**BENEFITS**

- Improves early season vigour
- Promotes root and shoot growth
- Reduces early season stress
- Labelled for foliar applications
- Compatible with most fertilisers and pesticides
- Registered APVMA product
Capitalise on an APVMA-registered, proven formulation of Plant Growth Hormones

RADIATE® is a patented formulation of 3-indolebutyric acid (IBA) & other nutritional ingredients, in optimised ratios, designed to enhance early season vigour and drive maximum root growth. The proven plant health stimulant technology in RADIATE® provides growers with consistent performance across a wide variety of crops.

By delivering essential plant hormones in the optimum ratio, RADIATE® drives maximum root growth, improves plant vigour and reduces plant stress during the critical vegetative growth stages. In addition, RADIATE® contains a mixture of vitamins that aid in successful transplanting and plant growth.

RADIATE® can be used as a foliar application. Refer to label for crop specific rates.

RADIATE® is an APVMA registered product.
**Greater Plant Vigour, Less Plant Stress**

Until a seedling’s root system is well established, it must not only survive on a finite source of nourishment, but it is also very vulnerable to stunting or damage from a wide variety of stresses. The faster the nodal root system grows, the greater the chance of a healthy plant that can withstand environmental stress and produce maximum yields.

**RADIATE®** is a proven solution for accelerating nodal root growth. It can be used on most crops to improve early season plant vigour, reduce early season stress and improve overall plant health, leading to increased root mass and optimised yield potential.

**More Root Mass, Better Nutrient Uptake**

Applying **RADIATE®** improves and accelerates the growth of root biomass, increasing nutrient uptake and improving plant development. Increased growth can be observed within a few days of applying **RADIATE®**.

**RADIATE®’s Effect on Root Hairs**

**RADIATE®** improves the growth of the primary root system and significantly increases the number of root hairs that are responsible for much of the plant’s nutrient and water uptake.
How It Works

Without RADIATE®:
✓ Less vigourous plant
✓ Fewer root hairs
✓ Plant vulnerable to stunting or damage from variety of stresses

With RADIATE®:
✓ Increased ability to produce auxin
✓ Enhanced root development, including more lateral roots and root hairs
✓ Greater early season plant vigour
✓ Reduced plant stress

Patented IBA nutritional formulation stimulates plant and root growth, also increasing the plant’s ability to make more essential hormones required for crop growth

Foliar application in vegetative stage of growth

Healthy, more developed root system increases nutrient and water uptake

Fewer nutrients taken up into plant
Effect of RADIATE® on Cotton
Increase in cotton growth after RADIATE® application
Effect of RADIATE® on Cotton
Increase in cotton growth after RADIATE® application
Effect of RADIATE® on Cotton – Fruiting Branches & Bolls

RADIATE® applied at 1-2 nodes on replant cotton – Mungindi, NSW

Effect of RADIATE® on Cotton – Yield (b/Ha)

RADIATE® applied at 1-2 nodes on replant cotton – Mungindi, NSW
Effect of RADIATE® on Cotton – Fruiting Branches & Bolls
RADIATE® applied at 8-9 nodes – Mungindi, NSW

![Graph showing the effect of RADIATE® on cotton fructification and yield.](image)

Effect of RADIATE® on Cotton – Yield (b/ha)
RADIATE® applied at 8-9 nodes – Mungindi, NSW

![Graph showing the yield of cotton in different treatments.](image)
Effect of RADIATE® on Wheat Yield and Protein
Wheat – Temora, NSW

<table>
<thead>
<tr>
<th>Treatment</th>
<th>Yield (T/ha)</th>
<th>Protein %</th>
</tr>
</thead>
<tbody>
<tr>
<td>GSP (MAP 80 kg)</td>
<td>4.6</td>
<td></td>
</tr>
<tr>
<td>GSP + 150mL RADIATE®</td>
<td>4.8</td>
<td>11.4</td>
</tr>
<tr>
<td>GSP + 300mL RADIATE®</td>
<td>5.0</td>
<td>12.6</td>
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</tbody>
</table>
Effect of RADIATE® on Canola
Increase in percentage oil in canola treated with RADIATE® and glyphosate (0.9kg/ha) - WA
At a Glance

<table>
<thead>
<tr>
<th>Application</th>
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<tbody>
<tr>
<td>Foliar</td>
<td></td>
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</table>

<table>
<thead>
<tr>
<th>Key Ingredients</th>
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<tbody>
<tr>
<td>3-indolebutyric acid (IBA)</td>
<td></td>
</tr>
<tr>
<td>Other nutritional ingredients</td>
<td></td>
</tr>
<tr>
<td>A proprietary mixture of vitamins</td>
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</table>

<table>
<thead>
<tr>
<th>Key Features</th>
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<tbody>
<tr>
<td>Improves plant vigour and health</td>
<td></td>
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<tr>
<td>Reduces plant stress</td>
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<tr>
<td>Accelerates root and shoot growth</td>
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<tr>
<td>Compatible with most post emergence-applied herbicides</td>
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<tr>
<td>Compatible with NPK fertilisers, sidedress nitrogen and starter applications</td>
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Uses and Rates

<table>
<thead>
<tr>
<th>Crop</th>
<th>Application</th>
<th>Recommended Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Most Crops</td>
<td>Foliar (see label for crop-specific timing)</td>
<td>150-300 mL/ha</td>
</tr>
</tbody>
</table>
**Plant Health Stimulants** are active ingredients that have a positive effect on plant health. They are typically applied in low quantities to mimic or enhance a plant’s metabolism.

**Plant Health Stimulants** can include:
- Plant Growth Hormones, like the ones in RADIATE®
- Systemic Acquired Resistance (SAR) Induction Agents
- Amino Acid Complexes

**Contact Your Local Landmark Agronomist**

**Loveland Agri Products**
loveland.landmark.com.au

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