

## Hamilton Medical's INTELLiVENT<sup>®</sup>-ASV<sup>®</sup> mode designated as breakthrough technology

The advanced ventilation mode INTELLiVENT-ASV has demonstrated a reasonable expectation for providing more effective treatment and was therefore included in the FDA Breakthrough Device Program.

The FDA's Breakthrough Device Program is intended to help patients and healthcare providers in the United States receive more timely access to breakthrough technologies that provide for more effective treatment of life-threatening or irreversibly debilitating conditions. Clinical data<sup>1,2</sup> on the effectiveness of INTELLiVENT-ASV in reducing ventilator-induced lung injuries in ARDS patients and increasing adherence to lung-protective strategies in ICU patients gave the FDA grounds to include INTELLiVENT-ASV in the program.

With this mode, the clinician sets targets for PetCO<sub>2</sub> and SpO<sub>2</sub>, as well as limits for various controls, including PEEP and Oxygen, for the patient. INTELLiVENT-ASV then functions like a bedside assistant and adjusts the controls for CO<sub>2</sub> elimination and oxygenation within the rules of a lung-protective strategy, using both physiologic data from the patient and the clinician-set targets and limits. INTELLiVENT-ASV also manages the transition from passive to active patient and encourages the patient to breathe spontaneously. When the Quick Wean function is activated, it progressively decreases pressure support, screens the readiness-to-wean criteria, and provides an operator- configurable weaning protocol.

Hamilton Medical has also been granted an Investigational Device Exemption (IDE) for INTELLiVENT-ASV by the FDA. Preparations are currently underway for an international multicenter study to investigate the safety and efficacy of INTELLiVENT-ASV at clinical sites in Europe and the USA.

Existing studies have shown that tidal volumes, driving pressure and mechanical power delivered by INTELLiVENT-ASV are in line with current recommendations for lung-protective ventilation.<sup>1,3</sup> A comparison of ventilation modes showed it to rate best among all modes evaluated in terms of capabilities relating to safety, comfort, and weaning.<sup>4</sup>

INTELLiVENT-ASV is available exclusively on Hamilton Medical ventilators. For more information visit:

[www.hamilton-medical.com/Solutions/INTELLiVENT-ASV.html](http://www.hamilton-medical.com/Solutions/INTELLiVENT-ASV.html)

## References

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- 3 Arnal JM. Intensive Care Med Exp 2016, 4(Suppl 1):A602.
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## Picture legend



Doctor in ICU setting targets for INTELLiVENT-ASV mode on HAMILTON-S1 ventilator.

## About Hamilton Medical

In 1983, Hamilton Medical was founded with a vision: To develop Intelligent Ventilation solutions that make life easier for patients in critical care and for the people who care for them. Today, Hamilton Medical is a leading manufacturer of critical care ventilation solutions for a variety of patient groups, applications, and environments.

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