2022

First Workshop on NLP in Agriculture and Livestock Management

Proceedings of the Workshop

December 15, 2022

©2022 Association for Computational Linguistics

Order copies of this and other ACL proceedings from:

Association for Computational Linguistics (ACL)
209 N. Eighth Street
Stroudsburg, PA 18360
USA
Tel: +1-570-476-8006
Fax: +1-570-476-0860
acl@aclweb.org

ISBN 978-1-959429-38-8

Introduction

Currently, agriculture and livestock management are at a crossroads. There has been an increase in the world's population, a reduction in available farmland as well as competition for agricultural land from biofuels. Advances from traditional agricultural areas have been resisted by consumers and politicians, and consequently increases in productivity need to come from non-traditional areas to ensure that the world's population has access to basic nutrition at an affordable price. The Semantic and Natural Language Processing (NLP) community can assist the agricultural domain by providing unique insights from data or by providing greater clarity to current agricultural processes.

Agricultural and livestock researchers, in common with other domains, have access to large collections of documents such as scientific papers, news, social media data, etc. These textual documents can be analyzed and processed with NLP methods, supported by semantic knowledge, to resolve issues in digital agriculture and livestock management.

To date, the application of text mining and semantics in the agricultural domain remains underexplored. This Research Topic invites original research, surveys, and position papers that address issues in Agricultural Text Mining or Agri Semantics, in order to increase the visibility and application potential of this important and emerging research area.

Organizing Committee

Workshop Organizers

Manjira Sinha, IIT Kharagpur, India
Tirthankar Dasgupta, TCS Research, India
Sanjay Chatterjee, IIIT Kalyani, India

Program Committee

Program Committee

Manjira Sinha, IIT Kharagpur, India
Tirthankar Dasgupta, TCS Research, India
Sanjay Chatterjee, IIIT Kalyani, India
Adway Mitra, IIT Kharagpur, India

Table of Contents

Rice Cultivation in India – Challenges and Environmental Effects
Ushasi Bhattacharya 1

A custom CNN model for detection of rice disease under complex environment
Chiranjit Pal, Sanjoy Pratihar and Imon Mukherjee 5