

ENROLLED HOUSE
BILL NO. 2185

By: Bengé and Newport of the
House

and

Crutchfield and Rabon of
the Senate

An Act relating to science and technology; amending 74 O.S. 2001, Sections 5060.4, as last amended by Section 1 of Enrolled House Bill No. 2356 of the 2nd Session of the 50th Oklahoma Legislature and 5060.12, which relate to the Oklahoma Science and Technology Research and Development Act; adding definitions; expanding scope of centers of excellence; clarifying statutory language; modifying findings required for establishment of new centers of excellence or increasing funding for existing centers; allowing Oklahoma Center for the Advancement of Science and Technology (OCAST) to use certain funds for certain plant science research; specifying purposes for which funds are to be used; directing OCAST to specify standards for use of funds; establishing program ensuring impartial distribution; providing maximum percentage of Oklahoma Science and Technology Research and Development Act (OSTRaD) funding allowed for applied plant science research; requiring certain findings by OSTRaD Board; providing conditions for award of professional service contract to support plant science research project; providing for codification; and providing an effective date.

BE IT ENACTED BY THE PEOPLE OF THE STATE OF OKLAHOMA:

SECTION 1. AMENDATORY 74 O.S. 2001, Section 5060.4, as last amended by Section 1 of Enrolled House Bill No. 2356 of the 2nd Session of the 50th Oklahoma Legislature, is amended to read as follows:

Section 5060.4 As used in the Oklahoma Science and Technology Research and Development Act:

1. "Applied research" means those research activities occurring at institutions of higher education, nonprofit research foundations, and in private enterprises which have potential commercial application;

2. "Basic research" means any original investigation for the advancement of scientific knowledge not having a specific commercial objective, but having potential long-range value to commercial interests;

3. "Board" means the Oklahoma Science and Technology Research and Development Board;

4. "Center" or "OCAST" means the Oklahoma Center for the Advancement of Science and Technology;

5. "Enterprise" means a firm with its principal place of business in Oklahoma;

6. "Health research project" means a specific examination, experimentation or investigation, or initiative to provide research resources oriented principally toward basic, applied, and developmental scientific inquiry related to the causes, diagnosis, prevention, and treatment of human diseases and disabilities and mental health and emotional disorders, and the rehabilitation of persons afflicted with such diseases, disabilities, and disorders; new knowledge, better understanding, and innovative methods to improve the processes by which health care services are made available and how they may be provided more efficiently, more effectively and at a lower cost, for all the citizens of this state; and the development of new products and services which shall form the basis of new high-technology health research and care industry for this state;

7. "Industrial Extension System" means a coordinated network of public and private manufacturing modernization resources, the purpose of which is to stimulate the competitiveness of Oklahoma small and medium-sized manufacturing firms;

8. "Institute" means the Oklahoma Institute of Technology;

9. "Institutional Review Board" means a committee composed of investigators, lay representatives, and legal counsel, which is established at each institution of higher learning and each nonprofit research institution receiving funds from a health research project, for the express purpose of determining the appropriateness of any research involving human subjects;

10. "Institutions of higher education" means public and private colleges and universities in the state;

11. "Investigator" means a person who proposes research projects and is primarily responsible for the execution of the proposed projects and is employed by or affiliated with an institution of higher education, a nonprofit research institution in this state, or a private enterprise;

12. "Nanotechnology" means technology development at the molecular range (1nm to 100nm) to create and use structures, devices, and systems that have novel properties because of their small size;

13. "New technology" means methods, products, processes and procedures developed through science or research;

14. "Nonprofit research institution" means any not-for-profit public or private facility in this state which has the capabilities for research projects and which is not a subsidiary of any corporation, partnership, or association organized for profit, nor

is its stock or assets owned or controlled by a corporation, partnership, or association organized for profit;

15. "OAME" means the Oklahoma Alliance for Manufacturing Excellence, Inc., a corporation to be formed pursuant to the provisions of Title 18 of the Oklahoma Statutes and Section 5060.26 of this title;

16. "ONAP" means the Oklahoma Nanotechnology Applications Project;

17. "OSTRaD" means the Oklahoma Science and Technology Research and Development Act;

18. "Person" means any individual, partnership, corporation or joint venture carrying on business or proposing to carry on business within the state;

19. "Plant science research" means those research activities occurring at institutions of higher education, nonprofit research institutions, and in private enterprises, which have potential commercial application and concern plant productivity, renewable biomass, plant-based environmental applications and chemical platforms, plant-based solutions to improve nutrition, human and/or animal health or performance, process applications, and seed management and the development of new products and services that shall form the basis of new, high-technology plant science/agriculture industry for this state;

~~18.~~ 20. "Product" means any outcome, device, technique or process, which is or may be developed or marketed commercially and which has advanced beyond the theoretical stage and is in a prototype or practice stage;

~~19.~~ 21. "Professional service contract" means a written agreement providing funds for the performance of a research project; for salaries and fringe benefits of personnel associated with research programs; for research equipment; for operating expenses associated with a research program; or for services provided in connection with the evaluation of applications submitted to the Center;

~~20.~~ 22. "Qualified security" means any public or private financial arrangement, involving any note, security, debenture, evidence of indebtedness, certificate of interest or participation in any profit-sharing agreement, preorganization certificate or subscription, transferable security, investment contract, certificate of deposit for a security, certificate of interest or participation in a patent or application therefor, or in royalty or other payments under such a patent or application, or, in general, any interest or instrument commonly known as a "security" or any certificate for, receipt for, guarantee of, or option, warrant or right to subscribe to or purchase any of the foregoing to the extent allowed by law;

~~21.~~ 23. "Seed-capital" means financing that is provided for the development, refinement and commercialization of a product, process or innovation, whether for the startup of a new firm or the expansion or the restructuring of a small firm; and

~~22.~~ 24. "Technology transfer" means a two-way process by which ideas or inventions for processes or products (developed in research programs usually on a laboratory or pilot-plant scale) are converted to commercial use.

SECTION 2. AMENDATORY 74 O.S. 2001, Section 5060.12, is amended to read as follows:

Section 5060.12 A. The purpose of this section is to authorize the establishment of two types of centers of excellence at institutions of higher education or nonprofit research institutions: centers of excellence for basic research and centers of excellence for applied research, development and technology transfer.

B. Centers of excellence for basic research will primarily undertake ongoing basic research that has potential for long-range value to the state's economic development. The centers should build on institutional strengths and conduct activity in areas of research in which the participating institutions of higher education or nonprofit research institutions have achieved or have true promise of attaining a standard of excellence as recognized by national and international peers.

C. Centers of excellence for applied research, development and technology transfer will primarily undertake applied research, development and technology transfer that has long-run potential for commercial development. The centers should build on institutional strengths and conduct activity in areas of research in which the participating institutions of higher education or nonprofit research institutions have achieved or have true promise of attaining a standard of excellence in applied research and development.

D. The Oklahoma Center for the Advancement of Science and Technology (OCAST) shall award funding to centers of excellence in accordance with subsections E and F of this section.

E. ~~The Center~~ OCAST may award funding from the Research Support Revolving Fund for new centers and increased funding for established centers only after:

1. Developing, adopting and publishing the criteria it shall use when evaluating centers of excellence; and

2. Reviewing proposals for new or established centers of excellence containing:

- a. documentation, in the case of applied research, development and technology transfer, that not less than fifty percent (50%) of the center's total funding will be provided by sources other than ~~the Center~~ OCAST and other than state-appropriated money; and, in the case of basic research, documentation that not less than twenty percent (20%) of the funding for centers conducting basic research will be provided by sources other than ~~the Center~~ OCAST and other than state-appropriated money; machinery or equipment may be considered as part of the matching funds, but must be accompanied by a statement that the center of excellence has received the machinery or equipment,

that it is appropriate and useful to the program under review, and either:

- (1) verifying that the machinery or equipment is donated, has only been used in testing to ensure quality control, or used by a wholesaler or retailer for demonstration purposes only and verifying the fair market value of the machinery or equipment on the date of the gift, or
 - (2) detailing the price paid by the center of excellence, with an invoice showing the amount paid for the equipment,
- b. a description of the proposed center's potential contribution to the state's economic development interests,
 - c. an itemized operations budget, and
 - d. other information that may be required by the ~~board~~ Oklahoma Science and Technology Research and Development Board.

F. The board may approve proposals to establish new centers of excellence and increase funding for existing centers contingent on the availability of funds and only after the board finds, based upon the proposal submitted, external peer reviews, and such additional investigation as the staff of ~~the Center~~ OCAST shall make and incorporate in its minutes that:

1. ~~The~~ Each proposed center of excellence involves ~~more than one~~ higher education institution institution(s), nonprofit research institution(s), and private enterprise;

2. Each proposed center of excellence is funded at Nine Hundred Thousand Dollars (\$900,000.00), or so much as is needed, per year for five (5) years, above the annual appropriation for OCAST;

3. In the case of applied research, development and technology transfer the proposed center of excellence has the potential to stimulate economic development in Oklahoma by fostering partnership between among higher education institutions, nonprofit research institutions, and businesses;

~~3.~~ 4. The center has the long-run potential to benefit existing and new businesses through innovation and development of new technology; and

~~4.~~ 5. Approval of the proposal will not create or foster unnecessary duplication of programs, particularly at the graduate level of instruction.

G. Any commercialized research that results from the funding of a center of excellence shall be subject to negotiations and policies pursuant to the provisions of this act.

SECTION 3. NEW LAW A new section of law to be codified in the Oklahoma Statutes as Section 5060.53 of Title 74, unless there is created a duplication in numbering, reads as follows:

A. The Oklahoma Center for the Advancement of Science and Technology (OCAST) may use monies from the Research Support Revolving Fund to carry out the purposes of the Oklahoma Science and Technology Research and Development Act by awarding competitive basic and applied plant science research funds, through professional service contracts, to institutions of higher education, nonprofit research foundations and private enterprises of special importance to the Oklahoma economy.

B. The Oklahoma Center for the Advancement of Science and Technology, contingent on the availability of funds, and with the advice of the Plant Science Research Committee, shall:

1. Establish and operate a state program designed to secure and impartially distribute funds credited to the Research Support Revolving Fund to support professional service contracts for basic plant science research projects to be awarded only on the basis of scientific and technical merit;

2. Design the basic plant science research program to ensure the optimum performance of the investigator(s) and the maximum efficiency of the project(s);

3. Evaluate and approve basic plant science research projects to be funded from the Research Support Revolving Fund;

4. Establish a procedure for the referral of proposed basic plant science research projects to the Plant Science Research Committee for review;

5. Establish procedures for review of proposed basic plant science research projects by qualified individuals, the majority of whom reside outside of Oklahoma;

6. Suspend or terminate any professional service contract supporting basic plant science research projects for failure by an investigator, institution of higher learning, private enterprise, or nonprofit research institution to comply with the procedures, requirements, or bylaws of the Oklahoma Science and Technology Research and Development (OSTRaD) Board; and

7. Enter into contracts to ensure the optimum performance of plant science research investigators and to ensure the maximum efficiency of proposed plant science research projects.

C. The Board shall award funding or professional service contracts for basic plant science research, contingent on the availability of funds and based upon the proposal submitted; external peer review, the majority of whom must reside outside of Oklahoma; and such additional investigation as the staff of OCAST shall make only after:

1. Developing, adopting and publishing the criteria it shall use when evaluating research proposals; and

2. Ensuring that funding to support basic plant science research projects is awarded only on the basis of scientific and technical merit.

D. The Oklahoma Center for the Advancement of Science and Technology, contingent on the availability of funds, and with the advice of the Plant Science Research Committee, shall establish and operate a state program designed to secure and impartially distribute funds credited to the Research Support Revolving Fund to support professional service contracts for applied plant science research projects.

E. The OSTRaD Board shall award funding or professional service contracts for applied plant science research only after:

1. Developing, adopting and publishing the criteria it shall use when evaluating research proposals; and

2. Reviewing applied plant science research proposals which present:

- a. documentation, if the proposal is from an institution of higher education or nonprofit research institution, that not less than fifty percent (50%) of the total direct cost of the proposed project will be provided by sources other than OCAST and other than state-appropriated money; machinery or equipment may be considered as part of the matching funds for the research, but must be accompanied by a statement:
 - (1) that the institution of higher education or nonprofit research institution has possession of the machinery or equipment and that it is appropriate and useful to the program under review, and either
 - (2) verifying that the equipment or machinery is donated and has only been used in testing to ensure quality control, or used by a wholesaler or retailer for demonstration purposes only and verifying the fair market value of the machinery or equipment on the date of the gift, or
 - (3) detailing the price paid by the institution of higher education or nonprofit research institution, with an invoice showing the amount paid for the machinery or equipment,
- b. documentation, if the proposal is from a private enterprise, that not less than fifty percent (50%) of the total direct cost of the proposed project will be provided by sources other than OCAST and other than state-appropriated money. No portion of the fifty percent (50%) may be provided by in-kind services performed by the enterprise,
- c. a description of the potential commercial application of and the industrial sectors that will likely benefit from the applied research project and the potential to enhance employment opportunities in Oklahoma,
- d. an itemized research budget, time line and research methodology,

- e. a recommendation from the sponsoring institution of higher education, nonprofit research institution or business enterprise, and
- f. other information that may be required by the Board.

F. The OSTRaD Board may approve such applied plant science research proposals, contingent on the availability of funds, after the Board finds, based upon the proposal submitted; external peer review, the majority of whom must reside outside of Oklahoma; and such additional investigation as the staff of OCAST shall make and incorporate in its minutes, that:

1. The proposed project is research that leads to innovation, new knowledge or technology and is not training or technical assistance for business firms;

2. The project has a reasonable probability to enhance employment opportunities within Oklahoma; and

3. The project is technically sound and will produce a specified measurable result.

SECTION 4. NEW LAW A new section of law to be codified in the Oklahoma Statutes as Section 5060.54 of Title 74, unless there is created a duplication in numbering, reads as follows:

No professional service contract shall be awarded by the Oklahoma Center for the Advancement of Science and Technology (OCAST) to support a basic or applied plant science research project unless:

1. The investigators are residents of this state or become residents of this state before the ninetieth day after a professional service contract, pursuant to which they will be functioning as an investigator, has been funded by OCAST;

2. The institutions that administer the professional service contracts are primarily located in this state and are able to assume financial responsibility for professional service contracts; and

3. The professional service contract will not be transferred to any other institutions within the state without the approval of OCAST and will not be transferred to an institution outside of the State of Oklahoma at any time.

SECTION 5. This act shall become effective November 1, 2006.

Passed the House of Representatives the 26th day of May, 2006.

Presiding Officer of the House of
Representatives

Passed the Senate the 26th day of May, 2006.

Presiding Officer of the Senate