

# Software Packages Provided by Kawasaki Steel Systems R & D Corporation\*

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## 1 Introduction

Kawasaki Steel Systems R&D Corp. (KSD), an affiliated company of Kawasaki Steel Corp. (KSC), was established on September 1, 1983 as an information service company specializing in software development.

Initially the company carried out system development work for the parent company, but in fiscal 1986 a large number of Systems Division staff were reassigned to the company from KSC Head Office in an effort to strengthen KSD's outside sales activities. This effort was successful, and in particular, by making full use of the technical capabilities nurtured in jobs at the parent company, KSD has won the confidence of customers in its products and services. The company has shown especially strong performance in development work for the financial institutions (banks and securities companies) in the field of large-scale system development, and sales have shown steady growth in the area of universal-use software packages for large-scale systems.

In the field of medium and small system development, KSD has also steadily accumulated a record of sales in projects commissioned by various affiliates of

KSC and by outside medium- and small-enterprises, as well as in the sales of application software packages. In particular, application software packages have sold well in the fields of the welfare facilities management systems, hospital systems, athletic facilities systems, and positive sales activities are continuing.

In the field of scientific and engineering computation, a considerable number of software packages developed for KSC but now packaged as commercial products are being planned for sale.

Software packages are providing users such benefits as shortening of the development time and reduction of development costs. The use rate of software packages in Japan is currently very low at 6% or below, but the predicted growth rate of about 20% per year in the future should bring this close to the U.S. figure of more than 40%. KSD is now rapidly building up the organization necessary to take advantage of this trend in the development and sales of software packages.

The following will review various software packages which are now available from KSD as commercial product.

## 2 Descriptions of Available Software Packages

	Package Name	Outline
General-Purpose Packages	FRIEND (TSO-type FOCUS Utilization Support System)	Easy use of FOCUS (end-user language). Requests are entered and registered under TSO; initiates tabulation jobs, makes schedules for the job execution.
	FRIEND (IMS Online-type FOCUS Utilization Support System)	Easy use of FOCUS and increased efficiency of system resources utilization. Requests are entered and registered as a link of IMS online jobs; initiates tabulation jobs, makes schedules for the job execution.
	BARON (Batch Job Control System for IMS Online)	Executes simple batch jobs (up to a processing time of about 5 min) as a link of IMS online jobs. Initiates batch

\* Originally published in *Kawasaki Steel Giho*, 20(1988)2, pp. 170-171

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General-Purpose Packages		jobs from the IMS online terminal and returns its processed results to the terminal (CRT or printer).
	JOSEX (Job Reservation and Execution Control System)	Executes batch jobs under the guidance of the end-user. Automatically compiles and executes schedules when job execution time and date are registered via IMS online terminal. UP to 15 jobs can be grouped into a single network, and all or designated jobs are executed in serial order.
	FTSS (File Transfer Support System)	Automation of file transfer between computers (intracompany or intercompanies). Automatically transmits data items at specified times after they are registered in transmittal files, improving accuracy of data transfer between offices/companies and reducing operator's workload.
	BMP* <sup>1</sup> -RECOVERY (BMP Job Recovery and Restart Control System)	Automates restarting when a BMP job stops. When the stopped job is restarted, the restart point is automatically set and processing is resumed from the restart point, even without special operations such as JCL.
	DIMS (Data Input Management System)	Unified control of input data entered in online system or punched-card system. When various types of data are entered from various user divisions, the data collection is carried out by the IMS database. When all data is available, the system transfers the entire lot to processing job.
Application Packages	Welfare Facilities Management System	Receives reservation requests for welfare facilities such as resort hotels, recreation halls, playgrounds, tennis courts, etc. from terminals and issues coupons (if necessary, by lot). Also supply data for reservations and for responding inquiries of customers, and compile management data. Generally applicable to process reservation jobs in connection with company recreation facilities, guesthouses, hotels, resort hotels, etc.
	Hospital System	An integrated system for hospital management; processes clerical and accounting jobs related to medical care, such as hospital accounting, preparation of receipts, and patient care management; also performs medical examination jobs and supplies medical information to doctors. Main functions include patient care management, medical treatment accounting, hospital bed management, preparation of statistical management data, medical examination processing, management of medical examination data and supply of medical information.
	Library Management System	Personal-computer based quick processing system for library clerical work including purchase of books, acceptance, lending, retrieval, storage, inventory, and budget management. Since the control of book circulation is processed as a single work flow including even the preparation of lending cards, much faster processing is now possible than with conventional manual ledger control.
	Patent Management System	Manages patent application procedures and information ranging from acceptance of inventions and ideas to expiration of patent rights, as well as retrieval of information on registered patents. Multipurpose retrieval system for accumulated patent information; applicable to outside-the-

	Package Name	Outline
Application Packages		company patent information as well as in-company patent information.
	Athletic Facility System	This system controls the management of athletic facilities such as swimming and tennis schools, gymnasiums, fitness clubs, etc. Permits real-time grasp of information and can cope with all jobs related to athletic facilities management.
	Cafeteria System	Magnetic card system for cafeteria-type food services facilities such as company cafeterias. Handles such tasks as settlement of accounts, disbursements, totaling of sales, and preparation of various control data.
	Health Insurance Association System	Manages data on Health Insurance Association members and their families, including medical treatment records, and all jobs related to benefits such as the management and information retrieval of benefits; carries out preparation and retrieval of statutory books of accounting. Main functions include retrieval of information on individuals, insurance certificate management, preparation of statutory books, insurance-premium calculations, settlement of medical-care claims, processing of various benefits and preparation of various statistical data.
Engineering Computation Packages	MARC-EXPERT (MARC Input Data Preparation Support System)	An expert system of preparation of parameters required by MARC (a software package developed by MARC Analysis Research Corporation for structural heat transfer analysis.) This system has a knowledge base in which sets of combination of information written in MARC manuals and know-how accumulated by system experts are stored, enabling users to use MARC effectively with minimized trial and error.
	Piping Network Flow-rate Analysis Program Using Hardy-Cross Method	When inside diameters and roughness coefficients on the internal surfaces of the pipelines are known, this program generates a flow-rate and loss of head by the Hardy-Cross Method for given flow level so that the sum of loss of head of all the closed circuit becomes zero. Can be used for design and maintenance of area pipeline networks.
	Experimental Regression Analysis Program Using Simulation	In this program, undetermined coefficients are obtained by simulation using an orthogonal table (L36, L108). Given an inherent technical limitation range, the residual sum of squares is statistically minimized. This program is applicable to all fields where curb fitting and regression analysis are necessary.

\*<sup>1</sup>Batch Message Program (Batch Program under IMS)

For further details of the above-mentioned software packages, please contact:

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