

Cardiol Therapeutics Commences Multi-Center Phase II Pilot Study of CardiolRx(TM) for the Treatment of Recurrent Pericarditis

The Cleveland Clinic and the Mayo Clinic Study Sites have been Initiated and are Eligible to Recruit Participants

Initiation of Additional U.S. Cardiovascular Research Centers is Planned for Q1, 2023

Oakville, Ontario--(Newsfile Corp. - December 12, 2022) - Cardiol Therapeutics Inc. (**NASDAQ: CRDL**) (**TSX: CRDL**) ("**Cardiol**" or the "**Company**"), a clinical-stage life sciences company focused on the research and clinical development of anti-inflammatory and anti-fibrotic therapies for the treatment of heart diseases, announced today the initiation of a Phase II open-label pilot study (NCT05494788), to investigate the tolerance, safety, and efficacy of CardiolRx™ in patients with recurrent pericarditis. In addition to standard safety assessments, the study is designed to evaluate improvement in objective measures of disease, and during an extension period, assess the feasibility of weaning concomitant background therapy including corticosteroids, while taking CardiolRx™.

"The initiation of this important study at the Cleveland Clinic and the Mayo Clinic marks an important milestone in our efforts to improve treatment options for patients with recurrent pericarditis," commented David Elsley, Cardiol Therapeutics' President and Chief Executive Officer. "Recurrent pericarditis is an inflammatory heart disease with symptoms that include sharp stabbing chest pain, shortness of breath, and fatigue, thereby limiting an individual's physical activity and quality of life. The data generated from patients who enroll in the study at our collaborating research centers will provide further information in support of the use of CardiolRx™ as a novel therapy for this debilitating and frequently undertreated disorder. We are pleased to have the study underway, and we share the enthusiasm demonstrated by the study investigators in evaluating the clinical potential of CardiolRx™ in pericarditis."

The Company's Phase II pilot study is expected to enroll 25 patients at clinical centers in the United States that specialize in pericarditis care. The protocol has been designed in collaboration with thought leaders in pericardial disease. The study Chairman is Allan L. Klein, MD, Director of the Center of Pericardial Diseases and Professor of Medicine, Heart and Vascular Institute, at the Cleveland Clinic. The primary efficacy endpoint is the change, from baseline to 8 weeks, in patient-reported pericarditis pain using an 11-point numeric rating scale ("NRS"). The NRS is a validated clinical tool employed across multiple conditions with acute and chronic pain, including previous studies of recurrent pericarditis. Secondary endpoints include the pain score after 26 weeks of treatment, and changes in circulating levels of C-reactive protein, a commonly used clinical marker of inflammation.

Pre-clinical data adding to the strong scientific basis for investigating CardiolRx™ clinically in recurrent pericarditis was recently presented at the American Heart Association Scientific Sessions 2022. Cardiol's research collaborators from Virginia Commonwealth University presented results demonstrating the protective effects of CardiolRx™ in a model of pericarditis, which included a significant reduction in imaging signs of pericardial effusion and thickening, and significant suppression of key pro-inflammatory markers interleukin-1 β ("IL-1 β ") and interleukin-6 ("IL-6"). The release of these cytokines IL-1 β and IL-6 is responsible for the cycle of inflammation in recurrent pericarditis leading to the pericardial effusion and thickening characteristic of the disease.

About Recurrent Pericarditis

Recurrent pericarditis refers to inflammation of the pericardium (the membrane or sac that surrounds the heart) that follows an initial episode (frequently resulting from a viral infection). Patients may have multiple recurrences. Symptoms include debilitating chest pain, shortness of breath, and fatigue,

resulting in physical limitations, reduced quality of life, emergency department visits, and hospitalizations. Significant accumulation of pericardial fluid and scarring can progress to life-threatening constriction of the heart. The only FDA-approved therapy for recurrent pericarditis, launched in 2021, is costly and is primarily used as a third-line intervention. The number of cases of patients seeking and receiving treatment for recurrent pericarditis annually in the U.S. is estimated at 38,000. Hospitalization due to recurrent pericarditis is often associated with a 6-8-day length of stay and cost per stay is estimated to range between \$20,000 and \$30,000 in the United States.

About Cardiol Therapeutics

Cardiol Therapeutics Inc. (NASDAQ: CRDL) (TSX: CRDL) is a clinical-stage life sciences company focused on the research and clinical development of anti-inflammatory and anti-fibrotic therapies for the treatment of heart diseases. The Company's lead product candidate, CardiolRx™ (cannabidiol), is a pharmaceutically manufactured oral solution formulation that is being clinically developed for use in heart diseases. It is recognized that cannabidiol inhibits activation of the inflammasome pathway, an intracellular process known to play an important role in the inflammation and fibrosis associated with myocarditis, pericarditis, and heart failure.

Cardiol has received Investigational New Drug Application authorization from the United States Food and Drug Administration to conduct clinical studies to evaluate the efficacy and safety of CardiolRx™ in two diseases affecting the heart: (i) a Phase II multi-national, randomized, double-blind, placebo-controlled trial (the "ARCHER" trial) in acute myocarditis, an important cause of acute and fulminant heart failure in young adults and a leading cause of sudden cardiac death in people less than 35 years of age; and (ii) a Phase II multi-center open-label pilot study in recurrent pericarditis (inflammation of the pericardium), which is associated with symptoms including debilitating chest pain, shortness of breath, and fatigue, and results in physical limitations, reduced quality of life, emergency department visits, and hospitalizations.

Cardiol is also developing a novel subcutaneously administered drug formulation of cannabidiol intended for use in heart failure - a leading cause of death and hospitalization in the developed world, with associated healthcare costs in the United States exceeding \$30 billion annually.

For more information about Cardiol Therapeutics, please visit cardiolrx.com.

Cautionary statement regarding forward-looking information:

This news release contains "forward-looking information" within the meaning of applicable securities laws. All statements, other than statements of historical fact, that address activities, events, or developments that Cardiol believes, expects, or anticipates will, may, could, or might occur in the future are "forward-looking information". Forward looking information contained herein may include, but is not limited to, statements relating to the Company's focus on developing anti-inflammatory and anti-fibrotic therapies for the treatment of heart diseases, the molecular targets and mechanism of action of our product candidates, that cannabidiol may represent a novel strategy for treating pericarditis and preventing its complications and recurrence, the Company's intended clinical study and trial activities and timelines associated with such activities, and the Company's plan to advance the development of a novel subcutaneous formulation of CardiolRx™ for use in heart failure. Forward-looking information contained herein reflects the current expectations or beliefs of Cardiol based on information currently available to it and is based on certain assumptions and is also subject to a variety of known and unknown risks and uncertainties and other factors that could cause the actual events or results to differ materially from any future results, performance or achievements expressed or implied by the forward-looking information, and are not (and should not be considered to be) guarantees of future performance. These risks and uncertainties and other factors include the risks and uncertainties referred to in the Company's Annual Information Form dated March 23, 2022, as well as the risks and uncertainties associated with product commercialization and clinical studies. These assumptions, risks, uncertainties, and other factors should be considered carefully, and

investors should not place undue reliance on the forward-looking information, and such information may not be appropriate for other purposes. Any forward-looking information speaks only as of the date of this press release and, except as may be required by applicable securities laws, Cardiol disclaims any intent or obligation to update or revise such forward-looking information, whether as a result of new information, future events, or results, or otherwise.

For further information, please contact:

Trevor Burns, Investor Relations +1-289-910-0855

trevor.burns@cardiolrx.com



To view the source version of this press release, please visit

<https://www.newsfilecorp.com/release/147628>