

## HOS 5555 TROPICAL FRUIT PRODUCTION AND RESEARCH 2008 CLASS SYLLABUS

Instructor: Dr. Jonathan H. Crane, Tropical Fruit Crop Specialist

Dates: Monday, June 30<sup>th</sup>, 2008 to Friday, August 8, 2008 (class is Mon. through Fri.)

Location: Tropical Research and Education Center

18905 S.W. 280 St.

Homestead, FL 33031-3314

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Target audience: This course offers graduate students, scientists, extension faculty, and other professionals (including experienced producers) an opportunity to increase their knowledge of tropical fruit crop horticulture and plant physiology.

Class: Class begins at 8:30 AM each day.

Lecture is usually until 12:00 PM (noon) and then we break for lunch from 12:00 PM (noon) to 1:00 PM to 1:30 PM. In the afternoons after lunch we are generally in the field up to 4:00 PM to 7:00 PM depending upon what is happening and the distance traveled.

Students will be more comfortable in the field if they wear comfortable shoes or sneakers and a hat. You may want to bring water too.

Sunscreen is always a good idea as is bug spray on some occasions.

Objectives of the class:

1. To emphasize horticultural practices of commercial tropical fruit crop management in Florida, the applied aspects of research, and explore the physiological basis for horticultural practices used in crop production of: avocado, mango, carambola, papaya, lychee, longan, mamey sapote, passionfruit, atemoya, sugar apple, guava and others.
2. To expose students to various aspects of fruit production from other tropical areas of the world through presentations.
3. To expose students to production practices through field visits to working orchards, nurseries, packinghouses, botanical gardens, and research/education institutions. Guest lectures will be offered in tissue culture, biotechnology,

insect and disease management, genetics and plant breeding, hydrology, and postharvest handling.

3. To have students understand and be able to apply the principles, concepts, and information from the class to their own situations in production, research, and teaching.

Methods for teaching:

1. Formal lecture, as well as, informal open discussion and questioning.
2. Reading of books and papers, slides, videos.
3. Field visits to interact with production managers, orchardists, researchers, and extension faculty.
4. One or two assignments may be used to demonstrate useful production and research concepts.

Required course texts:

Verheij, E.W.M. and R.E. Coronel (eds.). 1992. Plant Resources of South-East Asia 2: Edible Fruits and Nuts. Backhuys Publishers B.V., Leiden, The Netherlands. (estimated soft-cover \$79.00/ CD estimated \$149.00)

Nakasone, H.Y. and R.E. Paull. 1998. Tropical Fruits. CAB International, Wallingford, UK. (estimated cost \$75.00)

\* These may be purchased the first several days of class by money order or check.

Optional texts: (these may be ordered during class, however, availability and time to delivery is out of the instructor's control)

Campbell, R.J. 1992. Mangos: A guide to mangos in Florida, Fairchild Tropical Garden, Miami, Florida. (estimated cost \$30.00)

Janick, J. and R.E. Paull. 2008. The Encyclopedia of Fruits and Nuts. CABI, Cambridge, MA. (estimated cost \$310.00).

Litz, R.E. 1997. The Mango: Botany, Production and Uses, CAB International, NY, NY. (estimated cost \$140.00)

Morton, J.F. 1987. Fruits of warm climates, Creative Resource Systems, Inc., Winterville, NC. (estimated cost \$125.00)

Peña, J.E., J.L. Sharp, and M. Wysoki. 2002. Tropical Fruit Pests and Pollinators. CABI Publishing, NY, NY. (estimated cost \$149.00)

Ploetz, R.C. 2003. Diseases of Tropical Fruit Crops. CAB International, NY, NY. (estimated cost \$175.00)

Schaffer, B. and P.C. Andersen. 1994. Handbook of environmental physiology of fruit crops, Vol II: Sub-tropical and tropical crops, CRC Press, Inc., Boca Raton, Florida. (estimated cost \$145.00)

Sisir, M. and B.C.K.V. Alaya, K. 1997. Postharvest Physiology and Storage of Tropical and Subtropical Fruits. CAB International, NY, NY. (estimated cost \$120.00)

Whiley, A.W., B. Schaffer, and B.N. Wolstenholme. 2002. The Avocado: Botany, Production and Uses. CABI Publishing, NY, NY. (estimated cost \$149.00)

Numerous handouts will also be provided. Daily reading is expected from texts and handouts on pertinent class subjects.

Optional videos and CD-ROMs to view:

1. ECHO video series - Intro. to tropical fruits; Grafting tropical fruit/avocado; tapes #3-6 cover numerous crops.

2. Handling and promotion of Florida tropical fruits video. Fla. Dept. of Agric. and Consumer Services, TFAC.

Course attendance:

Students are expected to attend every day of class. Special arrangements may be made ahead of time for specific problems and reasons.

Exams: There are three to four exams. Exams are not cumulative with respect to the crop species but is expected that concepts and strategies that are applied throughout the course are fair game for exams. Exams usually last 1-2 hours. The final grade is an average of all exams and student presentations. Test questions on exams consist of primarily short answer and essay.

Grading scale -

A	91-100
B	81-90
C	71-80
D	61-70
F	≤ 60

Academic honesty statement: I (the student) understand that the University of Florida expects its students to be honest in all their academic work. I agree to adhere to this commitment to academic honesty and understand that my failure to comply with this commitment may result in disciplinary action up to and including expulsion from the University.

UF counseling services: Resources are available on the main campus in Gainesville for students having personal problems or lacking clear career and academic goals which interfere with their academic performance. These resources include -

- 1) Univ. Counseling Center, (352) 392-1575 (<http://www.counsel.ufl.edu/>), personal and career counseling; 2) Student Mental Health Care Center, (352) 392-1171 (<http://shcc.ufl.edu/smhs/>); 3) Sexual Assault Recovery Services, (352) 392-1161 (<http://www.shcc.ufl.edu/care/> and <http://www.counsel.ufl.edu/>); and 4) Career

Resource Center, (352) 392-1575  
(<http://www.counsel.ufl.edu/default.aspx>), career  
counseling. They can all be reached by Internet  
at <http://www.counsel.ufl.edu/>.

**The schedule of lectures and field visits is  
being finalized.**

Instructors office hours: At my office (Bldg.  
8221, Rm. 1; phone, 246-7001 x.290), Monday  
through Friday before class (7:30 AM to 8:15  
AM) and after class (usually after 4:00 PM).  
Saturdays and Sundays please call 247-2930 or  
786-255-5878.

Health care: Students are advised that no  
University health-care services are available in  
Homestead. Students needing medical care must  
obtain it from private sources and pay for it  
themselves or by private insurance.

#### TREC ADMINISTRATION OFFICE POLICIES

#### STUDENTS HOUSED AT TREC

1. The cost of housing at TREC is  
\$50.00/month.
2. If there is something malfunctioning or  
broken in the trailer/cottage please notify  
Dr. Crane first.
3. Please treat the furniture, appliances, and  
building with care so it is usable by the  
next visitor.
4. Students must clean their living quarters  
at the end of their stay.

#### ALL STUDENTS - FRONT OFFICE POLICY

The Administration Building is generally off  
limits to the students. This is because the office  
staff is very busy serving the needs of the faculty  
at TREC. If you need to make a phone call  
and/or send/receive a fax please speak with Dr.  
Crane. You must pay for long distance phone  
calls by calling card. The photocopying machine  
is not for student use.

#### MAIL

Students may receive mail at TREC. However,  
Dr. Crane will pick up the mail from the front  
office for distribution. Dr. Crane will also be  
glad to have mail forwarded (you pay postage)  
from the front office.

(c://teaching/HOS5555/syllabus2008.doc)