

UPWARD BOUND MATH AND SCIENCE CENTER

Mission

The Upward Bound Math and Science Center ensures access to programs that develop the potential to excel in math and science and pursue postsecondary education in these fields for low-income, first-generation high school students.

Vision

The Upward Bound Math and Science Center will be a:

- Model for creating an educational environment that encourages academic excellence in math and science at the high school level;
- Leader in preparing individuals to be academically successful in math and science at the high school and postsecondary levels; and
- Catalyst for systemic change regarding access to programs that ensure academic success in math and science for high school students.

Core Values

Excellence: We seek excellence in all our endeavors, and we are committed to continuous improvement.

Intellectual Freedom: We believe in ethical and scholarly questioning in an environment that respects the rights of all to freely pursue knowledge.

Integrity: We are committed to the principles of truth and honesty, and we will be equitable, ethical, and professional.

Service: We believe that serving others is a noble and worthy endeavor.

Diversity: We respect others and value diversity of opinion, freedom of expression, and other ethnic and cultural backgrounds.

Stewardship of Resources: We are dedicated to the efficient and effective use of resources. We accept the responsibility of the public's trust and are accountable for our actions.

Goals, Critical Success Factors, Objectives and Strategies

Goal One: To help students recognize and develop their potential to excel in math and science, strengthen these skills, and encourage them to pursue postsecondary degrees in math and science.

Critical Success Factors:

- 50 eligible participants from identified target schools will be enrolled and receive services through the OSU UBMSC program
- 80% of participants in the OSU/UBMSC program will demonstrate improvement in academic skills and competencies by maintaining a minimum 3.0 GPA in math and science throughout their program
- 85% of participants in the OSU/UBMSC program will continue to participate in the program until they complete their secondary education program and graduate
- 80% of the participants who complete the OSU/UBMSC program (or were scheduled to complete the program) will undertake programs of postsecondary education
- 40% of participants who complete the OSU/UBMSC program (or were scheduled to complete the program) will succeed in education beyond high school and graduate from postsecondary education programs

Objectives:

Objective 1.1: Identify, recruit, and enroll/retain 50 qualified participants in grades 9 through 11 who have demonstrated interest and capacity to pursue academic programs and careers in mathematics and science and who could benefit from the OSU/UBMSC program, by January 1 of each year program year. 34 of the participants will be both low-income and first-generation college participants. The remainder will be either low-income or first-generation college participants.

Strategies:

- Provide program information to target school administrators, school counselors, and service agencies.
- Meet with community service agencies, community organizations churches, and other service-based organizations to describe the program, eligibility criteria, and the application process.
- Contact target schools for list of students eligible for free lunch program or are low income and have academic potential for success in post-secondary education in math and science.
- Utilize public service announcements that are culturally sensitive and written at the appropriate reading level.

- Distribute informational materials on the program and application process through a variety of media.
- Present program information to minority groups and the disabled.
- Develop materials in Braille or on audiotape as needed for disabled students. Assure physical surroundings accommodate the disabled.
- Use local community leaders to explain and translate information for non-English speaking individuals and families, including Hispanic and Native Americans. Printed information about the program will be developed in Spanish, if needed.
- Conduct recruitment sessions with potential participants at target schools and distribute application materials.
- Screen applications for the program and enroll participants based upon program criteria.
- Conduct individual and group interviews.
- Select eligible participants based upon interview and documentation of need.
- Notify applicants in writing of their acceptance. Develop a list of alternates and notify them of their alternate status.
- Enroll sufficient numbers at the beginning of each program year to maintain goal of minimum of 50 participating in the program.
- If insufficient numbers of applicants enroll in the program, select participants from alternate list.
- Place those not accepted for enrollment on an alternate list.
- Send list of students selected to participate and those on the alternate to each target school.

Objective 1.2: Develop a Personal Academic/Career Plan (PACP) based upon a needs assessment for 100% of active participants within 6 weeks of acceptance into the OSU UBMSC program.

Strategies:

- Review completed application including transcript, scores from standardized tests, and other documents related to academic performance for each participant enrolled in the program.
- Evaluate results of instruments administered measuring reading, math, writing, and study skills.
- Develop individualized Personal Academic/Career Plan in collaboration with student, parent(s) if possible, school counselor or other school representative, and others as needed.
- Establish file for each participant, to be located at main program office.
- Monitor progress of student in meeting goals of PACP 1 time each semester.

- Review summary progress reports with school counselors and parents.
- Report discrepancies or barriers to achievement of goals of PACP to Project Director.
- Provide appropriate documentation of encounters with each participant according to program procedures.
- Make certain services are adapted as needed to meet needs of disabled students.
- Each PACP to be reviewed by Project Director for completeness and appropriateness.

Objective 1.3: 100% of participants in the OSU UBMSC program will participate in a minimum of 3 program activities during each program year to include the summer academy program.

Strategies:

- Conduct a 6-week summer residential educational program to enhance academic skills in the areas of math and science, and other areas as prescribed by the funding agency.
- Provide workshops each academic year covering financial aid, preparation for ACT and SAT tests and completing a college application.
- Conduct workshops on applying for college, financial aid, college entrance examinations, etc. for parents/guardians and participants.
- Conduct campus tours of regional post-secondary educational institutions, to include a comprehensive university, regional university, and 2-year college.
- Offer Summer Bridge program to participants who have graduated from high school and enrolled in postsecondary education, to include tutorial sessions, group activities, etc.

Objective 1.4: 80% of OSU UBMSC parents or guardians will participate in a minimum of 1 activity during the program year.

Strategies:

- Sponsor a minimum of 1 workshop for parents/guardians during the academic year and 1 workshop during the summer program that focus upon program objectives.
- Distribute program newsletter to parents/guardians regarding program activities and accomplishments.