Systems Contracting at Raritan Supply

One of the original practitioners of systems contracting in our industry, Raritan has shown how this progressive MRO distribution method can reduce customer costs, while providing the wholesaler with a steady, profitable volume.



A foreman at a chemical plant is assigned the job of hooking up two tanks to a pump. To procure the necessary items, he must compose a bill of materials to be submitted to the plant storeroom. There, the bill will be converted to a requisition order and passed along to the purchasing department, where it will be transformed into a purchase order.

Procurement will then begin telephoning several local distributors, in order to compare price and availability on the needed material. Once he has made his selection, the buyer will issue the purchase order to the chosen wholesaler, who will then funnel it through his own administration to generate the necessary paperwork. The order will be picked and packed in his warehouse, and then delivered on the next scheduled truck run to the plant.

The plant's receiving department will accept the material and then pass it along to the storeroom, which in turn will send all the accompanying documents to purchasing for acknowledgement of receipt. In the interim, the distributor's truck driver has returned to his warehouse with proof of delivery papers, which will cue the billing department to release an invoice to the customer. The plant's purchasing department will match the receiving documents with this invoice, along with a copy of the original purchase order, and send it all to accounting for approval and eventual payment.

Meanwhile, the storeroom dispenses the needed material to the foreman so he and his men can finally get to work hooking up that pump.

The above is an idealized description of the prevailing method for handling MRO (maintenance, repair and operation) materials by industrial distributors and their customers. Laundered of all the inevitable breakdowns, delays and miscues, even this tedious scenario may fail to convey what a drag on time, money and manpower conventional MRO distribution often represents. The inescapable fact that MRO materials do not in any way enhance the profitability of an industrial operation further compounds the seriousness of the problem. In many cases, the cost of the paperwork itself equals or exceeds that of the materials purchased

To counter such inefficiency and nonproductivity, a purchasing method known as "systems contracting" was developed in the late '50s by Ernest L. Anderson, while he was purchasing director of Browne & Sharpe, a machine tool manufacturer. The method was first put into practice during Anderson's subsequent tenure in a similar post at the Carborundum Co. An associate at the company, manager of special accounts R. A. Bolton, later authored a text on the method.

As defined by Anderson and Bolton, systems contracting is a method of distribution whereby an industrial customer enters into an agreement with a single wholesaler to supply a large volume of highly repetitive, low cost MRO products (pipe, valves and fittings) directly to the point of actual consumption in the plant. The main attraction of systems contracting is the drastic reduction in the customer's overhead expenses (see box on page 94), through the elimination of receiving and purchasing's involvement in the flow of an MRO order, and the phasing out of on-site inventories. Material is ordered by and shipped directly to the end user (i. e., a pipefitting foreman) at the plant from the wholesaler's warehouse, with no middlemen necessary. Accounting continues to pay the bills, but there is a good deal less paper shuffling from one department to the next, prior to this final stage.

Systems contracting is often confused with the more popular blanket

by John O'Reilly

order agreement, itself an improvement over conventional MRO distribution. But the blanket order runs a distant second to systems contracting in terms of cost savings and efficiency, mainly because it demands a less intimate working relationship between distributor and customer.

For example, under a classic systems contract, the industrial customer literally shuts down his storeroom for everyday PVF material transactions, and permits the wholesaler a more integrated role in his organization. The distributor's warehouse is now his storeroom; the

Systems Contracting vs. **Conventional MRO Distribution** Conventional MRO... User User Accounting Inventory Control **Point Vlaau** House Purchasing Supply House ... Systems Accounting Contracting



distributor's truck, his receiving department; the distributor's administrative people, his procurement staff. With this arrangement, paperflow and material handling is radically curtailed and simplified.

On the other hand, with blanket contracts, the industrial customer still maintains his own inventory, and keeps intact the same material handling and purchasing systems. He may be receiving a very high degree of service, but the liaison with the wholesaler is not nearly so close-knit. Under a systems contract, the wholesaler functions with the customer, instead of selling to him.

Despite the obvious benefits of improved economy and productivity, systems contracting has not made huge inroads into the industrial PVF business since its inception two de-

cades ago. While the concept is probably more at home in the major U.S. piping markets of California, New Jersey and the Gulf Coast, it is difficult to gauge its popuarity a mong PVF wholesalers elsewhere.

One of the first distributors in our industry to become involved with systems contracting and currently one of its more accomplished practitioners, is Raritan Supply Company of Edison,

N.J., located about 30 miles south of Newark. No stranger to the pages of this magazine, president Bill Richardson and his company have been featured on three previous occasions, the last of which was in July 1971. At that time, we were heralding the company's initial entry into systems contracting and the installation of its new IBM 360/20 computer. Using IBM's Wholesale IMPACT inventory control system, Raritan was hoping that the new equipment would help maintain the firm's traditional instock service level of 95%, while also substantially increasing its overall turnover figure.

Today, six and a half years later, quality customer service remains the number one priority of this basically industrial PVF firm, whose 1977 volume totaled \$8 million, more than half of which was contributed by MRO sales. Sales to mechanical contractors and engineering construction accounts contribute the remaining portion.

As described in the accompanying



PHOTO ABOVE: The interior of Raritan's 11,000 sq. ft. pipe shed, set adjacent to company headquarters in Edison, N.J.

PHOTO LEFT: Inside sales manager Bob Cardaneo (standing), with inside şalesman John Zimmerman, who specializes in systems contract work. story on this page, Raritan had a parting of the ways with IBM on January 1, 1977, after nearly 12 years and four generations of various types of IBM equipment. The 360/20 and its successor in 1974, a Systems 3 Model 10-both batch processing operations-have been replaced with a Prophet 21, an on-line computer system packaged by Programmed Control Corporation of Hopewell, N.J. While the new Prophet 21 is not directly involved in Raritan's dayto-day systems contracting business, its on-line capabilities continue to provide the tight and timely inventory control necessary to achieve the 98% service level for this area of operations.

"Theoretically, we could handle a systems contract effectively without a computer—assuming, of course, we had an exceptionally accurate manual inventory control system," remarks vice president, sales Bill Lanahan, who oversees Raritan's systems contracting program. "But with 10,000 authorized stock items and our volume of daily transactions, that's much too big an assumption as far as I am concerned.

"The service demands of MRO business are high enough to begin with," he continues, "and with systems contracting, they are even greater—stock-outs must be avoided at all cost. Under these circumstances, timely and accurate inventory control, which in turn gives rise to more responsive purchasing decisions, is an absolute must for our business."

Raritan presently has seven systems contracts, accounting for just under \$3 million sales annually. All seven are termed "classic" in their makeup by Bill Lanahan; that is, they exhibit all the basic characteristics of a systems contract, as defined by Messrs. Anderson and Bolton. In addition to these seven, there are four other agreements which possess various features contained in the prototype format.

"Not all contracts are the same," Lanahan observes, "and we could not take any one customer's agreement and impose it precisely upon another. In fact, one of the most important lessons we have learned over the past six years is the necessity to tailor each contract to the individual customer's requirements—his particular purchasing policies, safety

standards, union requirements, etc.

"This, of course, requires a great deal of flexibility on our part, which we have been able to achieve through the establishment of a separate paper and material flow for systems contracting, which functions outside our conventional operations. In addition, we have an inside salesman and a truck driver/warehouseman who devote their time and energies exclusively to systems contract work."

The "Classic" System

In a classic systems contract, the end user at the plant has two essential tools. The first is a four-part, color-coded requisition form. The customer may either design his own format, or use one that Raritan has made expressly for this purpose.

The end user also makes frequent use of his specially prepared products catalog, which may or may notdepending upon customer preference-list Raritan's entire authorized stock list. Raritan's on-site data processing capability provides the customer with a wide range of catalog formats from which to choose. Raritan will insert the customer's own stock coding system on whichever items he selects, and the catalog can also display prices or any additional line item data if this is desired. The catalog is produced in the form of a computer printout, so all these variations can be handled simply by pressing a few buttons on the CRT (cathode ray tube) input device.

The procedure for moving material under a classic contract works as follows. In anticipation of his requirements for a future job, the end user at the plant consults his catalog and lists the needed items on his requisition form. Raritan's systems contract driver/warehouseman, Casey Sadlowski, arrives at the plant on a predetermined schedule (sometimes daily, sometimes less frequently) to pick up this order. The installer keeps one part of the form, while Sadlowski returns to the warehouse with the other three.

Once back at Raritan's facility, Casey picks all the merchandise himself from inventory—systems contract orders are rarely handled by the other warehousemen. While systems contract stocks are not segregated in the warehouse from that of other materials, Sadlowski does set aside a small space for himself to

store the picked materials in preparation for shipment.

Meanwhile, Sadlowski's inside sales counterpart, John Zimmerman, is busy processing the paperwork, seeing that the order is priced properly, and then entered into the computer for immediate update of the files. Should there be any back orders, or a request for an item not in Raritan's authorized stock (dubbed a "special"). Sadlowski and Zimmerman, in consultation with inside sales manager Bob Cardaneo, will decide whether or not to purchase the material immediately from a local supplier. If the customer is not in a rush for this special. Raritan can wait to add it to a larger order with one of their regular vendors.

According to schedule, Sadlowski returns to the end user with the order, and the installer will sign all three documents taken previously by Casey. Sadlowski returns to the warehouse with the proof of delivery copy and the end user keeps the other two-one for the plant purchasing department's files and one for accounting. With this single piece of paper, accounting is informed that an authorized installer entered the order and that he received whatever was purchased in the quantities designated. Once they have verified the pricing with their own catalog, accounting can use this single carbon as a bill and send a payment for the material, receiving a discount under the standard industry terms.

"To the accountant, without any matching or collating of documents along the paperwork trail, that single piece of paper represents the fact that an authorized employee entered an order, the material ordered was properly received, and only the negotiated price will be paid," observes Lanahan. "It contains everything the plant accountant requires, and we never even have to send him an invoice. We simply place a 'post only' billing debit on the customer's aged trial balance, and wait for the check to arrive."

Negotiating A Contract

The speed and simplicity of the systems contract procedure is the result of many days' hard work on the part of Raritan and the customer in hammering out an agreement. Negotiations often extend four to five months (Raritan is currently working on one contract now in its 18th

month of preparation) and perhaps a dozen or more meetings with the customer's purchasing, engineering and accounting staff. While Bill Lanahan serves as chief negotiator for the company, before it is all over, he is likely to call in the outside salesman assigned to the account, inside sales manager Cardaneo, data processing director Ray Mutz and warehouse supervisor David Brown for their assistance.

Although each contract is customized to the needs of the individual industrial account, there are certain common characteristics. For example, the duration of a contract can be from one to three years, with an automatic renewal unless written notification of termination is presented by either Raritan or the client, 60 days prior to the expiration date. In general, termination of the contract, for whatever reason, requires 60 days' notice. Price increases must be announced with a written notification 90 days in advance

All prices are negotiated on a cost plus basis, according to the customer's volume, indicated by past usage records and the work required of Raritan (expressed in lines of billing). Knowing its net profit objective, Raritan can then set the percentage markup on various product categories.

Finally, Raritan is normally bound to a "dedicated supply" of certain repetitive items, equal to at least 60 days' normal usage by the customer. Should Raritan find itself faced with a stock-out situation on key merchandise, it must immediately advise the client and then make efforts to obtain the material from alternative sources of supply—at no increased cost to the customer.

Once matters of pricing, delivery frequency, termination of the contract, etc., are resolved, Raritan officials undertake an inspection of the customer's on-site inventories, with the intent of cutting back PVF stock levels to the bare essentials and then moving everything else to the company's own warehouse. Materials in the client's storeroom are compared to Raritan's authorized stock list. If such items are presently inventoried by Raritan, then there's nothing more to do but increase on-hand supply to meet the requirements of the new customer. If such items are not presently inventoried, and if the customer does not wish to substitute with authorized stock items, Raritan will add the new material to its inventory. Such special merchandise typically amounts to only 1% of the 500 to 600 items warehoused for an individual industrial account by Raritan.

"If an extremely unique product is required by the customer, we will negotiate for the insertion of a protective clause into the contract," explains Lanahan, "whereby if the customer fails to purchase a certain volume of this item—usually one annual turn—he agrees to pay an interest charge to compensate us for our handling expenses. Such a clause is rarely, if ever, invoked."

By such a thorough cleaning out of the storeroom, Raritan achieves a tremendous cost savings for the client, according to Lanahan, ridding it of all duplicate and obsolete stocks.

"We do not intend to liquidate the client's storeroom inventories entirely," Lanahan cautions, "but we do hope to trim his investment in onpremises stocks by as much as 80%. This is done in a step-by-step fashion, which eventually leaves the client with a 'break-glass' inventory, to be used in case of emergency only. And because the customer's people just naturally do more advanced planning under a systems contract, such emergencies are far fewer than under a conventional MRO system."

Customer Reservations

Negotiating and setting up a systems contract is a long and arduous task. But selling the legions of skeptical industrial purchasing agents on the seemingly obvious practicality of the idea is apparently an even tougher assignment. Raritan has more than 800 industrial accounts, but only 7 systems contracts. If systems contracting is such a hot number, why is it such a hard sell?

"Well, first of all, the concept isn't totally right for everyone," Lanahan observes. "The customer must have a requirement for a large volume of repetitious, low cost MRO items—a volume on the order of \$75,000 to \$100,000 annually. Generally, a plant with corrosion problems in its pipelines—as is the case with chemical and pharmaceutical people in our market—is ideal for this buying approach. But since not all accounts have such a repetitious buying cycle, we can only approximate the advan-

tages of systems buying with them, using some type of blanket contract.

"Beyond problems of volume and buying cycles, prospective customers frequently dislike being tied to a single distributor for all their PVF needs. While some are prevented by corporate policies from entering into such a large contract, others for various reasons, wish to operate in the most basic manner imaginable, shopping price on every MRO purchase. They fear that allegiance to one wholesaler may someday limit their ability to obtain material or force them to pay higher prices should the industry ever suffer another shortage crisis, such as in 1974."

Actually, the precise opposite happened in 1974, according to Lanahan, with Raritan systems contract clients receiving the best service and the lowest prices by far, as compared to other, conventional accounts.

"Since wholesalers didn't have the material to sell then," Lanahan explains, "distributors like ourselves had to make better margins on whatever merchandise was available, in order to pay for our overhead. But we had definite legal obligations to our systems contract customers—not only to give them first crack at supplies, but also to keep the price of those goods as negotiated.

"If prices did rise, it was done with contract-dictated advance notice. And since we deal on a cost plus basis, such price increases were based solely upon industry-wide increases by manufacturers. We added no new margin for our own bottom line.

"So being tied down to a single supplier proved highly beneficial to many of our customers in 1974."

Another major customer objection to systems contracting is the somewhat higher cost per line item, a margin justified by Raritan's greatly increased service input. According to Bill Lanahan, while a systems contract account is not likely to reduce his purchase costs, he should be able to save more substantial amounts of money on his installed costs. Unfortunately, not all buyers are able to appreciate the distinction.

"There are many industrial purchasing departments which are still evaluated—or at least perceive that they are being evaluated—on the basis of how much less they have paid for material this year than last year," Lanahan says. "They struggle to show they are winning the battle against inflation, and so they make buying decisions based almost entirely upon the lowest line item price.

Perhaps such an outlook is good for the purchasing department come evaluation time," he continues, "but in more progressive companies, procurement is looked at with a much larger, more sophisticated perspective. Such organizations are more concerned with overall costs: the cost of handling, the cost of storage, the cost of paperwork, the cost of not having an item when it is needed, as well as the cost of the material itself. These companies understand that systems contracting truly represents their minimum cost, and that a higher invoice price is not the sole determinant of an industrial customer's expenses."

Guaranteed Business

Customer resistance of this kind, while disheartening at times, has not dampened Raritan management's overall enthusiasm for systems contracting. After all, how can you criticize a guaranteed volume, at an established and fair margin, which accounts for more than 30% of the company's annual sales?

"This steady volume has been very, very important to us over the past three years, with the continued economic stagnation here in the Northeast," admits Bill Richardson. "And while you can never afford the luxury of taking a customer for granted, a superior performance throughout the duration of a systems contract provides us with a very strong momentum into the next one. It's consistent, dependable business that tends to repeat itself—we haven't lost a contract yet as a result of poor service."

Systems contracting also permits Raritan to make a more precise forecast of customer demand, which enables them to fulfill those lofty customer service objectives.

"It is much easier to provide quality service on a systems contract than on either a blanket order or on a conventional purchase order issued on an 'as needed' basis," insists Bill Lanahan. "With the latter types of orders, you realize that, from time to time, you will fail to anticipate the customer's every demand, that you

LINDEN CHLORINE PRODUCTS 1976 Statistics

Total Sales	Total Transactions	Total Lines
\$186,251.00	541	1712
The estimated savings to Linden Chlorine Products on the above volume, using systems contracting:		
Issuing of Purchase Orders to include forms, preparation, mailing etc., using \$25.00 per P.O. issued \$13,525.00		
2. Reduction of inventory to include taxes and insurance Estimate 8% of volume		rance \$14,900.00
3. Expediting—to include letters and phone calls		\$1,850.00
4. Receiving time to include reports		\$1,000.00
5. Pilferage and obsolescence of inventory		\$800.00
normally would be	manufacturer's price increases passed on immediately but di a savings of approximately 10%	ue to ·
7. Systems Contraction pieces of paper,	ng eliminated approximately (5,500

are at the mercy of your vendors, and that you cannot control as tightly the quality of service rendered.

"However, with a systems contract, we know exactly what the customer needs—we can depend upon it, plan around it. We know the material required will be on our shelves in ample supply. And we know that we have the equipment, personnel and administrative setup to move it to the customer in as rapid and direct a manner as possible. Everything is predetermined, functioning with machine-like precision."

While Raritan's program has grown steadily over the past six and a half years, Bill Lanahan concedes that the struggling Northeast economy is not the most favorable climate in which to promote the systems contracting concept.

"The Northeast has not totally revived from the 1974-75 recession," he observes. "New Jersey has an unemployment rate of well over 8%, and industry is moving out of the state faster than it's coming in.

"The remaining businessmen are deeply preoccupied with environmental, labor, tax and general productivity problems. They just don't seem to have the time and the energy to investigate a purchasing system for MRO materials, which is really only a secondary aspect of their operations. It's ironic in these profitpinching and inflationary times, that such a modern, cost-saving program fails to stir widespread interest."

Nonetheless, Lanahan and his sales team have recently managed to persuade a couple of progressive clients in their market of the advantages of systems contracting. These two additional contracts should be finalized in the very near future.

"The economy is a problem," Bill Richardson observes, "but I don't believe the program has in any way matured. There are a good number of industrial accounts out there, particularly those with more than one plant facility, for whom the program would be especially ideal.

"While overall, I think we have a quality setup, I believe we can do even better. And in conjunction with our mill supplies affiliate, Bridge Supply (housed in the same 58,000 sq. ft. building in Edison), the strength of our program's appeal to industrial MRO accounts can only improve."