THE INFLUENCE OF CLIPPING OF FLOWER STALKS ON THE YIELD OF RED ONION (Allium cepa L. Aggregatum Group) LANDRACES IN EASTERN REGION

By

NAGARAJAH GOKULARAJAN

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Approved by



Supervisor

Mr.K.Thedchanamoorthy

Senior Lecturer

Faculty of Agriculture

Eastern University

Sri Lanka 31, 12, 2003 .

Head/ Dept. of Agronomy

Dr.T.Thiruchelyam

Senior Lecturer

Faculty of Agriculture

Eastern University

Sri Lanka Date: 21: 12: 2003

ABSTRACT

Bolting (flowering) is occasionally a problem in planted onion, particularly in onions grown from sets or transplants. This research evaluated the influence of clipping of flower stalk on the yield of Red Onion landraces in eastern region. The Vethalan, Muri vethalan and Kal vethalan red onion landraces were planted in Randomize complete block design (RCBD) with four replication and six treatments. The trial was carried out during the period Sept-Dec, 2003 period at the Agronomy farm of Faculty of Agriculture, Eastern University, Sri Lanka.

The agronomical important traits were studied both in the laboratory and in the field upto harvest. These include character of yield components namely bulb-let weight, bulb-let diameter, number of bulb-let per plant, marketable bulb-let percentage, and other traits number of leaves, plant height, plant weight, twenty plant bulb-let weight, bulb-let rotten percentage were significant difference observed between the flower clipped and flower unclipped treatments.

The difference in percentage of flowering and leaf twist disease among the flower clipped and flower unclipped treatments were not significant. However significant difference was observed within the red onion landraces. The bulb-let weight and twenty plant bulb-lets weight were significantly different between Vethalan and other land races.

The yield increase due to flower clipping was found to be14.9% in Muri vethalan, 14.3% in Kal vethalan and 15.1% in Vethalan. The cost of production to produce one Kg of Red Onion; flower clipped with stalk was Rs 15.67, flower clipped without stalk was Rs 14.86 and flower unclipped was Rs 16.88

The experiment concludes that clipping of flower stalks in tested landraces of red onions increases bulb-let yield but interactions between Red Onion landraces and flower clipped treatments were not observed. Further studies are suggested to compare different method of flower clipping on the yield of red onion land races.

LIST OF CONTENTS

Cont	ents				Page No
ABST	TRACT				1
ACKI	NOWLEDGE	MENTS			11
CON	ΓENTS				IV
LIST	OF FIGURES	S			VIII
LIŜT	OF TABLES				IX
LIST	OF PLATES			*	XI
e					
CHAF	TER 1	INTRODUCTION			1.
CHAF	TER 2	LITERATURE REV	IEW		6
2.1	Onions-Tax	onomy			6
2.2	Factors affe	cting bulbing of onion w	ith special ret	erence to the trop	ics 6
2.2.1.	Environmen	ntal factors			7
×	2.2.1.1 Phot	toperiod			7
	2.2.1.2 Inter	nsity of light			8
	,2.2.1.3 Ligh	nt spectral quality		,	9
	2.2.1.4 Tem	perature	å.		9
	2.2.1.5 Soil	factor			10
2.2.2	Plant factor	¥	, si-		12
	2.2.2.1 Influ	nence of leaves		,	12
	2.2.2.2 Influ	ience of apical bud	- y	* 1	12
	2.2.2.3 Influ	nence of roots	, .		13
	2.2.2.4 Effe	ct of plant size and age			13
	2.2.2.5 Tran	slocation of assimilates		¥7	14
	2.2.2.6 Effe	ct of plant growth regula	tors		14
	2.2.2.7 Effe	ct of interplant competiti	on		15
	2.2.2.8 Flov	vering		10	16
	2.2.2	2.8.1 Conditions essentia	l for flowerin	σĎ	18
	2.2.2	2.8,1.1 Physiological age			18

	2.2.2.8.1.1.1 Growing Seedlings	19				
	2.2.2.8.1.1.2 Bulbs					
	2.2.2.8.1.2 Environmental factors					
	2.2.2.8.1.2.1 Temperature	20				
	2.2.2.8.1.2.1.1 Floral Primordium Initiation	21				
	2.2.2.8.1.2.1.2 Inflorescence Elongation	24				
	2. 2.2.8.1.2.1.3 Day length, light intensity, and light quality	25				
	2.2.2.8.2 Metabolites, Hormones, and Growth Regulators	26				
	2.2.2.8.2.1 Internal Changes					
2.2.2.8.2.1.1 Carbohydrates						
2.2.2.8.2.1.2 Plant Hormones						
2.2.2.8.2.2 External effect						
	2.2.2.8.2.2.1 Growth Regulators	29				
	2.2.2.8.2.2.2 Fertilizers and Defoliation	31				
2.2.2.8.2.2.1 Mineral Nutrition						
	2.2.2.8.2.2.2 Defoliation 2.2.2.8.3 Vernalization in the onion	32				
	2.2.2.6.5 Vernanzation in the onion	33				
СНА	PTRE 3 MATERIALS & METHODS	35				
3.1	Location	35				
3.2	Varieties of Red Onion Used					
3,4	varieties of Red Offion Used	35				
3.3	Treatments	36				
3.4	Lay out and design of the experiment	36				
3.5	Agronomical practices	37				
	3.5.1 Previous crop in the same field	37				
	3.5.2 Land preparation	37				
	3.5.3 Basal fertilizer application	37				
	3.5.4 Selection of seed Bulb-lets	37				
	3.5.5 Seed bulb-lets treatment	38				
	3.5.5 Planting	38				

	3.5.6 Irrigation	38	
	3.5.7 Top dressing fertilizer application	39	
	3.5.8 Pest and Disease control	39	
	3.5.9 Weed control	39	
	3.5.10 Flower clipping	39	
3.6	Measurement and observation	40	
3.7	Statiscal analysis	40	
3.8	Method of data collection	40	
	3.8.1 Germination percentage	40	
	3.8.2 Number of days required to germination in field	40	
	3.8.3 Number of leaves	41	
	3.8.4 Plant height	41	
	3.8.5 Flowering percentage	41	
	3.8.6 Pest and Disease incidence	41	
	3.8.7 Maturity days	41	
	3'.8.8 Assessment of growth yields and yields components	41	
	3.8.8.1 Fresh weight of leaves & bulb-lets	42	
	3.8.8.2 Number of bulb-lets . *	42	
	3.8.8.3 Size of bulb-lets	42	
CHAI	PTER 4 RESULTS AND DISCUSSIONS	43	
4.1	Germination percentage	43	
4.2	Number of days required for bulb sprouting in the field	43	
4.3	Number of Leaves		
4.5	Plant Height	44	
4.5	Flowering	45	

4.6	Plant Weight	46
4.7	Pest and Disease incidence	47
4.8	Maturity days	48
4.9	Yield Components	49
	4.9.1 Bulb-let Diameter	49
•	4.9.2 Number of bulb-let	50
	4.9.3 Bulb-let weight	50
	4.9.4 Twenty plant bulb-lets weight	51
4.10	Bulb-let rot at harvest	52
4.11	Marketable bulb-lets	53
4.11	Economic analysis clipping Red Onion flower stalks	55
4.12	Estimation in yield increase	57
5 CON	CLUSIONS	58
BIBILIO	59	
APPEN	70	

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