

The Development of a CROMERR-Compliant Electronic Document Receiving System

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MACTEC, Inc.

I. Overview

- I. Overview**
- II. Background**
- III. What is *i*-STEPS**
- IV. System Process Overview**
- V. Web Satellite *i*-STEPS**
- VI. CROMERR Process**
- VII. CROMERR Requirements and Compliance**
- VIII. Benefits**

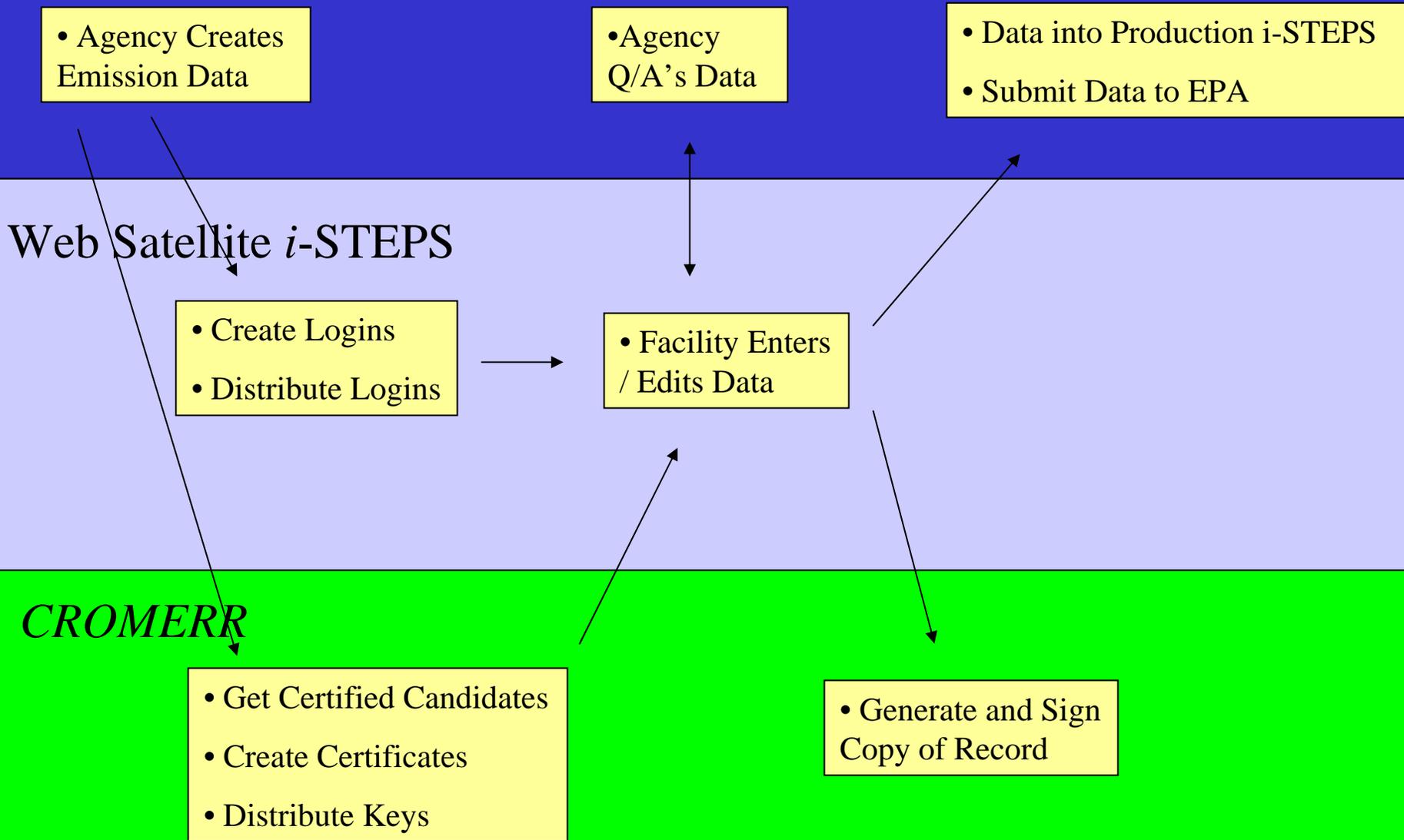
II. Background

- **MACTEC worked with Five State Agencies to develop an online reporting system for NEI data complying with CROMERR through an EPA Challenge Grant**
- **Participating states: Arizona, Delaware, Indiana, Kansas and South Carolina**
- **All use the off-the-shelf software *i*-STEPS to manage NEI data**

III. What is *i*-STEPS ?

- ***i*-STEPS is a 32 bit application developed by MACTEC to manage air emissions and permit data for regulatory agencies.**
- **The original version uses Window based Satellite *i*-STEPS for distribution to facilities to collect emissions data. Once deemed acceptable Satellite *i*-STEPS data are downloaded into the main database. This avoids manual forms.**
- **Delaware is using an online Satellite *i*-STEPS system using terminal servers to receive data from over 100 facilities the last two years.**
- **Data from *i*-STEPS is exported to EPA in NEI and XML format using a utility.**

IV. System Process Overview



V. Web Satellite *i*-STEPS

- **System Setup**
 - **Web Server**
 - Microsoft IIS 4.0 or better
 - **Database Server**
 - Oracle 8.x or better
 - SQL Server 2000 or better
- **Data Setup**
 - **Data Instance Creation**
 - **Field Definition and Security**
 - **Login Generation**

V. Web Satellite *i*-STEPS – continued

- **Acceptance of Data**
 - **Agency QA of submitted Data**
 - **Facility Signature of Data**
 - **Transmission of Data to EPA**



VI. CROMERR Process - Certificates

- **Associate Keys with Users**
- **Verify Identity with Public Key**
- **Contain Key and Information**
 - **Name, Public Key, Email Address, Phone Number**
 - **Signed by a Trusted Third Party (Certificate Authority)**

VI. CROMERR Process - Certificates



- **Data reviewer approves Copy of Record and signs with Private Key**

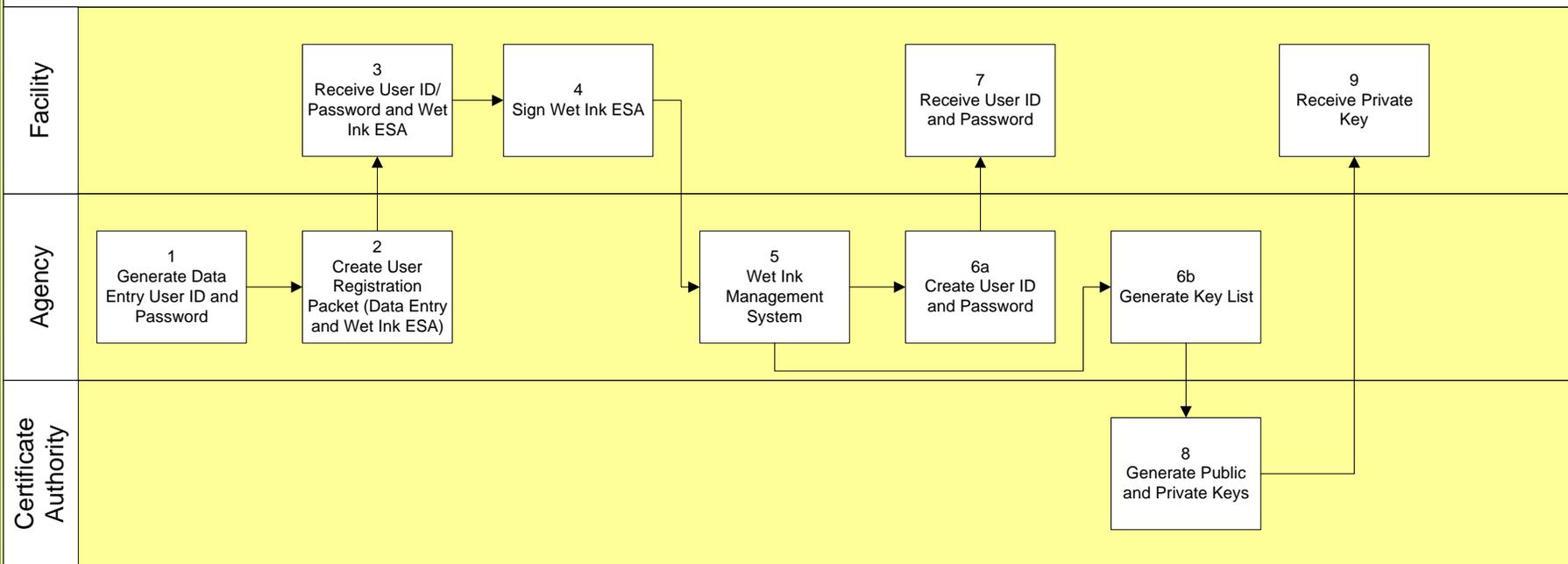


- **System uses Certificate Authority to verify with Public Key**

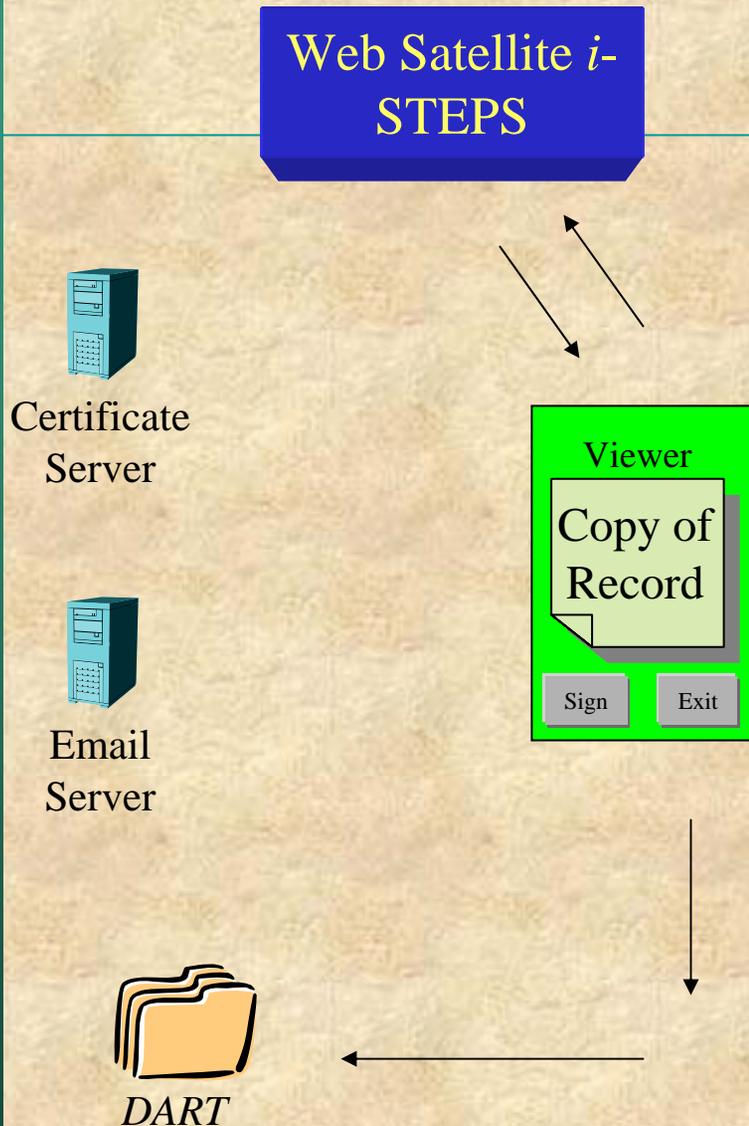


- **Certificate Authority issues Certificate that is integrated with Copy of Record**

CROMERR User Registration Process

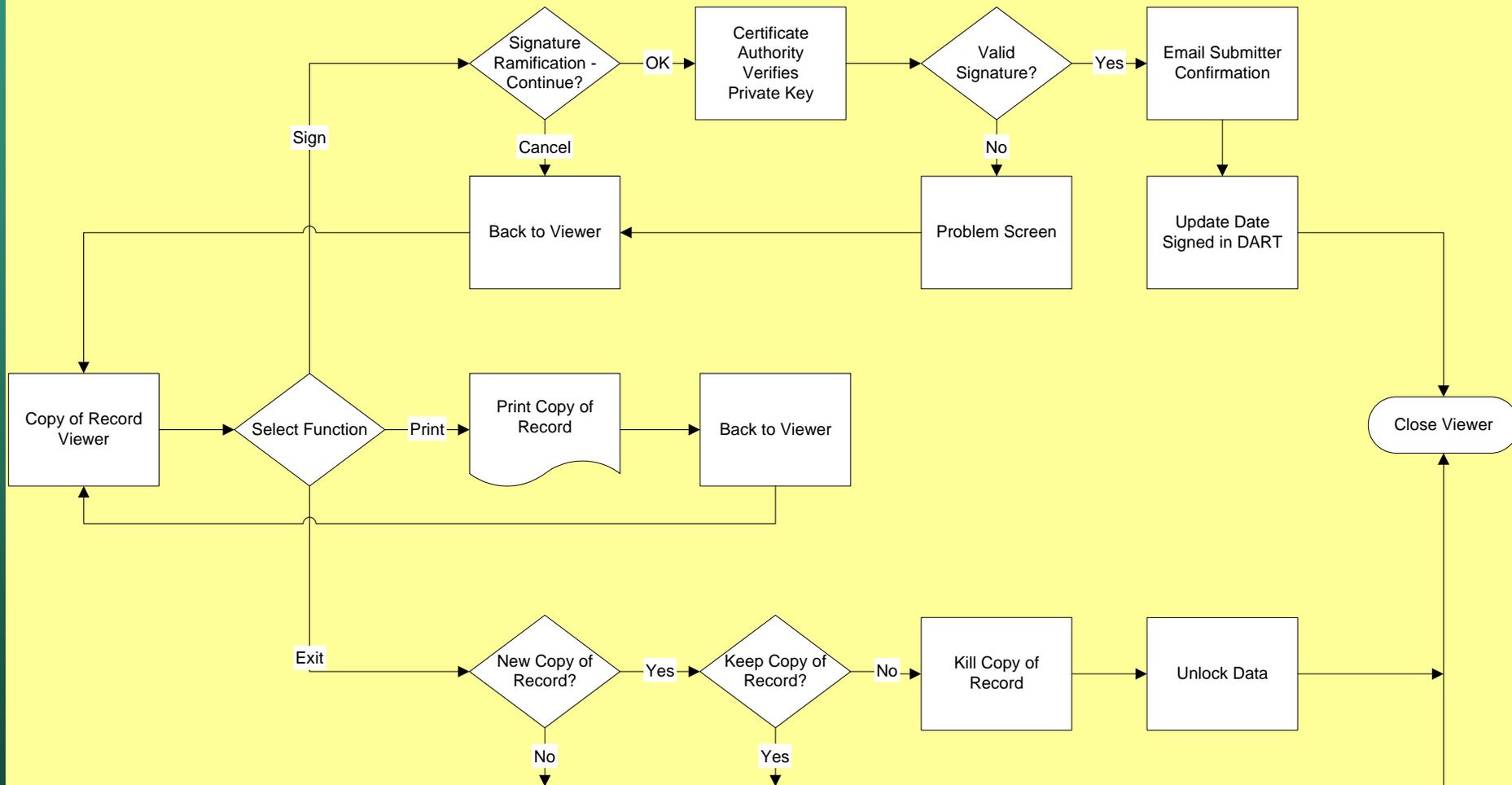


VI. CROMERR Elements and Process

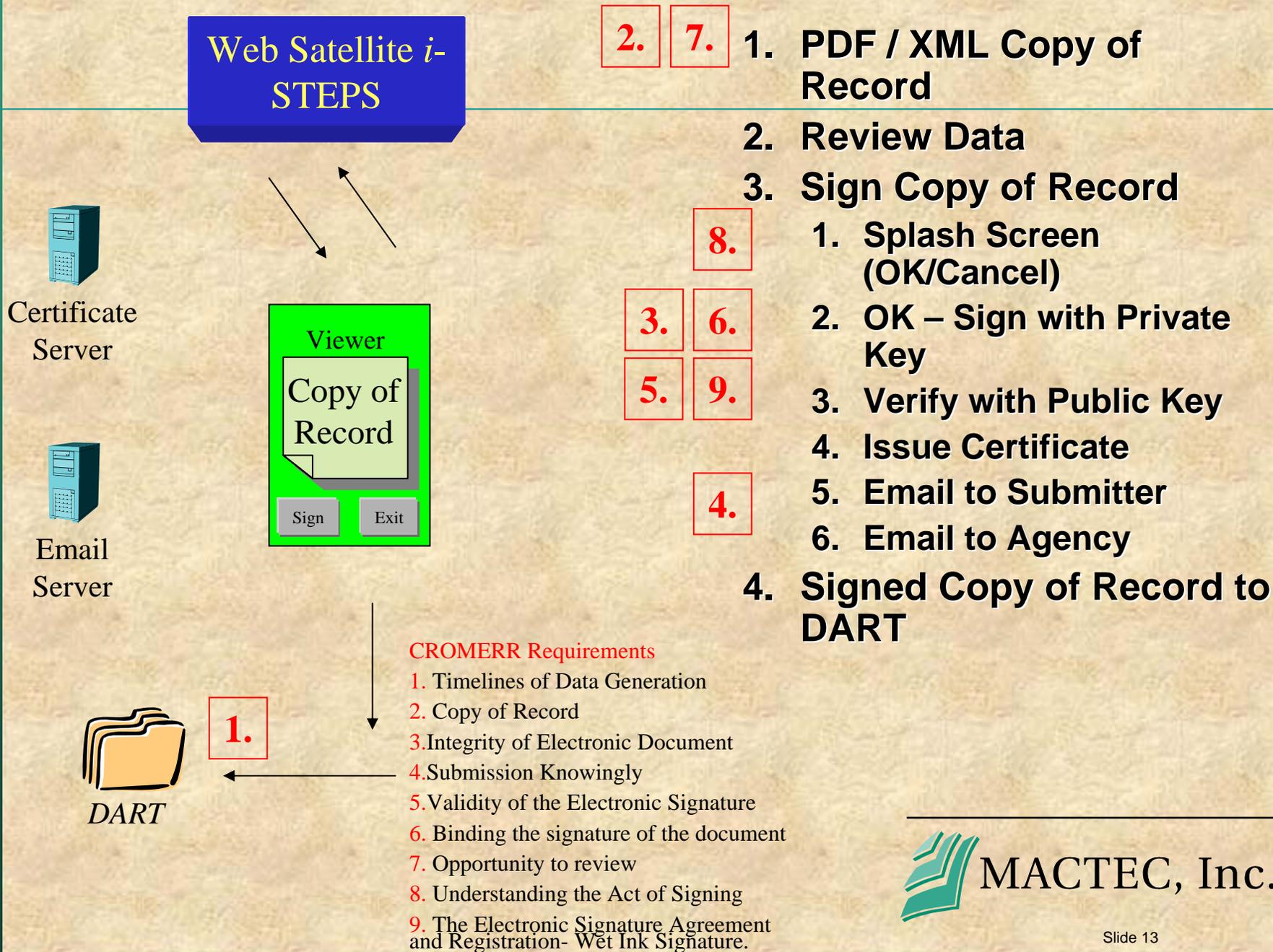


1. PDF / XML Copy of Record
2. Review Data
3. Sign Copy of Record
 1. Splash Screen (OK/Cancel)
 2. OK – Sign with Private Key
 3. Verify with Public Key
 4. Issue Certificate
 5. Email to Submitter
 6. Email to Agency
4. Signed Copy of Record to DART

Process Flow for CROMERR Copy of Record Viewer



VII. CROMERR Requirements and Compliance



VIII. System Benefits

- **Improved Quality of data**
- **Reduced cost of data collection & submission**
- **Paper reduction**
- **Improved access to data**

