



Title	Support for the Hungate 1000 culture collection
Project Timeframe	Feb 2019 – Jun 2020
Countries Involved	New Zealand (AgResearch)
Aims	To revive, maintain, preserve, ensure availability of the Hungate 1000 culture collection strains to international researchers and the planning of transition of the Hungate 1000 culture collection to an internationally recognised commercial culture collection.
Research Highlights	<ul style="list-style-type: none"> • Undertook an initial stock-take and recording of the culture metadata in a Rumen Microbiology laboratory freezer catalogue system. • Divided the culture collections into two sets of cultures: a set of working cultures and a set of reserve cultures stored in two separate -80oC freezers for backup in case of freezer failure. • Established a detailed process with standard operating procedures for reviving the strains, checking purity, packaging the cultures for international transportation, and meeting all the regulatory and administrative requirements for shipping biological materials, including the completion of Material Transfer Agreements. • The Hungate1000 collection of >400 cultures were also checked for purity, and appropriately stored to ensure maintenance, viability and availability to researchers requesting the cultures. • Revived, purity checked, and shipped more than 200 cultures to 21 different research groups internationally, including the on-going delivery of the whole collection to the Ben Gurion University in Israel. • Developed a plan, timeline and budget to transfer the Hungate1000 collection, with the aim of ensuring its long-term availability and supply to the scientific community into the future. • Collaborations have been formed with international partners as a result of the culture collection (the USA, England, Germany, France, Japan, Ireland, and Israel). • The Hungate1000 Culture Collection is the single most impactful research output ever in New Zealand rumen microbiology.
Future Work	The Hungate1000 Culture Collection will be deposited at the German Collection of Microorganisms and Cell Cultures GmbH (Deutsche Sammlung von Mikroorganismen und Zellkulturen GmbH).