I. **Math Science Initiative Goal: Improving Teacher Knowledge**

II. **Mathematics Professional Development Institutes (MPDI)**

   **Program Design**
   Each institute provides an intensive period of instruction consistent with the California Mathematics Content Standards and the 1999 California Mathematics Framework. The summer/inter session phase of each institute ranges from 40-120 hours of instruction depending on the scope and complexity of the program. These intensive sessions are augmented by 80 hours of continuing education, half of which is additional instruction and half of which is site- or team-based work. Teachers are further supported by Internet-based strategies that aid in the electronic collection of data and participant collaboration.

   Mathematics institutes serve a school, district, or consortium team of teachers, accompanied by a site or district administrator who has responsibility for the quality of mathematics instruction. The participation requirement for the administrator varies with the length and content of the Institutes. However, an administrator must support the academic year work of the team of teachers and participate in after-school meetings. Each team has a designated leader responsible for coordinating the ongoing participation and work of the team.

   Four types of Institutes are offered to teachers according to the level they teach: Elementary mathematics, Algebra, Algebra Academy, and High School.

III. **Purpose**

   To provide opportunities for teachers to:
   - Participate in stimulating university-based summer or intercession institutes.
   - Engage in a variety of practical year-round activities designed to support their instructional practice.
   - Deepen their academic knowledge.
   - Refine their classroom teaching strategies.
   - Join their school colleagues as members of a high performance team focused on improving student achievement.
   - Employ useful common assessment strategies to monitor student progress and inform classroom practice.
   - Receive a stipend as compensation for participation.

   To help Pre-K through 12th grade teachers to:
   - Improve student achievement in core content areas
   - Join a team from your school
   - Partner with local colleges and universities
   - Earn a stipend for your participation

IV. **Accomplishments/Results**

   In the past year approximately 9,000 teachers, primarily from low-performing schools, attended these Institutes.

V. **Plans for the next 12 months**

   These Institutes will be offered this year and a similar number of participants is expected.