

THE PURPOSE OF THIS NEWS-LETTER is to share and promote team efforts in working toward ECB Manufacturing's goal of providing 100 percent good parts on time at the lowest possible cost.

ECB MANUFACTURING NEWSLETTER

MAY 1982

UPDATE ON NEW F1 BUILDING

The construction of the new Fl Building is proceeding very well. After receiving the board's approval in February of 1981, our architects—Daniel, Mann, Johnson, and Mendenhall (DMJM)—and our technical consultant—Technical Management Services, Inc. (TMSI)—began work on the design of the site and the building. The building was placed on our 100-acre site taking into consideration the various existing site parameters. Parking for approximately 500 cars (a mix of small and large spaces) was constructed on two parking lots—a large one to the south and a smaller one to the west. A service zone for shipping, receiving, bulk chemical delivery, and other services will be constructed on the north side of the building.

The building is 174,000 square feet with an office area which includes a cafeteria like Y6's; a dry process area which includes drilling, routing, mechanical, imaging, screen fabrication, soldermask, photo tooling, and shipping and receiving; and a plating area which contains all but two of the plating lines, the chiller and/or boiler room, chemical storage, and the control and met lab. A waste treatment facility will be constructed by CHEC Engineering, Inc. on the west side of the building. This facility will process all chemical wastes, and the effluent will be piped to the Unified Sewer Agency treatment plant located to the southwest of our property.

Ground was broken on August 8, 1981, and the site work was started by Ken Leahy Construction, Inc. It was essentially completed by October; and on October 15, 1981, Hoffman Construction Company started construction on the building.

The floor slab was poured first, and the tilt-up wall panels were poured on top of the floor slab. The panels were completed and erected by February 15, 1982. The erection of structural steel and roof deck was complete by the end of March.

Currently the contractor is installing the backbone utility mains, mechnical duct work, interior walls, and roofing. The building shell will be substantially complete on September 1, 1982, less than one year after starting.

The first delivery of equipment is due on May 15. This equipment, the plating lines, will arrive from Germany on three Flying Tiger 747s. Since the installation is so complex and time consuming, the plating area portion of the building was expedited to extend the installation and start-up time.

The construction drawings for the remaining equipment hookup and move-in work which we call "process work" are being completed. The drawings for this work have been released for construction during the first week of this month. Process construction has begun and will continue through December. A landscaping contract will be let during June. Work will be ongoing throughout the summer and will be completed by November.

Move-in and relocation is planned to start in November and continue through December.

David Lintz, Major Project Manager, Corporate Construction

Mike Probstfield-Engineering Manager



Another Oregonian and graduate of The Dalles High School and San Jose State, Mike has been with the USAF (Radar and Missile Auxiliaries), United Airlines (as a serviceman), and the University of California LRL (in the electrical engineering lab designing electronic controls for manufacturing machine and measuring equipment).

His Tek experience began in 1968 as a part of a 3-man design engineering team that developed an NC control. He joined Electrochem as the Production Support Manager which included tooling, engineering, and maintenance. Leaving Electrochem for Component Services in Technical Support, Mike returned to ECBM via the F1 Project in May of 1981. "The F1 Engineering team is committed to the successful integration of high technology equipment and the Krone technician system to meet EMCM goals."

Linda Oeffner-Education and Training Manager



A product of a small farm on Washington's Olympic Peninsula, Linda worked in California for Fairchild in screen printing ceramic substrates and for a small semiconductor plant as a manager of the photolithographic lab.

In 1973 she became a Tek operator and engineering technician in Wafer Fabrication. Interested in better communications with operators, Linda became a Supervisor of Instructors and a Training Specialist for ICs and later for CRT. She joined the Forest Grove team in September 1981. "We have the opportunity and support to become the best informed group of producers in all of Tek."

Ron DeAngelo-Tek Circles Facilitator



A New Yorker who graduated from Pennsylvania State University in Business Administration, Ron began his career with Proctor and Gamble in management and training. He left the East to teach and study at Utah State University. Through Boise Cascade, Ron moved to Oregon to work in operations. Since his move to Oregon, Ron has been and is involved in teaching at Portland Community College and Clackamas Community College in management training.

In 1979 he began with Tek in Purchasing. Two years later he joined Building 38 and the F1 Project as a Tek Circles Facilitator. "My current goals are related to helping the Forest Grove facility be the most productive, efficient, and best place to work in the ECB world."



"We put a rubber stamp on things, and there it stays, often never to be removed."

Kurt Hanks

TRAINING TRAINING TRAINING

THE EUROPEAN EXPERIENCE

Several people in the Forest Grove group will be winging their way to far away places as part of the new equipment training—toWest Germany, Sweden, and possibly Switzerland or Italy. The representatives of the Schmid Company, makers of the strip-and-etch and the etch-and-strip modules and the conveyorized image equipment (scrub, develop, SP stripper), have arranged assembly, operation, and maintenance training at their plant in Freudenstadt, West Germany. This training will begin in mid-summer. The participants will represent the Inner Layer, Outer Layer, and Plating Business Elements.

The Svecia Silkscreen Maskiner Company of Stockholm, supplier of the new screen-making and printing equipment, has scheduled training to take place sometime in July. This trip to Sweden will include familiarization with our equipment and training in electronic maintenance. The trip may also include visits to the screen fabric manufacturers in Switzerland and Italy.

Computer programming and maintenance training will take place in Feucht, West Germany. The lucky individual will spend six weeks during June and July learning about the plating lines' computer system.

Individuals elected to participate in these training programs will possess basic prerequisites of knowledge about the process and/or similar equipment. They will be expected to document the information and teach others in their Business Element what they have learned. These are exciting opportunities that carry with them the responsibility of capturing the knowledge and sharing it with others.

Interview by LO

THE PERSONNEL ROLE

SELF-INSTRUCTION

Tektronix's Education Program, TEP, is currently offering an extensive self-teaching program to all its employees. Courses within this program enable students to work independently at their own rates and at convenient times and places. It allows for short-period interruptions without serious drawbacks.

The courses use specially written books, sound tapes, or video tapes to convey the information. Written responses to questions throughout the printed material are a part of the learning process. Most students are able to complete a course within two or three months.

Courses offered include classes in Electronics, Mathematics, Materials and Processes, Data Processing, Communications, Accounting, Business, Management, Office Skills, and General Development. Self-instruction courses are available to employees at the current TEP costs.

For specific courses, TEP certification, and other questions, you can call Education and Training, Extension 2378, or Tony Perry, Extension 0358.

Tony Perry, Personnel Administrator

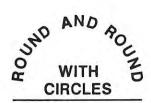


"The very idea that there is another idea is something gained."

Richard Jeffries

TEK CIRCLES







ROUND AND ROUND WITH TEK CIRCLES

PIN POINTS

As a group, our first project was to write process procedurs. They would be a guideline to the circuit board testing fixtures assembler and would be an indication of whether or not he or she is doing the assembling procedures correctly. Our goal is to have these procedures written within three months and ready to be used.

We hope that by using the written procedures we will eliminate the mistakes and lost time caused by the confusion of not knowing the proper procedures. We, also, feel that these procedures will help the training program run smoother. With the help of our Process Technician, we will accomplish our goal very soon.

Leader: Martha Winslow Manager: Bill James the beginnings of better profit share! Please share any feed-back, questions, or ideas with our circle by writing to The Moppet Show, care of Ruben Wysingle, 22-074.

If you work with us and not against us, we might all realize

Leader: Steve Doane Manager: Ruben Wysingle

RUNNING IN CIRCLES

Running in Circles would like to welcome two new members: Al Maldonado and Zeno Idzerda.

In the past we have concentrated our efforts on several shortterm projects. As our first long-term project, we are attempting to reduce the amount of reworks being done by our strip and etch operators for other departments. We are currently in the data gathering stage and are preparing to put our information together for a management presentation.

Leader: Kyle Manjarrez Manager: Eric Pennington

THE MOPPET SHOW

PEOPLE ARE THE KEY! We are the very first Custodial Support Circle at Tektronix and the newest Circle in Building 38.

After brainstorming a list of the problems we encounter in our job, we found that some of the solutions to these problems depend on the cooperation of the personnel in this building. Some of the things we would like you to be aware of are the grafitti on the walls, cigarette butts ground out on the floors, and using the sand urns as garbage receptacles. The time we are spending in these areas is critical time that could be used to service more important areas—such as the clean rooms, the lobby, and the cafeteria.

PERFECTION DETECTION

We are currently working on an on-hold log which when implemented will reduce waste, down time, and confusion. The efficiency and productivity in our department will greatly improve.

At this point we are preparing a management presentation outlining the benefits of this idea. Further information will be forthcoming.

We are looking forward to solving other department problems as being the key to the success of our circle.

Leader: Alan Merkel Manager: Hector DeJesus