Edinburgh, U.K. 15th January 2021

NuCana Presents Encouraging Data at ASCO GI for NUC-3373 in Heavily Pre-Treated Patients with Metastatic Colorectal Cancer

Promising Efficacy Signals Including a 62% Disease Control Rate and a Partial Response in Patients who had Progressed on Prior Fluoropyrimidine Therapy

Safety Profile Continues to be Favorable

Edinburgh, United Kingdom, January 15, 2021 (GLOBE NEWSWIRE) – NuCana plc (NASDAQ: NCNA) today announced interim data from the ongoing NuTide:302 study at the ASCO GI Conference, being held virtually January 15-17, 2021.

NuTide:302 is a three-part study investigating NUC-3373, NuCana's targeted thymidylate synthase inhibitor, in heavily pre-treated patients with metastatic colorectal cancer. The study is evaluating NUC-3373's optimal dose and schedule in combination with agents commonly used to treat patients with colorectal cancer and is assessing safety, pharmacokinetics and anti-cancer activity. NUC-3373 has been designed to overcome the main challenges associated with 5-FU and capecitabine, including cancer-resistance mechanisms which limit efficacy, off-target toxicity and administration burdens.

The ASCO GI presentation highlighted data from 37 patients treated in Part I of the study who received NUC-3373 either as monotherapy or in combination with leucovorin. Ten patient case studies highlighted NUC-3373's ability to stabilize disease and achieve prolonged durations of progression-free survival. Many patients achieved longer progression-free survival on NUC-3373 than they had on their prior line of therapy and five patients experienced tumor shrinkage. These patients included:

- A fourth-line patient who achieved a Partial Response with a 40% reduction in tumor volume;
- A third-line patient who achieved a 28% reduction in tumor volume after their disease rapidly progressed through all prior fluoropyrimidine-containing regimens.

Among the efficacy-evaluable population, a disease control rate of 62% was achieved.

In addition to these encouraging efficacy signals, the presentation compared the safety profile of NUC-3373 in Part I of the study with historical data for 5-FU and capecitabine in the front-line treatment of patients with colorectal cancer. NUC-3373 was well tolerated with no hand-foot-syndrome or neutropenia as well as lower rates of diarrhea, mucositis and stomatitis.

Dr. Andrew Coveler, Associate Professor at the University of Washington School of Medicine and Fred Hutchinson Cancer Research Center and an investigator in the NuTide:302 study, remarked: "I am encouraged by both the clinical activity and safety of NUC-3373. To observe this anti-cancer activity, including a Partial Response, in such a heavily pre-treated patient population is very promising. In addition, NUC-3373 has been well tolerated and its safety appears favorable when compared to 5-FU and capecitabine. As such, I look forward to advancing NUC-3373's development in patients with colorectal cancer."

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"We are very pleased with these additional data from Part I of the NuTide:302 study," said Hugh S. Griffith, NuCana's Founder and CEO. "It was particularly encouraging to observe tumor shrinkages, prolonged disease stabilization and a favorable safety profile in a patient population that had received at least two prior fluoropyrimidine-containing regimens. We look forward to continuing Part II of the study in which NUC-3373 is being combined with leucovorin and either oxaliplatin or irinotecan. Our objective is to replace 5-FU and capecitabine with NUC-3373 as the backbone of treatment for patients with colorectal cancer."

Details of the poster presentation are as follows:

Title:	A phase Ib study of NUC-3373 in combination with standard therapies in advanced/metastatic colorectal cancer (NuTide:302)
Session:	Colorectal Cancer
Abstract Number:	93

About NuCana

NuCana is a clinical-stage biopharmaceutical company focused on significantly improving treatment outcomes for patients with cancer by applying our ProTide technology to transform some of the most widely prescribed chemotherapy agents, nucleoside analogs, into more effective and safer medicines. While these conventional agents remain part of the standard of care for the treatment of many solid and hematological tumors, their efficacy is limited by cancer cell resistance mechanisms and they are often poorly tolerated. Utilizing our proprietary technology, we are developing new medicines, ProTides, designed to overcome key cancer resistance mechanisms and generate much higher concentrations of anti-cancer metabolites in cancer cells. NuCana's robust pipeline includes three ProTides in clinical development. Acelarin and NUC-3373, are new chemical entities derived from the nucleoside analogs gemcitabine and 5-fluorouracil, respectively, two widely used chemotherapy agents. Acelarin is in a Phase III study for patients with advanced biliary tract cancer and a Phase III study for patients with metastatic pancreatic cancer for which enrollment has been suspended. NUC-3373 is in a Phase I study for the potential treatment of a wide range of patients with advanced solid tumors and a Phase Ib study for patients with metastatic colorectal cancer. Our third ProTide, NUC-7738, is a transformation of a novel nucleoside analog (3'-deoxyadenosine) and is in a Phase I study for patients with advanced solid tumors.

Forward-Looking Statements

This press release may contain "forward-looking" statements within the meaning of the Private Securities Litigation Reform Act of 1995 that are based on the beliefs and assumptions and on information currently available to management of NuCana plc (the "Company"). All statements other than statements of historical fact contained in this press release are forward-looking statements, including statements concerning the Company's planned and ongoing clinical studies for the

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Company's product candidates and the potential advantages of those product candidates, including Acelarin, NUC-3373 and NUC-7738; the initiation, enrollment, timing, progress, release of data from and results of those planned and ongoing clinical studies, including NuTide:121; the Company's goals with respect to the development and potential use, if approved, of each of its product candidates; and the utility of prior non-clinical and clinical data in determining future clinical results. In some cases, you can identify forward-looking statements by terminology such as "may," "will," "should," "expects," "plans," "anticipates," "believes," "estimates," "predicts," "potential" or "continue" or the negative of these terms or other comparable terminology. Forward-looking statements involve known and unknown risks, uncertainties and other factors that may cause the Company's actual results, performance or achievements to be materially different from any future results, performance or achievements expressed or implied by the forward-looking statements. These risks and uncertainties include, but are not limited to, the risks and uncertainties set forth in the "Risk Factors" section of the Company's Annual Report on Form 20-F for the year ended December 31, 2019 filed with the Securities and Exchange Commission ("SEC") on March 10, 2020, and subsequent reports that the Company files with the SEC. Forward-looking statements represent the Company's beliefs and assumptions only as of the date of this press release. Although the Company believes that the expectations reflected in the forward-looking statements are reasonable, it cannot guarantee future results, levels of activity, performance or achievements. Except as required by law, the Company assumes no obligation to publicly update any forward-looking statements for any reason after the date of this press release to conform any of the forward-looking statements to actual results or to changes in its expectations.

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