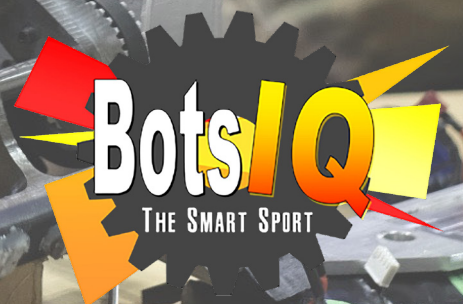


A photograph of two students, a girl and a boy, wearing red shirts and safety glasses, focused on working on a robot. The girl on the left has a purple headband and a name tag that says "Delaney Martin". The boy on the right has a name tag that says "Jacob Bellerillo" and "Northwestern Area High School". They are working on a robot with green wheels and a metal frame. The background shows other students in red shirts, suggesting a competition or workshop setting.

# AN INDUSTRY ADVISOR'S GUIDE TO SUCCESS

Way Beyond Battle Strategies

SOUTHWESTERN PENNSYLVANIA







## AN INDUSTRY ADVISOR'S GUIDE TO SUCCESS

### WAY BEYOND BATTLE STRATEGIES

## YOUR MISSION:

- **Be enthusiastic** and excited to be there!
- **Orient students** to all aspects of the manufacturing industry.
- **Actively assist students** in their efforts to establish goals and objectives for the project.
- **Serve as a role model**, both specific to the project and in general; use this opportunity to excite students about careers in manufacturing.
- **Plan well, but be flexible**; be supportive, patient, enthusiastic, compassionate and available.
- **Ensure and emphasize** the importance of safety during use of machines, robots, etc.
- **Evaluate student performance** in a constructive manner and provide feedback to the teacher. This is a chance to enhance their education and enrich their learning with industry standards and practices.
- **Learn something yourself!** Take advantage of this unique situation to bolster your own career development.

## SAFETY FIRST

Safety is more important than ever in today's schools. Here are a few things to consider:

- Understand that every school is responsible for a safety and security plan.
- Look for ways to help the administrative leadership fulfill the requirements of that plan.
- Provide safety glasses and other safety equipment to the students.
- Offer to share your safety and security plans with school officials as appropriate.
- Explain to students the importance of safety in your workplace and help them to develop a safety plan of their own.



# WHAT SKILLS DO OUR STUDENTS LEARN?

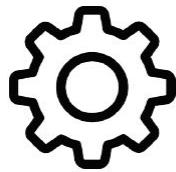
## TECHNICAL SKILLS:

Applied Academics,  
Manufacturing Skills,  
Business Knowledge...

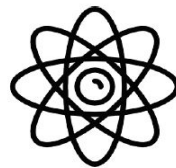
## SOFT SKILLS:

Communication Skills,  
Adaptability, Problem  
Solving, Leadership  
Abilities...

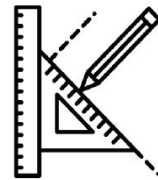
### TECHNICAL SKILLS



Machining &  
Electronics



Math &  
Science



Engineering &  
Documentation



Marketing &  
Budgeting

### SOFT SKILLS



Teamwork



Critical  
Thinking



Work  
Ethic



Project  
Management

## RESEARCH & DESIGN

- Research Bot designs
  - Material analysis
  - Accounting/budget/fundraising
  - Sketch designs
- Engineering drawing set & assemblies
  - Prototype models
  - Safety plan



- Share Bot knowledge
- Help students understand material selection
- Ensure engineering drawing set and assemblies are industry quality
- Help students understand if a design is machinable
- Listen to students "pitch" their prototyped designs
- Share safety considerations

## MACHINE

- Manufacturing of materials and inspection of parts



## WHERE INDUSTRY A

- Assist with helping to machine Bot part(s)
- Donate materials to the team

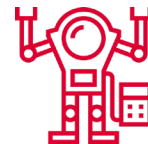
## ASSEMBLY

- Drive assembly
- Power assembly
- Weapon systems
- Wiring schematics
- Structural analysis



## TEST & REPAIR

- BotsIQ Preliminary Competition (March)
- BotsIQ Finals Competition (April)
- Possibly National Competition (May)



## DVISORS CAN HELP

- Ensure wiring schematics are industry quality
- Help with creating a power system

- Attend a competition and cheer on your team(s)
- Use the competition to network



## AN INDUSTRY ADVISOR'S GUIDE TO SUCCESS

### WAY BEYOND BATTLE STRATEGIES

## TIPS FOR SUCCESSFUL CAREER DEVELOPMENT



- At project kickoff, open your facility for a **student tour**. This is your chance to talk about your company, demonstrate what you do and get the attention of tomorrow's workforce. **We also encourage you to invite school administration, counselors and parents on the tour.**
- **Challenge all students** to learn more about the manufacturing process and enhance their technical skills.
- **Talk to the students about your personal career pathway.** Where did you learn the skills needed to be productive in your job? Give them an idea of how and why you selected manufacturing as a career. Only you and your employees have the firsthand experience to tell students about the benefits of the job.
- **Identify the students who are engaged, energetic and eager,** and concentrate on building their interest in manufacturing; it's important to be inclusive of all students, but feel free to devote extra time/guidance to the students who actively seek it out.
- After the program, **provide students with opportunities** for job shadowing, co-op programs during the school year, summer internships or full-time employment upon graduation.



# THE FUTURE IS BRIGHT

## HELPING STUDENTS WITH CAREER EXPLORATION—FOR THEIR BENEFIT, AND YOURS

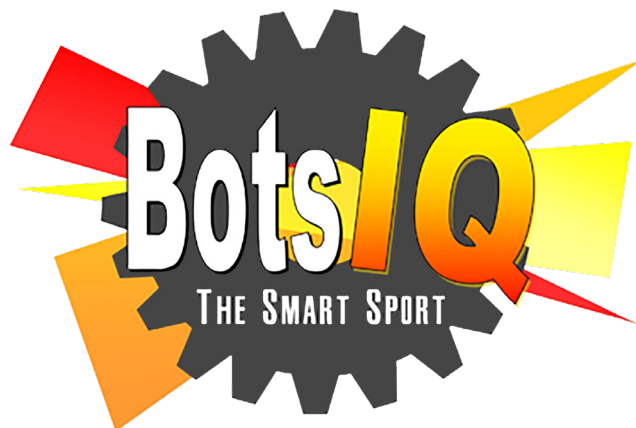
BotsIQ schools offer our program as a class or club in which students elect to sign-up to be a part of the excitement. Our students are engaged with the thrill of the competition, and the Bot that they create. As a BotsIQ Industry Advisor, you have the special opportunity to connect their excitement to career pathways in manufacturing.



**YOUR TIME AS A BOTSIQ INDUSTRY ADVISOR IS WHAT YOU MAKE OF IT. BE PROACTIVE IN UTILIZING THIS PROJECT AS A MANUFACTURING WORKFORCE DEVELOPMENT PROGRAM BY ENCOURAGING STUDENTS TO SEEK FUTURE OPPORTUNITIES WITH YOUR COMPANY.**



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