

DOBLE PROTECTION TESTING

# ENOSERV RTS®

Protection Testing Software

## A POWERFUL TEST INTERFACE WITH A RELATIONAL DATABASE BACKEND

RTS is a vendor-neutral software which allows you to connect to a variety of relay test sets in your test equipment inventory. RTS is ideal for testing and capturing data during commissioning and field performance/compliance testing.

RTS features powerful automation tools that reduce complexity. It offers an extensive relay test plan library to quickly perform standardized tests. Your teams will save time thanks to the robust communication tools that help automate and simplify testing.



## FEATURES

- Works with tests sets from Doble, Manta, ISA, Megger, Omicron and SMC
- Includes over 600 test routines for popular relay models
- Automated settings imports supporting popular relay models and automatic compensation of applied settings within test actions and pass/fail tolerances one device to the next per relay model
- Forms package enabling testing and management of test records for batteries, DC control circuitry, CT/VT instruments and cabling, communications equipment and user-defined applications
- Sequence component line modeling for automatic impedance-based fault calculations
- COMTRADE playback, SS1 file importing/playback, multi-sequence state editing, timecompensated end-to-end testing supporting disparate test sets

## BENEFITS

- RTS streamlines testing processes and works with a variety of different test sets for system-wide standardization
- Limitless incorporation of formulas, scripting, forms and external document references for powerful, customized test operations
- Unique template-to-device linking that enables powerful data control, bulk edits, mass updates and consolidated reporting
- Step-by-step test generation interface and limitless flexibility to adjust tests throughout the application
- Seamless integration with ENOSERV PowerBase® protection data management system

## SECURITY

Use Routine Protection Options to protect your intellectual property and use PowerBase for secured, one-at-a-time critical asset data exchanges.

## DISCRETE CONTROL

Manually enter and track test data using forms. Perform test set operations manually using the simulate mode. Apply specific quantities using the manual control interface.

## ELECTROMECHANICAL RELAYS

Quickly find calibration points using click-selectable controls that adjust the instrument injections automatically. No need to change settings or alter tolerances.

## IEDs

Computer-to-computer communication using commands embedded within test sequences. Use the MODBUS module for automated settings exchanges or import/apply from files.

## SECONDARY SYSTEM DEVICES

Use the forms package to perform and track testing of batteries, DC circuitry, CT/VT, communications devices, instrument cabling, or any other equipment. Use the transducer interface for injections using supported test instruments.

## USING RTS SOFTWARE

- Select from a list of over 600 model-specific, steady-state element verification test routines to begin setting up your database.
- Edit the provided routines to your requirements. Add dynamic tests and other logic/scheme testing sequences. Customize around your company-specific processes by adding forms, attachments and notes/commands.
- Define which tests are required and in what order they should be performed. Organize your tests into folders and arrange them around various test purposes, protection functions or any other user-defined/company-specific rationale.
- Link your test routines to the relays you need to test.
- Use any of a variety of supported test sets.
- Verify/enter device data such as nameplate and settings values. Use commands to automate settings imports or use PowerBase and have this data pre-populated.
- Perform your tests. If an automated sequence or the relay itself needs adjustment, use RTS to test the relay manually then continue with automated tests after troubleshooting. Capture notes within the interface to save with As-Found/As-Left results.
- Merge your results into an administrator's RTS database or use PowerBase for automated uploads to the office.

	Basic	Pro	RTS is keyed software (USB dongles and software code keys) with two user levels: Basic (manual) and Pro (full test set control).											
Routine Protection Options	✓	✓	RTS Pro keys are upgraded with drivers that control a variety of test instruments. Each driver is manufacturer-specific and supports RTS software capabilities as indicated within that manufacturer's line of test instruments.											
PowerBase Live Testing	✓	✓												
Forms Package	✓	✓												
Simulate Mode	✓	✓												
Modbus Module		✓												
Manual Control Interface		✓												
Steady State Test Operations		✓												
Dynamic State Test Operations		✓												
COMTRADE Playback		✓												
Transducer Test Interface		✓												
			Doble		Mantal		SA	Megger			Omicron	SMC		
			F6000 series	F2000 series	MTS-5000 series	MTS-1700 series	DRTS series	SMRT series	MPRT series	Pulsar	Epoch series	CMC / CMA series	Mentor	PTE Range
			✓	✓	✓			✓	✓	✓		✓		
			✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			✓	✓	✓			✓	✓		✓		✓	
			✓		✓			✓	✓		✓			

RTS is designed to operate on Windows XP, XP (x64), Vista (x32), Vista (x64), Windows 7 (x32), Windows 7 (x64), Windows 8 (x32), Windows 8 (x64) and Windows 10.



**Doble Engineering Company**  
 Worldwide Headquarters  
 85 Walnut Street, Watertown, MA 02472 USA  
 tel +1 617 926 4900 | fax +1 617 926 0528  
[www.doble.com](http://www.doble.com)

Specifications are subject to change without notice.  
 Doble is ISO certified.  
 Doble is an ESCO Technologies Company.  
 PUBLISHED: FEBRUARY 2019