



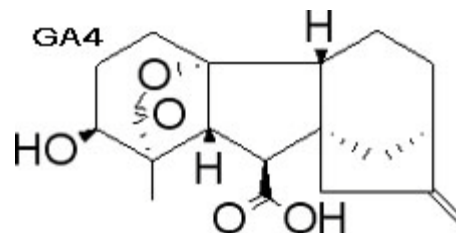
## Product Information Sheet

### G358 Gibberellins A<sub>4</sub> + A<sub>7</sub>

Synonym: N/A  
CAS: N/A  
Formula: GA<sub>4</sub>: C<sub>19</sub>H<sub>24</sub>O<sub>5</sub> GA<sub>7</sub>: C<sub>19</sub>H<sub>22</sub>O<sub>5</sub>  
Molecular Wt: GA<sub>4</sub>: 332.4 GA<sub>7</sub>: 330.38

#### Properties

Form: Powder  
Appearance: White to Off-White Powder  
Application: Plant Growth Regulator  
Solubility: KOH  
Typical Working Concentration: 0.01 – 5.0 mg/L, varies depending on application, should be determined by end user.  
Storage Temp: 2 to 6 °C  
Stock Solution: 2 to 6 °C  
Other Notes: Plant Tissue Culture Tested; For Research Use only



#### Application Notes

Gibberellins are known to promote shoot (internode) elongation and break certain dormancies in seeds. They also can induce flowering in some plant species.<sup>2</sup>

In a study of potato tuberization, potato cultures treated with 0.01 to 0.03 µM of GA<sub>4+7</sub> produced normal shaped tubers, while in the same study, higher concentrations ranging from 0.1 to 0.3 µM produced abnormal shaped tubers.<sup>3</sup> Variations of GA<sub>4+7</sub> concentrations have also been observed for tobacco callus. GA concentrations of 0.01-5.0 mg/L have been shown to promote shoot development in tobacco callus, while higher concentrations of 5.0 mg/L to 10 mg/L inhibited shoot production.<sup>4</sup>

PhytoTechnology Laboratories® also carries Gibberellic Acid Solution at 13 mg/mL (Prod. No. G362), Gibberellic Acid Solution at 1 mg/mL (Prod. No. G198), and Gibberellic Acid powder (Prod. No. G500).

Please Note: Gibberellins can be co-autoclaved with media components; however, some loss of activity may occur. While PhytoTechnology Laboratories™ tests each lot of this product with two or more plant cell/ tissue culture lines, it is the sole responsibility of the purchaser to determine the appropriateness of this product for the specific plants that are being cultured and applications that are being used.

#### References

1. Merck **13**, 4431
2. Harada H. and J. P. Nitsch. 1959. Flower Induction in Japanese Chrysanthemums with Gibberellic Acid. *Science New Series*. 129(335):777-778.
3. Xu, Xia, Andre A.M. van Lammeren, Evert Vermeer, and Dick Vreugdenhil. 1998. The Role of Gibberellin, Abscisic Acid, and Sucrose in the Regulation of Potato Tuber Formation in Vitro. *Plant Physiol*. 117:575-584.
4. Murashige, T (1961) Suppression of Shoot Formation in Cultured Tobacco Cells by Gibberellic Acid. *Science, New Series*, 134:3474, pp. 280.

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