

Press Release

FOR IMMEDIATE RELEASE

CRITICAL OUTCOME TECHNOLOGIES INC. REPORTS SECOND QUARTER 2009 FINANCIAL RESULTS

London, Ontario (December 18, 2008): Critical Outcome Technologies Inc. (TSX Venture: COT) today announced financial results for its second quarter and the six months ended October 31, 2008.

Selected Highlights

The Company is pleased to report positive results on its research and development programs and organizational developments. Selected operating highlights during the quarter include:

- The appointment of Mr. Michael Cloutier as Chief Executive Officer in October. Mr. Cloutier is a seasoned, senior executive with major pharmaceutical company background, experience and contacts, with his most recent role having been as a VP in Global Marketing at AstraZeneca.
- The signing of a Material Transfer Agreement in September with a major pharmaceutical company to advance up to six drug candidates from COTI's HIV-1 integrase inhibitor program on a cost-sharing basis. Synthesis was initiated on six compounds identified under this agreement during the quarter.
- The initiation of mechanism of action studies on COTI-219 in October. COTI-219 is a molecule
 on a different scaffold than the company's lead compound COTI-2 and shows positive in vitro
 and in vivo human cell line test results in various cancers.
- The successful synthesis and initial confirmatory in vitro testing of COTI-4A, an active analog of COTI-4 that provides an enhanced intellectual property position.
- The engagement of a major clinical research organization to oversee the completion of all remaining Health Canada enabling experiments and regulatory filings for COTI-2 to permit a multi-centered Phase 1B clinical trial in late 2009.

Financial Results

The Company reported a net loss of (725,002) or (0.02) per share compared to a net loss of (519,968) or (0.01) per share for the comparable quarter ended October 31, 2007. For the six months

ended October 31, 2008 the net loss is (1,583,773) or (0.03) per share compared to a net loss of (1,020,426) or (0.03) per share in the prior year.

Operating revenues of \$5,982 were recorded in the quarter with no revenues in the comparable prior year quarter. The increased loss of \$205,034 resulted from three main expenses; increased research and product development of \$267,282, amortization of the small cell lung cancer molecules acquired in fiscal 2008 of \$97,224, increased salaries and benefits of \$33,559 offset by a decrease in stock-based compensation of \$199,019 and a decrease in professional fees of \$29,912.

Financing activities during the quarter consisted of the exercise of 23,680 warrants exercised and common shares issued for gross proceeds of \$9,472. At October 31, 2008, the Company had cash, cash equivalents and short-term investments of \$5,235,773. Since the April 30, 2008 year end, the balance of cash, cash equivalents and short-term investments declined by \$977,936 from \$6,213,709 reflecting the use of cash in operations and the repayment of \$353,247 on a promissory note which matured on July 31, 2008.

More detailed operating and financial results can be found in the Company's financial statements and Management's Discussion and Analysis for the three and six-month periods ended October 31, 2008, which can be found on SEDAR at www.sedar.com.

About Critical Outcome Technologies Inc. (COTI)

COTI is formed around a unique computational platform technology called CHEMSAS®, which allows for the accelerated identification, profiling and optimization of targeted small molecules potentially effective in the treatment of human diseases for which current therapy is either lacking or ineffective. COTI's business is focused on the discovery and pre-clinical development of libraries of novel, optimized lead molecules for the treatment of specific cancers, HIV and multiple sclerosis. Currently, five targeted libraries of lead compounds are under active development: small cell lung cancer, HIV integrase inhibitors, acute adult leukemia, multiple sclerosis and colorectal cancer.

Forward-looking Statements

Information contained in this press release may contain certain statements, which constitute "forward looking statements" within the meaning of the Securities Act (Ontario) and applicable securities laws. These forward-looking statements, by their nature, are not guarantees of future performance and are based upon management's current expectations, estimates, projections and assumptions. Specifically, the engagement of a clinical research organization to oversee the completion of all remaining Health Canada enabling experiments and regulatory filings for COTI-2 to permit a multi-centered Phase 1B clinical trial in late 2009 is subject to change. For example, unfavourable test results, a decision to licence the compound to a third party or to co-develop the compounds with another company may change future outcomes. COTI operates in a highly competitive and regulated environment that involves significant risks and uncertainties, which could cause actual results to differ materially from those anticipated in these forward-looking statements. Management of COTI considers the assumptions on which these forward-looking statements are based to be reasonable, but because of the many risk factors, cautions the reader that actual results could differ materially from those expressed or implied in these forward-looking statements. Information in this press release should be considered accurate only as of the date of the release and may be superseded by more recent information disclosed in later press releases, filings with the securities regulatory authorities or otherwise.

For more information on COTI, visit www.criticaloutcome.com or contact:

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