**Data from Investigator-sponsored Trial of Mereo BioPharma's alvelestat in Bronchiolitis Obliterans Syndrome (BOS) Accepted for Presentation at American Society of Hematology (ASH) Annual Meeting**

**London and Redwood City, Calif., November 4, 2021** - Mereo BioPharma Group plc (NASDAQ: MREO) ("Mereo" or the "Company"), a clinical stage biopharmaceutical company focused on oncology and rare diseases, today announced that data from an investigator-sponsored study of alvelestat in patients with Bronchiolitis Obliterans Syndrome ("BOS") following hematopoietic stem cell transplantation ("HCT") will be shared in a poster presentation at the 2021 American Society of Hematology (ASH) Annual Meeting, being held December 11-14, 2021 in Atlanta, Georgia and virtually.

**Following are the details of the poster presentation:**

**Title:** Effects of Alvelestat, an Oral Neutrophil Elastase Inhibitor, on Elevated Elastase and Collagen Turnover Biomarkers in Patients with Bronchiolitis Obliterans Syndrome after Hematopoietic Cell Transplantation
**Date / Time:** Saturday, December 11, 2021, 5:30 – 7:30 p.m. EST
**Location:** Georgia World Congress Center, Hall B5
**Presenter:** Annie Im, MD, University of Pittsburgh, UPMC Hillman Cancer Center, Pittsburgh, PA

The poster abstract will also be available today, November 4, 2021 at 9am EDT in the November supplemental issue of Blood and online in the ASH 2021 meeting program: https://ashpublications.org/blood

The Phase 1b study of alvelestat, an oral neutrophil elastase inhibitor, was conducted under a Clinical Trial Agreement between Mereo and the National Cancer Institute and enrolled a total of seven patients with BOS and chronic GVHD following HCT. There was consistency of a suppressive effect on biomarkers of elastase activity and collagen turnover in 6 of 7 treated patients, all of whom had improved or stable lung disease. This was the first evidence of elevated elastase activity as detected by elastin breakdown in patients with BOS and chronic GVHD. Treatment with alvelestat was associated with progressive reduction of plasma desmosine levels over 8 weeks of within-subject dose escalation and reduction stimulated neutrophil elastase activity. The consistent suppression of elastase and of collagen synthesis/turnover biomarkers following alvelestat treatment is encouraging for its potential to impact progressive lung fibrosis in BOS and chronic GVHD.

BOS is an inflammatory condition that affects the bronchioles, the smallest airways in the lungs. As the disease progresses, the bronchioles may become damaged and inflamed, leading to extensive scarring and blockage of the airways. Allogeneic HCT is associated with significant morbidity and mortality and BOS following a lung transplant is the leading cause of re-transplantation and mortality.

**About Mereo BioPharma**
Mereo BioPharma is a biopharmaceutical company focused on the development and commercialization of innovative therapeutics that aim to improve outcomes for oncology and rare diseases. The Company has developed a portfolio of six clinical stage product candidates. Mereo's lead oncology product candidate, etigilimab (anti-TIGIT), has advanced into an open label Phase 1b/2 basket study evaluating anti-TIGIT in combination with an anti-PD-1 in a range of tumor types including three rare tumors and three gynecological carcinomas, cervical, ovarian and endometrial carcinomas. The Company's second oncology product, navicixizumab, for the treatment of late line ovarian cancer, has completed a Phase 1 study and has been partnered with OncXerna Therapeutics, Inc., formerly Oncologie, Inc. The Company has two rare disease product candidates: alvelestat for the treatment of severe Alpha-1 antitrypsin

deficiency (AATD), which is being investigated in an ongoing Phase 2 proof-of-concept study in the U.S. and Europe, for which the Company expects to provide an update in the fourth quarter of 2021, and setrusumab for the treatment of osteogenesis imperfecta (OI). In September 2020, the FDA granted Rare Pediatric Disease designation to setrusumab for the treatment of OI. In December 2020, the Company signed a license and collaboration agreement for setrusumab in OI with Ultragenyx Pharmaceutical Inc.

**Forward-Looking Statements**

This press release contains "forward-looking statements." All statements other than statements of historical fact contained in this press release are forward-looking statements within the meaning of Section 27A of the United States Securities Act of 1933, as amended (the "Securities Act"), and Section 21E of the United States Securities Exchange Act of 1934, as amended (the "Exchange Act"). Forward-looking statements relate to future events, including, but not limited to, statements regarding future clinical development, efficacy, safety and therapeutic potential of clinical product candidates, including expectations as to reporting of data, conduct and timing and potential future clinical activity and milestones and expectations regarding the initiation, design and reporting of data from clinical trials. Forward-looking statements are often identified by the words "believe," "expect," "anticipate," "plan," "intend," "foresee," "should," "would," "could," "may," "estimate," "outlook" and similar expressions, including the negative thereof. The absence of these words, however, does not mean that the statements are not forward-looking. These forward-looking statements are based on the Company's current expectations, beliefs and assumptions concerning future developments and involve risks and uncertainties that could cause actual results, performance, or events to differ materially from those expressed or implied in such statements. You should carefully consider the foregoing factors and the other risks and uncertainties that affect the Company's business, including those described in the "Risk Factors" section of its latest Annual Report on Form 20-F, reports on Form 6-K and other documents furnished or filed from time to time by the Company with the Securities and Exchange Commission. You should not place undue reliance on any forward-looking statements, which speak only as of the date hereof. The Company undertakes no obligation to publicly update or revise any forward-looking statements after the date they are made, whether as a result of new information, future events or otherwise, except to the extent required by law.

**Mereo BioPharma Contacts:**

**Mereo** **+44 (0)333 023 7300**

Denise Scots-Knight, Chief Executive Officer

Christine Fox, Chief Financial Officer

**Burns McClellan (Investor Relations Adviser to Mereo)** **+01 212 213 0006**

Lee Roth

**Investors**

investors@mereobiopharma.com