

SYLLABUS FOR SEMBA'S BEEKEEPING COURSE FOR BEGINNERS

General Overview of Course:

This course is designed for beginners to learn about the biology of the honey bee, the honey bee hive, tools needed to work with honey bees, feeding honey bees, seasonal management, honey extraction, and honey bee disease identification. Students will be given several sessions of basic beginning beekeeping instruction including lecture and hands-on field experience. Students who place a hive, or anything else, on or at Tollgate must timely remove same from Tollgate; anything not timely removed will be auctioned at or after the last session with all of the proceeds going towards costs, expenses and M.S.U.

Instructors:

Mike Siarkowski (Leader) (517)545-0824
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Richard I. Mendel (734) 660-8621

Classes held: 1:00 p.m., Sundays, except as noted

Apiary Site: Tollgate Education Center, M.S.U.
28115 Meadowbrook Road
Novi, MI 48377-3128

Winn Harless (734) 453-2914

Tuition (all in U.S. funds):

Tuition for the entire course, other than SEMBA's Annual Beekeepers' Conference:

\$120 per student, payable in advance, if you provide your own new hive and new bees
(However, family members may share their hive with each other).

\$170 per student, payable in advance, if you don't provide a new hive and new bees.

\$30 per session; but only with prior approval and payment in advance.

Tuition includes a paperback copy of the text entitled "First Lessons in Beekeeping" by Keith S. Delaplane, an electronic copy of *Starting and Keeping Bees in Michigan*, and a one-year SEMBA membership (either first year or renewal), but does not include any bees, equipment, supplies, etc. [Tuition also does **not** include the following items required for the course: New hive wood ware, new package of bees with new queen (both from an approved source), protective clothing, hive tool, and smoker.]

Requirements:

Attendance at SEMBA's all-day Annual Beekeepers' Conference, to be held at the Vis Ta Tech Center of Schoolcraft College, 18600 Haggerty Rd., Livonia, MI, on **Saturday, March 17, 2012**, beginning at 9:00 a.m. Students are required to attend the three breakout sessions on that day entitled "Introduction to SEMBA Beekeeping Course", "Overview of Getting Started in Beekeeping" and "Basic Beekeeping Equipment Requirements". The written textbook for the course may be distributed at the SEMBA's all-day Annual Beekeepers' Conference.

Registration will continue during SEMBA's Annual Beekeepers' Conference only if, and while, there are available openings in the course. Please note the class size is limited and preference is granted to SEMBA members.

Students will participate in hands-on training. Accordingly, all students must bring clean and uncontaminated protective clothing, (i.e., bee suit with attaching veil and helmet or hood, bee gloves, and work boots or shoes with protective ankle wraps), hive tool, smoker, new woodware equipment and new package of bees with a new queen (both from an approved source).

To help reduce the risk of introducing pests, students electing to temporarily have a hive at Tollgate will need to provide all new hive equipment and a new package of bees with a new queen (both from an approved source). New hive equipment includes all new woodware that includes at least one new outer cover, one new inner cover, at least six (6) new hive bodies, at least sixty (60) new frames with new foundation (added just prior to use), one new bottom board, one new entrance reducer, and one new hive support.

Anyone re-installing a queen and/or any other bee(s) must also acquire them from an approved source. One such source may include the Advance Beekeeping Course at Tollgate; if available, a queen within a cage (which cage is to be promptly returned) and a drawn out frame of brood may be purchased for \$30 (plus one new, unused replacement frame and foundation). Please note that this alternative source not your only approved source and is only being offered as a possible convenience.

Reading text is a must. Attendance at each session is important, since it is difficult to duplicate hive conditions for non-attendees and classes often build upon prior classes.

All participants must properly maintain all items left at Tollgate and conduct themselves in a friendly and helpful manner, following all rules.

INTRODUCTION TO BEEKEEPING SYLLABUS OVERVIEW

SESSION 1, MARCH 17, at the Vis Ta Tech Center of Schoolcraft College, 18600 Haggerty Rd., Livonia, MI, beginning at 9:00 a.m.

- Introduction to SEMBA Beekeeping Course.
- Overview of Getting Started in Beekeeping.
- Basic Beekeeping Equipment Requirements.

"SPRING" MANAGEMENT

SESSION 2, MARCH 18 (Before the class, read text pages: 29-40 and 44-48)

- Introduction to Tollgate and discuss rules.
- Discuss beekeeping and setting goals.
- Synopsis of Langstroth alternatives such as top bar hives, Warre hives and skeps.
- Discuss hive placement.
- TO DO: **Bring** hive woodware [i.e., outer cover, inner cover, boxes, frames, foundation, screened bottom board, entrance reducer and feeder (wood hive stand, optional)] to be constructed.
- TO DO: **Bring** hammer, waterproof exterior glue, correctly sized nails for frames and hive bodies, and staples (air compressor and air powered crown staple gun). (Optional: 1½" x ¼" crown staples and air powered crown staple gun or 2", #6 deck screws and power driver.)
- TO DO: Identify future hive placement and hive owner by number, for reference purposes.
- TO DO: Begin (or continue) to construct hive equipment.
- TO DO: Optional, at your location, prime or stain exterior surfaces of hive.
- TO DO: Optional, at your location, paint any primed exterior surfaces of hive.

SESSION 3, MARCH 25 (Before the class, read text pages: 1-21 and 49-56)

- Identify five (5) key points from last Session.
- Discuss foundation.
- Discuss installation of bee packages.
- Brief overview of bee pests and pathogens, as well as possible interventions.
- Discuss possibly medicating packages.
- Discuss feeding bees - why, what, when and how.
- TO DO: Start to set up bee yard (**bring** carpet & hive support such as bricks, blocks & rocks).
- TO DO: Continue to construct hive equipment, **bring** items and supplies.
- TO DO: Inspect dead overwintered hive(s), if any.
- TO DO: Optional, at your location, prime & paint, or stain, exterior surfaces of hive.

SESSION 4, APRIL 15 (Before the class, read text pages: 22-28, 41-43 and 125-140)

- Identify five (5) key points from last Session.
- Answer questions regarding installation of packages.
- Answer questions regarding feeding, and possibly medicating, packages.
- Discuss inspecting overwintered hives.
- Discuss feeding and medicating overwintered hives.
- TO DO: "De-winterize" overwintered hive(s), **bring** camera.
- TO DO: Look at overwintered hives.
- TO DO: Complete construction of hive equipment, **bring** items and supplies.
- TO DO: Complete bee yard (**bring** carpet & hive support such as bricks, blocks & rocks).
- TO DO: Set up hive for bees (**bring** completed hive equipment including bricks or rocks).
- TO DO: Finish construction of hive equipment, **bring** items and supplies.
- TO DO: Finish, at your location, prime & paint, or stain, exterior surfaces of hive.

SESSION 5, APRIL (Evening of a date to be determined based upon arrival of bee packages)

- TO DO: **Bring** protective clothing, hive tool, and smoker.
- TO DO: **Bring**, if not already at Tollgate, outer cover, inner cover, feeder, spacer, at least two (2) brood boxes, at least ten (10) frames with foundation, bottom board, entrance reducer, carpet & hive support such as bricks, blocks & rocks, as well as bricks or rock for top.
- TO DO: **Bring** sugar syrup (and, optionally, medication).
- TO DO: Optional, medicate packages.
- TO DO: Install packages.
- TO DO: Feeding bees in the hive (and continue to do so).

SESSION 6, APRIL 29 (Before the class, read text pages: 57-58, 61-64, and 75-77)

- Identify five (5) key points from last Session.
- Discuss what to look for when inspecting a new hive.
- Discuss feeding new and overwintered hives.
- Discuss medicating new and overwintered hives organically and otherwise.
- Discuss equalizing and splitting overwintered hives.
- TO DO: Inspect overwintered hives, consider feeding and medication.
- TO DO: Consider splitting overwintered hives.
- TO DO: Inspect new hives.
- TO DO: Feed new hives.

SESSION 7, MAY 20 (Before the class, read text pages: 59, 60, and 66-72)

- Identify five (5) key points from last Session.
- Discuss inspecting all hives for queens and brood.
- Discuss swarming.
- TO DO: Install drone comb in overwintered hives for Integrated Pest Management (IPM).
- TO DO: Inspect all hives for queen and brood.
- TO DO: Add second brood chamber to new hives.
- TO DO: Feed if needed.

"SUMMER" MANAGEMENT

SESSION 8, JUNE 3 (Before the class, read text pages: 73-75 and 78-85)

- Identify five (5) key points from last Session.
- Discuss Michigan honey flows.
- Discuss importance of nucs in the bee yard.
- Discuss honey supering (why, when, and how).
- Discuss drone comb and swarm cells.
- TO DO: Inspect and feed new hives.
- TO DO: Add second or third brood chamber to new hives.
- TO DO: Add honey supers to overwintered hives.

SESSION 9, JUNE 24 (Before the class, read text pages: 118-125 and 141-143)

- Identify five (5) key points from last Session.
- **Discuss pests**
- Discuss and demo sugar roll.
- **Discuss IPM and types of treatments (e.g., broad interruption options).**
- Discuss queen replacement as well as swarm, supersedure and emergency cells.
- Discuss summer increases (making nucs and addressing queens in nucs).
- TO DO: Inspect hives and continue IPM.
- TO DO: Super where needed.

SESSION 10, JULY 15 (Before the class, read text pages: 105-117)

- Identify five (5) key points from last Session.
- **Discuss pathogens and treatment**
- Discuss thinking ahead -- issues and opportunities.
- Discuss extracting surplus honey, if any.
- Answer questions regarding IPM check for pests (e.g., mites).
- Questions and answers (If students don't ask, instructors will.)
- TO DO: Check supers.
- TO DO: IPM check for pests (e.g., mites), treat if necessary and honey will not be extracted.

SESSION 11, AUGUST 5 (Before the class, read text pages: 85-97)

- Identify five (5) key points from last Session.
- Discuss products from the hive.
- Discuss how to move hives.
- TO DO: Inspect nucs.
- TO DO: IPM, monitor hives for pests such as varroa mites, treat if necessary.
- TO DO: Consider feeding hives [e.g., nuc's, light hives & those with pulled honey super(s)].
- TO DO: Pull honey, if any surplus.
- TO DO: Select honey supers for extraction -- either by agreement or by pulling "numbers from a hat".
- **RETURN TO CLASS:** for demonstration of extraction, as well as introduction to bottling, wax rendering and candle making.

"FALL" MANAGEMENT

SESSION 12, AUGUST 26 (Before the class, read text pages: 99-100)

- Identify five (5) key points from last Session.
- Discuss whether to feed or, in the alternative, to super for fall honey.
- Discuss fall requeening (using nucs or not).
- Discuss what to do with nucs.
- Discuss how to move hives.
- TO DO: Check nucs (feed).
- TO DO: Inspect hive for mites, remove treatments.
- TO DO: Feed hive.

SESSION 13, **SATURDAY**, SEPTEMBER 8, at **9:00 a.m.**

- TO DO: Remove hives and all related items.

(STUDENTS MUST REMOVE THEIR RESPECTIVE HIVE AND ALL RELATED ITEMS FROM TOLLGATE EDUCATION CENTER. ANYTHING NOT TIMELY REMOVED (i.e., ABANDONED ITEMS) WILL BE AUCTIONED AT OR AFTER THE LAST SESSION WITH ALL OF THE PROCEEDS GOING TOWARDS COSTS, EXPENSES AND M.S.U.)

"WINTER" MANAGEMENT

SESSION 14, SEPTEMBER 23 (Before the class, read text pages: 22 and 99-104)

- Identify five (5) key points from last Session,
- Discuss getting ready for winter.
- Discuss overwintering hives.
- Discuss getting ready for next year including reviewing "to-do's" such as attending seminars, reading beekeeping journals, ordering and constructing equipment, and early spring hive management.
- General discussion.
- **AUCTION OF ABANDONED ITEMS.**