CG1: Japan’s text proposal on Product Design

What should be covered in the legally binding instrument

- In order to promote resource circulation of plastics, and contribute to addressing plastic pollution, it is necessary and indispensable to take reduction, reuse, and recycling efforts into consideration from the design stage of plastic products. Therefore, the legally binding instrument needs to include provisions related to product design, as noted in UNEA Resolution 5/14.

- In specifying requirements for product design in the instrument, it is necessary to take into consideration differences of the characteristics and use methods of its products in each country, such as the infrastructure for recycle and waste management, the production technologies for plastic products and the availability of recycled materials. For this reason, each country needs to set ambitious design and performance standards for plastics and take appropriate measures, based on the elements related to product design and performance standards which would be specified in the Annex of the instrument (or determined separately by COP).

- The elements which should be specified in the Annex may include the following: the weight reduction, the reuse of parts, the use of easily-recyclable materials, substitution of materials other than plastic and the use of recycled plastics and bioplastics. (For details, see the following page.)

- Conceivable domestic implementing measures by each country may include, for example, formulation of design guidelines for manufacturers to follow in designing plastic products, based on the Annex, taking into account the infrastructure for recycling and waste management, and characteristics and applications of the products in each country.

- One option to further promote resource circulation of plastics is to facilitate industry's voluntary actions such as standardization of product designs for each product groups and establishment of guidelines developed by industry groups, observance of such standards and guidelines, and sharing of best practices.

- In addition to regulatory measures and labeling systems to be implemented as necessary in each country, the legally binding instrument should also include a provision to recommend the establishment of governmental support mechanisms, such as the introduction of certification scheme and public procurement, which will lead to further improvement in the design performance of plastic products.
1. Each Party shall take measures to enhance the design of plastic products, including packaging, and improve the composition [of plastics and] plastic products, with a view to:
   a. Reducing demand for and use of primary plastic polymers, plastics and plastic products
   b. Increasing the safety durability, reusability, refillability, repairability and refurbishability of plastic products, as relevant, and their capacity to be repurposed, recycled and disposed of in a safe and environmentally sound manner upon becoming waste;
   c. Minimizing releases and emissions leakages from plastics and plastic products, including intentionally microplastics considering technical feasibility and accessibility of potential microplastic alternatives and socio-economic impacts
2. Each Party should adopt sustainable product design and performance criteria and take the necessary measures to:
   a. Reduce the use of plastics across the value chain, including in product packaging; and
   b. Increase the safety, durability, reusability, recyclability, refillability, repairability and refurbishability of plastics and plastic products, as relevant, and their capacity to be reused repurposed, recycled, recovery and disposed of in a safe and environmentally sound manner upon becoming waste;

   in accordance with the elements contained in part I of annex C, and taking into account relevant international standards and guidelines, including any relevant sector- or product-specific standards and guidelines. The measures adopted pursuant to this provision shall be reflected in the national plan communicated pursuant to [Part IV.1 on national plans].
3. Each Party shall consider including the following actions as part of its measures laid out in paragraph 1:
   a. Adopting public procurement policies or guidelines for plastic products to enhance circularity of plastic products;
   b. Promoting the use of environmental performance standards for plastic products;
   c. Supporting efforts to establish or augment voluntary certification schemes for environmentally preferable products or packaging to encourage sustainable choices;
   d. Parties should take into account relevant international standards and guidelines, including any relevant sector- or product-specific standards and guidelines.
4. Each Party should establish, in accordance with the elements contained in part I of annex C, to the extent possible, transparency, labelling and certification procedures and requirements for plastics and plastic products that conform to the design and performance criteria established pursuant to paragraph 1, taking into account Confidential Business Information (CBI).
Attachment draft Annex

The following elements should be considered in the product design stage:

&lt;Structure of Product&gt;

1. Reduction in volume of plastic use
   ✔ Use the smallest volume of material as much as possible.
2. Simplified packaging
   ✔ Restrain excessive packaging.
3. Longer use and longer service life
   ✔ Enhance the durability of the product.
   ✔ The product is able to withstand repeated use.
   ✔ The parts of the product are easily replaceable.
   ✔ The product is easily repairable.
4. Use of easily reusable parts or reuse of parts
   ✔ Use parts that are easily reusable.
   ✔ Reuse parts.
5. Use of Single materials or reduction of material types.
   ✔ Use a single material for the product as a whole or parts thereof, or reduce the material types used.
6. Easier disassembly and separation
   ✔ The parts are easily disassembled and sorted by components. (Easier removal of lithium-ion batteries from other parts of the product is better.)
   ✔ The number of processes required to remove parts, etc., is minimized as much as possible.
   ✔ The types of materials used are indicated.
7. Easier collection and transportation
   ✔ The weight, size, shape, and structure of the product are to facilitate easier collection and transportation as much as possible.
8. Easier crushing and incineration
   ✔ Easier crushing and incineration for parts that are difficult to reuse or recycle.

&lt;Materials of Product&gt;

1. Substitution of materials other than plastic
   ✔ Substitute materials other than plastic.
2. Use of easily-recyclable materials
   ✔ Use easily-recyclable materials.
   ✔ Reduce material types.
   ✔ Avoid using additives and other materials, that hinder recycling.
3. Use of recycled plastics
   ✔ Use recycled plastics.
4. Use of bioplastics
   ✔ Use biomass (bio-based) plastics from renewable organic resources such as plants.
   ✔ Use biodegradable plastics for products that tend to unavoidably leak to natural environment, taking into account the conditions in which biodegradation occurs.