- (B) how industry will participate in the evaluation of the applicant's progress in research and development activities; and
- (C) the extent to which industry funds are committed to the applicant's proposal;
- (2) have a commitment for matching funds from non-Federal sources, which shall consist of

(A) cash, or

- (B) as determined by the Secretary, the fair market value of equipment, services, materials, appropriate technology transfer activities, and other assets directly related to the proposal's cost:
- (3) include a single or multiyear management plan that outlines how the research and development activities will be administered and carried out;
- (4) state the annual cost of the proposal and a breakdown of those costs; and
- (5) describe the technology transfer mechanisms the applicant will use to make available research results to industry and to other researchers.

(c) Content of management plan

The management plan set forth in subsection (b)(3) of this section shall—

- (1) outline the basic research and development activities expected to be performed;
- (2) outline who will conduct those research activities:
- (3) establish the time frame over which the research activities will take place; and
- (4) define the overall program management and direction by—
 - (A) identifying managerial, organizational and administrative procedures and responsibilities:
 - (B) outlining how the coordination of research and development between the individuals and organizations involved will be achieved:
 - (C) demonstrating how implementation and monitoring of the progress of research projects after receipt of funding from the Secretary will be achieved;
 - (D) demonstrating how recommendations and implementations on modifications to the plan will be achieved; and
 - (E) providing sufficient rationale to support the plan's costs.

(d) Selection of proposals

ductivity: and

From the proposals submitted, the Secretary shall select proposals for funding. The Secretary shall attempt to select at least four proposals. The Secretary shall select the proposals that—

- (1) will best result in carrying out needed metal casting research and development in one or more of the following general areas—
 - (A) solidification and casting technologies;(B) computational modeling and design;
 - (C) processing technologies and design for energy efficiency, material conservation, environmental protection, or industrial pro-
 - (D) other areas of research, which in the judgment of the Secretary, after consulting with the Board established in section 5306 of this title, further the purposes of this chapter.

- (2) represent research and development in specific areas identified in the "Metal Casting Research Priorities" developed annually by the Board pursuant to section 5306(b)(1) of this title:
- (3) to the greatest extent possible and subject to available appropriations, ensure that at least one applicant is selected from each of the four census regions of the country where the metal casting industry is concentrated;
 - (4) demonstrate strong industry support;
- (5) ensure the timely transfer of technology to industry; and
- (6) otherwise best carry out the purposes of this chapter.

(e) Funding of program

From amounts made available in separate appropriation Acts, the Secretary shall provide to each applicant selected the financial and technical assistance and other incentives that are necessary and appropriate to carry out the purposes of this chapter.

(f) National Metal Casting Research Institute

Each recipient of financial assistance under subsection (d) of this section shall be known as a "National Metal Casting Research Institute".

(Pub. L. 101–425, §5, Oct. 15, 1990, 104 Stat. 916.)

§ 5305. Review

(a) Evaluation of research activities

The Secretary shall regularly monitor and evaluate the research activities of the applicants selected. After considering the reports of the Board provided for in section 5306(b)(2) of this title, the Secretary shall determine whether each applicant selected has complied with the management plan submitted in the original proposal and any modifications made since.

(b) Annual report

Each selected applicant in the program shall provide an annual report to the Secretary that explains the progress made, compliance with the management plan, whether changes are needed and are being made to the management plan, and what new research is planned.

(c) Discontinuation of funding

In the event a selected applicant has substantially failed in the implementation of the management plan and research activities, the Secretary shall discontinue funding.

(d) Solicitation of new proposals

Upon completion or discontinuance of any research activity authorized in section 5304 of this title, the Secretary shall, using available funds appropriated pursuant to this chapter, solicit new research proposals as set forth under the terms of this chapter.

(Pub. L. 101–425, §6, Oct. 15, 1990, 104 Stat. 918.)

$\S\,5306.$ Industrial Advisory Board

(a) Establishment of Board

Within 120 days after October 15, 1990, the Secretary, after consulting with representatives of trade and technical associations of the metal casting industry, shall establish an Industrial