This is an outline of what our final paper should roughly look like. The Part Catalog will be separate and include images and diagrams.

1 MW Ballard Fuel Cell General Manual

I. Abstract
II. Outline of Ballard Fuel Cell Study
   A. Manual Information
   B. Systemization of disassembly
   C. Concepts learned through disassembly
      1. Intake, Reaction, Exhaust
      2. Squirrel Cage
      3. Swedged fittings
      4. Water Vortex
      5. Pressure/Temperature sensors
      6. H. Sensor
      7. Flow Path
      8. PRD Vent
   D. Literature Review

III. Part Catalogue

1. **Cover Plate**
   The Cover Plate, recognizable by the Ballard logo stretching along its central length, is a protective plate that seals off the top of the system to complete it. It is held onto the frame by 4 screws and has a hole toward top-right of the Ballard logo for the PRD vent to reach out of. It has a soft, protective insulation underneath which is most heavily placed in the area that covers the fuel cell stacks.

2. **Front-side Plate**
   The Front-side Plate is the protective cover that hosts the most openings in its face. It has been designated as the front side due to its distinct difference from the other protective plates. The openings that are found throughout the plate are for providing inlet as well as outlet to various pipes and plugs that run electricity and other resources needed to run or to be removed from the fuel cell. It is held onto the frame by up to 16 screws and slides into place from above.

3. **Channel Seal Mount** (x2)
   The Channel Seal Mount is held or mounted onto either of the Front-side Plate by the six screws that go through it to hold the plate into the frame. It is recognizable as a short aluminum bar with three holes going through the front face to house screws, as well
as a slight chamfer at the end of the bar. There are two of these, and their purpose is to ensure the Front-side Plate is held tightly to the frame.

4. **Right-side Plate**
   Covering the right side of the fuel cell in reference to the Front-side Plate, the Right-side Plate is a very plain rectangular cover that protects most of the passageways that go in and out of the fuel cell stacks. It has a very thin coating of insulation on its inner side and is held on to the frame by up to 5 screws.