I do believe that this is the first time that a series of articles have been written on bleaching geared specifically for the consumer. In order to understand bleaching it is important that the consumer read each article thoroughly before preceding to the next article. I have been teaching the art of bleaching to professional drycleaners throughout the country for 35 years. I have also taught bleaching to museum curators including the people at the Metropolitan Museum of Art in New York City.

Bleaching is a process entailing chemicals that utilize oxygen to make a stain invisible or make a discolored garment whiter. Bleaching can be used on the last traces of any wetside stain removal process increasing stain removal success. High end cleaners increase their stain removal success to 95% and restore fabrics using the bleaching process. There may be many people who think they know bleaching but in reality are probably not using it properly. The purpose of these articles is to teach people how to use bleaching properly.

## **TYPES OF BLEACHES**

There are two major categories of bleach. They are oxidizing and reducing bleach. Oxidizing bleaches add oxygen to a stain in order to make it invisible or make a fabric lighter. Oxidizing bleaches are effective on last traces of most wetside stains including dye, coffee, tea, liquor, many medicines, soft drinks, etc. It is also effective for removing scorch. Reducing bleaches are effective on dye stains and are referred to as stripping agents.

## **IMPORTANT FACTS ABOUT BLEACH**

.....Heat accelerates bleach. Every 18oF rise in temperature doubles the strength of the bleach. This means that raising the temperature from 90oF to 108oF doubles the strength of the bleach.

.....Metal accelerates bleach. Never use bleach on a metal trimming or in a metal container.

.....Bleach is not effective on dryside stains such as paint, oil, nail polish and glue. It is a waste of time to bleach these substances.

.....Color safe bleach is a misnomer. No bleach is safe on all colored fabrics. The manufacturer using this term is inferring that color safe bleach may be safer than other bleach.

.....Colored fabrics can be bleached only when the color is tested before application of the bleach.

.....Chemicals and bleach. There are some bleaches that are accelerated by chemicals while others are decomposed by the chemicals. Knowledge of the chemicals and bleach are important.

.....Concentration-Never apply bleach on a fabric full strength because it can decompose the yarn.

.....Sunlight-Fabrics that have been bleached and dried outside exposed to sunlight can be deteriorated by the rays of the sunlight.

.....Last trace stain removal-It is important to use bleach only on the last traces of a stain. For example bleach will not remove heavy staining unless other processes were used which left the remnants of the stain.

.....Mildew-Only some bleaches work on mildew while other bleaches do not work.