The anxiously awaited decision....

....by Wal-Mart, to purchase wireless, spread spectrum, portable computer systems, was made in mid-February. As widely anticipated, the hotly contested bid was won by Telxon.

Since Wal-Mart has bound Telxon and its subcontractors to absolute silence about the size or terms of the contract, the door has been opened to speculation from many sources -- particularly the financial analysts who follow the industry and who recognize the importance of the award.

- Walt Winnitzki (Brown Brothers Harriman) estimated the size of the deal at $25 to $30 million. Winnitzki went on, in his report: "From the perspective of the overall industry, the award illustrates the large potential growth opportunity as retailers move toward implementing the concept of the wireless store."

- Bob Anastasi (Robinson-Humphrey) thinks Wal-Mart may have contracted for 10,000 units [which might bring the total dollar amount to about the same as the Winnitzki estimate -- but no one can tell for sure without unit price information].

In any case, Telxon did what it had to do. An enthusiastic President Ray Meyo told SCAN: "It is one of the largest plums in the business. This was not a 'gimme.' Telxon earned this business with performance."

If Telxon won, and Symbol lost this contract, then why do Symbol executives display such a self-satisfied grin these days when discussing the Wal-Mart negotiations? Winnitzki of Brown Brothers puts it this way: "[Symbol] will receive royalty payments from a licensing agreement it has with Telxon on the sale of any integrated scanning terminals. Symbol's management has indicated that...it makes almost as much through royalty payments from Telxon as opposed to winning the award outright." [Symbol's license agreement with Telxon calls for royalties of 7 1/2% of the total cost of the terminals -- including the scanners, if not supplied by Symbol.]

Which brings up another question. Whose scanning "engines" will Telxon include in the Wal-Mart systems? In the Telxon announcement, only Photographic Sciences was mentioned as the supplier of the laser scanner modules. When we questioned Meyo as to whether PSC will be the exclusive supplier of these
units, he replied somewhat ambiguously: "All units tested in all the stores were PSC and they worked very well. I am not saying that PSC is getting -- or not getting -- the entire contract. We will continue to give Wal-Mart the finest product in the world and that will be whosoever's product continues to be the best."

PSC announced, very modestly: "PSC today reported that it has received orders for its 5300 Series laser scanners from Telxon" -- without even mentioning the name Wal-Mart! A follow-up call to PSC's President Mike Hone elicited the following, carefully worded reply: "I cannot answer whether we will be supplying the scanners for the entire contract. We would like to, and have the capability, but we have not been told."

A bit of gamesmanship all around -- but our congratulations, nevertheless, to Telxon, PSC, Symbol and, especially, to Wal-Mart.

"It's a shame....

....that we had to go through all that misinformation, bad communication and bad feelings these past few weeks, but let's put that on the shelf and go forward."

That statement, by AIM US President Ivan Jeanblanc (DH Technology), made to SCAN on March 6, about the AIM US and AIM Europe controversy, put the best possible face on two months of the most acrimonious, bitter and resentful infighting we have ever witnessed in a trade organization.

The battle had started on January 6, 1992 with a faxed letter from Chet Benoit (Welch Allyn), Chairman of AIM International, to the Board of Directors of AIM Europe (SCAN Feb 92). Benoit unceremoniously, and without consultation or approval of his own Board of Directors, notified AIM Europe that its license to use the AIM designation -- or "mark" -- had been terminated.

The furor this action generated among almost all of the AIM Europe members was heard clear 'round the world and culminated in an overwhelming no-confidence vote for Benoit's leadership by the AIM International members (minus AIM US and Japan).

Attorneys were consulted, endless meetings were held and matters were brought to a boiling point by mid-February. Everyone was looking toward the AIM US meeting (February 26-27 in Charleston, SC) for the showdown.

In preparation for the Charleston meeting, AIM US President Jeanblanc and Board member Jack Kindsvater (Zebra) flew to London to meet on February 20 for two days of talks with AIM Europe's Board and General Secretary (Ian Smith). The participants came to a tentative agreement (signed by all parties) subject to approval by the AIM US Board at its meeting in Charleston. Ian Smith then travelled to Charleston to represent the AIM Europe Board of Directors.

For reasons not entirely clear, on the first day in Charleston, the AIM US Board tinkered with the language agreed to in London. It issued a revised version which Smith rejected on instructions from the AIM Europe Board -- which he had polled by fax and phone. Following late night and early morning meetings, the differences were finally patched up at the eleventh hour the next
day (at 11:45 a.m. to be exact) and the 1:00 p.m. general meeting went forward.

In what has since been dubbed the Ivan and Ian Show, these estimable gentlemen stood before the AIM US members for about two hours and described the plight of AIM Europe; why it was having financial difficulties and had fallen behind in its payment of dues to AIM International; the constructive programs it has managed in the past; and the important agenda it hoped to achieve in the future. All questions were fully answered and AIM Europe seems to have regained the endorsement and support of everyone. The next step was to be a meeting of the AIM International Board scheduled for March 9-10 in Amsterdam.

Finally, as we went to press on March 10, we received word from Amsterdam: "[AIM International] unanimously endorsed the status quo of AIM Europe as a legitimate affiliate of AIM International....A task force was appointed to develop a reorganization plan...[and] will be the governing body." Of the six voting members of this new task force, four were appointed: Jeanblanc and Kindsvater (AIM US); Trevor Dean (AIM Australia); Brian Marcel (AIM Europe).

COMMENT

It has been Kafka-esque. The loss of trust, cooperation and friendship -- not to mention sleep and money -- between the members of AIM US and AIM Europe these past eight weeks was unnecessary, uncalled for and ultimately, unreal.

The final agreements, reached in Charleston and Amsterdam, not only reinstated AIM Europe (and AIM Korea and AIM New Zealand, by the way) but AIM US also actually agreed to provide a "substantial loan" to AIM International for continued market expansion in Europe -- plus the establishment of a $25,000 CEN fund "to advance Europe-wide automatic identification standards." There is still the matter of the reorganization of AIM International to prevent any reoccurrence of this fiasco -- and the determination as to who controls the AIM "mark."

After all is said and done, however, and after all of the problems have been aired and the communications channels cleared, there remains a basic challenge to AIM Europe to get its house in order. The ultimate issue will not be the feelings and sensitivities of the parties involved, but whether AIM Europe can survive as a viable, strong organization with programs that succeed financially as well as aesthetically.

Have we, at SCAN, become over-exercised by all of this? We think not. The Automatic Identification Manufacturers trade organizations throughout the world have become an important and integral part of the growth of this industry. They sponsor SCAN-TECH trade shows, issue standards, provide liaison to user-industries, and overall, represent a unified presence for the vendor community. No individual or narrow group should ever again be allowed to tamper with the integrity of that organization.

In a most welcome initiative....

....a high-level American team of symbology experts visited Europe in February to open a clear communications channel between the AIM US Technical Symbology Committee and the European community's CEN TC225 Bar Code Standards Group. The party included TSC Chairman Sprague Ackley (Intermec); Clive Hohberger (Zebra);
Andy Longacre (Welch Allyn); and Ted Williams (Laserlight Systems).

The Americans were invited as guests to the February 14, 17 and 18 meetings of the TC225 Working Group 2 (Quality); the TC225 Working Group 1 (Symbology); and the AIM Europe Bar Code Committee. The wide range of subjects discussed and decisions reached at these sessions were certainly important.

But the lasting significance of what transpired was the cooperation between the American and European groups. The positive aspects of these meetings, despite the differences that emerged, turned out to be that the opinions were not split by USA vs. Europe divisions, but rather along the lines of different intellectual views. There were no closed minds, which bodes well for the future relationships at the technical level between AIM Europe and AIM US.

We are pleased to report these promising events, particularly in view of the acrimony and divisiveness that surfaced among the officers, directors and bureaucrats of these two groups during these past two months.

The corporate news was plentiful....

....and significant this past month. In alphabetical order:

Last year was a mixed bag for DH Technology (San Diego, CA). Sales were up -- due in part to the acquisitions of Datac PLC and IBI (SCAN Dec 90) -- but earnings were down for the same reason. According to the company's report, in the fourth quarter DHT had increased earnings from its existing businesses, but they were "more than offset [by] the dilutive effect on earnings from the acquisitions."

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<tr>
<th>DH Technology</th>
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<td>1991</td>
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<tr>
<td>Revenues ($000)</td>
<td>$ 46,546</td>
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<td>Earnings ($000)</td>
<td>4,638</td>
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<td>Earnings/share</td>
<td>.93</td>
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It should be noted that net income may have been down, compared to last year, but it was still a healthy 10% of sales.

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A major benchmark was passed by Photographic Sciences (Webster, NY) when its 1991 annual sales exceeded $20 million -- while net profits more than doubled.

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<td>1991</td>
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<tr>
<td>Revenues ($000)</td>
<td>$ 20,170</td>
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<tr>
<td>Earnings ($000)</td>
<td>1,631</td>
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<tr>
<td>Earnings/share</td>
<td>.26</td>
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President Mike Hone will not discuss forecasts of revenues or earnings, but that doesn't stop the analysts. Bob Anastasi of Robinson-Humphrey predicts PSC
annual earnings growth of 30% or more over the next several years. He believes that PSC has already captured 6% to 7% of the hand-held laser scanner market and will expand that portion -- including about $2 million as a result of the Telxon/Wal-Mart contract (see above). PSC shares are now trading at about $11 (approximately 30x Anastasi's 1992 earnings estimate of $.36 per share), which indicates that some people are firm believers in this company's future.

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**Symbol Technologies** (Bohemia, NY) left its dismal 1990 earnings behind and came out roaring in 1991.

**Symbol Technologies**

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<td><strong>1990</strong></td>
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<td>Revenues ($000)</td>
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<td>Earnings ($000)</td>
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<td>Earnings/share</td>
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Analysts estimate that revenues for 1992 will reach $385 million (up 21%) and earnings will be $1.20 to $1.30 per share (up to 35% to 40%).

Symbol announced it will license Norand (Cedar Rapids, IA) to manufacture and sell a one-piece integrated laser scanning terminal under its patents.

On the sales side, Symbol will supply Nordstrom, reportedly the leading fashion specialty retailer (67 stores and growing), with its LRT 3800 Spectrum One Wireless Systems. The size of the contract was not revealed. In Europe, Symbol will provide Metro International, the Swiss-based giant retailer/wholesaler ($30 billion annual revenue), with laser scanners and terminals worth $9.5 million.

Symbol also resolved a shareholder derivative and class action suit, which had challenged the company’s August 1989 sale of stock. Of the total settlement of $11.5 million, Symbol's insurance carrier will pay $7.25 million in cash and the balance, $4.25 million, will be covered through warrants on the company’s stock.

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**Zebra Technologies** (Vernon Hills, IL) has reported its first annual financial results since going public in August (**SCAN Aug 91**).

**Zebra Technologies**

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Zebra has filed suit against RJS (Monrovia, CA) for infringement of its registered trademark and copyrighted software, unfair competition, false advertising and deceptive trade practices. Zebra’s CFO Charles Whitchurch told **SCAN** that his company’s action falls into three parts: 1. RJS has been...
using its trademark, Zebra Programmable Language (ZPL), in its advertising and publicity. 2. RJS has been falsely advertising that its software is fully compatible with ZPL. 3. RJS’s software has the "look and feel of Zebra’s programs" and therefore infringes its copyrights. RJS had no comment.

If getting all of your competitors....

....mad at you is a sign of a winning strategy, then Metrologic has made a successful move.

In a drastic step to increase sales of their Model MS951 hand-held (triggerless) laser scanner, Metrologic announced a 54% price reduction: from $1,087 to $495. According to its prepared statement: "The reason for this unusually large price cut at this time is the convergence of several factors: key component vendor partnering, engineering cost reduction programs, manufacturing efficiencies and reduced costs because of the elimination of the trigger mechanism."

The new price level is less than half the price of competitive hand-held laser scanners with triggers, which has caused Symbol Tech and PSC to sit up and take notice. It also makes the MS951 available at prices that are even below those of some CCD-type scanners -- which has forced Opticon and Welch Allyn to explore ways of meeting this challenge. One vendor of hand-held scanners told SCAN: "Since Metrologic has not been successful in selling this unit against triggered laser scanners, they see their real competition as CCDs."

In an interview with SCAN, Monroe Dorris, Sales Manager for Metrologic, sees it quite differently: "We have been predicting for three or four years that the price of hand-held scanners will come down to under $200 to the end user. Sears paid about $175 for CCDs. Once we withdrew our hand-held triggered laser scanner from the market last year, after we had gained a fair market share, then CCDs came in and took over where we left off. We want that market share back. We have new distributors and resellers and we are putting in new sales people. We are beefing up and we are going for it."

On another front, Metrologic has launched a frontal attack against Symbol Technologies, by suing its arch-rival for patent infringement. In January 1992, Metrologic was issued a patent covering a "Universal Digital Code Processor" that the company believes is being used in several Symbol products. Metrologic is seeking an "immediate injunction against Symbol Technologies from further manufacturing and selling these products...[and] substantial damages."

According to Metrologic's Dorris: "The patent [which was filed in 1986] covers a device which allows plugging in a hand-held scanner -- laser, CCD or light pen -- usually through a wedge, into a fixed position scanner. The Symbol Technologies Omnilink is one example where they are in violation."

Dorris told SCAN that Metrologic also believes that Spectra Physics has a low speed option port on their Freedom Scanner which may be in violation -- although Metrologic has not yet researched this question or notified Spectra Physics. "There are probably others," he maintains, "but our bone to pick right now is Symbol."

Symbol Technologies' public reply is that they do not infringe and that the suit is "totally without merit and Symbol will seek to have it dismissed."
Privately, a Symbol spokesman told SCAN: "Even if we find that we are in violation, it is the kind of thing that is easily avoidable. Within a couple of weeks we can change some software or alter some circuits to avoid the patent claims. We think that all of the other manufacturers could do the same."

The major issue....

....of quality control of UPC symbols on retail packaging is being addressed much more aggressively. We previously reported on the efforts by major retailers (Wal-Mart, Kmart, Ralph's) to hammer home the importance of scannable bar codes by using a sledge hammer. In effect, they have been saying: "If symbols do not scan, be prepared to pay exorbitant fines -- up to $100,000."

Now, we're witnessing a new approach. Two major market research companies, whose services depend on accurate and consistent scanning of the UPC symbols -- both in the stores and at homes -- are now offering verification services.

- A.C. Nielsen (Bannockburn, IL) is marketing their ScanRight UPC evaluation service. According to the company, the ScanRight service tests the UPC codes on new and existing products to make sure the codes comply with UCC guidelines. Product codes are scanned on POS scanners and then on verifiers to check for decodability, reflectance, symbol contrast, modulation, edge contrast and other possible defects.

Nielsen's involvement -- aside from recognizing the possibilities for a profitable new business venture -- stems from their concern about the reliability of their in-home scanning systems (SCAN Oct 91), which depend on the accuracy of their consumer-panelists scanning all of their purchases when they arrive home.

- Information Resources Inc. (IRI), Nielsen's market research competitor, also based in the Chicago area, is now offering customers their Firstpass 97 service -- named for its goal to increase the first pass scan rates to 97%. IRI also has a strong vested interest in accurate first time scans, since their research service depends on tracking product sales through their consumer panels based on front-end scanning in the retail store.

These services, and the retailers' efforts to emphasize quality, are headed in the right direction, but they test the symbols after they have been printed on the packages or labels and after the products have been distributed.

The goal should be to teach the product manufacturers and their printer-contractors pre-production quality control procedures to insure first-time read rates. The manufacturers and printers have gotten into bad habits: They take short cuts; they use what they believe to be the newest technology to reduce symbol costs; and they ignore industry specifications as to size and color. Ultimately, they produce finished products which do not meet UCC/EAN standards.

If we were writing....

....a political column, the headline would read: "What did he know and when did he know it?" Or possibly: "White House denies cover-up of Scangate." But
we'll avoid those cliches -- mostly because they were used by Supermarket News, the trade publication, in their February 24 edition.

It's mighty tough being a Presidential candidate, even if you're President. Last December, Mr. Bush bought a few pair of socks at a J.C. Penney store (that obviously wasn't yet equipped with the latest in bar code scanning technology) in a frustrating attempt -- apparently dreamt up by a top "economist" -- to jump-start the sluggish economy.

Then in early February, the President visited the National Grocer's Association Conference in Orlando, FL and made the mistake of being impressed -- on camera -- with the performance of what was thought to be an ordinary UPC scanner. According to conflicting press reports and the video taken of the incident, the President was shown an NCR point-of-sale scanner, passed a bag of candy over the scanning window, and then pointed to the register, shaking his head in wonder.

The political commentators, cartoonists and late-night comedians loved it. His reaction clearly demonstrated, they thought, that the President was out of touch with ordinary people. After all, what was more ordinary than scanners in the supermarket?

This embarrassing treatment by the press so angered Mr. Bush that the White House released an explanation that the President was actually commenting on the newest scanning technology which NCR was featuring, which resembled symbols that were torn or mutilated-- so-called "scan-stitching."

Our latest "insider information" is that from now on, whenever Barbara Bush goes shopping at her local market, she will take the President along to meet their neighbors and keep up with the latest in scanning scales, coupon scanning, consumer panels, EDI and the Enquirer and Star tabloids.

One added note: At the next Defense Department briefing, it might be a good idea if one of the members of the Joint Chiefs of Staff demonstrated the use of scanning by the military and how extensively the LOGMARS program and systems were used in tracking DOD materiel and weapons in and out of the Persian Gulf. That should really shake up the Commander-in-Chief.

Amplification has been requested....

....about the terms of the pending acquisition of the magazine, Auto ID News Today (owned by AIM Europe) by US-based Automatic ID News (Advanstar Communications) as reported last month (SCAN Feb 92).

Auto ID News publisher Tom Morgan wrote us in order to clarify his previous statement as follows: "Our acquisition of Auto ID Today does not provide us with access to the AIM Europe data base, it only provides us with the ownership of 20,000 names from the subscription files from Auto ID Today. The purchase of Auto ID Today does not make the AIM Europe data base available in any way, shape or form to Automatic ID News."

This is an important point to AIM Europe which plans to retain the confidentiality of its data base.