1027

MONITORING INFLATION

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BEFORE THE

JOINT ECONOMIC COMMITTEE CONGRESS OF THE UNITED STATES

NINETY-SIXTH CONGRESS

SECOND SESSION

PART 4

AUGUST 22 AND SEPTEMBER 23, 1980

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CONTENTS

WITNESSES AND STATEMENTS

FRIDAY, AUGUST 22, 1980

Bentsen, Hon. Lloyd, chairman of the Joint Economic Committee: Opening statement
Kahn, Hon. Alfred E., Chairman, Council on Wage and Price Stability, accompanied by W. Kip Viscusi, Deputy Director34
Tuesday, September 23, 1980
Proxmire, Hon. William, member of the Joint Economic Committee, presiding: Opening statement
SUBMISSIONS FOR THE RECORD
Friday, August 22, 1980
Bentsen, Hon. Lloyd: Press release No. 80-521 entitled "The Consumer Price Index—July 1980," Bureau of Labor Statistics, Department of Labor, August 22, 1980.
Press release No. 80-523 entitled "Consumer Prices: Energy—July 1980," Bureau of Labor Statistics, Department of Labor, August 22, 1980
Press release No. 80-524 entitled "Real Earnings in July 1980" Bureau of Labor Statistics, Department of Labor, August 22,
Kahn, Hon. Alfred E., et al.: Table reflecting the "Consumer Price Index" 36 Response to Senator Proxmire's request for COWPS to document specific success cases under its wage-price program 52
Tuesday, September 23, 1980
Proxmire, Hon. William: Press release No. 80-592 entitled "The Consumer Price Index— August 1980," Bureau of Labor Statistics, Department of Labor, September 23, 1980
Bureau of Labor Statistics, Department of Labor, September 23, 1980
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MONITORING INFLATION

FRIDAY, AUGUST 22, 1980

Congress of the United States, Joint Economic Committee, Washington, D.C.

The committee met, pursuant to notice, at 10:15 a.m., in room 6226, Dirksen Senate Office Building, Hon. Lloyd Bentsen (chairman of the committee) presiding.

Present: Senators Bentsen, Proxmire, and Sarbanes; and Repre-

sentatives Reuss, Mitchell, and Heckler.

Also present: John M. Albertine, executive director; Charles H. Bradford, minority counsel; William R. Buechner, professional staff member; and Mark R. Policinski, minority professional staff member.

OPENING STATEMENT OF SENATOR BENTSEN, CHAIRMAN

Senator Bentsen. This hearing will come to order.

Mr. Kahn, for the first time in a year and a half you have had a chance to come before us with some good news, and you're so happy I understand you're almost ready to shave your mustache and declare

a victory, from what you told me.

Today's news on inflation is really most encouraging. For the first time in over 13 years, the Consumer Price Index for July showed no increase. Not since March of 1967 have we had a monthly report from the Bureau of Labor Statistics that showed zero inflation. Today's figures are an indication that some of these measures taken by the President during the past year are finally having some effect on inflation, but as I'm sure you will warn this committee and the public, our problems aren't over and we are not out of the woods.

Much of the improvement in the inflation rate during July was the result of declining mortgage interest rates. During the first half of this year, rising mortgage rates gave the CPI an upward bias and now the opposite is happening. When you take out the mortgage factor, the inflation rate is well above the reported figure. With food prices rising again, productivity falling, and unit labor costs going up, the underlying rate of inflation is still too high. So we can't let down our guard on inflation just because we have 1 month's good news.

A complicating factor in our attempt to control inflation is recession. Our economy is now operating at 76.1 percent of capacity and there are 8.2 million people out of work. For the sake of these people and millions of others who stand to lose their jobs if conditions deteriorate, we can't let the economy simply meander along. I think that's one of the reasons why we have to have a tax cut properly structured.

What came out of the Finance Committee yesterday, in spite of what one of the stories that I noticed in the paper said, was well within the projections of that committee. We stated in the beginning that we would have a tax cut that would be \$25 to \$30 billion for the fiscal year and for the calendar year not in excess of \$40 billion, and we stayed within those limitations.

But our problem now is to make further progress in this fight against inflation without consigning the economy to an endless recession, and those are the policies we want to discuss with you this

morning.

Without objection, the press releases entitled "The Consumer Price Index—July 1980," "Consumer Prices: Energy—July 1980," and "Real Earnings in July 1980" will be inserted in the hearing record at this point.

[The press releases referred to follow:]

CVS United States Department of Labor



Bureau of Labor Statistics

Washington, D.C. 20212

Patrick Jackman (202) 272-5160 272-5064 Kathryn Hoyle (202) 523-1208 523-1913 USDL-80-521 TRANSMISSION OF MATERIAL IN THIS RELEASE IS EMBARCOED UNTIL 9:00 A.M. (EDT) Friday, August 22, 1980

THE CONSUMER PRICE INDEX-JULY 1980

The Consumer Price Index for All Urban Consumers (CPI-U) rose 0.1 percent before seasonal adjustment in July to 247.8 (1967=100), the Bureau of Labor Statistics of the U.S. Department of Labor announced today. The Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W) also increased 0.1 percent before seasonal adjustment in July to 248.0 (1967=100). The CPI-U was 13.2 percent higher and the CPI-W was 13.0 percent higher than in July 1979.

CPI for All Urban Consumers (CPI-U)—Seasonally Adjusted Changes

On a seasonally adjusted basis, the CPI for All Urban Consumers was unchanged from June to July. This compares with increases of 0.9 percent or more in each of the preceding 18 months and marked the first time since March 1967 that the CPI did not register an increase. The index for housing declined 0.7 percent, as a result of a 5.7 percent decline in mortgage interest rates. This decrease offset the acceleration in food and beverage prices, as well as the comparatively moderate increases in most other major categories of consumer spending.

Table A. Percent Changes in	n CPI f	or All	Urba	n Cons	umers	(CPI-	U)		
14010 111 -011111		S	eason	ally a	<u>d</u> just	ed			Unadjusted
Expenditure category		Change			eding	month		Compound annual rate 3-mos ended	
	Jan.	Feb.	Mar.	Apr.	May	June	July	July '80	July '80
All items Food and beverages Housing Apparel and upkeep Transportation Medical care Entertainment Other goods and services	1.4 .1 1.4 .9 3.1 1.3 1.0	1.4 0 1.4 .6 2.8 1.5 1.2	1.4 1.0 1.6 2.0 1.7 .9 1.3	.9 .5 1.3 .3 .6 .7 .8	.9 .3 1.5 2 .3 .5 .6	1.0 .5 1.8 0 2 .5 .6	0 .9 7 .4 .4 .7 .8	7.6 7.5 11.1 .9 1.6 7.4 8.6 8.6	13.2 7.6 16.1 7.2 15.9 11.1 9.3 9.4
	I								+

(Data for CPI-U are shown in tables 1 through 3.)

The decline in the housing component in July followed a 15-month period of increases of 1.0 percent or more and was the first decrease since March 1973. Home financing costs declined 5.6 percent, reflecting the 5.7 percent decrease in mortgage interest rates and an increase of 0.5 percent in house prices. The index for rent rose 0.5 percent in July, following increases of 1.0 percent or more in each of the previous 2 months. Prices for household fuels continued to increase but not as much as in the 2 previous months. Charges for natural gas and electricity rose 1.4 and 1.0 percent, respectively, while fuel oil prices continued the moderate trend evident since April. The index for household furnishings and operations rose 0.6 percent in July, the same as in May and June.

Prices for grocery store foods rose 1.2 percent in July, after increasing only 1.5 percent during the first 6 months of the year. Prices for beef, pork, and poultry rose sharply, following 3 months of declines. The indexes for fruits and vegetables and dairy products also registered substantial increases in July. Prices for sugar and sweets continued the sharp upward trend which began in January. Prices of the other two components of the food and beverage index—restaurant meals and alcoholic beverages—rose 0.5 percent in July, less than in recent months.

The transportation component rose 0.4 percent in July, following a decline of 0.2 percent in June. New and used car prices rose 0.9 and 0.7 percent, respectively, and were primarily responsible for the July increase. Gasoline prices declined, following seasonal adjustment, for the third consecutive month, but not as much as in May or June. Prices for tires and other petroleum products—motor oil and coolant—rose substantially in July. Automomobile finance charges, which had advanced sharply earlier this year, declined 2.6 percent in July, following a drop of 0.8 percent in June. The index for public transportation rose 3.4 percent, reflecting a large increase in intracity mass transit fares.

The medical care index rose 0.7 percent in July, following increases of 0.5 percent in both May and June. Charges for hospital and other medical services rose 1.5 percent. Physicians' fees rose 0.6 percent in July, the same as in June. The index for medical care commodities rose 0.8 percent about the same as the monthly increase during the first 6 months of 1980.

The index for apparel and upkeep rose 0.4 percent in July. Seasonal sales were prevalent, but most clothing items registered small increases, following seasonal adjustment. Charges for apparel services rose 0.3 percent in July, following a 0.6 percent increase in June and substantially larger increases earlier this year. The index for entertainment rose 0.8 percent and the index for other goods and services increased 0.5 percent in July, following increases in June of 0.6 and 0.8 percent, respectively.

CPI for Urban Wage Farners and Clerical Workers (CPI-W)-Seasonally Adjusted Changes

On a seasonally adjusted basis, the CPI for Urban Wage Earners and Clerical Workers was unchanged from June to July. This compares with increases of 0.9 percent or more in each of the preceding 18 months. The housing index declined 0.7 percent as mortgage interest rates declined 5.6 percent. This decrease offset both the advance in the food and beverage index and the comparatively moderate increases in most other categories of consumer spending.

The decline in the housing component in July followed a 17-month period of increases of 1.0 percent or more and was the first decrease since March 1973. Home financing costs declined 5.6 percent, reflecting the 5.6 percent decrease in mortgage interest rates and an increase of 0.5 percent in house prices. The index for rent rose 0.5 percent in July, following increases of 1.0 percent or more in each of the previous 2 months. Prices for household fuels continued to increase but not as much as in the 2 previous months. Charges for natural gas and electricity rose 1.0 and 1.2 percent, respectively, while fuel oil prices continued the moderate upward trend evident since April.

Prices for grocery store foods rose 1.1 percent in July, after increasing only 1.6 percent during the first 6 months of the year. Prices for beef, pork, and poultry rose sharply, following 3 months of declines. The indexes for fruits and vegetables and dairy products also registered substantial increases in July. Prices for sugar and sweets continued the sharp upward trend which began in January. Prices of the other two components of the food and beverage index—restaurant meals and alcoholic beverages—rose 0.5 and 0.6 percent, respectively, in July.

The transportation component rose 0.4 percent in July, following a decline of 0.3 percent in June. New and used car prices rose 0.8 and 0.7 percent, respectively, and were primarily responsible for the July increase. Gasoline prices declined for the fourth consecutive month, following seasonal adjustment, but not as much as in May or June. Prices for tires and other petroleum products—motor oil and coolant—rose substantially in July. Automobile finance charges, which had advanced sharply earlier this year, declined 2.9 percent in July, following a drop of 0.2 percent in June. The index for public transportation rose 4.6 percent, reflecting a large increase in intracity mass transit fares.

The medical care index rose 0.8 percent in July, compared with an increase of 0.4 percent in June. Charges for hospital and other medical services rose 1.8 percent as many hospitals changed their price structure in July.

The index for apparel and upkeep rose 0.5 percent in July. Seasonal sales were prevalent but most clothing items registered small increases, following seasonal adjustment. Charges for apparel services rose 0.3 percent in July, about the same as in June and substantially less than increases earlier this year. The index for entertainment rose 0.4 percent and the index for other goods and services increased 0.5 percent in July, following increases in June of 0.7 and 0.8 percent, respectively.

Table B. Percent Changes in CPI for Urban Wage Earners and Clerical Workers (CPI-W)

		Se	asona]	ly ad	usted				Unadjusted
Expenditure category		Compound annual rate 3-mos. ended							
	Jan.	Feb.	Mar.	Apr.	May	June	July	July '80	July '80
All items	1.4	1.4	1.4	1.0	.9	.9	0	7.4	13.0
Food and beverages	.2	0	.9	.7	.5	.5	.9	7.8	7.9
Housing	1.5	1.4	1.6	1.4	1.5	1.9	7	11.3	16.1
Apparel and upkeep	.8	.9	1.7	.3	.1	3	.5	1.1	6.6
Transportation	3.1	2.8	1.7	.6	.2	3	.4	1.3	15.7
Medical care	1.3	1.5	.9	.8	.6	.4	.8	7.5	11.4
Entertainment	.8	1.2	1.6	.8	.5	.7	.4	6.9	8.4
Other goods and services	1.4	.9	.4	.5	.8	.8	.5	8.5	9.1

Technical Notes

Brief Explanation of the CPI

The Consumer Price Index (CPI) is a measure of the average change in prices over time in a fixed market basket of goods and services. Effective with the January 1978 index, the Bureau of Labor Statistics began publishing CPI's for two population groups: (1) A new CPI for All Urban Consumers (CPI-U) which covers approximately 80 percent of the total noninstitutional civilian population; and (2) a revised CPI for Urban Wage Earners and Clerical Workers (CPI-W) which represents about half the population covered by the CPI-U. The CPI-U includes, in addition to wage earners and clerical workers, groups which historically have been excluded from CPI coverage, such as professional, managerial, and technical workers, the self-employed, short-term workers, the unemployed, and retiriees and others not in the labor force.

The CPI is based on prices of food, clothing, shelter, and fuels, transportation fares, charges for doctors' and dentists' services, drugs, and the other goods and services that people buy for day-to-day living. Prices are collected in 85 urban areas across the country from about 18,000 tenants, 18,000 housing units for property taxes, and about 24,000 establishments—grocery and department stores, hospitals, filling stations, and other types of stores and service establishments. All taxes directly associated with the purchase and use of items are included in the index. Prices of food, fuels, and a few other items are obtained every month in all 85 locations. Prices of most other commodities and services are collected every month in the five largest geographic areas and every other month in other areas. Prices of most goods and services are obtained by personal

visits of the Bureau's trained representatives. Mail questionnaires are used to obtain public utility rates, some fuel prices, and certain other items.

In calculating the index, price changes for the various items in each location are averaged together with weights which represent their importance in the spending of the appropriate population group. Local data are then combined to obtain a U.S. city average. Separate indexes are also published by size of city, by region of the country, for cross-classifications of regions and population-size classes, and for 28 local areas. Area indexes do not measure differences in the level of prices among cities; they only measure the average change in prices for each area since the base period.

The index measures price changes from a designated reference date—1967—which equals 100.0. An increase of 122 percent, for example, is shown as 222.0. This change can also be expressed in dollars as follows: The price of a base period "market basket" of goods and services in the CPI has risen from \$10 in 1967 to \$22.20.

For further details see the following: The Consumer Price Index: Concepts and Content Over the Years, Report 517, revised edition (Bureau of Labor Statistics, May 1978); The Revision of the Consumer Price Index, by W. John Layng, reprinted from the Statistical Reporter, February 1978, No. 78-5 (U.S. Dept. of Commerce), Revisions in the Medical Care Service Component of the Consumer Price Index, by Daniel H. Ginsburg, Monthly Labor Review, August 1978; and CPI Issues, Report 593, (Bureau of Labor Statistics, February 1980).

A Note About Calculating Index Changes

Movements of the indexes from one month to another as usually expressed as percent changes rather than changes in index points because index point changes are affected by the level of the index in relation to its base period while percent changes are not. The example in the accompanying box illustrates the computation of index point and percent changes.

Percent changes for 3-month and 6-month periods are expressed as annual rates and are computed according to the standard formula for compound growth rates. These data indicate what the percent change would be if the current rate were maintained for a 12-month period.

Index Point Change	
CPI	236.4
Less previous Index	233.2
Equals Index point change:	3.2
Percent Change	
Index point difference	3.2
Divided by the previous Index	233.2
Equals:	0.014
Results multiplied by one hundred	0.014x100
Equals percent change:	1.4

A Note on Seasonally Adjusted and Unadjusted Data

Because price data are used for different purposes by different groups, the Bureau of Labor Statistics publishes seasonally adusted as well as unadjusted changes each month.

For analyzing general price trends in the economy, seasonally adjusted changes are usually preferred since they eliminate the effect of changes that normally occur at the same time and in about the same magnitude every year—such as price movements resulting from changing climatic conditions, production cycles, model changeovers, holidays, and sales.

The unadjusted data are of primary interest to consumers concerned about the prices they actually pay. Unadjusted data also are used extensively for escalation proposes. Many collective bargaining contract agreements and pension plans, for example, tie compensation changes to the Consumer Price Index unadjusted for seasonal variation.

Seasonal factors used in computing the seasonally adjusted indexes are derived by the X-11 Variant of the Census Method II Seasonal Adjustment Program. The updated seasonal data at the end of 1977 replaced data from 1967 through 1977. Subsequent annual updates have replaced 5 years of seasonal data, e.g., data from 1975 through 1979 were replaced at the end of 1979. The seasonal movement of all items and 35 other aggregations is derived by combining the seasonal movement of 45 selected components. Each year the seasonal status of every series is reevaluated based upon certain statistical criteria. If any of the 45 selected components changes its seasonal status, seasonal data from 1967 forward for the all items and for any of the 35 other aggregations, that have that series as a component, are replaced.

24 Hour CPI Mailgram Service.

Consumer Price Index data now are available by mail-gram within 24 hours of the CPI release. The new service is being offered by the Bureau of Labor Statistics through the National Technical Information Service of the U.S.
Department of Commerce.
The CPI MAILGRAM service provides unadjusted and
seasonally adjusted data both for the All Urban Consumers

(CPI-U) and for the Urban Wage Earners and Clerical Workers (CPI-W) Indexes as shown on the CPI-U sample page below. The unadjusted data include the current month's index and the percent changes from 12 months ago and one month ago. The seasonally adjusted data are the percent changes from one month ago.

CONSUMER PRICE INDEX FOR ALL URBAN C AVERAGE (1967:100)	OKSUMER	& (CPI-U):	U.S. C	LTY.
GROUP	UNADJ INDEX MAY 1979	PER CHG F FROM 12 F MD AGO M	ER CHG I	S ADJ PER CHO FROM 1 90 AGO
ALL ITEMS ALL ITEMS(1957-59=100) FOOD AND REVERAGES	214.1 249.0	19.8	1.2	1.1
FOCD AT HOME CEREALS AND BAKERY PRODUCTS MEALS, POULTRY, FISH, AND EGGS DIRY PRODUCTS FRUITS AND VEGETABLES FRUITS AND VEGETABLES FOOD ALMY FROTH HOME	234.3 233.4 216.2 242.2 203.8 226.8 241.1	11.2 11.4 11.3 9.5 19.4 11.1 3.4	•	1.0 .1 .8
FUEL OIL, COAL, AND BOTTLED GAS GAS (PIPED) AND ELECTRICITY	364.3	23.2		1:0
APPAREL AND UPKEEP	146.1	3.9	. 4.	. 0
HOUSEMOLD FURNISHINGS AND OPERATION APPAREL AND UPKEEP TEAMSPORTATION NEIL CARS GASOLINE PUBLIC TRANSPORTATION MEDICAL CARE REDICAL CARE REDICAL CARE OTHER GOODS AND SERVICES	267.7 165.8 205.4 247.7 193.3	13.4 8.7 11.3 29.1	2.4 9 2.7 5.5	1.8 1.1 7.5 5.0
MEDICAL CARE MEDICAL CARE SERVICES	236.3 254.4	1.2	.3 .5	. 6
ENTERTAINMENT	187.8	6,6	.7	. 5
OTHER GOODS AND SERVICES FERSONAL CARE IN	193.9	7.5 7.5	:6	. 3
COMMODITIES COMMODITIES LESS FOOD AND EFVERAGES NONDURABLES LESS FOOD AND TEVERAGES DURABLES	225.4	10.9	1.2 1.5 2.0 1.1	- 1 0
SERVICES ALL ITEMS LESS FOOD SHERGY LA ALL ITEMS LESS FOOD AND ENERGY	229.5 263.9 260.8 264.1	10.5	1.1	1.3

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CFI-U
TABLE 1. Consumer Price Index for all urban consumers: U.S. city average, by expenditure category and commodity and service group, 1967-100

1967+100	•							
Group	Relative importance, Oecember 1979	Unadjusted June 1980	indexes July 1980	Unacjus percent cna July 1980 July 1979 Ju	ted nge to from- ne 1980	Season percen Apr. to May	naily adjus nt change May to June	sted From- June to July
				Expenditure c	ategory			
All items	100.000	247,6 288.0	247.8 288.2	13.2	0.1	0.9	1.0	0.0
Food and beverages	18 . 685	245.7 252.0	248.3 254.8	7.6 7.6	1.1	.3	.5 .5	1.0
Food at home	17.655	248.0	251.5 247.8	6.8 12.6	1.4	1.0	.4	1.2
Cereals and bakery products 1/	4.189	245.9	247.8	12.6	.8	1.0 -2.0	.6	, .8
Food an beverages. Food at home. Cereals and bakery products ½/ Meats, poultry, fish, and eggs. Dairy products. Fruits and vegetables.	1.642	231.2	236.7 228.6	10.8	6	. 1.8	.6	1.2 .8 1.2 1.2
Fruits and vegetables	1.702	250.1 342.0	253.9 353.1	6.6	2.4 .6 1.5 3.2	2.3	4 .6 .5 4.7	1.8
Fats and oils	.418 .346 1.375	240.0 395.9	219.1	5.2 12.1		2	4	4
Monalcoholic beverages	1.375	395.9 230.9	397.4	11.1	.4	1.4	1.0	
Sugar and seets I/. Fats and oils. Monalcoholic Deverages Other prepared foods food away from home. Alcoholic beverages.	5.454	266.6	232.3 267.8	9.4	.6 .5	1.4 .5 .7	.9	.5 .5 7
Alcoholic beverages	1.029	186.4 266.7	187.2 265.1	8.4 16.1	- 6	1.5	1.8	
Shelter	30.910	286.3 191.1		17.8	-1.2	1.6	2.1 1.2	-1.4 .5 .2
Other rental costs	.734	264.2	265.7	12.6	.6	.3	.7	.2
Homeownership	24.904	320.4 252.6	192.1 265.7 315.4 253.9	12.6 19.9 13.3	-1.6 .5	1.8	2.3	-1.8 .5
Financing, taxes, and insurance	10.902	416.1	399.6	29.5	-4.0	2.5	3.9	-A.A
Maintenance and repairs	3.606	285.9 310.6	287.6 312.1	11.5	.6 .5	:7	1 4	.6
Maintenance and repair		228.0		11.7	1.0	.7	1.0	1.0
Fuel and other utilities 1/	.828 6.477	282.2	265.5 360.6 560.4 314.3 165.9	17.2 22.8 35.7	1.2	2.0	2.3 2.7	1.2
Fuel nil coel and bottled pas 1/	4.607 1.214 3.393	355.8 558.7	360.8 560.4	22.8 35.7	1.4	4.1	2.7 .5 3.6	1.4 .3 1.8
Gas (piped) and electricity 1/	3.393		314.3		1.0		3.6	1.8
Other utilities and public services 1/	1.870	164.9	206.2	4.1 8.3	.5	.6	1.1	.6
Housefurnishings	7.612 4.139 1.459	174.6 245.4	206.2 174.7 247.3	7.2 11.2	.1	.5 .6 .5	.6	.6
Housekeeping services I/	2.015	269.1	270.4	8.3 7.2	.5 6 7	.6 2	.6 .0	.6 .8 .5
Apparel and upkeep	5.107	177.2 169.7	176.2	7.2 6.2	6	2	1	::
Hen's and boys' apparel	4.446 1.396	166.8	165.9	6.2 4.2 1.9	5	-,4 .2 -1.7	1	.6
Nomen's and girls' apparel	.108	240.9	243.0	11.0	-1.6	1.3	1.5	1.2
Footwear	.669 .572	189.0 205.3	189.5 205.5	11.0 7.3 22.4	.3	.5	1.3	1.2
Apparel services 1/	.662 18.572	233.6 249.7	234.4	14.0		1.0	.6	.3
Transportation	18.572 17.506	249.7	251.0	14.0 15.9 15.2 7.5	.3	.3	.6 2 4	.4 .2 .9
New Cars	3.731 2.838	178.5	179.2	7.5	1.3	1.0	.1	.9
Used cars	2.838 >.619	200.7 376.2 267.3	203.4 376.7	34.5	.1	-1.7 6 .8	-1.1	5
Other prepared Goods Flood step from home Alcoholic beverages Alco	1.473	267.3	269.0 224.5	10.2	6 2	.8 1.8	.6	:1
Other private transportation	.712	225.0 195.5	197.7	14.1	1.1		.1	1.1
Other private trans. services	3.133	235.0 242.2	233.8	12.9 27.1	3.4	2.1 1.5 .5 .9	.5 1.1 .5	3.4
Hedical care	4.817	264.7 167.9	266.6	9.7	3.4 .7 .7 .7	.5	.5	.7
Hedical care commodities	.802 4.015	285.9	169.1 288.0	11.4	:;	.5		.7
Professional services 1/	2.104	251.8 327.2	253.5 329.7	11.4 11.5	.7	.8 .2 .6	.6	.7
Entertainment	3.738	205.3	206.6	9.3	.8 .6 .5	.6	.6 .5	.8
Entertainment commodities	2.214 1.523	208.3	209.3 203.1 213.5	9.3 10.3 7.7 9.4	.8	.5 .8	.6	. B
Other goods and services	4.081	201.4	213.5	9.4		R		.5
Personal care I/	1.080	203.4	203.8	9.1 9.2	.2	.8 .9	.6 .8 1.5	.8 .5 .2 .9
Toilet goods and personal care	.728	205.1	207.9	10.2	1.4			1.4
Personal care services 1/	.905	219.6	220.9	10.2 8.3 9.8	.6	1.1 .7 .8	.4	.6
Personal and educational expenses	.905 1.369 .174	229.5 207.1		9.8 8.1	.2		.5 .4 .5 .5	.6 .3 .7
Other modical care services I. Entertainment commodities Entertainment services I. Othercommon services I. Othercommon services I. Othercommon services I. Tobacco products I. Personal care I. Fersonal care services I. Personal and educational expenses School books and uppoli services Personal and educational expenses	1.195	235.0	207.2	10.1	.2	.8	.5	. 2
			Com	modity and serv	ice group	•		
All stems	100,000	247.6	247.8	13.2	0.1	0.9	1.0	0.0
All items	59.063 18.685	232.8	234.1 248.3	11.2	.6 1.1	.3	.3 .5 .3	.6
Commodities less food and beverages	18.685 40.379 17.706	232.8 245.7 223.2 241.1	224.0	11.2 7.6 12.9 18.2		:4	.3	.6 .9 .5 .3
Nondurables less food and beverages	17.706	241.1 169.7	241.4 168.5	18.2 6.2		.4 .2 4	.0 	.3
Commodities. Food and beverages towncollies less food and beverages who parect commodities. Monourables less food beverages, Monourables services less food Other services [/	13.261	282.0	282.9		.3	.3	.0	,
Ourables	22.672 40.937	208.6 274.2	209.8 272.4	8.9	6	.6	.5	:\$
Services	40.937 5.273	274.2	272.4	16.1	7	1.6 1.0	1.8	8
Household services less rent	21.692	191.1 328.8	192.1 323.3	8.9 16.1 9.2 20.4 14.7	-1.7	2.1	1.2	.5 8 .5 -1.9 .7 .7
Transportation services	5.673 4.015	242.6 285.9	243.8 288.0	14.7	.3	1.6	.7 .4 .6	:,
Other services	4.285	216.9	218.1	9.4	.6	.8	.6	.5
Special indexes:								
All items less food	82.345 69.090	245.5 234.9 235.4	245.1	14.4 11.1	2	1.0	1.1	2 .7
All items less mortgage interest costs	91.346	235.4	236.8	11.2	.6 .6	.6	.6	.6
All items less home purchase and	80.950	233.5	235.0	11.0	.6	.6 .9	.5	.6
All items less medical care	95.183 41.408 18.736 14.290	246.4 221.4	246.5 222.2	11.1	.0	.9	1.0	.6 .0 .5
Commodities less food	18.736	236.3 269.3	236.6	12.8 17.7	.1	. 2	. 1	.3
Mondurables less food and apperel	14.290 36.391		270.3	21.3	. 6	.3	1	.2 .7 •.9
Services less rent	35.664	290.0 271.0	245.9 287.6	17.1	8	1.7	2.0	ۇ
Services less medical care 1/	36.921 10.313	271.0 367.8	268.9 370.4	16.6 29.0	8 .7	1.6	2.0	8
All items less energy	89.687	238.3	238.3	11.5	.0 3	.8 .9 1.0	1.0 1.1	.0
All items iess food and energy Commodities less food and energy	72.032 34.488	233.7	233.1	12.4 8.8	.4	.6	.6	.6
Energy commodities	6.920 37.544	404.1 271.5	404.8 269.1	34.6 15.8	9	1.4	1.6	2 6 2 -1.0
Purchasing power of the consumer dollar:	37.244					-1.0		
Special indexes: all items less food. all items less shelter. connodities less food and apparel. Mendurables less food and apparel. Mendurables less food and apparel. Mendurables less food and apparel. all items less shelter. all items less shelter. all items less food and mergy. connection of the consumer dollars. Services less energy. Services less energy. Yerchasing power of the consumer dollars. 1957-39-51.00 [/	:	\$.404 .347	3.404	-11.6	۰.0	-1.0	-1.0	0
			/					

1/ Not seasonally adjusted.

TABLE 2. Consumer Price Index for all urban consumers: Semsonally adjusted U.S. city average, by expenditure category and commodity and service group, 1967-100

community and service group, 1967*100	Sanna	nally ad	lueten 1			·				
Group	Apr.	Hav	June	July		seasona Poothe	percent c	hange fo	r- C months	ending in
	1980	1980	1980	1980	Oct. 1979	Jan. 1980	Apr. 1980	July 1980	Jan. 1980	July 1980
				٠.	penditure			1,00	1700	1700
All items	_	-				15.6	15.9	7.6	10.5	11.7
All items	242.1	242.9	244.2	246.5	13.4 7.9 7.9 7.2	8.8	6.2	7.6 7.5 7.4 7.4	14.5 8.4	6.8
Food at home	244.5	249.2 245.1	250.5 246.0	252.9 248.9	7.2	8.6 8.2	6.2 6.0 4.5	7.4	8.2 7.7	6.0
Meats, poultry, fish, and eggs	235.3	244.5 230.6	245.9 229.6	247.8 232.3	13.1 -5.0 10.6 13.8	13.3	14.0 ~8.5	-5.0	13.2 5.3 9.0	12.0 -6.8
Fruits and vegetables	235.7	241.1	227.7 242.3	230.4 246.7	10.6 13.8	7.5 -12.7	10.1 8.4 47.7	15.2	9.0	12.6
Sugar and sweets 1/	319.5	326 · 8 239 · 7	342.0 238.8	353.1 237.9	5.4 8.6	9.8 5.8	47.7 10.8	49.2 -3.8	7.6 7.2	14.1 48.5 3.3
Nonalcoholic beverages	388.0	388.7 228.9	390.8 231.1	391.9	30.1 0.2	10.6 6.7 11.7	5.2 15.1	4.1	19.9	4.6
Food away from home	262.5	263.8 184.7	266.1	267.3	9.5	11.7	9.0	7.5	10.6	8.3
Housing	258.2	262.2	186.0 267.0	187.0 265.1	8.4 16.7	8.7 17.6 21.8	19.0	9.3	8.5	15.0
Rent, residential 1/	187.0	281.0 188.9	286.8 191.1	282.8 192.1	19.8 13.1	21.8 6.1 17.4	21.1 6.5 16.2	11.4	20.8 9.5 14.9	8.9
Other rental costs	261.0 308.5	261.9 314.0	263.7 321.1	264.1 315.3	12.5	17.4 25.6	24.3	9.1	14.9 23.6	10.4
Financing, taxes, and insurance	246.5 392.6	249.7	252.6	315.3 253.9 399.6	21.7 17.9 29.8	25.6 15.8 40.6	7.5	9.1 12.6 7.3	23.6 16.8 35.1	16.4 10.0
Maintenance and repairs	283.6	285.5	418.2 285.2 309.7	286.9	10.3	11.5	19.9	4.7	10.9	24.1 12.1 12.2
Maintenance and repair	224.1		228.0	230.3	13.0	10.0	12.9	11.1	11.5	
Fuel and other utilities 1/	270.5	225.8 275.9	282.2	285.5	16.4	9.3	19.7	24.1	12.0	12.0 21.9
Fuels i/ Fuel oil, coal, and bottled gas 1/	337.8 556.4	346.4 556.D	355.8 558.7	360.8 560.4	24.4 69.0	10.3	27.3 37.3	30.1 2.9	17.2 55.0	28.7 18.9
Cas (piped) and electricity 1/	288.0	298.2 163.1	308.8 164.9	314.3	12.7	7.0	23.9	41.8 9.2	6.5	32.5
Household furnishings and operation	202.6	203.9	205.2 174.1	206.4 175.1	5.3	9.0	11.0	7.7 6.9	7.2	5.5 9.3 8.2
Housekeeping supplies 1/	240.7	243.6	245.4 269.1	247.5	4.6	11.7	9.6	11.A	8.1	14 5
Apparel and upkeep	177.5	177.2	269.1 177.2 169.7	270.4 177.9	8.1 8.2 7.4	11.7 8.8 7.8	9.6 12.4	6.8	8.4 8.0 7.0	8.2
Apparel commodities	166.9	167.5	166.6	170.4	7.4 6.1 4.0	6.5	11.6 5.7	1.7	7.0 4.8 3.9	6.5 5.5 3.7
<pre>#omen's and girls' apparel</pre>	156.7 234.3	154.1 237.4	153.3	153.4 243.0	31.0	3.7	8.6	-8.2 15.7	3.9 5.5	1 16.7
Other apparel commodities 1/	187.5	188.5	188.8	191.0	8.3	7.7 21.9	5.5	7.7	5.5 8.0 20.6	6.6
Apparel services 1/	230.0	232.2 248.3	233.6	234.4	19.4 13.9 15.8	16.4 25.1 24.2	18.0	7.3 7.9 1.6	20.6 15.1 20.3	24.2 12.8 11.6
Private transportation	247.9	248.4 178.7	247.5 178.9	248.0	15.1	24.2	23.0	A.1	19.5	11.0
Used cars	198.7	195.4	193.2	194.6	-2.2	14.4	-13.1	-8.0	5.8	-10.6
Maintenance and repair	378.1 263.6	375.8 265.8	372.1 267.3	370.4 269.3	45.0 9.1 10.9	58.6 9.8	54.7 13.5 23.0	-7.9 8.9	51.6 9.5	19.4 11.2 16.2
Other private transportation Other private trans. commodities 1/	220.2 194.1	224.2 195.3	225.2 195.5	225.4 197.7	21.6	9.5 14.8	12.7	9.8 7.6	10.2	16.2 10.1
Other private trans. services	229.2	234.0	235 2	235.0	85	83	25 1	10.5 27.2	8.4	17.6
Medical care commodities	261.9	239.5 263.3 166.1	242.2 264.7 167.6	266.6 168.9	26.7 10.6 8.0	38.4 13.8 10.3	17.0 13.0	7.4	9.2	10.2
Hedical care services 1/	283.4	284.7	285.9 251.8	288.0	10.9	14.4	13.8	6.7	12.7	10.2
Other medical care services 1/	325.8	326.3	327.2	253.5 329.7	7.2 14.8	15.5	16.5 11.0	8.8	10.2 15.1	7.9
Entertainment commodities	202.2	203.5	204.7	206.4	7.2 6.9	7.3	14.0	8.6 7.6	7.2 9.5	11.2
Other goods and services 1/	198.5	200.1	201.4	203.1	4.7 IM.2	3.6 8.8	13.1	9.6	10.0	11.3
Tobacco products 1/	198.8	200.4	203.4	203.8	10.0	11.6	8.4 4.3 11.2	10.4	10.9	7.3
Toilet goods and personal care	20: 8	204.1	205.1	207.9	8.5	8.4	11.5	12.7		
Personal care services 1/	217.2	218.8	219.6	220.9	6.2	9.2 7.6	11.0	7.0	8.4 7.7	9.0
School books and supplies	207.5	208.6	209.6	211.0	4.4	13.0	8.2 8.3	7.0 6.4 6.9	12.5	12.1 9.0 7.3 7.6
Personal and educational services	234.9	236.8	238.1	238.6		6.5	8.4	6.5	13.0	7.4
				COMMOD	ity and s					
All items. Commodities Food and beverages. Commodities Commodities Another items of the commodities Services Rent, resionatial j/ Mousehold services less rent Transportation services. Model of the commodities Model of the commo	230.0	230.8 242.9	231.6	233.0	13.4 12.4 7.9	15.6 15.1 8.8	15.9 12.2	7.6 5.3 7.5	14.5 13.7	11.7
Food and beverages	242.1 220.8 240.0	242.9 221.6 240.5	244.2 222.2	246.5 223.2	7.9 14.7	8.8 18.4 24.9	6.2 15.0 27.2	7.5	8.4	6.8 9.6
Nondurables less food and beverages	240.0 170.5	240.5 169.8	240.6 169.7	241.4	20.2	24.9	27.2 11.6	2.4	22.5 7.0	14.1
Nondurables less food, beverages,	280.2	281.0	280.9	281 2	26.5	30.1	34.1		28.3	16.6
Ourables	205.1	206.3	207.4	208.5	9.1	14.6	5.2 21.7	6.6	11.8	6.0
Rent, residential 1/	265.6 187.0	269.8 188.9	274.7 191.1	272.5 192.1	15.1	16.4 6.1 22.7	6.5 29.5	10.8 11.4 .11.5	15.7 9.5	16.1 8.9
Transportation services	314.4 237.2	320.9 241.1	329.5 242.7	323.1 244.5	18.3	13.8	29.5 20.5 13.8		20.5 12.8 12.7	20.2 16.6
Medical care services 1/	283.4	284.7	285.9	288.0	10.9	14.4	13.8	6.7	12.7	10.2
									•	
Spelar interests food. Ali items less mortgage interest costs. All items less mortgage interest costs.	240.3	242.6	245.2	244.8	14.8	17.5 12.9 13.3	18.3 13.9 12.2	7.7	16.1 11.9 12.6	12.9
All items less mortgage interest costs	231.8	233.2	234.5	235.6 235.9	12.0	13.3	12.2	7.3	12.6	10.3
mortgage interest costs	230.2	231.5	232.6	234.1	11.3	12.5	13.1	7.0	11.9	10.0
All items less medical care	Z41.3	243.4	245.8	245.8	13.7	15.9	16.0	7.7	14.8	11.8
Commodities less food	219.0 235.1 267.3	219.8 235.5 268.2	220.4 235.8 268.5	221.4 236.6 269.0	14.4 19.6	18.1 23.7	15.0 26.2	4.5 2.6	16.2 21.6	9.6 13.8
Nondurables less food and apparel	267.3 242.0	268.2 242.5	268.5 243.3 290.5	744.9	25.2 14.1	28.0 16.2 17.9	32.2 16.0	2.6 4.9	26.6	16.4
Services less rent	280.4 261.5	285.1 265.7	290.5	287.8 268.9	15.5 16.5	17.9	24.0	11.0	16.7	17.3
Fnerov	361.0	363.9	364.9	366.0	35.5	35.9	42.3		35.7	22.6
Energy All items less energy All items less food and energy Commodities less food and energy Energy commodities Services less energy.	233.4		237.8	237.8	11.3	14.4	12.6	5.7 7.8 7.9	12.9	10.1
Commodities less food and energy	228.7 198.4	231.0 199.5 404.2	233.5	233.1 201.8 400.0	11.9 8.0	15.5 13.1 52.9	12.6 14.7 7.4 53.3 21.4	7.0	13.7	11.2 7.2 20.5 14.7
Services less energy	405.5	404.2 267.6	400.9 272.0	400.0 269.3	48.0 15.4	52.9 18.0	53.3 21.4	-5.3 8.4	50.4 16.7	20.5 14.7

1/ Not seasonally adjusted. NOTE: Index applies to a month as a whole, not to any specific date.

CPI-U

TABLE 3. Consumer Price Index for all urban consumers: Selected areas, all items index, 1967=100 unless otherwise noted

		Other					-					
Area 1/	Pricing	index	Apr.	May	exes June	July	Perce	nt chang	e to	Perce	nt chang	e to
-	schedule	Dase	1980	1980	1980	1980	July	May II	June	June	1980 fr	
	2/					.,,,,	1979	1980	1980	1979	1980	May 1980
	-								.,,,,	.,,,	1700	1900
U.S. city average			242.5	244.9	247.6	247.8	13.2	1.2	0.1	14.3	2.1	1.1
Chicago, IllMorthwestern Ind			240.1									
Oetroit, Mich	ä		248.2	245.1	248.2 256.7	246.8	13.5	1.5	6	16.3	3.4	2.1
L.ALong Beach, Anaheim, Calif	2		244.6	249.1	250.1	253.7 248.7	15.6 15.8	2.1	+1.2	19.2	3.4	3.3
N.Y., N.YNortheastern N.J	*		233.1	234.5	237.2	238.9	11.6	1.9	6	17.5	2.2	4
Philadelphia, PaM.J	Ä		237.4	239.4	242.5	244.1	13.0	2.0	.7	11.6 13.4	1.0	1.2
								2.0	.,	15.4	2.1	1.3
Anchorage, Alaske	1	10/67		226.5	-	228.4	10.1	. 8	-	_	_	_
Baltimore, Md			-	249.1		252.4	14.2	1.3	-	-		
Baston, Mass	j		-	236.9	-	240.9	12.5	1.7	-	-	-	-
Cincinnati, Onio-KyInc Denver-Boulder, Colo			-	251.6	-	256.7	14.2	2.0	-	-	-	
Miami, Fla	1	11/77	-	258.0	-	261.6	10.6	1.4	-	-	-	-
Milwaukee, Wis	•	11///	-	129.7 250.3	-	133.6	15.5	3.0	-	-	-	-
Mortheast Pennsylvania			-	232.5	-	239.8	13.0		-	-	-	
Portland, Oreg Wash	i			257.3		252.7	11.1	3.1 -1.8		:	-	- '
St. Louis, Mo111	ī		-	241.6		245.0	13.0	1.3	-	-	-	-
San Diego, Calif	1		-	269.7	-	269.9	14.3	1.1		:	•	•
Seattle-Everett, wash	1		-	249.6	-	255.1	17.3	2.2	-	-		-
Washington, D.CMdVa	1		-	241.2	-	247.2	12.2	2.5	-	-	- 1	
4414- 0-	_											
Atlanta, Ga	2		235.3	-	242.2		-	-	-	13.9	2.9	-
duffalo, N.Y	2 2		233.7	-	235.4	-	-	-	-	12.5	.7	
Dalias-Fort worth, Tex	2		247.3	-	250.1	-		-	-	13.7	1.1	-
Honolulu, Hawaii	2		251.4		256.4	:	-	-	-	17.9	2.0	-
Houston, Tex	2		260.8	-	266.5	- :	•	-	-	11.3	.0	-
Kansas City, MoKans	2		243.8		247.8	:			:	13.2	2.2	-
Minneapolis-St.Paul, MinnWis	ž		244.3		246.4		- :		-	10.8	1.6	-
Pittsburgh, Pa	2		240.9		246.1		-			14.7	2.2	
San Francisco-Dakland, Calif	2		243.5	-	248.0	-	-	-	- 1	16.7	1.6	
01 11											2.0	_
Region 3/												
Northeast	2	12/77	10.									
North Central	ź	12/77	126.8	-	129.1 134.7	-	-	-	-	13.0	1.8	-
South	2	12/77	130.8	-	133.4	-	:	- :	-	14.4		-
West	2	12/77	132.7		135.5	:	•	-	-	13.9 16.1	2.0	•
	-			_		-	-	-	-	10.1	2.1	-
Population size class 3/				-								
A-1	2	12/77	128.9	-	131.9	-	-	-	-	14.8	2.3	_
A-2	2	12/77	131.1	-	133.7	-	-	-	-	14.4	2.0	
B	2	12/77	131.6	-	134.2	-	-	-	-	14.2	2.0	
D	2	12/77	130.9	•	133.3	•	-	-	-	13.7	1.8	-
•	-	12///	120.6	-	132.0	-	-	-	-	14.0	2.6	-
Region/population size class												
cross classification 3/												
Northeast/A	2	12/77	125.0	-	127.1	-		-		12.3	1.7	_
Morth Central/A	2	12/77	133.2	-	136.7		-	-		15.7	2.6	- :
South/A	2	12/77	130.7	-	133.5	-	-	-	_	14.2	2.1	
West/A	2	12/77	132.8	•	136.1	-	-	-	-	17.3	2.5	
North Central/B	3	12/77	129.0	-	131.0	-	-	-	-	13.6	1.6	-
South/B	2	12/77	130.9	-	134.4	-	•	-	-	13.9	2.7	-
west/8	ź	12/77	131.7	-	134.7	-	-	-	-	14.6	2.3	-
Mortheast/C	2	12/77	132.7	-	136.0	-	•	-	-	14.6	1.4	-
North Central/C	5	12/77	128.9		131.9	-	•	-	-	15.7	2.2	-
South/C	ž	12/77	131.3	:	133.1	- :	:	-	:	12.9	2.3	-
West/C	2	12/77	131.4	-	133.6				:	14.3	1.4	-
Mortheast/D	2	12/77	127.4	-	131.0		-	-	-	13.4	2.8	- :
North Central/O	2	12/77	128.7	-	131.9	-	-	-	-	13.1	2.5	:
South/0	2	12/77	128.3	-	131.4		-	-	-	13.7	2.4	
West/D	2	12/77	130.4	•	134.3	•	-	-	-	16.7	3.0	-

Area is generally the Standard Metropolitan Statistical Area (SMSA), exclusive of farms. i.A.-tong Beach, Anahola, Calif.
is a combination of two SMSA's, and M.Y., M.Y.-Mertheastern M.J. and Chicapo, Ill.-Mertheastern Indo. are extensive Standard Consolidated Areas. Area edinitions are those established by the Office of Management and Budget in 1973, except for Denver-Boulors, Colo. which does not include Douglas County. Definitions on not include revisions made foods, fuels, and several other Items priced every month in all areas; most other goods and services priced as indicated:

N - Guery March, May, July, September, and Movember.

1 - January, March, May, July, September, and Movember.

Regions are defined at the foods, fuels, October, and Occamber.

Regions are defined at the foods, fuels, and Occamber.

A.1 More than 4,000,000.

A.2 1,35,000 to 1250,000.

C 75,000 to 385,000.

C 75,000 to 385,000.

Population size class A is the aggregation of population size classes A-1 and A-2.

Perice channess within areas are found in the Consumer Price Index: differences in living costs among areas are found in

MOTE: Price changes within areas are found in the Consumer Price Index; differences in living costs among areas are found in Family Budgets.

CPI-W

TABLE 4. Consumer Price Index for urban wage earners and clerical workers: U.S. city average, by expenditure category and commodity and service group, 1967-100

commodity and service group, 1967=100								
Group	Relative importance,	Unadiusted	indexes	Unadjus percent cha July 1980 July 1979 Ju	ited inge to	Season	naily adjus nt change f May to June	ted rom-
	December 1979	June 1980	July 1980	July 1980	from- ine 1980	Apr. to May	May to June	June to July
	•///	.,,,,	1,00	Expenditure				•
All items					0.1	0.9	. 0.9	0.0
All items(1957-59*100)	100.000	247.8 288.2	248.0 288.4	13.0			_	-
Food and beverages	20.353	246.4	249.1 255.5	7.9 7.8	1.1	.5	.5 .5 .3	.9
Food at home	13.427	247.7	251	6.9	1.4	.3	.3	. j 1.1
Cerewis and makery products 1/	1.683	245.7	248.0	12.2	.9 2.5	-2.0	5	.9 1.3
Dairy products	4.663 1.810	227.8	236.1	10.9	1.1	1.8 2.6 2.2	.5 .6 4.5 5	1.2
Fruits and vegetables	1.762	250.2 342.9	253.0 354.6	6.9 27.4	3.4	2.8	4.5	3.4
Fats and oils	.376 1.557	240.5 395.1	240.6 396.2	5.7 12.0	.0	.3	5	:1
Other prepared foods	1.129	230.8	232.1	11.2	.6	1.5	. 6	1.1
Food away from nome	5.810	269.9 188.0	271.2 169.2	10.0 9.2	.5 .6	.8 .9	1.0	.5 .6 7
Housing	41.667	266.9	265.1	16.1 18.1	-1.3	1.5	1.9	7
Shelter	28.038 4.982	288.0 190.8	284.3 191.8	9.1	-1.5 .5	1.0	1.9 2.2 1.1	.5
Other rental costs	.502 22.553	263.9 323.4	265.5 317.9	12.9 20.3	.6 -1.7	1.6	.6 2.5	-2.0
Home purchase 1/	9.137 10.163	253.0 422.0	254.3	13.5	1.3	1.3	1.3	
Financing, taxes, and insurance	10.163 3.254	422.0 263.8	405.0 285.1	13.5 30.4 10.0	-4.0 .5 .2	.5	4.1	-4.5 .3
Maintenance and repair services	2.322	308.5	309.0	9.3	. 2	. 4	6	.0
Maintenance and repair commodities i/	.931	228.8	231.3	12.0	1.1	1.0	1.0	1.1
Fuel and other utilities 1/	6.373 4.584 1.209 3.375	283.0 355.8 559.8	284 1	17.2 22.6 35.9	1.1	2.0	2.4	1.1
Fuel gil, coal, and bottied gas 1/	1.209	559.8	360.3 561.9	35.9	. 4	.0	3.7	.4
Gas (pipeo) and electricity 1/	3.375 1.788	308.5 164.9	313.5	18.5	1.6	3.4	1.1	1.6
Household furnishings and operation	7.256 4.231	202.9	203.5	4.ì 7.7 6.4	.3	.6 .5 1.3	.5 .4 .7	.6 .5
. Housefurnishings	1.499	172.9 243.0	172.9 245.2	11.1 7.8	.9	1.3	:7	.9
Housekeeping services 1/	1.527			7.8	- 3	.5	. 5	.9 .4 .5
Apparel commodities	4.489	176.0 168.8	175.4 168.0	6.6 5.6	3	2 5	-13 -14 -11	.5
Hen's and doys' apparel	1.391	168.1	167.2	1.6	5	-1.0	-1.9	:\$
infants' and toddiers' apparel 1/	.124	246.8 188.9	249.2 189.3	12.3	1.0	.7	1.6	
Other appares commodities 1/	.706 .550	201.0 231.8	200.8	19.2 13.5	1 3	6 2.1		1.0 1 .3
Apparel services 1/	.625 20.902	231.8 250.6	232.6 251.9	13.5	.3	2.1	3 3	.3
Private transportation	19.962		251.5	15.7 15.2	.5	.2 .2 1.1 -1.7	3	.1
New Cars	3.946 3.622	179.4 200.8	180.0 203.4	8.0 -2.8	1.3	-1.7	-1.1	.8 .7
Gasoline	6.429	377.6	203.4 377.6	34.4 10.4	.1	6 .8	-1.1 .9	5 .7
Maintenance and repair	1.621	268.0 227.3 196.8	269.7 226.7 200.1	15.9 14.7	.6 3 1.7	2.0	.6 .1	.0 1.7
Other private trans. commodities 1/.	.794	196.8 237.6	200.1	14.7	1.7	.5	-1 8	1.7
Other private trans. services Public transportation 1/	3.550 .940	234.9	245.B	13.7 24.4 11.4 9.3	4.6	2.3	. 8 . 9	4.6
Medical care	4.372	265.9 168.5	267.8	11.4	.7	.6	.4	.B .9 .7
Medical care services 1/	3.641	287.3	289.3	11.8 11.7	.7	.6		.7
Professional services 1/	1.843	255.1 326.5	256.1 329.8	11.8	1.0	.* .\$.6 .0 .7	1.0
Entertainment	3.556 2.248		204.4	8.4	.2	.5	•?	.4
Entertainment commodities	1.308	204.5 204.3	204.8	8.8	. 7	1.0	1.2	.4 .2 .5 .2
Other goods and services	4.035	212.1 203.6	212.9	9.1	.4	.8 .8 .7	1.5	.5
Personal Care 1/	1.684	211.8	213.1	9.1 8.7	.6	. 7	.4	. 6
Toilet goods and personal care	.796	204.5	206.6 219.8	9.8 7.7	1.0	1.0	.3 .5	1.0
Personal care services 1/	.688	219.1	219.8	7.7 9.8	.3	. 4 . 7 . 6	.5	.3
School books and supplies	1.046	204.> 219.1 229.8 210.9	230.3	8.6	.0	.6	.6 .6 .7	.6
Other private trans services Public transportation 1/ Medical care Medical care commontles Medical care commontles Professional services 1/ Other general services 1/ Other ge	.890	234.8	235.4	10.0	.3	.8	.,	.,
			Com	modity and ser	vice grou	P		
All items	100.000	247.8 233.0 246.4 223.4	248.0	13.0	0.1	0.9	0.9	0.0
Commodities. Food and beverages Commodities less food and beverages Nondurables less food and beverages	61.878 20.353	233.D 246.4	234.4	11.1 7.9 12.8	.6 1.1	., .,	.3	.6
Commodities less food and beverages	41.524 18.832	223.4	224.2 243.5	12.8 18.4	.a .1	.3	.2	.4
Apparel commouties	4.489	243.2 168.8	168.0	5.6	5	2	4	.3
Mondurables less food and beverages. Apparel camaconties. Mondurables less food, baverages, Mondurables less food, baverages, Mondurables less food, baverages, Mondurables less food, baverages, Rent, tesudential l/. Household services less rent Fransportation services. Other services // Other services // Doceses:	14.343	284.1	284.9	22.6	.3	.3	1	.1
Durables	22.692 38.122	206.8 275.1	208.0 273.1	8.2 16.2	.6 7	1.7	1.9	.5 9
Services	38.122 4.982	275.1 190.8	273.1 191.8	16.2 9.1	. 5	1.7	1.9	9
Household services less rent	4.982 19.677	190.8 331.9	191.8 325.9	9.1 20.8	-1.8	1.0 2.1 1.8	2.9	.5 -2.1 .7 .7
Transportation services	6.111 3.641	242.7 287.3	243.9 289.3	14.3 11.8 9.2	.5	1.0	.8 .3	.,
Other services	3.711	217.9	218.6	9.2	.3	1.0	.8	.3
All items less food	80.763	245.7	245.5 237.2	و. 14	2	1.0	1.0	2
Ali items less shelter	71.962 91.812	235.7 236.0	237.2	11.1	.6 .6	.6 .6	.6	.6
All items less home purchase and				10.9				
mortgage interest costs	82.675 95.628	234.3	235.8 246.6	13.1 12.7	.6 .0	.9	. 4 . 9	.6 .0
Commodities less food	95.628 42.641 19.948	246.5 221.6 238.3	222.4 238.7 272.2 247.2	17.9	.2	.6 .9 .4 .2	.2	.4 .2 .6 -1.1 9 .2
Nondurables less food and apparel	15.459	271.4 245.7	272.2	21.6 12.8	.3		:0	2
Nondurables	39.185 33.140	245.7 291.2		17.3	9	1.7	2.0	-1.1
Services less medical care 1/	34.481	271.8 371.8	269.4 373.9	16.6		1.7	2.1	9
All items less energy	11.115 88.865	237 6	237.6	29.3 11.1	.6	.6	. 9	.6
All items less food and energy	69.648 34.900	232.7 199.8	232.1	12.0	3	1.0	1.2	3 .6 3
Energy commodities	7.740	405.6 272.5	406.1 269.8	8.2 34.5 15.9	-1.0	1.5	9 1.8	3
Medical care services i/. Special indexes: Special indexes: All items less mortgage interest costs Commodities less food Monourables less food Monourables less food Monourables less food and apparel Services less mergy Compared to the cost of the consumer coller 1967-51:00 1/. the consumer coller 1967-51:00 1/. the consumer coller 1967-51:00 1/. the consumer coller	34.747							
1967-\$1.00 1/	•	\$.404	\$.403 .347	-11.6	2	-1.0	-1.0	2
1757-59-\$1.0U 1/		. 347	. , , ,	-	•	•	-	-

1/ Not seasonally adjusted. NOTE: Index applies to a month as a whole, not to any specific date.

CPI-W

TABLE 5. Consumer Price Index for uroan wage earners and clerical workers: Seasonally adjusted U.S. city average, by expenditure category and commodity and service group, 1967-100

category and commodity and service group, 1967						Ĭ				
Group		ustly sq				Seasona	illy adju ercent (sted anni hange fo	ual rate r-	
Group	Apr . 1980	1980	June 1980	July 19 80	0ct. 1979		ADT -	JULY	Jan.	ending in July
				_		1980	1980	1980	1980	1980
All items. Food and beverages Food at home Coreals and bakery products I/ Bodity products Fruits and vegetables Supar and sweets I/ Monalchoilc beverages Other prepared foods Alcone Alcone Housing Smaller casishinats I/ When the control of the control of the control Household and repairs Maintenance and repairs Muse further and bottles gas I/ Fuels I/ Fuel oil, coal and bottles gas I/ Muse furthishings and operation Mouse furthishings Apparel and upkeep Apparel and upkeep Apparel sound is apparel I/fants' and toodlers' app				EX	penditure 13.2	teategor 15.7				
Food and beverages	242.6	243.7	245.0	247.2	7.9	9.2	15.9	7.4	14.5 8.5	11.6 7.1
Food at home	248.8 244.2	249.9 244.9	251.2 245.7	253.5 248.5	7.9 7.7 6.9	9.2 9.0 8.4	6.2	7.8	8.3	7.0 6.1
Cereals and bakery products 1/ Meats, poultry, Fish, and egus	242.2 234.8	244.4 230.0	245.7 228.8	248.0	12.9	12.5	13.4	9.9	12.7	11.7
Dairy products	223.1	227.1	228.3 242.4	231.0 245.4	10.8	7.5	10.5	14.9	9.1	12.7
Sugar and sweets 1/	320.8	328.0	342.9 239.1		5.7 7.8	10.9	50.6	49.3	8.3	49.9
Nonalcoholic beverages	386.9	240.3 388.0	390.A	239.4 390.7	26.1	7.8 12.2	8.1 7.2	5 4.0	7.8	3.7 5.6
Other prepared foods	225.7 264.8	229.1	251.0	233.5 270.7	8.≠ 9.4	7.1	14.5	14.6 9.2	8.0 10.8	14.5
Alcoholic beverages	184.6	186.3	187.6	IRA A	9.1	12.3	9.3 10.1 18.8	9.4 11.3	8.5 17.2	9.8 15.0
Shelter	277.8	282.3	288.5	265.1 284.2	20.4	17.4 22.3	20.9	9.5		15.i
Other rental costs	260.5	261.7	190.8 263.4	191.8	12.9	6.1 18.8	6.7	10.9	9.4 15.7	8.8
Home purchase 1/	310.8	316.3 249.8	324.1 253.0	317.7	22.4	26.1 15.8	24.4 7.1	9.2	24.3 17.0	16.5
Financing, taxes, and insurance	397.3	407.3 283.8	424.1 283.4	405.0 284.3	31.2 9.8	41.0	44.6 15.5	8.0	36.0	25.0
Maintenance and repair services	308.6	309.7	307.9	307.8	9.2	12.2	17.4	-1.0	10.7	7.8
, commodities 1/	224.3	226.5	228.8	231.3	10.9	12.5	11.3	13.1	11.9	12.2
Fuels 1/	271.0 337.6	276.4 346.0	283.0 355.8	286.1	16.1 23.9	9.5 10.7 42.2	19.5 26.9	24.2	12.8 17.1	21.8 28.3
Fuel oil, coal, and bottled gas i/	557.1	346.0 557.1 297.5	355.8 559.8	360.3 561.9	69.3	42.2	36.8 23.2	29.7 3.5 41.2		19.0 31.9
Other utilities and public services 1/	162.3	163.1	308.5 164.9	313.5 165.9	-1.2	1.2	2.0	9.2	6.4 2.7	3.5
Housefurnishings	171.0	201.6	202.7 172.6	203.7 173.2	5.4 4.2	7.5 6.2 9.0	9.9	6.8 5.2 12.5	6.4 5.2 7.5	8.9 7.6
Housekeeping supplies 1/ Housekeeping services 1/	238.1	241.2 265.6 176.7	243.0 267.0	245.2	5.9 8.8		17.3	12.5	7.5 8.7	14.6
Apparel and upkeep	176.5	176.7	267.0 176.1 168.9	268.1 177.0 169.8	7.2 6.6	6.1 5.0	12.4	1.1	6.6	6.6
Men's and Doys' apparel	167.3	168.2	168.1	168.7	2.7	2.0	8.3	3.4	2.4	5.8
infants' and toddlers' apparel 1/	241.1	242.8	246.8	152.6 249.2	3.2 12.8	2.7 .7 8.4	9.8 22.7	-8.2 14.1	3.D 6.6 7.8	.4 18.3
Other apparel commodities 1/	198.5	188.5	188.7	190.6	7.2 26.8	8.4 16.1 12.1	6.4 31.1 17.9	6.8	21.3	6.6 17.2
Apparei services 1/	226.0 248.5	230.8	231.8	232.6	12.0	12.1 25.9	17.9 22.7	12.2	12.1	15.0 11.5
Private transportation	248.8	249.3	248.5	248.6 181.3	15.1 14.7 -1.0	25.6	22.9 13.9	.n	20.0	10.9
Used Cars	198.8	195.4	193.3	194.6	-2.2	14.4	-12.9	8.4	5.1 5.8	-10.6 19.2
Maintenance and repair	263.5	377.5 265.6	268.0	371.5 270.0	45.4 9.3	58.1 11.0	55.0 11.4	-8.4 10.2	51.6 10.1	10.8
Other private transportation Other private trans, commodities 1/	221.9 195.8	226.3 196.7	227.7 196.8	227.6 200.1	10.4 17.6 8.7	10.3	24.9 17.7	10.7	10.4	17.6
Other private trans, services	231.0	236.3	238.1 234.9	237.2 245.8	8.7 21.1	9.3 31.3		11.2	9.0	18.6
Medical care	263.0	264.7	265.8	267.B			14.8 13.2	31.1 7.5 9.5	12.5 8.2	22.7 10.3
Hedical care services 1/	284.5	166.7 286.3	168.0 287.3	169.5 289.3	6.9	9.4	11.4	6.9	B.2 13.4	10.4
Professional services 1/ Other medical care services 1/	251.2	253.5 326.5	255.1 326.5	256.1	10.1	12.1	16.7	8.0	11.1	12.3
Entertainment	200.9	202.0	203.5	204.3	7.0	4.9 7.1 1.9	15.0 17.0	5.6 6.9 4.8	5.9	10.9
Entertainment services 1/	199.9	201.8	204.3	204.8	6.8 7.3	1.9	11 A	10 2		11.0
Tobacco products 1/	198.9	200.5	212.7 203.6	213.7 204.0	10.2	10.1 12.9	7.6	8.5	10.1	8.0 7.1
Personal care 1/	209.5	210.9	211.8	213.1	7.1	10.4	10.4	7.1	8.8	8.7
Partonal care arrange 1/	201.8	203.9	204.5	206.6 219.8	7.7 6.6	10.0 10.6	11.9	9.9	8.8	10.9
Personal and educational expenses	229.5	218.1 231.2	232.6	233.6 215.0	16.8	6.9	8.7 8.5	7.3	11.7	6.8
Personal and educational services	234.3	236.1	232.6 213.7 237.7	215.D 238.5	3.6 18.7	6.0	8.4	7.6	9.2 12.2	8.0 8.0
				Commod	ity and s	ervice a	quo			
All items	_	_		_	17.2	15.7	15.9	7.4	14.5	11.6
Commodities	230.3	231.1 243.7 221.6	231.0	233.1 247.2 223.1	11.9 7.9 14.0	15.3	12.4	5.0 7.8	13.6	8.7 7.1 9.4
Commodities less food and beverages	242.6 221.1 242.2	221.6	245.0 222.2 242.7	223.1	14.0	9.2 18.8	6.3	3.7	16.4	9.4
Apparel commodities	169.9	169.6	168,9	169.8	20.7	24.6	28.0 11.6	2.2	22.7 5.8	14.4 5.5
and apparel,	282.5	263.3	283.0	283.2	27.1	30.3	34.8	1.0	28.7	16.7
Services	203.5 266.0	204.8 270.4 188.7	205.6 275.6	206.6 273.2 191.8 325.7	8.0 15.4 12.9	13.4	5.5 21.6	6.2	10.6	5.9 16.3
Rent, residential 1/	186.9 316.7	188.7 323.3	190.8	191.8	12.9 19.2	6.1 23.1	6.7 29.6	10.9	9.4	8.6
Transportation services		741.1	332.8 243.0	244.7 289.3	10.5	13.0	20.5	13.8	11.7	17.1
Other services	284.5 214.8	286.3 216.9	287.3 218.6	289.3	12.9 10.6	6.6	13.6	6.9 8.4	8.5	10.2
All items Commodities Food and beverages Food and beverages Commodities ans food and beverages Managered Repeated Repeated Repeated Repeated Rent, residential /- Household services - Food arevices arevices - Rent, residential /- Household services - Rent - R	240.5	242.5	245.3	244.8	14.6	17.7	18.3	7.3	16.1	12.7
All items less shelter	232.4	233.7 233.6	234.7	236.2	10.6	13.3	14.0	6.7 7.2	11.9	10.3
Ail items less home purchase and	231.0	232.4	233.4	234.9	11.0				12.4	
All items less medical care	241.4	243.5	245.8	245.7	13.3	12.5 16.1	13.3	6.9 7.3	11.8	10.1 11.6
Commodities less food	219.3	220.1	220.5	221.4	13.9	18.5	15.4	3.9	16.2	9.5
Mondurables less food	237:2	237.7	237.8 270.3	238.7	20.1 25.9 13.9	23.5 28.6	27.1 32.5	2.6	21.6	14.2 16.2
Nondurables	269.5 243.1 281.1	244.1 286.0	244.5	246.0 288.7	13.9	16.4	16.3	4.9	15.1	10.4
Commodities less food	261.9	266.3	271.8	269.4	16.3	17.0	21.4	11.3	16.8 16.7	17.4
Energy All items less energy All items less food and energy Commodities less food and energy Commodities less food energy Energy commodities Services less energy. I/ Mot measonally adjusted.	365.5	367.7	368.8	369.5 237.1	36.3	37.2	43.1	4.4	36.7	22.2
All items less food and energy	232.7	367.7 234.9 230.0 198.2	237.1	237.1 231.9	10.5	13.8 14.7 11.5	12.4	4.4 7.8 7.6 6.9	12.2	10 1
Commodities less food and energy Energy commodities	197.1	198.2	232.7 199.2 402.4	231.9 200.4 401.3	11.1 6.9 47.8	11.5	14.8 7.9 53.9	6.9 -5.8	9.2	11.1 7.4 20.4
Services less energy	264.4	268.3	273.0	270.0	15.8	52.6 17.8	21.4	. 8.7	16.8	14.9
1/ Not seasonally adjusted.										

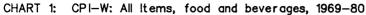
^{1/} Not seasonally adjusted. NOTE: |Index applies to a month as a whole, not to any specific date.

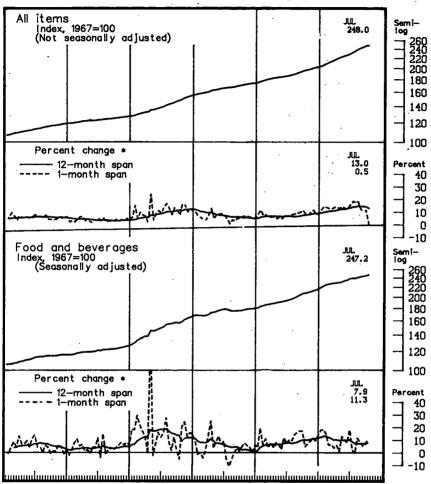
othersise nated												
Area <u>1</u> /	Pricing schedule	Other index base	Apr. 1980	Inde May 1980	June 1980	July 1980		nt chang 1980 fr May 1980			nt chang 1980 fr Apr. 1980	
U.S. city average			242.6	245.1	247.8	248.0	13.0	1.2	0.1	14.2	2.1	1.1
Unicago, IilNorthwestern Ind Detroit, Mich L.ALong Beach, Anaheim, Calif N.Y. N.YNortheastern N.J Philadelphia, PaN.J	H H H		239.8 248.0 247.8 232.4 257.9	243.0 248.9 252.6 234.1 239.9	248.0 255.8 253.4 236.7 243.8	247.0 252.1 251.5 258.4 245.5	13.9 14.7 16.0 11.3 13.1	1.6 1.3 4 1.8 2.3	-1.4 7 .7	16.3 18.7 18.1 11.5 13.7	3.4 3.1 2.3 1.9 2.5	2.1 2.8 .3 1.1 1.6
Anchorays, Alaska Galtlaure, Mo. Suation, Mass Cincinnali, Odin-My-lino. Missi, Fla. Milssuce, Wis. Mortheast Pannsylvania. Portland, Orgo, -Wash. San Olego, Calif. Santie-Everett, Mash.	1 1 1 1	11/77		223.1 247.8 236.8 252.9 262.4 130.9 255.2 235.8 255.9 242.6 264.8		224.6 250.8 240.9 259.1 265.8 134.7 253.9 243.2 252.2 245.9 265.7 251.6	8.9 13.3 12.7 14.4 11.1 15.2 13.7 14.0 10.7 13.1 14.0	.8 1.2 1.7 2.5 1.3 2.9 .3 3.1 -1.4 1.4				
Mashington, D.CMdYa	î		-	242.0	-	248.7	12.1	2.8	•	-	-	•
Atlants, Ca. duffalo, M.Y. Liaveland, Onio. Callas-Fort worth, Fex. Honolutu, Hessil. Houston, Tex. Hansas City, WoKans. Hansas City, WoKans. Pagual Himels. San Francisco-Gakisno, Calif.	2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2		239.3 233.3 248.4 249.6 228.4 257.5 242.2 245.7 242.2 242.8		244.7 234.6 250.5 254.5 228.0 262.8 246.3 246.8 247.7					14.1 11.9 13.2 16.7 12.0 12.1 12.8 11.2 14.8 15.9	2.3 .6 .8 2.0 2 2.1 1.7 1.1 1.9 2.0	:
Region 3/										17.0		
Mortheast	2 2	12/77 12/77 12/77 12/77	126.8 131.6 130.6 133.2	:	129.2 134.9 133.4 135.9	:	i	:	Ė	13.0 14.4 13.7 16.1	1.9 2.5 2.0 2.0	
Population size class 3/												
A-1	2 2	12/77 12/77 12/77 12/77 12/77	129.1 131:1 131.8 130.6 128.8	:	132.3 133.6 134.3 133.3 132.1	:	:	:	Ë	14.1 14.1 13.7 13.6	2.5 1.9 1.9 1.9 2.6	:
Region/population size class cross classification 3/				,								
Mortheast/A. Morth Central/A. South/A. Mortheast/B. Mortheast/B. South/B. South/B. South/B. South/C. Gest/C. Morth Central/C. South/C. Morth Central/C. Morth Central/C. Mortheast/O. Mortheast/O. Mortheast/O. Mortheast/O.	222222222222222222222222222222222222222	12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77 12/77	124.9 133.4 133.6 132.0 131.6 132.6 132.6 128.3 131.7 128.0 129.1 128.0		127.1 136.9 133.6 136.6 131.4 134.4 136.3 135.6 131.2 133.9 131.5 132.4 131.2					12.3 15.7 13.7 17.5 14.0 14.3 14.5 15.3 12.6 13.5 13.9 13.9 13.4	1.8 2.6 2.1 2.4 1.6 2.1 1.3 2.3 1.8 2.7 2.6 3.1	

Ares is generally the standard description Statistical Ares (SMSA), exclusive of farms. L. A.-Long Beach, Amshais, Calif.
et and Standard Consolidated Ares. Area definitions are those stabilished by the Office of Management and Budget in
1973, except for Denver-Boulder, Colo. which does not include Douglas County. Definitions do not include revisions asce
1972, except for Denver-Boulder, Colo. which does not include Douglas County. Definitions do not include revisions asce
1973, except for Denver-Boulder, Colo. which does not include Douglas County. Definitions do not include revisions asce
1973, and several other items priced every month in all areas; most other goods and services priced as indicated:
1 - January, March, May, July, Saptember, and November.
2 - Fabruary, April, June, August, October, and December.
4 - December of the County of

^{3/}

Price changes within areas are found in the Consumer Price Index; differences in living costs among areas are found in family Budgets.



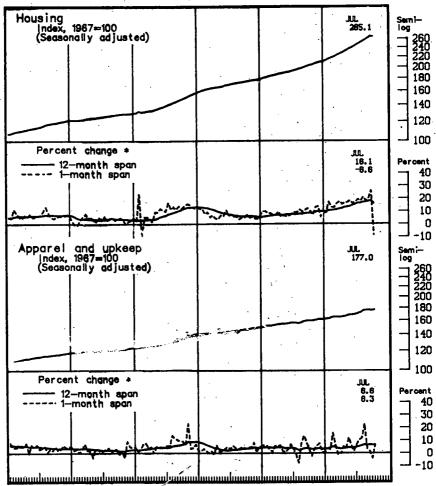


1989 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980

^{*} Unadjusted data used to calculate 12-month percent change. Percent changes over 1-month spans are annual rates calculated from seasonally adjusted data.

** August 1973 = 92 percent

CHART 2: CPI-W: Housing, apparel and upkeep, 1969-80



1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980 * Unadjusted data used to calculate 12—month percent change. Percent changes over: 1—month spans are annual rates calculated from seasonally adjusted data.

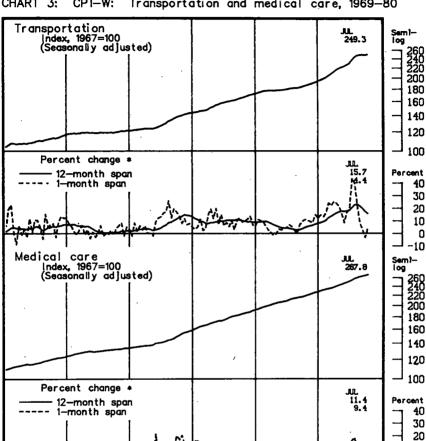


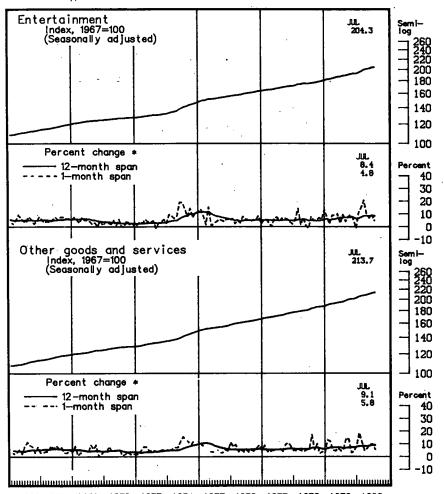
CHART 3: CPI-W: Transportation and medical care, 1969-80

1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980

10 0 -10

^{*} Unadjusted data used to calculate 12—month percent change. Percent changes over 1—month spans are annual rates calculated from seasonally adjusted data.

CHART 4: CPI-W: Entertainment, other goods and services, 1969—80



1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980

^{*} Unadjusted data used to calculate 12—month percent change. Percent changes over 1—month spans are annual rates calculated from seasonally adjusted data.

Table C. HOMEOWNERSHIP COMPONENTS used in official CPI-U and in experimental measures: Percent change over 12 months

	Official		E	xperimental of homeown				Official	ı	Experimental home	l measures wnership c		rnative
	12 months ended 1 m	f-services	measures	Outlays u	easures								
December: 1968 1970 1970 1971 1972 1973 1974 1975 1976 1977 1978 August 1979 September 1979 October 1979 November 1979 December 1979 December 1979 March 1980 March 1980 March 1980 March 1980 March 1980	for All Urban Con- sumers	Rental equiva- lence using CPI	User cost using current interest	User cost using average interest	Outlays using current interest	Outlays using average interest	12 months ended	Urben Con- sumers	Rental equiva- lence using CPI	X-2 User cost using current interest cost	X-3 User cost using average interest cost	X-4 Outlays using current interest cost	X-5 Outlays using average interes cost
December:							December:		-				
1968	7.6	2.8	11.0	8.0	11.0	6.0	1968	4.7	3.9	4.9	4.6	4.7	4.2
1969	10.2	3.8	7.1	3.5	13.2	8.3		6.1	5.2	5.6	5.2	6.0	5.7
1970	10.2	4.5	4.2	1.7	12.6	10.1		5.5	4.5	4.5	4.2	5.2	4.9
1971	2.7	3.8	-12.1	-8.9	0.3	7.7		3.4	3.5	1.6	2.2	3.2	3.8
1972					4.8			3.4		3.2	3.3	- 3.4	3.5
1973	7.7	4.9	23.0	18.9	10.8	4.4	1973	8.8	8.5	10.4	10.0	9.2	8.7
1974	13.3	5.4	16.9	12.9	14.9	9.1	1974	12.2	11.1	12.6	12.1	12.3	11.8
1975	7.9	5.2	2.8	3.4	7.1	9.0		7.0	6.6	6.4	6.4	6.8	6.9
1976	3.8	5.5	-1.1	1.9	2.7	7.6	1976	4.8	5.1	4.3	4.7	4.8	5.2
1977	9.2	6.5	2.5	0.4	10.4	9.0	1977	6.8	6.3	5.9	5.7	6.6	6.5
1978	12.4	7.3	5.7	-1.1	12.0	5.3	1978	9.0	7.9	7.8	7.1	8.5	7.8
August 1979										11.5	10.7	11.0	10.2
September 1979										11.7	10.9	11.5	10.6
October 1979										12.2	11.3	11.5	10.6
November 1979										12.5	11.4	11.8	10.6
										13.2	12.1	12.5	11.3
										13.9	12.7	13.1	11.7
February 1980										14.3	. 13.1	13.4	12.1
March 1980										15.5	14.1	13.9	12.5
April 1980										15.7	14.2	13.8	12.3
May 1980										15.4	13.9	13.5	11.9
June 1980										15.6	13.7	13.4	11.5
July 1980	19.9	9.2	36.0	27.5	24.5	13.9	July 1980	13.2	10.8	14.0	12.6	12.5	11.3
Relative importance December 1977	22.8	14.5	11.4	10.0	10.0	8.7.							

Table D. Official ALL-ITMS CPI-U and EXPERIMENTAL MEASURES using

alternative homeownership components: Percent change over 12 months

Explanations of Homeownership Measures

Official CPI-U includes five components. (1) The weights for property taxes, property insurance, and home maintenance and repairs represent expenditures of all homeowers in the base period. The weights for house prices and contracted mortgage interest cost represent only those homeowners who actually purchased a home in the base period. Included are the total price paid for the home and the total amount of interest expected to be paid over half the stated life of the mortgage. (2) Current monthly prices are used for each of these components.

Experimental Measure X-I: (1) The weight for this rental equivalence measure is the estimate of the rental value of all owner-occupied homes in the base period compiled from a specific question asked on the 1972-73 Consumer Expenditure Survey. This covers the entire stock of owned homes. (2) Prices used are the current rents collected for the residential rent component of the CPI. The CPI rent component is designed to represent changes in residential rents for all types of housing units, not just changes in rents for units that are typically owner occupied. The CPI rent component is, therefore, not appropriate for this measure.

Experimental Measure X-2: (1) The weight for this user cost method includes expenditures for mortgage interest, property taxes, property insurance, maintenance and repairs, the estimated base-period cost of homeowners' equity in their houses, and the offset to shelter costs resulting from the estimated appreciation of house values in the base period. This measure covers the entire stock of owned houses. To derive the weights for mortgage interest costs and equity costs, the total value of the housing stock in the base period was apportioned into its debt and equity components. The debt component equals the amount owed, and the equity component is the amount owned, i.e., payments on principal plus appreciation from the time of purchase to the base period. Each component was subsequently multiplied by the average mortgage interest rate

in the base period to determine its cost. (2) Prices used are current ones except for the appreciation term which uses a 5-year moving average of the changes in appreciation rates.

Experimental Measure X-3: (1) The weights are the same as in Experimental Measure X-2, except that mortgage interest costs are calculated as the total interest amount paid out by homeowners in the base period. As in X-1 and in X-2, this measure covers the entire homeowner population. (2) The prices for all components except mortgage interest costs and appreciation are current monthly prices. As in X-2, appreciation is represented by a 5-year moving average of the changes in house prices. However, X-3 uses past and current mortgage interest costs in a 15-year weighted moving average, which reflects the base period age distribution of mortgage loans.

Experimental Measure X-4: (1) The weights for this outlays approach include expenditures actually made in the base period for property taxes, property insurance, and maintenance and repairs. The weight for the mortgage interest term is calculated in the same manner as in X-2. However, no appreciation or equity terms are included. Not all homeowners are represented in this measure because those who made no mortgage debt payment in the base period are excluded. (2) The prices used for each of these items are current ones.

Experimental Measure X-5: (1) The weights for this outlays approach include, as in X-4, expenditures actually made in the base period for property taxes, property insurance, and maintenance and repairs. The weight for the mortgage interest cost term is the same as for the X-3. No appreciation or equity elements are used. As in X-4, not all homeowners are represented in this measure because those who made no mortgage debt payment in the base period are excluded. (2) Current prices are used in X-5 except for mortgage interest which uses the 15-year weighted moving average also used in the X-3.



United States Department of Labor



Bureau of Labor Statistics

Washington, D.C. 20212

Kay Ford Betty Rice Kathryn Hoyle (202) 272-5177 (202) 272-5080 (202) 523-1913 USDL-80-523

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CONSUMER PRICES: ENERGY - July 1980

The Bureau of Labor Statistics of the U.S. Department of Labor released today the average retail prices for gascline, fuel oil, natural gas, and electricity for July 1980. These average prices are compiled from data collected by BLS in conjunction with the Consumer Price Index.

Gasoline and Fuel Oil

The U.S. average price for all types of gasoline rose to \$1.247. July prices of leaded regular gasoline averaged \$1.216; unleaded regular, \$1.271; and leaded premium, \$1.307. In the 28 cities for which gasoline prices are published (table 3), prices of all types of gasoline averaged highest in Honolulu, San Francisco, and Chicago and lowest in Dallas, Kansas City, Milwaukee, and St. Louis.

The U.S. average price per gallon of fuel oil rose to \$1.022 in July. In the 15 cities for which fuel oil prices are published (table 1), the price per gallon averaged highest in Seattle, Anchorage, and Washington, D.C., and lowest in Baltimore and Northeast Pennsylvania (Scranton).

Electricity and Natural Gas

The U.S. average price for 500 KWH of electricity was \$31.51, up 58 cents from June. The July price for 40 therms of natural gas was \$17.18, 19 cents higher than June. The U.S. price for 100 therms was \$40.42, \$1.56 higher than June.

Table 1. Average prices for utility (piped) gas, electricity, and fuel oil, U.S. city average and selected areas

		Utility (p	iped) gas		Electr	icity	Fuel o	il #2
Area, region and population size	per 40	theras	per 100	therms	per 50	D KWH	per ga	llon
	June 1980	July 1980	June 1980	July 1960	June 1980	July 1980	Jun s 1980	July 1980
U.S. city average 1/	\$16.989	\$17.184	\$38.858	\$40.415	\$30.931	\$31.513	\$1.017	\$1.022
Chicago, IllNorthwestern Ind Detroit, Mich	16.061 17.369	16.174 17.560	35.579 36.513	35.861 36.982	37.197 32.327	37.064 32.081	1.019	1.016
L.ALong Beach, Anahain, Calif	_ 13.759 _	15-218		- 43.733-	 36-26 1	- ~ 35-,808 -	NA - 1.031	MA -
N.Y., N.ŸNortheastern N.J Philadelphia, PaN.J	27.087 21.186	26.906 21.186	57.669 45.778	57.222 45.778	50.216 33.730	52.267 35.170	.999	1.000
Anchorage, Alaska	9.640	9.750	19.790	20.080	21.573	21.871	1.031	1.058
Baltimore, Md Boston, Mass	18.590 22.146	19.410 22.146	41.400	41.960 46.681	34.180 32.673	34.190 33.979	.961 1.012	.963 1.022
Cincinnati, Ohio-KyInd	16.830	16.351	38.885	37.716	23.250	23.160	.985	.985
Denver-Boulder, Colo	16.978	16.500	38.214	37.354	32.069	32.324	NA	NA
Miami, Fla	21.080	21.820	44.150	46.020	29.765	29.992	NA	NA
Hilwaukee, Wis	17.930	17.930	41.152	41.152	23.960	31.560	.982	.980
Northeast Pennsylvania	19.167 24.790	19.167 24.790	39.755 56.977	39.755 56.977	25.170 17.954	25.600 17.607	.968 1.033	.969 1.029
Portland, OregWash St. Louis, MoIll	15.529	15.665	34.462	34.666	27.888	27.888	NA NA	NA
San Diego, Calif	12.615	14.192	31.741	35.931	38.422	48.668	NA	NA
Seattle-Everett, Wash	26.671	26.671	55.479	55.479	11.502	10.656	1.072	1.084
Washington, D.CMdVa	18.851	19.003	41.921	42.213	31.560	32.512	1.049	1.054
Atianta, Ga	17.110	15.810	37.380	34.120	24.124	24.174	NA	NA
Buffalo, N.Y	18.699	18.396	42.649	41.936	26.867	26.046	1.028	1.029
Cleveland, Dhio	15.883	15.883 I1.670	35.285 27.842	35.285 25.965	31.527 25.699	31.97B 26.088	NA NA	NA NA
Dallas-Fort Worth, Tex	12.411 56.610	59.260	138.410	145.040	36.950	37.130	NA NA	NA NA
Houston, Tex	15.990	15.990	34.240	34.240	29.940	30.370	NA	NA
Kansas City, MoKans	12.628	12.632	29.018	29.032	32.548	33.986	NA	NA
Minneapolis-St. Paul, MinnWis	14.935	14.605	32.919	32.091	. 25.966	26.038	.985	.977
Pittsburgh, Pa	14.732	14.763	31.935	32.017	27.864	28.142	NA.	MA
San Francisco-Oaklano, Calif	16.900	16.900	56.898	56.898	29.136	29.136	NA	NA
Region 3/								
Northeast	22.219	22.122	47.750	47.518	37.856	39.042	1.020	1.027
North Central	16.059	16.124	35.518	35.675	30.863	31.263 26.902	1.000	.998
Sauth	16.065 15.299	15.841 16.099	35.449 39.574	34.375 46.158	26.302 28.181	28.295	1.045	1.019
West 1/	13.233	16.077	37.374	40.170	20.101	10.277	1.047	1.050
Region/population size class cross classification <u>2</u> /								
Northeast/A	22.163	22.072	47.724	47.459	39.983	41.403	1.019	1.026
North Central/A	16.094	16.157	35.549	35.700	32.274	32.820	.999	.997
South/A	16.758	16.542	37.010	36.130	29.281	29.665	.999 .	1.002
West/A	14.945 22.706	15.962 22.956	38.429 48.168	46.592 48.762	29.061 29.551	29.314 29.772	1.067	1.076
Northeast/B	15.557	15.676	35.206	35.508	26.736	26.392	1.001	.998
South/B	14.000	13.622	31.188	29.208	22.305	23.337	1.032	1.028
West/B 1/	16.793	16.991	44.562	46.537	26.845	26.651	1.033	1.029
Northeast/C	20.067	18.962	42.539	40.028	29.896	30.363	1.063	1.070
North Central/C	15.829	15.861	34.920	34.929	21.952 24.274	22.135	1.019 NA	1.017 NA
South/C	15.367 14.639	15.367 14.589	36.105 38.551	36.097 38.436	24.274	24.569 24.956	1.031	1.058
West/C	26.827	26.785	59.971	59.968	28.303	28-803	1.033	1.046
North Central/D	15.028	15.150	33.640	33.986	26.485	26.264	.999	.997
- South/D	16.887	17.422	35.477	36.867	26.542	28.157	1.021	1.021
West/D	15.221	14.688	36.353	34.369	16.523	16.415	.935	.939

At the monitude of the control of th

Table 2. Average unit prices and consumption ranges for utility (piped) gas and electricity for U.S. city average and selected areas

Area, region and population size	Average pric of utility (e per therm piped) ges	Range of consumpt July	ion for	Average pri of elect		Renge o consumpt July	ion for
class	June 1980	July 1980	Low	High	June 1980	July 1980	LOW	High
U.S. city average <u>1</u> /	. \$0.408	\$0.419	1	1,688	\$0.063	\$0.064	3	9,782
Chicago, III Northwestern Ind	. ,340	.342	30	701	.074	.074	168	2,484
Detroit, Mich		7.396		341	.069	.068	85	9,031
t.ALong Beach, Ansheim, Calif	357	-444	6	193	.075	.074	14	8,224
N.Y., N.YNortheastern N.J Philadelphia, PaN.J		.692	.2	1,011	.117	.121	28	4,945
Filtredstpile, FaM.J	454	.456	14	257	.070	.073	155	2,542
Anchorage, Alaska	179	. 182	65	1,688	.041	.041	120	2,182
Baltimore, Md	456	.474	10	190	.065	.065	157	9,586
Boston, Mass	532	.532	5	291	.068	.071	130	6,840
Cincinnati, Ohio-KyInd	391	.379	37	248	.053	.053	46	1,211
Denver-Boulder, Colo		.397 .776	13	335	.055	.056	386	6,975
Milwaukee, Wis		.427	3 10	52 280	.059	.059	161	2,973
Northeast Pennsylvania		.509	10	119	.044 .050	.055 .051	178	2,503
Portland, Oregwash		.588	- 1	200	.033	.032	103 323	2,173
St. Louis, MoIll		.374	j	228	.054	.054	204	4,375 2,100
San Diego, Calif		.373	5	115	.078	.098	-17	4,830
Seattle-Everett, Wash		.592	2.	553	.019	.017	210	8,243
Weshington, D.CMdVa	468	.470	9	267	.066	.067	110	7,290
Atlanta, Ga	479	.437	4	418	.051	.051	237	5,345
Buffelo, N.Y		.408	37	249	.054	.052	41	9,060
Cleveland, Ohio	376	376	.2	369	.061	.062	205	8,586
Honolulu, Hawaii 2/	291	.277 1.882	35 1	429	-049	.050	. 243	3,936
Houston, Tex	320	.320	83	35 297	.068	-069	300	4,453
Kensas City, MoKens	306	.306	9	387	.061	.055	242	5,156
Minneapolis-St. Paul, MinnWis	343	.336	16	562	.051	.051	65 18	2,102 1.834
Pittsburgh, Pa	312	.313	72	270	.057	.058	21	5,035
San Francisco-Oakland, Calif	570	.570	52	350	.077	.077	16	7,997
Region 3/								
Northeast	520	.518	1	1.011			_	
North Central		.357	î	701	.082	.084	.8	9,782
South		.399	ż	776	.053	.062	18	9,031 9,588
West 1/	423	.468	2	1,688	.058	.058	14	9,301
Region/population size class cross classification 3/								·
Northeast/A	518	.516	2	1.011	.087	.090	21	9,060
North Central/A	356	.358 .	2	701	,065	.066	îå	9.031
South/A		.408	3	429	.056	.057	110	9,588
West/A		.475	2	553	-060	.061	14	8.243
North Central/8		.545	. 3	512	.061	.061	8	2,889
South/8		.341 .386	34 2	643 776	.051	.051	186	7,099
West/B 1/		.494	4	776 351	.046 .054	.049	. 8	8,793
. Mortheast/C	516	.505	ĩ	268	.065	.054	55	9,301
North Central/C	412	.417	1	387	.042	.044	108	9,782 3,626
South/C		.346	10	350	.051	.052	3	8,348
West/C	345	.344	7	1,688	.053	.053	120	7,454
North Central/O		.821 .	5	243	.054	.055	117	4,921
South/D		.340 .573	2	320	.057	.056	18	3,732
West/0		.341	31	220 255	.051 .027	.055 .027	23 97	9,485

Honolulu not included for utility (piped) gas.

Prices are for propage only

Regions are for propage only

Regions are for propage only

The population size classes are aggregations of grees which have urban population as defined below:

A-1 - More than 4,000,000.

B - 185,000 to 4,000,000.

C - 75,000 to 385,000.

O - Less than 75,000.

Population size classes A is the aggregation of population size classes A-1 and A-2.

Table 3. Gasoline average prices per gallon, U.S. city average and selected areas

Area, region and population size		oline, pes <u>l</u> /	Leaded	regular	Unleaded	regular	Leaded	presium
••••	June 1980	July 1980	June 1980	July 1980	June 1980 .	July 1980	. June 1980	July 1980
Area <u>2</u> /	*	•						
U.S. city average	\$1.246	\$1.247	\$1.217	\$1.216	\$1.269	\$1.271	\$1.300	\$1.307
Chicago, IllNorthwestern Ind	1.307	1.303	1.271	1.267	1.323	1.320	NA	NA
Detroit, Mich	1.286	1.277	1.265	1.255	1.329	1.323	NA	NA '
L.ALong Beach, Anaheim, Calif N.Y., N.YNortheastern N.J	1.270	1.274	1.231	1.230	1.278	1.280	1.305	1.314
Philadelphia, PaN.J	1.249	1.289	1.267	1.262	1.316	1.312	1.319	1.319
				1.217	1.200	1.255	1.302	1.297
Anchorage, Alaska	1.267	1.289	1.237	1.262	1.265	1.285	1.317	1.337
Beltimore, Md	1.267	1.264	1.237	1.232	1.283	1.280	1.301	1.302
Boston, Mass	1.221	1.222	1.206	1.207	1.252	1.253	1.285	1.294
Cincinnati, Ohio-KyInd Denver-Boulder, Colo	1.221	1.225	1.193	1.197	1.246	1.249	1.268	1.275
Miami, Fla	1.230	1.235	1.175	1.176	1.241	1.247	1.253	1.274
Milwaukee, Wis	1.195	1.188	1.213	1.213	1.252	1.261	NA	NA
Northeast Pennsylvania	1.219	1.217	1.200	1.198	1.225	1.221	NA NA	NA.
Portland, OregWash	1.227	1.243	1.203	1.217	1.234	1.246	1.294	1.292
St. Louis, MoIll	1.199	1.109	1.178	1.166	1.246	1.236	1.265 NA	1.307 NA
San Diego, Calif	1.285	1.277	1.249	1.227	1.297	1.298	1.321	1.322
Seattle-Everett, Wash	1.258	1.259	1.237	1.230	1.250	1.265	1.307	1.313
Washington, D.CMdVa	1.260	1.289	1.231	1.262	1.281	1.313	1.303	1.321
Atlanta, Ga	1.264	1.263	1.224	1 222	1 020			
Buffalo, N.Y	1.288	1.288	1.265	1.222	1.276	1.272	1.308	1.315
Cleveland, Ohio	1.210	1.226	1.190	1.203	1.302	1.302	NA 1.252	, NA
Dallas-Fort Worth, Tex	1.180	1,177	1.160	1.157	1.215	1.211	1.252 NA	1.277 NA
Honolulu, Hawaii	1.352	1.370	1.310	1.332	1.350	1.364	1.383	1.401
Houston, Tex	1.190	1.193	1.168	1.171	1.213	1.218	1.240	1.243
Kansas City, MoKans	1.189	1.182	1.168	1.161	1.220	1.214	NA NA	NA NA
Minneapolis-St. Paul, MinnWis	1.228	1.216	1.210	1.197	1.264	1.254	1.260	1.248
Pittsburgh, Pa	1.261	1.262	1.240	1.240	1.273	1.276	1.303	1.302
San Francisco-Oakland, Calif	1.307	1.305	1.270	1.264	1.328	1.327	1.341	1.344
Region 3/								
Northeast	1.268	1.265	1.245	1.241	1.285	1.283	1.302	1.300
North Central	1.238	1.237	1.211	1.209	1,273	1.273	1.282	1.291
South	1.227	1.229	1.199	1.200	1.247	1.252	1.283	1.288
West	1.263	1.267	1.223	1.224	1.279	1.284	1.314	1.323
Region/population size class cross classification 3/								
Northeast/A	1.272	1.268	1.247	1.242	1.291	1.287	1.315	1.315
North Central/A	1.255	1.250	1.224	1.218	1.285	1.283	1.267	1.266
South/A	1.230	1.236	1.201	1.205	1.251	1,256	1.283	1.291
west/A	1.279	1.281	1.243	1.239	1,288	1.291	1.314	1.321
Northeast/B	1.258	1.256	1.233	1.231	1.276	1.274	1.285	1.277
North Central/B	1.219	1.232	1.190	1.203	1.255	1.264	NA.	NA
South/8	1.222	1.218	1.196	1.189	1.238	1.238	1.275	1.281
Northeast/C	1.265	1.269	1.220	1.218	1.290	1.294	1.316	1.328
North Central/C	1.215	1.214	1.197	1.247	1.279	1.283	NA NA	NA.
South/C	1.216	1.219	1.189	1.191	1.238	1.243	1.281	NA 1 270
West/C	1.240	1,250	1.209	1.217	1.257	1.269	1.281	1.278
Northeast/D	1.272	1.266	1.254	1.252	1.281	1.281	NA NA	. NA .
North Central/D	1.236	1.234	1.215	1.212	1.266	1.266	NA.	NA.
South/0	1.254	1.267	1.224	1.232	1.288	1.314	NA	'NA
West/D	1.210	1.219	1.192	1.202	1.230	1.240	1.262	1.265

st/D. 1.200

TECHNICAL NOTE

Beginning in February 1978, the Bureau of Labor Statistics (BLS) began publishing two Consumer Price Indexes: A new CPI for All Urban Consumers (CPI-U) and a revised CPI for Urban Wage Earners and Clerical Workers (CPI-W). The previous report on fuel and utility prices and indexes was compiled from the unrevised CPI-W and was discontinued effective with data for June 1978. Due to changes in compilation methods, the price data published in this report are not strictly comparable with those from the unrevised CPI-W.

Prices are usually available for the U.S. city average, 28 large urban areas and 12 areas reflecting the four Census regions cross-classified by three population sizes. However, not all energy commodities and services are used in every area of the country. Fuel oil, for example, is not a common heating fuel in some urban areas, particularly in the South and West. Where no average prices are available, the designation NA will appear—average price not available. NA will also appear if the data sufficiency criteria have not been met in any given month. For example, if there are fewer than five usable fuel oil prices for a published city or region size class, no fuel oil prices for the area will be published.

All prices, except for electricity, are collected monthly by BLS representatives in the urban areas priced for the CPI. Electricity prices are collected monthly on mail questionnaires by the Department of Energy for BLS. Prices for natural gas and electricity include fuel and purchased gas adjustments and all applicable taxes. Fuel oil and gasoline prices include applicable Federal, State, and local taxes.

Natural gas and electricity: Natural gas prices are reported in therms, which are a measure of heating value. Electricity prices are given in kilowatt hours (kwh). For both utility services, the consumption ranges specified in table 2 are the upper and lower limits of the bill sizes priced for the Consumer Price Index. The average prices per therm and per kilowatt hour are calculated from bills priced within these ranges. It should be noted that bills priced for the CPI are not only for different consumption amounts, but may also be calculated from different types of residential rate schedules. The average prices per therm and per kilowatt hour are not, therefore, generally suitable for use in place-to-place price comparisons.

The average prices for 40 and 100 therms of natural gas and for 500 kilowatt hours of electricity (table 1) are calculated for this energy release from a special price collection program. They are not used in the calculation of the CPI. Since heating and air conditioning requirements vary by geographic location, climate, and weather conditions, it cannot be inferred that these consumption amounts represent those used by a typical residential consumer. These bills are used merely to track price changes over time for constant amounts of consumption, to provide data for place-to-place price comparisons, and to provide continuity with prices of natural gas and electricity formerly published in conjunction with the unrevised Consumer Price Index.

Fuel oil: Only #2 fuel oil (home heating oil) is priced. Prices are collected, in most cases, for quantities greater than one gallon. These prices are converted to a per gallon price for this program. Fuel oil prices reflect discounts for quantity and/or quick payment.

Gasoline: Gasoline prices are collected at the pump from a sample of full service, mini-service, and self-serve gas stations.

Approximate British Thermal Unit (BTU) values for some energy items are as follows, according to the source indicated:

- 1 therm = 100,000 BTU's (U.S. Department of Energy).
- 1 kwh = 3,412 BTU's (Edison Electric Institute)
- 1 gallon #2 fuel oil = 140,000 BTU's (U.S. Department of Energy).

News

United States Department of Labor



Bureau of Labor Statistics

Washington, D.C. 20212

Michael Buso (202) 523-1364 Kathryn Hoyle (202) 523-1913 USDL-80-524 TRANSMISSION OF MATERIAL IN THIS RELEASE IS EMBARGOED UNTIL 9:00 A.M. (E.D.T.), Friday, August 22, 1980

REAL EARNINGS IN JULY 1980

Preliminary real earnings figures for July--covering full-time and parttime workers on production or nonsupervisory jobs in the private nonfarm sector of
the American economy--were released today by the Bureau of Labor Statistics of the
U. S. Department of Labor. Real earnings--or earnings in constant dollars--for
July were calculated by adjusting earnings in current dollars for changes in the
Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W).

*Real gross average weekly earnings were virtually unchanged from June to July after allowance for the usual seasonal variation. A 0.3 percent increase in average hourly earnings was offset by a 0.3 percent decline in average weekly hours with no change in the CPI-W. (See table A.)

Over the year, real average weekly earnings were down 6.8 percent. A 7.5 percent increase in average hourly earnings was offset by a 1.9 percent decline in average weekly hours and a 13.0 percent increase in the CPI-W. Before adjustment for the CPI-W and seasonal change, average weekly earnings were \$233.69 in July compared with \$221.76 a year earlier. (See table 1.)

*Real spendable earnings --average weekly earnings reduced by social security and Federal income taxes applicable to a married worker with three dependents who earned the average amount and then deflated by the CPI-W--were virtually unchanged from June, seasonally adjusted. Over the year, real spendable earnings were down 7.4 percent. (See footnote 2, table A, for explanation of over-the-year average tax effect.)

*The Hourly Earnings Index in dollars of constant purchasing power increased 0.2 percent from June to July. Compared with a year ago, the index was down

Table A. Composition of change in real earnings (production or nonsupervisory workers on private nonfarm payrolls)

	(1)	(2)	(3)	(4)	(5) Real	(6)	(7)
Month	Average	Average	Average	Consumer	average	Average	.Real
	hourly	weekly	weekly	price	weekly	tax	spendable
	earnings	hours	earnings	index 1/	earnings	effect 2/	earnings 3/
1979	Pe	rcent cha	nge from p	receding m	onth, seas	onally ad	usted
July -	0.7	0.0	0.7	1.1	-0.4	0.1	-0.5
August	0.8	0.3	1.1	1.0	0.1	0.1	(4)
Sept.	0.6	-0.3	0.4	1.1	-0.8	(4)	-0.8
Octobe	r 0.3	0.0	0.3	1.0	-0.7	(4)	-0.7
Nov.	1.0	0.0	1.0	1.0	-0.1	0.1	-0.2
Dec. 1980	0.8	0.3	1.1	1.2	-0.2	0.2	-0.3
Januar		-0.3	(4)	1.4	-1.4	0.0	-1.4
Feb.	0.6	-0.3	0.3	1.4	-1.0	(4)	-1.1
March	0.9	-0.3	0.6	1.4	-0.7	0.1	-0.8
April	0.5	-0.3	0.2	1.0	-0.8	(4)	-0.8
May	0.5	-0.6	-0.1	0.9	-1.0	(4)	-0.9
June p		0.0	0.9	0.9	(4)	0.1	-0.1
July p	0.3	-0.3	(4)	(4)	(4)	0.0	(4)
1979		Per	cent chang	e from sam	e month a	year ago	
July -	8.1	-0.8	7.2	11.5	-3.9	0.0	-3.9
August		-0.6	7.6	12.0	-3.9	(4)	-4.0
Sept.	8.2	-0.3	7.9	12.4	-3.9	0,1	-4.0
Octobe		-0.6	6.9	12.4	-4.9	-0.1	-4.8
Nov.	7.8	-0.6	7.2	12.8	-4.9	. (4)	-4.9
Dec. 1980	8.0	-0.6	7.4	13.4	-5.3	(4)	-5.3
Januar		-0.6	6.9	14.0	-6.2	0.8	-7.0
Feb.	7.7	-0.8	6.8	14.2	-6.5	0.8	- 7.3
March	8.1	-1.4	6.6	14.6	-7.0	0.8	- 7.7
April	8.5	-0.3	8.2	14.5	-5.6	1.0	-6.5
May	8.1	-1.4	6.5	14.4	-6.9	0.8	-7.6
June p	8.2	-1.4	6.7	14.2	-6.6	0.9	-7.4
July p	7.5	-1.9	5.4	13.0	-6.8	0.7	-7.4

Note: The following relationships hold approximately:

column (1) + column (2) = column (3) column (3) - column (4) = column (5)

column (5) - column (6) = column (7)

- p = preliminary
 1/ The Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W) is used as the deflator for constant dollar series presented in this release.
- 2/ When comparing spendable earnings estimates for periods subject to the same Federal tax laws, the percent change in average tax effect is a measure of the progressive effect of the Federal tax system on average earnings. This is the case for comparisons within 1979 and 1980 and of 1980 to 1979 as the only tax law change effective in 1980 was an increase in the social security tax base which was already above the level that would affect such comparisons. When comparing spendable earnings estimates for periods subject to different tax laws, i.e. 1979 to 1978, the percent change in average tax effect reflects both the progressive effect and the effect of the tax law change.
- 3/ Married workers with three dependents who earned the gross average
- weekly earnings. 4/ Less than 0.05 percent.

3.7 percent. (See tables 2 and 3.) The index excludes the effects of overtime in manufacturing and of interindustry shifts, such as the shift of workers between high-wage and low-wage industries.

Explanatory Notes

Spendable earnings are calculated by taking the average weekly pay for all production or nonsupervisory jobs, both full-time and part-time, and then deducting social security and Federal income taxes applicable to a single worker or to a married worker with three decendents who made this amount.

Real spendable earnings represents the buying power of the spendable earnings of a worker earning the average pay and with the applicable deductions, after allowance for price changes from the 1967 base period, that is, adjustment by the appropriate Consumer Price Index for Urban Wage Earners and Clerical Workers. (See Michael Buso, "Changes in the Spendable Earnings Series for 1979." Employment and Earnings, March 1979.)

The earnings series from which spendable and real spendable earnings are derived---gross average weekly earnings--is an arithmetic average of the earnings of all production or nonsupervisory jobs, including part-time jobs. Therefore, it is less than the average weekly earnings of full-time wage earners. It should be noted that the series on spendable earnings represents only the average earnings for those rank-and-file workers whose weekly pay approximates the averages indicated. The actual earnings level of married workers with three dependents tends to be higher than the average figures given above, since married workers with three dependents are generally older and more experienced and thus likely to command higher hourly wage rates and work more hours. Month-to-month and year-toyear changes in actual spendable earnings for this worker might also differ from the average estimates presented in this release.

The Bureau of Labor Statistics has also published data on annual after-tax earnings based on information obtained through the Current Population Survey. These series, which have been constructed for the 1962-1974 period, relate to the actual earnings of heads of households of specific size and composition. For a discussion of these series, see Paul M. Ryscavage, "Annual Earnings of Household Heads," Monthly Labor Review, August 1975.

The hourly earnings index is designed to measure under-

lying wage movements for production or nonsupervisory workers in the private nonfarm economy. It is adjusted to exclude the effects of two types of changes that are not related to underlying wage rate developments: Overtime in manufacturing (the only sector for which overtime data are available) and interindustry employment shifts, such as shifts of workers between high-wage and low-wage industries.

Seasonally adjusted data are preferred by some users for analyzing general earnings trends in the economy since they eliminate the effect of changes that normally occur at the same time and in about the same magnitude each year, and therefore, reveal the underlying cyclical trends. These changes in average earnings may be due to seasonal changes in the proportion of workers in high-wage and low-wage industries or occupations, or to seasonal changes in the amount of overtime work, and so on. The seasonally adjusted data are presented in table 2.

Income tax law changes that become effective during the year may produce misleading year-to-year comparisons of changes in the tax liability from the spendable earnings series. For example, in 1977, the calculation of spendable earnings following the enectment of the Tax Reduction and Simplification Act of 1977 (effective June 1, 1977) concentrated the entire 1977 reduction in the subsequent 7 months. The Bureau of Labor Statistics develops and publishes "annual average" spendable earnings formulas which distribute the impact of tax law changes over the entire calendar year. These formulas should be used to compute year-to-year comparisons in tax liability changes.

For a comprehensive discussion of the spendable earnings series and hourly earnings index, and their relation to other wage data, see the following articles: Jack Alterman, "Compensation per Man-Hour and Take Home Pay," Monthly Labor Review, June 1971; Thomas Gavett, "Measures of Change in Real Wages and Earnings," Monthly Labor Review, February 1972; Norman Samuels, "Developing a General Wage Index," Monthly Labor Review, March 1971; Paul Schwab, "Two Measures of Purchasing Power Contrasted," Monthly Labor Review, April 1971.

Table 1. Earnings of production or nonsupervisory workers on private nonagricultural payrolls by major industry division

	٠ _			Hou	ıriy earni	nas	_			<u> </u>	Spend	able average	weekly ear	ninas ²	
Industry		oss avera urly earn	-		index ¹ 967 = 10	-		iross average sekly earnin		Married wo	rker with 3		⊢	with no dep	pendents
	July 1979		July 1980p			July 1980p	July 1979	June 1980p	July 1980p	July 1979	June 1980p	July 1980p	July 1979	June 1980p	July 1980p
TOTAL PRIVATE: 3 Current dollars	\$6.16 2.81						\$221.76 101.08			\$196.26 89.45	\$205.56 82.95	\$205.33 82.79	\$179.35 81.75	\$188.05 75.89	\$187.84 75.74
Mining: Current dollars	8.54 3.89			267.4 121.9			356.12 162.32			296.71 135.24		317.74 128.12	269.66 122.91	293.14 118.30	287.47 115.92
Construction: Current dollars	9.26 4.22			222.3 101.3			350.03 159.54					309.01 124.60			280.29 113.02
Manufacturing: Current dollars	6.72 3.06			235.2 107.2			268.13 122.21			231.46 105.50		242.89 97.94			222.10 89.56
Current dollars	8.19 3.73			248.9 113.5								292.72 118.03	251.45 114.61		266.16 107.32
Current dollars	5.05 2.30	2.19	2.20	223.8 102.0	97.2	97.7	76.65	71.00	71.64	71.68	65.57	65.99	63.81	58.84	147.11 59.32
Current dollars	5.28 2.41	2,32	2.31		92.1	91.6	87.12	84.70	83.96	78.66	75.47	74.88	71.57	68.88	169.47 68.33
Current dollars	5.29 2.41			226.8 103.4				190.90 77.04							

Adjusted for overtime (menufacturing only) and interindustry employment shifts.

struction; and nonsupervisory workers in transportation and public utilities; trade; finance, insurance, and real estate; and services, Included in this group are approximately four-fifths of all workers on private industry navnulls.

p=preliminary.

Spendable sernings are calculated by deducting social security and Faderal income taxes applicable to a settle; a spendable serning are calculated by deducting social security and Faderal income taxes applicable to a settle; a serial settle of the spendable servings series is available on equest.
Population of the calculation and uses of the spendable servings series is available on equest.

Data relate to production and related workers in mining and manufacturing; construction workers in con-

Table 2. Earnings of production or nonuncervisory workers on private nonegricultural nevertile, sessentily adjusted

			197	79			1980						
Series	July	August	Sept.	October	Nov.	Dec.	January	Feb.	March	April	May	June p	July p
Gross average hourly earnings:													
Current dollars	\$6.17	\$6.22	\$6.26	\$6.28	\$6.34	\$6.39	\$6.41	\$6.45	\$6.51	\$6.54	\$6.57	\$6.63	\$6.65
1967 dollars	2.82	2.82	2.80	2.78	2.78	2.77	2.74	2.72	2.71	2.69	2.68	2.68	2.69
Hourly earnings index ¹ (1967=100):					· ·					1			
Current dollars C	230.8	232.3	234.3	235.0	237.3	239.4	240.3	242.4	245.2	246.2	248.3	250.7	251.3
1967 dollars ^c	105.5	105.2	104.9	104.2	104.1	103.8	102.7	102.2	102.0	101.4	101.4	101.5	101.7
Gross average weekly earnings:				i						ŀ		1	
Current dollars	\$219.65	s222.05	S222.86	s223.57	s225.70	S228.12	s228.20	\$228.98	\$230.45	\$230.86	\$230.61	\$232.71	\$232.75
1967 dollars	100.43	100.52	99.76	99.10	99.03	98.88	97.52	96.53	95.82	95.08	94.16	94.18	94.15
Spendable average weekly earnings ² :													
Current dollars	194.62	196.49	197.12	197.65	199.27	201.10	201.17	201.76	202.87	203.18	202.99	204.59	204.62
1967 dollars	88.99	88.95	88.24	87.61	87.44	87.17	85.97	85.06	84.35	83.68	82.89	82.80	82.78

o-preliminary.

cecorrected.

Table 3. Percentage change¹ over the year in earnings of production or nonsupervisory workers on private nonagricultural payrolls by major industry division

July 1979 - July 1980

		earnings	Gross	average	Spendable average weekly earnings 3					
Industry	inde (1967	× ² = 100)	weekly	earnings	Married with 3 de	l worker pendents	Worker with no dependents			
	Current dollars	1967 dollars	Current dollars	1967 dollars	Current dollars	1967 dollars	Current dollars	1967 dollars		
TOTAL PRIVATE	8.9	-3.7	5.4	-6.8	4.6	-7.4	4.7	-7.4		
Mining	7.4	-5.0	8.1	-4.4	7.1	-5.3	6.6	-5.7		
Construction	6.7	-5.6	6.6	-5.7	5.7	-6.5	5.5	-6.7		
Manufacturing	10.5	-2.3	5.6	-6.6	4.9	-7.2	4.8	-7.3		
Transportation and public utilities	8.1	-4.4	7.0	-5.3	6.1	-6.2	5.9	-6.4		
Wholesale and retail trade	8.3	-4,2	5.6	-6.5	4.1	-7.9	5.1	-7.0		
Finance, insurance, and real estate	8.0	-4.4	8.9	-3.6	7.6	-4.8	7.9	-4.5		
Services	8.9	-3.7	8.8	-3.7	6.3	-5.9	. 7.8	-4.6		

¹ Based on pretiminary data for the current month. Hourly earnings index changes are based on seasonally adjusted data. Gross and weekty changes are based on data that are not seasonally adjusted.

2 See footnote 1, table 1.

Calculated for workers who earned the average weekly earnings.

Senator Bentsen. I'd like to now defer to my colleague, Congress-

man Reuss for any comments he might have.

Representative Reuss. I just want to say that, Mr. Kahn, it couldn't have happened to a nicer guy and I'm glad it was given to you while you're still among the active and I will have some questions later. You swear that you didn't jiggle these figures and that they are honest and true?

Mr. Kahn. I have been trying to jiggle them for a year and a half

without success. I did not succeed this time.

Representative Reuss. OK. I'm proud of you.

Senator Bentsen. Chairman Kahn, we are pleased to have you and you may proceed.

STATEMENT OF HON. ALFRED E. KAHN, CHAIRMAN, COUNCIL ON WAGE AND PRICE STABILITY, ACCOMPANIED BY W. KIP VISCUSI, DEPUTY DIRECTOR

Mr. Kahn. Thank you. I'm delighted to be here and let me introduce

our Deputy Director, W. Kip Viscusi.

Mr. Chairman, I feel today very much like the mythical draftee that we used to talk about when I was in the Army 37 years ago. During the entire period of his basic training, he walked around the camp and picked up imaginary pieces of paper, examined them very carefully, and each time would say, "That's not it," and throw them away. Finally, after 2 or 3 months of that he received a medical discharge for psychological reasons and they handed him his discharge and he looked at the paper and said, "That's it."

I have been looking at the CPI in exactly the same way. Today is

the one time to which I can respond, "That's it."

Two months ago I testified on the May CPI figure and I observed at that time that May was very much like April, that both of them were very much better than the first quarter of 1980, but that the interesting thing I felt was that both were portents of substantially better

results in the months immediately ahead.

It is pleasant for a change to have been right and, even more, to have been right for the right reasons. Our predictions months ago were based on an expectation of a cooling off of energy prices; second, on a recognition that we were getting more help from food than in a sense we deserved or then was good for the economy. Food prices at the farm were going down very, very sharply and almost certainly would turn around, but as you have observed, the turnaround in mortgage interest would more than compensate. That factor, the turnaround of mortgage interest, was the single most eloquent demonstration of the effectiveness and success of the policies of additional restraint that the President announced in March of this year.

I'll supply just a few of the pertinent figures and then go on to the few important conclusions which you of course have anticipated.

The CPI in the first quarter of 1980 rose at an 18.1-percent annual rate. In the second quarter of this year that 18.1 percent had dropped to 11.6. Food had helped us more than we deserved in the second quarter, but that was 5 points. Energy was on a downslide, 8.1, but mortgage interest costs were 55-percent annual rate. The July figure again then is 0.0. Food, however, has now turned around quite properly.

This is, of course, partly because of the unfortunate effect of the weather, but it is more importantly the result of a necessary recovery in prices at the farm. When the July figure was 0.0 annual rate, food was 12.1 annual rate; energy is still on the bottom side of 3.7; but now home purchase, insurance, and taxes is -25 annual rate and mortgage interest is down something like 51 percent at an annual rate.

Now it's hard to imagine anything more satisfying than zero, of course, but what is even more satisfying and more important to call to your attention is the rate excluding that aberrant mortgage interest figure and indeed if you wish excluding food and energy which have been helping us, something closer to what we have been referring to as what looks like the basic, the core, the underlying, much less

tractible rate of inflation.

In the four quarters of 1979, as I pointed out in past testimony, the annual rates seasonally adjusted were 7.5, 7.2, 8.1, 8.6. In the first quarter of 1980, that figure was 12.7, more frightening than the 18.1 because it was more fundamental.

The July figure, taking our mortgage interest; energy; food; and used cars to, since their prices are very much market determined, was 7.4-percent annual rate. The last 3 months, since July could be an aberration of this measure, the annual rate has been 7.9 percent, and I think that's the figure to focus on, on the good side and the bad side; 7.9 percent means that we have now cooled off that expansion of the core rate through the latter half of 1979 and the first half of 1980 and it seems to me this is the important figure. It takes out the mortgage interest. It takes out energy which has been helping us. It takes out food which has been helping us and used cars which has been helping us as well.

I must, however, as you again fully expected, have to observe that while we are at long last out of double-digit rates of inflation, that the extreme exacerbation of inflation that we have been so worried about has gone, at least for the time being, inflation still is a clear and present danger and we must frame our every economic policy in consideration of the fact that the core rate of inflation is probably still at the 9- or 9.5-percent level. These lower numbers are, as you point out, in part, a consequence of recession; they are almost certainly lower than the basic cost structure in our economy; and therefore we still have to deal with a basic rate of inflation which, while not substantially higher than it has been for the last decade—this core rate has been over 6 percent for the last decade—now this 7.5, 7.9 percent is really not substantially different from what it was in preceding years, but nevertheless, it is too high. There is that constant danger of its resurgence if the economy heats up too fast, and resurgence will show up almost certainly first in resurgence of interest rates if we rekindle inflationary expectations, and that of course means a killing of our hope for a recovery of the economy as well.

I can't think of a clearer demonstration point that inflation, if it gets extreme, inevitably means high interest rates and that inevitably means a recession coming, and therefore, that recovery depends on continuing to contain inflation and its unfortunate effect on interest

rates.

Two final observations of warning. One is of course that the record of the Producer Price Index is not quite as good as that of the Consumer Price Index. It, too, has improved. It, too, seems to have moved perhaps below the double-digit rate. We can talk about the July rate in particular if you want to. That was, as you know, frighteningly high. I don't think one should put excessive emphasis on that 1 month. I can give you information on why that's so. In just the same way, though I'm utterly delighted by the 0.0, I wouldn't begin for a moment to pretend that is our rate of inflation.

Second, wage settlements, if anything, seem to be accelerating. Wage settlements in the second quarter of 1980 were probably slightly higher than in the first quarter of 1980 and that means that we are running our basic cost structure at something like a 9-percent or even a 10-percent rate and I'm taking out the short-run decline in productivity that may be the effect of the cycle. Unit labor costs are going up even higher

than 10 percent because productivity is negative.

Now the acceleration of wage settlements is understandable, given the past rate of increase in the CPI, but it builds in a core of underlying rate of inflation of 9 to 10 percent. It emphasizes the vital importance of wage and price restraint, especially in an economy that is in recession when unemployment is increasing, and the necessity again of addressing ourselves-I have never given a piece of testimony before you, Mr. Chairman, in which I have not observed in the end that we have to address ourselves to the tougher long-run questions which hinge around the question of productivity.

Still, I hope you will not begrudge me a certain measure of joy on having a 0.0 rate this morning. That concludes my statement.

[The table attached to Mr. Kahn's statement follows:]

CONSUMER PRICE INDEX [Seasonally adjusted, percentage changes]

	December 1979 relative importance (percent)			3 mo ended 1—					
		July to July	October 1979	January 1980	April 1980	July 1980	June to July		
All items	100.0	13. 2	13. 4	15. 6	15, 9	7.6	0		
Food	17, 7	7.6	7. 9	8.6	6.0	7.4	1.0		
Food at home	12. 2	6.8	7. 2	8.2	4, 5	7.4	1.5		
Domestically produced_	10.0	6. 8 5. 6	5. ī	8. 2 7. 1	2.8	7. 5	i.		
Imported 2	2. 2	12. 5	14. 9	7. 9	17. 2	10.3	1.		
Imported 2 Food away from home	5.5	9, 4	9.5	11.7	9.0	7.5	-: -:		
Housing less tuels 2	40. 4	15. 3	16.7	17. 8	17. 4	9.7			
Home purchase 2	10.4	13, 3	17. 9	15.8	7.5	12.6			
Home purchase 2 Mortgage interest costs	8.7	36. 4	36.0	54. 9	54.0	6.8	-5 .		
Rent 2	5.3	9. 2	13. 1	6. 1	6.5	11.4	-5,		
Energy	10. 3	29. 0	35. 5	35. 9	42. 3	5.7			
Transportation less gasoline	12. 9	7.8	4. 5	12.7	10. 2	5.6	•		
Public transportation 2	1.1	27. 1	26. 7	38. 4	17.0	27, 2	3.		
New cars	3, 7	7.5	.7	8.8	12.7	8. 1			
Apparel and upkeep	5, 1	7. 2	8. 2	8. 8 7. 8	12. 4	°. 9			
Medical care	4, 8	11, 1	10.6	13, 8	13.0	7. 4	•		
Entertainment	3.7	9. 3	7. 2	7.3	14.0	8.6	•		
Other goods and services	4. 1	9. 4	11.2	8.8	8. 4	8.6	:		
All items less energy All items less mortgage interest	89. 7	11.5	11.3	14. 4	12.6	7.8	0.		
costs (MIC)	91. 3	11.2	12. 0	13. 3	12. 2	7.3			
All items less energy and MIC	81.0	8.7	8.6	9.6	9.5	8, 2	:		
Inderlying rate 3	47. 9	9.7	8. 1	10.5	12. 4	7. 9	•		

¹ Annual rates of change

Not seasonally adjusted.

3 Not seasonally adjusted.

3 The Consumer Price Index excluding the costs of home purchase, finance, taxes and insurance; and food, energy and

Source: U.S. Department of Labor, Bureau of Labor Statistics, and the Council on Wage and Price Stability.

Senator Bentsen. Thank you very much, Mr. Kahn.

I looked at the substantial preponderance of my Democratic colleagues here as related to my Republican colleagues and I wonder if

that relates to the good news this morning.

Mr. Kahn. I'll leave that interpretation up to you, Mr. Chairman. Senator Bentsen. There's a school of thought that says that the expected rate of inflation is a major determinant of interest rates. Now we have seen a substantial reduction in the rate of inflation over the last several months, but recently interest rates have begun to climb.

Do you think today's figures are going to help bring down interest rates or are there other things that are more important that determine

the inflation rate.

Mr. Kahn. I think that the inflation rate is fundamental. I think that the financial markets may well shrug off a 0.0, recognizing the preponderant influence of declining mortgage interest rates. I think they will have greater difficulty shrugging off this clear decline in the residual, even after you take mortgage interest out; the fact that for the last 3 months, with mortgage interest out, you're talking about 7.5 percent. If you take out energy and food and everything else, you're talking about 7.9 percent. So I think this will help to hold interest rates down. But an economy that has been burned by accelerating inflation that we had for the last 2 years is very, very nervous, and it appears that just the evidence of a sharp increase in the rate of growth of the money supply was enough to turn the mortgage interest rate around.

I must say that I'm concerned as to what the financial markets' reaction would be to a \$40 billion calendar year tax cut. I know that's a complicated issue and, as you know, the President has not yet stated his own program, but the emergence of the \$39 billion figure, and the apparent understanding that the chairman of the committee will support some additional cuts on the floor, while I'm not a social psychoanalyst, I'm worried that people may feel that we may be excessively inclined to declare victory on the inflation side, however much the enormous merit of a lot of the elements of the tax cut are.

Senator Bentsen. Let us address that some. What we have seen with the CBO figures is that, next year, you're going to have \$86 billion in increased taxes at the Federal level and another \$30 billion increase in taxes at the city and State level. So you're going to have a situation of well over \$100 billion in increased drag on the economy.

Now what the Finance Committee has done is stay within its guidelines and its target; the \$25 to \$30 billion in tax cuts on a fiscal year basis, and \$39 billion on the calendar year basis. Actually, it's just a moderation of the increase in taxes and a substantial part of that tax cut is to try to increase productivity in this country, which this committee has been concerned about for some time.

One of the ways that you beat inflation is by having more efficient production, putting more goods on the shell at a cheaper price, by having better tools in the hands of American working people. Now that is the goal of a substantial part of that tax cut and that part of it at least this committee I would think from its previous reports would be encouraged by. You at COWPS have been recommending that type of thing for some time.

Mr. Kahn. That's correct, Mr. Chairman. We have never had any disagreement between us on the desirability of reversing that longrun productivity trend. I have always cautioned that the issue was one of timing and particularly in light of the inescapable effect of the recession on the budget, in any case, with all the automatic stabilizers, and also we have cautioned about the dangers of trying to enact a tax cut on a very short notice before November 3. I'm not anything like the principal developer within the administration or exponent or spokesman on the question of fiscal policy and the tax cut. As you know, the President has emphasized caution. You point out that there are parts of the tax cut, important parts, which are productivity oriented. I think there's a fear that other things will get attached to it in haste and I'm merely repeating what the President himself has said. I don't have an independent judgment on that.

The President will be speaking, as you know, within the next few

days on that subject.

Senator Bentsen. I'm going to ask that the members limit their first round to 6 minutes since I'm now at 5 minutes and I have one more

question.

Mr. Kahn. I think it's terribly important how we proceed, too. I'm also fully aware that some other things may be added on the floor and it is ever so. But I also know that when it finally gets to conference many, many of those things are then dropped to put it back within the confines of what one would think should be done. As a member of the Finance Committee, let me say I have never seen much difference in the pressure on a tax bill, regardless of when it is offered, and I have all the scars to prove it. There is always intense pressure on any kind of a tax cut that's brought up, be it before or after an election.

So I believe a tax bill can be structured that will help moderate the increased drag on the economy that's brought about by \$86 billion in

additional taxes.

I would like to turn to my colleague, Representative Reuss, and I will take people in the order in which they appeared.

Representative Reuss. There's a vote in the House. Do you want

to make the vote?

Representative Heckler. Yes, I do.

Representative Reuss. Why don't you go first then. Representative HECKLER. Thank you very much.

I'd like to say, Mr. Kahn, you have good news and bad news. The good news is the zero growth in the inflation rate as measured by the CPI, and that is good news. The bad news is the 22-percent increase in the Producer Price Index announced last week, and that is very serious and very negative news.

What I'd like to know is, What is the delay in impact between the announcement of a substantial increase in the Producer Price Index and the Consumer Price Index? That was the largest monthly increase in 3 years. What is the time gap between the identification of

that increase and the impact on consumer prices?

Mr. Kahn. I would like to say one thing about—forgive me, this is not directly responsive and I will try to respond—about the 1 month. The Producer Price Index jumps around quite widely. It was, as you

say, 22.3 percent in July. It was at a 13-percent rate in June. It was at a 2-percent rate in May. So that I do feel it's quite important that we not overemphasize the single month. That's why I tried, even in my good news testimony, to use 3-month averages.

Representative Heckler. But that trend is even more alarming,

from 13 to 22.

Mr. Kahn. Partly, it's because of the effect of food. Partly it's very heavily influenced by automobiles and that is very heavily influenced by an erroneous seasonal adjustment. It's just one of those crazy things in which the automobile manufacturers have changed the timing of their announced price increases and the seasonal still has the old months. So instead of seasonally adjusted, it's 2.2 percent, which takes you way over 25. The raw figure is 1.4 percent, but the critical thing, if you take the last 3 months, automobile prices annual average rate of increase is 9 percent at the wholesale level, which is within our standards.

As I say, I do honestly believe it's very mistaken to just take those 3 months. I could take the preceding 3 months and have it below. On the specific question, Kip, I don't know if you have any feel-

ing on that.

Mr. Viscusi. First, on the cars, let me just add that one problem with the seasonal adjustment is that the procedure is based on what the prices have been over the past 5 years.

Representative Heckler. I'm asking what is the time gap between the announcement of an increase and the impact on the consumer

prices.

Mr. Viscusi. It depends a lot on the component—

Representative Heckler. Let's discuss food. That's going to be a major consumer concern.

Mr. Viscusi. That would be fairly rapid.

Representative Heckler. By fairly rapid, would you say next month?

Mr. Viscusi. Within the quarter I would say.

Mr. Kahn. We have seen a number of projections made very recently in food prices. The general expectation is that food prices will be increasing in the latter part of the year at something like a 12- to 14-percent annual rate. They have, of course, been increasing much less than that in the last 12 months. I think it's only 6 percent. The expectation is that, therefore, that will take the annual figure up now to 9 percent. It's kind of a middle number. And in fact, we are already seeing it in food. Food prices at the farm, for example, even in the CPI-farm value of food had been going down in the first months of this year at annual rates of 35 percent, 14 percent, 11 percent, 51 percent. Then it began to turn around and farm value of foodthis is CPI-in May was up 35 percent annual rate, in June up 71 percent, and in July up 95 percent. That did not show up, however. in food prices rising more than the CPI until this month. So there may be as much as a 2-month lag, but that's just a guess. We expect the food prices in the next few months to go up considerably more rapidly than 10 percent.

Representative Heckler. So, the CPI will be rising next month

because of the food increase?

Mr. Kahn. Well, I wish that I could predict that it will not rise above 0.0 percent. Our best estimates—and Mr. Viscusi presides over these estimates—are that the CPI, as I predicted a few months ago, will remain markedly below the double-digit level for the next few months with these offsetting values. We expect food to continue to be up. We expect mortgage interest, energy, and the general residual to be below the double-digit range.

Representative Heckler. But it seems that since the mortgage interest rates are rising, that too will be a factor which will indicate an

increase in the CPI?

Mr. Kahn. Yes; Mr. Viscusi is an expert on that, but that's going

to lag several months.

Mr. Viscusi. Let me say that in the mortgage interest component there's roughly a 1-month lag from the time it goes in. What we're seeing in terms of the July CPI is the decline during June, particularly the first 5 days in May to the first 5 days in June. So, for the comparable period, that will go into next month's CPI. It's coming at a contracted rate of interest at negative 4 percent. So, overall, we would expect the mortgage interest component would be negative, maybe minus 3 percent, next month as well, and then the following month you will see a flattening out.

Representative Heckler. I'd like to say that I don't think you have any need to fear that there will be opposition to the fight against inflation. I don't think anybody in America or Congress feels that we have licked it. And while this month's report is more optimistic than what we had in the past, the forthcoming increase and bulges in the Producer Price Index increase certainly are alarming and give us

great reason to be further concerned about fighting inflation.

Mr. Kahn. I think we must continuously be concerned about it, as you say. One of the few encouraging aspects of my job is making people recognize it.

Senator Bentsen. Thank you very much, Congresswoman Heckler.

Congressman Reuss.

Representative Reuss. The optimist sees the doughnut, the pessimist sees the hole, as somebody once said, and we on this side, of course,

are optimists by nature. We have to be.

You were propelled to greatness this morning, largely by interest rates, and I want to keep you on that Matterhorn you have now ascended. Everything was great in July, now Chase Manhattan has raised the prime rate; and the lead headline in the Wall Street Journal this morning is: "Rising Interest Rates Hurt Housing Again, Boding Ill for the Economy."

In my judgment, you said it all a moment ago when you said—and I jotted it down—that restraint is especially necessary when the economy is in recession. Now I see no reason under the Sun why the major banks have any excuse in this recession to raise their interest rates,

prime or anything else.

You have as much jurisdiction over interest rates as you do over anything else—a mighty power of suasion is what it amounts to. You were respected before today and you're going to be defied for at least

a few days. I encourage you to use this position of strategic strength to call together the Nation's 20 leading banks and ask them as a patriotic matter not to increase their interest rates in this recessionary period; point out that increases in interest rates may well give away the inflationary gain; and that the best way you can think of to impel fiscal prudence on the Congress, either in spending or tax reductions, is by a reasonable interest rate structure; point out that the too little money supply flurries which are used as an excuse by the banks to raise interest rates don't, in your opinion—if that is your opinion, as I hope it is—justify increasing rates. One was due to social security checks floating around. Another, yesterday, is because the Fed has engaged in one of those 5-day buy-backs of securities; it doesn't alter the money supply at all, but money markets are using that as an excuse to raise the rates. Point out to the major banks that if they would cut down as the Fed asked them to do before it went limp some months ago on loans to the Bunker Hunts for commodity speculation, loans for the greatest rash of corporate raids and takeovers we have had in some time, and excessive foreign lending, they would then be able to lend at reasonable interest rates and without increasing them to productivity enhancing investment. Expanded investment is the last best hope of getting us out of this inflation.

So is there anything to prevent you, whom I have so much confidence in, from doing unto the banks what in other days you have done unto big steel, big autos and other powerful people, and isn't

now the time $\overline{?}$

Mr. Kahn. I'm hesitant to respond off the cuff. The reason that we have made no such efforts to approach voluntary restraint in interest rates over the last year and a half or more is that we have tended to regard the prices in that market as being determined essentially by

the forces of demand and supply.

Now, as you have pointed out very powerfully, the market is an imperfect one and there is a good deal of stickiness in the prime rate. I think we have expressed some concern at the slowness at which the prime rate went down in the April, May, and June period, but I am, despite that, quite worried that an attempt on the part of the people concerned with inflation to jawbone interest rates might really be

counterproductive.

I get letters from people almost daily saying the way to solve your problem is just to decree reductions in interest rates, and I have taken the position—which I think is professionally the correct one—that the high interest rates from which we have suffered in the past are far more intelligently looked at as the consequence of inflation rather than something that can be remedied by administrative fiat; that they are the consequence of the highest, almost hysterically insatiable, demand for credit in which circumstances there would have been nothing the Government could have done to hold them down except to expand credit. We can get to the selective aspect of it you referred to and, as you know, I'm very sympathetic to that, and any attempt to hold interest rates down, given that inflationary expectation, would only have pumped up the money supply. It would have been self-defeating because it would have meant that you had even more hysteria, more people buying houses at 16-, 17-, and 18-percent mortgages.

I'm worried that an attempt to correct what may really be an uniustified administered temporary increase may be more harmful than

helpful, and I would welcome your reaction to that.

Representative Reuss. I will react on the next go-around. Let me just round out my 6 minutes by saying, of course, I'm not suggesting for 1 minute that you or anybody else should lean on the Fed to crank up the money supply. We—Senator Proxmire and myself and others—have been very pleased with the fact that the Fed has not exceeded its targets. We want that to continue. But within the given quantity of credit, there is composition, and I can't see where the Nation has benefited when, as in February, 10 percent of new lending went to the Bunker Hunts to speculate in silver.

So I would think putting on your microeconomic hat might enable you to continue on that path to greatness which I see you now treading.

I'll be back.

Mr. Kahn. I'm reminded about what happened to the other czars in the same way I'm reminded of what happened to the last czar in

1917, which happened to be the year in which I was born.

I am, of course, very sympathetic. I guess I have been released as the member of the administration on the question of desirability of trying to influence the allocation of credit. I'm not sure Senator Proxmire was entirely happy with that, but I have felt that if we feel we should, by Government policy, alter the utilization of our resources between consumption and investment, for example, and are willing to use our tax system for that purpose, then that really recognizes that there are certain allocated decisions which are not necessarily made in the best public interest by markets. Certainly the allocation of credit for speculative purposes I think is of questionable value and, as you know, the Fed did move at least modestly in the direction of trying to discourage some of those kinds of loans that you're talking about, and they did so with my enthusiastic support. I don't mean to have the last word.

Senator Bentsen. Senator Proxmire.

Senator Proxmire. Mr. Kahn, this is indeed good news. It's good news, however, as you pointed out very properly, which is the result to some extent of a peculiarity in the Consumer Price Index which you have criticized again and again. You have said this exaggerates the inflation, that it did exaggerate the inflation in previous months, and

now it's understating inflation rather severely.

The housing component of the Consumer Price Index constitutes, I understand, about 45 percent of the entire category, and for that reason this change—and it's not only the fact that the housing component dropped, but that it dropped when it had been so high in the preceding month. In June, there was a 1.8-percent increase in 1 month and in July it went down 0.7 of 1 percent. It was that turnaround, that vast turnaround, that makes this surprising, if not shocking, difference.

Inoticed that every other component, with the exception of "others," which I take it is the smaller one, went up. Food went up; apparel went up; transportation went up; medical care went up; entertain-

ment went up over the preceding month.

Mr. Viscusi told us that he would expect that the same influence would be felt in August; is that right?

Mr. Viscusi. Not to the same extent, but it would still come in negatively.

Senator Proxmire. Still come in negatively?

Mr. Viscusi. Right.

Senator Proxmire. So what we get in September—the CPI—is likely to be also to some extent perhaps, at least in my view, an under-

statement of the inflation rate.

Mr. Viscusi. Right. There's also been a dramatic change in the home purchase price component which also is a moving average. This is a 3-month moving average. So for this to drop down to 0.5 after 3 consecutive months at 1 or higher means we had a major drop this month.

Senator Proxmire. Did you say that would also be reflected in September or perhaps in September?

Mr. Viscusi. This would be part of the weighted average.

Senator Proxmire. So everything we get before the November election will tend to hold down the CPI below what it would be otherwise.

It's a very happy kind of situation.

Mr. Kahn. Just one factual point, Senator. I don't think I want to make a case that the kind of "all other" items went up more in July than June. If you take out those volatile ones—that is, energy and food and—

Senator Proxmire. I'm reading right down the line. Food went up, apparel went up, transportation went up, medical care went up, entertainment went up. They all went up except "other goods and services" which is the catchall category which apparently are minor items. Is that right?

Mr. Kahn. I would have to add the residual went down from 0.7 to 0.6 from June to July and I'd have to go through it to see why, but I see declines in rent, declines in imported food. There's a variety of declines in other goods and services, which you point out is a rather

large category.

Senator Proxmire. That can certainly be the case, depending on the

weights given to each of these.

Mr. Kahn. Exactly. I'd have to say it's kind of-

Senator Proxmire. While we have good news—at least apparent good news on the housing front—the news already been brought out in the food area is not good and the Producer Price Index and all the other indications are food is likely to increase more sharply in September and October. Is that correct? August, September, and October?

Mr. Viscusi. We have already started to see some of the increase in meat, poultry, fish, and eggs. That component had been working negatively for us for 3 consecutive months and now it's a positive

force

Senator Proxmire. It's increased more?

Mr. Kahn. The increases have been enormous already.

Senator Proxmire. But you gave fantastic statistics about how the annual rate of increase in food prices are 90 percent in the latest month.

Mr. Kahn. I gave you the value at the farm. That's the latest month. Senator Proxmire. That's passing through so that in the next 3 or 4 months it will go up. How about gasoline prices; they declined last month. What's the outlook for gasoline prices?

Mr. Viscusi. They are expected to remain fairly flat for the next

coming months.

Senator Proxmire. Let me ask you, Mr. Kahn, because you're the chief inflation fighter, what in your best judgment, being as objective as you can, is the Government really contributing to anti-inflation right now, anything in the fight against inflation?

Mr. Kahn. Well, I certainly think that the monetary policies of the last 4 months have been a major contributor to the fight against infla-

tion. Obviously they have had an unfortunate-

Senator Proxmire. You're response I believe in responding to what Representative Reuss asked was you indicated you felt the market forces which are the product of what the Fed does resulting in increases in interest rates, so the monetary policy I think in the long run is correct and I strongly support it, but I think that the price you pay is a rise in interest rates as you begin to recover or the recession levels off; isn't that right?

Mr. Kahn. That's right, but it's always kind of which is the more powerful influence. I thought your question was in what ways has gov-

ernment policy contributed to the fight against inflation.

Senator Proxmire. That's right.

Mr. Kahn. I'm sure you would agree with me in the last 4 months monetary policy has made a very powerful contribution to the decline

in the underlying figures.

Senator PROXMIRE. My time is about up. It's interesting that you say monetary policy. What would happen if we abolished COWPS? I have been defending COWPS, but it's been under a lot of criticism. Many people say the wage and price incomes policies that you follow had their principal effect in the first several months or so. If we abolish COWPS, in your judgment, would it make any significant difference in the inflation fight?

Mr. Kahn. It's very hard for me to estimate the present degree of effectiveness of COWPS. It certainly remains the case that so far as we can tell the majority of the big companies in this country continue to be concerned that they not be identified as violating our standards. I can't tell you truly at the moment to what extent wage settlements are more influenced by market developments than they are by the COWPS standards, but I think that I, myself, would be very concerned about

an elimination of wage and price standards.

Any kind of standard to which business can hark, to which we can allude in trying to jawbone, without substituting anything for it, that's my point. I'm not saying that this present program is one for the ages. On the contrary, the life of programs like this is very, very short, but I find it unthinkable that we would not try to put something in its place, particularly when we have prices continuing to go up. Good Lord, look at the automobile industry and what's happening to it, and yet automobile wages are going up more than the average with settlements above the average. Automobile prices marching up and up in the face of declining demand. Even though I cannot say to you that what we are doing now is having a major effect, I find it unthinkable that we would be denuded of any kind of instrument of incomes policy in the years ahead.

Senator Proxime. My time is up.

Senator Bentsen. Congressman Mitchell.

Representative MITCHELL. Thank you, Mr. Chairman.

It's good to see you again, Mr. Kahn.

Mr. KAHN. Thank you, sir.

Representative MITCHELL. I want to share the good news of no increase in inflation with the 8.2 million people who are unemployed. I think we need to get the word out to them and I guess they would be so ecstatic about this news that they would switch over from the cheapest cuts of hamburger to filet mignon. They will stop drinking the cheapest beer and maybe get some Chateaubriand. Let's get the word out to them that a miracle has been accomplished. We have stopped inflation temporarily and their lot is better. I'm being facetious.

What can we do to stimulate the economy to help 8.2 million plus people who are out of work, some of whom are running out of unemployment benefits and other reserves that they have had? It is not possible to come up with some kind of stimulus to assist these people with-

out triggering another round of inflation?

Mr. Kahn. It is not in my nature, Congressman, to be cagey, but we are as you know actively in the process of a discussion with the President to answer the question of what can we do. I'm not sure I would use the words "to stimulate the economy."

Representative MITCHELL. Relieve their plight?

Mr. Kahn. Sure. I'm not quarreling about words. It's simply that I think a mere repetition of the past history of stimulus of aggregate demand just promises a repetition of this dreary cycle we have been through. Certainly the intensity of that problem is in our minds all the time and the President, as far as I know, next week will try to present a plan that will relieve these severe difficulties and set us on the road to, over a long period of time, a renewal of economic growth, a reduction in unemployment, which won't just immediately start shooting interest rates up and just turn housing down and turn investment down. And I feel really it's almost improper of me to try publicly just in these few days before his speech to anticipate things that will be in it. I apologize for that, but—

Representative MITCHELL. No need to apologize. I might apologize

for my next question. Have you had any input into his speech?

Mr. Kahn. I have had some, yes. I have had less than in the past, for a combination of reasons, some of which are purely personal, but also because in the nature of the event the task is now one of fiscal policy which more intimately and necessarily involves the Secretary of the Treasury and the Council of Economic Advisers.

Representative MITCHELL. One last question along that line. Did you tangentially or peripherally refer to the plight of the unemployed in

your inputs into the President's speech?

Mr. Kahn. Absolutely; absolutely.

Representative MITCHELL. Interest rates—this has been referred to by my other colleagues. My estimate is that they are going to continue to rise unless there is the kind of intervention by you and others which Congressman Reuss alluded to, unless there's strong intervention,

strong jawboning. Absent that, what's your prediction on the increase in interest rates? Absent intervention on the part of the President and

you and others to try to pull these interest rates down?

Mr. Kahn. I think any answer I give you would not be worth very much. I'm not a principal person involved or even anything close to it in monetary policy. I do, like Congressman Reuss, I think, regard the present upward blip as in some degree an aberration. I think that the Federal Reserve System, quite properly, will continue to try to limit the growth of the money supply. It is conceivable there was overreaction. It's not something that I can evaluate to that short-term increase in money supply.

Representative MITCHELL. Generally Congressman Reuss and I are in pretty good agreement on most issues. I'm not at all sure that the

sudden upsurge in interest rates is a temporary aberration.

Mr. Kahn. Well, the lesson I draw from it, and it's obviously not the only lesson but the one that's pertinent from my standpoint, is that it demonstrates to me again that that monster of inflation and the fear of its renewal is right there just beneath the surface, and it is in fact a strange phenomenon that you have an increase in the money supply with an increase in interest rates as well. If you stop and think, it seems to defeat logic. An increase in money supply would have the effect of holding down interest rates, but the effect on people's expectations is so powerful now that people look at that and say, "Oh, my Lord, that's going to set off inflation. I'd better go in and borrow more." So we have to devise a set of policies that address themselves, of course, to the fiscal drag to which you referred, but offer some promise that they are also trying to solve a long-run problem and to permit growth in the economy. These policies, however, should not be along the lines of just saying let's hold down interest rates and the only way I know to do that is to gin up the money supply and increase consumption spending across the board. I think our programs for relief have got to be much more targeted and much more restrained than they have been in the past.

Representative MITCHELL. My 6 minutes have flown. Maybe I can

get in some more questions later.

Senator Bentsen. Mr. Kahn, I'd like to ask you about homebuilding. Homebuilding really ran into a disastrous slide and went throughout the economy with a great deal of unemployment. Now we have a modest recovery start. I'd like to talk to you about the young couple that wants to buy their first home. All of a sudden they saw interest rates going down and it began to be within their reach to buy that new home. In recent weeks I have seen the California savings and loans raise their mortgage rates from 11.5 to 13.5 percent and I have seen the VA and FHA raise their maximum interest rates from 11.5 to 12 percent. What does that mean to that young couple trying to buy a home and what do you think that means to homebuilding now?

Mr. Kahn. Well, surely, if mortgage interest rates either continue to rise or remain at 13 to 14 percent, when there was some promise not long ago of their being 11 or 12 percent, we very much fear that it will abort what seems to have been a modest but nevertheless real recovery in home construction with the rather sharp increase

in housing starts—seasonally adjusted—in June and a more modest one in July. That young couple has suffered in recent years from a lot of things, but among others, the fact is that they have been competing for funds and for homes just as they would suffer if they were competing for jewelry or for gold. They have been competing with a speculative demand fired and fueled by an expectation of inflation.

I don't know any way of helping those people except by doing what we can to dampen those fires. Obviously the 13- to 14-percent mortgage

rate right now will undo some of the good we have seen.

Senator Bentsen. It certainly will and it will slow down housing starts and put that home more out of reach for those young couples.

I'd like to talk about energy and what's happening there. Now we have seen speculators in oil, oil brokers betting on the outcome and making fortunes out of it. All of a sudden we have seen the spot price of oil drop. We are seeing tankers stand offshore because they find the tanks onshore full and no place to deliver oil. We have seen some price moderation.

What do you think we are facing for the rest of the year insofar as

energy prices?

Mr. Kahn. I have to rely on what the Department of Energy is predicting; it has been reasonably accurate over the last 6 to 9 months. They expect energy prices to be relatively stable in the next couple of months and then move up modestly as we move into the fall and winter months with the continued increase in the gradual deregulation of the price of oil but not operating within a very wide range.

Senator Bentsen. What is the status of our current supplies of oil

that's available in tanks for heating oil and the rest of demand?

Mr. Kahn. My understanding is that we still have very, very high inventories. In fact, it was the accumulation of those very high inventories over the last year, often again speculative and powered by the fear of shortage when in fact oil production increased, that imparted such enormous upward thrusts to oil prices from which we have suffered so badly. The supply situation is very good unless there is some major interruption in the Middle East. That is the basis for the expectation and we have a very moderate behavior in the months ahead.

Senator Bentsen. Knowing my colleagues want another round, I

will cut mine short. Congresswoman Heckler may proceed. Representative Heckler. Thank you, Mr. Chairman.

Mr. Kahn, I'd like to go back to the young couple that Senator Bentsen mentioned. Really, the young couple in America hasn't been able to afford a home for quite some time as the average home price in Massachusetts is \$72,000 and at a recent hearing in Boston we learned that it took three or four incomes—a husband and wife both working and one or two moonlighting to acquire the downpayment for a new home. So that the dream of homeownership for a young family is becoming the impossible dream. It would seem that while our interest rates have been reduced and now would seem to be edging upward again that there's not been a substantial increase in housing purchases for many reasons—the whole weak economy, the fear of recession, the question of unemployment—very few people who are marginal buyers are going to go into the housing market. And yet the housing component of the CPI is at 45 percent.

Now with very few people able to buy a new home each month, is this the correct weight to be given to the housing component? And second, what are we going to do about a true increase in the development of housing and making housing affordable for young

people in America?

Mr. Kahn. The first question relates to the way in which the CPI is constructed and the fact that it imparts some upward bias because the CPI is the price of a market basket of goods in portions that were bought several years ago, therefore, of course, there will be a tendency for the current distribution of purchases to be somewhat less. The measurements of that that have been made in the past tend to say that we are talking about maybe one-tenth of a point per year over 10 or 15 years. It's not a huge influence. I don't have any doubt that over the last year there's been some exaggeration of the increase in the cost of living for that reason—the slightly mistaken composition of the CPI.

By the way, also, that distortation in the mortgage interest rates now, even though homes are larger, is so important that it has outweighed the effect of this question of the adequacy of the competition of the market basket.

The more difficult question is your second one. What can we do for the young couple that has suffered a loss of their dream of home-

ownership.

There's no way that I know of combating inflation without some restraint. That restraint is in some degree unfairly distributed, but there is no restraint more unfairly distributed than what happens as a result of inflation. Inflation is erratic and cruel. You should see the letters I have gotten over the last year from people who are

trying to live on fixed incomes, retirement.

One aspect of the chronic source of inflation we have is that this year's dream of material possessions has always been higher than last year's. What is regarded as an acceptable home today is so different from what was regarded as an acceptable home 25 years ago that they are almost two different commodities. Its average size is up 70 to 75 percent. Its average lot size is up 85 percent. I have used this figure before and I apologize, but in 1950, less than 4 percent of the houses had two or more bathrooms. Now it's over 70 percent. But yet here's an economy that has suffered a decline in the rate of increase in productivity and then over the last year and a half an absolute actual decline. It has suffered a decline in the energy productivity and has been subjected to exploitation by foreign suppliers. Such an economy is simply not able to satisfy everybody's dream of last year plus 3 percent, which is kind of an historic fact.

I don't mean to sound hardhearted or nonunderstanding, but there's bound to be some suffering, and all I can ask myself is to the extent I influence Government policy, is it disproportionately borne by people that can't afford to buy? I have to worry about people who are really poor and living on small fixed incomes and under those circumstances I'm not sure that Government policy at this time ought to try to help young couples, regardless of income, to compete in the market for a good that everybody seems to think is a good hedge against inflation. As I say, we have to be selective. I can easily solve that problem and

say that the Government could subsidize everybody that wants to buy a house. The variable mortgage rates will help to some extent, introducing changes in the pattern, but I'm not sure that's the proper thing for me to worry about as being our most serious inflation problem.

Representative Heckler. Unfortunately, my time has expired.

Mr. Kahn. I'm sorry if I used up your time.

Representative Reuss. Mr. Kahn, let me return to my urging you that you perform an interest rate "Alamo" and draw a line in the dust with your toe and say let interest rates stay, as long as the recession lasts, at no higher than the July level. I think that would be useful because the leaching out of inflation in July gives you a fulcrum from which to do bold things and I frankly can't see the slightest difference between the sale of money and the sale of anything else, and if COWPS deserves to exist, which I believe it does, because fiscal and monetary policy alone are not enough and we need a microeconomic anti-inflationary policy, I should think COWPS' concern would apply to the price of money equally well. Nor do I think that you would be justified in leaving it to the Federal Open Market Commitee. They, after all, are 5/12ths banker elected and you can't expect them to display the zeal that an independent agency would be likely to display.

I think you made—although maybe I do you an injustice—a point in resisting my urging to greatness before. I think you made a point that there's a great rash of demand for bank loans. In fact—and I have here the monetary report of the Federal Reserve Bank of St. Louis—whereas bank lending on a month-to-month basis last February and March did increase in those Bunker Hunt days at the rate of 21 percent a month, lately it's been going down, and the latest figures show that bank loans are off 14 percent over the last couple of months.

So if you take into account the fact that July was a good benchmark month showing what could be done, if you take into account the fact that bank lending demand is not hyperthyroid, if you take into account the fact that the composition of bank lending is what's really important, tell me straight out why don't you make your views known to the banking community and ask them as a patriotic matter to resist inflationary loans of which they have made plenty in the last year, and instead concentrate on inflation-fighting, productivity-increasing lending? That's the basis of your pitch to everybody else—labor and business. What is there about bankers that makes them sacrosanct?

Mr. Kahn. Well, insofar as the specific answer to your question is concerned, I don't think I have anything to add to what I said before. There is something different about my suggesting to automobile companies that at a time when the demand for their cars is 25 or 30 percent below a year ago that they ought not to exert such market power as they have and increase their prices—and you can hardly argue that the increase in prices had anything to do with supply and demand. But there is at least a different situation in money markets and a much greater danger of publicly seeming to try to change the price. It's comparable to my saying—suppose I try to jawbone farmers. I know this is a less perfect market—beef—but I remember the time when beef prices were increasing sharply and I said it's been very painful but we must not try to do anything there. On the other hand, it's because of that perception and danger of what the psychological effect

would be that any interventions I might make, at least at this stage, ought to be purely private and exploratory and I take your suggestions

very seriously.

Representative Reuss. Jawboning farmers, of course, I would agree is irrelevant; but coming out as you have, I believe, for a close look at the old Brannon plan which tried to support farmer income rather than farmer prices seemed to be something you could well do there.

Mr. Kahn. Yes.

Representative Reuss. And again, I think jawboning of bankers—please be reasonable—wouldn't get you very far. I'm not advocating that. What I'm advocating is a close look at the composition of their portfolios. After all, the Fed did that last October 6. It's unfortunately gone limp and I tried to give you some of the reasons why that is what's likely to happen when the Fed takes on the banking system, but you don't have their impediments.

Let me raise one other related matter. One hears from members of the Fed occasionally that they may think it's necessary to raise interest rates and to tighten money over and beyond what they think is necessary for domestic inflation fighting, in order to protect the interna-

tional dollar.

Now protection of the international dollar results in our having to pay lower prices on imports, raw materials and manufactured goods, not themselves denominated in dollars, and has something to do with inflation of course, but have you ever made a cost-benefit study, of where the greatest good lies? Is the inflation helped by raising interest rates through tightening of the money supply to the point where men and women are thrown out of jobs, and to the point where the cost factor of higher interest rates ruins the housing market, ruins capital investment? Is that outweighed by the slight price advantage we get in a firmer U.S. dollar? I would think that you could do a useful job by running that one down and then informing our friends at the Fed of your conclusions, because as it is now they are enabled to get by with this shibboleth about "We must protect the dollar," and I'm wondering if they really are on the right track.

Mr. Kahn. It's a question of such cosmic import that I don't pretend I can give you an adequate answer. I suspect, however, that the answer will vary from circumstance to circumstance. The times at which I have been in some degree involved in tightening of monetary policy with an eye to, among other things, the foreign exchange value of the dollar—two major incidents which I have been involved with were back in November 1978 when you may remember there was a rather dramatic announcement, and then in March 1980. In the first case, the flight from the dollar, and, in both cases, the acceleration of inflationary fears, were so great that defending the foreign exchange value of the dollar was clearly a necessary complement, in my opinion, of fighting inflation; and therefore, I believe in both cases we made proper—"we" is really presumptuous but I was involved to some

degree—the proper balance estimate.

So I think probably there's no way of making one statement about the cost versus the benefits that applies at all times. My first book was on the balance of payments of Great Britain, and the best thing that ever happened to the British economy was the devaluation—giving up that fight to cling to gold—and the devaluation that took place at a time back in September and October of 1931. I believe the devalua-

tion of the American dollar in the 1930's was helpful.

On the other hand, I think the devaluation that took place in the early 1970's really was a mistake. I say that with benefit of hindsight because it was in a time when we had a very, very chronic inflation problem and you couldn't distinguish between defending the dollar internally from defending it externally. We may be in a somewhat different situation right now.

Representative Reuss. I think that's a very useful answer, because you have said "each tub on its own bottom," and in season and out of season you don't always have to defend the dollar, so to speak, by

raising interest rates.

Senator Proxmire. Mr. Kahn, you're Chairman of the Council on Wage and Price Stability, COWPS?

Mr. Kahn. The Council, yes.

Senator Proxmire. Well, as you know, that agency's life expires on September 30. This is August 22. It's passed the Senate and it has not passed the House, as I understand it. It passed our body and we reported it out. It would seem to me that the credibility of your agency of COWPS is absolutely essential. In other words, if the workers in this country and the businessmen in this country don't feel that COWPS has clout and force and effect it can't be effective. It's the belief that is so important.

Can you give me two or three specific cases since the Mobil Oil situation where COWPS has taken an action to hold prices down and

it's worked?

Mr. Kahn. My inability to rattle off the 10 or more that have taken place since Mobil Oil is a consequence of the fact that I have been busy with a grandchild and other personal endeavors of that kind. We would be glad to supply you with this.

Senator PROXMIRE. I just want to know the most conspicuous examples of that because I think we should know that and be able to

point to your successes.

Mr. Viscusi. In the petroleum area, for example, Citco, Cities Service, and Kern County Petroleum. The total of corrective actions in

petroleum companies from——

Senator PROXMIRE. What was the effect there? What was the difference between what would have happened without COWPS and what happened with it?

Mr. Viscusi. Both of them combined were \$15 million.

Senator PROXMIRE. Roughly what?

Mr. Viscusi. \$15 million.

Senator Proxmire. Can you tell us what the price difference was as far as the consumer is concerned in paying for gasoline? Can you translate that?

Mr. Kahn. In the case of Mobil, what it came to—and this is comparable in terms of size of the companies—it came to something like 3 cents a gallon for 90 days. I mean, you understand we're dealing at the margin.

Senator Proxmire. I understand and I'm trying to elicit more. Can

you give me another example?

Mr. Kahn. We had a couple in the hotel field. I want to be careful—Holiday Inns was one. I'm sorry; I can't tell the other.

Senator Proxmire. For the record, give me what you can.

[The following information was subsequently supplied for the record:]

EXECUTIVE OFFICE OF THE PRESIDENT, COUNCIL ON WAGE AND PRICE STABILITY, Washington, D.C., September 3, 1980.

Hon. WILLIAM PROXMIRE, U.S. Senate, Washington, D.C.

DEAR SENATOR PROXMIRE: During my appearance before the Joint Economic Committee a week ago Friday you asked me to submit material for the record

documenting some of the recent successes of our wage/price program.

You asked, in particular, for a list of instances since the Mobil Oil case in which COWPS had elicited significant corrective actions from companies. At that time we mentioned the recent actions by Holiday Inns, Cities Service, and Kern County Refinery (the latter two of which brought to \$72 million the amount of corrective action we have secured from petroleum refiners).

Here are a few other such successes since the Mobil settlement:

Ford Motor Company agreed to keep its management pay below the low end of the second year pay range to compensate for its noncomplying collective bargaining agreement with the UAW.

Phillips Petroleum and Kerr-McGee Petroleum Companies agreed to keep their price increases well below their second year allowables to return to

the market excess revenues from the first program year.

Other companies that agreed to restrain their pricing to stay in compliance in this period: Quaker Oats Company; Alumax, Inc.; Diamond International Corporation; Grocers Supply Company; Diamond Shamrock; U.S. Steel (non-steel operations); Spartan Stores; AMFAC, Inc. (Liberty House of California); S. C. Johnson Company (Elsa Williams Company); American Hoist and Derrick; ConAgra Corporation; Southdown, Inc. (Southwestern Portland Cement Corporation); The Federal Company (Holly Farms, Inc.); and Phelps Dodge Corporation (Phelps Dodge Mercantile). The dollar sum of these restitutions comes to \$65 million.

I must point out that we have no way of calculating what portion of these "restitutions" is or will prove to be merely nominal, in the sense that these companies might in any event be unable to raise their prices by the full amount that the standards permit. On the other hand, I must also observe that the program's greatest successes have come not from these agreements by individual companies to take corrective actions for previous violations of the standards, but from the widespread compliance with the standards by business and labor. I enclose a paper in which we evaluate the overall effects of the program in some detail. Among its central conclusions are that inflation in the sectors of the economy covered by our standards has been about what would have been expected with a reasonable degree of compliance, and that the level and pattern of wage increases appear to reflect a substantial degree of restraint. Our simulation studies suggest that inflation would have been one-half to three-quarters of a percentage point higher without the standards than it was with them. (To put this last figure in perspective, at least one econometric study has suggested that it would have cost thirty to forty-five billion dollars to secure a comparable degree of restraint through fiscal policy.)

If you would like any additional information, please let me know.

With warm regards,

Sincerely,

ALFRED E. KAHN, Chairman.

Enclosure.

Exacutive Office of the President

Council on Wage and Price Stability
600 Seventeenth St. N.W.
Washington, D.C. 20506
Telephone 202-456-6757

EMBARGOED UNIIL 12:00 NOON Tuesday, July 8, 1980

FOR FURTHER INFORMATION (202) 456-6757

In a paper released today, the Council on Wage and Price Stability asked for public comments on the future design of the voluntary standards program. The paper, which offers a detailed discussion of the issues confronting the Council as it approaches the third program year (slated to begin October 1), also includes an analysis of the first 18 months of the voluntary pay and price standards.

Although the inflation rate during the first year and half of the program (12-1/2 percent during the first 5 quarters and 18 percent during the sixth) far exceeded the rate that was expected with widespread compliance with the basic price standard (6-1/2 percent), most of the difference is attributable to the necessary passthrough of soaring raw material costs. The standards were never intended to prevent inflation caused by rising raw material prices. Nevertheless, the program "had induced considerable restraint" in the areas it was designed to cover, the Council stated.

The underlying inflation rate -- a proxy for price increases in the covered sectors of the economy -- was about 7-1/2 percent through the first five quarters of the program. In the sixth program quarter, the energy price explosion temporarily spilled over into the covered sectors. The Council estimates that the underlying rate would have been 1 to 1-1/2 percentage points greater during the first year and a half without the program.

Wage inflation through the first year (8 1/2 percent) was also about one percentage point higher than expected with universal compliance. Most of the difference is attributable to the underevaluation of cost-of-living adjustment clauses under the standards.

Despite the soaring cost of living, wage inflation was no greater in the first program year than it was the year before (though it did accelerate in the fifth or sixth quarter). The Council estimates that the annual rate of wage inflation for the first year and a half would have been almost 2 percentage points greater without the program.

Pay data supplied by companies that regularly report to the Council showed that 85 percent of all workers were in compliance with the 7 percent pay standard during the first year of the program. The average chargeable pay increase for all workers was 6.1 percent annually, according to these data.

AIP-207

The average chargeable increase for union workers was 6.8 percent annually over the life of the contract, and nonunion workers (management and nonmanagement) received chargeable increases that averaged 5.8 percent. The Council said that half of the union workers received pay increases that exceeded the standard, but these workers were concentrated in the rubber and auto industries. In both instances, the companies pledged additional restraint to offset the inflationary effect of the excessive pay increases.

Actual pay increases granted by the reporting companies (before adjustments for exemptions and exclusions) averaged 7.1 percent, the data show. Union workers received average pay increases of 8.9 percent annually over the term of the contract and nonunion workers received unadjusted increases of 6.6 percent. Underevaluation of COLA clauses accounted for the largest part of the disparity between chargeable and actual pay increases, the Council said.

Company-reported price data indicate that the average first-year price increase of companies not eligible for alternative (gross-margin) standards was 10.6 percent. Most of the difference between this increase and the 6.6 percent average allowable increase for this group of companies is attributable to large price increases (19.8 percent) for companies that filed under the profit limitation, because surging raw material prices made compliance with the basic price limitation impossible. (Price data for companies on the Council's gross margin standards are not available, but comparisons between the 10.6 percent figure and various economy-wide price indexes indicate that the price increases of this group were slightly higher than the increases of companies not eligible for the gross margin standards.)

By comparison, compliance units that filed under the basic price standard reported average price increases of 5.6 percent during the first program year. Compliance units accounting for 96 percent of the revenues of this group reported price increases below their allowable limits, the Council said. The bulk of the increases were a quarter of a point or less below the allowable; this suggests that the price limitation was constraining for a large proportion of the companies.

Since inflation remains a serious problem "we expect that the pay/price standards program will be continued," the Council said. However, in the paper, the Council observed that the fundamental question before it is whether there should be a third program year. The Council asked for public comments on this point.

The Council solicited comments on the merits of switching the program from a price limitation to a cost passthrough basis, adjustments in the base period, the level of the price standard, alterations in the profit limitation and the modified price standards, and the question of a three-year cumulative standard vs. a one-year standard. It noted, however, that "the less radical and extensive the changes, the more we can capitalize on the experience gained by companies and by the Council in applying the standards over the past two years."

The Council said that it might allow companies to self-administer uncontrollable cost exceptions in order to reduce the administrative burdens on companies and on itself. The Council also asked for comments on possible prenotification of selected price increases during the third program year. It said it had decided not to seek prenotification during the current program year because it is so late in the year.

Public comments must be filed by August 1, 1980. Comments should be typed and submitted to Patrick Macfarland, Assistant General Counsel, Council on Wage and Price Stability, 600 17th Street, N.W.., Washington, D.C., 20506.

TABLE OF CONTENTS

			Page
I.	INT	RODUCTION	. 1
II.	EVA	LUATION OF THE PROGRAM	. 4
	A.	Analysis of Aggregate Wage and Price Data	. 4 . 4 . 11 . 13 . 15
	В.	Analysis of Company-Specific Pay Data	. 19
	c.	Analysis of Company-Specific Price Data	. 30
	D.	Conclusion	. 40
III.		OR ISSUES IN THE DESIGN OF THE THIRD-YEAR CE STANDARDS	. 43
	A.	Threshold Issues	. 43
	В.	Specific Issues	. 45
		Passthrough	. 45
		Price Standard 3. The Choice of a Base Period	. 54 . 58 . 59 . 61
		8. Excluded Products	. 65

	9.	Modified Price Standards 66	
	• •	a. Retailers and wholesalers 66	
		b. Food manufacturers and processors 68	
		c. Petroleum refiners 69	
		d. Electric. gas. and water utilities 75	
	10.	Company Organization	
	11.	Self-Administration of Uncontrollable-Cost	
		Exceptions	ľ
	12.	Price Prenotification 81	
APPEND IX	A:	DETAILED ANALYSIS OF COMPANY-SPECIFIC PAY DATA	
APPEND IX	B:	NUMERICAL EXAMPLE TO ILLUSTRATE POSSIBLE CHANGES IN THE PETROLEUM-REFINER STANDARD B-1	

I. INTRODUCTION

The purpose of this document is to solicit public comment on one of the central components of the broad anti-inflation program that the President announced in October 1978—the voluntary pay and price standards. During the first year of the orogram, the standards restrained the rise in prices and employment costs in the industrial sector of the economy. But accelerating inflation created problems for designing the second-year program, and we observed at that time that some of the provisions of the standards created distortions or inequities. To initiate the process of evaluation and review and to encourage public participation, we published an <u>Issue Paper</u> on August 7, 1979, requesting comments on the first-year standards. The paper included an economic review of the first program year as well as a discussion of conceptual and practical issues on which we particularly wanted the public to focus.

The response to the <u>Issue-Paper</u> was helpful in developing the second-year standards—not only in revealing how the public perceived the program but also in getting the public's views on some of the options for resolving the technical issues. After considering the responses to the <u>Issue Paper</u>, the Council on September 28, 1979, published interim final second-year price standards. With minor changes, these standards became final on November 1, 1979.

As a result of comments that this program, unlike previous ones, had not included a clearly defined role for representatives of labor, management, and the public, the President created the Council's Pav Advisory Committee. The Committee, composed of 18 members—six representatives each from labor, business, and the general public—was given a variety of tasks, with its principal assignment being to recommend modifications of the pay standard, including the basic pay limitation, the inflation assumption for the pay standard, including the basic pay limitation, the inflation assumption for the pay standard, including the basic pay limitation, the inflation assumption for the pay standard, including the basic pay limitation.

evaluating cost-of-living-adjustment clauses, and the adjustment for employee units not covered by such clauses. The Council's Price Advisory Committee was also created to include six representatives of the general public and it was asked to comment on the revised price standard developed for the second program year.

As we approach the end of the second program year, we confront the question, once again, of whether the pay and price standards should be extended for a third year, and, if so, with what changes, major or minor. Historically, programs like this tend to diminish in effectiveness over time and may develop distortions and inefficiencies. Against these considerations, we must weigh the manifest need for continued pay and price restraint, and the doubt that restrained monetary and fiscal policy alone can limit inflation except at excessive costs.

Because the comments we received last year were helpful and because many interested parties have asked for one, we have published another <u>Issue Paper</u>. Like last year's, it includes an evaluation of the standards program to date, drawing on both published aggregate data and aggregated company-specific data supplied to the Council (although the latter are available so far only for the first program year). This evaluation (presented in Section II) constitutes a regulatory review of the standards program. Section III attempts to identify both fundamental issues—including the most fundamental one of whether the standards should be continued in something like their present form—and technical issues on which we wish to have the public's comments.

The situation with the pay standard differs from that with the price standards. The Council adopted the present pay standard only recently after lengthy consideration by and consultation with the Pay Advisory Committee. We have therefore decided that it would be premature to publish a discussion of pay-standard issues at this time, although comment on this subject is not precluded.

3

IL EVALUATION OF THE PROGRAM

Our evaluation begins with a review of wage and price developments both before and during the program (Subsection A). This cursory review provides evidence about the program's effectiveness—based upon both what actually happened during the program and estimates of what would have happened in the absence of the program. Subsections B and C use aggregated company data supplied to the Council to assess the extent to which companies were constrained by the standards and to quantify the amount of noncompliance with the standards and the various sources of slippage (i.e., variation from the basic pay and price limitations attributable to exemptions, exceptions, and exclusions).

A. Analysis of Aggregate Wage and Price Data

1. Price Performance

When the anti-inflation program was announced in October 1978, the annual rate of inflation—as measured by the Consumer Price Index (CPI)—was running about 9 percent (see Table 1). During the first quarter of the program, the inflation rate changed very little, but in early 1979 it escalated sharply to about 13 percent. Then, after remaining in the 13-to-14-percent range throughout 1979, it rose sharply again in early 1980 reaching an annual rate of 18 percent, before falling in April and Way to an annual rate of 11 percent.

These accelerations are commonly cited as evidence that the pay/price-standards program was ineffective. That summary conclusion is not well founded. The standards program necessarily excludes many prices from its coverage; it makes no sense to apply

Table 1
Selected Components of the Consumer Price Index
(Seasonally adjusted, annual percentage rates of change)

	Dec. 1979			First Program Year Sec Change over Previous Quarter						and Program Year		
•	Relative Inportance (%)	Calembr 1978 1/	Calendar 1979 1/	78:111	78 : IV	79:1	79:11	79:111	79: IV	A0: 1	Moreh to Moy 2/	
All Items Forgy Constities Mortgage Interest Cost (MIC)	(100.0) (6.9) (8.7)	9.0 8.1 22.0	13.3 52.3 34.7	8.9 10.9 24.0	8.9 18.9 25.1	13.0 37.5 31.5	12.8 83.8 27.7	13.8 67.9 29.0	13.7 26.7 52.8	18.1 96.5 53.8	11.2 0.0 47.3	
MI Items less MIC and	(17.7)	8.4	9.2	6.7	7.2	10.2	6.4 8.0	6.5 9.3	9.5	9.6	5.2	
All Items less Food, MIC, and Energy Competities	(66.8)	7.3	9,0	7.9	6.0	8.7	8.4	10.0		11.4	9.8	
Underlying Nate 3/	(47.9)	6.5	7.8	6.6	7.2	7.5	7.2	8.1	8.6	12.7	9.7	

^{1/} Weenber to December changes not seasonally adjusted.

^{2/} Bates of change from Murch to Miv; June figures are not yet available.

³⁷ The Consumer Price Index excluding the costs of food, energy, used cars, and home purchase, finance, insurance, and taxes.

²³⁴⁴ E. (Wis calculations based on data from U.S. Department of Labor, Darent of Labor Statistics.

standards that call for price restraint in markets where sellers have little or no discretion in setting prices—i.e., in highly competitive markets, where attempts to hold prices below market—clearing levels would quickly generate damaging shortages. We therefore excluded from the program prices set in organized exchange markets. We also excluded raw—material prices, generally, because most are determined in highly competitive world markets, and attempts to restrict these prices artificially could quickly reduce domestic supplies. Also excluded are prices set by sales contracts in effect before the program, prices of new or custom products (since it is impossible to compute price changes for these commodities), and interest rates (since these are competitively determined and are heavily influenced by policy decisions of the Federal Reserve Board). Despite these exclusions, about 60 percent of the economy is covered by the price standards, as compared to about 45 percent under the Nixon Administration's mandatory controls.

The surge in the inflation rate in 1979 and early 1980 was the result primarily of a sharp acceleration in prices not covered by the standards. The world-wide economic expansion that continued throughout 1979 sent raw-material prices skyrocketing. These soaring raw-material prices rippled through the American economy, forcing many companies off the basic price limitation and onto the gross-margin and profit-margin limitations, which allow uncontrollable cost increases to be passed through.

The most dramatic raw-material price surge was the 110-percent increase in crude-oil prices during 1979 and early 1980. This jump contributed to the 80-percent increase in the U.S. energy-commodity prices during that period. In fact, the energy-commodity component of the CPI, accounting for only 7 percent of the weight, was directly responsible for one-fifth of the overall increase in consumer prices in 1979, and nearly one-third of the price surge in the first quarter of 1980.

There were, moreover, substantial <u>indirect</u> effects, not only because energy is an important input into the production process, but also because rising consumer prices elicit higher wage demands, and so inflate labor costs. It has been estimated that the total effect of energy-price increases is roughly double the direct effect, although much of the indirect effect is lagged. We independently estimate that at least ? percentage points of the inflation rate in early 1980—on top of the 5.2 points of direct impact—is attributable to the lagged effect of soaring energy prices in 1979.

Of course, not all of this increase in energy prices can be attributed to the doubling of crude-oil prices during this period; a large part is attributable to the substantially expanded margins of both petroleum refiners and gasoline and home-heating-oil retailers and distributors. Earlier this year, the Council published a detailed analysis of these expanded margins (Petroleum Prices and the Price Standards, February 25, 1980).

Another important contributor to the recent surge in the CPI was the steep climb in interest rates. This contributes directly to the measured rate of inflation through the homeownership component of the CPL. Mortgage interest costs increased 35 percent during 1979, and at an annual rate of 54 percent in early 1980. Thus, the mortgage-interest component of the CPI, whose weight is only 8-1/2 percent of the total, was responsible for one fourth of the total inflation in 1979 and the first quarter of 1980.

Taken together, energy-commodity prices and mortgage-interest costs, which accounted for less than one-sixth of the weight of the CPI, were responsible for nearly half of the inflation in 1979 and for over half of the inflation in the first quarter of 1980. Even more dramatic, they accounted for three-fourths of the acceleration in inflation from 1978 to 1979 and from 1979 to the first quarter of 1980.

No reasonable anti-inflation program could have prevented the surge in inflation caused by the escalation of crude-oil prices and interest rates. No petroleum importing country has insulated itself from the world-wide explosion of crude-oil prices. The U.S. economy has, indeed, been the hardest hit, because it is the most energy-intensive country in the world other than Canada (see section V of the Council's Inflation Update. released June 12, 1980). Similarly, any attempt by the Federal Reserve Board to prevent the surge in interest rates by accommodating the large demand for credit would have exacerbated the inflation by expanding the money supply even more rapidly and adding to aggregate demand. The degree to which interest rates can be lowered by expanding the money supply is limited since high interest rates are as much a result as a cause of high inflation rates. (The inflation rate affects interest rates by influencing price expectations and hence the expected real rates of return from any given level of interest rates.)

For these reasons, both crude-oil prices and interest rates have been excluded from the program, and the very large part of inflation for which they have been responsible cannot be attributed to noncompliance with the standards. On the other hand, this experience demonstrates the limitations of wage and price standards as an instrument for combatting inflation: they are essentially powerless to prevent inflation caused by either excess aggregate demand or surging raw-material prices.

The proper measure to be used in assessing the program's effectiveness is the behavior of prices in the sector of the economy that it covers. No precise index is available. As a proxy, we have used the CPI-based underlying inflation rate (the CPI less the food, energy, homeownership, and used-car components). This and other underlying-rate concepts, which are intended to measure fundamental inflationary pressures in the industrial and service core of the economy (in contrast with the effects of exogenous shocks such as the crude-oil price increase) are discussed in the Council's latest Inflation Update (June 12, 1980).

The CPI-based measure of the underlying rate of inflation was 6-1/2 percent when the program was announced in October, 1978. It accelerated very little until the third quarter of 1979, when it moved up to 8 percent. Another gradual increase, to about 8-1/2 percent, in the fourth quarter of 1979 was succeeded by an abrupt ascent to about 12-1/2 percent in the first quarter of 1980. The rise in the underlying inflation rate reflected in this measure was genuine; on the other hand, the 12-1/2 percent figure exaggerates it, since it reflects, in large part, the temporary surge of energy costs through other sectors of the economy; a surge that would be expected to abate, with a lag, once the surge of energy prices themselves abated.

Like the changes in the entire CPI, accelerations or decelerations of even the underlying inflation rate do not in themselves provide clear evidence of the effectiveness or ineffectiveness of the program. The ideal test, of course, is a comparison of the actual inflation rate with the rate that would have prevailed in the absence of the program; we will report some results of such comparisons in the final segment of this section. Another approach is to compare the price increases that actually took place with what the standards would have allowed; this we will do here.

The underlying inflation rate during the 1976-77 base period—as measured by the CPI residual—was about 6-1/4 percent. Because the first-year price standard called for price increases 1/2 percentage point below those in the base period, one would expect, with universal compliance and no slippage (i.e., in the absence of larger price increases attributable to exceptions and exclusions from the general standard), an underlying rate of inflation during the first year of 5-3/4 percent. The actual rate was 7-1/2 percent, suggesting slippage and/or noncompliance of about 1-3/4 percentage points. As will be seen in the next section, most of the slippage is attributable to the passing through of the surge in raw-material prices throughout 1979 under the exceptions and alternative standards available to those with uncontrollable cost increases.

In the second year, the price standard was loosened by 1 pecentage point. Hence—again with universal compliance and no slippage—one would expect the underlying rate of inflation to have been about 6-3/4 percent. The actual annual rate during the first quarter of the second program year was 8-1/2 percent, indicating slippage of about 1-3/4 percentage points—the same as in the first program year. The apparent slippage increased substantially in the first quarter of 1989, but appears to have declined since then.

To conclude, inflation rates in the sectors covered by the standards appear not to have been inexplicably larger than would be expected with universal compliance and no slippage. Because there was substantial slippage attributable to the surge in raw-material prices, the aggregate price data do not support the contention that the standards were ineffective.

Wage Performance

The pattern of changes of wages and other measures of labor compensation suggest that the pay standard has had a definite restraining influence. Wage inflation during the first year of the program was slightly below the rate in the preceding year, despite the sharp acceleration that took place in the cost of living and concomitant decline in real wages (see Table 2). Union wages went up by 8-1/2 percent, and nonunion wages by 7-1/2 percent. The average increase in total private labor compensation (wages plus private fringe benefits) was about 1/2 percentage point higher than in wages alone, because fringe benefits increased by 12 percent.

The 8-1/2 percent increase in total private labor compensation during the first year of the program was about 1-1/2 percentage points above the 7-percent pay standard. It thus appears that the amount of slippage on the pay side was slightly smaller than on the price side—a result that is not surprising in view of the substantial increase in raw-material prices during that year.

Wage inflation appears to have accelerated somewhat in late 1979 and early 1980. The rate of increase of the hourly earnings index moved up to 9-1/2 percent in the second half of 1979 and to 10 percent in the first quarter of 1980.

Table 2
Selected Measures of Employee Compensation
(Private Nonfarm Sector) */
(Seasonally adjusted, annual percentage rates of change)

	Fiscal		First Program Year					Second Program Year			
		1979	Change over Previous Quarter								
			78:111	78: IV	79:1	79:11	79:111	79: IV	80: I	March to May	
Average Hourly Earnings	8.6	8.3	8.0	10.0	8.4	6.1	8.8	8.6	9.1	3.7	
Hourly Earnings Index	8.4	8.2	8.0	8.4	7.9	7.0	9.6	9.2	10.0	6.5	
Hiptoynent Cost Index	8.0	7.7	8.2	6.1	8.2	7.8	8.7	10.0	10.0		
L Union	7.9	8.4	8.7	8.2	7.4	8.7	9.1	10.8	9.5		
Nonunion	8.0	7.3	7.8	4.5	8.7	7.8	7.8	9.5	10.4		
Total Hourly Conpensation	8.6	8.9	8.7	8.7	10.3	7.9	8.6	9.0	10.3		
Private Hourly Compensation	8.4	8.6	9.0	8.8	8.8	8.2	8.9	9.1	10.2		
Wages & Salaries Per Hour	8.2	8.3	8.G	8.8	8.8	7.4	8.1	8.7	9.7		
Pringe Benefits Per Hour Buployer Contributions to	10.1	12.0	12.3	9.1	8.9	15.2	15.2	12.6	11.7		
Social insurance Per Hour	11.7	12.2	5.0	7.4	33.5	5.2	5.2	6.6	13.3		
Real Hourly Farnings Index	0.1	-3.6	-0.3	-0.4	-5.3	-5.7	-3.4	-4.1	-7.1	-4.6	
Real Spendable Earnings (Weekly)	-3.2	-3.9	~2.4	-0.4	-1.3	-9.5	-4.4	-5.6	-11.8	-11.4	

^{&#}x27;/ Piscal year figures for the Phylogenet Cost Index and all hourly and real-earnings series are September-to-September changes and quarterly figures measure three-month changes. Hourly compensation, productivity, and unit labor costs are for all employees in the nonfarm business sector, fiscal year figures measure third quarter to third quarter changes.

SCANCES: CAPS calculations based on data from U.S. Department of Labor, Bureau of Labor Statistics; and U.S. Department of Commerce, Bureau of Feonomic Analysis.

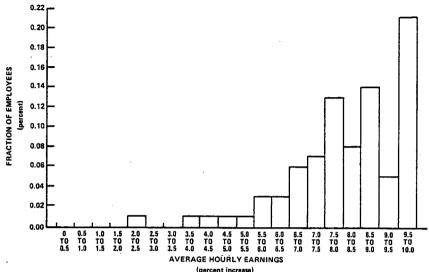
An interim pay standard was in effect during the last quarter of 1979 and the first quarter of 1980 while the Administration awaited the recommendations of the Pay Advisory Committee. During this period, the Council implemented an automatic 1-percentage-point catch-up adjustment for workers in employee units that were in compliance during the first program year and did not have cost-of-living-adjustment clauses, which raised the standard to 8 percent for the great majority of workers. The 9-to-10 percent increases that actually occurred in this period thus reflect a difference of about 1 to 2 percentage points, which is comparable to the difference in the first program year.

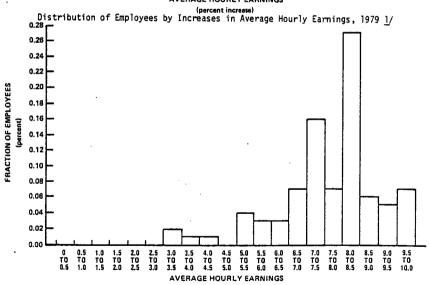
3. Wage Distributions

The behavior of average wage increases provides some indication of wage restraint under the program. The intent of the standards, however, is not to restrain all wage increases, but rather to discourage increases in excess of the stipulated ceiling after allowances for exceptions and exclusions, without elevating increases that otherwise would have been below it. We can roughly assess our success in achieving these goals by examining the way in which individual wage increases were distributed.

Figure 1 shows distributions in the first program year (1978:IV to 1979:III) and the base period (1977:IV to 1978:III). (For simplicity, we refer to the former of these periods as 1979 and the latter as 1978). The data are nominal wage increases for all workers.

Figure 1 Distribution of Employees by Increases in Average Hourly Earnings, 1978 $\underline{1}/$





(percent increase)

1/ Workers receiving pay-rate increases above 10 percent are not shown.

It is clear from these distributions that the bulk of the increases was redistributed from the 8-1/2-to-10-percent to the 7-to-9-percent range between 1978 and 1979. Moreover, there is no evidence of an upward shift of the concentration of workers at the lower end of the distribution—i.e., no evidence of a tendency for the ceiling to become also a floor. As a result, the average (mean) pay increase was lowered from 8-1/2 percent to 8 percent. The downward shift in the distribution between 1978 and 1979 would be even more pronounced if we were to show real rather than nominal wages, because the rate of increase in the CPI rose from 8.3 percent to 12.1 percent in this same interval.

To summarize, despite the substantial inflationary pressures on wages during the first program year, there was a downward shift in the upper range of wage increases and no upward shift in the lower part of the range. The fact that a substantial number of workers received increases just above 7 percent is largely the consequence of the various exceptions and exclusions incorporated into the standard to avoid inequities and market distortions. We examine these adjustments in detail in Section II-B, which also contains an analysis of wage distributions drawn from the data supplied by individual companies.

4. Simulation Results

The previous sections provide impressionistic evidence that the standards program was reasonably effective in preventing the spillover of the energy-price surge into the industrial wage/price structure. The relatively modest escalation in wage inflation and in the underlying inflation rate (compared to the much greater escalation of the overall inflation rate) supports the view that the standards had some effect in restraining wage and price increases.

In order to assess rigorously the effectiveness of a program whose purpose is to alter the course of events, it is necessary to estimate (as best one can) what would have happened in its absence. Obviously it is not possible to perform an experiment over the life of the program that would compare what would have happened both with and without it. It is possible, however, to construct models that predict the behavior over time of the relevant variables and to use such models to simulate what would have happened to these variables in the absence of the program (and of any other structural changes that may have occurred in the wage/price process that could have caused the results to differ from what would have been predicted from historical experience). A comparison of the simulated results with what actually happened allows one to assess the effect of the program, assuming that the advent of the standards was the principal structural change in that process.

Because of numerous statistical problems, constructing wage/price models that generate reliable simulations over the program period is difficult. Some preliminary work on this problem has been done by the Council of Economic Advisors (see the Economic Report of the President, January 1980) and by the Council (see our Interim Report on the Effectiveness of the Pay and Price Standards, May 6, 1980).

Using a variety of models developed by others as well as its staff, the CEA estimates that the annual rate of growth of wages during the first program year would have been 1 to 1-1/2 percentage points greater were it not for the standards. Our simulation exercises suggest that the annual rate of growth of average hourly earnings was 1.8 to 2.0 percentage points less than it would have been without the program. We also estimate that the CPI-based underlying rate of inflation (the CPI less the costs of

food, energy, used cars, and home purchase, finance, taxes, and insurance) would have been 1.1 to 1.5 percentage points higher; hence, the overall inflation rate—assuming that the program had <u>no</u> effect on the costs of food, energy, used cars, and home purchase, finance, taxes, and insurance—would have been one-half to three-quarters of a percentage point higher.

These simulation results suggest that the program had a greater restraining effect on wages than on prices. There are two major reasons for this difference. First, the price standards could not and should not have constrained the prices of primary energy goods, houses, interest rates, and food at the farm; hence, the effect of the price standard on the covered sector is diluted when it is evaluated on the basis of its effect on the entire Consumer Price Index. Second, even within the covered sector, there was more slippage on the price than the wage side, primarily because of the unavoidable passthroughs of energy and other raw-material costs.

It would, therefore, be incorrect to conclude from these simple comparisons that the standards bore discriminately unfairly on wages. In fact, labor's share of total income was not compressed relative to the profit share. Since the program was announced, the profit share has decreased from 10.0 percent to 8.6 percent, while labor's share has increased from 75.4 percent to 76.4 percent. Almost half of the increase in labor's share, however, is attributable to rising social insurance taxes; the share of wages and salaries plus private fringe benefits increased by only 0.5 percentage points—from 65.9 percent in 1978:III to 66.4 percent in 1980:I (see Table 3). More important, simulation studies carried out by the Council in its Inflation Update (June 12, 1980) suggest that the observed changes in income shares during the program period are

Table 3
National Income Shares During the Program Period (percent)

						Labor Coupensa	tion
	Corporate Profits 1/	Interest Incane	Rental Income 2/	Proprietors Income 1/	Total Labor Compensation	Social Insurance Taxes	Whges, Salaries, and Private Fringe Benefits 3/
1978:111	10.0	6.4	1.5	6.7	75.4	9.5	
1978:IV	10.2	6.5	1.5	6.9	75.0		65.9
1979:1	9.6	6.6	1.5	6.9		9.4	65.6
1979:11	9.3				75.5	9.9	65.6
		6.6	1.4	6.8	75.9	9.9	66.0
1979:111	9.3	6.8	1.4	6.7	75.9	9.8	
· 1979 : IV	8.9	7.0	1.4	6.8			66.1
1000					76.0	9.8	66.2
₩ 198011	8.6	7.3	1.3	6.4	76.4	10. 0	66.4

 $[\]underline{t}/$ Before taxes with inventory valuation adjustment and capital consumption adjustment.

SCHNE: U.S. Department of Commerce, Bureau of Economic Analysis

^{2/} With capital consumption adjustment.

^{2/} Fringe benefits include cuployer payments for private pension, health and welfare funds, compensation for injuries, directors' fees, and pay of the military reserves.

explained largely by business cycle variables—i.e., that the program had no (statistically significant) effect on income shares. This is not surprising, as the program was designed to be neutral with respect to income shares.

B. Analysis of Company-Specific Pay Data

As part of its monitoring effort, the Council collected data on pay-rate increases granted during the first program year by compliance units with 10,000 or more employees. These data shed additional light on the effects of the program on wages.

The pay standard requires companies to partition workers into three categories: those employees subject to a collective-bargaining agreement, all management employees, and all other (nonmanagement nonunion) employees. Hence, separate statistics are available for these three groups. In all, the pay reports cover 7-1/2 million workers—close to a third of them in management units, about a fifth in collective-bargaining units, and the rest in the all-other category. The reports do not cover workers excluded under the low-wage exemption (those with straight-time hourly wages of \$4.00 or less on October 1, 1978) or collective-bargaining units whose contracts were not renegotiated during the first program year. By subtracting these excluded groups from the total work force, we estimate that the number of workers covered by the pay standard in the first year was 48 million; thus, the pay-reporting forms encompass about 15-1/2 percent of the covered work force.

The average increase in wages plus fringe benefits (before adjustments for exclusions and exceptions) for workers in the reporting universe was 7.6 percent in the first year of the program—11.0 percent for union workers and 6.8 percent for both the management and nonmanagement nonunion groups combined. (See Table 4.) The discrepancy between this 7.6 percent and the 8.6-percent increase in private hourly compensation, in fiscal-year 1979 for the entire economy (see subsection A) is attributable to several factors.

First, the applicable periods for the data reported in Table 4 do not conform precisely to the Council's first program year (essentially fiscal-year 1979). For example, the first year of a collective-bargaining agreement signed late in the first program year would extend well into the second program year.

Second, many of the collective-bargaining contracts contain cost-of-living adjustment (COLA) clauses, and the cost of these, as reported to us, are based on company assumptions about the prospective inflation rate. Other data supplied by these companies indicate that they assumed, on average, an inflation rate of about 9.4 percent-substantially below the 13.5 percent that the CPI actually increased, on average, during the first year of collective-bargaining agreements signed during the first year of the program (estimated roughly as the average of the CPI increases over the nine annual periods, September 1978 to September 1979, October 1978 to October 1979, and so on up through May 1979 to May 1980). With an assumption of an average recovery rate of 60 percent (i.e., that a one-percentage-point increase in the CPI results in an average COLA-payment of 0.6 percentage point), this average under-forecast of the CPI increase resulted in a 2-1/2 percentage-point underestimation of COLA payments. Because

Table 4
Pay Data for Reporting Units 1/

Number of Workers Percent of Workers	All 2/ Workers 7,430,162 100.0 Annual Average over First Year Life of Contract		Collective 2/ Pargaining Units 1,399,054 18.8 Annual Average over Pirst Year Life of Contract		Management Units 2,415,305	All- Other Units 3,615,713 48.7	
					32.5		
Unadjusted Percentage Pay-Rate Increase Adjustment	7.6 6.3 1.3	7.1 6.1 1.0	11.0 7.9 3.1	8.9 6.8 2.1	6.6 - 5.8 0.8	6.6 5.8 0.8	

^{1/} The percentage increases are obtained by averaging across employee units, using base-period diployment as weights.

^{2/} Pay increases for collective-bargaining units are calculated in two ways: The first-year calculations represent the costs of the first year of collective-bargaining agreements negotiated during the program period, while the annual-average data pertain to the (geometric) average annual rate of increase over the life of the contract. Because of front-loading, the first-year estimates for multi-year contracts are usually larger than the annual averages.

approximately 3 percent of the workforce signed collective-bargaining agreements with such clauses during the first program year, this undervaluation accounts for about 0.1 percentage point of the one point difference between the reported increase and the national aggregate increase.

Another factor explaining this disparity is the exclusion from the reporting sample of the increases under collective-bargaining agreements signed before the announcement of the program. We estimate that these averaged 8.1 percent and that the affected workers account for about 14-1/2 percent of the total workforce. Thus, the exclusion of these workers from the reporting universe accounts for another 0.1 percentage point of the 1.0 point disparity.

Finally, the low-wage exemption accounts for a substantial share of the disparity. Approximately 35 percent of the workforce was excluded under this exemption. We estimate that, on average, these excluded workers received 9-1/2-percent increases during the first program year (the increase in the minimum wage was 9.4 percent, and workers slightly above the minimum wage received comparable increases in order to avoid wage compression). After appropriate weighting of these percentage increases by the low level of wages involved, we estimate that the low-wage exemption accounts for about 0.4 percentage point of the one-point difference.

The three quantified factors—underestimation of the costs of COLA clauses, exemption of increases under pre-existing contracts, and the low-wage exemption—account for about six-tenths of the 1.0-percentage-point disparity between the increase in the national aggregate wage level and the increase shown by our reporting universe. The small remainder can be attributed to statistical error and the possible differences between the wage increases of reporting and nonreporting compliance units (for example,

most of the workers covered by construction and teamsters settlements—which typically provided for very large increases—are in compliance units with less than 10,000 workers).

As noted above, the average reported first-year increase under collective-bargaining agreements was 11.0 percent. The average annual increase over the lives of the contracts was 8.9 percent. The first-year pay standard restricted the increase in each year of a multi-year contract to no more than 8 percent and the average annual increase to no more than 7 percent. The fact that the reported increases are above the respective limitations does not necessarily mean that these increases were not in compliance with the pay standard. For the purpose of evaluating compliance, the pay standard provided for several departures from actual costs. The most important of these adjustments is attributable to the CPI assumption used in evaluating COLAs. The 6-percent inflation-rate assumption stipulated by the standards turned out to be below the actual inflation rate and below the assumptions made throughout the year by employers. In addition, the standard provided a number of exceptions and exclusions, in order to assure that it does not generate unnecessary inequities or inefficiencies.

Adjustments such as these lowered the average pay-rate increases of all three categories of employees, as measured under the standard; but the adjustment was especially dramatic in the case of collective-bargaining units. The average downward adjustment for union workers was 3.1 percentage points for the first year and 2.1 percentage points for the annual average over the lives of the contracts. In contrast, the average adjustment for both management and nonmanagement nonunion units was 0.3 percentage point. Thus, the average chargeable first-year increase for union workers was 7.3 percent (slightly below the 8-percent limit), and the average annual chargeable increase over the lives of contracts signed during the first year was 5.8 percent (slightly below the 7-percent limit). The average chargeable increase for both management and

nonmanagement nonunion workers was 5.8 percent (substantially below the pay standard). The average downward adjustment to the average increase of 7.6 percent for all workers in the first year was 1.3 percentage points, which results in an average chargeable pay-rate increase of 6.3 percent.

The adjustments for each group are summarized in Table 5. (The components are described in detail in Appendix A.) This table shows that half of the discrepancy between reported actual and chargeable pay-rate increases is attributable to discrepancies between the COLA assumption stipulated by the standards and the evaluations made by the employers. As would be expected, this COLA adjustment was most significant in the case of union employee units, accounting for 1.5 of the 2.1 percentage points of adjustments for these workers; it was also important for the nonmanagement, nonunion units, accounting for more than a third of their total adjustment. The two "maintenance of benefit" adjustments for health insurance and pensions also contributed substantially to the disparities between actual and chargeable pay increases for all groups. The exclusion of overages attributable to formal annual pay plans announced before the beginning of the program were important for both categories of nonunion workers. The exclusion of promotions and qualification increases for employee units using the "fixed population" method of calculation was significant only for management units; exclusions for incentive pay, on the other hand, were a significant factor only for the nonmanagement, nonunion units.

Table 5
Contributions of Various Components to Adjustments of Wages and Salaries 1/
(First Program Year)

	All Workers	Union 2/	Management	Others
Total Adjustment 3/	1.0	2.1	0.8	0.8
Contribution of: COLA evaluation	0.5	1.5	0.1	0.3
Maintenance of health benefits	0.1	0.2	0.1	0.1
Pension plans	0.2	0.2	0.2	0.1
Formal annual pay plans	0.1	NA.	0:2	0.1
Excluded promotions and qualification increases	0.0	NA.	0.1	0.0
Excluded incentive pay	0.0	0.0	0.0	0.1
Exceptions	0.1	0.3	n.1	0.1

^{1/} See Appendix A for descriptions of these adjustments.

^{2/} Annual average over the life of the contract.

^{3/} Components may not add to total because of rounding (effect of weighted average method is negligible, see Appendix A).

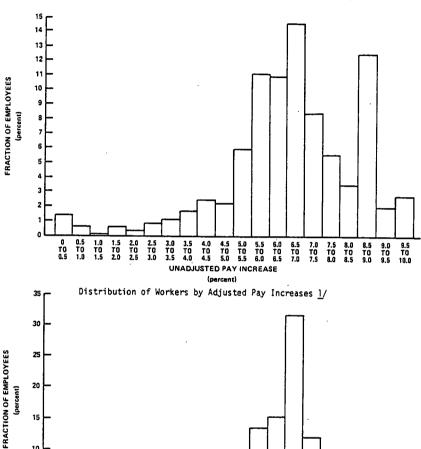
Each of the foregoing adjustments of actual pay increases was an integral part of the basic standard and was therefore self-administered by the companies. The pay standard also allowed for special exceptions for tandem relationships between different employee units, increases necessitated by acute labor shortages, the exchange of pay increases for phasing out of productivity-inhibiting work rules, and the correction of inequities. The slippage in the standards accounted for by these Council-granted exceptions was significant for all three groups, but it was much larger for the union groups than for management and nonmanagement, nonunion groups.

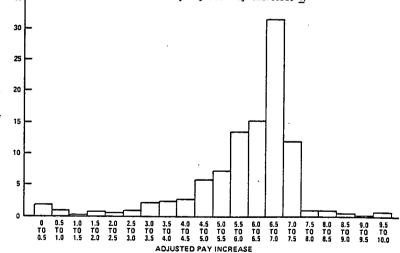
While much can be learned by examining the <u>averages</u> of the pay-rate increases, there is also something to be learned from the <u>distributions</u>. Figures 2, 3, and 4 show the distribution of both actual and chargeable pay-rate increases for all reporting workers, union employee units, and nonunion employee units. (We do not show distributions for the management and nonmanagement units separately because the two are similar.) In each case, the estimates are weighted by the number of employees in each compliance unit.

The top charts in the three figures show that unadjusted rates of pay increase were widely dispersed and often considerably above the 7-percent standard. The nonunion pay-rate increases roughly follow a normal distribution; the union increases, in contrast, are bunched in the 8-1/2-to-9-1/2 percent range.

As our foregoing discussion of the differences between reported actual increases and those chargeable under the standards suggests, the disparity in the rates of pay increase for union and nonunion workers is narrowed considerably by the removal of the portions that are not chargeable.

Figure 2 Distribution of Workers by Unadjusted Pay Increases 1/





Workers receiving pay-rate increases above 10 percent are not shown.

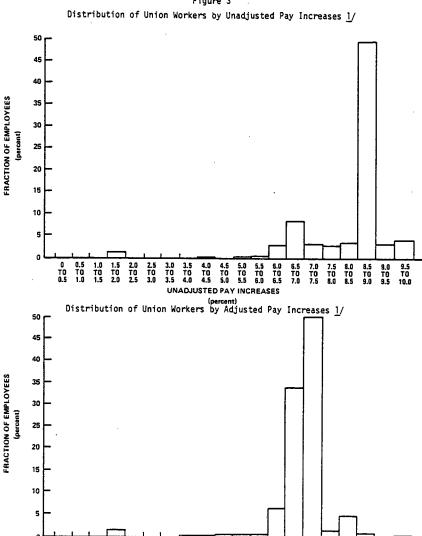


Figure 3

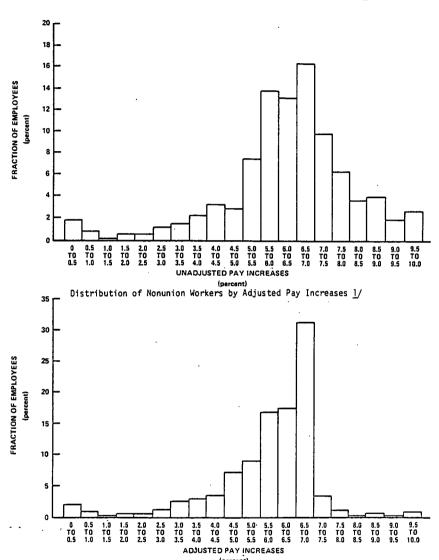
Workers receiving pay-rate increases above 10 percent are not shown.

ADJUSTED PAY INCREASE (percent)

9.5 TO 10.8

3.5 TO 4.0 4.0 TO 4.5 4.5 TO 5.0 5.0 TO 5.5 5.5 TO . 6.0 6.0 TO 6.5 6.5 TO 7.0 7.0 TO 7.5

Figure 4
Distribution of Nonunion Workers by Unadjusted Pay Increases 1/



(percent)

1/ Workers receiving pay-rate increases above 10 percent are not shown.

With these adjustments, almost a third of the nonunion workers are in the 6-1/2-to-7-percent range, sixty-five percent are in the 5-1/2-to-7-percent range, and only about 5 percent had increases of more than 7 percent. On the other hand, half of the union pay increases are slightly above the 7-percent standard—in the 7-to-7-1/2-percent range. About 34 percent are slightly below the standard—in the 6-1/2-to-7-percent range. The distribution of wage increases for union workers was heavily influenced by a number of major settlements that were slightly above the 7-percent standard. The most notable cases were rubber and autos, where the collective-bargaining agreements were found out of compliance but the companies involved were not listed as noncompliers because of their commitments to take corrective action (most frequently by exercising additional price restraint).

C. Analysis of Company-Specific Price Data

In the first program year, we asked all firms with sales of \$250 million or more in the last complete fiscal year before October 2, 1978, to file price, gross-margin, or profit-margin data with the Council. Approximately 1,300 companies were of this size; in their reports they disaggregated their operations into 2,101 compliance units. In addition, we asked 235 smaller companies in selected industries to file price-monitoring forms (PM-1s).

Of the reporting compliance units, 801 filed under the basic price deceleration standard, 546 under the various gross-margin standards available to selected industries, 815 under the profit-margin limitation, and 9 under the professional-fee standard; 165 were exempted from the price standards because 75 percent or more of their revenues came from the sale of excluded products (see Table 6).

			Total b Standa		rcent Total	No. of Can	M 1750-	ting by Size	n 13200 of Cristian	X.
	i.	Price Decaleration	101	34.3	ķ	230	169	91		
	ı.	Grass Mirgla	548	23.4		315	156	10		
		Percentage Gross Murgin		387	14.6		45	120	11	
		Food Mg.Proo. Gross Mirgin		91	4.9		β 8	20	3	
31		Itefinera Gross Mirgin		44	2.0		33	7	20	
	111.	Professional fee	_•	0.4		_1	_1	_1	,	
	IV.	Profit Mirgia	115	34.9		411	281	11		
		(W3 Granted/Pending	:	204	8.6		#3 	21	2	
		Solf Adulatered	;	175	18.4		36	176	5 84	
		··· Insufficient Product Coverge	;		10.0		6 3	4	17	
	V.	tionpt	105	7.1		105	_10	11	••	
		Total thebar of Pilings	2,334	100.1		1,143	638	235		

The following analysis is based on samples of these PM-1 forms; not all of the forms have been entered in our computer file, in part because we did not require computer-compatible forms until the second quarter of the second program year.

During the first program year, 871 compliance units reported price data to the Council. (This number is greater than the 801 that filed under the price deceleration standard because it includes some compliance units that received exceptions, permitting them to file under the alternative profit-margin limitation, on the grounds of uncontrollable costs or inability to compute.) The revenue-weighted average price increase during the base period for a sample of 83 percent of these firms was 6.35 percent. This translates to a 5.8-percent average allowable price increase after account is taken of the required price deceleration of 0.5 percentage point and the maximum (9.5 percent) and minimum (1.5 percent) allowable program-year increases. This is virtually identical to the 5.75-percent average allowable increase that we estimated on the basis of aggregate data for the entire economy when the standard was first promulgated.

The fact that the actual average price increase of 9.36 percent for this group during the first program year far exceeded the 5.8-percent limit does not necessarily signify widespread noncompliance because many of these firms received exceptions to the price deceleration standard. Because this sample underrepresents compliance units that received profit-margin exceptions (since fewer of them filed price data) it cannot be used to estimate the slippage attributable to the availability of this exception.

When we remove from the sample the compliance units that received profitmargin exceptions, we find that the revenue-weighted average price increase of the remaining units during the first program year was 6.44 percent, as compared to an average allowable increase of 5.92 percent for this group (see Table 7). Compliance units accounting for 87 percent of the revenues in this sample reported price increases below

Table 7
Compilance Units Filing Under the Price-Deceleration Standard

	Revenue Share 1/	Fraction of Compliance Units 2/ (2)	Average Allowable Price Increase (percent) (3)	Average Actual Price Increase (percent)	Difference (percent) (6) (4) - (3)	Contribution to Total Price Increase (percentage points) (7)
Reported compliance with price standard	. 8715	.8217	5.77	4.59	-1.18	4.00
Notices of Probable Noncompliance (sent or In process)	.0821	.0503	7.43	22.18	14.75	1.62
Under Analysis	.0465	.1280	6.07	13.33	7.26	0.62
Total ·	1.0000	1.0000	5.92	8.44	0.52	6.44

^{1/} Total revenues (thousands) = \$227,351,071.

^{2/} Total compliance units = 656.

their allowables. Moreover, the compliers were highly concentrated near those allowables: 50 percent of them were no more than a half percentage point below their ceilings. This suggests that the standard was constraining for a large proportion of the companies (see Figure 5).

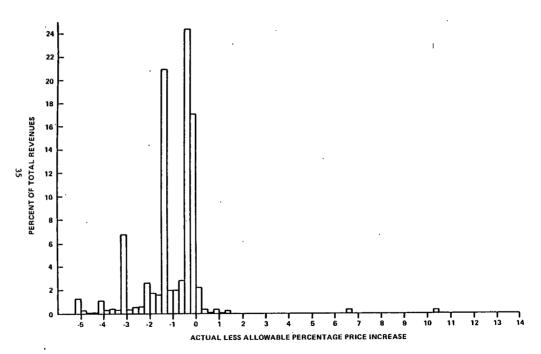
Eighteen percent of the compliance units, accounting for 13 percent of the revenues, reported price increases above their allowables. Not all of them are out of compliance; many will ultimately be found to have properly self-administered exceptions, or to have been eligible for alternative standards, or to have misinterpretated the standards or made calculation errors.

Thirty-three notices of probable noncompliance have been sent, or are in process of being sent, to companies in this sample. Analyses of the other 84 cases of overage are continuing, usually in discussions with the company. Some of these discussions have resulted in the companies taking corrective action to come back into compliance. (There have been over 20 publicly announced corrective actions totaling over \$130 million.)

The 6.44-percent price increase by compliance units in the sample that were not granted profit-limitation exceptions is, of course, considerably below the 12.5-percent increase in the CPI during the first program year. The 6.1-point difference between these two figures is explained by three factors: (1) the rapid increases in some components of the CPI that are not covered by the standards (most notably mortgage interest costs); (2) the passthrough of some large raw-material cost increases (most notably crude-oil costs) under the profit-margin limitation and the various gross-margin standards available to particular industries; and (3) some noncompliance.

Figure 5

Distribution of Revenues by Difference Between
Actual and Allowable Price Increases
(All Compliance Units Filing Under the Price Deceleration Standard)

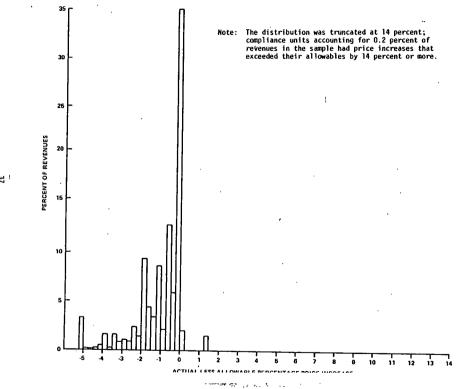


Note: The distribution was truncated at 14 percent; compliance units accounting for 5.77 percent of revenues in the sample had price increases that exceeded their allowables by 14 percent or more.

We have already discussed the first of these, in contrasting the behavior of prices covered and the prices not covered by the standards. However, since the sample includes some compliance units that were eligible for alternative standards or that self-administered exceptions, the 6.44-percent price increase is not indicative of actual price increases by firms on the price deceleration standard. Thus, to estimate the slippage and noncompliance attributable to the profit-margin exception, we must restrict the sample of compliance units filing price data further to exclude all firms that were eligible for an alternative standard: this cuts the sample to 317. Compliance units in this sample that filed under the price deceleration standard had a revenue-weighted program-year price increase of 5.57 percent; their allowable increase was 6.61 percent. The concentration of the price increases of this group just below the allowable is even more pronounced than in the larger sample (see Figure 6), probably because this smaller sample excludes many companies that have self-administered exceptions or that have converted to an alternative (gross margin) standard.

Compliance units in this sample that were granted profit-margin exceptions on average exceeded by 13.23 percentage points the price increases they would have been allowed had they remained on the basic price deceleration standard. (We cannot estimate the portions of this excess attributable respectively to noncompliance and to the fact that the profit-margin exception simply permits larger price increases.) Slippage and noncompliance thus contributed 4.66 percentage points to the total price increase for this group (obtained by multiplying 13.23 by the revenue share of companies under the profit-margin limitation).

Distribution of Revenues by Difference Between Actual and Allowable Price Increase
(All Comp)iance Units Filing Under the Price Deceleration Standard that are not Eligible for an Alternative Standard)



These calculations are summarized in Table 8. Compliance units under the price deceleration standard increased prices on average by 5.6 percent, whereas companies with profit-margin exceptions (to the price deceleration standard) increased theirs by 19.8 percent. Weighting these two figures by revenue shares, we obtain a total price increase of 10.6 percent. This increase, calculated from company specific data, is remarkably consistent with increases in comparable economy-wide price indexes during the first program year, which ranged from 9-1/2 percent to 11 percent. The Gross National Product deflator rose 9.6 percent; the fixed-weighted Personal Consumption Expenditure Deflator increased 10.0 percent; the CPI less mortgage interest costs—which are not covered by the standard and are not passed through under the profit-margin limitation—rose 10.5 percent; and the Producer Price Index for finished goods increased 11.2 percent. This suggests that price increases of companies eligible for the various gross-margin standards—which are not included in our sample but are, of course, included in the comparable aggregate indexes—were roughly equivalent to those not eligible for these alternatives.

Because the average allowable price increase for compliance units not eligible for the alternative standards was 6.6 percent—about one percentage point above the 5-3/4 percent estimated average allowable for the entire economy—it would appear that compliance units eligible for the alternatives had below-average base-period price increases. This implies, in turn, that the noncompliance and slippage among companies eligible for the various gross margin tests (i.e., the difference between their actual price increases and what they would have been allowed under the price deceleration standard) was greater than the slippage among companies that were not eligible for an alternative

Table 8

The Price Standard and Profit-Wargin Slippage

	Price Change	Contribution to Total Price Increase 1/
Price-deceleration standard		
Allowable	6.61	4.28
Underage	-1.44	93
Excess	0.40	26
Actual	5.57	3.91
Profit-margin limitation		
Allowable	6.58	2.32
Slippage and Noncompliance	13.23	4.66
Actual	19.81	6.98
Total		10.59

^{1/} The contributions were calculated by multiplying the first column by the relative revenue shares of compliance units under the price deceleration standard and the profit-margin limitation (.6476 and .3524, respectively).

standard. There is no way to test this conclusion, because price data are not reported by compliance units under these alternative standards. We do know, however, that the combination of slippage and noncompliance in petroleum refining and marketing was much larger than 4-1/2 percent—the estimated profit—margin slippage for compliance units not eligible for alternative standards—primarily because of the passthrough of a 56-percent increase in the cost of crude oil (see the Council's <u>Petroleum Prices and the Price Standards</u>, February 25, 1980). Similarly, the slippage in the food processing and distribution sector appears to have been about 5-1/2 percentage points: aggregate data show a base-period increase of about 4-1/2 percent and a program—year increase of 10 percent.

D. Conclusion

In this section, we have examined the efficacy of the standards program in restraining wage and price inflation. All of these analyses confirm our impression, based on day-to-day dealings with companies, that it has induced considerable restraint. Although the inflation rate accelerated markedly during the program period, most of this acceleration can be attributed directly to the passthrough of a surge in raw-material costs. We never expected the standards program to prevent such a passthrough, nor did we intend it to do so: any attempt to limit raw-materials costs or their passthrough would have produced serious distortions and shortages.

Our statistical analysis suggests that, had the standards not been in place during the year and a half ending in March 1980, the annual rate of increase of labor compensation would have been almost 2 percentage points higher, the underlying rate of inflation 1 to 1-1/2 percentage points higher, and the overall inflation rate almost 1/2 to 3/4 percentage point higher.

The social benefits of the program depend, of course, on the gains from reducing inflation. Such gains cannot be measured directly. If, however, we are willing to take as given the social commitment to lower the inflation rate, then we can measure the benefits of the program by referring to the social costs of reducing the inflation rate by alternative methods—namely, additional fiscal and monetary restraint. A conservative estimate, based on recent econometric evidence, is that, in order to generate a sustained lowering of the underlying inflation rate of 1 percentage point by fiscal and monetary

restraint alone, we would have to increase the unemployment rate by 1 percentage point. This translates into a 2-percent reduction in output, or 47 billion dollars of lost GNP. These estimates are, of course, inferential and are subject to statistical error; nevertheless, even if they were off by several orders of magnitude, the social benefits of the standards program would remain extremely large.

The social costs of the program are much harder to quantify; they are reflected in the administrative burdens imposed on companies and in any loss of output caused by induced economic inefficiencies and market distortions. (The directly measurable costs of the program as reflected in the Council's budget are miniscule compared to the apparent social benefits.) Perhaps because of the substantial flexibility in the standards, however, we have seen no convincing documentation of significant induced inefficiencies.

Of course, documentation that the pay and price standards were beneficial during the first year and a half does not, in itself, demonstrate that they should be continued. The critical question is whether or not these standards can continue to be a potent force for wage and price restraint in the year ahead. The answer to this question depends in part on economic conditions during the next year and in part upon the degree to which strains within the standards program have made it less viable.

There is now a consensus view that the economy has moved into a recession. It may be argued that standards are not needed during recession because market forces will restrain pay and price increases. On the other hand, it can be argued that standards are most needed during a slowdown or a recession in order to make the slowdown work as much as possible toward reducing the underlying inflation rate. This argument is especially forceful when the recession takes place in the aftermath of a large increase in consumer prices, because these increases continue to provide pressures to increase wages

in order to catch up for past decreases in the standard of living, despite the fact that labor markets are weakening. Finally, it can be argued that it is necessary to keep the standards in place to prevent another serious surge of inflation when the economy begins to recover in late 1980 or early 1981, particularly since the underlying rate of inflation is expected to hover near double-digit rates through most of the recession.

III. MAJOR ISSUES IN THE DESIGN OF THE THIRD-YEAR PRICE STANDARDS

A. Threshold Issues

The foregoing analysis suggests that the standards have helped to limit the rate of inflation. Because inflation continues to be a serious problem, despite the onset of recession, we expect that the pay/price-standards program will be continued. We recognize factors which suggest the opposite, however. There is some basis for the view that the effectiveness of programs like these may diminish over time and that the distortions and inefficiencies they introduce—no matter how flexible their design and administration—become increasingly burdensome. In addition, the recession may tend to make such standards less useful. While, therefore, we expect to carry the present program into a third program year, we solicit public comment on the general question of whether a third year of pay and price standards following the general outlines of the first two years is a useful component of an anti-inflation program. We ask that those who respond in the negative give serious consideration to what alternative program, if any, would be more desirable.

Assuming that the present program is continued, there is another threshold question that must be resolved before deciding the form of the third-year standards: whether it is better to proceed, as in the past, with standards for a 12-month period, or alternatively, whether they should be reevaluated (and modified, if appropriate) within a more limited period of time (e.g., quarter by quarter or every six months). While it can be argued that more frequent modifications are preferable, especially in times when the economy is in an unusual state of flux, the mere possibility of changes in the standards

during the year would subject companies to greater uncertainty and render them unwilling or unable to develop effective long-term compliance plans. And, if a major program change were in fact made, it would impose substantial additional administrative costs on both the companies and the Council.

In any event, retaining a 12-month concept for the third program year would not preclude us from modifying the standards during the year if changing economic conditions made this advisable. During the past year, for example, we initially set the third-quarter price limitation at the same level as for the entire two years, but at the same time announced that, if price developments earlier in the year suggested the need for more restrictive quarterly limits, the third-quarter ceiling might be adjusted downward. And then, in late March, after the annual rate of increase of the CPI reached 18 percent, we announced a tightening of the third-quarter limit. Similarly, we could loosen the standards within the framework of an annual program. For example, during this past year, we developed a modified standard for companies that use a significant amount of gold and/or silver, and we adjusted the price limitation for airline companies that had experienced large increases in fuel costs.

Assuming that we retain a 12-month program period, the remaining price-standard issues are best considered in the following order: (1) the price limitation versus cost passthrough, (2) the level of the aggregate price standard, (3) the choice of a base period, (4) adjustments to the base period, (5) the range of allowable price increases, (6) a one-year versus a three-year cumulative standard, (7) changes in the profit limitation, (8) excluded products, (9) modified price standards, (10) company organization, (11) self-administration of uncontrollable-cost exceptions, and (12) price prenotification. In discussing these issues and expressing our preferences for particular resolutions, we are influenced by the consideration that the less radical and extensive the changes, the more

both the Council and the affected companies can benefit from their experience over the past two years. At the same time, some changes are necessary, and others might even reduce the administrative costs of the program.

B. Specific Issues

1. The Price Limitation versus Cost Passthrough

The basic price limitation is cast in terms of a company's average rate of price change for all of its products. This approach gives companies maximum opportunity to adjust their relative prices in response to varying demand and supply conditions, while providing for overall restraint in their pricing. The second-year standard limited a company's average rate of price increase over the first two program years to its average increase over the two-year base period. It has been suggested that this standard should be replaced by one permitting passthroughs of all costs (like the current profit limitation), rather than having profit restrictions apply only when companies are faced with uncontrollable cost increases or are unable to make price calculations. In the past, we have rejected this suggestion, preferring the price limitations for the following reasons:

- Price limitations involve fewer accounting complications and are easier to monitor than cost passthroughs.
- Price limitations do not vary with changes in costs. This provides companies with incentives to resist cost inflation.
- o Price limitations permit firms the full benefits of increased productivity.

So long as exceptions are provided for companies that cannot comply with the price limitations because of uncontrollable cost increases, there is no inherent inequity in having the price limitation as the basic standard. The Council has approved exceptions for full cost passthrough in individual cases and has approved passthroughs of particularly large, uncontrollable increases in the costs of specific inputs (e.g., gold and silver, and airline fuel).

These last specific adjustments demonstrate our commitment to enabling companies to remain on the price limitation, rather than their resorting to the cost-plus-profit limitation. It was to improve the likelihood of their being able to do so that the Price Advisory Committee recently recommended that we revise the overall price limitation upward for all companies to reflect the recent increase in the pay standard to the 7-1/2-to-9-1/2 percent range. In declining to follow that recommendation, we reasserted our preparedness to adjust price limitations for individual companies or industries on an ad hoc basis to account for unusually severe increases in cost, whether of labor or other inputs. We renew that pledge, and invite reasonable proposals to accomplish this objective.

2. Establishing the Level of the Aggregate Price Standard

For the first and second program years, the aggregate price standard was derived from the pay standard, assuming a constant percentage markup of prices over unit labor costs (i.e., constant labor and nonlabor income shares) and a trend productivity growth rate of 1-3/4 percent (the average increase during the previous 10 years). If the nexus is retained in the third year, three determinations must be made: (1) the level of the pay standard, (2) the estimate of trend productivity, and (3) the difference in the amounts of slippage inherent in the pay and price standards.

The pay standard now in effect is a range of 7.5 percent to 9.5 percent. Under it, annual pay-rate increases are expected in normal circumstances to average about the midpoint of the range.

As a result of the recent collapse in productivity growth, the 10-year-average measure of trend productivity growth has decreased from 1.74 percent in 1977 to 1.35 percent in 1979. Some argue for the use of a more recent time period for calculating this variable, on the ground that the 10-year average overstates the current trend rate.

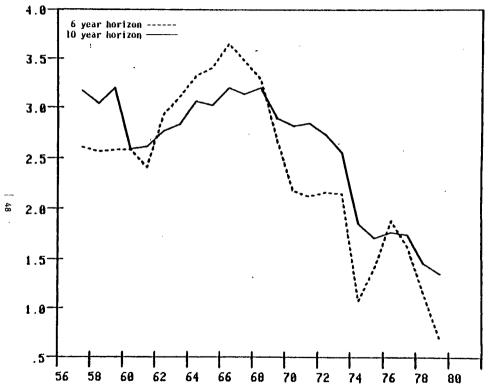
Conceptually, the measure of trend productivity should be based on relatively recent data, which are more relevant to current costs and pricing decisions. At the same time, the data must extend over a period sufficiently long to encompass experience from both the expansionary and contractionary phases of the business cycle, in order to produce a measure that is relatively stable and insensitive to cyclical influences.

The Council chose the 10-year period because it met these objectives. The ten years ending in 1977 incorporate approximately two complete business cycles and produce a relatively stable index. This can be seen clearly in Figures 7 and 8, which compare a ten-year trend with a six-year and a four-year trend, respectively.

Assuming an 8.5-percent pay standard and equal slippage for pay and price, the aggregate price standard for various productivity growth trends would be as follows:

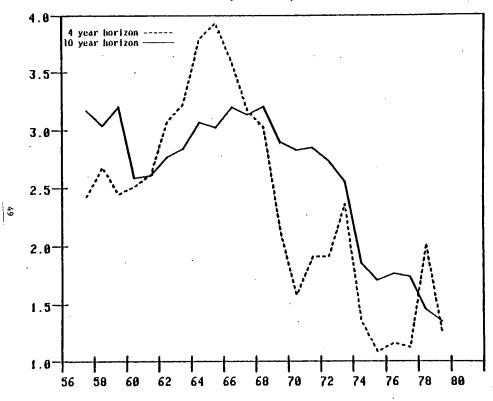
Productivity trend	Aggregate price standard				
1.75 (current assumption)	6.75				
1.35 (new 10 year trend)	7.15				
1.25 (4-year trend)	7.25				

47



106

Figure 8 Growth Rate in Output Per Hour, All Persons, Private Business Sector (annual data)



As noted in Section II, the apparent slippage on both the pay and price sides during the first program year was about 1-1/2 to 2 percentage points. Most of the slippage in the price standard is attributable to the passthrough of substantial raw-material cost increases; a large portion of the pay slippage resulted from a 9.4-percent increase in the minimum wage, which affected the wage increases of the 35 percent of the workforce excluded by the low-wage exemption. There should be less slippage in the pay standard during the second and third program years, because the minimum wage increased by only 6.9 percent in 1980 and will go up by 8.0 percent in 1981; both increases are below the 8.5-percent midpoint of the current pay-range standard. There should be less slippage on the price side as well, because raw-material price increases should be much more moderate as world economic growth slows. Whether the equality of slippage in the pay and price standards can be expected to continue is uncertain.

Once an aggregate level is established, the next step is to compare it to the aggregate base-period price change and then translate that into company-specific price limitations. Thus, for the first two program years, the aggregate two-year price standard was 13 percent; because the aggregate price change during the 1976-77 base period also was 13 percent, the two-year price limitation for each company was set equal to its cumulative price increase over the 1976-77 period.

Similar logic would be followed to establish company-specific third-year price limitations. The three-year aggregate standard would be calculated by compounding the aggregate two-year standard (13 percent) with the aggregate price standard for the third year. For example, if a 7.15-percent standard were chosen for the third year, the aggregate three-year price standard would be 21.1 percent ((1.13×1.0715) -1) x 100).

The difference between the aggregate three-year standard and the base-period rate of price increase compounded over three years (20 percent) would be used as the adjustment factor to calculate company-specific three-year price limitations. Continuing the above example, we subtract 20.0 percent from 21.1 percent to obtain the adjustment factor of 1.1 percentage points. Thus, an individual firm would calculate its allowable three-year price increase by compounding its average annual base-period price increase over three years and adding 1.1 percentage points.

3. The Choice of a Base Period

The logical structure described in subsection 2 implicitly assumes that there is some continuity over time in the differences among companies and industries in their respective productivity and cost trends, and that their relative price changes in the recent past adequately reflect these differences. In other words, the standard assumes that, in general, industries that experienced relatively rapid productivity growth (hence low rates of cost increase and low rates of price increase) in 1976-77 will continue to do so during the program period and that their allowable price increases should be correspondingly lower.

For the first and second program years, we selected the 1976-77 two-year period as the reference period for calculating the price limitation. We excluded earlier years because underlying cost trends had been distorted by the 1974-75 recession and the large energy price increases in 1973-74. We excluded the period since 1977 to avoid penalizing companies that had reduced their rates of price increase in cooperation with the Administration's informal program, announced in January 1978.

These advantages of 1979-77 as a reference period are still valid for the third program year. Moreover, retaining the same base period for the third program year minimizes the administrative costs of the program for both companies and the Council.

There is some sentiment, however, for moving the base period forward on the ground that it would then more closely reflect current cost trends and product mixes. Such a change also would expand the coverage of the program by including products introduced and companies formed during the first two program years.

Nonetheless, incorporating 1978 in the base period would be inequitable, for it would penalize companies that had exercised price restraint under the Administration's anti-inflation program during that period. Incorporating 1979 would be even more unfair; companies that had conscientiously complied with the first-year standards would have relatively lower allowables than those that had not complied. Moreover, if the base period were moved forward enough to encompass the explosion in energy and other raw-material costs, it would be equally unrepresentative for a program period in which the raw-material price increases are expected to abate. Finally, changing the base period would impose additional costs on companies—which would have to recalculate their base-period price changes—and on the Council—which would have to process the revised data.

4. Adjustments of the Base Period

While the base period is suitable for the vast majority of companies, we recognize that in individual instances a company's base period may not adequately represent its normal cost/revenue relationships. We anticipated such problems by providing undue-

hardship and gross-inequity exceptions designed in part to provide relief in the case of unrepresentative base periods. It has, however, taken us more time than expected to formulate criteria for such relief, because of the difficulty of defining criteria that would permit desirable adjustments without opening gaping loopholes.

Toward the end of the first program year, we began making adjustments for unusual and nonrecurring events during the base period—e.g., unusually high start-up costs, floods, fires, and strikes. More recently, we have provided relief for companies whose base—period profits were temporarily depressed because of readily identifiable, transitory, noncyclical developments.

Other criteria for adjusting base periods have been suggested to us but not accepted. For example, some companies have asked that they be allowed to raise their profit margins to an industry-wide average. This would have the effect of substantially increasing the average profit margin, because, of course, every company below the average would move up to it whereas no company above the average would be forced to come down to it. The result of such a universal acceptance of the propriety of catch-ups would be a slippage in the standards so serious as to threaten their effectiveness.

It has also been suggested that base-period adjustments be allowed for any company (or compliance unit) that incurred a loss during the base period. We acknowledge that a loss position cannot typically be representative of a viable long-term operation. Nevertheless, the Council has not automatically made adjustments in such cases, for several reasons. First, it is not necessarily an undue hardship for a compliance unit that is part of a larger company to be in a loss position; many companies may carry nominally losing operations for considerable periods of time for valid business reasons. Second—and more important—it is difficult, if not impossible, to develop workable and

equitable criteria for an adjustment. Zero growth in profits might sound more reasonable than a negative number, but those who object to a negative number would surely object also to zero. Moreover, it is arbitrary to distinguish between companies slightly below and those slightly above zero. The only logical outcome of that process would be something that also has been suggested—that the Council set "reasonable" rates of return for companies with negative—or low—base-period profits. It seems clear, however, that we will not allow ourselves to be drawn into rate-of-return regulation for large segments of the economy.

Although none of the base-period adjustments made by the Council to date have involved the price limitation, we have adjusted program-year price changes to achieve the same result, as in the above-cited cases of airline companies and companies using substantial amounts of gold and/or silver.

We believe that adjustments of base-period data will be increasingly important in the third program year, because the inequities caused by unrepresentative base periods cumulate the longer companies are constrained by their base-period performance. We therefore strongly urge public comments on possible ways of accomplishing this without gutting the standards.

5. The Range of Allowable Price Increases

During the first program year, a company's average price increase was not held below 1-1/2 percent, and not permitted above 9-1/2 percent, whatever its base-period rate of price change. In the second year, we narrowed that range to avoid inequitable treatment of firms with very low base-period rates of change without unduly relaxing the

standard; specifically, we set the price band at 3-1/2 percent to 8-1/2 percent for the second year alone. Because the second-year standard was a cumulative two-year limitation, the range of allowable price increases for the two years was 5 percent to 19 percent.

To determine the range of allowable price increases for the third year, it is instructive to examine the relationship between alternative ranges and levels of the aggregate price standard. Clearly, raising (lowering) either of these bounds increases (decreases) the aggregate price standard. Table 9 shows the level of the aggregate price standard for various values of the upper and lower bounds, assuming that the allowable rate of increase is set equal to the base-period rate of increase (of course, subtracting a "deceleration" factor would lower each value in the table by the amount of the deceleration factor). The constructed values are based on a sample of 727 compliance units.

Changing the bounds within moderate ranges has little effect on the aggregate price standard. For example, the change in the bounds from 1-1/2 percent and 9-1/2 percent in the first year to 3-1/2 and 8-1/2 percent in the second year had no effect on the aggregate price standard; both pairs yield an aggregate price standard of 6.27 percent (assuming no change in the deceleration factor). Note also that this figure differs little from the aggregate price standard with no upper or lower bound (6.35 percent).

Table 9 Relationship Between Alternative Ranges of Allowable Price Increases and the Aggregate Price Standard $\underline{1}/$

			ernative	Upper B	ounds		
	Bo	Upper und <u>9.</u>	5 9.	0 8.	<u>5</u> 8.	.0 7	<u>. 5</u>
	No Lower Bound	.4 6.	1 6.	1 5.	9 5.	. 8 5	. 5
Ä	1.5 6	.5 6.	3 6.	2 6.	1 5.	9 5	. 7
ower		.5 6.					.7 .7
ternative L Bounds	3.0 6	.6 6.	4 6.	3 6.	2 6.	.0 5	. 8
		.7 6. .8 6.					.9
	4.5 7	.0 6.	8 4.	7 6.	6 6.	.4 6	. 2
	5.0 7	.2 7.	0 6.	9 6.	8 6.	. 6 6	. 4
1							

Based on a sample of 727 compliance units with total sales of \$284 billion. The entries in the matrix are levels of the aggregate price standard, assuming no deceleration or acceleration from the base period.

Of course, the upper and lower bounds are not used to set the aggregate price standard; rather, they are intended to change the distribution of allowable increases for reasons of equity. The number of compliance units affected by changes in the range can be determined by reference to the cumulative distribution in Table 10. For example, raising the lower bound from 1.5 percent to 3.5 percent increased the proportion of units affected from 14 percent to 25 percent, but lowering the upper bound from 9.5 percent to 8.5 percent decreased the proportion of units affected from 86 percent to 77 percent.

Table 10

Cumulative Distribution of Compliance Units by Base-Period Rate of Price Change 1/

Base-Per	iod	Percentage of
Rate of	Price Change	Compliance Units
less than 0.0 0.5 1.0	0.0 0.5 1.0 1.5 2.0	8.6 10.1 12.1 14.3 17.5
2.0	2.5	19.7
2.5	3.0	22.2
3.0	3.5	25.3
3.5	4.0	27.3
4.0	4.5	30.3
4.5	5.0	35.7
5.0	5.5	41.2
5.5	6.0	45.8
6.0	6.5	52.6
6.5	7.0	58.5
7.0	7.5	64.0
7.5	8.0	70.2
8.0	8.5	77.1
8.5	9.0	81.6
9.0	9.5	86.0
9.5	10.0	86.6
10.0	10.5	87.9
10.5	11.0	88.8
11.0	11.5	89.3
11.5	12.0	89.3
12.0	12.5	90.0
12.5	13.0	90.8
13.0	13.5	91.4
13.5	14.0	92.1
14.0	14.5	92.4
14.5	15.0	92.6
15.0	15.5	92.8
15.5	16.0	92.9
16.0	16.5	93.5
16.5	and above	100.0

 $[\]underline{1}/$ Based on a sample of 727 compliance units with total sales of \$264 billion.

6. One-Year versus Cumulative Standard

There are essentially two choices for the design of the third-year price standard:

(1) a one-year limitation on price increases, measured from the fourth quarter of the second program year to the corresponding quarter of the third year; or (2) a cumulative three-year limitation, measured from the calendar or fiscal quarter immediately preceding the first program year (the base quarter) to the corresponding quarter in the third program year. A variation of the second approach would be to have a three-year cumulative limitation but to use the fourth quarter of a company's second program year as its base quarter for calculating its third-year increases.

A one-year limitation, by making the third-year limitation independent of actual and allowable increases in the first two program years, would eliminate complexities caused by the need to link changes in prices, gross margins, or profits of compliance units that comply with different standards in different years. It also has the advantage of moving the base quarter closer to the program year. This would expand the coverage of the program because it would permit the inclusion of products introduced, and companies formed, during the first two years. In addition, because the base-quarter product mix is used to calculate program-year price increases, using a more recent base quarter should reduce problems created by changes in product mix since the third quarter of 1978. However, a one-year limitation would penalize companies that did not increase prices as

much as their allowable during the first two years, and obviously benefit those who exhausted—or exceeded—their two-year allowables. This would, in turn, provide incentives for companies to use all of the allowable increases in subsequent periods—an inflationary outcome that the Council is determined to avoid.

A cumulative three-year limitation has the advantages of familiarity and continuity; most important, it does not penalize those who did not use all of their allowables. Also, as noted above, it is possible to have a three-year cumulative standard and designate the fourth quarter of the second program year as the base quarter for calculating the third-year price increases, thus permitting coverage of new products and companies and the use of more current product mixes. Incorporation of that property into a <u>cumulative</u> (as opposed to a one-year) standard would thus combine the principal advantages of one-year and three-year limitations.

7. Changes in the Profit Limitation

During the first two program years, a profit limitation was available to compliance units unable to comply with the price limitation or other price standards because of an inability to calculate price changes or gross margins or because of uncontrollable increases in the prices of purchased goods and services. It was essential to have an alternative limitation available because large numbers of compliance units were faced with mounting cost pressures during 1979 and 1980.

The profit limitation is intended to constrain increases in price approximately to the increases in costs (thus preserving income shares). The second-year limitation consists of two tests, both of which must be satisfied. The first, which is unchanged from the first year, is that the profit margin for the second program year should not

exceed the sales-weighted average profit margin for the best two of the compliance unit's last three fiscal years completed before October 2, 1978. The second test, which was tightened for the second program year, is that the compliance unit's secondprogram-year dollar profits should not exceed its base-year profits by more than 13.5 percent plus any positive percentage growth in physical volume from the base year to the second program year. Base-year dollar profits can be either (i) actual base-year profits or (ii) base-year revenue times the average of the base-year profit margin and the besttwo-out-of-three-year average profit margin. In the first year, compliance units were allowed to use the full best-two-out-of-three-year profit margin in calculating base-year dollar profits, rather than having to average it with the base-year profit margin. We estimate that the asymmetry inherent in both of these definitions of base-year profitsallowing companies an upward adjustment if their base-year margin is below the best two out of three (effectively allowing "catch-up"), but not requiring a downward adjustment if the base-year margin is above the best two out of three-resulted in potential slippage a little less than half a percentage point. Companies that qualified for the profit-margin limitation were allowed to increase prices, on average, by an additional 1.3 percentge points because of the optional adjustment of base year profits. Weighting this slippage by the revenue share of companies under the profit-margin limitation, we obtain the above estimate of potential overall slippage (for all companies). Of course, the actual slippage was less than the potential because market conditions did not allow all companies to capitalize fully on the catch-up allowance. The second-year revision cut this potential slippage in half.

Extent of "catch-up"

The extent to which the dollar-profit test permits a partial "catch-up" continues to be a matter of concern. As noted above, it grants some compliance units more than a passthrough of costs plus the stipulated percentage growth in profit. It may, therefore, be desirable to modify the profit limitation further by eliminating the alternative calculation, by simply reducing the amount of allowable "catch-up" from 50 percent to some lesser number, or by making the adjustment mandatory (requiring downward as well as upward adjustments).

b. Choice of the base period

During the first two program years, a compliance unit could choose any two of the last three fiscal years before October 1978 as its base period for profit calculations. We recognize that this period necessarily includes at least part of 1975, a recession year, and could include part of 1978, during which an informal anti-inflation program was in effect. Nevertheless, the two-out-of-three option eliminates the adverse effect of any unusual profit margin that might have occurred during one year of this period.

As with the base period for price calculations, the base period for the profit limitation could be moved forward. This, however, would create the same inequities as would a shift in the base for the price limitation, and would not necessarily better reflect current cost trends. In individual cases where the base-period results are clearly unrepresentative of normal operations and produce serious inequities, we have made adjustments (see Section 4), and will continue to do so.

c. Requiring volume adjustments

As currently drafted, the profit limitation provides for an upward adjustment of program-year dollar profits if a compliance unit experiences an increase in physical volume. If volumes decline, however, a compliance unit need not make any downward adjustment. Whether or not the standard should be symmetric—that is, an adjustment for volume be made mandatory in both directions—may be significant in the third program year, because significant declines in sales volumes are likely to take place during the recession. The principal problem with a mandatory volume adjustment is that many companies cannot readily develop physical volume indexes; indeed, many are under the profit limitation for precisely this reason.

d. Treatment of interest expense

The definition of profit under the profit limitation includes interest expense—that is, interest must be added to profits in calculating the profit margin. The principle underlying this requirement is neutrality with respect to alternative forms of capitalization. That is, we wanted to avoid favoring one form of financing over another, and excluding interest expense (i.e., treating it as a cost, which can be passed through) would favor debt, as opposed to equity, financing. This approach had profound

implications for many companies complying with the profit limitation because of the surge in interest rates during 1979 and early 1980. Particularly affected were retailers, who typically incur large short-term debt to finance inventories and accounts receivable; companies with primarily long-term debt—principally for capital investment—are less affected by short-term fluctuations in interest rates.

Two alternatives to the Council's approach have been suggested: (1) excluding all interest expense and (2) excluding short-term interest expense. As we have observed, the first of these would discriminate against equity financing (although many would contend that neutrality requires inclusion of rental expense as well as interest expense to avoid discriminating against companies that purchase—rather than rent—structures). The second alternative was adopted in the Nixon Administration's Economic Stabilization Program and seriously disrupted capital markets by creating incentives for short-term financing of even long-term capital projects.

Finally, the sharp downturn in interest rates, which is expected to continue throughout the recession, should make this issue less pressing in the third year. Nonetheless, we solicit public comment on this question.

e. Adjustments for productivity

In designing the standards, we have been cognizant of the danger that government interventions like this one can cause inefficiencies. We have been particularly concerned about possible inhibitions of incentives to engage in productivity-improving capital investment. This is a matter of special concern because productivity growth is an effective antidote to inflation, in that it provides a buffer between increases in labor compensation and increases in unit labor costs. Indeed, the recent collapse of productivity growth has been an important contributor to our current inflation problem.

Our concerns are manifested in the standards in various ways, the most important of which is the selection of the price limitation, rather than cost-passthrough, as the basic standard. As we have already observed, companies that meet the basic price test reap the fruits of higher productivity growth in the form of higher profits. On the other hand, cost-passthrough limitations—whether of the profit-margin or gross-margin variety—dilute companies' incentives to engage in costly projects that could improve productivity, for two reasons. First, in many instances, those standards permit passthroughs of the costs that the projects might save. Second, investment prospects may require wider profit or gross margins if the additional investment is to be profitable, or even feasible.

Unfortunately, universal reliance on a price limitation is not feasible because of the need for relief for companies experiencing uncontrollable cost increases. As a result of the world-wide explosion of raw-material costs in 1979 and 1980, many companies were forced to resort to the alternative profit limitation. In addition, gross-margin standards—which provide for passthrough of some, but not all, costs—were developed for certain industries with highly volatile material input costs.

Those who contend that the profit-margin and gross-margin standards have, in fact, inhibited capital investment have suggested that a special adjustment to allowable margins be made for improvements in productivity. In fact, the mix adjustments currently available under the gross-margin standard for petroleum refiners partially compensate for investments that result in changes in the mix of feedstock inputs or refined products. This procedure, and modifications of it, are considered in subsection 9c. Similar adjustments could be applied more generally.

If adjustments were made for every capital investment program or for every improvement in productivity, however, the restraining effect of these alternative limitations would be severely weakened. Moreover, such adjustments would discriminate against companies in industries where the opportunity for substitution of capital for other inputs and/or for productivity improvement is relatively limited. In some hightechnology industries, rapid productivity growth is commonplace; in other industries the technology simply does not lend itself to appreciable improvement. Nevertheless. because of the paramount social importance of revitalizing productivity growth, we modified our procedures at the beginning of the second program year to provide that, when the Council grants a request for approval of an exception, it may modify the exception to make allowances for documented extraordinary improvements in productivity that are demonstrably attributable to unusual capital expenditure programs. We anticipated that such a provision would produce a variety of requests, on the basis of which we could formulate criteria that could contribute to productivity growth without producing unacceptable slippage in the program. It elicited only a handful of requests, however-all of them received only recently.

8. Excluded Products

Agricultural, fishing, forestry, and mineral products falling within specified groups in the 1972 Standard Industrial Classification Manual were excluded from the program during its first and second years. The reason for providing an exclusion was, in the case of most of these products, that their prices are set in competitive markets, in which sellers have little control over prices and in which price ceilings might possibly give rise to damaging shortages. The reason for relying on the SIC manual is that its classification scheme is well-known, well-understood, and easily administered.

While we are confident that the broad policies underlying both the exclusion and our reliance on the SIC manual are sound, we invite comment on whether the provision should be redrawn to include products now excluded or to exclude products now included.

9. Modified Price Standards

We developed the modified price standards as alternatives for industries for which the price standard is unsuitable. This is the case where (1) price-change indexes are too difficult or burdensome to compute, (2) raw-material costs are highly volatile, or (3) market characteristics necessitate special treatment. Modified standards are available for a number of kinds of companies, including retailers and wholesalers, food manufacturers and processors, petroleum refiners, electric, gas, and water utilities, insurance companies, professional firms, and financial institutions. A discussion of suggested revisions of some of the modified standards follows (no issues have yet been identified for the insurance (705.48 and 705.49), financial-institution (705.50), professional-fee (705.46), and government (705.47) standards, but comments on these standards are, of course, welcome).

a. Retailers and wholesalers

The most controversial aspect of the percentage-gross-margin standard is the provision that allows companies whose percentage gross margins grew during the base period to continue their expansion at the same rate during the program period, but restricts companies whose margins were not growing to the base-year percentage.

Allowing the percentage gross margin to increase has been criticized by some. The Council adopted this policy because equal deceleration in the rate of growth of dollar gross margin per unit of output and in the prices of goods purchased for resale implies no change in the rate of growth of the percentage gross margin. Had all companies under this standard been restricted to a constant percentage gross margins, the allowable margin during the first year would have been 25.59 percent, 0.49 percentage point below the actual allowable.

Some retailers and wholesalers, on the other hand, argue that compliance units with zero or negative margin trends should be allowed a minimum positive trend—e.g., an allowable increase of one percentage point. Such a positive floor for the percentage-gross-margin trend has been likened to the 5-percent floor for the allowable two-year price limitation. The analogy is not apt, however, because constancy of the percentage gross margin entails a positive growth in dollar gross margin per unit (and in prices charged) so long as the prices of goods purchased for resale are going up.

The Price Advisory Committee has suggested that the Council allow a company to choose between (1) continuing to project a positive margin trend or (2) having a dollar-for-dollar passthrough of the amount by which its program-year interest costs exceed its base-year interest costs. This suggestion was prompted by concern that the explosion in interest rates in late 1979 and early 1980 had a particularly profound effect on compliance units subject to the percentage-gross-margin standard. As noted above, the current decline in interest costs should make this less of a problem in the third program year. Nevertheless, the Council invites comment on the issue. Commentators should take note of the fact that the provision of alternatives necessarily introduces additional slippage into the standards, because companies inevitably select the one that allows them the greater price increases.

A separate question that has been raised is whether the Council should specify all of the items to be excluded in calculating gross margin. Currently, under the percentage-gross-margin standard, the retailer/wholesaler gross margin is defined as net sales less the cost of goods sold. Some firms apparently include within the cost of goods sold certain items, such as warehousing and transportation costs, that others do not. Although consistency is desirable, there are so many accounting variations among companies and among industries that the Council could not conceivably specify with the precision desired the elements of costs to be excluded in calculating gross margin. We, therefore, solicit suggestions for other alternatives.

b. Food manufacturers and processors

Some food processors and manufacturers have repeatedly asked to have the cost of other items besides the food used in their operations excluded in calculating their gross margin. The alternative gross-margin standard was provided to these companies, however, because of the volatility of farm prices; that is why only the cost of food products used in food manufacturing and processing is excluded in the calculation of gross margin. The processors argue that there are several other elements of uncontrollable costs that are sharply rising and should therefore be passed through; they point specifically to packaging, interest, and energy.

The Council has provided special gross-margin standards to some industries so as to avoid the full cost-passthrough provisions of the profit limitation. The more items that are excluded from the gross margin, the less incentive there is for companies to substitute inputs whose prices are going up more slowly for those whose prices are going

up more rapidly—the more, that is, the gross-margin standard takes on more of the infirmities of a profit limitation. Moreover, the profit limitation is available to individual food processors (as well as other companies) that experience particularly large and uncontrollable cost increases.

To the extent that rapidly rising costs of items not excluded under the gross-margin standard are a major problem, an alternative to excluding these specific items from the gross margin would be to raise the allowable growth of the gross margin. This might provide the requested relief, while avoiding the cost-plus character of the other proposed remedy. The Price Advisory Committee has recommended that the Council seek from the industry documentation of the extent of the problem.

c. Petroleum Refiners

We developed a gross-margin standard for petroleum refiners for the same reason as for food processors and manufacturers: their raw-material costs are large and highly volatile. Unlike the other standards, however, we reviewed and substantially modified this one after the beginning of the second program year. At that time, we required refiners to disaggregate refining and marketing operations from all other operations for purposes of compliance. In addition, we tightened the standard by (1) expressing the limitation in terms of the gross margin per barrel, which has the effect of lowering allowable dollar gross margins if volumes decline, (2) making the output-mix adjustment mandatory, which eliminates an option, and thereby cuts down slippage, (3) specifying more clearly that only the cost of goods sold may be deducted from revenues in computing the gross margin (that is, costs of crude oil and refined product placed in

inventory must not be subtracted from revenues in this calculation), and (4) making the intermediate (quarterly) limitations more restrictive than the end-quarter (two-year) limitation. Finally, we stipulated that, effective January 1, 1980, the cost of process fuel used in refinery operations should be subtracted from revenue in calculating gross margins.

This review and modification resolved many of the questions that had arisen during the first program year and that were analyzed in the Council's report, <u>Petroleum Prices and the Price Standards</u>, released February 25, 1980. Nevertheless, several important issues remain, particularly with respect to the relationship between the petroleum-refiner standards and national energy objectives. In a report released on May 30, 1980, <u>The Council's Petroleum-Refiner Standards</u>, we concluded that the standards strike a reasonable balance between energy goals and restraining inflation, but pledged to continue to review outstanding issues and to develop policy options for the third program year. The two principal areas of concern are (1) investment and energy-conservation incentives and (2) the choice between a quarterly and an annual gross-margin standard.

(1) Investment and Energy-Conservation Incentives

It has been asserted that, by limiting gross margins (which include capital and other non-petroleum costs), the petroleum-refiner standard inhibits incentives to invest in expanded or upgraded refinery facilities (e.g., facilities that produce the same or a lighter mix of products with heavier or source crude oil), and that, more generally, it may discourage investments or processes that entail costs that have to be recovered in the gross margin. Of course, constraining price increases always runs the risk of inhibiting investment incentives, and any partial cost-passthrough standard creates incentives to

favor the use of inputs whose costs are passed through. There has been no documentation, however, that the gross-margin standard has significantly curtailed investment expenditures or unduly interfered with energy conservation efforts. This may be because of the availability of input- and output-mix adjustments of refiner margins, which at least partially compensate for changes in non-petroleum costs (including capital costs) associated with changes in the mix of inputs or outputs. Nonetheless, we recognize that possible interference with investment incentives and energy-conservation efforts would become more serious the longer the voluntary standards remain in place. Consequently, we are requesting public comment on the following possible revisions to the petroleum-refiner standard.

Alternative mix adjustment. With the mix adjustments required under the current gross-margin standard, the base-period margin is calculated using the program-quarter (current) proportions of input and output quantities. This procedure compensates refiners for mix-induced changes in non-petroleum costs (including capital costs)—that is to say, it gives them credit for shifts to less costly crude-oil inputs and to more valuable outputs—to the extent that the base-period price differentials reflect current cost differentials. It has been suggested, however, that this last condition is not being met, and, as a result, that the refiners' standard discourages investments that would enable refiners to adjust to a relative decline in lighter crude supplies and a relative increase in the demand for lighter products.

An alternative procedure that would correct for these deficiencies—to the extent they exist—would be to calculate the program-period gross margin using base-period quantities, rather than adjusting the base-period margin using current quantities. The program-period gross margin would thus be the difference between (1) revenues that would have been earned (at current product prices) on the mix of products sold during the

base period and (2) the input costs that would have been incurred (at current input prices) on the mix of inputs used during the base period. Any increases in actual revenues attributable to a change in the mix of sales toward higher-valued products would thus not appear in the constructed (mix-adjusted) revenues. Similarly, any decrease in costs attributable to a change in the mix of inputs toward lower-valued ones would not appear in the constructed (mix-adjusted) costs, and therefore the resultant savings would not show up in the constructed program-period gross margin. In other words, refiners would retain the benefits of investments, conservation efforts, or other measures that improve the productivity of refining operations—i.e., that produce higher-valued products from lower-cost inputs. (See Appendix B for a numerical example that compares these two procedures.)

To the extent that this alternative procedure encourages investment more than the current procedure does, the resultant increase in refinery productivity would tend to compensate for the reduced price restraint. To the extent that it merely provides windfall gains for investments that have already been made or that would take place in any event, there would be no offsetting advantage. One way to help ensure the former result would be for us to commit now to use such a procedure only in later program years (if any), when investments being considered now would be coming on line.

Mix adjustments with an updated base period. Any mix-adjustment procedure necessarily entails the use of the same quantities in computing the base- and program-period gross margins. The alternative mix adjustment described above holds quantities constant at their base-period levels, so as to eliminate inadequacies in the adjustment attributable to obsolesence of the relative base-period prices of different kinds of crudes and products. (When quantities are held constant at current-period levels, the mix

adjustment uses <u>base-period</u> prices, because in this event it is the base-period gross margin that is a constructed rather than an actual one. Conversely, when quantities are held constant at <u>base-period</u> levels, the mix adjustment uses <u>current-period</u> prices, because the current-period gross margin is the one that is constructed—not actual.)

Under either the current or the alternative mix adjustment procedure, a related issue is whether the base period should be updated periodically. Under the alternative mix adjustment, this would have the effect of updating the quantities used in the mix adjustment. Under the current mix adjustment, this would have the effect of updating the prices used in the mix adjustment.

Under either method, whether updating the base would permit greater price increases depends on changes in relative prices and relative quantities. Individual refiners, of course, might be disadvantaged by the selection of a new base period, just as they may have been disadvantaged by the choice of the original base period. In either case, however, exceptions may be available for companies whose compliance is measured against an unrepresentative base.

Volume decreases. The alternative mix-adjustment procedure described above is designed to encourage improvements in productivity. A separate, but related, issue is whether allowable dollar gross margins should change as volume changes (which in many cases results in productivity changes). In the first program year, we permitted refiners to increase their dollar gross margin to reflect increases in volume. In the second program year, we extended this principle to volume declines, by expressing the limitation in terms of the gross margin per barrel.

Some refiners have argued that, since fixed costs (which constitute most of the gross margin) do not decrease with decreases in volume, the per-barrel calculation unduly restricts their profits. By the same token, of course, the standard rewards productivity increases that arise when volumes increase. Absent a compelling reason to the contrary—which we have not yet seen—we will probably conclude that the objectives of the anti-inflation program are best served by symmetric treatment of changes in volume.

(2) Quarterly versus Annual Standard

In the first program year, the refiners' gross-margin standard compared program quarters with a base quarter. In developing the second-year standard, we proposed instead that the "base-quarter gross margin" be the average quarterly gross margin in the base year. On the basis of public comments, we reverted to the base-quarter measure used during the first year.

It is now being suggested that the Council should move to an annual standard for the program year. Some refiners have argued that, with a quarterly standard, the timing of crude-oil and product acquisitions takes on undue importance because the acquisition costs in each quarter affect the allowable prices that can be charged only in that quarter. This may occur even if the acquisitions are placed in inventory, because under customary accounting practices transitory changes in crude-oil and product inventories can affect costs of goods sold. Accordingly, the refiners conclude, a quarterly standard may thwart inventory accumulation objectives or encourage perverse pricing patterns. A quarterly standard also raises problems when there are retroactive crude-oil price increases (like the ones we experienced last winter) and when firms make annual, but not quarterly, inventory-valuation adjustments.

If we were to adopt an annual program-year gross-margin limitation, we would also consider making the base-period an annual, rather than a quarterly, measure. Conversion to an annual standard would also reduce the likelihood of unrepresentative base-period margins.

d. Electric, Gas and Water Utilities

When the standards program was first announced, there was much thought given to excluding rate-regulated public utilities because utility prices are already regulated by various state and local public utility commissions (PUCs) as well as by several Federal agencies. On the other hand, prices charged by some utilities (e.g., power and gas) had recently increased substantially and it was thought that exclusion of such a prominent part of the economy would be undesirable in view of the economy-wide nature and urgency of the inflation problem. Our solution was to recognize the primary role of the State and local PUCs by asking them to administer our standards, while also delegating to them the responsibility for granting exceptions. This division of labor was intended to minimize the administrative costs of the standards program for utility companies and, at the same time, to ensure that the objectives of the President's anti-inflation program would be considered by the PUCs in their deliberations.

During the past year, there has been renewed interest in excepting utilities from the standards program. It has been argued that the standards are at best duplicative and at worst inconsistent with the approaches and/or criteria used by PUCs in evaluating rate-increase requests. Public comment on this threshold question would be very useful.

Assuming that a standard for utility companies will be a part of the third-year program, we should consider whether it should be modified to make it more compatible with the regulatory practices of the PUCs. A relatively minor change would be to allow utilities the option of using either the Council's base and program years or the test year used by the PUCs. Those who choose the latter would not have the additional computation costs required to demonstrate compliance with the Council's standard. On the other hand, the transition to a different program period would itself raise administrative and computational problems. In addition, allowing companies a choice between alternatives introduces additional slippage in the standards.

A more substantial endeavor would be to recast the standard to coincide more closely with the standards typically used by PUCs. This was the spirit of the Council's recent revision of the gross-margin standard for electric and gas utilities, permitting them either to include in the base-year margin the allowance for funds used during construction of plant not yet in service, or to exclude from the program-year margin a part of the additional revenue requirements attributable to the entry of new plant in service or construction work in process into the rate base.

The ultimate revision would be for the Council simply to defer to the PUC's, not merely in the administration of its standards, as at present, but also in the standards to be applied. The purpose of this change, as of those already made, would not be to weaken price restraint on utility companies, but only to recognize that PUC's already have the legal responsibility to restrain rate increases in the public interest, and that the superimposition of the Council's standards could be either redundant or a kind of double regulation to which no other industries are subject.

The fact remains, however, that, to the extent that the Council's standards have an additional constraining influence, removing them would constitute a relaxation of the standards. We invite comments on these possibilities.

10. Company Organization

At the beginning of the first program year, firms were given considerable latitude (subject to certain accounting restrictions) in organizing themselves for compliance purposes; some chose to report to the Council as one integrated unit, and others disaggregated themselves into separate compliance units. We afforded such latitude largely to hold down companies' compliance costs and to accommodate firms with operations in several different sectors of the economy that are subject to vastly different economic forces.

At the beginning of the second program year, we allowed companies to reorganize themselves for compliance purposes, thus allowing them to respond to internal changes, altered economic circumstances, and simple mistakes in choosing compliance structures. We recognized that this would permit firms to group different portions of their operations in ways that allowed access to various exceptions. While this freedom created some slippage in the price standards, we believed the amount involved would probably not be significant, particularly since we did not generally permit reorganization during the program year.

We must now confront the question of whether firms should again be permitted complete latitude (subject to certain accounting criteria) to reorganize for the third program year. The pros and cons have not changed from last year. Accordingly, at this time we are leaning torward permitting such reorganization between program years, but not allowing reorganization within the year.

Assuming that company reorganization is permitted between the second and third program years, we are considering (at the suggestion of some) whether to require some disaggregation for compliance purposes in the third year. The ability of highly diverse firms to report as a single unit has made it difficult for the Council to obtain industryspecific data from major producers in industries exhibiting high inflation rates and to monitor effectively and equitably different companies operating in the same industry. Equally important, the flexibility in company organization has created inequities among companies in their access to modified price standards and in their ability to comply with the price standards. An example of the first situation is that a company with 50 percent or more of its revenues derived from food manufacturing or processing may report all of its operations under the food-processing gross-margin standard, while a company with 49 percent of its revenues derived from these activities would have to disaggregate in order to place its food-processing operations under that standard. An example of the second (and more serious) type of inequity arises from the fact that a conglomerate reporting on a consolidated basis might be able to offset high price increases in one area of its operations with low price increases in another; as a result it might be able to comply more easily than a company that operates only in the industry with large price increases.

Nonetheless, specifying ways for companies to disaggregate for compliance purposes has several problems. Obviously, it reduces their discretion to adopt the organizational structure they consider most suitable. It might disrupt their established frameworks for managing their business activities, or impose additional reporting burdens. It also would be difficult to specify the types of acceptable or unacceptable disaggregations. Most important, it would reduce the flexibility to adjust relative prices in response to changing market conditions—a feature of the price standard that promotes economic efficiency.

One approach would be to require disaggregation (as long as the accounting criteria are met) to the level of the major economic sectors as defined in the Standard Industrial Classification Code (e.g., agricultural production; mining; construction; manufacturing; transportation, communication, and utilities; wholesale/retail trade; finance, insurance, and real estate; and services). Another possibility would be to require a company applying a modified price standard to disaggregate the affected segment of its operations as a separate compliance unit. Finally, we could approach this problem on a case-by-case basis by placing suitable organizational-structure restrictions on grants of exception.

The flexibility accorded to companies in organizing for compliance purposes also can be used to shield the parent company from the adverse publicity of a noncompliance action against one of its compliance units. To increase the incentives for compliance, the Council is considering listing the parent as well as the particular compliance unit.

The Council solicits public comment on all of these issues of company organization.

11. Self-Administration of Uncontrollable-Cost Exceptions

The great majority of exception requests during the first two years have been based on uncontrollable cost increases. This is an area where the Council has over time refined the criteria both for eligibility and for the documentation needed to demonstrate it. In fact, by the time we promulgated the second-year price standards, these criteria were so well developed that they could have been incorporated directly into the standards. If that had been done, it would have had the effect of authorizing companies that satisfied the eligibility criteria to self-administer the exception, just as companies eligible for some of the modified standards for selected industries are able to choose them.

Not only has the Council had two years of experience with administering this exception, but the companies as well have undoubtedly developed a good understanding of the Council's approach to these cases. This is evidenced by the fact that most requests for this exception are now routinely approved, although there are still a significant number of cases where insufficient data are provided.

Because of these developments and because we maintain an interest in reducing compliance burdens, we are considering allowing companies to self-administer uncontrollable-cost exceptions during the third program year. One disadvantage would be the greater likelihood that companies would self-administer exceptions to which they were not entitled, although this danger could be minimized by requiring companies to notify the Council when they self-administer the exception and to submit supporting documentation. An intermediate approach would be to permit self-administration of uncontrollable-cost exceptions only by companies that had already received Council approval during the second program year, on the ground that they are likely to be eligible, and presumably are relatively familiar with the technical questions involved.

12. Price Prenotification

We assess compliance with the standards after price increases have been put into effect. Price increases that exceed the standards come to our attention mainly when companies file their quarterly compliance reports. We might, however, improve the program's effectiveness if we assessed compliance before price increases took place, because companies typically are more willing to modify prospective increases than to take after-the-fact corrective action—which may involve price rollbacks. In addition, if we asked companies to notify us before they increased prices, it would facilitate rapid resolution of possible misunderstandings or misinterpretations of the standards and encourage companies to maintain a closer and more current check on their compliance posture.

Such considerations provided the rationale for the orice prenotification program that the President announced on March 14. Because it is so late in the second program year, the Council will not initiate a prenotification program this year, and is using this <u>Issue Paper</u> to solicit comments on whether there should be a program for the third year and, if so, what it should look like.

The program that the Council is considering would be selective and voluntary, seeking prenotification only where the benefits in improved price restraint clearly outweigh the heavier reporting burdens. Prenotification would not be used to delay or to suspend proposed price increases, as it was in the Nixon Administration's Economic Stabilization Program; the Council does not have statutory suspend-and-delay authority and will not seek it. To the extent that the Council's intentions are misunderstood, a prenotification plan may lead to anticipating price increases that will diminish any benefits of the effort.

The number of companies asked to prenotify would be kept small to limit the reporting burden and to assure timely Council responses. Possible criteria for selection are (1) problem sectors, (2) basic or key industries, (3) company size, (4) price leadership, (5) degree of industry concentration, (6) historical industry pricing practices, and (7) homogeneity of product lines.

To help develop a prenotification program, the Council has consulted a number of outside groups; these have raised a number of problems with which we are still grappling. First, because businesses often do not know the exact size of a price increase until shortly—days or even hours—before the increase is implemented; therefore, it could be hard to prenotify with sufficient lead time. Second, because of differences in company pricing policies, different lead times would be appropriate for different companies; even pricing within a company can vary from region to region and product to product. Third, because data for prenotification are not kept in the ordinary course of business, projecting compliance would involve additional administrative cost. Because of the difficulties involved in developing a workable prenotification program, the Council strongly urges comments on this issue.

Appendix A. Detailed Analysis of Company-Specific Pay Data

This appendix provides more detailed breakdowns of the company-specific pay data issued in Section II-B.

In Table A-I, we provide the base-period and program-period data that were used in calculating the unadjusted and adjusted pay-rate increases shown in Table 4. The pay-rate increases shown at the bottom of the table can be calculated by dividing the appropriate program-period level by its corresponding base-period amount in the upper half of the table.

The nature of the adjustments and exceptions for the program period that were used in calculating the overall statistics in Table A-I are shown in more detail in Table A-II. For each category, we present the percentage of workers who received the adjustments and, for those workers, the increase in the dollar adjustment over the comparable adjustment for the base period and, the percent of the workers' base year pay that these net adjustments represent. In addition, we show the magnitude and percentage amount that these adjustments represent on average for all workers, including those who received no adjustments (i.e., the weighted hourly adjustment).

Although the implications of the patterns were discussed earlier in the report, some additional explanation of the adjustment categories is helpful in interpreting the results.

A-1

TABLE A-I

PAY-1 buta

Components of Hourly Pay 1/
(In dollars)

Рау Сопроценц	All Workers 2/	Collective Bargaining Units 2/	Monagement Units	Other Units
Namber of Pase-Period Reporting Workers	7,430,162	1,399,054	2,415,395	3,615,713
Percent of Pase-Period Reporting Workers	100.0	18.8	32.5	48.7
Rose Period (IP) IV (Inadjusted Hourly Pay Note IV (Inadjusted Wages and Salaries IV (Inadjusted Hourly Cost of Incentive Pay IV (Inadjusted Hourly Cost of Renefits IV Total Adjustments IV Adjusted Hourly Pay Note	11.34	12.16	14.44	8.96
	8.70	8.49	11.23	7.09
	0.42	0.13	0.77	0.29
	2.23	3.54	2.44	1.58
	0.11	0.01	0.16	0.11
	11.23	12.16	14.28	2.85
A - 2	Pirst Year Annualized	First Year Annualized		
Program Period (PP) PP Unadjusted Hourly Pay Hate PP Unadjusted Hourly Wages and Salaries PP Unadjusted Hourly Oust of Incentive Pay PP Unadjusted Hourly Oust of Benefits PP Total Adjustments PP Adjusted Hourly Pay Rate	12.20 12.15	13.51 13.24	15.40	9.55
	9.37 9.34	9.40 9.24	12.02	7.59
	0.41 0.41	0.14 0.13	0.77	0.28
	2.41 2.39	3.96 3.87	2.62	1.67
	0.26 0.24	0.38 0.26	0.29	0.19
	11.94 11.91	13.13 12.98	15.11	9.36
Unadjusted Pay-Rate Increase (%)	7.6 7.1	11.0 8.9	6.8	6.6
Adjusted Pay-Rate Increase (%)	6.3 6.1	7.9 6.8	5.8	5.6
Unadjusted Minus Adjusted Increase (%)	1.3 1.0	3.1 2.1	0.8	0.8

^{1/} The percentage increases are obtained by averaging across employee units, using base period employment as weights.
Components may not add to total because of rounding.

^{2/} Pay increases for collective bargaining units are calculated in two ways: The first-year calculations represent the costs of the first year of collective-bargaining agreements, negotiated during the program period, while the annual-average data periain to the (geometric) average annual rate of increase over the life of the contract. Because of front loading, first-year estimates for uniti-year contracts are usually larger than the annual averages.

TABLE A-II

Program Period
PAY-1 Data Adjustments 1/

Adjustment Category		All Workers	Collective 2/ Dargaining Units	Monagement Units	Other Units
Total Program-Year	Percent of Reporting Workers Affected	53.2	85.8	47.7	44.2
Ad Justment	Hourly Adj. per Affected Biployee: Dollars	0.23	0.31	0.27	0.18
•	Percent	2.0	2.5	1.9	1.9
	Weighted Hourly Adjustment: Dollars		0.26	0.13	0.08
	Percent	1.1	2.2	0.9	0.9
Incentive Pay/Sales	Percent of Reporting Workers Affected	6.6	0.6	10.0	6.6
. Cumission Overages	Hourly Adj. per Affected Employee: Dollars	0.05	0.01	0.06	0.06
Attributable	Percent	0.7	1.3	0.4	0.7
to Higher Votume	Weighted Hourly Adjustment: Dollars	0.00	0.00	0.01	0.00
	Percent'	0.0	0.0	0.0	0.1
CDIA Payment	Percent of Reporting Workers Affected	22.8	74.8	6.3	13.6
Overages	Hourly Adj. per Affected Reptoyce: Pollars	0.23	0.25	0.25	0.20
	Percent	1.9	2.0	2.1	1.7
	Weighted Hourly Adjustment: Dollars	0.05	0.18	0.02	0.03
	Percent	0.5	1.5	0.1	0.3
Maintenance of	Percent of Reporting Workers Affected	35.8	74.9	29.3	25.1
Health Benefits	Hourly Adj. per Affected Amployee: Dollars	0.04	0.04	0.04	0.03
Overages	Percent	0.4	0.3	0.3	0.4
	Weighted Hourly Adjustment: Dollars	0.01	0.02	0.01	0.01
	Percent	0.1	0.2	0.1	0.1

	Aljustment Category		All Workers	Obligative Bergaining Units	Management Units	Other <u>Units</u>	
	D	Percent of Reporting Workers Affected	17.3	63.5	8.8	5.0	
	Overnges Due to	Iburly Ail. per Affected Biployee: Pollars	0.07	0.02	0.13	0.05	
	Non Chargeable	Percent	0.6	0.1	0.8	0.6	
	Changes in Defined-	Weighted Hourly Adjustment: Dollars	0.01	0.01	0.01	0.00	
	Benefit Pension Funding Costs	Percent	0.1	0.1	0.1	0.0	
		Percent of Reporting Workers Affected	6.3	2.5	16.3	16.2	
	Exclusion of Un-	Hourly Adj. per Affected Amployee: Dollars	0.10	0.26	0.09	0.05	
	Altered Pension	Percent	1.2	3.7	0.7	0.6	
	Plan	• - •	0.01	0.01	0.61	0.01	
		Weighted Hourty Adjustment: Dollars Percent	0.1	0.1	0.1	0.1	
						8.9	-
	Exclusion of	Percent of Reporting Workers Affected	6.5	0.1	6.6	0.04	144
	Qualified Profit-	Hourly Adj. per Affected Biployee: Dollars	0.15	0.65	0.04		11-2
>	Shering Retirement	Percent	1.4	5.4	0.3	0.5	
1	Plans	Weighted Hourly Adjustment: Dollars	0.00	0.00	0.00	0.00	
4	,	Percent	0.00	0.0	0.0	0.0	
	Overages From	Percent of Reporting Workers Affected	16.9	NA	20.7	14.3	
	Formal Annual Pay	Hourly Adj. per Affected Biployec: Dollars	0.09	NA	0.10	0.08	
	Plans	Percent	0.6	NA	0.7	1.0	
	Tans	Weighted Hourly Adjustment: Dollars	0.01	NA	0.02	0.01	
		Percent	0.1	NA	0.2	0.1	
	Effect of Pixed-	Percent of Reporting Workers Affected	7.3	NA	11.7	4.3	
		Hourly Adj. per Affected Employees Dollars	0.11	NA	0.17	0.07	
	Pop. Method; Promotions	Percent	1.2	NA.	1.4	1.0	
	Promot tons	Weighted Hourly Adjustment: Dollars	0.01	NA.	0.02	0.00	
		Percent	0.0	NA.	0.1	0.0	

↽
4
6.

Ad Justinent Category		All Workers	Collective Bargaining Units	Managenent Units	Other Units
Effect of Fixed- Pop. Method; Qualification Increases	Percent of Reporting Workers Affected Hourly Adj. per Affected Imployee: Dollars Percent Weighted Hourly Adjustment: Dollars	3.4 0.13 1.3 0.00	NA NA NA NA	4.2 0.12 0.9 6.00	2.9 0.13 1.6 0.00
Effect of Weighted Avg. Method	Percent Percent of Reporting Workers Affected Hourly Adj. per Affected Employee: Dollars Percent Weighted Hourly Adjustment: Dollars Percent	0.0 2.2 0.14 1.3 0.00 0.0	NA NA NA NA NA	0.0 1.5 0.22 1.7 0.00	0.0 2.0 0.08 1.0 0.00 0.0
Overages From Pay Exceptions: CWPS Approved	Percent of Reporting Workers Affected Hourly Adj. per Affected Employees: Dollars Percent Weighted Hourly Adjustment: Dollars. Percent	5.7 0.15 1.5 0.01 0.1	13.9 0.20 2.1 0.03 0.2	4.4 0.15 1.2 0.01 0.1	3.3 0.14 1.4 0.00 0.1
(iverages from Pay Exceptions: Solf Administered	Percent of Reporting Workers Affected Hourly Adj. per Affected Employee: Pollars Percent Weighted Hourly Adjustment: Dollars Percent	2.5 0.13 1.0 0.00 0.0	2.1 0.31 1.6 0.01 0.1	2.4 0.12 0.8 0.00	2.8 0.06 0.8 0.00 0.0

^{1/} The percentage increases are obtained by averaging across employee units, using base period employment as weights.

 $[\]underline{2}$ / Annualized over the life of contract.

Adjustments for incentive pay overages attributable to higher volume are provided in instances where physical volume increases can reasonably be attributed to increased work effort or improved worker performance. COLA payment overages reflect the costs attributable to the difference between the company's inflation assumption for costing out cost-of-living escalators and the stipulated assumption of a 6-percent inflation rate. The maintenance-of-health-benefits exclusion represents the costs above 7 percent involved in maintaining the present levels of health insurance coverage, which the Council excludes from consideration.

There are three retirement-plan adjustments. The first pertains to changes in defined pension funding costs—that is, changes in costs attributable to altered actuarial assumptions or poor performance of the fund's investments. The exclusion for unaltered pension plans pertains to pension plans that link benefits to the level of wages and salaries. In cases where the plans are not amended and the benefit structure remains unchanged, companies could exclude all pension costs from the base period and programperiod pay rates. Finally, costs associated with profit-sharing retirement plans may be excluded from the pay calculations when the formulas are not changed.

The adjustments for formal annual pay plans exclude from the chargeable increases all pay increases above 7 percent that are made under pre-existing formal pay plans. Only previously communicated increases are included in this exclusion.

There are two types of adjustments pertaining to the method of computation used to determine compliance. If the fixed-population method is used, pay increases resulting from promotions or qualification increases are excluded. If the unit-average method is used and the mix of workers changes from the base period, the pay increase calculations can be done using the base-period weights, with the difference in the results being excluded from the chargeable increases.

The final two adjustment categories are for exceptions granted by the Council or self-administered by the company. The categories for both kinds of exceptions are identical: acute labor shortages, tandem relationships, gross inequity, or undue hardship, and productivity-improving work-rule changes.

The key pages of the Council's PAY-1 form in which the data in Tables A-I and A-II are based are reproduced as Table A-III. The blanks in the form have been completed using the average amounts for all of the reporting companies.

Finally, we have included in Attachment A-I a summary of the pay standards from the Council's Compendium. This discussion summarizes the factors guiding the design of the pay standard. Part 6 of this excerpt material provides a detailed description of the criteria for exceptions and exemptions from the pay standard.

·Table A-III

Par	t III - P	ay Rate Data <u>1</u> /	(A) Base Period Pay Rate	(B) Program Period Pay Rate	
		nt-Time Wage and Salary: COLA at% CPI:\$)	\$ <u>8.70</u> _	\$_ 9.3 4 _	1
2.	Incent: a.	ive Pay (where applicable): Sales commission and production incentive pay:		'	2a
	b.	Bomuses and other annual incentive pay:			2 <u>t</u>
	c.	Long term incentive pay:		'	2 c
	đ.	Total hourly cost of incentive pay:	_ 0-4 2 _	_ 0.4 1 _	2ć
3.	Benefi			•	3a
		Pay for time not worked			3Ł
		Savings and thrift plans:			JL
	c.	Qualified defined-benefit retirement plans:		'	3с
	đ.	Health benefit plans:	'	'	3ċ
	e.	Other insurance plans:	'		3€
	f.	Other (total):		<u> </u>	3f
	g.	Total hourly cost of fringe benefits:	_ 2.2 3 _	<u>2.39</u>	3ç
4.	Hourl	y Pay Rate (Sum of 1+2d+3g):	\$11.34_	\$ 12.15_	4
5.		Percent Pay-Rate Increase:	- 1-		5
	IS ARE	THE ANNUAL PERCENT PAY-RATE ID FOR MULTI-YEAR AGREEMENTS ABOVE 8 PERCENT) AND DEFINED UNCHANGED, THE EMPLOYEE UNCHANGED, THE EMPLOYEE UNCHANGED OF BE COMPLETED.	, NO INDIVIDUAL D-BENEFIT PENSI	ON FUNDING COST	20

 $[\]underline{1}/$ Components may not add to total because of rounding.

	(A) Base Period Pay Rate	(B) Program Period Pay Rate
6. Adjustments to pay rate (where applicable)		
a. Alternate base adjustment for bonus plans:	- \$ <u>0.00</u>	6a
 Sales commission/production incentive pay due to higher volume: 		\$_0.0 <u>1</u> _6b
c. COLA payments beyond 6 per- cent increase in CPI (attach copy of formula):		_ <u>0.0 5</u> _ 6c
d. Maintenance of health benefits cost increase above 7 percent:		_ <u>0.0 1</u> _ 6d
e. (1) Non-chargeable changes in defined-benefit pension funding costs:		
(2) Exclusion of unaltered pension plan:	_ 0.0 9 _	$-\frac{0.1}{2} \frac{0}{2} - \frac{6e(2)}{2}$
f. Exclusion of qualified profit- sharing retirement plan:	_ 0.0 2 _	_ 0.0 2 _ 6£
g. Overage from formal annual pay plans:		_ <u>0.0 1</u> _ 6g
h. Overage from pay exceptions		
(1) Approved by CWPS (TAIS_	_WRWH):	$-\frac{0.0}{1}$ - 6h(1)
(2) Self-Administered(TAIS	_WRWH):	$-\frac{0.0}{-}\frac{0}{-}$ 6h (2)
 Effect on average wage if fixed population method used, 705B-4(b) 		
(1) Promotions (in base period	\$):	-0.01 6i(1)
(2) Qualification increases (in period \$):	base	$-\frac{0.00}{0}$ 6i(2)
 j. Effect on pay rate if weighted average method used, 705B-4(e): 		_ <u>0.0 0</u> _ 6i
k. Total adjustments: \$ -	D.LL_	s_ 0.24 _ 6k
7. Adjusted Hourly Pay Rate (Difference 4-6k):	sl 1.23_	<u>s. 1.9 1</u> _ 7
8. Adjusted Annual Percent Pay-Rate Increase:	_ 6-1 _3	

Part I: DESIGN OF THE PAY/PRICE STANDARDS

The pay and price standards have been crafted carefully to strike a balance among four principal criteria: effectiveness, simplicity, equity, and economic efficiency.

To be effective, the goals of the standards were targeted to be ambitious enough for widespread compliance to reduce inflation significantly without being so ambitious that compliance becomes impractical. Also for effectiveness, the standards were designed to apply to a wide range of diverse economic activities.

Against the need for widespread coverage, every effort has been made to retain simplicity. And, in fact, the basic standards remain simple for most businesses to apply. However, some increased complexity has come about in response to requests from large businesses for more specificity and due to the need to provide modifications that account for the institutional characteristics and operational realities of certain industries.

For purposes of equity, the standards request mioderate restraint from the widest possible range of individuals and organizations; no one group is asked to shoulder a disproportionate share of the burden. But, as in any effort to break into a pay/price spiral, some are bound to be affected sooner or to a somewhat greater degree than others. In recognition of this fact, the standards include several explicit provisions aimed at avoiding the imposition of major inequities.

As with most government intervention in the marketplace, the call for restraint in pay and price decisions runs the risk of inducing some economic inefficiencies by distorting market incentives and signals, resulting in a misallocation of resources. This concern is reflected throughout the standards, evidenced by the general focus on average prices and pay rates rather than on those of individual products and workers, thus allowing relative prices and pay rates to respond to market conditions.

In designing and revising the standards, adherence to these criteria forced numerous difficult decisions required to balance conflicting objectives. In particular, most efforts to add sensible exception provisions and to provide the degree of flexibility needed to minimize potential inequities and market distortions directly reduced the potential effectiveness of the standards. Conversely, most efforts to increase potential effectiveness increased the risk that compliance would cause inequities and inefficiencies.

Since the standards are sufficiently ambitious to be effective with widespread compliance, it is undoubtedly the case that some inequities and inefficiencies will result. But, these are likely to be small compared to the capricious inequities and the fundamental economic inefficiencies caused by inflation itself.

The pay and price standards were designed to be consistent with each other, assuming a continuation of the well-established historical relationship between prices and unit labor costs.

The price deceleration standard provides each firm with its own numerical limitation on price increases during the program year. For each firm, this limitation is derived by deducting one-half of a percentage point from the average annual rate of price increase over the 1976-77 period. If every company in the U.S. economy were to adhere precisely to this standard, the program-year inflation rate would be about 5-3/4 percent. This figure is obtained by deducting one-half of a percentage point from the 6-1/4 percent annual rate of increase in the Consumer Price Index, excluding food, during the 1976-77 period.

However, not all firms will be able to achieve price deceleration, due to raw-material price increases, previously negotiated labor contracts, and other factors. To comply with the price standard, these firms will resort to the profit-margin exception, which allows unit-cost increases to be passed through on a percentage basis up to 6-1/2 percent and on a dollar-for-dollar basis thereafter. Given full compliance with the price standard, including this exception, inflation would be about 6-1/2 percent in absence of raw-material shortages or external supply shocks.

The standards were designed to make this price objective consistent with full compliance with the pay standard, constant functional income shares (i.e., constant profit margins and a constant labor share of total national income), and the estimated long-term productivity trend.

The pay standard requests that average increases in wage rates and private fringe-benefit costs per hour not exceed 7 percent over the program year. However, with full compliance, actual private hourly compensation costs will rise by about 7-3/4 percent. The slippage between the 7-percent pay standard and the 7-3/4 percent objective is attributable to several provisions and exceptions included to accommodate legitimate concerns about equity and economic efficiency. When mandated Social-Security cost increases above 7-3/4 percent are included total compensation per hour will increase by about 8-1/4 percent. Deducting from this figure the 10-year productivity growth trend of 1-3/4 percent, unit labor costs will increase by about 6-1/2 percent.

Historically, changes in unit labor costs and changes in prices have been very closely related, reflecting the virtual constancy of functional income shares. The numerical standards were designed purposely to reflect this relationship. Hence, as seen above, the 6-1/2 percent increase in unit labor costs, assuming full compliance with the pay standard, is consistent with the 6-1/2 percent price objective, assuming full compliance with the price standard.

This is not a forecast of inflation rates over the program year. Even with full compliance, if productivity growth rates are below historical averages or if there are major perverse supply shocks, price increases will exceed the above objective.

The pay and price objective for the second program year will, of course, depend on the degree of success during the first year. Therefore the second-year standards will not be formulated until the third quarter of 1979.

A. The Pay Standard

Compliance with the pay standard requires that pay rates increase by 7 percent or less for each of several identified employee groups. The 7-percent standard is not intended as a target for pay-rate increases; it is an upper limit, or cap. Where market forces suggest that smaller increases are warranted, smaller increases should be granted.

The standard imposes a common numerical limit across industries and regions. Although an assumption about aggregate productivity growth provides the link between the pay standard and price standard, the pay standard does not vary across industries or firms depending on industry-specific or firm-specific productivity changes. The absence of such productivity adjustment reflects both the effectiveness and equity criteria discussed above.

First, productivity is extremely difficult to measure and the existence of a general adjustment would create a significant loophole, preventing the effective limitation of pay-rate increases.

More importantly, from an equity standpoint, the disparities between productivity growth rates across industries are not attributable to differences in the diligence of the workers involved; instead they are due to the fact that there is more potential for productivity-improving innovations in some industries (for example, manufacturing) than in others (for example, services). Further, there is no logical justification or historical support for the notion that high-productivity-growth industries are high-wage-growth industries. Instead, disparities in productivity growth rates across industries tend to be reflected in divergent price trends: price increases tend to be relatively low in high-productivity-growth sectors and relatively high in low-productivity-growth sectors.

Although the notion of a pay standard tied to companyspecific productivity growth has been rejected in the interest of promoting efficiency, incentive pay plans that relate individual pay rates to individual performance receive special treatment.

Incorporation of the above criteria (effectiveness, simplicity, equity, and efficiency) dictate several other general characteristics of the pay standard:

- For reasons of equity and effectiveness, all forms of pay are included.
- The standard applies to the sum of different types of pay rather than to each component separately, imposing no restrictions on the mix of pay increases.
- The standard applies the average pay rates for employee groups rather than for individual employees, imposing no restrictions on the distribution of pay-rate increases across individuals.
- The standard applies directly to those components of pay that firms control, and makes certain allowances for pay increases not controlled directly by the company.

1. Components of Pay

Pay rates are defined to exclude overtime pay unless the terms of the overtime pay are changed (say by changing the formula from time and a half to double time, in which case the impact on hourly cost should be estimated and counted as a pay increase).

Private fringe-benefit payments — but not employer contributions to legally-mandated benefit programs such as Social Security, unemployment insurance, and worker compensation — are counted as pay. These private fringe benefits include (but are not confined to) pensions, health insurance, and all forms of paid leave.

The inclusion of fringe-benefit costs is important since these have become an increasingly significant component of labor costs in recent years, and their inclusion is necessary to avoid an obvious loophole: the substitution of fringe benefits for cash wages. However, the standard allows complete flexibility between wage increases and benefit improvements. For example, if the base pay rate for an employee group averages S8.00 per hour in wages with an additional \$2.00 per hour in benefits, the total wage and benefit base is \$10.00 per hour. Under the standard, the average increase cannot exceed 7 percent annually, or 7 cents per hour. This allowable 70-cent increment can be distributed in any manner between wage increases and benefit improvements.

There are three important qualifications to the provisior that all increases in costs of benefits are counted against the standard. First, government-mandated increases — including increases in items mentioned earlier — are excluded from the calculation of pay increases, since these cos increases are beyond the control of the employer.

Second, only the first 7 percent of the increased cost o maintaining existing health-plan benefits is counted. I could be argued that the entire increased cost o maintenance of benefits (MOB) should be counted agains the standard because (1) these increased costs add to labo costs and exert upward pressure on prices, and (2) no counting the increased cost of MOB discriminates agains workers whose employers do not provide elaborate fringe benefit plans and must therefore pay their own increased medical-care costs out of their increases in wages (which do count against the standard). On the other hand, the equitissue results in a standoff because, without the specia provision for this category of fringe benefits, employee with identical benefit packages could be subject to differen limitations on wages and salaries due to differences in benefit plan experience or in the timing of premiun adjustments. In addition, employers object to including al increases in MOB costs because they have little or no control over them. It was this latter point that led the Council to revise the treatment of maintenance of medical care costs in the final standards.

Third, for the same reasons, increased costs of maintaining a pension fund, with no improvement in benefits, are no counted against the pay standard. Such cost changes car come about because of changes in funding methods changes in amortization periods, changes in actuaria assumptions, or plan experiences.

The full amount of all cost increases due to improvements in health or pension benefits is counted in determining payrate changes.

2. Employee Groups

The 7-percent limitation on annual pay-rate increases does not apply to individual employees. Instead, the standard applies to the average pay-rate increases for units of employees. Within each unit, some employees may receive increases above 7 percent so long as these excesses are offset by smaller increases for other employees in the same unit. This flexibility allows employers to adjust individual pay rates on the basis of individual merit and market conditions for different types of labor services, so long as the overall 7-percent limitation is satisfied. This feature of the pay standard promotes economic efficiency and facilitates equitable pay policies.

The separate employee units to be identified under the standard are (1) each collective bargaining unit, (2) all management personnel, and (3) nonmanagement employees not covered by collective bargaining agreements. A collective bargaining unit representing less than 5 percent of all employees in a firm need not be considered separately, but can be combined with the appropriate nonunion group. Any reasonable divisions of the nonunion employees into management and nonmanagement units is acceptable.

Collective bargaining units are required to be identified separately because these employee groups are subject to binding contracts and the contract terms can be altered only at the time of negotiation. The standards therefore apply to the terms of newly negotiated contracts. For nonunion employees, the distinction between management and nonmanagement groups is provided to ensure that management decisions about pay-rate increases provide equitable treatment for nonmanagement employees. If a company can provide an alternative means of demonstrating that this equity condition is satisfied, the two groups may be combined.

3. Application of the Pay Standard to Collective Bargaining Agreements

The pay standard does not apply to existing contractual agreements reached before announcement of the program. Instead, it requires that the annual rate of increase of pay rates dictated by any new collective bargaining agreement (any agreement entered into during the program year) be no greater than 7 percent compounded over the contract term. Since these increases are compounded, pay rates can increase by approximately 14-1/2 percent over the life of a two-year agreement and 22-1/2 percent over the life of a three-year agreement. Under such multi-year agreements, however, the total allowable increase must be allocated fairly evenly over the life of the contract — no more than 3 percent of the total allowable increase can occur in any single year of such an agreement. This allows for some "front loading." a common characteristic of labor contracts.

A large and increasing number of collective bargaining agreements have built-in escalators, or cost-of-living adjustments. The actual pay-rate increases generated under these contracts will depend on the actual rates of inflation experienced over the contract term. In order to provide a method by which the parties can determine whether a new contract complies with the standard at the time it is signed. cost-of-living adjustments in multi-year contracts are to be evaluated assuming a 6-percent annual inflation rate. This rate is below the anticipated inflation rate for 1979, even assuming full compliance with the pay and price standards, but is a reasonable assumption to make for the period covered by multi-year contracts. For this reason, the 6percent assumption cannot be employed in labor contracts covering one year or less. One-year contracts with cost-ofliving adjustment clauses must be evaluated retrospectively, using the actual inflation rate and hence the actual cost to the employer.

Application of the Pay Standard to Nonunion Employee Units

For employee units not covered by collective bargaining agreements, the standard requires that average pay rates in the final quarter of the program year be no more than 7 percent greater than the average pay rates in the base quarter. The base quarter is the last complete fiscal or calendar quarter prior to October 2, 1978, and the terminal quarter is the corresponding quarter of 1979.

In many cases, actual pay-rate increases during the coming year will be based on decisions and commitments made prior to the announcement of the program. In order to provide equitable treatment of union and nonunion units, recognition of these situations is necessary. As a result, when pay-rate increases are dictated by the continuation of a formal, documented annual wage and salary program already in operation, the completion of this program is allowed. Similarly, if future pay-rate increases have already been promised or communicated to the recipient employees, these promised increases are allowed. Compliance requires, however, that new pay plans announced during the program year be consistent with the 7-percent standard for the next planning year of the company.

Changes in average pay rates are determined by changes in the pay rates of individual employees and by changes in the composition of the employee group. In some cases, the 7-percent standard would be exceeded solely due to a shift in the composition of employment toward individuals with higher skill levels and, therefore, higher pay rates. To prevent such situations, two methods are provided for neutralizing the effects of skill-mix changes on average pay rates for nonunion groups. The first allows pay-rate increases to be computed as a weighted average of the separate increases for distinct employee subgroups within an employee unit. This is similar to the procedure used in determining the pay-rate increase over the life of a new collective bargaining agreement. The second method allows the computation of pay-rate changes for the group of continuing individuals employed throughout the program year. Using this latter method, pay-rate increases for

legitimate, individual promotions and changes in individual job qualifications may be excluded. Under this option, a company that gives company-wide raises (including benefits) of 7 percent and continues its normal promotional practices will be in compliance with the standard regardless of changes in the employee skill mix during the program year. This approach should be especially useful to small firms that do not typically perform extensive cost-control budgeting analyses.

5. Variable Compensation

Application of the pay standard to nonunion employee groups is complicated by the existence of widely varying, and often complicated, incentive pay plans. Typically, the actual payments received by employees under these plans are not controlled by the firm once these plans are in place. In fact, the primary rationale for these plans is that pay should be high when individual or company performance is good and low when it is not. The primary examples are commission programs, piece-work pay, annual bonus plans, and long-term incentive plans.

Two principles guide the treatment of these programs under the pay standard: (1) all such forms of compensation should be counted as pay and (2) such compensation should be counted as pay when earned rather than when paid (except for discretionary bonuses). Commission and piece-work pay increases in excess of 7 percent under these plans will not put a company out of compliance if it can be shown that the extra pay is attributable to increases in physical volume rather than to rising prices or a change in the pay formula. As noted above, discretionary bonuses are counted as pay when received. Vondiscretionary bonuses (i.e., bonuses dictated by a fixed formula or rule) are counted as pay when earned. In dealing with incentive pay that is tied to profit, companies should make a projection of the growth in profit and grant salary increases that are consistent with the profit projection and the pay standard. Pay increases that exceed 7 percent because profits rise by more than was reasonably expected will not result in determinations of noncompliance.

"Future-value incentive programs," such as stock option plans (providing the option to purchase stocks at some future date at a currently stipulated price) are treated separately. Under this type of plan, compensation received by exercising a purchase option during the program year will be the result of grants or commitments made before tha announcement of the anti-inflation program, and is not charged against the pay standard. Similarly, the compensation value of grants made during the coming year will not be known until several years in the future. In these cases, the 7-percent limitation is applied to the number of units granted (per eligible employee) in the base year. (If eligibility rules are changed, the limitation is applied to the number of units granted per employee in the relevant employee unit.)

Exemptions and Exceptions

In the interest of equity and economic efficiency, a number of exceptions and exclusions have been included in the pay standard.

a. Low-wage workers

Because the poor are least able to bear the burden c fighting inflation, an explicit exemption for low-wag workers is provided. This exemption is effected be requiring that, in the calculation of pay-rate change: employees earning no more than \$4.00 per hour in straightime wages at the beginning of the program year be excluded from all employee groups. As a result of this exclusion, if pay rates for these low-wage workers increase b more than 7 percent — for example, due to the revision it the minimum wage and the so-called "ripple effect" avoid compression of the wage structure near the minimum wage—this does not count against the allowable increase for other employees. Also, if pay rates for low-wage workers increase by less than 7 percent, these lesse increases cannot be used to offset greater increases fo other workers.

b. Tandem relationships

An exception to the pay standard is provided for reasons c equity to allow for the continuation of established tander relationships among employee groups. For example, i some bargaining situations, one or more units traditionall adopt the settlement of a leader unit. Also, som companies have traditionally maintained a fixedifferential (or even equality) between the wages of their union and nonunion employees in the same plant or i. different plants. Where such tandem relationships exist. is possible for the follower employee unit to receive a pay rate increase of more than 7 percent to keep in step with complying leader unit without being out of compliance The exception applies, for example, if the leader (collectiv bargaining) unit signed a contract before the beginning o the program year and the follower unit signs the samcontract during the program year. The tandem exception can also be invoked if a leader collective bargaining uni signs a complying contract during the program year tha provides for an 8-percent increase in the first year and : follower, nonunion unit is given the same percentage

It should be emphasized that this exception can be invoked only in those situations in which the leader/followe relationship is clear, in terms of both the amount and the timing of pay-rate increases. For example, industry-wide pattern bargaining, in which a settlement with on company — but not always the same company — sets pattern that is adopted by other companies does no qualify as a tandem relationship because the leader fol lower relationship is not fixed over time. Compliance determinations in such situations can, however, be mad for the industry as a whole, using the industry-wide bas-nay rate.

c. Productivity-enhancing work-rule changes

To promote economic efficiency, pay-rate increases tha are traded for work-rule changes that result it demonstrable improvements in productivity are no counted against the 1-percent standard. This exception applies only to collective bargaining situations in which company has no alternative means of eliminating pas contractual work-rule restrictions other than to buy then out through an additional wage-rate increase. The

exception does not apply to wage-rate adjustments for improvements in productivity that are not tied to contractual work-rule changes.

d. Acute labor shortages

Although the pay standard allows for a substantial amount of flexibility in setting pay rates for particular types of workers, this flexibility may be inadequate to retain or attract workers in occupations that are in severely short supply. An explicit exception is therefore provided for cases of acute labor shortages. To invoke this exception, the acute labor shortages must be documented by evidence on the number of vacancies, the time required to fill vacancies, and movements in entry-level pay rates.

e. Undue hardship and gross inequity

The pay standard, including the above exceptions and exemptions, has been designed to prevent complying workers and businesses from suffering extreme hardship or inequities. Nevertheless, not all situations causing hardship or inequity can be anticipated. For this reason, the standard allows for a general exception for undue hardship and gross inequities. It must be emphasized, however, that to qualify for this exception, a situation must be manifestly unfair. In particular, perceived notions of the need to "catch up" with other groups of workers (even with traditional "comparability groups") do not, in and of themselves, constitute grounds for an exception.

A-15

Appendix B. Numerical Example to Illustrate Possible Changes in the Petroleum-Refiner Standard.

Under the current mix adjustment, the <u>base-period</u> gross margin is calculated using program-period quantities. Using the alternative mix adjustment, one would calculate the <u>program-period</u> gross margin using base-period quantities. The following example illustrates the difference between the two procedures for changes in product and input mixes that might occur as the result of investments in upgraded refinery processing facilities. On the product side, the mix shifts away from residual oil toward lighter products; on the input side, the mix shifts away from light crude toward heavy crude. The base-year and program-year prices in the example correspond closely to actual average prices during these periods. In the example, the adjustment—and hence the allowable growth in gross margin after the adjustment is made—is much larger using the alternative method. This difference reflects primarily the rapid growth in the price differentials between the base year and the program year.

Tables B-II and B-II show the calculations for the alternative method, while Tables B-III and B-IV refer to the current method. In the former case, the base-year gross margin is \$3.50 per barrel, the actual program-year gross margin is \$5.77 per barrel, and the constructed program-year gross margin is \$3.87 per barrel; hence, the adjustment permits refiners to earn an additional \$1.90 per barrel. By comparison, under the current procedure the constructed base-period gross margin is \$4.23 per barrel while the actual gross margins in the base period and program year remain the same; hence, the adjustment permits refiners to earn an additional \$.33 per barrel, the difference between the constructed and actual base-period gross margins multiplied by 1.135 (the permitted growth in the gross margin over the first two program years).

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		Dase Year			Program Year		Const	ructed Progra	n Year
Product Sales Mix	Price Per Darrel (Dollars) (1)	Unit Sales (K Barrols) (2)	Dollar Sales (K Barrels) (3)	Price Per Barrel (Dollars) (4)	Unit Sales (K Harrets) (5)	Dollar Sales (K Barrels)	Price Per Barrel (Dollars) (7)	Unit Sales (K Barrels) (a)	Pollar Sales (K Parrels)
Onsolino				•			·		
Regular Leaded	\$17.50	1,700	\$ 29,750	\$32.00	1,500	\$ 48,000	\$32.00	1,700	\$54,400
Unicaded	19.30	900	17,370	33.60	1,300	43.660	33.60	900	30,240
Premium Leaded	20.00	500	10,000	34.40	400	13,760	34.40	500	17,200
Distillates	16.00	2,000	32,000	29.00	2,500	72,500	29.00	2.000	58,000
Roslduel	12.00	1,130	13,560	22.00	800	17,600	22.00	1,130	24,860
Other	20.00	500	10,000	35.00	608	21,000	35.00	500	17,500
Output Mix Subtotal	\$16.74	8,730	\$112,686	\$30.50	7,100	\$218,530	\$30.04	8,730	\$202,200
		Dase Year			Program Yea	r	Const	ructed Progra	n Year
i Ltadi	Cost per			Cost per			Chat per		
ilydrocarbon Cost Mix	Darrel	Quantity	Cost	Parrel	Quantity	Cost	Barrel	Quant I ty	Cost
,	(follors)	(K Harrels) (2)	(K Dollars) (3)	(follers) (4)	(K Barrels) (5)	(K Dollars)	(Dollara) (7)	(K Parrols)	(K Dollars)
Crude Petroleum									
Light	\$12.50	5,000	\$62,500	\$25.00	3,500	\$ 67,500	\$25.00	5,000	\$125,000
licavy .	11.00	1,000	11,000	20.00	3,000	60,000	20.00	1,000	20,000
Refined Products	15.00	1,000	15,000	30.00	900	27,000	30.00	1,600	30,000
Other Hydrocarbons	12.00	50	600	22.00	50	1,100	22.00	50	1,100
	-	7,050	\$89,100		7,450	\$175,800		7.050	\$176,100
Input Mix Subtotal	\$13.24	6,730 <u>1</u> /	\$89,100	\$24.73	7,180 <u>1</u> /	\$175,600	\$26.17	6,730 <u>1</u> /	\$176,100
Gross Margin Per Sales fe	rrol				•				
Actus! Alimable	\$ 3.50			\$ 5.77			\$ 3.87 \$ 3.97 2/		

^{1/} Sales barrels used in computing unit cost.

^{2/} Equals the actual base-year unit gross margin multiplied by 1.135.

TABLE B-II

Value of Mix Adjustment - Alternative Method

Product Mix

Actual program-period
unit revenues

$$= \sum_{j} p_{j}(t) q_{j}(t) / \sum_{j} q_{j}(t)$$

$$= $30.50.$$
Constructed program-period unit revenues
$$= \sum_{j} p_{j}(t) q_{j}(0) / \sum_{j} q_{j}(0)$$

$$= $30.04.$$

Value of product-mix adjustment = (actual unit revenues constructed unit revenues) x sales volume

 $= (\$30.50 - \$30.04) \times 7,100,000 = \$3,266,000.$

Input Mix

Actual program-period
$$\frac{\text{Constructed program-period}}{\text{unit cost}}$$

$$= \sum_{i} c_{i}(t) v_{i}(t) / \sum_{j} q_{j}(t)$$

$$= \sum_{i} c_{i}(t) v_{i}(0) / \sum_{j} q_{j}(0)$$

$$= 24.73.$$

$$= 26.17.$$

Value of input-mix adjustment = (actual unit cost - constructed unit cost) x sales volume

 $= ($24.73 - $26.17) \times 7,100,000 = -$10,224,000.$

Effect on Gross Margin (Additional Allowable Gross Margin)

Effect on gross margin = value of product-mix adjustment

- value of input-mix adjustment
- = \$3,266,000 + \$10,224,000 = \$13,490,000.

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			Dase Year			Program Year		Con	structed Base	Year
	Product Sales Mix	Price Per Berrel (Dollars) (1)	Unit Sales (K Barrels) (2)	Dollar Sates (K Barrels) (3)	Price Per Derrel (Dollars) (4)	Unit Sales (K Barrels) (5)	Not lar Sales (K Narrels) (6)	Price Per Barrel (Dollars) (1)	Unit Sales (K Harrels) (8)	Noties Sales (K Harrels) (9)
	Ansoline Regular Londed Unleaded Premium Lended Distillates Residual Other Cutput Mix Subtotal	\$17.50 19.30 20.00 18.00 17.00 20.00 \$18.74	1,700 900 500 2,000 1,130 500 8,730	\$ 29,750 17,370 10,000 32,000 13,560 10,000 \$112,680	\$32.00 33.60 34.40 29.00 22.00 35.00 \$30.50	1,500 1,300 400 2,500 600 600 7,100	\$ 48,000 43,680 13,760 72,500 17,606 21,000 \$218,540	\$17.50 19.30 20.60 16.00 12.00 20.00 \$17.03	1,500 1,300 400 2,500 800 600 7,108	\$26,250 25,090 8,000 40,000 9,600 12,000 \$120,646
B-4	Hydrocarbon Cost Mix	Cost per Berrel (Dollars)	Quantity (K Barrols) (2)	Cost (K Tollars) (3)	Cost per Carrel (follars) (4)	Program Year Quantity (K florreis) (5)	Cost (K Dollars) (6)	Cost per Darrel (Not lars) (7)	Quantity (K Barrels) (8)	Cost (K Dollars)
	Crude Petroleun Light Beavy Rolined Products Other Bydrocarbons Input Mix Subtotal	\$12.50 11.00 15.00 12.00 \$ - \$13.24	5,000 1,000 1,000 50 7,050 6,730 1/	\$62,500 11,000 15,000 600 \$89,100 \$89,100	\$25.00 20.00 30.00 22.00 \$ \$ \$24.73	3,500 3,000 900 50 7,450 7,100 <u>1</u> /	\$ 87,500 60,000 27,800 1,100 \$175,605 \$175,600	\$12.50 11.00 15.00 12.00 \$-	3,500 3,000 900 50 7,450 7,100 <u>1</u> /	\$43,750 33,000 13,590 600 \$90,850 \$90,850
	Gross Margin Actual Gross Margin Allowable Gross Margin	\$ 3.50			\$ 5.77 \$ 4.80 <u>2</u> /			\$ 4.23		

^{1/} Sales harrels used in computing unit cost.

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^{2/} Equals the constructed base-year unit gross margin multiplied by 1.135.

TABLE B-IV

Value of Mix Adjustment - Current Method

Product Mix

Actual base-period $\frac{\text{Constructed base-period}}{\text{unit revenues}} = \sum_{j=1}^{n} p_{j}(0) q_{j}(0) / \sum_{j=1}^{n} q_{j}(0) = \sum_{j=1}^{n} p_{j}(0) q_{j}(1) / \sum_{j=1}^{n} q_{j}(1) / \sum_$

Value of product-mix adjustments = (constructed unit revenues -

actual unit revenues) x 1.135 x sales volume

= \$17.03 - \$16.74) x 1.135 x 7,100,000 = \$2,336,965.

(note: program-period sales volume used in measuring program-period period value of mix adjustment on unit revenues)

Input Mix

Actual base-period unit cost
$$= \sum_{i} c_{i}(o) v_{i}(o) / \sum_{j} q_{j}(o)$$

$$= \sum_{i} c_{i}(o) v_{i}(t) / \sum_{j} q_{j}(t)$$

$$= \sum_{i} c_{i}(o) v_{i}(t) / \sum_{j} q_{j}(t)$$

$$= \sum_{i} c_{i}(o) v_{i}(t) / \sum_{j} q_{j}(t)$$

Value of input-mix adjustment = (constructed unit cost - actual unit cost) x 1.135 x 7,100,000

= (\$12.80 - \$13.24) x 1.135 x 7,100,000 = -\$3,545,740.

(note: program-period sales volume used in computing program-period value of mix adjustment on unit cost)

Effect on Gross Margin (Additional Allowable Gross Margin)

Effect on gross margin = value of product-mix adjustment - value of
input-mix adjustment

= \$2,336,965 + \$3,545,740 = \$5,882,705.

Senator PROXMIRE. Now give me what you can in the wage area. Is there any wage negotiation in the last 6 or 8 months where you have been able to step in and effectively hold down wage increases that would have had an inflationary effect?

Mr. Kahn. The constraints on our stepping in directly in the wage field are more complicated than in the price field, largely by virtue of

the presence of the pay advisory committee.

What I can say is that the major settlements that have taken place in the last few months and the ones that are in prospect are in compliance with the standards, or seem to be; and second, that I know that the negotiating parties, at least on our side of the table, paid close attention to the standards.

Senator Proxmire. Do you feel without the standards the settle-

ments might well have been higher?

Mr. Kahn. I genuinely do. I confess to you that those standards are surely not noninflationary, and specifically, that the evaluation of cost of living adjustment clauses is excessively generous, but the fact remains—say, steel—steel is well within the standards. Market influences, of course, were very important. I believe that I'm just expressing expectation that the communications settlement will be within the standards.

Senator Proxmire. At the end of my last questioning, you indicated you felt it would be a mistake to eliminate COWPS without having something in its place. How about something like this in its place: the late Arthur Oakun and Mr. Wallach have both proposed a tax-based incomes policy which would reward workers for holding down their wage increases, and Mr. Wallach would penalize if they didn't hold down their wage increases, and reward companies that hold their prices down. Those are two eminent economists. Other topflight economists have supported that. The New York Times and other papers have said that they think that makes sense.

We are talking about a tax cut now. Many people feel a tax cut, if not frivolous, doesn't go to the heart of controlling inflation. Why wouldn't thet administration consider supporting that kind of a directly designed tax reduction to hold down wages and prices and cope with inflation? Why has there never been any substantial support from

the administration for that kind of income-based policy?

Mr. Kahn. No. 1, the administration has seriously considered proposing some sort of tax-based incentive policy of the kind you mentioned. It goes in waves. I have been through about three of those waves since I have been in this job. The real wage insurance proposal was in some ways related to that, although I understand not precisely so, but it was an attempt to use the tax system to encourage wage restraint. I'm enormously attracted by such an arrangement. It seems to me to offer us some middle ground between recession on the one side and inflation on the other by trying to build into the system incentives for restraint.

The principal problem that we have encountered in the past is that it is an intellectual program. I should say a program with a strong intellectual constituency—in which I include you, Mr. Chairman—but not a very strong political constituency so far.

I think that in the next decade—and I don't mean to be purely theoretical—but in the years ahead, I think we will come back to it

and come back to it until people recognize that macroeconomic liberality, permitting a greater measure of economic recovery, is going to be aborted time and again unless we get responsible wage and price

policy.

Senator Proxmire. That's very encouraging. It seems to me unlikely that we will get a tax cut adopted before the election. We may or may not, but the timing doesn't seem to be there. After the election would be the ideal time it seems to me for the Congress to act and this is good sound economic policy in the judgment of many people, including yourself, I think, and I would hope we could give that very serious consideration at that time.

Now I don't think we ought to dismiss you without discussing productivity because all of us are so concerned with that and it's such a central element in inflation. I have on my door a chart that says, "Read them and weep" that points out what a terrible productivity record we had compared to other countries in the world, particularly in the last few years. According to the Bureau of Labor Statistics, we declined at a 3.1 percent annual rate during the second quarter of this year. That's the sixth straight quarter in which the productivity failed in the private sector, an extraordinary situation in American economic history, when the productivity goes down. It goes down in a deep depression but rarely does it go down this consistently.

How much of the inflation rate can be attributed to that decline in

productivity, in your judgment?

Mr. Kahn. I'll have to answer slightly equivocably. One can make a simple arithmetic calculation that is static and holds everything else equal, and say that decline in the rate in productivity from 3 percent 15 or 20 years ago to a trend in the 1970's on the order of 1.5 percent and, more recently, 1 percent—

Senator Proxmire. More recently, zero or minus.

Mr. Kahn. I wanted to try to separate out the short-term declines which occur in recessions.

Senator Proxmire. We haven't had a recession for 6 quarters and this

has been negative for 6 quarters.

Mr. Kahn. You're quite right that it was negative between the 4th quarter of 1978 and 1979. I'm not trying to minimize it. All I'm saying is therefore you're talking about the real uncertainty. I think if we could turn around to a situation where the CPI goes up less than wages, which has been our historic experience, we may get some tapering down of wage demands as well. So I think two or three points over a long period of time is probably the lower level.

Senator PROXMIRE. At least two or three points of inflation is owing

to the productivity decline?

Mr. KAHN. Using my logic, I believe that's right.

Senator Proxmire. What measures do you think we should take to

stimulate productivity?

Mr. Kahn. I will begin by saying that nobody really has more than a plausible list of explanations, almost each one of which can be refuted by looking at the experience of some other country. We have no choice but I think to proceed along a number of lines, even though our best estimates are that each one may make only a relatively small contribution. I think that clearly the case can be made for tax incen-

tives in the area of physical capital plants and equipment. I think that's been made so many times it has I think probably been oversold. The best guess people can think of that they may change the productivity rate over a period of 5 years, a rather large program might make a difference of half a point. But half a point is a lot in turning this around.

Similarly, I think investment in technological capital, hours of expenditure on research and development in this country as a proportion of GNP, is still higher than other countries, but the trend is

disturbingly down.

Senator Proxmire. We have more engineers and scientists than any other country in the world in per capita terms as well as absolute terms. It's an astonishing investment with a pitiful result. It's hard to understand it.

Mr. Kahn. It's a difference of opinion about what the payoffs are. The trend is clearly in the direction opposite from the trend in Ger-

many and Japan and I believe France as well.

Senator Proxmire. Somehow we have to provide an incentive to mine those research developments. We seem to do the developing and the Germans and Japanese have the wisdom and the ability to take

advantage of it.

Mr. Kahn. There's a very disturbing article in the Harvard Business Review in the summer issue which attributes a very large proportion of the blame to the nature of the incentives and management of our major corporations, that there's been a marked change, for example, an increase in the proportion of people who run our corporations who are lawyers and in finance. Some of my best friends are lawyers and in finance, but it is at least conceivable that there's an excessive emphasis—

Senator PROXMIRE. Having been in the Senate and having seen how the lawyers botch up this body, it's no surprise that they have probably succeeded in doing the same to American business. The Harvard Business Review is where you would find it because the Harvard Business School provides experts and the Harvard Law School provides

lawvers.

Mr. Kahn. The article, if you read between the lines, is critical of what people are taught in business school. That is to say, the emphasis on short-term maximization, discounting future income by 30 percent, so that no investment should be made unless it promises to pay 30 to 35 percent, is apparently resulting in the decline in the willingness to take long-term risks; but inflation probably contributes to that, and one of the main things we can do is, again, slow down the rate of inflation.

I haven't mentioned the importance of investing carefully in human capital, change and that sort of thing. Certainly the whole area of regulatory reform, reliance on competition—I mean, probably the best thing Congress did this term for productivity is deregulation of trucking. I know that's my own pet anxiety, but it's a case in which restoring the discipline of the competitive market is really terribly important.

Senator Proxmire. And the second thing was deregulation of

banking.

Mr. Kahn. Well, I'm in no position to underestimate that.

Senator Proxmire. The Proxmire-Reuss bill.

Mr. Kahn. I know that perfectly well, but I thought you ought to say it. Of course, I agree with that. You've got the rail deregulation bill in front of you. There's a serious issue there, but there again we've got to free those industries. By the way, I happen also to feel that we ought to have the opportunity to build coal slurry pipelines to expose the railroads to competition as well.

Senator PROXMIRE. I just have one more question but it follows out

from what we have been talking about here.

One way to try to improve our productivity is by what is called reindustrialization. I'm very, very concerned about that program because I think it will go exactly the wrong way. Reindustrialization can mean tremendous loan guarantees. It can mean refundable tax credits. It can mean a number of what I would call giveaways or at least big grants as well as loans to business. It would mean that the Federal Government would become bigger, more involved, spending more money to help industry in various ways. I understand the President plans to present an industrial renewal policy around Labor Day. What recommendations has COWPS made concerning what should be in that program and have your recommendations been accepted?

Mr. Kahn. I'm going to be somewhat reserved in my answer because we have made recommendations. I have been participating, especially recently, in that process. The President will be making his announcement and I think probaby it would be improper for me to be precise, but I think that it is not improper in any way for me to emphasize my strong agreement with you. Reindustrialization, if that's the term that one uses-and I'm worried about using that term precisely because it has developed these connotations—can mean a variety of things. It can mean the kinds of things I have talked about which I think you're in agreement on that ought to be done in the way of improving productivity in the economy. It can mean being as neutral as possible in terms of microinterventions. It can mean at the other extreme bailing out losers. And I think you know us well enough to know that while we would have great enthusiasm about a policy that aimed at what we used to just call productivity—R. & D., incentives to capital formation and the like—while I'm not necessarily insensitive to particular problems—and that we would be very, very skeptical about a program that was a massive one that would build a reconstruction finance corporation.

Senator Proxmire. That's exactly what concerns me. You put your finger precisely on it when you said bailing out losers. Of course, this administration did bail out the Chrysler Corp., which I thought was a serious mistake and I understand all the human appeal that that kind of thing has, but once you start down that path there's no end to it. You bail out your inefficient operations or you provide investment in what the people in Washington here—the people in the Government think are promising industries for the future, thinking their

judgment is better than the investment community.

In any event, the Government gets big, burdensome. The cost of

Government is heavier and the effect on inflation is perverse.

Mr. Kahn. I think all I can say is that all of us are very conscious of the desirability of what you will understand of what I describe as

microneutrality, doing what you can without trying too much to work the process. I truly do not know where the President's package is going to come out. There are certain situations in which there's a proper role for government, and I don't mean to suggest that there are no situations in which the market works perfectly in which there may not be—I mean government can invest a lot in education. Let me just take an obvious case that is not microneutral. We allocate resources to education because we think in the long run that does promote productivity. All I can say is that there's a great sensitivity on the part of all of us.

Senator Proxmire. Mr. Kahn, I want to thank you very, very much for excellent testimony and a fine record. The fact that inflation does seem to be cooling off, if not at zero and it isn't certain that it's maybe 7 or 7.5 percent underlying rate or 8 percent, it's a great improvement and you certainly deserve substantial credit for it and you should get it. You're not going to get much of it because the people who run for office are going to claim it, but you deserve whatever credit there is, in my judgment, more than anybody. Thank you.

[Whereupon, at 11:45 a.m., the committee adjourned, subject to

the call of the Chair.]

MONITORING INFLATION

TUESDAY, SEPTEMBER 23, 1980

Congress of the United States, Joint Economic Committee, Washington, D.C.

The committee met, pursuant to notice, at 10:10 a.m., in room 6226, Dirksen Senate Office Building, Hon. William Proxmire (member of the committee) presiding.

Present: Senator Proxmire.

Also present: John M. Albertine, executive director; Charles H. Bradford, minority counsel; William R. Buechner and Mayanne Karmin, professional staff members; and Betty Maddox, administrative assistant.

OPENING STATEMENT OF SENATOR PROXMIRE, PRESIDING

Senator PROXMIRE. The committee will come to order. While Mr. Russell is getting his act in order, I'll make a short opening statement.

The news for August for consumer prices unfortunately is not good. True, there is only a—only a seven-tenths of 1 percent increase, but if we take out mortgage interest rates, for which there is a lag, it's a 1.1 percent increase, which is back to the same old story of about a 13 to 14 percent inflation rate.

Why do I take out mortgage interest rates? I take them out because the August rates reflect the closing period of a commitment which was made in June; in other words, the June interest rate for mortgages is the one that is reflected in the August figures. As we know, in June we are going down; by August, September—this month—they are going

So I think it is probably a more accurate reflection of what the infla-

tion rate truly is to take that out.

One other point I'd make, Mr. Russell, that you might try to cope with, and that is the producer price figures that came out earlier this month for August. They were particularly disturbing, especially in the area of food.

Overall, the producer price figures for August were 1.5, which in annual rate, of course, is around 17 to 18 percent. Consumer foods were up 4.4, but then when we go back and look at the intermediate goods level, we see foods rose in that single month of August 9.7 percent, and in July and August together, crude goods—crude foods, rose in a total for those 2 months of 18 percent; 18 percent in 2 months, that's about 100-percent inflation rate at the crude level.

Now, obviously, part of the food dollar the farmer gets is limited, so that will be reflected in the far lesser increase in the price of food, but it will mean that for many weeks and months to come, we can expect the price of food to rise and rise sharply. And therefore, I would expect that the inflation rate is going to continue to rise right through the fall; at least that's the way I look at this.

Without objection, the press releases entitled "The Consumer Price Index—August 1980" and "Real Earnings in August 1980" will be

inserted in the hearing record at this point.

[The press releases referred to follow:]

New United States Department of Labor

Bureau of Labor Statistics

Washington, D.C. 20212

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--- THE-CONSUMER-PRICE -INDEX--AUGUST 1980 --

The Consumer Price Index for All Urban Consumers (CPI-U) rose 0.6 percent before seasonal adjustment in Avgust to 249.4 (1967=100), the Bureau of Labor Statistics of the U.S. Department of Labor announced today. The Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W) also increased 0.6 percent before seasonal adjustment in August to 249.6 (1967=100). The CPI-U was 12.8 percent higher and the CPI-W was 12.7 percent higher than in August 1979.

CPI for All Urban Consumers (CPI-U) -- Seasonally Adjusted Changes

On a seasonally adjusted basis, the CPI for All Urban Consumers rose 0.7 percent in August. This increase followed no change in July and an average monthly increase of 0.9 percent during the second quarter of this year. About one-half of the August increase was due to a sharp acceleration in the food and beverage index, which rose 1.7 percent. The housing component showed little change in August (0.1 percent increase), following a decline of 0.7 percent in July, as higher house prices and other housing costs offset a 4.3 percent decline in mortgage interest rates. The transportation component also accelerated in August,

Table A. Percent Changes in CPI for All Urban Consumers (CPI-U)

l		seasor	iarra	adjust	ed			Unadjusted
	Chang	es fro			month	<u> </u>	Compound annual rate 3-mos. ended	12-mos. ended
Feb.	Mar.	Apr.	May	June	July	Aug.	Aug. '80	Aug. '80
1.4	1.4	.9	.9	1.0	0	.7	6.9	12.8
0	1.0	.5	.3	.5	.9	1.7	13.7	9.5
1.4	1.6	1.3	1.5	1.8	7	.1	5.0	14.8
6	2.0	.3	2	0	.4	.6	4.1	7.4
2.8	1.7	.6	.3	2	.4	.9	4.1	- 15.1
1.5	.9	.7	٠,5	.5	.7	.7	8.0	11.0
1.2	1.3	.8	.6	.6	.8	.8	9.1	9.4
1.0	.5	•6	.8	.8	.5	.6	7.6	8.9
	1.4 0 1.4 .6 2.8 1.5	Chang Feb. Mar. 1.4 1.4 0 1.0 1.4 1.66 2.0 2.8 1.7 1.5 .9 1.2 1.3	Changes from Feb. Mar. Apr. 1.4 1.4 .9 0 1.0 .5 1.4 1.6 1.3 .6 2.0 .3 2.8 1.7 .6 1.5 .9 .7 1.2 1.3 .8	Changes from pre 1980 Feb. Mar. Apr. May 1.4 1.4 .9 .9 0 1.0 .5 .3 1.4 1.6 1.3 1.5 .6 2.0 .32 2.8 1.7 .6 .3 1.5 .9 .7 .5 1.2 1.3 .8 .6	Changes from preceding 1980 Feb. Mar. Apr. May June 1.4 1.4 .9 .9 1.0 0 1.0 .5 .3 .5 1.4 1.6 1.3 1.5 1.8 .6 2.0 .32 0 2.8 1.7 .6 .32 1.5 .9 .7 .5 .5 1.2 1.3 .8 .6 .6	1980	Changes from preceding month 1980 Feb. Mar. Apr. May June July Aug. 1.4 1.4 .9 .9 1.0 0 .7 0 1.0 .5 .3 .5 .9 1.7 1.4 1.6 1.3 1.5 1.87 .1 1.6 2.0 .32 0 .4 .6 2.8 1.7 .6 .32 .4 .9 1.5 .9 .7 .5 .5 .7 .7 1.2 1.3 .8 .6 .6 .8 .8	Changes from preceding month 1980 3-nos. ended Aug. '80 1.4 1.4 .9 .9 1.0 0 .7 6.9 1.7 13.7 1.4 1.6 1.3 1.5 1.8 -7 .1 5.0 1.6 2.0 .3 -2 0 .4 .6 4.1 2.8 1.7 .6 .3 -2 .4 .9 4.1 1.5 .9 7 .5 5.5 .7 .7 8.0 1.2 1.3 .8 .6 .6 .8 .8 9.1

(Data for CPI-U are shown in tables 1 through 3.)

primarily reflecting price increases for new and used cars. Other major components of consumer expenditures continued to advance at about the same rate as in July.

Prices for grocery store foods rose 2.3 percent in August, following a 1.2 percent increase in July and much smaller increases earlier this year. The index for meats, poultry, fish, and eggs rose 4.1 percent and accounted for about one-half of the increase. Beef, pork, and poultry prices all advanced sharply for the second consecutive month. Egg prices rose 6.6 percent, following a 3.9 percent decline in July. The indexes for fresh fruits and vegetables, non-alcoholic beverages, fats and oils, and other prepared foods also registered substantial increases in August. Prices of the other two components of the food and beverage index--restaurant meals and alcoholic beverages--rose 0.6 and 1.0 percent, respectively.

The housing index increased 0.1 percent in August, following a 0.7 percent decline in July and substantially larger increases earlier this year. After decreasing 5.6 percent in July, home financing costs declined 2.8 percent in August, reflecting a 4.3 percent drop in mortgage interest rates and a rise of 1.7 percent in house prices. The index for rent rose 0.6 percent, about the same as in July. Prices for household fuels rose 0.5 percent, the smallest increase this year. Fuel oil prices continued the moderate rate of increase evident since April and charges for natural gas and electricity advanced less than in recent months. The index for household furnishings and operations rose 0.5 percent in August, about the same as in recent months.

The transportation component increased 0.9 percent in August, the largest monthly advance since March. New and used car prices rose 1.7 and 2.3 percent, respectively, and were primarily responsible for the increase. The index for public transportation rose 4.4 percent, reflecting large increases in airline, intracity mass transit, intercity bus, and taxi fares. Casoline prices declined for the fourth consecutive month. Automobile finance charges, which had advanced sharply earlier this year, declined for the third consecutive month.

The index for apparel and upkeep rose 0.6 percent in August, compared with a 0.4 percent increase in July. The introduction of fall and winter clothing was largely responsible for the increase. Prices for other apparel commodities rose sharply, primarily due to increases in prices for jewelry. The index for apparel services rose moderately for the third consecutive month, following substantial increases earlier this year.

The medical care index increased 0.7 percent in August, the same as in July. Charges for hospital and other medical care services rose 1.5 percent, while physicians' fees advanced 0.5 percent. The index for medical care commodities rose 0.9 percent, about the same as in recent months.

The index for entertainment rose 0.8 percent and the index for other goods and services increases 0.6 percent, about the same as in July.

CPI for Urban Wage Earners and Clerical Workers (CPI-W) -- Seasonally Adjusted Changes

On a seasonally adjusted basis, the CPI for Urban Wage Earners and Clerical Workers rose 0.7 percent in August, following no change in July and an average monthly increase of 0.9 percent during the second quarter this year. Almost one-half of the August increase was due to a sharp acceleration in the food and beverage index, which rose 1.7 percent. The housing component rose 0.2 percent in August, following a decline of 0.7 percent in July, as increases in house prices and other housing costs offset a 4.3 percent decline in mortgage interest rates. The transportation component also accelerated in August, primarily reflecting price increases for new and used cars. Most other major components of consumer expenditures advanced slightly more in August than in July.

Prices for grocery store foods rose 2.2 percent in August, following a 1.1 percent increase in July and much smaller increases earlier this year. The index for meats, poultry, fish, and eggs rose 3.8 percent and accounted for about one-half of the increase. Beef, pork, and poultry prices all advanced sharply for the second consecutive month. Egg prices rose

6.3 percent, following a 4.2 percent decline in July. The indexes for fresh fruits and vegetables, non-alcoholic beverages, fats and oils, and other prepared foods at home also registered substantial increases in August.

The housing index increased 0.2 percent in August, following a 0.7 percent decline in July and increases of 1.0 percent or more in each of the preceding 17 months. Following a 5.6 percent decrease in July, home financing costs declined 2.7 percent in August, reflecting a 4.3 percent drop in mortgage interest rates and an increase of 1.7 percent in house prices. The index for rent rose 0.6 percent, about the same as in July. Prices for household fuels rose 0.5 percent, the smallest increase this year.

The transportation component rose 0.9 percent in August, the largest increase since March. New and used car prices rose 1.7 and 2.3 percent, respectively, and were primarily responsible for the increase. The index for public transportation rose 4.5 percent. Gasoline prices declined for the fifth consecutive month. Automobile finance charges, which had advanced sharply earlier this year, declined for the third consecutive month.

The index for apparel and upkeep rose 0.7 percent in August, compared with an increase of 0.5 percent in July. The introduction of new fall and winter wear was largely responsible for the increase.

The medical care index rose 0.8 percent in August, the same as in July. Charges for hospital and other medical care services rose 1.7 percent, while physicians' fees rose 0.8 percent. The index for medical care commodities rose 0.8 percent.

The index for entertainment rose 0.7 percent, and the index for other goods and services increased 0.6 percent.

Table B. Percent Changes in CPI for Urban Wage Earners and Clerical Workers (CPI-W)

	Se	easonal	ly ad	justed				Unadjusted
	Chang	es fro			month		Compound annual rate 3-mos. ended	12-mos. ended
Feb.	Mar.	Apr.	May	June	July	Aug.	Aug. '80	Aug. '80
1.4	1.4	1.0	.9	.9	0	.7	6.7	12.7
0	.9	.7	.5	.5	.9	1.7	13.1	9.6
1.4	1.6	1.4	1.5	1.9	7	.2	5.5	14.8
.9	1.7	.3	.1	3	.5	.7	3.7	7.0
2.8	1.7	.6	. 2	3	.4	.9	3.9	14.9
1.5	.9	.8	.6	.4	.8	.8	8.3	11.3
1.2	1.6	.8	.5	.7	.4	.7	7.7	8.8
.9	.4	.5	.8	.8	•5	.6	7.8	8.5
	1.4 0 1.4 .9 2.8 1.5	Change Feb. Mar. 1.4 1.4 0 .9 1.4 1.6 .9 1.7 2.8 1.7 1.5 .9 1.2 1.6	Changes from Feb. Mar. Apr. 1.4 1.4 1.0 0 9 .7 1.4 1.6 1.4 .9 1.7 .3 2.8 1.7 .6 1.5 .9 .8 1.2 1.6 .8	Changes from pre 1980 Feb. Mar. Apr. May 1.4 1.4 1.0 .9 0 .9 .7 .5 1.4 1.6 1.4 1.5 .9 1.7 .3 .1 2.8 1.7 .6 .2 1.5 .9 .8 .6 1.2 1.6 .8 .5	Changes from preceding 1980 Feb. Mar. Apr. May June 1.4 1.4 1.0 .9 .9 0 .9 .7 .5 .5 1.4 1.6 1.4 1.5 1.9 .9 1.7 .3 .13 2.8 1.7 .6 .23 1.5 .9 .8 .6 .4 1.2 1.6 .8 .5 .7	1980 1980	Changes from preceding month 1980 Feb. Mar. Apr. May June July Aug. 1.4 1.4 1.0 .9 .9 .0 .7 0 .9 .7 .5 .5 .9 1.7 1.4 1.6 1.4 1.5 1.97 .2 .9 1.7 .3 .13 .5 .7 2.8 1.7 .6 .23 .4 .9 1.5 .9 .8 .6 .4 .8 .8 1.2 1.6 .8 .5 .7 .4 .7	Changes from preceding month 1980 Feb. Mar. Apr. May June July Aug. '80 1.4 1.4 1.0 .9 .9 .0 .7 6.7 0 .9 .7 .5 .5 .9 1.7 13.1 1.4 1.6 1.4 1.5 1.97 .2 5.5 .9 1.7 .3 .13 .5 .7 3.7 2.8 1.7 .6 .23 .4 .9 3.9 1.5 .9 .8 .6 .4 .8 .8 8.3 1.2 1.6 .8 .5 .7 .4 .7 7.7

(Data for CPI-W are shown in tables 4 through 6.)

Technical Notes

Brief Explanation of the CPI

The Consumer Price Index (CPI) is a measure of the average change in prices over time in a fixed market basket of goods and services. Effective with the January 1978 index, the Bureau of Labor Statistics began publishing CPI's for two population groups: (1) A new CPI for All Urban Consumers (CPI-U) which covers approximately 80 percent of the total noninstitutional civilian population; and (2) a revised CPI for Urban Wage Earners and Clerical Workers (CPI-W) which represents about half the population covered by the CPI-U. The CPI-U includes, in addition to wage earners and clerical workers, groups which historically have been excluded from CPI coverage, such as professional, managerial, and technical workers, the self-employed, short-term workers, the unemployed, and retirees and others not in the labor force.

The CPI is based on prices of food, clothing, shelter, and fuels, transportation fares, charges for doctors' and dentists' services, drugs, and the other goods and services that people buy for day-to-day living. Prices are collected in 85 urban areas across the country from about 18,000 tenants, 18,000 housing units for property taxes, and about 24,000 establishments—grocery and department stores, hospitals, filling stations, and other types of stores and service establishments. All taxes directly associated with the purchase and use of items are included in the index. Prices of food fuels, and a few other items are obtained every month in all 85 locations. Prices of most other commodities and services are collected every month in the five largest geographic areas and every other month in other areas. Prices of most goods and services are obtained by personal

visits of the Bureau's trained representatives. Mail questionnaires are used to obtain public utility rates, some fuel prices, and certain other items.

In calculating the index, price changes for the various items in each location are averaged together with weights which represent their importance in the spending of the appropriate population group. Local data are then combined to obtain a U.S. city average. Separate indexes are also published by size of city, by region of the country, for cross-classifications of regions and population-size classes, and for 28 local areas. Area indexes do not measure differences in the level of prices among cities; they only measure the average change in prices for each area since the base period.

The index measures price changes from a designated reference date—1967—which equals 100.0. An increase of 122 percent, for example, is shown as 222.0. This change can also be expressed in dollars as follows: The price of a base period "market basket" of goods and services in the CPI has risen from \$10 in 1967 to \$22.20.

For further details see the following: The Consumer Price Index: Concept and Content Over the Years, Report 517, revised edition (Bureau of Labor Statistics, May 1978); The Revision of the Consumer Price Index, by W. John Layng, reprinted from the Statistical Reporter, February 1978, No. 78-5 (U.S. Dept. of Commerce), Revisions in the Medical Care Service Component of the Consumer Price Index, by Daniel H. Ginsburg, Monthly Labor Review, August 1978; and CPI Issues, Report 593, (Bureau of Labor Statistics, February 1980).

A Note About Calculating Index Changes

Movements of the indexes from one month to another are usually expressed as percent changes rather than changes in index points because index point changes are affected by the level of the index in relation to its base period while percent changes are not. The example in the accompanying box illustrates the computation of index point and percent changes.

Percent changes for 3-month and 6-month periods are expressed as annual rates and are computed according to the standard formula for compound growth rates. These data indicate what the percent change would be if the current rate were maintained for a 12-month period.

Index Point Change	
CPI	236.4
Less previous index	233.2
Equals index point change:	3.2
. Percent Change	
Index point difference	3.2
Divided by the previous Index	233.2
Equals:	0.014
Results multiplied by one hundred	0.014x100
Equals percent change:	1.4

A Note on Seasonally Adjusted and Unadjusted Data

Because price data are used for different purposes by different groups, the Bureau of Labor Statistics publishes seasonally adusted as well as unadjusted changes each month.

For analyzing general price trends in the economy, seasonally adjusted changes are usually preferred since they eliminate the effect of changes that normally occur at the same time and in about the same magnitude every year—such as price movements resulting from changing climatic conditions, production cycles, model changeovers, holidays, and sales.

The unadjusted data are of primary interest to consumers concerned about the prices they actually pay. Unadjusted data also are used extensively for escalation purposes. Many collective bargaining contract agreements and pension plans, for example, tie compensation changes to

the Consumer Price Index unadjusted for seasonal variation. Seasonal factors used in computing the seasonally adjusted indexes are derived by the X-11 Variant of the Census Method II Seasonal Adjustment Program. The updated seasonal data at the end of 1977 replaced data from 1967 through 1977. Subsequent annual updates have replaced 5 years of seasonal data, e.g., data from 1975 through 1979 were replaced at the end of 1979. The seasonal movement of all items and 35 other aggregations is derived by combining the seasonal movement of 45 selected components. Each year the seasonal status of every series is reevaluated based upon certain statistical criteria. If any of the 45 selected components changes its seasonal status, seasonal data from 1967 forward for the all items and for any of the 35 other aggregations. that have that series as a component, are replaced.

24 Hour CPI Mailgram Service

Consumer Price Index data now are available by mailgram within 24 hours of the CPI release. The new service is being offered by the Bureau of Labor Statistics through the National Technical Information Service of the U.S. Department of Commerce.

The CPI MAILGRAM service provides unadjusted and seasonally adjusted data both for the All Urban Consumers

(CPI-U) and for the Urban Wage Larners and Clerical Workers (CPI-W) Indexes as shown on the CPI-U sample page below. The unadjusted data include the current month's index and the percent changes from 12 months ago and one month ago. The seasonally adjusted data are the percent changes from one month ago.

GROUP	UNADJ INDEX May 1979	PER CHG	FER CHG FROM I MO AGO	
tt ITIMS tt IT(MS(1957-59=100)	214.1 249.0	10.8	1.2	2:1
DUP AND PLVERAGES	228.2	11.2 11.4	. 8	. !
nch	234.3	11.4	. 7	
OUP AT HOME	216.2		. 8	1.0
FREALS AND BAKERY PRODUCTS FATS, FOULTRY, FISH, AND ECGS	242.2	19.4	. 9	
ZIKT FRURUCIS	203.8	11,1	; i	. 1
RUITS AND VEGETABLES	226.8	3.4		
ODD ARAY FROM HOME	241;1			
nustuc	222.4	11.3 6.8 14.6 7.7 23.2 8.2 7.5	1.2	
ENT. RESIDENTIAL	173.8	8.8	1.0	111
CHECUSING HIP USE AND OTHER UTILITIES	232.2	17.5	2.1	
THE OIL COME, AND BOTTLED GAS	366.3	23.2	4.1	4.3
SET OIL COAL AND BOTTLED GAS	251.6	8.2	2.6	2.6
CUSTROLD FURNISHINGS AND OPERATION	189.2	7.5	. 3	٠.٠
PFARIL AND UPKEEP	166.1	3.9	.4	. (
RANSPORTATION	207.7	13.4 8.7	2.4	1.8
CH CARS	165.8		2.7	1.
SID CARS	565.3	29 1	5.5	
SID CARS ASCLING USLIC IRANSPORTATION UDICAL CARS	193.3	11.3 29.1 3.1	7.4	- 13
	236.3	8.9	. 5	
EDICAL CARE SERVICES .	254.4	9.4	. 5	
NICSTAINMENT	187.8	6.6		
THER GOODS AND SERVICES	193.9	7.5 7.5	. •	٠,
IRSONAL CARE 1/				
OFMORTALIS CIDIOPLIALS LESS FOOD AND SEVERAGES	225.8	10.9	1.2	
CKPURARIIS LESS FOOD AND LEVERAGES	195 7	12.0	2.0	
0246112	189.2	10.0		
IRVICES	229.5	10.3	1.1	1.3
it tites tess read	263.9	10.5	1.3	
NERGY TV AL TITRS 1835 FOOD AND EMERGY	204.1	19.8	4.3	• •

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TABLE 1. Consumer Price Index for all urban consumers: U.S. city average, by expenditure category and commodity and service group, 1967+100

All items (1937-39-100). Food and beverages. Open and beverages. Food and beverages. Open and beverages. Careals and bakery products 1/ Means, pooltry, fish, and eggs. Fruits and vegetables. Sugar and swest 1/ Flass and oils. Fruits and oils. Sugar and swest 1/ Flass and oils. Fruits and vegetables. Fruits and product are repairs. Fruits and purchase 1/ Fruits and purchase 1/ Fruits and post of the vegetables. Fruits and post of the vegetables. Fruits and vegetables. Fruits and vegetables. Fruits and vegetables. Fruits and vegetables. Mouse furnishings. Housekeeping supplies 1/ House vegetables. Men's and boys' apparel. Fruits and vegetables. Men's and boys' apparel. Fruits and vegetables. Fruits and vegetables. Men's and boys' apparel. Fruits and vegetables. Men's and boys' apparel. Fruits and vegetables. Men's and boys' apparel. Fruits and vegetables. Men's and poys' apparel. Men's and poys' apparel. Men's and poys' apparel. Men's an	Relative importance, December 1979	Unadjusted July 1980	indexes Aug. 1980		from- uly 1980	Sesso perce May to June	nally adjus nt change f June to July	ted rom- July to Aug.
				Expenditure	category			
All items(1957-59=100)	100.000	247.8	249.4	12.6	0.6	1.0	0.0	0.7
Food and beverages	18.685	288.2 248.3	290.0 252.0	9.5 9.5 9.6	1.5	., .5	9	1.7
Food at home	17.655	254.8 251.5 247.8	258.7 256.3	9.5 9.6		.5 .4 .6	1.0	1.6
Heats, poultry, fish, and eggs	1.518		249.2	11.4	3.7	.6	1.2	4.1
Dairy products	1.642	228.6	229.7 258.4	10.1		4 .6	1.2	.5
Sugar and sweets 1/	.418 .346	228.6 253.9 353.1	355.1	26.4	.6 1.1	4.7	1.8	3.4
Nonalcoholic beverages	1.375	239.3 397.4 232.3	242.0 402.8	26.4 5.7 11.3	1.1	-:4	4	1.5
Other prepared foods	1.013	232.3 267.8		11.6	1.1	1.0	1.0	1.2
Alcoholic beverages	1.029	187.2	269.5 188.7	8.9 14.8	.ā	.7 1.0	.5	1.0
Shelter	30.910	265.1 282.9	265.8 283.3	16.2	.1	2.1	-1.4	1
Other rental costs	5.273	192.1 265.7	193.2	8.8	.6 .7	2.1 1.2 .7 2.3	.5	.6 .6 2 1.7
Homeownership	24.904 10.396	315.4 253.9	315.4	17.9 13.8	.0	2.3	-1.8 .5	2
Financing, taxes, and insurance	10.902 3.606	399.6 287.6	393.6	24.4 11.1	1.7	1.2 3.9	-4 4	-2.0
Maintenance and repair services	2.778	312.1	312.4	10.9	.3	1 4	.6 .5	.1
commodities 1/	.828	230.3	232.7	11.8	1.0	1.0	1.0	1.0
Fuel and other utilities 1/	6.477 4.607	285.5 360.8	286.8 362.5	16.0 21.0	.5	2.3	1.2	
Fuel oil, coal, and bottled gas 1/	4.607 1.214 3.393	360.8 560.4 314.3	561.5 316.1	28.0	.2	.5	.3	.5 .5
Other utilities and public services 1/	1.870	165.9	144 8	18.6	.4 .5	3.6	1.8	.6
Housefurnishings	7.612 4.139	206.2 174.7	207.2 175.2	8.4 7.4	. 3	.6 .6	.6 .6	.5
Housekeeping supplies I/	1.459	247.3	249.9 271.6	11.9	1.1	.7	.8	1.1
Apparel and upkeep	5.107 4.446 1.396	176.2 168.5	178.6 171.0	18.6 4.2 8.4 7.4 11.9 7.9	1.4	.0		.4
Men's and boys' apparel	1.396	165.9	167.9	5.2	1.5	1 4	. 6	.6 .6 .7
Infants' and toddlers' apparel 1/	1.701	150.6 243.0 189.5	153.7 243.9	1.6 10.3 7.2	2.1	1.5	.6 .1 .9	
Other apparel commodities 1/	.669 .572	189.5 205.5	190.3	7.2	2-1	1.3	1.2	2.1
Apparel services 1/	.662 18.572	205.5 234.4 251.0 250.5	235.4 252.7	23.6 13.3 15.1	.7	.6 2	.3	.4.
Private transportation	17.506 3.731 2.838	250.5 179.2	251.6 181.1	14.2 8.7	. 4	4	.2	.7
Used cars	2.838	203.4	206.4	3	1.1	-1.1	.9	1.7 2.3
Maintenance and repair	5.619 1.473	376.7 269.0	375.9 271.1	28.7 10.3	.8	-1.0 .6	.7 5 .7	4 . 5
Other private transportation Other private trans. commodities 1/.	3.845 .712 3.133	224.5 197.7	224.7 198.3	12.1 13.2	.1	.6 .4 .1 .5	1.1	.4
Other private trans. services	3.133	233.6 250.5	233.9	11.9	iñ.		1	.3
Medical care	4.817	266.6 169.1	268.4 170.2	11.0 9.8	•.7	1.1 .5 .9	3.4	.3 4.4 .7
Medical care services 1/	4.015	288.0	289.8	11.2	4.4 .7 .7 .6	.4	.8	.9
Other medical care services 1/	1.911	288.0 253.5 329.7	254.7 332.3 208.0	11.3 11.1	.5 .6 .7	.6 .3	.7 .7 .6	.6
Entertainment	3.738	206.6	208.0	9.4	- 7		.8	.8 .9 .6
Entertainment services 1/	2.214 1.523 4.081	203.1 213.5 203.6	210.8 204.3	7.9 8.9	-6	.6 .5 .6 .8	. 8 . 5	.6
Tobacco products 1/	1.080	203.6	214.5 204.5 215.4	7.7	.6 .5 .3	1.5	.3 .2 .9	.6 .3 .5
Toilet goods and personal care	1.632			9.1		.4	.9	.5
Personal care services 1/	.728 .905 1.369	207.9 220.9 229.9	209.0 221.7	10.2 8.1	.5	.5	1.4	.5
Personal and educational expenses School books and supplies	1.369	229.9 207.2	221.7 231.4 207.7	9.8 7.8	.4	.5 .4 .5 .5	.6 .3 .7	.5 .4 .9 .7
Personal and aducational services	1.195	235.5	237.1	10.1	.7	.3	.2	.9
			Comm	odity and serv	ice group			
All items Commodities Food and Deverages Commodities less food and beverages Modification less food and beverages Modification less food beverages Apparal commodities and beverages, and apparal Dufables Services Services Household services less rant Transportation services Medical care services Medical care services Johns services Special induces	100.000	247.8	249.4	12.6	0.6	1.0	0.0	0.7
Food and beverages	59.063 18.685 40.379	234.1 248.3	236.7 252.0 226.0	11.5 9.5 12.5	1.1 1.5 .9	.3	.6 .9	0.7 1.2 1.7
Mondurables less food and beverages	17.706	224.0 241.4	242.6	12.5 16.2 6.5	.9 .5 1.5	.0	.6 .9 .5	.9
Mondurables less food, beverages,	4.446	168.5	171.0		1.5	1	14	.6
and apparel Durables	13.261	282.9	283.5	19.5	.2	.0 .5	-1 -5	
Services	40.937	209.8 272.4 192.1 323.3	212.4	9.7	6	1.8	8	1.6
Household services less rent	5.273 21.692	323.3	193.2 321.5	6.8 17.9	6 1.1	1.2 2.7 .7	.5 -1.9	6 8
Medical care services 1/	5.673 4.015	243.8	246.4 289.6	14.7 11.2	1.1	.7		1.3
Other services Special indexes: All items less food	4.285	218.1	219.2	9.3	.6 .5	.6	.7	.6
All items less food	82.345 69.090	245.1 236.4	246.3 238.5	13.6	.5 .9 .9	1.1	2	
All items less mortgage interest costs	91.346	236.8	239.0	11.3	.9	.5	2 .7 .6	1.0
mortgage interest costs	80.950	235.0	236.9	11.0	.8	.5	.6	1.0
Commodities less food.	95.183 41.408	246.5	248.1 224.2 237.8	12.9 12.4 15.8	.6 .9	1.0	.ŏ	.7
Mondurables less food	18.736 14.290	236.6 270.3	270.9	15.8 16.7	.5 .2 1.0		. 3	., .,
Nondurables	36.391 35.664	245.9 287.6	748.3	12.7	1.0	.3	.2 .7	1.1
Services less medical care 1/	36.921	268.9 370.4	287.4 268.7 370.7	15.5 15.0	-:1 -:1	2.0	9 8	2
All items less energy	10.313 89.687	238.3	240.0	25.1 11.4	.1	1.0	.3	. 2
All items less food and energy Commodities less food and energy	72.032 34.488	233.1 202.0	234.3 204.3	11.9	1.1	1.1	- 2	1.1
Energy commodities	6.920 37.544	404.8 269.1	404.2 269.0	9.4 28.5 14.3	i	6	.6 2	1.1 4 2
Special indexes (cod. All items less shelter. All items less shelter. All items less shortened interest costs. All items less shortened costs. All items less shortened costs. All items less food. All items less food. Mondurables less food. Mondurables less food and apparel. Services less rent. Services less rent. Services less madical care ly. Commodities less food and energy. Commodities less food and energy. All items less food and energy. Energy commodities.		\$.404	\$.401	-11.3	.0	1.6	-1.0	
1957-59=\$1.00 1/	:	.347	.345	-11.3	7	-1.0	0	7
1/ Mot sessonally adjusted								

1/ Not seasonally adjusted.

CPI-U

TABLE 2. Consumer Price Index for all urban consumers: Seasonally adjusted U.S. city average, by expenditure category and commodity and service group, 1967-100

•	Seasonally adjusted indexes					Seasonally sojusted annual rate percent change for- 3 months ending in 6 months ending in						
Group	May 1980	June 1980	July 1980	Aug. 1980	Nov. 1979	Feb. 1980	naing in May 1980	Aug. 1980	Feb. 1980	ending in Aug. 1980		
All items. Pood and beverages Food at home Coreals and bakery products I/ Food at home Coreals and bakery products I/ Dairy products Fruits and vegetables Sugar and sweets I/ Monalicholic beverages Other prepared foods Food swey from home And the prepared food Food swey from home And the prepared food Mousing Home purchase I/ Finel residential I/ Other purchase I/ Finel the purchase I/ Finel the purchase I/ Finel commodities I/ Full and internance and repair services Maintenance and repair services Maintenance and repair services Maintenance and repair services Mouse food in the purchase I/ Foul commodities I/ Foul commodities I/ Mousehold furnishings and operation Mouse furnishings Mousekeeping supplies I/ Mousehold furnishings and operation Mouse furnishings Mouse food furnishing				Ex	penditure							
All items	242.9	244.2 250.5	246.5	250.8 257.5	13.5 10.3 10.4	17.2 5.9 5.6	13.6 7.6	6.9 13.7 14.0	15.3 8.1 8.0	10.2 10.6 10.7		
Food at home	249.2 245.1	250.5 246.0 245.9	252.9 248.9	254.7	10.7	4.1	7.6 7.6 7.2 13.7	14.0 16.6 7.9	7.4	10.7 11.8 10.7		
Cereals and bakery products 1/	244.5	245.9	247.8	249.2	9.2 11.2	14.9	13.7	7.9	12.1	10.7		
Dairy products	226.4	229.6 227.7 242.3	232.3 230.4	241.8 231.6 255.1	9.9	-20.7	-9.2 15.5 30.4	9.5 25.3	8.0 -7.7	4.8 12.5 27.9		
Sugar and sweets 1/	326.8	342.0 238.8	246.7 353.1		1,2	21.8	45.6	39.4	12.1	42.5		
Fats and oils Monalcoholic beverages	239.7 388.7	390.8	237.9 391.9	241.5 400.0	5.4 23.4	9.3	45.6 3.2 1.6 15.7	3.0 12.1	16.1 8.7	6.7		
Other prepared foods	228.9 263.8	231.1 266.1	233.5	236.3 269.0	6.8	10.6	8.3	13.6		14.6 8.2		
Alcoholic beverages	184.7	186.0	187.0 265.1	188.9	9.5	7.2 18.3	8.3 9.4 19.7	9.4 5.0	8.4 17.6 20.9	9.4 12.1		
Shelter	281.0	286.8	282.8	282.6	21.4	20.3	21.9	2.3 9.4	20.9	11.7		
Other rental costs	261.9	263.7	264.1	265.6	14.2	20.6	9.2 25.6	5.8	17.4	7.5 12.5		
Home purchase 1/	249.7	252.6	253.9	258.1	19.6	10.0	11.5	14.2	14.7	12.8		
Financing, taxes, and insurance Maintenance and repairs	285.5	418.2 285.2	399.6 286.9	391.6 287.9	34.2 10.6	39.5 14.6	43.0 16.2	-10.4 3.4	36.8 12.6	9.6		
Maintenance and repair services	311.0	. 309.7	311.2	311.5	10.2	16.2	17.2	.6	13.1	8.6		
commodities 1/	225.8	228.0 282.2	230.3 285.5	232.7 286.8	11.6	9.5 20.1	13.2	12.8 16.8	10.6	13.0 18.2		
Fuels 1/	346.4	355.8 558.7	360.8 560.4	362.5 561.5	8.0 10.1 40.4	28.9 62.6	19.6 25.8 13.1	16.8 19.9 4.0	19.1 51.1	22.8 8.5		
Gas (piped) and electricity 1/	298.2	308.8	314.3	316.1	1.2	18.4	30.9	26.3	9.4			
Household furnishings and operation	203.9	164.9 205.2	206.4	1645 207.5	3.0 7.3	9.1	4.5 9.8	8.6 7.3	8.2	6.6		
Housekeeping supplies 1/	173.1 243.6	174.1 245.4 269.1	175.1 247.3	175.7 249.9 271.6	6.5 9.1 8.2	8.2 12.3 8.0	8.5 15.5	6.1	7.3	7.3 13.1		
Housekeeping services I/	267.6	269.1	270.4	271.6 179.0	8.2 7.7	8.0 9.3	9.5	6.1	8.1	7.8		
Apparel commodities	169.8	177.2 169.7 166.5	170.4	171.5	6.9	8.1	7.4	4.1	7.5	6.4 5.7 5.6		
Momen's and dirls, abbasel	154.1	153.3	153.4 243.0	154.0	9.5	6.2	20.5	3.4 3 11.4	3.2	· .1		
Footwear	188.5	188.8	191.0	243.9 191.1	10.2	6.5	6.6 25.8	5.6 15.0	8.4	6.1		
Apparel services 1/	202.7	205.3	205.5	209.9 235.4	20.2 13.1	34.3 17.3	17.8	15.0 5.6 4.1	27.1 15.2	20.3 11.5 7.4		
fransportation	248.3	247.7 247.5	248.6 248.0	250.6 249.7	13.7	33.6 33.8	10.8 10.5	2.1	23.2 22.6	7.4 6.2		
New Cars	178.7	178.9 193.2	180.5	183.5 199.0	1.0	11.6 8.6	11.5 -17.0	11.2 7.6	6.1 5.2 61.1	11.3		
Gasoline	375.8	372.1	370.4 269.3	368.9 271.4	32.9	95.4 10.8	13.9	-7.1 8.7	61.1	-5.5 2.8 10.9		
Other private transportation	224.2	225.2	225.4 197.7	226.2 198.3	8.9 7.8	12.0	26.5	3.6	9.8	14.5		
Other private trans. commodities 1/ Other private trans. services	234.0	195.5 235.2	235.0	235.8	20.4 5.0 35.1	10.7	8.9 30.6	6.3 3.1	19.2 7.8	16.0		
Public transportation 1/	239.5	242.2 264.7	250.5 266.6	261.5 268.4	35.1 10.7	26.3 16.9	18.6	42.1 8.0	30.6	29.8 8.3		
Medical care commodities	166.1 284.7	167.6 285.9	168.9 288.0	170.4 289.8	7.7	10.2 18.2	10.8	10.8 7.4	9.0 14.6	10.B		
Professional services 1/	250.3	251.8 327.2	253.5 329.7	254.7 332.3	7.4	18.1	12 8	7.2	12.6	10.0		
Entertainment	203.5	204.7	206.4	208.0	6.5	10.3	4.5 11.4 11.2	9.1	8.4	6.0 10.2 10.2		
Entertainment services 1/	200.1	201.4	203.1	204.3	4.5	6.4	12.0	8.7	5.5	10.3		
Other goods and services	200.4	213.4	214.5 203.8	215.7 204.5	8.5	11.5	7.7	7.6 8.4 7.4	10.0 8.8 9.3	7.6		
Personal care 1/	211.6	212.4	214.4	215.4	7.1	11.6	10.3			6.8		
appliances 1/	204.1	205.1 219.6	207.9	209.0	7.4	11.9	11.5	10.0	9.6	10.7 7.1		
Personal and educational expenses	231.3	232.5	233.1 211.0	221.7 235.1 212.4	14.8	10.3	8.9 7.6 7.8	5.4 6.7 7.5	9.2 12.5 8.1	7.1 7.2 7.7 7.1		
Personal and educational services	236.8	238.1	238.6	240.7	16.3	10.0	7.4	6.6	13.1	ž.i		
				Commod	ity and s	ervice g	roup					
All items	230.8	011		235.8	13.5	17.2 15.9	13.6	6.9	15.3	10.2		
All items. Commodities. Food and beverages. Commodities less food and beverages. Nondurables less food and beverages.		231.6 244.2 222.2 240.6	233.0 246.5 223.2 241.4	250.8 250.8 225.3 242.4	10.3	5.9 21.5 36.4	8.6 7.6 9.0	6.9 9.0 13.7 6.8 3.2	8.1 17.5	8.8 10.6 7.9		
Nondurables less food and beverages	242.9 221.6 240.5	240.6	241.4	242.4	13.6 14.1	36.4	13.5	3.2	24.8	8.2		
Mondurables less food and beverages. Apparel coamodities. Mondurables less food, beverages, Durabled apparel Services. Rent, residential /- Household services less rent Transportation services. Other services. Special indexes:	169.8	169.7	1/0.4	171.5	6.9	8.1	7.4	4.1	7.5	5.7		
and apparel	281.0 206.3	280.9 207.4	281.2 208.5	282.4 211.8	18.2 11.4	46.1 10.7	15.8 5.6	2.0 11.1	31.4 11.1	8.7		
Services	269.8 188.9	274.7	272.5	272.3 193.2	14.9 10.8	18.6	5.6 21.8	11.1 3.8 . 9.4	11.1 16.7 9.3	12.4		
Household services less rent	320.9	329.5 242.7	323.1	320.5 247.6	19.0 11.0	25.5 13.5	7.3 29.9 23.7	11.2	22.2 12.2	8.4 13.7 17.3		
Medical care services 1/	284.7	285.9	288.0 218.8	289.8 220.1	11.2	18.2	8.4 10.8	7.4	14.6	7.9		
Other services	216.4									8.9		
All items less food	242.6 232.9	245.2 234.0	244.8 235.6	245.8 237.9	14.2 10.3	20.1 15.8	15.1 10.2	5.4 8.9	17.1 13.0	10.2 9.5		
All items less mortgage interest costs All items less home purchase and	233.2	234.5	235.9	238.5	11.5	14.1	10.2	9.4	12.8	9.8		
Other services Special indexes: All items less foot. All items less shelter. All items less shelter. All items less mortgage interest costs All items less home purchase and mortgage interest costs. All items less medical care.	231.5 243.4	232.6 245.8	234.1 245.8	236.4	10.5	14.7 17.5	10.3	8.7 6.7	12.6 15.5	9.5 10.3		
Commodition lass food	219.8	220.4	221.4	223.5	13.5	21.2	8.8	6.9	17.3	7.9		
Nondurables less food	235.5	235.8	236.6 269.0	237 4	13.0		11.0	3.6 2.4 8.7	23.9	8.2 8.3 9.1		
Mondurables	242.5	243.3	244.9 287.8	269.8 247.6 287.2	17.6	43.6 20.1	14.6	8.7	16.4 17.8	9.1		
Mondurables less food and apparel Mondurables less food and apparel Mondurables Services less rent. Services less medical care 1/	285.1 265.7	290.5 271.0	268.9	268.7	15.4 15.8	20.3 18.3	24.0 22.2	3.0 4.6	17.8	13.0 13.1		
Energy	363.9	364.9	366.0	366.7	23.2	60.0	20.4	3.1	40.4	11.4		
All items less energy	235.5 231.0	237.8	237.8 233.1	239.8	12.2 12.6	12.9	13.4 14.1 7.6	7.5 5.8 9.5	12.6 14.0 10.1	10.4 9.9 8.5		
Energy All items less energy All items less food and energy Commodities less food and energy Energy commodities Services less energy	199.5	200.6 400.9	201.8	20A.1	12.2 12.6 9.1 32.3	11.1	7.6 16.7	9.5	10.1 57.1	8.5		
Services less energy	267.6	272.0	269.3	398.6 268.8	16.4	86.5 18.7	16.7 20.9	1.8	57.1 17.5	10.9		
1/ Not seasonally adjusted.												

1/ Not seasonally adjusted. NOTE: Index applies to a month as a whole, not to any specific date.

CPI-U

TABLE 3. Consumer Price Index for all urban consumers: Selected areas, all items index, 1967=100 unless

THERE S. CONSCIENT FILLS INCEX FOR E	Able 5. Consider Files have for all drown consumers: Selected areas, all items index, 1967=100 unless otherwise noted											
Ares 1/	Pricing schedule	Other index base	May 1980	Ind June 1980	exes July 1980	Aug. 1980	Aug.	nt chang 1980 fi June	July	July July	nt chang 1980 fi May	
U.S. city everage	2/		244.9	247.6	247.8	249.4	1979 12.8	1980 0.7	1980	1979	1980	1980
					247.0	247.4	12.0	u.,	0.6	13.2	1.2	0.1
Chicago, IllMorthwestern Ind Detroit, Mich			243.1	248.2	246.8	245.2	12.2	-1.2	6	13.5	1.5	6
L.ALong Beach, Anaheim, Calif			248.4	256.7 250.1	253.7 248.7	255.1	14.8	6	.6	15.6	2.1	-1.2
N.Y., N.YNortheastern N.J	Ĥ		234.5	237.2	238.9	240.8	13.7	-1.1 1.5	6	15.8	1.9	6
Philadelphia, PaN.J	н		239.4	242.5	244.1	246.0	13.0	1.4	.8	13.0	2.0	:7
Anchorage, Alaska	1	10/67	226.5	-	228.4		_			10.1		
Baltimore, Mo	1		249.1		252.4	- :			-	14.2	1.3	-
Boston, Mass			236.9	-	240.9	-	-	-	-	12.5	1.7	:
Cincinnati, Ohio-KyInd Denver-Boulder, Colo	1		251.6	-	256.7	•	-	-	-	14.2	2.0	-
Misni, Fla		11/77	258.0 129.7	- :	261.6 133.6	- :	-	-	-	10.6	1.4	-
Hilwaukee, Wis	1		250.3		251.6	- 1	-	-		15.5 13.0	· 3.0	-
Northeast Pennsylvania			232.5	-	239.8	-	_			13.3	3.1	
Portland, OregWash	1		257.3	-	252.7	-	-	-	-	11.1	-1.6	
St. Louis, MoIll	i		241.6 269.7	-	245.0	-	-	-	-	13.0	1.3	-
Seattle-Everett, Wash	i		249.6	-	269.9 255.1	:	- :	:	-	14.3	.1	-
Washington, D.CMaVa	ī		241.2	-	247.2		- :	-	-	17.3	2.2	- :
Atlanta, Ga	2		-	242.2	-	246.5	13.6	1.6		_	_	
Buffelo, N.Y			-	235.4	-	236.8	10.3	.6	-	-		
Cleveland, Ohio			-	250.1	-	253.9	14.7	1.5	-	-	-	-
Dallas-Fort Worth, Tex Honolulu, Hawaii	2		-	256.4	-	258.5 230.1	16.0 11.1	, - 8	-	-	-	~
Houston, Tex	2		- :	266.5	:	268.6	11.6	1.1	- :	-	- :	-
Kansas City, MoKans	2		-	247.8	-	250.8	11.7	1.2	- :			
Minneapolis-St.Paul, MinnWis	2		-	246.4	-	250.1	10.2	1.5	-	-	-	-
Pittsburgh, Pa San Francisco-Cakland, Calif	2 2		-	246.1 248.0	-	250.7 251.0	14.4	1.9	- :	-	-	-
Region 3/											-	-
Northeast	2	12/77	-	129.1		131.6	13.3	1.9				
North Central	2	12/77	-	134.7	-	134.9	12.1	-:1			:	
South	2	12/77	-	133.4	-	134.2	12.4	. 6	-	-	-	-
West	2	12/77	-	135.5	-	135.6	13.6	-1	-	-	-	-
Population size class 3/												
A-1	2.	12/77	-	131.9	-	132.1	12.7	.2		_	_	
A-2	2	12/77	-	133.7	-	135.2	13.5	1.1	_	-		- :
8	2 2	12/77	-	134.2	-	135.5	13.1	1.0	-	-	-	-
D	ź	12/77	-	133.3	:	134.4	12.4	.8	- 1	-	-	-
Region/population size class cross classification 3/								.,	·	-	-	-
Northeast/A	2	12/77	-	127.1	-	129.1	12.3	1.6	_	_	_	
Morth Central/A	2	12/77	-	136.7	-	136.8	13.1	1.1	Ĩ.	-	:	- :
South/A	2	12/77	-	133.5	-	134.8	13.6	1.0	-	-	-	-
Northeast/8	2	12/77	-	136.1	-	135.5 134.8	14.2	4	-	-	-	-
North Centrel/8	2	12/77	- :	134.4	- :	134.B 134.7	14.9	2.9	-	-	-	-
South/B	2	12/77	-	134.7		135.4	12.7	.5	-	:	:	- :
West/8	2	12/77	-	136.0	-	136.8	13.2	- 6	-	-	-	-
Northeast/C	2 2	12/77	-	135.6	-	138.3	15.1	2.0	-	-	-	-
South/C	2 2	12/77		151.9 133.1	-	132.9	11.7	.8	-	-	-	-
West/C	2	12/77		133.6		134.2	12.3	.5	-	-	-	-
Mortheast/0	2	12/7.7		131.0		134.1	14.7	2.4		:	:	
Morth Centrel/O	2	12/77	-	131.9	-	131.7	10.2	+.2	-	-		
South/D	2 2	12/77 12/77	-	131.4	-	131.9	11.3	.4	-	-	-	-
	-	12///	-	134.3	-	135.4	14.0	.8	-	-	-	-

Area is generally the Standard Metropolitan Statistical Area (SMSA), exclusive of farms, i.A.-Long Gesch, Arabita, Calif.
is a combination of two SMSA's, and M.Y., M.Y.-Nertheastern M.J. and Chicage, Ill.-Metribestern Inc. are the mare
extensive Standard Consolidated Areas. Area edininions are those established by the Office of Management and Budget in
1973, except for Denver-doulour, Colo. which does not include Douglas County. Definitions on not include revisions made
1973, except for Denver-doulour, Colo. which does not include Douglas County. Definitions on not include revisions made
7 Fords, Yuels, and several other items priced every month in all areas; most other goods and services priced as indicated:
A - Every month.
A - Bertusty, April, June, Apput, October, and December.
A - Fordsty, April, June, Apput, October, and December.
A - More than 4,000,000.
A - 2 1,250,000 to 4,000,000.
A - 2 1,250,000 to 4,000,000.
C 2 7,000 to 128,000.
C Less than 15,000.
C Less than 15,000.
C Less than 15,000.
C Less than 15,000.
C The Contract of the Contract of Contract Contract of Contract C

NOTE: Price changes within areas are found in the Consumer Price Index; differences in living costs among areas are found in Family Budgets.

CPI-W
TABLE 4. Consumer Price Index for urban wage earners and cherical workers: U.S. city average, by expenditure category and commodity and service group, 1967-100

commodity and service group, 1767-100								
Group	Relative importance,	Unadjusted	indexes	Unadju percent chi Aug. 1980 Aug. 1979 Ju	ited	Seaso	nally adjust of change to June to July	sted from-
	Oscenher	July 1980	Aug. 1980	Aug. 1980	fron-	May to	June to	July to
	1979	1960	1980			June	July	Aug.
				Expenditure of	ategory			
All items	100.000	248.0	249.6	12.7	0.6	0.9	, 0.0	0.7
All items(1957-59=100)	20.353	288.4 249.1	290.3	9.6	1.4	5	9	1.7
Food	19.237 13.427	248.0 288.4 249.1 255.5 251.1	252.5 259.2	9.6 9.6	1.4	.5	1.1	1.7
Cereals and bakery products 1/	1.683	248.0	255.6 249.6	9.5 11.4	1.8 .6 3.5	.3	. 9	.6
Meats, poultry, fish, and eggs	1.810	236.1 229.2	244.3 229.9	6.4	3.5	٠.۶	1.3	3.8
Fruits and vegetables	1.762	253.0 354.6	256.6 356.6	8.3 27.4	1.4	4.5 5	1.2	. 3.1
Sugar and sweets 1/	.376	354.6 240.6	356.6	27.4	.6 .7 1.7	4.5	3.4	.6 1.2 2.4
Nonalcoholic beverages	.376 1.557 1.129	396.2	242.4 403.0	5.9 11.9	1.7	.6		2.4
Food away from home	5.810	232.1 271.2	234.2 272.8	11.3	.6 .7	1.0	1.1	.9 .6 1.1
Alcoholic beverages	1.116	189.2 265.1	190.6	9.8 14.8	.7	1.9	.6 7	1.1
Shelter	28.038	284.3	284.8	16.5	.2	2.2 1.1		.6
Rent, residential 1/	4.982	191.8	267.3	8.9	.2 .6 .7	1.1	.5	.6 .5
Homeownership	.502 22.553	265.5 317.9	267.3 318.1	12.5 18.3 13.9	. 1	.6 2.5	-2.0	-:1
Financing, taxes, and insurance	9.137 10.163	254.3 405.0	258.6 398.8	25.1	1.7	1.3	.5 -4.5	1.7
Maintenance and repairs	3.254 2.322	285.1 309.0	287.7 312.1	10.3 9.8	1.0	1 6	.3	1.0
Maintenance and repair	1.721							
Fuel and other utilities 1/	.931 6.373 4.584	231.3	233.2 287.4 362.1	11.6 16.0	.B	1.0	1.1	.8 .5 .5
Fuels 1/	4.584	286.1 360.3	362.1	16.0 20.8	.5 .5	2.4	1.1	. 5
Gas (piped) and electricity 1/	1.209 3.375 1.788	561.9 313.5	562.7 315.4	28.2 18.3	.6	3.7	1.6	.6
Other utilities and public services 1/	1.788	165.9 203.5	166.4 204.5 173.5	4.1	.3	1.1	.6	.3
Housefurnishings	4.231	172.9 245.2	173.5	6.4 11.8	.3	: 7	.3	.1 .6 .3 .6 .5 1.1 .3
Housekeeping supplies 1/	1.499	245.2 268.1	247.8 269.0	11.8	1.1	.7	.9	1.1
Apparel and upkeep	5.114	268.1 175.4 168.0	177.9	7.4 7.0	1.4	3	:\$	
Men's and boys' apparel	1.391	167.2	168.4	6.2 4.5	1.6	4 1	.5 .4 .7	.8
Women's and girls' apparel	1.719	149.9 249.2	154.1 252.6	2.4 12.7	2.8 1.4	-1.9 . 1.6	1.0	1.1
Footwear	.706	189.3	1.094	7.4 19.9	1.6	.1	1.0	.0
Other apparel commodities 1/	.550	200.8	204.1 233.7 253.5	19.9	1.6	1.8	1.0 1 .3	1.6
Transportation	20.902	232.6 251.9	253.5	13.1 14.9	.5	-:\$.1	.5
Private transportation	19.962 3.946	251.5 180.0	252.7 181.9	14.2 9.4 3	1.1	3	.1	1.7
Used cars	3.622 6.429	203.4 377.8	206.4 377.1	28.6	1.5	.2 -1.1 -1.1	.7	2.3
Maintenance and repair	1.621	269.7 226.7	272.2	10.7 12.8	2	.9 .6	.8 .7 5	.7 1.7 2.3 3 .9
Other private transportation	4.344	226.7		12.8 13.9	.0	.6	.0 1.7	.3
Other private trans. services	3.550	236.0	200.6 236.0	12.6	.2	.8	- 4	.2
Public transportation 1/	.940 4.372	245.8 267.8	256.9 270.0	28.1 11.3	4.5	.9	4.6 .8 .9	4.5
Medical care commodities	.731 3.641	169.7	170.8 291.7 257.8	9.3 11.7	.6 .8	.8 .3	.9	.8
Professional services 1/	1.843	289.3 256.1 329.8	257.8	11.6 11.8	.7	.6 .0		:7
Other medical care services 1/	1.798	329.8 204.4	333.3	11.8 8.8	1.1	.0 .7	1.0	.7 1.1 .7 1.1 .2 .6
Entertainment commodities	2.248	204.8	206.4	9.6	.6 .8	.4	.4 .4 .2 .5	1.1
Other goods and services 1/	4.035	204.8 212.9	206.4 205.2 214.0	7.6 8.5	.2	1.2	.2	.2
Tobacco products 1/	1.306	204.0 213.1	204.4	7.5	.2	1.5	.2	.2
Toilet goods and personal care	1.664							
appliances 1/	.796 .888	206.6	208.8 220.7	9.8 · 7.7	1.1	.3 .5 .6	1.0	1.1
Personal and educational expenses	1.046	219.8 230.3	231.8	9.8	: 7	.6	.3	.4
School books and supplies Personal and educational services	.156 .890	210.9	211.5	8.4 10.0	.3	.6 .7	.6	1.0
7								
All items. 1937-39-100. All items. 1937-39-100. Food and beverages. Food. Corrests and bakery products 1/. Mests, poultry, fish, and eggs. Dairy products. Fats and cis. Suger and sweets 1/. Fats and cis. Monalcoholic beverages. Food away from home. Alcoholic beverages. Housing. Shear esidential 1/. Other rental costs. Homeownership. Homeownership. Homeownership. Hand other utilities 1/. Fuels 1/. Fuel and other utilities 1/. Other utilities and repairs. Haintenance and repairs. Haintenance and repairs. Haintenance and repairs. Haintenance and repairs. Homeownership. Other utilities 1/. Other utilities 1/. Apparel and other utilities 1/. Apparel and other utilities 1/. Apparel and upkeep. Apparel commodities and public services 1/. Apparel commodities proceed. Housekeeping services 1/. Apparel commodities proceed. However and gits, sporeel. Infants and tooders' apparel 1/. Footwear and office of the proceed of the				modity and serv				
All items	100.000	248.0	249.6	12.7	0.6	0.9	0.0	0.7 1.2 1.7
Food and beverages	61.878 20.353	249.1	252.5	9.6	1.4	.5	.6	1.7
Ail items. Connodities Food and beverages Commodities less food and beverages Mondurables less food and beverages	41.524 18.832	248.0 234.4 249.1 224.2 243.5	249.6 236.9 252.5 226.2 244.8	12.4 16.3	1.4 .9 .5	.3 .5 .2 .0	.4	1.0
Apparel commodities	4.489	168.0	170.7	6.2	1.6	4	.5	.8
Annourables less food and beverages. Apparel commodities. Mandurables less food beverages, and apparel. Services. Rent, residential L/. Household services less rent Transportation services. Other services. Special indexes:	14.343	284.9	285.5	19.5 9.1	1.2	1	.1	.4
Durables	22.692	208.0	210.5 273.3 193.0	9.1 14.9	1.2	, . 4	.5	1.6
Rent, residential 1/	38.122 4.982 19.677 6.111	273.1 191.6	193.0		.1 .6 5 1.0	1.9 1.1 2.9	.5	
Transportation services	19.677 6.111	325.9 243.9	324.2 246.3 291.7	16.3	1.0	2.9	-2.1	1.1
Hedical care services 1/	, 3.641° 3.711	289.3 216.6	291.7 219.5	16.3 14.4 11.7 9.1	.8	.8 .3 .6	.5 9 .5 -2.1 .7 .7	.8
Special indexes:	3.711				.4			
All items less food	80.763 71.962 91.812	245.3 237.2 237.4	246.6 239.2	13.5	.5	1.0	2	5
All items less mortgage interest costs	91.812	237.4	239.6	11.3	. B	.6	.6	1.0
All items less home purchase and mortoage interest costs	82.675	225.0	237.8	11.0			.6	
All items less medical care	95.628 42.641 19.948	246.6	248.2 224.4 239.9	12.8 12.3	.6	.4 .9 .2	.0	.9 .7 .9
Mondurables less food	19.948	246.6 222.4 238.7 272.2	239.9	15.9 18.8	3	.0	:4	:4
Nondurables less food and apparel	15.459 39.185		272.9 249.6	18.8 12.8	1.0	.0	.4 .2 .6 -1.1	.4 1.2 1
Services less rent	33.140	288.6	288.6	12.8 15.8	1.0	2.0	-1.1	-:1
Energy	34.481 11.115	269.4 373.9 237.6	269.4 374.2 239.4	. 15.2	.0	2.1	9	.0 .3
All items less energy	88.885	237.6	239.4 233.4	. 15.2 25.2 11.2 11.7	.8	1.2 .5 9	.0 3 .6 3	. 9
Commodities less food and energy	69.648 34.900	232.1 200.6	202.9	8.9 28.4	1.1 1	1.5	6	1.1
Energy commodities	7.740 34.747	406.1 269.8	405.5 269.9	28.4 14.5	1 .0	1.6	-1.1	-:1
Medical care services 1/. Other services Spall items less food. All items less food. All items less shelter All items less shelter All items less shelter All items less shelter All items less shoeler All items less shoeler All items less sontigage interest coats All items less sondiance Coccondities less food. Mondurables less food. Mondurables less food and apparel Mondurables less food and apparel Services less medical care 1/. Energy All items less services less decides care 1/. Connocities less food and energy Connocities less food and energy Connocities less food and energy Energy connocities Purchase less energy.				-11.1				
1957-59=\$1.00 1/	:	\$.403 .347	\$.401 .344	-11.1	5	-1.0	2	5
-								

1/ Not seasonally adjusted. NOTE: Index applies to a month as a whole, not to any specific date.

CPI-W

(ABLE 3. Consumer Price Index for urban wage earners and clerical workers: Seasonally adjusted U.S. city average, by expenditure lategory and commodity and service group, 1967-100

,	Seaso	nally ad	justed 1	ndexes		Seasona	lly adju	sted ann	al rate	
Group	May 1980	June 1980	July 1980	Aug. 1980	J Nov	months e	nding in	sted anni hange fo Aug. 1980	months	ending in
	1700	1700	1500					1980	1980	1980
				E×	penditure					
All items. Food and beverages. Food and beverages. Food and beverages. Out I hem be a server products I/. Meats, poultry, fish, and eggs. Delry products. Sugar and weeks I/. Fets and cile. Monal coholic beverages. Alcoholic beverages. Alcoholic beverages. Alcoholic beverages. Alcoholic beverages. Alcoholic beverages. Monal products I/. Other residential I/. Other residential I/. Homeownership. Homeownership. Homeownership. Food and repairs. Maintenance and repairs. Mousefurishings. Mousefurishi	243.7	245.0	247.2	251.3 257.9	13.3	17.3 6.3 6.1	13.6 8.5 8.2	13.1	15.3 8.3 8.1	10.1 10.7
Food at home	249.9 244.9	251.2 245.7 245.7	247.2 253.5 248.5	254.0	10.3 10.2 10.8 10.4	6.1 4.4 14.1	7.3	13.1 13.4 15.7 8.8	7.6	10.6
Cereals and bakery products i/ Meats, poultry, fish, and eggs	244.4	245.7 228.8 228.3	248.0	249.6 240.5 232.0	10.4 12.0	14.1 6.9 5.5	12.3	8.8 19.5 8.9	12.2 9.4 7.5	10.5 3.5 12.7
Fruits and vegetables	227.1 240.9	228.3 242.4 342.9	231.0	253.1	12.0 9.6 4.9	5.5 -21.5	-10.4 16.7 37.2	8.9 21.8 39.7	7.5 -9.3	12.7
Sugar and sweets 1/	328.0 240.3		354.6 239.4	356.6 242.2	2.9 6.3	-21.5 23.4 11.7		39.7 3.2	12.7	
Nonalcoholic baverages	388.0 229.1	390.4 231.0	390.7 233.5	400.2 235.6	21.3 7.8	11.6	2.9 2.4 16.3	3.2 13.2 11.8	8.9 16.5 8.7	3.0 7.7 14.1
Food away from home	266.8	269.4 187.6	270.7 188.8	235.6 272.3 190.8	9.5	9.6 11.5 8.1	16.3 10.2 11.0	8.5	10.5	9.3
Housing	262.0	267.1 288.5	265.1 284.2	265.5	16.9 22.1	8.1 18.1 20.4	11.0 19.5 22.0	5.5	8.9 17.5 21.3	12.2
Rent, residential 1/	188.7	190.8 263.4	191.8	193.0	10.8	8.2	22.0 7.1 9.0	9.4	9.5	8.2 7.2
Homeownership	316.3	324.1 253.0	317.7 254.3	317.3	14.8 25.0 20.2	21.2 23.1 9.2 39.7	25.9 11.7	1.3	24.0	12.9
Financing, taxes, and insurance	407.3	424.1 283.4	405.0	396.8	35.6	39.7	43.7 12.8	-9.9	14.6 37.6 11.9	13.6
Maintenance and repair services	309.7	307.9	307.8	311.2	9.6	14.2 15.7	12.4	2.0	12.7	7.0
commodities 1/	226.5	228.8	231.3	233.2	9.1 7.8	11.5	13.4 19.4	12.4	10.3	12.9
Fuels 1/	346.0	283.0 355.8 559.8	360.3	362.1 562.7	9.8	20.4 28.9 63.0	25.3	20.0	13.9	18.2 22.6
Gas (piped) and electricity 1/	297.5	308.5	313.5	315.4	.9	18.2	30.2	4.1 26.3 8.3	51.5 9.2	28.3
Household furnishings and operation	201.6	202.7	203.7	204.9	6.2	1.2 8.6 7.5	4.3 9.7 9.1	6.7	2.0 7.4 5.8	6.3 8.2
Housekeeping supplies 1/	241.2	243.0	245.2	247.8 269.0	9.5 9.1	11.2	15.2 7.1	11.4	10.4	7.0 13.3
Apparel and upkeep	176.7	267.0 176.1	177.0	. 178.3	6.4 5.8	8.4 9.5	8.6	5.2 3.7	10.4 6.7 8.0	6.1
Men's and boys' apparel	168.2	168.9 168.1	169.8	171.1 169.2	3.8	8.6 2.0	10.1	3.6 2.4	2.9	5.2 6.2
Infants' and toddlers' apparel 1/	242.8	151.5 246.8	152.6 249.2 190.6	154.3 252.6	. 8.3 10.5	8.5 7.2	18.5	17.1	4.3 7.7 8.3	.5 17.8
Other apparel commodities 1/	188.5	188.7 201.0	200.8	190.6 204.1 233.7	10.5 24.5 10.7	6.1 29.5	18.5 8.7 12.2 21.6	14.3	8.3 27.0	6.6 13.2
Transportation	249.1	231.8 248.4	232.6 249.3	251.5	10.7 13.6 12.8	15.5	10.8	5.1 3.9	27.0 13.1 23.3	13.0 7.3
Private transportation	249.3 179.6	248.5 179.9	248.8 181.3	250.6 184.3 199.0	12.8 2.4 1.8	10.8	10.6	2.1 10.9	6.5	6.3 12.2
Gasoline	195.4 377.5	193.3 373.5	194.6 371.5	199.0 370.4 272.5	32.7	8.6 94.9	-17.0 14.2	7.6 -7.3	5.2 60.8	-5.5 2.9
Other private transportation	265.6 226.3	268.0 227.7	270.0 227.6	228.3	8.9 8.4 18.9	11.8 12.4 18.1	11.1 28.9	10.8 3.6	10.3	11.0
Other private trans. commodities 1/ Other private trans. services	196.7 236.3	196.8 238.1	200.1	200.6		11.1	10.8 33.1 17.1	8.2	18.5	9.5
Public transportation 1/	232.9 264.7	234.9 265.8	245.8 267.8	256.9 270.0	29.5 11.2	19.8 16.3 10.2	9.6	48.D 8.3	24.6 13.7	31.6
Medical care commodities	166.7 286.3	168.0 287.3	169.5 289.3	170.8 291.7	6.6	10.2		10.2		10.2 8.7
Professional services 1/	253.5 326.5	255.1 326.5	256.1 329.8	257.8 333.3	8.6 15.9	17.4 17.3 17.6	9.6 13.7 5.6	7.8 7.0 8.6	14.7 12.9 16.8	10.3
Entertainment	202.0	203.5	204.3	205.8	7.6	7.9	5.6 12.1 12.1	7.7	7.8 9.1	9.9
Entertainment services 1/ Other goods and services	201.8	204.3	204.8	205.2	7.8	3.5 12.7 15.2	12.4	6.9 7.8	9.7	9.6 7.4
Personal care 1/	210.9	203.6	204.0 213.1	204.4	2.8	15.2	6.3 4.5 8.6	8.0 7.4	8.8	€.2 8.0
Toilet goods and personal care appliances 1/	203.9	204.5	206.6	208.8	4.7	12.8	11.8	10.0	8.7	10.9
Personal care services 1/	218.1	219.1 232.6	219.8	220.7 235.8	7.2 13.9	12.8	5.9	4.9 8.2 7.9	10.0	5.4 7.9 7.8
Mac cars Gaotine Gaotine Maintenance and repair Other private transportation Other private trans commodities I/ Public transportation I/ Madical cars Madical cars Madical cars envices I/ I Professional services I/ Other accidal cars earlies I/ Environment transportation Commodities I/ Other accidal cars earlies I/ Entertainment commodities Content cars and cars earlies I/ Other goods and services I/ Other goods and personal cars Pappliance I/ Professional cars earlies I/ Professional cars e	212.4	213.7	215.0 238.5	216.5	5.9 15.2	11.9	7.7	7.9	11.8 8.9 12.1	7.8 8.1
				Commod	ity and s	ervice o		*.*		•
All items. Commodities. Fond and beverages. Commodities. Nondurables less food and beverages. Apparel commodities. Nondurables less food beverages. Durables less food beverages. Durables less food beverages. Services. Rent, residential 1/. Household services less rent Transportation services. When the services and the services. Other services.	-	-	_	-	13.3	17.3	13.6	6.7	15.3	10.1
Food and beverages	231.1	231.8	233.1	235.9 251.3	12.0 10.3	16.8	8.6 8.5	8.6	15.3 14.4 8.3	8.6 10.7 7.5
Commodities less food and beverages Nondurables less food and beverages	243.7 221.8 242.8	222.2	223.1 243.5	251.3 225.3 244.6	13.0 13.8	6.3 22.6 38.0	8.5 8.5 13.4	13.1 6.5 3.0	8.3 17.7 25.3	7.5
Apparel commodities Nondurables less food, beverages,	169.6	168.9	. 169.8	171.1	5.8	8.6	6.9	3.6	25.3 7.2	8.1 5.2
and apparel	283.3 204.8	283.0 205.6	283.2	284.4	18.1 9.9	46.6	16.1	1.6	31.6	8.6
Services	270.4 188.7	275.6 190.8	273.2 191.8	273.2 193.0	15.1 10.8	18.3	22.2	9.4	9.8 16.7 9.5	12.8
Transportation services	323.3 241.1	332.8 243.0 287.3	325.7	323.2 247.5 291.7	19.6	26.0	30.0	17.0	22.8	8.2 13.9
Medical care services 1/	286.3 216.9	287.3 218.6	289.3 219.2	291.7 220.3	12.2	12.5 17.4 9.0	24.6 9.6 11.2	7.8	11.2 14.7 9.4	17.6 8.7 8.8
Special indexes:										***
All items less food	242.8 233.7	245.3 234.7 235.1	244.8 236.2 236.5	246.0 238.5 239.1	14.0 10.1	20.7	14.7 10.4	5.4 8.5	17.3	10.0
All items less mortgage interest costs All items less home purchase and	233.8				11.2	16.4	10.4	9.4	12.8	9.4
Special Indexes: All items less food All items less shelter All items less mortgage interest costs All items less none purchase and mortgage interest costs All items less medical care	232.4	233.4 245.8	234.9 245.7	237.1 247.5	10.1 13.2	14.8 17.9	10.6 13.7	8.3	12.4	9.5 10.2
Commodities less food	220.1	220.5 237.8	221.4	223.5	12.0	22.1	8.8	6.3	17 A	7.6
Nondurables less food	237.7 270.3	237.8	238.7 270.8	239.7 271.8	13.8 17.5 12.5 15.8 15.7	36.1 43.9		3.4	24.5 30.0	8.0
Nondurables	244.1 286.0	244.5 291.8	246.0 288.7	248.9 288.4	12.5 15.8	20.8	15.2 10.5 24.4	8.1 3.4	16.6	8.5 9.3 13.4
Services less medical care 1/	266.3	271.8	269.4	269.4	15.7	18.5	22.6	4.7	17.1	13.3
EnergyAll items less energy	367.7 234.9	368.8 237.1	369.5 237.1	370.5 239.2	23.6 11.8	61.5 12.1	19.7 13.7	3.1 7.5	41.3	11.1
All items less food and energy		232.7	231.9	233.4		14.9	14.2	6.0	13.4	10.0
Energy All items less energy All items less food and energy Commodities less food and energy. Energy commodities Services less energy.	198.2 405.9 268.3	402.4 273.0	401.3	399.9 269.7	8.0. 32.2 16.5	87.0 18.5	14.2 7.8 16.5 21.4	-5.8 2.1	57.2 17.5	8.6 4.8 11.3
1/ Not seasonally adjusted.						-5.5		• • •		

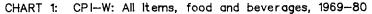
1/ Not seasonally adjusted.
NOTE: Index applies to a month as a whole, not to any specific date

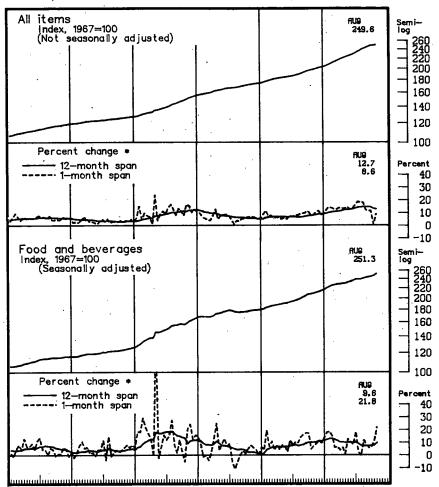
CPI-W

TABLE 6. Consumer Price Index for urban wage earners and clerical workers: Selected areas, all items index, 1967=100 unless otherwise noted

	1cina	index	May	June	July	Aug.	Perce	nt chang 1980 fr	e to	Perce	nt chang 1980 fr	e to
sc.	hedule 2/	base	1980	1980	1980	1980	Aug. 1979	June 1980	July 1960	July 1979	Hay 1980	June 1980
U.S. city average			245.1	247.8	245.0	249.6	12.7	0.7	0.6	13.0	1.2	0.1
Chicago, IllNorthwestern Ind	H		243.0	248.0	247.0	245.4	12:5	-1.0	6	13.9	1.6	4
Detroit, Mich	M		248.9	255.8	252.1	253.8	14.0	8	.,	14.7	1.3	-1.4
M.Y., N.YNortheastern N.J	Ħ		252.6 234.1	253.4	251.5	250.1	13.9	-1.3	6	16.0	4	7
Philadelphia, PaN.J	Ä		239.9	243.8	238.4 245.3	240.7 247.3	11.8	1.7	1.0	11.3	1.8	.7
Anchorage, Alaska	1	10/67	223.1				-,				2.5	
Baltimore, Md	i	20/0/	247.8	:	224.B 250.8	•	:	:	•	.8.9	6	-
Boston, Mass	1		236.8	-	240.9					13.3	1.2	-
Cincinnati, Ohio-KyInd Denver-Boulder, Colo	1		252.9	-	259.1	•	-			14.4	2.5	- :
Miani, Fla	1	11/77	262.4	•	265.8	-	-	-	-	11.1	1.3	-
Milvaukee, Wis	î	11///	255.2		134.7 255.9	-	:	-	-	15.2	2.9	-
Mortheast Pennsylvenia	ī		235.8	-	243.2	- :	:	-		13.7	3.1	-
Portland, OragWash	1		255.9	÷	252.2	-	-	-	- 1	10.7	-1.4	-
St. Louis, MoIll	1		242.6	-	245.9	-	-	-	-	13.1	1.4	-
Seattle-Everett, wash	i		264.8 246.8	-	265.7 251.6	-	-	-	-	14.0	.3	-
Washington, D.CMdVa	ī		242.0	:	248.7	:	:	-	:	16.5	1.9	:
Atlanta, Ga	2		_	244.7		249.7	14.0	2.0	_			_
Buffalo, M.Y	2		-	234.6		235.5	9.4	2.4	:	- :	:	:
Cleveland, Onio	2 2		•	250.5	-	254.4	14.3	1.6	-		-	:
Honolulu, Hawaii	2		•	254.5	-	257.4	15.4	1.1	-	-	-	-
Houston, Tex	2		-	228.0 262.8	-	229.5 265.6	10.6	1:7		-	-	-
Kansas City, MoKans	2		-	246.3		249.3	11.7	1.2		:	-	-
Minneapolis-St.Paul, MinnHis Pittsburgh, Pa	2		-	248.4	-	250.6	9.7	.9	-	-		:
San Francisco-Bakland, Calif	2		:	246.8 247.7	:	251.2 251.4	14.2 15.0	1.8	:	•	-	-
Region 3/								,	•	•	•	•
Northeast	2	12/77		129.2		131.6	13.1	1.9	-			
North Central	2	12/77	-	134.9	-	135.2	12.1	2			:	
South	2	12/77	-	133.4	-	134.4	12.4	.7	•		-	
	•	12/77	•	135.9	-	136.0	13.5	.1	-	-	-	-
Population size class 3/			•									
A-1	2	12/77	-	132.3		132.5	12.8	.2		-	_	_
A-2	2	12/77	-	133.6	-	135.3	13.3	1.3	-	-	-	
C	2	12/77	•	134.3	-	135.7	13.0	1.0	-	-	-	-
0	2	12/77	-	132.1	:	132.8	12.2 11.5	.8 .5	:	:	:	:
Region/population size class cross classification 3/												
Northeast/A		12/77		127.1	-	129.2	12.3	1.7	_	_		
North Centrel/A		12/77	-	136.9	-	137.0	13.0	-:í	-	Ī	:	:
South/A		12/77	-	133.6	-	135.2	13.3	1.2	-	-	-	
Mortheast/8		12/77	:	136.6	-	136.0	14.7	2.4	-	-	-	-
Morth Central/8	2	12/77	-	135.4	- :	136.0	14.7	2.6	•	:	-	•
South/8		12/77		134.4	-	135.4	12.7	:;	-	:	:	:
West/B Northeast/C		12/77 12/77	-	136.3	-	137.0	13.0	. 5	-	-	-	-
North Central/C		12/77	:	135.6	-	138.1 132.1	14.4	1.8	-	-	-	-
South/C	2	12/77	-	133.5		134.1	11.7	:4	:	:	-	-
West/C Northeast/O		12/77	-	133.9	-	134.6	12.3	.5	-	:	-	-
North Central/D		12/77 12/77	-	131.5	-	134.1		2.0	-	•	-	-
South/0		12/77	:	131.2	-	132.2	10.1	2 .5	-	-	-	-
West/0		12/77	-	134.1	-	135.1	13.1	.7	Ξ	:	-	Ξ

MOTE: Price changes within areas are found in the Consumer Price Innex; differences in living costs among areas are found in Family Budgets.





1980 1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979

Unadjusted data used to calculate 12—month percent change. Percent changes over 1—month spans are annual rates calculated from seasonally adjusted data.
 August 1973 = 92 percent Percent

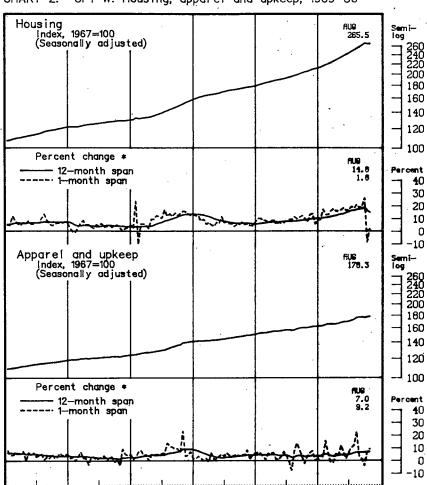


CHART 2: CPI-W: Housing, apparel and upkeep, 1969-80

1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980

^{*} Unadjusted data used to calculate 12—month percent change. Percent changes over 1—month spans are annual rates calculated from seasonally adjusted data.

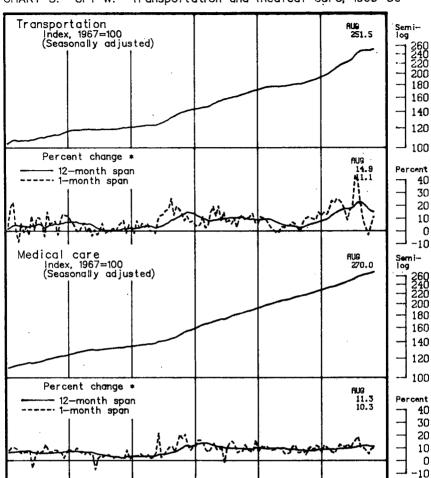
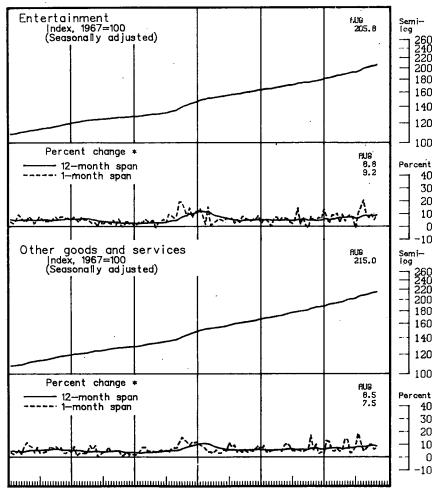


CHART 3: CPI-W: Transportation and medical care, 1969-80

1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980 * Unadjusted data used to calculate 12—month percent change. Percent changes over 1—month spans are annual rates calculated from seasonally adjusted data.

CHART 4: CPI-W: Entertainment, other goods and services, 1969-80



1969 1970 1971 1972 1973 1974 1975 1976 1977 1978 1979 1980

^{*} Unadjusted data used to calculate 12—month percent change. Percent changes over 1—month spans are armual rates calculated from seasonally adjusted data.

Explanations of Homeownership Measures

Official CPI-U includes five components. (1) The weights for property taxes, property insurance, and home maintenance and repairs represent expenditures of all homeowers in the base period. The weights for house prices and contracted mortgage interest cost represent only those homeowners who actually purchased a home in the base period. Included are the total price paid for the home and the total amount of interest expected to be paid over half the stated life of the mortgage. (2) Current monthly prices are used for each of these components.

Experimental Measure X-1: (1) The weight for this rental equivalence measure is the estimate of the rental value of all owner-occupied homes in the base period compiled from a specific question asked on the 1972-73 Consumer Expenditure Survey. This covers the entire stock of owner homes. (2) Prices used are the current rents collected for the residential rent component of the CPI. The CPI rent component is designed to represent changes in residential rents for all types of housing units, not just changes in rents for units that are typically owner occupied. The CPI rent component is, therefore, not appropriate for this measure.

Experimental Measure X-2: (1) The weight for this user cost method includes expenditures for mortgage interest, property taxes, property insurance, maintenance and repairs, the estimated base-period cost of homeowners' equity in their houses, and the offset to shelter costs resulting from the estimated appreciation of house values in the base period. This measure covers the entire stock of owned houses. To derive the weights for mortgage interest costs and equity costs, the total value of the housing stock in the base period was apportioned into its debt and equity components. The debt component equals the amount owed, and the equity component is the amount owned, i.e., payments on principal plus appreciation from the time of purchase to the base period. Each component was subsequently multiplied by the average mortgage interest rate

in the base period to determine its cost. (2) Prices used are current ones except for the appreciation term which uses a 5-year moving average of the changes in appreciation rates.

Experimental Measure X-3: (1) The weights are the same as in Experimental Measure X-2, except that mortgage interest costs are calculated as the total interest amount paid out by homeowners in the base period. As in X-1 and in X-2, this measure covers the entire homeowner population. (2) The prices for all components except mortgage interest costs and appreciation are current monthly prices. As in X-2, appreciation is represented by a 5-year moving average of the changes in house prices. However, X-3 uses past and current mortgage interest costs in a 15-year weighted moving average, which reflects the base period age distribution of mortgage loans.

Experimental Measure X-4: (1) The weights for this outlays approach include expenditures actually made in the base period for property taxes, property insurance, and maintenance and repairs. The weight for the mortgage interest term is calculated in the same manner as in X-2. However, no appreciatior or equity terms are included. Not all homeowners are represented in this measure because those who made no mortgage debt payment in the base period are excluded. (2) The prices used for each of these items are current ones.

Experimental Measure X-5: (1) The weights for this outlays approach include, as in X-4, expenditures actually made in the base period for property taxes, property insurance, and maintenance and repairs. The weight for the mortgage interest cost term is the same as for the X-3. No appreciation or equity elements are used. As in X-4, not all homeowners are represented in this measure because those who made no mortgage debt payment in the base period are excluded. (2) Current prices are used in X-5 except for mortgage interest which uses the 15-year weighted moving average also used in the X-3.

Table C. HOMEOWRENSHIP COMPONENTS used in official CPI-U and in experimental measures: Percent change over 12 months

Table D. Official ALL-TTEMS CPI-U and EXPERIMENTAL MEASURES using alternative homeownership components: Percent change over 12 months

	Official		Ex	of homeowne		4		Official Consumer		Experimental homeo	measures whership c		rnative
	Consumer Price Index	Flow-of-services		neasures	Outlays o	measures		Price Index	Flow-of	-services	Outlays m	easures	
12 months ended	for All Urban Con- sumers (CPI-U)	X-1 Rental equiva- lence using CPI rent	X-2 User cost using current interest cost	X-3 User cost using average interest cost	X-4 Outlays using current interest cost	X-5 Outlays using average interest cost	12 months ended	for All Urban Con- sumers (CPI-U)	X-1 Rental equiva- lence using CPI rent	X-2 User cost using current interest cost	X-3 User cost using average interest cost	X-4 Outlays using current interest cost	X-5 Outlays using average interest cost
December:							December:						
1968	7.6	2.8	11.0	8.0	11.0	6.0	1968	4.7	3.9	4.9	4.6	4.7	4.2
1969	10.2	3.8	7.1	3.5	13.2	8.3	1969	6.1	5.2	5.6	5.2	6.0	5.7
.1970	10.2	4.5	4.2	1.7	12.6	10.1	1970	5.5	4.5	4.5	4.2	5.2	4.9
1971	2.7	3.8	-12.1	-8.9	0.3	7.7	1971	3.4	3.5	1.6	2.2	3.2	3.8
1972	4.1	3.5	2.4	3.2	4.8	6.2	1972	3.4	3.3	3.2	3.3	3.4	3.5
1973	7.7	4.9	23.0	18.9	10.8	4.4	1973	8.8	8.5	10.4	10.0	9.2	8.7
1974	13.3	5.4	16.9	12.9	14.9	9.1	1974	12.2	11.1	12.6	12.1	12.3	11.8
1975	7.9	5.2	2.8	3.4	7.1	9.0	1975	7.0	6.6	6.4	6.4	6.8	6.9
1976		5.5	-1.1	1.9	2.7	7.6	1976	4.8	5.1	4.3	4.7	4.8	5.2
1977		6.5	2.5	0.4	10.4	9.0	1977	6.8	6.3	5.9	5.7	6.6	6.5
1978		7.3	5.7	-1.1	12.0	5.3	1978	9.0	7.9	7.8	7.1	8.5	7.8
September 1979	16.1	7.6	18.3	11.5	16.4	7.5	September 1979	12.1	10.4	11.7	10.9	11.5	10.6
October 1979	16.8	8.4	22.2	15.5	17.2	7.8	October 1979	12.2	10.5	12.2	11.3	11.5	10.6
November 1979	18.3	8.1	24.5	16.3	19.0	7.9	November 1979	12.6	10.5	12.5	11.4	11.8	10.6
December 1979	19.8	7.9	28.2	20.5	22.6	11.2	December 1979	13.3	10.8	13.2	12.1	12.5	11.3
January 1980	21.1	8.1	30.7	22.0	24.4	11.5	January 1980	13.9	11.2	13.9	12.7	13.1	11.7
February 1980	20.6	8.5	31.2	23.3	245	12.1	February 1980	14.1	11.6	14.3	13.1	13.4	12.1
March 1980	21.7	8.9	38.0	29.7	26.5	12.7	March 1980	14.7	12.0	15.5	14.1	13.9	12.5
April 1980		8.7	42.3	33.1	27.7	12.9	April 1980	14.7	11.7	15.7	14.2	13.8	12.3
May 1980	22.8	8.7	42.8	33.9	28.3	13.3	May 1980	14.4	11.4	15.4	13.9	13.5	11.9
June 1980	23.8	9.4	47.7	36.5	30.6	13.5	June 1980	14.3	11.1	15.6	13.7	13.4	11.5
July 1980	19.9	9.2	36.0	27.5	24.5	13.9.	July 1980	13.2	10.8	14.0	12.6	12.5	11.3
August 1980	17.9	8.8	26.1	18.6	20.6	13.8	August 1980	12.8	10.9	13.0	11.9	12.2	11.4
Relative importance													
December 1977	22.8	14.5	11.4	10.0	10.0	8.7							

News

United States Department of Labor



Bureau of Labor Statistics

Washington, D.C. 20212

Michael Buso (202) 523-1364 Kathyrn Hoyle (202) 523-1913 USDL-80-591
TRANSHISSION OF MATERIAL IN THIS
RELEASE IS EMBARGOED UNTIL 9:00 A.M.
(E.D.T.), Tuesday, September 23, 1980

REAL EARNINGS IN AUGUST 1980

Preliminary real earnings figures for August-covering full-time and parttime workers on production or nonsupervisory jobs in the private nonfarm sector of the American economy-were released today by the Bureau of Labor Statistics of the U.S. Department of Labor. Real earnings-or earnings in constant dollars-for August were calculated by adjusting earnings in current dollars for changes in the Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W).

*Real gross average weekly earnings increased 0.5 percent from July to
August after allowance for the usual seasonal variation. A 0.6 percent increase
in average hourly earnings and a 0.6 percent increase in average weekly hours
were partially offset by a 0.7 percent increase in the CPI-W. (See table A.)

Over the year, real average weekly earnings were down 5.7 percent. A 7.8 percent increase in average hourly earnings was offset by a 1.4 percent decline in average weekly hours and a 12.7 percent increase in the CPI-W. Before adjustment for the CPI-W and seasonal change, average weekly earnings were \$236.43 in August compared with \$222.48 a year earlier. (See table 1.)

*Real spendable earnings--average weekly earnings reduced by social security and Federal income taxes applicable to a married worker with three dependents who earned the average amount and then deflated by the CPI-W--increased 0.3 percent from July, seasonally adjusted. Over the year, real spendable earnings were down 6.5 percent. (See footnote 2, table A, for explanation of over-the-year average tax effect.)

*The Hourly Earnings Index in dollars of constant purchasing power decreased 0.1 percent from July to August. Compared with a year ago, the index was down

Table A. Composition of change in real earnings (production or nonsupervisory workers on private nonfarm payrolls)

	(1)	(2)	(3)	(4)	(5) Real	(6)	(7)
lonth	Average	Average	Average	Consumer	average	Average	Real
	hourly	weekly	weekly	price	weekly	tax	spendable
	earnings	hours	earnings	index 1/	earnings	effect 2	earnings 3/
1979		rcent cha	nge from p	receding m	onth, seas	onally ad	justed
Augus	t 0.8	0.3	1.1	1.0	0.1	0.1	(4)
Sept.	0.6	-0.3	0.4	1.1	-0.8	(4)	-0.8
Octob		0.0	0.3	1.0	-0.7	(4)	-0.7
Nov.	1.0	0.0	1.0	1.0	-0.1	0.1	-0.2
Dec. 1980	0.8	0.3	1.1	1.2	-0.2	0.2	-0.3
Janua		-0.3	(4)	1.4	-1.4	0.0	-1.4
Feb.	0.6	-0.3	ò. 3	1.4	-1.0	(4)	-1.1
March	0.9	-0.3	0.6	1.4	-0.7	0.1	
April	0.5	-0.3	0.2	1.0	-0.8	(4)	-0.8
May	0.5	-0.6	-0.1	0.9	-1.0	(4)	-0.9
June	0.8	-0.3	0.5	0.9	-0.4	0.1	-0.5
July	0.6	-0.3	0.3	(4)	0.3	(4)	0.2
Aug.	0.6	0.6	1.2	0.7	0.5	0.2	0.3
1979		Per	cent chang	e from sam	e month a	year ago	
Augusi		-0.6	7.6	12.0	-3.9	(4)	-4.0
Sept.	8.2	-0.3	7.9	12.4	-3.9	0.1	-4.0
Octobe		-0.6	6.9	12.4	-4.9	-0.1	-4.8
Nov.	7.8	-0.6	7.2	12.8	-4.9	(4).	-4.9
Dec. 1980	8.0	-0.6	7.4	13.4	-5.3	(4)	-5.3
Januar		-0.6	6.9	14.0	-6.2	0.8	-7.0
Feb.	7.7	-0.8	6.8	14.2	-6.5	0.8	-7.3
March	8.1	-1.4	6.6	14.6	-7.0	0.8	-7.7
April	8.5	-0.3	8.2	14.5	-5.6	1.0	-6.5
May	8.1	-1.4	6.5	14.4	-6.9	0.8	-7.6
June	8.2	-1.7	6.4	14.2	-6.9	0.8	-7.7
July p	7.8	-1.9	5.7	13.0	-6.5	0.8	- 7.2
Aug.	7.8	-1.4	6.3	12.7	-5.7	0.8	-6.5

Note: The following relationships hold approximately:

column (1) + column (2) = column (3) column (3) - column (4) = column (5)

column (3) = column (4) = column (5) column (5) = column (6) = column (7)

p = preliminary

3/ Married workers with three dependents who earned the gross average weekly earnings.

4/ Less than 0.05 percent.

^{1/} The Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W) is used as the deflator for constant dollar series presented in this release.

^{2/} When comparing spendable earnings estimates for periods subject to the same Federal tax laws, the percent change in average tax effect is a measure of the progressive effect of the Federal tax system on average earnings. This is the case for comparisons within 1979 and 1980 and of 1980 to 1979 as the only tax law change effective in 1980 was an increase in the social security tax base which was already above the level that would affect such comparisons. When comparing spendable earnings estimates for periods subject to different tax laws, i.e. 1979 to 1978, the percent change in average tax effect reflects both the progressive effect and the effect of the tax law change.

3.3 percent. (See tables 2 and 3.) The index excludes the effects of overtime in manufacturing and of interindustry shifts, such as the shift of workers between high-wage and low-wage industries.

Explanatory Notes

Spendable earnings are calculated by taking the average weekly pay for all production or nonsupervisory jobs, both full-time and part-time, and then deducting social security and Federal income taxes applicable to a single worker or to a married worker with three dependents who made this amount.

Real spendable earnings represents the buying power of the spendable earnings of a worker earning the average pay and with the applicable deductions, after allowance for price changes from the 1967 base period, that is, adjustment by the appropriate Consumer Price Index for Urban Wage Earners and Clerical Workers. (See Michael Buso, "Changes in the Spendable Earnings Series for 1979," Employment and Earnings, March 1979.)

The earnings series from which spendable and real spendable earnings are derived---gross average weekly earnings--is an arithmetic average of the earnings of all production or nonsupervisory jobs, including part-time jobs. Therefore, it is less than the average weekly earnings of full-time wage earners. It should be noted that the series on spendable earnings represents only the average earnings for those rank-and-file workers whose weekly pay approximates the averages indicated. The actual earnings level of married workers with three dependents tends to be higher than the average figures given above, since married workers with three dependents are generally older and more experienced and thus likely to command higher hourly wage rates and work more hours. Month-to-month and year-toyear changes in actual spendable earnings for this worker might also differ from the average estimates presented in this release.

The Bureau of Labor Statistics has also published data on annual after-tax earnings based on information obtained through the Current Population Survey. These series, which have been constructed for the 1962-1974 period, relate to the actual earnings of heads of households of specific size and composition. For a discussion of these series, see Paul M. Rysavage, "Annual Earnings of Household Heads." Monthly Labor Review, August 1975.

The hourly earnings index is designed to measure under-

lying wage movements for production or nonsupervisory workers in the private nonfarm economy. It is adjusted to exclude the effects of two types of changes that are not related to underlying wage rate developments. Overtime in manufacturing (the only sector for which overtime data are available) and interindustry employment shifts, such as shifts of workers between high-wage and low-wage industries.

Sesonally adjusted data are preferred by some users for analyzing general earnings trends in the economy since they eliminate the effect of changes that normally occur at the same time and in about the same magnitude each year, and therefore, reveal the underlying cyclical trends. These changes in average earnings may be due to seasonal changes in the proportion of workers in high-wage and low-wage industries or occupations, or to seasonal changes in the amount of overtime work, and so on. The seasonally adjusted data are presented in table 2.

Income tax law changes that become effective during the year may produce misleading year-to-year comparisons of changes in the tax liability from the spendable earnings series. For example, in 1977, the calculation of spendable earnings following the enactment of the Tax Reduction and Simplification Act of 1977 (effective June 1, 1977) concentrated the entire 1977 reduction in the subsequent 7 months. The Bureau of Labor Statistics develops and publishes "annual average" spendable earnings formulas which distribute the impact of tax law changes over the entire calendar year. These formulas should be used to compute year-to-year comparisons in tax liability changes.

For a comprehensive discussion of the spendable earnings series and hourly earnings index, and their relation to other wage data, see the following articles: Jack Alterman, "Compensation per Man-Hour and Take Home Pay." Monthly Labor Review, June 1971; Thomas Gavett, "Measures of Change in Real Wages and Earning," Monthly Labor Review, February 1972; Norman Samuels, "Developing a General Wage Index," Monthly Labor Review, March 1971; Paul Schwab, "Two Measures of Purchasing Power Contrasted," Monthly Labor Review, April 1971.

Table 1. Earnings of production or nonsupervisory workers on private nonagricultural payrolls by major industry division

	Gr	oss avera	ge		urty earni index 1	ngs	G	iross average	,		Spend	table average	weekly ear	nings ²	
Industry	ho	urly earn	ings		967 = 10	D)	w	eekly earnin	gs	Married wo	rker with 3	dependents	Worker	with no dep	pendents
	Aug. 1979		Aug. 1980p	Aug. 1979	July 1980p		August 1979	July 1980p	August 1980p	August 1979	July 1980p	August 1980p	August 1979	July 1980p	August 1980p
TOTAL PRIVATE: 3															
Current dollars	56.18	\$6.64	\$6.66	230.9	250.8	251.6	\$222.48	\$234.39	\$236.43	\$196.83	\$205.86	\$207.41	\$179.87	\$188.33	\$189.75
1967 dollars	2.79				101.1								81.21	75.94	76.02
Minina:	ł	l		l					ŀ	1			İ] !	
Current dollars	8.50	9.12	9.15	265.2	288.6	289.0	366.35	379.39	378.81	304.17	313,67	313.25	276.20	284.12	283.77
1967 dollars	3.84	3.68	3.67	119.7	116.4	115.8	165.40	152.98	151.77	137.32	126.48	125.50	124.70	114.56	113.69
Construction:	}	l	l	ł	ł	ł		•					!		
Current dollars	9.34				237.1								269.49		279.92
1967 dollars	4.22	4.00	4.01	101.3	95.6	95.8	160.65	150.80	149.19	133.87	124.89	123.62	121.67	113.26	112.15
Manufacturing:		7 20	١.,,	۱,,,, ,,	260.0	060.0	260.00	002 50	288.75	221 26	243.18	247.10	211.79	222.37	225.87
Current dollars	6.70				260.0		268.00 120.99							89.67	90.49
1967 dollars	3.02	2.94	2.93	100.3	104.9	104.3	120.99	114.33	1173.03	104.43	30.00	33.00	33.02	09.07	30.43
Transportation and public utilities: Current dollars	8.31	a. 83	3 ×n	252 7	269.5	270.4	334.89	352.32	355.29	281.24	293.95	296.11	256.10	267.24	269.13
1967 dollars	3.75				108.6										
Wholesale and retail trade:	,,,,	3.50	,,,,,		1.0000	100.5	15	*					}		
Current dollars	5.06	5.46	5.46	224.4	242.8	243.0	167.99	177.45	178.00	157.13	163.51	163.88	139.86	146.95	147.36
1967 dollars	2.28	2.20	2.19	101.3	97.9	97.4	75.84	71.55	71.31	70.94	65.93	65.66	63.14.	59.25	59.04
Finance, insurance, and real estate:		ł		l		ŀ									
Current dollars	5.28				229.1			208.87							170.80
1967 dollars	2.38	2.33	2.31	94.9	92.4	91.9	86.05	84.22	84.15	77.75	75.09	74.97	70.72	68.53	68.43
Services:			1	l	1										
Current dollars	5.31				247.2										
1967 dollars	2.40	2.34	2.33	102.5	99.7	99.4	79.59	77.18	76.81	73.47	69.65	69.29	65.95	63.40	63.08

struction; and nonsupervisory workers in transportation and public utilities; trade; finance, insurance, and real estate; and services, Included in this group are approximately four-fifths of all workers on private industry

Adjusted for overtime (manufacturing only) and interindustry employment shifts.

Spendable earnings are calculated by deducting social security and Federal income taxes applicable to a worker who earned the gross average weekly earnings of all production or nonsupervisory workers. A technical note on the calculation and uses of the spendable earnings series is available on request.

Data relate to production and related workers in mining and manufacturing; construction workers in con-

preliminary.

Table 2. Earnings of production or nonsupervisory workers on private nonagricultural payrolls, seasonally adjusted

Series	L		1979						19	80			
Jeries .	August	Sept.	October	Nov.	Dec.	January	Feb.	March	April	May	June	July p	Aug. p
Gross average hourly earnings:													
Current dollars	\$6.22	\$6.26	\$6.28	\$6.34	. \$6.39	\$6.41	\$6.45	\$6.51	\$6.54	\$6.57	\$6.62	\$6.66	86.7
1967 dollars	2.82	2.80	2,78				2.72						2.6
Hourly earnings index1 (1967=100):		:							••••	2.00	2.00	2.09	2.0
Current dollars	232.3	234.3	235.0	237.3	239.4	240.3	242.4	245.2	246.2	248.3	250.9	251.7	253.
1967 dollars	105.2	104.9	104.2	104.1	103.8	102.7	102.2				101.5		
Gross average weekly earnings:								102.0	101.4	101.4	101.5	101.0	101.
Current dollars	\$222.05	\$222.86	\$223.57	\$225.70	\$228.12	\$228, 20	\$228.98	\$230.45	\$230.86	\$230 61	6231 70		
1967 dollars	100.52	99.76	99.10	99.03	98.88	97.52	96.53	95.82					
Spendable average weekly earnings ³ :						-,,,,,	,,,,,	73.02	73.00	74.10	33.77	34.03	94.4
Current dollars	196.49	197.12	197.65	199.27	201.10	201.17	201.76	202.87	203.18	202.99	203.82	204.37	206.4
1967 dollars	88.95	88.24	87.61	87.44			85.06	84.35					82.9

See footnote 1, table 1,

p-preliminary.

Table 3. Percentage change¹ over the year in earnings of production or nonsupervisory workers on private nonagricultural payrolls by major industry division

August 1979 - August 1980

Industry		earnings	Gross	average	Spenda	pendable average weekly earnings 3				
	index ² (1967 = 100)		weekly	eernings	Married with 3 de	worker pendents	Worker with no dependents			
	Current dollars	1967 dollars	Current dollars	1967 dollars	Current dollars	1967 dollars	Current dollars	1967 dollars		
TOTAL PRIVATE	9.0	-3.3	6.3	-5.7	5.4	-6.5	5.5	-6.4		
Mining	9.0	-3.3	3.4	-8.2	3.0	-8.6	2.7	-8.8		
Construction	6.6	-5.4	4.6	-7.1	4.1	-7.7	3.9	-7.8		
Manufacturing	9.2	-3.1	7.7	-4.4	6.8	~5.2	6.6	-5.4		
Transportation and public utilities	7.0	-5.0	6.1	-5.9	5.3	-6.6	5.1	-6.7		
Wholesale and retail trade	8.3	-3.9	6.0	-6.0	4.3	-7.4	5.4	-6.5		
Finance, insurance, and real estate	9.1	-3.1	10.2	-2.2	8.7	-3.6	9.0	-3.2		
Services	9.3	-3.0	8.8	-3.5	6.3	-5.7	7.8	-4.4		

Based on preliminary data for the current month. Hourly earnings index changes are based on sessonally adjusted data. Gross and weekly changes are based on data that are not seasonally adjusted.

2 See footnote 1, table 1.

³ Calculated for workers who earned the average weekly earnings.

Senator Proxmire. Mr. Russell, I would like to now hear your views, and then we can get to some questions. Please proceed.

STATEMENT OF R. ROBERT RUSSELL, DIRECTOR, COUNCIL ON WAGE AND PRICE STABILITY

Mr. Russell. Thank you, Senator; I am sorry I was late.

I see the CPI release this week a little bit less pessimistically than you. While it's a lot higher than it was the month before, we know the month before was an aberration attributable to the 5.5-percent decline in the mortgage interest cost component, reflecting, as you point out, declines that came much earlier.

This month, the decline in the mortgage interest cost component reflecting past real declines was only 2.5 percent. So the slowdown in the rate of decline accounts for about 0.3 of a percentage point of the

acceleration from July to August.

Senator PROXMIRE. When I took that 1.1 percent—let me just interrupt—I relied on your own statistics that said that if you leave mortgage rates aside, the inflation rate is 1.1 percent in August consumer

Mr. Russell. That's right. Of course, to get a picture of what the underlying inflationary trends are, we like to leave out not just mortgage interest costs, but also some of the other volatile components, some of which are going up rapidly, and some going up not so rapidly.

If you leave out mortgage interest costs, food, and energy, and the

used-car component, which you know is very volatile-

Senator Proxmire. How can you leave out food? If you say we leave it out of all figures, we know that figure is inaccurate for this month.

Mr. Russell. You calculate the CPI-based underlying rate. We have consistently taken out exactly the same components; we can't change the components we take out from month to month. We took out food to get at the underlying rate of inflation, when food prices were going up at an annual rate of 6 percent or less, and that measure showed an alarming increase in the first quarter of 1980, going up to about 12.5 percent.

Much of that reflected the passthrough of the big energy price increases of late 1979, but since then that underlying rate has dropped down to 9 percent, and now down, it appears, to something on the

order of 7 or 8 percent.

So the underlying rate of inflation appears to have dropped precipitously, and I would date that drop with the March 14 announcement of the President and the followup actions of the Federal Reserve Board which appear to have punctured inflationary expectations. Commodity prices started to tumble even slightly before the announcement, in anticipation of it, so that the underlying rate of inflation. the CPI-based underlying rate, which was 12.5 percent in the first quarter, has been in the single-digit rate since April.

I think that's the good news in what we're seeing in the CPI.

Now if we look at the problem sectors, I think you're right. We have maybe 1 month left of salutary effects of the mortgage interest cost

component. Starting in October, that will probably turn positive

again, so we won't have this-

Senator Proxmire. The October figures we receive in mid-November? Mr. Russell. Those are the figures received in November. That's correct.

Senator Proxmire. That's when the inflation will start going up? Mr. Russell. That component will. On the other hand, let's look at

the other problem areas.

Energy has been very soft for quite a while, and I expect that to continue to be so. It appears the energy policy is something that at least in the short run is working. I think gasoline consumption is down almost 8 percent from a year ago. Inventories are very high; gasoline inventories are around 260 million barrels now compared to 232 million barrels a year ago.

Inventories of home heating oil are at 228 million barrels compared to 203 a year ago, so they're about 15 percent higher than a year ago. Consumption of gasoline is down about 8 percent, the market is very soft. Despite the Saudi oil price increases, I would expect energy prices would be very stable throughout the rest of this year and on into 1981, barring any major political disturbance in the Middle East.

The other problem sector, as you mentioned, is food. There is no doubt that food prices are going to be going up at fairly high rates the rest of this year, but I think we've seen the worst of it. I do not believe the 1.8-percent increase in food this year will be repeated for

the rest of this year.

I would expect increases in food prices of 1 percent or less per month for the rest of this year. There is no doubt that will be the problem area, but the recent declines in cattle prices will start showing up soon in deceleration in the rate of increase of meat prices, which is what is pushing that food index up so alarmingly right now.

So where are we? Well, I think that the main thing is that the underlying rate, as we are measuring it, consistently taking out the same components, whether they're going up a lot or a little, seems to

be stuck in about the 8- to 10-percent range.

If we look at wages, I think the recession appears to have knocked down the rate of wage inflation in the nonunion sector quite a bit. Unfortunately, despite the recession, there appears to have been, if anything, an acceleration in the rate of increase of union wages. The Employment Cost Index for union workers for the second quarter of 1980 was up 11.7 percent annual rate, compared to 9.5 percent in the first quarter of 1980, so despite the recession, union wage increases, as typically happens, have continued to go up at very rapid rates.

So I think that we're going to pull out of this recession-or, we may now be pulling out of this recession with an underlying inflation rate of anywhere in the range of 8 to 10 percent, depending on whether

you're an optimist or pessimist.

This means that again, inflation is still our No. 1 economic problem; we need policies to cope with inflation in both the long run and the short run. It can be a start on the long run with the President's proposals for tax incentives for investment, which would help to revitalize productivity growth.

I think in the short run there is still a manifest need for wage and price restraint, so I hope the guidelines would continue to be operative, as we pull out of this recession.

Senator Proxmire. Well, thank you very much, Mr. Russell.

I am puzzled by your description of the underlying rate, again. The reason I took out mortgage interest rates was, as you say, that they are the one component that has a very long lag. It goes back to a rate that was actually the going rate in June, but because there's a 60-day period before closing, and for most housing purchases it is reflected in the closing figure, which is 2 months later, therefore, we know that figure isn't accurate. Therefore, you take that out.

On the other hand, we know that the price that people have to pay for food in August is the price reflected in the Consumer Price Index

for August. Isn't that right?

Mr. Russell. Yes.

Senator Proxmire. Now you're talking about underlying rate, so you disregard what you call the volatile elements, which include food and how much of housing? Just the mortgage interest rate component of housing?

Mr. Russell. We take out mortgage interest components and home

purchase costs, which also enters into the long lag.

Senator Proxmire. The housing component represents altogether

about 45 percent of this CPI?

Mr. RUSSELL. That's home ownership, Senator; we don't take out all of home ownership. A lot of that is utilities and so forth, which does reflect——

Senator Proxmire. What percentage of the CPI do you take out in

computing your underlying rates?

Mr. Russell. It's somewhere in the range of 40-some percent. Food is close to 20 percent. Home purchase and mortgage interest is about 15; that's 35, and energy is around 8—you're up to 43. Used cars is 4; you're up to around 47, roughly.

Senator Proxmire. You take out about half of it?

Mr. Russell. Close to it.

Now, note that we are taking them out consistently, not just the ones that are going up rapidly. Energy right now is very flat.

What we're trying to get at is what are the underlying trends of the

economy? One way to get at it is union labor costs.

Senator Proxmire. Isn't another way to get at it to look at the whole-sale price of food?

Mr. Russell. Yes.

Senator Proxmire. And look back and see what the wholesale price was in—the crude price was, and if the crude price is up at an enormously high rate—the highest rate, probably, in history for any 2 months—18 percent, I can't remember any time when it was up that high; maybe you can. I doubt it. Even in World War II, we didn't get that kind of an increase, or after World War II.

Mr. Russell. Right.

Senator Proxmire. So that 18 percent is almost unprecedented. Isn't it logical to expect that would be reflected in much, much higher food prices in coming months?

Mr. Russell. Well, crude food input prices constitute only one-third of the cost of domestically produced food. The other two-thirds are the marketing costs.

Senator PROXMIRE. I understand that. So one-third of 18 percent for 2 months is 6 percent for 2 months, and that means, at an annual rate,

that's a 36-percent inflation rate for food. Right?

Mr. Russell. Not all of that gets passed through. It typically happens as farm prices go up, the margins get squeezed for food processors and retailers.

Senator Proxmire. You did say that there was a disappointingly sharp increase in the union wages, which is disappointing from the standpoint of inflation. That's going to have an inflationary effect, too; right?

Mr. Russell. Yes, I think that's typically the case in recessions, that union wage increases are not as sensitive to unemployment as are non-

union wage increases.

One of the reasons for that, of course, is that at any point in time, roughly two-thirds of union wages within any one year are predetermined by contracts signed during the previous year.

Senator Proxmire. Let me ask you this: Have we ever come out of a recession with an inflation rate as high as 8 to 10 percent you

describe?

Mr. Russell. No, we haven't. We came out of the last recession with an underlying core rate of inflation of about 6 percent. We came out of the previous one with an underlying rate of about 4 percent.

Each time we've come out of a recession, the inflation rate has been

ratcheted up.

Senator Proxmire. This is about 25 percent—about a quarter higher than any previous recession we've gone through.

Mr. Russell. That's approximately correct; yes. This is a short re-

cession, of course.

Senator Proxmire. Now, I think last time when you were here—or was it another group I asked about this? I asked if they could tell us the inflationary effect, to the extent there was one, of the Reagan tax proposal, and of the Carter tax cut.

Are you aware of that? Can you give us that?

Mr. Russell. You're asking for the inflationary impact of these?

Senator Proxmire. Yes, sir.

Mr. Russell. Well, there's no doubt that the Reagan tax cut would be inflationary.

Senator Proxmire. How inflationary?

Mr. Russell. It's not as inflationary as it would have been had he stuck with his original tax cut plan, which would have been phenomenally inflationary. He's cut it back considerably now, to a much more modest tax cut program, and has abandoned many of what I consider to be the most unwise aspects of his policy, such as the 10-5-3, but he is now still channeling at least three-fourths or more of his tax cut into personal income tax cuts, which will therefore fuel consumer expenditures, which will fuel the inflationary process without doing anything for enhancing investment and solving our productivity problem.

Senator Proxime. Can you tell me how much of an added increase

in inflation that would represent?

Mr. Russell. No; I don't have an exact estimate, Senator.

Senator PROXMIRE. Can you make a rough estimate? Would this add 1 percent, 2 percent, to the inflation rate over the next couple of years? Mr. Russell. I would hesitate to make an estimate.

Senator Proxmire. Can you make an estimate of the Carter pro-

posal?

Mr. Russell. It's certainly minimum; there is very little short-run inflation impact. In the long run, it would be anti-inflationary, because more of this tax cut than any tax cut ever proposed is going into encouraging investment and insofar as it can improve productivity, it will be anti-inflationary, something the Reagan tax cut does not do.

Senator Proxmire. Now, the two components of the CPI that declined in August, the gasoline prices and mortgage interest rates could easily reverse direction and begin rising later this year. Food prices are also highly volatile, compared to inflation even more later on.

Is there anything in the CPI that promises any long-term relief, or

are we looking at a really bad situation over the next 6 months or year?

Mr. Russell. Over the next 6 months or a year, I still think that the energy price outlook is good; I think the energy prices are going to go up less than the underlying rate of inflation over that time, unless there is some worldwide shock that we can't possibly anticipate.

Food prices will be going up a lot through the rest of this year and into the early part of 1981, but I believe that they should start to

moderate later on in 1981.

Senator PROXMIRE. What do you base your estimate of energy prices on? Isn't it true that the OPEC cartel has decided that they will in-

crease oil prices modestly, but increase them?

Mr. Russell. Well, for example, the recent Saudi price increase would increase the price of gasoline and home heating oil in this country, if fully passed through, by one-half of 1 cent per gallon. Now, that won't be passed through this year; the reason is the market is

simply too soft.

If you look at what's happening, refiners' spreads are actually going down now, as some of them are offering rebates to the retailers to buy their products. Retailer and wholesaler margins, which reached very high peaks early this year, are also plummeting. The market is changing now; it's becoming highly competitive, and I expect to see those margins continue to decline for quite a while, so that they will more than compensate for any crude oil price increases that I see.

Senator PROXMIRE. Iraq and Iran are engaged in a heated border war, that now seems to have resulted so far in the destruction of any of their capacity for petroleum production. If that war does continue and accelerate, and results in both Iraq and Iran shutting down their petroleum production for more than a short period, how will this affect the world supply and price of petroleum? And could it have an effect

as great as the fallout of the recent revolution in Iran?

Mr. Russell. No, I don't think so, because when the Iranian revolution came, they were accounting for about 5 percent, I believe, of the world's oil supply, and that went to virtually nothing in no time at all.

Now that is enough in itself, given what we know about short-run elasticities, to cause something like a 30- to 50-percent increase in crude oil prices in the short run. In the long run it can be much less than that, as people adapt to high prices.

Right now, Iranian production, while we don't know exactly what it is, is way below what it was before the revolution. Therefore, as long as this situation is, I think, restricted to Iran and Iraq, I would not expect any crisis of the proportions that we saw last year. If it spreads, however, throughout the rest of the Middle East, then it could be extremely problematic.

Senator Proxmire. How about Iraq? How about the effect on their

production?

Mr. Russell. I don't know what Iraq's share of world oil production is, but I would not expect Iraq's production to fall that much unless——

Senator PROXMIRE. You say this depends on whether or not hostilities are confined to these two countries? If they are, you think the effect will be minimal?

Mr. Russell. Yes. I haven't studied this in any length, mind you, but I don't think it would be a problem of the proportions that we

faced in 1979 if it were contained.

Senator PROXMIRE. Mr. Russell, last winter families all through the North—certainly in my States and other States, the Northern States—were battered by the doubling of heating oil prices. What do you foresee happening to heating oil prices this winter? It was a mild winter last winter, too.

Mr. Russell. If we have just an ordinary winter this year, home heating oil prices should go up certainly at no faster rate than the overall inflation rate. I don't think we'll see anything like what we saw last winter, because, again, home heating oil stocks are very large right now. The only stocks that are what you call normal are middle-distillate fuels, but because of the huge buildup last year, home heating oil stocks and gasoline stocks are very high.

If in fact we have a very severe winter, then they were plenty of inventories to draw down, but as they draw down these inventories, that will create space to increase their inventories of gasoline, and may

actually push up gasoline prices.

But I don't expect anything like last year, even if we have an

extremely severe winter.

Senator PROXMIRE. You're a real optimist this morning. [Laughter.] In your recent report extending the guidelines until the end of 1980, the Council on Wage and Price Stability indicated the program may be terminated soon. The report said, and I quote:

"A thorough examination of the continued effectiveness of the pro-

gram, and possible alternatives, is needed."

In light of the very poor inflation performance of the guideline program, as begun in the fall of 1978, would you say the program contributed at all to inflationary restraint? If so, how much?

Mr. Russell. I certainly believe that it has contributed to inflationary restraint. I believe the inflation rate is lower than it would have

been without these guidelines.

It's true that it did not and could not have prevented the explosion in prices caused by the direct effects of the world oil price explosion. It's hard to determine by exactly how much we did reduce the inflation rate, because this requires estimating what inflation would have been in the absence of the guidelines. That requires statistical inference and

econometric estimation; econometric wage and price models tend not to be very robust. That is to say, very sensitive to the kinds of assump-

tions you make about the wage-price process.

Therefore, in the work we're doing on the effectiveness of the guidelines over the past 2 years, we're getting very different results, depending upon exactly what model we use. But basically, I think the CEA estimates in their January report, of having taken 1 to 1.5 percent off wage rates, is probably about the best estimate that we can make.

Now, labor costs account for some two-thirds of the total cost of production. Therefore, if we took about 1 to 1.5 percent off wages, then, given that income shares didn't change, we must have taken about 1

percentage point at an annual rate off the rate of inflation.

Senator Proxime. What are the arguments for terminating the

program?

Mr. Russell. The arguments for terminating any program such as this is that the longer it's in existence, the more poignant become the kinds of problems that you always have in a program such as this, caused by unrepresentative base periods. The further away we get from the base period, the more unrepresentative it becomes.

Insofar as any distortions are created by the program, they become magnified the longer the program goes along. We try to adapt to this problem by introducing more flexibility in the guidelines in order to correct for the kinds of inequities that can arise as the program

endures.

Also, I think that a voluntary program over time gradually loses its public support. A program such as this cannot work without the cooperation, if not the support, of labor and business. I don't think, however, that we are yet anywhere near the point that the program can no longer serve as an effective complement to monetary and fiscal policy

Senator PROXMIRE. Now, if the program is terminated soon, what

should we do to take its place?

Mr. Russell. I think something has got to be done, because we're going to be pulling out of this recession, as we noted earlier, with an underlying inflation rate higher than we've ever had coming out of a recession before. Unless we want to dive right back into a recession with very restrictive monetary policies in 1981—and I'm sure that Mr. Volcker is determined to avoid another outbreak of inflation, and this may therefore happen—we have to have something in place, as we move into 1981, to induce restraint in the setting of wages and prices. I don't know exactly what the shape of that program should be—whether it should be a straightforward continuation of this program, whether this program should be restructured in some way, whether it should be supplanted in some way with some alternatives such as the tax-based incentive program, whether we should try to secure some kind of meaningful social compact of the types that have worked in other countries—there are lots of options.

I wouldn't propose anything in particular yet. We've said that we're going to be looking at the viability of this program and the attractiveness of alternatives throughout the remainder of this year, and will

make a decision by January.

Senator Proxmire. The September 22 issue of Business Week reported a debate between economic advisers for the three Presidential candidates; according to the article, the three economists agreed the recession will end without significantly dampening inflation, which is what has happened, as you've just described it.

Now, two of the three, including Chairman Charles Schultz of the Council of Economic Advisers, also believe that the failure of the recession to cut inflation means that adopting a stronger form of

incomes policies is unavoidable.

Where do you stand on that issue, and if an incomes policy is needed, will you favor direct controls or some kind of tax-based incomes policy?

Mr. Russell. I agree with Mr. Schultz that either this program has got to be fortified to keep it viable, or we have to find some stronger

alternative to it that provides additional incentives to comply.

I do not think that mandatory controls are the answer, for reasons that we have articulated many times in the past. I think that these tax-based incomes policies are very attractive, theoretically; there are, however, a number of administrative problems that are attendant on tying any kind of incomes policy to our tax system, but I don't think that these problems are insurmountable.

I think there are lots of questions that have to be answered, but they all do have answers and we could devise a useful TIP that could help

to restrain prices and wages.

Senator Proxmire. Last month Courtenay Slater, who is a splendid economist—she was a senior economist for this committee for years, and as you know, she has now become Chief Economist for the Commerce Department—seems to have been one of the few or one of the first, at least, economists who said that the economy has reached bottom, the recession is over, and we are now moving ahead.

What's your view?

Mr. Russell. All of the indicators are that we have certainly bottomed out. The signs of recovery are a bit mixed, but the data on retail sales and other leading indicators suggest that we are indeed pulling out of the recession.

Senator Proxmire. Did we actually have a recession?

Mr. Russell. Oh, ves.

Senator Proxmire. I say that—wait a minute. The technical definition of a recession is two successive quarters in which the real gross national product declines. It declined in the second quarter; the third quarter is still going on, and we say we're moving ahead.

It's conceivable we may have some positive growth in the third

quarter. in which case there was no recession; isn't that right?

Mr. Russell. It's certainly conceivable by that technical definition we were not in a recession, but when the unemployment rate goes up by almost 2 percentage points in 2 months, I think it would be a mistake not to—

Senator Proxmer. Yes: but Mr. Russell. you can't just pull your definition out of the air. The definition that has been accepted by most economists and by the administration, and by many others, is that you have two successive quarters in which the real gross national product declines, and we may not have that.

Mr. Russell. I don't wish to challenge that definition; I just wish to say we'd better think up another name for the kind of precipitous decline we had in the second quarter. If we're not going to call it a recession, I don't know what you want to call it, but it was certainly

a decline in economic activity.

Senator PROXMIRE. Let me try again once more. On your estimate of where prices are likely to be going; while our economy has been declining, at least, if not in a recession for a few months, inflation has dropped from an 18.1 percent annual rate during the first quarter of this year to an annual rate of-

Mr. Russell. 7.5.

Senator Proxmire. An annual rate of about 7.5 to 7.8 percent. Despite this improvement there's a widespread feeling that inflation will worsen as the economy experiences a recovery from the recession.

Do you see any signs of a permanent improvement in the inflation situation because of the recession, or do you expect a return soon to double-digit inflation that we experienced during 1979 and the first few months of this year?

You've answered that in part by telling us that we emerged from this recession, whatever this is—pause in growth—with the highest

inflation rate that we have had under similar circumstances.

Does this mean there is every likelihood that we can expect inflation to worsen, follow a similar pattern to what it followed in the past, as we recover?

Mr. Russell. I think there is a grave danger that the inflationary benefits of recession can be not only ephemeral, but even counterproductive, because during a recession the rate of growth of our capital stock declines. This retards productivity growth and reduces the stock of housing available. Thus, when housing prices take off when we pull out of the recession, the increase can be extremely large; so that it can actually cause an even greater rate of inflation after the recession than any temporary benefits that we may have gotten by the recession.

The same argument has been made about the controls programs, of course: The postcontrols catchup actually can outweight the salutary effect of the controls while they're in effect, so I think there is indeed

Recessions, or slowdowns, can do a lot to slow down the inflation rate permanently, if it bursts the kind of speculation bubble. If the recession or slowdown can be used, or if the severe tightening of monetary policy such as we saw in March can be used to reverse inflationary

expectations, then it can have an enduring effect.

So I think there may be some of that. If we had let things go as they were going in the first quarter of this year, with all of the speculation in the crude materials markets, precious metals markets, and moneys markets, then I think the results would have been nothing short of disastrous.

So I don't regret for a minute what the administration did in March. Senator Proxmire. Well. you're a very persuasive man: I'm a Democrat, and I support President Carter for reelection, but I must say it would be very hard for me to say that the position that President Carter took in April has had a direct and clear effect in reducing the inflation rate.

You say it has?

Mr. Russell. Yes, I believe it has, but of course-

Senator Proxmire. Well, you're the first person, I think, who has

said that, including the administration's spokesman.

President Carter is not exactly bashful about indicating where he has made progress, and I haven't heard him say that. I haven't heard Robert Strauss, even at the height of the Republican Convention he didn't make that kind of a claim, so I'm kind of startled at that from a person who is relatively objective.

Mr. Russell. Let's separate two things here. Senator Proxmire. Speaking as a scholar?

Mr. Russell. Yes, that's hard to do, separating the two things.

One is the question of what's happening to underlying cost trends, and this is what we're trying to get at with this underlying rate of inflation.

I think that the underlying rate of inflation has been retarded little if at all by this recession. On the other hand, had we not had the recession, I think that the inflationary expectations which were almost out of control in the first quarter—

Senator Proxmire. Now you're saying something different, and I think that's right. Now you're saying that the slowdown that resulted perhaps from policies of the Congress and the administration, and so forth—and other causes, too—has had some effect in reducing the rate of inflation.

If we hadn't had that, inflation would be worse than it is.

Mr. Russell. That's right.

Senator Proxmire. But previously I understood you to say that it was because of the action that President Carter took in April, including the action with respect to the Federal Reserve, and credit policies and so forth—I understood you to indicate that that was the cutting element that made the difference.

Mr. Russell. I think it did puncture inflationary expectation, which

has an immediate impact in the crude material markets

Senator PROXMIRE. You think that punctured inflationary expectations instead of the slowdown in the economy puncturing inflationary impacts?

Mr. Russell. I think they're a package. The announcement signaled a slowdown of the economy, particularly because people felt the Federal Reserve Board was serious about the credit controls.

I think it did reverse inflationary expectations, which show up most dramatically in these crude material markets, but also feed through m the industrial sector of the economy, resulting, in my opinion, in some slight, but only slight, moderation in the underlying rate of inflation. But basic cost trends have not been markedly affected by this recession.

Senator Proxwire. We have one more question.

In spite of imports and declining demand, U.S. auto makers continue to increase the price of their cars. Has the Council reviewed that situation?

Mr. Russell. We certainly have. We probably monitor no industry

more closely than the automobile industry.

Senator Proxmire. How do you explain that? They are all in a very serious situation; Chrysler, as we know, has been on the brink of bankruptcy, Ford has been losing money, General Motors is losing money on their domestic operations, and yet prices continue to increase.

Mr. Russell. It's cost-push. They signed a fairly expensive labor agreement recently, steel prices have been going up, prices of rubber have been going up, plastic prices for the past year, too, have been going out of sight, particularly the petrochemical-based—

Senator PROXMIRE. Have you examined those costs to see if they

justify the price increases?

Mr. Russell. No, not precisely, because our standard is not fundamentally a cost-passthrough standard. They are under a price standard, and they are complying with those standards, so they are not out of compliance with our standards.

You're arguing they should be coming in well below the limit of our standard places on the price increases because of the competition from

abroad, and I guess I agree.

Senator PROXMIRE. I can fully understand, of course, the effect of

cost on prices; there's no question there's a very clear effect.

On the other hand, because of the very high fixed costs in the industry, it would seem to me if they can get prices down to a point where they increase volume, they can do better. There doesn't seem to be any response to the recession in lower prices in the automobile industry.

Mr. Russell. I think they're lowering prices a lot on the cars they

can't sell, the big ones.

Senator PROXMIRE. Used cars?

Mr. Russell. No, the large cars. They are producing at full capacity in their factories that make the compact cars, and that's where most of the price increases are coming from—domestically produced compact cars and imports—but the big car prices are not going up very much at all.

Senator Proxime. Mr. Russell, thank you very much.

The committee stands adjourned.

[Whereupon, at 10:45 a.m., the committee adjourned, subject to the call of the Chair.]