

## Pilot study of Scrambler therapy for the treatment of chemotherapy-induced peripheral neuropathy.

**Sub-category:**  
Symptom Management/Supportive Care/Palliative Care

**Category:**  
Patient and Survivor Care

**Meeting:**  
2012 ASCO Annual Meeting

**Session Type and Session Title:**  
General Poster Session, Patient and Survivor Care

**Abstract No:**  
9075

**Citation:**  
J Clin Oncol 30, 2012 (suppl; abstr 9075)

**Author(s):**  
Deirdre R. Pachman, Breanna M. Linqvist, Debra L. Barton, Kelliann C. Fee-Schroeder, Thomas J. Smith, Daniel Honore Lachance, Heshan Liu, Drew K. Seisler, Charles L. Loprinzi; Mayo Clinic, Rochester, MN; Sidney Kimmel Comprehensive Cancer Center at Johns Hopkins, Baltimore, MD

Abstracts that were granted an exception in accordance with ASCO's Conflict of Interest Policy are designated with a caret symbol (^) here and in the printed Proceedings.

### Abstract Disclosures

**Abstract:**

**Background:** Chemotherapy-induced peripheral neuropathy (CIPN), a common dose-limiting side effect of chemotherapy, remains without known effective interventions. Preliminary data support that Scrambler therapy, a device which treats pain via non-invasive cutaneous electrostimulation, is beneficial for the treatment of CIPN. This pilot trial was performed to investigate the effect of Scrambler therapy for the treatment of CIPN. **Methods:** Eligible patients included those age  $\geq 18$  years, ECOG PS  $\leq 2$ , life expectancy  $\geq 3$  months, with pain or CIPN symptoms of  $\geq 1$  month duration and tingling or pain  $\geq 4/10$  during the prior week. Patients were treated with Scrambler therapy to the affected area for up to 10 daily 30 minute sessions. Symptoms were monitored daily during therapy using a questionnaire to measure symptoms of neuropathy with a numerical analogue scale. **Results:** We report on the first 11 CIPN patients, enrolled between 7/18/2011 and 12/12/2011, 3 men and 8 women; mean age 57 years. Patients had history of exposure to various chemotherapeutic agents and the majority had symptoms  $> 2$  years. The table portrays data at baseline, at the end of the 10 planned days of therapy, and the percent changes from baseline to the end of treatment, regarding patient reported pain, tingling, and numbness over the preceding 24 hours. There were no adverse events. Persistent benefit out to 5 weeks was seen in some patients; maturing data will be available by May 2012. Descriptive summary statistics formed the basis of data analysis. Further patients are being entered on this trial. **Conclusions:** Scrambler therapy appears to be beneficial in the treatment of CIPN. A prospective placebo-controlled clinical trial should be performed to confirm these preliminary findings.

Effect of Scrambler therapy on CIPN score.

Symptom	Mean baseline score		Mean final score		Percent change	
	Mean	Worst	Mean	Worst	Mean	Worst
Pain	5.7 (2.20)	6.0 (2.10)	3.0 (2.65)	3.8 (3.06)	-48% (2.65)	-36% (3.54)
Tingling	6.5 (1.81)	7.0 (1.84)	3.8 (2.82)	4.0 (2.65)	-41% (2.34)	-43% (1.95)
Numbness	6.5 (1.57)	7.2 (1.78)	5.1 (2.43)	5.2 (2.48)	-21% (1.75)	-28% (2.14)

Numbers in parentheses represent standard deviations.

➤ **Associated Presentation(s):**

1. Pilot study of Scrambler therapy for the treatment of chemotherapy-induced peripheral neuropathy.

Meeting: 2012 ASCO Annual Meeting

Presenter: Deirdre R. Pachman

Session: Patient and Survivor Care (General Poster Session)

► **Other Abstracts in this Sub-Category:**

1. Randomized trial of vitamin D3 to prevent worsening of musculoskeletal symptoms and fatigue in women with breast cancer starting adjuvant letrozole: The VITAL trial.

Meeting: 2012 ASCO Annual Meeting Abstract No: 9000 First Author: Qamar J. Khan  
Category: Patient and Survivor Care - Symptom Management/Supportive Care/Palliative Care

2. Phase III evaluation of American ginseng (panax quinquefolius) to improve cancer-related fatigue: NCCTG trial N07C2.

Meeting: 2012 ASCO Annual Meeting Abstract No: 9001 First Author: Debra L. Barton  
Category: Patient and Survivor Care - Symptom Management/Supportive Care/Palliative Care

3. Dexamethasone (DM) for cancer-related fatigue: A double-blinded, randomized, placebo-controlled trial.

Meeting: 2012 ASCO Annual Meeting Abstract No: 9002 First Author: Sriram  
Yennurajalingam

Category: Patient and Survivor Care - Symptom Management/Supportive Care/Palliative Care  
More...

► **Abstracts by Deirdre R. Pachman:**

1. Pilot evaluation of a stellate ganglion block for the treatment of hot flashes.

Meeting: 2010 ASCO Annual Meeting Abstract No: 9104 First Author: D. R. Pachman  
Category: Patient and Survivor Care - Supportive Care

More...

► **Presentations by Deirdre R. Pachman:**

1. Pilot study of Scrambler therapy for the treatment of chemotherapy-induced peripheral neuropathy.

Meeting: 2012 ASCO Annual Meeting

Presenter: Deirdre R. Pachman, M.D.

Session: Patient and Survivor Care (General Poster Session)

2. Pilot evaluation of a stellate ganglion block for the treatment of hot flashes.

Meeting: 2010 ASCO Annual Meeting

Presenter: Deirdre R Pachman

Session: Patient and Survivor Care (General Poster Session)

More...

► **Educational Book Manuscripts by Deirdre R. Pachman:**

No items found.