



CONTACT:

Mark Sacaris, Vice President, Marketing, Medical Compression Systems, Inc.
(858) 345-1156

Dan Budwick, Pure Communications
(973) 271-6085

**Landmark Head-to-Head S.A.F.E. Study Comparing ActiveCare+S.F.T. to Lovenox
Published in Journal of Bone & Joint Surgery**

*- Non-Invasive Compression System Shown To Be No Different In Efficacy Yet Far
Safer Than Most Widely Prescribed Drug Therapy for Prevention of VTE -*

OR AKIVA, Israel & WEST HILLS, Calif., March 1, 2010 — Medical Compression Systems, Ltd. (TASE: MDCL), a company specializing in innovative non-invasive blood circulation solutions, today announced publication of the results from the landmark head-to-head S.A.F.E. (S.F.T. Alternative to Enoxaparin) study. The results, published as the lead article in the March 2010 issue of *Journal of Bone and Joint Surgery*, demonstrated that the ActiveCare+S.F.T.[®] non-invasive mobile compression system, used as monotherapy, achieved no significant difference in efficacy and a significant decrease in major bleeding events compared to Lovenox[®] (enoxaparin sodium injection) in the prevention of venous thromboembolism (VTE) in total hip arthroplasty (THA).

“Preventing the occurrence of venous thromboembolism, a common and potentially fatal complication following THA procedures, is critically important. We all want to minimize the risk to our patients from the possible consequence of VTE and at the same time minimize the risks associated with prevention treatments,” stated lead author Clifford W. Colwell Jr., M.D., The Donald and Darlene Chair in Orthopaedic Research at Scripps Clinic. “Unfortunately, the drugs commonly used to prevent these complications can lead to increased bleeding events, placing patients at another type of risk. Results from the S.A.F.E. study demonstrate that ActiveCare+S.F.T. has a significantly lower risk of serious bleeding complications than the most widely used pharmacologic agent worldwide. The risk of VTE was similar in the two groups following total hip replacements in nine major medical centers in the U.S.”

The multicenter, prospective, randomized, controlled study involved 410 patients and was designed to assess the efficacy and safety of the ActiveCare+S.F.T. Continuous Enhanced Circulation Therapy[®] (C.E.C.T) system vs. Lovenox, currently the most widely prescribed therapy for VTE prevention in the United States.

Following are highlights from the study, which demonstrated that there was no statistical difference between the non-invasive ActiveCare+S.F.T.system and Lovenox in the prevention of VTEs in patients following THA surgery:

-contd-



- The rate of VTE was almost identical between the two groups; 5.1% (n=10) in patients treated with ActiveCare+S.F.T., and 5.2% (n=10) in patients treated with Lovenox
- Major bleeding events occurred in 0% of the ActiveCare+S.F.T. group vs. 5.6% (n=11) for the Lovenox group (p=0.0007)
- Pulmonary emboli occurred in 1% (n=2) of both the ActiveCare+S.F.T. and Lovenox groups

The ActiveCare+S.F.T. system is the first non-invasive, medical device clinically proven to prevent VTE in total hip arthroplasty throughout the time of high risk (approximately 10 days post-operation, including in and outpatient terms). The system generates a unique venous flow in the limbs that is highly efficacious in preventing VTEs. It is also palm-sized and mobile, thus promoting high patient compliance in and out of the hospital.

“Patients recovering from surgery should not have to face the serious bleeding risks associated with current therapeutic options when being treated for the prevention of VTEs. The ActiveCare+S.F.T. system has demonstrated efficacy equal to that of the leading drug in the market with dramatically reduced bleeding complications following THA. This novel device clearly represents a significant advance in how VTE prevention should be managed,” said Adi Dagan, chief executive officer, Medical Compression Systems. “As a non-pharmaceutical solution without the adverse events and problematic drug interactions associated with traditional pharmaceutical approaches, we are confident that many patients can benefit from ActiveCare+S.F.T. to prevent VTEs safely. We look forward to further advancing clinical and commercial efforts around the globe in 2010.”

The study, titled “*Thrombosis Prevention in Total Hip Arthroplasty: A Prospective Randomized Trial comparing a Mobile Compression Device with Low-Molecular-Weight-Heparin*,” by Colwell et al, is available online in this month’s issue of the *Journal of Bone and Joint Surgery* at <http://www.ejbs.org/cgi/content/abstract/92/3/527>.

About the Study

The study involved 410 patients, of which 392 patients were evaluable for safety and 386 patients were evaluable for efficacy. Patients in both groups were closely monitored throughout their treatment (in and out of the hospital) for VTE events and for serious bleeding complications. Major bleeding was defined as bleeding that required rehospitalization or prolonged hospitalization, that required any intervention to prevent permanent impairment or damage, that endangered critical organs, that was life threatening or that caused death.

The patients in the ActiveCare+S.F.T. group used the device for a mean of 11 days, and a mean of 221 hours for a mean of 20 hours per day. The Lovenox group used a mean of 12 doses during a mean of 10 days of prophylaxis.

-contd-



About Deep Vein Thrombosis and Venous Thromboembolism

Deep vein thrombosis (DVT) is a serious, potentially life-threatening condition in which a blood clot (thrombus) forms in one or more of the deep veins in the lower limbs (legs).

Left untreated, these clots can cause disability or become life threatening; the clot can break off, travel through the bloodstream and restrict blood flow in the lungs, causing a pulmonary embolism (PE). Venous thromboembolism (VTE) is the collective term for DVT and PE. Without preventative treatment, the rate of DVT after THA is as high as 50 percent. According to the American Heart Association, more than 200,000 new cases of PE occur annually in the United States. Of these, 30 percent die within 30 days, one-fifth suffer sudden death due to PE, and about 30 percent develop recurrent VTE within 10 years. Independent predictors for recurrence include increasing age, obesity, malignant neoplasm and extremity paresis.

About ActiveCare+S.F.T.® Continuous Enhanced Circulation Therapy® System

The ActiveCare+S.F.T.® Continuous Enhanced Circulation Therapy® (C.E.C.T) system is the first non-invasive, non-pharmaceutical monotherapy clinically proven to prevent venous thromboembolism (VTE) in total hip arthroplasty. ActiveCare+S.F.T. uniquely improves the blood circulation in the limbs with a palm-sized, mobile, pneumatic compression therapy system.

The system works by gently applying compression to your legs, increasing the speed of blood flow in the veins and reducing the risk of clot formation. Its portable size, lightweight mobility and ease of use provides patients with protection for the most safe and effective way to prevent deep vein thrombosis (DVT). The system shows high compliance with patients, and is able to deliver its unique therapy on a continual basis both in and out of the hospital, without the use of anticoagulants and their associated bleeding risks.

About Medical Compression Systems, Ltd.

Medical Compression Systems, Ltd. (MCS) specializes in the development, manufacturing and marketing of innovative non-invasive blood circulation solutions. Founded in 1997, MCS is an Israeli public company, traded on the Tel Aviv Stock Exchange (TASE: MDCL). MCS has developed the only proven non-invasive alternative to anticoagulants for the prevention of deep vein thrombosis (DVT) for in and outpatient use; it's Synchronized Flow Technology® (S.F.T.) and Continuous Enhanced Circulation Therapy® (C.E.C.T.) approach successfully delivers improved blood circulation to the limbs and significantly increases patient compliance levels. The company's management and R&D are headquartered in Israel with manufacturing facilities located in both Israel and the United States. The company's sales and marketing teams are managed in the United States by its subsidiary, MCS Inc., which conducts in-depth training and support programs to distributors and medical facilities throughout the country. For more information, visit Medical Compression Systems online at www.mcsmed.com.

###



**Medical Compression Systems Inc, 6520 Platt Ave. #804
West Hills, CA 91307-3218, Tel: 1-800 377 5804
www.mcsmed.com**