Managing Your INR as an IE/RE in RIOO Interconnection Services

Version 12.31.21

ERCOT RIOO Interconnection Services Release Notes

December 17, 2021

ERCOT has released a new version of Resource Integration and Ongoing Operations - Interconnection Services (RIOO - IS) that enables companies to propose a new electricity generation resource to interconnect to the Texas power grid.

Representing a company, an Interconnecting Entity (IE) or Resource Entity (RE) uses the RIOO - IS app to create and manage a generation interconnection request (INR) online. The ERCOT Integration Team reviews the information submitted in the INR and conducts studies, along with the Transmission or Distribution Service Provider who owns the power lines in the area, to understand the effect the resource may have on the grid and determine the economic feasibility of the project.

About This Guide

This guide provides information and instructions for performing the tasks online in RIOO - IS to manage an INR project submitted by an IE/RE, including attaching documents, adding change requests, and deleting or cancelling the INR project.

For information about changing your phone number or multifactor authentication method selected during signup, refer to *Managing Your RIOO Services User Account*.

Updates in this Guide

This guide was created from the former *RIOO Interconnection Services IE User Guide* and includes the following updates:

- The process for selling your INR project to another IE or RE has been updated/
- Sections about viewing your RIOO - IS account settings and changing your password as well as changing your multifactor login app have been moved to *Managing Your RIOO Services User Account* (available from the *Resource Integration* page on the ercot.com website).

Supporting Documentation

Other RIOO – IS user documentation for IEs and REs available from the *Resource Integration* page of the ercot.com website includes:

- *Signing Up for an IE RIOO Services User Account*
- *Signing Up for an RE RIOO Services User Account*
- *Managing Your RIOO Services User Account*
- *Creating an INR for a Generation Resource Under 10MW*
- *Creating an INR for a Generation Resource Over 10MW*

Documentation is also available for TSPs/DSPs on the *Resource Integration* page of the ERCOT website (ercot.com).

Also available on the *Resource Integration* page, the *Interconnection Handbook* contains conceptual information about modeling your resource and the energization and synchronization process that occurs after your INR has been accepted

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Managing Your INR

Managing your INR involves corresponding with ERCOT about any questions or revisions they have and updating information in your INR, including make changes to the project name, megawatt output, and milestone dates for interconnecting to the grid as well as attaching documents, adding permits, and confirming the fulfillment of Nodal Protocol requirements.

You submit changes using change requests. The ERCOT planning and integration team and the transmission or distribution service provider assigned to your INR project review your change requests and accept the change or offer comments.

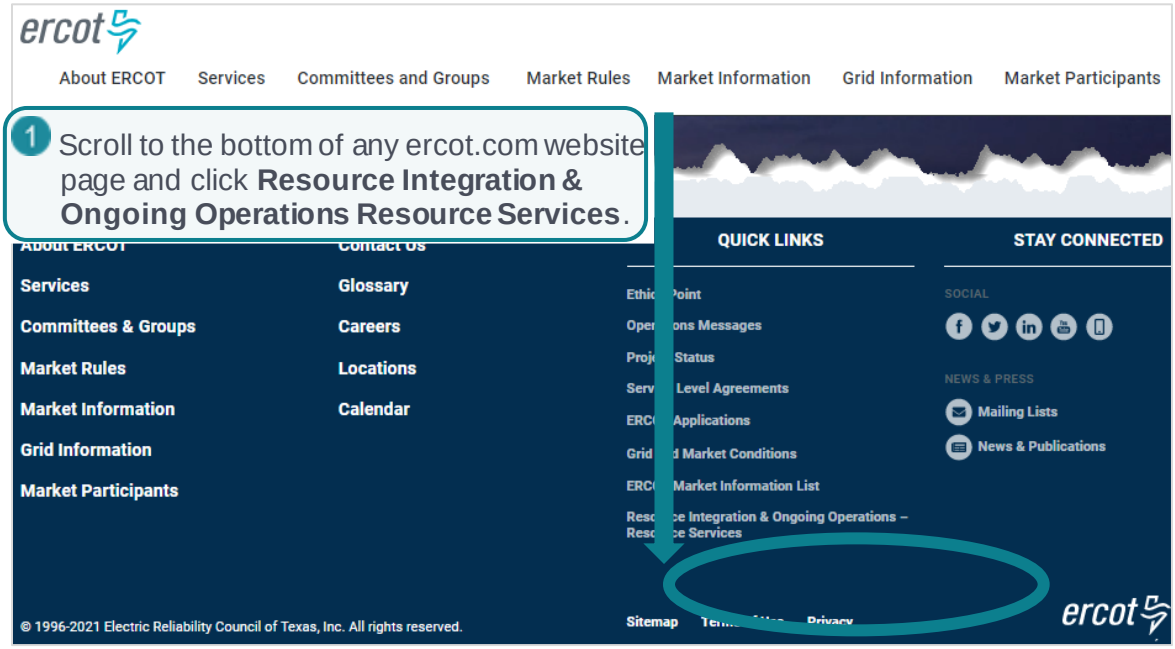
If you are an IE, you can also manage your project contacts to add new backups who can work on the INR with you or contacts who can view the INR to offer suggestions to you, delete contacts, and manage their email address information.

Managing an INR project may also involve selling the project to another IE or RE. You can also delete an INR before submitting it or cancel a submitted INR.

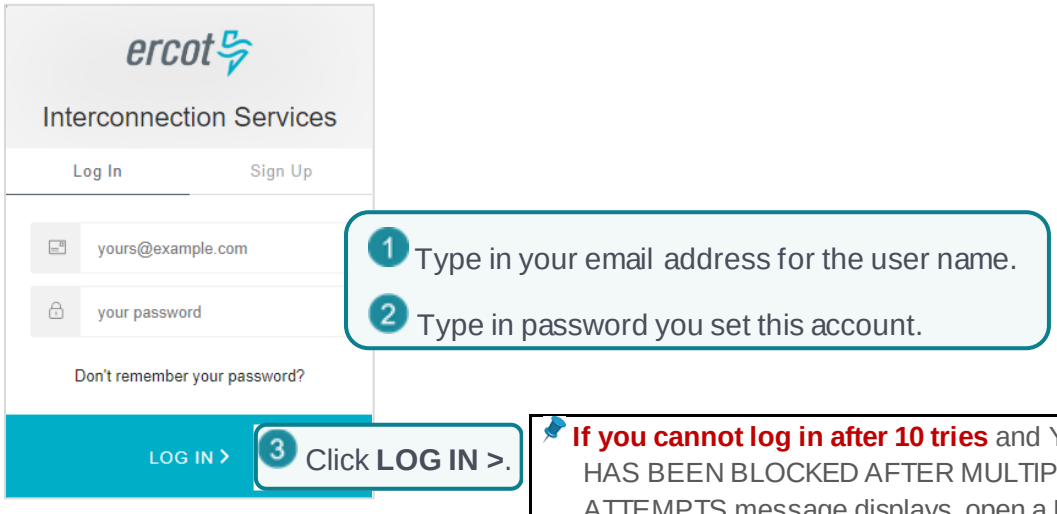
Accessing RIOO - IS

After clicking the **Resource Integration & Ongoing Operations** link (in the Quick Links section) at the bottom of any ercot.com website page, you must log in to your RIOO - IS account and select the **Interconnection Services** option, which displays your Interconnection Request List dashboard.

Access the RIOO App from the ERCOT Website

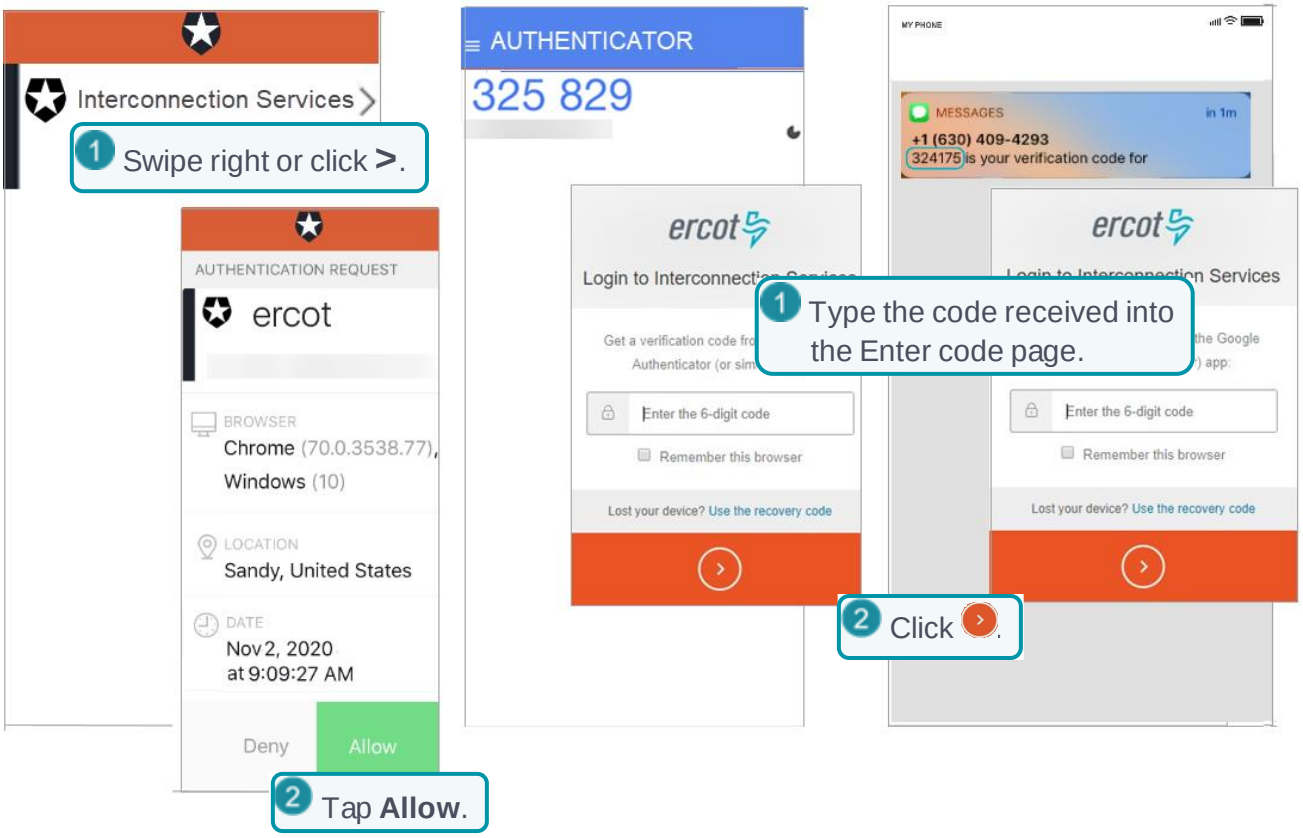


Log Into Your RIOO-IS Account

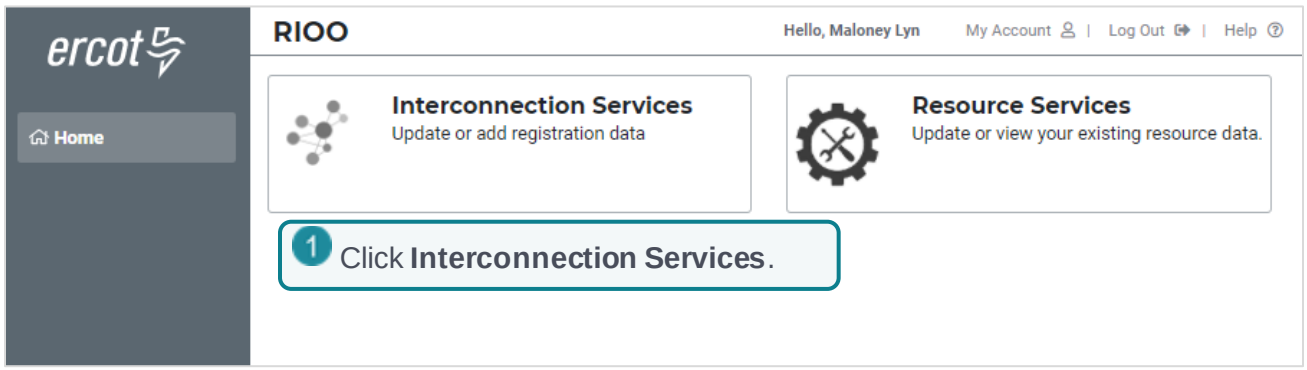


If you cannot log in after 10 tries and YOUR ACCOUNT HAS BEEN BLOCKED AFTER MULTIPLE LOGIN ATTEMPTS message displays, open a Help Desk ticket that tells them you are blocked by your MFA and that Operations should unblock your ID.

Verify Your Login On Your Smart Phone



Select Interconnection Services



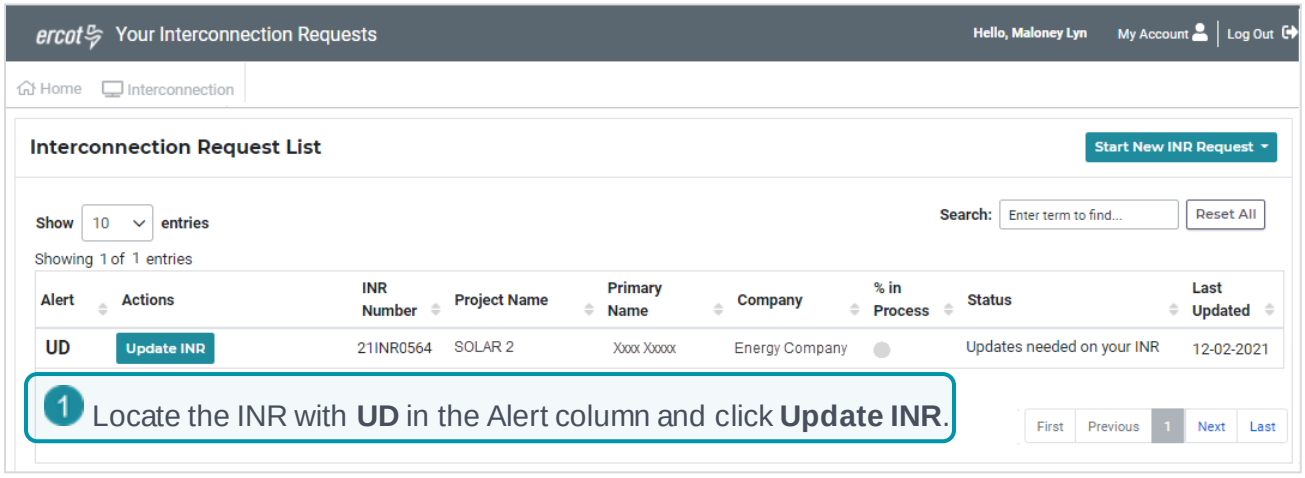
Corresponding with ERCOT About Your INR

After receiving your submitted INR and payment, ERCOT has 10 days to review the INR to be sure all fields are complete and contain the required information. If any questions or issues arise, ERCOT sends you an email about needing input and places the UD (Update) alert in your Interconnection Request List along with the Update INR button to respond.

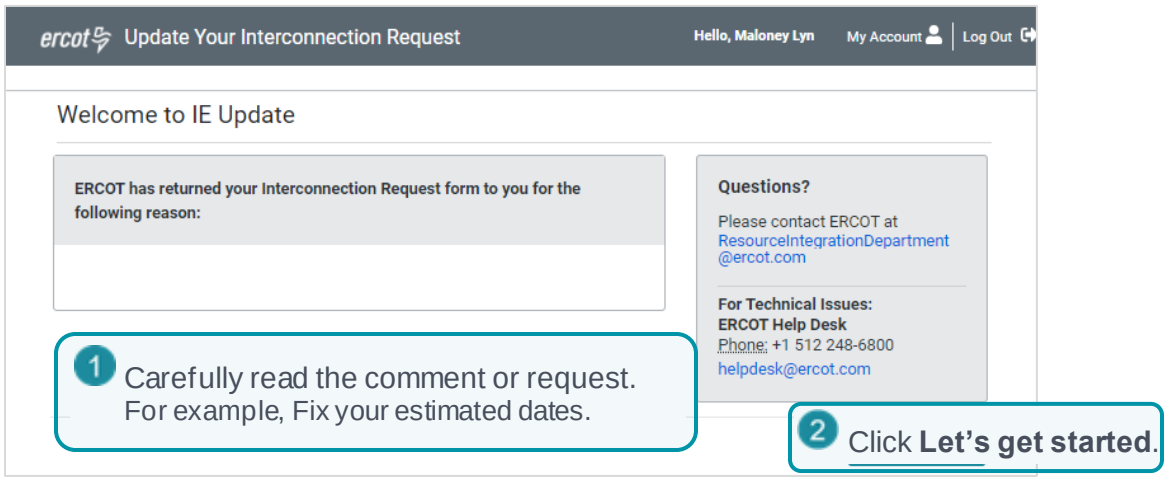
To modify details or add new information from this point forward, you must submit change requests to the INR. For more information about change requests, refer to page 8.

To stop ERCOT from processing your request at this point, you can cancel the INR from the View Interconnection Request Page. If you have not submitted the INR yet, you can delete it (refer to *Deleting an Unfinished INR* on page 61.

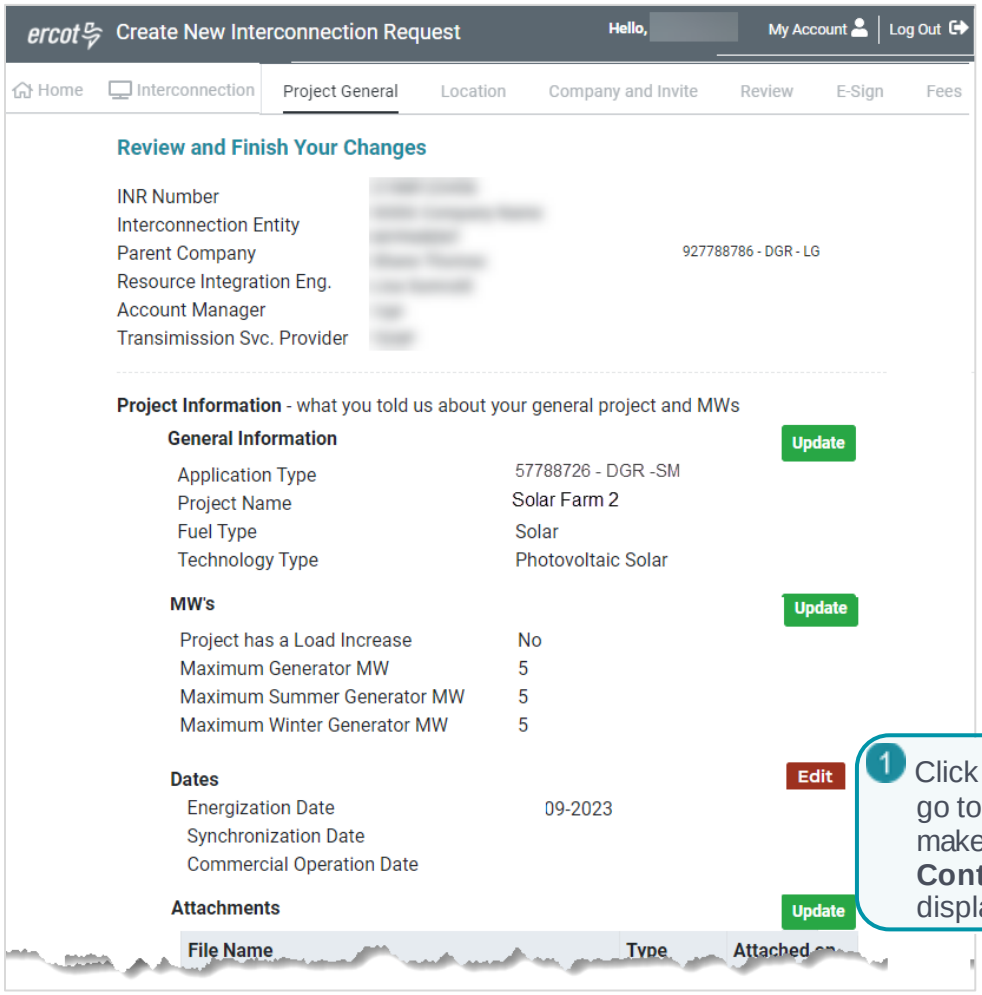
Check Interconnection List for Update



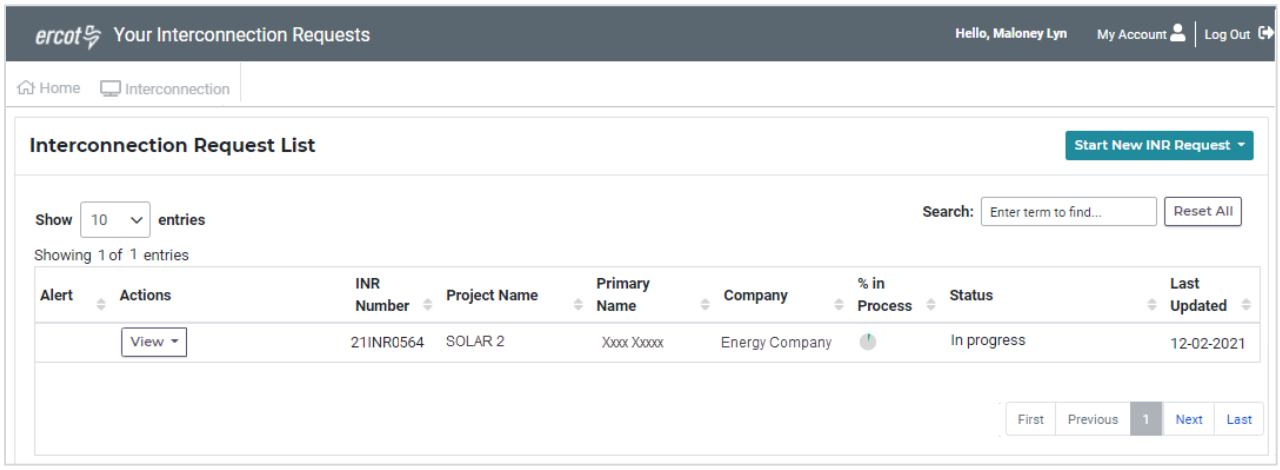
Read the Information/Comments in the Update Panel



Edit the Appropriate Changes



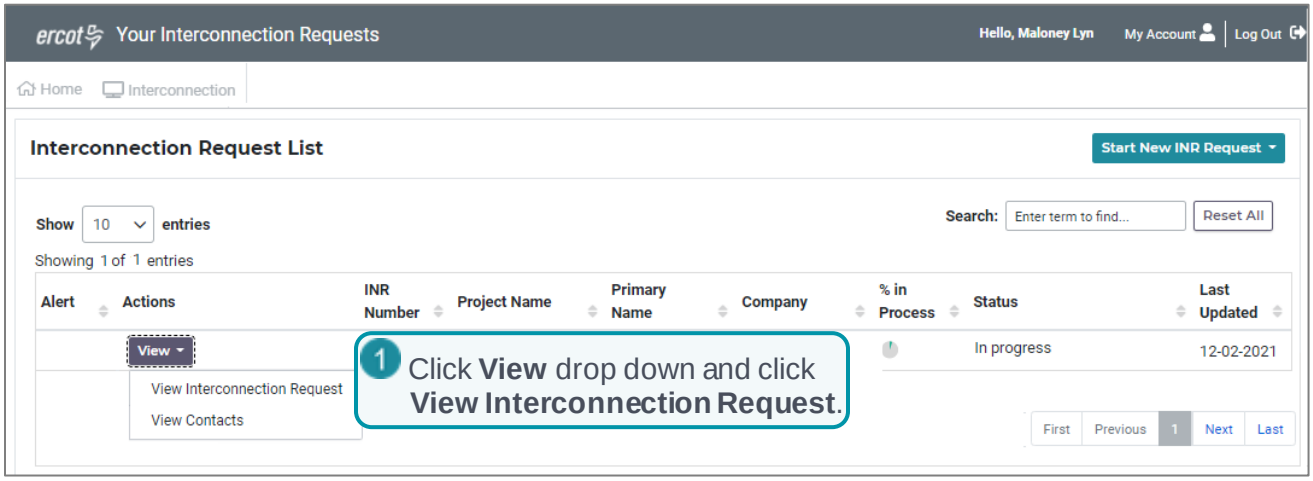
The Interconnection Request List displays and the UD is cleared.



Viewing Your Submitted INR

You can view the details and project information you submitted

View Your INR from the Interconnection Request List



View the INR

ercot Your Interconnection Requests Hello, My Account | Log Out

Home | Interconnection | Review

View Interconnection Request

INR Number	23INR0455
Interconnection Entity	XXXX XXXX
Parent Company	XXXXXXXX
Resource Integration Eng.	XXXX XXXX
Account Manager	XXXX XXXX
Transimission Svc. Provider	XXXX XXXX

Project Information - what you told us about your general project and MWs

General Information

Application Type	0788904743000 - DGR - SM
Project Name	Solar Farm 2
Fuel Type	Solar
Technology Type	Photovoltaic Solar

MW's

Project has a Load Increase	No
Maximum Generator MW	6
Maximum Summer Generator MW	6
Maximum Winter Generator MW	6

Dates

Energization Date	10-22-2022
Synchronization Date	11-11-2022
Commercial Operation Date	03-11-2023

Attachments

File Name	Type	Attached on
onelinediagram.png	One-line	12-01-2021
08D-110116Lonestar Attestation.docx	Other	12-01-2021
ElectronicSignature.pdf	Electronic Signature	12-02-2021

Project Location - what you told us about your general project and MWs

Location

County	Williamson
Latitude	30.568341
Longitude	-97.783148
POIB - Point of Interconnection Bus	Airport Rd
POI kV	48

Map

Company & Invites - who will be working with us on your project

Company

Type of Company	OTH
Interconnecting Entity Name	XXXX XXXX
Parent or Holding Company Name	

Cancel INR Print Form

Understanding the Change Request Process

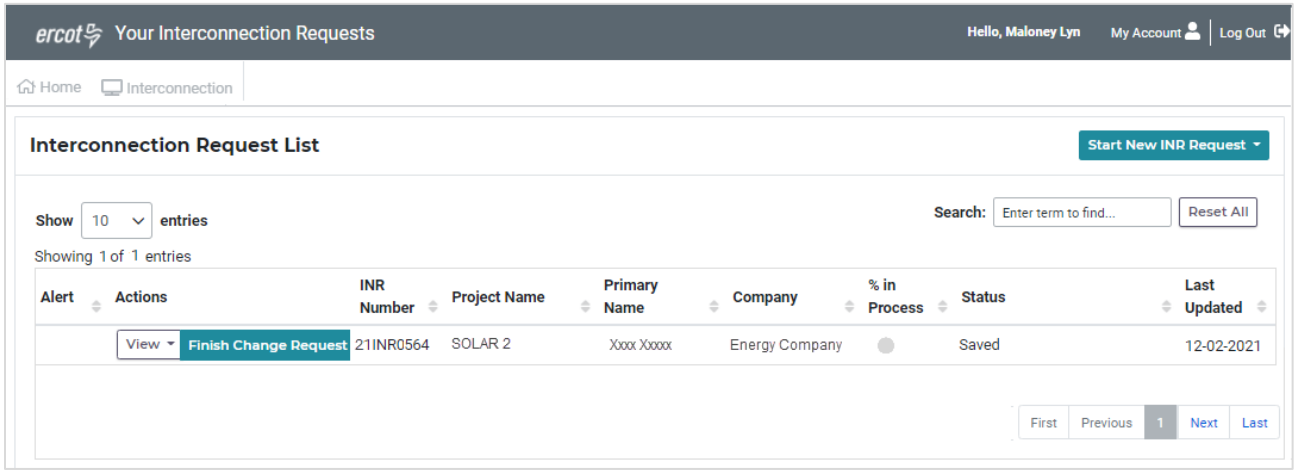
To update information in your INR, you must add a change request to the original INR in your Interconnection Requests List. The types of changes are grouped in three main categories.

When you select one of the 3 main category buttons, a green checkmark displays to confirm your selection and the page expands to display the options available in that category. You can select as many choices under an category as you need. Each selection is confirmed with a checkmark. Select:

- **Update My INR** to:
    - Modify the project details (project name, MWs, Energization, Synchronization, Commercial Operations dates)
    - Upload and attach new documents to this INR
    - Add air or greenhouse gas permits and the adequate water declaration
- **Add Confirmations** to electronically sign and confirm that your resource has met various required Nodal Protocol requirements (as outlined in your Planning Guide).
- **Other Changes** to sell your project

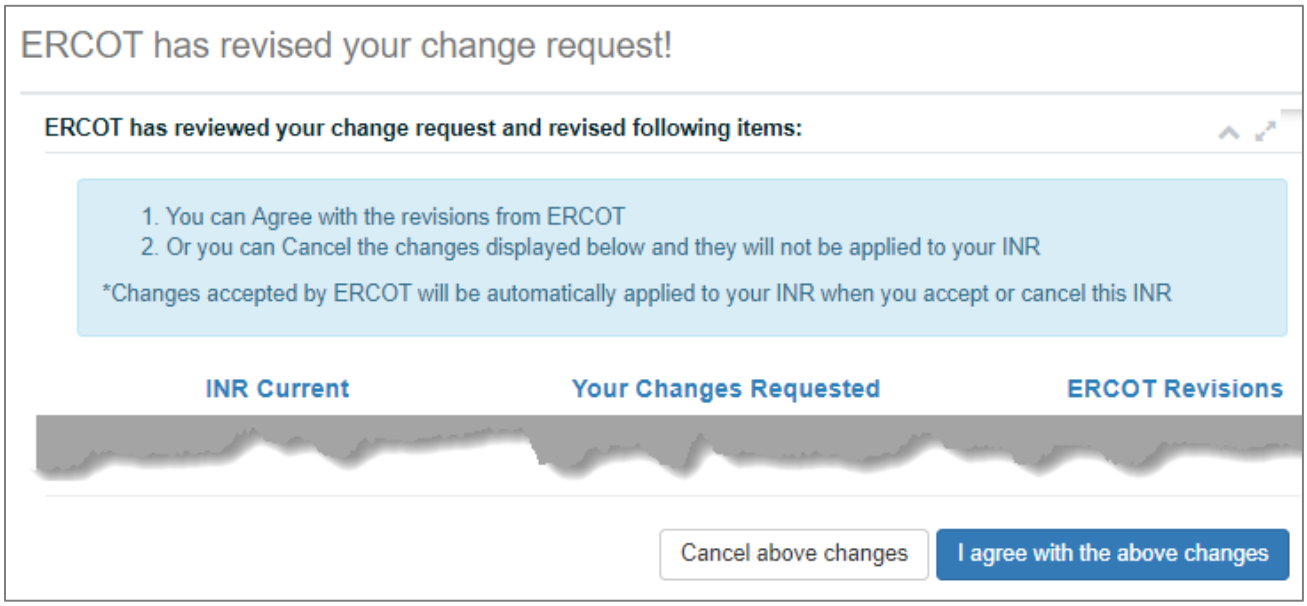
The change request navigation guides you through each process by displaying web pages with information you must complete and a review page that displays with any areas needing updates before you can submit your change request.

If you start a change request but leave it to answer questions or find materials, the system saves it and you can finish it later.



If ERCOT has questions about your change request, the 💬 (comment bubble) displays in the Alerts column of your Interconnection Request List along with the **Respond to ERCOT** button.

You can click the **Respond to ERCOT** button to read the revision and further instructions.

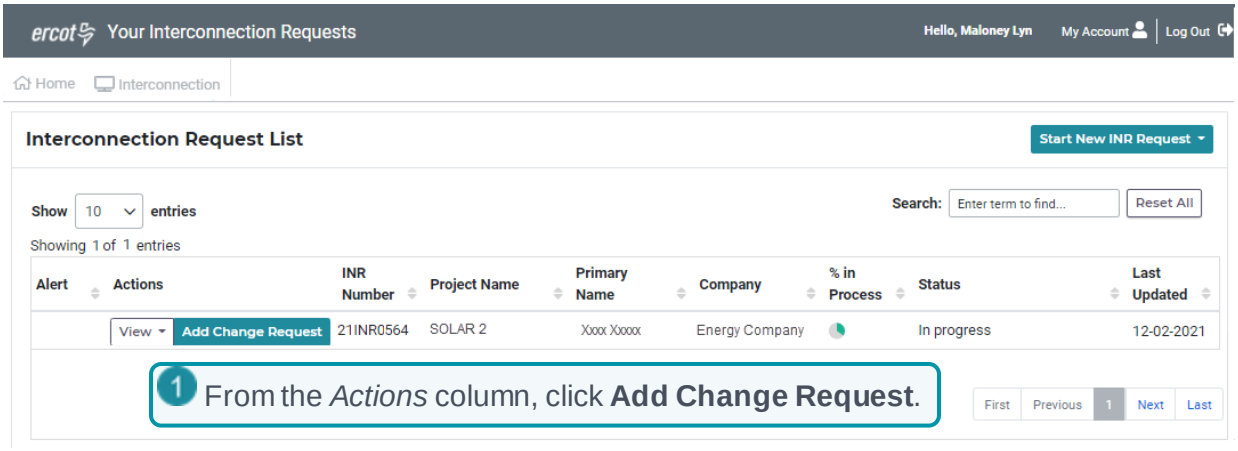


You can click I agree with the above changes to accept the changes into your INR. Or, if you want additional feedback or want to respond to the suggested changes, click the **Cancel above changes** button and the requested change will not be added to your INR.

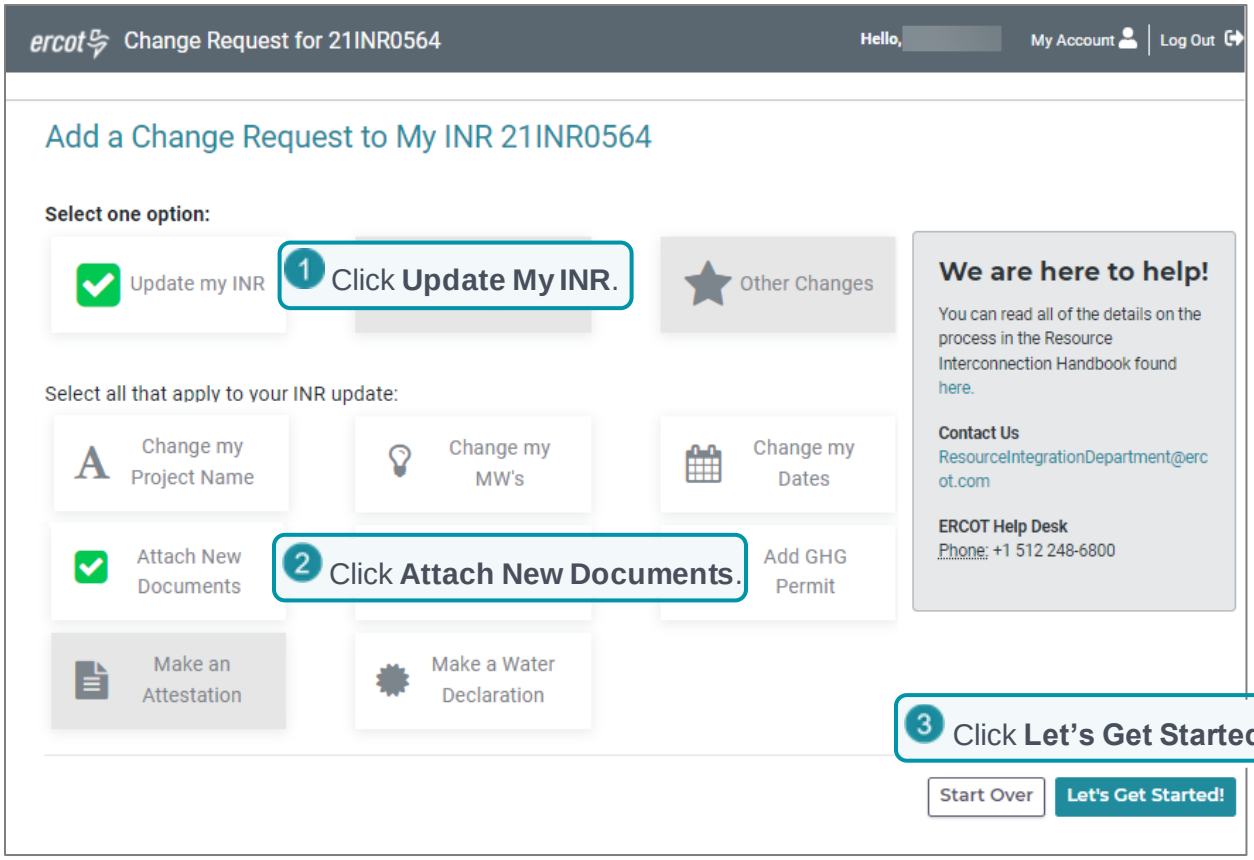
Attaching Documents to the INR

When you created your INR, you were required to upload certain documents. You can upload modified versions of the documents plus any other documents required for your project.

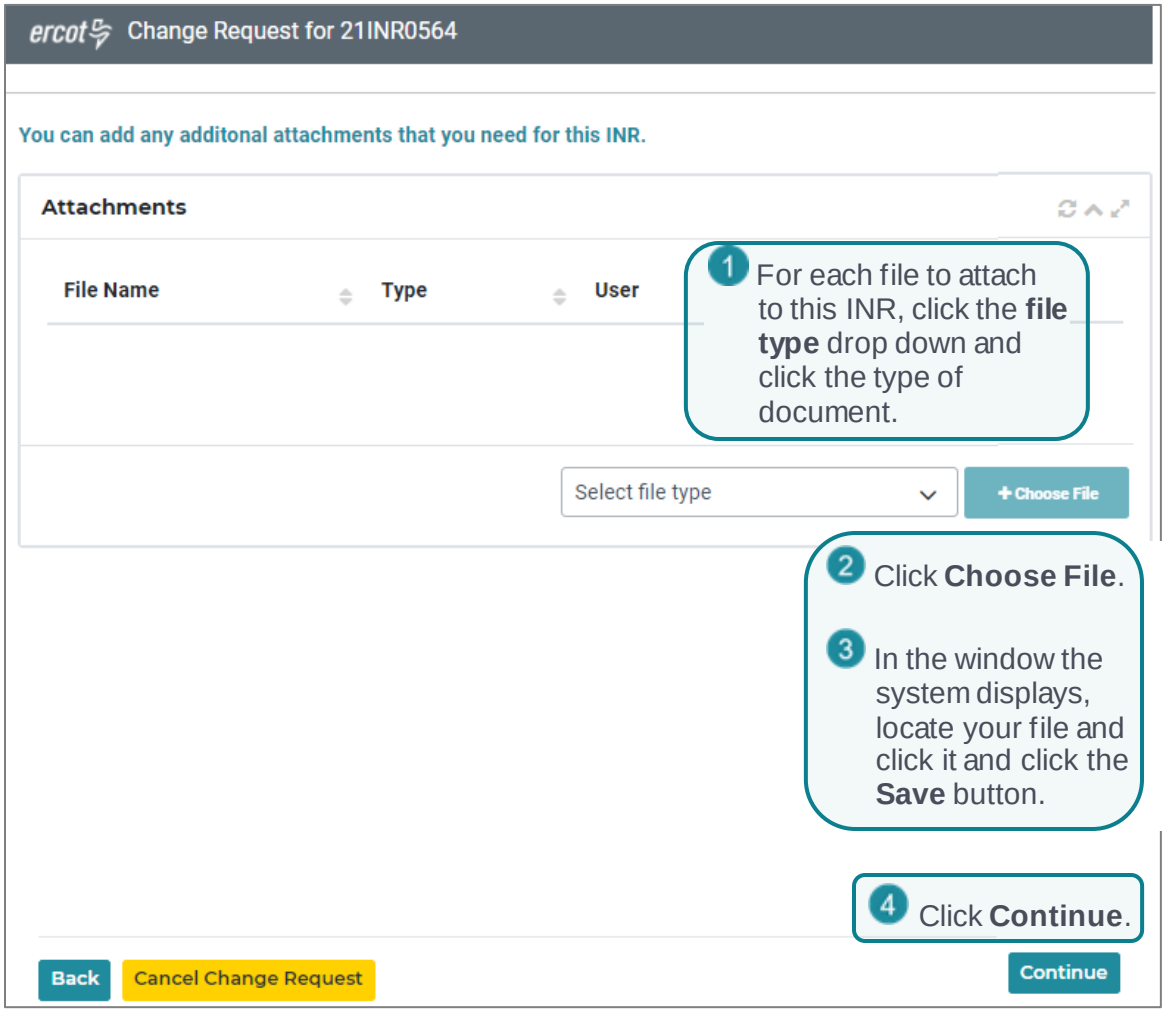
Add a Change Request from the Interconnection Requests List Page



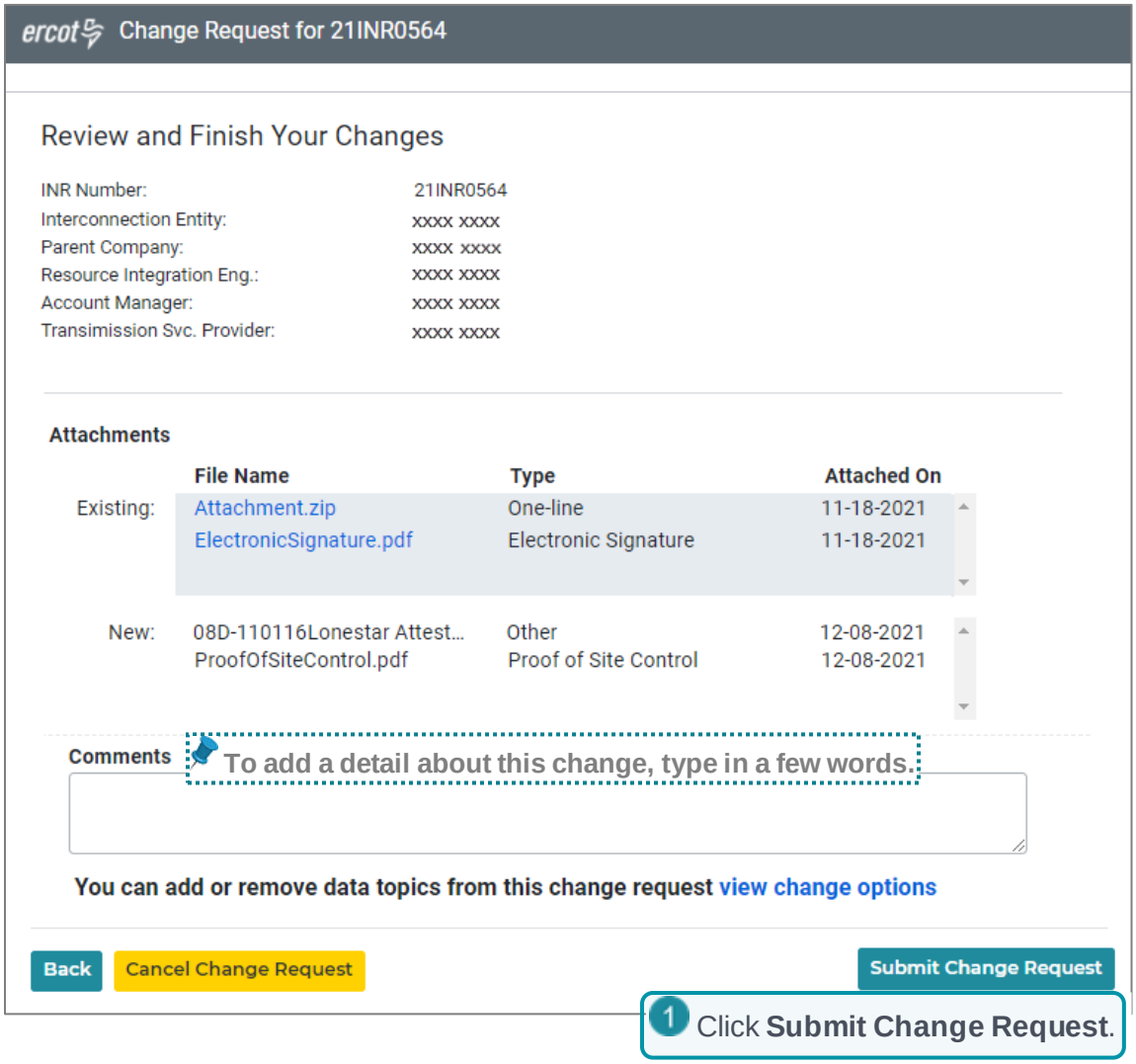
Select the Type of Change Request



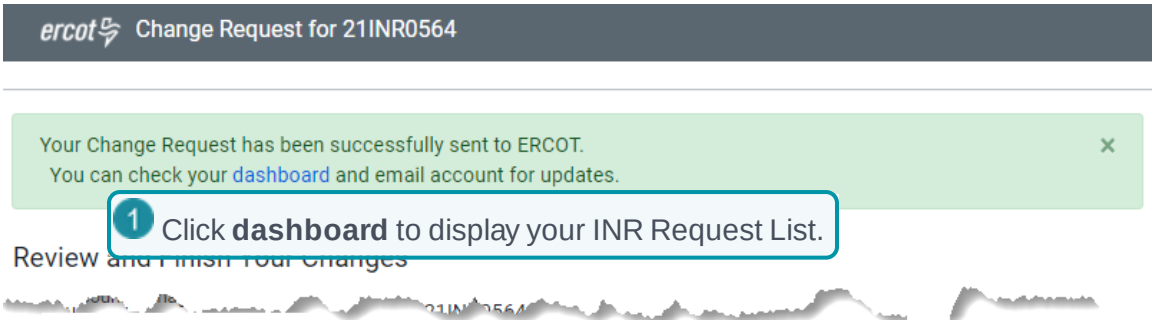
Attach Each File



Submit Your Change Request

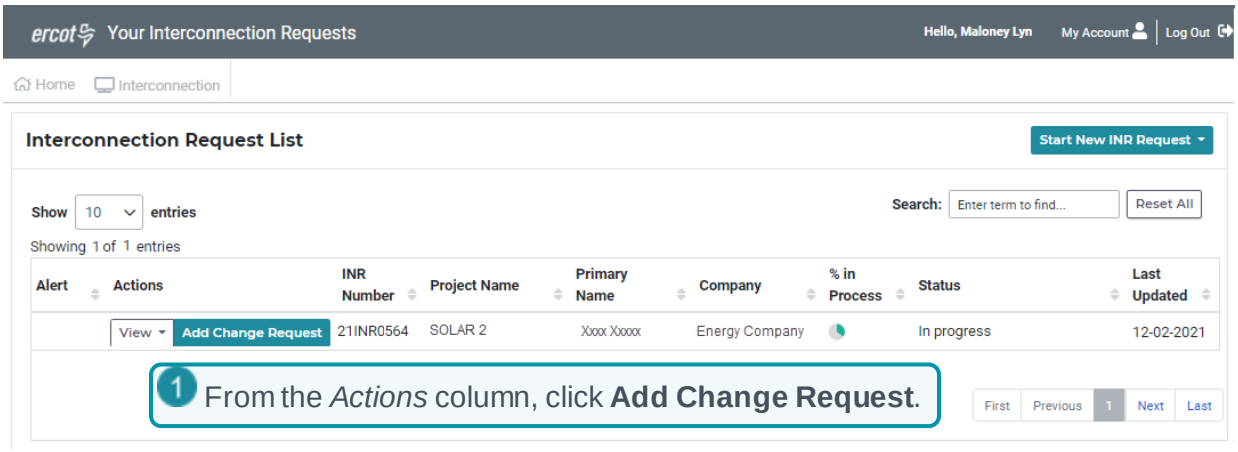


Change Request Successfully Sent Message

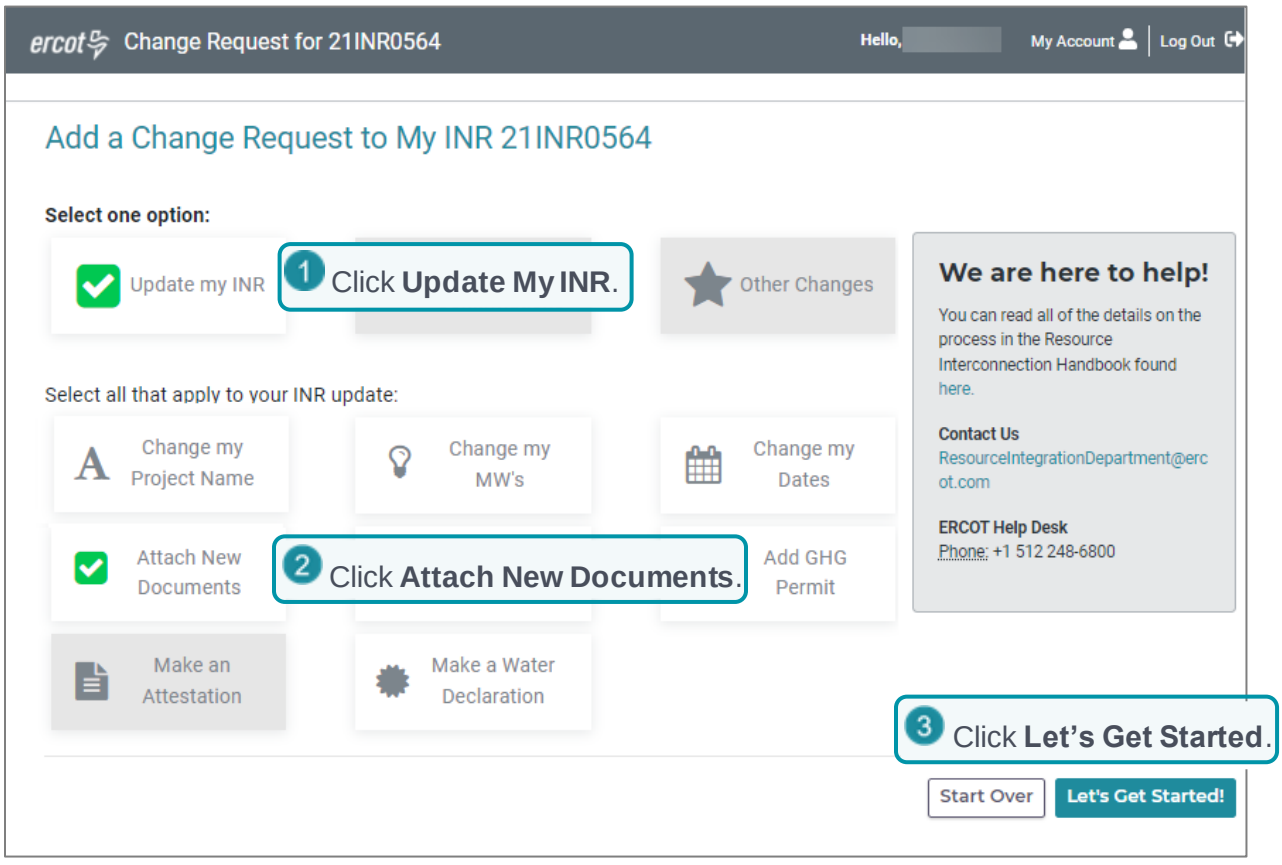


Uploading Your Resource Asset Registration Form (RARF)

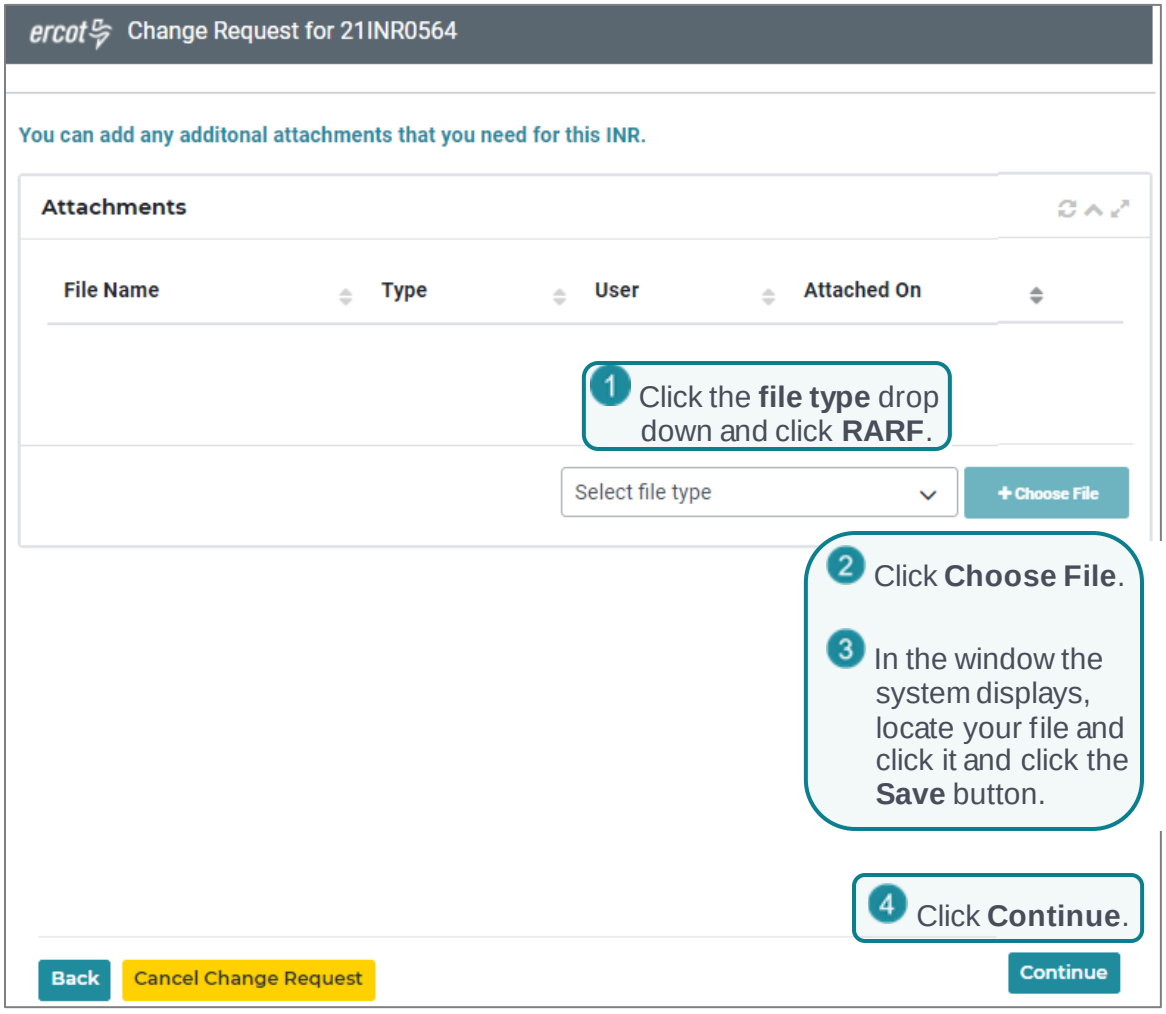
Add the Change Request from the Interconnection Requests List Page



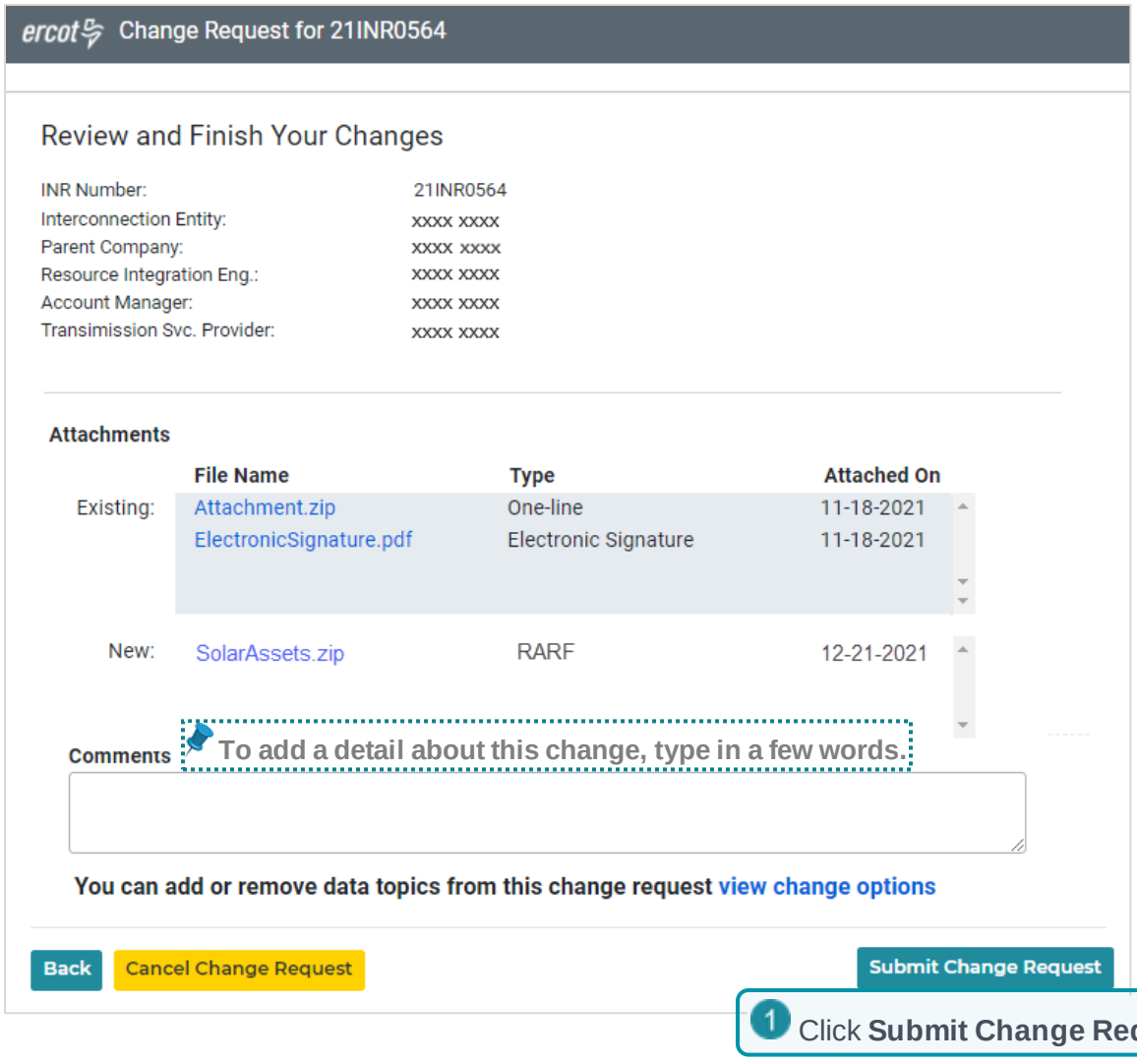
Select the Type of Change Request



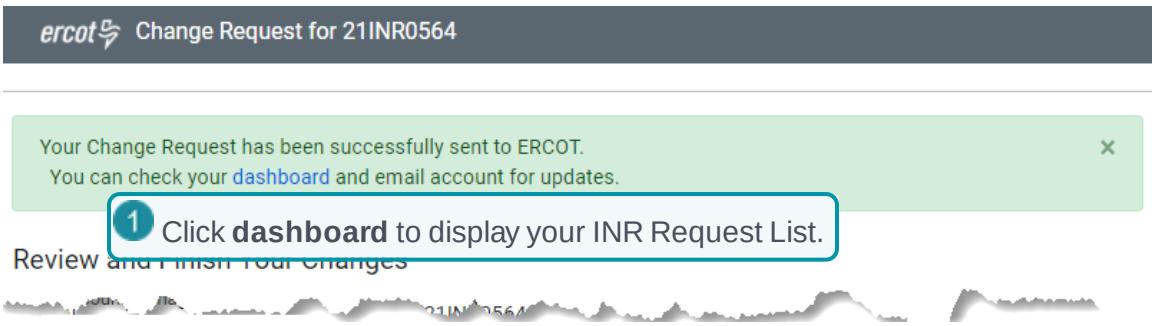
Attach and Upload Your RARF



Submit Your Change Request



Change Request Successfully Sent Message



Updating Your INR Details

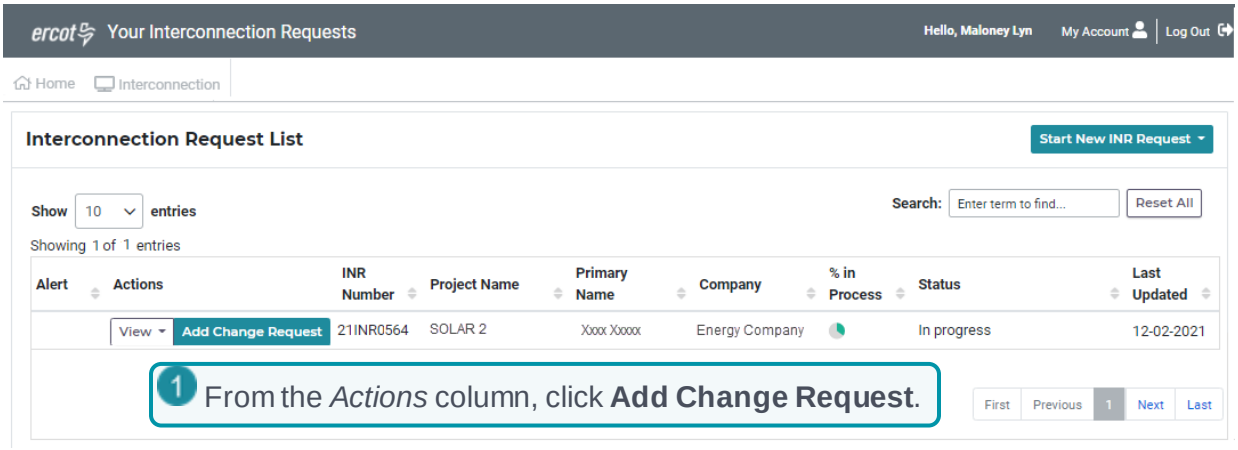
You can update your INR to:

- Change the name of project or fix a typographical error. Remember that project names must be unique across ERCOT.
- Change the number of megawatts (MWs) you originally entered by up to 20% of the amount originally entered and the summer or winter MWs cannot exceed 20% of the original value or the overall MWs. If this INR is for a resource less than 10MWs, you cannot exceed the 10MW value or you must cancel this INR and start a new one for a large resource.
- Change a milestone date for the resource energization, synchronization with the grid, or operating in the market (COD) or add a date if not entered in the original INR. Note that the Energization date must be at least 130 days before the Commercial Operations Date and 10 days before the Synchronization date, which must be . The Synchronization date must be at least 10 days after the Energization date and 120 days before the COD.

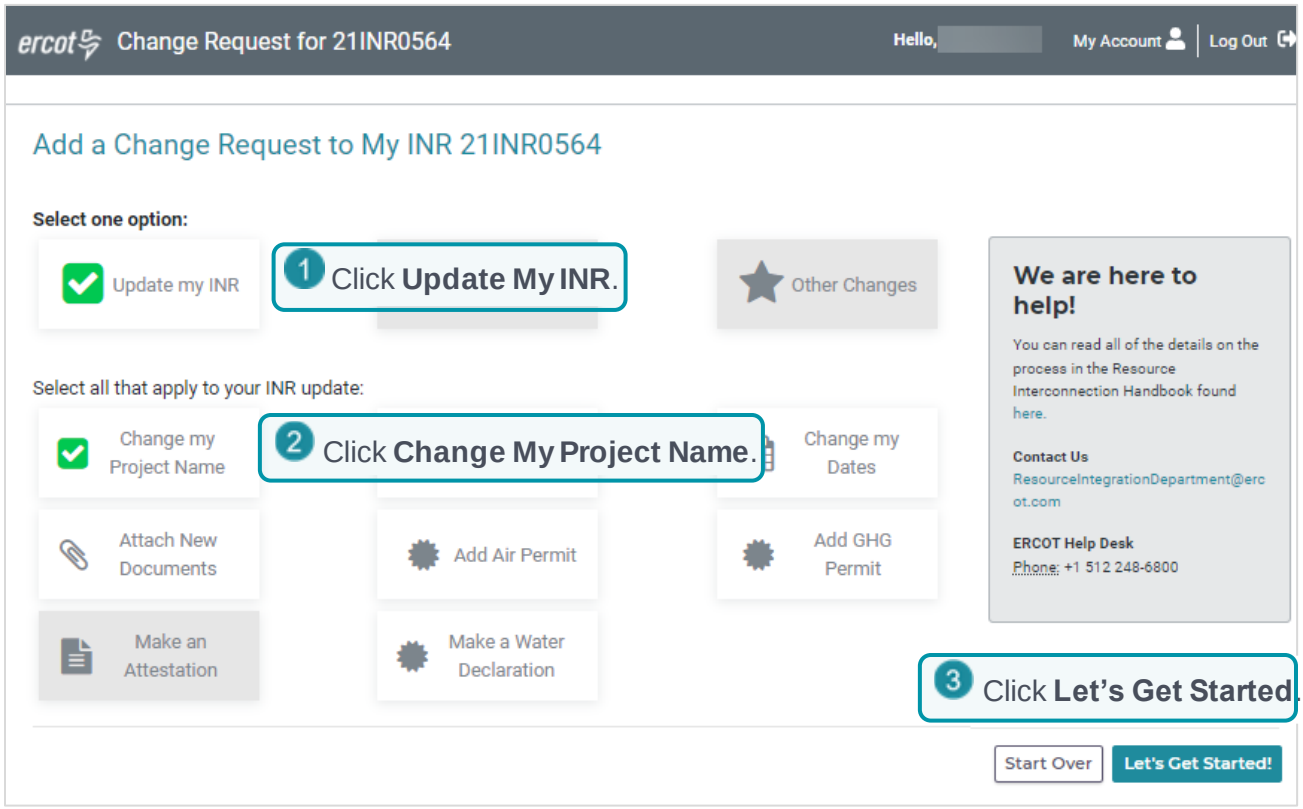
Changing the Project Name

You can add a change request to modify or change the name of your project. Remember that project names must be unique across ERCOT.

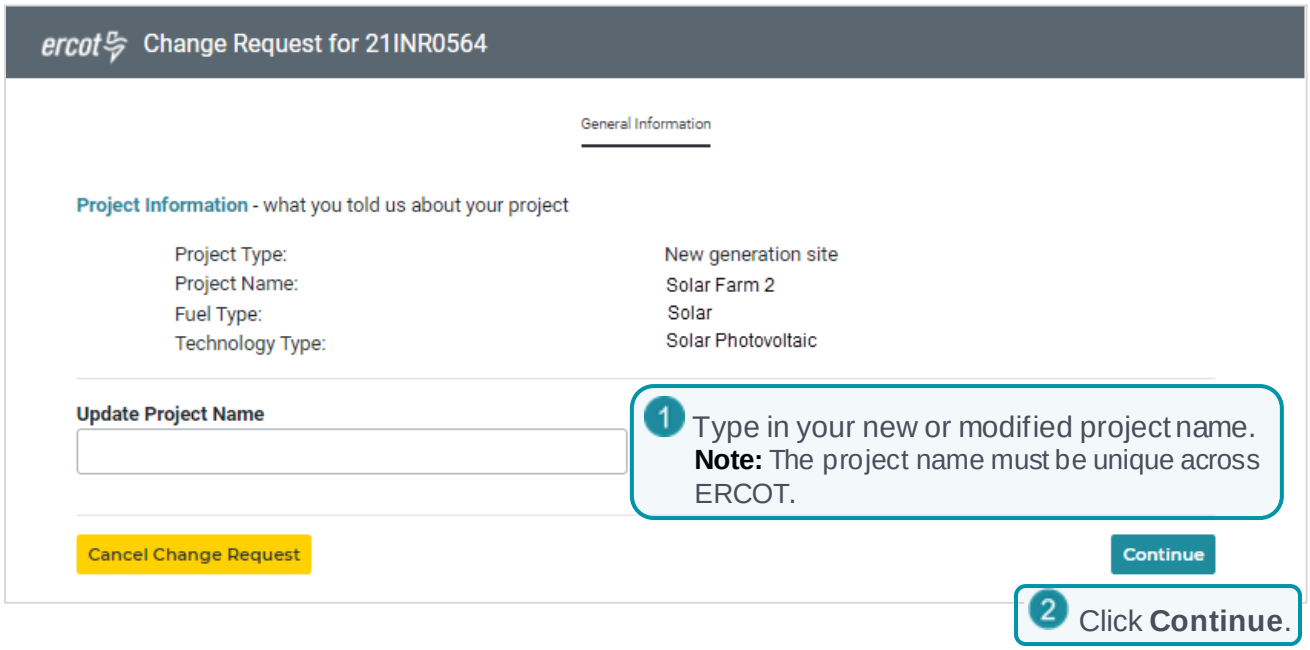
Add a Change Request from the Interconnection Requests List Page



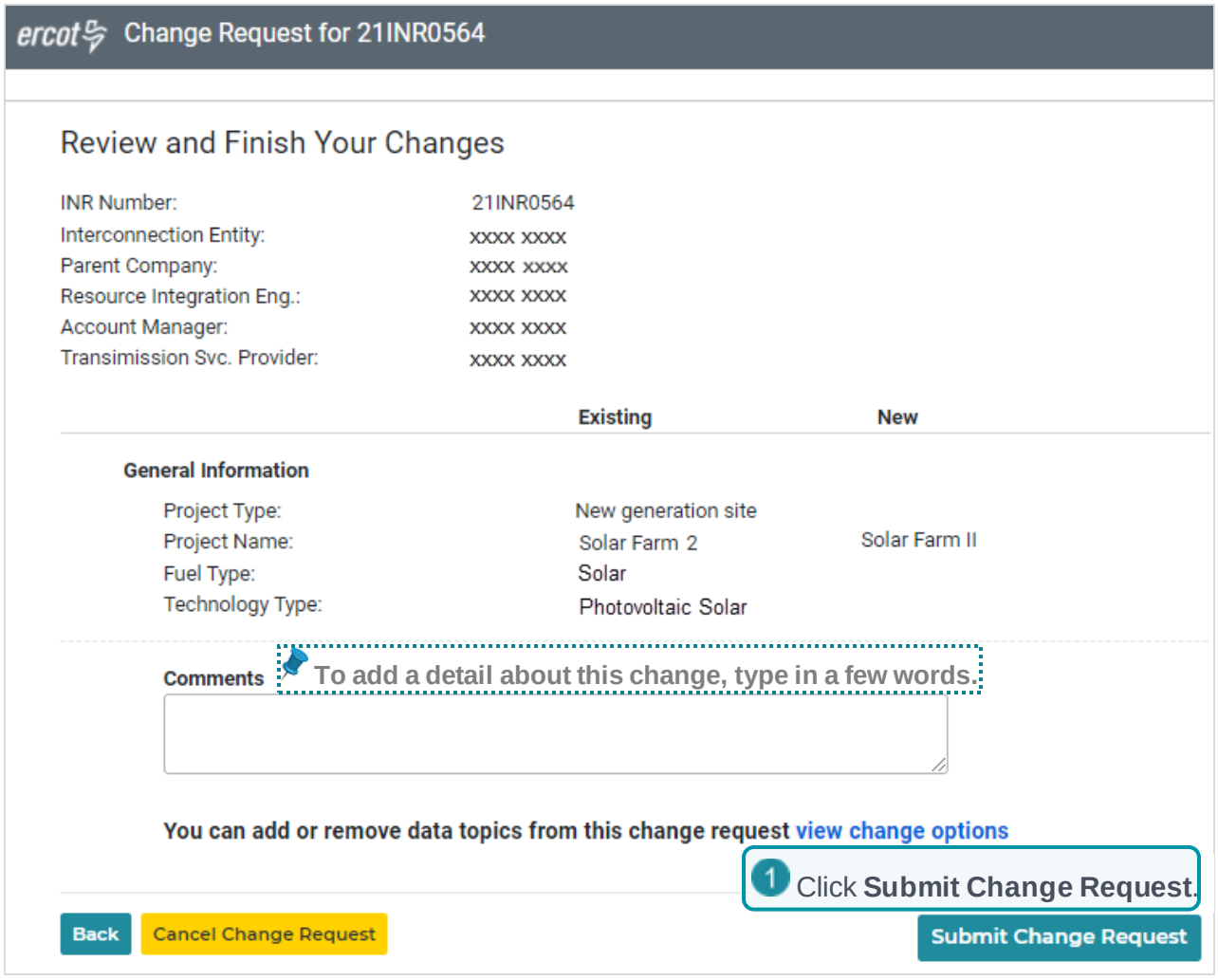
Select the Type of Change Request



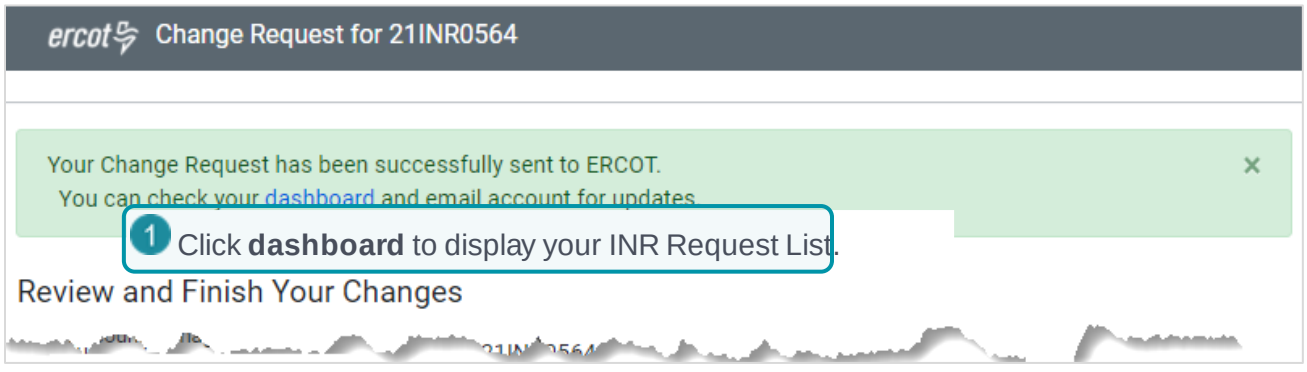
Update the Existing Information



Submit Your Change Request



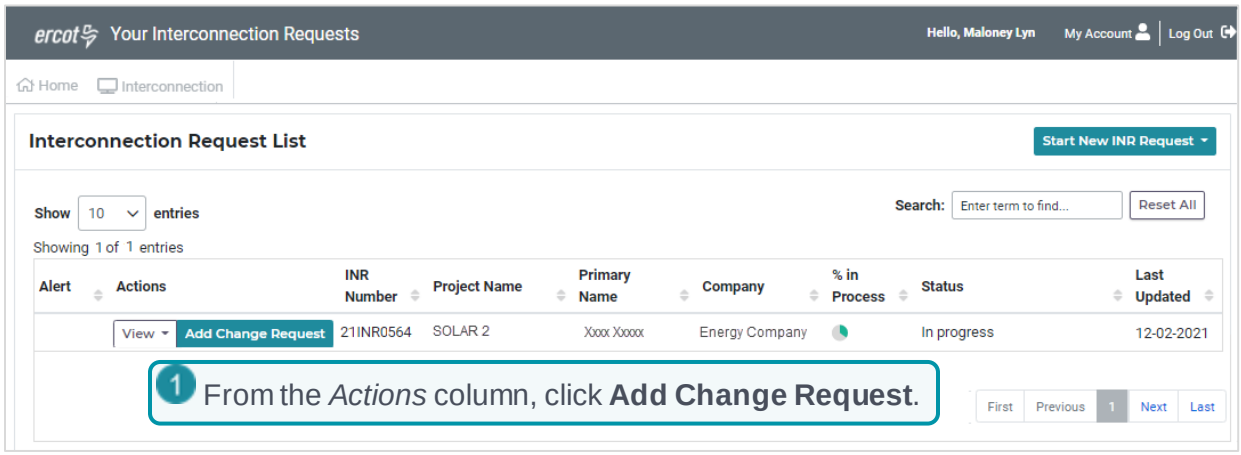
Change Request Successfully Sent Message



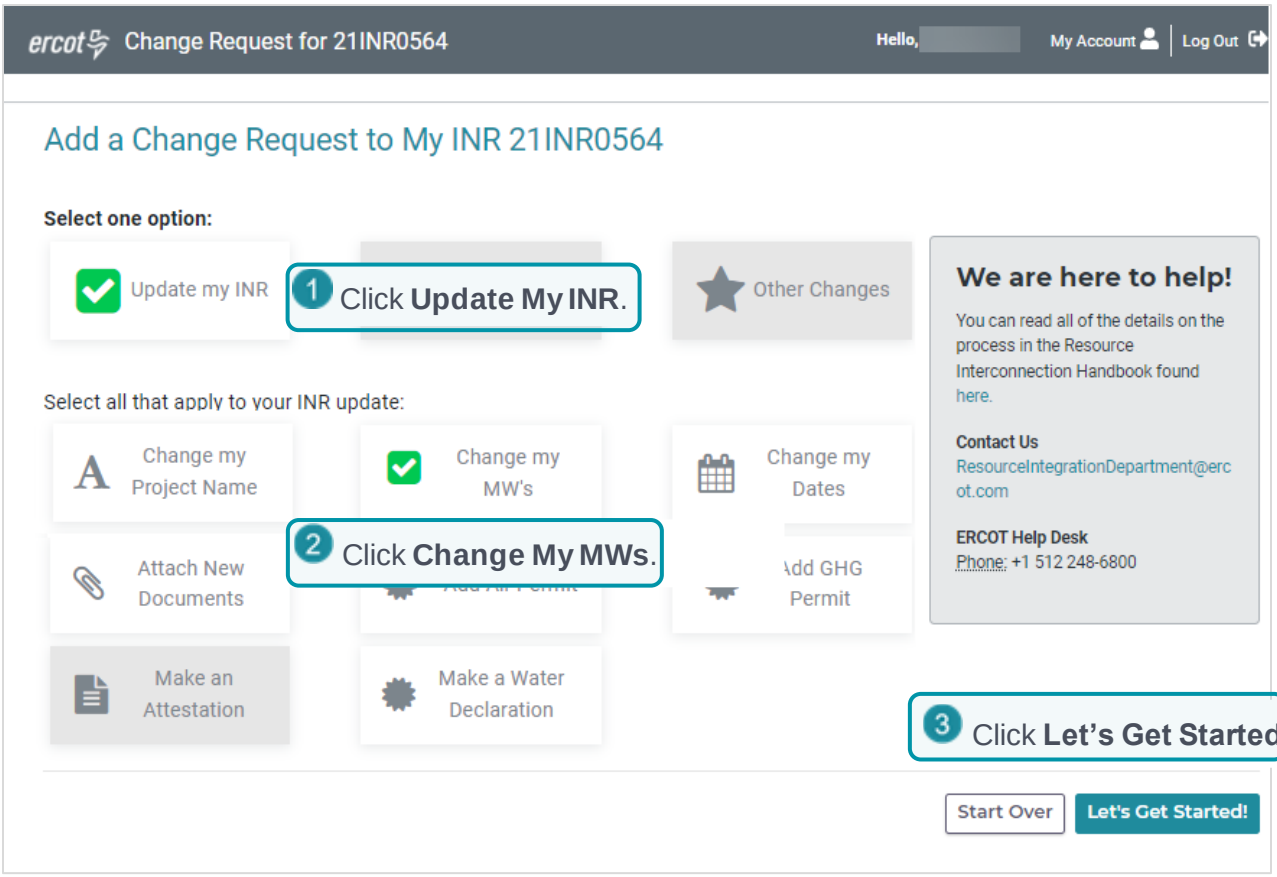
Changing the MWs

You can change the number of megawatts (MWs) you originally entered up to 20% of the amount you originally entered on your INR. If you change your summer or winter MWs, they cannot exceed 20% of the original and the overall MWs.

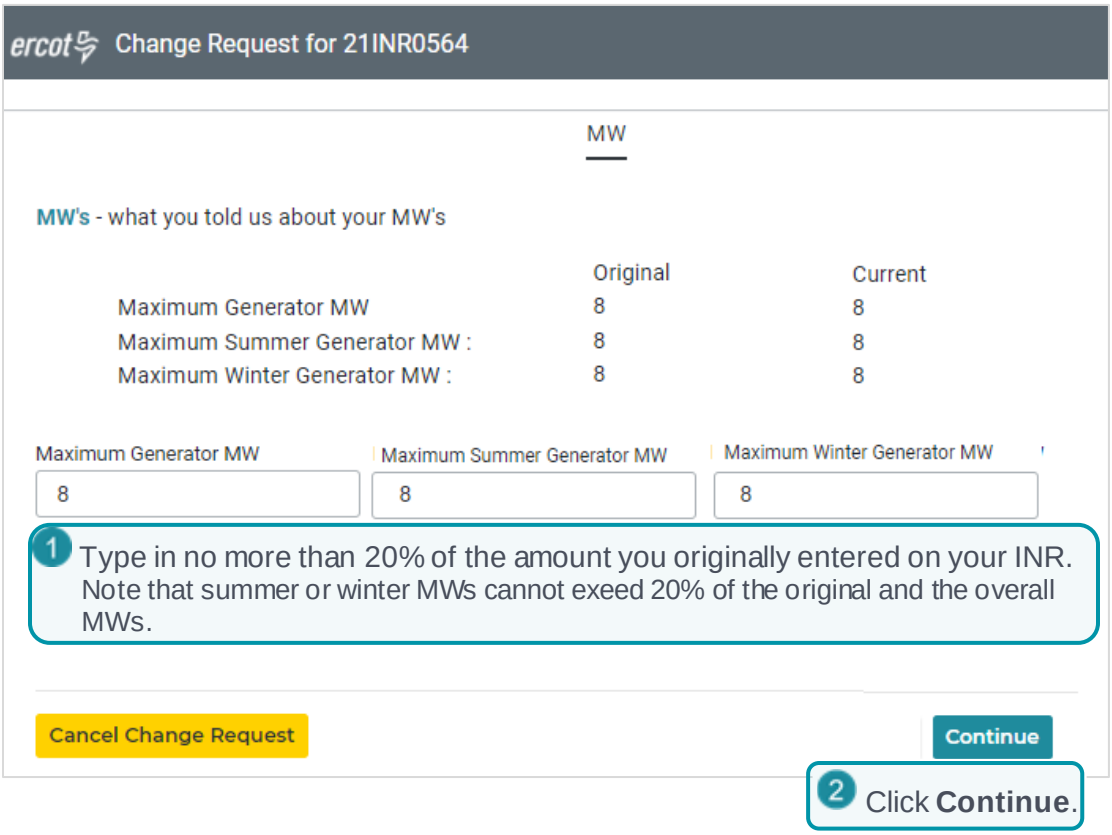
Add a Change Request from the Interconnection Requests List Page



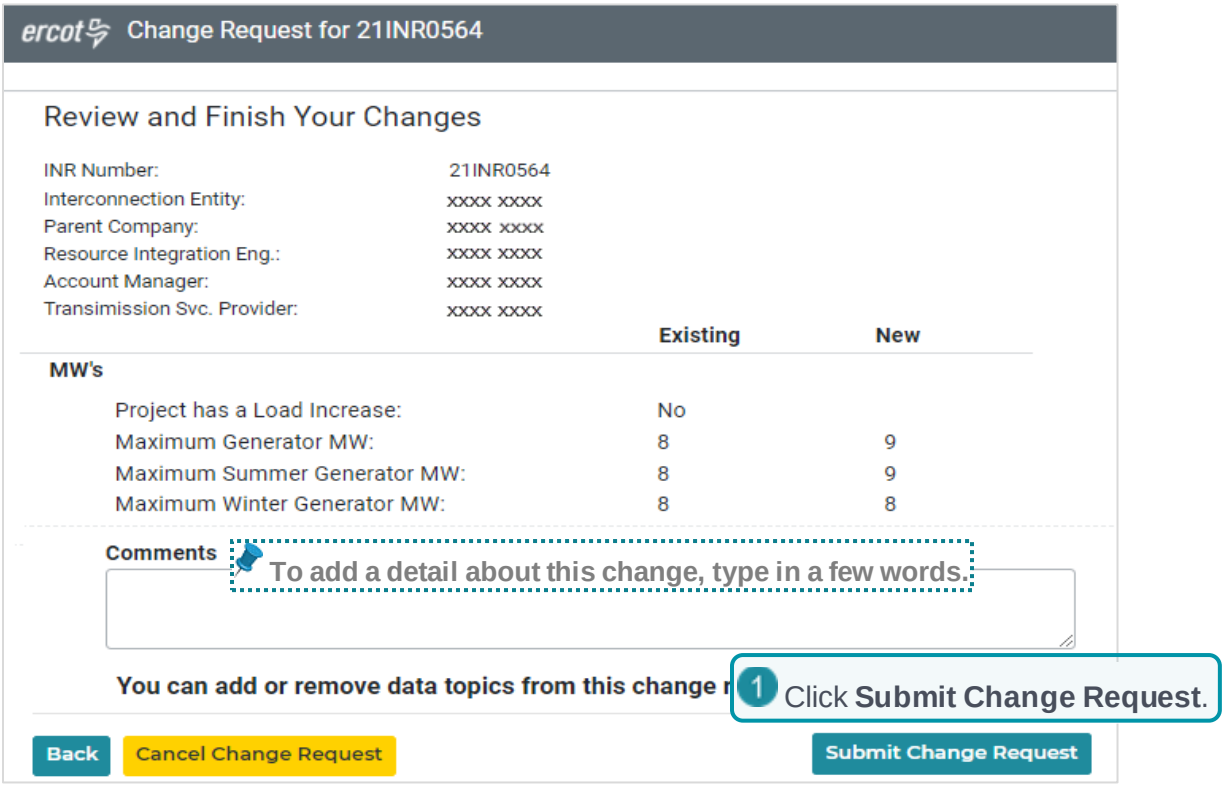
Select the Type of Change Request



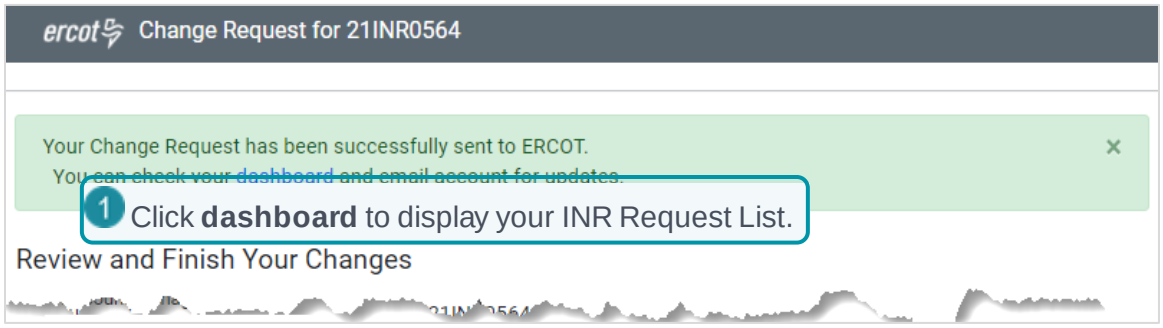
Update the Existing Information



Submit Your Change Request



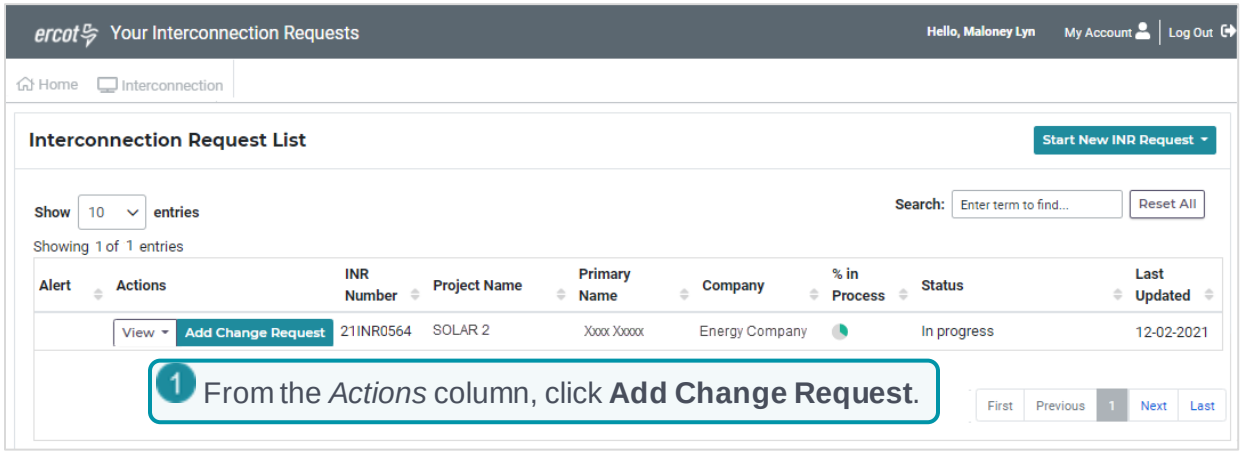
Change Request Successfully Sent Message



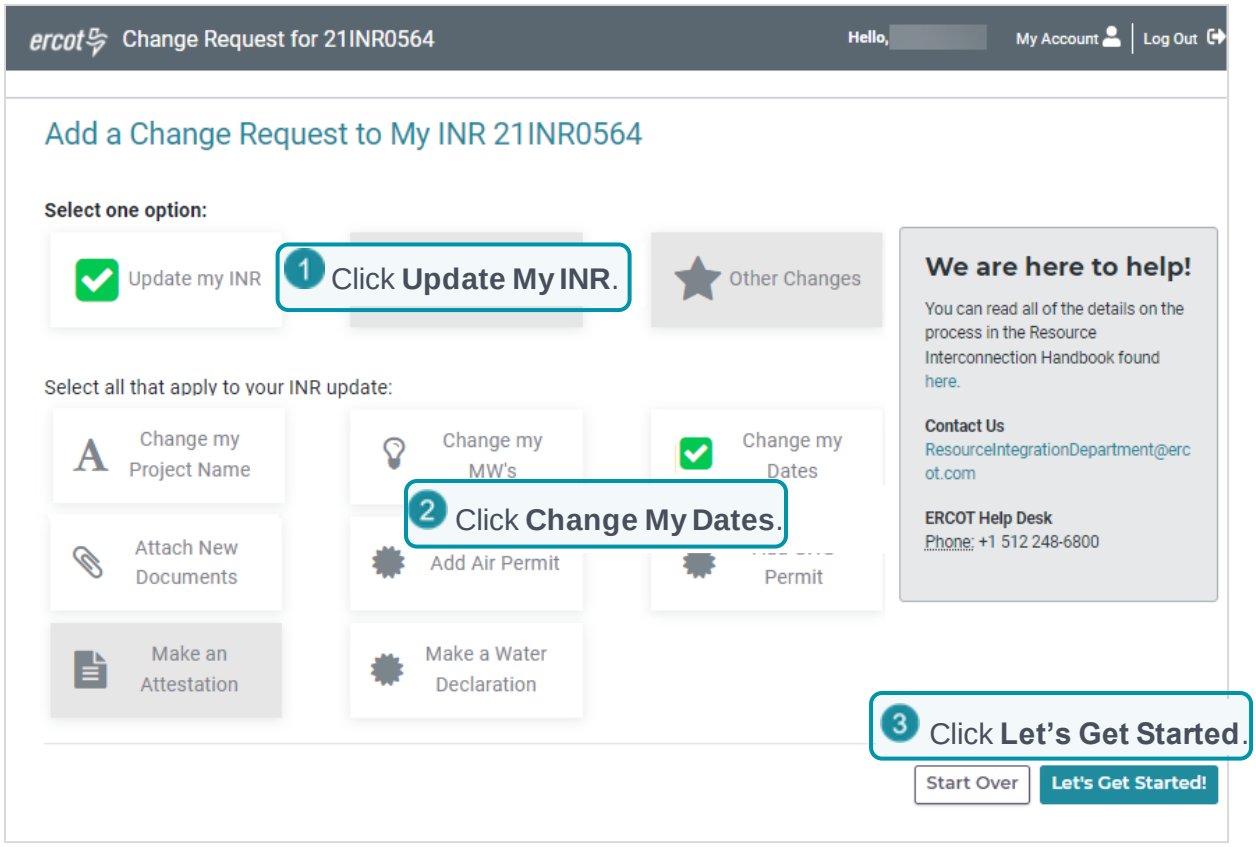
Changing the Project Dates

You can change your original Commercial Operation date (COD) as well as the Energization and Synchronization dates, or add them if you did not in your original request. The Energization date must be at least 130 days before the COD and 10 days before the Synchronization date, which must be at least 10 days after the Energization date and 120 days before the COD.

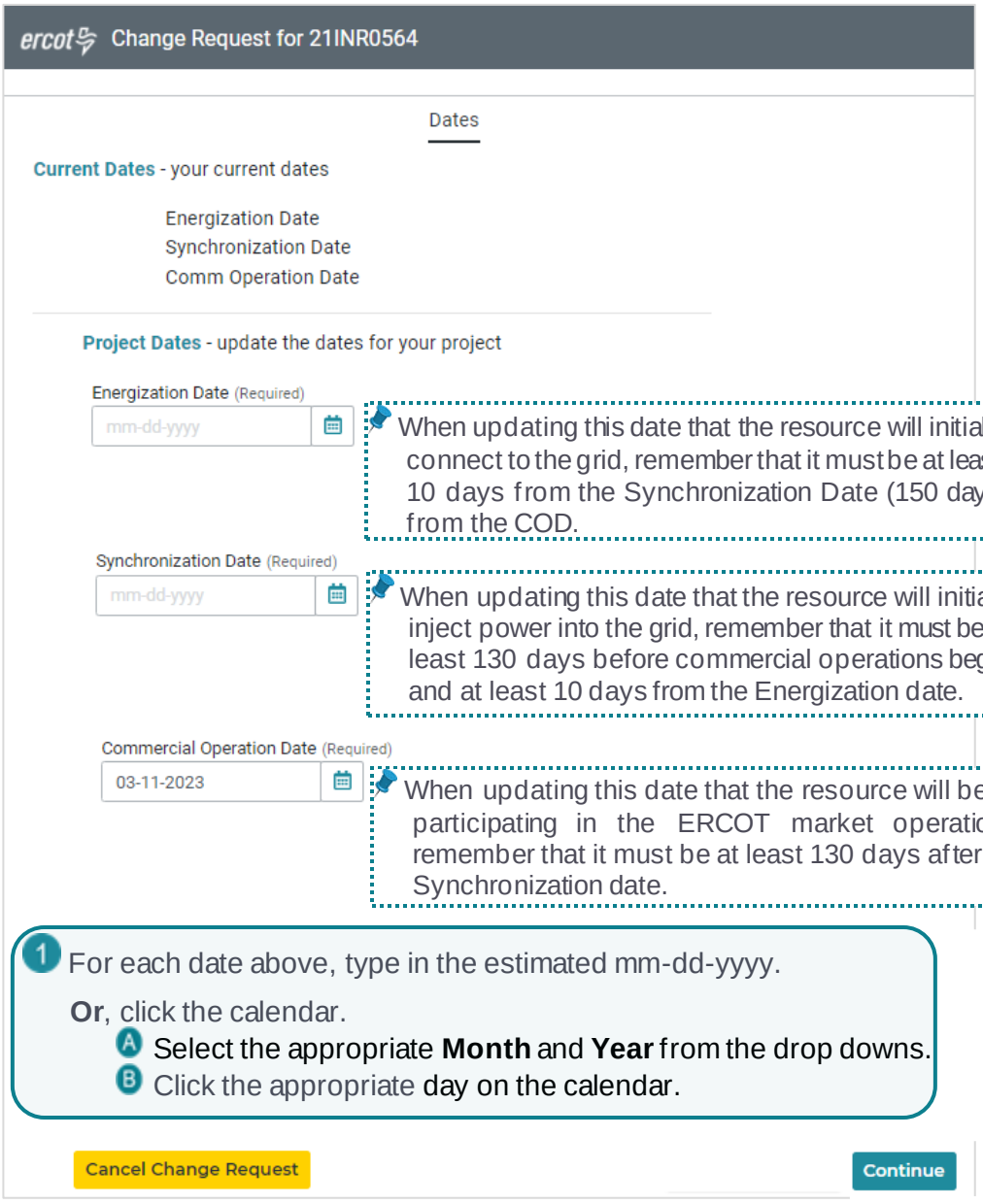
Add a Change Request from the Interconnection Requests List Page



Select the Type of Change Request

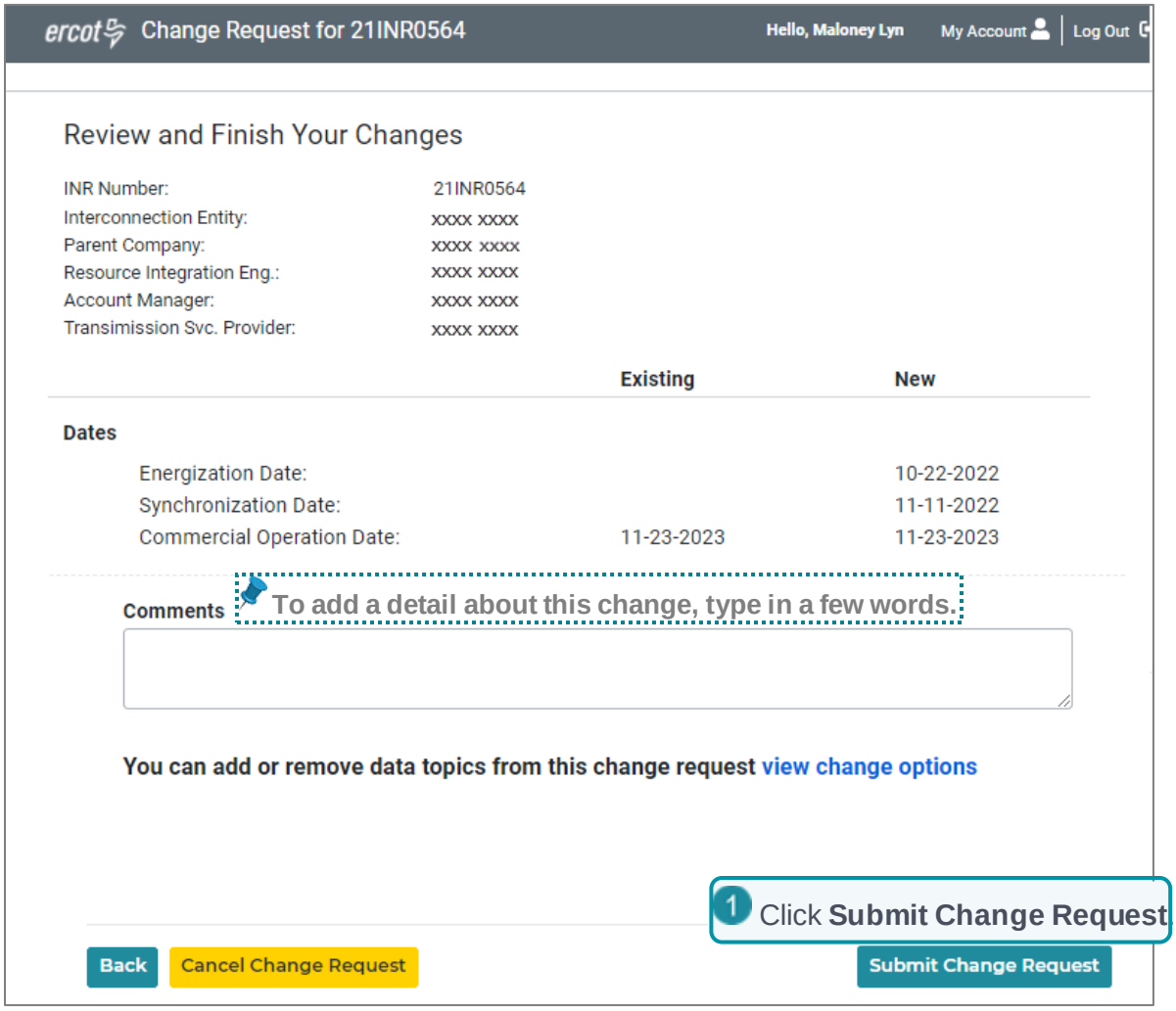


Update the Existing Information

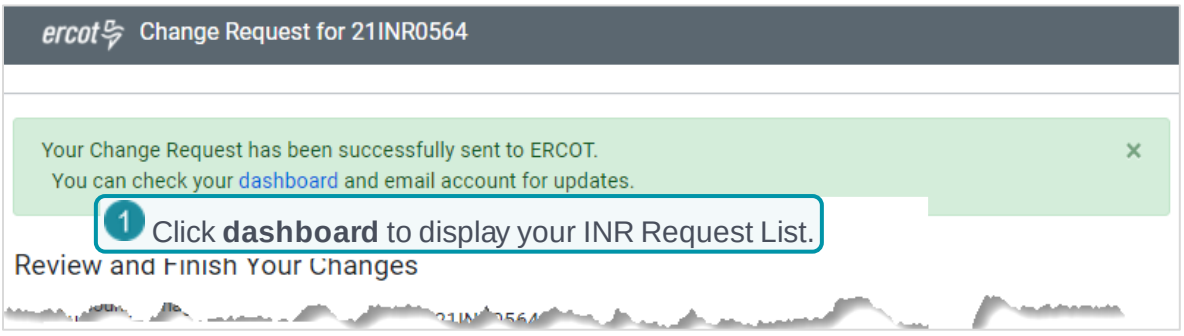


2 Click **Continue**.

Submit Your Change Request



Change Request Successfully Sent Message



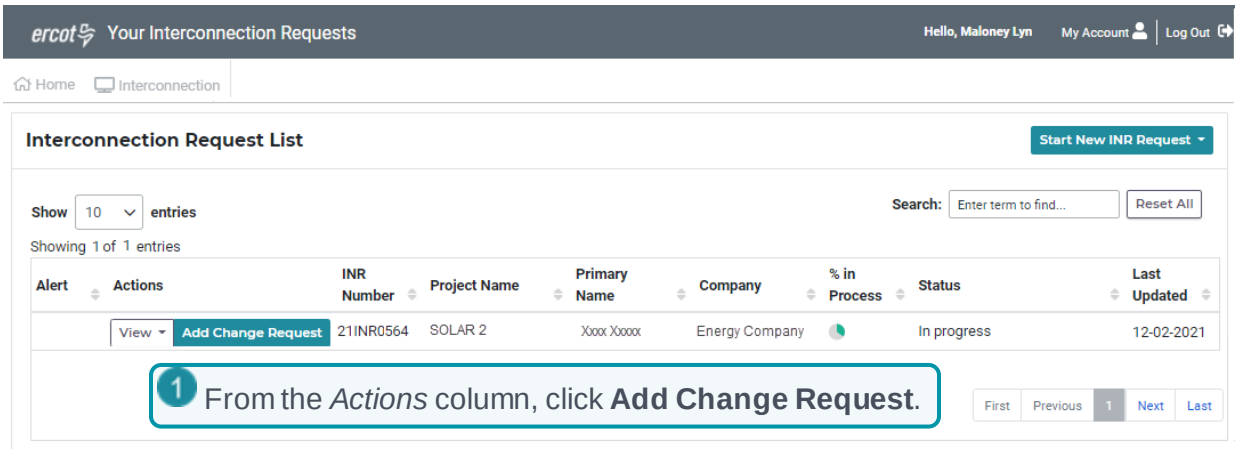
Adding Permits and Declarations

You can enter and upload required permits and declarations as change requests.

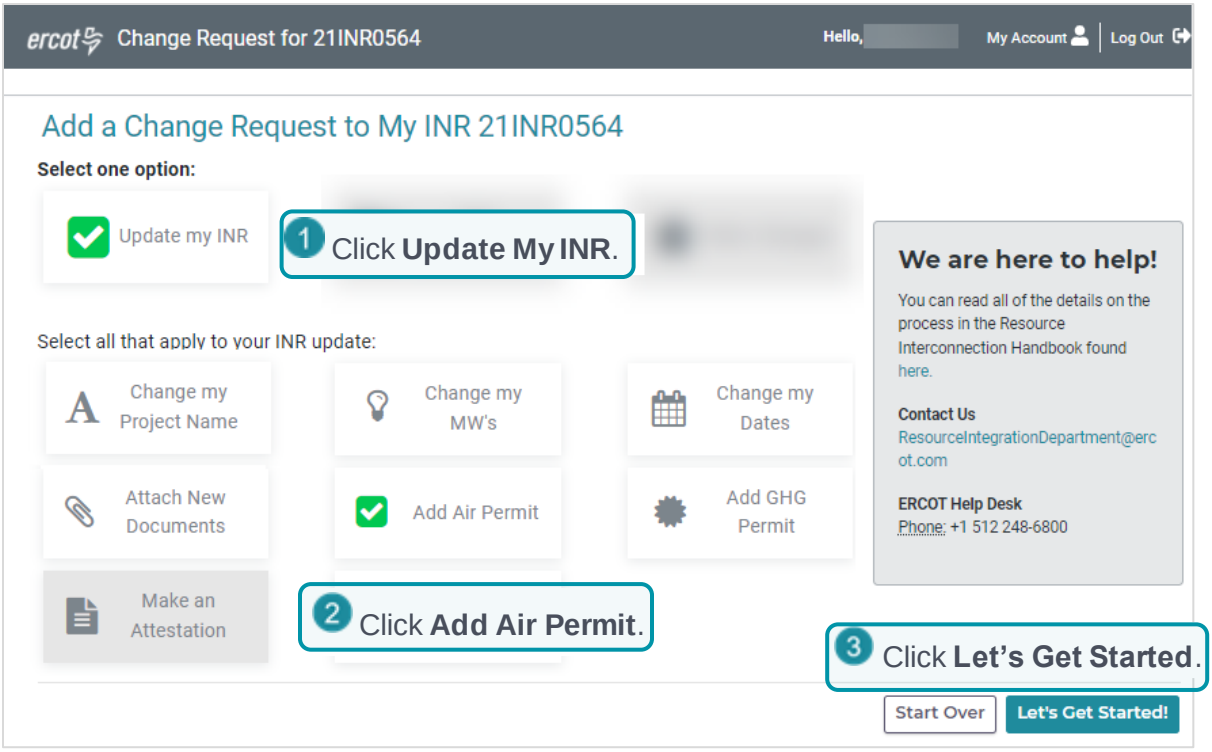
Adding an Air Permit

If your project requires an air quality permit, you must enter the date it was issued. You can optionally upload a file containing a copy of the permit.

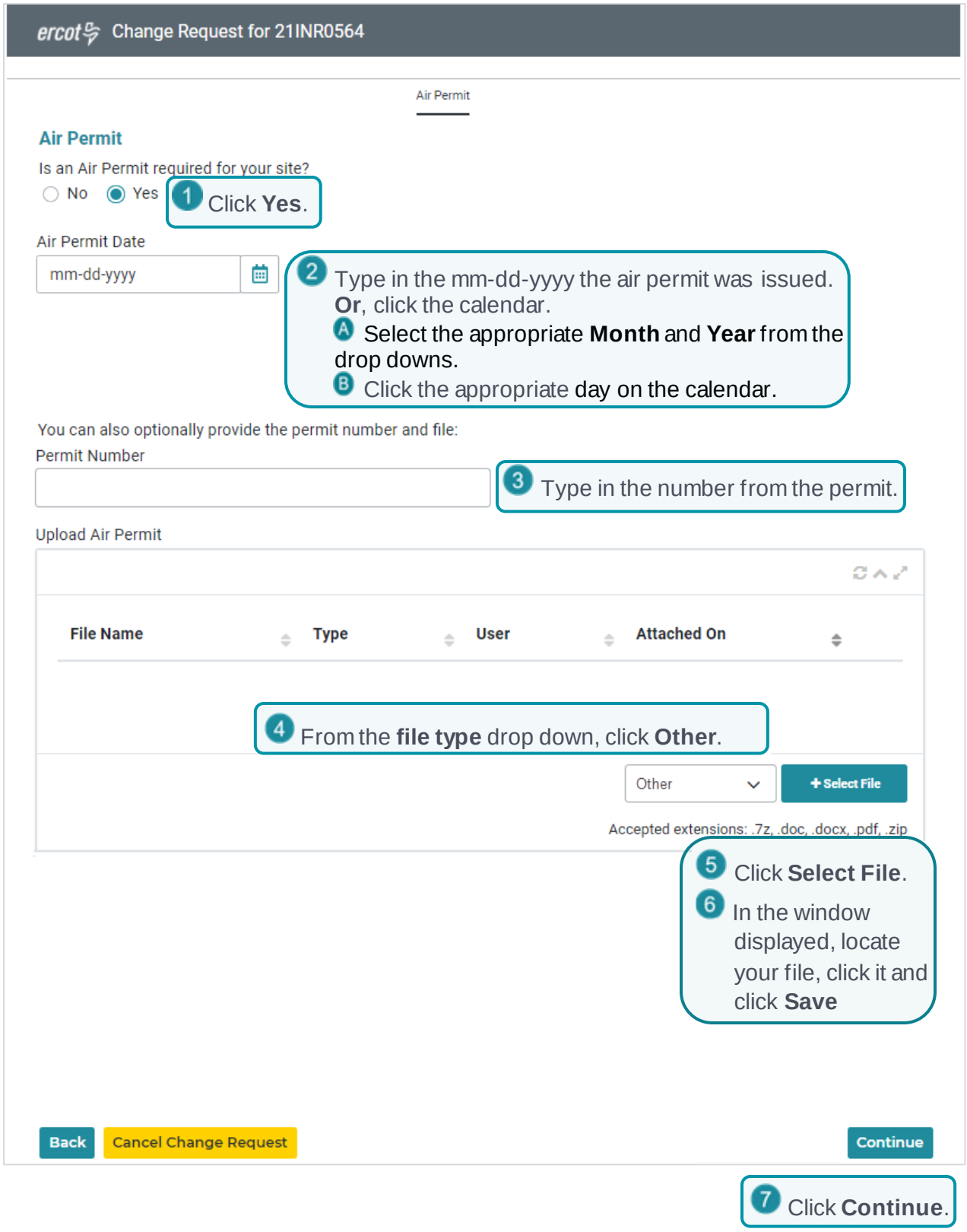
Add a Change Request from the Interconnection Requests List Page



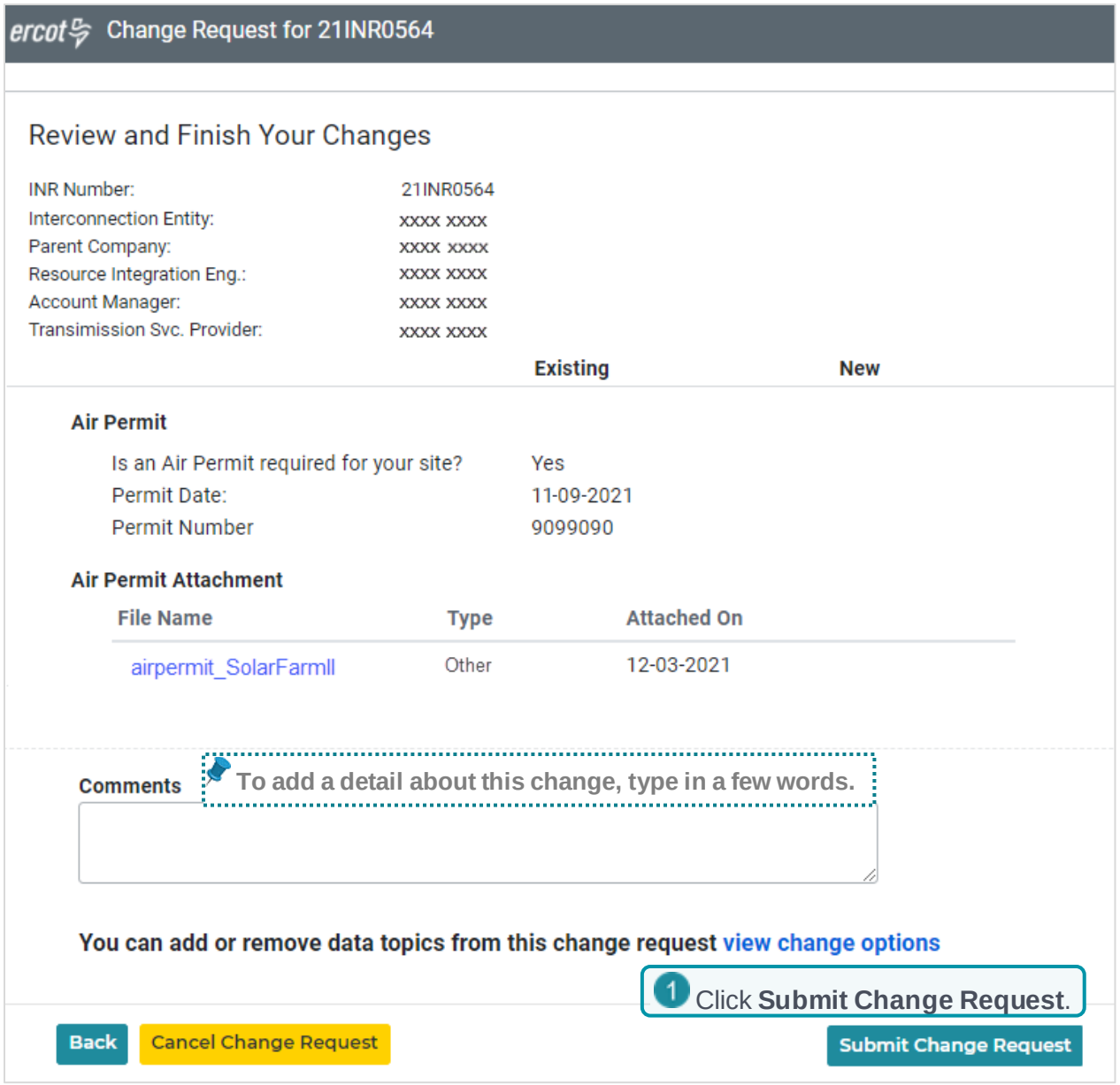
Select the Type of Change Request



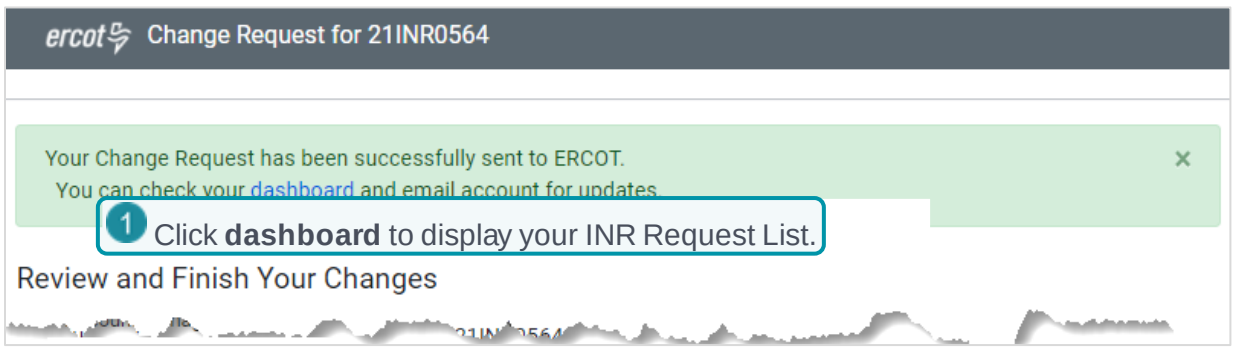
Complete the Air Permit Page



Submit Your Change Request



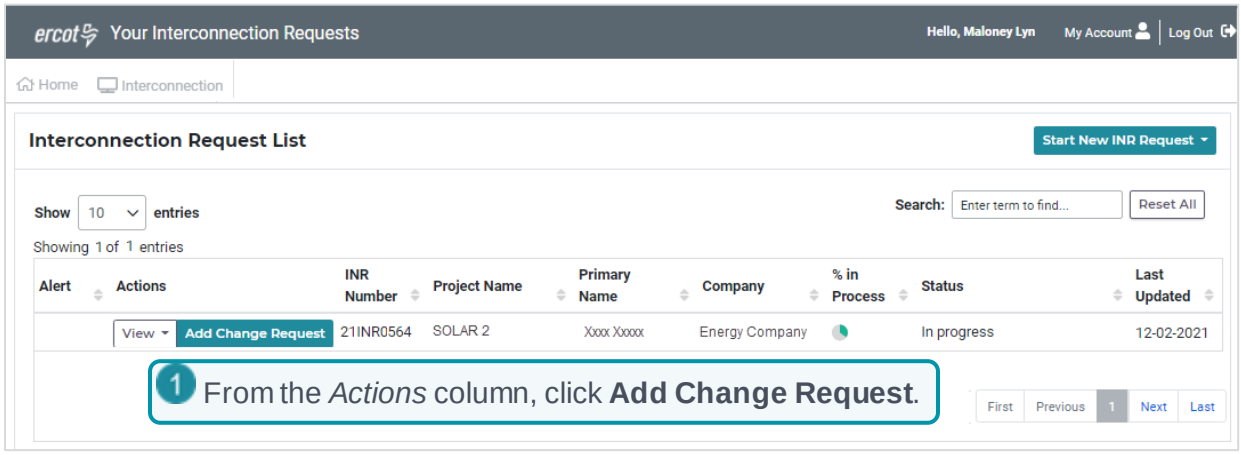
Change Request Successfully Sent Message



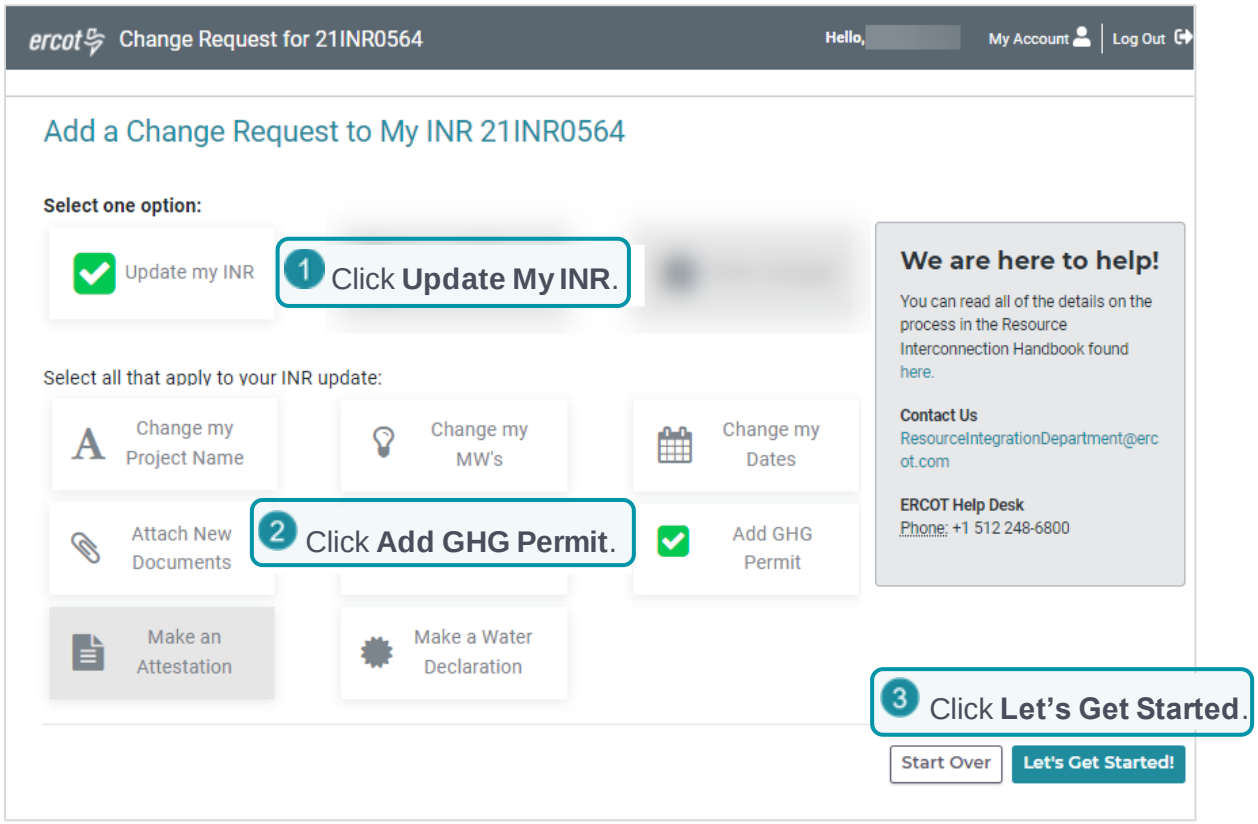
Adding a Green House Gas Permit

If your project requires this permit, you must enter the date it was issued. You can optionally upload a file containing a copy of the permit.

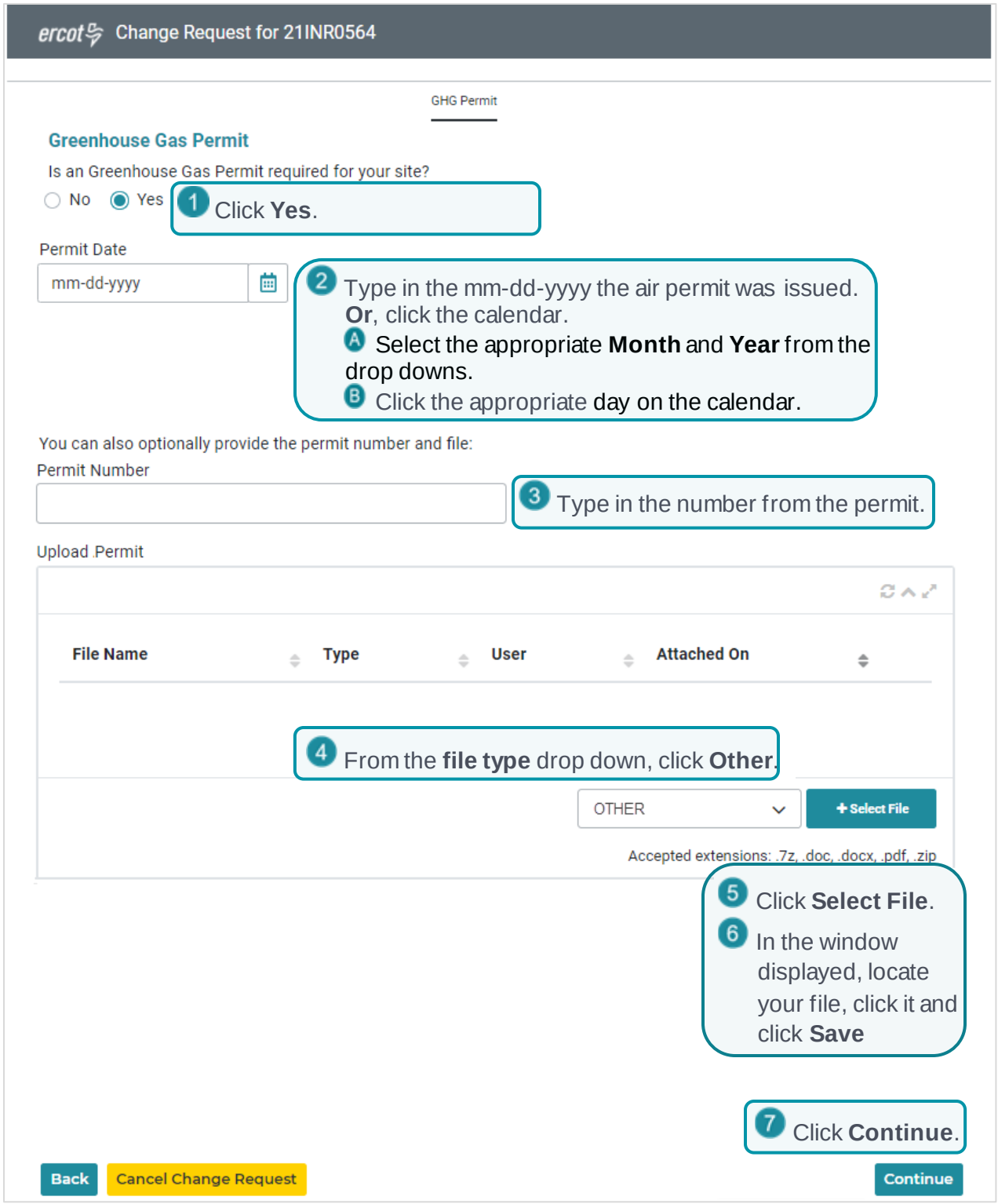
Add a Change Request from the Interconnection Requests List Page



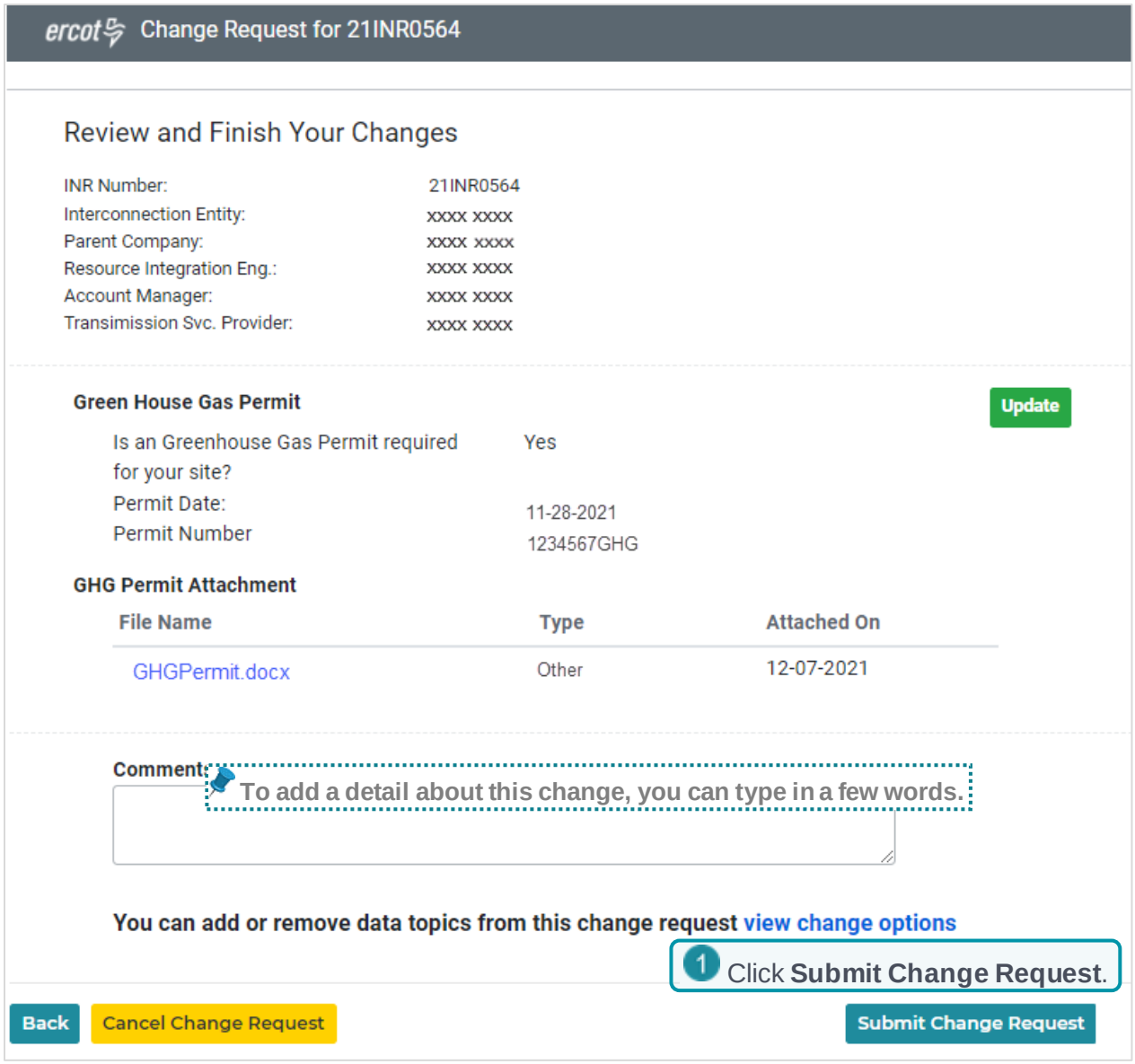
Select the Type of Change Request



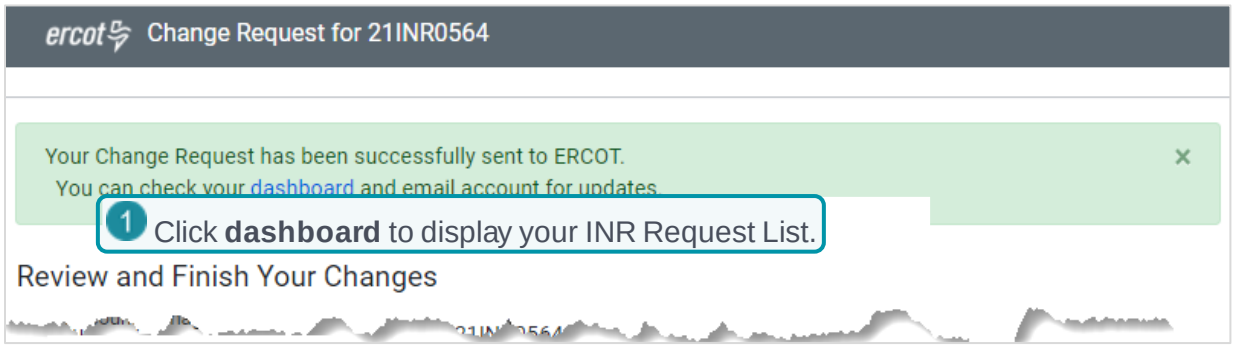
Complete the Permit Page



Submit Your Change Request



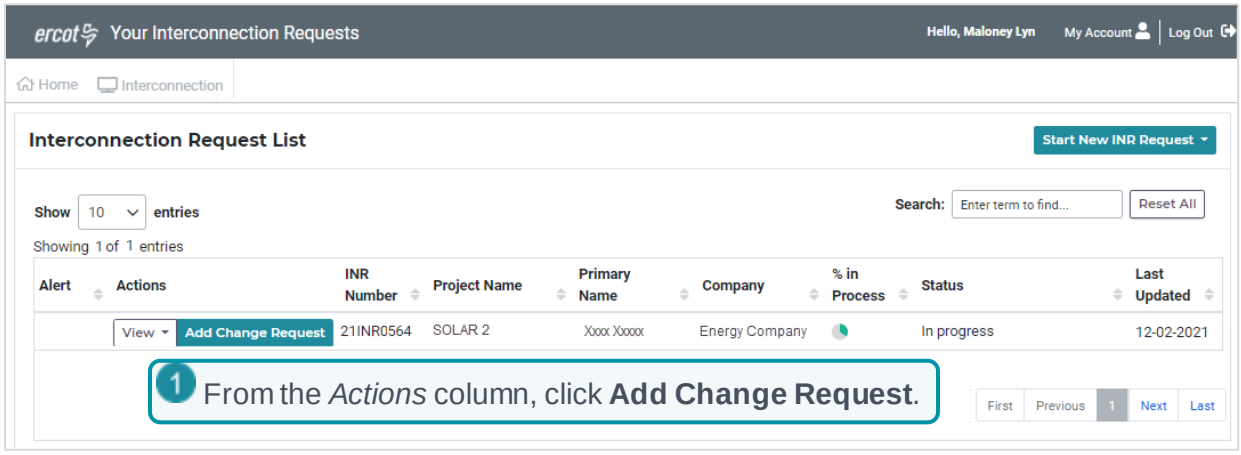
Change Request Successfully Sent Message



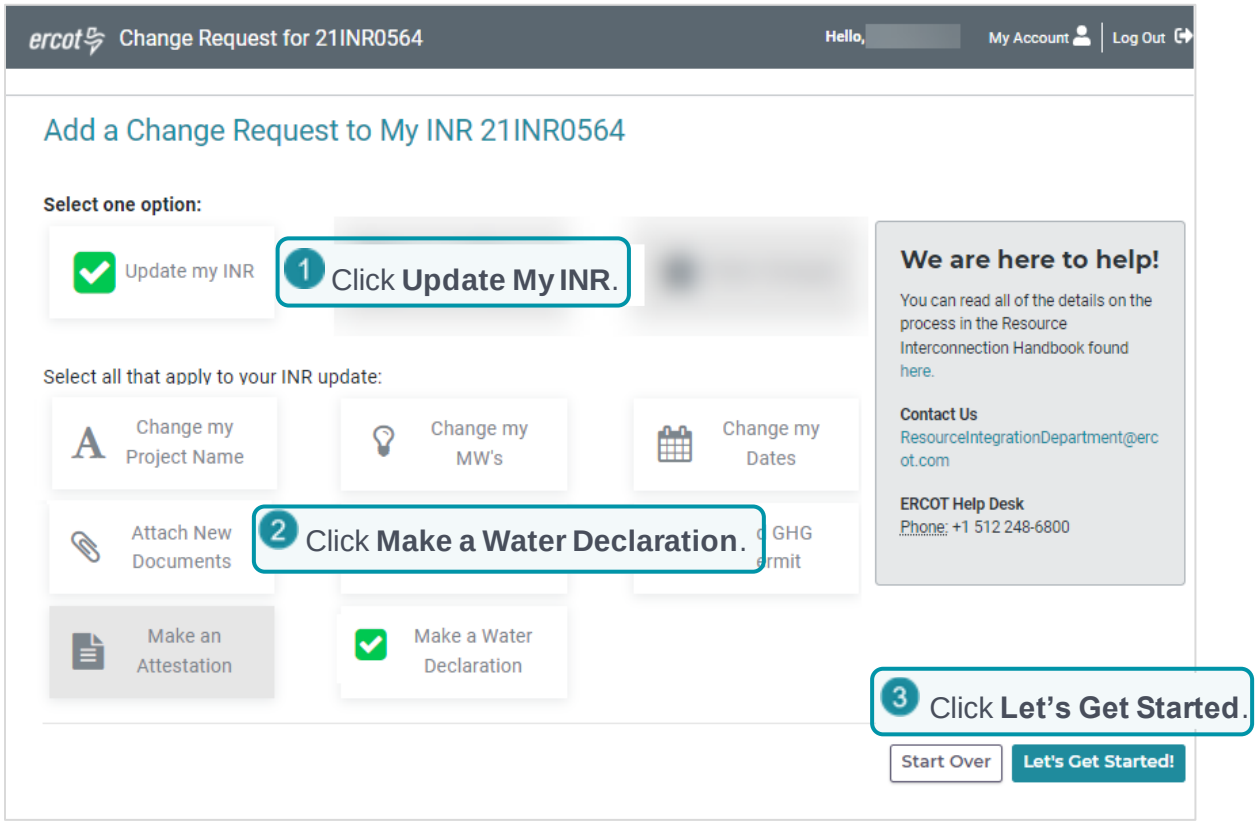
Adding a Water Rights Declaration

You must submit a change request that confirms either you do not need water rights, contracts or groundwater supplies in order to generate electricity at your site or that you have secured these rights. You can attach the contracts, permits and ground water adequacy studies that support this confirmation using the Attach New Documents change request.

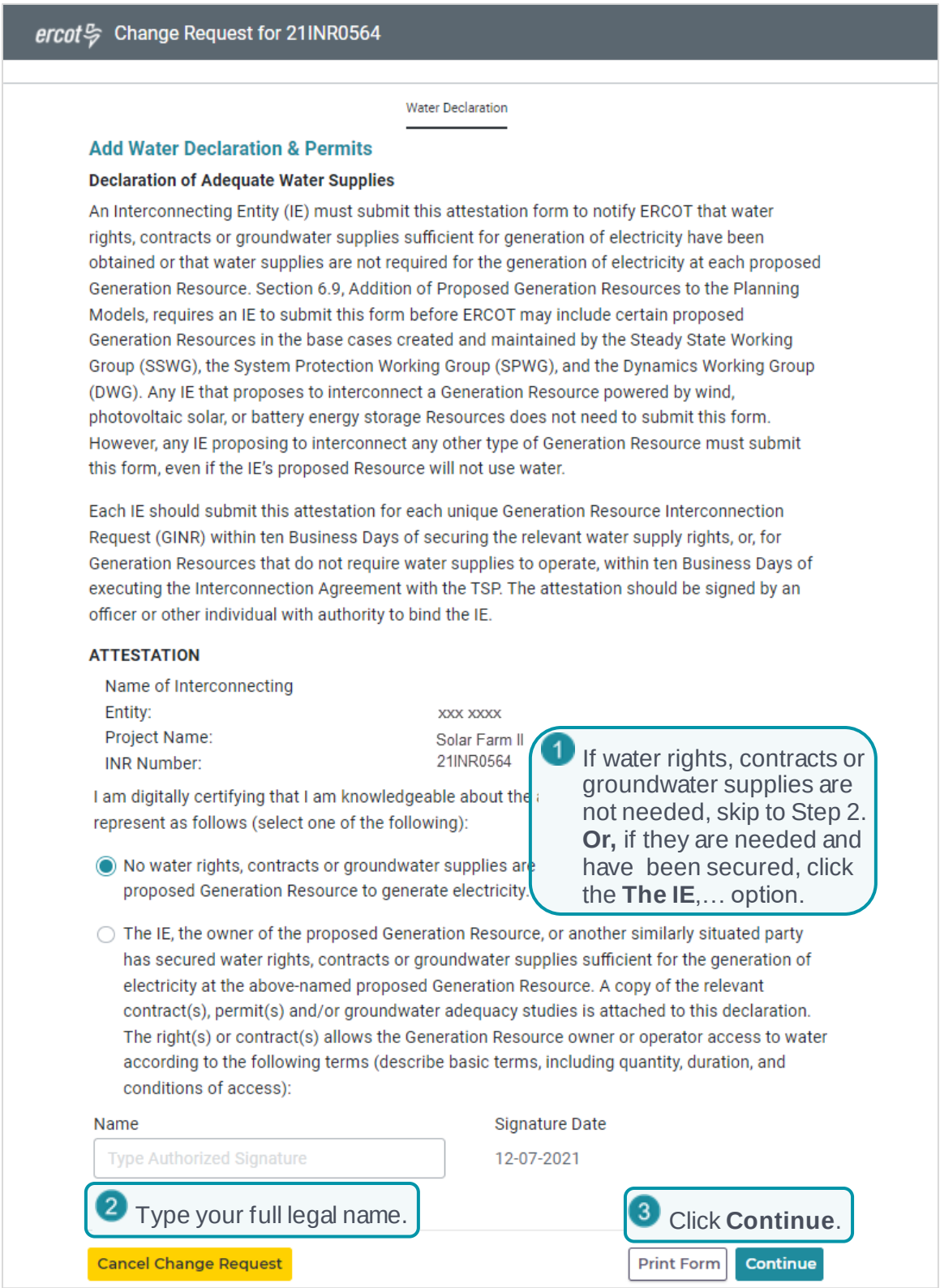
Add a Change Request from the Interconnection Requests List Page



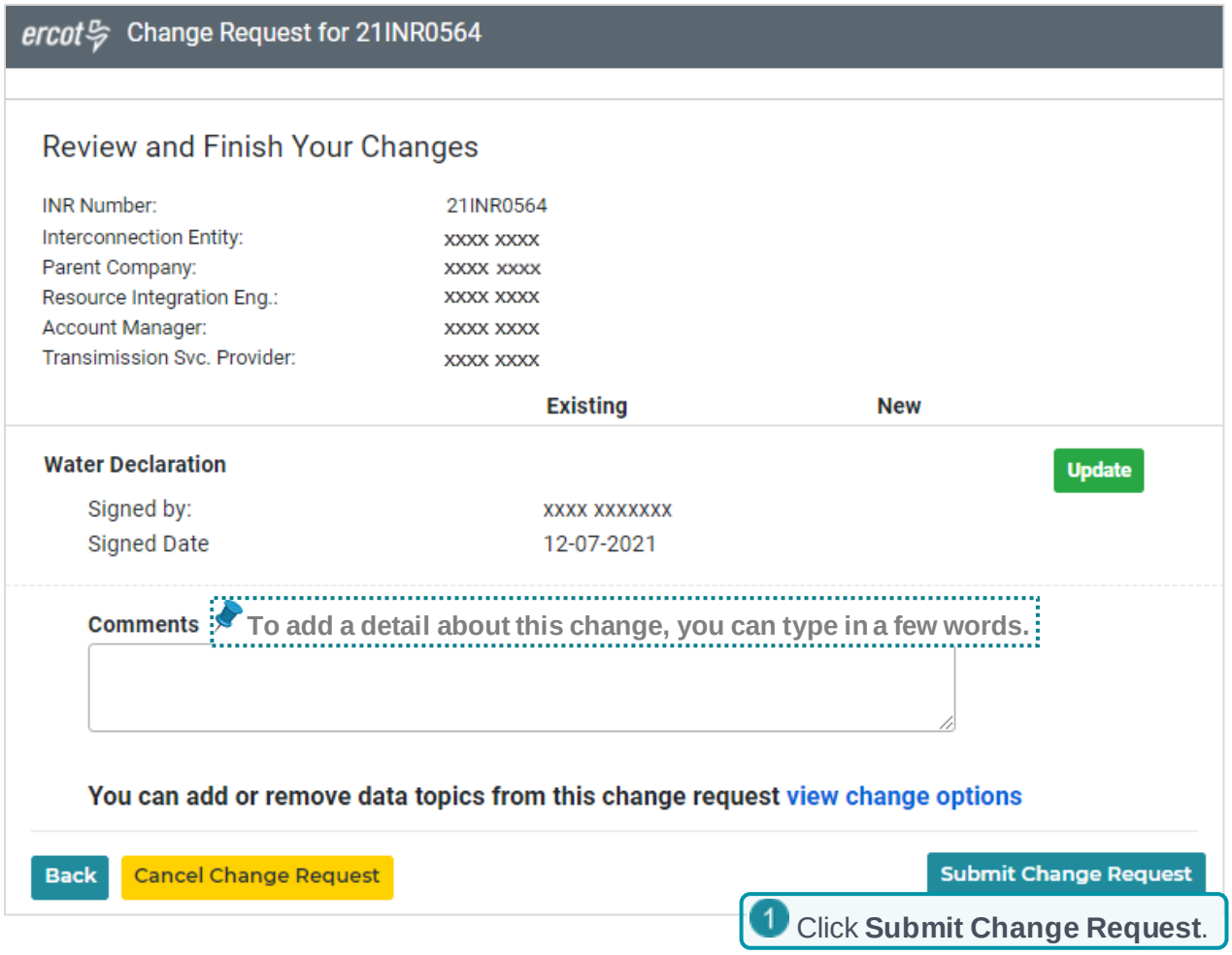
Select the Type of Change Request



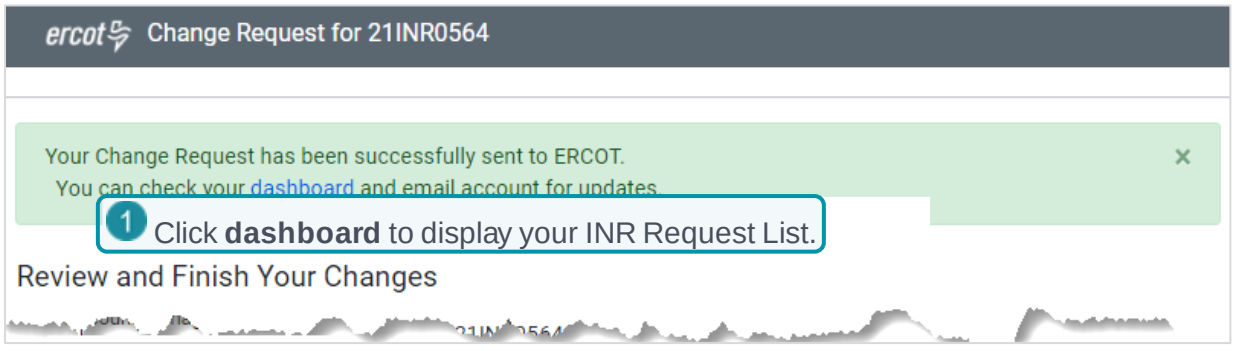
Complete the Water Declaration Page



Submit Your Change Request



Change Request Successfully Sent Message



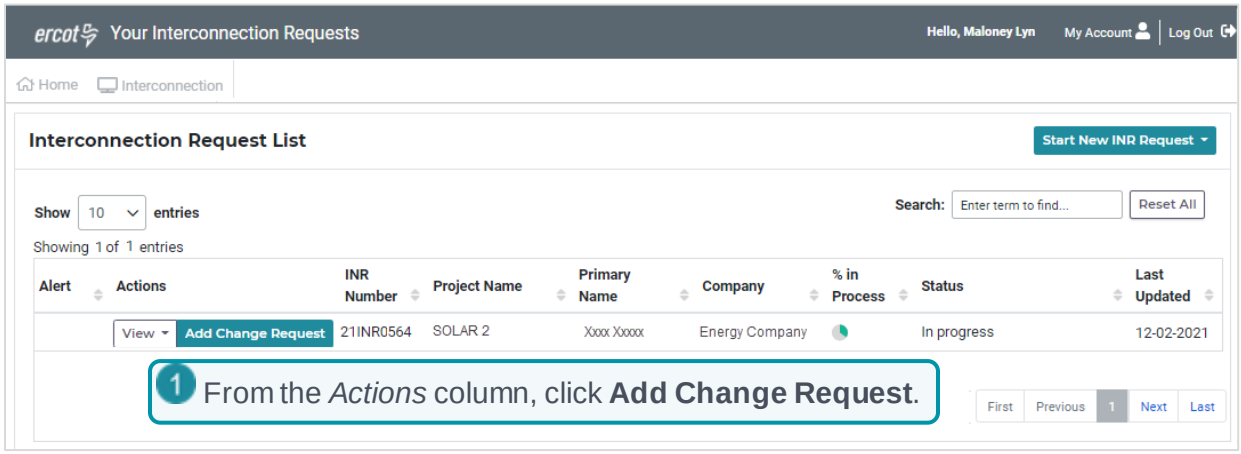
Confirming Nodal Protocol Requirements Have Been Met

You must sign several documents confirming you have attended to several Nodal Protocols requirements.

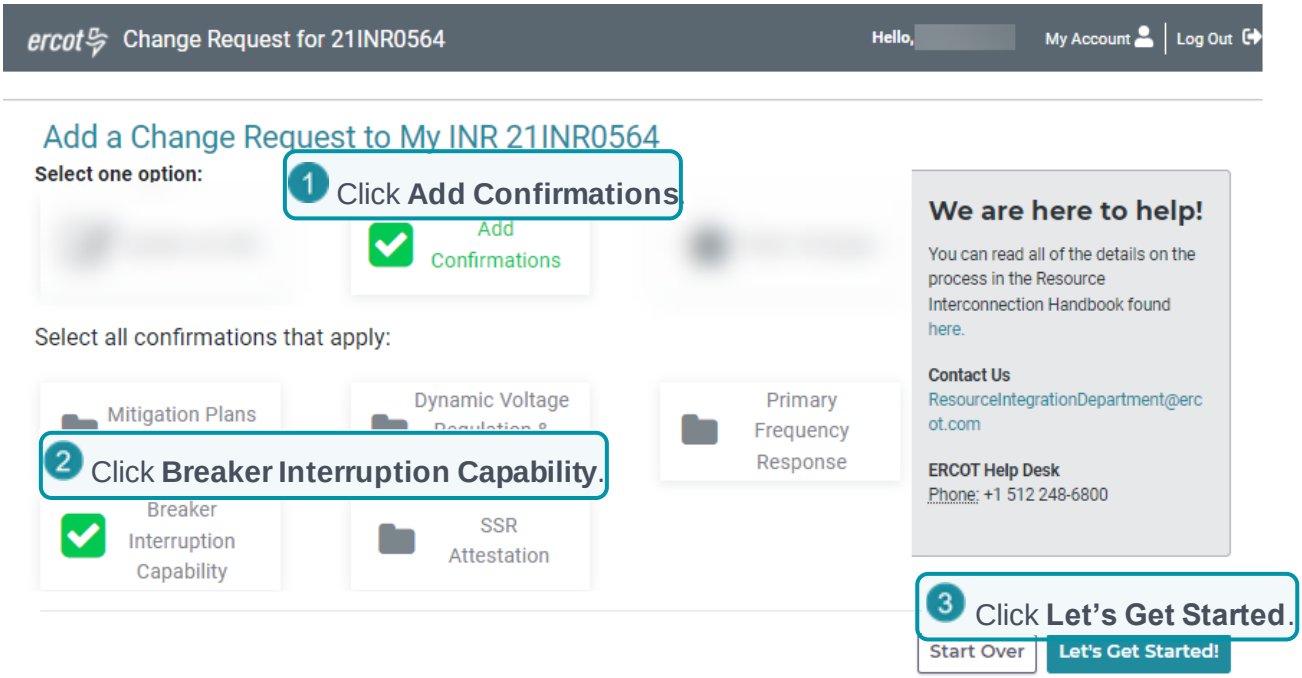
Confirming Breaker Interruption Capability

You must confirm that the resource can inform ERCOT of the interrupting capability of the main breaker on the high side of the generator step up unit transformer.

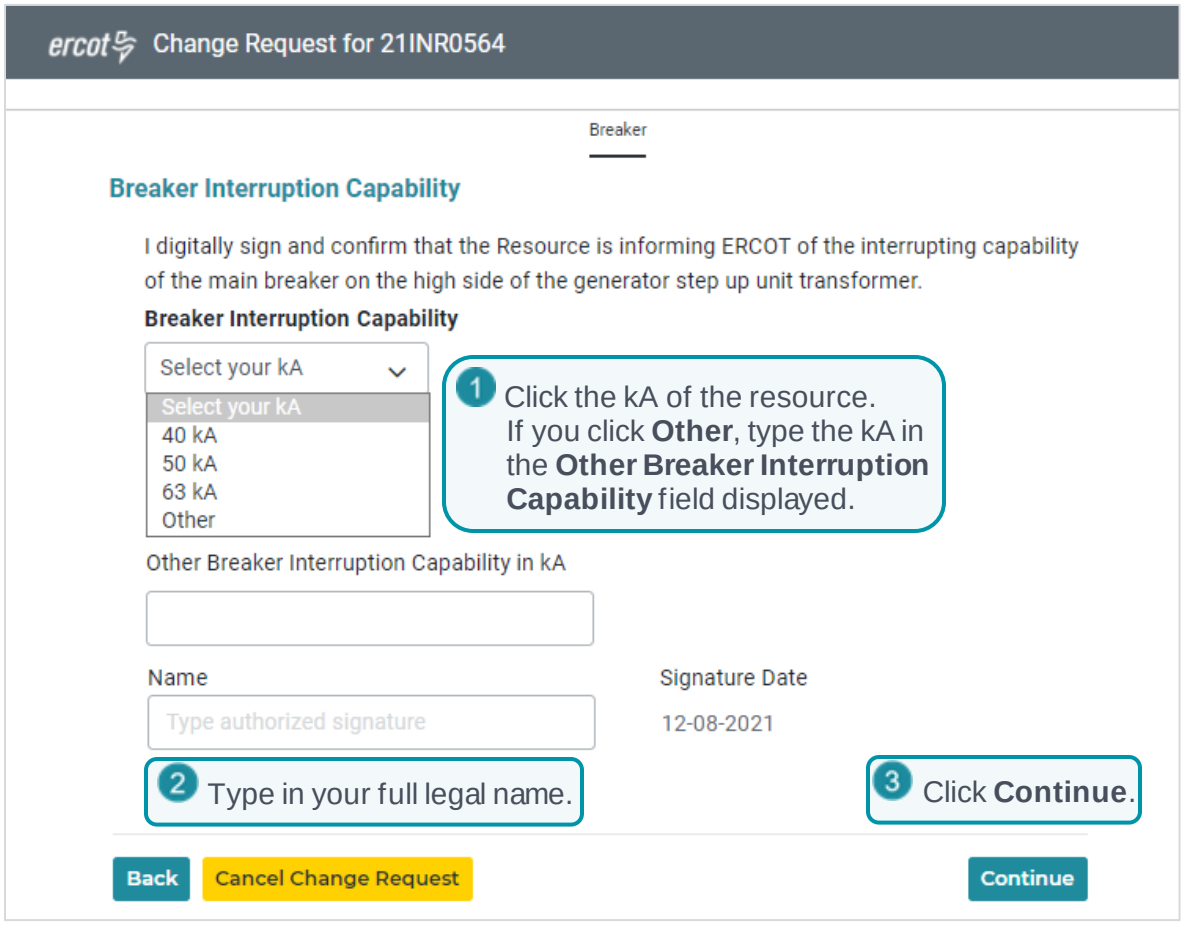
Add a Change Request from the Interconnection Requests List Page



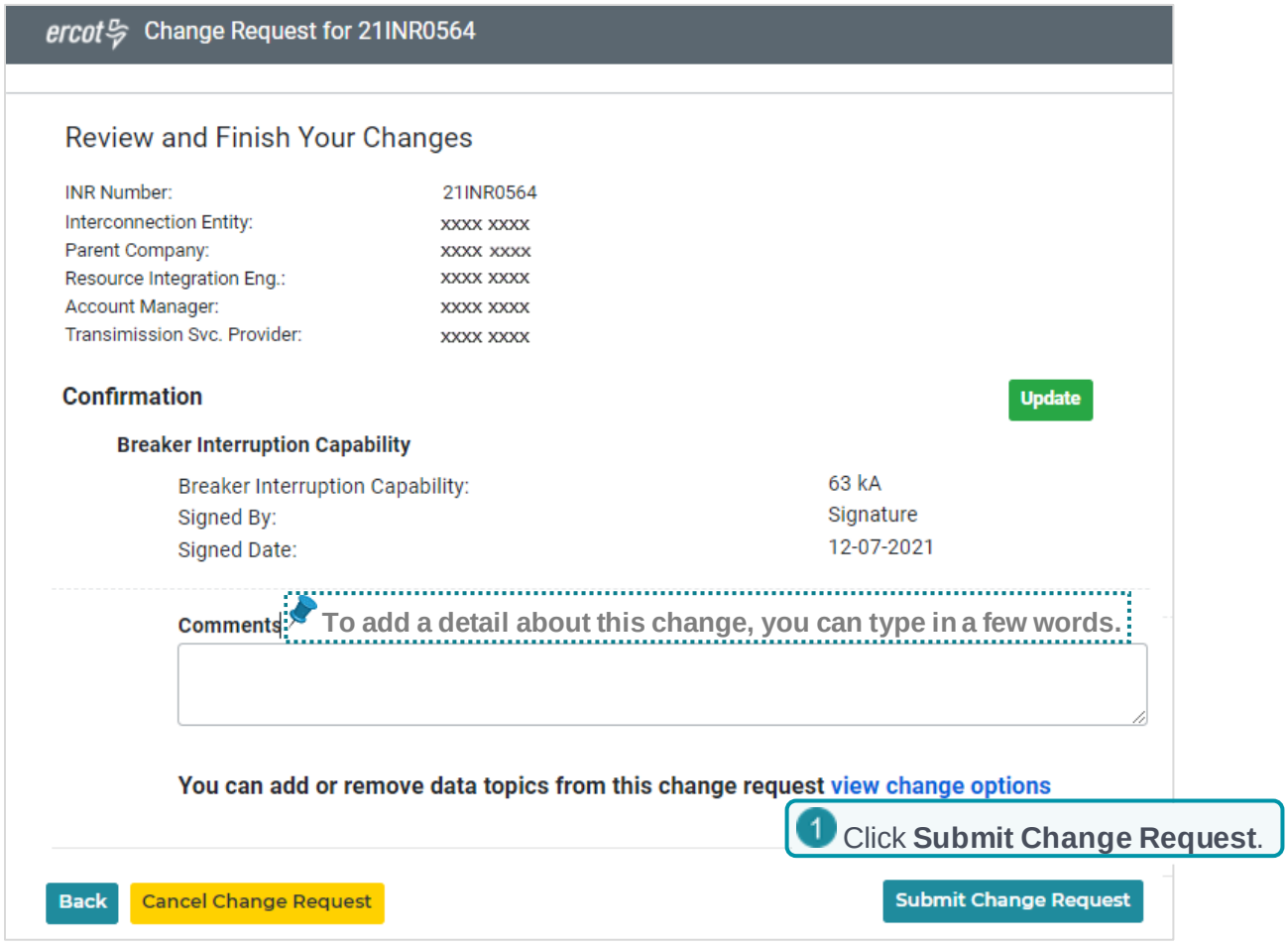
Select the Type of Change Request



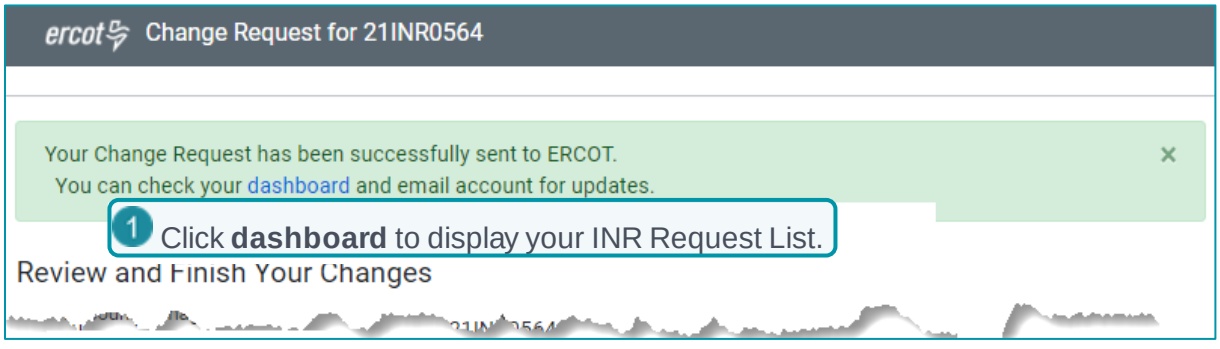
Sign the Confirmation Page



Submit Your Change Request



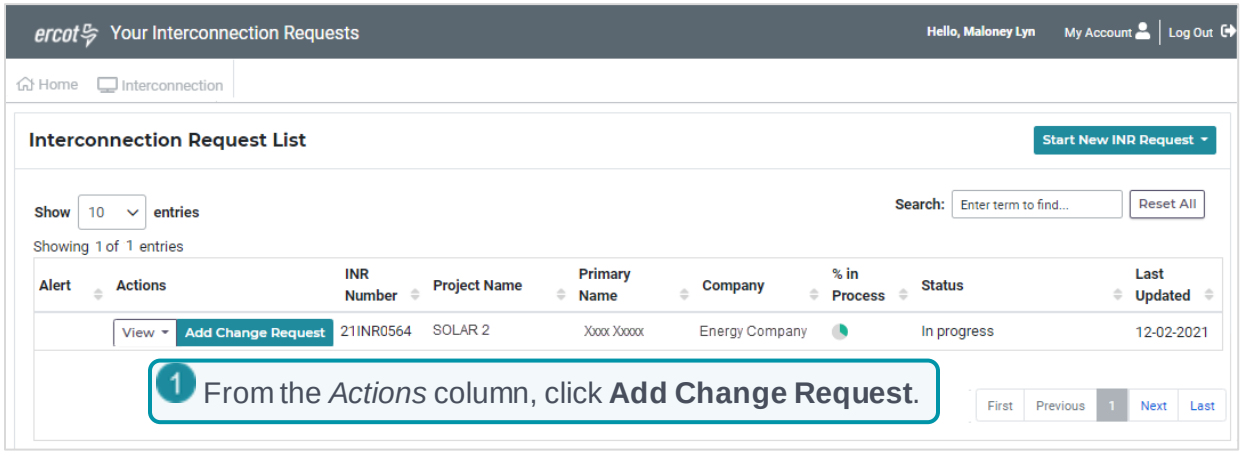
Change Request Successfully Sent Message



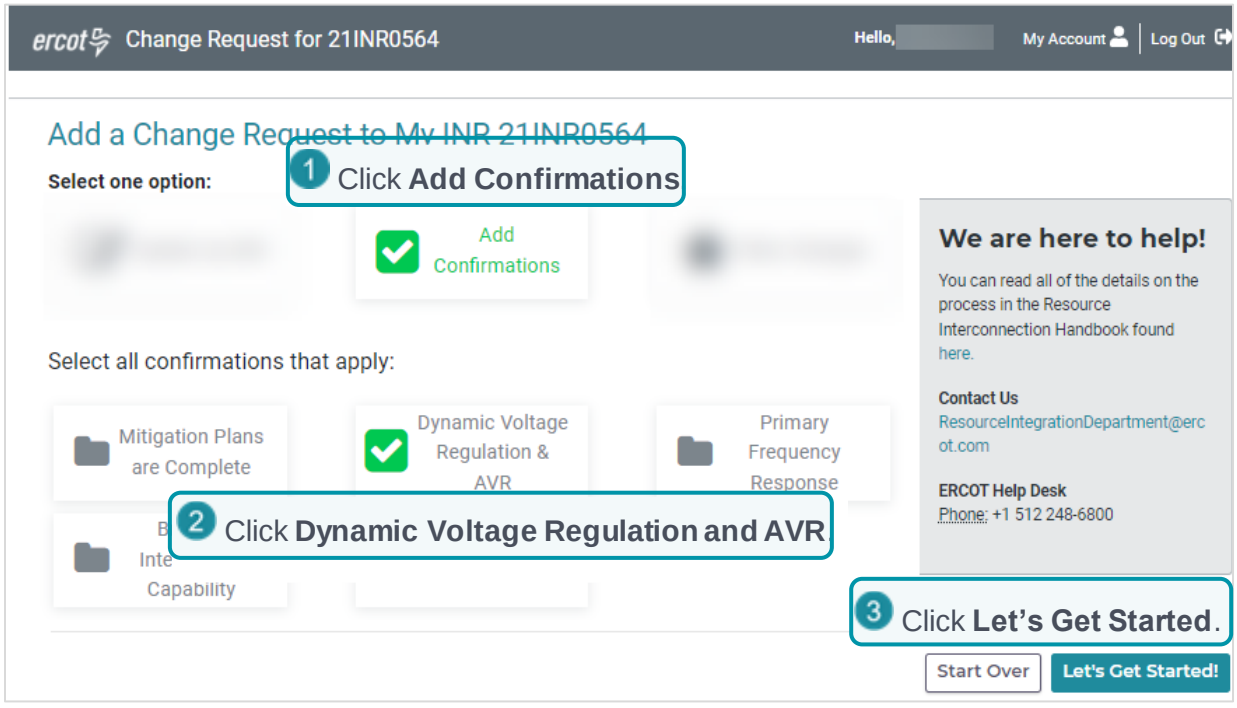
Confirming the Dynamic and Automatic Voltage Regulators are Installed

You must confirm that the dynamic and automated voltage regulators are installed.

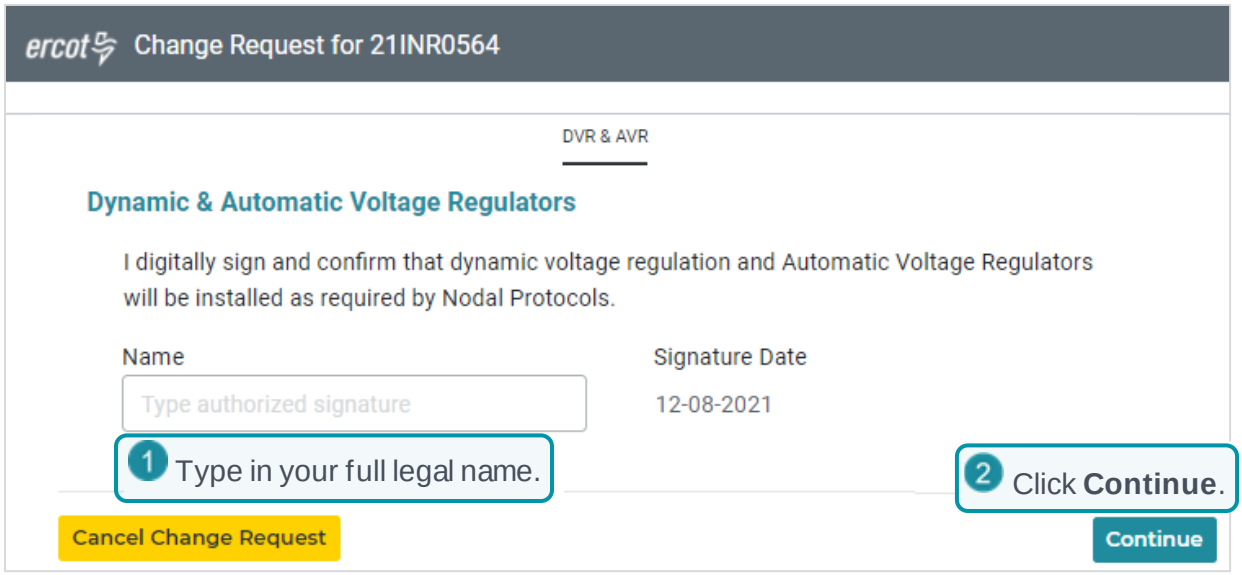
Add a Change Request from the Interconnection Requests List Page



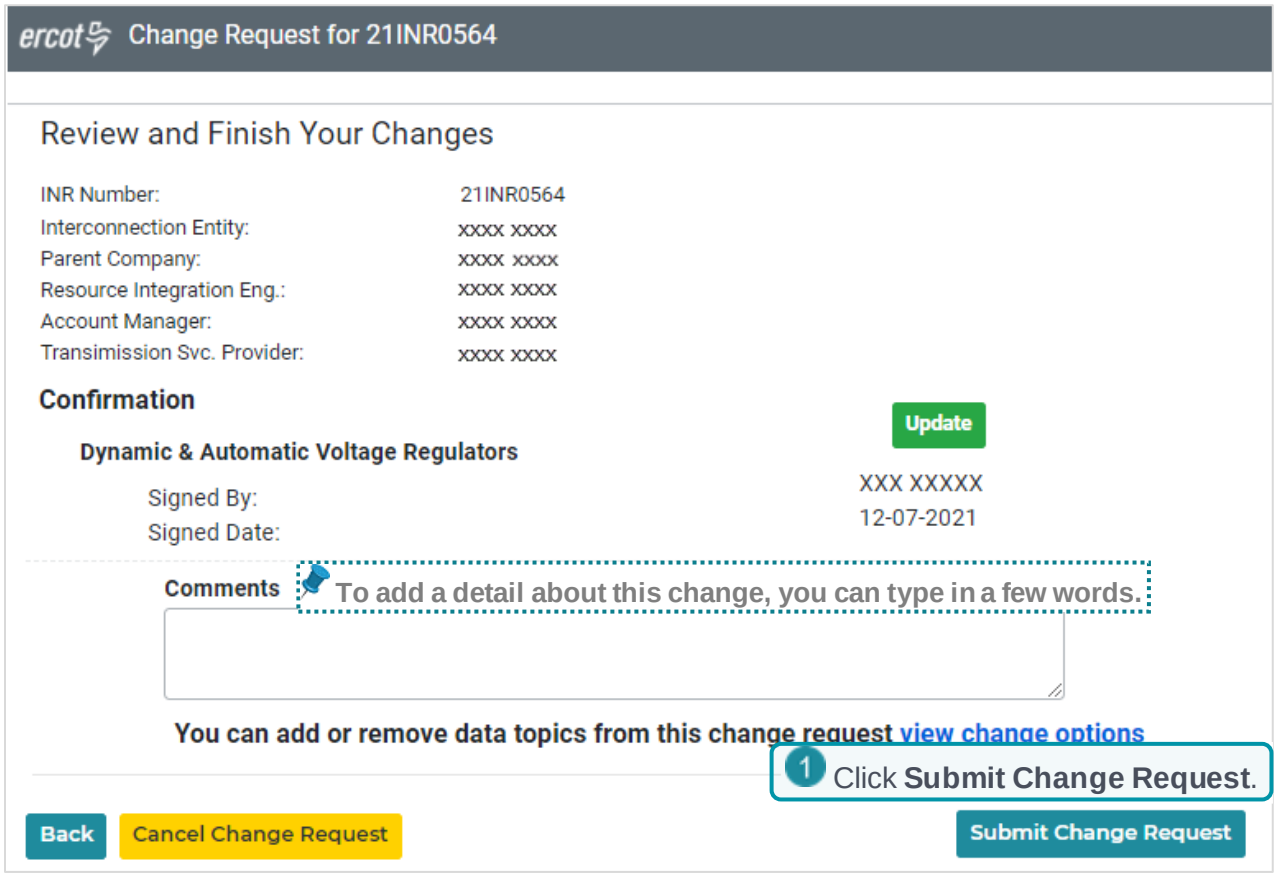
Select the Type of Change Request



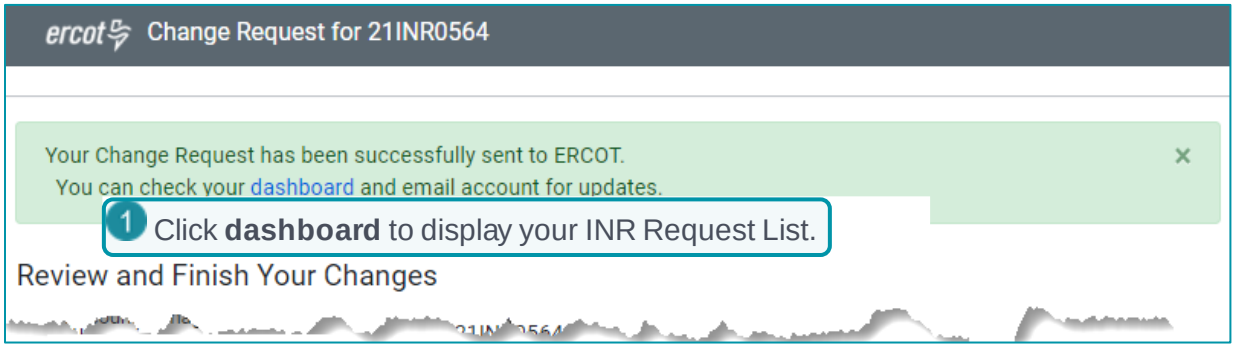
Sign the Confirmation Page



Submit Your Change Request



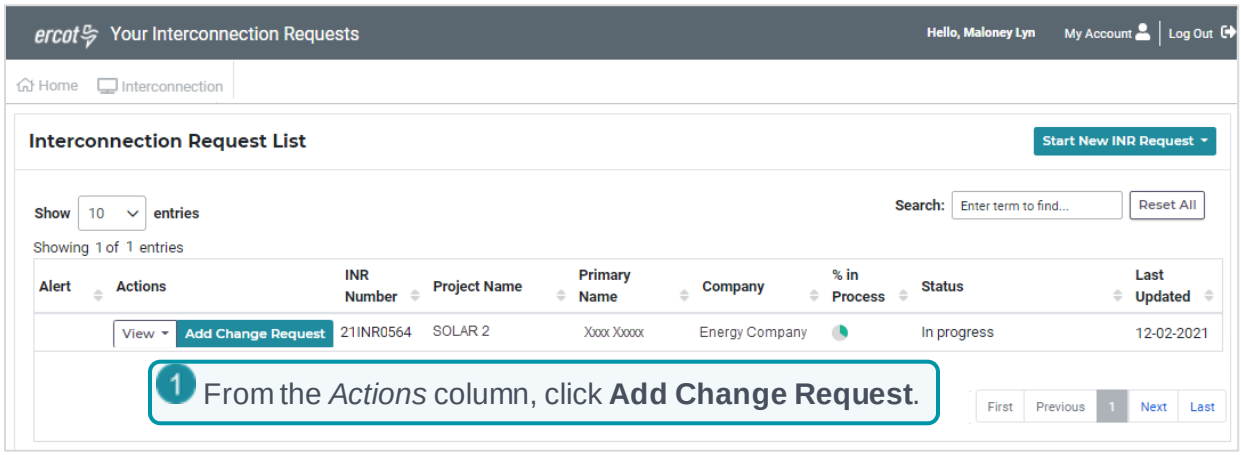
Change Request Successfully Sent Message



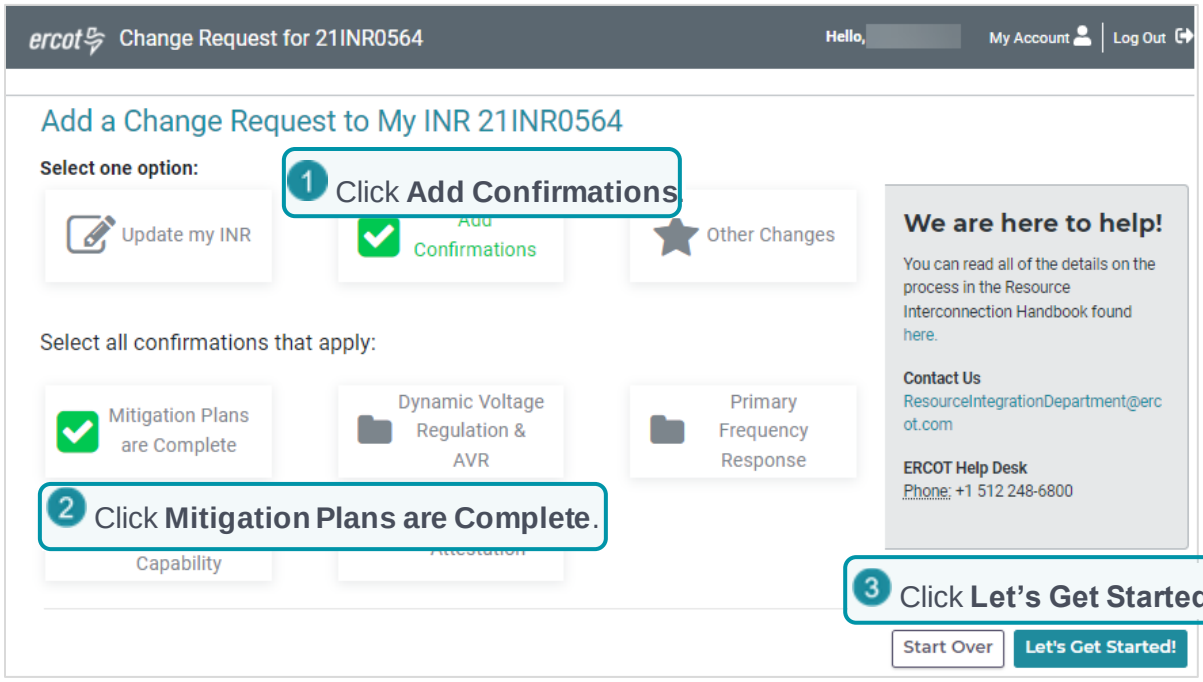
Confirming Study Mitigation Plans are Complete

You must confirm that your project will have system improvements or mitigation plans installed prior to synchronization as identified in the completed FIS Studies and an Reactive Power Study.

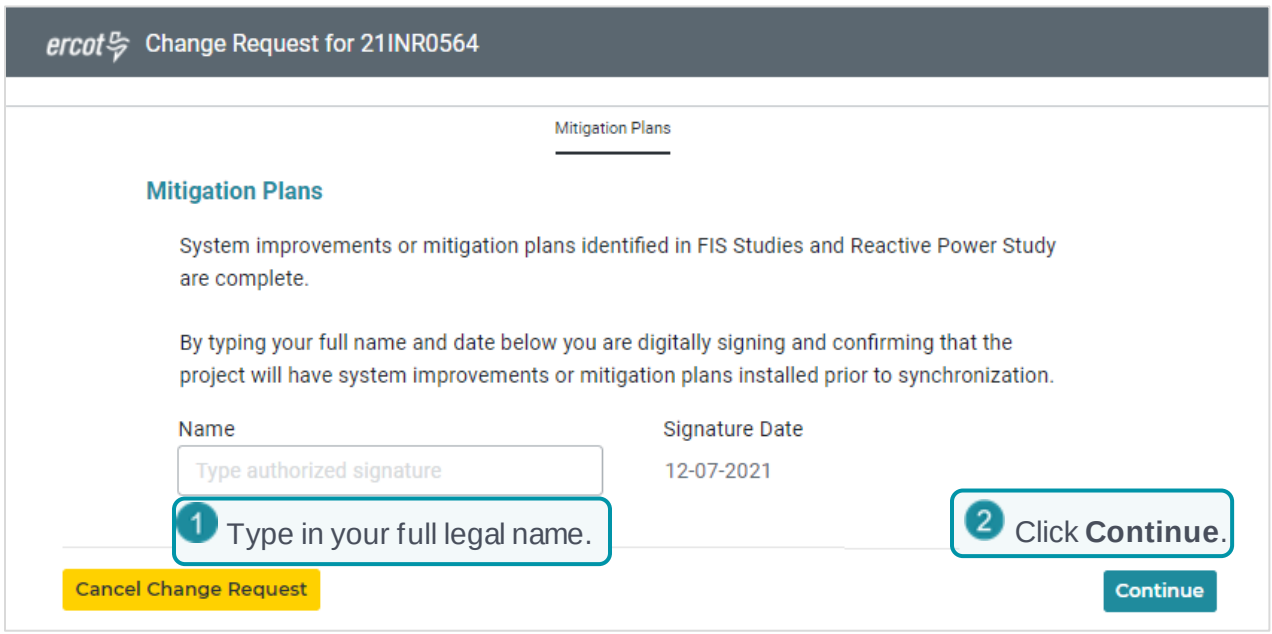
Add a Change Request from the Interconnection Requests List Page



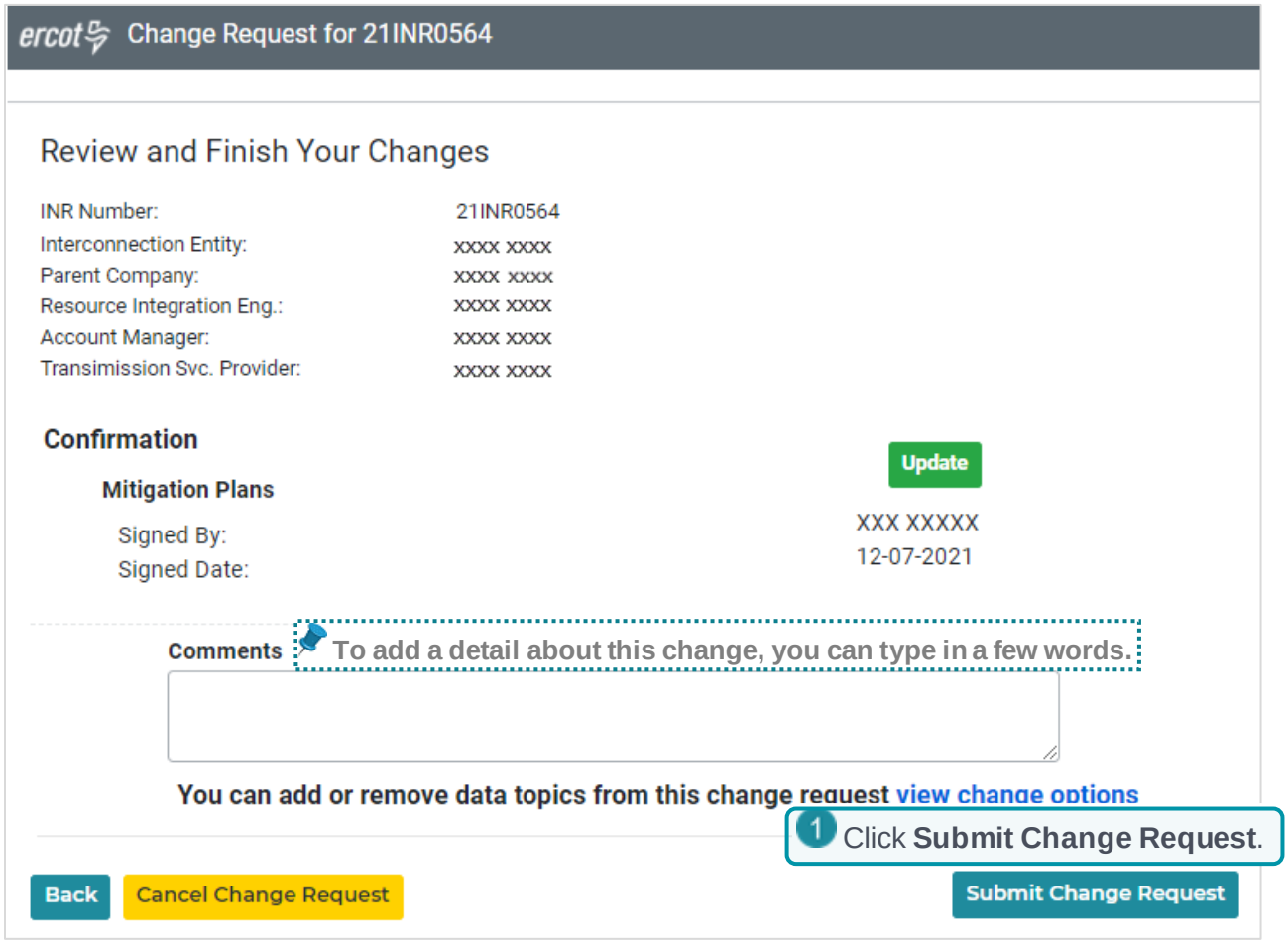
Select the Type of Change Request



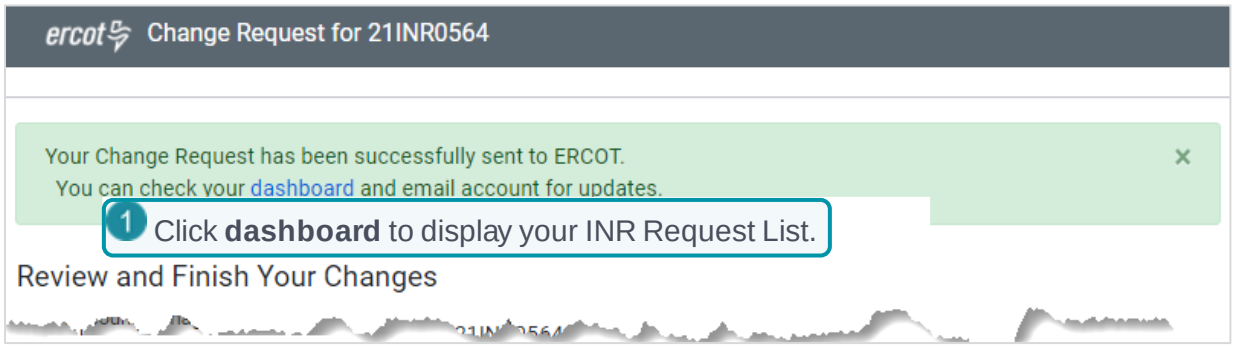
Sign the Confirmation Page



Submit Your Change Request



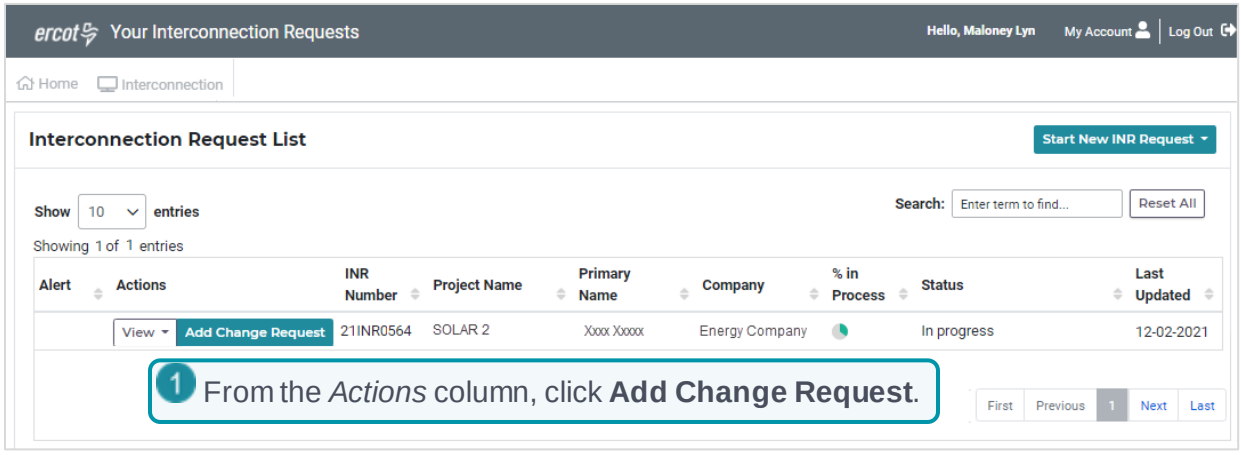
Change Request Successfully Sent Message



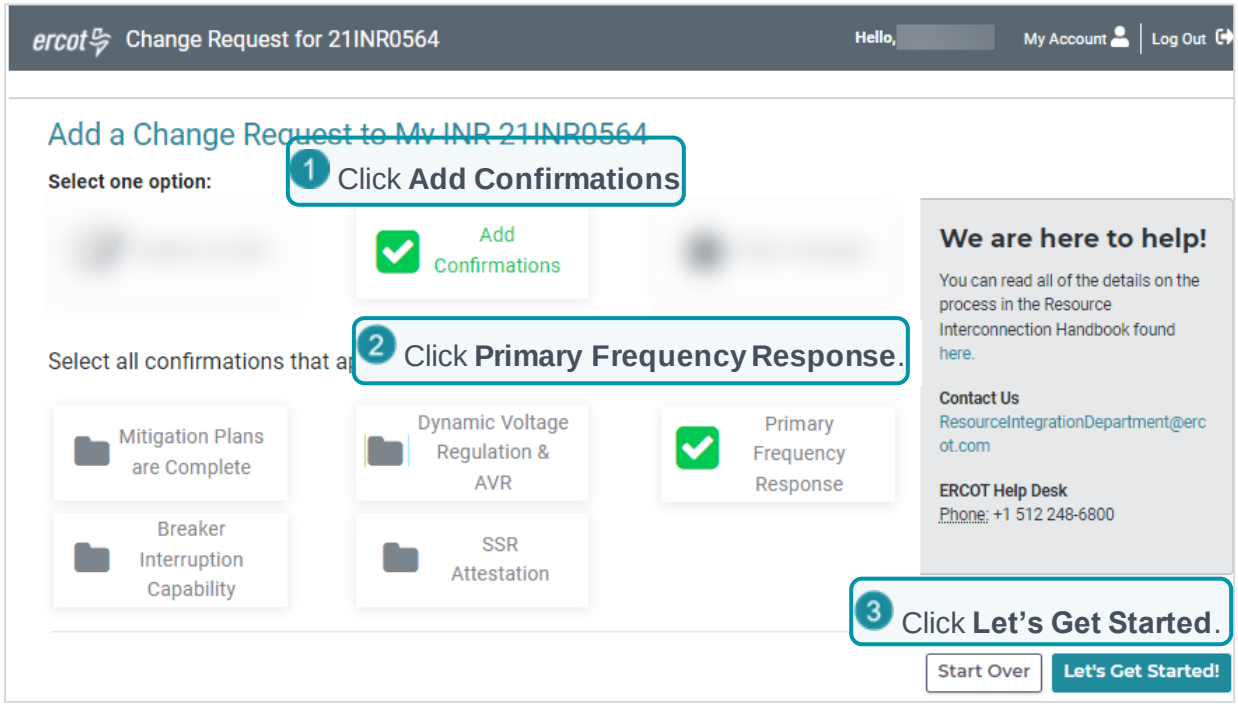
Confirming the Primary Frequency Response Capability

You must confirm that the resource is capable of Primary Frequency Response.

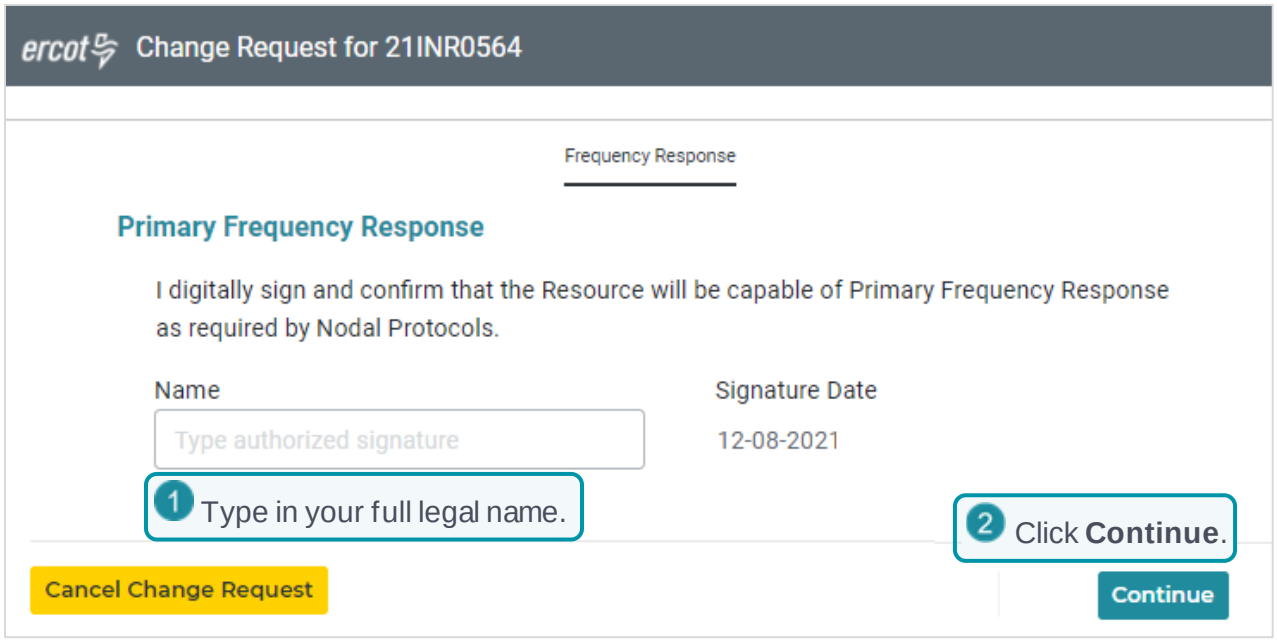
Add a Change Request from the Interconnection Requests List Page



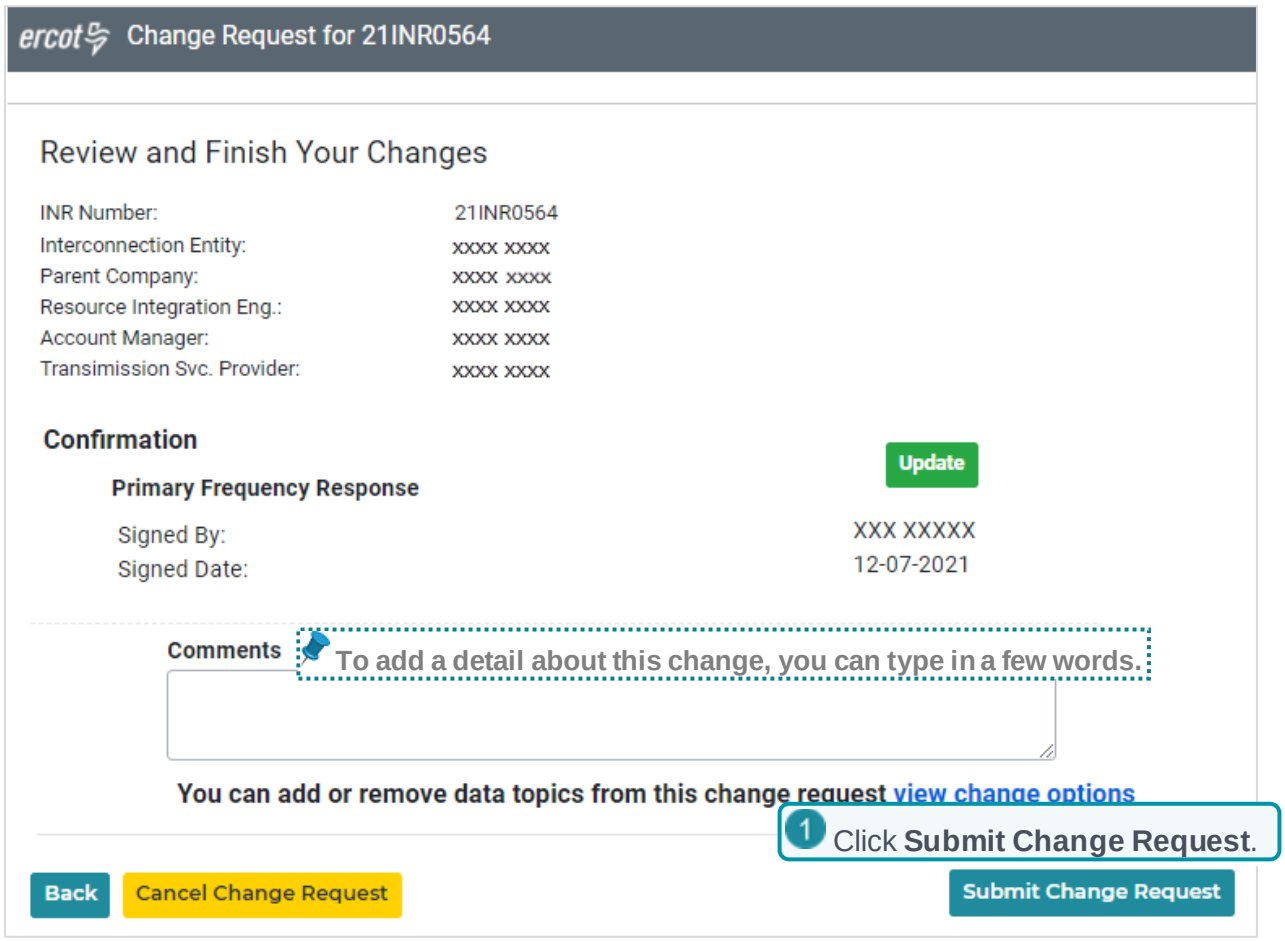
Select the Type of Change Request



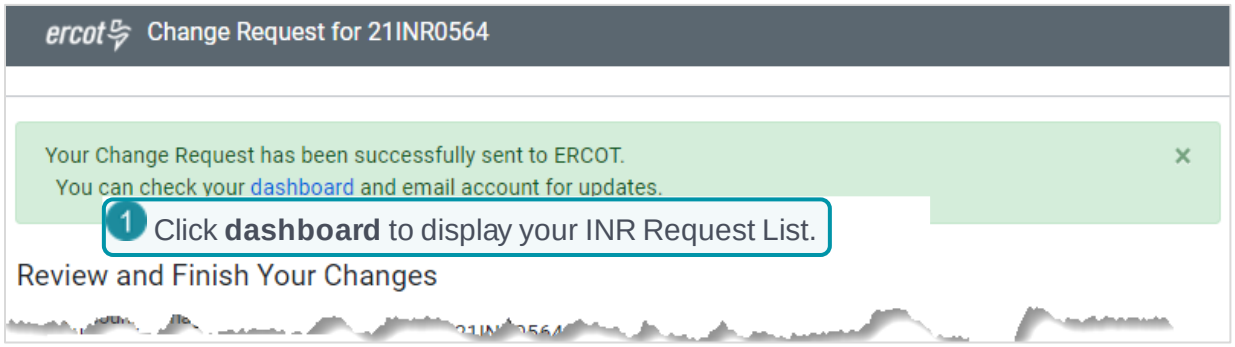
Sign the Confirmation Page



Submit Your Change Request



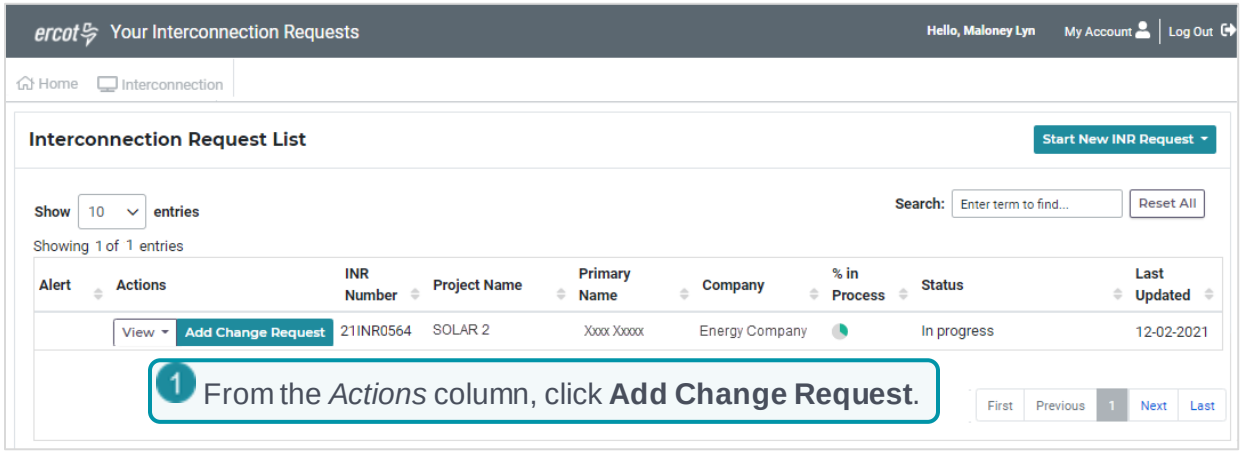
Change Request Successfully Sent Message



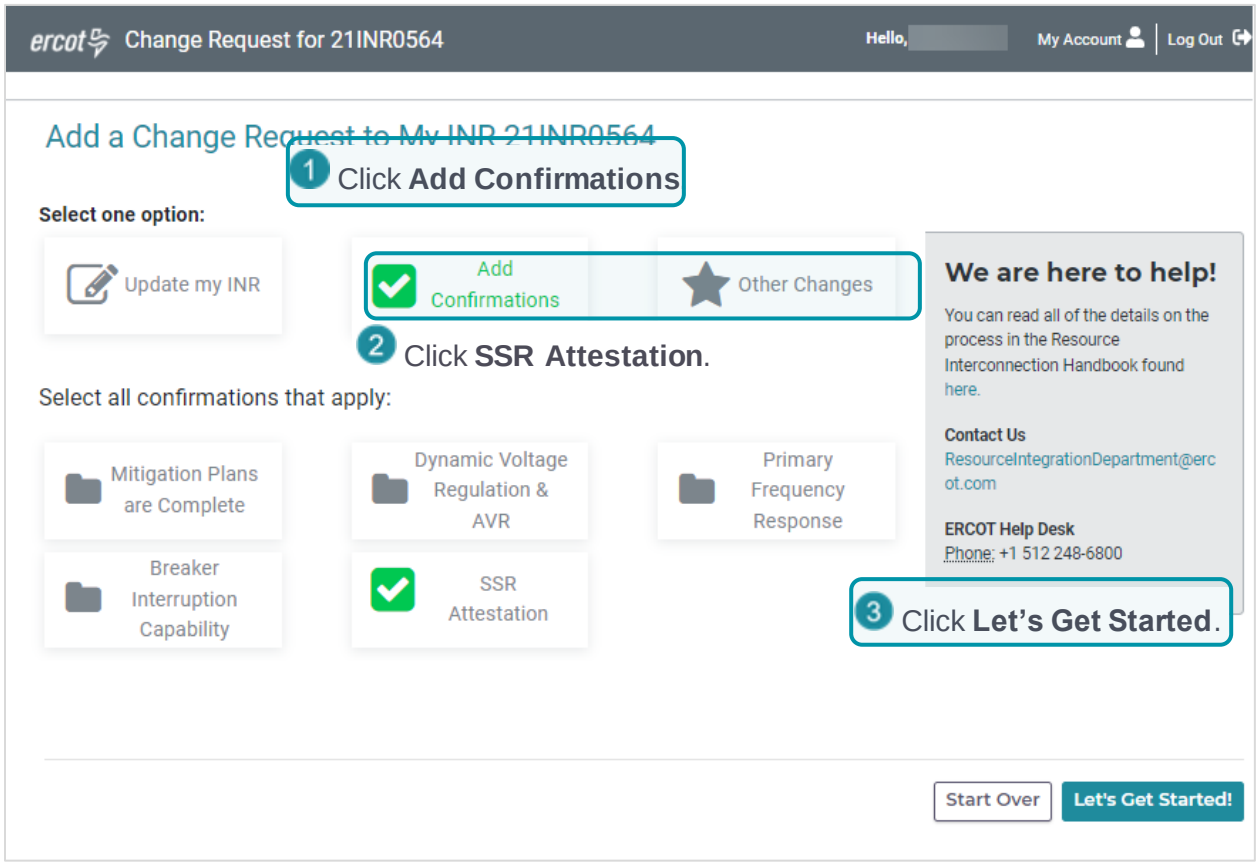
Confirming Subsynchronous Resonance Mitigation

You must confirm that required SSR mitigation equipment will be functional prior to initial synchronization of the resource.

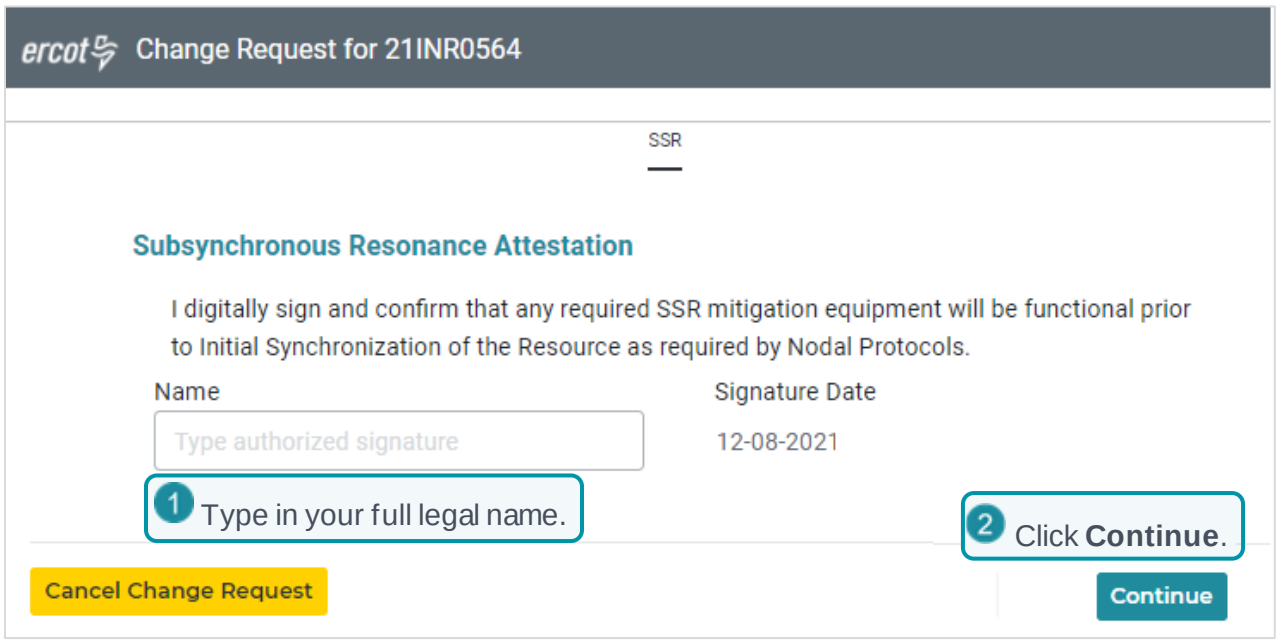
Add a Change Request from the Interconnection Requests List Page



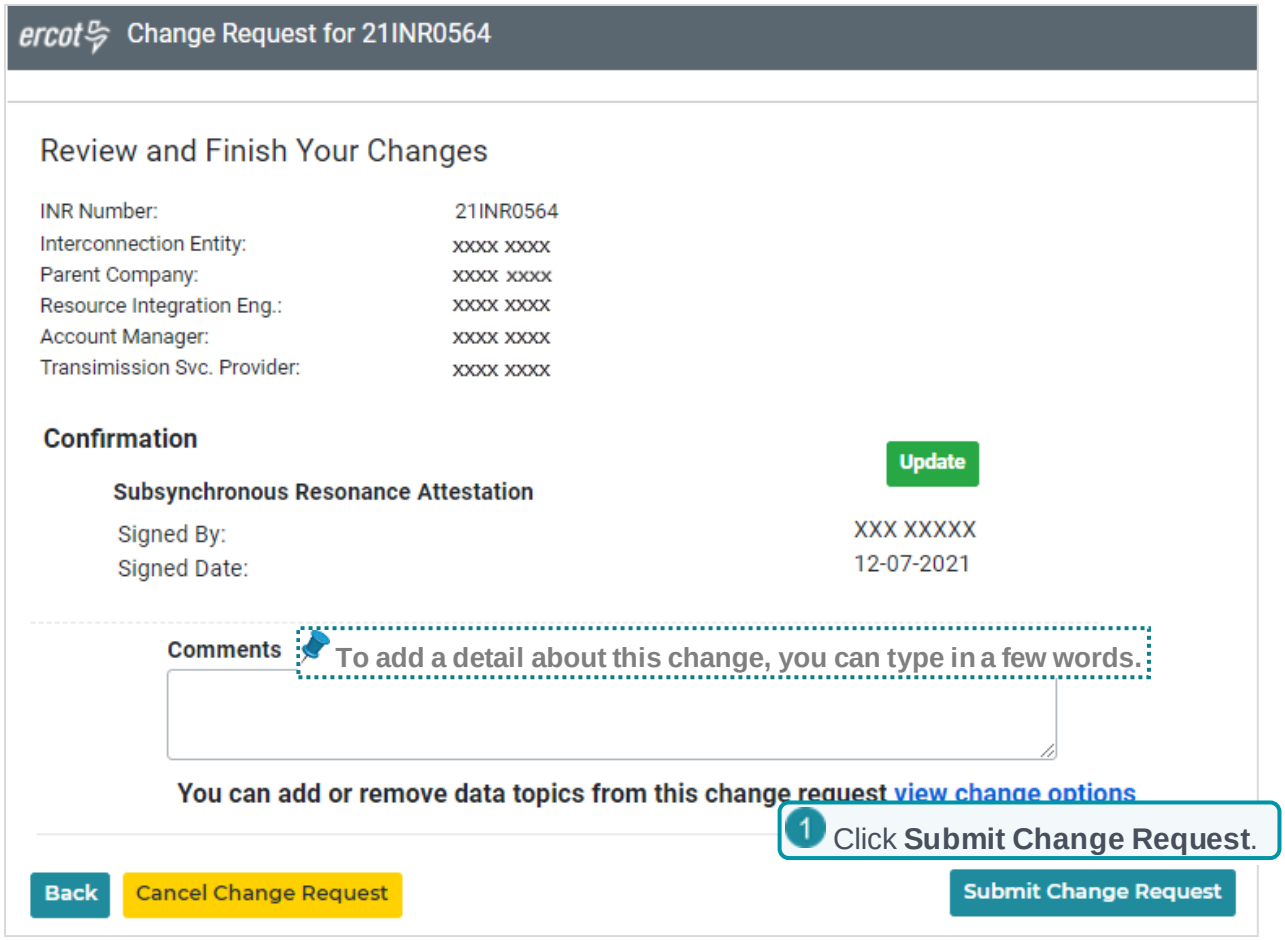
Select the Type of Change Request



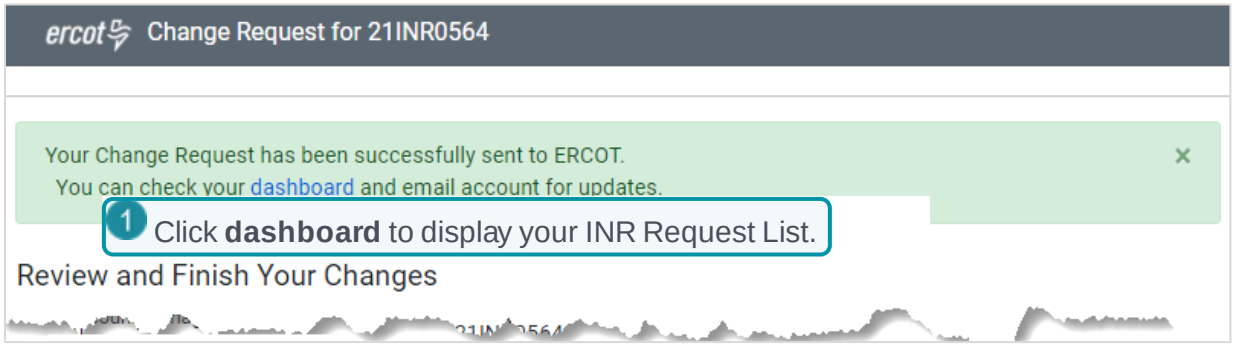
Sign the Confirmation Page



Submit Your Change Request



Change Request Successfully Sent Message



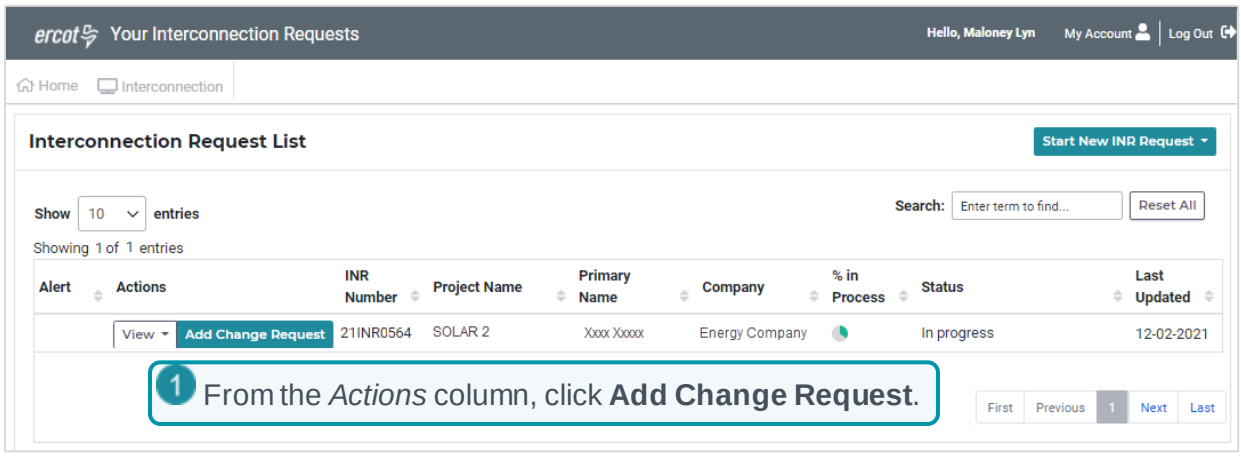
Selling Your Project

As an IE, you can sell your project to another IE or an RE. You are removed as the primary contact on the account and must supply the email address of the new contact.

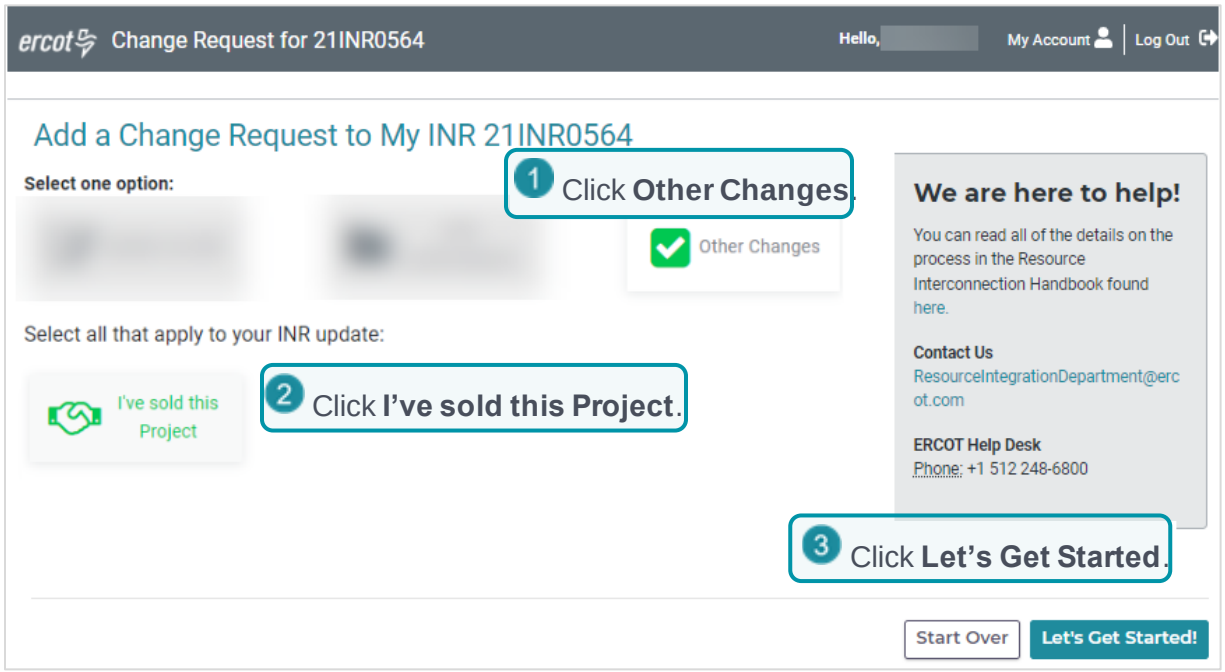
As an RE, you can sell your project to an IE or another RE. You are removed as the primary contact on the account and must supply the email address of the new contact and the new company.

You can attach any important documents to the INR about the sale.

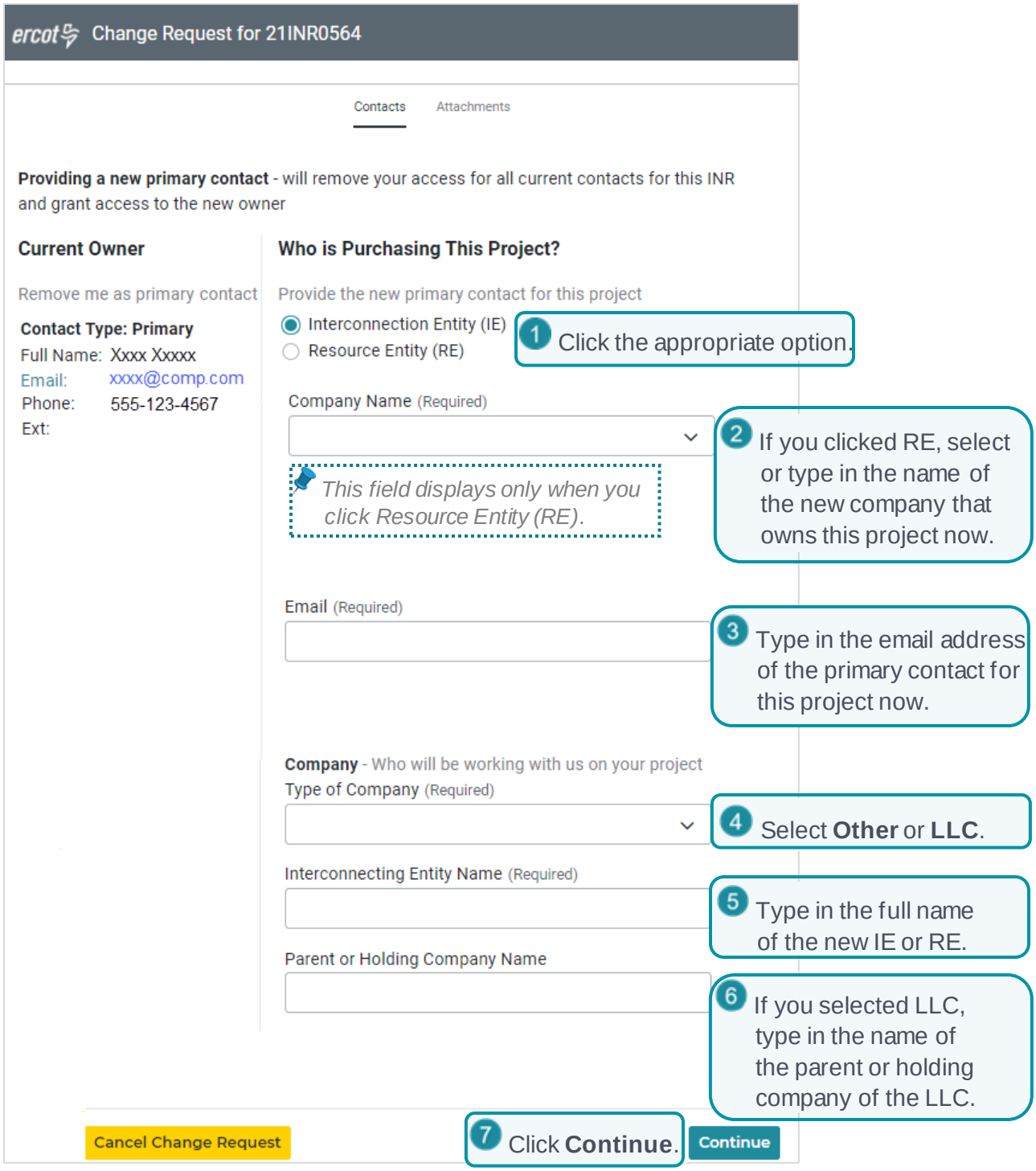
Add a Change Request from the Interconnection Requests List Page



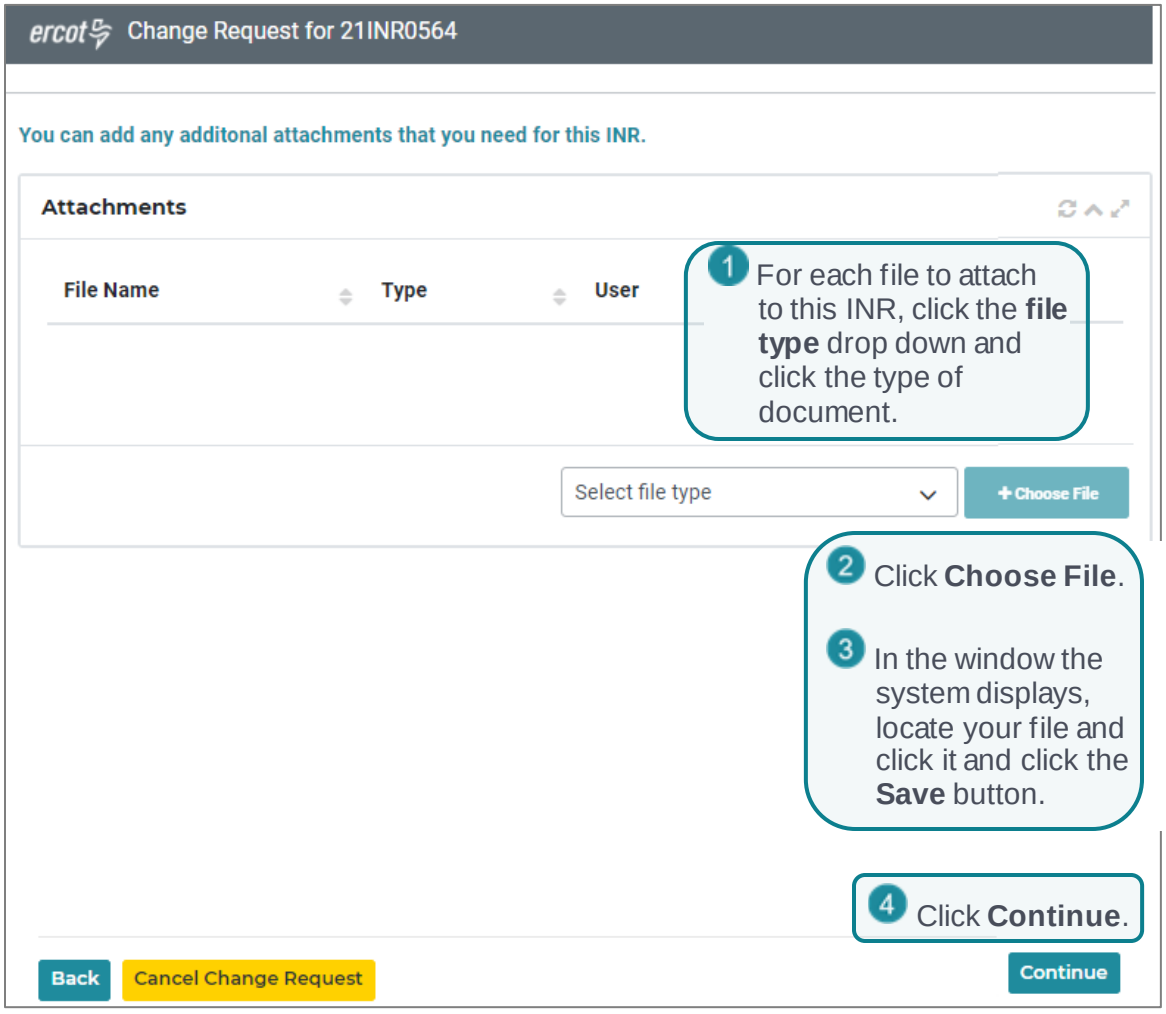
Select the Type of Change Request



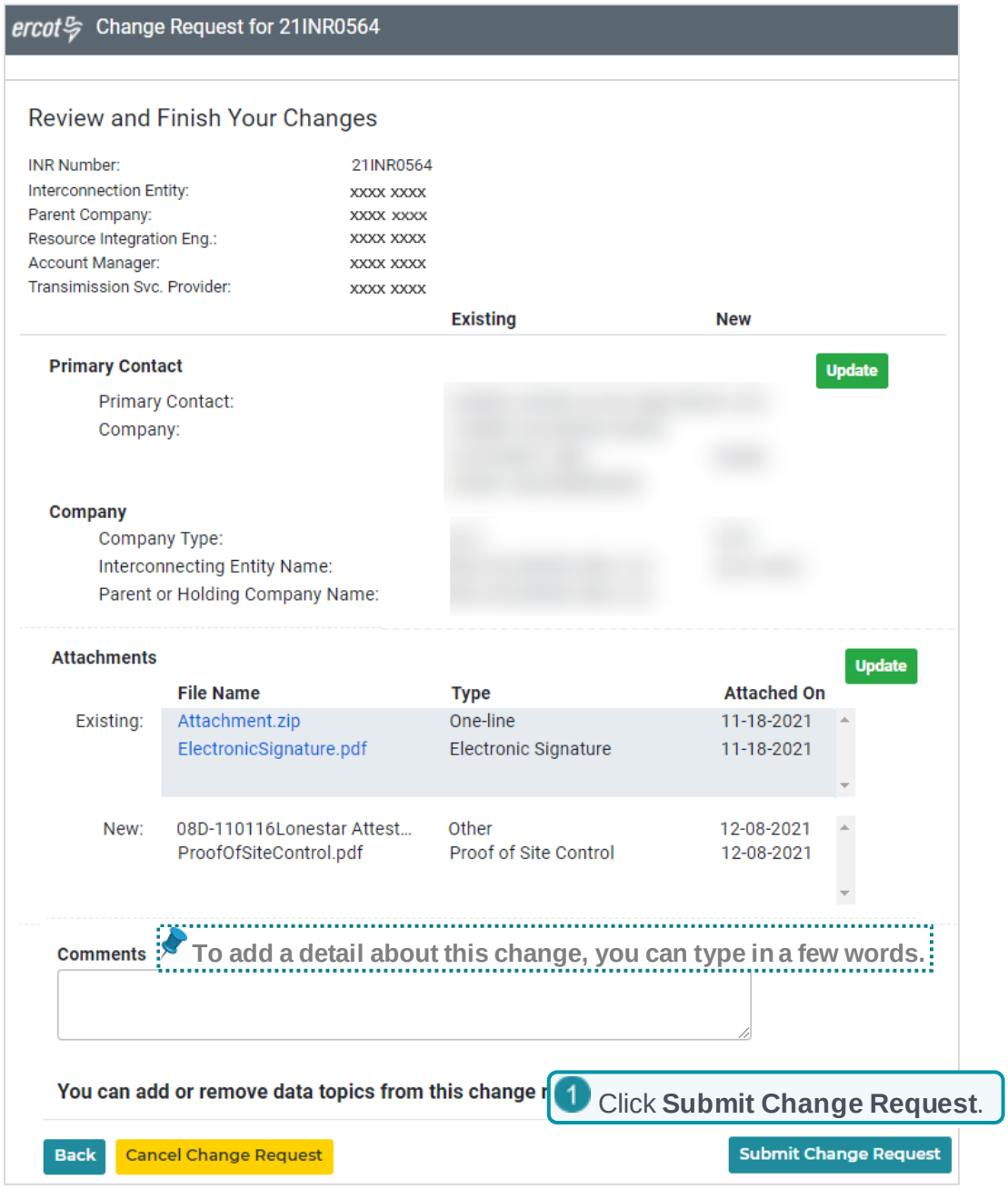
Complete Seller Information



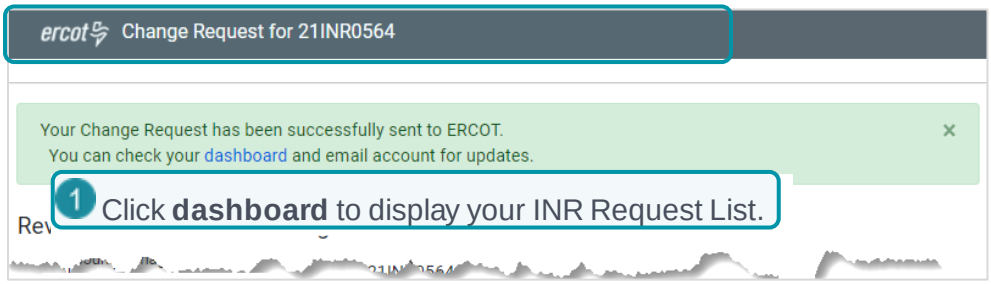
Attach Important Documents



Submit Your Change Request



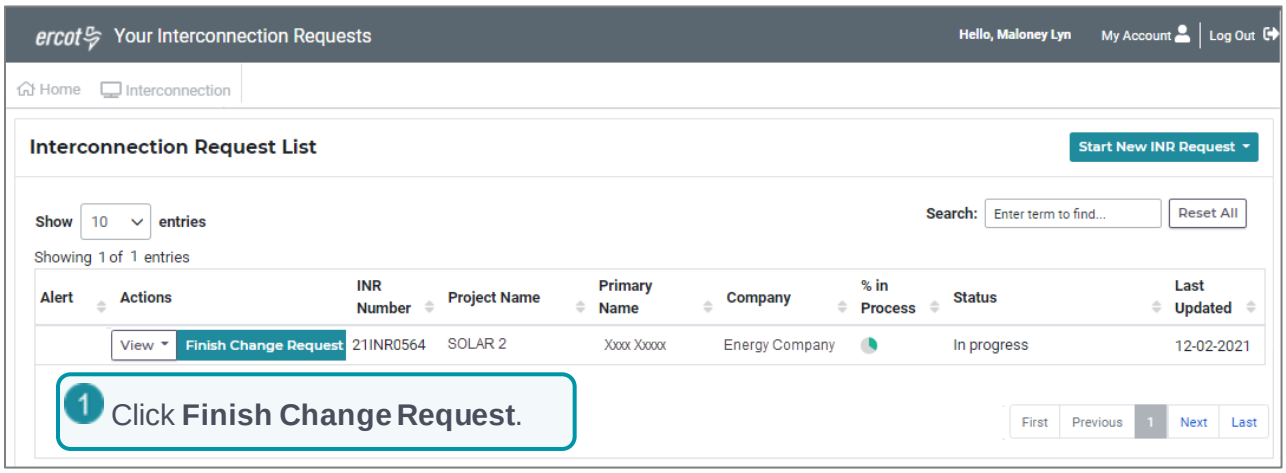
Change Request Successfully Sent Message



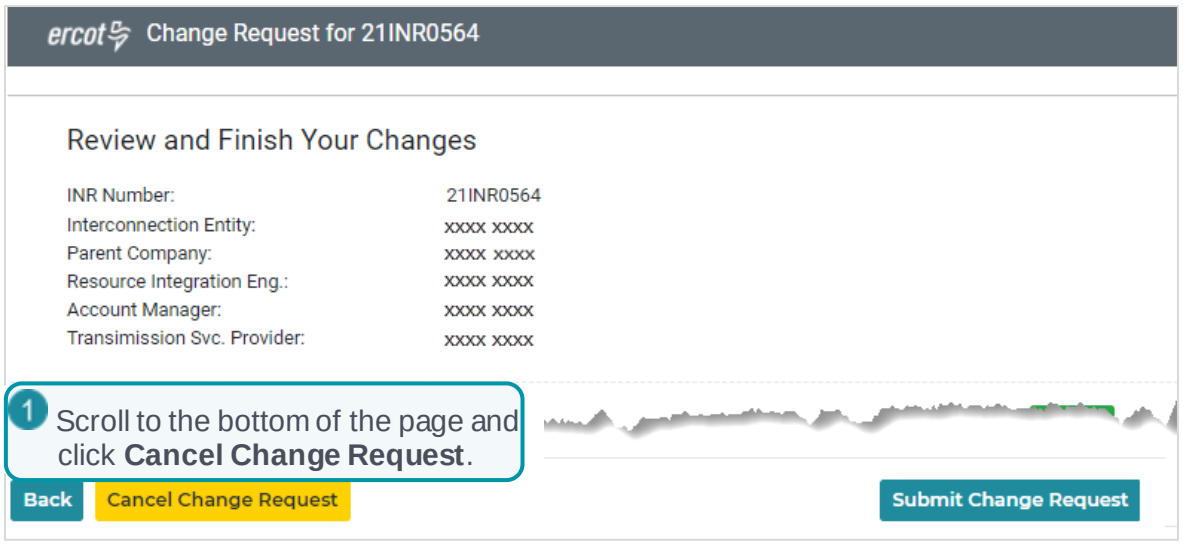
Cancelling a Change Request

You can cancel an unfinished change request online until ERCOT has processed it and merged it into the project.

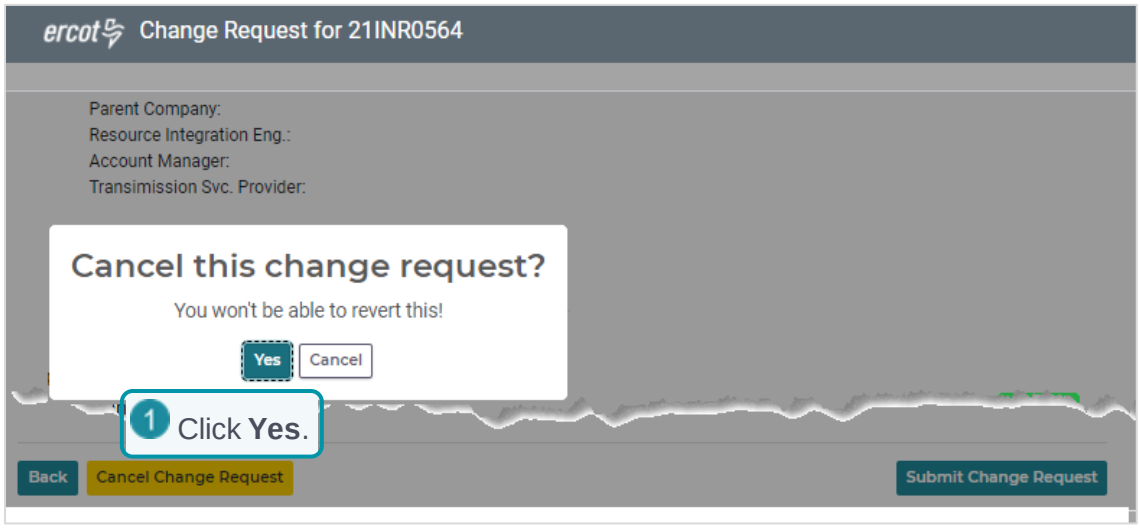
Open the Unfinished Change Request



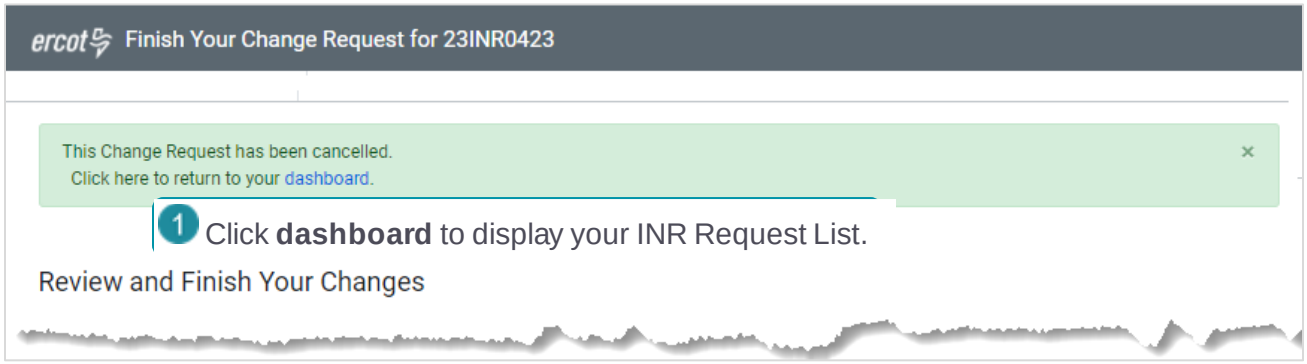
Cancel the Change Request



Confirm the Cancel



View the Success Message on the Review Page



Managing the Contacts On Your Project

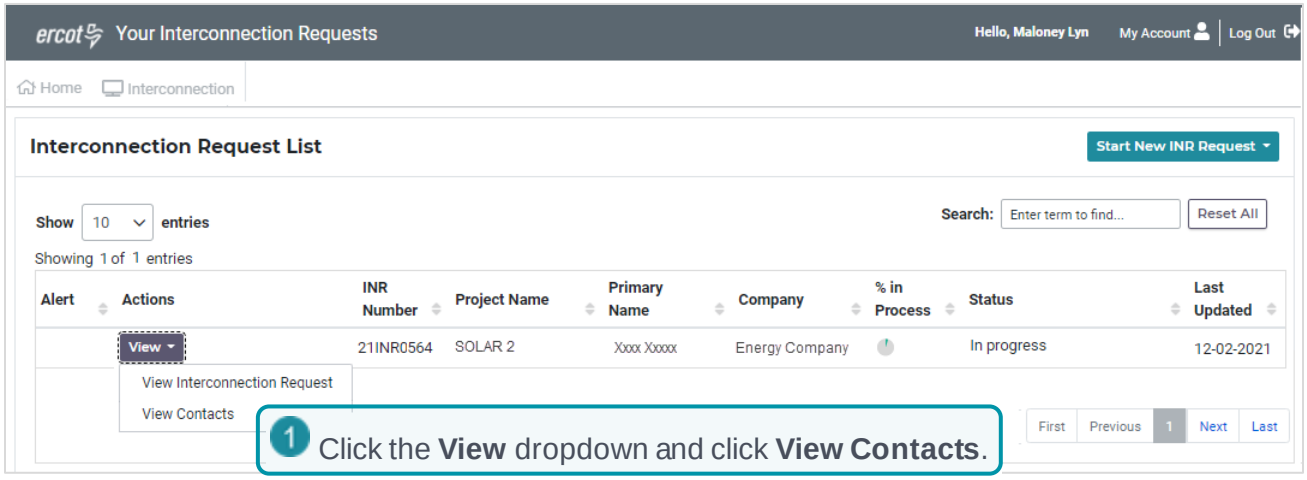
The project owner is the Primary Contact. Backups and other contacts that you have invited to join the project are displayed on cards on the All Contacts page.

If you need to change a contact to a Backup contact, you must delete the contact and add the contact again specifying that the person is a Backup contact.

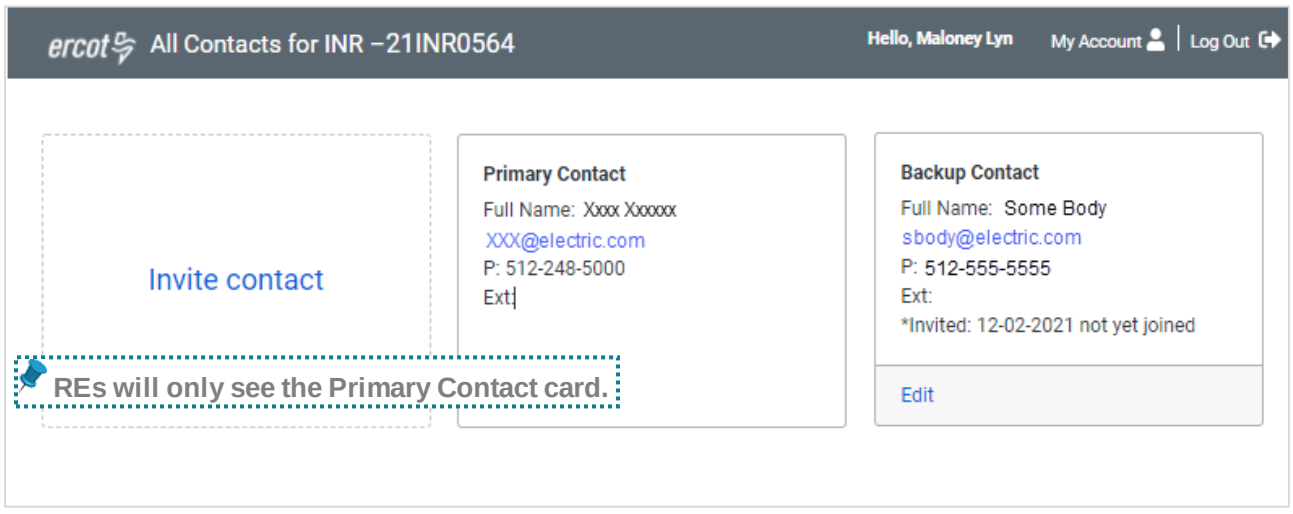
Viewing Project Contacts

From the Interconnection Requests List, you can use the View menu button to display the contact cards of people you have added to your project. Viewing the cards can help you determine who has joined the project and who has yet to join.

Select View Contacts from INR List



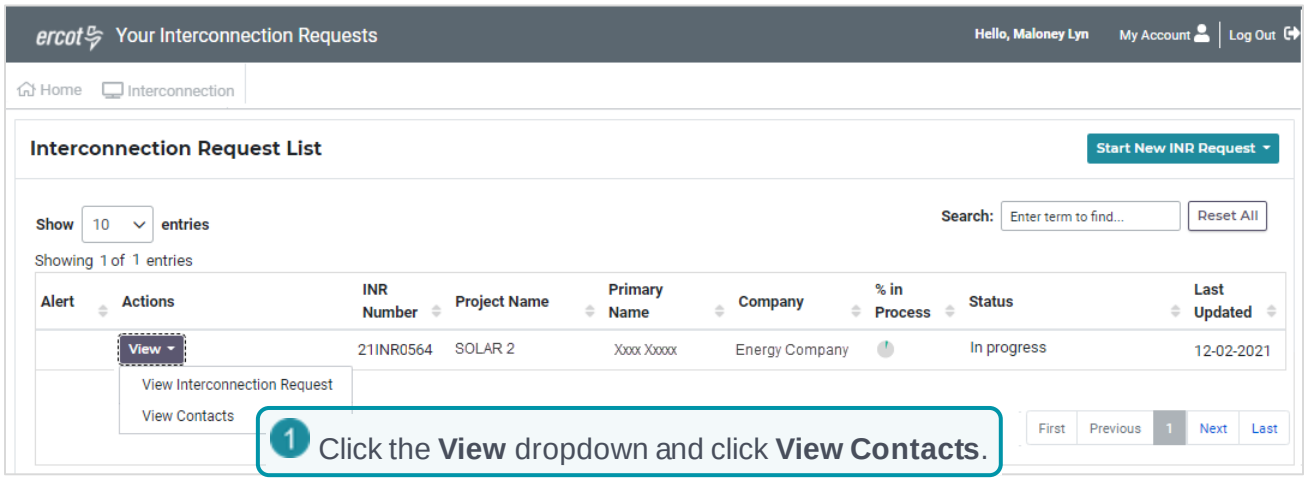
View the Contact Cards



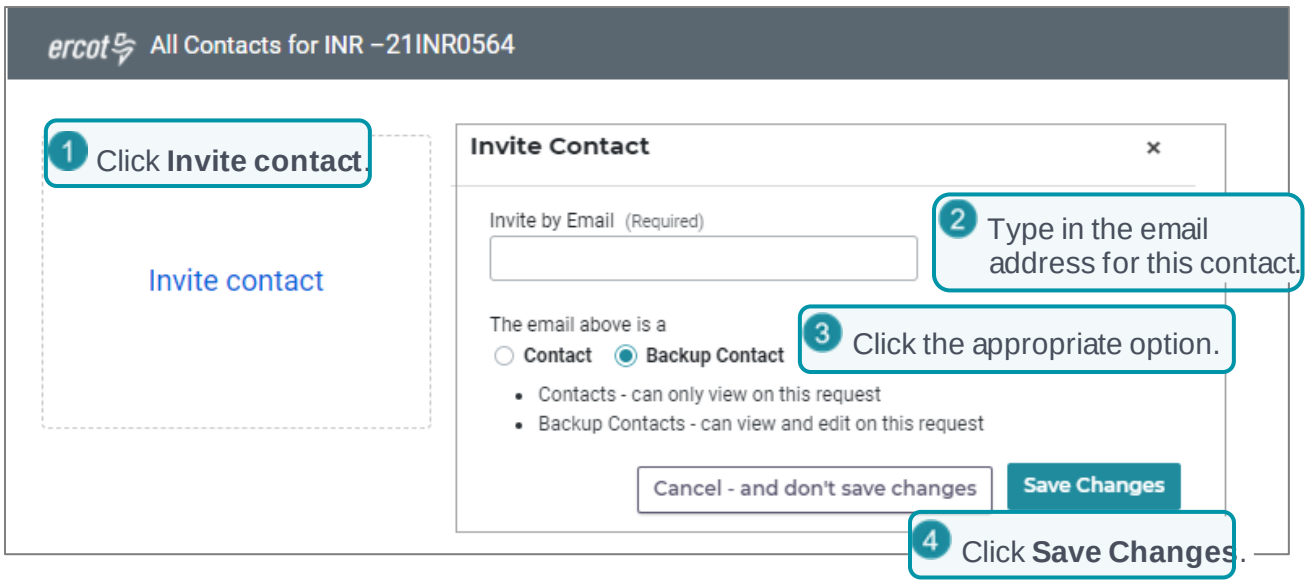
Inviting New Contacts to Join Your Project (IEs only)

You can invite others to join the project and designate them as backup contacts who can view, edit, and invite others to work on the project or additional contacts who can view the project. ERCOT sends the invited contact an email with instructions on how to sign up and join the project.

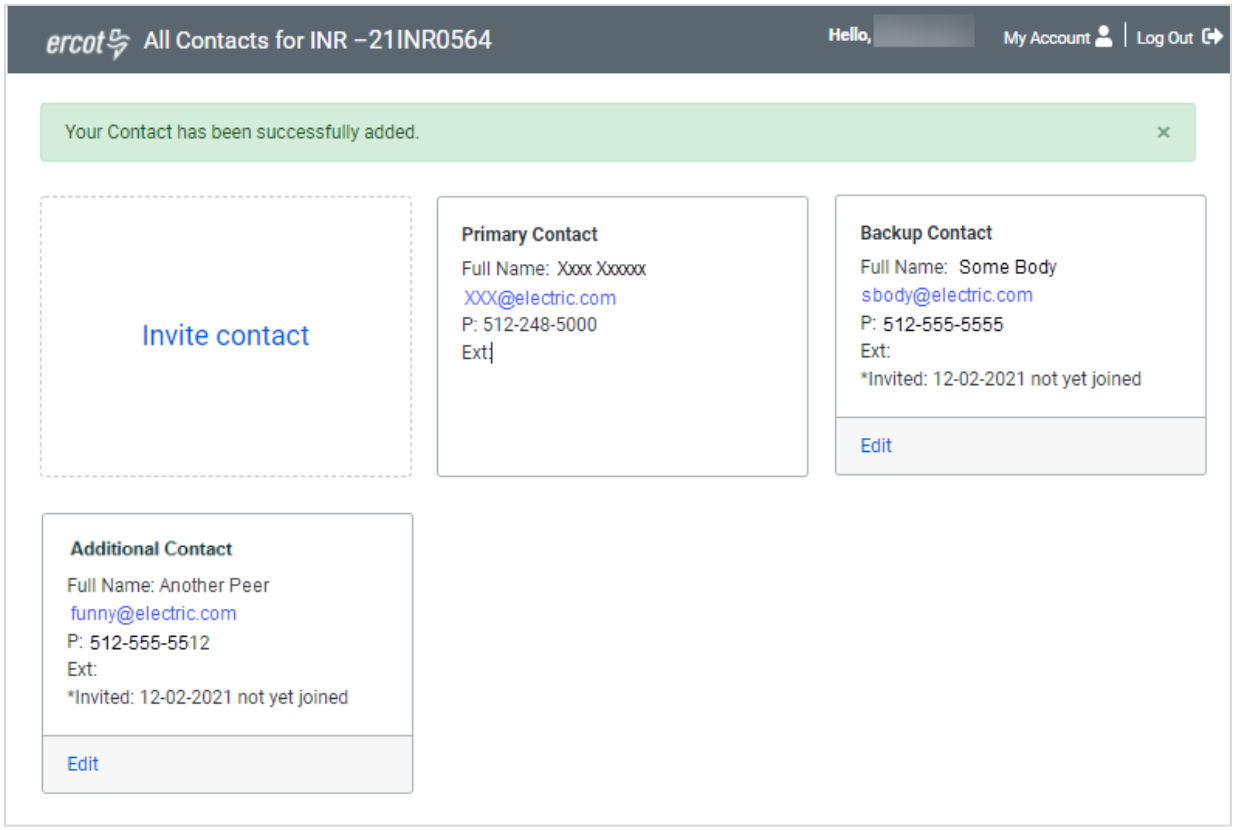
Select View Contacts from INR List



Invite a New Contact



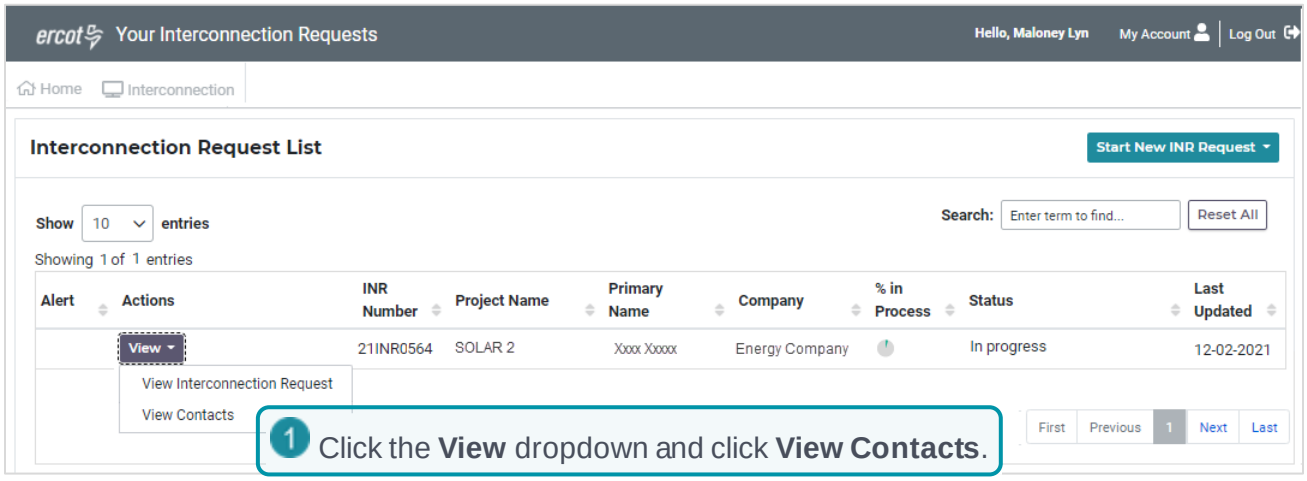
View the Contact Successfully Added Message



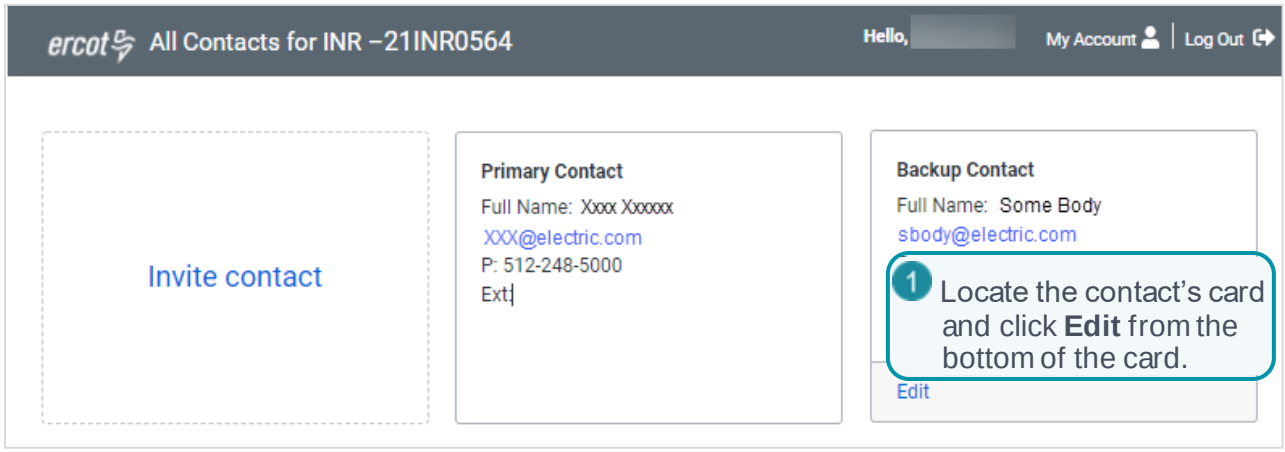
Editing Contact Information

You can edit the email address of contacts who have not yet joined this project.

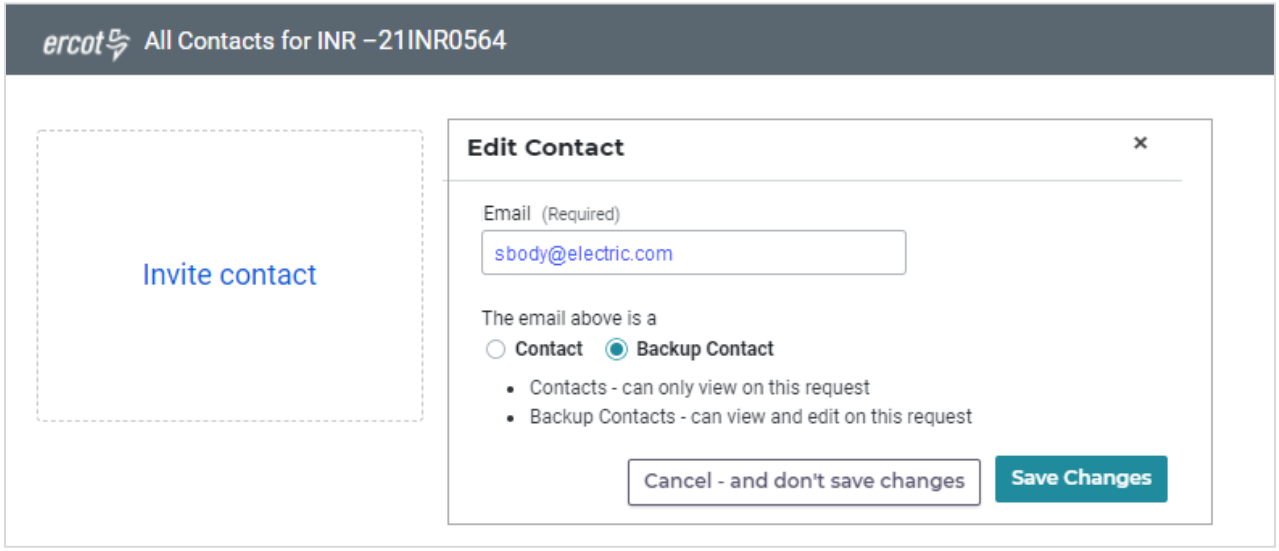
Select View Contacts from INR List



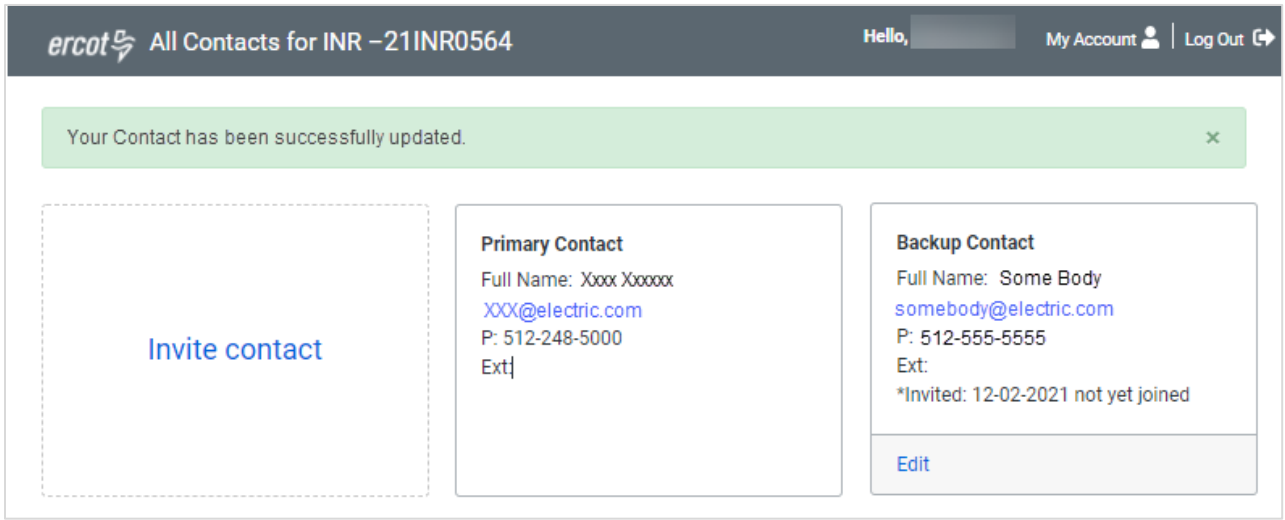
Locate the Contact's Card



Edit the Information



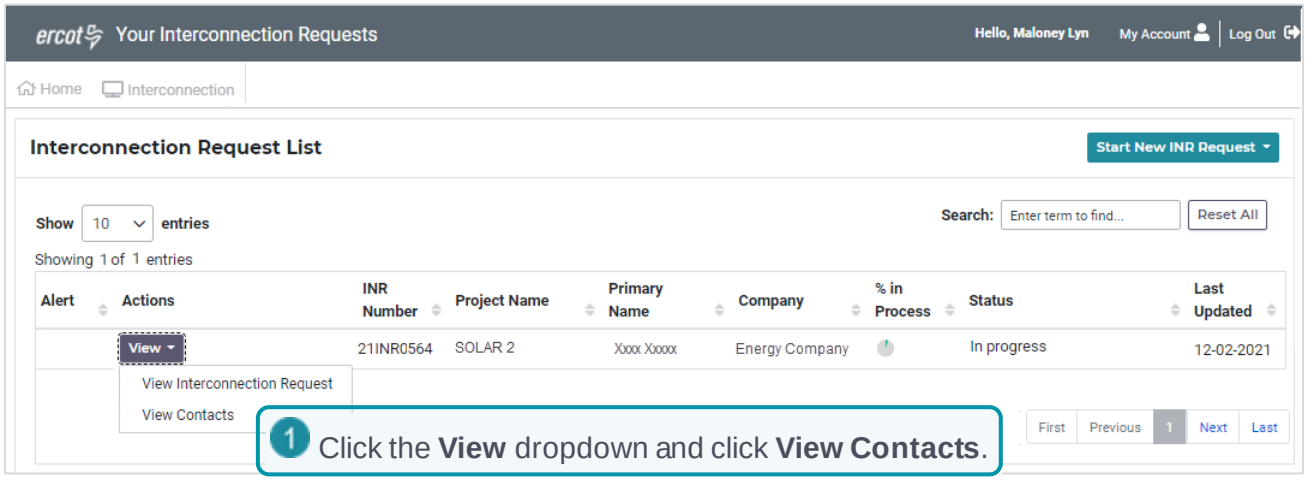
View the Contact Successfully Updated Message



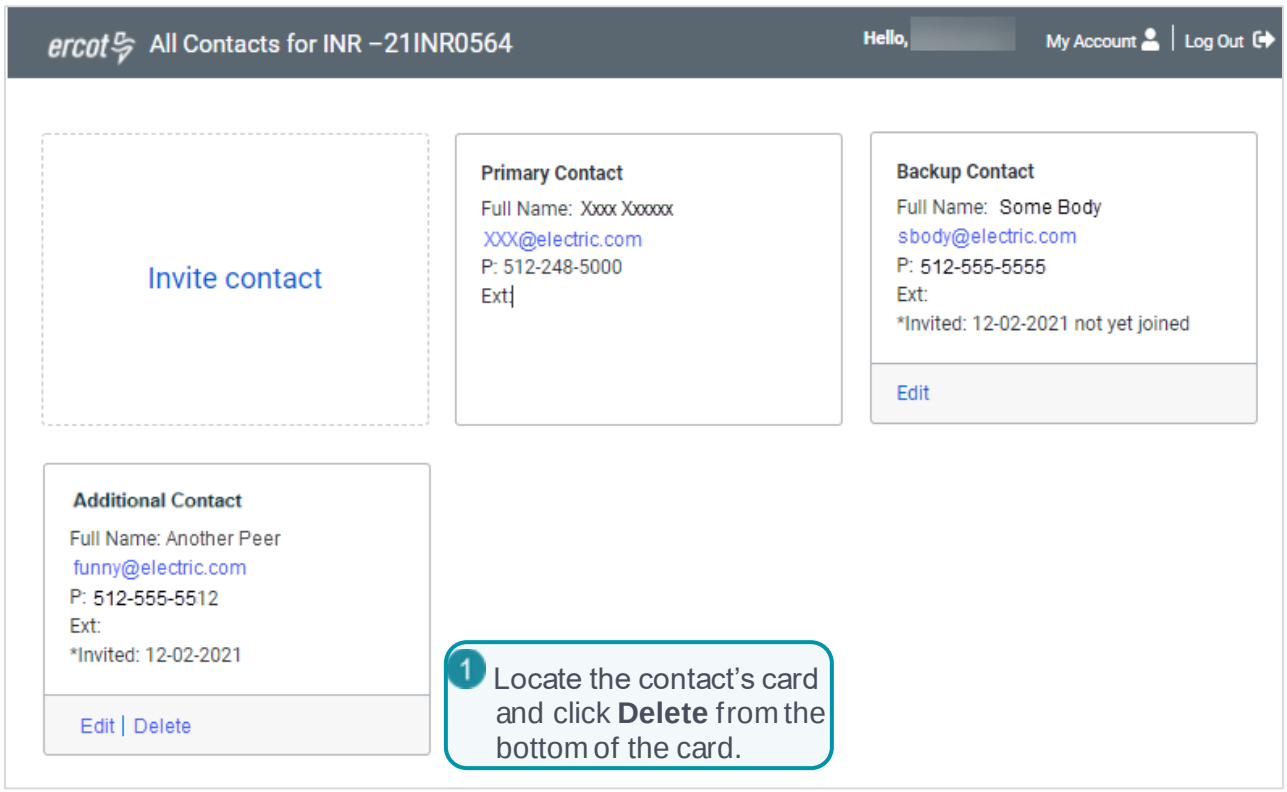
Removing a Contact from the Project

You can remove a contact unless the contact is your only Backup Contact. You should invite a new Backup Contact and when that contact joins, you can delete the original Backup Contact card.

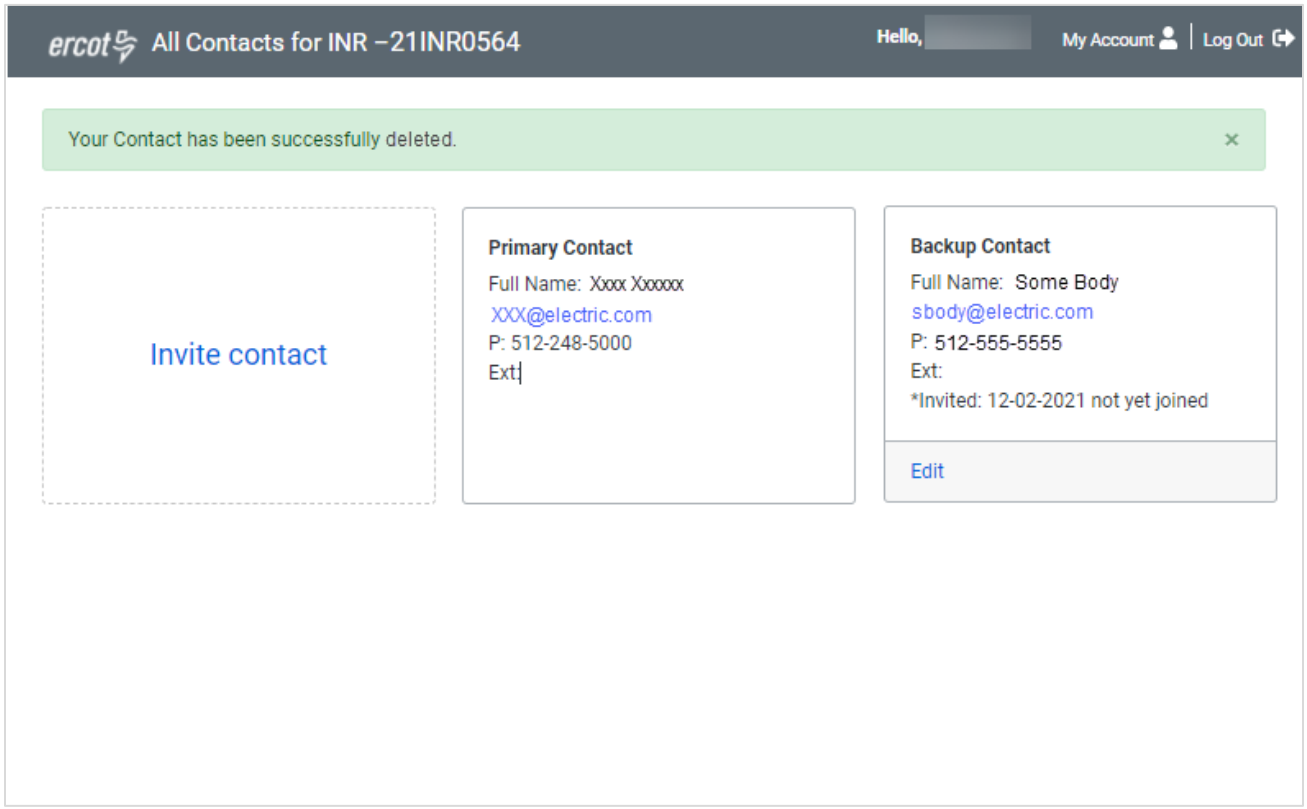
Select View Contacts from INR List



Locate the Contact's Card



View the Contact Successfully Deleted Message

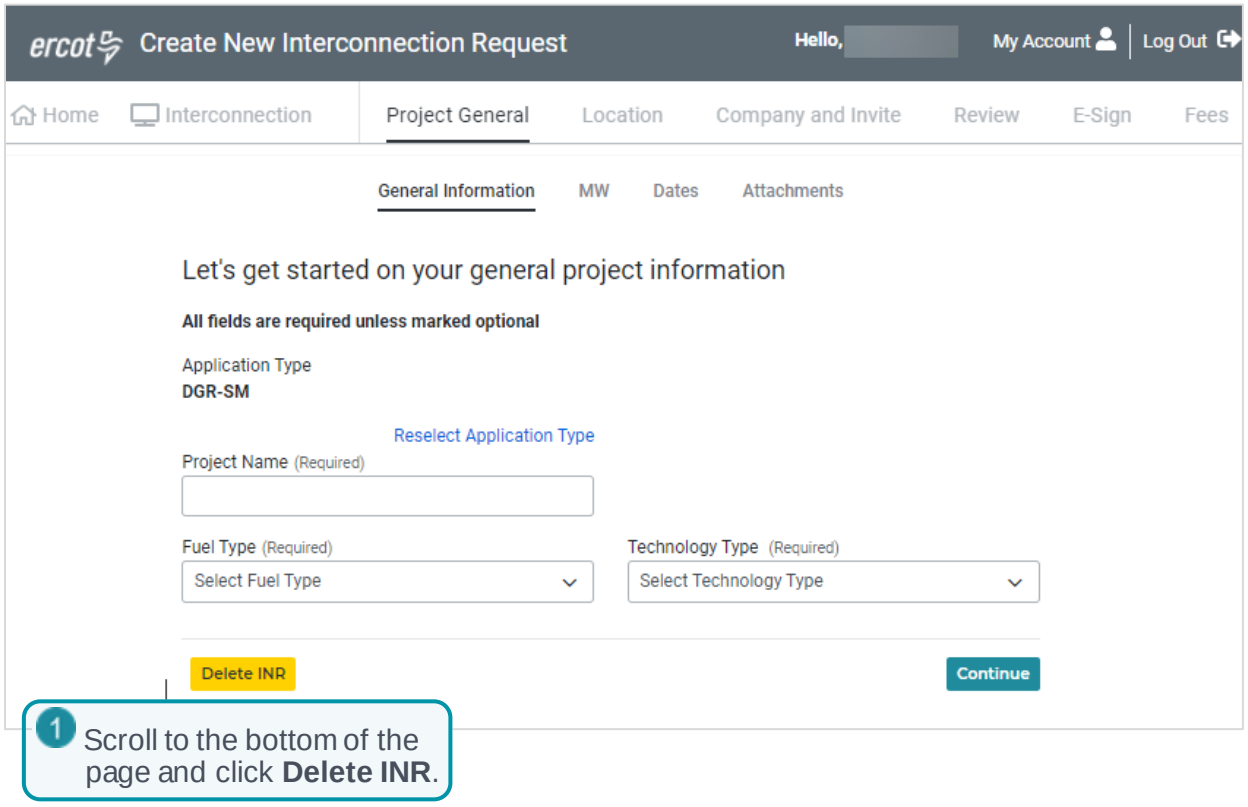


Deleting an Unsubmitted INR

You can delete an INR to remove it from your Interconnection Request List before you have submitted it from any page as you are working by clicking the **Delete INR** button at the bottom of any page or by clicking Finish INR on the Interconnection Request List. :You can cancel an INR that you have submitted to ERCOT.

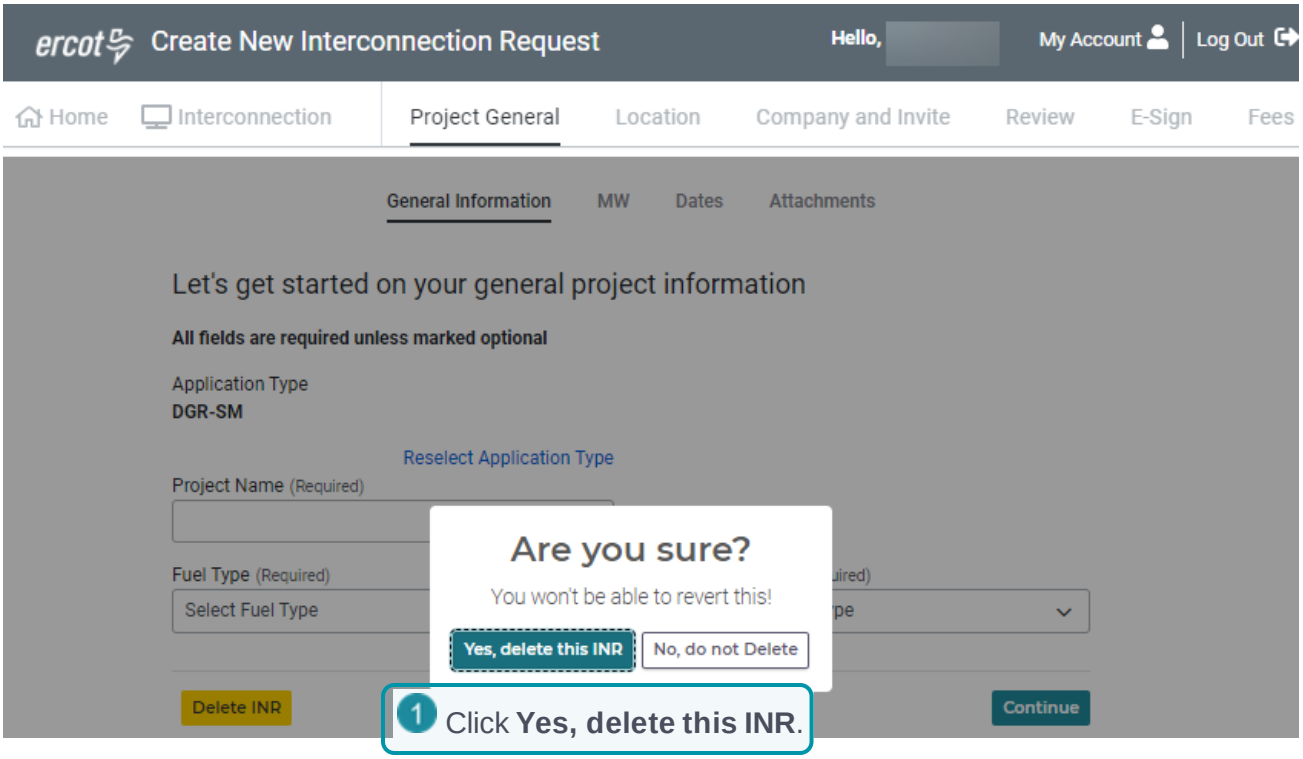
Deleting the INR While Working on Your INR

Delete the INR

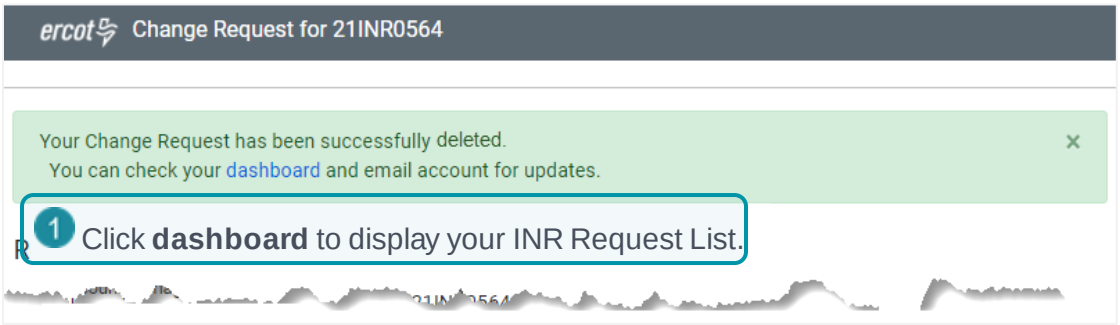


1 Scroll to the bottom of the page and click **Delete INR**.

Confirm the Deletion

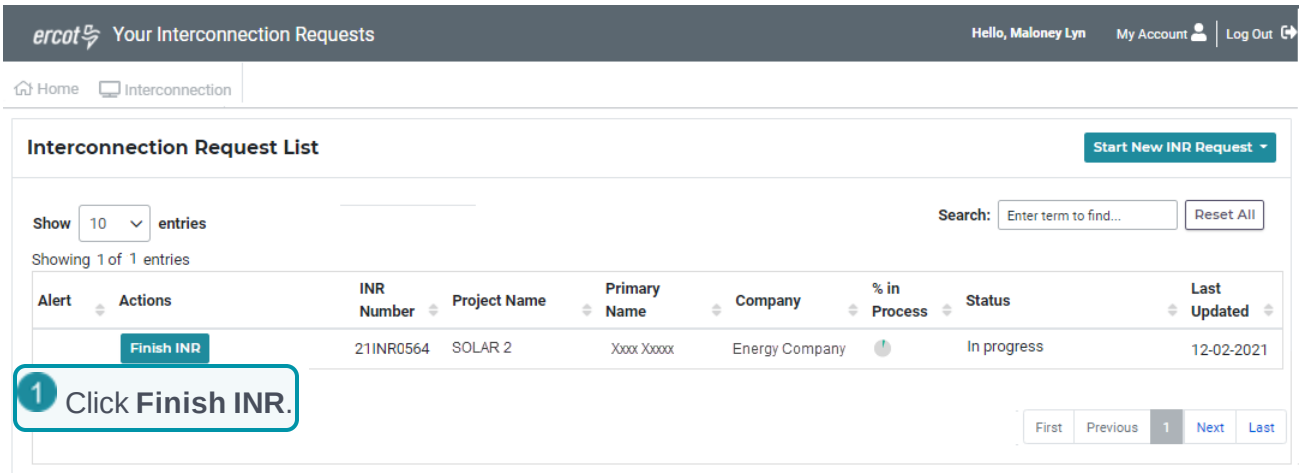


View Successfully Deleted Message

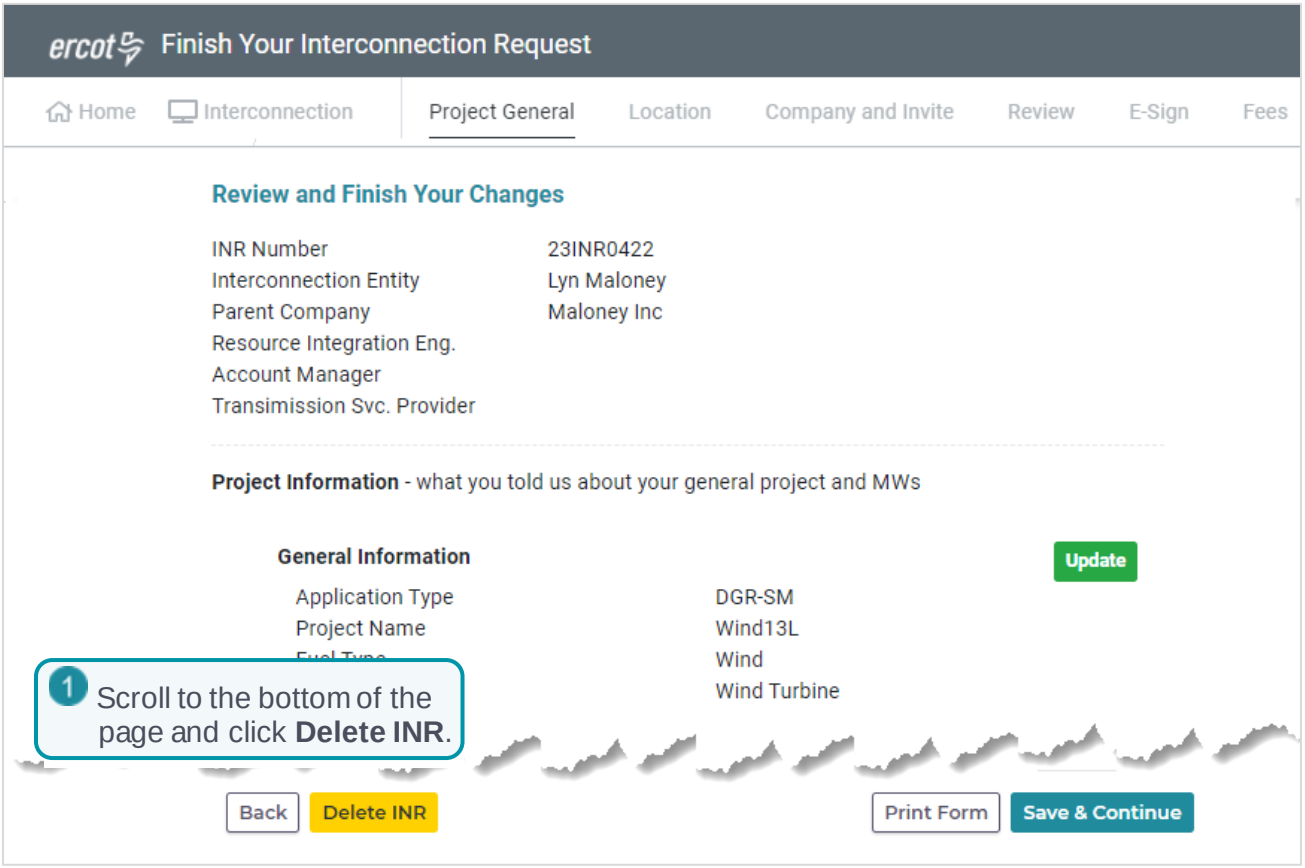


Deleting an Unfinished INR from the Interconnection Request List

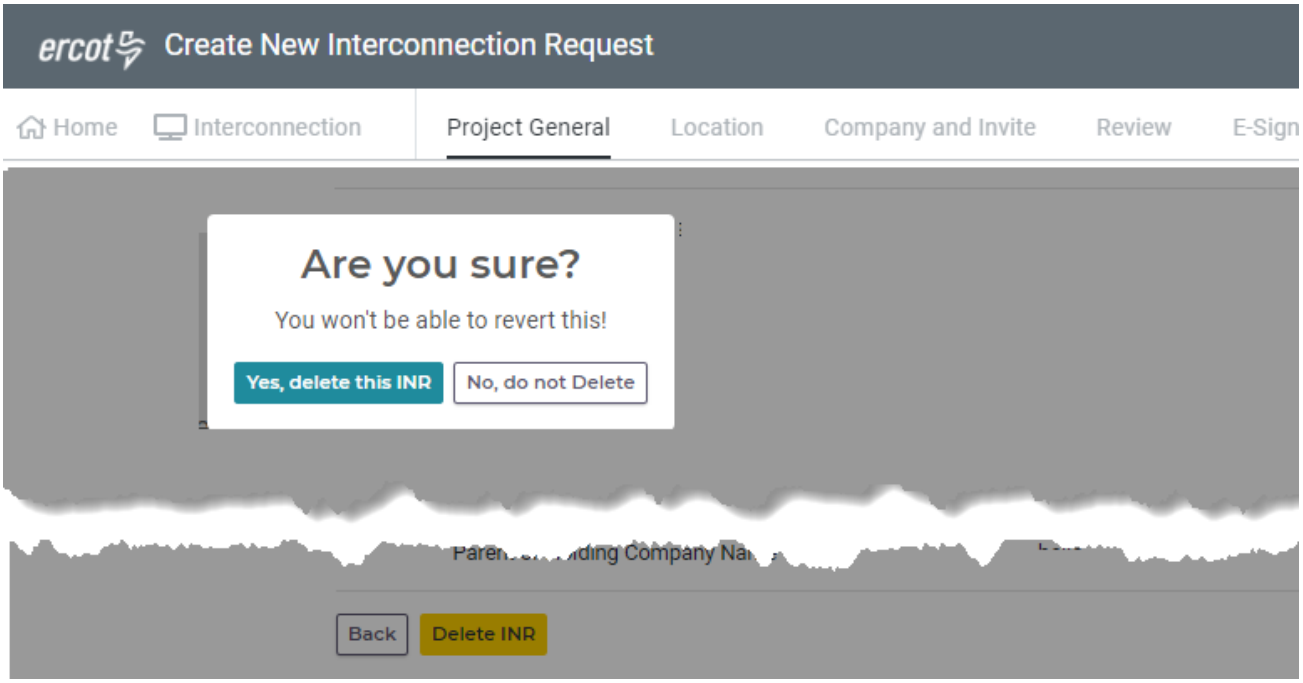
Click Finish INR



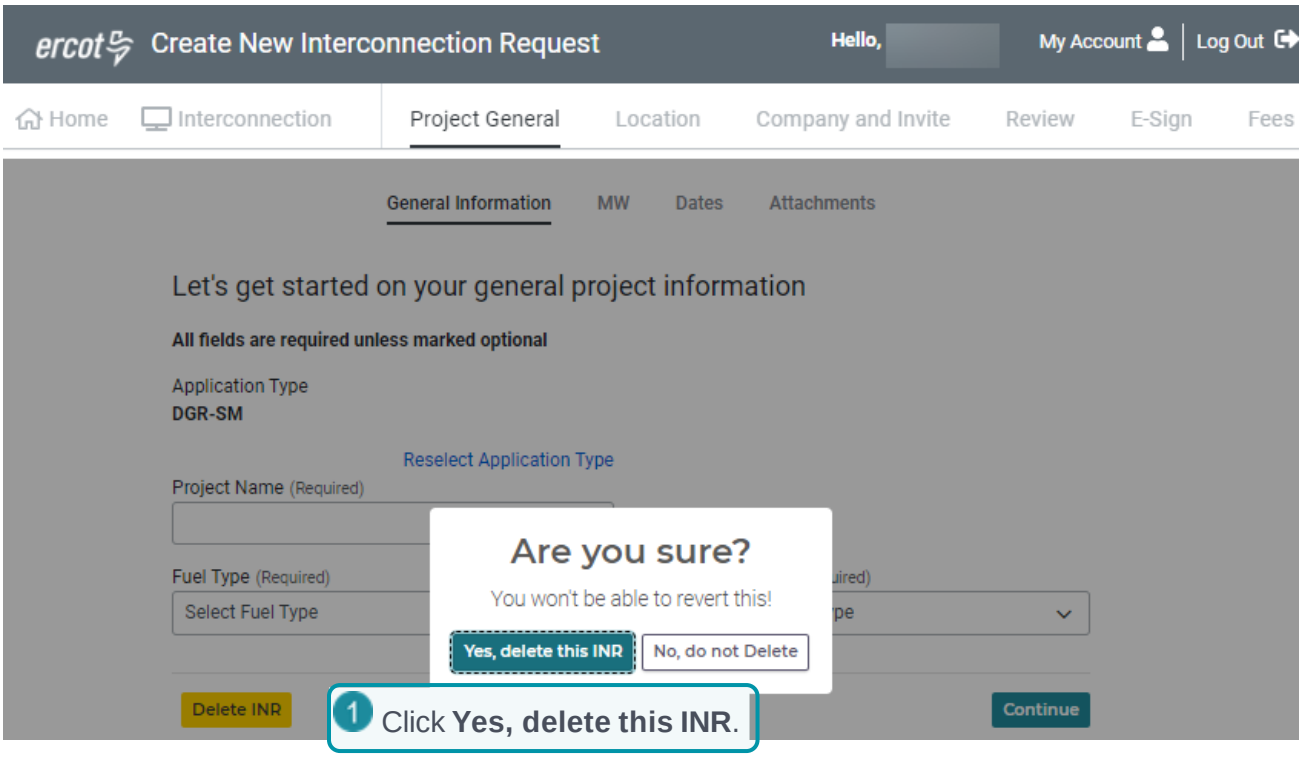
Delete the INR



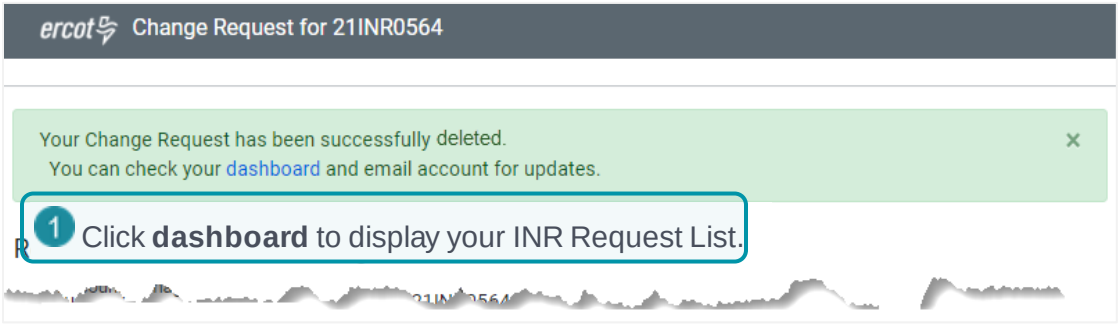
Confirm the Deletion



Confirm the Deletion



View Successfully Deleted Message

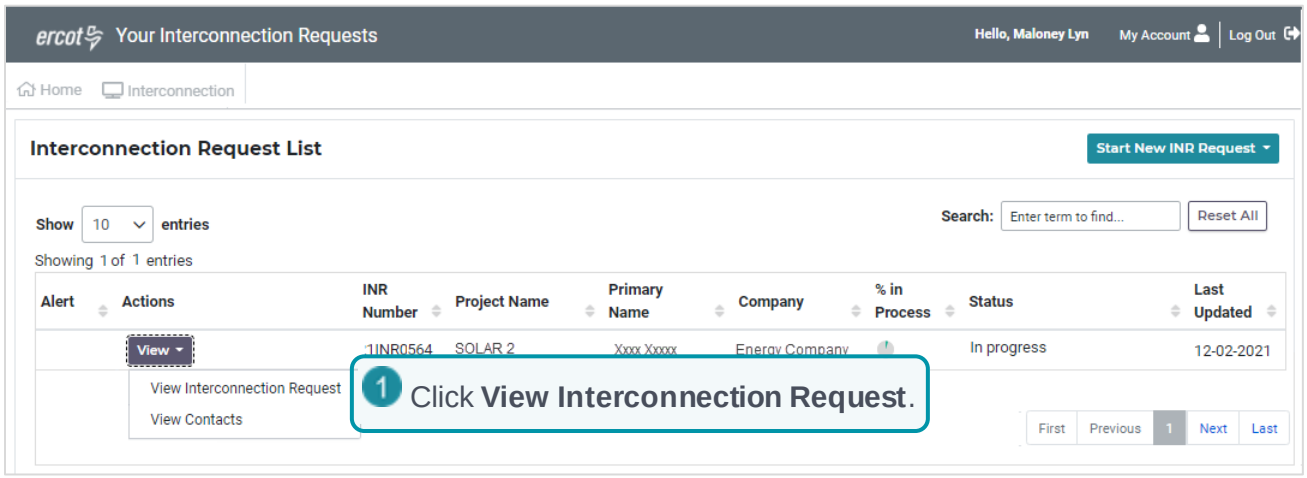


Cancelling a Submitted INR

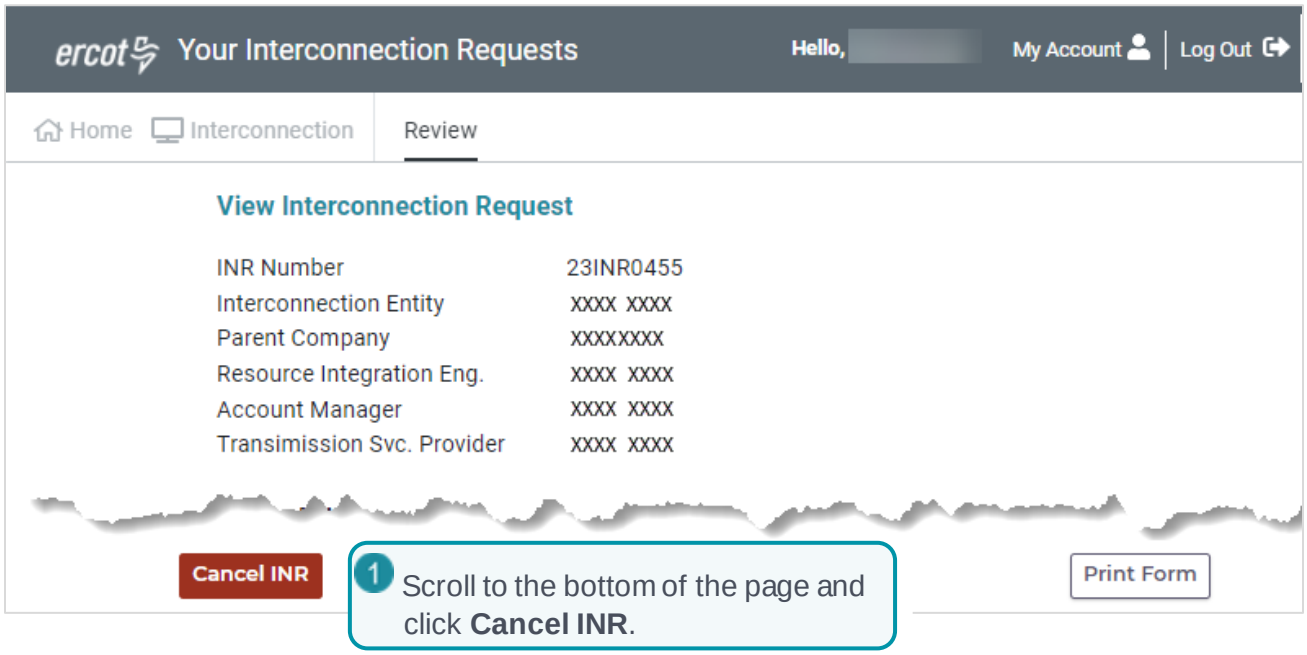
You can cancel an INR that has already been submitted to ERCOT, which removes it from your Interconnection Request List and lets ERCOT know that you will no longer be pursuing the project. The system will send an email notifying any assigned TSPs, engineers, and planners that you cancelled the INR project.

Any Screening Study fees that you have paid are not refundable.

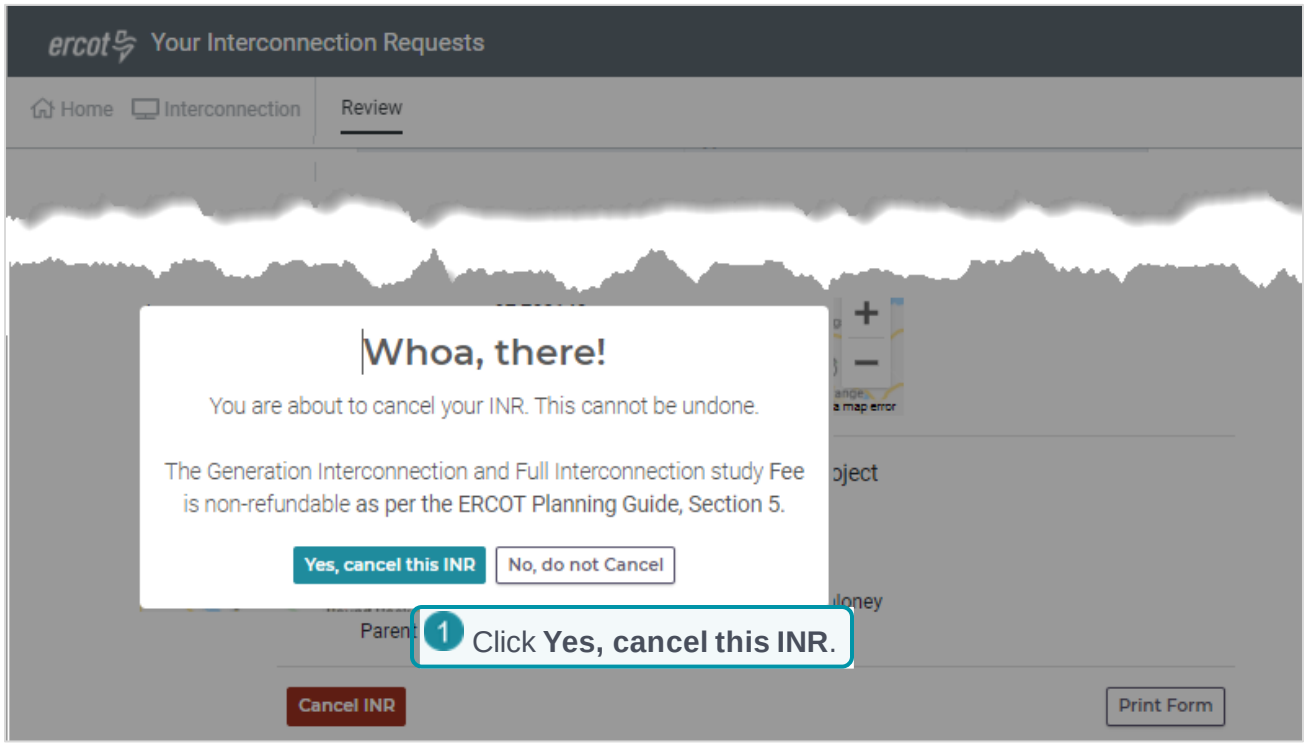
View Your INR



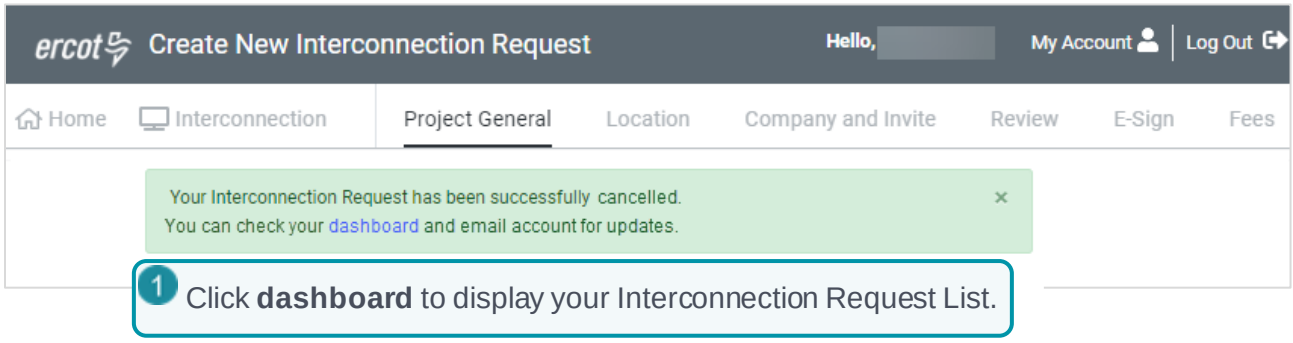
Cancel the INR from the View Page



Confirm Cancel



View Successfully Cancelled Message



Appendix A. Troubleshooting Tips

The following tips may help you if you are experiencing certain conditions while using Interconnection Services.

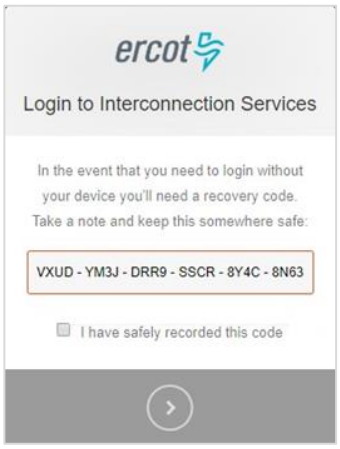
Pages Do Not Seem to Display Correctly

If no page displays or the page looks incorrect, right-clicking and selecting Reload may help fix the problem.

Using Your Auth0 Recovery Code

When you signed up for your RIOO IS account, an Interconnection Services page displayed with a Recovery Code that you were instructed to copy into a file (named something like `ERCOT Auth Information`) and save on your computer. If the Use Your Recovery Code message displays when you attempt to log into your Interconnection Services account, attempt to locate this file.

If you cannot locate the file, you can submit a help desk ticket requesting a reset of your MFA.



Adding Trusted Sites to Your Web Browser

You may need to whitelist, or add, ERCOT Interconnection Services and your multifactor app (Auth0 Guardian or Google Authenticator) to your browser settings in order to access the sites correctly.

You should search Google for the instructions on adding trusted sites to your browser.

Payment Submitted but Submit Page Displays

If you click the **Pay Now** button to submit your payment and another *Submit* page displays, you can click the **Submit** button on the second page without paying again.

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