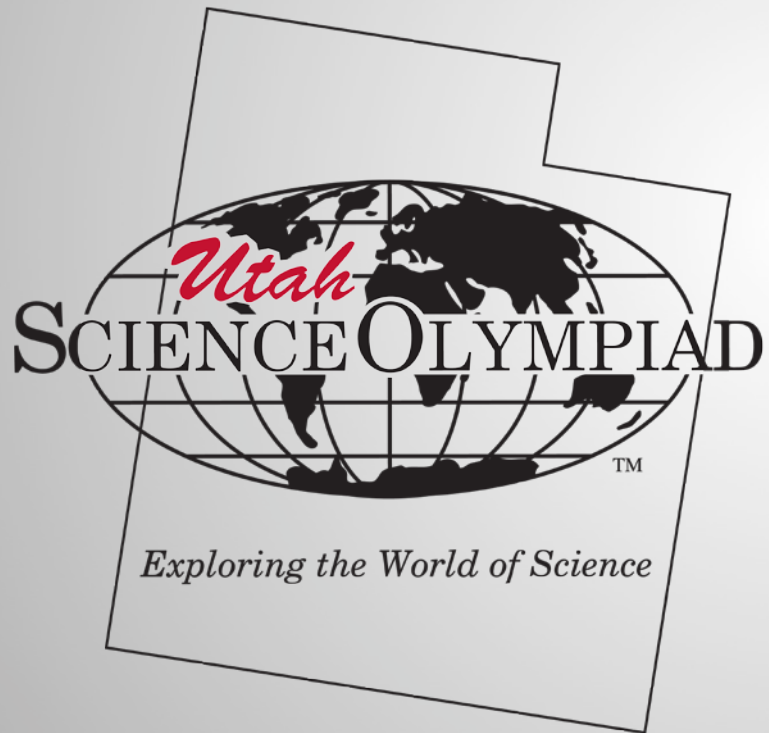


# THE ABCS OF SCIENCE OLYMPIAD

Amy Arkwright, Utah State Coordinator



# EXTRACURRICULAR HANDS-ON STEM— SCIENCE OLYMPIAD

Sponsored by the College of Engineering

Written in NSF MRSEC grant

- \$20k in participant support & supplies
- Paid student support
- Salary support for a coordinator

Affects over 70 schools in Utah from corner to corner;  
15 kids/team: grades 7-12

U of U has previously sponsored >\$70k total  
scholarship funds for medalists

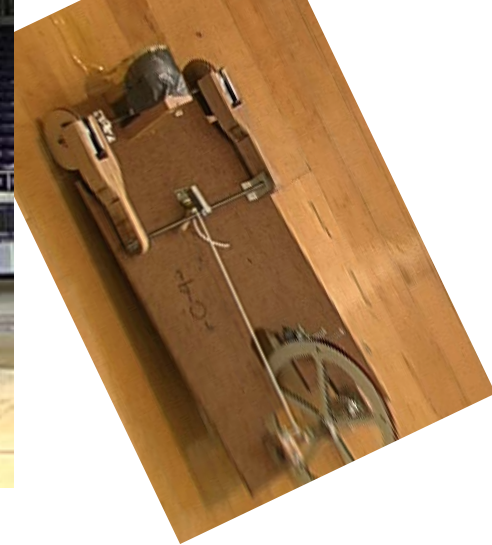
Events represent disciplines of 15 academic  
departments and five colleges



**Vision: to be top-ten in the Nation**

# U OF U HOSTING SCIENCE OLYMPIAD

- ✓ 250 support volunteers
- ✓ 47 total events
- ✓ 70 Utah schools
- ✓ Jr. High & H.S. divisions
- ✓ Over 1000 students on-the-day



# EVENT TYPES

Anatomy

Awesome Aquifers

Bottle Rocket

Disease Detectives

Dynamic Planet

Electric Vehicle

Food Science

Forensics

Invasive Species

Meteorology

Mission Possible

Oceanography

Road Scholar

Robot Arm

Science Crime Busters

Simple Machines

Solar System

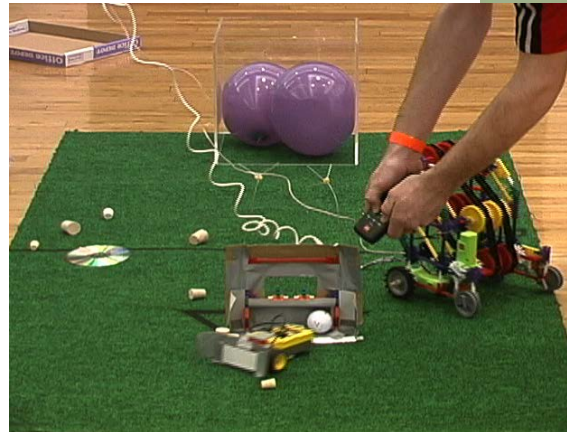
Tower Building

Write it - Do it

Science Concepts and Knowledge

Science Processes and Inquiry Skills

Science Application and Technology



# SCIENCE OLYMPIAD IS:

- ✓ Multidisciplinary
- ✓ Inclusive
- ✓ Teamwork-oriented
- ✓ Communication-oriented
- ✓ Self assembly
- ✓ Self selection

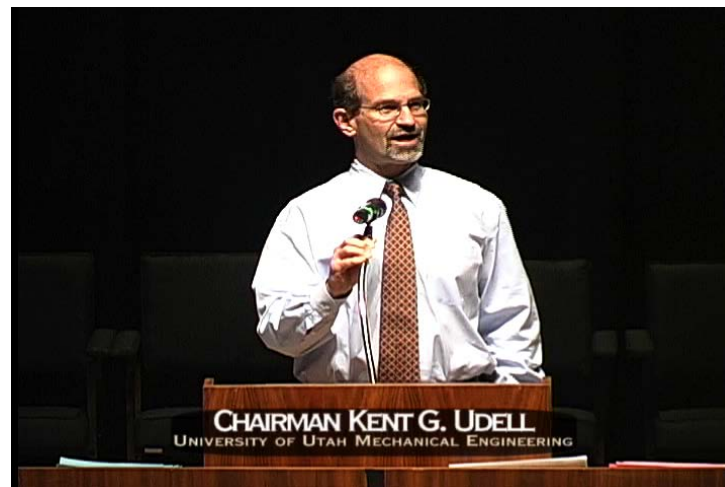


# THESE ARE THE KIDS WE WANT!

\$500-2,000 scholarships in discipline-specific events

BOTH junior high and high school divisions

>\$70k total scholarships offered; 30% girls



# TYPES OF STUDENT INTERACTIONS

Sponsor coach clinics

Teacher training

Provide event coaches

Formal recruiting tables

Scholarships

Awards ceremony

Post-awards ceremony

Invite to on-campus events

Department mailing lists



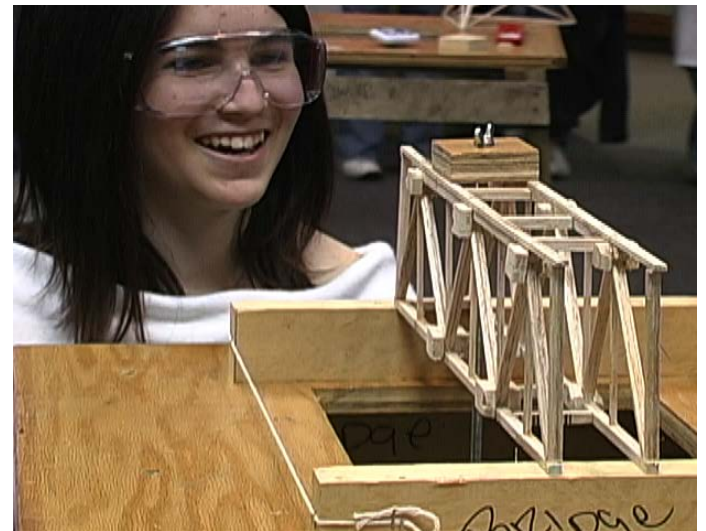
# “THE MESSAGE” AS-SENT

“We understand your commitment!”

“We recognize your effort!”

“You can succeed in this field!”

✓ Target underrepresented groups!





# THE MESSAGES RECEIVED...

“Major Universities are paying attention with *real* scholarships!”

“Our district needs to take this more *seriously*”

- ✓ more schools, more kids, more teachers, more parents need to get *involved*
- ✓ Enhanced level of competition!
- ✓ UT teams are nationally competitive
- ✓ Everybody wins!



<http://www.soinc.org/events/>

# NATIONAL SCIENCE EDUCATION STANDARDS

National Research Council

CONCEPTS INQUIRY PHYSICAL LIFE EARTH TECH PER/SOC HIST/NAT

	CONCEPTS	INQUIRY	PHYSICAL	LIFE	EARTH	TECH	PER/SOC	HIST/NAT
Anatomy	■	■		■			■	
Astronomy	■	■	■	■	■	■	■	■
Awesome Aquifer	■	■		■		■	■	■
Balloon Launch Glider	■	■	■			■		
Booilever	■	■	■			■		
Chem Lab	■	●	■			▲		●
Circuit Lab	■	■	■					
Designer Genes	■	■		■			●	
Disease Detectives	■	■		■		■	■	■
Don't Bug Me	■	■		■			■	■
Dynamic Planet	■	■		■	■		■	
Ecology	■	■		■			■	■
Experimental Design	■	■	●				■	
Fermi Questions	■	■	■			■		
Five Star Science	■		■	■	■	■		
Food Science	■	●	■			▲		●
Forensics	■	■	■				●	
Health Science	■	■		■			■	
Heredity	■	■		■				■
Meteorology	■	■		■	■		■	
Metric Mastery	■	■	▲			■		
Mission Possible	■	■	■			■		
Oceanography	■	■	■	■	■	■	■	■
Physics Lab	■	■	■					
Remote Sensing	■	■		■	■		■	
Road Scholar	■	▲			■			
Robot Ramble	■	■	■			■		■
Rocks and Minerals	■	■			■			■
Science Crime Busters	■	■	■	■			●	
Science Word	■		■	■	■	■		
Scrambler	■	■	■			■		■
Simple Machines	■	■	■			■		
Solar System	■	■	■		■	■	■	■
Sounds of Music	■	■	■			■		
Storm the Castle	■	■	■			■		
Tower Building	■	■	■			■		
Wheeled Vehicle	■	■	■			■		
Wright Stuff	■	■	■			■		
Write It/Do It	■	■					■	

Coverage Key: ■=In-depth, ●=Moderate, ▲=Introductory

[www.soinc.org/events/](http://www.soinc.org/events/)

