Regulatory assessment of ‘stacked trait’ products is unnecessary when the single trait parents have been concluded as safe.

Stacked trait products contain multiple genetically modified (GM) traits, which have been brought together through conventional plant breeding. For example, different insect resistance traits can be stacked with one another to provide the crop with improved means of protecting itself against attack from multiple insects. This process also helps delay or avoid the development of resistance in the target pest populations.

Different traits (e.g. insect resistance, herbicide tolerance and product quality) can also be stacked together to improve yield and nutrition.

Stacked trait products are not substantially different from their single-trait parents. Therefore, they pose no greater risk to food or feed safety than products obtained from any other form of conventional breeding unless there is a plausible, testable hypothesis for the stacked traits to interact.

Multiple regulatory agencies have reviewed stacked trait products without any concerns. The European Food Safety Authority (EFSA) has extensively reviewed more than 30 stacked trait products, and determined them to be safe.

Is it time for regulatory overhaul?

Removing regulatory requirements for stacked trait products is scientifically justified and provides a consistent framework for innovation.

Differing regulatory requirements internationally for stacked trait products add unnecessary cost and time to the review process. Some countries (e.g. Brazil, Argentina) have recently significantly reduced or eliminated requirements if the single-trait parents have been approved, and Japan has continued to simplify their regulations for stacked trait products based on a history of safe use and familiarity.

Some countries have gone a step further and set a precedent for not even including stacked products in their regulation and only require a notification of commercialization (e.g. Australia and Canada).

Globally, no stacked trait product has ever been denied approval due to safety concerns.

Examples of benefits of stacked traits:

For farmers:
Ability to protect plants against multiple pests and diseases at once, giving farmers the necessary options to control insects, diseases, and weeds to optimize their operations.

For consumers:
Ability to combine multiple nutritional and other quality benefits at once (e.g. longer shelf life and enhanced nutrients).

For the environment:
Ability to enable no-till agriculture and water-efficiency in a single seed, allowing for use of best management practices that reduce tillage and conserve water.