Sample Validation & Submission Guide (Using CMDP Templates)

The Compliance Monitoring Data Portal (CMDP) is an online reporting application that allows certified laboratories to report compliance monitoring data directly to the Nevada Bureau of Safe Drinking Water (BSDW).

This document is divided into five separate parts and provides instruction on how to create an XML file, and then upload the XML file into CMDP, identifies items to consider when addressing validation errors within CMDP, and highlights the most common reasons why samples are rejected from the State in CMDP. If anything in this guidance document is unclear, please contact the BSDW at: <u>E-Data_BSDW@ndep.nv.gov.</u>

The BSDW intends to replace current compliance reporting methods with CMDP by the end of 2019. Laboratories will transition from the pre-production to the production version of CMDP on an individual basis.

Getting Started

Review this document and the EPA developed training material in order to learn how to navigate through and use the CMDP application. Links to all pertinent CMDP training materials are available within this document, as well as the BSDW's <u>CMDP Helpdesk</u> site, and the main <u>CMDP Help Center</u> site.

Currently, BSDW intends to use the CMDP Template file submission process. Relevant training for this approach includes the following CMDP Help Center content:

- Introduction to the CMDP
- Manually Upload Files
- Submission Workflow
- Entering PWS and Lab Profiles
- Searching Samples

Links to training materials/videos for the topics above can be accessed on the CMDP Help Center at: <u>https://cmdp.zendesk.com/hc/en-us/sections/207244487-Using-CMDP-for-Labs-Public-Water-Systems-</u>PWS-

After reviewing the EPA developed training material, be sure to review and print out the BSDW Data Submission Guides (as appropriate). These documents highlight data entry fields required by the State and will facilitate a successful data submittal. To view the documents, visit the BSDW CMDP Helpdesk.

Part 1: Prepare Submission File

Step 1: Download the CMDP Template

MS Excel Templates (spreadsheets) are available for each sample category. These templates can be downloaded from the **CMDP Home Page** by selecting a template using the dropdown field under **Templates** and clicking on the **Download** button.



There are two (2) master Workbooks that contain Excel Templates for CMDP sample results:

- Workbook 1: CMDP_ Sample_Result_Template.xlsm

This workbook contains three (3) templates; each is in a separate sheet.

- 1. Microbiological
- 2. Chems-Rads
- 3. Cryptosporidium

Workbook 2: CMDP_Operational_Data_Template.xlsm

This workbook contains nine (9) templates; each is in a separate sheet.

- 1. CFE Turbidity
- 2. IFE Turbidity
- 3. Chlorine Dioxide and Chlorite
- 4. Chlorine Chloramine Entering DS (Distribution System)
- 5. Chlorine Chloramine in DS (Distribution System)
- 6. LCR WQP (Water Quality Parameters)
- 7. TOC (Total Organic Carbon)
- 8. Ozone Treatment (Bromate)
- 9. TTHM and HAA5

Step 2: Prepare a Sample Job Using a CMDP Template

To use the File Upload functionality in CMDP you first enter the data into the appropriate CMDP Template.

You may want to make a copy of the template you'll use and name the file to reflect the data you'll be entering into it. You likely will want to use the same name when you generate an XML file from the template, so have it handy. The name you give to the XML file will be recorded in CMDP when you upload the XML file.

Keep the following in mind when using the templates:

- Some data validations are included in the templates to help ensure that the data are valid and will be accepted by CMDP.
- Be sure to enter valid data in appropriate formats in each cell so that a record is not rejected. If any cell contains invalid data or formats, the record will be rejected. Please refer to the *CMDP Web Services Sample Data Dictionary* for valid values for the fields used by CMDP.
- It is critical that users take into consideration the stored reference data in CMDP and that data are case-sensitive. For example, entering "oh0000001" as a Water System ID is not a valid value; the correct value is "OH0000001."

If a record contains a value not stored in CMDP as reference data for these fields, then the value will not be considered valid, and CMDP will reject the record. To help avoid these kinds of errors, please log into CMDP and view the PWS Profiles or Laboratory Profiles to check for the reference data stored in CMDP for critical fields such as: Water System ID, Water System Facility ID, Sampling Point ID, and Laboratory ID.

Alternatively your State agency may already provide a reference for submitters, for example, Drinking Water Watch, or another state website, where these values are stored.

- Because the CMDP templates are in MS Excel, copy and paste features are available for use. If multiple samples share the same information (same collection date, sample time, etc.), you can copy the information contained in a row and paste it in the next row.
- When entering repeat samples, make sure that you populate the routine (Original) Sample ID
 and optionally the Repeat Location field. It is important that the value (ID) entered in the
 Original Sample ID field exists in CMDP before the associated repeat samples are reported,
 otherwise the repeat samples will be rejected. To ensure this works correctly when CMDP
 processes the content of the Template, enter the routine sample into a row in the template and
 then enter any associated repeat samples in the rows below.
- Save your progress regularly when using Excel. Also, save your template prior to clicking the "Generate XML" button on each tab.

- While it is possible to use the CMDP_ Sample_Result_Template.xlsm to enter multiple samples (Microbial, Chem/Radionuclides, and Crypto) for different water systems if needed, the CMDP_Operational_Data_Template.xlsm for CFE, IFE, and Disinfectant Residuals will only allow reports for one particular water system facility at a time.
- The MS Excel Templates cannot be uploaded as Excel files to the CMDP application; only the XML files created using the "Generate XML" button can be uploaded.
- Once an XML file is uploaded successfully, a draft Sample Job number will be created, and the contents will appear to the user in CMDP as web forms for each sample result, so that you can edit the data and submit just as if you had entered the results as web forms.
- The following features are available in the CMDP user interface for uploaded jobs (as long as the user has the appropriate permissions): Add/Remove Attachments, View Job History (any actions will be recorded when Job is in Draft with Reviewer Status and forward), View Validations, and Add/Remove Samples for a Job.
- Some of the columns contain pick-lists where you can search for a specific value (e.g., Analytes).
 In that case, you can double-click the cell and enter the value to look up; the field will be populated with the result of your search when you press Enter.

Workbook 1: CMDP_Sample_Result_Template

In **Workbook 1: CMDP_Sample_Result_Template.xlsm**, each <u>row</u> in the template represents a sample result in the sample. And so, if there is more than one result for a single sample, each result should be entered into a separate row in the template (see below).

If invalid data are entered for any row (result) in the template, that row will not be added to the CMDP database when uploading the XML file. All rows containing valid data for sample results will be added to the Sample Job even if some of them fail.

The red box in the snapshot below shows how a sample (1002754-01-SRP) with 5 results should be entered into the template. If there is a dropdown for a cell, use it to select a valid entry (e.g., use the dropdown under "Sample Type").

4															
5	Reporting La	ab. ID *		c	Ge	nerate XML									
6															
7			Sample II	nformation									Resu	ts	
8	Sample ID*	WS ID*	Facility ID*	Sampling Point ID*	Collection Date ^{*1}	Collection Time (24H) ^f	Sample Type ^{#f}	Analyte ^{#f} [Code - Name]	Not Detected ^f	Result ^f	Result UOM ^f	Standard Deviation (+/-) ^f	Reporting Limit ^f	Reporting Limit UOM	Ana Start
9	1002754-01-SRP	UTAH11015	SS159	SS159	04/19/2010	9:22	Routine	4116-17-CHLORINE-36	No	5.6	pCi/L	2.4	3	PCI/L	05/04
10								4100-GROSS BETA PARTICLE ACTIVITY	No	5.3	pCi/L	2.2	4	PCI/L	05/04
11								4030-RADIUM-228	Yes				1	PCI/L	05/04
12								4020-RADIUM-226	Yes				1	PCI/L	05/04
13								4010-COMBINED RADIUM (-226 & -228)	Yes					PCI/L	
14	1002068-02-SRP	UTAH27069	WS002	WS002	03/23/2010	9:22	Routine	4109-GROSS ALPHA PARTICLE ACTIVITY	No	7.2	pCi/L	1.5	3	PCI/L	04/01
15								4100-GROSS BETA PARTICLE ACTIVITY	Yes				4	PCI/L	04/01
16								4030-RADIUM-228	Yes				1	PCI/L	04/05
17								4020-RADIUM-226	Yes				1	PCI/L	04/05
18								4010-COMBINED RADIUM (-226 & -228)	Yes				1	PCI/L	
19	1002546-01-SRP	UTAH08007	TP001	TP001	04/12/2010	9:22	Routine	9-GROSS ALPHA PARTICLE ACTIVITY	No	3.2	pCi/L	1	3	PCI/L	04/27
20				Routine Repeat			/	Applo-GROSS BETA PARTICLE ACTIVITY	No	6.2	pCi/L	1	4	PCI/L	04/27
21				Trigger	əd			80-RADIUM-228	Yes				1	PCI/L	05/10
22	1002551-01-SRP	UTAH23010	TP007	TP00 Confirm			- C	80-RADIUM-228	Yes				1	PCI/L	04/28
23	1002569-01-SRP	UTAH25002	WS004	WS0 Special Batch B				99-GROSS ALPHA PARTICLE ACTIVITY	No	27.1	pCi/L	2	3	PCI/L	04/27
24				Batch B Field Bl				00-GROSS BETA PARTICLE ACTIVITY	No	7.8	pCi/L	1	4	PCI/L	04/27
25					ance Evaluation	ı		v 30-RADIUM-228	Yes				1	PCI/L	05/10
26								4020-RADIUM-226	Yes				1	PCI/L	05/10

Reporting	Lab. ID *		с		Gener	ate XML											
						ample Inforn equired for r		st)		Results (* - Field required for record to exist)					Field Results and Measurements (Optic (* - Field required for record to exis		
Sample ID	WS ID	Facility ID [*]	Sampling Point ID	Sampling Location	Collection Date ^{*f}	Collection Time (24H) ^f	Sample Type ^{•f}	Sample Volume ^f	Repeat Location	Original Sample ID [*]	Original Reporting Lab.ID	Original Collection Date	Analyte ^{•!} [Code - Name]	A/P* ^f	Parameter* [Code - Name]	Result*	UOM*
09061702-01	UTAH18011	DS001	DS001	1015 15th Ave	06/17/2009	13:12	Repeat	100	Original Site	09061504-13	с	06/15/2009	3100 - COLIFORM (TCR)	Absent	1013 - Free Chlorine Residual	.08	mg/I
													3014 - E. COLI	Absent			
09061702-02	UTAH18011	DS001	DS001	1035 15th Ave	06/17/2009	13:22	Repeat	100	Downstream	09061504-13	С	06/15/2009	3100 - COLIFORM (TCR)	Present	1013 - Free Chlorine Residual	.13	mg/I
													3014 - E. COLI	Absent			
09061702-03	UTAH18011	DS001	DS001	1011 15th Ave	06/17/2009	13:35	Repeat	100	Upstream	09061504-13	C	06/15/2009	3100 - COLIFORM (TCR)	Absent	1013 - Free Chlorine Residual		mg/I
													3014 - E. COLI	Absent	0100 - Turbidity		
09061702-04	UTAH18011	DS001	DS001	1015 15th Ave	06/17/2009	13:13	Repeat	100	Original Site	09061504-13	С	06/15/2009	3100 - COLIFORM (TCR)	Absent	0999 - Chlorine		mg/I
													3014 - E. COLI	Absent	1012 - Total Chlorine Residual		
															1013 - Free Chlorine Residual		T
															1925 - pH 🖓		_

The snapshot below shows how to enter RTCR repeat samples that also include field results.

Workbook 2: CMDP_Operational_Data_Template

In **Workbook 2: CMDP_Operational_Data_Template.xlsm**, for CFE, IFE, Residuals Entering DS, and Residuals in DS, each <u>tab</u> represents a single monthly report for the operational data.

On several of the sheet/tabs, you can enter summary information for the operational data and detailed information. For example, in the CFE Turbidity sheet, you enter the required summary information at the top and can enter details about combined filter turbidity readings for each day at the bottom (see below).

	A	В	С	D	E	F	G	Н	Ι.		L	М	N	0	P	Q	R	S
1		CM	DP						C	ETur	bidity							
2	Com	pliance Monito	oring Data P	ortal														
3																		
4																1		
5																		
6	WS ID UTAH06014 Total Required								186					GenerateXM	L			
7	Facil	Facility ID * TP014 Total Taken *							186									
8		ng Period	10	2016		Total <=0.3 NT	ments taken 🏾	186										
9	Monthly	y Hours Of	rs Of Percentage 100. Was the CFE turbidity <= 0.15 NTU in at least															
10																		
11						95% of the me	asurements o	of the month?	Yes									
12 13																		
13																		
			Da	ily CFE Turbi	idity - Grab Sam	oles or Continuous	Monitoring					0	Daily CFE - 4 Ho	ur Readings and	l/ or Grab Sam	ples		
14						1												
15		Total Hours				Grab Sample		Continuous Mor										
	Day	Filtering (In	Maximum Turbidity *	Turbidity	Average Turbidity	Total Number of	# of Results	Total Hours	Total Hours	Day	12:00 AM or 1st Reading		8:00 AM or 3rd Reading	12:00 PM or 4th Reading	4:00 PM or 5th Reading		Raw Turbidity (once per day)	Hours of Operation
		Operation)	Turbially -	Turbluity	runbluity	Results	Exceeding	Results Were	Results Exceed		TSC Keading	2110 Reading	STU Keauling	4th Keauing	Strikeaung	our Reading	(once per day)	operation
16 17		24	0.11	0.08			Max NTU	Reported 24.00	Max NTU 0.00	1	0.09	0.08	0.1	0.1	0.11	0.09	1.22	24.00
1/	2	24		0.08				24.00	0.00	2	0.09	0.08		0.1		0.09		24.00
19	2	24		0.04				24.00		3	0.04	0.03		0.03				24.00
20	4	24		0.03				24.00		4	0.03	0.03		0.06		0.06		24.00
25	-	24		0.05				24.00		-	0.07							24.00

There are some calculations in the templates, but details entered generally are not used to calculate summary information.

If invalid data are entered for a report, none of the contents for the tab will be added to the CMDP database when uploading the file. However, all other tabs that have 100% valid data within the workbook will be added to the CMDP database.

Step 3: Generate an XML File from a CMDP Template

Once all the results data to be reported to the State have been entered into the CMDP Template, save the file and click any "**Generate XML**" button available on any sheet in the template (see above) to create the XML file. Save the XML file so that it can be found when you continue to the next section.

NOTE: Confirm the appropriate analysis Method is and a Sampling Location is entered prior to uploading the data into CMDP as these are State required fields.

Part 2: Upload Sample Job Information

<u>Step 1</u>

Once the XML file has been generated, create a new Sample Job by going to the **Drinking Water Sample Jobs** tab and selecting **Create New Job**.

Complia	ance Monitoring Data	a Portal		_
Home PWS	Profiles Laboratory Prof	iles Drinking Wat	er Sample Jobs	Search Individual
Job Maintenand	ce View			
Search Jobs				
Job ID	Created By	Status		rom
Drinking Wat	ar Sample, John			
🥭 Refresh 🕴	Create New Job	o Reviewer Send to	Certifier Certify	and Submit to State
Job ID	Category Des	cription File Nan	ne Primacy Agency	Status

<u>Step 2</u>

From the pop-up window, select the **Upload File** option. Then, click the **Choose a file to upload...** link to select the XML file. Navigate to the appropriate folder where your XML file is located, select it, and click **Open**. Wait until the **Done** icon is displayed (located next to the XML file name) before clicking the **Upload** button.

A message stating the Information was saved successfully will appear at the top of the dialog box and a Job ID will be listed within the grayed-out field (this number is automatically assigned by CMDP).

- Upload Sam	ple File		
ed successful	ly.		×
		ssion.xml Done]
	Upload	Close	
	Job ID 112	Example Resubmi	Job ID 11205

<u>Step 3</u>

After clicking the **Close** button in the step above, check the **Sample Result** sub-tab to confirm that all sample submissions were uploaded successfully. If the data was uploaded successfully, each sample submission will be displayed under the **Sample Result** sub-tab (screen shot below). If all submissions are listed, proceed to Part 2.

Compliance Monitori	ng Data Portal						hel Westbrook(Private Lab CHDP Administrator)	🛛 🖬 Logout
Home PWS Profiles Labor	atory Profiles Drinking Water Sample	Jobs Search Individual Samples Sy	stem Administration					
Job Maintenance View Job Su	mmary View - 7321 💢							
Sample Result V perational D	ata Job History Validations Att	achments Composite Samples						
🥲 Refresh 🗛 💌 💥 Ref	owe							
Category	WS ID	WS Name	Facility Name	Sampling Point	Sample ID	Sample Type	Collection Date	
Microbial	AK2120606	KASAAN	DS LINCKUM CREEK	SPD9001TCR	BT-RPT-16	Repeat	08/29/2017	
Microbial	AK2120606	KABAAN	DS LINCKUM CREEK	SPDS001TCR	BT-RPT-17	Repeat	08/29/2017	
Microbial	AK2120606	KABAAN	DS LINCKUM CREEK	SPDS001TCR	BT-RPT-18	Repeat	08/29/2017	

If a submission is missing (i.e., not listed) from the **Sample Result** sub-tab, OR if no submissions are listed and the warning of "**No items to show**" (screen shot below) is displayed, this indicates a significant field(s) (i.e., Sample ID, WS ID, Analyte [Code-Name], etc.) were left blank in the Excel template.

NOTE: If the **Sample Category** column (located on the **Job Maintenance View** tab) is blank, this also indicates that data was unsuccessfully uploaded.

In either case, the user will need to remove the submission from CMDP by returning to the **Job Maintenance View** tab, select the Job ID and click **Remove** to delete the Sample Job from CMDP. The user will then have to go back to the Excel template, fix the error, and then re-create the XML file.

C	Compliance Monitoring Data Portal				(Hello Rachel Westbrook(Pri ORG: AK-ANALYTICA ALASKA	Administrator)	🗟 Logout
	Home PWS Profiles Laboratory Profiles Drinking	Water Sample Jobs Sear	ch Individual Samples 💙 Sy	stem Administration				
1	Job Maintenance View Job Summary View - 12567 🎉							
	Sample Result Operational Data Job History Val	idations Attachments	Composite Samples					
Т	🥏 Refresh 🛛 Add 🔻 💥 Remove							
Ш	Category WS ID	WS Name	Facility Name	Sampis Point	Sample ID	Sample Type	Collection Date	
				No items to show				

Part 3: Review Validations Tab

<u>Step 1</u>

After the user has uploaded the XML submission into CMDP successfully, as part of the review process be sure to check for validation errors under the **Validations** tab. This is a very important step because addressing errors listed here will reduce the number of submission rejections issued by the State.

If the "**No items to show**" notification is displayed in Section A (see screenshot below), AND the numbers listed under the **With Errors** column shown in Section B are all equal to "0", then this indicates that no validation errors were identified within the uploaded XML information.

If no validation errors are listed under this tab, the user can submit the sample/results to the State. For guidance on how to submit this information to the state, proceed to Part 3 of this document.

Compliance Monitoring Data Portal			Helio Rachel Westbrook(Private Admi (ORG: <i>AK-ANALYTICA ALASKA - ANC</i>	Lab CMDP inistrator) 🕜 🖪 Logou 'HORAGE)
Home PWS Profiles Laboratory Profiles Drinking V	Vater Sample Jobs Search Individual Samples System Adminis	tration		
Job Maintenance View Job Summary View - 7327 🙀				
Sample Result Operational Data Job History Valid	ations tachments Composite Samples			
Federal Reporting Validation Results				<u>^</u>
Category	Sample Identifier	Validation Category	Error Description	
		No items to show.		
		Section A		
XML Submittal Validation Summary				
Category	Total	Without Errors	With Errors	
Microbial Chem/Radionuclides	3	3	0	
Cryptosporidium	0	0	0	
Operational	0	0	0	
Composite	0	0	0	
		Section B		
		Section D		
XML Submittal Validation Error Details				
Category	Validation Category	Sample Identifier	Error Description	
U				×

If one or more messages are displayed within Section A, AND/OR the **With Errors** column in Section B indicates a number of 1 or greater, this indicates that validation errors were identified within the uploaded XML information (see screen shot below).

If any validation errors are listed under this tab, the user must make the appropriate corrections prior to submitting the sample/results to the State. For guidance on how to address the information within Section A refer to Step 2, and for Section B refer to Step 4.

Compliance Monitoring Data Portal			Helio Rachel Westbrook(Private Lab CMDP Administrator) (ORG: AK-ANALYTICA ALASKA - ANCHORAGE)	🕜 🛛 Log
Home PWS Profiles Laboratory Profiles Drink	ing Water Sample Jobs Search Individual Samples System Administration			
Job Maintenance View 🔾 Job Summary View - 7151 🎽	Job Summary View - 12630 💢			
Sample Result Operational Data Job History	Validations Attachments Composite Samples			
Federal Reporting Validation Results				
Category	Sample Identifier	Validation Category	Error Description	_
Microbial	jobid=12500, wsid=x4/2249201, itsrithName=BPC6469 - QUICK DRAW H20 #SS 3600, sampleCathgogr-indicabiat_softextondate=5/7022018, labSiampleCd=TEST354, analyteName=3100 - Colform (TCR)	Federally Required or Conditionally Required	Missing Data for Fields (Analysis Start Date, analysisStartTime)	
	Sect	ion A		
XML Submittal Validation Summary Calegory	Total	Without Errors	With Errors	
Microbial	1	1	0	
Chem/Radionuclides	2	1	1	
Cryptesporidium Operational	0	0	0	
Composite	ő	0	0	
	Sect	ion B		
XML Submittal Validation Error Details				
Category	Validation Category	Sample Identifier	Error Description	
ChemRadionucides	Critical	Peode":WC236016"; Solid: "12639"; stateAssignedFacid: "TP9	TransfeCateg ("RegalEntifyld" "Invalid Lab kit", "Inethodid" "Invalid Method Code Ref k	id.")

Step 2: Section A: Federal Reporting Validation Results Table

This table contains results of validations checked against fields that are federally required/conditionallyrequired to see if there is a valid value. If fields are left blank or information is entered incorrectly, they will be listed as errors in this table. If the user double-clicks on an individual row in this table, they will be brought to the specific sample submission.

ſ	Sample Result Operational Data Validations	nple Result Operational Data Validations Attachments Composite Samples												
┛	Federal Reporting Validation Results													
1	1 Category 2	Sample Identifier 3	Validation Category	Error Description										
	Chem/Radionuclides c	obld=12207, wsld=AK2360816, facliityName=TP FOR RAMPART WASHETERIA, ampleCategory=ChemRadionuclides, sollectionDate=06/09/2018, abSampleCd=TESTFBKNI4A, analyteName=1040 - titrate	Federally Required or Conditionally Required	Missing Data for Fields [Analysis Start Date, analysisStartTime]										

The information below provides a brief description of each column within the Federal Reporting Validation Results table and how users can navigate through the information.

- 1. **Category**: This column lists the type of sample group as it relates to the specific sample with an error. The categories listed can include Microbial, Chem/Radionuclides or Cryptosporidium.
- 2. **Sample Identifier:** This column provides details on the sample that contains the Federal reporting error(s). The information merely identifies the sample, it does not describe the error. The screen shot above (highlighted text under second column) identifies that an error occurred, and provides the following sample meta-data:
 - jobId: Job sample identification code assigned by CMDP
 - wsld: Public Water System identification number
 - facilityName: Water system facility name entered in CMDP
 - **sampleCategory**: Type of sample classification (i.e., Microbial, Chem/Radionuclides, Cryptosporidium)
 - collectionDate: Date sample collected (MM/DD/YY)
 - labSampleCd: Lab sample identification number
 - analyteName: Sample analyte(s) code/name

- 3. **Validation Category:** This column identifies the severity level for the type of error identified (e.g., federally required/conditionally required).
- 4. **Error Description:** This column describes the specific error that has occurred with the sample submission.

The table below highlights the various CMDP error messages as displayed within **Error Description** column along with an explanation of the error. This table also highlights the specific fields within the Excel template that could generate the error.

NOTE: This is not an all-inclusive list of every error that can occur and only identifies the most common errors. If you run into an error message that is not listed in the table below, please contact the State CMDP Administrator for assistance.

CMDP Error Message	Explanation of Error	Fields for Labs to Review
Missing Data for Fields	No data entered in Sample Received	Add data into Sample Received Date
[sampleRecievedDt]	Date field.	field.
Missing Data for Fields [sampleVolume]	No data entered in Sample Volume field. NOTE: Only required for Microbial Samples.	Add data into Sample Volume field.
Missing Data for Fields [Collection Time]	No data entered in Collection Time (24H) field.	Add data into Collection Time (24H) field.
Missing Data for Fields [Missing Sample Result for E.coli Given Reported TC+ Sample Result]	E.coli sample result was not submitted with TC+ sample result.	Add E.coli sample result to sample submission.
Missing Data for Fields [Volume Assayed]	No data entered in Volume Assayed field.	Add data into Volume Assayed field.
Missing Data for Fields [Method]	No data entered in Method field.	Add data into Method field.
Missing Data for Fields [Analysis Start Date]	No data entered in Analysis Start Date field.	Add data into Analysis Start Date field.
Missing Data for Fields [analysis StartTime]	No data entered in Analysis Start Time field.	Add data into Analysis Start Time field.

If additional errors appear on the **Validations** tab within Section B, refer to Step 4. If no additional errors appear on the **Validations** tab then proceed to Step 3, and continue to Part 3 when done.

<u>Step 3</u>

Once the user has reviewed the all validation errors listed within this section, make note of all errors then delete the Sample Job from CMDP.

To delete the Sample Job, click the **Remove** button located under the **Drinking Water Sample Jobs** menu (screen shot below). Then, make the appropriate edits to the Excel template and re-upload the corrected submission into CMDP by following the process outlined in Part 1.

	Drinking Water Sample Jobs													
	🔁 Refresh 🌵 Create New Job Send to Reviewe				Send to Certifier Certify and Submit to S			Submit to State	💢 Reject	💢 Remove	Remove · Download Samples			
	Job ID Sample Category V 12630 Microbial Chem/Radionuclide		Sample Category		Description		File Name		Primacy Agenc	y	Status		Preparer	
			Microbial Chem/Radionuclides	New Job usin		g files mysamplesA.xm		nl AK			Draft with Prepa	rer	Rachel Westbrook	

Step 4: Section B: XML Submittal Validation Summary/ XML Submittal Validation Error Details

Check the **XML Submittal Validation Summary** table, specifically the **With Errors** column (e.g., number of records with errors identified). If there are errors, a number of 1 or greater will be listed in the **With Errors** column.

Click on the individual row to display the error message in the **XML Submittal Validation Error Details** table. Errors displayed in this table include invalid data entries and missing software required fields for each sample.

Category	Total	Without Errors	With Errors	
licrobial	1	1	0	
hem/Radionuclides	2	1	1	
ryptosporidium	0	0	0	
perational	0	0	0	
omposite	0	0	0	_
		111		
ML Submit				
ategory 2 Validation Catego 3	Sample Identifier		4 Error Desc	cription
hem/Radionuclides Critical		"P001","sampleCategory":"Chem/Radionuclides","sampleCd":"TEST1A76","	("legalEntit	yld":"Invalid Lab Id.","methodid":"

The information below provides a brief description of each column within **XML Submittal Validation Error Details** table and how users can navigate through the information.

- 1. **Category:** This column lists the type of sample group as it relates to the specific sample with an error. The categories listed can include Microbial, Chem/Radionuclides or Cryptosporidium.
- 2. Validation Category: This column identifies the severity level for the type of error identified (e.g., Critical).
- 3. **Sample Identifier:** This column provides details on the specific sample that contains the XML errors. The information merely identifies the sample, it does not describe the error.

The screen shot above (highlighted text under third column) identifies that an error occurred, and provides the following sample meta-data:

- wsld: Public Water System identification number
- **jobId:** Job sample identification code assigned by CMDP
- stateAssignedFacId: Water system facility code entered in CMDP
- **sampleCategory:** Type of sample classification (i.e., Microbial, Chem/Radionuclides, Cryptosporidium)
- **sampleCd:** Lab sample identification number
- collectionDate: Date sample collected (MM/DD/YY)
- analyteCd: Sample analyte(s) code/name
- 4. **Error Description:** This column describes the specific error that has occurred with the sample submission. If the user double clicks on an individual row, they will NOT be brought to the specific sample submission.

The table below highlights the various CMDP error messages as displayed within the **Error Description** column along with an explanation of the error. This table also highlights the specific fields within the Excel template that could generate the error.

NOTE: This is not an all-inclusive list of every error that can occur and only identifies the most common errors. If you run into an error message that is not listed in the table below, please contact the State CMDP Administrator for assistance.

CMDP Error Message	Description of Error	Field for Labs to Review
{"collectionDate"."Date is not a valid	No data entered in Collection Date	Add data into Collection Date field or
date in the required format."}	field or data entered incorrectly.	correct data to match the MM/DD/YY
		format.
{sampleRecievedDt":"Sample Received	The sample has to be collected before	Confirm the Sample Received Date is a
Date must be after Collected Date."}	it is received by the laboratory.	date occurring AFTER the Collection
		Date.
{"facSamplingPointId"."Invalid Facility	The Sampling Point ID entered is not	Confirm the Sample Point ID's are
Sampling Point Id."}	associated to the water system or is	associated to the correct water system
	not associated to the Facility ID	and are for the correct contaminant
	entered.	submitted. Users can confirm this
		information from the annual
		Monitoring Summary, <u>DEC Excel Look-</u>
		<u>Up tool</u> or contacting the PWS or DW
		Program directly.
{"facilityId":"Invalid Facility Id."}	Facility ID entered is not associated to	Review the Facility ID field for the
	the water system or is entered	water system. Users can confirm this
	incorrectly.	information from the annual
		Monitoring Summary, <u>DEC Excel Look-</u>
		<u>Up tool</u> or contacting the PWS or DW
		Program directly.
{"legalEntityId": "Invalid Lab Id."}	The lab ID code entered in the	Confirm the Reporting Lab ID or
	Reporting Lab ID or Analyzing Lab ID	Analyzing Lab ID listed in the template
	field is not correct.	is entered correctly and confirm the lab
		is certified in the State of Alaska.
{"methodId":"Invalid Method Code Ref	Method code entered in Method field	Review the Method field to confirm it
ld."}	is not compatible with entered analyte.	is appropriate compared to the analyte
		submitted.
{originalSampleId":"Original Sample Id	When the sample type is listed as	Confirm the Sample Type entered. If
is required when Sample Type is	Repeat, Triggered, or	indeed entry is a repeat, triggered or
Repeat, Triggered, or Confirmation."}	Confirmation it must be associated to	confirmation sample, the Original
	original Total Coliform present (TC+) or	Sample ID field must contain the
	Chem sample that caused the sample	Sample ID for the original positive
	to be collected.	sample.
{"SampleExists":"Sample already	Sample submission has previously been	If all the information is correct, re-
exists"}	uploaded into CMDP.	upload the sample with a different
		Sample ID (i.e., from 1184407005 to
		1184407005-01).

<u>Step 5</u>

Once the user has reviewed the all validation errors listed within this section, make note of all errors then delete the Sample Job from CMDP. To delete the Sample Job, click the **Remove** button located under the **Drinking Water Sample Jobs** menu (screen shot below). Then, make the appropriate edits to the Excel template and re-upload the corrected submission into CMDP by following the process outlined in Part 1.

Drinking Water Sample Jo	Drinking Water Sample Jobs										
ಿ Refresh 🌵 Create New .	lob Send to Reviewer S	Send to Certifier Certify and S	Submit to State 🛛 💥 Reject	Kemove · Download Samples							
Job ID 🔺	Sample Category	Description	File Name	Primacy Agency	Status	Preparer					
12630	Microbial Chem/Radionuclides	New Job using files	mysamplesA.xml	AK	Draft with Preparer	Rachel Westbrook					

Part 4: Submit Sample Job

<u>Step 1</u>

Once the user has confirmed that no errors exist from the Validations tab, the Sample Job can be submitted to the State. To submit a sample, go to the **Job Maintenance View** tab, enter the **Job ID** into the search bar and click on the check box to select the appropriate job.

<u>Step 2</u>

Click the Send to Reviewer button on the Drinking Water Sample Jobs menu.

<mark>ی</mark> د	ompliance M	onitoring Data P	ortal		
Home	PWS Profiles	Laboratory Profiles	Drinking Wate	r Sample Jobs	Search Individual
Job Ma	intenance View	Job Summary View	12582 💥		
Search	h Jobs				
Job ID		Created By	Status	Fro	m
12582					
Drinki	ng Water Samp	le Jobs			
a Re	fresh 🛛 🍦 Create	New Job Send to Re	wiewer liend to (Certifier Certify a	nd Submit to Stat
3	ob ID	Sample Category	Description	File Name	Primacy Agence
-		Microhial .			

A pop-up will ask you to select the appropriate individual. After the user has selected the reviewer, click the Submit button.

Send Data to Reviewer		
Select Individual	v	
Are you sure yo		8
Submit	Rachel Westbrook	
Submit	Marci Irwin	
	Jeanine Vance	
	Kathleen Spaulding	

A confirmation window will pop-up stating the job was successfully submitted for review. Click OK. An automated email will then be sent to the assigned reviewer's email indicating that a job is ready for review.

<u>Step 3</u>

The Sample Job should then be sent to the certifier by clicking the **Send to Certifier** button. Again, a pop-up will ask the user to select the appropriate certifier.

Home PWS Pro	files Laborat	- ory Profil	es Drin	king Wat	er Sample	Jobs
Job Maintenance V	Job Sum	ımary Vie	w - 12582	×	_	
Search Jobs						
Job ID	Created	By	:	Status		From
12582				7	7	-
Drinking Water	Sample Jobs					
ಿ Refresh 🖕	Create New Job	Send to	Reviewe	Send to	Certifier	Certify and
Job ID	Sample 0	Category	Descrip	011	Pile real	me
12582	Microbial		New Job	using file	s mysamr	las vml

A confirmation window will pop-up stating the job was successfully submitted to the certifier, and an automated email will be sent to the assigned certifier's email indicating that a job is ready for the final evaluation.

<u>Step 4</u>

When the certifier or Lab System Administrator is prepared to submit the Sample Job, click the **Certify and Submit to State** button.



The submitter will be prompted to enter their user name and password, as well as asked a security question, and must click the check box (indicated by red arrow in screen shot) to certify the information provided was true and accurate. Finally, they will click the **Submit** button.

Attachments			
File Name	Description	Date Added	Added
		No items to show.	
Ouestion: What was your	first pet's name?		
Question: What was you	r first pet's name?		

A final confirmation window will pop-up, and the user will click the **OK** button to complete the submission process.

The user will be able to see exactly when the data was submitted to the State and who the preparer, reviewer and certifier were, and when the certification steps were completed as displayed in the job details row. This row will update automatically once the user clicks **OK** on the pop-up window.

Part 5: Validation Errors from the State

After the Sample Job is submitted to the State there is still a possibility the sample may be rejected during the state validation process (meaning the errors will not necessarily be listed on the **Validations** tab in CMDP). The following steps outline how to address rejected sample submissions.

Step 1

If a data error was identified in a sample submission AFTER it was accepted by the State, the State will notify laboratory staff via automated email explaining the sample has been rejected along with the reason for the rejection.

To understand the type of error that occurred, refer to the table below. This table highlights the rejection message as displayed on the email along with an explanation of the rejection, and the specific fields within the Excel template that could generate the error.

NOTE: The (xxxx) denoted in the **Rejection Message** column acts as a placeholder indicating unique information related to the sample submission will be displayed here (e.g., analyte code, method code).

Rejection Message	Explanation of Rejection	Fields for Labs to Review
Invalid data: Lab sample ID is too long.	Sample ID field exceeds the maximum	Enter Sample ID that is within 20
Maximum allowed length: 20	allowed 20 character limit.	character limit.
characters		
Lab is not certified for this method	Method field contains method code	Confirm Method field contains method
(xxxx) and analyte (xxxx) for the given	that Analyzing Lab is not certified for.	code that Analyzing Lab is certified for.
analysis date		Refer to DEC Lab Data Submission
		<u>Guides</u> for additional information.
Sample age for Sample Result (xxxx) is	Sample result exceeds hold time.	Confirm Analysis Start Date value and
beyond the allowed limit	Analysis Start Date value entered is	Collection Date value are correct.
	more than 24 hrs. from Collection	
	Date.	
Required field: Sample collection date	Collection Date field is blank.	Add data to Collection Date field.
is missing		
Required field: Sample collection time	Collection Time (24H) field is blank.	Add data to Collection Time (24H).
is missing		
Required field: Lab receipt date is	Lab Sample Received Date field is	Add data to Sample Received Date
missing	blank.	field.
Required field: Sample collection	Sampling Location field is blank	Add data to Sampling Location field.
location is missing		
Required field for Sample Result (xxxx)	Analysis Start Date field is blank.	Add data to Analysis Start Date field.
Analysis start date is missing		
Required field for Sample Result (xxxx)	Analysis Start Time field is blank.	Add data to Analysis Start Time field.
Analysis start time is missing		
Presence Indicator	(e.g. A/P field listed as Present but	If contaminant is Present in sample,
(ResultMeasurementQualifier), Count	Count field does not have a value.)	Count field may need data (determined
(ResultMeasurementValue), and/or	NOTE: Only required for Microbial	by method used).
Interference. (SAMPLE RESULT)	Samples.	
REJECT: Inconsistent result data:	(e.g. A/P field listed as Absent but	If contaminant is Absent in sample,
Presence Indicator is "A" (absent) and	Count field has a value.)	Count field should not have data
Count Value is not "0". (SAMPLE	NOTE: Only required for Microbial	entered.
RESULT)	Samples.	
REJECT: Laboratory Received Date	The sample has to be collected before	Confirm the Sample Received Date is
supplied was prior to Sample Collection	it is received by the laboratory.	<i>before in time</i> of the Collection Date .
Date. (SAMPLE)		
REJECT: Sample Result failed duplicate	A sample result with the same	Review previous sample result(s)
by data check. A sample result for the	information in the Analyte [Code-	submitted and if indeed information is

same analyte is already present for this	Name] (as it relates to the sample) has	correct, confirm the Sample ID field is
sample (SAMPLE RESULT)	already been submitted to the State.	different compared to the previous
		sample submitted. Contact the <u>CMDP</u>
		Helpdesk if issue persists.

<u>Step 2</u>

Once the user understands the issue, you will need to make the appropriate correction(s). However, be aware this process is different than any errors corrected PRIOR to the sample submission to the State (i.e., errors list on the Validations tab).

To correct errors AFTER the sample has been submitted to the State (as identified in the Validation Error email) the user must make the appropriate edits to the originally submitted Excel template.

After the validation errors are corrected within the originally submitted Excel template, be sure to change the Sample ID code/name to a different code/name (i.e., Sample ID column cell value changed from 11844070-01 to 1184407005 as shown in highlighted text in screen shot below.)

CMD									Mi	crob	iologic	al Sam	ples		
Compliance f	mpliance Monitoring Data Portal														
Reporting	(Lab. ID *	AK00	961	1		Gene	rate XML								
						(* - F		nformation d for record to ex	cist)						
Sample ID	Sample Received Date ^f	ws ID	Facility ID	Sampling Point ID	Sampling Location	Collection Date ^{•f}	Collection Time (24H)	Sample Type ^{•f}	Sample Volume [†]	Repeat Location	Original Sample ID ⁺	Original Reporting Lab.ID	Original Collection Date	Comment	Sampl Collect Name
1184407005	3/2/2018	AK2249203	D5001	SPDS001TCR	CREEK NATURE CENTER	3/2/2018	10:10	Routine	100						RW

After editing the Excel template, generate the XML file. It is recommended to rename the XML file and the Job Description name with a naming convention that indicates the sample/result is a resubmission.

<u>Step 3</u>

Once the XML is re-generated, re-upload the sample submission into CMDP, review the Validations tab for any inconsistencies and submit the sample/result to the State (following the process outlined in Part 1-3, above).

This completes the process for dealing with rejected sample submissions using the Excel template.