

Life of Earth: Pure

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The inspiration of this apparel design is environmental issues occurring in some cities in China the designer observed while visiting her home in summer 2013. Due to acute pollution, the skies of the country are no longer blue, some rivers have changed to dark colors. The goals of creating this design (as a part of a series) were to: a) use garments as a communication tool to raise the public attention on pollution issues in China and b) combine digital printing and free form embroidery technique to create unique printed fabric and textured fabric.



The design process model created by LaBat and Sokolowski (1999) was used as a framework for this design. *Step 1- problem definition and research:* digital printing is one of the main design concepts, since it lowers wastes levels, yields faster production and maximizes high energy efficiency (Memon, 2012). The target market for this ensemble is 20-35 years old females who care about the environment, and pursue unique, superior fabrications, plus sophisticated design details. *Step 2 – creative exploration:* fashion illustrations and technical sketches were developed before draping the proto sample garments. The world map was the major motif digitally printed on the fabric. *Life of Earth: Pure*, is the ensemble in the series that represents the unpolluted Earth with white clouds in a bright blue sky and clear natural colors. *Step 3 – implementation:* an image of a flat satellite view of the world was altered in Adobe Photoshop to intensify the colors. The one-piece dress was draped on the size 8 dress form, transferred to a paper pattern, then digitized into OptiTex, a CAD patternmaking software. The garment pattern was adjusted and cleaned in Adobe Illustrator in preparation of placing the world map images. Using Adobe Photoshop, the three pattern pieces of the dress and the images were engineered (placed) based on the width of fabric to get the best usage of fabric and reduce fabric waste. The engineered garment patterns with 1/2” seam allowance were digital printed on 100% silk charmeuse using a Miamaki TX2-1600 digital fabric printer. The world map images of the sleeves were adjust to 45% transparency and engineered in Adobe Photoshop and digital printed on 100% silk organza.

Free form machine embroidery was used to create a light weight and multi-color vest to match the digital printed dress. Six colors of 100% rayon embroidery thread were machine embroidered on dissolvable film to create the front and back pieces of the vest. The pattern pieces were connected using free form embroidery to create a seamless garment. The completed vest was submerged in warm water for 30 seconds, then rinsed in cold water, air dried overnight, and then ironed.



The white flare top was made from silk organza. The designer chose white to represent purity and white clouds absent of pollution. The flare silhouette represents optimistic, hopeful expectations for the Earth, while accentuating the colors of the vest.

The *Self's Level of Aspiration Theory* was used to evaluate the garment design to determine whether the “ideal goals” were achieved (Hoppe, 1931; Lawin, 1944; & Diggory, 1966). The self-evaluation questionnaire included linear rating scales and was filled out by the designer at the end of the design process. This self-evaluation process helped designer understand the achievement or failure of the whole design process in order to enhance the performance of future designs and prevent future mistakes.

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