

# 1-Introduction to Configuration

## Introduction

The RediGate is a multi-application remote data communications computer/data integration device. It provides a wide array of SCADA and other communication and logic processing functionality. In order to configure the operational characteristics of the RediGate, Elecsys provides the Advanced Configuration Environment (ACE) program. This manual describes the configuration objects of the RediGate, including the standard features and some of the optional properties that may be specific to some customer installations.

**Note:** Due to project-specific requirements or on-going product development, some configuration templates may contain more or fewer objects than are described in this manual. This manual should be treated as a guide to understanding the basic RediGate configuration, but project documentation may contain additional details.

It is assumed that the user has already installed the ACE Editor and is familiar with the ACE configuration tools. Please refer to the *ACE Operation Manual* for more details on installation and use of ACE.

This manual includes some detail on configuring the RediGate ACE objects for communication to an HCP. However, see HCP documentation for additional information on setting up HCP and RediGate configurations, in order to fine-tune the SCADA system operation for optimal performance.

This manual omits many of the protocol-specific details for configuring master or slave communication to various proprietary protocol-based devices. Elecsys provides a number of supplementary protocol-specific manuals documenting the ACE objects for individual protocols. This manual also does not cover programming the RediGate using the ISaGRAF development environment or POD logic. See the *Elecsys ISaGRAF Manual* and *POD Programming Manual* for that information.

## ACE Configuration Program

Within the ACE Editor, a configuration is made up of a collection of "objects." Each configuration object is represented by an icon and contains general properties and specific fields that provide operational settings for the RediGate and/or HCP.

This manual provides reference information on the configuration objects within the ACE Editor. Each section gives a description of the object's purpose and functionality, the graphical icon, and also a section describing the object Properties and Fields. Icons shown in this manual include newer style icons, as well as older historic icons for reference.

Each section gives the "Parent" of the object, showing the hierarchical tree of parent objects in the configuration. For instance, the AsyncPort is the child of the System and Networks objects ("System>Networks").

Each sub-section describes the ACE object and its properties (including constraints on the Instance number), and object fields and their possible values. The Instance Number is a required element of many ACE objects, and allows multiple instances of the same object type under the same parent to be identified uniquely.

Each object includes a Description property, which allows the system designer to include some descriptive text about the purpose or use of the object. Each object includes an Enabled property. If an object is disabled, then the object and all of its child object hierarchy are effectively disabled and will not be used in the device operational settings.

The "UFF External" property is only mentioned for certain objects where it is typically used, but it should normally be left unchecked. This property allows the configured values for certain ACE objects to be loaded and used in the RediGate separately from the main configuration file.