

## QUALITY OF THE 1997 CROP

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### Abstract

American Upland cotton quality has generally been at a high level for the past five crop years for the major quality factors. Classers' color grades of 41/32 and higher accounted for over 85 percent of the crop for four of the past five years. Classer color grades 41/32 and higher amounted to 89 percent for the 1997 crop through December 15, the highest of the past five crop years. Classers' leaf grades averaged 3.1 for the 1997 crop and ranged from 2.9 to 3.1 for the past five crops. The percentage of extraneous matter averaged lower in the 1997 crop than the previous two crops but higher than the 1993 crop. The average mike for the U.S. crop was 4.3 for the past three crop years. The U.S. strength average was 29.0 for the 1997 crop, up from 28.4 for the 1996 crop and down slightly from 29.1 in 1995. The U.S. staple length averaged 35.2 for the past two crop years.

### Introduction

The quality of the 1997 Upland and Pima cotton crops based on USDA classification has been compared with crops from the previous four years for the most important quality factors. Classers' color grade and leaf grade for Upland cotton, classers' grade for Pima cotton, and extraneous matter plus HVI mike, strength, and length were the quality factors compared. Quality factors not compared in this report were length uniformity, HVI color and trash (Upland). Comparisons were made for the entire United States Upland and Pima crops with regional comparisons made for Upland: the Southeast, the Mid-South, Texas/Oklahoma, the Desert Southwest, and the San Joaquin Valley. The regional breakdown and classing office groupings by region are as follows:

REGION	CLASSING OFFICES DATA INCLUDED
Southeast	Florence, Macon, Birmingham
Mid-South	Rayville, Dumas, Memphis, Hayti
Texas/Oklahoma	Corpus Christi, Abilene, Lamesa, Lubbock
Desert Southwest	Phoenix
San Joaquin Valley	Visalia

The 1997 data was cut off on December 15. The Division had classed 16,184,000 samples (including 349,000 Pima) through that date. The Division expects to class around 18,200,000 samples from the 1997 crop by season's end.

The data represents Upland and Pima classings from recent crop years as shown below:

Crop Year	CLASSINGS	
	Upland	Pima
1997 *	15,834,000	349,000
1996	17,680,000	426,000
1995	16,752,000	301,000
1994	18,521,000	289,000
1993	15,012,000	305,000

\* through December 15, 1997

### Discussion

#### Classers' Color Grade

The percentage of color grades 41/32 and higher was 89 percent for the U.S. crop in 1997, an all-time high or since the separation of color and leaf started in 1993. Color grades were at or near highs in all regions except the Southeast where only 65 percent were 41/32 and higher.

#### Classers' Leaf Grade

Leaf grades averaged 3.1 for the 1997 crop, the lowest since the 1994 crop that also averaged 3.1. Leaf grades averaged lower (high number) in 1997 than the previous four crop years in all regions but the Desert Southwest and the San Joaquin Valley. Leaf grade averages indicated a cleaner crop in those two regions.

#### Extraneous Matter

The percentage of extraneous matter was about average for the 1997 crop when compared with other crop years and less than that of the 1995 and 1996 crops.

#### Mike

Mike averaged 4.3 for the 1997 crop. The previous four crops averaged 4.2 to 4.4. The Southeast averaged 4.4 for the 1997 crop compared to 4.2 to 4.6 for the past four crops. The Mid-South also averaged 4.4 in 1997, while the 1993-1996 crops averaged 4.3 to 4.6. Texas/Oklahoma has averaged 4.1 in 1997, up from 3.9 in 1995 and 1996 but down from 4.2 in 1993 and 1994. The Desert Southwest averaged 4.6 for the third year in a row and four out of the last five. The 1994 crop averaged 4.8. The San Joaquin Valley averaged 4.2 for the second year in a row. The 1993-1995 crops averaged lower at 4.0 to 4.1.

#### Strength

Average strength for the 1997 crop averaged 29.0 grams per tex, higher than any previous crop except for the 1995 crop that averaged 29.1. The Texas/Oklahoma crop averaged 29.0, an all-time high for that region. The Desert Southwest averaged 28.0, the lowest since the 1993 crop averaged 27.7. The San Joaquin Valley averaged 31.7, also the lowest since 31.0 for the 1993 crop.

#### Length

The U.S. crop averaged 35.2 for the second year in a row. The 1994 crop also averaged 35.2, while the 1993 and 1995 crops averaged 35.0. The Southeast had the shortest crop in recent years with a 34.8 average. The average for the preceding four crops ranged from 35.0 to 35.6. Conversely, the Mid-South averaged 36.1, the highest in recent years. The average of the past four crops ranged from 35.1 to 35.5. Texas/Oklahoma averaged 33.9, down from 34.3 in 1996 and the same as the 1994 and 1995 crops and longer than the 33.7 for 1993. The Desert Southwest length average of 35.5 was shorter than the previous four crops that ranged from 35.7 to 36.1. The San Joaquin Valley averaged 36.3, the shortest since the 1993 crop averaged 36.2. The last three crops averaged 36.5 to 36.6.

**American Pima**

Grade 3 and higher averaged nearly 99 percent for the 1997 crop through mid-December. Grade 3 and higher percentages ranged from 89 percent to 93 percent for the past four crops. Length averaged 45.7 in 1997 compared to averages of 45.6 to 45.9 for the past four crops. Mike has averaged 4.0 for four of the past five Pima crops. The 1995 crop averaged 3.8.

Strength averages for the last five Pima crops were within a close range of 37.8 to 38.1. The 1994 and 1997 crops averaged 38.1.

**Summary**

The United States Upland and Pima crops have generally improved in the 1990's. The past five crops discussed in this paper reflect high quality for all factors. The past five crops have been marked by high quality and production.

# **Cotton Division Classing Offices**

Region	Classing Offices(s)
Southeast	Florence, Macon, Birmingham
Mid South	Rayville, Dumas, Memphis, Hayti
Texas-Oklahoma	Corpus Christi, Abilene, Lamesa, Lubbock
Desert Southwest	Phoenix
San Joaquin Valley	Visalia

Figure 1. Regions/Classing Offices table.

# **Classings**

Crop Year	Upland	Pima
1997 (Dec. 15)	15,834,000	349,000
1996	17,680,000	426,000
1995	16,752,000	301,000
1994	18,521,000	289,000
1993	15,012,000	305,000

Figure 2. Upland and Pima Classings by Cop Year table.

# United States

Color Grade 41/32 and Higher

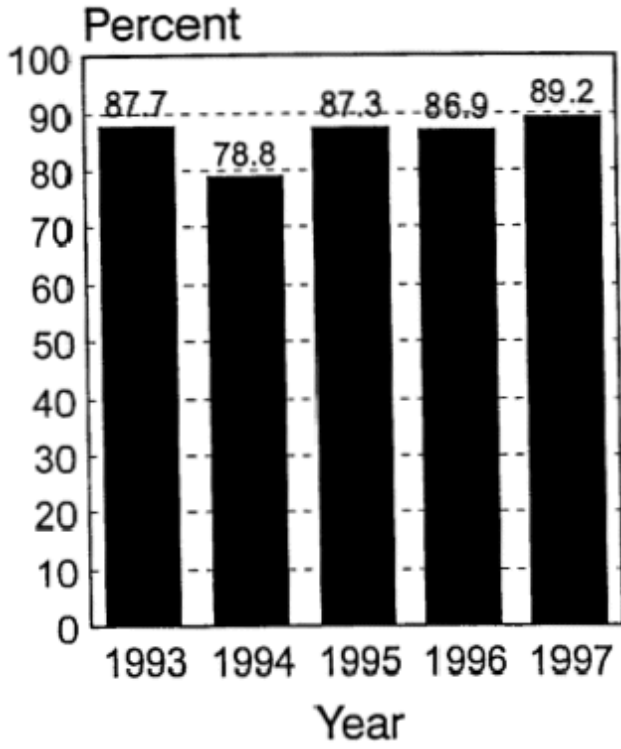


Figure 3. United States Color Grades 41/32 and Higher chart.

# Southeast

Color Grade 41/32 and Higher

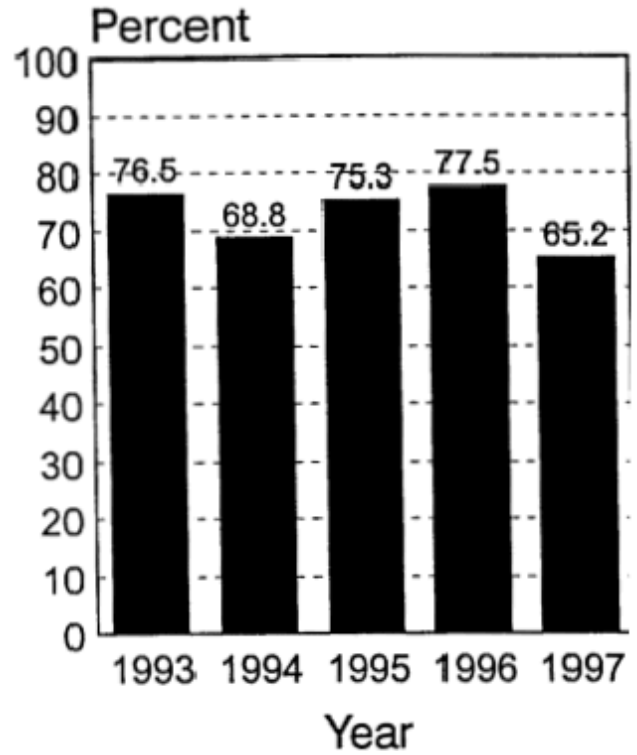


Figure 4. Southeast Color Grade 41/32 and Higher chart.

# Mid South

Color Grade 41/32 and Higher

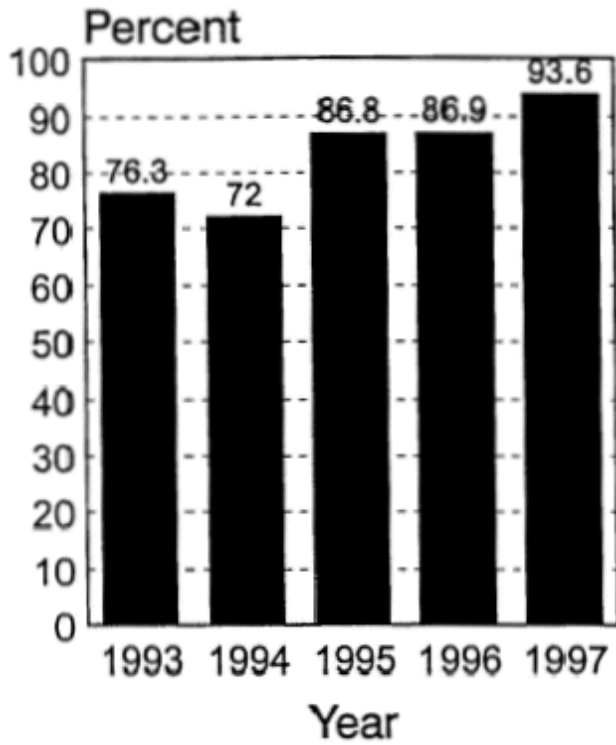


Figure 5. Mid South Color Grade 41/32 and Higher chart.

# Texas - Oklahoma

Color Grade 41/32 and Higher

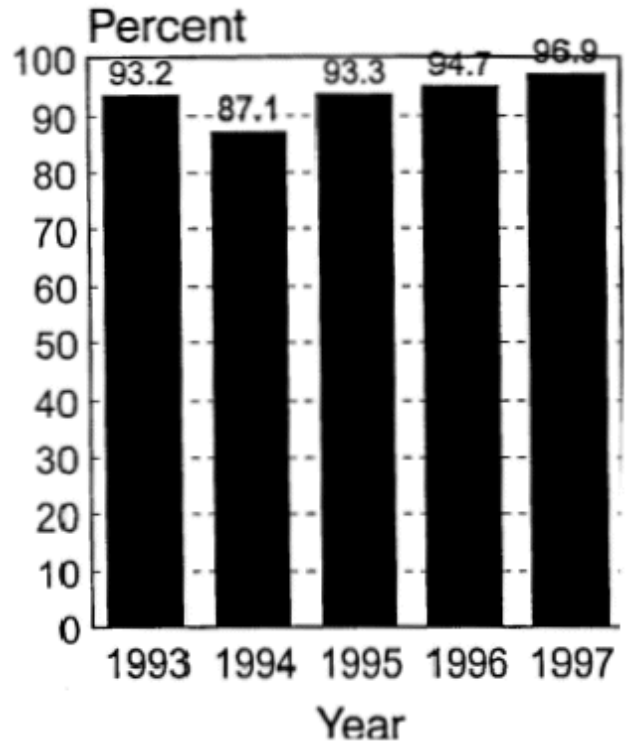


Figure 6. Texas-Oklahoma Color Grade 41/32 and Higher chart.

# Desert Southwest

Color Grade 41/32 and Higher

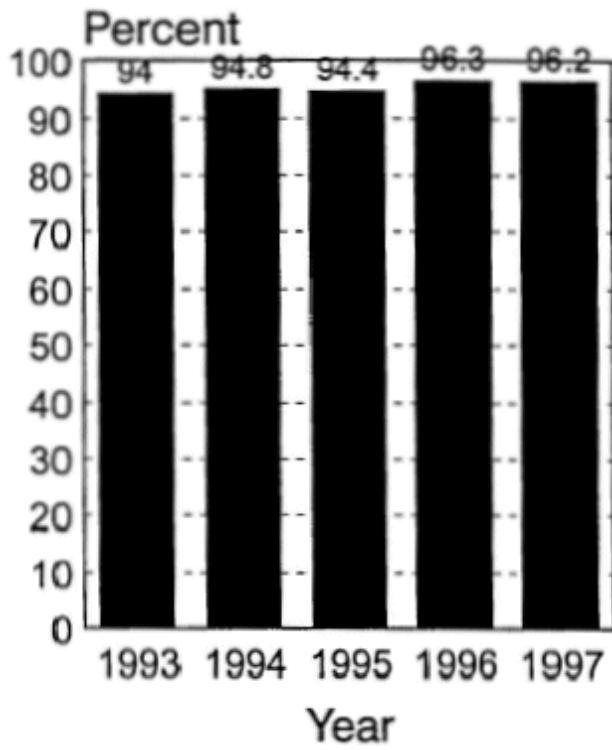


Figure 7. Desert Southwest Color Grade 41/32 and Higher chart.

# San Joaquin Valley

Color Grade 41/32 and Higher

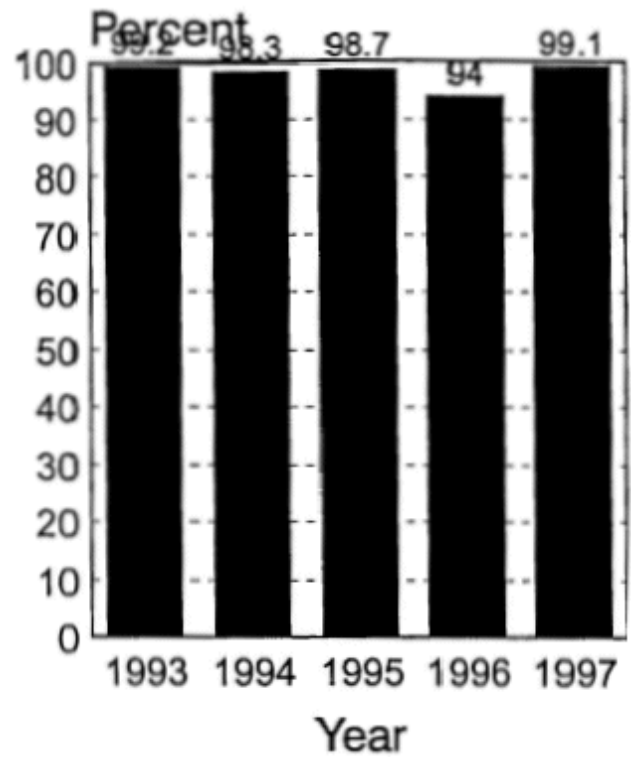


Figure 8. San Joaquin Valley Color Grade 41/32 and Higher chart.

# United States

## Leaf Grade Average

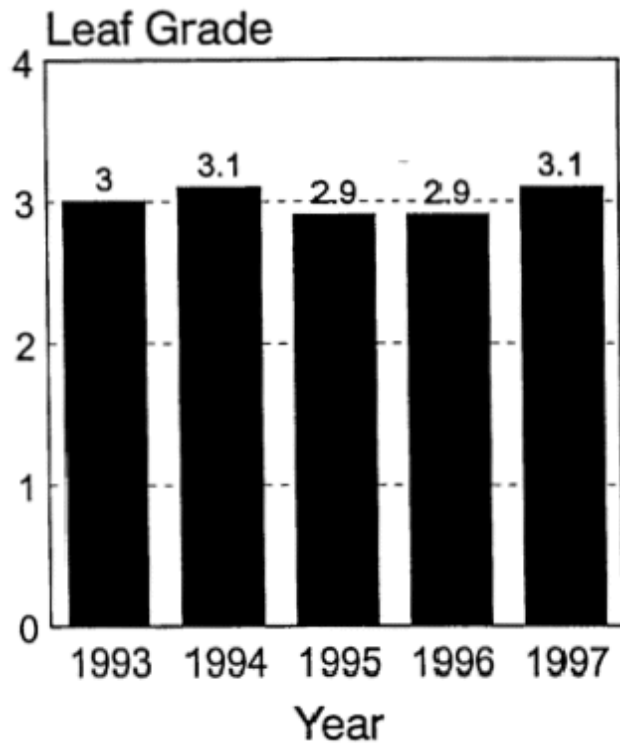


Figure 9. United States Leaf Grade Average chart.

# Southeast

## Leaf Grade Average

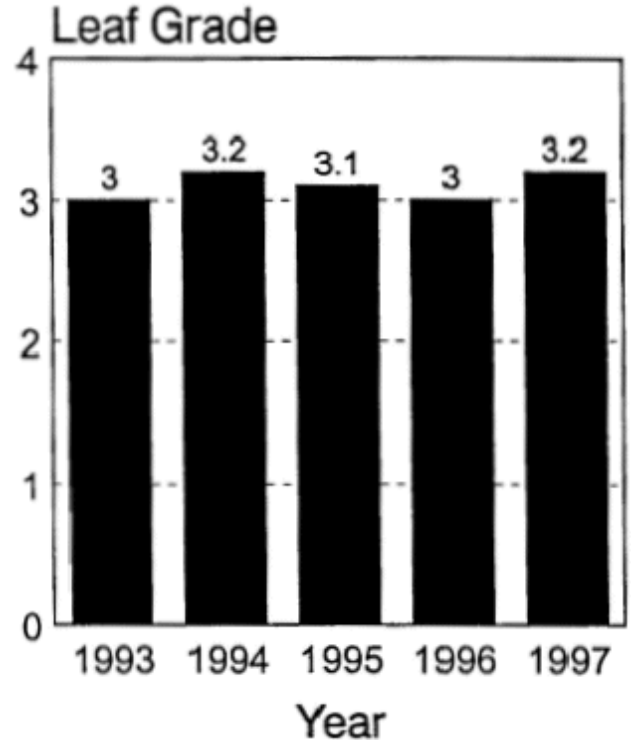


Figure 10. Southeast Leaf Grade Average chart.

# Mid South

## Leaf Grade Average

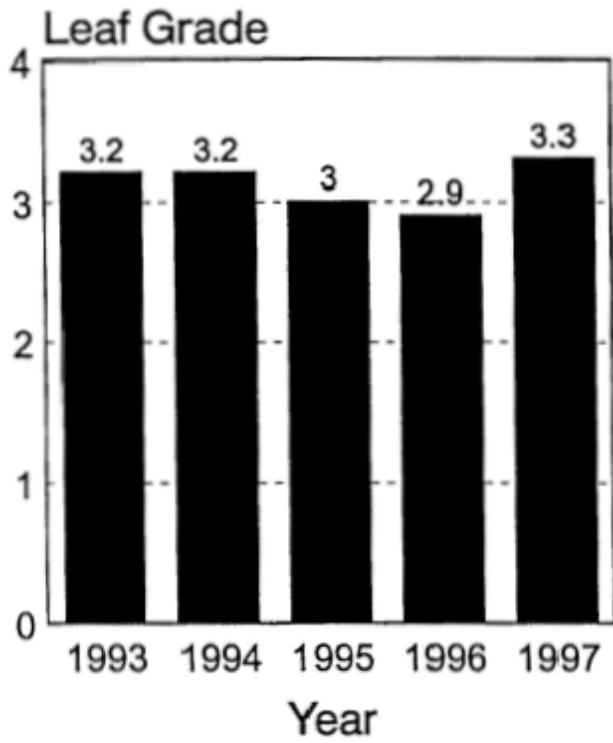


Figure 11. Mid South Leaf Grade Average chart.

# Texas - Oklahoma

## Leaf Grade Average

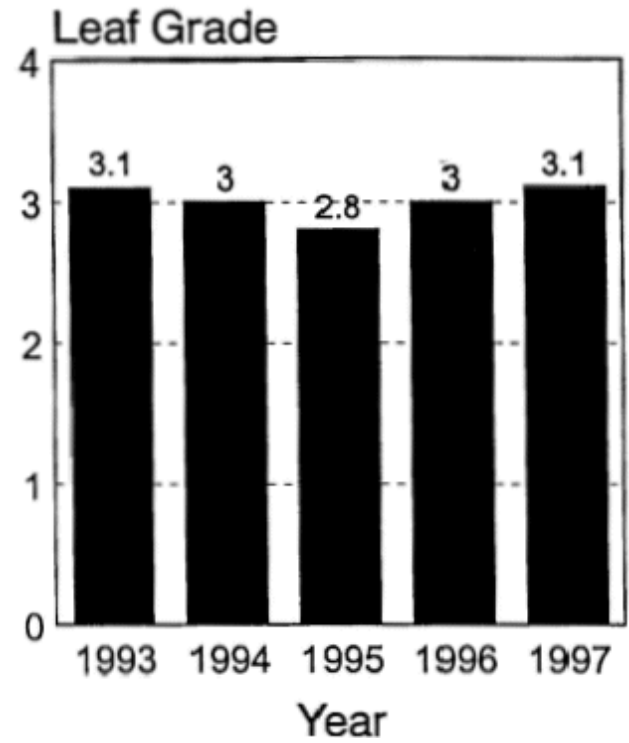


Figure 12. Texas-Oklahoma Leaf Grade Average chart.

# Desert Southwest

## Leaf Grade Average

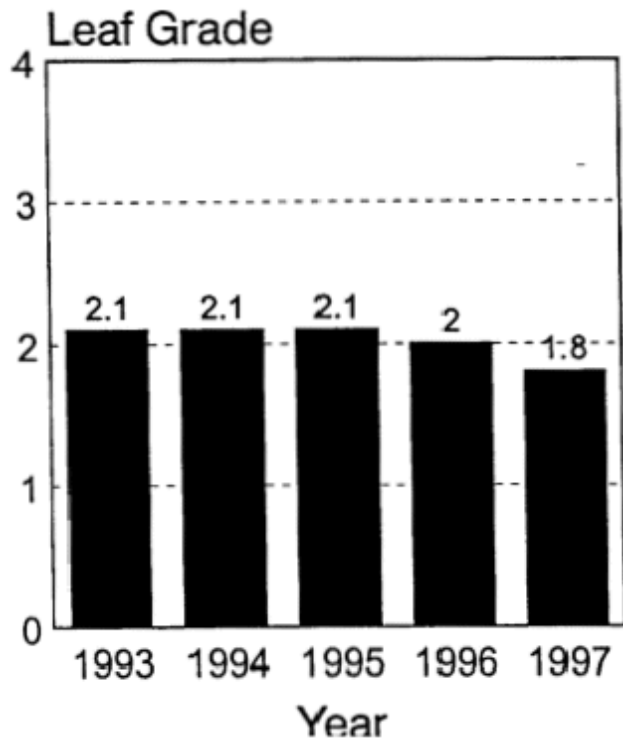


Figure 13. Desert Southwest Leaf Grade Average chart.

# San Joaquin Valley

## Leaf Grade Average

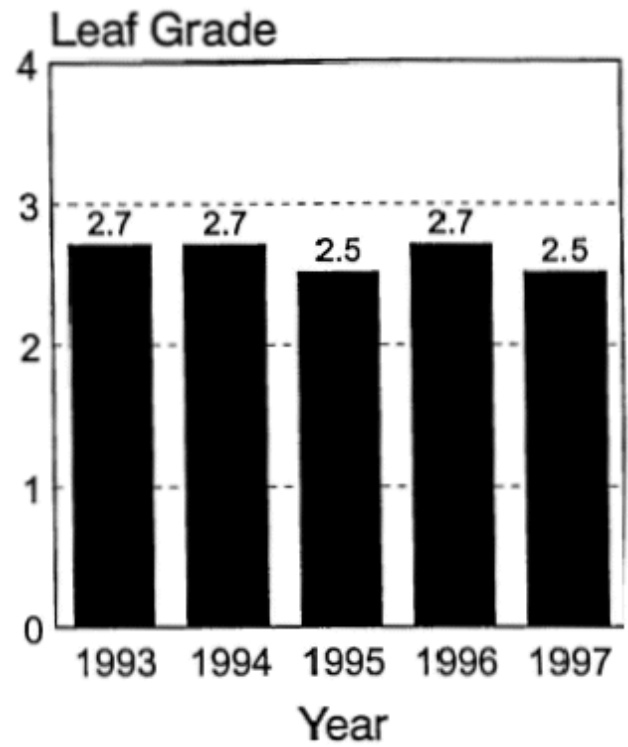


Figure 14. San Joaquin Valley Leaf Grade Average chart.



# United States

## Extraneous Matter

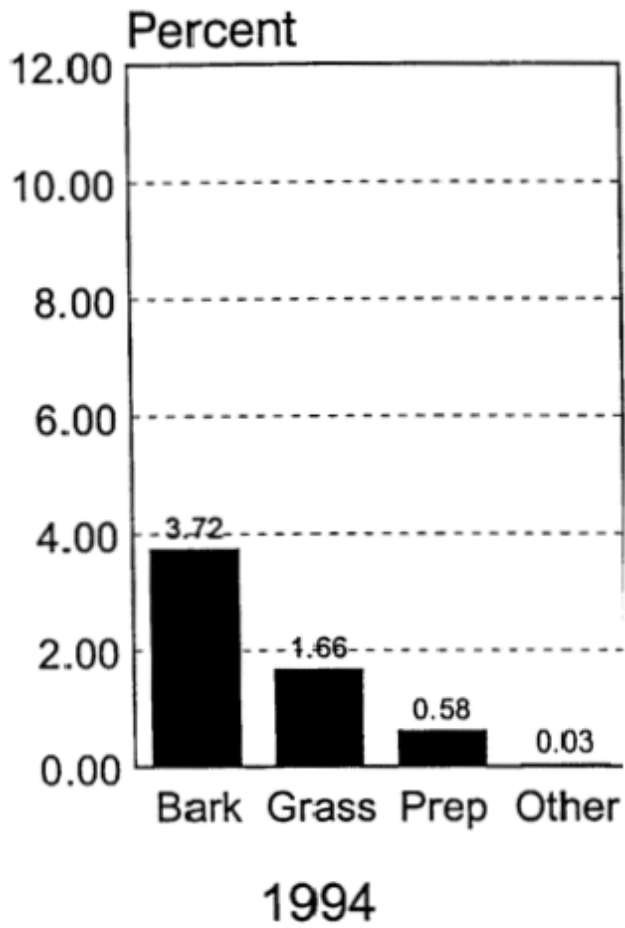


Figure 15. United States Extraneous Matter 1994 chart.

# United States

## Extraneous Matter

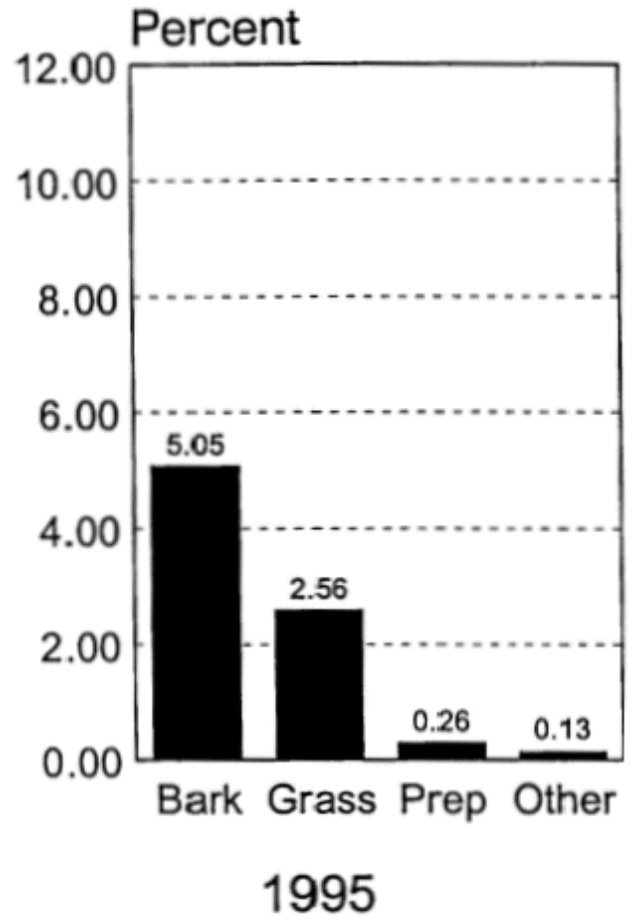


Figure 16. United States Extraneous Matter 1995 chart.

# United States

## Extraneous Matter

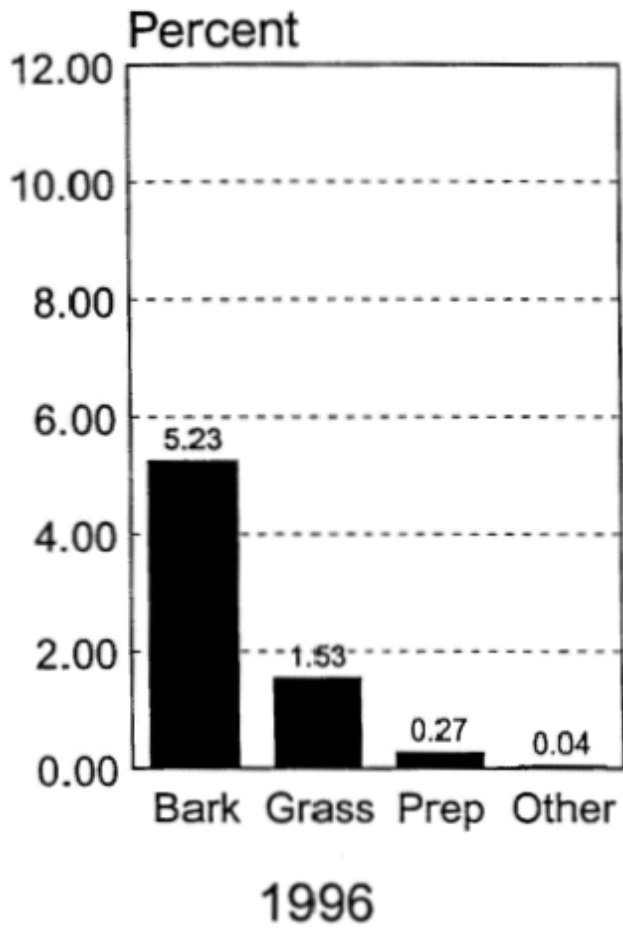


Figure 17. United States Extraneous Matter 1996 chart.

# United States

## Extraneous Matter

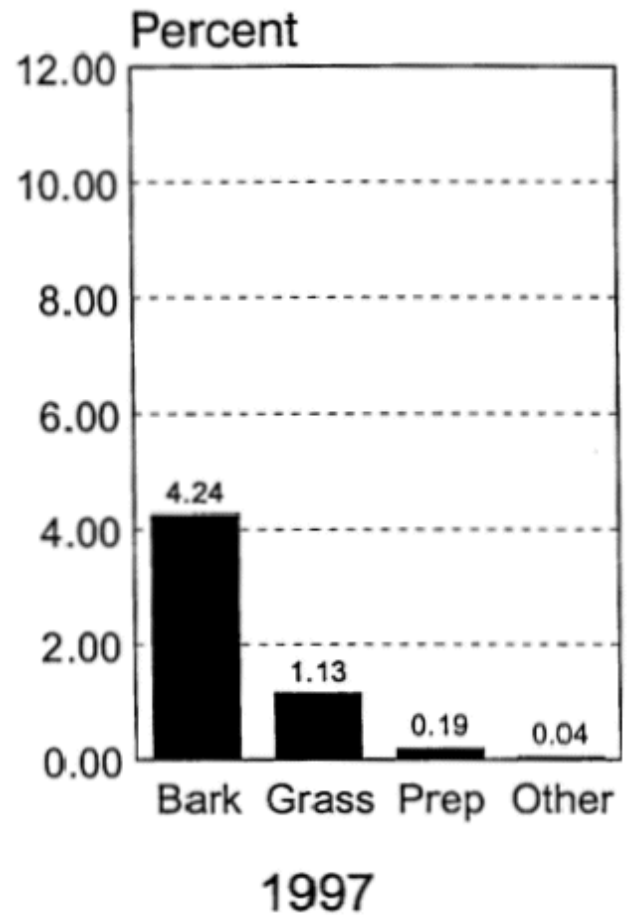


Figure 18. United States Extraneous Matter 1997 chart.

# United States

## Micronaire Average

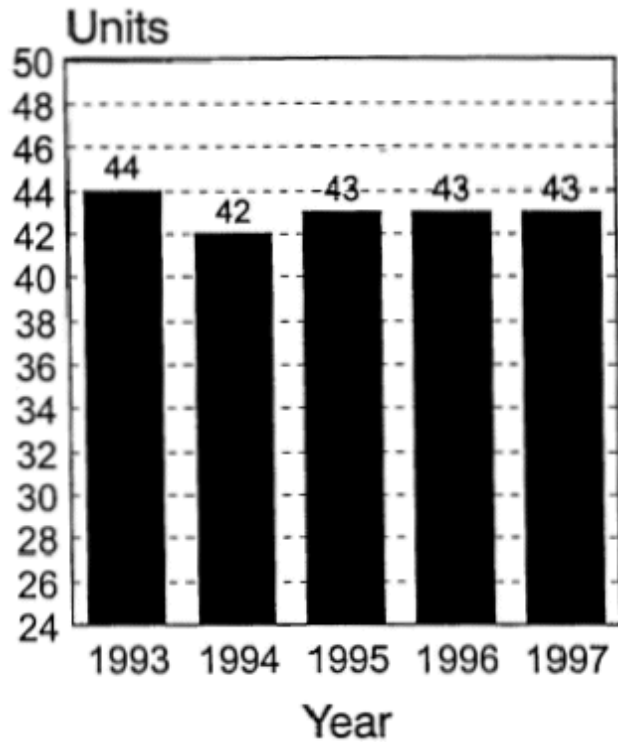


Figure 19. United States Micronaire Average chart.

# Southeast

## Micronaire Average

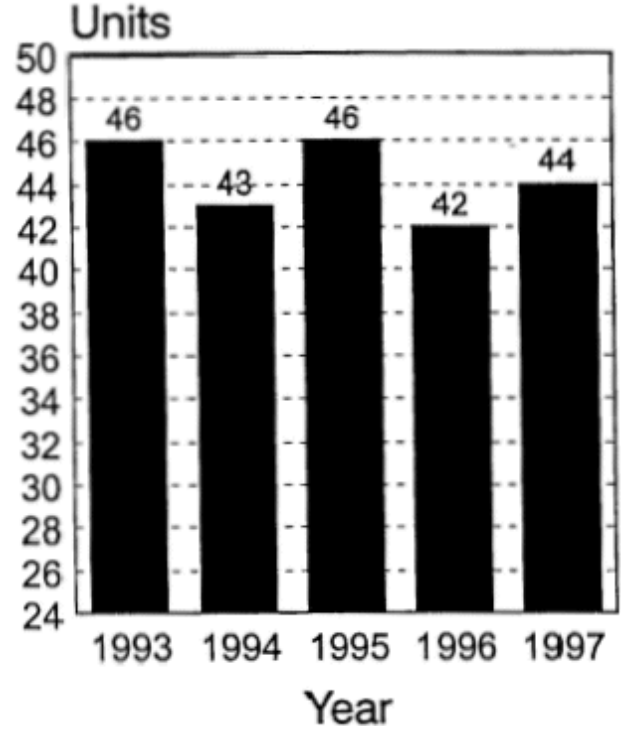


Figure 20. Southeast Micronaire Average chart.

# Mid South

## Micronaire Average

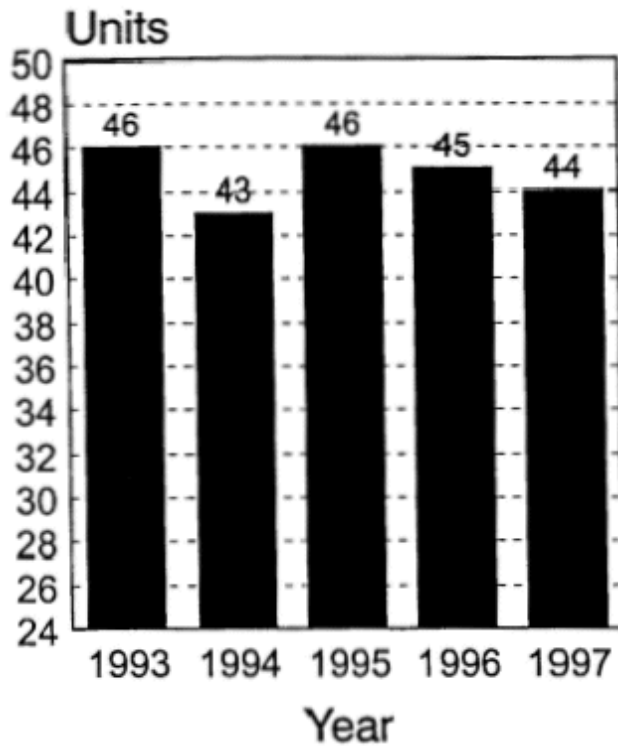


Figure 21. Mid South Micronaire Average chart.

# Texas - Oklahoma

## Micronaire Average

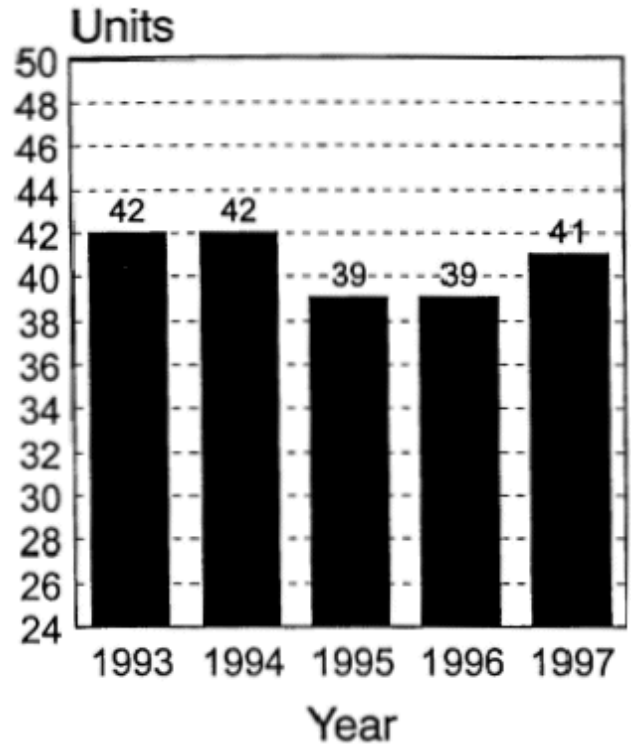


Figure 22. Texas-Oklahoma Micronaire Average chart.

# Desert Southwest

## Micronaire Average

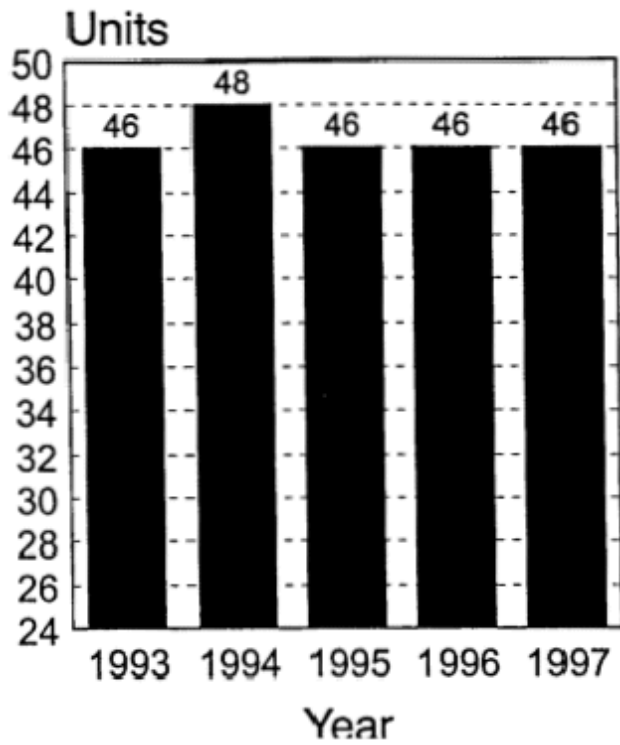


Figure 23. Desert Southwest Micronaire Average chart.

# San Joaquin Valley

## Micronaire Average

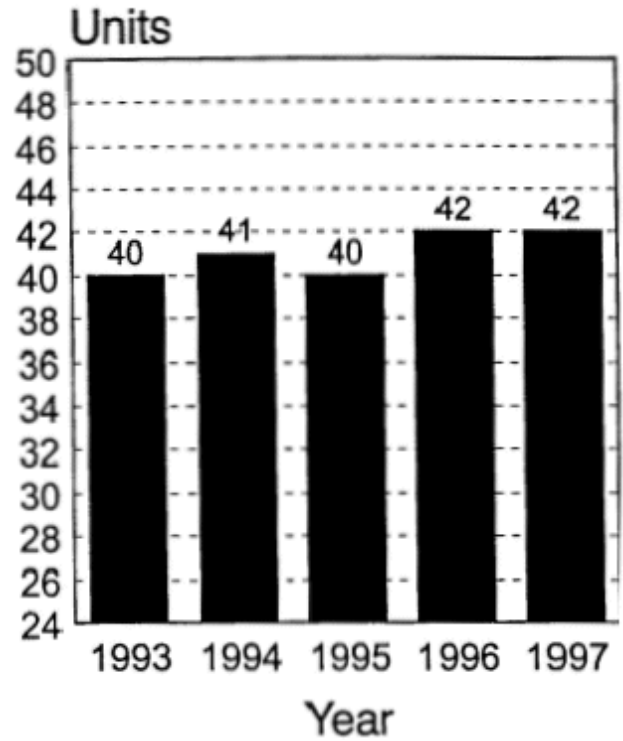


Figure 24. San Joaquin Valley Micronaire Average chart.

# United States

## Strength Average

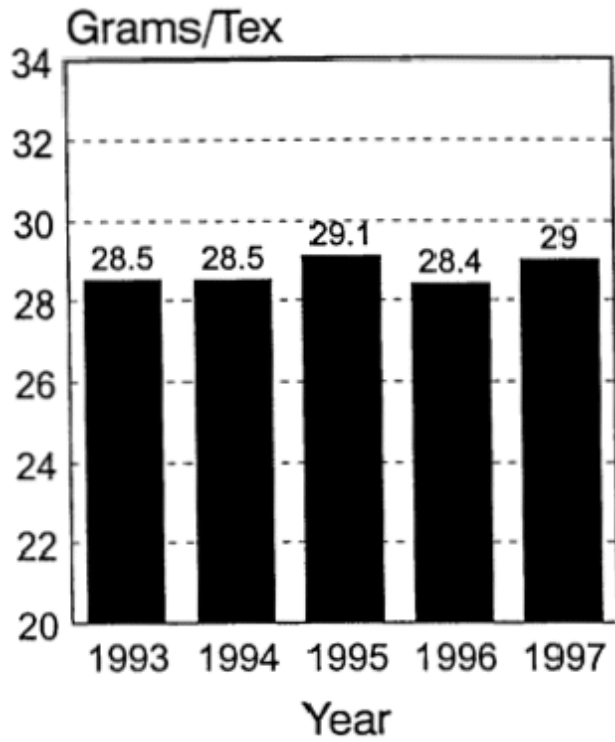


Figure 25. United States Strength Average chart.

# Southeast

## Strength Average

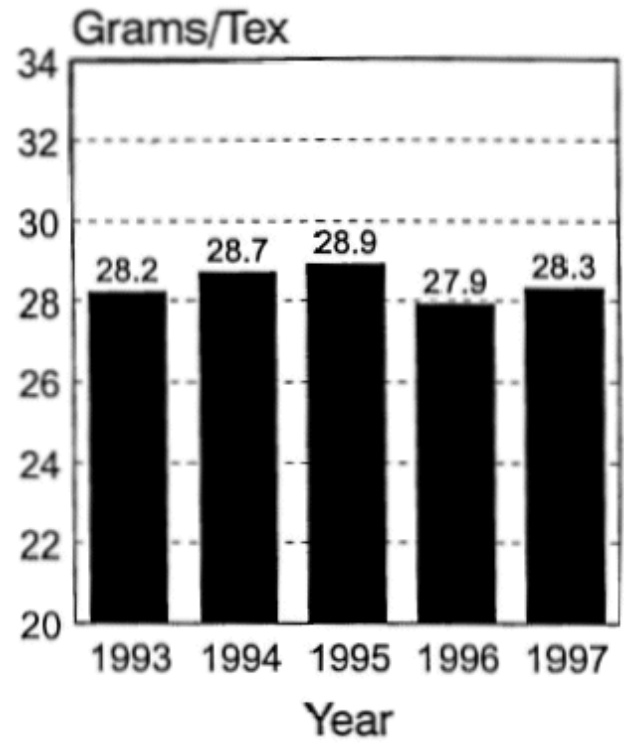


Figure 26. Southeast Strength Average chart.

# Mid South

## Strength Average

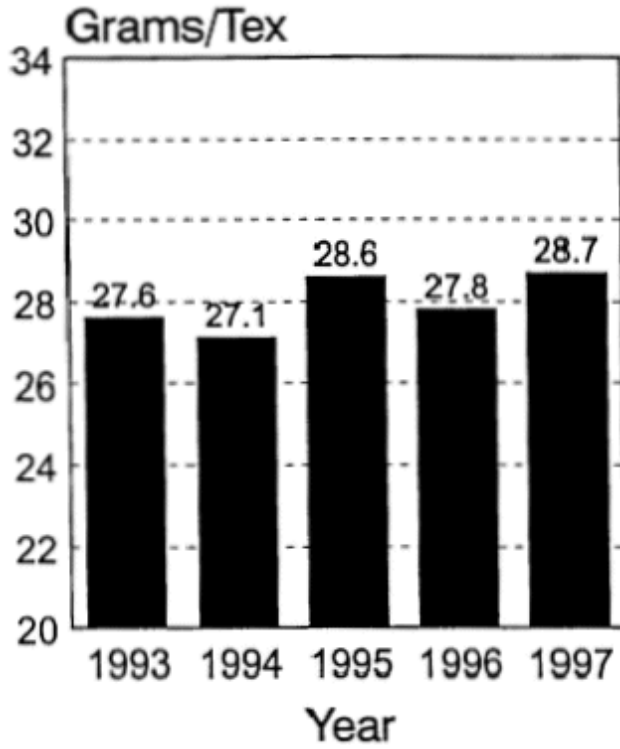


Figure 27. Mid South Strength Average chart.

# Texas - Oklahoma

## Strength Average

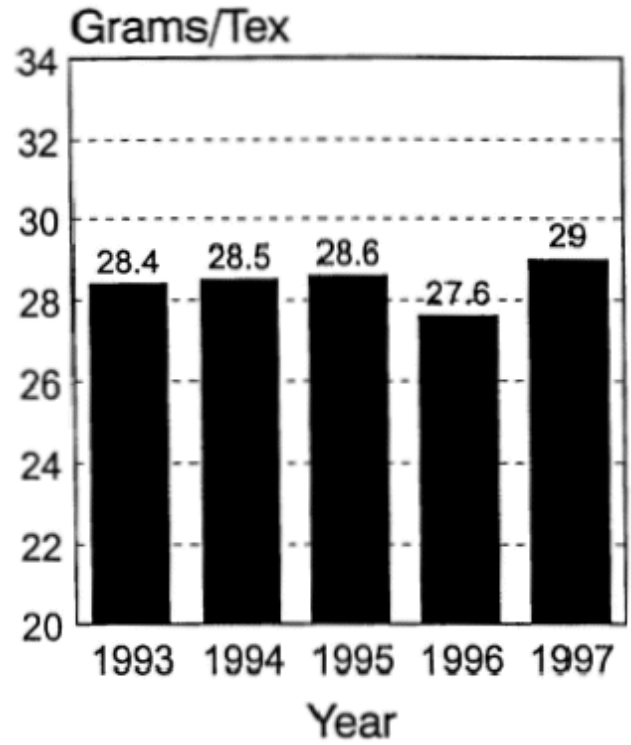


Figure 28. Texas-Oklahoma Strength Average chart.

# Desert Southwest

## Strength Average

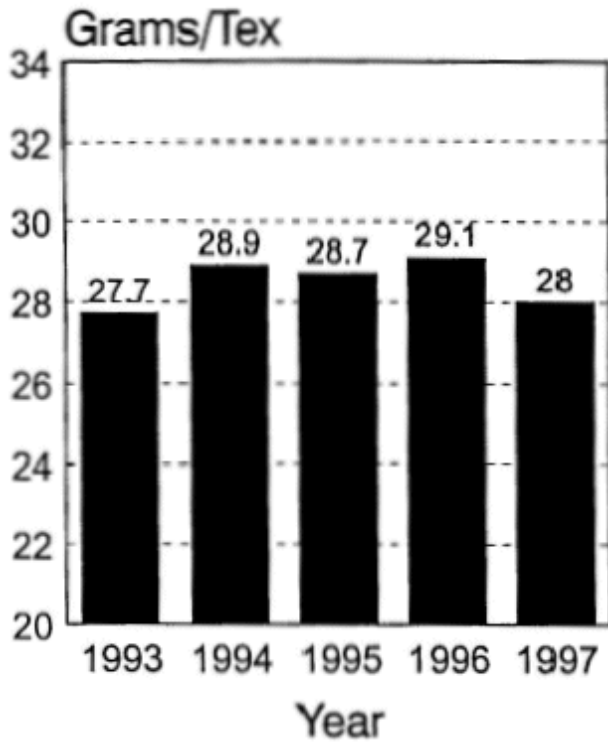


Figure 29. Desert Southwest Strength Average chart.

# San Joaquin Valley

## Strength Average

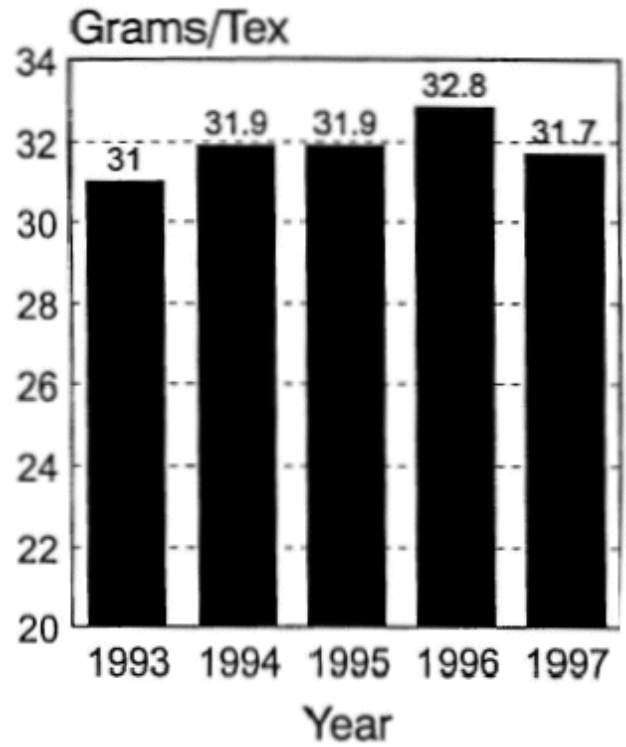


Figure 30. San Joaquin Valley Strength Average chart.



# United States

Length Average

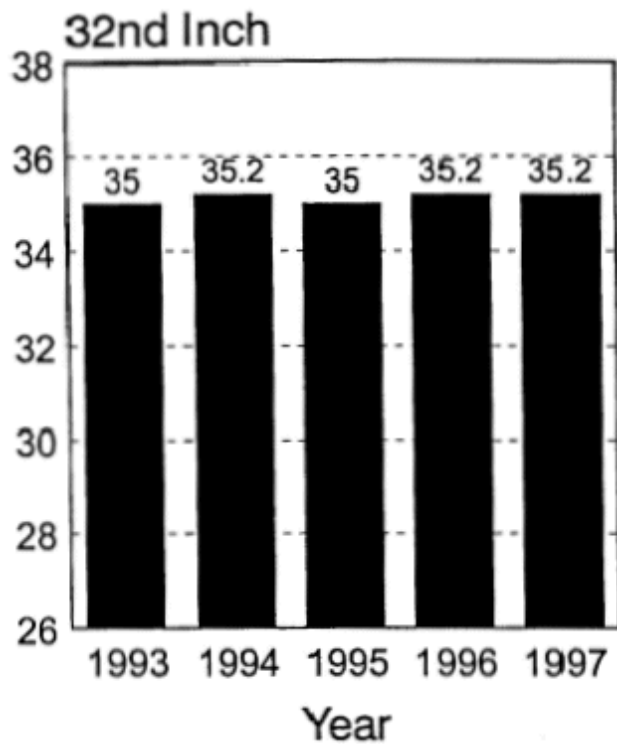


Figure 31. United States Length Average chart.

# Southeast

Length Average

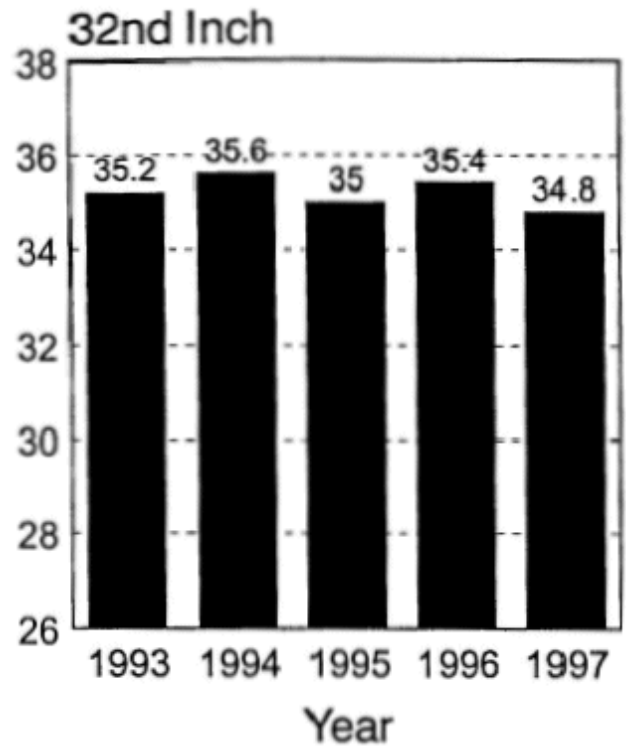


Figure 32. Southeast Length Average chart.

# Mid South

## Length Average

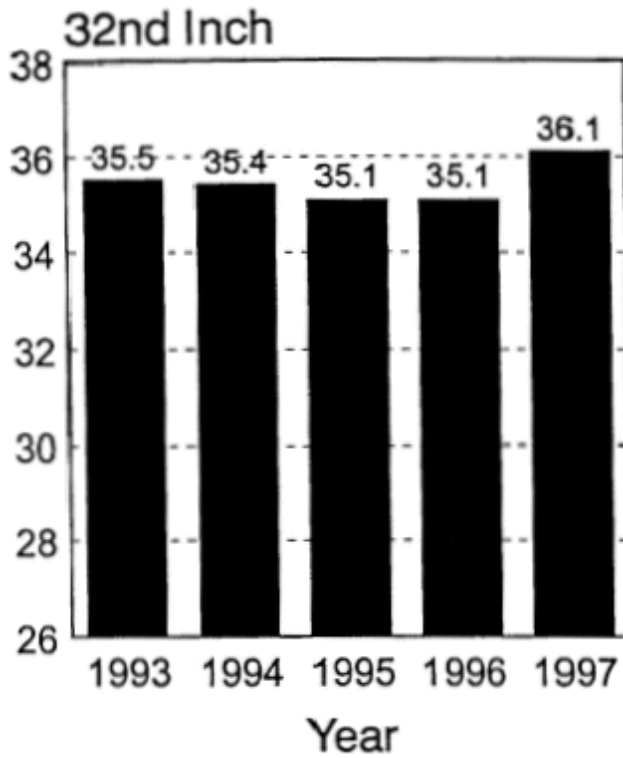


Figure 33. Mid South Length Average chart.

# Texas - Oklahoma

## Length Average

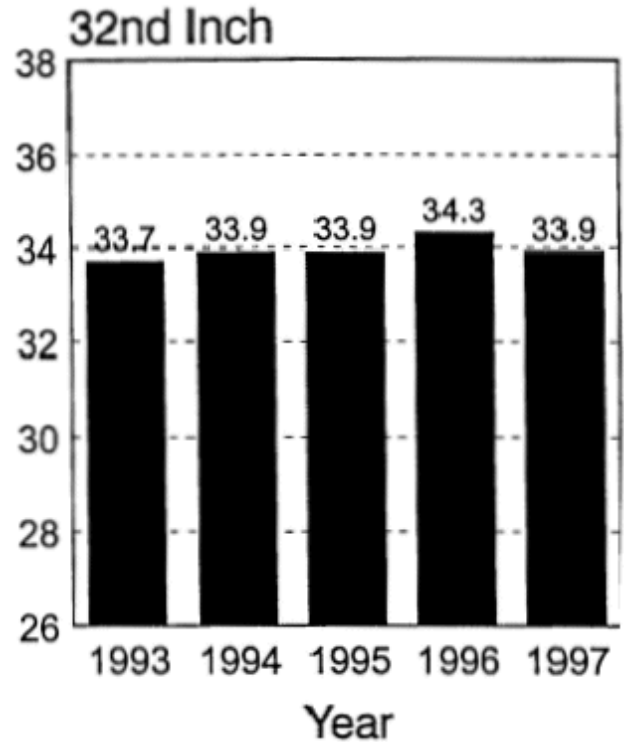


Figure 34. Texas-Oklahoma Length Average chart.

# Desert Southwest

## Length Average

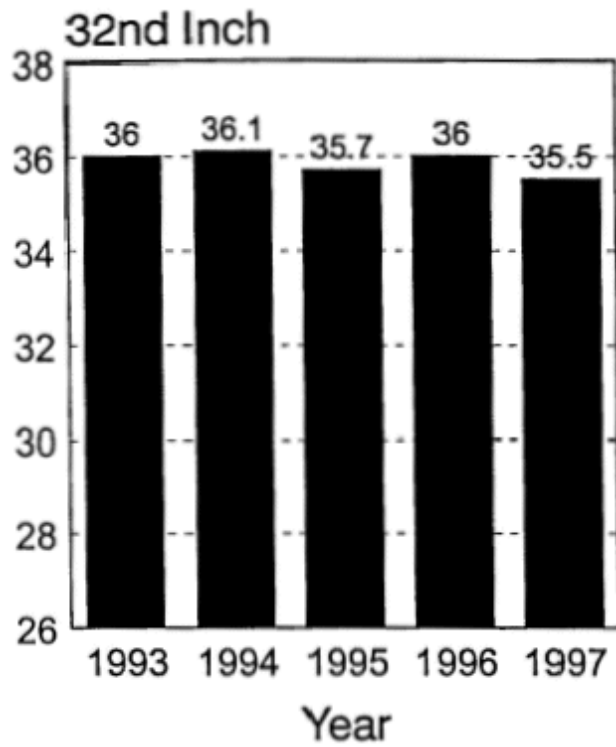


Figure 35. Desert Southwest Length Average chart.

# San Joaquin Valley

## Length Average

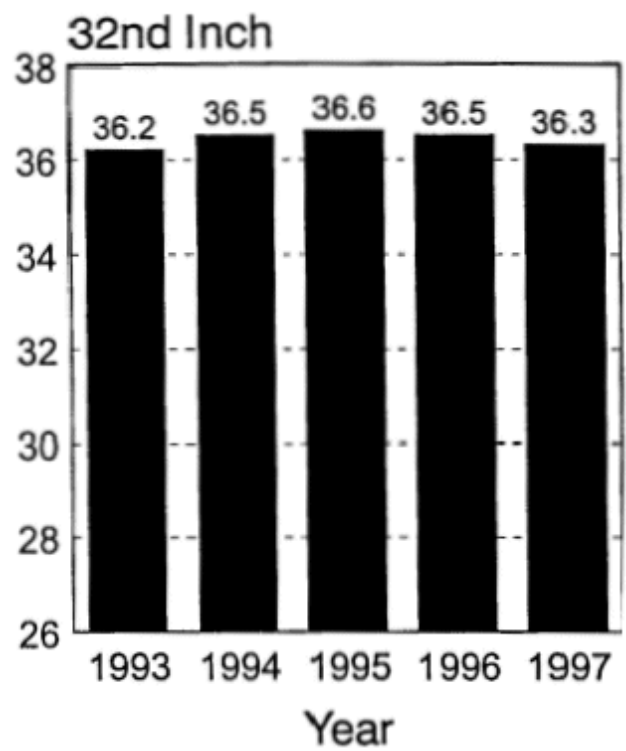


Figure 36. San Joaquin Valley Length Average chart.

# San Joaquin Valley

## Length Average

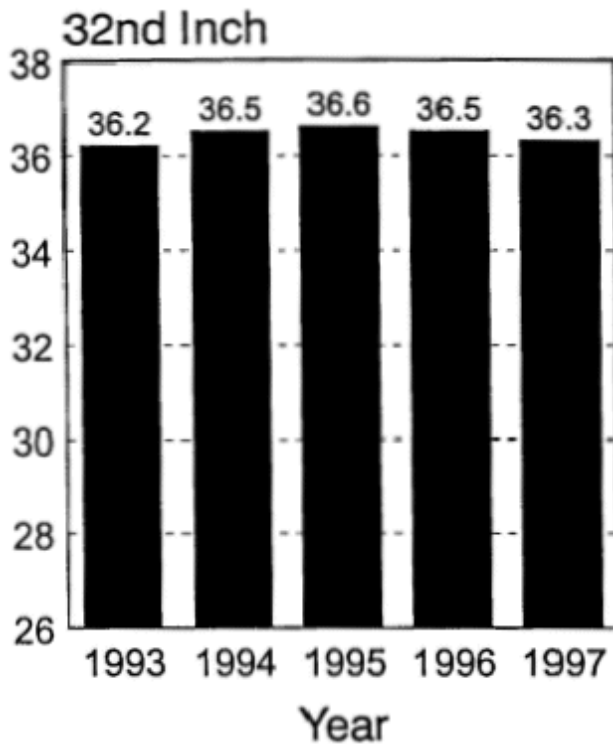


Figure 37. American Pima Grade 3 and Higher chart.

# American Pima

## Micronaire Average

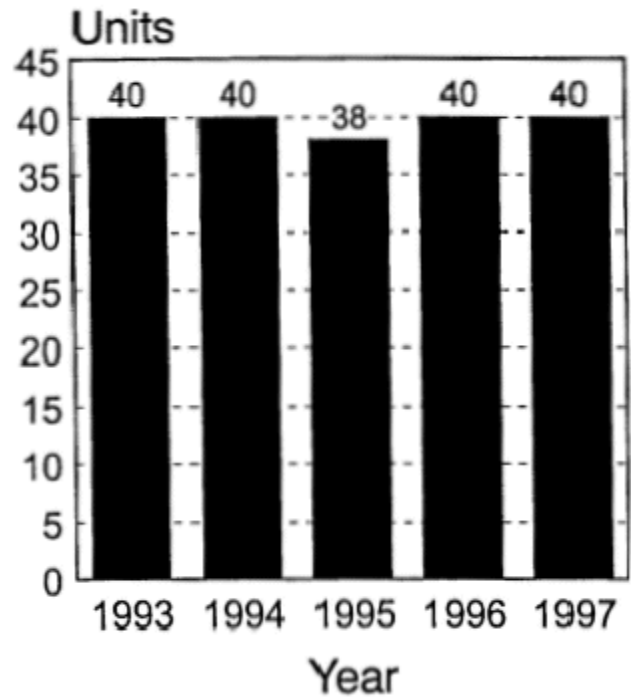


Figure 38. American Pima Micronaire Average chart.