The non-thesis Master’s degree programs in Biology, Microbiology, and Zoology are designed to make a substantial contribution to the intellectual development of students who are not interested in pursuing a research-oriented career in science. To earn the non-thesis Master’s degree, the student must complete at least **36 hours** of course credit beyond the Bachelor’s degree. At least 18 hours are required in the major subject area.

**Academic Standing in the Program**
A student who is on schedule for completion of the degree program (see the accompanying checklist) and who maintains a **GPA of at least 3.0** is considered in good academic standing, unless he or she receives the grade of “C” in **six hours** of any courses used to satisfy the degree plan (listed on the “Program for the Master’s Degree and Admission to Candidacy” form – see the “Degree Plan” section of this handbook), or a grade of “D” or “F” in any **graduate course**.

Once each year (usually in January), all graduate students are required to fill out an evaluation form reporting on various aspects of their progress toward the completion of their degrees. The Graduate Student Affairs Committee (GSAC) uses this form to assess the progress and academic standing of each graduate student. Students who are not making adequate progress or who fall from good academic standing may be referred to the Chairperson of the Department for review and possible loss of teaching assistantship or dismissal from the graduate program.

**Admission to the Master’s Degree Program**
Applications for admission into the Master’s degree programs in Biology, Microbiology, or Zoology are considered and acted upon by the department’s Graduate Student Selection Committee (GSSC). Decisions to admit students are based upon:

1. the grade point average (GPA) over the last **60 hours** of undergraduate course work;
2. the verbal, quantitative, and analytical writing scores for the Graduate Record Examination (GRE) General Test;
3. **three** favorable letters of recommendation;
4. in the case of **international students** for whom English is a second language, the scores for the Test of English as a Foreign Language (TOEFL) or International English Language Testing System (IELTS); and
5. a Goals Statement. This statement (**1–2 pages** in length is sufficient) should be a specific and thoughtful explanation of the student’s career goals and how an M.S. degree from Texas Tech University will contribute toward attaining those goals. Any prior experience with scientific research should also be described.
In addition to the above criteria, each student must identify a faculty member who has at least provisionally agreed to serve as the student’s Major Advisor before he or she is considered for admission into the Master’s program. Students are urged to communicate directly with one or more faculty members whose research interests are most compatible with their own. **Any student who does not gain admission initially is welcome to submit a new application after improving his or her credentials.**

**Advisory Committee**

As soon as possible, but **no later than the second semester** of enrollment in the Master’s degree program, the student will form an Advisory Committee in consultation with his or her Major Advisor. This Committee is composed of **three** (occasionally more) Graduate Faculty members, one of them being the Major Advisor who will serve as the Chairperson of the Committee. At least **two-thirds** of the Committee members, including the Chairperson, must be Graduate Faculty members in the Department of Biological Sciences (this may include Adjunct Faculty). As soon as the student has filed the “Program for the Master’s Degree and Admission to Candidacy” form (see the “Degree Plan” section of this handbook), the Dean of the Graduate School will officially appoint the Advisory Committee. It is the responsibility of the student and Major Advisor to inform the Graduate Advisor and the Dean of the Graduate School of any changes in the composition of the Advisory Committee.

The Advisory Committee will meet with the student at least **once a year** to advise the student and assess his or her progress towards the Master’s degree. The Committee determines course requirements and conducts the final oral examination.

Occasionally, it may become necessary for a student to change the composition of his or her Advisory Committee.

1. In the case of a proposed change other than the Major Advisor, the process is initiated by the Major Advisor. The Graduate Advisor must be informed of the change. The student must also show courtesy to the Committee member being replaced by letting him or her know about the plans for change and reasons for the decision. It may be that a misunderstanding has occurred that can be resolved, so that a change will not be necessary.

2. A student proposing to change his or her Major Advisor should inform the current Major Advisor directly or through the Chairperson of the Department. In either case, the Major Advisor will be given an opportunity to express his or her opinion and make an attempt to work out problems that may have precipitated the need for such a change. Some discussion with the Chairperson of the Department may be required before a final decision is reached.

3. In extreme cases of disagreement, the Major Advisor or Committee member has the right to file an official grievance, which will be conducted according to normal grievance policies of the University.

4. If a degree plan has been filed prior to a change in the composition of the Advisory Committee, a “Title or Committee Change Form” must be completed, signed by the Graduate Advisor, and submitted to the Graduate School.
Course Requirements
The student and Advisory Committee together will determine which courses must be
taken to satisfy the M.S. degree requirements. The student is required to complete at
least **36 credit hours** beyond the Bachelor’s degree. The Graduate School ordinarily
does not permit more than 6 hours of individual study courses and/or BIOL 7000
Research to be counted as part of the non-thesis Master’s degree program. In addition,
the following specific requirements and considerations apply to all graduate students.

1. **BIOL 6202. Preparation for Graduate Learning and Teaching in Biology.**
   All students are required to take BIOL 6202 during their first fall semester of
   enrollment in the graduate program. Failure to take the course at the appropriate
time might result in dismissal of the student from the program or the loss of a
   teaching assistantship.

2. **BIOL 6301. Biological Pedagogy.** All teaching assistants are required to take
   this section of BIOL 6301 Advanced Topics in Biology during their first year of
   enrollment in the graduate program. Failure to take the course at the appropriate
time might result in the loss of a teaching assistantship.

3. **Leveling courses.** Incoming graduate students with educational gaps in their
   background may be required by their Advisory Committee to take certain courses
   in order to fill these gaps.

4. **Languages and research tools.** The Department of Biological Sciences does not
   have a general requirement for either a foreign language or a research tool subject
   (for example, computer programming) for the graduate degree. However, the
   Advisory Committee may require the individual student to take such courses if
   they are deemed an essential part of the student’s area of scholarly interest.

Deadlines and Time Limit
Although every effort will be made by both the Graduate Advisor and the Major Advisor
to make the student aware of various University and Department regulations and
deadlines, it is ultimately the student’s responsibility to see that these regulations are
adhered to and that the deadlines are met (see the accompanying checklist). All course
work applied towards a Master’s degree must be completed within **six calendar years**
after acceptance into the graduate program.

Degree Plan (see also Filing a Degree Plan)
All Master’s students must submit a “Program for the Master’s Degree and Admission to
Candidacy” form to the Graduate School. This form, which must be initialed by the
Major Advisor and signed by the Graduate Advisor, lists all required courses. It should
be submitted as soon as possible but **no later than the second semester** of enrollment in
the Master’s degree program. The Graduate Catalog should be consulted for any
additional requirements that must be met before Admission to Candidacy is granted.
Subsequent changes in the degree plan must also be approved by the Advisory
Committee and filed with the Graduate School.

Departmental Graduate Student Meeting
The **week before classes begin** in the fall semester, the Chairperson of the Department
and other faculty will meet with the graduate students to communicate important news
and information. Attendance at this meeting is mandatory. In addition, course coordinators often hold organizational meetings with Teaching Assistants during this same week.
Enrollment for Non-thesis M.S. Degree
All graduate students are required to register for appropriate courses in every semester or summer session in which they expect to receive assistance, use the facilities of the University and faculty time, or take comprehensive examinations. If enrollment is interrupted during the summer, the student may be required to pay additional fees upon re-enrollment in the following fall semester.

Students are expected to register for a number of course hours commensurate with the anticipated level of effort in their graduate studies. Except in unusual circumstances, all students who are seriously pursuing graduate degrees will be enrolled full time. Full-time enrollment is normally 12 hours in a regular semester and 6 hours in each summer session. For students on fellowships, assistantships, or other appointments that require duties other than course work, full-time enrollment is normally 9 hours in a regular semester and 3 hours in each summer session (i.e., 24 hours per calendar year).

Filing a Degree Plan
No later than the second semester of enrollment in the graduate program, the student must file a “Program for the Master’s Degree and Admission to Candidacy” form at the Graduate School.

All requested information must be filled in on the form, including expected graduation date (month and year) and members of the Advisory Committee. If a proposed member of the Committee is at an institution other than Texas Tech University or the TTU Health Sciences Center, the Graduate School must be provided with his or her curriculum vitae. In general, the person’s academic credentials should be equivalent to those of a Graduate Faculty member at Texas Tech University.

The student and his or her Advisory Committee will decide together what courses are listed on the degree plan. Under the Major column, list all of the courses that are taken to complete the M.S. degree requirements in the major subject area, including BIOL 6202. All graduate (5000 and 6000)-level courses with BINF, BIOL, BOT, MBIO, and ZOOL prefixes are considered as major courses. Formal courses are listed only by prefix and number without a title, e.g., BIOL 5320. For individual study courses or courses that can be repeated for additional credit (e.g., BIOL 6100, BIOL 6101, BIOL 6301, and BIOL 6309), different sections or specific titles should also be listed to indicate that the course does not have the same content each time it is taken. Up to 6 credit hours of BIOL 7000 Research can be included on the non-thesis M.S. degree plan. If the student desires, two or three courses in a subject area outside of the major can be designated as a minor and listed under the Minor column. However, this is entirely optional. A minimum of 36 credit hours of course work must be listed on the degree plan. Undergraduate courses cannot be counted toward the Master’s degree. Tool, Language, or Leveling courses are listed only if required by the Advisory Committee. If the student wishes to receive transfer credit for graduate courses taken at another institution, the course prefixes and numbers on the student’s transcript from that institution must be listed as well as the equivalent graduate courses at Texas Tech University. The student should be prepared to
provide the Graduate Advisor and the Graduate School with copies of the transcript. Up to six hours of course credit can be transferred.

The completed form must be signed by the Graduate Advisor before it is submitted to the Graduate School. The student’s Major Advisor should either initial (not sign) the form or send a short note to the Graduate Advisor indicating that the plan has been approved by the Advisory Committee.

**Final Oral Examination**
Before earning the M.S. degree, each non-thesis Master’s student must pass a final comprehensive examination in the major field before earning a Master’s degree. The graduate student may set a date for the examination with the approval of all Advisory Committee members, which should be scheduled at least three weeks in advance. Students should be aware that the results of the examination must be reported to the Graduate School approximately four weeks prior to graduation (consult the “Graduation Deadlines” posted on the Graduate School web site for the exact date), and the examination should be scheduled with this deadline in mind. Students should also understand that faculty members may not be available for an examination during the summer.

The final oral examination is administered by the student’s Advisory Committee. The Committee members will use the question-and-answer format to assess the extent of the student’s knowledge and understanding of the basic scientific principles he or she has been exposed to through course work and readings. The student is expected to deliver responses that are concise and well-reasoned. As soon as possible after the examination, the Major Advisor will report the results to the Dean of the Graduate School. Satisfactory performance by the student is indicated by a majority affirmative vote of the Committee members. A student who fails the examination may repeat it once, but only after an interval of four months or more. In the event of failure, the Major Advisor will provide the student with a written summary of the perceived deficiencies and corrective actions that need to be taken before making the second attempt.

**Graduation: Additional Requirements**
During the semester of intended graduation, a “Statement of Intention to Graduate” must be filed at the Graduate School, and payment of all required fees must be posted to the student’s University bill. Since exact dates for these requirements vary with the semester, the current “Graduation Deadlines” posted on the Graduate School web site should be consulted.

**Maximum Allowable Graduate Hours**
Graduate students who are not making timely progress toward completion of their degree are subject to termination by the Dean of the Graduate School. Students beyond the maximum allowable graduate hours may be required to pay out-of-state tuition, regardless of residence status. The maximum time allowed for completing a Master’s degree is **six years**.
**Preliminary Examination (Diagnostic)**

The student’s Major Advisor or Advisory Committee may require the student to pass a preliminary examination in the major and minor fields of the degree program to facilitate evaluation and counseling of the student. The Major Advisor will coordinate the administration of the examination, which may be either written or oral and should be taken before the end of the student’s **second semester** of enrollment in the graduate program.
**NON-THESIS M.S. CHECKLIST**

Students are responsible for seeing that all deadlines are met.

<table>
<thead>
<tr>
<th>Item</th>
<th>Date or Deadline</th>
</tr>
</thead>
<tbody>
<tr>
<td>Choose <strong>Major Advisor</strong></td>
<td><strong>Prior to entry</strong> into the graduate program</td>
</tr>
<tr>
<td>Departmental <strong>graduate student meeting</strong></td>
<td><strong>Week before</strong> classes begin in the fall semester</td>
</tr>
<tr>
<td>Plan <strong>courses</strong> for first semester: BIOL 6202 (Preparation for Graduate Learning and Teaching in Biology) is required during first fall enrollment</td>
<td><strong>Week before</strong> classes begin</td>
</tr>
<tr>
<td>Set up and meet with <strong>Advisory Committee</strong></td>
<td><strong>During first semester</strong> of enrollment</td>
</tr>
<tr>
<td>Take <strong>preliminary examination</strong> (if required by the Advisory Committee)</td>
<td><strong>During first semester</strong> of enrollment</td>
</tr>
<tr>
<td>File <strong>degree plan</strong> (<strong>“Program for the Master’s Degree and Admission to Candidacy” form</strong>) at the Graduate School: at least <strong>36 hours</strong> of graduate course work is required (must also file any subsequent course changes)</td>
<td><strong>As soon as possible but no later than the second semester of enrollment</strong></td>
</tr>
<tr>
<td>Turn in annual <strong>graduate student evaluation form</strong></td>
<td><strong>Usually due in January of each year</strong></td>
</tr>
<tr>
<td>File <strong>“Statement of Intention to Graduate”</strong> at the Graduate School</td>
<td><strong>During the semester of graduation</strong> (exact deadline varies)</td>
</tr>
<tr>
<td>Obtain approval of all Advisory Committee members to schedule the <strong>final oral examination</strong></td>
<td><strong>During the semester of graduation</strong> (exact deadline varies)</td>
</tr>
</tbody>
</table>
### NON-THESIS M.S. CHECKLIST, continued

<table>
<thead>
<tr>
<th>Task</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Take <strong>Final Comprehensive Examination</strong></td>
<td>During the <strong>semester of graduation</strong> (exact deadline varies)</td>
</tr>
<tr>
<td>(Major Advisor reports the result to the Graduate School)</td>
<td></td>
</tr>
<tr>
<td><strong>Graduation</strong></td>
<td><strong>Target:</strong> two years</td>
</tr>
</tbody>
</table>