i3 Missoula



Forward Thinking, High Achieving.

Missoula County Public Schools

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Inspire, Imagine, Innovate... this is the essence of i3 Missoula. The program is an embodiment of the **21st Century Model of Education**.

In May, 2013, 150 high school students applied for 30 student positions in the inaugural i3 Missoula summer program. These students were guided by three teachers and spent four weeks on the University of Montana campus where they were given the opportunity to engage in highly creative and collaborative problem solving and solution seeking. Working in teams, these students developed a project that would identify an issue in the community and produce a solution to be presented to the Missoula City Council. The intended outcome: The projects become a reality and ultimately benefit the community.

The resulting projects included:

- River Gears a low-head water turbine, using the river's current to produce electricity without harming the ecosystem.
- •Green Roofs a living roof model to be placed on MCPS buildings and city offices to increase their energy efficiency, and lower their carbon foot print.
- **Trailhead Vending** a unique solar-powered, outdoor vending machine offering unique non-consumable outdoor safety items.
- •Biogas identified the need for low-cost renewable energy sources, and created a working model of a biogas digester.
- •Greenholes successfully tested a new type of pothole-filler, which utilizes recycled glass.
- •Teen Jobs R Us created a website for students 12-15 looking for jobs, allowing them to connect with local Missoulians in need of help.

Vision for 21st Century Teaching and Learning

We communicate; we collaborate; we think critically; and we create.

We are Missoula County Public Schools - educational leaders in a global society fostering uncompromising excellence and empowering all learners.

The Goal

i3 Missoula effectively meets the student outcome goals of 21st Century Teaching and Learning.

Lifelong Learning Skills – Students worked collaboratively and independently developing new solutions by asking questions and thinking creatively and critically.

Conceptual Knowledge – Students grew their knowledge base through inquiry and the use of technology and experts in the field.

Community and Citizenship – All projects were community related and reflected ways to improve the quality of life in Missoula. Community experts including business members, City Council and Mayor were asked to give constructive feedback for the purpose of improving the projects.

Career Development – Students developed skills required in the workforce. Experts in the field shared their knowledge and insights to prepare students to showcase their efforts to the authentic audience of the Missoula community.

The Future

The success of i3 Missoula and its alignment to 21st Century Model of Education, demands that we incorporate the essence of i3 into our schools year-round as well as expand the summer program. It transformed the learning environment to a flexible and engaging expanded classroom for students. As a community focused program, we need the support of the community to effect change. i3 Missoula has the potential to revolutionize education as we know it throughout our community, our state and even our nation. Will you join us in our efforts?

Program Components

- •One full time Program Coordinator to support current students and their projects as well as collaborate with teachers and the community to implement i3 Missoula in our schools and summer programs
- •Budget for materials and supplies
- •Stipends for participating teachers during school and teachers and students in the summer program.

Ways to Support i3 Missoula

- •Provide classroom space for the i3 Summer Program
- •Provide transportation options for the i3 Summer Program
- •Sponsor the i3 Summer Program's Staff and Student Stipends
- •Sponsor an i3 Club in a school



- "The i3 program is interesting on a number of fronts. The earlier we can engage young people in understanding that as individuals or in groups working together, they can make a difference in their community...the better off we are as a community."
- Mayor John Engen

"It taught me how to work with other students who had a variety of other ideas and experiences. It created the environment where I learned by myself without a teacher or the textbook, I was given the ability to go out and look at all the information I wanted to find and use that information. It taught me a lot about independence, and the real world where you are just told, go out and do it.." -Isiah, i3 Summer Program Student

"i3 taught me about collaboration and how to work with others to innovate. I learned how to work with others with different mindsets."

-Katee, i3 Summer Program Student

"Everyone on city council was extremely excited to have the students come and present to us. They gave some of the best presentations that we have seen in a long time. They had really complex problems that they were addressing."

-Marilyn Marler, City Council

"I hope that i3 will expand and positively affect, many other kids like me. It is so refreshing to be in a program where my thoughts and ideas truly matter, and that is what makes i3 truly unique."

-Emily, i3 Summer Program Student