influence. A **positive** aspect of TV viewing is the opportunity to see different lifestyles and cultures. Children today are entering school more knowledgeable than children before the TV era. Moreover, there is some evidence that children's shows that are developed to teach academic and social skills can help children **learn** effectively. In addition, TV has great **entertainment** value.

On-screen violence may shock, but other more subtle messages can also have a **life-long influence** on young people. If repeated incessantly, they often change lifestyles, such as by encouraging over-consumption or promoting **eating disorders**.



Advertising: a global biz

The global advertising business will hit US\$451 billion (€\$338.7 billion) in 2007 with a growth rate of 5.2%. The United States dominates, accounting for almost 50% of the world's total advertising expenditure.

It's anticipated that in the next few years Asia will overtake Western Europe as the second largest advertising region, driven by growth in Japan and

China. The American ad market in 2004 was worth US\$154 billion and was bigger than the 18 next highest ad spending countries combined - including Japan (US\$37.3 billion), the United Kingdom (US\$17.2 billion), Germany (US\$16.1 billion), China (US\$13.8 billion) and Australia (US\$6.4 billion) - ninth overall.

The advertising volumes of the US as a single market are impressive - TV is

worth US\$60 billion, radio US\$20 billion and the internet US\$10 billion.

Source: [www.interpublic.com/read_file.php?did=48]; [www.smh.com.au/news/Business/TVs-feather-duster-becomes-a-rooster/2005/02/09/110_789027009_1.html?one click=true]; [www.chamber.org.hk/hk/newsletters/news_template.asp?id=4697]

An Inconvenient Truth -

Former US Vice-President Al Gore has understood how media information can stir public opinion attention on causes of general interest. His documentary 'An Inconvenient Truth' based on numerous collaborations with experts, is easy to follow and yet accurate and has succeeded in making climate change more accessible to the general public.

[www.climatecrisis.net]



IDOLS & AUDIENCES

Actors, models and sport champions sometimes provide positive **role models**, reporting about their stand for a cause or participating in media acts as a **catalyst** in raising awareness and capturing the attention of the huge youth audience about a specific problem be it HIV/AIDS, world hunger or the environment.

Music – a universal language by definition - is probably the medium that has most consistently carried strong **social messages**. Examples? Events such as *Live Aid*, *Farm Aid*, *the Amnesty International Tour*, *Our Common Future*, *Greenpeace Album*, etc., just to mention a few. These events also shape the meaning of the audience’s participation. Enjoying a performance becomes a gesture of political or humanitarian solidarity.

Nowadays, young people feel comfortable with the media. There are thousands of websites run for and by teenagers. Their **commitment** to promoting often complex causes (e.g. human rights, environment) is proof of their ability not only to channel the media, but also their **talents** towards sustainable projects.


Idealist: volunteering online - Action Without Borders is a global network of individuals and organisations working to build a world where all people can live free and dignified lives.

It runs the Idealist.org website where you will find over 40,000 non-profit and community organisations in 165 countries, which you can search or browse by name, location or mission; thousands of volunteer opportunities in your community and around the world, and a list of organisations that can help you volunteer abroad. It is the best non-profit career centre on the web, with hundreds of job and internship listings.

[www.idealist.org]

Need to know more? Go to the Facts & figures section and look for [advertising & youth] - [internet / intro] - [internet & youth] - [music global market] - [media concentration] - [biz-concentration].

Get inspiration to guide your choice in the working world... The Career compass section displays a selection of organisations relevant to the issues treated in this chapter: [media diversity] - [media watch, Canada] - [indie music online] - [enviro film festival] - [sustainability-TV] - [altnet] -

 **WWW...**
youthxchange.net

[eco-entertainment] - [indymedia] - [inspiring responsibility].

Look at the Trainer's room section: here you'll find two classwork activities [decoding advertising] and [progress is progress], designed to help you to understand better - respectively - advertising mechanisms and science & technology innovations.

Pop stars for a better world

Celebrities have been playing dual roles, as entertainers and activists, for a long time. Celebrity involvement on global issues is not a new concept: the UNICEF Goodwill Ambassadors programme has been at this task for more than half a century. The programme was founded to harness entertainers to uplift children in need around the world. Movie star Audrey Hepburn was one of the first celebrities to embrace the cause.

However, these days it seems that nearly every celebrity has a cause or organisation they are affiliated with. Artists and actors have emerged as spokespersons for some of the most pressing problems of our time. Actress and campaigner Angelina Jolie is the goodwill ambassador for the UN High Commission for Refugees (UNHCR). Her humanitarian work has taken her to refugee camps in Russia, Africa, the Middle East and Asia.

Performers such as Bono and George Clooney represent the best elements of the cadre of celebrity over-achievers. They have attained incredible professional

success not only because of their remarkable talent in their profession but also as advocates for the fight against HIV/AIDS and Darfur respectively.

Over the last few years, Lorenzo Cherubini, the Italian artist better known as Jovanotti, has increased his political and social involvement and has become one of the main promoters of the campaign for the cancellation of the public debt owed by Third World countries.

Celebrities attract the attention of those who otherwise might skip the world news sections of the local paper/TV chain. As these otherwise uninvolved communities get inspired to take action, it might even be viewed as a healthy sign of democratisation. But some critics complain that celebrities are more interested in boosting their profile, than raising aid for the causes they're touting. Celebrities and other public figures should use their position in society to educate the masses but also to explain that these efforts need long-term thinking and innovative solutions.

The US arm of Green Cross International, Global Green, recently partnered

with Brad Pitt to launch a competition on sustainable design and green building strategies related to the New Orleans redevelopment effort. Global Green isn't new to celebrity engagement - it's the organisation of choice for stars like Edward Norton and Leonardo DiCaprio, one of the most active members of the green set in Hollywood.

Sources: Jonathan Greenblatt, "Kingdom Come: Striking the Balance between Celebrities and Causes", December 21, 2006 3:29 AM [www.worldchanging.com/archives/005505.html]; Crystal Park, "Celebrity Activism: Publicity Stunt or Sincere Care?", Washington, 21 February 2007 [www.voanews.com/english/2007-02-21-voa-38.cfm]; [www.italica.rai.it/eng/principal/topics/bio/jovanotti.htm].

Serious Fun - *Adbusters is a Canadian-based non-profit organisation that produces a magazine and a website dedicated to examining the relationship between "human beings and their physical and mental environment".*

Self-styled 'culture-jammers', they provide another perspective on life and our daily habits. Encouraging people to question the media, they point out obvious and hidden messages that are transmitted and often taken for granted. Through their parodies of famous ads as well as their own annual campaigns such as 'Buy Nothing Day' and 'TV Turn Off Week', they push people to rethink their priorities and lifestyles as well as raising awareness on a variety of issues (inequality, overconsumption, media manipulation, etc.). Although some people may not approve of their tactics, Adbusters is a lively and creative organisation, which has a particular talent: using the advertising industry's very own skills to question the media's role and influence. This is a clear example of the power of an active, networking group. [www.adbusters.org]. Adbusters is in different countries, for instance in France. [www.casseursdepub.org]

Eating habits & advertising

In the USA, an increasingly large number of people eat too much: 55% of the population is overweight, and 14% of children are obese. Their eating habits are shaped by what's available -in fast food restaurants, cafeterias, snack bars and... by advertising. Given the high exposure to media, many mass communication experts list mass media as equal in importance to other socialisation agents in the lives of US adolescents. Adolescents have

tremendous discretionary spending power and spend about US\$140 billion a year. About 15% of this spending is for fast food and snacks. Adolescents influence their parents' spending: they directly influence about US\$19.6 billion of grocery purchases each year. The US food marketing system is the second-largest advertiser in the economy (after the automobile industry) and a leading supporter of media networks: about US\$25 billion are spent annually on food and drink advertising.

[www.ijbnpa.org/content/1/1/3]

Europe is also at the crossroads on nutritional health. Obesity continues to escalate rapidly - a pandemic with major economic as well as health consequences that are increasing the burden of chronic non-communicable diseases throughout Europe. Health promotion schemes advocating improvements in diet and activity levels conducted over many years have had no tangible impact. In most of Europe

increasingly more of its citizens are overweight and up to one in three adults is clinically obese. The rise in overweight and obesity affecting children is highlighted dramatically in Italy - the worst in Europe - with a prevalence reaching 36% in some studies.

[www.iotf.org/media/euobesity2.pdf]

Our website

"The best way to predict the future... is to create it."

[Alan Kay, American computer scientist]





Networking: instructions for use

"Service to others is the rent
you pay for your room here on
earth."

[Muhammad Ali,
world boxing champion]

The official youthxchange site
is available in French
[www.youthxchange.net/fr].
Some youthxchange partners
also have their local version
of the site: go to
[www.youthxchange.org] if you
speak Korean and to
[www.jovenesporcambio.org] if
you are from Colombia.

The Internet is both a communication tool and a **gateway** to information. Although the global phenomenon of the Net is actually still limited, it is the medium of the future that best captures the capabilities and **talent** of young people today. The Internet is also a 'language' that a large and rising number of young people are fluent in.

This **tool kit** has been designed with both trainers and students in mind. While this guide represents a quick overview on the **topics** and **challenges** of SC, the **youthxchange** (YXC) website explores the issue more in depth.

Popular subjects (e.g. music, fashion, cinema, sports and new media) are used as springboards for discussions and play a key role in developing an easy-to-follow path throughout the website. YXC has an extremely innovative communication style. It describes to the reader **real-life** based stories and hundreds of **solutions** that show how a growing number of people and organisations are moving towards sustainability.

Like a constantly **moving puzzle**, case studies, products and service examples, youth initiatives, statistics and links are offered to teachers to build and rebuild **customised** teaching sessions.

Showing these experiences will have the added value of encouraging direct and active involvement in promoting **sustainable lifestyles**.





www.youthxchange.net, our website, is structured in the following way:

☞ THE THEMATIC ROOMS (*the colourful tabs*):

The YXC contents are organised in **9 thematic rooms** accessible from each page through a colourful horizontal navigation bar. The thematic rooms were conceived to start from young people's lifestyles and carefully avoid any 'top-down' approach. Over **130 case studies** - real stories of real people - are displayed here, helping teachers to introduce sustainable consumption in their class activities.

01_respecting our bodies - Respecting ourselves is the first step to respecting other people, the environment, and our planet. **Nutrition, health and beauty** are the three pillars of this room.

02_packaging yourself - Are we really choosing what we want to look like? What is the role of mass media in this process? The room deals with the different influences that may occur in building our own **image**, the hidden costs of garments in terms of social and environmental impact and suggests possible alternatives for 'looking nice being good'.

03_awakening your soul - Building your own **identity** is feeding your soul. How? Comparing different cultures, learning how to better **express yourself**, and re-thinking your real needs. This room also deals with **dangers** that can occur in this process: spiritual exploitation, fundamentalism, and hidden persuaders (advertising).



04_looking for a place - This room features the intersection of issues that are only seemingly different: **housing**, moving around/away, being forced elsewhere. The first topic is about creating your nest in the most eco-friendly, socially committed way; the second deals with the impact of **mobility** and **tourism**; the third focuses on **immigrants** and **refugees**.

05_carrying the torch - Here we mainly deal with (formal and informal) **education**, tackling illiteracy, traditional knowledge, inter-cultural and inter-generational **exchange**. This room also underlines access to information and suggests examples on how to use the **media** to make your voice heard.

06_clean up your fun - **Entertainment** and **leisure** activities (sport, music, theatre, cinema, comics, etc.) could be excellent means raising citizenship awareness enhancing solidarity and social inclusion. Here you will find examples of how to have more fun and be sustainable: no-waste parties, zero emissions venues, etc.

07_social belonging - The core concepts of this room are those of 'citizenship' and 'participation' in community life. Here you will find cases concerning social and political rights (e.g. access to jobs, social protection, gender mainstreaming, **peace** and **justice**) as well as examples of innovative community models.

08_pay the right price - The room focuses on the environmental, social and economic **costs** of our production and consumption patterns. It is also about the consumer's rights. The 'financing sustainability' section gives examples on how **money** could become fair.

09_looking ahead - Learning about microchips to heat our clothes in winter or the link between access to **energy** and poverty, showing how simple alternatives can make a big change! This thematic room emphasises the role of **innovation** and **creativity** in moving towards a better world.

DROP DOWN MENUS: to help you going deeper in the issues presented in the thematic rooms, look for more facts to support your lessons or your studies, to allow you to send us more case studies in your region, or understand how the



youthxchange project works at global level and for many other reasons, you have three drop down menus.

👉 UTILITIES (drop down menu):

facts & figures: over **500 pages** of data on economics, environmental and social issues. A **statistical overview** in 4 sections: General Data, Environment, Basic Needs, Other Needs.

dep't store: straight information about 150 'sustainable' **products & services** available in the marketplace that help consumers to switch to more sustainable lifestyles.

career compass: **spotlights** about interesting organisations; **interviews** with people who have chosen to make sustainability their profession; and **cool contacts** helping YXC users to use information to transform their professional lives.

trainer's room: introduction to YXC, how to use the web site and **classwork** activities to stimulate participation.

test & play: tests, **games**, and curiosities to raise awareness having fun.

links: short-paths to the best available **online resources**, organised by issue.

👉 PARTICIPATE (drop down menu):

This section allows you to add content to the web-site, download YXC related goodies (the multiple language versions of the guide or the video); send a YXC e-card, get the YXC bulletin and mostly important to **send your comments** and remarks on the site to UNEP and UNESCO.

👉 YXC WORLDWIDE (drop down menu):

The YXC guide is available in over **15 languages**. Partners of the YXC projects are everywhere and you can link to them to have guides in your language, organise training sessions on sustainable lifestyles or to know more about the project in your country. This sections opens up to the YXC network everywhere you are.



Sources

Websites, books, etc. mentioned in the Guide.

Introducing SC

- ▶ Brundtland Gro Harlem et al., *Brundtland Report. Our Common Future*, WCED, New York-Oxford, Oxford University Press, 1987
- ▶ UNEP, *Youth and Sustainable Consumption*, Nairobi/Paris, October 1999
- ▶ Weizsäcker Ernst von, Amory B. Lovins and L. Hunter Lovins. *Factor Four: Doubling Wealth, Halving Resource Use*, Earthscan Publication, UK, 1998
- ▶ www.factor10-institute.org
- ▶ www.unep.fr/pc/sustain/10year/SCP_Resource_Kit.htm
- ▶ *Teaching and Learning for a sustainable future - a multimedia professional development programme*, UNESCO 2005 - www.unesco.org/education/tlfs

The YXC project

- ▶ www.unep.fr/pc/sustain/youth/research-project.htm
- ▶ www.unesco.org/youth_survey
- United Nations - Population Division: <http://esa.un.org/unpp/index.asp?panel=2>

UN Education Decade

- ▶ www.unesco.org/education/desd
- ▶ www.unesco.org/ccivs/New-SiteCCSVI/CcivsOther/esd/esd-presentation.htm

Switching to sustainable lifestyles

- ▶ www.footprintnetwork.org <http://ecofoot.org>
- ▶ *Living Planet Report 2006*: www.panda.org/news_facts/publications/living_planet_report/index.cfm
- ▶ *Putting priorities into perspective*: see table p.82-83
- ▶ www.wfp.org/aboutwfp/introduction/hunger_what.asp?section=1&sub_section=1
- ▶ "More than 30% of our food is thrown away" by John Vidal, environment editor, *The Guardian*, Friday April 15, 2005 [<http://>

[/society.guardian.co.uk/environment/news/0,14129,1460299,00.html](http://society.guardian.co.uk/environment/news/0,14129,1460299,00.html)]

▶ www.globalfoodbanking.org

Take care

- ▶ www.foodbiotech.org
- ▶ www.cafarmersmarkets.com
- ▶ www.greentrade.net
- ▶ www.lfm.org.uk
- ▶ www.cantierisola.org
- ▶ www.ferryplazafarmersmarket.com
- ▶ www.nutrar.com
- ▶ www.consumersinternational.org
- ▶ www.sustainweb.org/chain_fm_index.asp
- ▶ www.hacsg.org.uk
- ▶ www.chem.unep.ch
- ▶ www.pan-international.org
- ▶ www.pesticide.org
- ▶ www.who.int/topics/pesticides/en
- ▶ <http://glossary.eea.europa.eu/EEAGlossary>
- ▶ www.pmac.net
- ▶ <http://ianrpubs.unl.edu/pesticides>
- ▶ www.who.int/topics/air_pollution_indoor/en/index.html
- ▶ www.epa.gov/iaq/pubs/hpguide.html
- ▶ www.epa.gov/iaq/index.html
- ▶ www.arb.ca.gov/research/asthma/asthma.htm

Getting around

- ▶ www.wbcsmobility.org
- ▶ http://europa.eu.int/eur-lex/en/com/cnc/2004/com2004_0060en01.pdf
- ▶ www.uitp.com/Project/pics/susdev/BrochureUK.pdf
- ▶ World Bank, *Development Indicators 2005* [<http://devdata.worldbank.org/wdi2005/Cover.htm>]
- ▶ www.wbcd.org/web/publications/mobility/overview.pdf
- ▶ www.transport2000.org.uk/factsandfigures/Facts.asp
- ▶ www.unep.org/GEO/geo3/english/376.htm
- ▶ <http://observer.guardian.co.uk/carbontrust/story/0,16099,1511925,00.html>
- ▶ www.worldcarfree.net/resources/stats.php #onecar
- ▶ www.business-standard.com
- ▶ www.oica.net/htdocs/Main.htm
- ▶ www.walkingbus.org
- ▶ www.stattauto.de
- ▶ www.carsharing.net
- ▶ www.agenda21.bremen.de/carfree
- ▶ www.toshare.org
- ▶ www.eltis.org
- ▶ www.pewclimate.org
- ▶ www.iea.org
- ▶ Clayton Caroline, *Dirty Planet: the Friends of the Earth Guide to pollution and what you can do about it*, London, Livewire Books, 2000

▶ www.greener-driving.net/site/home.html

▶ UNEP, Transport Initiative: www.unep.fr/en/info/videos.htm

Getting away

- ▶ www.unep.fr/tourism
- ▶ www.world-tourism.org
- ▶ www.wttc.org
- ▶ www.ecotourism.org
- ▶ www.tourismconcern.org.uk
- ▶ www.survival-international.org
- ▶ www.farfrontiers.com/about-us/166/the-himalayan-tourist-code
- ▶ www.eed.de/fix/ten-tourism
- ▶ www.tourisminsight.com
- ▶ www.green-travel.org
- ▶ www.responsibletravel.com
- ▶ www.sierraclub.org

Reduce waste

- ▶ http://themes.eea.eu.int/Environmental_issues/waste/reports
- ▶ www.mindfully.org/Plastic/Ocean/Moore-Trashed-PacificNov03.htm
- ▶ www.plasticdebris.org
- ▶ www.algalita.org
- ▶ www.goacom.com/community/pfgc
- ▶ www.reciclar-t3.org.br
- ▶ www.shareholder.com/bid/news/20021206-96753.cfm
- ▶ www.svtc.org
- ▶ www.worldwatch.org/pubs/goodstuff/computers
- ▶ www.epson.com/cgi-bin/Store/Recycle/RecycleProgram.jsp
- ▶ www.ibm.com/ibm/environment
- ▶ www.apple.com/environment/recycling/nationalservices
- ▶ www.hp.com/hpinfo/global/citizenship/environment/recycling/index.html
- ▶ www.dell.com/content/topics/segtopic.aspx/dell_recycling?c=us&cs=19&l=en&s=dhs
- ▶ www.intel.com/intel/other/ehs/product_ecology/R_R_Initiatives.htm
- ▶ www.philips.com/assets/Downloadablefile/Environmental-responsibility-2828.pdf
- ▶ www.sony.net/SonyInfo/Environment/recycle/japan/index.html
- ▶ www.xerox.com/go/xrx/template/020e.jsp?Xcstry=USA&Xlang=en_US
- ▶ www.o2.org/index.php
- ▶ www.cfd.rmit.edu.au
- ▶ www.wastewatch.org.uk
- ▶ www.unep.fr/pc/sustain/design/design.htm
- ▶ www.env.go.jp/recycle/3r/en
- ▶ www.wastewatch.org.uk
- ▶ www.recycle.net
- ▶ www.grn.com/grn/library/gloss
- ▶ www.kenya-wildlife-service.org/marine.html #Kiunga
- ▶ www.ucc.ie/famine/GCD/Kiunga-Case%20Study.doc
- ▶ www.atimes.com/china

▶ www.tragamovil.com

▶ www.europa.eu.int/comm/environment/waste/facts_en

Optimise energies

- ▶ www.iea.org
 - ▶ www.eia.doe.gov
 - ▶ www.eccj.or.jp/index_e.html
 - ▶ www.housing.gov.za/sustainable/settlements/CaseStudies/DisplayCase.asp
 - ▶ www.wri.org/wri/trends/index
 - ▶ www.fuelcellpark.com
 - ▶ www.lipower.org/cei/tips.html
 - ▶ www.npower.com/juice
 - ▶ www.seba.es
 - ▶ www.menergia.gov.ec/php/proy_galapagos_ELECTE.php
 - ▶ <http://rredc.nrel.gov>
 - ▶ www.soldardome.com
 - ▶ www.solarnow.org
 - ▶ <http://solstice.crest.org>
 - ▶ www.eere.energy.gov
 - ▶ www.renewables.ca/main/main.php
 - ▶ www.fedarene.org
 - ▶ www.energystar.gov
 - ▶ www.eu-greenlight.org
 - ▶ www.eu-greenlight.org/pdf/GL_Catalogue/GL_catalog_14.pdf
 - ▶ www.designinggreen.com/english/index.htm
 - ▶ Clayton Caroline, *Dirty Planet*, op.cit.
 - ▶ www.eren.de.gov
 - ▶ www.energystar.gov
 - ▶ www.eu-greenlight.org
 - ▶ <http://energyefficiency.jrc.ec.eu.int/energystar>
 - ▶ http://europa.eu.int/comm/energy/en/renewable/idae_site/deploy/prj083/prj083_1.html
 - ▶ <http://database.bestpractices.org>
 - ▶ www.barefootcollege.org
 - ▶ www.wbcd.org
 - ▶ www.fastcompany.com
 - ▶ www.ashdenawards.org
- ## Forecast the weather
- ▶ www.unep.fr/ozonaction
 - ▶ www.ipcc.ch
 - ▶ <http://unfccc.int/2860.php>
 - ▶ www.wmo.ch/index-en.html
 - ▶ www.grida.no/climate
 - ▶ <http://pacinst.org/globalchange.org>
 - ▶ www.greenpeace.org/international/campaigns/climate-change
 - ▶ http://unfccc.int/essential_background/kyoto_protocol/items/2830.php
 - ▶ www.hm-treasury.gov.uk/media/8AC/F7/Executive_Summary.pdf
 - ▶ http://unfccc.int/files/press/backgrounders/application/pdf/factsheet_adaptation.pdf
 - ▶ www.climateneutral.com
 - ▶ www.pewclimate.org
 - ▶ www.unesco.org/mab/ecosyst/drylands.shtml
 - ▶ www.iea.org/Textbase/npsum/enertech2006SUM.pdf

- ▶ www.worldwildlife.org/climate_savers
- ▶ www.impattozero.it
- ▶ www.defipourlaterre.org
- ▶ www.ceroco2.org
- ▶ www.safecclimate.net/business/index.php
- ▶ www.climatevoice.org
- ▶ www.iisd.org/youth/internetcafe
- ▶ www.globalchange.org
- ▶ www.cool-companies.org
- ▶ www.safecclimate.net
- ▶ www.climatevoice.org

Save water, safe water

- ▶ www.waterweb.org
- ▶ www.ashoka.org/global/ei_case_studies.cfm#laxman
- ▶ www.earth-policy.org/Updates/2006/Update51.htm
- ▶ www.panda.org/about_wwf/what_we_do/freshwater/news/index.cfm?uNewsID=2250
- ▶ http://enrin.grida.no/ara/main_e.htm
- ▶ www.grinningplanet.com
- ▶ www.who.int/water_sanitation_health/dwq/guidelines/en
- ▶ www.unesco.org/water
- ▶ www.unwater.org
- ▶ www.gpa.unep.org
- ▶ www.thewaterpage.com

Purchase without pain

- ▶ www.ilo.org/public/english/standards/ipecc/simpoc/ others/globalest.pdf
- ▶ www.rugmark.org
- ▶ www.fifa.com/en/fairplay/index/0,1255,113478,00.html?articleid=113478
- ▶ www.unicef.org/protection/files/child_labour.pdf
- ▶ www.solidar.org
- ▶ www.dol.gov
- ▶ www.bls.gov
- ▶ www.unicef.org/sowc04/sowc04_education_child_labour.html
- ▶ www.managementtoday.co.uk/article/600660
- ▶ www.ibe.unesco.org/cops/Anima tion/UNICEF_%20UESCOrepchild.pdf
- ▶ www.un.org/millenniumgoals/regionalreps.html
- ▶ www.unesco.org/education/efa/fr/wef_2000/index.shtml
- ▶ www.uis.unesco.org/ev_fr.php?ID=5275_201&ID2=DO_TOPIC
- ▶ www.icftu.org
- ▶ www.stopchildlabor.org/internationalchildlabor/PlantationProject
- ▶ www.ethicalconsumer.org/boycotts/successfulboycotts.htm
- ▶ www.amnesty.org
- ▶ www.hrw.org
- ▶ www.ilo.org/public/english/standards/ipecc/about/ factsheet/exp1s-98/examp13.htm
- ▶ www.nlcnet.org/campaigns/maternity
- ▶ www.antislavery.org
- ▶ www.stopchildlabor.org/interna

- ▶ www.ethicalconsumer.org/boycotts/successfulboycotts.htm
- ▶ www.amnesty.org
- ▶ www.hrw.org
- ▶ www.ilo.org/public/english/standards/ipecc/about/ factsheet/exp1s-98/examp13.htm
- ▶ www.nlcnet.org/campaigns/maternity
- ▶ www.antislavery.org
- ▶ www.hrw.org

Live and let live

- ▶ www.infolav.org
- ▶ www.thematrix.com/shop
- ▶ www.leapingbunny.org/faq.htm
- ▶ www.allforanimals.com/cruelfree1.htm
- ▶ www.naturewatch.org
- ▶ www.animalaid.org
- ▶ www.eceae.org
- ▶ www.aveda.com/customerservice/ourmission.tmpl
- ▶ <http://valuesreport.thebodyshop.net>
- ▶ www.iucn.org
- ▶ www.worldwildlife.org/buyer beware
- ▶ www.savedolphins.org
- ▶ www.unep.org/grasp
- ▶ www.biodiv.org/default.shtml
- ▶ www.unesco.org/mab/biodiv.shtml
- ▶ www.cites.org
- ▶ www.worldwildlife.org/wildplaces/congo
- ▶ www.traffic.org/news/salaw
- ▶ *Time Europe*, April 17, 2000 Vol.155 No.15
- ▶ www.eia-international.org
- ▶ www.ecocrimes.org

Looking cool & fair

- ▶ <http://en.wikipedia.org/wiki/Fashion>
- ▶ http://en.wikipedia.org/wiki/Dress_code
- ▶ www.fashion-era.com/sociology_semiotics.htm
- ▶ <http://online.sfsu.edu/~kendrav/fashion>
- ▶ Joanne Finkelstein, *Chic Theory*, in *Australian Humanities Review*, 1997 [www.lib.latrobe.edu.au/AHR/archive/Issue-March-1997/finkelstein.html]
- ▶ www.marquise.de/en/misc/fashion.shtml
- ▶ Roland Barthes, *The Language of Fashion*, Berg Publishers, Oxford (UK), March 2006, pp 224 [www.bergpublishers.com]
- ▶ www.anitaroddick.com
- ▶ www.nologo.org
- ▶ www.ethicalfashionshow.com
- ▶ www.sustainablestyle.org
- ▶ www.treehugger.com
- ▶ www.springwise.com/fashion_beauty
- ▶ www.ekwo.org
- ▶ www.ethicalfashionshow.com
- ▶ www.cleanclothes.org/codes/

- ▶ www.sweatshopwatch.org
- ▶ www.corpwatch.org
- ▶ www.itcilo.org/actrav/actrav-english/telearn/global/ilo/code/main.htm#The%20Concept
- ▶ www.jo-in.org
- ▶ www.coopa-roca.org.br/en/index_en.html
- ▶ www.indigenousdesigns.com
- ▶ www.marketresearch.com
- ▶ www.pan-international.org
- ▶ www.katarinahamnett.com
- ▶ www.organicexchange.org
- ▶ www.laborrighths.org/projects/conference/ecopolitics.htm
- ▶ www.ota.com/organic/woolfact sheet.html
- ▶ www.centexbel.be/Eng/i-box_archives.htm
- ▶ www.oeko-tex.com

Take action

- ▶ www.unep.fr/sustain
 - ▶ http://europa.eu.int/comm/environment/ecolabel/index_en.htm
 - ▶ www.greenmoneyjournal.com
 - ▶ www.energystar.gov
 - ▶ www.ithacahours.org
 - ▶ www.comune.fe.it/bancadeltempo
 - ▶ www.appropriate-economics.org/africa/africa.htm
 - ▶ www.sustainable-everyday.net
 - ▶ www.unep.org/tunza
 - ▶ www.cool-companies.org
 - ▶ www.co-operativebank.co.uk/ethics.html
 - ▶ www.ethicalconsumer.org
 - ▶ www.novethic.fr/novethic/site/index.jsp
 - ▶ www.gdrc.org/icm
 - ▶ www.grameen-info.org/bank/moa.html
 - ▶ www.pactworld.org
 - ▶ www.eca-watch.org
 - ▶ www.fern.org/pages/eca/ eucamp.html
 - ▶ www.oneworld.org/guides/ethcons/eth_invest_link
 - ▶ Klein Naomi, *No Logo*, Flamingo, London 2001 [www.nologo.org]
- Discover the global village**
- ▶ www.kff.org
 - ▶ <https://drum.umd.edu/dspace/bitstream/1903/3120/1/umi-umd-2935.pdf>
 - ▶ *L'Espresso*, 27 September 2001
 - ▶ *Encyclopaedia of Business*; quoted in [www.answers.com/library/Encyclopedia+of+Business-cid-1123397206]
 - ▶ www.media-awareness.ca
 - ▶ www.adforum.com/specialevents/ACT/ACT6/tc.asp
 - ▶ www.interpublic.com
 - ▶ www.smh.com.au
 - ▶ www.chamber.org.hk
 - ▶ www.unep.fr/pc/sustain/advertising/advertising.htm
 - ▶ www.phac-aspc.gc.ca/ncfv-cnivf

- ▶ [/familyviolence/html/nfntseffemedia_e.html](http://familyviolence/html/nfntseffemedia_e.html)
- ▶ www.apa.org/releases/media_violence.html
- ▶ www.idealist.org
- ▶ www.ijbnpa.org/content/1/1/3
- ▶ www.ietf.org/media/eu obesity2.pdf
- ▶ 4www.thebodyshop.com.au/ourValues.cfm?pageID=30
- ▶ 4www.myspace.com
- ▶ 4www.youtube.com
- ▶ 4www.takingitglobal.org
- ▶ Jonathan Greenblatt, *"Kingdom Come: Striking the Balance between Celebrities and Causes"*, December 21, 2006 3:29 AM [www.worldchanging.com/archives/005505.html]
- ▶ [4Crystal Park, "Celebrity Activism: Publicity Stunt or Sincere Care?"](http://4Crystal Park,), Washington, 21 February 2007 [www.voanews.com/english/2007-02-21-voa38.cfm]
- ▶ 4www.italica.rai.it/eng/principal/topics/bio/jovanotti.htm
- ▶ 4www.adbusters.org
- ▶ 4www.casseursdepub.org
- ▶ 4www.justthink.org

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- ▶ *Tomorrow Magazine*, Stockholm (cover, p. 16, 21)
- ▶ *La Nuova Ecologia*, Rome (cover)
- ▶ *Colors Magazine*, Ponzano Veneto, Italy (p. 24)
- ▶ *Brand-New*, London (p. 34)
- ▶ www.citywatchnews.net (p. 68)
- ▶ www.davidakin.blogware.com (p. 69)
- ▶ www.globecommsystems.com (p. 73)

MDGs: what we should achieve... (by 2015) *	US\$	source	year **
1. Eradicate extreme poverty and hunger <i>TARGET 1: reduce by half the proportion of people living on less than a dollar a day</i>	54-62	Rathin Roy and Antoine Heuty, "MDG Cost Estimates: The Limits of Expert Knowledge", UNDP Public Resource Management Training, New Delhi. March/April 2004. [www.undp.org/documents/5637-MDG_Cost_Estimates_The_Limits_of_Expert_Knowledge_-_PowerPoint_Presentation.ppt#268,12,Global cost estimate 2 - The World Bank]	2004
<i>TARGET 2: reduce by half the proportion of people who suffer from hunger</i> ▶ halving the proportion of child malnutrition	29.6	International Food Policy Research Institute, December 2005. IFPRI-IMPACT projects that the business as usual scenario will cost US\$21.5 billion per annum during 1995-2015 for all developing countries. The MDG scenario projects US\$29.6 billion per annum over the same period. Investments are needed in the five key drivers--rural road construction, education, clean water provision, agricultural research, and irrigation. [www.ifpri.org/pubs/agm05/jvbaqm2005.asp#read]	2005 (1995/ 2015)
2. Achieve universal primary education <i>TARGET 3: ensure that all boys and girls complete (...)</i>	11	EFA Report 2007 [www.unesco.org/education/GMR/2007/highlights.pdf]	2007
3. Promote gender equality and empower women <i>TARGET 4: (...)</i> in primary and secondary education	0.4/0.6	[http://unesdoc.unesco.org/images/0012/001297/129777e.pdf]	2002
4. Reduce child mortality <i>TARGET 5: reduce by 2/3 (...)</i> children under 5 ▶ extending the coverage of maternal and newborn care	1/6.1	The cost, additional to current levels of expenditure in the 75 poorest countries, increases from US\$ 1 billion in 2006 to US\$ 6.1 billion in 2015. [www.who.int/entity/whr/2005/td_two_en.pdf]	2005 (2006/ 2015)
▶ child and maternal immunisation in the poorest countries	3.5	[www.who.int/entity/immunization/givs/GAVI_Imm_Forum_piece.pdf]	2006
5. Improve maternal health <i>TARGET 6: reduce by 3/4 the maternal mortality ratio</i> ▶ providing universal access to sexual and reproductive health services	23	Global Health Watch 2005-2006 [www.zedbooks.co.uk]	2006
6. Combat HIV/AIDS, malaria and other diseases <i>TARGET 7: halt and begin to reverse (...)</i> HIV/AIDS	22.1	By the same year (2008), UNAIDS estimates that US\$ 11.4 billion will be needed for HIV prevention activities alone. [http://data.unaids.org/pub/GlobalReport/2006/2006_GR-ExecutiveSummary_en.pdf]	2006 (2008)
<i>TARGET 8: (...)</i> malaria and other major diseases	3.2	WHO and UNICEF, World Malaria Report 2005, [www.rbm.who.int/wmr2005/html/3-1.htm]	2005
7. Ensure environmental sustainability <i>TARGET 9: (...)</i> reverse loss of environmental resources ▶ funding protected areas (PA) for biodiversity conservation	12/13	Another recent, widely-cited estimate suggests that up to US\$45 billion per year (over 30 years) may be required to secure an expanded network of protected areas, covering 15% of terrestrial and 30% of marine ecosystems, mainly in the tropics., [www.iucn.org/bookstore/HTML-books/BP13-sustainable-financing/Part%20I-section2.html]	2005 (2005/ 2015)
<i>TARGET 10: (...)</i> sustainable access to drinking water	10	World Water Council, Jérémie Toubkiss, March 2006; [www.financingwaterforall.org/fileadmin/Financing_water_for_all/Reports/FullTextCover_MDG.pdf]	2006
<i>TARGET 11: (...)</i> 100 million slum dwellers	20	Cities Alliance, Annual Report 2005 [www.citiesalliance.org/doc/annual-reports/2005/ch-1.pdf]	
8. Develop a global partnership for development <i>TARGET 12: (...)</i> an open trading and financial system (...) ▶ trade-related technical assistance and capacity building	10.2	WTO/OECD, 2003 - reported in [www.unmillenniumproject.org/documents/tf9interim.pdf]	2003 (2001/ 2002)
<i>TARGET 13: address the least developed countries' special needs. This includes (...)</i> ▶ full cancellation of the debt of the poorest countries	- 80	EURODAD, a European coalition of CSOs that closely follows debt and finance, calculates that about US\$35 billion is needed to fully cancel the multilateral debt of the HIPC countries, and up to \$80 billion to cancel the debt of all low income countries (except India). [www.ccic.ca/e/docs/002_aid_2005-05_politics_of_mdgs_part_2.pdf]	2005
<i>TARGET 14: address the special needs of landlocked and small island developing States</i>	9.9	[http://mdgs.un.org/unsd/mdg/Resources/Attach/Products/Progress2005/goal_8.doc]	2005 (2003)
<i>TARGET 15: (...)</i> national and international measures to make debt sustainable in the long term ▶ implementing the Heavily Indebted Poor Countries (HIPC) Initiative	63.2	The total cost of the HIPC Initiative for the 40 HIPCs is estimated at US\$63.2 billion in end-2005 NPV terms. Of this, US\$41.3 billion represents the cost of HIPC Initiative debt relief committed to the 29 countries that have reached their decision points. HIPC Initiative debt relief that has been or is being delivered irrevocably to the 19 countries that have reached the completion point amounts to US\$28.8 billion. Of the total committed assistance, about half of the cost is borne by multilateral creditors - 23% by IDA and 8% by the IMF. [www.imf.org/external/np/pp/eng/2006/082106.pdf]	2006 (2005)
<i>TARGET 16: In cooperation with the developing countries, develop decent and productive work for youth</i>	=	no available data	=
<i>TARGET 17: In cooperation with pharmaceutical companies, provide access to affordable essential drugs in developing countries</i>	=	no available data	=
<i>TARGET 18: In cooperation with the private sector, make available the benefits of new technologies- especially ICT</i> ▶ improving mobile phone infrastructure in developing countries	56	Some rich nations are spending US\$3,000 per capita per year or more on ICT, whereas a number of poor countries are spending less than US\$50 per capita per year. [www.developmentgateway.org/download/222137/partnership.doc] Fay and Delgado (2003), reported in -- <i>World Bank, Global Trends and Policies - Information and Communications for Development, 2006</i> [www-wds.worldbank.org/external/default/WDSContentServer/WDSP/IB/2006/04/20/000012009_20060420105118/Rendered/INDEX/359240PAPER0In101OFFICIAL0USE0ONLY1.txt]	2003 2006 (2005/ 2010)

* See: "Putting priorities into perspective" (p.16) - ** Publication year. Contents referred to specific year/s in brackets.

	... compared to what we are spending now for:	US\$	source	country	year
	<i>military equipment & services</i>	1001	Stockholm International Peace Research Institute, "SIPRI Yearbook 2006 - Armaments, Disarmament and International Security", June 2006 [http://yearbook2006.sipri.org/chap8]	worldwide	2005
	<i>pet food & pet care products</i>	37	In 2005, Americans spent over \$35 billion on pet supplies and services. This figure is projected to approach \$37 billion in 2006 and surpass \$43 billion by 2011, an average annual growth rate (AAGR) of 3.4% from through 2011. [www.bccresearch.com/fod]	North America	2006
	<i>alcoholic drinks</i>	73.7	[www.marketresearchworld.net/index.php?option=content&task=view&id=304&Itemid=]	UK	2004
	<i>cosmetic surgery</i>	8.5	American Society of Plastic Surgeons [www.plasticsurgery.org/news_room/Media-FAQs.cfm]	USA	2004
	<i>ice cream and frozen desserts</i>	36.6	2005 Dairy Facts/International Ice Cream Association [www.idfa.org/facts/icmonth/page2.cfm]	USA	2004
	<i>baby clothing and footwear</i>	16.8	[www.packagedfacts.com]	USA	2005
	<i>cosmetics & toiletries</i>	48.2	(€36.6 billion) - The European Cosmetic, Toiletry & Perfumery Market 2005 [www.colipa.com]	Western Europe	2005
	<i>weight-loss products</i>	49.2	"Overweight consumers and the future of food and drinks", Dec. 2005. [www.datamonitor.com]	Europe	2004
	<i>cut flowers</i>	40	Amy Stewart, <i>Flower Confidential: The Good, the Bad, and the Beautiful in the Business of Flowers</i> , Algonquin Books of Chapel Hill, USA, Feb. 2007. [www.powells.com/biblio/9781565124387]	worldwide	2005
	<i>sea cruises</i>	28.3	European Cruise Council (ECC) [www.hrnews.com/news.php?sid=26129] and [www.cruisedownunder.com]	USA and Europe	2005
	<i>bottled water</i>	100	Worldwatch Institute - October 19, 2006 [www.worldwatch.org/node/4683]	worldwide	2006
	<i>jewelry and watches</i>	59.4	[http://unitymarketing.ecnext.com/coms2/gi_0270-761/Jewelry-Report-2006-Update-The.html]	USA	2005
	<i>online gambling</i>	12	There are more than 2,000 Internet gambling sites worldwide. Sports betting accounted for almost \$4.3 billion of the total, poker around \$2.4 billion. [www.responsiblegambling.org/staffsearch/library_news_results_details.cfm?intID=9628]	worldwide	2005
	<i>farm subsidies</i>	321	"Agricultural Policies in OECD Countries: Monitoring and Evaluation 2005" [www.oecd.org/document/9/0,2340,en_2649_33773_35015433_1_1_1_1,00.html]	USA, EU, Japan	2004
	<i>personal travel & tourism</i>	348	Worldwide, international tourism receipts are estimated at US\$ 680 billion (547 billion euros) in 2005. [www.world-tourism.org/facts/menu.html]	Europe	2005
	<i>advertising</i>	451	ZenithOptimedia, reported in [www.itfacts.biz/index.php?id=P5330]	worldwide	2007
	<i>video games</i>	23	Electronic games revenues are dominated by North America, Europe and Japan, which currently account for 90% of global sales. [www.deloitte.com/dtt/cda/doc/content/2006%20TMT_Media_Predictions.pdf]	worldwide	2006
	<i>illicit drugs</i>	322	The value of the global illicit drug market for the year 2003 was estimated at US\$13 billion at the production level, at US\$94 billion at the wholesale level, and at US\$322 billion based on retail prices and taking seizures and other losses into account. [www.unodc.org/unodc/world_drug_report_2005.html]	worldwide	2005
	<i>digital consumer electronics</i>	167	Strategy Analytics, reported in [www.itfacts.biz/index.php?id=C0_25_1]	worldwide	2006

