The Department of Economics at Iowa State University provides a unique opportunity for students to obtain quality graduate education through course instruction, workshops, seminars, research and interaction with world-class scholars. As a major part of graduate education, each student chooses a major professor who is a mentor and guide for graduate work. The major professor along with the Program of Study (POS) Committee provides specific direction for an individual student's graduate program and research. The following guidelines will help the student, in conjunction with his/her POS Committee, plan a graduate program that will lead to the desired degree and career path in a timely and efficient manner while meeting all departmental and university requirements. These guidelines are approved by the economics faculty as a whole and should be interpreted as minimum standards. Individual POS committees may choose additional coursework or other requirements to meet the needs of a given student or research topic.

Specific Requirements for M.S. and Ph.D. Degrees

I. Master of Science
   The Department of Economics offers M.S. degrees in either economics or agricultural economics. Students may not obtain both majors. Core classes are the same for each major. The Program of Study (POS) Committee approves other coursework and the thesis or creative component topic leading to either the economics or agricultural economics degree.

A. Thesis option for the M.S. degree
1. Graduate credit requirements
   This degree requires 30 credits. These credits must be graduate credits (500 & 600 level) except that, with POS Committee approval, up to 9 credits of 300 & 400 level classes at Iowa State (not undergraduate courses from other institutions) will be eligible. Undergraduate classes in economics may not be used. At most, 3 credits at the 300 level may be used.
   Of the 30 required credits:
   a) A minimum of 24 credit hours is earned in formal coursework. Of these 24 hours, at least 17 hours must be in graduate level economics courses (i.e. 500 & 600 level economics courses excluding Econ 532, 590, 599, 690, 691 and 699).
   b) The remaining required hours are earned in either formal coursework or research credits (Economics 699) in connection with the preparation of a master's thesis. A minimum of three semester hours of research credits is required by the Graduate College.
2. Course requirements
   a) Econ 500 (Quantitative Methods in Economic Analysis I), Econ 501 (Microeconomics), Econ 502 (Macroeconomics), and Econ 571 (Intermediate Econometrics) are required. These requirements may constitute 15 of the 17 hours of required formal coursework in economics.
3. Program of Study Committee
   a) Committee appointment: In consultation with the student's major professor, a Program of Study Committee consisting of at least 3 members of the graduate faculty is appointed. One committee member must be outside the student's field of emphasis.
   b) Program of Study (POS): In consultation with the student's POS Committee, an official POS is developed listing all the classes the student will complete in order to obtain the desired degree. Appointment of committee members and determination of the POS is accomplished by filing the POS Committee (POSC) form through AccessPlus. Details regarding the process for filing this form are available in the Economics Department Graduate Studies Office. Students should file the POSC form by the end of the second semester of their M.S. program.
4. An oral defense-of-the-thesis examination is required. Students must file a request for final oral with the Graduate College at least three weeks before the final oral examination. Students are required to provide a copy of the thesis to each member of the POSC at least two weeks before the final oral examination. Forms for requesting a final oral examination are available on the Graduate College website.
B. Non-Thesis option for the M.S. degree

1. Graduate credit requirements
   This degree requires 32 credits. These credits must be graduate credits (500 & 600 level) except that, with POSC approval, up to 9 credits of 300 & 400 level classes at Iowa State (not undergraduate courses from other institutions) will be eligible. Undergraduate classes in economics may not be used. At most, 3 credits at the 300 level may be used. Of these 32 credits:
   a) a minimum of 30 hours is earned in formal coursework. Of these 30 hours, at least 17 hours must be in graduate level economics courses (i.e. 500 & 600 level economics courses excluding Econ 532, 590, 599, 690, 691, 699).
   b) A minimum of two semester hours of research credits (Econ 599) earned in connection with the preparation of a creative component is required by the Graduate College. A creative component need not meet the Graduate College’s requirements for a thesis.

2. Course requirements
   a) Econ 500 (Quantitative Methods in Economic Analysis I), Econ 501 (Microeconomics), Econ 502 (Macroeconomics), and Econ 571 (Intermediate Econometrics) is required. These requirements may constitute 15 of the 17 hours of required formal coursework in economics.

3. Program of Study Committee (POSC):
   a) Committee appointment: In consultation with the student's major professor, a POSC consisting of at least 3 members of the graduate faculty is appointed. One committee member must be outside the student's field of emphasis.
   b) Program of Study (POS):
      In consultation with the student's POSC, an official POS is developed listing all the classes the student will complete in order to obtain the desired degree. Appointment of committee members and determination of the POS is accomplished by filing the POSC form through AccessPlus. Details regarding the process for filing this form are available in the Economics Department Graduate Studies Office. **Students should file the POSC form by the end of the second semester of their M.S. program.**

4. An oral comprehensive examination is required. This examination covers both the creative component and other coursework. Students file a request for final oral with the Graduate College at least three weeks before the final oral examination. Students are required to provide a copy of the creative component to each member of the Program of Study Committee at least two weeks before the final oral examination. Forms for requesting a final oral examination are available on the Graduate College website.

5. Guidelines for the creative component:
   a) Work equivalent to at least two hours of graduate credit may be reflected in one or more separate creative reports as determined by the POSC.
   b) The creative component requirement may be satisfied with one or more of the following:
      1) a theoretical or empirical economic analysis of some problem or issue,
      2) an essay or commentary on some economic concept, analytical or research method, or policy issue or problem,
      3) a feasibility study of some economic enterprise or activity,
      4) a comprehensive literature review and critical analysis of some economic issue or problem,
      5) the presentation and testing of a relatively simple statistical problem or econometric model.
   c) The length of the creative component may vary, depending upon the extent of statistical analysis or modeling and of supporting data and graphics. A creative component that includes significant statistical or econometric analysis, for example, could be shorter in length than a report that is essentially an essay or commentary on some issue or problem. A creative component is not expected to reflect the depth of analysis normally found in an M.S. thesis, nor the detailed discussion of theory, methodology, or related work on the subject.

C. Co-major Requirements
A co-major in economics at the M.S. level requires the approval of the Director of Graduate Education. Students pursuing a co-major at the M.S. level in the Department of Economics must complete 17 hours of formal graduate level coursework in Economics (i.e. 500 & 600 level courses exclusive of 532, 590, 599, 690, 691, 699). Of this requirement, 15 hours must be the core classes of Economics 500 (Quantitative Methods in Economic Analysis I), Economics 501 (Microeconomics), Economics 502 (Macroeconomics) and Economics 571 (Intermediate Econometrics).
D. Concurrent Master’s Degree Program
Individuals pursuing concurrent M.S. degrees are required by the Graduate College to complete at least 22 hours of non-overlapping credits. The Economics Department requires that, of these 22 hours, at least 17 must be in graduate level economics courses. The core course requirements of Econ 500 (Quantitative Methods in Economic Analysis I), Econ 501 (Microeconomics), Econ 502 (Macroeconomics) and Econ 571 (Intermediate Econometrics) must be met. Students planning to pursue concurrent graduate degrees should contact the Economics Department Graduate Studies Office for additional details.

E. Minor Requirements
Students wishing to complete a graduate minor in Economics are required to have at least 9 hours of formal coursework in economics courses. These courses must be at the 300-level or above, excluding Econ 313, 334, 336, 337, 353, 362, 364, 370, 378, 380, 398, 490, 492, 495, 496, and 498. It is required that one of the courses be in microeconomic theory (Econ 301, Econ 401, or Econ 501).

F. Grading of graduate courses for the M.S. degree
Graduate courses are usually graded on a letter grade basis (A-F). In all but exceptional cases, a grade of B- will serve as an adequate signal of unsatisfactory performance. Only grades of satisfactory/fail are given in the following classes: Econ 590, 599, 690, 691, 699.

II. Ph.D.
The Department of Economics offers Ph.D. degrees in either economics or agricultural economics. The core courses are the same for both majors. Students may not obtain both majors.

A. Graduate credit requirements
A total of 72 credits is required. These credits must be graduate credits (500 & 600 level) except that, with POSC approval, up to 9 credits of 300 & 400 level classes at Iowa State (not undergraduate courses from other institutions) will be eligible. Undergraduate classes in Economics may not be used. At most, 3 credits at the 300-level may be used.
1. Students are required to complete seven field graduate courses in economics beyond the Ph.D. core (601, 602, 603, 604, 671, 672). Field courses must comprise at least two fields of concentration other than Applied Econometrics (currently offered fields are listed in the section entitled "Fields of Concentration"). Six of these course must be at the 600 level, other than 690, 691 or 699.
2. Student must successfully complete Econ 694A and econ 694B.
3. Three semester hours in Economics 691 are earned in conjunction with the third year paper.
4. A minimum of 9 of the 72 credits must be earned as research credits (Econ 699) in connection with the preparation of a Ph.D. dissertation. A maximum of 21 credits of Econ 699 may count toward the required 72.
5. A maximum of 15 hours may be earned as a combination of the following credits:
   a) research credits (to a maximum of 6) earned in connection with the preparation of an M.S. thesis,
   b) credits earned in special topics courses (Economics 590 or 690).

B. Course requirements
The material covered in Economics 601, 602, 603, and 604 forms a basis for the Departmental Qualifying Examinations in Economic Theory. (See section II.E. of the Departmental Policy on the Written Qualifying Examinations in Economic Theory). Economics 671 and 672 (Econometrics) are required in the first year of the program.

C. Core Course Sequence and the “Ph.D. Track”
In most cases, students enrolled in the Ph.D. program will start with the Ph.D. core: 601, 602, and 671 in the fall of the first year; 603, 604, and 672 in the spring of the first year. Under some circumstances, however, Ph.D. enrollees will be advised to start with the M.S. core (500, 501, and 502 in fall and 571 plus additional courses in spring of the first year), and postpone the start of the Ph.D. core until the beginning of the second year in the program.

D. Program of Study Committee
1. Committee appointment
   In consultation with the student's major professor, a Program of Study Committee (POSC) consisting of at least 5 members of the graduate faculty is appointed. One committee member must be outside the student's field of emphasis.
2. Program of Study
   In consultation with the student's Program of Study Committee (POSC), an official POS is developed listing all the classes the student will complete in order to obtain the desired degree. Appointment of
committee members and determination of the POS is accomplished by filing the POSC form through AccessPlus. Details regarding the process for filing this form are available in the Economics Department Graduate Studies Office. **Students should file the POSC form by end of the fifth semester in the Ph.D. track. The POSC form must be approved by the Graduate College before the preliminary oral is held.**

E. **Qualifying Examinations in Economic Theory and Field of Concentration Requirements**
   1. Written qualifying examinations in microeconomic theory and macroeconomic theory are required.
   2. Mastery of two Fields of Concentration is required (currently offered fields are listed in the section entitled "Fields of Concentration"). Mastery in each elective field of concentration in the Department of Economics is demonstrated by completion of coursework requirements for that field.

F. **Third Year Paper**
A formal research paper under the direction of the major professor is required during the third year of the Ph.D. track. This paper must be satisfactorily completed (fully approved by both the major professor and the second reader) before the preliminary oral examination may be held.

G. **Oral preliminary examination**
An oral preliminary examination is required of all Ph.D. students and is administered by the POSC. The oral preliminary examination requires prior approval by the Graduate College. Students should get the appropriate forms to be filed with the Graduate College from the Economics Department Graduate Studies Office and file them at least two weeks before the date of the examination. **The examination should be held no later than the student's seventh semester on the Ph.D. track.** Ideally, it should be held early enough in the student's research program that significant faculty input into the process can be obtained. Students are required to provide a copy of the proposal to each committee member at least two weeks before the preliminary oral examination.

While the exact nature of the preliminary oral examination depends on the POSC and the particular area of research, some general departmental guidelines apply. In all cases the student should be given clear direction regarding expectations well before preparing the dissertation proposal. The purpose of the examination is to rigorously test the student's knowledge of major, minor, and supporting subject areas relevant to the proposed dissertation topic, as well as the student's ability to analyze, organize, and present subject matter relevant to the field. The means of doing this is to consider the student's proposal for the economic research that will lead to the dissertation. While some questioning over general issues may occur, the bulk of the examination will concentrate on the dissertation topic. In this regard the student should prepare a specific and well-documented proposal for research. The dissertation proposal consists of a statement of the problems to be considered, a review of the relevant literature, a consideration of theoretical models to analyze the problems, and a discussion of potential data and quantitative methods to be used in addressing the topic. When the essay approach is chosen, the preliminary oral should consider the specific topic of each essay, along with basic models, data issues and quantitative methods to be used in addressing these topics. The first of the three essays should be complete or nearly complete before taking the preliminary oral examination. An appropriate literature review for the entire dissertation should be prepared.

In some cases the POSC or a portion thereof may meet one or more times between the preliminary and final oral examinations in order to monitor the student's progress. The department will enforce the Graduate College requirement that the final Ph.D. oral examination must be at least six months after the preliminary Ph.D. oral examination.

H. **Oral defense-of-the-dissertation final examination**
The final oral examination requires prior approval by the Graduate College. Students should get the appropriate forms to be filed with the Graduate College from the Economics Department Graduate Studies Office and file them at least three weeks before the date of the examination. Students are required to provide a copy of the dissertation to each member of the POSC at least two weeks before the final oral examination.

I. **Majors**
1. Students majoring in Economics, in addition to completing the requirements outlined in II A-H of the requirements for the Ph.D. degree, must choose at least one of their two required fields of concentration from among the fields of a) Environmental and Resource Economics, b) Financial Economics, c) Human Resources, d) Industrial Organization and Economics of Organization, e) International Economics, and f) Macroeconomics.
2. Students majoring in Agricultural Economics, in addition to completing the requirements outlined in II A-H of the requirements for the Ph.D. degree, must choose at least one of their two required fields of concentration from either a) Agricultural Economics or b) Environmental and Resource Economics.

3. Students must choose to major in either economics or agricultural economics. They may not major in both areas. Students majoring in economics may not obtain a minor in agricultural economics. Similarly, students majoring in agricultural economics may not obtain a minor in economics.

J. Co-major Requirements
A co-major, at the Ph.D. level, in economics or agricultural economics and another field requires the approval of the Director of Graduate Education. Students pursuing a co-major at the Ph.D. level must complete 72 credits. These credits must be graduate credits (500 & 600 level) except that, with POSC approval, up to 9 credits of 300 & 400 level classes at Iowa State (not undergraduate courses from other institutions) will be eligible. Undergraduate classes in economics may not be used. At most, 3 credits at the 300-level may be used.

1. Students are required to complete the Ph.D. core (Econ 601, 602, 603, 604, 671, 672) and pass the written qualifying examinations in microeconomic theory and macroeconomic theory.

2. Students are required to complete three graduate courses in economics beyond the Ph.D. core, comprising at least one field of concentration other than Applied Econometrics. These courses shall be at the 600 level, other than 690, 691 or 699, or shall be 500 level courses that are acceptable as part of a Ph.D. Field of Concentration. The student must demonstrate mastery of the elective field by completion of coursework requirements for that field.

3. A minimum of 9 of the 72 credits must be earned as research credits (699-numbered courses, with the "Econ" or other designator) in connection with the preparation of a Ph.D. dissertation deemed, by the POSC, to be acceptable as a Ph.D. dissertation in the discipline of economics. A maximum of 21 credits of 699-numbered courses may count toward the required 72.

4. Co-major students face the same credit hour restrictions that are detailed under section II.A.5.

5. Co-major students face the same oral preliminary examination and oral defense-of-the-dissertation final examination requirements that are detailed in sections II.G. and II.H.

K. Grading of graduate courses for the Ph.D. degree
Graduate courses are usually graded on a letter grade basis (A-F). In all but exceptional cases, a grade of B- will serve as an adequate signal of unsatisfactory performance. Only grades of satisfactory/fail are given in the following classes: Econ 590, 599, 690, 691 699.
Departmental Policy on the Written Qualifying Examinations in Economic Theory

I. Purposes and Goals of the Examinations
The purposes and goals of the written qualifying examinations are to help ensure that each student who receives a Ph.D. from the department is thoroughly trained in the basic core of economic theory and to provide an incentive for the student to review, integrate, and apply his/her economic theory training.

II. Administration of the Examinations
A. Scheduling of the Examinations
The examinations are administered during the summer session following the first year on the Ph.D. track. The first attempt of the microeconomics examination will be given on the third Friday following Spring Commencement in odd numbered calendar years and the Tuesday following the third Friday following Spring Commencement in even numbered calendar years. The first attempt of the macroeconomics examination will be given on the third Friday following Spring Commencement in even numbered calendar years and the Tuesday following the third Friday following Spring Commencement in odd numbered calendar years.

The second attempt of the microeconomics examination will be given on the Monday one week before classes begin for the Fall semester in odd numbered calendar years and on the Friday immediately before classes begin for the Fall semester in even numbered calendar years. The second attempt of the macroeconomics examination will be given on the Friday immediately before classes begin for the Fall semester in odd numbered calendar years and on the Monday one week before classes begin for the Fall semester in even numbered calendar years.

B. Form of the Examinations
For each examination, students will be allowed a total of six hours. These hours will be divided into two blocks: a four-hour morning session and a two-hour afternoon session. In the morning session, students will be asked to answer two out of at least three questions. In the afternoon session, students will be asked to answer one out of one or more questions. Questions that appear in the morning session cannot be used in the afternoon session.

C. Grading of the Examinations
Each examination will be evaluated separately, and a grade of "Pass with Distinction", "Pass", or "Fail" will be assigned. The results of the examination will be sent to the student and to the chair of the student's POSC, or the student's academic advisor if the POSC has not yet been formed.

The examining committee will complete the grading of the examinations as soon as possible. In no case will the results of the first round of examinations be returned later than June 30. Should June 30 fall on a weekend, results will be returned no later than the Friday preceding June 30. In no case will the results of the second round of the examinations be returned more than four weeks after the examination is given. The Director of Graduate Education will present the overall results of the examinations to the earliest possible meeting of the Economics Professors. An answer outline for each qualifying examination shall be placed on closed reserve for student use no later than four weeks after the date of the examination.

D. Other Requirements of the Department Related to Taking and Passing the Qualifying Examinations
1. Each student in the Ph.D. program must pass two qualifying exams in economic theory (one in macroeconomics and one in microeconomics).
2. Students will have two attempts to pass a qualifying examination on each subject. Students must take the examinations at the times outlined. The first attempt for each examination will be offered following Spring Semester following the first year on the Ph.D. track. The second attempt, should it be needed, will be offered prior to the Fall Semester of the second year on the Ph.D. track. There will be no additional attempts except as outlined in Section IV, "Petition Process." Students who have failed to pass both qualifying exams will not be admitted to candidacy and will be given the option of completing a Master's degree or leaving the program. If a student chooses not to attempt a given examination at the time it is offered, the student will be given a failing grade on the examination.
3. To be eligible to take the theory qualifying examinations, a student must be officially accepted into the Ph.D. program.
4. Students will be provided information regarding their ability to pass the theory qualifying examinations through their performance in the relevant theory courses. Specifically, instructors of the relevant theory courses will assign grades of B+ or higher only to those students who have done work of sufficient
quality to suggest that they will be able to pass the corresponding examination.
5. Students are not required to file a POS prior to taking the qualifying examinations.
6. Both qualifying examinations, field of concentration requirements, and minor examinations (if any) must be passed before a student will be allowed to take his or her preliminary oral examination.

E. The Examining Committee
Each qualifying examination committee shall be composed of three members, at least one of whom shall be from the relevant theory teaching core. Each committee will be appointed by January 1 and will serve for one year.

F. Material to be Covered in the Examinations
Questions on the qualifying examinations will cover material from the current topic outlines in economic theory. This outline encompasses the general subject matter of microeconomic and macroeconomic theory appropriate for study by beginning Ph.D. students. The graduate courses, Econ 601, Econ 602, Econ 603 and Econ 604 will cover the majority of topics on this outline and the syllabi for these courses are a useful reference for the examinations. Copies of these syllabi and the topic outline will be available on the Economics Graduate Web page. Students will be held responsible for any changes in the topic outline or course material that have occurred since they completed the relevant classes.

III. Appeal Process
If asked to do so, the chair of the examining committee will meet on an individualized basis with students after the examination results are released to discuss the examinations. If, after these meetings and within 2 weeks of the date the results of the examination are returned, a student is dissatisfied with the grading of his/her examination, the student may notify the Department Chair that he/she wishes to appeal the results of the examination. The student's written defense of the examination paper must accompany this notification.

The student's written defense will then be given to the original examining committee for its consideration. If the original examining committee judges that the student's arguments are reasonable, the committee may reverse its original decision and change the grade from failing to passing. If the original examining committee does not reverse its original decision, it will write a defense of its original decision and will present this to the student and the Chair.

If the student still feels that he/she has a grievance after the examining committee has reconsidered its original decision, a further appeal procedure is available in the Graduate College, as described in the Graduate College Handbook. http://www.grad-college.iastate.edu/common/handbook/

IV. Petition Process
A student who has failed to pass either the Microeconomics or Macroeconomics Qualifying examination in two attempts (see section II. D. 2 of Departmental Policy on the Written Qualifying Examinations in Economic Theory) will have the option of petitioning the Chair to allow him/her to take the examination in question one additional time. The student will have 2 weeks from the time that the examination result is returned to initiate the process. If the student has appealed the decision and lost that appeal, he/she will have 2 weeks from the date of the appeal decision to start the petition process. Within 4 weeks from the time the petition is filed, the Chair will then make one of the following decisions:
1. the student will be removed from the Ph.D. program; or
2. the student will be permitted to take the next offering of the relevant qualifying examination. No further petition will be allowed.

The Chair will grant the petition only under exceptional circumstances that were responsible for the student's substandard performance on the relevant qualifying exam.
Fields of Concentration

I. **Agricultural Economics** (Artz, Balistreri, Choi, Crespi, DePaula, Gallagher, Hallam, Hart, Hayes, W. Huffman, Jacobs, Jensen, Lade, Lawrence, Lence, Moschini, Plastina, Pouliot, Schulz, Zhang)
   Required: Econ 641 Agricultural Economics I
   Econ 642 Agricultural Economics II

II. **Applied Econometrics**: Available as a third field only. (Bartalotti, Bunzel, Crespi, DePaula, W. Huffman, Keiser, Kreider, Zhylyevskyy)
   Choose Two: Econ 673 Microeconometrics
               Econ 674 Macroeconometrics
               Econ 675 Advanced Topics in Econometrics
   To fulfill the requirement for this field, students must complete 2 of 3 courses listed above.

III. **Environmental and Resource Economics** (Balistreri, Hoffman, Keiser, Kling, Lade, Rudik, Weninger, Zhang)
    Required: Econ 581 Advanced Environmental Economics
              Econ 680 Advanced Resource Economics

IV. **Financial Economics** (Hayes, Lapan, Lence, Singh, Zhylyevskyy)
    Required: Econ 653 Financial Economics
    Choose One: Econ 537 Commodity Markets: Analysis and Strategy
                Econ 657 International Finance
    To fulfill the requirement for this field, students must complete Econ 653 and one course from the others listed.

V. **Human Resources** (Artz, Bartalotti, Hoffman, S. Huffman, W. Huffman, Jensen, Kreider, Orazem, Rosenbloom, Zhylyevskyy)
   Required: Econ 520 Labor Supply and Human Capital Formation
   Choose One: Econ 510 Experimental Economics
               Econ 521 Labor Markets
               Econ 545 Public Economics
               Econ 576 Spatial Economics
   Recommended: Econ 673 Microeconometrics
   To fulfill the requirement for this field, students must complete Econ 520 and one course from the others listed.

VI. **Industrial Organization and Economics of Organization** (Artz, Balistreri, Crespi, Hallam, Lapan, Moschini, Tesfatsion, Weninger)
    Required: Econ 615 Theoretical Industrial Organization
    Choose One: Econ 616 Empirical Methods in Industrial Organization
                Econ 618 Game Theory
                Econ 642 Agricultural Economics II
    To fulfill the requirement for this field, students must complete Econ 615 and one course from the others listed.

VII. **International Economics** (Balistreri, Choi, Hayes, Lapan, Lence, Lyn, Moschini, Singh)
     Required: Econ 655 International Trade
               Econ 657 International Finance

VIII. **Macroeconomics** (Bhattacharya, Bunzel, Cordoba, Singh, Tesfatsion)
     Choose Two: Econ 606 Advanced Topics in Macroeconomics
                 Econ 657 International Finance
                 Econ 674 Macroeconometrics
     To fulfill the requirement for this field, students must complete 2 of the 3 courses listed above.
Departmental Policy on the Third Year Paper

I. Purpose and Goals of the Third Year Paper
The purpose of the third year paper is to help ensure that each student who receives a Ph.D. from the department is thoroughly familiar with the research process and begins to focus on the research aspect of the degree early in their program.

II. Administration of the Paper
A. Timing of the Paper
Each student will be required to prepare a paper during the third year on the Ph.D. track. The paper should be satisfactorily completed by the end of the summer following the third year on the Ph.D. track.

B. Format of the Paper
In general, the paper should address a topic/problem in the student's major field of study that is likely to emerge as a component of the student's Ph.D. dissertation. However, the paper may be in a related area, provided the two faculty members who evaluate the paper agree. Minimal expectations for the paper are that it be a critical review of a body of literature that is likely to be the focus of the student's dissertation research. The two faculty members who evaluate the paper will determine whether the paper is satisfactory.

C. Evaluation of the Paper
The third year paper will be evaluated by two faculty members, including the student's major professor and one other faculty member (chosen by the student and approved by the major professor) on the student's POSC. The paper shall be evaluated satisfactory/not satisfactory.

D. Other Requirements
Each third year student will be required to register for 3 credits of Econ 691 during either the fall or spring semester. When the third year paper is judged satisfactory, the student will be given a grade of “S” in Econ 691.

E. Relationship of the Paper to the Degree Program
The third year paper must be satisfactorily completed before a student will be allowed to take the preliminary oral examination. Students who do not complete the third year paper will no longer be considered a Ph.D. program candidate and will be given the option to complete the M.S. degree program.

F. Relationship of the Paper to Assistantship Funding
If the student receives a satisfactory evaluation of the paper (fully approved by both the major professor and second reader) by August 15th of the summer following the third year on the Ph.D. track the student's assistantship stipend will be increased by $50 per pay period starting fall semester of the fourth year. A student whose paper is judged unsatisfactory at the end of the summer, but satisfactorily completes the third year paper requirement during the seventh semester will receive the $50 per pay period increase in stipend starting spring semester of the fourth year. Students not receiving a satisfactory evaluation of the paper by the end of the seventh semester of the Ph.D. track will not be funded beyond that time.
Normal Progress Guidelines for M.S. and Ph.D. Students

I. M.S. Students

Students making normal progress complete the M.S. degree program in one and one half academic years. Normal progress guidelines for each year are given below.

A. First Year

M.S. students complete quantitative methods (Econ 500), microeconomics (Econ 501), macroeconomics (Econ 502), econometrics (Econ 571), and three field courses in economics or other disciplines in the first year of the program. The normal course load is three regular courses during the fall semester and four regular courses during the second semester. A student making normal progress will complete a minimum of 24 credits by the end of the first year in the program, including at least 17 credits in regular economics courses. Normal progress requires a cumulative grade point average of at least 3.0 in these courses. Students in the thesis option complete all course requirements by the end of the second semester. Students making normal progress file the POSC form by the end of the second semester in the program.

B. Fall Semester of the Second Year

M.S. students take no more than six credits of regular (non-research) classes in the third semester. Students doing the non-thesis option complete all course requirements by the end of the fall semester of the second year. A cumulative grade point average of at least 3.0 is required in order to graduate.

II. Ph.D. Students

Students are expected to complete the Ph.D. degree program in 4.5 years or fewer. Students entering the program after spending a year in our M.S. program should be able to complete the Ph.D. in an additional 4-4.5 years. Normal progress guidelines are discussed in the following paragraphs.

A. Entry

All Ph.D. programs begin in the fall. The rare student who enters during the spring term will be officially entered into the Ph.D. program in the fall term of that calendar year, and will face the same requirements for normal progress as the Fall Ph.D. entrants of that year. Most students will enter the Ph.D. track in their first fall semester in the program. Some students will be advised to start with the 500-level core and postpone their entry to the Ph.D. track until fall of the second year. Students who start the Ph.D. program with the 500-level core will, for the first year, face the same normal progress requirements as students in the first year of the M.S. program.

B. First Year on the Ph.D. Track

Ph.D. students complete the microeconomic theory (Econ 601 and Econ 603), macroeconomic theory (Econ 602 and Econ 604) and econometrics (Econ 671 and Econ 672) courses in the first year of the program. The normal load is three courses per semester. These students must take the microeconomics and macroeconomics qualifying examinations for the first time shortly following the Spring Semester of the first year. Should it be needed, the second attempt will be completed in August preceding the second year. These students will complete 24 credits by the end of the first year in the program. Normal progress requires a cumulative grade point average of at least 3.0 in these courses.

C. Second Year on the Ph.D. Track

Students will take a total of at least nine credits of formal coursework in the fall semester, and at least nine credits of formal coursework in the spring semester. A student will have completed the courses for two field sequences and a minimum of 42 credits by the end of the second year. Students will have completed at least 4 Ph.D. field courses beyond the core courses (Econ 601, 602, 603, 604, 671, 672) of the Ph.D. program. Normal progress requires a cumulative grade point average of at least 3.0 in all courses to this point.

D. Third Year on the Ph.D. Track

Students take the third year workshop courses, Econ 694A on the fall semester and Econ 694B in the spring semester of their third year. Students who have not completed all field course requirements take the number of credits needed to accomplish this task during the fall or spring semester of the third year. Students must complete and submit the third year paper and register for three credits of Econ 691. They receive a satisfactory grade on the third year paper before the beginning of the fall semester of their fourth year. Students spend most of their time on dissertation research and register for an appropriate number of research credits each semester (Econ 699). Ph.D. students file the POSC form no later than the end of their fifth semester on the Ph.D. track. Students making normal progress complete all field requirements by the end of the fall semester of the third year. Normal progress requires a cumulative grade point average of at least 3.0.
E. Fourth and Fifth Year on the Ph.D. Track
Ph.D. students making normal progress hold the preliminary oral exam no later than the seventh semester on the Ph.D. track. They also provide a workshop presentation on their dissertation research between the preliminary oral examination and final oral examination. A cumulative grade point average of at least 3.0 is required in order to graduate.

III. Funding
Individuals who obtain university support for their graduate education in the form of teaching or research assistantships receive direct and indirect benefits from the university. The most important indirect benefit is the Graduate College tuition scholarship. Other benefits may include better access to equipment and research materials. Thus, those on assistantship are different than other university employees and graduate students.

The Department policy concerning reappointment eligibility for teaching or research assistantships requires that the following criteria be met:

1. Satisfactory completion of the prior appointment duties and responsibilities;
2. Satisfactory academic performance as defined in this document is achieved;
3. Satisfactory academic progress (normal progress as defined in this document) is accomplished;
4. Satisfactory behavior in compliance with the ISU Student Disciplinary Regulations is maintained;
5. The maximum length of time on appointment as defined by the Department in this document and the Graduate College has not expired; and
6. Continuation is always contingent on the availability of funding.

A. M.S. Students
1. Students initially admitted to the M.S. program with funding will be given priority for renewal of appointment if they have completed less than one year in the M.S. program. Students will only be renewed if their appointment performance is satisfactory and they are meeting the normal progress requirements.
2. M.S. students will not be funded as graduate assistants, regardless of funding source, beyond the equivalent of one and one-half academic years of one-half time assistantship support. Any ISU funding will be on a base other than that reserved for graduate assistants.

B. Ph.D. Students
1. Students initially admitted to the Ph.D. program with funding will be given priority for assistantship support for a total of four academic years from initial registration with the possibility of a fifth year. Students who have completed two or more years in the program will almost never be continued on assistantship support unless they are meeting normal progress requirements. Support for a fifth year may be available and is dependent on a number of factors including exemplary performance of duties, availability of funding for a specific project, and normal progress toward the degree. Any student who has not completed a preliminary oral examination will not be supported beyond four years.
2. Students initially admitted to the M.S. program who are later admitted to the Ph.D. program with funding will be given priority for assistantship support for four academic years from admission to the Ph.D. program with the possibility of a fifth year. Students who have completed two or more years in the economics program will almost never be continued on assistantship support unless they are meeting normal progress requirements. Support for a fifth year may be available and is dependent on a number of factors including exemplary performance of duties, availability of funding for a specific project, and normal progress toward the degree. Any student who has not completed a preliminary oral examination will not be supported beyond four years.
3. A student who does not satisfactorily complete a third-year paper by the seventh semester on the Ph.D. track will not be funded beyond that time.
4. Students initially admitted to the Ph.D. program who start with the M.S. core will be required to achieve a GPA of 3.0 or better in Econ 500, 501, 502, and 571 in order to be eligible for renewal of funding beyond the first year.
5. Ph.D. students will not be funded as graduate assistants for periods in excess of these guidelines. Any ISU funding will be on a base other than that reserved for graduate assistants.

C. Restrictions on hours of work for those on assistantship:
1. M.S. and Ph.D. students who receive funding from the department are discouraged from seeking additional employment outside the assistantship. Such outside commitments can hinder normal academic progress and can affect the performance of assistantship responsibilities. Students who find jobs in addition to their assistantship are still required to meet normal progress requirements in order to qualify for departmental support.
D. Administration of Assistantship Appointments

Graduate assistantship appointments are administered by the Graduate Studies Office. Determination of the specific assistantship appointment is based upon a number of factors including departmental needs, faculty needs, student interests, and funding availability. Requests for changes in assistantship appointments should be initiated through the Director of Graduate Education.

IV. Ph.D. Co-Major Students

In the case of students pursuing a Ph.D. with a co-major in economics or agricultural economics and another field, it is the expectation that the Economics Department and the co-major department or program will both contribute to the teaching or research assistantship funding of the student. The co-major Ph.D. student will be given priority for assistantship support from the Economics Department for the equivalent of three academic years with the possibility of a fourth. Support for the fourth year is dependent on a number of factors including exemplary performance of duties, availability of funding for a specific project, and normal progress toward the degree. For a co-major student, normal progress requirements (for renewal of assistantship) will be determined by the Director of Graduate Education on a case-by-case basis and will be communicated to the student in writing.