



US005732230A

# United States Patent [19]

[11] Patent Number: 5,732,230

Cullen et al.

[45] Date of Patent: Mar. 24, 1998

[54] **COMPUTER USER INTERFACE FOR MANIPULATING IMAGE FRAGMENTS USING DRAG, DROP AND MERGE OPERATIONS**

5,473,737 12/1995 Harper ..... 395/131  
5,611,033 3/1997 Pillelout et al. .... 395/135

### FOREIGN PATENT DOCUMENTS

0235902 1/1987 European Pat. Off. .  
4-235464 8/1992 Japan .  
WO 93/12501 6/1993 WIPO .

[75] Inventors: **John F. Cullen**, Redwood City; **Mark Peairs**; **Peter E. Hart**, both of Menlo Park, all of Calif.

*Primary Examiner*—Raymond J. Bayerl  
*Assistant Examiner*—A. Katbab  
*Attorney, Agent, or Firm*—Charles J. Kulas; Philip H. Albert; Townsend and Townsend and Crew LLP

[73] Assignees: **Richo Company Ltd.**, Tokyo, Japan; **Richo Corporation**, Menlo Park, Calif.

### [57] ABSTRACT

[21] Appl. No.: 446,196

A system for manipulating image fragments so that image processing devices such as copiers, fax machines and scanners may efficiently process oversize images. The system provides a user interface so that when an oversize image is scanned in multiple parts to produce multiple image fragments the user can manipulate the image fragments by performing drag, drop and merge operations on the image fragments. Embodiments of the invention include the use of a touch screen or mouse to allow the user to perform the operations. Other operations are selectable such as rotating an image fragment, zooming in or out on portions of the displayed fragments, merging the fragments into an integrated image and storing or printing the image fragments.

[22] Filed: May 19, 1995

[51] Int. Cl.<sup>6</sup> ..... G06F 3/00

[52] U.S. Cl. .... 395/339; 395/135; 358/450

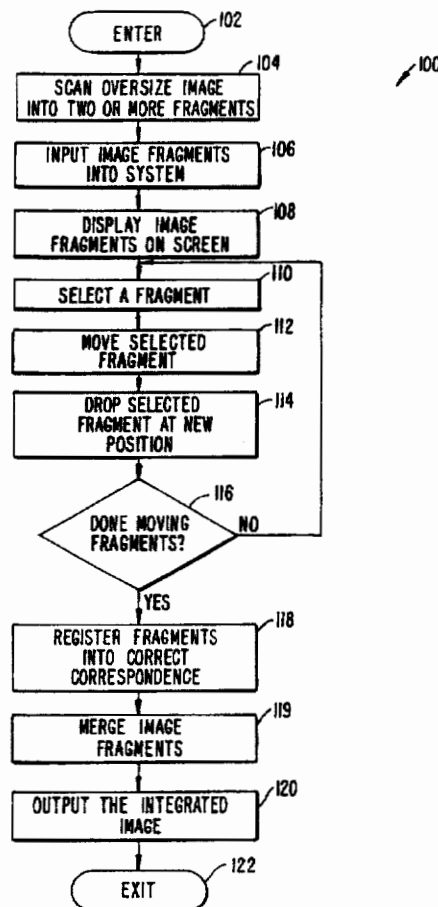
[58] Field of Search ..... 395/155, 157, 395/159, 161, 135, 339, 133, 138; 358/450

### [56] References Cited

#### U.S. PATENT DOCUMENTS

5,022,085 6/1991 Cok ..... 382/1  
5,140,647 8/1992 Ise et al. .... 382/41  
5,185,808 2/1993 Cok ..... 382/1

17 Claims, 10 Drawing Sheets



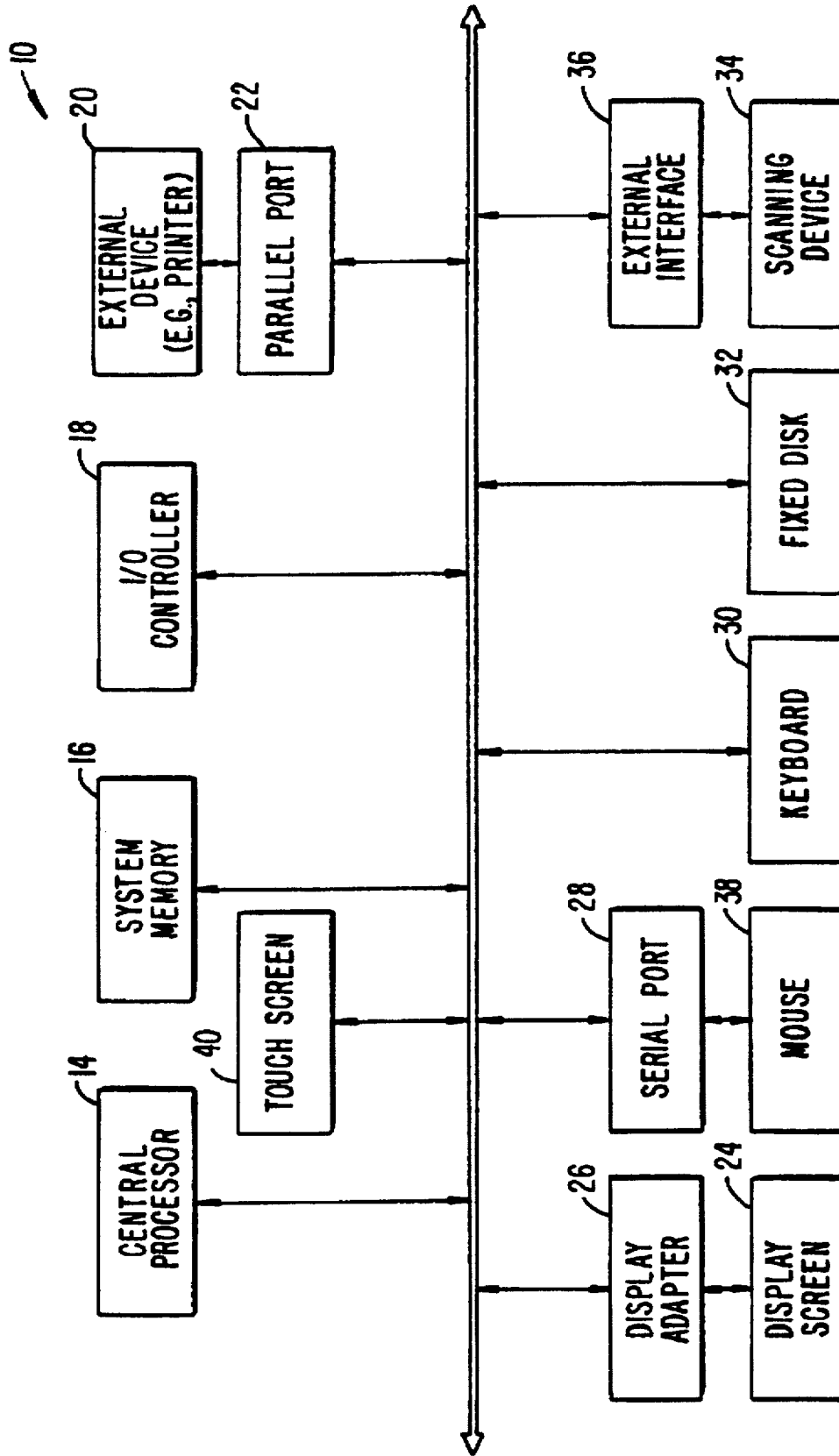


FIG. 1.

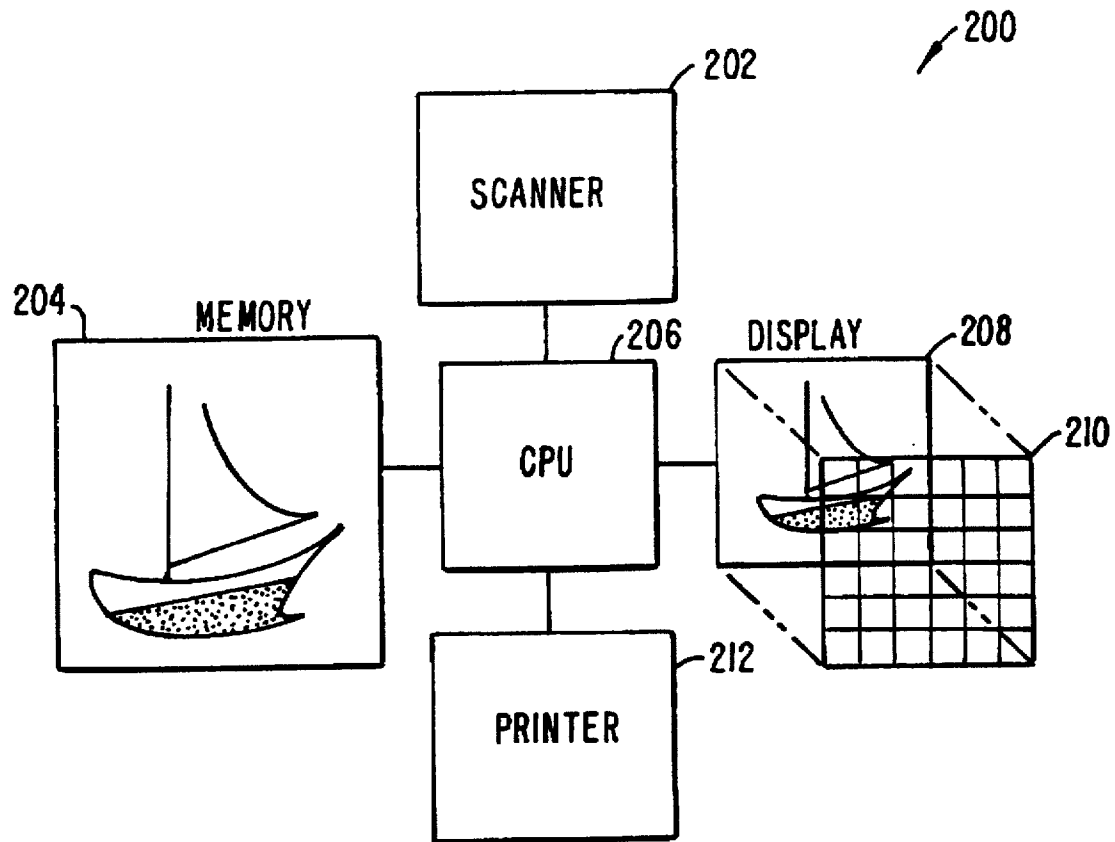


FIG. 2

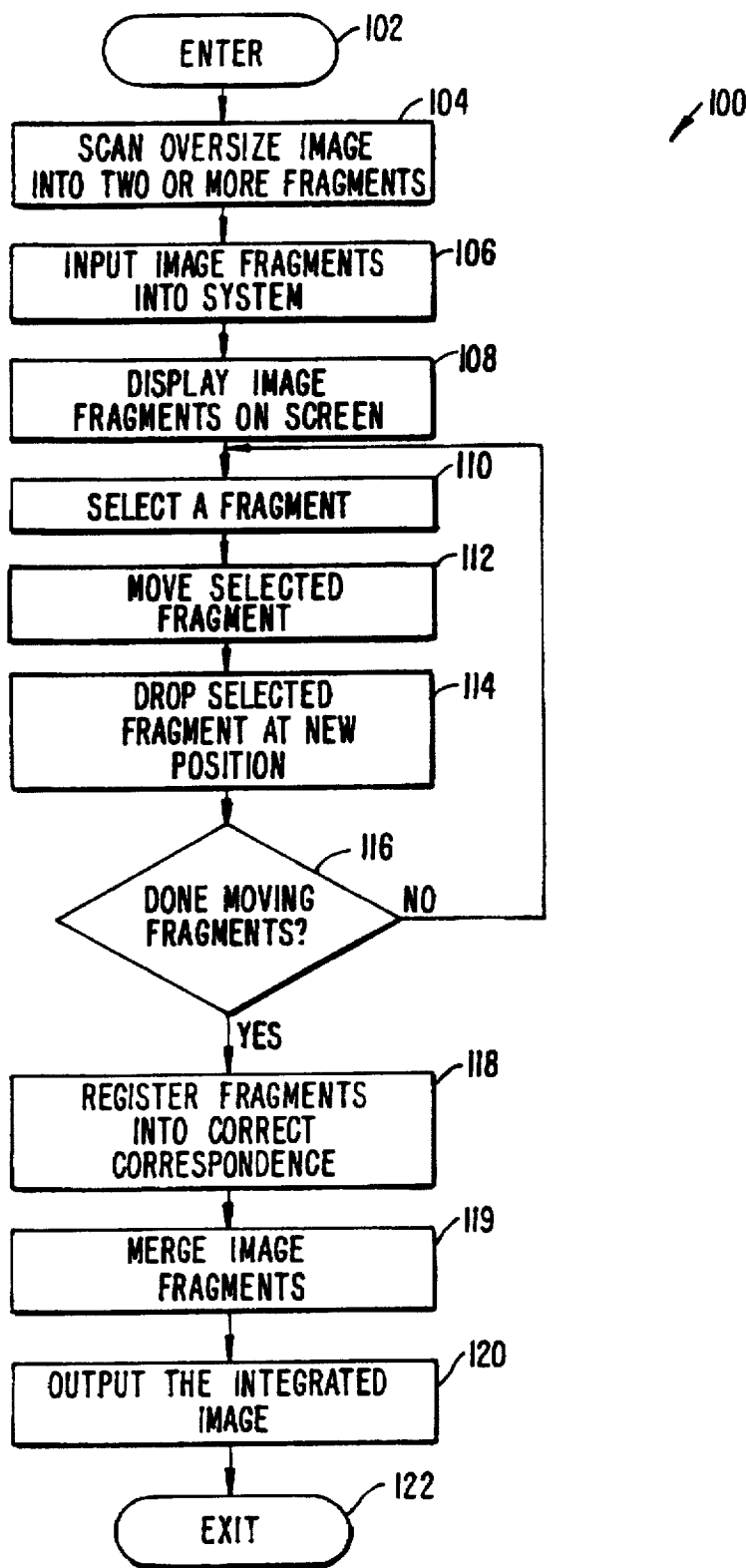


FIG. 3.

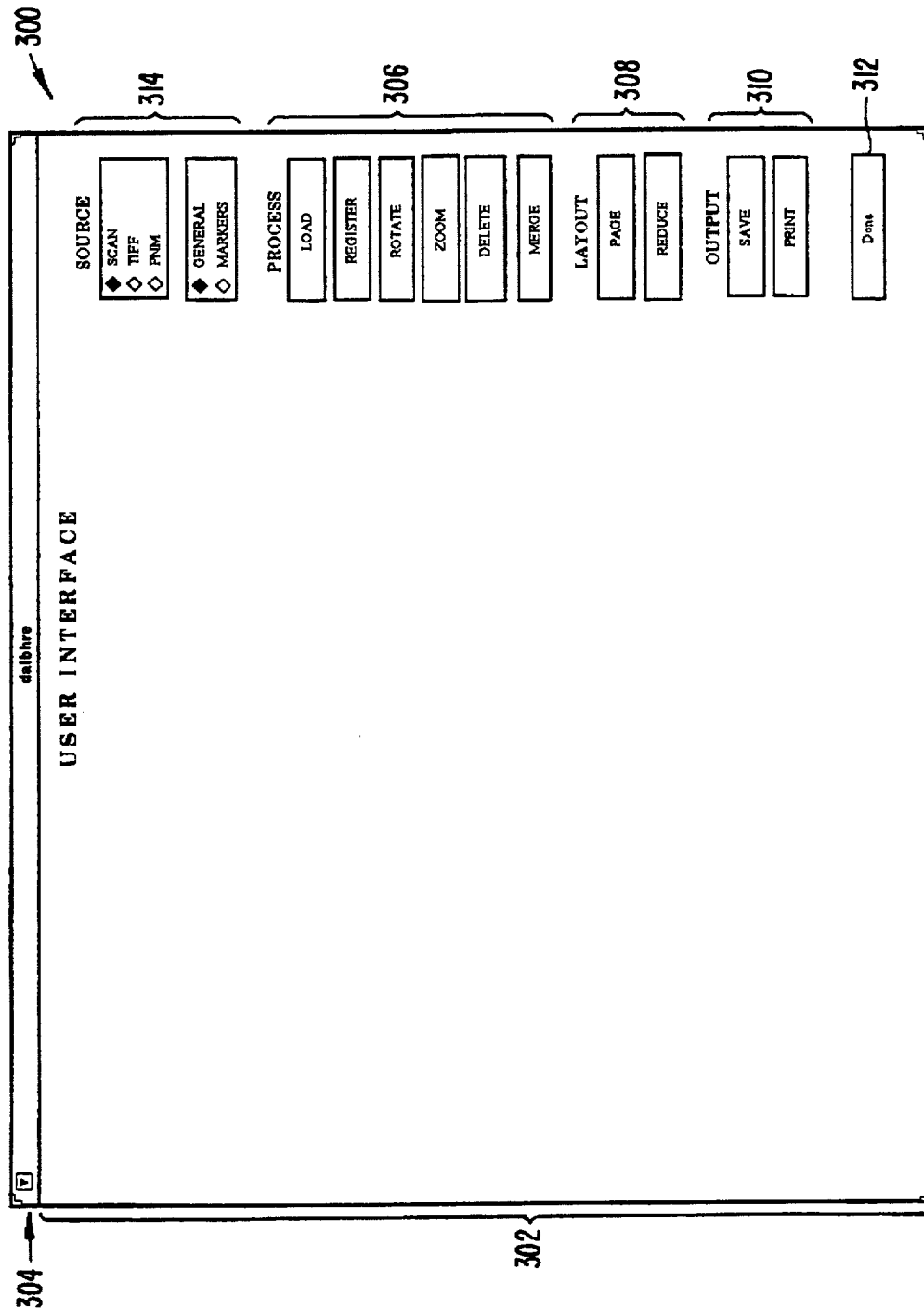


FIG. 4.

# Explore Litigation Insights

Docket Alarm provides insights to develop a more informed litigation strategy and the peace of mind of knowing you're on top of things.

## Real-Time Litigation Alerts



Keep your litigation team up-to-date with **real-time alerts** and advanced team management tools built for the enterprise, all while greatly reducing PACER spend.

Our comprehensive service means we can handle Federal, State, and Administrative courts across the country.

## Advanced Docket Research



With over 230 million records, Docket Alarm's cloud-native docket research platform finds what other services can't. Coverage includes Federal, State, plus PTAB, TTAB, ITC and NLRB decisions, all in one place.

Identify arguments that have been successful in the past with full text, pinpoint searching. Link to case law cited within any court document via Fastcase.

## Analytics At Your Fingertips



Learn what happened the last time a particular judge, opposing counsel or company faced cases similar to yours.

Advanced out-of-the-box PTAB and TTAB analytics are always at your fingertips.

## API

Docket Alarm offers a powerful API (application programming interface) to developers that want to integrate case filings into their apps.

## LAW FIRMS

Build custom dashboards for your attorneys and clients with live data direct from the court.

Automate many repetitive legal tasks like conflict checks, document management, and marketing.

## FINANCIAL INSTITUTIONS

Litigation and bankruptcy checks for companies and debtors.

## E-DISCOVERY AND LEGAL VENDORS

Sync your system to PACER to automate legal marketing.