



WORKING THROUGH THE  
INTERCONNECTION PROCESS

# Small Hydro Workshop

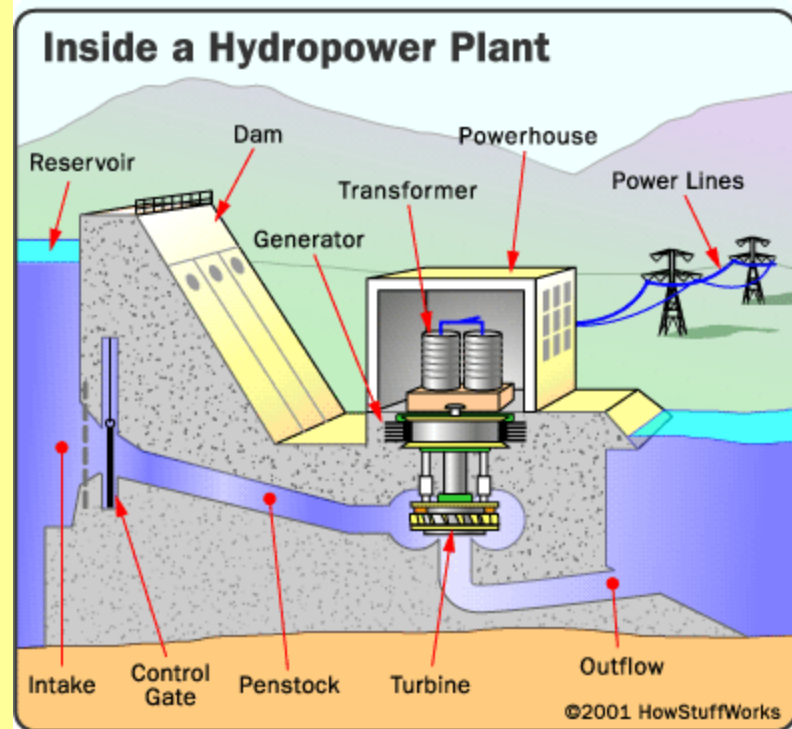
Bend, Oregon  
September 22-23, 2011

Steve Anderson,  
Evergreen Energy



# Careful, Complete, Competent Application Forms

- Maps and electrical designs should be complete and clear.
- Use professionals to help with applications.
- Have professional participate at first meetings.



# Communicate Your Concept Completely

- Let the utility know what your intentions are.
- Make sure plans and schedule are realistic.
- Find alternatives for roadblocks.



# Coordinate with Utility and your Design Professionals



- Know the steps of the process.
- Keep design professionals aware of the issues, concerns, and constraints of the utility.



# Utility Interconnection Process

- Application
- Interconnect Study
- Facility Study
- Interconnection Agreement

# Bonneville Power Administration



New Customers must file Form 4220 which consists of W9e and the New Vendor form

## **Large Generator Facility:**

Greater than 20 MW

Contact: Nick Peck  
[cnpeck@bpa.gov](mailto:cnpeck@bpa.gov) (360)-619-6419

Process:

- Submittal of an Interconnection Request
- \$10,000 deposit + additional \$10,000 deposit unless Initial deposit is accompanied with a Site Control
- Scoping Meeting
- Feasibility and Scope Study

## **Small Generator Facility: 20 MW or Less**

Contact: Anna Cosola  
[amcosola@bpa.gov](mailto:amcosola@bpa.gov) (360)-619-6047

Process:

- Submit Interconnection Request
- Show Site Control
- Scoping Meeting
- Feasibility and Scope Study



## **Tiered application process:**

- Tier 1 Application (PDF) - 25kW and smaller
- Tier 2-4 Application (PDF) - 10MW and smaller

After electrical inspection must submit  
Certificate of Completion (PDF)

Interconnection Equipment as-built  
Specifications (PDF)

**Contact:** Shaun Foster (503)-464-7945  
Interconnection Coordinator

## **Net Metering:**

- Net Metering Application/ Agreement
- Email [netmetering@pgn.com](mailto:netmetering@pgn.com) to set up final inspection



**Small Generating Facility:** Equal to or smaller than 20MW

Contact: Laura Raypush [laura.raypush@pacificorp.com](mailto:laura.raypush@pacificorp.com) (503)-813-7040

**Large Generating Facility:** Greater than 20 MW

Contact: Tom Fishback [tom.fishback@pacificorp.com](mailto:tom.fishback@pacificorp.com) (503)-813-6102

**Process:**

- Application
- Study Process
- Scoping Meeting
- Engineering Procurement
- Interconnection Agreement
- Financial Security
- Operating and Maintenance Agreement
- Closeout Checklist

**Net Metering:** Call at 1-888-221-7070

Applications

- Level 1 Inverter based systems 25kW or less
- Level 2 Capacity of 2 MW or less
- Level 3 Capacity of 2 MW or Less



## Facility Connection Requirements (PDF)

Applications for Generators based on size

- Less than 25kW Application (PDF)
- Up to 10 MW Application (PDF)

Additional Documents:

- Feasibility Study Agreement (PDF)
- System Impact Study Agreement (PDF)
- Facility Study Agreement (PDF)
- Certificate of Completion (PDF)
- As Built Specifications, Initial Setting and Operating Requirements (PDF)
- Oregon Small Generator Interconnection Agreement (PDF)

Contact: Generator Interconnection, Rowena Bishop, [rbishop@idahopower.com](mailto:rbishop@idahopower.com) (208)-388-2658

Contact: Net Metering, Scott Gates, [sgates@idahopower.com](mailto:sgates@idahopower.com) (208)-388-2518



# Thanks For Your Interest! Questions?

**Stephen F. Anderson P.E.**

Phone: (503)-297-8263

Fax: (503)-682-1656

[steve@evergreenrg.com](mailto:steve@evergreenrg.com)

[www.evergreenrg.com](http://www.evergreenrg.com)

Evergreen Energy  
8590 SW Miami St.  
Wilsonville, OR 97070