

A20-311-890FE

Efficacy of ozone applied alone and in mix, against Botrytis spp. on Blackberry. Morocco 2020

Trial ID: A20-311-890FE Location: Italy Trial Year: 2020
Protocol ID: 890A20FE12 Investigator (Creator): Antonio Russo
Project ID: Study Director: Renzo Bucchi - Agri 2000 Net Srl
Official Trial ID: A20-311-890FE Sponsor Contact: Giulio Senese - MET Srl
Trial Origin: C contracted trial

TREATMENT LIST

Trt No.	Type	Treatment Name	Form Conc	Form Unit	Form Type	Other Rate	Other Rate Unit	Appl Code	Comment 1
1	CHK	Untreated Check							
2	FUNG	Ozone			SN	3PPM	PR	ABCDE	500-1500 L/ha
3	FUNG	Serenade ASO	14,1g/L		SC	8L/ha		ABCDE	500-1500 L/ha

OBJECTIVES

- Do the Ozone used alone have efficacy comparable to the standard Serenade ASO?
- Does the addition of Ozone to the standard Serenade ASO increase the efficacy of Serenade ASO used alone?
- Does the addition of Ozone emulsified Sunflower oil increase the efficacy of Ozone used alone?
- Are all treatments safe for the crop?

SITE DESCRIPTION

Trial Location

City: Agadir **Country:** MAR Morocco
Climate Zone: EPOMED EPPO Mediterranean

Crop Description

Crop 1: Vaccinium myrtillus (Blackberry)
Entry Date: Dec-14-2020
Variety: CHESTER
Planting Date: Feb-8-2018
Planting Density: 10000 P/ha
Row Spacing: 1 m
Spacing within Row: 1 m

Pest Description

Pest 1 Type: D **Code:** BOTRSP Botrytis sp.
Common Name: Botrytis sp.

Stage Scale: BBCH

Site and Design

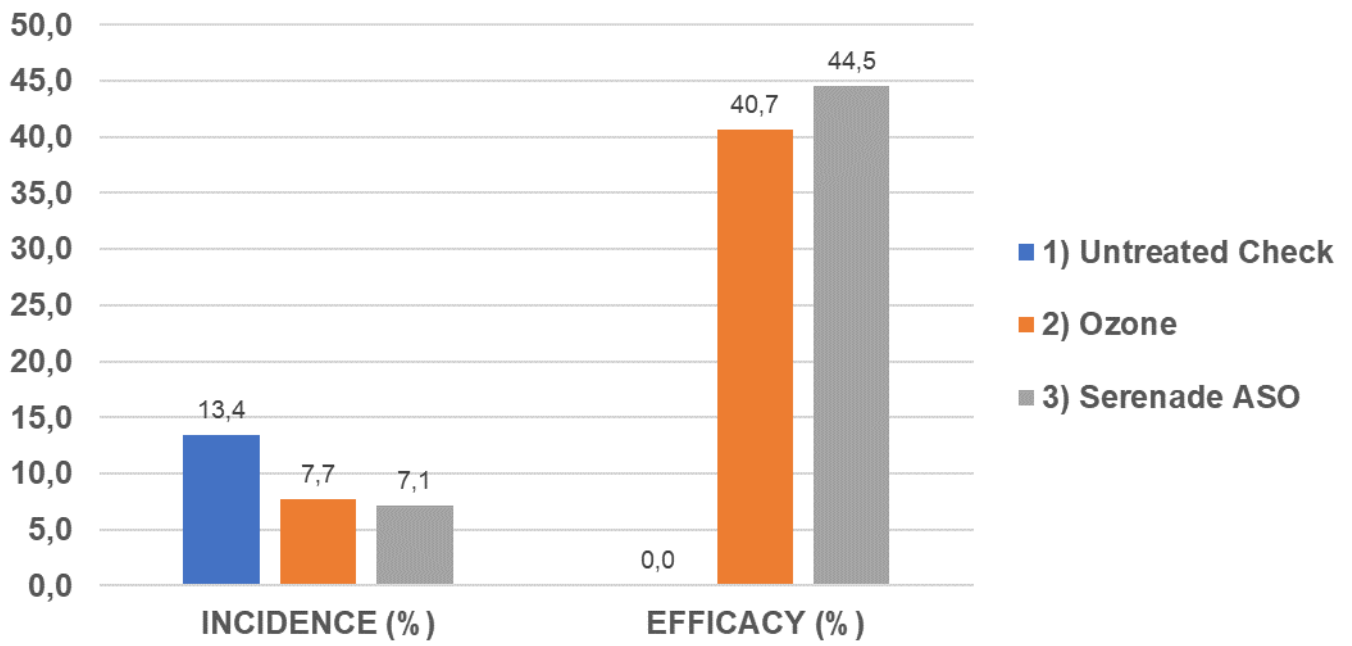
Treated Plot Width: 1 m **Site Type:** GREENH greenhouse
Treated Plot Length: 6 m
Treated Plot Area: 6,0 m²
Replications: 7
Study Design: Randomized Complete Block (RCB)
Untreated Arrangement: INCLUDED single control randomized in each block

Application Description

	A	B	C	D	E
Application Date	Sep-14-2020	Sep-21-2020	Oct-30-2020	Nov-7-2020	Nov-8-2020

RESULTS

On fruits – after 7 days storage



COMMENTS

English version: At the end of the experimental program for the control of *Botrytis* on blackberry in greenhouse, during which 5 applications were carried out based on susceptibility moments of the crop, the untreated check showed an incidence on fruits equal to 13,4% (13,4 attacked fruits on 100 fruits), with a consequent serious damage to the yield. All the products tested in field showed significant results if compared to the untreated check. The best result is showed by the standard Serenade ASO, which reduced the *Botrytis* damage to 7,1% of fruits, ensuring a more qualitative production to the crop. Also the Ozone applied alone allowed a control of the disease, albeit lower, showing an incidence of 7,7%.

Versione italiana: Al termine della strategia sperimentale per il controllo di botrite su mirtillo in serra, durante la quale sono state realizzate 5 applicazioni, basate su i momenti di suscettibilità della coltura, il testimone non trattato ha mostrato un'incidenza sui frutti pari al 13,4% (13,4 frutti colpiti su 100 frutti), con conseguente grave danno alla produzione. Tutti i prodotti applicati in campo hanno fornito risultati significativi rispetto al testimone. Il miglior risultato è stato fornito dallo standard Serenade ASO, che ha ridotto l'attacco da botrite al 7,1% dei frutti, garantendo una produzione più qualitativa alla coltura. Anche l'ozono applicato da solo ha permesso un controllo della malattia, seppur inferiore, mostrando un'incidenza del 7,7%.

CONCLUSION

English version: Within the test aimed at controlling *Botrytis* sp. on blackberry in greenhouse with the use of organic products, Ozone alone showed efficacy on fruits and resulted statistically comparable to the standard products Serenade ASO in terms of efficacy. No symptoms of phytotoxicity were observed.

Versione italiana: All'interno della prova volta al controllo della botrite su mirtillo in serra con utilizzo di prodotti biologici, l'Ozono da solo ha mostrato efficacia su frutto ed è risultato statisticamente comparabile al prodotto standard Serenade ASO in termini di efficacia. Non si sono osservati sintomi di fitotossicità.

CONTACTS

Renzo Bucchi

Scientific Responsible

Agri 2000 Net Srl

www.agri2000net.com

bucchi@agri2000.it