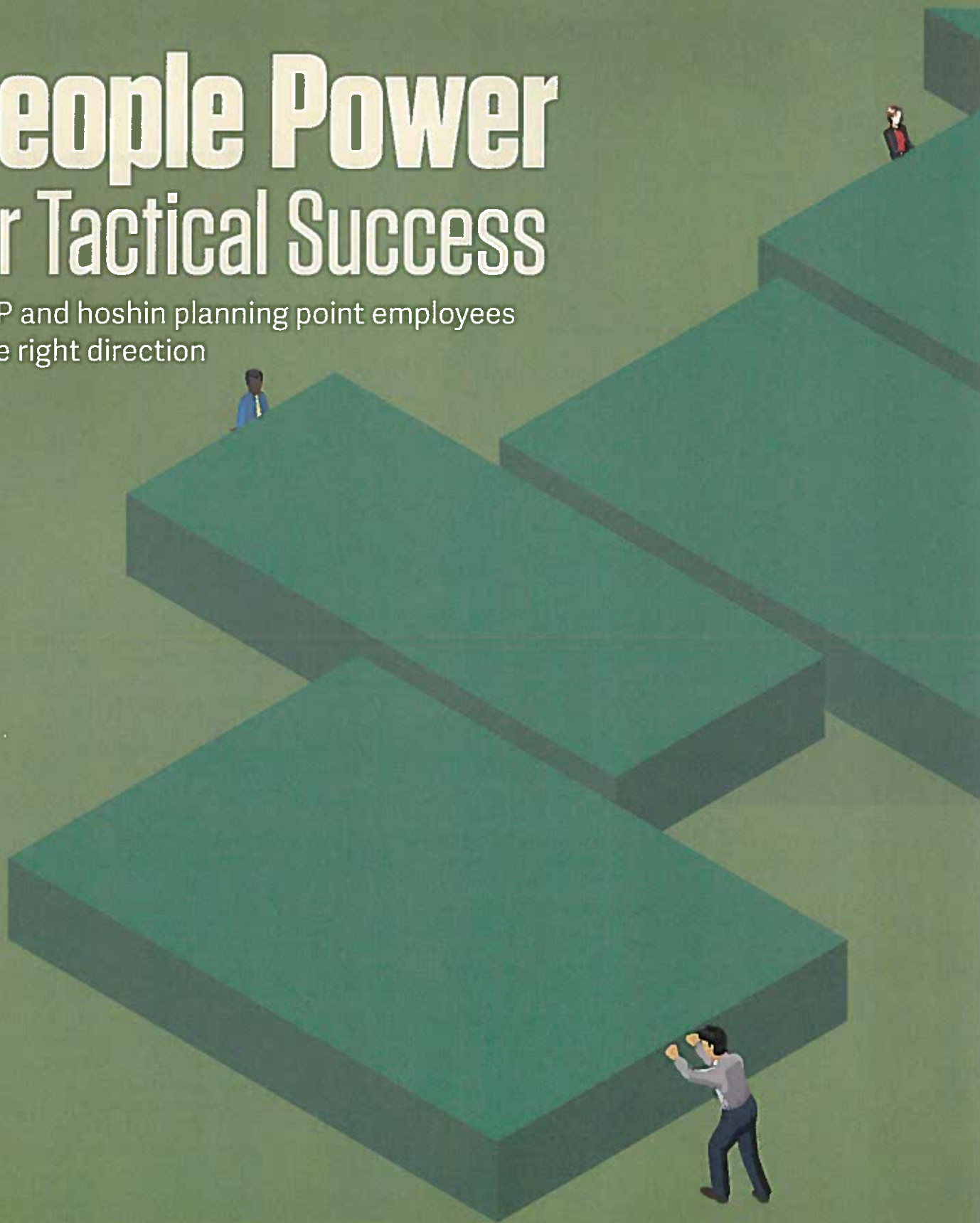


People Power for Tactical Success

S&OP and hoshin planning point employees
in the right direction





By Bharani Ranganathan, CSCP

Organizations seeking to improve their planning methods aren't limited to following a single path. Sales and operations planning (S&OP) combined with hoshin planning principles is a unique new device in the toolbox.

S&OP enables users to develop shared goals, communicate them, evaluate progress, and assign accountability. However, when this concept is applied by a company with an extended supply chain that sources components globally, there is added complexity. Such a situation demands a highly disciplined process, transparent decision making, teamwork from multiple business functions, and the elimination of information silos. By also having a long-range vision developed through hoshin planning, executives can monitor immediate business challenges while charting a multi-year course for improvement.

Business leaders may choose to apply both S&OP and hoshin planning for many reasons: improved customer service via the balancing of demand and supply, the ability to change supply rates much earlier and in smaller increments, or faster new product introductions to capture a competitive

advantage. All of this is possible when using the methodology described in this article.

Understanding S&OP

The S&OP process is used to establish an organization's overall level of sales and manufacturing output, expressed in families, to form the company game plan. The process's primary purpose is to institute rates of activity that will achieve company objectives such as meeting customer service and revenue goals, optimizing inventories, maintaining a stable workforce, and enhancing the effectiveness of new product introductions.

According to the *APICS Dictionary*, S&OP brings together all the strategies for the business—sales, marketing, development, manufacturing, sourcing, and financial—into one integrated set of plans. The process is performed at least once a month and is reviewed by management at an aggregate level to ensure that S&OP activities are reconciling all supply, demand, and new product tactics and are connected to the business plan.

S&OP also makes it possible for a company to translate high-level goals into quantitative, achievable actions through policy deployment that encourages employees to

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Putting the Plan into Action Gets Results

The vice president of supply chain at a high-tech manufacturer was facing the usual raft of problems: inaccurate forecasts, declining demand, bulging inventory, and a subcontractor with idle capacity. But calling the troops together only led to more questions and finger pointing. The situation continued to get worse before it got better.

The following observations were made:

- There was a strong disconnect between high-level plans and the day-to-day activities in areas where product was being ordered, produced, and shipped.
- The business lacked an executive decision-making process.
- A forum or a process was needed to balance demand and supply.
- There was no method in place to deal with volume in both units and dollars.
- Operational plans needed to be tied to financial plans.
- Everyone had a different set of numbers and targets.
- Relevant strategy and policy regarding demand and supply were not being properly established.
- With all the growing complexity and the rate of change, the company lacked a coordination process among its various functions.

Decision makers knew that meaningful change was necessary—and that all employees needed to be a part of that change. They chose to implement the S&OP and hoshin planning methodology for a 90-day pilot period. This entailed a strong commitment from executives in terms of participation in the process month over month, an agreement to follow implementation guidelines, and a plan to devise and deploy S&OP policy.

At the end of the three months, the company had

- established a well-coordinated decision-making process and an S&OP policy
- balanced demand, supply, and revenue with one set of numbers
- tied operational plans to financial plans
- shifted from a fire-fighting to a risk-adjusted organization
- created employee empowerment in devising the plan and having accountability.

After seeing success in the pilot program, the company continued the implementation over the course of a year. In the end, customer service satisfaction rates increased from 70 percent to 95 percent, and forecast accuracy improved from 60 percent to about 85 percent. The company's average cash conversion cycle went from 70 days to about one month, and gross profit margin increased from 45 percent to 55 percent. In addition, inventory levels were optimized at both the finish goods and work-in-process levels across the supply chain, and there were faster new product introductions. The business also experienced better decision making with less time and effort; improved financial plans; earlier identification of potential risk; and enhanced employee engagement, teamwork, and morale.

analyze situations, create plans for improvement, conduct performance checks, and take appropriate action. The first step always involves "stopping the bleed" by institutionalizing a coordination process. Then, the company is put on the right track to becoming a learning organization by moving people from fire fighting and short-term fixes to creating long-term improvements. This should bring about a lasting, sustained process that encourages continuous reflection and improvement.

Understanding hoshin planning

Today, industry operates in an extremely harsh business climate, and many companies must make frequent substantial operational advances simply to survive. Smart supply chain leaders constantly fine-tune their strategic plans. In Japan, such structural improvements typically are based on hoshin planning.

Hoshin means "breakthrough." Hoshin planning is a Japanese strategic process in which a company develops up to four vision statements that indicate where the business should be in the next five years. All employees participate, from the top down and the bottom up. The *APICS Dictionary* notes, "Company goals and work plans are developed based on the vision statements, [and] periodic audits are conducted to monitor progress."

Hoshin planning helps organizations

- focus on a shared, dynamic goal
- communicate that goal to all employees
- involve employees in the planning to achieve the goal
- hold stakeholders accountable for achieving their parts of the plan
- periodically evaluate whether the system is performing to expectations.

Although most executives understand the importance of having and following a game plan, many people get caught up in the stress and immediate needs of daily business. Goals and accountabilities aren't necessarily linked or cascaded. Hoshin planning assumes that daily controls and performance measures are in place and helps align an organization toward accomplishing the agreed-upon objectives.

Hoshin planning also focuses the entire organization on vital objectives, communicating a shared vision, participative alignment toward breakthrough objectives, careful monitoring, and smart management. Implementing this tool is achieved by clarifying strategy, communicating strategic objectives, planning and setting meaningful targets, aligning strategic initiatives across all levels, and building in a feedback loop for constant learning. This is sometimes called a "policy deployment," which describes the process of flowing objectives from the executive level down to work groups, as shown in Figure 1.

Figure 1: Planning through an organization



Putting them together

The joint S&OP and hoshin planning approach is a four-step process:

1. Assess the current S&OP maturity level and establish a key performance indicator baseline.
2. Hold an executive S&OP workshop so company decision makers can get a feel for how S&OP works and understand what type of leadership commitment and support they will need to provide.
3. Conduct a pilot proof of concept for one low-risk, low-cost, high-impact product family. This should include financial integration factors in order to help executives decide on the future implementation method for all product families.
4. Select the right technology, implement it, run the process, and evaluate benefits and challenges. Continuous improvement is essential.

This strategy (see sidebar) is effective because the S&OP process and hoshin planning principles are so closely related. For instance, they both focus on a common, strategic, multi-year goal. Second, but perhaps most importantly, both techniques ensure that the goal is communicated to all employees.

In fact, everyone at the company is involved in the planning that goes into achieving goals. Specifically, participants develop the year-over-year operating

plan—how much product will be produced and sold—which changes relative to business and market conditions. This strategy becomes the marching orders for all employees over the next 12 months. Likewise, the yearly sales and revenue plan is created

Smart supply chain leaders constantly fine-tune their strategic plans.

by people representing all business segments who, together, decide on a final number through consensus. Furthermore, both S&OP and hoshin planning hold participants accountable through multiple feedback loops for achieving their parts of the plan.

Another similarity is periodic evaluation. Employees judge whether the systems are performing to expectations using root cause analysis and continuous monitoring of the execution of the agreed-upon plans.

This assessment occurs every month at pre-defined meetings. All of the people who created the strategies are called on to compare what was planned versus actual results. Depending on the deviations, corrective actions are taken to stay the course and align with the operating plan.

Finally, both S&OP and hoshin planning require rigid implementations and long-term commitments with stable objectives over a period of years. This may be difficult in some cultures. However, the results are worth the time and effort.

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