

Abstract Presented at ASTRO 2018 Monday October 22: Initial Clinical Experience with Uni-Directional LDR Brachytherapy in the Treatment of Retroperitoneal Sarcoma

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RESEARCH TRIANGLE PARK, N.C. CivaTech Oncology®

Physicians report CivaSheet®, a unidirectional LDR brachytherapy implant, demonstrates up to two year local control in recurrent retroperitoneal sarcomas (RPS) when implanted during surgical resection. The crude cumulative incidence of local recurrence (LR) is 26%. In this report, six RPS patients were implanted with CivaSheet at four medical centers. RPS patients tolerated the implant well with no complications following surgery and no reports of source movement. Median 15 months (8-24 months) follow-up, none of the seven patients (0/7) have demonstrated local recurrence. There were no reported incidences of acute or late radiation toxicity despite the surrounding organs at risk, including small bowel, ureter and kidneys. The directional source distribution allows for safe re-irradiation or adjuvant brachytherapy boost radiation therapy in patients who have had maximum EBRT dose.

Krisha Howell MD and Dian Wang MD indicate uni-directional, planar Pd-103 LDR brachytherapy has demonstrated up to two year recurrence-free survival even in patients with a focally positive microscopic margin. The uni-directional design protects healthy tissues allowing a targeted dose with no toxicity. The novel polymer encapsulation allows unprecedented dose uniformity. Application of uni-directional, planar Pd-103 LDR brachytherapy technology is safe and easy and should be considered as a standard option to escalate dose to high risk margins of RPS after resection.

About CivaSheet®:

CivaSheet® is a flexible, implantable intra-operative radiation therapy device (brachytherapy), which emits unidirectional radiation by integrating gold shielding into its polymer encapsulation. CivaSheet has broad FDA clearance to include sarcoma and many other malignancies. CivaSheet enables boost radiation therapy in patients who have otherwise received the maximum radiation dose.

Development of the CivaSheet and clinical studies are partially supported by the NIH, NCI and the NC Biotech Center.

About CivaTech® Oncology:

CivaTech Oncology's products bring meaningful improvements to provide targeted personalized radiation therapy in more aggressive doses with higher tolerability. For more information, please visit www.civatechoncology.com.

ABOUT ASTRO

The American Society for Radiation Oncology (ASTRO) is the world's largest radiation oncology society, with more than 10,000 members who are physicians, nurses, biologists, physicists, radiation therapists, dosimetrists and other health care professionals who specialize in treating patients with radiation therapies. The Society is dedicated to improving patient care through



professional education and training, support for clinical practice and health policy standards, advancement of science and research, and advocacy. ASTRO publishes three medical journals, International Journal of Radiation Oncology • Biology • Physics, Practical Radiation Oncology and Advances in Radiation Oncology; developed and maintains an extensive patient website, RT Answers; and created the nonprofit foundation Radiation Oncology Institute. To learn more about ASTRO, visit astro.org or RTanswers.org, sign up to receive our news and follow us on our blog, Facebook and Twitter.

This news release contains additional and/or updated information from the study author(s).

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Release Summary

Drs. Dian Wang and Krisha Howell conclude: Uni-directional, planar Pd-103 LDR brachytherapy has demonstrated up to 2-year recurrence-free survival in retroperitoneal sarcoma patients with focally positive microscopic margins.

For Clinical Study locations contact:

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