

# ARTBOTICS: COMPUTER SCIENCE AND ART IN A COMMUNITY BASED PROGRAM

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Artbotics is a collaboration between the University of Massachusetts Lowell and the Revolving Museum, both located in Lowell, Massachusetts. The program has been designed to allow students to explore the intersection between Art and Computer Science, especially Robotics, through project-based learning, public exhibitions and service-learning experience. Students learn founding principles in both the fields of Art and Computer Science, and put them into practice by creating interactive, tangible exhibits that are displayed in public settings.



We have designed materials after school programs for high school students (48 student participants to date) and an undergraduate course (59 students in two offerings, with a wide variety of majors represented). Student programs culminate in exhibitions at the Revolving Museum, which introduce the public to computing.

The goals of the program are to increase the number of women and minorities in computing through the use of

innovative and interactive technologies, broaden student understanding of the field of computing, introduce computing to the public through exhibitions of the art projects, and build community with mentoring opportunities for students.



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**BPC-DP: COLLABORATIVE COMPUTING EXPERIENCES TO BROADEN PARTICIPATION IN COMPUTER SCIENCE (CNS-0540564)**

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