

# **Strigolactone Mimic** Leading to Withering of the Parasitic Plant Striga



Sphynolactone-7 5mg / 25mg [P2745]

Seeds of the root parasitic weed Striga, which is dormant in soil, germinate in response to strigolactone secreted from the roots of the host plant. Sphynolactone-7 [P2745] is a strigolactone mimic developed by Designated Associate Prof. Yuichiro Tsuchiya et al. at Nagoya University, and it is possible to germinate and wither Striga in soil with absent of a host as a nutrient source.<sup>1)</sup> The activity of Sphynolactone-7 against germination is extremely high, but its action as a plant hormone on plants is very weak, so it is expected to be used as a revolutionary control method for Striga.



When maizes were cocultivated with Striga seeds for three months in Sphynolactone-7 (SPL7) treated soil or not treated (left) soil, maize in soil SPL7 treated soil grew up without being parasitized by Striga.

DMSO DMSO GR24 SPL7



max4-1

Unlike the artificial strigolactone GR24, branching was not suppressed when Sphynolactone-7 (SPL7) was applied to strigolactone biosynthesis mutant of Arabidopsis thaliana, max4-1.

Image data and every kind of information have been provided by Designated Associate Prof. Yuichiro Tsuchiya at Nagoya University.

Reference 1) D. Uraguchi, Y. Tsuchiya, et al., Science 2018, 362, 1301. https://doi.org/10.1126/science.aau5445

Related Product

## Yoshimulactone Green (YLG)

**Ordering and Customer Service** 

#### **TCI AMERICA**

: 800-423-8616 / 503-283-1681 Tel Tel :888-520-1075 / 503-283-1987 Fax E-mail : Sales-US@TCIchemicals.com

TCI EUROPE N.V. : +32 (0)3 735 07 00 Tel Fax : +32 (0)3 735 07 01 E-mail : Sales-EU@TCIchemicals.com

#### **TCI Deutschland GmbH** :+49 (0)6196 64053-00

:+49 (0)6196 64053-01 Fax E-mail : Sales-DE@TCIchemicals.com

Tel :+44 (0)1865 78 45 60 E-mail : Sales-UK@TCIchemicals.com

# 梯希爱(上海)化成工业发展有限公司

Tel :800-988-0390 / 021-67121386 :021-6712-1385 Fax E-mail : Sales-CN@TCIchemicals.com

1mg / 10mg [E1238]

Tokyo Chemical Industry UK Ltd. Tokyo Chemical Industry (India) Pvt. Ltd. Tel : 1800 425 7889 / 044-2262 0909 E-mail : Sales-IN@TCIchemicals.com

### TOKYO CHEMICAL INDUSTRY CO., LTD.

Tel : +81 (0)3-5640-8878 E-mail : globalbusiness@TCIchemicals.com

• Chemicals itemized in this brochure are for research and testing use only. Please avoid use other than by chemically knowledgeable professionals. • Information such as listed products and its specifications and so on are subject to change without prior notice. • The contents may not be reproduced or duplicated in whole or in part without permission of Tokyo Chemical Industry Co., Ltd.