THE OHIO STATE UNIVERSITY, DEPARTMENT OF PSYCHOLOGY Cognitive Area Program

The guiding principle in the Cognitive Area graduate training program is to involve students from their very first year in the tasks that are performed professionally by cognitive psychologists: theoretical analysis, research design, data analysis, scholarly writing, teaching, editorial reviewing, and oral presentation of research.

All graduate students are expected to follow guidelines set forth by the Graduate School of The Ohio State University (see Graduate School Handbook) and the Department of Psychology (see Summary of Rules Concerning Graduate Students in Psychology; also, Graduate Program Handbook). Below are additional guidelines developed for graduate students in the Cognitive Area program. These guidelines, along with those of the Psychology Department and the Graduate School, define what the Cognitive Area considers as making reasonable progress toward a degree.

I. Research

Each student is encouraged to work closely with faculty members. Independence in research is encouraged, although often at first the student gains an introduction to active research programs by assisting in currently ongoing research. As competence and experience are gained, the student assumes a larger role in the conception and initiation of projects, eventually becoming a full collaborator.

- 1. The first-year project is intended to immerse the student in research immediately upon starting the graduate program. The project can be a theoretical, quantitative, empirical, or methodological investigation that, by the end of the first year, demonstrates the student has begun to develop scientific competence. A paper (approximately 20-30 text pages) on the project must be turned in to the Area Head no later than the end of summer semester after the student's first year. One style for the paper is the brief report in Psychonomic Bulletin & Review. The advisor and Area Head will evaluate the paper's quality, which must be judged acceptable for the student to continue in the program.
- 2. The program requires a Plan A Master's Degree (i.e., with a Master's Thesis). It is required that the Master's Thesis will be completed before the start of the student's third year in the program, and will be considered in conducting the second year review. If this deadline is not met, the Area in consultation with the chair of the Graduate Studies Committee may ask the Graduate School to issue an official warning to the student that further registration may be denied. If the thesis has not been completed after one additional semester, the student may be required to meet with the faculty of the Area and provide an oral justification for continuation in the program. One possible outcome of this meeting is that the student will be advised to complete a terminal Master's program and not to continue in the Ph.D. program.

The Master's Thesis: At the outset of the project, an M.A. candidate must submit a formal research proposal to faculty members of her/his Master's committee. The committee is comprised of at least three faculty members. At least two of the three, including the student's adviser, must hold graduate faculty rank in Psychology. The third committee member need not be from the Psychology Department, but must be a member of the graduate faculty. The adviser must be at least Category II Graduate Faculty and be a member of the Cognitive Area; remaining committee members must be at least Category I.

The M.A. proposal should consist of a brief review of the relevant literature and a method section in which the proposed experimental design is outlined. The total length of the proposal should not exceed ten typewritten pages (double-spaced), and it should be presented to the three committee members involved no later than the beginning of the fall semester of the student's second year.

The proposal may include preliminary research, but students are strongly advised to submit the proposal as early as possible, because the committee may require changes in the design which could negate any work already completed. In addition, students should be advised that some faculty may require that they receive the proposal before any data collection is begun, regardless of any potential changes, and for that reason also, students are encouraged to complete the proposal as early as possible.

Immediately after a student has taken the one-hour oral examination necessary to complete the Master's Thesis, the Master's Examining Committee will carefully evaluate the quality of the thesis. The Committee in consultation with the Area will then recommend to the Graduate Studies Committee of the Department of Psychology whether or not the student should be allowed to pursue further graduate work toward the Ph.D. degree. It is the student's responsibility to obtain appropriate forms from the graduate school and to schedule dates, times and location for the master's examination.

- 3. Each student is required to complete two substantial pieces of research prior to the student's Doctoral Dissertation. Students are encouraged to collaborate on research with more than one faculty member to fulfill this requirement.
- 4. Every year, students are required to make one oral presentation of research findings to the Area faculty and graduate students.

Each year many of our students attend one or more professional conventions, and they often present posters or papers. At conventions, students can hear reports of current research a few years before they appear in print and also have informal contact with colleagues from other institutions.

II. Course Requirements

In general, a student and his/her advisor will jointly design a plan for study for the student. The plan must include the following:

- 1. Statistics 6810 and 6811 must be taken in the students' first year unless the student can show that the same work has been completed elsewhere.
- 2. Students are required to take 1 course from each of the three areas: Perception, Cognitive Neuroscience and Language and Memory.

III. Annual Reviews

At the end of each year, Area faculty will evaluate each student's progress in the graduate program. The evaluation will be based on performance in coursework, meeting deadlines for the Master's Thesis and Candidacy Examination, and the student's general professional development. The student's advisor will then meet with the student and convey the progress report. Unsatisfactory progress will be noted in a letter, a copy of which will be kept in the student's file. The student has the right to appeal any evaluation or program requirement following the grievance procedures in the Department of Psychology Graduate Program Handbook. In some special situations the review will take account of extenuating circumstances that slow the student's progress.

IV. Candidacy Examination

Admission to candidacy for the Ph.D. degree is determined at the Candidacy Examination. The decision is made on the basis of the student's performance on both the written and oral portions of that examination. A recommendation to candidacy represents a commitment by the graduate faculty of the Area and enables the student

to study for the highest degree offered by the University. The Ph.D. program demands a heavy investment from the student, faculty and institution. It demands unusual amounts of time, energy and financial support. As a program and as a department, the faculty work hard to ensure that these finite resources are available to students whose performance demonstrates high levels of ability and effort.

A student's graduate training is, because of the academic structure, "compartmentalized" into courses taken in specific calendar semester. One result is that the relevance of information acquired in one time and place for a problem encountered in another time and place is often not recognized or fully appreciated. The Candidacy Examination has as one of its aims the promotion of "decompartmentalization." By requiring responses to questions that are issue- or problem-related, the exam seeks to promote integration and synthesis of knowledge and to encourage students to seek connections among pieces of information acquired at different times and on different topics.

The Cognitive Area views the Candidacy Examination as a broad test of the student's knowledge in the field of cognitive psychology, and requires evidence of scholarship that would certify the student to conduct research and teach undergraduate level courses over a wide range of problem areas related to cognitive psychology. This will mean that a plan of study be formulated that goes beyond the student's course work and research experience at Ohio State. For example, independent readings that extend the reading requirements of courses taken by the student are expected and these should be reflected in the student's study plan. The specific contents of the plan of study are determined by the student's interests and by the interests and recommendations of the faculty members who form the Candidacy Examination committee. The faculty expect that a student who requests a specific faculty member as a committee member will have taken courses and/or participated in individual studies with the faculty member as a means of establishing a set of interests to be tested in the Candidacy Examination. Faculty members have the right to refuse membership on the committee of a student with whom, for example, they have neither common interests nor sufficient prior interaction.

The Candidacy Examination committee consists of at least four authorized graduate faculty members, including the student's adviser. At least three of the members of the committee must hold the necessary graduate faculty status in the Department of Psychology. (The adviser must be Category III; other members at least Category II). The adviser and at least one other member must be from the Cognitive Area. Also, it is deemed advisable that one member of the committee be from a department or departmental area outside the student's major area. This committee (referred to as the Advisory Committee by the Graduate School) writes questions for the written portion of the Candidacy Examination. The two-hour oral examination following the written portion is conducted by these faculty members plus a Graduate School Representative.

A formal version of the study plan (i.e., an organized reading list) must be submitted to the student's advisory committee by May 1 of the student's third year in the program, with the exam completed no later than Autumn semester of the student's fourth year. The student must include with the plan of study: (1) a one page summary of courses taken and research completed to meet the requirements listed above in sections I and II; (2) a one page summary of his or her area(s) of specialization plus a brief explanation of the relationship of these specialty areas to the plan of study. Upon receipt of a study plan, Faculty members should give prompt and responsive feedback to the student.

Prior to assigning dates for the oral and written portions of the examination, it is the student's responsibility to *notify* the graduate school of intent to undertake the examination. The student is responsible for obtaining appropriate forms from the graduate school and arranging dates, times and location of the examination. The formal examination consists of written and oral portions. The student will have seven days to answer examination questions posed in the written portion and on the eighth day the written response will be date-stamped by an Area administrative associate. The student will be able to distribute the seven days between questions. The two-hour oral portion of the examination must follow the written examination according to guidelines stipulated by the graduate school (within one month); however, all faculty on the Candidacy Examination committee, including the faculty representative assigned by the graduate school, must be given at least one week to read the written portion.

Graduate school rules permit the option of a second attempt at Candidacy Examination, at the recommendation of the advisory committee. In cases where a second attempt is permitted, the student must complete the written portion of the second attempt no later than the Candidacy Examination scheduled one year after the first attempt. Failure to pass Candidacy Examination on a second attempt results automatically in dismissal from the program. If the examination is NOT taken within one year, the Area in consultation with the chair of the Graduate Studies Committee may ask the Graduate School to issue a warning that further registration may be denied. At a minimum the area will recommend to the Stipends Committee that NO departmental assistantship be awarded during further participation in the program.

V. Minors

Students whose major interest is in the Cognitive Area may minor in other academic areas within or outside of the Psychology Department. The nature of a minor program is determined by requirements for a minor as specified by the program in which the student chooses to minor. Cognitive Area students are encouraged to familiarize themselves with these so that at Candidacy Examination time, they will have (a) satisfactorily completed minor requirements and (b) accepted terms on which the minor portion of the Candidacy Examination is administered by the minor program.

Students whose major interest is in a field outside the Cognitive Area (whether in the Psychology Department or not) may minor in the Cognitive Area. A minor in the Cognitive Area requires that the student (a) identify an Cognitive Area faculty member as a minor advisor; (b) take courses from at least two different Cognitive Area faculty members; (c) pass a Candidacy Examination in which the minor area is represented on both written and oral portions. With respect to evaluation of a student's minor performance on the Candidacy Examination, at least two Cognitive Area faculty will participate in construction and grading of the written portion of this Examination. The student's minor adviser (or surrogate in case of prior arrangement) will represent the Cognitive Area in the oral examination portion, and his/her assessment will weigh jointly in the student's written and oral performance.

VI. Dissertation

The Doctoral Dissertation represents the final stage in the program. A Dissertation research problem is first proposed by the Ph.D. candidate and this is reviewed in a prospectus meeting attended by members of the student's dissertation committee. A dissertation proposal should include a brief review of relevant literature, a statement of hypothesis and rationale, proposed design(s), and it may often also include (or reference) pilot research. It is presented, at the outset of the dissertation project, to members of the candidate's dissertation committee who have the primary function of evaluating the merits of the proposed research and recommending potential changes. The proposal may include preliminary research, but students are strongly advised to submit the proposal as early as possible, because the committee may require changes in the design which could negate any work already completed. In addition, students should be advised that some faculty may require that they receive the proposal before any data collection is begun, regardless of any potential changes, and for that reason also, students are encouraged to complete the proposal as early as possible.

The dissertation committee consists of at least three faculty members. The adviser must hold Category III graduate faculty status. The other members must be either Category II or III. Category II faculty may serve as coadvisers. At least three members (including the adviser) of the committee must be from the Department of Psychology. The adviser and at least one other member must be from the Cognitive Area. These faculty and a Graduate School Representative will attend the two-hour oral examination. It is the student's responsibility to arrange for the dissertation oral with the graduate school. This includes obtaining appropriate forms and scheduling dates, times and rooms for this examination.

These stages of the graduate student's training are conducted according to rules described by the Graduate School (Section 9-9) and the Department of Psychology (Rules Summary items 15-16). Students must schedule 999 credits during their dissertation years to reflect the proportion of their graduate work devoted to dissertation research.

VII. Outside employment

The department of psychology attempts, whenever possible, to support graduate students during their training years via employment opportunities such as GTAs, GRAs, and so on. These are 50% employment positions with the assumption that the job itself provides learning opportunities for the student and the remaining time is devoted to graduate training activities. On those occasions where the department cannot support the student half-time, students may seek outside support. The department has no strict policies on the amount of outside employment but the Cognitive Area faculty do not want such activities to jeopardize a graduate student's progress in the doctoral program. If students do not make satisfactory progress in courses and research, they jeopardize their standing in the program and outside employment will not be considered an extenuating factor for those students who are already funded 50% time.

VIII. Leave of Absence

There may be circumstances under which the student needs to take some time away from the program, and in most cases this can be arranged relatively easily. The first step in arranging for a leave of absence is for a student to consult with his or her adviser. If the adviser agrees concerning the need for and appropriateness of a leave as a means of facilitating the student's eventual return to and completion of the program, the student and adviser will need to decide on the length of the leave and the likely date of resuming graduate work, and submit that to the Area faculty. The faculty will consider a student's request at a regularly scheduled Area meeting. Requests for leaves of absence of two years or less are more likely to be approved by the faculty than are longer leaves, primarily because it is difficult for faculty to anticipate course and advising loads several years in advance.

There is no stigma attached to requesting or taking a leave. There are times when people need to consider temporary (or permanent) changes in circumstances, and in several cases students have returned after a leave to successfully complete the Ph.D. and pursue a successful career in psychology. However, students should be cautioned that the Graduate School requires the student to complete the Dissertation within five years after the Candidacy Examination. A leave of absence does not alter this requirement.

Summary of Committees

Master's Committee: The committee is comprised of at least three faculty members. At least two of the three, including the student's adviser, must hold graduate faculty rank in Psychology. The third committee member need not be from the Psychology Department, but must be a member of the graduate faculty. The adviser must be at least Category II Graduate Faculty and be a member of the Cognitive Area; remaining committee members must be at least Category I. The oral examination lasts approximately one hour.

Candidacy Examination Committee: The Candidacy Examination committee consists of at least four authorized graduate faculty members, including the student's adviser. At least three of the members of the committee must hold the necessary graduate faculty status in the Department of Psychology. (The adviser must be Category III; other members at least Category II). The adviser and at least one other member must be from the Cognitive Area. Also, it is deemed advisable that one member of the committee be from a department or departmental area outside the student's major area. This committee writes questions for the written portion of the Candidacy Examination. The two-hour oral examination following the written portion is conducted by these faculty members plus a Graduate School Representative.

Dissertation Committee: The dissertation committee consists of at least three faculty members. The adviser must hold Category III graduate faculty status. The other members must be either Category II or III. Category II faculty may serve as co-advisers. At least three members (including the adviser) of the committee must be from the Department of Psychology. The adviser and at least one other member must be from the Cognitive Area. These faculty and a Graduate School Representative will attend the two-hour oral examination.

Here is a checklist of some major Area requirements:	
	First-year project completed no later than end of summer semester of the first year
	Master's Thesis completed by the end of the <u>second</u> year
	One oral presentation of research findings each year
	Candidacy Examination at the end of the third year
	One additional research project
	Teaching experience
	Dissertation

The student is encouraged to obtain copies of the Graduate School Handbook and the Department of Psychology Graduate Program Handbook for additional information for themselves and their advisers.