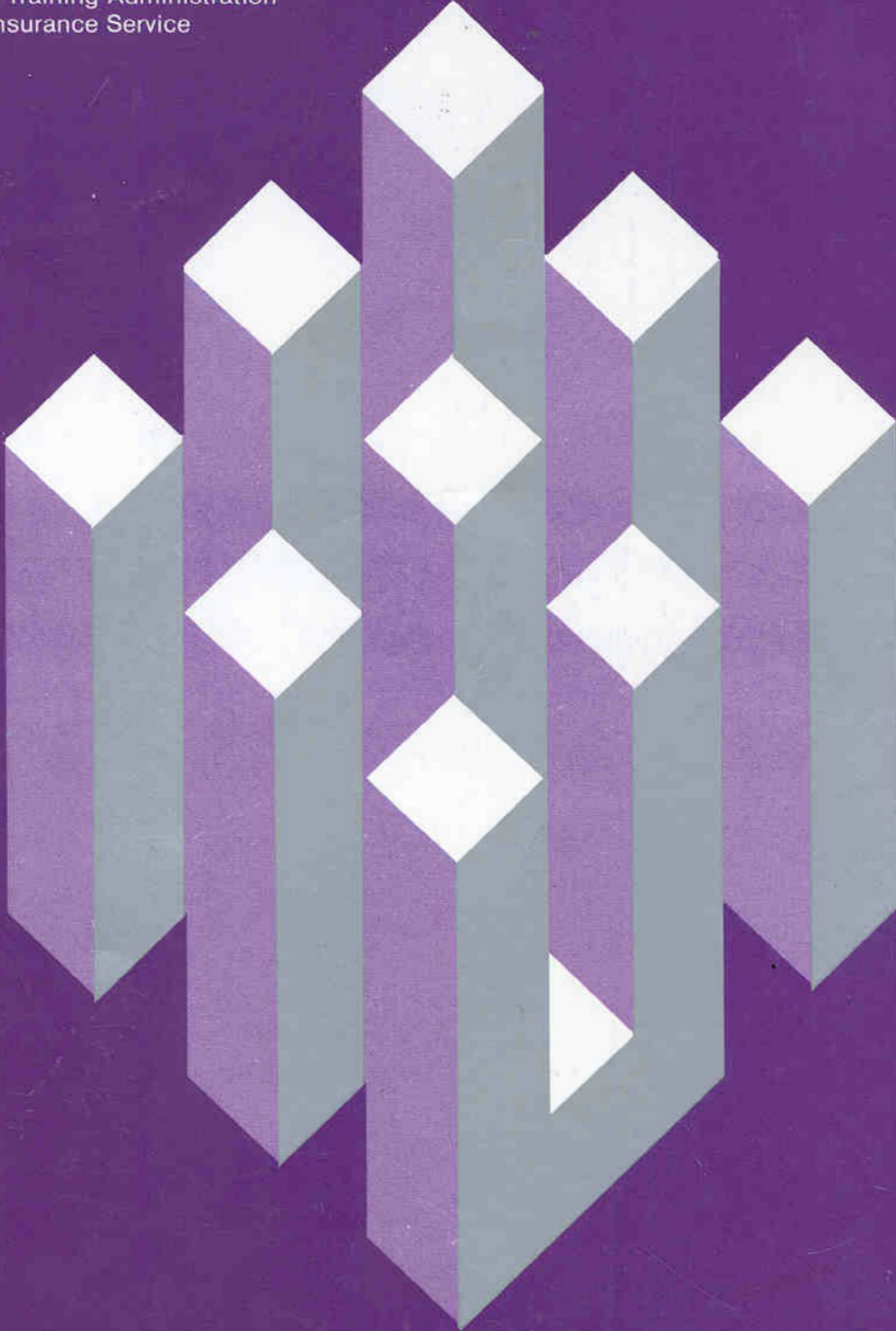


Extended UI Benefit Triggers



Unemployment Insurance
Occasional Paper 94-2

U.S. Department of Labor
Employment and Training Administration
Unemployment Insurance Service



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U.S. Department of Labor
Robert B. Reich, Secretary

Employment and Training Administration
Doug Ross, Assistant Secretary for
Employment and Training

Unemployment Insurance Service
Mary Ann Wyrsh, Director

1994

This report was prepared for the Unemployment Insurance Service, U.S. Department of Labor under Contract Number 7949-002 with Mathematica Policy Research, Inc. The authors of this report are Walter Corson and Anu Rangarajan. Since contractors conducting research and evaluation projects under government sponsorship are encouraged to express their own judgement freely, this report does not necessarily represent the official opinion or policy of the U.S. Department of Labor.

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EXTENDED UI BENEFIT TRIGGERS

September, 1993

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ACKNOWLEDGEMENTS

A number of individuals at the U.S. Department of Labor, Westat, and Mathematica Policy Research contributed in important ways to this report and deserve our thanks. At USDOL, Stephen Wandner of the Unemployment Insurance Service and Sharon Brown of the Bureau of Labor Statistics provided overall guidance and helpful suggestions throughout the project. Robert Pavosevich of the Unemployment Insurance Service and Daniel Lambert of the Bureau of Labor Statistics provided and answered questions about the data. Richard Beatty and Louis Jacobson, at Westat, also provided helpful comments. At Mathematica Policy Research, Joanne Pfeiderer edited the report and Cindy Castro oversaw production of the report.

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SERVICE SECTORS**

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ABSTRACT

The unemployment insurance system provides income support of limited duration to workers who lose their jobs. Most workers receive this income support through state unemployment insurance (UI) programs that generally provide up to 26 weeks of benefits and through extended benefit programs that offer additional weeks of benefits when unemployment rates are high. Since 1970 these extended benefits programs have included the permanent Extended Benefits (EB) program and a series of temporary programs established during major recessionary periods.

This report responds to a request from Congress to the Department of Labor to examine the implications of using alternative triggers for extended UI benefits based on the insured unemployment rate (IUR)--the unemployment rate among the population covered by the UI program--and the total unemployment rate (TUR)--the unemployment rate among the entire population. Most importantly the report finds that the TUR-based trigger rates included in recent legislation provide substantially more extended benefits coverage of exhaustees than the IUR-based trigger rates used in the permanent EB program and the current temporary benefits program. The report also finds that thresholds--that is, requirements that the current IUR or TUR exceed 120 or 110 percent of the average rate in the corresponding period during the previous two years--have a major impact on coverage. Substantially lower trigger rates are needed to provide the same coverage as a given trigger rate without a threshold.

The report also examined how differences in state UI eligibility requirements and how the shift from a manufacturing to a service economy may affect the availability of extended benefits. Analysis of these issues indicates that restrictive state eligibility criteria tend to have a negative on the IUR and that the proportion of unemployment in manufacturing had a positive effect on the IUR in the first half of the 1980s. Since the magnitude of these estimated effects was fairly small, they do not appear to have a major affect on the availability of extended benefits. However, since the variables included in the analysis may not have fully captured the effects on the IUR of state eligibility requirements, these findings should be viewed with some caution.

EXECUTIVE SUMMARY

The unemployment insurance system provides income support of limited duration to workers who lose their jobs. Most workers receive this income support through state unemployment insurance (UI) programs that generally provide up to 26 weeks of benefits and through extended benefit programs that offer additional weeks of benefits when unemployment rates are high. Since 1970 these extended benefits programs have included the permanent Extended Benefits (EB) program and a series of temporary programs established during major recessionary periods.

The permanent EB program and most temporary programs have used the unemployment rate among the population covered by the UI program--the insured unemployment rate (IUR)--to determine either when extended benefits are made available or the number of weeks benefits are extended. Recently, however, a decline in the IUR relative to the unemployment rate among the entire population--the total unemployment rate (TUR)--has led to a decline in the availability of extended benefits and to dissatisfaction with the IUR as a "trigger" for extended benefits. This situation has led to proposals for the use of the TUR as an alternative trigger for extended benefits. In 1991, the TUR was used as an alternative trigger in a temporary extended benefits program.

This report responds to a request from Congress to the Department of Labor to examine the implications of using alternative IUR- and TUR-based triggers for extended UI benefits. This examination includes alternative trigger rates and trigger definitions that, in many cases, include a "threshold" requirement--that is, a requirement that the current IUR or TUR exceed 120 or 110 percent of the average rate in the corresponding period during the previous two years. This examination of alternative triggers also considers the degree to which alternative triggers and trigger rates would have provided extended benefits coverage to the UI population during the past decade, and how this extended benefits coverage would have been distributed by labor market, stage of the business cycle, calendar quarter, and region of the country. It finds that:

- The TUR-based trigger rates included in the Emergency Unemployment Compensation (EUC) program and in recent changes to the permanent EB program provide substantially more extended benefits coverage of exhaustees than the IUR-based trigger rates also used in these two programs. For example, during the 1980s, 37 percent of exhaustees were in states that would have been on extended benefits if the extended benefit program used, as a trigger, the 6.5 percent, three-month average seasonally adjusted TUR with a threshold that is used in recent legislation. In contrast, only 9 percent of exhaustees would have been on extended benefits with the 5 percent IUR trigger with a threshold that is used in the permanent EB program. Consequently, a very low IUR (1.5 percent with a threshold) would be needed to match the coverage of the 6.5 percent seasonally adjusted TUR with a threshold.
- The imposition of thresholds has a major impact on coverage. When a threshold is used, a substantially lower trigger rate is needed to provide the same coverage as a given trigger rate without a threshold. Triggers with thresholds also tend to direct benefits to states and time periods with worsening labor market conditions. Triggers without thresholds do a better job of directing benefits to states and time periods with high current rates of long-term unemployment. The performance of trigger mechanisms that trigger extended benefits when either of two rates is satisfied--a lower rate with a threshold and a higher rate without a threshold--falls between that of the comparable triggers with and without thresholds.

- The performance of TUR- and IUR-based triggers providing equal extended benefits coverage shows that the TUR-based triggers are better at directing benefits to states and time periods experiencing high current rates of long-term unemployment. The IUR-based triggers are better at directing benefits to states and time periods experiencing worsening labor markets. Because the TUR triggers are based on seasonally adjusted unemployment rates, they provide approximately equal coverage to exhaustees regardless of the season. The IUR-based triggers provide less equal coverage because they rely on data that are not seasonally adjusted. The TUR-based triggers also appear better at directing extended benefits coverage to regions with high unemployment rates.

Congress also raised two related issues, namely how differences in state UI eligibility requirements and how the shift from a manufacturing to a service economy may affect the availability of extended benefits. Because the IUR was used to trigger extended benefits during the 1980s, the analysis focused on how these factors affected the IUR during that period. It also examined how differences among states in benefit generosity may have affected the IUR.

Analysis of these issues indicates that restrictive state eligibility criteria tended to have a negative and statistically significant effect on the IUR, while state benefit generosity had a positive and statistically significant effect on it. Despite the statistical significance of these findings, the magnitude of these estimated effects was fairly small. However, since the variables included in the analysis may not have fully captured the effects on the IUR of state eligibility requirements, these findings should be viewed with some caution.

Finally, the proportion of unemployment in manufacturing had a positive and significant effect on the IUR in the first half of the 1980s, as was found in prior research, but it had an insignificant effect when the entire decade was considered.

I. INTRODUCTION

The unemployment insurance system provides income support of limited duration to workers who lose their jobs. Most workers receive this income support through state unemployment insurance (UI) programs that generally provide up to 26 weeks of benefits and through extended benefit programs that offer additional weeks of benefits when unemployment rates are high. Since 1970 these extended benefits programs have included the permanent Extended Benefits (EB) program and a series of temporary programs established during major recessionary periods.

The permanent EB program and most temporary programs have used the unemployment rate among the population covered by the UI program--the insured unemployment rate (IUR)--to determine either when extended benefits are made available or the number of weeks benefits are extended. Recently, however, dissatisfaction with the IUR as a "trigger" for extended benefits has led to proposals for the use of the unemployment rate among the entire population--the total unemployment rate (TUR)--as an alternative trigger for extended benefits. In 1991, the TUR was used as an alternative trigger in a temporary extended benefits program.

This report responds to a request from Congress to the Department of Labor to examine the implications of using alternative IUR- and TUR-based triggers for extended UI benefits. It begins, in this chapter, with a brief overview of the triggers used in EB programs and analyses of those triggers. This chapter also describes the approach used to analyze alternative trigger mechanisms. Chapter II then presents a comparison of alternative triggers. This comparison examines the degree to which alternative triggers and trigger rates would have provided extended benefits coverage to the UI population during the past decade, and how this extended benefits coverage would have been distributed by labor market, stage of the business cycle, calendar quarter, and region of the country. The final chapter examines two related issues raised by Congress, namely how the shift from a

manufacturing to a service economy and differences in state UI eligibility requirements may affect the availability of extended benefits.

A. THE USE OF TRIGGERS IN UI EXTENDED BENEFITS PROGRAMS

Various trigger rates and definitions have been used to extend UI benefits. These programs have included a permanent EB program enacted in 1970 and changed substantially in the early 1980s, as well as a number of temporary extended benefits programs.

1. The Permanent EB Program in the 1970s

The permanent UI extended benefits (EB) program was enacted as part of the Employment Security Amendments of 1970. Unlike two previous temporary extensions of UI benefits, this program incorporated a mechanism to trigger extended benefits automatically when unemployment increased beyond a specified level. The triggering mechanism used a moving 13-week average of the insured unemployment rate (IUR) in a state to determine when extended benefits would be available.¹ Specifically, EB was triggered when the 13-week average IUR for a state equaled or exceeded 4 percent and was at least 120 percent of the state's average IUR in the corresponding calendar period during the previous two years. Benefits were made available in all states, regardless of the state IUR, when the national IUR (averaged over a 13-week period) equaled or exceeded 4.5 percent.

The IUR was chosen as the triggering mechanism for the EB program, in part, because it provides a measure of the unemployment rate among the insured population (the IUR is the ratio of UI claims to the UI-covered population). It was also chosen because it was available by state on a weekly basis. At the time, the total unemployment rate (TUR), which is now being used as an alternative trigger, was only available by state on an annual basis.²

¹The EB program provides a maximum of 13 additional weeks of benefits to eligible claimants.

²Reliable estimates of the monthly TUR by state were first available in the late 1970s. Seasonally adjusted estimates were not available until 1992.

The IUR trigger mechanism used in the EB program had several other features worth noting.

First, for EB to be made available, the state trigger required the IUR to:

- Equal or exceed a trigger level (4 percent)
- Equal or exceed a prior "threshold" of 120 percent of the average rate in the corresponding period during the previous two years

This threshold requirement was intended to target benefits to states in which unemployment conditions had worsened relative to the previous two years rather than states in which the IUR routinely exceeded 4 percent. Although the threshold requirement helped achieve this objective, some states with very high IURs did not trigger EB because of the threshold. As a result the threshold requirement was suspended several times in the early 1970s. In 1976 states were given the option of waiving the threshold requirement and triggering EB when the IUR equaled or exceeded 5 percent.

Second, the IUR trigger initially used in the program counted EB recipients in the trigger rate calculation (that is, the claims number used in the trigger rate calculation included claims under both the regular state program and the EB program). When EB was triggered in a state, the IUR rose and EB was more likely to remain in effect than it would have been if EB recipients had not been counted.

Finally, the IUR was not and still is not seasonally adjusted. Because UI claims rise in the winter, the EB program has been more likely to be triggered in the winter than other times.

2. The Permanent EB Program in the 1980s

In the early 1980s the EB program was modified substantially. In particular, the Omnibus Budget Reconciliation Act of 1981 instituted several changes in the EB triggering formula, which made it more difficult for states to become and remain eligible for the program. These changes included:

- Elimination of the national trigger
- Elimination of EB claimants from the IUR trigger rate calculation
- An increase in the state trigger rate from 4 to 5 percent (or to 6 percent if the 120 percent criterion was waived)³

A simulation analysis of the effect of these changes (Corson and Nicholson 1985) estimated that the changes in the EB program, by themselves, led to a reduction in first payments under the program of about 24 percent in late 1982 and 1983, a period of high national unemployment rates. The changes in the trigger rates accounted for much of the decline. However, actual first payments under the EB program during this period declined by as much as 55 percent from the level that would have been expected, on the basis of the relationship between EB program first payments and the TUR in the 1970s. This further decline in the availability of EB occurred, in all likelihood, because of the drop in insured relative to total unemployment during the 1980s.⁴ This decline in insured unemployment under the regular state UI programs lowered the IUR and made it less likely that states would trigger EB at a given total unemployment rate.

3. Temporary Extended Benefits Programs

A number of temporary extended benefits programs, enacted during recessionary periods, have used triggers to determine when extended benefits would be available or to determine the duration of extended benefits in a state. In most cases, the IUR has been used as the trigger in these temporary programs, but in several cases alternative triggers have been used. More specifically, both the temporary compensation program established by the Emergency Unemployment Compensation Act of 1971 and the Emergency Unemployment Compensation Program (EUC) established in November 1991 used an adjusted IUR designed to account for benefit exhaustions. The EUC

³A second set of changes in the early 1980s tightened individual eligibility criteria.

⁴See, for example, analyses by Burtless (1983), Burtless and Saks (1984), Corson and Nicholson (1988), Blank and Card (1991), and Vroman (1991).

program also used an alternative TUR-based trigger, namely a six-month moving average of the monthly TUR. Finally, in July 1992, modifications to the permanent EB program permitted states to use the three-month average, seasonally adjusted TUR as an alternative to the existing IUR trigger.

The adjusted IUR used in the 1971 temporary compensation program and the one used in the EUC program both differed from the IUR used in the EB program in that a factor was added to the 13-week moving average of the IUR to account for UI benefit exhaustions. For the 1971 program, this factor equaled one quarter of the previous year's exhaustions divided by average covered employment. For the EUC program, this factor equaled the sum of the most recent three months of exhaustions divided by average covered employment. Implicitly, both these calculations assumed that approximately three months worth of exhaustees were unemployed at any point in time.

In the 1971 program an adjusted IUR of 6.5 percent was used to trigger benefits, while in the EUC program an adjusted IUR of 5 percent was used initially to trigger a maximum of 20 weeks of extended benefits (as opposed to the minimum of 13 weeks provided in all states). Amendments to the program in 1992 increased the maximum benefit durations to 26 and 33 weeks. These maximums were reduced in subsequent amendments.

The six-month average TUR used in the EUC program equaled the average of the most recent six months of nonseasonally adjusted total unemployment in a state divided by the average number of individuals in the labor force in the same six-month period. A 9 percent rate was used initially to trigger the maximum extended benefits period of 20 weeks. The three-month seasonally adjusted TUR is based instead on three months of seasonally adjusted data. In this latter case, the TUR trigger rate for the EB program is set at 6.5 percent (that is, EB is triggered if the three-month seasonally adjusted TUR equals or exceeds 6.5 percent). In addition, this alternative trigger definition for EB includes a threshold requirement that the TUR equal or exceed 110 percent of the average rate in the corresponding three-month periods during the preceding two years.

Finally, as is clear from the fact that TUR triggers are currently being used, the Bureau of Labor Statistics (BLS) is now able to estimate the TUR reliably on a state-by-state basis each month. Moreover, these estimates are also provided on a seasonally adjusted basis.

B. ANALYSIS APPROACH

This report analyzes the performance of alternative extended benefits triggers by simulating the performance of alternative triggers from 1980 through 1991. This period was chosen primarily because monthly, seasonally adjusted data on the TUR by state were available beginning in 1978 and because two years of data--1978 and 1979--before the beginning of the simulation period were needed to compute the thresholds used in some of the simulations. However, this period also included a wide range of labor market conditions, from an initial recessionary period, to a period of recovery, to a subsequent recession.

The simulations include all 50 states plus the District of Columbia and Puerto Rico.⁵ For each state, monthly BLS data on the TUR and weekly UI data on the IUR were used to compute an on-off indicator for each trigger for each month (in the case of the TUR-based triggers) and each week (in the case of the IUR-based triggers).⁶ When the trigger definition included a threshold requirement, these on-off indicators considered not only the current level of the unemployment rate (TUR or IUR), but also the rate in the corresponding period in two prior years. Similarly, the on-off indicator for the adjusted IUR was computed using weekly IUR data and data on the number of UI exhaustees.

For analysis purposes, the monthly or weekly indicators were then aggregated to quarterly measures for each state, showing the proportion of time the state would have been on extended

⁵Some of the BLS data used for the distributional analysis were unavailable for Puerto Rico. In these cases the analysis includes the 50 states plus the District of Columbia.

⁶We used the 13-week IUR reported weekly by the states to the Department of Labor.

benefits during each quarter.⁷ For example, if, for a given trigger, a state would have been on extended benefits for an entire quarter, the indicator was set at one. If the state would have been on extended benefits for two months, it was set at two-thirds. If the state would have been on these benefits for one month, it was set at one-third; if the state would not have been on extended benefits, the indicator was set at zero.

These quarterly indicators were then combined with state-level BLS data on the components of employment and unemployment (for example, the number of long-term unemployed) and UI data on exhaustions to create a data set for the analysis. This data set was then used to examine the degree of coverage of the unemployed provided by alternative triggers and to examine the distributional impacts of alternative triggers relative to labor market conditions, business cycle stages, seasons, and the geographic regions.

Additional data on UI eligibility conditions by state were added to the data set to explore the effect that eligibility conditions and other factors may have had on the availability of extended benefits. This analysis focused on the 1980s and examined the degree to which differences among state IURs could be explained by differences in economic conditions and differences in UI program parameters. The results of the analysis were then used to draw inferences about the effect of eligibility conditions and other factors on the availability of extended benefits.

⁷When the EB program triggers on or off it remains on or off for a minimum of 13 weeks. Our procedure for computing the proportion of time a state is on extended benefits ignores these minimums. However, this procedure should not bias our estimates.

II. COMPARISON OF ALTERNATIVE TRIGGERS

Although a number of TUR- and IUR-based trigger definitions and trigger levels have been used to extend UI benefits, relatively little analysis of the performance of these alternative triggers has occurred. This chapter examines the performance of alternative triggers definitions and trigger levels, focusing specifically on the degree to which alternative triggers provide extended benefits coverage to the unemployed. It also examines the distributional impacts of alternative triggers relative to labor market conditions, business cycle stages, seasons, and geographic regions.

The findings include the following:

- The TUR-based trigger rates (specifically, the 6.5 percent, three-month average seasonally adjusted TUR with a threshold) included in recent legislation provide substantially more extended benefits coverage of exhaustees than the IUR-based trigger rates used in the permanent EB program and the current temporary benefits program. A very low IUR (1.5 percent with a threshold) would be needed to match the coverage of the 6.5 percent seasonally adjusted TUR (SATUR) with a threshold.
- The imposition of thresholds has a major impact on coverage. When a threshold is used, a lower trigger rate is needed to provide the same coverage as a given trigger rate without a threshold. Triggers with thresholds also tend to direct benefits to states and time periods with worsening labor market conditions. Triggers without thresholds do a better job of directing benefits to states and time periods with high current rates of long-term unemployment. The performance of trigger mechanisms that trigger extended benefits when either of two rates is satisfied--a lower rate with a threshold and a higher rate without a threshold--falls between that of the triggers with and without thresholds.
- The performance of TUR- and IUR-based triggers providing equal extended benefits coverage shows that the TUR-based triggers are better at directing benefits to states and time periods experiencing high current rates of long-term unemployment. The IUR-based triggers are better at directing benefits to states and time periods experiencing worsening labor markets. Because the TUR triggers are based on seasonally adjusted unemployment rates, they provide approximately equal coverage to exhaustees regardless of the season. The IUR-based triggers provide less equal coverage because they rely on data that is not seasonally adjusted. The TUR-based triggers also appear better at directing extended benefits coverage to regions with high unemployment rates.

A. DEFINITION OF TRIGGERS USED IN THE ANALYSIS

We examine the performance of four alternative trigger definitions for UI extended benefits programs. Two of these definitions are based on the TUR, and two on the IUR. For each of these trigger definitions, we look at a number of alternative trigger rates and the implications of imposing threshold requirements--that is, requirements that the trigger must exceed both a specific level and a level based on past experience. In all cases the triggers operate at the state level.

Existing or proposed legislation guided our choice of trigger definitions and levels. Additional trigger levels were included to allow us to compare the distributional implications of alternative triggers definitions, using triggers that provide approximately equal coverage of the UI exhaustee population.

1. Three-Month Average, Seasonally Adjusted TUR (Three-Month SATUR)

This trigger definition is included in the amendments to the regular EB program enacted in July 1992 as the Unemployment Compensation Amendments of 1992. Under that legislation, states can choose to use this TUR-based trigger definition beginning in March 1993.

Specifically, this trigger is defined as the average of the most recent three months of the seasonally adjusted TUR available in a state.¹ If this average equals or exceeds 6.5 percent and the rate is greater than or equal to 110 percent of the average rate for the corresponding three-month period in the two preceding calendar years, extended benefits trigger on in the state.²

In our analysis we used the 6.5 percent rate with the 110 percent threshold. We also used a 6.5 percent rate without the threshold, an 8.5 percent rate without the threshold, a 9.5 percent rate with

¹Monthly TUR data are available from the BLS, with a lag of approximately one and a half months, so the TUR for May becomes available in mid-July. However, since we had data by month, we assumed for simplicity that the actual lag was only one month. For example, we used the average for March, April, and May to compute the three-month seasonally adjusted TUR applicable in July. We used a similar assumption for the six-month TUR-based trigger definition.

²Claimants receive an entitlement of 50 percent of their regular UI entitlement, up to a maximum of 13 weeks. If the trigger rate exceeds 8 percent, the entitlement is 80 percent of the regular UI entitlement, up to 20 weeks.

a threshold, and a combination of 7.5 percent with the threshold and 9.5 percent without it (in this case a state triggers EB if either condition holds). These additional triggers were chosen to examine the coverage and distributional effects of the threshold and to compare the TUR-based triggers and IUR-based triggers, while holding the level of coverage constant.

2. Six-Month Average, Nonseasonally Adjusted TUR (Six-Month TUR)

This trigger, which was used in the EUC program, is the six-month average of the most recent six months of the nonseasonally adjusted TUR available. For comparison with the three-month seasonally adjusted TUR, we used 6.5 percent with and without a 110 percent threshold and 8.5 percent without the threshold.

3. Insured Unemployment Rate (IUR)

This trigger is the 13-week moving average of the weekly IUR used in the existing EB program. We used 4 and 5 percent triggers with and without the 120 percent threshold used in the EB program. For comparison with the TUR-based triggers, we also used a 1.5 percent rate with the 120 percent threshold and a combination of 3 percent with the threshold and 4.5 percent without it.

4. Adjusted Insured Unemployment Rate (Adjusted IUR)

This trigger is the adjusted IUR used in the EUC program. It adds a component to the weekly IUR to account for exhaustions in the most recent three months. This component equals three months of exhaustions divided by covered employment.³ On average this component adds approximately one percentage point to the IUR. As with the IUR, we used 4 and 5 percent triggers with and without the 120 percent threshold.

³We did not have enough detail to compute this number for the entire analysis period, so we computed a quarterly exhaustion factor and added it to the IUR for each time period. We used a lag of one quarter for this adjustment.

B. COVERAGE OF ALTERNATIVE EXTENDED BENEFITS TRIGGERS

Table II.1 shows coverage under each of the triggers we analyzed. The first measure--time extended benefits (EB) are available--shows, for each trigger, the mean of the on-off indicator variable described in Chapter I.⁴ This mean is interpreted as the proportion of time EB would have been available in the average state during the 1980s. For example, the first row in the table indicates that EB would have been available 24 percent of the time in the 1980s if the EB program used a three-month seasonally adjusted TUR with a 6.5 percent trigger rate and a 110 percent threshold.

Because this measure treats each state and each time period as equally important, Table II.1 also includes weighted measures of coverage estimates, where the weights are exhaustees, the unemployed, job losers, and the long-term unemployed (27 or more weeks of unemployment). These measures give greater weight to states and time periods in which the numbers of exhaustees, the unemployed, job losers, or the long-term unemployed were greater than average. For exhaustees, the estimates indicate the proportion of exhaustees who live in states that would have been on EB. For the other measures, the estimates show the proportion of the unemployed, job losers, or the long-term unemployed who live in states that would have been on EB.

Examination of the data in Table II.1 leads to three general conclusions:

- First, all of the triggers tend to direct extended benefits toward exhaustees and the unemployed. That is, coverage rates are higher when measured for exhaustees, the unemployed, job losers, or the long-term unemployed, as compared with coverage rates measured in terms of time.
- Second, thresholds have a major impact on coverage. With TUR-based triggers, removing the threshold doubles the time EB would be available. With IUR-based triggers, removing the threshold more than doubles the time EB would be available.⁵

⁴We use EB here and in the remainder of this report to refer to an extended benefits program that would, like the permanent EB program, trigger on automatically.

⁵Changes in the level of the threshold also affect coverage, but to a lesser degree than does imposition of a threshold. For example, using a 120 percent threshold for the 6.5 percent three-month SATUR trigger would reduce the time EB is available to 18 percent as compared to 24 percent with a 110 percent threshold. A 100 percent threshold would increase the time EB is available to 30.6 percent.

TABLE II.1
 COVERAGE OF THE UNEMPLOYED UNDER ALTERNATIVE EB TRIGGERS
 1980-1991

Triggers	Percentage of:				
	Time EB Available	Exhaustees in States on EB	Unemployed in States on EB	Job Losers in States on EB	Long-Term Unemployed in States on EB
TUR-Based Triggers					
3-Month Average Seasonally Adjusted TUR					
6.5%, with 110% threshold	24.0	37.4	32.1	35.8	39.5
6.5%, without threshold	51.9	67.4	65.8	68.2	76.2
8.5%, without threshold	23.7	33.1	32.3	34.0	44.0
9.5% with 110% threshold	8.5	15.8	13.9	16.0	21.2
7.5% with 110% threshold, or 9.5% without threshold	24.8	36.6	34.0	36.0	43.9
6-Month Average Nonseasonally Adjusted TUR					
6.5%, with 110% threshold	23.5	36.6	31.6	35.3	40.0
6.5%, without threshold	51.8	66.7	65.1	67.3	75.9
8.5%, without threshold	23.4	32.3	31.9	33.3	43.7
IUR-Based Triggers					
Insured Unemployment Rate					
1.5%, with 120% threshold	22.8	31.5	26.1	28.8	26.8
4%, with 120% threshold	8.9	16.1	12.4	14.6	15.5
4%, without threshold	22.9	32.8	27.9	29.9	34.2
5%, with 120% threshold	4.6	9.2	7.1	8.6	10.2
5%, without threshold	11.4	17.0	14.3	15.2	19.0
3%, with 120% threshold, or 4.5% without threshold	24.5	34.4	28.3	30.5	32.9
Adjusted Insured Unemployment Rate					
2%, with 120% threshold	24.1	34.0	28.0	31.0	30.0
4%, with 120% threshold	15.6	25.6	19.7	22.7	23.6
4%, without threshold	41.4	57.7	50.7	54.0	59.4
5%, with 120% threshold	11.1	19.9	14.6	17.7	19.6
5%, without threshold	25.9	37.5	31.4	33.8	38.9

- Third, coverage rates measured for exhaustees, the unemployed, job losers, or the long-term unemployed are generally higher for TUR-based triggers than for IUR-based ones providing similar coverage measured in terms of time.

More specific findings are that:

- The coverage provided by the three-month SATUR and the six-month TUR triggers is almost identical when the same trigger rates are used.⁶
- The 6.5 percent three-month SATUR trigger is substantially more generous than either the IUR or the adjusted IUR when trigger rates for these measures are set at 4 or 5 percent. These TUR and IUR trigger rates were used in recent legislation.
- A very low IUR (1.5 percent with a threshold) is needed to match the coverage provided by the 6.5 percent SATUR with a threshold. Conversely, a high SATUR trigger rate (9.5 percent with a threshold) is needed to match the coverage provided by a 4 percent IUR trigger rate with a threshold.
- Because the adjusted IUR adds a factor to the IUR to account for exhaustions it provides greater coverage than the IUR, at a given trigger level. While this increase in coverage is substantial, a low adjusted IUR trigger level (2 percent with a threshold) would still be needed to match the coverage provided by the 6.5 percent SATUR with a threshold.
- The combination of a 7.5 percent SATUR with a threshold and 9.5 percent without a threshold would provide approximately the same coverage as the 6.5 percent SATUR with a threshold. A similar level of coverage would be provided by the combination of a 3 percent IUR with a threshold and 4.5 percent without one.

C. LABOR MARKET PERFORMANCE OF ALTERNATIVE EB TRIGGERS

Previous analyses of IUR-based triggers have used the TUR to examine the distribution of extended benefits to high or low unemployment rate areas. Because this analysis includes TUR-based triggers, however, we did not want to use the TUR as a yardstick for measuring performance. Instead we developed several alternative measures of labor market strength that focus on changes in labor market conditions in the previous year (Table II.2). For example, the annual employment change variable equals employment in the current quarter divided by employment in the same quarter a year

⁶Additional analyses of a three-month average TUR trigger (not reported in the table) showed that this trigger also provided the same coverage as the six-month TUR and the three-month SATUR.

TABLE II.2
LABOR MARKET MEASURES
1980-1991

Measure	Mean	Standard Deviation	Points on Distribution	
			33 Percent	67 Percent
Annual Employment Change	1.014	.027	1.003	1.025
Annual Manufacturing Employment Change	0.996	.048	0.978	1.016
Annual Unemployment Change	1.050	.233	0.929	1.115
Annual Job Losers Change	1.090	.327	0.905	1.169
Annual Long-Term Unemployment Change	1.202	.711	0.832	1.248
Annual UI Exhaustion Rate Change	1.080	.905	0.913	1.072
Long-Term Unemployment as Percentage of Total Unemployment	0.128	.058	0.097	0.142
UI Exhaustion Rate	0.332	.146	0.265	0.378

NOTE: The employment, manufacturing employment, unemployment, and exhaustion rate variables are based on quarterly estimates, while the job losers and long-term unemployment variables are based on annual averages because they are measured less precisely than the other variables. The change variables represent the value in the current quarter (or the most recent four-quarter average), divided by the value for the same period one year earlier.

earlier. A value greater than one indicates employment growth; a value lower than one indicates a decline in employment. Similar variables were computed for manufacturing employment, unemployment, job losers, long-term unemployment, and the exhaustion rate.⁷ In general these variables are used to examine how well each trigger targets benefits to states and time periods in which labor market conditions are worsening, as compared with the previous year.

We also used two variables that focus on the duration of contemporaneous unemployment--long-term unemployment as a percentage of total unemployment and the UI exhaustion rate. These measures are used to examine targeting to the long-term unemployed.

Tables II.3 through II.6 present the results of this analysis. The first two tables show the distribution of extended benefits to eligible exhaustees by labor market measure.⁸ For example, the upper left hand block of Table II.3 shows that 67 percent of the *exhaustees who would have been eligible for EB* under the three-month SATUR with a 6.5 percent trigger and a threshold were from states and time periods in which employment change was in the lowest third of the distribution. These periods represent stagnant to declining employment.

The next two tables (Tables II.5 and II.6) examine *exhaustees in states with poor labor markets* (e.g., low employment change or high unemployment change) and report the proportion who would have been eligible for extended benefits. The data in Table II.5 show that 63 percent of the exhaustees from states in which employment change was in the lowest third would have been eligible for EB, if we used a 6.5 percent SATUR with a threshold.

Comparisons among triggers are complicated by the fact that a change in trigger rates or definitions alters the amount of benefits available, which leads to changes in the distribution of benefits. For example, if we remove the threshold for the 6.5 percent SATUR, 78 percent

⁷Annual averages were used for the job loser and long-term unemployment variables to account for the fact that these variables are measured less precisely than the others.

⁸Eligible exhaustees reside in states that would have been on EB when the exhaustees depleted regular UI.

TABLE II.3

EXHAUSTIVES IN STATES WITH EB: DISTRIBUTION BY
 SELECTED LABOR MARKET MEASURES,
 TUR-BASED TRIGGERS
 1980-1991
 (Percentage)

	Three-Month SATUR					Six-Month TUR		
	6.5% with 110% Threshold	6.5% Without Threshold	8.5% Without Threshold	9.5% with 110% Threshold	7.5% with Threshold, or 9.5% Without Threshold	6.5% with 110% Threshold	6.5% Without Threshold	8.5% Without Threshold
Annual Employment Change								
Lowest Third	67.4	46.4	56.5	76.2	61.0	66.3	45.7	52.7
Middle Third	23.8	28.9	24.0	16.1	23.5	22.3	28.7	23.7
Highest Third	8.9	24.7	19.6	7.7	15.5	11.4	25.5	23.6
Annual Manufacturing Employment Change								
Lowest Third	78.9	53.0	62.1	79.4	69.5	76.4	51.5	58.5
Middle Third	15.6	25.8	18.1	14.1	16.1	15.9	26.4	23.7
Highest Third	5.4	21.1	19.8	6.4	14.4	7.7	22.0	17.8
Annual Unemployment Change								
Lowest Third	6.5	25.8	24.1	10.3	16.3	10.3	27.5	28.3
Middle Third	22.1	29.4	24.7	21.9	23.3	22.7	29.5	24.7
Highest Third	71.4	44.8	51.2	67.8	60.4	67.0	43.1	47.0
Annual Job Losers Change								
Lowest Third	0.4	21.8	14.9	0.7	7.5	0.5	23.0	17.7
Middle Third	15.2	27.4	22.7	17.8	18.5	18.1	27.7	22.8
Highest Third	84.4	50.7	62.4	81.5	74.0	81.4	49.3	59.5

TABLE II.3 (continued)

	Three-Month SATUR					Six-Month TUR		
	6.5% with 110% Threshold	6.5% Without Threshold	8.5% Without Threshold	9.5% with 110% Threshold	7.5% with Threshold, or 9.5% Without Threshold	6.5% with 110% Threshold	6.5% Without Threshold	8.5% Without Threshold
Annual Long-Term Unemployment Change								
Lowest Third	0.5	20.1	11.2	0.2	4.3	0.4	21.0	12.6
Middle Third	17.3	27.8	22.6	16.7	21.4	15.5	27.3	22.7
Highest Third	82.2	52.1	66.2	83.1	74.3	84.1	51.7	64.7
Annual UI Exhaustion Rate Change								
Lowest Third	15.1	24.7	26.8	20.9	22.1	18.2	25.7	29.7
Middle Third	19.4	30.1	24.1	20.2	22.3	19.7	30.7	25.5
Highest Third	65.5	45.3	49.0	58.9	55.6	62.1	43.6	44.7
Long-Term Unemployment as Percentage of Total Unemployment								
Lowest Third	10.9	9.6	2.2	1.9	11.4	8.5	8.3	2.2
Middle Third	33.9	32.4	21.6	14.3	25.0	32.9	32.5	18.8
Highest Third	55.2	58.0	76.2	83.8	63.6	58.6	59.2	79.0
UI Exhaustion Rate								
Lowest Third	11.4	13.5	11.0	8.5	5.4	11.5	14.3	12.3
Middle Third	25.6	32.0	26.9	24.6	29.7	25.7	31.8	26.6
Highest Third	62.9	54.5	62.1	66.8	64.9	62.8	53.9	61.1

TABLE II.4

EXHAUSTEES IN STATES WITH EB: DISTRIBUTION BY
 SELECTED LABOR MARKET MEASURES,
 IUR-BASED TRIGGERS
 1980-1991
 (Percentage)

	Insured Unemployment Rate						Adjusted Insured Unemployment Rate				
	1.5% with 120% Threshold	4.0% with 120% Threshold	4.0% Without Threshold	5.0% with 120% Threshold	5.0% Without Threshold	3% with 120% Threshold, or 4.5% Without Threshold	2% with 120% Threshold	4.0% with 120% Threshold	4.0% Without Threshold	5.0% with 120% Threshold	5.0% Without Threshold
Annual Employment Change											
Lowest Third	70.9	83.1	65.9	84.3	73.8	69.9	70.0	77.1	52.4	81.8	62.7
Middle Third	23.7	14.1	22.4	12.3	16.4	21.5	23.9	19.8	26.6	15.1	23.1
Highest Third	5.4	2.8	11.7	3.3	9.8	8.7	6.1	3.1	21.0	3.0	14.2
Annual Manufacturing Employment Change											
Lowest Third	87.6	91.3	74.1	91.2	82.1	81.7	86.6	89.6	59.2	85.7	57.7
Middle Third	11.4	18.1	16.8	8.1	10.2	12.8	11.7	9.5	24.7	10.7	22.0
Highest Third	1.0	0.6	9.0	0.8	7.7	5.5	1.7	0.9	16.2	3.7	20.3
Annual Unemployment Change											
Lowest Third	1.1	0.0	12.9	0.0	7.1	7.2	1.5	0.6	22.3	0.3	16.9
Middle Third	14.1	11.4	25.5	15.7	24.7	19.6	16.8	13.2	27.2	13.5	24.0
Highest Third	84.6	88.6	61.6	84.3	68.2	73.2	81.7	86.2	50.4	86.2	59.1
Annual Job Losers Change											
Lowest Third	0.1	0.1	7.1	0.0	3.0	2.7	0.1	0.0	17.0	0.1	7.8
Middle Third	11.3	7.1	22.0	9.8	19.7	17.2	10.3	7.3	26.9	6.7	23.0
Highest Third	88.5	92.8	70.8	90.2	77.3	80.0	89.6	92.7	56.2	93.2	69.2

TABLE II.4 (continued)

	Insured Unemployment Rate						Adjusted Insured Unemployment Rate				
	1.5% with 120% Threshold	4.0% with 120% Threshold	4.0% Without Threshold	5.0% with 120% Threshold	5.0% Without Threshold	3% with 120% Threshold, or 4.5% Without Threshold	2% with 120% Threshold	4.0% with 120% Threshold	4.0% Without Threshold	5.0% with 120% Threshold	5.0% Without Threshold
Annual Long-Term Unemployment Change											
Lowest Third	1.3	0.2	9.1	0.3	2.4	3.4	1.1	0.4	16.7	0.1	8.0
Middle Third	21.8	16.4	25.4	11.5	24.1	24.3	18.2	14.2	27.2	11.5	24.0
Highest Third	76.9	83.4	65.5	88.2	73.5	72.2	80.7	85.4	56.1	88.3	68.0
Annual UI Exhaustion Rate Change											
Lowest Third	7.1	7.1	16.5	10.0	17.8	12.3	8.5	7.9	21.2	7.6	19.5
Middle Third	11.6	10.2	22.4	12.2	19.9	18.0	13.4	12.6	28.0	12.6	23.5
Highest Third	81.3	82.7	61.1	77.8	62.3	69.7	78.1	79.5	50.9	79.8	57.0
Long-Term Unemployment as Percentage of Total Unemployment											
Lowest Third	24.6	11.5	10.2	4.3	6.4	15.4	22.7	16.1	11.2	9.5	8.7
Middle Third	41.3	36.4	30.0	26.3	22.0	33.1	38.6	35.4	33.3	32.9	29.9
Highest Third	34.1	52.1	59.7	69.4	71.6	51.5	38.7	48.5	55.5	57.6	61.4
UI Exhaustion Rate											
Lowest Third	12.7	8.5	7.6	6.5	7.5	10.8	12.9	11.2	11.5	9.4	8.9
Middle Third	23.5	18.3	27.2	14.9	23.1	24.8	24.6	23.0	30.5	22.4	27.0
Highest Third	63.8	73.2	65.2	78.6	69.4	64.5	62.5	65.8	58.0	68.2	64.1

TABLE II.5
 EXHAUSTEES IN STATES WITH SELECTED LABOR MARKET CONDITIONS:
 PERCENTAGE ELIGIBLE FOR EB,
 TUR-BASED TRIGGERS
 1980-1991

	Three-Month SATUR					Six-Month TUR		
	6.5% with 110% Threshold	6.5% Without Threshold	8.5% Without Threshold	9.5% with 110% Threshold	7.5% with 110% Threshold, or 9.5% Without Threshold	6.5% with 110% Threshold	6.5% Without Threshold	8.5% Without Threshold
Annual Employment Change, Lowest Third	62.8	78.2	46.4	30.0	55.1	61.0	76.0	42.3
Annual Manufacturing Employment Change, Lowest Third	63.8	77.5	44.3	27.2	54.4	61.0	74.2	40.7
Annual Unemployment Change, Highest Third	66.6	75.8	42.4	26.7	54.8	61.7	71.7	37.9
Annual Job Losers Change, Highest Third	74.7	80.1	47.2	30.3	61.6	71.0	76.7	43.9
Annual Long-Term Unemployment Change, Highest Third	74.2	83.9	51.0	31.5	63.1	74.8	82.0	48.7
Annual UI Exhaustion Rate Change, Highest Third	57.7	72.2	38.2	21.9	47.5	54.0	68.5	34.1
Long-Term Unemployment as a Percentage of Total Unemployment, Highest Third	47.4	88.9	55.9	30.2	47.7	49.6	89.4	56.5
UI Exhaustion Rate, Highest Third	49.1	78.1	42.3	22.4	52.5	48.4	75.1	40.6

TABLE II.6

EXHAUSTEES IN STATES WITH SELECTED LABOR MARKET CONDITIONS:
 PERCENTAGE ELIGIBLE FOR EB.
 IUR-BASED TRIGGERS
 1980-1991

	Insured Unemployment Rate					Adjusted Insured Unemployment Rate					
	1.5% with 120% Threshold	4.0% with 120% Threshold	4.0% Without Threshold	5.0% with 120% Threshold	5.0% Without Threshold	3% with 120% Threshold, or 4.5% Without Threshold	2% with 120% Threshold	4.0% with 120% Threshold	4.0% Without Threshold	5.0% with 120% Threshold	5.0% Without Threshold
Annual Employment Change, Lowest Third	56.2	33.3	53.7	19.0	29.9	60.2	59.1	48.9	75.7	39.5	58.5
Annual Manufacturing Employment Change, Lowest Third	60.2	31.8	52.2	17.9	28.7	61.1	63.2	49.4	74.0	28.5	45.5
Annual Unemployment Change, Highest Third	67.1	35.6	50.3	19.1	27.7	63.4	69.1	54.8	73.0	41.6	55.2
Annual Job Losers Change, Highest Third	66.6	35.1	52.9	19.1	28.2	63.8	72.0	55.9	75.7	42.6	59.5
Annual Long-Term Unemployment Change, Highest Third	58.9	32.2	49.8	19.0	27.3	58.7	66.1	52.4	77.0	41.2	59.5
Annual UI Exhaustion Rate Change, Highest Third	60.9	31.4	47.0	16.6	23.9	57.0	62.3	47.7	69.4	36.4	50.2
Long-Term Unemployment as a Percentage of Total Unemployment, Highest Third	24.9	19.1	43.3	14.3	25.3	39.8	30.2	28.3	72.6	25.6	51.2
UI Exhaustion Rate, Highest Third	42.4	24.6	44.5	14.9	23.6	64.5	44.2	35.0	70.3	27.6	50.1

(Table II.5) of exhaustees from states in which employment change was in the lowest third would have been eligible for extended benefits, compared with 63 percent with the threshold. However, only 46 percent of the benefits (Table II.3) would have gone to states and time periods in which employment change was in the lowest third, compared with 67 percent with the threshold. As shown in Table II.1, however, dropping the threshold would double the coverage provided under the program. We can expect a larger program to cover more individuals but to target benefits more poorly than a smaller program.

For this reason, it is important to compare triggers and trigger rates that provide approximately equal coverage. Our analysis focuses on triggers that would provide EB coverage about one-fourth of the time. These triggers include:

- A 6.5 percent three-month average SATUR with a threshold
- A 8.5 percent three-month SATUR without a threshold
- A combination of a 7.5 percent SATUR with a threshold and a 9.5 percent SATUR without a threshold
- A 6.5 percent six-month average TUR with a threshold
- A 1.5 percent IUR with a threshold
- A 4 percent IUR without a threshold
- A combination of a 3 percent IUR with a threshold and a 4.5 percent IUR without a threshold
- A 2 percent adjusted IUR with a threshold

Comparisons of these triggers show that the three-month SATUR trigger with a threshold does a better job of directing benefits to states and time periods in which the labor market is worsening (as compared with the previous year) than the comparable three-month SATUR trigger without a threshold. However, the trigger without a threshold is better at directing benefits to states and time

periods with high current rates of long-term unemployment. A comparison of IUR triggers with and without a threshold leads to the same conclusion.⁹

As one would expect, the performance of the SATUR and IUR triggers that trigger extended benefits when either of two rates is satisfied--a lower rate with a threshold and a higher rate without a threshold--falls between that of the comparable triggers with and without thresholds. The combination triggers are not as successful at directing benefits to states and time periods in which the labor market is worsening than the comparable SATUR and IUR triggers with a threshold. However, the combination triggers perform better on this dimension than do the triggers without a threshold. The performance of the combination triggers on directing benefits to states and time periods with high current rates of long-term unemployment also falls between the performance of triggers with and without thresholds.

There are almost no distributional differences between the three-month SATUR and the six-month TUR. Because they provide similar coverage, we can conclude that these two triggers are almost identical.¹⁰ The performance of the comparable IUR and adjusted IUR triggers is also quite similar.

Finally, a comparison of the comparable SATUR and IUR triggers shows that the SATUR performs better than the IUR along some dimensions, while the IUR performs better along others. More specifically, the SATUR does a better job of directing benefits to states and time periods with high current long-term unemployment (Tables II.3 and II.4), but the IUR does a better job at directing benefits to states and time periods that are experiencing a worsening of the labor market. If we examine the percentage of exhaustees eligible for EB in states and time periods with poor labor market conditions (Tables II.5 and II.6), we find that the 6.5 percent SATUR trigger performs better

⁹These conclusions holds for the analyses in Tables II.3, II.4, II.5, and II.6.

¹⁰A separate analysis shows that for the 6.5 percent trigger rate, the two measures agree 95 percent of the time. In 5 percent of the state/quarter observations, one trigger is on and the other is not.

than the 1.5 percent IUR trigger on all measures. However, this finding probably arises because, while both triggers provide benefits about one-fourth of the time, the SATUR trigger provides coverage to about 37 percent and the IUR trigger provides coverage to only 32 percent of exhaustees. For the comparable triggers (the 9.5 percent SATUR with a threshold and the 4 percent IUR with a threshold) providing EB coverage about 9 percent of the time to the same percentage of exhaustees (16 percent), the IUR performs better than the SATUR for some measures showing the percentage of exhaustees eligible for EB, while the SATUR performs better for others.

D. PERFORMANCE OF ALTERNATIVE EB TRIGGERS DURING BUSINESS CYCLE STAGES

Another way to compare alternative EB triggers is to consider how well they perform at different stages of the business cycle. Do extended benefits become available when economic conditions worsen and when unemployment is high?

To address these questions, Table II.7 shows the percentage of exhaustees who would have been eligible for EB when the national seasonally adjusted TUR was rising and when it was greater than 6.5 percent. These estimates are for the triggers that would provide EB coverage about 25 percent of the time (we did not include the six-month TUR because it was identical to the comparable three-month SATUR). We also include the SATUR and IUR triggers that provide EB coverage about 9 percent of the time, since these triggers provide equal coverage to exhaustees.

The estimates in Table II.7 show that all of the triggers provide substantially higher coverage when the national TUR is increasing than when it is decreasing, and that all of the triggers provide substantially higher coverage when the national TUR is high (6.5 percent or higher) than when it is low (under 6.5 percent). Comparisons among the various triggers also show that:

- Thresholds direct benefits to periods in which the national TUR is increasing. In most cases thresholds also appear to direct benefits to periods with a high national TUR.
- No clear pattern emerges for comparable SATUR and IUR triggers. In some cases the SATUR trigger appears to perform better; in other cases the IUR trigger is the better performer.

TABLE II.7

PERCENTAGE OF EXHAUSTEES ELIGIBLE FOR EB UNDER
ALTERNATIVE EB TRIGGERS, BY NATIONAL TUR
1980-1991

	National TUR				Total
	Increasing	Decreasing	Greater Than or Equal to 6.5%	Less than 6.5%	
TUR-Based Triggers					
Three-Month Average Seasonally Adjusted TUR					
6.5%, with 110% threshold	63.6	10.6	48.9	2.7	37.4
8.5%, without threshold	39.6	26.5	41.2	9.0	33.1
9.5%, with 110% threshold	25.7	5.7	21.0	0.1	15.8
7.5%, with 110% threshold, or 9.5% without threshold	52.4	20.0	46.3	6.5	36.6
IUR-Based Triggers					
Insured Unemployment Rate					
1.5%, with 120% threshold	56.5	6.7	38.0	13.2	31.5
4%, with 120% threshold	30.4	1.6	20.9	1.8	16.1
4%, without threshold	51.6	13.4	40.4	9.4	32.8
3%, with 120% threshold, or 4.5% without threshold	60.2	8.7	43.8	7.6	34.4
Adjusted Insured Unemployment Rate					
2%, with 120% threshold	60.0	7.3	41.3	11.7	34.0

NOTE: The national seasonally adjusted TUR is used to classify time periods.

E. SEASONAL PERFORMANCE OF ALTERNATIVE EB TRIGGERS

Chapter I stated that the permanent EB program has exhibited a seasonal pattern because the IUR is not seasonally adjusted and because UI claims tend to rise in the winter. As a result benefits have triggered on in the first calendar quarter and off in the second or third quarter. Because it seems desirable to provide equal extended benefits coverage to UI exhaustees, regardless of the season in which they exhaust benefits, this pattern may be producing an inequitable distribution of EB benefits. However, this conclusion is not necessarily accurate because the number of exhaustees also exhibits a seasonal pattern matching the availability of EB (that is, there are more exhaustees in the second quarter than in other quarters).

To examine this issue further, Table II.8 estimates the percentage of exhaustees eligible for EB by quarter for the set of alternative triggers. These data show that the IUR trigger closest to the one used in the permanent EB program (the 4 percent trigger with a 120 percent threshold) does indeed exhibit some seasonal variation in coverage. The proportion of exhaustees eligible for EB is highest in the second quarter and lowest in the third quarter. The difference in coverage is substantial (exhaustees in the second quarter are almost twice as likely as those in the third quarter to be covered by EB). An even more pronounced seasonal pattern occurs for the 4 percent IUR trigger without a threshold. Interestingly, the seasonal patterns for the 1.5 percent IUR trigger with a threshold and the 2 percent adjusted IUR trigger with a threshold are less pronounced and somewhat different (the highest coverage rate for both of these triggers occurs in the fourth quarter). Nevertheless the TUR-based triggers show the least seasonal variation in their coverage of exhaustees, which makes sense because these triggers are based on seasonally adjusted unemployment rates.

TABLE II.8
 PERCENTAGE OF EXHAUSTEES ELIGIBLE FOR EB UNDER
 ALTERNATIVE EB TRIGGERS, BY QUARTER
 1980-1991

Triggers	Quarter				Total
	1	2	3	4	
TUR-Based Triggers					
Three-Month Average Seasonally Adjusted TUR					
6.5%, with 110% threshold	35.2	37.1	40.3	37.1	37.4
8.5%, without threshold	32.1	32.9	33.4	34.3	33.1
9.5%, with 110% threshold	14.0	15.8	17.2	16.3	15.8
7.5%, with 110% threshold, or 9.5% without threshold	35.8	35.8	37.9	35.9	36.6
IUR-Based Triggers					
Insured Unemployment Rate					
1.5%, with 120% threshold	28.8	31.3	30.6	36.9	31.5
4%, with 120% threshold	17.3	20.9	11.8	13.9	16.1
4%, without threshold	40.8	44.2	24.3	19.8	32.8
3%, with 120% threshold, or 4.5% without threshold	41.1	40.2	29.3	27.4	34.4
Adjusted Insured Unemployment Rate					
2%, with 120% threshold	30.5	33.2	34.8	37.4	34.0

F. REGIONAL PERFORMANCE OF ALTERNATIVE EB TRIGGERS

Estimates of the percentage of exhaustees eligible for EB by region of the country are reported in Table II.9 for our set of alternative triggers. These estimates show considerable variation among regions in the percentages of exhaustees who are eligible for EB. This variation is expected, however, because economic conditions differ by region over the analysis period (the past decade). As shown in the table, Region 5 (IL, IN, MI, MN, OH, WI) had the highest average unemployment rate during the period.¹¹ Region 10 (AK, ID, OR, WA) also had a high unemployment rate. Region 1 (CT, ME, MA, NH, RI) had the lowest unemployment rate.

Given this situation it is not surprising that, for the TUR-based triggers, a greater percentage of exhaustees would have been eligible for EB in Region 5 than in other regions. With the exception of the 6.5 percent trigger with a threshold, Region 10 would have had the next highest eligibility rate, and Region 1 the lowest. For the 6.5 percent rate, the pattern of eligibility among regions appears more similar than the pattern for the other TUR-based triggers.

With the exception of the 1.5 percent trigger with a threshold and the 2 percent adjusted IUR trigger with a threshold, the IUR triggers would have provided the highest rates of coverage in Region 10 and the next highest in Region 5. However, for the 1.5 percent IUR and 2 percent adjusted IUR triggers, the highest rates of coverage would have occurred in Region 1, the region with the lowest average TUR during the analysis period. For the IUR triggers the lowest rates of eligibility would have occurred in Region 2 or Region 8 (CO, MT, ND, SD, UT, WY), depending on the trigger used.

¹¹We used a weighted average unemployment rate, where the number of exhaustees was used for weighting, to account for the differences in size among states. In unweighted estimates, Regions 2 and 10 have the highest average unemployment rates because of the high unemployment rates in Puerto Rico and Alaska, respectively.

TABLE II.9

PERCENTAGE OF EXHAUSTEES ELIGIBLE FOR EB UNDER ALTERNATIVE EB TRIGGERS,
BY REGION
1980-1991

	Region										Total	
	1	2	3	4	5	6	7	8	9	10		
TUR-Based Triggers												
Three-Month Average Seasonally Adjusted TUR												
6.5%, with 110% threshold	34.3	20.5	40.9	38.1	48.5	39.1	33.4	33.8	35.4	35.9	37.4	
8.5%, without threshold	12.2	21.4	33.2	29.6	56.2	39.0	13.8	10.5	20.4	51.7	33.1	
9.5%, with 110% threshold	1.8	1.4	19.8	15.7	30.1	11.7	6.5	2.0	15.6	23.1	15.8	
7.5%, with 110% threshold, or 9.5% without threshold	18.8	23.0	38.0	37.9	51.9	45.8	22.0	21.9	25.8	48.2	36.6	
IUR-Based Triggers												
Insured Unemployment Rate												
1.5%, with 120% threshold	37.6	21.4	34.4	33.6	31.5	37.3	28.6	29.1	34.8	29.9	31.5	
4%, with 120% threshold	15.7	4.3	20.0	12.2	23.6	11.2	10.3	8.6	20.1	26.0	16.1	
4%, without threshold	30.3	30.9	41.2	21.3	45.0	19.5	19.3	17.6	26.0	71.9	32.8	
3%, with 120% threshold or, 4.5% without threshold	35.8	30.1	43.5	24.7	44.3	21.6	27.3	21.6	31.9	66.5	34.4	
Adjusted Insured Unemployment Rate												
2%, with 120% threshold	41.3	20.5	37.2	35.4	37.8	41.1	29.3	32.3	31.3	33.5	34.0	
Mean SATUR ^a	6.1	7.7	8.0	7.7	9.2	8.2	6.5	6.5	7.3	8.7		

NOTE: The regions include the following states: Region 1: CT, ME, MA, NH, RI; Region 2: NJ, NY, PR; Region 3: DE, DC, MD, PA, VA, WV; Region 4: AL, FL, GA, KY, MS, NC, SC, TN; Region 5: IL, IN, MI, MN, OH, WI; Region 6: AR, LA, NM, OK, TX; Region 7: IA, KS, MO, NE; Region 8: CO, MT, ND, SD, UT, WY; Region 9: AZ, CA, HI, NV; and Region 10: AK, ID, OR, WA.

^aThe mean SATUR is weighted by the number of exhaustees.

III. FACTORS AFFECTING THE AVAILABILITY OF EXTENDED BENEFITS

In this chapter we examine the effects of economywide and state-specific factors on the availability of extended UI benefits. More specifically, Congress raised two issues concerning the availability of extended benefits:

- How has the shift from a manufacturing economy to a service economy affected the availability of extended benefits?
- How have state UI eligibility criteria affected the availability of extended benefits?

In addition to these two questions, we also examine how differences in the generosity of state unemployment insurance (UI) benefits affect the availability of extended benefits.

We address these questions by focusing on the effect these factors had on the IUR during the 1980s, because the IUR was used during that period as a trigger for extended benefits. We then examine the effects of changes in these variables on the magnitude of the IUR, and consequently its implications for the availability of extended benefits.

We find that, in the 1980s, the proportion of unemployment in manufacturing had no significant effect on the IUR, while the proportion of unemployment in construction had a positive and significant effect on the IUR. Further, as expected, more restrictive state eligibility criteria tended to have a negative and statistically significant effect on the IUR, while state benefit generosity had a positive and statistically significant effect on the IUR. Despite the statistical significance of these findings, the magnitude of the estimated effects of these variables on the IUR was found to be small. However, since the variables we were able to include in our analysis may not fully capture the effects on the IUR of state eligibility requirements and other factors, these findings should be viewed with some caution.

A. NATIONAL EMPLOYMENT AND UNEMPLOYMENT PATTERNS AND POTENTIAL EFFECTS ON THE IUR

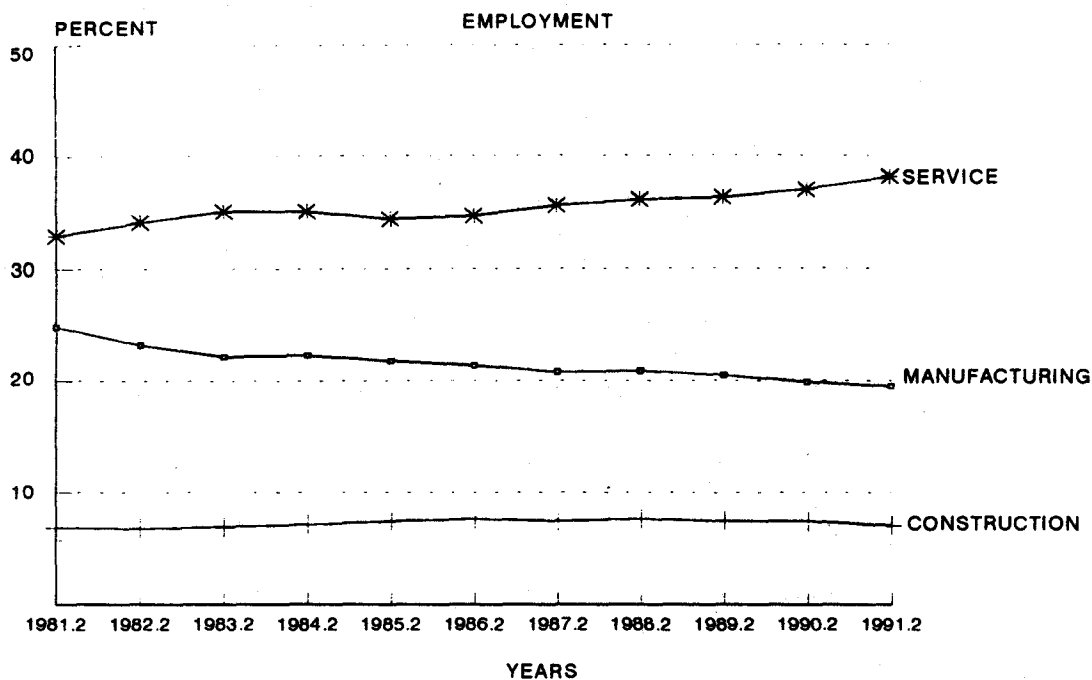
Figure III.1 shows national trends in employment and unemployment for the manufacturing, construction, and service sectors during the 1980s. Nationally, the proportion of employment in manufacturing declined during this period (from 25 percent in 1981 to just over 19 percent in 1991), while the proportion of employment in the service sector increased over this period (from 33 percent in 1981 to over 38 percent in 1991). Over the same period, the proportion of unemployment in manufacturing also decreased (from 23 percent in 1981 to 19 percent in 1991) and the proportion of unemployment in the service sector increased (from about 16 percent in 1981 to over 19 percent in 1991). The proportion of employment and unemployment in construction stayed fairly constant over this period.

There was also wide variation in the proportion of unemployment in manufacturing among states as well as in the amount of decline in the proportion of unemployment in the manufacturing sector during the 1980s. For example, in the early 1980s, over 30 percent of the unemployment in Arkansas, Connecticut, Georgia, Indiana, Michigan, Ohio, and North and South Carolina was in manufacturing, while less than 10 percent of the unemployment in Alaska, Nevada, New Mexico, North Dakota and Wyoming was in manufacturing. Some states such as Connecticut, Georgia, Illinois, and Indiana, with a high share of unemployment in manufacturing in the early 1980s experienced large reductions (about 30 to 40 percent) in manufacturing unemployment during the 1980s, while other states experienced smaller reductions. Some states, such as Montana, Nebraska, and North Dakota, experienced a slight increase during the 1980s in the proportion of unemployed in manufacturing.

We expect these differences among states and changes over time in manufacturing unemployment to affect the likelihood of UI receipt and, consequently, the IUR and the availability of extended benefits. In particular, information about UI and hence access to UI may be greater in manufacturing than in other sectors. Unions, which are more prevalent in manufacturing than in most other sectors, may provide information about UI to their members. Workers in manufacturing

FIGURE III.1

PROPORTION OF EMPLOYMENT AND UNEMPLOYMENT
IN THE MANUFACTURING, CONSTRUCTION, AND
SERVICE SECTORS



SOURCE: Employment and Earnings, Bureau of Labor Statistics, U.S. Department of Labor.

are also likely to have had previous experience with the UI system because of the temporary layoffs common to that industry. A relative decline in unemployment in manufacturing would probably cause UI claims to decline. A decline in claims will probably produce a decline in the IUR and the availability of extended benefits.

B. STATE ELIGIBILITY REQUIREMENTS AND BENEFIT GENEROSITY

Differences among states in both monetary and nonmonetary UI eligibility requirements and changes in these requirements over time are likely to affect IURs and the availability of extended benefits. For example, the ratio of the minimum base period wages required for UI eligibility to the average weekly earnings for state UI covered employment--a variable reflecting the number of weeks a worker who earns the average wage would have to work to be eligible for the minimum amount of UI--varies among states, from about one week (Alabama, Alaska, Connecticut and Florida) to over six weeks (New Hampshire, North Dakota, Oklahoma, and Virginia). This wide variation is likely to affect eligibility and state IURs. This ratio rose by half a week across all states, on average, during our observation period. This tightening of eligibility requirements is likely to have affected state IURs.

Differences among states or changes over time in benefit generosity may also affect the likelihood that an unemployed worker files for UI and may also affect IURs and the availability of extended benefits. We observe some variation among states in UI weekly benefit amounts. For example, during our observation period, the average wage replacement rate (the average UI weekly benefit amount divided by the average weekly wage) varied between 28 and 35 percent for most states. However, the average wage replacement rate (WRR) was close to 20 percent in Alaska, California, and Indiana, and close to 40 percent in Hawaii, Kansas, and Montana. Potential duration of benefits also exhibited wide variation, with some states providing 26 weeks of benefits to all UI claimants and others providing amounts that vary with the amount of base period wages.

There is also some evidence of a decrease in benefit generosity over the past decade. On average, the wage replacement rate decreased by only a small amount. However, some states, such as Connecticut, Illinois, and Indiana experienced a significant decrease in the WRR (between 10 to 30 percent) while other states, such as Kansas and Michigan, experienced a slight increase in the WRR. There was also a decrease of about three-quarters of a week in the maximum duration of benefit receipt. Although most states had the same maximum duration throughout the period, some with a maximum duration greater than 26 weeks in the early 1980s reduced their maximum to 26 during the 1980s.

C. ANALYTICAL METHOD AND RESULTS

We estimated a regression model in which we examined the effects of key explanatory variables on the IUR. These explanatory variables attempt to capture, either directly or indirectly, the effects of changes in eligibility requirements or benefit generosity and the shift from a manufacturing to a service economy.

1. Analytical Methodology and Key Explanatory Variables

We used simple regression estimation methods to examine the effects of key variables on the IUR, using a combination of quarterly cross-section and time-series data for all states over the period from 1981 through 1991.^{1,2} These data allow us to use variation in state UI program characteristics to identify the effects of these variables on the IUR. We also estimated a fixed-effects model by

¹We could only obtain state level data on proportion of unemployment in the manufacturing and construction sectors beginning in 1981.

²Our approach is similar to the one used by Corson and Nicholson (1988) to explore the reasons for the decline in insured relative to total employment. That study used quarterly state-level data for the period 1971 through 1986 to examine the effects on insured relative to total unemployment of labor market variables, changes in federal laws, changes in state laws, and changes in the measurement of unemployment after 1980. That study found that state administrative practices and the fraction of unemployment in manufacturing had a significant influence on the insured to total unemployment ratio. The study also found that regional shifts in unemployment contributed to the decline in the ratio.

including binary variables for states, because the IUR may vary across states for unobserved reasons, and it is unlikely that our explanatory variables can fully account for all the differences in the IUR among states.

The key explanatory variables used in the models attempt to capture the effects of state program characteristics, the shift from a manufacturing to a service economy, and variables reflecting state labor market conditions. The means and standard deviations of these variables are presented in Table III.1.

To capture the effects of changes in state eligibility requirements, we used variables based directly on eligibility requirements as well as some variables that reflect UI administrative actions. To capture changes in monetary eligibility, we used the ratio of the minimum base period wages necessary for UI eligibility (qualifying earnings) to the average weekly earnings for a state's UI covered employment. The minimum base period wages were divided by average wages to control for differences among states and time periods. The variable reflects the number of weeks a worker who earns the average wage would have to work to be eligible for UI.³

To capture nonmonetary eligibility, we use separation denial rates and nonseparation denial rates. The separation denial rate pertains to benefit denials that occur when an individual first applies for UI. For example, it includes denials for voluntary separations and misconduct. It is defined as the number of denials per 1,000 new spells of insured unemployment. The nonseparation denial rate pertains to denials that occur during the claim period--after initial eligibility for UI is established. It includes denials because the UI claimant was not able and available for work, because the claimant refused suitable work, or because the claimant did not report to the UI office when required. This rate is defined as the number of denials per 1,000 claimant contacts.

³This variable ignores the fact that, to establish eligibility, most states require earnings in more than one quarter of the base period.

TABLE III.1
 MEANS AND STANDARD DEVIATIONS OF KEY
 VARIABLES USED IN THE ANALYSIS

	Mean	Standard Deviation
IUR	3.642	1.927
TUR	6.905	2.462
Proportion Long-Term Unemployed ^a	0.134	0.065
Proportion Job Losers ^b	0.494	0.097
Qualifying Earnings/Average Wages	2.930	1.494
Separation Denial Rate	105.425	69.976
Nonseparation Denial Rate	16.232	11.842
Wage Replacement Rate	0.304	0.045
Maximum Duration	26.230	1.216
Uniform Duration Dummy	0.157	0.364
Proportion of Unemployment in Manufacturing	0.205	0.089
Proportion of Unemployment in Construction	0.120	0.038

NOTE: The means and standard deviations pertain to quarterly state-level data for the period 1981 through 1991.

^aThe proportion of long-term unemployed is the proportion who are unemployed for 27 or more weeks.

^bThe proportion job losers is the proportion of the unemployed who are job losers.

To capture state benefit generosity we used three variables. The wage replacement rate (the average weekly UI benefit for total unemployment, divided by the average weekly wage in covered employment); maximum duration (the maximum number of potential weeks of regular UI benefits available to claimants in a state); and a uniform duration dummy (a binary variable equal to one for states that provide the same potential duration of benefits to all claimants).⁴

To capture the effects of the shift from a manufacturing to a service economy, we use the proportion of unemployed in manufacturing. Data on the share of unemployment in manufacturing are unavailable at the quarterly level by state, but are available at the annual level.⁵ For purposes of this analysis, we use the state annual figure for each quarter. Similar data for the share of unemployment in construction were also used in the regressions.

In our regression models, we also included variables to capture labor market conditions in each state. We included the total unemployment rate (TUR), the proportion of the unemployed who are long-term unemployed, and the proportion of the unemployed who are job losers. As the proportion of the unemployed who are long-term unemployed increases, we would expect a decrease in the IUR, since fewer of the unemployed are eligible for UI. On the other hand, an increase in the proportion of the unemployed who are job losers is likely to increase the number collecting UI and is likely to increase the IUR.

In addition to these variables, we included binary variables for the quarter to capture seasonal effects and binary variables for each year to capture any national trend.⁶

⁴We attempted to use the proportion of claimants who are eligible for maximum duration as an explanatory variable. However, the data series for this variable had numerous missing and out of range values. Consequently we decided not to use this variable in our analysis.

⁵Data on the proportion of unemployment in manufacturing and in construction was obtained from the *Geographic Profiles of Employment and Unemployment*, Bureau of Labor Statistics, U.S. Department of Labor.

⁶We also estimated alternative specifications that exclude the yearly time variables and include a quadratic specification for time. The estimated coefficients from these alternative specifications were similar to the results presented here.

2. Results

Table III.2 contains the results of the basic regression models estimated using the cross-section time-series data. The first column contains the results of the specification with no fixed effects, while the second column presents estimates of the model with fixed effects.

The estimated coefficients show that the state labor market conditions have the expected effects and are statistically significant. Both the TUR and the proportion of job losers have a positive effect on the IUR, while an increase in the proportion of long-term unemployment lowers the IUR.⁷ These effects are fairly similar in models with and without fixed effects.

For the full period covered by the data, we found that the proportion of unemployed in manufacturing has no effect on the IUR. We re-estimated our basic model separately for the period 1981 through 1986, and for the period 1987 through 1991. Consistent with the results in Corson and Nicholson (1988), we found that the proportion of unemployment in manufacturing had a positive and significant effect on IUR in the early period. However, this variable had a negative effect on the IUR for the latter part of the 1980s, leading to the overall small and insignificant effect of the proportion of unemployment in manufacturing for the entire period.⁸ We also found that the proportion of unemployment in construction had a positive and statistically significant effect on the IUR.

The estimated effects of the eligibility requirements and benefit generosity are as expected and as found in prior research (Corson and Nicholson 1988). In general, more restrictive eligibility

⁷Given the high degree of correlation between the proportion of long-term unemployed and the proportion of job losers, we estimated alternative specifications in which we included only one of the two variables. The sign and significance of these variables stayed the same in all cases, and the magnitude of the coefficients was affected to a small extent. We also estimated models in which we included lagged TUR to control for exhaustions. As expected, the coefficient on this variable was negative and statistically significant. Further the sign and significance of the other variables were not affected by this specification.

⁸We suspect this change in the effect on the IUR of the fraction of unemployment in manufacturing over time is due to a change in the composition of manufacturing unemployment over the period.

TABLE III.2

EFFECTS OF STATE UI PROGRAM CHARACTERISTICS AND
LABOR MARKET CONDITIONS ON THE IUR
(Standard Errors in Parentheses)

	No Fixed Effects	State Fixed Effects Specification
TUR	0.506 ** (0.014)	0.530 ** (0.013)
Proportion Long-Term Unemployed	-3.307 ** (0.479)	-1.739 ** (0.337)
Proportion Job Losers	3.658 ** (0.297)	1.988 ** (0.207)
Qualifying Earnings/Average Wages	-0.065 ** (0.015)	-0.078 ** (0.020)
Separation Denial Rate	-0.0035 ** (0.0004)	0.00004 (0.0005)
Nonseparation Denial Rate	0.011 ** (0.002)	-0.014 ** (0.002)
Wage Replacement Rate	2.398 ** (0.510)	6.346 ** (0.677)
Maximum Duration	0.105 ** (0.019)	0.015 (0.016)
Uniform Duration Dummy ^a	0.149 ** (0.062)	--
Proportion of Unemployment in Manufacturing	0.140 (0.296)	0.120 (0.451)
Proportion of Unemployment in Construction	3.943 ** (0.633)	1.889 ** (0.491)
Constant	-4.857 ** (0.561)	-2.868 ** (0.496)
Average IUR	3.643	3.643
R ²	0.720	0.899
Sample Size	2,244	2,244

NOTE: The regressions contain quarterly state-level data for the period 1981 through 1991. Quarterly dummies and yearly time dummies were also included in these regressions.

^aThe uniform duration dummy was perfectly colinear with a set of state dummy variables. Consequently, we excluded this variable in our fixed effect specifications.

conditions were likely to lead to a reduction in the IUR. Qualifying earnings, as expected, had a negative effect on the IUR, indicating that the higher the base period earnings required to qualify for UI, the lower the IUR. Separation denial rates also had a statistically significant negative effect in the model without fixed effects, but not in the model with fixed effects. In contrast, the nonseparation denial rates coefficients were positive and statistically significant in the model without fixed effects, and negative and significant in the model with fixed effects. The estimated coefficients on the state benefit generosity were positive and statistically significant, indicating that higher generosity is likely to increase the IUR. Higher wage replacement rates, maximum duration, and uniform duration all tended to increase the IUR.⁹

What are the implications of these estimated coefficients for the IUR and consequently the states' ability to trigger extended benefits? In order to answer this question, we used the estimated coefficients to examine the effect on the IUR of a change in value for each key explanatory variable from the 25th and 75th percentile of its distribution, holding other variables at their mean. The percentile values and mean value of the explanatory variables are contained in Table III.3 and the predicted values of the IURs in Table III.4.

We find that state labor market conditions, especially the total unemployment rate, have a large effect on the IUR, while the effects of state eligibility requirements and the effects of the shift from a manufacturing to a service economy on the IUR are small. When we compare the predicted IURs at the 25th and 75 percentiles for the key state eligibility requirement variables, we find only small differences in the IURs, suggesting that changes in eligibility requirements and other factors are unlikely to have a large effect on the availability of extended benefits. However, since the variables we were able to include in our analysis may not fully capture the effects on the IUR of state eligibility requirements, we should view these findings with some caution.

⁹We excluded the uniform duration binary variables from the fixed effect model since it was perfectly collinear with a combination of state dummy variables. Moreover, there was very little variation across states in the maximum duration variable, and, therefore, this variable is likely to be highly correlated with the fixed effects. We ran the fixed-effects model excluding the maximum duration variable. This did not have any effect on the coefficients of the explanatory variables in the model, except to increase the significance of certain state dummy coefficients.

TABLE III.3
DISTRIBUTION OF KEY EXPLANATORY VARIABLES

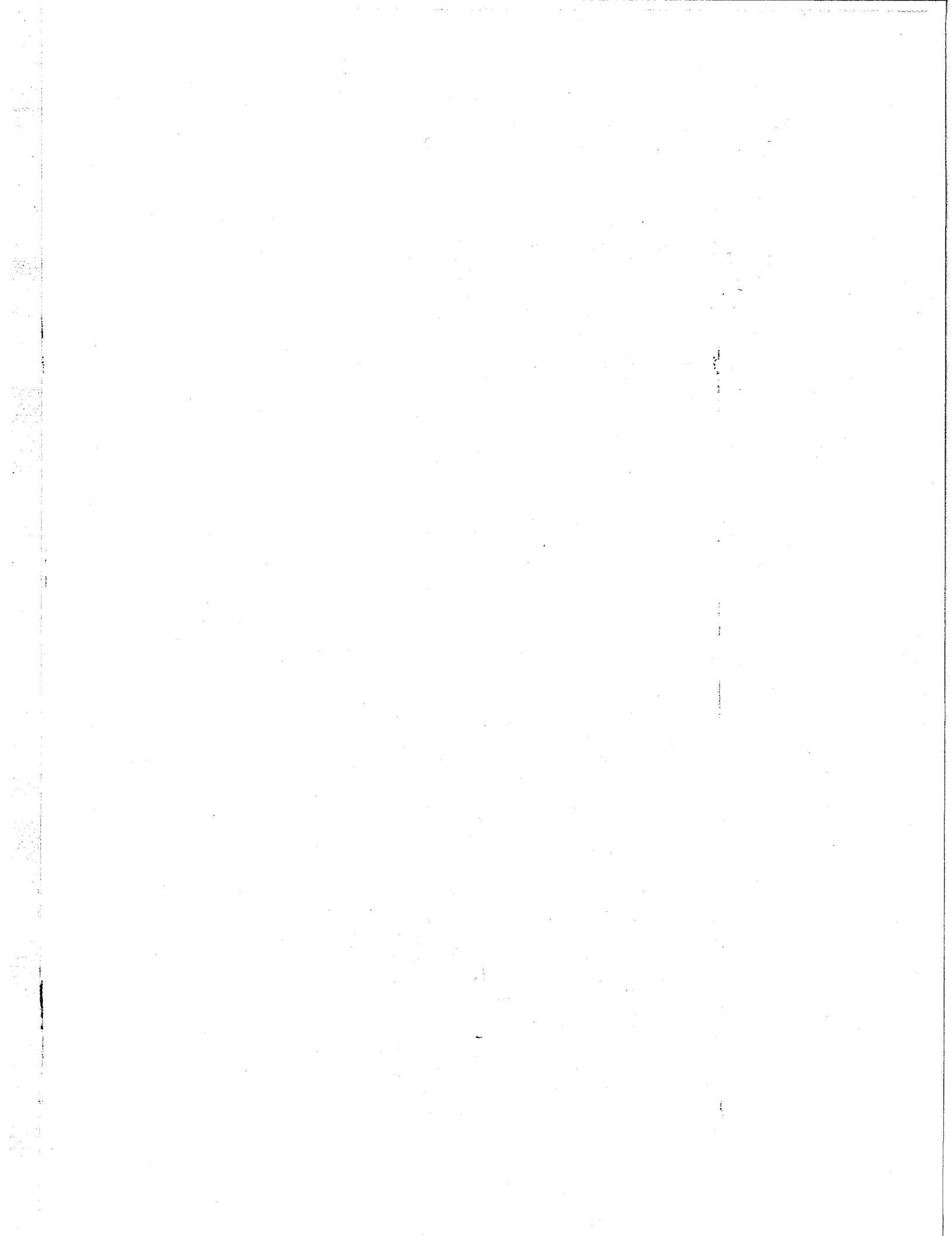
	Mean	25th Percentile	50th Percentile (Median)	75th Percentile
Qualifying Earnings/Average Wages	2.93	1.92	2.75	3.63
Separation Denial Rate	105.42	64.83	90.33	127.26
Nonseparation Denial Rate	16.23	8.27	13.72	20.46
Wage Replacement Rate	0.304	0.273	0.307	0.335
Maximum Duration	26.30	26.00	26.00	26.00
Uniform Duration Dummy	0.157	0	0	0
Proportion of Unemployment in Manufacturing	0.205	0.140	0.209	0.274
Proportion of Unemployment in Construction	0.120	0.098	0.117	0.141
TUR	6.905	5.127	6.514	8.322
Proportion Longterm Unemployed	0.134	0.089	0.122	0.169
Proportion Job Losers	0.494	0.428	0.490	0.559

TABLE III.4

PREDICTED VALUES OF THE TUR EVALUATED AT THE 25TH AND 75TH PERCENTILE OF KEY EXPLANATORY VARIABLES^a

	No Fixed Effects			Fixed Effects		
	25th Percentile	75th Percentile	Difference	25th Percentile	75th Percentile	Difference
Qualifying Earnings/Average Wages	3.71	3.60	-0.11	3.72	3.59	-0.11
Separation Denial Rate	3.79	3.57	-0.22	3.66	3.63	0.03
Nonseparation Denial Rate	3.56	3.69	0.13	3.75	3.58	-0.17
Wage Replacement Rate	3.57	3.72	0.15	3.44	3.84	0.40
Maximum Duration	3.62	3.62	0.00	3.64	3.64	0.00
Uniform Duration Dummy	3.62	3.62	0.00	--	--	--
Proportion of Unemployment in Manufacturing	3.63	3.65	0.02	3.64	3.65	0.01
Proportion of Unemployment in Construction	3.56	3.73	0.17	3.60	3.68	0.08
TUR	2.74	4.36	1.62	2.70	4.39	1.69
Proportion Longterm Unemployment	3.79	3.53	-0.26	3.72	3.58	-0.14
Proportion Job Losers	3.43	3.87	0.44	3.51	3.77	0.26

^aAll other variables included in the regression, except for the one under consideration, were evaluated at the sample means.



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