

May 7, 2015

ENHANCING POLLINATOR HEALTH
Ministry of the Environment and Climate Change
Climate Change and Environmental Policy Division
Strategic Policy Branch
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**Submission: Regulatory Amendments to Ontario Regulation 63/09
under the Pesticides Act to Reduce the Use of Neonicotinoid
Insecticides**

The Canadian Seed Trade Association (CSTA) represents 130 companies involved in all aspects of the seed industry. Our members work with over 50 different crop kinds and are engaged in all production systems: organic, conventional and biotechnology. Our members range from single farm family retailers to large multinational firms. They are involved in all aspects of the seed industry; plant breeding and research, production, marketing and distribution, packaging, conditioning and international trade. The Canadian seed industry contributes \$5.6 billion to the Canadian economy annually, with exports valued at \$450 million and employing over 57,000 Canadians, many of those in Ontario.

It is estimated that 9 out of every 10 bites of food taken by people around the world start with the planting of a seed. Seed is the driver of the innovation that the world's farmers will need to feed, fuel and clothe a world population that is expected to reach 9.3 billion in fewer than 40 years, while facing the challenges of climate change and competing demand for water, land and resources.

As an association we support the Government of Ontario's goal of protecting and enhancing pollinator health. However, we do not support the Ontario Government's proposed approach to achieving its goal as was first outlined in the *'Pollinator Health Action Plan'* and has subsequently been introduced as draft regulations entitled; *'Regulatory Amendments to Ontario Regulation 63/09 under the Pesticides Act to Reduce the Use of Neonicotinoid Insecticides'*

CSTA takes pride in well researched input to government consultation processes. It is very unfortunate that the Government of Ontario chose only a 45 day public consultation period. This extremely short time frame; combined with the fact that the comment period deadline of May 7 falls in one of the busiest times of the year for the seed industry, retailers and their farmer customers; will not facilitate meaningful participation by the sector that will be the most affected by the regulations.

The Ontario Ministry of Agriculture, Food and Rural Affairs website even notes that the first 10 days of May are the ideal time for the planting of corn¹ and soybeans². Many smaller Ontario based CSTA member companies have expressed significant concerns that they won't be able to fully participate in the comment period due to the associated timelines.

CSTA is also very concerned with the July 1, 2015 date for the implementation of these regulations. This will not allow adequate time to thoughtfully review the submissions, seek clarification from stakeholders and make the necessary changes that will come from the consultations

Our organization gets its direction from its 130 members across Canada. However given the challenging time frame, the presentation was prepared without the ability to properly solicit input from our members.

The submission was also prepared based on many unanswered questions. CSTA's Ontario corn and soybean company members raised a number of questions during the OMAFRA and MOECC "Technical Briefing", which remain unanswered including:

- What constitutes a vendor?
 - Who bears the increased liability if recommendations are made in error or if a producer does not comply?
- How will crop insurance be impacted?
 - Increased replant claims
 - Reduction in guaranteed on-farm yields
- What will happen to current treated seed inventory?
- What if a grower is unable to get a pest assessment done?

We believe these are all very serious questions, and that a proper assessment of the proposed regulations cannot be made without a clear understanding of these issues.

Enhancing Pollinator Health

It is well known and commonly understood that pollinator health is complex and multi-factorial and yet the regulatory proposal which was designed to enhance pollinator health is entirely focused on pesticides and more specifically neonicotinoid insecticide treated seed. The public consultations the Ontario government held in late 2014 clearly emphasized that there was a need to introduce regulations to further enhance pollinator health.

The discussion document that preceded the draft regulations formally recognized 4 stressors that impact pollinator health:

- 1) Pollinator Habitat and Nutrition
- 2) Diseases, Pests and Genetics
- 3) Pesticide Exposure
- 4) Climate Change and Weather

While the proposal recognizes that there are multiple stressors impacting pollinator health the regulatory proposal only focuses on one very specific class and use of pesticides. To solve an issue that is complex and multi-factorial by focusing on only one stressor is not scientifically defensible and will cause significant economic hardship for Ontario seed companies, retailers

and farmers; will have a negative impact on the environment; and is unlikely to enhance pollinator health..

We strongly urge the Government of Ontario to work closely with stakeholders to draft a plan that addresses all of the issues impacting pollinator health. An effective regulatory proposal must including a plan to address all of the factors that impact pollinator health:

- Parasites: Varroa mites are often cited as the number one issue facing commercial beekeepers
- Diseases: e.g. Nosema
- Technology: There are very few in-hive treatment products currently available
- Nutrition: Lack of appropriate food at appropriate times
- A lack of genetic diversity within bee stocks
- Climate change and associated changes in habitat and forage
- Pesticides and interactions with modern agriculture, including products used in hive by beekeepers
- Other stress-inducing problems such as colony transport and weather
- Queen quality
- Beekeeper Best Management Practices

Science Based Decision Making

In order to be successful and remain competitive as an industry, we rely on government and regulators at every level to make decisions based on sound, reputable science. Sound scientific principles are measurable, reproducible and predictable. Regulatory assessments and approval processes based on science ensure that all products are assessed consistently, giving confidence to consumers and to the developers of innovation.

The Ontario government's current regulatory proposal is based on a very loose interpretation of the precautionary principal that directly links the use of neonicotinoid treated seed and honey bee overwintering mortality rates. Despite numerous requests from CSTA and other value chain groups, no data or evidence has been provided to confidently link an 80% reduction in acres treated with neonicotinoids to a 15% reduction in overwintering losses of honey bees.

In fact on November 25, 2014; the day that the Government of Ontario announced that it was planning to significantly limit the availability of an important tool in modern agriculture; Health Canada's Pest Management Regulatory Agency (PMRA) issued a report stating that there was not sufficient information to draw conclusions regarding a link between negative colony effects and potential neonicotinoid exposure.

PMRA's scientific report found that the number of bee death incidents reported during planting in Canada was down by 70% in 2014 compared to 2013. In Ontario the number of incidents reported during planting was down even further, by 79% in 2014 compared by 2013.

In its report PMRA also noted that 72 percent of the bee-yards reporting post-planting colony effects were reported by three beekeepers, which contributed significantly to the number of yards reported during that timeframe.

CSTA and the seed company members that we serve request that the Ontario Government defer to PMRA when it comes to regulating pesticides. The PMRA has the mandate and expertise to make sound science based decisions based on a wide body of evidence. PMRA is the only agency that is legally obligated to make decisions based on scientific rigor.

There are also a number of very important and worthwhile studies underway regarding both pollinators and neonicotinoid seed treatments. However good science takes time, it requires reviewing data over more than one growing season to ensure accuracy of the findings. By rushing forward with a non-science based regulatory proposal the Ontario government is undermining research currently underway.

Assessment Protocol

It is the opinion of many agronomists and Certified Crop Advisors (CCA) that the protocol outlined in the draft regulations for determining insect pressure is too rigid and not founded on sound science. OMAFRA recently published a pest methodologies and thresholds document entitled '*A Guide to Early Season Field Crop Pests*', based upon the best science available. The proposed assessments in the draft regulations appear not to follow the government's own official publications. At minimum, the proposed regulations should follow the established methodologies and thresholds as set out in *A Guide to Early Season Field Crop Pests*.

The scope of the pest assessment prescribed in the draft regulations does not include all of the pests for which neonicotinoid seed treatments are recommended to control, e.g.: bean leaf beetle, flea beetle, cut worm and soybean aphid. It also doesn't take into account all of the pests against which neonicotinoids are federally approved for use.

Timing

In order to implement the proposed regulations, pest risk assessments must be conducted to determine the presence of crop damaging insects. A proper assessment of pest pressure must be conducted in the spring in order to scout for soil borne insects when they are present and could cause damage to seed and germinating plants. In the summer and fall, insects like wireworms and grubs have typically migrated deeper into the soil or have pupated to the adult stages of their life cycles.

The 2015 window for pest assessments is very quickly closing, and without a pest assessment protocol and training for growers yet in place, it stands to reason that the earliest that proper and thorough scouting and identification can begin is in the spring of 2016, in advance of the 2017 growing season.

Third party Assessment

The feedback that we have received is that Ontario farmers should be permitted to do their own pest assessments, if required. To insist on a third party assessment does not take into account the high degree of knowledge, education and sophisticated tools employed on the modern Ontario farm. No one knows Ontario farms better than the farmers who live and work on the land. Farmers make informed decisions and judgments every day on how best to use their land in a way that maximizes yield and provides the highest level of environmental stewardship.

Farmers in Ontario and across Canada are environmentalists. They have to be. Their livelihoods depend on the health of the environment in which they operate.

While CSTA does not believe anyone other than farmers are better positioned to conduct pest assessments, if non-farmers are going to be required, we encourage the government to consider Ontario's pool of Certified Crop Advisors. CCAs are well trained and knowledgeable, are respected in the farm and academic communities, and operate based on clear Code of Ethics. However the insistence in the proposed regulations that assessments be conducted by

independent third party assessors eliminates most CCAs because they are affiliated with seed companies, retailers or other agribusinesses.

Economic Harm

There is no question that the proposed regulations will result in significant economic harm to the Ontario agriculture value chain. According to a recently commissioned study by RIAS Inc., using internationally accepted approaches to standard cost modeling (SCM) and sound regulatory impact analysis (RIS), the cost to comply with the proposed regulations is significant. The study concludes that it will cost Ontario farmers more than \$24 million each year to comply with the proposed regulation in addition to an annual reduction in farm income of \$880 million., The result will be an Ontario industry that produces 2.6 million fewer tons of corn and 1 million fewer tons of soybeans each year.³

The value of treated corn and soybean seed inventory currently in storage with Ontario seed companies is significant. If it cannot be sold into the market within the next two years, and/or is not exempted from the current regulations, it will need to be disposed of in municipal landfills. CSTA's Ontario corn and soybean seed company members estimate that the value of the current treated corn and soybean inventory in Ontario to be anywhere from \$50 to 100 million dollars. In addition to the lost income that will result from the need to discard seed, companies will also incur very substantial costs to replace the inventory in order to supply the market.

Increased Seed Company Resources

These proposed regulations add significant new operating costs for corn and soybean seed companies operating in Ontario, including but not limited to:

- Cost to license both the business and sales representatives as ‘Vendors’
- Cost for staff time to file, compile, track and submit all of the necessary sales information of treated and untreated seed to MOECC
 - It is estimated that many smaller seed companies will need one staff person full time in the medium term ensuring compliance with the regulations and the necessary administrative work they entail. Larger companies may be able to spread the work over a larger workforce and not have to hire staff which creates an advantage for larger companies
- Cost to change, upgrade and maintain IT systems to ensure compliance with the regulations
- Additional storage space to maintain the minimum five years worth of environmental assessments and sales information.
- Increased logistics costs associated with increased inventory management in both corn and soybeans
- Reduced availability of certified U.S. produced seed to meet customer needs in Canada given both compliance timelines and concerns around uncertainty in the Ontario market
- Significant staff time spent explaining the regulatory changes to customers
- The seed industry will need to produce additional seed supplies to be sold to farmers as replant seed for crops lost to insect pressure

Given a lack of clarity in both the regulations and during the 'Technical Briefing' it is still unknown what these additional costs will mean to bottom lines.

Increased Environmental Cost

It is well understood that the use of seed treated with insecticides is the least environmentally intrusive measure for controlling insects that are an annual concern in many crop types, including corn and soybeans, and as a result are an important tool for many producers. Safe and targeted use of seed treatments reduces the amount of chemical used on large areas of farmland by reducing or eliminating the use of foliar sprays and allowing for a precision agricultural operation. Farmers who are not able to purchase neonicotinoid treated corn and soybean seed will have to turn to alternative methods to manage insect pressure: in-furrow or foliar applications, both of which are more expensive and less environmentally friendly.

Precision agriculture means that farmers do not have to till their land before planting the crop. No-till farming practices are proven to protect fragile soils; reduce erosion and soil compaction while protecting soil nutrients and allowing natural cover crops to grow. No and low till systems also use less fuel, reducing Ontario's agriculture carbon footprint. These regulations will require farms across the province to till the land extensively before planting to raise the soil temperature and remove organic matter left in the field where insects are most prevalent, releasing stored carbon. The additional fuel that will be required to work the soil will not only increase farm costs but will increase Ontario's carbon footprint

Ontario farmers will face significant new costs under the current draft regulations. They will be required to hire 'pest assessors' paying currently unknown fees to conduct tests for each farm unit as defined by the draft regulations. In many cases where farmers do not initially meet the stringent requirements necessary to purchase treated seed they will have to purchase additional seed to try and recover yield loss from insect pressure. All of these added fees and the increased uncertainty that will be created by the proposed regulations could result in the elimination of some farm operators who cannot afford the additional costs and the risks associated with these regulations.

The inability to use a valuable crop protection tool: seed treated with neonicotinoid insecticides; will almost certainly result in reduced yields and a downward slope in guaranteed yields under the Ontario crop insurance program. The result will be less effective and more expensive crop insurance policies.

Potential for Restructuring of the Ontario Seed Industry

Currently over 50% of the corn and soybean seed sold in Ontario is by farm retailers. These are often family run businesses that use the income from seed sales to supplement their income to continue to run family farm operations.

The regulations could result in the elimination of many family farm retailers whose margins simply will not allow them to operate given the extra resources needed to just comply. If farm based retailers are driven out of business there is a real potential for a further consolidation of the seed sector in the hands of larger retailers.

Consolidation could also occur in the number of available corn and soybean hybrids and varieties. Given the logistical requirements of tracking and information management required for each hybrid and each variety, some Ontario companies have signaled that a simplification of their product offerings may be necessary.

The lack of certainty around science based decision making in Ontario will make it an uncertain place to invest and do business.

Class 12

The decision to describe treated corn and soybean seeds as a pesticide in subsection 8.1 of the draft regulations and therefore regulate the seed is not appropriate. *Canada's Seeds Act* defines a seed as '*any plant part of any species belonging to the plant kingdom, represented, sold or used to grow a plant.*' Neonicotinoid pesticides do not belong to the plant kingdom; they are however registered under the Canada Pest Control Products Act, corn and soybean seed are not.

The *Ontario Pesticides Act* defines pesticides as '*any organism, substance or thing that is manufactured, represented, sold or used as a means of directly or indirectly controlling, preventing, destroying, mitigating, attracting or repelling any pest or of altering the growth, development or characteristics of any plant life that is not a pest and includes any organism substance or thing registered under the Pest Control Products Act (Canada).*'

It is the registered plant control products that are and should be regulated, not the seed. It is therefore not appropriate to characterize a treated seed as a pesticide.

CSTA Request

The Canadian Seed Trade Association and its member companies have always been committed to working with the Ontario government to find a workable, long term, science based solution to this issue that allows for the success of the apiculture and agriculture industries in the province, while supporting the farmer customers that our members serve. In CSTA's submission to the government of Ontario in response to the 'Enhancing Pollinator Health' discussion document we requested that the government:

- 1) Conduct a thorough cost benefit analysis before proceeding with the approach outlined in the Pollinator Health Discussion Paper.
- 2) Return to the Pollinator Task Force and collaborate on real solutions to protect pollinators and the environment.
- 3) Abandon the goal to reduce neonicotinoids by 80% in Ontario and support an agri-industry led approach that will work for the complexities of modern agriculture and apiculture
- 4) Ensure that neonicotinoid treated corn and soybeans not be placed in a new Class 12 under the Pesticides Act

Unfortunately the Ontario government chose not to act on any of our requests when it developed its '*Regulatory Amendments to Ontario Regulation 63/09 under the Pesticides Act to Reduce the Use of Neonicotinoid Insecticides*'. CSTA therefore requests the following:

1. Regulatory processes have traditionally required a thorough understanding and characterization of the needs of the industry; the economic and environmental impacts and the potential long term implications of the proposed regulations. Whether it is the result of a short time frame, or a lack of desire to follow traditional process, these

proposed regulations do not.

It is very important that the Ontario government give due consideration to its own precedents and allow for adequate time for the public consultation as well for analyses of the submissions. The imposition of an implementation date so close to the end of the public consultation period is not in keeping with past Ontario EBR postings, including:

- a. EBR posting 012-1394 *Water Supply Well - Requirements and Best Management Practices Manual* where a policy decision took 379 days with just two comments having been received through the EBR process⁴.
 - b. EBR posting 012-1559 *Reducing Coal Use In Energy-Intensive Industries* where a regulation decision took 318 days with just 77 comments received through the EBR process⁵.
 - c. EBR posting 011-8075 *Regulatory Discussion Paper under the Nutrient Management Act, 2002, to allow for the Land Application of Nutrient Feedwater in Ontario* where a regulatory decision took 614 days with just 12 comments received through the EBR process.⁶
2. That the EBR comment period be extended until June 30, 2015 to allow for adequate participation from the Ontario Agriculture sector, as has been done with other EBR items including EBR registry number 011-7696: *Proposed approaches to the implementation of the Endangered Species Act*.

In support of our Ontario corn and soybean company members, and in review of the proposed regulations, CSTA strongly recommends that the following steps be taken before regulations are finalized and implemented:

3. Establish a process that includes farm and industry organizations, to develop a comprehensive pollinator action strategy. Consultations conducted by the seed sector, and by the National Bee Health Roundtable with beekeepers across Canada have clearly concluded that bee health is a comprehensive subject and that neonicotinoids are not at the top of the list in terms of issues affecting bee health. In fact many beekeepers have clearly stated that the elimination of neonicotinoids would increase their concerns, not alleviate them.

This process could bring crop producers and beekeepers together in a constructive dialogue towards a common objective, rather than the current divide that is threatening crop agriculture in Ontario. The Grain Farmers of Ontario (GFO) have already developed a Pollinator Health Blueprint with input from a diverse cross section of the agriculture and apiculture industry that could serve as a starting point for a meaningful dialogue.
4. Re-evaluate clauses related to the requirement for third party assessors. The proposed regulations are not only onerous but appear to disregard the knowledge and professionalism within the agriculture industry in Ontario today.
5. Study the impact of the restriction of neonicotinoid use by the European Union on crop production and bee health and the subsequent decision to allow member countries to re-evaluate its moratorium on neonicotinoids.
6. Take a comprehensive approach that includes government, industry and academics to develop and test Integrated Pest Management (IPM) systems for corn and soybean production.
7. Withdraw the proposal to class treated corn and soybean seed as a Class 12 pesticide.
8. At the minimum address key outstanding concerns from the seed industry including:

- a. The definition of a vendor
- b. Who is liable where crop losses occur from an erroneous assessment
- c. Update on discussions with Crop Insurance related to replant coverage
- d. Exemption for treated inventory currently in seed warehouses given this is the largest asset on the books for most seed companies
- e. Written confirmation that seed production in both corn and soybeans is exempt going forward
- f. Exemption for growers who cannot access an assessor given the restrictions on assessor qualifications currently in the regulations

Unprecedented Industry Action

CSTA and our member companies recognized early on that steps needed to be taken to mitigate risk to pollinators during the planting of neonicotinoid treated corn and soybean seed. The decision to take action was industry led and driven and it resulted in unprecedented cooperation and collaboration amongst value chain stakeholder groups.

In July, 2013 CSTA facilitated the creation of a '*Seed Applied Insecticide and Pollinator Health Value Chain Coalition*'. The industry led coalition brings together grower groups, developers, applicators, marketers and users of seed treatments and treated seed who are committed to maintaining the highest possible standards for the development, application and use of all federally approved crop production inputs, including neonicotinoid seed treatments.

In August, 2013 the Coalition sent a formal letter to the Federal and Provincial Ministers' of Agriculture and the Environment that outlined the Canadian agriculture industry's commitment to working with the entire value chain and our federal and provincial regulators to find a workable, non-regulatory solution to protecting and enhancing pollinator health. In March, 2015 an even broader cross group of agriculture associations again wrote a formal letter to follow up on the commitments that were made.

(See Appendices 1 and 2 at the end of document for the letter sent to the Ontario Minister of Agriculture and the Minister of Environment)

Since making our commitments known, CSTA and our members have been working diligently and collaboratively with the entire value chain to ensure that the technology carried by seed, such as insecticides, is used in a responsible manner to mitigate risk to pollinators.

CSTA and our members specifically have undertaken six key initiatives to help ensure that pollinators and the environment are protected and those farmers are able to continue to access the tools that they need to grow the crops that Canadian's rely on for food, fuel and fiber:

Conclusion

CSTA and its member companies have been very engaged on the pollinator health issue. With a genuine desire to develop mutually beneficial solutions, we have dedicated significant time and resources to working with policy makers, regulators and value chain stakeholders to ensure that every reasonable step is being taken to mitigate risk to pollinators. The seed industry has made considerable effort to mitigate risk to pollinators while ensuring that Canadian growers have access to the technologies that they need to produce food in a safe, sustainable and environmentally friendly way.

CSTA's member companies are stewards of seed and the technology that seed carries. The seed sector takes its responsibilities very seriously and understands that it has a responsibility to ensure that seed and seed technology are used in a way that contributes to an abundant and safe food supply, a vibrant agricultural economy and a healthy environment.

It is our impression that the government of Ontario's proposed regulations places the burden of implementing an incomplete and non-science based regulatory system solely on the agriculture industry. In order to effect positive change, a genuine and sincere collaborative process is needed and is expected moving forward.

cc:

Hon. Glen Murray, Minister of Environment and Climate Change

Hon. Jeff Leal, Minister of Agriculture, Food and Rural Affairs

Hon. Kathleen Wynne, Premier of Ontario

Hon. Charles Sousa, Minister of Finance

Hon. Brad Duguid, Minister of Economic Development, Employment and Infrastructure



canolacouncil
OF CANADA



CANADIAN
CANOLA GROWERS
ASSOCIATION



August 12, 2013

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Honourable Jim Bradley
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Dear Ministers' Wynne and Bradley,

The Canadian Agriculture and Agri-food system makes a significant contribution to the Canadian economy, directly providing one in eight jobs, employing 2.1 million people and accounting for 8.0% of total GDP.

In order to produce an abundant supply of high quality products for food, feed and industrial uses farmers need to have access to the latest technologies and production tools. As participants in the value chain, we are committed to providing and using this technology in a sustainable and responsible manner. The undersigned organizations are committed to maintaining the highest possible standards for the development, application and use of all crop production inputs, including seed treatments.

We all have a vested interest in the health and wellbeing of pollinators. They are critical for the production of many crops and for the overall success of the Canadian agriculture industry. As an industry we agree that bees and other non-target organisms should not come in to contact with seed-borne insecticides, such as neonicotinoids and we are committed to mitigating any potential risk to bees from dust generated during planting. As technology developers, seed treaters, seed and seed treatment marketers, and users of the technology, we have a role to play in ensuring that seed-applied insecticides are used in a manner that minimizes the risk of pollinator exposure.

Specifically we commit to:

- continue to work together with regulators and policy makers, to develop and implement measures and practises that will substantially reduce the dust generated from planting insecticide-treated seed;
- inform, educate and train those who choose insecticide-treated seed on when and how to safely use the technology;
- offer untreated seed to those who may decide not to use the technology; and

- engage the beekeeper community to understand the challenges they face as integral components of our agricultural industry.

Seed-Borne Insecticides bring Value to Farmers and to the Environment

By 2050, the world's farmers will need to double their food production while challenged by competition for land and water and by climate change. Seed-applied insecticides, or seed treatments, offer real and tangible benefits to the value chain by increasing productivity, facilitating sustainable farm incomes, and targeting the product where it is most effective.

Farming practices have changed. In order to extend the growing season and maximize yield, many crops are planted earlier in the year in soils that are often cold and wet. This exposes the seed and seedling to a range of potentially devastating pests including those that carry bacterial and viral diseases that could destroy a harvest. Seed-applied insecticides, like neonicotinoids, help protect the seed and seedling against these pests during the most vulnerable period, giving the seed the chance to grow and flourish into a healthy crop.

Seed-applied insecticides provide a real economic benefit to Canadian farmers. The use of seed-applied insecticides has been proven to significantly increase production, with a positive impact on farm income. For example, trials conducted in Ontario and Quebec from 2002-2007 showed that seed-applied insecticides helped to boost average corn yields by 4.2 to 13.3 bushels per acre, which translates to an increase of \$21 to \$67 per acre for the grower. This represents between \$63 and \$201 million for corn growers in Canada in 2012 (based on 3 million acres at \$5.05/bu corn). Similar trials in soybeans showed an average yield increase of 2.1 to 6.8 bushels per acre, resulting in an increase of \$26 to \$108 per acre for the grower. In addition to increased productivity and profitability, evidence also suggests that seed treatments enhance plant health and vigour while improving germination and creating a more uniform plant stand.

Seed treatments are a highly efficient and targeted form of crop protection technology that is more environmentally friendly than the alternative insecticide application methods. Precise amounts of insecticide are applied directly to the seed which is then planted in the ground, minimizing the likelihood that non-targeted organisms, such as bees, are exposed. The alternative to using seed-applied insecticides are broadcast/foiar sprays or in-furrow treatments, which are less targeted and require more chemicals to treat the same amount of farmland. For example, the amount of seed-borne insecticide used is typically less than 10% of that applied in-furrow and less than 1% of that from a broadcast spray treatment. Depending on the crop and pests in the area, seed treatments can reduce the number of foliar sprays by up to 4 applications.

The Value Chain Has a Role

As the developers, applicators, marketers and users of seed treatments and treated seed, we take our stewardship obligations very seriously. We have a responsibility to ensure that the technology is being used in a safe and responsible way. In light of recent events, our industry has taken additional steps to further protect bees from potential risks from unintended exposures to pesticides from treated seeds and is confident that these efforts will have a positive and lasting effect. A recent international meeting of regulators, including Canada's Pest Management Regulatory Agency (PMRA) and industry stakeholders, hosted by the United States Environmental Protection Agency (US EPA), concluded that activities currently underway in our industry would mitigate the risk to bees from planting dust. Some of these efforts include:

- 1. Promotion of Best Management Practices:** Best Management Practices (BMPs) for Planting Treated Seed, have been developed, and are being actively promoted along the value chain.

2. **Labeling:** All insecticide treated seed bags on the market in 2014 will contain additional text reminding growers that the seeds have been treated with an insecticide and directing them to follow BMPs to reduce pollinator exposure to dust at planting.
3. **Improved Technology:** Substantial resources have been dedicated to improving seed coating quality, seed flow lubricants, and planting equipment to help keep the insecticide on the seed in order to substantially reduce dust. Initial testing indicates that replacing traditional lubricants could reduce total dust by up to 90% and total active ingredient in the dust by up to 60%.

Some of these innovations have already been introduced and the plan is for others to be available for broad use by the industry beginning in 2014.
4. **Lifecycle Stewardship:** Additional standards are being developed, and will be enforced by the industry, around the handling, storage and use of seed treatments and treated seed, from development to disposal of seed and seed bags.
5. **Giving Farmers Choice:** We will continue to ensure that farmers have access to a range of products including untreated seed, fungicide-only treated seed, and seed treated with fungicides and insecticides.

Farmers around the world face the daunting challenge to feed, clothe and fuel an ever-growing world population and Canadian farmers are in the enviable position to lead that effort. However, in order to do so, farmers need access to new technologies to continue to increase productivity in an environmentally sustainable fashion. We understand that pollinators and crop protection products are complementary and integral components of a sustainable agricultural system. We look forward to an ongoing dialogue and continued action to find sustainable solutions for our industry, the Canadian economy, and the health of our environment.

Respectfully signed:

Grain Growers of Canada
Canola Council of Canada
Canadian Canola Growers Association
Canadian Seed Trade Seed Trade Association
CropLife Canada



March 10, 2015

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Dear Minister Leal and Minister Murray,

In the fall of 2012 an industry led value chain coalition came together in the spirit of stewardship and collaboration to begin a dialogue on pollinator health and seed applied insecticides. This diverse group of stakeholders developed a series of initiatives that could be collectively implemented to mitigate risk to pollinators, including from dust generated during the planting of corn and soybeans. In August 2013 this coalition sent a letter to the federal and provincial ministers of agriculture and environment that outlined our commitments and reaffirmed our continued desire to work with policy makers at both the federal and provincial levels. A copy of this letter is enclosed.

Over the past 18 months this coalition and the broader agriculture industry have achieved strong, measurable success in mitigating risk to pollinators while ensuring that Canadian growers have access to the technologies that they need to produce food in a safe, sustainable and environmentally friendly way.

In the August 2013 letter this coalition made five specific commitments to improve pollinator health. The five commitments made were:

1. Promotion of best management practices for the planting of treated seed
2. Additional labeling for treated seed
3. Improved technology



4. Lifecycle stewardship
5. Giving farmers choice

As a coalition we are pleased to report that we have made significant progress on our commitments:

Promotion of best management practices (BMPs): BMPs for planting treated seed were developed by industry stakeholders and brought forward by the Pest Management Regulatory Agency (PMRA) of Health Canada in 2013. In a very short period of time these BMPs were widely communicated and adopted by seed companies, retailers and growers.

Additional labeling: New labeling for corn and soybeans that have been treated with neonicotinoids was developed by the Pest Management Regulatory Agency (PMRA) of Health Canada and members of this coalition. Although the additional labeling was not scheduled to be implemented until 2015 our industry partners were able to implement the new PMRA labeling to neonicotinoid treated corn and soybeans for the

2014 season, implementing the requirements a full year ahead of schedule as a direct reflection of our clear commitment to pollinator health.

Improved technology: Substantial resources went into distributing, educating, promoting and training for the mandatory use of a new seed flow fluency agent when planting neonicotinoid treated corn and soybeans. This new fluency agent significantly reduces the dust generated during planting and was used on the vast majority of acres planted with treated seeds (based on the volume of the product distributed). Having a completely new product so widely adopted in just a matter of months would not have been possible without the sincere commitment of the agriculture sector.

Lifecycle stewardship: New standards for seed treatment facilities are being implemented and additional standards for the handling, storage; use and disposal of treated seed are being developed, and will be enforced by the industry. With support from industry, CleanFARMS, a not-for-profit industry stewardship organization, is continuing to run an empty seed and pesticide bag collection pilot project to ensure that products are disposed of in an environmentally responsible manner. CleanFARMS will be expanding this program to over 200 locations in 2015. CleanFARMS is an industry-led stewardship organization that was awarded the 2012 Minister's Award for Environmental Excellence by the Ontario Ministry of the Environment and Climate Change.

Giving farmers choice: Seed companies and seed retailers will continue to ensure that farmers have access to a range of products including untreated seed, fungicide-only treated seed, and seed treated with fungicides and insecticides. More options were offered in 2014 than ever before. These options were also collected and published by the Ontario Ministry of Agriculture, Food and Rural Affairs. The choice of seed protection options will continue to be customer driven based on the individual needs identified on the land they farm.

Today

This coalition has gone above and beyond the initial commitments it made and will continue to work together to reduce the dust generated during planting to ensure the safe planting of insecticide treated seed. Our coalition, which includes, grower groups, developers, academics, beekeepers and regulators, among others, is actively educating and training those who choose to use insecticide treated seed to ensure that it is being used in a safe and responsible manner.

The stewardship initiatives undertaken by the value chain are paying off. On November 25, 2014 PMRA released preliminary results of its bee health monitoring project which concluded that to date *"Health Canada's PMRA does not have sufficient information to draw conclusions regarding a link between these*

colony effects and potential neonicotinoid exposure.” PMRA’s scientific work found that the number of bee death incidents reported during planting in Canada was down by 70 per cent in 2014 compared to 2013.

We are united as an agriculture industry and the lines of communication and dialogue are open like never before.

Recognizing that bee health is complex and multi-factorial, several members of this coalition requested the creation of a multi-stakeholder National Bee Health Roundtable. The mandate of the Bee Health Roundtable is to share information, educate, and work collaboratively on strategies to realize the goal of the Roundtable. This is facilitated by multi-stakeholder representatives from across the apiculture value chain, including beekeepers, professional apiculturists, agricultural producers, seed companies, government regulators, the crop protection industry, and agronomists.

As an industry we recognize that in order to meet future global food demand, farmers will have to increase their food production while being challenged by competition for land and water and by climate change. To meet these demands, production and yield must increase on a per acre basis. As such, farming practices have changed. Farmers are increasingly planting seed earlier in the growing season to allow for a longer growing period to help maximize yields. This is especially true for corn and soybeans.

However, early season planting in cold and wet soils puts the seed and seedling at a greater risk. Seed treatments help offset some of this risk because they offer protection when the plant is most vulnerable; as a seed and seedling. Currently neonicotinoid seed treatments are the only way to protect the seed from pests. There is no rescue treatment available for below-ground pest control after planting.

Seed treatments remain the least environmentally intrusive measure for controlling insects that are an annual concern in many crop types, including corn, soybeans and canola, and as a result are an important tool for many producers. Safe and targeted use of neonicotinoid seed treatment introduces an efficient use of pesticides and reduces the amount of chemical used on large areas of farmland by reducing or eliminating the number of foliar sprays and allowing for a precision agricultural operation.

Another benefit of this technology is that farmers do not have to till or over-till their land before they plant their crop, protecting fragile soil, reducing erosion and soil compaction while protecting soil nutrients and allowing the use of seeded cover crops. This also means less fuel is used on farm, reducing the carbon footprint.

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Without access to technologies such as neonicotinoid seed treatments, production would drop and costs would rise sharply for both farmers and consumers. The economic costs would be heavy and ironically, the environmental costs would also be high.

As an industry we encourage both federal and provincial policy makers to support peer reviewed science as the foundation for regulatory decisions. Sound scientific principles are measurable and reproducible. Regulatory assessments and approval process based on risk ensure that all products are assessed consistently, giving confidence to consumers and to the developers of innovative solutions for agriculture.

The Canadian agriculture industry understands that pollinators and crop protection products are complementary and integral components of a sustainable agricultural system. We will continue to work with regulators and the entire value chain to ensure the safe and responsible use of all seed borne technologies, including neonicotinoid seed treatments.

Respectfully signed:

Canadian Seed Trade Association
Canadian Canola Growers Association
Canadian Association of Agri-Retailers
Grain Growers of Canada
Grain Farmers of Ontario
Association of Equipment Manufacturers
Canadian Horticultural Council
CropLife Canada
Quebec Seed Trade Association
Canola Council of Canada

Endnotes

¹ Ministry of Agriculture, Food and Rural Affairs (Corn: Planting)
<http://www.omafr.gov.on.ca/english/crops/pub811/1planting.htm>

² Ministry of Agriculture, Food and Rural Affairs (Soybean Planting and Crop Development)
<http://www.omafr.gov.on.ca/english/crops/pub811/2planting.htm>

³ An Assessment of the Cost to Ontarians of Proposed Amendments to Ontario Regulation 63/09 Under the Pesticides Act by RIAS Inc. Publication pending.

⁴ EBR posting 012-1394 <http://www.ebr.gov.on.ca/ERS-WEB-External/displaynoticecontent.do?noticeId=MTIxOTIy&statusId=MTg0NjYx&language=en>

⁵ EBR posting 012-1559 <http://www.ebr.gov.on.ca/ERS-WEB-External/displaynoticecontent.do?noticeId=MTIyMDkz&statusId=MTg3NzM5&language=en>

⁶ EBR Posting 011-8075 <http://www.ebr.gov.on.ca/ERS-WEB-External/displaynoticecontent.do?noticeId=MTE4NTY5&statusId=MTg2NjY1&language=en>