Co-creating patient safety solutions at Tilcentrum

The Dutch company Tilcentrum, which offers solutions for lifting and transfer issues in healthcare, has started to develop prospective risk analysis together with its clients. By developing BowTies in cooperation with Medisch Spectrum Twente, a large Dutch hospital, Tilcentrum is the first manufacturer within healthcare to support a client with risk assessments.

As a large supplier and manufacturer of mobilization tools, Tilcentrum wants to support healthcare facilities with the prospective identification of the risks for both the patients and staff. “It really started while talking to risk consultant Kitty ter Borg of MEDD,” Marieke Haarhuis-Zonder says. “We discussed that developing BowTies for hospitals might support hospitals in assessing risks surrounding mobilization tools.” “To develop BowTies for clients is very unusual,” Marieke Haarhuis-Zonder continues. “We did not want to assess the risks from a commercial perspective, but objectively and without self-interest.” Tilcentrum, together with MEDD, started by developing BowTies together with the staff at Medisch Spectrum Twente. This arrangement is unique and an important step in improving patient and employee safety. “Together we are improving the healthcare with user friendly mobilization devices,” Kitty ter Borg says. “This way, we are co-creating patient safety solutions.”
Closing the gap with mandatory risk management systems
The insights gained during user tests of the patient lift, incident records, hospital tours and other sources served as input for the BowTie analysis.

During the inventory phase of the BowTie method, a multidisciplinary team maps both the dangers of using hoists and employability within the hospital and the associated patient and employee safety.

“After the evaluation phase, advice is given on the use of the lifts in an effective, efficient and above all safe manner,” Marieke Haarhuis-Zonder says. “Risk management staff then ensures that it is secured within the organization, including the mandatory system of the Nederlands Instituut voor Accreditatie in de Zorg (NIAZ) and the ‘Veiligheids Management Systeem’ (VMS).” VMS is a safety management system shared by a large number of Dutch hospitals to increase safety within the healthcare system.

In assessing the risks together with the hospital, Tilcentrum and MEDD also closed the gap between the mandatory ‘Failure Modes and Effects Analysis’ (FMEA) designer analysis and the ‘Healthcare Failure Modes and Effects Analysis’ (HFMEA) analysis in the environment of use.

Practical insights
“The BowTie methodology steers the team during the risk analysis and results in easy to understand diagrams that are very helpful in risk communication and training purposes. BowTieXP is a perfect tool to facilitate the communication with all stakeholders, both departmental and managerial,” Marieke Haarhuis-Zonder says, “Developing the BowTie gave us all a deepening insight into the most important risks involved with using the lift within the Medisch Spectrum Twente. For example, behavior is mentioned quite often, as well as clear guidelines within the organization.”

The first results of the user test have already led to new practical insights about the use and risks of the lifts. “As a result of developing the BowTie together with the Medisch Spectrum Twente, we have included checklists for using a hoist, both at the front and at the back,” Marieke Haarhuis-Zonder explains. “The equipment of the hoist can have changed since the last time it was used, so there should be a brief safety check every time it is used. For example, the checklist includes a brief visual check to see if no one has driven a mobility scooter against the hoist.”

Everyone involved benefits
All parties involved are positive about the results of working closely together to develop the risk assessments. “It has been very enlightening. The hospital has new insights and new checklists, while we increased our understanding of patient experience and patient safety,” Marieke Haarhuis-Zonder says. “Every health institute has its own specific risks, which will give us other insights as well. We are certainly planning to develop BowTies with other clients as well, as it benefits everyone involved.”

Industry Award nomination 2012
YPFB has been nominated for an Industry Award in the category Best Application. Organizations nominated in this category have shown a concrete application of solutions to make a change.
The Dutch Tilcentrum is a leader in preventive physical lifting, offering total solutions for lifting and transfer issues in healthcare.

Since 1996 Tilcentrum is known for its innovative products, services and customer solutions. Some examples are the children hoist Tonya, the universal safety clip and the 'specials', the custom made slings.

BowTieXP is a next generation risk assessment tool that uses the BowTie Method to assess risks. BowTieXP is unique in its ability to visualize complex risks in a way that is understandable, yet also allows for detailed risk based improvement plans. Many global companies have chosen BowTieXP.