



NATIONAL ACADEMY OF SCIENCES

Office of the President

February 8, 2008

Mr. Roberto Martinez
255 Aragon Avenue, 2nd Floor
Coral Gables, FL 33134

Dear Mr. Martinez:

Thank you for your letter dated February 5, 2008, in which you asked us to comment on whether we recommend the adoption of the evolution standards and the reasons for our position. We have asked members of our staff who are knowledgeable both about the science of evolution and about national and state standards to review the draft standards on evolution for Grades 3, 5, 6, 7, and 9-12 that you included with your request. Our comments are based on their findings.

We fully support efforts by the committee that drafted the revisions to Florida's science standards to include evolution as an integral component of modern science education for students in your state. Standard 15A for Grades 9-12 echoes the positions of the National Academy of Sciences and the Institute of Medicine succinctly and eloquently:

Evolution is the fundamental concept underlying all of biology and is supported by multiple forms of scientific evidence.

This statement is also supported in the revised Florida science standards by benchmark SC.912.L.15.1 in which students are asked to "Explain how evolution is supported by the fossil record, comparative anatomy, comparative embryology, biogeography, molecular biology, and observed evolutionary change."

Other benchmarks in these draft standards also ask students to understand many of the principles of evolution similarly reflect the fact that the study of evolution is one of the most robust of disciplines in modern biology. These standards and benchmarks are entirely consistent with longstanding positions of the National Academy of Sciences, the Institute of Medicine, and reflects the overwhelming consensus of the scientific community based upon the massive and continually accumulating body of evidence that supports evolution as the most complete scientific explanation for the past and present diversity of life that is observed on Earth.

We are also pleased to see that, consistent with recommendations in the *National Science Education Standards* (published in 1996 by the Academy's National Research Council), the draft Florida standards introduce students to concepts related to evolution in the elementary grades and build upon those expectations as students move to biology courses in the secondary grades.

In summary, we applaud the efforts of the writing committee and the product of their work. These standards are both explicit in recognizing evolution as a central organizing principle of modern biology and lay out the many types and levels of evidence about evolution about which Florida students should learn.

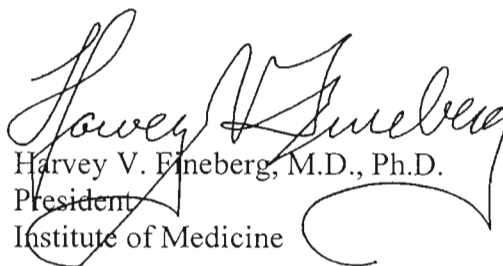
The National Academy of Sciences has published a number of books and policy statements about the evidence for evolution (including the recently published *Science, Evolution, and Creationism*) and the importance of including evolution as an integral part of high quality programs of science education. All of these books and statements are freely available at <http://nationalacademies.org/evolution>. We also would be pleased to send printed copies of *Science, Evolution, and Creationism* to you and the other members of the Board of Education for the State of Florida.

As per your request, a copy of this letter is also being sent directly to Dr. Eric J. Smith, Commissioner of Education.



Ralph J. Cicerone, Ph.D.
President
National Academy of Sciences

Sincerely yours,



Harvey V. Fineberg, M.D., Ph.D.
President
Institute of Medicine

cc: Dr. Eric J. Smith