HyperCard and Writing How One Good Idea Leads to Another

You may have heard something about HyperCard already—from your colleagues, a computer magazine, or scholarly journals. Apple's new hypermedia program is causing quite a stir in education circles. The best way to explain why is to explain the program's lineage.

It all started more than 40 years ago when Franklin Roosevelt's science advisor, Vannevar Bush, became concerned that the human mind was getting too full—that there was too much information to absorb, and no adequate method of sifting through it.

What Bush proposed as a solution to this problem was a wondrous machine he called a *memex*, a sort of mechanized private library—a desk with a keyboard, buttons, levers, and tilting translucent screens. The machine would store every scrap of information you would ever need: books, notes, pictures, newspaper, and other documents. You could search through information with incredible speed. You could pinpoint a thought in a book, leap to a related point in a newspaper story, and go on linking ideas until you found what you needed to know.

The magical tool Bush envisioned in 1945 is known today as *hypermedia*. The only difference is that it doesn't come on a desk, it comes on a disk. and its name isn't memex, it's HyperCard. with HyperCard, you can do much of what Bush fantasized—create integrated, nonlinear databases that link, annotate, and cross-reference text, video, animation, still images, music, and voice. What's even more amazing is that you can do it all yourself—without knowing anything about programming.

HyperCard is abased on a research metaphor we're all familiar with—notecards. These cards are grouped into *stacks*. You can link one card to another (or one piece of information to another) by creating *buttons*. Then, whenever you use the mouse to click on a button, you'll move instantly from one card to another—or from one bit of information to another.

You can imagine the possibilities. And, why some wags like to say, "HyperCard is all things to all people." Read on to learn how your colleagues have been using this amazingly flexible and versatile tool to extend and enrich their writing programs.

Creating Interactive Yearbooks with HyperCard

Los Colinas School Camarillo, CA

Match sixth graders who want to demonstrate what they've learned about ancient Greece with a teacher who's beginning to experiment with *HyperCard*, and you might get a stack like *The Gods and Goddesses Yearbook*.

"It starts out with a picture of the children dressed up as gods and goddesses," says teacher Joni Chancer. "When you click on any one of the faces, you see a first-person description of the life and exploits of that god or goddess." Other buttons, she says, go to a "mythological family tree" and to a description of ancient Greece.

By developing this stack, the sixth-graders are writing for a real audience, and that's highly motivating. They're also integrating and internalizing what they've learned in their recent studies. *The Library*, a stack that Chancer developed, is an innovative tool for reporting on books. The students use it to enter information and comments about books they've read, and they also refer to it when they want new book suggestions. Chancer uses the stack herself to keep track of her students' reading progress.

"We have a program of independent reading, and I wanted to make something the children could use as a tool for responding to the books. I also wanted it to bring together the elements I'm trying to teach: an awareness of genre, setting, character descriptions, and plot."

A child who's looking for reading suggestions can use the stack to browse through descriptions written by the students—of different literary genres.

"When you click on the icon that says historical fiction," Chancer explains, "it takes you to a field that describes—in the students' own words—what that is." Someone looking for specific suggestions within a particular genre can then see a title-by-title list of all the books the children have read. And that's not all.

By clicking on one of the book titles, Chancer says, the child brings up a reference card with basic information about the book. This card, filled out by the first student in the class to read the particular book, also contains buttons labeled with elements such as character, setting, plot synopsis, and favorite quotes. Each of these connects to a scrolling field with room for comments from both the original book reporter as well as from others.

For information on how to order *The Library*, see the Stackware Information section.

Multimedia Helps English Students Make Connections

Cincinnati Country Day School Cincinnati, Ohio

American literature and interactive multimedia may seem to be an unlikely combination, but students in Briggeman's junior English class are blending them, and they are very excited with the results. An innovative project uses multimedia to show the relationships of the literature, art, and music for various periods in literary history. Briggeman explains that with this project, students begin to appreciate that literature does not exist in isolation, but is related to the major intellectual motifs of an era.

The project involves creating a *HyperCard* stack that includes excerpts from the literature students have read, essays they have written about the literature, paintings selected from videodiscs of art, and musical selections of the period.

To begin the project, students discuss what they have learned from their reading about the

characteristics of American literature from the ages of Romanticism, Realism, and Modernism. Then they are asked to apply those characteristics to the art of three periods by exploring the *National Gallery of Art* and the *Louvre* videodiscs and selecting three paintings from each period. A *HyperCard* stack index that accompanies the videodiscs allows students to search for paintings in a particular classification, such as artist, style, or time period.

Once they have selected the paintings they will include in their *HyperCard* stacks, students write essays that compare and contrast the features of the paintings with the characteristics of the literature they read in class. Their essays are incorporated into their stacks along with buttons that will access the paintings they have selected. The final step of the project is to add music from the different periods using *HyperSound* and *MacRecorder*.

Briggeman describes the result as a presentation that allows students to look at a painting, read about its characteristics, and immediately reference related literature while they listen to music that is associated with these literary and artistic styles. He says, "The computer enables the students to understand the concepts of Romanticism, Realism, and Modernism far more vividly, poignantly and lastingly than ever before. Students loved doing this project and want to do more like it."

HyperStories—An Adventure in Writing

Whittier Center San Diego, California

What happens next? That's a decision students at Whittier Center make as they write HyperStories —interactive stories written in HyperCard. These students write several scenarios for the same story and let the readers choose their own adventurous course with the click of a button.

Deaf students create illustrated "storybooks" using HyperCard templates and Macintosh computers. Even though the templates were developed with deaf students in mind, teacher Mary Lange points out that hey can be used with all types of students.

Students compose HyperStories on curriculum themes and topics such as the Industrial Revolution, the Oregon Trail, pilgrims, and rain forests. They also use the templates to learn creative writing skills, such as character and plot development. "What's really nice about HyperStories is that they can easily be adapted to the curriculum and to student's needs," says Lange. "The students love HyperStories. They are a great motivators. If students have to write, they would rather do it on the computers."

Lange says that teacher training on the use of Macintosh and HyperCard is very important She also suggests that teachers look at some examples of branching stories written in HyperCard such as *The Amanda Stories* or *The Manhole*; or at books such as *Choose Your Own Adventure* or *Twist-A-Plot* before developing a template.

For information on how to order *HyperStories*, see the Stackware Information section.

Freshman Composition Will Never Be The Same

New York University New York City, New York

"Teaching students how to write by asking them to write a linear text is like teaching students how to draw—but only letting them use straight lines. They'll never learn how to draw circles if we only teach them how to draw straight lines. And they'll absolutely never learn to draw spheres, with shading and three-dimensional perspective."

With a background in media and philosophy, New York University English professor John McDaid is not your typical freshman composition instructor. But when it comes to teaching writing, his goals are the same as those of most other instructors. He wants his students to use writing as a tool for discovery—a tool for finding out what there is to say about a subject, exploring various perspectives, and creating their own meanings.

That's why McDaid decided to use HyperCard instead of word processing software as the writing software in the second semester of NYU's two-semester freshman composition course. For the final semester project, he asked students to produce hypermedia essays. One student produced a HyperCard essay on Van Gogh that included a history of the artist's life, scanned images of his paintings, and a running commentary linked to descriptions of the artist's life. Another student did an essay on the history of the New York subway; it comprised historical facts, maps, photographs, trivia, and even a little undercover reporting.

"On the last day of class, all these students were shouting at each other from across the room, saying, 'Wait up, I want a copy of your stack before you go!' How often do writing instructors have a class of students making a fuss over getting a copy of each other's papers?"

The Earthquake Preparedness Stack was developed for Apple Computer. This stack is similar in format and content to the hypermedia essays developed by John McDaid's students at NYU. For information about how to order *The Earthquake Preparedness Stack*, see the Stackware Information section.

Simulating the Pleasures and Pitfalls of Small-Town Reporting

West Valley Community College Felton, California

Written by Rich Cameron, a journalism professor at West Valley Community College, City Council is a HyperCard application that simulates the pleasures and pitfalls that any reporter encounters in covering a small-town city council meeting.

"It's based on an actual city council meeting that I covered several years ago," he says. "When students use City Council, they're presented with an agenda and notes from the meeting. Based on that material, there are 12 possible this HyperCard-based news-gathering simulation for the Macintosh computer develops students' journalism skills. The program provides students with a city council meeting agenda and the complete recorded notes taken at that meetings. Using this material and any additional information they can gather from the city paper's archives and interviews with key people involved in the meeting, students practice writing news articles about the meeting.

For information on how to order *City Council*, see the Stackware Information section.

HyperCard Resources

Stackware Information

City Council

Rich Cameron 586 Gold Avenue Felton, CA 95018 408/741-2043 Price: see below

City Council is shareware with the initial stack free by writing or calling Rich Cameron. Once the user decides that he/she wants to know more and actually use the stack, sending in a registration fee of \$20.00 obtains the entire program, a special stack for teachers and a printed manual.

The Earthquake Preparedness Stack

Gaia Systems 3000 Alpine Road Menlo Park, CA 94028 415/854-8288 Price: \$29.95

HyperStories

C.U.E. SoftSwap P.O. Box 271704 Concord, CA 94527-1704 Price: \$22 (order code #STORIES)

HyperStories is a HyperCard-based authoring system for the Macintosh which allows children (and adults!) to create interactive branching stories just by pointing, clicking and (most importantly) writing. No programming is required. Includedin the package is a sample completed story, several story starters, and short tutorials on character and plot development and cause and effect in stories. HyperStories was developed by Mary Lange and Gabriel Acosta-Lopez, as part of an Apple Equal Time grant. Once the disk is obtained from CUE, it is considered public domain and may be freely copied and distributed.

The Library

Joni Chancer 5850 Terra Bella Lane Camarillo, CA 93012 805/484-1802 Price: to be determined when product ships (end of August, 1990)

Commercial, Writing-Related HyperCard Stacks

Amanda Stories (Vol. 1 & 2) Voyager; 800/446-2001, 213/451-1383.

American English Writing Guide Nova Development Corp.; 818/992-3222,800/950-6682.

Country Christmas, A B&B Soundworks, 408/241-7986.

Culture 1.0 Cultural Resources; 201/232-4333.

King Frog Actreo Software; 612/546-3456.

Manhole, The Activision Entertainment; 415/329-0500.

My First Book of Poetry and A Dream Called Storm B&B Soundworks, 408/241-7986.

Nuts & HyperBolts Sterling Swift Software, 512/280-2431.

Writing Process Workshop Educational Activities, Inc.; 800/645-3739.

Books

HyperCard in a Hurry by George Beekman. Published by Wadsworth, Belmont, CA.

HyperCard Made Easy by William B. Sanders. Published by Scott, Foresman and Co., Glenview, IL.

HyperCard Power: Techniques and Scripts by Carol Kaehler. Published by Addison-Wesley, Reading, MA.

Training

HyperCard: A Tool for Educators from the Minnesota Educational Computing Consortium. This workshop provides hands-on experience with ready-made "stackware" that demonstrates HyperCard's use as a teaching, learning, and management. Participants will also use HyperCard student courseware and learn how HyperCard can serve as an authoring system for integrating the Macintosh with other technologies, including videodiscs and music interfaces. For more information, contact MECC, 3490 Lexington Avenue North, St. Paul, Minnesota 55126; 612/481-3652 or AppleLink: K0091.

HyperCard Video Tutorial from Voice & Video, Inc., 5038 Ruffner St., San Diego, CA 92111. A videotape tutorial for HyperCard that's designed for the complete beginner, not only to HyperCard but also to the Macintosh.

HyperEasy from Personal Training Systems in Santa Clara, CA, is a series of four audiotape and disk-based tutorials that guide a user through HyperCard's browsing, authoring, and scripting capabilities. For information, call 408/559-8635.