

Arch Therapeutics Announces Positive Preclinical Data From Its Study of AC5 Surgical Hemostatic Device(TM) in Animals on Blood Thinner

AC5(TM) Quickly Stopped Brisk Bleeding in Livers of Nine Rats; Potential Treatment Option for Patients at Increased Risk of Bleeding Due to Anticoagulant and Potentially Antiplatelet Drugs

WELLESLEY, MA -- (Marketwired) -- 08/25/14 -- Arch Therapeutics, Inc. (OTCQB: ARTH) ("Arch" or the "Company"), developer of the AC5 Surgical Hemostatic Device™ for potential use in bleeding during surgery, today announced positive data in an initial preclinical study assessing the use of its AC5 Surgical Hemostatic Device™ in animals receiving an anticoagulant medication (i.e. blood thinner).

In the first preclinical assessment of AC5 in the presence of an anticoagulant, AC5 quickly stopped brisk bleeding from a 4mm diameter biopsy surgical site created in the livers of nine rats that had been treated with a clinically relevant dose of the drug heparin. Heparin is an anticoagulant commonly given to patients to prevent blood clots during and after surgical procedures and in other circumstances. The study demonstrated that application of AC5 in this commonly used animal model of brisk bleeding was able to stop blood loss from the liver in less than 30 seconds and to achieve hemostasis. Time to hemostasis (TTH) after creation of the liver wounds in heparin-treated animals was comparable to TTH after creation of liver wounds in normal, non-anticoagulated animals.

"There is a great need to continue to develop novel hemostatic agents and sealants that are efficacious in surgical and trauma patients," said Cambridge, MA-based surgeon Steven Schwaitzberg, MD, Professor of Surgery at Harvard Medical School and advisor to Arch Therapeutics. "In particular, the need is greatest in those patients whose underlying coagulation cascade or platelet status is abnormal, whether due to concurrent antithrombotic therapy or an underlying disease. Increasing numbers of patients are on anticoagulant or antiplatelet medications. This can present a challenge to surgeons and other interventionalists when procedures are needed on these patients. These initial findings on the activity of AC5 in this setting are very encouraging and may lead to significant benefit in the future."

Terrence W. Norchi, MD, President and CEO of Arch Therapeutics, said, "We are excited by the data from this early study. This is the first of several planned preclinical studies intended to assess the utility of AC5 in animals on antiplatelet or anticoagulant therapy, commonly referred to as blood thinners. A significant portion of the population takes blood thinners to

prevent a range of life-threatening conditions. Patients on these medications are at increased risk of bleeding and their management during surgical and other procedures requires extra care. We hope to demonstrate that AC5 is effective regardless of a patient's underlying platelet or bleeding status, whether due to prescribed medications or an underlying condition such as hemophilia, in order to offer surgeons and patients an even better tool to control bleeding."

About Arch Therapeutics, Inc.

Arch Therapeutics, Inc. is a medical device company developing a novel approach to stop bleeding (hemostasis) and control leaking (sealant) during surgery and trauma care. Arch is developing products based on an innovative self-assembling peptide technology platform to make surgery and interventional care faster and safer for patients. Arch's flagship development stage product candidate, known as AC5 Surgical Hemostatic Device ™, is being designed to achieve hemostasis in minimally invasive and open surgical procedures.

Find out more atwww.archtherapeutics.com.

Notice Regarding Forward-Looking Statements

This news release contains "forward-looking statements" as that term is defined in Section 27(a) of the Securities Act of 1933, as amended, and Section 21(e) of the Securities Exchange Act of 1934, as amended. Statements in this press release that are not purely historical are forward-looking statements and include any statements regarding beliefs, plans, expectations or intentions regarding the future. Such forward-looking statements include, among other things, references to novel technologies and methods, our business and product development plans and projections, or market information. Actual results could differ from those projected in any forward-looking statements due to numerous factors. Such factors include, among others, the inherent uncertainties associated with developing new products or technologies and operating as a development stage company, our ability to retain important members of our management team and attract other qualified personnel, our ability to raise the additional funding we will need to continue to pursue our business and product development plans, our ability to develop and commercialize products based on our technology platform, and market conditions. These forward-looking statements are made as of the date of this news release, and we assume no obligation to update the forward-looking statements, or to update the reasons why actual results could differ from those projected in the forward-looking statements. Although we believe that any beliefs, plans, expectations and intentions contained in this press release are reasonable, there can be no assurance that any such beliefs, plans, expectations or intentions will prove to be accurate. Investors should consult all of the information set forth herein and should also refer to the risk factors disclosure outlined in the reports and other documents we file with the SEC, available at www.sec.gov.

On Behalf of the Board, Terrence W. Norchi, MD Arch Therapeutics, Inc.

Contact:

ARTH Investor Relations

Toll Free: +1-855-340-ARTH (2784) (US and Canada)

Email: investors@archtherapeutics.com

Website: www.archtherapeutics.com

Source: Arch Therapeutics, Inc.