



Mallinckrodt Announces Data from a Multicenter Post Hoc Analysis of Terlipressin in Patients with Hepatorenal Syndrome-Acute Kidney Injury (HRS-AKI) at The Liver Meeting Digital Experience

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U.K. retrospective chart review examined potential predictors of treatment response including age, baseline AKI severity and concomitant use of albumin in patients with HRS-AKI

DUBLIN, Nov. 16, 2020 /PRNewswire/ -- [Mallinckrodt plc](#), a global biopharmaceutical company, today announced results from a post hoc analysis of a retrospective chart review study of terlipressin in patients with hepatorenal syndrome-acute kidney injury (HRS-AKI) conducted in 26 hospitals in the United Kingdom. HRS-AKI, also known as HRS-1, is an acute and life-threatening syndrome involving acute kidney failure in people with cirrhosis.¹ Results were presented during a poster presentation at The Liver Meeting Digital Experience, the annual meeting of the American Association for the Study of Liver Diseases (AASLD). The poster can be accessed [here](#) on the company's website.

Terlipressin is an investigational product and its safety and effectiveness have not yet been established by the U.S. Food and Drug Administration.

The retrospective chart review study included 250 hospitalized adult patients from 26 centers in the U.K. with a diagnosis of HRS-AKI who received terlipressin or other vasopressors. The majority of patients were treated with terlipressin (n=203) and were evenly distributed by baseline AKI severity: mild, 33 percent (SCr <2.25 mg/dL); moderate, 36 percent (SCr ≥2.25 mg/dL and <3.5 mg/dL); severe, 31 percent (SCr ≥3.5 mg/dL). The overall response rate among patients treated with terlipressin, including complete responses (SCr ≤1.5 mg/dL) and partial responses (SCr reduction ≥20 percent but SCr >1.5 mg/dL), was 73 percent and differed between the mild and moderate (79 percent and 78 percent) groups compared to the severe group (60 percent). The retrospective chart review study identified absence of a precipitating event, concomitant use of albumin and mild or moderate baseline AKI severity as predictors of overall response. Presence of encephalopathy was the only predictor of mortality (hazard ratio, 2.77; 95 percent confidence interval, 1.56 to 4.92) identified by the study.²

Other outcomes included need for dialysis, mortality, liver transplantation and adverse event rates. The limitations of this post hoc analysis of a retrospective chart review include a more heterogeneous HRS population than those in randomized clinical trials, sampling bias from conveniently selected centers, potential selection bias towards patients with known outcomes to the providers and under reporting of less severe adverse events.

"As a physician treating patients with difficult to treat conditions like HRS-1, it's important to continue to build on decades of research of investigational products like terlipressin that can advance our scientific understanding of potential treatment options for these very sick patients," said **Kevin Moore, M.D., UCL Institute of Liver and Digestive Health, Royal Free Hospital, University College London**.

Terlipressin is approved in many countries outside the United States, where it has been a standard of care for decades in the treatment of patients with HRS-1.^{3,4} Terlipressin, together with albumin, is currently the standard of care for HRS-1 in countries where it is available.⁵

HRS-1 has a median survival time of approximately two weeks and greater than 80 percent mortality within three months if left untreated.^{6,7} At present, there are no drug therapies approved for the treatment of HRS-1 in the U.S. or Canada.⁸ HRS-1 is estimated to affect between 30,000 and 40,000 patients in the U.S. annually.^{9,10}

"Mallinckrodt remains committed to furthering our understanding of HRS-1 and the potential of terlipressin to address HRS-1, a disease that is often a challenge to effectively diagnose," said **Steven Romano, M.D., Executive Vice President and Chief Scientific Officer at Mallinckrodt**. "The results from this U.K. study add to the extensive knowledge and data of the investigational product in the U.S."

This study was funded by Mallinckrodt.

About Terlipressin

Terlipressin is a potent vasopressin analogue selective for V1 receptors being investigated for the treatment of HRS-1 in the U.S. and Canada. It is an investigational product in these countries as the safety and efficacy have not been established with, nor has approval been granted by, regulatory authorities in either country. Terlipressin is approved for use outside the U.S. and Canada.

ABOUT MALLINCKRODT

Mallinckrodt is a global business consisting of multiple wholly owned subsidiaries that develop, manufacture, market and distribute specialty pharmaceutical products and therapies. The company's Specialty Brands reportable segment's areas of focus include autoimmune and rare diseases in specialty areas like neurology, rheumatology, hepatology, nephrology, pulmonology and ophthalmology; immunotherapy and neonatal respiratory critical care therapies; analgesics and gastrointestinal products. Its Specialty Generics reportable segment includes specialty generic drugs and active pharmaceutical ingredients. To learn more about Mallinckrodt, visit www.mallinckrodt.com.

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automatic e-mail and other notifications alerting them when new information is made available on the Investor Relations page of the website.

CAUTIONARY STATEMENTS RELATED TO FORWARD-LOOKING STATEMENTS

This release includes forward-looking statements with regard to terlipressin, including its potential impact on patients. The statements are based on assumptions about many important factors, including the following, which could cause actual results to differ materially from those in the forward-looking statements: satisfaction of regulatory and other requirements; actions of regulatory bodies and other governmental authorities; changes in laws and regulations; issues with product quality, manufacturing or supply, or patient safety issues; and other risks identified and described in more detail in the "Risk Factors" section of Mallinckrodt's most recent Annual Report on Form 10-K and other filings with the SEC, all of which are available on its website. The forward-looking statements made herein speak only as of the date hereof and Mallinckrodt does not assume any obligation to update or revise any forward-looking statement, whether as a result of new information, future events and developments or otherwise, except as required by law.

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