

Recirculated in 1999

PRINCIPLES REFLECTED IN INTERNATIONAL AGREEMENTS: OBLIGATIONS INCURRED AND EXPECTATIONS CREATED 1999

GENERAL GLOBAL URGENCY RECOGNIZED IN INTERNATIONAL AGREEMENTS BY THE UNITED NATIONS AND NON-GOVERNMENTAL ORGANIZATIONS

(See Charter of Obligations, 1995 for a comprehensive list of global recognition of the urgency of the global situation)

ACKNOWLEDGING THE PERPETUATION OF INEQUALITY AND THE DETERIORATION OF THE ECOSYSTEM

1. Humanity stands at a defining moment in history. We are confronted with a perpetuation of disparities between and within nations, a worsening of poverty, hunger, ill health and illiteracy and the continuing deterioration of the ecosystem on which we depend for our well being (Preamble, Agenda 21, UNCED, 1999)
2. ACKNOWLEDGING THE NEGATIVE IMPACT OF UNSUSTAINABLE PATTERNS OF CONSUMPTION PARTICULARLY IN INDUSTRIALIZED COUNTRIES

We recognize that “the major cause of the continued deterioration of the global environment is the unsustainable pattern of consumption and production, particularly in industrialized countries, which is a matter of grave concern, aggravating poverty and imbalances. (4.3. Changing Consumption Patterns, Agenda 21. 1992, UNCED)

RECOGNIZING INCREASED ECOLOGICAL THREATS TO FUTURE GENERATIONS

Ecological problems, such as global climate change, largely driven by unsustainable patterns of production and consumption, are adding to the threats to the well-being of future generations. (Preamble, 1.2 International Conference on Population and Development, 1994)

PRINCIPLES

A goal could be described as the final purpose or end to which a design tends or which a person, institution or any other body aims to attain. Principles, however, do not establish a goal or vision which is unattainable, and which is to be compromised through trade-offs. A principle is a foundation from which anything proceeds, a comprehensive law or doctrine from which others are derived or on which others are founded. Principles give substance to standards. A standard is that which is set up and established by authority as a rule for the measure of value, or that which is established by authority, custom or general consent as an example or criterion. The principle provides the foundation for the standards.

(1)

INTERDEPENDENCE PRINCIPLE

The interdependence principle affirms the interdependence of promoting and fully guaranteeing, respect for human rights; ensuring the preservation and protection of the environment; creating a global structure that respects the rule of law, achieving a state of peace; justice and security, and participating in socially equitable and environmentally sound development. These issues will be perceived to be interdependent facets of a potentially viable solution. It is no longer possible to consider in isolation: threats and impacts of war; the use of ecologically unsafe and unsound energy; the loss of ecological integrity; the disposal of toxic and hazardous wastes, including nuclear waste, the disregard for inter-generational and gender equality/equity; the ignoring of health issues related to population and environmental degradation; the perpetuation of the current model of development; the inequitable distribution of resources; the disenfranchised and the enfranchised gap etc.

1.1. RECOGNIZING THE GROWING AWARENESS OF THE INTERCONNECTION OF ISSUES

... reflects[ing] the growing awareness that population, poverty, patterns of production and consumption and other threats to the environment are so closely interconnected that none of them can be considered in isolation. (Preamble, 1.5., International Conference on Population and Development, 1994)

1.2. UNDERTAKING RESEARCH INTO LINKAGES

Research *should shall* be undertaken on the linkages among population, consumption and production, the environment and natural resources and human health as a guide to effective **socially equitable and environmentally-sound sustainable development** policies (3.31., International Conference on Population and Development, 1994)

1.3. RECOGNIZING DEPENDENCE ON NATURE

mankind humankind is a part of nature and life depends on the uninterrupted functioning of natural systems which ensure the supply of energy and nutrients (Preamble (a) UN Resolution, 37/7, World Charter of

Nature, 1982)

1.4. RECOGNISING THE PRESENT AND FUTURE IMPACT OF ENVIRONMENTAL CONTAMINANTS

(a) (Article 95 bis. Many environmental contaminants, such as radioactive materials and persistent organic pollutants, work their way into the food chain and eventually into human beings, thus compromising the health of present and future generations. (Habitat II)

(2)

ECOSYSTEM PRIMACY PRINCIPLE

Through mandatory international standards, States shall undertake that, in all decisions made about interventions into the ecosystem, the ecosystem shall be given primacy.

Through a 1982 General Assembly Resolution 37/7, the majority of states undertook to “Ensure [e]nsuring that every form of life is unique, warranting respect regardless of its worth to humans” (World Charter of Nature, 1982). **Also, through General Assembly resolution 37/7** it was recognized that humankind is a part of nature and life depends on the uninterrupted functioning of natural systems which ensure the supply of energy and nutrients.

“Ecosystem” is defined in the Convention on Biological Diversity as a dynamic complex of plant, animal and micro-organism communities and their non-living environment interacting as a functional unit (Convention on Biological Diversity, UNCED, 1992). Biodiversity is defined as “the variability among living organisms from all sources including terrestrial, marine and other aquatic ecosystems, and the ecological complexes of which they are part; this includes diversity within species, between species and of ecosystems (Convention on Biological Diversity, UNCED, 1992)

Interdependence of biota and the delicate balance and interaction among various ecosystems shall be ensured as well as the integrity of the components themselves.

2.1. RESPECTING OF INHERENT WORTH OF NATURE

Every form of life is unique, warranting respect regardless of its worth to man [Humanity], and to accord other organisms such recognition's, man [humans] must be guided by a moral code of action (Preamble, UN Resolution, 37/7, World Charter of Nature, 1982

Nature shall be respected and its essential processes shall not be impaired (Principle 1, UN Resolution, 37/7, World Charter of Nature, 1982) World Charter of Nature, 1982)

2.3. REDUCING THE ECOLOGICAL FOOTPRINT PRINCIPLE

Promoting changes in unsustainable production and consumption patterns, particularly in industrialized countries...settlement structures that are more sustainable, reduce environmental stress, promote the efficient and rational use of natural resources- including water, air, biodiversity, forests, energy sources and land - and meet basic needs thereby providing a healthy living and working environment for all and reducing the ecological footprint of human settlements; (27 b, Habitat II, 1996)

2.4. ACTING UPON THE ACKNOWLEDGMENT THAT THERE ARE LIMITS-TO GROWTH: LIVING WITHIN THE CARRYING CAPACITY OF THE ECOSYSTEM

There are real limits to consumption, population and pollution. Although their precise quantification is uncertain, there are serious indications that these limits have long since passed, and failure to act upon this acknowledgment is negligence.

* [Find: Quote from Club of Rome]

2.5. RESPECTING THE CARRYING CAPACITY OF ECOSYSTEMS

Sustainable human settlements development incorporates... the precautionary principle, pollution prevention, respect for the carrying capacity of ecosystems and preservation of opportunities for future generations. (16, Habitat II). **Respecting the carrying capacity of ecosystems also entails acknowledging that there are limits to growth, and respecting the inherent worth of nature, and thus does not justify increased pollution in pristine areas, or give a licence to pollute less polluted areas.**

2.6. KNOWING ECO-CYCLES

To facilitate capacity-building and institutional development for the improvement of human settlements planning and management, governments at the appropriate levels, including local authorities and their associations, should: * be encouraged to increase their knowledge about the eco-cycles involving their cities so as to prevent environmental damage (Art. 135, Habitat II, 1996)

2.7. PROMOTING THE CONSERVATION AND SUSTAINABLE USE OF URBAN AND PERIURBAN BIODIVERSITY

In order to promote a healthy environment that will continue to support adequate shelter for all and sustainable human settlements for current and future generations, Governments at the appropriate levels, in partnership with all relevant interested parties, should:

(a) Promote the conservation and sustainable use of urban and peri-urban biodiversity, including forests, local habitats and species biodiversity; the protection of biodiversity should be included within local sustainable development planning activities

(b) encourage, where appropriate, the establishment of productive and recreational green belts around urban and rural agglomerations in order to protect their environment and contribute to the provision of food products. (Article* 98 bis Habitat II, 1996)

2.8. ENSURING EQUAL ACCESS TO... GREEN SPACES

Formulate and implement human settlement development policies that ensure equal access to and maintenance of basic services, including those related to the provision of food security; education; employment and livelihood; primary health care [changed to basic health care, June 14], including reproductive and sexual health care and services [deleted June 14]; safe drinking water and sanitation; adequate shelter; and access to open and green spaces; giving special priority to the needs and rights of women and children, who often bear the greatest burden of poverty (Article *87(a) Habitat)

2.9 BEING ENTITLED TO ... HEALTHY PRODUCTIVE LIFE IN HARMONY WITH NATURE

human beings are entitled to a healthy and productive life in harmony with nature (Article 23, Habitat II, 1996)

2.10. ENSURING SOCIAL PROGRESS IN HARMONY WITH THE ENVIRONMENT

Sustainable settlements development ensures economic development, employment opportunities and social progress in harmony with the environment

(3)

GLOBE-WIDE STANDARDS PRINCIPLE

3.1. ESTABLISHING GLOBE-WIDE STANDARDS

Through mandatory international normative standards (MINS), the invalid argument that, in a pristine environment that has not yet been polluted by industrial activity, emission standards shall be relaxed. A licence to pollute in a pristine area shall not be given to

industry because the area has not yet officially been designated as being polluted would be discredited.

Polluting industries that have been regulated under statutory law, shall not through redefinition of practice be excluded from the previous regulations

States shall ensure consistency so that point source discharges, no matter where they are located will be equally affected by the standards.

Standards must ensure acceptable ambient environmental conditions globally. No particular area should be penalized due to a pre-existing high-quality environment

In no way shall the requirement to ensure consistency be used as a justification for the relaxing of globe-wide standards and technical regulations

3.2. HARMONIZING UPWARD OF THE "PLAYING FIELD"

Through mandatory international standards (MINS), states shall ensure that the regional, national, and international targets with the highest possible socially equitable and environmentally sound standards shall be drawn upon.

3.3. ENFORCING GLOBE-WIDE PREVENTION, REDUCTION AND ELIMINATION Through mandatory international standards (MINS), states shall establish and enforce reduction and elimination targets and ensure that corporations including transnationals meet or exceed, globe-wide reduction and elimination targets, Ambient criteria, or environmental quality standards referring to levels of contaminants in the environment must be zero use, production, and release in all cases where a toxic substance is persistent or bio-accumulative, or where substance will generate persistent or bio-accumulative toxic by-products or breakdown products during its productions, use or disposal (paraphrase of Zero Toxics Alliance Statement of Principles)

Given that local and regional goals and targets may not have taken into consideration pollution prevention, the goals and targets, consequently, shall be reassessed in the light of the precautionary, anticipatory principle, and other principles such as those advocated by the Zero Toxics Alliance in their Statement of principles from July 26, 1994:

Zero Toxics Statement of Principles from the "Zero Toxics Alliance Statement of Principles" 7/26/94

1. ... zero use, production, and release of persistent and /or bio-accumulative toxic substances in the environment, workplace and home. Zero does not mean below some arbitrary level, or even beneath the level of detection. Zero means Zero.

2. ... elimination and reduction of the use, production, and release of other toxics substances in the environment, workplace and home.

3.the goal of zero use, production, and release applies in all cases where a toxic substance is persistent or bio-accumulative. It also applies when a substance will generate persistent or bio-accumulative toxic by-products or breakdown products during its production, use or disposal

4. ... advocat[ing] programs that achieve ...goals through reformulation of industrial processes associated with toxics use and production. Limiting discharges and shifting toxics from one environmental medium to another do not protect people or the environment

5. ...reject[ion] of risk assessments which claim that exposures to toxic substances are safe

In addition, in establishing international standards, drafters shall give serious consideration to “bio-concentration”. For example, the discharge of mercury was deemed to be at an acceptable level. The mercury, however, was taken up by small organisms becoming more highly concentrated as it moved up the food chain. Biopathways must always be examined”.

3.4. STRIVING TO ENSURE THAT THE LOCAL, REGIONAL AND NATIONAL TARGETS IN EACH STATE SHALL DRAW UPON THE HIGHEST POSSIBLE SOCIALLY EQUITABLE AND ENVIRONMENTALLY SOUND STANDARDS

Collectively the member states of the United Nations are in a position to drive industry through regulations which establish the highest possible equitable and ecological standards and technical regulations, and to promote the highest possible level global playing field.

3.5. ENSURING GLOBE-WIDE CONSISTENT PROTECTION OF AMBIENT AIR, WATER, AND SOIL QUALITY

Through mandatory international standards, states shall ensure consistent protection considering both variation in air water and soil conditions locally, regionally, nationally and globally; and the variation in effects of different substances emitted. However, ensuring consistent protection also means that states will not transfer their pollution problems onto other jurisdictions nor will states relax or change their standards or technical regulations in order to attract industry.

regulations.

(4)

COMPLIANCE PRINCIPLE

States shall discharge obligations, and fulfill expectations, and shall enact the necessary to ensure the discharging of obligations and the fulfilling of expectations. In, through mandatory international normative standards (MINS), legislation to ensure that corporations comply.

In Art. 60 of the Convention of Treaties, states are bound to not create situations in which it would be impossible to fulfill treaty obligations; in many cases current ecologically unsound practices result in the impossibility of fulfilling treaty obligations. Also, under the Convention of the Law of Treaties, states are bound, unless specifically mentioned, not to invoke internal law to justify non performance of a treaty obligation (Art. 27).

Through mandatory international normative standards (MINS), states shall comply with all international, national, bilateral and regional agreements, protocols and conventions as a

minimum. If there is a conflict between international, national, bilateral and regional agreements, the most stringent environmental provisions shall prevail. In 1995, in the Platform of Action, UN Convention on Women: Equality, Development and Peace, States undertook to ensure that “all corporations including transnational corporations, comply with national laws and codes, social security regulations, applicable international agreements, instruments and conventions, including those related to the environment, and other relevant laws” (Section 167). This undertaking was reaffirmed and extended in the Habitat II Agenda to include the “private sector”. A treaty shall be interpreted in good faith in accordance with the ordinary meaning to be given to the terms of the treaty in their context and in the light of its object and purpose (Art.1.Convention on the Law of Treaties, 1968)

Rules of customary international law will continue to govern questions not regulated by the provisions of the present Convention have agreed as follows (Article 29 territorial scope of treaties, Convention on the Law of Treaties)

4.1. REFRAINING FROM ACTS THAT WOULD DEFEAT THE PURPOSE

The Law of Treaties has established that there exists an

obligation not to defeat the object and purpose of a treaty prior to its entry into force

A state is obliged to refrain from acts which would defeat the object and purpose of a treaty when:

- (i) it has signed the treaty or has exchanged instruments constituting the treaty subject to ratification, acceptance or approval, until it shall have made its intention clear not to become a party to the treaty a); or
- (ii) it has expressed its consent to be bound by the treaty, pending the entry into force of the treaty and provided that such entry into force is not unduly delayed b)

(Art. 18, Convention on the Law of Treaties, 1968)

4.2. APPLYING THE DOCTRINE OF LEGITIMATE EXPECTATIONS

The Doctrine of Legitimate Expectations has established an institutional obligation to citizens:

- (i) "To create an expectation is an empty gesture without a promise to fulfill it. Before creating an expectation, an organization must assure itself of its ability to fulfill the promise it implies" (Introduction, B.C. Ombudsman Annual Report, 1991)

and that

- (ii) If a government holds itself out to do something even if not legally required to do so, it will be expected to act carefully and appropriately without negligence, and the citizens have the legitimate expectation that the government will discharge its obligations (Ombudsman Office, Personal Communication).

(See Russow, J. (1995) Charter of Obligations for A survey of obligations compiled by the Global Compliance Research project.

4.3. ENACTING INTERNATIONAL PRINCIPLES IN STATE LAW AND PRACTICE

The obligation to enact the necessary legislation to ensure compliance has been established in international Conventions, Protocols, Declarations, Covenants, and Resolutions, and has thus become a principle of international customary law. Through international mandatory standards states shall ensure that international obligations are reflected in the law and practice of each State. This international customary law principle has been expressed in numerous international documents for over 20 years. An example of the enunciation of the principle can be found in the UN Resolution 37/7. and reads as follows:

The principles set forth in the present Charter shall be reflected in the law and practice of each State, as well as at the international level (UN Resolution 37/7)

If there is a conflict between international, national, bilateral and regional agreements, the most stringent environmental provisions shall prevail.

4.4 ACKNOWLEDGING THE NEED FOR MORAL CODE OF ACTION IN RESPECT OF NATURE

The World Charter of Nature provided guidance for human respect for and action towards nature: Ensuring that every form of life is unique, warranting respect regardless of its worth to man [humans], and to accord other organisms such recognition's, man [human] must be guided by a moral code of action (UN Resolution 37/7), 1982)

4.5. ADOPTING PERFORMANCE STANDARDS

Join with professional societies to review and revise building codes and regulations based on current standards of engineering, building and planning practices, local conditions and ease of administration, and adopt performance standards **for all industrial activity**, as appropriate (Art. 169 n, Habitat II, 1996)

4.6. ESTABLISHING POLICIES, LAWS AND REGULATIONS

Governments at all appropriate levels, including local authorities have a responsibility to ensure access to education and to protect their population's health, safety and general welfare. This requires, as appropriate, establishing policies, laws and regulation for both public and private activities... (Article 19, Habitat II, 1996)

4.7 ESTABLISHING AND ADOPTING A REGULATORY FRAMEWORK

establish and adopt a regulatory framework, and provide institutional support for facilitating participation and partnership arrangements at all levels. (Article 50 e, Habitat II)

4.8 ESTABLISHING LEGISLATIVE AND REGULATORY FRAMEWORKS

* Establishing legislative and regulatory frameworks, institutional arrangements and consultative mechanisms for involving organizations in the design, implementation and evaluation of human settlements strategies and programmes (Art. 180 (a), Habitat II, 1996)

4.9 ENSURING OF COMPLIANCE OF PRIVATE SECTOR

Encourage the adoption of policies for the creation and development of the private sector and promote strategies for substantial and well-directed public and private investments in construction and development of shelter, infrastructure, health, education and other basic services through, inter alia, the provision of appropriate technical and financial assistance; in addition encourage Governments to promote strategies to ensure that the private sector, including transnational corporations, comply with national laws and codes, social security regulations, applicable international agreements, instruments and conventions, including those related to the environment, and other relevant laws, and adopt policies and establish mechanisms to grant contracts on a non-discriminatory basis; recruit women for leadership, decision-making and management and provide training programmes, all on an equal basis with men; and observe national labour, environment, consumer, health and safety laws, particularly those that affect women and children (Article 148 * e, Habitat II)

4.10 PROMOTING ...ETHICAL PRACTICES

promote transparency, accountability and ethical practices in financial transactions through support from effective legal and regulatory frameworks (Article 61* (d) Habitat II)

4.11. ESTABLISHING MONITORING AND EVALUATING COMPLIANCE WITH ENVIRONMENTAL REGULATIONS AND EFFECTIVENESS OF ENFORCEMENT AT ALL LEVELS

Establish, equip and build capacity for monitoring and evaluating compliance with environmental regulations and effectiveness of enforcement at all levels (Article 97 (c) Habitat II); 4.12.

IMPLEMENTING LOCAL ENVIRONMENTAL PLANS AND LOCAL AGENDA 21

support mechanisms for consultations and partnerships among interested parties to prepare and implement local environmental plans and local Agenda 21s and specific cross-sectoral environmental health programmes (Article 97 (h) Habitat II)

4.13. PROMOTING COMPLIANCE AND ENFORCEMENT

Promote, where appropriate, compliance with and enforcement of all health and environmental laws, especially in low-income areas with vulnerable groups (Article 75 d Habitat)

(5)

REGULATOR MUST NOT BE PROMOTER PRINCIPLE

This principle holds that regulators must not promote the continuance of the object or activity over which they regulate. For example, IAEA (The International Atomic Energy Association) that has the responsibility of regulating the civil nuclear industry promotes the use of nuclear energy.

(6)

STANDARDS-DRIVING INDUSTRY PRINCIPLE

Through mandatory international normative standards (MINS), states shall ensure that standards drive industry rather than industry driving standards. States in conjunction with international standards shall establish regulations that will drive industry.

The cost to the environment of continued degradation as a result of not enforcing standards and regulations rather than the cost to industry of environmental regulations shall be paramount.

Socially equitable and sound environmental performance will be determined by mandatory international normative standards (MINS) and technical regulations. These standards and technical regulations have as a foundation international principles related to promoting and fully guaranteeing respect for human rights; to ensuring of the preservation, conservation and protection of the environment; to creating a global structure that respects the rule of law, to achieving a state of peace; justice and security, and to participating in socially equitable and environmentally sound development.

There shall be continuous monitoring to ensure that corporation including transnationals, as well as small operations and the private sector generally are complying with international normative standards and technical regulations. In the event of non-compliance with MINS, the charters of all the corporations including the transnationals that contribute to conflict, to the escalation of war, to the violation of human rights and to the degradation of the environment shall be revoked. The emphasis of the international mandatory and normative regulatory policy is to ensure that standards drive industry not industry driving standards. To this end all promotion shall focus on developing and implementing BEST (Best Environmentally-Sound Traditions) practices. The environment and ecosystem will determine BEST practices not be “managed” MINS establishes absolute requirements for environmental performance to satisfy socially equitable and environmentally-sound development.

“Socioeconomic needs”, when referred to in international documents shall be limited to socially equitable and environmentally sound development principles, including fundamental international rights but shall not include a professed right to engage in socially inequitable and environmentally unsound practices.

All impacts of the corporation or business shall be examined even those impacts that normally would be deemed beyond objective quantification. Ignorance by corporations, including transnationals of the deleterious consequences arising from inequitable/ecologically unsound practices shall not absolve corporations from legal responsibility.

6.2 REVOCATION OF CHARTERS PRINCIPLE

In the event of non-compliance with MINS, the charters of all the corporations including the transnationals that contribute to conflict, to the escalation of war, to the violation of human rights and to the degradation of the environment shall be revoked.

(7) NON-PROSECUTING FOR DEMONSTRATING FOR COMPLIANCE WITH STANDARDS

States shall not prosecute citizens for demonstrating to protest non-compliance with regional, national or international standards.

(8) NON-TRANSFERENCE OF MEDIA

Through mandatory international normative standards (MINS), states shall ensure that polluting substances are not transferred from one media to another (for example from

water to air). in other words, pollution prevention is complete prevention instead of displacement of problem

(9) INCLUSIVENESS OF ACTIVITIES AND SUBSTANCES PRINCIPLE

Through mandatory international standards (MINS) , states shall ensure that every activity or substance that could prevent the protection and , conservation of the environment will be included under regulatory schemes, regardless of whether the activity or substance is presumed to be covered under another Act For example, “atomic wastes” have not been included under the Basel Conventions dealing with hazardous wastes, and currently “forestry” is proposed for exclusion from the Biodiversity Convention rather than being a protocol linked with the Biodiversity Convention, Climate Change Convention, Convention on Desertification or other relative conventions.

(10) PRECAUTIONARY PRINCIPLE

Through mandatory international standards, states shall invoke and ensure compliance with the precautionary principle.

The precautionary principle has been enunciated in international documents since at least the 1972 United Nations Conference on Humans and the Environment (Stockholm Convention), where it appeared in a rudimentary form; it was then reinforced in the 1982 UN Resolution 37/7, the World Charter of Nature, and then re-enunciated throughout the UNCED documents.

The precautionary principle has been enunciated” as follows:

where there is a threat of significant reduction or loss of biological diversity, lack of full scientific certainty should not be used as a reason for postponing measures to avoid or minimize such a threat” (Convention on Biological Diversity, UNCED, 1992)

This could be generalized into the following form:

where there are threats of serious or irreversible damage, the lack of full scientific certainty shall not be used as a reason for postponing measures to prevent environmental degradation

(Note: that the precautionary principle shall not be misconstrued to mean” that there is evidence but not scientific certainty that a particular practice, substance or activity is causing harm therefore we shall continue the practice; or the precautionary principle should not be used to justify not using an environmentally sound practice because it is not scientifically based.)

The precautionary principle shall be applied to all potentially harmful emissions, contaminants, agents of pollutants, or re-concentrated substances—created through imbalance in biogeochemical cycles

(11) ANTICIPATORY PRINCIPLE

States shall ensure that in all their activities and in the activities of corporations including transnational corporations there is adherence to the anticipatory principle.

In the international document's different aspects of the anticipatory principle are enunciated: proceeding with doubt, prevention and avoidance of costly subsequent means:

11.1. ENSURING DOUBT-DRIVEN ACTION

Activities which are likely to pose a significant risk to nature shall be preceded by an exhaustive examination; their proponents shall demonstrate that expected benefits outweigh potential damage to nature, and where potential adverse effect are not fully understood, the activities should not proceed (General Assembly Resolution, 37/7, 1982)

11.2. ENSURING PREVENTIVE MEASURES

A preventive approach, where appropriate, is crucial to the avoiding of costly subsequent measures to rehabilitate, treat and develop new water supplies. (18.45 Fresh water, Agenda 21)

Undertake measures to prevent soil erosion and promote erosion-control activities in all sectors. (13.16 Fragile ecosystem, Agenda 21)

11.3. TAKING INTO ACCOUNT CRADLE-TO-GRAVE APPROACH

taking into account the cradle-to-grave approach **by phasing out and eventually eliminating the production and consumption of hazardous waste to the management of hazardous wastes, in order to identify BEST practices for phasing out and eventually eliminating options for minimizing the generation of hazardous wastes, through safer handling, storage, disposal and destruction** (20.20 e Hazardous wastes, Agenda 21). 11.4. ENSURING THE MONITORING FROM CRADLE TO GRAVE

Governments, in collaboration with industry and appropriate international organizations, and **through the establishment of Mandatory International Normative standards** should develop procedures for monitoring the application of the cradle to grave approach, including environmental audits (20.20 e Hazardous wastes)

11.5. ENSURING FULL LIFE CYCLE CARE

promote efficient use of materials and resources, taking into account all aspects related to life cycles of products **including the phasing out and eventual elimination of toxic chemicals and the ensuring of BEST (Best Environmentally Sound Traditions) practices** (19.15 e, Toxic Chemicals, Agenda 21)

11.6. PROMOTING A CULTURE OF SAFETY

to promote a 'culture of safety' in all countries, especially those that are disaster-prone, the following activities should be carried out: (7.60, Disasters, Agenda 21)

11.7. ENSURING RESPONSIBLE CARE

Industry **shall be required** *should be encouraged* to (19.51 Toxic chemicals) "develop application of a 'responsible care' approach by producers and manufacturers towards chemical products, taking into account the total life cycle of such products (19.51 b. Toxic chemicals, Agenda 21)

11.8. REVISITING INSUFFICIENT OR OUTDATED CRITERIA OF ACCEPTANCE

Governments, in cooperation with relevant international organizations and programmes, should carry out national reviews, as appropriate, of previously accepted pesticides whose acceptance was based on criteria now recognized as insufficient or outdated and of their possible replacement with other pest control methods, particularly in the case of pesticides that are toxic, persistent and/or bio-accumulative. (19.55 b Toxic chemicals, Agenda 21)

11.9. RECOGNIZING THE NEED OF ANTICIPATORY POLICIES

Mindful of the need and importance to develop anticipatory policies and of preventing, mitigating and monitoring significant adverse environmental impact in general and more specifically in a trans-boundary context (Convention on Environmental Impact Assessment in a Transboundary Context, 1994)

The anticipatory principle shall be followed as a pro-active measure to ensure that substances and processes which are harmful to the environment or to human health are prevented from entering the environment. One aspect of the anticipatory principle is to determine in advance before extracting resources whether the extraction causes environmental harm or is culturally inappropriate to indigenous peoples whose territory is beyond the treaty frontier.

(12) PREVENTION PRINCIPLE AND “REVERSE ONUS “PRINCIPLE

Through mandatory international normative standards (MINS), States shall ensure that in all its activities and in the activities of corporations, including transnational corporations, there is adherence to the prevention principle and “reverse onus “principle

12.1. PREVENTION PRINCIPLE

Mandatory standards and technical regulations will be developed to prevent adverse effects of substances on the ecosystem including the adverse effects on the health of human and non-human species.

Adverse effects include, but are not limited to, toxicity, bio-accumulation, bio-concentration; persistence, destruction [depletion] of the stratospheric ozone layer, reduction of carbon sinks, increased greenhouse gases, increased human-induced climate change and global climate change, reduction or loss of biodiversity, as well as heat, light and electro-magnetic radiation, atomic radiation, thermal discharges, hormone mimicry, egg-shell thinning

Adverse effects include the above environmental effects and effect and impacts on human health.

NOTE: DEFINITION OF ‘ENVIRONMENT”

Environment

means the components of the earth and includes:

(a) air, land, water, sediment, soils

(b) all organic and inorganic matter, including living organisms such as humans and non-humans

(c) the interacting ecological systems that include components referred to in subclauses (a) and (b)

Adverse effects include the above environmental effects and effect and impacts on human health

12.2. INVOKING THE REVERSE-ONUS PRINCIPLE

Through mandatory international standards, states shall adopt the reverse-onus principle. With the reverse onus, the onus of proof shall shift from the opponents of an intervention having to demonstrate harm to the proponents of an intervention having to demonstrate safety.

13 DISASTER PREVENTION PRINCIPLE

13.1. ENSURING ADEQUATE REGULATORY ...MEASURES TO PREVENT DISASTERS

PREVENTION OF DISASTERS, including major technological disasters by ensuring adequate regulatory and other measures to avoid their occurrence and reducing the impacts of natural disasters and other emergencies on human settlements... (27 i, Habitat II, 1996) 3.2.

PROMOTING THE USE OF TOOLS FOR DISASTER PREVENTION

OF NATURAL, ANTHROPOGENIC AND INDUSTRIAL DISASTERS

Promote the use of tools for disaster prevention, mitigation, and preparedness in order to reduce the vulnerability of populations to natural, man-made and technological disasters (Article 75 (g) Habitat II, 1996).

The impact on people and human settlements of natural and human-made disasters is on the increase. Disasters are frequently caused by vulnerabilities created by human actions, **such as the consumption and production of ozone-depleting substances, of green-house gas emissions, of toxic, hazardous and atomic wastes;** such as uncontrolled or inadequately planned human settlements, lack of basic infrastructure and the occupation of disaster-prone areas, **and such as the continued production of arms and weapons of mass destruction, and the continued visits of nuclear powered vessels in urban ports.** Armed conflicts also have consequences that affect human settlements and the country as a whole and call for specific rehabilitation and reconstruction processes that may necessitate international involvement, at the request of the Government of the concerned country. The impact of such disasters and emergencies is especially severe in countries where prevention, preparedness, mitigation and response capacities are ineffective in dealing with such situations (Article 24. Habitat II, 1996).

13.3. IMPROVING NATURAL AND HUMAN-MADE DISASTER PREVENTION

In improving natural and human-made disaster prevention, preparedness, mitigation and response, Governments at the appropriate levels, including local authorities, and in close consultation and cooperation with such entities as insurance companies, non-governmental

organizations, community-based organizations, organized communities, the academic, health and scientific communities, **shall should:** (Article 126, Habitat II, 1996)

13.4. INCLUDING PARTICIPATION IN RECOGNIZING VULNERABILITY TO HUMAN-MADE AND NATURAL DISASTERS

Ensure that serious public concern about an activity or technology that could lead to preventable disaster be taken into consideration and the activity or technology shall be prevented or banned, and ensure that the participation in preparing and planning for non-preventable disaster *planning and management* of all **[stakeholders individuals and organizations of civil society with a wide range of experience and expertise, including particularly marginalized members of society such as. **]**, including women, children, the elderly, and people with disabilities, in recognition of their particular vulnerability to human-made and natural disasters (Article 126 a bis Habitat II, 1996) ;**

13.5 ENSURING REGULATIONS THAT WILL PREVENT PREVENTABLE ANTHROPOGENIC DISASTERS

ensuring regulations that will prevent preventable anthropogenic disasters and encourage continued *mobilization* of domestic and international resources for disaster reduction activities for non-preventable disasters (Article 126 (b) Habitat II, 1996);

Given that since the development of nuclear technology the most significant preventable anthropogenic disaster has been the preventing of nuclear-related disasters, and given that the outcome of nuclear disasters, including from nuclear arms and nuclear civil reactors, has had irreversible consequences that cannot be considered to have been remediated other than by forced reallocation ; and continues to have unexpected consequences; the global community, if it is to embark upon the prevention of preventable disaster, shall prevent the continued production of nuclear arms, the mining of uranium for the producing of nuclear arms, the testing of nuclear arms, the circulating and harbouring of nuclear-armed or nuclear-powered military vessels, and the using of civil nuclear reactors. It should be noted that at the 1972 UN Conference on Human Environment (UNCHE) held in Stockholm the states globally adopted the commitment in Article 26 to “eliminate the production of weapons of mass destruction” and twenty years later a Nobel Laureate Declaration called for the phasing out of civil nuclear reactors, and in 1994, and 1996 resolutions from the IUCN have called for the phasing out of the use of civil nuclear reactors. As a consequence of the development and testing of nuclear weapons, disasters with irreversible environmental consequences have occurred and communities have been displaced, there has to be an acknowledgment that there is no acceptable remediation to these nuclear disasters. The least that can be done for those who have been affected by nuclear disasters is to ensure that all states sign and ratified a treaty for the prohibition of nuclear weapons Until then there is a need for the safe resettlement of displaced populations especially those from small island developing States and coastal regions. There also has to be an acknowledgment that there is no real restoration of sites that have been exposed to radiation from nuclear disasters, otherwise the perpetuation of the belief in the possibility of restoration could justify the continued nuclear associated technologies.

13.6 PREVENTING DISASTERS THROUGH BUILDING A CULTURE OF SAFETY

Promote and encourage all parts of society to participate in disaster preparedness planning in such areas as water and food storage, fuel and first-aid, and in disaster prevention through activities that build a culture of safety (Article * 127 (d) Habitat II, 1996)

In order to prevent technological and industrial disasters, governments at the appropriate levels, including local authorities, as appropriate, should

(Article * 127 bis:

Pursue the objectives of preventing major technological accidents and limiting their consequences through, inter alia, land-use policies and the promotion of safe technology (Article 127 (a) Habitat II, 1996)

13.7. REMOVING IMMEDIATELY ANTI-PERSONNEL LAND MINES

Support work for immediate removal of anti-personnel land mines following the cessation of armed conflict (Article 128 (i) Habitat II, 1996);

13.8. PREVENTING POLLUTION AND EXPOSURE TO POLLUTION

DISCOURAGING DISPROPORTIONATE SITINGS

Prevent or minimize pollution and exposure to pollution from industrial facilities, while also promoting urban planning, housing and industrial siting initiatives that discourage the disproportionate sitings of polluting industrial facilities in areas inhabited by people living in poverty or those belonging to vulnerable and disadvantaged groups (Article * 84 e ter Habitat II, 1996)

13.9. PREVENTING AND MITIGATING ADVERSE ENVIRONMENTAL IMPACTS

Increasingly, cities have a network of linkages that extends far beyond their boundaries. Sustainable urban development requires consideration of the carrying capacity of the entire ecosystem supporting such development including the prevention and mitigation of adverse environmental impacts occurring outside urban areas. All trans-boundary movements of hazardous waste and substances should be carried out in accordance with relevant international agreements by parties to those agreements. Rapid urbanization in coastal areas is causing the rapid deterioration of coastal and marine ecosystems (Article * 79 Habitat II, 1996).

13.10. REDUCING SIGNIFICANTLY OR ELIMINATING ENVIRONMENTALLY HARMFUL SUBSIDIES

Reduce significantly or eliminate environmentally harmful **technologies**, subsidies and other programmes, such as those which stimulate the excessive use of pesticides and chemical fertilizers, and price control or subsidy systems that perpetuate unsustainable practices and production systems in rural and agricultural economies. (Article 122 (e) Habitat II)

13.11. TAKING INTO ACCOUNT INTERNATIONAL AGREEMENTS AND INSTRUMENTS

In seeking to prevent trans-boundary pollution and minimize its impacts on human settlements when it does occur, Governments should cooperate to develop appropriate mechanisms for

assessing the environmental impact of proposed activities that are likely to have a significant adverse impact on the environment, including an evaluation of relevant comments provided by other potentially affected countries. Governments should also cooperate to develop and implement mechanisms for prior and timely notification, exchange of information and consultation in good faith, and mitigation of the potential adverse effects regarding those activities, taking into account existing international agreements and instruments. (Article 99 bis Habitat II)

Through various international instruments states have undertaken to ban the use of production and consumption of ozone depleting substances (Vienna Convention on depletion of the ozone layer, 1985); to reduce the production of greenhouse gases and to conserve carbon sinks (Framework Convention on Climate Change, 1992); to identify biodiversity and to carry out and environmental impact assessment of activities that could contribute to the loss or reduction of biodiversity; to combat desertification (Convention on the Combating of desertification); to promote renewal energy (Chapter 9, Agenda 21) and to phase out fossil fuel (Habitat 1). To preserve cultural and natural heritage (Convention on the Protection of Cultural and Natural Heritage, 1972)

In addition, states have agreed to the precautionary principle, the anticipatory principle, the internalizing of environmental costs (environmental audit). Yet few states if any have taken the necessary measures.

13.12. INVOKING THE REVERSE-ONUS PRINCIPLE

Through mandatory international standards, states shall adopt the reverse-onus principle. With the reverse onus, the onus of proof shall shift from the opponents of an intervention having to demonstrate harm to the proponents of an intervention having to demonstrate safety.

Every proponent of an intervention in the ecosystem must demonstrate that the intervention will not cause harm to the environment or will not create ecologically unsound wastes

[NOTE THAT THE HONORABLE SHEILA COPPS, WHEN SHE WAS THE MINISTER OF ENVIRONMENT OF CANADA HAS CALLED FOR THE IMPLEMENTATION OF THE REVERSE ONUS.]



(14)

REFUSE OR REUSE TO AVOID MISUSE AND ABUSE PRINCIPLE

Citizens should be encouraged to refuse to use products that originate from inequitable and ecologically-unsound development and, in other cases where the products have been derived from equitable and ecologically sound development and practices, every effort shall be made to reuse the products.

(15)

NON-TRANSFERENCE OF HARMFUL SUBSTANCES OR ACTIVITIES PRINCIPLE

Through mandatory international normative standards (MINS), states shall ensure the prevention of the transference of substances or activities, harmful to the environment or human health to other parts of the state or to other states.

15.1. PREVENTING THE TRANSFER OF SUBSTANCES AND ACTIVITIES THAT ARE HARMFUL TO HUMAN HEALTH AND THE ENVIRONMENT

This principle was globally adopted at the UNCED:

States should effectively cooperate to discourage or prevent the relocation and transfer to other States of any activities and substances that cause severe environmental degradation or are found to be harmful to human health (Rio Declaration, UNCED)

This principle shall never be qualified by the excuse that the recipient state is willing to accept the harmful substances or activities. Also, the excuse of “Extraterritoriality” shall not be used as a device to justify the transferring these harmful substances and activities (i.e. what right do we have to impose our standards on other communities, regions or states—self-serving extraterritorialism-avoidance).

15.2. ENSURE AVOIDANCE OF DUMPING OF ENVIRONMENTALLY UNSOUND TECHNOLOGIES

Seeking to ensure that the process of technology transfer avoids the dumping of environmentally-unsound technologies on the recipients and that the transfer of environmentally-sound technologies and corresponding know-how in particular to developing countries, is on favourable terms, as mutually agreed, taking into account the need to protect intellectual property rights (Article *151 b Habitat II)

15.3. RECOGNIZING THAT THE USE AND TRANSFER OF ENVIRONMENTALLY SOUND TECHNOLOGIES IS A PREREQUISITE FOR “SOCIALY EQUITABLE AND ENVIRONMENTALLY SOUND DEVELOPMENT”

The use and transfer of environmentally sound *technologies* **practices** which have a profound impact on consumption and production patterns are prerequisites for **socially equitable and environmentally sound sustainable human settlements development**. **Advanced BEST (Best Environmentally Sound Traditions) practices and appropriate technologies and the knowledge-based systems which support their application offer new opportunities for more efficient use of human, financial and material resources, more sustainable industrial practices and new sources of meaningful employment. International agencies including UNCHS (Habitat) have an essential role in disseminating and facilitating access to information on BEST practices available technologies and options for their transfer. It is understood that the transfer of technology BEST practices includes assurances of adequate protection of intellectual property and mutually agreed allocation of commercial benefits, particularly those benefits that shall accrue to developing countries for traditional practices including those related to biodiversity, and biotechnology].**

(Article 151. Habitat II, 1966)

the use and transfer of environmentally-sound technologies that have a profound impact on consumption and production patterns are prerequisites for sustainable human settlements development. Advanced and appropriate technologies and the knowledge-based systems that support their application offer new opportunities for more efficient use of human, financial and material resources, more sustainable industrial practices and new sources of employment. International organizations have an important role to play in disseminating and facilitating access to information on technologies available for transfer. It is understood that the transfer of technology will take into account the need to protect intellectual property rights (Article 151 *Habitat II, 1966)

(16)

NOT RELAXING STANDARDS TO ATTRACT INDUSTRY PRINCIPLE

Through mandatory international normative standards (MINS), states shall not relax or change standards and technical regulations to attract industry.

This principle was enunciated in NAFTA:

The Parties recognize that it is inappropriate to encourage investment by relaxing domestic health, safety or environmental measures. Accordingly, a Party should not waive or otherwise derogate from, or offer to waive or otherwise derogate from such measures as an encouragement for the establishment, acquisition, expansion or retention in its territory of an investment of an investor. IF a Party considers that another Party has offered such an encouragement, it may require consultations with the other Party and the two Parties shall consult with a view to avoiding any such encouragement. (NAFTA Article 1114 ss 2)

In addition, states shall not refrain from establishing the highest standards to correspond to Mandatory International Normative Standards and Technical Regulations based on international principles, or not change existing high standards so as to attract industry

(17)

TRANSBOUNDARY PRINCIPLE

Through mandatory international normative standards, states shall take all measures necessary to ensure that activities under their jurisdiction or control are so conducted as not to cause damage by pollution to other States and their environment, and that pollution arising from incidents or activities under their jurisdiction or control does not spread beyond the areas where they exercise sovereign rights in accordance with this Convention. (Art. 194. 2., Law of the Seas, 1982)

(18)

RENEW ABILITY PRINCIPLE

All use of non-renewable resources shall be phased out, with firm time-lines. Renewable resources shall be harvested according to socially equitable and environmentally sound development principles:

(19)

BEST (BEST ENVIRONMENTALLY SOUND TRADITIONS) PRACTICES

ENVIRONMENTAL SOUNDNESS PRINCIPLE

Through mandatory international normative standards (MINS), states shall ensure that they use and that corporations including transnationals use BEST technology (best environmentally sound traditions)

There is no guarantee that the Best Available Technology will be ecologically sound. BAT may be the best available but it may not be good enough. It is important to support and

promote the development of and the use of BEST (Best Environmentally Sound Traditions). In the event that there is no BEST practice which can prevent the release of persistent or bio-accumulative toxics then the extractive or productive activities which produce the product or substance process should be changed; the activities and product phased out/outlawed, or the demand for the product reduced through public education. In this case, the industry involved shall be assisted in the conversion to alternative processes or products involving BEST practices.

Presumably, if there is a commitment to develop alternatives, there will be a concomitant responsibility to relocate funding from the current practices of mitigating of ecologically unsound practices of the “environment industry” to the preventing of ecologically

19.1. SUBSTITUTING ENVIRONMENTALLY SOUND ALTERNATIVES

In the international documents there is a commitment to develop ecologically sound alternatives. In particular, in Agenda 21 (UNCED) alternative ecologically sound practices have been advocated in the following way in the following sections:

There are often alternatives to toxic chemicals currently in use. Thus, risk reduction can sometimes be achieved by using other chemicals or even non-chemical technologies. The classic example of risk reduction is the substitution of harmless or less harmful substances for harmful ones. Establishment of pollution prevention procedures and setting standards for chemicals in each environmental medium, including food and water, and in consumer goods, constitute another example of risk reduction (19.45 Toxic chemicals)

Reduce over-dependence on the use of agricultural chemicals through alternative farming practices, integrated pest management and other appropriate means (19.50, Toxic chemicals)

Utilizing and producing environmentally [safe and] sound renewable energy resources, such as solar, wind, geothermal, hydropower and biomass (9.9g Atmosphere, Agenda 21)

Consider undertaking pilot projects that combine environmental protection and development functions with particular emphasis on some of the traditional environmental management practices or systems that have a good impact on the environment (13.21.a Fragile ecosystem, Agenda 21)

19.2. PROMOTING ENVIRONMENTALLY SOUND TECHNOLOGIES AND BEST PRACTICES

promoting education about, and training on, environmentally sound technologies, materials and products (Article 27 f quarter, Habitat II, 1966)

Establish laws and regulations aimed at preventing discrimination and barriers and, where such laws and regulations already exist, ensure their enforcement (Article 73 *(b) Habitat II, 1966)

[Modification of principles from the ten elements of sustainability developed by the Institute for Sustainable Forestry.]

1. BEST practices will protect, maintain and/or restore fully functioning ecosystems at all scales in both the short-and long-terms

2. BEST practices will maintain and/or restore surface and groundwater quality, quantity, and timing of flow, including aquatic and riparian habitat

3. BEST practices will maintain and/or restore natural processes of soil fertility productivity and stability.

4. BEST practices will maintain and/or restore natural processes of soil fertility, productivity and stability.

5. BEST practices will encourage a natural regeneration of native species to protect valuable native gene pools.

6. BEST practices will not include the use of artificial chemical fertilizers or synthetic chemical pesticides

19.3 DEVELOPING ENVIRONMENTALLY SOUND LAND-USE STRATEGIES

Develop, with the participation of all interested parties, comprehensive and environmentally sound land-use strategies at the local level. (Article*85 (d) Habitat II, 1966)

19.4 STIMULATING ...ENVIRONMENTALLY SOUND USE OF LAND

Apply transparent, comprehensive and equitable fiscal incentive mechanisms, as appropriate, to stimulate the efficient, accessible and environmentally-sound use of land, and utilize land-based and other forms of taxation in mobilizing financial resources for service provision by local authorities (Article 56 (d) Habitat II, 1966)

Land is essential for the provision of food, water and energy for many living systems, and it is critical to human activity. In rapidly growing urban areas, access to land is rendered increasingly difficult by the potentially competing demands of housing, industry, commerce, infrastructure, transport, agriculture and the need for open spaces and green areas, and the protection of fragile ecosystems. The rising costs of urban land and other factors prevent persons living in poverty and members of other *vulnerable marginalized* and disadvantaged groups from gaining access to suitable land, the location of which does not pose economic, environmental or health risks to the residents because of such reasons as proximity to polluting industrial facilities in appropriate geographical conditions or susceptibility to natural disasters. Bringing the development of urban areas into harmony with the natural environment, **especially within the carrying capacity of the ecosystem** and the overall system of settlements is one of the basic tasks to be undertaken in achieving a **socially equitable and environmentally sound sustainable** urbanized world. The *tools* mean **to for** achieving a physically more balanced development include not only specific urban and regional policies and legal, economic, financial, cultural and other measures, but also innovative methods of urban planning and design and of urban development, **and** revitalization *and management*. National, sub national and local

policies and problems need to be integrated. **[The precautionary principle/approach and the use of environmental and social impact assessment are essential].**

(Article [82 Habitat II, 1966)

19.4. PROTECTING WATER RESOURCES FROM HARMFUL EFFECTS OF HUMAN SETTLEMENTS

Land-use is closely related to water resource management because of the critical need to protect aquifers and other fresh-water resources from the harmful effects of human settlements. Special attention should be paid to guiding potentially hazardous activities away from the fragile areas. Oceans and coastal areas should be protected from land-based sources of pollution. (Article * 82 bis Habitat II, 1966)

19.5 ENCOURAGING AND PROMOTING THE APPLICATION OF LOW-ENERGY ENVIRONMENTALLY SOUND AND SAFE TECHNOLOGIES

ENCOURAGING AND PROMOTING TECHNOLOGY WITH REGULATORY MEASURES

Encourage and promote the application of low-energy, environmentally sound and safe manufacturing technologies backed by appropriate norms and effective regulatory measures (Article 71 * (b) Habitat II, 1996)

19.6 PROMOTING ENVIRONMENTALLY SOUND TRANSPORTATION

Environmentally sound transportation systems (27 d Habitat II, 1996))

19.7. REDUCING TRANSPORT DEMAND THROUGH PROMOTING OF SPATIAL DEVELOPMENT

promotion of spatial development patterns and communications policies that reduce transport demand (27 d) Habitat II, 1996)

Transport and communication systems are the key to the movement of goods, people, information and ideas, and to access to markets, employment, schools and other facilities and land use, both within cities and between cities, and in rural and other remote areas. The transportation sector is a major consumer of non-renewable energy and of land and is a major contributor to pollution, congestion and accidents. Integrated transport and land-use policy and planning can reduce the ill effects of current transport systems. People living in poverty, women, children, youth, older persons, people with disabilities are particularly disadvantaged by the lack of accessible, affordable, safe and efficient public transport systems (Article *102 Habitat II, 1996)

19.8. ENCOURAGING AND RESEARCHING DEVELOPMENT AND USE OF NON-MOTORIZED OR LOW-ENERGY TRANSPORT SYSTEMS

Promote through regulations use of renewable sources of energy and Encourage and research, development and use of non-motorized or low-energy transport systems and the use of renewable energy sources and technologies, such as solar, wind and biomass energy; developed states shall not transfer non-renewable, obsolete, or unsafe sources of energy to developing states (Article 101 (d) Habitat II, 1996).

19.9. EXCHANGING KNOWLEDGE ON ENVIRONMENTALLY SOUND SUBSTITUTE FOR LEAD GASOLINE

Encourage countries, in particular developing countries, to cooperate in exchanging knowledge, experience and know-how in the phasing out of lead gasoline, including the use of biomass ethanol as an environmentally sound substitute (Article 101 (e) Habitat II, 1996);

19.10. EDUCING NEGATIVE EFFECTS OF TRANSPORT ON THE ENVIRONMENT

REDUCING UNNECESSARY TRAVEL

DEVELOPING ALTERNATIVES OTHER THAN THE AUTOMOBILE

DEVELOPING ALTERNATIVE FUELS

Managing transport in human settlements should be done in a way that promotes good access for all to places of work, social interaction and leisure and facilitates important economic activities, including obtaining food and other necessities of life. This should be done while reducing the negative effects of transport on the environment. Transport-system priorities should be given to reducing unnecessary travel through appropriate land-use and communication policies, developing transport policies that emphasize mobility alternatives other than the automobile, developing alternative fuels and alternative fuel vehicles, improving the environmental performance of existing modes of transport, and adopting appropriate pricing and other policies and regulations (Article 102 * Habitat II, 1996).

19.11. PROMOTING AFFORDABLE, EFFICIENT AND ENERGY-SAVING MODES OF TRANSPORT Non-motorized transport is a major mode of mobility, particularly for low-income, vulnerable and disadvantaged groups. One structural measure to counteract the socioeconomic marginalization of these groups is to foster their mobility by promoting affordable, efficient and energy-saving modes of transport (Article *103 bis. Habitat II, 1996).

19.12. REDUCING THE NEED TO TRAVEL

Coordinate land-use and transport planning in order to encourage spatial settlement patterns that facilitate access to such basic necessities as workplaces, schools, health care, places of worship, goods and services, and leisure, thereby reducing the need to travel (Article 104 * (b) Habitat II, 1996).

19.13. PROMOTING COMMUNICATIONS AND TRANSPORT PLANNING TO REDUCE DEMAND FOR TRANSPORT

Promote the integration of land-use, communications and transport planning to encourage development patterns that reduce the demand for transport (Article *84(g) Habitat II, 1996).

Develop and implement integrated coastal zone management plans to ensure the proper development and conservation of coastal resources (Article *84 (g) bis Habitat II, 1996).

19.14. ENCOURAGING THE USE OF AN OPTIMAL COMBINATION OF MODES OF TRANSPORT

(Article 104 * (c) Encourage the use of an optimal combination of modes of transport, including walking, cycling and private and public means of transportation, through appropriate pricing, spatial settlement policies and regulatory measures Habitat II, 1996).

19.15. PROMOTING AND IMPLEMENTING DISINCENTIVE MEASURES THAT DISCOURAGE THE INCREASING GROWTH OF PRIVATE MOTORIZED TRAFFIC

ACKNOWLEDGING THAT CONGESTION IS DAMAGING **ENVIRONMENTALLY**

ENCOURAGING ALTERNATIVE TRANSPORT METHODS

Promote and implement disincentive measures that discourage the increasing growth of private motorized traffic and reduce congestion, which is damaging environmentally, economically and socially, and to human health and safety, through pricing, traffic regulations, parking and land-use planning and traffic abatement methods, and by providing or encouraging effective alternative transport methods, particularly to the most congested areas (Article **104** * (d) Habitat II, 1996).;

19.16. GIVING PRIORITY TO COLLECTIVE MEANS OF TRANSPORT WITH ADEQUATE CARRYING CAPACITY AND FREQUENCY

Provide or promote an effective, affordable, physically accessible and environmentally sound public transport and communication system, giving priority to collective means of transport with adequate carrying capacity and frequency that support basic needs and the main traffic flows (Article 104 * e Habitat II, 1996).;

19.17. PROMOTING, REGULATING AND ENFORCING QUIET USE EFFICIENT AND LOW-POLLUTING TECHNOLOGIES

Promote, regulate, and enforce BEST—Best Ecologically Sound Traditions— practices, and , during conversion, promote, regulate, and enforce quiet, use-efficient and low-polluting technologies, including fuel-efficient engine and emissions controls and fuel with a low level of polluting emissions and impact on the atmosphere and **actively fund and promote** other alternative forms of energy (Article 104 (f) Habitat II, 1996).;

19.18. PROMOTING PRACTICES AND CONSUMPTION THAT WILL CONSERVE...

Promote practices and consumption patterns that will conserve and protect freshwater and saltwater resources and top soil, as well as air and soil quality; (Article 98(a)

* brackets removed

Reduce significantly the degradation of the marine environment emanating from land-based activities, including municipal, industrial and agricultural wastes and run-off, which have a pernicious impact on the productive areas of the marine environment and coastal areas (Article *98 bis (c)Habitat II, 1996).

19.19. PROMOTING ENVIRONMENTALLY SOUND RENEWABLE ENERGY

Access to sustainable sources of energy (Article 66* (f) Habitat II)

Reducing energy consumption

Provide incentives for engineers, architects, planners and contractors and their clients to design and build accessible energy-efficient structures and facilities by using locally available resources and to reduce energy consumption in buildings in use (Article *69 (h) Habitat II, 1996).

Intensify and support research efforts to find substitutes for or optimize the use of non-renewable resources, and to reduce their polluting effects and paying special attention to recycling, re-use of waste materials and increased reforestation;] (Article * 71 [(a) Habitat II, 1996).

Encourage and promote the application of low-energy, environmentally sound and safe manufacturing technologies backed by appropriate norms and effective regulatory measures (Article 71 * (b) Habitat II, 1996).

19.20. INTENSIFYING AND SUPPORT RESEARCH INTO SUBSTITUTES

Intensify and support research efforts to find substitutes for *or optimize the use of non-renewable resources, particularly fossil fuels, and to reduce their polluting effects and paying special attention to recycling, re-use of waste materials and increased reforestation;*

Reaffirm the obligation undertaken in 1981 through the General Assembly Resolution at the UN Conference on New and renewable Sources of Energy to move through “the transition form the present international economy based primarily on hydrocarbons to one based increasingly on new and renewable sources of energy. In addition, establish a time-table for the phasing out of the use of fossil fuel and of civil nuclear energy as proposed in the 1992 Nobel Laureate Declaration (Article **71 [(a) Habitat II, 1996).**

19.21. PROVIDING ENVIRONMENTALLY SOUND SHELTER

adequate shelter for all ...through the development and improvement of shelter that is environmentally sound (2 bis)

integrating a gender perspective in the design and implementation of environmentally sound and sustainable resource management mechanisms, production techniques and infrastructure development in rural and urban areas (27 d)

19.22. ADVOCATING INTERTRANSFER OF BEST PRACTICES RATHER THAN NORTH-SOUTH TECHNOLOGY TRANSFER

Through mandatory international normative standards (MINS) states shall compile innovative BEST local practices that is not damaging to the environment in the way that the current over-consumptive model of consumption is. Industrialized states shall seriously explore the innovative technological developments of traditional local practices, and thus not presume that the industrialized technological fixes are the most appropriate even in industrialized state context.

(20)

TRADITIONAL PRACTICES PRINCIPLE

20.1. PROMOTING TRADITIONAL AND INDIGENOUS PRACTICES

Through international standards states shall refrain from imposing external devised technologies and encourage the development of BEST local and indigenous technologies:

Throughout the UNCED documents there is a call for the respect of indigenous practices, and local technologies:

"Promote development in accordance with indigenous practices and adopt technologies appropriate to local conditions (7.42 c)

the promotion of sustainable production systems such as traditional methods of agriculture, agroforestry, forestry, range and wildlife management, which use, maintain or increase biodiversity (15.5 Biodiversity)

" consider undertaking pilot projects that combine environmental protection and development functions with particular emphasis on some of the traditional environmental management practices or systems that have a good impact on the environment (13.21.a Fragile ecosystem)

" Collect and record information on indigenous conservation and rehabilitation practices and farming systems as a basis for research and extension programmes. (14.47 c, Agriculture)

" Governmentsshould ... Recognize and foster the traditional methods and the knowledge of indigenous people and their communities, emphasizing the particular role of women, relevant to the conservation of biological diversity and the sustainable use of biological resources, and ensure the opportunity for the participation of those groups in the economic and commercial benefits derived from the use of such traditional methods and knowledge (15.4, g Biodiversity)

" Take effective economic, social and other appropriate incentive measures to encourage the conservation of biological diversity and the sustainable use of biological resources, including the promotion of sustainable production systems, such as traditional methods of agriculture, agroforestry, forestry, range and wildlife management, which use, maintain or increase biodiversity (15.5 d Biodiversity)

" Take effective economic, social and other appropriate incentive measures to encourage the conservation of biological diversity and the sustainable use of

biological resources, including the promotion of sustainable production systems, such as traditional methods of agriculture, agroforestry, forestry, range and wildlife management, which use, maintain or increase biodiversity (15.5 d Biodiversity)

" Take action where necessary for the conservation of biological diversity through the in-situ conservation of ecosystems and natural habitats, as well as primitive cultivars and their wild relatives, and the maintenance and recover of viable populations of species in their natural surroundings. 15.6 g. Biodiversity)

Governments... consistent with the requirements of international law should, as appropriate collect, assess and make available relevant and reliable information in a timely manner and in a form suitable for decision-making at all levels, with the full support and participation of local and indigenous people and their communities.

(15.6 f Biodiversity)

"promotion of collaborative research programmes... fostering of traditional methods and knowledge of such groups (local and indigenous) in connection with these activities. (16.7 b Biotechnology)

States shall cooperate with a view to the conservation of marine mammals and, in the case of cetaceans, shall in particular work through the appropriate international organizations for their conservation, management and study (17.50 Marine)

20.2. PROMOTING INDIGENOUS PLANNING AND DESIGN TECHNIQUES

Encourage and support research and studies to promote and develop indigenous planning and design techniques, norms and standards to match with the actual needs of local communities, **and as agreed in the “Establishment of a New Economic Order, to support the use of natural material, and as agreed in Habitat I to support the use of endogenous technology** (Article 69(a) Habitat II, 1996);

20.3. ENCOURAGING AND SUPPORTING THE USE OF ...LOCAL BUILDING MATERIALS

Encouraging and supporting the use of appropriate building technology and the production of local building materials, as well as supporting the development of international, sub regional and regional networks of institutions involved in research, production, dissemination and

commercialization of locally produced building materials (Article 152 * c bis merged with d bis) Habitat II, 1996);

20.4. STRENGTHENING THE INDIGENOUS BUILDING MATERIALS INDUSTRY

strengthening the indigenous building materials industry, based as far as possible on locally available resources. (51 d Habitat II, 1996))

Provide data base on adverse environmental effects of building materials (51d Habitat II, 1996))

(21)

COUPLING-AVOIDANCE PRINCIPLE

The coupling-avoidance principle involves the avoidance of coupling of a “clean-up environment” industry with a toxic, hazardous or atomic waste producer in order to justify the continuation of the production of toxic hazardous or atomic wastes.

Through mandatory international normative standards (MINS) states shall not accept the “environment-industry” being coupled with the toxic hazardous, and atomic waste production industry as a means of justifying the continuation of the toxic, hazardous and atomic waste producing activity.

(22)

SOLUTION-WORSE-THAN-PROBLEM-AVOIDANCE PRINCIPLE

This principle involves the avoidance of the advocating of a “solution” that is potentially worse than the problem to be addressed. For example, the civil nuclear power industry is promoting nuclear energy as the solution to climate change.

Through mandatory international normative standards (MINS), states shall not accept a solution that is worse than the problem

(23)

ENVIRONMENTAL AUDITS AND ECOLOGICAL CONSEQUENCES PRINCIPLE

States shall ensure environmental audits and the taking into account of all ecological consequences

23.1. INCLUDING OF ECOLOGICAL CONSEQUENCES IN ANALYSIS OF COSTS

In international documents there is the recognition of the importance of environmental audits, and of the taking into consideration of ecological consequences:

Governments,...should develop procedures for monitoring the application of the cradle to grave approach, including environmental audits (Agenda 21, 20.20 e)

Ensure that relevant decisions are preceded by environmental impact assessments and also take into account the costs of any ecological consequences (Agenda 21, 7.42)

23.2. INCORPORATING ECOLOGICAL CONSEQUENCES AND ENVIRONMENTAL AUDITS WITHIN FULL COST METHODS.

The costs to the environment of continuing with ecologically unsound practices rather than the cost to industry of introducing ecologically sound practices shall be considered.

It is equally important to ensure that, in carrying out an environmental assessment on a particular substance or activity that could have potential adverse environmental effects, other ecologically sound alternative practices shall also be assessed. If the precautionary principle is to be applied in the assessment of costs, the full environmental costs have to be taken into consideration, as well as the full economic costs of monitoring and enforcement of legislation to regulate ecologically unsound practices, and the projected economic costs and environmental costs of accidents, and restoration if accidents occur. If the “ecological costs are horrendous”, no economic benefits will justify the costs.

23. 3. ASSESSING FULL ECONOMIC COSTS OF ECOLOGICALLY UNSOUND PRACTICES AND OF FULL ECONOMIC BENEFITS OF PREVENTION:

The introduction of ecologically unsound practices has inordinate, extensive, unexpected short-term and long-term economic costs, including the following:

- the cost of monitoring, investigation, enforcement, and conviction.;**
- the costs of subsidies—taking research dollars from developing ecologically sound alternatives;**
- the costs of inappropriate funding for attempts to rectify previous errors;**
- the costs to displaced disenfranchised indigenous peoples;**
- the costs of rehabilitation of ecologically devastated sites;**

- the costs of loss of biodiversity; costs of loss of resources— destruction of fish habitat;
- the costs of health impacts on employees.

• Financial benefits associated with toxics use reduction can include reduced raw material costs, reduced effluent and emissions monitoring and control costs, reduced energy use, reduced water use, reduced liability ... (from submission to Department of Ecology by Carol Dansereau, Director, Industrial Toxics Project, Washington Toxics Coalition, May 4, 1994)

• Companies may be unaware of the benefits or may opt to limit short-term investments despite longer term savings. Thus, in the absence of regulations, they might continue to avoid very reasonable available technologies that protect the environment better by preventing pollution (from submission to Department of Ecology by Carol Dansereau, Director, Industrial Toxics Project, Washington Toxics Coalition, May 4, 1994)

- It is incumbent upon society and government to strive towards high standards so that the segment of industry (prevention-technology or techniques industry—BEST industry) dedicated to developing ecologically sound alternatives will be at an economic advantage
- The technique of assessing the complexity of the multiple costs must be used. This technique could be extended to re-evaluate the totality of spending including the excessive costs of maintaining the global military (800 billion), when the money from the military could be transferred to assist in the conversion to an ecologically sound and equitable society.
- A full life-cycle analysis of the economic and environmental costs through time and space of each substance and activity shall be carried out.
- The independent assessment of full economic costs shall be carried out by the Auditor General's office
- The establishment of the highest possible mandatory standards, legal enforcement mechanism, and support structures for ensuring that prevention techniques are economically feasible.

23.4. ASSESSING OF FULL ENVIRONMENTAL AND HUMAN HEALTH IMPACT COSTS OF INACTION OR NON-PREVENTION

Ecological and equitable “back-casting” — “going to the future though the present “moving from vision to measures to implement the vision — must be supported. If the vision is to adopt a prevention and precautionary approach to interventions into the ecosystem, anything that detracts or deters from that vision should be seriously

questioned, and the justification of the continuing the questionable practices should come under serious scrutiny. In other words, if unacceptable present and future ecological consequences are likely to occur, the activity shall not proceed and the substance shall not be used.

- the enunciation of an “ecological imperative” as part of a long-term complex solution

- “The difficulty of assessing environmental impacts cannot be used as an excuse for ignoring them. (from submission to Department of Ecology by Carol Dansereau, Director, Industrial Toxics Project, Washington Toxics Coalition, May 4, 1994)

- The presence of ecological irreversible consequences shall be deemed to be beyond an acceptable risk, and thus not subject to the usual means of quantification. In this event, the anticipatory, precautionary, and reverse onus principle shall apply, and the activity or substance shall be banned or phased out

- Ecological, and equitable consequences, and health impact consequences must be examined in full complexity through time and space

- in the event that the activity or substance has been proven to have caused environmental degradation, or to be able to cause long term ecological consequences, the activity shall cease or the use of the substance shall be banned or phased out.

- No economic benefit shall be used to justify the violation of ecological rights— right to a safe environment and the right to an ecological heritage, and the integrity of the ecosystem. Economic benefits must be seen in the context of ecosystem primacy; otherwise long-term future ecological and humanitarian rights— right to food, safe water, health care and shelter will be compromised

- In determining whether the [technology] emission limitation is sufficient to protect health, welfare and the environment, {governments} must consider all known and suspected impacts, including but not limited to mutagenicity, teratogenicity, neurological damage, development damage, immune suppression, organ damage, reproductive impairment, and hormone mimicry.

- Procedures to ensure that an environmental assessment review of any practices or substances that could contribute to the loss or reduction of Biodiversity shall be in place

- Assessment of full costs of violating the rights of the disenfranchised shall be carried out. The groups bearing the greatest impact from ecologically unsound practices and disposal of toxic, hazardous, and atomic wastes are often the disenfranchised in society.

24

ENVIRONMENTAL ASSESSMENT REVIEW PRINCIPLE

24.1.

24.2 COMPLYING WITH THE ENVIRONMENTAL ASSESSMENT REVIEW PRINCIPLE

The essence of this principle can also be traced through the 1972 Stockholm Convention, and the UN Resolution 37/7, as well as in the UNCED documents, where it is enunciated in the following way:

ASSERTION OF THE AVOIDANCE OF ACTIVITIES PRINCIPLE

Activities which are likely to cause irreversible damage to nature shall be avoided (UN Resolution 37/7 1982)

Introduce appropriate procedures requiring environmental impact assessment of its proposed projects that are likely to have significant adverse effects on Biological diversity with a view to avoiding or minimizing such effects, and where appropriate, allow for public participation in such procedures (Article 14, 1A, Convention on Biological Diversity)

24.3 REQUIRING A LEGITIMATE ENVIRONMENTAL IMPACT ASSESSMENT

Through mandatory international normative standards, states shall require a legitimate environmental assessment review of any practice, activity or substance that could have significant adverse environmental effects. An actual assessment of the short and long term potentially adverse environmental effects of existing and proposed projects and activities shall be carried out. It is understood that a review of a project or activity to assess the "environmental, economic, social, cultural, heritage, health effects of the reviewable projects" is not a legitimate environmental impact assessment.

23.7. REQUIRING COST RECOVERY FOR ENVIRONMENTAL IMPACT ASSESSMENT AND FOR MONITORING AND ENFORCING REGULATIONS

Industries that are permitted to engage in environmentally unsound practices that require regulations and enforcement shall bear the full cost of the additional charges incurring as a result of governments having to ensure compliance with regulations. In addition, for all proposals, projects, activities that intervene in an environmentally unsound way in the ecosystem, and that are deemed to require an environmental assessment review, governments shall recover the full costs of the review.

(25)

COST RECOVERY PRINCIPLE

23 bis 1. REQUIRING COST RECOVERY FOR ENVIRONMENTAL IMPACT ASSESSMENT AND FOR MONITORING AND ENFORCING REGULATIONS

Industries that are permitted to engage in environmentally unsound practices that require regulations and enforcement shall bear the full cost of the additional charges incurring as a result of governments having to ensure compliance with regulations. In addition, for all proposals, projects, activities that intervene in an environmentally unsound way in the ecosystem, and that are deemed to require an environmental assessment review government shall recover the full costs of the review.

(26)

ENVIRONMENTALLY RESPONSIBLE INVESTMENT PRINCIPLE

24.1. ENCOURAGING SOCIALLY AND ENVIRONMENTALLY RESPONSIBLE COMMUNITY INVESTMENT

(Article * 157 e bis Encourage public-private partnerships in socially and environmentally responsible community investment and reinvestment in shelter and sustainable human settlements programmes and make publicly available and accessible the data and best practices developed through them Habitat II, 1996);

24.2. PROMOTING SOCIALLY AND ENVIRONMENTALLY RESPONSIBLE CORPORATE INVESTMENT (31 D)

Strengthening regulatory and legal frameworks to enable markets to work, overcome market failure and facilitate independent initiative and creativity, as well as to promote socially and environmentally responsible corporate investment.... (31 d Habitat II)

(27)

POLLUTER PAY PRINCIPLE

States shall enforce the Polluter Pay Principle to ensure that those who may release polluting substances into the environment pay the full-cost of environmentally safe handling, treatment, disposal, and remediation; in addition, permits shall be suspended and canceled, if the polluter has caused serious irreversible ecological damage, and criminal charges laid. Mens Rea shall not have to be proved, executives and directors of the company shall be subject to potential criminal charges, and the excuse of due diligence is no longer acceptable.

25.1. TAKING INTO ACCOUNT THE POLLUTER-PAY PRINCIPLE

In different section of Agenda 21, the polluter Pay principle is advocated:

' Governments should include in national planning and legislation an integrated approach to environmental protection, driven by prevention and source reduction criteria, taking into account the 'polluter pays' principle, and adopt programmes for hazardous waste reduction, including targets and adequate environmental control (20.20 b Hazardous Wastes, Agenda 21)

" Governments should ...(b) apply the 'polluter pays' principle, where appropriate, by setting waste management charges at rates that reflect the costs of providing the service and ensure that those who generate the wastes pay the full cost of disposal in an environmentally safe way (21.42 b Solid wastes, Agenda 21)

25,2. DEVISING ...NEW FISCAL INSTRUMENTS THAT PENALIZE ENVIRONMENTAL DAMAGE FROM BOTH PRODUCTION AND CONSUMPTION ACTIVITIES

Develop efficient, equitable and buoyant sources of national and local revenues, including taxation, user charges, tariffs and betterment ~~fees~~ **levies** to promote national and local capacity for capital investment in housing, infrastructure and basic services; and devise, as appropriate, new financial instruments **which are conditional on mandatory international normative standards (MINS) including the penalizing *penalize* of environmental damage arising from both production and consumption of environmentally unsound activities (NGO Composite);**

* (c) Develop efficient, fair, equitable and buoyant sources of national and local revenue, including taxation, user charges, tariffs and betterment levies, to promote national and local capacity for capital investment in housing, infrastructure and basic services, and devise, as appropriate, new fiscal instruments that penalize environmental damage from both production and consumption activities (140 (c) Habitat II, 1996).

(28)

COMPENSATION PRINCIPLE

Through mandatory international normative standards (MINS), states shall require corporations including transnationals to pay compensation for environmental degradation, and for human rights violations.

Given that corporate-sympathetic government regimes have failed in the past both to ensure corporate compliance with international obligations, and to enforce their own statutory legislation, and given that there has been resultant environmental degradation and human rights violations, states shall now seek environmental compensation from companies that can be shown to have contributed to environmental degradation or human rights violations. The funds from environmental compensation shall be put into a restoration fund, into developing BEST (Best Ecologically Sound techniques) and into addressing human rights violations.

Often industries that have contributed to environmental degradation seek compensation from states when areas are taken out of production for environmental

reasons. Any potential compensation shall be assessed against the estimate of previous ecological consequences.

States shall ensure that the cost of potential compensation is not used as justification for not fulfilling the duty to preserve, protect, and conserve the environment

(29)

REHABILITATION PRINCIPLE

27.1. ENSURING PREVENTIVE MEASURES

A preventive approach, where appropriate, is crucial to the avoiding of costly subsequent measures to rehabilitate, treat and develop new water supplies.
(18.45 Fresh water, Agenda 21)

There exists a notion that environmental degradation is reversible; it can be restored, and rehabilitated. This notion shall never be used as a justification for the causing of environmental degradation

27.2. PROTECTING THE LIVING ENVIRONMENT AND RESTORING CONTAMINATED LAND

In cooperation with the international community, promote the protection of the living environment and strive to restore contaminated land, air and water to levels acceptable for **socially equitable and environmentally sound** *sustainable* human settlements (Habitat 97 (j)).

(30)

CHANGE THROUGH AWARENESS AND EDUCATION PRINCIPLE

Through international standards an educational program called principle-based education could be expanded. Principle-based education is based on a conceptual framework of international principles.

In chapter 36 of Agenda 21, a very important distinction is made between promoting "education," promoting "public awareness," and promoting "training." It appears to be clear in Agenda 21 that non-governmental organizations, community-based groups, women's groups and aboriginal groups are called upon to assist educational authorities in reorienting education. The role of industry is ascertained to be limited to specific areas of business and industrial and training programs.

Educational authorities, with appropriate assistance of non-governmental organizations, including women's and indigenous peoples' organizations should

promote all kinds of adult education programmes for continuing education in environment and development, basing activities around elementary/secondary schools and local problems. The authorities and industry should encourage business, industrial and agricultural schools to include such topics in their curricula. The corporate sector could include sustainable development in their education and training programmes. Agenda 21, Chapter 36.5 I

In the section of Agenda 21 that addresses the "promoting of public awareness " industry is included not as the dispenser of "education" but as the recipient of needed education.

"Countries and regional organizations should be encouraged, as appropriate, to provide public environmental and development information services for raising the awareness of all groups, the private sector and particularly decision makers. (Agenda 21, section 36.10 c)

In the section of Agenda 21, that addresses the "promoting of training, an important role for industry is envisioned.

To strengthen national capacities, in training, to enable governments, employers and workers to meet their environmental and development objectives and to facilitate the transfer and assimilation of new environmentally sound, socially acceptable and appropriate technology and know-how (Agenda 21, 36.13 c)

(31)

ARMS LENGTH RESEARCH PRINCIPLE

This principle holds that most of the current research that has been used to support the continuation of the current model of development has arisen from non-arms length research by vested interests, and that if the urgency of the global situation is to be addressed arms-length non-vested interest research has to be relied on.

(32)

CULTURAL APPROPRIATENESS PRINCIPLE

Through mandatory international standards, states shall ensure that the rights of Indigenous peoples are guaranteed:

30.1. AFFIRMING OF POSITIVE-DUTY-TO PROTECT-INDIGENOUS-LANDS

the lands of indigenous people and their communities should be protected from activities that are environmentally unsound or that the indigenous people concerned consider to be socially and culturally inappropriate (16.3. ii, Agenda 21)

30.2. ACKNOWLEDGING THAT RURAL AND INDIGENOUS PEOPLES ENSURE THE...SUSTAINING SOCIAL AND ECOLOGICAL BALANCE

Rural populations, including indigenous people, play an important role in **demonstrating to urban populations practices of living within the carrying capacity of the ecosystem, in providing evidence of BEST practices**, in ensuring food security and in sustaining the social and ecological balance over large tracts of land in many nations and thus contribute significantly to the task of protecting biodiversity and fragile ecosystems and to the sustainable use of biological resources. (Art 118 Habitat II)

30.3. DEVELOPING OF POLICIES AND PROGRAMMES TO PREVENT ENVIRONMENTAL DEGRADATION OF LAND THROUGH INTEGRATING INDIGENOUS WOMEN ...

Integrate indigenous women, their perspectives and knowledge on an equal basis with men, in decision-making regarding human settlements, including sustainable resources management and the development of policies and programmes for sustainable development, including, in particular, those designed to address and prevent environmental degradation of land (Art 90, quart c Habitat II)

(33)

INTERGENERATIONAL EQUITY PRINCIPLE

31.1. RESPECTING THE RIGHTS OF FUTURE GENERATIONS

Through mandatory international standards, states shall respect intergenerational equity.

The obligation to future generation has been enunciated as a principle for over twenty years, and should be incorporated as a principle in the establishment of the international standards. This obligation to future generation can be traced in the following way:

In the United Nations Convention for the Protection of Cultural and Natural Heritage:

Each State Party to this Convention recognizes that the duty of ensuring the identification, protection, conservation, presentation and transmission to future generations of the cultural and natural heritage referred to in articles 1 and 2 and situated on its territory, belongs primarily to that State. (United Nations Convention for the Protection of Cultural and Natural Heritage, 1972)

In the Stockholm Convention of 1972, the requirement to preserve our environmental heritage and the requirement to save a representative sample of natural ecosystems for future generations were being recognized:

The natural resources of the earth including the air, water, land, flora and fauna and especially representative samples of natural ecosystems must be safeguarded for the benefit of present and future generations (Principle 2)

Man has a special responsibility to safeguard and wisely manage the heritage of wild life and its habitat which are now gravely imperiled by a combination of adverse factors (Principle 4),

In UN Resolution 37/7, 1982

Reaffirming that man [humans] must acquire the knowledge to maintain and enhance his ability to use natural resources in a manner which ensures the preservation of the species and ecosystems for the benefit of present and future generations, (UN Resolution 37/7, 1982)

In the Convention of Biological Diversity

"to conserve and sustainably use biological diversity for the benefit of present and future generations (Biodiversity Convention, UNCED, 1992)

and in the Framework Convention on Climate Change:

" to protect the climate system for present and future generations"

The principle of considering the need to preserve ecological heritage for future generations, because of its continued inclusion in international documents, has become a principle of international customary law.

Continued depletion of resources upon which future generations depend are being depleted

Around the world many of the basic resources on which future generations will depend for their survival and well-being are being depleted and environmental degradation is intensifying, driven by unsustainable patterns of production and consumption, unprecedented growth in population, widespread and persistent poverty, and social and economic inequality (Preamble, 1.2. International Conference on Population and Development, 1994)

(34)

COMMON GOOD PRINCIPLE

32.1. CONTRIBUTING TO COMMON GOOD

All people have rights and must also accept their responsibility to respect and protect the rights of others- including future generations and to contribute actively to the common good.... (Article 79 Habitat II)

(35)

EQUALITY and EQUITY PRINCIPLE

33.1. AFFIRMING FUNDAMENTAL HUMAN RIGHTS

... faith in fundamental human rights, in the dignity and worth of human person and in the equal rights of men and women and have determined to promote social progress and better standards of life in large freedom (Preamble, Universal Declaration of Human Rights, 1948)

(36)

COMMUNITY INVOLVEMENT WITHIN A FRAMEWORK OF INTERNATIONAL PRINCIPLES

While decentralized, participatory planning are important features of a decision-making process, the planning should be grounded in fundamental principles related to the enshrining and guaranteeing of human rights, the ensuring of social justice, the preserving, protecting and conserving of the environment, and the promoting of peace. It should be acknowledged that although there has been some increased participation by

individuals and groups of civil society in bringing about the necessary global changes for the establishment of socially equitable and environmentally sound development of communities, there is a long way to go to achieve the necessary access to and meaningful participation and involvement of civil society.

(37)

DOCTRINE OF LEGITIMATE EXPECTATIONS

The obligations undertaken by governments in

ratifying these instruments are the standards against which they should be held accountable, both by their own citizenry and by actors in the international arena (International Human Rights Safeguards, Document for the Summit of the Americas, 1994).

The above statement alludes to two key questions that the Charter of Obligations has been devised to address. One is “what constitutes obligations?” and “what constitutes ‘civil society’?” The use of the term “Obligations” in this Charter is based on a key doctrine called the Doctrine of Legitimate Expectation. This doctrine could be enunciated as follows, and contains the following elements:

- **Not breaking and undertaking as one pleases**
- **Compatibility with public duty**
- **Public interest may be better served by honouring their undertaking than by breaking it**

But that principle does not mean that a corporation can give an undertaking and break it as they please. So long as the performance of the undertaking is compatible with their public duty, they must honour it. And I should have thought that this undertaking was so compatible.... The public interest may be better served; by honouring their undertaking than by breaking it. (Lord Denning, Central London Property Trust Ltd. v High Trees House Ltd. [1947] KB 130, 594

- **Fulfilling the expectation must assist in performing rather than inhibit the performance of its statutory duties**

If I thought that the effect of granting to the applicants the relief sought was to prevent the council validly using those powers which Parliament has conferred on it, I would refuse relief. But that is not the present case. It seems to me the relief claimed will in the end, as counsel for the corporation ultimately conceded assist the council to perform rather than inhibit the performance of its statutory

duties" (Lord Roskill *Central London Property Trust Ltd. v High Trees House Ltd.*
[1947] KB 130, 596)