

93



stations, are expected to find broad application in state and municipal auto inspection programs.

Similar technology is employed in production of other exhaust analyzers, including systems to check out new engines in laboratory tests and units for testing new car emissions to assure that they meet Environmental Protection Agency standards. The Automated System for Emission Testing (ASET) can coordinate as many as seven vehicle exhaust analyzers at one time. The Automotive Pre-Check Corp. of Los Angeles uses ASET to test about 3,000 new cars each year, to comply with California air pollution laws which require that a two-percent sample of all new cars sold in the state be exhaust-analyzed.

This Jacksonville, Florida, apartment complex has a wastewater treatment system which clears the water, removes harmful microorganisms and reduces solid residue to ash. It is a spinoff from spacecraft waste management and environmental control technology.

Packaged Waste Treatment

As NASA contractor on the biosatellite program several years ago, General Electric Co. acquired experience in waste management and associated spacecraft environmental technology. The company has spun off this experience into packaged waste treatment systems for both sea and land applications.

GE's initial effort was a "shipboard waste treatment system," which used physical and chemical processes to clear wastewater, settle the solid matter, and remove harmful microorganisms. The solid residue is reduced to a small amount of ash by the system. GE built and installed these sludge incinerator systems on an Army dredge, a Navy destroyer escort and three Great Lakes steel ore carriers.

Shortly thereafter, passage of the 1972 Clean Water Act prohibited ships from dumping treated or untreated wastewater. Thus, demand turned from shipboard treatment systems to shipboard holding tanks and shore-based treatment systems.

Using the same technology, GE then built and tested a trial land-based system. This experiment evolved into an advanced 50,000-gallon-a-day "packaged waste treatment system," installed in Jacksonville, Fla. by Demetree Builders of that city. The system now serves about 600 units in the Villa del Rio and Ortega Arms apartment complexes.

Two environment-related automotive products are Chrysler's "lean-burn" engine and an auto exhaust emission analyzer. These and other products now being built at the Electronics Division trace their lineage to technology acquired when it was a key test and development center for the space program.

