

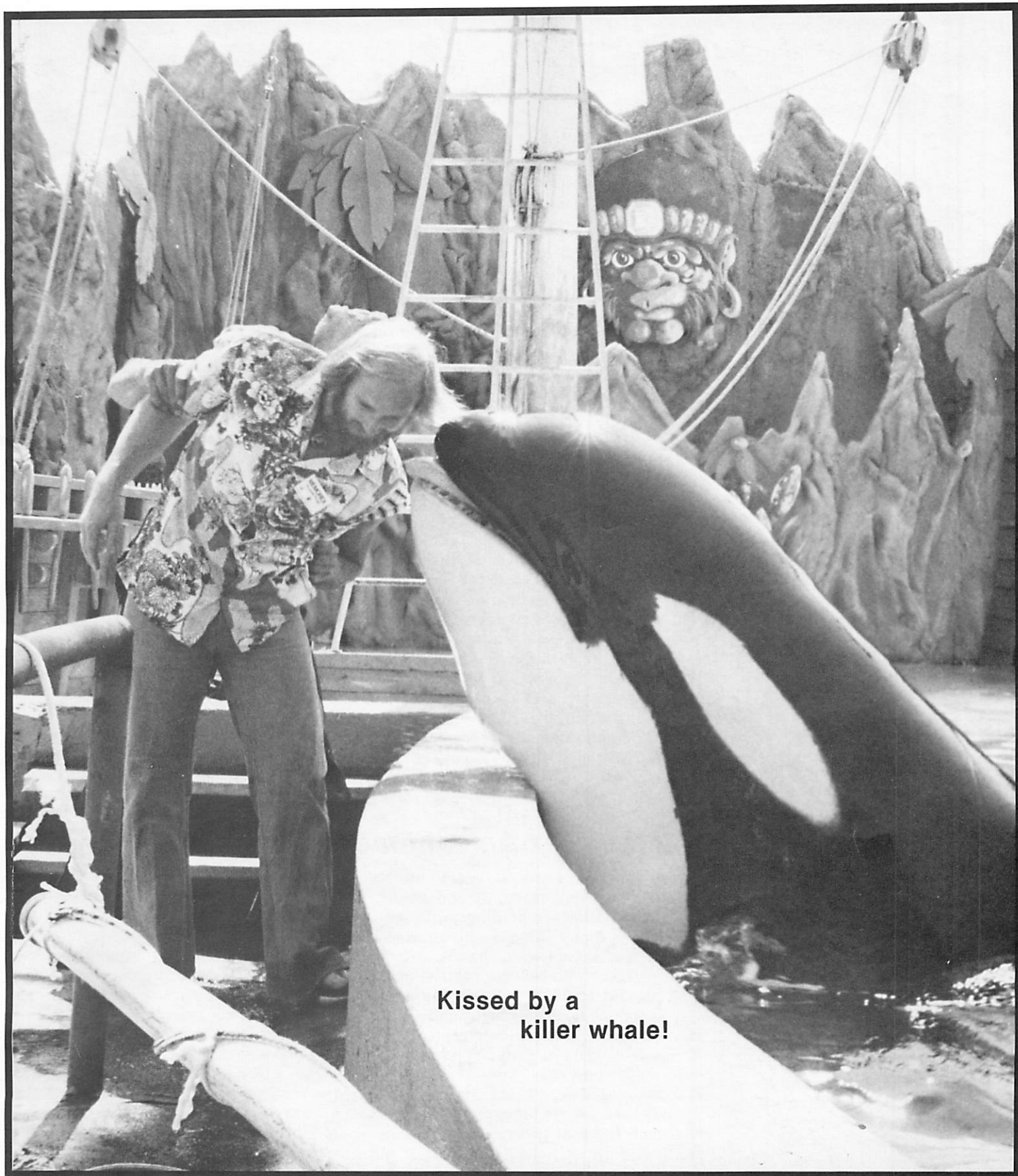
INTERCOM

A newsmagazine for Memorex people everywhere

Volume 16

Number 3

July 1979



Kissed by a
killer whale!



3220 team ships 2,000th tape drive

Employees of Large Storage Systems' 3220 tape drive program, established in 1977, celebrate shipment of their 2,000th tape drive during June 27 party. Managers George Medawar and Jack McInturf thanked the employees for their contributions to the success of the program.



Simpson

King

Simpson, King appointed LSS and CMG presidents

James Simpson has been named president of Memorex's Large Storage Systems Group, and Jack H. King has been named president of its Computer Media Group. Simpson has been president of the Computer Media Group, while King has been general manager of the group's Computer Tape Division.

Simpson continues as a Memorex vice-president and a member of the Corporate Operating Committee, and King becomes a company vice-president and COC member.

"Jim Simpson has provided excellent leadership in a series of increasingly responsible positions," said Chairman Robert C. Wilson in his announcement of the appointments. "He has long experience in both equipment and media." In reference to King, he said, "The Computer Tape Division has performed extremely well under his leadership. Filling both of these key positions from within the company," he said, "confirms the depth and strength of management which Memorex has achieved."

First-half revenue of \$359.2 million reported

Memorex has reported second quarter net income of \$10.6 million before extraordinary credit, a 3% increase over second quarter 1978. Net income per share of \$1.32 was 8% below that for the prior year, primarily because of an increase in the number of common shares outstanding resulting from the public offering in August 1978.

Revenue for the quarter was \$181.3 million or 14% over second quarter 1978 revenue of \$158.5 million.

For the first six months of the year, income before extraordinary credit was \$22.3 million, a 14% increase over the comparable 1978 figure of \$19.6 million. Income per share before extraordinary credit was \$2.79 compared with \$2.74 for the prior year. There was no extraordinary credit in the first half of 1979. However, there was an \$8.2-million, or \$1.30-per-share, extraordinary credit in the first half of 1978.

Revenue for the first six months was \$359.2 million, an increase of 21% over the \$297.4 million reported for the first half of 1978.

On the cover: Pat Thompson finds being kissed by a killer whale "much drier than I expected." The swing-shift supervisor for Corporate Reproduction Services volunteered for the unique experience during the Memorex Annual Picnic at Marine World/Africa USA. For more pictures, see page 6.

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Memorex-Amdahl merger talks announced

Chairman Robert C. Wilson has announced that Memorex and Amdahl Corporation are holding exploratory discussions looking toward a possible merger of the two companies.

"The merger will not become final," he said, "until after a definitive agreement has been negotiated and approved by the boards of directors and shareholders of both companies. This process may take several months. In the meantime, it is essential that all of us keep our eye firmly on the Memorex ball. The year 1979 holds unusual opportunity and challenge—and it will take our best efforts to optimize our

business.

"Our decentralized business teams will continue to function as they have in the past. There will be more than enough opportunity and challenge for all employees. Therefore, each of us should continue to contribute to Memorex to the best of our abilities, and we should encourage our associates to do the same.

"On a long-term basis, I believe that the merger will be beneficial to the employees and shareholders of Memorex. If our analysis supports that view, I will recommend approval of the board of directors and shareholders...."

Super sleuth (SAM) helps engineers solve surface exam mysteries

Memorex engineers facing particularly vexing surface examination problems have a new weapon in their technological arsenal—a Scanning Auger Microprobe (SAM). The new device, purchased in January for nearly a third of a million dollars, brings the latest in surface examination technology to the Materials Development Department of Large Storage Systems Engineering.

Rudy Boynton, LSS staff engineer who works with the device in a special laboratory in building 14 in Santa Clara, says: "Personnel from all groups who need the ultimate in surface analysis for one of their projects have access to the SAM."

Senior Engineer Grant Dodson, the other member of the SAM staff, relates this example of the SAM's super sleuthing. He was brought an aluminum recording disc with unidentified contamination on its surface. A sample was placed in the SAM's vacuum chamber and bombarded with an electron beam probe. Electron collisions caused an "Auger electron" to be emitted. By an examination of the energy of this



In SAM laboratory, Boynton, left, adjusts vacuum chamber, while Dodson uses visual display terminal. System also includes microprocessor, center, and small computer, far right.

electron, the microprobe analyzer determined that the contamination was aluminum oxide from a polishing compound used on the disc. Because aluminum was present in both the disc surface and the contaminant, other examination techniques failed to distinguish between the two.

"The SAM has two basic functions," says Boynton. "It analyzes what elements are present and in what quantities, and it can be used to thoroughly examine approximately two atomic layers of a surface structure. Also, by ion-bombardment techniques, we can peel atomic layers back to examine areas beneath

the surface."

He says technical development in the areas of recording surfaces and heads, such as the emergence of thin-film technologies, makes this degree of sophistication in surface analysis necessary. "It is also a tool which can be applied to improve the quality of existing products."

"I believe the system will prove increasingly valuable to Memorex as more people in the various groups become familiar with it and take maximum advantage of its capabilities."

(Persons needing further details about SAM applications may call 7-0588.)

Daniel, Sordello and Scott honored as first Memorex Fellows

Three key members of Memorex's technical staff have been selected as the first participants in the company's newly established Memorex Fellows program. Recipients of the

prestigious fellowships are: Eric Daniel, manager of Memorex's Magnetic and Chemical Technology Center; Frank Sordello, manager of its Recording Technology Center; and John Scott, president of the company's newly formed subsidiary, the Memorex Mini Disc Drive Co.

Steve Puthuff, Engineering vice-president, said: "This program recognizes industry-wide technology leaders at Memorex and promotes the highest level of excellence throughout the company's technical community. Participation in the program is open to both managerial and non-managerial contributors. It is part of a corporate program to provide dual career path opportunities at Memorex. This allows exceptional technical persons to advance to the highest professional levels in the company."

The three persons were chosen by unanimous vote of the company's Corporate Operating Committee. As Memorex Fellows, they will provide management with advice and information pertaining to the application of advanced technology to Memorex products. As an important part of the program, each Memorex Fellow will receive a \$100,000 grant from Memorex to be used during the final year of the five-year fellowship to pursue individual research projects. As further recognition of their status, Fellows also will receive perquisites similar to those of COC members.



Present at awarding of Memorex Fellow certificates are, from left, Daniel, Puthuff, Sordello, Mr. Wilson and Scott.

News**makers**

Lena Long, Large Storage Systems senior ferrite assembler, received special recognition and was taken to lunch for a suggestion she made which improved a rail-grinding process in her department.

Picking up the tab for lunch was LSS Engineering Manager **Tom Gardner**, who said the suggestion eliminated a malfunction in a machine which was damaging 3650 low mass sliders. Also present at the luncheon were **Ron Kehl**, LSS manager for process development, and **Carol Ledger**, supervisor for the low mass slider area.



Long is congratulated by Gardner as Kehl, left, and Ledger, right, look on.

★ ★ ★

The latest recipients of Memorex Engineering certificates of merit for publishing technical articles are: Head Technology Group Manager **Eric Katz** and Staff Scientist **John Newman**, both with the LSS Recording Technology Center, who co-authored "Thermal Magnetic Properties of Chromium Dioxide Powder" in the March issue of the Institute of Electrical and Electronic Engineers' *Transactions on Magnetics*; and **Sam Karunanithi**, staff engineer with LSS Test Engineering, two awards, for "Some New Types of Logical Completeness" and "Analysis of Digital Systems Using a New Measure of System Diagnosis" in November and February issues of the IEEE's *Transactions on Computers*.

★ ★ ★

Personnel at Memorex's CFI Division in Anaheim are preparing for a fall move into a new 112,000-square-foot building at 1401 E. Orangethorpe Ave. in nearby Fullerton. **Raymond Valle**, division general manager, says the facility is important for the division's near-term growth. "We are emphasizing the expansion of particle-oriented media, the fastest growing segment of the rigid disc market," he says. The division will move out of buildings at 223 Crescent Way and 240 E. Palais St. The remaining building at 305 Crescent will be used for disc coating.

★ ★ ★

Recent graduates receiving bachelor of science degrees in a University of San Francisco program conducted at Memorex are: **George Chaisson**, electronic process support supervisor, and **Bernie Laguna**, technical associate, both with Computer Media's Recording Components Division, and **Donna Smith**, Communications receiving inspector. In addition to credits received for academic work in the classroom, the participants also received college credits for experience gained on the job.

★ ★ ★

Quality Engineer **Rick Gravely** won the first of four drawings in the Recording Components Division's W.O.W. (War on Waste) contest, which is aimed at reducing costs by reducing waste. Participants submit ideas, and, once the idea is accepted, the person's name is entered in drawings for prizes. Gravely suggested that the quality engineering organization qualify vendors before purchase contracts are honored to avoid losses from transactions with vendors whose products are not up to Memorex standards.

He won a seven-inch black and white television. Future prizes for August, September and October drawings are: a three-inch black and white television/radio/cassette player, a color television and a video cassette recorder.

★ ★ ★

Finishing 18th in this year's Memorex Fitness Run, his first race, whetted **Doug Sourbeer's** appetite for competitive distance running. The 29-year-old LSS Final Test swingshift supervisor went on to run in the recent San Francisco Marathon, finishing the 26.2 miles in two hours and 58 minutes.

Mike Paradis, manager for Corporate Benefits Programs, also ran in the San Francisco race, finishing in three hours. Paradis, 41, has been running for two years.

Earlier in the year, **Jack Jones**, also 41, ran in the April 16 Boston Marathon. Jones, general manager for Computer Media's flexible disc product section, finished the 26 miles in three hours and 26 minutes.

★ ★ ★

Memorex Sweden was the winner in a recent EUMEA-wide (Europe, Middle East and Africa Group) inventory reduction contest with a 61-percent reduction. As a result, four members of its customer service staff were awarded a trip to the United States.

Arriving at company headquarters in April as part of their US tour were: **Gösta Ottoson**, warehouseman; **Kjell Kagestedt**, customer service manager; **Mertil Berglund**, media order processor; and **Agneta Olsson**, equipment order processor. One of the persons coordinating their visit was **Rolf Bertler**, Santa Clara-based EUMEA manager for US relations.



From left, Ottoson, Kagestedt, Berglund, Bertler and Olsson chat in Santa Clara Guest Relations Center.

Ten veteran employees celebrate service anniversaries



Eric Daniel—manager, Magnetic and Chemical Technology Center, 15 years



Tad Konar—technical associate, Magnetic and Chemical Technology Center, 15 years



Willie Opp—601 PCB supervisor, General Systems' Disc Drive Division, 15 years



Sandy Polando—customer service order administrator, Computer Tape, 15 years



Edward Sutter—national technical support manager, RCD, 15 years



Bob Finucane—supervisor, disc pack final test and assembly, RCD, 10 years



John Hayes—value engineer, LSS Purchasing, 10 years



Napoleon Littlefield—supervisor, LSS Special Production Operations, 10 years



Leon Pickard—material reclaim, RCD, 10 years



Greg Rodoni—QA Department technician, LSS Final Test, 10 years



Use mail stops!

To avoid delay, says mail room manager Larry Nelson, all employees, customers and vendors should use the addressee's name and mail stop designation on all correspondence. Employees who have moved should fill out an EID (employee information document), so their new mail stops will be recorded. For further information, call: 7-1961.

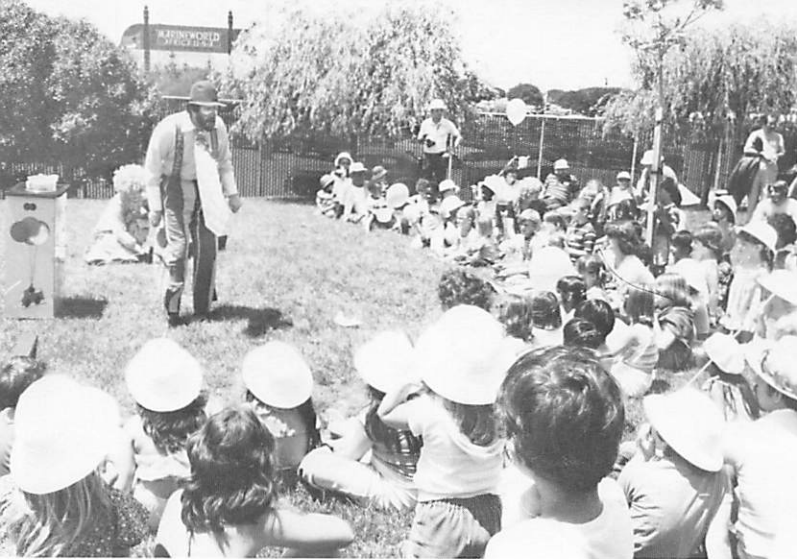
Employee families take part in Fitness Run

Cooler weather and a field of runners expanded to include employee family members resulted in greater participation and faster times during the company's Second Annual Fitness Run. The course was the same, a 3.6-mile run through the campus of West Valley College in Saratoga. This year's event was held on March 31, a month and a half earlier than last year's May 13 run. Some 300 persons participated.

Fitness Run Winners

Winning team and combined time for top five finishers: LSS Manufacturing, 109:25

Female		Male	
Under 13			
C. Cramer	32:28	B. Splaine	24:57
L. Stantora	39:25	C. Spelleri	28:56
J. Wilkie	40:38	G. Pirkil	29:40
13—15			
P. Surmeier	25:31	J. Perrone	22:20
J. Perrone	30:52	K. Byron	23:48
L. Luper	43:40	C. Plant	24:24
16—22			
M. Pyle	30:53	T. Catledge	20:16
K. McGrady	32:45	J. Sandoval	20:16
C. Muller	35:42	D. Castro	21:28
23—29			
A. Howe	26:06	H. Sandoval	21:17
L. Benenato	28:10	K. Drew	21:37
C. Etheredge	32:52	J. Johnson	22:02
30—37			
S. Branning	26:16	D. Branning	21:39
L. Ridley	30:15	M. Meeker	22:30
M. Fratis	38:26	R. Therrell	22:57
38—44			
J. Pifer	31:28	M. Paradis	22:22
J. Ottinger	34:44	D. Barker	23:35
S. Mulcahy	35:24	J. Jones	23:50
Over 44			
M. Herte	33:46	C. Ochoa	23:45
B. Rubly	46:26	R. Selvi	24:43
M. Roessler	59:43	L. Barnes	26:51



6,000 persons attend Memorex Annual Picnic

Clown shows, parrots racing bicycles on a tight wire, elephant rides and a special children's playground were just a few of the many attractions featured at the Memorex Annual Picnic May 19 and 20 at Marine World/Africa USA. More than 6,000 employees and members of their families attended the event, which is sponsored by the Memorex Activities Group.

Barbecued beef sandwiches were served for lunch in a reserved picnic area, where park attendants painted clown faces on children and passed out white safari hats and helium-filled balloons. Performances by the park's two killer whales and a water skiing demonstration were included in each day's activities. Boat tours of the various areas of the park also were available.

New eight-inch rigid disc drive makes its debut

Memorex has announced the first in a planned family of eight-inch rigid disc drives for original equipment manufacturers. The new Model 101 drive provides more than seven times the storage capacity of flexible disc drives, while occupying the same amount of space.

Jay Hemmig and Walt Zemaitis discussed the features of the new disc drive during a recent interview in the offices of Memorex's new Mini Disc Drive Co. The company is located in Santa Clara in building eight at 3214 Scott Boulevard near San Tomas Expressway. John Scott has been named president of the new subsidiary. He reports to A. Keith Plant, General Systems Group President.

Hemmig, one of the company's advanced development project engineers, and Zemaitis, an engineering specialist, said the 101 represents a new generation of advanced Winchester storage technology for small system users.

The result of more than two years of extensive research and development, the mini-disc drive incorporates the same high performance and reliability as Memorex's 317.5-megabyte end-user drive—but in a greatly condensed format. Providing 11.7 megabytes of fixed storage on two discs, the drive weighs 20 pounds and measures 14 by 8.55 by 4.38 inches.

Because the drive provides a number of exclusive features, Memorex has applied for four patents to protect its design.

Company's energy-saving efforts continue

In key speeches delivered this month, President Carter again has urged Americans to do everything possible to save energy. In the wake of this renewed focusing of national attention on energy conservation, Memorex continues its efforts to reduce energy consumption.

Steps the company has taken during the past year have resulted in the estimated savings of the equivalent of 40,000 barrels of oil. If all this oil could be converted to gasoline, it would total more than 1.6 million gallons. These energy saving measures include:

- Cleaning of air within the building at the new Eau Claire, Wis., plant and the recirculating of this already heated or cooled air rather than exhausting it.

- Setting of thermostats at 65 degrees during the heating season and 78 degrees during the air conditioning season.

- Adjusting lighting to provide adequate light for work areas but eliminating excessive lighting in areas such as hallways.

- Turning off some hot water heaters for restrooms.

- Installing a computerized Honeywell Energy Management System for more effective control of heating and air conditioning at the Tape Plant and at the San Tomas complex.

- Involving employees in turning off lights and equipment when not in use and in energy saving suggestion contests.

In another area, the company has received responses from some 500 Santa Clara based employees interested in car pooling. To help them find riders, Memorex matches these persons by census tract or zipcode area (for information, call: 7-3697).

Also, Memorex is participating in the energy saving programs of the Santa Clara County Manufacturing Group. Memorex Chairman Robert C. Wilson serves as chairman of the group, which includes 50 area firms. It has participated in establishing a pilot shuttle bus program from the Southern Pacific line to Stanford Industrial Park. The group also encourages and helps persons interested in sharing rides, and it is working on increasing the number of express buses in the county.

New Corporate QA manager outlines coming activities



Reynolds explains role of quality system guidelines and procedures manual.

Establishment of a quality council, expansion of quality control circles and preparation of corporate quality operating guidelines and procedures are among the first activities planned by Jack Q. Reynolds, Memorex's new Corporate Quality Assurance manager.

Reynolds, who joined the company in June, says he plans to continue work on developing a corporate-wide total quality systems program begun by his predecessor, Ed LaChance. LaChance moved late last year to his present post as Quality Assurance manager for Large Storage Systems.

Discussing his plans for the coming months, Reynolds says, "In working with division QA managers and general managers, I intend to emphasize two areas—where product reliability improvement is involved and where a considerable potential cost reduction is involved."

Near the top of his agenda is the establishment of a quality council made up of Memorex's 16 divisional level QA managers plus himself. His plans are for the council to hold its first meeting this month.

Reynolds is impressed with the successful establishment earlier this year of quality control circles in General Systems' Disc Drive Division.

The new Corporate QA manager says he hopes other divisions will explore the possibility of using these circles in their areas.

He also plans to begin work on defining the 10 elements of his corporate-wide total quality systems program. "These 10 elements will then serve as the bases for Memorex's corporate quality operating guidelines and procedures."

In his new post, Reynolds reports to Corporate Manufacturing Vice-President Walter B. Kurgas, and he is responsible for Corporate QA programs, which are designed to contribute to the profitability and growth of the company.

Reynolds comes to Memorex from Rockwell International's Admiral Group, where his most recent assignment was director of national parts and service operations. Prior to that, he held a variety of management positions, including director of product assurance, director of electronic product marketing, director of product planning and director of program management. Earlier, he was manager of quality and reliability assurance for Collins Radio Divisions, Cedar Rapids, Iowa, and, before that, for Magnavox Company's government and industrial division.

Customer site and installation audits help improve LSS quality program

A new auditing system introduced by Large Storage Systems' Field Product Assurance staff is proving to be an effective means of identifying and resolving field and customer quality problems.

"We've completed about a dozen customer site and installation audits so far," says Field Product Assurance Manager Dick Booth. He explains that the latter concentrates on the quality of the equipment installed and reviews the role of Field Engineering personnel in installing it. The former may include an installation audit, but it focuses primarily on the role of Memorex equipment in the total customer environment.

The audits cover maintenance practices, customer problems and operational applications as well as the development of corrective action plans.

Included in the 12 audits were the first installation of a 3650 Disc Drive with an Intelligent Dual Interface for the Atlanta News in Georgia and a 3675 Disc Drive with IDI for Aerospace Corporation in El Segundo, Calif.

"Sometimes field problems prove to be more imaginary than real," says Booth. "For example, a customer feels Memorex equipment is performing poorer than it is because of poor record keeping.

"In other cases, the problems are real, and our face-to-face contact with field personnel and customers facilitates defining and solving the problems.

"The audits assist in ensuring customer satisfaction—which is our ultimate objective. They also provide a measure of the effectiveness of the LSS total quality systems program.



Booth points out sites where audits were made.

"The program audits product shipment, product installation and the operation of the product at the customer site. It is more sophisticated and more thorough than methods previously used.

"This work is done with the help of several Santa Clara groups, including Systems Engineering, National Field Service Support and the other segments of the LSS Quality Engineering organization."

Tiger symbolizes aggressiveness of 3652 teams

Johan, the internationally known tiger from Marine World/Africa USA, recently paid a visit to Memorex headquarters. The occasion was a symbolic picture-taking session with Johan Willems, manager of Large Storage Systems' Manufacturing Research/Manufacturing Engineering, and members of LSS's 3652 Early Entry and 3652 Development Engineering teams.

The tiger represented the aggressiveness of the employees who succeeded in completing the first customer shipment of the Memorex 3652 Disc Subsystem on June 18—more than six months ahead of schedule. The shipment went to SDL Corporation in the city of Ottawa in Ontario, Canada.

The team members also were special guests of the company's Corporate Operating Committee at its June luncheon meeting, where



Johan Willems holds namesake's chain during photo session.

Engineering Vice-President Steve Puthuff presented each one with Memorex Engineering Excellence Awards.

"These 12 award recipients are representative of a large number of LSS Manufacturing and Engineering personnel whose contributions were a major factor in the 3652 early entry effort," said Puthuff. "With the early entry of the 3652, Memorex achieves the prominent product leadership position for a double-capacity, plug-compatible equivalent of the IBM 3350."

Besides Willems, award recipients included: Bob Parks, HDA (head disc assembly), advanced manufacturing responsibility; Joe Southorn, 3652 Subsystem responsibility; Jerry Sheridan, advanced manufacturing 3652 program administrator; Luke Yam, preproduction test process.

Also, Dennis Moynahan, 3652 development program manager; Syed Iftikar, HDA development; Ben Alaimo,

servo development; Lew Raney, drive integration manager; Bob Dean and Bob Couse, staff electrical engineers, and Nahum Guzik, 3652 recording channel manager.

Besides Puthuff, other COC members present for either or both photo sessions were Chairman Robert C. Wilson and LSS President Marcelo Gumucio. Also present were LSS Engineering Manager Tom Gardner and LSS Disc Storage Manufacturing Manager Stan Mantell.

The new 3652 Subsystem is a dual-spindle, double-capacity version of the company's widely used 317.5-megabyte 3650 drive. It provides users with more than 1.2 gigabytes (billions of bytes) of stored data, while occupying the same space as the 3650.

The 3652 is totally compatible with IBM System/370 Models 158 and 168 and systems 3031, 3032, 3033 and 4341, as well as Amdahl 470 V series and equivalent processors.



Willems makes victory gesture during COC meeting.

S.O.S. program means better spare parts service

Memorex has introduced a special program called S.O.S. (Ship Our Spares), which is aimed at improving spare parts service to company customers.

Corporate Customer Service Manager Rod Rodriguez says the program's objectives are to: make personnel involved with spare parts aware of the importance of their role, optimize spare parts inventories worldwide by having the right parts in the right place at the right time and increase availability of critical spare parts.

"The end result," says Rodriguez, "is better service to customers, reduced down time for Memorex pro-

ducts and better support to the company's Field Engineering organization.

"The program is part of an overall effort originated by a company-wide Spares Management Task Force under the direction of Executive Vice-President James Dobbie. Some 200 persons from the company's Large Storage Systems, Communications, General Systems and Field Operations groups have been involved in the program, which has been coordinated by Corporate Marketing and Manufacturing.

During a recent trip to Santa Clara headquarters, Reto Braun, president for the Europe, Middle East and Africa



From left, Braun discusses S.O.S. program with warehouse coordinator Ernie Harper and Rodriguez.

Group (EUMEA), visited a loading dock in building 14. There he was impressed by personnel involved in the S.O.S. program who were preparing to ship nearly \$100,000 in spare parts to EUMEA.