The URI Graduate School has established general Graduate Degree Requirements for the Doctor of Philosophy Degree, which all doctoral candidates must satisfy. As indicated in Section 7.55 of the Graduate Manual (http://www.uri.edu/gsadmis/GraduateManual.htm) a Qualifying Examination (QE) is intended to assess a student’s potential to perform satisfactorily at the doctoral level.

The purpose of the Qualifying Examination in Ocean Engineering is to assess the ability of a student to successfully complete the doctoral program in Ocean Engineering and to serve as a diagnostic tool to identify areas of weakness. The examination provides an early opportunity to measure the student’s performance against minimum standards, which have evolved over the year. Results from the examination are also used to make recommendations about changes in the student’s program of study.

In light of the diverse educational backgrounds of our incoming doctoral students, the Department of Ocean Engineering requires that all incoming doctoral students take the Qualifying Examination. For full time graduate students the examination is administered after 9-12 credits have been completed which is typically before the end of the second semester of a student’s program of study. For part time students who are not fully matriculated each semester the examination is typically administered within the two year period after admission into the program.

The Qualifying Examination is administered by a department selected committee comprised of a minimum of three faculty members within the Department of Ocean Engineering. The Department typically offers the examination once per year. At least one member of the committee will have served on the previous examining committee in order to provide continuity in the administration of the examination. The major professor of a student taking the examination may or may not serve on the committee administering the examination. In all cases, an effort is made to select an examining committee whose interests and expertise span the diverse areas within Ocean Engineering.

The format for the QE consists of a two hour oral examination of the student by the examining committee. Each examining committee member asks a series of questions in a round robin procedure. Two rounds are typical. The examination is intended to determine the level of understanding of fundamental material which is typically taught at the undergraduate engineering level. This material includes, but is not limited to basic material in the following areas: Fluid Mechanics, Solid Mechanics including Statics, Dynamics, and Vibrations, Instrumentation and Circuit Theory, Mathematics (Calculus through Ordinary Differential Equations), and the student’s research area. Since Ocean Engineering is fundamentally interdisciplinary, a minimum level of proficiency is required in the above noted areas. Some suggested texts for review of the areas are included here as an Appendix.
The Committee evaluates the performance of the student as either Satisfactory or Unsatisfactory at the conclusion of the examination. A Satisfactory performance allows the student to continue in the Ocean Engineering Program. The committee may recommend specific courses be included into the student's program of study to remedy any deficiencies.

An Unsatisfactory performance results in either of two possible courses of action by the Examining Committee. If the committee decides that the student is likely to be able to complete the doctoral program in Ocean Engineering by completing additional courses to remedy the deficiencies, the student will be allowed to continue in the doctoral program. However, the additional courses will be required in the student’s Program of Study and the student must successfully pass a re-examination. If the committee decides that the student is unlikely to successfully complete the doctoral program the student will be dismissed from the doctoral program. A student dismissed from the program may be given an opportunity to enter and complete the Masters Degree program in Ocean Engineering.

Appendix: Some texts for review of engineering fundamentals:


