

LYING DOWN **ON THE JOB**



Operating room tables have come a long way

By Keith Loria

It stands to reason that ever since the first surgical procedure there has always been some sort of table a patient lies on to get his or her operation. Through the years, operating room tables have gone from thin, uncomfortable slabs, to luxurious, padded, battery-operated tables that probably cost more than the cars that drove the patients there in the first place. Not that everyone requires the top-of-the-line surgical tables for their hospital; but it's comforting to know that manufacturers have put so much time and effort into creating tables that not only are practical and save time for the surgeons, but allow for a patient to rest a bit easier during the surgery.

According to the latest census report, there are 7,569 hospitals in the United States and it is estimated that there are more than 34,000 operating rooms in hospitals and 5,000 operating rooms in outpatient surgical centers. That creates the need for a lot of tables.

Looking at the market for new tables in 2009, the general state of affairs is one of conservative and selective spending.

"There are facility projects that are moving forward, but some of the expenditures have been reduced or postponed, having been categorized as 'nice to have, but not critical,'" says

Eric Wittine, senior product manager, surgical tables, Steris Corporation.

"Recently, we have seen projects released to move ahead that had previously been put on hold. Overall, we see the emergence of a cautious recovery for the table market."

Randy Tomaszewski, Vice President of Marketing for Skytron, has also seen a slight decrease in the industry.

"It is a little bit slower, but there is still a demand," he says. "Tables are in demand not only for weight capacity and imaging capability but also flexibility to deal with many different types of specialties and general purpose procedures."

Other OEMs like Maquet, Stryker and Berchtold have been continually producing upgrades in their table lines as most companies agree that operating room tables will continue to be in demand.

"Our general surgical table line effectively supports everything from versatile surgery centers to state-of-the-art robotic and hybrid suites," Wittine says. "In some cases, such as in vascular procedures, they do require specialty tables with additional capabilities such as larger radiolucent areas for real-time imaging. We offer a full range of general and specialty tables to meet procedural needs."

To compete with the big guys, Surgical Tables Incorporated manufactures a table they designed for the outpatient

procedures that are done in surgical centers.

"We are dedicated to providing surgeons innovative patient platforms on which to perform cutting-edge surgical procedures. Price becomes a big issue because doctors are buying the equipment themselves instead of the hospitals, so the price point makes us pretty economical, which allows them to get business," says Matt Neckoroski, President of Surgical Tables Incorporated. "People are tightening their belts because the way the economy is and our sales are down a little bit, but I think in the next couple of years the market will continue to grow."

According to manufacturers, the biggest challenge in the O/R table market is to help hospitals and health centers realize that even in a down economy, there are thoughtful, planned investments that should be made because they will provide long-lasting positive effects on patient care, quality and outcomes.

"The challenge for medical device manufacturers in this economy is to protect their core R&D efforts and continue focusing on innovation and new product development so that they are ready when the economy improves and opens up restricted budgets," Wittine says. "Versatility is very important in most operating rooms today; the ability to do the most with one table will resonate with them."

Rise of Refurbishments

Some OEMs have lowered their prices, but while new tables aren't as strong as they once were, the refurbished market has seen a boom in sales since the economic downturn.

"One reason is that surgeons are opening operating room suites and they are more inclined to buy a refurbished table," says Addam Arrington, President of Nashville, Tenn.-based Pilot Medical, Inc. "You don't get to charge for what color your O/R table is, you get to charge for the procedure. The return on investment is much faster with a refurbished system."

Those dealing with the used market reveal they can save someone anywhere from 40% to 65% for a refurbished surgical table compared to the price of a new one.

Gregory Wallace, owner of H&S Medical, believes that you have to be creative in this economy and has been pleased with how much business has grown lately.

"There are a lot of talented people and resources available to us that weren't before. We have more very talented people (mostly ex military) working for us and we tapped into technology-based improvements that were previously unavailable or just too expensive," Wallace says. "We have been able to 'save' quite a few tables that were considered un-repairable for about \$5,000 to \$7,000. We have extended this expertise to some dealers who were stuck with a problem they were unable to resolve."

Things have become so busy for some of the companies that supplies have diminished over the last year and companies are networking and turning to DOTmed.com to help replenish their supply.

"I think fewer new tables are being bought and that's why the supply has been low," says Arrington. "We attempt to buy good deals and have inventory of the most popular brands. As we get requests for quotes, we go on the trail to find what the customer is looking for."

The process for refurbishing an O/R table is complicated -



as every table is stripped and disassembled with the parts tested and calibrated, while bad parts are disposed of. Once reassembled, the table should operate as if it was brand new.

"The process includes initial inspection for full motion and feature operation to determine existing conditions," says David Ogren, President of OMED of Nevada. "Following the initial assessment, a full disassembly follows, all the way down to the seals on the hydraulic hoses. Replacement of fittings, hoses, fluids, batteries and damaged parts is next. Then we have prepping, painting, polishing and general cosmetic improvement. We finish up with new Velcro for pad placement and the pads as well."

Any part that has wear and tear should be replaced, including batteries, wheels, brakes, plastic lines, hydraulics, and O-rings. Wallace breaks down the refurbishing even further and explains why no power tools are used in the end.

"We disassemble each table, rebuild and clean the components for inspection. Hydraulics are rebuilt and if necessary replaced. We also rebuild the printed circuit boards and reseal them against moisture and dust. All bearings are replaced and properly lubricated. Batteries are always replaced or if not already in a table can be added," he says. "Final assembly is by hand, no power tools. Our Proprietary techniques allow us to properly adjust all facets of the table to factory specifications. Of course we do repaint as well and polish the stainless and replace the decals. Finally, an inspection is done before the table leaves our facility."

With the shortage of investment dollars and the possibility of lower reimbursements in the future, a properly reconditioned O/R table is a great use of a facility's capital dollars.

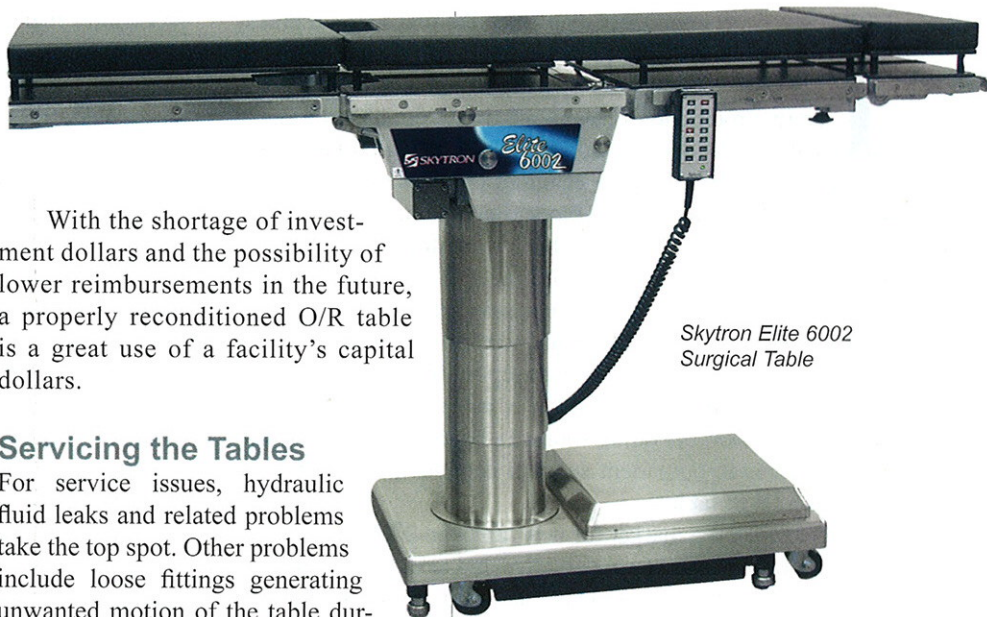
Servicing the Tables

For service issues, hydraulic fluid leaks and related problems take the top spot. Other problems include loose fittings generating unwanted motion of the table during procedures, lack of motion due to failure of hand controller and floor lock problems.

Wallace warns that while tables get scrubbed down after every use, people would be surprised to discover the places fluids can get into during scrub down and surgery procedures.

"Dust is also a big problem for electronic components because of the natural magnetic field emitted during use," he says. "A more recent problem is wear and tear on bearings and hydraulics related to bariatric patients. Even 1000-pound rated tables are affected and you have to be very careful to check for table play and lash."

Almost all refurbishers and OEMs will offer a maintenance contract. And fixes are generally not too troublesome once discovered.



Skytron Elite 6002
Surgical Table

Weighty Measures

The growing rate of obesity in the U.S. is behind today's most requested option in surgical tables.

"More and more people are wanting higher capacity, over 500 pound tables," says Bob Mighell, President of World Medical Equipment. "We have seen an increased demand for these in recent years."

OEMs remained alert and saw that the population continued to become larger and recognized a need for tables with increased weight capacity to safely manipulate a patient was important.

"Tables continue to be in high-demand for weight capacity because this baby boom population, where people are living longer, primarily as they get older are getting more orthopedic, spine, neural, cardiovascular ... surgical procedures and the tables have to be able to manipulate heavy loads because patients are getting bigger and bigger," Tomaszewski says. "The bariatric population continues to get larger and there's an obese population that needs to be addressed as well."

Bells and Whistles

But that's not all that's desired in a table. When it comes to features, there are a multitude of other options for the operating room tables, many dealing with safety, dependability and ease of use. Versatility is also very important.

"Return to level is important because if you are in a rush at the end to get things



STERIS® 5085 SRT
Surgical Table

back to normal, it takes a while to get things back without it, but the table can return to the original position in seconds, no matter what the previous position, so it's a big time saver," says Arrington. "Batteries are also important because you're still able to finish the procedure even if the power goes out."

In fact, customers are asking more about battery operated tables these days, which also ensures that staff do not trip and injure themselves on the electrical cords. The technology for surgical table batteries usually allows a table to be run on the battery all week.

When customers are purchasing a table, the way a table moves is also taken into account.

"Vertical and horizontal position change is an important feature because in the operating room you need to elevate the patient up to a height that's comfortable for a surgeon to operate," Ogren says. "The tilt from side to side is an important function. With C-arm application, the horizontal feature is key as that extends the right left movement of the table so they can get the patient X-rayed."

Tomaszewski says a growing concern is how low a table can go and that's important with a heavy table because sometimes surgeons have to stand on stools, which can cause back pain. Thus, the low table height has become more in demand today.

In March, Steris received FDA clearance for a highly versatile, power-assisted general surgery table that allows a single staff member to safely transport a patient throughout the pre-operative area.

"The 5085 SRT table is the only platform that allows clinicians the ability to slide, rotate and transport their patient on the same table," Wittine says. "The transport feature, combined with an unusually low height adjustment capability and a high weight capacity, yields the world's first crossover table."

Skytron offers solutions such as 20-inch plus top slide in conjunction with usable radiolucent areas for imaging concerns, weight bearing capabilities such as 1,200 lbs., lift with 1,000 lbs. articulation, rotating tabletops, ultra low table heights, and removable and interchangeable back and leg sections.



5 Steris 3080s that have been refurbished at World Medical Equipment

Of course not everyone is searching for all of these features. While nice, they aren't always necessary.

"We find surgery centers or plastic surgeons just looking for the best bang for their buck and don't need bells and whistles for what they are doing," says Mighell. "It really depends on a person's budget."

Looking Ahead

As the years pass, continued advancements are expected to make things easier for the surgeon and more comfortable for the patient.

"The operating room table of the future must be designed to meet the requirements of all specialties utilizing minimally invasive techniques while supporting open procedures that continue to exist," says Neckoroski. "At Surgical Tables Incorporated we are dedicated to bridging the gap between today and tomorrow. We see the need for a better solution to the current operating room tables and we are excited to be working on this project. We have named the project the MIS. The MIS will revolutionize the operating rooms of tomorrow."

O/R tables are more than their specifications and features; they also add versatility and value for the OR team by enabling them to meet a variety of surgical needs while helping to improve patient outcomes, surgical productivity and throughput.

● Online: dotmed.com/dm9712

DOTmed Registered O/R Tables Equipment Sales & Service Companies

For convenient links to these companies' DOTmed Services Directory listings, go to www.dotmed.com and enter [DM 9712]
Names in **boldface** are Premium Listings.

Name	Company - Domestic	City	State	Certified	DM100
Morris Dweck	BH World, Inc.	Hollywood	FL	●	
John Pritchard, II	Venture Medical ReQuip, Inc.	Tampa	FL		
Sam Liotta	SJL Medical Sales	Atlanta	GA		
Paul Larson	Beacon Surgical	Churubusco	IN		
Sara Whelan	AliMed, Inc.	Dedham	MA		
Kevin Blaser	Coast To Coast Medical	Fall River	MA		
Matthew Nekoroski	Surgical Tables Incorporated	Middleton	MA		
John Gladstein	Medical Device Depot	Ellicott City	MD		
Randy Tomaszewski	Skytron	Grand Rapids	MI		
Asif Bhinder	tekyard	Burnsville	MN		
Gregory Wallace	H&S MEDICAL	Portsmouth	NH		
David Ogren	OMED of Nevada	Reno	NV		
Scott Minich	KMA Remarketing Corp.	DuBois	PA	●	
Patricia Binder	Boiance Massage Tables	Shrewsbury	PA		
Wanda Krupinski	Berchold Corporation	Charleston	SC		
Addam Arrington	Pilot Medical, Inc.	Nashville	TN	●	
Keith Kincannon	Plan B Medical, Inc.	Jasper	TX		
Herbert Wayne	eMedicalSales.com	North Zulch	TX		
Natalie Nelson	BPI Medical	Fife	WA		
Don Osborne	Resource Surgical Equipment	Lynnwood	WA		
Bob Mighell	World Medical Equipment	Marysville	WA	●	
Steve Beno	Sterilizer Services, Inc.	Green Bay	WI	●	