Hydro Power Site Design Information

This information will assist in designing a system to accommodate your unique site conditions. If this is a new installation, or if you don't know the answer to a question, please say it is an estimate. Refer to other literature provided on www.homepower.ca for assistance in determining water flow and load analysis. You can e-mail the answers in a separate note, or fill in this form and e-mail or post back.

A. <u>Site data:</u>
1. Are you grid connected, and if not, how far to grid power
2. Creek name and location of project
3. Do you have a water license for domestic or power use now?
4. Measured flow, (avg. and min.) per second or minute, in units of liters, cubic feet, US or imperial gallons (state units) Avg = Min =
5. Measured elevation, from pipe intake to power house site, in feet or meters
6. Length of pipeline required
7. Describe terrain pipe would cross
8. Will the pipe be subject to freezing , can it be buried
9. Length of power line from generator to batteries or AC distribution panel
10. Insert a sketch of the layout including the intake (send a PDF sketch or use back or a separate sheet)
11. Water source characteristics, i.e. steep and rocky, prone to flooding,silty, spring, lake, etc. Use the back or fill in here to better describe your site.
12. Could you construct an intake or very small dam to capture water
B: General information – enter what you can, or say "to be determined – homepower to design".
1. Is system to be DC, AC using an inverter, some of both, or AC direct
2. For DC systems, what is the battery voltage and capacity in amp hours
3. List the major electrical loads and hours of use here, or on back
4. What is the anticipated or required amount of power in kW or amp hours
5. For AC systems, will it be 3 phase or single phase
6. What is the expected date for completion
7. Describe the vehicle access to site, or other means of access
8. Do you have available labour to assist in installing the system
9. What is you level of understanding on micro-hydro, beginner, moderate
10. Include any additional information about the site or your requirements