

MustGrow Biologics Reports Positive Tobacco Field Trial Results Versus Synthetic Chemical “Chloropicrin”

- **Comparable efficacy and yield results with MustGrow’s natural mustard-derived biological products versus Chloropicrin.**
- **Field study funded via collaboration with a 3rd party research organization.**
- **MustGrow’s organic biopesticide is plant-based, harnessing the mustard seed’s natural defense mechanism to control diseases, insect pests and weeds.**

SASKATOON, Saskatchewan, Canada, April 12, 2021 – **MustGrow Biologics Corp. (CSE: MGRO) (OTC: MGROF) (FRA: 0C0) (“MustGrow”)** is pleased to announce successful field trial studies comparing MustGrow’s mustard plant-based biopesticide versus one of the leading soil fumigation synthetic chemicals, *Chloropicrin 100 band* (“**Chloropicrin**”). As previously [reported in June 2020](#), MustGrow’s tobacco crop protection program is being funded by and conducted through a 3rd party research organization (“**3rd PRO**”).

The 3rd PRO conducted a field study to evaluate the effectiveness of MustGrow’s biofumigant and bionematicide applied pre-transplanting at rates of 5.0 gal/acre (46.77 L/ha) and 2.5 gal/acre (23.38 L/ha) and subsequently 28 days after transplanting, at a rate of 2.5 gal/acre (23.38 L/ha). The MustGrow treatments were compared to Chloropicrin. Plant growth, phytotoxicity, *nematodes* (forms of parasitic roundworms) and soil fungi (*Fusarium* and *Pythium*) were evaluated periodically, and dry leaf yield weight was assessed at harvest.

Overall, the 3rd PRO found similar or comparable efficacy and yield results evaluating MustGrow’s natural mustard-derived biological products versus the widely-used synthetic fumigation chemical, Chloropicrin. MustGrow and the 3rd PRO will further evaluate MustGrow’s products during the 2021 growing season to assess tobacco leaf yield and chemistry data once the tobacco leaves have been *cured*. Field trial data will be used to potentially achieve a product registration to control diseases and insect pests that affect tobacco production.

The need for biopesticides is increasing as farmers, consumers and regulators seek ‘natural biological’ alternatives to synthetic chemical pesticides. Several harmful synthetic chemicals are being banned or deregistered, leaving tobacco farmers with limited viable crop protection options. MustGrow believes these field trial achievements represent an opportunity to extend our core product technologies into the US\$28 billion tobacco agriculture market⁽¹⁾.

Chloropicrin is a widely-used synthetic chemical in agricultural soil fumigation. As a potent skin irritant, Chloropicrin toxicity through dermal, inhalation and eye exposure can induce vomiting, bronchitis, internal corrosive effects, and fatal pulmonary edema in humans⁽²⁾.

Nematodes infect a tobacco plant’s root system which reduces water and nutrients movement into the plant, resulting in immature plants and lower yields. Yield-destruction from nematodes has been reported from eleven tobacco-producing countries on four continents, including the United States and Canada⁽³⁾. Despite extensive synthetic chemical pesticide use to combat this parasitic disease, nematodes continue to cause damage to global tobacco farming, an industry size estimated at US\$28 billion (US\$1.1 billion in the United States)⁽¹⁾. The global tobacco crop loss from nematodes damage is estimated at US\$4.2 billion, or 15%⁽⁴⁾, resulting in an estimated loss in infected fields of US\$1,000 per acre⁽⁵⁾.

Sources:

- (1) World Bank, Statistica
- (2) ScienceDirect.com
- (3) Virginia Tech - Virginia Polytechnic Institute and State University
- (4) Plant Nematode Interactions. Chapter 22: Tobacco
- (5) College of Agricultural & Environmental Sciences University of Georgia.

About MustGrow

MustGrow is a publicly traded (CSE: MGRO) (OTC: MGROF) (FRA: 0C0) agriculture biotech company focused on providing natural science-based biological solutions for high value crops, including fruits & vegetables and other industries. MustGrow has designed and owns a U.S. EPA-approved natural solution that uses the mustard seed's natural defence mechanism to protect plants from diseases and insect pests. Over 110 independent tests have been completed, validating MustGrow's safe and effective signature products. The product, in granule format, is EPA-approved across all key U.S. states and by Health Canada's PMRA (Pest Management Regulatory Agency) as a biopesticide for high value crops such as in fruit & vegetables. MustGrow has now concentrated a mustard extract biopesticide in liquid format, TerraMG, and with regulatory approval, could be applied through standard drip or spray equipment, improving functionality and performance features. In addition, the Company's mustard-derived extract technologies could have other applications in several different industries from pre-plant soil treatment, to weed control, to post harvest disease control and food preservation.

The Company has approximately 42.8 million basic common shares issued and outstanding and 50.6 million shares fully diluted. For further details please visit www.mustgrow.ca.

ON BEHALF OF THE BOARD

"Corey Giasson"

Director & CEO

Phone: +1-306-668-2652

info@mustgrow.ca

Forward-Looking Statements

Certain statements included in this press release constitute "forward-looking statements" which involve known and unknown risks, uncertainties and other factors that may affect the results, performance or achievements of MustGrow.

Generally, forward-looking information can be identified by the use of forward-looking terminology such as "plans", "expects", "is expected", "budget", "estimates", "intends", "anticipates" or "does not anticipate", or "believes", or variations of such words and phrases or statements that certain actions, events or results "may", "could", "would", "might", "occur" or "be achieved".

Forward-looking statements are subject to a number of risks and uncertainties that may cause the actual results of MustGrow to differ materially from those discussed in such forward-looking statements, and even if such actual results are realized or substantially realized, there can be no assurance that they will have the expected consequences to, or effects on, MustGrow.

These risks are described in more detail in MustGrow's Prospectus and other continuous disclosure documents filed by MustGrow with the applicable securities regulatory authorities and available



at www.sedar.com. Readers are referred to such documents for more detailed information about MustGrow, which is subject to the qualifications, assumptions and notes set forth therein.

This release does not constitute an offer for sale of, nor a solicitation for offers to buy, any securities in the United States.

Neither the CSE nor its Regulation Services Provider (as that term is defined in the policies of the CSE) accepts responsibility for the adequacy or accuracy of this release.

© 2021 MustGrow Biologics Corp. All rights reserved.