4
Uploading Data to CIWQS

This chapter addresses the following information:

- Data formats
- How to Register
- How to approve/disapprove pending registrations

4.1 Introduction

Self-Monitoring Report data can be uploaded to CIWQS using the Electronic Deliverable Format (EDF). EDF is a data standard for transferring electronic data files between data producers (e.g. labs and facilities) and data users (Water Boards).

This release of CIWQS will support EDF version 1.2i (July 2002). Additional information about the EDF can be found in "The Electronic Deliverable Format (EDF) version 1.2i Format Specifications" document prepared by ArsenaultLegg, Inc. (available here).

CIWQS supports both EDF formats:

- The relational format (six files: sample, quality control, test, results, narrative, and control limits); and
- The flat file format (two files: control limits and flat file).

4.2 Uploading Data to CIWQS

This release of CIWQS will focus on importing only those fields necessary to match the data required by the raw data screen. Additional data will not be imported into database fields. Note, however, that the original EDF file will be stored as a binary large object in the database; therefore, all data in the submission can be viewed. As the original EDF file will be stored, as the CIWQS database expands to include additional fields, these EDF files may be re-imported.

4.2.1 File Preparation

Prior to submission, the following tools may be used to prepare and validate an EDF submission:

- ◆ COELT (U.S. Army Corps of Engineers Loading Tools): A software tool designed for data entry, data export, data verification, and data reporting. Analytical laboratories use this tool to generate EDF deliverables.
- ◆ EDCC (Electronic Deliverable Consistency Checker): A software tool designed to verify lab EDF deliverables for compliance to the EDF format.

Links to these tools can be found on the California SWRCB website.

> **Although CIWQS performs a specific set of verifications, it does not perform all of the checks found in EDCC. The use of this program by submitters is highly recommended!**

4.2.2 File Considerations

EDF files must be compressed in ZIP format. Tools such as PDZip, WinZip, and Windows XP's compressed folders all use the zip format. By compressing the various files into a single ZIP file, this ensures that the different files that comprise a submission do not become separated.

The ZIP file should contain:

- ◆ EDCC.TXT: An EDCC error report in test format. This file is not used by CIWQS, but will be stored for possible review. *Relational or Flat File*;
- ◆ EDFNAR.TXT: Any narrative text. *Relational only*;
- ◆ EDFSAMP.TXT: Sample data. *Relational only*;
- ◆ EDFTEST.TXT: Test data. *Relational only*;
- ◆ EDFRES.TXT: Results data. *Relational only*;
- ◆ EDFQC.TXT: Quality Control data. *Relational only*;
- ◆ EDFCL.TXT: Control Limits data. *Relational or Flat File*; and
- ◆ EDFFLAT.TXT: Flat File. *Flat File only*.

Uploaded EDF files should be named in a manner that makes it clear what the file contains (e.g., facility name and report date, lab name) and should end in ".zip". If multiple EDF files are uploaded, each must contain a unique name. EDF files uploaded to CIWQS should *not* be password encrypted. Table 10.1 shows how data is mapped from the EDF files to the CIWQS data fields.

Table 10.1 EDF Data Mapping

CIWQS Field	Relational File	Field (EDFFLAT for Flat File)
Report ID	*The upload is related to the report by CIWQS when the EDF file is uploaded.*	
Monitoring Location	Sample	FIELD_PT_NAME
Sample Event Date	Sample	LOGDATE
Sample Event Time	Sample	LOGTIME
Parameter	Results	PARLABEL (only PVCCODE=primary)
Minimum Sampling Frequency	*Pulled from the Regulatory Measure related to this Report. This is the sampling frequency for the matching Monitoring Location and Parameter.*	
Sample Type	*Pulled from the Regulatory Measure related to this Report. This is the sample type for the matching Monitoring Location and Parameter.*	
Sample Medium	Sample	MATRIX
Units	Results	UNITS
Sample Date	Sample	LOGDATE
Sample Time	Sample	LOGTIME
Result	Results	PARVAL (only PARVQ=equals; see "non-detect")
Method Detection Limit	Results	LABDL
Minimum Level		*Not available in EDF, so not populated.*
Non-Detect	Results	*If PARVQ=< and PARVAL=method detection limit, then this is a non-detect*
Analytical Method	Results	ANMCODE
Sample Analysis Date	Results	ANADATE
Sample Analysis Time	*This information is not available from an EDF submission and will be left blank.*	

⚠️ **EDF files must contain no errors to upload. This will result in the generation of an error message within CIWQS. In some cases, an error may prevent a downstream error from being discovered.**

4.2.3 Code Value Mapping

Several files are entered as codes in the EDF format, CIWQS, or both. Any value that is a code in CIWQS will have a cross-map to the possible EDF values/codes. If a value is reported in an EDF that does not have a mapped value in CIWQS, the submission is rejected.