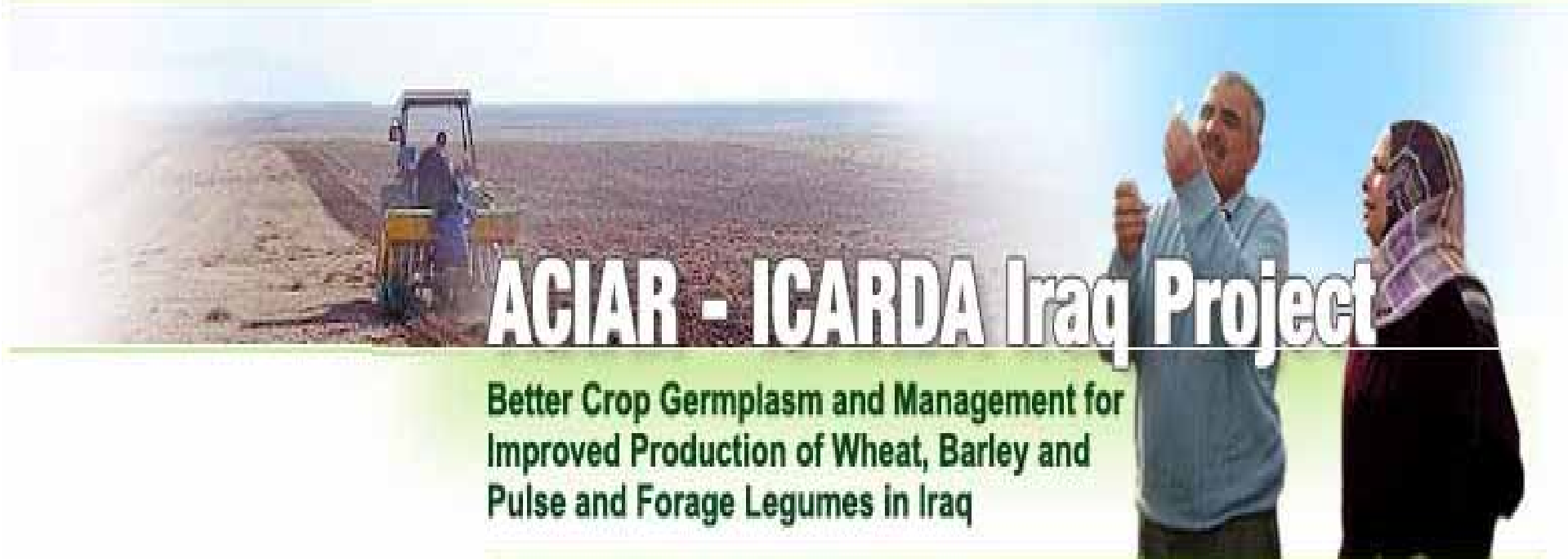


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Results of 2007/2008

Demos - Iraq

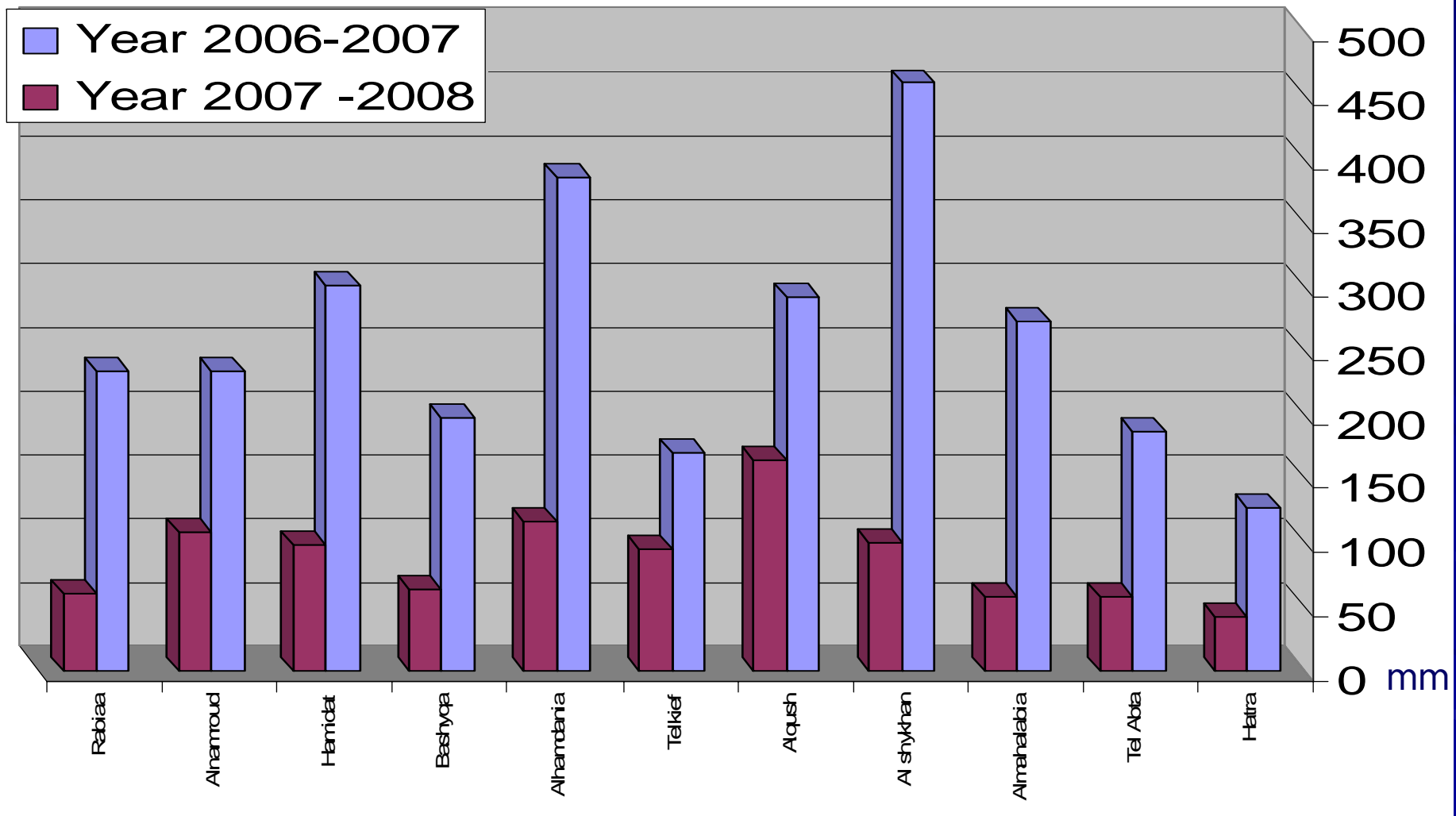
Presented By Dr. Abdulsattar A. Al-rijabo

Introduction

- Until 15/1/2008 which is the last date for sowing wheat in Ninevah there is no effective rain and temperature is below 0c°.
- For this reason and to save seeds and budget and machines the activities was as follow:
- Cultivate crops in the locations which Z.T and chisel machines there from the last season , so we cultivated barley in 2 LRA (Tell abta & Hatra) and wheat (Namroud & Rabeea) as SI location and cultivate wheat in Rabeea location as HRA , Even of that the drought this season is very effective even in HRA. And because of the drought the is Problems in SI in irrigation system project in Rabeea & some places in Al-Namroud.
- All (11) Wheat cultivars which received from ICARDA this season are planted in AL- Namroud location under SI (100m²) for evaluating and seed production to use it in the next season , and for save this cultivars from drought or storage damage.
- Because of the drought the only result is as below:

Planning Demonstration 2007/2008

This season in Ninevah is un usual season , its very dry and very cold.



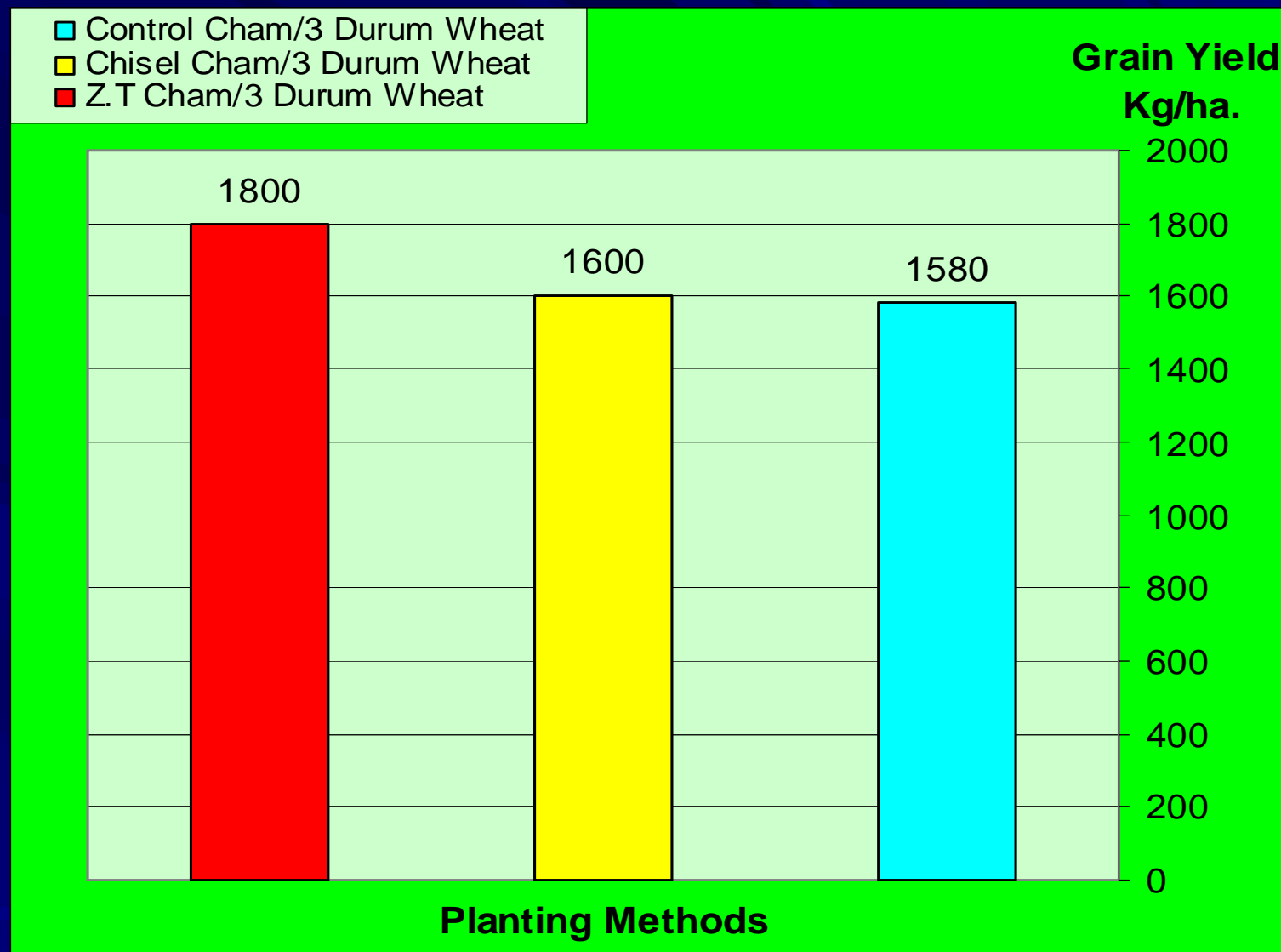
The Fig. show Amount of rain fall (mm) until 6 April for two years.

Planting Methods Result

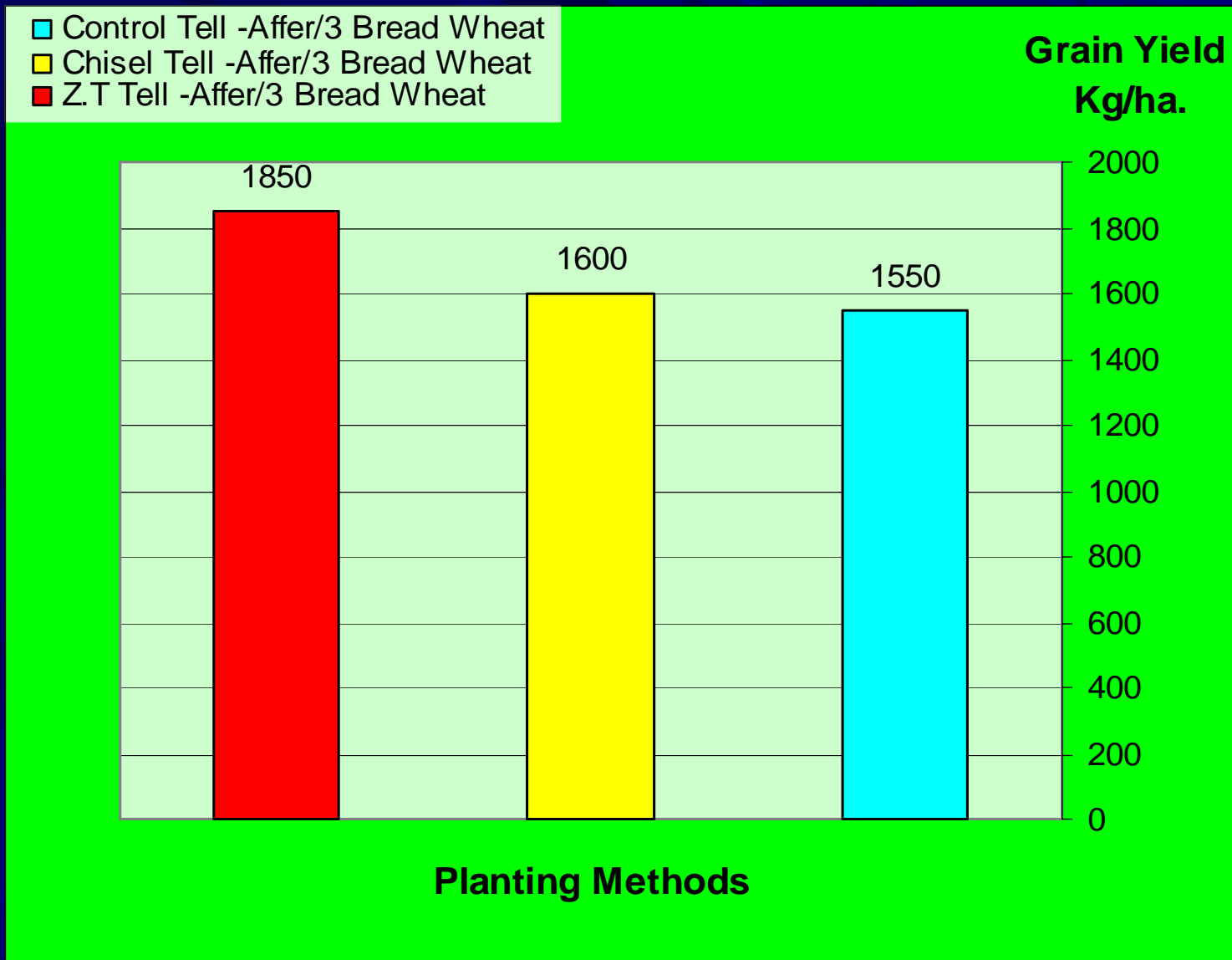
Location : Al-Namroud SI :

Crop	Cultivar	Treatments	Area -ha.
Durum Wheat	Cham/3	Control	1
Durum Wheat	Cham/3	Chisel	1
Durum Wheat	Cham/3	Z.T	1





Fig(1): Effect of planting methods on grains yield (Kg/ha.) of Durum Wheat in SI location



Fig(2): Effect of planting methods on grains yield (Kg/ha.) of Bread Wheat in SI location

Cultivars evaluating and seed production Result

Presented By Dr.Abdulsattar A. Al-rijabo

- All (11) Wheat cultivars which received from ICARDA this season are planted in AL-Namroud location under SI (100m²) for evaluating and seed production to use it in the next season.
- Sowing rate for Bread wheat (1,2 Kg / 100m²)
- Sowing rate for Durum wheat (1,4 Kg / 100m²)

Location : Al-Namroud SI

ICASYR - 2 Durum Wheat

منطقة
أبنا سير
« 2 » فشة

2008/04/02

Baltagy - 3 Durum Wheat

منطقة
بالتاجي « 3 »
فشة

2008/04/02

AZEGHAR - 2 Durum Wheat

منطقة
أزغار « 2 »
فشة

2008/04/02

Qimma - 6 Bread Wheat

منطقة
قمة ناعمة
« 6 »

2008/04/02

Younes-1 Durum Wheat

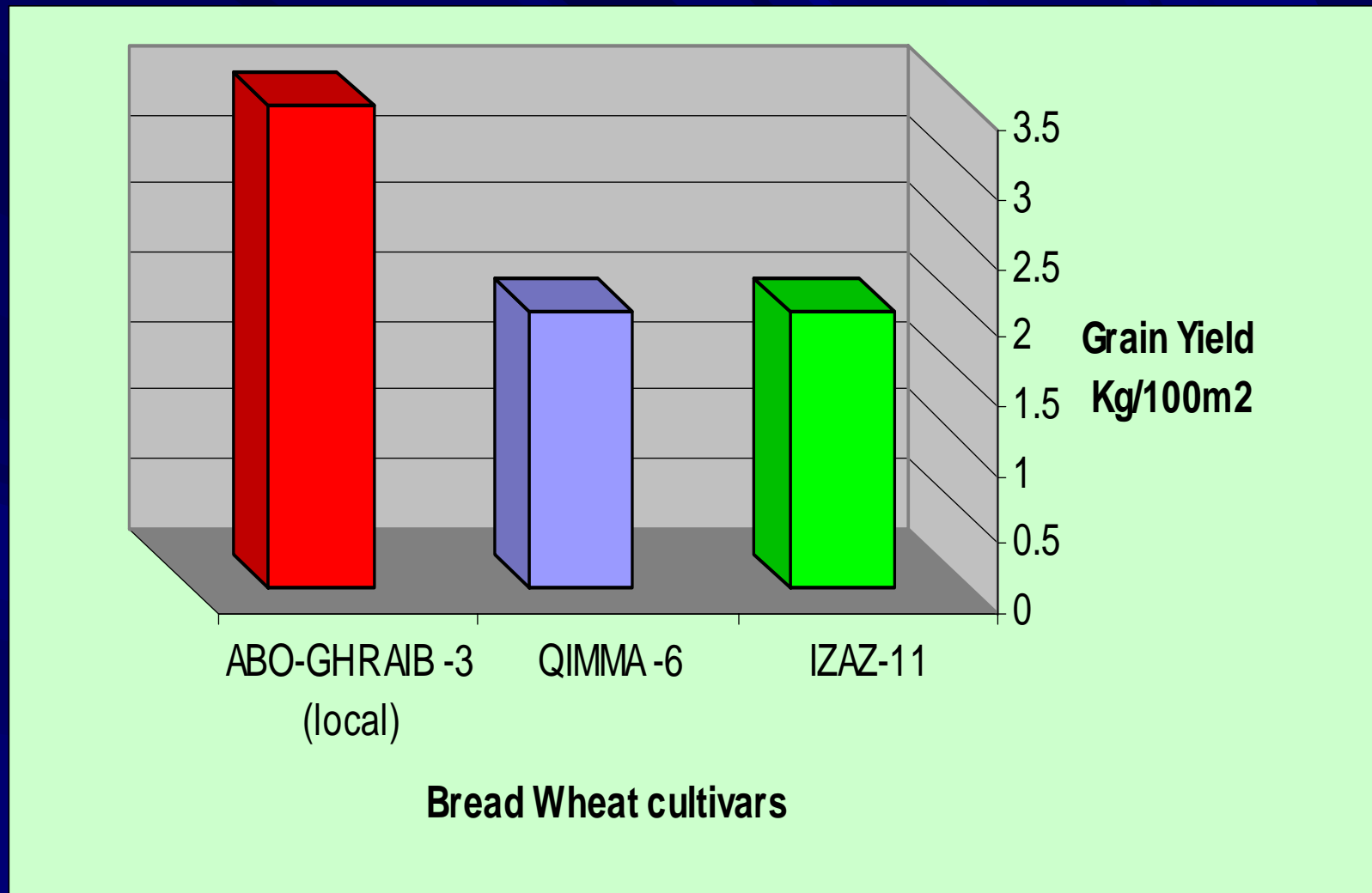
منطقة
يونس « 1 »
فشة

2008/04/02

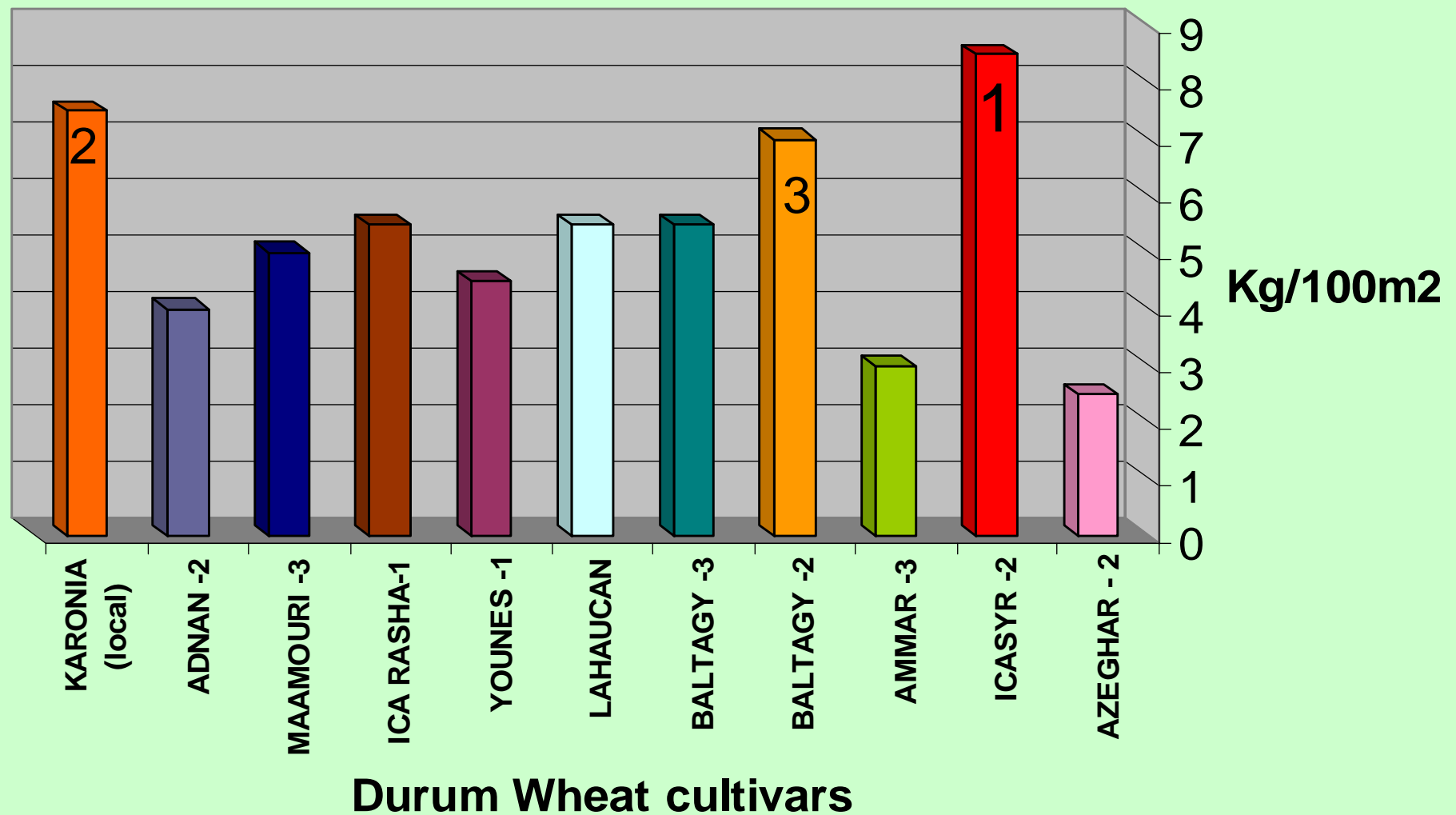
Baltagy - 2 Durum Wheat

منطقة
بالتاجي « 2 »
فشة

2008/04/02



Fig(3): Grains Yield (Kg/100m².) of Bread Wheat cultivars in SI location



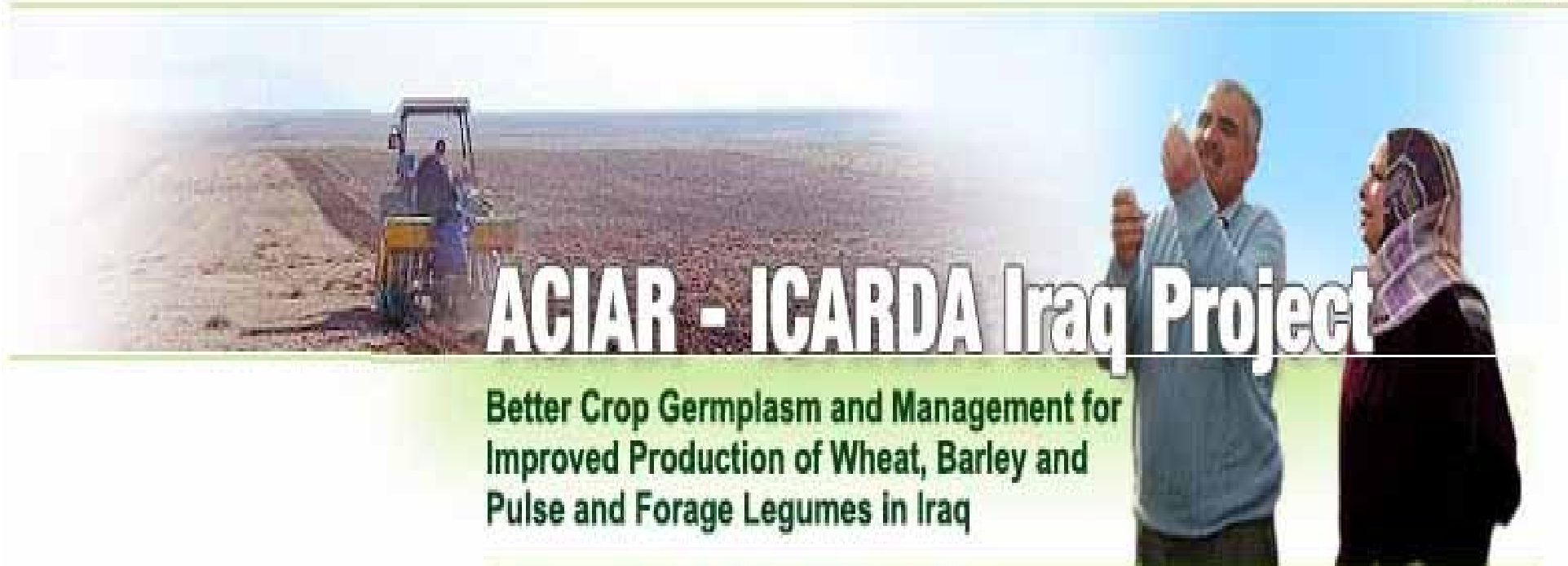
Fig(4): Grains Yield (Kg/100m2.) of Durum Wheat cultivars in SI location



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ACIAR - ICARDA Iraq Project

Better Crop Germplasm and Management for
Improved Production of Wheat, Barley and
Pulse and Forage Legumes in Iraq

**Results of 2007/2008
Research – Iraq
Mosul Univ.**

Introduction

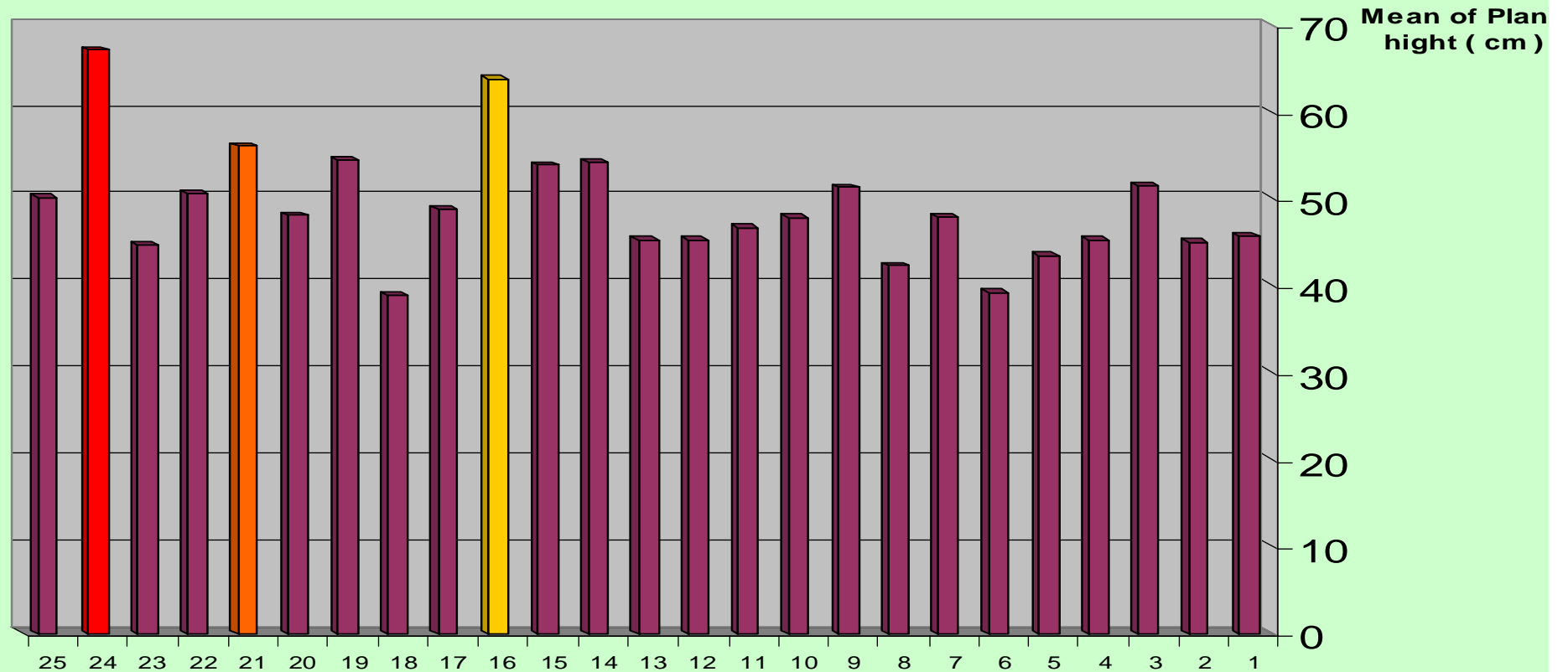
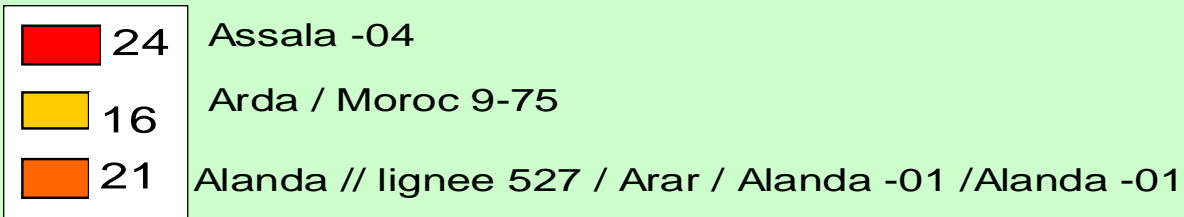
- We received only Six set of barley three of them (LRA barely) and the others (MRA barely) and we cultivated 3 MRA set in Mosul Univ. and the other three set cultivated by research station in Mosul.



- We get result from only One set (03) of MRA barely in Mosul Univ. under SI (2 irrigated in 4/4/2008 and 23/4/2008)

result of set (03) of MRA barely in Mosul Univ.
under SI (2 irrigated in 4/4/2008 and 23/4/2008)
Breeder: Mohammed S. Al-Taweel

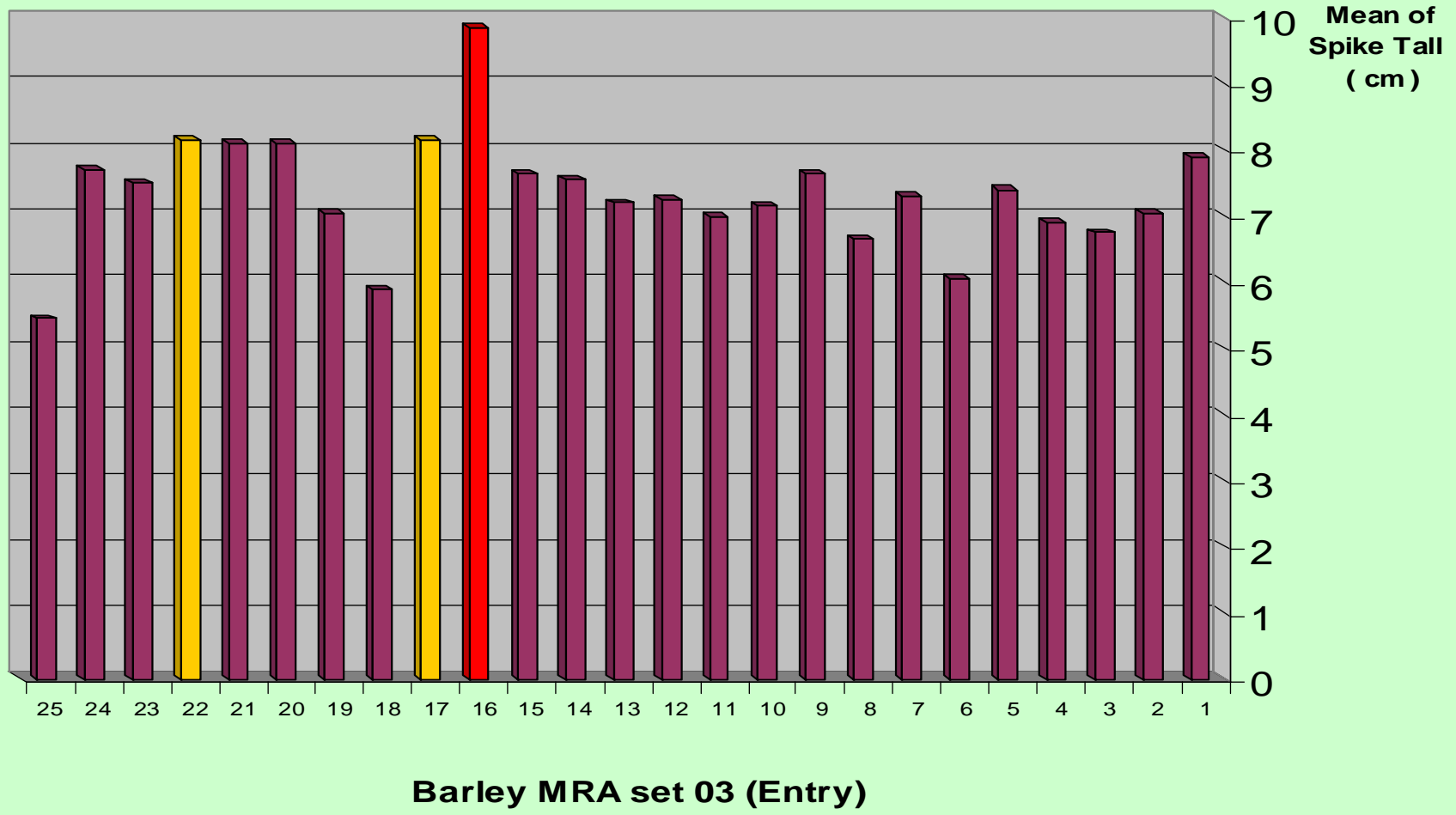




Barley MRA set 03 (Entry)

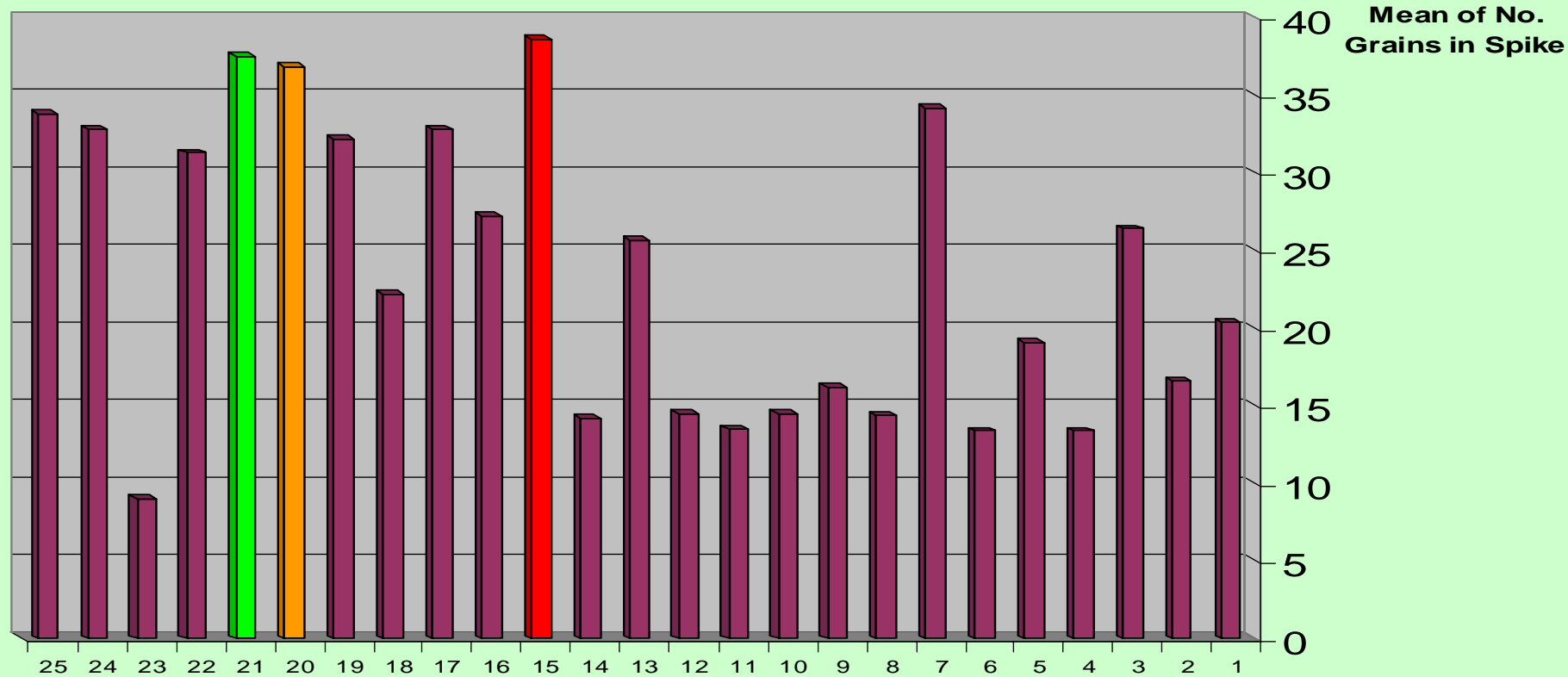
Fig(5): Plant height (cm) of MRA Barley Entry

- 16 Arda / Moroc 9-75
- 17 Lignee 527 / Chn - 01 /3/Arar// CompCr 29 / C63
- 22 N - Acc -4000 - 301 - 80 / IFB 974 // Alanda -01



Fig(6): Spike Tall (cm) of MRA Barley Entry

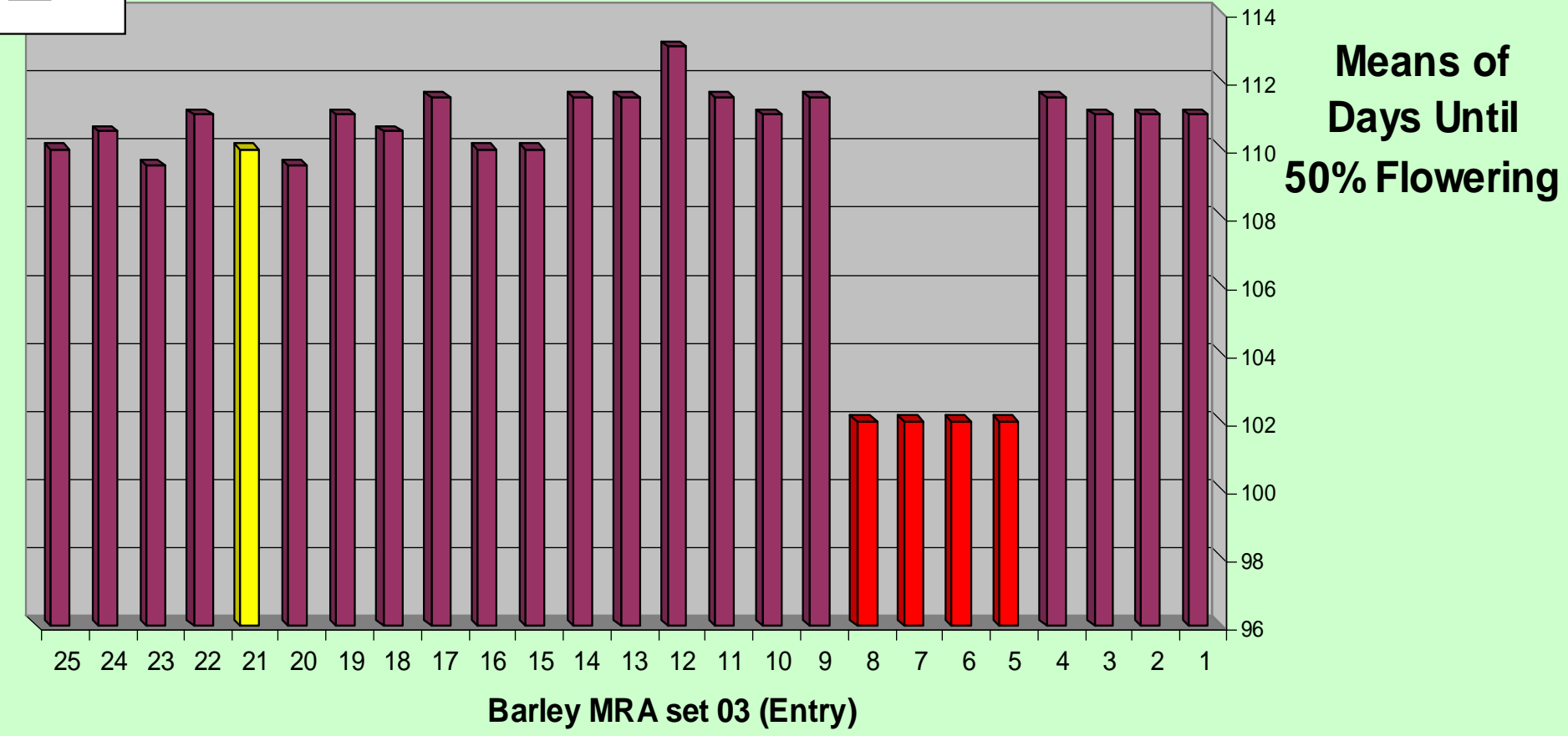
- 15 UZB-Farghona -ICB-123442// ICB -107766 /K-332-1
- 21 Alanda // lignee 527 / Arar / Alanda -01 /Alanda -01
- 20 Eldorado // Alanda / Hamra -01



Barley MRA set 03 (Entry)

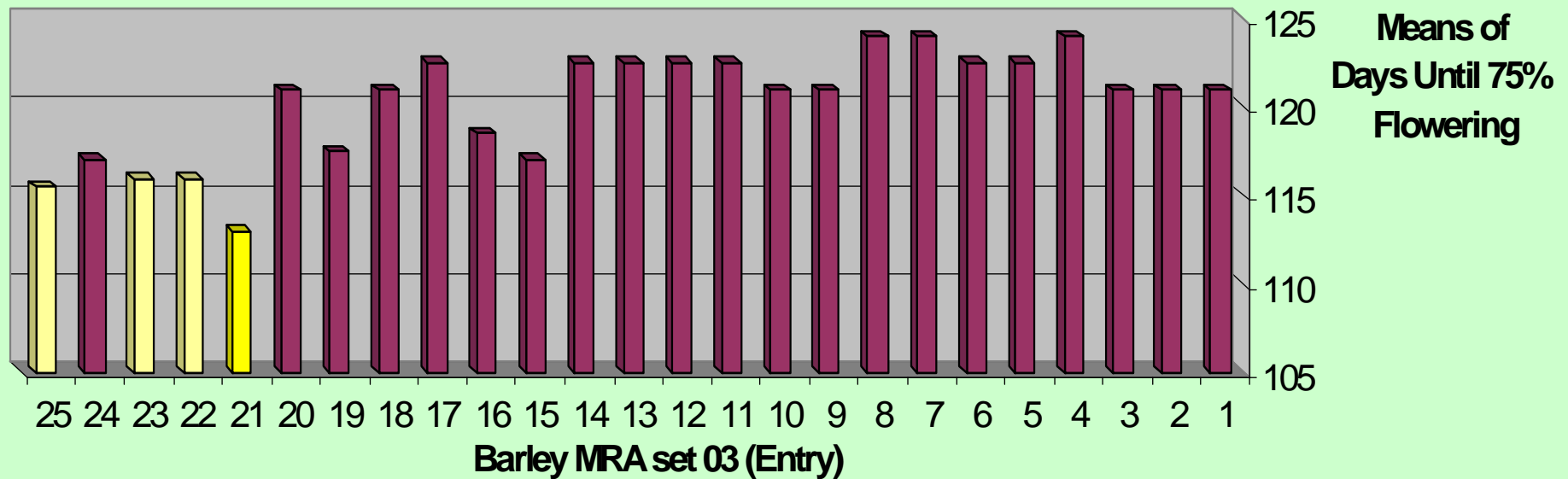
**Fig(7): No. of grains in spike of MRA
Barley Entry**

- 5 WI2291/Tadmor /4/ChiCm/An57//Albert /3 /Alger / Ceres362-1-1
- 6 SLB 34 -40 // W12291 / Tadmor
- 7 Moroc 9-75 / Arabi Aswad
- 8 SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02 (ICB95-0788-0AP-15AP-0AP-2TR-0AP)



Fig(8): Days until 50% Flowering of MRA Barley Entry

- 21 Alanda // lignee 527 / Arar / Alanda -01 /Alanda -01
- 22 N- Acc -4000 - 301 - 80 / IFB 974 // Alanda -01
- 23 Manal / Alanda 01
- 25 Rihane - 03



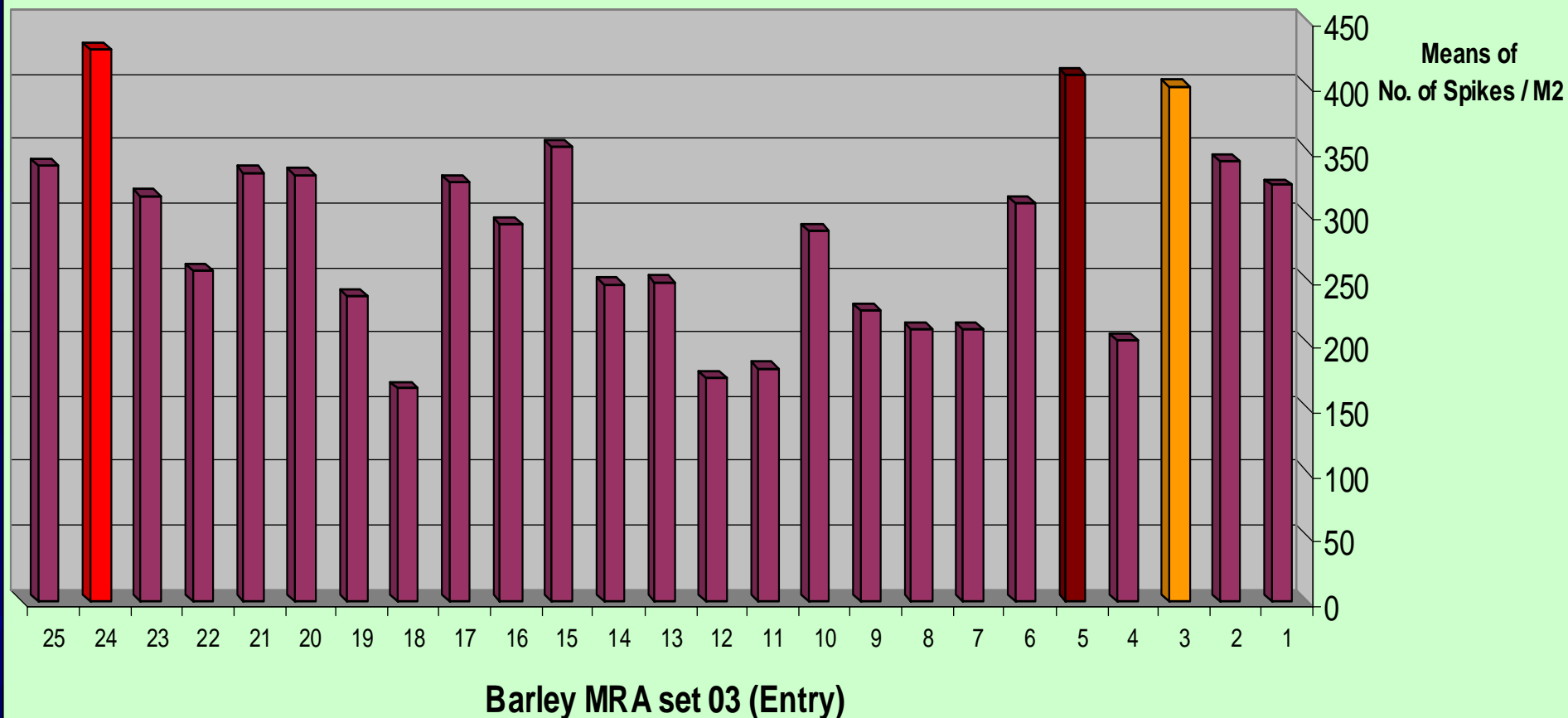
Fig(8): Days until 75% Flowering of MRA Barley Entry



Assala - 04

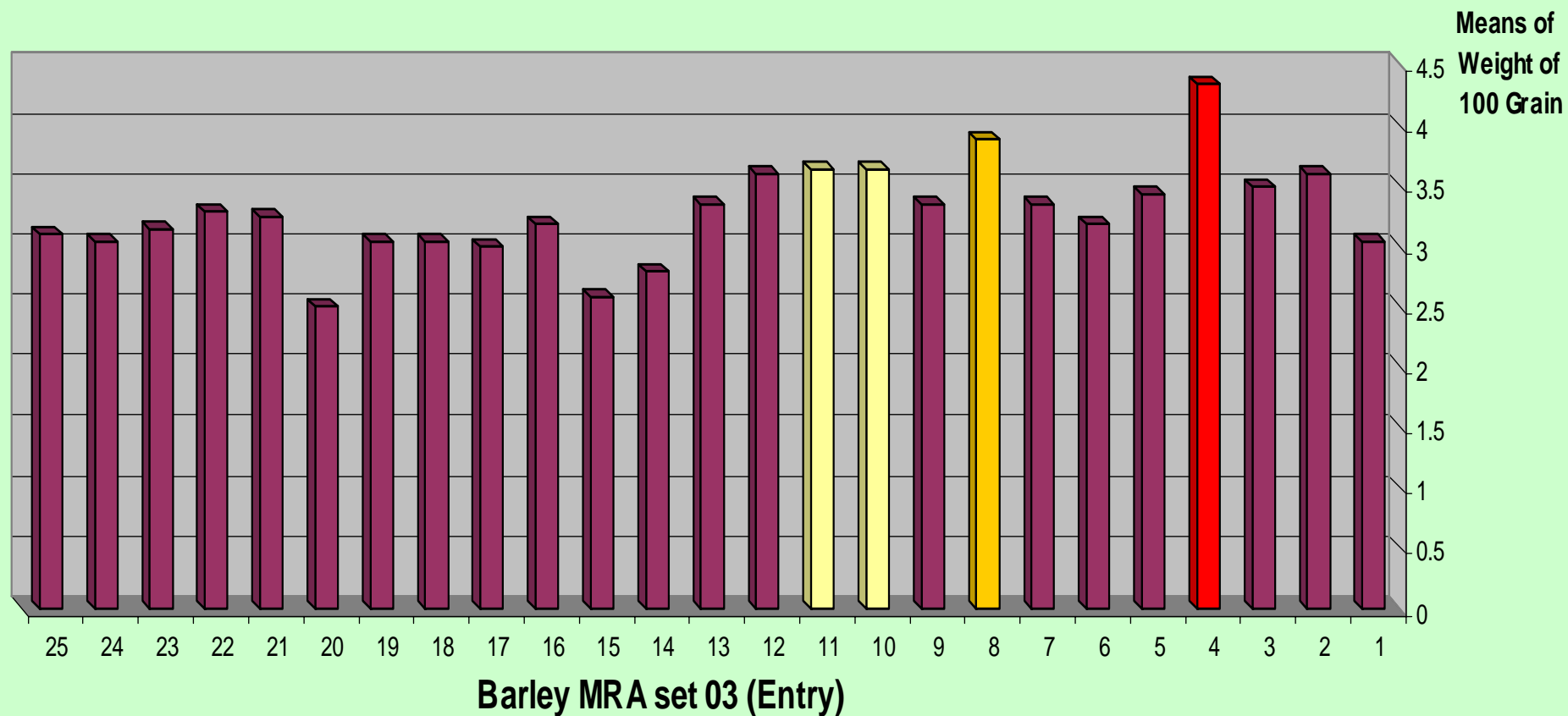
WI2291/Tadmor /4/ChiCm/An57//Albert /3 /Alger / Ceres362-1-1

ETHGAW 80 - 4/3 / Tadmor // WI2291 / WI2269



Fig(9): No. of spikes / m2 of MRA Barley Entry

- 4 ER/Apm// Lignee 131 / 3 / Lignee 131 / Arabi Abiad/4 / Zanbaka
- 8 SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02 (ICB95-0788-0AP-15AP-0AP-2TR-0AP)
- 10 SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02 (ICB95-0788-0AP-15AP-0AP-9TR-0AP)
- 11 SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02 (ICB95-0788-0AP-15AP-0AP-15TR-0AP)



Fig(10): Weight of 100 Grains of MRA Barley Entry

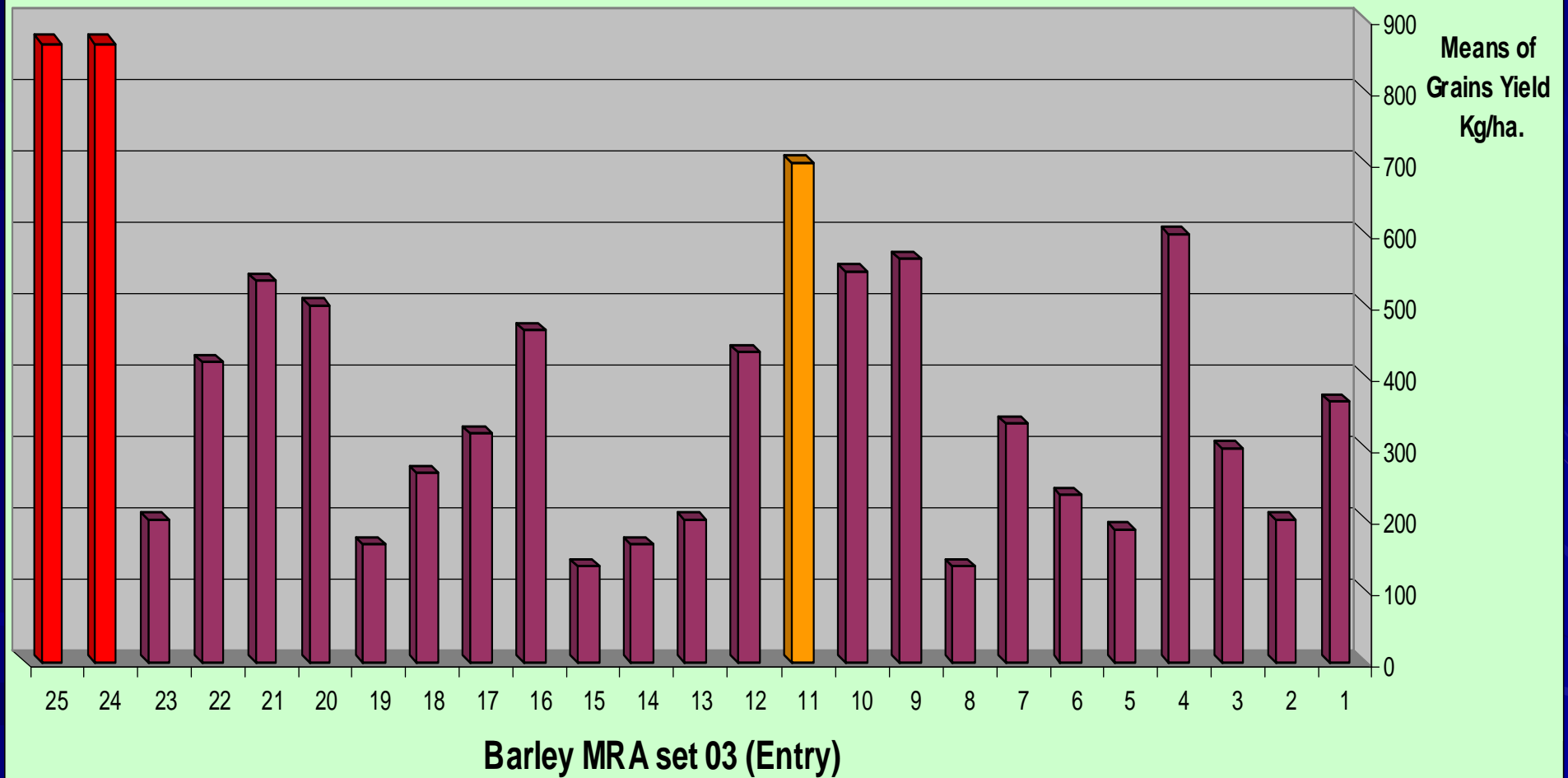
- 24
- 25
- 11

Assala - 04

Rihane - 03

SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02 (ICB95-0788-0AP-15AP-0AP-15TR-0AP)

*** (Assala -04:- Superior in Plant height and No. Spikes \ M2)**

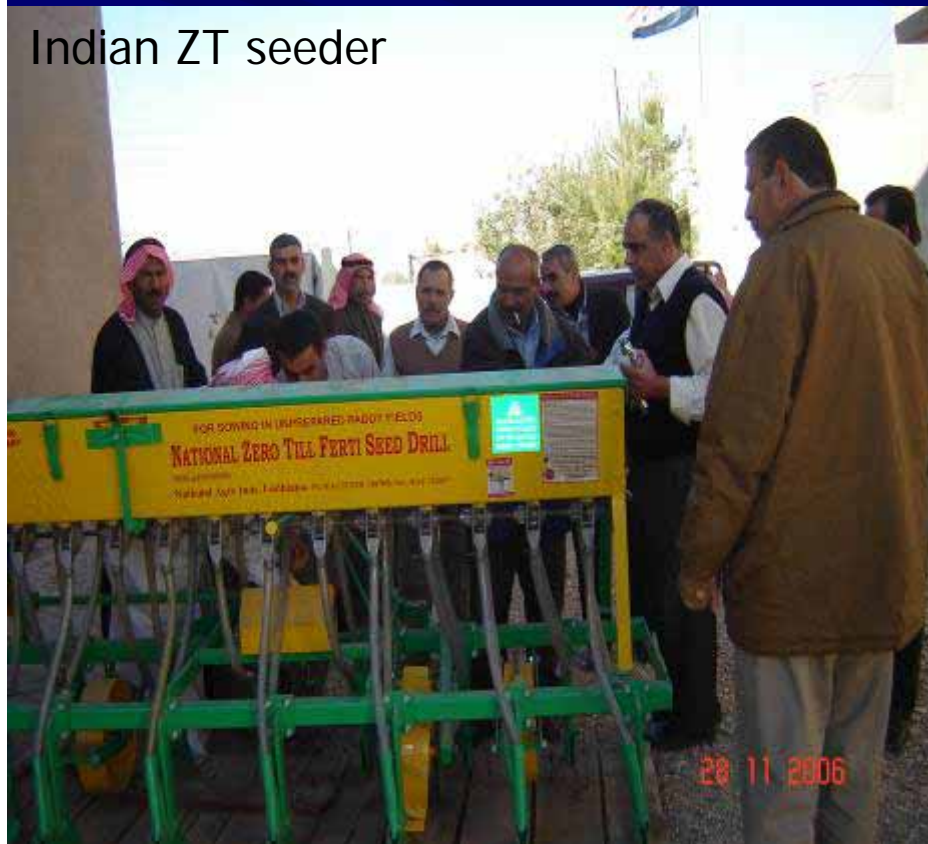


Fig(11): Grains Yield (Kg/ ha.) of MRA Barley Entry

En	Name	Pedigree	FAO Status SOURCE	SN
1	Cerise/Lignee1479//Moroc9-75/pmB/3/ArabiAbiad/Arar//H.spont.41-5/Tadmor	ICB01-0678-0AP	U LS07IN	50
2	WI2291//Alger/Ceres362-1-1/3/ArabiAbiad/Arar//H.spont.41-5/Tadmor	ICB01-0681-0AP	U LS07IN	51
3	ETHGAW 80 - 4/3 / Tadmor // WI2291 / WI2269	ICB98-0494-0AP-17AP-0AP	U LS07IN	53
4	ER/Apm //Lignee131/3/Lignee131/ArabiAbiad/Arar/4/Zanbaka	ICB98-1096-0AP-24AP-0AP	U LS07IN	59
5	WI2291/Tadmor /4/ChiCm/An57//Albert /3 /Alger / Ceres362-1-1	ICB98-11142-0AP-12AP-0AP	U LS07IN	60
6	SLB 34 -40 // W12291 / Tadmor	ICB98-1053-409AP-0AP	U LS07IN	72
7	Moroc 9-75 / Arabi Aswad	ICB86-00426-0AP-60AP-1AP-1AP-1AP-0AP-19TR-0AP	U LS07IN	73
8	SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02	ICB95-0788-0AP-15AP-0AP-2TR-0AP	U LS07IN	76
9	SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02	ICB95-0788-0AP-15AP-0AP-4TR-0AP	U LS07IN	77
10	SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02	ICB95-0788-0AP-15AP-0AP-9TR-0AP	U LS07IN	78
11	SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02	ICB95-0788-0AP-15AP-0AP-18TR-0AP	U LS07IN	79
12	SLB 45-90 /H.spont .41-5/3/Lignee1242 /Hml -02	ICB95-0788-0AP-15AP-0AP-7AP-0AP	U LS07IN	80
13	ARM-ICB12347/UZB-Dzhizak-ICB-123667	ICB02-2393-50AP-0AP	U BI08IN	85
14	AZE-Nagorno-Karabakh-ICB-123332/4/RWA.M54/3/K-247/2401-13//Vavilon	ICB04-1527-0AP	U BI08IN	1011
15	UZB-Farghona -ICB-123442// ICB -107766 /K-332-1	ICB04-1914-0AP	U BI08IN	1021
16	Arda / Moroc 9-75	ICB93-1136-0AP-5AP-0AP	U IBYT07-MRA	2
17	Lignee 527 / Chn - 01 /3/Arar// CompCr 29 / C63	ICB93-0946-0AP-23AP-0AP	U IBYT07-MRA	8
18	Courlis / Rhn-03	ICB93-0923-0AP-5AP-0AP	U IBYT07-MRA	11
19	Eldorado /3/Nk1272//Manker /Arig8	ICB94-0162-0AP-9AP-0AP	U IBYT07-MRA	12
20	Eldorado // Alanda / Hamra -01	ICB94-0189-0AP-18AP-0AP	U IBYT07-MRA	14
21	Alanda // lignee 527 / Arar / Alanda -01 /Alanda -01	ICB96-01923-0AP-43AP-0AP	U IBYT07-MRA	16
22	N - Acc -4000 - 301 - 80 / IFB 974 // Alanda -01	ICB96-01087-0AP-7AP-0AP	U IBYT07-MRA	17
23	Manal / Alanda-01	ICB97-0936-0AP-14AP-0AP	U IBYT07-MRA	19
24	Assala -04		U IBYT07-MRA	21
25	Rihane-03		U CHECK07	1

Locally manufactured No-Tillage sowing machine

Indian ZT seeder



Iraqian Z.T Seeder with Press Wheels



- Working width 213 cm
- Total weight 700 kg
- Blade spacing 16 cm
- No. of blades 13 (divided between two rows)
- Sowing depth 0-12 cm
- Seeds box capacity 170 kg of wheat
- Fertilizers box capacity 170 kg of granular material



Notes about Locally manufactured No-Tillage sowing machine

- The machine was initially manufactured by Mosul Company for Mechanical works as a replicate of the Indian sowing machine that was imported and used in Mosul for the program. Modifications were made for the skeleton of the machine and the moving parts in order to become more robust and durable regarding the dominant local working conditions which the manufacturing company has a long experience in making agricultural machines suitable for them, by which locally available material and techniques were used. Similar depth control and power transfer methods to the Indian machine were used. Adjustable soil press wheels were added to the local version, one for each sowing blade.

Notes :

- 1. The local version was eventually tested in the field and the process was documented by video and photos. The test took place in a field that was planted with wheat using No-Tillage method for the last two seasons, and the dry stubble of wheat were relatively dense. The pressing wheels and the blades along with the depth control steel wheels were stacked near each other, and caused stubble accumulate in between while sowing process. This caused sowing lines to be swept by the accumulating dense stubble , we think that this problem will be solved by increase the distance between rows to 20 cm. .

Notes

- 2-The pressing wheels seemed to be well shaping the grooves (canals) made by the blades.
- Then we moved to the second field which was also planted by No-Tillage method the last season, but the stubble were less dense. Here the dry stubble accumulation was no problem, and the sowing lines were distinct.
- 3-we need to change the inner place of the depth control wheels to outer place to save all rain harvest canals (rows) .
- 4- we need to know the exact pressure for press wheels under different soil texture

Thank You