INSIDE TOOL & DIE

I

At T&D Manufacturing, the procedure to obtain needed tooling is to have the tools designed in house by company tool engineers. When the design is approved, part prints and specifications are mailed to at least three approved outside vendors. The outside shop supplying the best price and delivery date is usually awarded a contract to produce the tool.

T&D also has an internal tool and die department. In the past this department has been used primarily to resharpen and repair the tools that are purchased outside. However, now the head of the department has requested management to allow them to offer a price to produce the tooling internally. This request is approved. Next the department head places a call to the Purchasing Department and asks for the prices obtained from the outside vendors **before** he submits his quote.

Is there anything wrong with the department head making this request?

How should Purchasing respond?

1. Send the department the outside quotes and allow a week to produce their own price.

2. Refuse the request as being unethical.

3. Tell the department head that he will receive the outside prices **after** the job is awarded.

4. Other.

II

[Following 1.]

Outside vendors discover that T&D's Purchasing Department has shared their quotes with T&D's tool and die department head. They complain that T&D has acted in bad faith with outside vendors. Outside vendors are, in effect, providing free advice to T&D -- and they will very likely lose out in the bidding. "At the very least," one of the vendors objects, "you should tell us what your procedure is. Then see how many of us will be interested in providing quotes at all. Why should we invest our time and energy in this only to have you pave the way for your own department to do the business we are seeking? We don't object to your department entering the competition, but only on a level playing field. You have to play fair with us -- otherwise we don't play."

Do the outside vendor's arguments now convince you that selection #1 in I should not be made? If so, return to I and make another selection. If not, explain.

III

[Following 2, 3, and 4.]

The department head is disappointed with the Purchasing Department's refusal to provide quotes of other vendors in advance. But he tries to persuade Purchasing that it is making a mistake: "Look, all in-plant departments are **a part of the company**! They should be working together to make money, stay in business, preserve jobs, and whatever other objectives the company might have. When you treat the inside tool and die shop as you would an outside vendor, you could be putting the company in competition with itself! We can't lose sight of the fact that we should all have the same objectives and goals here at T&D."

Are you convinced by the department head's reasoning? If so, return to I and make a selection consistent with his reasoning. If not, explain.

[Prepared with Roscoe A. Douglas.]

COMMENTARIES

W. Gale Cutler

A modern corporation, particularly one with several manufacturing divisions and internal capabilities to produce parts and tools it needs to manufacture a finished product, is a very complex organization. A major corporation can literally be thought of as a series of individual companies bound together by the management of the corporation. It is healthy in such an organization for internal competition to occur in bidding to make tools, parts, dies, etc. for other portions of the company. In such competitive bidding, honest quotes can only be obtained if internal departments/divisions are treated <u>exactly</u> the same as outside sources also asked to quote.

In Part I of this case, Purchasing should refuse to disclose outside quotes to the internal tool and die department. Disclosure of outside quotes violates the relationship a purchasing department should have with outside vendors and will give the internal tool and die department an unfair advantage. It will be impossible to get a fair and impartial quote from the internal tool and die department if they are provided the quotes from outside vendors. A truly competitive situation will provide the best situation for the company as a whole.

In Part II, the outside vendors have a justifiable complaint when they discover they are competing with an internal tool and die department that has full access to their quotes. With this kind of information available the internal department will undoubtedly deliver a quote low enough to win the job but this in no way assures they will produce the best quality tools and dies for the price. An honestly derived bid from the internal tool and die department is actually a very good check on the accuracy and validity of bids acquired externally.

In Part III, the tool and die department head has a definite misconception when he pleads that the "company should not compete with itself." Internal competition goes on in many major corporations and helps assure that they work effectively and efficiently to produce the best product at the best price. If the tool and die department has the goals and objectives of T&D in mind they will want tools and dies produced by the organization that will do it best, considering quality and price, whether than organization is outside the company or internal to the company.

An internal department, propped by access to privileged information, can actually prove a detriment by "rigging" quotes to get internal business it would not get otherwise. Frequently the internal department will overrun the cost of producing the item on which it has bid and the overrun reduces company profit in final accounting.

Michael Davis

[Michael Davis has modified the case somewhat in order to make it more a problem of engineering ethics than of business or purchasing ethics.]

You have been put on the spot. You are an engineer in Purchasing. The head of your in-house shop has called to ask the prices obtained from outside suppliers bidding on a certain job. He wants those prices to help him prepare his own bid on the same job. What should you do?

Such requests are likely to occur when a company begins to make its "inside supplier" more efficient by forcing it to compete with outside suppliers by making them compete with an insider. Unless a company has been careful to make clear to everyone involved what the point of the new practice is and how it is supposed to work, certain misunderstandings are inevitable. Insiders, for example, are likely to assume that they have an "inside track". Outsiders are likely to worry about that too.

Generally, competition between inside and outside suppliers will benefit the company only if the competition is fair. If the insider has an inside track, outsiders will not take the trouble to bid. Preparing a bid costs money. Would-be suppliers are not likely to spend their money on preparing a bid unless they have a good chance of getting the contract. Once it is clear that inside suppliers have the inside track, an outside supplier has only two options, to charge for preparing its bid or to decline to bid. The company will then have to pay the cost of the outside bid or see the outside competition disappear. Doing a favor for the shop head has a large hidden cost.

The head of the shop probably did not think of things this way. He probably thought of the situation as "us against them", where "us" is the company and "them" is the outsiders. It is "us" against "them". But "us" is only his shop. The rest of the company is the umpire. The old friendships, the hello in the hall, the same centrex, none of that matters anymore. You and the shop are no longer on the same team. The company has ceased to exist as a competitive unit. While every part has the same objective in one respect, maximizing return on investment for the owners, each part has a different objective in another. Each seeks to maximize return on what has been invested in it, whatever the effect on other parts of the company. The owners are supposed to benefit overall, even if some parts of the company suffer as a result. This is a coherent strategy. Whether it will work in a particular company is, of course, another matter.

What then should you do? Probably the best thing would be to suggest a meeting of appropriate department heads to discuss bidding procedures. That would get you off the hook for now. It would allow the issue to be aired in a relatively friendly environment. And it would probably help everyone to understand better what the rules really are (or should be).

One should certainly not begin with the assumption that the shop head is trying to obtain an unfair advantage. If, however, he declines to discuss his request with other department heads, you will have reason to believe that he knows he is doing something shady. You can then tell him to put his request in writing and you'll clear it with your boss. That should be the last you hear of it. You should probably also mention the incident to your superior, accompanying it with the suggestion that there may be a need for further training in Purchasing and elsewhere on the new relationship between department.

John B. Dilworth

Is there in general anything ethically unfair about an internal unit of a company receiving information from other units of the same company, which information is not made available to outsiders? Put in this general form, surely our answer has to be no. A business, and particularly a private business with no legal public disclosure requirements, is free to organize itself internally and move information around in any (legal) way it sees fit. Equally, it can relate externally to people or other businesses in any legally sanctioned way.

Secrecy in business is valuable, in that it is a prime factor in achieving a competitive edge in a company's dealings with others, and hence in improving the overall competitive health of an economy. But most kinds of 'external' secrecy would be a severe handicap to companies if they had to be practiced internally, and so would work against the interests of a capitalist society. Thus any ethical theory which generally supports capitalism is unlikely to defend internal secrecy requirements, whether in the name of fairness or for other reasons. If there were exceptions, they would have to be individually argued for.

So in the present case, the burden of proof is on those who would claim that there is something ethically unfair about an internal unit receiving information (about competitive bids) not available to outsiders.

Here's a more specific reason for thinking that internal sharing of information is morally legitimate in the present case. Suppose the situation were somewhat different at T&D Manufacturing, as follows. T&D has been internally producing the tools in question, with no outside help, but now would like to check whether it would be cheaper to 'outsource' the production, i.e., get external companies to produce the tools. So they request competitive bids from outsiders. In this case, the internal T&D tool and die department is central to current production and centrally involved in the new inquiries about relative costs for outsourcing, so it would be ridiculous to suggest that they should not be fully informed about the external bids received.

This example suggests that the initial case seemed unfair because the internal department was not initially involved. Thus it might have appeared to belong in a group with the external companies which are also not directly involved in business decisions of T&D. However, as the example shows, the involvement or non-involvement of any internal unit can easily be changed by circumstance or company policy. Since these matters are so variable, they cannot justify situation-independent judgements about the unfairness of the relevant kind of information-sharing.

If we accept that ethics does not require internal business secrecy, there might nevertheless be sound business reasons for restricting internal information-sharing in some cases. For example, it might be that as a matter of fact the most accurate method of estimating actual costs of production involves restriction of information about the costs of competitors. If so, business self-interest rather than ethics would dictate a 'sealed bid' approach.

Another example is provided in the case itself. If outside vendors are unhappy with a bidding situation in which an internal unit has an advantage, and if this affects their willingness to bid, then again prudent T&D officials might consider internal restriction of information so as to keep their suppliers happy. But here again it is the interests of their own company, rather than ethics, which is at work in their thinking.

C.E. Harris

The first issue in this case is one of fairness. The internal tool and die department at T&D Manufacturing has asked for information about the outside bids before their own quote is submitted. This gives them an obvious advantage over the other vendors. There can be little serious question that this practice would be unfair to the outside vendors. This practice must be kept secret, or many of the other vendors will probably not bid on the project.

The question is whether this unfairness and deception is justified by the loyalty which Purchasing might be expected to show to the "home team." Thus the fundamental moral issue is a conflict between the obligations of fairness and truthfulness on the one hand and loyalty to one's own company on the other. There is no question but that both obligations have validity. The question is what should be done when they conflict.

Sometimes the appeal to loyalty is justified. The appeal to loyalty is often understood as justifying an obligation to something (call it X) simply because it is our X. Now we do have special obligations to our parents or our children because they are our parents or our children. But there are limits to the appeal to loyalty. While the appeal to loyalty may justify providing for our child's college education rather than our neighbor's child's education, simply because he is our child, it would not justify helping our child to cheat on tests, simply because he is our child.

One way to see the limits of the appeal to loyalty is to consider the implications of the principle of universalization, which holds that a to be morally permissible, an action must be one capable of being performed by everyone. One of the versions of this principle is the Golden Rule. We can ask whether we would be willing for the internal tool and die department to give our bid to Purchasing if we were one of the vendors. Using still another version of the principle of universalization, we could ask whether it would benefit people generally if supposedly secret bids were revealed to inside bidders. For example, would such a practice promote the tendency of the capitalist system to provide the best goods at the cheapest price? It is obvious that it would be difficult to justify the violation of the canons of fairness and truthfulness by either version of the principle of universalization.

The conflict of obligation in this case could be dealt with by modifying one or both of the obligations by means of a compromise. For example, the inside tool and die department could be allowed to compete on the same basis as outside vendors. This would partially satisfy the demands of the internal department without being unfair to outside vendors. Or, the inside tool and die department could be informed of the amount of the outside bids, and the outside vendors could be told about the practice.

Carl O. Hilgarth

I

Now that T&D's internal tool and die department can bid on new tooling by offering a price to produce it internally, they will have to abide by the procedures established by the Purchasing Department so the integrity of the bidding and contract award process is not compromised. They should be placed on the approved bidder list, receive a copy of the approved tooling part prints and specifications, and the sealed bid envelope in which to respond with their quote. The department head of the internal tool and die is totally out of order when he asks the Purchasing Department for the prices obtained from the outside vendors before he submits his quote. With this inside information, he can become the low bidder.

Purchasing should refuse the internal tool and die department request as unethical--give him a set of the prints and specifications, the sealed bid envelope, the bid closing date, and tell him to submit quote. After contact award, he can review the source selection evaluations and bids in the same manner as the other bidders.

II

Well, T&D's Purchasing Department shares the quotes with T&D's tool and die department head. T&D's outside vendors complain that T&D has acted in bad faith. They're right! By being able to see the competing bids, the tool and die department head had inside information. If I was an outside supplier to T&D Manufacturing, I would decline to bid any of the jobs under these ground rules.

III

The logic of the tool and die department head in trying to persuade the Purchasing Department that it is making a mistake in not providing him the quotes of the other vendors in advance is ludicrous. If he thinks he can be competitive with the outside vendors, let him submit a bid like everyone else.

An interesting point here is the bid rate that internal tool and die uses in preparing their quotations. If their direct labor rate and material costs are not properly burdened, they'll use only the base rates and inherently underbid anyone. Management should have the cost accounting department prepare appropriate burdens for the internal tool and die to apply to their base labor rates and material costs so their bids are truly competitive with those of the outside vendors. If this is not done, the outside vendors will have another complaint in that T&D is only obtaining proforma outside bids and awarding the contract to internal tool and die on the basis of unrealistically low pricing.

Neil R. Luebke

This case describes a situation which, in one form or another, is familiar to many purchasing managers. The engineer most likely to be involved would be the person who would head the internal tool and die department. In the past there was no possibility of T&D Manufacturing competing with outside vendors in meeting its tool supply needs. The company maintained only a tool maintenance unit rather than a manufacturing unit. We do not know why T&D Manufacturing changed company practice to authorize the tool and die department to go into supply as well. Possibly the company thought there could be a saving on the cost of tools or in maintenance costs. Perhaps the head of the tool and die department is a very ambitious person who wants to build up that part of the company and was successful in getting upper management to go along.

Different practices exist among companies regarding the treatment of in-house suppliers of goods or services. In some cases, for instance, a company may see its own in-house supplier as being the supplier of first choice, and only if that supplier cannot take care of the need or can take care of the need only at a cost exceeding the open market would a call for outside bids go forth. In some cases heads of other departments in the company might be able to get an estimate from the in-house supply unit before checking informally on the price range for external supply. In the case before us, T&D Manufacturing seems to have kept a rather formal approach to the matter of tooling supply. Specifications are sent to at least three approved outside vendors, and confidential bids are received by the purchasing department. We are led to think that the in-house supply unit operates by these same rules, so it would use its own set of specifications and submit a price. Such an arrangement puts the in-house tool and die department in direct competition with the outside vendors. For the purchasing department to forward to the tool and die department the outside quotes and allow it a week to produce its own price and delivery date would certainly give the in-house supplier a competitive edge. The outside vendors justifiably would conclude that the competition is not fair. Outside vendors would be understandably reluctant to offer bids in the future on similar tooling requests if they thought it unlikely that their bids would have a fair chance. As a result, T&D Manufacturing may lose the services of some outside vendors who otherwise would do a quality job. There might also be legal problems.

Let us suppose the purchasing department head tells the internal tool and die department head that he cannot give him the outside quotes before receiving his own internal bid but that he will let him know the outside quotes after the job is awarded. If T&D Manufacturing were a public institution, such as a university, legally required to maintain publicly accessible records for its financial dealings, all bids would eventually become public and accessible not only to a unit within the institution but also to the outside vendors. In the case of a private organization, which would include a private university, it is a matter of policy whether to release information on the unsuccessful bidders. Perhaps the company policy would permit the purchasing head to inform the tool and die supply department head after the contract has been awarded. Perhaps it would be more limiting. In any event, the company policy should be communicated to the outside vendors so that, in making their bids, they know what will happen to the quotes after a contract decision is made. Bidders on jobs at public institutions know that their quotes are going to be publicly accessible. What happens to this information may affect their decisions to submit a price quotation.

Two additional comments are in order having to do with the topic of marketplace competition. First, consider the tool and die department head's reactions in being denied information about the quotes by the vendors. He claims that failing to give him the quotes would be putting the company in competition with itself. This is a questionable interpretation of the situation. If the company were not from the beginning convinced that better quality at a lower price could be obtained through competition among vendors, its policy of asking for bids from various vendors would not seem to be justified at all. It is doing the company no harm if it obtains a part from an outside vendor at a lesser cost than it could produce the part itself. If there is a net saving, it is a new saving that benefits the company as a whole. At the same time, however, it is not the case that every unit in a company has precisely the same goals and objectives. For instance, the production unit in a manufacturing company may regard its objective to be maximizing its productive capability, whereas a warehousing and distribution unit may see its job as moving goods into the market as rapidly as possible without excessive use of warehouse space. A market downturn is likely to result in an inventory backup with lessened distribution. It would then be counterproductive for production to strive for maximum levels. The overall interests and objectives of the company, therefore, require that production slow down for a period. In a similar way it may not be beneficial for a company always to give its own supply unit the advantage in competition with outside vendors.

The second point concerns a much larger question of values. It is the question of whether marketplace competition is always beneficial. While this question can be raised in a number of contexts, within the last couple of decades it has come up with regard to certain professions in the United States. Traditionally, physicians, lawyers, engineers, and architects have been opposed to the public advertising of prices for their services or being involved in competitive bidding for their services. Many felt that the practice reduced professional activity to crass materialism. Some claimed that the decision to employ a professional ought to be made more on the professional's record of quality than on considerations of price. Earlier versions of the professional codes for the American Institute of Architects, the National Society of Professional Engineers, and the American Society of Civil Engineers contained sections which prohibited persons in those professions from engaging in competitive bidding for professional services. The United States Department of Justice charged these societies with being in violation of the Sherman Antitrust Act's prohibition against unreasonable restraint of trade insofar as they had forbidden their members to engage in competitive bidding. The ASCE and AIA both signed consent decrees whereby they changed their policies and professional codes to permit the possibility of members engaging in competitive bidding. The National Society of Professional Engineers, however, fought the matter through the courts. Finally, in 1978, the Supreme Court of the United States issued its decision against the NSPE and ordered the Society to revise its professional code, manuals, and other literature which had forbidden or discouraged competitive bidding. The NSPE had argued before the Court that there are some situations in which competition is not for the public good and had claimed that engineering design was one of these situations. Among other things, the NSPE argued that to put design services on a competitive basis would give an impetus toward mediocrity and toward lessened ingenuity and creativity in design work. A firm could more cheaply do design work if it used stock approaches to situations and problems rather than if it attempted to address its clients' needs in more creative and possibly beneficial ways. The Supreme Court did not reject this argument *per se*; however, the Court considered it irrelevant to the decision in the case. According to the Supreme Court, Congress, in passing the Sherman Antitrust Act in 1890 and in subsequent legislation, had already decided that a policy of open competition in the marketplace was the beneficial policy for the country. In the Court's view, as long as Congress did not overstep its constitutional bounds, the Court had no authority to challenge Congress' conclusion on this matter.

Michael Rabins

Before getting too carried away about justice, fairness and "level playing fields" it is helpful to recognize some basic facts about the situation surrounding this Tool and Die case. First and foremost, Tool and Die is a for-profit company with several clear missions: it must deliver a profit to its owners or stockholders, it must justify the salaries it pays to its employees and mangers, it must deliver a competitive quality product and it must maintain professional standards in all of its operations. It is not in business just to support the outside vendors, although it clearly must maintain productive symbiotic relationships with those vendors.

If the internal tool and die department at T&D can produce the tooling designed by T&D at a price competitive with the cost of using outside vendors, then it would be foolish for T&D not to take advantage of that opportunity to save money. The question is how to do that while being fair enough to maintain continued open channels of communications with the outside vendors which will probably continue to be needed at some level.

Now, before we can consider the questions raised in version I of this case, it would seem appropriate to consider a different kind of competitive bidding than what has been used prior to T&D's internal tool and die department getting into the act. Previously, each outside vendor was undoubtedly asked for a single dollar price bid on each request for proposals. This dollar value is not really directly comparable to what the internal tool and die department will be bidding. The outside vendors' bids will include all direct costs, indirect costs (like heat, electricity, cleaning services, etc) and profit. The inside department bids will include just the first two items. That is what must be somehow compared. The equivalent of profit on the internal department bids is the moneys made available to the internal department (or others) for bonuses, other rewards for productivity and growth (i.e., profit reinvested in expansion or increased stock dividends).

To compare internal and external direct and indirect costs it would seem appropriate to prepare a new bidding format that indeed levels the playing field. Further it would not be appropriate to share the external bids with the internal department until all of the bids are in. Only then are all the T&D players acting as faithful agents and trustees of the T&D company. The appearance of fairness must be maintained in order to keep the vendors bidding. Any suspicion of bid rigging by the internal tool and die department must be avoided.

According to this analysis of the situation the response here to the 4 questions in part I of the case would be a combination of 3 and 4. In response to part II of the case, the analysis surely would support not using selection #1 in part I. If fair comparisons are not made between internal and external vendors in this case, there is also the danger of doing damage to the morale in other departments at T&D. Other department heads could argue that with rigged bidding, the internal tool and tie department has an unfair advantage over other T&D departments in showing increased productivity and looking good to upper management.

Regarding the internal tool and die department head's reasoning in part III of the case, it certainly sounds convincing and it is obviously true that all the departments must work together to maximize company profit. But that does not mean that purchasing should be a party to drying up the availability to T&D of outside vendors when they are needed. By sharing each set of bids with the internal tool and die department head <u>after</u> that bid is awarded, the opportunity is obviously provided for the internal department to be more competitive the next time around if it has not won the previous bidding competition.

The internal tool and die department head can certainly learn from comparing his previous losing bid to the winning external vendor's bid just exactly how his department can be more economical in determining future bids. This will eventually translate into increased profit for T&D in the long run and also maintain good relations with the outside vendors for as long as they are needed.

The key for this process to work is a carefully spelled out bidding procedure that allows apples to be compared with apples and clearly identifies the cost of labor, materials, direct overhead and indirect overhead. The last item is the most difficult to pin down equitably and accurately. Also, isn't the new procedure intended to gauge whether vendor's estimates are fair? If internal department doesn't blind bid, they will tend to try to always undercut bid and perhaps submit unrealistic estimate.

The federal government has a long standing discussion going on with industry and academia regarding this indirect overhead determination. In fact the subject has recently been front page news in regard to Stanford University and the resignation of the University President over audited misuse of the indirect overhead moneys paid Stanford by the federal government. This fact is mentioned only to indicate that T&D will have its work cut out to develop a fair and accurate comparison between internal and external vendors.