

APPENDIX E - AUTODESK ANIMATION COMPETITION



AUTODESK AWARD FIRST—The Competition 1998

For Excellence in Engineering Design Visualization and Communication

The Autodesk Award is presented to the team judged to have most effectively demonstrated its use of software technology tools for engineering design visualization and communication in context of solving the FIRST—The Competition 1998 engineering design problem. The competition period for the Autodesk Award category is from January 10, 1998 to March 16, 1998.

Entry Requirements

- Entrant must be a registered team participating in FIRST—The Competition 1998.
- Entries will include a storyboard and 30-seconds of animation created using Autodesk® software. See Entry Specifications for all requirements in detail.
- Limit one (1) Entry per team.
- **Entry Deadline: 5:00 PM, March 16, 1998.** All Entries (regardless of preferred shipping method) must be received at Autodesk, Inc. not later than 5:00 PM on Monday, March 16, 1998. Entries will not be accepted for judging after the deadline. Autodesk is not responsible for Entries not delivered to Autodesk's San Rafael, CA, office by the DEADLINE, nor for any lost, late, misdirected, illegible, incomplete, or damaged Entries.

Award Details and Description

The Autodesk Award is closely aligned with engineering and market-driven team design practices. Judging will focus on these key considerations with points (100 total points possible) awarded as follows:

Engineering Design Visualization (40pts)

Effectiveness in the use of computer graphics to visually communicate the engineering design, the assembly, functionality, and competition strategy of your robot design. The challenge is to show what your robot could look like and how it could function in competition.

Presentation and Communication (40pts)

Effectiveness in the use of computer graphics to promote your team's solution to The Competition design problem among members of your team and throughout your community. The challenge is to creatively tell the story that your team, your approach to The Competition, and your robot are unique and will win. The added challenge here is to generate excitement about engineering design and FIRST—The Competition 1998.

Composition (20pts)

An overall measurement of the distinctiveness of the entire piece—that “edge” that separates your winning Entry from all others. The challenge is quality of execution—how technology tools are creatively and effectively used, and how the final piece is brought together from development of the story through design, revision, and thoughtful editing to the final production.

Keys to Judging

In scoring your Entry, giving points in each of the three categories described above for a total of 100 points, judges will address the following criteria:

Creativity

A quality measured in terms of how effectively your team creates a mood, simulates an environment, and differentiates your robot from all other entries.

Tips:

- *“Brand” your team identity and personalize your Entry.*
- *Tell a great story, using real or imagined characters, humor, music or great effects.*
- *Maintain consistent creative energy making your Entry compelling and exciting to watch.*
- *Review your favorite commercials, computer games, videos/films, watching for the way they creatively use technology. Apply some of those creative qualities and technical tricks to your story and character(s).*

Storyboard

A quality measured in terms of how effectively your team organized the content for your story and communicated your Entry's design concept.

Tips:

- *Every story should have a beginning, a middle, and an end. It should be clear how you planned to organize content.*
- *Storyboards are for pre-production and should communicate what you intend to present. Complete the storyboard before beginning your animation and use it as a guide for design implementation.*
- *A lot of information can be communicated in 30-seconds of animation, but a common mistake has been to try to do too much. Focus on the key message(s) you lay out in your storyboard.*
- *Use a #3 pencil or softer for sketches to ensure that your original and duplicates are readable.*

Realism

A quality measured in terms of how effectively your team realistically and accurately simulates the design and functionality of your robot.

Tips:

- *A Digital Kit of Parts for use with Mechanical Desktop 2.0 software, based on the actual 1998 FIRST—The Competition Kit of Parts as well as parts used in The Competition playing field, will be available to all registered FIRST participants in January 1998. Check the FIRST Web site for a direct link to the download site.*
- *While it may not be possible to complete your Autodesk Award Entry using the actual, final design of your robot, maintain focus on the competition objective and show your design for a robot and a strategy that could really work.**

**Note: Ideally, the engineering design visualization/communication group work very closely with the actual robot design group—that being the goal of collaborative team design in the professional world.*

Technical Aesthetics

A quality measured in terms of how effectively your team uses texture mapping, color, lighting, special effects, cameras, motion, mood, editing technique, sound effects, voice over, photography, or live video.

Tips:

- *Pacing—Watch television ads and note the time between camera cuts, fades, and other transitions. Also, try to use 3-5 second (90-150 frame) individual segments using Video Post to “stitch” these segments together.*
- *Efficient Mesh Model—Optimize models for the lowest number of vertices and faces.*
- *Efficient Scene Materials—Use the lowest resolution bitmap possible in materials, avoid complex material trees, and minimize reflection/refraction.*
- *Efficient Scene Lighting—Use Omni lights with caution. Because light passes through objects, more than two or three Omni lights can be confusing.*
- *Shadows are “expensive” and should be used only when necessary. Use Attenuation on all lights to limit the range of shadow calculations.*
- *Add any color to lights only after final materials have been assigned to objects.*
- *Use creative camera view angles. Avoid choppy edits.*

Entry Specifications Checklist—Entries not meeting the requirements of this checklist will be disqualified from any judging.

- Hard copy of your original storyboard in 8_ -by- 11-inch format and not more than three (3) sketches per page and a total of not more than six (6) pages. Use #3 pencil or softer. Color may be used on the original.
- Six (6) legible copies of the original storyboard.
- Not more than 30-seconds (maximum) of animation not including credits. Credits are acceptable but will not be judged and should not be included in the 30-seconds of animation. To ensure judges accurately record timing, Entries should:
 - Open with still frame of the Entry title, school name(s), and corporate sponsor name(s). For example: Beyond the 'BOT
 Tech High School/Sponsor, Inc.
 - End with a still frame image of your robot.
 - Credits, if any, may follow but will not be included in judging.
- Animation may be submitted **-EITHER-** on .ZIP disk **-OR-** as videotape in one of the following tape formats: BETACAM SP; _ inch; SVHS, Hi-8; or VHS tape in NTSC format.
- Storyboard *and* .ZIP disk or video for your Entry *both* clearly labeled with the title of the animation, the school name(s), and the corporate sponsor name(s).
- A completed Autodesk Award Entry Form including a signed Autodesk Archive Consent and Release Authorization (AC&R) Form.
- Ship Entries to: Autodesk, Inc.
 Marketing Support Team—Image Archives
 111 McInnis Parkway
 San Rafael, CA 94903
 Attn.: Autodesk Award for FIRST

Note: Entries will remain the property of Autodesk, Inc. No hard copies, digital files, videocassettes, or computer disks will be returned.

Judging

Entries will be judged using a checklist of preset criteria developed by an independent education consultant and including both qualitative and quantitative scoring categories. Autodesk Award judging to select the top 4 Entries will be conducted by a select team of education, engineering, and animation experts. The recipient of the Autodesk Award will be determined by a group of the independent panel of judges that judges the National Championship of FIRST—The Competition 1998. The judges' decisions will be final.

Each team submitting a *qualified* Entry for the Autodesk Award will receive a copy of their score as well as verbatim comments from judges and a videotape of all Entries in this Award category.

Prizes and Prize Rules

The name of the winning team and up to three (3) Honorable Mentions will be announced during the FIRST—THE COMPETITION 1998 National Championship Awards Ceremony being held at EPCOT on April 4, 1998 at which time one (1) FIRST—THE COMPETITION 1998 Award trophy will be presented. Autodesk will also present a framed representative image from the winning Entry to the corporate sponsor and the high school, and grant education copies of the latest release of 3D Studio™ MAX to a select group of student animators on the winning team.*

If you have questions regarding these Entry requirements, please contact Kaki Leyens at 415-507-6418 or via e-mail at kaki.leyens@autodesk.com or Laura London at 415-507-6411 or laura.london@autodesk.com.

*Software awards will be shipped directly to individual student contributors following the Competition.

*Autodesk reserves the right to substitute, at its sole discretion, another prize of equal or greater value for any prize described herein. No part of any prize is transferable. No substitutions of prizes is permitted except as expressly provided above.

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**AUTODESK AWARD
Entry Form**



Information provided on this **Entry Form** is required and will be used in preparation of awards. Please record information as you wish it to appear. Please read the Entry Requirements and Specifications carefully before completing this Entry Form.

Entry Deadline: Must be received at Autodesk no later than 5:00 PM, March 16, 1998 (regardless of shipping method).

Entrant information [Please print.]

FIRST Team Number: _____ Autodesk Award Entry Title: _____

School Name(s): _____

Contact (School): _____ Telephone and e-mail: _____

Sponsor Company Name(s): _____

Contact (Sponsor): _____ Telephone and e-mail: _____

Individual student animator(s):

If more than 5 students contributed to this Entry, please have your team select up to 5 individual student animators as potential award recipients and then list them here. We want to acknowledge all other student contributors on your Autodesk Award team (including storyboard, modeling, sound effects, etc.), so please list any other contributors and attach that list to this Entry Form.

Student Name	Current Address	City, State, ZIP	Telephone
1. _____	_____	_____	_____
2. _____	_____	_____	_____
3. _____	_____	_____	_____
4. _____	_____	_____	_____
5. _____	_____	_____	_____

Individual Team Champion

In past competitions for the Autodesk Award, we've heard impressive stories of outstanding individuals on some competing teams. Please tell us who your "Team Champion" is this year and about his/her contribution to the team and your Entry. Your champion may be a student, teacher, engineer, community member, or other individual contributor. _____

Software Use—Describe how you used Autodesk software and the Digital Kit of Parts in your Entry. Also, briefly name and describe how you used any other design, visualization, or animation software products.

The Autodesk Archive Consent and Release Authorization agreement on the back of this form MUST be completed and included with your Entry.



AUTHORIZATION

ARCHIVE CONSENT AND RELEASE

The Competition 1998

for the Autodesk Award at FIRST—

Dear Contributor,

We appreciate your interest in submitting material to Autodesk, Inc. The following allows us to legally use your work.

- By signing and returning this consent form, the individual named below and/or if applicable the individual's employer, middle or high school(s), or corporate or college/university sponsor(s) and individual student, faculty and corporate contributors (hereinafter referred to collectively as the "Entrant") understand that the Entrant is agreeing to the following terms which will govern use of the images, animation, sounds, files and other material (the "Material") described below:
 - Entrant grants a nonexclusive, irrevocable, perpetual, worldwide license to Autodesk, Inc. to use the images, animation, sounds and other material contained in the "Material" in any manner it deems appropriate. "Nonexclusive" means that Entrant can allow others to use the Material and that the Entrant retains all rights to the Material other than those specifically granted to Autodesk.
 - Autodesk may change, reproduce, distribute, and sublicense the Material to its subsidiaries, affiliates, customers and to third parties granting them the same rights which Autodesk has received.
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The Entrant represents and warrants that the Material is owned by the Entrant free and clear of any liens or claims of any third party; that the Entrant has a legal right to grant the permission given in the Entry Form and in this Agreement.

The Entrant indemnifies and hold Autodesk, its subsidiaries, associated companies, successors, assigns, agents, and employees harmless against liability should any third party claim that the use of the Material or any part thereof by Autodesk violates any right of such third party. The Material does not include any proprietary information, logos (including the FIRST Foundation logo), or trademarks of any third party.

The authorized signatory for the Entrant is over 18 years old and either owns the copyright to the material in these files, or has the right to grant this consent on behalf of the owner, or knows that the material in these files is in the public domain. This consent does not conflict with any others the Entrant has granted or any other rights to the files.

EMPLOYER, SPONSOR OR SCHOOL (where applicable)

FIRST Team #: _____ **Autodesk Entry Title:** _____

Sponsor or School Name: _____

Authorized Signatory (print): _____

Address: _____ **Name:** _____

City, State, ZIP: _____ **Title:** _____

County: _____ **Date:** _____

EMail: _____ **Telephone #: ()** _____

Authorized Signature(s): _____ **Fax #: ()** _____

If you are submitting more than 2 source files for the animation (requested but not required), please provide & initial a listing of filenames and attach it to this form.

Filename :	Description:	Software Used: (please list all)	Initial
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Example:

CAPECOD.TGA	Cape Cod vacation home	AutoCAD®, 3D Studio®	MAX
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1. _____	_____	_____	_____
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2. _____	_____	_____	_____
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How would you like credits to be given to you, your school, and/or your company?
(Please note, however, credits cannot be guaranteed.) _____

THE ABOVE RELEASE SHALL BE VOID IF AMENDED IN ANY MANNER. AUTODESK SHALL NOT BE RESPONSIBLE FOR THE RETURN OF ANY FILES SUBMITTED.

