GS-C1

GREEN SEAL™ PILOT SUSTAINABILITY STANDARD FOR

COMPANIES

PART 1: PRODUCT MANUFACTURERS

FIRST EDITION August 28, 2009

THE MARK OF ENVIRONMENTAL RESPONSIBILITY

Green Seal, Inc. • 1001 Connecticut Ave. NW, Ste 872 • Washington, DC USA 20036-5525
(202) 872-6400 • FAX (202) 872-4324 • www.greenseal.org

GREEN SEAL™

Green Seal is a non-profit organization devoted to environmental standard setting; certification of products, services, and companies; and public education. Green Seal's mission is to work towards environmental sustainability by identifying and promoting environmentally responsible products, purchasing, and production. Through its standard setting, certification and education programs, Green Seal:

- identifies products, services, and companies that are environmentally preferable;
- offers scientific analyses to help consumers make educated purchasing decisions regarding environmental impacts;
- ensures consumers that any product; services, and companies bearing the Green Seal Certification Mark has earned the right to use it; and
- encourages manufacturers to develop new products and services that are significantly less damaging to the environment than their predecessors.

The intent of Green Seal's environmental requirements is to reduce, to the extent technologically and economically feasible, the environmental impacts associated with the manufacture, use and disposal of products and the provision of services. Set on a category-by-category basis, Environmental Standards focus on significant opportunities to reduce a product, service, or company's environmental impact.

Green Seal offers certification to all products, services, and companies covered by its Standards. Manufacturers may submit their products, services, and companies for evaluation by Green Seal. Those which comply with Green Seal's requirements may be authorized to use the Green Seal Certification Mark on products, services, and in advertising. Companies authorized to use the Green Seal Certification Mark for their product, service, or company are subject to an ongoing program of testing, inspection, and enforcement.
For additional information on Green Seal or any of its programs, contact:

Green Seal
1001 Connecticut Avenue, NW, Suite 827
Washington, DC 20036-5525
(202) 872-6400
www.greenseal.org

GREEN SEAL™
PILOT SUSTAINABILITY STANDARD FOR COMPANIES
PART 1: PRODUCT MANUFACTURERS (GS-C1)

TABLE OF CONTENTS

FOREWORD 6

LIST OF ACRONYMS AND TERM 8

1.0 SCOPE 9

2.0 DEFINITIONS 10

3.0 SOCIAL AND ENVIRONMENTAL PERFORMANCE REQUIREMENTS 21

3.1 CORPORATE LEVEL REQUIREMENTS. 21
3.1.1 Social and Environmental Policy 21
3.1.2 Social and Environmental Roles and Responsibilities. 21
3.1.3 Corporate Environmental Management System 22
3.1.4 Socially and Environmentally Responsible Purchasing 22
3.1.5 Company Role in Social and Environmental Public Policy 22
3.1.6 Publically Available Annual or Sustainability Report 23
3.1.7 Compliance 23
3.1.8 Social and Environmental Responsibility Operating Procedures 23
3.1.9 Social and Environmental Responsibility Training 24

3.2 KEY SOCIAL AND ENVIRONMENTAL SECTORS 24
3.2.1 Labor and Workplace 25
3.2.1.1 Fair Labor and Workplace Requirements 25
3.2.1.1.1 Fair Labor and Workplace Practices Verification 25
3.2.2 Community Engagement 26
3.2.2.1 Expanding Opportunity 26
3.2.2.2 Community Development 27
3.2.3 Greenhouse Gas Emissions 27
3.2.3.1 EPA Climate Leaders Partner, or Equivalent 27
3.2.3.2 Company-Wide GHG Emissions Inventory 28
3.2.3.3 Agressive GHG Emissions Reduction Goal 29
3.2.3.4 Management Plans for GHG Emissions and Emissions Inventory 30
3.2.3.5 Annual Reporting 30
3.2.4 Water Use 31
3.2.4.1 Water Conservation Goals and Management Plan 31
3.2.4.2 Water Use Tracking 31
3.2.4.3 Water Conservation Performance 32
3.2.5 Waste Reduction and Management 32
3.2.5.1 Waste Reduction Goals and Management Plan 32
3.2.5.2 Total Waste Audit 33
3.2.5.3 Total Waste Reduction 33
3.2.5.4 Total Waste Diversion 33
3.2.5.5 Solid Waste Recycling 34
3.2.6 Toxicity 34
3.2.6.1 Safer Chemistry Planning and Management 34
3.2.6.2 Safer Chemistry Performance 35
3.2.6.3 Safer Chemistry Reporting 35

3.2.7 Indigenous Peoples 35
3.2.7.1 Inventory of Potential Impacts on Indigenous Peoples 35
3.2.7.1.1 Indigenous Peoples Policy 36
3.2.7.1.2 Indigenous Peoples Action Plan 37
3.2.8 Biological Diversity 37
3.2.8.1 Inventory of Potential Impacts on Biodiversity 37
3.2.8.1.1 Biodiversity Action Plan 38
3.2.9 Social and Environmental Impact Assessment 39
3.2.9.1 Social and Environmental Impact Assessment Policy 39
3.2.9.2 Social and Environmental Impact Assessment Reporting 39

3.3 SUPPLIER MANAGEMENT 40
3.3.1 First-Tier Supplier Code of Conduct 40
3.3.1.1 Manage First-Tier Suppliers's Compliance 41
3.3.2 Identify Highest-Priority Suppliers and Sub-Suppliers 41
3.3.2.1 Management Plan for Highest-Priority Suppliers and Sub-Suppliers 42
3.3.3 Supply Decisions 43

3.4 PRODUCT LIFE CYCLE IMPACTS 43
3.4.1 Product Life Cycle Assessment 43
3.4.1.1 Prioritization of Products for Life Cycle Assessment 44
3.4.1.2 Life Cycle Assessment 44
3.4.1.3 Life Cycle Action Plan 45
3.4.1.4 Life Cycle Continuous Improvement and Leadership 46
3.4.2 Product Raw Materials 46
3.4.2.1 Product Raw Materials Management Plan 46
3.4.3 Product Manufacturing 47
3.4.3.1 Product Manufacturing Management Plan 47
3.4.4 Product Packaging 48
3.4.4.1 Packaging Policy and Management Plan 48
3.4.5 Product Transport 49
3.4.5.1 Product Transportation Management Plan 49
3.4.5.2 Vehicle Use 49
3.4.6 Product Use 50
3.4.6.1 Inventory of Product Environmental Impacts During Product Use 50
3.4.6.1.1 Plan to Reduce Product Environmental Impacts During Use 50
3.4.7 End of Product Life 51
3.4.7.1 Inventory of Product Environmental Impacts at End of Product Life 51
3.4.7.1.1 Product Stewardship 51

3.5 PRODUCT ENVIRONMENTAL CERTIFICATION 52

4.0 CONTINUOUS IMPROVEMENT 54
4.1 Company Charter 54
4.2 Social and Environmental Responsibility Plan 54
4.3 Continuous Improvement Plan 54
4.4 Required Improvement Timing 54

5.0 LABELING REQUIREMENTS 55

APPENDIX A. ACCEPTABLE EMS THIRD PARTY VERIFICATION 56

APPENDIX B: ADDITIONAL COMPLIANCE INFORMATION 58

APPENDIX C: WATER USE & CONSERVATION 60

APPENDIX D: SAFER CHEMISTRY 61

APPENDIX E: EXAMPLES OF SUSTAINABLE PACKAGING EFFORTS 65

APPENDIX F. NON-EXCLUSIVE LIST OF THIRD-PARTY PRODUCT OR SERVICE CERTIFICATION PROGRAMS 67

FOREWORD

A. Certification. This Pilot Sustainability standard contains the basic requirements for certain consumer product manufacturers (as defined in the Scope section below) to be certified by Green Seal™ and for their business to receive authorization to use the Green Seal Certification Mark. The requirements are based on an assessment of the social and environmental impacts of product manufacturing from raw materials acquisition, manufacture, use, and disposal to utility use and waste generation. The Pilot standard is intended to be used by product manufacturers during a pilot process that will systematically obtain information and advice from relevant stakeholders including industry, trade associations, users, government officials, environmental and other public interest organizations, and others with relevant expertise. The requirements of this pilot standard are subject to revision as further experience and investigation may show is necessary or desirable.

B. Compliance with the Standard. Compliance with this Standard is one of the conditions of certification of a product manufacturer by Green Seal.

C. Compliance with Government Rules. In order to be authorized to use the Green Seal Certification Mark, the certified product manufacturer must disclose all governmental allegations or determinations of violation of federal, state, or local environmental laws or regulations with respect to products manufactured and facilities/locations in which product manufacturing is conducted. Certification will be denied any product manufacturer whose products or product manufacturing are in violation of workplace or environmental laws or regulations if, in Green Seal's judgment, such violations indicate that the social or environmental impacts of the product manufacturer significantly exceed those contemplated in the setting of the standard.

D. Limitations on Purpose of Standard. Green Seal's Standards provide basic criteria to promote environmental quality. Provisions for product safety have not been included in this Standard because government agencies and other national standard-setting organizations establish and enforce safety requirements.

E. Substantially Equivalent. Product manufacturers that are substantially similar to those covered by this standard in terms of function and environmental impact may be evaluated and certified by Green Seal against the intent of the requirements of this standard.

F. Unanticipated Environmental Impacts. A product manufacturer which complies with this Standard will not necessarily be certified by Green Seal if, when examined, it is found to have other features which significantly increase its impact on society or the environment. In such a situation, Green Seal will ordinarily amend its standards to account for the unanticipated environmental impacts.

G. Certification Agreement and Green Seal Rules. In order to be authorized to use the Green Seal Certification Mark in connection with a certified product manufacturer, or to use the Green Seal

Certification Mark in advertising, the product manufacturer must (1) undergo an initial evaluation to determine that the product manufacturer complies with Green Seal's requirements, (2) sign a Green Seal Certification Agreement that, among other things, defines how and where the Green Seal may be used, (3) pay fees to cover the costs of evaluating and monitoring, (4) agree to an ongoing program of on-site inspections and operational evaluations, and (5) comply with the requirements found in the most recent version of "Rules Governing the Use of the Green Seal Certification Mark."

H. Disclaimer of Liability. Green Seal™, in performing its functions in accordance with its objectives, does not assume or undertake to discharge any responsibility of the product manufacturer or any other party. Green Seal shall not incur any obligations or liability for damages, including consequential damages, arising out of or in connection with the interpretation of, reliance upon, or any other use of this Standard.

I. Care in Testing. Many tests required by Green Seal's Standards involve safety considerations. Adequate safeguards for personnel and property should be employed in conducting such tests.

J. Referenced Standards. Standards referenced in this document may have been superseded by a later edition, and it is intended that the most recent edition of all referenced standards be used in determining compliance of a product with this standard.

K. Labeling Requirements. This standard neither modifies nor supersedes government labeling requirements. Labeling language which varies in form from the requirements of this section may be used with the written approval of Green Seal.

LIST OF ACRONYMS AND TERMS

CERCLA: Comprehensive Environmental Response, Compensation, and Liability Act
CEO: Chief Executive Officer
CFC: Chlorofluorocarbon
CFL: Compact Fluorescent Light
CPSC: Consumer Product Safety Commission
DfE: Design for the Environment
EMAS: Eco-Management and Audit Scheme (EMAS) of the European Union (EU)
EMS: Environmental Management System
EPA: Environmental Protection Agency
EPEAT: Electronic Product Environmental Assessment Tool
EU: European Union
FCC: Federal Communications Commission
FSC: Forest Stewardship Council
FTC: Federal Trade Commission
GHG: Greenhouse Gas
GRI: Global Reporting Initiative
HAP: Hazardous Air Pollutant
IFC: International Finance Corporation
ILO: International Labor Organization
IPCC: Intergovernmental Panel on Climate Change
ISO: International Organization for Standardization
IUCN: International Union for the Conservation of Nature
LCA: Life-cycle Assessment
LEED: Leadership in Energy and Environmental Design (US Green Building Council Program)
MWDBE: Minority-owned, woman-owned or disabled-owned business enterprise
NGO: Non-Governmental Organization
OSHA: Occupational Safety and Health Administration (United States Government)
PPM: Parts Per Million
SAI: Social Accountability International
SBA: Small Business Administration
SHARP: Safety and Health Achievement Recognition Program (OSHA)
UN: United Nations
US: United States of America
VOC: Volatile Organic Compound
VPP: Voluntary Protection Programs (OSHA)
WBCSD: World Business Council for Sustainable Development
WRI: World Resources Institute

GREEN SEAL™
PILOT SUSTAINABILITY STANDARD FOR COMPANIES
PART A: PRODUCT MANUFACTURERS

1.0 SCOPE

This standard establishes social and environmental requirements for product manufacturers that have been operating for at least three months whose primary business is manufacturing of products.

Each criterion applies to all product manufacturers and to all companies under the product manufacturer's control. In addition, some requirements identified in the standard will also apply to all of the co-manufacturers that a product manufacturer contracts with. Some criteria state "where applies" and are not required when a criterion, mandatory or option, is not relevant. Compliance to all applicable laws and regulations is required. Where a criterion conflicts with local code or regulations, the latter takes precedence.

There are three certification levels achievable in this standard: bronze, silver, and gold. The three levels are sequential and not all criteria are required for all levels. Each subsequent level (e.g., bronze to silver) assumes the requirements for the previous level in addition to the requirements outlined for its own level. For example, silver includes all bronze criteria plus the silver requirements. If criteria overlap for different levels (i.e., silver and bronze criteria) the stricter requirement is applied if the manufacturer wishes to obtain the higher certification level.

2.0 DEFINITIONS

Aggressive. For purposes of this standard, a goal will be considered aggressive if it is markedly better than the average performance for the company's sector (e.g., top 15% to 20% of sector), requires company to act with all deliberate speed, and represents a significant improvement from the company's performance in the most recent base year for which data are available.

Alternatively-Fueled Vehicle. A vehicle that runs predominantly or exclusively on compressed natural gas, biodiesel from recycled vegetable oil, or electrically-generated power as demonstrated by fuel purchase records and mileage records for the vehicle(s). Gasoline purchases for the vehicle(s) shall not exceed the amount required to drive the vehicle(s) 15% of the miles driven annually.

Barriers to Employment. Workers may face barriers to employment that create difficulty in finding and maintaining a job. Specific barriers to employment include, but are not limited to: lack of education; lack of work history; low income; child care; lack of transportation; health conditions; substance-abuse; criminal record or incarceration; homelessness; language barriers among diverse populations; and disabilities.

Business Principles for Countering Bribery. A framework for companies to develop comprehensive anti-bribery programs. The principles were developed by Transparency International in cooperation with Social Accountability International.

By-Product. A secondary or incidental product obtained from a manufacturing process or a chemical reaction. It can be a useful and marketable product or it can be an undesirable outcome/product.

Climate Leaders Program. A voluntary partnership program of the US Environmental Protection Agency. Climate Leaders recognizes, and provides technical assistance for, companies which are corporate leaders within their sectors in reducing GHG emissions. The Climate Leaders Program approach is based, with slight modifications, on the WRI/WBCSD protocol. Relevant guidance can be found in "A Program Guide for Climate Leaders" and "Design Principles Guidance."

Colorant. A substance deliberately added to change the color of a product. For example, a colorant is the ink, dye, or pigment added during the manufacturing process to change the color of the final product.

Co-Manufacturer. A third party that a product manufacturer contracts with directly to manufacture or assemble part or all of a final product that is sold by a product manufacturer.

Component. A smaller, self-contained part of a larger item.

Compostable. Any food or other organic material capable of undergoing biological decomposition, such that the material is not visually distinguishable and breaks down to carbon dioxide, water, inorganic compounds, and biomass, at a rate consistent with known compostable materials. Products claiming to be compostable shall be certified as such by a third-party certification program.

Environmental Quality. A set of properties or characteristics, either local or generalized, which influence the natural and built environment. Such characteristics can include air, water purity, pollution, and noise. Many national regulatory agencies have standards for environmental quality.

Environmentally-Preferable. "Environmentally preferable" is defined in Section 201 of US Executive Order 13101 to mean products or services that "have a lesser or reduced effect on human health and the environment when compared with competing products or services that serve the same purpose. This comparison may consider raw materials acquisition, production, manufacturing, packaging, distribution, reuse, operation, maintenance or disposal of the product or service."

Environmentally and Socially Responsible Purchasing. The procurement of goods, services and works that incorporates environmental and social considerations alongside the conventional criteria of price and quality. This procurement process is also known as the 'triple-baseline' since it includes: economic, environmental and social criteria.

Energy-Efficient. A term used to qualify a product or process when it processes a superior ability to convert or conserve energy compared to an equivalent product or process. A product is energy-efficient when it uses less energy to achieve the same outcome as a comparable model. Energy-efficient industry standards exist for many consumer and commercial products and practices.

ENERGY STAR. A joint United States Environmental Protection Agency and Department of Energy program created in 1992 to help the public and businesses save money and protect the environment through the promotion of energy-efficient products and practices. Many countries have their own energy standards and labels that serve the same function as the US ENERGY STAR label (e.g., www.energylabels.org.uk) and 25 countries have cooperatively joined the Global Ecolabelling Network (www.globalecolabelling.net) to exchange information between national ecolabel activities.

Energy Use. The energy consumed during an activity, function or manufacturing process. In comprehensive evaluations, the total energy used is considered all energy consumed, regardless

of source, and excluding any generated energy sold to a power grid. For example, it can include the total energy consumed during recovery of resource materials, manufacturing of a product, waste treatment, and packaging.

Environmentally Preferable. Causing less harm to the environment or having a more positive impact on the environment. Typically used to describe products or services that have fewer impacts during raw material acquisition, production, use, and disposal than other goods and services that serve the same purpose. Compared to conventional products or services, environmentally preferable products and services may, for example, be made from more sustainably produced materials, produce fewer GHG emissions, use less water, generate less waste, be made with fewer toxic ingredients, or have similar beneficial attributes.

Environmental Management System (EMS). Refers to the management of an organization's environmental programs in a comprehensive, systematic, planned and documented manner. It includes the organizational structure, planning and resources for developing, implementing and maintaining policy for environmental protection. There are a number of recognized EMS frameworks including ISO 14001 and the European Eco-Management and Audit Scheme (EMAS).

Equator Principles. The Equator Principles (EP) are a set of environmental and social benchmarks for managing environmental and social issues in development project finance globally. They are based on the environmental standards of the World Bank and the social policies of the International Finance Corporation (IFC). There are ten Equator Principles: (1) Review and Categorization; (2) Social and Environmental Assessment; (3) Applicable Social and Environmental Standards; (4) Action Plan and Management System; (5) Consultation and Disclosure; (6) Grievance Mechanism; (7) Independent Review; (8) Covenants; (9) Independent Project Monitoring and Reporting; and (10) Annual Reporting on Equator Principle Implementation.

Food. Items that are edible and consumed for nutrition or pleasure. These include meals, snacks, dessert and beverages.

Forecasting. Using past data to estimate future needs. This is primarily done to evaluate beneficial outcomes for topics such as purchasing needs, production costs, labor requirements, improving waste management techniques and reducing costs.

Fuel-Efficient Vehicle. A vehicle that attains a better fuel economy (e.g., mpg or liter/km) than a comparable vehicle in the same model class is more fuel-efficient. Fuel-efficient vehicles are better because they emit less atmospheric pollution that cause health, ecological and climate change problems. In 2008, some countries (e.g. Australia, EU) have started to require legal disclosure of a vehicle's fuel consumption and greenhouse gas emissions when they are sold in a non-private sale.

Greenhouse Gas (GHG). For the purposes of this standard, GHGs are the six gases listed in the Kyoto Protocol: carbon dioxide (CO**2**); methane (CH**4**); nitrous oxide (N**2**O); hydrofluorocarbons (HFCs); perfluorocarbons (PFCs); and sulphur hexafluoride (SF**6**).
Greenhouse Gas Emissions Inventory. A quantified list of an organization's GHG emissions and the sources for those emissions. .

Green Screen. An analytical procedure to rank hazardous chemicals.

Historically Underrepresented Groups. Populations that have been historically underrepresented in organizations. Includes but is not limited to women, ethnic minorities, people with disabilities.

Hybrid-Electric Vehicle. A vehicle that runs on two or more power sources to move the vehicle and where one of the power sources is electricity. Current hybrid-electric vehicles are generally powered by a fuel source (gas or diesel) combined with an electric source (e.g. onboard Li-ion battery or a plug-in source).

Indigenous Peoples. The United Nations and its subsidiaries, including the ILO and the World Bank, have not agreed on a definition of the term "indigenous peoples" but use it in a practical sense, such as in the ILO's Indigenous and Tribal Peoples Convention (No. 169) and the World Bank's Indigenous Peoples Policy. The World Bank, for example, refers to indigenous peoples in a generic sense to refer to distinct, vulnerable, social and cultural groups possessing the following characteristics in varying degrees:
(a) self-identification as members of a distinct indigenous cultural group and recognition of this identity by others;
(b) collective attachment to geographically distinct habitats or ancestral territories in the project area and to the natural resources in these habitats and territories
(c) customary cultural, economic, social, or political institutions that are separate from those of the dominant society and culture; and
(d) an indigenous language, often different from the official language of the country or region.

Ingredient. Any substance of a mixture that is intentionally or unintentionally present. National laws exist for many ingredients that are known to cause pharmacological effects or are hazardous.

Integrated Biodiversity Assessment Tool. An online tool to assist companies in assessing their potential biodiversity impacts, developed cooperatively by BirdLife International, Conservation International and United Nations Environment Programme World Conservation Monitoring Centre.

Intentional Introduction. The act of deliberately utilizing a substance in the formation of a product where its impact is desired to provide a specific characteristic, appearance, or quality.

Intergovernmental Panel on Climate Change (IPCC). The Intergovernmental Panel on Climate Change is the leading body for the assessment of climate change, established by the United Nations Environment Programme and the World Meteorological Organization to provide the world with a clear scientific view on the current state of climate change and its potential environmental and socio-economic consequences. IPCC is a scientific body that reviews and assesses the most recent scientific, technical and socio-economic information produced worldwide relevant to the understanding of climate change; and publishes special reports on topics relevant to the implementation of the UN Framework Convention on Climate Change.

International Finance Corporation (IFC). An affiliate of the World Bank Group that provides financing and advisory services to private-sector enterprises in developing countries.

International Finance Corporation's Environmental and Social Review Procedure. IFC's Environmental and Social Review Procedure outlines IFC's management-approved steps for proposed investments, thereby supporting compliance with the IFC commitment to environmentally and socially sustainable development.

International Finance Corporation's Performance Standards. IFC's eight Performance Standards establish standards that an IFC-financed private enterprise is to meet throughout the life of an investment by IFC or other relevant financial institution. The eight Performance Standards are: (1) Social and Environmental Assessment and Management System; (2) Labor and Working Conditions; (3) Pollution Prevention and Abatement; (4) Community Health, Safety and Security; (5) Land Acquisition and Involuntary Resettlement; (6) Biodiversity Conservation and Sustainable Natural Resource Management; (7) Indigenous Peoples; and (8) Cultural Heritage.

International Labor Organization (ILO). A United Nations' specialized agency which seeks the promotion of social justice and internationally recognized human and labor rights.

Kyoto Protocol. The Kyoto Protocol is a protocol to the United Nations Framework Convention on Climate Change, an international environmental treaty with the goal of achieving "stabilization of greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system." The Kyoto Protocol establishes commitments for the reduction of four greenhouse gases (carbon dioxide, methane, nitrous oxide, sulphur hexafluoride), and two groups of gases (hydrofluorocarbons and perfluorocarbons) produced by industrialized nations.

Life Cycle Assessment. A key tool to evaluate product-based environmental impacts is life-cycle assessment (LCA). LCA is a well-established scientific method (governed by the ISO 14044 standard) that evaluates all stages of a product's life from raw material extraction, manufacturing, and use to disposal or reuse. During this evaluation, environmental impacts from each life cycle stage are considered from raw materials, processing, distribution, use, and end-of-life. Commonly applied environmental impact categories within LCA are global warming, eutrophication, acidification, photochemical smog and land use. For the purposes of this

standard, LCA shall be conducted following ISO 14044 requirements and if completed by the company, must be third-party reviewed.

Optical Brightener. Chemicals that enhances the appearance of colors and whiteness in materials by absorbing ultraviolet and violet radiation and emitting blue radiation. Used primarily for fabrics, clothing and paper, there are over 400 known types of optical brighteners.

Occupational Safety and Health Administration (OSHA). The main US federal agency charged with the enforcement of safety and health legislation. OSHA's Voluntary Protection Programs (VPP) promote effective worksite-based safety and health, and its Safety and Health Achievement Recognition Program (SHARP) recognizes small employers who operate an exemplary safety and health management system.

Paperboard. A material made from one or several layers of paper to create a rigid format with a high thickness, usually over .01" (.25mm). It is often used as a packaging container for items such as roll cores, brown papers, wrappers, bands, and folding cartons. It is sometimes referred to by the more generic term 'cardboard'.

Post-Consumer Material/Content. See definition of Recycled Content.

Primary Packaging. Material physically containing and coming into contact with the product.

Protected Area. A protected area, as defined by the International Union for Conservation of Nature (IUCN), is a clearly defined geographical space, recognized, dedicated and managed, through legal or other effective means, to achieve the long-term conservation of nature with associated ecosystem services and cultural values. There are six IUCN protected area categories:

- Nature reserve/wilderness area: protected area managed mainly for science or wilderness protection
- National park: protected area managed mainly for ecosystem protection and recreation
- Natural monument: protected area managed mainly for conservation of specific natural features
- Habitat/Species Management Area: protected area managed mainly for conservation through management intervention
- Protected Landscape/Seascape: protected area managed mainly for landscape/seascape protection and recreation
- Managed Resource Protected Area: protected area managed mainly for the sustainable use of natural ecosystems

RECIPE for Dialogue Project Guidebook. Developed by First Peoples Worldwide and Business for Social Responsibility, the *Resource/Extractive Companies and Indigenous Peoples Engagement for Dialogue* is a tool to help indigenous peoples and companies engage constructively on issues that concern them.

Recovered Material/Content. Material that would otherwise have been disposed of as waste or used for energy recovery, but has instead been collected and recovered (reclaimed) as a material input, in lieu of new primary material, for a recycling or manufacturing process. (Adopted from ISO 14021.)

Recyclable. A characteristic of a product, packaging or associated component that can be diverted from the waste stream through available processes and programs and can be collected and returned to use in the form of raw materials or products. Qualifications: If collection or drop-off facilities for the purpose of recycling product or packaging are not conveniently available to a reasonable proportion of purchasers, potential purchasers and users of the product in the area where the product is sold, then the following shall apply:

- A qualified claim of recyclability shall be used
- The qualified claim shall adequately convey the limited availability of collection facilities
- Generalized qualifications, such as "recyclable where facilities exist," which do not convey the limited availability of collection facilities are not adequate. (Adopted from ISO 14021.)

Recycled Content. Proportion, by mass, of recycled material in a product or package. Only pre-consumer and post-consumer materials shall be considered as recycled content, with the following usage of terms:

1. Pre-consumer material: Material diverted from the waste stream during a manufacturing process. Excluded is reutilization of materials such as rework, regrind or scrap generated in a process and capable of being reclaimed within the same process that generated it.

2. Post-consumer material: Material generated by households or by commercial, industrial, and institutional facilities in their role as end-users of the product, which can no longer be used for its intended purpose. This includes returns of the material from the distribution chain. Post-consumer material does not include materials and by-products generated from, and commonly re-used within, an original manufacturing and fabrication process. (Adopted from ISO 14021.)

Red List Chemicals. A list of high hazard chemicals.

Reproductive Toxin. Chemicals that disrupt the reproductive process in organisms (male or female). These hazardous chemicals cause a variety of adverse effects such as alterations of the sex organs and/or endocrine system, infertility and genetic mutations.

SA 8000. A global standard for safe and humane workplace management developed by Social Accountability International. SA 8000 includes requirements related to child labor; forced labor; workplace safety and health; freedom of association and right to collective bargaining; discrimination; discipline; working hours; remuneration; and an effective management system. SA 8000 certification applies to one or more particular facilities -- such as a factory, farm, or office – and not to products or services. Certification of compliance to SA8000 is available only

through qualified certification bodies granted accreditation by the non-profit Social Accountability Accreditation Services.

Safer Chemistry. A safer chemistry program aims to remove the hazardous chemicals in a manufacturer's products and processes and replace them with environmentally preferable alternatives. See Appendix D for informational resources. 'Safer Chemistry' is also known as 'Green Chemistry' and 'Clean Production'.

Scope 1 Emissions. GHG emissions resulting directly from operations/activities of company owned or managed facilities (e.g., on-site power generation, industrial processing, emissions from air conditioning or refrigeration systems, etc.) or vehicles (individual vehicles or fleets of cars, busses, trucks or other transportation modes). Also referred to as direct emissions.

Scope 2 Emissions. GHG emissions resulting primarily from purchase of electricity generated off-site. Also referred to as a subset of indirect emissions.

Scope 3 Emissions. Relevant indirect GHG emissions not accounted for under Scope 1 and Scope 2 emissions. Examples include business travel, employee commuting, offsite waste disposal, emissions due to use of the company's products, emissions from some or all of the company's supply chain.

Secondary Packaging. Any packaging or material other than primary packaging including but not limited to paper bands, wrappers, and boxes.

Small Business. For purposes of this standard, wherever it is noted that a small business is given a different requirement than larger businesses, any business meeting the SBA definition of a small business AND having less than 200 employees is automatically qualified for the small business requirement. A business meeting the SBA definition of a small business and having 200 or more employees may qualify for the small business requirement at the certifier's discretion.

Socially and Environmentally Preferable Purchasing. The objective of socially and environmentally preferable purchasing or procurement is to purchase socially and environmentally preferable products and contribute to an organization's environmental, social, and financial objectives. This approach means basing purchasing decisions and allocation of contracts on social and environmental criteria as well as on other typical purchasing criteria such as price, quality, and availability. Socially and environmentally preferable purchasing specifications may require suppliers to provide third-party certified products, for example, or to provide products that meet detailed environmental and social technical criteria identified by the purchaser.

Socially Preferable. Producing less harm to the community or society or having a positive impact on the community or society. Typically used to describe products or services that produce less social harm or greater social benefit during their production, use, and disposal than

other goods and services that serve the same purpose. In general, socially preferable products or services support the welfare and interest of society in its more social aspects such as diversity, human rights, fair labor, fair trade, ethical behavior, safety, and community involvement or philanthropy.

Solid Waste. Material that is discarded into the waste stream as garbage. Much of the material that is discarded as solid waste would be better used if it were donated, recycled or composted. Such items include paper, packaging, supplies, food, surplus production runs, electronic and mechanical equipment.

Superfund Program, U.S. This US government program was created to protect people, families, communities and others from heavily contaminated toxic waste sites. In 1980, in response to the public outcry surrounding two toxic waste zones (Love Canal; and, Valley of the Drums), the United States Congress established the Comprehensive Environmental Response, Compensation and Liability Act to regulate toxic waste dump sites. This environmental policy is more commonly known as the Superfund Act of 1980.

Supplier. A company's suppliers are businesses that provide goods or services needed to create the company's products. Suppliers may provide, for example, raw materials; parts or ingredients of products; finished products that the company distributes; or services such as energy, transportation, cleaning, or waste management. A "first-tier" supplier of Company A is an organization that sells a product or service directly to Company A; a "second-tier" supplier of Company A is an organization that sells product or service to one of Company A's first-tier suppliers; a "third-tier" supplier of Company A is an organization that sells product or service to one of Company A's second-tier suppliers; and so on. Second-tier, third-tier, and higher-tier suppliers are also known as "sub-suppliers."

Supplier Diversity. Supplier diversity focuses on identifying and supporting minority-owned, woman-owned or disabled-owned business enterprises (MWDBEs) as potential suppliers. Purchasers identify and track MWDBE vendors throughout the procurement process and may also support MWDBEs through training, mentoring, education, regional supplier councils, awards, and networking.

Supply Chain. The network of interactions among all the organizations, people, money, technology, activities, storage facilities, information, resources and capital equipment involved in the production, delivery and sale of a product or service. Supply chains include all interactions involved to transform natural and raw materials or components into a finished product/service for delivery to a consumer.

Surfactant. A group of chemicals with a hydrophilic and hydrophobic group. Chemicals such as defoamers, dispersants, foaming agents, and collectors used in flotation deinking are all considered surfactants. This group of chemicals is also known as surface-active agents.

Sustainable Packaging. Packaging that has a more positive ecological impact than an alternative packaging material. Sustainable packaging meets all market criteria for performance and cost and is also sourced, manufactured, transported, and recycled using clean production technologies, maximal recycled and renewable materials, and is beneficial, safe and healthy for all individuals and communities throughout its life cycle.

Sustainability. The ability to maintain all ecosystem processes and productivity into the future**.** In terms of humans, it is the idea that economic, social and environmental spheres can simultaneously prosper perpetually.

Sustainability Report. A reporting format based on a framework of topics that help businesses, organizations and governments achieve progress toward the tri-goals of economic prosperity, environmental quality and social justice for both their internal and external operations.

Take-Back Initiative/Program. The process when a business or organization sets up a method for consumers to return a product for the purpose of environmentally-preferred disposal. These programs currently exist for many hazardous products including, but not limited to, office equipment (computers, monitors, printers, ink cartridges), televisions, cell phones, compact fluorescent bulbs, batteries.

Third-Party Certification Program. An audit or inspection carried out by a party other than the supplier (first party) or the sourcing company (second party) without any financial interest or stake in the sales of the product or service being certified, or other conflict of interest. A standard must form the basis of the certification, be appropriate and meaningful for its intended purpose, and be publically available and developed with stakeholder input. Certification to the standard must be completed by an independent party (i.e. not the product company), and include site inspections, where applicable, and have a monitoring program to verify ongoing compliance.

Verification. In the context of labor practices, verification concerns the impartial examination of claims made regarding adherence to international code provisions and standards. The essence of verification is to ensure the credibility of public claims. Verification implies an examining of evidence in order to establish that previously reported results are accurate.

Waste. A material or substance that is unwanted or undesired. Often referred to as trash or garbage, it includes materials left over from manufacturing processes, wastewater, compostable material, or food among other things.

Waste-To-Feed Exchange/By-Product Synergy. A process where the waste or by-product from one organization is used as a resource for another function within the same organization or provided to a completely different organization to be used in their manufacturing process. The goal of this effort is to increase economic gains while improving environmental impacts. Some examples include: heat generated from the boiler of a manufacturing process is used to heat the office space within this same organization; or, surplus heat from a power plant can be sold to a nearby community to heat homes. Both these examples reduce thermal pollution generated from

power generation. Another example is when the byproducts of a power plant, such as gypsum or flyash, are sold to wallboard manufacturers or cement manufacturers. These waste-to-feed exchanges reduce open-pit mining, divert material from the waste stream, reduce energy investment in processing virgin materials, conserve virgin materials and reduce pollution.

Water Use. The total amount of process and cooling water used during the manufacture of a product.

World Resources Institute – World Business Council for Sustainable Development Greenhouse Gas Protocol. The most widely accepted and internationally-recognized protocol for corporate accounting for GHG emissions has been developed by the World Resources Institute (WRI) and the World Business Council for Sustainable Development (WBCSD), with collaboration from NGOs, business and government. See the WRI/WBCSD's "The Greenhouse Gas Protocol: A Corporate Accounting and Reporting Standard."

3.0 SOCIAL AND ENVIRONMENTAL PERFORMANCE REQUIREMENTS

All requirements are mandatory unless otherwise noted.

3.1 CORPORATE LEVEL REQUIREMENTS

3.1.1 Social and Environmental Policy.

BRONZE	SILVER	GOLD
The company shall provide a documented, publically available corporate social and environmental policy signed by CEO or designee so attested, or state where this can be found in the public domain (e.g., web link). The policy shall define the organization's overall commitment related to the social and environmental issues covered in this standard, such as fair labor and workplace conditions; community investment and opportunities for historically underrepresented groups and people with barriers to employment; energy and GHG emissions; water use; toxics; emissions, effluents, and waste; biodiversity; indigenous peoples; life-cycle impacts of products and services; compliance; supplier management; and overall.		

3.1.2 Social and Environmental Roles & Responsibilities.

BRONZE	SILVER	GOLD
The company shall provide documentation of a clear, publically available description of the roles and responsibilities of the Board of Directors, senior executives, unit managers and employees in developing and implementing social and environmental policy (3.1.1) and corresponding goals.		

3.1.3 Corporate Environmental Management System. The company shall implement a company-wide EMS, and shall:

BRONZE	SILVER	GOLD: Meets Bronze/Silver Requirement plus:
Ensure that EMS includes the following as described in ISO 14001: 1. Policy (section 3.1.1 of this standard) 2. Planning 3. Implementation and Operation 4. Checking and Corrective Action 5. Management Review		Have their EMS assessed by an independent party, with evidence thereof. Evidence of ISO 14001 or EMAS certification of EMS qualifies as meeting this requirement. See Appendix A for additional information on qualifications for third-party certifiers of EMS.

3.1.4 Socially and Environmentally Responsible Purchasing.

BRONZE	SILVER	GOLD
The company shall provide a documented, publically available policy requiring the purchase and use of socially and environmentally preferable products and services for its non-manufacturing purchasing. (i.e. corporate support functions). The policy shall cover the range of non-manufacturing purchasing including, but not limited to, building operations and maintenance-related equipment and materials; office equipment and supplies; information technology; cleaning products, janitorial supplies, cleaning services; food and food-related supplies, food services.		

3.1.5 Company Role in Social and Environmental Public Policy.

BRONZE	SILVER	GOLD
No requirement.	The company shall provide documentation of significant lobbying activities relevant to public policy or legislative initiatives affecting the workplace, human health and the environment, with primary emphasis on those related to labor and workplace issues, energy, emissions of greenhouse gasses, water use and supply, waste, toxics, chemical constituents in consumer products, biological diversity, or indigenous peoples. This shall include lobbying at the federal, state or provincial levels concerning workplace or environmental laws and regulations.	

3.1.6 Publically Available Annual or Sustainability Report. Companies shall demonstrate a commitment to corporate transparency and stakeholder engagement by providing documentation that the:

BRONZE	SILVER	GOLD
Company's annual report meets the requirements of GRI level B (Level C for small businesses), or equivalent.	Company's annual report meets the requirements of GRI level A (level B for small business), or equivalent.	Company's annual report meets the requirements of GRI level A+, or equivalent, including GRI's requirements for external assurance reports.

3.1.7 Compliance.
Companies and co-manufacturers shall demonstrate with appropriate attestation and supporting information:

BRONZE	SILVER	GOLD
Compliance to all applicable laws and regulations (See Appendix B for example) and: • No significant violations of local, state, federal or international workplace or environmental laws or regulations during previous 12 months • No convictions or pending cases for criminal violations of workplace or environmental laws or regulations in past three years • Report violations of workplace or environmental standards, laws or regulations during the last 12 months • Report if potentially responsible party under federal or state superfund programs • Report any product recalls		

3.1.8 Social and Environmental Responsibility Operating Procedures.

BRONZE	SILVER	GOLD
No requirement.	The operation shall have written environmental and social operating procedures available to each employee, including at least the following: • Fair labor, workplace and social responsibility practices • Environmental policy • Environmental roles and responsibilities • Environmentally and socially-sensitive purchasing policy	

	• Energy and water management and conservation • Waste management • Chemical management (including cleaning) • Transportation • Administration • Worker safety

3.1.9 Social and Environmental Responsibility Training.

BRONZE	SILVER	GOLD
No requirement.	Training shall be conducted on the company's social and environmental policies and responsibilities (3.1.1, 3.1.2) and operating procedures (3.1.8). • New employees shall receive a minimum of one hour (paid) of documented training within the first month of employment, as applicable to their duties. • All employees shall receive a minimum of two hours (paid) of documented training annually, beyond the initial training required.	

3.2 KEY SOCIAL AND ENVIRONMENTAL SECTORS

For the requirements in Section 3.2 (requirements 3.2.1.1 through 3.2.9.2), when a requirement is said to apply to, or include, all company and co-manufacturing operations, this means all manufacturing and non-manufacturing activities at all facilities owned, leased, or operated by the product manufacturer or by companies under the product manufacturers control; as well as at all facilities the product manufacturer contracts with directly to manufacture or assemble its final products.

3.2.1 Labor and Workplace

3.2.1.1 Fair Labor and Workplace Requirements. The following requirements shall apply to all company and co-manufacturing operations. Company shall document the following:

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
Conformity to the requirements from the following sections of the SA 8000 standard or equivalent: • Child labor • Forced and compulsory labor • Health and safety • Freedom of association and right to collective bargaining • Discrimination • Disciplinary practices • Working hours • Remuneration The location of 100% of the company's manufacturing and co-manufacturing facilities. Company has in place: • A process to manage social compliance that ensures that the company's manufacturing and co-manufacturing facilities meet or exceed local laws and the requirements listed above • Procedures ensuring that prior to entering into relationship with new co-manufacturer, the co-manufacturer is evaluated by company for requirements listed above, quality of production, and capacity for production.	Conformity to the requirements of the SA 8000 standard or equivalent.	

3.2.1.1.1 Fair Labor and Workplace Practices Verification. The following requirements shall apply to all company and co-manufacturing operations. Management plans described below shall include measurable goals, including intermediate benchmarks; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures

for corrective action; and periodic management review. The company shall provide documentation demonstrating:

BRONZE	SILVER	GOLD: Meets Silver requirements plus:
No requirement.	US facilities: The company shall have a management plan in place to achieve recognition by OSHA's VPP or SHARP programs, or equivalent, for a significant percentage of its facilities. The goal shall be aggressive and deemed reasonable by the certifier; and company shall demonstrate substantial yearly progress toward achievement of this goal. US facilities may also choose to seek SA 8000 certification (see below) in place of, or in addition to, VPP or SHARP recognition. International facilities: The company shall have a management plan in place to achieve an internationally recognized third party certification, such as SA 8000 or equivalent, for a significant percentage of its facilities. The goal shall be aggressive and deemed reasonable by the certifier; and company shall demonstrate substantial yearly progress toward achievement of this goal.	Company shall have demonstrated major progress toward achieving its goals.

3.2.2 Community Engagement

3.2.2.1 Expanding Opportunity. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER	GOLD
The company shall provide evidence of programs to increase employment opportunity for people from historically underrepresented groups and people with barriers to employment (see definitions). Programs may include but are not limited to: • Active recruitment for company positions, including management and Board of Directors, of people from historically underrepresented groups and people with barriers to employment		

- Programs to increase upward mobility such as job training and continuing education
- Programs to increase accessibility such as flex-time, telecommuting, job sharing, employee childcare, public transportation incentives
- Accessibility of company facilities to people with disabilities

Company shall report annually on these programs and demonstrate yearly progress on increasing employment opportunity for people from historically underrepresented groups and people with barriers to employment.

3.2.2.2 Community Development.

BRONZE	SILVER	GOLD
The company shall provide evidence of investment in community development and related programs that create opportunities for people in locations where the company has operations (including co-manufacturing operations) or sources its products. This could include, but is not limited to: • Investments in infrastructure or institutions including education, health care, small business, housing, and utilities • Local purchasing requirements • Supplier diversity requirements • Programs to encourage and facilitate community service by company employees Company shall report annually on these programs and demonstrate yearly progress on creation of opportunity in locations where the company has operations or sources it products.		

3.2.3 Greenhouse Gas Emissions

3.2.3.1 EPA Climate Leaders Partner, or Equivalent.

BRONZE	SILVER	GOLD
If eligible, company shall have joined the EPA Climate Leaders Partnership program, or shall be in partnership with an equivalent GHG management program, and shall provide evidence of current partnership. If company does not meet EPA eligibility requirements for partnership in the Climate Leaders program, or eligibility requirements for an equivalent program, company		

shall provide evidence of ineligibility from EPA Climate Leaders or equivalent program.

There is no cost to join the EPA Climate Leaders program, which provides useful guidance and may offer free technical assistance to help Climate Leaders partners inventory their GHG emissions, set an aggressive GHG emissions reduction goal, and reduce their GHG emissions.

3.2.3.2 Company-Wide GHG Emissions Inventory.

BRONZE	SILVER	GOLD

Company shall have completed a documented company-wide GHG emissions inventory developed for EPA Climate Leaders or equivalent program. If, due to ineligibility (3.2.3.1), company is not an EPA Climate Leaders partner or in partnership with an equivalent program, GHG emissions inventory shall have been developed in accordance with EPA Climate Leaders Design Principles Guidance (based on the WRI/WBSCD GHG Protocol), the WRI/WBSCD GHG Protocol, or equivalent.

Inventory shall include GHG emissions from all company and co-manufacturing facilities. For each co-manufacturing facility, company's portion of emissions shall be calculated as follows:

$$G_c = G_t(V_c/V_t)$$

G_c = Company's portion of GHG emissions from co-manufacturing facility

G_t = Co-manufacturing facility's total GHG emissions

V_c = Portion of co-manufacturing facility's volume produced for company

V_t = Co-manufacturing facility's total production volume

Companies with international operations shall report GHG emissions inventory separately for each country of operation as well as reporting a worldwide total.

3.2.3.3 Aggressive GHG Emissions Reduction Goal. All GHG emissions reduction goals outlined below shall be made available to the public. Goals shall include GHG emissions from all company and co-manufacturing operations (3.2.3.2) and shall reflect the most recent scientific recommendations of the IPCC. Company shall document the following:

BRONZE	SILVER	GOLD
If possible, goals outlined below shall have been developed (a) in partnership with EPA Climate leaders or equivalent program (preferred approach); or (b) in accordance with the most recent goal-setting guidance and requirements of EPA Climate Leaders or equivalent program. If goals outlined below were developed in the absence of conditions (a) or (b) above, company shall so indicate and document the goal development process. 1. Company shall have developed an aggressive, company-wide GHG emissions reduction goal, including all US and international operations. 2. In the event that company has achieved its initial GHG emissions reduction goal, company shall develop an aggressive new company-wide GHG emissions reduction goal; new goal shall include all US and international operations.	Goals outlined below shall have been developed in partnership with EPA Climate Leaders or equivalent program. If, due to ineligibility (3.2.3.1), company is not an EPA Climate Leaders partner or in partnership with an equivalent program, goals outlined below shall have been developed in accordance with the most recent goal-setting guidance and requirements of EPA Climate Leaders or equivalent program. 1. Company shall have developed an aggressive, company-wide GHG emissions reduction goal, including all US and international operations. 2. In the event that company has achieved its initial GHG emissions reduction goal, company shall develop an aggressive new company-wide GHG emissions reduction goal; new goal shall include all US and international operations.	Goals outlined below shall have been developed in partnership with EPA Climate Leaders or equivalent program. If, due to ineligibility (3.2.3.1), company is not an EPA Climate Leaders partner or in partnership with an equivalent program, goals outlined below shall have been developed in accordance with the most recent goal-setting guidance and requirements of EPA Climate Leaders or equivalent program. 1. Company shall have achieved its aggressive, company-wide GHG emissions reduction goal, which shall have included all US and international operations. 2. Having achieved its initial GHG emissions reduction goal, company shall develop an aggressive new company-wide GHG emissions reduction goal; new goal shall include all US and international operations.

3.2.3.4 Management Plans for GHG Emissions and Emissions Inventory.

BRONZE	SILVER	GOLD
The company shall have a documented, corporation-wide GHG emissions management plan designed to meet the company-wide GHG emissions reduction goal outlined in section 3.2.3.3. The management plan shall address the sources of GHG emissions identified in the company's GHG emissions inventory (3.2.3.2) and shall include: • Clearly defined roles and responsibilities • Identification of interim or facility-specific goals as appropriate • Specific time-bound actions, including operating plans and procedures as needed • Documented monitoring and reporting with procedures for taking corrective actions • Periodic management review of results with provision to change course if needed In partnership with EPA Climate Leaders or equivalent program, the company shall have developed a documented company-wide GHG inventory management plan to ensure the ongoing quality and credibility of its GHG emissions inventory information. If, due to ineligibility (3.2.3.1), company is not an EPA Climate Leaders partner or in partnership with an equivalent program, company-wide GHG inventory management plan shall have been developed in accordance with the most recent inventory management plan guidance and requirements of EPA Climate Leaders or equivalent program.		

3.2.3.5 Annual Reporting.

BRONZE	SILVER	GOLD
Annually, company shall publicly report its GHG emissions inventory and progress toward achieving their company-wide GHG emissions reduction goal. If, due to ineligibility (3.2.3.1), company is not an EPA Climate Leaders partner or in partnership with an equivalent program, annual public reporting shall be developed and provided in accordance with the most recent reporting guidance and requirements of EPA Climate Leaders or equivalent program. Reporting shall include all GHG emissions in the company-wide GHG emissions inventory (3.2.3.2). Company shall report its GHG emissions annually to the Carbon Disclosure Project. Companies shall demonstrate yearly progress toward achievement of their company-wide GHG emissions reduction goal.		

3.2.4 Water Use

See Appendix C for additional information.

3.2.4.1 Water Conservation Goals and Management Plan.

BRONZE	SILVER: Meets Bronze requirement plus:	GOLD : Meets Bronze requirement plus:
The company shall have set measureable, publicly available goals for company-wide water-use reduction. Goals shall include all company and co-manufacturing operations; shall be aggressive; and shall be deemed reasonable by the certifier.	The company shall have a documented water management plan to meet the company's water-use reduction goals for company and co-manufacturing operations, including clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring and reporting on progress; procedures for corrective action; and periodic management review. Water management plan shall make use of WCBSD's Global Water Tool (2009), Energy Star Portfolio Manager, or equivalent, and shall include, but not be limited to, the following issues: • Consideration of why, how and where the company uses water and ways to reduce water use • Identify areas of greater risk related to water quality and availability in countries and watersheds where company facilities or suppliers' facilities are located Water-use reduction management plan shall be supported as needed by facility-specific operating plans and procedures.	

3.2.4.2 Water Use Tracking. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER	GOLD
The company shall monitor water bills and water use monthly, for each facility and company-wide, with the WCBSD's Global Water Tool (2009), ENERGY STAR portfolio manager, or an equivalent utility management or documentation system (e.g., utility's software or Excel) that tracks utilization and costs for total water use, water use per product, and non-production water use; benchmarks these factors relative to past performance; and determines percent improvement or savings. Monthly tracking data shall be compiled to show yearly performance; yearly performance data shall be available to the public. Company portion of water use at each co-manufacturing facility shall be calculated as follows:		

$$W_c = W_t(V_c/V_t)$$

W_c = Company's portion of water use at co-manufacturing facility
W_t = Co-manufacturing facility's total water use
V_c = Portion of co-manufacturing facility's volume produced for company
V_t = Co-manufacturing facility's total production volume

3.2.4.3 Water Conservation Performance. Water conservation measures shall achieve the following documented results, normalized for production volume:

BRONZE	SILVER	GOLD
No requirement	A 10% or greater improvement from baseline (no less than one year ago, no greater than 3 years ago), as described in 3.2.4.2.	A 20% or greater improvement from baseline (no less than one year ago, no greater than 3 years ago), as described in 3.2.4.2.

3.2.5 Waste Reduction and Management

3.2.5.1 Waste Reduction Goals and Management Plan. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
The company shall have set measureable, publicly available goals for company-wide waste reduction and diversion, with a priority given to waste reduction. Goals shall include all company and co-manufacturing operations; shall be aggressive; and shall be deemed reasonable by the certifier.	The company shall have a documented waste management plan to meet the company's waste reduction goals for company and co-manufacturing operations, including clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring and reporting on progress, procedures for corrective action; and periodic management review. Waste reduction management plan shall be supported as needed by facility-specific operating plans and procedures including, for example, forecasting, production records, inventory management, alternates to landfill and incineration for disposal of waste, and waste-to-feed exchanges (by-product synergy).	

3.2.5.2 Total Waste Audit. The following requirements shall apply to all types of waste at all company and co-manufacturing facilities. The company shall track and document total waste per facility, including pre-production waste; post-production waste; total solid waste to landfill or incinerator including non-production waste; and company-wide total waste normalized to sales or production volume. For each co-manufacturing facility, company's portion of waste, including solid waste to landfill or incinerator, shall be calculated as follows:

$$S_c = S_t(V_c/V_t)$$

S_c = Company's portion of co-manufacturing facility's waste

S_t = Co-manufacturing facility's total waste

V_c = Portion of co-manufacturing facility's volume produced for company

V_t = Co-manufacturing facility's total production volume

The company shall maintain records on amount (e.g., pounds) and type (e.g., recyclable material, solid waste, etc.) over a period of at least three days of normal operations; tracking shall be conducted at the frequency shown below. Tracking data shall be compiled to show yearly performance; yearly performance data shall be available to the public.

BRONZE	SILVER	GOLD
Tracking conducted at least quarterly.	Tracking conducted at least monthly.	

3.2.5.3 Total Waste Reduction.

BRONZE	SILVER	GOLD
No requirement.	The company shall demonstrate total waste reduction, normalized for sales volume, by comparing the most recent audit from 3.2.5.2 to the baseline. The baseline shall be the beginning amount of waste after the first audit or, if audits have been conducted for more than one year, the waste level no greater than 3 years ago.	

3.2.5.4 Total Waste Diversion. The following requirements shall apply to all company and co-manufacturing operations. The company shall document diversion, excluding incineration, of at least the following percent of total operational waste (excluding construction or renovation material) from the landfill based on the most recent waste audit conducted during normal operations according to 3.2.5.2:

BRONZE	SILVER	GOLD
25%	50%	80%

3.2.5.5 Solid Waste Recycling. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER	GOLD
No requirement.	The company shall research and document local solid waste recycling options in the locations it operates. The company shall maintain and document a recycling program for materials for which recycling is locally available and have clearly marked sorting mechanisms (e.g., bins) in areas waste is collected. Materials may include, but are not limited to, aluminum, plastic (1-5), steel, glass, cardboard, newspaper, mixed paper, electronics, inkjet and toner cartridges, paint, batteries, and fluorescent lighting including CFLs.	

3.2.6 Toxicity

3.2.6.1 Safer Chemistry Planning and Management. The following requirements shall apply to all company and co-manufacturing operations. The company shall have a documented, corporation-wide safer chemistry program that will reduce or remove the use or generation of hazardous chemicals, in a priority order, from products and processes in US and international operations and from their products and replace them with environmentally preferable alternatives. The program as needed shall include the following elements:

BRONZE	SILVER	GOLD
• Identify and prioritize hazardous chemicals by conducting a green screen for product lines (e.g., see Appendix D for examples on how to do this) and using Green Seal's Red List of High Hazard Chemicals • Show how hazardous chemicals are handled, used and disposed of in accordance to national or international guidelines and regulations • Develop a safer chemistry management plan for replacing or eliminating identified hazardous chemicals. The plan shall include measureable goals, clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring and reporting on progress, procedures for corrective action; and periodic management review. As needed, the plan may require actions from co-manufacturers, suppliers and sub-suppliers problematic ingredients.		

3.2.6.2 Safer Chemistry Performance. The following requirements shall apply to all company and co-manufacturing operations. The company shall:

BRONZE	SILVER	GOLD – meet all Silver requirements plus:
No requirement.	• Demonstrate achievements in replacing or eliminating at least 75% of hazardous chemicals with safer alternatives • For hazardous chemicals that are not eliminated, demonstrate that they are being reused, recycled and treated to render them less hazardous. • After highest priority chemicals are replaced, institutionalize plan to continually address lesser priority chemicals of concern. • Demonstrate that products made by this company and processes used by this company anywhere in the world meet or exceed the EU Regulation EC no. 1907/2006 that promotes the safe use of chemicals.	• Demonstrate achievements in replacing or eliminating *all* hazardous chemicals; those not replaced shall be explained.

3.2.6.3 Safer Chemistry Reporting. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER	GOLD
The company shall publicly report on meeting the goals of their safer chemistry program in their annual report and provide updates on their website. The annual report(s) shall contain summaries of both the domestic and international safer chemistry program and their achievements. The company's website shall provide periodic updates of the safer chemistry progress in between annual reports.		

3.2.7 Indigenous Peoples

3.2.7.1 Inventory of Potential Impacts on Indigenous Peoples.

BRONZE	SILVER	GOLD
Company shall have a documented, publically available inventory of potential impacts on indigenous peoples of all company and co-manufacturing operations, including raw materials		

harvesting or mining by the company or co-manufacturers. (Impacts on indigenous peoples related to supplier or sub-supplier activities are covered in sections 3.3 and 3.4). Inventory may be developed using the RECIPE for Dialogue Project Guidebook or similar tool, and shall include the following

1. Document the location and size of land owned, leased, managed in, or adjacent to, areas that Indigenous Peoples are present in, or have collective attachment to.
2. For operations located in areas that may affect indigenous peoples, per the criteria listed above in (1), a description of significant impacts of activities, products, and services on indigenous peoples will be provided. Impacts on indigenous peoples shall be evaluated based on a social assessment carried out by experienced social scientists, and shall include free, prior and informed consultation with affected indigenous peoples.
3. Prioritize and document the company or co-manufacturing sites or operations in terms of threat to indigenous peoples.
4. If the inventory shows that company and co-manufacturing operations have no potential impacts on indigenous peoples, document that finding. Companies with no potential impacts on indigenous peoples do not need to meet requirements 3.2.7.1.1 and 3.2.7.1.2 below.

3.2.7.1.1 Indigenous Peoples Policy.

BRONZE	SILVER	GOLD
If the company's inventory of potential impacts on indigenous peoples (3.2.7.1) shows the potential for significant impacts on indigenous peoples, the company shall have in place a documented, publically available policy, consistent with the World Bank Indigenous Peoples Policy or equivalent, requiring that in its operations and co-manufacturing operations the company fully respects the dignity, human rights, economies, and cultures of indigenous peoples. The policy shall require the company, in deciding whether to proceed with an activity that may affect indigenous peoples (e.g., facilities construction or expansion, infrastructure investment, natural resource development), to ascertain whether the affected indigenous peoples' communities provide their free, prior and informed consent to the project. The policy shall prohibit an activity that may affect indigenous peoples from going forward in the absence of documented free, prior and informed consent from affected indigenous peoples' communities. The determination of free, prior and informed consent from affected indigenous peoples' communities shall be made on the basis of the social assessment and the free, prior and informed consultation of affected indigenous peoples' communities (3.2.7.1).		

3.2.7.1.2 Indigenous Peoples Action Plan.

BRONZE	SILVER	GOLD
If the company's inventory of potential impacts on indigenous peoples (3.2.7.1) shows the potential for significant impacts on indigenous peoples, company shall have a documented, publically available indigenous peoples action plan that shall address all company and co-manufacturing operations identified by the inventory as potentially creating impacts on indigenous peoples. The action plan shall address all potential impacts identified in the inventory and include measurable goals; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. The aims of the action plan shall include, but not be limited to, the following: • Avoid potentially adverse effects on the Indigenous Peoples' communities; or when avoidance is not feasible, minimize, mitigate, or compensate for such effects. • Ensure that the indigenous peoples receive social and economic benefits from company activities that are culturally appropriate and gender and intergenerationally inclusive. • Where there is documented free, prior and informed consent from affected indigenous communities for an activity that might impact their communities (3.2.7.1.1), the company shall prepare a detailed, publically available report that documents: a. the findings of the social assessment; b. the process of free, prior and informed consultation with the affected indigenous peoples' communities; c. additional measures, including project design modification, that may be required to address adverse effects on the indigenous peoples and to provide them with culturally appropriate project benefits; d. recommendations for free, prior, and informed consultation with and participation by indigenous peoples' communities during project implementation, monitoring, and evaluation; and e. any formal agreements reached with indigenous peoples' communities.		

3.2.8 Biological Diversity

3.2.8.1 Inventory of Potential Impacts on Biodiversity.

BRONZE	SILVER	GOLD
Company shall have a documented, publically available inventory of potential biodiversity impacts of all company and co-manufacturing operations, including raw materials harvesting or mining by the company or co-manufacturers. (Biodiversity impacts related to supplier or		

sub-supplier activities are covered in sections 3.3 and 3.4). Inventory may be developed using the Integrated Biodiversity Assessment Tool or similar approach, and shall include the following:

1. Document the location and size of land owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas.
2. Provide a description of significant impacts of activities, products, and services on biodiversity in protected areas and areas of high biodiversity value outside protected areas.
3. Identify and document any IUCN Red List species and national conservation list species with habitats in areas affected by operations, by level of extinction risk.
4. Prioritize and document the company's sites or operations in terms of threat to biodiversity.
5. If the inventory shows that company and co-manufacturing operations have no potential biodiversity impacts, document that finding. Companies with no potential biodiversity impacts do not need to meet requirement 3.2.8.1.1 below.

3.2.8.1.1 Biodiversity Action Plan.

BRONZE	SILVER	GOLD

Based on the findings of its biodiversity inventory (3.2.8.1), if any company or co-manufacturing sites or operations may have a potential negative impact on biodiversity, company shall have a documented, publically available biodiversity action plan to mitigate or eliminate these impacts. The action plan shall include measurable goals; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. The aims of the action plan shall include, but not be limited to, the following:

- Conserve biodiversity and avoid the conversion or degradation of natural habitat
- Use biological resources sustainably
- Ensure informed participation of, and share benefits equitably with, local communities
- Strengthen management systems
- Monitor, evaluate, report on progress

3.2.9 Social and Environmental Impact Assessment

3.2.9.1 Social and Environmental Impact Assessment Policy. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER	GOLD
For any new construction project, investment, expansion, or other activity that could have a potential social or environmental impact (e.g., facilities construction or expansion, infrastructure investment, natural resource development, including raw materials harvesting or mining by the company or co-manufacturers), company shall have a documented, publically available policy requiring a social and environmental screening and, for all projects likely to have significant or limited impacts, a social and environmental impact assessment of the activity. The policy shall follow the guidance of the Equator Principles; the International Finance Corporation's Environmental and Social Review Procedure and Performance Standards; or equivalent. The ten Equator Principles for social and environmental impact assessment are: (1) Review and Categorization; (2) Social and Environmental Assessment; (3) Applicable Social and Environmental Standards; (4) Action Plan and Management System; (5) Consultation and Disclosure; (6) Grievance Mechanism; (7) Independent Review; (8) Covenants; (9) Independent Project Monitoring and Reporting; and (10) Annual Reporting on Equator Principle Implementation.		

3.2.9.2 Social and Environmental Impact Assessment Reporting. The following requirements shall apply to all company and co-manufacturing operations.

BRONZE	SILVER	GOLD
No requirement.	Company shall provide a publically available report at least annually on implementation of its social and environmental impact assessment policy (3.2.9.1), including at a minimum the following: • Results of social and environmental screening for all projects screened • Results of free, prior informed public consultation on all proposed projects • Summary of all social and environmental impact assessment findings	

	• Progress on implementation of all social and environmental mitigation plans • All complaints made to the company's grievance mechanism about company projects and the resolution of such complaints

3.3 SUPPLIER MANAGEMENT

3.3.1 First-Tier Supplier Code of Conduct. Company shall:

BRONZE	SILVER:	GOLD:
Have in place a publically available Code of Conduct, consistent with the objectives and requirements of this standard, for all first-tier suppliers. Code of Conduct shall be documented and shall include but not be limited to the following topics: 1. Fair labor practices and workplace conditions (including child labor; forced and compulsory labor; health and safety; freedom of association and right to collective bargaining; discrimination; disciplinary practices; working hours; and remuneration) 2. Governance & transparency (e.g., GRI reporting for small & medium enterprises) 3. Social and environmental issues including policies, management, tracking and reporting (e.g., GHG emissions; energy; water; chemicals & hazardous materials; waste; biodiversity; indigenous peoples' rights, sustainability of raw materials) 4. Bribery & corruption (e.g., Business Principles for Countering Bribery) 5. Sub-supplier management (e.g., requirements for first-tier suppliers to monitor compliance with these principles among subcontractors and among second-tier suppliers, third-tier suppliers, etc.) 6. Compliance with laws and regulations	Meets Bronze requirements plus: Code of Conduct shall require first-tier suppliers to conform to the requirements of the SA 8000 standard or equivalent.	

3.3.1.1 Manage First-Tier Suppliers' Compliance.

Company shall identify all first-tier suppliers have a process in place to manage all first-tier suppliers for compliance with local laws and the Code of Conduct. Company shall document:

BRONZE	SILVER	GOLD
The country of origin for 100% of all materials (e.g., wood, metal, ingredients, resins) or components (e.g., zippers, circuit boards, bottles) that the company purchases directly (from first-tier suppliers) to make the company's final products; and the location of 100% of first-tier suppliers' facilities used to produce the materials or components the company purchases. Procedures ensuring that prior to entering into relationship with a new first-tier supplier, the supplier is evaluated by company for compliance with Code of Conduct, quality of production, and capacity for production. Evidence of monitoring by company, or by third-party approved by company, including interview and site visits; record of problems identified. Evidence of working with suppliers to resolve issues found during social and environmental compliance evaluations, and documentation of specific corrections and improvements taken to resolve social and environmental compliance issues.	Meets Bronze requirements plus: Company provides education or other supporting resources to assist suppliers and sub-suppliers in meeting the Code of Conduct.	

3.3.2 Identify Highest-Priority Suppliers and Sub-Suppliers.

BRONZE	SILVER	GOLD
Identify and document its highest-priority domestic and international suppliers – including first-tier, second-tier or higher if needed – based on purchase volume and social or environmental impact. • Highest-volume suppliers or sub-suppliers whose raw materials, processes or products create moderate to highly significant impacts on greenhouse gas emissions, water, waste, toxics or hazardous materials, biodiversity, indigenous peoples, or other environmental or social impacts such as degradation of primary tropical moist forests, child labor, or human rights problems.		

- Lower-volume suppliers or sub-suppliers shall also be identified if their social or environmental impacts are especially significant, sensitive, or irreversible; or if the supplier or its products have high profile with NGOs or have had significant media coverage, e.g. forestry, specific chemicals, country of origin might be associated with child labor or human rights problems.

3.3.2.1 Management Plan for Highest-Priority Suppliers and Sub-Suppliers.
Develop a documented management plan to reduce, in priority order, the social and environmental impacts of its highest-priority suppliers and sub-suppliers. The plan shall include measurable goals; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. The action plan shall include, but not be limited to, the following:

BRONZE	SILVER – all Bronze requirements plus:	GOLD – all Silver requirements plus:

• Programs to assist highest-priority suppliers and sub-suppliers to substantially reduce their social and environmental impacts.
• Implementation of lower-impact sourcing strategies where existing suppliers or sub-suppliers are making insufficient progress.
	• Demonstrate achievements in substantially reducing or eliminating the social and environmental impacts from at least 75% of the highest-priority suppliers and sub-suppliers.
	• Company maintains appropriate records of suppliers or sub-suppliers commitments to social and environmental accountability and their performance against these commitments, including but not limited to contractual agreements and written commitments of suppliers or sub-suppliers to:
	  • Conform to the requirements of the SA 8000 standard or equivalent
	  • Participate in social and environmental monitoring activities as requested by company and implement prompt corrective and preventive actions
	  • Ensure that home workers are afforded a similar level of protection as directly employed personnel
		• Demonstrate achievements in substantially reducing or eliminating *all* of the social and environmental impacts from highest-priority suppliers and sub-suppliers; those impacts not reduced or eliminated shall be explained.
		• After impacts have been substantially reduced or eliminated at highest-priority suppliers and sub-suppliers, institutionalize plan to continually address lesser priority supplier and sub-supplier impacts.

3.3.3 Supply Decisions. In order to ensure that first-tier supplier compliance with (a) local laws and the Code of Conduct (3.3.1.1) and (b) the action plan for highest-priority suppliers and sub-suppliers (3.3.2.1) are incorporated into all supply decisions, company shall provide documented evidence of the following:

BRONZE	SILVER	GOLD
• For all first-tier suppliers, documented supplier compliance with local laws and Code of Conduct is required as a condition of continued procurement of suppliers' products or services. • For highest-priority suppliers and sub-suppliers, documented compliance with relevant goals, targets and timetables of action plan is also required as a condition of continued procurement of suppliers' products or services. • A senior officer is responsible for enforcement of compliance with local laws, supplier Code of Conduct, and action plan for highest-priority suppliers and sub-suppliers. Enforcement of these requirements is on a par with enforcement of product quality requirements. • All relevant purchasers and supply chain managers are aware of the Code of Conduct and the action plan for highest-priority suppliers and sub-suppliers; responsible for integrating them into supply decisions; and accountable for their performance. • An annual, publically available report on its supplier management activities and performance.		

3.4 PRODUCT LIFE CYCLE IMPACTS

3.4.1 Product Life Cycle Assessment

LCA shall be conducted on the products sold by the company. If the LCAs identify significant environmental issues of immediate concern, steps to address these issues may be required prior to certification. Where applies, the product co-manufactures, suppliers, or sub-suppliers shall be included in this assessment.

3.4.1.1 Prioritization of Products for Life Cycle Assessment.

BRONZE	SILVER	GOLD
• The company shall complete the Green Seal™ LCA Prioritization Questionnaire for Companies[1] and submit it to the certifying organization. • The certifying organization shall identify up to five unique product systems that have more significant environmental impacts than other products sold by the company, based on product volume and type and level of impacts.		

3.4.1.2 Life Cycle Assessment. The certifying organization shall complete LCAs using ISO 14040 and 14044 methodology. The scope of the assessments shall be from raw material production through to the product and package disposal. The LCA shall be:

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Silver requirements plus:
• Conducted on each unique product process identified in 3.4.1.1 in a screening-level approach. This means that company-specific and inventory data may not be needed.	• Conducted on at least three of the unique product process identified in 3.4.1.1 with an internal-level approach. This means that company-specific data shall be used, but unit process inventory data may not be needed.	• Conducted on each of the unique product process identified in 3.4.1.1 with an internal-level approach. This means that company-specific data shall be used, but unit process inventory data may not be needed. The studies shall be peer reviewed by third-party reviewers. • Conducted on at least one of the unique product process identified in 3.4.1.1 in an inventory-level approach. The study shall be peer reviewed by third-party reviewers.

If a company has completed LCA on the products identified in 3.4.1.1 in the last 3 years, provided no substantive changes have been made to the product, process, or package, shall be provided to the certifying organization. The company's previously completed LCA work will be incorporated into the LCA analysis for the company certification program.

[1] The Green Seal LCA Prioritization Questionnaire for Companies is a free tool, available through Green Seal's web site, that was developed with LCA expert and stakeholder input. It is not a proprietary tool.

3.4.1.3 Life Cycle Action Plan.

BRONZE	SILVER: Meets Bronze requirements plus	GOLD: Meets Silver requirements plus
• The company and certifying organization shall develop a set of aggressive, measureable Bronze-level goals based on the results of the Bronze-level LCAs in 3.4.1.2. The goals shall focus on effectively reducing the largest sources of environmental impacts in the product life cycle, from whatever source those impact come from (e.g. direct or indirect). • The goals shall also encompass environmental impact reduction attributed to each phase of the life cycle, where applies: raw materials, manufacturing, packaging, distribution, use, disposal. • The goals shall be reported publicly through the company and certifying organization's web sites. • The company and certifying organization shall develop an LCA Action Plan that will enable the company to achieve its goals according to a reasonable time-table. The LCA Action Plan shall include target completion dates for each goal, including intermediate benchmarks for long-term goals; clearly defined roles and responsibilities; time-bound actions; monitoring and reporting on progress; procedures for corrective action; and periodic management review.	• Based on the additional Silver-level LCAs in 3.4.1.2, the company shall modify the Bronze-level goals and action plan as needed and develop additional Silver-level goals, with a target completion date for each goal including intermediate benchmarks for long-term goals.	• Based on the additional Gold-level LCAs in 3.4.1.2, the company shall modify the Bronze-level and Silver-level goals and action plan as needed and develop additional Gold-level goals, with a target completion date for each goal including intermediate benchmarks for long-term goals.

3.4.1.4 Life Cycle Continuous Improvement and Leadership. The company shall evaluate performance against its action plan outlined in 3.4.1.3, at least annually, and report progress to the certifying organization. As progress is made on the action plan, the goals shall be updated and reported to the certifying organization.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Silver requirements plus:
For initial Bronze certification: No requirement. After initial Bronze certification: • Company shall demonstrate that it is making all reasonable efforts to achieve the Bronze-level goals of the LCA Action Plan outlined in 3.4.1.3, including substantial compliance with the target completion dates and intermediate benchmarks for each goal.	After initial Silver certification: • Company shall demonstrate that it is making all reasonable efforts to achieve the Bronze-level and Silver-level goals of the LCA Action Plan outlined in 3.4.1.3, including substantial compliance with the target completion dates and intermediate benchmarks for each goal. • Company shall demonstrate that it has significantly reduced its environmental impacts identified in 3.4.1.2.	After initial Gold certification: • Company shall demonstrate that it is making all reasonable efforts to achieve the Bronze-level, Silver-level, and Gold-level goals of the LCA Action Plan outlined in 3.4.1.3, including substantial compliance with the target completion dates and intermediate benchmarks for each goal. • Company shall demonstrate that it has significantly reduced its environmental impacts identified in 3.4.1.2. • The company shall demonstrate innovation and leadership in its efforts to reduce its environmental impact identified in 3.4.1.2.

3.4.2 Product Raw Materials

3.4.2.1 Product Raw Materials Management Plan.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
Company shall implement the raw materials-related actions in the LCA Action Plan (3.4.1.3).	The company shall have documented management plan with goals for increasing the sustainability of raw materials for the company's products; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management	

	review. As needed, the plan may require actions from co-manufacturers and may also involve suppliers and sub-suppliers. The action plan may include such topics as: • Use of fewer materials • Use of fewer new or virgin materials • Eliminating impacts on indigenous peoples and biodiversity • Sustainably harvested raw materials (e.g., FSC-certified fiber) • Locally derived materials. • Materials with significant post-consumer recycled content. • Materials that can be re-used or recycled at end of life. • Compostable materials. • Materials that can be acquired with less energy or fewer GHG emissions than current materials • Materials that are less toxic than current materials.

3.4.3 Product Manufacturing

3.4.3.1 Product Manufacturing Management Plan. Section 3.2 includes management plans to reduce company-wide impacts from energy, water, waste, toxics, and additional impacts. Those plans should incorporate manufacturing impacts; accordingly, the management plan developed under this section should incorporate the plans under Section 3.2 and build on them as needed.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
Company shall implement the product manufacturing-related actions in the LCA Action Plan (3.4.1.3).	The company shall have a documented product manufacturing management plan with goals for reducing environmental impacts; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. As needed, the plan may require actions from co-manufacturers and may also involve suppliers and sub-suppliers. The plan shall incorporate and build on related plans, such as those required in section 3.2, and shall include but not be limited to the following elements: • GHG emissions, energy-efficiency and conservation • Water use • Waste • Toxics	

3.4.4 Product Packaging

3.4.4.1 Packaging Policy and Management Plan. Appendix E. Companies shall document the following:

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Silver requirements plus:
Company shall implement the packaging-related actions in the LCA Action Plan (3.4.1.3).	The company shall have documented management plan with goals for reducing packaging and increasing packaging sustainability; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. As needed, the plan may require actions from co-manufacturers and may also involve suppliers and sub-suppliers. The action plan may include such topics as: • Evaluate sustainability of existing packaging • Reduce unnecessary, larger or heavier than necessary packaging • Increase recyclability or reuse of packaging • Institutionalized sustainable packaging plan with measurable targets in place. • Demonstrate progress toward sustainable packaging plan targets. • Evaluate opportunities to increase the use of environmentally preferable materials used in packaging • Demonstrate efficient packaging and shipping using relevant metrics (*e.g.*, product/package ratio and cube utilization) • Ensure safety of packaging for food, medicine and other ingestible products.	• Achieve significant, measurable packaging improvements • Demonstrate leadership in improved packaging standards across the industry • Eliminate hazardous materials in all packaging

3.4.5 Product Transport

3.4.5.1 Product Transportation Management Plan.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
Company shall implement the transport-related actions in the LCA Action Plan (3.4.1.3).	The company shall have a documented, corporation-wide product transportation management plan with goals for GHG emissions reduction and transportation efficiency; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. The action plan may include the following topics: • Tracking environmental performance of transportation, including fuel used (amount and type), miles traveled, waste generated, water and energy used, and other relevant measures. • Optimizing transportation (distance and type). • Maximizing use of more efficient modes of transport, such as ocean and rail. • Reducing vehicle mileage, including use of route management software to minimize number of trips. • Promotion of fuel-efficient vehicles or alternatively-fueled vehicles. • Use of environmentally preferable fleet maintenance practices. • Driver education.	

3.4.5.2 Vehicle Use. The company shall utilize, with documentation to demonstrate, EPA SmartWay certified, fuel-efficient vehicle, hybrid-electric, or alternatively-fueled vehicles for direct business accordingly:

BRONZE	SILVER	GOLD
No requirement	At least 25% of cumulative vehicle miles driven annually	At least 50% of cumulative vehicle miles driven annually.

3.4.6 Product Use

3.4.6.1 Inventory of Product Environmental Impacts During Product Use.

BRONZE	SILVER	GOLD
Company shall have a documented inventory of potential environmental impacts of company's products during product use. Such impacts during product use might include, for example: • Energy consumption • Water consumption • Air and water emissions • Human health impacts If the inventory shows that the company's products have no environmental impacts during product use, document that finding. Companies whose products have no potential environmental impacts during product use do not need to meet requirement 3.4.6.1.1 below.		

3.4.6.1.1 Plan to Reduce Product Environmental Impacts During Product Use.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
Company shall implement the product use-related actions in the LCA Action Plan (3.4.1.3).	If the company's inventory of potential environmental impacts during product use (3.4.6.1) shows the potential for significant impacts, the company shall have a documented management plan to reduce the use-phase environmental impacts of its products. The aim of the plan will be to produce products in the greenest 20% or better of their product category (e.g., top 20% in energy efficiency, lowest 20% for VOC emissions) during product use. The plan will include clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. The scope of the action plan shall include all relevant use-phase environmental impacts identified in the inventory (3.4.6.1) such as, but not limited to: • Energy use • Water use • Air and water emissions • Human health impacts	

3.4.7 End of Product Life

3.4.7.1 Inventory of Product Environmental Impacts at End of Product Life.

BRONZE	SILVER	GOLD
Company shall have a documented inventory of potential environmental impacts of company's products at end of product life. Such end-of-life impacts might include, for example: • Waste • GHG or other emissions to air, soil, or water • Impediments to reuse, remanufacturing, recycling or other environmentally preferable end-of-life options • Human health impacts If the inventory shows that the company's products have no environmental impacts at end of life, document that finding. Companies whose products have no potential environmental impacts at end of life do not need to meet requirements 3.4.7.1.1 below.		

3.4.7.1.1 Product Stewardship.

BRONZE	SILVER: Meets Bronze requirements plus:	GOLD: Meets Bronze requirements plus:
Company shall implement the product end-of-life-related actions in the LCA Action Plan (3.4.1.3).	• If the company's inventory of potential environmental impacts at end of product life (3.4.7.1) shows the potential for significant impacts, the company shall have a documented, corporation-wide product end-of-life management plan with goals for reducing product end-of-life impacts; clearly defined roles and responsibilities; baseline benchmarks; time-bound actions; monitoring, reporting, and procedures for corrective action; and periodic management review. The action plan shall include all relevant use-phase environmental impacts identified in the inventory (3.4.7.1) such as, but not limited to: • Designing for products that are durable, re-useable, recyclable, compostable, or otherwise avoid the solid waste stream • Reducing product end-of-life waste, emissions, health impacts • Developing take-back programs for products or product components that are large, complex, or difficult for purchaser to recycle or to dispose of safely (e.g., electronic equipment, carpets, paint, vehicles, products containing mercury, packaging).	

3.5 PRODUCT ENVIRONMENTAL CERTIFICATION

The company shall provide evidence that products have been certified by third-party certification programs, when such certifications exist for a product category. The following hierarchy applies to certification programs:

Tier 1. Leadership-level, multi-attribute, life-cycle-based (ISO 14024) standards certified by third party certification programs with on-site audits and periodic monitoring. If, and only if, such programs do not exist for the product category under consideration, move to Tier 2 below.

Tier 2. Multi-attribute, life-cycle-based standards where compliance is self-declared. If, and only if, Tier 1 and 2 programs do not exist for the product category under consideration, move to Tier 3 below.

Tier 3. Single-attribute or non-life-cycle-based standards certified by a third party, including on-site audits and periodic monitoring. If, and only if, Tier 1, 2 and 3 programs do not exist for the product category under consideration, move to Tier 4 below.

Tier 4. Single-attribute or non-life-cycle-based standards where compliance is self-declared.

BRONZE	SILVER	GOLD
1. At the time of initial Bronze certification to this standard, for product categories where third-party certification programs exist, the company shall have achieved third-party certification for: (a) at least 5% of its products (must be at least one product); OR (b) at least 15 products. In addition, at the time of initial certification the company shall commit to achieving third-party certification for at least 25% of its products for product categories where such certification programs exist.	1. At the time of initial Silver certification to this standard, the company shall have achieved third-party certification for at least 25% of its products for product categories where such certification programs exist; and the company shall commit to achieving third-party certification for at least 50% of its products, measured by production volume, for product categories where such certification programs exist. 2. The company shall have a	1. At the time of initial Gold certification to this standard, the company shall have achieved third-party certification for at least 50% of its products, measured by production volume, for product categories where such certification programs exist; and the company shall commit to achieving third-party certification for at least 80% of its products, measured by production volume, for product categories where such certification programs exist. 2. The company shall have a

2. The company shall have a documented plan in place to achieve this 25% goal by a target date that is (a) aggressive; (b) commensurate with the level of effort required by the company to achieve this goal, and (c) deemed reasonable by the certifier. 3. By the target date agreed in part 2 above, at least 25% of all the company's products shall have been certified by third-party certification programs, for product categories where such certification programs exist. 4. Company shall demonstrate yearly progress on achieving third-party certification of its products for product categories where such certifications exist.	documented plan in place to achieve this 50% goal by a target date that is (a) aggressive; (b) commensurate with the level of effort required by the company to achieve this goal, and (c) deemed reasonable by the certifier. 3. By the target date agreed in part 2 above, at least 50% of all the company's products, measured by production volume, shall have been certified by third-party certification programs, for product categories where such certification programs exist. 4. Company shall demonstrate yearly progress on achieving third-party certification of its products for product categories where such certifications exist.	documented plan in place to achieve this 80% goal by a target date that is (a) aggressive; (b) commensurate with the level of effort required by the company to achieve this goal, and (c) deemed reasonable by the certifier. 3. By the target date agreed in part 2 above, at least 80% of all the company's products, measured by production volume, shall have been certified by third-party certification programs, for product categories where such certification programs exist. 4. Company shall demonstrate yearly progress on achieving third-party certification of its products for product categories where such certifications exist.

In some sectors where the market penetration of certified green products is very high or very low, the required percentages may be adjusted accordingly by the certifier. Further, certification is not required for a product category when there is no credible Tier 1, 2, 3, or 4 program in existence for the product category under consideration. Appendix F provides examples of programs that may qualify for tiers 1, 2, 3, and 4.

4.0 CONTINUOUS IMPROVEMENT

4.1 Company Charter

BRONZE	SILVER	GOLD
The company shall have a company strategic plan or charter that formally adopts a written commitment to the environmentally and socially responsible practices included in this standard.		

4.2 Social and Environmental Responsibility Plan

BRONZE	SILVER	GOLD
The company shall have a social and environmental responsibility plan that includes goals and an action plan related to the criteria of this standard and is updated annually.		

4.3 Continuous Improvement Plan

BRONZE	SILVER	GOLD
The company shall demonstrate annual improvement, for normal operating conditions, based on the action plan included in 4.2. Progress on all goals in plan shall be publicly available.		

4.4 Required Improvement Timing

BRONZE	SILVER	GOLD
Companies at the BRONZE level shall meet SILVER requirements within three years of initial certification.	No requirement	No requirement

5.0 LABELING REQUIREMENTS

BRONZE	SILVER	GOLD
Whenever a company makes a claim that it has been certified to this standard, it shall be based on a third-party certification program with an on-site audit requirement and qualified LCA practitioners (meet requirements section 4), and state: "[Name of company] meets the Green Seal™ Pilot Sustainability Standard for Companies GS-C1 based on its reduced social and environmental impacts including responsible social policies and practices; environmentally preferable product manufacturing and supply chain management; reduction of waste and toxic chemicals and conservation of energy, water, and other natural resources."		

Appendix A. Acceptable EMS Third party verification:

1. A comprehensive EMS audit conducted in conjunction with participation in a State EMS/performance-based program and whose audit team members meet the requirements of the Qualifications for Independent Assessment Team Members below; or
2. An assessment conducted by one of the following (a – c) or equivalent, so long as the lead auditor is not directly employed by the facility *and* did not play a substantive role in developing the EMS for the facility:
   a. an audit led by an individual certified as an EMS lead auditor by RABQSA or the Board of Environmental, Health & Safety Auditor Certifications (BEAC). This includes ISO 14001:2004 certification audits.
   b. a corporate audit whose audit team members meet the requirements of (2)(a) or the Qualifications for Independent Assessment Team Members below;
   c. an audit conducted under an established trade association EMS audit program (e.g., the Responsible Care audit program) whose audit team members meet the requirements of (2)(a) or the Qualifications for Independent Assessment Team Members below.

Qualifications for Independent Assessment Team Members

Individuals wishing to serve as auditors shall meet the qualifications listed in the table below. The selection of the auditors should be based on the ISO 19011:2002 *Guidelines for quality and/or environmental management systems auditing.*

Qualification Category	Lead Auditor	Audit Team Members
Education	Bachelor's degree	Bachelor's degree
Training	**40-hour** RABQSA Accredited ISO 14001:2004 EMS Lead Auditor Course or IPC (formerly IATCA) EMS Lead Auditor courses; must receive passing grade on course examination.	**40-hour** RABQSA Accredited ISO 14001:2004 EMS Lead Auditor Course or IPC (formerly IATCA) EMS Lead Auditor courses; must receive passing grade on course examination.
Work Experience	**Five years** of work experience in environmental management, environmental science and technology, environmental	**Three years** of work experience in environmental management, environmental science and technology, environmental

	regulation, or related field.	regulation, or related field.
Auditing Experience	Auditing experience required is **thirty-five audit days**[1] acting in the role of lead auditor planning, conducting, and reporting on full EMS audits.[2] A maximum of ten days of off-site audit activity is allowed in these thirty-five days. Included in the thirty-five audit days, an applicant must demonstrate at least **seven complete environmental management system audits** as a solo auditor, as a member of an audit team or as an audit team leader. At least **three** of the complete audits and a total of at least fifteen audit days must be performed as an audit team leader managing a team of at least one other auditor.	Auditing experience required is **twenty audit days**[2] acting in the role of co-auditor participating in environmental audits.[3] A maximum of six days of off-site audit activity is allowed in these twenty days. Included in the twenty audit days, an applicant must demonstrate at least **four complete environmental management system audits** as a member of an audit team.

Source: Adapted from PCD19 – RABQSA Competence Qualifications of EMS Auditors

1. An audit day as defined by the ANAB is a minimum of 8 hours. Additional hours above 8 over multiple days may not be used to make additional audit days.

2. EMS audit experience can include ISO 14001:2004 audits, RC 14001:2005/2008 audits, and other EMS audits of similar quality.

3. Audit experience can include regulatory, compliance assistance, pollution prevention, or EMS audits.

Appendix B: Additional Compliance Information

Note: URLs may be out of date and do not reflect on any requirements of the Standard.

The company must report on any significant civil violations of federal, state, provincial, municipal, national, or international workplace or environmental statutes or regulations involving its facilities (owned or managed) or products within the past 12 months, or any criminal violations of these statutes or regulations for which it has been convicted within the last three years. The company must also report any on-going, unresolved litigation relating to these issues. Relevant provisions for this section include for example, but are not limited to, the following federal requirements, as well as related provincial, state or international statutes or regulations (including significant violations in any countries where the company operates or sells products):

- Clean Air Act (high priority violations only)
- Clean Water Act (significant violations only)
- Resource Conservation and Recovery Act (significant violations only)
- Safe Drinking Water Act (maximum contaminant level violations and systems in Significant Non-Compliance (SNCs) only)
- Toxic Substances Control Act
- Federal Insecticide, Fungicide and Rodenticide Act
- National Environmental Policy Act
- Food Quality Protection Act
- Endangered Species Act
- Coastal Zone Management Act
- Oil Pollution Act
- Marine Mammal Protection Act
- Fair Labor Standard Act
- Child labor laws
- Minimum wage laws
- Bribery and corruption laws
- OSHA regulations
- USDA or FDA recalls
- CPSC regulations
- FTC regulations
- FCC regulations

The company should also provide information if it is a potentially responsible party under CERCLA or state superfund programs.

The company should provide information/documentation on the current status and disposition of any violations it reports.

- Companies convicted of any workplace or environmental criminal violations within the past three years are not currently eligible for the program.

- Companies with significant civil violations within the past 12 months, in most cases, are not currently eligible currently for the program.

While compliance with environmental laws and regulations is a Company Certification Program baseline, it is recognize that minor violations of environmental statutes can occur even in companies with strong environmental goals and management programs. The sign of a strong commitment to protecting the environment is not only avoidance of violations, but the speed with which any problems that do occur are recognized and corrected.

Certifier will review submitted documentation relating to significant civil violations, and the present status of those violations, to determine their potential impact on current program eligibility. For example, "significant" violations (as defined by EPA) of the Clean Water Act would, in most cases, create a barrier to eligibility. But some strictly paperwork violations defined by EPA as "significant," if unrelated to actual polluting discharges, and if not part of a pattern of continuing noncompliance, might not prevent a company from being considered for the program.

While most companies will have internal databases on violations, a useful, publicly-accessible database for major violations of several of the above statutes can be found at: http://www.epa-echo.gov/echo/ .

Companies must also submit information on any violations of the federal Occupational Safety and Health or Fair Labor Standards Acts, or of related state or international laws and regulations, during the previous 12 months. While there is no specific program standard for compliance with these laws and regulations, it is expected that any company seeking recognition under the Company Certification Program will demonstrate a socially responsible approach to applicable standards for worker health and safety, child labor, fair wages, and non-discrimination.

Appendix C: Water Use & Conservation

Note: URLs may be out of date and do not reflect on any requirements of the Standard.

This section requires a more significant focus on water conservation for businesses with facilities or offices in water-short areas or arid or semi-arid climate zones. Water-short or stressed basins are as defined by applicable federal, state or provincial programs. Arid and semi-arid climate zones are chronically water-short areas where evaporation exceeds precipitation and are defined by the widely used Koeppen Climate Classification System. (See http://en.wikipedia.org/wiki/K%C3%B6ppen_climate_classification).

For the Bronze level a general report of water use and conservations measures initiated and reductions achieved is expected for all facilities. Facilities not in water-short, arid or semi-arid areas are expected to continue to refine their understanding of the best opportunities for achieving water reductions and to pursue these as they progress through the company certification tiers.

At the Silver level, a detailed water accounting and short- and mid-term plans for reductions are expected for facilities in water-short, arid or semi-arid areas. A high standard of innovative conservation measures with significant reductions in water use is expected by the Gold Level for those facilities in areas that are vulnerable to water shortages.

Accounting for water use has lagged behind Greenhouse Gas accounting but more and more businesses are seeing the advantages of understanding their water use fully. One approach to evaluating water use is to use the World Business Council on Sustainable Development's Global Water Tool. (See www.wbcsd.org/web/watertool.htm.) This free tool debuted in 2007 and provides outputs that are compatible with the GRI reporting framework. There are other methods of accounting for water use that are acceptable as well. For information on water accounting and effective water conservation measures, see:

- The US EPA's WaterSense Program at: http://www.epa.gov/watersense/
- North Carolina Department of Environment and Natural Resources' "Water Efficiency Manual for Commercial, Industrial and Institutional Facilities" at: http://www.p2pays.org/ref/01/00692.pdf
- The American Water Works Association's WaterWiser (water efficiency clearinghouse) at: http://www.awwa.org/Resources/Waterwiser.cfm?ItemNumber=29269&navItemNumber=1561.

Appendix D: Safer Chemistry

Extensive information is available to companies seeking guidance on how to develop a program to reduce the use of high-level hazardous chemicals from their operations. The following are some helpful resources. Note: URLs may be out of date and do not reflect on any requirements of the Standard.

Tools: Red Lists, Green Screens

1. Green Seal developed a Red List, based on Clean Production Action's Green Screen, to identify Hazardous Substances of the highest priority for reduction or elimination. This red list contains substances that are persistent, bioaccumulative, carcinogenic, mutagenic, and toxic for a variety of endpoints.

The Green Seal Red List of High Hazard Chemicals

Companies practice safer chemistry by assessing the hazard level of the chemicals in their products and moving to replace the highest hazard ingredients with safer substitutes. This chemical assessment is done by means of a green screen that evaluates whether chemicals are persistent, bioaccumulative or toxic and considers the evidence for adverse human health effects and ecotoxicity. In developing our "Red List", we have drawn on Clean Production Action's well-respected "Green Screen for Safer Chemicals: Evaluating Flame Retardants for TV Enclosures"[2] which, in turn, incorporates the work of many others.[3]

Green Seal is asking companies to focus initially on screening their products for the highest hazard chemicals and working to replace those with safer substitutes. The "Red List" below provides the threshold values for each chemical hazard rated as high in the Green Seal program.

Threshold Values for Each Chemical Hazard Included in a Green Screen[4]

Hazard	High Hazard
Environmental Fate	
Persistence (half-life in days)	- Soil or sediment >60 days; - Water >40 days; or - Potential for long-range environmental transport

[2] [2] Adapted from "The Green Screen for Safer Chemicals: Evaluating Flame Retardants for TV Enclosures" by Clean Production Action, March 2007, available at http://www.cleanproduction.org/library/Green%20Screen%20Report.pdf.

[3] Clean Production Action references work by the International Agency for Research on Cancer (IARC), The Occupational Safety and Health Administration, the National Toxicology Program, California Prop 65, the European Union, Japan and the US Environmental Protection Agency. See the report in Footnote One for more details.

[4] This table reproduces the Very High and High categories from Table 3 in "The Green Screen for Safer Chemicals: Evaluating Flame Retardants for TV Enclosures", Clean Production Action, March 2007.

Bioaccumulation Potential	- BCF/BAF >1000; - Absent such data log K_{ow} >4.5; or - Weight of evidence demonstrates bioaccumulation in humans or wildlife
Ecotoxicity	
Acute Aquatic Toxicity	- $LC_{50}/EC_{50}/IC_{50}$ <1 mg/l; or - GHS Category 1 - NOEC <0.1 mg/l; or - GHS Category 1
Human Health	
Carcinogenicity	- Evidence of adverse effects in humans; - Weight of evidence demonstrates potential for adverse effects in humans; - NTP known or reasonably anticipated to be human carcinogen; - OSHA carcinogen; - USE EPA known/likely (probable); - California Prop 65; - IARC Group 1 or 2A; - EU Category 1 or 2; or - GHS Category 1A or 1B
Mutagenicity / Genotoxicity	- Evidence of adverse effects in humans; - Weight of evidence demonstrates potential for adverse effects in humans; - EU Category 1 or 2; or - GHS Category 1A or 1B
Reproductive Toxicity	- Evidence of adverse effects in humans; - Weight of evidence demonstrates potential for adverse effects in humans; - EU Category 1 or 2; or - GHS Category 1A or 1B
Developmental Toxicity	- Evidence of adverse effects in humans; - Weight of evidence demonstrates potential for adverse effects in humans; - NTP Center for the Evaluation of Risks to Human Reproduction; - California Prop 65
Acute Toxicity (oral, dermal, or inhalation)	- LD_{50} <50 mg/kg bodyweight (oral); - LD_{50} <200 mg/kg bodyweight (dermal); - LC_{50} <500ppm (gas); - LC_{50} <o.5 mg/l (dust or mist); - US EPA Extremely Hazardous Substance List; or - GHS Category 1 or 2
Corrosion/Irritation of the Skin or Eye	- Evidence of irreversible effects in studies of human population; - Weight of evidence of irreversible effects in animal studies; or

	- GHS Category 1 (skin or eye)
Sensitization of the Skin or Respiratory System	- Evidence of adverse effects in humans' - Weight of evidence demonstrates potential for adverse effects in humans; - GHS Category 1 – (skin or respiratory); or - Positive responses in predictive Human Repeat insult Patch Tests (HRIPT) (skin)
Physical/Chemical Properties	
Explosive	- GHS Category: Unstable explosives or Divisions 1.1, 1.2, or 1.3
Flammable	- GHS Category 1 – Flammable Gases - GHS Category 1 – Flammable Aerosols; or - GHS Category 1 or 2 – Flammable Liquids

2. Green Chemistry Expert System (GCES) is a free computer program that helps reduce or eliminate the use or production of hazardous substances. It identifies opportunities for greener chemicals through design and process modifications, suggests alternatives and provides a searchable database of green chemistry references.

- http://www.epa.gov/greenchemistry/pubs/gces.html

3. The Clean Production Action: Green Screen

- http://www.cleanproduction.org/Green.php

4. PRIO is the Swedish Chemical Agency's web-based tool for hazardous chemicals reduction that takes into account the EU chemicals legislation, REACH. It includes a priority-setting guide and searchable database.

- http://www.kemi.se/templates/PRIOEngframes____4144.aspx

5. Design for the Environment: Screen for Safer Chemical Ingredients (The Formulator Program)

- http://www.epa.gov/dfe/pubs/projects/gfcp/index.htm

6. Legislation

European Union, 2007: REACH – Registration, Evaluation, Authorization and Restriction of Chemical substances

- http://ec.europa.eu/environment/chemicals/reach/reach_intro.htm

7. Programs

United States

Green Chemistry/Sustainable Chemistry: The design of chemical

- http://www.epa.gov/greenchemistry/index.html

12 Principles of Green Chemistry

- http://www.epa.gov/greenchemistry/pubs/principles.html

The American Chemical Society (ACS): Green Chemistry Institute
- http://www.acs.org/greenchemistry

Europe
OECD (Organization for Economic Co-operation and Development:
- http://www.oecd.org/document/6/0,3343,en_2649_34375_1909638_1_1_1_1,00.html

8. Networks and Journals
North America
- http://www.greenchemex.org/
- http://www.greenchemistry.ca/index.html

Asia
Japan: Green and Sustainable Chemistry Network
- http://www.gscn.net/indexE.html

Green Chemistry Journal
- http://www.rsc.org/Publishing/Journals/gc/index.asp

Appendix E: Examples of Sustainable Packaging Efforts

Note: URLs may be out of date and do not reflect on any requirements of the Standard.

All companies are expected to take significant steps toward sustainable packaging. The company and co-manufacturers are encouraged to adhere to the following packaging material requirements:

Paperboard Primary Packaging. The paperboard primary packaging shall be recyclable and shall contain, at a minimum, the applicable EPA Comprehensive Procurement Guideline minimum levels for recovered and post-consumer material content. Where the packaging is below these levels, the company must demonstrate that efforts have been made to use the maximum available recovered and post-consumer material.

Plastic Primary Packaging. Plastic primary packaging shall be recyclable or shall contain a state-of-the-art amount of post-consumer material content. Where the primary packaging is below these levels, the company shall demonstrate that efforts have been made to use the maximum available post-consumer material in packaging. The package must be clearly marked with the appropriate Society of the Plastics Industry symbol to identify the type of plastic for recycling.

Secondary Packaging. Secondary packaging shall be recyclable and shall contain, at a minimum, the applicable EPA Comprehensive Procurement Guideline minimum levels for recovered and post-consumer content. Where the secondary packaging is below these levels, the company must demonstrate that efforts have been made to use the maximum available post-consumer material in packaging.

Colorant Components. Packaging may contain colorant components provided that they contain a sum concentration of less than 100 parts per million, by weight, of the following items: carcinogens; mutagens; reproductive toxins; heavy metals (including but not limited to lead, chromium, selenium in elemental of compound form); ozone-depleting compounds; optical brighteners; surfactants; fragrances; HAPs; colorants.

Heavy Metal Restrictions. Heavy metals, including lead, mercury, cadmium, and hexavalent chromium, shall not be intentionally introduced in packaging. Further, the sum of the concentration levels of these metals present shall not exceed 100 parts per million by weight (0.01%); an exception is allowed for packages that would not exceed this maximum level but for the addition of post-consumer materials. Further, intentional introduction does not include the use of one of the metals as a processing aid or intermediate to impart certain chemical or physical changes during manufacturing, where the incidental retention of a residual of that metal in the final packaging or packaging component is not desired or deliberate, if the final packaging or packaging component complies with the incidental concentration restrictions of 100 ppm.

Improving the sustainability of the materials that comprise a product is often one of the most effective ways of reducing the environmental impacts associated with a product. The list below suggests several ways that the sustainability of materials can be enhanced, for example:

- Reduced total use of materials
- Reduced use of new or virgin materials
- Sustainably harvested raw materials (e.g., FSC-certified wood fiber)
- Locally derived materials.
- Materials made with significant post-consumer recycled content.
- Materials that can be re-used or recycled at end of life.
- Compostable materials.
- Materials that can be acquired with less energy or fewer GHG emissions than current materials
- Materials that are less toxic than current materials.

This list is by no means exhaustive. Innovation and leadership are encouraged.

Certified companies shall source materials from sustainably managed sources, reduce packaging (by weight and quantity/bulk), increase environmentally preferred methodologies, and develop an overall sustainable packaging plan with targets that are regularly achieved.

Type	Example
List of Principles	The Sustainable Packaging Coalition's Eight Sustainable Packaging principles: (www.sustainablepackaging.org/about_sustainable_packaging.asp)
Scorecard	Wal-Mart's packaging scorecard (www.packworld.com/new-22320)
Sustainably Sourced Materials (some examples, not exhaustive list)	• Forest Stewardship Council certified wood (www.fsc.org) • Roundtable on Sustainable Palm Oil (www.rspo.org) • Fair Trade certified (www.transfairusa.org); www.fairtrade.net • Rainforest Alliance (www.ra.org) • www.greenpackaginginc.com • www.thegreenpostalstore.com • www.salazarpackaging.com

Appendix F. Non-Exclusive List of Third-Party Product or Service Certification Programs.

This list is not exhaustive and is intended only to provide examples of the types of programs that may qualify. Note: URLs may be out of date and do not reflect on any requirements of the Standard.

In addition to the types of product and service certification programs listed below, there are third-party certification programs that certify facility or company operations rather than products or services. SA 8000 is an important example of a program that certifies facilities (http://www.sa-intl.org/; see definition of SA 8000). EPA Climate Leaders (http://www.epa.gov/stateply/) is an important recognition program that applies to companies.

Product or Service Type, or Issue	Program Name	Website
Tier 1 Certifications. Leadership-level, multi-attribute, life-cycle-based standards certified by third party certification program using site audits and periodic monitoring.		
Consumer and institutional products and services (US), various categories	Green Seal	www.greenseal.org
Consumer and institutional products and services (outside the US), various categories	Members of Global Ecolabeling Network	www.globalecolabelling.net
Tier 2 Certifications. Multi-attribute, life-cycle-based standards where compliance is self-declared.		
Electronic Products	Green Electronic council's EPEAT Program (Electronic Product Environmental Assessment Tool)	www.epeat.net
Tier 3 Certifications. Single-attribute or non-life-cycle-based standards certified by third party certification program, including site audits and periodic monitoring. In some cases, a product may be certified based on materials the product contains (e.g., furniture that is made entirely or in part from certified wood).		
Food and Beverage	USDA Certified Organic	www.ams.usda.gov/nop/NOP/standards.html
	Food Alliance Certified	www.foodalliance.org/certification/index.html

	Rainforest Alliance Certified	www.rainforest-alliance.org
	Protected Harvest Certified	www.protectedharvest.org/farmers/standards.htm
	Marine Stewardship Council's Blue Eco-Label	www.msc.org
	Aquaculture Certification Council	http://www.aquaculturecertification.org/
	American Humane Certified	http://www.americanhumane.org/site/PageServer?pagename=pa_farm_animals
	Animal Welfare Approved	http://www.animalwelfareapproved.org/
	Certified Humane	http://www.certifiedhumane.com/
	Bird Friendly Coffee	http://nationalzoo.si.edu/ConservationAndScience/MigratoryBirds/Coffee/
	Fair Trade Certified	www.transfairusa.org
Forest Conservation	Forest Stewardship Council	http://www.fsc.org/
	Sustainable Forestry Initiative	http://www.sfiprogram.org/
	National Standard for Sustainable Forest Management (Canadian Standards Association)	http://www.csa-international.org/product_areas/forest_products_marking/Default.asp?language=english
	Program for the Endorsement of Forest Certification	http://www.pefc.org/internet/html/
Indoor Air Quality	GREENGUARD	www.greenguard.org
Textiles	Global Organic Textile Standard	http://www.global-standard.org/
Water Conservation	Water Sense	www.epa.gov/WaterSense/
Tier 4 Certifications. Single-attribute or non-life-cycle-based standards where compliance is self-declared.		
Energy Efficiency	Energy Star	www.energystar.gov
Chemical formulations and products	Design for the Environment (DfE; not a certification, but rather a partnership program leading to recognition).	http://www.epa.gov/dfe/index.htm