

FLUTIANIL

Fungicide

Product name: **GATTEN®**

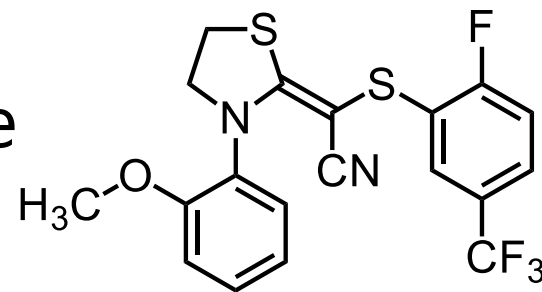


OAT Agrico Co., Ltd.

—Tokyo, Japan—

Flutianil, Characteristics

- New chemical group : cyano-methylene thiazolidine
- Effective in controlling powdery mildew
- **Novel Mode of Action against powdery mildew (FRAC Code U13)**
- **No Cross-Resistance with other chemical classes**



■ US

- Reduced risk status granted for all of the registered crops
- Approval: Registration granted March 2018
- Registered crops: Apple, Cantaloupe, Cherry, Cucumber, Grape, Squash, and Strawberry.
- Pending label expansion: Cucurbits Group 9, Cherry Subgroup 12-12A, Berry, low growing subgroup 13-07G, Fruit, small, vine climbing, except fuzzy kiwifruit, subgroup 13-07F, hops.

■ Canada

- Submitted application to PMRA for Cucurbits Crop Group 9, Cherry Subgroup 12-09A and Fruit, small, vine growing, except fuzzy kiwifruit, subgroup 13-07F.
- Import tolerance submission for Apples and Strawberries.

■ Japan

- Registered on Eggplant, Cucumber, Pumpkin and Squash, Watermelon, Melons, Strawberry, Zucchini, Tomato, Peas, Flowers and Ornamental plants, and Trees and Shrubs.

■ Korea

- Registered on Green & Red pepper (Fresh), Strawberry, Watermelon, Cucumber, Korean melon, and Sweet pepper

■ EU

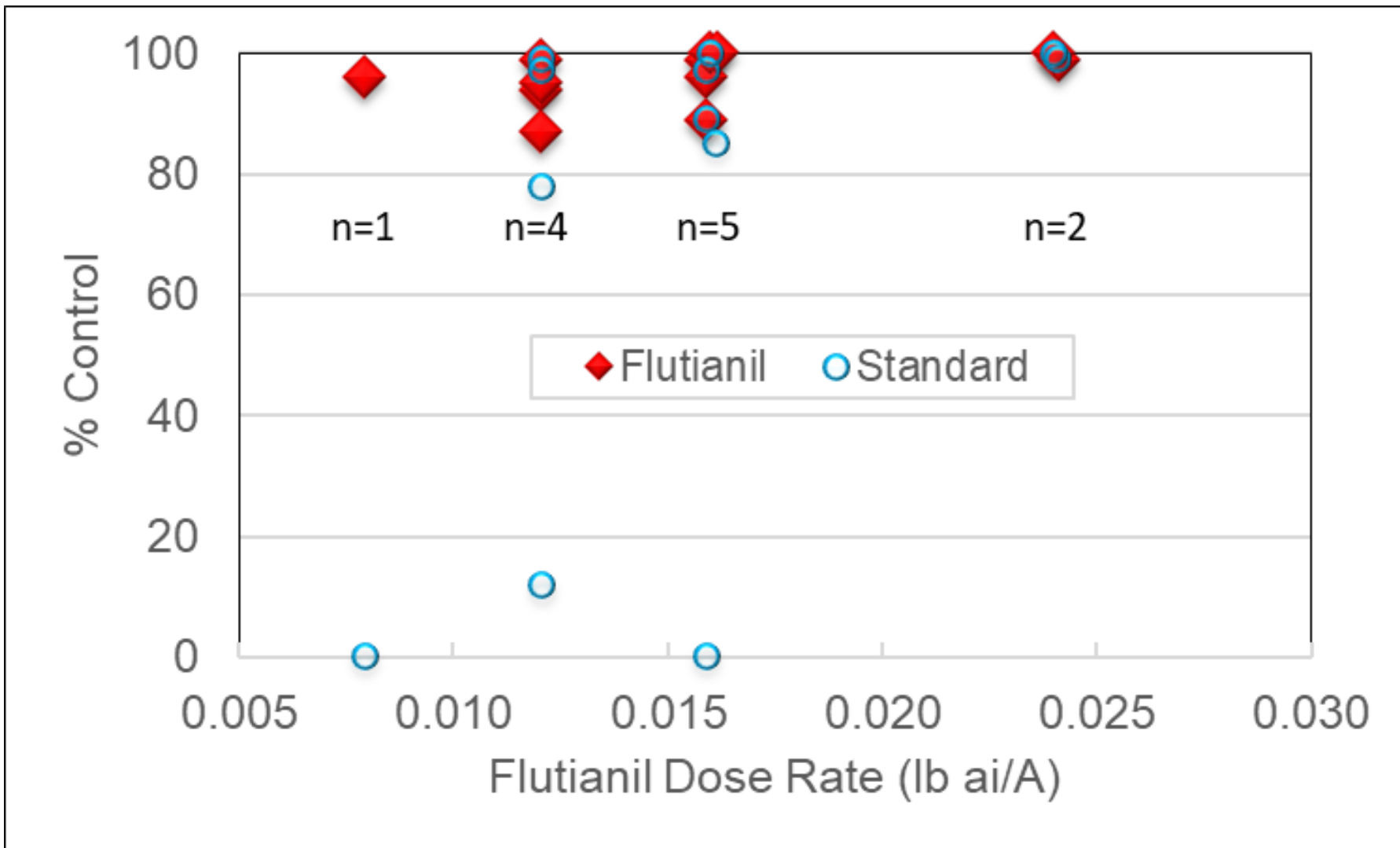
- Approval: Annex I granted April 2019
- Approved crops: Grapes and Flowers and Ornamental plants

- **Type:** Fungicide
- **Product Name:** GATTEN®
- **Active ingredient:** Flutianil
- **Formulation:** 5% EC
- **Use rate:** 0.04 lb ai/acre (0.01-0.05 lb ai/acre global)
 - **Note: 0.01 – 0.02 lb ai/A is new targeted use rate in US**
- **Application:** 4-5 times per season, 7 day interval
- **PHI:** 0-14 days
- **Crops:** Apple, Cantaloupe, Cherry, Cucumber, Grape, Squash, and Strawberry
 - All granted reduced risk status
 - Pending label expansion for crop groups/subgroups and hops.

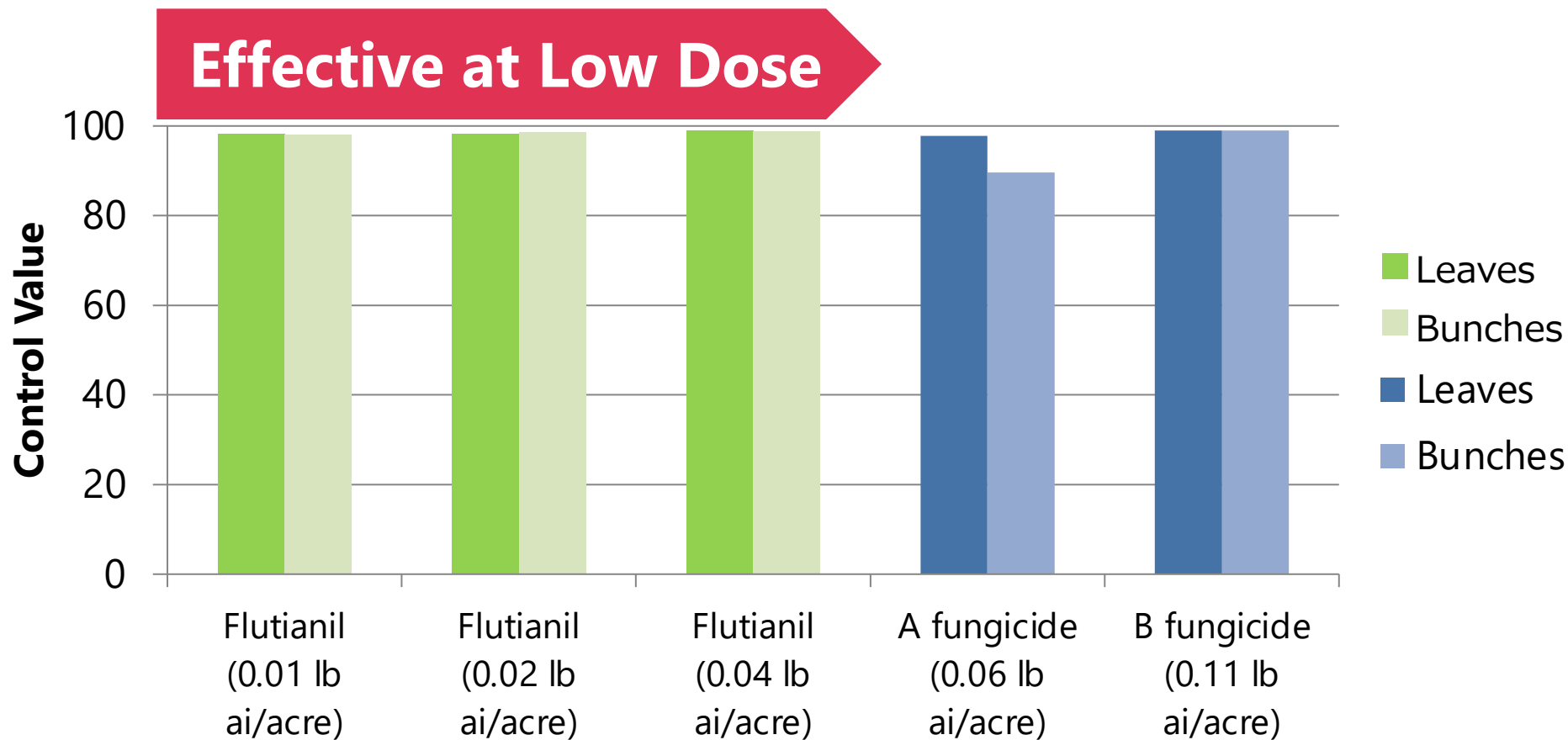
US Label Expansion

- Label Expansion Pending with the EPA (Submitted 12/2018)
 - Cucurbit Crop Group 9
 - Cherry Subgroup 12-12A
 - Berry, low growing subgroup 13-07G
 - Fruit, small, vine climbing, except fuzzy kiwifruit, subgroup 13-07F
 - Hops
- Current IR-4 Studies – Lettuce (incl. GH), Peach, Cucumber (GH part of GMUS) and possibly Rosemary and Sage (IR-4 efficacy studies on-going)
- IR-4 on-going studies to be submitted when complete.

Field Performance on Grape (US)



Erysiphe necator on Chardonnay Grape



- Location: Italy
- Four applications, targeted for every 10 days until color change
- Assessment was determined at 11 (leaves) and 10 (bunches) days after the last application
- Application: 1 – 6/28/11, 2 – 7/9/11, 3 – 7/20/11, 4 – 7/31/11

Uncinula necator on Grapevine

Flutianil

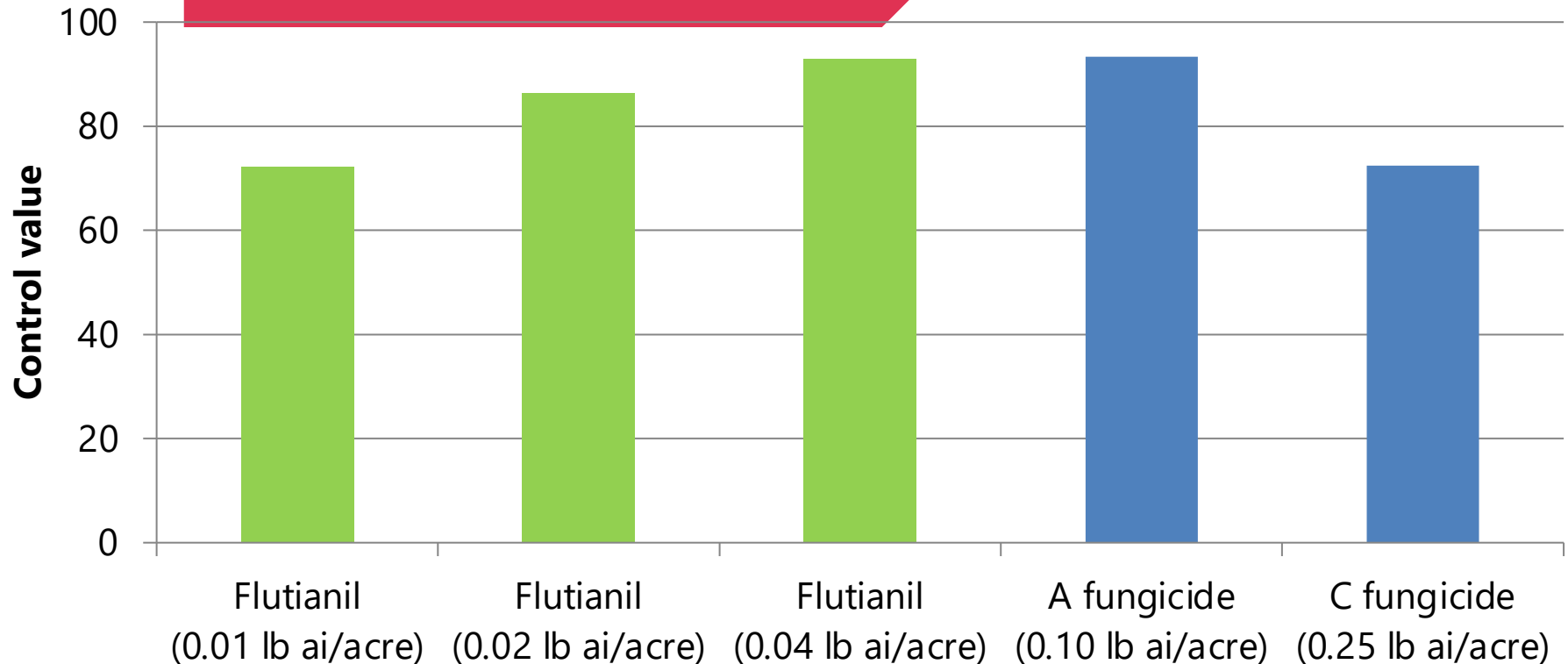
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- **Location: Spain**
- **Application: June 6, 19, July 1, 15, 30, 2008**

Podosphaera xanthii on Leaves of Yellow Squash

Effective at Low Dose



- Location: Raleigh, NC
- Five applications targeted at 7 days intervals
- Assessment was determined at 7 days after the last application
- Application: 1 - 7/27/2011, 2 - 8/3/2011, 3 - 8/10/2011, 4 - 8/17/2011, 5 - 8/24/2011

Sphaerotheca fuliginea on Squash

0.03 lb ai/acre Flutianil

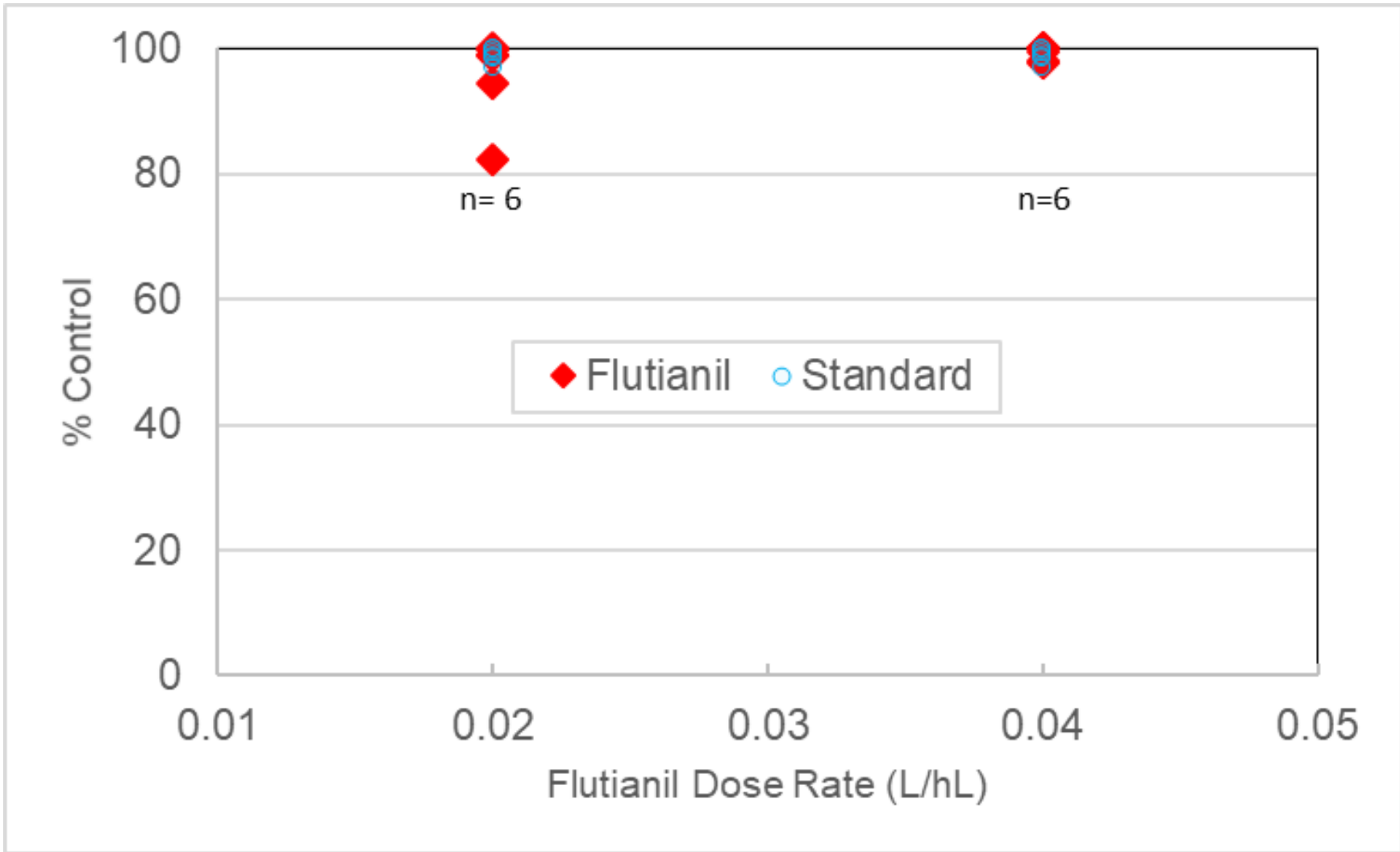


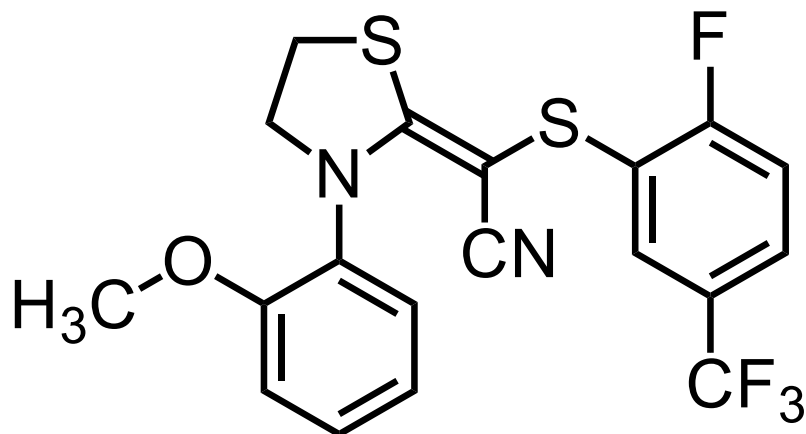
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- Location: Tokushima, Japan, OAT AGRIO
- One application targeted, Assessment was determined at 25 days after application
- Application: 1 - 6/18/2012

Field Performance on Non-woody Ornamentals (EU)





Fultianil

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Thank you



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