

### A unique cathode ray tube.

The success of the DatagraphiX display systems on the A-NEW program is due in large measure to the CHARACTRON® Shaped Beam Tube we build.

The alphanumerics and symbols displayed on the CHARAC-TRON CRT are produced by directing the electron beam through individual characters etched in a micro-matrix located within the tube. This technique stencils each character clearly into the tube face—crisp and steady—and permits intricate symbols to be displayed as sharply as the type on this page.

Pictorial information such as curves, vectors and video displays are produced by spot-writing methods and the matrix-produced alphanumerics and symbols are time-shared with the pictorial images. Thus a single display becomes multipurpose. We have pioneered the time-sharing concept in CRT's, which accounts for our leadership today.

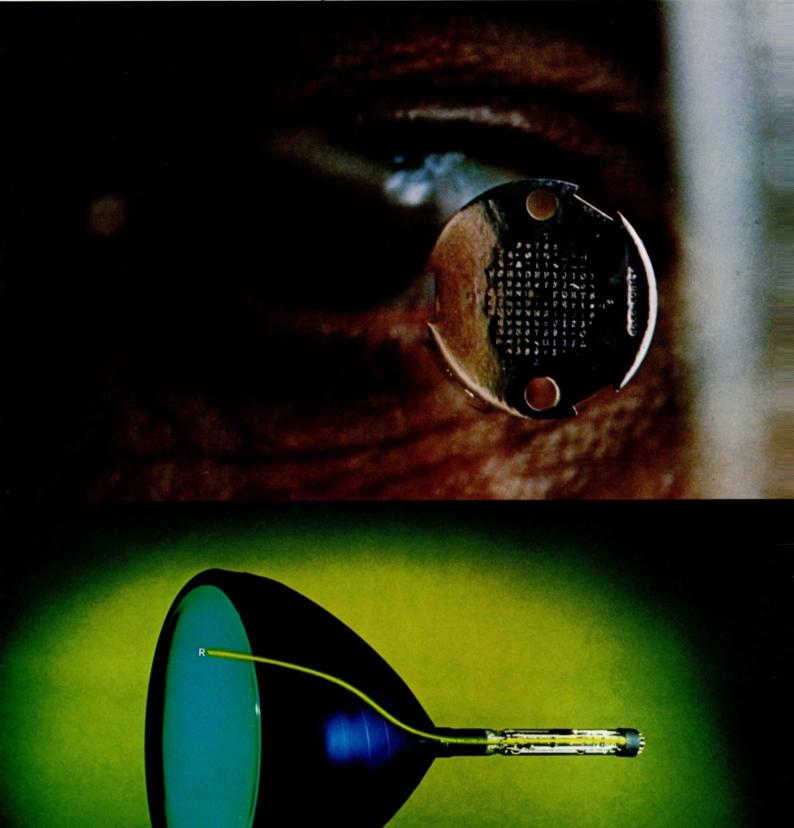
The CHARACTRON Shaped Beam Tube, with its character resolution measured at 5,000 to 8,000 lines per screen, provides higher information transfer fidelity, lower error rates and less fatigue. The clearest and easiest-to-read display available. Helping people see more through the use of multi-purpose displays is our business here at Stromberg DatagraphiX. We have more experience in multi-purpose displays than any other display manufacturer in the nation.

## The growing need for airborne displays.

Increasingly, men depend upon airborne displays. To chart safe courses through the crowded sky. For reconnaissance. Close air support. Air/interdiction. Air defense. For airlift and airdrops. Air rescue. General command support. And for command and control of events on land, on sea and in the air itself.

In the 18th century man invented flight, and extended his vision. In the 20th century he invented the electronic computer, and extended his intellect. And now with airborne displays, he's combined his two mightiest inventions.

So that he can see what must be done.



# Enlarging visions on land.

In the air he commands sweeping vistas; but it is on land that man lives, and it is from this vantage point that he mainly views his world. At Stromberg DatagraphiX we have an impressive history of designing and building successful ground-based display systems.

We began by developing the CHARACTRON Shaped Beam Tube. At first we used it as a simple CRT display. Its first large-scale use in this application was in the U.S. Air Force 416L Program, SAGE. However, we soon discovered the tube filled an even broader need in the high-speed readout of information generated by data processing equipment. The extraordinary clarity of its image makes the CHARACTRON tube an ideal link between people and computers. Not only as an output device, but as a means of input as well.

In the ensuing years our efforts have been directed toward advancing this crucial link between man and machine.

### Real time battle display.

The Battle Area Surveillance and Integrated Communications Systems (BASIC), and a more portable version, the Mobile Tactical Exercise and Control System (MOTECS), were produced by us for the U.S. Marine Corps. With both systems, tactical information from forward observers is transmitted through conventional field communications channels by means of a hand-held digital data input device no larger than a walkie-talkie to a computer located at a command post. The computer-processed battle information is then superimposed over a geographical map display—created by projecting slides of the map onto the CHARACTRON tube face from a special window located at the rear of the tube—revealing the entire battle situation in a single display, on-line and in real time.

### Army War Room display equipment.

The U.S. Army War Room at the Pentagon is equipped with Stromberg DatagraphiX display consoles. These consoles display both tabular and graphic information. They have built-in line printers for the production of paper copies of the displayed material. A keyboard, joy stick, and other function controls permit the instantaneous, two-way exchange of information between men and computers—accelerating decision making, and helping provide the U.S. Army with its incomparable flexibility and control, emulated by every ground fighting force in the world.