Verbatim Transcript for ECHO Webinar: Intro to ECHO Demonstration

May 3, 2016

Good afternoon. Welcome to the second in a series of EPA ECHO web presentations. Today's presentation will include a live demonstration of the ECHO website. For today's webinar, you'll be in listen-only mode. To ask questions, please type them into the question box. During the course of the webinar, there'll be two short polls. Please select the appropriate multiple choice answers when the poll pops up on your screen. In closing, the webinar will end with a short survey. Enjoy the presentation.

Hi everyone. I'd like to welcome you to the second series of webinars for the Enforcement and Compliance History Online, our ECHO website. Today we're going to do a demo of the ECHO website and how to do basic searches within the site. To give you an idea of what we're searching, I want to share with you the sources of ECHO data where we extract our data from. About every week we extract our data from the Integrated Compliance Information System (ICIS), the Resource Conservation and Recovery Act Information System, the Safe Drinking Water Information System, the Facility Registry System, and Envirofacts. You can get all of this information in more detail at echo.epa.gov on the link at the bottom of your screen right now. And all of this data is inside of the ECHO site.

ECHO has a couple different features. The main feature is facility search and for that we can search for: any data, air-specific, water-specific, hazardous waste-specific, or drinking water. You can also download the data that you searched for and utilize other services. We also have an Enforcement Case Search and some different tools. Today, we're going to focus on the facility searches and in future tutorials, we'll go over some other tools.

I'd like to take this time to do a poll question.

[Poll Question: What ECHO searches have you used?]

The top searches on ECHO are mostly new to ECHO, mostly water, and then tied with mostly air, and mostly RCRA [hazardous waste].

Just a quick reminder as I enter the live demo. If you have any questions, go ahead and type them into your question box and as the presentation goes and at the end we will go through them and answer your questions.

This is the ECHO Home page. The Home page defaults to a search by community, but there's also links for facilities, maps, dashboards, and other resources. Today, we're going to focus on the Explore Facilities toolbar.

Our first search will be an All Data search just to introduce you to what the ECHO site looks like after a search. Inside of the search you can use the geographic location or facility characteristics if you have something in mind. You can also search through any enforcement actions that you're interested in learning about, environmental conditions of your concern, or any specific pollutants.

Today, we're going to use the Current Compliance Status. We're going to set it to "Multiple Significant." This is just a basic search so I can show you the map. Your search result page has a map and also a table with facility information. On the map, these are the different facilities that were found in the search. You can utilize the map legend to see that all of the facilities right now are what's called "multimedia," and that means that they fall under multiple acts. And they also all have a red color which means they're in "serious noncompliance." And we can see when they were last inspected; those are the numbers on the screen. Down in the table, you can also see more facility information such as quarters of noncompliance, number of inspections, informal actions, etc. We can customize these columns by using this toolbar here. I'm just going to turn on a different facility type and the date of last inspection. And I'm going to leave all of the other default choices. When you're doing a search, you can sort your table any way you want. Today, we're going to sort it by Informal Enforcement Actions [in the last 5 years]. In the reports toolbar—the Reports column—we can see what different reports are inside—or on a facility. I'm going to show you the facility report for the Invista SA RL because I can see that there's different reports to show you.

This leads us to a Detailed Facility Report. In a Detailed Facility Report, there's a Facility Summary which has a summary of all violations and how the facility is regulated, what different acts. There's also Facility Characteristics. This shows us the permits, which is helpful if you're looking into the history of a facility. The Detailed Facility Report also has a history of Enforcement and Compliance listed out. This has both formal and informal actions, and it is broken down by type of enforcement action, as well. There's also an Environmental Conditions tab. This will show us impaired waters and other environmental conditions of a facility area. Under Pollutants tab, these are not necessarily violations or anything wrong, but it shows you the pollution that is released by a facility. And finally, there's a Demographics tab which gives you a summary of the area and what's happening with the people around the facility. That's the basic-- this is the facility report. We're going to go back to the top. Up here in the summary we can see "significant noncompliance" and "noncompliance." This just identifies the response priority based on a facility having multiple or unresolved violations.

I'm going to go back to the Home page, and do an Air Search.

The search table looks relatively similar to the All Data. Today, we're going to look in Indian Country. It's just a filter in your search table. And we're going to check the Stack Test, the last time it was checked within two years. The result page will look relatively similar to what we saw before. Again, the numbers show when it was last inspected. The green means that it's part of the Clean Air Act and the blue means that there's no violation in the database. We can see down here in the facilities table, the permitting detail and facility testing detail. If you're interested in air emissions over time, you can click on a facility and see their history again in the Detailed Facility Report, as we just saw.

Now, I'll show you the Drinking Water Search. In our Drinking Water Search, we can search by system type. There's various types of water sources and we're going to look at the "community" water system. In Enforcement, we're going to say "No Violations." Here, we can also search various pollutants and you can put a population limit on your community. Our Drinking Water Search displays a table only. In this table, we can see population served, if it's a violator, additional compliance data, and the type of water—the source water type.

Let's look at a Detailed Facility Report for a water system. Inside of the Detailed Facility Report for a water system, we can see where a facility is, and any compliance and enforcement of a facility. We can also see a history of testing that's happened on a facility.

The Clean Water Act Search is a little bit different from the Drinking Water Search. This is looking for facilities that are regulated by the Clean Water Act and this will help us find impaired waters as well. You can search by a Watershed if you know a specific watershed that you're interested in. You can also search by Facility Permit and many of the other same searches as the detailed—as the "any permit" search. Today, we're going to search for no informal actions within three years. We're also going to put in our permit status, make sure that it's effective.

We can see that this has resulted in too many records. So, over here, in the summary, we can modify our search. This will take us back to our table, but it keeps what we've already picked. So, I'm going to select "No Violations." And we still need to get a little more specific. So, let's see what's not discharging into impaired waters.

With our search results, the map will be different. We can see that there's clustering of facilities. As you zoom in on the area, those clusters start to break up. I'm going to customize our columns. There's various columns we can add for more information on a facility. Today, we're going to look at DMR Loadings (pounds per year) and Informal Enforcement Actions. You can also include columns for local water bodies, and other information for the area around a facility. This will help you sort your data as you're doing a search.

Okay, I'm sorry. It appears our Internet is a little slow right now. I'm going to try one more time. Looks like we're having network problems. I'm going to try the search one more time. I'm doing a Water Search. Let's try a slightly different search that doesn't have as many records returned for right now as our Internet is a little slow. So, we're going to limit it to Indian Country, effective permit status, no violations, and no informal enforcement actions within three years. Let's see if that helps.

We're going to customize our columns again to DMR Loadings and Informal Enforcement Actions. Remember these columns will just help give you more information about a facility if you have a specific search that you're looking for, or if you're looking to make specific comparisons between facilities. So, I'm interested in the DMR loadings. So, we're going to sort that column. I'm going to scroll back over. I'm interested in the facility; it is the top polluter for DMR. Let's take a look.

In the Detailed Facility Report, we have a three-year compliance status summary and we can also see where the facility is. And just like before, we can see the facility characteristics, where it's located, the tribe information because it is in Indian Country, inspections that have occurred. There's something different up here I did not show you before: an Enforcement Case Report, Clean Water Act Pollutant Loading Report, and Effluent Charts. These are the different charts and reports to this specific facility. The Enforcement Case I'll do in another tutorial on. And now I just want to show you the Effluent Charts. It's just specific for the water, and this breaks down the pollutants. You can go and you can scroll through it and you can even click on the different pollutants and get a little more information.

So, through these different searches you're able to explore ECHO with as specific, as well as non-specific, questions as you would like. If you have a search for something that you want in particular, you can narrow your search down.

We have been reading your questions. Please continue to ask your questions. We're going to post another poll and then we'll move into the question and answer session.

[Poll Question: Which tools would you like more in depth trainings on?]

Great, thanks for the feedback. We are putting together summaries for the upcoming months and we'll definitely look into incorporating these tools.

Now, we're going to read your questions and answer them. If you continue to have questions, feel free to type them into the question box.

Eva, do we have any questions?

Yes, our first question is how often are the data updated?

The data is automatically updated from the different systems about weekly.

That's right. This is Rebecca Kane. I work with Jessie and we have a refresh every weekend that extracts the data from the national source systems for almost all of the data. As Jessie mentioned, there's some exceptions, like drinking water data is updated quarterly. And all of that information is on the ECHO About the Data page.

What is the data source for the population data?

All of the population demographic data comes from the U.S. Census and, again, that is documented. If you go to the ECHO Home page, and click on Resources, which is a green square towards the bottom right of the page, there's a link to the About the Data page that we've already mentioned a couple times. If you go to that page and scroll down a little bit to the data sources, there's a pretty extensive table of all the data we include and how often it's refreshed and it does explain a little bit of how we use the U.S. Census data.

Does the output of the facility search find only those facilities that have been inspected in the past five years or is it output all records in ICIS regardless of compliance and enforcement action?

So, the short answer is, the second part of that question, is yes. So, what we're looking at is all of the records from the national source systems that we pulled into ECHO, we look at all of the records and then filter them based on your search criteria.

When we find an error in a facility record, what can we do?

At the top of every ECHO page—top of the Detailed Facility Report, I apologize—there's a Report a Data Error button. You can report any error that you have.

And while we're looking through the other questions, I wanted to qualify my answer about the five years. While we do look at all facility records based on your search criteria, the data that we deploy on ECHO right now, on the Detailed Facility Report, will be limited to the actions that have taken place in the last five years, but your search itself is not necessarily limited by that.

Do we have other questions, Eva?

Yes. Can you search for specific facilities?

You can. So, in your ECHO search, under Explore Facilities, you can enter facility names in the search bar. You can also looks for types of facilities under Facility Characteristics. You can type in "agriculture," "forestry," and various types of facilities.

Is a login account required to access the demonstrated data?

Oh, definitely not. This site is available to the public and there's no need to log in.

Does EPA perform QA on the data as it's uploaded from source databases?

Yes. I don't know all of the details of this, but all of the source systems—all of the national EPA systems—have data quality checks and I don't know the details of those. In addition, I'm sure that the state systems have their own data quality procedures and then as well we have automated testing procedures when we pull the data. When we extract the data from the source system up to ECHO we also have automated test cases that we run every time. And if you'd like more details on how QA is done on the source systems, feel free to use the Contact Us link on the ECHO site and we will get more information to you.

How far back do the records in ECHO go?

The actual facility identification information is not limited by time, and you can search for facilities that have never been inspected, which is also not limited by time. We have fields on the search results that show when the last inspection or the last enforcement action was, no matter how long ago it was, but most of the data is for the past five years. So, the Detailed Facility Report will display information from the last five years and generally if you need more than that we have large data sets that can be downloaded from the site.

In regard to air reports, how long does it typically take for corrections to be made?

Well, that depends on the person who gets the report and then it depends on how busy they are, how difficult it is to research the answer, and then how quickly they get the correction to the database. The air notifications are routed to a data steward, either in an environmental agency or at EPA headquarters, depending on who's the owner of the data. That person has to look into the concern and then determine whether a correction has to made, whether a correction should be made, and then make the correction in the source system, and then after that's done ECHO will pick up the change in its next weekend refresh.

The majority of the time that a facility is in current violation, I am not able to obtain information as to what the violation is or other details. I end up having to call to try to talk with the investigator. Is there an easier way to determine the violation using ECHO?

This is a very, very common question that we get. Often times, unfortunately, the data that we show on the facility report, the Detailed Facility Report, is all that we have, just because of the amount of data that we ask the state environmental agencies and their local environmental agencies and our EPA regions, because of the volume of data that we ask them to report to the national database, we can't ask for every piece of data. So, we show the data that's required to be reported to us and sometimes, like for the Hazardous Waste Program, there will be a violation citation, but, often not a lot more information than that, and it varies by the other programs. So, often what you see in ECHO is all the information we have on the national level and then it takes a little bit more research to look at whether

the state agency has its own system online or if you need to call, like you said, call an investigator for more information. And you know, we always hope to improve the system and are looking for ways to do that, but in some cases we just don't have any more information. And I would like to ask Eva, who works for our support contractor and our Help desk. Do you have any other recommendations when you get that question on the Helpline?

No, that's typically what we recommend.

Okay, thank you.

We've had several questions about documents. The first is, is there a push to include copies of permits for permitted facilities? I see that some facilities have a link to documents and others do not.

Yes, that's a good question. That's also a common comment that we get as people like us to link to the actual documents and right now EPA doesn't have really a central place to store documents. We don't generally have a good way to do that. What we started doing on ECHO where you do see us link to permits is work with state agencies who already have their permits posted online and we link directly to those permits. And so, there's a couple states where we've done that already, so if you're interested in doing that. Any state agency that wants to do that, we're happy to do that, just to link straight from an ECHO facility report to those documents. But, as far as a national solution to link to all permit documents, that's something that people are almost always talking about here at EPA headquarters and hopefully we'll come up with something, but as of right now there's not any concrete plans.

There's also a question about linking to enforcement action documents.

Yeah, it would pretty much be the same answer. EPA headquarters does post its formal enforcement actions, like the actual consent decrees and announcements. So, often EPA cases are posted online, but as far as a comprehensive list of enforcement action documents, we don't have them. So, that would be along the same lines with looking for a national solution for that. And I think we do link from ECHO to— sorry I'm kind of trying to refresh my memory. I think we do link from ECHO over to that EPA page where they actually post the documents. Eva, can you think off the top of your head where we have that link?

Yes. We have a link to that in the Enforcement Case Search Help.

Thank you. So that's a little bit hard to find. We may need to bring that link up. If you click on the ECHO Home page on the little yellow Help square, there is an Enforcement Case Search Help about in the middle of that list and on there, under EPA resources on the right-hand side of the page, we link to some places where we do post some of the settlement documents, for EPA cases.

Is there an indicator as to whether a facility is closed?

Yes. On the Detailed Facility Report in the second section of the report, there is Facility Characteristics section. And I think Jessie's trying to find it. It doesn't look like you have a facility report open. So, anyway in the second section is the Facility Characteristics section will list each program that the facility is regulated under and then whether what the status is as far as we know whether it's operating, closed, whatever status information we have. So, yes, that's on the Detailed Facility Report.

Can I view all facilities in one state?

Yes, you can. In your facility search, you can limit it to a state. You can then continue to limit it to a type of facility that you want and any sort of watershed. Some of those, if you only put in a state, some of the result sets are pretty large, but they will eventually come up even for the states with the most facilities.

Okay, it looks like for the one I just did, the results are too high.

So, if you just do a single state, or sometimes it helps to at least have a type of facility so that it's not as large of a data set and you can see all the records returned. There is a limit on how many facilities can be returned in a search.

The limit right now is 75,000 and so anything under that should come up.

Do we have more questions?

Does ECHO include data reported by states?

Yes. State and local environmental agencies will report enforcement and compliance information up to the national--the EPA national systems of record--and then we extract that data into ECHO.

How can I download data into Excel?

When you do a facility search, any facility search, and you get the search results page, you will see an option to download the data. It's right above the data table. It'll say "Download." Depending on how large your data set is, if it's up to 10,000 facilities, you have a choice to download it straight into Excel. If it's more than 10,000 facilities then it goes into a .csv file, which is just a comma separated value file, it's just a file of data that can—that Excel will open. On your facility search results page just look for those download options right above the data table, right below the map.

Are there enhancements and improvements planned for ECHO?

We're always trying to enhance the site. So, we don't have any huge features coming out, but just a long wish list of minor enhancements and improvements we'd like to make and we're trying to prioritize that based on what users most need. So, if you have ideas or opinions on what you'd like to see ECHO do, or improvements or changes, please use the Contact Us link on all of the ECHO pages toward the top right and just let us know and that would help us enhance the site.

On the Search Results page, there's a world map provided. Can we look at locations outside the U.S.?

No. The reason that there's a world map is because we do show the facilities that are in the U.S. territories. So, if you do a nationwide search, you would get, for example, you get facilities in Guam. So, that's why initially you'll see a world map that ECHO only has facilities that are regulated by the United States.

Does the Air Facility Search include Clean Air Act section 112R violations, RMP violations?

The short answer is no. You can, where we do have 112R, or RMP is Risk Management Plans, that would be in the Detailed Facility Reports, which will say whether a facility is regulated under that program and then you can search for facilities that may have a--that are regulated under that program, but there is no data on violation. In the Enforcement Case Search that we did not demonstrate this time, if EPA took any enforcement actions under that program, then we would have enforcement actions there. And

some cases there would be details on why there is an action taken, like what kind of violations there were, but in general, we don't have straight violation data for that program.

Eva, before you ask another question, I want to backtrack on whether there's any enhancements planned. I kind of forgot about something. We have been working to make some enhancements to the way that Search Results page works to allow for some filtering right on the screen and to add some map layers. That's kind of in the works and hasn't been fully tested in demos internally, so, we're not ready to show that. But, before we make any changes we've been doing some outreach to users outside of EPA, publicly, and in state environmental agencies before we make any changes. So, there will be information about that on the site hopefully in the summer.

A few questions regarding the search results: Do you get a notice if there are no facilities meeting your search criteria?

Yes, you will. It'll say if there's too many facilities. It'll say if there's no facilities. I am trying to keep my computer from freezing right now, I apologize. But, it'll tell you how many facilities are in a search result, including zero. And so then you can click Modify Search and you can alter your search a little bit to see where a facility might be.

In regards specifically to hazardous waste, are the results of state RCRA hazardous waste inspections included in ECHO or only inspections conducted by U.S. EPA?

The inspections by the state agencies also are included.

Does ECHO show HPV, High Priority Violation, status?

Yes.

Can you see it for all facilities in a specific region?

Yes. "High priority violation" is a term used by the Clean Air Act stationary source program. So, if you did, Jessie, I think was demoing some water searches. If you did an air search for an EPA region, then you would see the status of all the facilities in that region and whether they're indicated to be in high priority violation or not.

Are all the data in ECHO facility-based?

Mostly. That's kind of the meat of our data is the facility-based information and that's what Jessie was showing for all these different facility searches. The exception to that is we have dashboards that are like a rolled up look of activity by states and EPA regions. So, that's one exception would be the state dashboards which I think we'll talk about in the next demo.

Yes, we'll be talking about the dashboards and what those show us on May 17th. To answer the HPV, I'm in the air search, I selected a region randomly, if you're in a region you'll probably select the region you're looking for, and you can then go under Enforcement and Compliance, select recent violations and you can put the restriction on that it has HPV. Click "Search" and there we go. And also, just to go back to the download in the search, you see the Download Excel File and the Download the CSV File buttons. And this will also show you the search results, there's twelve search results. If this result rendered no facilities, it would say zero.

Is there a lag time between the time the inspections or enforcements are conducted in the field and when it gets uploaded and pulled into ECHO?

Yes. The lag time varies. It just requires the person responsible for entering the data to get down, get to their computer and enter that data into the state system. Or some state agencies and local agencies enter it directly into the national system of record and some of them enter it into a state system. If they enter it into the state or local system then it might take some time to get pushed up to the national system and then it would be up to a week after that before it gets into ECHO. It really varies, but it's usually not a huge amount of time.

What is an informal enforcement action?

There's a lot of terminology we throw out there and a lot of these questions are answered in various places on ECHO. One place you can go without getting too bored is if you click on the little yellow Help square on the Home page and click the third link down, ECHO Tutorials. There are some short YouTube videos about using ECHO that gets into terminology and also it'd be a reminder of the demos that Jessie did without spending a bunch of time reading stuff. And then we also have from the Home page, Help. We have a Frequently Asked Questions document, let me look under Resources. Under the green Resources tab about in the middle, there's a Frequently Asked Questions page that gets into—explains —some of the terminology. But to answer the specific question about informal enforcement actions, that varies a little bit based on the programs. In general, it's a notice to a facility that an enforcement proceeding may occur if the violation is not quickly resolved. It's usually a notice that an inspector found an alleged violation.

We have a question about the upcoming webinar. What time is the May 17th session and where can they find information about this upcoming session?

A link to the upcoming session can be found under Training on the echo.epa.gov section. It will be on May 17th at 1:30 PM Eastern.

And the link has not been posted yet. It will be posted this afternoon. So, if you go to the Training site, you'll see a webinar link. We are looking to put together other more detailed webinars for each tool. I can see people are looking for a Water Tool webinar and a RCRA Tool. So, we'll put those together over the course of the summer and try to get those out to everybody. Another way to stay tuned to the webinars and any sort of tool development that we're putting out or training tips is to sign up for the listserv. There is a link on this page right now. I'll leave this up for a little bit and you can also access it on the ECHO Home page including links to all of the Frequently Asked Questions, Tutorials, and the Contact Us.

I think that's it for today. If we didn't answer your question on the webinar, we have it and we will email you an answer as soon as we can. And otherwise, thank you for joining us today and I'll see you on the next webinar!