



Birth of an Adventure

The Creation of a Sierra Game

By Lorelei Shannon

Mommy, Where Do Games Come From?

Sierra On-Line receives many letters from people wondering how a particular game came into existence. Was it a story first? Who designed it? Who did the art, the programming, the writing?

These are all good questions. After all, when you look at a finished Sierra animated adventure, it's hard to imagine it was ever just an idea in the back of someone's head.

But it was.

The Perfect Paragraph

Every Sierra game starts out its life in the same way: As an idea. The designers think of hundreds and hundreds of possible game ideas every month. They must sift through these ideas, and pick out the good ones, the fun ones, the original ones. Often times these decisions are made in "brainstorming" sessions, in which the designers pool their talents to create the best game possible.

When the designers have a really good idea, they write it down. The game ideas first incarnation is the "story treatment", just two or three paragraphs outlining the major events in the game.

Josh Mandel, director of product design at Sierra, elaborates: "The story treatment tells us everything we need to know. Is the raw concept of the game—which can usually be summed up in a few sentences—exciting or uninspiring? Is the genre popular? Are the characters unique and interesting? Does the setting sound like a place that will be fun to explore? Do a hundred puzzles and situations spring

to mind? If a proposal pushes all the right buttons (and it's tough to find one that does), then we all get excited, pat each other on the back, and try to get the proposal approved for expansion into the full design document."

People, Places, and Things

Once the game is approved for production, the designers create the "design document". This is almost like a short story which describes in detail the characters, actions, and plot branches in the game.

The characters are developed even further. The designers work with the production designer to come up with a visual image of the character. Sierra characters are often so fully developed by the game designer that much of the information never gets used in the game. For instance, Roberta Williams could undoubtedly tell you what Princess Rosella's favorite color is, and Lori Cole could tell you about the Bookwyrms' childhood. The very fact that this information exists makes the characters much more alive and real.

Greenwood or Gothic? Underwater or Outer Space?

Once the plot and characters are set, decisions are made as to the ultimate "look" of the game. "The initial concept for the way a game will look can come from any one of several different sources," said Bill Davis, Sierra's creative director. "Many times, as the design develops, I formulate very specific ideas for a game's 'art style'. In situations like this, it becomes

my simple task to convince the director, designer, and production designer that I'm right. At other times it may be the designer who has the initial vision, the director another time, or the production designer another. Ultimately, though, the burden of physically developing the "look" is placed on the shoulders of the production designer for Sierra, Andy Hoyos. When Andy has completed his 'treatment' the baton is passed along to the game's art designer. He or she is assigned the responsibility of actually interpreting this treatment or style throughout the actual game. What a team!"

Frame by Frame, Word by Word

Next, the designers team up with the artists to create storyboards. These combine art and text to illustrate the major screens and actions in the game. The storyboards ultimately function as a sort of map for the artists and animators to work with.

The last stage of design is the final script for the game, much like a Hollywood movie script. Also like Hollywood, Sierra scripts often stay open for revision and interpretation by various members of the team throughout production. Everyone's opinion counts.

Poetry in Motion

The artists and animators can now begin to bring the game to life. "Sierra has successfully been able to blend various animation techniques, such as traditional cel animation, stop motion clay animation, video-capture and state of the art computer animation to bring a new, lifelike dimension to the computer entertainment industry," said Sierra animator Barry Smith. "It is definitely a positive new venue now open to animators who enjoy performing a variety of tasks and exploring uncharted animation techniques."

The most common form of animation used at Sierra is cel. The characters are animated first in pencil, one frame (or cel) at a time. Then the drawings are scanned into the computer, where they're colored, shaded, and rounded out. Using a tool called a video editor, the frames are strung together to create continuous motion.

In video-capture, live actors in motion are captured on videotape, and at the same time, digitized into a computer. The tape is only kept as a backup. A piece of proprietary software created by Sierra called Movie 256 turns the video feed into individual animation cels. The cels are then artistically enhanced within the computer, to conform to the "look" of the game. "Through video capture," said video artist Bob Ballew, "we produce the depth and believability of real life."

Sierra has begun working with clay stop-motion animation only recently. This new application of a classic technique has opened new possibilities for visuals in adventure games.

Interactive Art Gallery

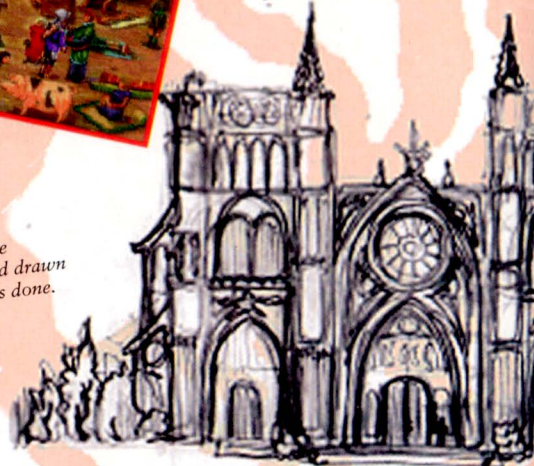
The backgrounds and character portraits, or "talkers" in Sierra games are all hand-painted, and then digitized into the computer. They are literally works of art. Artist Jim Larsen states; "In my career as an artist, I have



Thousands of hours of design, artwork, animation, and programming went into Conquest of the Longbow.



Places and settings are carefully designed and drawn before any painting is done.



Alan-a-dale

The music is composed and recorded by musicians, and finally added to the game by the programmers

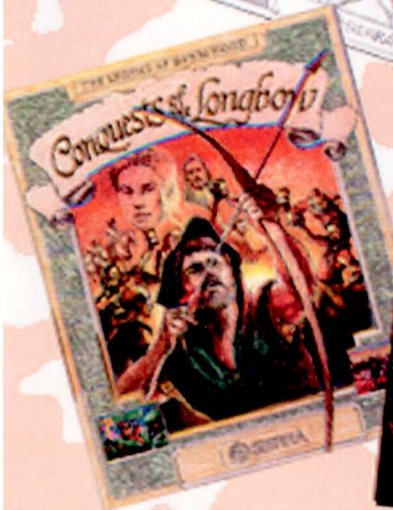




The designers work with the production designer to come up with a visual image of the character.



Many box cover ideas are explored before the final artwork is decided on.



always marvelled over the fact that I am allowed to do something I enjoy so much and actually get paid for it. To think that my artwork will be seen and hopefully enjoyed by so many is really an exciting thought for me. It is even more exciting that the artwork created here at Sierra eventually comes to life. There is a great deal of pride in every piece of Sierra artwork, as well as a lot of imagination and hard work."

The character portraits are animated and lip-synched, and the game animation is superimposed on the backgrounds. During the animation process, the computer artists can highlight parts of the scenery, so characters can actually go behind and around them. That's what creates Sierra's 3-D animation effect.

Cohesive Code: Weaving it Together

The programmers start with the game script, pencil drawings of the backgrounds, and rough animation, and begin to tie them together. Using an original computer language known as SCI (Sierra Creative Interpreter), they assemble the pieces of the game. When it's running properly, the finished animation and backgrounds are added. The programmers continue to minutely adjust and tighten the code, until the game is as perfect as possible. In the words of Sierra programmer Brian Hughes: "Programming is the science of turning the story, art, and music into a game."

In Multimedia versions of Sierra games, voices are recorded and digitized, and the programmers must integrate the voices with lip-synched loops of animation.

Music! Music! Music!

Somewhere along the line, the director, music director, and composer must decide on the type of music that will appear in the game. "The general sort of music that will be used in a game is pretty much decided by committee," said long-time Sierra musician Mark Seibert. "We get together with everyone and look at the game as a whole. We try to match the music to the animation and style of the game. Of course, some scenes need exciting music, some scenes need music to evoke suspense, and so on. When we get started, it's magic. It's just a lot of fun."

Sierra's music department is talented and versatile, capable of creating anything from heavy metal to medieval morris dances. The music and sound effects are composed and recorded by musicians, and finally added to the game by the programmers.

Coordination, Diplomacy, and Direction

Someone has to keep all of these elements coordinated. Every game has a producer and a director, just like a movie. The producer makes sure that everything happens in the right order, and happens when it's supposed to. He or she works with the various departments individually, and keeps them working harmoniously together. Or, as Stuart Moulder, Sierra producer, whimsically put it,

"The producer is a bit like the midwife of the game. Our job is to be there and ensure the successful delivery of something very special to our customers."

The director does the same job a Hollywood director does. Working with the art designer, the director decides what the "shots" will look like, how scenes will be timed, and the "mood" of the scenes, as well as coordinating many other important elements. "We panic a lot," said director Bill Skirvin, with a smile. "We're responsible for every part of the game. We have to coordinate the music, art, animation, and programming. It's up to us to make sure the game looks right in every way. It's nerve-wracking, but it's really fun when everything starts coming together and looking good."

Only the Best: Quality Assurance

Once the game is finally finished, it still has a long way to go. Quality assurance takes over. QA people play games all day long, and it's hard work! Sharon Simmons of quality assurance explains: "The Quality Assurance Department is responsible for testing and assuring the quality of each Sierra game. Each game is tested for its playability, design logic, program code errors, and text logic and quality. The game is also analyzed from a user's point of view; novice, hacker, and serious experienced game player. In the course of the QA process an analyst will go through the game approx. 400 to 500 times. Each analyst has their own style of testing a game. The resulting finished product has had all aspects of the game tested in every possible way."

When the game has QA's seal of approval, it goes to the Quality Control department. There, the actual disks are checked for compatibility, easy startup, and other crucial technical points.

When the disks finally go into mass duplication, Sierra's original duplication machines check each disk as it is copied. If the disk is bad, it is automatically ejected.

An In-House Ad Agency

All packaging and marketing is done in-house. From the copy on the box back to the documentation inside, the game is 100% Sierra.

"When we start a cover," said Kurt Busch, Creative Director for the Marketing Division, "We meet with the game's designer and lead artist to get a feel for the look and atmosphere of the game. We match the right artist and prepare dozens of pencil sketches. At the same time, we put together screen shots and copy that will hopefully bring out the way one would feel playing the game." Only when the box sleeve, with its original cover art, is slipped around the game box, is the game truly finished.

Any Sierra game you see is the result of a massive team effort. All of that cooperation and talent really shows in the final product!



Initial concepts may change a little in the final artwork. Sometimes they change a lot.

Storyboards provide a guideline for the artists and animators to work with.



Ext. Archery in Forest
L. Robin Practicing With Bow And Arrow
IN FOREST ARCHERY

