

Technology Fair Registration – Team Entry

Team Member #1

Student Last Name

Student First Name

Address

City

State

Zip

Team Member #2

Student Last Name

Student First Name

Address

City

State

Zip

Team Name

Enter sponsor information below. This may be a parent or Fulton County employee who will be responsible for the student the day of the fair.

Sponsor Last Name

Sponsor First Name

Grade Level Group:

- 3-4 9-10
- 5-6 11-12
- 7-8

Category:

- Digital Imaging – Video Editing
- Non-Animated Graphic Design
- 3D Modeling
- Internet/Intranet Application
- Non-Multimedia Applications
- Robotics
- Animated Graphic Design
- Digital Photography
- Hardware (6-12 grades only)
- Multimedia Applications (3-12 only)
- Project Programming
- Technology Literacy Challenge

URL:

School:

Permission Form? Yes No

Category Descriptions

Case Modifications

A student may decorate, paint, add lights or moving parts to any working computer. Use your imagination and fancy up those computers for a fun event! *This is an individual event, not team.*

Digital Imaging – Video Editing:

This category is defined as any video project that has been edited on a computer with digital video editing software such as iMovie, Windows Movie Maker, Pinnacle, or other software. Extra points will be awarded if the final product is exported into a digital video format, such as Quicktime, AVI, MPEG, WMV9, or others, including saving to digital video tape. The project must be displayed for viewing on a computer.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Animated Graphic Design:

This category is defined as an original design with the primary purpose for allowing for the motion of objects. Software may include, but not be limited to, Flash, KidPix, etc. You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Non-Animated Graphic Design:

This category is defined as any computer created original art project. This category does not include photography or 3D design projects (see below). Software may include, but not be limited to, Paint, KidPix, Photoshop, Corel Draw, Illustrator, or Free Hand. The project may be displayed on the computer in the program in which it was created. A hard copy of the finished project may be displayed.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Digital Photography:

This category is defined as any computer created original project using photographs. Software may include, but not be limited to, Photoshop, Corel Draw, Microsoft Photo Editor. The project must be displayed on the computer in the program in which it was created. A hard copy of the finished project may be displayed.

You may have up to 2 people on a team but teams and individuals will compete against

each other within each grade grouping.

There will be a 15 minute time limit on all entries.

3D Modeling:

This category is defined as any original artwork that had been created and can be modeled in three dimensions. Software may include, but not be limited to, Maya, AutoCad, Sketch Up, and Light Wave.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Hardware:

This category is for student built computers. Parts do not have to be new, but the operating components of the computer should be essentially built or put together by the student. The case modification category is for modifications to the non-electronic parts (the case or enclosure). For any component such as a floppy drive or CDROM, the student should be able to demonstrate that the system recognizes it and can access it. There should be a purpose for building the computer and the components should match that purpose. (Ex: An appropriate video card that would support video editing or gaming). Because of the specialized nature of the competition, this competition is open to 6th grade and above.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Team Programming Challenge:

This category is an on-site event in which two student is given a series of problems that s/he must solve during the two-hour competition time.

Any questions regarding interpretation of the problems must be submitted in writing to the judges who may choose to answer or reject the question. The decisions of the judges are final.

Each team will be awarded points for each problem solved correctly. Programs will also be judged on structure, design, and organization. In the event of a tie, two or more teams may be declared winners.

Competition will begin with a briefing session. The contest problems will be distributed to all teams at the same time. At the end of the two hours, the floppy disks used in the competition will be submitted for judging. The judges will use the contestants' computers to check the solutions to the problems. Results will be announced at an awards ceremony.

Each contestant is required to bring the computer of their choice, appropriate operating system software, and programming software with which to compete. Students must also bring two non-initialized disks, a power strip and extension cord to the test site.

Contestants may bring an additional computer only for emergency situations in the event that one computer does not function. However, back up computers must remain unplugged and may not be used unless permission is obtained from one of the judges.

Contestants may bring to the contest only the manuals for their computers. Any contestant using other resources including textbooks, published program listings, notes, or disks other than the blank ones submitted at the end, will be disqualified.

Contestants will not be permitted to communicate with their advisors. No visitors will be allowed in the testing areas. Contestants will be monitored on a random basis. Each contestant must be able to enter their programming code, execute the solutions to the problems and save them on the disks that will be submitted to the judges.

Intranet/Internet Applications:

Projects in this category have strength in their use on networks, either the World Wide Web or LANs (Local Area Networks). Examples of intranet/Internet application projects include web pages, web sites, chat rooms, interactive games, bulletin boards, and blogs.

Your computer is required to display this project. Internet access will not be available at the fair. All links must be captured one level deep. No tri-board displays.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Multimedia Applications:

Multimedia projects are defined as computer-based reports or creative presentations using any combination of sound and/or images with text. Possible software used for projects in this category include but are not limited to: Power Point, KidPix, AppleWorks, Astound, Storybook Weaver and HyperStudio. If appropriate to the project, a storyboard may be included in the students' notebooks to show sequencing of project creation.

Videos do not go in this category. Any hyperlinks need to be captured one level deep since Internet access will not be available.

Grade levels for this category are 3, 4, 5, 6, 7, 8, 9, 10, 11 and 12. Your computer is required to display your project.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Non-Multimedia Applications:

Entries can be developed from various non-multimedia application programs such as

word processing, spreadsheets, databases or any other non-multimedia software. This category includes, but is not limited to, desktop publishing projects. **No tri-board displays.**

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Project Programming:

Projects in this category are self-executing programs created using recognizable programming languages such as BASIC, C++, Pascal, LOGO, etc. All parts of the program must be the author's own design. Programs must be identifiable in one of the three following categories:

1. Computer-aided instruction or educational/learning games.
2. Business or commercial applications.
3. Personal applications that, with minor alterations, could be marketed for larger commercial audiences.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Robotics

Projects may be constructed from kits or published schematic drawings, modified from other devices to create new applications, or constructed from the student's own concepts and designs. The projects must have some obvious relationship to the computer and controlled through student created programming. All entries must be a working and functional piece of electronics. Examples of commercially available kits are robotic "arms" or robot movers, Lego and K'Nex-style building kits, Capsella, and Technics style robotics kits.

You may have up to 2 people on a team but teams and individuals will compete against each other within each grade grouping.

There will be a 15 minute time limit on all entries.

Technology Literacy Challenge

Written exams will be given on-site for each of the grade level categories. The exams will have 50 multiple-choice questions. Questions will be vocabulary and concept oriented.

They will come from the following topic areas:

- History of computers
- Parts of the computer
- Peripheral computer devices

- Uses and limitations of computers
- General uses of common computer applications software
- New and emerging technologies
- The Internet
- Social implications of computers
- General programming (Level III, Grades 9-12, only)

Questions for the Technology Literacy Challenge will come from information generally available in textbooks and reliable sources on the Internet. A suggested list of resources is available on the Fair web site. Computer magazines and television programs have discussed some of the social implications of computers. An oral exam may be used as a tie-breaker of three or more students.

Suggested Resources for the Technology Literacy Challenge:

- Gookin, Dan. *PCs for Dummies*. IDG Books. January 2000.
ISBN: 0764581309
- Maran, Ruth. *Computers Simplified*. 4th Edition. IDG Books. September 1998.
ISBN: 0764560425
- Maran, Ruth. *The Internet and World Wide Web Simplified*. IDG Books. October 1999.
ISBN: 0764534092
- Rathbone, Andy. *Windows 98 for Dummies*. IDG Books Worldwide. June 1998.
ISBN: 0764502611
- White, Ron. *How Computers Work*. 5th Edition. MacMillan. 1999.
ISBN: 0789721120
- Wingate, Phillipa. *The Internet for Beginners*. EDCP. August 1997.
ISBN: 881109290

For younger students:

- *The Computer Age*. Modern Media series. Barrons Educational Series. March 2000.
ISBN: 076411667
- Kalman, Bobbie. *The Computer from A to Z*. Crabtree. March 1998.
ISBN: 0865053790
- Parker, Steve. *Computers*. 20th Century Inventions Series. Raintree Steck-Vaughn. April 1997.
ISBN: 0811728110
- White, Nancy. *The Magic School Bus Gets Programmed: A Book About Computers*. Scholastic.
- Wright, David. *Computers*. Inventors and Inventions Series. Benchmark Books. January 1996.
ISBN: 0761400648

Web sites:

- [Computer Dictionaries, Acronyms and Glossaries](#)
- [Triumph of the Nerds](#)