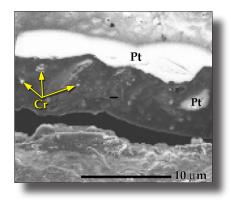
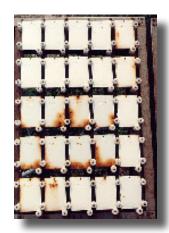
Surface Analysis

 Microscopy, TEM, XPS, and other analyses for full characterization of your samples.





Coating Application and Evaluation

- Walk-in spray application booth.
- Blast cabinet.
- Conventional, HVLP, airless, and plural component spray.
- Multiple abrasion and adhesion testers.
- Dry- and wet-film thickness measurements.

Contact Information

http://corrosion.ksc.nasa.gov corrosion@ksc.nasa.gov

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National Aeronautics and Space Administration



NASA Corrosion Technology Laboratory

The Corrosion Technology Laboratory is a full-service facility providing one-stop shopping in the field of corrosion science and engineering.

- Atmospheric Exposure
- Seawater Immersion
- Engineering Services
- Accelerated Corrosion Testing
- Concrete Testing
- Cathodic Protection
- Applied Research
- Electrochemistry
- Surface Analysis
- Coating Application and Evaluation





Atmospheric Exposure Test Site

- Located approximately 100 feet from the median high tide line of the Atlantic Ocean and documented as having the highest corrosion rates in the country.
- Over 40 years of historical exposure data.
- Continuous online monitoring of temperature, humidity, wind speed, rainfall, total incident solar radiation, and UVB radiation.
- Real-time data acquisition and Internet video of samples during exposure.
- Remote electrochemical measurements.
- · Laboratory and portable glossimeter, colorimeter, and spectrophotometer.
- · Capable of exposure-testing samples of all sizes and shapes, such as metal panels, painted panels, concrete articles, and airplane wings.

Seawater Immersion System

- Provides a continuous flow of filtered water directly from the Atlantic Ocean.
- Utilized for the evaluation of protective coatings, metal alloys, reinforced concrete, composites, and other materials in an ocean environment.
- Seawater spray testing.
- Alternate immersion exposure.



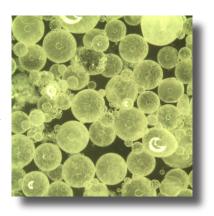


Engineering Services

 Friendly, knowledgeable, and experienced staff ready to help with all your current and future corrosion control and prevention needs.

Applied Research

- Coating development.
- · Anodizing, electropolishing, and electroplating.
- Evaluation of corrosion properties and maintenance procedures.
- · Materials degradation in extreme environments.



Accelerated Corrosion Facility

- Continuous and cyclic salt fog exposure.
- Acid fog exposure.
- Other tests, including filiform corrosion.

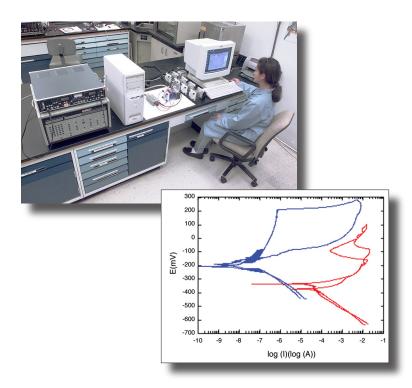


Concrete Testing

- Complete physical-property testing.
- Evaluation of concrete and rebar performance in any of our exposure environments.

Cathodic Protection

• Design, evaluation, and implementation of cathodic protection systems.



Electrochemistry

- DC and AC electrochemical measurements with portable and remote measurement capability.
- High-temperature electrochemistry cell.
- Microelectrochemical testing.