among different types of land disposal. While the effluent guidelines address both monthly and daily limits, UTS only sets daily limits.

For many pollutants, there are differences in the numerical values of the limits. The differences result from the use of different legal criteria for developing the limits and resulting differences in the technical and economic criteria and data sets for establishing the respective limits. As described above, the LDR UTS establish a single numerical standard for each regulated pollutant parameter that applies to all waste streams.

The Clean Water Act pollutant specific numerical effluent limitations guidelines and standards (40 CFR Subchapter N) often differ not only from the LDR UTS but also from point-source category to point-source category (e.g., Electroplating, 40 CFR part 413; and Metal Finishing, 40 CFR part 433). The effluent guidelines limitations and standards are industry-specific, subcategory-specific, and technologybased. The numerical limits are typically based on different data sets that reflect the performance of specific waste water management and treatment practices. Differences in the limits reflect differences in the statutory factors that the Administrator is required to consider in developing technically and economically achievable limitations and standardsmanufacturing products and processes (which for CWT facilities includes types of treatment or waste management services performed), raw materials, wastewater characteristics, treatability, facility size, geographic location, age of facility and equipment, non-water quality environmental impacts, and energy requirements.

Limits for CWT's are developed for individual industrial subcategories leaving the permit writer with the responsibility of assembling the "building blocks" into a discharge limit. There is, however, only one set of LDR standards, the Universal Treatment Standards (UTS) applying to all constituents regardless of the waste stream. While there is one set of standards for LDR rules, the limits are generally based on BDAT applied to the waste that is most difficult to treat.

A consequence of these differing approaches is that similar or identical waste streams are regulated at different levels. Several of the effluent guidelines discharge categories reflect pretreatment prior to discharge to POTW's where there is further treatment and are therefore not directly comparable to LDR wastewater standards. However, those categories that represent daily maximum standards for discharge of treated wastes are analogous to the LDR wastewater standards, and the numerical differences in these standards reflect differences in methodology as described above.

EPA's survey of CWT facilities identified no wastewater discharges which would be regulated under the CWT effluent limitations guidelines and standards and the Universal Treatment Standards. Because none of the 72 CWT discharging CWT facilities discharge wastewater effluent to land disposal units, the proposed regulations for the CWT Industry are not redundant requirements.

## III. Description of the Industry

## A. Centralized Waste Treatment Facilities

Presented below is a brief summary description of the Centralized Waste Treatment Industry for which EPA is today proposing guidelines.

Based upon responses to EPA's 1991 Waste Treatment Industry Questionnaire (see discussion below), the Agency estimates that there are approximately 85 centralized waste treatment facilities in 31 States of the type for which EPA is proposing limitations and standards. These include both stand-alone treatment facilities as well as facilities which treat their own process wastewater and treatment or process residuals as well as wastes received from off-site. The major concentration of centralized waste treatment facilities in the U.S. are found in the Midwest, Northeast, and Northwest regions, due to the proximity of the industries generating the wastes undergoing treatment.

As previously noted, centralized waste treatment facilities accept a variety of different wastes for treatment. Before these facilities accept a waste for treatment, the waste generally undergoes a rigorous screening for compatibility with other wastes being treated at the facility. Waste generators initially furnish the treatment facility with a sample of the waste stream to be treated. The sample is analyzed to characterize the level of pollutants in the sample and bench-scale treatability tests are performed to determine what treatment is necessary to treat the waste stream effectively. After all analysis and tests are performed, the treatment facility determines the cost for treating the waste stream. If the waste generator accepts the cost of treatment, shipments of the waste stream to the treatment facility will begin. For each truck load of waste received for treatment, the treatment facility collects a sample from the shipment and analyzes the sample to determine if it is similar to the initial sample tested. If the sample is similar, the shipment of waste will be treated. If the sample is not similar but falls within an allowable range as determined by the treatment facility, the treatment facility will reevaluate the estimated cost of treatment for the shipment. Then, the waste generator decides if the waste will remain at the treatment facility for treatment. If the sample is not similar and does not fall within an allowable range, the treatment facility will decline the shipment for treatment.

Treatment facilities and waste generators complete extensive amounts of paperwork during the waste acceptance process. Most of the paperwork is required by Federal, State, and local regulations. The amount of paperwork necessary for accepting a waste stream emphasizes the difficulty of operating Centralized Waste Treatment facilities.

In its information and data-gathering effort, EPA also looked at how these facilities handle wastes after they are accepted for treatment. Even though a waste must surmount a number of hurdles before being accepted for treatment at a facility, many facilities do not devote the same level of attention to the process of managing and treating wastes for optimal removals. Thus, EPA's data show that approximately half of the facilities in the industry 1) accept wastes for treatment in more than one of the waste categories (metalbearing, oily or organic-bearing) being considered here or 2) operate other industrial processes that generate wastes at the same site. In most cases, the waste streams from these various sources are mixed prior to treatment or after minimal pretreatment.

The problems associated with the mixing of the different types of wastes and wastewater treated at centralized waste treatment facilities or mixing with other industrial wastewater and noncontaminated stormwater exacerbated the difficulty of evaluating adequate treatment performance. EPA concluded that mixing waste streams adversely affects pollutant removal in the discharge water. Rather than treating to remove pollutants, the facilities were diluting their streams to achieve required effluent levels. Therefore, EPA has concluded reasonable further progress to the goal of reducing discharges requires achievement of discharge levels associated with treatment of segregated wastestreams. Consequently, as explained above, the Agency is proposing to establish effluent limitations which reflect